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SENTRON • SIVACON • ALPHA

Low-Voltage Power Distribution and Electrical Installation Technology

Protection, Switching, Measuring and Monitoring Devices, Switchboards and Distribution Systems

Catalog LV 10

Edition 10/2017

siemens.com/lowvoltage

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Related catalogs

Low-Voltage Power Distribution and Electrical Installation Technology LV 10
SENTRON • SIVACON • ALPHA
Protection, Switching, Measuring and Monitoring Devices, Switchboards and Distribution Systems

PDF/print (E86060-K8280-A101-A6-7600)



3VA Molded Case Circuit Breakers with UL and IEC Certification
SENTRON

PDF/print (E86060-K8290-A101-A2-7600)



Industrial Controls IC 10
SIRIUS

PDF (E86060-K1010-A101-A8-7600)



Industrial Communication IK PI
SIMATIC NET

E86060-K6710-A101-B8-7600



DELTA ET D1
Switches and Socket Outlets

PDF



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TIA Selection Tool
for the selection, configuration and ordering of TIA products and devices

www.siemens.com/tst



Products for Automation and Drives CA 01
Interactive Catalog
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www.siemens.com/lowvoltage

Technical Support



Expert advice on technical questions with a wide range of demand-optimized services for all our products and systems.

www.siemens.com/lowvoltage/support-request

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Low-Voltage Power Distribution and Electrical Installation Technology

Protection, Switching, Measuring and Monitoring Devices, Switchboards and Distribution Systems

SENTRON · SIVACON · ALPHA



Catalog LV 10 · 10/2017

Supersedes:
Catalog LV 10 · 2016/2017

Refer to the Industry Mall for current updates of this catalog:
www.siemens.com/industrymall

The products in this catalog can also be found in the Interactive Catalog CA 01.
Article No.: E86060-D4001-A510-D8-7600

Please contact your local Siemens branch.

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The products and systems listed in this catalog are developed and manufactured using a certified quality management system in accordance with EN ISO 9001:2008.

Protection, Switching, Measuring and Monitoring Devices

Air Circuit Breakers 1
Molded Case Circuit Breakers 2
Miniature Circuit Breakers 3
Residual Current Protective Devices / Arc Fault Detection Devices (AFDDs) 4
Fuse Systems 5
Overvoltage Protection Devices 6
Switch Disconnectors 7
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Busbar Systems 11
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Switchboards and Distribution Systems

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Appendix 20

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New Developments

The 3VA molded case circuit breaker.
A complete system designed with you in mind.



The 3VA molded case circuit breaker is a well thought-out, modular and highly variable system which is rigorously designed to provide optimum support in every process step – from engineering to daily operation of the electrical power distribution system.

NEW

The 3VA2 molded case circuit breaker is available in frame size 1000 A with rated currents of 630 A, 800 A and 1000 A.

The 3VA molded case circuit breaker – a complete system designed with you in mind. It offers high flexibility, efficiency and safety – and enables you to:

- Find solutions – independently of individual requirements
- Minimize efforts – from planning to installation and maintenance
- Increase transparency – across all energy-relevant data
- Ensure system availability – preventively and reliably

→ Page 2/42

For further information visit: www.siemens.com/3VA

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New Developments

Power monitoring made easy: 7KM PAC measuring devices



Modern measuring devices such as the 7KT/7KM PAC record up to 800 measured values precisely and reliably - and forward them to higher-level energy management and automation systems for further processing.

NEW

New additions to the program are the compact 7KM PAC3200T and 7KM PAC2200 standard mounting rail devices for simple, low-cost entry to power monitoring and the expansion module (N), I(Diff), analog.

These measuring devices provide you with the following:

- Integrated communication and web server
- Compact design for the standard mounting rail
- Analog measurement
- Direct integration in powerconfig and powermanager

→ Page 12/13

For further information visit: www.siemens.com/switching-devices

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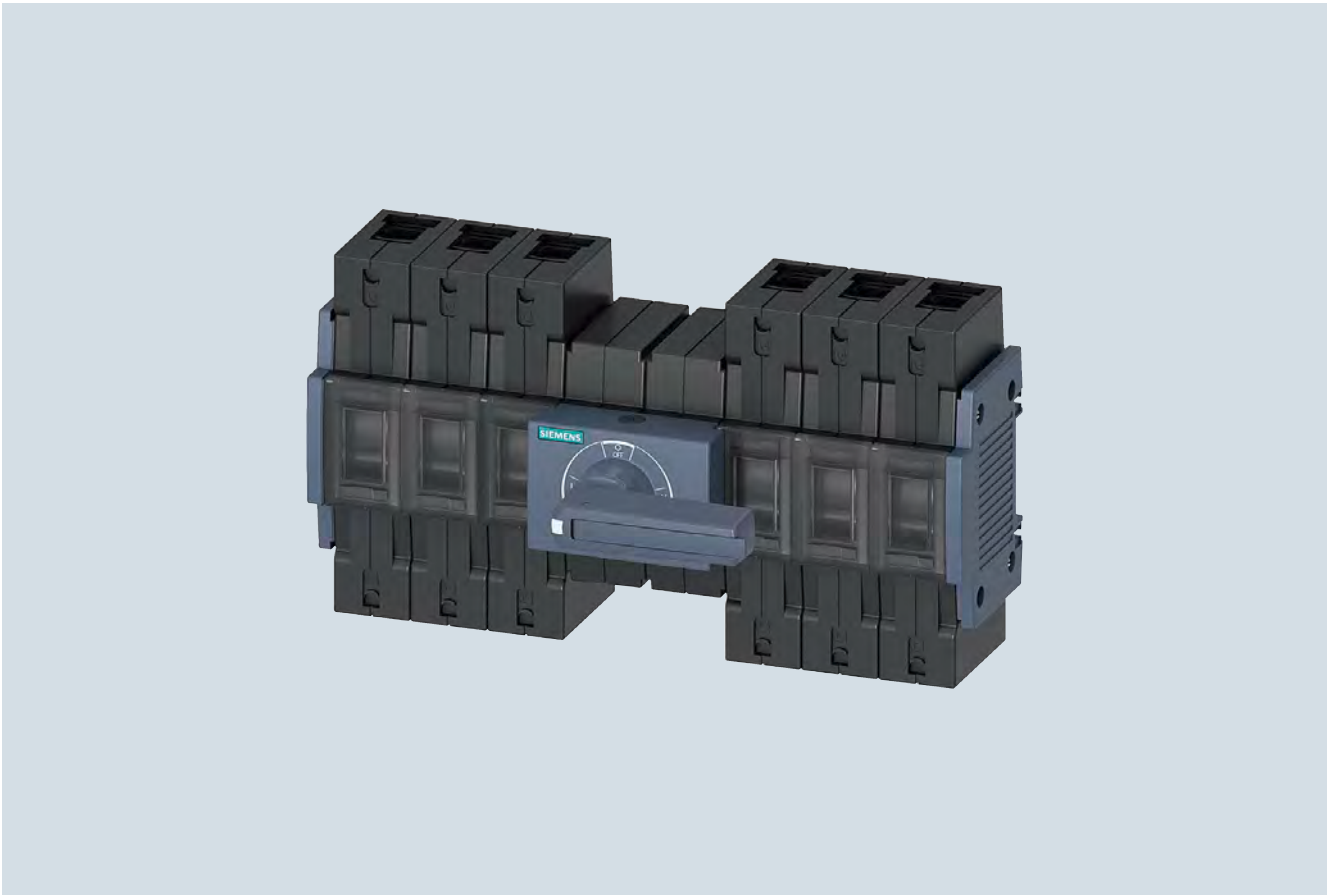
New Developments

Your power supply won't let you down: 3KC transfer switching equipment



NEW

The 3KC transfer switching equipment ensures a continuous supply of power by switching between a main power source and an alternative power source. The devices are characterized in particular by their simple installation and their safe, reliable operation.

The manually operated transfer switching equipment MTSE is available in five frame sizes from 16 to 1600 A each with a 3-pole and 4-pole version.

→ Page 8/12

For further information visit: www.siemens.com/switching-devices

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New Developments

Safer switching under load with the 3KF switch disconnector with fuses



NEW

3KF switch disconnectors with fuses protect against overload and short-circuits in low-voltage circuits as main control switches, EMERGENCY-STOP or maintenance switches of switchboard assemblies, power distribution boards, power supply and motor outgoing feeders. Depending on their size, they enable a rated current between 32 and 800 A to be switched on and off.

3KF switch disconnectors with fuses are optimized for complex applications in which LV HRC fuses are used.

Benefits:

- Switch disconnectors with door coupling or direct operating mechanism in five sizes can be used in a variety of applications.
- Simple retrofitting of functions possible thanks to an extensive range of accessories.
- Reliable protection against electrical accidents by means of locking functions, touch protection and automatically interlocked fuse cover in the switched-on state.
- Rugged technology with high short-circuit strength for high system availability.
- Quick installation on the standard mounting rail with frame sizes up to 80 A.
- Reliable protection also for wind power plants up to 690 V + 10%.

→ Page 7/122

For further information visit: www.siemens.com/powermonitoring

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New Developments

NEW Arc fault detection devices



5SM6 AFDD

In new design and with patented SIARC technology → Page 4/50

NEW Residual current protective devices



5SV RCCB, Type A/AC/F/G/K/SEL

New design → Page 4/4

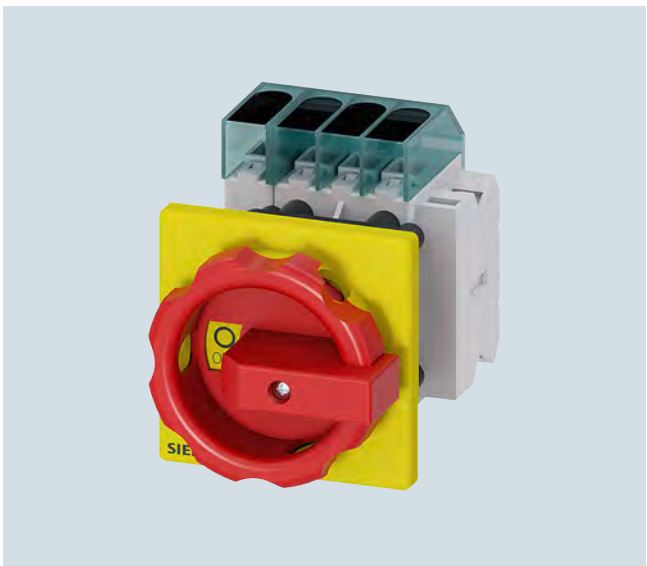
NEW Additional component for protective devices



5ST3 remote controlled mechanism (RC)

For remotely switching protective devices on/off or automatically switching them on again → Pages 3/36 and 4/22

NEW Switching devices



3LD3 main control and EMERGENCY-STOP switches

Safe disconnection of loads from 16 A to 63 A → Page 7/4

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New Developments

NEW Switching devices

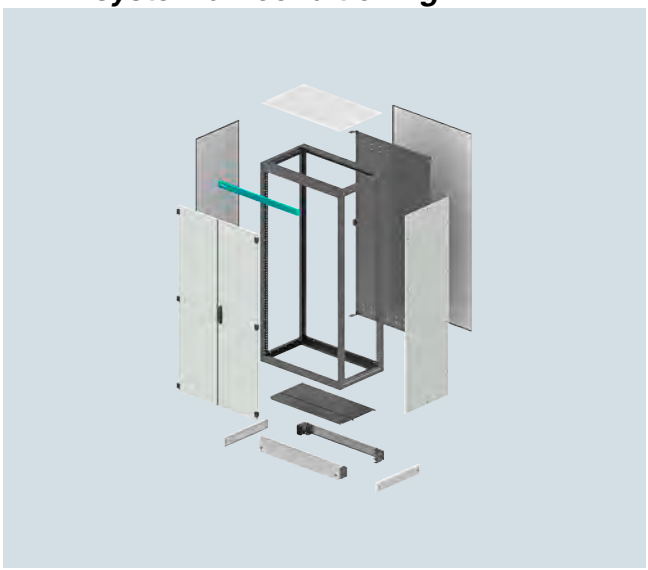


5TT4 remote control switches

Applications from 20 A to 63 A

→ Page 9/24

NEW System cubicles, system lighting and system air-conditioning



SIVACON 8MF1 system cubicles

Expansion of the modular system by further standard elements

→ Page 18/2

NEW Distribution boards



Assembly kit for 3KD switch disconnectors

More flexibility through a host of installation options for the 3KD switch disconnector

→ Page 19/38

NEW Distribution boards



ALPHA DIN technology distribution boards

Portfolio expansion with assembly kits for 3VA molded case circuit breakers with front mounted rotary operator

→ Page 19/32

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New Developments

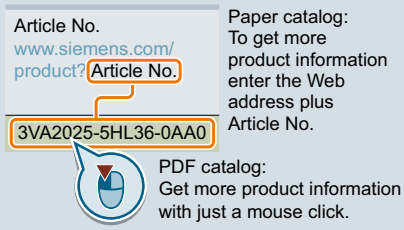
NEW Search function

Search for new products by entering NEW in the text field of the search function.



NEW Clickable article numbers

Direct reference to the products in the Industry Mall from the selection and ordering data tables:



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Notes

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As a source of energy for industry, buildings and infrastructures, the reliability of the power supply is becoming ever more important. Only a flexible power supply tailored to every individual scenario can meet all individual challenges, while at the same time increasing availability and profitability.

Totally Integrated Power (TIP) from Siemens is a holistic, customizable power supply solution comprising software and hardware products, systems and solutions across all voltage levels. The systems and products of the TIP portfolio can be integrated seamlessly into industrial and building automation systems. TIP enables companies to focus on their core business and simultaneously ensure a reliable, secure and efficient supply of power. Because "power matters".

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Electrical power distribution – integrated, safe and efficient

The increasing level of automation in buildings and industry introduces novel requirements for electrical power distribution and makes the underlying technologies ever more complex. Our components and systems are perfect for integration into networked environments, and they significantly contribute toward increasing the efficiency of your business processes. Communication-capable, flexible and fail-safe devices combine with digital engineering to provide you with optimized solutions – for any application.

Comprehensive portfolio

Our products lay the foundations for safe, reliable and efficient electrical infrastructure at medium and low-voltage levels in buildings, infrastructure and industrial applications. Our portfolio includes, among other devices, power distribution boards and distribution boards, communication-capable protection, switching, measuring and monitoring devices, as well as switches and socket outlets. Our tested and certified components, systems and software packages allow for ever-suitable solutions in both centralized and distributed power systems the world over. They reliably protect against accidents, faults and fires caused by electrical installations and allow consumers to utilize electrical power in a sustainable, responsible manner.

Simplified engineering

We support you throughout the entire value chain – from the planning stage, during installation and right through to operation, as well as when it comes to measures for modernizing and expanding your electrical power distribution systems. You benefit from a broad portfolio of personalized and online-based maintenance and support services. Professional software and data ensure simple planning in compliance with standards as well as error-free configuration and documentation. Clear ordering channels, transparent product availability data and high delivery reliability coupled with swift global spare part provision, comprehensive online services, expert consulting and fast, efficient and reliable processes ensure that you are optimally covered throughout the entire product life cycle.

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Planning Efficiency

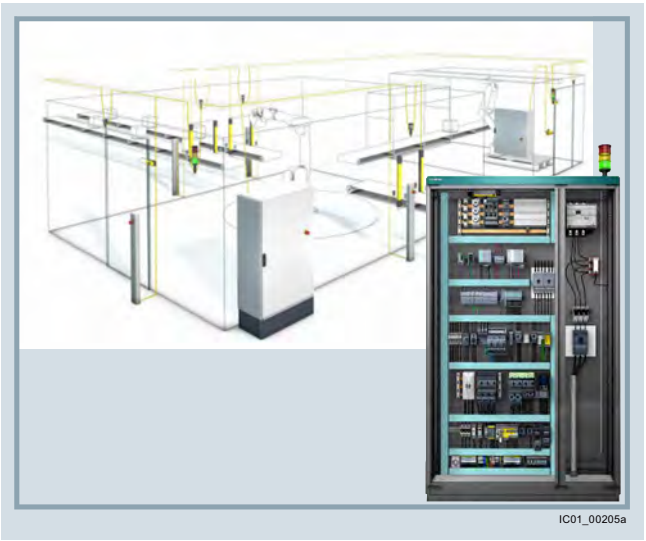
Overview

With Planning Efficiency, Siemens supplies answers to typical questions that often present themselves in electrical planning:

- What is the appropriate product for my application?
- Where can I find product data?
- How can I make processes more efficient and save more time?

The entire electronic support offered by Siemens is merged under Planning Efficiency. At each phase of the project, online functions make the everyday work of the planners easier and more efficient. Planning Efficiency focuses on optimizing the control cabinet configuration among other things.

Especially in this early phase, up to 80% of time and costs can be saved.



IC01_00205a

In order to supply the planners with all they need and to simplify the modern electrical planning of every aspect of the control cabinet configuration, the electrical support of Planning Efficiency focuses on four benefits:

- Finding the right product faster using intuitive product selection
- Time savings of up to 80% with universal product data for your CAE and CAD systems
- User-friendly compilation of project-specific documentation
- Comprehensive support – at any time, whatever your location



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Process phases

At each phase of the process, Siemens provides comprehensive online functions free of charge.

This ensures that all the necessary information and product data are available around the clock at any location worldwide.



Configurators for products and systems

With just a few mouse clicks, you will find yourself guided by the configurator to a suitable product or system. Simply enter the relevant parameters and select your individual solution.

CAx Download Manager

The CAx Download Manager can supply you with all the necessary CAx file types for the products of your choice for use in all common CAE and CAD systems. The data contained in the files is continuously updated. The whole process involves only four selection steps and is free of charge. All the files you select will then be compiled into a zip file and made available for you to download for further use. This results in a time saving of up to 80% because there is no need for manual data collection thanks to the universal manufacturer data for all commonly used CAE and CAD systems.

My Documentation Manager

To provide support when creating the plant documentation, we have developed a manual configurator.
My Documentation Manager enables you to assemble the standard-compliant plant documentation individually with just a few clicks of the mouse. Simply select the required sections from the existing manuals of the installed Siemens products.

EPLAN Electric P8 Macro – a big plus for EPLAN users

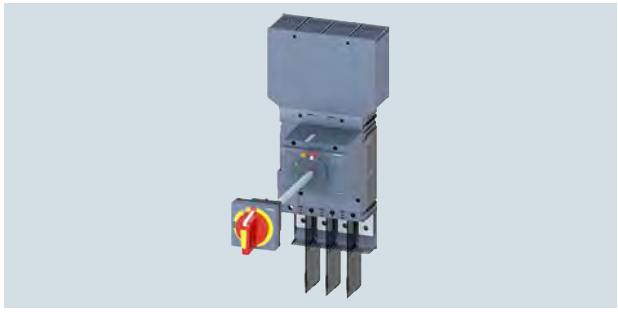
Using the EPLAN Electric P8 Macro in .edz exchange format (EPLAN Data Archived Zipped) the overall time required for data integration can be further reduced. With just a few clicks, the data types for any number of article numbers can be imported and combined. In this way, it is possible for the installed Siemens products to be displayed across different pages of the circuit diagram quickly and easily.

At a glance

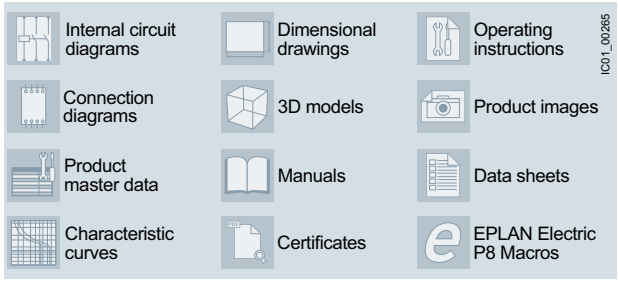
Without Planning Efficiency a lot of time would often be lost due to manual data transmission. Now you are able to concentrate on the essentials. All necessary information and product data is provided by Siemens for easy retrieval.

This makes the control cabinet configuration process more efficient and simplifies your everyday work.

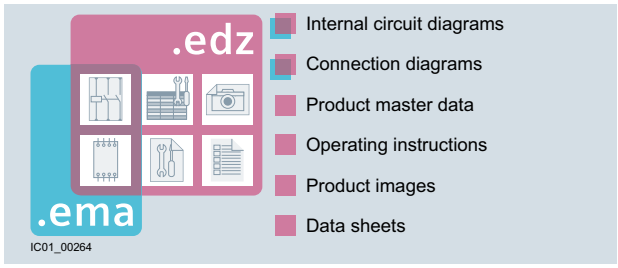
For more information, see www.siemens.com/planning-efficiency.



The configurator supplies the appropriate 3D models and dimension drawings for the control cabinet construction diagram.



The CAx Download Manager makes 11 universal data types available, as well as the EPLAN Electric P8 macro.



The EPLAN Electric P8 macro in .edz exchange format offers even more compared to the .ema exchange format.



Find out more about Planning Efficiency in our informative videos

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Technical Support

The Technical Support for low-voltage power distribution and electrical installation technology assists you with all your technical queries about our products and systems – both before and after delivery.

Still have questions?

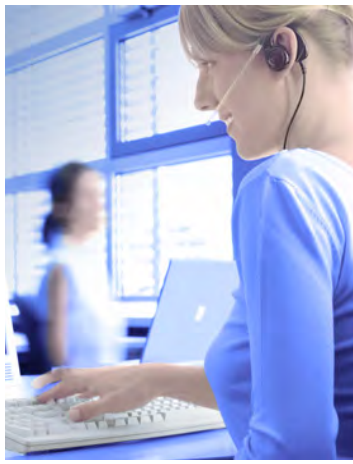
Our experts will help you with competent specialist support



Competent and fast specialist advice on:

- Product selection
- Commissioning
- Issues during operation
- Possible special versions
- Special requirements
- Product features
- Device communication

I201_19185



Get all the information you need – with just one click



Industry Online Support – get up-to-date information online fast

www.siemens.com/online-support

In the "Entry type" selection box in Product Support, you will find manuals, operating instructions, catalogs, certificates, FAQs, etc.

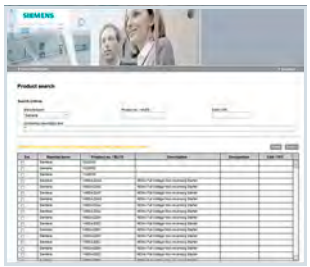
www.siemens.com/lowvoltage/product-support



Support Request – the quickest route to the experts

www.siemens.com/lowvoltage/support-request

You can put your question directly to our Technical Support team using the Support Request Form in Industry Online Support.



Conversion tool – the easy and efficient way of finding successor products

www.siemens.com/conversion-tool

The benefits for you

- Response within 4 hours in 93% of cases
- Direct support from an experienced team of engineers and technicians

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SITRAIN – Training for Industry

With SITRAIN, you benefit from practical training directly from the manufacturer. Our certified trainers are active in more than 60 countries and can help you and you and your employees develop their skills.



Competence through training

Information on our training courses can be found at

www.siemens.com/lowvoltage/training

Requirement for taking part in the courses:
Basic principles of electrical engineering and power distribution

I201_19565



Circuit breaker courses

LV-CBMAIN
Maintenance and operation of SENTRON 3WL circuit breakers: 2 days

LV-CBPROJ
Basic principles of configuring and selecting SENTRON circuit breakers: 1 day

→ **LV-CBCOM**
Communications with SENTRON components: 1 day

→ **LV-SENVER**
Advanced course on SENTRON products: 1 day

Power monitoring courses

LV-EMSENTB
Energy management (Basic): 2 days

→ **LV-EMSENTE**
Energy management (Expert): 1 day

Switchboard courses

LV-ALPHAPB
ALPHA 3200
Switchboard installation: 1 day

LV-ALPHATA
ALPHA 3200
Technology and software: 1 day

LV-SIVAS4
SIVACON S4
Power distribution boards: 2 days

The benefits for you

- Flexible plant adaptation to market requirements
- Ensuring quality standards in production
- Reliable engineering and commissioning
- Shorter commissioning, maintenance and service times
- Exclude expensive faulty planning right from the outset
- Reduce downtimes and rectify faults more quickly

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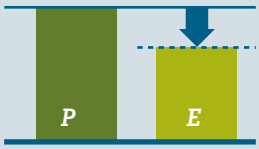
We are IE3/IE4 ready

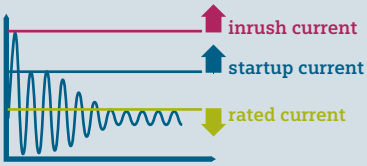
SENTRON/SIRIUS controls and protective devices

for reliable switching and protection of IE3/IE4 motors

IE3/IE4-compliant motors

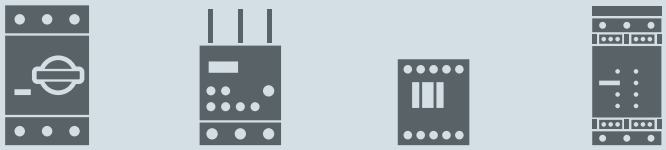


consume
less energy

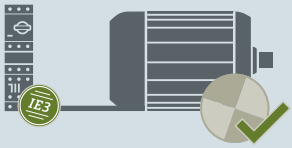


but are characterized by
higher currents during starting

This is why we have optimized our SENTRON/SIRIUS controls and protective devices for IE3/IE4 motors



For example



No false tripping during startup process



Reliable switching capacity when using IE3/IE4 motors

I201_19467

SENTRON/SIRIUS controls and protective devices

Reliable switching and protection of motors *at all times*



Are you IE3/IE4 ready?
siemens.com/ie3ready

IE3 motors have been mandatory for mains-fed operation in Europe since January 1, 2015. The initial stage applies to the 7.5 to 375 kW output range, while in the second stage starting in 2017, the scope will be extended to include outputs down to 0.75 kW.

From an electrical viewpoint, IE3/IE4 motors behave differently than less energy-efficient models – they are characterized by higher startup currents and modified dynamic behavior. That involves challenges for our switchgear and protective equipment.

The latest generation of SENTRON/SIRIUS controls has been fully optimized for IE3/IE4. They avoid false tripping due to the higher inrush currents of IE3/IE4 motors, offer optimized setting ranges for rated currents, and ensure reliable switching and protection in any situation – the best requirements for use of modern IE3/IE4 motors.

You will be optimally equipped for the new motor generation with the **3VA and 3VL molded case circuit breakers**.

HIGHLIGHTS

- Comprehensive range of IE3/IE4 motors for every application
- Siemens offers expertise through extensive analysis of IE3/IE4 motors
- Optimization of SENTRON/SIRIUS switching and protective devices for use with IE3/IE4 motors

More information:

For the IE3/IE4 ready portal, see siemens.com/ie3ready

For the application manual for controls with IE3/IE4 motors see https://support.industry.siemens.com/cs/ww/en/view/94770820

Are you IE3/IE4 ready?

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For further information on 3WL5
see Catalog LV 16



1/2	**Introduction**
	3WL1 air circuit breakers/ non-automatic air circuit breakers
1/5	Introduction
	Up to 6300 A (AC), IEC
1/6	Introduction
1/9	General data
1/19	3-pole, fixed-mounted versions
1/26	3-pole, withdrawable versions
1/33	4-pole, fixed-mounted versions
1/40	4-pole, withdrawable versions
1/47	Options
1/54	Accessories and spare parts
	Up to 4000 A (DC), IEC
1/75	General data
1/78	3- and 4-pole, fixed-mounted versions
1/79	3- and 4-pole, withdrawable versions
1/81	Accessories and spare parts
	3WL5 air circuit breakers/ non-automatic air circuit breakers
1/83	Introduction
1/85	General data
	Up to 5000 A (AC), acc. to UL 489/IEC 60947-2
1/92	3-pole, fixed-mounted versions
1/93	3-pole, withdrawable versions
1/94	4-pole, fixed-mounted versions
1/95	4-pole, withdrawable versions
	Up to 3200 A (DC) acc. to UL 489B/IEC 60947-2
1/96	Fixed-mounted versions
1/97	Options
1/104	Accessories and spare parts
Ch. 8	**3KC ATC5300 and ATC3100 transfer control devices**

For further technical product information:

Configuration Manual

Miniature Circuit Breakers
Article No.: 3ZW1012-5SL61-0AC1

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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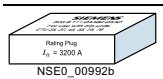
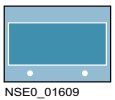
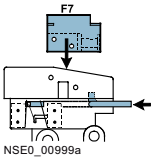
Overview

Devices		Page		Application/individual components	Standards	Used in		
		3WL1	3WL5			Non-residential buildings	Residential buildings	Industry
	**3WL1 air circuit breakers/ non-automatic air circuit breakers up to 6300 A (AC), IEC**	1/19 ... 1/46	--	As incoming-feeder, distribution, tie, and outgoing-feeder circuit breakers in electrical installations. For switching and protecting motors, capacitors, generators, transformers, busbars and cables.	IEC 60947-2, climate-proof acc. to IEC 60068-2-30 CCC	✓	--	✓
	**3WL1 non-automatic air circuit breakers up to 4000 A (DC), IEC**	1/78 ... 1/80	--	As incoming-feeder, distribution, tie, and outgoing-feeder circuit breakers in electrical installations. For switching and protecting busbars and cables.	IEC 60947-2, climate-proof acc. to IEC 60068-2-30 CCC	✓	--	✓
	**3WL5 air circuit breakers up to 5000 A (AC), UL 489/IEC 60947-2**	--	1/92 ... 1/95	As incoming-feeder, distribution, tie, and outgoing-feeder circuit breakers in electrical installations. For switching and protecting motors, capacitors, generators, transformers, busbars and cables.	UL 489, UL 489B, IEC 60947-2 IEC 60947-2 appendix F/CISPR 11/22 Class B DIN VDE 0660 Part 101 climate-proof acc. to IEC 60068-2-30 CCC	✓	--	✓
	**3WL5 air circuit breakers up to 3200 A (DC), UL 489B/IEC 60947-2**	--	1/96	As incoming-feeder, distribution, tie, and outgoing-feeder circuit breakers in electrical installations. For switching and protecting busbars and cables.	UL 489, UL 489B, IEC 60947-2 IEC 60947-2 appendix F/CISPR 11/22 Class B DIN VDE 0660 Part 101 climate-proof acc. to IEC 60068-2-30 CCC	✓	--	✓
	Protective device with device holder and optional metering function (ETU)	1/61	1/107	Electronic Trip Units with current limiters with protection functions LI, LSI, LSING, LSIN(G) with or without metering function *Plus*	As for circuit breakers	✓	--	✓
 NSE0_00992b	**Rating plugs**	1/61	1/107	For rated current I_n from 250 A to 6300 A. The maximum rated current of the circuit breaker must not be exceeded.	As for circuit breakers	✓	--	✓
 NSE0_01027a	**Ground-fault modules**	1/61	1/107	With alarm and tripping	As for circuit breakers	✓	--	✓
 NSE0_01609	**Displays**	1/61	1/107	4-line displays for ETU45B	As for circuit breakers	✓	--	✓
 NSE0_00990a	**Current transformers for N conductor protection**	1/61	1/107	Internal transformers for N conductors, external transformers for N conductors	As for circuit breakers	✓	--	✓
	EMC filters	1/61	1/107	Common-mode interference suppressor filters	As for circuit breakers	✓	--	✓
 NSE0_00999a	**More accessories for Electronic Trip Units**	1/62	1/108	Sealable and lockable covers, automatic reset of the reclosing lockout, remote reset solenoid, retrofittable internal **Cubicle**BUS wiring, retrofittable internal wiring for connection of the external N and G transformers	As for circuit breakers	✓	--	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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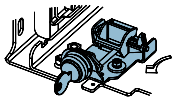
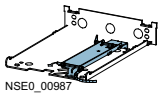
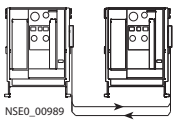
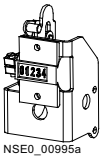
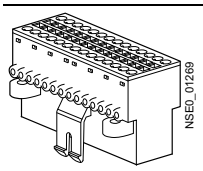
Devices		Page		Application/individual components	Standards	Used in		
		3WL1	3WL5			Non-residential buildings	Residential buildings	Industry
 NSE0_00982	**Locking devices**	1/62	1/108	Interlocking set for mechanical ON/OFF, locking devices against unauthorized closing in operator panels/for withdrawable circuit breakers, locking devices for operating mechanism handle with padlock, locking devices to prevent movement of the withdrawable circuit breakers, interlocking systems	As for circuit breakers	✓	--	✓
 NSE0_00987	**Locking mechanisms**	1/63	1/109	To prevent movement of the withdrawable circuit breakers into disconnected position, to prevent opening of the cabinet door in ON position, to prevent opening of the cabinet door, to prevent movement with the cabinet door open	As for circuit breakers	✓	--	✓
 NSE0_00989	**Interlocks**	1/64	1/110	Mutual mechanical interlocking, couplings on the circuit breaker (with ring) for mutual interlocking, Bowden wire	As for circuit breakers	✓	--	✓
 	**3KC ATC5300 and ATC3100 transfer control devices**	Ch. 8	Ch. 8	The 3KC ATC5300 and ATC3100 transfer control devices, equipped with two circuit breakers with motorized operating mechanism, serve as a transfer system that automatically or manually switches between two power supply systems in low-voltage power distribution applications.	IEC 60947-6-1 DIN VDE 0660-114 UL 508 CSA 22.2 No. 14	✓	✓	✓
	Test devices	1/64	1/110	Manual testers Release 2 for Electronic Trip Units, function testers	As for circuit breakers	✓	--	✓
	Capacitor storage devices	1/64	1/110	For shunt releases	As for circuit breakers	✓	--	✓
 NSE0_00995a	**Indicators, control elements**	1/65	1/111	Ready-to-close signaling switches, signaling switches, tripped signaling switches, operating cycles counters, stored-energy status signaling switches, position signaling switches for guide frames, electric ON buttons, motor shutdown switches, EMERGENCY-STOP buttons	As for circuit breakers	✓	--	✓
 NSE0_01269	**Auxiliary conductor terminals**	1/66	1/112	Male connectors for circuit breakers, extension for 1000 V male connector versions, male connectors and extension for1000 V, auxiliary supply connectors for circuit breakers or guide frames, coding kits, sliding contacts for guide frames, blanking blocks for circuit breakers	As for circuit breakers	✓	--	✓
	Auxiliary releases	1/67	1/113	Closing coils/shunt releases, undervoltage releases	As for circuit breakers	✓	--	✓
	Operating mechanisms	1/67	1/113	Motorized operating mechanism	As for circuit breakers	✓	--	✓
	Auxiliary contacts	1/67	1/113	Auxiliary switch blocks	As for circuit breakers	✓	--	✓
	Door sealing frames, hoods, shutters	1/68	1/114	Door sealing frames, IP55 protective covers, shutters	As for circuit breakers	✓	--	✓
	Arc chutes	1/68	--	Arc chutes, arc chute covers	As for circuit breakers	✓	--	✓
	Coding for withdrawable version	1/68	1/114	By customer, for 36 coding variants	As for circuit breakers	✓	--	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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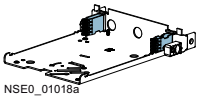
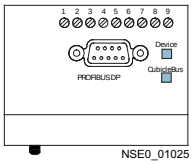
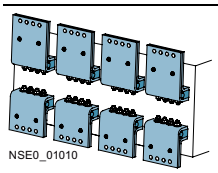
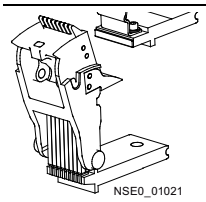
Devices		Page		Application/individual components	Standards	Used in		
		3WL1	3WL5			Non-residential buildings	Residential buildings	Industry
 NSE0_01018a	**Grounding connection**	1/69	--	Grounding connection between the guide frame and the withdrawable circuit breaker, contacting modules for withdrawable circuit breakers	As for circuit breakers	✓	--	✓
	Support brackets	1/69	1/115	For mounting fixed-mounted circuit breakers on vertical plane	As for circuit breakers	✓	--	✓
	CubicleBUS modules	1/69	1/115	Digital and analog input and output modules, Zone Selective Interlocking modules	As for circuit breakers	✓	--	✓
	Parameterization systems	1/69	1/115	Breaker Data Adapter (BDA), BDA *Plus*, connection cables for BDA *Plus*, powerconfig parameterization software	As for circuit breakers	✓	--	✓
	Accessories for communications	1/70	1/116	Pre-assembled cables for CubicleBUS modules, SENTRON manuals for communication solutions, voltage transformers	As for circuit breakers	✓	--	✓
 NSE0_01025	**Retrofitting and spare parts**	1/70	1/116	PROFIBUS retrofit kits, COM15 PROFIBUS modules, COM16 MODBUS modules, MODBUS IEC retrofit kits, Breaker Status Sensor (BSS), metering function *Plus*	As for circuit breakers	✓	--	✓
 NSE0_01010	**Main conductor connections, fixed-mounted, main conductor connections, withdrawable**	1/71, 1/72	1/117, 1/118	Front-accessible main connections with double or single hole, rear vertical main connections, rear horizontal main connections, circuit connecting flanges, supports for front and DIN connecting bars	As for circuit breakers	✓	--	✓
	Conversion sets	1/73	1/118	Conversion set for converting fixed-mounted circuit breakers into withdrawable circuit breakers	As for circuit breakers	✓	--	✓
 NSE0_01021	**Main contact elements**	1/73	--	For replacement of the main contacts during maintenance and thus to boost the useful life of the breaker.	As for circuit breakers	✓	--	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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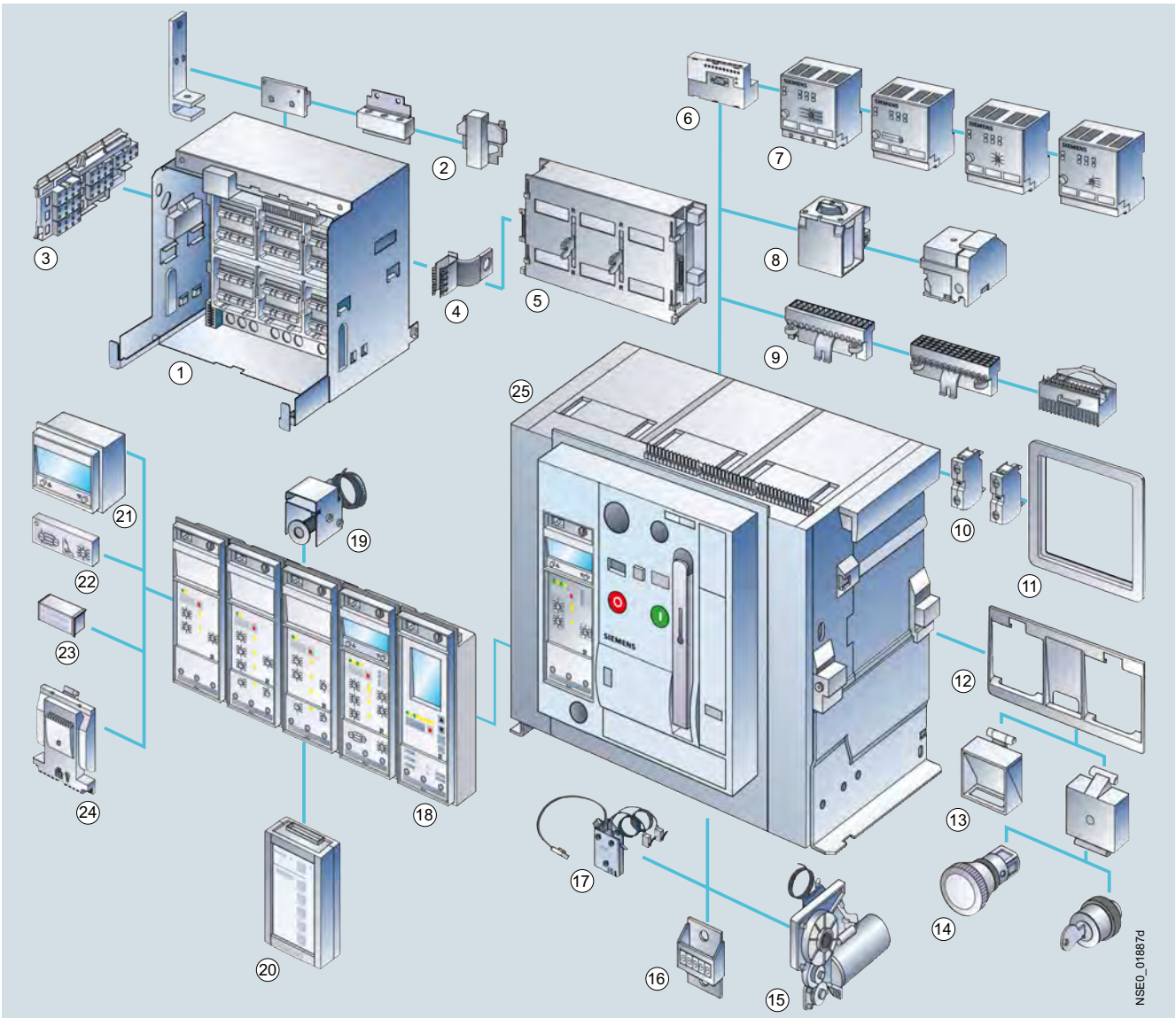
Overview

3WL1 air circuit breakers offer highly flexible application and consistent communication capability. With the 3WL1 circuit breakers, just three sizes cover a performance range of 630 A to 6300 A. All models are characterized by the same design, the same operation and the same comprehensive accessories.



1. Guide frame (page 1/55 to page 1/60)
2. Main circuit connection front, flange, horizontal, vertical (page 1/52, 1/71 and 1/72)
3. Position signaling switch (page 1/50 and 1/65)
4. Grounding connection, leading (page 1/69)
5. Shutters (page 1/50 and 1/68)
6. COM15 PROFIBUS module or COM16 MODBUS module (page 1/50 and 1/70)
7. External **Cubicle**BUS modules (page 1/69)
8. Closing coil, auxiliary release (page 1/47, 1/49 and 1/67)
9. Auxiliary conductor plug-in system (page 1/51 and 1/66)
10. Auxiliary switch block (page 1/47 and 1/67)
11. Door sealing frame (page 1/49 and 1/68)
12. Interlocking set for mechanical ON/OFF (page 1/62)
13. Transparent panel, function insert (page 1/62)
14. EMERGENCY-STOP pushbutton, key operated (page 1/65)
15. Motorized operating mechanism (page 1/49 and 1/67)
16. Operating cycles counter (page 1/49 and 1/65)
17. Breaker Status Sensor (BSS) (page 1/50 and 1/70)
18. Protective device with device holder, Electronic Trip Unit (ETU) (page 1/61)
19. Remote reset solenoid (page 1/49 and 1/62)
20. Breaker Data Adapter (BDA *Plus*) (page 1/69)
21. Four-line display (page 1/61)
22. Ground-fault protection module (page 1/61)
23. Rating plug (page 1/48 and 1/61)
24. Metering function module (page 1/50 and 1/61)
25. Air circuit breaker (page 1/19 to 1/46)

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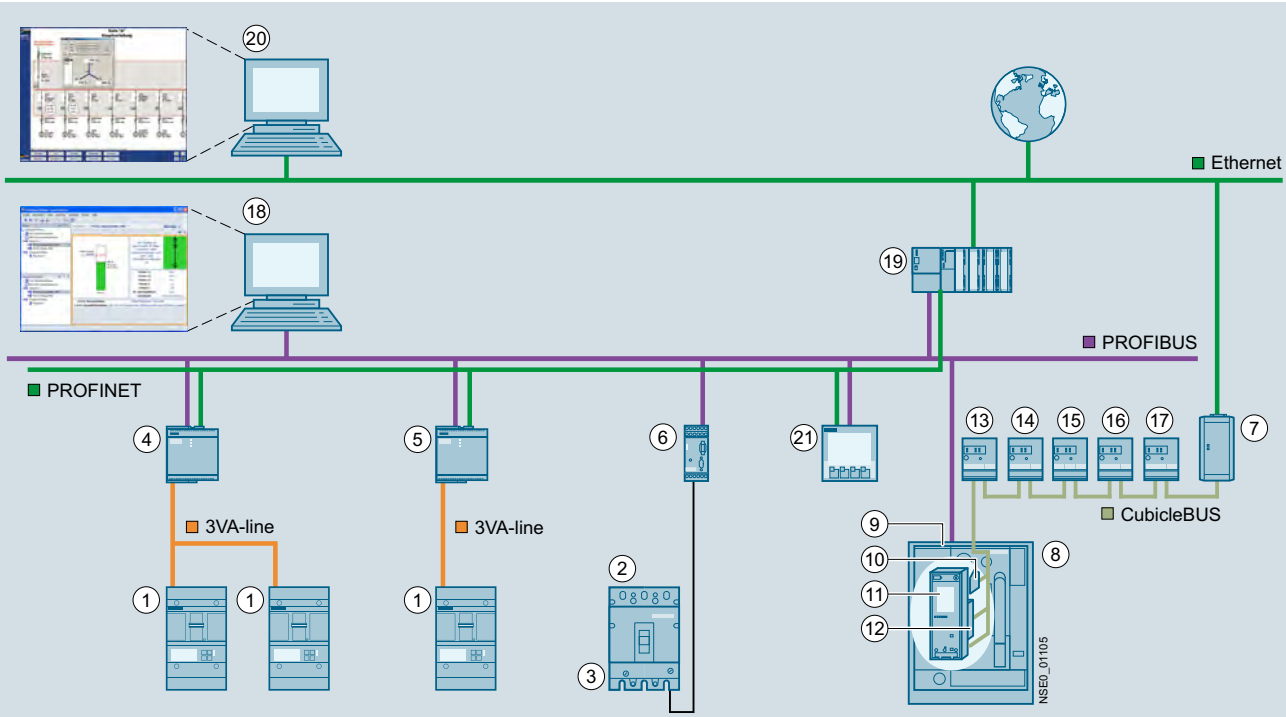
Introduction

Overview

Communication-capable circuit breakers (with ETU45B or ETU76B Electronic Trip Unit)



1 3VA molded case circuit breakers
2 3VL molded case circuit breakers
3 Electronic Trip Unit ETU / LCD ETU
4 COM800 breaker data server
5 COM100 breaker data server
6 COM20 Release 2 PROFIBUS module including Zone Selective Interlocking
7 BDA *Plus* with Ethernet interface
8 3WL air circuit breaker
9 COM15 PROFIBUS module
10 Breaker Status Sensor (BSS)
11 Electronic Trip Unit (ETU)
12 Metering function *Plus*
13 Zone Selective Interlocking module
14 Digital output module with relay contacts
15 Digital output module with relay contacts, configurable
16 Analog output module
17 Digital input module
18 Configuration software powerconfig V2.3 and higher
19 PLC, e.g. SIMATIC S7
20 E.g. SIMATIC powerrate
21 7KM PAC measuring devices

Minimum order quantity (PS) or a multiple thereof can be ordered.

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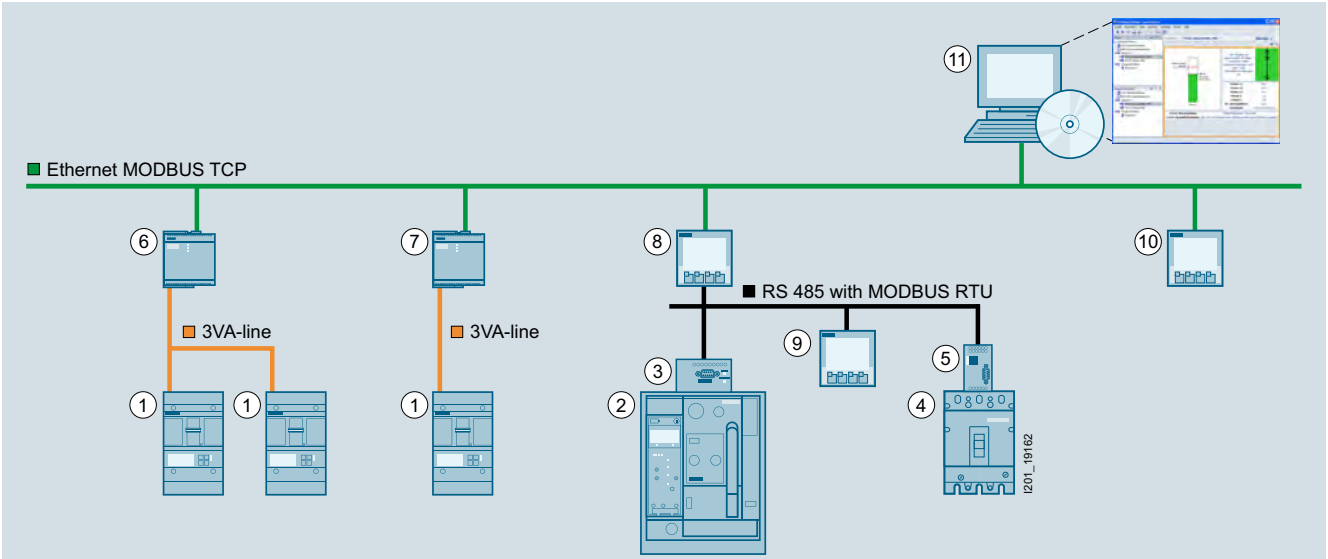

1 3VA molded case circuit breakers
2 3WL air circuit breaker
3 COM16 MODBUS module
4 3VL molded case circuit breaker
5 COM21 MODBUS module
6 COM800 breaker data server
7 COM100 breaker data server
8 7KM PAC4200 measuring device
9 7KM PAC3100 measuring device
10 7KM PAC3200 measuring device
11 powerconfig configuration software V2.3 and higher

Characteristics

- Coordinated communication concept using the PROFIBUS DP or MODBUS, ranging from 16 A to 6300 A with 3VL molded case circuit breakers and 3WL air circuit breakers
- The high level of modularity of circuit breakers and accessories allows easy retrofitting of all communication components
- Significant additional benefits for the switchboard due to the possibility of linking up external input and output modules to the circuit breaker-internal **Cubicle**BUS of the 3WL air circuit breaker
- Innovative software products for parameterization, operation, monitoring, and diagnostics of circuit breakers, both locally or via PROFIBUS DP, MODBUS or Ethernet/Intranet/Internet
- Complete integration of the circuit breakers into the Totally Integrated Power and Totally Integrated Automation solutions

Communication:

- For air circuit breakers with optional communication function (ETU45B or ETU76B Electronic Trip Unit), see page 1/19 to page 1/46.
- For accessories, see page 1/69 and page 1/70.
- For more information, see chapter "Measuring Devices and Power Monitoring" and see chapter "Monitoring Devices".
- For configuring information, see also configuration manual "Air Circuit Breakers" at www.siemens.com/lowvoltage/manuals.

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Benefits

Low space requirements

The 3WL1 air circuit breakers require very little space. Size I devices (up to 2000 A) fit into a 400 mm wide switchboard panel. Size III devices (up to 6300 A) are the smallest of their kind and with their construction width of 704 mm fit into an 800 mm wide switchboard panel.

Modular design

Components such as auxiliary releases, motorized operating mechanisms, Electronic Trip Units, current sensors, auxiliary circuit signaling switches, automatic reset devices, interlocks and engagement operating mechanisms can all be exchanged or retrofitted at a later stage, thus allowing the circuit breaker to be adapted to new, changing requirements.

The main contact elements can all be replaced in order to increase the endurance of the circuit breaker.

Retrofittable modules for Electronic Trip Units

Modularity is one of the main features of the new 3WL1 circuit breakers.
Special LCDs, ground-fault modules, rating plugs and communication modules for the Electronic Trip Units are available for fast and easy retrofitting and adaptation to changing requirements.

Communication/metering functions

The use of modern communication-capable circuit breakers opens up completely new possibilities in terms of start-up, parameterization, diagnostics, maintenance and operation. This allows many different ways of reducing costs and improving productivity in industrial plants, buildings and infrastructure projects to be achieved:

- Fast and reliable parameterization
- Timely information and response can prevent plant stoppages
- Effective diagnostics management
- Measured values are the basis for efficient load management, for drawing up power demand profiles and for allocating energy to cost centers
- Preventive maintenance reduces the risk of expensive plant downtimes
- Metering function with a very wide range of measured values, such as current, voltage, energy, power, etc.
- Can be used in 690 V networks

Application

- As incoming-feeder, distribution, tie, and outgoing-feeder circuit breakers in electrical installations.
- For switching and protecting motors, capacitors, generators, transformers, busbars and cables.

When connected to an electronic I&C system, the air circuit breakers offer a wide range of options for monitoring network events.

Air circuit breakers belong to the SENTRON product family of protection, switching, measuring and monitoring devices and can be used in applications between 16 A and 6300 A.

The AC devices are available as circuit breakers and non-automatic air circuit breakers. DC devices are only available as non-automatic air circuit breakers.

Standards

3WL1 air circuit breakers comply with:

- IEC 60947-2
- IEC 60947-2 Appendix F / CISPR 11/22 Class B
- Climate-proof according to IEC 60068-2-30.

For further standards, see chapter "Appendix".

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Technical specifications

Size			I				II			
Type			**... 3WL11 10**	**3WL11 12**	**3WL11 16**	**3WL11 20**	**3WL12 08**	**3WL12 10**	**3WL12 12**	**3WL12 16**
Number of poles			3-pole, 4-pole							
Rated current I_n at 40 °C, at 50/60 Hz										
Main conductor		A	... 1000	1250	1600	2000	800	1000	1250	1600
N conductor (only on 4-pole versions)		A	... 1000	1250	1600	2000	800	1000	1250	1600
Rated operational voltage U_e at 50/60 Hz		V AC	...	...	...	...	...	...	...	...
(1000 V version, see page 1/48 "Options")			690/1000	690/1000	690/1000	690/1000	690/1000	690/1000	690/1000	690/1000
Rated insulation voltage U_i		V AC	1000	1000	1000	1000	1000	1000	1000	1000
Rated impulse withstand voltage U_{imp}										
• Main conducting paths		kV	12	12	12	12	12	12	12	12
• Auxiliary circuits		kV	4	4	4	4	4	4	4	4
• Control circuits[9]		kV	2.5	2.5	2.5	2.5	2.5	2.5	2.5	2.5
Isolating function acc. to EN 60947-2			Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes
Utilization category			B							
Permissible ambient temperature										
• During operation (in operation with LCD max. 55 °C)[1]		°C	–25/+70	–25/+70	–25/+70	–25/+70	–25/+70	–25/+70	–25/+70	–25/+70
• Storage		°C	–40/+70	–40/+70	–40/+70	–40/+70	–40/+70	–40/+70	–40/+70	–40/+70
Permissible load for withdrawable versions at rear horizontal main connections	• Up to 55 °C (Cu, bare)	A	1000	1250	1600	2000	800	1000	1250	1600
	• Up to 60 °C (Cu, bare)[2]	A	1000	1250	1600	1930	800	1000	1250	1600
	• Up to 70 °C (Cu black, painted)[2]	A	1000	1210	1490[3]	1780	800	1000	1250	1600
Rated rotor operational voltage U_{er}		V	2000	2000	2000	2000	2000	2000	2000	2000
Power loss at I_n										
With three-phase symmetrical load										
• Fixed-mounted circuit breakers		W	100	105	150	240	40	45	80	85
• Withdrawable circuit breakers		W	195	205	350	440	85	95	165	175
Switching times										
• Make time		ms	35	35	35	35	35	35	35	35
• Opening time		ms	38	38	38	38	34	34	34	34
• Electrical make time (through closing coil)[4]		ms	80	80	80	80	100	100	100	100
• Electrical opening time (through shunt release)		ms	73	73	73	73	73	73	73	73
• Electrical opening time (instantaneous undervoltage release)		ms	73	73	73	73	73	73	73	73
• Opening time due to ETU, instantaneous short-circuit release		ms	50	50	50	50	50	50	50	50
Service life: Breaking capacity N and S, 3-/4-pole										
• Mechanical (without maintenance)		Operating cycles	10 000	10 000	10 000	10 000	10 000	10 000	10 000	10 000
• Mechanical (with maintenance)[5]		Operating cycles	20 000	20 000	20 000	15 000	15 000	15 000	15 000	15 000
• Electrical (without maintenance)		Operating cycles	10 000	10 000	10 000	7500	7500	7500	7500	7500
• 1000 V version, electrical (without maintenance)		Operating cycles	--	--	--	--	--	--	--	--
• 1150 V version, electrical (without maintenance)		Operating cycles	--	--	--	--	--	--	--	--
• Electrical (with maintenance)[5]		Operating cycles	20 000	20 000	20 000	15 000	15 000	15 000	15 000	15 000
Service life: Breaking capacity H, 3-pole										
• Mechanical (without maintenance)		Operating cycles	10 000	10 000	10 000	10 000	10 000	10 000	10 000	10 000
• Mechanical (with maintenance)[5]		Operating cycles	15 000	15 000	15 000	15 000	15 000	15 000	15 000	15 000
• Electrical (without maintenance)		Operating cycles	7 500	7 500	7 500	7500	7500	7500	7500	7500
• 1000 V version, electrical (without maintenance)		Operating cycles	1000	1000	1000	1000	1000	1000	1000	1000
• 1150 V version, electrical (without maintenance)		Operating cycles	--	--	--	--	500	500	500	500
• Electrical (with maintenance)[5][6]		Operating cycles	15 000	15 000	15 000	15 000	15 000	15 000	15 000	15 000
Service life: Breaking capacity H, 4-pole										
• Mechanical (without maintenance)		Operating cycles	10 000	10 000	10 000	10 000	10 000	10 000	10 000	10 000
• Mechanical (with maintenance)[5]		Operating cycles	15 000	15 000	15 000	15 000	15 000	15 000	15 000	15 000
• Electrical (without maintenance)		Operating cycles	7 500	7 500	7 500	7500	7500	7500	7500	7500
• 1000 V version, electrical (without maintenance)		Operating cycles	1000	1000	1000	1000	1000	1000	1000	1000
• 1150 V version, electrical (without maintenance)		Operating cycles	--	--	--	--	500	500	500	500
• Electrical (with maintenance)[5][6]		Operating cycles	10 000	10 000	10 000	10 000	15 000	15 000	15 000	15 000
Service life: Breaking capacity C										
• Mechanical (without maintenance)		Operating cycles	--	--	--	--	5 000	5 000	5 000	5 000
• Mechanical (with maintenance)[5]		Operating cycles	--	--	--	--	10 000	10 000	10 000	10 000
• Electrical (without maintenance)		Operating cycles	--	--	--	--	5 000	5 000	5 000	5 000
• Electrical (with maintenance)[5]		Operating cycles	--	--	--	--	10 000	10 000	10 000	10 000
Switching frequency[7]										
• 690 V version		1/h	60[8]	60[8]	60[8]	60	60[8]	60[8]	60[8]	60[8]
• 1000 V version		1/h	--	--	--	20	20	20	20	20
• 1150 V version		1/h	--	--	--	--	20	20	20	20
Minimum interval between tripping operation by Electronic Trip Unit and next making operation of the circuit breaker (only with automatic mechanical resetting of the lockout device). Minimum interval between On-Off or Off-On switching operations.		ms	80	80	80	80	80	80	80	80

1) Use of trip units from -20 °C.
2) ETU76B with graphics display can be used up to max. 55 °C.
3) At breaking capacity H: 1600 A to 70 °C.
4) Make time through closing coil for synchronization purposes (short-time excited) 50 ms.
5) Maintenance means: Replace main contact elements and arc chutes (see Operating Manual).
6) Replacement of the main contact elements of circuit breakers size I with breaking capacity H is only possible at the factory.
7) Minimum interval time between 2 tripping operations.
8) 3-pole switching with breaking capacity N and S: 45/h.
9) Motorized operating mechanism U_{imp}=1.2 kV

Minimum order quantity (PS) or a multiple thereof can be ordered.

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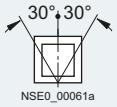
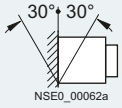
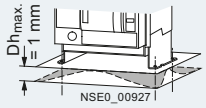
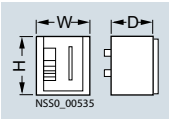
General data

Size			**I**				**II**			
Type			**... 3WL11 10**	**3WL11 12**	**3WL11 16**	**3WL11 20**	**3WL12 08**	**3WL12 10**	**3WL12 12**	**3WL12 16**
Mounting position			 and/or 							
Degree of protection			IP20 without cabinet door, IP41 with door sealing frame, IP55 with cover							
Main conductor minimum cross-sections	• Copper bars, bare	Unit(s) mm²	1 × 60 × 10	2 × 40 × 10	2 × 50 × 10	3 × 50 × 10	1 × 50 × 10	1 × 60 × 10	2 × 40 × 10	2 × 50 × 10
	• Copper bars, painted black	Unit(s) mm²	1 × 60 × 10	2 × 40 × 10	2 × 50 × 10	3 × 50 × 10	1 × 50 × 10	1 × 60 × 10	2 × 40 × 10	2 × 50 × 10
Auxiliary conductors (Cu) Max. number Auxiliary conductors × cross-section (solid/stranded)	Standard connection = strain-relief clamp									
	• Without end sleeve		2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16); 1 × 2.5 mm² (AWG 14)							
	• With end sleeve acc. to DIN 46228 Part 2		1 × 0.5 mm² (AWG 20) ... 1 × 1.5 mm² (AWG 16)							
	• With twin end sleeve		2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)							
	Optional connection = tension spring									
	• Without end sleeve		2 × 0.5 mm² (AWG 20) ... 2 × 2.5 mm² (AWG 14)							
	• With end sleeve acc. to DIN 46228 Part 2		2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)							
Position signaling switches	Tension spring terminals		1 × 0.5 mm² (AWG 20) ... 1 × 2.5 mm² (AWG 14)							
Weights 3-pole	• Fixed-mounted circuit breakers	kg	43	43	43	43	56	56	56	56
	• Withdrawable circuit breakers	kg	45	45	45	45	60	60	60	60
4-pole	• Guide frames	kg	25	25	25	25	31	31	31	31
	• Fixed-mounted circuit breakers	kg	50	50	50	50	67	67	67	67
	• Withdrawable circuit breakers	kg	54	54	54	54	72	72	72	72
	• Guide frames	kg	30	30	30	30	37	37	37	37
Dimensions 3-/4-pole 		W mm	320/410				460/590			
	Fixed-mounted	H mm	434				434			
		D mm	291				291			
	Withdrawable	H mm	465.5				465.5			
		D mm	471				471			

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size			**II**				**III**		
Type			**3WL12 20**	**3WL12 25**	**3WL12 32**	**3WL12 40**	**3WL13 40**	**3WL13 50**	**3WL13 63**
Number of poles			3-pole, 4-pole						
Rated current I_n at 40 °C, at 50/60 Hz									
Main conductor		A	2000	2500	3200	4000	4000	5000	6300
N conductor (only on 4-pole versions)		A	2000	2500	3200	4000	4000	5000	6300
Rated operational voltage U_e at 50/60 Hz		V AC	...	...	...	...	...	...	...
(1000 V version, see page 1/48 "Options")			690/1000	690/1000	690/1000	690/1000	690/1000	690/1000	690/1000
Rated insulation voltage U_i		V AC	1000	1000	1000	1000	1000	1000	1000
Rated impulse withstand voltage U_{imp}									
• Main conducting paths		kV	12	12	12	12	12	12	12
• Auxiliary circuits		kV	4	4	4	4	4	4	4
• Control circuits[10]		kV	2.5	2.5	2.5	2.5	2.5	2.5	2.5
Isolating function acc. to EN 60947-2			Yes	Yes	Yes	Yes	Yes	Yes	Yes
Utilization category			B						
Permissible ambient temperature									
• During operation (in operation with LCD max. 55 °C)[1]		°C	–25/+70	–25/+70	–25/+70	–25/+70	–25/+70	–25/+70	–25/+70
• Storage		°C	–40/+70	–40/+70	–40/+70	–40/+70	–40/+70	–40/+70	–40/+70
Permissible load for withdrawable versions[2) 4)]	• Up to 55 °C (Cu, bare)	A	2000	2500	3200	3950	4000	5000	5920
	• Up to 60 °C (Cu, bare)	A	2000	2500	3020	3810	4000	5000	5810
	• Up to 70 °C (Cu black, painted)	A	2000	2280	2870	3600	4000	5000	5500
Rated rotor operational voltage U_{er}		V	2000	2000	2000	2000	2000	2000	2000
Power loss at I_n									
With three-phase symmetrical load									
• Fixed-mounted circuit breakers		W	180	270	410	750	520	630	900
• Withdrawable circuit breakers		W	320	520	710	925	810	1050	1600
Switching times									
• Make time		ms	35	35	35	35	35	35	35
• Opening time		ms	34	34	34	34	34	34	34
• Electrical make time (through closing coil)[5]		ms	100	100	100	100	100	100	100
• Electrical opening time (through shunt release)		ms	73	73	73	73	73	73	73
• Electrical opening time (instantaneous undervoltage release)		ms	73	73	73	73	73	73	73
• Opening time due to ETU, instantaneous short-circuit release		ms	50	50	50	50	50	50	50
Service life: Breaking capacity N, S and H[11)]									
• Mechanical (without maintenance)		Operating cycles	10000	10000	10000	10000	5000	5000	5000
• Mechanical (with maintenance)[6]		Operating cycles	15000	15000	15000	15000	10000	10000	10000
• Electrical (without maintenance) up to 690 V		Operating cycles	7500	7500	4000	2000	2000	2000	2000
• 1000 V version, electrical (without maintenance)		Operating cycles	1000	1000	1000	1000	1000	1000	1000
• 1150 V version, electrical[7] (without maintenance)		Operating cycles	500	500	500	500	500	500	500
• Electrical (with maintenance)[6]		Operating cycles	15000	15000	15000	15000	10000	10000	10000
Service life: Breaking capacity C									
• Mechanical (without maintenance)		Operating cycles	5000	5000	5000	--	5000	5000	5000
• Mechanical (with maintenance)[6]		Operating cycles	10000	10000	10000	--	10000	10000	10000
• Electrical (without maintenance) up to 690 V		Operating cycles	5000	5000	4000	--	1000	1000	1000
• Electrical (without maintenance) up to 1150 V		Operating cycles	--	--	--	--	500	500	500
• Electrical (with maintenance) up to 690 V[6]		Operating cycles	10000	10000	8000	--	--	--	--
Switching frequency[8)]									
• 690 V version		1/h	60[9)]	60[9)]	60[9)]	60[9)]	60	60	60
• 1000 V version		1/h	20	20	20	20	20	20	20
• 1150 V version[7]		1/h	20	20	20	20	20	20	20
Minimum interval between tripping operation by Electronic Trip Unit and next making operation of the circuit breaker (only with automatic mechanical resetting of the lockout device).		ms	80	80	80	80	80	80	80
Minimum interval between On-Off or Off-On switching operations.									

1) Use of trip units from -20 °C.

2) 4000 A, size II in fixed-mounted version, 3-pole.

4) ETU76B with graphics display can be used up to max. 55 °C.

5) Make time through closing coil for synchronization purposes (short-time excited) 50 ms.

6) Maintenance means: Replace main contact elements and arc chutes (see Operating Manual).

7) Size II with order code "A15" and size III: data for very high breaking capacity.

8) Minimum interval time between 2 tripping operations.

9) 3-pole switching with breaking capacity N and S: 45/h.

10) Motorized operating mechanism U_{imp} =1.2 kV

11) 1000 V and 1150 V versions only in the case of H breaking capacity

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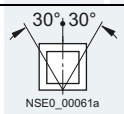
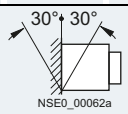
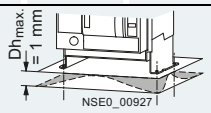
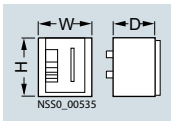
General data

Size			II				III		
Type			**3WL12 20**	**3WL12 25**	**3WL12 32**	**3WL12 40**	**3WL13 40**	**3WL13 50**	**3WL13 63**
Mounting position			 NSE0_00061a and/or  NSE0_00062a				 NSE0_00927		
Degree of protection			IP20 without cabinet door, IP41 with door sealing frame, IP55 with cover						
Main conductor minimum cross-sections	• Copper bars, bare	Unit(s) mm²	3 × 50 × 10	2 × 100 × 10	3 × 100 × 10	4 × 120 × 10	4 x 100 x 10	6 x 100 x 10	6 x 120 x 10
	• Copper bars, painted black	Unit(s) mm²	3 × 50 × 10	2 × 100 × 10	3 × 100 × 10	4 × 100 × 10[1]	4 × 100 × 10	6 × 100 × 10	6 × 120 × 10
Auxiliary conductors (Cu) Max. number of auxiliary conductors × cross-section (solid/stranded)	Standard connection = strain-relief clamp • Without end sleeve • With end sleeve acc. to DIN 46228 Part 2 • With twin end sleeve		2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16); 1 × 2.5 mm² (AWG 14) 1 × 0.5 mm² (AWG 20) ... 1 × 1.5 mm² (AWG 16) 2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)						
	Optional connection = tension spring • Without end sleeve • With end sleeve acc. to DIN 46228 Part 2		2 × 0.5 mm² (AWG 20) ... 2 × 2.5 mm² (AWG 14) 2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)						
Position signaling switches	Tension spring terminals		1 × 0.5 mm² (AWG 20) ... 1 × 2.5 mm² (AWG 14)						
Weights 3-pole	• Fixed-mounted circuit breakers	kg	56	59	64	85	82	82	90
	• Withdrawable circuit breakers	kg	60	63	68	121	88	88	96
	• Guide frames	kg	31	39	45	52	60	60	70
4-pole	• Fixed-mounted circuit breakers	kg	67	71	77	103	99	99	108
	• Withdrawable circuit breakers	kg	72	76	82	146	106	106	108
	• Guide frames	kg	37	47	54	62	84	84	119
Dimensions 3-/4-pole  NSS0_00535		W mm	460/590				704/914		
	Fixed-mounted	H mm	434				434		
		D mm	291				291		
	Withdrawable	H mm	465.5				465.5		
		D mm	471				471		

[1] Minimum main conductor cross-sections for 4-pole withdrawable circuit breakers: 4 x 120 x 10 mm

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Breaking capacity

Size		I			II				III		
Type		3WL11			3WL12				3WL13		
Breaking capacity		**N** (N)	**S** (S)	**H** (H)	**N** (N)	**S** (S)	**H** (H)	**C**[7] (C)	**H** (H)	**C 3-pole** (C)	**C 4-pole** (C)
Rated short-circuit breaking capacity											
Rated operational voltage U_e up to 415 V AC											
I_{cu}	kA	55	66	85	66	80	100	130	100	150	130
I_{cs}	kA	55	66	85	66	80	100	130	100	150	130
I_{cm}	kA	121	145	187	145	176	220	286	220	330	286
Rated operational voltage U_e up to 500 V AC											
I_{cu}	kA	55	66	85	66	80	100	130	100	150	130
I_{cs}	kA	55	66	85	66	80	100	130	100	150	130
I_{cm}	kA	121	145	187	145	176	220	286	220	330	286
Rated operational voltage U_e up to 690 V AC											
I_{cu}	kA	42	50	66	50	75	85	100	85	150	130
I_{cs}	kA	42	50	66	50	75	85	100	85	150	130
I_{cm}	kA	88	105	145	105	165	187	220	187	330	286
Rated operational voltage U_e up to 1000/1150 V AC											
I_{cu}	kA	--	--	50[5]	--	--	50	--	50	70[4]	70[4]
I_{cs}	kA	--	--	50[5]	--	--	50	--	50	70[4]	70[4]
I_{cm}	kA	--	--	105[5]	--	--	105	--	105	154[4]	154[4]
Rated short-time withstand current I_{cw}[3]											
0.5 s	kA	55	66	75	66	80	100	100	100	100	100
1 s	kA	42	50	66	55	66	85	100	100	100	100
2 s	kA	29.5	35	46	39	46	65[1]/70[2]	70	80	80	80
3 s	kA	24	29	44	32	44	50[1]/65[2]	65	65	65	65
Rated conditional short-circuit current I_{cc} of the non-automatic air circuit breakers											
Up to 500 V AC	kA	55	66	75	66	80	100	130	100	100	100
Up to 690 V AC	kA	42	50	66	50	75	85	100	85	100	100
Up to 1000 V/1150 V AC	kA	--	--	50[5]	--	--	50[4]	--	50[6]	70[4]	70[4]

(N) Circuit breakers with ECO breaking capacity N
(S) Circuit breakers with standard breaking capacity S
(H) Circuit breakers with high breaking capacity H
(C) Circuit breakers with very high breaking capacity C
(DC) Non-automatic air circuit breakers with DC breaking capacity

These breaking capacities are indicated in the corresponding tables by the symbols shown on orange backgrounds.

Note:

For further technical specifications, see the configuration manual "Air Circuit Breakers". Free download from: www.siemens.com/lowvoltage/manuals

Abbreviations* (functions)	English long text	Explanation
L	Long Time Delay	Overload protection
S	Short Time Delay	Short-circuit protection (short-time delayed)
I	Instantaneous	Short-circuit protection (instantaneous)
N	Neutral Protection	Neutral conductor protection
G	Ground Fault	Ground-fault protection

* Designations according to IEC 60947-2, Annex K.

1) Size II with $I_{n\,max} \leq 2500$ A.
2) Size II with $I_{n\,max} = 3200$ A and $I_{n\,max} = 4000$ A.
3) At a rated voltage of ≥ 690 V, the I_{cw} value of the circuit breaker cannot be greater than the I_{cu} or I_{cs} value at 690 V.
4) Rated operational voltage $U_e = 1150$ V.
5) Values also apply to 690 V + 20% version with Z option "A16".
6) Rated operational voltage $U_e = 1000$ V.
7) Up to 3200 A rated current.

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General data

Size				**I to III**
Type				**3WL1**
Manual operating mechanism with mechanical closing				
Switching on/ Charging the energy store	Max. force required to operate the hand lever Required number of strokes on the hand lever		N	≤ 230 9
Manual operating mechanism with mechanical and electrical closing				
Charging the energy store				
Closing coil (CC)	• Primary operating range			0.85 ... 1.1 × U_s
	• Extended operating range for battery operation	At 24 V DC, 48 V DC 60 V DC, 110 V DC 220 V DC		0.7 ... 1.26 × U_s
	• Rated control supply voltage U_s	50/60 Hz AC DC	V V	110 ... 127; 208 ... 240 24; 30; 48; 60; 110 ... 125; 220 ... 250
	• Power consumption	AC/DC	VA/ W	15/15
	• Min. command duration at U_s for the closing coil		ms	60
	• Short-circuit protection Smallest permissible DIAZED fuse (operational class gL)/ automatic circuit breaker with C characteristic			1 A TDz (slow)/1 A
Manual/motorized operating mechanism with mechanical and electrical closing				
Manual operating mechanism				For data, see above.
Motor	• Primary operating range			0.85 ... 1.1 × U_s
	• Extended operating range for battery operation	At 24 V DC, 48 V DC 60 V DC, 110 V DC 220 V DC		0.7 ... 1.26 × U_s
	• Power consumption of motor	AC/DC	VA/ W	135/135
	• Time required to charge the spring energy store at 1 × U_s		s	≤ 10
Closing coil				For data, see above.
For motor and closing coil	• Short-circuit protection Smallest permissible DIAZED fuse (operational class gL)/ automatic circuit breaker with C characteristic; Motor and closing coil for same rated control supply voltages			6 A TDz (slow)/2 A
	• Smallest permissible DIAZED fuse (operational class gL)/ automatic circuit breaker with C characteristic (for different rated control supply voltages)	At U_s = 24 ... 30 V At U_s = 48 ... 60 V At U_s = 110 ... 125 V DC/ 110 ... 127 V AC At U_s = 220 ... 250 V DC/ 208 ... 240 V AC		6 A 6 A 2 A 2 A
Signals of the Electronic Trip Unit				
Measuring accuracy of the Electronic Trip Unit				Protection functions acc. to EN 60947; Current indication ≤ 10%; Metering function for base quantities ≤ 1%; Metering function for derived quantities ≤ 4%
Auxiliary releases				
Undervoltage releases UVR (F3) and UVR-t_d (F4)	• Response values	Pickup Dropout		≥ 0.85 × U_s (circuit breaker can be closed) 0.35 ... 0.7× U_s (circuit breaker is opened)
	• Primary operating range			0.85 ... 1.1
	• Extended operating range for battery operation	At 24 V DC, 30 V DC, 48 V DC, 110 V DC, 220 V DC		0.85 ... 1.26
	• Rated control supply voltage U_s	Instantaneous 50/60 Hz AC DC Delayed 50/60 Hz AC DC	 V V V V	 110 ... 127/208 ... 240/380 ... 415 24/30/48/60/110 ... 125/220 ... 250[1)] 110 ... 127; 208 ... 240; 380 ... 415 48; 110 ... 125; 220 ... 250
	• Power consumption (pickup/uninterrupted duty)	AC DC	VA W	20/5 20/5
	• Opening time of the circuit breaker at U_s = 0 - Version UVR (F3) Without delay With delay - Version UVR-t_d (F8) With delay, t_d = 0.2 to 3.2 s Reset through additional NC contact – direct tripping		ms ms ms s ms	200 80 200 0.2 ... 3.2 ≤ 100
	• Short-circuit protection Smallest permissible DIAZED fuse (operational class gL)/ automatic circuit breaker with C characteristic			1 A TDz (slow)/1 A

[1)] 24 V and 30 V only with undervoltage release UVR (F3).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size						**I to III**		
Type						**3WL1**		
Auxiliary releases								
Shunt releases (ST) (F1, F2)	• For continuous command (100% OP), locks out on momentary-contact commands	- Response value	Pickup			> 0.7 × U_s (circuit breaker is tripped)		
		- Primary operating range				0.7 ... 1.1 × U_s		
		- Extended operating range for battery operation	At 24 V DC, 48 V DC 60 V DC, 110 V DC 220 V DC			0.7 ... 1.26 × U_s		
		- Rated control supply voltage U_s	50/60 Hz AC DC	V V		110 ... 127; 208 ... 240 24; 30; 48; 60; 110 ... 125; 220 ... 250		
		- Power consumption	AC/DC	VA/W		15/15		
		- Min. command duration at U_s		ms		60		
		- Opening time of the circuit breaker at U_s = 100%	At AC/DC	ms		80		
		- Short-circuit protection Smallest permissible DIAZED fuse (operational class gL)/ automatic circuit breaker with C characteristic				1 A TDz (slow)/1 A		
	5% ON period	- Response value	Pickup			> 0.7 × U_s (circuit breaker is tripped)		
		- Primary operating range				0.7 ... 1.1 × U_s		
		- Extended operating range for battery operation	At 24 V DC, 48 V DC 60 V DC, 110 V DC 220 V DC			0.7 ... 1.26 × U_s		
		- Rated control supply voltage U_s	50/60 Hz AC DC	V V		110 ... 127; 208 ... 240 24; 48; 110 ... 125; 220 ... 250		
		- Power consumption	AC/DC	VA/W		15/15		
		- Min. command duration at U_s		ms		25		
		- Opening time of the circuit breaker at U_s = 100%	At AC/DC	ms		50		
		- Short-circuit protection Smallest permissible DIAZED fuse (operational class gL)/ automatic circuit breaker with C characteristic				1 A TDz (slow)/1 A		
	• With spring energy store consisting of shunt release and capacitor storage device	- Rated control supply voltage U_s	50/60 Hz AC DC	V V		110; 230 110; 220		
		- Primary operating range				0.85 ... 1.1 × U_s		
		- Power consumption	AC/DC	VA/W		1/1		
		- Storage time at U_s/ Recharging time at U_s				max. 5 min/min. 5 s		
		- Opening time of the circuit breaker, short-circuit protection				As with "for continuous command"		
Remote reset solenoid for mechanical tripped indicator (F7)								
Remote reset solenoid for mechanical tripped indicator (F7)		- Primary operating range				0.85 ... 1.1 × U_s		
		- Extended operating range for battery operation	At 24 V DC, 48 V DC 110 V DC 220 V DC			0.7 ... 1.26 × U_s		
		- Power consumption	AC/DC	VA/W		50/50		
		- Min. command duration at U_s for the remote reset solenoid		ms		60		
		- Short-circuit protection Smallest permissible DIAZED fuse (operational class gL)/automatic circuit breaker with C characteristic				2 A TDz (slow)/1 A at 24 V DC and 48 V DC, 1 A TDz (slow)/1 A at 110 V and 208 ... 250 V		
Contact position-driven auxiliary switches (S1, S2, S3, S4, S7, S8)								
Rated insulation voltage U_i				V AC/DC		500		
Rated operational voltage U_e				V AC/DC		500		
Rated impulse withstand voltage U_{imp}				kV		4		
Breaking capacity	• Alternating current 50/60 Hz	- Rated operational voltage U_e		V		24 ... 230	380/400	500
		- Rated operational current I_e/AC-12		A		10	10	10
		I_e/AC-15		A		4	3	2
	• Direct current	- Rated operational voltage U_e		V	24	48	110	220
		- Rated operational current I_e/DC-12		A	10	8	3.5	1
		I_e/DC-13		A	8	4	1.2	0.4
Short-circuit protection	• Largest permissible DIAZED fuse (operational class gL) • Largest permissible miniature circuit breaker with C characteristic					10 A TDz, 10 A Dz 10 A		

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General data

Size					**I to III**		
Type					**3WL1**		
Ready-to-close signaling switches (S20) (acc. to DIN VDE 0630)							
Breaking capacity	• Alternating current	- Rated operational voltage U_e - Rated operational current I_e	V A		250 8		
	• Direct current	- Rated operational voltage U_e - Rated operational current I_e	V A		125 0.4	250 0.2	
Short-circuit protection	Largest permissible DIAZED fuse (operational class gL)				2 A Dz (quick)		
Tripped signaling switches (S24) and signaling switches for auxiliary releases (S22, S23) (acc. to DIN VDE 0630)							
Breaking capacity	• Alternating current	- Rated operational voltage U_e - Rated operational current I_e/AC-12	V A		250 8		
	• Direct current	- Rated operational voltage U_e - Rated operational current I_e/DC-12	V A		24 6	125 0.4	250 0.2
Short-circuit protection	Largest permissible DIAZED fuse (operational class gL)				6 A Dz (quick)		
Tripped signaling switch	Signal duration after tripping				Until manual or electrical remote reset (option)		
Position signaling switches on guide frame							
Type of contact	• Signal:	- "Circuit breaker in connected position" - "Circuit breaker in test position" - "Circuit breaker in disconnected position"			3 CO 2 CO 1 CO	or	1 CO 1 CO 1 CO
Rated insulation voltage U_i			50/60 Hz AC DC	V V	440 250		
Rated operational voltage U_e				V	250		
Rated impulse withstand voltage U_{imp}				kV	4		
Breaking capacity	• Rated operational current I_e	- I_e/AC-12 - I_e/AC-15 - I_e/DC-12 - I_e/DC-13 - A 300 (AC) - R 300 (DC)			24 V 10 A, 110/127 V 10 A, 220/240 V 10 A, 320/440 V 10 A 220/240 V 4 A, 320/440 V 3 A, 24 V 10 A, 48 V 2.5 A, 220/240 V 0.2 A, 24 V 3.0 A, 220/240 V 0.1 A 120 V 6 A, 240 V 3 A 125 V 0.22 A, 250 V 0.11 A		
Short-circuit protection	• Largest permissible DIAZED fuse (operational class gL) • Largest permissible miniature circuit breaker with C characteristic				8 A TDz (slow) 8 A TDz (slow)		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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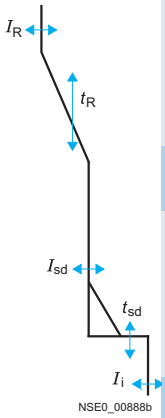
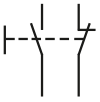
Protection functions Parameterization by			ETU15B D	ETU25B D	ETU27B D & S
Function overview of the electronic trip system					
 NSE0_00888b		**Overload protection**	✓	✓	✓
		Function can be switched on/off	--	--	--
		Setting range $I_R = I_n \times$ ...	0.5-0.55-0.6-0.65-0.7-0.75-0.8-0.85-0.9-1	0.4-0.45-0.5-0.55-0.6-0.65-0.7-0.8-0.9-1	0.4-0.45-0.5-0.55-0.6-0.65-0.7-0.8-0.9-1
	L	Switchable overload protection (I^2t- or I^4t-dependent function)	--	--	--
		Setting range for time-lag class t_R at I^2t	10 s fixed	10 s fixed	10 s fixed
		Setting range for time-lag class t_R at I^4t	--	--	--
		Thermal image can be switched on/off	--	--	--
		Phase failure sensitivity	--	At t_{sd} = 20 ms (M)	At t_{sd} = 20 ms (M)
	N	**N-conductor protection**	--	--	✓
		Function can be switched on/off	--	--	✓
		N-conductor setting range $I_N = I_n \times$ ...	--	--	1
	S	**Short-time delayed short-circuit protection**	--	✓	✓
		Function can be switched on/off	--	--	--
		Setting range $I_R = I_n \times$ ...	--	1.25-1.5-2-2.5-3-4-6-8-10-12	1.25-1.5-2-2.5-3-4-6-8-10-12
		Setting range for delay time t_{sd}	--	0-M-100-200-300-400 ms	0-M-100-200-300-400 ms
		Switchable short-time delayed short-circuit protection (I^2t-dependent function)	--	--	--
		Setting range for delay time t_{sd} at I^2t	--	--	--
		ZSI function	--	--	--
	I	**Instantaneous short-circuit protection**	✓	✓	✓
		Function can be switched on/off	--	--	--
		Setting range $I_i = I_n \times$ ...	2-3-4-5-6-7-8	Fixed for $I_i \geq 20 \times I_n$, max. 50 kA	Fixed for $I_i \geq 20 \times I_n$, max. 50 kA
	G	**Ground-fault protection**	--	--	✓ permanently installed
		Tripping and alarm functions	--	--	--
		Tripping function can be switched on/off	--	--	✓
		Alarm function can be switched on/off	--	--	--
		Detection of the ground-fault current through summation current formation with internal or external N conductor transformer	--	--	✓
		Detection of ground-fault current through external current transformer	--	--	--
		Setting range of the operating current I_g for tripping	--	--	A-B-C-D-E
		Setting range of the operating current I_g for alarm	--	--	--
		Setting range of the delay time t_g	--	--	100-200-300-400-500 ms
		Switchable ground-fault characteristic (I^2t-dependent function)	--	--	--
		Setting range for delay time t_g at I^2t	--	--	--
		ZSI-G function	--	--	--
Parameter set changeover					
		Switchable between parameter set A and B	--	--	--
LCD					
		Alphanumeric LCD (4-line)	--	--	--
		Graphical LCD (24 V, external power supply required)	--	--	--
Self-monitoring / communication					
		Watchdog-monitored	✓	✓	✓
		Communication-capable	--	--	--
Metering function					
		Metering capability with metering function *Plus*	--	--	--
LED display					
 NSE0_00890		Electronic Trip Unit active	✓	✓	✓
		Alarm	✓	✓	✓
		ETU fault	✓	✓	✓
		L tripping operation	--	✓	✓
		S tripping operation	--	✓	✓
		I tripping operation	--	✓	✓
		N tripping operation	--	--	✓
		G tripping operation	--	--	✓
		G alarm	--	--	--
		Tripping operation as a result of extended prot. function	--	--	--
		Communication	--	--	--
Signals from signaling switches with external CubicleBUS **modules (relays)**					
 NSE0_00891		Overload warning	--	--	--
		Load shedding, load absorbing	--	--	--
		Leading signal overload trip 200 ms	--	--	--
		Temperature alarm	--	--	--
		Phase unbalance	--	--	--
		Instantaneous short-circuit trip	--	--	--
		Short-time delayed short-circuit trip	--	--	--
		Overload trip	--	--	--
		Neutral conductor trip	--	--	--
		Ground-fault protection trip	--	--	--
		Ground-fault alarm	--	--	--
		Auxiliary relay	--	--	--
		ETU fault	--	--	--

Delay time figures given in ms.
M = Motor protection, corresponds to 20 ms
D = Rotary coding switch
D & S = Rotary coding and slide switch
K = Communication
M/K = Menu/Communication

✓ Available.
-- Not available.
❑ optional.

For setting range of the operating current I_g, see page 1/18.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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General data

Protection functions Parameterization by	ETU45B D & S	ETU76B M/K
Function overview of the electronic trip system		
Overload protection Function can be switched on/off	✓ --	✓ ✓
Setting range $I_R = I_n \times ...$	0.4-0.45-0.5-0.55-0.6-0.65-0.7-0.8-0.9-1	0.4 ... 1
Switchable overload protection (I^2t- or I^4t-dependent function)	✓	✓
Setting range for time-lag class t_R at I^2t	2-3.5-5.5-8-10-14-17-21-25-30 s	2 ... 30 s
Setting range for time-lag class t_R at I^4t	1-2-3-4-5 s	1 ... 5 s
Thermal image can be switched on/off	✓	✓
Phase failure sensitivity	At t_{sd} = 20 ms (M)	✓ (on/off)
N-conductor protection	✓	✓
Function can be switched on/off	✓	✓
N-conductor setting range $I_N = I_n \times ...$	0.5 ... 1	0.2 ... 2
Short-time delayed short-circuit protection	✓	✓
Function can be switched on/off	✓	✓
Setting range $I_R = I_n \times ...$	1.25-1.5-2-2.5-3-4-6-8-10-12	1.25 × I_n ... 0.8 × I_{cw}
Setting range for delay time t_{sd}	M-100-200-300-400 ms	M-80 ... 4000 ms
Switchable short-time delayed short-circuit protection (I^2t-dependent function)	✓	✓
Setting range for delay time t_{sd} at I^2t	100-200-300-400 ms	100 ... 400 ms
ZSI function	By **Cubicle**BUS module	By **Cubicle**BUS module
Instantaneous short-circuit protection	✓	✓
Function can be switched on/off	✓	✓
Setting range $I_i = I_n \times ...$	1.5-2.2-3-4-6-8-10-12-0.8 x I_{cs}	1.5 × I_n ... 0.8 × I_{cs}
Ground-fault protection	❑ Module can be retrofitted	❑ Module can be retrofitted
Tripping and alarm functions	✓	✓
Tripping function can be switched on/off	✓	✓
Alarm function can be switched on/off	--	✓
Detection of ground-fault current through summation current formation with internal or external N-conductor transformer	✓	✓
Detection of ground-fault current through external current transformer	✓	✓
Setting range of the operating current I_g for tripping	A-B-C-D-E	A ... E
Setting range of the operating current I_g for alarm	A-B-C-D-E	A ... E
Setting range of the delay time t_g	100-200-300-400-500 ms	100 ... 500 ms
Switchable ground-fault characteristic (I^2t-dependent function)	✓	✓
Setting range for delay time t_g at I^2t	100-200-300-400-500 ms	100 ... 500 ms
ZSI-G function	By **Cubicle**BUS module	By **Cubicle**BUS module
Parameter set changeover		
Switchable between parameter set A and B	--	✓
LCD		
Alphanumeric LCD (4-line)	❑	--
Graphical LCD (24 V, external power supply required)	--	✓
Self-monitoring / communication		
Watchdog-monitored	✓	✓
Communication-capable	✓	✓
Metering function		
Metering capability with metering function *Plus*	✓	✓
LED display		
Electronic Trip Unit active	✓	✓
Alarm	✓	✓
ETU fault	✓	✓
L tripping operation	✓	✓
S tripping operation	✓	✓
I tripping operation	✓	✓
N tripping operation	✓	✓
G tripping operation	✓ (only with ground-fault protection module)	✓ (only with ground-fault protection module)
G alarm	✓ (only with ground-fault protection module)	✓ (only with ground-fault protection module)
Tripping operation as a result of extended protection functions	✓	✓
Communication	✓	✓
Signals from signaling switches with external CubicleBUS **modules (relays)**		
Overload warning	✓	✓
Load shedding, load absorbing	✓	✓
Leading signal overload trip 200 ms	✓	✓
Temperature alarm	✓	✓
Phase unbalance	✓	✓
Instantaneous short-circuit trip	✓	✓
Short-time delayed short-circuit trip	✓	✓
Overload trip	✓	✓
Neutral conductor trip	✓	✓
Ground-fault protection trip	✓ (only with ground-fault protection module)	✓ (only with ground-fault protection module)
Ground-fault alarm	✓ (only with ground-fault protection module)	✓ (only with ground-fault protection module)
Auxiliary relay	✓	✓
ETU fault	✓	✓

Setting range of the operating current I_g

	Size I and size II	Size III
A	100 A	400 A
B	300 A	600 A
C	600 A	800 A
D	900 A	1000 A
E	1200 A	1200 A

Increment size when settings are made for the ETU76B using the menu

From ... to	Increment size	From ... to	Increment size
0 ... 1	0.1	1000 ... 1600	50
1 ... 100	1	1600 ... 10000	100
100 ... 500	5	10000 ... max	1000
500 ... 1000	10		

Legend, see page 1/17.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 55/66 kA at 500 V, ECO breaking capacity N (N) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Horizontal main circuit connection									
I	630	630	55		**3WL1106-2□□32-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□32-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□32-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□32-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□32-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□32-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□32-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□32-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□32-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□32-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□32-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□32-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□32-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	630	630	55		**3WL1106-2□□31-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□31-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□31-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□31-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□31-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□31-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□31-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□31-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□31-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□31-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□31-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□31-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□31-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-2□□31-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[3][5]	**EG**		✓
	ETU45B: Protection functions LSING[3][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

4) Current transformers for protection of the N conductor are to be ordered separately, see page 1/61.

5) ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3-pole, fixed-mounted versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 55/66 kA at 500 V, ECO breaking capacity N (N) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Front main circuit connection, single hole									
I	630	630	55		**3WL1106-2□□33-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□33-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□33-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□33-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□33-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□33-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□33-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□33-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□33-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□33-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□33-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□33-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	630	630	55		**3WL1106-2□□34-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□34-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□34-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□34-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□34-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□34-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□34-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□34-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□34-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□34-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□34-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□34-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□34-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[3][5]	**EG**		✓
	ETU45B: Protection functions LSING[3][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

4) Current transformers for protection of the N conductor are to be ordered separately, see page 1/61.

5) ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 66/80 kA at 500 V, standard breaking capacity S** (S) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Horizontal main circuit connection									
I	630	630	66		**3WL1106-3□□32-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□32-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□32-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□32-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□32-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□32-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□32-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□32-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□32-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□32-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□32-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□32-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□32-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	630	630	66		**3WL1106-3□□31-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□31-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□31-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□31-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□31-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□31-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□31-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□31-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□31-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□31-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□31-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□31-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□31-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-3□□31-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[3][5]	**EG**		✓
	ETU45B: Protection functions LSING[3][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

4) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

5) ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3-pole, fixed-mounted versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 66/80 kA at 500 V, standard breaking capacity S (S) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Front main circuit connection, single hole									
I	630	630	66		**3WL1106-3□□33-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□33-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□33-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□33-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□33-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□33-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□33-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□33-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□33-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□33-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□33-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□33-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	630	630	66		**3WL1106-3□□34-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□34-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□34-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□34-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□34-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□34-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□34-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□34-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□34-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□34-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□34-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□34-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□34-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[3][5]	**EG**		✓
	ETU45B: Protection functions LSING[3][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

4) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

5) ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 85/100 kA at 500 V, high breaking capacity H** (H) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Horizontal main circuit connection									
I	630	630	85		**3WL1106-4□□32-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□32-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□32-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□32-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□32-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□32-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□32-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□32-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□32-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□32-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□32-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□32-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□32-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□32-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□32-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	630	630	85		**3WL1106-4□□31-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□31-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□31-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□31-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□31-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□31-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□31-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□31-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□31-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□31-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□31-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□31-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□31-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-4□□31-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□31-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□31-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-4□□31-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[3][5]	**EG**		✓
	ETU45B: Protection functions LSING[3][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

4) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

5) ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3-pole, fixed-mounted versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 85/100 kA at 500 V, high breaking capacity H (H)		PU (UNIT, SET, M)	PS	PG
					Article No. www.siemens.com/product?Article No.	Basic price per PU			
	A	A	kA	d					
Front main circuit connection, single hole									
II	800	800	100		**3WL1208-4□□33-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□33-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□33-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□33-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□33-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□33-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□33-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□33-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	630	630	85		**3WL1106-4□□34-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□34-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□34-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□34-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□34-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□34-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□34-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□34-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□34-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□34-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□34-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□34-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□34-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□34-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[3][5]	**EG**		✓
	ETU45B: Protection functions LSING[3][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

4) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

5) ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 130/150 kA at 500 V, very high breaking capacity C** Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Horizontal main circuit connection									
II	1600	1600	130		**3WL1216-5□□32-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□32-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□32-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□32-□□□□**		1	1 unit	1CA
III	4000	4000	150		**3WL1340-5□□32-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□32-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
II	1600	1600	130		**3WL1216-5□□31-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□31-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□31-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□31-□□□□**		1	1 unit	1CA
III	4000	4000	150		**3WL1340-5□□31-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□31-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-5□□31-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI [3]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[4)6)]	**EG**		✓
	ETU45B: Protection functions LSING[4)6)] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4)6)] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) ETU15B cannot be used with 3WL1 circuit breakers, size III.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

5) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

6) ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

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3-pole, withdrawable versions

Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 55/66 kA at 500 V, ECO breaking capacity N (N) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
I	630	630	55		**3WL1106-2□□35-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□35-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□35-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□35-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□35-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□35-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□35-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□35-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□35-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□35-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□35-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□35-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□35-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-2□□35-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	630	630	55		**3WL1106-2□□36-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□36-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□36-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□36-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□36-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□36-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□36-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□36-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□36-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□36-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□36-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□36-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□36-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[4][6]	**EG**		✓
	ETU45B: Protection functions LSING[4][6] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][6] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

5) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

6) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 55/66 kA at 500 V, ECO breaking capacity N (N) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
With guide frames, vertical main circuit connection									
I	630	630	55		**3WL1106-2□□37-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□37-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□37-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□37-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□37-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□37-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□37-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□37-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□37-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□37-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□37-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□37-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□37-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-2□□37-□□□□**		1	1 unit	1CA
With guide frames, connecting flanges									
I	630	630	55		**3WL1106-2□□38-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□38-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□38-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□38-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□38-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□38-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□38-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□38-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□38-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□38-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□38-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□38-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□38-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[4][6]	**EG**		✓
	ETU45B: Protection functions LSING[4][6] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][6] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

5) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

6) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3-pole, withdrawable versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 66/80 kA at 500 V, standard breaking capacity S (S) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
I	630	630	66		**3WL1106-3□□35-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□35-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□35-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□35-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□35-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□35-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□35-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□35-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□35-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□35-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□35-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□35-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□35-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-3□□35-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	630	630	66		**3WL1106-3□□36-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□36-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□36-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□36-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□36-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□36-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□36-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□36-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□36-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□36-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□36-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□36-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□36-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[4)6)]	**EG**		✓
	ETU45B: Protection functions LSING[4)6)] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4)6)] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

5) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

6) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 66/80 kA at 500 V, standard breaking capacity S (S) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
With guide frames, vertical main circuit connection									
I	630	630	66		**3WL1106-3□□37-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□37-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□37-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□37-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□37-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□37-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□37-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□37-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□37-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□37-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□37-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□37-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□37-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-3□□37-□□□□**		1	1 unit	1CA
With guide frames, connecting flanges									
I	630	630	66		**3WL1106-3□□38-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□38-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□38-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□38-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□38-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□38-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□38-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□38-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□38-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□38-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□38-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□38-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□38-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[4][6]	**EG**		✓
	ETU45B: Protection functions LSING[4][6] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][6] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

5) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

6) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

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3-pole, withdrawable versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 85/100 kA at 500 V, high breaking capacity H (H) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
I	630	630	85		**3WL1106-4□□35-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□35-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□35-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□35-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□35-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□35-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□35-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□35-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□35-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□35-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□35-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□35-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□35-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-4□□35-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□35-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□35-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-4□□35-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	630	630	85		**3WL1106-4□□36-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□36-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□36-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□36-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□36-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□36-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□36-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□36-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□36-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□36-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□36-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□36-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□36-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□36-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□36-□□□□**		1	1 unit	1CA

Options				Add. price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[7]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[4][6]	**EG**		✓
	ETU45B: Protection functions LSING[4][6] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][6] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

5) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

6) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

7) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 85/100 kA at 500 V, high breaking capacity H** (H) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
With guide frames, vertical main circuit connection									
I	630	630	85		**3WL1106-4□□37-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□37-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□37-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□37-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□37-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□37-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□37-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□37-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□37-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□37-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□37-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□37-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□37-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-4□□37-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□37-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□37-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-4□□37-□□□□**		1	1 unit	1CA
With guide frames, connecting flanges									
I	630	630	85		**3WL1106-4□□38-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□38-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□38-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□38-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□38-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□38-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□38-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□38-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□38-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□38-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□38-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□38-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□38-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□38-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[7]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[4][6]	**EG**		✓
	ETU45B: Protection functions LSING[4][6] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][6] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

5) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

6) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

7) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3-pole, withdrawable versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 130/150 kA at 500 V, very high breaking capacity C** Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
II	1600	1600	130		**3WL1216-5□□35-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□35-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□35-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□35-□□□□**		1	1 unit	1CA
III	4000	4000	150		**3WL1340-5□□35-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□35-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-5□□35-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
II	1600	1600	130		**3WL1216-5□□36-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□36-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□36-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□36-□□□□**		1	1 unit	1CA
III	4000	4000	150		**3WL1340-5□□36-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□36-□□□□**		1	1 unit	1CA
With guide frames, vertical main circuit connection									
II	1600	1600	130		**3WL1216-5□□37-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□37-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□37-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□37-□□□□**		1	1 unit	1CA
III	4000	4000	150		**3WL1340-5□□37-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□37-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-5□□37-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[4]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[5]	**EB**		✓
	ETU45B: Protection functions LSIN[5] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[5] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[6]	**DG**		✓
	ETU45B: Protection functions LSING[5][7]	**EG**		✓
	ETU45B: Protection functions LSING[5][7] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[5][7] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) ETU15B cannot be used with 3WL1 circuit breakers, size III.

5) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61.

6) Current transformers for protection of the N-conductor are to be ordered separately, see page 1/61.

7) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 55/66 kA at 500 V, ECO breaking capacity N (N)		PU (UNIT, SET, M)	PS	PG
					Article No. www.siemens.com/product?Article No.	Basic price per PU			
	A	A	kA	d					
Horizontal main circuit connection									
I	630	630	55		**3WL1106-2□□42-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□42-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□42-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□42-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□42-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□42-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□42-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□42-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□42-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□42-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□42-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□42-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□42-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	630	630	55		**3WL1106-2□□41-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□41-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□41-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□41-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□41-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□41-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□41-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□41-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□41-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□41-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□41-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□41-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□41-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-2□□41-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[3]	**DG**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][4] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

4) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

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4-pole, fixed-mounted versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 55/66 kA at 500 V, ECO breaking capacity N (N) — Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Front main circuit connection, single hole									
I	630	630	55		**3WL1106-2□□43-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□43-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□43-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□43-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□43-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□43-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□43-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□43-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□43-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□43-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□43-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□43-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	630	630	55		**3WL1106-2□□44-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□44-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□44-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□44-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□44-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□44-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□44-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□44-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□44-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□44-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□44-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□44-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□44-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[3]	**DG**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][4] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

[1] The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

[2] For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

[3] Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

[4] For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 66/80 kA at 500 V, standard breaking capacity S (S)		PU (UNIT, SET, M)	PS	PG
					Article No. www.siemens.com/product?Article No.	Basic price per PU			
	A	A	kA	d					
Horizontal main circuit connection									
I	630	630	66		**3WL1106-3□□42-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□42-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□42-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□42-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□42-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□42-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□42-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□42-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□42-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□42-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□42-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□42-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□42-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	630	630	66		**3WL1106-3□□41-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□41-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□41-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□41-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□41-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□41-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□41-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□41-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□41-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□41-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□41-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□41-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□41-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-3□□41-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[3]	**DG**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][4] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

4) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

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4-pole, fixed-mounted versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 66/80 kA at 500 V, standard breaking capacity S (S) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Front main circuit connection, single hole									
I	630	630	66		**3WL1106-3□□43-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□43-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□43-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□43-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□43-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□43-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□43-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□43-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□43-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□43-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□43-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□43-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	630	630	66		**3WL1106-3□□44-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□44-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□44-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□44-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□44-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□44-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□44-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□44-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□44-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□44-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□44-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□44-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□44-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[3]	**DG**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][4] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

[1] The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

[2] For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

[3] Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

[4] For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 85/100 kA at 500 V, high breaking capacity H** (H) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Horizontal main circuit connection									
I	630	630	85		**3WL1106-4□□42-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□42-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□42-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□42-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□42-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□42-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□42-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□42-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□42-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□42-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□42-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□42-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□42-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□42-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□42-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	630	630	85		**3WL1106-4□□41-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□41-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□41-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□41-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□41-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□41-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□41-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□41-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□41-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□41-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□41-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□41-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□41-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-4□□41-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□41-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□41-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-4□□41-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[5]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[3]	**DG**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][4] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

4) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

5) ETU15B cannot be used with 3WL1 circuit breakers, size III.

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4-pole, fixed-mounted versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 85/100 kA at 500 V, high breaking capacity H (H) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Front main circuit connection, single hole									
II	800	800	100		**3WL1208-4□□43-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□43-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□43-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□43-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□43-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□43-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□43-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□43-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	630	630	85		**3WL1106-4□□44-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□44-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□44-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□44-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□44-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□44-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□44-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□44-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□44-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□44-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□44-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□44-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□44-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□44-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[5]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[3] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[3]	**DG**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[3][4] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

4) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

5) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 130/150 kA at 500 V, very high breaking capacity C (C) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Horizontal main circuit connection									
II	1600	1600	130		**3WL1216-5□□42-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□42-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□42-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□42-□□□□**		1	1 unit	1CA
III	4000	4000	130		**3WL1340-5□□42-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□42-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
II	1600	1600	130		**3WL1216-5□□41-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□41-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□41-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□41-□□□□**		1	1 unit	1CA
III	4000	4000	130		**3WL1340-5□□41-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□41-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-5□□41-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[3]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

3) ETU15B cannot be used with 3WL1 circuit breakers, size III.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

5) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

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4-pole, withdrawable versions

Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 55/66 kA at 500 V, ECO breaking capacity N** (N) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
I	630	630	55		**3WL1106-2□□45-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□45-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□45-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□45-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□45-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□45-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□45-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□45-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□45-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□45-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□45-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□45-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□45-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-2□□45-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	630	630	55		**3WL1106-2□□46-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□46-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□46-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□46-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□46-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□46-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□46-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□46-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□46-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□46-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□46-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□46-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□46-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

5) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 55/66 kA at 500 V, ECO breaking capacity N (N)		PU (UNIT, SET, M)	PS	PG
					Article No. www.siemens.com/product?Article No.	Basic price per PU			
	A	A	kA	d					
With guide frames, vertical main circuit connection									
I	630	630	55		**3WL1106-2□□47-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□47-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□47-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□47-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□47-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□47-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□47-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□47-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□47-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□47-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□47-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□47-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□47-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-2□□47-□□□□**		1	1 unit	1CA
With guide frames, connecting flanges									
I	630	630	55		**3WL1106-2□□48-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-2□□48-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-2□□48-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-2□□48-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-2□□48-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-2□□48-□□□□**		1	1 unit	1CA
II	800	800	66		**3WL1208-2□□48-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-2□□48-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-2□□48-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-2□□48-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-2□□48-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-2□□48-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-2□□48-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

5) For ETU45B to ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

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4-pole, withdrawable versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	**I_{cu} 66/80 kA at 500 V, standard breaking capacity S** (S) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
I	630	630	66		**3WL1106-3□□45-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□45-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□45-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□45-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□45-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□45-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□45-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□45-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□45-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□45-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□45-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□45-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□45-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-3□□45-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	630	630	66		**3WL1106-3□□46-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-3□□46-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-3□□46-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-3□□46-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-3□□46-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-3□□46-□□□□**		1	1 unit	1CA
II	800	800	80		**3WL1208-3□□46-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-3□□46-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-3□□46-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-3□□46-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-3□□46-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-3□□46-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-3□□46-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

5) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 66/80 kA at 500 V, standard breaking capacity S (S)	PU (UNIT, SET, M)	PS	PG
					Article No. www.siemens.com/product?Article No. / Basic price per PU			
	A	A	kA	d				
With guide frames, vertical main circuit connection								
I	630	630	66		**3WL1106-3□□47-□□□□**	1	1 unit	1CA
	800	800			**3WL1108-3□□47-□□□□**	1	1 unit	1CA
	1000	1000			**3WL1110-3□□47-□□□□**	1	1 unit	1CA
	1250	1250			**3WL1112-3□□47-□□□□**	1	1 unit	1CA
	1600	1600			**3WL1116-3□□47-□□□□**	1	1 unit	1CA
	2000	2000			**3WL1120-3□□47-□□□□**	1	1 unit	1CA
II	800	800	80		**3WL1208-3□□47-□□□□**	1	1 unit	1CA
	1000	1000			**3WL1210-3□□47-□□□□**	1	1 unit	1CA
	1250	1250			**3WL1212-3□□47-□□□□**	1	1 unit	1CA
	1600	1600			**3WL1216-3□□47-□□□□**	1	1 unit	1CA
	2000	2000			**3WL1220-3□□47-□□□□**	1	1 unit	1CA
	2500	2500			**3WL1225-3□□47-□□□□**	1	1 unit	1CA
	3200	3200			**3WL1232-3□□47-□□□□**	1	1 unit	1CA
	4000	4000			**3WL1240-3□□47-□□□□**	1	1 unit	1CA
With guide frames, connecting flanges								
I	630	630	66		**3WL1106-3□□48-□□□□**	1	1 unit	1CA
	800	800			**3WL1108-3□□48-□□□□**	1	1 unit	1CA
	1000	1000			**3WL1110-3□□48-□□□□**	1	1 unit	1CA
	1250	1250			**3WL1112-3□□48-□□□□**	1	1 unit	1CA
	1600	1600			**3WL1116-3□□48-□□□□**	1	1 unit	1CA
	2000	2000			**3WL1120-3□□48-□□□□**	1	1 unit	1CA
II	800	800	80		**3WL1208-3□□48-□□□□**	1	1 unit	1CA
	1000	1000			**3WL1210-3□□48-□□□□**	1	1 unit	1CA
	1250	1250			**3WL1212-3□□48-□□□□**	1	1 unit	1CA
	1600	1600			**3WL1216-3□□48-□□□□**	1	1 unit	1CA
	2000	2000			**3WL1220-3□□48-□□□□**	1	1 unit	1CA
	2500	2500			**3WL1225-3□□48-□□□□**	1	1 unit	1CA
	3200	3200			**3WL1232-3□□48-□□□□**	1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

5) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 85/100 kA at 500 V, high breaking capacity H (H) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
I	630	630	85		**3WL1106-4□□45-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□45-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□45-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□45-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□45-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□45-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□45-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□45-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□45-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□45-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□45-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□45-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□45-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-4□□45-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□45-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□45-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-4□□45-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	630	630	85		**3WL1106-4□□46-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□46-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□46-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□46-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□46-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□46-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□46-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□46-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□46-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□46-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□46-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□46-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□46-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□46-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□46-□□□□**		1	1 unit	1CA

Options				Add. price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

5) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 85/100 kA at 500 V, high breaking capacity H (H) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
With guide frames, vertical main circuit connection									
I	630	630	85		**3WL1106-4□□47-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□47-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□47-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□47-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□47-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□47-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□47-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□47-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□47-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□47-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□47-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□47-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□47-□□□□**		1	1 unit	1CA
	4000	4000			**3WL1240-4□□47-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□47-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-4□□47-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-4□□47-□□□□**		1	1 unit	1CA
With guide frames, connecting flanges									
I	630	630	85		**3WL1106-4□□48-□□□□**		1	1 unit	1CA
	800	800			**3WL1108-4□□48-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1110-4□□48-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1112-4□□48-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1116-4□□48-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1120-4□□48-□□□□**		1	1 unit	1CA
II	800	800	100		**3WL1208-4□□48-□□□□**		1	1 unit	1CA
	1000	1000			**3WL1210-4□□48-□□□□**		1	1 unit	1CA
	1250	1250			**3WL1212-4□□48-□□□□**		1	1 unit	1CA
	1600	1600			**3WL1216-4□□48-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-4□□48-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-4□□48-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-4□□48-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL1340-4□□48-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[6]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[4] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[4]	**DG**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[4][5] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

5) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

6) ETU15B cannot be used with 3WL1 circuit breakers, size III.

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4-pole, withdrawable versions

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity $I_{cu} = I_{cs}$	SD	I_{cu} 130/150 kA at 500 V, very high breaking capacity C (C) Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames[2] (for guide frames, see pages 1/55 to 1/60)									
II	1600	1600	130		**3WL1216-5□□45-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□45-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□45-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□45-□□□□**		1	1 unit	1CA
III	4000	4000	130		**3WL1340-5□□45-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□45-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-5□□45-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
II	1600	1600	130		**3WL1216-5□□46-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□46-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□46-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□46-□□□□**		1	1 unit	1CA
III	4000	4000	130		**3WL1340-5□□46-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□46-□□□□**		1	1 unit	1CA
With guide frames, vertical main circuit connection									
II	1600	1600	130		**3WL1216-5□□47-□□□□**		1	1 unit	1CA
	2000	2000			**3WL1220-5□□47-□□□□**		1	1 unit	1CA
	2500	2500			**3WL1225-5□□47-□□□□**		1	1 unit	1CA
	3200	3200			**3WL1232-5□□47-□□□□**		1	1 unit	1CA
III	4000	4000	130		**3WL1340-5□□47-□□□□**		1	1 unit	1CA
	5000	5000			**3WL1350-5□□47-□□□□**		1	1 unit	1CA
	6300	6300			**3WL1363-5□□47-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU15B: Protection functions LI[4]	**BB**		✓
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[5]	**EB**		✓
	ETU45B: Protection functions LSIN[5] with 4-line display	**FB**		✓
	ETU76B: Protection functions LSIN[5] with full graphics display	**NB**		✓
	Versions with ground-fault protection			
	ETU27B: Protection functions LSING[5]	**DG**		✓
	ETU45B: Protection functions LSING[5][6]	**EG**		✓
	ETU45B: Protection functions LSING[5][6] with 4-line display	**FG**		✓
	ETU76B: Protection functions LSING[5][6] with full graphics display	**NG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, adaptation by order code, see page 1/48.

2) Z options which are installed on the guide frame are not available.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see page 1/13.

4) ETU15B cannot be used with 3WL1 circuit breakers, size III.

5) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/61. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/50.

6) For ETU45B and ETU76B with ground-fault protection module GFM AT (alarm and tripping), see page 1/61.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

				Article No. supplement 3WL1...-..... - □□□□	Additional price
Operating mechanisms					
Manual operating mechanism with mechanical closing				**1**	**None**
Manual operating mechanism with mechanical and electrical closing, closing coil suitable for uninterrupted duty, 100% OP					
50/60 Hz V AC	V DC				
110	110 ... 125			**2**	✓
230	220			**3**	✓
Manual/motorized operating mechanism with mechanical and electrical closing, closing coil suitable for uninterrupted duty, 100% OP					
Motor		Closing coil			
50/60 Hz V AC	V DC	50/60 Hz V AC	V DC		
208 ... 240	220 ... 250	230	220	**4**	✓
110 ... 127	110 ... 125	110	110 ... 125	**5**	✓
--	24	--	24	**6**	✓
Note					
To order different voltages for motorized operating mechanism and closing coil or closing coil for synchronization purposes: "1" at the 13th digit of the Article No. and order codes, see page 1/49.					
1st auxiliary release					
Type	Condition	U_s 50/60 Hz V AC	U_s V DC		
Without 1st auxiliary releases	--	--	--	**A**	**None**
Shunt release suitable for uninterrupted duty, 100% OP	Operating range 0.85 ... 1.1 × U_s	--	24	**B**	✓
		--	30	**C**	✓
		--	48	**D**	✓
		--	60	**E**	✓
		110 ... 127	110 ... 125	**F**	✓
		208 ... 240	220 ... 250	**G**	✓
2nd auxiliary release					
Type	Condition	U_s 50/60 Hz V AC	U_s V DC		
Without 2nd auxiliary releases	--	--	--	**A**	**None**
Shunt release suitable for uninterrupted duty, 100% OP	Operating range 0.85 ... 1.1 × U_s	--	24	**B**	✓
		--	30	**C**	✓
		--	48	**D**	✓
		--	60	**E**	✓
		110 ... 127	110 ... 125	**F**	✓
		208 ... 240	220 ... 250	**G**	✓
Undervoltage release, instantaneous (≤ 80 ms), short-delay (≤ 200 ms)	Operating range 0.85 ... 1.1 × U_s	--	24	**J**	✓
		--	30	**K**	✓
		--	48	**L**	✓
		--	60	**U**	✓
		110 ... 127	110 ... 125	**M**	✓
		208 ... 240	220 ... 250	**N**	✓
		380 ... 415	--	**P**	✓
Undervoltage release, can be delayed between 0.2 s and 3.2 s	Operating range 0.85 ... 1.1 × U_s	--	48	**Q**	✓
		110 ... 127	110 ... 125	**R**	✓
		208 ... 240	220 ... 250	**S**	✓
		380 ... 415	--	**T**	✓
Auxiliary switches					
1st auxiliary switch block					
2 NO + 2 NC				**2**	**None**
1st + 2nd auxiliary switch block					
4 NO + 4 NC				**4**	✓
6 NO + 2 NC				**7**	✓
5 NO + 3 NC				**8**	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Options

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

			3WL....-.....-....-Z □□□ +...+...	Additional price
Operating manuals				
Printed version	French/Italian		A 1 1	✓
	Spanish/Portuguese		A 1 2	✓
Rated voltage 1000 V AC and 690 V IT networks				Additional price 3-pole / Additional price 4-pole
Conditions	Size	Rated current I_n		
Only for circuit breakers with high breaking capacity H (8th digit of the Article No. is a "4"). Cannot be combined with rated voltage 1150 V AC, order code "A15".	I[1]	Up to 2000 A	A 0 5	✓ / ✓
	II[1)2)]	Up to 2000 A	A 0 5	✓ / ✓
		2500 A	A 0 5	✓ / ✓
		3200 A / 4000 A	A 0 5	✓ / ✓
	III[1)3)]	4000 A	A 0 5	✓ / ✓
		5000 A	A 0 5	✓ / ✓
		6300 A	A 0 5	✓ / ✓
Rated voltage 1150 V AC				
Conditions	Size	Rated current I_n		
Only for circuit breakers with high breaking capacity H (8th digit of the Article No. is a "4"). Cannot be combined with rated voltage 1000 V AC, order code "A05".	II[2)]	Up to 2000 A	A 1 5	✓ / ✓
		2500 A	A 1 5	✓ / ✓
		3200 A	A 1 5	✓ / ✓
		4000 A	A 1 5	✓ / ✓
Note				
For size III select a circuit breaker with very high breaking capacity C, which can be used as standard up to 1150 V AC.				
Rated voltage 690 V AC (+ 20%)				
Conditions	Size	Rated current I_n		
Only for 3WL11 circuit breakers, size I, with high breaking capacity H (8th digit of the Article No. is a "4").	I	Up to 2000 A	A 1 6	✓ / ✓
Tinned version of the customer's connections on the guide frame[4)5)]				
Conditions	Size			
Only for circuit breakers in withdrawable version with horizontal connection or flange connection. The normal delivery time increases to 15 work days.	I		A 0 8	✓ / ✓
	II		A 0 8	✓ / ✓
	III		A 0 8	✓ / ✓
Special packaging (moisture protection)				Additional price
Special packaging for extended technical requirements				
Cardboard packaging with water-repellent coating on corrugated cardboard (moisture protection).			A 6 1	✓
Rating plugs				Additional price
Conditions	Size	Rated current I_n A		
Only one module is possible per circuit breaker (not in conjunction with Electronic Trip Unit ETU15B). As standard the Electronic Trip Units are equipped with a rating plug which is equal to the maximum rated circuit breaker current ($I_{n\,max}$). The rated current of the selected rating plug must be smaller than $I_{n\,max}$.	I, II	250	B 0 2	None
		315	B 0 3	None
		400	B 0 4	None
		500	B 0 5	None
		630	B 0 6	None
		800	B 0 8	None
		1000	B 1 0	None
	I, II, III	1250	B 1 2	None
		1600	B 1 6	None
		2000	B 2 0	None
	II, III	2500	B 2 5	None
		3200	B 3 2	None
		4000	B 4 0	None
	III	5000	B 5 0	None
		6300	B 6 3	None

1) When ordering withdrawable circuit breaker and guide frame separately, specify order code "A05" for withdrawable circuit breaker and guide frame.

2) Not possible for circuit breakers with very high breaking capacity C.

3) Not necessary for circuit breakers with very high breaking capacity C as these circuit breakers can be used as standard up to 1150 V AC.

4) Front connections are tinned as standard.

5) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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				Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL....-.....-....-Z** ☐☐☐ **+...+...**	Additional price
Indication/operator control elements, door sealing frames						
5-digit mechanical operating cycles counter[1]					**C 0 1**	✓
Electrical ON button S10 in the operator panel[2] Possible only for circuit breakers with closing coil.		Button with sealing cap			**C 1 1**	✓
		Key operation with CES lock			**C 1 2**	✓
Storage status signaling switches[2] **(S21)**		1 NO contact			**C 2 0**	✓
Ready-to-close signaling switches (S20)		1 NO contact			**C 2 2**	✓
Signaling switches[2]		For the first auxiliary release (S22)			**C 2 6**	✓
		For the second auxiliary release (S23)			**C 2 7**	✓
Motor shutdown switch in the operator panel[3] **(S12)**					**S 2 5**	✓
EMERGENCY-STOP pushbuttons		Mushroom pushbutton instead of the mechanical OFF pushbutton			**S 2 4**	✓
Door sealing frames					**T 4 0**	✓
Reclosing lockout and remote resets						
Automatic reset of the reclosing lockout					**K 0 1**	✓
1st tripped signaling switch[2][4] **(S24)**		1 CO contact			**K 0 7**	✓
2nd tripped signaling switch[2][4][8] **(S25)**		1 NO contact			**K 0 6**	✓
Type		50/60 Hz V AC	V DC			
Remote reset solenoid for displays and reset buttons including automatic reset of the reclosing lockout		--	24		**K 1 0**	✓
		--	48		**K 1 1**	✓
		120	125		**K 1 2**	✓
		208 ... 250	208 ... 250		**K 1 3**	✓
Motorized operating mechanism and closing/opening coils						
Type	Conditions	Motor 50/60 Hz V AC	V DC			
Motorized operating mechanism	Only possible if the 13th digit of the Article No. = "1"	--	24 ... 30		**M 0 1**	✓
		--	48 ... 60		**M 0 3**	✓
		110 ... 127	110 ... 125		**M 0 5**	✓
		208 ... 240	220 ... 250		**M 0 6**	✓
Type	Conditions	Activation solenoids 50/60 Hz V AC	V DC			
Closing coil suitable for uninterrupted duty, 100% OP	Only possible if the 13th digit of the Article No. = "1"	--	24		**M 2 1**	✓
		--	30		**M 2 2**	✓
		--	48		**M 2 3**	✓
		--	60		**M 2 4**	✓
		110 ... 127	110 ... 125		**M 2 5**	✓
		208 ... 240	220 ... 250		**M 2 6**	✓
Type	Conditions	Activation solenoids 50/60 Hz V AC	V DC			
Closing coil[5] **not suitable for uninterrupted duty, 5% OP, synchronizable**	Only possible if the 13th digit of the Article No. = "1"	--	24		**M 3 1**	✓
		--	48		**M 3 3**	✓
		110 ... 127	110 ... 125		**M 3 5**	✓
		208 ... 240	220 ... 250		**M 3 6**	✓
Type	Conditions	Activation solenoids 50/60 Hz V AC	V DC			
Opening coils (shunt release)[6][7]	Not suitable for uninterrupted duty, 5% OP, synchronizable	--	24		**M 4 1**	✓
		--	48		**M 4 3**	✓
		110 ... 127	110 ... 125		**M 4 5**	✓
		208 ... 240	220 ... 250		**M 4 6**	✓

1) Only possible with motorized operating mechanism.
2) Not possible with "communications interface" option, order code "F02" or "F12".
3) Only for breakers with motorized operating mechanism, not possible with order codes "C11", "C12".
4) Not available for non-automatic air circuit breakers.
5) Overexcited, i.e. switching time 50 ms (standard > 80 ms).
6) Only possible if the 14th position of the Article No. for the circuit breaker is "A", i.e. "without 1st auxiliary release".
7) Overexcited, i.e. opening time 50 ms (standard > 80 ms).
8) Only possible with option "K07".

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Options

				3WL....-.....-....-Z ☐☐☐ +...+...	Additional price
Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).					
Interlocks, covers, position signaling switches (for fixed-mounted version)					
Mutual mechanical interlockings (interlocking module with Bowden wire 2 m)	Fixed-mounted circuit breakers			S 5 5	✓
Interlocks, covers, position signaling switches (for withdrawable version)					
Mutual mechanical interlockings (interlocking module with Bowden wire 2 m)	Version				
	For withdrawable circuit breakers with guide frame			R 5 5	✓
	For guide frames			R 5 6	✓
	For withdrawable circuit breakers			R 5 7	✓
Arc chute covers Not available for - 1000 V version (order code "A05") - DC version - 4000 A, size II - 1150 V version (order code "A15") - 130 kA version, size II - 150 kA version, size III	Number of poles	Size			
	3-pole	I		R 1 0	✓
		II		R 1 0	✓
		III		R 1 0	✓
	4-pole	I		R 1 0	✓
		II		R 1 0	✓
		III		R 1 0	✓
Shutters 2-part lockable with padlocks[1]	Number of poles	Size			
	3-pole	I		R 2 1	✓
		II		R 2 1	✓
		III		R 2 1	✓
	4-pole	I		R 2 1	✓
		II		R 2 1	✓
		III		R 2 1	✓
Position signaling switches for guide frames	Connected position	Test position	Disconnected position		
	1 CO	1 CO	1 CO	R 1 5	✓
	3 CO	2 CO	1 CO	R 1 6	✓
Communication and metering functions					
Breaker Status Sensor (BSS)				F 0 1	✓
PROFIBUS DP communications interface[2]	Including COM15 and breaker status sensor (BSS)			F 0 2	✓
MODBUS RTU communications interface[2]	Including COM16 and breaker status sensor (BSS)			F 1 2	✓
Metering function *Plus* (without PROFIBUS/MODBUS communications interface)[3]				F 0 5	✓
Overload and short-circuit protection for neutral conductors					
Internal current transformer for N-conductor Only possible with 4-pole circuit breakers with ETU27B to ETU76B	Size				
	I			F 2 3	✓
	II			F 2 3	✓
	III			F 2 3	✓
EMC filters					
EMC filters • Common-mode interference suppressor filters (e.g. in IT networks, caused by frequency converters) • Insertion loss (asymmetric) in the range 40 kHz to 10 MHz > 40 dB				F 3 1	✓
Transformer (without iron core), Rogowski coil only NEW					
Transformer Used in converter applications with high harmonic components; can only be used with ETU45B or ETU76B • External 24 V DC supply required • Undervoltage release required Comprises: • 3 (3-pole) or 4 (4-pole) transformers • Warning signs • Manual	Number of poles	Size			
	3-pole	I		K 6 0	✓
		II		K 6 0	✓
		III		K 6 0	✓
	4-pole	I		K 6 0	✓
		II		K 6 0	✓
		III		K 6 0	✓

1) Padlocks not included in scope of supply.

2) When ordering withdrawable circuit breaker and guide frame separately, specify order code "F02" or "F12" for withdrawable circuit breaker only.

3) Additional voltage transformers are required for connection of the metering function *Plus*, see page 1/70.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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		Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL....-.....-....-Z** ☐☐☐ +...+...	Additional price
Locking devices (for fixed-mounted versions and withdrawable versions)				
Locking devices against unauthorized closing, in the operator panel The disconnector unit fulfills the requirements for main circuit breakers according to EN 60204-1.	Version			
	Made by CES	**S 0 1**		✓
	Made by IKON	**S 0 3**		✓
	Assembly kit FORTRESS or Castell[1]	**S 0 5**		✓
	Assembly kit for padlocks[2]	**S 0 7**		✓
	Made by Ronis	**S 0 8**		✓
	Made by Profalux	**S 0 9**		✓
EMERGENCY-STOP pushbuttons	Mushroom pushbutton instead of the mechanical OFF pushbutton	**S 2 4**		✓
Locking devices for operating mechanism handles with padlock[2]		**S 3 3**		✓
Locking devices (for withdrawable version)				
Locking devices against unauthorized closing, for withdrawable circuit breakers The disconnector unit fulfills the requirements for main circuit breakers acc. to EN 60204-1, consisting of a lock in the cabinet door, active in the connected position, function is retained when circuit breaker is replaced. Not possible in combination with order codes "R81", "R85" or "R86".	Version			
	Made by CES	**R 6 1**		✓
	Made by Ronis	**R 6 8**		✓
	Made by Profalux	**R 6 0**		✓
Locking devices to prevent movement of the withdrawable circuit breakers Safety lock for mounting on the circuit breaker.	Version			
	Made by CES	**S 7 1**		✓
	Made by Profalux	**S 7 5**		✓
	Made by Ronis	**S 7 6**		✓
Locking mechanisms (for fixed-mounted versions)				
Locking mechanism Not possible in combination with order codes "R81", "R85" or "R86".	To prevent opening of the cabinet door in ON position	**S 3 0**		✓
Locking mechanisms (for withdrawable versions)				
Locking mechanism Not possible in combination with order codes "R81", "R85" or "R86".	Version			
	To prevent opening of the cabinet door in connected position	**R 3 0**		✓
	To prevent closing of circuit breaker with the cabinet door open[3][5]	**R 4 0**		✓
	To prevent movement with the cabinet door open[4]	**R 5 0**		✓
Locking mechanism to prevent movement of the withdrawable circuit breakers in disconnected position, consisting of Bowden wire and lock in the cabinet door. Not possible in combination with order codes "R30", "R50", "R61", "R68" or "R60".	Version			
	Made by CES	**R 8 1**		✓
	Made by Profalux	**R 8 5**		✓
	Made by Ronis	**R 8 6**		✓
Connection methods for auxiliary conductors (for fixed-mounted and withdrawable versions)				
Connections for screwless terminals (tension spring)	Version			
	Fixed-mounted	**N 6 1**		✓
	Withdrawable	**P 6 1**		✓

1) Locks must be ordered from the manufacturer
2) Padlock not included in the scope of supply
3) Not available in combination with R50
4) Not available in combination with R40
5) Combination with R81, R85 and R86 on request

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Options

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

3WL....-.....-....-Z
□□□ **+...+...**

For withdrawable circuit breakers with guide frames or for guide frames[1]						Additional price 3-pole	Additional price 4-pole
Note							
To select this connection method, the 12th digit of the Article No. for the circuit breaker must be a "6".							
Connection methods for main connections	Size	Rated current I_n					
Top and bottom:[1) 2)] accessible from front, single hole	I	Up to 1600 A	**P**	**0**	**0**	✓	✓
	II	Up to 2000 A	**P**	**0**	**0**	✓	✓
		Up to 2500 A	**P**	**0**	**0**	✓	✓
		Up to 3200 A	**P**	**0**	**0**	✓	✓
	III	Up to 4000 A	**P**	**0**	**0**	✓	✓
Connection methods for main connections	Size	Rated current I_n					
Top and bottom:[1)] accessible from front, double hole	I	Up to 2000 A	**P**	**0**	**1**	✓	✓
	II	Up to 2000 A	**P**	**0**	**1**	✓	✓
		Up to 2500 A	**P**	**0**	**1**	✓	✓
		Up to 3200 A	**P**	**0**	**1**	✓	✓
	III	Up to 4000 A	**P**	**0**	**1**		
Connection methods for main connections	Size	Rated current I_n					
Top:[1) 2)] horizontal Bottom: accessible from front, single hole	I	Up to 1600 A	**P**	**0**	**7**	✓	✓
	II	Up to 2000 A	**P**	**0**	**7**	✓	✓
		Up to 2500 A	**P**	**0**	**7**	✓	✓
		Up to 3200 A	**P**	**0**	**7**	✓	✓
	III	Up to 4000 A	**P**	**0**	**7**		
Connection methods for main connections	Size	Rated current I_n					
Top: vertical Bottom: horizontal	I	Up to 2000 A	**P**	**1**	**8**	✓	✓
	II	Up to 2000 A	**P**	**1**	**8**	✓	✓
		Up to 2500 A	**P**	**1**	**8**	✓	✓
		Up to 3200 A	**P**	**1**	**8**	✓	✓
	III	Up to 4000 A	**P**	**1**	**8**	✓	✓
		Up to 5000 A	**P**	**1**	**8**		
Connection methods for main connections	Size	Rated current I_n					
Top:[1)] connection flange Bottom: horizontal	I	Up to 2000 A	**P**	**1**	**9**	✓	✓
	II	Up to 2000 A	**P**	**1**	**9**	✓	✓
		Up to 2500 A	**P**	**1**	**9**	✓	✓
		Up to 3200 A	**P**	**1**	**9**	✓	✓
	III	Up to 4000 A	**P**	**1**	**9**		
Connection methods for main connections	Size	Rated current I_n					
Top: horizontal Bottom: vertical	I	Up to 2000 A	**P**	**2**	**3**	✓	✓
	II	Up to 2000 A	**P**	**2**	**3**	✓	✓
		Up to 2500 A	**P**	**2**	**3**	✓	✓
		Up to 3200 A	**P**	**2**	**3**	✓	✓
	III	Up to 4000 A	**P**	**2**	**3**	✓	✓
		Up to 5000 A	**P**	**2**	**3**		
Connection methods for main connections	Size	Rated current I_n					
Top:[1)] horizontal Bottom: connecting flange	I	Up to 2000 A	**P**	**2**	**8**	✓	✓
	II	Up to 2000 A	**P**	**2**	**8**	✓	✓
		Up to 2500 A	**P**	**2**	**8**	✓	✓
		Up to 3200 A	**P**	**2**	**8**	✓	✓
	III	Up to 4000 A	**P**	**2**	**8**	✓	✓

1) Cannot be used for size II and III circuit breakers with very high breaking capacity C

2) Not for 3WL1 size I with high breaking capacity H

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

3WL....-.....-....-Z
□□□ **+...+...**

For fixed-mounted circuit breakers							Additional price 3-pole	Additional price 4-pole
Note								
To select this connection method, the 12th digit of the Article No. for the circuit breaker must be a "2".								
Connection methods for main connections	Size	Rated current I_n						
Top:[1] horizontal Bottom: accessible from front, single hole	I	Up to 1600 A	**N**	**1**	**1**		✓	✓
	II	Up to 2000 A	**N**	**1**	**1**		✓	✓
		Up to 2500 A	**N**	**1**	**1**		✓	✓
		Up to 3200 A	**N**	**1**	**1**		✓	✓
	III[2]	Up to 4000 A	**N**	**1**	**1**			
Connection methods for main connections	Size	Rated current I_n						
Top: vertical Bottom: horizontal	I	Up to 1600 A	**N**	**2**	**0**		✓	✓
		Up to 2000 A	**N**	**2**	**0**		✓	✓
	II	Up to 2000 A	**N**	**2**	**0**		✓	✓
		Up to 2500 A	**N**	**2**	**0**		✓	✓
		Up to 3200 A	**N**	**2**	**0**		✓	✓
	III	Up to 4000 A	**N**	**2**	**0**		✓	✓
		Up to 5000 A	**N**	**2**	**0**			
Connection methods for main connections	Size	Rated current I_n						
Top: horizontal Bottom: vertical	I	Up to 1600 A	**N**	**2**	**4**		✓	✓
		Up to 2000 A	**N**	**2**	**4**		✓	✓
	II	Up to 2000 A	**N**	**2**	**4**		✓	✓
		Up to 2500 A	**N**	**2**	**4**		✓	✓
		Up to 3200 A	**N**	**2**	**4**		✓	✓
	III	Up to 4000 A	**N**	**2**	**4**		✓	✓
		Up to 5000 A	**N**	**2**	**4**		✓	✓

1) Not for 3WL1 size I with high breaking capacity H and circuit breakers with very high breaking capacity C

2) Not for size III with very high breaking capacity C

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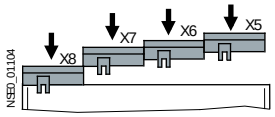
Overview

Determination of the number of auxiliary supply connectors required

This selection is only required if the guide frame is ordered under a separate Article No.



The required number of auxiliary supply connectors depends on the:
- Operating mechanism type
- Electronic Trip Unit with/without current transformer
- Type and number of auxiliary releases
- Number of auxiliary switches
- COM15/COM16 communication interface

		Number of auxiliary supply connectors	Terminal
a	**The first auxiliary supply connector X6 is always required.**	**1**	X6
b	**Operating mechanisms**		
b1	Manual operating mechanism with stored-energy feature with mechanical closing	**0**	
b2	Manual operating mechanism with stored-energy feature with mechanical and electrical closing	**0**	X6
b3	Manual/motorized operating mechanism with stored-energy feature with mechanical and electrical closing	**+1**	X5
c	**Electronic Trip Units**		
c1	Electronic Trip Units ETU15B, ETU25B, ETU27B	**0**	
c2	Electronic Trip Units ETU45B, ETU76B (internal Cubicle**BUS**)	**+1**	X8
	Connections for external current transformers for overload protection in the N-conductor and ground fault protection		
c3	Current transformer installed in the N-conductor (required with 3-pole circuit breakers if c2 is not selected)	**+1**	X8
c4	Current transformer in the neutral point of the transformer (required if c2 or c3 is not selected)	**+1**	X8
d	**Auxiliary releases**		
d1	With/without 1st auxiliary release (shunt release F1)	**0**	X6
d2	2nd auxiliary release (shunt release F2, undervoltage release F3, delayable undervoltage release F4)	**+1**	X5
e	**Auxiliary switch blocks**		
e1	1st auxiliary switch block 2 NO + 2 NC	**0**	X6
e2	1st and 2nd auxiliary switch block 4 NO + 4 NC or 6 NO + 2 NC or 5 NO + 3 NC (required if b3 or d2 is not selected)	**+1**	X5
f	**Communication modules**		
f1	Without communication module COM15/COM16	**0**	
f2	With communication module COM15/COM16 - occupies the entire terminal strip X7, making the following options no longer possible: • Tripped signaling switch S24 • Stored-energy status indication S21 • Electrical ON button S10 • Signaling switch on first and second auxiliary release S22 + S23	**+1**	X7
g	**Optional signals/accessories**		
g1	Tripped signaling switch S24 (only when f2 not selected)	**+1**	X7
g2	Stored-energy status indicator S21 (only when f2 not selected, required if g1 not selected)	**+1**	X7
g3	Electric ON button S10 (only when f2 not selected, required if g1 or g2 not selected)	**+1**	X7
g4	Signaling switch at first auxiliary release S22 (only when f2 not selected, required if g1, g2 or g3 not selected)	**+1**	X7
g5	Signaling switch at second auxiliary release S23 (only when f2 not selected, required if g1, g2, g3 or g4 not selected)	**+1**	X7
g6	Switch on ready-to-close signaling switch S20	**0**	X6
g7	Motor shutdown switch S12 (only if motorized operating mechanism selected)	**0**	X5
g8	Remote reset solenoid F7 (required if c2 not selected)	**+1**	X8
h	**Total number of auxiliary supply connectors**	**(max. 4)**	

For ordering the auxiliary supply connectors, see under "Accessories and spare parts, Guide frames for AC circuit breakers/ non-automatic air circuit breakers", page 1/55 to page 1/60 and under "Accessories and spare parts, Auxiliary conductor connections, Auxiliary supply connectors", page 1/66.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Guide frames for AC circuit breakers/non-automatic air circuit breakers

Size	Max. rated circuit breaker current $I_{n\,max}$	Breaking capacity $I_{cu} = I_{cs}$	SD	**Guide frames for 3-pole circuit breakers/ non-automatic air circuit breakers** Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	kA	d					
Front main circuit connection, single hole								
I	1000	... 66		**3WL9211-1AA□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2AA□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3AA□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4AA□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5AA□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6AA□□-□□A1**		1	1 unit	1CA
Front main circuit connection, double hole								
I	1000	... 66		**3WL9211-1AB□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2AB□□-□□A1**		1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3AB□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3AB□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4AB□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5AB□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6AB□□-□□A1**		1	1 unit	1CA
Horizontal main circuit connection								
I	1000	... 66		**3WL9211-1AC□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2AC□□-□□A1**		1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3AC□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3AC□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4AC□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5AC□□-□□A1**		1	1 unit	1CA
	3200	... 130		**3WL9212-5AC□□-□□C1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6AC□□-□□A1**		1	1 unit	1CA
	5000	... 100		**3WL9213-7AC□□-□□A1**		1	1 unit	1CA
	4000	... 150		**3WL9213-6AC□□-□□C1**		1	1 unit	1CA
	5000	... 150		**3WL9213-7AC□□-□□C1**		1	1 unit	1CA

Options								Additional price
Number of auxiliary supply connectors	None		**0**					**None**
	1 connector		**1**					✓
	2 connectors		**2**					✓
	3 connectors		**3**					✓
	4 connectors		**4**					✓
Note								
For required number of auxiliary supply connectors, see table on page 1/54.								
Type of auxiliary circuit connections	None[2]			**0**				**None**
	With screw connection (SIGUT, standard)			**1**				✓
	With screwless connection method (tension spring)			**2**				✓
Position signaling switches	None				**0**			**None**
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO				**1**			✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO				**2**			✓
Shutters	None					**A**		**None**
	With shutter, 2-part, lockable	Size I				**B**		✓
		Size II				**B**		✓
		Size III				**B**		✓

[1] For 3WL1 air circuit breakers size I from 630 A to 2000 A with high breaking capacity H and 3WL1 air circuit breakers size I with rated current I_n = 2000 A.

[2] Can only be selected if the number of auxiliary supply connectors = 0.

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Accessories and spare parts

	Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL921.-.....-....-Z** □ □ □	Additional price
Rated voltage 1000 V AC and 690 V IT networks			
Size I (breaking capacity H)		**A 0 5**	✓
Size II (breaking capacity H), not for breaking capacities N, S and C		**A 0 5**	✓
Size III, not necessary with circuit breakers with very high breaking capacity		**A 0 5**	✓
Rated voltage 1150 V AC			
Size II, except breaking capacity C and 4000 A (breaking capacity H)		**A 1 5**	✓
Rated voltage 690 V AC (+ 20%)			
Size I (breaking capacity H)		**A 1 6**	✓
Tinned version of the customer's connections on the guide frame[1)2)] Only for guide frames with horizontal connection or flange connection			
Size I		**A 0 8**	✓
Size II		**A 0 8**	✓
Size III		**A 0 8**	✓
Notes			
• For vertical main circuit connection and main circuit connection connecting flange, see the following page. • All other accessory parts must be ordered by specifying "-Z" and the corresponding order code, see page 1/48 to page 1/53.			

1) Front connections are tinned as standard.

2) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Breaking capacity $I_{cu} = I_{cs}$	SD	**Guide frames for 3-pole circuit breakers/ non-automatic air circuit breakers** Article No.: www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	kA	d					
Vertical main circuit connection								
I	1000	... 66		**3WL9211-1AD□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2AD□□-□□A1**		1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3AD□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3AD□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4AD□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5AD□□-□□A1**		1	1 unit	1CA
	3200	... 130		**3WL9212-5AD□□-□□C1**		1	1 unit	1CA
	4000	... 100		**3WL9212-6AD□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6AD□□-□□A1**		1	1 unit	1CA
	5000	... 100		**3WL9213-7AD□□-□□A1**		1	1 unit	1CA
	6300	... 100		**3WL9213-8AD□□-□□A1**		1	1 unit	1CA
	4000	... 150		**3WL9213-6AD□□-□□C1**		1	1 unit	1CA
	5000	... 150		**3WL9213-7AD□□-□□C1**		1	1 unit	1CA
	6300	... 150		**3WL9213-8AD□□-□□C1**		1	1 unit	1CA
Main circuit connection connecting flanges								
I	1000	... 66		**3WL9211-1AE□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2AE□□-□□A1**		1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3AE□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3AE□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4AE□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5AE□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6AE□□-□□A1**		1	1 unit	1CA

Options							Additional price
Number of auxiliary supply connectors	None		**0**				**None**
	1 connector		**1**				✓
	2 connectors		**2**				✓
	3 connectors		**3**				✓
	4 connectors		**4**				✓
Note							
For required number of auxiliary supply connectors, see table on page 1/54.							
Type of auxiliary circuit connections	None[4]			**0**			**None**
	With screw connection (SIGUT, standard)			**1**			✓
	With screwless connection method (tension spring)			**2**			✓
Position signaling switches	None				**0**		**None**
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO				**1**		✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO				**2**		✓
Shutters	None					**A**	**None**
	With shutter,	Size I				**B**	✓
	2-part,	Size II				**B**	✓
	lockable	Size III				**B**	✓

	Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL921.-.....-....-Z** □ □ □	Additional price
Rated voltage 1000 V AC and 690 V IT networks			
Size I (breaking capacity H)		**A 0 5**	✓
Size II (breaking capacity H), not for breaking capacities N, S and C		**A 0 5**	✓
Size III, not necessary with circuit breakers with very high breaking capacity		**A 0 5**	✓
Rated voltage 1150 V AC			
Size II, except breaking capacity C and 4000 A (breaking capacity H)		**A 1 5**	✓
Rated voltage 690 V AC (+ 20%)			
Size I (breaking capacity H)		**A 1 6**	✓
Tinned version of the customer's connections on the guide frame[1)2)] Only for guide frames with horizontal connection or flange connection			
Size I		**A 0 8**	✓
Size II		**A 0 8**	✓
Size III		**A 0 8**	✓
Notes			
• For vertical main circuit connection and main circuit connection connecting flange, see the following page. • All other accessory parts must be ordered by specifying "-Z" and the corresponding order code, see page 1/48 to page 1/53.			

1) For 3WL1 circuit breakers size I from 630 A to 2000 A with high breaking capacity H and 3WL1 circuit breakers size I with rated current I_n = 2000 A.

2) Front connections are tinned as standard.

3) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

4) Can only be selected if the number of auxiliary supply connectors = 0.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Breaking capacity $I_{cu} = I_{cs}$	SD	Guide frames for 4-pole circuit breakers/ non-automatic air circuit breakers Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	kA	d					
Front main circuit connection, single hole								
I	1000	... 66		**3WL9211-1BA□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2BA□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3BA□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4BA□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5BA□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6BA□□-□□A1**		1	1 unit	1CA
Front main circuit connection, double hole								
I	1000	... 66		**3WL9211-1BB□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2BB□□-□□A1**		1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3BB□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3BB□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4BB□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5BB□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6BB□□-□□A1**		1	1 unit	1CA
Horizontal main circuit connection								
I	1000	... 66		**3WL9211-1BC□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9211-2BC□□-□□A1**		1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3BC□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9212-3BC□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9212-4BC□□-□□A1**		1	1 unit	1CA
	3200	... 100		**3WL9212-5BC□□-□□A1**		1	1 unit	1CA
	3200	... 130		**3WL9212-5BC□□-□□C1**		1	1 unit	1CA
III	4000	... 100		**3WL9213-6BC□□-□□A1**		1	1 unit	1CA
	5000	... 100		**3WL9213-7BC□□-□□A1**		1	1 unit	1CA
	4000	... 130		**3WL9213-6BC□□-□□C1**		1	1 unit	1CA
	5000	... 130		**3WL9213-7BC□□-□□C1**		1	1 unit	1CA

Options						Additional price
Number of auxiliary supply connectors	None		**0**			**None**
	1 connector		**1**			✓
	2 connectors		**2**			✓
	3 connectors		**3**			✓
	4 connectors		**4**			✓
Note						
For required number of auxiliary supply connectors, see table on page 1/54.						
Type of auxiliary circuit connections	None[2]			**0**		**None**
	With screw connection (SIGUT, standard)			**1**		✓
	With screwless connection method (tension spring)			**2**		✓
Position signaling switches	None				**0**	**None**
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO				**1**	✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO				**2**	✓
Shutters	None				**A**	**None**
	With shutter, 2-part, lockable	Size I			**B**	✓
		Size II			**B**	✓
		Size III			**B**	✓

[1] For 3WL1 circuit breakers size I from 630 A to 2000 A with high breaking capacity H and 3WL1 circuit breakers size I with rated current I_n = 2000 A.

[2] Can only be selected if the number of auxiliary supply connectors = 0.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL921.-.....-....-Z** □ □ □	Additional price
Rated voltage 1000 V AC and 690 V IT networks		
Size I (breaking capacity H)	**A 0 5**	✓
Size II (breaking capacity H), not for breaking capacities N, S and C	**A 0 5**	✓
Size III, not necessary with circuit breakers with very high breaking capacity	**A 0 5**	✓
Rated voltage 1150 V AC		
Size II, except breaking capacity C and 4000 A (breaking capacity H)	**A 1 5**	✓
Rated voltage 690 V AC (+ 20%)		✓
Size I (breaking capacity H)	**A 1 6**	✓
Tinned version of the customer's connections on the guide frame[1)2)] Only for guide frames with horizontal connection or flange connection		
Size I	**A 0 8**	✓
Size II	**A 0 8**	✓
Size III	**A 0 8**	✓
Notes		
• For vertical main circuit connection and main circuit connection connecting flange, see the following page.		
• All other accessory parts must be ordered by specifying "-Z" and the corresponding order code, see page 1/48 to page 1/53.		

1) Front connections are tinned as standard.

2) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Breaking capacity $I_{cu} = I_{cs}$	SD	**Guide frames for 4-pole circuit breakers/ non-automatic air circuit breakers**	PU (UNIT, SET, M)	PS	PG
	A	kA	d	Article No.: www.siemens.com/product?Article No. — Basic price per PU			
Vertical main circuit connection							
I	1000	... 66		**3WL9211-1BD□□-□□A1**	1	1 unit	1CA
	1600	... 66		**3WL9211-2BD□□-□□A1**	1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3BD□□-□□A1**	1	1 unit	1CA
II	2000	... 100		**3WL9212-3BD□□-□□A1**	1	1 unit	1CA
	2500	... 100		**3WL9212-4BD□□-□□A1**	1	1 unit	1CA
	3200	... 100		**3WL9212-5BD□□-□□A1**	1	1 unit	1CA
	3200	... 130		**3WL9212-5BD□□-□□C1**	1	1 unit	1CA
	4000	... 100		**3WL9212-6BD□□-□□A1**	1	1 unit	1CA
III	4000	... 100		**3WL9213-6BD□□-□□A1**	1	1 unit	1CA
	5000	... 100		**3WL9213-7BD□□-□□A1**	1	1 unit	1CA
	6300	... 100		**3WL9213-8BD□□-□□A1**	1	1 unit	1CA
	4000	... 130		**3WL9213-6BD□□-□□C1**	1	1 unit	1CA
	5000	... 130		**3WL9213-7BD□□-□□C1**	1	1 unit	1CA
	6300	... 130		**3WL9213-8BD□□-□□C1**	1	1 unit	1CA
Main circuit connection connecting flanges							
I	1000	... 66		**3WL9211-1BE□□-□□A1**	1	1 unit	1CA
	1600	... 66		**3WL9211-2BE□□-□□A1**	1	1 unit	1CA
	2000[1]	... 85		**3WL9211-3BE□□-□□A1**	1	1 unit	1CA
II	2000	... 100		**3WL9212-3BE□□-□□A1**	1	1 unit	1CA
	2500	... 100		**3WL9212-4BE□□-□□A1**	1	1 unit	1CA
	3200	... 100		**3WL9212-5BE□□-□□A1**	1	1 unit	1CA
III	4000	... 100		**3WL9213-6BE□□-□□A1**	1	1 unit	1CA

Options				Additional price
Number of auxiliary supply connectors	None		**0**	**None**
	1 connector		**1**	✓
	2 connectors		**2**	✓
	3 connectors		**3**	✓
	4 connectors		**4**	✓
Note				
For required number of auxiliary supply connectors, see table on page 1/54.				
Type of auxiliary circuit connections	None[4]		**0**	**None**
	With screw connection (SIGUT, standard)		**1**	✓
	With screwless connection method (tension spring)		**2**	✓
Position signaling switches	None		**0**	**None**
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO		**1**	✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO		**2**	✓
Shutters	None		**A**	**None**
	With shutter, 2-part, lockable	Size I	**B**	✓
		Size II	**B**	✓
		Size III	**B**	✓

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL921.-.....-....-Z** □ □ □	Additional price
Rated voltage 1000 V AC and 690 V IT networks		
Size I (breaking capacity H)	**A 0 5**	✓
Size II (breaking capacity H), not for breaking capacities N, S and C	**A 0 5**	✓
Size III, not necessary with circuit breakers with very high breaking capacity	**A 0 5**	✓
Rated voltage 1150 V AC		
Size II, except breaking capacity C and 4000 A (breaking capacity H)	**A 1 5**	✓
Rated voltage 690 V AC (+ 20%)		
Size I (breaking capacity H)	**A 1 6**	✓
Tinned version of the customer's connections on the guide frame[1)2)] Only for guide frames with horizontal connection or flange connection		
Size I	**A 0 8**	✓
Size II	**A 0 8**	✓
Size III	**A 0 8**	✓
Notes		
• For vertical main circuit connection and main circuit connection connecting flange, see the following page. • All other accessory parts must be ordered by specifying "-Z" and the corresponding order code, see page 1/48 to page 1/53.		

1) For 3WL1 circuit breakers size I from 630 A to 2000 A with high breaking capacity H and 3WL1 circuit breakers size I with rated current I_n = 2000 A.

2) Front connections are tinned as standard.

3) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

4) Can only be selected if the number of auxiliary supply connectors = 0.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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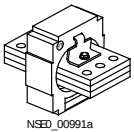
	Designation			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 NSE0_01610b 3WL931.-.AA.0-0AA1	**Protective device with device holder and optional metering function[1]**								
	Type	With protection function	Metering function						
	ETU15B	LI	None		**3WL9311-5AA00-0AA2**		1	1 unit	1CA
	ETU25B	LSI	None		**3WL9312-5AA00-0AA2**		1	1 unit	1CA
	ETU27B	LSING	None		**3WL9312-7AA00-0AA2**		1	1 unit	1CA
	ETU45B (without display)	LSIN(G)	None		**3WL9314-5AA00-0AA2**		1	1 unit	1CA
			With metering function *Plus*		**3WL9314-5AA20-0AA2**		1	1 unit	1CA
	ETU76B	LSIN(G)	None		**3WL9317-6AA00-0AA2**		1	1 unit	1CA
			With metering function *Plus*		**3WL9317-6AA20-0AA2**		1	1 unit	1CA
 NSE0_00992b 3WL9111-0AA64-0AA0	**Rating plugs[2]**								
	Size		Rated current I_n A						
	I, II		250		**3WL9111-0AA51-0AA0**		1	1 unit	1CA
			315		**3WL9111-0AA52-0AA0**		1	1 unit	1CA
			400		**3WL9111-0AA53-0AA0**		1	1 unit	1CA
			500		**3WL9111-0AA54-0AA0**		1	1 unit	1CA
			630		**3WL9111-0AA55-0AA0**		1	1 unit	1CA
			800		**3WL9111-0AA56-0AA0**		1	1 unit	1CA
			1000		**3WL9111-0AA57-0AA0**		1	1 unit	1CA
	I, II, III		1250		**3WL9111-0AA58-0AA0**		1	1 unit	1CA
			1600		**3WL9111-0AA61-0AA0**		1	1 unit	1CA
			2000		**3WL9111-0AA62-0AA0**		1	1 unit	1CA
	II, III		2500		**3WL9111-0AA63-0AA0**		1	1 unit	1CA
			3200		**3WL9111-0AA64-0AA0**		1	1 unit	1CA
			4000		**3WL9111-0AA65-0AA0**		1	1 unit	1CA
	III		5000		**3WL9111-0AA66-0AA0**		1	1 unit	1CA
			6300		**3WL9111-0AA67-0AA0**		1	1 unit	1CA
 NSE0_01027a 3WL9111-0AT53-0AA0	**Ground-fault modules[3]**								
	Versions								
	• GFM AT 45B (only for ETU45B) alarm and tripping				**3WL9111-0AT53-0AA0**		1	1 unit	1CA
	• GFM AT 55B–76B (only for ETU76B) alarm and tripping				**3WL9111-0AT56-0AA0**		1	1 unit	1CA
 NSE0_01609 3WL9111-0AT81-0AA0	**Displays** • For ETU45B • 4-line				**3WL9111-0AT81-0AA0**		1	1 unit	1CA
 NSE0_00990a 3WL9111-0AA2.-0AA0	**Internal current transformers for N-conductor** Including wiring kit								
	ETU Release 2		Size						
	--		I		**3WL9111-0AA11-0AA0**		1	1 unit	1CA
			II		**3WL9111-0AA12-0AA0**		1	1 unit	1CA
			III		**3WL9111-0AA13-0AA0**		1	1 unit	1CA
	✓		I		**3WL9111-0AA14-0AA0**		1	1 unit	1CA
			II		**3WL9111-0AA15-0AA0**		1	1 unit	1CA
			III		**3WL9111-0AA16-0AA0**		1	1 unit	1CA
 NSE0_00991a 3WL9111-0AA3.-0AA0	**External current transformers for N-conductor** For T5, "Measurement Method" function, see Technical Information at www.siemens.com/lowvoltage/product-support.								
	Copper connection pieces		Size						
	--		I		**3WL9111-0AA21-0AA0**		1	1 unit	1CA
			II		**3WL9111-0AA22-0AA0**		1	1 unit	1CA
			III		**3WL9111-0AA23-0AA0**		1	1 unit	1CA
	✓		I		**3WL9111-0AA31-0AA0**		1	1 unit	1CA
			II		**3WL9111-0AA32-0AA0**		1	1 unit	1CA
			III		**3WL9111-0AA33-0AA0**		1	1 unit	1CA
	EMC filters • Common-mode interference suppressor filters (e.g. in IT networks, caused by frequency converters) • Insertion loss (asymmetric) in the range 40 kHz to 10 MHz > 40 dB								
	Versions								
	• Not for ETU Release 2				**3WL9111-0AK32-0AA0**		1	1 unit	1CA
	• Only for ETU Release 2				**3WL9111-0AK34-0AA0**		1	1 unit	1CA

1) For replacement in existing circuit breakers, please specify the circuit breaker ID No. when ordering.

2) With the rating plug selected, the maximum rated current $I_{n\,max}$ of the circuit breaker must not be exceeded. The following applies: $I_n \leq I_{n\,max}$

3) For direct measurement of the ground-fault current, e.g. in the neutral point of the transformer, a 1200 A/1 A current transformer, class 1, is required. The internal load of the 3WL is 0.11 Ω. If the ground-fault current is to be determined using the vectorial sum of the phases, a transformer must be installed in the neutral conductor.

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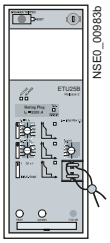
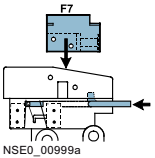
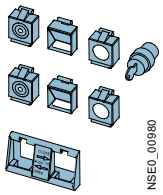
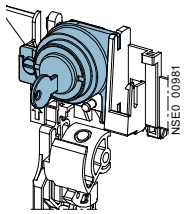
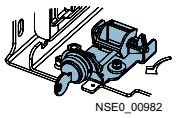
Accessories and spare parts

	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
More accessories for Electronic Trip Units							
 3WL9111-0AT45-0AA0	**Sealable and lockable covers**						
	Versions						
	• For ETU15B to ETU45B		**3WL9111-0AT45-0AA0**		1	1 unit	1CA
	• For ETU76		**3WL9111-0AT46-0AA0**		1	1 unit	1CA
	Automatic reset of the reclosing lockout Spare part for option **K01,** see "-Z" + order code, see page 1/49.		**3WL9111-0AK21-0AA0**		1	1 unit	1CA
 3WL9111-0AK0.-0AA0	**Remote reset coils**[1] • For mechanical tripped indicator • Spare part for options **K10** to **K13,** see "-Z" + order code, page 1/49.						
	Note						
	Automatic reset of the reclosing lockout 3WL9111-0AK21-0AA0 also needed.						
	Versions						
	• 24 V DC		**3WL9111-0AK03-0AA0**		1	1 unit	1CA
	• 48 V DC		**3WL9111-0AK04-0AA0**		1	1 unit	1CA
	• 120 V AC/125 V DC		**3WL9111-0AK05-0AA0**		1	1 unit	1CA
	• 208-250 V AC/208-250 V DC		**3WL9111-0AK06-0AA0**		1	1 unit	1CA
	Retrofittable internal CubicleBUS wiring for connection to terminal X8 • For ETU45B and ETU76B • With male connector[2]		**3WL9111-0AK30-0AA0**		1	1 unit	1CA
	Retrofittable internal wiring for connection of the external N- and G-transformers to terminal X8 • Not for ETU Release 2 • Without male connector		**3WL9111-0AK31-0AA0**		1	1 unit	1CA
	Retrofittable internal wiring for connection of the external N- and G-transformers to terminal X8 • For ETU Release 2 • Without male connector		**3WL9111-0AK33-0AA0**		1	1 unit	1CA
Locking devices							
 3WL9111-0BA22-0AA0	**Interlocking set for mechanical ON/OFF** • Each consisting of 2 transparent covers for sealing or for attaching padlocks[4] • Cover with 6.35 mm hole (for tool actuation) • Lock mount for safety lock for key operation						
	Versions						
	• Without safety lock		**3WL9111-0BA21-0AA0**		1	1 unit	1CA
	• Made by CES		**3WL9111-0BA22-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA24-0AA0**		1	1 unit	1CA
 3WL9111-0BA31-0AA0	**Locking devices against unauthorized closing, in the operator panel** • The disconnector unit fulfills the requirements for main circuit breakers acc. to EN 60204-1 • Spare part for options **S01** to **S09,** see "-Z" + order code, page 1/51.						
	Versions						
	• Assembly kit FORTRESS or Castell[3]		**3WL9111-0BA31-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA33-0AA0**		1	1 unit	1CA
	• Made by KIRK-Key[3]		**3WL9111-0BA34-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA35-0AA0**		1	1 unit	1CA
	• Made by CES		**3WL9111-0BA36-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA38-0AA0**		1	1 unit	1CA
	• Assembly kit for padlocks[4]		**3WL9111-0BA41-0AA0**		1	1 unit	1CA
 3WL9111-0BA53-0AA0	**Locking devices against unauthorized closing, for withdrawable circuit breakers** • The disconnector unit fulfills the requirements for main circuit breakers acc. to EN 60204-1 • Consisting of lock in the guide frame, active in connected position, function is retained when circuit breaker is replaced • Spare part for option **R60, R61, R68**, see "-Z" + order code, page 1/51.						
	Versions						
	• Made by CES		**3WL9111-0BA51-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA53-0AA0**		1	1 unit	1CA
	• Made by KIRK-Key[3]		**3WL9111-0BA57-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA58-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA50-0AA0**		1	1 unit	1CA

1) Can only be used in conjunction with "automatic reset of reclosing lockout", e.g. "-Z" + "K01", 3WL9111-0AK21-0AA0.
2) Required if communication is retrofitted.
3) Locks, cylinders and keys must be ordered from the manufacturer.
4) Padlock not included in the scope of supply.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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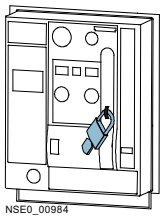
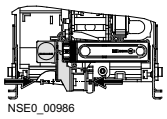
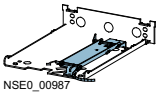
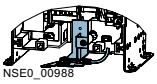
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 NSE0_00984 3WL9111-0BA71-0AA0	**Locking devices for operating mechanism handle with padlock**[1] Spare part for option **S33,** see "-Z" + order code, page 1/51.		**3WL9111-0BA71-0AA0**		1	1 unit	1CA
 NSE0_00986 3WL9111-0BA76-0AA0	**Locking devices to prevent movement of the withdrawable circuit breakers** • Safety lock for mounting on the circuit breaker • Spare part for option **S71, S75, S76**, see "-Z" + order code, page 1/51.						
	Versions						
	• Made by CES		**3WL9111-0BA73-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA75-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA76-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA77-0AA0**		1	1 unit	1CA
	• Made by KIRK-Key[2]		**3WL9111-0BA80-0AA0**		1	1 unit	1CA
	Interlocking systems • Made by CES • 2 of the same keys for 3 circuit breakers • Locking device in OFF position • Lock in the operator panel • A maximum of 2 circuit breakers can be switched on		**3WL9111-0BA43-0AA0**		1	1 unit	1CA
Locking mechanisms							
 NSE0_00987 3WL9111-0BA83-0AA0	**Locking mechanisms to prevent movement of the withdrawable circuit breakers in disconnected position** • Consisting of Bowden wire and lock in the cabinet door on the circuit breaker • Spare part for option **R81**, **R85**, **R86,** see "-Z" + order code, page 1/51.						
	Versions						
	• Made by CES		**3WL9111-0BA81-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA83-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA85-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA86-0AA0**		1	1 unit	1CA
	Note						
	Not possible in combination with "Locking mechanism to prevent opening of the cabinet door" (order code "R30") or "Locking mechanism to prevent movement with the cabinet door open (order code "R50").						
 NSE0_00988 3WL9111-0BB12-0AA0	**Locking mechanisms to prevent opening of the cabinet door in ON position** • Fixed-mounted • Can be defeated • Spare part for option **S30,** see "-Z" + order code, page 1/51.		**3WL9111-0BB12-0AA0**		1	1 unit	1CA
	Locking mechanisms to prevent opening of the cabinet door • Guide frames • Can be defeated • Spare part for option **R30,** see "-Z" + order code, page 1/51.		**3WL9111-0BB13-0AA0**		1	1 unit	1CA
	Note						
	Not possible in combination with "Locking device to prevent movement of the withdrawable circuit breakers in disconnected position" (order codes "R81", "R85" or "R86").						
	Locking mechanisms to prevent movement with the cabinet door open • Guide frames • Spare part for option **R50,** see "-Z" + order code, page 1/51.		**3WL9111-0BB15-0AA0**		1	1 unit	1CA
	Note						
	Not possible in combination with "Locking device to prevent movement of the withdrawable circuit breakers in disconnected position" (order codes "R81", "R85" or "R86").						

1) Padlock not included in the scope of supply.
2) Locks, cylinders and keys must be ordered from the manufacturer.

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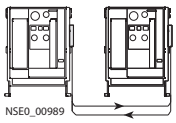
Accessories and spare parts

	Designation			SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Interlocks									
 3WL9111-0BB21-0AA0	**Mutual mechanical interlocking** With Bowden wire 2000 mm (one required for each circuit breaker)								
	Type	When ordered separately	Spare part for						
	Fixed-mounted circuit breakers	--	Option **S55,** see "-Z" + order code, page 1/50.		**3WL9111-0BB21-0AA0**		1	1 unit	1CA
	Module for withdrawable circuit breakers with guide frame	--	Option **R55,** see "-Z" + order code, page 1/50.		**3WL9111-0BB24-0AA0**		1	1 unit	1CA
	Module for guide frame	✓	Option **R56,** see "-Z" + order code, page 1/50.		**3WL9111-0BB22-0AA0**		1	1 unit	1CA
	Module for withdrawable circuit breaker	✓	Option **R57,** see "-Z" + order code, page 1/50.		**3WL9111-0BB23-0AA0**		1	1 unit	1CA
	Adapter for size III withdrawable circuit breaker	✓	--		**3WL9111-0BB30-0AA0**		1	1 unit	1CA
 3WL9112-8HA47-0AA0	**Couplings on the circuit breaker (with ring) for mutual interlocking** Can be used in all circuit breakers				**3WL9112-8AH47-0AA0**		1	1 unit	1CA
	Bowden wires								
	Versions								
	2000 mm				**3WL9111-0BB45-0AA0**		1	1 unit	1CA
	3000 mm				**3WL9111-0BB46-0AA0**		1	1 unit	1CA
	4500 mm				**3WL9111-0BB47-0AA0**		1	1 unit	1CA
Transfer control devices									
 3KC9000-8TL30 3KC9000-8EL10	**3KC ATC5300 and ATC3100 transfer control devices** For combination with two air circuit breakers/molded case circuit breakers for changeover according to IEC 60947-6-1. For more information, see chapter "Transfer Switching Equipment and Load Transfer Switches".								
Test devices									
	Manual tester Release 2 for Electronic Trip Units ETU15B to ETU76B For testing the Electronic Trip Unit functions of all 3WL ETUs (release 1 and release 2)				**3WL9111-0AT32-0AA0**		1	1 unit	1CA
	Function testers For testing the tripping characteristics for Electronic Trip Units ETU15B to ETU76B				**3WL9111-0AT44-0AA0**		1	1 unit	1CA
Capacitor storage devices									
	Capacitor storage devices • For shunt releases • Storage time 5 min				**3WL9111-0BA14-0AA0**		1	1 unit	1CA
	Rated control supply voltage/rated operational voltage								
	50/60 Hz V AC	V DC							
	220 ... 240	220 ... 250							
	Note								
	• Rated control supply voltage must match the rated control supply voltage of the shunt release • Suitable also for 3VL and 3WN circuit breakers								

Minimum order quantity (PS) or a multiple thereof can be ordered.

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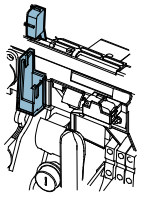
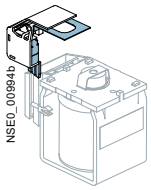
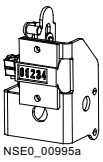
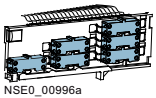
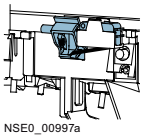
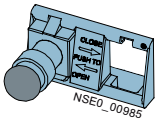
Indicators, control elements							
 NSE0_00993a 3WL9111-0AH01-0AA0	**Ready-to-close signaling switches (S20)** • 1 NO contact • Spare part for option **C22,** see "-Z" + order code, page 1/49.		**3WL9111-0AH01-0AA0**		1	1 unit	1CA
 NSE0_00994b 3WL9111-0AH02-0AA0	**Signaling switches[1)2)] (S22 or S23)** • 1st or 2nd auxiliary release • Spare part for option **C26** and **C27,** see "Z" + code, page 1/49.		**3WL9111-0AH02-0AA0**		1	1 unit	1CA
	1st tripped signaling switch[1)2)] (S24) • 1 CO contact • Spare part for option **K07,** see "-Z" + order code, page 1/49.		**3WL9111-0AH14-0AA0**		1	1 unit	1CA
	2nd tripped signaling switch[1)2)3)] (S25) • 1 NO contact • Spare part for option **K06,** see "-Z" + order code, page 1/49.		**3WL9111-0AH17-0AA0**		1	1 unit	1CA
 NSE0_00995a 3WL9111-0AH07-0AA0	**Operating cycles counter** • Mechanical[4)] • Spare part for option **C01,** see "-Z" + order code, page 1/49.		**3WL9111-0AH07-0AA0**		1	1 unit	1CA
	Stored-energy status signaling switches[1)2)] • 1 NO contact • Spare part for option **C20,** see "-Z" + order code, page 1/49.		**3WL9111-0AH08-0AA0**		1	1 unit	1CA
 NSE0_00996a 3WL9111-0AH12-0AA0	**Position signaling switches for guide frames** Spare part for option **R15** and **R16,** see "Z" + code, page 1/50.						
	Versions						
	• 1st block (3 CO contacts) • 2nd block (6 CO contacts)		**3WL9111-0AH11-0AA0** **3WL9111-0AH12-0AA0**		1 1	1 unit 1 unit	1CA 1CA
 NSE0_00997a 3WL9111-0AJ0.-0AA0	**Electrical ON buttons[1)5)] (S10)** • Button + wiring[2)] • For operator panel • Spare part for options **C11** and **C12**, see "Z" + order code, page 1/49.						
	Versions						
	• With sealing cap **C11** • With CES assembly kit **C12** • With IKON assembly kit		**3WL9111-0AJ02-0AA0** **3WL9111-0AJ03-0AA0** **3WL9111-0AJ05-0AA0**		1 1 1	1 unit 1 unit 1 unit	1CA 1CA 1CA
	Note						
	Possible only for circuit breakers with closing coil.						
	Motor shutdown switches[6)] (S12) • Mounting on operator panel • Spare part for option **S25,** see "-Z" + order code, page 1/49.		**3WL9111-0AJ06-0AA0**		1	1 unit	1CA
 NSE0_00985 3WL9111-0BA72-0AA0	**EMERGENCY-STOP pushbuttons** • Mushroom pushbutton instead of the mechanical OFF pushbutton • Spare part for option **S24,** see "-Z" + order code, page 1/49.		**3WL9111-0BA72-0AA0**		1	1 unit	1CA

1) Not possible with "communications interface" option, order code "F02" or "F12".

2) X7 auxiliary supply connector required for circuit breakers or guide frames. If this is not already available, please order additionally (see page 1/54 and page 1/66).

3) Can only be used in combination with 1st tripped signaling switch.

4) Only in conjunction with motorized operating mechanism.

5) Not possible with motor shutdown switch.

6) Not possible with electrical ON button.

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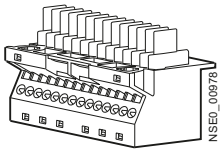
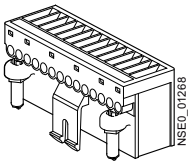
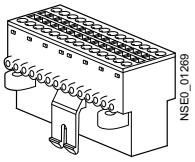
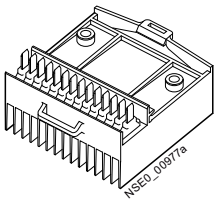
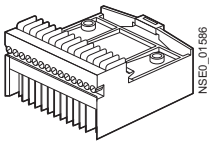
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Auxiliary conductor connections							
 3WL9111-0AB01-0AA0	**Male connectors for circuit breakers** ①		**3WL9111-0AB01-0AA0**		1	1 unit	1CA
	Extension for the 1000 V male connector versions Male connector must be ordered separately.		**3WL9111-0AB02-0AA0**		1	1 unit	1CA
	Male connectors and extension for 1000 V		**3WL9111-0AB10-0AA0**		1	1 unit	1EA
 3WL9111-0AB03-0AA0	**Auxiliary supply connectors for circuit breakers or guide frames** ② Versions						
	• Screw connection (SIGUT)		**3WL9111-0AB03-0AA0**		1	1 unit	1CA
 3WL9111-0AB04-0AA0	• Screwless connection method (tension spring)		**3WL9111-0AB04-0AA0**		1	1 unit	1CA
  3WL9111-0AB07-0AA0	**Coding kits** For fixed-mounted versions (X5 to X8) ③		**3WL9111-0AB07-0AA0**		1	1 unit	1CA
 3WL9111-0AB08-0AA0	**Sliding contact modules for guide frames** ④		**3WL9111-0AB08-0AA0**		1	1 unit	1CA
 3WL9111-0AB18-0AA0	**One-part sliding contact modules for guide frames** Screw connection (SIGUT) ⑤		**3WL9111-0AB18-0AA0**		1	1 unit	1CA
	Blanking blocks for circuit breakers		**3WL9111-0AB12-0AA0**		1	1 unit	1CA

For a complete auxiliary current connection you must order:

Fixed-mounted version: ① + ② + ③

Withdrawable version: ① + ④ + ② or ① + ⑤

Minimum order quantity (PS) or a multiple thereof can be ordered.

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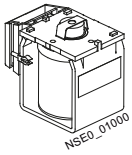
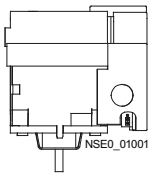
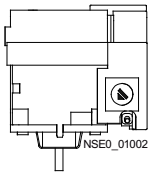
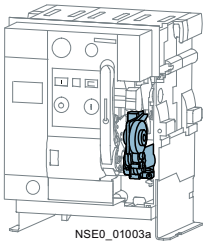
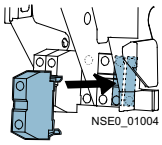
Auxiliary releases								
 3WL9111-0AD06-0AA0	**Closing coils/shunt releases**							
	Versions	Voltage						
	100% OP	24 V DC		**3WL9111-0AD01-0AA0**		1	1 unit	1CA
		30 V DC		**3WL9111-0AD02-0AA0**		1	1 unit	1CA
		48 V DC		**3WL9111-0AD03-0AA0**		1	1 unit	1CA
		60 V DC		**3WL9111-0AD04-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AD05-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AD06-0AA0**		1	1 unit	1CA
	5% OP[1]	24 V DC		**3WL9111-0AD11-0AA0**		1	1 unit	1CA
		48 V DC		**3WL9111-0AD12-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AD13-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AD14-0AA0**		1	1 unit	1CA
 3WL9111-0AE0.-0AA0	**Undervoltage releases**							
	Versions	Voltage						
	Instantaneous	24 V DC		**3WL9111-0AE01-0AA0**		1	1 unit	1CA
		30 V DC		**3WL9111-0AE02-0AA0**		1	1 unit	1CA
		48 V DC		**3WL9111-0AE03-0AA0**		1	1 unit	1CA
		60 V DC		**3WL9111-0AE07-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AE04-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AE05-0AA0**		1	1 unit	1CA
		380 ... 415 V AC		**3WL9111-0AE06-0AA0**		1	1 unit	1CA
 3WL9111-0AE1.-0AA0	Delayed	48 V DC		**3WL9111-0AE11-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AE12-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AE13-0AA0**		1	1 unit	1CA
		380 ... 415 V AC		**3WL9111-0AE14-0AA0**		1	1 unit	1CA
Operating mechanisms								
 3WL9111-0AF0.-0AA0	**Motorized operating mechanisms[2]**							
	Versions							
	• 24 ... 30 V DC			**3WL9111-0AF01-0AA0**		1	1 unit	1CA
	• 48 ... 60 V DC			**3WL9111-0AF02-0AA0**		1	1 unit	1CA
	• 110 ... 125 V DC/110 ... 127 V AC			**3WL9111-0AF03-0AA0**		1	1 unit	1CA
	• 220 ... 250 V DC/208 ... 240 V AC			**3WL9111-0AF04-0AA0**		1	1 unit	1CA
Auxiliary contacts								
 3WL9111-0AG03-0AA0	**Auxiliary switch blocks**							
	Versions							
	• 2 NO contacts + 2 NC contacts			**3WL9111-0AG01-0AA0**		1	1 unit	1CA
	• 2 NO contacts			**3WL9111-0AG02-0AA0**		1	1 unit	1CA
	• 1 NO contact + 1 NC contact			**3WL9111-0AG03-0AA0**		1	1 unit	1CA

[1] Overexcited, i.e. switching time 50 ms (standard > 80 ms).

[2] X5 auxiliary supply connector required for circuit breakers or guide frames. If this is not already available, please order additionally (see page 1/54 and page 1/57).

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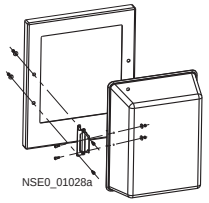
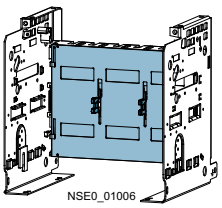
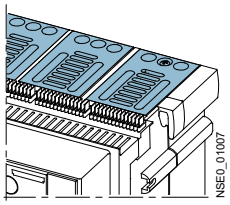
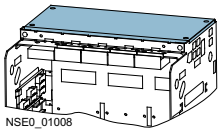
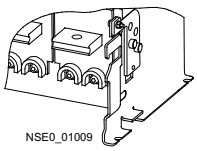
Accessories and spare parts

	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Door sealing frames, hoods, shutters							
	Door sealing frames Spare part for option **T40,** see "-Z" + order code, page 1/49.		**3WL9111-0AP01-0AA0**		1	1 unit	1CA
 3WL9111-0AP02-0AA0	**Protective covers** IP55 Notes • Cannot be used in conjunction with door sealing frames • Hood removable and can be opened on both sides		**3WL9111-0AP02-0AA0**		1	1 unit	1CA
 3WL9111-0AP0.-0AA0	**Shutters** Spare part for option **R21,** see "-Z" + order code, page 1/50.						
	Number of poles: 3-pole; Size: I		**3WL9111-0AP04-0AA0**		1	1 unit	1CA
	Size: II[1]		**3WL9111-0AP06-0AA0**		1	1 unit	1CA
	Size: II C		**3WL9111-0AP43-0AA0**		1	1 unit	1CA
	Size: III		**3WL9111-0AP07-0AA0**		1	1 unit	1CA
	Number of poles: 4-pole; Size: I		**3WL9111-0AP08-0AA0**		1	1 unit	1CA
	Size: II[1]		**3WL9111-0AP11-0AA0**		1	1 unit	1CA
	Size: II C		**3WL9111-0AP44-0AA0**		1	1 unit	1CA
	Size: III		**3WL9111-0AP12-0AA0**		1	1 unit	1CA
Arc chutes							
 3WL9111-0AS0.-0AA0	**Arc chutes**						
	Versions: 690 V; Size: I		**3WL9111-0AS01-0AA0**		1	1 unit	1CA
	Size: II[1]		**3WL9111-0AS02-0AA0**		1	1 unit	1CA
	Size: II C		**3WL9111-0AS10-0AA0**		1	1 unit	1CA
	Size: III		**3WL9111-0AS03-0AA0**		1	1 unit	1CA
	Versions: 1000 V/1150 V; Size: II		**3WL9111-0AS05-0AA0**		1	1 unit	1CA
	Size: III		**3WL9111-0AS06-0AA0**		1	1 unit	1CA
 3WL9111-0AS3.-0AA0	**Arc chute covers**[2] • Parts kit for guide frame • Spare part for option **R10,** see "-Z" + order code, page 1/50.						
	Number of poles: 3-pole; Size: I		**3WL9111-0AS32-0AA0**		1	1 unit	1CA
	Size: II		**3WL9111-0AS36-0AA0**		1	1 unit	1CA
	Size: III		**3WL9111-0AS38-0AA0**		1	1 unit	1CA
	Number of poles: 4-pole; Size: I		**3WL9111-0AS42-0AA0**		1	1 unit	1CA
	Size: II		**3WL9111-0AS44-0AA0**		1	1 unit	1CA
	Size: III		**3WL9111-0AS46-0AA0**		1	1 unit	1CA
Coding for withdrawable version							
 3WL9111-0AR12-0AA0 3WL9111-0AR13-0AA0	**Coding for withdrawable version** By customer, for 36 coding variants						
	Versions: • Sizes I and II		**3WL9111-0AR12-0AA0**		1	1 unit	1CA
	• Size III		**3WL9111-0AR13-0AA0**		1	1 unit	1CA

[1] Cannot be used for 3WL1 size II with very high breaking capacity C

[2] Not available for:
- 1000 V version (order code "A05")
- 1150 V version (order code "A15")
- DC version
- 4000 A size II
- Circuit breakers with very high breaking capacity C

Minimum order quantity (PS) or a multiple thereof can be ordered.

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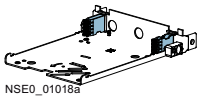
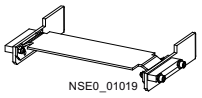
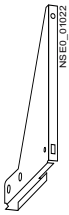
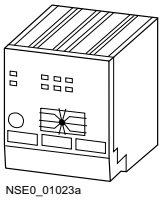
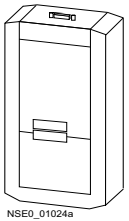
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Grounding connection							
 NSE0_01018a 3WL9111-0BA02-0AA0	**Grounding connection between the guide frame and the withdrawable circuit breaker** • For 30 kA ground short-circuit current[1] • Contacting modules for guide frame						
	Versions						
	• Size I and II[2] • Size III		**3WL9111-0BA01-0AA0** **3WL9111-0BA02-0AA0**		1 1	1 unit 1 unit	1CA 1CA
 NSE0_01019 3WL9111-0BA07-0AA0	**Contact modules for withdrawable circuit breakers**						
	Number of poles / Size						
	3-pole: I		**3WL9111-0BA05-0AA0**		1	1 unit	1CA
	3-pole: II[2]		**3WL9111-0BA06-0AA0**		1	1 unit	1CA
	3-pole: III		**3WL9111-0BA07-0AA0**		1	1 unit	1CA
	4-pole: I		**3WL9111-0BA08-0AA0**		1	1 unit	1CA
	4-pole: II[2]		**3WL9111-0BA04-0AA0**		1	1 unit	1CA
	4-pole: III		**3WL9111-0BA10-0AA0**		1	1 unit	1CA
Support brackets							
 NSE0_01022 3WL9111-0BB50-0AA0	**Support brackets** • For mounting fixed-mounted circuit breakers on vertical plane • Only for sizes I and II (1 set = 2 units)		**3WL9111-0BB50-0AA0**		1	1 unit	1CA
CubicleBUS modules[3][6]							
 NSE0_01023a 3WL9111-0AT23-0AA0	**Digital output modules with rotary coding switch, relay outputs**		**3WL9111-0AT26-0AA0**		1	1 unit	1CA
	Digital output modules, configurable, relay outputs		**3WL9111-0AT20-0AA0**		1	1 unit	1CA
	Digital input modules		**3WL9111-0AT27-0AA0**		1	1 unit	1CA
	Analog output modules		**3WL9111-0AT23-0AA0**		1	1 unit	1CA
	Zone Selective Interlocking modules		**3WL9111-0AT21-0AA0**		1	1 unit	1CA
Parameterization systems[6]							
 NSE0_01024a 3WL9111-0AT28-0AA0	**BDA *Plus***[4][5] • Parameterization, operation, monitoring and diagnostics of 3WL air circuit breakers using the local interface • Breaker Data Adapter, connection cable to the 3WL air circuit breaker and to the programming device (e.g. notebook) • Can be run with Internet Explorer with JAVA2 VM 1.4.0-01 and higher • With Ethernet interface for connection to Ethernet/Intranet/ Internet		**3WL9111-0AT33-0AA0**		1	1 unit	1CA
	Connection cables for BDA *Plus* • Connection cable for connection of BDA *Plus* to terminal X8 of the 3WL air circuit breaker • Required if neither COM15 nor COM16, nor other external **Cubicle**BUS modules are available • Length 2 m		**3WL9111-0BC21-0AA0**		1	1 unit	1CA
	powerconfig parameterization software • Parameterization, operation, monitoring and diagnostics of 3WL air circuit breakers using powerconfig software, see chapter "Software", "Configuring, Visualizing and Controlling with SENTRON". • powerconfig is available free of charge at http://support.automation.siemens.com/WW/view/en/63452759						

1) For 60 kA ground short-circuit current, order 2.

2) Cannot be used for size II with very high breaking capacity C and size II, 4000 A.

3) Each **Cubicle**BUS module is supplied with a 0.2 m pre-assembled cable to connect the modules with each other. A longer pre-assembled cable is required for connection to the circuit breaker.

4) A 24 V DC power supply unit is required.

5) Operation under Windows Vista and Windows 7 possible with restrictions.

6) All communication components, **Cubicle**BUS modules and metering functions are available for the ETU45B and ETU76B Electronic Trip Units.

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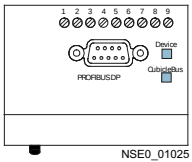
Accessories and spare parts

	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Accessories for communications[3]						
	Pre-assembled cables for CubicleBUS **modules**						
	Versions						
	• 0.5 m long, for connection to 3WL with COM15/COM16		**3WL9111-0BC04-0AA0**		1	1 unit	1CA
	• 1 m long, for connection to 3WL with COM15/COM16		**3WL9111-0BC02-0AA0**		1	1 unit	1CA
	• 2 m long, for connection to 3WL with COM15/COM16		**3WL9111-0BC03-0AA0**		1	1 unit	1CA
	• 2 m long, for connection to 3WL without COM15/COM16		**3WL9111-0BC05-0AA0**		1	1 unit	1CA
	SENTRON manual for communication solutions • Detailed description of the communication functions for circuit breakers. Installation, connection, commissioning, data transmission to the PLC. • Free download from: www.siemens.com/lowvoltage/manuals						
	Voltage transformers • 3-pole, for 3WL circuit breakers with metering function *Plus*[1] • 380 ... 690 V/100 V, class 0.5		**3WL9111-0BB68-0AA0**		1	1 unit	1CA
	Retrofitting and spare parts[3] [4]						
	PROFIBUS retrofit kits Retrofit kit for PROFIBUS communications including COM15, BSS and set of cables for all 3WL air circuit breakers with ETU45B and ETU76B Electronic Trip Units		**3WL9111-0AT12-0AA0**		1	1 unit	1CA
 3WL9111-0AT15-0AA0	**COM15 PROFIBUS modules** For ETU45B and ETU76B Electronic Trip Units		**3WL9111-0AT15-0AA0**		1	1 unit	1CA
	COM16 MODBUS modules For ETU45B and ETU76B Electronic Trip Units		**3WL9111-0AT17-0AA0**		1	1 unit	1CA
	MODBUS IEC retrofit kits Retrofit kit for MODBUS communications including COM16, BSS and set of cables for all 3WL air circuit breakers with ETU45B and ETU76B Electronic Trip Units		**3WL9111-0AT18-0AA0**		1	1 unit	1CA
	Additional parts for retrofitting the COM15/COM16 communication modules NEW In withdrawable version 3WL circuit breakers with Z options: • A05 (1000 V AC) or • A15 (1150 V AC) or • A16 (690 V + 20%)						
	Size						
	I		**3WL9111-0AT62-0AA0**		1	1 unit	1CA
	II/III		**3WL9111-0AT63-0AA0**		1	1 unit	1CA
	Breaker Status Sensor (BSS) For ETU45B and ETU76B Electronic Trip Units		**3WL9111-0AT16-0AA0**		1	1 unit	1CA
	Metering function *Plus*[2] • For ETUs Release 2 • Voltage transformer required		**3WL9111-0AT04-0AA0**		1	1 unit	1CA
	Transformers (without iron core), Rogowski coil only NEW Used in converter applications with high harmonics; can only be used with ETU45B or ETU76B • External 24 V DC supply required • Undervoltage release required Comprises: • Transformer • Warning signs • Manual						
	Number of poles / Size						
	3-pole / I		**3WL9111-0AA42-0AA0**		1	1 unit	1CA
	3-pole / II		**3WL9111-0AA43-0AA0**		1	1 unit	1CA
	3-pole / III		**3WL9111-0AA44-0AA0**		1	1 unit	1CA
	4-pole / I		**3WL9111-0AA45-0AA0**		1	1 unit	1CA
	4-pole / II		**3WL9111-0AA46-0AA0**		1	1 unit	1CA
	4-pole / III		**3WL9111-0AA47-0AA0**		1	1 unit	1CA

1) Is required for operation of the metering function *Plus*.

2) A measuring accuracy of 3% is reached if retrofitted.

3) All communication components, **Cubicle**BUS modules and metering functions are available for the ETU45B and ETU76B Electronic Trip Units.

4) For retrofitting the COM15 or COM16 communication modules in withdrawable 3WL circuit breakers with Z options A05 (1000 V AC), A15 (1150 V AC) or A16 (690 V + 20%), the following additional assembly kits are required: 3WL9111-0AT62-0AA0 for circuit breakers size I or 3WL9111-0AT63-0AA0 for circuit breakers size II/III

Minimum order quantity (PS) or a multiple thereof can be ordered.

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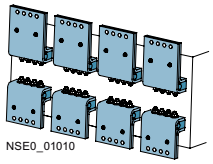
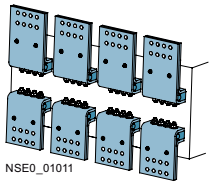
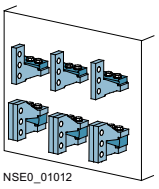
	Designation		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main conductor connections, fixed-mounted versions (essential accessories)								
	Specified for each connection							
3WL9111-0AL06-0AA0	**Front-accessible main connections, single hole at top**[1]							
 NSE0_01010	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AL01-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AL02-0AA0**		1	1 unit	1CA
	II[4]	Up to 2000 A		**3WL9111-0AL03-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL04-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL05-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL06-0AA0**		1	1 unit	1CA
3WL9111-0AL56-0AA0	**Front-accessible main connections, single hole at bottom**[1]							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AL51-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AL52-0AA0**		1	1 unit	1CA
	II[4]	Up to 2000 A		**3WL9111-0AL53-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL54-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL55-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL56-0AA0**		1	1 unit	1CA
3WL9111-0AL14-0AA0	**Front-accessible main connections according to DIN 43673, double hole at top**							
 NSE0_01011	Size	Rated current I_n						
	I	Up to 1000 A[1]		**3WL9111-0AL07-0AA0**		1	1 unit	1CA
		1250 A to 2000 A		**3WL9111-0AL08-0AA0**		1	1 unit	1CA
	II[4]	Up to 2000 A		**3WL9111-0AL11-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL12-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL13-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL14-0AA0**		1	1 unit	1CA
3WL9111-0AL64-0AA0	**Front-accessible main connections according to DIN 43673, double hole at bottom**							
	Size	Rated current I_n						
	I	Up to 1000 A[1]		**3WL9111-0AL57-0AA0**		1	1 unit	1CA
		1250 A to 2000 A		**3WL9111-0AL58-0AA0**		1	1 unit	1CA
	II[4]	Up to 2000 A		**3WL9111-0AL61-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL62-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL63-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL64-0AA0**		1	1 unit	1CA
	Rear vertical main connections							
 NSE0_01012	Size	Rated current I_n						
3WL9111-0AM03-0AA0	I[2]	Up to 2000 A		**3WL9111-0AM01-0AA0**		1	1 unit	1CA
	II[3]	Up to 3200 A		**3WL9111-0AM02-0AA0**		1	1 unit	1CA
	III	Up to 6300 A		**3WL9111-0AM03-0AA0**		1	1 unit	1CA

1) Not for 3WL1 size I with high breaking capacity H.

2) In the case of vertical connection size I with breaking capacity N and S, up to 1000 A one 3WL9111–0AM01-0AA0 vertical connection is required, up to 2000 A or with breaking capacity H two 3WL9111-0AM01-0AA0 vertical connections are required.

3) In the case of vertical connection size II, up to 2500 A one 3WL9111–0AM02-0AA0 vertical connection is required, up to 3200 A two 3WL9111-0AM02-0AA0 vertical connections are required.

4) Not for circuit breakers with very high breaking capacity C.

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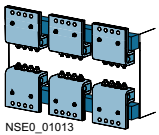
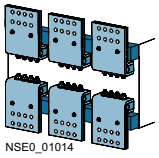
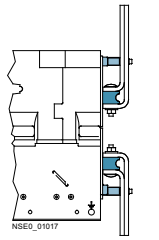
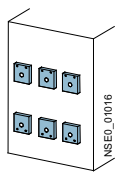
Accessories and spare parts

	Designation		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main conductor connections, withdrawable versions (essential accessories)								
	Specified for each connection							
 NSE0_01013 3WL9111-0AN06-0AA0	**Front-accessible main connections, single hole at top or at bottom[1) 2)]**							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AN01-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AN02-0AA0**		1	1 unit	1CA
	II[3)]	Up to 2000 A		**3WL9111-0AN03-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN04-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN05-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AN06-0AA0**		1	1 unit	1CA
 NSE0_01014 3WL9111-0AN14-0AA0	**Main connections accessible from front according to DIN 43673, double hole at top or at bottom[1)]**							
	Size	Rated current I_n						
	I	Up to 1000 A[2)]		**3WL9111-0AN07-0AA0**		1	1 unit	1CA
		1250 A to 2000 A		**3WL9111-0AN08-0AA0**		1	1 unit	1CA
	II[3)]	Up to 2000 A		**3WL9111-0AN11-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN12-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN13-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AN14-0AA0**		1	1 unit	1CA
 NSE0_01017 3WL9111-0AN41-0AA0	**Supports for front and DIN connecting bars**							
	Number of poles	Size						
	3-pole for 3 bars	I		**3WL9111-0AN41-0AA0**		1	1 unit	1CA
		II		**3WL9111-0AN42-0AA0**		1	1 unit	1CA
		III		**3WL9111-0AN43-0AA0**		1	1 unit	1CA
	4-pole for 4 bars	I		**3WL9111-0AN44-0AA0**		1	1 unit	1CA
		II		**3WL9111-0AN45-0AA0**		1	1 unit	1CA
		III		**3WL9111-0AN46-0AA0**		1	1 unit	1CA
 NSE0_01015 3WL9111-0AN23-0AA0	**Rear vertical main connections**							
	Size	Rated current I_n						
	I	Up to 1000 A[2)]		**3WL9111-0AN15-0AA0**		1	1 unit	1CA
		1250 A to 2000 A		**3WL9111-0AN16-0AA0**		1	1 unit	1CA
	II	Up to 2000 A[3)]		**3WL9111-0AN17-0AA0**		1	1 unit	1CA
		Up to 2500 A[3)]		**3WL9111-0AN18-0AA0**		1	1 unit	1CA
		Up to 3200 A[3)]		**3WL9111-0AN21-0AA0**		1	1 unit	1CA
		1600 ... 3200 A[4)]		**3WL9111-0AN38-0AA0**		1	1 unit	1CA
	III	Up to 5000 A		**3WL9111-0AN22-0AA0**		1	1 unit	1CA
		Up to 6300 A, 3 busbar connection pieces for 3-pole circuit breakers		**3WL9111-0AN23-0AA0**		1	1 unit	1CA
		Up to 6300 A, at top, 4 busbar connection pieces for 4-pole circuit breakers		**3WL9111-0AN20-0AA0**		1	1 unit	1CA
		Up to 6300 A, at bottom, 4 busbar connection pieces for 4-pole circuit breakers		**3WL9111-0AN10-0AA0**		1	1 unit	1CA
	Rear horizontal main connections							
	Size	Rated current I_n						
	I	Up to 1000 A[2)]		**3WL9111-0AN32-0AA0**		1	1 unit	1CA
		1250 A to 2000 A		**3WL9111-0AN33-0AA0**		1	1 unit	1CA
	II	Up to 2000 A[3)]		**3WL9111-0AN34-0AA0**		1	1 unit	1CA
		Up to 2500 A[3)]		**3WL9111-0AN35-0AA0**		1	1 unit	1CA
		Up to 3200 A[3)]		**3WL9111-0AN36-0AA0**		1	1 unit	1CA
		1600 ... 3200 A[4)]		**3WL9111-0AN47-0AA0**		1	1 unit	1CA
	III	Up to 5000 A		**3WL9111-0AN37-0AA0**		1	1 unit	1CA
 NSE0_01016 3WL9111-0AN24-0AA0	**Connecting flange**							
	Size	Rated current I_n						
	I	Up to 1000 A[2)]		**3WL9111-0AN24-0AA0**		1	1 unit	1CA
		1250 A to 2000 A		**3WL9111-0AN25-0AA0**		1	1 unit	1CA
	II[3)]	Up to 2000 A		**3WL9111-0AN26-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN27-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN28-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AN31-0AA0**		1	1 unit	1CA

1) When using front-accessible mains connections (withdrawable circuit breakers) supports are required.

2) Not for 3WL1 size I with high breaking capacity H.

3) Not for circuit breakers with very high breaking capacity C.

4) Only for circuit breakers with very high breaking capacity C.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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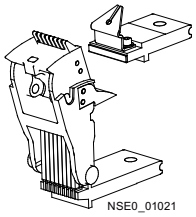
	Designation		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Conversion sets								
	Conversion set for converting fixed-mounted circuit breakers into withdrawable circuit breakers[1] Guide frames and sliding contact modules must be ordered separately.							
	Number of poles	Size						
	3-pole	I		**3WL9111-0BC11-0AA0**		1	1 unit	1CA
		II		**3WL9111-0BC12-0AA0**		1	1 unit	1CA
		III		**3WL9111-0BC13-0AA0**		1	1 unit	1CA
	4-pole	I		**3WL9111-0BC14-0AA0**		1	1 unit	1CA
		II		**3WL9111-0BC15-0AA0**		1	1 unit	1CA
		III		**3WL9111-0BC16-0AA0**		1	1 unit	1CA
Main contact elements								
 NSE0_01021	**Main contact elements**[2)4)]							
	Size	$I_{n\,max}$						
	I	Up to 1600 A		**3WL9111-0AM90 L1Y**[3)]		1	1 unit	1CA
	II	Up to 2500 A		**3WL9111-0AM91 L1Y**[3)]		1	1 unit	1CA
	II	Up to 4000 A		**3WL9111-0AM92 L1Y**[3)]		1	1 unit	1CA
	III	Up to 6300 A		**3WL9111-0AM93 L1Y**[3)]		1	1 unit	1CA
	Notes							
	• The circuit breaker ID No. must be specified when ordering • Specified for each connection (depending on the number of poles on the circuit breaker, order 3 or 4 units) • Article No. is automatically adapted to the circuit breaker ID No.							

1) Conversion from fixed-mounted to withdrawable is not possible for 3WL1 circuit breakers with very high breaking capacity C.

2) Not for circuit breakers with very high breaking capacity C.

3) Please specify the circuit breaker ID No. in plain text when ordering.

4) Replacement of the main contact elements for 3WL1 circuit breakers with very high breaking capacity C is only possible at the factory.

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Options

Structure of the article number

3WL1 2 2 0 – 4 N G 3 1 – 1 F A 2

Example

5th position:	Size	Size II
6th and 7th positions:	Max. rated circuit breaker current $I_{n\,max}$	$I_{n\,max}$ = 2000 A
8th position:	Breaking capacity class	High breaking capacity "H": 100 kA
9th position:	Electronic Trip Units	ETU76B with graphics display ...
10th position:	Electronic Trip Unit supplement	... with ground-fault protection
11th position:	Number of poles	Three-pole
12th position:	Installation type	Fixed-mounted, main connections on rear, vertical
13th position:	Operating mechanisms	Manual operating mechanism with mechanical closing
14th position:	1st auxiliary release	Shunt release 50/60 Hz 110 V AC
15th position:	2nd auxiliary release	Without 2nd auxiliary release
16th position:	Auxiliary switches	2 NO contacts + 2 NC contacts

An important prerequisite for electronic order processing is that article numbers must be structured according to standardized criteria.

They are used as an unambiguous means of communication for various purposes:

- Offer processing
  Selection and configuration
- Order processing
  Orders
  Order confirmation
  Processing of products for storage
  Order processing in supply locations
  Supply and dispatch
- Reporting and planning
- Service and warranty

The standardized structure ensures that only one article number has to be administered for one device.

This saves time and effort during planning, configuring, ordering and in stock keeping, and consequently above all it saves costs.

The example opposite explains the various positions within an article number.

Accessories: With first order (components are already mounted)

Example

3WL1 2 1 6 – 4 J G 3 1 – 1 F A 3 – Z F 0 2

"–Z" with order code	Communications interface "Standard" + Breaker Status Sensor (BSS) + communication module COM15 for connection to PROFIBUS DP **Z F 0 2**

Additional accessory components can be ordered ready-mounted.

These supplements are identified by **"–Z"**.

Even with additional components, one article number is sufficient.

Accessories: For retrofitting (components for subsequent fitting)

Example

3WL9 1 1 1 – 0 B A 2 1 – 0 A A 0

Interlocking set for mechanical ON/OFF without lock

Additional accessories which are not intended to be ready-mounted in the factory, such as spare parts for storage, can also be ordered separately from the circuit breaker.

Accessories for retrofitting are identified by the Article No. stem 3WL9.

Documentation

Operating manual	German/English	Article No.	**3ZX18 12-0WL00-0AN2**	Delivery time class C
Complete set	French/Italian	Article No.	**3ZX18 12-0WL00-0AJ2**	On request
	Spanish/Portuguese	Article No.	**3ZX18 12-0WL00-0AL2**	On request
PROFIBUS	German	Article No.	**A5E0151347**	
Communication manual	English	Article No.	**A5E0151353**	
MODBUS	German	Article No.	**3ZX10 12-0WL10-1AB1**	
Communication manual	English	Article No.	**3ZX10 12-0WL10-1AC1**	

Free download of documentation from
www.siemens.com/lowvoltage/manuals

More information

Up-to-date information on the Internet at:
www.siemens.com/sentron

Minimum order quantity (PS) or a multiple thereof can be ordered.

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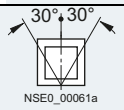
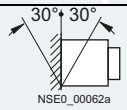
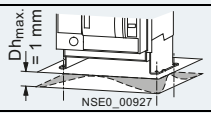
Technical specifications

Size			**I**	**II**		
Type			**3WL11 20**	**3WL12 10**	**3WL12 20**	**3WL12 40**
Rated current I_n at 40 °C Main conductor		A	2000	... 1000	2000	4000
Rated operational voltage U_e (for 1000 V version, see "-Z" option and order code "A05", page 1/48)		V DC	1000	... 600/1000	... 600/1000	... 600/1000
Rated insulation voltage U_i		V DC	1000	1000	1000	1000
Rated impulse withstand voltage U_{imp}						
• Main conducting paths		kV	12	12	12	12
• Auxiliary circuits		kV	4	4	4	4
• Control circuits		kV	2.5	2.5	2.5	2.5
Isolating function acc. to EN 60947-2			Yes	Yes	Yes	Yes
Utilization category				B		
Permissible ambient temperature						
• Operation		°C	–25/+70	–25/+70	–25/+70	–25/+70
• Storage		°C	–40/+70	–40/+70	–40/+70	–40/+70
Permissible load	Up to 40 °C	A	2000	1000	2000	4000
At rear horizontal main con-	Up to 55 °C	A	1910	1000	2000	3640
nections	Up to 60 °C	A	1850	1000	2000	3500
(Cu painted black)	Up to 70 °C	A	1710	1000	1950	3250
Power loss at I_n for symmetrical loads Withdrawable circuit breakers		W	150	280	770	1640
Switching times						
• Make time		ms	35	35	35	35
• Opening time		ms	38	34	34	34
• Electrical make time (through activation solenoid)[1]		ms	100	100	100	100
• Electrical opening time (through shunt release)		ms	73	73	73	73
• Electrical opening time (instantaneous undervoltage release)		ms	73	73	73	73
Service life[3]						
• Mechanical (without maintenance)		Operating cycles	10000	10000	10000	10000
• Mechanical (with maintenance)[2]		Operating cycles	15000	15000	15000	15000
• Electrical (without maintenance)		Operating cycles	1000	6000	6000	4000
• 1000 V version		Operating cycles	1000	1000	1000	1000
• Electrical (with maintenance)[2]		Operating cycles	2000	15000	15000	15000
Switching frequency						
• 600 V version		1/h	--	60	60	60
• 1000 V version		1/h	20	20	20	20
Mounting position				 NSE0_00061a and/ or  NSE0_00062a  NSE0_00927		
Degree of protection				IP20 without cabinet door, IP41 with door sealing frame, IP55 with cover		
Auxiliary conductors (Cu)	Standard connection = strain-relief clamp					
Max. number	• Without end sleeve			2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16); 1 × 2.5 mm² (AWG 14)		
Auxiliary conductors ×	• With end sleeve acc. to DIN 46228 Part 2			1 × 0.5 mm² (AWG 20) ... 1 × 1.5 mm² (AWG 16)		
cross-section	• With twin end sleeve			2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)		
(solid/stranded)	Optional connection = tension spring					
	• Without end sleeve			2 × 0.5 mm² (AWG 20) ... 2 × 2.5 mm² (AWG 14)		
	• With end sleeve acc. to DIN 46228 Part 2			2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)		
Weights 3-pole	• Fixed-mounted circuit breakers	kg	43	56	56	64
	• Withdrawable circuit breakers	kg	--	60	60	68
	• Guide frames	kg	--	31	31	45
4-pole	• Fixed-mounted circuit breakers	kg	50	67	67	77
	• Withdrawable circuit breakers	kg	--	72	72	82
	• Guide frames	kg	--	37	37	54

1) Make time through activation solenoid for synchronization purposes (short-time excited) 50 ms.

2) Maintenance means: Replace main contact elements and arc chutes (see Operating Manual).

3) Further technical specifications on request.

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General data

Breaking capacity

Size			I (DC)	II (DC)
Type			**3WL11**	**3WL12**
Breaking capacity			**DC**	**DC**
Short-circuit breaking capacity				
Up to 220 V DC	I_{cc}	kA	20	35
Up to 300 V DC	I_{cc}	kA	20	30
Up to 600 V DC	I_{cc}	kA	20	25
Up to 1000 V DC	I_{cc}	kA	20	20
Rated short-time withstand current I_{cw}				
0.5 s		kA	--	--
1 s		kA	20	35[1]/30[2]/25[3]/20[4]
2 s		kA	--	--
3 s		kA	--	--

(N) Circuit breakers with ECO breaking capacity N
(S) Circuit breakers with standard breaking capacity S
(H) Circuit breakers with high breaking capacity H
(C) Circuit breakers with very high breaking capacity C
(DC) Non-automatic air circuit breakers with DC breaking capacity

These breaking capacities are indicated in the corresponding tables by the symbols shown on orange backgrounds.

Note:

For further technical specifications, see the configuration manual "Air Circuit Breakers". Free download from: www.siemens.com/lowvoltage/manuals

Abbreviations* (functions)	English long text	Explanation
L	Long Time Delay	Overload protection
S	Short Time Delay	Short-circuit protection (short-time delayed)
I	Instantaneous	Short-circuit protection (instantaneous)
N	Neutral Protection	Neutral conductor protection
G	Ground Fault	Ground-fault protection

* Designations according to IEC 60947-2, Annex K.

1) At U_e = 220 V DC
2) At U_e = 300 V DC
3) At U_e = 600 V DC
4) At U_e = 1000 V DC

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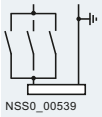
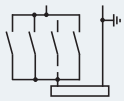
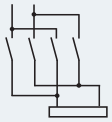
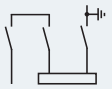
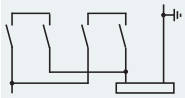
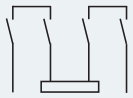
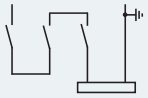
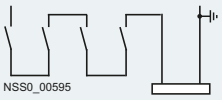
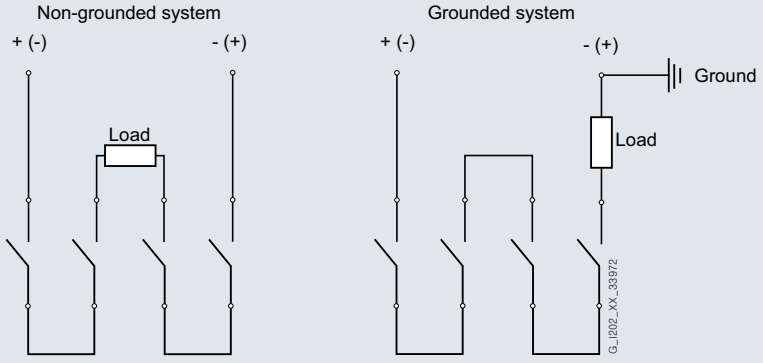
Application examples size II – non-automatic air circuit breakers for DC

Rated operational voltage	**Required series-connected contact gaps at rated voltage**	**For 3-pole non-automatic air circuit breakers** (operational currents up to 4000 A/ conducting path)		**For 4-pole non-automatic air circuit breakers** (operational currents up to 4000 A/conducting path)	
Up to 300 V + 10%		 NSS0_00539 1-pole, 2 parallel conducting paths, only with grounded system	 2-pole	 1-pole, 3 parallel conducting paths, only with grounded system	 2-pole 2 parallel conducting paths
Over 300 V + 10% Up to 600 V + 10%		 2-pole, only with grounded system		 1-pole, 2 parallel conducting paths, only with grounded system	 2-pole
Over 600 V + 10% Up to 1000 V + 10% (version for 1000 V required, order with "-Z" and code A05)		 1-pole, only with grounded system		 2-pole, only with grounded system	 NSS0_00595 1-pole, only with grounded system

Connection to the circuit breakers is independent of the direction and polarity; the circuit diagrams can be converted analogously.
If the parallel or series connections are established directly to the connecting bars, for thermal reasons the circuit breakers may only be subjected continuously to 80% of the permissible operational current. If the parallel or series connection is made at a distance of 1 m from the connecting bars, the circuit breaker can be used at full operational current load.
⊣⊪ grounded system
□ load

Application examples size I – non-automatic air circuit breakers for DC

Permissible interconnections
Circuit diagrams for size I
1000 V DC non-automatic air circuit breakers



More information

Up-to-date information on the Internet at: www.siemens.com/sentron

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Selection and ordering data

For general data, see page 1/8.

Size	Max. rated circuit breaker current $I_{n\,max}$	SD	3-pole non-automatic air circuit breakers (DC)	PU (UNIT, SET, M)	PS	PG
	A	d	Article No.: www.siemens.com/product?Article No. — Price per PU			
Horizontal main circuit connection						
II	1000		**3WL1210-8□□32-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□32-□□□□**	1	1 unit	1CA
	4000[1]		**3WL1240-8□□32-□□□□**	1	1 unit	1CA
Vertical main circuit connection						
II	1000		**3WL1210-8□□31-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□31-□□□□**	1	1 unit	1CA
	4000[1]		**3WL1240-8□□31-□□□□**	1	1 unit	1CA
Front main circuit connection, single hole						
II	1000		**3WL1210-8□□33-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□33-□□□□**	1	1 unit	1CA
Front main circuit connection, double hole						
II	1000		**3WL1210-8□□34-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□34-□□□□**	1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Operating mechanisms	Manual operating mechanism with mechanical closing		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

Size	Max. rated circuit breaker current $I_{n\,max}$	SD	4-pole non-automatic air circuit breakers (DC)	PU (UNIT, SET, M)	PS	PG
	A	d	Article No.: www.siemens.com/product?Article No. — Price per PU			
Horizontal main circuit connection						
I[3]	2000		**3WL1120-8□□42-□□□□**	1	1 unit	1CA
II	1000		**3WL1210-8□□42-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□42-□□□□**	1	1 unit	1CA
	4000[1]		**3WL1240-8□□42-□□□□**	1	1 unit	1CA
Vertical main circuit connection						
I[3]	2000		**3WL1120-8□□41-□□□□**	1	1 unit	1CA
II	1000		**3WL1210-8□□41-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□41-□□□□**	1	1 unit	1CA
	4000[1]		**3WL1240-8□□41-□□□□**	1	1 unit	1CA
Front main circuit connection, single hole						
II	1000		**3WL1210-8□□43-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□43-□□□□**	1	1 unit	1CA
Front main circuit connection, double hole						
II	1000		**3WL1210-8□□44-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□44-□□□□**	1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Operating mechanisms	Manual operating mechanism with mechanical closing		**1AA2**	**None**
	For further Article No. supplements, see page 1/47			

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

3WL12.0-8....-....-Z
□ □ □

Condition	Size	Rated current I_n				Additional price 3-pole	Additional price 4-pole
Rated voltage 1000 V DC	II	Up to 2000 A	**A**	**0**	**5**	✓	✓
		Up to 4000 A	**A**	**0**	**5**	✓	✓

Note

For voltages over 600 V, use the version for 1000 V DC rated voltage for size II: Order with "-Z" and order code "A05".
All other accessory parts must be ordered by specifying "-Z" and the corresponding order code, see "3WL1 Air Circuit Breakers/Non-Automatic Air Circuit Breakers up to 6300 A (AC), IEC", "Options", from page 1/48.
An external overload and short-circuit protection device is available from the company "mat" for the 3WL1 non-automatic air circuit breakers. Available only directly from the company "mat" – Maschinen- und Anlagentechnik (for the address, see page 1/80).

1) Provisions to dissipate heat must be made on the line side.

2) For permissible rated short-time current I_{cw} and short-circuit breaking capacity I_{cc} for non-automatic air circuit breakers, see page 1/13.

3) 3WL1120-8 DC non-automatic air circuit breakers are designed for a rated voltage of 1000 V DC.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	SD	3-pole non-automatic air circuit breakers (DC)	PU (UNIT, SET, M)	PS	PG
	A	d	Article No. www.siemens.com/product?Article No.	Price per PU		
Without guide frames (for guide frames, see page 1/81)						
II	1000		**3WL1210-8□□35-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□35-□□□□**	1	1 unit	1CA
	4000 [1]		**3WL1240-8□□35-□□□□**	1	1 unit	1CA
With guide frames, horizontal main circuit connection						
II	1000		**3WL1210-8□□36-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□36-□□□□**	1	1 unit	1CA
	4000 [1]		**3WL1240-8□□36-□□□□**	1	1 unit	1CA
With guide frames, vertical main circuit connection						
II	1000		**3WL1210-8□□37-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□37-□□□□**	1	1 unit	1CA
	4000 [1]		**3WL1240-8□□37-□□□□**	1	1 unit	1CA
With guide frames, connecting flanges						
II	1000		**3WL1210-8□□38-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□38-□□□□**	1	1 unit	1CA
	4000 [1]		**3WL1240-8□□38-□□□□**	1	1 unit	1CA

Options			Additional price
Non-automatic air circuit breakers [2]	Without Electronic Trip Units	**AA**	**None**
Operating mechanisms	Manual operating mechanism with mechanical closing	**1AA2**	**None**
	For further Article No. supplements, see page 1/47		

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

3WL12.0-8..3.-....-Z
□ □ □

Condition	Size	Rated current I_n				Additional price 3-pole
Rated voltage 1000 V DC	II [4]	Up to 2000 A	**A**	**0**	**5**	✓
		Up to 4000 A	**A**	**0**	**5**	✓
Tinned version of the customer's connections on the guide frame [3] Only for circuit breakers in withdrawable version with horizontal connection or flange connection. The normal delivery time increases to 15 work days.	II		**A**	**0**	**8**	✓

Note

For voltages over 600 V use the version for 1000 V DC rated voltage: Order with "-Z" and order code "A05".

All other accessory parts must be ordered by specifying "-Z" and the corresponding order code, see "3WL1 Air Circuit Breakers/Non-Automatic Air Circuit Breakers up to 6300 A (AC), IEC", "Options", from page 1/48.

An external overload and short-circuit protection device is available from the company "mat" for the 3WL1 non-automatic air circuit breakers.

Available only directly from the company "mat" – Maschinen- und Anlagentechnik (for the address, see page 1/80).

1) Provisions to dissipate heat must be made on the line side.

2) For permissible rated short-time current I_{cw} and short-circuit breaking capacity I_{cc} for non-automatic air circuit breakers, see page 1/13.

3) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

4) When ordering withdrawable circuit breaker and guide frame separately, specify order code "A05" for withdrawable circuit breaker and guide frame.

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Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	SD	4-pole non-automatic air circuit breakers (DC)	PU (UNIT, SET, M)	PS	PG
	A	d	Article No. www.siemens.com/product?Article No. / Price per PU			
Without guide frames (for guide frames, see page 1/81)						
II	1000		**3WL1210-8□□45-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□45-□□□□**	1	1 unit	1CA
	4000 1)		**3WL1240-8□□45-□□□□**	1	1 unit	1CA
With guide frames, horizontal main circuit connection						
II	1000		**3WL1210-8□□46-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□46-□□□□**	1	1 unit	1CA
	4000 1)		**3WL1240-8□□46-□□□□**	1	1 unit	1CA
With guide frames, vertical main circuit connection						
II	1000		**3WL1210-8□□47-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□47-□□□□**	1	1 unit	1CA
	4000 1)		**3WL1240-8□□47-□□□□**	1	1 unit	1CA
With guide frames, connecting flanges						
II	1000		**3WL1210-8□□48-□□□□**	1	1 unit	1CA
	2000		**3WL1220-8□□48-□□□□**	1	1 unit	1CA
	4000 1)		**3WL1240-8□□48-□□□□**	1	1 unit	1CA

Options			Additional price
Non-automatic air circuit breakers 2)	Without Electronic Trip Units	**AA**	**None**
Operating mechanisms	Manual operating mechanism with mechanical closing	**1AA2**	**None**
	For further Article No. supplements, see page 1/47		

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).			**3WL12.0-8..4.-....-Z** □ □ □	Additional price 4-pole
Condition	Size	Rated current I_n		
Rated voltage 1000 V DC	II 4)	Up to 2000 A	**A 0 5**	✓
		Up to 4000 A	**A 0 5**	✓
Tinned version of the customer's connections on the guide frame 3) Only for circuit breakers in withdrawable version with horizontal connection or flange connection. The normal delivery time increases to 15 work days.	II		**A 0 8**	✓

Note

For voltages over 600 V use the version for 1000 V DC rated voltage: Order with "-Z" and order code "A05".

All other accessory parts must be ordered by specifying "-Z" and the corresponding order code, see "3WL1 Air Circuit Breakers/Non-Automatic Air Circuit Breakers up to 6300 A (AC), IEC", "Options", from page 1/48.

An external overload and short-circuit protection device is available from the company "mat" for the 3WL1 non-automatic air circuit breakers.

Available only directly from the company "mat" – Maschinen- und Anlagentechnik 5).

1) Provisions to dissipate heat must be made on the line side.

2) For permissible rated short-time current I_{cw} and short-circuit breaking capacity I_{cc} for non-automatic air circuit breakers, see page 1/13.

3) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

4) When ordering withdrawable circuit breaker and guide frame separately, specify order code "A05" for withdrawable circuit breaker and guide frame.

5) **mat – Maschinen- und Anlagentechnik**
Dr. Becker GmbH
Rudolf-Diesel-Strasse 22
22941 Bargteheide, Germany
Tel.: +49 (45 32) 20-2101
Fax: +49 (45 32) 20-2121
Email: info@m-a-t.de
Internet: www.m-a-t.de

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Guide frames for DC non-automatic air circuit breakers

Size	Max. rated circuit breaker current $I_{n\,max}$	SD	Guide frames for 3-pole non-automatic air circuit breakers Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
Front main circuit connection, single hole							
II	2000		**3WL9212-3DA□□-□□A1**		1	1 unit	1CA
Front main circuit connection, double hole							
II	2000		**3WL9212-3DB□□-□□A1**		1	1 unit	1CA
Horizontal main circuit connection							
II	2000		**3WL9212-3DC□□-□□A1**		1	1 unit	1CA
	4000		**3WL9212-6DC□□-□□A1**		1	1 unit	1CA
Vertical main circuit connection							
II	2000		**3WL9212-3DD□□-□□A1**		1	1 unit	1CA
	4000		**3WL9212-6DD□□-□□A1**		1	1 unit	1CA
Main circuit connection connecting flanges							
II	2000		**3WL9212-3DE□□-□□A1**		1	1 unit	1CA
	4000		**3WL9212-6DE□□-□□A1**		1	1 unit	1CA

Options						Additional price 3-pole
Number of auxiliary supply connectors	None	**0**				**None**
	1 connector	**1**				✓
	2 connectors	**2**				✓
	3 connectors	**3**				✓
	4 connectors	**4**				✓
Note						
For required number of auxiliary supply connectors, see table on page 1/54.						
Type of auxiliary circuit connections	None[2]		**0**			**None**
	With screw connection (SIGUT, standard)		**1**			✓
	With screwless connection method (tension spring)		**2**			✓
Position signaling switches	None			**0**		**None**
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO			**1**		✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO			**2**		✓
Shutters	None				**A**	**None**
	With shutter, 2-part, lockable				**B**	✓

	Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL9212-.....-..A1-Z** □ □ □	Additional price
Rated voltage 1000 V DC			
Size II		**A 0 5**	✓
Tinned version of the customer's connections on the guide frame[1] Only for guide frames with horizontal connection or flange connection			
Size II		**A 0 8**	✓
Notes			
• For guide frames for 4-pole DC non-automatic air circuit breakers, see the following page. • All other accessory parts must be ordered by specifying "–Z" and the corresponding order code, see "3WL1 Air Circuit Breakers/Non-Automatic Air Circuit Breakers up to 6300 A (AC), IEC", "Options", from page 1/48.			

1) The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

2) Can only be selected if the number of auxiliary supply connectors = 0.

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Accessories and spare parts

Size	Max. rated circuit breaker current $I_{n\,max}$	SD	For 4-pole non-automatic air circuit breakers Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
Front main circuit connection, single hole							
II	2000		**3WL9212-3EA□□-□□A1**		1	1 unit	1CA
Front main circuit connection, double hole							
II	2000		**3WL9212-3EB□□-□□A1**		1	1 unit	1CA
Horizontal main circuit connection							
II	2000		**3WL9212-3EC□□-□□A1**		1	1 unit	1CA
II	4000		**3WL9212-6EC□□-□□A1**		1	1 unit	1CA
Vertical main circuit connection							
II	2000		**3WL9212-3ED□□-□□A1**		1	1 unit	1CA
II	4000		**3WL9212-6ED□□-□□A1**		1	1 unit	1CA
Main circuit connection connecting flanges							
II	2000		**3WL9212-3EE□□-□□A1**		1	1 unit	1CA
II	4000		**3WL9212-6EE□□-□□A1**		1	1 unit	1CA

Options								Additional price 4-pole
Number of auxiliary supply connectors	None	**0**						✓
	1 connector	**1**						✓
	2 connectors	**2**						✓
	3 connectors	**3**						✓
	4 connectors	**4**						✓
Note								
For required number of auxiliary supply connectors, see table on page 1/54.								
Type of auxiliary circuit connections	None[2]		**0**					
	With screw connection (SIGUT, standard)		**1**					✓
	With screwless connection method (tension spring)		**2**					✓
Position signaling switches	None			**0**				
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO			**1**				✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO			**2**				✓
Shutters	None				**A**			
	With shutter, 2-part, lockable				**B**			✓

	Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL9212-.....-..A1-Z** □ □ □	Additional price
Rated voltage 1000 V DC			
Size II		**A 0 5**	✓
Tinned version of the customer's connections on the guide frame[1] Only for guide frames with horizontal connection or flange connection			
Size II		**A 0 8**	✓
Notes			
• For guide frames for 3-pole DC non-automatic air circuit breakers, see previous page. • All other accessory parts must be ordered by specifying "–Z" and the corresponding order code, see "3WL1 Air Circuit Breakers/Non-Automatic Air Circuit Breakers up to 6300 A (AC), IEC", "Options", from page 1/48.			

[1] The permissible temperature-rise limits according to IEC 60947-2 are 5 K lower for a tin surface than for a silver surface.

[2] Can only be selected if the number of auxiliary supply connectors = 0.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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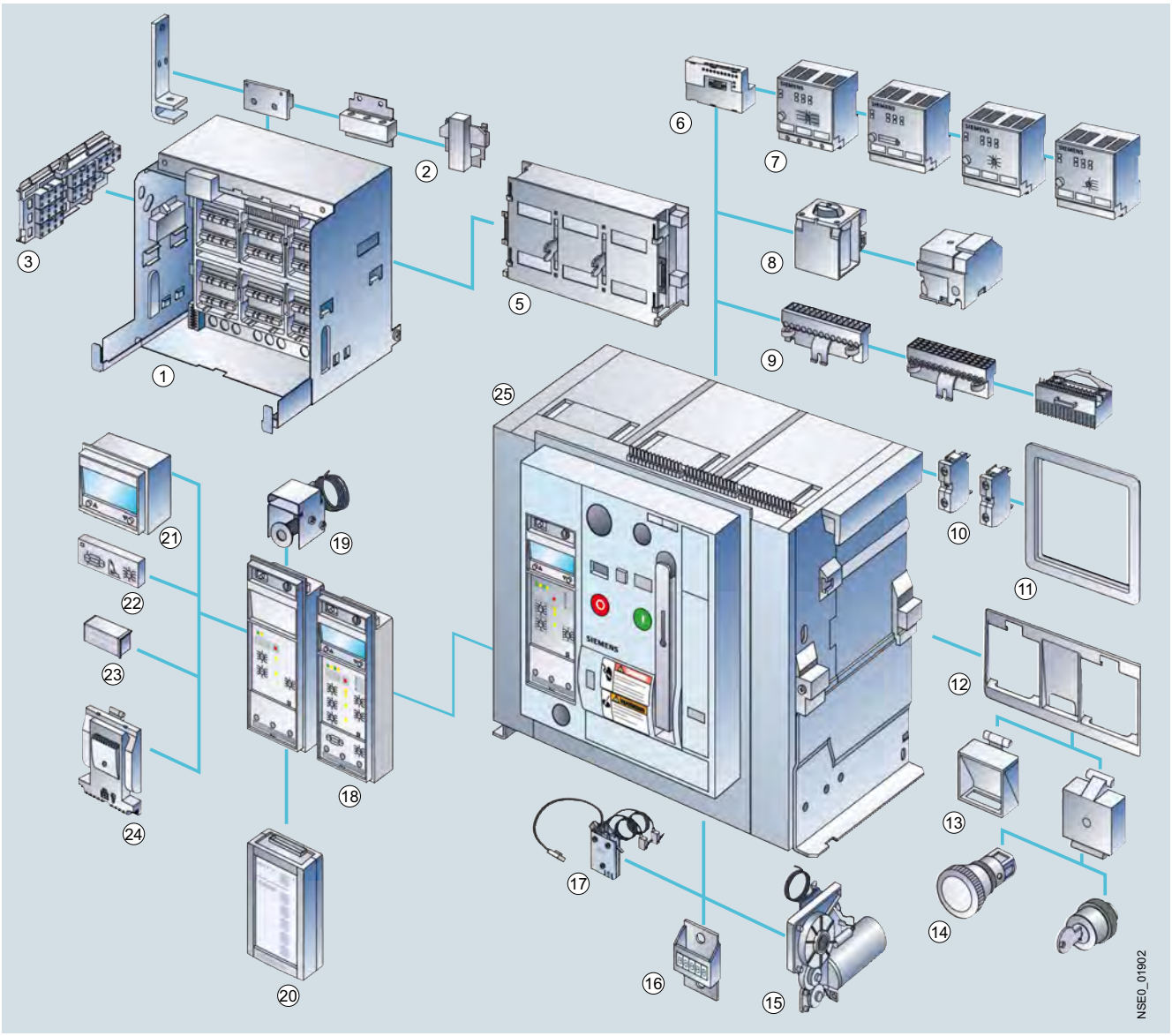
Overview

3WL5:
Superior individual products integrated into uniform power distribution systems – up to and including industry-specific industrial and infrastructure solutions



① Guide frame, see page 1/105
② Main circuit connection front, flange, horizontal, vertical, see page 1/92 and page 1/117
③ Position signaling switch, see page 1/99 and page 1/111
⑤ Shutters, see page 1/99
⑥ COM15 PROFIBUS module or COM16 MODBUS module, see page 1/116
⑦ External **Cubicle**BUS modules, see page 1/115
⑧ Closing coil, auxiliary release, see page 1/97
⑨ Auxiliary conductor plug-in system, see page 1/112
⑩ Auxiliary switch block, see page 1/97
⑪ Door sealing frame, see page 1/98
⑫ Interlocking set for mechanical ON/OFF, see page 1/108
⑬ Transparent panel, function insert, see page 1/108
⑭ EMERGENCY-STOP pushbutton, key operated, see page 1/111
⑮ Motorized operating mechanism, see page 1/99
⑯ Operating cycles counter, see page 1/98
⑰ Breaker Status Sensor (BSS), see page 1/100
⑱ Protective device with device holder, Electronic Trip Unit (ETU) see page 1/107
⑲ Remote reset solenoid, see page 1/98
⑳ Breaker Data Adapter (BDA Plus), see page 1/115
㉑ Four-line display, see page 1/107
㉒ Ground-fault protection module, see page 1/107
㉓ Rating plug, see page 1/98
㉔ Metering function module, see page 1/100
㉕ Air circuit breaker, see page 1/91 to page 1/96

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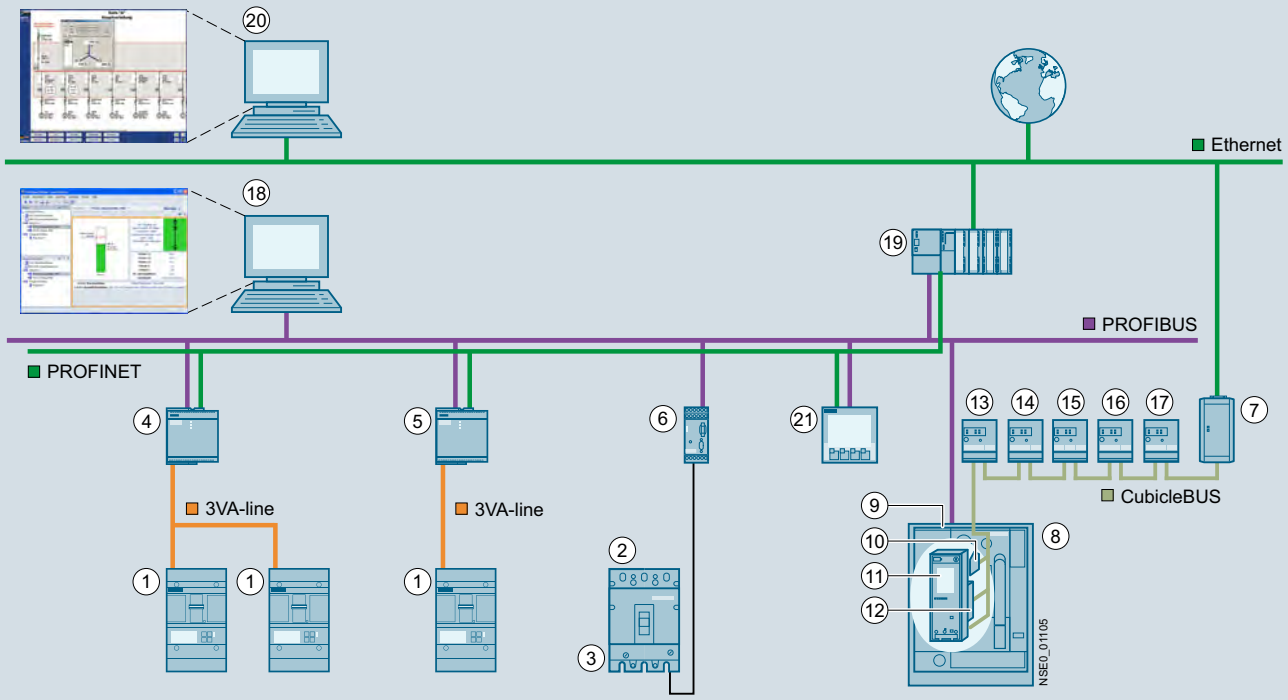
Introduction

Communication-capable circuit breakers (with ETU45B Electronic Trip Unit)



1 3VA molded case circuit breakers
2 3VL molded case circuit breakers
3 Electronic Trip Unit ETU / LCD ETU
4 COM800 breaker data server
5 COM100 breaker data server
6 COM20 Release 2 PROFIBUS module including Zone Selective Interlocking
7 BDA *Plus* with Ethernet interface
8 3WL air circuit breaker
9 COM15 PROFIBUS module
10 Breaker Status Sensor (BSS)
11 Electronic Trip Unit (ETU)
12 Metering function *Plus*
13 Zone Selective Interlocking module
14 Digital output module with relay contacts
15 Digital output module with relay contacts, configurable
16 Analog output module
17 Digital input module
18 Configuration software powerconfig V2.3 and higher
19 PLC, e.g. SIMATIC S7
20 E.g. SIMATIC powerrate
21 7KM PAC measuring devices

Characteristics

- Coordinated communication concept using the PROFIBUS DP or MODBUS, ranging from 16 A to 5000 A with 3VL molded case circuit breakers and 3WL5 air circuit breakers
- The high level of modularity of circuit breakers and accessories allows easy retrofitting of all communication components
- Significant additional benefits for the switchboard due to the possibility of linking up external input and output modules to the circuit breaker-internal **Cubicle**BUS of the 3WL5 air circuit breaker
- Innovative software products for parameterization, operation, monitoring, and diagnostics of circuit breakers, both locally or via PROFIBUS DP, MODBUS or Ethernet/Intranet/Internet
- Complete integration of the circuit breakers into the Totally Integrated Power and Totally Integrated Automation solutions

Communication:

- For air circuit breakers with optional communication function (ETU45B Electronic Trip Units), see page 1/107.
- For accessories, see page 1/104 to page 1/119.
- For more information, see chapter "Measuring Devices and Power Monitoring".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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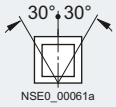
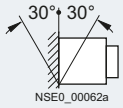
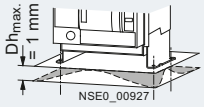
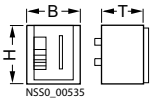
Technical specifications

Size			I		II
Type			**3WL5110**	**3WL5116**	**3WL5120**
Number of poles			3-pole, 4-pole		
Rated current I_n at 50/60 Hz					
Main conductor	At 40 °C	A	Up to 1000	1600	2000
	At 55 °C	A	1000	1600	2000
	At 60 °C	A	1000	1600	2000
Rated voltage U_e at 50/60 Hz		V AC	600 Y/347	600 Y/347	600
Rated ultimate short-circuit breaking capacity at 500 V AC		kA	65 (480 V)		100 (480 V)
Ambient temperature of the system		°C	–25/+40	–25/+40	–25/+40
Power loss at rated current					
With three-phase symmetrical load					
• Fixed-mounted circuit breakers		W	100	150	180
• Withdrawable circuit breakers		W	195	350	320
Switching times					
• Make time		ms	35	35	35
• Opening time		ms	38	38	34
• Electrical make time (through activation solenoid)[1]		ms	80	80	100
• Electrical opening time (through shunt release)		ms	73	73	73
• Electrical opening time (instantaneous undervoltage release)		ms	73	73	73
• Opening time due to ETU, instantaneous short-circuit release		ms	50	50	50
Endurance					
• Mechanical (without maintenance)	Operating cycles		10000	10000	10000
• Electrical (without maintenance)	Operating cycles		4000	4000	4000
Switching frequency		1/h	60	60	60
Minimum interval between tripping operation by Electronic Trip Unit and next making operation of the circuit breaker (only with automatic mechanical resetting of the lockout device).		ms	80	80	80
Minimum dimensions of circuit breaker compartment					
Width × Height × Depth	3-pole	mm	400 × 460 × 380	400 × 460 × 380	500 × 460 × 380
	4-pole	mm	500 × 460 × 380	500 × 460 × 380	600 × 460 × 380
Degree of protection					
• With cover			IP55		
• Without cover (with door sealing frame)			IP41		
Mounting position			 NSE0_00061a and/or  NSE0_00062a		 NSE0_00927
Main conductor minimum cross-sections		Unit(s)	2	2	2
		mm^2	6.4 × 76.2	6.4 × 76.2	6.4 × 102
		inches	1/4 × 3	1/4 × 3	1/4 × 4
Auxiliary conductors (Cu)	Standard connection = strain-relief clamp				
Max. number	• Without end sleeve		2 × 0.5 mm^2 (AWG 20) ... 2 × 1.5 mm^2 (AWG 16); 1 × 2.5 mm^2 (AWG 14)		
Auxiliary conductors × cross-section (solid/stranded)	• With end sleeve acc. to DIN 46228 Part 2[2]		1 × 0.5 mm^2 (AWG 20) ... 1 × 1.5 mm^2 (AWG 16)		
	• With twin end sleeve		2 × 0.5 mm^2 (AWG 20) ... 2 × 1.5 mm^2 (AWG 16)		
	Optional connection = tension spring				
	• Without end sleeve		2 × 0.5 mm^2 (AWG 20) ... 2 × 2.5 mm^2 (AWG 14)		
	• With end sleeve acc. to DIN 46228 Part 2		2 × 0.5 mm^2 (AWG 20) ... 2 × 1.5 mm^2 (AWG 16)		
Weights					
3-pole	• Fixed-mounted circuit breakers	kg	43	43	56
	• Withdrawable circuit breakers	kg	45	45	60
	• Guide frames	kg	25	25	31
4-pole	• Fixed-mounted circuit breakers	kg	50	50	67
	• Withdrawable circuit breakers	kg	54	54	72
	• Guide frames	kg	30	30	37
Dimensions 3-/4-pole					
 NSS0_00535		W mm	320/410		460/590
	Fixed-mounted	H mm	434		434
		D mm	291		291
	Withdrawable	H mm	465.5		465.5
		D mm	471		471

[1] Make time through activation solenoid for synchronization purposes (short-time excited): 50 ms.

[2] Notice: Approval of end sleeves.

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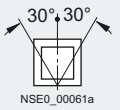
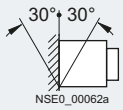
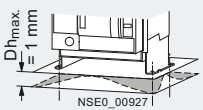
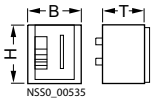
Size			II			III	
Type			**3WL5225**	**3WL5230**	**3WL5232**	**3WL5340**	**3WL5350**
Number of poles			3-pole, 4-pole				
Rated current I_n at 50/60 Hz							
Main conductor	At 40 °C	A	2500	3000	3200	4000	5000
	At 55 °C	A	2500	3000	3200	4000	5000
	At 60 °C	A	2500	3000	3200	4000	5000
Rated voltage U_e at 50/60 Hz		V AC	600	600	600	Up to 600 Y/347	Up to 600 Y/347
Rated ultimate short-circuit breaking capacity at 500 V AC		kA	100 (480 V)			100 (480 V)	
Ambient temperature of the system		°C	–25/+40	–25/+40	–25/+40	–25/+40	–25/+40
Power loss at rated current							
With three-phase symmetrical load							
• Fixed-mounted circuit breakers		W	270	410	410	520	630
• Withdrawable circuit breakers		W	520	710	710	810	1050
Switching times							
• Make time		ms	35	35	35	35	35
• Opening time		ms	34	34	34	34	34
• Electrical make time (through activation solenoid)[1]		ms	100	100	100	100	100
• Electrical opening time (through shunt release)		ms	73	73	73	73	73
• Electrical opening time (instantaneous undervoltage release)		ms	73	73	73	73	73
• Opening time due to ETU, instantaneous short-circuit release		ms	50	50	50	50	50
Endurance							
• Mechanical (without maintenance)	Operating cycles		10000	10000	10000	10000	10000
• Electrical (without maintenance)	Operating cycles		4000	4000	4000	1000	1000
Switching frequency		1/h	60	60	60	60	60
Minimum interval between tripping operation by Electronic Trip Unit and next making operation of the circuit breaker (only with automatic mechanical resetting of the lockout device).		ms	80	80	80	80	80
Minimum dimensions Circuit breaker compartment Width × Height × Depth	3-pole without A17	mm	500 × 460 × 380	500 × 460 × 380	500 × 460 × 380	800 × 460 × 380	800 × 460 × 380
	3-pole with A17	mm	560 × 570 × 500	--	560 × 570 × 500	810 × 570 × 500	--
	4-pole	mm	600 × 460 × 380	--	560 × 570 × 500	1000 × 460 × 380	1000 × 460 × 380
Degree of protection							
• With cover			IP55				
• Without cover (with door sealing frame)			IP41				
Mounting position			 NSE0_00061a and/or  NSE0_00062a			 NSE0_00927	
Main conductor minimum cross-sections		Unit(s) mm² inches	24 6.4 × 1276.4 × 63.5 1/4 × 51/4 × 2–1/2	4 6.4 × 102 1/4 × 4	4 6.4 × 102 1/4 × 4	4 10 × 120 1/4 × 5[2]	4 10 × 120 1/4 × 5[2]
Auxiliary conductors (Cu) Max. number of auxiliary conductors × cross-section (solid/stranded)	Standard connection = strain-relief clamp						
	• Without end sleeve		2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16); 1 × 2.5 mm² (AWG 14)				
	• With end sleeve acc. to DIN 46228 Part 2		1 × 0.5 mm² (AWG 20) ... 1 × 1.5 mm² (AWG 16)				
	• With twin end sleeve		2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)				
	Optional connection = tension spring						
	• Without end sleeve						
	• With end sleeve acc. to DIN 46228 Part 2		2 × 0.5 mm² (AWG 20) ... 2 × 2.5 mm² (AWG 14) 2 × 0.5 mm² (AWG 20) ... 2 × 1.5 mm² (AWG 16)				
Weights							
3-pole	• Fixed-mounted circuit breakers	kg	59	64	64	82	82
	• Withdrawable circuit breakers	kg	63	68	--	88	88
	• Guide frames	kg	39	45	--	60	60
4-pole	• Fixed-mounted circuit breakers	kg	71	77	77	99	99
	• Withdrawable circuit breakers	kg	76	82	--	106	106
	• Guide frames	kg	47	54	--	84	84
Dimensions 3-/4-pole							
 NSS0_00535		W mm	460/590			704/914	
	Fixed-mounted	H mm	434			434	
		D mm	291			291	
	Withdrawable	H mm	465.5			465.5	
		D mm	471			471	

[1] Make time through activation solenoid for synchronization purposes (short-time excited) 50 ms.

[2] 1/4 × 5 for fixed-mounted circuit breakers on request.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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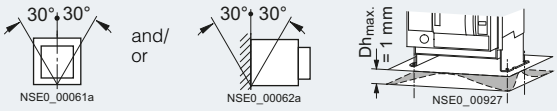
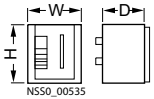
Size			**I**	**II**
Type			**3WL5120-8AA...**	**3WL5232-8AA...**
No. of poles			4-pole	3-pole
Rated current I_n at DC acc. to IEC 60947-2				
Main conductor	At 40 °C	A	2000	3200
	At 55 °C	A	2000	3200
	At 60 °C	A	2000	3200
Rated current I_n at DC acc. to UL 489B				
Main conductor	At 40 °C	A	1600	3200
	At 55 °C	A	1600	3200
	At 60 °C	A	1600	3200
Rated voltage U_e		V DC	1000	690
Rated conditional short-circuit current I_{cc} of the non-automatic air circuit breakers		kA at 690 V	20	25
		kA at 1000 V	20	--
Ambient temperature of the system		°C	–25/+40	–25/+40
Power loss at rated current				
With three-phase symmetrical load				
• Fixed-mounted circuit breakers		W	100	410
• Withdrawable circuit breakers		W	--	--
Switching times				
• Make time		ms	35	35
• Opening time		ms	38	34
• Electrical make time (through activation solenoid)[1]		ms	80	100
• Electrical opening time (through shunt release)		ms	73	73
• Electrical opening time (instantaneous undervoltage release)		ms	73	73
• Opening time due to ETU, instantaneous short-circuit release		ms	50	50
Endurance				
• Mechanical (without maintenance)	Operating cycles		10000	10000
• Electrical (without maintenance)	Operating cycles		1000	1000
Switching frequency		1/h	60	60
Minimum interval between tripping operation by Electronic Trip Unit and next making operation of the circuit breaker (only with automatic mechanical resetting of the lockout device).		ms	80	80
Minimum dimensions				
Circuit breaker compartment				
Width × Height × Depth		mm	560 × 570 × 500	560 × 570 × 500
Degree of protection				
• With cover			IP55	
• Without cover (with door sealing frame)			IP41	
Mounting position				
Main conductor minimum cross-sections		Unit(s) mm^2 inches	2 6.4 × 76.2 1/4 × 3	4 6.4 × 102 1/4 × 4
Auxiliary conductors (Cu)	Standard connection = strain-relief clamp			
Max. number of auxiliary conductors × cross-section (solid/stranded)	• Without end sleeve		2 × 0.5 mm^2 (AWG 20) ... 2 × 1.5 mm^2 (AWG 16); 1 × 2.5 mm^2 (AWG 14) 1 × 0.5 mm^2 (AWG 20) ... 1 × 1.5 mm^2 (AWG 16)	
	• With end sleeve acc. to DIN 46228 Part 2		2 × 0.5 mm^2 (AWG 20) ... 2 × 1.5 mm^2 (AWG 16)	
	• With twin end sleeve			
	Optional connection = tension spring			
	• Without end sleeve		2 × 0.5 mm^2 (AWG 20) ... 2 × 2.5 mm^2 (AWG 14)	
	• With end sleeve acc. to DIN 46228 Part 2		2 × 0.5 mm^2 (AWG 20) ... 2 × 1.5 mm^2 (AWG 16)	
Weights				
3-pole	• Fixed-mounted circuit breakers	kg	50	64
Dimensions 3-/4-pole				
		W mm	320/410	460/590
	Fixed-mounted	H mm	434	434
		D mm	291	291
	Withdrawable	H mm	465.5	465.5
		D mm	471	471

[1] Make time through activation solenoid for synchronization purposes (short-time excited) 50 ms.

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General data

Size		I	II	III
Type		**3WL51**	**3WL52**	**3WL53**
Breaking capacity class		**S** (S)	**H** (H)	**H** (H)
Short-circuit breaking capacity $I_{cu} = I_{cs}$ acc. to UL 489				
Up to 480 V AC	kA	65	100	100
Up to 600 V AC Y/347 V	kA	50	85[1)]	85
Up to 600 V AC	kA	--	85	--
Rated short-time withstand current acc. to UL 489				
At max. delay time t_{sd} = 0.4 s	kA	65	85	85
Short-circuit breaking capacity $I_{cu} = I_{cs}$ acc. to IEC 60947-2				
Up to 500 V AC	kA	65	100	100
I_{cm} at 500 V AC	kA	143	220	220
Up to 690 V AC	kA	50	85	85
I_{cm} at 690 V AC	kA	105	187	187
Rated short-time withstand current I_{cw} acc. to IEC 60947-2				
0.5 s	kA	65	85	85
1 s	kA	50	80	80

1) 600 V AC (delta) covered by test.

(S)	Circuit breakers with standard breaking capacity S ($I_{cu} = I_{cs}$ up to 65 kA at 480 V)
(H)	Circuit breakers with high switching capacity H ($I_{cu} = I_{cs}$ up to 100 kA at 480 V)
	These circuit breakers are shown in the technical specifications on orange backgrounds.

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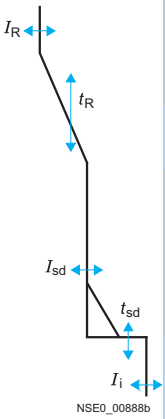
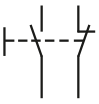
Protection functions Parameterization by			ETU25B D	ETU45B D & S
Function overview of the electronic trip system				
 NSE0_00888b	L	**Overload protection**	✓	✓
		Setting range $I_R = I_n \times$ ...	0.4-0.45-0.5-0.55-0.6-0.65-0.7-0.8-0.9-1	0.4-0.45-0.5-0.55-0.6-0.65-0.7-0.8-0.9-1
		Switchable overload protection (I^2t- or I^4t-dependent function)	--	✓
		Setting range for time-lag class t_R at I^2t	10 s fixed	2-3-5-5.5-8-10-14-17-21-25-30 s
		Setting range for time-lag class t_R at I^4t	--	1-2-3-4-5 s
		Thermal image can be switched on/off	--	✓
		Phase failure sensitivity	At t_{sd} = 20 ms (M)	At t_{sd} = 20 ms (M)
	N	**N-conductor protection**	--	✓
		Function can be switched on/off	--	✓
		N-conductor setting range $I_N = I_n \times$ ...	--	0.5 ... 1
	S	**Short-time delayed short-circuit protection**	✓	✓
		Function can be switched on/off	--	✓
		Setting range $I_R = I_n \times$ ...	1.25-1.5-2-2.5-3-4-6-8-10-12	1.25-1.5-2-2.5-3-4-6-8-10-12
		Setting range for delay time t_{sd}	0-M-100-200-300-400 ms	M-100-200-300-400 ms
		Switchable short-time delayed short-circuit protection (I^2t-dependent function)	--	✓
		Setting range for delay time t_{sd} at I^2t	--	100-200-300-400 ms
		ZSI function	--	By **Cubicle**BUS module
	I	**Instantaneous short-circuit protection**	✓	✓
		Function can be switched on/off	--	✓
		Setting range $I_i = I_n \times$ ...	Fixed for $I_i \geq 20 \times I_n$, max. 50 kA	1.5-2.2-3-4-6-8-10-12-0.8 × I_{cs}
	G	**Ground-fault protection**	--	❑ Module can be retrofitted
		Tripping and alarm functions	--	✓
		Tripping function can be switched on/off	--	✓
		Detection of ground-fault current through summation current formation with internal or external N-conductor transformer	--	✓
		Recording of the ground-fault current via external transformer	--	✓
		Setting range of the operating current I_g for tripping	--	A-B-C-D-E
		Setting range of the operating current I_g for alarm	--	A-B-C-D-E
		Setting range of the delay time t_g	--	100-200-300-400-500 ms
		Switchable ground-fault characteristic (I^2t-dependent function)	--	✓
		Setting range for delay time t_g at I^2t	--	100-200-300-400-500 ms
		ZSI-G function	--	By **Cubicle**BUS module
LCD				
		Alphanumeric LCD (4-line)	--	❑
Communication				
		CubicleBUS integrated	--	✓
		Communications capability via PROFIBUS DP	--	✓
		Communications capability via MODBUS	--	✓
Metering function				
		Metering function *Plus*	--	❑
LED display				
		Electronic Trip Unit active	✓	✓
		Alarm	✓	✓
		ETU fault	✓	✓
 NSE0_00890		L tripping operation	✓	✓
		S tripping operation	✓	✓
		I tripping operation	✓	✓
		N tripping operation	--	✓
		G tripping operation	--	✓ (only with ground-fault protection module)
		G alarm	--	✓ (only with ground-fault protection module)
		Tripping operation as a result of extended protection function	--	✓
		Communication	--	✓
Signals from signaling switches with external CubicleBUS **modules (relays)**				
 NSE0_00891		Overload warning	--	✓
		Load shedding, load absorbing	--	✓
		Leading signal overload trip 200 ms	--	✓
		Temperature alarm	--	✓
		Phase unbalance	--	✓
		Instantaneous short-circuit trip	--	✓
		Short-time delayed short-circuit trip	--	✓
		Overload trip	--	✓
		Neutral conductor trip	--	✓
		Ground-fault protection trip	--	✓ (only with ground-fault protection module)
		Ground-fault alarm	--	✓ (only with ground-fault protection module)
		Auxiliary relay	--	✓
		ETU fault	--	✓

Delay time figures given in ms.
M = Motor protection, corresponds to 20 ms.
D = Rotary coding switch
D & S = Rotary coding and slide switch
✓ Available.
-- Not available.
❑ optional.

Setting range of the operating current I_g		
	Size I and size II	Size III
A	100 A	400 A
B	300 A	600 A
C	600 A	800 A
D	900 A	1000 A
E	1200 A	1200 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

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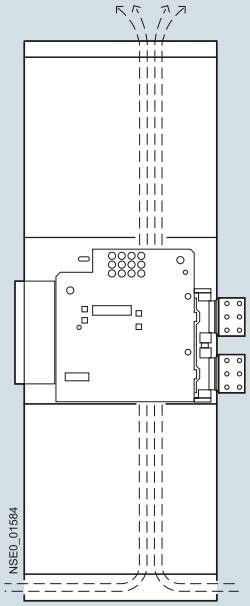
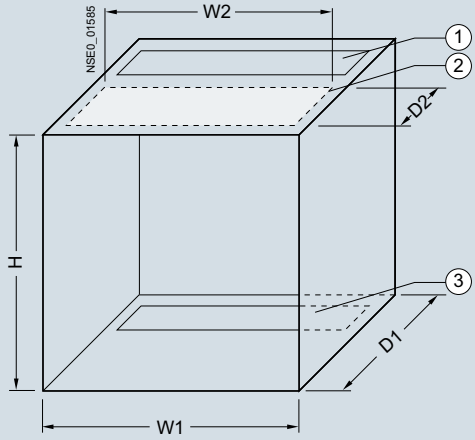
General data

Installation conditions for UL circuit breakers





(1) Ventilation opening on top
(2) Insulating plate, e.g. NEMA GPO-3 material, min. 2.3 mm thick
(3) Ventilation opening on bottom

Size	$I_{n\ max}$	Minimum dimensions of the installation space			Dimensions of the insulating plate		Ventilation
		Width W1 3/4-pole	Height H	Depth D1	Width W2 3/4-pole	Depth D2	
	A						
I	800, 1000	400/500	460[1)]	380	350/450	300	Not required
I	1250, 1600	400/500	460[1)]	380	350/450	300	
II	800, 1600, 2000	500/600	460[1)]	380	450/550	300	Not required
II	2000	500/600	460[1)]	380	450/550	300	
II	3000/3200	500/600	460[1)]	380	450/550	300	
III	4000	800/1000	460[1)]	380	750/900	300	Not required
III	5000	800/1000	460[1)]	380	750/900	300	

[1)] Height of installation compartment applies in case of roof insulation or for guide frame with arcing space cover.

UL certificate

3WL5 circuit breakers are not listed by Underwriters Laboratories (UL) under the Article No. but as individual components with their corresponding article numbers.

The UL designation of the basic circuit breaker (without Electronic Trip Unit, auxiliary release, auxiliary switch, etc.) is visible on the operator panel.

Designation of basic circuit breaker:

3WL5106-3 F 3 2
① ②③④

Digit	Meaning		
①	Article No.	1st to 8th digit	
②	Version	F: Fixed-mounted	D: Withdrawable versions
③	Number of poles		
④	12th digit	1, 2, 3, 4: Fixed-mounted connection types	5, 6, 7, 8: Withdrawable version connection types

The file numbers are:

E231263 for circuit breakers
E236088 for accessories
E236299 for guide frames

The file number can be called up at the following Internet site:

http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/gfilenbr.html

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits

Low space requirements

The 3WL5 air circuit breakers require very little space. Size I devices (up to 1600 A) fit into a 400 mm wide switchboard panel. Size III devices (up to 5000 A) are the smallest of their kind and with their construction width of 704 mm fit into an 800 mm wide switchboard panel.

Modular design

Components such as auxiliary releases, motorized operating mechanisms, Electronic Trip Units, current sensors, auxiliary circuit signaling switches, automatic reset devices, interlocks and engagement operating mechanisms can all be exchanged or retrofitted at a later stage, thus allowing the circuit breaker to be adapted to new, changing requirements.

Retrofittable modules for Electronic Trip Units

Modularity is one of the main features of the 3WL5 circuit breakers.
Special LCDs, ground-fault modules, rating plugs and communication modules for the Electronic Trip Units are available for fast and easy retrofitting and adaptation to changing requirements.

Communication

The use of modern communication-capable circuit breakers opens up completely new possibilities in terms of start-up, parameterization, diagnostics, maintenance and operation. This allows many different ways of reducing costs and improving productivity in industrial plants, buildings and infrastructure projects to be achieved.

- Timely information and response can prevent plant stoppages
- Effective diagnostics management
- Measured values are the basis for efficient load management, for drawing up power demand profiles and for allocating energy to cost centers
- Preventive maintenance reduces the risk of expensive plant downtimes

Application

- As incoming-feeder, distribution, tie, and outgoing-feeder circuit breakers in electrical installations.
- For switching and protecting motors, capacitors, generators, transformers, busbars and cables.

When connected to an electronic I&C system, the 3WL5 air circuit breakers offer a wide range of options for monitoring network events.

The extensive, coordinated SENTRON range of devices covers applications between 16 A and 5000 A with molded case and air circuit breakers.

Standards

3WL5 circuit breakers comply with:

- UL 489, UL 489B
- IEC 60947-2
- IEC 60947-2 appendix F/CISPR 11/22 Class B
- DIN VDE 0660, Part 101
- Climate-proof according to IEC 60068-2-30
- CCC requirements

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3-pole, fixed-mounted versions

Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity 480 V		Article No. www.siemens.com/product?Article No. For Article No. supplements, see page 1/97	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	SD d					
Horizontal main circuit connection									
I	1000	1000	65		**3WL5110-3□□32-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□32-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□32-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□32-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□32-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□32-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□32-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	1000	1000	65		**3WL5110-3□□31-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□31-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□31-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□31-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□31-□□□□**		1	1 unit	1CA
II[2]	3200	3200	100		**3WL5232-4□□31-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□31-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□31-□□□□**		1	1 unit	1CA
Front main circuit connection, single hole									
I	1000	1000	65		**3WL5110-3□□33-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□33-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□33-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□33-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□33-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□33-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	1000	1000	65		**3WL5110-3□□34-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□34-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□34-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□34-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□34-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□34-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[3]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[4]	**EB**		✓
	ETU45B: Protection functions LSIN[4] with 4-line display	**FB**		✓
	ETU45B: Protection functions LSING[4][5]	**EG**		✓
	ETU45B: Protection functions LSING[4][5] with 4-line display	**FG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/97			

Note: Max. voltage for auxiliary circuits 240 V.

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the rated current. If a lower rated current is required, see adaptation by rating plug on page 1/98.

2) Z option A17 must usually be ordered in addition.

3) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see Technical Specifications, page 1/85.

4) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/107.

5) For ETU45B with ground-fault protection module GFM AT (alarm and tripping), see page 1/107.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity 480 V		Article No. www.siemens.com/product?Article No. For Article No. supplements, see page 1/97	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	SD d					
Without guide frames (for guide frames, see page 1/105)									
I	1000	1000	65		**3WL5110-3□□35-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□35-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□35-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□35-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□35-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□35-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□35-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	1000	1000	65		**3WL5110-3□□36-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□36-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□36-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□36-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□36-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□36-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□36-□□□□**		1	1 unit	1CA
With guide frames, vertical main circuit connection									
I	1000	1000	65		**3WL5110-3□□37-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□37-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□37-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□37-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□37-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□37-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□37-□□□□**		1	1 unit	1CA
With guide frames, connecting flanges									
I	1000	1000	65		**3WL5110-3□□38-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□38-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□38-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□38-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□38-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□38-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/97			

Note: Max. voltage for auxiliary circuits 240 V.

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, see adaptation by rating plug on page 1/98.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see Technical Specifications, page 1/85.

3) Current transformers for protection of the N-conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/107.

4) For ETU45B with ground-fault protection module GFM AT (alarm and tripping), see page 1/107.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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4-pole, fixed-mounted versions

Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity 480 V	SD	Article No. www.siemens.com/product?Article No. For Article No. supplements, see page 1/97	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Horizontal main circuit connection									
I	1000	1000	65		**3WL5110-3□□42-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□42-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□42-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□42-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□42-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□42-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□42-□□□□**		1	1 unit	1CA
Vertical main circuit connection									
I	1000	1000	65		**3WL5110-3□□41-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□41-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□41-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□41-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□41-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□41-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□41-□□□□**		1	1 unit	1CA
Front main circuit connection, single hole									
I	1000	1000	65		**3WL5110-3□□43-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□43-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□43-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□43-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□43-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□43-□□□□**		1	1 unit	1CA
Front main circuit connection, double hole									
I	1000	1000	65		**3WL5110-3□□44-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□44-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□44-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□44-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□44-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□44-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/97			

Note: Max. voltage for auxiliary circuits 240 V.

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the rated current. If a lower rated current is required, see adaptation by rating plug on page 1/98.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see Technical Specifications, page 1/85.

3) Current transformers for protection of the N conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/107. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/100.

4) For ETU45B with ground-fault protection module GFM AT (alarm and tripping), see page 1/107.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Size	Max. rated circuit breaker current $I_{n\,max}$	Rated current[1] I_n	Breaking capacity 480 V	SD	Article No. www.siemens.com/product?Article No. For Article No. supplements, see page 1/97	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	kA	d					
Without guide frames (for guide frames, see page 1/105)									
I	1000	1000	65		**3WL5110-3□□45-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□45-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□45-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□45-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□45-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□45-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□45-□□□□**		1	1 unit	1CA
With guide frames, horizontal main circuit connection									
I	1000	1000	65		**3WL5110-3□□46-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□46-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□46-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□46-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□46-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□46-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□46-□□□□**		1	1 unit	1CA
With guide frames, vertical main circuit connection									
I	1000	1000	65		**3WL5110-3□□47-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□47-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□47-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□47-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□47-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□47-□□□□**		1	1 unit	1CA
III	5000	5000	100		**3WL5350-4□□47-□□□□**		1	1 unit	1CA
With guide frames, connecting flanges									
I	1000	1000	65		**3WL5110-3□□48-□□□□**		1	1 unit	1CA
I	1600	1600	65		**3WL5116-3□□48-□□□□**		1	1 unit	1CA
II	2000	2000	100		**3WL5220-4□□48-□□□□**		1	1 unit	1CA
II	2500	2500	100		**3WL5225-4□□48-□□□□**		1	1 unit	1CA
II	3000	3000	100		**3WL5230-4□□48-□□□□**		1	1 unit	1CA
III	4000	4000	100		**3WL5340-4□□48-□□□□**		1	1 unit	1CA

Options				Additional price
Non-automatic air circuit breakers[2]	Without Electronic Trip Units	**AA**		**None**
Electronic Trip Units	**Versions without ground-fault protection**			
	ETU25B: Protection functions LSI	**CB**		✓
	ETU45B: Protection functions LSIN[3]	**EB**		✓
	ETU45B: Protection functions LSIN[3] with 4-line display	**FB**		✓
	ETU45B: Protection functions LSING[3][4]	**EG**		✓
	ETU45B: Protection functions LSING[3][4] with 4-line display	**FG**		✓
Operating mechanism, auxiliary release, auxiliary switch	Manual operating mechanism with mechanical closing, without 1st and 2nd auxiliary releases; auxiliary switch 2 NC + 2 NO		**1AA2**	**None**
	For further Article No. supplements, see page 1/97			

Note: Max. voltage for auxiliary circuits 240 V.

1) The rated current is determined by the rating plug. For the standard version, the supplied module is equal to the maximum rated current. If a lower rated current is required, see adaptation by rating plug on page 1/98.

2) For permissible rated short-time current I_{cc} and rated short-circuit making capacity I_{cm} for non-automatic air circuit breakers, see Technical Specifications, page 1/85.

3) Current transformers for protection of the N conductor and current transformers for detection of the ground-fault current in the grounded neutral point of the transformer are to be ordered separately, see page 1/107. The internal current transformer for N-conductors can be ordered by adding the supplement "-Z" and order code "F23", see page 1/100.

4) For ETU45B with ground-fault protection module GFM AT (alarm and tripping), see page 1/107.

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Fixed-mounted versions

Selection and ordering data[1)]

Size	Max. rated circuit breaker current $I_{n\,max}$	No. of poles	Rated current I_n	Breaking capacity 690 V	SD	Article No. www.siemens.com/product?Article No. For Article No. supplements, see page 1/97	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		A	kA	d					
Horizontal main circuit connection										
I	1600[2)]	4p	1600[2)]	20[3)]		**3WL5120-8AA42-□□□□**		1	1 unit	1CA
II[4)5)]	3200	3p	3200	22		**3WL5232-8AA32-□□□□**		1	1 unit	1CA
Vertical main circuit connection										
I	1600[2)]	4p	1600[2)]	20[3)]		**3WL5120-8AA41-□□□□**		1	1 unit	1CA
II[4)5)]	3200	3p	3200	25		**3WL5232-8AA31-□□□□**		1	1 unit	1CA

For further Article No. supplements, see page 1/97.

1) For permissible rated breaking capacity for non-automatic air circuit breakers, see Technical Specifications, page 1/85.
2) According to IEC 60947-2 the rated current is 2000 A.
3) I_{cc} = 20 kA to U_e = 1000 V DC + 10%.
4) Can also be used at variable frequencies of 0 ... 30 Hz.
5) Z option A17 must usually be ordered in addition.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

				Article No. supplement 3WL5…-…..- □□□□	Additional price
Operating mechanisms					
Manual operating mechanism with mechanical closing				**1**	**None**
Manual operating mechanism with mechanical and electrical closing, closing coil suitable for uninterrupted duty, 100% OP					
50/60 Hz V AC	V DC				
110	110 ... 125			**2**	✓
240	220			**3**	✓
Manual/motorized operating mechanism with mechanical and electrical closing, closing coil suitable for uninterrupted duty, 100% OP					
Motor		Closing coil			
50/60 Hz V AC	V DC	50/60 Hz V AC	V DC		
208 ... 240	220 ... 250	230	220	**4**	✓
110 ... 127	110 ... 125	110	110 ... 125	**5**	✓
--	24	--	24	**6**	✓
Note					
To order different voltages for motorized operating mechanism and closing coil or closing coil for synchronization purposes: "1" at the 13th digit of the Article No. and order codes, see page 1/99.					
1st auxiliary release					
Type	Condition	U_s 50/60 Hz V AC	U_s V DC		
Without 1st auxiliary releases	--	--	--	**A**	**None**
Shunt release suitable for uninterrupted duty, 100% OP	Operating range 0.85 ... 1.1 × U_s	--	24	**B**	✓
		--	30	**C**	✓
		--	48	**D**	✓
		--	60	**E**	✓
		110 ... 127	110 ... 125	**F**	✓
		208 ... 240	220 ... 250	**G**	✓
2nd auxiliary release					
Type	Condition	U_s 50/60 Hz V AC	U_s V DC		
Without 2nd auxiliary releases	--	--	--	**A**	**None**
Shunt release suitable for uninterrupted duty, 100% OP	Operating range 0.85 ... 1.1 × U_s	--	24	**B**	✓
		--	30	**C**	✓
		--	48	**D**	✓
		--	60	**E**	✓
		110 ... 127	110 ... 125	**F**	✓
		208 ... 240	220 ... 250	**G**	✓
Undervoltage release, instantaneous (≤ 80 ms), short-delay (≤ 200 ms)	Operating range 0.85 ... 1.1 × U_s	--	24	**J**	✓
		--	30	**K**	✓
		--	48	**L**	✓
		--	60	**U**	✓
		110 ... 127	110 ... 125	**M**	✓
		208 ... 240	220 ... 250	**N**	✓
		380 ... 415	--	**P**	✓
Undervoltage release, can be delayed between 0.2 s and 3.2 s	Operating range 0.85 ... 1.1 × U_s	--	48	**Q**	✓
		110 ... 127	110 ... 125	**R**	✓
		208 ... 240	220 ... 250	**S**	✓
		380 ... 415	--	**T**	✓
Auxiliary switches					
1st auxiliary switch block					
2 NO + 2 NC				**2**	**None**
1st + 2nd auxiliary switch block					
4 NO + 4 NC				**4**	✓
6 NO + 2 NC				**7**	✓
5 NO + 3 NC				**8**	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Options

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

3WL....-.....-....-Z
□□□ +...+...

						Additional price
IT network capability at 690 V AC + 10% acc. to IEC 60947-2 Annex H						
Conditions	Size	Rated voltage V				
3WL5225-4□□31-...	II	AC	**A**	**1**	**7**	✓
3WL5225-4□□32-...			**A**	**1**	**7**	✓
3WL5232-4□□31-...			**A**	**1**	**7**	✓
3WL5232-8AA31-...		DC	**A**	**1**	**7**	✓
3WL5232-8AA32-...			**A**	**1**	**7**	✓
3WL5340-4□□31-...	III	AC	**A**	**1**	**7**	✓
3WL5340-4□□32-...			**A**	**1**	**7**	✓
3WL5350-4□□31-...[6]	III	AC	**A**	**1**	**7**	✓
3WL5350-4□□32-...[6]			**A**	**1**	**7**	✓
Special packaging (moisture protection)						
Special packaging for extended technical requirements						
Cardboard packaging with water-repellent coating on corrugated cardboard (moisture protection)			**A**	**6**	**1**	✓
Rating plugs						
Conditions	Size	Rated current I_n A				
Only one module is possible per circuit breaker. As standard the Electronic Trip Units are equipped with a rating plug which is equal to the maximum rated circuit breaker current ($I_{n\,max}$). The rated current of the selected rating plug must be smaller than $I_{n\,max}$.	I, II	250	**B**	**0**	**2**	**None**
		315	**B**	**0**	**3**	**None**
		400	**B**	**0**	**4**	**None**
		500	**B**	**0**	**5**	**None**
		630	**B**	**0**	**6**	**None**
		800	**B**	**0**	**8**	**None**
		1000	**B**	**1**	**0**	**None**
	I, II, III	1250	**B**	**1**	**2**	**None**
		1600	**B**	**1**	**6**	**None**
	II, III	2000	**B**	**2**	**0**	**None**
		2500	**B**	**2**	**5**	**None**
		3000	**B**	**3**	**0**	**None**
		3200	**B**	**3**	**2**	**None**
	III	4000	**B**	**4**	**0**	**None**
		5000	**B**	**5**	**0**	**None**
Indication/operator control elements, door sealing frames						
5-digit mechanical operating cycles counter[1]			**C**	**0**	**1**	✓
Electrical ON button S10 in the operator panel[2] Possible only for circuit breakers with closing coil.	Button with sealing cap		**C**	**1**	**1**	✓
	Key operation with CES lock		**C**	**1**	**2**	✓
Storage status signaling switches [2] (S21)	1 NO contact		**C**	**2**	**0**	✓
Ready-to-close signaling switches (S20)	1 NO contact		**C**	**2**	**2**	✓
Signaling switches[2]	For the first auxiliary release (S22)		**C**	**2**	**6**	✓
	For the second auxiliary release (S23)		**C**	**2**	**7**	✓
Motor shutdown switch in the operator panel[3] (S12)			**S**	**2**	**5**	✓
EMERGENCY-STOP pushbuttons	Mushroom pushbutton instead of the mechanical OFF pushbutton		**S**	**2**	**4**	✓
Door sealing frames			**T**	**4**	**0**	✓
Reclosing lockout and remote resets						
Automatic reset of the reclosing lockout			**K**	**0**	**1**	✓
1st tripped signaling switch[2][4] (S24)	1 CO contact		**K**	**0**	**7**	✓
2nd tripped signaling switch[2][4][5] (S25)	1 NO contact		**K**	**0**	**6**	✓
Type	50/60 Hz V AC	V DC				✓
Remote reset solenoid for displays and reset buttons including automatic reset of the reclosing lockout	--	24	**K**	**1**	**0**	✓
	--	48	**K**	**1**	**1**	✓
	120	125	**K**	**1**	**2**	✓
	208 ... 250	208 ... 250	**K**	**1**	**3**	✓

1) Only possible with motorized operating mechanism.
2) Not possible with "communications interface" option, order code "F02" or "F12".
3) Only for breakers with motorized operating mechanism, not possible with order codes "C11", "C12".
4) Not available for non-automatic air circuit breakers.
5) Only possible with option "K07".
6) 3WL5350-... available with A17 as from 01/2016.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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				3WL....-.....-....-Z □□□ +...+...	Additional price
Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).					
Motorized operating mechanisms and closing/opening coils					
Type	Conditions	Motor			
		50/60 Hz V AC	V DC		
Motorized operating mechanism	Only possible if the 13th digit of the Article No. = "1"	--	24 ... 30	**M 0 1**	✓
		--	48 ... 60	**M 0 3**	✓
		110 ... 127	110 ... 125	**M 0 5**	✓
		208 ... 240	220 ... 250	**M 0 6**	✓
Type	Conditions	Activation solenoids			
		50/60 Hz V AC	V DC		
Closing coil suitable for uninterrupted duty, 100% OP	Only possible if the 13th digit of the Article No. = "1"	--	24	**M 2 1**	✓
		--	30	**M 2 2**	✓
		--	48	**M 2 3**	✓
		--	60	**M 2 4**	✓
		110 ... 127	110 ... 125	**M 2 5**	✓
		208 ... 240	220 ... 250	**M 2 6**	✓
Type	Conditions	Activation solenoids			
		50/60 Hz V AC	V DC		
Closing coil[1] not suitable for uninterrupted duty, 5% OP, synchronizable	Only possible if the 13th digit of the Article No. = "1"	--	24	**M 3 1**	✓
		--	48	**M 3 3**	✓
		110 ... 127	110 ... 125	**M 3 5**	✓
		208 ... 240	220 ... 250	**M 3 6**	✓
Type	Conditions	Activation solenoids			
		50/60 Hz V AC	V DC		
Opening coils (shunt release)[2][3]	Not suitable for uninterrupted duty, 5% OP, synchronizable	--	24	**M 4 1**	✓
		--	48	**M 4 3**	✓
		110 ... 127	110 ... 125	**M 4 5**	✓
		208 ... 240	220 ... 250	**M 4 6**	✓
Interlocks, covers, position signaling switches (for fixed-mounted version)					
Mutual mechanical interlockings (interlocking module with Bowden wire 2 m)	Fixed-mounted circuit breakers			**S 5 5**	✓
Interlocks, covers, position signaling switches (for withdrawable version)					
Mutual mechanical interlockings (interlocking module with Bowden wire 2 m)	Version				
	For withdrawable circuit breakers with guide frame			**R 5 5**	✓
	For guide frames			**R 5 6**	✓
	For withdrawable circuit breakers			**R 5 7**	✓
Shutters 2-part lockable with padlocks[4]	Number of poles	Size			
	3-pole	I		**R 2 1**	✓
		II		**R 2 1**	✓
		III		**R 2 1**	✓
	4-pole	I		**R 2 1**	✓
		II		**R 2 1**	✓
		III		**R 2 1**	✓
Position signaling switches for guide frames	Connected position	Test position	Disconnected position		
	1 CO	1 CO	1 CO	**R 1 5**	✓
	3 CO	2 CO	1 CO	**R 1 6**	✓

1) Overexcited, i.e. switching time 50 ms (standard > 80 ms).
2) Only possible if the 14th position of the Article No. for the circuit breaker is "A", i.e. "without 1st auxiliary release".
3) Overexcited, i.e. opening time 50 ms (standard > 80 ms).
4) Padlocks not included in scope of supply.

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Options

			3WL....-.....-....-Z ☐☐☐ +...+...	Additional price
Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).				
Communication and metering functions				
Breaker Status Sensor (BSS)			**F 0 1**	✓
PROFIBUS DP communications interface[1]	Including COM15 and Breaker Status Sensor (BSS)		**F 0 2**	✓
MODBUS RTU communications interface[1]	including COM16 and Breaker Status Sensor (BSS)		**F 1 2**	✓
Metering function *Plus* (without PROFIBUS/MODBUS communications interface)[2]			**F 0 5**	✓
Overload and short-circuit protection for neutral conductors				
Internal current transformer for N-conductor Only possible with 4-pole circuit breaker with ETU45B	Size			
	I		**F 2 3**	✓
	II		**F 2 3**	✓
	III		**F 2 3**	✓
EMC filters				
EMC filters • Common-mode interference suppressor filters (e.g. in IT networks, caused by frequency converters) • Insertion loss (asymmetric) in the range 40 kHz to 10 MHz > 40 dB			**F 3 1**	✓
Transformer (without iron core), Rogowski coil only				
Transformer Used in converter applications with high harmonics; can only be used with ETU45B or ETU76B • External 24 V DC supply required • Undervoltage release required Comprising: • 3 (3-pole) or 4 (4-pole) transformers • Warning signs • Manual	Number of poles	Size		
	3-pole	I	**K 6 0**	✓
		II	**K 6 0**	✓
		III	**K 6 0**	✓
	4-pole	I	**K 6 0**	✓
		II	**K 6 0**	✓
		III	**K 6 0**	✓
Locking devices (for fixed-mounted versions and withdrawable versions)				
Locking devices against unauthorized closing, in the operator panel The disconnector unit fulfills the requirements for main circuit breakers according to EN 60204-1	Version			
	Made by CES		**S 0 1**	✓
	Made by IKON		**S 0 3**	✓
	Assembly kit FORTRESS or Castell[3]		**S 0 5**	✓
	Assembly kit for padlocks[4]		**S 0 7**	✓
	Made by Ronis		**S 0 8**	✓
	Made by Profalux		**S 0 9**	✓
EMERGENCY-STOP pushbuttons	Mushroom pushbutton instead of the mechanical OFF pushbutton		**S 2 4**	✓
Locking devices for operating mechanism handles with padlock[4]			**S 3 3**	✓
Locking devices (for withdrawable version)				
Locking devices against unauthorized closing, for withdrawable circuit breakers The disconnector unit fulfills the requirements for main circuit breakers acc. to EN 60204-1, consisting of a lock in the cabinet door, active in the connected position, function is retained when circuit breaker is replaced. Not possible in combination with order codes "R81", "R85" or "R86".	Version			
	Made by CES		**R 6 1**	✓
	Made by Ronis		**R 6 8**	✓
	Made by Profalux		**R 6 0**	✓
Locking devices to prevent movement of the withdrawable circuit breakers Safety lock for mounting on the circuit breaker	Version			
	Made by CES		**S 7 1**	✓
	Made by Profalux		**S 7 5**	✓
	Made by Ronis		**S 7 6**	✓

1) When ordering withdrawable circuit breaker and guide frame separately, specify order code "F02" or "F12" for withdrawable circuit breaker only.

2) Additional voltage transformers are required for connection of the metering function *Plus*, see page 1/116.

3) Locks must be ordered from the manufacturer.

4) Padlock not included in the scope of supply.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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		Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).	**3WL....-.....-....-Z** ☐☐☐ **+...+...**	Additional price
Locking mechanisms (for fixed-mounted versions)				
Locking mechanism Not possible in combination with order codes "R81", "R85" or "R86".	To prevent opening of the cabinet door in ON position	**S 3 0**		✓
Locking mechanisms (for withdrawable versions)				
Locking mechanism Not possible in combination with order codes "R81", "R85" or "R86".	Version			
	To prevent opening of the cabinet door in connected position	**R 3 0**		✓
	To prevent movement with the cabinet door open	**R 5 0**		✓
Locking mechanism to prevent movement of the withdrawable circuit breakers in disconnected position, consisting of Bowden wire and lock in the cabinet door. Not possible in combination with order codes "R30", "R50", "R61", "R68" or "R60".	Version			
	Made by CES	**R 8 1**		✓
	Made by Profalux	**R 8 5**		✓
	Made by Ronis	**R 8 6**		✓
Connection methods for auxiliary conductors (for fixed-mounted and withdrawable versions)				
Connections for screwless terminals (tension spring)	Version			
	Fixed-mounted	**N 6 1**		✓
	Withdrawable	**P 6 1**		✓

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Options

Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

3WL....-.....-....-Z
□□□ **+...+...**

						Additional price 3-pole	Additional price 4-pole
For "withdrawable circuit breakers with guide frames" or for "guide frames"							
Note							
To select this connection method, the 12th digit of the Article No. for the circuit breaker must be a "6".							
Connection methods for main connections	Size	Rated current I_n					
Top and bottom: accessible from front, single hole	I	Up to 1600 A	**P**	**0**	**0**	✓	✓
	II	Up to 2000 A	**P**	**0**	**0**	✓	✓
		Up to 2500 A	**P**	**0**	**0**	✓	✓
		Up to 3200 A	**P**	**0**	**0**	✓	✓
	III	Up to 4000 A	**P**	**0**	**0**		
Connection methods for main connections	Size	Rated current I_n					
Top and bottom: accessible from front, double hole	I	Up to 1600 A	**P**	**0**	**1**	✓	✓
	II	Up to 2000 A	**P**	**0**	**1**	✓	✓
		Up to 2500 A	**P**	**0**	**1**	✓	✓
		Up to 3200 A	**P**	**0**	**1**	✓	✓
	III	Up to 4000 A	**P**	**0**	**1**	✓	✓
Connection methods for main connections	Size	Rated current I_n					
Top: horizontal Bottom: accessible from front, single hole	I	Up to 1600 A	**P**	**0**	**7**	✓	✓
	II	Up to 2000 A	**P**	**0**	**7**	✓	✓
		Up to 2500 A	**P**	**0**	**7**	✓	✓
		Up to 3200 A	**P**	**0**	**7**	✓	✓
	III	Up to 4000 A	**P**	**0**	**7**	✓	✓
Connection methods for main connections	Size	Rated current I_n					
Top: vertical Bottom: horizontal	I	Up to 1600 A	**P**	**1**	**8**	✓	✓
	II	Up to 2000 A	**P**	**1**	**8**	✓	✓
		Up to 2500 A	**P**	**1**	**8**	✓	✓
		Up to 3200 A	**P**	**1**	**8**	✓	✓
	III	Up to 4000 A	**P**	**1**	**8**	✓	✓
		Up to 5000 A	**P**	**1**	**8**	✓	✓
Connection methods for main connections	Size	Rated current I_n					
Top: connecting flange Bottom: horizontal	I	Up to 1600 A	**P**	**1**	**9**	✓	✓
	II	Up to 2000 A	**P**	**1**	**9**	✓	✓
		Up to 2500 A	**P**	**1**	**9**	✓	✓
		Up to 3200 A	**P**	**1**	**9**	✓	✓
	III	Up to 4000 A	**P**	**1**	**9**	✓	✓
Connection methods for main connections	Size	Rated current I_n					
Top: horizontal Bottom: vertical	I	Up to 1600 A	**P**	**2**	**3**	✓	✓
	II	Up to 2000 A	**P**	**2**	**3**	✓	✓
		Up to 2500 A	**P**	**2**	**3**	✓	✓
		Up to 3200 A	**P**	**2**	**3**	✓	✓
	III	Up to 4000 A	**P**	**2**	**3**	✓	✓
		Up to 5000 A	**P**	**2**	**3**	✓	✓
Connection methods for main connections	Size	Rated current I_n					
Top: horizontal Bottom: connecting flange	I	Up to 1600 A	**P**	**2**	**8**	✓	✓
	II	Up to 2000 A	**P**	**2**	**8**	✓	✓
		Up to 2500 A	**P**	**2**	**8**	✓	✓
		Up to 3200 A	**P**	**2**	**8**	✓	✓
	III	Up to 4000 A	**P**	**2**	**8**	✓	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Add "**-Z**" to the complete Article No. and indicate the appropriate order code(s).

3WL....-.....-....-Z
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For fixed-mounted circuit breakers							Additional price 3-pole	Additional price 4-pole
Note								
To select this connection method, the 12th digit of the Article No. for the circuit breaker must be a "2".								
Connection methods for main connections[1]	Size	Rated current I_n						
Top: horizontal Bottom: accessible from front, single hole	I	Up to 1600 A	**N**	**1**	**1**		✓	✓
	II	Up to 2000 A	**N**	**1**	**1**		✓	✓
		Up to 2500 A	**N**	**1**	**1**		✓	✓
		Up to 3200 A	**N**	**1**	**1**		✓	✓
	III	Up to 4000 A	**N**	**1**	**1**		✓	✓
Connection methods for main connections	Size	Rated current I_n						
Top: vertical Bottom: horizontal	I	Up to 1600 A	**N**	**2**	**0**		✓	✓
		Up to 2000 A	**N**	**2**	**0**		✓	✓
	II	Up to 2000 A	**N**	**2**	**0**		✓	✓
		Up to 2500 A	**N**	**2**	**0**		✓	✓
		Up to 3200 A	**N**	**2**	**0**		✓	✓
	III	Up to 4000 A	**N**	**2**	**0**		✓	✓
		Up to 5000 A	**N**	**2**	**0**		✓	✓
Connection methods for main connections	Size	Rated current I_n						
Top: horizontal Bottom: vertical	I	Up to 1600 A	**N**	**2**	**4**		✓	✓
		Up to 2000 A	**N**	**2**	**4**		✓	✓
	II	Up to 2000 A	**N**	**2**	**4**		✓	✓
		Up to 2500 A	**N**	**2**	**4**		✓	✓
		Up to 3200 A	**N**	**2**	**4**		✓	✓
	III	Up to 4000 A	**N**	**2**	**4**		✓	✓
		Up to 5000 A	**N**	**2**	**4**		✓	✓

[1] A17 cannot be used for DC non-automatic air circuit breakers and circuit breakers with the Z option.

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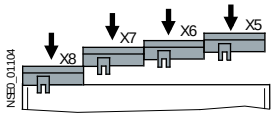
Overview

Determination of the number of auxiliary supply connectors required

This selection is only required if the guide frame is ordered under a separate Article No.



The required number of auxiliary supply connectors depends on the:
- Operating mechanism type
- Electronic Trip Unit with/without current transformer
- Type and number of auxiliary releases
- Number of auxiliary switches
- COM15/COM16 communication interface

		Number of auxiliary supply connectors	Terminal
a	**The first auxiliary supply connector X6 is always required.**	**1**	X6
b	**Operating mechanisms**		
b1	Manual operating mechanism with stored-energy feature with mechanical closing	**0**	
b2	Manual operating mechanism with stored-energy feature with mechanical and electrical closing	**0**	X6
b3	Manual/motorized operating mechanism with stored-energy feature with mechanical and electrical closing	**+1**	X5
c	**Electronic Trip Units**		
c1	Electronic Trip Unit ETU25B	**0**	
c2	Electronic Trip Unit ETU45B (internal **Cubicle**BUS)	**+1**	X8
	Connections for external current transformers for overload protection in the N-conductor and ground-fault protection		
c3	Current transformer installed in the N-conductor (required with 3-pole circuit breakers if c2 is not selected)	**+1**	X8
c4	Current transformer in the neutral point of the transformer (required if c2 or c3 is not selected)	**+1**	X8
d	**Auxiliary release**		
d1	With/without 1st auxiliary release (shunt release F1)	**0**	X6
d2	2nd auxiliary release (shunt release F2, undervoltage release F3, delayable undervoltage release F4)	**+1**	X5
e	**Auxiliary switch blocks**		
e1	1st auxiliary switch block 2 NO + 2 NC	**0**	X6
e2	1st and 2nd auxiliary switch block 4 NO + 4 NC or 6 NO + 2 NC or 5 NO + 3 NC (required if b3 or d2 is not selected)	**+1**	X5
f	**Communication module**		
f1	Without communication module COM15/COM16	**0**	
f2	With communication module COM15/COM16 - occupies the entire terminal strip X7, making the following options no longer possible: • 1st tripped signaling switch S24 • 2nd tripped signaling switch S25 • Stored-energy status indicator S21 • Electrical ON button S10 • Signaling switch on first and second auxiliary release S22 + S23	**+1**	X7
g	**Optional signals/accessories**		
g1	Tripped signaling switch S24 (only when f2 not selected)	**+1**	X7
g2	Stored-energy status indicator S21 (only when f2 not selected, required if g1 not selected)	**+1**	X7
g3	Electrical ON button S10 (only when f2 not selected, required if g1 or g2 not selected)	**+1**	X7
g4	Signaling switch at first auxiliary release S22 (only when f2 not selected, required if g1, g2 or g3 not selected)	**+1**	X7
g5	Signaling switch at second auxiliary release S23 (only when f2 not selected, required if g1, g2, g3 or g4 not selected)	**+1**	X7
g6	Switch on ready-to-close signaling switch S20	**0**	X6
g7	Motor shutdown switch S12 (only if motorized operating mechanism selected)	**0**	X5
g8	Remote reset solenoid F7 (required if c2 not selected)	**+1**	X8
h	**Total number of auxiliary supply connectors**	**(max. 4)**	

For ordering the auxiliary supply connectors, see under "Accessories and spare parts, Guide frames for AC circuit breakers/ non-automatic air circuit breakers", page 1/105 onwards and under "Accessories and spare parts, Auxiliary conductor connections, Auxiliary supply connectors", page 1/112.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Guide frames for circuit breakers/non-automatic air circuit breakers approved acc. to UL 489

Size	Max. rated circuit breaker current $I_{n\,max}$	Breaking capacity $I_{cu} = I_{cs}$	SD	**Guide frames for 3-pole circuit breakers/ non-automatic air circuit breakers** Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	kA	d					
Front main circuit connection, single hole								
I	1000	... 66		**3WL9251-1AA□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2AA□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3AA□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4AA□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5AA□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6AA□□-□□A1**		1	1 unit	1CA
Front main circuit connection, double hole								
I	1000	... 66		**3WL9251-1AB□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2AB□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3AB□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4AB□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5AB□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6AB□□-□□A1**		1	1 unit	1CA
Horizontal main circuit connection								
I	1000	... 66		**3WL9251-1AC□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2AC□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3AC□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4AC□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5AC□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6AC□□-□□A1**		1	1 unit	1CA
	5000	... 100		**3WL9253-7AC□□-□□A1**		1	1 unit	1CA
Vertical main circuit connection								
I	1000	... 66		**3WL9251-1AD□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2AD□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3AD□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4AD□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5AD□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6AD□□-□□A1**		1	1 unit	1CA
	5000	... 100		**3WL9253-7AD□□-□□A1**		1	1 unit	1CA
Main circuit connection connecting flanges								
I	1000	... 66		**3WL9251-1AE□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2AE□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3AE□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4AE□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5AE□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6AE□□-□□A1**		1	1 unit	1CA

Options							Additional price
Number of auxiliary supply connectors	None					**0**	**None**
	1 connector					**1**	✓
	2 connectors					**2**	✓
	3 connectors					**3**	✓
	4 connectors					**4**	✓
Note							
For required number of auxiliary supply connectors, see table page 1/104.							
Type of auxiliary circuit connections	None (can only be selected if the number of auxiliary supply connectors = 0)				**0**		**None**
	With screw connection (SIGUT, standard)				**1**		✓
	With screwless connection method (tension spring)				**2**		✓
Position signaling switches	None			**0**			**None**
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO			**1**			✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO			**2**			✓
Shutters	None		**A**				**None**
	With shutter, 2-part, lockable	Size I	**B**				✓
		Size II	**B**				✓
		Size III	**B**				✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	Max. rated circuit breaker current $I_{n\,max}$	Breaking capacity $I_{cu} = I_{cs}$	SD	Guide frames for 4-pole circuit breakers/ non-automatic air circuit breakers Article No. www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	kA	d					
Front main circuit connection, single hole								
I	1000	... 66		**3WL9251-1BA□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2BA□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3BA□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4BA□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5BA□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6BA□□-□□A1**		1	1 unit	1CA
Front main circuit connection, double hole								
I	1000	... 66		**3WL9251-1BB□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2BB□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3BB□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4BB□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5BB□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6BB□□-□□A1**		1	1 unit	1CA
Horizontal main circuit connection								
I	1000	... 66		**3WL9251-1BC□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2BC□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3BC□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4BC□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5BC□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6BC□□-□□A1**		1	1 unit	1CA
	5000	... 100		**3WL9253-7BC□□-□□A1**		1	1 unit	1CA
Vertical main circuit connection								
I	1000	... 66		**3WL9251-1BD□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2BD□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3BD□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4BD□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5BD□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6BD□□-□□A1**		1	1 unit	1CA
	5000	... 100		**3WL9253-7BD□□-□□A1**		1	1 unit	1CA
Main circuit connection connecting flanges								
I	1000	... 66		**3WL9251-1BE□□-□□A1**		1	1 unit	1CA
	1600	... 66		**3WL9251-2BE□□-□□A1**		1	1 unit	1CA
II	2000	... 100		**3WL9252-3BE□□-□□A1**		1	1 unit	1CA
	2500	... 100		**3WL9252-4BE□□-□□A1**		1	1 unit	1CA
	3000	... 100		**3WL9252-5BE□□-□□A1**		1	1 unit	1CA
III	4000	... 100		**3WL9253-6BE□□-□□A1**		1	1 unit	1CA

Options							Additional price
Number of auxiliary supply connectors	None		**0**				**None**
	1 connector		**1**				✓
	2 connectors		**2**				✓
	3 connectors		**3**				✓
	4 connectors		**4**				✓
Note							
For required number of auxiliary supply connectors, see table on page 1/104.							
Type of auxiliary circuit connections	None (can only be selected if the number of auxiliary supply connectors = 0)			**0**			**None**
	With screw connection (SIGUT, standard)			**1**			✓
	With screwless connection method (tension spring)			**2**			✓
Position signaling switches	None				**0**		**None**
	Option 1: Connected position 1 CO, test position 1 CO, disconnected position 1 CO				**1**		✓
	Option 2: Connected position 3 CO, test position 2 CO, disconnected position 1 CO				**2**		✓
Shutters	None					**A**	**None**
	With shutter, 2-part, lockable	Size I				**B**	✓
		Size II				**B**	✓
		Size III				**B**	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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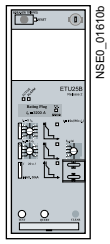
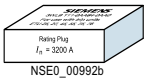
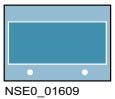
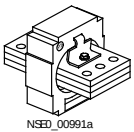
	Designation			SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 NSE0_01610b 3WL931.-.AA.0-0AA1	**Protective device with device holder and optional metering function**[1]								
	Type	With protection function	Metering function						
	ETU25B	LSI	None		**3WL9352-5AA00-0AA1**		1	1 unit	1CA
	ETU45B (without display)	LSIN(G)	None		**3WL9354-5AA00-0AA1**		1	1 unit	1CA
			With metering function *Plus*		**3WL9354-5AA20-0AA1**		1	1 unit	1CA
 NSE0_00992b 3WL9111-0AA64-0AA0	**Rating plugs**[2]								
	Size		Rated current I_n A						
	I, II		250		**3WL9111-2AA51-0AA0**		1	1 unit	1CA
			315		**3WL9111-2AA52-0AA0**		1	1 unit	1CA
			400		**3WL9111-2AA53-0AA0**		1	1 unit	1CA
			500		**3WL9111-2AA54-0AA0**		1	1 unit	1CA
			630		**3WL9111-2AA55-0AA0**		1	1 unit	1CA
			800		**3WL9111-2AA56-0AA0**		1	1 unit	1CA
			1000		**3WL9111-2AA57-0AA0**		1	1 unit	1CA
	I, II, III		1250		**3WL9111-2AA58-0AA0**		1	1 unit	1CA
			1600		**3WL9111-2AA61-0AA0**		1	1 unit	1CA
	II, III		2000		**3WL9111-2AA62-0AA0**		1	1 unit	1CA
			2500		**3WL9111-2AA63-0AA0**		1	1 unit	1CA
			3000		**3WL9111-2AA77-0AA0**		1	1 unit	1CA
			3200		**3WL9111-2AA64-0AA0**		1	1 unit	1CA
	III		4000		**3WL9111-2AA65-0AA0**		1	1 unit	1CA
			5000		**3WL9111-2AA66-0AA0**		1	1 unit	1CA
 NSE0_01027a 3WL9111-0AT53-0AA0	**Ground-fault modules**[3]								
	Versions								
	• GFM AT 45B (only for ETU45B) alarm and tripping				**3WL9111-2AT53-0AA0**		1	1 unit	1CA
 NSE0_01609 3WL9111-0AT81-0AA0	**Displays** • For ETU45B • 4-line				**3WL9111-1AT81-0AA0**		1	1 unit	1EA
 NSE0_00991a 3WL9111-0AA3.-0AA0	**External current transformer for N-conductor** For T5, "Measurement Method" function, see Technical Information at www.siemens.com/lowvoltage/product-support.								
	Copper connection pieces		Size						
	--		I		**3WL9111-0AA21-0AA0**		1	1 unit	1CA
			II		**3WL9111-0AA22-0AA0**		1	1 unit	1CA
			III		**3WL9111-0AA23-0AA0**		1	1 unit	1CA
	✓		I		**3WL9111-0AA31-0AA0**		1	1 unit	1CA
			II		**3WL9111-0AA32-0AA0**		1	1 unit	1CA
			III		**3WL9111-0AA33-0AA0**		1	1 unit	1CA
	EMC filters • Common-mode interference suppressor filters (e.g. in IT networks, caused by frequency converters) • Insertion loss (asymmetric) in the range 40 kHz to 10 MHz > 40 dB				**3WL9111-0AK32-0AA0**		1	1 unit	1CA

1) For replacement in existing circuit breakers, please specify the circuit breaker ID No. when ordering.

2) With the rating plug selected, the maximum rated current $I_{n\,max}$ of the circuit breaker must not be exceeded. The following applies: $I_n \leq I_{n\,max}$

3) For direct measurement of the ground-fault current, e.g. in the neutral point of the transformer, a 1200 A/1 A current transformer, class 1, is required. The internal load of the 3WL is 0.11 Ω. If the ground-fault current is to be determined using the vectorial sum of the phases, a transformer must be installed in the neutral conductor.

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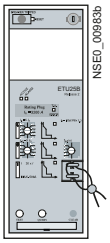
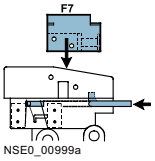
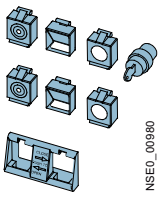
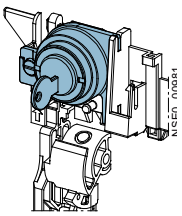
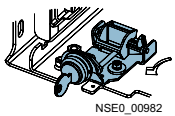
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
More accessories for Electronic Trip Units							
 3WL9111-0AT45-0AA0	**Sealable and lockable covers**						
	Version						
	• For ETU25B and ETU45B		**3WL9111-0AT45-0AA0**		1	1 unit	1CA
	Automatic reset of the reclosing lockout Spare part for option **K01,** see "-Z" + order code, page 1/98.		**3WL9111-0AK21-0AA0**		1	1 unit	1CA
 3WL9111-0AK0.-0AA0	**Remote reset coils**[1] • For mechanical tripped indicator • Spare part for options **K10** to **K13,** see "-Z" + order code, page 1/98.						
	Note						
	Automatic reset of the reclosing lockout 3WL9111-0AK21-0AA0 also needed.						
	Versions						
	• 24 V DC		**3WL9111-0AK03-0AA0**		1	1 unit	1CA
	• 48 V DC		**3WL9111-0AK04-0AA0**		1	1 unit	1CA
	• 120 V AC/125 V DC		**3WL9111-0AK05-0AA0**		1	1 unit	1CA
	• 208-250 V AC/208-250 V DC		**3WL9111-0AK06-0AA0**		1	1 unit	1CA
	Retrofittable internal CubicleBUS wiring for connection to terminal X8 • For ETU45B • With male connector[2]		**3WL9111-0AK30-0AA0**		1	1 unit	1CA
	Retrofittable internal wiring for connection of the external N- and G-transformers to terminal X8 • Not for ETU Release 2 • Without male connector		**3WL9111-0AK31-0AA0**		1	1 unit	1CA
Locking devices							
 3WL9111-0BA22-0AA0	**Interlocking set for mechanical ON/OFF** • Each consisting of 2 transparent covers for sealing or for attaching padlocks[4] • Cover with 6.35 mm hole (for tool actuation) • Lock mount for safety lock for key operation						
	Versions						
	• Without safety lock		**3WL9111-0BA21-0AA0**		1	1 unit	1CA
	• Made by CES		**3WL9111-0BA22-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA24-0AA0**		1	1 unit	1CA
 3WL9111-0BA31-0AA0	**Locking devices against unauthorized closing, in the operator panel** • The disconnector unit fulfills the requirements for main circuit breakers acc. to EN 60204-1 • Spare part for option **S01** to **S09,** see "-Z" + order code, page 1/100.						
	Versions						
	• Assembly kit FORTRESS or Castell[3]		**3WL9111-0BA31-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA33-0AA0**		1	1 unit	1CA
	• Made by KIRK-Key[3]		**3WL9111-0BA34-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA35-0AA0**		1	1 unit	1CA
	• Made by CES		**3WL9111-0BA36-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA38-0AA0**		1	1 unit	1CA
	• Assembly kit for padlocks[4]		**3WL9111-0BA41-0AA0**		1	1 unit	1CA
 3WL9111-0BA53-0AA0	**Locking devices against unauthorized closing, for withdrawable circuit breakers** • The disconnector unit fulfills the requirements for main circuit breakers acc. to EN 60204-1 • Consisting of lock in the cabinet door, active in connected position; function is retained when circuit breaker is replaced • Spare part for option **R60, R61, R68**, see "-Z" + order code, page 1/100.						
	Versions						
	• Made by CES		**3WL9111-0BA51-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA53-0AA0**		1	1 unit	1CA
	• Made by KIRK-Key[3]		**3WL9111-0BA57-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA58-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA50-0AA0**		1	1 unit	1CA

1) Can only be used in conjunction with "automatic reset of reclosing lockout", e.g. "–Z" + "K01", 3WL9111-0AK21-0AA0.
2) Required if communication is retrofitted.
3) Locks, cylinders and keys must be ordered from the manufacturer.
4) Padlock not included in the scope of supply.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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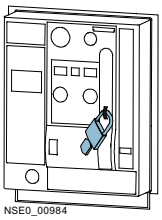
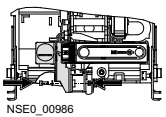
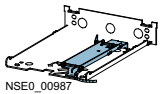
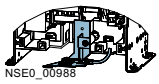
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 NSE0_00984 3WL9111-0BA71-0AA0	**Locking devices for operating mechanism handle with padlock**[1] Spare part for option **S33,** see "-Z" + order code, page 1/100.		**3WL9111-0BA71-0AA0**		1	1 unit	1CA
 NSE0_00986 3WL9111-0BA76-0AA0	**Locking devices to prevent movement of the withdrawable circuit breakers** • Safety lock for mounting on the circuit breaker • Spare part for option **S71, S75, S76,** see "-Z" + order code, page 1/100.						
	Versions						
	• Made by CES		**3WL9111-0BA73-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA75-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA76-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA77-0AA0**		1	1 unit	1CA
	• Made by KIRK-Key[2]		**3WL9111-0BA80-0AA0**		1	1 unit	1CA
	Interlocking systems • Made by CES • 2 of the same keys for 3 circuit breakers • Locking device in OFF position • Lock in the operator panel • A maximum of 2 circuit breakers can be switched on		**3WL9111-0BA43-0AA0**		1	1 unit	1CA
Locking mechanisms							
 NSE0_00987 3WL9111-0BA83-0AA0	**Locking mechanisms to prevent movement of the withdrawable circuit breakers in disconnected position** • Consisting of Bowden wire and lock in the cabinet door on the circuit breaker • Spare part for option **R81**, **R85**, **R86,** see "-Z" + order code, page 1/101.						
	Versions						
	• Made by CES		**3WL9111-0BA81-0AA0**		1	1 unit	1CA
	• Made by IKON		**3WL9111-0BA83-0AA0**		1	1 unit	1CA
	• Made by Profalux		**3WL9111-0BA85-0AA0**		1	1 unit	1CA
	• Made by Ronis		**3WL9111-0BA86-0AA0**		1	1 unit	1CA
	Note						
	Not possible in combination with "Locking mechanism to prevent opening of the cabinet door" (order code "R30") or "Locking mechanism to prevent movement with the cabinet door open (order code "R50").						
 NSE0_00988 3WL9111-0BB12-0AA0	**Locking mechanisms to prevent opening of the cabinet door in ON position** • Fixed-mounted • Can be defeated • Spare part for option **S30,** see "-Z" + order code, page 1/101.		**3WL9111-0BB12-0AA0**		1	1 unit	1CA
	Locking mechanisms to prevent opening of the cabinet door • Guide frames • Can be defeated • Spare part for option **R30,** see "-Z" + order code, page 1/101.		**3WL9111-0BB13-0AA0**		1	1 unit	1CA
	Note						
	Not possible in combination with "Locking device to prevent movement of the withdrawable circuit breakers in disconnected position" (order codes "R81", "R85" or "R86").						
	Locking mechanisms to prevent movement with the cabinet door open • Guide frames • Spare part for option **R50,** see "-Z" + order code, page 1/101.		**3WL9111-0BB15-0AA0**		1	1 unit	1CA
	Note						
	Not possible in combination with "Locking device to prevent movement of the withdrawable circuit breakers in disconnected position" (order codes "R81", "R85" or "R86").						

1) Padlock not included in the scope of supply.
2) Locks, cylinders and keys must be ordered from the manufacturer.

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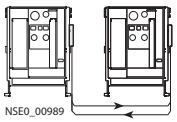
Accessories and spare parts

	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Interlocks							
 NSE0_00989 3WL9111-0BB21-0AA0	**Mutual mechanical interlocking** with Bowden wire 2000 mm (one required for each circuit breaker)						
	Type: Fixed-mounted circuit breakers; When ordered separately: --		Spare part for: Option **S55,** see "-Z" + order code, page 1/99.		**3WL9111-0BB21-0AA0**	1	1 unit 1CA
	Type: Module for withdrawable circuit breakers with guide frame; When ordered separately: --		Spare part for: Option **R55,** see "-Z" + order code, page 1/99.		**3WL9111-0BB24-0AA0**	1	1 unit 1CA
	Type: Module for guide frame; When ordered separately: ✓		Spare part for: Option **R56,** see "-Z" + order code, page 1/99.		**3WL9111-0BB22-0AA0**	1	1 unit 1CA
	Type: Module for withdrawable circuit breaker; When ordered separately: ✓		Spare part for: Option **R57,** see "-Z" + order code, page 1/99.		**3WL9111-0BB23-0AA0**	1	1 unit 1CA
	Type: Adapter for size III withdrawable circuit breaker; When ordered separately: ✓		Spare part for: --		**3WL9111-0BB30-0AA0**	1	1 unit 1CA
 NSE0_01886 3WL9112-8HA47-0AA0	**Couplings on the circuit breaker (with ring) for mutual interlocking** Can be used in all circuit breakers				**3WL9112-8AH47-0AA0**	1	1 unit 1CA
	Bowden wires						
	Versions						
	2000 mm				**3WL9111-0BB45-0AA0**	1	1 unit 1CA
	3000 mm				**3WL9111-0BB46-0AA0**	1	1 unit 1CA
	4500 mm				**3WL9111-0BB47-0AA0**	1	1 unit 1CA
Transfer control devices							
 3KC9000-8TL30 3KC9000-8EL10	**3KC ATC5300 and ATC3100 transfer control devices** For combination with two air circuit breakers/ molded case circuit breakers for changeover according to IEC 60947-6-1. For more information, see chapter "Monitoring Devices".						
Test devices							
	Manual test device for Electronic Trip Units ETU25B and ETU45B For testing the Electronic Trip Unit functions of all 3WL ETUs				**3WL9111-0AT32-0AA0**	1	1 unit 1CA
	Function testers For testing the tripping characteristics of Electronic Trip Units ETU25B and ETU45B				**3WL9111-0AT44-0AA0**	1	1 unit 1CA
Capacitor storage devices							
	Capacitor storage devices • For shunt releases • Storage time 5 min				**3WL9111-0BA14-0AA0**	1	1 unit 1CA
	Rated control supply voltage/rated operational voltage: 50/60 Hz V AC: 220 ... 240; V DC: 220 ... 250						
	Note: • Rated control supply voltage must match the rated control supply voltage of the shunt release • Suitable also for 3VL circuit breakers						

Minimum order quantity (PS) or a multiple thereof can be ordered.

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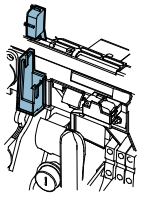
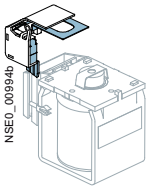
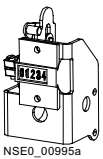
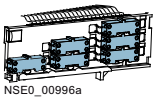
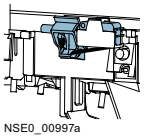
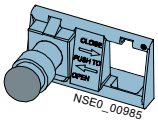
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Indicators, control elements							
 NSE0_00993a 3WL9111-0AH01-0AA0	**Ready-to-close signaling switches (S20)** • 1 NO contact • Spare part for option **C22,** see "-Z" + order code, page 1/98.		**3WL9111-0AH01-0AA0**		1	1 unit	1CA
 NSE0_00994b 3WL9111-0AH02-0AA0	**Signaling switches[1)2)] (S22 or S23)** • 1st or 2nd auxiliary release • Spare part for option **C26** and **C27,** see "Z" + order code, page 1/98.		**3WL9111-0AH02-0AA0**		1	1 unit	1CA
	1st tripped signaling switch[1)2)7)] (S24) • 1 CO contact • Spare part for option **K07,** see "-Z" + order code, page 1/98.		**3WL9111-0AH14-0AA0**		1	1 unit	1CA
	2nd tripped signaling switch[1)2)3)7)] (S25) • 1 NO contact • Spare part for option **K06,** see "-Z" + order code, page 1/98.		**3WL9111-0AH17-0AA0**		1	1 unit	1CA
 NSE0_00995a 3WL9111-0AH07-0AA0	**Operating cycles counter** • Mechanical[4)] • Spare part for option **C01,** see "-Z" + order code, page 1/98.		**3WL9111-0AH07-0AA0**		1	1 unit	1CA
	Stored-energy status signaling switches[1)2)] • 1 NO contact • Spare part for option **C20,** see "-Z" + order code, page 1/98.		**3WL9111-0AH08-0AA0**		1	1 unit	1CA
 NSE0_00996a 3WL9111-0AH12-0AA0	**Position signaling switches for guide frames** Spare part for option **R15** and **R16,** see "Z" + order code, page 1/99.						
	Versions						
	• 1st block (3 CO contacts) • 2nd block (6 CO contacts)		**3WL9111-0AH11-0AA0** **3WL9111-0AH12-0AA0**		1 1	1 unit 1 unit	1CA 1CA
 NSE0_00997a 3WL9111-0AJ0.-0AA0	**Electrical ON buttons[1)5)] (S10)** • Button + wiring[2)] • For operator panel • Spare part for options **C11** and **C12**, see "Z" + order code, page 1/98.						
	Versions						
	• With sealing cap **C11** • With CES assembly kit **C12** • With IKON assembly kit		**3WL9111-0AJ02-0AA0** **3WL9111-0AJ03-0AA0** **3WL9111-0AJ05-0AA0**		1 1 1	1 unit 1 unit 1 unit	1CA 1CA 1CA
	Note						
	Possible only for circuit breakers with closing coil.						
	Motor shutdown switches[6)] (S12) • Mounting on operator panel • Spare part for option **S25,** see "-Z" + order code, page 1/98.		**3WL9111-0AJ06-0AA0**		1	1 unit	1CA
 NSE0_00985 3WL9111-0BA72-0AA0	**EMERGENCY-STOP pushbuttons** • Mushroom pushbutton instead of the mechanical OFF pushbutton • Spare part for option **S24,** see "-Z" + order code, page 1/98.		**3WL9111-0BA72-0AA0**		1	1 unit	1CA

1) Not possible with "communications interface" option, order code "F02" or "F12".

2) X7 auxiliary supply connector required for circuit breakers or guide frames. If this is not already available, please order additionally (see page 1/104 and page 1/112).

3) Can only be used in combination with 1st tripped signaling switch.

4) Only in conjunction with motorized operating mechanism.

5) Not possible with motor shutdown switch.

6) Not possible with electrical ON button.

7) Not available for non-automatic air circuit breakers.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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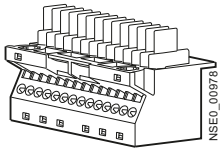
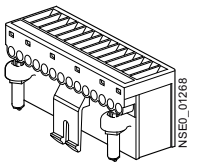
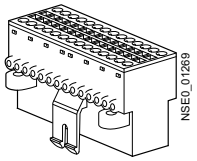
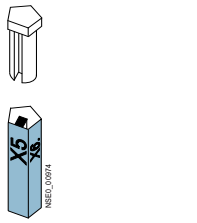
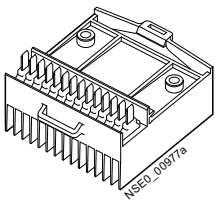
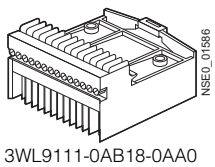
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Auxiliary conductor connections							
 3WL9111-0AB01-0AA0	**Male connectors for circuit breakers** ①		**3WL9111-0AB01-0AA0**		1	1 unit	1CA
	Extension for the 1000 V male connector versions Male connector must be ordered separately.		**3WL9111-0AB02-0AA0**		1	1 unit	1CA
	Male connectors and extension for 1000 V		**3WL9111-0AB10-0AA0**		1	1 unit	1EA
 3WL9111-0AB03-0AA0  3WL9111-0AB04-0AA0	**Auxiliary supply connectors for circuit breakers or guide frames** ② Versions • Screw connection (SIGUT) • Screwless connection method (tension spring)		**3WL9111-0AB03-0AA0** **3WL9111-0AB04-0AA0**		1 1	1 unit 1 unit	1CA 1CA
 3WL9111-0AB07-0AA0	**Coding kits** For fixed-mounted versions (X5 to X8) ③		**3WL9111-0AB07-0AA0**		1	1 unit	1CA
 3WL9111-0AB08-0AA0	**Sliding contact modules for guide frames** ④		**3WL9111-0AB08-0AA0**		1	1 unit	1CA
 3WL9111-0AB18-0AA0	**One-part sliding contact modules for guide frames** Screw connection (SIGUT) ⑤		**3WL9111-0AB18-0AA0**		1	1 unit	1CA
	Blanking blocks for circuit breakers		**3WL9111-0AB12-0AA0**		1	1 unit	1CA

For a complete auxiliary current connection you must order:

Fixed-mounted version: ① + ② + ③

Withdrawable version: ① + ④ + ② or ① + ⑤

Minimum order quantity (PS) or a multiple thereof can be ordered.

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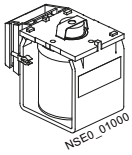
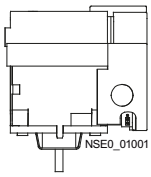
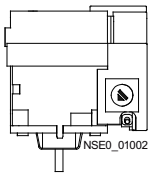
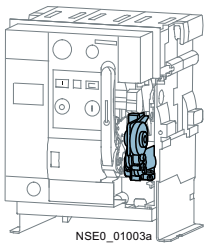
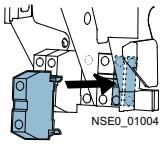
	Designation		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Auxiliary releases								
 3WL9111-0AD06-0AA0	**Closing coils/shunt releases**							
	Versions	Voltage						
	100% OP	24 V DC		**3WL9111-0AD01-0AA0**		1	1 unit	1CA
		30 V DC		**3WL9111-0AD02-0AA0**		1	1 unit	1CA
		48 V DC		**3WL9111-0AD03-0AA0**		1	1 unit	1CA
		60 V DC		**3WL9111-0AD04-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AD05-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AD06-0AA0**		1	1 unit	1CA
	5% OP[1]	24 V DC		**3WL9111-0AD11-0AA0**		1	1 unit	1CA
		48 V DC		**3WL9111-0AD12-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AD13-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AD14-0AA0**		1	1 unit	1CA
 3WL9111-0AE0.-0AA0	**Undervoltage releases**							
	Versions	Voltage						
	Instantaneous	24 V DC		**3WL9111-0AE01-0AA0**		1	1 unit	1CA
		30 V DC		**3WL9111-0AE02-0AA0**		1	1 unit	1CA
		48 V DC		**3WL9111-0AE03-0AA0**		1	1 unit	1CA
		60 V DC		**3WL9111-0AE07-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AE04-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AE05-0AA0**		1	1 unit	1CA
 3WL9111-0AE1.-0AA0	Delayed	48 V DC		**3WL9111-0AE11-0AA0**		1	1 unit	1CA
		110 ... 125 V DC/110 ... 127 V AC		**3WL9111-0AE12-0AA0**		1	1 unit	1CA
		220 ... 250 V DC/208 ... 240 V AC		**3WL9111-0AE13-0AA0**		1	1 unit	1CA
Operating mechanisms								
 3WL9111-0AF0.-0AA0	**Motorized operating mechanisms[2]**							
	Versions							
	• 24 ... 30 V DC			**3WL9111-0AF01-0AA0**		1	1 unit	1CA
	• 48 ... 60 V DC			**3WL9111-0AF02-0AA0**		1	1 unit	1CA
	• 110 ... 125 V DC/110 ... 127 V AC			**3WL9111-0AF03-0AA0**		1	1 unit	1CA
	• 220 ... 250 V DC/208 ... 240 V AC			**3WL9111-0AF04-0AA0**		1	1 unit	1CA
Auxiliary contacts								
 3WL9111-0AG03-0AA0	**Auxiliary switch blocks**							
	Versions							
	• 2 NO contacts + 2 NC contacts			**3WL9111-0AG01-0AA0**		1	1 unit	1CA
	• 2 NO contacts			**3WL9111-0AG02-0AA0**		1	1 unit	1CA
	• 1 NO contact + 1 NC contact			**3WL9111-0AG03-0AA0**		1	1 unit	1CA

1) Overexcited, i.e. switching time 50 ms (standard > 80 ms).

2) X5 auxiliary supply connector required for circuit breakers or guide frames. If this is not already available, please order additionally (see page 1/104 and page 1/112).

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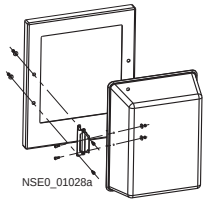
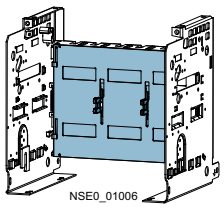
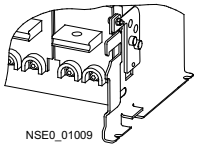
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Door sealing frames, hoods, shutters							
	Door sealing frames Spare part for option **T40,** see "-Z" + order code, page 1/98.		**3WL9111-0AP01-0AA0**		1	1 unit	1CA
 3WL9111-0AP02-0AA0	**Protective covers** IP55 Notes • Cannot be used in conjunction with door sealing frames • Hood removable and can be opened on both sides		**3WL9111-0AP03-0AA0**		1	1 unit	1CA
 3WL9111-0AP..-0AA0	**Shutters** Spare part for option **R21,** see "-Z" + order code, page 1/99.						
	Number of poles / Size						
	3-pole / I		**3WL9111-0AP04-0AA0**		1	1 unit	1CA
	3-pole / II		**3WL9111-0AP06-0AA0**		1	1 unit	1CA
	3-pole / III		**3WL9111-0AP07-0AA0**		1	1 unit	1CA
	4-pole / I		**3WL9111-0AP08-0AA0**		1	1 unit	1CA
	4-pole / II		**3WL9111-0AP11-0AA0**		1	1 unit	1CA
	4-pole / III		**3WL9111-0AP12-0AA0**		1	1 unit	1CA
Coding for withdrawable version							
 3WL9111-0AR12-0AA0 3WL9111-0AR13-0AA0	**Coding for withdrawable version** By customer, for 36 coding variants						
	Versions						
	• Sizes I and II		**3WL9111-0AR12-0AA0**		1	1 unit	1CA
	• Size III		**3WL9111-0AR13-0AA0**		1	1 unit	1CA

Minimum order quantity (PS) or a multiple thereof can be ordered.

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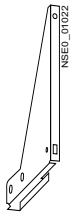
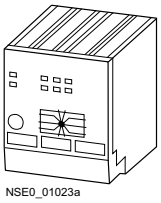
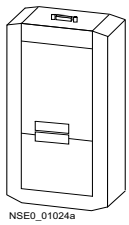
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Support brackets							
 3WL9111-0BB50-0AA0	**Support brackets** • For mounting fixed-mounted circuit breakers on vertical plane • Only for sizes I and II (1 set = 2 units)		**3WL9111-0BB50-0AA0**		1	1 unit	1CA
CubicleBUS modules[1)4)]							
 3WL9111-0AT23-0AA0	**Digital output modules with rotary coding switch, relay outputs**		**3WL9111-1AT26-0AA0**		1	1 unit	1EA
	Digital output modules, configurable, relay outputs		**3WL9111-1AT20-0AA0**		1	1 unit	1EA
	Digital input modules		**3WL9111-1AT27-0AA0**		1	1 unit	1EA
	Analog output modules		**3WL9111-1AT23-0AA0**		1	1 unit	1EA
	Zone Selective Interlocking modules		**3WL9111-1AT21-0AA0**		1	1 unit	1EA
Parameterization systems[2)]							
 3WL9111-0AT28-0AA0	**BDA *Plus***[2)3)] • Parameterization, operation, monitoring and diagnostics of 3WL air circuit breakers using the local interface • Breaker Data Adapter, connection cable to the 3WL air circuit breaker and to the programming device (e.g. notebook) • Can be run with Internet Explorer with JAVA2 VM 1.4.0-01 and higher • With Ethernet interface for connection to Ethernet/Intranet/Internet		**3WL9111-2AT33-0AA0**		1	1 unit	1CA
	Connection cables for BDA *Plus* • Connection cable for connection of BDA *Plus* to terminal X8 of the 3WL air circuit breaker • Required if neither COM15 nor COM16, nor other external **Cubicle**BUS modules are available • Length 2 m		**3WL9111-0BC21-0AA0**		1	1 unit	1CA
	powerconfig parameterization software • Parameterization, operation, monitoring and diagnostics of 3WL air circuit breakers using the powerconfig software, see chapter "Measuring Devices and Power Monitoring". • powerconfig is available free of charge at http://support.automation.siemens.com/WW/view/en/63452759						

1) Each **Cubicle**BUS module is supplied with a 0.2 m pre-assembled cable to connect the modules with each other. A longer pre-assembled cable is required for connection to the circuit breaker.

2) A 24 V DC power supply unit is required.

3) Operation under Windows Vista and Windows 7 possible with restrictions.

4) All communication components, **Cubicle**BUS modules and metering _functions are available for the ETU45B Electronic Trip Units.

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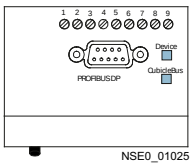
	Designation	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Accessories for communications[3]							
	Pre-assembled cables for CubicleBUS **modules**						
	Versions						
	• 0.2 m long, for connection to 3WL with COM15/COM16		**3WL9111-0BC04-0AA0**		1	1 unit	1CA
	• 1 m long, for connection to 3WL with COM15/COM16		**3WL9111-0BC02-0AA0**		1	1 unit	1CA
	• 2 m long, for connection to 3WL with COM15/COM16		**3WL9111-0BC03-0AA0**		1	1 unit	1CA
	• 2 m long, for connection to 3WL without COM15/COM16		**3WL9111-0BC05-0AA0**		1	1 unit	1CA
	SENTRON manual for communication solutions • Detailed description of the communication functions for circuit breakers. Installation, connection, commissioning, data transmission to the PLC. • Free download from: www.siemens.com/lowvoltage/manuals						
	Voltage transformers • 3-pole, for 3WL circuit breakers with metering function *Plus*[1] • 380 ... 690 V/100 V, class 0.5		**3WL9111-0BB68-0AA0**		1	1 unit	1CA
Retrofitting and spare parts[3]							
 3WL9111-0AT15-0AA0	**COM15 PROFIBUS modules** For ETU45B Electronic Trip Unit		**3WL9111-1AT65-0AA0**		1	1 unit	1EA
	COM16 MODBUS modules For ETU45B Electronic Trip Unit		**3WL9111-1AT15-0AA0**		1	1 unit	1CA
	Breaker Status Sensor (BSS) For ETU45B Electronic Trip Unit		**3WL9111-1AT16-0AA0**		1	1 unit	1EA
	Metering function *Plus*[2] Voltage transformer required		**3WL9111-1AT03-0AA0**		1	1 unit	1EA
	Transformers (without iron core), Rogowski coil only NEW Used in converter applications with high harmonic components; can only be used with ETU45B or ETU76B • External 24 V DC supply required • Undervoltage release required Comprises: • Transformer • Warning signs • Manual						
	Number of poles: 3-pole; Size: I		**3WL9111-0AA42-0AA0**		1	1 unit	1CA
	Number of poles: 3-pole; Size: II		**3WL9111-0AA43-0AA0**		1	1 unit	1CA
	Number of poles: 3-pole; Size: III		**3WL9111-0AA44-0AA0**		1	1 unit	1CA
	Number of poles: 4-pole; Size: I		**3WL9111-0AA45-0AA0**		1	1 unit	1CA
	Number of poles: 4-pole; Size: II		**3WL9111-0AA46-0AA0**		1	1 unit	1CA
	Number of poles: 4-pole; Size: III		**3WL9111-0AA47-0AA0**		1	1 unit	1CA

1) Is required for operation of the metering function *Plus*.

2) A measuring accuracy of 3% is reached if retrofitted.

3) All communication components, **Cubicle**BUS modules and metering functions are available for the ETU45B Electronic Trip Units.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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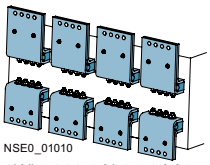
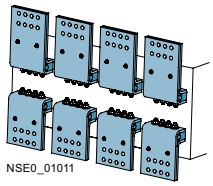
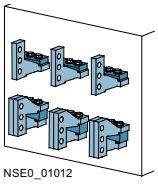
	Designation		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main conductor connections, fixed-mounted versions (essential accessory)								
	Specified for each connection							
 NSE0_01010 3WL9111-0AL06-0AA0 + 3WL9111-0AL56-0AA0	**Front-accessible main connections, single hole at top**							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AL01-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AL02-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AL03-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL04-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL05-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL06-0AA0**		1	1 unit	1CA
	Front-accessible main connections, single hole at bottom							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AL51-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AL52-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AL53-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL54-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL55-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL56-0AA0**		1	1 unit	1CA
 NSE0_01011 3WL9111-0AL14-0AA0 + 3WL9111-0AL64-0AA0	**Front-accessible main connections according to DIN 43673, double hole at top**							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AL07-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AL08-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AL11-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL12-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL13-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL14-0AA0**		1	1 unit	1CA
	Front-accessible main connections according to DIN 43673, double hole at bottom							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AL57-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AL58-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AL61-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AL62-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AL63-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AL64-0AA0**		1	1 unit	1CA
 NSE0_01012 3WL9111-0AM03-0AA0	**Rear vertical main connections**							
	Size	Rated current I_n						
	I[1]	Up to 1600 A		**3WL9111-0AM01-0AA0**		1	1 unit	1CA
	II[2]	Up to 3200 A		**3WL9111-0AM02-0AA0**		1	1 unit	1CA
	III	Up to 6300 A		**3WL9111-0AM03-0AA0**		1	1 unit	1CA

1) In the case of vertical connection size I with breaking capacity N and S, up to 1000 A one 3WL9111-0AM01-0AA0 vertical connection is required, up to 1600 A two 3WL9111-0AM01-0AA0 vertical connections are required.

2) In the case of vertical connection size II, up to 2500 A one 3WL9111-0AM02-0AA0 vertical connection is required, up to 3200 A two 3WL9111-0AM02-0AA0 vertical connections are required.

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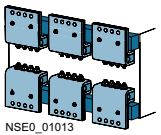
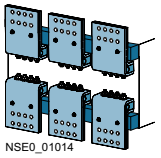
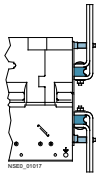
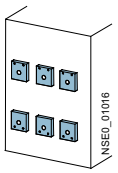
	Designation		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main conductor connections, withdrawable versions (essential accessories)								
	Specified for each connection							
 NSE0_01013 3WL9111-0AN06-0AA0	**Front-accessible main connections, single hole at top or at bottom**[1]							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AN01-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AN02-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AN03-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN04-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN05-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AN06-0AA0**		1	1 unit	1CA
 NSE0_01014 3WL9111-0AN14-0AA0	**Main connections accessible from front according to DIN 43673, double hole at top or at bottom**[1]							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AN07-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AN08-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AN11-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN12-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN13-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AN14-0AA0**		1	1 unit	1CA
 3WL9111-0AN41-0AA0	**Supports for front and DIN connecting bars**							
	Number of poles	Size						
	3-pole for 3 bars	I		**3WL9111-0AN41-0AA0**		1	1 unit	1CA
		II		**3WL9111-0AN42-0AA0**		1	1 unit	1CA
		III		**3WL9111-0AN43-0AA0**		1	1 unit	1CA
	4-pole for 4 bars	I		**3WL9111-0AN44-0AA0**		1	1 unit	1CA
		II		**3WL9111-0AN45-0AA0**		1	1 unit	1CA
		III		**3WL9111-0AN46-0AA0**		1	1 unit	1CA
 NSE0_01015 3WL9111-0AN23-0AA0	**Rear vertical main connections**							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AN15-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AN16-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AN17-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN18-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN21-0AA0**		1	1 unit	1CA
	III	Up to 5000 A		**3WL9111-0AN22-0AA0**		1	1 unit	1CA
	Rear horizontal main connections							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AN32-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AN33-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AN34-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN35-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN36-0AA0**		1	1 unit	1CA
	III	Up to 5000 A		**3WL9111-0AN37-0AA0**		1	1 unit	1CA
 NSE0_01016 3WL9111-0AN24-0AA0	**Connecting flange**							
	Size	Rated current I_n						
	I	Up to 1000 A		**3WL9111-0AN24-0AA0**		1	1 unit	1CA
		1250 A to 1600 A		**3WL9111-0AN25-0AA0**		1	1 unit	1CA
	II	Up to 2000 A		**3WL9111-0AN26-0AA0**		1	1 unit	1CA
		Up to 2500 A		**3WL9111-0AN27-0AA0**		1	1 unit	1CA
		Up to 3200 A		**3WL9111-0AN28-0AA0**		1	1 unit	1CA
	III	Up to 4000 A		**3WL9111-0AN31-0AA0**		1	1 unit	1CA
Conversion sets								
	Conversion set for converting fixed-mounted circuit breakers into withdrawable circuit breakers • Only for AC circuit breakers/non-automatic air circuit breakers • Guide frames and sliding contact modules must be ordered separately							
	Number of poles	Size						
	3-pole	I		**3WL9111-0BC11-0AA0**		1	1 unit	1CA
		II		**3WL9111-0BC12-0AA0**		1	1 unit	1CA
		III		**3WL9111-0BC13-0AA0**		1	1 unit	1CA
	4-pole	I		**3WL9111-0BC14-0AA0**		1	1 unit	1CA
		II		**3WL9111-0BC15-0AA0**		1	1 unit	1CA
		III		**3WL9111-0BC16-0AA0**		1	1 unit	1CA

[1] When using front-accessible mains connections (withdrawable circuit breakers) supports are required.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Options

Structure of the article number

3WL5 2 2 0 – 4 N G 3 1 – 1 F A 2

Example

5th position:	Size	Size II
6th and 7th positions:	Max. rated circuit breaker current $I_{n\,max}$	$I_{n\,max}$ = 2000 A
8th position:	Breaking capacity class	High breaking capacity "H": 100 kA
9th position:	Electronic Trip Units	ETU45B with 4-line display ...
10th position:	Electronic Trip Unit supplement	... with ground-fault protection
11th position:	Number of poles	Three-pole
12th position:	Installation type	Fixed-mounted, main connections on rear, vertical
13th position:	Operating mechanisms	Manual operating mechanism with mechanical closing
14th position:	1st auxiliary release	Shunt release 50/60 Hz 110 V AC
15th position:	2nd auxiliary release	Without 2nd auxiliary release
16th position:	Auxiliary switches	2 NO contacts + 2 NC contacts

An important prerequisite for computer-based order processing is that article numbers must be structured according to standardized criteria.

They are used as an unambiguous means of communication for various purposes:

- Offer processing
  Selection and configuration
- Order processing
  Orders
  Order confirmation
  Processing of products for storage
  Order processing in supply locations
  Supply and dispatch
- Reporting and planning
- Service and warranty

The standardized structure ensures that only one article number has to be administered for one device.

This saves time and effort during planning, configuring, ordering and in stock keeping, and consequently above all it saves costs.

The example opposite explains the various positions within an article number.

Accessories: With first order (components are already mounted)

Example

3WL5 2 1 6 – 4 J G 3 1 – 1 F A 3 – Z F 0 2

"–Z" with order code	Communications interface "Standard" + Breaker Status Sensor (BSS) + communication module COM15 for connection to PROFIBUS DP

Z F 0 2

Additional accessory components can be ordered ready-mounted.

These supplements are identified by **"–Z"**.

Even with additional components, one article number is sufficient.

Accessories: For retrofitting (components for subsequent fitting)

Example

3WL9 1 1 1 – 0 B A 2 1 – 0 A A 0

Interlocking set for mechanical ON/OFF without lock

Additional accessories which are not intended to be ready-mounted in the factory, such as spare parts for storage, can also be ordered separately from the circuit breaker.

Accessories for retrofitting are identified by the Article No. stem 3WL9.

Documentation

PROFIBUS manual	German	Article No.	**A5E0151347**
Communication	English	Article No.	**A5E0151353**
MODBUS manual	German	Article No.	**3ZX10 12-0WL10-1AB1**
Communication	English	Article No.	**3ZX10 12-0WL10-1AC1**

Free download of documentation from
www.siemens.com/lowvoltage/manuals

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More information

Up-to-date information on the Internet at:
www.siemens.com/sentron

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VA molded case circuit breakers

2/2 General data
2/16 3VA1 molded case circuit breakers up to 250 A, IEC
2/42 3VA2 molded case circuit breakers up to 1000 A, IEC NEW
2/76 3VA molded case circuit breakers – accessories, IEC
2/76 - Internal accessories
2/84 - Manual operators
2/91 - Motor operators
2/92 - Connection technology
2/109 - Plug-in and draw-out technology
2/114 - Residual current devices
2/117 - Communication and testing/ commissioning devices
2/124 - Accessories for locking, blocking and interlocking
2/128 - Other

3VL molded case circuit breakers up to 1600 A, IEC

2/130 Introduction
2/136 General data
2/140 3-pole
2/164 4-pole
2/185 Options
2/189 Accessories and spare parts

3VL molded case circuit breakers up to 1600 A, according to UL 489

2/228 Introduction
2/234 3-pole
2/250 Options
2/252 Accessories and spare parts
General data
2/286 - Design
2/291 - Function
2/295 - Configuration
2/296 - Technical specifications

Ch. 11 **Busbar device adapters and device holders from 630 A to 1600 A**

Ch. 12 **4NC current transformers**

Ch. 8 **3KC ATC5300 and ATC3100 transfer control devices**

Ch. 13 **Residual current devices (MRCD)**

For more information on 3VL acc. to UL
see Catalog LV 16



For further technical product information:

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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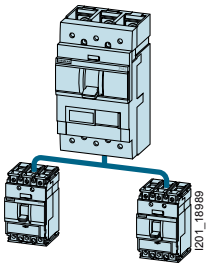
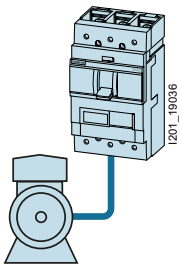
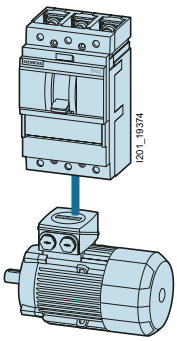
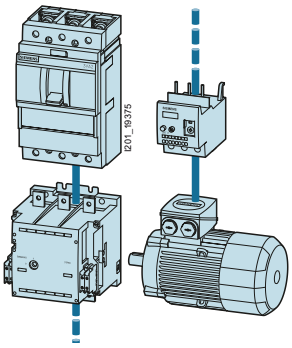
General data

Overview

Application	Page	3VA1	3VA2	Description	Standards
Line protection					
	2/16 ... 2/37 2/42 ... 2/71	✓	✓	The trip units for line protection are designed to provide overload and short-circuit protection for: • Cables • Leads • Non-motor loads	IEC / EN 60947-1, IEC / EN 60947-2
Generator protection					
	2/48 ... 2/55 2/64 ... 2/71	--	✓	The setting values of the trip units are matched to protecting generators.	IEC / EN 60947-1, IEC / EN 60947-2
Motor protection					
	2/74 ... 2/75	--	✓	The overload and short-circuit releases are designed for optimized protection and direct-on-line starting of induction squirrel-cage motors. The molded case circuit breakers for motor protection have phase-failure sensitivity and a thermal image that protects the motor against overheating. The adjustable time lag class enables users to adjust the overload release to the startup conditions of the motor to be protected. Are you IE3/IE4 ready?	IEC / EN 60947-1, IEC / EN 60947-2, IEC / EN 60947-4-1 IE3 ready
Protection for starter combinations (starter protection)					
	2/38 ... 2/39 2/74 ... 2/75	✓	✓	Starter combinations consist of: Molded case circuit breaker + contactor + overload relay. The molded case circuit breaker handles short-circuit protection and the isolating function. The task of the contactor is the operational switching of the feeder. The overload relay handles overload protection that can be specially matched to the motor. The molded case circuit breaker for the starter combination is therefore equipped with an adjustable and instantaneous short-circuit release. Are you IE3/IE4 ready?	IEC / EN 60947-1, IEC / EN 60947-2, IEC / EN 60947-4-1 IE3 ready

Minimum order quantity (PS) or a multiple thereof can be ordered.

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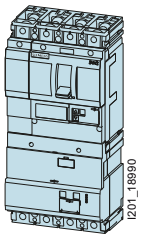
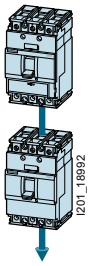
Application	Page	3VA1	3VA2	Description	Standards
Residual current protection					
	2/114 ... 2/116	✓	✓	Residual current protective devices afford fault protection (formerly referred to as: Protection in case of indirect contact) and supplementary protection (formerly referred to as: Protection in case of direct contact) in low-voltage systems in the event of the basic insulation failing or live parts being touched. Their task is to prevent or reduce injury to personnel or livestock, or damage to property.	IEC / EN 60947-2 (Annexes B, M)
Switch disconnectors					
	2/40	✓	--	Switch disconnectors are deployed: • As main disconnecting means • For on/off switching • For disconnection of loads • As switch disconnectors without overload and short-circuit protection The switch disconnectors comply with IEC / EN 60947-3.	IEC / EN 60947-1, IEC / EN 60947-3

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General data

2

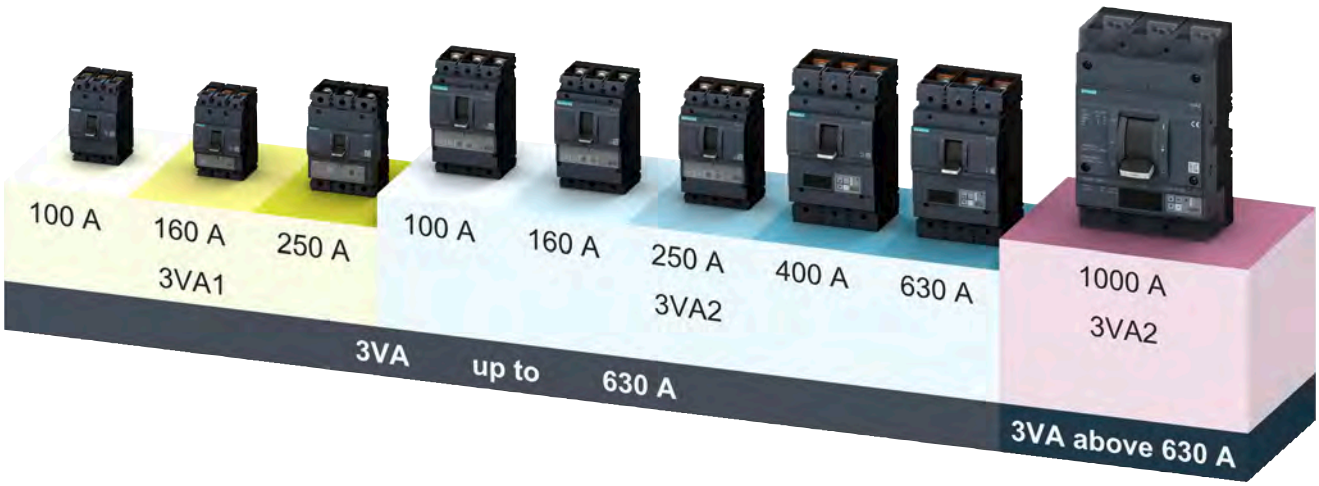
Sizes

The integrated 3VA portfolio consists of two different ranges of molded case circuit breakers in nine frame sizes. The 1000 A frame size of the 3VA2 molded case circuit breaker is new.

The 3VA molded case circuit breakers set new standards in flexibility and the variety of modular accessories available. Standardized accessories suitable for use with several sizes of circuit breaker from all the 3VA ranges help to cut costs and save time.

The 3VA1 molded case circuit breakers are available in 1 to 4-pole versions (3VA1 160 A) or in 3 and 4-pole versions (3VA1 100 A and 250 A). The 3VA2 molded case circuit breakers are available in 3 and 4-pole versions.

The circuit breakers are available with rated operational currents ranging from 16 A to 1000 A and rated voltages up to 690 V AC, depending on the range and frame size.



Integrated system

When it comes to operation, functionality and installation, the 3VA range of molded case circuit breakers is a fully integrated system. This principle is embodied in the basic units and in all internal and external accessories.

The benefits offered by the internal and external accessories available for the 3VA molded case circuit breakers are:

- Standardized methods of operation
- Standardized scope of functions
- Standardized installation procedures
- Uniform accessories from 100 A … 1000 A (e.g. auxiliary switches, auxiliary releases, etc.)

3VA1 molded case circuit breakers

The 3VA1 molded case circuit breakers reliably perform all the tasks required for line protection.

Features

The key features of the 3VA1 range are:

- Compact design
- Depending on size: 1-pole to 4-pole versions
- Depending on size: Breaking capacity of 16 kA ... 70 kA at 415 V, 3 or 4-pole breakers and 36 kA at 240 V, 1-pole breakers
- Fixed-mounted, plug-in version (depending on size)
- Thermal-magnetic trip units
- AC/DC applications
- No derating up to +50 °C
- Modular and easy-to-fit internal accessories with diverse functions
- Uniform accessories platform across all 3VA molded case circuit breakers

Compact dimensions

Thanks to a mounting depth of 70 mm and a cover size of 45 mm, the 3VA1 molded case circuit breakers of sizes 100 A, 160 A and 250 A are predestined for protecting cables and lines in the plant area, especially for the electrical installation area. For these applications, there is also a wide range of accessories available such as adapters for installation on DIN rails, as well as residual current devices (RCD310 (up to 160 A) and RCD510) that can be side-mounted.

Thermal-magnetic trip unit

A thermal-magnetic principle trip unit is the basic trip unit for providing overload and short-circuit protection. This has been developed for implementing economical, cost-efficient installations up to 250 A. It is suitable for use in three-phase networks, AC networks, 400 Hz applications, and with DC currents.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VA2 molded case circuit breakers

The 3VA2 molded case circuit breakers reliably perform all the tasks required for line protection, generator protection, motor protection and protection of starter combinations.

This range is designed for applications with increased requirements:

- Increased breaking capacity
- Very good selective protection response
- Integrated metering function
- Connection to a communication system

Features

The most important features of the 3VA2 series are:

- Compact dimensions
- 3 and 4-pole versions
- 6 sizes (1000 A NEW)
- Four breaking capacity classes from 55 kA … 150 kA (depending on size)
- Fixed-mounting, plug-in technology, draw-out technology
- Depending on size: Selective protection response in rated operational current interval 1 : 2.5
- Electronic Trip Units
- Retrofittable communication for ETU 5-series and 8-series
- Depending on the ETU: Integrated metering function
- AC applications
- Modular and easy-to-fit internal accessories with diverse functions
- Uniform accessories platform across all 3VA molded case circuit breakers

Compact dimensions with function expansions

In addition to its expanded functionality, the 3VA2 molded case circuit breaker also comes with compact dimensions for fixed mounting, as a plug-in version (up to 630 A) and a draw-out version (up to 630 A).

A cover size of 70 mm (up to 630 A) for the door cut-out and a complete selection of breaking capacity classes from 55 kA to 150 kA (depending on size) at 415 V provide the necessary flexibility for planning.

Despite its compact size, the circuit breaker offers the following benefits:

- Extremely high breaking capacity
- Extremely good selectivity
- Electronic trip units, versions with and without integrated metering function and optional communication interface

Selective contact system (up to 630 A)

With its contact system, the 3VA2 molded case circuit breaker is designed for fast selectivity tripping. The selective contact system ensures the following:

- Dynamic instantaneous short-circuit range
- High breaking capacity
- Selective protection response of the molded case circuit breakers in relation to each other
- Selective protection response of the molded case circuit breakers in relation to other protection devices such as downstream low-voltage fuses, etc.

Electronic Trip Units (ETUs)

The current sensor of the 3VA2 comprises an iron-cored transformer for the internal power supply and a Rogowski coil for precise current measurement. Each transformer can be optimized accordingly for its specific task. Thanks to the high accuracy of current measurement, the 3VA2 molded case circuit breaker is suitable for power/energy measurement. In addition, finer adjustment of ground fault current monitoring is possible.

The Electronic Trip Units (ETUs) provide the following protection functions:

- Overload protection L ("L" = Long-time delay)
- Short-time delayed short-circuit protection S ("S" = Short-time delay) for time-selective response in case of a short circuit
- Instantaneous short-circuit protection I ("I" = Instantaneous)
- Protection of the neutral conductor N against overload and short circuit ("N" = Neutral)
- Protection against residual currents to ground G ("G" = Ground fault)
- ELISA:
  Improved selective grading of downstream LV HRC fuses and upstream molded case circuit breakers by means of a special form of current-time characteristic

Energy management and communication

The Electronic Trip Units (ETUs) provide the following energy management and communication functions:

- Metering function
- Communication
- Flexible, local, digital inputs and outputs via the EFB300 external function box
- Software commissioning support with powerconfig
- Testing and archiving with the TD300 and TD500 test devices (with powerconfig)

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General data

3VA up to 630 A



Type		3VA10			3VA11										3VA12			3VA20			
Number of poles		3, 4			1			2			3, 4				3, 4			3, 4			
3VA1 molded case circuit breakers for line protection, standard applications																		**Molded case circuit breakers**			
Electrical characteristics according to IEC 60947-2																					
Size		100 A			160 A			160 A			160 A				250 A			100 A			
Rated operational current I_n at 50 °C ambient temperature	A	16 … 100			16 … 160			16 … 160			16 … 160				160 … 250			25 ... 100			
Rated operational voltage U_e 50/60 Hz AC	V	690			415			415			690				690			690			
Rated insulation voltage U_i	V	800			500			500			800				800			800			
Rated impulse withstand voltage U_{imp}	kV	8			8			8			8				8			8			
Use in IT networks		✓			✓			✓			✓				✓			✓			
Frequency	Hz	0 ... 400			0 ... 400			0 ... 400			0 ... 400				0 ... 400			50 … 60			
Breaking capacity		(B)	(N)	(S)	(N)	(S)	(M)	(N)	(S)	(M)	(N)	(S)	(M)	(H)	(S)	(M)	(H)	(M)	(H)	(C)	(L)
Rated ultimate short-circuit breaking capacity I_{cu} RMS value, according to IEC 60947-2																					
220 - 240 V AC / 50/60 Hz	kA	25	36	55	25	36	55	36	55	85	36	55	85	100	55	85	100	85	110	150	200
380 - 415 V AC / 50/60 Hz	kA	16	25	36	5	6	6	25	36	55	25	36	55	70	36	55	70	55	85	110	150
440 V AC / 50/60 Hz	kA	8	16	25	--	--	--	--	--	--	16	25	36	55[1)]	25	36	36	55	85	110	150
500 V AC / 50/60 Hz	kA	5	5	7	--	--	--	--	--	--	7	7	10	10	10	15	15	36	55	85	100
690 V AC / 50/60 Hz	kA	5	5	7	--	--	--	--	--	--	7	7	10	10	7	10	10	2	2	2	25
125 V DC (1 switching pole)	kA	--	--	--	16	25	30	16	25	30	--	--	--	--	--	--	--	--	--	--	--
250 V DC (2 switching poles)	kA	25	36	55	--	--	--	36	55	85	36	55	85	100	55	85	100	--	--	--	--
500 V DC (3 switching poles)	kA	25	36	55	--	--	--	--	--	--	36	55	85	100	55	85	100	--	--	--	--
600 V DC (4 switching poles)	kA	8	16	25	--	--	--	--	--	--	16	25	36	55	25	36	55	--	--	--	--
Rated service short circuit breaking capacity I_{cs} rms value, according to IEC 60947-2																					
220 - 240 V AC / 50/60 Hz	kA	25	36	55	25	36	55	36	55	85	36	55	85	100	55	85	100	85	110	150	200
380 - 415 V AC / 50/60 Hz	kA	16	25	36	5	6	6	25	36	55	25	36	55	70	36	55	70	55	85	110	150
440 V AC / 50/60 Hz	kA	8	16	25	--	--	--	--	--	--	16	25	36	40[1)]	25	36	36	55	85	110	150
500 V AC / 50/60 Hz	kA	5	5	5	--	--	--	--	--	--	5	5	5	5	10	10	10	36	55	85	100
690 V AC / 50/60 Hz	kA	5	5	5	--	--	--	--	--	--	5	5	5	5	5	5	5	2	2	2	18
125 V DC (1 switching pole)	kA	--	--	--	16	25	30	16	25	30	--	--	--	--	--	--	--	--	--	--	--
250 V DC (2 switching poles)	kA	25	36	55	--	--	--	36	55	85	36	55	85	100	55	85	100	--	--	--	--
500 V DC (3 switching poles)	kA	25	36	55	--	--	--	--	--	--	36	55	85	100	55	85	100	--	--	--	--
600 V DC (4 switching poles)	kA	8	16	25	--	--	--	--	--	--	16	25	36	55	25	36	55	--	--	--	--

✓ Available -- Not available * On request

1) I_n 125 A, 160 A: I_{cu} / I_{cs} = 36 kA / 36 kA

2) I_n 400/500 A; I_n 630 A: I_{cs} = 65 kA

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VA up to 630 A

3VA over 630 A NEW











3VA21	3VA22	3VA23	3VA24	3VA25
3, 4	3, 4	3, 4	3, 4	3, 4

3VA2 for line protection, selectivity applications

160 A				250 A				400 A				630 A				1000 A		
25 ... 160				160 ... 250				250 ... 400				400 ... 630				630 ... 1000		
690				690				690				690				690		
800				800				800				800				800		
8				8				8				8				8		
✓				✓				✓				✓				✓		
50 … 60				50 … 60				50 … 60				50 … 60				50 … 60		
(M)	(H)	(C)	(L)	(M)	(H)	(C)	(L)	(M)	(H)		(L)	(M)	(H)	(C)	(L)	(M)	(H)	(C)
85	110	150	200	85	110	150	200	85	110	150	*	85	110	150	*	85	110	200
55	85	110	150	55	85	110	150	55	85	110	*	55	85	110	*	55	85	110
55	85	110	150	55	85	110	150	55	85	110	*	55	85	110	*	*	*	*
36	55	85	100	36	55	85	100	36	55	85	*	36	55	85	*	*	*	*
2.5	2.5	2.5	25	3	3	3	25	5	5	5	*	6	6	6	*	25	35	35
--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
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--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
85	110	150	200	85	110	150	200	85	110	150	*	85	110	150	*	85	110	150
55	85	110	150	55	85	110	150	55	85	110	*	55	85	110	*	55	85	110
55	85	110	150	55	85	110	150	55	85	110	*	55	85	110	*	*	*	*
36	55	85	100	36	55	85	100	36	55	65	*	36	55	85[2)]	*	*	*	*
2.5	2.5	2.5	18	3	3	3	18	5	5	5	*	6	6	6	*	19	19	19
--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
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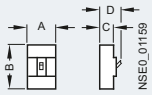
General data

3VA up to 630 A








Type			3VA10	3VA11	3VA11	3VA11	3VA12	3VA20
3VA1 molded case circuit breakers for line protection, standard applications								**Molded case circuit breakers**
Service life (make-break operations)								
Mechanical			20000[1]	20000[1]	20000[1]	20000[1]	20000[1]	20000
Electrical		380 ... 415 V	8000	8000	8000	8000	8000	12000
Trip units	FTFM	TM210	✓	✓	✓	✓	--	--
	ATFM	TM220	--	--	--	✓	--	--
	ATAM	TM240	--	--	--	✓	✓	--
	LI	ETU320	--	--	--	--	--	✓
	LIG	ETU330	--	--	--	--	--	✓
	ELISA LI	ETU340	--	--	--	--	--	✓
	LSI	ETU350	--	--	--	--	--	✓
	LSI	ETU550/ETU850	--	--	--	--	--	✓
	LSIG	ETU560/ETU860	--	--	--	--	--	✓
3VA1 molded case circuit breakers for starter protection (IEC 60947-4-1 standards and specifications acc. to AC-1)								**Molded case circuit breakers**
Rated operational current I_n at 50 °C ambient temperature		A	--	--	--	32 … 125	160, 200	--
Service life (make-break operations)								
Mechanical			20000[1]	20000[1]	20000[1]	20000[1]	20000[1]	--
Electrical		380 ... 415 V	8000	8000	8000	8000	8000	--
Trip units	AM	TM120M	--	--	--	✓	✓	--
	I	ETU310M	--	--	--	--	--	--
	LSI	ETU350M	--	--	--	--	--	--
	LSIG	ETU860M	--	--	--	--	--	--
Switch disconnectors								
Electrical characteristics according to IEC 60947-3								
Number of poles			--	--	--	3, 4	3, 4	--
Rated uninterrupted current I_u at 50 °C ambient temperature		A	--	--	--	63 … 160	250	--
Rated operational voltage U_e 50/60 Hz AC		V	--	--	--	690	690	--
Rated operational voltage U_e DC		V	--	--	--	500 (3p)/ 600 (4p)	500 (3p)/ 600 (4p)	--
Rated short-circuit making capacity I_{cn} with upstream circuit breaker		kA	--	--	--	70 kA at 415 V	70 kA at 415 V	--
Permissible rated short-time current I_{cw}		±1s kA	--	--	--	2	3	--
Dimensions								
	A	mm	76.2 (3p)/ 101.6 (4p)	25.4	50.8	76.2 (3p)/ 101.6 (4p)	105 (3p)/ 140 (4p)	105 (3p)/ 140 (4p)
	B	mm	130	130	130	130	158	181
	C	mm	70	70	70	70	70	86
	D	mm	88	88	88	88	88	107
Weight	1-pole nut keeper kit	kg	--	0.35	--	--	--	--
	2-pole nut keeper kit	kg	--	--	0.60	--	--	--
	3-pole nut keeper kit	kg	0.90	--	--	0.90	1.8	2.29
	4-pole nut keeper kit	kg	1.15	--	--	1.15	2.3	2.94
General information								
Standards and specifications			IEC 60947-2, -3, -4	IEC 60947-2, -3, -4	IEC 60947-2, -3, -4	IEC 60947-2, -3, -4	IEC 60947-2, -3, -4	IEC 60947-2, -3, -4
Utilization category according to IEC 60947-2			A	A	A	A	A	A
Power and infeed direction			Top and bottom					Top and bottom
Isolating features according to IEC 60947			✓	✓	✓	✓	✓	✓

✓ Available -- Not available [1] Mechanical operations ON - OFF

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VA up to 630 A				3VA over 630 A NEW
				
3VA21	3VA22	3VA23	3VA24	3VA25
3VA2 for line protection, selectivity applications				
20000	20000	15000	15000	10000
12000	10000	6000	4000	5000
--	--	--	--	--
--	--	--	--	--
--	--	--	--	--
✓	✓	✓	✓	✓
✓	✓	✓	✓	✓
✓	✓	✓	✓	✓
✓	✓	✓	✓	✓
✓	✓	✓	✓	✓
✓	✓	✓	✓	✓
3VA2 for motor/starter protection (standards and specifications 60947-4-1 acc. to AC-1)				
25 ... 100	160 ... 200	250	400 ... 500	--
20000	20000	15000	15000	--
12000	10000	6000	4000	--
--	--	--	--	--
✓	✓	✓	✓	--
✓	✓	✓	✓	--
✓	✓	✓	✓	--
--	--	--	--	--
--	--	--	--	--
--	--	--	--	--
--	--	--	--	--
--	--	--	--	--
--	--	--	--	--
105 (3p)/140 (4p)	105 (3p)/140 (4p)	138 (3p)/184 (4p)	138 (3p)/184 (4p)	210 (3p)/280 (4p)
181 86 107	181 86 107	248 110 137	248 110 137	320 120 253
--	--	--	--	--
--	--	--	--	--
2.29	2.41	4.3	4.3	11.35
2.94	3.09	4.8	4.8	15.42
IEC 60947-2, -3, -4	IEC 60947-2, -3, -4	IEC 60947-2, -3, -4	IEC 60947-2, -3, -4	IEC 60947-2
A	A	A	A/B[1)]	A
Top and bottom	Top and bottom	Top and bottom	Top and bottom	Top and bottom
✓	✓	✓	✓	✓

[1)] Utilization category B only for 400 A and 500 A and the trip units of the ETU5 and ETU8 series

Minimum order quantity (PS) or a multiple thereof can be ordered.

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General data

2

Molded case circuit breakers and accessories in the system

The 3VA molded case circuit breakers come with a large portfolio of internal and external accessories that can be installed flexibly in any size of circuit breaker (depending on the type of accessory).

The table below shows the molded case circuit breakers in or on which the accessories can be installed, and the sizes covered by the same accessory component:

Accessories	3VA molded case circuit breakers up to 630 A								3VA above 630 A
	3VA1			3VA2					3VA2
	100	160	250	100	160	250	400	630	1000
Auxiliary switches and alarm switches	■	■	■	■	■	■	■	■	■
Auxiliary releases	■	■	■	■	■	■	■	■	■
Connection technology	■	■	■	■	■	■	■	■	■
Plug-in technology		■	■	■	■	■	■	■	
Draw-out technology			■	■	■	■	■	■	
Front mounted rotary operator	■	■	■	■	■	■	■	■	■
Door mounted rotary operator	■	■	■	■	■	■	■	■	■
Side wall mounted rotary operator	■	■	■	■	■	■	■	■	
Motor operator MO310 (mounted on the side)		■							
Motor operator MO320 (mounted on the front)		■	■	■	■	■	■	■	
Locking, blocking and interlocking	■	■	■	■	■	■	■	■	■
Residual current device (mounted on the side)		■	■						
Residual current device (mounted underneath)		■	■	■	■	■	■	■	
Communications interface				■	■	■	■	■	■
EFB300				■	■	■	■	■	■
TD300 and TD500				■	■	■	■	■	■
Cover frame	■	■	■	■	■	■	■	■	■
DIN rail adapter	■	■							

Front terminals

The portfolio of connection components for the molded case circuit breakers includes a large selection of front cable and busbar terminals.

Connection technology available from/installed at the factory

All 3VA molded case circuit breakers are available as standard with a nut keeper kit (clip-in nut and clamping screw) at the infeed and load ends.

For units up to size 160 A, a box terminal for direct cable connection can be optionally selected instead of the nut keeper kit. The box terminal is preassembled and installed at the factory.

The connection technology available from/installed at the factory can be selected in the 12th position of the article number of the molded case circuit breaker.

Connection technology	Illustration	3VA1			3VA2					
		100	160	250	100	160	250	400	630	1000
Nut keeper kit		✓	✓	✓	✓	✓	✓	✓	✓	✓
Box terminal		✓	✓	--	✓	✓	--	--	--	--

✓ Available

Insulated busbars and cables with cable lugs can be connected directly to the nut keeper kit. Furthermore, all connection bar extensions are attached to the molded case circuit breaker using the nut keeper kit:

- Front bus connectors extended (phase barriers included in scope of supply)
- Front bus connectors offset (phase barriers included in scope of supply)
- Bus connectors edgewise (phase barriers included in scope of supply)
- Nut keeper kit, right-angled (phase barriers included in scope of supply)

The implementation of insulation measures (phase barriers or terminal covers) is recommended. With some accessory components, insulation measures are essential (and these are included in the scope of supply of the relevant component).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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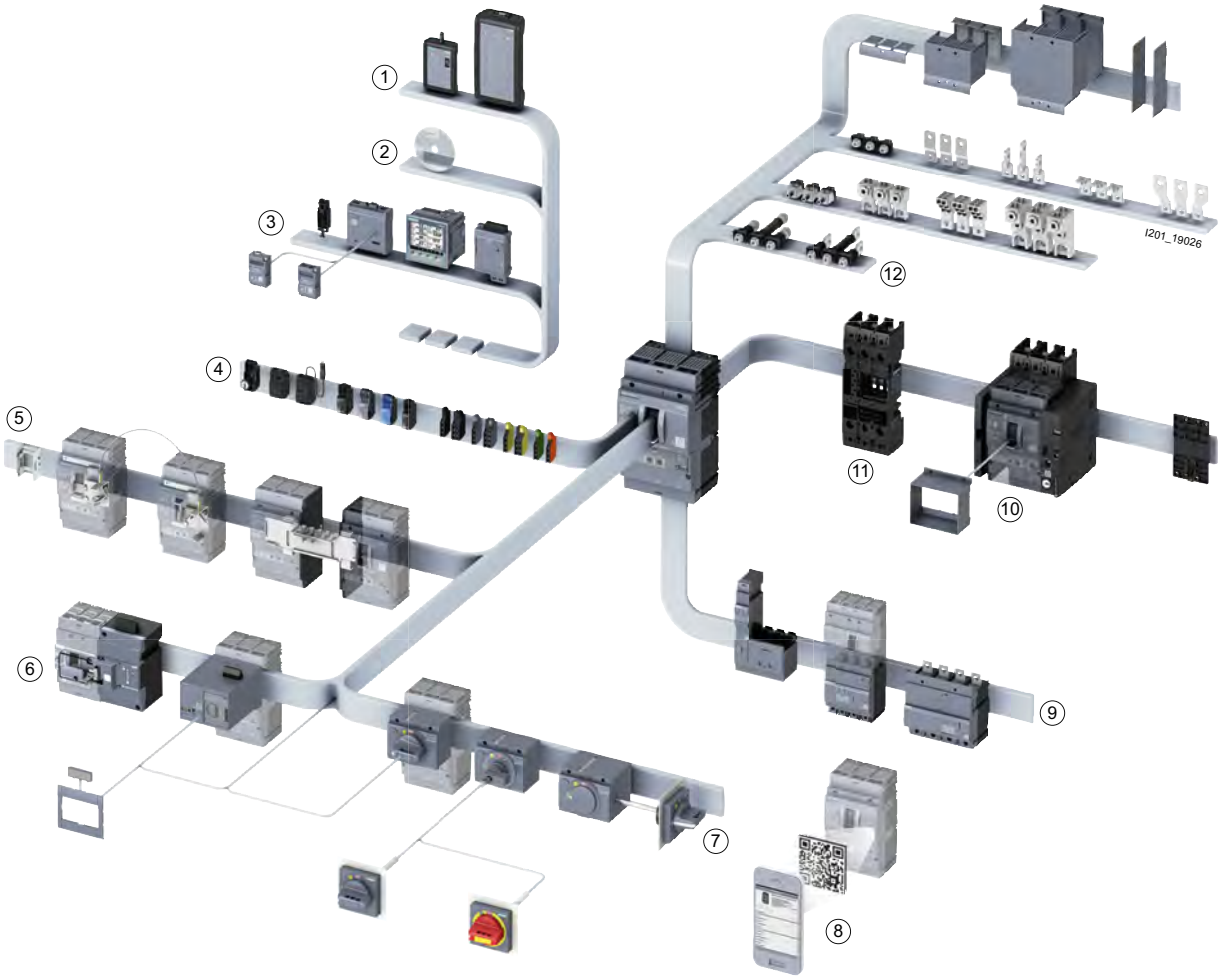


1 Test devices (page 2/123)
2 powerconfig software (page 2/123, chapter "Measuring Devices and Power Monitoring" and chapter "Software")
3 Communication (pages 2/118 to 2/123)
4 Internal accessories (pages 2/76 to 2/83)
5 Accessories for locking, blocking and interlocking (pages 2/124 to 2/127)
6 Motor operators (page 2/91)
7 Manual operators (pages 2/84 to 2/90)
8 Knowledge Manager (2/11)
9 Residual current devices (pages 2/114 to 2/116)
10 Draw-out technology (pages 2/109 to 2/113)
11 Plug-in technology (pages 2/109 to 2/113)
12 Connection technology (pages 2/92 to 2/108)

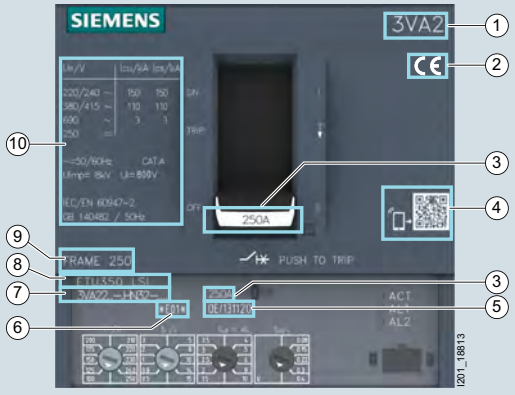
Knowledge Manager

By reading out the QR code using a smartphone and the "Siemens Industry Online Support" app, it is possible to view key product information via the Internet at any time.

Siemens provides the app free of charge.

Technical information about installation, parameterization or maintenance can be called up directly from the system by QR code on a smartphone.





1 Circuit breaker designation
2 Approvals
3 Rated current
4 Knowledge Manager
5 Production date
6 Product version
7 Article number
8 ETU type
9 Size and breaking capacity class
10 Rating plate

Front: Inscription

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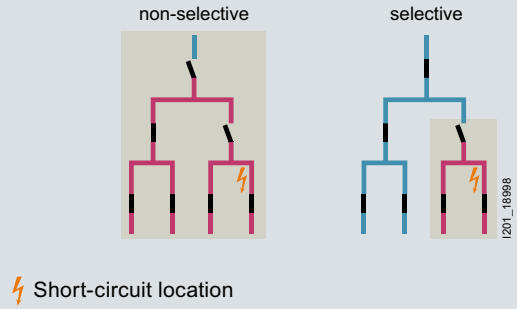
Selectivity

Protection devices connected in series, e.g. molded case circuit breakers and fuses, work in a coordinated manner to ensure that protection devices are tripped successively. The closest, upstream protection device before the location of the short-circuit must trip. The other protection devices on the same current run do not trip. The purpose of selectivity is to minimize the effects of a fault in terms of its duration and the area affected by the fault.

Selectivity is achieved when the circuit breakers are matched to each other by means of selection, configuring and trip settings in such a way that, in the event of a fault, only the breaker closest to the location of the fault trips.



Selectivity with 3VA2 molded case circuit breakers

The 3VA2 range is designed to deliver excellent selective tripping combined with optimum current limiting and outstanding breaking capacity.

3VA2 molded case circuit breakers have been specifically designed to meet the following requirements:

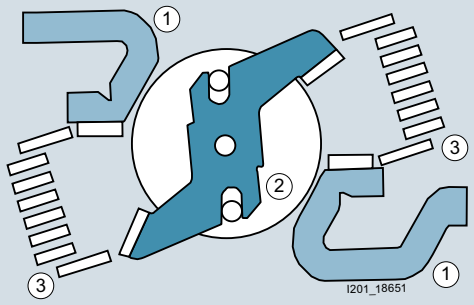
- System-wide, high selectivity with a rated operational current interval of 1 : 2.5 up to the miniature circuit breaker
- Selectivity in combination with high current limiting and high breaking capacity
- Cost-effective design / configuring of selective power distribution systems

You can find information on selectivity values for the 3VA2 molded case circuit breakers on the Internet under the link for the 3VA documentation (www.siemens.com/3VA-documentation).

Current limiting

To achieve excellent current limiting, the 3VA molded case circuit breakers are equipped with a rotary double-contact system that opens dynamically on its own above the specified disengaging currents on the principle of magnetic repulsion before the expected peak value of the short-circuit current is reached. These limits have been coordinated and optimized to suit the overall device characteristics. This substantially reduces the thermal and mechanical loading on the molded case circuit breaker.

The switching pole cassettes of the 3VA molded case circuit breakers are optimized for high breaking capacity, and their rotary double-contact system design enables extremely good current limiting thanks to the very fast build-up of peak arc voltage generated at both contacts in the event of a short circuit. This results in significant limitation of the let-through energy I^2t and the expected let-through current I_{sc}.



(1) Fixed contacts
(2) Rotating contact system
(3) Arc splitter chamber

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Standards and guidelines

The standards fulfilled by the 3VA molded case circuit breakers include:

- IEC/EN 60947-1
- IEC/EN 60947-2
- IEC/EN 60947-2, Annexes B, M
- IEC/EN 60947-3
- IEC/EN 60947-4-1

Certificates

You can find information on the available certification (CE, CCC, EHC) on the Internet (www.siemens.com/lowvoltage/certificates).

In the Entry List you can use the certificate type (general product approval, explosion protection, test certificates, shipbuilding, etc.) as a filter criterion.

Operating conditions

- Pollution degree:
  Operation of the 3VA1 and 3VA2 molded case circuit breakers is approved in accordance with IEC / EN 60947-1 and IEC / EN 60664-1 for pollution degree 3.
- Ambient temperature:
  - 3VA molded case circuit breakers are used at ambient temperatures from -25 °C to +70 °C. At temperatures above +50 °C there are reductions in the rated operational current (derating).
  - The permissible storage temperature in original Siemens packaging lies between -40 °C and +80 °C.

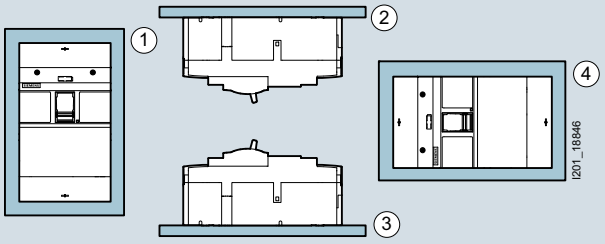
IE3 ready

As from January 2015, the energy-efficiency class IE3 will be mandatory, with a few exceptions only, for three-phase asynchronous motors. This will have an effect on motors, low-voltage power distribution and electrical installation technology, as well as industrial controls.

For use of 3VA molded case circuit breakers in conjunction with highly energy-efficient IE3 motors, please observe the information on dimensioning and configuring, see "Configuration Manual for SIRIUS Controls with IE3 Motors", at https://support.industry.siemens.com/cs/ww/en/view/94770820.

Are you IE3/IE4 ready?

Permissible mounting positions



1 Vertical wall mounting
2 Ceiling mounting
3 Floor mounting
4 Laterally rotated wall mounting

Positions in which the 3VA molded case circuit breakers are allowed to be installed

Further technical specifications

- See manual in SIOS at https://support.industry.siemens.com/cs/ww/en/view/90318775

3VA Equipment manual

- See communications manual in SIOS at https://support.industry.siemens.com/cs/ww/en/view/98746267

3VA Communication manual

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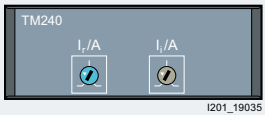
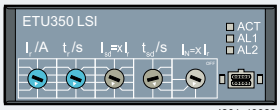
General data

Protection system

Description of functions

2

	Thermal-magnetic TM 2-series	Electronic ETU 3-series	Electronic with display ETU 5-series	Electronic with display and metering function – ETU 8-series
Protection				
Trip units	 I201_19035	 I201_18828	 I201_18480	 I201_18482
	Line protection: TM210, TM220, TM240 Starter protection: TM120M	Line protection: ETU320, ETU330, ETU340, ETU350 Starter protection: ETU310M Motor protection: ETU350M	Line protection: ETU550, ETU560	Line protection: ETU850, ETU860 Motor protection: ETU860M
Integrated functions				
Parameterizing				
	Setting and reading the parameters in A	Setting and reading the parameters in A and s	• Setting and reading the parameters via display and communication • Fine setting of the parameters • Reading the measured values	• Setting and reading the parameters via display and communication • Fine setting of the parameters • Reading the measured values
Status display	--			
		Indicating the ETU status via LEDs	Indicating the ETU status via LEDs	Indicating the ETU status via LEDs
Interface	--			
		Interface for test devices	Interface for test devices	Interface for test devices
Metering function	--	--	--	Metering function integrated
Optional expansions				
	--	--		
			24 V module for continuous power supply (also without primary current through the molded case circuit breaker)	24 V module for continuous power supply (also without primary current through the molded case circuit breaker)
	--			
		EFB300 external function box for connecting to the ETU	EFB300 external function box for connecting to the ETU	EFB300 external function box for connecting to the ETU
	--	--		
			COM060 communication module	COM060 communication module
	--	--		
			COM800/COM100 breaker data server Interface to • PROFIBUS • PROFINET • Modbus RTU • Ethernet (Modbus TCP)	COM800/COM100 breaker data server Interface to • PROFIBUS • PROFINET • Modbus RTU • Ethernet (Modbus TCP)
	--	--		
			DSP800 external display for installing in the cubicle door	DSP800 external display for installing in the cubicle door
	--			
		TD300/TD500 test device	TD300/TD500 test device	TD300/TD500 test device

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Protection functions of the 3VA1 molded case circuit breakers with thermal-magnetic trip unit

	TM120M AM	TM210 FTFM	TM220 ATFM	TM240 ATAM
Protection				
Starter protection	✓	--	--	--
Line protection	--	✓	✓	✓
Version available with				
1-pole and 2-pole breakers	--	✓	--	--
3-pole breaker	✓	✓	✓	✓
4-pole breaker	--	✓	✓	✓
Available protection parameters				
I_r adjustable	--	--	✓	✓
I_i adjustable	✓	--	--	✓
I_r fixed	--	✓	--	--
I_i fixed	--	✓	✓	--
I_N [1)]	--	✓	✓	✓

1) 3VA10 only without N protection
3VA11 without, 50% or 100% N protection
50% N protection from $I_n \geq 100$ A and only in size 160 A

Protection functions of the 3VA2 with electronic trip unit

	ETU310M I	ETU320 LI	ETU330 LIG	ETU340 ELISA®	ETU350 LSI	ETU350M LSI	ETU550 LSI	ETU560 LSIG	ETU850 LSI	ETU860 LSIG	ETU860M LSIG
Protection											
Starter protection	✓	--	--	--	--	--	--	--	--	--	--
Motor protection	--	--	--	--	--	✓	--	--	--	--	✓
Line protection	--	✓	✓	✓	✓	--	✓	✓	✓	✓	--
Generator protection	--	✓	✓	--	✓	--	✓	✓	✓	✓	--
Version available with											
3-pole without external neutral conductor transformer	✓	✓	✓	✓	✓	✓	--	--	--	--	✓
3-pole with external neutral conductor transformer	--	--	--	--	--	--	✓	✓	✓	✓	--
4-pole with protected neutral conductor transformer	--	✓	✓	✓	✓	--	✓	✓	✓	✓	--
Available protection parameters											
Characteristic in L range	I^2t	I^2t	I^2t	I^4t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t
I_r	--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
t_r at 6 x I_r	--	✓	✓	--	✓	--	✓	✓	✓	✓	--
t_c	--	--	--	--	--	✓	--	--	--	--	✓
t_p	--	--	--	--	--	--	--	--	--	--	✓
Thermal image	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Thermal image can be switched on/off	--	--	--	--	--	--	✓	✓	✓	✓	--
I_{sd}	--	--	--	--	✓	✓	✓	✓	✓	✓	✓
t_{sd} at 8 x I_r	--	--	--	--	✓	✓	✓	✓	✓	✓	✓
Characteristic in S range: I^2t_{sd}	--	--	--	--	✓	--	✓	✓	✓	✓	--
Characteristic in S range: selectable I^2t_{sd} / t_{sd}	--	--	--	--	--	--	✓	✓	✓	✓	--
I_i	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
I_N [1)]	--	✓	✓	✓	✓	--	✓	✓	✓	✓	--
I_g	--	--	✓	--	--	--	--	✓	--	✓	✓
t_g at 2 x I_g	--	--	✓	--	--	--	--	✓	--	✓	✓
Characteristic in G range: I^2t_g	--	--	✓	--	--	--	--	✓	--	✓	✓
Characteristic in G range: selectable I^2t_g / t_g	--	--	✓	--	--	--	--	✓	--	✓	✓
Ground-fault alarm function	--	--	--	--	--	--	--	✓	--	✓	✓
Blocking protection	--	--	--	--	--	--	--	--	--	--	✓
ZSI in combination with an EFB external function box	--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Features and options											
Setting by rotary switch	✓	✓	✓	✓	✓	✓	--	--	--	--	--
Setting by ETU display	--	--	--	--	--	--	✓	✓	✓	✓	✓
Data shown on ETU display	--	--	--	--	--	--	✓	✓	✓	✓	✓
Metering function	--	--	--	--	--	--	--	--	✓	✓	✓
Communication option	--	--	--	--	--	--	✓	✓	✓	✓	✓
Front interface	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

1) Available in a version with external current transformer for N conductor or 4-pole breaker

✓Available -- Not available

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

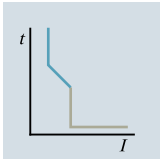
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



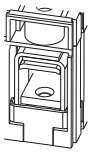
Connection technology	Type	Rated current I_n A	Current setting of the inverse-time delayed overload protection "L" I_r A	Operating current of the instanta-neous short-circuit protection "I" I_i A	SD d	I_{cu} up to 25 kA at 240 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU

1-pole, fixed-mounted, 3VA11, up to 160 A Thermal-magnetic trip unit



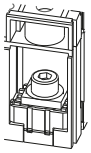


Line protection, 1-pole, TM210 FTFM
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	16	16	320	**3VA1196-3ED16-0AA0**
	20	20	320	**3VA1120-3ED16-0AA0**
	25	25	320	**3VA1125-3ED16-0AA0**
	32	32	320	**3VA1132-3ED16-0AA0**
	40	40	400	**3VA1140-3ED16-0AA0**
	50	50	500	**3VA1150-3ED16-0AA0**
	63	63	630	**3VA1163-3ED16-0AA0**
	80	80	800	**3VA1180-3ED16-0AA0**
	100	100	1000	**3VA1110-3ED16-0AA0**
	125	125	1250	**3VA1112-3ED16-0AA0**
	160	160	1600	**3VA1116-3ED16-0AA0**



Connection with nut keeper kit

3VA11	16	16	320	**3VA1196-3ED12-0AA0**
	20	20	320	**3VA1120-3ED12-0AA0**
	25	25	320	**3VA1125-3ED12-0AA0**
	32	32	320	**3VA1132-3ED12-0AA0**
	40	40	400	**3VA1140-3ED12-0AA0**
	50	50	500	**3VA1150-3ED12-0AA0**
	63	63	630	**3VA1163-3ED12-0AA0**
	80	80	800	**3VA1180-3ED12-0AA0**
	100	100	1000	**3VA1110-3ED12-0AA0**
	125	125	1250	**3VA1112-3ED12-0AA0**
	160	160	1600	**3VA1116-3ED12-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 240 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 55 kA at 240 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d	NEW	
Line protection, 1-pole, TM210 FTFM With fixed overload protection I_r and fixed short-circuit protection I_i						
		Connection with box terminal				
16		**3VA1196-4ED16-0AA0**			**3VA1196-5ED16-0AA0**	
20		**3VA1120-4ED16-0AA0**			**3VA1120-5ED16-0AA0**	
25		**3VA1125-4ED16-0AA0**			**3VA1125-5ED16-0AA0**	
32		**3VA1132-4ED16-0AA0**			**3VA1132-5ED16-0AA0**	
40		**3VA1140-4ED16-0AA0**			**3VA1140-5ED16-0AA0**	
50		**3VA1150-4ED16-0AA0**			**3VA1150-5ED16-0AA0**	
63		**3VA1163-4ED16-0AA0**			**3VA1163-5ED16-0AA0**	
80		**3VA1180-4ED16-0AA0**			**3VA1180-5ED16-0AA0**	
100		**3VA1110-4ED16-0AA0**			**3VA1110-5ED16-0AA0**	
125		**3VA1112-4ED16-0AA0**			**3VA1112-5ED16-0AA0**	
160		**3VA1116-4ED16-0AA0**			**3VA1116-5ED16-0AA0**	
		Connection with nut keeper kit				
16		**3VA1196-4ED12-0AA0**			**3VA1196-5ED12-0AA0**	
20		**3VA1120-4ED12-0AA0**			**3VA1120-5ED12-0AA0**	
25		**3VA1125-4ED12-0AA0**			**3VA1125-5ED12-0AA0**	
32		**3VA1132-4ED12-0AA0**			**3VA1132-5ED12-0AA0**	
40		**3VA1140-4ED12-0AA0**			**3VA1140-5ED12-0AA0**	
50		**3VA1150-4ED12-0AA0**			**3VA1150-5ED12-0AA0**	
63		**3VA1163-4ED12-0AA0**			**3VA1163-5ED12-0AA0**	
80		**3VA1180-4ED12-0AA0**			**3VA1180-5ED12-0AA0**	
100		**3VA1110-4ED12-0AA0**			**3VA1110-5ED12-0AA0**	
125		**3VA1112-4ED12-0AA0**			**3VA1112-5ED12-0AA0**	
160		**3VA1116-4ED12-0AA0**			**3VA1116-5ED12-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

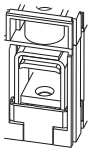
2-pole, fixed-mounted, 3VA11, up to 160 A
Thermal-magnetic trip unit



I201_19027

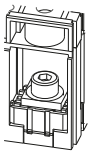


Line protection, 2-pole, TM210 FTFM
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	16	16	320	**3VA1196-3ED26-0AA0**
	20	20	320	**3VA1120-3ED26-0AA0**
	25	25	320	**3VA1125-3ED26-0AA0**
	32	32	320	**3VA1132-3ED26-0AA0**
	40	40	400	**3VA1140-3ED26-0AA0**
	50	50	500	**3VA1150-3ED26-0AA0**
	63	63	630	**3VA1163-3ED26-0AA0**
	80	80	800	**3VA1180-3ED26-0AA0**
	100	100	1000	**3VA1110-3ED26-0AA0**
	125	125	1250	**3VA1112-3ED26-0AA0**
	160	160	1600	**3VA1116-3ED26-0AA0**



Connection with nut keeper kit

3VA11	16	16	320	**3VA1196-3ED22-0AA0**
	20	20	320	**3VA1120-3ED22-0AA0**
	25	25	320	**3VA1125-3ED22-0AA0**
	32	32	320	**3VA1132-3ED22-0AA0**
	40	40	400	**3VA1140-3ED22-0AA0**
	50	50	500	**3VA1150-3ED22-0AA0**
	63	63	630	**3VA1163-3ED22-0AA0**
	80	80	800	**3VA1180-3ED22-0AA0**
	100	100	1000	**3VA1110-3ED22-0AA0**
	125	125	1250	**3VA1112-3ED22-0AA0**
	160	160	1600	**3VA1116-3ED22-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d	NEW	
Line protection, 2-pole, TM210 FTFM With fixed overload protection I_r and fixed short-circuit protection I_i						
		Connection with box terminal				
16		**3VA1196-4ED26-0AA0**			**3VA1196-5ED26-0AA0**	
20		**3VA1120-4ED26-0AA0**			**3VA1120-5ED26-0AA0**	
25		**3VA1125-4ED26-0AA0**			**3VA1125-5ED26-0AA0**	
32		**3VA1132-4ED26-0AA0**			**3VA1132-5ED26-0AA0**	
40		**3VA1140-4ED26-0AA0**			**3VA1140-5ED26-0AA0**	
50		**3VA1150-4ED26-0AA0**			**3VA1150-5ED26-0AA0**	
63		**3VA1163-4ED26-0AA0**			**3VA1163-5ED26-0AA0**	
80		**3VA1180-4ED26-0AA0**			**3VA1180-5ED26-0AA0**	
100		**3VA1110-4ED26-0AA0**			**3VA1110-5ED26-0AA0**	
125		**3VA1112-4ED26-0AA0**			**3VA1112-5ED26-0AA0**	
160		**3VA1116-4ED26-0AA0**			**3VA1116-5ED26-0AA0**	
		Connection with nut keeper kit				
16		**3VA1196-4ED22-0AA0**			**3VA1196-5ED22-0AA0**	
20		**3VA1120-4ED22-0AA0**			**3VA1120-5ED22-0AA0**	
25		**3VA1125-4ED22-0AA0**			**3VA1125-5ED22-0AA0**	
32		**3VA1132-4ED22-0AA0**			**3VA1132-5ED22-0AA0**	
40		**3VA1140-4ED22-0AA0**			**3VA1140-5ED22-0AA0**	
50		**3VA1150-4ED22-0AA0**			**3VA1150-5ED22-0AA0**	
63		**3VA1163-4ED22-0AA0**			**3VA1163-5ED22-0AA0**	
80		**3VA1180-4ED22-0AA0**			**3VA1180-5ED22-0AA0**	
100		**3VA1110-4ED22-0AA0**			**3VA1110-5ED22-0AA0**	
125		**3VA1112-4ED22-0AA0**			**3VA1112-5ED22-0AA0**	
160		**3VA1116-4ED22-0AA0**			**3VA1116-5ED22-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Line protection

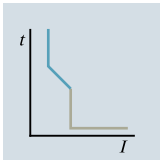
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



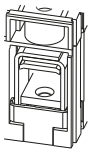
Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} **up to 16 kA at 415 V, very low breaking capacity B** (B) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

3-pole, fixed-mounted, 3VA10, up to 100 A Thermal-magnetic trip unit



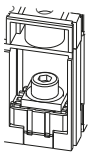


Line protection, TM210 FTFM
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA10	16	16	320	**3VA1096-2ED36-0AA0**
	20	20	320	**3VA1020-2ED36-0AA0**
	25	25	320	**3VA1025-2ED36-0AA0**
	32	32	320	**3VA1032-2ED36-0AA0**
	40	40	400	**3VA1040-2ED36-0AA0**
	50	50	500	**3VA1050-2ED36-0AA0**
	63	63	630	**3VA1063-2ED36-0AA0**
	80	80	800	**3VA1080-2ED36-0AA0**
	100	100	1000	**3VA1010-2ED36-0AA0**



Connection with nut keeper kit

3VA10	16	16	320	**3VA1096-2ED32-0AA0**
	20	20	320	**3VA1020-2ED32-0AA0**
	25	25	320	**3VA1025-2ED32-0AA0**
	32	32	320	**3VA1032-2ED32-0AA0**
	40	40	400	**3VA1040-2ED32-0AA0**
	50	50	500	**3VA1050-2ED32-0AA0**
	63	63	630	**3VA1063-2ED32-0AA0**
	80	80	800	**3VA1080-2ED32-0AA0**
	100	100	1000	**3VA1010-2ED32-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 — Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7 — Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d		
Line protection, TM210 FTFM With fixed overload protection I_r and fixed short-circuit protection I_i						
		Connection with box terminal				
16		**3VA1096-3ED36-0AA0**			**3VA1096-4ED36-0AA0**	
20		**3VA1020-3ED36-0AA0**			**3VA1020-4ED36-0AA0**	
25		**3VA1025-3ED36-0AA0**			**3VA1025-4ED36-0AA0**	
32		**3VA1032-3ED36-0AA0**			**3VA1032-4ED36-0AA0**	
40		**3VA1040-3ED36-0AA0**			**3VA1040-4ED36-0AA0**	
50		**3VA1050-3ED36-0AA0**			**3VA1050-4ED36-0AA0**	
63		**3VA1063-3ED36-0AA0**			**3VA1063-4ED36-0AA0**	
80		**3VA1080-3ED36-0AA0**			**3VA1080-4ED36-0AA0**	
100		**3VA1010-3ED36-0AA0**			**3VA1010-4ED36-0AA0**	
		Connection with nut keeper kit				
16		**3VA1096-3ED32-0AA0**			**3VA1096-4ED32-0AA0**	
20		**3VA1020-3ED32-0AA0**			**3VA1020-4ED32-0AA0**	
25		**3VA1025-3ED32-0AA0**			**3VA1025-4ED32-0AA0**	
32		**3VA1032-3ED32-0AA0**			**3VA1032-4ED32-0AA0**	
40		**3VA1040-3ED32-0AA0**			**3VA1040-4ED32-0AA0**	
50		**3VA1050-3ED32-0AA0**			**3VA1050-4ED32-0AA0**	
63		**3VA1063-3ED32-0AA0**			**3VA1063-4ED32-0AA0**	
80		**3VA1080-3ED32-0AA0**			**3VA1080-4ED32-0AA0**	
100		**3VA1010-3ED32-0AA0**			**3VA1010-4ED32-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 — Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

3-pole, fixed-mounted, 3VA11, up to 160 A
Thermal-magnetic trip unit



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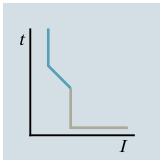
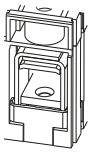
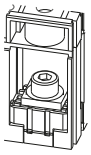


Line protection, TM210 FTFM
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	16	16	320	**3VA1196-3ED36-0AA0**
	20	20	320	**3VA1120-3ED36-0AA0**
	25	25	320	**3VA1125-3ED36-0AA0**
	32	32	320	**3VA1132-3ED36-0AA0**
	40	40	400	**3VA1140-3ED36-0AA0**
	50	50	500	**3VA1150-3ED36-0AA0**
	63	63	630	**3VA1163-3ED36-0AA0**
	80	80	800	**3VA1180-3ED36-0AA0**
	100	100	1000	**3VA1110-3ED36-0AA0**
	125	125	1250	**3VA1112-3ED36-0AA0**
	160	160	1600	**3VA1116-3ED36-0AA0**



Connection with nut keeper kit

3VA11	16	16	320	**3VA1196-3ED32-0AA0**
	20	20	320	**3VA1120-3ED32-0AA0**
	25	25	320	**3VA1125-3ED32-0AA0**
	32	32	320	**3VA1132-3ED32-0AA0**
	40	40	400	**3VA1140-3ED32-0AA0**
	50	50	500	**3VA1150-3ED32-0AA0**
	63	63	630	**3VA1163-3ED32-0AA0**
	80	80	800	**3VA1180-3ED32-0AA0**
	100	100	1000	**3VA1110-3ED32-0AA0**
	125	125	1250	**3VA1112-3ED32-0AA0**
	160	160	1600	**3VA1116-3ED32-0AA0**



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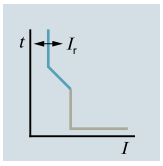
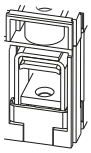
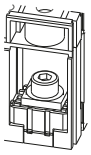


Line protection, TM220 ATFM
With adjustable overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	16	11 ... 16	320	**3VA1196-3EE36-0AA0**
	20	14 ... 20	320	**3VA1120-3EE36-0AA0**
	25	18 ... 25	320	**3VA1125-3EE36-0AA0**
	32	22 ... 32	320	**3VA1132-3EE36-0AA0**
	40	28 ... 40	400	**3VA1140-3EE36-0AA0**
	50	35 ... 50	500	**3VA1150-3EE36-0AA0**
	63	44 ... 63	630	**3VA1163-3EE36-0AA0**
	80	56 ... 80	800	**3VA1180-3EE36-0AA0**
	100	70 ... 100	1000	**3VA1110-3EE36-0AA0**
	125	88 ... 125	1250	**3VA1112-3EE36-0AA0**
	160	112 ... 160	1600	**3VA1116-3EE36-0AA0**



Connection with nut keeper kit

3VA11	16	11 ... 16	320	**3VA1196-3EE32-0AA0**
	20	14 ... 20	320	**3VA1120-3EE32-0AA0**
	25	18 ... 25	320	**3VA1125-3EE32-0AA0**
	32	22 ... 32	320	**3VA1132-3EE32-0AA0**
	40	28 ... 40	400	**3VA1140-3EE32-0AA0**
	50	35 ... 50	500	**3VA1150-3EE32-0AA0**
	63	44 ... 63	630	**3VA1163-3EE32-0AA0**
	80	56 ... 80	800	**3VA1180-3EE32-0AA0**
	100	70 ... 100	1000	**3VA1110-3EE32-0AA0**
	125	88 ... 125	1250	**3VA1112-3EE32-0AA0**
	160	112 ... 160	1600	**3VA1116-3EE32-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d			d		

Line protection, TM210 FTFM

With fixed overload protection I_r and fixed short-circuit protection I_i

	Connection with box terminal			
16	**3VA1196-4ED36-0AA0**	**3VA1196-5ED36-0AA0**	**3VA1196-6ED36-0AA0**	
20	**3VA1120-4ED36-0AA0**	**3VA1120-5ED36-0AA0**	**3VA1120-6ED36-0AA0**	
25	**3VA1125-4ED36-0AA0**	**3VA1125-5ED36-0AA0**	**3VA1125-6ED36-0AA0**	
32	**3VA1132-4ED36-0AA0**	**3VA1132-5ED36-0AA0**	**3VA1132-6ED36-0AA0**	
40	**3VA1140-4ED36-0AA0**	**3VA1140-5ED36-0AA0**	**3VA1140-6ED36-0AA0**	
50	**3VA1150-4ED36-0AA0**	**3VA1150-5ED36-0AA0**	**3VA1150-6ED36-0AA0**	
63	**3VA1163-4ED36-0AA0**	**3VA1163-5ED36-0AA0**	**3VA1163-6ED36-0AA0**	
80	**3VA1180-4ED36-0AA0**	**3VA1180-5ED36-0AA0**	**3VA1180-6ED36-0AA0**	
100	**3VA1110-4ED36-0AA0**	**3VA1110-5ED36-0AA0**	**3VA1110-6ED36-0AA0**	
125	**3VA1112-4ED36-0AA0**	**3VA1112-5ED36-0AA0**	**3VA1112-6ED36-0AA0**	
160	**3VA1116-4ED36-0AA0**	**3VA1116-5ED36-0AA0**	**3VA1116-6ED36-0AA0**	
	Connection with nut keeper kit			
16	**3VA1196-4ED32-0AA0**	**3VA1196-5ED32-0AA0**	**3VA1196-6ED32-0AA0**	
20	**3VA1120-4ED32-0AA0**	**3VA1120-5ED32-0AA0**	**3VA1120-6ED32-0AA0**	
25	**3VA1125-4ED32-0AA0**	**3VA1125-5ED32-0AA0**	**3VA1125-6ED32-0AA0**	
32	**3VA1132-4ED32-0AA0**	**3VA1132-5ED32-0AA0**	**3VA1132-6ED32-0AA0**	
40	**3VA1140-4ED32-0AA0**	**3VA1140-5ED32-0AA0**	**3VA1140-6ED32-0AA0**	
50	**3VA1150-4ED32-0AA0**	**3VA1150-5ED32-0AA0**	**3VA1150-6ED32-0AA0**	
63	**3VA1163-4ED32-0AA0**	**3VA1163-5ED32-0AA0**	**3VA1163-6ED32-0AA0**	
80	**3VA1180-4ED32-0AA0**	**3VA1180-5ED32-0AA0**	**3VA1180-6ED32-0AA0**	
100	**3VA1110-4ED32-0AA0**	**3VA1110-5ED32-0AA0**	**3VA1110-6ED32-0AA0**	
125	**3VA1112-4ED32-0AA0**	**3VA1112-5ED32-0AA0**	**3VA1112-6ED32-0AA0**	
160	**3VA1116-4ED32-0AA0**	**3VA1116-5ED32-0AA0**	**3VA1116-6ED32-0AA0**	

Line protection, TM220 ATFM

With adjustable overload protection I_r and fixed short-circuit protection I_i

	Connection with box terminal			
16	**3VA1196-4EE36-0AA0**	**3VA1196-5EE36-0AA0**	**3VA1196-6EE36-0AA0**	
20	**3VA1120-4EE36-0AA0**	**3VA1120-5EE36-0AA0**	**3VA1120-6EE36-0AA0**	
25	**3VA1125-4EE36-0AA0**	**3VA1125-5EE36-0AA0**	**3VA1125-6EE36-0AA0**	
32	**3VA1132-4EE36-0AA0**	**3VA1132-5EE36-0AA0**	**3VA1132-6EE36-0AA0**	
40	**3VA1140-4EE36-0AA0**	**3VA1140-5EE36-0AA0**	**3VA1140-6EE36-0AA0**	
50	**3VA1150-4EE36-0AA0**	**3VA1150-5EE36-0AA0**	**3VA1150-6EE36-0AA0**	
63	**3VA1163-4EE36-0AA0**	**3VA1163-5EE36-0AA0**	**3VA1163-6EE36-0AA0**	
80	**3VA1180-4EE36-0AA0**	**3VA1180-5EE36-0AA0**	**3VA1180-6EE36-0AA0**	
100	**3VA1110-4EE36-0AA0**	**3VA1110-5EE36-0AA0**	**3VA1110-6EE36-0AA0**	
125	**3VA1112-4EE36-0AA0**	**3VA1112-5EE36-0AA0**	**3VA1112-6EE36-0AA0**	
160	**3VA1116-4EE36-0AA0**	**3VA1116-5EE36-0AA0**	**3VA1116-6EE36-0AA0**	
	Connection with nut keeper kit			
16	**3VA1196-4EE32-0AA0**	**3VA1196-5EE32-0AA0**	**3VA1196-6EE32-0AA0**	
20	**3VA1120-4EE32-0AA0**	**3VA1120-5EE32-0AA0**	**3VA1120-6EE32-0AA0**	
25	**3VA1125-4EE32-0AA0**	**3VA1125-5EE32-0AA0**	**3VA1125-6EE32-0AA0**	
32	**3VA1132-4EE32-0AA0**	**3VA1132-5EE32-0AA0**	**3VA1132-6EE32-0AA0**	
40	**3VA1140-4EE32-0AA0**	**3VA1140-5EE32-0AA0**	**3VA1140-6EE32-0AA0**	
50	**3VA1150-4EE32-0AA0**	**3VA1150-5EE32-0AA0**	**3VA1150-6EE32-0AA0**	
63	**3VA1163-4EE32-0AA0**	**3VA1163-5EE32-0AA0**	**3VA1163-6EE32-0AA0**	
80	**3VA1180-4EE32-0AA0**	**3VA1180-5EE32-0AA0**	**3VA1180-6EE32-0AA0**	
100	**3VA1110-4EE32-0AA0**	**3VA1110-5EE32-0AA0**	**3VA1110-6EE32-0AA0**	
125	**3VA1112-4EE32-0AA0**	**3VA1112-5EE32-0AA0**	**3VA1112-6EE32-0AA0**	
160	**3VA1116-4EE32-0AA0**	**3VA1116-5EE32-0AA0**	**3VA1116-6EE32-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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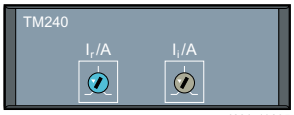
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

3-pole, fixed-mounted, 3VA11/3VA12, up to 250 A
Thermal-magnetic trip unit



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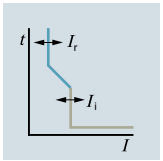
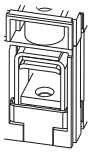
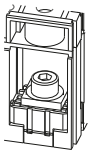


Line protection, TM240 ATAM
With adjustable overload protection I_r and adjustable short-circuit protection I_i



Connection with box terminal

3VA11	16	11 ... 16	160 ... 320	**3VA1196-3EF36-0AA0**
	20	14 ... 20	160 ... 320	**3VA1120-3EF36-0AA0**
	25	18 ... 25	160 ... 320	**3VA1125-3EF36-0AA0**
	32	16 ... 32	160 ... 320	**3VA1132-3EF36-0AA0**
	40	28 ... 40	200 ... 400	**3VA1140-3EF36-0AA0**
	50	35 ... 50	250 ... 500	**3VA1150-3EF36-0AA0**
	63	44 ... 63	315 ... 630	**3VA1163-3EF36-0AA0**
	80	56 ... 80	400 ... 800	**3VA1180-3EF36-0AA0**
	100	70 ... 100	500 ... 1000	**3VA1110-3EF36-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3EF36-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3EF36-0AA0**



Connection with nut keeper kit

3VA11	16	11 ... 16	160 ... 320	**3VA1196-3EF32-0AA0**
	20	14 ... 20	160 ... 320	**3VA1120-3EF32-0AA0**
	25	18 ... 25	160 ... 320	**3VA1125-3EF32-0AA0**
	32	16 ... 32	160 ... 320	**3VA1132-3EF32-0AA0**
	40	28 ... 40	200 ... 400	**3VA1140-3EF32-0AA0**
	50	35 ... 50	250 ... 500	**3VA1150-3EF32-0AA0**
	63	44 ... 63	315 ... 630	**3VA1163-3EF32-0AA0**
	80	56 ... 80	400 ... 800	**3VA1180-3EF32-0AA0**
	100	70 ... 100	500 ... 1000	**3VA1110-3EF32-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3EF32-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3EF32-0AA0**
3VA12	160	112 ... 160	800 ... 1600	--
	200	140 ... 200	1000 ... 2000	--
	250	175 ... 250	1250 ... 2500	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7
		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU
A	d		d		d	
Line protection, TM240 ATAM With adjustable overload protection I_r and adjustable short-circuit protection I_i						
		Connection with box terminal				
16		**3VA1196-4EF36-0AA0**		**3VA1196-5EF36-0AA0**		**3VA1196-6EF36-0AA0**
20		**3VA1120-4EF36-0AA0**		**3VA1120-5EF36-0AA0**		**3VA1120-6EF36-0AA0**
25		**3VA1125-4EF36-0AA0**		**3VA1125-5EF36-0AA0**		**3VA1125-6EF36-0AA0**
32		**3VA1132-4EF36-0AA0**		**3VA1132-5EF36-0AA0**		**3VA1132-6EF36-0AA0**
40		**3VA1140-4EF36-0AA0**		**3VA1140-5EF36-0AA0**		**3VA1140-6EF36-0AA0**
50		**3VA1150-4EF36-0AA0**		**3VA1150-5EF36-0AA0**		**3VA1150-6EF36-0AA0**
63		**3VA1163-4EF36-0AA0**		**3VA1163-5EF36-0AA0**		**3VA1163-6EF36-0AA0**
80		**3VA1180-4EF36-0AA0**		**3VA1180-5EF36-0AA0**		**3VA1180-6EF36-0AA0**
100		**3VA1110-4EF36-0AA0**		**3VA1110-5EF36-0AA0**		**3VA1110-6EF36-0AA0**
125		**3VA1112-4EF36-0AA0**		**3VA1112-5EF36-0AA0**		**3VA1112-6EF36-0AA0**
160		**3VA1116-4EF36-0AA0**		**3VA1116-5EF36-0AA0**		**3VA1116-6EF36-0AA0**
		Connection with nut keeper kit				
16		**3VA1196-4EF32-0AA0**		**3VA1196-5EF32-0AA0**		**3VA1196-6EF32-0AA0**
20		**3VA1120-4EF32-0AA0**		**3VA1120-5EF32-0AA0**		**3VA1120-6EF32-0AA0**
25		**3VA1125-4EF32-0AA0**		**3VA1125-5EF32-0AA0**		**3VA1125-6EF32-0AA0**
32		**3VA1132-4EF32-0AA0**		**3VA1132-5EF32-0AA0**		**3VA1132-6EF32-0AA0**
40		**3VA1140-4EF32-0AA0**		**3VA1140-5EF32-0AA0**		**3VA1140-6EF32-0AA0**
50		**3VA1150-4EF32-0AA0**		**3VA1150-5EF32-0AA0**		**3VA1150-6EF32-0AA0**
63		**3VA1163-4EF32-0AA0**		**3VA1163-5EF32-0AA0**		**3VA1163-6EF32-0AA0**
80		**3VA1180-4EF32-0AA0**		**3VA1180-5EF32-0AA0**		**3VA1180-6EF32-0AA0**
100		**3VA1110-4EF32-0AA0**		**3VA1110-5EF32-0AA0**		**3VA1110-6EF32-0AA0**
125		**3VA1112-4EF32-0AA0**		**3VA1112-5EF32-0AA0**		**3VA1112-6EF32-0AA0**
160		**3VA1116-4EF32-0AA0**		**3VA1116-5EF32-0AA0**		**3VA1116-6EF32-0AA0**
160		**3VA1216-4EF32-0AA0**		**3VA1216-5EF32-0AA0**		**3VA1216-6EF32-0AA0**
200		**3VA1220-4EF32-0AA0**		**3VA1220-5EF32-0AA0**		**3VA1220-6EF32-0AA0**
250		**3VA1225-4EF32-0AA0**		**3VA1225-5EF32-0AA0**		**3VA1225-6EF32-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

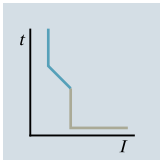


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} **up to 16 kA at 415 V, very low breaking capacity B** (B) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

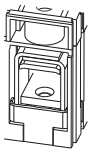
4-pole, fixed-mounted, 3VA10, up to 100 A
Thermal-magnetic trip unit



I201_19027

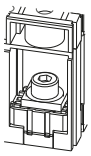


Line protection, TM210 FTFM, without neutral conductor protection
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA10	16	16	320	**3VA1096-2ED46-0AA0**
	20	20	320	**3VA1020-2ED46-0AA0**
	25	25	320	**3VA1025-2ED46-0AA0**
	32	32	320	**3VA1032-2ED46-0AA0**
	40	40	400	**3VA1040-2ED46-0AA0**
	50	50	500	**3VA1050-2ED46-0AA0**
	63	63	630	**3VA1063-2ED46-0AA0**
	80	80	800	**3VA1080-2ED46-0AA0**
	100	100	1000	**3VA1010-2ED46-0AA0**



Connection with nut keeper kit

3VA10	16	16	320	**3VA1096-2ED42-0AA0**
	20	20	320	**3VA1020-2ED42-0AA0**
	25	25	320	**3VA1025-2ED42-0AA0**
	32	32	320	**3VA1032-2ED42-0AA0**
	40	40	400	**3VA1040-2ED42-0AA0**
	50	50	500	**3VA1050-2ED42-0AA0**
	63	63	630	**3VA1063-2ED42-0AA0**
	80	80	800	**3VA1080-2ED42-0AA0**
	100	100	1000	**3VA1010-2ED42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7	
		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d		
Line protection, TM210 FTFM, without neutral conductor protection With fixed overload protection I_r and fixed short-circuit protection I_i						
		Connection with box terminal				
16		**3VA1096-3ED46-0AA0**			**3VA1096-4ED46-0AA0**	
20		**3VA1020-3ED46-0AA0**			**3VA1020-4ED46-0AA0**	
25		**3VA1025-3ED46-0AA0**			**3VA1025-4ED46-0AA0**	
32		**3VA1032-3ED46-0AA0**			**3VA1032-4ED46-0AA0**	
40		**3VA1040-3ED46-0AA0**			**3VA1040-4ED46-0AA0**	
50		**3VA1050-3ED46-0AA0**			**3VA1050-4ED46-0AA0**	
63		**3VA1063-3ED46-0AA0**			**3VA1063-4ED46-0AA0**	
80		**3VA1080-3ED46-0AA0**			**3VA1080-4ED46-0AA0**	
100		**3VA1010-3ED46-0AA0**			**3VA1010-4ED46-0AA0**	
		Connection with nut keeper kit				
16		**3VA1096-3ED42-0AA0**			**3VA1096-4ED42-0AA0**	
20		**3VA1020-3ED42-0AA0**			**3VA1020-4ED42-0AA0**	
25		**3VA1025-3ED42-0AA0**			**3VA1025-4ED42-0AA0**	
32		**3VA1032-3ED42-0AA0**			**3VA1032-4ED42-0AA0**	
40		**3VA1040-3ED42-0AA0**			**3VA1040-4ED42-0AA0**	
50		**3VA1050-3ED42-0AA0**			**3VA1050-4ED42-0AA0**	
63		**3VA1063-3ED42-0AA0**			**3VA1063-4ED42-0AA0**	
80		**3VA1080-3ED42-0AA0**			**3VA1080-4ED42-0AA0**	
100		**3VA1010-3ED42-0AA0**			**3VA1010-4ED42-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

Line protection

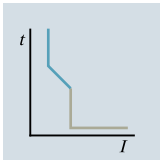
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



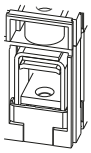
Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

4-pole, fixed-mounted, 3VA11, up to 160 A Thermal-magnetic trip unit



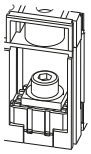


Line protection, TM210 FTFM, without neutral conductor protection
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

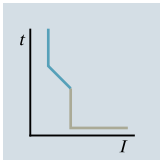
3VA11	16	16	320	**3VA1196-3ED46-0AA0**
	20	20	320	**3VA1120-3ED46-0AA0**
	25	25	320	**3VA1125-3ED46-0AA0**
	32	32	320	**3VA1132-3ED46-0AA0**
	40	40	400	**3VA1140-3ED46-0AA0**
	50	50	500	**3VA1150-3ED46-0AA0**
	63	63	630	**3VA1163-3ED46-0AA0**
	80	80	800	**3VA1180-3ED46-0AA0**
	100	100	1000	**3VA1110-3ED46-0AA0**
	125	125	1250	**3VA1112-3ED46-0AA0**
	160	160	1600	**3VA1116-3ED46-0AA0**



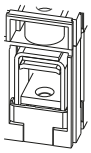
Connection with nut keeper kit

3VA11	16	16	320	**3VA1196-3ED42-0AA0**
	20	20	320	**3VA1120-3ED42-0AA0**
	25	25	320	**3VA1125-3ED42-0AA0**
	32	32	320	**3VA1132-3ED42-0AA0**
	40	40	400	**3VA1140-3ED42-0AA0**
	50	50	500	**3VA1150-3ED42-0AA0**
	63	63	630	**3VA1163-3ED42-0AA0**
	80	80	800	**3VA1180-3ED42-0AA0**
	100	100	1000	**3VA1110-3ED42-0AA0**
	125	125	1250	**3VA1112-3ED42-0AA0**
	160	160	1600	**3VA1116-3ED42-0AA0**



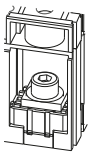


Line protection, TM210 FTFM, 50% neutral conductor protection
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	100	100	1000	**3VA1110-3FD46-0AA0**
	125	125	1250	**3VA1112-3FD46-0AA0**
	160	160	1600	**3VA1116-3FD46-0AA0**



Connection with nut keeper kit

3VA11	100	100	1000	**3VA1110-3FD42-0AA0**
	125	125	1250	**3VA1112-3FD42-0AA0**
	160	160	1600	**3VA1116-3FD42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d			d		

Line protection, TM210 FTFM, without neutral conductor protection

With fixed overload protection I_r and fixed short-circuit protection I_i

Connection with box terminal

16	**3VA1196-4ED46-0AA0**	**3VA1196-5ED46-0AA0**	**3VA1196-6ED46-0AA0**
20	**3VA1120-4ED46-0AA0**	**3VA1120-5ED46-0AA0**	**3VA1120-6ED46-0AA0**
25	**3VA1125-4ED46-0AA0**	**3VA1125-5ED46-0AA0**	**3VA1125-6ED46-0AA0**
32	**3VA1132-4ED46-0AA0**	**3VA1132-5ED46-0AA0**	**3VA1132-6ED46-0AA0**
40	**3VA1140-4ED46-0AA0**	**3VA1140-5ED46-0AA0**	**3VA1140-6ED46-0AA0**
50	**3VA1150-4ED46-0AA0**	**3VA1150-5ED46-0AA0**	**3VA1150-6ED46-0AA0**
63	**3VA1163-4ED46-0AA0**	**3VA1163-5ED46-0AA0**	**3VA1163-6ED46-0AA0**
80	**3VA1180-4ED46-0AA0**	**3VA1180-5ED46-0AA0**	**3VA1180-6ED46-0AA0**
100	**3VA1110-4ED46-0AA0**	**3VA1110-5ED46-0AA0**	**3VA1110-6ED46-0AA0**
125	**3VA1112-4ED46-0AA0**	**3VA1112-5ED46-0AA0**	**3VA1112-6ED46-0AA0**
160	**3VA1116-4ED46-0AA0**	**3VA1116-5ED46-0AA0**	**3VA1116-6ED46-0AA0**

Connection with nut keeper kit

16	**3VA1196-4ED42-0AA0**	**3VA1196-5ED42-0AA0**	**3VA1196-6ED42-0AA0**
20	**3VA1120-4ED42-0AA0**	**3VA1120-5ED42-0AA0**	**3VA1120-6ED42-0AA0**
25	**3VA1125-4ED42-0AA0**	**3VA1125-5ED42-0AA0**	**3VA1125-6ED42-0AA0**
32	**3VA1132-4ED42-0AA0**	**3VA1132-5ED42-0AA0**	**3VA1132-6ED42-0AA0**
40	**3VA1140-4ED42-0AA0**	**3VA1140-5ED42-0AA0**	**3VA1140-6ED42-0AA0**
50	**3VA1150-4ED42-0AA0**	**3VA1150-5ED42-0AA0**	**3VA1150-6ED42-0AA0**
63	**3VA1163-4ED42-0AA0**	**3VA1163-5ED42-0AA0**	**3VA1163-6ED42-0AA0**
80	**3VA1180-4ED42-0AA0**	**3VA1180-5ED42-0AA0**	**3VA1180-6ED42-0AA0**
100	**3VA1110-4ED42-0AA0**	**3VA1110-5ED42-0AA0**	**3VA1110-6ED42-0AA0**
125	**3VA1112-4ED42-0AA0**	**3VA1112-5ED42-0AA0**	**3VA1112-6ED42-0AA0**
160	**3VA1116-4ED42-0AA0**	**3VA1116-5ED42-0AA0**	**3VA1116-6ED42-0AA0**

Line protection, TM210 FTFM, 50% neutral conductor protection

With fixed overload protection I_r and fixed short-circuit protection I_i

Connection with box terminal

100	**3VA1110-4FD46-0AA0**	**3VA1110-5FD46-0AA0**	**3VA1110-6FD46-0AA0**
125	**3VA1112-4FD46-0AA0**	**3VA1112-5FD46-0AA0**	**3VA1112-6FD46-0AA0**
160	**3VA1116-4FD46-0AA0**	**3VA1116-5FD46-0AA0**	**3VA1116-6FD46-0AA0**

Connection with nut keeper kit

100	**3VA1110-4FD42-0AA0**	**3VA1110-5FD42-0AA0**	**3VA1110-6FD42-0AA0**
125	**3VA1112-4FD42-0AA0**	**3VA1112-5FD42-0AA0**	**3VA1112-6FD42-0AA0**
160	**3VA1116-4FD42-0AA0**	**3VA1116-5FD42-0AA0**	**3VA1116-6FD42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

2

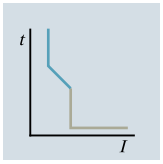


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

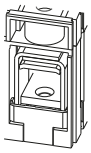
4-pole, fixed-mounted, 3VA11, up to 160 A
Thermal-magnetic trip unit



I201_19027

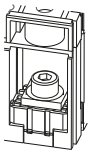


Line protection, TM210 FTFM, 100% neutral conductor protection
With fixed overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	16	16	320	**3VA1196-3GD46-0AA0**
	20	20	320	**3VA1120-3GD46-0AA0**
	25	25	320	**3VA1125-3GD46-0AA0**
	32	32	320	**3VA1132-3GD46-0AA0**
	40	40	400	**3VA1140-3GD46-0AA0**
	50	50	500	**3VA1150-3GD46-0AA0**
	63	63	630	**3VA1163-3GD46-0AA0**
	80	80	800	**3VA1180-3GD46-0AA0**
	100	100	1000	**3VA1110-3GD46-0AA0**
	125	125	1250	**3VA1112-3GD46-0AA0**
	160	160	1600	**3VA1116-3GD46-0AA0**



Connection with nut keeper kit

3VA11	16	16	320	**3VA1196-3GD42-0AA0**
	20	20	320	**3VA1120-3GD42-0AA0**
	25	25	320	**3VA1125-3GD42-0AA0**
	32	32	320	**3VA1132-3GD42-0AA0**
	40	40	400	**3VA1140-3GD42-0AA0**
	50	50	500	**3VA1150-3GD42-0AA0**
	63	63	630	**3VA1163-3GD42-0AA0**
	80	80	800	**3VA1180-3GD42-0AA0**
	100	100	1000	**3VA1110-3GD42-0AA0**
	125	125	1250	**3VA1112-3GD42-0AA0**
	160	160	1600	**3VA1116-3GD42-0AA0**



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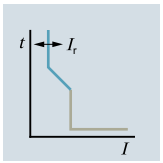
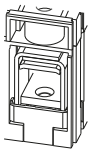
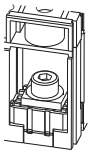


Line protection, TM220 ATFM, without neutral conductor protection
With adjustable overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	16	11 ... 16	320	**3VA1196-3EE46-0AA0**
	20	14 ... 20	320	**3VA1120-3EE46-0AA0**
	25	18 ... 25	320	**3VA1125-3EE46-0AA0**
	32	22 ... 32	320	**3VA1132-3EE46-0AA0**
	40	28 ... 40	400	**3VA1140-3EE46-0AA0**
	50	35 ... 50	500	**3VA1150-3EE46-0AA0**
	63	44 ... 63	630	**3VA1163-3EE46-0AA0**
	80	56 ... 80	800	**3VA1180-3EE46-0AA0**
	100	70 ... 100	1000	**3VA1110-3EE46-0AA0**
	125	88 ... 125	1250	**3VA1112-3EE46-0AA0**
	160	112 ... 160	1600	**3VA1116-3EE46-0AA0**



Connection with nut keeper kit

3VA11	16	11 ... 16	320	**3VA1196-3EE42-0AA0**
	20	14 ... 20	320	**3VA1120-3EE42-0AA0**
	25	18 ... 25	320	**3VA1125-3EE42-0AA0**
	32	22 ... 32	320	**3VA1132-3EE42-0AA0**
	40	28 ... 40	400	**3VA1140-3EE42-0AA0**
	50	35 ... 50	500	**3VA1150-3EE42-0AA0**
	63	44 ... 63	630	**3VA1163-3EE42-0AA0**
	80	56 ... 80	800	**3VA1180-3EE42-0AA0**
	100	70 ... 100	1000	**3VA1110-3EE42-0AA0**
	125	88 ... 125	1250	**3VA1112-3EE42-0AA0**
	160	112 ... 160	1600	**3VA1116-3EE42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d			d		

Line protection, TM210 FTFM, 100% neutral conductor protection

With fixed overload protection I_r and fixed short-circuit protection I_i

Connection with box terminal			
16	**3VA1196-4GD46-0AA0**	**3VA1196-5GD46-0AA0**	**3VA1196-6GD46-0AA0**
20	**3VA1120-4GD46-0AA0**	**3VA1120-5GD46-0AA0**	**3VA1120-6GD46-0AA0**
25	**3VA1125-4GD46-0AA0**	**3VA1125-5GD46-0AA0**	**3VA1125-6GD46-0AA0**
32	**3VA1132-4GD46-0AA0**	**3VA1132-5GD46-0AA0**	**3VA1132-6GD46-0AA0**
40	**3VA1140-4GD46-0AA0**	**3VA1140-5GD46-0AA0**	**3VA1140-6GD46-0AA0**
50	**3VA1150-4GD46-0AA0**	**3VA1150-5GD46-0AA0**	**3VA1150-6GD46-0AA0**
63	**3VA1163-4GD46-0AA0**	**3VA1163-5GD46-0AA0**	**3VA1163-6GD46-0AA0**
80	**3VA1180-4GD46-0AA0**	**3VA1180-5GD46-0AA0**	**3VA1180-6GD46-0AA0**
100	**3VA1110-4GD46-0AA0**	**3VA1110-5GD46-0AA0**	**3VA1110-6GD46-0AA0**
125	**3VA1112-4GD46-0AA0**	**3VA1112-5GD46-0AA0**	**3VA1112-6GD46-0AA0**
160	**3VA1116-4GD46-0AA0**	**3VA1116-5GD46-0AA0**	**3VA1116-6GD46-0AA0**
Connection with nut keeper kit			
16	**3VA1196-4GD42-0AA0**	**3VA1196-5GD42-0AA0**	**3VA1196-6GD42-0AA0**
20	**3VA1120-4GD42-0AA0**	**3VA1120-5GD42-0AA0**	**3VA1120-6GD42-0AA0**
25	**3VA1125-4GD42-0AA0**	**3VA1125-5GD42-0AA0**	**3VA1125-6GD42-0AA0**
32	**3VA1132-4GD42-0AA0**	**3VA1132-5GD42-0AA0**	**3VA1132-6GD42-0AA0**
40	**3VA1140-4GD42-0AA0**	**3VA1140-5GD42-0AA0**	**3VA1140-6GD42-0AA0**
50	**3VA1150-4GD42-0AA0**	**3VA1150-5GD42-0AA0**	**3VA1150-6GD42-0AA0**
63	**3VA1163-4GD42-0AA0**	**3VA1163-5GD42-0AA0**	**3VA1163-6GD42-0AA0**
80	**3VA1180-4GD42-0AA0**	**3VA1180-5GD42-0AA0**	**3VA1180-6GD42-0AA0**
100	**3VA1110-4GD42-0AA0**	**3VA1110-5GD42-0AA0**	**3VA1110-6GD42-0AA0**
125	**3VA1112-4GD42-0AA0**	**3VA1112-5GD42-0AA0**	**3VA1112-6GD42-0AA0**
160	**3VA1116-4GD42-0AA0**	**3VA1116-5GD42-0AA0**	**3VA1116-6GD42-0AA0**

Line protection, TM220 ATFM, without neutral conductor protection

With adjustable overload protection I_r and fixed short-circuit protection I_i

Connection with box terminal			
16	**3VA1196-4EE46-0AA0**	**3VA1196-5EE46-0AA0**	**3VA1196-6EE46-0AA0**
20	**3VA1120-4EE46-0AA0**	**3VA1120-5EE46-0AA0**	**3VA1120-6EE46-0AA0**
25	**3VA1125-4EE46-0AA0**	**3VA1125-5EE46-0AA0**	**3VA1125-6EE46-0AA0**
32	**3VA1132-4EE46-0AA0**	**3VA1132-5EE46-0AA0**	**3VA1132-6EE46-0AA0**
40	**3VA1140-4EE46-0AA0**	**3VA1140-5EE46-0AA0**	**3VA1140-6EE46-0AA0**
50	**3VA1150-4EE46-0AA0**	**3VA1150-5EE46-0AA0**	**3VA1150-6EE46-0AA0**
63	**3VA1163-4EE46-0AA0**	**3VA1163-5EE46-0AA0**	**3VA1163-6EE46-0AA0**
80	**3VA1180-4EE46-0AA0**	**3VA1180-5EE46-0AA0**	**3VA1180-6EE46-0AA0**
100	**3VA1110-4EE46-0AA0**	**3VA1110-5EE46-0AA0**	**3VA1110-6EE46-0AA0**
125	**3VA1112-4EE46-0AA0**	**3VA1112-5EE46-0AA0**	**3VA1112-6EE46-0AA0**
160	**3VA1116-4EE46-0AA0**	**3VA1116-5EE46-0AA0**	**3VA1116-6EE46-0AA0**
Connection with nut keeper kit			
16	**3VA1196-4EE42-0AA0**	**3VA1196-5EE42-0AA0**	**3VA1196-6EE42-0AA0**
20	**3VA1120-4EE42-0AA0**	**3VA1120-5EE42-0AA0**	**3VA1120-6EE42-0AA0**
25	**3VA1125-4EE42-0AA0**	**3VA1125-5EE42-0AA0**	**3VA1125-6EE42-0AA0**
32	**3VA1132-4EE42-0AA0**	**3VA1132-5EE42-0AA0**	**3VA1132-6EE42-0AA0**
40	**3VA1140-4EE42-0AA0**	**3VA1140-5EE42-0AA0**	**3VA1140-6EE42-0AA0**
50	**3VA1150-4EE42-0AA0**	**3VA1150-5EE42-0AA0**	**3VA1150-6EE42-0AA0**
63	**3VA1163-4EE42-0AA0**	**3VA1163-5EE42-0AA0**	**3VA1163-6EE42-0AA0**
80	**3VA1180-4EE42-0AA0**	**3VA1180-5EE42-0AA0**	**3VA1180-6EE42-0AA0**
100	**3VA1110-4EE42-0AA0**	**3VA1110-5EE42-0AA0**	**3VA1110-6EE42-0AA0**
125	**3VA1112-4EE42-0AA0**	**3VA1112-5EE42-0AA0**	**3VA1112-6EE42-0AA0**
160	**3VA1116-4EE42-0AA0**	**3VA1116-5EE42-0AA0**	**3VA1116-6EE42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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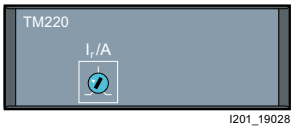
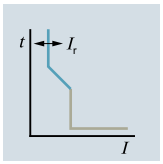
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



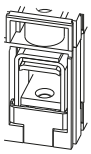
Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

4-pole, fixed-mounted, 3VA11, up to 160 A
Thermal-magnetic trip unit



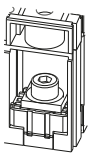


Line protection, TM220 ATFM, 50% neutral conductor protection
With adjustable overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

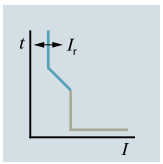
3VA11	100	70 ... 100	1000	**3VA1110-3FE46-0AA0**
	125	88 ... 125	1250	**3VA1112-3FE46-0AA0**
	160	112 ... 160	1600	**3VA1116-3FE46-0AA0**



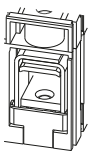
Connection with nut keeper kit

3VA11	100	70 ... 100	1000	**3VA1110-3FE42-0AA0**
	125	88 ... 125	1250	**3VA1112-3FE42-0AA0**
	160	112 ... 160	1600	**3VA1116-3FE42-0AA0**



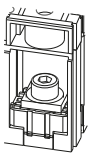


Line protection, TM220 ATFM, 100% neutral conductor protection
With adjustable overload protection I_r and fixed short-circuit protection I_i



Connection with box terminal

3VA11	16	11 ... 16	320	**3VA1196-3GE46-0AA0**
	20	14 ... 20	320	**3VA1120-3GE46-0AA0**
	25	18 ... 25	320	**3VA1125-3GE46-0AA0**
	32	22 ... 32	320	**3VA1132-3GE46-0AA0**
	40	28 ... 40	400	**3VA1140-3GE46-0AA0**
	50	35 ... 50	500	**3VA1150-3GE46-0AA0**
	63	44 ... 63	630	**3VA1163-3GE46-0AA0**
	80	56 ... 80	800	**3VA1180-3GE46-0AA0**
	100	70 ... 100	1000	**3VA1110-3GE46-0AA0**
	125	88 ... 125	1250	**3VA1112-3GE46-0AA0**
	160	112 ... 160	1600	**3VA1116-3GE46-0AA0**



Connection with nut keeper kit

3VA11	16	11 ... 16	320	**3VA1196-3GE42-0AA0**
	20	14 ... 20	320	**3VA1120-3GE42-0AA0**
	25	18 ... 25	320	**3VA1125-3GE42-0AA0**
	32	22 ... 32	320	**3VA1132-3GE42-0AA0**
	40	28 ... 40	400	**3VA1140-3GE42-0AA0**
	50	35 ... 50	500	**3VA1150-3GE42-0AA0**
	63	44 ... 63	630	**3VA1163-3GE42-0AA0**
	80	56 ... 80	800	**3VA1180-3GE42-0AA0**
	100	70 ... 100	1000	**3VA1110-3GE42-0AA0**
	125	88 ... 125	1250	**3VA1112-3GE42-0AA0**
	160	112 ... 160	1600	**3VA1116-3GE42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d			d		

Line protection, TM220 ATFM, 50% neutral conductor protection

With adjustable overload protection I_r and fixed short-circuit protection I_i

Connection with box terminal

100	**3VA1110-4FE46-0AA0**	**3VA1110-5FE46-0AA0**	**3VA1110-6FE46-0AA0**
125	**3VA1112-4FE46-0AA0**	**3VA1112-5FE46-0AA0**	**3VA1112-6FE46-0AA0**
160	**3VA1116-4FE46-0AA0**	**3VA1116-5FE46-0AA0**	**3VA1116-6FE46-0AA0**

Connection with nut keeper kit

100	**3VA1110-4FE42-0AA0**	**3VA1110-5FE42-0AA0**	**3VA1110-6FE42-0AA0**
125	**3VA1112-4FE42-0AA0**	**3VA1112-5FE42-0AA0**	**3VA1112-6FE42-0AA0**
160	**3VA1116-4FE42-0AA0**	**3VA1116-5FE42-0AA0**	**3VA1116-6FE42-0AA0**

Line protection, TM220 ATFM, 100% neutral conductor protection

With adjustable overload protection I_r and fixed short-circuit protection I_i

Connection with box terminal

16	**3VA1196-4GE46-0AA0**	**3VA1196-5GE46-0AA0**	**3VA1196-6GE46-0AA0**
20	**3VA1120-4GE46-0AA0**	**3VA1120-5GE46-0AA0**	**3VA1120-6GE46-0AA0**
25	**3VA1125-4GE46-0AA0**	**3VA1125-5GE46-0AA0**	**3VA1125-6GE46-0AA0**
32	**3VA1132-4GE46-0AA0**	**3VA1132-5GE46-0AA0**	**3VA1132-6GE46-0AA0**
40	**3VA1140-4GE46-0AA0**	**3VA1140-5GE46-0AA0**	**3VA1140-6GE46-0AA0**
50	**3VA1150-4GE46-0AA0**	**3VA1150-5GE46-0AA0**	**3VA1150-6GE46-0AA0**
63	**3VA1163-4GE46-0AA0**	**3VA1163-5GE46-0AA0**	**3VA1163-6GE46-0AA0**
80	**3VA1180-4GE46-0AA0**	**3VA1180-5GE46-0AA0**	**3VA1180-6GE46-0AA0**
100	**3VA1110-4GE46-0AA0**	**3VA1110-5GE46-0AA0**	**3VA1110-6GE46-0AA0**
125	**3VA1112-4GE46-0AA0**	**3VA1112-5GE46-0AA0**	**3VA1112-6GE46-0AA0**
160	**3VA1116-4GE46-0AA0**	**3VA1116-5GE46-0AA0**	**3VA1116-6GE46-0AA0**

Connection with nut keeper kit

16	**3VA1196-4GE42-0AA0**	**3VA1196-5GE42-0AA0**	**3VA1196-6GE42-0AA0**
20	**3VA1120-4GE42-0AA0**	**3VA1120-5GE42-0AA0**	**3VA1120-6GE42-0AA0**
25	**3VA1125-4GE42-0AA0**	**3VA1125-5GE42-0AA0**	**3VA1125-6GE42-0AA0**
32	**3VA1132-4GE42-0AA0**	**3VA1132-5GE42-0AA0**	**3VA1132-6GE42-0AA0**
40	**3VA1140-4GE42-0AA0**	**3VA1140-5GE42-0AA0**	**3VA1140-6GE42-0AA0**
50	**3VA1150-4GE42-0AA0**	**3VA1150-5GE42-0AA0**	**3VA1150-6GE42-0AA0**
63	**3VA1163-4GE42-0AA0**	**3VA1163-5GE42-0AA0**	**3VA1163-6GE42-0AA0**
80	**3VA1180-4GE42-0AA0**	**3VA1180-5GE42-0AA0**	**3VA1180-6GE42-0AA0**
100	**3VA1110-4GE42-0AA0**	**3VA1110-5GE42-0AA0**	**3VA1110-6GE42-0AA0**
125	**3VA1112-4GE42-0AA0**	**3VA1112-5GE42-0AA0**	**3VA1112-6GE42-0AA0**
160	**3VA1116-4GE42-0AA0**	**3VA1116-5GE42-0AA0**	**3VA1116-6GE42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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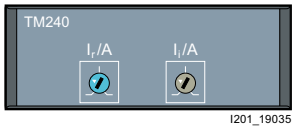
Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

4-pole, fixed-mounted, 3VA11/3VA12, up to 250 A
Thermal-magnetic trip unit



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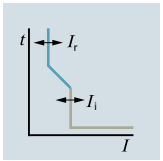
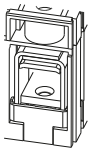


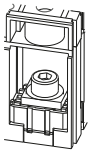
Line protection, TM240 ATAM, without neutral conductor protection
With adjustable overload protection I_r and adjustable short-circuit protection I_i

Connection with box terminal

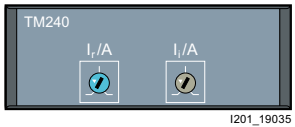


3VA11	16	11 ... 16	160 ... 320	**3VA1196-3EF46-0AA0**
	20	14 ... 20	160 ... 320	**3VA1120-3EF46-0AA0**
	25	18 ... 25	160 ... 320	**3VA1125-3EF46-0AA0**
	32	16 ... 32	160 ... 320	**3VA1132-3EF46-0AA0**
	40	28 ... 40	200 ... 400	**3VA1140-3EF46-0AA0**
	50	35 ... 50	250 ... 500	**3VA1150-3EF46-0AA0**
	63	44 ... 63	315 ... 630	**3VA1163-3EF46-0AA0**
	80	56 ... 80	400 ... 800	**3VA1180-3EF46-0AA0**
	100	70 ... 100	500 ... 1000	**3VA1110-3EF46-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3EF46-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3EF46-0AA0**

Connection with nut keeper kit



3VA11	16	11 ... 16	160 ... 320	**3VA1196-3EF42-0AA0**
	20	14 ... 20	160 ... 320	**3VA1120-3EF42-0AA0**
	25	18 ... 25	160 ... 320	**3VA1125-3EF42-0AA0**
	32	16 ... 32	160 ... 320	**3VA1132-3EF42-0AA0**
	40	28 ... 40	200 ... 400	**3VA1140-3EF42-0AA0**
	50	35 ... 50	250 ... 500	**3VA1150-3EF42-0AA0**
	63	44 ... 63	315 ... 630	**3VA1163-3EF42-0AA0**
	80	56 ... 80	400 ... 800	**3VA1180-3EF42-0AA0**
	100	70 ... 100	500 ... 1000	**3VA1110-3EF42-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3EF42-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3EF42-0AA0**
3VA12	160	112 ... 160	800 ... 1600	--
	200	140 ... 200	1000 ... 2000	--
	250	175 ... 250	1250 ... 2500	--



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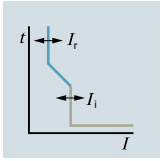
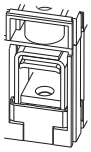


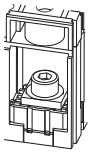
Line protection, TM240 ATAM, 50% neutral conductor protection
With adjustable overload protection I_r and adjustable short-circuit protection I_i

Connection with box terminal



3VA11	100	70 ... 100	500 ... 1000	**3VA1110-3FF46-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3FF46-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3FF46-0AA0**

Connection with nut keeper kit



3VA11	100	70 ... 100	500 ... 1000	**3VA1110-3FF42-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3FF42-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3FF42-0AA0**
3VA12	160	112 ... 160	800 ... 1600	--
	200	140 ... 200	1000 ... 2000	--
	250	175 ... 250	1250 ... 2500	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7
		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU
A	d		d		d	

Line protection, TM240 ATAM, without neutral conductor protection

With adjustable overload protection I_r and adjustable short-circuit protection I_i

	Connection with box terminal		
16	**3VA1196-4EF46-0AA0**	**3VA1196-5EF46-0AA0**	**3VA1196-6EF46-0AA0**
20	**3VA1120-4EF46-0AA0**	**3VA1120-5EF46-0AA0**	**3VA1120-6EF46-0AA0**
25	**3VA1125-4EF46-0AA0**	**3VA1125-5EF46-0AA0**	**3VA1125-6EF46-0AA0**
32	**3VA1132-4EF46-0AA0**	**3VA1132-5EF46-0AA0**	**3VA1132-6EF46-0AA0**
40	**3VA1140-4EF46-0AA0**	**3VA1140-5EF46-0AA0**	**3VA1140-6EF46-0AA0**
50	**3VA1150-4EF46-0AA0**	**3VA1150-5EF46-0AA0**	**3VA1150-6EF46-0AA0**
63	**3VA1163-4EF46-0AA0**	**3VA1163-5EF46-0AA0**	**3VA1163-6EF46-0AA0**
80	**3VA1180-4EF46-0AA0**	**3VA1180-5EF46-0AA0**	**3VA1180-6EF46-0AA0**
100	**3VA1110-4EF46-0AA0**	**3VA1110-5EF46-0AA0**	**3VA1110-6EF46-0AA0**
125	**3VA1112-4EF46-0AA0**	**3VA1112-5EF46-0AA0**	**3VA1112-6EF46-0AA0**
160	**3VA1116-4EF46-0AA0**	**3VA1116-5EF46-0AA0**	**3VA1116-6EF46-0AA0**
	Connection with nut keeper kit		
16	**3VA1196-4EF42-0AA0**	**3VA1196-5EF42-0AA0**	**3VA1196-6EF42-0AA0**
20	**3VA1120-4EF42-0AA0**	**3VA1120-5EF42-0AA0**	**3VA1120-6EF42-0AA0**
25	**3VA1125-4EF42-0AA0**	**3VA1125-5EF42-0AA0**	**3VA1125-6EF42-0AA0**
32	**3VA1132-4EF42-0AA0**	**3VA1132-5EF42-0AA0**	**3VA1132-6EF42-0AA0**
40	**3VA1140-4EF42-0AA0**	**3VA1140-5EF42-0AA0**	**3VA1140-6EF42-0AA0**
50	**3VA1150-4EF42-0AA0**	**3VA1150-5EF42-0AA0**	**3VA1150-6EF42-0AA0**
63	**3VA1163-4EF42-0AA0**	**3VA1163-5EF42-0AA0**	**3VA1163-6EF42-0AA0**
80	**3VA1180-4EF42-0AA0**	**3VA1180-5EF42-0AA0**	**3VA1180-6EF42-0AA0**
100	**3VA1110-4EF42-0AA0**	**3VA1110-5EF42-0AA0**	**3VA1110-6EF42-0AA0**
125	**3VA1112-4EF42-0AA0**	**3VA1112-5EF42-0AA0**	**3VA1112-6EF42-0AA0**
160	**3VA1116-4EF42-0AA0**	**3VA1116-5EF42-0AA0**	**3VA1116-6EF42-0AA0**
160	**3VA1216-4EF42-0AA0**	**3VA1216-5EF42-0AA0**	**3VA1216-6EF42-0AA0**
200	**3VA1220-4EF42-0AA0**	**3VA1220-5EF42-0AA0**	**3VA1220-6EF42-0AA0**
250	**3VA1225-4EF42-0AA0**	**3VA1225-5EF42-0AA0**	**3VA1225-6EF42-0AA0**

Line protection, TM240 ATAM, 50% neutral conductor protection

With adjustable overload protection I_r and adjustable short-circuit protection I_i

	Connection with box terminal		
100	**3VA1110-4FF46-0AA0**	**3VA1110-5FF46-0AA0**	**3VA1110-6FF46-0AA0**
125	**3VA1112-4FF46-0AA0**	**3VA1112-5FF46-0AA0**	**3VA1112-6FF46-0AA0**
160	**3VA1116-4FF46-0AA0**	**3VA1116-5FF46-0AA0**	**3VA1116-6FF46-0AA0**
	Connection with nut keeper kit		
100	**3VA1110-4FF42-0AA0**	**3VA1110-5FF42-0AA0**	**3VA1110-6FF42-0AA0**
125	**3VA1112-4FF42-0AA0**	**3VA1112-5FF42-0AA0**	**3VA1112-6FF42-0AA0**
160	**3VA1116-4FF42-0AA0**	**3VA1116-5FF42-0AA0**	**3VA1116-6FF42-0AA0**
160	**3VA1216-4FF42-0AA0**	**3VA1216-5FF42-0AA0**	**3VA1216-6FF42-0AA0**
200	**3VA1220-4FF42-0AA0**	**3VA1220-5FF42-0AA0**	**3VA1220-6FF42-0AA0**
250	**3VA1225-4FF42-0AA0**	**3VA1225-5FF42-0AA0**	**3VA1225-6FF42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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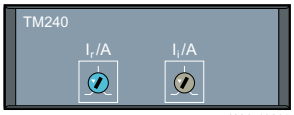
Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

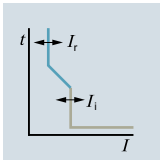


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 25 kA at 415 V, low breaking capacity N (N) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

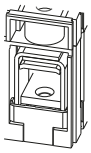
4-pole, fixed-mounted, 3VA11/3VA12, up to 250 A
Thermal-magnetic trip unit



I201_19035

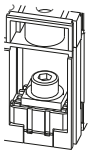


Line protection, TM240 ATAM, 100% neutral conductor protection
With adjustable overload protection I_r and adjustable short-circuit protection I_i



Connection with box terminal

3VA11	16	11 ... 16	160 ... 320	**3VA1196-3GF46-0AA0**
	20	14 ... 20	160 ... 320	**3VA1120-3GF46-0AA0**
	25	18 ... 25	160 ... 320	**3VA1125-3GF46-0AA0**
	32	16 ... 32	160 ... 320	**3VA1132-3GF46-0AA0**
	40	28 ... 40	200 ... 400	**3VA1140-3GF46-0AA0**
	50	35 ... 50	250 ... 500	**3VA1150-3GF46-0AA0**
	63	44 ... 63	315 ... 630	**3VA1163-3GF46-0AA0**
	80	56 ... 80	400 ... 800	**3VA1180-3GF46-0AA0**
	100	70 ... 100	500 ... 1000	**3VA1110-3GF46-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3GF46-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3GF46-0AA0**



Connection with nut keeper kit

3VA11	16	11 ... 16	160 ... 320	**3VA1196-3GF42-0AA0**
	20	14 ... 20	160 ... 320	**3VA1120-3GF42-0AA0**
	25	18 ... 25	160 ... 320	**3VA1125-3GF42-0AA0**
	32	16 ... 32	160 ... 320	**3VA1132-3GF42-0AA0**
	40	28 ... 40	200 ... 400	**3VA1140-3GF42-0AA0**
	50	35 ... 50	250 ... 500	**3VA1150-3GF42-0AA0**
	63	44 ... 63	315 ... 630	**3VA1163-3GF42-0AA0**
	80	56 ... 80	400 ... 800	**3VA1180-3GF42-0AA0**
	100	70 ... 100	500 ... 1000	**3VA1110-3GF42-0AA0**
	125	88 ... 125	625 ... 1250	**3VA1112-3GF42-0AA0**
	160	112 ... 160	800 ... 1600	**3VA1116-3GF42-0AA0**
3VA12	160	112 ... 160	800 ... 1600	--
	200	140 ... 200	1000 ... 2000	--
	250	175 ... 250	1250 ... 2500	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 36 kA at 415 V, standard breaking capacity S (S) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7
		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU
A	d		d		d	

Line protection, TM240 ATAM, 100% neutral conductor protection
With adjustable overload protection I_r and adjustable short-circuit protection I_i

		Connection with box terminal				
16		**3VA1196-4GF46-0AA0**		**3VA1196-5GF46-0AA0**		**3VA1196-6GF46-0AA0**
20		**3VA1120-4GF46-0AA0**		**3VA1120-5GF46-0AA0**		**3VA1120-6GF46-0AA0**
25		**3VA1125-4GF46-0AA0**		**3VA1125-5GF46-0AA0**		**3VA1125-6GF46-0AA0**
32		**3VA1132-4GF46-0AA0**		**3VA1132-5GF46-0AA0**		**3VA1132-6GF46-0AA0**
40		**3VA1140-4GF46-0AA0**		**3VA1140-5GF46-0AA0**		**3VA1140-6GF46-0AA0**
50		**3VA1150-4GF46-0AA0**		**3VA1150-5GF46-0AA0**		**3VA1150-6GF46-0AA0**
63		**3VA1163-4GF46-0AA0**		**3VA1163-5GF46-0AA0**		**3VA1163-6GF46-0AA0**
80		**3VA1180-4GF46-0AA0**		**3VA1180-5GF46-0AA0**		**3VA1180-6GF46-0AA0**
100		**3VA1110-4GF46-0AA0**		**3VA1110-5GF46-0AA0**		**3VA1110-6GF46-0AA0**
125		**3VA1112-4GF46-0AA0**		**3VA1112-5GF46-0AA0**		**3VA1112-6GF46-0AA0**
160		**3VA1116-4GF46-0AA0**		**3VA1116-5GF46-0AA0**		**3VA1116-6GF46-0AA0**
		Connection with nut keeper kit				
16		**3VA1196-4GF42-0AA0**		**3VA1196-5GF42-0AA0**		**3VA1196-6GF42-0AA0**
20		**3VA1120-4GF42-0AA0**		**3VA1120-5GF42-0AA0**		**3VA1120-6GF42-0AA0**
25		**3VA1125-4GF42-0AA0**		**3VA1125-5GF42-0AA0**		**3VA1125-6GF42-0AA0**
32		**3VA1132-4GF42-0AA0**		**3VA1132-5GF42-0AA0**		**3VA1132-6GF42-0AA0**
40		**3VA1140-4GF42-0AA0**		**3VA1140-5GF42-0AA0**		**3VA1140-6GF42-0AA0**
50		**3VA1150-4GF42-0AA0**		**3VA1150-5GF42-0AA0**		**3VA1150-6GF42-0AA0**
63		**3VA1163-4GF42-0AA0**		**3VA1163-5GF42-0AA0**		**3VA1163-6GF42-0AA0**
80		**3VA1180-4GF42-0AA0**		**3VA1180-5GF42-0AA0**		**3VA1180-6GF42-0AA0**
100		**3VA1110-4GF42-0AA0**		**3VA1110-5GF42-0AA0**		**3VA1110-6GF42-0AA0**
125		**3VA1112-4GF42-0AA0**		**3VA1112-5GF42-0AA0**		**3VA1112-6GF42-0AA0**
160		**3VA1116-4GF42-0AA0**		**3VA1116-5GF42-0AA0**		**3VA1116-6GF42-0AA0**
160		**3VA1216-4GF42-0AA0**		**3VA1216-5GF42-0AA0**		**3VA1216-6GF42-0AA0**
200		**3VA1220-4GF42-0AA0**		**3VA1220-5GF42-0AA0**		**3VA1220-6GF42-0AA0**
250		**3VA1225-4GF42-0AA0**		**3VA1225-5GF42-0AA0**		**3VA1225-6GF42-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Starter protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

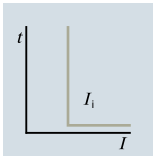


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 — Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

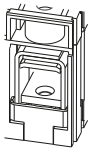
3-pole, fixed-mounted, 3VA11/3VA12, up to 200 A
Magnetic trip unit



I201_19523

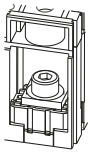


Starter protection, TM110M FM NEW
With fixed short-circuit protection I_i



Connection with box terminal

3VA11	8	--	128	**3VA1108-5MG36-0AA0**
	12.5	--	200	**3VA1192-5MG36-0AA0**

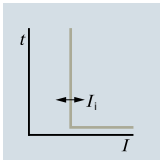


Connection with nut keeper kit

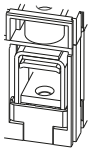
3VA11	8	--	128	**3VA1108-5MG32-0AA0**
	12.5	--	200	**3VA1192-5MG32-0AA0**



I201_19240

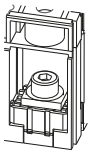


Starter protection, TM120M AM
With adjustable short-circuit protection I_i



Connection with box terminal

3VA11	20	NEW	--	140 ... 320	**3VA1120-5MH36-0AA0**
	32		--	220 ... 510	**3VA1132-5MH36-0AA0**
	40		--	280 ... 640	**3VA1140-5MH36-0AA0**
	50		--	350 ... 800	**3VA1150-5MH36-0AA0**
	63		--	440 ... 1010	**3VA1163-5MH36-0AA0**
	80		--	560 ... 1280	**3VA1180-5MH36-0AA0**
	100		--	700 ... 1600	**3VA1110-5MH36-0AA0**
	125		--	875 ... 2000	**3VA1112-5MH36-0AA0**



Connection with nut keeper kit

3VA11	20	NEW	--	140 ... 320	**3VA1120-5MH32-0AA0**
	32		--	220 ... 510	**3VA1132-5MH32-0AA0**
	40		--	280 ... 640	**3VA1140-5MH32-0AA0**
	50		--	350 ... 800	**3VA1150-5MH32-0AA0**
	63		--	440 ... 1010	**3VA1163-5MH32-0AA0**
	80		--	560 ... 1280	**3VA1180-5MH32-0AA0**
	100		--	700 ... 1600	**3VA1110-5MH32-0AA0**
	125		--	875 ... 2000	**3VA1112-5MH32-0AA0**
3VA12	160		--	1120 ... 2560	**3VA1216-5MH32-0AA0**
	200		--	1200 ... 2800	**3VA1220-5MH32-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} **up to 70 kA at 415 V, high breaking capacity H** (H) See "Overview", p. 2/6 and 2/7
		Article No. www.siemens.com/product?Article No. — Basic price per PU
A	d	

Starter protection, TM110M FM NEW
With fixed short-circuit protection I_i

		Connection with box terminal
8		**3VA1108-6MG36-0AA0**
12.5		**3VA1192-6MG36-0AA0**
		Connection with nut keeper kit
8		**3VA1108-6MG32-0AA0**
12.5		**3VA1192-6MG32-0AA0**

Starter protection, TM120M AM
With adjustable short-circuit protection I_i

		Connection with box terminal
20	NEW	**3VA1120-6MH36-0AA0**
32		**3VA1132-6MH36-0AA0**
40		**3VA1140-6MH36-0AA0**
50		**3VA1150-6MH36-0AA0**
63		**3VA1163-6MH36-0AA0**
80		**3VA1180-6MH36-0AA0**
100		**3VA1110-6MH36-0AA0**
125		**3VA1112-6MH36-0AA0**
		Connection with nut keeper kit
20	NEW	**3VA1120-6MH36-0AA0**
32		**3VA1132-6MH32-0AA0**
40		**3VA1140-6MH32-0AA0**
50		**3VA1150-6MH32-0AA0**
63		**3VA1163-6MH32-0AA0**
80		**3VA1180-6MH32-0AA0**
100		**3VA1110-6MH32-0AA0**
125		**3VA1112-6MH32-0AA0**
160		**3VA1216-6MH32-0AA0**
200		**3VA1220-6MH32-0AA0**

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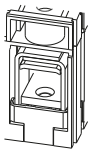
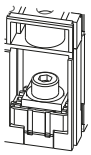
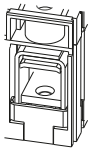
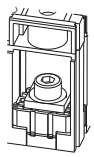
2

Selection and ordering data

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		
3-pole, fixed-mounted, 3VA11/3VA12, up to 250 A Without trip unit							
Switch disconnector without SD100 trip unit							
 **Connection with box terminal**	3VA11	63	--	--		**3VA1163-1AA36-0AA0**	
		100	--	--		**3VA1110-1AA36-0AA0**	
		125	--	--		**3VA1112-1AA36-0AA0**	
		160	--	--		**3VA1116-1AA36-0AA0**	
 **Connection with nut keeper kit**	3VA11	63	--	--		**3VA1163-1AA32-0AA0**	
		100	--	--		**3VA1110-1AA32-0AA0**	
		125	--	--		**3VA1112-1AA32-0AA0**	
		160	--	--		**3VA1116-1AA32-0AA0**	
	3VA12	250	--	--		**3VA1225-1AA32-0AA0**	
4-pole, fixed-mounted, 3VA11/3VA12, up to 250 A Without trip unit							
Switch disconnector without SD100 trip unit							
 **Connection with box terminal**	3VA11	63	--	--		**3VA1163-1AA46-0AA0**	
		100	--	--		**3VA1110-1AA46-0AA0**	
		125	--	--		**3VA1112-1AA46-0AA0**	
		160	--	--		**3VA1116-1AA46-0AA0**	
 **Connection with nut keeper kit**	3VA11	63	--	--		**3VA1163-1AA42-0AA0**	
		100	--	--		**3VA1110-1AA42-0AA0**	
		125	--	--		**3VA1112-1AA42-0AA0**	
		160	--	--		**3VA1116-1AA42-0AA0**	
	3VA12	250	--	--		**3VA1225-1AA42-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Note

You will find the 3VA2 molded case circuit breakers up to 1000 A, IEC from page 2/42 onwards.

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2

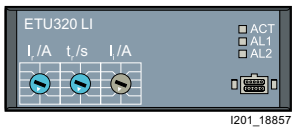
Selection and ordering data

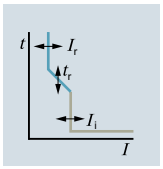
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} **up to 55 kA at 415 V, medium breaking capacity M** See "Overview", p. 2/6 and 2/7 (M)
		A	A	A	d	Article No. www.siemens.com/product?Article No. — Basic price per PU

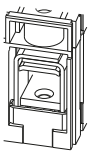
3-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A
Electronic trip unit





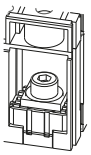
Line protection, ETU320 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i



Connection with box terminal

3VA20	25	10 ... 25	38 ... 300	**3VA2025-5HL36-0AA0**
	40	16 ... 40	60 ... 480	**3VA2040-5HL36-0AA0**
	63	25 ... 63	95 ... 756	**3VA2063-5HL36-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2010-5HL36-0AA0**
3VA21	25	10 ... 25	38 ... 300	**3VA2125-5HL36-0AA0**
	40	16 ... 40	60 ... 480	**3VA2140-5HL36-0AA0**
	63	25 ... 63	95 ... 756	**3VA2163-5HL36-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2110-5HL36-0AA0**
	160	63 ... 160	240 ... 1600	**3VA2116-5HL36-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	38 ... 300	**3VA2025-5HL32-0AA0**
	40	16 ... 40	60 ... 480	**3VA2040-5HL32-0AA0**
	63	25 ... 63	95 ... 756	**3VA2063-5HL32-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2010-5HL32-0AA0**
3VA21	25	10 ... 25	38 ... 300	**3VA2125-5HL32-0AA0**
	40	16 ... 40	60 ... 480	**3VA2140-5HL32-0AA0**
	63	25 ... 63	95 ... 756	**3VA2163-5HL32-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2110-5HL32-0AA0**
	160	63 ... 160	240 ... 1600	**3VA2116-5HL32-0AA0**
3VA22	160	63 ... 160	240 ... 1920	**3VA2216-5HL32-0AA0**
	250	100 ... 250	375 ... 2500	**3VA2225-5HL32-0AA0**
3VA23	250	100 ... 250	375 ... 3000	**3VA2325-5HL32-0AA0**
	400	160 ... 400	600 ... 4000	**3VA2340-5HL32-0AA0**
3VA24	400	160 ... 400	600 ... 4800[1]	**3VA2440-5HL32-0AA0**
	630	250 ... 630	945 ... 5670	**3VA2463-5HL32-0AA0**
3VA25 NEW	630[2]	250 ... 630	945 ... 7560	**3VA2563-5HL32-0AA0**
	800	320 ... 800	1200 ... 8000	**3VA2580-5HL32-0AA0**
	1000	400 ... 1000	1500 ... 10000	**3VA2510-5HL32-0AA0**

1) At breaking capacity L 4400 A
2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} **up to 85 kA at 415 V, high breaking capacity H** (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} **up to 110 kA at 415 V, very high switching capacity C** (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} **up to 150 kA at 415 V, extremely high switching capacity L** (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line protection, ETU320 LI With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i										
			Connection with box terminal							
	25		**3VA2025-6HL36-0AA0**			**3VA2025-7HL36-0AA0**			**3VA2025-8HL36-0AA0**	
	40		**3VA2040-6HL36-0AA0**			**3VA2040-7HL36-0AA0**			**3VA2040-8HL36-0AA0**	
	63		**3VA2063-6HL36-0AA0**			**3VA2063-7HL36-0AA0**			**3VA2063-8HL36-0AA0**	
	100		**3VA2010-6HL36-0AA0**			**3VA2010-7HL36-0AA0**			**3VA2010-8HL36-0AA0**	
	25		**3VA2125-6HL36-0AA0**			**3VA2125-7HL36-0AA0**			**3VA2125-8HL36-0AA0**	
	40		**3VA2140-6HL36-0AA0**			**3VA2140-7HL36-0AA0**			**3VA2140-8HL36-0AA0**	
	63		**3VA2163-6HL36-0AA0**			**3VA2163-7HL36-0AA0**			**3VA2163-8HL36-0AA0**	
	100		**3VA2110-6HL36-0AA0**			**3VA2110-7HL36-0AA0**			**3VA2110-8HL36-0AA0**	
	160		**3VA2116-6HL36-0AA0**			**3VA2116-7HL36-0AA0**			**3VA2116-8HL36-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6HL32-0AA0**			**3VA2025-7HL32-0AA0**			**3VA2025-8HL32-0AA0**	
	40		**3VA2040-6HL32-0AA0**			**3VA2040-7HL32-0AA0**			**3VA2040-8HL32-0AA0**	
	63		**3VA2063-6HL32-0AA0**			**3VA2063-7HL32-0AA0**			**3VA2063-8HL32-0AA0**	
	100		**3VA2010-6HL32-0AA0**			**3VA2010-7HL32-0AA0**			**3VA2010-8HL32-0AA0**	
	25		**3VA2125-6HL32-0AA0**			**3VA2125-7HL32-0AA0**			**3VA2125-8HL32-0AA0**	
	40		**3VA2140-6HL32-0AA0**			**3VA2140-7HL32-0AA0**			**3VA2140-8HL32-0AA0**	
	63		**3VA2163-6HL32-0AA0**			**3VA2163-7HL32-0AA0**			**3VA2163-8HL32-0AA0**	
	100		**3VA2110-6HL32-0AA0**			**3VA2110-7HL32-0AA0**			**3VA2110-8HL32-0AA0**	
	160		**3VA2116-6HL32-0AA0**			**3VA2116-7HL32-0AA0**			**3VA2116-8HL32-0AA0**	
	160		**3VA2216-6HL32-0AA0**			**3VA2216-7HL32-0AA0**			**3VA2216-8HL32-0AA0**	
	250		**3VA2225-6HL32-0AA0**			**3VA2225-7HL32-0AA0**			**3VA2225-8HL32-0AA0**	
	250		**3VA2325-6HL32-0AA0**			**3VA2325-7HL32-0AA0**			**3VA2325-8HL32-0AA0**	
	400		**3VA2340-6HL32-0AA0**			**3VA2340-7HL32-0AA0**			**3VA2340-8HL32-0AA0**	
	400		**3VA2440-6HL32-0AA0**			**3VA2440-7HL32-0AA0**			**3VA2440-8HL32-0AA0**	
	630		**3VA2463-6HL32-0AA0**			**3VA2463-7HL32-0AA0**			**3VA2463-8HL32-0AA0**	
NEW	630[1]		**3VA2563-6HL32-0AA0**			**3VA2563-7HL32-0AA0**			--	
	800		**3VA2580-6HL32-0AA0**			**3VA2580-7HL32-0AA0**			--	
	1000		**3VA2510-6HL32-0AA0**			**3VA2510-7HL32-0AA0**			--	

[1] Start of delivery scheduled for 1st quarter 2018

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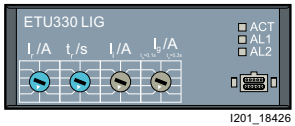
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

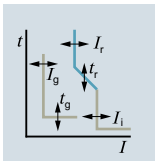


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	Ground-fault protection G I_g	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

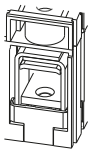
3-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A
Electronic trip unit



I201_18426

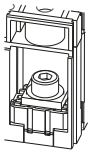


Line protection, ETU330 LIG
With adjustable overload protection I_r, adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g



Connection with box terminal

3VA20	25	10 ... 25	38 ... 300	15 ... 25	**3VA2025-5HM36-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2040-5HM36-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2063-5HM36-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2010-5HM36-0AA0**
3VA21	25	10 ... 25	38 ... 300	15 ... 25	**3VA2125-5HM36-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2140-5HM36-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2163-5HM36-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2110-5HM36-0AA0**
	160	63 ... 160	240 ... 1600	32 ... 160	**3VA2116-5HM36-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	38 ... 300	15 ... 25	**3VA2025-5HM32-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2040-5HM32-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2063-5HM32-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2010-5HM32-0AA0**
3VA21	25	10 ... 25	38 ... 300	15 ... 25	**3VA2125-5HM32-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2140-5HM32-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2163-5HM32-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2110-5HM32-0AA0**
	160	63 ... 160	240 ... 1600	32 ... 160	**3VA2116-5HM32-0AA0**
3VA22	160	63 ... 160	240 ... 1920	32 ... 160	**3VA2216-5HM32-0AA0**
	250	100 ... 250	375 ... 2500	50 ... 250	**3VA2225-5HM32-0AA0**
3VA23	250	100 ... 250	375 ... 3000	50 ... 250	**3VA2325-5HM32-0AA0**
	400	160 ... 400	600 ... 4000	80 ... 400	**3VA2340-5HM32-0AA0**
3VA24	400	160 ... 400	600 ... 4800[1]	80 ... 400	**3VA2440-5HM32-0AA0**
	630	250 ... 630	945 ... 5670	126 ... 630	**3VA2463-5HM32-0AA0**
3VA25 NEW	630[2]	250 ... 630	945 ... 7560	126 ... 630	**3VA2563-5HM32-0AA0**
	800	320 ... 800	1200 ... 8000	160 ... 800	**3VA2580-5HM32-0AA0**
	1000	400 ... 1000	1500 ... 10000	200 ... 1000	**3VA2510-5HM32-0AA0**

1) At breaking capacity L 4400 A
2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line protection, ETU330 LIG With adjustable overload protection I_r, adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g										
			Connection with box terminal							
	25		**3VA2025-6HM36-0AA0**			**3VA2025-7HM36-0AA0**			**3VA2025-8HM36-0AA0**	
	40		**3VA2040-6HM36-0AA0**			**3VA2040-7HM36-0AA0**			**3VA2040-8HM36-0AA0**	
	63		**3VA2063-6HM36-0AA0**			**3VA2063-7HM36-0AA0**			**3VA2063-8HM36-0AA0**	
	100		**3VA2010-6HM36-0AA0**			**3VA2010-7HM36-0AA0**			**3VA2010-8HM36-0AA0**	
	25		**3VA2125-6HM36-0AA0**			**3VA2125-7HM36-0AA0**			**3VA2125-8HM36-0AA0**	
	40		**3VA2140-6HM36-0AA0**			**3VA2140-7HM36-0AA0**			**3VA2140-8HM36-0AA0**	
	63		**3VA2163-6HM36-0AA0**			**3VA2163-7HM36-0AA0**			**3VA2163-8HM36-0AA0**	
	100		**3VA2110-6HM36-0AA0**			**3VA2110-7HM36-0AA0**			**3VA2110-8HM36-0AA0**	
	160		**3VA2116-6HM36-0AA0**			**3VA2116-7HM36-0AA0**			**3VA2116-8HM36-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6HM32-0AA0**			**3VA2025-7HM32-0AA0**			**3VA2025-8HM32-0AA0**	
	40		**3VA2040-6HM32-0AA0**			**3VA2040-7HM32-0AA0**			**3VA2040-8HM32-0AA0**	
	63		**3VA2063-6HM32-0AA0**			**3VA2063-7HM32-0AA0**			**3VA2063-8HM32-0AA0**	
	100		**3VA2010-6HM32-0AA0**			**3VA2010-7HM32-0AA0**			**3VA2010-8HM32-0AA0**	
	25		**3VA2125-6HM32-0AA0**			**3VA2125-7HM32-0AA0**			**3VA2125-8HM32-0AA0**	
	40		**3VA2140-6HM32-0AA0**			**3VA2140-7HM32-0AA0**			**3VA2140-8HM32-0AA0**	
	63		**3VA2163-6HM32-0AA0**			**3VA2163-7HM32-0AA0**			**3VA2163-8HM32-0AA0**	
	100		**3VA2110-6HM32-0AA0**			**3VA2110-7HM32-0AA0**			**3VA2110-8HM32-0AA0**	
	160		**3VA2116-6HM32-0AA0**			**3VA2116-7HM32-0AA0**			**3VA2116-8HM32-0AA0**	
	160		**3VA2216-6HM32-0AA0**			**3VA2216-7HM32-0AA0**			**3VA2216-8HM32-0AA0**	
	250		**3VA2225-6HM32-0AA0**			**3VA2225-7HM32-0AA0**			**3VA2225-8HM32-0AA0**	
	250		**3VA2325-6HM32-0AA0**			**3VA2325-7HM32-0AA0**			**3VA2325-8HM32-0AA0**	
	400		**3VA2340-6HM32-0AA0**			**3VA2340-7HM32-0AA0**			**3VA2340-8HM32-0AA0**	
	400		**3VA2440-6HM32-0AA0**			**3VA2440-7HM32-0AA0**			**3VA2440-8HM32-0AA0**	
	630		**3VA2463-6HM32-0AA0**			**3VA2463-7HM32-0AA0**			**3VA2463-8HM32-0AA0**	
NEW	630[1]		**3VA2563-6HM32-0AA0**			**3VA2563-7HM32-0AA0**			--	
	800		**3VA2580-6HM32-0AA0**			**3VA2580-7HM32-0AA0**			--	
	1000		**3VA2510-6HM32-0AA0**			**3VA2510-7HM32-0AA0**			--	

[1] Start of delivery scheduled for 1st quarter 2018

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Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

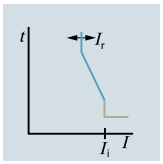


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} **up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

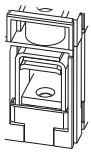
3-pole, fixed-mounted, 3VA21 to 3VA25, up to 1000 A
Electronic trip unit



I201_18427

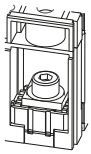


Line protection, ETU340 ELISA
With **easily** adjustable characteristic (characteristic form of a **fuse**)



Connection with box terminal

3VA21	25	10 ... 25	375	**3VA2125-5HK36-0AA0**
	40	16 ... 40	600	**3VA2140-5HK36-0AA0**
	63	25 ... 63	945	**3VA2163-5HK36-0AA0**
	100	40 ... 100	1500	**3VA2110-5HK36-0AA0**



Connection with nut keeper kit

3VA21	25	10 ... 25	375	**3VA2125-5HK32-0AA0**
	40	16 ... 40	600	**3VA2140-5HK32-0AA0**
	63	25 ... 63	945	**3VA2163-5HK32-0AA0**
	100	40 ... 100	1500	**3VA2110-5HK32-0AA0**
3VA22	160	63 ... 160	2400	**3VA2216-5HK32-0AA0**
3VA23	250	100 ... 250	3750	**3VA2325-5HK32-0AA0**
3VA24	400	160 ... 400	6000[1]	**3VA2440-5HK32-0AA0**
	500	200 ... 500	7000	**3VA2450-5HK32-0AA0**
	630	250 ... 630	5670	**3VA2463-5HK32-0AA0**
3VA25 NEW	630[2]	250 ... 630	7560	**3VA2563-5HK32-0AA0**
	800	320 ... 800	8000	**3VA2580-5HK32-0AA0**
	1000	400 ... 1000	10000	**3VA2510-5HK32-0AA0**

[1] At breaking capacity L 4400 A
[2] Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} **up to 85 kA at 415 V, high breaking capacity H** (H) See "Overview", p. 2/6 and 2/7		SD	I_{cu} **up to 110 kA at 415 V, very high switching capacity C** (C) See "Overview", p. 2/6 and 2/7		SD	I_{cu} **up to 150 kA at 415 V, extremely high switching capacity L** (L) See "Overview", p. 2/6 and 2/7	
			Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line protection, ETU340 ELISA With **easily** adjustable characteristic (characteristic form of a **fuse**)										
			Connection with box terminal							
	25		**3VA2125-6HK36-0AA0**			**3VA2125-7HK36-0AA0**			**3VA2125-8HK36-0AA0**	
	40		**3VA2140-6HK36-0AA0**			**3VA2140-7HK36-0AA0**			**3VA2140-8HK36-0AA0**	
	63		**3VA2163-6HK36-0AA0**			**3VA2163-7HK36-0AA0**			**3VA2163-8HK36-0AA0**	
	100		**3VA2110-6HK36-0AA0**			**3VA2110-7HK36-0AA0**			**3VA2110-8HK36-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2125-6HK32-0AA0**			**3VA2125-7HK32-0AA0**			**3VA2125-8HK32-0AA0**	
	40		**3VA2140-6HK32-0AA0**			**3VA2140-7HK32-0AA0**			**3VA2140-8HK32-0AA0**	
	63		**3VA2163-6HK32-0AA0**			**3VA2163-7HK32-0AA0**			**3VA2163-8HK32-0AA0**	
	100		**3VA2110-6HK32-0AA0**			**3VA2110-7HK32-0AA0**			**3VA2110-8HK32-0AA0**	
	160		**3VA2216-6HK32-0AA0**			**3VA2216-7HK32-0AA0**			**3VA2216-8HK32-0AA0**	
	250		**3VA2325-6HK32-0AA0**			**3VA2325-7HK32-0AA0**			**3VA2325-8HK32-0AA0**	
	400		**3VA2440-6HK32-0AA0**			**3VA2440-7HK32-0AA0**			**3VA2440-8HK32-0AA0**	
	500		**3VA2450-6HK32-0AA0**			**3VA2450-7HK32-0AA0**			**3VA2450-8HK32-0AA0**	
	630		**3VA2463-6HK32-0AA0**			**3VA2463-7HK32-0AA0**			**3VA2463-8HK32-0AA0**	
NEW	630[1]		**3VA2563-6HK32-0AA0**			**3VA2563-7HK32-0AA0**			--	
	800		**3VA2580-6HK32-0AA0**			**3VA2580-7HK32-0AA0**			--	
	1000		**3VA2510-6HK32-0AA0**			**3VA2510-7HK32-0AA0**			--	

[1] Start of delivery scheduled for 1st quarter 2018

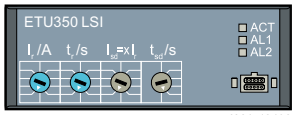
© Siemens 2018

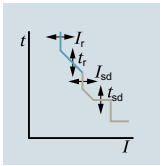
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

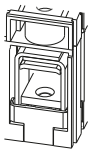
3-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A
Electronic trip unit





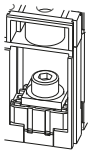
Line and generator protection, ETU350 LSI

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and fixed instantaneous short-circuit protection I_i



Connection with box terminal

		I_r x ...			
3VA20	25	10 ... 25	1.5 ... 10	300	**3VA2025-5HN36-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2040-5HN36-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2063-5HN36-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2010-5HN36-0AA0**
3VA21	25	10 ... 25	1.5 ... 10	300	**3VA2125-5HN36-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2140-5HN36-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2163-5HN36-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2110-5HN36-0AA0**
	160	63 ... 160	1.5 ... 10	1600	**3VA2116-5HN36-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	1.5 ... 10	300	**3VA2025-5HN32-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2040-5HN32-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2063-5HN32-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2010-5HN32-0AA0**
3VA21	25	10 ... 25	1.5 ... 10	300	**3VA2125-5HN32-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2140-5HN32-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2163-5HN32-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2110-5HN32-0AA0**
	160	63 ... 160	1.5 ... 10	1600	**3VA2116-5HN32-0AA0**
3VA22	160	63 ... 160	1.5 ... 10	1920	**3VA2216-5HN32-0AA0**
	250	100 ... 250	1.5 ... 10	2500	**3VA2225-5HN32-0AA0**
3VA23	250	100 ... 250	1.5 ... 10	3000	**3VA2325-5HN32-0AA0**
	400	160 ... 400	1.5 ... 10	4000	**3VA2340-5HN32-0AA0**
3VA24	400	160 ... 400	1.5 ... 10	4800[1]	**3VA2440-5HN32-0AA0**
	630	250 ... 630	1.5 ... 9	5670	**3VA2463-5HN32-0AA0**
3VA25 NEW	630[2]	250 ... 630	1.5 ... 10	7560	**3VA2563-5HN32-0AA0**
	800	320 ... 800	1.5 ... 10	8000	**3VA2580-5HN32-0AA0**
	1000	400 ... 1000	1.5 ... 10	10000	**3VA2510-5HN32-0AA0**

1) At breaking capacity L 4400 A

2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		

Line and generator protection, ETU350 LSI

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and fixed instantaneous ground-fault protection I_i

		Connection with box terminal							
	25	**3VA2025-6HN36-0AA0**			**3VA2025-7HN36-0AA0**			**3VA2025-8HN36-0AA0**	
	40	**3VA2040-6HN36-0AA0**			**3VA2040-7HN36-0AA0**			**3VA2040-8HN36-0AA0**	
	63	**3VA2063-6HN36-0AA0**			**3VA2063-7HN36-0AA0**			**3VA2063-8HN36-0AA0**	
	100	**3VA2010-6HN36-0AA0**			**3VA2010-7HN36-0AA0**			**3VA2010-8HN36-0AA0**	
	25	**3VA2125-6HN36-0AA0**			**3VA2125-7HN36-0AA0**			**3VA2125-8HN36-0AA0**	
	40	**3VA2140-6HN36-0AA0**			**3VA2140-7HN36-0AA0**			**3VA2140-8HN36-0AA0**	
	63	**3VA2163-6HN36-0AA0**			**3VA2163-7HN36-0AA0**			**3VA2163-8HN36-0AA0**	
	100	**3VA2110-6HN36-0AA0**			**3VA2110-7HN36-0AA0**			**3VA2110-8HN36-0AA0**	
	160	**3VA2116-6HN36-0AA0**			**3VA2116-7HN36-0AA0**			**3VA2116-8HN36-0AA0**	
		Connection with nut keeper kit							
	25	**3VA2025-6HN32-0AA0**			**3VA2025-7HN32-0AA0**			**3VA2025-8HN32-0AA0**	
	40	**3VA2040-6HN32-0AA0**			**3VA2040-7HN32-0AA0**			**3VA2040-8HN32-0AA0**	
	63	**3VA2063-6HN32-0AA0**			**3VA2063-7HN32-0AA0**			**3VA2063-8HN32-0AA0**	
	100	**3VA2010-6HN32-0AA0**			**3VA2010-7HN32-0AA0**			**3VA2010-8HN32-0AA0**	
	25	**3VA2125-6HN32-0AA0**			**3VA2125-7HN32-0AA0**			**3VA2125-8HN32-0AA0**	
	40	**3VA2140-6HN32-0AA0**			**3VA2140-7HN32-0AA0**			**3VA2140-8HN32-0AA0**	
	63	**3VA2163-6HN32-0AA0**			**3VA2163-7HN32-0AA0**			**3VA2163-8HN32-0AA0**	
	100	**3VA2110-6HN32-0AA0**			**3VA2110-7HN32-0AA0**			**3VA2110-8HN32-0AA0**	
	160	**3VA2116-6HN32-0AA0**			**3VA2116-7HN32-0AA0**			**3VA2116-8HN32-0AA0**	
	160	**3VA2216-6HN32-0AA0**			**3VA2216-7HN32-0AA0**			**3VA2216-8HN32-0AA0**	
	250	**3VA2225-6HN32-0AA0**			**3VA2225-7HN32-0AA0**			**3VA2225-8HN32-0AA0**	
	250	**3VA2325-6HN32-0AA0**			**3VA2325-7HN32-0AA0**			**3VA2325-8HN32-0AA0**	
	400	**3VA2340-6HN32-0AA0**			**3VA2340-7HN32-0AA0**			**3VA2340-8HN32-0AA0**	
	400	**3VA2440-6HN32-0AA0**			**3VA2440-7HN32-0AA0**			**3VA2440-8HN32-0AA0**	
	630	**3VA2463-6HN32-0AA0**			**3VA2463-7HN32-0AA0**			**3VA2463-8HN32-0AA0**	
NEW	630[1)]	**3VA2563-6HN32-0AA0**			**3VA2563-7HN32-0AA0**			--	
	800	**3VA2580-6HN32-0AA0**			**3VA2580-7HN32-0AA0**			--	
	1000	**3VA2510-6HN32-0AA0**			**3VA2510-7HN32-0AA0**			--	

[1)] Start of delivery scheduled for 1st quarter 2018

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

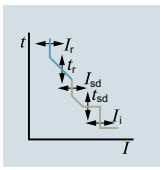


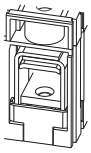
Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

3-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A
Electronic trip unit



I201_18480



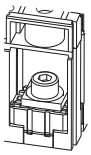


Line and generator protection, with display, ETU550 LSI

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous ground-fault protection I_i

Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JP36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JP36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JP36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JP36-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JP36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JP36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JP36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JP36-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JP36-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JP32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JP32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JP32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JP32-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JP32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JP32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JP32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JP32-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JP32-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5JP32-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5JP32-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5JP32-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5JP32-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1]	**3VA2440-5JP32-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5JP32-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5JP32-0AA0**
3VA25 NEW	630[2]	250 ... 630	378 ... 6300	945 ... 7560	**3VA2563-5JP32-0AA0**
	800	320 ... 800	480 ... 8000	1200 ... 8000	**3VA2580-5JP32-0AA0**
	1000	400 ... 1000	600 ... 10000	1500 ... 10000	**3VA2510-5JP32-0AA0**

1) At breaking capacity L 4400 A

2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line and generator protection, with display, ETU550 LSI With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous ground-fault protection I_i										
			Connection with box terminal							
	25		**3VA2025-6JP36-0AA0**			**3VA2025-7JP36-0AA0**			**3VA2025-8JP36-0AA0**	
	40		**3VA2040-6JP36-0AA0**			**3VA2040-7JP36-0AA0**			**3VA2040-8JP36-0AA0**	
	63		**3VA2063-6JP36-0AA0**			**3VA2063-7JP36-0AA0**			**3VA2063-8JP36-0AA0**	
	100		**3VA2010-6JP36-0AA0**			**3VA2010-7JP36-0AA0**			**3VA2010-8JP36-0AA0**	
	25		**3VA2125-6JP36-0AA0**			**3VA2125-7JP36-0AA0**			**3VA2125-8JP36-0AA0**	
	40		**3VA2140-6JP36-0AA0**			**3VA2140-7JP36-0AA0**			**3VA2140-8JP36-0AA0**	
	63		**3VA2163-6JP36-0AA0**			**3VA2163-7JP36-0AA0**			**3VA2163-8JP36-0AA0**	
	100		**3VA2110-6JP36-0AA0**			**3VA2110-7JP36-0AA0**			**3VA2110-8JP36-0AA0**	
	160		**3VA2116-6JP36-0AA0**			**3VA2116-7JP36-0AA0**			**3VA2116-8JP36-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6JP32-0AA0**			**3VA2025-7JP32-0AA0**			**3VA2025-8JP32-0AA0**	
	40		**3VA2040-6JP32-0AA0**			**3VA2040-7JP32-0AA0**			**3VA2040-8JP32-0AA0**	
	63		**3VA2063-6JP32-0AA0**			**3VA2063-7JP32-0AA0**			**3VA2063-8JP32-0AA0**	
	100		**3VA2010-6JP32-0AA0**			**3VA2010-7JP32-0AA0**			**3VA2010-8JP32-0AA0**	
	25		**3VA2125-6JP32-0AA0**			**3VA2125-7JP32-0AA0**			**3VA2125-8JP32-0AA0**	
	40		**3VA2140-6JP32-0AA0**			**3VA2140-7JP32-0AA0**			**3VA2140-8JP32-0AA0**	
	63		**3VA2163-6JP32-0AA0**			**3VA2163-7JP32-0AA0**			**3VA2163-8JP32-0AA0**	
	100		**3VA2110-6JP32-0AA0**			**3VA2110-7JP32-0AA0**			**3VA2110-8JP32-0AA0**	
	160		**3VA2116-6JP32-0AA0**			**3VA2116-7JP32-0AA0**			**3VA2116-8JP32-0AA0**	
	160		**3VA2216-6JP32-0AA0**			**3VA2216-7JP32-0AA0**			**3VA2216-8JP32-0AA0**	
	250		**3VA2225-6JP32-0AA0**			**3VA2225-7JP32-0AA0**			**3VA2225-8JP32-0AA0**	
	250		**3VA2325-6JP32-0AA0**			**3VA2325-7JP32-0AA0**			**3VA2325-8JP32-0AA0**	
	400		**3VA2340-6JP32-0AA0**			**3VA2340-7JP32-0AA0**			**3VA2340-8JP32-0AA0**	
	400		**3VA2440-6JP32-0AA0**			**3VA2440-7JP32-0AA0**			**3VA2440-8JP32-0AA0**	
	500		**3VA2450-6JP32-0AA0**			**3VA2450-7JP32-0AA0**			**--**	
	630		**3VA2463-6JP32-0AA0**			**3VA2463-7JP32-0AA0**			**3VA2463-8JP32-0AA0**	
NEW	630[1]		**3VA2563-6JP32-0AA0**			**3VA2563-7JP32-0AA0**			**--**	
	800		**3VA2580-6JP32-0AA0**			**3VA2580-7JP32-0AA0**			**--**	
	1000		**3VA2510-6JP32-0AA0**			**3VA2510-7JP32-0AA0**			**--**	

[1] Start of delivery scheduled for 1st quarter 2018

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Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

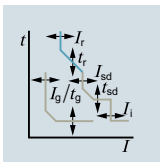


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} **up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7	
							Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

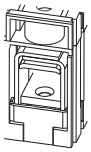
3-pole, fixed-mounted, 3VA20 to 3VA24, up to 630 A
Electronic trip unit



I201_18481

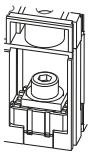


Line and generator protection, with display, ETU560 LSIG
With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd}, adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g



Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JQ36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JQ36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JQ36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JQ36-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JQ36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JQ36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JQ36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JQ36-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JQ36-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JQ32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JQ32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JQ32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JQ32-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JQ32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JQ32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JQ32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JQ32-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JQ32-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5JQ32-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5JQ32-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5JQ32-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5JQ32-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1]	**3VA2440-5JQ32-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5JQ32-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5JQ32-0AA0**

[1] At breaking capacity L 4400 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7
		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU		Article No. www.siemens.com/product?Article No. Basic price per PU
A	d		d		d	
Line and generator protection, with display, ETU560 LSIG With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd}, adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g						
		Connection with box terminal				
25		**3VA2025-6JQ36-0AA0**		**3VA2025-7JQ36-0AA0**		**3VA2025-8JQ36-0AA0**
40		**3VA2040-6JQ36-0AA0**		**3VA2040-7JQ36-0AA0**		**3VA2040-8JQ36-0AA0**
63		**3VA2063-6JQ36-0AA0**		**3VA2063-7JQ36-0AA0**		**3VA2063-8JQ36-0AA0**
100		**3VA2010-6JQ36-0AA0**		**3VA2010-7JQ36-0AA0**		**3VA2010-8JQ36-0AA0**
25		**3VA2125-6JQ36-0AA0**		**3VA2125-7JQ36-0AA0**		**3VA2125-8JQ36-0AA0**
40		**3VA2140-6JQ36-0AA0**		**3VA2140-7JQ36-0AA0**		**3VA2140-8JQ36-0AA0**
63		**3VA2163-6JQ36-0AA0**		**3VA2163-7JQ36-0AA0**		**3VA2163-8JQ36-0AA0**
100		**3VA2110-6JQ36-0AA0**		**3VA2110-7JQ36-0AA0**		**3VA2110-8JQ36-0AA0**
160		**3VA2116-6JQ36-0AA0**		**3VA2116-7JQ36-0AA0**		**3VA2116-8JQ36-0AA0**
		Connection with nut keeper kit				
25		**3VA2025-6JQ32-0AA0**		**3VA2025-7JQ32-0AA0**		**3VA2025-8JQ32-0AA0**
40		**3VA2040-6JQ32-0AA0**		**3VA2040-7JQ32-0AA0**		**3VA2040-8JQ32-0AA0**
63		**3VA2063-6JQ32-0AA0**		**3VA2063-7JQ32-0AA0**		**3VA2063-8JQ32-0AA0**
100		**3VA2010-6JQ32-0AA0**		**3VA2010-7JQ32-0AA0**		**3VA2010-8JQ32-0AA0**
25		**3VA2125-6JQ32-0AA0**		**3VA2125-7JQ32-0AA0**		**3VA2125-8JQ32-0AA0**
40		**3VA2140-6JQ32-0AA0**		**3VA2140-7JQ32-0AA0**		**3VA2140-8JQ32-0AA0**
63		**3VA2163-6JQ32-0AA0**		**3VA2163-7JQ32-0AA0**		**3VA2163-8JQ32-0AA0**
100		**3VA2110-6JQ32-0AA0**		**3VA2110-7JQ32-0AA0**		**3VA2110-8JQ32-0AA0**
160		**3VA2116-6JQ32-0AA0**		**3VA2116-7JQ32-0AA0**		**3VA2116-8JQ32-0AA0**
160		**3VA2216-6JQ32-0AA0**		**3VA2216-7JQ32-0AA0**		**3VA2216-8JQ32-0AA0**
250		**3VA2225-6JQ32-0AA0**		**3VA2225-7JQ32-0AA0**		**3VA2225-8JQ32-0AA0**
250		**3VA2325-6JQ32-0AA0**		**3VA2325-7JQ32-0AA0**		**3VA2325-8JQ32-0AA0**
400		**3VA2340-6JQ32-0AA0**		**3VA2340-7JQ32-0AA0**		**3VA2340-8JQ32-0AA0**
400		**3VA2440-6JQ32-0AA0**		**3VA2440-7JQ32-0AA0**		**3VA2440-8JQ32-0AA0**
500		**3VA2450-6JQ32-0AA0**		**3VA2450-7JQ32-0AA0**		**--**
630		**3VA2463-6JQ32-0AA0**		**3VA2463-7JQ32-0AA0**		**3VA2463-8JQ32-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

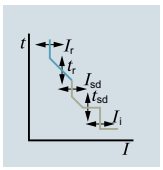


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	**I_{cu} up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

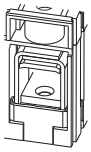
3-pole, fixed-mounted, 3VA20 to 3VA24, up to 630 A Electronic trip unit



I201_18482

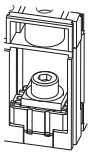


Line and generator protection, with display, with metering function, ETU850 LSI
With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous ground-fault protection I_i



Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KP36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KP36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KP36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KP36-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KP36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KP36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KP36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KP36-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KP36-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KP32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KP32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KP32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KP32-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KP32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KP32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KP32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KP32-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KP32-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5KP32-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5KP32-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5KP32-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5KP32-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1)]	**3VA2440-5KP32-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5KP32-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5KP32-0AA0**

1) At breaking capacity L 4400 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d			d		

Line and generator protection, with display, with metering function, ETU850 LSI
With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous ground-fault protection I_i

		Connection with box terminal							
25		**3VA2025-6KP36-0AA0**			**3VA2025-7KP36-0AA0**			**3VA2025-8KP36-0AA0**	
40		**3VA2040-6KP36-0AA0**			**3VA2040-7KP36-0AA0**			**3VA2040-8KP36-0AA0**	
63		**3VA2063-6KP36-0AA0**			**3VA2063-7KP36-0AA0**			**3VA2063-8KP36-0AA0**	
100		**3VA2010-6KP36-0AA0**			**3VA2010-7KP36-0AA0**			**3VA2010-8KP36-0AA0**	
25		**3VA2125-6KP36-0AA0**			**3VA2125-7KP36-0AA0**			**3VA2125-8KP36-0AA0**	
40		**3VA2140-6KP36-0AA0**			**3VA2140-7KP36-0AA0**			**3VA2140-8KP36-0AA0**	
63		**3VA2163-6KP36-0AA0**			**3VA2163-7KP36-0AA0**			**3VA2163-8KP36-0AA0**	
100		**3VA2110-6KP36-0AA0**			**3VA2110-7KP36-0AA0**			**3VA2110-8KP36-0AA0**	
160		**3VA2116-6KP36-0AA0**			**3VA2116-7KP36-0AA0**			**3VA2116-8KP36-0AA0**	
		Connection with nut keeper kit							
25		**3VA2025-6KP32-0AA0**			**3VA2025-7KP32-0AA0**			**3VA2025-8KP32-0AA0**	
40		**3VA2040-6KP32-0AA0**			**3VA2040-7KP32-0AA0**			**3VA2040-8KP32-0AA0**	
63		**3VA2063-6KP32-0AA0**			**3VA2063-7KP32-0AA0**			**3VA2063-8KP32-0AA0**	
100		**3VA2010-6KP32-0AA0**			**3VA2010-7KP32-0AA0**			**3VA2010-8KP32-0AA0**	
25		**3VA2125-6KP32-0AA0**			**3VA2125-7KP32-0AA0**			**3VA2125-8KP32-0AA0**	
40		**3VA2140-6KP32-0AA0**			**3VA2140-7KP32-0AA0**			**3VA2140-8KP32-0AA0**	
63		**3VA2163-6KP32-0AA0**			**3VA2163-7KP32-0AA0**			**3VA2163-8KP32-0AA0**	
100		**3VA2110-6KP32-0AA0**			**3VA2110-7KP32-0AA0**			**3VA2110-8KP32-0AA0**	
160		**3VA2116-6KP32-0AA0**			**3VA2116-7KP32-0AA0**			**3VA2116-8KP32-0AA0**	
160		**3VA2216-6KP32-0AA0**			**3VA2216-7KP32-0AA0**			**3VA2216-8KP32-0AA0**	
250		**3VA2225-6KP32-0AA0**			**3VA2225-7KP32-0AA0**			**3VA2225-8KP32-0AA0**	
250		**3VA2325-6KP32-0AA0**			**3VA2325-7KP32-0AA0**			**3VA2325-8KP32-0AA0**	
400		**3VA2340-6KP32-0AA0**			**3VA2340-7KP32-0AA0**			**3VA2340-8KP32-0AA0**	
400		**3VA2440-6KP32-0AA0**			**3VA2440-7KP32-0AA0**			**3VA2440-8KP32-0AA0**	
500		**3VA2450-6KP32-0AA0**			**3VA2450-7KP32-0AA0**			--	
630		**3VA2463-6KP32-0AA0**			**3VA2463-7KP32-0AA0**			**3VA2463-8KP32-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

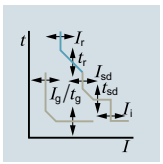


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

3-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A
Electronic trip unit

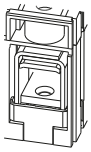


I201_18483



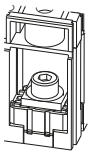
Line and generator protection, with display, with metering function, ETU860 LSIG

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd}, adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g



Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KQ36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KQ36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KQ36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KQ36-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KQ36-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KQ36-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KQ36-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KQ36-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KQ36-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KQ32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KQ32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KQ32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KQ32-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KQ32-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KQ32-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KQ32-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KQ32-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KQ32-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5KQ32-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5KQ32-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5KQ32-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5KQ32-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1]	**3VA2440-5KQ32-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5KQ32-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5KQ32-0AA0**
3VA25 NEW	630[2]	250 ... 630	378 ... 6300	945 ... 7560	**3VA2563-5KQ32-0AA0**
	800	320 ... 800	480 ... 8000	1200 ... 8000	**3VA2580-5KQ32-0AA0**
	1000	400 ... 1000	600 ... 10000	1500 ... 10000	**3VA2510-5KQ32-0AA0**

[1] At breaking capacity L 4400 A

[2] Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line and generator protection, with display, with metering function, ETU860 LSIG										
With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd}, adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g										
			Connection with box terminal							
	25		**3VA2025-6KQ36-0AA0**			**3VA2025-7KQ36-0AA0**			**3VA2025-8KQ36-0AA0**	
	40		**3VA2040-6KQ36-0AA0**			**3VA2040-7KQ36-0AA0**			**3VA2040-8KQ36-0AA0**	
	63		**3VA2063-6KQ36-0AA0**			**3VA2063-7KQ36-0AA0**			**3VA2063-8KQ36-0AA0**	
	100		**3VA2010-6KQ36-0AA0**			**3VA2010-7KQ36-0AA0**			**3VA2010-8KQ36-0AA0**	
	25		**3VA2125-6KQ36-0AA0**			**3VA2125-7KQ36-0AA0**			**3VA2125-8KQ36-0AA0**	
	40		**3VA2140-6KQ36-0AA0**			**3VA2140-7KQ36-0AA0**			**3VA2140-8KQ36-0AA0**	
	63		**3VA2163-6KQ36-0AA0**			**3VA2163-7KQ36-0AA0**			**3VA2163-8KQ36-0AA0**	
	100		**3VA2110-6KQ36-0AA0**			**3VA2110-7KQ36-0AA0**			**3VA2110-8KQ36-0AA0**	
	160		**3VA2116-6KQ36-0AA0**			**3VA2116-7KQ36-0AA0**			**3VA2116-8KQ36-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6KQ32-0AA0**			**3VA2025-7KQ32-0AA0**			**3VA2025-8KQ32-0AA0**	
	40		**3VA2040-6KQ32-0AA0**			**3VA2040-7KQ32-0AA0**			**3VA2040-8KQ32-0AA0**	
	63		**3VA2063-6KQ32-0AA0**			**3VA2063-7KQ32-0AA0**			**3VA2063-8KQ32-0AA0**	
	100		**3VA2010-6KQ32-0AA0**			**3VA2010-7KQ32-0AA0**			**3VA2010-8KQ32-0AA0**	
	25		**3VA2125-6KQ32-0AA0**			**3VA2125-7KQ32-0AA0**			**3VA2125-8KQ32-0AA0**	
	40		**3VA2140-6KQ32-0AA0**			**3VA2140-7KQ32-0AA0**			**3VA2140-8KQ32-0AA0**	
	63		**3VA2163-6KQ32-0AA0**			**3VA2163-7KQ32-0AA0**			**3VA2163-8KQ32-0AA0**	
	100		**3VA2110-6KQ32-0AA0**			**3VA2110-7KQ32-0AA0**			**3VA2110-8KQ32-0AA0**	
	160		**3VA2116-6KQ32-0AA0**			**3VA2116-7KQ32-0AA0**			**3VA2116-8KQ32-0AA0**	
	160		**3VA2216-6KQ32-0AA0**			**3VA2216-7KQ32-0AA0**			**3VA2216-8KQ32-0AA0**	
	250		**3VA2225-6KQ32-0AA0**			**3VA2225-7KQ32-0AA0**			**3VA2225-8KQ32-0AA0**	
	250		**3VA2325-6KQ32-0AA0**			**3VA2325-7KQ32-0AA0**			**3VA2325-8KQ32-0AA0**	
	400		**3VA2340-6KQ32-0AA0**			**3VA2340-7KQ32-0AA0**			**3VA2340-8KQ32-0AA0**	
	400		**3VA2440-6KQ32-0AA0**			**3VA2440-7KQ32-0AA0**			**3VA2440-8KQ32-0AA0**	
	500		**3VA2450-6KQ32-0AA0**			**3VA2450-7KQ32-0AA0**			**--**	
	630		**3VA2463-6KQ32-0AA0**			**3VA2463-7KQ32-0AA0**			**3VA2463-8KQ32-0AA0**	
NEW	630[1)]		**3VA2563-6KQ32-0AA0**			**3VA2563-7KQ32-0AA0**			**--**	
	800		**3VA2580-6KQ32-0AA0**			**3VA2580-7KQ32-0AA0**			**--**	
	1000		**3VA2510-6KQ32-0AA0**			**3VA2510-7KQ32-0AA0**			**--**	

[1)] Start of delivery scheduled for 1st quarter 2018

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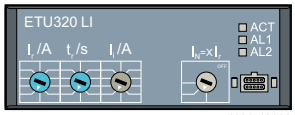
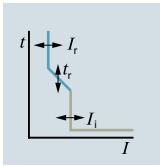
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

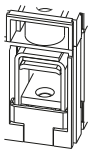
4-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A Electronic trip unit





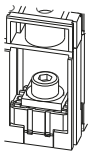
Line protection, ETU320 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A)



Connection with box terminal

3VA20	25	10 ... 25	38 ... 300	**3VA2025-5HL46-0AA0**
	40	16 ... 40	60 ... 480	**3VA2040-5HL46-0AA0**
	63	25 ... 63	95 ... 756	**3VA2063-5HL46-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2010-5HL46-0AA0**
3VA21	25	10 ... 25	38 ... 300	**3VA2125-5HL46-0AA0**
	40	16 ... 40	60 ... 480	**3VA2140-5HL46-0AA0**
	63	25 ... 63	95 ... 756	**3VA2163-5HL46-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2110-5HL46-0AA0**
	160	63 ... 160	240 ... 1600	**3VA2116-5HL46-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	38 ... 300	**3VA2025-5HL42-0AA0**
	40	16 ... 40	60 ... 480	**3VA2040-5HL42-0AA0**
	63	25 ... 63	95 ... 756	**3VA2063-5HL42-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2010-5HL42-0AA0**
3VA21	25	10 ... 25	38 ... 300	**3VA2125-5HL42-0AA0**
	40	16 ... 40	60 ... 480	**3VA2140-5HL42-0AA0**
	63	25 ... 63	95 ... 756	**3VA2163-5HL42-0AA0**
	100	40 ... 100	150 ... 1200	**3VA2110-5HL42-0AA0**
	160	63 ... 160	240 ... 1600	**3VA2116-5HL42-0AA0**
3VA22	160	63 ... 160	240 ... 1920	**3VA2216-5HL42-0AA0**
	250	100 ... 250	375 ... 2500	**3VA2225-5HL42-0AA0**
3VA23	250	100 ... 250	375 ... 3000	**3VA2325-5HL42-0AA0**
	400	160 ... 400	600 ... 4000	**3VA2340-5HL42-0AA0**
3VA24	400	160 ... 400	600 ... 4800[1]	**3VA2440-5HL42-0AA0**
	630	250 ... 630	945 ... 5670	**3VA2463-5HL42-0AA0**
3VA25 NEW	630[2]	250 ...630	945 ... 7560	**3VA2563-5HL42-0AA0**
	800	320 ... 800	1200 ... 8000	**3VA2580-5HL42-0AA0**
	1000	400 ... 1000	1500 ... 10000	**3VA2510-5HL42-0AA0**

1) At breaking capacity L 4400 A

2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		

Line protection, ETU320 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A)

			Connection with box terminal							
	25		**3VA2025-6HL46-0AA0**			**3VA2025-7HL46-0AA0**			**3VA2025-8HL46-0AA0**	
	40		**3VA2040-6HL46-0AA0**			**3VA2040-7HL46-0AA0**			**3VA2040-8HL46-0AA0**	
	63		**3VA2063-6HL46-0AA0**			**3VA2063-7HL46-0AA0**			**3VA2063-8HL46-0AA0**	
	100		**3VA2010-6HL46-0AA0**			**3VA2010-7HL46-0AA0**			**3VA2010-8HL46-0AA0**	
	25		**3VA2125-6HL46-0AA0**			**3VA2125-7HL46-0AA0**			**3VA2125-8HL46-0AA0**	
	40		**3VA2140-6HL46-0AA0**			**3VA2140-7HL46-0AA0**			**3VA2140-8HL46-0AA0**	
	63		**3VA2163-6HL46-0AA0**			**3VA2163-7HL46-0AA0**			**3VA2163-8HL46-0AA0**	
	100		**3VA2110-6HL46-0AA0**			**3VA2110-7HL46-0AA0**			**3VA2110-8HL46-0AA0**	
	160		**3VA2116-6HL46-0AA0**			**3VA2116-7HL46-0AA0**			**3VA2116-8HL46-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6HL42-0AA0**			**3VA2025-7HL42-0AA0**			**3VA2025-8HL42-0AA0**	
	40		**3VA2040-6HL42-0AA0**			**3VA2040-7HL42-0AA0**			**3VA2040-8HL42-0AA0**	
	63		**3VA2063-6HL42-0AA0**			**3VA2063-7HL42-0AA0**			**3VA2063-8HL42-0AA0**	
	100		**3VA2010-6HL42-0AA0**			**3VA2010-7HL42-0AA0**			**3VA2010-8HL42-0AA0**	
	25		**3VA2125-6HL42-0AA0**			**3VA2125-7HL42-0AA0**			**3VA2125-8HL42-0AA0**	
	40		**3VA2140-6HL42-0AA0**			**3VA2140-7HL42-0AA0**			**3VA2140-8HL42-0AA0**	
	63		**3VA2163-6HL42-0AA0**			**3VA2163-7HL42-0AA0**			**3VA2163-8HL42-0AA0**	
	100		**3VA2110-6HL42-0AA0**			**3VA2110-7HL42-0AA0**			**3VA2110-8HL42-0AA0**	
	160		**3VA2116-6HL42-0AA0**			**3VA2116-7HL42-0AA0**			**3VA2116-8HL42-0AA0**	
	160		**3VA2216-6HL42-0AA0**			**3VA2216-7HL42-0AA0**			**3VA2216-8HL42-0AA0**	
	250		**3VA2225-6HL42-0AA0**			**3VA2225-7HL42-0AA0**			**3VA2225-8HL42-0AA0**	
	250		**3VA2325-6HL42-0AA0**			**3VA2325-7HL42-0AA0**			**3VA2325-8HL42-0AA0**	
	400		**3VA2340-6HL42-0AA0**			**3VA2340-7HL42-0AA0**			**3VA2340-8HL42-0AA0**	
	400		**3VA2440-6HL42-0AA0**			**3VA2440-7HL42-0AA0**			**3VA2440-8HL42-0AA0**	
	630		**3VA2463-6HL42-0AA0**			**3VA2463-7HL42-0AA0**			**3VA2463-8HL42-0AA0**	
NEW	630[1]		**3VA2563-6HL42-0AA0**			**3VA2563-7HL42-0AA0**			--	
	800		**3VA2580-6HL42-0AA0**			**3VA2580-7HL42-0AA0**			--	
	1000		**3VA2510-6HL42-0AA0**			**3VA2510-7HL42-0AA0**			--	

[1] Start of delivery scheduled for 1st quarter 2018

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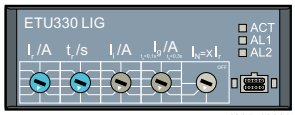
2

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

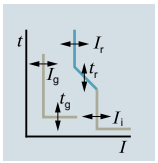


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	Ground-fault protection G I_g	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

4-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A Electronic trip unit

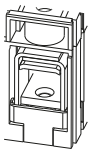


I201_18829



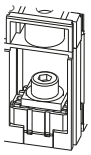
Line protection, ETU330 LIG

With adjustable overload protection I_r, adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A) and adjustable ground-fault protection I_g



Connection with box terminal

3VA20	25	10 ... 25	38 ... 300	15 ... 25	**3VA2025-5HM46-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2040-5HM46-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2063-5HM46-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2010-5HM46-0AA0**
3VA21	25	10 ... 25	38 ... 300	15 ... 25	**3VA2125-5HM46-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2140-5HM46-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2163-5HM46-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2110-5HM46-0AA0**
	160	63 ... 160	240 ... 1600	32 ... 160	**3VA2116-5HM46-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	38 ... 300	15 ... 25	**3VA2025-5HM42-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2040-5HM42-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2063-5HM42-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2010-5HM42-0AA0**
3VA21	25	10 ... 25	38 ... 300	15 ... 25	**3VA2125-5HM42-0AA0**
	40	16 ... 40	60 ... 480	16 ... 40	**3VA2140-5HM42-0AA0**
	63	25 ... 63	95 ... 756	16 ... 63	**3VA2163-5HM42-0AA0**
	100	40 ... 100	150 ... 1200	20 ... 100	**3VA2110-5HM42-0AA0**
	160	63 ... 160	240 ... 1600	32 ... 160	**3VA2116-5HM42-0AA0**
3VA22	160	63 ... 160	240 ... 1920	32 ... 160	**3VA2216-5HM42-0AA0**
	250	100 ... 250	375 ... 2500	50 ... 250	**3VA2225-5HM42-0AA0**
3VA23	250	100 ... 250	375 ... 3000	50 ... 250	**3VA2325-5HM42-0AA0**
	400	160 ... 400	600 ... 4000	80 ... 400	**3VA2340-5HM42-0AA0**
3VA24	400	160 ... 400	600 ... 4800[1]	80 ... 400	**3VA2440-5HM42-0AA0**
	630	250 ... 630	945 ... 5670	126 ... 630	**3VA2463-5HM42-0AA0**
3VA25 NEW	630[2]	250 ... 630	945 ... 7560	126 ... 630	**3VA2563-5HM42-0AA0**
	800	320 ... 800	1200 ... 8000	160 ... 800	**3VA2580-5HM42-0AA0**
	1000	400 ... 1000	1500 ... 10000	200 ... 1000	**3VA2510-5HM42-0AA0**

1) At breaking capacity L 4400 A

2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line protection, ETU330 LIG With adjustable overload protection I_n, adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A) and adjustable ground-fault protection I_g										
			Connection with box terminal							
	25		**3VA2025-6HM46-0AA0**			**3VA2025-7HM46-0AA0**			**3VA2025-8HM46-0AA0**	
	40		**3VA2040-6HM46-0AA0**			**3VA2040-7HM46-0AA0**			**3VA2040-8HM46-0AA0**	
	63		**3VA2063-6HM46-0AA0**			**3VA2063-7HM46-0AA0**			**3VA2063-8HM46-0AA0**	
	100		**3VA2010-6HM46-0AA0**			**3VA2010-7HM46-0AA0**			**3VA2010-8HM46-0AA0**	
	25		**3VA2125-6HM46-0AA0**			**3VA2125-7HM46-0AA0**			**3VA2125-8HM46-0AA0**	
	40		**3VA2140-6HM46-0AA0**			**3VA2140-7HM46-0AA0**			**3VA2140-8HM46-0AA0**	
	63		**3VA2163-6HM46-0AA0**			**3VA2163-7HM46-0AA0**			**3VA2163-8HM46-0AA0**	
	100		**3VA2110-6HM46-0AA0**			**3VA2110-7HM46-0AA0**			**3VA2110-8HM46-0AA0**	
	160		**3VA2116-6HM46-0AA0**			**3VA2116-7HM46-0AA0**			**3VA2116-8HM46-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6HM42-0AA0**			**3VA2025-7HM42-0AA0**			**3VA2025-8HM42-0AA0**	
	40		**3VA2040-6HM42-0AA0**			**3VA2040-7HM42-0AA0**			**3VA2040-8HM42-0AA0**	
	63		**3VA2063-6HM42-0AA0**			**3VA2063-7HM42-0AA0**			**3VA2063-8HM42-0AA0**	
	100		**3VA2010-6HM42-0AA0**			**3VA2010-7HM42-0AA0**			**3VA2010-8HM42-0AA0**	
	25		**3VA2125-6HM42-0AA0**			**3VA2125-7HM42-0AA0**			**3VA2125-8HM42-0AA0**	
	40		**3VA2140-6HM42-0AA0**			**3VA2140-7HM42-0AA0**			**3VA2140-8HM42-0AA0**	
	63		**3VA2163-6HM42-0AA0**			**3VA2163-7HM42-0AA0**			**3VA2163-8HM42-0AA0**	
	100		**3VA2110-6HM42-0AA0**			**3VA2110-7HM42-0AA0**			**3VA2110-8HM42-0AA0**	
	160		**3VA2116-6HM42-0AA0**			**3VA2116-7HM42-0AA0**			**3VA2116-8HM42-0AA0**	
	160		**3VA2216-6HM42-0AA0**			**3VA2216-7HM42-0AA0**			**3VA2216-8HM42-0AA0**	
	250		**3VA2225-6HM42-0AA0**			**3VA2225-7HM42-0AA0**			**3VA2225-8HM42-0AA0**	
	250		**3VA2325-6HM42-0AA0**			**3VA2325-7HM42-0AA0**			**3VA2325-8HM42-0AA0**	
	400		**3VA2340-6HM42-0AA0**			**3VA2340-7HM42-0AA0**			**3VA2340-8HM42-0AA0**	
	400		**3VA2440-6HM42-0AA0**			**3VA2440-7HM42-0AA0**			**3VA2440-8HM42-0AA0**	
	630		**3VA2463-6HM42-0AA0**			**3VA2463-7HM42-0AA0**			**3VA2463-8HM42-0AA0**	
NEW	630[1]		**3VA2563-6HM42-0AA0**			**3VA2563-7HM42-0AA0**			--	
	800		**3VA2580-6HM42-0AA0**			**3VA2580-7HM42-0AA0**			--	
	1000		**3VA2510-6HM42-0AA0**			**3VA2510-7HM42-0AA0**			--	

[1] Start of delivery scheduled for 1st quarter 2018

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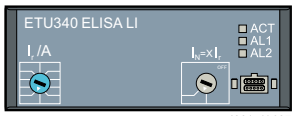
Line protection

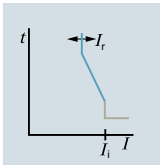
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB



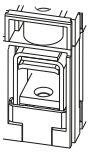
Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} **up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	d		

4-pole, fixed-mounted, 3VA21 to 3VA25, up to 1000 A Electronic trip unit



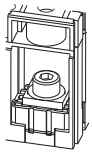


Line protection, ETU340 ELISA
With **easily** adjustable characteristic (characteristic form of a **fuse**)
with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A)



Connection with box terminal

3VA21	25	10 ... 25	375	**3VA2125-5HK46-0AA0**
	40	16 ... 40	600	**3VA2140-5HK46-0AA0**
	63	25 ... 63	945	**3VA2163-5HK46-0AA0**
	100	40 ... 100	1500	**3VA2110-5HK46-0AA0**



Connection with nut keeper kit

3VA21	25	10 ... 25	375	**3VA2125-5HK42-0AA0**
	40	16 ... 40	600	**3VA2140-5HK42-0AA0**
	63	25 ... 63	945	**3VA2163-5HK42-0AA0**
	100	40 ... 100	1500	**3VA2110-5HK42-0AA0**
3VA22	160	63 ... 160	2400	**3VA2216-5HK42-0AA0**
3VA23	250	100 ... 250	3750	**3VA2325-5HK42-0AA0**
3VA24	400	160 ... 400	6000[1]	**3VA2440-5HK42-0AA0**
	500	200 ... 500	7000	**3VA2450-5HK42-0AA0**
	630	250 ... 630	5670	**3VA2463-5HK42-0AA0**
3VA25 NEW	630[2]	250 ... 630	7560	**3VA2563-5HK42-0AA0**
	800	320 ... 800	8000	**3VA2580-5HK42-0AA0**
	1000	400 ... 1000	10000	**3VA2510-5HK42-0AA0**

[1] At breaking capacity L 4400 A
[2] Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7	
			Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
	Line protection, ETU340 ELISA With **easily** adjustable characteristic (characteristic form of a **fuse**) with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A)									
			Connection with box terminal							
	25		**3VA2125-6HK46-0AA0**			**3VA2125-7HK46-0AA0**			**3VA2125-8HK46-0AA0**	
	40		**3VA2140-6HK46-0AA0**			**3VA2140-7HK46-0AA0**			**3VA2140-8HK46-0AA0**	
	63		**3VA2163-6HK46-0AA0**			**3VA2163-7HK46-0AA0**			**3VA2163-8HK46-0AA0**	
	100		**3VA2110-6HK46-0AA0**			**3VA2110-7HK46-0AA0**			**3VA2110-8HK46-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2125-6HK42-0AA0**			**3VA2125-7HK42-0AA0**			**3VA2125-8HK42-0AA0**	
	40		**3VA2140-6HK42-0AA0**			**3VA2140-7HK42-0AA0**			**3VA2140-8HK42-0AA0**	
	63		**3VA2163-6HK42-0AA0**			**3VA2163-7HK42-0AA0**			**3VA2163-8HK42-0AA0**	
	100		**3VA2110-6HK42-0AA0**			**3VA2110-7HK42-0AA0**			**3VA2110-8HK42-0AA0**	
	160		**3VA2216-6HK42-0AA0**			**3VA2216-7HK42-0AA0**			**3VA2216-8HK42-0AA0**	
	250		**3VA2325-6HK42-0AA0**			**3VA2325-7HK42-0AA0**			**3VA2325-8HK42-0AA0**	
	400		**3VA2440-6HK42-0AA0**			**3VA2440-7HK42-0AA0**			**3VA2440-8HK42-0AA0**	
	500		**3VA2450-6HK42-0AA0**			**3VA2450-7HK42-0AA0**			**3VA2450-8HK42-0AA0**	
	630		**3VA2463-6HK42-0AA0**			**3VA2463-7HK42-0AA0**			**3VA2463-8HK42-0AA0**	
NEW	630[1]		**3VA2563-6HK42-0AA0**			**3VA2563-7HK42-0AA0**			--	
	800		**3VA2580-6HK42-0AA0**			**3VA2580-7HK42-0AA0**			--	
	1000		**3VA2510-6HK42-0AA0**			**3VA2510-7HK42-0AA0**			--	

[1] Start of delivery scheduled for 1st quarter 2018

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Molded Case Circuit Breakers

3VA2 Molded Case Circuit Breakers up to 1000 A, IEC

Line protection

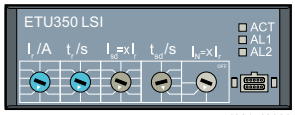
PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

2

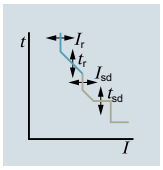


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	**I_{cu} up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

4-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A Electronic trip unit

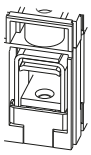


I201_18828



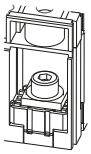
Line and generator protection, ETU350 LSI

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and fixed instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A)



Connection with box terminal

	Rated current I_n	I_r x ...	I_{sd} x I_r	Operating current of the instantaneous short-circuit protection "I" I_i	Article No.
3VA20	25	10 ... 25	1.5 ... 10	300	**3VA2025-5HN46-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2040-5HN46-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2063-5HN46-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2010-5HN46-0AA0**
3VA21	25	10 ... 25	1.5 ... 10	300	**3VA2125-5HN46-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2140-5HN46-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2163-5HN46-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2110-5HN46-0AA0**
	160	63 ... 160	1.5 ... 10	1600	**3VA2116-5HN46-0AA0**



Connection with nut keeper kit

	Rated current I_n	I_r x ...	I_{sd} x I_r	Operating current of the instantaneous short-circuit protection "I" I_i	Article No.
3VA20	25	10 ... 25	1.5 ... 10	300	**3VA2025-5HN42-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2040-5HN42-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2063-5HN42-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2010-5HN42-0AA0**
3VA21	25	10 ... 25	1.5 ... 10	300	**3VA2125-5HN42-0AA0**
	40	16 ... 40	1.5 ... 10	480	**3VA2140-5HN42-0AA0**
	63	25 ... 63	1.5 ... 10	756	**3VA2163-5HN42-0AA0**
	100	40 ... 100	1.5 ... 10	1200	**3VA2110-5HN42-0AA0**
	160	63 ... 160	1.5 ... 10	1600	**3VA2116-5HN42-0AA0**
3VA22	160	63 ... 160	1.5 ... 10	1920	**3VA2216-5HN42-0AA0**
	250	100 ... 250	1.5 ... 10	2500	**3VA2225-5HN42-0AA0**
3VA23	250	100 ... 250	1.5 ... 10	3000	**3VA2325-5HN42-0AA0**
	400	160 ... 400	1.5 ... 10	4000	**3VA2340-5HN42-0AA0**
3VA24	400	160 ... 400	1.5 ... 10	4800[1]	**3VA2440-5HN42-0AA0**
	630	250 ... 630	1.5 ... 9	5670	**3VA2463-5HN42-0AA0**
3VA25 NEW	630[2]	250 ... 630	1.5 ... 10	7560	**3VA2563-5HN42-0AA0**
	800	320 ... 800	1.5 ... 10	8000	**3VA2580-5HN42-0AA0**
	1000	400 ... 1000	1.5 ... 10	10000	**3VA2510-5HN42-0AA0**

1) At breaking capacity L 4400 A

2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7	
			Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
			Connection with box terminal							
	25		**3VA2025-6HN46-0AA0**			**3VA2025-7HN46-0AA0**			**3VA2025-8HN46-0AA0**	
	40		**3VA2040-6HN46-0AA0**			**3VA2040-7HN46-0AA0**			**3VA2040-8HN46-0AA0**	
	63		**3VA2063-6HN46-0AA0**			**3VA2063-7HN46-0AA0**			**3VA2063-8HN46-0AA0**	
	100		**3VA2010-6HN46-0AA0**			**3VA2010-7HN46-0AA0**			**3VA2010-8HN46-0AA0**	
	25		**3VA2125-6HN46-0AA0**			**3VA2125-7HN46-0AA0**			**3VA2125-8HN46-0AA0**	
	40		**3VA2140-6HN46-0AA0**			**3VA2140-7HN46-0AA0**			**3VA2140-8HN46-0AA0**	
	63		**3VA2163-6HN46-0AA0**			**3VA2163-7HN46-0AA0**			**3VA2163-8HN46-0AA0**	
	100		**3VA2110-6HN46-0AA0**			**3VA2110-7HN46-0AA0**			**3VA2110-8HN46-0AA0**	
	160		**3VA2116-6HN46-0AA0**			**3VA2116-7HN46-0AA0**			**3VA2116-8HN46-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6HN42-0AA0**			**3VA2025-7HN42-0AA0**			**3VA2025-8HN42-0AA0**	
	40		**3VA2040-6HN42-0AA0**			**3VA2040-7HN42-0AA0**			**3VA2040-8HN42-0AA0**	
	63		**3VA2063-6HN42-0AA0**			**3VA2063-7HN42-0AA0**			**3VA2063-8HN42-0AA0**	
	100		**3VA2010-6HN42-0AA0**			**3VA2010-7HN42-0AA0**			**3VA2010-8HN42-0AA0**	
	25		**3VA2125-6HN42-0AA0**			**3VA2125-7HN42-0AA0**			**3VA2125-8HN42-0AA0**	
	40		**3VA2140-6HN42-0AA0**			**3VA2140-7HN42-0AA0**			**3VA2140-8HN42-0AA0**	
	63		**3VA2163-6HN42-0AA0**			**3VA2163-7HN42-0AA0**			**3VA2163-8HN42-0AA0**	
	100		**3VA2110-6HN42-0AA0**			**3VA2110-7HN42-0AA0**			**3VA2110-8HN42-0AA0**	
	160		**3VA2116-6HN42-0AA0**			**3VA2116-7HN42-0AA0**			**3VA2116-8HN42-0AA0**	
	160		**3VA2216-6HN42-0AA0**			**3VA2216-7HN42-0AA0**			**3VA2216-8HN42-0AA0**	
	250		**3VA2225-6HN42-0AA0**			**3VA2225-7HN42-0AA0**			**3VA2225-8HN42-0AA0**	
	250		**3VA2325-6HN42-0AA0**			**3VA2325-7HN42-0AA0**			**3VA2325-8HN42-0AA0**	
	400		**3VA2340-6HN42-0AA0**			**3VA2340-7HN42-0AA0**			**3VA2340-8HN42-0AA0**	
	400		**3VA2440-6HN42-0AA0**			**3VA2440-7HN42-0AA0**			**3VA2440-8HN42-0AA0**	
	630		**3VA2463-6HN42-0AA0**			**3VA2463-7HN42-0AA0**			**3VA2463-8HN42-0AA0**	
NEW	630[1)]		**3VA2563-6HN42-0AA0**			**3VA2563-7HN42-0AA0**			--	
	800		**3VA2580-6HN42-0AA0**			**3VA2580-7HN42-0AA0**			--	
	1000		**3VA2510-6HN42-0AA0**			**3VA2510-7HN42-0AA0**			--	

Line and generator protection, ETU350 LSI

With adjustable overload protection I_n, adjustable delayed short-circuit protection I_{sd} and fixed instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit 0%, 50% or 100% (50% only from $I_n \geq 100$ A)

[1)] Start of delivery scheduled for 1st quarter 2018

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

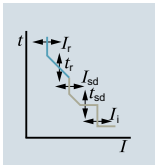


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	**I_{cu} up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

4-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A Electronic trip unit

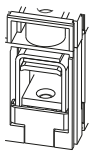


I201_18480



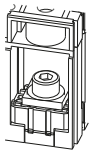
Line and generator protection, with display, ETU550 LSI

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160%



Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JP46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JP46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JP46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JP46-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JP46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JP46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JP46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JP46-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JP46-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JP42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JP42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JP42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JP42-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JP42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JP42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JP42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JP42-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JP42-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5JP42-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5JP42-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5JP42-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5JP42-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1]	**3VA2440-5JP42-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5JP42-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5JP42-0AA0**
3VA25 NEW	630[2]	250 ... 630	378 ... 6300	945 ... 7560	**3VA2563-5JP42-0AA0**
	800	320 ... 800	480 ... 8000	1200 ... 8000	**3VA2580-5JP42-0AA0**
	1000	400 ... 1000	600 ... 10000	1500 ... 10000	**3VA2510-5JP42-0AA0**

1) At breaking capacity L 4400 A

2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line and generator protection, with display, ETU550 LSI										
With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160%										
			Connection with box terminal							
	25		**3VA2025-6JP46-0AA0**			**3VA2025-7JP46-0AA0**			**3VA2025-8JP46-0AA0**	
	40		**3VA2040-6JP46-0AA0**			**3VA2040-7JP46-0AA0**			**3VA2040-8JP46-0AA0**	
	63		**3VA2063-6JP46-0AA0**			**3VA2063-7JP46-0AA0**			**3VA2063-8JP46-0AA0**	
	100		**3VA2010-6JP46-0AA0**			**3VA2010-7JP46-0AA0**			**3VA2010-8JP46-0AA0**	
	25		**3VA2125-6JP46-0AA0**			**3VA2125-7JP46-0AA0**			**3VA2125-8JP46-0AA0**	
	40		**3VA2140-6JP46-0AA0**			**3VA2140-7JP46-0AA0**			**3VA2140-8JP46-0AA0**	
	63		**3VA2163-6JP46-0AA0**			**3VA2163-7JP46-0AA0**			**3VA2163-8JP46-0AA0**	
	100		**3VA2110-6JP46-0AA0**			**3VA2110-7JP46-0AA0**			**3VA2110-8JP46-0AA0**	
	160		**3VA2116-6JP46-0AA0**			**3VA2116-7JP46-0AA0**			**3VA2116-8JP46-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6JP42-0AA0**			**3VA2025-7JP42-0AA0**			**3VA2025-8JP42-0AA0**	
	40		**3VA2040-6JP42-0AA0**			**3VA2040-7JP42-0AA0**			**3VA2040-8JP42-0AA0**	
	63		**3VA2063-6JP42-0AA0**			**3VA2063-7JP42-0AA0**			**3VA2063-8JP42-0AA0**	
	100		**3VA2010-6JP42-0AA0**			**3VA2010-7JP42-0AA0**			**3VA2010-8JP42-0AA0**	
	25		**3VA2125-6JP42-0AA0**			**3VA2125-7JP42-0AA0**			**3VA2125-8JP42-0AA0**	
	40		**3VA2140-6JP42-0AA0**			**3VA2140-7JP42-0AA0**			**3VA2140-8JP42-0AA0**	
	63		**3VA2163-6JP42-0AA0**			**3VA2163-7JP42-0AA0**			**3VA2163-8JP42-0AA0**	
	100		**3VA2110-6JP42-0AA0**			**3VA2110-7JP42-0AA0**			**3VA2110-8JP42-0AA0**	
	160		**3VA2116-6JP42-0AA0**			**3VA2116-7JP42-0AA0**			**3VA2116-8JP42-0AA0**	
	160		**3VA2216-6JP42-0AA0**			**3VA2216-7JP42-0AA0**			**3VA2216-8JP42-0AA0**	
	250		**3VA2225-6JP42-0AA0**			**3VA2225-7JP42-0AA0**			**3VA2225-8JP42-0AA0**	
	250		**3VA2325-6JP42-0AA0**			**3VA2325-7JP42-0AA0**			**3VA2325-8JP42-0AA0**	
	400		**3VA2340-6JP42-0AA0**			**3VA2340-7JP42-0AA0**			**3VA2340-8JP42-0AA0**	
	400		**3VA2440-6JP42-0AA0**			**3VA2440-7JP42-0AA0**			**3VA2440-8JP42-0AA0**	
	500		**3VA2450-6JP42-0AA0**			**3VA2450-7JP42-0AA0**			--	
	630		**3VA2463-6JP42-0AA0**			**3VA2463-7JP42-0AA0**			**3VA2463-8JP42-0AA0**	
NEW	630[1]		**3VA2563-6JP42-0AA0**			**3VA2563-7JP42-0AA0**			--	
	800		**3VA2580-6JP42-0AA0**			**3VA2580-7JP42-0AA0**			--	
	1000		**3VA2510-6JP42-0AA0**			**3VA2510-7JP42-0AA0**			--	

[1] Start of delivery scheduled for 1st quarter 2018

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

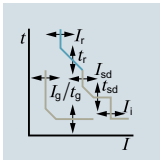


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	**I_{cu} up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7	
		A	A	A	A	d	Article No. www.siemens.com/product?Article No.	Basic price per PU

4-pole, fixed-mounted, 3VA20 to 3VA24, up to 630 A
Electronic trip unit

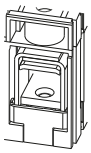


I201_18481



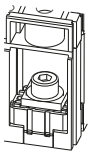
Line and generator protection, with display, ETU560 LSIG

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160% and adjustable ground-fault protection I_g



Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JQ46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JQ46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JQ46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JQ46-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JQ46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JQ46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JQ46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JQ46-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JQ46-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5JQ42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5JQ42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5JQ42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5JQ42-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5JQ42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5JQ42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5JQ42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5JQ42-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5JQ42-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5JQ42-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5JQ42-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5JQ42-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5JQ42-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1]	**3VA2440-5JQ42-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5JQ42-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5JQ42-0AA0**

[1] At breaking capacity L 4400 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

© Siemens 2018

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7	
		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d			d		
Line and generator protection, with display, ETU560 LSIG With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160% and adjustable ground-fault protection I_g									
		Connection with box terminal							
25		**3VA2025-6JQ46-0AA0**			**3VA2025-7JQ46-0AA0**			**3VA2025-8JQ46-0AA0**	
40		**3VA2040-6JQ46-0AA0**			**3VA2040-7JQ46-0AA0**			**3VA2040-8JQ46-0AA0**	
63		**3VA2063-6JQ46-0AA0**			**3VA2063-7JQ46-0AA0**			**3VA2063-8JQ46-0AA0**	
100		**3VA2010-6JQ46-0AA0**			**3VA2010-7JQ46-0AA0**			**3VA2010-8JQ46-0AA0**	
25		**3VA2125-6JQ46-0AA0**			**3VA2125-7JQ46-0AA0**			**3VA2125-8JQ46-0AA0**	
40		**3VA2140-6JQ46-0AA0**			**3VA2140-7JQ46-0AA0**			**3VA2140-8JQ46-0AA0**	
63		**3VA2163-6JQ46-0AA0**			**3VA2163-7JQ46-0AA0**			**3VA2163-8JQ46-0AA0**	
100		**3VA2110-6JQ46-0AA0**			**3VA2110-7JQ46-0AA0**			**3VA2110-8JQ46-0AA0**	
160		**3VA2116-6JQ46-0AA0**			**3VA2116-7JQ46-0AA0**			**3VA2116-8JQ46-0AA0**	
		Connection with nut keeper kit							
25		**3VA2025-6JQ42-0AA0**			**3VA2025-7JQ42-0AA0**			**3VA2025-8JQ42-0AA0**	
40		**3VA2040-6JQ42-0AA0**			**3VA2040-7JQ42-0AA0**			**3VA2040-8JQ42-0AA0**	
63		**3VA2063-6JQ42-0AA0**			**3VA2063-7JQ42-0AA0**			**3VA2063-8JQ42-0AA0**	
100		**3VA2010-6JQ42-0AA0**			**3VA2010-7JQ42-0AA0**			**3VA2010-8JQ42-0AA0**	
25		**3VA2125-6JQ42-0AA0**			**3VA2125-7JQ42-0AA0**			**3VA2125-8JQ42-0AA0**	
40		**3VA2140-6JQ42-0AA0**			**3VA2140-7JQ42-0AA0**			**3VA2140-8JQ42-0AA0**	
63		**3VA2163-6JQ42-0AA0**			**3VA2163-7JQ42-0AA0**			**3VA2163-8JQ42-0AA0**	
100		**3VA2110-6JQ42-0AA0**			**3VA2110-7JQ42-0AA0**			**3VA2110-8JQ42-0AA0**	
160		**3VA2116-6JQ42-0AA0**			**3VA2116-7JQ42-0AA0**			**3VA2116-8JQ42-0AA0**	
160		**3VA2216-6JQ42-0AA0**			**3VA2216-7JQ42-0AA0**			**3VA2216-8JQ42-0AA0**	
250		**3VA2225-6JQ42-0AA0**			**3VA2225-7JQ42-0AA0**			**3VA2225-8JQ42-0AA0**	
250		**3VA2325-6JQ42-0AA0**			**3VA2325-7JQ42-0AA0**			**3VA2325-8JQ42-0AA0**	
400		**3VA2340-6JQ42-0AA0**			**3VA2340-7JQ42-0AA0**			**3VA2340-8JQ42-0AA0**	
400		**3VA2440-6JQ42-0AA0**			**3VA2440-7JQ42-0AA0**			**3VA2440-8JQ42-0AA0**	
500		**3VA2450-6JQ42-0AA0**			**3VA2450-7JQ42-0AA0**			--	
630		**3VA2463-6JQ42-0AA0**			**3VA2463-7JQ42-0AA0**			**3VA2463-8JQ42-0AA0**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

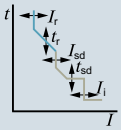


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7	
		A	A	A	A	d	Article No. www.siemens.com/product?Article No.	Basic price per PU

4-pole, fixed-mounted, 3VA20 to 3VA24, up to 630 A
Electronic trip unit

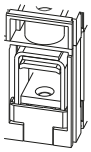


I201_18482



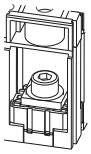
Line and generator protection, with display, with metering function, ETU850 LSI

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160%



Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KP46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KP46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KP46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KP46-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KP46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KP46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KP46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KP46-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KP46-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KP42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KP42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KP42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KP42-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KP42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KP42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KP42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KP42-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KP42-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5KP42-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5KP42-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5KP42-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5KP42-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1]	**3VA2440-5KP42-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5KP42-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5KP42-0AA0**

[1] At breaking capacity L 4400 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7	
		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d			d		
Line and generator protection, with display, with metering function, ETU850 LSI									
With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160%									
		Connection with box terminal							
25		**3VA2025-6KP46-0AA0**			**3VA2025-7KP46-0AA0**			**3VA2025-8KP46-0AA0**	
40		**3VA2040-6KP46-0AA0**			**3VA2040-7KP46-0AA0**			**3VA2040-8KP46-0AA0**	
63		**3VA2063-6KP46-0AA0**			**3VA2063-7KP46-0AA0**			**3VA2063-8KP46-0AA0**	
100		**3VA2010-6KP46-0AA0**			**3VA2010-7KP46-0AA0**			**3VA2010-8KP46-0AA0**	
25		**3VA2125-6KP46-0AA0**			**3VA2125-7KP46-0AA0**			**3VA2125-8KP46-0AA0**	
40		**3VA2140-6KP46-0AA0**			**3VA2140-7KP46-0AA0**			**3VA2140-8KP46-0AA0**	
63		**3VA2163-6KP46-0AA0**			**3VA2163-7KP46-0AA0**			**3VA2163-8KP46-0AA0**	
100		**3VA2110-6KP46-0AA0**			**3VA2110-7KP46-0AA0**			**3VA2110-8KP46-0AA0**	
160		**3VA2116-6KP46-0AA0**			**3VA2116-7KP46-0AA0**			**3VA2116-8KP46-0AA0**	
		Connection with nut keeper kit							
25		**3VA2025-6KP42-0AA0**			**3VA2025-7KP42-0AA0**			**3VA2025-8KP42-0AA0**	
40		**3VA2040-6KP42-0AA0**			**3VA2040-7KP42-0AA0**			**3VA2040-8KP42-0AA0**	
63		**3VA2063-6KP42-0AA0**			**3VA2063-7KP42-0AA0**			**3VA2063-8KP42-0AA0**	
100		**3VA2010-6KP42-0AA0**			**3VA2010-7KP42-0AA0**			**3VA2010-8KP42-0AA0**	
25		**3VA2125-6KP42-0AA0**			**3VA2125-7KP42-0AA0**			**3VA2125-8KP42-0AA0**	
40		**3VA2140-6KP42-0AA0**			**3VA2140-7KP42-0AA0**			**3VA2140-8KP42-0AA0**	
63		**3VA2163-6KP42-0AA0**			**3VA2163-7KP42-0AA0**			**3VA2163-8KP42-0AA0**	
100		**3VA2110-6KP42-0AA0**			**3VA2110-7KP42-0AA0**			**3VA2110-8KP42-0AA0**	
160		**3VA2116-6KP42-0AA0**			**3VA2116-7KP42-0AA0**			**3VA2116-8KP42-0AA0**	
160		**3VA2216-6KP42-0AA0**			**3VA2216-7KP42-0AA0**			**3VA2216-8KP42-0AA0**	
250		**3VA2225-6KP42-0AA0**			**3VA2225-7KP42-0AA0**			**3VA2225-8KP42-0AA0**	
250		**3VA2325-6KP42-0AA0**			**3VA2325-7KP42-0AA0**			**3VA2325-8KP42-0AA0**	
400		**3VA2340-6KP42-0AA0**			**3VA2340-7KP42-0AA0**			**3VA2340-8KP42-0AA0**	
400		**3VA2440-6KP42-0AA0**			**3VA2440-7KP42-0AA0**			**3VA2440-8KP42-0AA0**	
500		**3VA2450-6KP42-0AA0**			**3VA2450-7KP42-0AA0**			--	
630		**3VA2463-6KP42-0AA0**			**3VA2463-7KP42-0AA0**			**3VA2463-8KP42-0AA0**	

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Line protection

PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

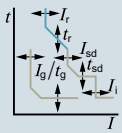


Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, medium breaking capacity M (M) See "Overview", p. 2/6 and 2/7	
		A	A	A	A	d	Article No. www.siemens.com/product?Article No.	Basic price per PU

4-pole, fixed-mounted, 3VA20 to 3VA25, up to 1000 A Electronic trip unit

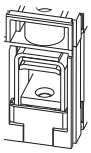


I201_18483



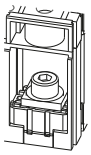
Line and generator protection, with display, with metering function, ETU860 LSIG

With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160% and adjustable ground-fault protection I_g



Connection with box terminal

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KQ46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KQ46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KQ46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KQ46-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KQ46-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KQ46-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KQ46-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KQ46-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KQ46-0AA0**



Connection with nut keeper kit

3VA20	25	10 ... 25	15 ... 250	38 ... 300	**3VA2025-5KQ42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2040-5KQ42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2063-5KQ42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2010-5KQ42-0AA0**
3VA21	25	10 ... 25	15 ... 250	38 ... 300	**3VA2125-5KQ42-0AA0**
	40	16 ... 40	24 ... 400	60 ... 480	**3VA2140-5KQ42-0AA0**
	63	25 ... 63	38 ... 630	95 ... 756	**3VA2163-5KQ42-0AA0**
	100	40 ... 100	60 ... 1000	150 ... 1200	**3VA2110-5KQ42-0AA0**
	160	63 ... 160	96 ... 1600	240 ... 1600	**3VA2116-5KQ42-0AA0**
3VA22	160	63 ... 160	96 ... 1600	240 ... 1920	**3VA2216-5KQ42-0AA0**
	250	100 ... 250	150 ... 2500	375 ... 2500	**3VA2225-5KQ42-0AA0**
3VA23	250	100 ... 250	150 ... 2500	375 ... 3000	**3VA2325-5KQ42-0AA0**
	400	160 ... 400	240 ... 4000	600 ... 4000	**3VA2340-5KQ42-0AA0**
3VA24	400	160 ... 400	240 ... 4000	600 ... 6000[1]	**3VA2440-5KQ42-0AA0**
	500	200 ... 500	300 ... 5000	750 ... 7000	**3VA2450-5KQ42-0AA0**
	630	250 ... 630	378 ... 5670	945 ... 5670	**3VA2463-5KQ42-0AA0**
3VA25 NEW	630[2]	250 ... 630	378 ... 6300	945 ... 7560	**3VA2563-5KQ42-0AA0**
	800	320 ... 800	480 ... 8000	1200 ... 8000	**3VA2580-5KQ42-0AA0**
	1000	400 ... 1000	600 ... 10000	1500 ... 10000	**3VA2510-5KQ42-0AA0**

1) At breaking capacity L 4400 A

2) Start of delivery scheduled for 1st quarter 2018

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

	Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU	SD	I_{cu} up to 150 kA at 415 V, extremely high switching capacity L (L) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
	A	d			d			d		
Line and generator protection, with display, with metering function, ETU860 LSIG										
With adjustable overload protection I_r, adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i, with neutral protection against overload and short circuit from 20%/40% to 100%/160% and adjustable ground-fault protection I_g										
			Connection with box terminal							
	25		**3VA2025-6KQ46-0AA0**			**3VA2025-7KQ46-0AA0**			**3VA2025-8KQ46-0AA0**	
	40		**3VA2040-6KQ46-0AA0**			**3VA2040-7KQ46-0AA0**			**3VA2040-8KQ46-0AA0**	
	63		**3VA2063-6KQ46-0AA0**			**3VA2063-7KQ46-0AA0**			**3VA2063-8KQ46-0AA0**	
	100		**3VA2010-6KQ46-0AA0**			**3VA2010-7KQ46-0AA0**			**3VA2010-8KQ46-0AA0**	
	25		**3VA2125-6KQ46-0AA0**			**3VA2125-7KQ46-0AA0**			**3VA2125-8KQ46-0AA0**	
	40		**3VA2140-6KQ46-0AA0**			**3VA2140-7KQ46-0AA0**			**3VA2140-8KQ46-0AA0**	
	63		**3VA2163-6KQ46-0AA0**			**3VA2163-7KQ46-0AA0**			**3VA2163-8KQ46-0AA0**	
	100		**3VA2110-6KQ46-0AA0**			**3VA2110-7KQ46-0AA0**			**3VA2110-8KQ46-0AA0**	
	160		**3VA2116-6KQ46-0AA0**			**3VA2116-7KQ46-0AA0**			**3VA2116-8KQ46-0AA0**	
			Connection with nut keeper kit							
	25		**3VA2025-6KQ42-0AA0**			**3VA2025-7KQ42-0AA0**			**3VA2025-8KQ42-0AA0**	
	40		**3VA2040-6KQ42-0AA0**			**3VA2040-7KQ42-0AA0**			**3VA2040-8KQ42-0AA0**	
	63		**3VA2063-6KQ42-0AA0**			**3VA2063-7KQ42-0AA0**			**3VA2063-8KQ42-0AA0**	
	100		**3VA2010-6KQ42-0AA0**			**3VA2010-7KQ42-0AA0**			**3VA2010-8KQ42-0AA0**	
	25		**3VA2125-6KQ42-0AA0**			**3VA2125-7KQ42-0AA0**			**3VA2125-8KQ42-0AA0**	
	40		**3VA2140-6KQ42-0AA0**			**3VA2140-7KQ42-0AA0**			**3VA2140-8KQ42-0AA0**	
	63		**3VA2163-6KQ42-0AA0**			**3VA2163-7KQ42-0AA0**			**3VA2163-8KQ42-0AA0**	
	100		**3VA2110-6KQ42-0AA0**			**3VA2110-7KQ42-0AA0**			**3VA2110-8KQ42-0AA0**	
	160		**3VA2116-6KQ42-0AA0**			**3VA2116-7KQ42-0AA0**			**3VA2116-8KQ42-0AA0**	
	160		**3VA2216-6KQ42-0AA0**			**3VA2216-7KQ42-0AA0**			**3VA2216-8KQ42-0AA0**	
	250		**3VA2225-6KQ42-0AA0**			**3VA2225-7KQ42-0AA0**			**3VA2225-8KQ42-0AA0**	
	250		**3VA2325-6KQ42-0AA0**			**3VA2325-7KQ42-0AA0**			**3VA2325-8KQ42-0AA0**	
	400		**3VA2340-6KQ42-0AA0**			**3VA2340-7KQ42-0AA0**			**3VA2340-8KQ42-0AA0**	
	400		**3VA2440-6KQ42-0AA0**			**3VA2440-7KQ42-0AA0**			**3VA2440-8KQ42-0AA0**	
	500		**3VA2450-6KQ42-0AA0**			**3VA2450-7KQ42-0AA0**			**--**	
	630		**3VA2463-6KQ42-0AA0**			**3VA2463-7KQ42-0AA0**			**3VA2463-8KQ42-0AA0**	
NEW	630[1]		**3VA2563-6KQ42-0AA0**			**3VA2563-7KQ42-0AA0**			**--**	
	800		**3VA2580-6KQ42-0AA0**			**3VA2580-7KQ42-0AA0**			**--**	
	1000		**3VA2510-6KQ42-0AA0**			**3VA2510-7KQ42-0AA0**			**--**	

[1] Start of delivery scheduled for 1st quarter 2018

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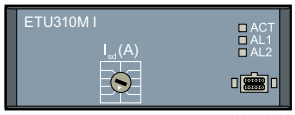
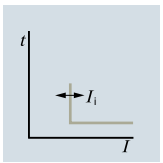
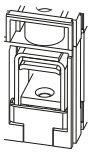
Connection technology	Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instanta-neous short-circuit protection "I" I_i	SD	**I_{cu} up to 55 kA at 415 V, medium breaking capacity M** (M) See "Overview", p. 2/6 and 2/7 Article No. www.siemens.com/product?Article No.	Basic price per PU
		A	A	A	A	d		

3-pole, fixed-mounted, 3VA20 to 3VA24, up to 630 A Electronic trip unit



I201_18428



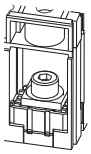


Starter protection, ETU310M I

With adjustable short-circuit protection I_i

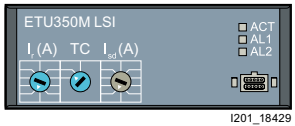
Connection with box terminal

3VA21	25	--	--	75 ... 375	--
	40	--	--	120 ... 600	--
	63	--	--	189 ... 945	--
	100	--	--	300 ... 1500	--

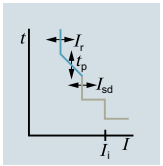


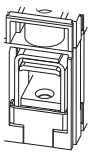
Connection with nut keeper kit

3VA21	25	--	--	75 ... 375	--
	40	--	--	120 ... 600	--
	63	--	--	189 ... 945	--
	100	--	--	300 ... 1500	--
3VA22	160	--	--	480 ... 2400	--
	200	--	--	600 ... 3000	--
3VA23	250	--	--	750 ... 3750	--
3VA24	400	--	--	1200 ... 6000	--
	500	--	--	1500 ... 7500	--



I201_18429



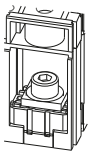


Motor protection, ETU350M LSI

With adjustable overload protection I_r (delay adjustable via trip class T_C (10A, 10/10E, 20/20E), adjustable delayed short-circuit protection I_{sd}, and fixed instantaneous short-circuit protection I_i

Connection with box terminal

			I_r x ...		
3VA21	25	10 ... 25	3 ... 15	375	**3VA2125-5MN36-0AA0**
	40	16 ... 40	3 ... 15	600	**3VA2140-5MN36-0AA0**
	63	25 ... 63	3 ... 15	945	**3VA2163-5MN36-0AA0**
	100	40 ... 100	3 ... 15	1500	**3VA2110-5MN36-0AA0**



Connection with screw terminal

3VA21	25	10 ... 25	3 ... 15	375	**3VA2125-5MN32-0AA0**
	40	16 ... 40	3 ... 15	600	**3VA2140-5MN32-0AA0**
	63	25 ... 63	3 ... 15	945	**3VA2163-5MN32-0AA0**
	100	40 ... 100	3 ... 15	1500	**3VA2110-5MN32-0AA0**
3VA22	160	63 ... 160	3 ... 15	2400	**3VA2216-5MN32-0AA0**
	200	80 ... 200	3 ... 15	3000	**3VA2220-5MN32-0AA0**
3VA23	250	100 ... 250	3 ... 15	3750	**3VA2325-5MN32-0AA0**
3VA24	400	160 ... 400	3 ... 15	6000	**3VA2440-5MN32-0AA0**
	500	200 ... 500	3 ... 15	7500	**3VA2450-5MN32-0AA0**



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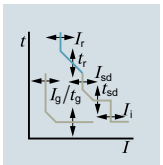


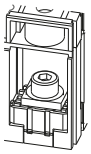


Motor protection, with display, with metering function, ETU860M LSIG

With adjustable overload protection I_r (delay adjustable via trip class T_C (10A, 10/10E, 20/20E, 30/30E) or directly via T_P in the range of 3 ... 30 s at 7.2 x I (depending on size)), adjustable delayed short-circuit protection I_{sd}, and adjustable instantaneous short-circuit protection I_i, and fixed ground-fault protection I_g

Connection with box terminal

3VA21	25	10 ... 25	38 ... 375	75 ... 375	**3VA2125-5MQ36-0AA0**
	40	16 ... 40	60 ... 600	120 ... 600	**3VA2140-5MQ36-0AA0**
	63	25 ... 63	95 ... 945	189 ... 945	**3VA2163-5MQ36-0AA0**
	100	40 ... 100	150 ... 1500	300 ... 1500	**3VA2110-5MQ36-0AA0**



Connection with screw terminal

3VA21	25	10 ... 25	30 ... 375	75 ... 375	**3VA2125-5MQ32-0AA0**
	40	16 ... 40	48 ... 600	120 ... 600	**3VA2140-5MQ32-0AA0**
	63	25 ... 63	76 ... 945	189 ... 945	**3VA2163-5MQ32-0AA0**
	100	40 ... 100	120 ... 1500	300 ... 1500	**3VA2110-5MQ32-0AA0**
3VA22	160	63 ... 160	192 ... 2400	480 ... 2400	**3VA2216-5MQ32-0AA0**
	200	80 ... 200	240 ... 3000	600 ... 3000	**3VA2220-5MQ32-0AA0**
3VA23	250	100 ... 250	300 ... 3750	750 ... 3750	**3VA2325-5MQ32-0AA0**
3VA24	400	160 ... 400	480 ... 6000	1200 ... 6000	**3VA2440-5MQ32-0AA0**
	500	200 ... 500	600 ... 7500	1500 ... 7500	**3VA2450-5MQ32-0AA0**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PU (UNIT, SET, M) = 1 PS = 1 UNIT PG = 1CB

Rated current I_n	SD	I_{cu} up to 85 kA at 415 V, high breaking capacity H (H) See "Overview", p. 2/6 and 2/7		SD	I_{cu} up to 110 kA at 415 V, very high switching capacity C (C) See "Overview", p. 2/6 and 2/7	
		Article No. www.siemens.com/product?Article No.	Basic price per PU		Article No. www.siemens.com/product?Article No.	Basic price per PU
A	d			d		
Starter protection, ETU310M I With adjustable short-circuit protection I_i						
		Connection with box terminal			**Connection with box terminal**	
25		--			3VA2125-7MS36-0AA0	
40		--			3VA2140-7MS36-0AA0	
63		--			3VA2163-7MS36-0AA0	
100		--			3VA2110-7MS36-0AA0	
		Connection with nut keeper kit			**Connection with nut keeper kit**	
25		--			3VA2125-7MS32-0AA0	
40		--			3VA2140-7MS32-0AA0	
63		--			3VA2163-7MS32-0AA0	
100		--			3VA2110-7MS32-0AA0	
160		--			3VA2216-7MS32-0AA0	
200		--			3VA22 20-7MS32-0AA0	
250		--			3VA2325-7MS32-0AA0	
400		--			3VA2440-7MS32-0AA0	
500		--			3VA2450-7MS32-0AA0	
Motor protection, ETU350M LSI With adjustable overload protection I_r (delay adjustable via trip class T_C (10A, 10/10E, 20/20E), adjustable delayed short-circuit protection I_{sd}, and fixed instantaneous short-circuit protection I_i						
		Connection with box terminal			**Connection with box terminal**	
25		--			3VA2125-7MN36-0AA0	
40		--			3VA2140-7MN36-0AA0	
63		--			3VA2163-7MN36-0AA0	
100		--			3VA2110-7MN36-0AA0	
		Connection with nut keeper kit			**Connection with nut keeper kit**	
25		--			3VA2125-7MN32-0AA0	
40		--			3VA2140-7MN32-0AA0	
63		--			3VA2163-7MN32-0AA0	
100		--			3VA2110-7MN32-0AA0	
160		--			3VA2216-7MN32-0AA0	
200		--			3VA2220-7MN32-0AA0	
250		--			3VA2325-7MN32-0AA0	
400		--			3VA2440-7MN32-0AA0	
500		--			3VA2450-7MN32-0AA0	
Motor protection, with display, with metering function, ETU860M LSIG With adjustable overload protection I_r (delay adjustable via trip class T_C (10A, 10/10E, 20/20E, 30/30E) or directly via T_P in the range of 3 ... 30 s at 7.2 x I (depending on size)), adjustable delayed short-circuit protection I_{sd}, and adjustable instantaneous short-circuit protection I_i, and fixed ground-fault protection I_g						
		Connection with box terminal			**Connection with box terminal**	
25		--			3VA2125-7MQ36-0AA0	
40		--			3VA2140-7MQ36-0AA0	
63		--			3VA2163-7MQ36-0AA0	
100		--			3VA2110-7MQ36-0AA0	
		Connection with nut keeper kit			**Connection with nut keeper kit**	
25		--			3VA2125-7MQ32-0AA0	
40		--			3VA2140-7MQ32-0AA0	
63		--			3VA2163-7MQ32-0AA0	
100		--			3VA2110-7MQ32-0AA0	
160		--			3VA2216-7MQ32-0AA0	
200		--			3VA2220-7MQ32-0AA0	
250		--			3VA2325-7MQ32-0AA0	
400		--			3VA2440-7MQ32-0AA0	
500		--			3VA2450-7MQ32-0AA0	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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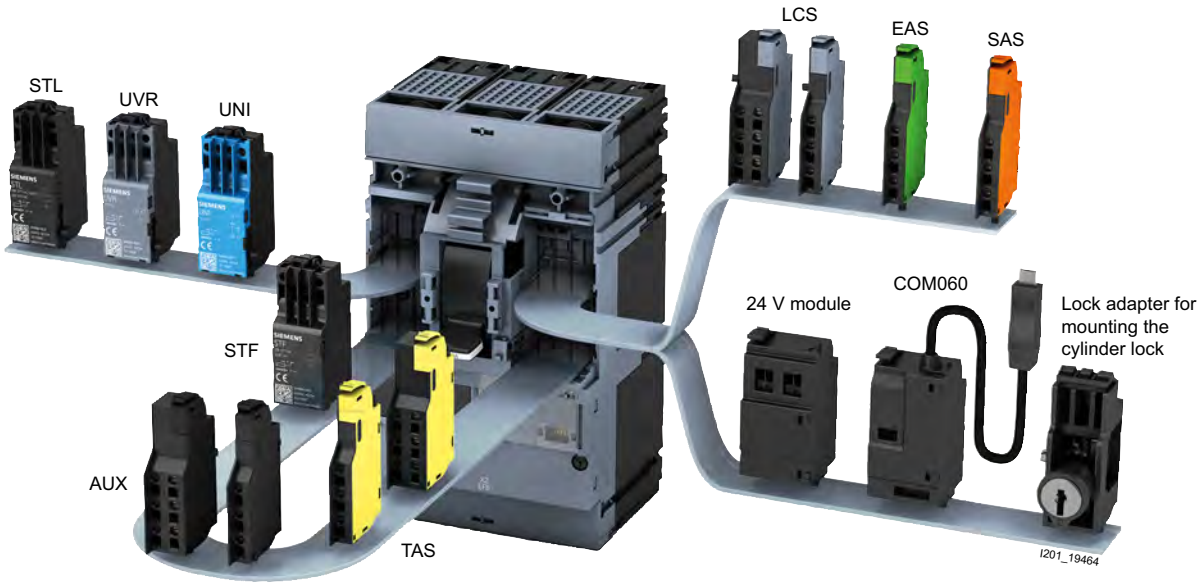
Overview

Color coding of accessories



A color coding system has been used to clearly identify the specific functions of individual accessories:

Color	Auxiliary switches and alarm switches (changeover contacts)	Auxiliary releases
Black	Auxiliary switch AUX	• Shunt trip left STL • Shunt trip flexible STF
Gray	Leading changeover switch LCS	• Undervoltage release UVR
Yellow	Trip alarm switches TAS	--
Orange	Short circuit alarm switch SAS	--
Green	Electrical alarm switch EAS	--
Blue	--	Universal release UNI

Auxiliary switches

All auxiliary and alarm switches for the 3VA molded case circuit breakers and switch disconnectors belong to an integrated range of accessories. They are consistently designed as changeover contacts. The auxiliary switches can be simply snapped into place and connected up in the accessories compartment provided on the front face of the unit to the left and right of the handle.

The purpose of the auxiliary switches AUX is to signal the position of the main contacts of the molded case circuit breaker. The contacts of the auxiliary switches open and close simultaneously with the main contacts of the molded case circuit breaker.

Leading changeover switches LCS signal the opening of the main contacts with a lead time of 20 ms in advance of the circuit breaker trips and are used for load shedding, for example.

Trip alarm switches TAS signal every circuit breaker tripping operation, regardless of the cause of the trip. The trip alarm switches are actuated whenever the molded case circuit breaker switches to the TRIP position.

Electrical alarm switches EAS are actuated as soon as the main contacts of the molded case circuit breaker open in the event that the breaker is tripped by the ETU.

Special electronic-compatible variants are available for applications which require the auxiliary switch signals to be linked to automation systems.

Auxiliary releases

Auxiliary releases allow remote electrical tripping of the circuit breaker. They can be used to monitor control or main circuits in order to implement a protective system against accidental restart following a power failure, for example.

Undervoltage releases trip the 3VA molded case circuit breaker in the event that the rated voltage of a monitored circuit drops below a minimum permissible limit or fails altogether.

Shunt trips can be used to trip the 3VA molded case circuit breaker remotely. The STF variant can be mounted in either the left-hand or the right-hand accessories compartment. The STL and STL (EI) types are specifically designed for mounting in the left-hand compartment and are very low-consumption devices. The STL (EI) variant can be used to implement electrical interlocks between molded case circuit breakers.

A universal release is a single, 21-mm-wide component in which a shunt trip and an undervoltage release are combined. These are subject to the same tripping conditions as the individual devices.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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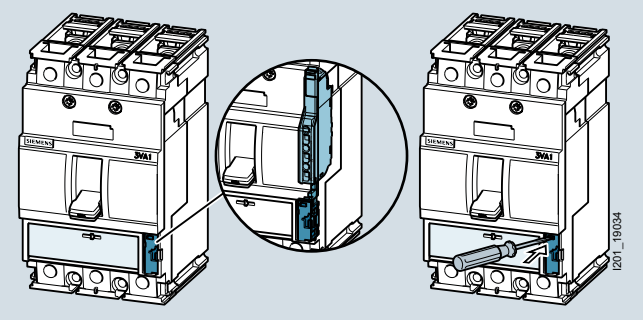
Short circuit alarm switches SAS

Short circuit alarm switches signal tripping operations only if they have been initiated by a short circuit. Tripping due to a short circuit is also indicated on the molded case circuit breaker.



The tripping operation must be reset by deliberate acknowledgement of the fault before the molded case circuit breaker can be switched to ON again.

Note

Short circuit alarm switches are only compatible with 3VA1 molded case circuit breakers. On breakers equipped with electronic trip units, the short circuit alarm function is performed by the electronic trip unit (ETU) and the EFB external function box.

Benefits

- The internal accessories are extremely easy to install. No tools are required because they are simply snapped into place in the accessories compartments to the left and right of the handle.
- The accessories are connected by screw terminals for auxiliary conductors with a cross-section of up to 2.5 mm^2. The terminals are mounted on the front of the unit for easy access.
- All auxiliary and alarm switches are designed as changeover contacts and therefore provide a high degree of flexibility for planning and installation purposes.
- Slimline auxiliary and alarm switches HQ and double-width auxiliary and alarm switches HP are suitable for use in applications involving diverse types of signaling contact and with high continuous currents.
- With two conductors per contact point for the auxiliary and alarm switches HP, looping through is extremely easy.
- Symbols engraved in the lid of the accessories compartment indicate the possible mounting positions of the internal accessories.

3VA with internal accessories preassembled at the factory

The basic circuit breakers with -0AA0 at the end of the article number are supplied without installed internal accessories.

Due to the high number of different internal accessory components available and the associated flexibility of use, it is not possible to represent all options with an article number for circuit breakers and installed internal accessories.

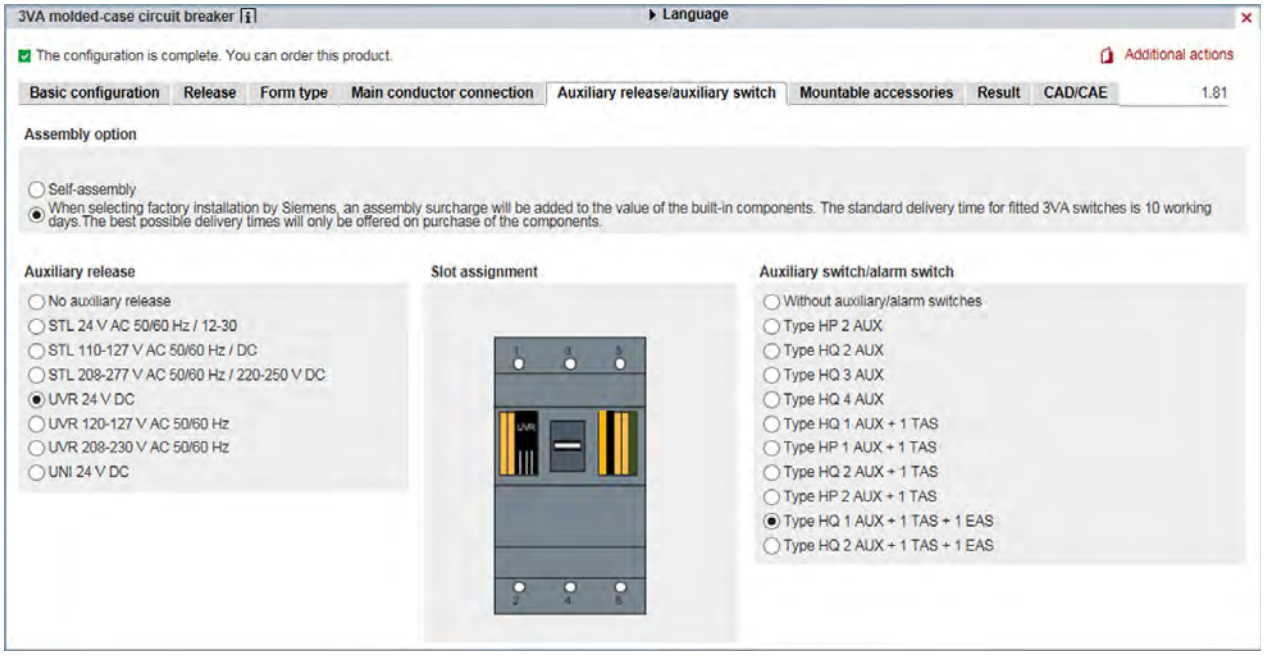
However, it is possible to order a basic circuit breaker with pre-defined combinations of internal accessories that are installed at the factory. This concerns a selection of different auxiliary releases and auxiliary/alarm switch combinations especially for each basic circuit breaker type.

In the case of factory installation, an installation surcharge is levied for the installed internal accessories.

The normal delivery time for equipped 3VA breakers is 10 working days. The best possible delivery times are only achieved when the individual components are ordered.

Basic circuit breakers with pre-installed internal accessories can only be ordered by registered customers using the 3VA Configurator:

www.siemens.com/lowvoltage/configurator-3VA



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Design

Internal accessories
Optional equipment

		3VA11 2-pole	3VA10 3- and 4-pole	3VA11 3- and 4-pole	3VA12 3- and 4-pole
		160 A	100 A	160 A	250 A
Slot No.:		23 22 21	23 22 21 11 12 13	23 22 21 11 12 13	24 23 22 21 11 12 13 14
Auxiliary switch	**Type**				
Auxiliary switch	AUX_HQ	x x x	x x x x x x	x x x x x x	x x x x x x x x
	AUX_HQ_el	x x x	x x x x x x	x x x x x x	x x x x x x x x
	AUX_HP	x / x	x	x / x	x x / x x
Leading changeover switch	LCS_HQ			x	x
	LCS_HQ_el			x	x
	LCS_HP			x	x
Alarm switch	**Type**				
Trip alarm switch	TAS_HQ	x x	x x x x	x x x x	x x x x
	TAS_HQ_el	x x	x x x x	x x x x	x x x x
	TAS_HP	x	x	x x	x x
Short circuit alarm switch	SAS_HQ			x	x
	SAS_HQ_el			x	x
Auxiliary release	**Type**				
Shunt trip flexible	STF	x	x	x	x
Shunt trip left	STL	x	x	x	x
	STL (EI)	x	x	x	x
Residual current release	RCR [1]			x	x
Undervoltage release	UVR	x	x	x	x
Universal release	UNI	x	x	x	x
Other					
Cylinder lock (type Ronis)			x	x	x

[1] Included in the scope of supply for side mounted residual current devices

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Internal accessories **Optional equipment**		3VA20/21/22 3-pole								3VA20/21/22 4-pole												
	Slot No.:	24	23	22	21	250 A	11	12	13	14	34	33	32	31	24	23	22	21	250 A	11	12	13	14
Auxiliary switch	**Type**																						
Auxiliary switch	AUX_HQ	x	x	x	x		x	x	x	x	x	x	x	x	x	x	x	x		x	x	x	x
	AUX_HQ_el	x	x	x	x		x	x	x	x	x	x	x	x	x	x	x	x		x	x	x	x
	AUX_HP	x		x			x		x		x		x		x		x			x		x	
			x					x				x				x					x		
Leading changeover switch	LCS_HQ						x													x			
	LCS_HQ_el						x													x			
	LCS_HP						x													x			
Alarm switch	**Type**																						
Trip alarm switch	TAS_HQ			x	x		x	x									x	x		x	x		
	TAS_HQ_el			x	x		x	x									x	x		x	x		
	TAS_HP			x			x										x			x			
Electrical alarm switch	EAS_HQ									x													x
	EAS_HQ_el									x													x
Auxiliary release	**Type**																						
Shunt trip flexible	STF		x				x									x				x			
Shunt trip left	STL		x													x							
	STL (EI)		x													x							
Undervoltage release	UVR		x													x							
Universal release	UNI		x													x							
ETU/communication	**Type**																						
Breaker data server communication module	COM060						x													x			
24 V module							x													x			
Other																							
Cylinder lock (type Ronis)							x													x			

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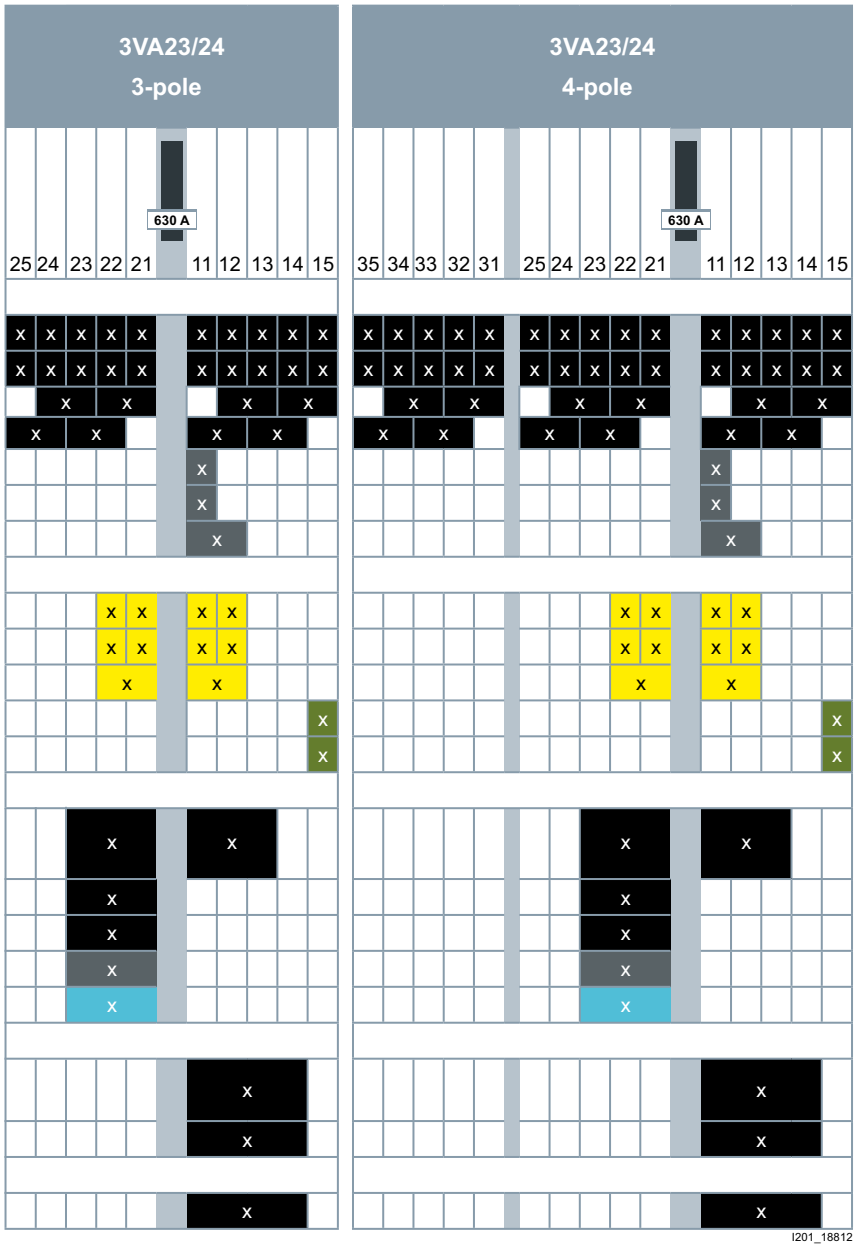
Internal accessories

2

Internal accessories
Optional equipment



Slot No.:	
Auxiliary switch	**Type**
Auxiliary switch	AUX_HQ
	AUX_HQ_el
	AUX_HP
Leading changeover switch	LCS_HQ
	LCS_HQ_el
	LCS_HP
Alarm switch	**Type**
Trip alarm switch	TAS_HQ
	TAS_HQ_el
	TAS_HP
Electrical alarm switch	EAS_HQ
	EAS_HQ_el
Auxiliary release	**Type**
Shunt trip flexible	STF
Shunt trip left	STL
	STL (EI)
Undervoltage release	UVR
Universal release	UNI
ETU/communication	**Type**
Breaker data server communication module	COM060
24 V module	
Other	
Cylinder lock (type Ronis)	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Internal accessories **Optional equipment**		3VA25 3-pole											3VA25 4-pole										
	Slot-No.:	24	23	22	21	1000 A	11	12	13	14	15	16	24	23	22	21	1000 A	11	12	13	14	15	16
Auxiliary switch	**Type**																						
Auxiliary switch	AUX_HQ	x	x	x	x				x	x	x	x	x	x	x	x				x	x	x	x
	AUX_HQ_el	x	x	x	x				x	x	x	x	x	x	x	x				x	x	x	x
	AUX_HP	x		x					x		x		x		x					x		x	
			x					x		x				x					x		x		
Leading changeover switch	LCS_HQ						x											x					
	LCS_HQ_el						x											x					
	LCS_HP						x											x					
Alarm switch	**Type**																						
Trip alarm switch	TAS_HQ						x	x										x	x				
	TAS_HQ_el						x	x										x	x				
	TAS_HP						x											x					
Electrical alarm switch	EAS_HQ											x											x
	EAS_HQ_el											x											x
Auxiliary release	**Type**																						
Shunt trip flexible	STF		x											x									
Shunt trip left	STL		x											x									
	STL (EI)		x											x									
Undervoltage release	UVR		x											x									
Universal release	UNI		x											x									
ETU/communication	**Type**																						
Breaker data server communication module	COM060							x											x				
Module 24 V								x											x				
Other																							
Cylinder lock								x											x				

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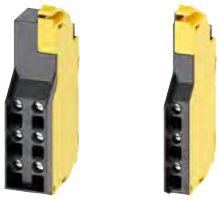
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Auxiliary switches and alarm switches (changeover contacts)							
 3VA9988-0AA11 3VA9988-0AA12	**Auxiliary switch AUX**						
	Type/switching capacity/size / Electronic-compatible						
	HP/high switching capacity/2 slots / --		**3VA9988-0AA11**		1	1 unit	1CB
	HQ/compact size/1 slot / --		**3VA9988-0AA12**		1	1 unit	1CB
	HQ_el/compact size/1 slot / ✓		**3VA9988-0AA13**		1	1 unit	1CB
 3VA9988-0AA21 3VA9988-0AA22	**Leading changeover switch LCS**						
	Type/switching capacity/size / Electronic-compatible						
	HP/high switching capacity/2 slots / --		**3VA9988-0AA21**		1	1 unit	1CB
	HQ/compact size/1 slot / --		**3VA9988-0AA22**		1	1 unit	1CB
	HQ_el/compact size/1 slot / ✓		**3VA9988-0AA23**		1	1 unit	1CB
 3VA9988-0AB11 3VA9988-0AB12	**Trip alarm switch TAS**						
	Type/switching capacity/size / Electronic-compatible						
	HP/high switching capacity/2 slots / --		**3VA9988-0AB11**		1	1 unit	1CB
	HQ/compact size/1 slot / --		**3VA9988-0AB12**		1	1 unit	1CB
	HQ_el/compact size/1 slot / ✓		**3VA9988-0AB13**		1	1 unit	1CB
 3VA9988-0AB32	**Short circuit alarm switch SAS (3VA1 only)**						
	For molded case circuit breakers/ Article No. stem / Electronic-compatible						
	For 3VA10, 3VA11						
	• HQ/compact size/1 slot / --		**3VA9988-0AB32**		1	1 unit	1CB
	• HQ_el/compact size/1 slot / ✓		**3VA9988-0AB33**		1	1 unit	1CB
	For 3VA1 250 A						
	• HQ/compact size/1 slot / --		**3VA9988-0AB34**		1	1 unit	1CB
	• HQ_el/compact size/1 slot / ✓		**3VA9988-0AB35**		1	1 unit	1CB
 3VA9988-0AB22	**Electrical alarm switch EAS (3VA2 only)**						
	Type/switching capacity/size / Electronic-compatible						
	HQ/compact size/1 slot / --		**3VA9988-0AB22**		1	1 unit	1CB
	HQ_el/compact size/1 slot / ✓		**3VA9988-0AB23**		1	1 unit	1CB
Undervoltage releases							
 3VA9908-0BB15	**Undervoltage release UVR**						
	50/60 Hz V AC / V DC						
	-- / 12		**3VA9908-0BB10**		1	1 unit	1CB
	-- / 24		**3VA9908-0BB11**		1	1 unit	1CB
	-- / 48		**3VA9908-0BB12**		1	1 unit	1CB
	-- / 60		**3VA9908-0BB13**		1	1 unit	1CB
	-- / 125 ... 127		**3VA9908-0BB14**		1	1 unit	1CB
	-- / 220 ... 230		**3VA9908-0BB15**		1	1 unit	1CB
	-- / 250		**3VA9908-0BB16**		1	1 unit	1CB
	24 / --		**3VA9908-0BB20**		1	1 unit	1CB
	48 / --		**3VA9908-0BB21**		1	1 unit	1CB
	60 / --		**3VA9908-0BB22**		1	1 unit	1CB
	110 / --		**3VA9908-0BB23**		1	1 unit	1CB
	120 ... 127 / --		**3VA9908-0BB24**		1	1 unit	1CB
	208 ... 230 / --		**3VA9908-0BB25**		1	1 unit	1CB
	380 ... 400 / --		**3VA9908-0BB26**		1	1 unit	1CB
	440 ... 480 / --		**3VA9908-0BB27**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Shunt trip left



3VA9988-0BL33

Shunt trip left STL

Version		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
50/60 Hz V AC	V DC						
--	12		**3VA9988-0BL10**		1	1 unit	1CB
24	24 ... 30		**3VA9988-0BL30**		1	1 unit	1CB
48 ... 60	48 ... 60		**3VA9988-0BL31**		1	1 unit	1CB
110 ... 127	110 ... 127		**3VA9988-0BL32**		1	1 unit	1CB
208 ... 277	220 ... 250		**3VA9988-0BL33**		1	1 unit	1CB
--	12		**3VA9988-0BL10**		1	1 unit	1CB
380 ... 600	--		**3VA9988-0BL20**		1	1 unit	1CB

Shunt trip left STL (EI)

50/60 Hz V AC	V DC						
--	24		**3VA9988-0BM10**		1	1 unit	1CB

Shunt trip flexible STF



3VA9988-0BA23

Shunt trip flexible

50/60 Hz V AC	V DC						
24	--		**3VA9988-0BA20**		1	1 unit	1CB
48 ... 60	--		**3VA9988-0BA21**		1	1 unit	1CB
110 ... 127	--		**3VA9988-0BA22**		1	1 unit	1CB
208 ... 277	--		**3VA9988-0BA23**		1	1 unit	1CB
380 ... 500	--		**3VA9988-0BA24**		1	1 unit	1CB
600	--		**3VA9988-0BA25**		1	1 unit	1CB

Universal release UNI



3VA9908-0BD13

Universal release

50/60 Hz V AC	V DC						
--	12		**3VA9908-0BD11**		1	1 unit	1CB
--	24		**3VA9908-0BD12**		1	1 unit	1CB
--	48		**3VA9908-0BD13**		1	1 unit	1CB

Time-delay device for undervoltage releases


3VA9988-0BF22

Time-delay device

V AC	V DC	Delay time					
110	110	Fixed	**3VA9988-0BF21**		1	1 unit	1CB
230	230	Fixed	**3VA9988-0BF22**		1	1 unit	1CB
--	24	Fixed	**3VA9988-0BF23**		1	1 unit	1CB

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2

Overview

Manual operators are provided to facilitate manual operation of the 3VA molded case circuit breakers, either directly at the circuit breaker or through the door or side wall of the cubicle.

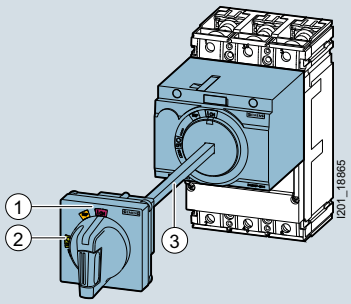
Front mounted rotary operator

The front mounted rotary operator is mounted directly on the molded case circuit breaker and is available with or without a door interlocking system. It meets the requirements for degree of protection IP30. The door interlock locks the cubicle door when the molded case circuit breaker is closed, but can be deliberately overridden if necessary.



Door mounted rotary operator

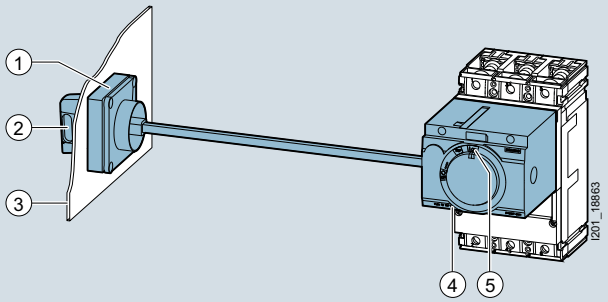
The door mounted rotary operator enables operation of the molded case circuit breaker from the cubicle door. The door element meets the requirements for degree of protection IP65 and features a door interlocking system and tolerance compensation. A variable depth adapter can be deployed to allow use of the door mounted rotary operator in conjunction with draw-out units. A supplementary handle can be attached directly to the shaft shoulder to allow convenient operation of the molded case circuit breaker when the cubicle door is open (i.e. when the control element is decoupled).



1 Door element
2 Switching position indicator ON, TRIP, OFF, RESET
3 Shaft

Side wall mounted rotary operator

The side wall mounted rotary operator is designed for installation in the cubicle side wall. It is available optionally with short shaft and mounting plate for mounting directly adjacent to the cubicle wall. The wall element meets the requirements for degree of protection IP65.



1 Side wall mounted rotary operator
2 Padlock device
3 Side wall of cubicle
4 PUSH-to-TRIP button
5 Switching position indicator ON, TRIP, OFF, RESET

All manual operators as well as the supplementary handle for the door mounted rotary operator are also available in a version for use in EMERGENCY-OFF applications. These are colored a conspicuous yellow/red for easier identification.

Interlocking methods

All manual operators are designed to allow locking of the operator at the handle and at the rotary operator with up to three padlocks in each case. It is also possible to fit a cylinder lock which can be used either to lock or to interlock molded case circuit breakers depending on the application.

If the cylinder lock is applied as a lock, it can be used to prevent the molded case circuit breaker from closing. The key can be removed at any time. If the lock is used to create an interlock, the key can be removed only when it is in the OFF position, allowing the creation of an interlock by the use of a single key for several breakers.

Active illumination

The manual operators are also available in illuminated variants in which the handle is illuminated red, yellow or green via LEDs (24 V DC) depending on the position of the breaker. This means that the switching position of the molded case circuit breaker can be immediately identified, even when light conditions are poor. This option can also be retrofitted.

Benefits

- Convenient circuit breaker operation inside and outside the cubicle
- Locking, blocking and interlocking for all manual operators prevents unauthorized breaker operation
- Conspicuously colored variant for EMERGENCY-OFF circuits
- Illumination for clear indication of the breaker status even when light conditions are poor
- All manual operators meet the standards for isolating characteristics defined by IEC / EN 60947-1

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	Type	Color	For molded case circuit breakers/ Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Front mounted rotary operators														
 3VA9267-0EK11	**Front mounted rotary operators** • Rotary operator • Handle • For IEC • Degree of protection IP30													
	• Standard, without illumination kit	Gray		✓	--	--	--	--		**3VA9157-0EK11**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK11**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK11**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK11**		1	1 unit	1CB
				--	--	--	--	✓ NEW		**3VA9687-0EK11**		1	1 unit	1CB
	• Standard, with illumination kit	Gray		✓	--	--	--	--		**3VA9157-0EK13**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK13**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK13**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK13**		1	1 unit	1CB
	• EMERGENCY-OFF, without illumination kit	Yellow-red		✓	--	--	--	--		**3VA9157-0EK15**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK15**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK15**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK15**		1	1 unit	1CB
				--	--	--	--	✓ NEW		**3VA9687-0EK15**		1	1 unit	1CB
	• EMERGENCY-OFF, with illumination kit	Yellow-red		✓	--	--	--	--		**3VA9157-0EK17**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK17**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK17**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK17**		1	1 unit	1CB
	• Standard, with door interlock	Gray		✓	--	--	--	--		**3VA9157-0EK21**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK21**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK21**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK21**		1	1 unit	1CB
	• Standard, with door interlock, with illumination kit	Gray		✓	--	--	--	--		**3VA9157-0EK23**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK23**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK23**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK23**		1	1 unit	1CB
	• EMERGENCY-OFF, with door interlock	Yellow-red		✓	--	--	--	--		**3VA9157-0EK25**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK25**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK25**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK25**		1	1 unit	1CB
	• EMERGENCY-OFF, with door interlock, with illumination kit	Yellow-red		✓	--	--	--	--		**3VA9157-0EK27**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0EK27**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0EK27**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0EK27**		1	1 unit	1CB
 3VA9267-0GK00	• Without handle, with shaft stub, without door interlock	Gray		✓	--	--	--	--		**3VA9157-0GK00**		1	1 unit	1CB
				--	✓	--	--	--		**3VA9257-0GK00**		1	1 unit	1CB
				--	--	✓	--	--		**3VA9267-0GK00**		1	1 unit	1CB
				--	--	--	✓	--		**3VA9467-0GK00**		1	1 unit	1CB
				--	--	--	--	✓ NEW		**3VA9687-0GK00**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Manual operators

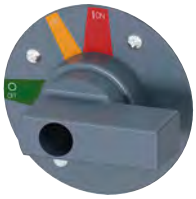
Door mounted rotary operators


3VA9267-0FK21

Door mounted rotary operator

- Rotary operator
- Shaft 300 mm (325 mm for 1000 A)
- Mounting tolerance compensation
- Handle with masking plate 75 × 75 mm
- Degree of protection IP65

Version	Color	For molded case circuit breakers/ Article No. stem: 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
• Standard	Gray	✓	--	--	--	--		**3VA9157-0FK21**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9257-0FK21**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9267-0FK21**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9467-0FK21**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9687-0FK21**		1	1 unit	1CB
• Standard, with illumination kit	Gray	✓	--	--	--	--		**3VA9157-0FK23**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9257-0FK23**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9267-0FK23**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9467-0FK23**		1	1 unit	1CB
• EMERGENCY-OFF	Yellow-red	✓	--	--	--	--		**3VA9157-0FK25**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9257-0FK25**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9267-0FK25**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9467-0FK25**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9687-0FK25**		1	1 unit	1CB
• EMERGENCY-OFF, with illumination kit	Yellow-red	✓	--	--	--	--		**3VA9157-0FK27**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9257-0FK27**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9267-0FK27**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9467-0FK27**		1	1 unit	1CB


3VA9487-0GC01

Supplementary handle for door mounted rotary operator

for operation when cabinet door is open

Type	Color							Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
• Standard	Gray	✓	✓	--	--	--		**3VA9287-0GC01**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9487-0GC01**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9487-0GC11**		1	1 unit	1CB
• EMERGENCY-OFF	Yellow-red	✓	✓	--	--	--		**3VA9287-0GC05**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9487-0GC05**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9487-0GC15**		1	1 unit	1CB

Shaft


8UD1900-2WB00


8UD1900-4WB00

Versions							Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
• 8 mm											
- 300 mm long	✓	✓	✓	✓	--		**8UD1900-2WA00**		1	1 unit	1CB
- 600 mm long	✓	✓	✓	✓	--		**8UD1900-2WB00**		1	1 unit	1CB
• 12 mm NEW											
- 325 mm long	--	--	--	--	✓		**8UD1900-4WA00**		1	1 unit	1CB
- 600 mm long	--	--	--	--	✓		**8UD1900-4WB00**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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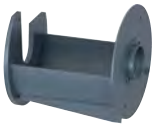
	Version	For molded case circuit breakers/ Article No. stem					SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	d					
	Adapter for shaft											
	Versions											
 8UD1900-2DA00	• 8 mm x 8 mm With door mounted rotary operator and side wall mounted rotary operator	✓	✓	✓	✓	--		**8UD1900-2DA00**		1	1 unit	1CB
 8UD1900-4DA00	• 12 mm x 12 mm NEW With door mounted rotary operator	--	--	--	--	✓		**8UD1900-4DA00**		1	1 unit	1CB
	Door coupling											
	Versions											
 8UD1900-2HA00	• 8 mm x 8 mm	✓	✓	✓	✓	--		**8UD1900-2HA00**		1	1 unit	1CB
 8UD1900-4HA00	• 12 mm x 12 mm NEW	--	--	--	--	✓		**8UD1900-4HA00**		1	1 unit	1CL
	Mounting tolerance compensation											
	Versions											
 8UD1900-2GA00	• 8 mm x 8 mm	✓	✓	✓	✓	--		**8UD1900-2GA00**		1	1 unit	1CB
 8UD1900-4GA00	• 12 mm x 12 mm NEW	--	--	--	--	✓		**8UD1900-4GA00**		1	1 unit	1CL
 3VA9487-0GA80	**Fixing bracket for shaft**	✓	✓	--	--	--		**3VA9287-0GA80**		1	1 unit	1CB
		--	--	✓	✓	--		**3VA9487-0GA80**		1	1 unit	1CB
 3VA9487-0GB10	**Variable depth adapter** 8 × 8 mm							**3VA9487-0GB10**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Manual operators

Side wall mounted rotary operators

	Version		For molded case circuit breakers/Article No. stem				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	d					
 3VA9267-0PK11	**Side wall mounted rotary operators** • Without mounting plate - Rotary operator with shaft 300 mm - Handle with masking plate 75 x 75 mm - Degree of protection IP65											
	Type	Color										
	• Standard	Gray	✓	--	--	--		**3VA9157-0PK11**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK11**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK11**		1	1 unit	1CB
			--	--	--	✓		**3VA9467-0PK11**		1	1 unit	1CB
	• Standard, with illumination kit	Gray	✓	--	--	--		**3VA9157-0PK13**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK13**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK13**		1	1 unit	1CB
			--	--	--	✓		**3VA9467-0PK13**		1	1 unit	1CB
	• EMERGENCY-OFF	Yellow-red	✓	--	--	--		**3VA9157-0PK15**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK15**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK15**		1	1 unit	1CB
			--	--	--	✓		**3VA9467-0PK15**		1	1 unit	1CB
	• EMERGENCY-OFF, with illumination kit	Yellow-red	✓	--	--	--		**3VA9157-0PK17**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK17**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK17**		1	1 unit	1CB
			--	--	--	✓		**3VA9467-0PK17**		1	1 unit	1CB
 3VA9267-0PK51	**Side wall mounted rotary operators** • With mounting plate - Rotary operator with short shaft - Handle with masking plate 75 x 75 mm - Degree of protection IP65											
	Type	Color										
	• Standard	Gray	✓	--	--	--		**3VA9157-0PK51**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK51**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK51**		1	1 unit	1CB
	• Standard, with illumination kit	Gray	✓	--	--	--		**3VA9157-0PK53**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK53**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK53**		1	1 unit	1CB
	• EMERGENCY-OFF	Yellow-red	✓	--	--	--		**3VA9157-0PK55**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK55**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK55**		1	1 unit	1CB
	• EMERGENCY-OFF, with illumination kit	Yellow-red	✓	--	--	--		**3VA9157-0PK57**		1	1 unit	1CB
			--	✓	--	--		**3VA9257-0PK57**		1	1 unit	1CB
			--	--	✓	--		**3VA9267-0PK57**		1	1 unit	1CB
 3VA9987-0GL30	**Extended DIN rail for N/PE terminal** • For mounting plate • Up to 250 A							**3VA9987-0GL30**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Handles



8UD1731-0AB11

Handles
• With masking plate

Type	Color	Tolerance compensation	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
• Standard	Gray	Without	✓	✓	✓	--	--		**8UD1721-0AB11**		1	1 unit	1CB
		With	✓	✓	✓	--	--		**8UD1721-0AB21**		1	1 unit	1CB
		Without	--	--	--	✓	--		**8UD1731-0AB11**		1	1 unit	1CB
		With	--	--	--	✓	--		**8UD1731-0AB21**		1	1 unit	1CB
		Without	--	--	--	--	✓ NEW		**8UD1741-0AB11**		1	1 unit	1CB
		With	--	--	--	--	✓ NEW		**8UD1741-0AB21**		1	1 unit	1CB
• EMERGEN-CY-OFF	Yellow-red	Without	✓	✓	✓	--	--		**8UD1721-0AB15**		1	1 unit	1CB
		With	✓	✓	✓	--	--		**8UD1721-0AB25**		1	1 unit	1CB
		Without	--	--	--	✓	--		**8UD1731-0AB15**		1	1 unit	1CB
		With	--	--	--	✓	--		**8UD1731-0AB25**		1	1 unit	1CB
		Without	--	--	--	--	✓ NEW		**8UD1741-0AB15**		1	1 unit	1CB
		With	--	--	--	--	✓ NEW		**8UD1741-0AB25**		1	1 unit	1CB



Spare part:
Toggle lever extension NEW

			--	--	--	--	✓		**3VA9987-0SC10**		1	1 unit	1CB

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Manual operators

	Version		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
General accessories for manual operators								
 3VA9087-0SX10	**Labeling plate for manual operators**			**3VA9087-0SX10**		1	10 units	1CB
 8UD1900-0KA20	**Illumination kit for manual operators** 24 V DC voltage	For molded case circuit breakers						
		3VA1, 100 ... 250 A	Front mounted rotary operators	**8UD1900-0KA10**		1	1 unit	1CB
		3VA2, 100 ... 630 A	Front mounted rotary operators	**8UD1900-0KA20**		1	1 unit	1CB
		3VA1, 3VA2, 100 … 630 A	Door mounted rotary operator and side wall mounted rotary operator	**8UD1900-0KA20**		1	1 unit	1CB
 8UD1900-0MB01	**Cylinder lock (type Kaba)** • For door mounted rotary operator and side wall mounted rotary operator (in the masking plate) • Standard masking plate	Key 1		**8UD1900-0MB01**		1	1 unit	1CB
		Key 2		**8UD1900-0NB01**		1	1 unit	1CB
		Key 3		**8UD1900-0PB01**		1	1 unit	1CB
		Key 4		**8UD1900-0QB01**		1	1 unit	1CB
 8UD1900-0MB05	**Cylinder lock (type Kaba)** • For door mounted rotary operator and side wall mounted rotary operator (in the masking plate) • EMERGENCY-OFF masking plate	Key 1		**8UD1900-0MB05**		1	1 unit	1CB
		Key 2		**8UD1900-0NB05**		1	1 unit	1CB
		Key 3		**8UD1900-0PB05**		1	1 unit	1CB
		Key 4		**8UD1900-0QB05**		1	1 unit	1CB
 3VA9980-0VL10	**Cylinder lock (type Ronis)** • Includes a lock with 2 keys • For locking or interlocking • For installation in all rotary operators • For mounting in the adapter kit for the accessories compartment	Key 1		**3VA9980-0VL10**		1	1 unit	1CB
		Key 2		**3VA9980-0VL20**		1	1 unit	1CB
		Key 3		**3VA9980-0VL30**		1	1 unit	1CB
		Key 4		**3VA9980-0VL40**		1	1 unit	1CB
	Note							
	The cylinder lock adapter for rotary operators is also needed for locking or interlocking circuit breakers via rotary operators.							
 3VA9980-0LF20	**Cylinder lock adapter for rotary operators** To mount the cylinder lock in the rotary operator (also possible with door mounted rotary operator and side wall mounted rotary operator)			**3VA9980-0LF20**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

MO310 side mounted motor operator

The MO310 side mounted motor operator is optimized for use in the area of electrical installation. It is mounted on the side of the 3VA1 molded case circuit breaker and, thanks to the cover size of 45 mm, is suitable for side-by-side arrangement with miniature circuit breakers.

The MO310 motor operator can also be locked with several padlocks.

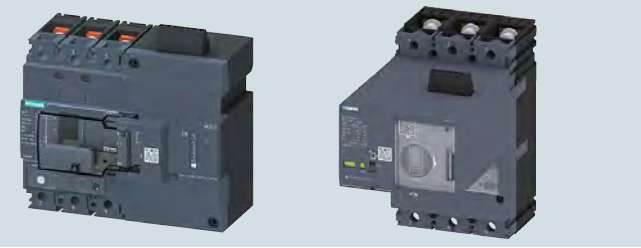
MO320 front mounted motor operator

The MO320 motor operator is mounted on the front of the 3VA molded case circuit breaker and opens and closes the molded case circuit breaker by means of control cable commands (e.g. from pushbuttons or a PLC). It can also be operated manually, however, and a handle is provided on the unit for this purpose.

The motor operator also features a clear switching position indicator which indicates ON and OFF and, via LED, whether the circuit breaker has tripped (TRIP). The motor operator therefore meets the standards for isolating characteristics defined by IEC / EN 60947-1. It is thus possible to identify the switching position of the molded case circuit breaker at any time.

Two different reset modes can be selected, i.e. in one mode, the operator resets the molded case circuit breaker automatically and in the other, it waits for confirmation by an OFF signal before it resets the breaker.

Furthermore, the motor operator can be locked in the OFF position by means of several padlocks.



Benefits

- Remote operation of the molded case circuit breaker by means of control cable commands
- Clear switching position indication including TRIP provides a quick visual overview and prevents operating errors
- Locking capability prevents unauthorized operations
- Meets the standards for isolating characteristics defined by IEC / EN 60947-1
- All motor operators are suitable for use with 3 and 4-pole molded case circuit breakers.

Design

- The MO320 motor operator is simply snapped into position on a mounting frame which is installed instead of the accessories lid of the molded case circuit breaker.

Technical specifications

MO310 motor operator	**3VA1**
	160 A
Degree of protection	IP20, with cover frame IP30
Rated control supply voltage (operating range of control supply voltage)	42 V ... 60 V AC/ 24 V ... 60 V DC (0.85 ... 1.26) 110 V ... 230 V AC/ 110 V ... 250 V DC (0.85 ... 1.1)
Power consumption	250 W, max. 500 W (60 ms)
Make time, typically	< 300 ms
Break time, typically	< 300 ms

MO320 motor operator	**3VA1**		**3VA2**	
	160 A	250 A	250 A	630 A
Degree of protection	IP20, with cover frame IP30			
Rated control supply voltage (operating range of control supply voltage)	24 V ... 60 V DC (0.85 ... 1.26) 110 V ... 230 V AC/ 110 V ... 250 V DC (0.85 ... 1.1)			
Power consumption	250 W, max. 500 W (60 ms)			
Make time, typically	< 800 ms	< 800 ms	< 1000 ms	< 1700 ms
Break time, typically	< 800 ms	< 800 ms	< 1000 ms	< 1400 ms

Selection and ordering data

	Version	For molded case circuit breakers/Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Motor operators											
 3VA9267-0HB10	**Side mounted motor operator (MO310)**										
	Versions										
	• 24 ... 60 V DC 42 ... 60 V AC	✓	--	--	--		**3VA9117-0HB10**		1	1 unit	1CB
	• 110 ... 230 V AC, 110 ... 250 V DC	✓	--	--	--		**3VA9117-0HB20**		1	1 unit	1CB
 3VA9267-0HA10	**Motor operator without stored energy feature (MO320)**										
	Versions										
	• 24 ... 60 V DC	✓	--	--	--		**3VA9157-0HA10**		1	1 unit	1CB
		--	✓	--	--		**3VA9257-0HA10**		1	1 unit	1CB
		--	--	✓	--		**3VA9267-0HA10**		1	1 unit	1CB
		--	--	--	✓		**3VA9467-0HA10**		1	1 unit	1CB
	• 110 ... 230 V AC, 110 ... 250 V DC	✓	--	--	--		**3VA9157-0HA20**		1	1 unit	1CB
		--	✓	--	--		**3VA9257-0HA20**		1	1 unit	1CB
		--	--	✓	--		**3VA9267-0HA20**		1	1 unit	1CB
		--	--	--	✓		**3VA9467-0HA20**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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2

Overview

The proper functioning and in particular the safety of electrical installations does not just depend on the quality and design of the components, but also on the method of installation.

The following aspects of electrical installations are of crucial importance for the implementation of a safe, properly functioning connection to the 3VA molded case circuit breakers:

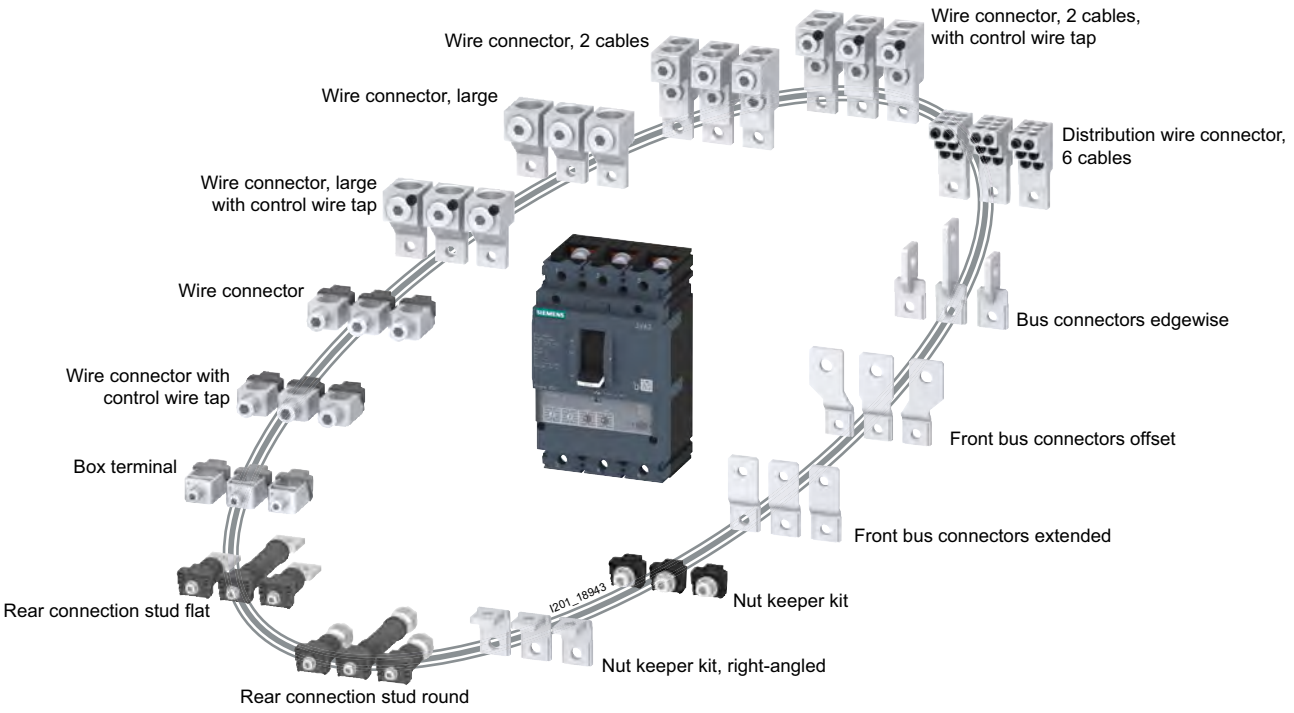
- Installation, e.g. connection to cables or busbars
- Dimensioning of the cables and busbars
- Installation medium, e.g. rigid or flexible

The following catalog pages provide all the information needed to ensure that a 3VA molded case circuit breaker is safely connected.

Connection technology for the 3VA molded case circuit breaker

The connection technology of the 3VA molded case circuit breakers is designed to support uncomplicated and convenient commissioning of the 3VA molded case circuit breakers and to meet all installation requirements.

To meet this objective, an extensive portfolio of connection components is available.



3VA2 conductor cross-sections 1000 A

Connection technology	Cable medium	Cables and busbars	Dimensions	3VA2
				1000 A
Wire connector for 2 cables	Stranded cable	Cu/Al cable	mm^2	120 ... 300
	Finely stranded cable	Cu cable	mm^2	120 ... 185
	Finely stranded with insulated end sleeve	Cu cable	mm^2	120 ... 185
Front busbar connector	Direct (width x height)	Busbar	mm x mm	50 x 28
	Front bus connectors extended	Busbar	mm x mm	50 x 28

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VA1/3VA2 conductor cross-sections

Connection technology	Cable medium	Cables and busbars	Dimensions	3VA1		3VA2		
				100 A/160 A	250 A	100 A/160 A/250 A	400 A	630 A
Box terminal 	Solid cable	Cu cable	mm^2	1.5 ... 16	6 ... 16	6 ... 16	--	--
	Stranded cable	Cu cable	mm^2	1.5 ... 70	6 ... 120 50 ... 185	6 ... 120 25 ... 185	35 ... 300	35 ... 300[1]
	Finely stranded cable	Cu cable	mm^2	1.5 ... 50	10 ... 95 95 ... 150	10 ... 95 35 ... 150	25 ... 240	25 ... 240[1]
	Finely stranded with insulated end sleeve	Cu cable	mm^2	1.5 ... 50	6 ... 95 50 ... 150	6 ... 95 25 ... 150	25 ... 240	25 ... 240[1]
	Flexible copper busbar	Flexible busbar	mm x mm	2x ..6x [13 x 0.5] ... 2x ..9x [9 x 0.8]	2x ..6x [13 x 0.5] ... 2x ..6x [15.5 x 0.8] ... 2x ..6x [20 x 1]	2x ..6x [13 x 0.5] ... 2x ..6x [15.5 x 0.8] ... 2x ..6x [20 x 1]	2x ..10x [20 x 1] ... 2x ..10x [24 x 1]	2x ..10x [20 x 1] ... 2x ..10x [24 x 1]
Wire connectors 	Solid cable	Cu/Al cable	mm^2	2.5/4 ... 16	--	1.5/4 ... 16	--	--
	Stranded cable	Cu/Al cable	mm^2	1.5/4 ... 95	35 ... 185	1.5/4 ... 50 16 ... 185	50 ... 300	--
	Finely stranded cable	Cu cable	mm^2	1.5 ... 35	35 ... 150	1.5 ... 35 25 ... 150	50 ... 240	--
	Finely stranded with insulated end sleeve	Cu cable	mm^2	1.5 ... 35	35 ... 150	1.5 ... 35 16 ... 120	50 ... 240	--
Wire connector, large 	Solid cable			--	--	--	--	--
	Stranded cable	Cu/Al cable	mm^2	25 ... 150	50 ... 240	50 ... 240	--	--
	Finely stranded cable	Cu cable	mm^2	25 ... 120	50 ... 185	50 ... 185	--	--
	Finely stranded with insulated end sleeve	Cu cable	mm^2	25 ... 95	50 ... 185	50 ... 185	--	--
Wire connector for 2 cables 	Solid cable			--	--	--	--	--
	Stranded cable	Cu/Al cable	mm^2	--	25 ... 150	25 ... 150	70 ... 300	70 ... 300
	Finely stranded cable	Cu cable	mm^2	--	25 ... 150	25 ... 150	70 ... 240	70 ... 240
	Finely stranded with insulated end sleeve	Cu cable	mm^2	--	25 ... 70	25 ... 70	70 ... 185	70 ... 185
Distribution wire connector for 6 cables 	Solid cable	Cu/Al cable	mm^2	1.5/4 ... 16	1.5/4 ... 16	1.5/4 ... 16	1.5/4 ... 16	1.5/4 ... 16
	Stranded cable	Cu/Al cable	mm^2	1.5/4 ... 35	1.5/4 ... 35	1.5/4 ... 35	1.5/4 ... 35	1.5/4 ... 35
	Finely stranded cable	Cu cable	mm^2	1.5 ... 25	1.5 ... 25	1.5 ... 25	1.5 ... 25	1.5 ... 25
	Finely stranded with insulated end sleeve	Cu cable	mm^2	1.5 ... 25	1.5 ... 25	1.5 ... 25	1.5 ... 25	1.5 ... 25
Front busbar connector	Direct (width x height)	Busbar	mm x mm	17 x 6.5	25 x 8	25 x 8	35 x 10	35 x 10
	Front bus connectors extended	Busbar	mm x mm	22 x 8	32 x 10	32 x 10	40 x 12.5	40 x 12.5
	Front bus connectors offset	Busbar	mm x mm	30 x 8	35 x 10	35 x 10	60 x 12.5	60 x 12.5

[1] Only approved up to rated current 400 A

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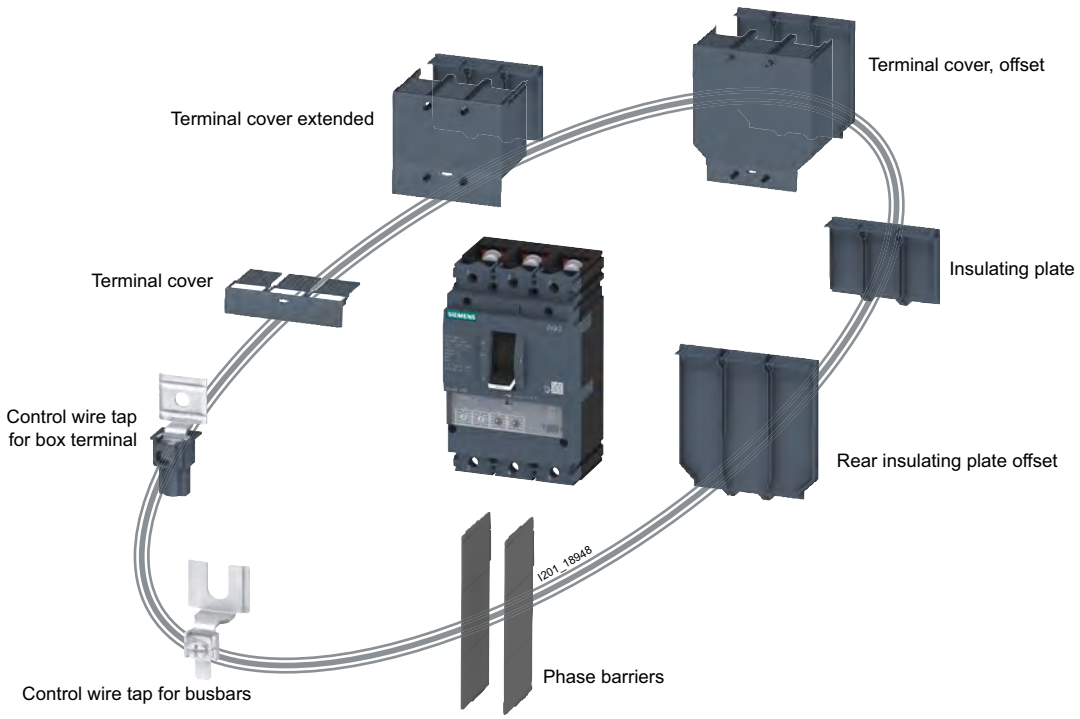
Further connection accessories

Insulation / auxiliary conductor connections

The connection accessories portfolio includes an extensive selection of insulating components (phase barriers, terminal covers, etc.).

Auxiliary conductor connections for box terminals and busbars are also available.



Terminal covers

Terminal covers are insulating and sealable insulation accessories which protect against accidental contact with main current paths. When mounted on the circuit breaker, terminal covers at the front provide degree of protection IP4x and when correctly installed at the infeed and load ends of the breaker, degree of protection IP2x. All terminal covers have a recess on the inside face which can be drilled out if necessary so that safe isolation can be afforded by commercially available voltage detectors.

- Short terminal covers are normally installed for all types of front termination which do not exceed the geometric dimensions of the molded case circuit breaker (the termination area) (e.g. box terminal, nut keeper kit, etc.).
- Extended terminal covers are required when bar extensions or external terminals (i.e. terminals which exceed the dimensions of the termination area of the molded case circuit breaker) are installed. The extended terminal cover consists of two parts, an insulating plate and the top half of the terminal cover. Both parts are attached by screws and thus afford the degrees of protection specified above.
- Broad terminal covers are required when front bus connectors offset are installed. The extended terminal cover consists of two parts, a rear insulating plate offset and the top half of the terminal cover. Both parts are attached by screws and thus afford the degrees of protection specified above.

Insulating plates

The purpose of insulating plates is to insulate the main terminals of the molded case circuit breaker from the mounting plate (cubicle).

- Insulating plate: in combination with bus connector extended, for example
- Rear insulating plate offset: in combination with front bus connectors offset, for example

Control wire taps

All wire connectors can be ordered with or without control wire tap (see page 2/10, Front terminals). The following accessories are available to allow the implementation of a control wire tap in combination with a box terminal or busbar connection:

- Control wire tap for box terminal: This terminal is fastened by screws in the box terminal with the cable.
- Control wire tap for busbars: This terminal is attached by screws directly to the busbar.

All control wire taps are rated for a maximum load of 6 A. Cables of up to 2.5 mm^2 can be connected.

Benefits

- High degree of flexibility
- Cables and busbars can be connected quickly and easily to the 3VA molded case circuit breaker
- Extensive selection of connection accessories

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Connection technology – suitable for all installation types (fixed-mounted, plug-in and draw-out versions)

Selection and ordering data

	Version	Minimum for stranded cable	Maximum for stranded cable	For molded case circuit breakers/ Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Box terminals – suitable for all installation types (fixed-mounted, plug-in and draw-out versions)														
 3VA9163-0JA12	**Box terminal** • Connection of Cu cable • Included in scope of supply: 3 single terminals	1.5 mm²	70 mm²	✓	--	--	--	--		**3VA9153-0JA11**		1	1 unit	1CB
		6 mm²	120 mm²	--	✓	--	--	--		**3VA9253-0JA11**		1	1 unit	1CB
		50 mm²	185 mm²	--	✓	--	--	--		**3VA9253-0JA12**		1	1 unit	1CB
		6 mm²	120 mm²	--	--	✓	--	--		**3VA9163-0JA12**		1	1 unit	1CB
		25 mm²	185 mm²	--	--	✓	--	--		**3VA9263-0JA12**		1	1 unit	1CB
		35 mm²	300 mm²	--	--	--	✓[1]	--		**3VA9483-0JA13**		1	1 unit	1CB
 3VA9164-0JA12	**Box terminal** • Connection of Cu cable • Included in scope of supply: 4 single terminals	1.5 mm²	70 mm²	✓	--	--	--	--		**3VA9154-0JA11**		1	1 unit	1CB
		6 mm²	120 mm²	--	✓	--	--	--		**3VA9254-0JA11**		1	1 unit	1CB
		50 mm²	185 mm²	--	✓	--	--	--		**3VA9254-0JA12**		1	1 unit	1CB
		6 mm²	120 mm²	--	--	✓	--	--		**3VA9164-0JA12**		1	1 unit	1CB
		25 mm²	185 mm²	--	--	✓	--	--		**3VA9264-0JA12**		1	1 unit	1CB
		35 mm²	300 mm²	--	--	--	✓[1]	--		**3VA9484-0JA13**		1	1 unit	1CB
Wire connectors suitable for all installation types (fixed-mounted, plug-in and draw-out versions)														
 3VA9103-0JB11	**Wire connector** • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals	1.5 mm²	95 mm²	✓	--	--	--	--		**3VA9113-0JB11**		1	1 unit	1CB
		35 mm²	185 mm²	--	✓	--	--	--		**3VA9253-0JB12**		1	1 unit	1CB
		1.5 mm²	50 mm²	--	--	✓	--	--		**3VA9103-0JB11**		1	1 unit	1CB
		16 mm²	185 mm²	--	--	✓	--	--		**3VA9263-0JB12**		1	1 unit	1CB
		50 mm²	300 mm²	--	--	--	✓	--		**3VA9383-0JB13**		1	1 unit	1CB
 3VA9503-0JB23	**Wire connector, 2 cables** • Connection of Cu/Al cable • included in scope of supply: 3 single terminals and 1 terminal cover, short	120 mm²	300 mm²	--	--	--	--	✓ NEW		**3VA9503-0JB23**		1	1 unit	1CB
 3VA9104-0JB11	**Wire connector** • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals	1.5 mm²	95 mm²	✓	--	--	--	--		**3VA9114-0JB11**		1	1 unit	1CB
		35 mm²	185 mm²	--	✓	--	--	--		**3VA9254-0JB12**		1	1 unit	1CB
		1.5 mm²	50 mm²	--	--	✓	--	--		**3VA9104-0JB11**		1	1 unit	1CB
		16 mm²	185 mm²	--	--	✓	--	--		**3VA9264-0JB12**		1	1 unit	1CB
		50 mm²	300 mm²	--	--	--	✓	--		**3VA9384-0JB13**		1	1 unit	1CB
 3VA9504-0JB23	**Wire connector, 2 cables** • Connection of Cu/Al cable • included in scope of supply: 4 single terminals and 1 terminal cover, short	120 mm²	300 mm²	--	--	--	--	✓ NEW		**3VA9504-0JB23**		1	1 unit	1CB
 3VA9103-0JG11	**Wire connector with control wire tap** • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals	16 mm²	95 mm²	✓	--	--	--	--		**3VA9113-0JG11**		1	1 unit	1CB
		35 mm²	185 mm²	--	✓	--	--	--		**3VA9253-0JG12**		1	1 unit	1CB
		1.5 mm²	50 mm²	--	--	✓	--	--		**3VA9103-0JG11**		1	1 unit	1CB
		16 mm²	185 mm²	--	--	✓	--	--		**3VA9263-0JG12**		1	1 unit	1CB
		50 mm²	300 mm²	--	--	--	✓	--		**3VA9383-0JG13**		1	1 unit	1CB

[1] Only approved up to rated current 400 A

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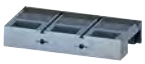
Connection technology – suitable for all installation types (fixed-mounted, plug-in and draw-out versions)

	Version	Minimum for stranded cable	Maximum for stranded cable	For molded case circuit breakers/ Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3VA9503-0JG23	**Wire connector, 2 cables, with control wire tap** • Connection of Cu/Al cable • included in scope of supply: 3 single terminals and 1 terminal cover, short	120 mm²	300 mm²	--	--	--	--	✓ NEW		**3VA9503-0JG23**		1	1 unit	1CB
 3VA9104-0JG11	**Wire connector with control wire tap** • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals	16 mm²	95 mm²	✓	--	--	--	--		**3VA9114-0JG11**		1	1 unit	1CB
		35 mm²	185 mm²	--	✓	--	--	--		**3VA9254-0JG12**		1	1 unit	1CB
		1.5 mm²	50 mm²	--	--	✓	--	--		**3VA9104-0JG11**		1	1 unit	1CB
		16 mm²	185 mm²	--	--	✓	--	--		**3VA9264-0JG12**		1	1 unit	1CB
		50 mm²	300 mm²	--	--	--	✓	--		**3VA9384-0JG13**		1	1 unit	1CB
 3VA9504-0JG23	**Wire connector, 2 cables, with control wire tap** • Connection of Cu/Al cable • included in scope of supply: 4 single terminals and 1 terminal cover, short	120 mm²	300 mm²	--	--	--	--	✓ NEW		**3VA9504-0JG23**		1	1 unit	1CB

	Version	Max. tap width	Max. tap thick-ness	For molded case circuit breakers/ Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Nut keeper kits suitable for all installation types (fixed-mounted, plug-in and draw-out versions)														
 3VA9203-0QA00	**Nut keeper kit** Included in scope of supply: • 3 single terminals	17 mm	6.5 mm	✓	--	--	--	--		**3VA9113-0QA00**		1	1 unit	1CB
		25 mm	8 mm	--	✓	--	--	--		**3VA9213-0QA00**		1	1 unit	1CB
		25 mm	8 mm	--	--	✓	--	--		**3VA9203-0QA00**		1	1 unit	1CB
		35 mm	10 mm	--	--	--	✓	--		**3VA9403-0QA00**		1	1 unit	1CB
 3VA9603-0QA00	**Nut keeper kit** Included in scope of supply: • Nut keeper kit for 3-pole breakers • 1 terminal cover	50 mm	28 mm	--	--	--	--	✓ NEW		**3VA9603-0QA00**		1	1 unit	1CB
 3VA9204-0QA00	**Nut keeper kit** Included in scope of supply: • 4 single terminals	17 mm	6.5 mm	✓	--	--	--	--		**3VA9114-0QA00**		1	1 unit	1CB
		25 mm	8 mm	--	✓	--	--	--		**3VA9214-0QA00**		1	1 unit	1CB
		25 mm	8 mm	--	--	✓	--	--		**3VA9204-0QA00**		1	1 unit	1CB
		35 mm	10 mm	--	--	--	✓	--		**3VA9404-0QA00**		1	1 unit	1CB
 3VA9604-0QA00	**Nut keeper kit** Included in scope of supply: • Nut keeper kit for 4-pole breakers • 1 terminal cover	50 mm	28 mm	--	--	--	--	✓ NEW		**3VA9604-0QA00**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Connection technology – suitable for all installation types (fixed-mounted, plug-in and draw-out versions)

	Version	Max. tap width	Max. tap thick-ness	For molded case circuit breakers/ Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Bus connectors extended suitable for all installation types (fixed-mounted, plug-in and draw-out versions)														
 3VA9263-0QB00	**Front bus connectors extended** Included in scope of supply: • 3 single terminals • 2 phase barriers	22 mm	8 mm	✓	--	--	--	--		**3VA9153-0QB00**		1	1 unit	1CB
		32 mm	10 mm	--	✓	--	--	--		**3VA9253-0QB00**		1	1 unit	1CB
		32 mm	10 mm	--	--	✓	--	--		**3VA9263-0QB00**		1	1 unit	1CB
		40 mm	12.5 mm	--	--	--	✓	--		**3VA9483-0QB00**		1	1 unit	1CB
 3VA9603-0QB00	**Front bus connectors extended** Included in scope of supply: • 3 single terminals • 2 phase barriers	50 mm	28 mm	--	--	--	--	✓ NEW		**3VA9603-0QB00**		1	1 unit	1CB
 3VA9264-0QB00	**Front bus connectors extended** Included in scope of supply: • 4 single terminals • 3 phase barriers	22 mm	8 mm	✓	--	--	--	--		**3VA9154-0QB00**		1	1 unit	1CB
		32 mm	10 mm	--	✓	--	--	--		**3VA9254-0QB00**		1	1 unit	1CB
		32 mm	10 mm	--	--	✓	--	--		**3VA9264-0QB00**		1	1 unit	1CB
		40 mm	12.5 mm	--	--	--	✓	--		**3VA9484-0QB00**		1	1 unit	1CB
 3VA9604-0QB00	**Front bus connectors extended** Included in scope of supply: • 4 single terminals • 3 phase barriers	50 mm	28 mm	--	--	--	--	✓ NEW		**3VA9604-0QB00**		1	1 unit	1CB
 3VA9263-0QC00	**Front bus connectors offset** Included in scope of supply: • 3 single terminals • 2 phase barriers Distance between pole centers: 100/160 A = 35 mm 250 A = 45 mm 400/630 A = 70 mm	30 mm	8 mm	✓	--	--	--	--		**3VA9153-0QC00**		1	1 unit	1CB
		35 mm	10 mm	--	✓	--	--	--		**3VA9253-0QC00**		1	1 unit	1CB
		35 mm	10 mm	--	--	✓	--	--		**3VA9263-0QC00**		1	1 unit	1CB
		60 mm	12.5 mm	--	--	--	✓	--		**3VA9483-0QC00**		1	1 unit	1CB

	Version	Max. tap width	Max. tap thickness	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3VA9264-0QC00	**Front bus connectors offset** Included in scope of supply: • 4 single terminals • 3 phase barriers Distance between pole centers: 100/160 A = 35 mm 250 A = 45 mm 400/630 A = 70 mm	30 mm	8 mm	✓	--	--	--		**3VA9154-0QC00**		1	1 unit	1CB
		35 mm	10 mm	--	✓	--	--		**3VA9254-0QC00**		1	1 unit	1CB
		35 mm	10 mm	--	--	✓	--		**3VA9264-0QC00**		1	1 unit	1CB
		60 mm	12.5 mm	--	--	--	✓		**3VA9484-0QC00**		1	1 unit	1CB

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Connection technology – suitable for all installation types (fixed-mounted, plug-in and draw-out versions)

	Version	Max. tap width	Max. tap thickness	For molded case circuit breakers/Article No. stem				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	d					
 3VA9263-0QD00	**Bus connectors edgewise** Included in scope of supply: • 3 single terminals • 2 phase barriers	20 mm	6 mm	✓	--	--	--		**3VA9153-0QD00**		1	1 unit	1CB
		25 mm	7 mm	--	✓	--	--		**3VA9253-0QD00**		1	1 unit	1CB
		25 mm	7 mm	--	--	✓	--		**3VA9263-0QD00**		1	1 unit	1CB
		40 mm	8 mm	--	--	--	✓		**3VA9483-0QD00**		1	1 unit	1CB
 3VA9264-0QD00	**Bus connectors edgewise** Included in scope of supply: • 4 single terminals • 3 phase barriers	20 mm	6 mm	✓	--	--	--		**3VA9154-0QD00**		1	1 unit	1CB
		25 mm	7 mm	--	✓	--	--		**3VA9254-0QD00**		1	1 unit	1CB
		25 mm	7 mm	--	--	✓	--		**3VA9264-0QD00**		1	1 unit	1CB
		40 mm	8 mm	--	--	--	✓		**3VA9484-0QD00**		1	1 unit	1CB
 3VA9223-0QG00	**Nut keeper kit right-angled**[1] Included in scope of supply: • 3 single terminals • 2 phase barriers	22 mm	8 mm	✓	--	--	--		**3VA9113-0QG00**		1	1 unit	1CB
		32 mm	10 mm	--	✓	--	--		**3VA9213-0QG00**		1	1 unit	1CB
		32 mm	10 mm	--	--	✓	--		**3VA9223-0QG00**		1	1 unit	1CB
		40 mm	12.5 mm	--	--	--	✓		**3VA9403-0QG00**		1	1 unit	1CB
 3VA9224-0QG00	**Nut keeper kit right-angled**[1] Included in scope of supply: • 4 single terminals • 3 phase barriers	22 mm	8 mm	✓	--	--	--		**3VA9114-0QG00**		1	1 unit	1CB
		32 mm	10 mm	--	✓	--	--		**3VA9214-0QG00**		1	1 unit	1CB
		32 mm	10 mm	--	--	✓	--		**3VA9224-0QG00**		1	1 unit	1CB
		40 mm	12.5 mm	--	--	--	✓		**3VA9404-0QG00**		1	1 unit	1CB

[1] Can only be connected to breaker side N,1,3,5

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Connection technology – suitable for all installation types (fixed-mounted, plug-in and draw-out versions)

	Version	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Rear connection studs flat suitable for all installation types (fixed-mounted, plug-in and draw-out versions)											
 3VA9203-0QE00	**Rear connection stud flat** Included in scope of supply: • 2 short connection studs flat • 1 long connection stud flat	✓	--	--	--		**3VA9113-0QE00**		1	1 unit	1CB
		--	✓	--	--		**3VA9213-0QE00**		1	1 unit	1CB
		--	--	✓	--		**3VA9203-0QE00**		1	1 unit	1CB
		--	--	--	✓		**3VA9403-0QE00**		1	1 unit	1CB
 3VA9204-0QE00	**Rear connection stud flat** Included in scope of supply: • 2 short connection studs flat • 2 long connection studs flat	✓	--	--	--		**3VA9114-0QE00**		1	1 unit	1CB
		--	✓	--	--		**3VA9214-0QE00**		1	1 unit	1CB
		--	--	✓	--		**3VA9204-0QE00**		1	1 unit	1CB
		--	--	--	✓		**3VA9404-0QE00**		1	1 unit	1CB
 3VA9201-0QE10	**Rear connection stud flat** Included in scope of supply: • 1 short connection stud flat	✓	--	--	--		**3VA9111-0QE10**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0QE10**		1	1 unit	1CB
		--	--	✓	--		**3VA9201-0QE10**		1	1 unit	1CB
		--	--	--	✓		**3VA9401-0QE10**		1	1 unit	1CB
 3VA9201-0QE20	**Rear connection stud flat** Included in scope of supply: • 1 long connection stud flat	✓	--	--	--		**3VA9111-0QE20**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0QE20**		1	1 unit	1CB
		--	--	✓	--		**3VA9201-0QE20**		1	1 unit	1CB
		--	--	--	✓		**3VA9401-0QE20**		1	1 unit	1CB
Rear connection studs round suitable for all installation types (fixed-mounted, plug-in and draw-out versions)											
 3VA9203-0QF00	**Rear connection stud round** Included in scope of supply: • 1 long connection stud round • 2 short connection studs	✓	--	--	--		**3VA9113-0QF00**		1	1 unit	1CB
			✓	--	--		**3VA9213-0QF00**		1	1 unit	1CB
		--	--	✓	--		**3VA9203-0QF00**		1	1 unit	1CB
		--	--	--	✓		**3VA9403-0QF00**		1	1 unit	1CB
 3VA9204-0QF00	**Rear connection stud round** Included in scope of supply: • 2 long connection studs round • 2 short connection studs round	✓	--	--	--		**3VA9114-0QF00**		1	1 unit	1CB
		--	✓	--	--		**3VA9214-0QF00**		1	1 unit	1CB
		--	--	✓	--		**3VA9204-0QF00**		1	1 unit	1CB
		--	--	--	✓		**3VA9404-0QF00**		1	1 unit	1CB
 3VA9201-0QF10	**Rear connection stud round** Included in scope of supply: • 1 short connection stud round	✓	--	--	--		**3VA9111-0QF10**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0QF10**		1	1 unit	1CB
		--	--	✓	--		**3VA9201-0QF10**		1	1 unit	1CB
		--	--	--	✓		**3VA9401-0QF10**		1	1 unit	1CB
 3VA9111-0QF20	**Rear connection stud round** Included in scope of supply: • 1 long connection stud round	✓	--	--	--		**3VA9111-0QF20**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0QF20**		1	1 unit	1CB
		--	--	✓	--		**3VA9201-0QF20**		1	1 unit	1CB
		--	--	--	✓		**3VA9401-0QF20**		1	1 unit	1CB

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Connection technology – specially for fixed mounting

Phase barriers suitable for all installation types (fixed-mounted, plug-in and draw-out versions)


3VA9262-0WA00

Phase barriers
Included in scope of supply:
• 2 phase barriers

For molded case circuit breakers/ Article No. stem: 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
✓	--	--	--	--		**3VA9152-0WA00**		1	1 unit	1CB
--	✓	--	--	--		**3VA9252-0WA00**		1	1 unit	1CB
--	--	✓	--	--		**3VA9262-0WA00**		1	1 unit	1CB
--	--	--	✓	--		**3VA9482-0WA00**		1	1 unit	1CB
--	--	--	--	✓ NEW		**3VA9602-0WA00**		1	1 unit	1CB

Bus connectors extended specially for fixed mounting


3VA9151-0QB00

Front bus connectors extended
Included in scope of supply:
• 1 busbar connection piece

Max. tap width	Max. tap thickness	For molded case circuit breakers/ Article No. stem: 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
32 mm	10 mm	✓	--	--	--		**3VA9151-0QB00**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Minimum for stranded cable	Maximum for stranded cable	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Wire connectors specially for fixed mounting													
 3VA9112-0JJ12	**Wire connector, large** • Connection of Cu/Al cable • Included in scope of supply: - 2 single terminals - 1 terminal cover extended - 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9112-0JJ12**		1	1 unit	1CB
 3VA9113-0JJ12	**Wire connector, large** • Connection of Cu/Al cable • Included in scope of supply: - 3 single terminals - 1 terminal cover extended - 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9113-0JJ12**		1	1 unit	1CB
		50 mm²	240 mm²	--	✓	--	--		**3VA9213-0JJ13**		1	1 unit	1CB
		50 mm²	240 mm²	--	--	✓	--		**3VA9223-0JJ13**		1	1 unit	1CB
 3VA9114-0JJ12	**Wire connector, large** • Connection of Cu/Al cable • Included in scope of supply: - 4 single terminals - 1 terminal cover extended - 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9114-0JJ12**		1	1 unit	1CB
		50 mm²	240 mm²	--	✓	--	--		**3VA9214-0JJ13**		1	1 unit	1CB
		50 mm²	240 mm²	--	--	✓	--		**3VA9224-0JJ13**		1	1 unit	1CB
 3VA9112-0JC12	**Wire connector, large, with control wire tap** • Connection of Cu/Al cable • Included in scope of supply: - 2 single terminals - 1 terminal cover extended - 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9112-0JC12**		1	1 unit	1CB
 3VA9223-0JC13	**Wire connector, large, with control wire tap** • Connection of Cu/Al cable • Included in scope of supply: - 3 single terminals - 1 terminal cover extended - 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9113-0JC12**		1	1 unit	1CB
		50 mm²	240 mm²	--	✓	--	--		**3VA9213-0JC13**		1	1 unit	1CB
		50 mm²	240 mm²	--	--	✓	--		**3VA9223-0JC13**		1	1 unit	1CB
 3VA9114-0JC12	**Wire connector, large, with control wire tap** • Connection of Cu/Al cable • Included in scope of supply: - 4 single terminals - 1 terminal cover extended - 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9114-0JC12**		1	1 unit	1CB
		50 mm²	240 mm²	--	✓	--	--		**3VA9214-0JC13**		1	1 unit	1CB
		50 mm²	240 mm²	--	--	✓	--		**3VA9224-0JC13**		1	1 unit	1CB

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Connection technology – specially for fixed mounting

	Version	Minimum for stranded cable	Maximum for stranded cable	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3VA9223-0JJ22	**Wire connector, 2 cables** • Connection of Cu/Al cable • Included in scope of supply: - 3 single terminals - 1 terminal cover extended - 1 insulating plate	2 x 25 mm²	2 x 150 mm²	--	✓	--	--		**3VA9213-0JJ22**		1	1 unit	1CB
		2 x 25 mm²	2 x 150 mm²	--	--	✓	--		**3VA9223-0JJ22**		1	1 unit	1CB
		2 x 70 mm²	2 x 300 mm²	--	--	--	✓		**3VA9403-0JJ23**		1	1 unit	1CB
 3VA9224-0JJ22	**Wire connector, 2 cables** • Connection of Cu/Al cable • Included in scope of supply: - 4 single terminals - 1 terminal cover extended - 1 insulating plate	2 x 25 mm²	2 x 150 mm²	--	✓	--	--		**3VA9214-0JJ22**		1	1 unit	1CB
		2 x 25 mm²	2 x 150 mm²	--	--	✓	--		**3VA9224-0JJ22**		1	1 unit	1CB
		2 x 70 mm²	2 x 300 mm²	--	--	--	✓		**3VA9404-0JJ23**		1	1 unit	1CB
 3VA9223-0JC22	**Wire connector, 2 cables, with control wire tap** • Connection of Cu/Al cable • Included in scope of supply: - 3 single terminals - 1 terminal cover extended - 1 insulating plate	2 x 25 mm²	2 x 150 mm²	--	✓	--	--		**3VA9213-0JC22**		1	1 unit	1CB
		2 x 25 mm²	2 x 150 mm²	--	--	✓	--		**3VA9223-0JC22**		1	1 unit	1CB
		2 x 70 mm²	2 x 300 mm²	--	--	--	✓		**3VA9403-0JC23**		1	1 unit	1CB
 3VA9224-0JC22	**Wire connector, 2 cables, with control wire tap** • Connection of Cu/Al cable • Included in scope of supply: - 4 single terminals - 1 terminal cover extended - 1 insulating plate	2 x 25 mm²	2 x 150 mm²	--	✓	--	--		**3VA9214-0JC22**		1	1 unit	1CB
		2 x 25 mm²	2 x 150 mm²	--	--	✓	--		**3VA9224-0JC22**		1	1 unit	1CB
		2 x 70 mm²	2 x 300 mm²	--	--	--	✓		**3VA9404-0JC23**		1	1 unit	1CB
 3VA9112-0JF60	**Distribution wire connector, 6 cables** • Connection of Cu/Al cable • Included in scope of supply: - 2 single terminals - 1 terminal cover extended - 1 insulating plate	6 x 1.5 mm²	6 x 35 mm²	✓	--	--	--		**3VA9112-0JF60**		1	1 unit	1CB
 3VA9223-0JF60	**Distribution wire connector, 6 cables** • Connection of Cu/Al cable • Included in scope of supply: - 3 single terminals - 1 terminal cover extended - 1 insulating plate	6 x 1.5 mm²	6 x 35 mm²	✓	--	--	--		**3VA9113-0JF60**		1	1 unit	1CB
				--	✓	--	--		**3VA9213-0JF60**		1	1 unit	1CB
				--	--	✓	--		**3VA9223-0JF60**		1	1 unit	1CB
				--	--	--	✓		**3VA9303-0JF60**		1	1 unit	1CB
 3VA9224-0JF60	**Distribution wire connector, 6 cables** • Connection of Cu/Al cable • Included in scope of supply: - 4 single terminals - 1 terminal cover extended - 1 insulating plate	6 x 1.5 mm²	6 x 35 mm²	✓	--	--	--		**3VA9114-0JF60**		1	1 unit	1CB
				--	✓	--	--		**3VA9214-0JF60**		1	1 unit	1CB
				--	--	✓	--		**3VA9224-0JF60**		1	1 unit	1CB
				--	--	--	✓		**3VA9304-0JF60**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For molded case circuit breakers/Article No. stem				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	d					
Terminal covers specially for fixed mounting											
 3VA9111-0WD10	**Terminal cover for 1-pole breakers**	✓	--	--	--		**3VA9111-0WD10**		1	1 unit	1CB
 3VA9111-0WD20	**Terminal cover for 2-pole breakers**	✓	--	--	--		**3VA9111-0WD20**		1	1 unit	1CB
 3VA9221-0WD30	**Terminal cover for 3-pole breakers**	✓	--	--	--		**3VA9111-0WD30**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WD30**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WD30**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WD30**		1	1 unit	1CB
 3VA9221-0WD40	**Terminal cover for 4-pole breakers**	✓	--	--	--		**3VA9111-0WD40**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WD40**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WD40**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WD40**		1	1 unit	1CB
 3VA9111-0WF20	**Terminal cover extended, 2-pole** including insulating plate	✓	--	--	--		**3VA9111-0WF20**		1	1 unit	1CB
 3VA9221-0WF30	**Terminal cover extended for 3-pole breakers** including insulating plate	✓	--	--	--		**3VA9111-0WF30**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WF30**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WF30**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WF30**		1	1 unit	1CB
 3VA9221-0WF40	**Terminal cover extended for 4-pole breakers** including insulating plate	✓	--	--	--		**3VA9111-0WF40**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WF40**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WF40**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WF40**		1	1 unit	1CB
 3VA9221-0WG30	**Terminal cover offset for 3-pole breakers** including insulating plate	✓	--	--	--		**3VA9111-0WG30**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WG30**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WG30**		1	1 unit	1CB
		--	--	--	✓		**3VA9401-0WG30**		1	1 unit	1CB

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Connection technology – specially for fixed mounting

	Version	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3VA9221-0WG40	**Terminal cover offset for 4-pole breakers** including insulating plate	✓	--	--	--		**3VA9111-0WG40**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WG40**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WG40**		1	1 unit	1CB
		--	--	--	✓		**3VA9401-0WG40**		1	1 unit	1CB
Insulating plates specially for fixed mounting											
 3VA9111-0WJ20	**Insulating plate, 2-pole**	✓	--	--	--		**3VA9111-0WJ20**		1	1 unit	1CB
 3VA9221-0WJ30	**Insulating plate, 3-pole**	✓	--	--	--		**3VA9111-0WJ30**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WJ30**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WJ30**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WJ30**		1	1 unit	1CB
 3VA9221-0WJ40	**Insulating plate, 4-pole**	✓	--	--	--		**3VA9111-0WJ40**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WJ40**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WJ40**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WJ40**		1	1 unit	1CB
 3VA9221-0WK30	**Insulating plate offset, 3-pole**	✓	--	--	--		**3VA9111-0WK30**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WK30**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WK30**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WK30**		1	1 unit	1CB
 3VA9221-0WK40	**Insulating plate offset, 4-pole**	✓	--	--	--		**3VA9111-0WK40**		1	1 unit	1CB
		--	✓	--	--		**3VA9211-0WK40**		1	1 unit	1CB
		--	--	✓	--		**3VA9221-0WK40**		1	1 unit	1CB
		--	--	--	✓		**3VA9481-0WK40**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Control wire taps specially for fixed mounting											
 3VA9200-0WB00	**Control wire tap for box terminal**	✓	--	--	--		**3VA9110-0WB00**		1	10 units	1CB
		--	✓	✓	--		**3VA9200-0WB00**		1	10 units	1CB
		--	--	--	✓		**3VA9480-0WB00**		1	10 units	1CB
 3VA9200-0WC00	**Control wire tap for busbar**	✓	--	--	--		**3VA9110-0WC00**		1	10 units	1CB
		--	✓	✓	--		**3VA9200-0WC00**		1	10 units	1CB
		--	--	--	✓		**3VA9480-0WC00**		1	10 units	1CB
DC insulating plates specially for fixed mounting											
 3VA9113-0SG10	**DC insulating plate for 3VA1**										
	Versions										
	• For fixed-mounted molded case circuit breakers										
	- 3-pole	✓	--	--	--		**3VA9113-0SG10**		1	10 units	1CB
	- 4-pole	✓	--	--	--		**3VA9114-0SG10**		1	10 units	1CB
Side plate specially for fixed mounting											
 3VA9112-0SG20	**Side plate for 3VA1**										
	Versions										
	• For fixed-mounted molded case circuit breakers										
	- 2-pole	✓	--	--	--		**3VA9112-0SG20**		1	5 units	1CB

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Connection technology – specially for plug-in and draw-out units

Terminal covers specially for plug-in and draw-out units

Terminal cover for plug-in/draw-out unit (spare part)
- To provide circuit breaker touch protection
- For mounting on the molded case circuit breaker



3VA9123-0KB01



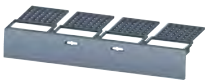
3VA9124-0KB01

Version	For molded case circuit breakers/Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Versions										
• 3-pole • Included in scope of supply: Cover for infeed and outgoing side	✓	--	--	--		**3VA9113-0KB01**		1	1 unit	1CB
	--	✓	--	--		**3VA9213-0KB01**		1	1 unit	1CB
	--	--	✓	--		**3VA9123-0KB01**		1	1 unit	1CB
	--	--	--	✓		**3VA9353-0KB01**		1	1 unit	1CB
• 4-pole • Included in scope of supply: Cover for infeed and outgoing side	✓	--	--	--		**3VA9114-0KB01**		1	1 unit	1CB
	--	✓	--	--		**3VA9214-0KB01**		1	1 unit	1CB
	--	--	✓	--		**3VA9124-0KB01**		1	1 unit	1CB
	--	--	--	✓		**3VA9354-0KB01**		1	1 unit	1CB

Terminal cover for plug-in or draw-out socket
- For touch protection in the termination area of the plug-in or draw-out socket
- For mounting on the plug-in or draw-out socket



3VA9153-0KB03



3VA9154-0KB03

Version	For molded case circuit breakers/Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Versions										
• 3-pole	✓	--	--	--		**3VA9153-0KB03**		1	1 unit	1CB
	--	✓	--	--		**3VA9253-0KB03**		1	1 unit	1CB
	--	--	✓	--		**3VA9163-0KB03**		1	1 unit	1CB
	--	--	--	✓		**3VA9353-0KB03**		1	1 unit	1CB
• 4-pole	✓	--	--	--		**3VA9154-0KB03**		1	1 unit	1CB
	--	✓	--	--		**3VA9254-0KB03**		1	1 unit	1CB
	--	--	✓	--		**3VA9164-0KB03**		1	1 unit	1CB
	--	--	--	✓		**3VA9354-0KB03**		1	1 unit	1CB

Terminal cover, extended, for plug-in or draw-out socket
- For touch protection in the termination area of the plug-in or draw-out socket
- For mounting on the plug-in or draw-out socket
- 1 insulating plate



3VA9153-0KB04



3VA9154-0KB04

Version	For molded case circuit breakers/Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Versions										
• 3-pole	✓	--	--	--		**3VA9153-0KB04**		1	1 unit	1CB
	--	✓	--	--		**3VA9253-0KB04**		1	1 unit	1CB
	--	--	✓	--		**3VA9163-0KB04**		1	1 unit	1CB
	--	--	--	✓		**3VA9353-0KB04**		1	1 unit	1CB
• 4-pole	✓	--	--	--		**3VA9154-0KB04**		1	1 unit	1CB
	--	✓	--	--		**3VA9254-0KB04**		1	1 unit	1CB
	--	--	✓	--		**3VA9164-0KB04**		1	1 unit	1CB
	--	--	--	✓		**3VA9354-0KB04**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For molded case circuit breakers/Article No. stem				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	d					
	Terminal cover, offset, for plug-in or draw-out socket • For touch protection in the termination area of the plug-in or draw-out socket • For mounting on the plug-in or draw-out socket • 1 insulating plate										
	Versions										
 3VA9153-0KB05	• 3-pole	✓	--	--	--		**3VA9153-0KB05**		1	1 unit	1CB
		--	✓	--	--		**3VA9253-0KB05**		1	1 unit	1CB
		--	--	✓	--		**3VA9163-0KB05**		1	1 unit	1CB
		--	--	--	✓		**3VA9353-0KB05**		1	1 unit	1CB
 3VA9154-0KB05	• 4-pole	✓	--	--	--		**3VA9154-0KB05**		1	1 unit	1CB
		--	✓	--	--		**3VA9254-0KB05**		1	1 unit	1CB
		--	--	✓	--		**3VA9164-0KB05**		1	1 unit	1CB
		--	--	--	✓		**3VA9354-0KB05**		1	1 unit	1CB

	Version	Minimum for stranded cable	Maximum for stranded cable	For molded case circuit breakers/Article No. stem				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	d					
Wire connectors specially for plug-in and draw-out units													
 3VA9153-0JC12	**Wire connector, large, with control wire tap** Included in scope of supply: • 3 single terminals • 1 terminal cover extended • 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9153-0JC12**		1	1 unit	1CB
		50 mm²	240 mm²	--	✓	--	--		**3VA9253-0JC13**		1	1 unit	1CB
		50 mm²	240 mm²	--	--	✓	--		**3VA9263-0JC13**		1	1 unit	1CB
 3VA9154-0JC12	**Wire connector, large, with control wire tap** Included in scope of supply: • 4 single terminals • 1 terminal cover extended • 1 insulating plate	25 mm²	150 mm²	✓	--	--	--		**3VA9154-0JC12**		1	1 unit	1CB
		50 mm²	240 mm²	--	✓	--	--		**3VA9254-0JC13**		1	1 unit	1CB
		50 mm²	240 mm²	--	--	✓	--		**3VA9264-0JC13**		1	1 unit	1CB

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Connection technology – specially for plug-in and draw-out units

	Version	Minimum for stranded cable	Maximum for stranded cable	For molded case circuit breakers/Article No. stem				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	d					
 3VA9263-0JC22	**Wire connector, 2 cables, with control wire tap** Included in scope of supply: • 3 single terminals • 1 terminal cover extended • 1 insulating plate	2 x 25 mm²	2 x 150 mm²	--	✓	--	--		**3VA9253-0JC22**		1	1 unit	1CB
		2 x 25 mm²	2 x 150 mm²	--	--	✓	--		**3VA9263-0JC22**		1	1 unit	1CB
		2 x 70 mm²	2 x 300 mm²	--	--	--	✓		**3VA9483-0JC23**		1	1 unit	1CB
 3VA9264-0JC22	**Wire connector, 2 cables, with control wire tap** Included in scope of supply: • 4 single terminals • 1 terminal cover extended • 1 insulating plate	2 x 25 mm²	2 x 150 mm²	--	✓	--	--		**3VA9254-0JC22**		1	1 unit	1CB
		2 x 25 mm²	2 x 150 mm²	--	--	✓	--		**3VA9264-0JC22**		1	1 unit	1CB
		2 x 70 mm²	2 x 300 mm²	--	--	--	✓		**3VA9484-0JC23**		1	1 unit	1CB
 3VA9153-0JF60	**Distribution wire connector, 6 cables** Included in scope of supply: • 3 single terminals • 1 terminal cover extended • 1 insulating plate	6 x 1.5 mm²	6 x 35 mm²	✓	--	--	--		**3VA9153-0JF60**		1	1 unit	1CB
		6 x 1.5 mm²	6 x 35 mm²	--	✓	--	--		**3VA9253-0JF60**		1	1 unit	1CB
		6 x 1.5 mm²	6 x 35 mm²	--	--	✓	--		**3VA9263-0JF60**		1	1 unit	1CB
		6 x 1.5 mm²	6 x 35 mm²	--	--	--	✓		**3VA9383-0JF60**		1	1 unit	1CB
 3VA9154-0JF60	**Distribution wire connector, 6 cables** Included in scope of supply: • 4 single terminals • 1 terminal cover extended • 1 insulating plate	6 x 1.5 mm²	6 x 35 mm²	✓	--	--	--		**3VA9154-0JF60**		1	1 unit	1CB
		6 x 1.5 mm²	6 x 35 mm²	--	✓	--	--		**3VA9254-0JF60**		1	1 unit	1CB
		6 x 1.5 mm²	6 x 35 mm²	--	--	✓	--		**3VA9264-0JF60**		1	1 unit	1CB
		6 x 1.5 mm²	6 x 35 mm²	--	--	--	✓		**3VA9384-0JF60**		1	1 unit	1CB
Control wire taps specially for plug-in and draw-out units													
 3VA9280-0WB00	**Control wire tap for box terminal**			✓	--	--	--		**3VA9150-0WB00**		1	10 units	1CB
				--	✓	✓	--		**3VA9280-0WB00**		1	10 units	1CB
				--	--	--	✓		**3VA9480-0WB00**		1	10 units	1CB
 3VA9280-0WC00	**Control wire tap for busbar**			✓	--	--	--		**3VA9150-0WC00**		1	10 units	1CB
				--	✓	✓	--		**3VA9280-0WC00**		1	10 units	1CB
				--	--	--	✓		**3VA9480-0WC00**		1	10 units	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Using plug-in and draw-out technology the 3VA molded-case circuit breakers can be installed/removed or replaced quickly and safely. In this case, the cables or busbars of the main current paths are connected to the taps of the plug-in socket or the draw-out socket.

The termination areas of the sockets for these versions are designed in the same way as those of the molded case circuit breakers but, due to the different requirements for creepages and clearances, have slightly different dimensions.

This means that all connections without insulating measures (e.g. box terminals) from the range of breakers can also be used with the socket for plug-in or draw-out units.

Connections with insulating measures have their own article numbers and are listed below.

A 3VA molded case circuit breaker in the plug-in or draw-out version has plug-in contacts on the input and load side of the main terminals. When the circuit breaker is plugged or moved into the socket, the plug-in contacts slide into the socket-side tulip contacts and connect the main current paths with the circuit breaker. In addition, auxiliary circuit connectors can be used to connect the auxiliary and control signals from the internal accessories of the molded case circuit breaker to the outside.

The main differences between plug-in units and draw-out units are convenience of operation and the potential for functional expansion.

Plug-in technology

Plug-in technology is the less expensive and more space-saving of the two solutions. The plug-in version of the molded case circuit breaker is equipped with plug-in contacts on the back of the 3VA molded case circuit breaker. These make a friction-locked and keyed connection with the corresponding mating connectors in the plug-in socket. The plug-in unit can be supplied as a complete kit or as a conversion kit for breakers including screw-fastened terminal covers.

Draw-out technology

Draw-out versions of the molded case circuit breaker are also equipped with plug-in contacts at the main current paths. In addition, side walls including guide and support bolts are bolted to the sides of the molded case circuit breaker. With this version, the mating component is the draw-out socket. It is also equipped with a guide mechanism via which the molded case circuit breaker is moved into the draw-out socket by means of a handle in order to connect the breaker to the main circuits. The operator can clearly read from a position indicator whether the breaker is properly connected to the main circuits or safely isolated from them (so that it can be withdrawn).

Position signaling switches which transmit the position information CONNECT, TEST, and DISCONNECT can be integrated in the right-hand side wall of the draw-out unit. A special set of position signaling switches transfers the position data to the COM060 communication module via a preassembled wire.

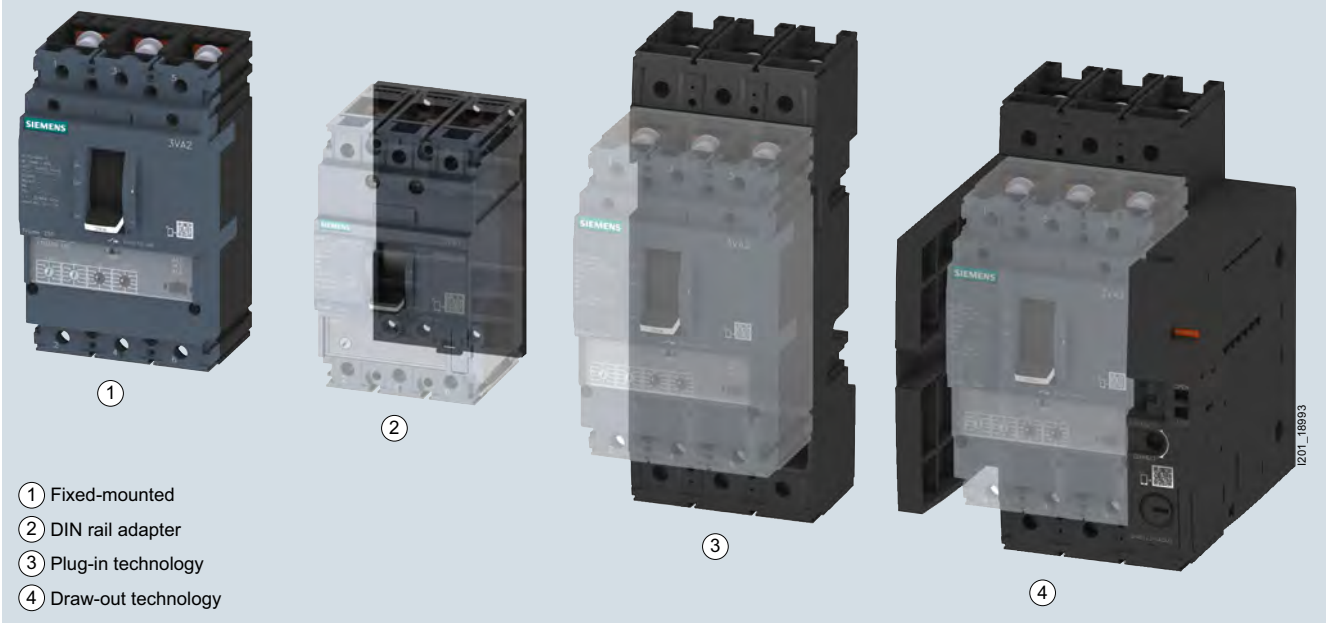
The draw-out complete kit as well as the draw-out conversion kit for one breaker are available. Both kits include screw-fastened terminal covers for the breaker. The crank handle for the draw-out unit must be ordered separately.

Benefits

- Molded case circuit breakers can be replaced quickly and easily for the purpose of overhaul or servicing
- Electrical isolation and clearly visible isolating distance
- Socket can be interlocked to prevent the 3VA molded case circuit breaker from being plugged in or moved in
- Identical connection technology for all molded case circuit breakers, whether they are plug-in, draw-out or fixed-mounted units
- Test of the auxiliary and control circuit connections in the test position of the draw-out unit possible without contacted main current paths

Installation variants

3VA molded case circuit breakers are available in the following installation variants:



1 Fixed-mounted
2 DIN rail adapter
3 Plug-in technology
4 Draw-out technology

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Plug-in and draw-out technology

2

Selection and ordering data

	Version	For molded case circuit breakers/ Article No. stem				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	d					
Plug-in socket											
	Plug-in unit, complete kit Comprising: • Plug-in socket • Conversion kit • Mounting screw kit										
	Versions										
 3VA9123-0KP00	• 3-pole	✓	--	--	--		**3VA9113-0KP00**		1	1 unit	1CB
		--	✓	--	--		**3VA9213-0KP00**		1	1 unit	1CB
		--	--	✓	--		**3VA9123-0KP00**		1	1 unit	1CB
		--	--	--	✓		**3VA9323-0KP00**		1	1 unit	1CB
 3VA9124-0KP00	• 4-pole	✓	--	--	--		**3VA9114-0KP00**		1	1 unit	1CB
		--	✓	--	--		**3VA9214-0KP00**		1	1 unit	1CB
		--	--	✓	--		**3VA9124-0KP00**		1	1 unit	1CB
		--	--	--	✓		**3VA9324-0KP00**		1	1 unit	1CB
	Plug-in unit, conversion kit Comprising: • Screw-fastened terminal covers for molded case circuit breakers • Plug-in contacts • Cable cages • Autotrip plunger										
	Versions										
 3VA9123-0KP10	• 3-pole	✓	--	--	--		**3VA9113-0KP10**		1	1 unit	1CB
		--	✓	--	--		**3VA9213-0KP10**		1	1 unit	1CB
		--	--	✓	--		**3VA9123-0KP10**		1	1 unit	1CB
		--	--	--	✓		**3VA9323-0KP10**		1	1 unit	1CB
 3VA9124-0KP10	• 4-pole	✓	--	--	--		**3VA9114-0KP10**		1	1 unit	1CB
		--	✓	--	--		**3VA9214-0KP10**		1	1 unit	1CB
		--	--	✓	--		**3VA9124-0KP10**		1	1 unit	1CB
		--	--	--	✓		**3VA9324-0KP10**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Draw-out units

	Version	For molded case circuit breakers/ Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Draw-out unit, complete kit Comprising: • Draw-out socket • Conversion kit • Mounting screw kit										
	Versions										
 3VA9123-0KD00	• 3-pole	--	✓	--	--		**3VA9213-0KD00**		1	1 unit	1CB
		--	--	✓	--		**3VA9123-0KD00**		1	1 unit	1CB
		--	--	--	✓		**3VA9323-0KD00**		1	1 unit	1CB
 3VA9124-0KD00	• 4-pole	--	✓	--	--		**3VA9214-0KD00**		1	1 unit	1CB
		--	--	✓	--		**3VA9124-0KD00**		1	1 unit	1CB
		--	--	--	✓		**3VA9324-0KD00**		1	1 unit	1CB
	Note										
	The crank handle for the draw-out unit must be ordered separately.										
	Draw-out unit, conversion kit Conversion kit comprising: • Screw-fastened terminal covers for molded case circuit breakers • Side walls • Plug-in contacts • Cable cages • Autotrip plungers										
	Versions										
 3VA9123-0KD10	• 3-pole	--	✓	--	--		**3VA9213-0KD10**		1	1 unit	1CB
		--	--	✓	--		**3VA9123-0KD10**		1	1 unit	1CB
		--	--	--	✓		**3VA9323-0KD10**		1	1 unit	1CB
 3VA9124-0KD10	• 4-pole	--	✓	--	--		**3VA9214-0KD10**		1	1 unit	1CB
		--	--	✓	--		**3VA9124-0KD10**		1	1 unit	1CB
		--	--	--	✓		**3VA9324-0KD10**		1	1 unit	1CB

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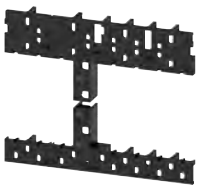
Plug-in and draw-out technology

Cable cage


3VA9167-0KB02

Version	For molded case circuit breakers/ Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Cable cage for plug-in/draw-out unit 3/4-pole (spare part) Cable duct for routing of the required cables from the internal accessories on the back of the circuit breaker	✓	--	--	--		**3VA9157-0KB02**		1	1 unit	1CB
	--	✓	--	--		**3VA9257-0KB02**		1	1 unit	1CB
	--	--	✓	--		**3VA9167-0KB02**		1	1 unit	1CB
	--	--	--	✓		**3VA9367-0KB02**		1	1 unit	1CB

Door feedthrough


3VA9167-0KT00

Version	For molded case circuit breakers/ Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Door feedthrough	--	✓	--	--		**3VA9257-0KT00**		1	1 unit	1CB
	--	--	✓	--		**3VA9167-0KT00**		1	1 unit	1CB
	--	--	--	✓		**3VA9367-0KT00**		1	1 unit	1CB

Spare part: autotrip plunger NEW


3VA9457-0KP81

Version	For molded case circuit breakers/Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Autotrip plunger										
• Accessories for plug-in unit	✓	--	--	--		**3VA9157-0KP81**		1	1 unit	1CB
	--	✓	--	--		**3VA9257-0KP81**		1	1 unit	1CB
	--	--	✓	--		**3VA9267-0KP81**		1	1 unit	1CB
	--	--	--	✓		**3VA9457-0KP81**		1	1 unit	1CB
• Accessories for draw-out unit	--	✓	--	--		**3VA9257-0KD81**		1	1 unit	1CB
	--	--	✓	--		**3VA9267-0KD81**		1	1 unit	1CB
	--	--	--	✓		**3VA9457-0KD81**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Other accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3VA9987-0KC00	**Communication link for draw-out unit** Comprising: • Cable kit with 3 special position signaling switches • Connecting cable 3VA9987-0KC10		**3VA9987-0KC00**		1	1 unit	1CB
 3VA9987-0KB00	**Position signaling switches** • For draw-out unit • For plug-in unit		**3VA9987-0KB00**		1	1 unit	1CB
 3VA9987-0KC10	**Spare part: connecting cable** To connect the position signaling switches for communication with the COM060		**3VA9987-0KC10**		1	1 unit	1CB
 3VA9987-0KD81	**Crank handle for draw-out unit** Insulated, incl. crank holder		**3VA9987-0KD81**		1	1 unit	1CB
 3VA9987-0KD80	**Auxiliary circuit connector**						
	Versions						
	• For all draw-out units		**3VA9987-0KD80**		1	1 unit	1CB
	• For all plug-in units		**3VA9987-0KP80**		1	1 unit	1CB
	Note						
	Each auxiliary circuit connector is designed for 4 cables.						

	Version		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3VA9980-0VL10	**Cylinder lock (type Ronis)** • Includes a lock with 2 keys • For locking • For installation in all rotary operators • For mounting in the adapter kit for the accessories compartment	Key 1		**3VA9980-0VL10**		1	1 unit	1CB
		Key 2		**3VA9980-0VL20**		1	1 unit	1CB
		Key 3		**3VA9980-0VL30**		1	1 unit	1CB
		Key 4		**3VA9980-0VL40**		1	1 unit	1CB
 3VA9980-0LF40	**Cylinder lock adapter for draw-out unit** • For fitting a cylinder lock in the right-hand side wall of the draw-out unit • To prevent unauthorized withdrawal or insertion of the circuit breaker into the draw-out unit • Circuit breaker can be locked in the CONNECT, TEST and DISCONNECT positions			**3VA9980-0LF40**		1	1 unit	1CB

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Residual current devices

Overview

Residual current devices can be used to prevent hazardous residual currents that could cause injury to personnel and livestock, and damage to property. These are available as accessory components for the 3VA series up to the largest circuit breaker size. All residual current devices detect both purely sinusoidal AC residual currents as well as pulsating DC residual currents (type A), and the combination of molded case circuit breakers or switch disconnectors with mounted residual current devices complies with IEC 60947-2 Annex B, while the combination with modular residual current devices complies with IEC 60947-2 Annex M.



RCD510 RCD520 RCD820

"Basic" type residual current devices for 3VA1

The "Basic" type residual current devices are characterized by the following features:

- LEDs for signaling "ready" state and pre-alarms
- Tripped signal at device and via electrical contacts

On the residual current devices of the 5-series (RCD5..), tripping can be delayed by up to three seconds so that in the event of a fault, only the branch containing the fault is switched off by means of appropriate selective grading of the series-switched residual current devices. The device types of the 3-series (RCD3..) are instantaneous versions, in other words, they trip immediately.

RCD310 and RCD510

The RCD310/RCD510 can be combined with the 3VA1 molded case circuit breaker and the switch disconnector. They are mounted on the left side of the breaker. In the event of a residual current, the breaker is tripped by an RCR (residual current release) built into the left accessories compartment of the breaker.

RCD320 and RCD520

The RCD320 or RCD520 can be installed below the trip unit of the 3VA1 molded case circuit breaker. Equipping the molded case circuit breaker fully with internal accessories is easy because with these residual current devices, the molded case circuit breaker is tripped by a plunger that is already integrated into the residual current device and the circuit breaker.

"Advanced" type residual current devices for 3VA2

RCD820

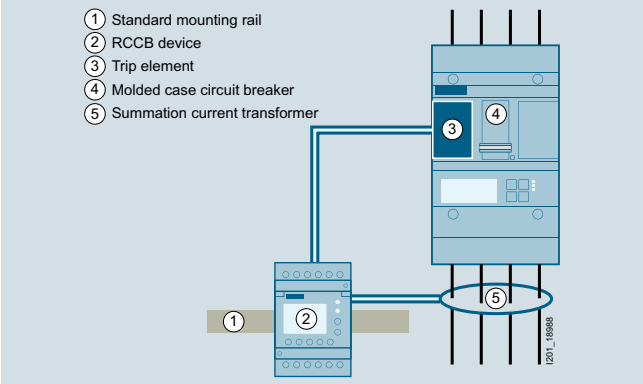
"Advanced" residual current devices can detect fault type A currents up to 10 A and type AC up to 30 A. Status message can be forwarded via the large number of auxiliary contacts on the unit or via the communication connection. LEDs for signaling the "ready" state of the residual current device, the communication connection, and the two pre-alarms on the residual current device provide information on the current status on-site.

Modular residual current device for 3VA1/3VA2

As well as a residual current device mounted direct on the breaker, an external solution is also available. The modular solution consists of a residual current protection device, a separate summation current transformer and a trip element.

If the trip element is omitted, the combination of residual current device and summation current transformer works purely as a display unit.

For further information, see chapter "Monitoring Devices" in the section on residual current devices (MRCD).



Modular residual current device

Benefits

RCD310 and RCD510

- Increased packaging density in the cubicle thanks to the compact L-shaped design
- Through-hole technology saves inconvenient wiring of the breaker and the residual current device
- Mounting of a DIN rail adapter enables attachment to a DIN rail
- Side-by-side arrangement with miniature circuit breakers possible thanks to 45 mm cover size
- Function of a shunt trip automatically integrated by RCR dual functionality
- Deliberate acknowledgment of a residual current prevents unintentional restart
- Can be used purely as a display unit

RCD320 and RCD520

- Compact design saves space in the cubicle
- Deliberate acknowledgment of a residual current prevents unintentional restart

RCD820

- Communication connection or alternatively electrical contacts ensure fast status messages – even remotely
- Advanced RCD820 is also suitable for use as a display unit
- Staggered pre-alarms prevent/avoid plant downtimes
- Local presence not required thanks to remote test, acknowledgment and commissioning of the RCD820 via electrical contacts or communication

Modular residual current device

- Modular design allows mounting on different breaker designs (e.g. 1, 2, 3 and 4-pole breakers)
- Reuse in the event of a change of application ensures cost savings
- Time savings thanks to simple upgrading of the residual current functionality in an existing plant
- Especially suitable for use where installation space is restricted

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	For molded case circuit breakers/ Article No. stem 3VA11	3VA12	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Residual current devices (RCD) for 3VA1									
	Type A (pulse current sensitive) • Mounted on the side (left) • Trip element (RCR) included in the scope of delivery • Can only be mounted on molded case circuit breakers and switch disconnectors with box terminal • U_e = 127 - 480 V AC, 50/60 Hz								
	Note If the molded case circuit breaker has no box terminals as connections, a set of box terminals must be ordered additionally for the taps below the thermal-magnetic trip units.								
 3VA9114-0RS10	**RCD310** • 4-pole • Rated residual response current, adjustable: $I_{\Delta n}$ = 0.03 - 0.05 - 0.1 - 0.3 - 0.5 - 1 - 3 - 5 A; default: 30 mA • Instantaneous (INS)	✓	--		**3VA9114-0RS10**		1	1 unit	1CB
 3VA9113-0RS20	**RCD510** • Rated residual response current, adjustable: $I_{\Delta n}$ = 0.03 - 0.05 - 0.1 - 0.3 - 0.5 - 1 - 3 - 5 A; default: 30 mA • Delay time, adjustable: Δt = Instantaneous (INS) - 0.06 - 0.15 - 0.3 - 0.5 - 1 - 2 - 3 s; default: Instantaneous (INS)								
	Versions								
	• 3-pole	✓	--		**3VA9113-0RS20**		1	1 unit	1CB
		--	✓		**3VA9213-0RS20**		1	1 unit	1CB
	• 4-pole	✓	--		**3VA9114-0RS20**		1	1 unit	1CB
 3VA9114-0RS20		--	✓		**3VA9214-0RS20**		1	1 unit	1CB
	Type A (pulse current sensitive) • Mounted below (under trip unit) • Can be mounted on molded case circuit breakers • U_e = 127 - 480 V AC, 50/60Hz								
 3VA9114-0RL10	**RCD320** • 4-pole • Rated residual response current, adjustable: $I_{\Delta n}$ = 0.03 - 0.05 - 0.1 - 0.3 - 0.5 - 1 - 3 - 5 A; default: 30 mA • Instantaneous (INS)	✓	--		**3VA9114-0RL10**		1	1 unit	1CB
 3VA9113-0RL20	**RCD520** • Rated residual response current, adjustable: $I_{\Delta n}$ = 0.03 - 0.05 - 0.1 - 0.3 - 0.5 - 1 - 3 - 5 A; default: 30 mA • Delay time, adjustable: Δt = Instantaneous (INS) - 0.06 - 0.15 - 0.3 - 0.5 - 1 - 2 - 3 s; default: Instantaneous (INS)								
	Versions								
	• 3-pole	✓	--		**3VA9113-0RL20**		1	1 unit	1CB
		--	✓		**3VA9213-0RL20**		1	1 unit	1CB
	• 4-pole	✓	--		**3VA9114-0RL20**		1	1 unit	1CB
 3VA9114-0RL20		--	✓		**3VA9214-0RL20**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Residual current devices

Residual current devices (RCD) for 3VA2

Version	For molded case circuit breakers/Article No. stem 3VA20 3VA21	3VA22	3VA23	3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Type A (pulse current sensitive) • Mounted below (under trip unit) • With energy infeed from below, the required auxiliary switch (AUX) must be ordered separately. • U_e = 127 - 690 V AC, 50/60 Hz										
RCD820 • Rated residual response current, adjustable: $I_{\Delta n}$ = 0.03 - 0.05 - 0.1 - 0.3 - 0.5 - 1 - 3 - 5 - 10 - 30 A; default: 30 mA • Delay time, adjustable: Δt = 0 - 0.06 - 0.15 - 0.3 - 0.5 - 1 - 2 - 3 - 5 - 10 s; default: Instantaneous (INS) • Note: 30 A setting range only for type AC applications										
Versions										
• 3-pole	✓	--	--	--		**3VA9123-0RL30**		1	1 unit	1CB
	--	✓	--	--		**3VA9223-0RL30**		1	1 unit	1CB
	--	--	✓	--		**3VA9323-0RL30**		1	1 unit	1CB
	--	--	--	✓		**3VA9423-0RL30**		1	1 unit	1CB
• 4-pole	✓	--	--	--		**3VA9124-0RL30**		1	1 unit	1CB
	--	✓	--	--		**3VA9224-0RL30**		1	1 unit	1CB
	--	--	✓	--		**3VA9324-0RL30**		1	1 unit	1CB
	--	--	--	✓		**3VA9424-0RL30**		1	1 unit	1CB


3VA9123-0RL30


3VA9124-0RL30

Modular residual current device MRCD



For more information, see chapter "Monitoring Devices".

Version	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Metering function

The Rogowski coils integrated in the 3VA2 molded case circuit breakers are capable of delivering particularly accurate current measurements. An additional voltage tap is integrated in molded case circuit breakers equipped with an 8-series ETU, which means that energy data can also be measured – the 3VA2 molded case circuit breaker therefore offers a range of metering functions similar to those available with the tried-and-tested 7KM PAC measuring device!

An external current transformer for N conductors is available to allow direct measurement of the neutral conductor current with 3-pole molded case circuit breakers. When the 3-pole circuit breaker is installed in the 4-pole network, it is advisable to deploy the voltage tap at the neutral conductor so that the neutral point of the voltage network can be fixed.

Communication via the COM800/COM100 breaker data server

The 3VA2 molded case circuit breaker utilizes an innovative, modern communication concept. This concept is based on the COM800 breaker data server which can link up to eight molded case circuit breakers to different bus systems. For applications involving only one 3VA2 molded case circuit breaker, the COM100 is an ideal alternative to the COM800 breaker data server.

The COM060 communication module in the molded case circuit breaker is wired via a T-Connector to the COM800/COM100 breaker data server. Integrated as standard in the COM800/COM100 breaker data server is an Ethernet interface with the Modbus TCP protocol to allow communication with powerconfig and the powermanager. Optional communication modules can be installed to provide different communication protocols. An additional benefit of this structure is that the communication costs per molded case circuit breaker decrease with every further circuit breaker that is connected to the COM800 breaker data server.

The communication equipment for the molded case circuit breakers can be installed and connected extremely easily, reliably and efficiently thanks to the connector system used. The 24 V DC supply to the electronic trip units is also reliably provided by these connections. The breaker data server utilizes independent supplementary functions to deliver valuable information about the connected molded case circuit breakers and the power distribution system.

Flexible communication thanks to optional expansion modules

With COM800/COM100, the 3VA2 molded case circuit breakers can be integrated into the relevant communication networks via the following optional expansion modules:

- Switched Ethernet PROFINET
- PROFIBUS
- RS 485 (Modbus RTU)

GSDML or GSD files are also available for PROFINET and PROFIBUS for integration into the engineering system, e.g. STEP 7.

DSP800 display

The DSP800 display can be used to show breaker information (status, measured values, parameters) on the cubicle door. It communicates via the integral Ethernet interface with the COM800/COM100 and is thus able to display the data of up to 8 3VA2 molded case circuit breakers simultaneously.

EFB300 external function box

The EFB300 external function box is linked directly to the ETU of the 3VA2 molded case circuit breaker by a cable. It provides four digital outputs and one digital input. The powerconfig software can be used to set which information is to be output from the ETU via the four digital outputs:

- All reasons for tripping, categorized according to LSING
- Overload alarms AL1 and AL2
- Pre-trip alarm from overload protection system
- Load shedding and load pick-up
- Temperature alarm
- Output of an energy pulse (S0 signal), in combination with an 8-series ETU only

A zone selective interlocking functionality (ZSI) can also be implemented via the module.

Note:

A TD500 or the COM060 and COM800/COM100 combination is needed to program a change in the output assignments with powerconfig.

TD300 and TD500 test devices

The TD300 activation and trip box is a mobile, battery-operated local test device. One of its functions is to provide a temporary power supply to the Electronic Trip Units (ETUs) so that they can be operated and parameterized. It is also used to test the tripping function of the molded case circuit breaker.

The TD500 mobile test device allows the proper functioning and connections of all connected system components to be tested at the breaker commissioning stage because it is capable of simulating every conceivable cause of breaker tripping. The molded case circuit breaker responds as if the emergency were real – it trips in accordance with the set parameters and transmits all alarm and trip signals to the connected components.

The TD500 test device can be used as a hand-held tester or in conjunction with a PC. In the latter case, the TD500 test device is connected to the PC via a supplied USB cable and acts as a gateway to the 3VA2 molded case circuit breaker. Using the powerconfig software, it is possible to read out or modify the setting parameters of the molded case circuit breaker and monitor the measured values.

Benefits

- The metering function integrated in 8-series ETUs can acquire energy data without requiring additional external transformers
- The COM800 breaker data server provides a cost-efficient communication interface for up to 8 3VA2 molded case circuit breakers
- Universal bus interfaces are available for the COM800/COM100 breaker data server
- Universal S0 interface for the output of energy pulses
- 100 test results can be stored with the TD500 test device
- Status and measured values of up to 8 molded case circuit breakers are displayed in the cubicle door using the DSP800

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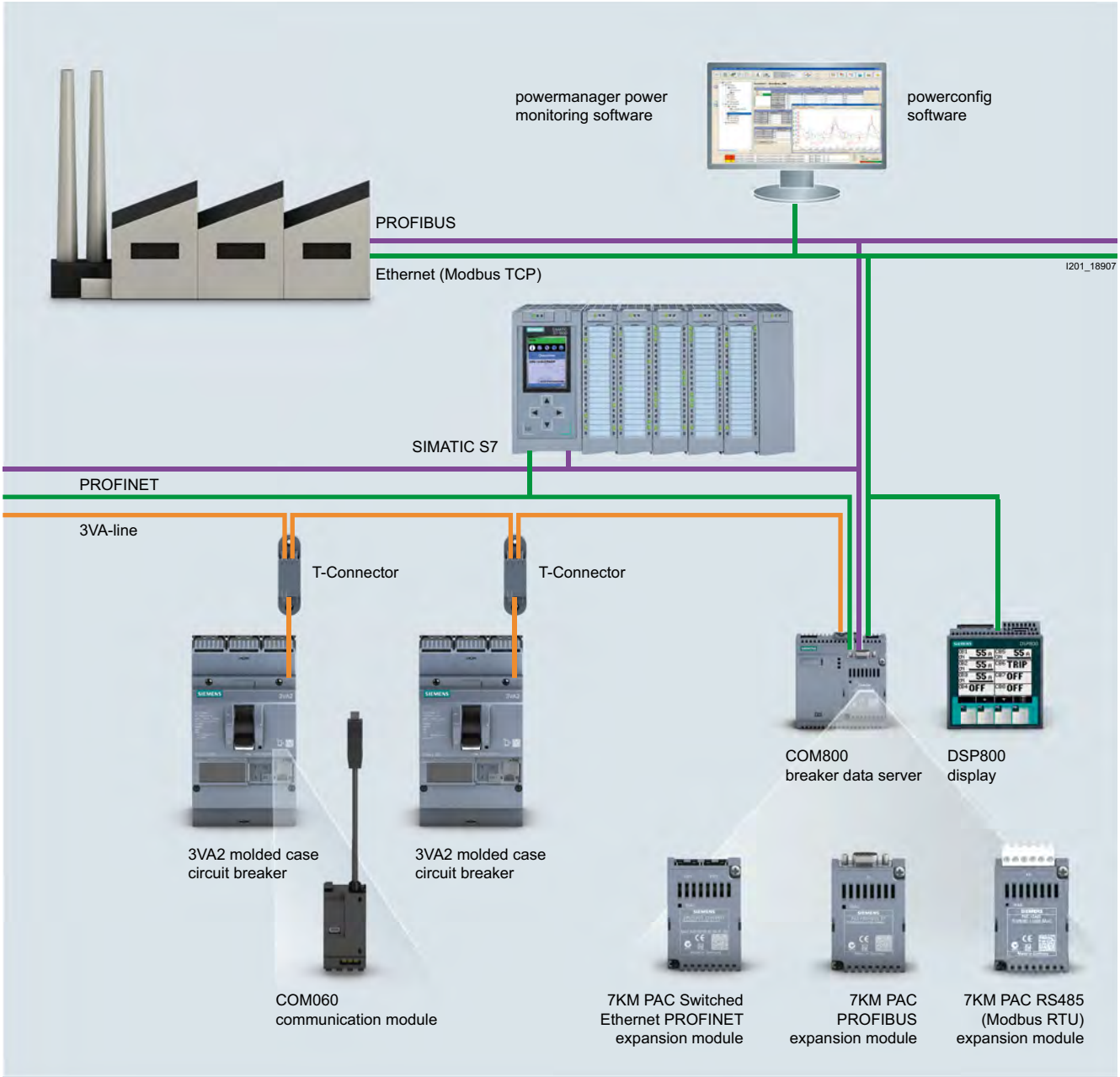
2

Design



Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview of the metering functions

Metering function[1]			ETUs of the 5-series	ETUs of the 8-series	Display Display in ETU	Display DSP800	Communication COM800/COM100
Current							
Phase and neutral conductor currents	I_1,I_2,I_3,I_N	A	✓	✓	👁	👁	👁
Residual current to ground	I_g	A	✓	✓	👁	👁	👁
Phase with highest load		A	✓	✓	👁	👁	👁
Mean value over the three phase currents	$I_{LAVG}= (I_1+I_2+I_3)/3$	A	--	✓	--	👁	👁
Asymmetry of the phase currents	I_{nba}	%	--	✓	--	👁	👁
THD of the 3 phases	$THDI_1$, $THDI_2$, $THDI_3$	%	--	✓	--	👁	👁
Voltage							
Phase voltages incl. mean value	U_{12}, U_{23}, U_{31}, U_{phavg}	V	--	✓	👁	👁	👁
Voltages to N conductor incl. mean value	U_{1N}, U_{2N}, U_{3N}, U_{Navg}	V	--	✓	--	👁	👁
Voltage unbalance		%	--	✓	--	👁	👁
THD phase/phase and phase/N	$THDI_1$, $THDI_2$, $THDI_3$	%	--	✓	--	👁	👁
Power							
Active power, total and per phase	P_1, P_2, P_3, P_{tot}	kW	--	✓	👁 (P_{tot})	👁	👁
Apparent power, total and per phase	S_1, S_2, S_3, S_{tot}	kVA	--	✓	--	👁	👁
Reactive power, total and per phase	Q_1, Q_2, Q_3, Q_{tot}	kVAr	--	✓	👁	👁	👁
Power factor of the fundamental	PF_1, PF_2, PF_3, PF_{avg}		--	✓	👁 (PF_{avg})	👁	👁
Energy							
Active energy, infeed and feedback	E_p	kWh	--	✓	👁	👁	👁
Reactive energy, infeed and feedback	E_q	kVArh	--	✓	--	👁	👁
Apparent energy	E_s	kVAh	--	✓	--	👁	👁
Frequency							
Present frequency	f	Hz	--	✓	👁	👁	👁
Maximum pointer function							
Min/max current, voltage, power	with time stamp		--	--	--	--	👁

[1] Depending on ETU version

✓ Available -- Not available

👁 Displayable

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Accuracy specifications

Accuracy levels of the specified measured values of the 8-series ETU, including the integrated current sensors:

Measured value	Additional condition	Accuracy in % of the read-off measured value
Current	0.2 x I_b ... 1.2 x I_b	±1%
Voltage (L-N)	80 V < U < 480 V	±1%
THD current	Up to the 19th harmonic 0.2 x I_b ... 1.2 x I_b	±5%
THD voltage	Up to the 19th harmonic 80 V < U < 480 V	±5%
Power factor PF	0.2 x I_b ... 1.2 x I_b	± 0.05% absolute
Active power	I_b and U_n as described below the table	Class 2 according to IEC 61557-12
Active energy	I_b and U_n as described below the table	Class 2 according to IEC 61557-12
Reactive power Apparent power	0.2 x I_b ... 1.2 x I_b PF ≥ 0.6 inductive PF ≥ 0.8 capacitive	±2%
Reactive energy Apparent energy	0.2 x I_b ... 1.2 x I_b PF ≥ 0.6 inductive PF ≥ 0.8 capacitive	±2%
Frequency	80 V < U < 480 V	±0.1%

Legend:

I_b is the maximum current in the relevant size.

Example: 3VA21 → I_b = 160 A

U_n refers to the nominal voltage of the metering function; between phase and neutral

All specified accuracies refer to an ambient temperature of 23 °C ± 2 °C.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	For molded case circuit breakers/ Article No. stem 3VA20 3VA21 3VA22	3VA23 3VA24 3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
24 V module									
 3VA9187-0TB50	**24 V module** • 24 V DC • For mounting in the right-hand accessories compartment of the 3VA2 • Optional energy supply for the ETU, also includes continuous operation of the ETU display and the metering function of the ETU 8-series	✓	--		**3VA9187-0TB50**		1	1 unit	1CB
		--	✓		**3VA9387-0TB50**		1	1 unit	1CB
Communication accessories in the molded case circuit breaker									
 3VA9187-0TB10	**COM060 communication module** • For mounting in the right-hand accessories compartment of the 3VA2 molded case circuit breaker (including ETU power supply) • Communication with the COM800/COM100 breaker data server via the 3VA-line • Including a T-Connector	✓	--		**3VA9187-0TB10**		1	1 unit	1CB
		--	✓		**3VA9387-0TB10**		1	1 unit	1CB
Breaker data server									
 3VA9987-0TA10	**COM800 breaker data server** • 2 terminating resistors • Central communication module for connecting up to eight 3VA2 molded case circuit breakers via the 3VA-line • Ethernet 10/100 Mbps interface • Module slot for plugging on an optional PROFIBUS DP or PROFINET module				**3VA9987-0TA10**		1	1 unit	1CB
 3VA9987-0TA20	**COM100 breaker data server** • 2 terminating resistors • Optimized, central communication module for connecting a 3VA2 molded case circuit breaker via the 3VA-line • Ethernet 10/100 Mbps interface • Module slot for plugging on an optional PROFIBUS DP or PROFINET module				**3VA9987-0TA20**		1	1 unit	1CB
 7KM9300-0AB01-0AA0	**7KM PAC PROFIBUS DP expansion module** • The 7KM PAC PROFIBUS DP expansion module is used for connecting the COM800/COM100 breaker data server, and the 3VA molded case circuit breakers connected to it, to PROFIBUS DPV1. • The 7KM PAC PROFIBUS DP expansion module provides the status and measured quantities of the 3VA molded case circuit breaker for the PROFIBUS DP master. It receives information (e.g. commands) from the PROFIBUS DP master, and forwards this information to the 3VA molded case circuit breaker.				**7KM9300-0AB01-0AA0**		1	1 unit	1DD
 7KM9300-0AE01-0AA0	**7KM PAC Switched Ethernet PROFINET expansion module** • The 7KM PAC Switched Ethernet PROFINET expansion module is used to connect the COM800/COM100 breaker data server, and the 3VA molded case circuit breakers connected to it, to PROFINET via two Ethernet interfaces. • The 7KM PAC Switched Ethernet PROFINET expansion module provides the status and measured quantities of the 3VA molded case circuit breaker to PROFINET via the PROFINET IO, PROFIenergy and Modbus TCP protocols.				**7KM9300-0AE01-0AA0**		1	1 unit	1DD
 7KM9300-0AM00-0AA0	**7KM PAC RS 485 Modbus RTU expansion module** • The 7KM PAC RS 485 Modbus expansion module is used to connect the COM800/COM100 breaker data server, and the 3VA molded case circuit breakers connected to it, to Modbus RTU. • The 7KM PAC RS 485 Modbus expansion module provides the status and measured quantities of the 3VA molded case circuit breaker for the Modbus RTU master. It receives information (e.g. commands) from the Modbus RTU master, and forwards this information to the 3VA molded case circuit breaker.				**7KM9300-0AM00-0AA0**		1	1 unit	1DD

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Communication and testing/commissioning devices

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Accessories for communication							
 3VA9987-0TG10	**T-Connector** • Spare part • Provides spur line feeder to COM060 and loops through to the next circuit breaker.		**3VA9987-0TG10**		1	1 unit	1CB
 3VA9987-0TG11	**DIN rail adapter** For snapping the T-Connector onto a DIN rail.		**3VA9987-0TG11**		1	1 unit	1CB
 3VA9987-0TC10	**Preassembled T-Connector-to-T-Connector or T-Connector-to-COM800/COM100 connecting cable**						
	• 0.4 m long		**3VA9987-0TC10**		1	1 unit	1CB
	• 1 m long		**3VA9987-0TC20**		1	1 unit	1CB
	• 2 m long		**3VA9987-0TC30**		1	1 unit	1CB
	• 4 m long		**3VA9987-0TC40**		1	1 unit	1CB
 3VA9987-0TF20	**Preassembled connecting cable for extending the COM060-to-T-Connector spur line connection**						
	• 0.4 m long		**3VA9987-0TF20**		1	1 unit	1CB
	• 0.8 m long		**3VA9987-0TF10**		1	1 unit	1CB
 3VA9987-0TE10	**Additional bus terminating resistors**		**3VA9987-0TE10**		1	5 units	1CB
 3VA9987-0UC10	**Voltage tap to external N conductor** Cable for connecting the neutral point for the metering function of the 8-series ETU, length 1.5 m		**3VA9987-0UC10**		1	1 unit	1CB
 3VA9107-0NA10	**External current transformer for N conductor** Connection of an external current transformer for the N conductor for 3-pole 3VA2 molded case circuit breakers for 5-series and 8-series ETUs, including connecting cable						
		• I_n = 25 ... 150 A	**3VA9007-0NA10**		1	1 unit	1CB
		• I_n = 160 ... 350 A	**3VA9107-0NA10**		1	1 unit	1CB
		• I_n = 400 ... 630 A	**3VA9307-0NA10**		1	1 unit	1CB
 3VA9077-0NA10	**External current transformer as straight-through transformer** NEW						
		• I_n = 25 ... 150 A	**3VA9077-0NA10**		1	1 unit	1CB
		• I_n = 160 ... 350 A	**3VA9177-0NA10**		1	1 unit	1CB
		• I_n = 400 ... 630 A	**3VA9377-0NA10**		1	1 unit	1CB
		• I_n = 600 ... 1250 A	**3VA9677-0NA10**		1	1 unit	1CB
	Spare part: cable for connecting external current transformer for N conductor		**3VA9907-0NB10**		1	1 unit	1CB
Display							
 3VA9987-0TD10	**DSP800 display** • For displaying the status, measured values and parameters of up to 8 3VA2 molded case circuit breakers • Connection to the COM800/COM100 via Ethernet for displaying information of the COM800/COM100 and the connected 3VA2 molded case circuit breaker		**3VA9987-0TD10**		1	1 unit	1CB
External function box							
 3VA9987-0UA10	**EFB300** • External function box for connection to the ETU of the 3VA2 molded case circuit breaker • 4 digital outputs for information output • 1 digital input • ZSI functionality • S0 interface • Including cable 1.5 m in length		**3VA9987-0UA10**		1	1 unit	1CB
	Connecting cable for EFB300 Spare part						
	• Length 1.5 m		**3VA9987-0UB10**		1	1 unit	1CB
	• Length 3.0 m		**3VA9987-0UB20**		1	1 unit	1CB
	• Length 3.0 m for 3VA2 with EFB and RCD820		**3VA9987-0UB30**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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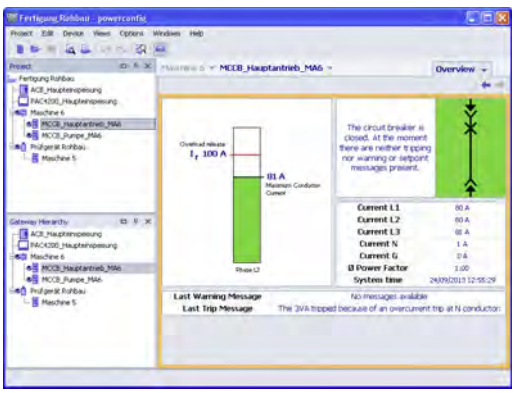
	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Test devices							
 3VA9987-0MA10	**TD300** • Connection to the front interface of the ETU • Test device for activating the ETU and triggering a test trip		**3VA9987-0MA10**		1	1 unit	1CB
 3VA9987-0MB10	**TD500** • Connection to the front interface of the ETU • Initiation of various test trips (LSING) • USB interface for connection of a PC using powerconfig • ETU parameterization • Including external power supply • Including connecting cable to the 3VA2 molded case circuit breaker		**3VA9987-0MB10**		1	1 unit	1CB
 3VA9987-0MX10	**Spare part: external power supply for TD500** Spare part 110 ... 240 V AC		**3VA9987-0MX10**		1	1 unit	1CB
 3VA9987-0MY10	**Spare part: cable for connecting the TD500 to the 3VA2 molded case circuit breaker**		**3VA9987-0MY10**		1	1 unit	1CB
Commissioning and service software: powerconfig							
	• Commissioning and service software for 3VA2 molded case circuit breakers and further SENTRON components • For Windows XP, Windows 7 and Windows 8 • Connection via TD500 or COM800/COM100 • Languages: German, English, Chinese, Spanish, Portuguese • Enables complete use of the electronic components of the 3VA2 such as ETU, EFB300, DSP800, TD500 • Communication via PROFINET, PROFIBUS, Ethernet Modbus TCP and RS 485 with Modbus RTU • see also chapter "Software" "Configuring, visualizing and controlling with SENTRON". • powerconfig can be downloaded free of charge from Siemens Industry Online Support at http://support.automation.siemens.com/WW/view/en/63452759 • More information can be found on the Internet at: www.siemens.com/sentron						

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

With all types of 3VA molded case circuit breakers, a basic distinction is made between:

- Locking of molded case circuit breakers
- Interlocking of molded case circuit breakers

The padlock devices make it possible to lock the 3VA molded case circuit breaker in either the OFF or the ON operating position.

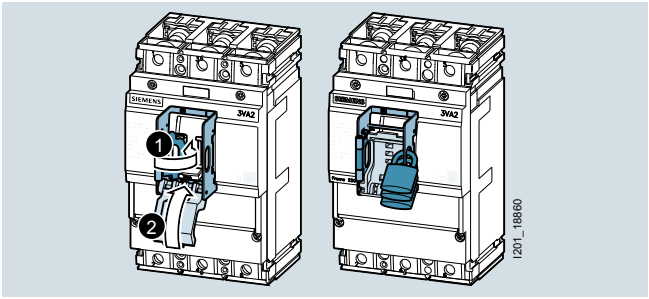
Using the interlocking technology, it is possible to mutually interlock two or more molded case circuit breakers. The interlock system is designed to ensure that no more than one molded case circuit breaker can be operated at a time. The following methods of interlocking can be used on 3VA molded case circuit breakers:

- Front interlock
- Rear interlock

Locking technology

Padlock device for the handle

A padlock device mounted and latched on the handle allows the 3VA molded case circuit breaker to be locked in the OFF or the ON position.

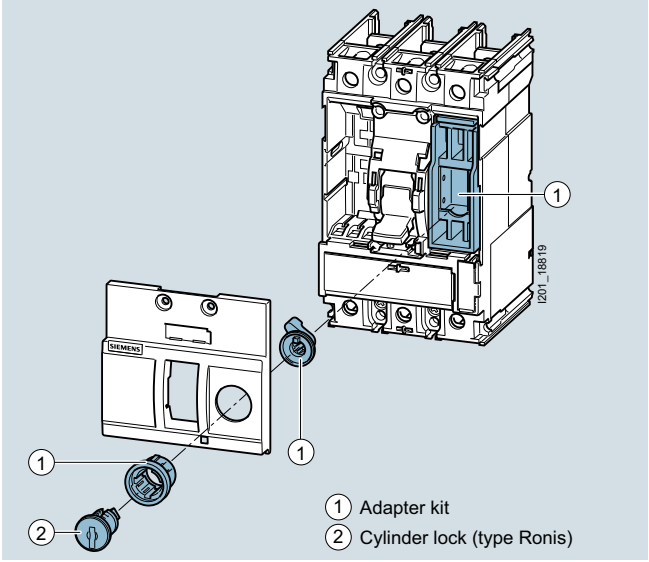


Locking with cylinder lock

The 3VA molded case circuit breaker can also be locked in the OFF (O) or ON (I) position by means of a cylinder lock supplied by Ronis. This prevents further operation of the circuit breaker.

In order to lock a molded case circuit breaker in a specific operating state, the following two components need to be ordered.

- Cylinder lock (type Ronis)
- Lock adapter kit for mounting the cylinder lock in the accessories compartment

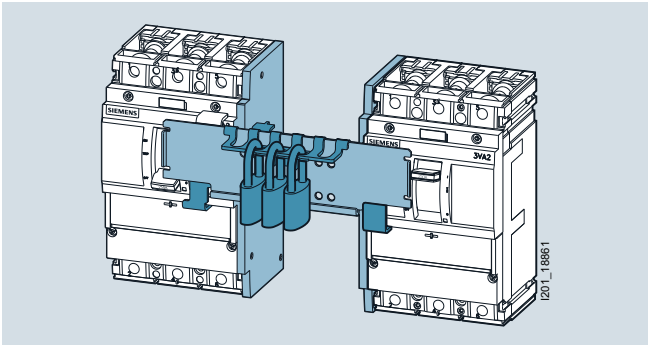


Interlocking technology

Interlocking by means of a sliding bar

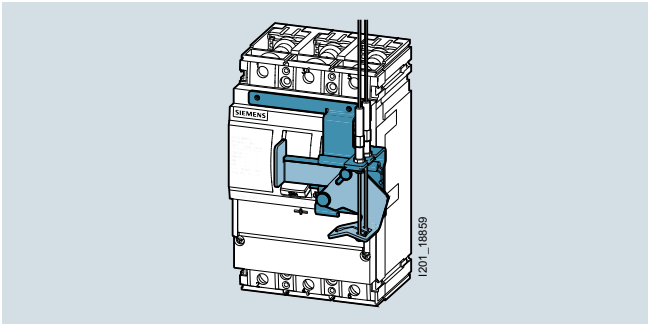
The sliding bar allows between two and three 3VA molded case circuit breakers of the same size to be mutually interlocked by means of a sliding bar.

With this device, the sliding bar is moved to block the handle of the interlocked molded case circuit breaker. For this reason, a molded case circuit breaker is always locked in the safe OFF position, while the released circuit breaker can still be operated.



Handle interlock using a Bowden cable

With the front Bowden cable interlock, it is possible to implement a mutual interlock between two or three molded case circuit breakers of different sizes. The front Bowden cable interlock operates according to the blocking principle. In order to implement this system, modules for the Bowden cable interlock must be mounted on the molded case circuit breakers to be included in the interlock arrangement. Each of these modules is equipped with a slide which blocks or releases operation of the handle.



Interlocking with cylinder locks

Using the cylinder lock (type Ronis), it is not only possible to lock a molded case circuit breaker, but also to create an interlock between an optional number of molded case circuit breakers of different sizes. To implement an interlocking application using cylinder locks, the adapter kit with the cylinder lock (type Ronis) must be fitted in the right-hand accessories compartment of each molded case circuit breaker to be included in the interlock arrangement and all breakers must be locked in the OFF position. In order to ensure reliable functioning of the interlock, only one key may be used for the entire interlock application! All other keys must be kept or locked away in a safe place. This one key must be used as the release instrument for only one molded case circuit breaker at a time! To release or operate a molded case circuit breaker, the cylinder lock must be turned to the "Unlocked" position with this one particular key. Only then can the handle of the circuit breaker be moved to the ON position. When the cylinder lock is in the "Unlocked" position, the key cannot be removed and must be left in the lock.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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To implement an interlocking application involving multiple molded case circuit breakers, the following two components must be ordered for each circuit breaker:

- Cylinder lock (type Ronis) with identical key number
- Interlock adapter kit for mounting the cylinder lock in the accessories compartment



Rear interlock

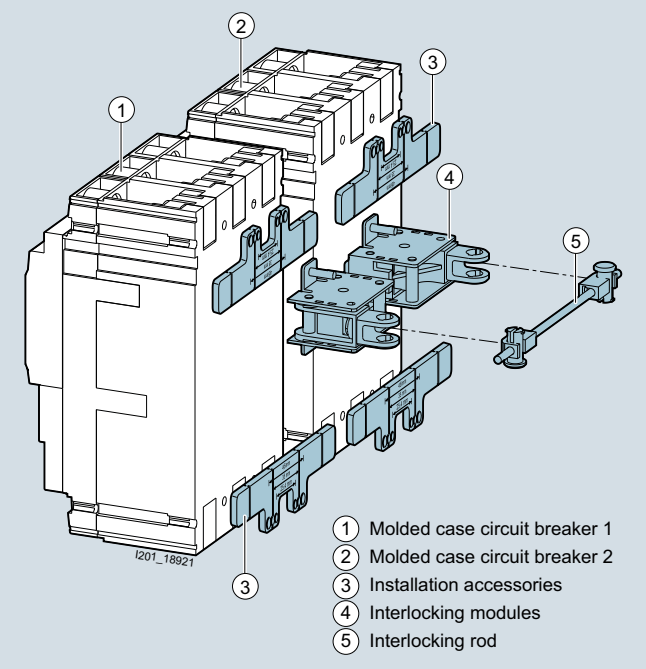
The rear interlock system allows implementation of an interlock without restricting the number of accessories which can be installed at the front of the 3VA molded case circuit breaker. Using the rear interlock, it is possible to create an interlock between two molded case circuit breakers of different sizes based on the blocking principle. When one molded case circuit breaker closes, the other circuit breaker is prevented from closing by a plunger which engages in the breaker mechanism directly from the rear panel of the molded case circuit breaker.

This system requires the installation of two interlocking modules which are mounted behind the molded case circuit breakers and behind the mounting frame of the cubicle. The two interlocking modules are interconnected by means of the interlocking rod.

A mounting plate comprising a plate and two profile rails is available as an accessory to assist installation.

Rear interlock for plug-in or draw-out units

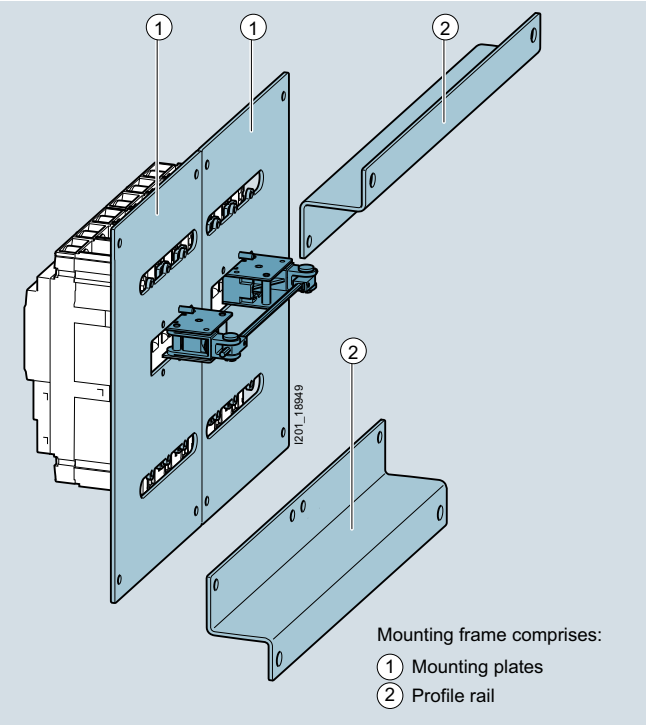
In order to install a rear interlock for plug-in or draw-out versions of the molded case circuit breakers, the plunger needs to be lengthened. The rear interlock for plug-in or draw-out versions is offered as a complete kit.



Rear interlock without mounting frame

Benefits

- Broad range of applications thanks to flexibility of interlocking technology
- Locking technology ensures safe locking of molded case circuit breakers, e.g. for maintenance purposes
- No restriction to use of internal accessories or to scope of accessories installed at the front of the molded case circuit breaker (when a rear interlock is deployed)
- Molded case circuit breakers of different sizes can be mutually interlocked.



Rear interlock with mounting frame

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Selection and ordering data

	Version	For molded case circuit breakers/ Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Accessories for locking, blocking and interlocking												
 3VA9167-0LF10	**Adapter kit for mounting the cylinder lock (type Ronis) in the accessories compartment of the molded case circuit breaker** Comprising 2 cylinder lock casings (one for locking and one for interlocking) and the appropriate mounting module											
	Notes	✓	--	--	--	--		**3VA9157-0LF10**		1	1 unit	1CB
	• To implement an interlock or a lock: select suitable cylinder lock(s) • For an interlock: select the same cylinder lock number	--	✓	--	--	--		**3VA9257-0LF10**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9167-0LF10**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9367-0LF10**		1	1 unit	1CB
 3VA9980-0VL10	**Cylinder lock (type Ronis)** • Includes a lock with 2 keys • For locking or interlocking • For installation in all rotary operators • For mounting in the adapter kit for the accessories compartment											
	Versions											
	• Key 1 (lock number 1)	✓	✓	✓	✓	--		**3VA9980-0VL10**		1	1 unit	1CB
	• Key 2 (lock number 2)	✓	✓	✓	✓	--		**3VA9980-0VL20**		1	1 unit	1CB
	• Key 3 (lock number 3)	✓	✓	✓	✓	--		**3VA9980-0VL30**		1	1 unit	1CB
	• Key 4 (lock number 4)	✓	✓	✓	✓	--		**3VA9980-0VL40**		1	1 unit	1CB
 3VA9168-0VF30	**Sliding bar** Complete kit for interlocking 2 circuit breakers											
	Note	✓	--	--	--	--		**3VA9158-0VF30**		1	1 unit	1CB
	The article number must be ordered 2 x to implement an interlock between 3 breakers of the same size.	--	✓	--	--	--		**3VA9258-0VF30**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9168-0VF30**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9368-0VF30**		1	1 unit	1CB
 3VA9167-0VF10	**Module for handle interlock using a Bowden cable**											
	Notes	✓	--	--	--	--		**3VA9157-0VF10**		1	1 unit	1CB
	• A separate handle interlock module is required for each 3VA. • A Bowden cable must be ordered separately.	--	✓	--	--	--		**3VA9257-0VF10**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9167-0VF10**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9367-0VF10**		1	1 unit	1CB
3VA9980-0VC10	**Bowden cable**											
	Versions											
	• Length 0.6 m							**3VA9980-0VC10**		1	1 unit	1CB
	• Length 1.0 m							**3VA9980-0VC20**		1	1 unit	1CB
	• Length 1.5 m							**3VA9980-0VC30**		1	1 unit	1CB
 3VA9088-0VM10	**Rear interlock with rod** Complete kit for fixed mounting											
	Note	✓	✓	✓	✓	--		**3VA9088-0VM10**		1	1 unit	1CB
	Mounting frames are not included in scope of supply.											
 3VA9588-0VM10		--	--	--	--	✓ NEW		**3VA9588-0VM10**		1	1 unit	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For molded case circuit breakers/ Article No. stem 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3VA9088-0VM30	**Rear interlock with rod** Complete kit for plug-in/draw-out unit	✓	✓	✓	✓	--		**3VA9088-0VM30**		1	1 unit	1CB
	Note											
	If plug-in or draw-out technology is used together with the rear interlock with rod, the mounting plates and profile rails cannot be used.											
 3VA9588-0VK10	**Mounting frame for rear interlock with rod** For fixed mounting only The following are required for the complete mounting frame kit:											
	Versions											
	• Profile rails Contents: 2 units	✓	✓	✓	✓	--		**3VA9088-0VK10**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9588-0VK10**		1	1 unit	1CB
 3VA9268-0VK20	• Mounting plate one per breaker, depending on size	✓	--	--	--	--		**3VA9158-0VK20**		1	1 unit	1CB
	Notes	--	✓	--	--	--		**3VA9258-0VK20**		1	1 unit	1CB
	2 mounting plates must be ordered. They are screwed onto the profile rail that can be ordered above. Different breakers can be mutually interlocked (3VA25 only with 3VA25).	--	--	✓	--	--		**3VA9268-0VK20**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9468-0VK20**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9588-0VK20**		1	1 unit	1CB

	Version	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Accessories for locking											
 3VA9388-0LB10	**Locking devices for handles**	✓	✓	--	--		**3VA9088-0LB10**		1	1 unit	1CB
		--	--	✓	✓		**3VA9388-0LB10**		1	1 unit	1CB

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Selection and ordering data

	Version	For molded case circuit breakers/ Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	3VA25	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Cover frame for door cut-out												
 3VA9163-0SB10	**Cover frame for door cut-out for molded case circuit breaker**											
	Versions											
	• 3-pole, door cut-out without trip unit	✓	--	--	--	--		**3VA9053-0SB10**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9253-0SB10**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9163-0SB10**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9383-0SB10**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9503-0SB10**		1	1 unit	1CB
	• 3-pole, door cut-out with trip unit	✓	--	--	--	--		**3VA9053-0SB20**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9253-0SB20**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9163-0SB20**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9363-0SB20**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9503-0SB20**		1	1 unit	1CB
	• 4-pole, door cut-out without trip unit	✓	--	--	--	--		**3VA9054-0SB10**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9254-0SB10**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9164-0SB10**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9384-0SB10**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9504-0SB10**		1	1 unit	1CB
	• 4-pole, door cut-out with trip unit	✓	--	--	--	--		**3VA9054-0SB20**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9254-0SB20**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9164-0SB20**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9364-0SB20**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9504-0SB20**		1	1 unit	1CB
	Cover frame for MO320 motor operators	✓	--	--	--	--		**3VA9053-0SB20**		1	1 unit	1CB
		--	✓	✓	--	--		**3VA9257-0SB30**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9387-0SB30**		1	1 unit	1CB
	Cover frame for RCD320, RCD520 and RCD820 residual current devices											
	Versions											
	• 3-pole	✓	--	--	--	--		**3VA9053-0SB10**		1	1 unit	1CB
		--	✓	✓	--	--		**3VA9253-0SB10**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9303-0SB40**		1	1 unit	1CB
	• 4-pole	✓	--	--	--	--		**3VA9054-0SB10**		1	1 unit	1CB
		--	✓	✓	--	--		**3VA9254-0SB10**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9304-0SB40**		1	1 unit	1CB
	Cover frame for front mounted rotary operator	✓	--	--	--	--		**3VA9053-0SB10**		1	1 unit	1CB
		--	✓	--	--	--		**3VA9253-0SB10**		1	1 unit	1CB
		--	--	✓	--	--		**3VA9163-0SB10**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9383-0SB10**		1	1 unit	1CB
		--	--	--	--	✓ NEW		**3VA9503-0SB10**		1	1 unit	1CB
	Cover frame for door feedthrough	--	✓	✓	--	--		**3VA9253-0SB20**		1	1 unit	1CB
		--	--	--	✓	--		**3VA9353-0SB20**		1	1 unit	1CB
 3VA9087-0SX10	**Labeling plate for cover frame**							**3VA9087-0SX10**		1	10 units	1CB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For molded case circuit breakers/Article No. stem 3VA10 3VA11	3VA12	3VA20 3VA21 3VA22	3VA23 3VA24	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Adapter for DIN rails for 3VA1 molded case circuit breakers											
 3VA9187-0SH10	**Adapter for DIN rails for 3VA1 molded case circuit breakers**										
	Versions										
	• 1-pole[1)]	✓	--	--	--		**3VA9181-0SH10**		1	1 unit	1CB
	• 2-pole	✓	--	--	--		**3VA9182-0SH10**		1	1 unit	1CB
	• 3 and 4-pole	✓	--	--	--		**3VA9187-0SH10**		1	1 unit	1CB
	• 3 and 4-pole in conjunction with RCD310 or RCD510	✓	--	--	--		**3VA9187-0SH20**		1	1 unit	1CB
Adapter for 60 mm busbar system (8US)											
	Busbar adapter systems with 40 mm or 60 mm busbar center-to-center spacing with components for busbar runs, adapters and switching device holders for individual equipment possibilities, devices with an integrated adapter, as well as accessories and flat copper profiles. Observe the short-circuit strength of the busbar system. Short-circuit strength greater than 50 kA on request. For more information, see chapter "Busbar Systems".										
Mounting screw kit											
 3VA9111-0SS10	**Mounting screw kit**										
	Versions										
	• For fixed-mounted molded case circuit breakers										
	- 1-pole	✓	--	--	--		**3VA9111-0SS10**		1	1 unit	1CB
	- 2 and 3-pole (apart from 125 A/160 A with 55 kA and 70 kA)	✓	✓	--	--		**3VA9116-0SS10**		1	1 unit	1CB
	- 3-pole (125 A/160 A with 55 kA and 70 kA) and 4-pole	✓	✓	--	--		**3VA9114-0SS10**		1	1 unit	1CB
	- 3-pole	--	--	✓	--		**3VA9126-0SS10**		1	1 unit	1CB
	- 4-pole	--	--	✓	--		**3VA9124-0SS10**		1	1 unit	1CB
	- 3 and 4-pole	--	--	--	✓		**3VA9328-0SS10**		1	1 unit	1CB
	• For plug-in technology	✓	✓	--	--		**3VA9114-0SS10**		1	1 unit	1CB
	• For plug-in and draw-out units	--	✓	--	--		**3VA9114-0SS10**		1	1 unit	1CB
		--	--	✓	--		**3VA9124-0SS10**		1	1 unit	1CB
		--	--	--	✓		**3VA9328-0SS10**		1	1 unit	1CB
	For 3VA 1000 A molded case circuit breakers:										
	• Spare part 4 screws 4 nuts metric thread						**3VA9517-0SS10**		1	1 unit	1CB

[1)] For 3VA1 molded case circuit breakers, 160 A 1-pole up to 25 kA

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Overview

Devices		Page	Application/ individual components	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**3VL molded case circuit breakers for line protection** **3VL molded case circuit breakers for generator protection**	2/140 ... 2/155, 2/164 ... 2/181	The overload and short-circuit releases are designed for the protection of cables, leads and non-motor loads. The overload and short-circuit releases can be used for optimized protection of generators.	IEC 60947-1, EN 60947-1, IEC 60947-2, EN 60947-2.	✓	✓	✓
	**3VL molded case circuit breakers for motor protection** Are you IE3/IE4 ready?	2/156 ... 2/159	Circuit breakers for motor protection are specifically designed for the characteristic curve of the motor, and have additional functions such as phase failure detection and adjustable trip class.	IEC 60947-1, EN 60947-1, IEC 60947-2, EN 60947-2. IE3 ready	✓	✓	✓
	**3VL molded case circuit breakers for starter protection** Are you IE3/IE4 ready?	2/160, 2/161	Starter combinations consist of: motor starter protector + contactor + overload relay. The motor starter protector provides short-circuit protection and the isolating function. The task of the contactor is the operational switching of the feeder. The overload relay provides overload protection, which is specifically designed for the motor.	IEC 60947-1, EN 60947-1, IEC 60947-2, EN 60947-2. IE3 ready	✓	✓	✓
	**3VL non-automatic circuit breakers, molded case**	2/160, 2/161, 2/182, 2/183	These circuit breakers are used as feeder circuit breakers, main control switches or disconnectors without overload protection. They have fixed short-circuit releases.	IEC 60947-1, EN 60947-1, IEC 60947-2, EN 60947-2. Isolating features according to IEC 60947-2, EN 60947-2.	✓	✓	✓
	**Auxiliary switches and auxiliary releases for 3VL molded case circuit breakers**	2/189, 2/190	Auxiliary switches, alarm switches, undervoltage releases and shunt releases	As for circuit breakers	✓	✓	✓
	**Operating mechanisms**	2/192 ... 2/199	The manual operating mechanisms are available in two versions: • Front-operated rotary operating mechanism, • Door-coupling rotary operating mechanism In the case of the motorized operating mechanisms there are also two versions: • MO for standard applications • SEO for network synchronization tasks	As for circuit breakers	✓	✓	✓
	**Plug-in versions/ withdrawable versions**	2/200 ... 2/205	Assembly in plug-in and withdrawable versions allows the 3VL molded case circuit breaker to be replaced quickly without accessing the terminals.	As for circuit breakers	✓	✓	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Devices		Page	Application/ individual components	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**RCD modules**	2/206	Protection of plant and personnel against damage or injury caused by residual currents and insulation faults.	IEC EN 60947-2 (Annex 5)	✓	✓	✓
	**Residual current devices (MRCD)**	Ch. 13	Modular residual current devices (MRCD) monitor residual currents in electrical systems and trip the molded case circuit breaker via an auxiliary release after an adjustable advance warning if the residual current exceeds a defined value.	IEC EN 60947-2 (Annex M)	✓	✓	✓
	**Connection parts for fixed-mounted circuit breakers**	2/207 ... 2/212	Front connecting bars, rear terminals, box terminals, circular conductor terminals, multiple feed-in terminals, auxiliary conductor terminals, terminal plates, connections with screw terminals, terminal covers for circuit breakers, phase barriers for circuit breakers	As for circuit breakers	✓	✓	✓
	**Interlocks**	2/213 ... 2/218	Locking devices for toggle levers, rear interlocking modules, interlocking modules for Bowden cable interlocking	As for circuit breakers	✓	✓	✓
 	**3KC ATC5300 and ATC3100 transfer control devices**	Ch. 8	The 3KC ATC5300 and ATC3100 transfer control devices, equipped with two circuit breakers with motorized operating mechanism, serve as a transfer system that automatically or manually switches between two power supply systems in low-voltage power distribution applications.	IEC 60947-6-1 DIN VDE 0660-114 UL 508 CSA 22.2 No. 14	✓	✓	✓
	**40 mm busbar systems and 60 mm busbar systems**	Ch. 11	Busbar adapters	As for circuit breakers	✓	✓	✓
	**Accessories for communication**	2/221	Data transmission through COM20, COM21: COM20 (PROFIBUS) for Electronic Trip Units with communication function, COM21 (MODBUS) for Electronic Trip Units with communication function, powerconfig parameterization software	As for circuit breakers	✓	✓	✓
	Further accessories	2/222 ... 2/225	Cover frames for door cut-outs, to increase degree of protection	As for circuit breakers	✓	✓	✓

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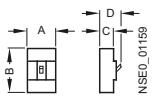
Type			VL160X/3VL1		VL160/3VL2		VL250/3VL3		VL400/3VL4	
Molded case circuit breakers										
3VL molded case circuit breakers up to 1600 A										
Rated current I_n at 50 °C ambient temperature		A	16 ... 160		50 ... 160		200 ... 250		200 ... 400	
Number of poles			3	4	3	4	3	4	3	4
Rated operational voltage U_e										
50/60 Hz AC		V	690	690	690	690	690	690	690	690
DC[1]		V	500	500[2]	600	600	600	600	600	600
Trip units										
Thermal-magnetic			✓	✓	✓	✓	✓	✓	✓	✓
Electronic LCD ETU/ETU			--	--	✓	✓	✓	✓	✓	✓
PROFIBUS module COM20			--	--	✓	✓	✓	✓	✓	✓
Dimensions										
	A	mm	105	139	105	139	105	139	139	183
	5	mm	157	157	175	175	175	175	279	279
	C	mm	81	81	81	81	81	81	102	102
	D	mm	107	107	107	107	107	107	138	138
Breaking capacity I_{cu}/I_{cs} RMS value acc. to IEC 60947-2										
Standard breaking capacity N[3]	(N)									
Up to 240 V AC		kA	65/65		65/65		65/65		65/65	
Up to 415 V AC		kA	55/55		55/55		55/55		55/55	
Up to 440 V AC		kA	25/20		25/20		25/20		35/26	
Up to 500/525 V AC		kA	18/14		25/20		25/20		25/20	
Up to 690 V AC		kA	8/4[4]		12/6		12/6		15/8	
Up to 250 V DC[5]		kA	30/30		32/32		32/32		32/32	
up to 500 V DC[5]		kA	--		--		--		--	
Up to 600 V DC[5]		kA	--		--		--		--	
NEMA breaking capacity[6]										
Up to 480 V AC		kA	25		25		25		35	
Up to 600 V AC		kA	8[4]		12		12		20	
High breaking capacity H[3]	(H)									
Up to 240 V AC		kA	100/75		100/75		100/75		100/75	
Up to 415 V AC		kA	70/70		70/70		70/70		70/70	
Up to 440 V AC		kA	42/32		50/38		50/38		50/38	
Up to 500/525 V AC		kA	30/23		40/30		40/30		40/30	
Up to 690 V AC		kA	12/6[4]		12/6		12/6		15/8	
Up to 250 V DC[5]		kA	30/30		32/32		32/32		32/32	
Up to 500 V DC[5]		kA	30/30		32/32		32/32		32/32	
Up to 600 V DC[5]		kA	--		--		--		--	
NEMA breaking capacity[6]										
Up to 480 V AC		kA	42		50		50		50	
Up to 600 V AC		kA	12[4]		12		12		20	
Very high breaking capacity L[3]	(L)									
Up to 240 V AC		kA	--		200/150		200/150		200/150	
Up to 415 V AC		kA	--		100/75		100/75		100/75	
Up to 440 V AC		kA	--		75/50		75/50		75/50	
Up to 500/525 V AC		kA	--		50/38		50/38		50/38	
Up to 690 V AC		kA	--		12/6		12/6		15/8	
Up to 250 V DC[5]		kA	--		32/32		32/32		32/32	
Up to 500 V DC[5]		kA	--		32/32		32/32		32/32	
Up to 600 V DC[5]		kA	--		32/32		32/32		32/32	
NEMA breaking capacity[6]										
Up to 480 V AC		kA	--		75		75		75	
Up to 600 V AC		kA	--		12		12		20	

✓ Available
-- Not available

For 3VL molded case circuit breakers acc. to UL 489
see page 2/228 or see Catalog LV 16.

[1] Rated DC voltage applies only for circuit breakers with thermal-magnetic trip unit.

[2] For PV applications up to U_{oc} = 1000 V DC.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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VL630/3VL5		VL800/3VL6		VL1250/3VL7		VL1600/3VL8	
3VL molded case circuit breakers up to 1600 A							
315 ... 630		800		1000 ... 1250		1600	
3	4	3	4	3	4	3	4
690 600	690 600	690 --	690 --	690 --	690 --	690 --	690 --
✓ ✓ ✓	✓ ✓ ✓	-- ✓ ✓	-- ✓ ✓	-- ✓ ✓	-- ✓ ✓	-- ✓ ✓	-- ✓ ✓
190 279 102 138	253 279 102 138	190 406 114 151	253 406 114 151	229 406 152 207	305 406 152 207	229 406 152 207	305 406 152 207
65/65 55/55 35/26 25/20 20/10		65/65 55/55 35/26 25/20 20/10		65/35 55/28 35/26 25/20 20/10		65/35 55/28 35/26 25/20 20/10	
32/32 -- --		-- -- --		-- -- --		-- -- --	
25 20		25 20		25 20		25 20	
100/75 70/70 50/38 40/30 20/10		100/75 70/70 50/38 40/30 20/10		100/50 70/35 50/38 40/30 30/15		100/50 70/35 50/38 40/30 30/15	
32/32 32/32 --		-- -- --		-- -- --		-- -- --	
50 30		50 30		50 30		50 30	
200/150 100/75 75/50 50/38 20/10		200/150 100/75 75/50 50/38 20/10		200/100 100/50 75/50 50/38 35/17		200/100 100/50 75/50 50/38 35/17	
32/32 32/32 32/32		-- -- --		-- -- --		-- -- --	
65 35		65 35		65 35		65 35	

[3] At 240 V AC, 415 V AC, 525 V AC and 690 V AC max. 5% overvoltage, at 440 V AC and 500 V AC max. 10% overvoltage, at 250/500/600 V DC max. 5% overvoltage.

[4] Rated current $I_n \geq 25$ A.

[5] The maximum permitted DC voltage for each conducting path needs to be taken into account for DC switching applications; see Technical Information at www.siemens.com/lowvoltage/product-support; time constant $t = 15$ ms.

[6] The NEMA breaking capacity can be found on the rating plate of each IEC circuit breaker.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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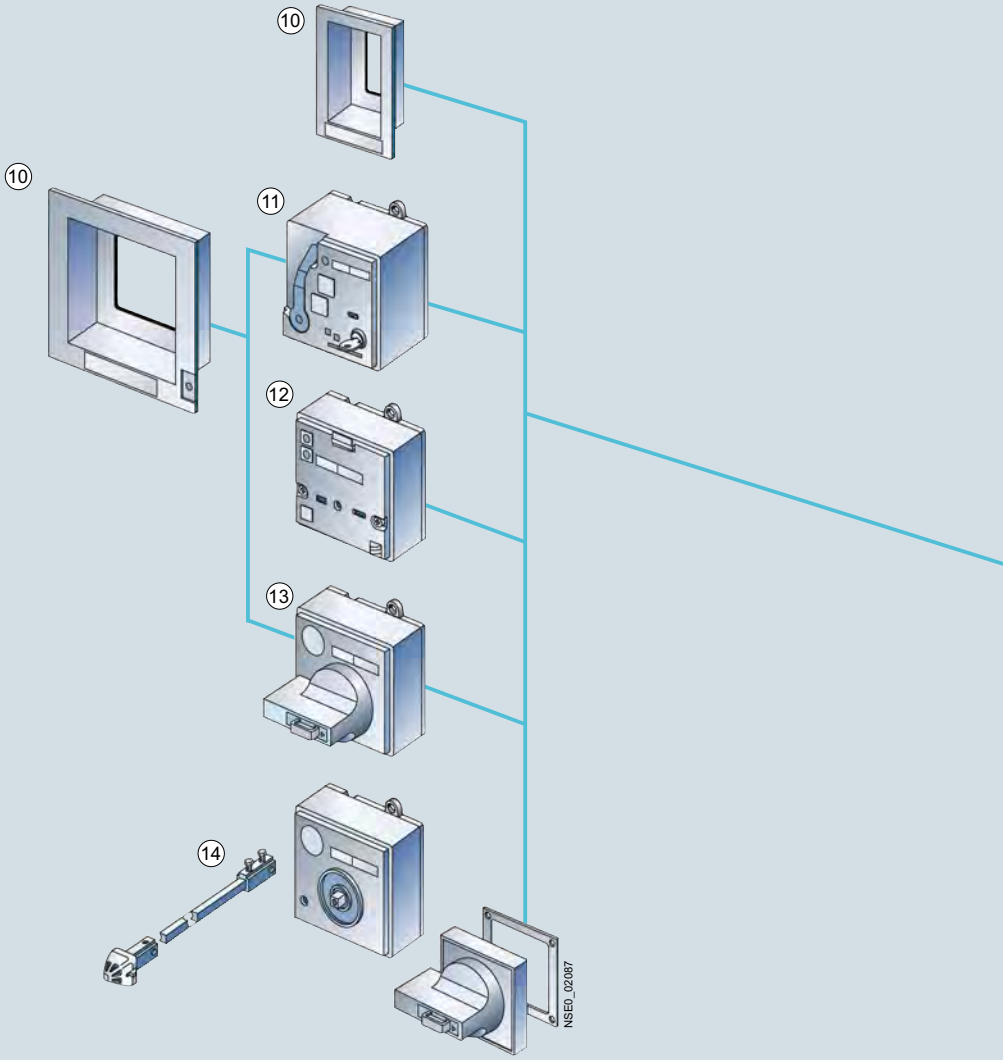
Introduction



(1) Withdrawable/plug-in bases (pages 2/200 to 2/205)
(2) Side walls of withdrawable unit (pages 2/200 to 2/205)
(3) Phase barriers (pages 2/207 to 2/212)
(4) Flared front busbar connecting bars (pages 2/207 to 2/212)
(5) Straight connecting bars (pages 2/207 to 2/212)
(6) Circular conductor terminals for Al/Cu (pages 2/207 to 2/209)
(7) Box terminals for Cu (pages 2/207 to 2/212)
(8) Extended connection covers (terminal covers) (pages 2/207 to 2/212)
(9) Standard connection covers (pages 2/207 to 2/212)
(10) Masking frames/cover frames for door cut-out (pages 2/222 to 2/225)
(11) Motorized operating mechanisms with stored energy mechanism (SEO) (page 2/196)
(12) Motorized operating mechanisms (MO) (page 2/196)
(13) Front-operated rotary operating mechanisms (pages 2/192 to 2/195)
(14) Door-coupling rotary operating mechanisms (pages 2/192 to 2/195)
(15) 3VL molded case circuit breakers (pages 2/140 to 2/183)
(16) Internal accessories (pages 2/187, 2/188, 2/189 to 2/191)
(17) Electronic trip units LCD ETU (pages 2/150, 2/154, 2/158, 2/174 and 2/176)
(18) Electronic trip units with communication function (pages 2/142 to 2/159, 2/170 to 2/180)
(19) Thermal/magnetic trip units (pages 2/140 to 2/142, 2/160, 2/164 to 2/168, 2/182)
(20) RCD modules (page 2/206)
(21) Rear terminals, flat and round (pages 2/207 to 2/212)
(22) COM20/21 communication module for the PROFIBUS DP/MODBUS (page 2/221)
(23) Battery power supplies with test function for Electronic Trip Units (pages 2/214 to 2/218)

Minimum order quantity (PS) or a multiple thereof can be ordered.

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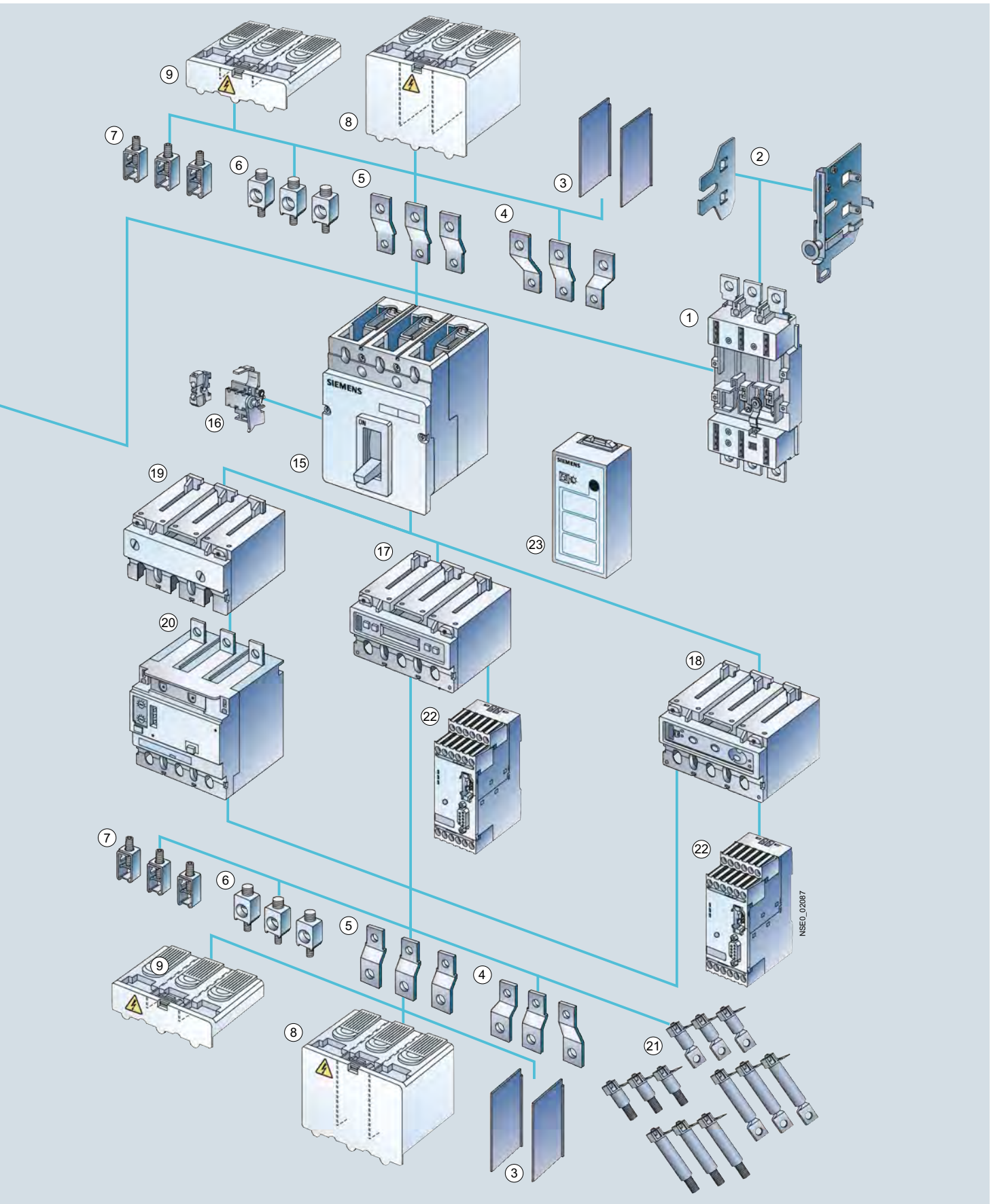

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2

Benefits

- The compact design of the 3VL molded case circuit breakers coupled with excellent characteristics fulfills the high demands of today's electrical distribution systems.
- These circuit breakers offer a broad product range, improved technology, space savings and easy operation.
- They are available both in thermal-magnetic (16 A to 630 A) and in electronic versions (63 A to 1600 A).

Communication

The use of modern communication-capable circuit breakers opens up completely new possibilities in terms of start-up, parameterization, diagnostics, maintenance and operation. This allows many different ways of reducing costs and improving productivity in industrial plants, buildings and infrastructure projects to be achieved:

- Fast and reliable parameterization
- Timely information and response can prevent plant stoppages
- Effective diagnostics management

Measured values are the basis for efficient load management, for drawing up power demand profiles and for assigning power to cost centers.

Communication:

- For molded case circuit breakers with communication function, see pages 2/142 to 2/159, 2/170 to 2/159.
- For communication accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Application

The different versions of 3VL molded case circuit breakers are suitable for the following applications:

- Incoming and outgoing circuit breakers in distribution systems
- Switching and protection devices for motors, transformers and capacitors
- Disconnecting means with features for stopping and switching off in an emergency (main disconnecting means and EMERGENCY-STOP switches) in conjunction with lockable rotary operating mechanisms and terminal covers.

The 3VL molded case circuit breakers are available in the following versions:

1. For line protection (in 3- and 4-pole versions)
   The overload and short-circuit releases are designed for the protection of cables, leads and non-motor loads.
2. For motor protection (in 3-pole version)
   The overload and short-circuit releases are designed for optimized protection and direct-on-line starting of induction squirrel-cage motors. The circuit breakers for motor protection are susceptible to phase failure and feature an adjustable trip class. The Electronic Trip Units operate with a microprocessor.
3. For starter combinations (in 3-pole version)
   These circuit breakers are used both for short-circuit protection as well as for isolating functions, which may be required in starter combinations consisting of motor starter protectors, overload relays and motor contactors. These circuit breakers exclusively feature adjustable, instantaneous short-circuit releases.
4. As non-automatic air circuit breakers (in 3 and 4-pole versions)
   These circuit breakers can be used as feeder circuit breakers, main control switches or non-automatic circuit breakers without overload protection. They incorporate an integrated short-circuit self-protection system, eliminating the need for back-up fuses.

Breaking capacity

(N)	Circuit breakers with standard breaking capacity N (I_{cu} up to 55 kA at 415 V)
(H)	Circuit breakers with high breaking capacity H (I_{cu} up to 70 kA at 415 V)
(L)	Circuit breakers with very high breaking capacity L (I_{cu} up to 100 kA at 415 V)
	These breaking capacities are indicated in the corresponding tables by the symbols shown on orange backgrounds.

Standards and specifications

3VL molded case circuit breakers comply with:

IEC 60947-1, EN 60947-1,
VDE 0660-100,
IEC 60947-2, EN 60947-2,
VDE 0660-101.
Isolating features according to IEC 60947-2, EN 60947-2.

Means of disconnection (main disconnecting means) according to EN 60204 (VDE 0113).
The 3VL molded case circuit breakers comply in addition with requirements for "disconnecting means with features for stopping and switching off in an emergency" (EMERGENCY-STOP switches) in conjunction with lockable rotary operating mechanisms (red-yellow) and terminal covers.

Please contact Siemens for details of other standards.

The Electronic Trip Units of the circuit breakers for motor protection also comply with IEC 60947-4-1, VDE 0660-102.

VL160X to VL400 circuit breakers can be equipped with a 3VL RCD module. They therefore comply with IEC 60947-2 Annex 5.

The 3VL RCD module complies with IEC 61000-4-2 to IEC 61000-4-6, IEC 61000-4-11 and EN 55011, Class 5 (equivalent to CISPR 11) with regard to electromagnetic compatibility.

Operating conditions

The 3VL molded case circuit breakers are designed for operation in enclosed areas.

Suitable enclosures must be provided for operation in areas with severe ambient conditions (such as dust, caustic vapors, hazardous gases).

The incoming and outgoing terminals for the circuit breaker can be freely selected. The electrical data remains unaffected.

IE3 ready

As from January 2015, the energy-efficiency class IE3 will be mandatory, with a few exceptions only, for three-phase asynchronous motors. This will have an effect on motors, low-voltage power distribution and electrical installation technology, as well as industrial controls.

For use of 3VL molded case circuit breakers in conjunction with highly energy-efficient IE3 motors, please observe the information on dimensioning and configuring, see "Configuration Manual for SIRIUS Controls with IE3 Motors", at https://support.industry.siemens.com/cs/ww/en/view/94770820.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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RCD modules

The RCD module is designed for retrofitting to the circuit breaker. It can also be retrofitted by the customer.

The combination of 3VL molded case circuit breaker and RCD module can be fed from the top or bottom.

All 3VL molded case circuit breakers with RCD modules are available with auxiliary switches, alarm switches, undervoltage and shunt releases.

Protection of plant and equipment against overload or damage by ground faults (ground-fault protection).

The RCD module trips the circuit breaker through vectorial summation current formation for all phase currents if the vectorial sum of the currents in the poles (= the ground fault current) overshoots the pre-set response and delay time values. AC currents and pulsating DC currents are measured (CBR, design A according to EN 60947-2).

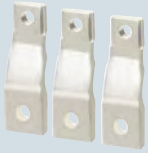
Main connections, basic equipment and options



Box terminal
(for copper cables or solid/flexible busbars)



Connection with screw terminal (available with direct cable lug connection on VL160X, VL160, VL250, VL400)



Connection to front busbar connecting bars (screw terminal required)



Circular conductor terminals multiple feed-in terminal (for Al/Cu terminal)

Main connections (for conductor cross-sections, see below)

Circuit breakers	Connection overview and further options				
	Box terminals	Screw terminals with metric thread for flat connection	Circular conductor terminal/multiple feed-in terminals	Rear connections	Front-accessible connecting bars
VL160X	□	□	×	×	×
VL160	□	□	×	×	×
VL250	□	□	×	×	×
VL400	×	○	×[2)3)]	×	×
VL630	×[1)]	○	×[2)]	×	×
VL800	--	○	×[2)]	×	×
VL1250	--	○	×[2)]	×	×
VL1600	--	×	--	×	○

○ Scope of supply
□ Optional scope of supply
× Available
-- Not available

1) Connecting terminal plate for flexible busbar; not for 690 V AC/600 V DC.
2) Multiple feed-in terminal.
3) Circular conductor terminal also available.

Conductor cross-sections

Type			VL160X 3VL1	VL160 3VL2	VL250 3VL3	VL400 3VL4	VL630 3VL5	VL800 3VL6	VL1250 3VL7	VL1600 3VL8
Conductor cross-sections										
Box terminal[1)]										
• Solid or stranded cable	Copper only	mm^2	2.5 ... 95	2.5 ... 95	25 ... 185	50 ... 300	--	--	--	--
• Finely stranded with end sleeve		mm^2	2.5 ... 50	2.5 ... 50	25 ... 120	50 ... 240	--	--	--	--
• Finely stranded without end sleeve		mm^2	2.5 ... 70	2.5 ... 70	25 ... 150	50 ... 240	--	--	--	--
• Flexible busbar		mm	12 × 10	12 × 10	17 × 10	25 × 10	--	--	--	--
Connecting terminal plate for flexible busbar[2)]		mm	--	--	--	--	2 units 10 × 32	--	--	--
Circular conductor terminal for cable[1)]										
• Solid or stranded cable	Cu or Al	mm^2	16 ... 70	16 ... 70	25 ... 185	50 ... 300	--	--	--	--
- With terminal cover	Cu or Al	mm^2	16 ... 150	16 ... 150	120 ... 240	--	--	--	--	--
• Finely stranded with end sleeve		mm^2	10 ... 50	10 ... 50	25 ... 120	50 ... 240	--	--	--	--
Multiple feed-in terminal[1)]										
• Solid or stranded cable	Cu or Al	mm^2	--	--	--	2 units 50 ... 120	2 units 50 ... 240	3 units 50 ... 240	4 units 50 ... 240	--
- With terminal cover	Cu or Al	mm^2	--	--	--	2 units 70 ... 300	--	--	--	--
• Finely stranded with end sleeve		mm^2	--	--	--	2 units 50 ... 95	2 units 50 ... 185	3 units 50 ... 185	4 units 50 ... 185	--
• Direct connection of busbars	Cu or Al	mm	17 × 7	22 × 7	24 × 7	32 × 10	40 × 10	2 × 40 × 10	2 × 50 × 10	3 × 60 × 10
• Screw for connection with screw terminal			M6	M6	M8	M8	M6	M8	M8	--
Conductor cross-sections for control circuits with terminal connection										
Screw terminals										
• Solid		mm^2	0.75 ... 1.5	0.75 ... 1.5	0.75 ... 1.5	0.75 ... 1.5	0.75 ... 1.5	0.75 ... 1.5	0.75 ... 1.5	0.75 ... 1.5
• Finely stranded with end sleeve		mm^2	0.75 ... 1.0	0.75 ... 1.0	0.75 ... 1.0	0.75 ... 1.0	0.75 ... 1.0	0.75 ... 1.0	0.75 ... 1.0	0.75 ... 1.0

For details, see Mounting Instructions.

1) Cross-sections according to IEC 60999.
2) Not for 690 V AC/600 V DC.

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General data

VL160 to VL1600 trip units – functional overview

Article No. supplement	Releases	Line protection	Line/generator protection	Motor protection	Starter protection	Non-automatic circuit breakers	Function	Setting options L Overload protection	S[1] Short-circuit protection (short-time delayed)		I[1] Short-circuit protection (instantaneous)	G Ground-fault protection	
								$I_r = \times I_n$	$I_{sd} = \times I_r$	t_{sd} [s]	$I_i = \times I_n$	$I_g = \times I_n$	t_g [s]
DK	M	--	--	--	✓	--	I	--	--	--	7 ... 15	--	--
DE	M	--	--	--	--	✓	I	--	--	--	8 ... 18	--	--
EE	M	--	--	--	--	✓	I	--	--	--	8 ... 18	--	--
DA	TM[2]	✓	--	--	--	--	LI	1	--	--	9 ... 18[4]	--	--
DD	TM[2]	✓	--	--	--	--	LI	0.8 ... 1	--	--	9 ... 18[4]	--	--
DC	TM[2]	✓	--	--	--	--	LI	0.8 ... 1	--	--	5 ... 10	--	--
EH	TM[2]	✓	--	--	--	--	LI	1	--	--	9 ... 18[4]	--	--
EJ	TM[2]	✓	--	--	--	--	LI	0.8 ... 1	--	--	5 ... 10	--	--
EA/EL	TM[2]	✓	--	--	--	--	LIN	1	--	--	9 ... 18[4]	--	--
EC	TM[2]	✓	--	--	--	--	LIN	0.8 ... 1	--	--	5 ... 10	--	--
EM	TM[2]	✓	--	--	--	--	LIN	0.8 ... 1	--	--	5 ... 10	--	--
SP	ETU10M[3]	--	--	✓	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
MP	ETU10M[3]	--	--	✓	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
SB	ETU10	✓	--	--	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
MB	ETU10	✓	--	--	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
LB	ETU10	✓	--	--	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
TA	ETU10	✓	--	--	--	--	LIN	0.4 ... 1	--	--	1.25 ... 11	--	--
NA	ETU10	✓	--	--	--	--	LIN	0.4 ... 1	--	--	1.25 ... 11	--	--
LA	ETU10	✓	--	--	--	--	LIN	0.4 ... 1	--	--	1.25 ... 11	--	--
TB	ETU10	✓	--	--	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
NB	ETU10	✓	--	--	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
SL	ETU12	✓	--	--	--	--	LIG	0.4 ... 1	--	--	1.25 ... 11	0.6 ... 1, OFF	0.1 ... 0.3
ML	ETU12	✓	--	--	--	--	LIG	0.4 ... 1	--	--	1.25 ... 11	0.6 ... 1, OFF	0.1 ... 0.3
SF	ETU12	✓	--	--	--	--	LIG	0.4 ... 1	--	--	1.25 ... 11	0.6 ... 1, OFF	0.1 ... 0.3
MF	ETU12	✓	--	--	--	--	LIG	0.4 ... 1	--	--	1.25 ... 11	0.6 ... 1, OFF	0.1 ... 0.3
TN	ETU12	✓	--	--	--	--	LING	0.4 ... 1	--	--	1.25 ... 11	0.6 ... 1, OFF	0.1 ... 0.3
NN	ETU12	✓	--	--	--	--	LING	0.4 ... 1	--	--	1.25 ... 11	0.6 ... 1, OFF	0.1 ... 0.3
SE	ETU20	--	✓	--	--	--	LSI	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
ME	ETU20	--	✓	--	--	--	LSI	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
LE	ETU20	--	✓	--	--	--	LSI	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
TE	ETU20	--	✓	--	--	--	LSI	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
NE	ETU20	--	✓	--	--	--	LSI	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
TF	ETU20	--	✓	--	--	--	LSIN	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
NF	ETU20	--	✓	--	--	--	LSIN	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
LF	ETU20	--	✓	--	--	--	LSIN	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	--	--
SG	ETU22	--	✓	--	--	--	LSIG	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	0.6 ... 1, OFF	0.1 ... 0.3
MG	ETU22	--	✓	--	--	--	LSIG	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	0.6 ... 1, OFF	0.1 ... 0.3
SH	ETU22	--	✓	--	--	--	LSIG	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	0.6 ... 1, OFF	0.1 ... 0.3
MH	ETU22	--	✓	--	--	--	LSIG	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	0.6 ... 1, OFF	0.1 ... 0.3
TH	ETU22	--	✓	--	--	--	LSING	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	0.6 ... 1, OFF	0.1 ... 0.3
NH	ETU22	--	✓	--	--	--	LSING	0.4 ... 1	1.5 ... 10	0 ... 0.5	11	0.6 ... 1, OFF	0.1 ... 0.3
SS	ETU30M[3]	--	--	✓	--	--	LI	0.4 ... 1	--	--	6/8/11	--	--
MS	ETU30M[3]	--	--	✓	--	--	LI	0.4 ... 1	--	--	6/8/11	--	--
LS	ETU30M[3]	--	--	✓	--	--	LI	0.4 ... 1	--	--	6/8/11	--	--
UP	LCD ETU40M[3]	--	--	✓	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--	--
UH	LCD ETU40	--	✓	--	--	--	LI, LS, LSI	0.4 ... 1	1.5 ... 10	0 ... 0.5	1.25 ... 11	--	--
UJ	LCD ETU40	--	✓	--	--	--	LI, LSI, LIN, LSIN	0.4 ... 1	1.5 ... 10	0 ... 0.5	1.25 ... 11	--	--
UL	LCD ETU42	--	✓	--	--	--	LSIG	0.4 ... 1	1.5 ... 10	0 ... 0.5	1.25 ... 11	0.4 ... 1	0.1 ... 0.5
UM	LCD ETU42	--	✓	--	--	--	LSIG	0.4 ... 1	1.5 ... 10	0 ... 0.5	1.25 ... 11	0.4 ... 1	0.1 ... 0.5
UN	LCD ETU42	--	✓	--	--	--	LSIG, LSING	0.4 ... 1	1.5 ... 10	0 ... 0.5	1.25 ... 11	0.4 ... 1	0.1 ... 0.5

✓ Function is available.
-- Function not available.
1) Size dependent.
2) TM up to I_n = 630 A.
3) Motor protection up to I_n = 500 A.
4) Fixed.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Article No. supplement	Releases	Thermal image	Phase failure	Communication-capable	Ground-fault protection	Number of poles	N-pole protected[1]	I^2t (ON/OFF)	Trip class (t_C)	Time-lag class (t_R)	Thermal-magnetic overcurrent releases	Magnetic releases	Electronic Trip Unit	LCD display
DK	M	--	--	--	--	3	--	--	--	--	--	✓	--	--
DE	M	--	--	--	--	3	--	--	--	--	--	✓	--	--
EE	M	--	--	--	--	4	--	--	--	--	--	✓	--	--
DA	TM[2]	✓	--	--	--	3	--	--	--	--	✓	--	--	--
DD	TM[2]	✓	--	--	--	3	--	--	--	--	✓	--	--	--
DC	TM[2]	✓	--	--	--	3	--	--	--	--	✓	--	--	--
EH	TM[2]	✓	--	--	--	4	--	--	--	--	✓	--	--	--
EJ	TM[2]	✓	--	--	--	4	--	--	--	--	✓	--	--	--
EA/EL	TM[2]	✓	--	--	--	4	100%	--	--	--	✓	--	--	--
EC	TM[2]	✓	--	--	--	4	60%	--	--	--	✓	--	--	--
EM	TM[2]	✓	--	--	--	4	100%	--	--	--	✓	--	--	--
SP	ETU10M[3]	✓	40% I_R	--	--	3	--	--	10	--	--	--	✓	--
MP	ETU10M[3]	✓	40% I_R	✓[4]	--	3	--	--	10	--	--	--	✓	--
SB	ETU10	✓	--	--	--	3	--	--	--	2.5 ... 30	--	--	✓	--
MB	ETU10	✓	--	✓[4]	--	3	--	--	--	2.5 ... 30	--	--	✓	--
LB	ETU10	✓	--	--	--	3	--	--	--	2.5 ... 30	--	--	✓	--
TA	ETU10	✓	--	--	--	4	50/100%	--	--	2.5 ... 30	--	--	✓	--
NA	ETU10	✓	--	✓[4]	--	4	50/100%	--	--	2.5 ... 30	--	--	✓	--
LA	ETU10	✓	--	--	--	4	50/100%	--	--	2.5 ... 30	--	--	✓	--
TB	ETU10	✓	--	--	--	4	--	--	--	2.5 ... 30	--	--	✓	--
NB	ETU10	✓	--	✓[4]	--	4	--	--	--	2.5 ... 30	--	--	✓	--
SL	ETU12	✓	--	--	①	3	--	--	--	2.5 ... 30	--	--	✓	--
ML	ETU12	✓	--	✓[4]	①	3	--	--	--	2.5 ... 30	--	--	✓	--
SF	ETU12	✓	--	--	②	3	--	--	--	2.5 ... 30	--	--	✓	--
MF	ETU12	✓	--	✓[4]	②	3	--	--	--	2.5 ... 30	--	--	✓	--
TN	ETU12	✓	--	--	②	4	50/100%	--	--	2.5 ... 30	--	--	✓	--
NN	ETU12	✓	--	✓[4]	②	4	50/100%	--	--	2.5 ... 30	--	--	✓	--
SE	ETU20	✓	--	--	--	3	--	✓	--	--	--	--	✓	--
ME	ETU20	✓	--	✓[4]	--	3	--	✓	--	--	--	--	✓	--
LE	ETU20	✓	--	--	--	3	--	✓	--	--	--	--	✓	--
TE	ETU20	✓	--	--	--	4	--	✓	--	--	--	--	✓	--
NE	ETU20	✓	--	✓[4]	--	4	--	✓	--	--	--	--	✓	--
TF	ETU20	✓	--	--	--	4	50/100%	✓	--	--	--	--	✓	--
NF	ETU20	✓	--	✓[4]	--	4	50/100%	✓	--	--	--	--	✓	--
LF	ETU20	✓	--	--	--	4	50/100%	✓	--	--	--	--	✓	--
SG	ETU22	✓	--	--	①	3	--	✓	--	--	--	--	✓	--
MG	ETU22	✓	--	✓[4]	①	3	--	✓	--	--	--	--	✓	--
SH	ETU22	✓	--	--	②	3	--	✓	--	--	--	--	✓	--
MH	ETU22	✓	--	✓[4]	②	3	--	✓	--	--	--	--	✓	--
TH	ETU22	✓	--	--	②	4	50/100%	✓	--	--	--	--	✓	--
NH	ETU22	✓	--	✓[4]	②	4	50/100%	✓	--	--	--	--	✓	--
SS	ETU30M[3]	✓	40% I_R	--	--	3	--	--	10, 20, 30	--	--	--	✓	--
MS	ETU30M[3]	✓	40% I_R	✓[4]	--	3	--	--	10, 20, 30	--	--	--	✓	--
LS	ETU30M[3]	✓	40% I_R	--	--	3	--	--	10, 20, 30	--	--	--	✓	--
UP	LCD ETU40M[3]	✓	5 ... 50% I_R	✓[4]	--	3	--	--	5, 10, 15, 20, 30	--	--	--	✓	✓
UH	LCD ETU40	✓	--	✓[4]	--	3	--	✓	--	2.5 ... 30	--	--	✓	✓
UJ	LCD ETU40	✓	--	✓[4]	--	4	50 ... 100%, OFF	✓	--	2.5 ... 30	--	--	✓	✓
UL	LCD ETU42	✓	--	✓[4]	①	3	--	✓	--	2.5 ... 30	--	--	✓	✓
UM	LCD ETU42	✓	--	✓[4]	①/③	3	--	✓	--	2.5 ... 30	--	--	✓	✓
UN	LCD ETU42	✓	--	✓[4]	②	4	50 ... 100%, OFF	✓	--	2.5 ... 30	--	--	✓	✓

Ground-fault protection
① Vectorial summation current formation (3-wire system)
② Vectorial summation current formation (4-wire system)
③ Direct detection of ground-fault current in the neutral point of the transformer

✓ Function is available.
-- Function not available.

[1] Size dependent.
[2] TM up to I_n = 630 A.
[3] Motor protection up to I_n = 500 A.
[4] With COM20/COM21.

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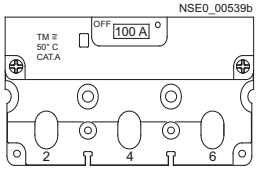
3-pole

Selection and ordering data

Type	Rated current I_n	Current setting range of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview". (N) Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					

3-pole, fixed-mounted, for line protection, 16 A to 160 A, thermal-magnetic overcurrent releases LI


NSE0_00695



Line protection, TM, LI function

With fixed thermal overcurrent releases, fixed short-circuit releases

	16	16	300	**3VL1796-1DA3□-□□□□**	1	1 unit	1CC
VL160X/	20	20	300	**3VL1702-1DA3□-□□□□**	1	1 unit	1CC
3VL1	25	25	300	**3VL1725-1DA3□-□□□□**	1	1 unit	1CC
	32	32	300	**3VL1703-1DA3□-□□□□**	1	1 unit	1CC
	40	40	600	**3VL1704-1DA3□-□□□□**	1	1 unit	1CC
	50	50	600	**3VL1705-1DA3□-□□□□**	1	1 unit	1CC
	63	63	600	**3VL1706-1DA3□-□□□□**	1	1 unit	1CC
	80	80	1000	**3VL1708-1DA3□-□□□□**	1	1 unit	1CC
	100	100	1000	**3VL1710-1DA3□-□□□□**	1	1 unit	1CC
	125	125	1000	**3VL1712-1DA3□-□□□□**	1	1 unit	1CC
	160	160	1500	**3VL1716-1DA3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal not in conjunction with RCD module[1)]	**6**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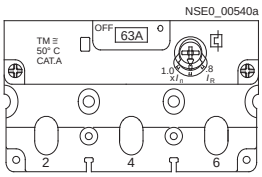

Line protection, TM, LI function

With adjustable thermal overcurrent releases, fixed short-circuit releases

VL160X/	20	16 ... 20	300	**3VL1702-1DD3□-□□□□**	1	1 unit	1CC
3VL1	32	25 ... 32	300	**3VL1703-1DD3□-□□□□**	1	1 unit	1CC
	40	32 ... 40	600	**3VL1704-1DD3□-□□□□**	1	1 unit	1CC
	50	40 ... 50	600	**3VL1705-1DD3□-□□□□**	1	1 unit	1CC
	63	50 ... 63	600	**3VL1706-1DD3□-□□□□**	1	1 unit	1CC
	80	63 ... 80	1000	**3VL1708-1DD3□-□□□□**	1	1 unit	1CC
	100	80 ... 100	1000	**3VL1710-1DD3□-□□□□**	1	1 unit	1CC
	125	100 ... 125	1000	**3VL1712-1DD3□-□□□□**	1	1 unit	1CC
	160	125 ... 160	1500	**3VL1716-1DD3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal not in conjunction with RCD module[1)]	**6**

[1)] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced**.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL1796-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1702-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1725-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1703-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1704-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1705-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1706-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1708-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1710-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1712-2DA3□-□□□□		1	1 unit	1CC		--				
	3VL1716-2DA3□-□□□□		1	1 unit	1CC		--				
	3 **6**										
	3VL1702-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1703-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1704-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1705-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1706-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1708-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1710-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1712-2DD3□-□□□□		1	1 unit	1CC		--				
	3VL1716-2DD3□-□□□□		1	1 unit	1CC		--				
	3 **6**										

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, IEC

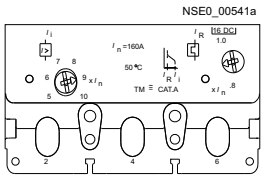
3-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "L" I_R	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N See "Overview". (N)				
					Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU/ Price see page 2/162	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					

3-pole, fixed-mounted, for line protection, 50 A to 630 A, thermal-magnetic overcurrent releases LI



NSE0_00691


NSE0_00541a

Line protection, TM, LI function

With adjustable thermal overcurrent releases, adjustable short-circuit releases

VL160/ 3VL2	50	40 ... 50	300 ... 600	**3VL2705-1DC3□-□□□□**	1	1 unit	1CC
	63	50 ... 63	300 ... 600	**3VL2706-1DC3□-□□□□**	1	1 unit	1CC
	80	63 ... 80	400 ... 800	**3VL2708-1DC3□-□□□□**	1	1 unit	1CC
	100	80 ... 100	500 ... 1000	**3VL2710-1DC3□-□□□□**	1	1 unit	1CC
	125	100 ... 125	625 ... 1250	**3VL2712-1DC3□-□□□□**	1	1 unit	1CC
	160	125 ... 160	800 ... 1600	**3VL2716-1DC3□-□□□□**	1	1 unit	1CC
VL250/ 3VL3	200	160 ... 200	1000 ... 2000	**3VL3720-1DC3□-□□□□**	1	1 unit	1CC
	250	200 ... 250	1250 ... 2500	**3VL3725-1DC3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal[1)]	**6**

VL400/3VL4	200	160 ... 200	1000 ... 2000	**3VL4720-1DC36-□□□□**	1	1 unit	1CC
	250	200 ... 250	1250 ... 2500	**3VL4725-1DC36-□□□□**	1	1 unit	1CC
	315	250 ... 315	1575 ... 3150	**3VL4731-1DC36-□□□□**	1	1 unit	1CC
	400	320 ... 400	2000 ... 4000	**3VL4740-1DC36-□□□□**	1	1 unit	1CC
VL630/3VL5	315	250 ... 315	1575 ... 3150	**3VL5731-1DC36-□□□□**	1	1 unit	1CC
	400	320 ... 400	2000 ... 4000	**3VL5740-1DC36-□□□□**	1	1 unit	1CC
	500	400 ... 500	2500 ... 5000	**3VL5750-1DC36-□□□□**	1	1 unit	1CC
	630	500 ... 630	3150 ... 6300	**3VL5763-1DC36-□□□□**	1	1 unit	1CC

3-pole, fixed-mounted, for line protection, 63 A to 1600 A, Electronic Trip Units LI



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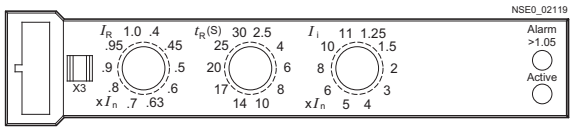

NSE0_02119

ETU10, LI function

With adjustable overcurrent releases, adjustable short-circuit releases

VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n	**3VL2706-1□□3□-□□□□**	1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n	**3VL2710-1□□3□-□□□□**	1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n	**3VL2716-1□□3□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n	**3VL3720-1□□3□-□□□□**	1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n	**3VL3725-1□□3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal[1)]	**6**

VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n	**3VL4731-1□□36-□□□□**	1	1 unit	1CC
	400	160 ... 400	1.25 ... 11 × I_n	**3VL4740-1□□36-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n	**3VL5763-1□□36-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n	**3VL6780-1□□36-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n	**3VL7710-1□□36-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	1.25 ... 11 × I_n	**3VL7712-1□□36-□□□□**	1	1 unit	1CC
VL1600/3VL8[2)]	1600	640 ... 1600	1.25 ... 9 × I_n	**3VL8716-1□□30-□□□□**	1	1 unit	1CC

• Without communication preparation	**SB**
• With communication preparation	**MB**
• Marine engineering-certified LRS, DNV, GL and BV (not communication-ready)	**LB**

[1)] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[2)] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H) — Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU/ Price see page 2/162	PU (UNIT, SET, M)	PS	PG
	3VL2705-2DC3□-□□□□		1	1 unit	1CC
	3VL2706-2DC3□-□□□□		1	1 unit	1CC
	3VL2708-2DC3□-□□□□		1	1 unit	1CC
	3VL2710-2DC3□-□□□□		1	1 unit	1CC
	3VL2712-2DC3□-□□□□		1	1 unit	1CC
	3VL2716-2DC3□-□□□□		1	1 unit	1CC
	3VL3720-2DC3□-□□□□		1	1 unit	1CC
	3VL3725-2DC3□-□□□□		1	1 unit	1CC
	3 6				
	3VL4720-2DC36-□□□□		1	1 unit	1CC
	3VL4725-2DC36-□□□□		1	1 unit	1CC
	3VL4731-2DC36-□□□□		1	1 unit	1CC
	3VL4740-2DC36-□□□□		1	1 unit	1CC
	3VL5731-2DC36-□□□□		1	1 unit	1CC
	3VL5740-2DC36-□□□□		1	1 unit	1CC
	3VL5750-2DC36-□□□□		1	1 unit	1CC
	3VL5763-2DC36-□□□□		1	1 unit	1CC
	3VL2706-2□□3□-□□□□		1	1 unit	1CC
	3VL2710-2□□3□-□□□□		1	1 unit	1CC
	3VL2716-2□□3□-□□□□		1	1 unit	1CC
	3VL3720-2□□3□-□□□□		1	1 unit	1CC
	3VL3725-2□□3□-□□□□		1	1 unit	1CC
	3 6				
	3VL4731-2□□36-□□□□		1	1 unit	1CC
	3VL4740-2□□36-□□□□		1	1 unit	1CC
	3VL5763-2□□36-□□□□		1	1 unit	1CC
	3VL6780-2□□36-□□□□		1	1 unit	1CC
	3VL7710-2□□36-□□□□		1	1 unit	1CC
	3VL7712-2□□36-□□□□		1	1 unit	1CC
	3VL8716-2□□30-□□□□		1	1 unit	1CC
	SB MB LB				

SD d	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L) — Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU/ Price see page 2/162	PU (UNIT, SET, M)	PS	PG
	3VL2705-3DC3□-□□□□		1	1 unit	1CC
	3VL2706-3DC3□-□□□□		1	1 unit	1CC
	3VL2708-3DC3□-□□□□		1	1 unit	1CC
	3VL2710-3DC3□-□□□□		1	1 unit	1CC
	3VL2712-3DC3□-□□□□		1	1 unit	1CC
	3VL2716-3DC3□-□□□□		1	1 unit	1CC
	3VL3720-3DC3□-□□□□		1	1 unit	1CC
	3VL3725-3DC3□-□□□□		1	1 unit	1CC
	3 6				
	3VL4720-3DC36-□□□□		1	1 unit	1CC
	3VL4725-3DC36-□□□□		1	1 unit	1CC
	3VL4731-3DC36-□□□□		1	1 unit	1CC
	3VL4740-3DC36-□□□□		1	1 unit	1CC
	3VL5731-3DC36-□□□□		1	1 unit	1CC
	3VL5740-3DC36-□□□□		1	1 unit	1CC
	3VL5750-3DC36-□□□□		1	1 unit	1CC
	3VL5763-3DC36-□□□□		1	1 unit	1CC
	3VL2706-3□□3□-□□□□		1	1 unit	1CC
	3VL2710-3□□3□-□□□□		1	1 unit	1CC
	3VL2716-3□□3□-□□□□		1	1 unit	1CC
	3VL3720-3□□3□-□□□□		1	1 unit	1CC
	3VL3725-3□□3□-□□□□		1	1 unit	1CC
	3 6				
	3VL4731-3□□36-□□□□		1	1 unit	1CC
	3VL4740-3□□36-□□□□		1	1 unit	1CC
	3VL5763-3□□36-□□□□		1	1 unit	1CC
	3VL6780-3□□36-□□□□		1	1 unit	1CC
	3VL7710-3□□36-□□□□		1	1 unit	1CC
	3VL7712-3□□36-□□□□		1	1 unit	1CC
	3VL8716-3□□30-□□□□		1	1 unit	1CC
	SB MB LB				

Minimum order quantity (PS) or a multiple thereof can be ordered.

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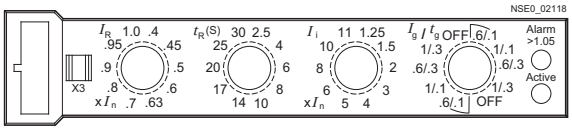
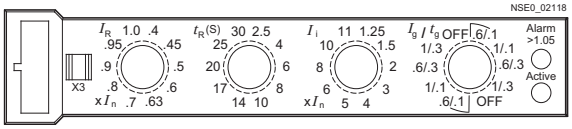
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "L" I_R	Operating current of the instantaneous short-circuit protection "I" I_i	Ground-fault protection "G" I_g	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N See "Overview". (N)			
						Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
	A	A	A	A	d					
3-pole, fixed-mounted, for line protection, 63 A to 1600 A, Electronic Trip Units LIG										
 NSE0_00693										
 NSE0_02118										
ETU12, LIG function for 3-wire three-phase systems										
With adjustable overcurrent releases, adjustable short-circuit releases, vectorial summation current formation, ground-fault delay t_g = 0.1 ... 0.3 s, ground fault function (G) can be switched off.										
VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL2706-1□□3□-□□□□**	1	1 unit		1CC
	100	40 ... 100	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL2710-1□□3□-□□□□**	1	1 unit		1CC
	160	64 ... 160	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL2716-1□□3□-□□□□**	1	1 unit		1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL3720-1□□3□-□□□□**	1	1 unit		1CC
	250	100 ... 250	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL3725-1□□3□-□□□□**	1	1 unit		1CC
Connection type can be selected by assignment of the 12th position of the Article No.										
• Connection with box terminal						**3**				
• Connection with screw terminal[1]						**6**				
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL4731-1□□36-□□□□**	1	1 unit		1CC
	400	160 ... 400	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL4740-1□□36-□□□□**	1	1 unit		1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n	0.6 ... 1 × I_n, OFF		**3VL5763-1□□36-□□□□**	1	1 unit		1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n	0.6 ... 1 × I_n, OFF		**3VL6780-1□□36-□□□□**	1	1 unit		1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL7710-1□□36-□□□□**	1	1 unit		1CC
	1250	500 ... 1250	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL7712-1□□36-□□□□**	1	1 unit		1CC
VL1600/3VL8[2]	1600	640 ... 1600	1.25 ... 9 × I_n	0.6 ... 1 × I_n, OFF		**3VL8716-1□□30-□□□□**	1	1 unit		1CC
• Without communication preparation						**SL**				
• With communication preparation						**ML**				
3-pole, fixed-mounted, for line protection, 63 A to 1600 A, Electronic Trip Units LIG										
 NSE0_00693										
 NSE0_02118										
ETU12, LIG function for 4-wire three-phase systems										
With adjustable overcurrent releases, adjustable short-circuit releases, vectorial summation current formation, external current transformers required in addition, see page 2/220. Ground fault delay t_g = 0.1 ... 0.3 s, ground fault function (G) can be switched off.										
VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL2706-1□□3□-□□□□**	1	1 unit		1CC
	100	40 ... 100	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL2710-1□□3□-□□□□**	1	1 unit		1CC
	160	64 ... 160	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL2716-1□□3□-□□□□**	1	1 unit		1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL3720-1□□3□-□□□□**	1	1 unit		1CC
	250	100 ... 250	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL3725-1□□3□-□□□□**	1	1 unit		1CC
Connection type can be selected by assignment of the 12th position of the Article No.										
• Connection with box terminal						**3**				
• Connection with screw terminal[1]						**6**				
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL4731-1□□36-□□□□**	1	1 unit		1CC
	400	160 ... 400	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL4740-1□□36-□□□□**	1	1 unit		1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n	0.6 ... 1 × I_n, OFF		**3VL5763-1□□36-□□□□**	1	1 unit		1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n	0.6 ... 1 × I_n, OFF		**3VL6780-1□□36-□□□□**	1	1 unit		1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL7710-1□□36-□□□□**	1	1 unit		1CC
	1250	500 ... 1250	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF		**3VL7712-1□□36-□□□□**	1	1 unit		1CC
VL1600/3VL8[2]	1600	640 ... 1600	1.25 ... 9 × I_n	0.6 ... 1 × I_n, OFF		**3VL8716-1□□30-□□□□**	1	1 unit		1CC
• Without communication preparation						**SF**				
• With communication preparation						**MF**				

[1] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced**.

[2] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)			
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS / PG		Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS / PG
d					d				
	3VL2706-2□□3□-□□□□		1	1 unit 1CC		**3VL2706-3□□3□-□□□□**		1	1 unit 1CC
	3VL2710-2□□3□-□□□□		1	1 unit 1CC		**3VL2710-3□□3□-□□□□**		1	1 unit 1CC
	3VL2716-2□□3□-□□□□		1	1 unit 1CC		**3VL2716-3□□3□-□□□□**		1	1 unit 1CC
	3VL3720-2□□3□-□□□□		1	1 unit 1CC		**3VL3720-3□□3□-□□□□**		1	1 unit 1CC
	3VL3725-2□□3□-□□□□		1	1 unit 1CC		**3VL3725-3□□3□-□□□□**		1	1 unit 1CC
	3 6					**3 6**			
	3VL4731-2□□36-□□□□		1	1 unit 1CC		**3VL4731-3□□36-□□□□**		1	1 unit 1CC
	3VL4740-2□□36-□□□□		1	1 unit 1CC		**3VL4740-3□□36-□□□□**		1	1 unit 1CC
	3VL5763-2□□36-□□□□		1	1 unit 1CC		**3VL5763-3□□36-□□□□**		1	1 unit 1CC
	3VL6780-2□□36-□□□□		1	1 unit 1CC		**3VL6780-3□□36-□□□□**		1	1 unit 1CC
	3VL7710-2□□36-□□□□		1	1 unit 1CC		**3VL7710-3□□36-□□□□**		1	1 unit 1CC
	3VL7712-2□□36-□□□□		1	1 unit 1CC		**3VL7712-3□□36-□□□□**		1	1 unit 1CC
	3VL8716-2□□30-□□□□		1	1 unit 1CC		**3VL8716-3□□30-□□□□**		1	1 unit 1CC
	SL ML					**SL ML**			

SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)			
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS / PG		Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS / PG
d					d				
	3VL2706-2□□3□-□□□□		1	1 unit 1CC		**3VL2706-3□□3□-□□□□**		1	1 unit 1CC
	3VL2710-2□□3□-□□□□		1	1 unit 1CC		**3VL2710-3□□3□-□□□□**		1	1 unit 1CC
	3VL2716-2□□3□-□□□□		1	1 unit 1CC		**3VL2716-3□□3□-□□□□**		1	1 unit 1CC
	3VL3720-2□□3□-□□□□		1	1 unit 1CC		**3VL3720-3□□3□-□□□□**		1	1 unit 1CC
	3VL3725-2□□3□-□□□□		1	1 unit 1CC		**3VL3725-3□□3□-□□□□**		1	1 unit 1CC
	3 6					**3 6**			
	3VL4731-2□□36-□□□□		1	1 unit 1CC		**3VL4731-3□□36-□□□□**		1	1 unit 1CC
	3VL4740-2□□36-□□□□		1	1 unit 1CC		**3VL4740-3□□36-□□□□**		1	1 unit 1CC
	3VL5763-2□□36-□□□□		1	1 unit 1CC		**3VL5763-3□□36-□□□□**		1	1 unit 1CC
	3VL6780-2□□36-□□□□		1	1 unit 1CC		**3VL6780-3□□36-□□□□**		1	1 unit 1CC
	3VL7710-2□□36-□□□□		1	1 unit 1CC		**3VL7710-3□□36-□□□□**		1	1 unit 1CC
	3VL7712-2□□36-□□□□		1	1 unit 1CC		**3VL7712-3□□36-□□□□**		1	1 unit 1CC
	3VL8716-2□□30-□□□□		1	1 unit 1CC		**3VL8716-3□□30-□□□□**		1	1 unit 1CC
	SF MF					**SF MF**			

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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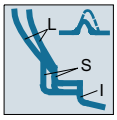
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview".				(N)
						Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
						Article No. supplement, see page 2/186; www.siemens.com/product?Article No.				
	A	A	A	A	d					

3-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSI



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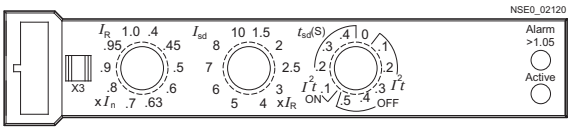

ETU20, LSI function for time-based discrimination

With adjustable overcurrent releases, fixed short-circuit releases, short-circuit delay (t_{sd} = 0 to 0.5 s)

VL160/3VL2	63	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL2706-1□□3□-□□□□**	1	1 unit	1CC
	100	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL2710-1□□3□-□□□□**	1	1 unit	1CC
	160	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL2716-1□□3□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL3720-1□□3□-□□□□**	1	1 unit	1CC
	250	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL3725-1□□3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with screw terminal[1)]	**6**

VL400/3VL4	315	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL4731-1□□36-□□□□**	1	1 unit	1CC
	400	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL4740-1□□36-□□□□**	1	1 unit	1CC
VL630/3VL5	630	0.4 ... 1.0 × I_n	10 × I_n	1.5 ... 9 × I_R	**3VL5763-1□□36-□□□□**	1	1 unit	1CC
VL800/3VL6	800	0.4 ... 1.0 × I_n	8 × I_n	1.5 ... 7 × I_R	**3VL6780-1□□36-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL7710-1□□36-□□□□**	1	1 unit	1CC
	1250	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL7712-1□□36-□□□□**	1	1 unit	1CC
VL1600/3VL8[2)]	1600	0.4 ... 1.0 × I_n	9 × I_n	1.5 ... 8 × I_R	**3VL8716-1□□30-□□□□**	1	1 unit	1CC

• Without communication preparation	**SE**
• With communication preparation	**ME**
• Marine engineering-certified LRS, DNV, GL and BV (not communication-ready)	**LE**

1) **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced**.

2) Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG		Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
d					d						
	3VL2706-2□□3□-□□□□		1	1 unit	1CC		**3VL2706-3□□3□-□□□□**		1	1 unit	1CC
	3VL2710-2□□3□-□□□□		1	1 unit	1CC		**3VL2710-3□□3□-□□□□**		1	1 unit	1CC
	3VL2716-2□□3□-□□□□		1	1 unit	1CC		**3VL2716-3□□3□-□□□□**		1	1 unit	1CC
	3VL3720-2□□3□-□□□□		1	1 unit	1CC		**3VL3720-3□□3□-□□□□**		1	1 unit	1CC
	3VL3725-2□□3□-□□□□		1	1 unit	1CC		**3VL3725-3□□3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□36-□□□□		1	1 unit	1CC		**3VL4731-3□□36-□□□□**		1	1 unit	1CC
	3VL4740-2□□36-□□□□		1	1 unit	1CC		**3VL4740-3□□36-□□□□**		1	1 unit	1CC
	3VL5763-2□□36-□□□□		1	1 unit	1CC		**3VL5763-3□□36-□□□□**		1	1 unit	1CC
	3VL6780-2□□36-□□□□		1	1 unit	1CC		**3VL6780-3□□36-□□□□**		1	1 unit	1CC
	3VL7710-2□□36-□□□□		1	1 unit	1CC		**3VL7710-3□□36-□□□□**		1	1 unit	1CC
	3VL7712-2□□36-□□□□		1	1 unit	1CC		**3VL7712-3□□36-□□□□**		1	1 unit	1CC
	3VL8716-2□□30-□□□□		1	1 unit	1CC		**3VL8716-3□□30-□□□□**		1	1 unit	1CC
	SE ME LE						**SE ME LE**				

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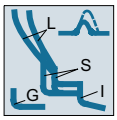
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	Ground-fault protection "**G**" I_g	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview". (N)			
							Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS / PG
							Article No. supplement, see page 2/186; www.siemens.com/product?Article No.			
	A	A	A	A	A	d				

3-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSIG



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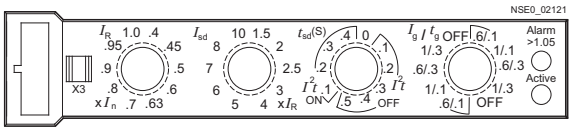

ETU22, LSIG function for 3-wire three-phase systems and time-based discrimination

With adjustable overcurrent releases, fixed short-circuit releases, ground-fault delay t_g = 0.1 ... 0.3 s, short-circuit delay t_{sd} = 0 ... 0.5 s, ground fault function (G) can be switched off.

VL160/3VL2	63	25 ... 63	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2706-1□□3□-□□□□**	1	1 unit	1CC
	100	40 ... 100	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2710-1□□3□-□□□□**	1	1 unit	1CC
	160	64 ... 160	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2716-1□□3□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL3720-1□□3□-□□□□**	1	1 unit	1CC
	250	100 ... 250	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL3725-1□□3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with screw terminal[1)]	**6**

VL400/3VL4	315	128 ... 315	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL4731-1□□36-□□□□**	1	1 unit	1CC
	400	160 ... 400	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL4740-1□□36-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	10 × I_n	1.5 ... 9 × I_R	0.6 ... 1 × I_n, OFF	**3VL5763-1□□36-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	8 × I_n	1.5 ... 7 × I_R	0.6 ... 1 × I_n, OFF	**3VL6780-1□□36-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL7710-1□□36-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL7712-1□□36-□□□□**	1	1 unit	1CC
VL1600/3VL8[2)]	1600	640 ... 1600	9 × I_n	1.5 ... 8 × I_R	0.6 ... 1 × I_n, OFF	**3VL8716-1□□30-□□□□**	1	1 unit	1CC

• Without communication preparation	**SG**
• With communication preparation	**MG**

[1)] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[2)] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
d					d					
	3VL2706-2□□3□-□□□□		1	1 unit	1CC	**3VL2706-3□□3□-□□□□**		1	1 unit	1CC
	3VL2710-2□□3□-□□□□		1	1 unit	1CC	**3VL2710-3□□3□-□□□□**		1	1 unit	1CC
	3VL2716-2□□3□-□□□□		1	1 unit	1CC	**3VL2716-3□□3□-□□□□**		1	1 unit	1CC
	3VL3720-2□□3□-□□□□		1	1 unit	1CC	**3VL3720-3□□3□-□□□□**		1	1 unit	1CC
	3VL3725-2□□3□-□□□□		1	1 unit	1CC	**3VL3725-3□□3□-□□□□**		1	1 unit	1CC
	3 6					**3 6**				
	3VL4731-2□□36-□□□□		1	1 unit	1CC	**3VL4731-3□□36-□□□□**		1	1 unit	1CC
	3VL4740-2□□36-□□□□		1	1 unit	1CC	**3VL4740-3□□36-□□□□**		1	1 unit	1CC
	3VL5763-2□□36-□□□□		1	1 unit	1CC	**3VL5763-3□□36-□□□□**		1	1 unit	1CC
	3VL6780-2□□36-□□□□		1	1 unit	1CC	**3VL6780-3□□36-□□□□**		1	1 unit	1CC
	3VL7710-2□□36-□□□□		1	1 unit	1CC	**3VL7710-3□□36-□□□□**		1	1 unit	1CC
	3VL7712-2□□36-□□□□		1	1 unit	1CC	**3VL7712-3□□36-□□□□**		1	1 unit	1CC
	3VL8716-2□□30-□□□□		1	1 unit	1CC	**3VL8716-3□□30-□□□□**		1	1 unit	1CC
	SG MG					**SG MG**				

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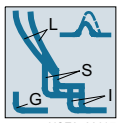
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	Ground-fault protection "**G**" I_g	SD	**I_{cu} up to 55 kA at 415 V, standard breaking capacity N** See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	A	A	d					

3-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSIG



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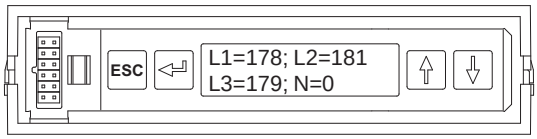

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LCD-ETU42, LSIG function for 3-wire three-phase systems and time-based discrimination

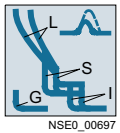
With adjustable overcurrent releases, adjustable short-circuit releases,
vectorial summation current formation, ground-fault delay t_g = 0.1 ... 0.5 s, short-circuit delay t_{sd} = 0 ... 0.5 s

VL160/3VL2	63	25 ... 63	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL2706-1UL3□-□□□□**	1	1 unit	1CC
	100	40 ... 100	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL2710-1UL3□-□□□□**	1	1 unit	1CC
	160	64 ... 160	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL2716-1UL3□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL3720-1UL3□-□□□□**	1	1 unit	1CC
	250	100 ... 250	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL3725-1UL3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with screw terminal[1)]	**6**

VL400/3VL4	315	128 ... 315	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL4731-1UL36-□□□□**	1	1 unit	1CC
	400	160 ... 400	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL4740-1UL36-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	10 × I_n	1.5 ... 9 × I_R	0.4 ... 1 × I_n	**3VL5763-1UL36-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	8 × I_n	1.5 ... 7 × I_R	0.4 ... 1 × I_n	**3VL6780-1UL36-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL7710-1UL36-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL7712-1UL36-□□□□**	1	1 unit	1CC
VL1600/3VL8[2)]	1600	640 ... 1600	9 × I_n	1.5 ... 8 × I_R	0.4 ... 1 × I_n	**3VL8716-1UL30-□□□□**	1	1 unit	1CC



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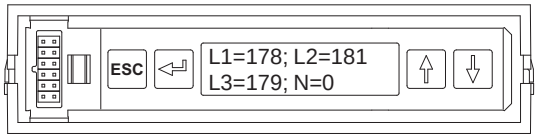

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LCD-ETU42, LSIG function for 4-wire three-phase systems and time-based discrimination

With adjustable overcurrent releases, adjustable short-circuit releases. External current transformers required in addition, see page 2/220.
Vectorial summation current formation, ground-fault delay t_g = 0.1 ... 0.5 s, short-circuit delay t_{sd} = 0 ... 0.5 s

VL160/3VL2	63	25 ... 63	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL2706-1UM3□-□□□□**	1	1 unit	1CC
	100	40 ... 100	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL2710-1UM3□-□□□□**	1	1 unit	1CC
	160	64 ... 160	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL2716-1UM3□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL3720-1UM3□-□□□□**	1	1 unit	1CC
	250	100 ... 250	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL3725-1UM3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with screw terminal[1)]	**6**

VL400/3VL4	315	128 ... 315	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL4731-1UM36-□□□□**	1	1 unit	1CC
	400	160 ... 400	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL4740-1UM36-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	10 × I_n	1.5 ... 9 × I_R	0.4 ... 1 × I_n	**3VL5763-1UM36-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	8 × I_n	1.5 ... 7 × I_R	0.4 ... 1 × I_n	**3VL6780-1UM36-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL7710-1UM36-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n	**3VL7712-1UM36-□□□□**	1	1 unit	1CC
VL1600/3VL8[2)]	1600	640 ... 1600	9 × I_n	1.5 ... 8 × I_R	0.4 ... 1 × I_n	**3VL8716-1UM30-□□□□**	1	1 unit	1CC

[1)] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[2)] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2706-2UL3□-□□□□		1	1 unit	1CC		**3VL2706-3UL3□-□□□□**		1	1 unit	1CC
	3VL2710-2UL3□-□□□□		1	1 unit	1CC		**3VL2710-3UL3□-□□□□**		1	1 unit	1CC
	3VL2716-2UL3□-□□□□		1	1 unit	1CC		**3VL2716-3UL3□-□□□□**		1	1 unit	1CC
	3VL3720-2UL3□-□□□□		1	1 unit	1CC		**3VL3720-3UL3□-□□□□**		1	1 unit	1CC
	3VL3725-2UL3□-□□□□		1	1 unit	1CC		**3VL3725-3UL3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2UL36-□□□□		1	1 unit	1CC		**3VL4731-3UL36-□□□□**		1	1 unit	1CC
	3VL4740-2UL36-□□□□		1	1 unit	1CC		**3VL4740-3UL36-□□□□**		1	1 unit	1CC
	3VL5763-2UL36-□□□□		1	1 unit	1CC		**3VL5763-3UL36-□□□□**		1	1 unit	1CC
	3VL6780-2UL36-□□□□		1	1 unit	1CC		**3VL6780-3UL36-□□□□**		1	1 unit	1CC
	3VL7710-2UL36-□□□□		1	1 unit	1CC		**3VL7710-3UL36-□□□□**		1	1 unit	1CC
	3VL7712-2UL36-□□□□		1	1 unit	1CC		**3VL7712-3UL36-□□□□**		1	1 unit	1CC
	3VL8716-2UL30-□□□□		1	1 unit	1CC		**3VL8716-3UL30-□□□□**		1	1 unit	1CC
	3VL2706-2UM3□-□□□□		1	1 unit	1CC		**3VL2706-3UM3□-□□□□**		1	1 unit	1CC
	3VL2710-2UM3□-□□□□		1	1 unit	1CC		**3VL2710-3UM3□-□□□□**		1	1 unit	1CC
	3VL2716-2UM3□-□□□□		1	1 unit	1CC		**3VL2716-3UM3□-□□□□**		1	1 unit	1CC
	3VL3720-2UM3□-□□□□		1	1 unit	1CC		**3VL3720-3UM3□-□□□□**		1	1 unit	1CC
	3VL3725-2UM3□-□□□□		1	1 unit	1CC		**3VL3725-3UM3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2UM36-□□□□		1	1 unit	1CC		**3VL4731-3UM36-□□□□**		1	1 unit	1CC
	3VL4740-2UM36-□□□□		1	1 unit	1CC		**3VL4740-3UM36-□□□□**		1	1 unit	1CC
	3VL5763-2UM36-□□□□		1	1 unit	1CC		**3VL5763-3UM36-□□□□**		1	1 unit	1CC
	3VL6780-2UM36-□□□□		1	1 unit	1CC		**3VL6780-3UM36-□□□□**		1	1 unit	1CC
	3VL7710-2UM36-□□□□		1	1 unit	1CC		**3VL7710-3UM36-□□□□**		1	1 unit	1CC
	3VL7712-2UM36-□□□□		1	1 unit	1CC		**3VL7712-3UM36-□□□□**		1	1 unit	1CC
	3VL8716-2UM30-□□□□		1	1 unit	1CC		**3VL8716-3UM30-□□□□**		1	1 unit	1CC

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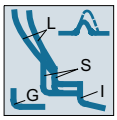
3-pole

2

Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	Ground-fault protection "**G**" I_g	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
	A	A	A	A	A	d					

3-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSIG



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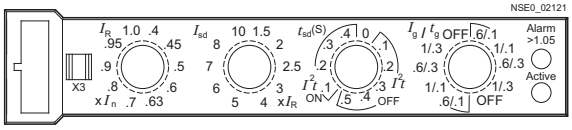

ETU22, LSIG function for 4-wire three-phase systems and time-based discrimination

With adjustable overcurrent releases, fixed short-circuit releases, external current transformers required in addition, see page 2/220. ground-fault delay t_g = 0.1 ... 0.3 s, short-circuit delay t_{sd} = 0 ... 0.5 s, ground fault function (G) can be switched off.

VL160/3VL2	63	25 ... 63	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2706-1□□3□-□□□□**	1	1 unit	1CC
	100	40 ... 100	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2710-1□□3□-□□□□**	1	1 unit	1CC
	160	64 ... 160	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2716-1□□3□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL3720-1□□3□-□□□□**	1	1 unit	1CC
	250	100 ... 250	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL3725-1□□3□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with screw terminal[1)]	**6**

VL400/3VL4	315	128 ... 315	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL4731-1□□36-□□□□**	1	1 unit	1CC
	400	160 ... 400	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL4740-1□□36-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	10 × I_n	1.5 ... 9 × I_R	0.6 ... 1 × I_n, OFF	**3VL5763-1□□36-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	8 × I_n	1.5 ... 7 × I_R	0.6 ... 1 × I_n, OFF	**3VL6780-1□□36-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL7710-1□□36-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL7712-1□□36-□□□□**	1	1 unit	1CC
VL1600/3VL8[2)]	1600	640 ... 1600	9 × I_n	1.5 ... 8 × I_R	0.6 ... 1 × I_n, OFF	**3VL8716-1□□30-□□□□**	1	1 unit	1CC

• Without communication preparation	**SH**
• With communication preparation	**MH**

1) **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced**.

2) Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)			
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG		Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
d					d						
	3VL2706-2□□3□-□□□□		1	1 unit	1CC		**3VL2706-3□□3□-□□□□**		1	1 unit	1CC
	3VL2710-2□□3□-□□□□		1	1 unit	1CC		**3VL2710-3□□3□-□□□□**		1	1 unit	1CC
	3VL2716-2□□3□-□□□□		1	1 unit	1CC		**3VL2716-3□□3□-□□□□**		1	1 unit	1CC
	3VL3720-2□□3□-□□□□		1	1 unit	1CC		**3VL3720-3□□3□-□□□□**		1	1 unit	1CC
	3VL3725-2□□3□-□□□□		1	1 unit	1CC		**3VL3725-3□□3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□36-□□□□		1	1 unit	1CC		**3VL4731-3□□36-□□□□**		1	1 unit	1CC
	3VL4740-2□□36-□□□□		1	1 unit	1CC		**3VL4740-3□□36-□□□□**		1	1 unit	1CC
	3VL5763-2□□36-□□□□		1	1 unit	1CC		**3VL5763-3□□36-□□□□**		1	1 unit	1CC
	3VL6780-2□□36-□□□□		1	1 unit	1CC		**3VL6780-3□□36-□□□□**		1	1 unit	1CC
	3VL7710-2□□36-□□□□		1	1 unit	1CC		**3VL7710-3□□36-□□□□**		1	1 unit	1CC
	3VL7712-2□□36-□□□□		1	1 unit	1CC		**3VL7712-3□□36-□□□□**		1	1 unit	1CC
	3VL8716-2□□30-□□□□		1	1 unit	1CC		**3VL8716-3□□30-□□□□**		1	1 unit	1CC
	SH MH						**SH MH**				

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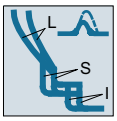
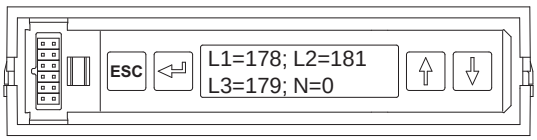
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview".				(N)
						Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	A	d					
3-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LI, LS, LSI										



NSE0_00696



NSE0_02129

LCD-ETU40, LI/LS/LSI function selectable

With adjustable overcurrent releases, adjustable short-circuit releases, short-circuit delay (t_{sd} = 0 to 0.5 s)

VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL2706-1UH3□-□□□□**	1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL2710-1UH3□-□□□□**	1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL2716-1UH3□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL3720-1UH3□-□□□□**	1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL3725-1UH3□-□□□□**	1	1 unit	1CC
		Connection type can be selected by assignment of the 12th position of the Article						
		• Connection with box terminal			**3**			
		• Connection with screw terminal[1]			**6**			
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL4731-1UH36-□□□□**	1	1 unit	1CC
	400	160 ... 400	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL4740-1UH36-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n	1.5 ... 9 × I_R	**3VL5763-1UH36-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n	1.5 ... 7 × I_R	**3VL6780-1UH36-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL7710-1UH36-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	1.25 ... 11 × I_n	1.5 ... 10 × I_R	**3VL7712-1UH36-□□□□**	1	1 unit	1CC
VL1600/3VL8[2]	1600	640 ... 1600	1.25 ... 9 × I_n	1.5 ... 8 × I_R	**3VL8716-1UH30-□□□□**	1	1 unit	1CC

[1] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced**.

[2] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2706-2UH3□-□□□□		1	1 unit	1CC		**3VL2706-3UH3□-□□□□**		1	1 unit	1CC
	3VL2710-2UH3□-□□□□		1	1 unit	1CC		**3VL2710-3UH3□-□□□□**		1	1 unit	1CC
	3VL2716-2UH3□-□□□□		1	1 unit	1CC		**3VL2716-3UH3□-□□□□**		1	1 unit	1CC
	3VL3720-2UH3□-□□□□		1	1 unit	1CC		**3VL3720-3UH3□-□□□□**		1	1 unit	1CC
	3VL3725-2UH3□-□□□□		1	1 unit	1CC		**3VL3725-3UH3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2UH36-□□□□		1	1 unit	1CC		**3VL4731-3UH36-□□□□**		1	1 unit	1CC
	3VL4740-2UH36-□□□□		1	1 unit	1CC		**3VL4740-3UH36-□□□□**		1	1 unit	1CC
	3VL5763-2UH36-□□□□		1	1 unit	1CC		**3VL5763-3UH36-□□□□**		1	1 unit	1CC
	3VL6780-2UH36-□□□□		1	1 unit	1CC		**3VL6780-3UH36-□□□□**		1	1 unit	1CC
	3VL7710-2UH36-□□□□		1	1 unit	1CC		**3VL7710-3UH36-□□□□**		1	1 unit	1CC
	3VL7712-2UH36-□□□□		1	1 unit	1CC		**3VL7712-3UH36-□□□□**		1	1 unit	1CC
	3VL8716-2UH30-□□□□		1	1 unit	1CC		**3VL8716-3UH30-□□□□**		1	1 unit	1CC

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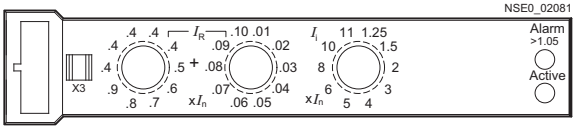
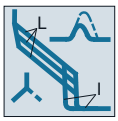
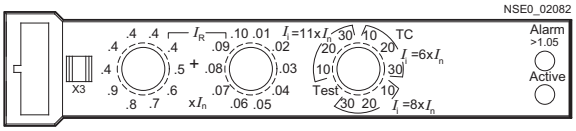
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "L" I_R	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N (N) See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
3-pole, fixed-mounted, for motor protection, 63 A to 500 A, Electronic Trip Units LI									
 NSE0_00943	 NSE0_02081								
ETU10M, LI function[1] With thermal image, with fixed trip class t_C = 10, with phase failure sensitivity 40% I_R									
VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n		**3VL2706-1□□3□-□□□□**		1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n		**3VL2710-1□□3□-□□□□**		1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n		**3VL2716-1□□3□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n		**3VL3720-1□□3□-□□□□**		1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n		**3VL3725-1□□3□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with screw terminal[2]					**6**				
VL400/3VL4	315	125 ... 315	1.25 ... 11 × I_n		**3VL4731-1□□36-□□□□**		1	1 unit	1CC
VL630/3VL5	500	200 ... 500	1.25 ... 12.5 × I_n		**3VL5750-1□□36-□□□□**		1	1 unit	1CC
• Without communication preparation					**SP**				
• With communication preparation					**MP**				
 NSE0_01419	 NSE0_02082								
ETU30M, LI function[1] With thermal image, with adjustable trip class t_C = 10, 20, 30 with phase failure sensitivity 40% I_R									
VL160/3VL2	63	25 ... 63	6/8/11 × I_n		**3VL2706-1□□3□-□□□□**		1	1 unit	1CC
	100	40 ... 100	6/8/11 × I_n		**3VL2710-1□□3□-□□□□**		1	1 unit	1CC
	160	64 ... 160	6/8/11 × I_n		**3VL2716-1□□3□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	80 ... 200	6/8/11 × I_n		**3VL3720-1□□3□-□□□□**		1	1 unit	1CC
	250	100 ... 250	6/8/11 × I_n		**3VL3725-1□□3□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with screw terminal[2]					**6**				
VL400/3VL4	315	125 ... 315	6/8/11 × I_n		**3VL4731-1□□36-□□□□**		1	1 unit	1CC
VL630/3VL5	500	200 ... 500	6/8/12.5 × I_n		**3VL5750-1□□36-□□□□**		1	1 unit	1CC
• Without communication preparation					**SS**				
• With communication preparation					**MS**				
• Marine engineering-certified LRS, DNV, GL and BV (not communication-ready)					**LS**				

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

[1] For use of 3VL molded case circuit breakers with an energy-efficient IE3 motor, you are advised to use a contactor for operational switching of the motor, see also page 2/13.

[2] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG		Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/162	PU (UNIT, SET, M)	PS	PG
d					d						
	3VL2706-2□□3□-□□□□		1	1 unit	1CC		**3VL2706-3□□3□-□□□□**		1	1 unit	1CC
	3VL2710-2□□3□-□□□□		1	1 unit	1CC		**3VL2710-3□□3□-□□□□**		1	1 unit	1CC
	3VL2716-2□□3□-□□□□		1	1 unit	1CC		**3VL2716-3□□3□-□□□□**		1	1 unit	1CC
	3VL3720-2□□3□-□□□□		1	1 unit	1CC		**3VL3720-3□□3□-□□□□**		1	1 unit	1CC
	3VL3725-2□□3□-□□□□		1	1 unit	1CC		**3VL3725-3□□3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□36-□□□□		1	1 unit	1CC		**3VL4731-3□□36-□□□□**		1	1 unit	1CC
	3VL5750-2□□36-□□□□		1	1 unit	1CC		**3VL5750-3□□36-□□□□**		1	1 unit	1CC
	SP MP						**SP MP**				

	3VL2706-2□□3□-□□□□		1	1 unit	1CC		**3VL2706-3□□3□-□□□□**		1	1 unit	1CC
	3VL2710-2□□3□-□□□□		1	1 unit	1CC		**3VL2710-3□□3□-□□□□**		1	1 unit	1CC
	3VL2716-2□□3□-□□□□		1	1 unit	1CC		**3VL2716-3□□3□-□□□□**		1	1 unit	1CC
	3VL3720-2□□3□-□□□□		1	1 unit	1CC		**3VL3720-3□□3□-□□□□**		1	1 unit	1CC
	3VL3725-2□□3□-□□□□		1	1 unit	1CC		**3VL3725-3□□3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□36-□□□□		1	1 unit	1CC		**3VL4731-3□□36-□□□□**		1	1 unit	1CC
	3VL5750-2□□36-□□□□		1	1 unit	1CC		**3VL5750-3□□36-□□□□**		1	1 unit	1CC
	SS MS LS						**SS MS LS**				

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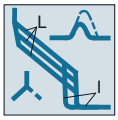
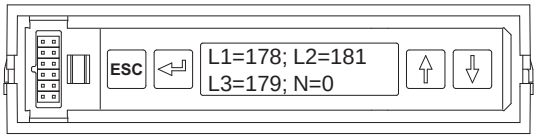
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview".				(N)
					Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
3-pole, fixed-mounted, for motor protection, 63 A to 500 A, Electronic Trip Units LI									
 NSE0_01419									
 NSE0_02129									
LCD-ETU40M, LI function[1] With thermal image, with adjustable trip class t_C = 5, 10, 15, 20, 30 with phase failure sensitivity adjustable in steps 5 ... 50% I_R									
VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n		**3VL2706-1UP3□-□□□□**		1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n		**3VL2710-1UP3□-□□□□**		1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n		**3VL2716-1UP3□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n		**3VL3720-1UP3□-□□□□**		1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n		**3VL3725-1UP3□-□□□□**		1	1 unit	1CC
		Connection type can be selected by assignment of the 12th position of the Article No.							
		• Connection with box terminal			**3**				
		• Connection with screw terminal[2]			**6**				
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n		**3VL4731-1UP36-□□□□**		1	1 unit	1CC
VL630/3VL5	500	250 ... 500	1.25 ... 12.5 × I_n		**3VL5750-1UP36-□□□□**		1	1 unit	1CC

1) For use of 3VL molded case circuit breakers with an energy-efficient IE3 motor, you are advised to use a contactor for operational switching of the motor, see also page 2/13.

2) **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2706-2UP3□-□□□□		1	1 unit	1CC		**3VL2706-3UP3□-□□□□**		1	1 unit	1CC
	3VL2710-2UP3□-□□□□		1	1 unit	1CC		**3VL2710-3UP3□-□□□□**		1	1 unit	1CC
	3VL2716-2UP3□-□□□□		1	1 unit	1CC		**3VL2716-3UP3□-□□□□**		1	1 unit	1CC
	3VL3720-2UP3□-□□□□		1	1 unit	1CC		**3VL3720-3UP3□-□□□□**		1	1 unit	1CC
	3VL3725-2UP3□-□□□□		1	1 unit	1CC		**3VL3725-3UP3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2UP36-□□□□		1	1 unit	1CC		**3VL4731-3UP36-□□□□**		1	1 unit	1CC
	3VL5750-2UP36-□□□□		1	1 unit	1CC		**3VL5750-3UP36-□□□□**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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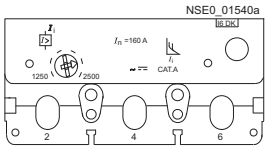
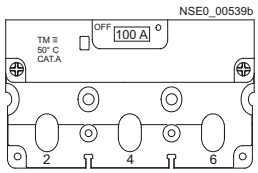
Molded Case Circuit Breakers
3VL Molded Case Circuit Breakers up to 1600 A, IEC

3-pole

Type	Rated current I_n	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N (N) See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
3-pole, fixed-mounted, for starter protection, 63 A to 500 A, magnetic trip unit I								
 NSE0_00707	 NSE0_01540a							
Starter protection, M, I function[1] Without thermal overcurrent release, with adjustable short-circuit release								
VL160/3VL2	63	450 ... 900		**3VL2706-1DK3□-□□□□**		1	1 unit	1CC
	100	750 ... 1500		**3VL2710-1DK3□-□□□□**		1	1 unit	1CC
	160	1250 ... 2500		**3VL2716-1DK3□-□□□□**		1	1 unit	1CC
VL250/3VL3	250	1750 ... 3500		**3VL3725-1DK3□-□□□□**		1	1 unit	1CC
				Connection type can be selected by assignment of the 12th position of the Article No.				
				• Connection with box terminal **3**				
				• Connection with screw terminal[2] **6**				
VL400/3VL4	200	1250 ... 2500		**3VL4720-1DK36-□□□□**		1	1 unit	1CC
	250	2000 ... 4000		**3VL4725-1DK36-□□□□**		1	1 unit	1CC
	315	2000 ... 4000		**3VL4731-1DK36-□□□□**		1	1 unit	1CC
VL630/3VL5	315	2000 ... 4000		**3VL5731-1DK36-□□□□**		1	1 unit	1CC
	500	3250 ... 6300		**3VL5750-1DK36-□□□□**		1	1 unit	1CC
3-pole, fixed-mounted, for safe disconnection, 100 A to 1600 A, magnetic trip unit I								
 NSE0_00708	 NSE0_00539b							
Non-automatic molded case circuit breakers[3], ***I function*** Without thermal overcurrent release, with fixed short-circuit release (for intrinsic protection only)								
VL160X/3VL1	100	1800		**3VL1710-1DE3□-□□□□**		1	1 unit	1CC
	160	1800		**3VL1716-1DE3□-□□□□**		1	1 unit	1CC
VL160/3VL2	100	2500		**3VL2710-1DE3□-□□□□**		1	1 unit	1CC
	160	2500		**3VL2716-1DE3□-□□□□**		1	1 unit	1CC
VL250/3VL3	250	3500		**3VL3725-1DE3□-□□□□**		1	1 unit	1CC
				Connection type can be selected by assignment of the 12th position of the Article No.				
				• Connection with box terminal **3**				
				• Connection with screw terminal not in conjunction with RCD module with 3VL1[2] **6**				
VL400/3VL4	400	4000		**3VL4740-1DE36-□□□□**		1	1 unit	1CC
VL630/3VL5	630	6300		**3VL5763-1DE36-□□□□**		1	1 unit	1CC
VL800/3VL6	800	6500		**3VL6780-1DE36-□□□□**		1	1 unit	1CC
VL1250/3VL7	1250	12000		**3VL7712-1DE36-□□□□**		1	1 unit	1CC
VL1600/3VL8[4]	1600	14400		**3VL8716-1DE30-□□□□**		1	1 unit	1CC

For further versions, including for short-circuit and ground-fault protection, see pages 2/142 to 2/159.

1) For use of 3VL molded case circuit breakers with an energy-efficient IE3 motor, you are advised to use a contactor for operational switching of the motor, see also page 2/136.

2) **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

3) See chapter "Switch Disconnectors". 3K switch disconnectors are also available with rear-mounting operating mechanism and leading contacts.

4) Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2706-2DK3□-□□□□		1	1 unit	1CC		**3VL2706-3DK3□-□□□□**		1	1 unit	1CC
	3VL2710-2DK3□-□□□□		1	1 unit	1CC		**3VL2710-3DK3□-□□□□**		1	1 unit	1CC
	3VL2716-2DK3□-□□□□		1	1 unit	1CC		**3VL2716-3DK3□-□□□□**		1	1 unit	1CC
	3VL3725-2DK3□-□□□□		1	1 unit	1CC		**3VL3725-3DK3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4720-2DK36-□□□□		1	1 unit	1CC		**3VL4720-3DK36-□□□□**		1	1 unit	1CC
	3VL4725-2DK36-□□□□		1	1 unit	1CC		**3VL4725-3DK36-□□□□**		1	1 unit	1CC
	3VL4731-2DK36-□□□□		1	1 unit	1CC		**3VL4731-3DK36-□□□□**		1	1 unit	1CC
	3VL5731-2DK36-□□□□		1	1 unit	1CC		**3VL5731-3DK36-□□□□**		1	1 unit	1CC
	3VL5750-2DK36-□□□□		1	1 unit	1CC		**3VL5750-3DK36-□□□□**		1	1 unit	1CC
	3VL1710-2DE3□-□□□□		1	1 unit	1CC		**--**				
	3VL1716-2DE3□-□□□□		1	1 unit	1CC		**--**				
	3VL2710-2DE3□-□□□□		1	1 unit	1CC		**3VL2710-3DE3□-□□□□**		1	1 unit	1CC
	3VL2716-2DE3□-□□□□		1	1 unit	1CC		**3VL2716-3DE3□-□□□□**		1	1 unit	1CC
	3VL3725-2DE3□-□□□□		1	1 unit	1CC		**3VL3725-3DE3□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4740-2DE36-□□□□		1	1 unit	1CC		**3VL4740-3DE36-□□□□**		1	1 unit	1CC
	3VL5763-2DE36-□□□□		1	1 unit	1CC		**3VL5763-3DE36-□□□□**		1	1 unit	1CC
	3VL6780-2DE36-□□□□		1	1 unit	1CC		**3VL6780-3DE36-□□□□**		1	1 unit	1CC
	3VL7712-2DE36-□□□□		1	1 unit	1CC		**3VL7712-3DE36-□□□□**		1	1 unit	1CC
	3VL8716-2DE30-□□□□		1	1 unit	1CC		**3VL8716-3DE30-□□□□**		1	1 unit	1CC

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Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, IEC

3-pole

Article No. supplement (for complete Article No., see pages 2/142 to 2/159) **3VL.7 ..-. □□3.-....** Trip unit		Breaking capacity	Type	**VL160**[1] 3VL2			**VL250**[1] 3VL3		**VL400** 3VL4		**VL630** 3VL5		**VL800** 3VL6	**VL1250** 3VL7		**VL1600** 3VL8
			Rated current I_n	63 A	100 A	160 A	200 A	250 A	315 A	400 A	500 A	630 A	800 A	1000 A	1250 A	1600 A
			Price													
ETU10	**SB**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU10	**MB**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU10	**LB**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU12	**SL**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU12	**ML**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU12	**SF**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU12	**MF**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU20	**SE**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU20	**ME**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU20	**LE**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU22	**SG**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU22	**MG**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU42	**UL**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU42	**UM**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU22	**SH**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU22	**MH**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
ETU40	**UH**	N		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		H		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓
		L		✓	✓	✓	✓	✓	✓	✓	--	✓	✓	✓	✓	✓

✓ Available

-- Not available

[1] **The basic price is reduced when the molded case circuit breaker is ordered with a flat screw terminal ".36-".**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Article No. supplement (for complete Article No., see pages 2/142 to 2/159) **3VL.7 ..-.□□3.-....** Trip unit		Breaking capacity	Type **VL160**[1] 3VL2			**VL250**[1] 3VL3		**VL400** 3VL4		**VL630** 3VL5		**VL800** 3VL6	**VL1250** 3VL7		**VL1600** 3VL8
			Rated current I_n												
			63 A	100 A	160 A	200 A	250 A	315 A	400 A	500 A	630 A	800 A	1000 A	1250 A	1600 A
			Price												
ETU10M	**SP**	N	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		H	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		L	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
ETU10M	**MP**	N	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		H	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		L	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
ETU30M	**SS**	N	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		H	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		L	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
ETU30M	**MS**	N	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		H	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		L	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
ETU30M	**LS**	N	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		H	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		L	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
ETU40M	**UP**	N	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		H	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--
		L	✓	✓	✓	✓	✓	✓	--	✓	--	--	--	--	--

✓ Available

-- Not available

[1] **The basic price is reduced when the molded case circuit breaker is ordered with a flat screw terminal ".36-".**

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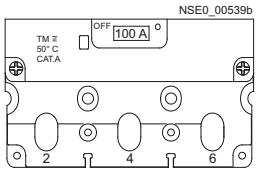
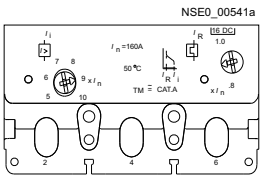
Selection and ordering data

Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "L" I_R	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
4-pole, fixed-mounted, for line protection, 16 A to 630 A, thermal-magnetic overload releases LI									
 NSE0_00695  NSE0_00539b									
Line protection, TM, LI function									
With fixed thermal overcurrent releases, fixed short-circuit releases without overcurrent or short-circuit protection in the 4th pole (N)									
VL160X/3VL1	16	16	300		**3VL1796-1EH4□-□□□□**		1	1 unit	1CC
	20	20	300		**3VL1702-1EH4□-□□□□**		1	1 unit	1CC
	25	25	300		**3VL1725-1EH4□-□□□□**		1	1 unit	1CC
	32	32	300		**3VL1703-1EH4□-□□□□**		1	1 unit	1CC
	40	40	600		**3VL1704-1EH4□-□□□□**		1	1 unit	1CC
	50	50	600		**3VL1705-1EH4□-□□□□**		1	1 unit	1CC
	63	63	600		**3VL1706-1EH4□-□□□□**		1	1 unit	1CC
	80	80	1000		**3VL1708-1EH4□-□□□□**		1	1 unit	1CC
	100	100	1000		**3VL1710-1EH4□-□□□□**		1	1 unit	1CC
	125	125	1000		**3VL1712-1EH4□-□□□□**		1	1 unit	1CC
	160	160	1500		**3VL1716-1EH4□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with screw terminal not in conjunction with RCD module[1]					**6**				
 NSE0_00704  NSE0_00541a									
Line protection, TM, LI function									
With adjustable thermal overcurrent releases, adjustable short-circuit releases without overcurrent or short-circuit protection in the 4th pole (N)									
VL160/3VL2	50	40 ... 50	300 ... 600		**3VL2705-1EJ4□-□□□□**		1	1 unit	1CC
	63	50 ... 63	300 ... 600		**3VL2706-1EJ4□-□□□□**		1	1 unit	1CC
	80	63 ... 80	400 ... 800		**3VL2708-1EJ4□-□□□□**		1	1 unit	1CC
	100	80 ... 100	500 ... 1000		**3VL2710-1EJ4□-□□□□**		1	1 unit	1CC
	125	100 ... 125	625 ... 1250		**3VL2712-1EJ4□-□□□□**		1	1 unit	1CC
	160	125 ... 160	800 ... 1600		**3VL2716-1EJ4□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	160 ... 200	1000 ... 2000		**3VL3720-1EJ4□-□□□□**		1	1 unit	1CC
	250	200 ... 250	1250 ... 2500		**3VL3725-1EJ4□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with flat screw terminal[1]					**6**				
VL400/3VL4	200	160 ... 200	1000 ... 2000		**3VL4720-1EJ46-□□□□**		1	1 unit	1CC
	250	200 ... 250	1250 ... 2500		**3VL4725-1EJ46-□□□□**		1	1 unit	1CC
	315	250 ... 315	1575 ... 3150		**3VL4731-1EJ46-□□□□**		1	1 unit	1CC
	400	320 ... 400	2000 ... 4000		**3VL4740-1EJ46-□□□□**		1	1 unit	1CC
VL630/3VL5	315	250 ... 315	1575 ... 3150		**3VL5731-1EJ46-□□□□**		1	1 unit	1CC
	400	320 ... 400	2000 ... 4000		**3VL5740-1EJ46-□□□□**		1	1 unit	1CC
	500	400 ... 500	2500 ... 5000		**3VL5750-1EJ46-□□□□**		1	1 unit	1CC
	630	500 ... 630	3150 ... 6300		**3VL5763-1EJ46-□□□□**		1	1 unit	1CC

[1] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL1796-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1702-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1725-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1703-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1704-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1705-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1706-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1708-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1710-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1712-2EH4□-□□□□		1	1 unit	1CC		--				
	3VL1716-2EH4□-□□□□		1	1 unit	1CC		--				
	3 6										
	3VL2705-2EJ4□-□□□□		1	1 unit	1CC		**3VL2705-3EJ4□-□□□□**		1	1 unit	1CC
	3VL2706-2EJ4□-□□□□		1	1 unit	1CC		**3VL2706-3EJ4□-□□□□**		1	1 unit	1CC
	3VL2708-2EJ4□-□□□□		1	1 unit	1CC		**3VL2708-3EJ4□-□□□□**		1	1 unit	1CC
	3VL2710-2EJ4□-□□□□		1	1 unit	1CC		**3VL2710-3EJ4□-□□□□**		1	1 unit	1CC
	3VL2712-2EJ4□-□□□□		1	1 unit	1CC		**3VL2712-3EJ4□-□□□□**		1	1 unit	1CC
	3VL2716-2EJ4□-□□□□		1	1 unit	1CC		**3VL2716-3EJ4□-□□□□**		1	1 unit	1CC
	3VL3720-2EJ4□-□□□□		1	1 unit	1CC		**3VL3720-3EJ4□-□□□□**		1	1 unit	1CC
	3VL3725-2EJ4□-□□□□		1	1 unit	1CC		**3VL3725-3EJ4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4720-2EJ46-□□□□		1	1 unit	1CC		**3VL4720-3EJ46-□□□□**		1	1 unit	1CC
	3VL4725-2EJ46-□□□□		1	1 unit	1CC		**3VL4725-3EJ46-□□□□**		1	1 unit	1CC
	3VL4731-2EJ46-□□□□		1	1 unit	1CC		**3VL4731-3EJ46-□□□□**		1	1 unit	1CC
	3VL4740-2EJ46-□□□□		1	1 unit	1CC		**3VL4740-3EJ46-□□□□**		1	1 unit	1CC
	3VL5731-2EJ46-□□□□		1	1 unit	1CC		**3VL5731-3EJ46-□□□□**		1	1 unit	1CC
	3VL5740-2EJ46-□□□□		1	1 unit	1CC		**3VL5740-3EJ46-□□□□**		1	1 unit	1CC
	3VL5750-2EJ46-□□□□		1	1 unit	1CC		**3VL5750-3EJ46-□□□□**		1	1 unit	1CC
	3VL5763-2EJ46-□□□□		1	1 unit	1CC		**3VL5763-3EJ46-□□□□**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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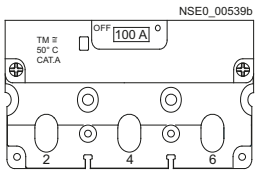
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "L" I_R	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N See "Overview".				
					Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
4-pole, fixed-mounted, for line protection, 16 A to 160 A, thermal-magnetic overcurrent releases LIN									





Line protection, TM, LIN function

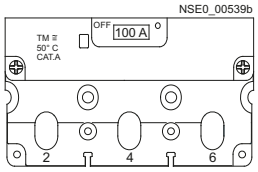
With fixed thermal overcurrent releases, fixed short-circuit releases with "N" overcurrent and short-circuit release
N protection = 100%

VL160X/3VL1	16	16	300	**3VL1796-1EA4□-□□□□**	1	1 unit	1CC
	20	20	300	**3VL1702-1EA4□-□□□□**	1	1 unit	1CC
	25	25	300	**3VL1725-1EA4□-□□□□**	1	1 unit	1CC
	32	32	300	**3VL1703-1EA4□-□□□□**	1	1 unit	1CC
	40	40	600	**3VL1704-1EA4□-□□□□**	1	1 unit	1CC
	50	50	600	**3VL1705-1EA4□-□□□□**	1	1 unit	1CC
	63	63	600	**3VL1706-1EA4□-□□□□**	1	1 unit	1CC
	80	80	1000	**3VL1708-1EA4□-□□□□**	1	1 unit	1CC
	100	100	1000	**3VL1710-1EA4□-□□□□**	1	1 unit	1CC
	125	125	1000	**3VL1712-1EL4□-□□□□**	1	1 unit	1CC
	160	160	1500	**3VL1716-1EL4□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with screw terminal not in conjunction with RCD module[1)]	**6**





Line protection, TM, LIN function

With fixed thermal overcurrent releases, fixed short-circuit releases with "N" overcurrent and short-circuit release
N protection = 60%

VL160X/3VL1	125	125	1000	**3VL1712-1EA4□-□□□□**	1	1 unit	1CC
	160	160	1500	**3VL1716-1EA4□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with screw terminal not in conjunction with RCD module[1)]	**6**

1) When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL1796-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1702-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1725-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1703-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1704-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1705-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1706-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1708-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1710-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1712-2EL4□-□□□□		1	1 unit	1CC		--				
	3VL1716-2EL4□-□□□□		1	1 unit	1CC		--				
	3 **6**										

	3VL1712-2EA4□-□□□□		1	1 unit	1CC		--				
	3VL1716-2EA4□-□□□□		1	1 unit	1CC		--				
	3 **6**										

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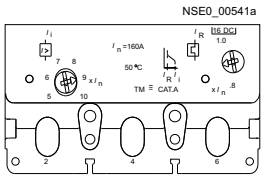
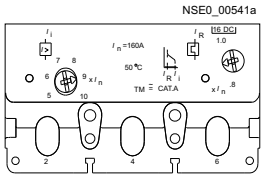
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "L" I_R	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N See "Overview".				(N)
					Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
4-pole, fixed-mounted, for line protection, 16 A to 630 A, thermal-magnetic overcurrent releases LIN									
 NSE0_00691									
 NSE0_00541a									
Line protection, TM, LIN function									
With adjustable thermal overcurrent releases, adjustable short-circuit releases, with "N"overcurrent and short-circuit release N protection = 100%									
VL160/3VL2	50	40 ... 50	300 ... 600		**3VL2705-1EM4□-□□□□**		1	1 unit	1CC
	63	50 ... 63	300 ... 600		**3VL2706-1EM4□-□□□□**		1	1 unit	1CC
	80	63 ... 80	400 ... 800		**3VL2708-1EM4□-□□□□**		1	1 unit	1CC
	100	80 ... 100	500 ... 1000		**3VL2710-1EM4□-□□□□**		1	1 unit	1CC
	125	100 ... 125	625 ... 1250		**3VL2712-1EM4□-□□□□**		1	1 unit	1CC
	160	125 ... 160	800 ... 1600		**3VL2716-1EM4□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	160 ... 200	1000 ... 2000		**3VL3720-1EM4□-□□□□**		1	1 unit	1CC
	250	200 ... 250	1250 ... 2500		**3VL3725-1EM4□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with flat screw terminal[1)]					**6**				
VL400/3VL4	200	160 ... 200	1000 ... 2000		**3VL4720-1EM46-□□□□**		1	1 unit	1CC
	250	200 ... 250	1250 ... 2500		**3VL4725-1EM46-□□□□**		1	1 unit	1CC
	315	250 ... 315	1575 ... 3150		**3VL4731-1EM46-□□□□**		1	1 unit	1CC
	400	320 ... 400	2000 ... 4000		**3VL4740-1EM46-□□□□**		1	1 unit	1CC
VL630/3VL5	315	250 ... 315	1575 ... 3150		**3VL5731-1EM46-□□□□**		1	1 unit	1CC
	400	320 ... 400	2000 ... 4000		**3VL5740-1EM46-□□□□**		1	1 unit	1CC
	500	400 ... 500	2500 ... 5000		**3VL5750-1EM46-□□□□**		1	1 unit	1CC
	630	500 ... 630	3150 ... 6300		**3VL5763-1EM46-□□□□**		1	1 unit	1CC
 NSE0_00691									
 NSE0_00541a									
Line protection, TM, LIN function									
With adjustable thermal overcurrent releases, adjustable short-circuit releases, with "N"overcurrent and short-circuit release N protection = 60%									
VL160/3VL2	125	100 ... 125	625 ... 1250		**3VL2712-1EC4□-□□□□**		1	1 unit	1CC
	160	125 ... 160	800 ... 1600		**3VL2716-1EC4□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	160 ... 200	1000 ... 2000		**3VL3720-1EC4□-□□□□**		1	1 unit	1CC
	250	200 ... 250	1250 ... 2500		**3VL3725-1EC4□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with flat screw terminal[1)]					**6**				
VL400/3VL4	200	160 ... 200	1000 ... 2000		**3VL4720-1EC46-□□□□**		1	1 unit	1CC
	250	200 ... 250	1250 ... 2500		**3VL4725-1EC46-□□□□**		1	1 unit	1CC
	315	250 ... 315	1575 ... 3150		**3VL4731-1EC46-□□□□**		1	1 unit	1CC
	400	320 ... 400	2000 ... 4000		**3VL4740-1EC46-□□□□**		1	1 unit	1CC
VL630/3VL5	315	250 ... 315	1575 ... 3150		**3VL5731-1EC46-□□□□**		1	1 unit	1CC
	400	320 ... 400	2000 ... 4000		**3VL5740-1EC46-□□□□**		1	1 unit	1CC
	500	400 ... 500	2500 ... 5000		**3VL5750-1EC46-□□□□**		1	1 unit	1CC
	630	500 ... 630	3150 ... 6300		**3VL5763-1EC46-□□□□**		1	1 unit	1CC

[1)] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2705-2EM4□-□□□□		1	1 unit	1CC		**3VL2705-3EM4□-□□□□**		1	1 unit	1CC
	3VL2706-2EM4□-□□□□		1	1 unit	1CC		**3VL2706-3EM4□-□□□□**		1	1 unit	1CC
	3VL2708-2EM4□-□□□□		1	1 unit	1CC		**3VL2708-3EM4□-□□□□**		1	1 unit	1CC
	3VL2710-2EM4□-□□□□		1	1 unit	1CC		**3VL2710-3EM4□-□□□□**		1	1 unit	1CC
	3VL2712-2EM4□-□□□□		1	1 unit	1CC		**3VL2712-3EM4□-□□□□**		1	1 unit	1CC
	3VL2716-2EM4□-□□□□		1	1 unit	1CC		**3VL2716-3EM4□-□□□□**		1	1 unit	1CC
	3VL3720-2EM4□-□□□□		1	1 unit	1CC		**3VL3720-3EM4□-□□□□**		1	1 unit	1CC
	3VL3725-2EM4□-□□□□		1	1 unit	1CC		**3VL3725-3EM4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4720-2EM46-□□□□		1	1 unit	1CC		**3VL4720-3EM46-□□□□**		1	1 unit	1CC
	3VL4725-2EM46-□□□□		1	1 unit	1CC		**3VL4725-3EM46-□□□□**		1	1 unit	1CC
	3VL4731-2EM46-□□□□		1	1 unit	1CC		**3VL4731-3EM46-□□□□**		1	1 unit	1CC
	3VL4740-2EM46-□□□□		1	1 unit	1CC		**3VL4740-3EM46-□□□□**		1	1 unit	1CC
	3VL5731-2EM46-□□□□		1	1 unit	1CC		**3VL5731-3EM46-□□□□**		1	1 unit	1CC
	3VL5740-2EM46-□□□□		1	1 unit	1CC		**3VL5740-3EM46-□□□□**		1	1 unit	1CC
	3VL5750-2EM46-□□□□		1	1 unit	1CC		**3VL5750-3EM46-□□□□**		1	1 unit	1CC
	3VL5763-2EM46-□□□□		1	1 unit	1CC		**3VL5763-3EM46-□□□□**		1	1 unit	1CC
	3VL2712-2EC4□-□□□□		1	1 unit	1CC		**3VL2712-3EC4□-□□□□**		1	1 unit	1CC
	3VL2716-2EC4□-□□□□		1	1 unit	1CC		**3VL2716-3EC4□-□□□□**		1	1 unit	1CC
	3VL3720-2EC4□-□□□□		1	1 unit	1CC		**3VL3720-3EC4□-□□□□**		1	1 unit	1CC
	3VL3725-2EC4□-□□□□		1	1 unit	1CC		**3VL3725-3EC4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4720-2EC46-□□□□		1	1 unit	1CC		**3VL4720-3EC46-□□□□**		1	1 unit	1CC
	3VL4725-2EC46-□□□□		1	1 unit	1CC		**3VL4725-3EC46-□□□□**		1	1 unit	1CC
	3VL4731-2EC46-□□□□		1	1 unit	1CC		**3VL4731-3EC46-□□□□**		1	1 unit	1CC
	3VL4740-2EC46-□□□□		1	1 unit	1CC		**3VL4740-3EC46-□□□□**		1	1 unit	1CC
	3VL5731-2EC46-□□□□		1	1 unit	1CC		**3VL5731-3EC46-□□□□**		1	1 unit	1CC
	3VL5740-2EC46-□□□□		1	1 unit	1CC		**3VL5740-3EC46-□□□□**		1	1 unit	1CC
	3VL5750-2EC46-□□□□		1	1 unit	1CC		**3VL5750-3EC46-□□□□**		1	1 unit	1CC
	3VL5763-2EC46-□□□□		1	1 unit	1CC		**3VL5763-3EC46-□□□□**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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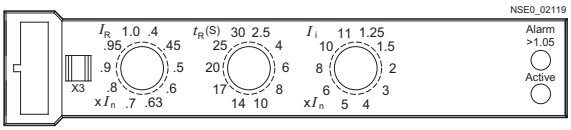
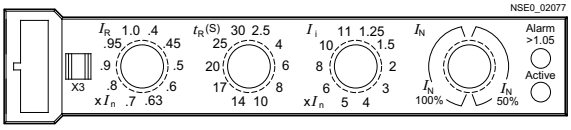
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview".				(N)
					Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
4-pole, fixed-mounted, for line protection, 63 A to 1600 A, Electronic Trip Units LI									
 NSE0_00691									
 NSE0_02119									
ETU10, LI function									
With adjustable overcurrent releases, adjustable short-circuit releases without overcurrent and short-circuit release in the 4th pole (N)									
VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n		**3VL2706-1□□4□-□□□□**		1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n		**3VL2710-1□□4□-□□□□**		1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n		**3VL2716-1□□4□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n		**3VL3720-1□□4□-□□□□**		1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n		**3VL3725-1□□4□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with flat screw terminal[1]					**6**				
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n		**3VL4731-1□□46-□□□□**		1	1 unit	1CC
	400	160 ... 400	1.25 ... 11 × I_n		**3VL4740-1□□46-□□□□**		1	1 unit	1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n		**3VL5763-1□□46-□□□□**		1	1 unit	1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n		**3VL6780-1□□46-□□□□**		1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n		**3VL7710-1□□46-□□□□**		1	1 unit	1CC
	1250	500 ... 1250	1.25 ... 11 × I_n		**3VL7712-1□□46-□□□□**		1	1 unit	1CC
VL1600/3VL8[2]	1600	640 ... 1600	1.25 ... 9 × I_n		**3VL8716-1□□40-□□□□**		1	1 unit	1CC
• Without communication preparation					**TB**				
• With communication preparation					**NB**				
4-pole, fixed-mounted, for line protection, 63 A to 1600 A, Electronic Trip Units LIN									
 NSE0_00691									
 NSE0_02077									
ETU10, LIN function									
With adjustable overcurrent releases, adjustable short-circuit releases with overcurrent or short-circuit release in the 4th pole (N) N protection = 50/100%									
VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n		**3VL2706-1□□4□-□□□□**		1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n		**3VL2710-1□□4□-□□□□**		1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n		**3VL2716-1□□4□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n		**3VL3720-1□□4□-□□□□**		1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n		**3VL3725-1□□4□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.									
• Connection with box terminal					**3**				
• Connection with flat screw terminal[1]					**6**[1]				
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n		**3VL4731-1□□46-□□□□**		1	1 unit	1CC
	400	160 ... 400	1.25 ... 11 × I_n		**3VL4740-1□□46-□□□□**		1	1 unit	1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n		**3VL5763-1□□46-□□□□**		1	1 unit	1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n		**3VL6780-1□□46-□□□□**		1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n		**3VL7710-1□□46-□□□□**		1	1 unit	1CC
	1250	500 ... 1250	1.25 ... 11 × I_n		**3VL7712-1□□46-□□□□**		1	1 unit	1CC
VL1600/3VL8[2]	1600	640 ... 1600	1.25 ... 9 × I_n		**3VL8716-1□□40-□□□□**		1	1 unit	1CC
• Without communication preparation					**TA**				
• With communication preparation					**NA**				
• Marine engineering-certified LRS, DNV, GL and BV (not communication-ready)					**LA**				

[1] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[2] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
d					d						
	3VL2706-2□□4□-□□□□		1	1 unit	1CC		**3VL2706-3□□4□-□□□□**		1	1 unit	1CC
	3VL2710-2□□4□-□□□□		1	1 unit	1CC		**3VL2710-3□□4□-□□□□**		1	1 unit	1CC
	3VL2716-2□□4□-□□□□		1	1 unit	1CC		**3VL2716-3□□4□-□□□□**		1	1 unit	1CC
	3VL3720-2□□4□-□□□□		1	1 unit	1CC		**3VL3720-3□□4□-□□□□**		1	1 unit	1CC
	3VL3725-2□□4□-□□□□		1	1 unit	1CC		**3VL3725-3□□4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□46-□□□□		1	1 unit	1CC		**3VL4731-3□□46-□□□□**		1	1 unit	1CC
	3VL4740-2□□46-□□□□		1	1 unit	1CC		**3VL4740-3□□46-□□□□**		1	1 unit	1CC
	3VL5763-2□□46-□□□□		1	1 unit	1CC		**3VL5763-3□□46-□□□□**		1	1 unit	1CC
	3VL6780-2□□46-□□□□		1	1 unit	1CC		**3VL6780-3□□46-□□□□**		1	1 unit	1CC
	3VL7710-2□□46-□□□□		1	1 unit	1CC		**3VL7710-3□□46-□□□□**		1	1 unit	1CC
	3VL7712-2□□46-□□□□		1	1 unit	1CC		**3VL7712-3□□46-□□□□**		1	1 unit	1CC
	3VL8716-2□□40-□□□□		1	1 unit	1CC		**3VL8716-3□□40-□□□□**		1	1 unit	1CC
	TB NB						**TB NB**				

SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
d					d						
	3VL2706-2□□4□-□□□□		1	1 unit	1CC		**3VL2706-3□□4□-□□□□**		1	1 unit	1CC
	3VL2710-2□□4□-□□□□		1	1 unit	1CC		**3VL2710-3□□4□-□□□□**		1	1 unit	1CC
	3VL2716-2□□4□-□□□□		1	1 unit	1CC		**3VL2716-3□□4□-□□□□**		1	1 unit	1CC
	3VL3720-2□□4□-□□□□		1	1 unit	1CC		**3VL3720-3□□4□-□□□□**		1	1 unit	1CC
	3VL3725-2□□4□-□□□□		1	1 unit	1CC		**3VL3725-3□□4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□46-□□□□		1	1 unit	1CC		**3VL4731-3□□46-□□□□**		1	1 unit	1CC
	3VL4740-2□□46-□□□□		1	1 unit	1CC		**3VL4740-3□□46-□□□□**		1	1 unit	1CC
	3VL5763-2□□46-□□□□		1	1 unit	1CC		**3VL5763-3□□46-□□□□**		1	1 unit	1CC
	3VL6780-2□□46-□□□□		1	1 unit	1CC		**3VL6780-3□□46-□□□□**		1	1 unit	1CC
	3VL7710-2□□46-□□□□		1	1 unit	1CC		**3VL7710-3□□46-□□□□**		1	1 unit	1CC
	3VL7712-2□□46-□□□□		1	1 unit	1CC		**3VL7712-3□□46-□□□□**		1	1 unit	1CC
	3VL8716-2□□40-□□□□		1	1 unit	1CC		**3VL8716-3□□40-□□□□**		1	1 unit	1CC
	TA NA LA						**TA NA LA**				

Communication:
- Accessories see page 2/221.

- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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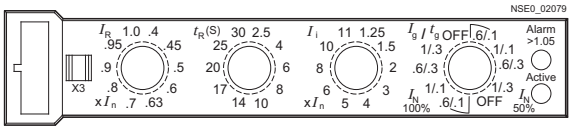
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "L" I_R	Operating current of the instantaneous short-circuit protection "I" I_i	Ground-fault protection "G" I_g	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N See "Overview".		PU (UNIT, SET, M)	PS	PG
						Article No.	Price, see page 2/184			
						Article No. supplement, see page 2/186; www.siemens.com/product?Article No.				
	A	A	A	A	d					

4-pole, fixed-mounted, for line protection, 63 A to 1600 A, Electronic Trip Units LING



NSE0_00693



ETU12, LING function for 4-wire three-phase systems

With adjustable overcurrent releases, adjustable short-circuit releases
vectorial summation current formation, ground-fault delay t_g = 0.1 ... 0.3 s, ground fault function (G) can be switched off
with overcurrent and short-circuit protection in the 4th pole (N), N protection = 50/100%

VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL2706-1□□4□-□□□□**	1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL2710-1□□4□-□□□□**	1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL2716-1□□4□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL3720-1□□4□-□□□□**	1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL3725-1□□4□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal[1)]	**6**

VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL4731-1□□46-□□□□**	1	1 unit	1CC
	400	160 ... 400	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL4740-1□□46-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n	0.6 ... 1 × I_n, OFF	**3VL5763-1□□46-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n	0.6 ... 1 × I_n, OFF	**3VL6780-1□□46-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL7710-1□□46-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	1.25 ... 11 × I_n	0.6 ... 1 × I_n, OFF	**3VL7712-1□□46-□□□□**	1	1 unit	1CC
VL1600/3VL8[2)]	1600	640 ... 1600	1.25 ... 9 × I_n	0.6 ... 1 × I_n, OFF	**3VL8716-1□□40-□□□□**	1	1 unit	1CC

• Without communication preparation	**TN**
• With communication preparation	**NN**

1) When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.

2) Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2706-2□□4□-□□□□		1	1 unit	1CC		**3VL2706-3□□4□-□□□□**		1	1 unit	1CC
	3VL2710-2□□4□-□□□□		1	1 unit	1CC		**3VL2710-3□□4□-□□□□**		1	1 unit	1CC
	3VL2716-2□□4□-□□□□		1	1 unit	1CC		**3VL2716-3□□4□-□□□□**		1	1 unit	1CC
	3VL3720-2□□4□-□□□□		1	1 unit	1CC		**3VL3720-3□□4□-□□□□**		1	1 unit	1CC
	3VL3725-2□□4□-□□□□		1	1 unit	1CC		**3VL3725-3□□4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□46-□□□□		1	1 unit	1CC		**3VL4731-3□□46-□□□□**		1	1 unit	1CC
	3VL4740-2□□46-□□□□		1	1 unit	1CC		**3VL4740-3□□46-□□□□**		1	1 unit	1CC
	3VL5763-2□□46-□□□□		1	1 unit	1CC		**3VL5763-3□□46-□□□□**		1	1 unit	1CC
	3VL6780-2□□46-□□□□		1	1 unit	1CC		**3VL6780-3□□46-□□□□**		1	1 unit	1CC
	3VL7710-2□□46-□□□□		1	1 unit	1CC		**3VL7710-3□□46-□□□□**		1	1 unit	1CC
	3VL7712-2□□46-□□□□		1	1 unit	1CC		**3VL7712-3□□46-□□□□**		1	1 unit	1CC
	3VL8716-2□□40-□□□□		1	1 unit	1CC		**3VL8716-3□□40-□□□□**		1	1 unit	1CC
	TN NN						**TN NN**				

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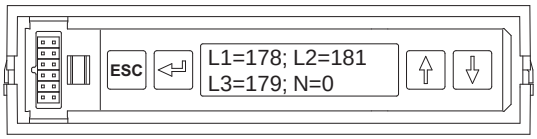
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	SD	**I_{cu} up to 55 kA at 415 V, standard breaking capacity N** See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	A	d					
4-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LI, LSI, LIN, LSIN										
 NSE0_00696										
 NSE0_02129										
LCD-ETU40, LI/LSI/LIN/LSIN function selectable										
With adjustable overcurrent releases, adjustable short-circuit releases short-circuit delay t_{sd} = 0 ... 0.5 s with overcurrent or short-circuit releases in the 4th pole (N) N protection = 50 ... 100%, OFF										
VL160/3VL2	63[1]	25 ... 63	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL2706-1UJ4□-□□□□**		1	1 unit	1CC
	100[1]	40 ... 100	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL2710-1UJ4□-□□□□**		1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL2716-1UJ4□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL3720-1UJ4□-□□□□**		1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL3725-1UJ4□-□□□□**		1	1 unit	1CC
	Connection type can be selected by assignment of the 12th position of the Article No.									
	• Connection with box terminal					**3**				
	• Connection with flat screw terminal[2]					**6**				
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL4731-1UJ46-□□□□**		1	1 unit	1CC
	400	160 ... 400	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL4740-1UJ46-□□□□**		1	1 unit	1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n	1.5 ... 9 × I_R		**3VL5763-1UJ46-□□□□**		1	1 unit	1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n	1.5 ... 7 × I_R		**3VL6780-1UJ46-□□□□**		1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL7710-1UJ46-□□□□**		1	1 unit	1CC
	1250	500 ... 1250	1.25 ... 11 × I_n	1.5 ... 10 × I_R		**3VL7712-1UJ46-□□□□**		1	1 unit	1CC
VL1600/3VL8[3]	1600	640 ... 1600	1.25 ... 9 × I_n	1.5 ... 8 × I_R		**3VL8716-1UJ40-□□□□**		1	1 unit	1CC

[1] N = 100% protection for $I_n \leq 100$ A.

[2] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[3] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2706-2UJ4□-□□□□		1	1 unit	1CC		**3VL2706-3UJ4□-□□□□**		1	1 unit	1CC
	3VL2710-2UJ4□-□□□□		1	1 unit	1CC		**3VL2710-3UJ4□-□□□□**		1	1 unit	1CC
	3VL2716-2UJ4□-□□□□		1	1 unit	1CC		**3VL2716-3UJ4□-□□□□**		1	1 unit	1CC
	3VL3720-2UJ4□-□□□□		1	1 unit	1CC		**3VL3720-3UJ4□-□□□□**		1	1 unit	1CC
	3VL3725-2UJ4□-□□□□		1	1 unit	1CC		**3VL3725-3UJ4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2UJ46-□□□□		1	1 unit	1CC		**3VL4731-3UJ46-□□□□**		1	1 unit	1CC
	3VL4740-2UJ46-□□□□		1	1 unit	1CC		**3VL4740-3UJ46-□□□□**		1	1 unit	1CC
	3VL5763-2UJ46-□□□□		1	1 unit	1CC		**3VL5763-3UJ46-□□□□**		1	1 unit	1CC
	3VL6780-2UJ46-□□□□		1	1 unit	1CC		**3VL6780-3UJ46-□□□□**		1	1 unit	1CC
	3VL7710-2UJ46-□□□□		1	1 unit	1CC		**3VL7710-3UJ46-□□□□**		1	1 unit	1CC
	3VL7712-2UJ46-□□□□		1	1 unit	1CC		**3VL7712-3UJ46-□□□□**		1	1 unit	1CC
	3VL8716-2UJ40-□□□□		1	1 unit	1CC		**3VL8716-3UJ40-□□□□**		1	1 unit	1CC

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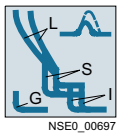
4-pole

4-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSIG, LSING



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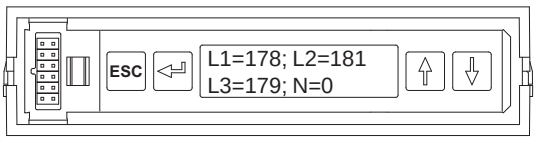

NSE0_02129

LCD-ETU42, LSIG/LSING function for 4-wire three-phase systems and time-based discrimination

With adjustable overcurrent releases, adjustable short-circuit releases
ground-fault delay t_g = 0.1 ... 0.5 s, short-circuit delay t_{sd} = 0 ... 0.5 s
with overcurrent or short-circuit releases in the 4th pole (N), N protection = 50 ... 100%, OFF

Type	Rated current I_n A	Current setting of the inverse-time delayed overcurrent protection "L" I_R A	Operating current of the instantaneous short-circuit protection "I" I_i A	S function, short-circuit protection (short-time delayed) S A	Ground-fault protection "G" I_g A	SD d	I_{cu} up to 55 kA at 415 V, standard breaking capacity N (N) Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
VL160/3VL2	63	25 ... 63	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL2706-1UN4□-□□□□**		1	1 unit	1CC
	100	40 ... 100	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL2710-1UN4□-□□□□**		1	1 unit	1CC
	160	64 ... 160	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL2716-1UN4□-□□□□**		1	1 unit	1CC
VL250/3VL3	200	80 ... 200	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL3720-1UN4□-□□□□**		1	1 unit	1CC
	250	100 ... 250	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL3725-1UN4□-□□□□**		1	1 unit	1CC
		Connection type can be selected by assignment of the 12th position of the Article No.									
		• Connection with box terminal					**3**				
		• Connection with flat screw terminal[1]					**6**				
VL400/3VL4	315	128 ... 315	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL4731-1UN46-□□□□**		1	1 unit	1CC
	400	160 ... 400	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL4740-1UN46-□□□□**		1	1 unit	1CC
VL630/3VL5	630	252 ... 630	1.25 ... 10 × I_n	1.5 ... 9 × I_R	0.4 ... 1 × I_n		**3VL5763-1UN46-□□□□**		1	1 unit	1CC
VL800/3VL6	800	320 ... 800	1.25 ... 8 × I_n	1.5 ... 7 × I_R	0.4 ... 1 × I_n		**3VL6780-1UN46-□□□□**		1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL7710-1UN46-□□□□**		1	1 unit	1CC
	1250	500 ... 1250	1.25 ... 11 × I_n	1.5 ... 10 × I_R	0.4 ... 1 × I_n		**3VL7712-1UN46-□□□□**		1	1 unit	1CC
VL1600/3VL8[2]	1600	640 ... 1600	1.25 ... 9 × I_n	1.5 ... 8 × I_R	0.4 ... 1 × I_n		**3VL8716-1UN40-□□□□**		1	1 unit	1CC

[1] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[2] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2706-2UN4□-□□□□		1	1 unit	1CC		**3VL2706-3UN4□-□□□□**		1	1 unit	1CC
	3VL2710-2UN4□-□□□□		1	1 unit	1CC		**3VL2710-3UN4□-□□□□**		1	1 unit	1CC
	3VL2716-2UN4□-□□□□		1	1 unit	1CC		**3VL2716-3UN4□-□□□□**		1	1 unit	1CC
	3VL3720-2UN4□-□□□□		1	1 unit	1CC		**3VL3720-3UN4□-□□□□**		1	1 unit	1CC
	3VL3725-2UN4□-□□□□		1	1 unit	1CC		**3VL3725-3UN4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2UN46-□□□□		1	1 unit	1CC		**3VL4731-3UN46-□□□□**		1	1 unit	1CC
	3VL4740-2UN46-□□□□		1	1 unit	1CC		**3VL4740-3UN46-□□□□**		1	1 unit	1CC
	3VL5763-2UN46-□□□□		1	1 unit	1CC		**3VL5763-3UN46-□□□□**		1	1 unit	1CC
	3VL6780-2UN46-□□□□		1	1 unit	1CC		**3VL6780-3UN46-□□□□**		1	1 unit	1CC
	3VL7710-2UN46-□□□□		1	1 unit	1CC		**3VL7710-3UN46-□□□□**		1	1 unit	1CC
	3VL7712-2UN46-□□□□		1	1 unit	1CC		**3VL7712-3UN46-□□□□**		1	1 unit	1CC
	3VL8716-2UN40-□□□□		1	1 unit	1CC		**3VL8716-3UN40-□□□□**		1	1 unit	1CC

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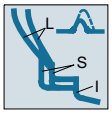
Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	SD	I_{cu} up to 55 kA at 415 V, **standard breaking capacity N** See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
	A	A	A	A	d					

4-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSI



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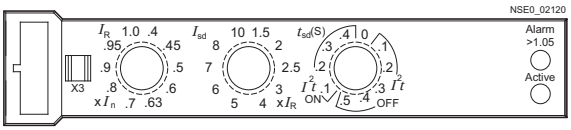


ETU20, LSI function for time-based discrimination

With adjustable overcurrent releases, fixed short-circuit releases, short-circuit delay (t_{sd} = 0 ... 0.5 s)
Without overcurrent and short-circuit release in the 4th pole (N)

VL160/3VL2	63	25 ... 63	11 × I_n	1.5 ... 10 × I_R	**3VL2706-1□□4□-□□□□**	1	1 unit	1CC
	100	40 ... 100	11 × I_n	1.5 ... 10 × I_R	**3VL2710-1□□4□-□□□□**	1	1 unit	1CC
	160	64 ... 160	11 × I_n	1.5 ... 10 × I_R	**3VL2716-1□□4□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	11 × I_n	1.5 ... 10 × I_R	**3VL3720-1□□4□-□□□□**	1	1 unit	1CC
	250	100 ... 250	11 × I_n	1.5 ... 10 × I_R	**3VL3725-1□□4□-□□□□**	1	1 unit	1CC

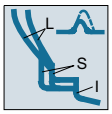
Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal[1]	**6**

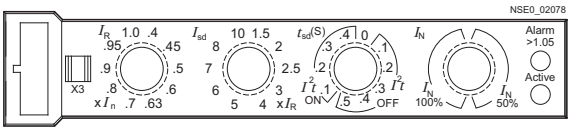
VL400/3VL4	315	128 ... 315	11 × I_n	1.5 ... 10 × I_R	**3VL4731-1□□46-□□□□**	1	1 unit	1CC
	400	160 ... 400	11 × I_n	1.5 ... 10 × I_R	**3VL4740-1□□46-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	10 × I_n	1.5 ... 9 × I_R	**3VL5763-1□□46-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	8 × I_n	1.5 ... 7 × I_R	**3VL6780-1□□46-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	11 × I_n	1.5 ... 10 × I_R	**3VL7710-1□□46-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	11 × I_n	1.5 ... 10 × I_R	**3VL7712-1□□46-□□□□**	1	1 unit	1CC
VL1600/3VL8[1]	1600	640 ... 1600	9 × I_n	1.5 ... 8 × I_R	**3VL8716-1□□40-□□□□**	1	1 unit	1CC

• Without communication preparation	**TE**
• With communication preparation	**NE**

4-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSIN



NSE0_00692



ETU20, LSIN function for time-based discrimination

With adjustable overcurrent releases, fixed short-circuit releases, short-circuit delay (t_{sd} = 0 ... 0.5 s)
with overcurrent or short-circuit releases in the 4th pole (N), N protection = 50/100%

VL160/3VL2	63	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL2706-1□□4□-□□□□**	1	1 unit	1CC
	100	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL2710-1□□4□-□□□□**	1	1 unit	1CC
	160	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL2716-1□□4□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL3720-1□□4□-□□□□**	1	1 unit	1CC
	250	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL3725-1□□4□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal[1]	**6**

VL400/3VL4	315	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL4731-1□□46-□□□□**	1	1 unit	1CC
	400	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL4740-1□□46-□□□□**	1	1 unit	1CC
VL630/3VL5	630	0.4 ... 1.0 × I_n	10 × I_n	1.5 ... 9 × I_R	**3VL5763-1□□46-□□□□**	1	1 unit	1CC
VL800/3VL6	800	0.4 ... 1.0 × I_n	8 × I_n	1.5 ... 7 × I_R	**3VL6780-1□□46-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL7710-1□□46-□□□□**	1	1 unit	1CC
	1250	0.4 ... 1.0 × I_n	11 × I_n	1.5 ... 10 × I_R	**3VL7712-1□□46-□□□□**	1	1 unit	1CC
VL1600/3VL8[2]	1600	0.4 ... 1.0 × I_n	9 × I_n	1.5 ... 8 × I_R	**3VL8716-1□□40-□□□□**	1	1 unit	1CC

• Without communication preparation	**TF**
• With communication preparation	**NF**
• Marine engineering-certified LRS, DNV, GL and BV (not communication-ready)	**LF**

[1] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[2] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Communication:
- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
d					d						
	3VL2706-2□□4□-□□□□		1	1 unit	1CC		**3VL2706-3□□4□-□□□□**		1	1 unit	1CC
	3VL2710-2□□4□-□□□□		1	1 unit	1CC		**3VL2710-3□□4□-□□□□**		1	1 unit	1CC
	3VL2716-2□□4□-□□□□		1	1 unit	1CC		**3VL2716-3□□4□-□□□□**		1	1 unit	1CC
	3VL3720-2□□4□-□□□□		1	1 unit	1CC		**3VL3720-3□□4□-□□□□**		1	1 unit	1CC
	3VL3725-2□□4□-□□□□		1	1 unit	1CC		**3VL3725-3□□4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□46-□□□□		1	1 unit	1CC		**3VL4731-3□□46-□□□□**		1	1 unit	1CC
	3VL4740-2□□46-□□□□		1	1 unit	1CC		**3VL4740-3□□46-□□□□**		1	1 unit	1CC
	3VL5763-2□□46-□□□□		1	1 unit	1CC		**3VL5763-3□□46-□□□□**		1	1 unit	1CC
	3VL6780-2□□46-□□□□		1	1 unit	1CC		**3VL6780-3□□46-□□□□**		1	1 unit	1CC
	3VL7710-2□□46-□□□□		1	1 unit	1CC		**3VL7710-3□□46-□□□□**		1	1 unit	1CC
	3VL7712-2□□46-□□□□		1	1 unit	1CC		**3VL7712-3□□46-□□□□**		1	1 unit	1CC
	3VL8716-2□□40-□□□□		1	1 unit	1CC		**3VL8716-3□□40-□□□□**		1	1 unit	1CC
	TE NE						**TE NE**				

SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG		Article No. Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
d					d						
	3VL2706-2□□4□-□□□□		1	1 unit	1CC		**3VL2706-3□□4□-□□□□**		1	1 unit	1CC
	3VL2710-2□□4□-□□□□		1	1 unit	1CC		**3VL2710-3□□4□-□□□□**		1	1 unit	1CC
	3VL2716-2□□4□-□□□□		1	1 unit	1CC		**3VL2716-3□□4□-□□□□**		1	1 unit	1CC
	3VL3720-2□□4□-□□□□		1	1 unit	1CC		**3VL3720-3□□4□-□□□□**		1	1 unit	1CC
	3VL3725-2□□4□-□□□□		1	1 unit	1CC		**3VL3725-3□□4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4731-2□□46-□□□□		1	1 unit	1CC		**3VL4731-3□□46-□□□□**		1	1 unit	1CC
	3VL4740-2□□46-□□□□		1	1 unit	1CC		**3VL4740-3□□46-□□□□**		1	1 unit	1CC
	3VL5763-2□□46-□□□□		1	1 unit	1CC		**3VL5763-3□□46-□□□□**		1	1 unit	1CC
	3VL6780-2□□46-□□□□		1	1 unit	1CC		**3VL6780-3□□46-□□□□**		1	1 unit	1CC
	3VL7710-2□□46-□□□□		1	1 unit	1CC		**3VL7710-3□□46-□□□□**		1	1 unit	1CC
	3VL7712-2□□46-□□□□		1	1 unit	1CC		**3VL7712-3□□46-□□□□**		1	1 unit	1CC
	3VL8716-2□□40-□□□□		1	1 unit	1CC		**3VL8716-3□□40-□□□□**		1	1 unit	1CC
	TF NF LF						**TF NF LF**				

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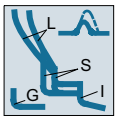
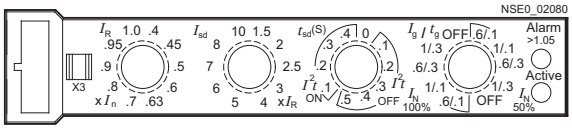
4-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overcurrent protection "**L**" I_R	Operating current of the instantaneous short-circuit protection "**I**" I_i	S function, short-circuit protection (short-time delayed) **S**	Ground-fault protection "**G**" I_g	SD	I_{cu} **up to 55 kA at 415 V, standard breaking capacity N** See "Overview".				(N)
							Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
							Article No. supplement, see page 2/186; www.siemens.com/product?Article No.				
	A	A	A	A	A	d					

4-pole, fixed-mounted, for line protection - generator protection, 63 A to 1600 A, Electronic Trip Units LSING



NSE0_00694



ETU22, LSIG function for 4-wire three-phase systems and time-based discrimination

With adjustable overcurrent releases, adjustable short-circuit releases
ground-fault delay t_g = 0.1 ... 0.3 s, ground fault function (G) can be switched off, short-circuit delay t_{sd} = 0 ... 0.5 s
with overcurrent or short-circuit releases in the 4th pole (N), N protection = 50/100%

VL160/3VL2	63	25 ... 63	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2706-1□□4□-□□□□**	1	1 unit	1CC
	100	40 ... 100	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2710-1□□4□-□□□□**	1	1 unit	1CC
	160	64 ... 160	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL2716-1□□4□-□□□□**	1	1 unit	1CC
VL250/3VL3	200	80 ... 200	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL3720-1□□4□-□□□□**	1	1 unit	1CC
	250	100 ... 250	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL3725-1□□4□-□□□□**	1	1 unit	1CC

Connection type can be selected by assignment of the 12th position of the Article No.

• Connection with box terminal	**3**
• Connection with flat screw terminal[1]	**6**

VL400/3VL4	315	128 ... 315	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL4731-1□□46-□□□□**	1	1 unit	1CC
	400	160 ... 400	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL4740-1□□46-□□□□**	1	1 unit	1CC
VL630/3VL5	630	252 ... 630	10 × I_n	1.5 ... 9 × I_R	0.6 ... 1 × I_n, OFF	**3VL5763-1□□46-□□□□**	1	1 unit	1CC
VL800/3VL6	800	320 ... 800	8 × I_n	1.5 ... 7 × I_R	0.6 ... 1 × I_n, OFF	**3VL6780-1□□46-□□□□**	1	1 unit	1CC
VL1250/3VL7	1000	400 ... 1000	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL7710-1□□46-□□□□**	1	1 unit	1CC
	1250	500 ... 1250	11 × I_n	1.5 ... 10 × I_R	0.6 ... 1 × I_n, OFF	**3VL7712-1□□46-□□□□**	1	1 unit	1CC
VL1600/3VL8[2]	1600	640 ... 1600	9 × I_n	1.5 ... 8 × I_R	0.6 ... 1 × I_n, OFF	**3VL8716-1□□40-□□□□**	1	1 unit	1CC

• Without communication preparation	**TH**
• With communication preparation	**NH**

[1] **When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.**

[2] Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Communication:

- For accessories, see page 2/221.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)				SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)			
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Price, see page 2/184	PU (UNIT, SET, M)	PS	PG
d					d					
	3VL2706-2□□4□-□□□□		1	1 unit	1CC	**3VL2706-3□□4□-□□□□**		1	1 unit	1CC
	3VL2710-2□□4□-□□□□		1	1 unit	1CC	**3VL2710-3□□4□-□□□□**		1	1 unit	1CC
	3VL2716-2□□4□-□□□□		1	1 unit	1CC	**3VL2716-3□□4□-□□□□**		1	1 unit	1CC
	3VL3720-2□□4□-□□□□		1	1 unit	1CC	**3VL3720-3□□4□-□□□□**		1	1 unit	1CC
	3VL3725-2□□4□-□□□□		1	1 unit	1CC	**3VL3725-3□□4□-□□□□**		1	1 unit	1CC
	3 6					**3 6**				
	3VL4731-2□□46-□□□□		1	1 unit	1CC	**3VL4731-3□□46-□□□□**		1	1 unit	1CC
	3VL4740-2□□46-□□□□		1	1 unit	1CC	**3VL4740-3□□46-□□□□**		1	1 unit	1CC
	3VL5763-2□□46-□□□□		1	1 unit	1CC	**3VL5763-3□□46-□□□□**		1	1 unit	1CC
	3VL6780-2□□46-□□□□		1	1 unit	1CC	**3VL6780-3□□46-□□□□**		1	1 unit	1CC
	3VL7710-2□□46-□□□□		1	1 unit	1CC	**3VL7710-3□□46-□□□□**		1	1 unit	1CC
	3VL7712-2□□46-□□□□		1	1 unit	1CC	**3VL7712-3□□46-□□□□**		1	1 unit	1CC
	3VL8716-2□□40-□□□□		1	1 unit	1CC	**3VL8716-3□□40-□□□□**		1	1 unit	1CC
	TH NH					**TH NH**				

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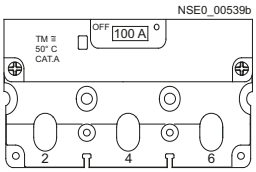
Type	Rated current I_n	Operating current of the instantaneous short-circuit protection "I" I_i	SD	I_{cu} up to 55 kA at 415 V, standard breaking capacity N See "Overview". Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	d					
4-pole, fixed-mounted, for safe disconnection, 100 A to 1600 A, magnetic release I								
 NSE0_00708								
 NSE0_00539b								
Non-automatic molded case circuit breakers[1], I function Without thermal overcurrent release, with fixed short-circuit release (for intrinsic protection only) without thermal overcurrent or short-circuit release in the 4th pole (N)								
VL160X/3VL1	100	1800		**3VL1710-1EE4□-□□□□**		1	1 unit	1CC
	160	1800		**3VL1716-1EE4□-□□□□**		1	1 unit	1CC
VL160/3VL2	100	2500		**3VL2710-1EE4□-□□□□**		1	1 unit	1CC
	160	2500		**3VL2716-1EE4□-□□□□**		1	1 unit	1CC
VL250/3VL3	250	3500		**3VL3725-1EE4□-□□□□**		1	1 unit	1CC
Connection type can be selected by assignment of the 12th position of the Article No.								
• Connection with box terminal				**3**				
• Connection with screw terminal not in conjunction with RCD module with 3VL1[2]				**6**				
VL400/3VL4	400	4000		**3VL4740-1EE46-□□□□**		1	1 unit	1CC
VL630/3VL5	630	6300		**3VL5763-1EE46-□□□□**		1	1 unit	1CC
VL800/3VL6	800	6500		**3VL6780-1EE46-□□□□**		1	1 unit	1CC
VL1250/3VL7	1250	12000		**3VL7712-1EE46-□□□□**		1	1 unit	1CC
VL1600/3VL8[3]	1600	14400		**3VL8716-1EE40-□□□□**		1	1 unit	1CC

1) See chapter "Switch Disconnectors". 3K. switch disconnectors are also available with rear-mounting operating mechanism and leading contacts.

2) When the circuit breaker with flat screw terminal is ordered, the basic price is reduced.

3) Front busbar connection pieces are included in the scope of supply and are to be fitted by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	I_{cu} up to 70 kA at 415 V, high breaking capacity H (H)					SD	I_{cu} up to 100 kA at 415 V, very high breaking capacity L (L)				
	Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG		Article No. / Article No. supplement, see page 2/186; www.siemens.com/product?Article No.	Basic price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL1710-2EE4□-□□□□		1	1 unit	1CC		**--**				
	3VL1716-2EE4□-□□□□		1	1 unit	1CC		**--**				
	3VL2710-2EE4□-□□□□		1	1 unit	1CC		**3VL2710-3EE4□-□□□□**		1	1 unit	1CC
	3VL2716-2EE4□-□□□□		1	1 unit	1CC		**3VL2716-3EE4□-□□□□**		1	1 unit	1CC
	3VL3725-2EE4□-□□□□		1	1 unit	1CC		**3VL3725-3EE4□-□□□□**		1	1 unit	1CC
	3 6						**3 6**				
	3VL4740-2EE46-□□□□		1	1 unit	1CC		**3VL4740-3EE46-□□□□**		1	1 unit	1CC
	3VL5763-2EE46-□□□□		1	1 unit	1CC		**3VL5763-3EE46-□□□□**		1	1 unit	1CC
	3VL6780-2EE46-□□□□		1	1 unit	1CC		**3VL6780-3EE46-□□□□**		1	1 unit	1CC
	3VL7712-2EE46-□□□□		1	1 unit	1CC		**3VL7712-3EE46-□□□□**		1	1 unit	1CC
	3VL8716-2EE40-□□□□		1	1 unit	1CC		**3VL8716-3EE40-□□□□**		1	1 unit	1CC

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4-pole

Article No. supplement (for complete Article No., see pages 2/170 to 2/181) **3VL7.. - .□□4.-....** Trip unit		Breaking capacity	Type **VL160**[1] 3VL2			**VL250**[1] 3VL3		**VL400** 3VL4		**VL630** 3VL5	**VL800** 3VL6	**VL1250** 3VL7		**VL1600** 3VL8
			Rated current I_n 63 A	100 A	160 A	200 A	250 A	315 A	400 A	630 A	800 A	1000 A	1250 A	1600 A
			Price											
ETU10	**TB**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU10	**NB**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU10	**TA**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU10	**NA**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU10	**LA**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU12	**TN**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU12	**NN**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU40	**UJ**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU42	**UN**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU20	**TE**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU20	**NE**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU20	**TF**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU20	**NF**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU20	**LF**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU22	**TH**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ETU22	**NH**	N	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		H	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
		L	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

✓ Available

[1] **The basic price is reduced when the molded case circuit breaker is ordered with a flat screw terminal ".36-".**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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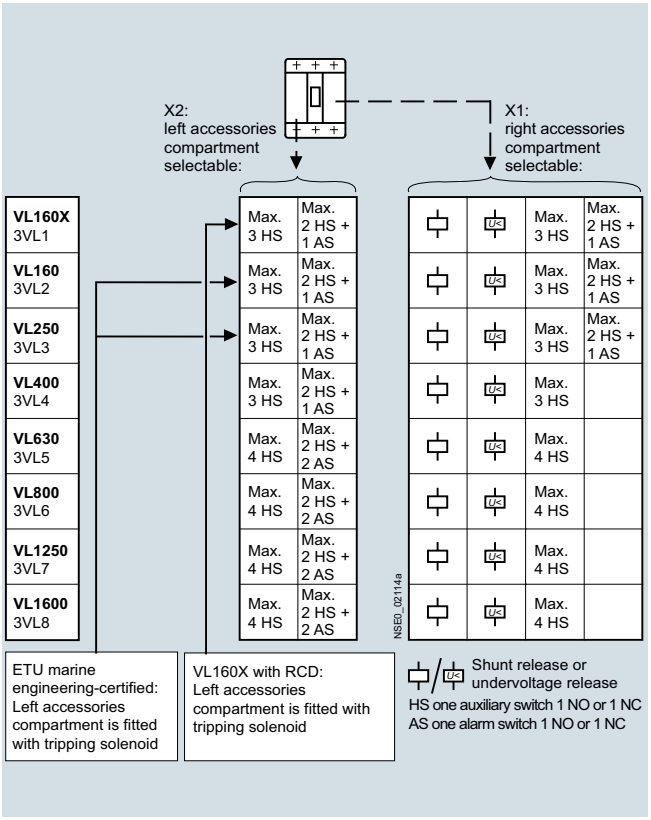
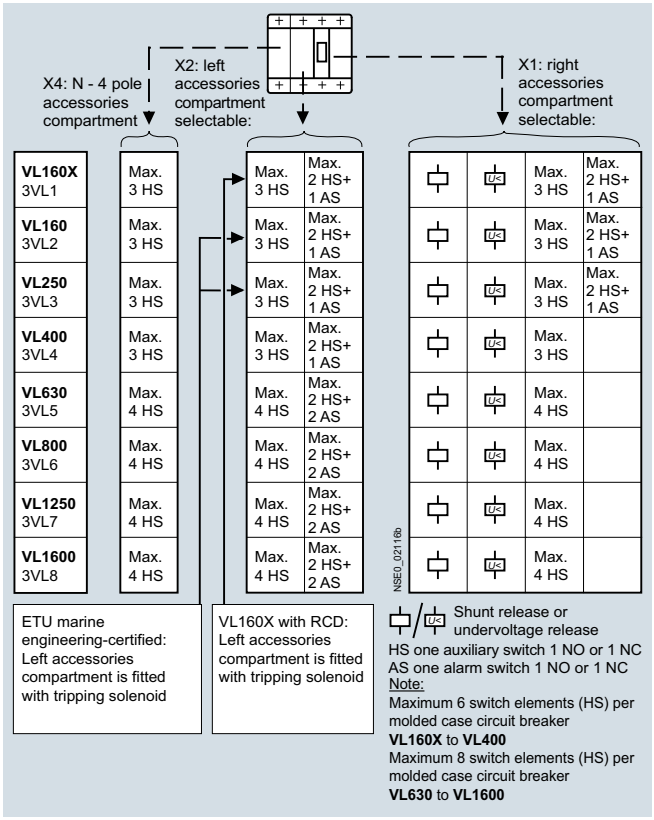
Equipment options for the insulated accessory compartments in the 3VL molded case circuit breakers

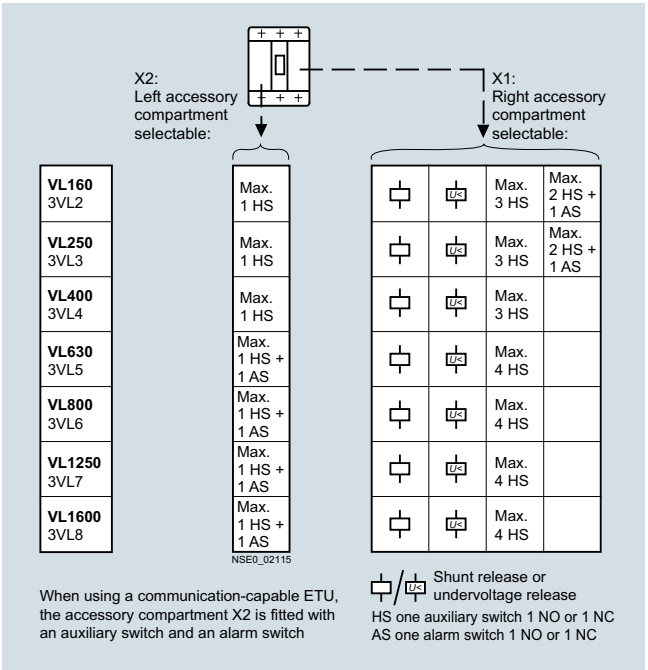
3-pole circuit breakers without communication preparation



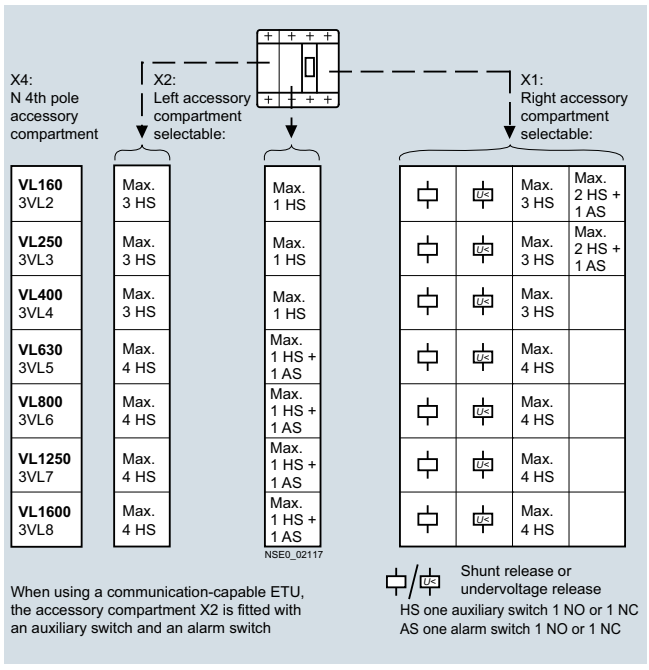
4-pole circuit breakers without communication preparation



3-pole circuit breakers with communication preparation



4-pole circuit breakers with communication preparation



Note:

Before ordering, use the tables above to check whether the required combination of shunt releases, undervoltage releases and auxiliary/alarm switches is feasible.

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Options

1st Article No. supplement:
Undervoltage or shunt release,
wiring directly to accessories

Rated control supply voltage U_s/frequency		Article No. supplement		Circuit breakers Type	
50/60 Hz AC DC		**3VL. . . .-. . . . . - ☐☐ ..**		**VL160X to VL400/ 3VL1 to 3VL4** Additional price	**VL630 to VL1600/ 3VL5 to 3VL8** Additional price
3 or 4-pole					
Without auxiliary releases		**0**	**A**	**None**	**None**
With undervoltage release Right pole only					
V AC	V DC				
--	12	**2**	**N**	✓	✓
--	24	**2**	**P**	✓	✓
--	48	**2**	**U**	✓	✓
--	60	**2**	**V**	✓	✓
--	110 ... 127	**2**	**R**	✓	✓
--	220 ... 250	**2**	**S**	✓	✓
24	--	**2**	**D**	✓	✓
110 ... 127	--	**2**	**G**	✓	✓
220 ... 250	--	**2**	**H**	✓	✓
208	--	**2**	**M**	✓	✓
277	--	**2**	**Q**	✓	✓
380 ... 415	--	**2**	**J**	✓	✓
440 ... 480	--	**2**	**K**	✓	✓
500 ... 525	--	**2**	**L**	✓	✓
With shunt release Right pole only					
V AC	V DC				
24	24	**8**	**C**	✓	✓
--	48 ... 60	**8**	**J**	✓	✓
--	110 ... 127	**8**	**K**	✓	✓
--	220 ... 250	**8**	**Q**	✓	✓
48 ... 60	--	**8**	**M**	✓	✓
110 ... 127	--	**8**	**R**	✓	✓
208 ... 277	--	**8**	**T**	✓	✓
380 ... 600	--	**8**	**V**	✓	✓

2nd Article No. supplement:
Auxiliary switches (HS) and alarm switches (AS),
left/right pole,
wiring directly to accessories

Equipment	Article No. supplement		Circuit breakers Type	
HS = 1 NO or 1 NC contact block AS = 1 NO contact block	**3VL. . . .-. . . . . - .. ☐☐**		**VL160X to VL400[1]/ 3VL1 to 3VL4** Additional price	**VL630 to VL1600/ 3VL5 to 3VL8** Additional price
Without auxiliary/alarm switches	**A**	**0**	**None**	**None**
2 HS (1 NO/1 NC)[2]	**B**	**1**	✓ [1)4)]	--
4 HS (2 NO/2 NC)	**C**	**1**	--	✓
2 HS (1 NO/1 NC) + 1 AS (1 NO)	**D**	**1**	✓ [1)4)]	--
2 HS (1 NO/1 NC) + 1 AS (1 NO)[3]	**E**	**1**	--	✓ [5]

✓ Additional price

-- Not available

1) Except for installation in the left accessory compartment of the VL160X molded case circuit breakers with RCD module.

2) With mounting adapter up to 3 HS.

3) With mounting adapter up to 2 HS + 2 AS.

4) Not feasible for use of marine engineering ETU and additional use of shunt and undervoltage releases.
When using a communication-capable ETU, the accessory compartment X2 is fitted with an auxiliary switch and an alarm switch. The combination of 1st and 2nd Article No. supplement is only possible with restrictions. It is recommended to use the configurator in the Mall for selection purposes.

5) Not possible when using a communication-capable ETU.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

When ordering, add **"-Z"** to the complete Article No. and add the relevant order code(s).

Article No. with **"-Z"**
1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16
3VL . . . . - . . . . . - . . . **-Z**
and additional order code(s)
□□□ + . . . + . . .

Code for further versions **-Z**

Additional price

For fixed-mounted circuit breakers (wired in factory)			
3 or 4-pole			
Prewired internal accessories Connecting cables (3 m long) brought out at the rear This option "L02" can be selected only in combination with internal accessories (page 2/186). Option not available for factory-fitted motorized operating mechanisms.	For VL160X to VL1600 (3VL1 to 3VL8)	**L 0 2**	✓
Prewired connecting cables for motorized operating mechanisms with stored energy mechanisms (SEO) Connecting cables on the circuit breaker for motorized operating mechanisms (3 m long). On VL160X to VL400 brought out at the top. On VL630 and VL800 brought out on the right. Option "L12" can only be selected in combination with motorized operating mechanisms (order codes "M24", "M42", "M60", "M11" and "M22).	For VL160X to VL800 (3VL1 to 3VL6)	**L 1 2**	✓
Motorized operating mechanisms with stored energy mechanisms for synchronization tasks (24 V DC) Motorized operating mechanisms not wired; if wiring for the motorized operating mechanism is wanted, please specify "L12" in addition. If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X, VL160, VL250 (3VL1, 3VL2, 3VL3)	**M 2 4**	✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
	VL1250, VL1600 (3VL7, 3VL8)[1]		✓
Motorized operating mechanisms with stored energy mechanisms for synchronization tasks (42 ... 48 V AC/DC) Motorized operating mechanisms not wired; if wiring for the motorized operating mechanism is wanted, please specify "L12" in addition. If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X, VL160, VL250 (3VL1, 3VL2, 3VL3)	**M 4 2**	✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
	VL1250, VL1600 (3VL7, 3VL8)[1]		✓
Motorized operating mechanisms with stored energy mechanisms for synchronization tasks (60 V AC/DC) Motorized operating mechanisms not wired; if wiring for the motorized operating mechanism is wanted, please specify "L12" in addition. If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X, VL160, VL250 (3VL1, 3VL2, 3VL3)	**M 6 0**	✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
	VL1250, VL1600 (3VL7, 3VL8)[1]		✓
Motorized operating mechanisms with stored energy mechanisms for synchronization tasks (110 ... 127 V AC/DC) Motorized operating mechanisms not wired; if wiring for the motorized operating mechanism is wanted, please specify "L12" in addition. If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X, VL160, VL250 (3VL1, 3VL2, 3VL3)	**M 1 1**	✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
	VL1250, VL1600 (3VL7, 3VL8)[1]		✓
Motorized operating mechanisms with stored energy mechanisms for synchronization tasks (220 ... 250 V AC/DC) Motorized operating mechanisms not wired; if wiring for the motorized operating mechanism is wanted, please specify "L12" in addition. If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X, VL160, VL250 (3VL1, 3VL2, 3VL3)	**M 2 2**	✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
	VL1250, VL1600 (3VL7, 3VL8)[1]		✓

✓ Additional price

[1] The motorized operating mechanism for VL1250 and VL1600 (3VL7 and 3VL8) has no stored energy mechanism and is also unsuitable for synchronization tasks.

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Options

2

When ordering, add **"-Z"** to the complete Article No. and add the relevant order code(s).

Article No. with **"-Z"**
1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16
3VL . . . . - . . . . . - . . . . -Z
and additional order code(s)
□□□ **+ . . . + . . .**

Code for further versions **-Z**

Additional price

For fixed-mounted circuit breakers (wired in factory)

3 or 4-pole

Pre-mounted motorized operating mechanisms (24 V DC) on circuit breaker, not synchronizable If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X (3VL1)	**M 2 5**	✓
	VL160, VL250 (3VL2, 3VL3)		✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
Pre-mounted motorized operating mechanisms (42 ... 60 V AC/DC) on circuit breaker, not synchronizable If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X (3VL1)	**M 4 3**	✓
	VL160, VL250 (3VL2, 3VL3)		✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
Pre-mounted motorized operating mechanisms (110 ... 127 V AC/DC) on circuit breaker, not synchronizable If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X (3VL1)	**M 1 2**	✓
	VL160, VL250 (3VL2, 3VL3)		✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓
Pre-mounted motorized operating mechanisms (220 ... 250 V AC/DC) on circuit breaker, not synchronizable If internal accessories are provided, the prewiring option "L02" for internal accessories is already included. In this case "L02" must not be specified in addition.	Available with VL160X (3VL1)	**M 2 3**	✓
	VL160, VL250 (3VL2, 3VL3)		✓
	VL400 (3VL4)		✓
	VL630, VL800 (3VL5, 3VL6)		✓

✓ Additional price

Minimum order quantity (PS) or a multiple thereof can be ordered.

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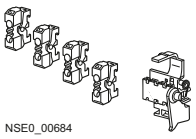
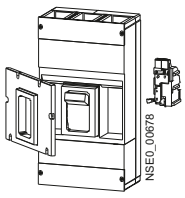
Selection and ordering data

	Wiring directly to accessories	SD	For VL160X to VL400 (3VL1 to 3VL4) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Auxiliary switches and auxiliary releases							
	3 or 4-pole						
	For retrofitting (for equipment options, see Technical Information at www.siemens.com/lowvoltage/product-support.)						
 NSE0_00684 3VL9400-2A.00	**Auxiliary switches (HS) and alarm switches (AS)** For retrofitting						
	Assembly kits / Mounting side						
	2 HS (1 NO + 1 NC) / N, left[1], right		**3VL9400-2AB00**		1	1 unit	1CC
	4 HS (2 NO + 2 NC) / N, left[1], right		**--**				
	2 HS (1 NC + 1 NO) / left[1], right[3]		**3VL9400-2AD00**		1	1 unit	1CC
	+ 1 AS (1 NO) (assembly kit) / left[1]		**--**				
	Additional auxiliary switch/alarm switch combinations		See page 2/191.				
 NSE0_00678 3VL9400-1S.00, 3VL9400-1U.00	**Shunt releases [2]** For retrofitting						
	V AC / V DC / Mounting side						
	24 / 24 / Right pole only		**3VL9400-1SC00**		1	1 unit	1CC
	-- / 48 ... 60 / Right pole only		**3VL9400-1SJ00**		1	1 unit	1CC
	-- / 110 ... 127 / Right pole only		**3VL9400-1SK00**		1	1 unit	1CC
	-- / 220 ... 250 / Right pole only		**3VL9400-1SQ00**		1	1 unit	1CC
	48 ... 60 / -- / Right pole only		**3VL9400-1SM00**		1	1 unit	1CC
	110 ... 127 / -- / Right pole only		**3VL9400-1SR00**		1	1 unit	1CC
	208 ... 277 / -- / Right pole only		**3VL9400-1ST00**		1	1 unit	1CC
	380 ... 600 / -- / Right pole only		**3VL9400-1SV00**		1	1 unit	1CC
	Undervoltage releases For retrofitting						
	V AC / V DC / Mounting side						
	-- / 12 / Right pole only		**3VL9400-1UN00**		1	1 unit	1CC
	-- / 24 / Right pole only		**3VL9400-1UP00**		1	1 unit	1CC
	-- / 48 / Right pole only		**3VL9400-1UU00**		1	1 unit	1CC
	-- / 60 / Right pole only		**3VL9400-1UV00**		1	1 unit	1CC
	24 / -- / Right pole only		**3VL9400-1UD00**		1	1 unit	1CC
	110 ... 127 / -- / Right pole only		**3VL9400-1UG00**		1	1 unit	1CC
	-- / 110 ... 127 / Right pole only		**3VL9400-1UR00**		1	1 unit	1CC
	208 / -- / Right pole only		**3VL9400-1UM00**		1	1 unit	1CC
	220 ... 250 / -- / Right pole only		**3VL9400-1UH00**		1	1 unit	1CC
	-- / 220 ... 250 / Right pole only		**3VL9400-1US00**		1	1 unit	1CC
	277 / -- / Right pole only		**3VL9400-1UQ00**		1	1 unit	1CC
	380 ... 415 / -- / Right pole only		**3VL9400-1UJ00**		1	1 unit	1CC
	440 ... 480 / -- / Right pole only		**3VL9400-1UK00**		1	1 unit	1CC
	500 ... 525 / -- / Right pole only		**3VL9400-1UL00**		1	1 unit	1CC
	Storage devices for shunt releases (208 ... 277 V AC/220 ... 250 V DC) Rated control supply voltage U_s 220 ... 240 V AC/220 ... 250 V DC						
	Storage time 5 min		**3WL9111-0BA14-0AA0**		1	1 unit	1CA

[1] Except for installation in the left accessory compartment of the VL160X (3VL1) molded case circuit breakers with RCD module.

[2] Shunt releases with disconnection contact (3SB3 for ON/OFF position) not floating (see Technical Information at www.siemens.com/lowvoltage/product-support).

[3] In the case of VL400 (3VL4):
Unsuitable for mounting in the right accessory compartment.
The 3VL9400-2AB00 assembly kit with auxiliary switches only is recommended.

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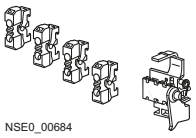
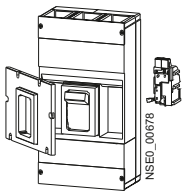
Accessories and spare parts

	Wiring directly to accessories	SD	For VL630 to VL1600 (3VL5 to 3VL8) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Auxiliary switches and auxiliary releases							
	3 or 4-pole						
	For retrofitting (for equipment options, see Technical Information at www.siemens.com/lowvoltage/product-support.)						
 NSE0_00684 3VL9800-2A.00	**Auxiliary switches (HS) and alarm switches (AS)** For retrofitting						
	Assembly kits / Mounting side						
	2 HS (1 NO + 1 NC) / N, left, right		--				
	4 HS (2 NO + 2 NC) / N, left, right		**3VL9800-2AC00**		1	1 unit	1CC
	2 HS (1 NC + 1 NO) / Left, right		--				
	+ 1 AS (1 NO) (assembly kit) / Left		**3VL9800-2AE00**		1	1 unit	1CC
	Additional auxiliary switch/alarm switch combinations		See page 2/191.				
 NSE0_00678 3VL9800-1S.00, 3VL9800-1U.00	**Shunt releases** [1] For retrofitting						
	V AC / V DC / Mounting side						
	24 / 24 / Right pole only		**3VL9800-1SC00**		1	1 unit	1CC
	-- / 48 ... 60 / Right pole only		**3VL9800-1SJ00**		1	1 unit	1CC
	-- / 110 ... 127 / Right pole only		**3VL9800-1SK00**		1	1 unit	1CC
	-- / 220 ... 250 / Right pole only		**3VL9800-1SQ00**		1	1 unit	1CC
	48 ... 60 / -- / Right pole only		**3VL9800-1SM00**		1	1 unit	1CC
	110 ... 127 / -- / Right pole only		**3VL9800-1SR00**		1	1 unit	1CC
	208 ... 277 / -- / Right pole only		**3VL9800-1ST00**		1	1 unit	1CC
	380 ... 600 / -- / Right pole only		**3VL9800-1SV00**		1	1 unit	1CC
	Undervoltage releases For retrofitting						
	V AC / V DC / Mounting side						
	-- / 12 / Right pole only		**3VL9800-1UN00**		1	1 unit	1CC
	-- / 24 / Right pole only		**3VL9800-1UP00**		1	1 unit	1CC
	-- / 48 / Right pole only		**3VL9800-1UU00**		1	1 unit	1CC
	-- / 60 / Right pole only		**3VL9800-1UV00**		1	1 unit	1CC
	24 / -- / Right pole only		**3VL9800-1UD00**		1	1 unit	1CC
	110 ... 127 / -- / Right pole only		**3VL9800-1UG00**		1	1 unit	1CC
	-- / 110 ... 127 / Right pole only		**3VL9800-1UR00**		1	1 unit	1CC
	208 / -- / Right pole only		**3VL9800-1UM00**		1	1 unit	1CC
	220 ... 250 / -- / Right pole only		**3VL9800-1UH00**		1	1 unit	1CC
	-- / 220 ... 250 / Right pole only		**3VL9800-1US00**		1	1 unit	1CC
	277 / -- / Right pole only		**3VL9800-1UQ00**		1	1 unit	1CC
	380 ... 415 / -- / Right pole only		**3VL9800-1UJ00**		1	1 unit	1CC
	440 ... 480 / -- / Right pole only		**3VL9800-1UK00**		1	1 unit	1CC
	500 ... 525 / -- / Right pole only		**3VL9800-1UL00**		1	1 unit	1CC
	Storage devices for shunt releases (208 ... 277 V AC/220 ... 250 V DC) Rated control supply voltage U_s 220 ... 240 V AC/220 ... 250 V DC						
	Storage time 5 min		**3WL9111-0BA14-0AA0**		1	1 unit	1CA

[1] Shunt releases with disconnection contact (3SB3 for ON/OFF position) not floating (see Technical Information at www.siemens.com/lowvoltage/product-support).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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For circuit breakers Type	Maximum combination of auxiliary switches (HS) and alarm switches (AS)	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
3SB adapters and 3SB contact blocks							
Mounting adapters for auxiliary and alarm switch combinations							
For installation in the N pole of the circuit breaker							
VL160X, VL160, VL250, VL400 (3VL1 to 3VL4)	Up to 3 HS[1]		**3VL9400-2AH00**		1	1 unit	1CC
	2 HS + 1 AS[1][2]		**--**				
VL630, VL800, VL1250, VL1600 (3VL5 to 3VL8)	Up to 4 HS		**3VL9816-2AL00**		1	1 unit	1CC
	2 HS + 2 AS		**--**				
For installation in the left pole of the circuit breaker							
VL160X, VL160, VL250, VL400 (3VL1 to 3VL4)	Up to 3 HS[1]		**3VL9400-2AH00**		1	1 unit	1CC
	2 HS + 1 AS[1][2]		**3VL9400-2AJ10**		1	1 unit	1CC
VL630, VL800, VL1250, VL1600 (3VL5 to 3VL8)	Up to 4 HS		**3VL9816-2AL00**		1	1 unit	1CC
	2 HS + 2 AS		**3VL9816-2AN10**		1	1 unit	1CC
For installation in the right pole of the circuit breaker							
VL160X, VL160, VL250, VL400 (3VL1 to 3VL4)[2]	Up to 3 HS[1]		**3VL9400-2AH00**		1	1 unit	1CC
	2 HS + 1 AS[1][2]		**3VL9400-2AJ20**		1	1 unit	1CC
VL630, VL800, VL1250, VL1600 (3VL5 to 3VL8)	Up to 4 HS		**3VL9816-2AL00**		1	1 unit	1CC
	2 HS + 2 AS		**--**				

[1] Except for installation in the left pole for VL160X (3VL1) molded case circuit breakers with RCD module.

[2] In the case of VL400: 3VL9400-2AJ20 unsuitable for mounting in the right accessory compartment.

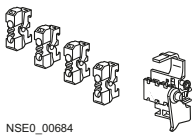
For auxiliary switches (HS) and alarm switches (AS)	SD d	Circuit breakers Type **VL160X to VL1600 (3VL1 to 3VL8)** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Contact blocks for auxiliary switch and alarm switch combinations						
1 NO		**3SB3400-0J**		1	1 unit	41J
1 NC		**3SB3400-0K**		1	1 unit	41J

For auxiliary switch or alarm switch combinations not included in the kits provided as standard, the mounting adapters specified can be ordered separately together with the required contact blocks:
1 HS or 1 AS with NO contact 3SB3400-0J
1 HS or 1 AS with NC contact 3SB3400-0K

Note:

A maximum of 6 contact blocks (HS) per circuit breaker (VL160X, VL160, VL250, VL400; 3VL1 to 3VL4) and a maximum of 8 contact blocks (HS) per circuit breaker (VL630, VL800, VL1250, VL1600; 3VL5 to 3VL8) are possible.

Four 3SB34 auxiliary contact blocks and one mounting adapter (right), suitable for VL630, VL800, VL1250, VL1600 (3VL5 to 3VL8) circuit breakers.



NSE0_00684

For retrofitting/equipment options, see Technical Information at www.siemens.com/lowvoltage/product-support.

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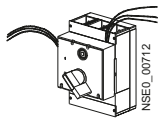
Accessories and spare parts

	Version	SD	For VL160X to VL250 (3VL1 to 3VL3) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Manual operating mechanisms							
	3 or 4-pole						
 3VL9.00-3H.00	**Front-operated rotary operating mechanisms**[1] For direct mounting on the circuit breaker, without leading auxiliary switch, degree of protection IP30[2], black, max. 3 padlocks		**3VL9300-3HA00**		1	1 unit	1CC
	EMERGENCY-STOP version						
	Red knob, yellow indicator plate		**3VL9300-3HC00**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/214 to 2/218.						
 3VL9300-3HE00	**Front-operated rotary operating mechanisms with shaft stub, without knob**[1] Without leading auxiliary switch, for auxiliary switches, see below.		**3VL9300-3HE00**		1	1 unit	1CC
 3VL9.00-3H.05	**Door-coupling rotary operating mechanisms, complete**[1] **Installation in doors and covers** Degree of protection IP65, including handle ti-gray, with masking plate, indicator plate, removable door coupling (die cast with reduced tolerance compensation), extension shaft (8 × 8 mm), length 300 mm and front-operated rotary operating mechanism for the respective circuit breaker, lockable with up to 3 padlocks, with door interlocking		**3VL9300-3HF05**		1	1 unit	1CC
	EMERGENCY-STOP version						
	Red knob, yellow indicator plate, without leading auxiliary switch		**3VL9300-3HG05**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/214 to 2/218.						
 3VL9.00-3A.10	**Leading auxiliary switches for installation in a front-operated rotary operating mechanism, door-coupling rotary operating mechanism or side panel rotary operating mechanism** Standard or EMERGENCY-STOP version						
	"OFF after ON" Leading auxiliary switches when switching on						
	1 changeover contact with 1.5 m long cables		**3VL9300-3AS10**		1	1 unit	1CC
	2 changeover contacts with 1.5 m long cables		**3VL9300-3AT10**		1	1 unit	1CC
	"ON after OFF" Leading auxiliary switches when switching off						
	1 changeover contact with 1.5 m long cables		**3VL9300-3AU10**		1	1 unit	1CC
	2 changeover contacts with 1.5 m long cables		**3VL9300-3AW10**		1	1 unit	1CC
	Side panel rotary operating mechanisms, complete[1] Degree of protection IP65, including black knob with masking plate, indicator plate, Bowden cable, lockable with up to 3 padlocks						
	- With 600 mm Bowden cable		**3VL9300-3HR10**		1	1 unit	1CC
	- With 1000 mm Bowden cable		**3VL9300-3HR20**		1	1 unit	1CC
	- With 1500 mm Bowden cable		**3VL9300-3HR30**		1	1 unit	1CC
	Side panel rotary operating mechanisms, complete[1] EMERGENCY-STOP version Degree of protection IP65, including red knob with masking plate, yellow indicator plate, Bowden cable, lockable with up to 3 padlocks						
	- With 600 mm Bowden cable		**3VL9300-3HR11**		1	1 unit	1CC
	- With 1000 mm Bowden cable		**3VL9300-3HR21**		1	1 unit	1CC
	- With 1500 mm Bowden cable		**3VL9300-3HR31**		1	1 unit	1CC
	Retaining brackets, suitable for matching door-coupling rotary operating mechanisms, complete with locking device						
	Retaining bracket is mounted on the operating mechanism, recommended for extension shafts >250 mm		**3VL9300-3HP02**		1	1 unit	1CC
	- For 6 mm shaft		**3VL9300-3HP00**		1	1 unit	1CC

Additional accessories and components for door-coupling rotary operating mechanism, see 2/197 and 2/199.

[1] Not possible on VL160X with RCD module.

[2] IP40 with additional masking frame mounted on the door cut-out.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL400 (3VL4) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL630 (3VL5) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9400-3HA00		1	1 unit	1CC		**3VL9600-3HA00**		1	1 unit	1CC
	3VL9400-3HC00		1	1 unit	1CC		**3VL9600-3HC00**		1	1 unit	1CC
	3VL9400-3HE00		1	1 unit	1CC		**3VL9600-3HE00**		1	1 unit	1CC
	3VL9400-3HF05		1	1 unit	1CC		**3VL9600-3HF05**		1	1 unit	1CC
	3VL9400-3HG05		1	1 unit	1CC		**3VL9600-3HG05**		1	1 unit	1CC
	3VL9400-3AS10		1	1 unit	1CC		**3VL9600-3AS10**		1	1 unit	1CC
	3VL9400-3AT10		1	1 unit	1CC		**3VL9600-3AT10**		1	1 unit	1CC
	3VL9400-3AU10		1	1 unit	1CC		**3VL9600-3AU10**		1	1 unit	1CC
	3VL9400-3AW10		1	1 unit	1CC		**3VL9600-3AW10**		1	1 unit	1CC
	3VL9400-3HR10		1	1 unit	1CC		**3VL9500-3HR10**		1	1 unit	1CC
	3VL9400-3HR20		1	1 unit	1CC		**3VL9500-3HR20**		1	1 unit	1CC
	3VL9400-3HR30		1	1 unit	1CC		**3VL9500-3HR30**		1	1 unit	1CC
	3VL9400-3HR11		1	1 unit	1CC		**3VL9500-3HR11**		1	1 unit	1CC
	3VL9400-3HR21		1	1 unit	1CC		**3VL9500-3HR21**		1	1 unit	1CC
	3VL9400-3HR31		1	1 unit	1CC		**3VL9500-3HR31**		1	1 unit	1CC
	3VL9400-3HP00		1	1 unit	1CC		**3VL9600-3HP00**		1	1 unit	1CC
	--						**--**				

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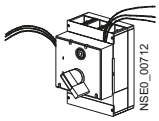
Accessories and spare parts

	Version	SD	For VL800 (3VL6) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Manual operating mechanisms							
	3 or 4-pole						
 3VL9.00-3H.00	**Front-operated rotary operating mechanisms** For direct mounting on the circuit breaker, without leading auxiliary switch, degree of protection IP30[1], black, max. 3 padlocks		**3VL9600-3HA00**		1	1 unit	1CC
	EMERGENCY-STOP version Red knob, yellow indicator plate		**3VL9600-3HC00**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/214 to 2/218.						
 3VL9.00-3H.05	**Front-operated rotary operating mechanisms with shaft stub, without knob** Without leading auxiliary switch, for auxiliary switches, see below.		**3VL9600-3HE00**		1	1 unit	1CC
 3VL9.00-3H.05	**Door-coupling rotary operating mechanisms, complete Installation in doors and covers** Degree of protection IP65, including handle, ti-gray, with masking plate, indicator plate, detachable door coupling (die cast, for VL800 (3VL6) with reduced tolerance compensation), extension shaft (8 × 8 mm for VL800 (3VL6), 12 × 12 mm for VL1250 (3VL7) and VL1600 (3VL8)), length 300 mm and front-operated rotary operating mechanism for the respective circuit breaker, lockable with max. 3 padlocks, with door interlocking		**3VL9600-3HF05**		1	1 unit	1CC
	EMERGENCY-STOP version Red knob, yellow indicator plate without leading auxiliary switch		**3VL9600-3HG05**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/214 to 2/218.						
 3VL9.00-3A.10	**Leading auxiliary switches for installation in a front-operated rotary operating mechanism, door-coupling rotary operating mechanism** Standard or EMERGENCY-STOP version						
	"OFF after ON" Leading auxiliary switches when switching on						
	1 changeover contact with 1.5 m long cables		**3VL9600-3AS10**		1	1 unit	1CC
	2 changeover contacts with 1.5 m long cables		**3VL9600-3AT10**		1	1 unit	1CC
	"ON after OFF" Leading auxiliary switches when switching off						
	1 changeover contact with 1.5 m long cables		**3VL9600-3AU10**		1	1 unit	1CC
	2 changeover contacts with 1.5 m long cables		**3VL9600-3AW10**		1	1 unit	1CC
	Retaining brackets, suitable for matching door-coupling rotary operating mechanisms, complete with locking device						
	Retaining bracket is mounted on the operating mechanism, recommended for extension shafts >250 mm		**3VL9600-3HP00**		1	1 unit	1CC

Additional accessories and components for door-coupling rotary operating mechanism, see 2/197 and 2/199.

[1] IP40 with additional masking frame mounted on the door cut-out.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL1250 to VL1600 (3VL7 and 3VL8) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9800-3HA00		1	1 unit	1CC
	3VL9800-3HC00		1	1 unit	1CC
	3VL9800-3HE00		1	1 unit	1CC
	3VL9800-3HF05		1	1 unit	1CC
	3VL9800-3HG05		1	1 unit	1CC
	3VL9800-3AS20		1	1 unit	1CC
	3VL9800-3AT20		1	1 unit	1CC
	3VL9800-3AU10		1	1 unit	1CC
	3VL9800-3AW10		1	1 unit	1CC
	3VL9800-3HP00		1	1 unit	1CC

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Accessories and spare parts

Motorized operating mechanisms

3 or 4-pole


3VL9.00-3M.00

Motorized operating mechanisms with stored energy mechanisms (SEO) for synchronization tasks[1)2)]
Degree of protection IP30, with locking device for 3 padlocks

50/60 Hz V AC	V DC	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		For VL160X to VL250 (3VL1 to 3VL3)						
--	24			**3VL9300-3MJ00**		1	1 unit	1CC
42 ... 48	42 ... 48			**3VL9300-3ML00**		1	1 unit	1CC
60	60			**3VL9300-3MS00**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9300-3MN00**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9300-3MQ00**		1	1 unit	1CC
		For VL400 (3VL4)						
--	24			**3VL9400-3MJ00**		1	1 unit	1CC
42 ... 48	42 ... 48			**3VL9400-3ML00**		1	1 unit	1CC
60	60			**3VL9400-3MS00**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9400-3MN00**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9400-3MQ00**		1	1 unit	1CC
		For VL630 and VL800 (3VL5 and 3VL6)						
--	24			**3VL9600-3MJ00**		1	1 unit	1CC
42 ... 48	42 ... 48			**3VL9600-3ML00**		1	1 unit	1CC
60	60			**3VL9600-3MS00**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9600-3MN00**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9600-3MQ00**		1	1 unit	1CC


3VL9.00-3M.10

Motorized operating mechanisms (MO)[1)]
Degree of protection IP30, with locking device for 3 padlocks

50/60 Hz V AC	V DC	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		For VL160X (3VL1)						
--	24			**3VL9100-3MA10**		1	1 unit	1CC
42 ... 60	42 ... 60			**3VL9100-3MC10**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9100-3MD10**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9100-3ME10**		1	1 unit	1CC
		For VL160 and VL250 (3VL2 and 3VL3)						
--	24			**3VL9300-3MA10**		1	1 unit	1CC
42 ... 60	42 ... 60			**3VL9300-3MC10**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9300-3MD10**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9300-3ME10**		1	1 unit	1CC
		For VL400 (3VL4)						
--	24			**3VL9400-3MA10**		1	1 unit	1CC
42 ... 60	42 ... 60			**3VL9400-3MC10**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9400-3MD10**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9400-3ME10**		1	1 unit	1CC
		For VL630 and VL800 (3VL5 and 3VL6)						
--	24			**3VL9600-3MA10**		1	1 unit	1CC
42 ... 60	42 ... 60			**3VL9600-3MC10**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9600-3MD10**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9600-3ME10**		1	1 unit	1CC
		For VL1250 and VL1600[2)] (3VL7 and 3VL8)						
--	24			**3VL9800-3MJ00**		1	1 unit	1CC
42 ... 48	42 ... 48			**3VL9800-3ML00**		1	1 unit	1CC
60	60			**3VL9800-3MS00**		1	1 unit	1CC
110 ... 127	110 ... 127			**3VL9800-3MN00**		1	1 unit	1CC
220 ... 250	220 ... 250			**3VL9800-3MQ00**		1	1 unit	1CC

Toggle lever extension

Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Toggle lever extension		**For VL400 to VL1600 (3VL4 to 3VL8)**				
• For VL400 (3VL4)		**3VL9400-3HN00**		1	1 unit	1CC
• For VL630 and VL800 (3VL5 and 3VL6)		**3VL9600-3HN00**		1	1 unit	1CC
• For VL1250 and VL1600 (3VL7 and 3VL8)		**3VL9800-3HN00**		1	1 unit	1CC

1) Not possible on VL160X with RCD module.

2) For safety lock as an assembly kit for retrofitting, see pages 2/214 to 2/218.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Individual parts for 8UC door-coupling rotary operating mechanisms[2]

Switching devices	Rotary operating mechanisms	Size	Cross-section of the actuating shaft	Version[1]	SD	Individual parts for 8UC7 door-coupling rotary operating mechanisms	PU (UNIT, SET, M)	PS	PG
Type	Type		mm × mm		d	Article No. www.siemens.com/product?Article No. Price per PE			
Handles with masking plate (including flat gasket and fixing screws)									
3VL1, 3VL2, 3VL3	8UC71	1	6 × 6 or 8 × 8	Standard EMERGENCY-STOP		**8UC7110-6BD** **8UC7120-8BD**	1 1	1 unit 1 unit	1CL 1CL
3VL4, 3VL5, 3VL6	8UC72	2	8 × 8	Standard EMERGENCY-STOP		**8UC7210-6BD** **8UC7220-8BD**	1 1	1 unit 1 unit	1CL 1CL
3VL7, 3VL8	8UC73	3	12 × 12	Standard EMERGENCY-STOP		**8UC7310-6BD** **8UC7320-8BD**	1 1	1 unit 1 unit	1CL 1CL


8UC7110-1BB


8UC7210-6BD

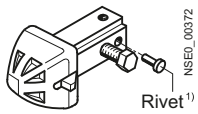

8UC7310-1BB

[1] Standard: Ti-gray handle, light-gray masking plate; EMERGENCY-STOP: red handle, yellow masking plate.

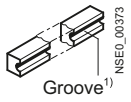
[2] Cannot be used for side panel rotary operating mechanisms.

Individual parts for 8UC door-coupling rotary operating mechanisms

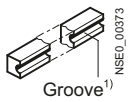
Rotary operating mechanisms	Cross-section of the actuating shaft	SD	Individual parts for 8UC6 door-coupling rotary operating mechanisms	PU (UNIT, SET, M)	PS	PG
Type	mm × mm	d	Article No. www.siemens.com/product?Article No. Price per PE			
Coupling drivers for 3VL						
8UC71 (plastic)	6 × 6		**8UC7011-2AA**	1	1 unit	1CL
8UC71/8UC72[2] (die cast)	8 × 8		**8UC6017-2AA**	1	1 unit	1CL
8UC73/74 (die cast)	12 × 12		**8UC6014**	1	1 unit	1CL
Extension shafts 300 mm long						
8UC71	6 × 6		**8UC6031**	1	1 unit	1CL
8UC71/8UC72	8 × 8		**8UC6032**	1	1 unit	1CL
8UC73	10 × 10		**8UC6033**	1	1 unit	1CL
8UC73/74	12 × 12		**8UC6034**	1	1 unit	1CL
Extension shafts 600 mm long						
8UC71	6 × 6		**8UC6081**	1	1 unit	1CL
8UC71/8UC72	8 × 8		**8UC6082**	1	1 unit	1CL
8UC73	10 × 10		**8UC6083**	1	1 unit	1CL
8UC73/74	12 × 12		**8UC6084**	1	1 unit	1CL
Shaft couplings						
8UC71	6 × 6		**8UC6021**	1	1 unit	1CL
8UC72	8 × 8		**8UC6022**	1	1 unit	1CL
8UC73	10 × 10		**8UC6023**	1	1 unit	1CL
8UC73/74	12 × 12		**8UC6024**	1	1 unit	1CL
Reducers						
8UC71	8 × 8 to 6 × 6		**8UC7058**	1	1 unit	1CL
8UC72	12 × 12 to 8 × 8		**8UC7050**	1	1 unit	1CL



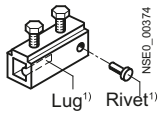
8UC6014



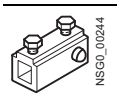
8UC6031



8UC6081



8UC6021 to 8UC6024



8UC7058

[1] Non-interchangeability features.

[2] Shortened coupling driver with reduced tolerance compensation.

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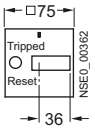
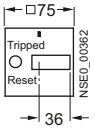
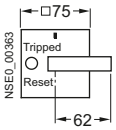
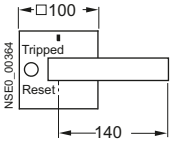
Accessories and spare parts

	Switching devices	Rated current	Cross-section of the actuating shaft	Torque	Rotary operating mecha-nisms	Illustrated: Handle, masking plate
	Type	A	mm	Nm	Size	
8UC door-coupling rotary operating mechanisms						
8UC71 - 3VL circuit breakers						
	3VL1	16 ... 160	6 × 6	4	1	
	3VL2	50 ... 160	6 × 6	4		
	3VL3	200... 250	6 × 6	4		
	3VL1	16 ... 160	8 × 8	4	1	
	3VL2	50 ... 160	8 × 8	4		
	3VL3	200... 250	8 × 8	4		
	(Supplied with door-coupling rotary operating mechanism, complete 3VL9 300-3H.05)					
8UC72 - 3VL circuit breakers						
	3VL4	200 ... 400	8 × 8	9	2	
	3VL5	315 ... 600	8 × 8	9		
	3VL6	320 ... 800	8 × 8	9		
8UC73 - 3VL circuit breakers						
	3VL7	400 ... 1250	12 × 12	25	3	
	3VL8	640 ... 1600	12 × 12	25		

[1] Requires in addition a front-operated rotary operating mechanism with shaft stub for direct mounting to the circuit breaker. For ordering the complete operating mechanism, see pages 2/192 to 2/195.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version	SD	**Rotary operating mechanisms, complete**[1]		PU (UNIT, SET, M)	PS	PG	Individual parts of the rotary operating mechanism			
Standard: Ti-gray handle, light gray masking plate; EMERGENCY-STOP: Red handle, yellow masking plate		Article No. www.siemens.com/product?Article No.	Price per PE				Handle with masking plate	Coupling drivers	Extension shaft (length 300 mm)	Reducer/ shaft coupling
	d						Article No.	Article No.	Article No.	Article No.
								☐ 6 mm	**☐ 6 mm**	**☐ 8 mm by 6 mm**
Standard		**8UC7111-6BD15**		1	1 unit	1CL	8UC7110-6BD	8UC7011-2AA	8UC6031	8UC7058
EMERGENCY-STOP		**8UC7121-8BD15**		1	1 unit	1CL	8UC7120-8BD	8UC7011-2AA	8UC6031	8UC7058
(Coupling driver made of plastic)										
								☐ 8 mm	**☐ 8 mm**	**☐ 8 mm by 8 mm**
Standard		**8UC7162-6BD22**		1	1 unit	1CL	8UC7110-6BD	8UC6017-2AA	8UC6032	8UC6022
EMERGENCY-STOP		**8UC7172-8BD22**		1	1 unit	1CL	8UC7120-8BD	8UC6017-2AA	8UC6032	8UC6022
(Die cast coupling driver with reduced tolerance compensation)										
								☐ 8 mm	**☐ 8 mm**	**☐ 12 mm by 8 mm**
Standard		**8UC7262-6BD26**		1	1 unit	1CL	8UC7210-6BD	8UC6017-2AA	8UC6032	8UC7050
EMERGENCY-STOP		**8UC7262-8BD26**		1	1 unit	1CL	8UC7220-8BD	8UC6017-2AA	8UC6032	8UC7050
(Die cast coupling driver with reduced tolerance compensation)										
								☐ 12 mm	**☐ 12 mm**	**☐ 12 mm by 12 mm**
Standard		**8UC7314-6BD44**		1	1 unit	1CL	8UC7310-6BD	8UC6014	8UC6034	8UC6024
EMERGENCY-STOP		**8UC7324-8BD44**		1	1 unit	1CL	8UC7320-8BD	8UC6014	8UC6034	8UC6024
(Die cast coupling driver)										

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Accessories and spare parts

Plug-in versions/withdrawable versions

	Version	SD	For VL160X (3VL1) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	3 or 4-pole						
 3VL9.00-4PA30	**Plug-in base assembly kits** Base, blade contacts for circuit breakers, terminal covers for degree of protection IP20, fixing screws, trip pin						
	Rear connections						
	3-pole		**3VL9100-4PA30**		1	1 unit	1CC
	3-pole with RCD module		**3VL9100-4PB30**		1	1 unit	1CC
	4-pole		**3VL9100-4PA40**		1	1 unit	1CC
	4-pole with RCD module		**3VL9100-4PB40**		1	1 unit	1CC
	90°angle connecting adapters						
	For rear connection, 3-pole		**3VL9300-4PE30**		1	1 unit	1CC
	For rear connection, 4-pole		**3VL9300-4PE40**		1	1 unit	1CC
	Front connections						
	3-pole		**3VL9100-4PC30**		1	1 unit	1CC
	3-pole with RCD module		**3VL9100-4PD30**		1	1 unit	1CC
	4-pole		**3VL9100-4PC40**		1	1 unit	1CC
	4-pole with RCD module		**3VL9100-4PD40**		1	1 unit	1CC
	Withdrawable version assembly kits Upgrade of the plug-in base assembly kit to						
	Withdrawable version including side panels and racking mechanism. 3-pole		--				
	3-pole with RCD		--				
	4-pole		--				
	4-pole with RCD		--				
	Withdrawable versions Same as plug-in base assembly kit, with additional side panels and racking mechanism						
	Rear connections						
	3-pole		--				
	3-pole with RCD module		--				
	4-pole		--				
	4-pole with RCD module		--				
	Front connections						
	3-pole		--				
	3-pole with RCD module		--				
	4-pole		--				
	4-pole with RCD module		--				
 3VL9.00-4WA30	**Blade contacts** As replacement for converting fixed-mounted circuit breakers into plug-in/withdrawable circuit breakers, including trip pin						
	1 set = 6 units 3-pole		**3VL9100-4PS30**		1	1 unit	1CC
	1 set = 8 units 4-pole		**3VL9100-4PS40**		1	1 unit	1CC
	Trip pins and springs						
	As replacement for plug-in/withdrawable circuit breaker		**3VL9100-4PF00**		1	1 unit	1CC
	Auxiliary circuit plug connections for plug-in bases Accessory connections for plug-in circuit breakers (factory-wired connectors) and for plug-in bases or withdrawable version (coupling with screw terminal)		**1)**				
	8 terminals		**3VL9300-4PJ00**		1	1 unit	1CC
 3VL9.00-4WA30	**Position signaling switches** (Connected/disconnected position) For plug-in/withdrawable base, 1 changeover contact, max. 2 signaling switches possible		**3VL9000-4WL00**		1	1 unit	1CC

1) It is recommended to use a maximum of 2 auxiliary circuit plug-in systems per circuit breaker (16 terminals).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL160 (3VL2) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL250 (3VL3) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9200-4PA30		1	1 unit	1CC		**3VL9300-4PA30**		1	1 unit	1CC
	3VL9200-4PB30		1	1 unit	1CC		**3VL9300-4PB30**		1	1 unit	1CC
	3VL9200-4PA40		1	1 unit	1CC		**3VL9300-4PA40**		1	1 unit	1CC
	3VL9200-4PB40		1	1 unit	1CC		**3VL9300-4PB40**		1	1 unit	1CC
	3VL9300-4PE30		1	1 unit	1CC		**3VL9300-4PE30**		1	1 unit	1CC
	3VL9300-4PE40		1	1 unit	1CC		**3VL9300-4PE40**		1	1 unit	1CC
	3VL9200-4PC30		1	1 unit	1CC		**3VL9300-4PC30**		1	1 unit	1CC
	3VL9200-4PD30		1	1 unit	1CC		**3VL9300-4PD30**		1	1 unit	1CC
	3VL9200-4PC40		1	1 unit	1CC		**3VL9300-4PC40**		1	1 unit	1CC
	3VL9200-4PD40		1	1 unit	1CC		**3VL9300-4PD40**		1	1 unit	1CC
	3VL9300-4WF30		1	1 unit	1CC		**3VL9300-4WF30**		1	1 unit	1CC
	3VL9300-4WG30		1	1 unit	1CC		**3VL9300-4WG30**		1	1 unit	1CC
	3VL9300-4WF40		1	1 unit	1CC		**3VL9300-4WF40**		1	1 unit	1CC
	3VL9300-4WG40		1	1 unit	1CC		**3VL9300-4WG40**		1	1 unit	1CC
	3VL9200-4WA30		1	1 unit	1CC		**3VL9300-4WA30**		1	1 unit	1CC
	3VL9200-4WB30		1	1 unit	1CC		**3VL9300-4WB30**		1	1 unit	1CC
	3VL9200-4WA40		1	1 unit	1CC		**3VL9300-4WA40**		1	1 unit	1CC
	3VL9200-4WB40		1	1 unit	1CC		**3VL9300-4WB40**		1	1 unit	1CC
	3VL9200-4WC30		1	1 unit	1CC		**3VL9300-4WC30**		1	1 unit	1CC
	3VL9200-4WD30		1	1 unit	1CC		**3VL9300-4WD30**		1	1 unit	1CC
	3VL9200-4WC40		1	1 unit	1CC		**3VL9300-4WC40**		1	1 unit	1CC
	3VL9200-4WD40		1	1 unit	1CC		**3VL9300-4WD40**		1	1 unit	1CC
	3VL9200-4PS30		1	1 unit	1CC		**3VL9300-4PS30**		1	1 unit	1CC
	3VL9200-4PS40		1	1 unit	1CC		**3VL9300-4PS40**		1	1 unit	1CC
	3VL9300-4PF00		1	1 unit	1CC		**3VL9300-4PF00**		1	1 unit	1CC
	1) **3VL9300-4PJ00**		1	1 unit	1CC		1) **3VL9300-4PJ00**		1	1 unit	1CC
	3VL9000-4WL00		1	1 unit	1CC		**3VL9000-4WL00**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Accessories and spare parts

Plug-in versions/withdrawable versions

Version	SD	For VL400 (3VL4) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
3 or 4-pole						
Plug-in base assembly kits Base, blade contacts for circuit breakers, terminal covers for degree of protection IP20, fixing screws, trip pin						
Rear connections						
3-pole		**3VL9400-4PA30**		1	1 unit	1CC
3-pole with RCD module		**--**[1]				
4-pole		**3VL9400-4PA40**		1	1 unit	1CC
4-pole with RCD module		**3VL9400-4PB40**		1	1 unit	1CC
90°angle connecting adapters						
For rear connection, 3-pole		--				
For rear connection, 4-pole		--				
Front connections						
3-pole		**3VL9400-4PC30**		1	1 unit	1CC
3-pole with RCD module		**--**[1]				
4-pole		**3VL9400-4PC40**		1	1 unit	1CC
4-pole with RCD module		**3VL9400-4PD40**		1	1 unit	1CC
Withdrawable version assembly kits Upgrade of the plug-in base assembly kit to						
Withdrawable version including side panels and racking mechanism. 3-pole		**3VL9400-4WF30**		1	1 unit	1CC
3-pole with RCD		**--**[1]				
4-pole		**3VL9400-4WF40**		1	1 unit	1CC
4-pole with RCD		**3VL9400-4WG40**		1	1 unit	1CC
Withdrawable versions Same as plug-in base assembly kit, with additional side panels and racking mechanism						
Rear connections[3]						
3-pole		**3VL9400-4WA30**		1	1 unit	1CC
3-pole with RCD module		**--**[1]				
4-pole		**3VL9400-4WA40**		1	1 unit	1CC
4-pole with RCD module		**3VL9400-4WB40**		1	1 unit	1CC
Front connections						
3-pole		**3VL9400-4WC30**		1	1 unit	1CC
3-pole with RCD module		**--**[1]				
4-pole		**3VL9400-4WC40**		1	1 unit	1CC
4-pole with RCD module		**3VL9400-4WD40**		1	1 unit	1CC
Blade contacts As replacement for converting fixed-mounted circuit breakers into plug-in/withdrawable circuit breakers, including trip pin						
1 set = 6 units 3-pole		**3VL9400-4PS30**		1	1 unit	1CC
1 set = 8 units 4-pole		**3VL9400-4PS40**		1	1 unit	1CC
Trip pins and springs						
As replacement for plug-in/withdrawable circuit breaker		**3VL9400-4PF00**		1	1 unit	1CC
Auxiliary circuit plug connections for plug-in bases Accessory connections for plug-in circuit breakers (factory-wired connectors) and for plug-in bases or withdrawable version (coupling with screw terminal)		[2]				
8 terminals		**3VL9400-4PJ00**		1	1 unit	1CC
Position signaling switches (Connected/disconnected position) For plug-in/withdrawable base, 1 changeover contact, max. 2 signaling switches possible		**3VL9000-4WL00**		1	1 unit	1CC


3VL9.00-4PA30


3VL9.00-4WA30


3VL9000-4WL00

1) For 3-pole applications please use 4-pole withdrawable version with 4-pole RCD module and 4-pole circuit breaker.

2) It is recommended to use a maximum of 3 auxiliary circuit plug-in systems per circuit breaker (24 terminals).

3) With VL800 (3VL6) to VL1600 (3VL8) as vertical connection.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL630 (3VL5)		PU (UNIT, SET, M)	PS	PG	SD	For VL800 (3VL6)		PU (UNIT, SET, M)	PS	PG
	Article No. www.siemens.com/product?Article No.	Price per PU					Article No. www.siemens.com/product?Article No.	Price per PU			
d						d					
	3VL9500-4PA30		1	1 unit	1CC		**--**				
	--						**--**				
	3VL9500-4PA40		1	1 unit	1CC		**--**				
	--						**--**				
	--						**--**				
	--						**--**				
	3VL9500-4PC30		1	1 unit	1CC		**--**				
	–						**--**				
	3VL9500-4PC40		1	1 unit	1CC		**--**				
	--						**--**				
	3VL9500-4WF30		1	1 unit	1CC		**--**				
	--						**--**				
	3VL9500-4WF40		1	1 unit	1CC		**--**				
	--						**--**				
	3VL9500-4WA30		1	1 unit	1CC		**3VL9600-4WA30**		1	1 unit	1CC
	--						**--**				
	3VL9500-4WA40		1	1 unit	1CC		**3VL9600-4WA40**		1	1 unit	1CC
	--						**--**				
	3VL9500-4WC30		1	1 unit	1CC		**3VL9600-4WC30**		1	1 unit	1CC
	--						**--**				
	3VL9500-4WC40		1	1 unit	1CC		**3VL9600-4WC40**		1	1 unit	1CC
	--						**--**				
	3VL9500-4PS30		1	1 unit	1CC		**3VL9600-4PS30**		1	1 unit	1CC
	3VL9500-4PS40		1	1 unit	1CC		**3VL9600-4PS40**		1	1 unit	1CC
	3VL9500-4PF00		1	1 unit	1CC		**3VL9600-4PF00**		1	1 unit	1CC
	2)						**2)**				
	3VL9600-4PJ00		1	1 unit	1CC		**3VL9600-4PJ00**		1	1 unit	1CC
	3VL9000-4WL00		1	1 unit	1CC		**3VL9000-4WL00**		1	1 unit	1CC

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Accessories and spare parts

Plug-in versions/withdrawable versions

	Version	SD	For VL1250 (3VL7) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	3 or 4-pole						
 3VL9.00-4PA30	**Plug-in base assembly kits** Base, blade contacts for circuit breakers, terminal covers for degree of protection IP20, fixing screws, trip pin						
	Rear connections						
	3-pole		--				
	3-pole with RCD module		--				
	4-pole		--				
	4-pole with RCD module		--				
	90°angle connecting adapters						
	For rear connection, 3-pole		--				
	For rear connection, 4-pole		--				
	Front connections						
	3-pole		--				
	3-pole with RCD module		--				
	4-pole		--				
	4-pole with RCD module		--				
	Withdrawable version assembly kits Upgrade of the plug-in base assembly kit to						
	Withdrawable version including side panels and racking mechanism. 3-pole		--				
	3-pole with RCD		--				
	4-pole		--				
	4-pole with RCD		--				
	Withdrawable versions Same as plug-in base assembly kit, with additional side panels and racking mechanism						
 3VL9.00-4WA30	**Rear connections**[1]						
	3-pole		**3VL9800-4WA30**		1	1 unit	1CC
	3-pole with RCD module		--				
	4-pole		**3VL9800-4WA40**		1	1 unit	1CC
	4-pole with RCD module		--				
	Front connections						
	3-pole		**3VL9800-4WC30**		1	1 unit	1CC
	3-pole with RCD module		--				
	4-pole		**3VL9800-4WC40**		1	1 unit	1CC
	4-pole with RCD module		--				
	Blade contacts As replacement for converting fixed-mounted circuit breakers into plug-in/withdrawable circuit breakers, including trip pin						
	1 set = 6 units 3-pole		**3VL9800-4PS30**		1	1 unit	1CC
	1 set = 8 units 4-pole		**3VL9800-4PS40**		1	1 unit	1CC
	Trip pins and springs As replacement for plug-in/withdrawable circuit breaker		**3VL9800-4PF00**		1	1 unit	1CC
	Auxiliary circuit plug connections for plug-in bases Accessory connections for plug-in circuit breakers (factory-wired connectors) and for plug-in bases or withdrawable version (coupling with screw terminal)		[2]				
	8 terminals		**3VL9800-4PJ00**		1	1 unit	1CC
 3VL9000-4WL00	**Position signaling switches** (Connected/disconnected position) For plug-in/withdrawable base, 1 changeover contact, max. 2 signaling switches possible		**3VL9000-4WL00**		1	1 unit	1CC

1) With VL800 (3VL6) to VL1600 (3VL8) as vertical connection.

2) It is recommended to use a maximum of 3 auxiliary circuit plug-in systems per circuit breaker (24 terminals).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL1600 (3VL8) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
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	3VL9800-4WA30		1	1 unit	1CC
	--				
	3VL9800-4WA40		1	1 unit	1CC
	--				
	3VL9800-4WC30		1	1 unit	1CC
	--				
	3VL9800-4WC40		1	1 unit	1CC
	--				
	3VL9800-4PS30		1	1 unit	1CC
	3VL9800-4PS40		1	1 unit	1CC
	3VL9800-4PF00		1	1 unit	1CC
	2)				
	3VL9800-4PJ00		1	1 unit	1CC
	3VL9000-4WL00		1	1 unit	1CC

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RCD modules



Molded case circuit breakers VL160X to VL400 with RCD module mounted below the circuit breaker

Circuit breakers for line protection, **only for TM, starters, disconnectors**	Rated current I_n	Residual currents I adjustable	Delay t_d adjustable	Rated operational voltage U_e	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	s	V AC	d					
3-pole										
VL160X (3VL1)		0.03	Instantaneous							
Bottom mounting[1)2)]	160	0.10	0.06	127 ... 480		**3VL9112-5GA30**		1	1 unit	1CC
VL160 (3VL2)	160	0.30	0.10	127 ... 480		**3VL9216-5GC30**		1	1 unit	1CC
		0.50	0.25	230 ... 690		**3VL9216-5GD30**		1	1 unit	1CC
VL250 (3VL3)	250	1.00	0.50	127 ... 480		**3VL9325-5GE30**		1	1 unit	1CC
		3.00	1.00	230 ... 690		**3VL9325-5GF30**		1	1 unit	1CC
VL400 (3VL4)	400			127 ... 480		**--**				
				230 ... 690		**--**				
4-pole										
VL160X (3VL1)		0.03	Instantaneous							
Bottom mounting[1)2)]	160	0.10	0.06	127 ... 480		**3VL9112-5GA40**		1	1 unit	1CC
VL160 (3VL2)	160	0.30	0.10	127 ... 480		**3VL9216-5GC40**		1	1 unit	1CC
		0.50	0.25	230 ... 690		**3VL9216-5GD40**		1	1 unit	1CC
VL250 (3VL3)	250	1.00	0.50	127 ... 480		**3VL9325-5GE40**		1	1 unit	1CC
		3.00	1.00	230 ... 690		**3VL9325-5GF40**		1	1 unit	1CC
VL400 (3VL4)	400			127 ... 480		**3VL9440-5GG40**		1	1 unit	1CC
				230 ... 690		**3VL9440-5GH40**		1	1 unit	1CC

Circuit breakers with RCD module



Circuit breakers for line protection, **only for TM, starters, disconnectors**	Rated current I_n	Residual currents I adjustable	Delay t_d adjustable	Rated operational voltage U_e	**3-pole circuit breakers** Article No. with **"-Z"** **3VL. . .-.D . . .-. . . .-Z** and additional order code	Additional price	**4-pole circuit breakers** Article No. with **"-Z"** **3VL. . .-.E . . .-. . . .-Z** and additional order code	Additional price
	A	A	s	V AC	□□□ Code for further versions **-Z**		□□□ Code for further versions **-Z**	
3 and 4-pole								
VL160X (3VL1)		0.03	Instanta-neous					
(Bottom mounting)	160	0.10	0.06	127 ... 480	**A 0 1** [1)2)]		**A 0 1** [1)2)]	
		0.30	0.10					
		0.50	0.25					
VL160 (3VL2)	160	1.00	0.50	127 ... 480	**A 0 1**		**A 0 1**	
		3.00	1.00	230 ... 690	**A 0 2**		**A 0 2**	
VL250 (3VL3)	250			127 ... 480	**A 0 1**		**A 0 1**	
				230 ... 690	**A 0 2**		**A 0 2**	
VL400 (3VL4)	400			127 ... 480	**--**		**A 0 1**	
				230 ... 690	**--**		**A 0 2**	

Residual current devices (MRCD)



Modular residual current devices (MRCD) monitor residual currents in electrical systems and trip the molded case circuit breaker via an auxiliary release after an adjustable advance warning if the residual current exceeds a defined value.

See chapter "Monitoring Devices".

1) Only the right-hand accessory compartment and the N conductor (4-pole) accessory compartment can be used for the installation of accessories, see Technical Information at www.siemens.com/lowvoltage/product-support.

2) VL160X (3VL1) + RCD module cannot be combined with motorized operating mechanism, front operating mechanism, door-coupling rotary operating mechanism, locking device for toggle levers, screw terminal connections (3VL17..-....6-....) and Bowden cable interlocking.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version		SD	For VL160X (3VL1) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Connection parts for fixed-mounted circuit breakers[1]								
	3 or 4-pole							
	Front connecting bars[2] Phase barriers included.							
	Standard							
 3VL9216-4EC40	1 set = 3 units	3-pole		**3VL9216-4EC30**		1	1 unit	1CC
	1 set = 4 units	4-pole		**3VL9216-4EC40**		1	1 unit	1CC
	For increased pole spacing							
 3VL9216-4ED40	1 set = 3 units	3-pole		**3VL9216-4ED30**		1	1 unit	1CC
	1 set = 4 units	4-pole		**3VL9216-4ED40**		1	1 unit	1CC
	Rear connections							
 3VL9.00-4RA00, 3VL9.00-4RB00	Short connection (1 unit)			**3VL9100-4RA00**		1	1 unit	1CC
	Long connection (1 unit)			**3VL9100-4RB00**		1	1 unit	1CC
	Terminal kit (2 short + 1 long)	3-pole		**3VL9100-4RC30**		1	1 unit	1CC
	Terminal kit (2 short + 2 long)	4-pole		**3VL9100-4RF40**		1	1 unit	1CC
 3VL9.00-4RK00, 3VL9.00-4RL00	Short flat connection (1 unit)			**3VL9100-4RK00**		1	1 unit	1CC
	Long flat connection (1 unit)			**3VL9100-4RL00**		1	1 unit	1CC
	Flat connector kit (2 short + 1 long)	3-pole		**3VL9100-4RM30**		1	1 unit	1CC
	Flat connector kit (2 short + 2 long)	4-pole		**3VL9100-4RN40**		1	1 unit	1CC
 3VL9.00-4TC.0	**Box terminals** Connection for flexible flat copper busbar or cable, see Technical Information at www.siemens.com/lowvoltage/product-support.							
	1 set = 3 units			**3VL9100-4TC30**		1	1 unit	1CC
	1 set = 4 units			**3VL9100-4TC40**		1	1 unit	1CC
 3VL9.00-4TD.0	**Circular conductor terminals** Only for cables (Al or Cu), aluminum terminal (tinned)							
	1 set = 3 units			**3VL9100-4TD30**		1	1 unit	1CC
	1 set = 4 units			**3VL9100-4TD40**		1	1 unit	1CC
	Circular conductor terminals with terminal covers for cable (Al or Cu)							
	1 set = 3 units			**3VL9115-4TD30**		1	1 unit	1CC
	1 set = 4 units			**3VL9115-4TD40**		1	1 unit	1CC
	Auxiliary conductor terminals For box terminals/circular conductor terminals 1 set = 10 units			**3VL9200-3TN00**		1	1 unit	1CC
 3VL9.00-4TA.0	**Terminals with screw connection - metric thread** With insulator (for rear) for use with busbars and cable lugs, see Technical Information at www.siemens.com/lowvoltage/product-support.							
	1 set = 3 units			**3VL9116-4TA30**		1	1 unit	1CC
	1 set = 4 units			**3VL9116-4TA40**		1	1 unit	1CC
 NSE0_00730 3VL9.00-3CB.0	**Connection covers (terminal covers) for circuit breakers** Degree of protection IP30 for main connections 1 set = 2 units							
	Extended	3-pole		**3VL9300-8CA30**		1	1 unit	1CC
	Standard	3-pole		**3VL9300-8CB30**		1	1 unit	1CC
	Extended	4-pole		**3VL9300-8CA40**		1	1 unit	1CC
	Standard	4-pole		**3VL9300-8CB40**		1	1 unit	1CC
 NSE0_00731 3VL9.00-8CE00	**Phase barriers for circuit breakers, fixed-mounted, plug-in or withdrawable versions**							
	1 set = 2 units			**3VL9300-8CE00**		1	1 unit	1CC

[1] For an overview of connectable connection parts, see page 2/137.

[2] Screw terminal connections are required for VL160X and VL160 molded case circuit breakers (3VL1 and 3VL2), see Technical Information at www.siemens.com/lowvoltage/product-support.

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Accessories and spare parts

	Version		SD	For VL160 (3VL2) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Connection parts for fixed-mounted circuit breakers[1]								
	3 or 4-pole							
 3VL9216-4EC40	**Front connecting bars**[2] Phase barriers included.							
	Standard							
	1 set = 3 units	3-pole		**3VL9216-4EC30**		1	1 unit	1CC
	1 set = 4 units	4-pole		**3VL9216-4EC40**		1	1 unit	1CC
 3VL9216-4ED40	For increased pole spacing							
	1 set = 3 units	3-pole		**3VL9216-4ED30**		1	1 unit	1CC
	1 set = 4 units	4-pole		**3VL9216-4ED40**		1	1 unit	1CC
 3VL9.00-4R.00	**Rear connections**							
	Short connection (1 unit)			**3VL9200-4RA00**		1	1 unit	1CC
	Long connection (1 unit)			**3VL9200-4RB00**		1	1 unit	1CC
	Terminal kit (2 short + 1 long) 3-pole			**3VL9200-4RC30**		1	1 unit	1CC
	Terminal kit (2 short + 2 long) 4-pole			**3VL9200-4RF40**		1	1 unit	1CC
 3VL9.00-4R.00	Short flat connection (1 unit)			**3VL9200-4RK00**		1	1 unit	1CC
	Long flat connection (1 unit)			**3VL9200-4RL00**		1	1 unit	1CC
	Flat connector kit (2 short + 1 long) 3-pole			**3VL9200-4RM30**		1	1 unit	1CC
	Flat connector kit (2 short + 2 long) 4-pole			**3VL9200-4RN40**		1	1 unit	1CC
 3VL9.00-4TC.0	**Box terminal** Connection for flexible flat copper busbar or cable, see Technical Information at www.siemens.com/lowvoltage/product-support.							
	1 set = 3 units			**3VL9200-4TC30**		1	1 unit	1CC
	1 set = 4 units			**3VL9200-4TC40**		1	1 unit	1CC
 3VL9.00-4TD.0	**Circular conductor terminals** Only for cables (Al or Cu), aluminum terminal (tinned)							
	1 set = 3 units			**3VL9200-4TD30**		1	1 unit	1CC
	1 set = 4 units			**3VL9200-4TD40**		1	1 unit	1CC
	Circular conductor terminals with terminal covers for cable (Al or Cu)							
	1 set = 3 units			**3VL9215-4TD30**		1	1 unit	1CC
	1 set = 4 units			**3VL9215-4TD40**		1	1 unit	1CC
 3VL9.00-4TF.0	**Multiple feed-in terminal without terminal covers**							
	3 units (2 × 50 ... 120)			--				
	4 units (2 × 50 ... 120)			--				
	Multiple feed-in terminal with terminal covers							
	3 units (2 × 70 ... 300)			--				
	4 units (2 × 70 ... 300)			--				
	Auxiliary conductor terminals For box terminals/circular conductor terminals/multiple feed-in terminals 1 set = 10 units			**3VL9200-3TN00**		1	1 unit	1CC
 3VL9.00-4TA.0	**Terminals with screw connection - metric thread** With insulator (for rear) for use with busbars and cable lugs, see Technical Information at www.siemens.com/lowvoltage/product-support.							
	1 set = 3 units			**3VL9216-4TA30**		1	1 unit	1CC
	1 set = 4 units			**3VL9216-4TA40**		1	1 unit	1CC
 NSE0_00730 3VL9.00-3CB.0	**Connection covers (terminal covers) for circuit breakers** Degree of protection IP30 for main connections 1 set = 2 units							
	Extended	3-pole		**3VL9300-8CA30**		1	1 unit	1CC
	Standard	3-pole		**3VL9300-8CB30**		1	1 unit	1CC
	Extended	4-pole		**3VL9300-8CA40**		1	1 unit	1CC
	Standard	4-pole		**3VL9300-8CB40**		1	1 unit	1CC
 NSE0_00731 3VL9.00-3CB.0	**Phase barriers for circuit breakers, fixed-mounted, plug-in or withdrawable versions**							
	1 set = 2 units			**3VL9300-8CE00**		1	1 unit	1CC

[1] For an overview of connectable connection parts, see page 2/137.

[2] Screw terminal connections are required for VL160X and VL160 molded case circuit breakers (3VL1 and 3VL2), see Technical Information at www.siemens.com/lowvoltage/product-support.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL250 (3VL3) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL400 (3VL4) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9300-4EC30		1	1 unit	1CC		**3VL9400-4EC30**		1	1 unit	1CC
	3VL9300-4EC40		1	1 unit	1CC		**3VL9400-4EC40**		1	1 unit	1CC
	3VL9300-4ED30		1	1 unit	1CC		**3VL9400-4ED30**		1	1 unit	1CC
	3VL9300-4ED40		1	1 unit	1CC		**3VL9400-4ED40**		1	1 unit	1CC
	3VL9300-4RA00		1	1 unit	1CC		**3VL9400-4RA00**		1	1 unit	1CC
	3VL9300-4RB00		1	1 unit	1CC		**3VL9400-4RB00**		1	1 unit	1CC
	3VL9300-4RC30		1	1 unit	1CC		**3VL9400-4RC30**		1	1 unit	1CC
	3VL9300-4RF40		1	1 unit	1CC		**3VL9400-4RF40**		1	1 unit	1CC
	3VL9300-4RK00		1	1 unit	1CC		**3VL9400-4RK00**		1	1 unit	1CC
	3VL9300-4RL00		1	1 unit	1CC		**3VL9400-4RL00**		1	1 unit	1CC
	3VL9300-4RM30		1	1 unit	1CC		**3VL9400-4RM30**		1	1 unit	1CC
	3VL9300-4RN40		1	1 unit	1CC		**3VL9400-4RN40**		1	1 unit	1CC
	3VL9300-4TC30		1	1 unit	1CC		**3VL9400-4TC30**		1	1 unit	1CC
	3VL9300-4TC40		1	1 unit	1CC		**3VL9400-4TC40**		1	1 unit	1CC
	3VL9300-4TD30		1	1 unit	1CC		**3VL9400-4TD30**		1	1 unit	1CC
	3VL9300-4TD40		1	1 unit	1CC		**3VL9400-4TD40**		1	1 unit	1CC
	3VL9324-4TD30		1	1 unit	1CC		**--**				
	3VL9324-4TD40		1	1 unit	1CC		**--**				
	--						**3VL9400-4TF30**		1	1 unit	1CC
	--						**3VL9400-4TF40**		1	1 unit	1CC
	--						**3VL9460-4TF30**		1	1 unit	1CC
	--						**3VL9460-4TF40**		1	1 unit	1CC
	3VL9300-3TN00		1	1 unit	1CC		**3VL9400-3TN00**		1	1 unit	1CC
	3VL9300-4TA30		1	1 unit	1CC		**3VL9400-4TA30**		1	1 unit	1CC
	3VL9300-4TA40		1	1 unit	1CC		**3VL9400-4TA40**		1	1 unit	1CC
	3VL9300-8CA30		1	1 unit	1CC		**3VL9400-8CA30**		1	1 unit	1CC
	3VL9300-8CB30		1	1 unit	1CC		**3VL9400-8CB30**		1	1 unit	1CC
	3VL9300-8CA40		1	1 unit	1CC		**3VL9400-8CA40**		1	1 unit	1CC
	3VL9300-8CB40		1	1 unit	1CC		**3VL9400-8CB40**		1	1 unit	1CC
	3VL9300-8CE00		1	1 unit	1CC		**3VL9600-8CE00**		1	1 unit	1CC

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Accessories and spare parts

	Version		SD	For VL630 (3VL5) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Connection parts for fixed-mounted circuit breakers[1]								
	3 or 4-pole							
	Front connecting bars Phase barriers included.							
	Standard							
 3VL9216-4EC40	1 set = 3 units	3-pole		**3VL9500-4EC30**		1	1 unit	1CC
	1 set = 4 units	4-pole		**3VL9500-4EC40**		1	1 unit	1CC
	For increased pole spacing							
 3VL9216-4ED40	1 set = 3 units	3-pole		**3VL9500-4ED30**		1	1 unit	1CC
	1 set = 4 units	4-pole		**3VL9500-4ED40**		1	1 unit	1CC
 3VL9.00-4RG00	Flat connecting bar (1 unit)			**3VL9500-4RG00**		1	1 unit	1CC
	Flat connecting bars Set = 3 units, 3-pole			**3VL9500-4RH30**		1	1 unit	1CC
	Flat connecting bars Set = 4 units, 4-pole			**3VL9500-4RH40**		1	1 unit	1CC
 3VL9.00-4TG.0	**Multiple feed-in terminals** Only for cables (Al or Cu) Aluminum terminal (tinned)							
	1 set = 3 units			**3VL9500-4TG30**		1	1 unit	1CC
	1 set = 4 units			**3VL9500-4TG40**		1	1 unit	1CC
	Auxiliary conductor terminals For multiple feed-in terminals 1 set = 10 units			**3VL9400-3TN00**		1	1 unit	1CC
 3VL9.00-4TT.0	**Terminal plates**[2] Connection for flexible flat copper busbar with auxiliary conductor connection 0.5 – 4 mm^2 (extended terminal covers or phase barriers required)							
	1 set = 3 units			**3VL9500-4TT30**		1	1 unit	1CC
	1 set = 4 units			**3VL9500-4TT40**		1	1 unit	1CC
 3VL9.00-4TA.0	**Terminals with screw connection - metric thread** With insulator (for rear) for use with busbars and cable lugs, see Technical Information at www.siemens.com/lowvoltage/product-support.							
	1 set = 3 units			**3VL9500-4TA30**		1	1 unit	1CC
	1 set = 4 units			**3VL9500-4TA40**		1	1 unit	1CC
 3VL9.00-3CB.0	**Connection covers (terminal covers) for circuit breakers** Degree of protection IP30 for main connections 1 set = 2 units							
	Extended	3-pole		**3VL9600-8CA30**		1	1 unit	1CC
	Standard	3-pole		**3VL9600-8CB30**		1	1 unit	1CC
	Extended	4-pole		**3VL9600-8CA40**		1	1 unit	1CC
	Standard	4-pole		**3VL9600-8CB40**		1	1 unit	1CC
 3VL9.00-8CE00	**Phase barriers for circuit breakers, fixed-mounted, plug-in or withdrawable versions**[3]							
	1 set = 2 units			**3VL9600-8CE00**		1	1 unit	1CC

[1] For an overview of connectable connection parts, see page 2/137.

[2] Front connecting bars included in scope of supply; not for 690 V AC/600 V DC.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL800 (3VL6) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL1250 (3VL7) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9600-4EC30		1	1 unit	1CC		**3VL9800-4EC30**		1	1 unit	1CC
	3VL9600-4EC40		1	1 unit	1CC		**3VL9800-4EC40**		1	1 unit	1CC
	3VL9600-4ED30		1	1 unit	1CC		**--**				
	3VL9600-4ED40		1	1 unit	1CC		**--**				
	3VL9600-4RG00		1	1 unit	1CC		**3VL9700-4RG00**		1	1 unit	1CC
	3VL9600-4RH30		1	1 unit	1CC		**3VL9700-4RH30**		1	1 unit	1CC
	3VL9600-4RH40		1	1 unit	1CC		**3VL9700-4RH40**		1	1 unit	1CC
	3VL9600-4TG30		1	1 unit	1CC		**3VL9700-4TG30**		1	1 unit	1CC
	3VL9600-4TG40		1	1 unit	1CC		**3VL9700-4TG40**		1	1 unit	1CC
	3VL9400-3TN00		1	1 unit	1CC		**3VL9400-3TN00**		1	1 unit	1CC
	--						**--**				
	--						**--**				
	3VL9600-4TA30		1	1 unit	1CC		**3VL9800-4TA30**		1	1 unit	1CC
	3VL9600-4TA40		1	1 unit	1CC		**3VL9800-4TA40**		1	1 unit	1CC
	3VL9600-8CA30		1	1 unit	1CC		**3VL9800-8CA30**		1	1 unit	1CC
	3VL9600-8CB30		1	1 unit	1CC		**3VL9800-8CB30**		1	1 unit	1CC
	3VL9600-8CA40		1	1 unit	1CC		**3VL9800-8CA40**		1	1 unit	1CC
	3VL9600-8CB40		1	1 unit	1CC		**3VL9800-8CB40**		1	1 unit	1CC
	3VL9600-8CE00		1	1 unit	1CC		**3VL9800-8CE00**		1	1 unit	1CC

3) Plug-in versions: not for VL1250 (3VL7),
withdrawable version: not for VL800 (3VL6) and VL1250 (3VL7).

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Accessories and spare parts

	Version		SD	For VL1600 (3VL8) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Connection parts for fixed-mounted circuit breakers[1]								
	3 or 4-pole							
	Front connecting bars Phase barriers included.							
 3VL9216-4EC40	Standard[2]							
	1 set = 3 units	3-pole		**3VL9800-4EC30**		1	1 unit	1CC
	1 set = 4 units	4-pole		**3VL9800-4EC40**		1	1 unit	1CC
 3VL9216-4ED40	For increased pole spacing							
	1 set = 3 units	3-pole		--				
	1 set = 4 units	4-pole		--				
	Rear connections							
 3VL9.00-4RG00	Flat connecting bar (1 unit)			**3VL9800-4RG00**		1	1 unit	1CC
	Flat connecting bars Set = 3 units, 3-pole			**3VL9800-4RH30**		1	1 unit	1CC
	Flat connecting bars Set = 4 units, 4-pole			**3VL9800-4RH40**		1	1 unit	1CC
 3VL9.00-4TA.0	**Terminals with screw connection - metric thread** With insulator (for rear) for use with busbars and cable lugs, see Technical Information at www.siemens.com/lowvoltage/product-support.							
	1 set = 3 units			**3VL9800-4TA30**		1	1 unit	1CC
	1 set = 4 units			**3VL9800-4TA40**		1	1 unit	1CC
 NSE0_00730 3VL9.00-3CB.0	**Connection covers (terminal covers) for circuit breakers** Degree of protection IP30 for main connections 1 set = 2 units							
	Extended	3-pole		**3VL9800-8CA30**		1	1 unit	1CC
	Standard	3-pole		**3VL9800-8CB30**		1	1 unit	1CC
	Extended	4-pole		**3VL9800-8CA40**		1	1 unit	1CC
	Standard	4-pole		**3VL9800-8CB40**		1	1 unit	1CC
	Phase barriers for circuit breakers, fixed-mounted							
 NSE0_00731 3VL9.00-8CE00	1 set = 2 units			**3VL9800-8CE00**		1	1 unit	1CC

[1] For an overview of connectable connection parts, see page 2/137.

[2] In scope of supply of circuit breaker.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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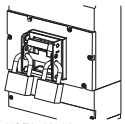
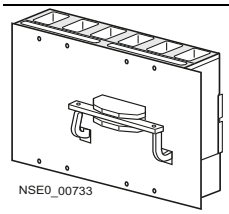
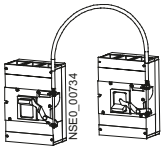
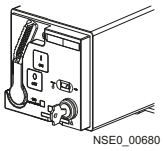
	Version	SD	For VL160X (3VL1) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Interlocks							
	3 or 4-pole						
 NSE0_00732 3VL9.00-3HL00	**Locking devices for toggle levers** For locking the circuit breaker in the "OFF" position. Up to 3 padlocks with a diameter of 5 – 8 mm can be used. Removable (padlocks not included)		**3VL9300-3HL00**		1	1 unit	1CC
 NSE0_00733 3VL9.00-8L.00	**Rear interlocking modules** For the mechanical interlocking of two adjacent circuit breakers. The circuit breakers must be of the same installation type and frame size. (Mounting plate not included in scope of supply)						
	Fixed-mounted circuit breakers		**3VL9300-8LC00**		1	1 unit	1CC
	Plug-in/withdrawable circuit breakers		**3VL9300-8LD00**		1	1 unit	1CC
 NSE0_00734 3VL9.00-8LA00	**Interlocking modules for Bowden cable interlocking**[1] For the mechanical interlocking of two circuit breakers. Interlocking module for one circuit breaker		Combination with next size up possible (see Article No.) **3VL9300-8LA00**		1	1 unit	1CC
	Bowden cables for Bowden cable interlocking[1]						
	Cable length 0.5 m		**3VL9000-8LH10**		1	1 unit	1CC
	Cable length 1.0 m		**3VL9000-8LH20**		1	1 unit	1CC
	Cable length 1.5 m		**3VL9000-8LH30**		1	1 unit	1CC
 NSE0_00680 3VL9...-8HA00	**Safety lock assembly kits** Key can be removed with the circuit breaker in the "OFF" position For front-operated rotary operating mechanisms						
	Lock types						
	Ronis		**3VL9715-8HA00**		1	1 unit	1CC
	For motorized operating mechanism with stored energy mechanism						
	Lock types						
	Ronis		**--**				
	Filli Giussani		**3VL9321-8HA00**		1	1 unit	1CC
	Sets of fixing screws (metric thread) Including the screws, washers and nuts required to secure a 3 or 4-pole circuit breaker to a prepared surface						
	Set with 4 screws		**3VL9300-8SA40**		1	1 unit	1CC
	Transparent covers for releases, sealable To prevent access by unqualified personnel and unauthorized changes to settings (seal not included)						
	Electronic Trip Unit		**--**				
	Thermal-magnetic		**3VL9300-8BM00**		1	1 unit	1CC

[1] Two interlocking modules and one Bowden cable are required.
Cannot be used in conjunction with motorized operating mechanism and withdrawable version!

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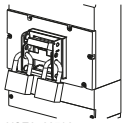
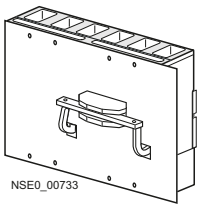
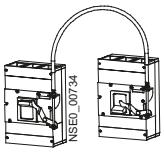
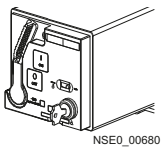
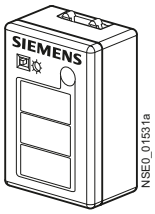
Accessories and spare parts

	Version	SD	For VL160 (3VL2) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Interlocks							
	3 or 4-pole						
 NSE0_00732 3VL9.00-3HL00	**Locking devices for toggle levers** For locking the circuit breaker in the "OFF" position. Up to 3 padlocks with a diameter of 5 – 8 mm can be used. Removable (padlocks not included)		**3VL9300-3HL00**		1	1 unit	1CC
 NSE0_00733 3VL9.00-8L.00	**Rear interlocking modules** For the mechanical interlocking of two adjacent circuit breakers. The circuit breakers must be of the same installation type and frame size. (Mounting plate not included in scope of supply)						
	Fixed-mounted circuit breakers		**3VL9300-8LC00**		1	1 unit	1CC
	Plug-in/withdrawable circuit breakers		**3VL9300-8LD00**		1	1 unit	1CC
 NSE0_00734 3VL9.00-8LA00	**Interlocking modules for Bowden cable interlocking**[1] For the mechanical interlocking of two circuit breakers.		Combinations with next size up/down possible (see Article No.)				
	Interlocking module for one circuit breaker		**3VL9300-8LA00**		1	1 unit	1CC
	Bowden cables for Bowden cable interlocking[1]						
	Cable length 0.5 m		**3VL9000-8LH10**		1	1 unit	1CC
	Cable length 1.0 m		**3VL9000-8LH20**		1	1 unit	1CC
	Cable length 1.5 m		**3VL9000-8LH30**		1	1 unit	1CC
 NSE0_00680 3VL9...-8HA00	**Safety lock assembly kits** Key can be removed with the circuit breaker in the "OFF" position For front-operated rotary operating mechanisms						
	Lock types						
	Ronis		**3VL9715-8HA00**		1	1 unit	1CC
	For motorized operating mechanism with stored energy mechanism						
	Lock types						
	Ronis		**--**				
	Filli Giussani		**3VL9321-8HA00**		1	1 unit	1CC
	Sets of fixing screws (metric thread) Including the screws, washers and nuts required to secure a 3 or 4-pole circuit breaker to a prepared surface						
	Set with 4 screws		**3VL9300-8SA40**		1	1 unit	1CC
 NSE0_01531a 3VL9000-8AP01	**Transparent covers for releases, sealable** To prevent access by unqualified personnel and unauthorized changes to settings (seal not included)						
	Electronic Trip Unit		**3VL9700-8BL00**		1	1 unit	1CC
	Thermal-magnetic		**3VL9300-8BM00**		1	1 unit	1CC
	Battery power supply for activating/parameterizing the LCD ETUs, with test function for all IEC and UL ETUs (two 9 V blocks are required in addition)		**3VL9000-8AP01**		1	1 unit	1CC

[1] Two interlocking modules and one Bowden cable are required.
Cannot be used in conjunction with motorized operating mechanism and withdrawable version!

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL250 (3VL3) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL400 (3VL4) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9300-3HL00		1	1 unit	1CC		**3VL9400-3HL00**		1	1 unit	1CC
	3VL9300-8LC00		1	1 unit	1CC		**3VL9400-8LC00**		1	1 unit	1CC
	3VL9300-8LD00		1	1 unit	1CC		**3VL9400-8LD00**		1	1 unit	1CC
	3VL9300-8LA00		1	1 unit	1CC		**3VL9400-8LA00**		1	1 unit	1CC
	3VL9000-8LH10		1	1 unit	1CC		**--**				
	3VL9000-8LH20		1	1 unit	1CC		**3VL9000-8LH20**		1	1 unit	1CC
	3VL9000-8LH30		1	1 unit	1CC		**3VL9000-8LH30**		1	1 unit	1CC
	3VL9715-8HA00		1	1 unit	1CC		**3VL9715-8HA00**		1	1 unit	1CC
	--						**3VL9715-8HA00**		1	1 unit	1CC
	3VL9321-8HA00		1	1 unit	1CC		**--**				
	3VL9300-8SA40		1	1 unit	1CC		**3VL9500-8SA40**		1	1 unit	1CC
	3VL9700-8BL00		1	1 unit	1CC		**3VL9700-8BL00**		1	1 unit	1CC
	3VL9300-8BM00		1	1 unit	1CC		**3VL9400-8BM00**		1	1 unit	1CC
	3VL9000-8AP01		1	1 unit	1CC		**3VL9000-8AP01**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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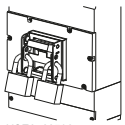
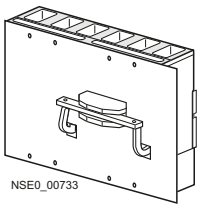
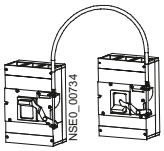
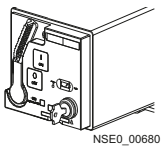
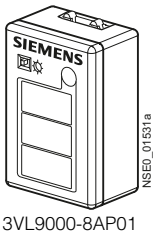
Accessories and spare parts

	Version	SD	For VL630 (3VL5) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Interlocks							
	3 or 4-pole						
 NSE0_00732 3VL9.00-3HL00	**Locking devices for toggle levers** For locking the circuit breaker in the "OFF" position. Up to 3 padlocks with a diameter of 5 – 8 mm can be used. Removable (padlocks not included)		**3VL9600-3HL00**		1	1 unit	1CC
 NSE0_00733 3VL9.00-8L.00	**Rear interlocking modules** For the mechanical interlocking of two adjacent circuit breakers. The circuit breakers must be of the same installation type and frame size. (Mounting plate not included in scope of supply)						
	Fixed-mounted circuit breakers		**3VL9600-8LC00**		1	1 unit	1CC
	Plug-in/withdrawable circuit breakers		**3VL9600-8LD00**		1	1 unit	1CC
 NSE0_00734 3VL9.00-8LA00	**Interlocking modules for Bowden cable interlocking**[1] For the mechanical interlocking of two circuit breakers.		Combinations with next size up/down possible (see Article No.)				
	Interlocking module for one circuit breaker		**3VL9600-8LA00**		1	1 unit	1CC
	Bowden cables for Bowden cable interlocking[1]						
	Cable length 0.5 m		**--**				
	Cable length 1.0 m		**3VL9000-8LH20**		1	1 unit	1CC
	Cable length 1.5 m		**3VL9000-8LH30**		1	1 unit	1CC
 NSE0_00680 3VL9...-8HA00	**Safety lock assembly kits** Key can be removed with the circuit breaker in the "OFF" position For front-operated rotary operating mechanisms						
	Lock types						
	Ronis		**3VL9715-8HA00**		1	1 unit	1CC
	For motorized operating mechanism with stored energy mechanism						
	Lock types						
	Ronis		**3VL9715-8HA00**		1	1 unit	1CC
	Filli Giussani		**--**				
	Sets of fixing screws (metric thread) Including the screws, washers and nuts required to secure a 3 or 4-pole circuit breaker to a prepared surface						
	Set with 4 screws		**3VL9500-8SA40**		1	1 unit	1CC
 NSE0_01531a 3VL9000-8AP01	**Transparent covers for releases, sealable** To prevent access by unqualified personnel and unauthorized changes to settings (seal not included)						
	Electronic Trip Units		**3VL9700-8BL00**		1	1 unit	1CC
	Thermal-magnetic		**3VL9600-8BM00**		1	1 unit	1CC
	Battery power supply for activating/parameterizing the LCD ETUs, with test function for all IEC and UL ETUs (two 9 V blocks are required in addition)		**3VL9000-8AP01**		1	1 unit	1CC

[1] Two interlocking modules and one Bowden cable are required. Cannot be used in conjunction with motorized operating mechanism and withdrawable version!

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL800 (3VL6) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL1250 (3VL7) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9600-3HL00		1	1 unit	1CC		**3VL9800-3HL00**		1	1 unit	1CC
	3VL9600-8LC00		1	1 unit	1CC		**3VL9800-8LC00**		1	1 unit	1CC
	3VL9600-8LD00		1	1 unit	1CC		**3VL9800-8LD00**		1	1 unit	1CC
	3VL9600-8LA00		1	1 unit	1CC		**3VL9800-8LA00**		1	1 unit	1CC
	--						**--**				
	3VL9000-8LH20		1	1 unit	1CC		**--**				
	3VL9000-8LH30		1	1 unit	1CC		**3VL9000-8LH30**		1	1 unit	1CC
	3VL9715-8HA00		1	1 unit	1CC		**3VL9715-8HA00**		1	1 unit	1CC
	3VL9715-8HA00		1	1 unit	1CC		**3VL9715-8HA00**		1	1 unit	1CC
	--						**--**				
	3VL9600-8SA40		1	1 unit	1CC		**3VL9800-8SA40**		1	1 unit	1CC
	3VL9700-8BL00		1	1 unit	1CC		**3VL9700-8BL00**		1	1 unit	1CC
	--						**--**				
	3VL9000-8AP01		1	1 unit	1CC		**3VL9000-8AP01**		1	1 unit	1CC

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Accessories and spare parts

Interlocks

	Version	SD	For VL1600 (3VL8) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
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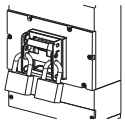
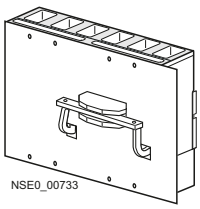
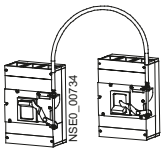
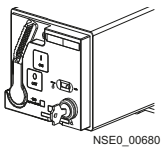
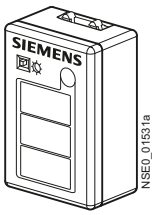
	3 or 4-pole						
 NSE0_00732 3VL9.00-3HL00	**Locking devices for toggle levers** For locking the circuit breaker in the "OFF" position. Up to 3 padlocks with a diameter of 5 – 8 mm can be used. Removable (padlocks not included)		**3VL9800-3HL00**		1	1 unit	1CC
 NSE0_00733 3VL9.00-8L.00	**Rear interlocking modules** For the mechanical interlocking of two adjacent circuit breakers. The circuit breakers must be of the same installation type and frame size.						
	Circuit breakers, fixed-mounted[1]		**3VL9800-8LC00**		1	1 unit	1CC
	Plug-in/withdrawable circuit breakers		**3VL9800-8LD00**		1	1 unit	1CC
 NSE0_00734 3VL9.00-8LA00	**Interlocking modules for Bowden cable interlocking[2]** For the mechanical interlocking of two circuit breakers. Interlocking module for one circuit breaker		**3VL9800-8LA00**		1	1 unit	1CC
	Bowden cables for Bowden cable interlocking[2]						
	Cable length 0.5 m		--				
	Cable length 1.0 m		--				
	Cable length 1.5 m		**3VL9000-8LH30**		1	1 unit	1CC
 NSE0_00680 3VL9...-8HA00	**Safety lock assembly kits** Key can be removed with the circuit breaker in the "OFF" position						
	For front-operated rotary operating mechanisms						
	Lock types						
	Ronis		**3VL9715-8HA00**		1	1 unit	1CC
	For motorized operating mechanisms						
	Lock types						
	Ronis		**3VL9715-8HA00**		1	1 unit	1CC
	Filli Giussani		--				
	Sets of fixing screws (metric thread) Including the screws, washers and nuts required to secure a 3 or 4-pole circuit breaker to a prepared surface						
	Set with 4 screws		**3VL9800-8SA40**		1	1 unit	1CC
 NSE0_01531a 3VL9000-8AP01	**Transparent covers for releases, sealable** To prevent access by unqualified personnel and unauthorized changes to settings (seal not included)						
	Electronic Trip Unit		**3VL9700-8BL00**		1	1 unit	1CC
	Thermal-magnetic		--				
	Battery power supply for activating/parameterizing the LCD ETUs, with test function for all IEC and UL ETUs (two 9 V blocks are required in addition)		**3VL9000-8AP01**		1	1 unit	1CC

1) Mounting plate not included in scope of supply.

2) Two interlocking modules and one Bowden cable are required. Cannot be used in conjunction with motorized operating mechanism and withdrawable version!

Minimum order quantity (PS) or a multiple thereof can be ordered.

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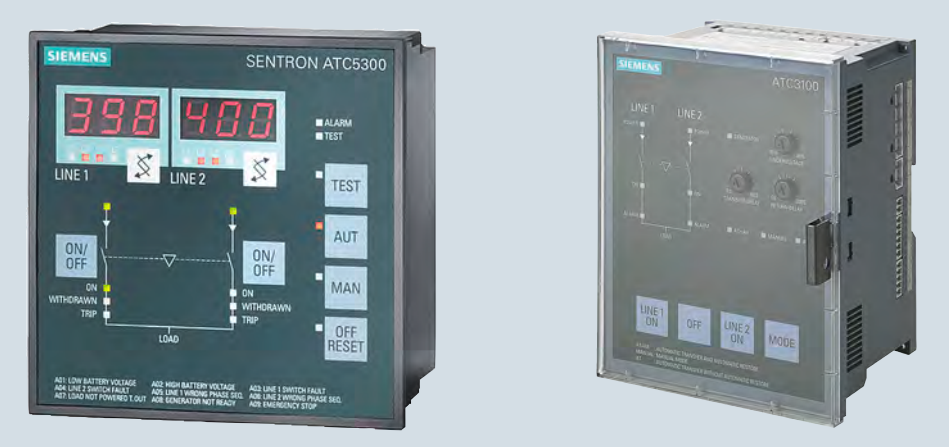
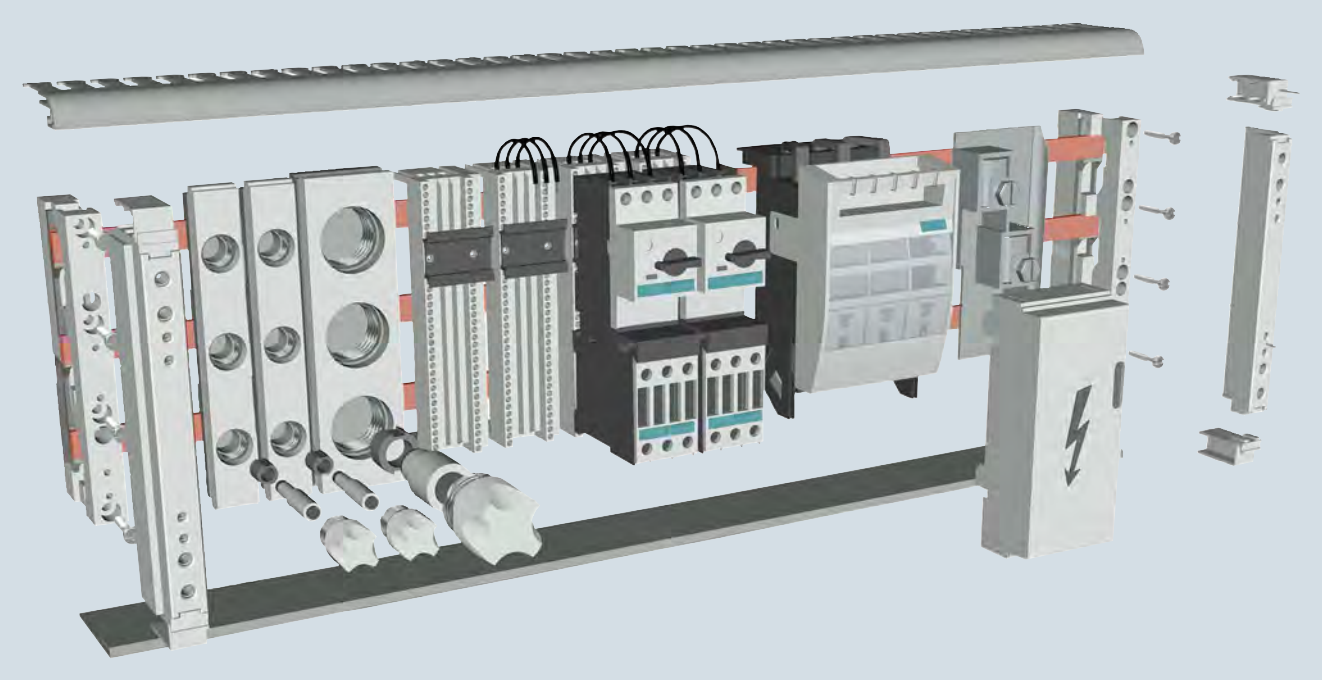
Transfer control devices



3KC ATC5300 and NEW ATC3100 transfer control devices. For combination with two air circuit breakers/molded case circuit breakers for changeover according to 60947-6-1.

For more information, see chapter "Transfer Switching Equipment and Load Transfer Switches".

Busbar systems



Busbar adapter systems with 40 mm or 60 mm busbar center-to-center spacing with components for busbar runs, adapters and switching device holders for individual equipment possibilities, devices with an integrated adapter, as well as accessories and flat copper profiles. Observe the short-circuit strength of the busbar system. Short-circuit strength greater than 50 kA on request.

For more information, see chapter "Busbar Systems".

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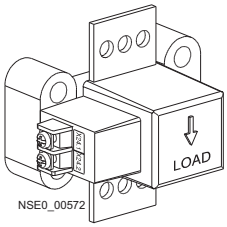
Accessories and spare parts

Further accessories

Current transformers (-T6) for N conductor/grounded neutral point of the transformer for ground-fault protection in 4-wire three-phase systems [1)]



Type	Rated current I_n A	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
VL160/3VL2	63, 80		**3VL9280-8TC00**		1	1 unit	1CC
	100		**3VL9210-8TC00**		1	1 unit	1CC
	160		**3VL9216-8TC00**		1	1 unit	1CC
VL250/3VL3	200		**3VL9320-8TC00**		1	1 unit	1CC
	250		**3VL9325-8TC00**		1	1 unit	1CC
VL400/3VL4	315		**3VL9440-8TC00**		1	1 unit	1CC
	400		**3VL9440-8TC00**		1	1 unit	1CC
VL630/3VL5	630		**3VL9563-8TC00**		1	1 unit	1CC
VL800/3VL6	800		**3VL9680-8TC00**		1	1 unit	1CC
VL1250/3VL7	1000		**3VL9712-8TC00**		1	1 unit	1CC
	1250		**3VL9712-8TC00**		1	1 unit	1CC
VL1600/3VL8	1600		**3VL9816-8TC00**		1	1 unit	1CC

[1)] Please note the rated current of the circuit breaker.

Current transformers for measuring purposes



4NC53 current transformer

See also chapter "Measuring Devices and Power Monitoring" under Accessories.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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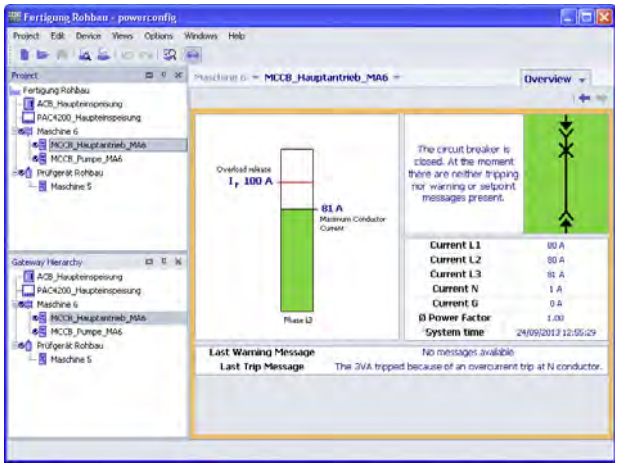
Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
Accessories for communication						
3 or 4-pole						
Data transmission through COM20, COM21						
VL160 (3VL2) to VL1600 (3VL8)						
COM20 Release 2 (PROFIBUS module for 3VL molded case circuit breaker) for ETUs with communication function and LCD ETUs Module for connecting the 3VL molded case circuit breaker to the PROFIBUS DP, including switching function and Zone Selective Interlocking functionality, connecting cable to ETU included in delivery of the ETU, length 1.5 m.		**3VL9000-8AU00**		1	1 unit	1CC
COM21 Release 2 (MODBUS RTU module for 3VL molded case circuit breaker) for ETUs with communication function and LCD ETUs Module for connecting the 3VL molded case circuit breaker to the MODBUS RTU, including switching function and Zone Selective Interlocking functionality, connecting cable to ETU included in delivery of the ETU, length 1.5 m.		**3VL9000-8AV00**		1	1 unit	1CC
Connecting cable ETU - COM20/COM21 For VL160 ... VL250, length 3 m For VL630 ... VL1600, length 3 m For VL400, length 3 m		**3VL9000-8AQ81** **3VL9000-8AQ71** **3VL9000-8AQ61**		1 1 1	1 unit 1 unit 1 unit	1CC 1CC 1CC
Addressing plugs **For assigning the module addresses without using a PC/PG** On COM20/COM21 through the system interface	►	**3UF7910-0AA00-0**		1	1 unit	42J
powerconfig parameterization software						



Parameterization, operation, monitoring and diagnostics of 3VL molded case circuit breakers using powerconfig software see chapter "Software" "Configuring, Visualizing and Controlling with SENTRON".
powerconfig is available free of charge at
http://support.automation.siemens.com/WW/view/en/63452759
You can find more information on the Internet at:
www.siemens.com/sentron

Communication:

- For molded case circuit breakers with communication function, see pages 2/142 to 2/159, 2/170 to 2/180.
- For more information, see also chapter "Measuring Devices and Power Monitoring" and chapter "Software".

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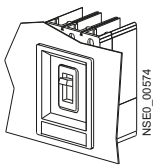
Accessories and spare parts

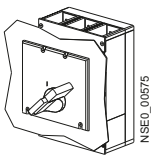
2

Further accessories

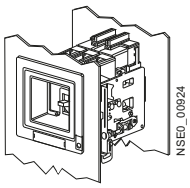
Version	SD	For VL160X (3VL1) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
3 or 4-pole						
Masking frames (cover frames) for door cut-outs						
A **IP40** Fixed-mounted or plug-in circuit breaker		**3VL9300-8BC00**		1	1 unit	1CC
B[1] **IP40** Fixed-mounted, plug-in or withdrawable circuit breaker with front-operated rotary operating mechanism or motorized operating mechanism (with or without SEO/MO stored energy mechanisms)		**3VL9300-8BG00**		1	1 unit	1CC
C **IP20** Withdrawable circuit breaker with toggle lever actuation. Assembly kit contains cover frame and extended escutcheon (cannot be used together with a motorized/rotary operating mechanism)		--				
D **IP40** Fixed-mounted circuit breaker or plug-in circuit breaker						
RCD circuit breaker masking frame		**3VL9300-8BD00**		1	1 unit	1CC
RCD masking frame		**3VL9300-8BD00**		1	1 unit	1CC
E[1] **IP40** Circuit breaker with RCD module and front-operated rotary operating mechanism. Assembly kit contains masking frame and extended escutcheon.		--				
Circuit breaker with RCD module and motorized operating mechanism. Assembly kit contains masking frame and extended escutcheon.		--				



Masking frame A



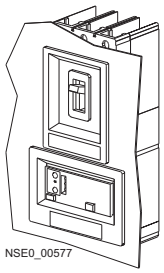
Masking frame 5



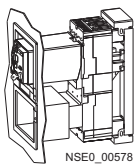
Masking frame C

Further accessories

Version	SD	For VL400 (3VL4) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
3 or 4-pole						
Masking frames (cover frames) for door cut-outs						
A **IP40** Fixed-mounted or plug-in circuit breaker		**3VL9400-8BC00**		1	1 unit	1CC
B[1)2)] **IP40** Fixed-mounted, plug-in or withdrawable circuit breaker with front-operated rotary operating mechanism or motorized operating mechanism (only with SEO stored energy mechanisms)		**3VL9400-8BG00**		1	1 unit	1CC
C **IP20** Withdrawable circuit breaker with toggle lever actuation. Assembly kit contains cover frame and extended escutcheon (cannot be used together with a motorized/rotary operating mechanism)		**3VL9400-8BH00**		1	1 unit	1CC
D **IP40** Fixed-mounted circuit breaker or plug-in circuit breaker						
RCD circuit breaker masking frame		**3VL9400-8BC00**		1	1 unit	1CC
RCD masking frame		**3VL9400-8BD00**		1	1 unit	1CC
E[1] **IP40** Circuit breaker with RCD module and front-operated rotary operating mechanism. Assembly kit contains masking frame and extended escutcheon.		**3VL9400-8BH00**		1	1 unit	1CC
Circuit breaker with RCD module and motorized operating mechanism. Assembly kit contains masking frame and extended escutcheon.		**3VL9400-8BJ00**		1	1 unit	1CC



Masking frame D



Masking frame E

[1] For withdrawable version IP20.

[2] For motorized operating mechanisms (without stored energy mechanism) for 3VL4-3VL6, use the Article No. 3VL9300-8BG00.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL160 (3VL2)		PU (UNIT, SET, M)	PS	PG	SD	For VL250 (3VL3)		PU (UNIT, SET, M)	PS	PG
	Article No. www.siemens.com/product?Article No.	Price per PU					Article No. www.siemens.com/product?Article No.	Price per PU			
d						d					
	3VL9300-8BC00		1	1 unit	1CC		**3VL9300-8BC00**		1	1 unit	1CC
	3VL9300-8BG00		1	1 unit	1CC		**3VL9300-8BG00**		1	1 unit	1CC
	3VL9300-8BH00		1	1 unit	1CC		**3VL9300-8BH00**		1	1 unit	1CC
	3VL9300-8BC00		1	1 unit	1CC		**3VL9300-8BC00**		1	1 unit	1CC
	3VL9300-8BD00		1	1 unit	1CC		**3VL9300-8BD00**		1	1 unit	1CC
	3VL9300-8BH00		1	1 unit	1CC		**3VL9300-8BH00**		1	1 unit	1CC
	3VL9300-8BJ00		1	1 unit	1CC		**3VL9300-8BJ00**		1	1 unit	1CC

SD	For VL630 (3VL5)		PU (UNIT, SET, M)	PS	PG	SD	For VL800 (3VL6)		PU (UNIT, SET, M)	PS	PG
	Article No. www.siemens.com/product?Article No.	Price per PU					Article No. www.siemens.com/product?Article No.	Price per PU			
d						d					
	3VL9600-8BC00		1	1 unit	1CC		**3VL9600-8BC00**		1	1 unit	1CC
	3VL9600-8BG00		1	1 unit	1CC		**3VL9600-8BG00**		1	1 unit	1CC
	3VL9600-8BH00		1	1 unit	1CC		**3VL9600-8BH00**		1	1 unit	1CC
	--						--				
	--						--				
	--						--				
	--						--				

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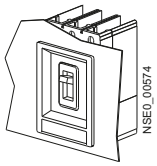
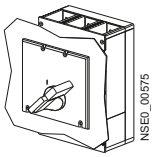
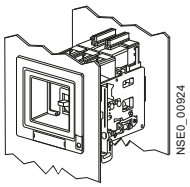
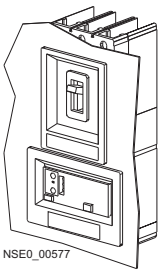
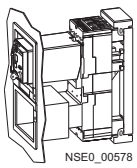
Accessories and spare parts

Further accessories

	Version	SD	For VL1250 (3VL7) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	3 or 4-pole						
	Masking frames (cover frames) for door cut-outs						
 Masking frame A	**A** **IP40** Fixed-mounted or plug-in circuit breaker		**3VL9800-8BC00**		1	1 unit	1CC
 Masking frame 5	**B**[1] **IP40** Fixed-mounted, plug-in or withdrawable circuit breaker with front-operated rotary operating mechanism or motorized operating mechanism.		**3VL9800-8BG00**		1	1 unit	1CC
 Masking frame C	**C** **IP20** Withdrawable circuit breaker with toggle lever actuation. Assembly kit contains cover frame and extended escutcheon (cannot be used together with a motorized/rotary operating mechanism)		**3VL9800-8BH00**		1	1 unit	1CC
 Masking frame D	**D** **IP40** Fixed-mounted circuit breaker or plug-in circuit breaker RCD circuit breaker masking frame RCD masking frame		-- --				
 Masking frame E	**E**[1] **IP40** Circuit breaker with RCD module and front-operated rotary operating mechanism. Assembly kit contains masking frame and extended escutcheon. Circuit breaker with RCD module and motorized operating mechanism. Assembly kit contains masking frame and extended escutcheon.		-- --				

[1] For withdrawable version IP20.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL1600 (3VL8)		PU (UNIT, SET, M)	PS	PG
d	Article No. www.siemens.com/product?Article No.	Price per PU			
	3VL9800-8BC00		1	1 unit	1CC
	3VL9800-8BG00		1	1 unit	1CC
	3VL9800-8BH00		1	1 unit	1CC
	--				
	--				
	--				
	--				

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More information

Manual for the 3VL molded case circuit breaker

This manual contains additional technical information, covering a product description, mode of operation, electrical wiring system and retrofitting.

The manual and operating instructions are available in PDF format at:

www.siemens.com/lowvoltage/manuals

SENTRON manual for communication solutions

Free download from
www.siemens.com/lowvoltage/manuals

See chapter "Software", "3WL Air Circuit Breakers/Non-Automatic Air Circuit Breakers up to 6300 A (AC), IEC", "Accessories and spare parts".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Note

You will find the 3VL molded case circuit breakers up to 1600 A according to UL 489 from page 2/228 onwards.

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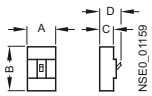
Overview






Type		VL150X UL, CG frame	VL150 UL, DG frame	VL250 UL, FG frame	VL400 UL, JG frame
Molded case circuit breakers					
3VL molded case circuit breakers up to 1600 A, according to UL 489					
Rated current I_n [1] at 40 °C ambient temperature	A	20 to 150	50 to 150	100 to 250	250 to 400
Number of poles		3	3	3	3
Rated operational voltage U_e (UL)					
50/60 Hz AC	V	480, 600/347	480, 600/347	400, 600/347	600
DC [2]	V	250	500	500	500
Trip units					
Thermal-magnetic		✓	✓	✓	✓
Electronic, ETU with setting knobs		--	✓	✓	✓
Electronic LCD ETU		--	✓	✓	✓
Dimensions					
 A	mm	105	105	105	139
B	mm	157	175	175	279
C	mm	81	81	81	102
D	mm	107	107	107	138
Breaking capacity					
Standard breaking capacity N (N)					
Up to 240 V AC	kA	65	65	65	65
Up to 480 V AC	kA	35	35	35	35
Up to 600 V AC	kA	--	--	--	25
Up to 600/347 V AC	kA	10	18	18	--
Up to 250 V DC [3]	kA	30	30	30	30
Up to 500 V DC [3] [4]	kA	--	18	18	25
Breaking capacity I_{cu}/I_{cs} RMS value acc. to IEC 60947-2					
Up to 240 V AC	kA	65/65	65/65	65/65	65/65
Up to 415 V AC	kA	40/40	40/40	40/40	45/45
Up to 690 V AC	kA	8/4 [5]	12/6	12/6	12/6
Up to 250 V DC [3]	kA	30/30	30/30	30/30	30/30
High breaking capacity H (H)					
Up to 240 V AC	kA	100	100	100	100
Up to 480 V AC	kA	65	65	65	65
Up to 600 V AC	kA	--	--	--	25
Up to 600/347 V AC	kA	10	18	18	--
Up to 250 V DC [3]	kA	30	30	30	30
Up to 500 V DC [3] [4]	kA	--	18	25	35
Breaking capacity I_{cu}/I_{cs} RMS value acc. to IEC 60947-2					
Up to 240 V AC	kA	100/75	100/75	100/75	100/75
Up to 415 V AC	kA	70/70	70/70	70/70	70/70
Up to 690 V AC	kA	10/5 [5]	12/6	12/6	15/8
Up to 250 V DC [3]	kA	30/30	30/30	30/30	30/30
Very high breaking capacity L (L)					
Up to 240 V AC	kA	--	200	200	200
Up to 480 V AC	kA	--	100	100	100
Up to 600 V AC	kA	--	--	--	25
Up to 600/347 V AC	kA	--	18	18	--
Up to 250 V DC [3]	kA	--	30	30	30
Up to 500 V DC [3] [4]	kA	--	18	30	35
Breaking capacity I_{cu}/I_{cs} RMS value acc. to IEC 60947-2					
Up to 240 V AC	kA	--	200/150	200/150	200/150
Up to 415 V AC	kA	--	100/75	100/75	100/75
Up to 690 V AC	kA	--	12/6	12/6	15/8
Up to 250 V DC [3]	kA	--	30/30	30/30	30/30

✓ Available -- Not available

1) 80% rated current applications according to UL 489, 100% rated current applications according to IEC 60947-2.

2) Rated DC voltage applies only for molded case circuit breakers with thermal-magnetic release.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	VL400X UL, LG frame	VL800 UL, MG frame	VL1200 UL, NG frame	VL1600 UL, PG frame
3VL molded case circuit breakers up to 1600 A, according to UL 489				
400 to 600	600 to 800	800 to 1200	1200 to 1600	
3	3	3	3	
600 500	600 500	600 500	600 500	
✓ ✓ ✓	✓ ✓ ✓	✓ ✓ ✓	✓ ✓ ✓	
139 279 102 138	190 406 118 151	229 406 157 209	229 406 157 209	
65 35 18 -- 30 25	65 35 25 -- 22 35	65 35 25 -- 22 35	65 35 25 -- 22 35	
65/65 45/45 12/6 30/30	65/65 50/50 20/10 30/30	65/35 50/25 20/10 30/30	65/35 50/25 20/10 30/30	
100 65 18 -- 30 35	100 65 35 -- 25 50	100 65 35 -- 25 50	100 65 35 -- 25 50	
100/75 70/70 15/8 30/30	100/75 70/70 20/10 30/30	100/50 70/35 30/15 30/30	100/50 70/35 30/15 30/30	
200 100 18 -- 30 35	200 100 50 -- 42 65	200 100 65 -- 42 65	200 100 65 -- 42 65	
200/150 100/75 15/8 30/30	200/150 100/75 20/10 30/30	200/100 100/50 35/17 30/30	200/100 100/50 35/17 30/30	

3) The maximum permitted DC voltage for each conducting path needs to be taken into account for DC switching applications.
4) 500 V DC rated / 600 V DC max. for use in ungrounded UPS DC applications (according to UL 489, Supplement SC)
5) Rated current $I_n \geq 25$ A.

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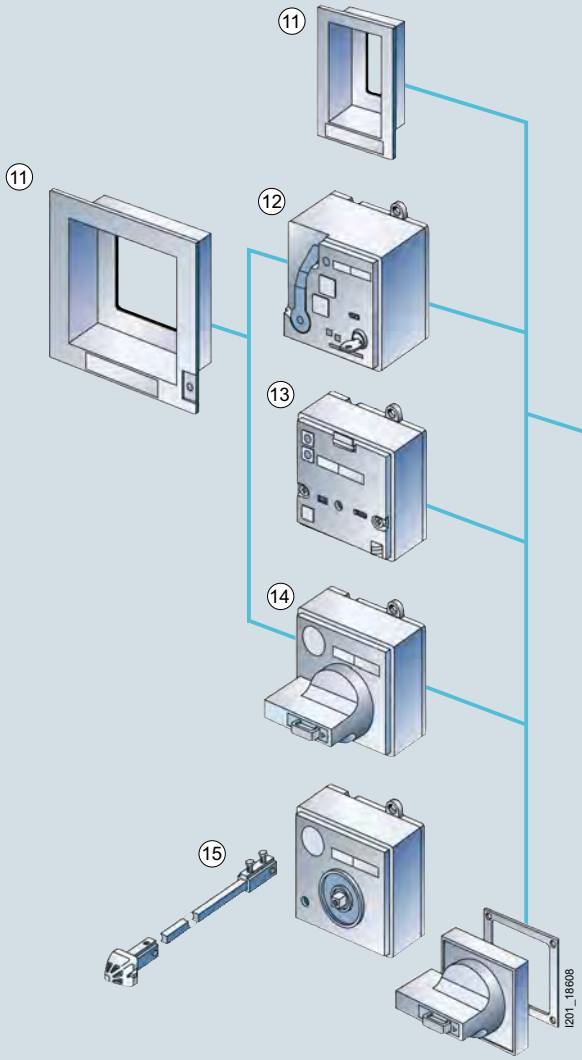

1 Standard terminal cover
2 Extended terminal cover
3 Phase barriers
4 Side walls of the withdrawable unit
5 Box terminal for Cu
6 Multiple feed-in terminal for Al/Cu (dependent on frame size)
7 Circular conductor terminals for Al/Cu
8 Withdrawable/plug-in base
9 Internal accessories
10 3VL molded case circuit breaker
11 Cover frame for door cut-out
12 Motorized operating mechanisms with stored energy feature (SEO), CG to MG frame only
13 Motorized operating mechanisms (MO), NG and PG frame only
14 Front-operated rotary operating mechanisms
15 Door-coupling rotary operating mechanisms
16 Operating unit with Bowden cable (Max Flex operator)
17 Battery power supply with test function for Electronic Trip Units
18 Thermal-magnetic release
19 Electronic Trip Unit with LCD (LCD ETU)
20 Electronic Trip Unit with setting knobs (ETU)
21 Communication module COM20/21 (Release 2)
22 Rear terminals – flat and round

Minimum order quantity (PS) or a multiple thereof can be ordered.

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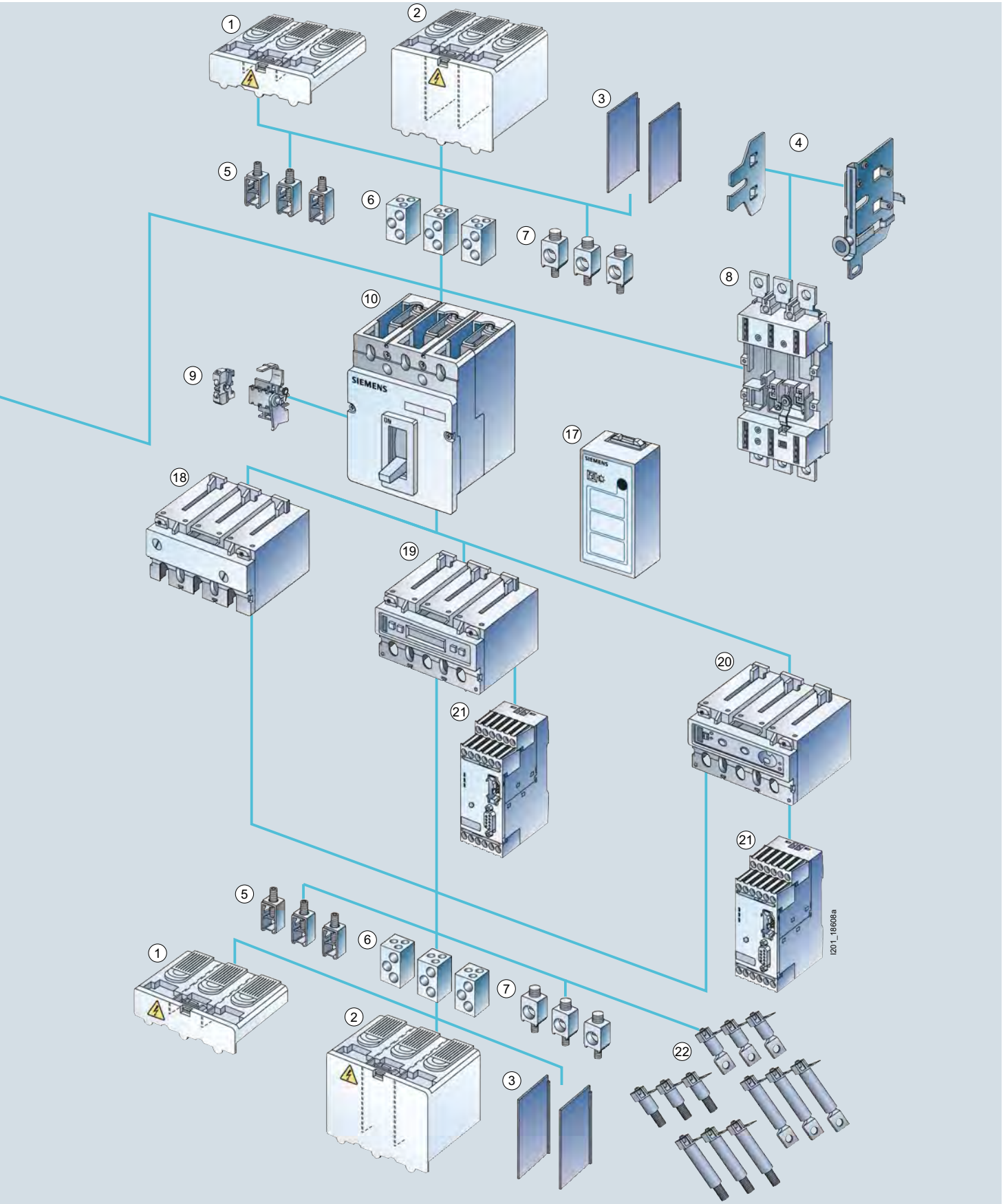

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Benefits



- 3VL molded case circuit breakers according to UL 489 optimally fulfill the high demands prevalent in modern power distribution.
- The molded case circuit breakers have a compact design and at the same time a high breaking capacity of up to 100 kA at 480 V.
- They are available both in thermal-magnetic (20 A to 1600 A) and in electronic versions (60 A to 1600 A).
- Via PROFIBUS DP and Modbus RTU, the molded case circuit breakers with Electronic Trip Units (ETUs) are consistently communication-capable.

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Application

The different versions of 3VL molded case circuit breakers according to UL are suitable for the following applications:

- Incoming circuit breakers (feeders) and outgoing circuit breakers (branches) in distribution systems
- Switching and protection devices for motors (motor protection in combination with a contactor and motor protection relay), transformers and capacitors
- Disconnecting means with features for stopping and switching off in an emergency (main disconnecting means and EMERGENCY-STOP switches) in conjunction with lockable rotary operating mechanisms.

The 3VL molded case circuit breakers according to UL are available in the following versions:

1. For line protection
   The overload and short-circuit releases are designed for the protection of cables, leads and non-motor loads.
2. For starter combinations
   These molded case circuit breakers are used both for short-circuit protection as well as for isolating functions, which may be required in starter combinations consisting of molded case circuit breakers, overload relays and motor contactors. These molded case circuit breakers exclusively feature adjustable, instantaneous short-circuit releases.
3. As non-automatic circuit breakers
   These molded case circuit breakers can be used as feeder circuit breakers, main control switches or non-automatic circuit breakers without overload protection. They incorporate an integrated short-circuit self-protection system.

Breaking capacity

(N)	Molded case circuit breakers with standard breaking capacity N (up to 35 kA at 480 V)
(H)	Molded case circuit breakers with high breaking capacity H (up to 65 kA at 480 V)
(L)	Molded case circuit breakers with very high breaking capacity L (up to 100 kA at 480 V)

Standards and specifications

3VL molded case circuit breakers according to UL comply with:

UL 489,
CSA (CSA C22.2 No. 5),
IEC/EN 60947-2,
For isolating features acc. to IEC 60947-2, EN 60947-2,
NOM (NMX-J-266-ANCE) please inquire.
CCC (only VL2 UL/DG, VL3 UL/FG, VL4 UL/JG and VL4X UL/LG)
GOST and FireSafety (Russia)

The 3VL UL molded case circuit breakers comply in addition with requirements for "disconnecting means with features for stopping and switching off in an emergency" (EMERGENCY-STOP switches) in conjunction with lockable rotary operating mechanisms (red-yellow).

Please contact Siemens for details of other standards.

Operating conditions

The 3VL molded case circuit breakers according to UL are designed for operation in enclosed areas.

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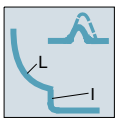
Selection and ordering data

Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	SD	Standard breaking capacity N, up to 35 kA at 480 V See "Overview". (N) Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
Fixed-mounted molded case circuit breakers, VL150X UL (CG frame) up to VL1600 UL (PG frame), thermal-magnetic releases (UL file: E10848, CCN[1]: DIVQ)									
 I201_19069					***Line protection, TM, LI function*** With fixed thermal overcurrent releases, adjustable short-circuit releases, VL150X UL: fixed short-circuit trip releases Connection type: Molded case circuit breakers without preassembled connections, connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.				
VL150X UL, CG frame	20	20	300		**3VL1102-1KM30-□□□□**		1	1 unit	1CC
	25	25	300		**3VL1125-1KM30-□□□□**		1	1 unit	1CC
	30	30	300		**3VL1103-1KM30-□□□□**		1	1 unit	1CC
	35	35	600		**3VL1135-1KM30-□□□□**		1	1 unit	1CC
	40	40	600		**3VL1104-1KM30-□□□□**		1	1 unit	1CC
	50	50	600		**3VL1105-1KM30-□□□□**		1	1 unit	1CC
	60	60	600		**3VL1106-1KM30-□□□□**		1	1 unit	1CC
	70	70	1000		**3VL1107-1KM30-□□□□**		1	1 unit	1CC
	80	80	1000		**3VL1108-1KM30-□□□□**		1	1 unit	1CC
	90	90	1000		**3VL1191-1KM30-□□□□**		1	1 unit	1CC
	100	100	1000		**3VL1110-1KM30-□□□□**		1	1 unit	1CC
	125	125	1000		**3VL1112-1KM30-□□□□**		1	1 unit	1CC
	150	150	1500		**3VL1115-1KM30-□□□□**		1	1 unit	1CC
VL150 UL, DG frame	50	50	450 ... 700		**3VL2505-1KN30-□□□□**		1	1 unit	1CC
	60	60	450 ... 700		**3VL2506-1KN30-□□□□**		1	1 unit	1CC
	70	70	450 ... 700		**3VL2507-1KN30-□□□□**		1	1 unit	1CC
	80	80	450 ... 800		**3VL2508-1KN30-□□□□**		1	1 unit	1CC
	90	90	500 ... 1000		**3VL2591-1KN30-□□□□**		1	1 unit	1CC
	100	100	500 ... 1000		**3VL2510-1KN30-□□□□**		1	1 unit	1CC
	110	110	550 ... 1100		**3VL2511-1KN30-□□□□**		1	1 unit	1CC
	125	125	625 ... 1250		**3VL2512-1KN30-□□□□**		1	1 unit	1CC
	150	150	800 ... 1600		**3VL2515-1KN30-□□□□**		1	1 unit	1CC
VL250 UL, FG frame	100	100	625 ... 1250		**3VL3510-1KN30-□□□□**		1	1 unit	1CC
	110	110	800 ... 1600		**3VL3511-1KN30-□□□□**		1	1 unit	1CC
	125	125	800 ... 1600		**3VL3512-1KN30-□□□□**		1	1 unit	1CC
	150	150	800 ... 1600		**3VL3515-1KN30-□□□□**		1	1 unit	1CC
	175	175	1000 ... 2000		**3VL3517-1KN30-□□□□**		1	1 unit	1CC
	200	200	1000 ... 2000		**3VL3520-1KN30-□□□□**		1	1 unit	1CC
	225	225	1250 ... 2500		**3VL3522-1KN30-□□□□**		1	1 unit	1CC
	250	250	1250 ... 2500		**3VL3525-1KN30-□□□□**		1	1 unit	1CC
VL400 UL, JG frame	250	250	1250 ... 2500		**3VL4125-1KN30-□□□□**		1	1 unit	1CC
	300	300	1500 ... 3000		**3VL4130-1KN30-□□□□**		1	1 unit	1CC
	350	350	1750 ... 3500		**3VL4135-1KN30-□□□□**		1	1 unit	1CC
	400	400	2000 ... 4000		**3VL4140-1KN30-□□□□**		1	1 unit	1CC
VL400X UL, LG frame	400	400	2000 ... 4000		**3VL4840-1KN30-□□□□**		1	1 unit	1CC
	500	500	2500 ... 5000		**3VL4850-1KN30-□□□□**		1	1 unit	1CC
	600	600	2750 ... 5500		**3VL4860-1KN30-□□□□**		1	1 unit	1CC
VL800 UL, MG frame	600	600	3000 ... 6000		**3VL6160-1KN30-□□□□**		1	1 unit	1CC
	700	700	3250 ... 6500		**3VL6170-1KN30-□□□□**		1	1 unit	1CC
	800	800	3250 ... 6500		**3VL6180-1KN30-□□□□**		1	1 unit	1CC
VL1200 UL, NG frame	800	800	4000 ... 8000		**3VL7180-1KN30-□□□□**		1	1 unit	1CC
	900	900	5000 ... 10000		**3VL7190-1KN30-□□□□**		1	1 unit	1CC
	1000	1000	5000 ... 10000		**3VL7110-1KN30-□□□□**		1	1 unit	1CC
	1200	1200	7000 ... 12000		**3VL7112-1KN30-□□□□**		1	1 unit	1CC
VL1600 UL, PG frame[2]	1200	1200	7000 ... 12000		**3VL8112-1KN30-□□□□**		1	1 unit	1CC
	1400	1400	7000 ... 12000		**3VL8114-1KN30-□□□□**		1	1 unit	1CC
	1600	1600	7000 ... 12000		**3VL8116-1KN30-□□□□**		1	1 unit	1CC

[1] UL Category Code Number.

[2] Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	High breaking capacity H, up to 65 kA at 480 V (H)					SD	Very high breaking capacity L, up to 100 kA at 480 V (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL1102-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1125-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1103-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1135-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1104-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1105-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1106-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1107-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1108-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1191-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1110-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1112-2KM30-□□□□		1	1 unit	1CC		--				
	3VL1115-2KM30-□□□□		1	1 unit	1CC		--				
	3VL2505-2KN30-□□□□		1	1 unit	1CC		**3VL2505-3KN30-□□□□**		1	1 unit	1CC
	3VL2506-2KN30-□□□□		1	1 unit	1CC		**3VL2506-3KN30-□□□□**		1	1 unit	1CC
	3VL2507-2KN30-□□□□		1	1 unit	1CC		**3VL2507-3KN30-□□□□**		1	1 unit	1CC
	3VL2508-2KN30-□□□□		1	1 unit	1CC		**3VL2508-3KN30-□□□□**		1	1 unit	1CC
	3VL2591-2KN30-□□□□		1	1 unit	1CC		**3VL2591-3KN30-□□□□**		1	1 unit	1CC
	3VL2510-2KN30-□□□□		1	1 unit	1CC		**3VL2510-3KN30-□□□□**		1	1 unit	1CC
	3VL2511-2KN30-□□□□		1	1 unit	1CC		**3VL2511-3KN30-□□□□**		1	1 unit	1CC
	3VL2512-2KN30-□□□□		1	1 unit	1CC		**3VL2512-3KN30-□□□□**		1	1 unit	1CC
	3VL2515-2KN30-□□□□		1	1 unit	1CC		**3VL2515-3KN30-□□□□**		1	1 unit	1CC
	3VL3510-2KN30-□□□□		1	1 unit	1CC		**3VL3510-3KN30-□□□□**		1	1 unit	1CC
	3VL3511-2KN30-□□□□		1	1 unit	1CC		**3VL3511-3KN30-□□□□**		1	1 unit	1CC
	3VL3512-2KN30-□□□□		1	1 unit	1CC		**3VL3512-3KN30-□□□□**		1	1 unit	1CC
	3VL3515-2KN30-□□□□		1	1 unit	1CC		**3VL3515-3KN30-□□□□**		1	1 unit	1CC
	3VL3517-2KN30-□□□□		1	1 unit	1CC		**3VL3517-3KN30-□□□□**		1	1 unit	1CC
	3VL3520-2KN30-□□□□		1	1 unit	1CC		**3VL3520-3KN30-□□□□**		1	1 unit	1CC
	3VL3522-2KN30-□□□□		1	1 unit	1CC		**3VL3522-3KN30-□□□□**		1	1 unit	1CC
	3VL3525-2KN30-□□□□		1	1 unit	1CC		**3VL3525-3KN30-□□□□**		1	1 unit	1CC
	3VL4125-2KN30-□□□□		1	1 unit	1CC		**3VL4125-3KN30-□□□□**		1	1 unit	1CC
	3VL4130-2KN30-□□□□		1	1 unit	1CC		**3VL4130-3KN30-□□□□**		1	1 unit	1CC
	3VL4135-2KN30-□□□□		1	1 unit	1CC		**3VL4135-3KN30-□□□□**		1	1 unit	1CC
	3VL4140-2KN30-□□□□		1	1 unit	1CC		**3VL4140-3KN30-□□□□**		1	1 unit	1CC
	3VL4840-2KN30-□□□□		1	1 unit	1CC		**3VL4840-3KN30-□□□□**		1	1 unit	1CC
	3VL4850-2KN30-□□□□		1	1 unit	1CC		**3VL4850-3KN30-□□□□**		1	1 unit	1CC
	3VL4860-2KN30-□□□□		1	1 unit	1CC		**3VL4860-3KN30-□□□□**		1	1 unit	1CC
	3VL6160-2KN30-□□□□		1	1 unit	1CC		**3VL6160-3KN30-□□□□**		1	1 unit	1CC
	3VL6170-2KN30-□□□□		1	1 unit	1CC		**3VL6170-3KN30-□□□□**		1	1 unit	1CC
	3VL6180-2KN30-□□□□		1	1 unit	1CC		**3VL6180-3KN30-□□□□**		1	1 unit	1CC
	3VL7180-2KN30-□□□□		1	1 unit	1CC		**3VL7180-3KN30-□□□□**		1	1 unit	1CC
	3VL7190-2KN30-□□□□		1	1 unit	1CC		**3VL7190-3KN30-□□□□**		1	1 unit	1CC
	3VL7110-2KN30-□□□□		1	1 unit	1CC		**3VL7110-3KN30-□□□□**		1	1 unit	1CC
	3VL7112-2KN30-□□□□		1	1 unit	1CC		**3VL7112-3KN30-□□□□**		1	1 unit	1CC
	3VL8112-2KN30-□□□□		1	1 unit	1CC		**3VL8112-3KN30-□□□□**		1	1 unit	1CC
	3VL8114-2KN30-□□□□		1	1 unit	1CC		**3VL8114-3KN30-□□□□**		1	1 unit	1CC
	3VL8116-2KN30-□□□□		1	1 unit	1CC		**3VL8116-3KN30-□□□□**		1	1 unit	1CC

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Type	Rated current I_n		Operating current of the instantaneous short circuit release "I" I_i	SD	**Standard breaking capacity N, up to 35 kA at 480 V** See "Overview". (N) Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		A	d					
Fixed-mounted molded case circuit breakers, VL150 UL (DG frame) to VL1600 UL (PG frame), magnetic and Electronic Trip Units									
 NSE0_00707					***Molded case circuit breakers for starter combination, I function (motor circuit-protectors; UL file: E10848, CCN[1]: DKPUZ)[2]*** Without overcurrent release, with adjustable short-circuit release. Connection type: Molded case circuit breakers without preassembled connections, connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.				
VL150 UL, DG frame	150 150 150		450 ... 900 750 ... 1500 1250 ... 2500		-- -- --				
VL250 UL, FG frame	250 250 250		600 ... 1200 1000 ... 2000 1750 ... 3500		-- -- --				
VL400 UL, JG frame	400 400[3]		1250 ... 2500 2000 ... 4000		-- --				
VL400X UL, LG frame	600 600[3]		2000 ... 4000 2750 ... 5500		-- --				
VL800 UL, MG frame	800		3250 ... 6500		--				
VL1200 UL, NG frame	1200		7000 ... 12000		--				
 NSE0_00708					***Non-automatic molded case circuit breakers (molded case switches; UL file: E68312, CCN[1]: WJAZ)*** Without overcurrent release, with fixed short-circuit release (for intrinsic protection only). Connection type: Molded case circuit breakers without preassembled connections, connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.				
VL150X UL, CG frame	100 150		1800 1800		**3VL1110-1KE30-□□□□** **3VL1115-1KE30-□□□□**		1 1	1 unit 1 unit	1CC 1CC
VL150 UL, DG frame	150		2500		--				
VL250 UL, FG frame	250		3500		--				
VL400 UL, JG frame	400		4400		--				
VL400X UL, LG frame	600		5500		--				
VL800 UL, MG frame	800		6500		--				
VL1200 UL, NG frame	1200		12000		--				
VL1600 UL, PG frame[4]	1600		14000		--				

1) UL Category Code Number.

2) UL-recognized.

3) Motor current according to NEC 430-110.

4) Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	High breaking capacity H, up to 65 kA at 480 V (H)					SD	Very high breaking capacity L, up to 100 kA at 480 V (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2515-2KJ30-□□□□		1	1 unit	1CC		--				
	3VL2515-2KK30-□□□□		1	1 unit	1CC		--				
	3VL2515-2KL30-□□□□		1	1 unit	1CC		--				
	3VL3525-2KJ30-□□□□		1	1 unit	1CC		--				
	3VL3525-2KK30-□□□□		1	1 unit	1CC		--				
	3VL3525-2KL30-□□□□		1	1 unit	1CC		--				
	3VL4140-2KJ30-□□□□		1	1 unit	1CC		--				
	3VL4140-2KK30-□□□□		1	1 unit	1CC		--				
	3VL4860-2KJ30-□□□□		1	1 unit	1CC		--				
	3VL4860-2KK30-□□□□		1	1 unit	1CC		--				
	3VL6180-2KK30-□□□□		1	1 unit	1CC		--				
	3VL7112-2KK30-□□□□		1	1 unit	1CC		--				
	3VL1110-2KE30-□□□□		1	1 unit	1CC		--				
	3VL1115-2KE30-□□□□		1	1 unit	1CC		--				
	3VL2515-2KE30-□□□□		1	1 unit	1CC		**3VL2515-3KE30-□□□□**		1	1 unit	1CC
	3VL3525-2KE30-□□□□		1	1 unit	1CC		**3VL3525-3KE30-□□□□**		1	1 unit	1CC
	3VL4140-2KE30-□□□□		1	1 unit	1CC		**3VL4140-3KE30-□□□□**		1	1 unit	1CC
	3VL4860-2KE30-□□□□		1	1 unit	1CC		**3VL4860-3KE30-□□□□**		1	1 unit	1CC
	3VL6180-2KE30-□□□□		1	1 unit	1CC		**3VL6180-3KE30-□□□□**		1	1 unit	1CC
	3VL7112-2KE30-□□□□		1	1 unit	1CC		**3VL7112-3KE30-□□□□**		1	1 unit	1CC
	3VL8116-2KE30-□□□□		1	1 unit	1CC		**3VL8116-3KE30-□□□□**		1	1 unit	1CC

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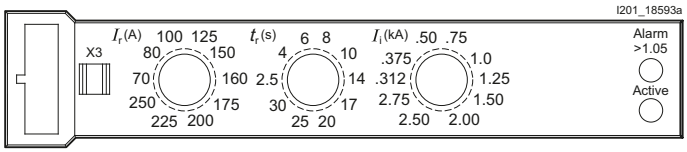
Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

3-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Response time of the inverse-time delayed overload protection "L" t_r	Operating current of the instantaneous short-circuit protection "I" I_i	SD	**Standard breaking capacity N, up to 35 kA at 480 V** See "Overview". (N) Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	s	A	d					
Fixed-mounted molded case circuit breakers, VL150 UL (DG frame) up to VL1600 UL (PG frame), Electronic Trip Units (UL file: E10848, CCN[1]: DIVQ)										
 NSE0_00691										
 I201_18593a										
Line protection										
With Electronic Trip Units ETU (model 555) LI function										
Connection type: Molded case circuit breakers without preassembled connections, connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.										
VL150 UL, DG frame	60	30 ... 60	2.5 ... 30	75 ... 660 (11 x I_n)		**3VL2506-1PB30-□□□□**		1	1 unit	1CC
	100	40 ... 100	2.5 ... 30	125 ... 1100 (11 x I_n)		**3VL2510-1PB30-□□□□**		1	1 unit	1CC
	150	60 ... 150	2.5 ... 30	187 ... 1650 (11 x I_n)		**3VL2515-1PB30-□□□□**		1	1 unit	1CC
VL250 UL, FG frame	100	40 ... 100	2.5 ... 30	125 ... 1100 (11 x I_n)		**3VL3510-1PB30-□□□□**		1	1 unit	1CC
	150	60 ... 150	2.5 ... 30	187 ... 1650 (11 x I_n)		**3VL3515-1PB30-□□□□**		1	1 unit	1CC
	250	70 ... 250	2.5 ... 30	312 ... 2750 (11 x I_n)		**3VL3525-1PB30-□□□□**		1	1 unit	1CC
VL400 UL, JG frame	250	70 ... 250	2.5 ... 30	312 ... 2750 (11 x I_n)		**3VL4125-1PB30-□□□□**		1	1 unit	1CC
	400	150 ... 400	2.5 ... 30	500 ... 4400 (11 x I_n)		**3VL4140-1PB30-□□□□**		1	1 unit	1CC
VL400X UL, LG frame	400	150 ... 400	2.5 ... 30	500 ... 4400 (11 x I_n)		**3VL4840-1PB30-□□□□**		1	1 unit	1CC
	600	200 ... 600	2.5 ... 30	750 ... 6000 (10 x I_n)		**3VL4860-1PB30-□□□□**		1	1 unit	1CC
VL800 UL, MG frame	600	200 ... 600	2.5 ... 30	750 ... 6000 (10 x I_n)		**3VL6160-1PB30-□□□□**		1	1 unit	1CC
	800	300 ... 800	2.5 ... 30	1000 ... 6000 (7.5 x I_n)		**3VL6180-1PB30-□□□□**		1	1 unit	1CC
VL1200 UL, NG frame	800	300 ... 800	2.5 ... 30	1000 ... 8800 (11 x I_n)		**3VL7180-1PB30-□□□□**		1	1 unit	1CC
	1000	400 ... 1000	2.5 ... 30	1250 ... 11000 (11 x I_n)		**3VL7110-1PB30-□□□□**		1	1 unit	1CC
	1200	400 ... 1200	2.5 ... 30	1500 ... 12000 (10 x I_n)		**3VL7112-1PB30-□□□□**		1	1 unit	1CC
VL1600 UL, PG frame[2]	1200	400 ... 1200	2.5 ... 30	1500 ... 12000 (10 x I_n)		**3VL8112-1PB30-□□□□**		1	1 unit	1CC
	1600	700 ... 1600	2.5 ... 30	2000 ... 9600 (6 x I_n)		**3VL8116-1PB30-□□□□**		1	1 unit	1CC

L = overload

I = short-circuit protection, instantaneous

1) UL Category Code Number.

2) Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	**High breaking capacity H, up to 65 kA at 480 V** (H)					SD	**Very high breaking capacity L, up to 100 kA at 480 V** (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2506-2PB30-□□□□		1	1 unit	1CC		**3VL2506-3PB30-□□□□**		1	1 unit	1CC
	3VL2510-2PB30-□□□□		1	1 unit	1CC		**3VL2510-3PB30-□□□□**		1	1 unit	1CC
	3VL2515-2PB30-□□□□		1	1 unit	1CC		**3VL2515-3PB30-□□□□**		1	1 unit	1CC
	3VL3510-2PB30-□□□□		1	1 unit	1CC		**3VL3510-3PB30-□□□□**		1	1 unit	1CC
	3VL3515-2PB30-□□□□		1	1 unit	1CC		**3VL3515-3PB30-□□□□**		1	1 unit	1CC
	3VL3525-2PB30-□□□□		1	1 unit	1CC		**3VL3525-3PB30-□□□□**		1	1 unit	1CC
	3VL4125-2PB30-□□□□		1	1 unit	1CC		**3VL4125-3PB30-□□□□**		1	1 unit	1CC
	3VL4140-2PB30-□□□□		1	1 unit	1CC		**3VL4140-3PB30-□□□□**		1	1 unit	1CC
	3VL4840-2PB30-□□□□		1	1 unit	1CC		**3VL4840-3PB30-□□□□**		1	1 unit	1CC
	3VL4860-2PB30-□□□□		1	1 unit	1CC		**3VL4860-3PB30-□□□□**		1	1 unit	1CC
	3VL6160-2PB30-□□□□		1	1 unit	1CC		**3VL6160-3PB30-□□□□**		1	1 unit	1CC
	3VL6180-2PB30-□□□□		1	1 unit	1CC		**3VL6180-3PB30-□□□□**		1	1 unit	1CC
	3VL7180-2PB30-□□□□		1	1 unit	1CC		**3VL7180-3PB30-□□□□**		1	1 unit	1CC
	3VL7110-2PB30-□□□□		1	1 unit	1CC		**3VL7110-3PB30-□□□□**		1	1 unit	1CC
	3VL7112-2PB30-□□□□		1	1 unit	1CC		**3VL7112-3PB30-□□□□**		1	1 unit	1CC
	3VL8112-2PB30-□□□□		1	1 unit	1CC		**3VL8112-3PB30-□□□□**		1	1 unit	1CC
	3VL8116-2PB30-□□□□		1	1 unit	1CC		**3VL8116-3PB30-□□□□**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

3-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Response time of the inverse-time delayed overload protection "L" t_r	Operating current of the instantaneous short-circuit protection "I" I_i	Standard setting of I_g/A and t_g/s	t_g/s adjustable to 0.1, 0.2 and 0.3 s for following I_g /A	SD	**Standard breaking capacity N, up to 35 kA at 480 V** See "Overview". (N) Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	s	A			d					
Fixed-mounted molded case circuit breakers, VL150 UL (DG frame) up to VL1600 UL (PG frame), Electronic Trip Units (UL file: E10848, CCN[1]: DIVQ)												
VL150 UL, DG frame	60	30 ... 60	2.5 ... 30	75 ... 660 (11 x I_n)	48/0.07	24/36/60		**3VL2506-1PD30-□□□□**		1	1 unit	1CC
	100	40 ... 100	2.5 ... 30	125 ... 1100 (11 x I_n)	80/0.07	40/60/100		**3VL2510-1PD30-□□□□**		1	1 unit	1CC
	150	60 ... 150	2.5 ... 30	187 ... 1650 (11 x I_n)	120/0.07	60/90/150		**3VL2515-1PD30-□□□□**		1	1 unit	1CC
VL250 UL, FG frame	100	40 ... 100	2.5 ... 30	125 ... 1100 (11 x I_n)	80/0.07	40/60/100		**3VL3510-1PD30-□□□□**		1	1 unit	1CC
	150	60 ... 150	2.5 ... 30	187 ... 1650 (11 x I_n)	120/0.07	60/90/150		**3VL3515-1PD30-□□□□**		1	1 unit	1CC
	250	70 ... 250	2.5 ... 30	312 ... 2750 (11 x I_n)	200/0.07	100/150/250		**3VL3525-1PD30-□□□□**		1	1 unit	1CC
VL400 UL, JG frame	250	70 ... 250	2.5 ... 30	312 ... 2750 (11 x I_n)	200/0.07	100/150/250		**3VL4125-1PD30-□□□□**		1	1 unit	1CC
	400	150 ... 400	2.5 ... 30	500 ... 4400 (11 x I_n)	320/0.11	160/240/400		**3VL4140-1PD30-□□□□**		1	1 unit	1CC
VL400X UL, LG frame	400	150 ... 400	2.5 ... 30	500 ... 4400 (11 x I_n)	320/0.11	160/240/400		**3VL4840-1PD30-□□□□**		1	1 unit	1CC
	600	200 ... 600	2.5 ... 30	750 ... 6000 (10 x I_n)	360/0.18	240/360/600		**3VL4860-1PD30-□□□□**		1	1 unit	1CC
VL800 UL, MG frame	600	200 ... 600	2.5 ... 30	750 ... 6000 (10 x I_n)	360/0.18	240/360/600		**3VL6160-1PD30-□□□□**		1	1 unit	1CC
	800	300 ... 800	2.5 ... 30	1000 ... 6000 (7.5 x I_n)	480/0.25	320/480/800		**3VL6180-1PD30-□□□□**		1	1 unit	1CC
VL1200 UL, NG frame	800	300 ... 800	2.5 ... 30	1000 ... 8800 (11 x I_n)	480/0.25	320/480/800		**3VL7180-1PD30-□□□□**		1	1 unit	1CC
	1000	400 ... 1000	2.5 ... 30	1250 ... 11000 (11 x I_n)	600/0.32	400/600/1000		**3VL7110-1PD30-□□□□**		1	1 unit	1CC
	1200	400 ... 1200	2.5 ... 30	1500 ... 12000 (10 x I_n)	720/0.32	480/720/1200		**3VL7112-1PD30-□□□□**		1	1 unit	1CC
VL1600 UL, PG frame[2]	1200	400 ... 1200	2.5 ... 30	1500 ... 12000 (10 x I_n)	720/0.32	480/720/1200		**3VL8112-1PD30-□□□□**		1	1 unit	1CC
	1600	700 ... 1600	2.5 ... 30	2000 ... 9600 (6 x I_n)	960/0.4	640/960/1200		**3VL8116-1PD30-□□□□**		1	1 unit	1CC



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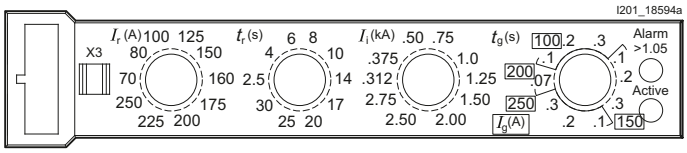

Line protection

With Electronic Trip Unit ETU (model 555)
LIG function
for 4-wire three-phase systems (vectorial summation current formation)
Connection type:
Molded case circuit breakers without preassembled connections,
connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.
Current transformers must be ordered under "Accessories" page 2/284.

L = overload

I = short-circuit protection, instantaneous

G = ground-fault protection

1) UL Category Code Number.

2) Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	High breaking capacity H, up to 65 kA at 480 V (H)					SD	Very high breaking capacity L, up to 100 kA at 480 V (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2506-2PD30-□□□□		1	1 unit	1CC		**3VL2506-3PD30-□□□□**		1	1 unit	1CC
	3VL2510-2PD30-□□□□		1	1 unit	1CC		**3VL2510-3PD30-□□□□**		1	1 unit	1CC
	3VL2515-2PD30-□□□□		1	1 unit	1CC		**3VL2515-3PD30-□□□□**		1	1 unit	1CC
	3VL3510-2PD30-□□□□		1	1 unit	1CC		**3VL3510-3PD30-□□□□**		1	1 unit	1CC
	3VL3515-2PD30-□□□□		1	1 unit	1CC		**3VL3515-3PD30-□□□□**		1	1 unit	1CC
	3VL3525-2PD30-□□□□		1	1 unit	1CC		**3VL3525-3PD30-□□□□**		1	1 unit	1CC
	3VL4125-2PD30-□□□□		1	1 unit	1CC		**3VL4125-3PD30-□□□□**		1	1 unit	1CC
	3VL4140-2PD30-□□□□		1	1 unit	1CC		**3VL4140-3PD30-□□□□**		1	1 unit	1CC
	3VL4840-2PD30-□□□□		1	1 unit	1CC		**3VL4840-3PD30-□□□□**		1	1 unit	1CC
	3VL4860-2PD30-□□□□		1	1 unit	1CC		**3VL4860-3PD30-□□□□**		1	1 unit	1CC
	3VL6160-2PD30-□□□□		1	1 unit	1CC		**3VL6160-3PD30-□□□□**		1	1 unit	1CC
	3VL6180-2PD30-□□□□		1	1 unit	1CC		**3VL6180-3PD30-□□□□**		1	1 unit	1CC
	3VL7180-2PD30-□□□□		1	1 unit	1CC		**3VL7180-3PD30-□□□□**		1	1 unit	1CC
	3VL7110-2PD30-□□□□		1	1 unit	1CC		**3VL7110-3PD30-□□□□**		1	1 unit	1CC
	3VL7112-2PD30-□□□□		1	1 unit	1CC		**3VL7112-3PD30-□□□□**		1	1 unit	1CC
	3VL8112-2PD30-□□□□		1	1 unit	1CC		**3VL8112-3PD30-□□□□**		1	1 unit	1CC
	3VL8116-2PD30-□□□□		1	1 unit	1CC		**3VL8116-3PD30-□□□□**		1	1 unit	1CC

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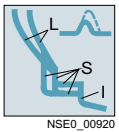
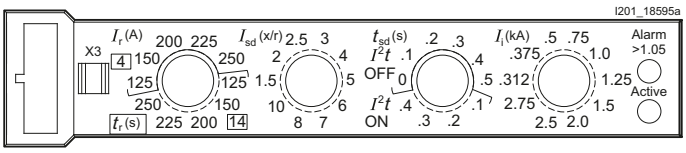
Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

3-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Response time of the inverse-time delayed overload protection "L" t_r	Operating current of the instantaneous short-circuit protection "I" I_i	Operating current of the short-time delayed short-circuit protection "S" I_{sd}	SD	**Standard breaking capacity N, up to 35 kA at 480 V** See "Overview". (N) Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	s	A	A	d					
Fixed-mounted molded case circuit breakers, VL150 UL (DG frame) up to VL1600 UL (PG frame), Electronic Trip Units (UL file: E10848, CCN[1]: DIVQ)											
Line and generator protection											
With Electronic Trip Unit ETU (model 555) LSI function (t_{sd} = 0 to 0.5 s) Connection type: Molded case circuit breakers without preassembled connections, connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.											
VL150 UL, DG frame	60	30 ... 60	4/14	75 ... 660 (11 x I_n)	1.5 ... 10 x I_r		**3VL2506-1PE30-□□□□**		1	1 unit	1CC
	100	40 ... 100	4/14	125 ... 1100 (11 x I_n)	1.5 ... 10 x I_r		**3VL2510-1PE30-□□□□**		1	1 unit	1CC
	150	60 ... 150	4/14	187 ... 1650 (11 x I_n)	1.5 ... 10 x I_r		**3VL2515-1PE30-□□□□**		1	1 unit	1CC
VL250 UL, FG frame	100	40 ... 100	4/14	125 ... 1100 (11 x I_n)	1.5 ... 10 x I_r		**3VL3510-1PE30-□□□□**		1	1 unit	1CC
	150	60 ... 150	4/14	187 ... 1650 (11 x I_n)	1.5 ... 10 x I_r		**3VL3515-1PE30-□□□□**		1	1 unit	1CC
	250	125 ... 250	4/14	312 ... 2750 (11 x I_n)	1.5 ... 10 x I_r		**3VL3525-1PE30-□□□□**		1	1 unit	1CC
VL400 UL, JG frame	250	125 ... 250	4/14	312 ... 2750 (11 x I_n)	1.5 ... 10 x I_r		**3VL4125-1PE30-□□□□**		1	1 unit	1CC
	400	200 ... 400	10/20	500 ... 4400 (11 x I_n)	1.5 ... 10 x I_r		**3VL4140-1PE30-□□□□**		1	1 unit	1CC
VL400X UL, LG frame	400	200 ... 400	10/20	500 ... 4400 (11 x I_n)	1.5 ... 10 x I_r		**3VL4840-1PE30-□□□□**		1	1 unit	1CC
	600	350 ... 600	10/20	750 ... 6000 (10 x I_n)	1.5 ... 10 x I_r		**3VL4860-1PE30-□□□□**		1	1 unit	1CC
VL800 UL, MG frame	600	350 ... 600	10/20	750 ... 6000 (10 x I_n)	1.5 ... 10 x I_r		**3VL6160-1PE30-□□□□**		1	1 unit	1CC
	800	400 ... 800	10/20	1000 ... 6000 (7.5 x I_n)	1.5 ... 10 x I_r		**3VL6180-1PE30-□□□□**		1	1 unit	1CC
VL1200 UL, NG frame	800	400 ... 800	10/20	1000 ... 8800 (11 x I_n)	1.5 ... 10 x I_r		**3VL7180-1PE30-□□□□**		1	1 unit	1CC
	1000	600 ... 1000	10/20	1250 ... 11000 (11 x I_n)	1.5 ... 10 x I_r		**3VL7110-1PE30-□□□□**		1	1 unit	1CC
	1200	700 ... 1200	10/20	1500 ... 12000 (10 x I_n)	1.5 ... 10 x I_r		**3VL7112-1PE30-□□□□**		1	1 unit	1CC
VL1600 UL, PG frame[2]	1200	700 ... 1200	10/20	1500 ... 12000 (10 x I_n)	1.5 ... 10 x I_r		**3VL8112-1PE30-□□□□**		1	1 unit	1CC
	1600	1000 ... 1600	10/20	2000 ... 9600 (6 x I_n)	1.5 ... 10 x I_r		**3VL8116-1PE30-□□□□**		1	1 unit	1CC





L = overload

S = short-circuit protection, short-time delayed

I = short-circuit protection, instantaneous

[1] UL Category Code Number.

[2] Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	High breaking capacity H, up to 65 kA at 480 V (H)					SD	Very high breaking capacity L, up to 100 kA at 480 V (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2506-2PE30-□□□□		1	1 unit	1CC		**3VL2506-3PE30-□□□□**		1	1 unit	1CC
	3VL2510-2PE30-□□□□		1	1 unit	1CC		**3VL2510-3PE30-□□□□**		1	1 unit	1CC
	3VL2515-2PE30-□□□□		1	1 unit	1CC		**3VL2515-3PE30-□□□□**		1	1 unit	1CC
	3VL3510-2PE30-□□□□		1	1 unit	1CC		**3VL3510-3PE30-□□□□**		1	1 unit	1CC
	3VL3515-2PE30-□□□□		1	1 unit	1CC		**3VL3515-3PE30-□□□□**		1	1 unit	1CC
	3VL3525-2PE30-□□□□		1	1 unit	1CC		**3VL3525-3PE30-□□□□**		1	1 unit	1CC
	3VL4125-2PE30-□□□□		1	1 unit	1CC		**3VL4125-3PE30-□□□□**		1	1 unit	1CC
	3VL4140-2PE30-□□□□		1	1 unit	1CC		**3VL4140-3PE30-□□□□**		1	1 unit	1CC
	3VL4840-2PE30-□□□□		1	1 unit	1CC		**3VL4840-3PE30-□□□□**		1	1 unit	1CC
	3VL4860-2PE30-□□□□		1	1 unit	1CC		**3VL4860-3PE30-□□□□**		1	1 unit	1CC
	3VL6160-2PE30-□□□□		1	1 unit	1CC		**3VL6160-3PE30-□□□□**		1	1 unit	1CC
	3VL6180-2PE30-□□□□		1	1 unit	1CC		**3VL6180-3PE30-□□□□**		1	1 unit	1CC
	3VL7180-2PE30-□□□□		1	1 unit	1CC		**3VL7180-3PE30-□□□□**		1	1 unit	1CC
	3VL7110-2PE30-□□□□		1	1 unit	1CC		**3VL7110-3PE30-□□□□**		1	1 unit	1CC
	3VL7112-2PE30-□□□□		1	1 unit	1CC		**3VL7112-3PE30-□□□□**		1	1 unit	1CC
	3VL8112-2PE30-□□□□		1	1 unit	1CC		**3VL8112-3PE30-□□□□**		1	1 unit	1CC
	3VL8116-2PE30-□□□□		1	1 unit	1CC		**3VL8116-3PE30-□□□□**		1	1 unit	1CC

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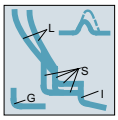
Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

3-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Response time of the inverse-time delayed overload protection "L" t_r	Operating current of the instantaneous short-circuit protection "I" I_i	Operating current of the short-time delayed short-circuit protection "S" I_{sd}	Standard setting of I_g/A and t_g/s	t_g/s adjustable to 0.1, 0.2 and 0.3 s for following I_g /A	SD	Standard breaking capacity N, up to 35 kA at 480 V (N) See "Overview". Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	s	A	A			d					

Fixed-mounted molded case circuit breakers, VL150 UL (DG frame) up to VL1600 UL (PG frame), Electronic Trip Units (UL file: E10848, CCN[1]: DIVQ)



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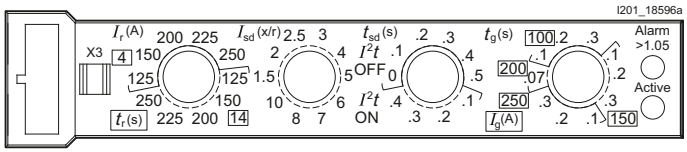

Line and generator protection

With Electronic Trip Unit ETU (model 555)
LSIG function (t_{sd} = 0 to 0.5 s)
for 4-wire three-phase systems (vectorial summation current formation)
Connection type:
Molded case circuit breakers without preassembled connections,
connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.
Current transformers must be ordered under "Accessories" page 2/284.

VL150 UL, DG frame	60	30 ... 60	4/14	300/660 (5/11 x I_n)	1.5 ... 10 x I_r	48/0.07	24/36/60	**3VL2506-1PH30-□□□□**	1	1 unit	1CC
	100	40 ... 100	4/14	500/1100 (5/11 x I_n)	1.5 ... 10 x I_r	80/0.07	40/60/100	**3VL2510-1PH30-□□□□**	1	1 unit	1CC
	150	60 ... 150	4/14	750/1650 (5/11 x I_n)	1.5 ... 10 x I_r	120/0.07	60/90/150	**3VL2515-1PH30-□□□□**	1	1 unit	1CC
VL250 UL, FG frame	100	40 ... 100	4/14	500/1100 (5/11 x I_n)	1.5 ... 10 x I_r	80/0.07	40/60/100	**3VL3510-1PH30-□□□□**	1	1 unit	1CC
	150	60 ... 150	4/14	750/1650 (5/11 x I_n)	1.5 ... 10 x I_r	120/0.07	60/90/150	**3VL3515-1PH30-□□□□**	1	1 unit	1CC
	250	125 ... 250	4/14	1250/2750 (5/11 x I_n)	1.5 ... 10 x I_r	200/0.07	100/150/250	**3VL3525-1PH30-□□□□**	1	1 unit	1CC
VL400 UL, JG frame	250	125 ... 250	4/14	1250/2750 (5/11 x I_n)	1.5 ... 10 x I_r	200/0.07	100/150/250	**3VL4125-1PH30-□□□□**	1	1 unit	1CC
	400	200 ... 400	10/20	2000/4400 (5/11 x I_n)	1.5 ... 10 x I_r	320/0.11	160/240/400	**3VL4140-1PH30-□□□□**	1	1 unit	1CC
VL400X UL, LG frame	400	200 ... 400	10/20	2000/4400 (5/11 x I_n)	1.5 ... 10 x I_r	320/0.11	160/240/400	**3VL4840-1PH30-□□□□**	1	1 unit	1CC
	600	350 ... 600	10/20	3000/6000 (5/10 x I_n)	1.5 ... 10 x I_r	360/0.18	240/360/600	**3VL4860-1PH30-□□□□**	1	1 unit	1CC
VL800 UL, MG frame	600	350 ... 600	10/20	3000/6000 (5/10 x I_n)	1.5 ... 10 x I_r	360/0.18	240/360/600	**3VL6160-1PH30-□□□□**	1	1 unit	1CC
	800	400 ... 800	10/20	4000/6000 (5/7.5 x I_n)	1.5 ... 10 x I_r	480/0.25	320/480/800	**3VL6180-1PH30-□□□□**	1	1 unit	1CC
VL1200 UL, NG frame	800	400 ... 800	10/20	4000/8800 (5/11 x I_n)	1.5 ... 10 x I_r	480/0.25	320/480/800	**3VL7180-1PH30-□□□□**	1	1 unit	1CC
	1000	600 ... 1000	10/20	5000/11000 (5/11 x I_n)	1.5 ... 10 x I_r	600/0.32	400/600/1000	**3VL7110-1PH30-□□□□**	1	1 unit	1CC
	1200	700 ... 1200	10/20	6000/12000 (5/10 x I_n)	1.5 ... 10 x I_r	720/0.32	480/720/1200	**3VL7112-1PH30-□□□□**	1	1 unit	1CC
VL1600 UL, PG frame[2]	1200	700 ... 1200	10/20	6000/12000 (5/10 x I_n)	1.5 ... 10 x I_r	720/0.32	480/720/1200	**3VL8112-1PH30-□□□□**	1	1 unit	1CC
	1600	1000...1600	10/20	8000/9600 (5/6 x I_n)	1.5 ... 10 x I_r	960/0.4	640/960/1200	**3VL8116-1PH30-□□□□**	1	1 unit	1CC

L = overload
S = short-circuit protection, short-time delayed
I = short-circuit protection, instantaneous
G = ground-fault protection

1) UL Category Code Number.
2) Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	High breaking capacity H, up to 65 kA at 480 V (H)					SD	Very high breaking capacity L, up to 100 kA at 480 V (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2506-2PH30-□□□□		1	1 unit	1CC		**3VL2506-3PH30-□□□□**		1	1 unit	1CC
	3VL2510-2PH30-□□□□		1	1 unit	1CC		**3VL2510-3PH30-□□□□**		1	1 unit	1CC
	3VL2515-2PH30-□□□□		1	1 unit	1CC		**3VL2515-3PH30-□□□□**		1	1 unit	1CC
	3VL3510-2PH30-□□□□		1	1 unit	1CC		**3VL3510-3PH30-□□□□**		1	1 unit	1CC
	3VL3515-2PH30-□□□□		1	1 unit	1CC		**3VL3515-3PH30-□□□□**		1	1 unit	1CC
	3VL3525-2PH30-□□□□		1	1 unit	1CC		**3VL3525-3PH30-□□□□**		1	1 unit	1CC
	3VL4125-2PH30-□□□□		1	1 unit	1CC		**3VL4125-3PH30-□□□□**		1	1 unit	1CC
	3VL4140-2PH30-□□□□		1	1 unit	1CC		**3VL4140-3PH30-□□□□**		1	1 unit	1CC
	3VL4840-2PH30-□□□□		1	1 unit	1CC		**3VL4840-3PH30-□□□□**		1	1 unit	1CC
	3VL4860-2PH30-□□□□		1	1 unit	1CC		**3VL4860-3PH30-□□□□**		1	1 unit	1CC
	3VL6160-2PH30-□□□□		1	1 unit	1CC		**3VL6160-3PH30-□□□□**		1	1 unit	1CC
	3VL6180-2PH30-□□□□		1	1 unit	1CC		**3VL6180-3PH30-□□□□**		1	1 unit	1CC
	3VL7180-2PH30-□□□□		1	1 unit	1CC		**3VL7180-3PH30-□□□□**		1	1 unit	1CC
	3VL7110-2PH30-□□□□		1	1 unit	1CC		**3VL7110-3PH30-□□□□**		1	1 unit	1CC
	3VL7112-2PH30-□□□□		1	1 unit	1CC		**3VL7112-3PH30-□□□□**		1	1 unit	1CC
	3VL8112-2PH30-□□□□		1	1 unit	1CC		**3VL8112-3PH30-□□□□**		1	1 unit	1CC
	3VL8116-2PH30-□□□□		1	1 unit	1CC		**3VL8116-3PH30-□□□□**		1	1 unit	1CC

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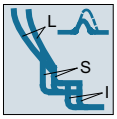
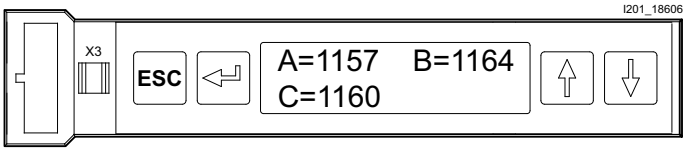
Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

3-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	SD	Standard breaking capacity N, up to 35 kA at 480 V (N) See "Overview". Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A	d					
Fixed-mounted molded case circuit breakers, VL150 UL (DG frame) up to VL1600 UL (PG frame), up to 1600 A Electronic Trip Units (UL file: E10848, CCN[1]: DIVQ)									
VL150 UL, DG frame	60	30 ... 60	75 ... 660 (11 x I_n)		**3VL2506-1VH30-□□□□**		1	1 unit	1CC
	100	40 ... 100	125 ... 1100 (11 x I_n)		**3VL2510-1VH30-□□□□**		1	1 unit	1CC
	150	60 ... 150	187 ... 1650 (11 x I_n)		**3VL2515-1VH30-□□□□**		1	1 unit	1CC
VL250 UL, FG frame	100	40 ... 100	125 ... 1100 (11 x I_n)		**3VL3510-1VH30-□□□□**		1	1 unit	1CC
	150	60 ... 150	187 ... 1650 (11 x I_n)		**3VL3515-1VH30-□□□□**		1	1 unit	1CC
	250	70 ... 250	312 ... 2750 (11 x I_n)		**3VL3525-1VH30-□□□□**		1	1 unit	1CC
VL400 UL, JG frame	250	70 ... 250	312 ... 2750 (11 x I_n)		**3VL4125-1VH30-□□□□**		1	1 unit	1CC
	400	150 ... 400	500 ... 4400 (11 x I_n)		**3VL4140-1VH30-□□□□**		1	1 unit	1CC
VL400X UL, LG frame	400	150 ... 400	500 ... 4400 (11 x I_n)		**3VL4840-1VH30-□□□□**		1	1 unit	1CC
	600	200 ... 600	750 ... 6000 (10 x I_n)		**3VL4860-1VH30-□□□□**		1	1 unit	1CC
VL800 UL, MG frame	600	200 ... 600	750 ... 6000 (10 x I_n)		**3VL6160-1VH30-□□□□**		1	1 unit	1CC
	800	300 ... 800	1000 ... 6000 (7.5 x I_n)		**3VL6180-1VH30-□□□□**		1	1 unit	1CC
VL1200 UL, NG frame	800	300 ... 800	1000 ... 8800 (11 x I_n)		**3VL7180-1VH30-□□□□**		1	1 unit	1CC
	1000	400 ... 1000	1250 ... 11000 (11 x I_n)		**3VL7110-1VH30-□□□□**		1	1 unit	1CC
	1200	400 ... 1200	1500 ... 12000 (10 x I_n)		**3VL7112-1VH30-□□□□**		1	1 unit	1CC
VL1600 UL, PG frame[3]	1200	400 ... 1200	1500 ... 12000 (10 x I_n)		**3VL8112-1VH30-□□□□**		1	1 unit	1CC
	1600	700 ... 1600	2000 ... 9600 (6 x I_n)		**3VL8116-1VH30-□□□□**		1	1 unit	1CC





Molded case circuit breakers with Electronic Trip Units with LCD, line protection with LI/LS/LSI function

- Connection type:
  Molded case circuit breakers without preassembled connections,
  connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.
- t_{sd} = 0 to 0.5 s
- t_r/s: 2.5, 4, 6, 8,10,14, 17, 20, 25, 30
- I_{sd}/A: 1.25 to 10 x I_r[2]
- Pre-alarm % of I_r: 80 to 100

L = overload
S = short-circuit protection, short-time delayed
I = short-circuit protection, instantaneous

1) UL Category Code Number.

2) Only for sizes for which I_i (max) = 11 x I_n. Here the factor is 11.
Otherwise the following applies:
I_{sd} (max) = (factor-1) x I_r (max). The factor is the value in brackets in the column I_i.

3) Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	High breaking capacity H, up to 65 kA at 480 V (H)					SD	Very high breaking capacity L, up to 100 kA at 480 V (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2506-2VH30-□□□□		1	1 unit	1CC		**3VL2506-3VH30-□□□□**		1	1 unit	1CC
	3VL2510-2VH30-□□□□		1	1 unit	1CC		**3VL2510-3VH30-□□□□**		1	1 unit	1CC
	3VL2515-2VH30-□□□□		1	1 unit	1CC		**3VL2515-3VH30-□□□□**		1	1 unit	1CC
	3VL3510-2VH30-□□□□		1	1 unit	1CC		**3VL3510-3VH30-□□□□**		1	1 unit	1CC
	3VL3515-2VH30-□□□□		1	1 unit	1CC		**3VL3515-3VH30-□□□□**		1	1 unit	1CC
	3VL3525-2VH30-□□□□		1	1 unit	1CC		**3VL3525-3VH30-□□□□**		1	1 unit	1CC
	3VL4125-2VH30-□□□□		1	1 unit	1CC		**3VL4125-3VH30-□□□□**		1	1 unit	1CC
	3VL4140-2VH30-□□□□		1	1 unit	1CC		**3VL4140-3VH30-□□□□**		1	1 unit	1CC
	3VL4840-2VH30-□□□□		1	1 unit	1CC		**3VL4840-3VH30-□□□□**		1	1 unit	1CC
	3VL4860-2VH30-□□□□		1	1 unit	1CC		**3VL4860-3VH30-□□□□**		1	1 unit	1CC
	3VL6160-2VH30-□□□□		1	1 unit	1CC		**3VL6160-3VH30-□□□□**		1	1 unit	1CC
	3VL6180-2VH30-□□□□		1	1 unit	1CC		**3VL6180-3VH30-□□□□**		1	1 unit	1CC
	3VL7180-2VH30-□□□□		1	1 unit	1CC		**3VL7180-3VH30-□□□□**		1	1 unit	1CC
	3VL7110-2VH30-□□□□		1	1 unit	1CC		**3VL7110-3VH30-□□□□**		1	1 unit	1CC
	3VL7112-2VH30-□□□□		1	1 unit	1CC		**3VL7112-3VH30-□□□□**		1	1 unit	1CC
	3VL8112-2VH30-□□□□		1	1 unit	1CC		**3VL8112-3VH30-□□□□**		1	1 unit	1CC
	3VL8116-2VH30-□□□□		1	1 unit	1CC		**3VL8116-3VH30-□□□□**		1	1 unit	1CC

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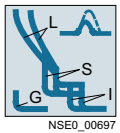
Molded Case Circuit Breakers

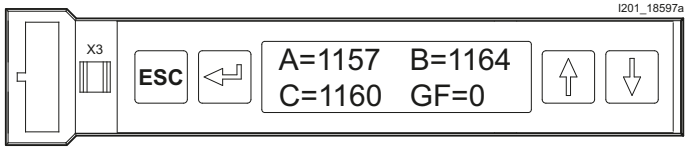
3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

3-pole

Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	Operating current of the instantaneous short-circuit protection "I" I_i	I_g in % of I_n	SD	Standard breaking capacity N, up to 35 kA at 480 V (N) See "Overview". Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	A	A		d					

Fixed-mounted molded case circuit breakers, VL150 UL (DG frame) up to VL1600 UL (PG frame), up to 1600 A
Electronic Trip Units (UL file: E10848, CCN[1]: DIVQ)





Molded case circuit breakers with Electronic Trip Unit with LCD, line protection with LSIG function or LSIG (alarm) function

- Connection type:
  Molded case circuit breakers without preassembled connections,
  connections must be ordered under "Accessories", "Plug-in versions/withdrawable versions", pages 2/265 to 2/268 or under "Accessories", "Connection parts for fixed-mounted molded case circuit breakers", pages 2/269 to 2/276.
- t_r/s: 2.5, 4, 6, 8,10,14, 17, 20, 25, 30
- I_{sd}/A: 1.25 to 10 x I_r[2]
- Pre-alarm % of I_r: 80 to 100
- t_g/s: 0.1; 0.2; 0.3; 0.4; 0.5

VL150 UL,	60	30 ... 60	75 ... 660 (11 x I_n)	40 ... 100	**3VL2506-1□□30-□□□□**	1	1 unit	1CC
DG frame	100	40 ... 100	125 ... 1100 (11 x I_n)	40 ... 100	**3VL2510-1□□30-□□□□**	1	1 unit	1CC
	150	60 ... 150	187 ... 1650 (11 x I_n)	40 ... 100	**3VL2515-1□□30-□□□□**	1	1 unit	1CC
VL250 UL,	100	40 ... 100	125 ... 1100 (11 x I_n)	40 ... 100	**3VL3510-1□□30-□□□□**	1	1 unit	1CC
FG frame	150	60 ... 150	187 ... 1650 (11 x I_n)	40 ... 100	**3VL3515-1□□30-□□□□**	1	1 unit	1CC
	250	70 ... 250	312 ... 2750 (11 x I_n)	40 ... 100	**3VL3525-1□□30-□□□□**	1	1 unit	1CC
VL400 UL,	250	70 ... 250	312 ... 2750 (11 x I_n)	40 ... 100	**3VL4125-1□□30-□□□□**	1	1 unit	1CC
JG frame	400	150 ... 400	500 ... 4400 (11 x I_n)	40 ... 100	**3VL4140-1□□30-□□□□**	1	1 unit	1CC
VL400X UL,	400	150 ... 400	500 ... 4400 (11 x I_n)	40 ... 100	**3VL4840-1□□30-□□□□**	1	1 unit	1CC
LG frame	600	200 ... 600	750 ... 6000 (10 x I_n)	40 ... 100	**3VL4860-1□□30-□□□□**	1	1 unit	1CC
VL800 UL,	600	200 ... 600	750 ... 6000 (10 x I_n)	40 ... 100	**3VL6160-1□□30-□□□□**	1	1 unit	1CC
MG frame	800	300 ... 800	1000 ... 6000 (7.5 x I_n)	40 ... 100	**3VL6180-1□□30-□□□□**	1	1 unit	1CC
VL1200 UL,	800	300 ... 800	1000 ... 8800 (11 x I_n)	40 ... 100	**3VL7180-1□□30-□□□□**	1	1 unit	1CC
NG frame	1000	400 ... 1000	1250 ... 11000 (11 x I_n)	40 ... 100	**3VL7110-1□□30-□□□□**	1	1 unit	1CC
	1200	400 ... 1200	1500 ... 12000 (10 x I_n)	40 ... 100	**3VL7112-1□□30-□□□□**	1	1 unit	1CC
VL1600 UL,	1200	400 ... 1200	1500 ... 12000 (10 x I_n)	40 ... 100	**3VL8112-1□□30-□□□□**	1	1 unit	1CC
PG frame[3]	1600	700 ... 1600	2000 ... 9600 (6 x I_n)	40 ... 75	**3VL8116-1□□30-□□□□**	1	1 unit	1CC

Electronic Trip Units with LCD, 3-pole version

Line protection with LSIG function For 4-wire three-phase systems (vectorial summation current formation) t_{sd} = 0 to 0.5 s, tg = 0 to 0.5 s	**V M**
Line protection with LSIG (alarm) function For 4-wire three-phase systems (vectorial summation current formation) t_{sd} = 0 to 0.5 s, tg = 0 to 0.5 s	**V J**

L = overload
S = short-circuit protection, short-time delayed
I = short-circuit protection, instantaneous
G = ground-fault protection

1) UL Category Code Number.
2) Only for sizes for which I_i (max) = 11 x I_n. Here the factor is 11. Otherwise the following applies: I_{sd} (max) = (factor-1) x I_r (max). The factor is the value in brackets in the column I_i.
3) Operation of the molded case circuit breakers within the applicable range of UL 489/CSA is permitted only in conjunction with the mounting base, (see page 2/276).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	High breaking capacity H, up to 65 kA at 480 V (H)					SD	Very high breaking capacity L, up to 100 kA at 480 V (L)				
	Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG		Article No. www.siemens.com/product?Article No. Article No. supplement required, see page 2/250	Price per PU	PU (UNIT, SET, M)	PS	PG
d						d					
	3VL2506-2□□30-□□□□		1	1 unit	1CC		**3VL2506-3□□30-□□□□**		1	1 unit	1CC
	3VL2510-2□□30-□□□□		1	1 unit	1CC		**3VL2510-3□□30-□□□□**		1	1 unit	1CC
	3VL2515-2□□30-□□□□		1	1 unit	1CC		**3VL2515-3□□30-□□□□**		1	1 unit	1CC
	3VL3510-2□□30-□□□□		1	1 unit	1CC		**3VL3510-3□□30-□□□□**		1	1 unit	1CC
	3VL3515-2□□30-□□□□		1	1 unit	1CC		**3VL3515-3□□30-□□□□**		1	1 unit	1CC
	3VL3525-2□□30-□□□□		1	1 unit	1CC		**3VL3525-3□□30-□□□□**		1	1 unit	1CC
	3VL4125-2□□30-□□□□		1	1 unit	1CC		**3VL4125-3□□30-□□□□**		1	1 unit	1CC
	3VL4140-2□□30-□□□□		1	1 unit	1CC		**3VL4140-3□□30-□□□□**		1	1 unit	1CC
	3VL4840-2□□30-□□□□		1	1 unit	1CC		**3VL4840-3□□30-□□□□**		1	1 unit	1CC
	3VL4860-2□□30-□□□□		1	1 unit	1CC		**3VL4860-3□□30-□□□□**		1	1 unit	1CC
	3VL6160-2□□30-□□□□		1	1 unit	1CC		**3VL6160-3□□30-□□□□**		1	1 unit	1CC
	3VL6180-2□□30-□□□□		1	1 unit	1CC		**3VL6180-3□□30-□□□□**		1	1 unit	1CC
	3VL7180-2□□30-□□□□		1	1 unit	1CC		**3VL7180-3□□30-□□□□**		1	1 unit	1CC
	3VL7110-2□□30-□□□□		1	1 unit	1CC		**3VL7110-3□□30-□□□□**		1	1 unit	1CC
	3VL7112-2□□30-□□□□		1	1 unit	1CC		**3VL7112-3□□30-□□□□**		1	1 unit	1CC
	3VL8112-2□□30-□□□□		1	1 unit	1CC		**3VL8112-3□□30-□□□□**		1	1 unit	1CC
	3VL8116-2□□30-□□□□		1	1 unit	1CC		**3VL8116-3□□30-□□□□**		1	1 unit	1CC
	VM						**VM**				
	VJ						**VJ**				

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Selection and ordering data

1st Article No. supplement:
Undervoltage and shunt releases,
wiring directly to accessories

Rated control supply voltage U_S/frequency		Article No. supplement			Molded case circuit breakers Type	
50/60 Hz AC DC		**3VL . . . . - . . . . . - ☐ ☐ . .**			**VL150X UL (CG frame) to VL400X UL (LG-Frame)[1]**	**VL800 UL (MG frame) to VL1600 UL (PG frame)**
					Additional price	Additional price
Without auxiliary releases			**0**	**A**	None	None
With undervoltage release Right pole only						
V AC	V DC					
--	12		**2**	**N**	✓[1]	✓
--	24		**2**	**P**	✓[1]	✓
--	48		**2**	**U**	✓[1]	✓
--	60		**2**	**V**	✓[1]	✓
--	110-127		**2**	**R**	✓[1]	✓
--	220-250		**2**	**S**	✓[1]	✓
24	--		**2**	**D** [2]	✓[1]	--
110-127	--		**2**	**G**	✓[1]	✓
220-250	--		**2**	**H**	✓[1]	✓
208	--		**2**	**M**	✓[1]	✓
277	--		**2**	**Q**	✓[1]	✓
380-415	--		**2**	**J**	✓[1]	✓
440-480	--		**2**	**K**	✓[1]	✓
500-525	--		**2**	**L** [2]	✓[1]	--
With shunt release Right pole only						
V AC	V DC					
--	24		**8**	**C**	✓[1]	✓
--	48-60		**8**	**J**	✓[1]	✓
--	110-127		**8**	**K**	✓[1]	✓
--	220-250		**8**	**Q**	✓[1]	✓
48-60	--		**8**	**M**	✓[1]	✓
110-127	--		**8**	**R**	✓[1]	✓
208-277	--		**8**	**T**	✓[1]	✓
380-600	--		**8**	**V**	✓[1]	✓

2nd Article No. supplement:
Auxiliary switches (HS) and alarm switches (AS),
left/right pole,
wiring directly to accessories

Equipment	Article No. supplement			Molded case circuit breakers Type	
HS = 1 NO or 1 NC contact block AS = 1 NO contact block	3VL . . . . - . . . . . - . . ☐ ☐			**VL150X UL (CG frame) to VL400X UL (LG frame)**	VL800 UL (MG frame) to VL1600 UL (PG frame)
				Additional price	Additional price
Without auxiliary/alarm switches		**A**	**0**	None	None
2 HS (1 NO/1 NC)[3]		**B**	**1**	✓[4]	--
4 HS (2 NO/2 NC)		**C**	**1**	--	✓
2 HS (1 NO/1 NC) + 1 AS (1 NO)		**D**	**1**	✓[4]	--
2 HS (1 NO/1 NC) + 1 AS (1 NO)[5]		**E**	**1**	--	✓

✓ Additional price

-- Not available

1) Only an undervoltage release or a shunt release or an auxiliary/alarm switch combination is possible for VL150 UL (DG frame)/VL250 UL (FG frame) molded case circuit breakers with an Electronic Trip Unit.

2) Not for VL800 UL (MG frame), VL1200 UL (NG frame) and VL1600 UL (PG frame) molded case circuit breakers.

3) Up to 3 HS are possible with a mounting adapter.

4) Except for installation in the left accessory compartment of the VL150 UL (DG frame)/VL250 UL (FG frame) molded case circuit breakers with Electronic Trip Unit because this compartment is fitted with the tripping solenoid. Only an auxiliary release or an auxiliary/alarm switch combination can be installed on the right.

5) Up to 2 HS + 2 AS are possible with a mounting adapter.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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When ordering, add **"-Z"** to the complete Article No. and add the relevant order code(s).		Article No. with **"-Z"** 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 **3VL . . . . – . . . . . – . . . . –Z** and additional order code(s) ☐ ☐ ☐ **+ . . . + . . .** Code for further versions **-Z**	Additional price
For fixed-mounted molded case circuit breakers (wired in factory)			
Wiring for internal accessories (Auxiliary switches, alarm switches, or auxiliary releases not included in scope of supply) with connecting cables (3 m long) brought out at the rear	VL150X UL (CG frame) to VL1600 UL (PG frame)	**L 0 2**	✓
Wiring for motorized operating mechanisms (Motorized operating mechanism not included in scope of supply, for selection and ordering data see pages 2/256 to 2/264) with connecting cables (3 m long) or brought out at the top in the case of VL150X UL (CG frame) to VL400X UL (LG frame) or brought out at the right in the case of VL800 UL (MG frame) to VL1600 UL (PG frame)	VL150X UL (CG frame) to VL1600 UL (PG frame)	**L 1 2**	✓
Motorized operating mechanisms (24 V DC) Mounted on molded case circuit breaker (motorized operating mechanism included in the scope of supply) **with wiring for internal accessories** of the molded case circuit breaker with connecting cables (3 m long) brought out at the rear (auxiliary switches, alarm switches, or auxiliary releases not included in scope of supply)	VL150X UL (CG frame) to VL250 UL (FG frame)	**M 2 4**	✓
	VL400 UL (JG frame) to VL400X UL (LG frame)		✓
	VL800 UL (MG frame)		✓
	VL1200 UL (NG frame) to VL1600 UL (PG frame)		✓
Motorized operating mechanisms (42-48 V AC/DC) Mounted on molded case circuit breaker (motorized operating mechanism included in the scope of supply) **with wiring for internal accessories** of the molded case circuit breaker with connecting cables (3 m long) brought out at the rear (auxiliary switches, alarm switches, or auxiliary releases not included in scope of supply)	VL150X UL (CG frame) to VL250 UL (FG frame)	**M 4 2**	✓
	VL400 UL (JG frame) to VL400X UL (LG frame)		✓
	VL800 UL (MG frame)		✓
	VL1200 UL (NG frame) to VL1600 UL (PG frame)		✓
Motorized operating mechanisms (60 V AC/DC) Mounted on molded case circuit breaker (motorized operating mechanism included in the scope of supply) **with wiring for internal accessories** of the molded case circuit breaker with connecting cables (3 m long) brought out at the rear (auxiliary switches, alarm switches, or auxiliary releases not included in scope of supply)	VL150X UL (CG frame) to VL250 UL (FG frame)	**M 6 0**	✓
	VL400 UL (JG frame) to VL400X UL (LG frame)		✓
	VL800 UL (MG frame)		✓
	VL1200 UL (NG frame) to VL1600 UL (PG frame)		✓
Motorized operating mechanisms (110-127 V AC/DC) Mounted on molded case circuit breaker (motorized operating mechanism included in the scope of supply) **with wiring for internal accessories** of the molded case circuit breaker with connecting cables (3 m long) brought out at the rear (auxiliary switches, alarm switches, or auxiliary releases not included in scope of supply)	VL150X UL (CG frame) to VL250 UL (FG frame)	**M 1 1**	✓
	VL400 UL (JG frame) to VL400X UL (LG frame)		✓
	VL800 UL (MG frame)		✓
	VL1200 UL (NG frame) to VL1600 UL (PG frame)		✓
Motorized operating mechanisms (220-250 V AC/DC) Mounted on molded case circuit breaker (motorized operating mechanism included in the scope of supply) **with wiring for internal accessories** of the molded case circuit breaker with connecting cables (3 m long) brought out at the rear (auxiliary switches, alarm switches, or auxiliary releases not included in scope of supply)	VL150X UL (CG frame) to VL250 UL (FG frame)	**M 2 2**	✓
	VL400 UL (JG frame) to VL400X UL (LG frame)		✓
	VL800 UL (MG frame)		✓
	VL1200 UL (NG frame) to VL1600 UL (PG frame)		✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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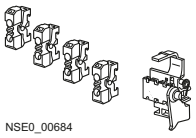
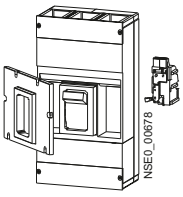
Selection and ordering data

	Wiring directly to accessories	SD	For VL150X UL (CG frame) to VL400X UL (LG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Auxiliary switches and auxiliary releases (UL file: E69455)							
	3-pole						
 NSE0_00684 3VL9400-2A.01	**Auxiliary switches (HS) and alarm switches (AS)** For retrofitting						
	Assembly kits: 2 HS (1 NO + 1 NC); Mounting side: N, left[1], right		**3VL9400-2AB01**		1	1 unit	1CC
	4 HS (2 NO + 2 NC); N, left, right		--				
	2 HS (1 NC + 1 NO); left, right[2]		**3VL9400-2AD01**		1	1 unit	1CC
	+ 1 AS (1 NO) (assembly kit); Left		--				
	Additional auxiliary switch/alarm switch combinations		See page 2/254.				
 NSE0_00678 3VL9400-1S.01, 3VL9400 1U.01	**Shunt releases** For retrofitting						
	V AC: --; V DC: 24; Mounting side: Right pole only		**3VL9400-1SC01**		1	1 unit	1CC
	V AC: --; V DC: 48 ... 60; Right pole only		**3VL9400-1SJ01**		1	1 unit	1CC
	V AC: --; V DC: 110 ... 127; Right pole only		**3VL9400-1SK01**		1	1 unit	1CC
	V AC: --; V DC: 220 ... 250; Right pole only		**3VL9400-1SQ01**		1	1 unit	1CC
	V AC: 48 ... 60; V DC: --; Right pole only		**3VL9400-1SM01**		1	1 unit	1CC
	V AC: 110 ... 127; V DC: --; Right pole only		**3VL9400-1SR01**		1	1 unit	1CC
	V AC: 208 ... 277; V DC: --; Right pole only		**3VL9400-1ST01**		1	1 unit	1CC
	V AC: 380 ... 600; V DC: --; Right pole only		**3VL9400-1SV01**		1	1 unit	1CC
	Undervoltage releases For retrofitting						
	V AC: --; V DC: 12; Mounting side: Right pole only		**3VL9400-1UN01**		1	1 unit	1CC
	V AC: --; V DC: 24; Right pole only		**3VL9400-1UP01**		1	1 unit	1CC
	V AC: --; V DC: 48; Right pole only		**3VL9400-1UU01**		1	1 unit	1CC
	V AC: --; V DC: 60; Right pole only		**3VL9400-1UV01**		1	1 unit	1CC
	V AC: 24; V DC: --; Right pole only		**3VL9400-1UD01**		1	1 unit	1CC
	V AC: 110 ... 127; V DC: --; Right pole only		**3VL9400-1UG01**		1	1 unit	1CC
	V AC: --; V DC: 110 ... 127; Right pole only		**3VL9400-1UR01**		1	1 unit	1CC
	V AC: 208; V DC: --; Right pole only		**3VL9400-1UM01**		1	1 unit	1CC
	V AC: 220 ... 250; V DC: --; Right pole only		**3VL9400-1UH01**		1	1 unit	1CC
	V AC: --; V DC: 220 ... 250; Right pole only		**3VL9400-1US01**		1	1 unit	1CC
	V AC: 277; V DC: --; Right pole only		**3VL9400-1UQ01**		1	1 unit	1CC
	V AC: 380 ... 415; V DC: --; Right pole only		**3VL9400-1UJ01**		1	1 unit	1CC
	V AC: 440 ... 480; V DC: --; Right pole only		**3VL9400-1UK01**		1	1 unit	1CC
	V AC: 500 ... 525; V DC: --; Right pole only		**3VL9400-1UL01**		1	1 unit	1CC

1) Except for installation in the left accessory compartment of the VL150 UL (DG frame)/VL250 UL (FG frame) molded case circuit breakers with Electronic Trip Unit because this compartment is fitted with the tripping solenoid.

2) In the case of VL400 UL (JG frame)/VL400X UL (LG frame): Unsuitable for mounting in the right accessory compartment. The 3VL9400-2AB01 assembly kit with auxiliary switches only is recommended.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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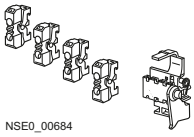
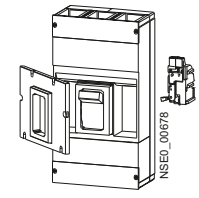
	Wiring directly to accessories	SD	For VL800 UL (MG frame) to VL1600 UL (PG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Auxiliary switches and auxiliary releases (UL file: E69455)							
	3-pole						
 NSE0_00684 3VL9800-2A.01	**Auxiliary switches (HS) and alarm switches (AS)** For retrofitting						
	Assembly kits / Mounting side						
	2 HS (1 NO + 1 NC) / N, left, right		--				
	4 HS (2 NO + 2 NC) / N, left, right		**3VL9800-2AC01**		1	1 unit	1CC
	2 HS (1 NC + 1 NO) / Left, right		--				
	+ 1 AS (1 NO) (assembly kit) / Left		**3VL9800-2AE01**		1	1 unit	1CC
	Additional auxiliary switch/alarm switch combinations		See page 2/254.				
 NSE0_00678 3VL9800-1S.01, 3VL9800-1U.01	**Shunt releases** For retrofitting						
	V AC / V DC / Mounting side						
	-- / 24 / Right pole only		**3VL9800-1SC01**		1	1 unit	1CC
	-- / 48 ... 60 / Right pole only		**3VL9800-1SJ01**		1	1 unit	1CC
	-- / 110 ... 127 / Right pole only		**3VL9800-1SK01**		1	1 unit	1CC
	-- / 220 ... 250 / Right pole only		**3VL9800-1SQ01**		1	1 unit	1CC
	48 ... 60 / -- / Right pole only		**3VL9800-1SM01**		1	1 unit	1CC
	110 ... 127 / -- / Right pole only		**3VL9800-1SR01**		1	1 unit	1CC
	208 ... 277 / -- / Right pole only		**3VL9800-1ST01**		1	1 unit	1CC
	380 ... 600 / -- / Right pole only		**3VL9800-1SV01**		1	1 unit	1CC
	Undervoltage releases For retrofitting						
	V AC / V DC / Mounting side						
	-- / 12 / Right pole only		**3VL9800-1UN01**		1	1 unit	1CC
	-- / 24 / Right pole only		**3VL9800-1UP01**		1	1 unit	1CC
	-- / 48 / Right pole only		**3VL9800-1UU01**		1	1 unit	1CC
	-- / 60 / Right pole only		**3VL9800-1UV01**		1	1 unit	1CC
	110 ... 127 / -- / Right pole only		**3VL9800-1UG01**		1	1 unit	1CC
	-- / 110 ... 127 / Right pole only		**3VL9800-1UR01**		1	1 unit	1CC
	208 / -- / Right pole only		**3VL9800-1UM01**		1	1 unit	1CC
	220 ... 250 / -- / Right pole only		**3VL9800-1UH01**		1	1 unit	1CC
	-- / 220 ... 250 / Right pole only		**3VL9800-1US01**		1	1 unit	1CC
	277 / -- / Right pole only		**3VL9800-1UQ01**		1	1 unit	1CC
	380 ... 415 / -- / Right pole only		**3VL9800-1UJ01**		1	1 unit	1CC
	440 ... 480 / -- / Right pole only		**3VL9800-1UK01**		1	1 unit	1CC
	500 ... 525 / -- / Right pole only		--				

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Accessories and spare parts

For molded case circuit breakers	Maximum combination of auxiliary switches (HS) and alarm switches (AS)	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Type		d					
3SB adapters and 3SB contact blocks							
Mounting adapters for auxiliary and alarm switch combinations (UL file: E69455)							
For installation in the left pole of the molded case circuit breaker							
VL150X UL (CG frame), VL150 UL (DG frame), VL250 UL (FG frame), VL400 UL (JG frame), VL400X UL (LG frame)	Up to 3 HS[1]		**3VL9400-2AH01**		1	1 unit	1CC
	2 HS + 1 AS[1)2)]		**3VL9400-2AJ11**		1	1 unit	1CC
VL800 UL (MG frame), VL1200 UL (NG frame), VL1600 UL (PG frame)	Up to 4 HS		**3VL9816-2AL01**		1	1 unit	1CC
	2 HS + 2 AS		**3VL9816-2AN11**		1	1 unit	1CC
For installation in the right pole of the molded case circuit breaker							
VL150X UL (CG frame), VL150 UL (DG frame), VL250 UL (FG frame), VL400 UL (JG frame), VL400X UL (LG frame)[2)]	Up to 3 HS[1)]		**3VL9400-2AH01**		1	1 unit	1CC
	2 HS + 1 AS[1)2)]		**3VL9400-2AJ21**		1	1 unit	1CC
VL800 UL (MG frame), VL1200 UL (NG frame), VL1600 UL (PG frame)	Up to 4 HS		**3VL9816-2AL01**		1	1 unit	1CC
	2 HS + 2 AS		**--**				

1) Except for installation in the left pole of the VL150 UL (DG frame)/VL250 UL (FG frame) molded case circuit breakers with Electronic Trip Unit. Only an auxiliary release or an auxiliary/alarm switch combination can be installed on the right.

2) In the case of VL400 UL (JG frame)/VL400X UL (LG frame): 3VL9400-2AJ21 unsuitable for mounting in the right-hand accessory compartment.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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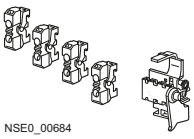
For auxiliary switches (HS) and alarm switches (AS)	SD	Molded case circuit breakers Type **VL150X UL (CG frame) to VL1600 UL (PG frame)**		PU (UNIT, SET, M)	PS	PG
	d	Article No. www.siemens.com/product?Article No.	Price per PU			
Contact blocks for auxiliary switch and alarm switch combinations						
1 NO		**3SB3400-0J**		1	1 unit	41J
1 NC		**3SB3400-0K**		1	1 unit	41J

For auxiliary switch or alarm switch combinations not included in the kits provided as standard, the mounting adapters specified can be ordered separately together with the required contact blocks:
1 HS or 1 AS with NO contact 3SB3400-0J
1 HS or 1 AS with NC contact 3SB3400-0K

Notes:

A maximum of 6 contact blocks (HS) per molded case circuit breaker (VL150X UL (CG frame) to VL400X UL (LG frame)) and a maximum of 8 contact blocks (HS) per molded case circuit breaker (VL800 UL (MG frame) to VL1600 UL (PG frame)) are possible.

Four 3SB3 auxiliary contact blocks and one mounting adapter (right), suitable for VL800 UL (MG frame) to VL1600 UL (PG frame) molded case circuit breakers.



NSE0_00684

For retrofitting/equipment options, see chapter "Design", "Auxiliary releases and auxiliary switches".

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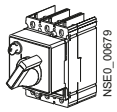
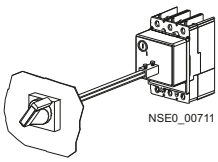
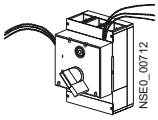
Accessories and spare parts

	Version	SD	For VL150X UL (CG frame) to VL250 UL (FG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Operating mechanisms							
	3-pole						
 3VL9.00-3H.01	**Front-operated rotary operating mechanisms (UL file: E69455)** For direct mounting on the molded case circuit breaker, without leading auxiliary switch, degree of protection IP30[1], black,		**3VL9300-3HA01**		1	1 unit	1CC
	EMERGENCY-STOP version Red knob, yellow indicator plate		**3VL9300-3HC01**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/277 to 2/281.						
 3VL9.00-3H.06	**Door-coupling rotary operating mechanisms, complete Installation in doors and covers (UL file: E69455)** NEMA 1, 12 Degree of protection IP65, including black knob with masking plate, indicator plate, removable door coupling, extension shaft 300 mm and front-operated rotary operating mechanism for the respective molded case circuit breaker		**3VL9300-3HF06**		1	1 unit	1CC
	EMERGENCY-STOP version Red knob, yellow indicator plate, without leading auxiliary switch		**3VL9300-3HG06**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/277 to 2/281.						
	Interlocking module UL 508A[2]						
	For use with 3VL1, 3VL2, 3VL3, 3VL4, 3VL4X and 3RV19.6-2		**8UC9400**		1	1 unit	1CL
 3VL9.00-3A.11	**Leading auxiliary switches for installation in a front-operated rotary operating mechanism or door-coupling rotary operating mechanism (UL file: E69455)** Standard or EMERGENCY-STOP version						
	"OFF after ON" Leading auxiliary switches when switching on		**3VL9300-3AS11**		1	1 unit	1CC
	1 changeover contact with 1.5 m long cables						
	2 changeover contacts with 1.5 m long cables		**3VL9300-3AT11**		1	1 unit	1CC
	"ON after OFF" Leading auxiliary switches when switching off 1 changeover contact with 1.5 m long cables		**3VL9300-3AU11**		1	1 unit	1CC
	2 changeover contacts with 1.5 m long cables		**3VL9300-3AW11**		1	1 unit	1CC
	Rotary operating mechanisms with shaft stub, without knob Without leading auxiliary switch, for auxiliary switches, see above.		**3VL9300-3HE01**		1	1 unit	1CC
	Retaining brackets, suitable for matching door-coupling rotary operating mechanisms, complete with locking device						
	Retaining bracket is mounted on the operating mechanism, recommended for extension shafts >250 mm		**3VL9300-3HP02**		1	1 unit	1CC
	- For 6 mm shaft		**3VL9300-3HP00**		1	1 unit	1CC

1) IP40 with additional masking frame mounted on the door cut-out.

2) In combination with 3VL1 to VL5, the interlocking module can be used with the complete door-coupling rotary operating mechanisms as follows:

	3VL1/3VL2/3VL3	3VL4/3VL4X
Door-coupling rotary operating mechanisms, complete		
• Black knob, light-gray indicator plate	3VL9300-3HF06	3VL9400-3HF06
• Red knob, yellow indicator plate	3VL9300-3HG06	3VL9400-3HG06

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL400 UL (JG frame) to VL400X UL (LG frame)	PU (UNIT, SET, M)	PS	PG	SD	For VL800 UL (MG frame)	PU (UNIT, SET, M)	PS	PG
	Article No. www.siemens.com/product?Article No. Price per PU					Article No. www.siemens.com/product?Article No. Price per PU			
d					d				
	3VL9400-3HA01	1	1 unit	1CC		**3VL9600-3HA01**	1	1 unit	1CC
	3VL9400-3HC01	1	1 unit	1CC		**3VL9600-3HC01**	1	1 unit	1CC
	3VL9400-3HF06	1	1 unit	1CC		**3VL9600-3HF06**	1	1 unit	1CC
	3VL9400-3HG06	1	1 unit	1CC		**3VL9600-3HG06**	1	1 unit	1CC
	8UC9400	1	1 unit	1CL		**--**			
	3VL9400-3AS11	1	1 unit	1CC		**3VL9600-3AS11**	1	1 unit	1CC
	3VL9400-3AT11	1	1 unit	1CC		**3VL9600-3AT11**	1	1 unit	1CC
	3VL9400-3AU11	1	1 unit	1CC		**3VL9600-3AU11**	1	1 unit	1CC
	3VL9400-3AW11	1	1 unit	1CC		**3VL9600-3AW11**	1	1 unit	1CC
	3VL9400-3HE01	1	1 unit	1CC		**3VL9600-3HE01**	1	1 unit	1CC
	3VL9400-3HP00	1	1 unit	1CC		**3VL9600-3HP00**	1	1 unit	1CC
	--					**--**			

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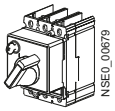
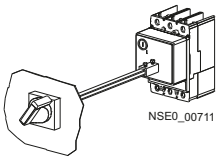
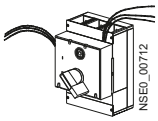
Accessories and spare parts

	Version	SD	For VL1200 UL (NG frame) to VL1600 UL (PG frame)		PU (UNIT, SET, M)	PS	PG
			Article No. www.siemens.com/product?Article No.	Price per PU			
		d					
Operating mechanisms							
	3-pole						
 3VL9.00-3H.01	**Front-operated rotary operating mechanisms (UL file: E69455)** For direct mounting on the molded case circuit breaker, without leading auxiliary switch, degree of protection IP30[1], black,		**3VL9800-3HA01**		1	1 unit	1CC
	EMERGENCY-STOP version Red knob, yellow indicator plate		**3VL9800-3HC01**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/277 to 2/281.						
 3VL9.00-3H.06	**Door-coupling rotary operating mechanisms, complete Installation in doors and covers (UL file: E69455)** Degree of protection IP65, including black knob with masking plate, indicator plate, removable door coupling, extension shaft 300 mm and front-operated rotary operating mechanism for the respective molded case circuit breaker		**3VL9800-3HF06**		1	1 unit	1CC
	EMERGENCY-STOP version Red knob, yellow indicator plate, without leading auxiliary switch		**3VL9800-3HG06**		1	1 unit	1CC
	For safety locks for installation by the customer, see pages 2/277 to 2/281.						
 3VL9.00-3A.11	**Leading auxiliary switches for installation in a front-operated rotary operating mechanism or door-coupling rotary operating mechanism (UL file: E69455)** Standard or EMERGENCY-STOP version						
	"OFF after ON" Leading auxiliary switches when switching on						
	1 changeover contact with 1.5 m long cables		**3VL9800-3AS21**		1	1 unit	1CC
	2 changeover contacts with 1.5 m long cables		**3VL9800-3AT21**		1	1 unit	1CC
	"ON after OFF" Leading auxiliary switches when switching off		**3VL9800-3AU11**		1	1 unit	1CC
	1 changeover contact with 1.5 m long cables						
	2 changeover contacts with 1.5 m long cables		**3VL9800-3AW11**		1	1 unit	1CC
	Rotary operating mechanisms with shaft stub, without knob Without leading auxiliary switch, for auxiliary switches, see above.		**3VL9800-3HE01**		1	1 unit	1CC
	Retaining brackets, suitable for matching door-coupling rotary operating mechanisms, complete with locking device						
	Retaining bracket is mounted on the operating mechanism, recommended for extension shafts >250 mm		**3VL9800-3HP00**		1	1 unit	1CC

[1] IP40 with additional masking frame mounted on the door cut-out.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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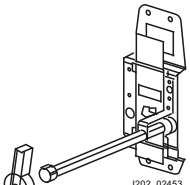
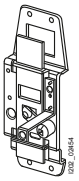
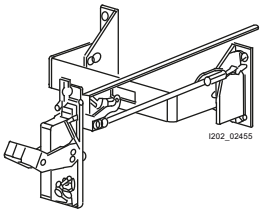
	Version	SD	For VL150 UL (DG frame) to VL250 UL (FG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Operating mechanisms							
	3-pole						
 3VL9.00-3JA01	**Front-operated rotary operating mechanisms**						
	Fixed depth; knob is fastened directly on molded case circuit breaker, silver knob, black lettering Lockable with up to 3 padlocks		**3VL9300-3JA01**		1	1 unit	1CC
 3VL9.00-3JD01	**Door-coupling rotary operating mechanisms, complete**						
	Variable installation depth, knob for door fitting, including knob with masking plate Black knob Indicator plate, removable door coupling 12-inch extension shaft and front-operated rotary operating mechanism for the respective molded case circuit breaker Lockable knob (up to 3 padlocks), NEMA 1, 12		**3VL9300-3JD01**		1	1 unit	1CC
 3VL9.00-3JE01	**Switching mechanism for door-coupling rotary operating mechanisms**						
	Switching mechanism		**3VL9300-3JE01**		1	1 unit	1CC
	Handle for door-coupling rotary operating mechanisms						
	Standard version NEMA 1, 12		**3VL9600-3JF11**		1	1 unit	1CC
	NEMA 3R		**3VL9600-3JF01**		1	1 unit	1CC
	NEMA 4X		**3VL9600-3JF41**		1	1 unit	1CC
	EMERGENCY-STOP version NEMA 1, 12 • Red knob • Yellow indicator plate		**3VL9600-3JG01**		1	1 unit	1CC
	Extension shaft for door-coupling rotary operating mechanisms						
	2 inch (50 mm)		**3VL9600-3JJ01**		1	1 unit	1CC
	3 inch (76 mm)		**--**				
	12 inch (0.3 m)		**3VL9600-3JJ11**		1	1 unit	1CC
	16 inch (0.4 m)		**3VL9600-3JJ21**		1	1 unit	1CC
	24 inch (0.6 m) with support bracket		**3VL9600-3JJ41**		1	1 unit	1CC
 3VL9300-3JF81	**NFPA-79 intermediate operating mechanism**						
	For door-coupling rotary operating mechanisms		**3VL9300-3JF81**		1	1 unit	1CC
 3VL9300-3JS01	**Operating mechanism with flange connection for variable installation depth**						
	Adjustable from 8 to 16 inch (approx. 200 to 400 mm)						
	Complete kit, including knob						
	Red/black knob[1]						
	NEMA 1, 3R, 12 plastic		**3VL9300-3JS01**		1	1 unit	1CC
	NEMA 4, 4X chrome-plated steel		**3VL9300-3JS41**		1	1 unit	1CC
	Black knob[1]						
	NEMA 1, 3R, 12 plastic		**3VL9300-3JS11**		1	1 unit	1CC
	NEMA 4, 4X chrome-plated steel		**3VL9300-3JS51**		1	1 unit	1CC

[1] The knobs in monochrome gray or black are preferably used in IEC markets. Red/black knobs (red for ON) are standard in UL markets.

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Accessories and spare parts

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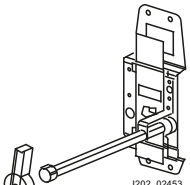
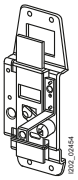
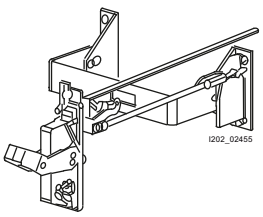
	Version	SD	For VL400 UL (JG frame) to VL400X UL (LG frame)	PU (UNIT, SET, M)	PS	PG
			Article No. www.siemens.com/product?Article No. / Price per PU			
		d				
Operating mechanisms						
	3-pole					
 3VL9.00-3JA01	**Front-operated rotary operating mechanisms** Fixed depth; knob is fastened directly on molded case circuit breaker, silver knob, black lettering Lockable with up to 3 padlocks		**3VL9400-3JA01**	1	1 unit	1CC
 3VL9.00-3JD01	**Door-coupling rotary operating mechanisms, complete** Variable installation depth, knob for door fitting, including knob with masking plate Black knob Indicator plate, removable door coupling 12-inch extension shaft and front-operated rotary operating mechanism for the respective molded case circuit breaker Lockable knob (up to 3 padlocks) NEMA 1, 12		**3VL9400-3JD01**	1	1 unit	1CC
 3VL9800-3JE01	**Switching mechanism for door-coupling rotary operating mechanisms** Switching mechanism		**3VL9400-3JE01**	1	1 unit	1CC
	Handle for door-coupling rotary operating mechanisms					
	Standard version	NEMA 1, 12	**3VL9600-3JF11**	1	1 unit	1CC
		NEMA 3R	**3VL9600-3JF01**	1	1 unit	1CC
		NEMA 4X	**3VL9600-3JF41**	1	1 unit	1CC
	EMERGENCY-STOP version • Red knob • Yellow indicator plate	NEMA 1, 12	**3VL9600-3JG01**	1	1 unit	1CC
	Extension shaft for door-coupling rotary operating mechanisms					
	2 inch (50 mm)		**3VL9600-3JJ01**	1	1 unit	1CC
	3 inch (76 mm)		--			
	12 inch (0.3 m)		**3VL9600-3JJ11**	1	1 unit	1CC
	16 inch (0.4 m)		**3VL9600-3JJ21**	1	1 unit	1CC
	24 inch (0.6 m) with support bracket		**3VL9600-3JJ41**	1	1 unit	1CC
 3VL9800-3JF81	**NFPA-79 intermediate operating mechanism** For door-coupling rotary operating mechanisms		**3VL9600-3JF81**	1	1 unit	1CC
 3VL9400-3JS01	**Operating mechanism with flange connection for variable installation depth** Adjustable from 8 to 16 inch (approx. 200 to 400 mm) Complete kit, including knob Red/black knob[1]					
	NEMA 1, 3R, 12 plastic		**3VL9400-3JS01**	1	1 unit	1CC
	NEMA 4, 4X chrome-plated steel		**3VL9400-3JS41**	1	1 unit	1CC
	Black knob[1]					
	NEMA 1, 3R, 12 plastic		**3VL9400-3JS11**	1	1 unit	1CC
	NEMA 4, 4X chrome-plated steel		**3VL9400-3JS51**	1	1 unit	1CC

[1] The knobs in monochrome gray or black are preferably used in IEC markets. Red/black knobs (red for ON) are standard in UL markets.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL800 UL (MG frame)	PU (UNIT, SET, M)	PS	PG	SD	For VL1200 UL (NG frame) to VL1600 UL (PG frame)	PU (UNIT, SET, M)	PS	PG
d	Article No. www.siemens.com/product?Article No. Price per PU				d	Article No. www.siemens.com/product?Article No. Price per PU			
	--					--			
	3VL9600-3JD01	1	1 unit	1CC		--			
	3VL9600-3JE01	1	1 unit	1CC		**3VL9800-3JE01**	1	1 unit	1CC
	3VL9600-3JF11	1	1 unit	1CC		**3VL9800-3JF01**	1	1 unit	1CC
	3VL9600-3JF01	1	1 unit	1CC		**3VL9800-3JF01**	1	1 unit	1CC
	3VL9600-3JF41	1	1 unit	1CC		**3VL9800-3JF41**	1	1 unit	1CC
	3VL9600-3JG01	1	1 unit	1CC		--			
	3VL9600-3JJ01	1	1 unit	1CC		--			
	--					**3VL9800-3JJ01**	1	1 unit	1CC
	3VL9600-3JJ11	1	1 unit	1CC		**3VL9800-3JJ11**	1	1 unit	1CC
	3VL9600-3JJ21	1	1 unit	1CC		--			
	3VL9600-3JJ41	1	1 unit	1CC		**3VL9800-3JJ21**	1	1 unit	1CC
	3VL9600-3JF81	1	1 unit	1CC		**3VL9800-3JF81**	1	1 unit	1CC
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Minimum order quantity (PS) or a multiple thereof can be ordered.

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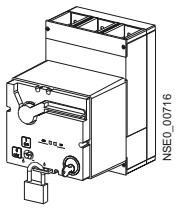
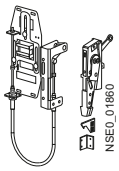
Accessories and spare parts

	Version	SD	For VL150X UL (CG frame) to VL250 UL (FG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Operating mechanisms							
	3-pole						
 3VL9.00-3M.01	**Motorized operating mechanism with spring energy mechanism[1] (UL file: E69455)** Degree of protection IP30, with locking device for 3 padlocks, synchronizable						
	50/60 Hz V AC / V DC						
	-- / 24		**3VL9300-3MJ01**		1	1 unit	1CC
	42 ... 48 / 42 ... 48		**3VL9300-3ML01**		1	1 unit	1CC
	60 / 60		**3VL9300-3MS01**		1	1 unit	1CC
	110 ... 127 / 110 ... 127		**3VL9300-3MN01**		1	1 unit	1CC
	220 ... 250 / 220 ... 250		**3VL9300-3MQ01**		1	1 unit	1CC
	Toggle lever extension		**--**				
 3VL9.00-3JM01	**Max-Flex operating mechanism, complete including switching mechanism, Bowden cable, red/black knob, NEMA 1, 3R, 12 plastic**						
	Bowden cable, 36 inch (0.9 m)		**3VL9300-3JM01**		1	1 unit	1CC
	Bowden cable, 48 inch (1.2 m)		**--**				
	Knob for Max-Flex operating mechanism						
	Red/black knob[2]						
	NEMA 1, 3R, 12 plastic		**3VL9600-3JP01**		1	1 unit	1CC
	NEMA 1, 3R, 12 steel – epoxy sheathed		**3VL9600-3JP21**		1	1 unit	1CC
	NEMA 4, 4X chrome-plated steel		**3VL9600-3JP41**		1	1 unit	1CC
	Gray knob[2]						
	NEMA 1, 3R, 12 plastic		**3VL9600-3JP11**		1	1 unit	1CC
	Black knob[2]						
	NEMA 1, 3R, 12 steel – epoxy sheathed		**3VL9600-3JP61**		1	1 unit	1CC
	Switching mechanism for Max-Flex operating mechanism		**3VL9300-3JN01**		1	1 unit	1CC
	Bowden cable for Max-Flex operating mechanism						
	36 inch (0.9 m)		**3VL9300-3JQ31**		1	1 unit	1CC
	48 inch (1.2 m)		**3VL9300-3JQ41**		1	1 unit	1CC
	60 inch (1.5 m)		**3VL9300-3JQ61**		1	1 unit	1CC
	72 inch (1.8 m)		**3VL9300-3JQ71**		1	1 unit	1CC
	84 inch (2.1 m)		**3VL9300-3JQ81**		1	1 unit	1CC
	96 inch (2.4 m)		**3VL9300-3JQ21**		1	1 unit	1CC
	120 inch (3.0 m)		**3VL9300-3JQ01**		1	1 unit	1CC
	144 inch (3.6 m)		**3VL9300-3JQ11**		1	1 unit	1CC
	Screw set For attaching the Max Flex operating mechanism incl. circuit breaker to an 8US busbar adapter (60 mm busbar system).						
	• 1 set = 3 screws size M4 x 100 mm[3][4]		**3VL9300-8SE20**		1	1 unit	1CC
	• 1 set = 2 screws size M6 x 100 mm and 2 special screws with threaded head[5]		**--**				
	Leading auxiliary switches for Max-Flex operating mechanism						
	• 1 changeover contact with 1.5 m long cables		**3VL9300-2AP11**		1	1 unit	1CC
	• 2 changeover contacts with 1.5 m long cables		**3VL9300-2AP21**		1	1 unit	1CC

1) For safety lock as an assembly kit for retrofitting, see pages 2/277 to 2/281.

2) The knobs in monochrome gray or black are preferably used in IEC markets. Red/black knobs (red for ON) are standard in UL markets.

3) The combination of molded case circuit breaker VL150X (CG) incl. Max-Flex operating mechanism on 8US busbar adapter is not possible.

4) For 3VL25/DG and 3VL35/FG, please use the busbar adapter 8US1213-4AQ03.

5) For 3VL41/JG and 3VL48/LG, please use the busbar adapter 8US1213-4AH00.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL400 UL (JG frame) to VL400X UL (LG frame)	PU (UNIT, SET, M)	PS	PG	SD	For VL800 UL (MG frame)	PU (UNIT, SET, M)	PS	PG
	Article No. www.siemens.com/product?Article No. Price per PU					Article No. www.siemens.com/product?Article No. Price per PU			
d					d				
	3VL9400-3MJ01	1	1 unit	1CC		**3VL9600-3MJ01**	1	1 unit	1CC
	3VL9400-3ML01	1	1 unit	1CC		**3VL9600-3ML01**	1	1 unit	1CC
	3VL9400-3MS01	1	1 unit	1CC		**3VL9600-3MS01**	1	1 unit	1CC
	3VL9400-3MN01	1	1 unit	1CC		**3VL9600-3MN01**	1	1 unit	1CC
	3VL9400-3MQ01	1	1 unit	1CC		**3VL9600-3MQ01**	1	1 unit	1CC
	3VL9400-3HN01	1	1 unit	1CC		**3VL9600-3HN01**	1	1 unit	1CC
	--					**--**			
	3VL9400-3JM01	1	1 unit	1CC		**3VL9600-3JM01**	1	1 unit	1CC
	3VL9600-3JP01	1	1 unit	1CC		**3VL9600-3JP01**	1	1 unit	1CC
	3VL9600-3JP21	1	1 unit	1CC		**3VL9600-3JP21**	1	1 unit	1CC
	3VL9600-3JP41	1	1 unit	1CC		**3VL9600-3JP41**	1	1 unit	1CC
	3VL9600-3JP11	1	1 unit	1CC		**3VL9600-3JP11**	1	1 unit	1CC
	3VL9600-3JP61	1	1 unit	1CC		**3VL9600-3JP61**	1	1 unit	1CC
	3VL9400-3JN01	1	1 unit	1CC		**3VL9600-3JN01**	1	1 unit	1CC
	3VL9600-3JQ31	1	1 unit	1CC		**3VL9600-3JQ31**	1	1 unit	1CC
	3VL9600-3JQ41	1	1 unit	1CC		**3VL9600-3JQ41**	1	1 unit	1CC
	3VL9600-3JQ61	1	1 unit	1CC		**3VL9600-3JQ61**	1	1 unit	1CC
	3VL9600-3JQ71	1	1 unit	1CC		**3VL9600-3JQ71**	1	1 unit	1CC
	3VL9600-3JQ81	1	1 unit	1CC		**3VL9600-3JQ81**	1	1 unit	1CC
	3VL9600-3JQ21	1	1 unit	1CC		**3VL9600-3JQ21**	1	1 unit	1CC
	3VL9600-3JQ01	1	1 unit	1CC		**3VL9600-3JQ01**	1	1 unit	1CC
	3VL9600-3JQ11	1	1 unit	1CC		**3VL9600-3JQ11**	1	1 unit	1CC
	--					**--**			
	3VL9460-8SE20	1	1 unit	1CC		**--**			
	3VL9400-2AP11	1	1 unit	1CC		**3VL9800-2AP11**	1	1 unit	1CC
	3VL9400-2AP21	1	1 unit	1CC		**3VL9800-2AP21**	1	1 unit	1CC

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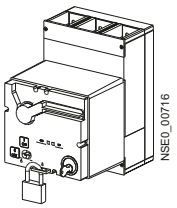
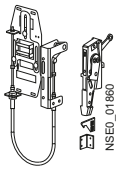
Accessories and spare parts

	Version	SD	For VL1200 UL (NG frame) to VL1600 UL (PG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Operating mechanisms							
	3-pole						
 3VL9.00-3M.01	**Motorized operating mechanism[1] (UL file: E69455)** Degree of protection IP30, with locking device for 3 padlocks, not synchronizable						
	50/60 Hz V AC / V DC						
	-- / 24		**3VL9800-3MJ01**		1	1 unit	1CC
	42 ... 48 / 42 ... 48		**3VL9800-3ML01**		1	1 unit	1CC
	60 / 60		**3VL9800-3MS01**		1	1 unit	1CC
	110 ... 127 / 110 ... 127		**3VL9800-3MN01**		1	1 unit	1CC
	220 ... 250 / 220 ... 250		**3VL9800-3MQ01**		1	1 unit	1CC
	Toggle lever extension		**3VL9800-3HN01**		1	1 unit	1CC
 3VL9.00-3JM01	**Max Flex operating mechanism, complete including switching mechanism, Bowden cable, red/black knob, NEMA 1, 3R, 12 steel – epoxy-sheathed**						
	Bowden cable, 36 inch (0.9 m)		--				
	Bowden cable, 48 inch (1.2 m)		**3VL9800-3JM01**		1	1 unit	1CC
	Knob for Max-Flex operating mechanism						
	Red/black knob[2]						
	NEMA 1, 3R, 12 plastic		--				
	NEMA 1, 3R, 12 steel – epoxy sheathed		**3VL9800-3JP01**		1	1 unit	1CC
	NEMA 4, 4X chrome-plated steel		**3VL9800-3JP41**		1	1 unit	1CC
	Gray knob[2]						
	NEMA 1, 3R, 12 plastic		--				
	Black knob[2]						
	NEMA 1, 3R, 12 steel – epoxy sheathed		**3VL9800-3JP11**		1	1 unit	1CC
	Switching mechanism for Max-Flex operating mechanism		**3VL9800-3JN01**		1	1 unit	1CC
	Bowden cable for Max-Flex operating mechanism						
	36 inch (0.9 m)		--				
	48 inch (1.2 m)		**3VL9800-3JQ41**		1	1 unit	1CC
	60 inch (1.5 m)		**3VL9800-3JQ61**		1	1 unit	1CC
	72 inch (1.8 m)		**3VL9800-3JQ71**		1	1 unit	1CC
	84 inch (2.1 m)		**3VL9800-3JQ81**		1	1 unit	1CC
	96 inch (2.4 m)		**3VL9800-3JQ21**		1	1 unit	1CC
	120 inch (3.0 m)		**3VL9800-3JQ01**		1	1 unit	1CC
	144 inch (3.6 m)		**3VL9800-3JQ11**		1	1 unit	1CC
	Leading auxiliary switches for Max-Flex operating mechanism						
	• 1 changeover contact with 1.5 m long cables		**3VL9800-2AP11**		1	1 unit	1CC
	• 2 changeover contacts with 1.5 m long cables		**3VL9800-2AP21**		1	1 unit	1CC

1) For safety lock as an assembly kit for retrofitting, see pages 2/277 to 2/281.

2) The knobs in monochrome gray or black are preferably used in IEC markets. Red/black knobs (red for ON) are standard in UL markets.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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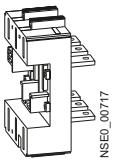
	Version	SD	For VL150X UL (CG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Plug-in versions/withdrawable versions (UL file: E69455)							
	3-pole						
 3VL9.00-4PA31	**Plug-in base assembly kits** Complete with base plate, base, blade contacts for circuit breakers, terminal covers for degree of protection IP20, fixing screws, trip pin						
	Rear connections						
	3-pole		**3VL9100-4PA31**		1	1 unit	1CC
	Front connections						
	3-pole		**3VL9100-4PC31**		1	1 unit	1CC
	Blade contacts As replacement for converting fixed-mounted into plug-in/withdrawable molded case circuit breakers, including trip pin						
	1 set = 6 units 3-pole		**3VL9100-4PS31**		1	1 unit	1CC
	Trip pins and springs As replacement for plug-in molded case circuit breaker		**3VL9100-4PF01**		1	1 unit	1CC
	Auxiliary circuit plug connections for plug-in bases[1] Accessory connections for plug-in molded case circuit breakers (factory-wired connectors) and for plug-in bases (coupling with screw terminal)						
	8 terminals[1]		**3VL9300-4PJ01**		1	1 unit	1CC
	Position signaling switches (connected/disconnected position) For plug-in base, 1 changeover contact, max. 2 signaling switches possible		**3VL9000-4WL01**		1	1 unit	1CC

[1] It is recommended to use a maximum of 2 auxiliary circuit plug-in systems per molded case circuit breaker (16 terminals).

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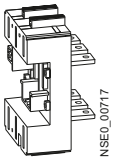
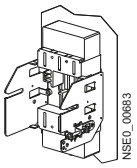
Accessories and spare parts

	Version	SD	for VL150 UL (DG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Plug-in versions/withdrawable versions (UL file: E69455)							
	3-pole						
 3VL9.00-4PA31	**Plug-in base assembly kits** Complete with base plate, base, blade contacts for circuit breakers, terminal covers for degree of protection IP20, fixing screws, trip pin						
	Rear connections						
	3-pole		**3VL9200-4PA31**		1	1 unit	1CC
	Front connections						
	3-pole		**3VL9200-4PC31**		1	1 unit	1CC
 3VL9.00-4WA31	**Withdrawable versions** Same as plug-in base assembly kit, with additional side panels and racking mechanism						
	Rear connections						
	3-pole		**3VL9200-4WA31**		1	1 unit	1CC
	Front connections						
	3-pole		**3VL9200-4WC31**		1	1 unit	1CC
	Blade contacts As replacement for converting fixed-mounted into plug-in/withdrawable molded case circuit breakers, including trip pin						
	1 set = 6 units 3-pole		**3VL9200-4PS31**		1	1 unit	1CC
	Trip pins and springs As replacement for plug-in/withdrawable circuit breaker		**3VL9300-4PF01**		1	1 unit	1CC
	Auxiliary circuit plug connections for plug-in bases Accessory connections for plug-in molded case circuit breakers (factory-wired connectors) and for plug-in bases or withdrawable version (coupling with screw terminal)		[1]				
	8 terminals		**3VL9300-4PJ01**		1	1 unit	1CC
	Position signaling switches (connected/disconnected position) For plug-in base, 1 changeover contact, max. 2 signaling switches possible		**3VL9000-4WL01**		1	1 unit	1CC

[1] It is recommended to use a maximum of 2 auxiliary circuit plug-in systems per molded case circuit breaker (16 terminals).

[2] It is recommended to use a maximum of 3 auxiliary circuit plug-in systems per molded case circuit breaker (24 terminals).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL250 UL (FG frame)	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	For VL400 UL (JG frame)	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
d							d						
	3VL9300-4PA31			1	1 unit	1CC		**3VL9400-4PA31**			1	1 unit	1CC
	3VL9300-4PC31			1	1 unit	1CC		**3VL9400-4PC31**			1	1 unit	1CC
	3VL9300-4WA31			1	1 unit	1CC		**3VL9400-4WA31**			1	1 unit	1CC
	3VL9300-4WC31			1	1 unit	1CC		**3VL9400-4WC31**			1	1 unit	1CC
	3VL9300-4PS31			1	1 unit	1CC		**3VL9400-4PS31**			1	1 unit	1CC
	3VL9300-4PF01			1	1 unit	1CC		**3VL9400-4PF01**			1	1 unit	1CC
	1) **3VL9300-4PJ01**			1	1 unit	1CC		2) **3VL9400-4PJ01**			1	1 unit	1CC
	3VL9000-4WL01			1	1 unit	1CC		**3VL9000-4WL01**			1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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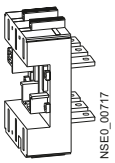
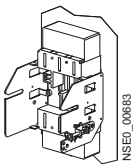
Accessories and spare parts

	Version	SD	For VL400X (LG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Plug-in versions/withdrawable versions (UL file: E69455)							
	3-pole						
 3VL9.00-4PA31	**Plug-in base assembly kits** Complete with base plate, base, blade contacts for circuit breakers, terminal covers for degree of protection IP20, fixing screws, trip pin						
	Rear connections 3-pole		**3VL9460-4PA31**		1	1 unit	1CC
	Front connections 3-pole		**3VL9460-4PC31**		1	1 unit	1CC
 3VL9.00-4WA31	**Withdrawable versions** Same as plug-in base assembly kit, with additional side panels and racking mechanism						
	Rear connections[1] 3-pole		**3VL9460-4WA31**		1	1 unit	1CC
	Front connections 3-pole		**3VL9460-4WC31**		1	1 unit	1CC
	Blade contacts As replacement for converting fixed-mounted into plug-in/withdrawable molded case circuit breakers, including trip pin 1 set = 6 units 3-pole		**3VL9460-4PS31**		1	1 unit	1CC
	Trip pins and springs As replacement for plug-in/ withdrawable molded case circuit breaker		**3VL9460-4PF01**		1	1 unit	1CC
	Auxiliary circuit plug connections for plug-in bases[2] Accessory connections for plug-in molded case circuit breakers (factory-wired connectors) and for plug-in bases or withdrawable version (coupling with screw terminal) 8 terminals[2]		**3VL9460-4PJ01**		1	1 unit	1CC
	Position signaling switches (connected/disconnected position) For plug-in base, 1 changeover contact, max. 2 signaling switches possible		**3VL9000-4WL01**		1	1 unit	1CC

1) With VL800 UL (MG frame) to VL1200 UL (NG frame) as vertical connection.

2) It is recommended to use a maximum of 3 auxiliary circuit plug-in systems per molded case circuit breaker (24 terminals).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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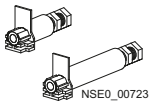
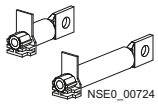
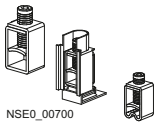
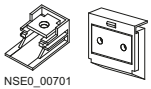
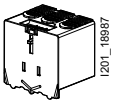
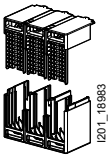
	Version	SD	For VL150X UL (CG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Connection parts for fixed-mounted molded case circuit breakers							
	3-pole						
	Rear connections						
 NSE0_00723 3VL9.00-4RA01, 3VL9.00-4RB01	Short connection (1 unit)		**3VL9100-4RA01**		1	1 unit	1CC
	Long connection (1 unit)		**3VL9100-4RB01**		1	1 unit	1CC
	Terminal kit (2 short + 1 long) 3-pole		**3VL9100-4RC31**		1	1 unit	1CC
 NSE0_00724 3VL9.00-4RK01, 3VL9.00-4RL01	Short flat connection (1 unit)		**3VL9100-4RK01**		1	1 unit	1CC
	Long flat connection (1 unit)		**3VL9100-4RL01**		1	1 unit	1CC
	Flat connector kit (2 short + 1 long) 3-pole		**3VL9100-4RM31**		1	1 unit	1CC
	Steel box terminal with auxiliary conductor connection						
	Terminal with auxiliary conductor connection up to 0.5 A		**3VL9120-4TN31**		1	1 unit	1CC
 NSE0_00700 3VL9...-4TC.1	**Box terminals** Connection for flexible flat copper busbar or cable 1 set = 3 units		**3VL9120-4TC31**		1	1 unit	1CC
 3VL9...-4TD.1	**Circular conductor terminals**[1] Only for cables (Al or Cu) Aluminum terminal (tinned) 1 set = 3 units		**3VL9130-4TD31**		1	1 unit	1CC
 NSE0_00701 3VL9.00-4TA.1	**Terminals with screw connection -** With insulator (for rear) for use with busbars and cable lugs 1 set = 3 units Metric thread		**3VL9100-4TA31**		1	1 unit	1CC
 I201_18987 3VL9.00-8CA.1	**Connection covers (terminal covers) for circuit breakers**[2] Degree of protection IP30 for main connections 1 set = 2 units						
	Extended 3-pole		**3VL9300-8CA31**		1	1 unit	1CC
 NSE0_00730 3VL9.00-8CB.1	Standard 3-pole		**3VL9300-8CB31**		1	1 unit	1CC
 I201_18983 3VL9300-8CD31	**Connection covers (terminal covers) for circuit breakers** Degree of protection IP2X for main connections 1 set = 1 unit (consisting of top part and bottom part) 3-pole		**3VL9300-8CD31**		1	1 unit	1CC
 NSE0_00731 3VL9.00-8CE01	**Phase barriers for molded case circuit breakers, fixed-mounted, plug-in or withdrawable versions** 1 set = 2 units		**3VL9300-8CE01**		1	1 unit	1CC

Note:

Only rear terminals with different lengths may be fitted next to one another (e.g. short-long-short or long-short-long).

1) Circular conductor terminals for VL150X UL (CG frame) suitable for 60 A to 150 A.

2) UL-listed for use with plug-in and withdrawable versions. A system-specific additional test is required for use with circuit breakers.

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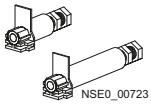
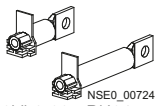
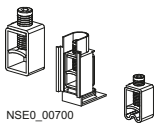
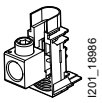
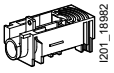
Accessories and spare parts

	Version	SD	for VL150 UL (DG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Connection parts for fixed-mounted molded case circuit breakers							
	3-pole						
	Front connecting bars						
	Terminal set with cover for mounting the circuit breaker on busbars 1 set = 3 units		**3VL9200-4EC31**		1	1 unit	1CC
 3VL9.00-4RA01, 3VL9.00-4RB01	**Rear connections**						
	Short connection (1 unit)		**3VL9200-4RA01**		1	1 unit	1CC
	Long connection (1 unit)		**3VL9200-4RB01**		1	1 unit	1CC
	Terminal kit (2 short + 1 long) 3-pole		**3VL9200-4RC31**		1	1 unit	1CC
 3VL9.00-4RK01, 3VL9.00-4RL01	Short flat connection (1 unit)		**3VL9200-4RK01**		1	1 unit	1CC
	Long flat connection (1 unit)		**3VL9200-4RL01**		1	1 unit	1CC
	Flat connector kit (2 short + 1 long) 3-pole		**3VL9200-4RM31**		1	1 unit	1CC
	Flat connecting bar (1 unit)		--				
	Flat connecting bars 1 set = 3 units, 3-pole		--				
 3VL9...-4TC.1	**Box terminal** Connection for flexible flat copper busbar or cable 1 set = 3 units		**3VL9220-4TC31**		1	1 unit	1CC
 3VL9215-4TD31	**Circular conductor terminal with terminal covers for cable (only for Al or Cu cables)** Terminal with auxiliary conductor connection up to 0.5 A 1 set = 3 units		**3VL9215-4TD31**		1	1 unit	1CC
 3VL9220-4TN31	**Steel box terminal with auxiliary conductor connection** Terminal with auxiliary conductor connection up to 0.5 A		**3VL9220-4TN31**		1	1 unit	1CC
 3VL9...-4TD.1	**Circular conductor terminals**[1] Only for cables (Al or Cu) Aluminum terminal (tinned) 1 set = 3 units		**3VL9230-4TD31**		1	1 unit	1CC
 3VL9...-4TF.1	**Multiple feed-in terminals** Only for cables (Al or Cu) Double Aluminum terminal (tinned) 1 set = 3 units		--				
	Multiple feed-in terminal with terminal cover Terminal with auxiliary conductor connection up to 0.5 A 1 set = 3 units Double		--				

Note:

Only rear terminals with different lengths may be fitted next to one another (e.g. short-long-short or long-short-long).

1) Circular conductor terminals for VL150 UL suitable for 60 to 150 A.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL250 UL (FG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL400 UL (JG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9300-4EC31		1	1 unit	1CC		**3VL9400-4EC31**		1	1 unit	1CC
	3VL9300-4RA01		1	1 unit	1CC		**3VL9400-4RA01**		1	1 unit	1CC
	3VL9300-4RB01		1	1 unit	1CC		**3VL9400-4RB01**		1	1 unit	1CC
	3VL9300-4RC31		1	1 unit	1CC		**3VL9400-4RC31**		1	1 unit	1CC
	3VL9300-4RK01		1	1 unit	1CC		**3VL9400-4RK01**		1	1 unit	1CC
	3VL9300-4RL01		1	1 unit	1CC		**3VL9400-4RL01**		1	1 unit	1CC
	3VL9300-4RM31		1	1 unit	1CC		**3VL9400-4RM31**		1	1 unit	1CC
	--						**--**				
	--						**--**				
	3VL9335-4TC31		1	1 unit	1CC		**3VL9460-4TC31**		1	1 unit	1CC
	--						**--**				
	3VL9335-4TN31		1	1 unit	1CC		**3VL9460-4TN31**		1	1 unit	1CC
	3VL9335-4TD31		1	1 unit	1CC		**3VL9475-4TD31**		1	1 unit	1CC
	--						**3VL9425-4TF31**		1	1 unit	1CC
	--						**3VL9460-4TF31**		1	1 unit	1CC

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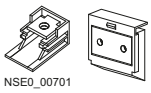
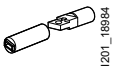
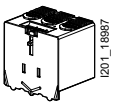
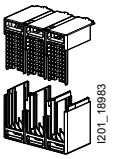
Accessories and spare parts

	Version		SD	for VL150 UL (DG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Connection parts for fixed-mounted molded case circuit breakers								
	3-pole							
 NSE0_00701	**Connection with screw-type terminals**							
	With insulator (for rear) for use with busbars and cable lugs							
3VL9.00-4TA.1	1 set = 3 units	Metric thread		**3VL9200-4TA31**		1	1 unit	1CC
	1 set = 3 units	Inch thread		**3VL9200-4TB31**		1	1 unit	1CC
 I201_18984	**Cable lug connection**							
	1 set = 3 units			**3VL9220-4TM31**		1	1 unit	1CC
3VL9220-4TM31								
	Connection covers (terminal covers) for circuit breakers [1]							
	Degree of protection IP30 for main connections							
	1 set = 2 units							
 I201_18987	Extended	3-pole		**3VL9300-8CA31**		1	1 unit	1CC
3VL9.00-3CA.1								
 NSE0_00730	Standard	3-pole		**3VL9300-8CB31**		1	1 unit	1CC
3VL9.00-3CB.1								
 I201_18983	**Connection covers (terminal covers) for circuit breakers**							
	Degree of protection IP2X for main connections							
	1 set = 1 unit (consisting of top part and bottom part)							
	3-pole			**3VL9300-8CD31**		1	1 unit	1CC
3VL9300-8CD31								
 NSE0_00731	**Phase barriers for molded case circuit breakers, fixed-mounted, plug-in or withdrawable versions**							
	1 set = 2 units			**3VL9300-8CE01**		1	1 unit	1CC
3VL9.00-8CE01								

[1] UL-listed for use with plug-in and withdrawable versions. A system-specific additional test is required for use with circuit breakers.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL250 UL (FG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL400 UL (JG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9300-4TA31		1	1 unit	1CC		**3VL9400-4TA31**		1	1 unit	1CC
	3VL9300-4TB31		1	1 unit	1CC		**--**				
	3VL9335-4TM31		1	1 unit	1CC		**3VL9460-4TM31**		1	1 unit	1CC
	3VL9300-8CA31		1	1 unit	1CC		**3VL9400-8CA31**		1	1 unit	1CC
	3VL9300-8CB31		1	1 unit	1CC		**3VL9400-8CB31**		1	1 unit	1CC
	3VL9300-8CD31		1	1 unit	1CC		**3VL9400-8CD31**		1	1 unit	1CC
	3VL9300-8CE01		1	1 unit	1CC		**3VL9600-8CE01**		1	1 unit	1CC

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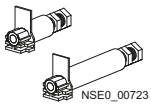
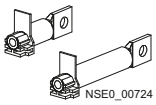
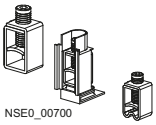
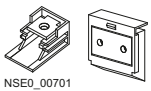
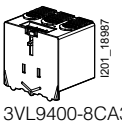
Accessories and spare parts

	Version		SD	For VL400X UL (LG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Connection parts for fixed-mounted molded case circuit breakers								
	3-pole							
	Front connecting bars							
	Terminal set with cover for mounting the circuit breaker on busbars			**3VL9460-4EC31**		1	1 unit	1CC
	1 set = 3 units							
 NSE0_00723 3VL9.00-4RA01, 3VL9.00-4RB01	**Rear connections**							
	Short connection (1 unit)			--				
	Long connection (1 unit)			--				
	Terminal kit (2 short + 1 long) 3-pole			--				
 NSE0_00724 3VL9.00-4RK01, 3VL9.00-4RL01	Short flat connection (1 unit)			--				
	Long flat connection (1 unit)			**3VL9460-4RP01**		1	1 unit	1CC
	Flat connector kit (2 short + 1 long) 3-pole			--				
 NSE0_00725 3VL9.00-4R..1	Flat connecting bar (1 unit)			**3VL9460-4RG01**		1	1 unit	1CC
	Flat connecting bars 1 set = 3 units, 3-pole			**3VL9460-4RH31**		1	1 unit	1CC
 NSE0_00700 3VL9.00-4TC.1	**Box terminal** Connection for flexible flat copper busbar or cable							
	1 set = 3 units			--				
 3VL9.00-4TD.1	**Circular conductor terminals** Only for cables (Al or Cu) Aluminum terminal (tinned)							
	1 set = 3 units			**3VL9475-4TD31**		1	1 unit	1CC
 NSE0_01542 3VL9...-4TF.1	**Multiple feed-in terminals** Only for cables (Al or Cu) Aluminum terminal (tinned)							
	1 set = 3 units	Double		--				
		• Terminal on feeder side[1]		**3VL9460-4TX31**		1	1 unit	1CC
		• Terminal on outgoing side[1]		**3VL9460-4TY31**		1	1 unit	1CC
		3-fold		--				
		4-fold		--				
 NSE0_00701 3VL9.00-4TA.1	**Connection with screw-type terminals** With insulator (for rear) for use with busbars and cable lugs							
	1 set = 3 units	Metric thread		**3VL9460-4TA31**		1	1 unit	1CC
	1 set = 3 units	Inch thread		**3VL9460-4TB31**		1	1 unit	1CC
 3VL9400-8CA31	**Connection covers (terminal covers) for circuit breakers[2]** Degree of protection IP30 for main connections 1 set = 2 units							
	Extended	3-pole		**3VL9400-8CA31**		1	1 unit	1CC
 NSE0_00730 3VL9.00-3CB.1	Standard	3-pole		**3VL9400-8CB31**		1	1 unit	1CC
 NSE0_00731 3VL9.00-8CE01	**Phase barriers for molded case circuit breakers, fixed-mounted, plug-in or withdrawable versions[3]**							
	1 set = 2 units			**3VL9600-8CE01**		1	1 unit	1CC

Note:

Only rear terminals with different lengths may be fitted next to one another (e.g. short-long-short or long-short-long).

[1] Extended terminal cover included in scope of supply.

[2] UL-listed for use with plug-in and withdrawable versions. A system-specific additional test is required for use with circuit breakers.

[3] Plug-in versions: not for VL1200 UL (NG frame); withdrawable version: not for VL800 UL (MG frame) and VL1200 UL (NG frame).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL800 UL (MG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL1200 UL (NG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9600-4EC31		1	1 unit	1CC		**3VL9800-4EF01**		1	1 unit	1CC
	--						--				
	--						--				
	--						--				
	--						--				
	3VL9600-4RP01		1	1 unit	1CC		--				
	--						--				
	3VL9600-4RG01		1	1 unit	1CC		**3VL9700-4RG01**		1	1 unit	1CC
	3VL9600-4RH31		1	1 unit	1CC		**3VL9700-4RH31**		1	1 unit	1CC
	--						--				
	--						--				
	3VL9675-4TF31		1	1 unit	1CC		--				
	--						--				
	--						--				
	3VL9650-4TG31		1	1 unit	1CC		**3VL9775-4TG31**		1	1 unit	1CC
	--						**3VL9750-4TH31**		1	1 unit	1CC
	3VL9600-4TA31		1	1 unit	1CC		**3VL9800-4TA31**		1	1 unit	1CC
	3VL9600-4TB31		1	1 unit	1CC		**3VL9800-4TB31**		1	1 unit	1CC
	3VL9600-8CA31		1	1 unit	1CC		**3VL9800-8CA31**		1	1 unit	1CC
	3VL9600-8CB31		1	1 unit	1CC		**3VL9800-8CB31**		1	1 unit	1CC
	3VL9600-8CE01		1	1 unit	1CC		**3VL9800-8CE01**		1	1 unit	1CC

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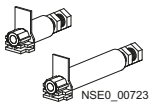
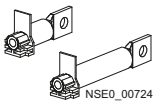
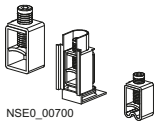
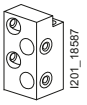
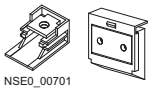
Accessories and spare parts

	Version	SD	For VL1600 UL (PG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Connection parts for fixed-mounted molded case circuit breakers							
	3-pole						
	Front connecting bars						
	Terminal set with cover for mounting the circuit breaker on busbars 1 set = 3 units • Incoming side, mounting from the top • Incoming side, mounting from the bottom		**3VL9800-4EF01**		1	1 unit	1CC
 NSE0_00723 3VL9.00-4RA01, 3VL9.00-4RB01	**Rear connections** Short connection (1 unit) Long connection (1 unit) Terminal kit (2 short + 1 long) 3-pole		-- -- --				
 NSE0_00724 3VL9.00-4RK01, 3VL9.00-4RL01	Short flat connection (1 unit) Long flat connection (1 unit) Flat connector kit (2 short + 1 long) 3-pole		-- -- --				
 NSE0_00725 3VL9.00-4R..1	Flat connecting bar (1 unit) Flat connecting bars 1 set = 3 units, 3-pole		-- --				
 NSE0_00700 3VL9...-4TC.1	**Box terminal** Connection for flexible flat copper busbar or cable 1 set = 3 units		--				
 3VL9...-4TD.1	**Circular conductor terminals** Only for cables (Al or Cu) Aluminum terminal (tinned) 1 set = 3 units		--				
 I201_18587 3VL9...-4T..1	**Multiple feed-in terminals** Only for cables (Al or Cu) Aluminum terminal (tinned) 4-fold (for installation with mounting base) 1 unit		**3VL9875-4TH01**		1	1 unit	1CC
 NSE0_00701 3VL9.00-4TA.1	**Terminals with screw connection -** With insulator (for rear) for use with busbars and cable lugs 1 set = 3 units Metric thread 1 set = 3 units Inch thread		**3VL9800-4TA31** **3VL9800-4TB31**		1 1	1 unit 1 unit	1CC 1CC
 NSE0_00681 3VL9.00-3CA.1	**Connection covers (terminal covers) for circuit breakers[1)]** Degree of protection IP30 for main connections 1 set = 2 units						
 NSE0_00730 3VL9.00-3CB.1	Extended 3-pole Standard 3-pole		**3VL9800-8CA31** **3VL9800-8CB31**		1 1	1 unit 1 unit	1CC 1CC
 NSE0_00731 3VL9.00-8CE01	**Phase barriers for molded case circuit breakers, fixed-mounted** 1 set = 2 units		**3VL9800-8CE01**		1	1 unit	1CC
	Mounting base Operation of the molded case circuit breaker within the scope of application of UL 489/CSA is permitted only in conjunction with the mounting base						
	Front connections Rear connections		**3VL9800-4TU31** **3VL9800-4TV31**		1 1	1 unit 1 unit	1CC 1CC

[1)] Not UL-listed.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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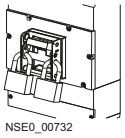
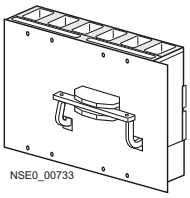
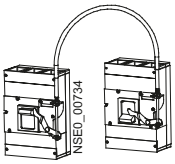
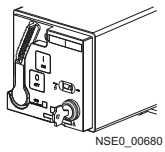
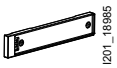
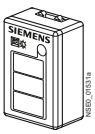
	Version	SD	For VL150X UL (CG frame) and VL150 UL (DG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Interlocks							
	3-pole						
 NSE0_00732 3VL9.00-3HL01	**Locking devices for toggle levers** For locking the molded case circuit breaker in the "OFF" position. Up to 3 padlocks with a diameter of 5 – 8 mm can be used. Removable (padlocks not included)		**3VL9300-3HL01**		1	1 unit	1CC
 NSE0_00733 3VL9.00-8L.01	**Rear interlocking modules** For the mechanical interlocking of two adjacent molded case circuit breakers. The circuit breakers must be of the same installation type and frame size. (Mounting plate not included in scope of supply)						
	Fixed-mounted molded case circuit breakers		**3VL9300-8LC01**		1	1 unit	1CC
 NSE0_00734 3VL9.00-8LA01	**Interlocking modules for Bowden cable interlocking**[1] For the mechanical interlocking of two molded case circuit breakers.						
	Interlocking module for one molded case circuit breaker		**3VL9300-8LA01**		1	1 unit	1CC
	Note						
	Combinations with next size up/down possible (see Article No.)						
	Bowden cables for Bowden cable interlocking[1]						
	• Cable length 0.5 m		**3VL9000-8LH11**		1	1 unit	1CC
	• Cable length 1.0 m		**3VL9000-8LH21**		1	1 unit	1CC
	• Cable length 1.5 m		**3VL9000-8LH31**		1	1 unit	1CC
	Sets of fixing screws (metric thread) Including the screws, washers and nuts required to secure a molded case circuit breaker to a prepared surface						
	Set with 4 screws		**3VL9300-8SA40**		1	1 unit	1CC
 NSE0_00680 3VL9.00-8L.01	**Safety lock assembly kits** Key can be removed with the molded case circuit breaker in the "OFF" position						
	For front-operated rotary operating mechanisms						
	Ronis lock type		**3VL9715-8HA01**		1	1 unit	1CC
	For motorized operating mechanism with stored energy mechanism						
	Filli Giussani lock type		**3VL9321-8HA01**		1	1 unit	1CC

	Version	SD	For VL150 UL (DG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 3VL9...-8B.01	**Transparent covers for releases, sealable** To prevent access by unqualified personnel and unauthorized changes to settings (seal not included)						
	• Electronic Trip Unit		**3VL9700-8BL01**		1	1 unit	1CC
	• Thermal-magnetic[2]		**3VL9300-8BM01**		1	1 unit	1CC
 3VL9000-8AP01	**Battery power supply for activating/parameterizing/tripping the Electronic Trip Units** (two 9 V blocks are required in addition)		**3VL9000-8AP01**		1	1 unit	1CC

[1] Two interlocking modules and one Bowden cable are required. Cannot be used in conjunction with motorized operating mechanism!
[2] Also suitable for VL150X UL (CG frame).

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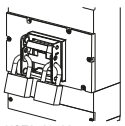
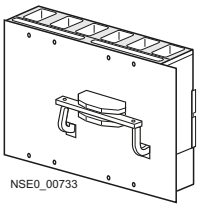
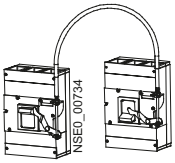
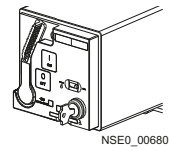
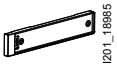
Accessories and spare parts

	Version	SD	For VL250 UL (FG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Interlocks							
	3-pole						
 NSE0_00732 3VL9.00-3HL01	**Locking devices for toggle levers** For locking the molded case circuit breaker in the "OFF" position. Up to 3 padlocks with a diameter of 5 – 8 mm can be used. Removable (padlocks not included)		**3VL9300-3HL01**		1	1 unit	1CC
 NSE0_00733 3VL9.00-8L.01	**Rear interlocking modules** For the mechanical interlocking of two adjacent molded case circuit breakers. The circuit breakers must be of the same installation type and frame size. (Mounting plate not included in scope of supply)						
	Fixed-mounted molded case circuit breakers		**3VL9300-8LC01**		1	1 unit	1CC
 NSE0_00734 3VL9.00-8LA01	**Interlocking modules for Bowden cable interlocking**[1] For the mechanical interlocking of two molded case circuit breakers.						
	Interlocking module for one molded case circuit breaker		**3VL9300-8LA01**		1	1 unit	1CC
	Note: Combinations with next size up/down possible (see Article No.)						
	Bowden cables for Bowden cable interlocking[1]						
	• Cable length 0.5 m		**3VL9000-8LH11**		1	1 unit	1CC
	• Cable length 1.0 m		**3VL9000-8LH21**		1	1 unit	1CC
	• Cable length 1.5 m		**3VL9000-8LH31**		1	1 unit	1CC
 NSE0_00680 3VL9...-8HA01	**Safety lock assembly kits** Key can be removed with the molded case circuit breaker in the "OFF" position						
	For motorized operating mechanism with stored energy mechanism						
	Lock types						
	• Ronis		--				
	• Filli Giussani		**3VL9321-8HA01**		1	1 unit	1CC
	Sets of fixing screws (metric thread) Including the screws, washers and nuts required to secure a molded case circuit breaker to a prepared surface						
	Set with 4 screws		**3VL9300-8SA40**		1	1 unit	1CC
 3VL9...-8B.01	**Transparent covers for releases, sealable** To prevent access by unqualified personnel and unauthorized changes to settings (seal not included)						
	• For Electronic Trip Unit		**3VL9700-8BL01**		1	1 unit	1CC
	• For thermal-magnetic release		**3VL9300-8BM01**		1	1 unit	1CC
 3VL9000-8AP01	**Battery power supply for activating/parameterizing/tripping the electronic trip units** (two 9 V blocks are required in addition)		**3VL9000-8AP01**		1	1 unit	1CC

[1] Two interlocking modules and one Bowden cable are required. Cannot be used in conjunction with motorized operating mechanism!

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL400 UL (JG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL400X UL (LG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9400-3HL01		1	1 unit	1CC		**3VL9400-3HL01**		1	1 unit	1CC
	3VL9400-8LC01		1	1 unit	1CC		**3VL9400-8LC01**		1	1 unit	1CC
	3VL9400-8LA01		1	1 unit	1CC		**3VL9400-8LA01**		1	1 unit	1CC
	--						**--**				
	3VL9000-8LH21		1	1 unit	1CC		**3VL9000-8LH21**		1	1 unit	1CC
	3VL9000-8LH31		1	1 unit	1CC		**3VL9000-8LH31**		1	1 unit	1CC
	3VL9715-8HA01		1	1 unit	1CC		**3VL9715-8HA01**		1	1 unit	1CC
	--						**--**				
	3VL9500-8SA40		1	1 unit	1CC		**3VL9500-8SA40**		1	1 unit	1CC
	3VL9700-8BL01		1	1 unit	1CC		**3VL9700-8BL01**		1	1 unit	1CC
	3VL9400-8BM01		1	1 unit	1CC		**3VL9400-8BM01**		1	1 unit	1CC
	3VL9000-8AP01		1	1 unit	1CC		**3VL9000-8AP01**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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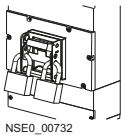
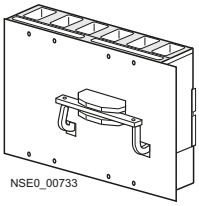
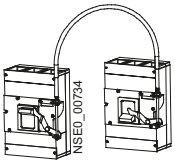
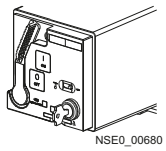
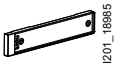
Accessories and spare parts

	Version	SD	For VL800 UL (MG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Interlocks							
	3-pole						
 NSE0_00732 3VL9.00-3HL01	**Locking devices for toggle levers** For locking the molded case circuit breaker in the "OFF" position. Up to 3 padlocks with a diameter of 5 – 8 mm can be used. Removable (padlocks not included)		**3VL9600-3HL01**		1	1 unit	1CC
 NSE0_00733 3VL9.00-8L.01	**Rear interlocking modules** For the mechanical interlocking of two adjacent molded case circuit breakers. The circuit breakers must be of the same installation type and frame size. (Mounting plate not included in scope of supply) Fixed-mounted molded case circuit breakers		**3VL9600-8LC01**		1	1 unit	1CC
 NSE0_00734 3VL9.00-8LA01	**Interlocking modules for Bowden cable interlocking**[1] For the mechanical interlocking of two molded case circuit breakers. Interlocking module for one molded case circuit breaker		**3VL9600-8LA01**		1	1 unit	1CC
	Note: Combinations with next size up/down possible (see Article No.)						
	Bowden cables for Bowden cable interlocking[1]						
	• Cable length 0.5 m		--				
	• Cable length 1.0 m		**3VL9000-8LH21**		1	1 unit	1CC
	• Cable length 1.5 m		**3VL9000-8LH31**		1	1 unit	1CC
 NSE0_00680 3VL9....-8HA01	**Safety lock assembly kits** Key can be removed with the molded case circuit breaker in the "OFF" position For motorized operating mechanism with stored energy mechanism Lock types						
	• Ronis		**3VL9715-8HA01**		1	1 unit	1CC
	• Filli Giussani		--				
	Sets of fixing screws (metric thread) Including the screws, washers and nuts required to secure a molded case circuit breaker to a prepared surface Set with 4 screws		**3VL9600-8SA40**		1	1 unit	1CC
 I201_18985 3VL9...-8B.01	**Transparent covers for releases, sealable** To prevent access by unqualified personnel and unauthorized changes to settings (seal not included)						
	• For Electronic Trip Unit		**3VL9700-8BL01**		1	1 unit	1CC
	• For thermal-magnetic release		--				
 3VL9000-8AP01	**Battery power supply for activating/parameterizing/tripping the Electronic Trip Units** (two 9 V blocks are required in addition)		**3VL9000-8AP01**		1	1 unit	1CC

[1] Two interlocking modules and one Bowden cable are required.
Cannot be used in conjunction with motorized operating mechanism!

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD d	For VL1200 UL (NG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	For VL1600 UL (PG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	3VL9800-3HL01		1	1 unit	1CC		**3VL9800-3HL01**		1	1 unit	1CC
	3VL9800-8LC01		1	1 unit	1CC		**3VL9800-8LC01**		1	1 unit	1CC
	3VL9800-8LA01		1	1 unit	1CC		**3VL9800-8LA01**		1	1 unit	1CC
	-- **--** **3VL9000-8LH31**		1	1 unit	1CC		**--** **--** **3VL9000-8LH31**		1	1 unit	1CC
	3VL9715-8HA01 **--**		1	1 unit	1CC		**3VL9715-8HA01** **--**		1	1 unit	1CC
	3VL9800-8SA40		1	1 unit	1CC		**3VL9800-8SA40**		1	1 unit	1CC
	3VL9700-8BL01 **--**		1	1 unit	1CC		**3VL9700-8BL01** **--**		1	1 unit	1CC
	3VL9000-8AP01		1	1 unit	1CC		**3VL9000-8AP01**		1	1 unit	1CC

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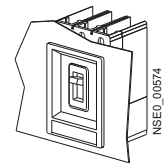
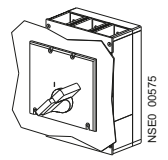
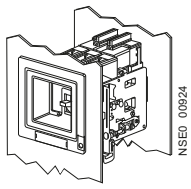
Accessories and spare parts

	Version	SD	For VL150X UL (CG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Further accessories							
	3-pole						
 Masking frame A	**Masking frames (cover frames) for door cut-outs** **A** **IP40** Fixed-mounted or plug-in molded case circuit breaker		**3VL9300-8BC01**		1	1 unit	1CC
 Masking frame B	**B**[1] **IP40** Fixed-mounted, plug-in or withdrawable molded case circuit breaker with front-operated rotary operating mechanism or motorized operating mechanism		**3VL9300-8BG01**		1	1 unit	1CC
 Masking frame C	**C** **IP20** Withdrawable molded case circuit breaker with toggle lever actuation. Assembly kit contains cover frame and extended escutcheon (cannot be used together with a motorized/rotary operating mechanism)		**--**				

	Version	SD	For VL800 UL (MG frame) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Further accessories							
	3-pole						
	Masking frames (cover frames) for door cut-outs **A** **IP40** Fixed-mounted or plug-in molded case circuit breaker		**3VL9600-8BC01**		1	1 unit	1CC
	B[1] **IP40** Fixed-mounted, plug-in or withdrawable molded case circuit breaker with front-operated rotary operating mechanism or motorized operating mechanism		**3VL9600-8BG01**		1	1 unit	1CC
	C **IP20** Withdrawable molded case circuit breaker with toggle lever actuation. Assembly kit contains cover frame and extended escutcheon (cannot be used together with a motorized/rotary operating mechanism)		**3VL9600-8BH01**		1	1 unit	1CC

[1] For withdrawable version IP20.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SD	For VL150 UL (DG frame) and VL250 UL (FG frame)		PU (UNIT, SET, M)	PS	PG	SD	For VL400 UL (JG frame) and VL400X UL (LG frame)		PU (UNIT, SET, M)	PS	PG
	Article No. www.siemens.com/product?Article No.	Price per PU					Article No. www.siemens.com/product?Article No.	Price per PU			
d						d					
	3VL9300-8BC01		1	1 unit	1CC		**3VL9400-8BC01**		1	1 unit	1CC
	3VL9300-8BG01		1	1 unit	1CC		**3VL9400-8BG01**		1	1 unit	1CC
	3VL9300-8BH01		1	1 unit	1CC		**3VL9400-8BH01**		1	1 unit	1CC

SD	For VL1200 UL (NG frame)		PU (UNIT, SET, M)	PS	PG	SD	For VL1600 UL (PG frame)		PU (UNIT, SET, M)	PS	PG
	Article No. www.siemens.com/product?Article No.	Price per PU					Article No. www.siemens.com/product?Article No.	Price per PU			
d						d					
	3VL9800-8BC01		1	1 unit	1CC		**3VL9800-8BC01**		1	1 unit	1CC
	3VL9800-8BG01		1	1 unit	1CC		**3VL9800-8BG01**		1	1 unit	1CC
	3VL9800-8BH01		1	1 unit	1CC		**3VL9800-8BH01**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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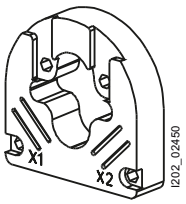
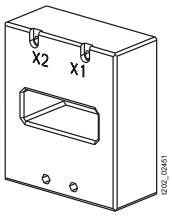
Accessories and spare parts

Further accessories



3VL9206-8TT01



3VL9660-8TT01

3-pole

Current transformers for N conductor/grounded neutral point of the transformer

for ground-fault protection in 4-wire three-phase systems

Version		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
I_n/A of the ETU	Purpose	d					
60	for VL150 UL (DG frame)		**3VL9206-8TT01**		1	1 unit	1CC
100	for VL150 UL (DG frame)		**3VL9310-8TT01**		1	1 unit	1CC
	for VL250 UL (FG frame)		**3VL9310-8TT01**		1	1 unit	1CC
150	for VL150 UL (DG frame)		**3VL9315-8TT01**		1	1 unit	1CC
	for VL250 UL (FG frame)		**3VL9315-8TT01**		1	1 unit	1CC
250	for VL250 UL (FG frame)		**3VL9425-8TT01**		1	1 unit	1CC
	for VL400 UL (JG frame)		**3VL9425-8TT01**		1	1 unit	1CC
400	for VL400 UL (JG frame)		**3VL9440-8TT01**		1	1 unit	1CC
	for VL400X UL (LG frame)		**3VL9440-8TT01**		1	1 unit	1CC
600	for VL400X UL (LG frame)		**3VL9660-8TT01**		1	1 unit	1CC
	for VL800 UL (MG frame)		**3VL9660-8TT01**		1	1 unit	1CC
800	for VL800 UL (MG frame)		**3VL9780-8TT01**		1	1 unit	1CC
	for VL1200 UL (NG frame)		**3VL9780-8TT01**		1	1 unit	1CC
1000	for VL1200 UL (NG frame)		**3VL9812-8TT01**		1	1 unit	1CC
1200	for VL1200 UL (NG frame)		**3VL9812-8TT01**		1	1 unit	1CC
	for VL1600 UL (PG frame)		**3VL9812-8TT01**		1	1 unit	1CC
1600	for VL1600 UL (PG frame)		**3VL9816-8TT01**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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For type	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories for communication							
3-pole							
Data transmission							
VL150 UL (DG frame) to VL1600 UL (PG frame)	**COM20 Release 2 (PROFIBUS module for 3VL molded case circuit breaker according to UL)** Module for connecting the 3VL molded case circuit breaker according to UL with Electronic Trip Unit to the PROFIBUS DP, including switching function and Zone Selective Interlocking functionality, connecting cable to ETU not included in delivery		**3VL9000-8AU00**		1	1 unit	1CC
VL150 UL (DG frame) to VL1600 UL (PG frame)	**COM21 Release 2 (Modbus module for 3VL molded case circuit breaker according to UL)** Module for connecting the 3VL molded case circuit breaker according to UL with Electronic Trip Unit to a Modbus RTU bus system, including switching function and Zone Selective Interlocking functionality, connecting cable to ETU not included in delivery		**3VL9000-8AV00**		1	1 unit	1CC
	Addressing plugs For assigning the module addresses without using a PC/PG on COM20/COM21 (Release 2) through the system interface	►	**3UF7910-0AA00-0**		1	1 unit	42J
VL150 UL (DG frame) to VL250 UL (FG frame)	**COMKIT3** Communication interface for connecting a 3VL molded case circuit breaker according to UL to a COM20/COM21 (Release 2) communication module. Comprising: • Connecting cable length 1.5 m • Alarm switches • Protective cover to protect the connecting cable		**3VL9300-8AQ61**		1	1 unit	1CC
VL400 UL (JG frame) to VL400X UL (LG frame)	**COMKIT4** Communication interface for connecting a 3VL molded case circuit breaker according to UL to a COM20/COM21 (Release 2) communication module. Comprising: • Connecting cable length 1.5 m • Auxiliary switches and alarm switches • Protective cover to protect the connecting cable		**3VL9400-8AQ61**		1	1 unit	1CC
VL600 UL (MG frame) to VL1600 UL (PG frame)	**COMKIT5** Communication interface for connecting a 3VL molded case circuit breaker according to UL to a COM20/COM21 (Release 2) communication module. Comprising: • Connecting cable length 1.5 m • Auxiliary switches and alarm switches • Protective cover to protect the connecting cable		**3VL9800-8AQ61**		1	1 unit	1CC
VL150 UL (DG frame) to VL250 UL (FG frame)	**COMKIT6** Communication interface for connecting a 3VL molded case circuit breaker according to UL to a COM20/COM21 (Release 2) communication module. Comprising: • Connecting cable length 3 m • Alarm switches • Protective cover to protect the connecting cable		**3VL9300-8AQ71**		1	1 unit	1CC
VL400 UL (JG frame) to VL400X UL (LG frame)	**COMKIT7** Communication interface for connecting a 3VL molded case circuit breaker according to UL to a COM20/COM21 (Release 2) communication module. Comprising: • Connecting cable length 3 m • Auxiliary switches and alarm switches • Protective cover to protect the connecting cable		**3VL9400-8AQ71**		1	1 unit	1CC
VL600 UL (MG frame) to VL1600 UL (PG frame)	**COMKIT8** Communication interface for connecting a 3VL molded case circuit breaker according to UL to a COM20/COM21 (Release 2) communication module. Comprising: • Connecting cable length 3 m • Auxiliary switches and alarm switches • Protective cover to protect the connecting cable		**3VL9800-8AQ71**		1	1 unit	1CC

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2

Design

- Rated current range from 20 A to 1600 A
- Different making and breaking capacities for each size

N	Standard (35 kA)
H	High (65 kA)
L	Very high (100 kA)

- No power reduction/derating up to 40 °C
- Electronic Trip Unit from size 150 A (VL150 UL, DG frame), especially for time-based discrimination and ground-fault protection
- 2 families of internal accessories
- Complete bandwidth of external accessories, e.g. terminals also for aluminum cables.

All molded case circuit breakers are supplied with integrated overcurrent releases. The VL150X UL (CG frame) to VL1600 UL (PG frame) molded case circuit breakers are available with different connection variants (see "Main connections, basic equipment and options", page 2/290). Auxiliary switches, alarm switches and auxiliary releases can be easily retrofitted in the molded case circuit breakers or, if requested, are already installed when delivered.
The breaking capacity is indicated on the front of every molded case circuit breaker.

- Standard breaking capacity:
  35 kA at 50/60 Hz 480 V AC
- High breaking capacity:
  65 kA at 50/60 Hz 480 V AC
- Very high breaking capacity:
  100 kA at 50/60 Hz 480 V AC

Connection

The following connection types are available for 3VL molded case circuit breakers according to UL 489:

- Box terminal, suitable for stranded conductors,
- Screw terminals for flat connection,
- Circular conductor/multiple feed-in terminal for Al/Cu cables,
- Cable lug connection.

The infeed and outgoing sides can be chosen on the molded case circuit breaker to suit requirements. The electrical data remains unaffected.

Various terminals feature an auxiliary conductor connection. Up to 0.5 A can be tapped here to directly power other devices.

Bare conductors at the top terminals must be insulated in the space that is needed above the arc chute.

All auxiliary releases (shunt releases and undervoltage releases), auxiliary switches and alarm switches are equipped with screw terminals and therefore are easy to connect electrically.

The motorized operating mechanisms with spring energy store always feature terminals. The leading auxiliary switches for the rotary operating mechanisms are always supplied with connecting cables.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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VL150X UL (CG frame) to VL1600 UL (PG frame) molded case circuit breakers

The main components of the 3VL molded case circuit breakers according to UL are the three conducting paths with incoming and outgoing terminals. The fixed and movable contacts are designed in such a way that magnetic repulsion of the contacts takes place under short-circuit conditions. In conjunction with the arc splitter chambers, a dynamic impedance is created that causes a current limitation through the reduction in the harmful effects of I^2t and the I_p energy resulting during short circuits.

The 3VL molded case circuit breaker has a trip-free mechanism.

The double-insulated accessory compartments for the auxiliary releases and auxiliary switches are located on the left and right of the circuit breaker's operating mechanism.

The overcurrent releases for the VL150X UL (CG frame) to VL1600 UL (PG frame) molded case circuit breakers have the following characteristics:

- The overcurrent releases are available in a thermal-magnetic version and in an electronic[1)] version.
- The thermal-magnetic releases have fixed overload releases and adjustable[2)] short-circuit releases.

In the case of all versions of the 3VL molded case circuit breakers according to UL with electronic overcurrent release, the current transformers are in the same enclosure as the tripping electronics. They supply a signal proportional to the load current to the electronic overcurrent release system.

All 3VL molded case circuit breakers according to UL with electronic overcurrent release measure the actual rms current. This is the most accurate method of measurement. Currents in present-day electrical distribution systems with very high harmonics are evaluated reliably.

Overcurrent tripping systems

The switching unit (frame) and release unit are assembled and tested at the factory. Accordingly, the release unit can only be replaced at the factory. The infeed and outgoing sides can be chosen on the molded case circuit breakers to suit requirements.

1. Thermal-magnetic releases of the VL150X UL (CG frame) to VL1600 UL (PG frame) molded case circuit breakers

The overcurrent releases and short-circuit releases work with bimetals and magnetic releases. They are available with fixed overload releases and adjustable short-circuit releases.[2)]

The 3VL molded case circuit breakers for starter combination applications are usually combined with a motor contactor and a suitable overload relay.

[1)] VL150X UL (CG frame) only thermal-magnetic.

[2)] VL150X UL (CG frame) only with fixed short-circuit release.

The non-automatic air circuit breakers have integrated self-protection against short circuit so that back-up fuses can be omitted. Non-automatic air circuit breakers do not have overload protection.

2. Overcurrent releases of the VL150 UL (DG frame) to VL1600 UL (PG frame) molded case circuit breakers, electronic, ETU

The electronic tripping system consists of:

- 3 current transformers
- Evaluation electronics with microprocessor
- Intrinsic power supply, no external auxiliary power necessary
- Tripping solenoid.

In the case of VL150 UL (DG frame) and VL250 (FG frame) molded case circuit breakers, the left accessory compartment is needed for the tripping solenoid included in the scope of supply. In the case of all other sizes, the tripping solenoid is integrated in the release unit and the left and right accessory compartments can be used for auxiliary switches, alarm switches and additional auxiliary releases.

The protection functions of the electronic trip units are ensured without additional auxiliary voltage. The overcurrent releases are supplied with energy via internal current transformers in the circuit breaker.

3. Overcurrent releases of the VL150 UL (DG frame) to VL1600 UL (PG frame) molded case circuit breakers

For parameterizing, the electronic overcurrent release must be activated. A load current amounting to at least 20% of the relevant molded case circuit breaker's rated current I_n is needed to do this. If this load current is not available, the necessary auxiliary energy can be supplied via a battery power supply. In the case of molded case circuit breakers that are connected to an active COM20 (PROFIBUS) or COM21 (Modbus) communication module (Release 2) for data transmission, the release is powered via the module.

Abbreviations (functions)		
L	= Long Time Delay	= Overload protection
S	= Short Time Delay	= Short-circuit protection (short-time delayed)
I	= Instantaneous	= Short-circuit protection (instantaneous)
N	= Neutral Protection	= Neutral conductor protection
G	= Ground Fault	= Ground-fault protection

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Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

General data

VL150 UL (DG frame) to VL1600 UL (PG frame) overcurrent releases – functional overview

Article No. supplement	Release/model	Line protection	Starter protection	Generator protection	Function	Setting options				
						L[1] Overload protection	S[1] Short-circuit protection (short-time delayed)		I[1] Short-circuit protection (instantaneous)	G[1] Ground-fault protection
						$I_r = \times I_n$	$I_{sd} = \times I_r$	t_{sd} [s]	$I_i = \times I_n$	$I_g = \times I_n$
KJ	M	--	✓	--	I	--	--	--	3 ... 6	--
KK	M	--	✓	--	I	--	--	--	4 ... 10	--
KL	M	--	✓	--	I	--	--	--	7 ... 16	--
KN	TM/525	✓	--	--	LI	1	--	--	5 ... 10	--
PB	ETU/555	✓	--	--	LI	0.4 ... 1	--	--	1.25 ... 11	--
PD	ETU/555	✓	--	--	LIG	0.4 ... 1	--	--	1.25 ... 11	0.4 ... 1[3]
PU	ETU/555	✓	--	✓	LSI	0.4 ... 1	1.5 ... 10	0 ... 0.5	1.25 ... 11	--
PH	ETU/555	✓	--	✓	LSIG	0.4 ... 1	1.5 ... 10	0 ... 0.5	1.25 ... 11	0.4 ... 1[3]
VH	LCD-ETU/586	✓	--	--	LI, LSI	0.4 ... 1	1.25 ... 10	0 ... 0.5	1.25 ... 11	--
VM	LCD-ETU/586	✓	--	--	LSIG	0.4 ... 1	1.25 ... 10	0 ... 0.5	1.25 ... 11	0.4 ... 1[2]
VJ	LCD-ETU/586	✓	--	--	LSI G (alarm)	0.4 ... 1	1.25 ... 10	0 ... 0.5	1.25 ... 11	0.4 ... 1[2]

Article No. supplement	Release/model	Thermal image	Communication-capable	Ground-fault protection	Number of poles	I^2t (ON/OFF)	Time-lag class (t_R)	Thermal-magnetic releases	Magnetic releases	Electronic release	LCD display
KJ	M	--	--	--	3	--	--	--	✓	--	--
KK	M	--	--	--	3	--	--	--	✓	--	--
KL	M	--	--	--	3	--	--	--	✓	--	--
KN	TM/525	✓	--	--	3	--	--	✓	--	--	--
PB	ETU/555	✓	✓	--	3	--	2.5 ... 30	--	--	✓	--
PD	ETU/555	✓	✓	①	3	--	2.5 ... 30	--	--	✓	--
PU	ETU/555	✓	✓	--	3	✓	--	--	--	✓	--
PH	ETU/555	✓	✓	①	3	✓	--	--	--	✓	--
VH	LCD-ETU/586	✓	✓	--	3	✓	2.5 ... 30	--	--	✓	✓
VM	LCD-ETU/586	✓	✓	① / ②	3	✓	2.5 ... 30	--	--	✓	✓
VJ	LCD-ETU/586	✓	✓	① / ②	3	✓	2.5 ... 30	--	--	✓	✓

Ground-fault protection
① Vectorial summation current formation (4-wire system)
② Direct detection of ground-fault current in the neutral point of the transformer

1) Size dependent.
2) t_g 0.1 s to 0.5 s.
3) t_g 0.07 s to 0.4 s size-dependent

Internal accessories (auxiliary switches, undervoltage releases, shunt releases)

3VL molded case circuit breakers according to UL can be supplied completely equipped with internal accessories (e.g. auxiliary switches, undervoltage releases or shunt releases). Refer to the tables of Article No. supplements for details of possible versions.

Fixed-mounted, plug-in or withdrawable version

The fixed-mounted molded case circuit breaker is the basic version. Using the appropriate assembly kit, it can be changed to a plug-in or withdrawable version. This assembly kit contains blade contacts, a locking pin and terminal covers for the plug-in version. The assembly kit for the withdrawable version additionally includes side panels and a racking mechanism. Even when the masking frame is fitted, movement using the withdrawable unit's handle is possible while the door is closed.

Operating mechanisms

In the basic version, the 3VL molded case circuit breakers according to UL have a toggle lever as an operating mechanism. This also functions as an indicator of the switch position. The "Tripped" position is also displayed in addition to the "ON" and "OFF" positions.

The toggle lever goes to the "Tripped" position when the internal tripping mechanism is activated by overcurrent tripping, e.g. on overload or short circuit. Activation of an undervoltage release or shunt release will also cause the toggle lever to move to the "Tripped" position. The toggle lever must be moved to the "OFF/RESET" position before the molded case circuit breaker can be closed again. This enables reset of the internal tripping mechanism and reactivation of the molded case circuit breaker's main contacts (see figure).

A toggle lever extension is supplied with the VL1200 UL (NG frame) and VL1600 UL (PG frame) molded case circuit breakers. For the VL400 UL (JG frame) to VL800 UL (MG frame) molded case circuit breakers, this accessory must be ordered separately if required.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Front-operated rotary operating mechanisms

These operating mechanisms are designed for direct attachment to 3VL molded case circuit breakers according to UL and convert movement of the toggle lever from a linear to a rotary movement.

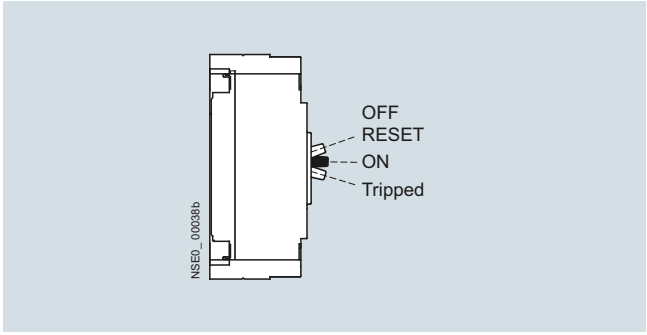
For a molded case circuit breaker with leading auxiliary switches, the undervoltage release can be connected to voltage in a leading fashion, as a result of which the molded case circuit breaker is ready for closing.

Door-coupling rotary operating mechanisms (complete operating mechanisms)

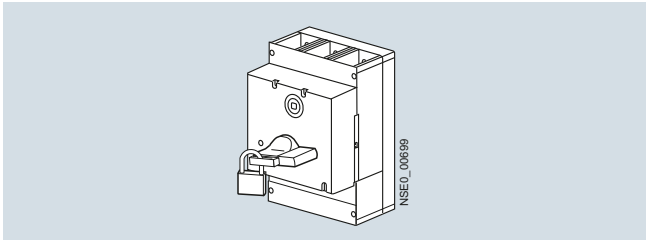
When the molded case circuit breakers are installed in control cabinets and distribution boards, door-coupling rotary operating mechanisms are available for doors and removable covers. These operating mechanisms are supplied as complete assembly kits, including an articulated-shaft mechanism.

With regard to switch positions and the "RESET" position, the same applies to rotary operating mechanisms as to toggle lever operating mechanisms. Indication is by the position of the operator lever (knob).

All 3VL molded case circuit breakers according to UL that feature these rotary operating mechanisms and corresponding terminal covers can be used as main disconnecting means.



Toggle lever operating mechanism positions



Rotary operating mechanism locked with padlock

Motorized operating mechanisms

VL150X UL (CG frame) to VL1600 UL (PG frame) molded case circuit breakers can be equipped with motorized operating mechanisms for operational remote closing and opening.

The motorized operating mechanisms for VL150X UL (CG frame) to VL800 UL (MG frame) molded case circuit breakers have a spring energy store (for synchronization) with a maximum ON period of $t_E \leq 80$ ms.

Motorized operating mechanisms without spring energy store for remotely controlled ON and OFF switching are available for the VL1200 UL (NG frame) and VL1600 UL (PG frame) molded case circuit breakers.

All motorized operating mechanisms are always supplied with a locking device for padlocks. Moreover, optional safety locks for motorized operating mechanisms with stored energy mechanism are also available.

The locking devices can be used for electrical and mechanical blocking of the operating mechanism. All remote operating mechanisms are equipped with a manual operating possibility for maintenance purposes.

Optionally, the motorized operating mechanisms for VL150X UL (CG frame) to VL800 UL (MG frame) and also the motorized operating mechanisms for VL1200 UL (NG frame) and VL1600 UL (PG frame) are each internally equipped with a floating signaling contact (normally open) for the following functions:

- Querying the AUTO/Manual selector switch for VL150X UL (CG frame) to VL800 UL (MG frame)
- Operating the mechanical OFF/0 button

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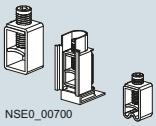
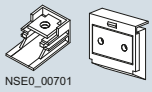
General data

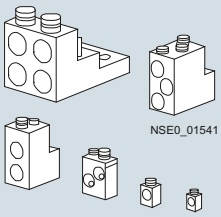
Main connections, basic equipment and options



Box terminal
(for copper cable)



Terminals with screw connection
(metric/inch)



Circular conductor terminals/multiple feed-in terminals
(for Al/Cu cables)

Main connections

Molded case circuit breakers	Connection overview and further options						
	Box terminals	Screw terminals for flat connection		Circular conductor terminal/ multiple feed-in terminal	Rear connections	Cable lug connection	Direct connection of bars possible (IEC-approved circuit breakers only)
	Cu only	with metric thread	with inch thread	Cu or Al			
VL150X UL (CG frame)	×	×	--	×	×	--	--
VL150 UL (DG frame)	×	×	×	×	×	×	--
VL250 UL (FG frame)	×	×	×	×	×	×	--
VL400 UL (JG frame)	×	×	--	×[1) 2)]	×	×	--
VL400X UL (LG frame)	--	×	×	×[1) 2)]	×	×	--
VL800 UL (MG frame)	--	×	×	×[1)]	×	×	--
VL1200 UL (NG frame)	--	×	×	×[1)]	×	×	--
VL1600 UL (PG frame)	--	×	×	×[1)]	×	--	--

× Available
-- Not available

[1)] Multiple feed-in terminals
[2)] Circular conductor terminal also available.

Note

For conductor cross-sections, see operating instructions.

Auxiliary releases and auxiliary switches

Undervoltage releases, leading auxiliary switches

If there is no voltage present, closing of the molded case circuit breaker is not possible. When no voltage is applied to the release, operating the circuit breaker leads to no-load switching.

Frequent no-load switching should be avoided to prevent shortening the molded case circuit breaker's useful life.

For a molded case circuit breaker with leading auxiliary switches, the undervoltage release can be connected to voltage in a leading fashion, as a result of which the molded case circuit breaker is ready for closing.

In the case of 3VL molded case circuit breakers according to UL, the leading auxiliary switch can be supplied together with the front-operated rotary operating mechanisms and complete operating mechanisms. For further information, see "Selection and ordering data" for accessories.

Shunt releases

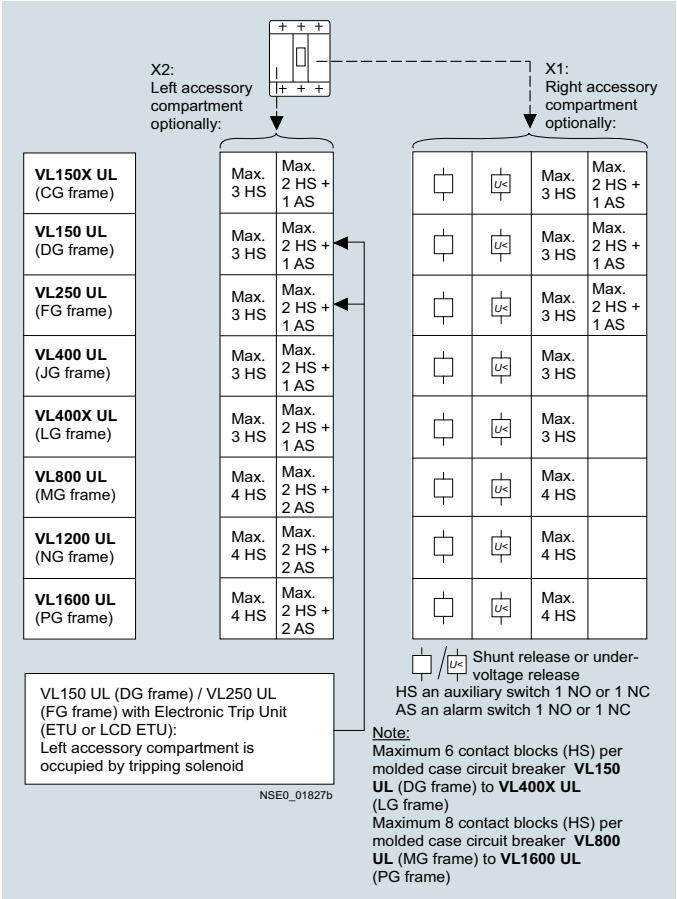
Shunt releases are used to remotely trip the molded case circuit breaker.

The shunt release's coil is designed for short-time operation. Coil deactivation is installed internally.

When a molded case circuit breaker is open, it is not permitted to apply a continuous opening command to the shunt release to prevent closing.
A center tap is available as standard to test the coil for continuity.

Note

Before ordering, use the graphic on the right to check whether the required combination of shunt releases, undervoltage releases and auxiliary/alarm switches is feasible.



Equipment options for the insulated accessory compartments in the 3VL molded case circuit breakers according to UL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Auxiliary switches

Auxiliary switches (HS) are used for signaling and controlling. The contacts of the auxiliary switch open and close along with the main contacts.

Alarm switches

Alarm switches (AS) operate when the molded case circuit breaker has been tripped due to an overcurrent situation, e.g. an overload or short circuit. However, they are also activated when the molded case circuit breaker has been tripped by a shunt release or an undervoltage release.

Installation of internal accessories

The insulated accessory compartments in the molded case circuit breakers for installation of internal accessories (auxiliary releases and auxiliary/alarm switches) are designated X1, X2 and X4.

Equipment of the molded case circuit breaker with internal accessories and the possibility of combination with auxiliary releases and auxiliary/alarm switches depend on the installation position and frame size of the molded case circuit breaker (see figure entitled "Equipment options for the insulated accessory compartments in the 3VL molded case circuit breakers according to UL").

PLC control

The auxiliary and alarm switches are suitable for PLC control. These switching elements are from the Siemens 3SB3 program.

Leading auxiliary switches

The leading auxiliary switches from OFF to ON or from ON to OFF are available as retrofit kits and for Max Flex operating mechanisms.

Function

Current limiting[1)]

3VL molded case circuit breakers according to UL are designed on the principle of magnetic repulsion of the contacts. The contacts open before the expected peak value of the short-circuit current is reached. The current-limiting effects of the 3VL molded case circuit breakers according to UL protect the system components effectively against thermal and dynamic effects of the short-circuit current in the event of an electrical fault.

Ground-fault protection

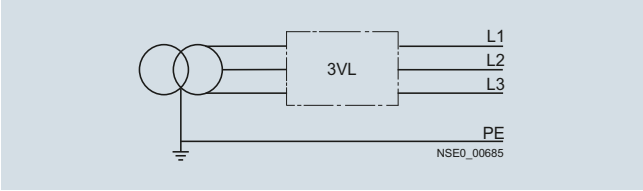
The ground-fault release "G" captures fault currents escaping to ground that can cause fires in the plant. Several molded case circuit breakers connected in series can be assigned graduated discrimination by means of the adjustable delay time.

The following measurement methods can be used to detect neutral conductor and ground-fault currents:

Vectorial summation current formation (measurement method 1)

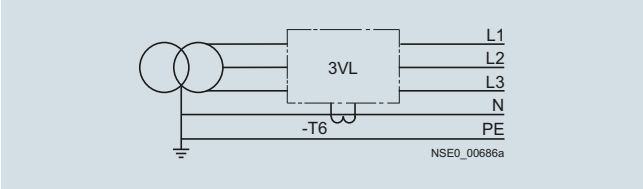
Ground-fault detection in balanced systems

The three phase currents are evaluated using vectorial summation current formation.



Ground-fault detection in unbalanced systems

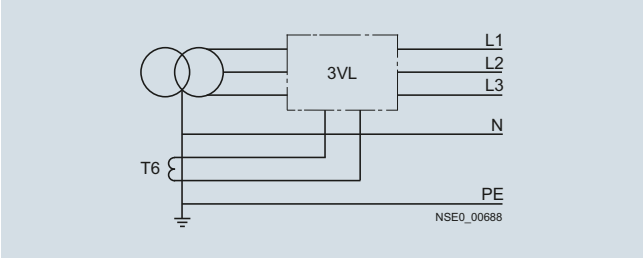
The neutral conductor current is measured directly and, in the case of the 3-pole circuit breakers, is only evaluated for ground-fault protection.
The overcurrent release calculates the ground-fault current using the vectorial summation of the three phase currents and the neutral conductor current.



3-pole molded case circuit breaker, current transformer in neutral conductor

Direct detection of the ground-fault current via a current transformer at the grounded star point of the transformer (measurement method 2)

The current transformer is installed directly at the grounded neutral point of the transformer.



3-pole molded case circuit breaker, current transformer at the grounded star point of the transformer

Transformer protection

The 3VL molded case circuit breakers according to UL protect power distribution systems in the event of overload and short circuit as from the low-voltage side of the infeed transformer. The resulting requirements for current and/or time-based discrimination are fulfilled reliably by 3VL molded case circuit breakers according to UL for line protection – equipped with thermal-magnetic (TM) or electronic trip units (ETU or LCD ETU).

[1)] Not current-limiting in terms of "Current limiting according to UL 489".

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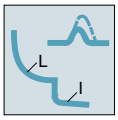
General data

Thermal-magnetic releases (TM)

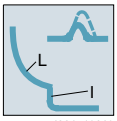


NSE0_00689

Application: line protection – TM, LI/LIN function

Overload protection, fixed,
short-circuit protection, fixed,
see "Selection and ordering data" for VL150X UL (CG frame),
integrated releases in the circuit breaker enclosure;

KM version.



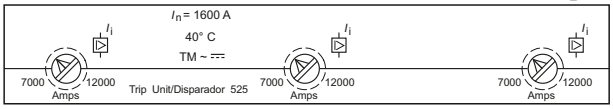
I201_19069

Application: line protection – TM/model 525, LI/LIN function

Overload protection, fixed,
short-circuit protection, adjustable
I_i = 5 to 10 × I_n [1], for VL150 UL (DG frame) to VL1600 UL (PG frame);

KN version

NSE0_01828



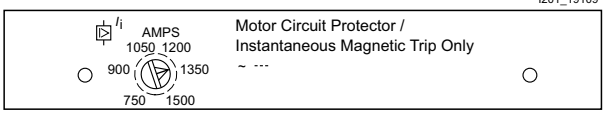

NSE0_00707

Application: starter protection – M, I function

Short-circuit protection, adjustable
I_i = 3 to 16 × I_n [1], for VL150 UL (DG frame) to VL1200 UL (NG frame);

KJ, KK, KL versions.

I201_19109




NSE0_00708

Application: switch disconnectors in molded case circuit breaker design – M, I function (for intrinsic protection)

Short-circuit protection, fixed

KE version

[1] Size-dependent, see "Selection and ordering data".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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2

Electronic Trip Units (ETU)

For types VL150 UL (DG frame) to VL1600 UL (PG frame)

General information:

- No auxiliary voltage required for release system
- All ETUs have a thermal image
- A flashing green LED indicates correct operation of the microprocessor
- Overload status ($I > 1.05 \times I_r$) is indicated by a permanently lit yellow LED (alarm)
- Integral self-test function
- Socket for battery power supply
- Communication link to PROFIBUS DP and Modbus RTU possible



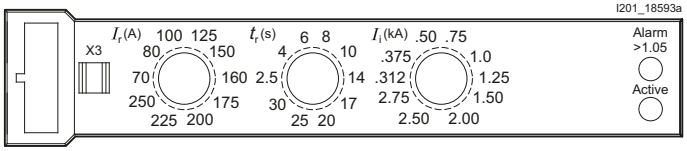
NSE0_00691

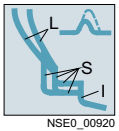
Application: line protection – model 555, LI function

Overload protection I_r = 0.28 to 1 × I_n [1], time-lag class t_r = 2.5 to 30

Short-circuit protection (instantaneous) I_i = 1.25 to 11 × I_n [1];

PB version





NSE0_00920

Application: line and generator protection – model 555, LSI function

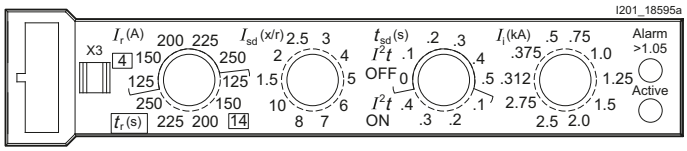
Overload protection I_r = 0.4 to 1 × I_n [1],

Short-circuit protection (short-time delay) I_{sd} = 1.5 to 10 × I_R [1], t_{sd} = 0 to 0.5 s,

I^2t on/off selectable

Short-circuit protection (instantaneous) I_i = 1.25 to 11 × I_n (fixed) [1]

PE version





NSE0_00693

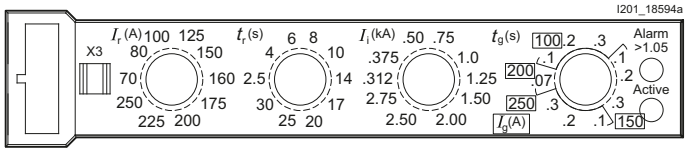
Application: line protection – model 555, LIG function

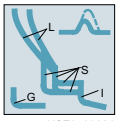
Overload protection I_r = 0.28 to 1 × I_n [1], time-lag class t_r = 2.5 to 30

Short-circuit protection (short-time delay) I_i = 1.25 to 11 × I_n [1]

Ground-fault protection: Measurement method No. 1:
(G_R) vectorial summation current formation of the currents in the three phases and the neutral conductor
(4-wire systems); I_g = 0.4 to 1 × I_n [1]

PD version





NSE0_00921

Application: line and generator protection – model 555, LSIG function

Overload protection I_r = 0.4 to 1 × I_n [1],

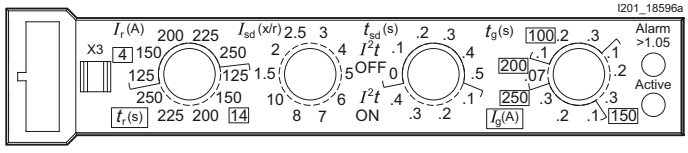
Short-circuit protection (short-time delay) I_{sd} = 1.5 to 10 × I_r [1], t_{sd} = 0 to 0.5 s,

I^2t on/off selectable

Short-circuit protection (short-time delay) I_i = 1.25 to 11 × I_n [1]

Ground-fault protection: Measurement method No. 1:
(G_R) vectorial summation current formation of the currents in the three phases and the neutral conductor
(4-wire systems); I_g = 0.4 to 1 × I_n [1]

PH version



[1] Size-dependent, see "Selection and ordering data".

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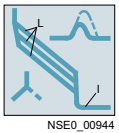
General data

Electronic Trip Units with LCD (LCD ETU)

General information:

- No auxiliary voltage required for release system
- Current display
- An illuminated green LCD display indicates correct operation of the microprocessor
- Overload status (I > 105% I_r) is indicated by "Overload" on the LCD display
- Direct, user-friendly, menu-driven setting of the absolute values of the protection parameters in the ampere values via keys
- Integral self-test function
- Socket for battery power supply
- Communication link to PROFIBUS DP and Modbus RTU possible



NSE0_00944

Application:
line protection – model 586, LSI function

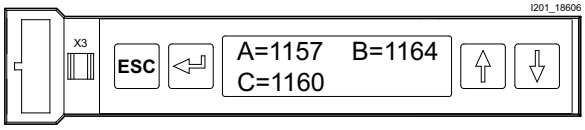
Overload protection I_r = 0.4 to 1 × I_n,
time-lag class t_r = 2.5 to 30

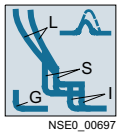
Thermal image selectable on/off

Short-circuit protection (short-time delay)
I_{sd} = 1.25 to 10 × I_R[1], t_{sd} = 0 to 0.5 s,
I^2t on/off selectable

Short-circuit protection (short-time delay)
I_i = 1.25 to 11 × I_n[1]

VH version





NSE0_00697

Application:
line protection – model 586, LSIG function

Overload protection I_r = 0.4 to 1 × I_n,
time-lag class t_r = 2.5 to 30

Thermal image selectable on/off

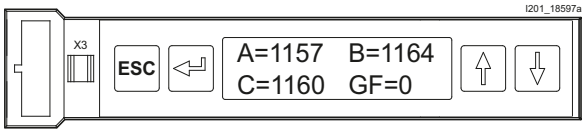
Short-circuit protection (short-time delay)
I_{sd} = 1.25 to 10 × I_R[1], t_{sd} = 0 to 0.5 s,
I^2t on/off selectable

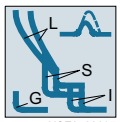
Short-circuit protection (short-time delay)
I_i = 1.25 to 11 × I_n[1]

Ground-fault protection: measurement method No. 1:
(G_R) vectorial summation current formation of the currents in the three phases and the neutral conductor (4-wire systems);
I_g = 0.4 to 1 × I_n[1].

Measurement method No. 2:
(G_{GND}) direct measurement of the ground-fault current using a current transformer, I_g = 0.4 to 1 × I_n,
t_g = 0.1 to 0.5 s.

VM version





NSE0_00697

Application: line protection – model 586,
LSI G (alarm) function

Overload protection I_r = 0.4 to 1 × I_n,
time-lag class t_r = 2.5 to 30

Thermal image selectable on/off

Short-circuit protection (short-time delay)
I_{sd} = 1.25 to 10 × I_R[1], t_{sd} = 0 to 0.5 s,
I^2t on/off selectable

Short-circuit protection (short-time delay)
I_i = 1.25 to 11 × I_n[1]

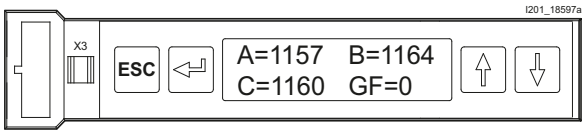
Ground-fault protection:

Measurement method No. 1:
(G_R) vectorial summation current formation of the currents in the three phases and the neutral conductor (4-wire systems);
I_g = 0.4 to 1 × I_n[1].

Measurement method No. 2:
(G_{GND}) direct measurement of the ground-fault current using a current transformer, I_g = 0.4 to 1 × I_n,
t_g = 0.1 to 0.5 s.

If a ground fault is detected, the LCD ETU only issues an alarm, without tripping the circuit breaker. This alarm is displayed direct on the display and/or is communicated to higher-level systems via PROFIBUS DP/Modbus RTU.

VJ version



[1] Size-dependent, see "Selection and ordering data".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Configuration

Communication

All 3VL molded case circuit breakers according to UL 489 with electronic trip unit (ETU) are communication-capable. To this end, the molded case circuit breaker's ETU is connected to a COM20 or COM21 communication module by means of a cable. The COM20 module (Release 2) supports the PROFIBUS DP protocol, while the COM21 module (Release 2) enables data transfer via Modbus RTU.

A communication kit – COMKIT 3 to 8 – is needed to connect the 3VL molded case circuit breaker (see page 2/285).

The COMKITs consist of a connecting cable including a protective cover and also one alarm and auxiliary switch each for installation in the molded case circuit breaker.[1] These are also connected to the electronic trip unit and signal the ON/OFF/TRIPPED circuit breaker status to the electronic trip unit.

The communication modules enable activation and deactivation of an optional motorized operating mechanism.

	Data transmission through COM20/COM21 (Release 2)
Data transferred	
Commands	
Closing or opening	✓
Deleting alarm and tripping operation buffer and also maintenance information	✓
Operating states[2]	
ON or OFF status trip position	✓
Event messages	
Tripped messages with tripping current	✓
Alarms (e.g. overload, phase unbalance current, etc.)	✓
Threshold violation (e.g. phase currents)	✓
Measured values	
Phase currents and neutral conductor current	✓
Parameter values	
Reading and writing	✓
Maintenance information	
(e.g. number of trips, number of switching operations)	✓
Data for device identification	✓
Clock synchronization	✓

✔ Available

Function	COM20/21 (Release 2) module with overcurrent release version	
	ETU	LCD ETU
Functions of communication components		
Transfer of the operating state (ON, OFF, tripped, warnings, tripped causes, event log, etc.) to the PROFIBUS	✓	✓
Display of measured values (current only) and parameters in the release, modifying parameters via the display	--	✓[3]
Transferring the maximum value of the actual current in %	✓	✓
Transferring the individual current phase currents	✓	✓
Transferring PROFIBUS identification data	✓	✓
Reading protection parameters via PROFIBUS/Modbus	✓	✓
Reading and setting protection parameters via PROFIBUS/Modbus	--	✓

✓ Function available.

Function can optionally be adopted by several trip units.

-- Function not available

1) Only an alarm switch is included with the COMKITs 3 and 6 because the auxiliary switch in the case of DG and FG frame sizes of the 3VL molded case circuit breakers is already included in the magnetic release (Maglatch).

2) Only in the case of built-in auxiliary switches connected to COM20/21 (Release 2)

3) COM20/21 not required

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General data

2

Switching direct current

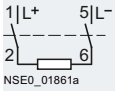
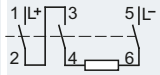
The VL150X UL (CG frame) to VL1600 UL (PG frame) molded case circuit breakers for line protection with thermal-magnetic trip units, for starter combinations, and for non-automatic air circuit breaker versions are also suitable for switching and protecting direct current.

The maximum permitted DC voltage for each conducting path needs to be taken into account for DC switching applications, however.

Series connection of 2 to 3 conducting paths is required for voltages in excess of 250 V in the case of VL150 UL (DG frame) to VL1600 UL (PG frame).

The following circuits are recommended since the current must flow through all conducting paths in order to conform to the thermal tripping characteristic curves.

The threshold values of the instantaneous short-circuit trip units ("I" trip units) increase by 30 to 40%.

Recommended circuit/maximum permitted DC voltage U_e		**Remarks**
Circuit A	Circuit B	
For 3-pole molded case circuit breakers		
250 V DC  NSE0_01861a	500 V DC rated / 600 V DC max. for use in ungrounded UPS DC applications (according to UL 489, Supplement SC)  NSE0_00741a	2-pole switching (ungrounded system)

Technical specifications

Type				**VL150X UL** CG frame	**VL150 UL** DG frame	**VL250 UL** FG frame	**VL400 UL** JG frame	**VL400X UL** LG frame	**VL800 UL** MG frame	**VL1200 UL** NG frame	**VL1600 UL** PG frame
Max. rated current I_n			A	150	150	250	400	600	800	1200	1600
Rated insulation voltage U_i only in accordance with IEC 60947-2											
Main conducting paths		AC	V	800							
Auxiliary circuits		AC	V	690							
Rated operational voltage U_e											
NEMA	50/60 Hz	AC	V	600							
		DC [1]	V	250	[2]						
IEC	50/60 Hz	AC	V	690							
Utilization category				A							
Permissible ambient temperature											
Operation: 0 °C ... +70 °C for devices with TM release (cf. IEC system manual)			°C	-25 ... +70							
Storage			°C	–40 ... +80							
Permissible load at different ambient temperatures											
Directly next to the molded case circuit breaker, referred to the molded case circuit breaker's rated current											
• Molded case circuit breaker for line protection	TM/ETU	Up to 40 °C	%	100	100/100				100/100		100/100
	TM/ETU	At 50 °C	%	93	93/100				94/100		92/100
	TM/ETU	At 60 °C	%	86	86/95				88/95		83/95
	TM/ETU	At 70 °C	%	79	79/80				82/80		75/80
• Molded case circuit breaker for starter combinations and non-automatic air circuit breakers		Up to 40 °C	%	100							
		At 50 °C	%	100							
		At 60 °C	%	93							
		At 70 °C	%	86							
Weight data of 3-pole molded case circuit breakers											
Basic circuit breaker											
• With thermal-magnetic release			kg	2.5	2.2	2.3	5.7	9.0	14.0	21.8	32.8
• With electronic trip unit			kg	--	2.4	2.5	5.9	9.3	16.0	25.0	31.3
Rated short-circuit breaking capacity				For rated short-circuit breaking capacity, see under "Overview" in table.							

[1] DC rated data applies to thermal-magnetic releases only.

[2] 500 V DC rated / 600 V DC max. for use in ungrounded UPS DC applications (according to UL 489, Supplement SC)

Minimum order quantity (PS) or a multiple thereof can be ordered.

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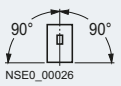
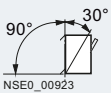
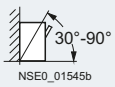
Type			VL150X UL CG frame	VL150 UL DG frame	VL250 UL FG frame	VL400 UL JG frame	VL400X UL LG frame	VL800 UL MG frame	VL1200 UL NG frame	VL1600 UL PG frame
Endurance	Switching cycles		20000				10000		3000	
Electrical endurance	Switching cycles		10000				5000	3000	1500	
Max. switching frequency	1/h		120				60		30	
Connection types			See "Main connections, basic equipment and options"							
Connection cross-sections for stranded cables										
Box terminal (Cu)	AWG/kcmil		1 x (14 ... 1/0)	1 x (8 ... 1/0)	1 x (3 ... 250)	1 x (1/0 ... 600)	--			
	mm^2		1 x (2.5 ... 50)	1 x (10 ... 50)	1 x (35 ... 120)	1 x (70 ... 300)	--			
Circular conductor terminal (Cu/Al)	AWG/kcmil		1 x (6 ... 3/0)		1 x (4 ... 350)	1 x Cu: 3/0 ... 600 Al: 250 ... 750		--		
	mm^2		1 x (16 ... 70)		1 x (25 ... 150)	1 x Cu: 95 ... 300 Al: 150 ... 300		--		
Circular conductor terminal with terminal cover (Cu/Al) • Terminal with auxiliary conductor connection up to 0.5 A • Aluminium terminals with control cable connection	AWG/kcmil		--	1 x (6 ... 300)	--					
	mm^2		--	1 x (16 ... 150)	--					
Multiple feed-in terminal (Cu/Al)	AWG/kcmil		--			2 x (3/0 ... 250)	2 x (2 ... 600)	2 x (500 ... 750)	--	
	mm^2		--			2 x (95 ... 120)	2 x (35 ... 300)	2 x 300	--	
	AWG/kcmil		--					3 x (1/0 ... 500)	3 x (500 ... 750)	--
	mm^2		--					3 x (70 ... 240)	3 x 300	--
	AWG/kcmil		--					--	4 x (1/0 ... 500)	--
	mm^2		--					--	4 x (70 ... 240)	--
	AWG/kcmil		--					--		4 x (600 ... 750)
	mm^2		--					--		4 x 300
Multiple feed-in terminal with terminal cover • Terminal with auxiliary conductor connection up to 0.5 A • Aluminium terminals with control cable connection	AWG/kcmil		--			2 x (2 ... 600)	--			
	mm^2		--			2 x (35 ... 300)	--			
Direct connection of busbars (Cu/Al, for IEC only)	mm		17 x 7	22 x 7	24 x 7	32 x 10	32 x 10	2 x 40 x 10	2 x 50 x 10	3 x 60 x 10
Screw for connection with screw terminal, metric			M 6		M 8		M10	M 8		
	inch		--	10-32 UNF	5/16	--	3/8	5/16		
Power losses per molded case circuit breaker at max. rated current										
Line protection	TM	W	17 ... 36	15 ... 48	32 ... 80	60 ... 175	85 ... 230	194 ... 269	150 ... 204	204 ... 329
Line protection	ETU or LCD ETU	W	--	6 ... 40	11 ... 60	38 ... 90	71 ... 160	140 ... 250	93 ... 210	146 ... 260
For starter combinations or non-automatic air circuit breakers		W	36	40	60	90	160	250	210	260
Permissible mounting position[1]			 NSE0_00026	 NSE0_00923	 [2] NSE0_01545b					

[1] For VL800 UL (MG frame) to VL1600 UL (PG frame) molded case circuit breakers with withdrawable unit frame in lateral installation position. Adapter set on request.

[2] Permissible current load factor 0.9; with internal accessories only.

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Molded Case Circuit Breakers

3VL Molded Case Circuit Breakers up to 1600 A, according to UL 489

General data

Type			VL150X UL CG frame	VL150 UL DG frame	VL250 UL FG frame	VL400 UL JG frame	VL400X UL LG frame	VL800 UL MG frame	VL1200 UL NG frame	VL1600 UL PG frame
Auxiliary switches and alarm switches										
Conventional free-air thermal current I_{th}		A	10							
Rated making capacity		A	10							
AC										
Rated operational voltage		V	24	48	110	230	400	600	--	
Rated operating current	AC-12	A	10						--	
	AC-15	A	6				3	1	--	
DC										
Rated operational voltage		V	24	48	110	230	--			
Rated operating current	DC-12	A	10	5	2.5	1	--			
	DC-13	A	3	1.5	0.7	0.3	--			
Back-up fuse/miniature circuit breaker		A	10 TDz / 10							
Leading auxiliary switch in rotary mechanism										
Rated thermal current I_{th}		A	2							
Rated making capacity		A	2 (ind. 0.5)							
Rated operational voltage		V AC	230							
Rated operating current		A	2							
Rated breaking capacity, inductive, p.f. = 0.7		A	0.5							
Rated breaking capacity		A	2							
Quick-response short-circuit fuse		A	2							
Position signaling switches										
Rated thermal current I_{th}		A	16		--					
Rated making capacity		A	16	10	--					
Rated operational voltage		V AC	250	400	--					
Rated operating current		A	16	10	--					
Rated breaking capacity, inductive, p.f. = 0.7		A	4		--					
Rated breaking capacity		A	16	10	--					
Quick-response short-circuit fuse		A	16	10	--					

Releases

			Family 1: VL150X UL (CG frame) to VL400X UL (LG frame)	Family 2: VL800 UL (MG frame) to VL1600 UL (PG frame)
Undervoltage releases				
Response voltage:				
• Release (circuit breaker trips)		V	0.35 ... 0.70 × U_s	0.35 ... 0.70 × U_s
• Pick-up (circuit breaker can be switched on)		V	0.85 ... 1.1 × U_s	0.85 ... 1.1 × U_s
Power consumption (continuous operation) at:				
• 24 V AC 50/60 Hz[1]		VA	1.4	--
• 110 ... 127 V AC 50/60 Hz		VA	1.0	1.8
• 220 ... 250 V AC 50/60 Hz		VA	1.0	1.8
• 208 V AC 50/60 Hz		VA	1.0	1.8
• 277 V AC 50/60 Hz		VA	1.0	1.8
• 380 ... 415 V AC 50/60 Hz		VA	1.0	1.8
• 440 ... 480 V AC 50/60 Hz		VA	1.0	1.8
• 500 ... 525 V AC 50/60 Hz		VA	1.0	--
• 12 V DC		W	0.8	1.5
• 24 V DC		W	0.8	1.5
• 48 V DC		W	0.8	1.5
• 60 V DC		W	0.8	1.5
• 110 ... 127 V DC		W	0.8	1.5
• 220 ... 250 V DC		W	0.8	1.5
Max. opening time		ms	50[2]	80
Shunt releases				
Response voltage:			U_s	U_s
Pick-up (switch tripped)		V	0.7 ... 1.1	0.7 ... 1.1
Power consumption **(short-time)** at:				
• 24 V AC 50/60 Hz		VA	310	330
• 48 ... 60 V AC 50/60 Hz		VA	335 ... 465	380 ... 460
• 110 ... 127 V AC 50/60 Hz		VA	470 ... 630	330 ... 430
• 208 ... 277 V AC 50/60 Hz		VA	585 ... 1000	520 ... 800
• 380 ... 600 V AC 50/60 Hz		VA	180 ... 500	228 ... 750
• 24 V DC		W	360	385
• 48 ... 60 V DC		W	380 ... 590	480 ... 720
• 110 ... 127 V DC		W	506 ... 680	362 ... 424
• 220 ... 250 V DC		W	470 ... 580	418 ... 476
Max. opening time		ms	50	50
Max. in-service period		s	interrupts automatically, less than 10 ms	interrupts automatically, less than 10 ms

[1] On request.

[2] 3VL9400-1UP01: 15 ms

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Type		VL150X UL CG frame	VL150 UL DG frame	VL250 UL FG frame	VL400 UL JG frame	VL400X UL LG frame	VL800 UL MG frame	VL1200 UL NG frame	VL1600 UL PG frame
Motorized operating mechanisms		--						x	
Motorized operating mechanism with spring energy store (synchronizable)		x						--	
Motorized operating mechanism									
Power consumption	VA/W	--						< 250	
Rated control supply voltage U_s	50/60Hz V AC	--						42 ... 48/60	110 ... 127/220 ... 250
	V DC	--						24 / 42 ... 48/60	110 ... 127/220 ... 250
Fusible link (operational class gG, slow-blow characteristic)	A	--						4	2
Miniature circuit breakers	A	--						4	2
Primary operating range	V	--						0.85 ... 1.1 × U_s	
Min. command duration U_s	ms	--						50	
Max. command duration, connection-dependent[1]		Jog/pushbutton or continuous command			--			Jog/pushbutton or continuous command	
Total make-time	s	--						<5	
Break-time	s	--						<5	
Interval between the commands OFF and ON	s	--						>5	
Interval between the commands ON and OFF	s	--						>5	
Max. permissible switching frequency	1/h	--						30	
Motorized operating mechanism with spring energy store (synchronizable)									
Power consumption	VA/W	< 100			< 200	< 250		--	
Rated control supply voltage U_s	50/60Hz V AC	42 ... 48 / 60			110 ... 127 / 220 ... 250			--	
	V DC	24 / 42 ... 48 / 60			110 ... 127 / 220 ... 250			--	
Fusible link (operational class gG, slow-blow characteristic)	A	4			2			--	
Miniature circuit breakers	A	4			2			--	
Primary operating range	V	0.85 ... 1.1 x U_s						--	
Min. command duration U_s	ms	50						--	
Max. command duration, connection-dependent[1]		Jog/pushbutton or continuous command						--	
Total make-time	ms	< 100						--	
Break-time	s	<5						--	
Interval between the commands OFF and ON	s	>5						--	
Interval between the commands ON and OFF	s	> 1						--	
Max. permissible switching frequency	1/h	120				60		--	

x Available

-- Not available

1) Changeover contact also permissible, but note the interval times between ON and OFF.

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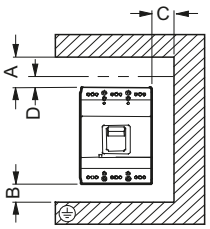
General data

Space requirement above arc chutes, safety clearance (applicable to IEC application)

2



Arcing spaces
Minimum clearances from adjacent grounded parts and non-insulated live parts.

Inside the arcing space, bare conductors and bars must be insulated with phase barriers.

For bare conductors and bars outside the arcing space, the specific mounting instructions for the different frame sizes must be observed.

For mounting instructions, see www.siemens.com/lowvoltage/product-support

Space requirement above arcing spaces according to IEC 60947-2

Molded case circuit breakers	Breaking capacity	Minimum enclosure volume	A			B	C	D
			≤ 415 V	> 415 ... 690 V	> 415 ... 690 V	≤ 690 V	≤ 690 V	≤ 690 V
Type		m^3	without/with terminal cover	without terminal cover	with terminal cover			
VL150X UL (CG frame)	Standard High Very high	0.011	35	70	35	25	25	35
VL150 UL (DG frame)	Standard High Very high	0.011	50	100	50	25	25	35
VL250 UL (FG frame)	Standard High Very high	0.015	50	100	50	25	25	35
VL400 UL (JG frame)	Standard High Very high	0.036	50	100	50	25	25	35
VL400X UL (LG frame)	Standard High Very high	0.18	50	100	50	25	25	35
VL800 UL (MG frame)	Standard High Very high	0.22	50	100	50	25	25	35
VL1200 UL (NG frame)	Standard High Very high	0.22	70	100	70	30	30	50
VL1600 UL (PG frame)	Standard High Very high	0.264	100	100	100	100	30	100

Definition of permissible safety clearances

Clearance between

A: molded case circuit breaker and busbars (uninsulated and grounded metal); terminal cover required above 600 V AC, 500 V DC

B: molded case circuit breaker terminal and lower panel

C: side of the molded case circuit breaker and side panels (uninsulated and grounded metal)

D: molded case circuit breaker and non-conductive parts with at least 3 mm thick insulation (insulator, insulated bar, painted plate)

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3/2	**Introduction**
	5SL miniature circuit breakers
3/3	Introduction
3/5	5SL3, 4500 A
3/7	5SL6, 6000 A
3/9	5SL4, 10000 A
	5SY and 5SP miniature circuit breakers
3/13	Introduction
3/15	5SY6, 6000 A
3/17	5SY4, 10000 A
3/21	5SP4, high-current, 10000 A
3/22	5SY5, universal current, 10000 A
3/24	5SY7, 15000 A
3/27	5SY8, 25000 A
3/29	**5SJ6...-. KS miniature circuit breakers, with plug-in terminals**
	5SY miniature circuit breakers, 1+N in 1 MW
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	Additional components
3/36	Electrical components
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	Busbars
3/49	5ST standard busbars
3/59	5ST3 busbars acc. to UL 508
3/63	5ST2 distribution blocks
3/67	SIKclip wiring system
3/69	**5SJ4 . . . - .HG miniature circuit breakers acc. to UL 489 and IEC, and accessories**
3/80	**SHU 5SP3 main miniature circuit breakers**

For further technical product information:

Configuration Manual

Miniature Circuit Breakers
Article No.: 3ZW1012-5SL61-0AC1

Siemens Industry Online Support:

www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
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FAQ
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Product note
Software archive
Technical data

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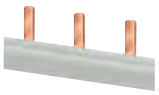
3

Overview

Devices		Page	Application	Standards
	**5SL miniature circuit breakers**	3/3	For all applications from 0.3 A to 63 A with B, C and D tripping characteristics with a rated breaking capacity of 4500 A, 6000 A and 10000 A acc. to EN 60898-1.	EN 60898-1
	**5SY and 5SP miniature circuit breakers**	3/17	For all applications from 0.3 A to 125 A with a rated breaking capacity of 10000 A and 15000 A acc. to EN 60898-1. Applications for universal current from 0.3 A to 63 A, version 25 kA, acc. to EN 60947-2.	EN 60898-1/-2 EN 60947-2 UL 1077 CSA 22.2 GB 10963.1/.2
	**5SJ6 . . .-. KS miniature circuit breakers, with plug-in terminals**	3/29	For socket outlet and lighting circuits in all building installations. The plug-in terminals offer easy front connection for manual insertion of conductors, which considerably reduces mounting times.	EN 60898-1
	**5SY miniature circuit breakers, 1+N in 1 MW**	3/32	For socket outlet and lighting circuits in all building installations where a switchable neutral conductor is required. The miniature circuit breaker 1+N saves space in the distribution board.	EN 60898-1
	**Additional components**	3/36	Auxiliary switches, fault signal contacts, shunt trips, undervoltage releases for higher system availability, RC units for personal safety and remote controlled mechanisms for remote switching.	
	**Busbars**	3/49	Busbars in 10 mm^2 and 16 mm^2 save space in the distribution board and time during mounting. Busbars in 18 mm^2 and 25 mm^2 acc. to UL 508 and CSA.	UL 508
	**5SJ4 . . . - .HG miniature circuit breakers acc. to UL 489 and IEC, and accessories**	3/69	Miniature circuit breakers can be used as "branch circuit protection" and are approved for the connection type "same polarity" and "opposite polarity" in the characteristics B, C and D acc. to UL 489, from 0.3 A to 63 A.	UL 489
	**SHU 5SP3 main miniature circuit breakers**	3/80	Voltage-independent selective main miniature circuit breakers (SHU) in the precounter area support downstream miniature circuit breakers by providing better current limitation.	DIN VDE 0641-21

Minimum order quantity (PS) or a multiple thereof can be ordered.

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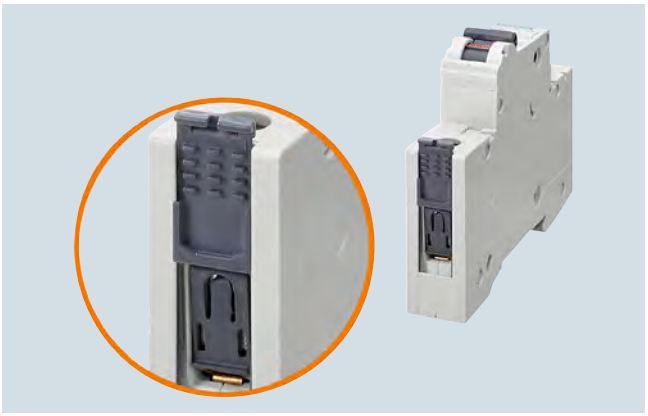
Overview

The 5SL miniature circuit breakers are intended for use up to 6 kA/10 kA. These devices have system features that are characteristic of all Siemens miniature circuit breakers.

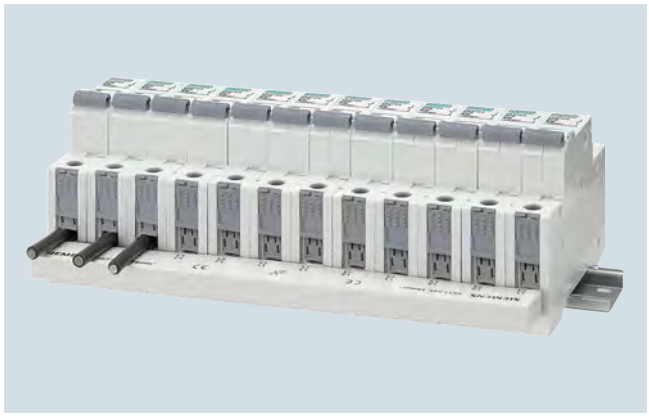
They are also suitable for the quick and easy mounting of additional components, such as auxiliary switches and fault signal contacts.
The 5SL4 miniature circuit breakers can also be combined with shunt trips, undervoltage releases and arc fault detection devices.

To facilitate cable entry, the devices are equipped with rectangular terminals for the accommodation of pin busbars with cables up to 35 mm^2. The rated current range is between 0.3 A and 63 A. The 5SL miniature circuit breakers are available in characteristics B, C and D.

Benefits



- Effective touch protection when grasping and manually operating the latching slide with latch-down option.



- Easy-to-mount busbar assembly.
- Consistent bus mounting concept throughout the Siemens miniature circuit breaker range.



- Individual devices can be removed from the bus-mounted assembly without the use of tools.



- The 5SL4 miniature circuit breakers are suitable for the quick and easy mounting of arc fault detection devices, auxiliary switches, fault signal contacts, shunt trips and undervoltage releases.

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3

Technical specifications

			5SL3	5SL6	5SL4
Standards			EN 60898-1		
Approvals			see chapter "Appendix"		
Tripping characteristic			B, C		B, C, D
Rated voltage U_n		V AC	230/400		
Operational voltage					
• Min.		V AC/DC per pole	24		
• Max.		V AC V DC/pole	250/440 60[1)]		60[1)2)]
Rated breaking capacity					
• I_{cn} acc. to IEC/EN 60898-1		kA AC	4.5	6	10
• I_{cu} acc. to IEC/EN 60947-2		kA AC	4.5	6	10
Insulation coordination					
• Rated insulation voltage		V AC	250/440		
• Pollution degree for overvoltage category			2/III		
• Rated impulse withstand voltage U_{imp}		kV AC	4		
Rated frequency		Hz	50/60		
Touch protection	Acc. to EN 50274		Yes		
Handle end position, sealable			Yes		
Degree of protection			IP20 with connected conductors, IP40 in the area of the handle with distribution cover	IP40 with connected conductors	IP20 with connected conductors
CFC and silicone-free			Yes		
Conductor cross-sections					
• 1-wire					
- Solid (≤ 10 mm^2) / stranded (≥ 16 mm^2)		mm^2	0.75 ... 35		
- Finely stranded with non-insulated end sleeve		mm^2	0.75 ... 25		
- Finely stranded with insulated end sleeve		mm^2	0.75 ... 25		
- Finely stranded without end sleeve		mm^2	1 ... 35		
• 2-wire, same cross-section, same conductor type					
- Solid (≤ 10 mm^2) / stranded (≥ 16 mm^2)		mm^2	0.75 ... 10		
- Finely stranded with non-insulated end sleeve		mm^2	0.75 ... 4		
- Finely stranded with insulated end sleeve		mm^2	0.75 ... 4		
- Finely stranded without end sleeve		mm^2	1 ... 4		
• 1-wire + busbar (pin thickness 1.5 mm)					
- Solid (≤ 10 mm^2) / stranded (≥ 16 mm^2)		mm^2	10 ... 25		
- Finely stranded with non-insulated end sleeve		mm^2	6 ... 25		
- Finely stranded with insulated end sleeve		mm^2	6 ... 16		
Terminals	± screw (Pozidriv)		2		
• Terminal tightening torque		Nm	2.5 ... 3		
Mounting position			Any		
Service life, on average, with rated load			20000 actuations		
Storage temperature		°C	-40 ... +75		
Ambient temperature		°C	-25 .. +45, occasionally +55, max. 95% humidity		-25 ... +55, max. 95% humidity
Resistance to climate	Acc. to IEC 60068-2-30		6 cycles		

1) The operational voltage 60 V DC/pole takes into account a battery charging voltage with a peak value of 72 V.

2) Exempt: Characteristic C: 0.3 ... 1 A, characteristic D: 0.3 ... 2 A.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The 5SL miniature circuit breakers are particularly suitable for the demands of 4.5 kA and 6 kA applications in infrastructure, such as residential buildings and small commercial buildings.

Selection and ordering data

4500 / 3	I_n	Mounting width	SD	Characteristic B: Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C: Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 4500 A														
	**1P, 230/400 V AC**													
	0.3	1		--						5SL3114-7		1	1 unit	1AE
	0.5			--						5SL3105-7		1	1 unit	1AE
	1			--						5SL3101-7		1	1 unit	1AE
	1.6			--						5SL3115-7		1	1 unit	1AE
	2			--						5SL3102-7		1	1 unit	1AE
	3			--						5SL3103-7		1	1 unit	1AE
	4			--						5SL3104-7		1	1 unit	1AE
	6			5SL3106-6		1	1 unit	1AE		5SL3106-7		1	1 unit	1AE
	8			--						5SL3108-7		1	1 unit	1AE
	10			5SL3110-6		1	1 unit	1AE		5SL3110-7		1	1 unit	1AE
	13			5SL3113-6		1	1 unit	1AE		5SL3113-7		1	1 unit	1AE
	16			5SL3116-6		1	1 unit	1AE		5SL3116-7		1	1 unit	1AE
	20			5SL3120-6		1	1 unit	1AE		5SL3120-7		1	1 unit	1AE
	25			5SL3125-6		1	1 unit	1AE		5SL3125-7		1	1 unit	1AE
	32			5SL3132-6		1	1 unit	1AE		5SL3132-7		1	1 unit	1AE
	40			5SL3140-6		1	1 unit	1AE		5SL3140-7		1	1 unit	1AE
	50			5SL3150-6		1	1 unit	1AE		5SL3150-7		1	1 unit	1AE
	63			5SL3163-6		1	1 unit	1AE		5SL3163-7		1	1 unit	1AE
	**1P+N, 230 V AC**													
	0.3	2		--						5SL3514-7		1	1 unit	1AE
	0.5			--						5SL3505-7		1	1 unit	1AE
	1			--						5SL3501-7		1	1 unit	1AE
	1.6			--						5SL3515-7		1	1 unit	1AE
	2			--						5SL3502-7		1	1 unit	1AE
	3			--						5SL3503-7		1	1 unit	1AE
	4			--						5SL3504-7		1	1 unit	1AE
	6			5SL3506-6		1	1 unit	1AE		5SL3506-7		1	1 unit	1AE
	8			--						5SL3508-7		1	1 unit	1AE
	10			5SL3510-6		1	1 unit	1AE		5SL3510-7		1	1 unit	1AE
	13			5SL3513-6		1	1 unit	1AE		5SL3513-7		1	1 unit	1AE
	16			5SL3516-6		1	1 unit	1AE		5SL3516-7		1	1 unit	1AE
	20			5SL3520-6		1	1 unit	1AE		5SL3520-7		1	1 unit	1AE
	25			5SL3525-6		1	1 unit	1AE		5SL3525-7		1	1 unit	1AE
	32			5SL3532-6		1	1 unit	1AE		5SL3532-7		1	1 unit	1AE
	40			5SL3540-6		1	1 unit	1AE		5SL3540-7		1	1 unit	1AE
	50			5SL3550-6		1	1 unit	1AE		5SL3550-7		1	1 unit	1AE
	63			5SL3563-6		1	1 unit	1AE		5SL3563-7		1	1 unit	1AE
	**2P, 400 V AC**													
	0.3	2		--						5SL3214-7		1	1 unit	1AE
	0.5			--						5SL3205-7		1	1 unit	1AE
	1			--						5SL3201-7		1	1 unit	1AE
	1.6			--						5SL3215-7		1	1 unit	1AE
	2			--						5SL3202-7		1	1 unit	1AE
	3			--						5SL3203-7		1	1 unit	1AE
	4			--						5SL3204-7		1	1 unit	1AE
	6			5SL3206-6		1	1 unit	1AE		5SL3206-7		1	1 unit	1AE
	8			--						5SL3208-7		1	1 unit	1AE
	10			5SL3210-6		1	1 unit	1AE		5SL3210-7		1	1 unit	1AE
	13			5SL3213-6		1	1 unit	1AE		5SL3213-7		1	1 unit	1AE
	16			5SL3216-6		1	1 unit	1AE		5SL3216-7		1	1 unit	1AE
	20			5SL3220-6		1	1 unit	1AE		5SL3220-7		1	1 unit	1AE
	25			5SL3225-6		1	1 unit	1AE		5SL3225-7		1	1 unit	1AE
	32			5SL3232-6		1	1 unit	1AE		5SL3232-7		1	1 unit	1AE
	40			5SL3240-6		1	1 unit	1AE		5SL3240-7		1	1 unit	1AE
	50			5SL3250-6		1	1 unit	1AE		5SL3250-7		1	1 unit	1AE
	63			5SL3263-6		1	1 unit	1AE		5SL3263-7		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

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5SL3, 4500 A

4500 / 3		I_n	Mounting width	SD	Characteristic B Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	MW[1]	d						d					
Miniature circuit breakers 4500 A															
	**3P, 400 V AC**														
		1			--						5SL3301-7		1	1 unit	1AE
		2			--						5SL3302-7		1	1 unit	1AE
		3			--						5SL3303-7		1	1 unit	1AE
		4			--						5SL3304-7		1	1 unit	1AE
		6			5SL3306-6		1	1 unit	1AE		5SL3306-7		1	1 unit	1AE
		10			5SL3310-6		1	1 unit	1AE		5SL3310-7		1	1 unit	1AE
		16			5SL3316-6		1	1 unit	1AE		5SL3316-7		1	1 unit	1AE
		20			5SL3320-6		1	1 unit	1AE		5SL3320-7		1	1 unit	1AE
		25			5SL3325-6		1	1 unit	1AE		5SL3325-7		1	1 unit	1AE
		32			5SL3332-6		1	1 unit	1AE		5SL3332-7		1	1 unit	1AE
		40			5SL3340-6		1	1 unit	1AE		5SL3340-7		1	1 unit	1AE
		50			5SL3350-6		1	1 unit	1AE		5SL3350-7		1	1 unit	1AE
		63			5SL3363-6		1	1 unit	1AE		5SL3363-7		1	1 unit	1AE
	**3P+N, 400 V AC**														
		1			--						5SL3601-7		1	1 unit	1AE
		2			--						5SL3602-7		1	1 unit	1AE
		3			--						5SL3603-7		1	1 unit	1AE
		4			--						5SL3604-7		1	1 unit	1AE
		6			5SL3606-6		1	1 unit	1AE		5SL3606-7		1	1 unit	1AE
		8			--						5SL3608-7		1	1 unit	1AE
		10			5SL3610-6		1	1 unit	1AE		5SL3610-7		1	1 unit	1AE
		13			5SL3613-6		1	1 unit	1AE		5SL3613-7		1	1 unit	1AE
		16			5SL3616-6		1	1 unit	1AE		5SL3616-7		1	1 unit	1AE
		20			5SL3620-6		1	1 unit	1AE		5SL3620-7		1	1 unit	1AE
		25			5SL3625-6		1	1 unit	1AE		5SL3625-7		1	1 unit	1AE
		32			5SL3632-6		1	1 unit	1AE		5SL3632-7		1	1 unit	1AE
		40			5SL3640-6		1	1 unit	1AE		5SL3640-7		1	1 unit	1AE
		50			5SL3650-6		1	1 unit	1AE		5SL3650-7		1	1 unit	1AE
		63			5SL3663-6		1	1 unit	1AE		5SL3663-7		1	1 unit	1AE
	**4P, 400 V AC**														
		1			--						5SL3401-7		1	1 unit	1AE
		2			--						5SL3402-7		1	1 unit	1AE
		3			--						5SL3403-7		1	1 unit	1AE
		4			--						5SL3404-7		1	1 unit	1AE
		6			--						5SL3406-7		1	1 unit	1AE
		10			--						5SL3410-7		1	1 unit	1AE
		13			--						5SL3413-7		1	1 unit	1AE
		16			--						5SL3416-7		1	1 unit	1AE
		20			--						5SL3420-7		1	1 unit	1AE
		25			--						5SL3425-7		1	1 unit	1AE
		32			--						5SL3432-7		1	1 unit	1AE
		40			--						5SL3440-7		1	1 unit	1AE
		50			--						5SL3450-7		1	1 unit	1AE
		63			--						5SL3463-7		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

6000 / 3	I_n	Mounting width	SD	Characteristic B: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 6000 A														
	**1P, 230/400 V AC**													
	0.3	1		--						5SL6114-7		1	1 unit	1AC
	0.5			--						5SL6105-7		1	1 unit	1AC
	1			--						5SL6101-7		1	1 unit	1AC
	1.6			--						5SL6115-7		1	1 unit	1AC
	2			--						5SL6102-7		1	1 unit	1AC
	3			--						5SL6103-7		1	1 unit	1AC
	4			--						5SL6104-7		1	1 unit	1AC
	6			5SL6106-6		1	1 unit	1AB		5SL6106-7		1	1 unit	1AC
	8			--						5SL6108-7		1	1 unit	1AC
	10			5SL6110-6		1	1 unit	1AB		5SL6110-7		1	1 unit	1AC
	13			5SL6113-6		1	1 unit	1AB		5SL6113-7		1	1 unit	1AC
	16			5SL6116-6		1	1 unit	1AB		5SL6116-7		1	1 unit	1AC
	20			5SL6120-6		1	1 unit	1AB		5SL6120-7		1	1 unit	1AC
	25			5SL6125-6		1	1 unit	1AB		5SL6125-7		1	1 unit	1AC
	32			5SL6132-6		1	1 unit	1AB		5SL6132-7		1	1 unit	1AC
	40			5SL6140-6		1	1 unit	1AB		5SL6140-7		1	1 unit	1AC
	50			5SL6150-6		1	1 unit	1AB		5SL6150-7		1	1 unit	1AC
	63			5SL6163-6		1	1 unit	1AB		5SL6163-7		1	1 unit	1AC
	**1P+N, 230 V AC**													
	0.3	2		--						5SL6514-7		1	1 unit	1AC
	0.5			--						5SL6505-7		1	1 unit	1AC
	1			--						5SL6501-7		1	1 unit	1AC
	1.6			--						5SL6515-7		1	1 unit	1AC
	2			--						5SL6502-7		1	1 unit	1AC
	3			--						5SL6503-7		1	1 unit	1AC
	4			--						5SL6504-7		1	1 unit	1AC
	6			5SL6506-6		1	1 unit	1AB		5SL6506-7		1	1 unit	1AC
	8			--						5SL6508-7		1	1 unit	1AC
	10			5SL6510-6		1	1 unit	1AB		5SL6510-7		1	1 unit	1AC
	13			5SL6513-6		1	1 unit	1AB		5SL6513-7		1	1 unit	1AC
	16			5SL6516-6		1	1 unit	1AB		5SL6516-7		1	1 unit	1AC
	20			5SL6520-6		1	1 unit	1AB		5SL6520-7		1	1 unit	1AC
	25			5SL6525-6		1	1 unit	1AB		5SL6525-7		1	1 unit	1AC
	32			5SL6532-6		1	1 unit	1AB		5SL6532-7		1	1 unit	1AC
	40			5SL6540-6		1	1 unit	1AB		5SL6540-7		1	1 unit	1AC
	50			5SL6550-6		1	1 unit	1AB		5SL6550-7		1	1 unit	1AC
	63			5SL6563-6		1	1 unit	1AB		5SL6563-7		1	1 unit	1AC
	**2P, 400 V AC**													
	0.3	2		--						5SL6214-7		1	1 unit	1AC
	0.5			--						5SL6205-7		1	1 unit	1AC
	1			--						5SL6201-7		1	1 unit	1AC
	1.6			--						5SL6215-7		1	1 unit	1AC
	2			--						5SL6202-7		1	1 unit	1AC
	3			--						5SL6203-7		1	1 unit	1AC
	4			--						5SL6204-7		1	1 unit	1AC
	6			5SL6206-6		1	1 unit	1AB		5SL6206-7		1	1 unit	1AC
	8			--						5SL6208-7		1	1 unit	1AC
	10			5SL6210-6		1	1 unit	1AB		5SL6210-7		1	1 unit	1AC
	13			5SL6213-6		1	1 unit	1AB		5SL6213-7		1	1 unit	1AC
	16			5SL6216-6		1	1 unit	1AB		5SL6216-7		1	1 unit	1AC
	20			5SL6220-6		1	1 unit	1AB		5SL6220-7		1	1 unit	1AC
	25			5SL6225-6		1	1 unit	1AB		5SL6225-7		1	1 unit	1AC
	32			5SL6232-6		1	1 unit	1AB		5SL6232-7		1	1 unit	1AC
	40			5SL6240-6		1	1 unit	1AB		5SL6240-7		1	1 unit	1AC
	50			5SL6250-6		1	1 unit	1AB		5SL6250-7		1	1 unit	1AC
	63			5SL6263-6		1	1 unit	1AB		5SL6263-7		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

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5SL6, 6000 A

6000 / 3	I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 6000 A														
	**3P, 400 V AC**													
	0.3	3		--						**5SL6314-7**		1	1 unit	1AC
	0.5			--						**5SL6305-7**		1	1 unit	1AC
	1			--						**5SL6301-7**		1	1 unit	1AC
	1.6			--						**5SL6315-7**		1	1 unit	1AC
	2			--						**5SL6302-7**		1	1 unit	1AC
	3			--						**5SL6303-7**		1	1 unit	1AC
	4			--						**5SL6304-7**		1	1 unit	1AC
	6			**5SL6306-6**		1	1 unit	1AB		**5SL6306-7**		1	1 unit	1AC
	8			--						**5SL6308-7**		1	1 unit	1AC
	10			**5SL6310-6**		1	1 unit	1AB		**5SL6310-7**		1	1 unit	1AC
	13			**5SL6313-6**		1	1 unit	1AB		**5SL6313-7**		1	1 unit	1AC
	16			**5SL6316-6**		1	1 unit	1AB		**5SL6316-7**		1	1 unit	1AC
	20			**5SL6320-6**		1	1 unit	1AB		**5SL6320-7**		1	1 unit	1AC
	25			**5SL6325-6**		1	1 unit	1AB		**5SL6325-7**		1	1 unit	1AC
	32			**5SL6332-6**		1	1 unit	1AB		**5SL6332-7**		1	1 unit	1AC
	40			**5SL6340-6**		1	1 unit	1AB		**5SL6340-7**		1	1 unit	1AC
	50			**5SL6350-6**		1	1 unit	1AB		**5SL6350-7**		1	1 unit	1AC
	63			**5SL6363-6**		1	1 unit	1AB		**5SL6363-7**		1	1 unit	1AC
	**3P+N, 400 V AC**													
	0.3	4		--						**5SL6614-7**		1	1 unit	1AC
	0.5			--						**5SL6605-7**		1	1 unit	1AC
	1			--						**5SL6601-7**		1	1 unit	1AC
	1.6			--						**5SL6615-7**		1	1 unit	1AC
	2			--						**5SL6602-7**		1	1 unit	1AC
	3			--						**5SL6603-7**		1	1 unit	1AC
	4			--						**5SL6604-7**		1	1 unit	1AC
	6			**5SL6606-6**		1	1 unit	1AB		**5SL6606-7**		1	1 unit	1AC
	8			--						**5SL6608-7**		1	1 unit	1AC
	10			**5SL6610-6**		1	1 unit	1AB		**5SL6610-7**		1	1 unit	1AC
	13			**5SL6613-6**		1	1 unit	1AB		**5SL6613-7**		1	1 unit	1AC
	16			**5SL6616-6**		1	1 unit	1AB		**5SL6616-7**		1	1 unit	1AC
	20			**5SL6620-6**		1	1 unit	1AB		**5SL6620-7**		1	1 unit	1AC
	25			**5SL6625-6**		1	1 unit	1AB		**5SL6625-7**		1	1 unit	1AC
	32			**5SL6632-6**		1	1 unit	1AB		**5SL6632-7**		1	1 unit	1AC
	40			**5SL6640-6**		1	1 unit	1AB		**5SL6640-7**		1	1 unit	1AC
	50			**5SL6650-6**		1	1 unit	1AB		**5SL6650-7**		1	1 unit	1AC
	63			**5SL6663-6**		1	1 unit	1AB		**5SL6663-7**		1	1 unit	1AC
	**4P, 400 V AC**													
	0.3	4		--						**5SL6414-7**		1	1 unit	1AC
	0.5			--						**5SL6405-7**		1	1 unit	1AC
	1			--						**5SL6401-7**		1	1 unit	1AC
	1.6			--						**5SL6415-7**		1	1 unit	1AC
	2			--						**5SL6402-7**		1	1 unit	1AC
	3			--						**5SL6403-7**		1	1 unit	1AC
	4			--						**5SL6404-7**		1	1 unit	1AC
	6			**5SL6406-6**		1	1 unit	1AB		**5SL6406-7**		1	1 unit	1AC
	8			--						**5SL6408-7**		1	1 unit	1AC
	10			**5SL6410-6**		1	1 unit	1AB		**5SL6410-7**		1	1 unit	1AC
	13			**5SL6413-6**		1	1 unit	1AB		**5SL6413-7**		1	1 unit	1AC
	16			**5SL6416-6**		1	1 unit	1AB		**5SL6416-7**		1	1 unit	1AC
	20			**5SL6420-6**		1	1 unit	1AB		**5SL6420-7**		1	1 unit	1AC
	25			**5SL6425-6**		1	1 unit	1AB		**5SL6425-7**		1	1 unit	1AC
	32			**5SL6432-6**		1	1 unit	1AB		**5SL6432-7**		1	1 unit	1AC
	40			**5SL6440-6**		1	1 unit	1AB		**5SL6440-7**		1	1 unit	1AC
	50			**5SL6450-6**		1	1 unit	1AB		**5SL6450-7**		1	1 unit	1AC
	63			**5SL6463-6**		1	1 unit	1AB		**5SL6463-7**		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

10000 / 3	I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 10000 A														
	**1P, 230/400 V AC**													
	0.3	1		--						5SL4114-7		1	1 unit	1AC
	0.5			--						5SL4105-7		1	1 unit	1AC
	1			5SL4101-6		1	1 unit	1AB		5SL4101-7		1	1 unit	1AC
	1.6			--						5SL4115-7		1	1 unit	1AC
	2			5SL4102-6		1	1 unit	1AB		5SL4102-7		1	1 unit	1AC
	3			5SL4103-6		1	1 unit	1AB		5SL4103-7		1	1 unit	1AC
	4			5SL4104-6		1	1 unit	1AB		5SL4104-7		1	1 unit	1AC
	6			5SL4106-6		1	1 unit	1AB		5SL4106-7		1	1 unit	1AC
	8			5SL4108-6		1	1 unit	1AB		5SL4108-7		1	1 unit	1AC
	10		▶	5SL4110-6		1	1 unit	1AB		5SL4110-7		1	1 unit	1AC
	13			5SL4113-6		1	1 unit	1AB		5SL4113-7		1	1 unit	1AC
	16		▶	5SL4116-6		1	1 unit	1AB	▶	5SL4116-7		1	1 unit	1AC
	20			5SL4120-6		1	1 unit	1AB		5SL4120-7		1	1 unit	1AC
	25			5SL4125-6		1	1 unit	1AB		5SL4125-7		1	1 unit	1AC
	32			5SL4132-6		1	1 unit	1AB		5SL4132-7		1	1 unit	1AC
	40			5SL4140-6		1	1 unit	1AB		5SL4140-7		1	1 unit	1AC
	50			5SL4150-6		1	1 unit	1AB		5SL4150-7		1	1 unit	1AC
	63			5SL4163-6		1	1 unit	1AB		5SL4163-7		1	1 unit	1AC
	**1P+N, 230 V AC**													
	0.3	2		--						5SL4514-7		1	1 unit	1AC
	0.5			--						5SL4505-7		1	1 unit	1AC
	1			5SL4501-6		1	1 unit	1AB		5SL4501-7		1	1 unit	1AC
	1.6			--						5SL4515-7		1	1 unit	1AC
	2			5SL4502-6		1	1 unit	1AB		5SL4502-7		1	1 unit	1AC
	3			5SL4503-6		1	1 unit	1AB		5SL4503-7		1	1 unit	1AC
	4			5SL4504-6		1	1 unit	1AB		5SL4504-7		1	1 unit	1AC
	6			5SL4506-6		1	1 unit	1AB		5SL4506-7		1	1 unit	1AC
	8			5SL4508-6		1	1 unit	1AB		5SL4508-7		1	1 unit	1AC
	10			5SL4510-6		1	1 unit	1AB	▶	5SL4510-7		1	1 unit	1AC
	13			5SL4513-6		1	1 unit	1AB		5SL4513-7		1	1 unit	1AC
	16			5SL4516-6		1	1 unit	1AB		5SL4516-7		1	1 unit	1AC
	20			5SL4520-6		1	1 unit	1AB		5SL4520-7		1	1 unit	1AC
	25			5SL4525-6		1	1 unit	1AB		5SL4525-7		1	1 unit	1AC
	32			5SL4532-6		1	1 unit	1AB		5SL4532-7		1	1 unit	1AC
	40			5SL4540-6		1	1 unit	1AB		5SL4540-7		1	1 unit	1AC
	50			5SL4550-6		1	1 unit	1AB		5SL4550-7		1	1 unit	1AC
	63			5SL4563-6		1	1 unit	1AB		5SL4563-7		1	1 unit	1AC
	**2P, 400 V AC**													
	0.3	2		--						5SL4214-7		1	1 unit	1AC
	0.5			--						5SL4205-7		1	1 unit	1AC
	1			5SL4201-6		1	1 unit	1AB		5SL4201-7		1	1 unit	1AC
	1.6			--						5SL4215-7		1	1 unit	1AC
	2			5SL4202-6		1	1 unit	1AB		5SL4202-7		1	1 unit	1AC
	3			5SL4203-6		1	1 unit	1AB		5SL4203-7		1	1 unit	1AC
	4			5SL4204-6		1	1 unit	1AB		5SL4204-7		1	1 unit	1AC
	6			5SL4206-6		1	1 unit	1AB		5SL4206-7		1	1 unit	1AC
	8			5SL4208-6		1	1 unit	1AB		5SL4208-7		1	1 unit	1AC
	10			5SL4210-6		1	1 unit	1AB		5SL4210-7		1	1 unit	1AC
	13			5SL4213-6		1	1 unit	1AB		5SL4213-7		1	1 unit	1AC
	16			5SL4216-6		1	1 unit	1AB		5SL4216-7		1	1 unit	1AC
	20			5SL4220-6		1	1 unit	1AB		5SL4220-7		1	1 unit	1AC
	25			5SL4225-6		1	1 unit	1AB		5SL4225-7		1	1 unit	1AC
	32			5SL4232-6		1	1 unit	1AB		5SL4232-7		1	1 unit	1AC
	40			5SL4240-6		1	1 unit	1AB		5SL4240-7		1	1 unit	1AC
	50			5SL4250-6		1	1 unit	1AB		5SL4250-7		1	1 unit	1AC
	63			5SL4263-6		1	1 unit	1AB		5SL4263-7		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

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10000 / 3	I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 10000 A														
	**3P, 400 V AC**													
	0.3	3		--						5SL4314-7		1	1 unit	1AC
	0.5			--						5SL4305-7		1	1 unit	1AC
	1			5SL4301-6		1	1 unit	1AB		5SL4301-7		1	1 unit	1AC
	1.6			--						5SL4315-7		1	1 unit	1AC
	2			5SL4302-6		1	1 unit	1AB		5SL4302-7		1	1 unit	1AC
	3			5SL4303-6		1	1 unit	1AB		5SL4303-7		1	1 unit	1AC
	4			5SL4304-6		1	1 unit	1AB		5SL4304-7		1	1 unit	1AC
	6			5SL4306-6		1	1 unit	1AB		5SL4306-7		1	1 unit	1AC
	8			5SL4308-6		1	1 unit	1AB		5SL4308-7		1	1 unit	1AC
	10			5SL4310-6		1	1 unit	1AB		5SL4310-7		1	1 unit	1AC
	13			5SL4313-6		1	1 unit	1AB		5SL4313-7		1	1 unit	1AC
	16			5SL4316-6		1	1 unit	1AB	▶	5SL4316-7		1	1 unit	1AC
	20			5SL4320-6		1	1 unit	1AB		5SL4320-7		1	1 unit	1AC
	25			5SL4325-6		1	1 unit	1AB		5SL4325-7		1	1 unit	1AC
	32			5SL4332-6		1	1 unit	1AB		5SL4332-7		1	1 unit	1AC
	40			5SL4340-6		1	1 unit	1AB		5SL4340-7		1	1 unit	1AC
	50			5SL4350-6		1	1 unit	1AB		5SL4350-7		1	1 unit	1AC
	63			5SL4363-6		1	1 unit	1AB		5SL4363-7		1	1 unit	1AC
	**3P+N, 400 V AC**													
	0.3	4		--						5SL4614-7		1	1 unit	1AC
	0.5			--						5SL4605-7		1	1 unit	1AC
	1			5SL4601-6		1	1 unit	1AB		5SL4601-7		1	1 unit	1AC
	1.6			--						5SL4615-7		1	1 unit	1AC
	2			5SL4602-6		1	1 unit	1AB		5SL4602-7		1	1 unit	1AC
	3			5SL4603-6		1	1 unit	1AB		5SL4603-7		1	1 unit	1AC
	4			5SL4604-6		1	1 unit	1AB		5SL4604-7		1	1 unit	1AC
	6			5SL4606-6		1	1 unit	1AB		5SL4606-7		1	1 unit	1AC
	8			5SL4608-6		1	1 unit	1AB		5SL4608-7		1	1 unit	1AC
	10			5SL4610-6		1	1 unit	1AB		5SL4610-7		1	1 unit	1AC
	13			5SL4613-6		1	1 unit	1AB		5SL4613-7		1	1 unit	1AC
	16			5SL4616-6		1	1 unit	1AB		5SL4616-7		1	1 unit	1AC
	20			5SL4620-6		1	1 unit	1AB		5SL4620-7		1	1 unit	1AC
	25			5SL4625-6		1	1 unit	1AB		5SL4625-7		1	1 unit	1AC
	32			5SL4632-6		1	1 unit	1AB		5SL4632-7		1	1 unit	1AC
	40			5SL4640-6		1	1 unit	1AB		5SL4640-7		1	1 unit	1AC
	50			5SL4650-6		1	1 unit	1AB		5SL4650-7		1	1 unit	1AC
	63			5SL4663-6		1	1 unit	1AB		5SL4663-7		1	1 unit	1AC
	**4P, 400 V AC**													
	0.3	4		--						5SL4414-7		1	1 unit	1AC
	0.5			--						5SL4405-7		1	1 unit	1AC
	1			5SL4401-6		1	1 unit	1AB		5SL4401-7		1	1 unit	1AC
	1.6			--						5SL4415-7		1	1 unit	1AC
	2			5SL4402-6		1	1 unit	1AB		5SL4402-7		1	1 unit	1AC
	3			5SL4403-6		1	1 unit	1AB		5SL4403-7		1	1 unit	1AC
	4			5SL4404-6		1	1 unit	1AB		5SL4404-7		1	1 unit	1AC
	6			5SL4406-6		1	1 unit	1AB		5SL4406-7		1	1 unit	1AC
	8			5SL4408-6		1	1 unit	1AB		5SL4408-7		1	1 unit	1AC
	10			5SL4410-6		1	1 unit	1AB		5SL4410-7		1	1 unit	1AC
	13			5SL4413-6		1	1 unit	1AB		5SL4413-7		1	1 unit	1AC
	16			5SL4416-6		1	1 unit	1AB		5SL4416-7		1	1 unit	1AC
	20			5SL4420-6		1	1 unit	1AB		5SL4420-7		1	1 unit	1AC
	25			5SL4425-6		1	1 unit	1AB		5SL4425-7		1	1 unit	1AC
	32			5SL4432-6		1	1 unit	1AB		5SL4432-7		1	1 unit	1AC
	40			5SL4440-6		1	1 unit	1AB		5SL4440-7		1	1 unit	1AC
	50			5SL4450-6		1	1 unit	1AB		5SL4450-7		1	1 unit	1AC
	63			5SL4463-6		1	1 unit	1AB		5SL4463-7		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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10000 / 3	I_n	Mounting width	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d					
Miniature circuit breakers 10000 A								
	**1P, 230/400 V AC**							
	0.3	1		**5SL4114-8**		1	1 unit	1AA
	0.5			**5SL4105-8**		1	1 unit	1AA
	1			**5SL4101-8**		1	1 unit	1AA
	1.6			**5SL4115-8**		1	1 unit	1AA
	2			**5SL4102-8**		1	1 unit	1AA
	3			**5SL4103-8**		1	1 unit	1AA
	4			**5SL4104-8**		1	1 unit	1AA
	6			**5SL4106-8**		1	1 unit	1AA
	8			**5SL4108-8**		1	1 unit	1AA
	10			**5SL4110-8**		1	1 unit	1AA
	13			**5SL4113-8**		1	1 unit	1AA
	16			**5SL4116-8**		1	1 unit	1AA
	20			**5SL4120-8**		1	1 unit	1AA
	25			**5SL4125-8**		1	1 unit	1AA
	32			**5SL4132-8**		1	1 unit	1AA
	40			**5SL4140-8**		1	1 unit	1AA
	50			**5SL4150-8**		1	1 unit	1AA
	63			**5SL4163-8**		1	1 unit	1AA
	**1P+N, 230 V AC**							
	0.3	2		**5SL4514-8**		1	1 unit	1AA
	0.5			**5SL4505-8**		1	1 unit	1AA
	1			**5SL4501-8**		1	1 unit	1AA
	1.6			**5SL4515-8**		1	1 unit	1AA
	2			**5SL4502-8**		1	1 unit	1AA
	3			**5SL4503-8**		1	1 unit	1AA
	4			**5SL4504-8**		1	1 unit	1AA
	6			**5SL4506-8**		1	1 unit	1AA
	8			**5SL4508-8**		1	1 unit	1AA
	10			**5SL4510-8**		1	1 unit	1AA
	13			**5SL4513-8**		1	1 unit	1AA
	16			**5SL4516-8**		1	1 unit	1AA
	20			**5SL4520-8**		1	1 unit	1AA
	25			**5SL4525-8**		1	1 unit	1AA
	32			**5SL4532-8**		1	1 unit	1AA
	40			**5SL4540-8**		1	1 unit	1AA
	50			**5SL4550-8**		1	1 unit	1AA
	63			**5SL4563-8**		1	1 unit	1AA
	**2P, 400 V AC**							
	0.3	2		**5SL4214-8**		1	1 unit	1AA
	0.5			**5SL4205-8**		1	1 unit	1AA
	1			**5SL4201-8**		1	1 unit	1AA
	1.6			**5SL4215-8**		1	1 unit	1AA
	2			**5SL4202-8**		1	1 unit	1AA
	3			**5SL4203-8**		1	1 unit	1AA
	4			**5SL4204-8**		1	1 unit	1AA
	6			**5SL4206-8**		1	1 unit	1AA
	8			**5SL4208-8**		1	1 unit	1AA
	10			**5SL4210-8**		1	1 unit	1AA
	13			**5SL4213-8**		1	1 unit	1AA
	16			**5SL4216-8**		1	1 unit	1AA
	20			**5SL4220-8**		1	1 unit	1AA
	25			**5SL4225-8**		1	1 unit	1AA
	32			**5SL4232-8**		1	1 unit	1AA
	40			**5SL4240-8**		1	1 unit	1AA
	50			**5SL4250-8**		1	1 unit	1AA
	63			**5SL4263-8**		1	1 unit	1AA

[1] 1 MW (modular width) = 18 mm.

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5SL4, 10000 A

10000 / 3	I_n	Mounting width	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d					
Miniature circuit breakers 10000 A								
	**3P, 400 V AC**							
	0.3	3		**5SL4314-8**		1	1 unit	1AA
	0.5			**5SL4305-8**		1	1 unit	1AA
	1			**5SL4301-8**		1	1 unit	1AA
	1.6			**5SL4315-8**		1	1 unit	1AA
	2			**5SL4302-8**		1	1 unit	1AA
	3			**5SL4303-8**		1	1 unit	1AA
	4			**5SL4304-8**		1	1 unit	1AA
	6			**5SL4306-8**		1	1 unit	1AA
	8			**5SL4308-8**		1	1 unit	1AA
	10			**5SL4310-8**		1	1 unit	1AA
	13			**5SL4313-8**		1	1 unit	1AA
	16			**5SL4316-8**		1	1 unit	1AA
	20			**5SL4320-8**		1	1 unit	1AA
	25			**5SL4325-8**		1	1 unit	1AA
	32			**5SL4332-8**		1	1 unit	1AA
	40			**5SL4340-8**		1	1 unit	1AA
	50			**5SL4350-8**		1	1 unit	1AA
	63			**5SL4363-8**		1	1 unit	1AA
	**3P+N, 400 V AC**							
	0.3	4		**5SL4614-8**		1	1 unit	1AA
	0.5			**5SL4605-8**		1	1 unit	1AA
	1			**5SL4601-8**		1	1 unit	1AA
	1.6			**5SL4615-8**		1	1 unit	1AA
	2			**5SL4602-8**		1	1 unit	1AA
	3			**5SL4603-8**		1	1 unit	1AA
	4			**5SL4604-8**		1	1 unit	1AA
	6			**5SL4606-8**		1	1 unit	1AA
	8			**5SL4608-8**		1	1 unit	1AA
	10			**5SL4610-8**		1	1 unit	1AA
	13			**5SL4613-8**		1	1 unit	1AA
	16			**5SL4616-8**		1	1 unit	1AA
	20			**5SL4620-8**		1	1 unit	1AA
	25			**5SL4625-8**		1	1 unit	1AA
	32			**5SL4632-8**		1	1 unit	1AA
	40			**5SL4640-8**		1	1 unit	1AA
	50			**5SL4650-8**		1	1 unit	1AA
	63			**5SL4663-8**		1	1 unit	1AA
	**4P, 400 V AC**							
	0.3	4		**5SL4414-8**		1	1 unit	1AA
	0.5			**5SL4405-8**		1	1 unit	1AA
	1			**5SL4401-8**		1	1 unit	1AA
	1.6			**5SL4415-8**		1	1 unit	1AA
	2			**5SL4402-8**		1	1 unit	1AA
	3			**5SL4403-8**		1	1 unit	1AA
	4			**5SL4404-8**		1	1 unit	1AA
	6			**5SL4406-8**		1	1 unit	1AA
	8			**5SL4408-8**		1	1 unit	1AA
	10			**5SL4410-8**		1	1 unit	1AA
	13			**5SL4413-8**		1	1 unit	1AA
	16			**5SL4416-8**		1	1 unit	1AA
	20			**5SL4420-8**		1	1 unit	1AA
	25			**5SL4425-8**		1	1 unit	1AA
	32			**5SL4432-8**		1	1 unit	1AA
	40			**5SL4440-8**		1	1 unit	1AA
	50			**5SL4450-8**		1	1 unit	1AA
	63			**5SL4463-8**		1	1 unit	1AA

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Miniature circuit breakers are used to protect systems and installations in buildings and for industrial applications.

Used in industrial applications and plant engineering, miniature circuit breakers can be supplemented with additional components, such as auxiliary switches, fault signal contacts, shunt trips, undervoltage releases, remote controlled mechanisms, RC units, and arc fault detection devices.

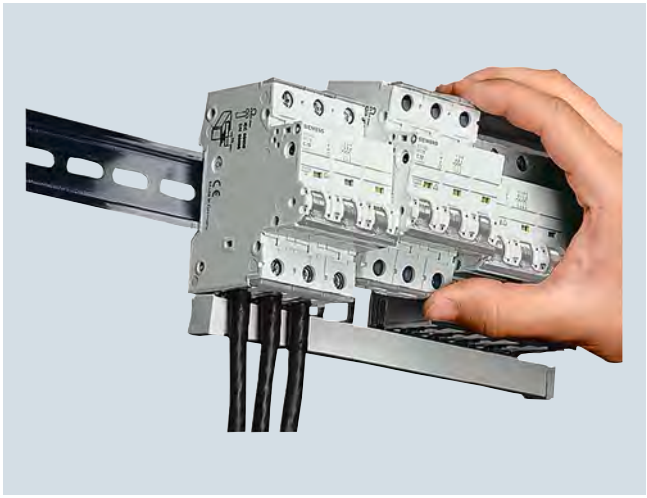
The devices are approved for worldwide use according to IEC standards for power supply systems up to 250/440 V AC. 72 V DC per pole is permitted in DC systems.

For North America, there is an additional approval according to UL 1077 for use as "supplementary protectors" in systems up to 480/277 V AC. For use in ship building, the devices also have numerous certifications according to shipping classifications BV, DNV, GL and LRS. For information on this, see chapter "Appendix" in "Standards and Approvals".

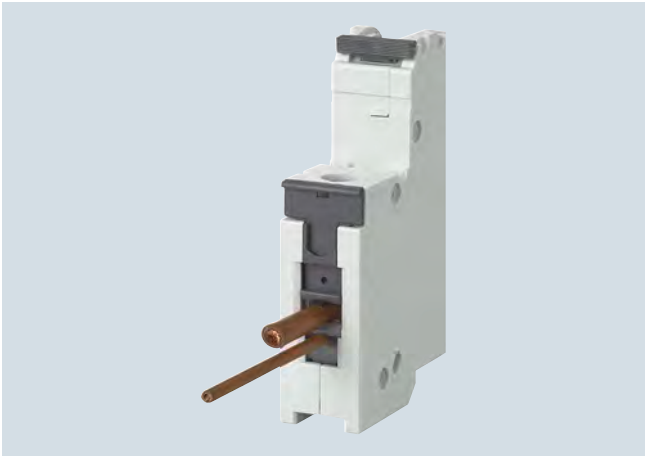
Benefits



- Optional top or bottom infeed as the terminals are identical
- Clear and visible conductor connection in front of the rear busbar facilitates controls
- The conductor is easily inserted into the terminal thanks to the large and easily accessible wiring space



- Quick and easy manual removal of miniature circuit breakers from the busbar assembly, for example if connections need to be changed
- Time-saving replacement of parts as busbars no longer need to be freed from adjacent devices



- Double terminal chambers permit accommodation of 2 wires of different cross-sections.



- The 5SY miniature circuit breakers are ideal for the quick and easy mounting of auxiliary switches and fault signal contacts. Captive metal brackets on the additional components ensure the quick and easy mounting of devices on the miniature circuit breakers without the need for tools.

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Technical specifications

			5SY6	5SY4	5SY5	5SY7	5SY8	5SP4
Standards			EN 60898-1	EN 60898-1	EN 60898-2	EN 60898-1	EN 60947-2	EN 60898-1
Approvals			see chapter "Appendix"					
Rated voltage U_n		V AC V DC	230/400 --	230/400 --	230/400 220/440/ 880[5]	230/400 --	230/400 --	230/400 --
Operational voltage								
	Min.	V AC/DC/pole	24	24	24	24	24	24
Acc. to EN 60898-1/-2 and EN 60947-2	Max. Max.	V DC/pole V AC	72[4] 250/440	72[4] 250/440	250 250/440	72[4] 250/440	72[4] 250/440	72 250/440
Acc. to UL 1077 and CSA C22.2 No.235	Max.	V AC	480/277	480/277	--	480/277	480/277	480/277
	Max.	V DC	60	60[6]	--	60[6]	60[6]	60
Breaking capacity[1]								
• I_{cn} acc. to IEC/EN 60898-1		kA AC	6	10	10	15	--	10
• I_{cn} acc. to IEC/EN 60898-2		kA DC	10	10	10	15	--	10
• I_{cu} acc. to IEC/EN 60947-2		kA AC kA DC	30 ... 10[1] 15	35 ... 10[1] 15	35 ... 10[1] 15	50 ... 15[1] 15	70 ... 20[1] 15	10 15
• Acc. to UL1077 and CSA C22.2 No.235		kA AC	5	5	--	5	5	5
Insulation coordination								
• Rated insulation voltage		V AC V DC/pole	250/440 --	--	250	--	--	--
• Rated impulse withstand voltage U_{imp}		kV AC	4					
Pollution degree for overvoltage category			3/III[3]					
Rated frequency		Hz	50/60					
Touch protection	Acc. to EN 50274		Yes					
Handle end position, sealable			Yes					
Degree of protection	Acc. to EN 60529		IP20 with connected conductors, IP40 in the area of the handle with distribution cover					
CFC and silicone-free			Yes					
Mounting								
• Snap-on fixing system			Yes					--
• Standard mounting rail and screw fixing			--					Yes
Terminals		± screw (Pozidriv)	2					
• Tunnel terminals at both ends			--					Yes
• Combined terminals at both ends			Yes					--
• Terminal tightening torque		Nm lbs/in.	2.5 ... 3 22 ... 26					2.5 ... 3.5 22 ... 31
Conductor cross-sections								
• Solid and stranded		mm^2	0.75 ... 35					4 ... 50
• Finely stranded, with end sleeve		mm^2	0.75 ... 25					1.5 ... 35
• AWG conductors (Cu 60/75 °C $I_n \leq 40$ A; 60 °C $I_n > 40$ A)		AWG	14 ... 4					14 ... 2
Mains connection								
• AC			Any					
• DC			Any		[2]	Any		
Mounting position			Any					
Service life On average, with rated load		Actuations Actuations	20000 10000, for 5SY5 at 40 A, 50 A and 63 A					
Ambient temperature		°C	-25 ... +55, max. 95% humidity					
Storage temperature		°C	-40 ... +75					
Resistance to climate	Acc. to IEC 60068-2-30		6 cycles					
Shock	Acc. to IEC 60068-2-27	m/s^2	150 at 11 ms half-sine					
Resistance to vibrations	Acc. to IEC 60068-2-6	m/s^2	50 at 25 ... 150 Hz and 60 at 35 Hz (4 s)					

1) For further information, see Configuration Manual "Miniature circuit breakers" at: www.siemens.com/lowvoltage/manuals.

2) Ensure compliance with the specified polarity when connecting DC.

3) 5SY54.. 4-pole, degree of pollution 2 for overvoltage category II.

4) Exempt: C/D 0.3 A ... 0.5 A

5) 5SY54.. 4-pole 880 V is not a standardized voltage acc. to EN 60898-1, suitable for max. 1000 V DC if the four poles are connected in series.

6) Valid for 1-pole switching devices only.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

6000 / 3	I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 6000 A														
	**1P, 230/400 V AC**													
	0.3	1		--						**5SY6114-7**		1	1 unit	1AC
	0.5			--						**5SY6105-7**		1	1 unit	1AC
	1			--						**5SY6101-7**		1	1 unit	1AC
	1.6			--						**5SY6115-7**		1	1 unit	1AC
	2			**5SY6102-6**		1	1 unit	1AB	▶	**5SY6102-7**		1	1 unit	1AC
	3			--						**5SY6103-7**		1	1 unit	1AC
	4			**5SY6104-6**		1	1 unit	1AB	▶	**5SY6104-7**		1	1 unit	1AC
	5			--						**5SY6111-7**		1	1 unit	1AC
	6		▶	**5SY6106-6**		1	1 unit	1AB	▶	**5SY6106-7**		1	1 unit	1AC
	8			--						**5SY6108-7**		1	1 unit	1AC
	10		▶	**5SY6110-6**		1	1 unit	1AB	▶	**5SY6110-7**		1	1 unit	1AC
	13			**5SY6113-6**		1	1 unit	1AB		**5SY6113-7**		1	1 unit	1AC
	15			--						**5SY6118-7**		1	1 unit	1AC
	16		▶	**5SY6116-6**		1	1 unit	1AB	▶	**5SY6116-7**		1	1 unit	1AC
	20			**5SY6120-6**		1	1 unit	1AB		**5SY6120-7**		1	1 unit	1AC
	25			**5SY6125-6**		1	1 unit	1AB		**5SY6125-7**		1	1 unit	1AC
	30			--						**5SY6130-7**		1	1 unit	1AC
	32			**5SY6132-6**		1	1 unit	1AB		**5SY6132-7**		1	1 unit	1AC
	40			**5SY6140-6**		1	1 unit	1AB		**5SY6140-7**		1	1 unit	1AC
	50			**5SY6150-6**		1	1 unit	1AB		**5SY6150-7**		1	1 unit	1AC
	63			**5SY6163-6**		1	1 unit	1AB		**5SY6163-7**		1	1 unit	1AC
	**1P+N, 230 V AC**													
	0.3	2		--						**5SY6514-7**		1	1 unit	1AC
	0.5			--						**5SY6505-7**		1	1 unit	1AC
	1			--						**5SY6501-7**		1	1 unit	1AC
	1.6			--						**5SY6515-7**		1	1 unit	1AC
	2			--						**5SY6502-7**		1	1 unit	1AC
	3			--						**5SY6503-7**		1	1 unit	1AC
	4			--						**5SY6504-7**		1	1 unit	1AC
	6			**5SY6506-6**		1	1 unit	1AB		**5SY6506-7**		1	1 unit	1AC
	8			--						**5SY6508-7**		1	1 unit	1AC
	10			**5SY6510-6**		1	1 unit	1AB		**5SY6510-7**		1	1 unit	1AC
	13			**5SY6513-6**		1	1 unit	1AB		**5SY6513-7**		1	1 unit	1AC
	16			**5SY6516-6**		1	1 unit	1AB		**5SY6516-7**		1	1 unit	1AC
	20			**5SY6520-6**		1	1 unit	1AB		**5SY6520-7**		1	1 unit	1AC
	25			**5SY6525-6**		1	1 unit	1AB		**5SY6525-7**		1	1 unit	1AC
	32			**5SY6532-6**		1	1 unit	1AB		**5SY6532-7**		1	1 unit	1AC
	40			**5SY6540-6**		1	1 unit	1AB		**5SY6540-7**		1	1 unit	1AC
	50			**5SY6550-6**		1	1 unit	1AB		**5SY6550-7**		1	1 unit	1AC
	63			**5SY6563-6**		1	1 unit	1AB		**5SY6563-7**		1	1 unit	1AC
	**2P, 400 V AC**													
	0.3	2		--						**5SY6214-7**		1	1 unit	1AC
	0.5			--						**5SY6205-7**		1	1 unit	1AC
	1			--						**5SY6201-7**		1	1 unit	1AC
	1.6			--						**5SY6215-7**		1	1 unit	1AC
	2			--					▶	**5SY6202-7**		1	1 unit	1AC
	3			--						**5SY6203-7**		1	1 unit	1AC
	4			--					▶	**5SY6204-7**		1	1 unit	1AC
	5			--						**5SY6211-7**		1	1 unit	1AC
	6			**5SY6206-6**		1	1 unit	1AB	▶	**5SY6206-7**		1	1 unit	1AC
	8			--						**5SY6208-7**		1	1 unit	1AC
	10			**5SY6210-6**		1	1 unit	1AB	▶	**5SY6210-7**		1	1 unit	1AC
	13			**5SY6213-6**		1	1 unit	1AB		**5SY6213-7**		1	1 unit	1AC
	15			--						**5SY6218-7**		1	1 unit	1AC
	16			**5SY6216-6**		1	1 unit	1AB	▶	**5SY6216-7**		1	1 unit	1AC
	20			**5SY6220-6**		1	1 unit	1AB		**5SY6220-7**		1	1 unit	1AC
	25			**5SY6225-6**		1	1 unit	1AB		**5SY6225-7**		1	1 unit	1AC
	30			--						**5SY6230-7**		1	1 unit	1AC
	32			**5SY6232-6**		1	1 unit	1AB		**5SY6232-7**		1	1 unit	1AC
	40			**5SY6240-6**		1	1 unit	1AB		**5SY6240-7**		1	1 unit	1AC
	50			**5SY6250-6**		1	1 unit	1AB		**5SY6250-7**		1	1 unit	1AC
	63			**5SY6263-6**		1	1 unit	1AB		**5SY6263-7**		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

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5SY6, 6000 A

6000 / 3	I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 6000 A														
	**3P, 400 V AC**													
	0.3	3		--						**5SY6314-7**		1	1 unit	1AC
	0.5			--						**5SY6305-7**		1	1 unit	1AC
	1			--						**5SY6301-7**		1	1 unit	1AC
	1.6			--						**5SY6315-7**		1	1 unit	1AC
	2			--						**5SY6302-7**		1	1 unit	1AC
	3			--						**5SY6303-7**		1	1 unit	1AC
	4			--						**5SY6304-7**		1	1 unit	1AC
	5			--						**5SY6311-7**		1	1 unit	1AC
	6			**5SY6306-6**		1	1 unit	1AB	▶	**5SY6306-7**		1	1 unit	1AC
	8			--						**5SY6308-7**		1	1 unit	1AC
	10			**5SY6310-6**		1	1 unit	1AB	▶	**5SY6310-7**		1	1 unit	1AC
	13			**5SY6313-6**		1	1 unit	1AB		**5SY6313-7**		1	1 unit	1AC
	15			--						**5SY6318-7**		1	1 unit	1AC
	16		▶	**5SY6316-6**		1	1 unit	1AB	▶	**5SY6316-7**		1	1 unit	1AC
	20			**5SY6320-6**		1	1 unit	1AB		**5SY6320-7**		1	1 unit	1AC
	25			**5SY6325-6**		1	1 unit	1AB		**5SY6325-7**		1	1 unit	1AC
	30			--						**5SY6330-7**		1	1 unit	1AC
	32			**5SY6332-6**		1	1 unit	1AB	▶	**5SY6332-7**		1	1 unit	1AC
	40			**5SY6340-6**		1	1 unit	1AB		**5SY6340-7**		1	1 unit	1AC
	50			**5SY6350-6**		1	1 unit	1AB		**5SY6350-7**		1	1 unit	1AC
	63			**5SY6363-6**		1	1 unit	1AB		**5SY6363-7**		1	1 unit	1AC
	**3P+N, 400 V AC**													
	0.3	4		--						**5SY6614-7**		1	1 unit	1AC
	0.5			--						**5SY6605-7**		1	1 unit	1AC
	1			--						**5SY6601-7**		1	1 unit	1AC
	1.6			--						**5SY6615-7**		1	1 unit	1AC
	2			--						**5SY6602-7**		1	1 unit	1AC
	3			--						**5SY6603-7**		1	1 unit	1AC
	4			--						**5SY6604-7**		1	1 unit	1AC
	6			**5SY6606-6**		1	1 unit	1AB		**5SY6606-7**		1	1 unit	1AC
	8			--						**5SY6608-7**		1	1 unit	1AC
	10			**5SY6610-6**		1	1 unit	1AB		**5SY6610-7**		1	1 unit	1AC
	13			**5SY6613-6**		1	1 unit	1AB		**5SY6613-7**		1	1 unit	1AC
	16			**5SY6616-6**		1	1 unit	1AB		**5SY6616-7**		1	1 unit	1AC
	20			**5SY6620-6**		1	1 unit	1AB		**5SY6620-7**		1	1 unit	1AC
	25			**5SY6625-6**		1	1 unit	1AB		**5SY6625-7**		1	1 unit	1AC
	32			**5SY6632-6**		1	1 unit	1AB		**5SY6632-7**		1	1 unit	1AC
	40			**5SY6640-6**		1	1 unit	1AB		**5SY6640-7**		1	1 unit	1AC
	50			**5SY6650-6**		1	1 unit	1AB		**5SY6650-7**		1	1 unit	1AC
	63			**5SY6663-6**		1	1 unit	1AB		**5SY6663-7**		1	1 unit	1AC
	**4P, 400 V AC**													
	0.3	4		--						**5SY6414-7**		1	1 unit	1AC
	0.5			--						**5SY6405-7**		1	1 unit	1AC
	1			--						**5SY6401-7**		1	1 unit	1AC
	1.6			--						**5SY6415-7**		1	1 unit	1AC
	2			--						**5SY6402-7**		1	1 unit	1AC
	3			--						**5SY6403-7**		1	1 unit	1AC
	4			--						**5SY6404-7**		1	1 unit	1AC
	6			**5SY6406-6**		1	1 unit	1AB		**5SY6406-7**		1	1 unit	1AC
	8			--						**5SY6408-7**		1	1 unit	1AC
	10			**5SY6410-6**		1	1 unit	1AB		**5SY6410-7**		1	1 unit	1AC
	13			**5SY6413-6**		1	1 unit	1AB		**5SY6413-7**		1	1 unit	1AC
	16			**5SY6416-6**		1	1 unit	1AB		**5SY6416-7**		1	1 unit	1AC
	20			**5SY6420-6**		1	1 unit	1AB		**5SY6420-7**		1	1 unit	1AC
	25			**5SY6425-6**		1	1 unit	1AB		**5SY6425-7**		1	1 unit	1AC
	32			**5SY6432-6**		1	1 unit	1AB		**5SY6432-7**		1	1 unit	1AC
	40			**5SY6440-6**		1	1 unit	1AB		**5SY6440-7**		1	1 unit	1AC
	50			**5SY6450-6**		1	1 unit	1AB		**5SY6450-7**		1	1 unit	1AC
	63			**5SY6463-6**		1	1 unit	1AB		**5SY6463-7**		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

10000 / 3	I_n	Mounting width	SD	Characteristic A: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic B: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 10000 A														
	1P, 230/400 V AC													
	0.5	1		**5SY4105-5**		1	1 unit	1AA		**--**				
	1			**5SY4101-5**		1	1 unit	1AA		**--**				
	1.6			**5SY4115-5**		1	1 unit	1AA		**--**				
	2			**5SY4102-5**		1	1 unit	1AA		**5SY4102-6**		1	1 unit	1AB
	3			**5SY4103-5**		1	1 unit	1AA		**--**				
	4			**5SY4104-5**		1	1 unit	1AA		**5SY4104-6**		1	1 unit	1AB
	6			**5SY4106-5**		1	1 unit	1AA	►	**5SY4106-6**		1	1 unit	1AB
	8			**5SY4108-5**		1	1 unit	1AA		**--**				
	10			**5SY4110-5**		1	1 unit	1AA	►	**5SY4110-6**		1	1 unit	1AB
	13			**5SY4113-5**		1	1 unit	1AA		**5SY4113-6**		1	1 unit	1AB
	16			**5SY4116-5**		1	1 unit	1AA	►	**5SY4116-6**		1	1 unit	1AB
	20			**5SY4120-5**		1	1 unit	1AA		**5SY4120-6**		1	1 unit	1AB
	25			**5SY4125-5**		1	1 unit	1AA		**5SY4125-6**		1	1 unit	1AB
	32			**5SY4132-5**		1	1 unit	1AA		**5SY4132-6**		1	1 unit	1AB
	40			**5SY4140-5**		1	1 unit	1AA		**5SY4140-6**		1	1 unit	1AB
	50			**5SY4150-5**		1	1 unit	1AA		**5SY4150-6**		1	1 unit	1AB
	63			**5SY4163-5**		1	1 unit	1AA		**5SY4163-6**		1	1 unit	1AB
	80			**--**						**5SY4180-6**		1	1 unit	1AB
	1P+N, 230 V AC													
	1	2		**5SY4501-5**		1	1 unit	1AA		**--**				
	1.6			**5SY4515-5**		1	1 unit	1AA		**--**				
	2			**5SY4502-5**		1	1 unit	1AA		**--**				
	3			**5SY4503-5**		1	1 unit	1AA		**--**				
	4			**5SY4504-5**		1	1 unit	1AA		**--**				
	6			**5SY4506-5**		1	1 unit	1AA		**5SY4506-6**		1	1 unit	1AB
	8			**5SY4508-5**		1	1 unit	1AA		**--**				
	10			**5SY4510-5**		1	1 unit	1AA		**5SY4510-6**		1	1 unit	1AB
	13			**5SY4513-5**		1	1 unit	1AA		**5SY4513-6**		1	1 unit	1AB
	16			**5SY4516-5**		1	1 unit	1AA		**5SY4516-6**		1	1 unit	1AB
	20			**5SY4520-5**		1	1 unit	1AA		**5SY4520-6**		1	1 unit	1AB
	25			**5SY4525-5**		1	1 unit	1AA		**5SY4525-6**		1	1 unit	1AB
	32			**5SY4532-5**		1	1 unit	1AA		**5SY4532-6**		1	1 unit	1AB
	40			**5SY4540-5**		1	1 unit	1AA		**5SY4540-6**		1	1 unit	1AB
	50			**5SY4550-5**		1	1 unit	1AA		**5SY4550-6**		1	1 unit	1AB
	63			**5SY4563-5**		1	1 unit	1AA		**5SY4563-6**		1	1 unit	1AB
	2P, 400 V AC													
	0.5	2		**5SY4205-5**		1	1 unit	1AA		**--**				
	1			**5SY4201-5**		1	1 unit	1AA		**--**				
	1.6			**5SY4215-5**		1	1 unit	1AA		**--**				
	2			**5SY4202-5**		1	1 unit	1AA		**--**				
	3			**5SY4203-5**		1	1 unit	1AA		**--**				
	4			**5SY4204-5**		1	1 unit	1AA		**--**				
	6			**5SY4206-5**		1	1 unit	1AA		**5SY4206-6**		1	1 unit	1AB
	8			**5SY4208-5**		1	1 unit	1AA		**--**				
	10			**5SY4210-5**		1	1 unit	1AA		**5SY4210-6**		1	1 unit	1AB
	13			**5SY4213-5**		1	1 unit	1AA		**5SY4213-6**		1	1 unit	1AB
	16			**5SY4216-5**		1	1 unit	1AA		**5SY4216-6**		1	1 unit	1AB
	20			**5SY4220-5**		1	1 unit	1AA		**5SY4220-6**		1	1 unit	1AB
	25			**5SY4225-5**		1	1 unit	1AA		**5SY4225-6**		1	1 unit	1AB
	32			**5SY4232-5**		1	1 unit	1AA		**5SY4232-6**		1	1 unit	1AB
	40			**5SY4240-5**		1	1 unit	1AA		**5SY4240-6**		1	1 unit	1AB
	50			**5SY4250-5**		1	1 unit	1AA		**5SY4250-6**		1	1 unit	1AB
	63			**5SY4263-5**		1	1 unit	1AA		**5SY4263-6**		1	1 unit	1AB
	80			**--**						**5SY4280-6**		1	1 unit	1AB

[1] 1 MW (modular width) = 18 mm.

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5SY4, 10000 A

10000 / 3	I_n	Mounting width	SD	Characteristic A Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 10000 A														
	**3P, 400 V AC**													
	0.5	3		**5SY4305-5**		1	1 unit	1AA		**--**				
	1			**5SY4301-5**		1	1 unit	1AA		**--**				
	1.6			**5SY4315-5**		1	1 unit	1AA		**--**				
	2			**5SY4302-5**		1	1 unit	1AA		**--**				
	3			**5SY4303-5**		1	1 unit	1AA		**--**				
	4			**5SY4304-5**		1	1 unit	1AA		**--**				
	6			**5SY4306-5**		1	1 unit	1AA		**5SY4306-6**		1	1 unit	1AB
	8			**5SY4308-5**		1	1 unit	1AA		**--**				
	10			**5SY4310-5**		1	1 unit	1AA		**5SY4310-6**		1	1 unit	1AB
	13			**5SY4313-5**		1	1 unit	1AA		**5SY4313-6**		1	1 unit	1AB
	16			**5SY4316-5**		1	1 unit	1AA	▶	**5SY4316-6**		1	1 unit	1AB
	20			**5SY4320-5**		1	1 unit	1AA		**5SY4320-6**		1	1 unit	1AB
	25			**5SY4325-5**		1	1 unit	1AA		**5SY4325-6**		1	1 unit	1AB
	32			**5SY4332-5**		1	1 unit	1AA		**5SY4332-6**		1	1 unit	1AB
	40			**5SY4340-5**		1	1 unit	1AA		**5SY4340-6**		1	1 unit	1AB
	50			**5SY4350-5**		1	1 unit	1AA		**5SY4350-6**		1	1 unit	1AB
	63			**5SY4363-5**		1	1 unit	1AA		**5SY4363-6**		1	1 unit	1AB
	80			**--**						**5SY4380-6**		1	1 unit	1AB
	**3P+N, 400 V AC**													
	1	4		**5SY4601-5**		1	1 unit	1AA		**--**				
	1.6			**5SY4615-5**		1	1 unit	1AA		**--**				
	2			**5SY4602-5**		1	1 unit	1AA		**--**				
	3			**5SY4603-5**		1	1 unit	1AA		**--**				
	4			**5SY4604-5**		1	1 unit	1AA		**--**				
	6			**5SY4606-5**		1	1 unit	1AA		**5SY4606-6**		1	1 unit	1AB
	8			**5SY4608-5**		1	1 unit	1AA		**--**				
	10			**5SY4610-5**		1	1 unit	1AA		**5SY4610-6**		1	1 unit	1AB
	13			**5SY4613-5**		1	1 unit	1AA		**5SY4613-6**		1	1 unit	1AB
	16			**5SY4616-5**		1	1 unit	1AA		**5SY4616-6**		1	1 unit	1AB
	20			**5SY4620-5**		1	1 unit	1AA		**5SY4620-6**		1	1 unit	1AB
	25			**5SY4625-5**		1	1 unit	1AA		**5SY4625-6**		1	1 unit	1AB
	32			**5SY4632-5**		1	1 unit	1AA		**5SY4632-6**		1	1 unit	1AB
	40			**5SY4640-5**		1	1 unit	1AA		**5SY4640-6**		1	1 unit	1AB
	50			**5SY4650-5**		1	1 unit	1AA		**5SY4650-6**		1	1 unit	1AB
	63			**5SY4663-5**		1	1 unit	1AA		**5SY4663-6**		1	1 unit	1AB
	**4P, 400 V AC**													
	1	4		**5SY4401-5**		1	1 unit	1AA		**--**				
	1.6			**5SY4415-5**		1	1 unit	1AA		**--**				
	2			**5SY4402-5**		1	1 unit	1AA		**--**				
	3			**5SY4403-5**		1	1 unit	1AA		**--**				
	4			**5SY4404-5**		1	1 unit	1AA		**--**				
	6			**5SY4406-5**		1	1 unit	1AA		**5SY4406-6**		1	1 unit	1AB
	8			**5SY4408-5**		1	1 unit	1AA		**--**				
	10			**5SY4410-5**		1	1 unit	1AA		**5SY4410-6**		1	1 unit	1AB
	13			**5SY4413-5**		1	1 unit	1AA		**5SY4413-6**		1	1 unit	1AB
	16			**5SY4416-5**		1	1 unit	1AA		**5SY4416-6**		1	1 unit	1AB
	20			**5SY4420-5**		1	1 unit	1AA		**5SY4420-6**		1	1 unit	1AB
	25			**5SY4425-5**		1	1 unit	1AA		**5SY4425-6**		1	1 unit	1AB
	32			**5SY4432-5**		1	1 unit	1AA		**5SY4432-6**		1	1 unit	1AB
	40			**5SY4440-5**		1	1 unit	1AA		**5SY4440-6**		1	1 unit	1AB
	50			**5SY4450-5**		1	1 unit	1AA		**5SY4450-6**		1	1 unit	1AB
	63			**5SY4463-5**		1	1 unit	1AA		**5SY4463-6**		1	1 unit	1AB
	80			**--**						**5SY4480-6**		1	1 unit	1AB

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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10000 / 3	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 10000 A														
	**1P, 230/400 V AC**													
	0.3	1		**5SY4114-7**		1	1 unit	1AC		**5SY4114-8**		1	1 unit	1AA
	0.5			**5SY4105-7**		1	1 unit	1AC		**5SY4105-8**		1	1 unit	1AA
	1			**5SY4101-7**		1	1 unit	1AC		**5SY4101-8**		1	1 unit	1AA
	1.6			**5SY4115-7**		1	1 unit	1AC		**5SY4115-8**		1	1 unit	1AA
	2		▶	**5SY4102-7**		1	1 unit	1AC		**5SY4102-8**		1	1 unit	1AA
	3			**5SY4103-7**		1	1 unit	1AC		**5SY4103-8**		1	1 unit	1AA
	4		▶	**5SY4104-7**		1	1 unit	1AC		**5SY4104-8**		1	1 unit	1AA
	5			**5SY4111-7**		1	1 unit	1AC		--				
	6		▶	**5SY4106-7**		1	1 unit	1AC		**5SY4106-8**		1	1 unit	1AA
	8			**5SY4108-7**		1	1 unit	1AC		**5SY4108-8**		1	1 unit	1AA
	10		▶	**5SY4110-7**		1	1 unit	1AC		**5SY4110-8**		1	1 unit	1AA
	13			**5SY4113-7**		1	1 unit	1AC		**5SY4113-8**		1	1 unit	1AA
	15			**5SY4118-7**		1	1 unit	1AC		--				
	16		▶	**5SY4116-7**		1	1 unit	1AC		**5SY4116-8**		1	1 unit	1AA
	20			**5SY4120-7**		1	1 unit	1AC		**5SY4120-8**		1	1 unit	1AA
	25			**5SY4125-7**		1	1 unit	1AC		**5SY4125-8**		1	1 unit	1AA
	30			**5SY4130-7**		1	1 unit	1AC		--				
	32			**5SY4132-7**		1	1 unit	1AC		**5SY4132-8**		1	1 unit	1AA
	35			**5SY4135-7**		1	1 unit	1AC		--				
	40			**5SY4140-7**		1	1 unit	1AC		**5SY4140-8**		1	1 unit	1AA
	45			**5SY4145-7**		1	1 unit	1AC		--				
	50			**5SY4150-7**		1	1 unit	1AC		**5SY4150-8**		1	1 unit	1AA
	60			**5SY4160-7**		1	1 unit	1AC		--				
	63			**5SY4163-7**		1	1 unit	1AC		**5SY4163-8**		1	1 unit	1AA
	80			**5SY4180-7**		1	1 unit	1AC		--				
	**1P+N, 230 V AC**													
	0.3	2		**5SY4514-7**		1	1 unit	1AC		**5SY4514-8**		1	1 unit	1AA
	0.5			**5SY4505-7**		1	1 unit	1AC		**5SY4505-8**		1	1 unit	1AA
	1			**5SY4501-7**		1	1 unit	1AC		**5SY4501-8**		1	1 unit	1AA
	1.6			**5SY4515-7**		1	1 unit	1AC		**5SY4515-8**		1	1 unit	1AA
	2			**5SY4502-7**		1	1 unit	1AC		**5SY4502-8**		1	1 unit	1AA
	3			**5SY4503-7**		1	1 unit	1AC		**5SY4503-8**		1	1 unit	1AA
	4			**5SY4504-7**		1	1 unit	1AC		**5SY4504-8**		1	1 unit	1AA
	6			**5SY4506-7**		1	1 unit	1AC		**5SY4506-8**		1	1 unit	1AA
	8			**5SY4508-7**		1	1 unit	1AC		**5SY4508-8**		1	1 unit	1AA
	10			**5SY4510-7**		1	1 unit	1AC		**5SY4510-8**		1	1 unit	1AA
	13			**5SY4513-7**		1	1 unit	1AC		**5SY4513-8**		1	1 unit	1AA
	16			**5SY4516-7**		1	1 unit	1AC		**5SY4516-8**		1	1 unit	1AA
	20			**5SY4520-7**		1	1 unit	1AC		**5SY4520-8**		1	1 unit	1AA
	25			**5SY4525-7**		1	1 unit	1AC		**5SY4525-8**		1	1 unit	1AA
	32			**5SY4532-7**		1	1 unit	1AC		**5SY4532-8**		1	1 unit	1AA
	40			**5SY4540-7**		1	1 unit	1AC		**5SY4540-8**		1	1 unit	1AA
	50			**5SY4550-7**		1	1 unit	1AC		**5SY4550-8**		1	1 unit	1AA
	63			**5SY4563-7**		1	1 unit	1AC		**5SY4563-8**		1	1 unit	1AA
	80			**5SY4580-7**		1	1 unit	1AC		--				
	**2P, 400 V AC**													
	0.3	2		**5SY4214-7**		1	1 unit	1AC		**5SY4214-8**		1	1 unit	1AA
	0.5			**5SY4205-7**		1	1 unit	1AC		**5SY4205-8**		1	1 unit	1AA
	1			**5SY4201-7**		1	1 unit	1AC		**5SY4201-8**		1	1 unit	1AA
	1.6			**5SY4215-7**		1	1 unit	1AC		**5SY4215-8**		1	1 unit	1AA
	2		▶	**5SY4202-7**		1	1 unit	1AC		**5SY4202-8**		1	1 unit	1AA
	3			**5SY4203-7**		1	1 unit	1AC		**5SY4203-8**		1	1 unit	1AA
	4			**5SY4204-7**		1	1 unit	1AC		**5SY4204-8**		1	1 unit	1AA
	5			**5SY4211-7**		1	1 unit	1AC		--				
	6		▶	**5SY4206-7**		1	1 unit	1AC		**5SY4206-8**		1	1 unit	1AA
	8			**5SY4208-7**		1	1 unit	1AC		**5SY4208-8**		1	1 unit	1AA
	10		▶	**5SY4210-7**		1	1 unit	1AC		**5SY4210-8**		1	1 unit	1AA
	13			**5SY4213-7**		1	1 unit	1AC		**5SY4213-8**		1	1 unit	1AA
	15			**5SY4218-7**		1	1 unit	1AC		--				
	16		▶	**5SY4216-7**		1	1 unit	1AC		**5SY4216-8**		1	1 unit	1AA
	20			**5SY4220-7**		1	1 unit	1AC		**5SY4220-8**		1	1 unit	1AA
	25			**5SY4225-7**		1	1 unit	1AC		**5SY4225-8**		1	1 unit	1AA
	30			**5SY4230-7**		1	1 unit	1AC		--				
	32			**5SY4232-7**		1	1 unit	1AC		**5SY4232-8**		1	1 unit	1AA
	35			**5SY4235-7**		1	1 unit	1AC		--				
	40			**5SY4240-7**		1	1 unit	1AC		**5SY4240-8**		1	1 unit	1AA
	45			**5SY4245-7**		1	1 unit	1AC		--				
	50			**5SY4250-7**		1	1 unit	1AC		**5SY4250-8**		1	1 unit	1AA
	60			**5SY4260-7**		1	1 unit	1AC		--				
	63			**5SY4263-7**		1	1 unit	1AC		**5SY4263-8**		1	1 unit	1AA
	80			**5SY4280-7**		1	1 unit	1AC		--				

Minimum order quantity (PS) or a multiple thereof can be ordered.

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10000 / 3	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 10000 A														
	**3P, 400 V AC**													
	0.3	3		**5SY4314-7**		1	1 unit	1AC		**5SY4314-8**		1	1 unit	1AA
	0.5			**5SY4305-7**		1	1 unit	1AC		**5SY4305-8**		1	1 unit	1AA
	1			**5SY4301-7**		1	1 unit	1AC		**5SY4301-8**		1	1 unit	1AA
	1.6			**5SY4315-7**		1	1 unit	1AC		**5SY4315-8**		1	1 unit	1AA
	2			**5SY4302-7**		1	1 unit	1AC		**5SY4302-8**		1	1 unit	1AA
	3			**5SY4303-7**		1	1 unit	1AC		**5SY4303-8**		1	1 unit	1AA
	4			**5SY4304-7**		1	1 unit	1AC		**5SY4304-8**		1	1 unit	1AA
	5			**5SY4311-7**		1	1 unit	1AC		--				
	6			**5SY4306-7**		1	1 unit	1AC		**5SY4306-8**		1	1 unit	1AA
	8			**5SY4308-7**		1	1 unit	1AC		**5SY4308-8**		1	1 unit	1AA
	10		▶	**5SY4310-7**		1	1 unit	1AC		**5SY4310-8**		1	1 unit	1AA
	13			**5SY4313-7**		1	1 unit	1AC		**5SY4313-8**		1	1 unit	1AA
	15			**5SY4318-7**		1	1 unit	1AC		--				
	16		▶	**5SY4316-7**		1	1 unit	1AC		**5SY4316-8**		1	1 unit	1AA
	20			**5SY4320-7**		1	1 unit	1AC		**5SY4320-8**		1	1 unit	1AA
	25			**5SY4325-7**		1	1 unit	1AC		**5SY4325-8**		1	1 unit	1AA
	30			**5SY4330-7**		1	1 unit	1AC		--				
	32		▶	**5SY4332-7**		1	1 unit	1AC		**5SY4332-8**		1	1 unit	1AA
	35			**5SY4335-7**		1	1 unit	1AC		--				
	40			**5SY4340-7**		1	1 unit	1AC		**5SY4340-8**		1	1 unit	1AA
	45			**5SY4345-7**		1	1 unit	1AC		--				
	50			**5SY4350-7**		1	1 unit	1AC		**5SY4350-8**		1	1 unit	1AA
	60			**5SY4360-7**		1	1 unit	1AC		--				
	63			**5SY4363-7**		1	1 unit	1AC		**5SY4363-8**		1	1 unit	1AA
	80			**5SY4380-7**		1	1 unit	1AC		--				
	**3P+N, 400 V AC**													
	0.3	4		**5SY4614-7**		1	1 unit	1AC		**5SY4614-8**		1	1 unit	1AA
	0.5			**5SY4605-7**		1	1 unit	1AC		**5SY4605-8**		1	1 unit	1AA
	1			**5SY4601-7**		1	1 unit	1AC		**5SY4601-8**		1	1 unit	1AA
	1.6			**5SY4615-7**		1	1 unit	1AC		**5SY4615-8**		1	1 unit	1AA
	2			**5SY4602-7**		1	1 unit	1AC		**5SY4602-8**		1	1 unit	1AA
	3			**5SY4603-7**		1	1 unit	1AC		**5SY4603-8**		1	1 unit	1AA
	4			**5SY4604-7**		1	1 unit	1AC		**5SY4604-8**		1	1 unit	1AA
	6			**5SY4606-7**		1	1 unit	1AC		**5SY4606-8**		1	1 unit	1AA
	8			**5SY4608-7**		1	1 unit	1AC		**5SY4608-8**		1	1 unit	1AA
	10			**5SY4610-7**		1	1 unit	1AC		**5SY4610-8**		1	1 unit	1AA
	13			**5SY4613-7**		1	1 unit	1AC		**5SY4613-8**		1	1 unit	1AA
	16			**5SY4616-7**		1	1 unit	1AC		**5SY4616-8**		1	1 unit	1AA
	20			**5SY4620-7**		1	1 unit	1AC		**5SY4620-8**		1	1 unit	1AA
	25			**5SY4625-7**		1	1 unit	1AC		**5SY4625-8**		1	1 unit	1AA
	32			**5SY4632-7**		1	1 unit	1AC		**5SY4632-8**		1	1 unit	1AA
	40			**5SY4640-7**		1	1 unit	1AC		**5SY4640-8**		1	1 unit	1AA
	50			**5SY4650-7**		1	1 unit	1AC		**5SY4650-8**		1	1 unit	1AA
	63			**5SY4663-7**		1	1 unit	1AC		**5SY4663-8**		1	1 unit	1AA
	80			**5SY4680-7**		1	1 unit	1AC		--				
	**4P, 400 V AC**													
	0.3	4		**5SY4414-7**		1	1 unit	1AC		**5SY4414-8**		1	1 unit	1AA
	0.5			**5SY4405-7**		1	1 unit	1AC		**5SY4405-8**		1	1 unit	1AA
	1			**5SY4401-7**		1	1 unit	1AC		**5SY4401-8**		1	1 unit	1AA
	1.6			**5SY4415-7**		1	1 unit	1AC		**5SY4415-8**		1	1 unit	1AA
	2			**5SY4402-7**		1	1 unit	1AC		**5SY4402-8**		1	1 unit	1AA
	3			**5SY4403-7**		1	1 unit	1AC		**5SY4403-8**		1	1 unit	1AA
	4			**5SY4404-7**		1	1 unit	1AC		**5SY4404-8**		1	1 unit	1AA
	6			**5SY4406-7**		1	1 unit	1AC		**5SY4406-8**		1	1 unit	1AA
	8			**5SY4408-7**		1	1 unit	1AC		**5SY4408-8**		1	1 unit	1AA
	10			**5SY4410-7**		1	1 unit	1AC		**5SY4410-8**		1	1 unit	1AA
	13			**5SY4413-7**		1	1 unit	1AC		**5SY4413-8**		1	1 unit	1AA
	16			**5SY4416-7**		1	1 unit	1AC		**5SY4416-8**		1	1 unit	1AA
	20			**5SY4420-7**		1	1 unit	1AC		**5SY4420-8**		1	1 unit	1AA
	25			**5SY4425-7**		1	1 unit	1AC		**5SY4425-8**		1	1 unit	1AA
	32			**5SY4432-7**		1	1 unit	1AC		**5SY4432-8**		1	1 unit	1AA
	40			**5SY4440-7**		1	1 unit	1AC		**5SY4440-8**		1	1 unit	1AA
	50			**5SY4450-7**		1	1 unit	1AC		**5SY4450-8**		1	1 unit	1AA
	63			**5SY4463-7**		1	1 unit	1AC		**5SY4463-8**		1	1 unit	1AA
	80			**5SY4480-7**		1	1 unit	1AC		--				

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

10000

I_n A	Mounting width MW[1]	SD d	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Miniature circuit breakers 10000 A, high-current							
 **1P, 230/400 V AC**							
80	1.5		**5SP4180-6**		1	1 unit	1AB
100			**5SP4191-6**		1	1 unit	1AB
125			**5SP4192-6**		1	1 unit	1AB
 **2P, 400 V AC**							
80	3		**5SP4280-6**		1	1 unit	1AB
100			**5SP4291-6**		1	1 unit	1AB
125			**5SP4292-6**		1	1 unit	1AB
 **3P, 400 V AC**							
80	4.5		**5SP4380-6**		1	1 unit	1AB
100			**5SP4391-6**		1	1 unit	1AB
125			**5SP4392-6**		1	1 unit	1AB
 **4P, 400 V AC**							
80	6		**5SP4480-6**		1	1 unit	1AB
100			**5SP4491-6**		1	1 unit	1AB
125			**5SP4492-6**		1	1 unit	1AB

10000

I_n A	Mounting width MW[1]	SD d	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Miniature circuit breakers 10000 A, high-current													
 **1P, 230/400 V AC**													
80	1.5		**5SP4180-7**		1	1 unit	1AC		**5SP4180-8**		1	1 unit	1AA
100			**5SP4191-7**		1	1 unit	1AC		**5SP4191-8**		1	1 unit	1AA
125			**5SP4192-7**		1	1 unit	1AC		--				
 **2P, 400 V AC**													
80	3		**5SP4280-7**		1	1 unit	1AC		**5SP4280-8**		1	1 unit	1AA
100			**5SP4291-7**		1	1 unit	1AC		**5SP4291-8**		1	1 unit	1AA
125			**5SP4292-7**		1	1 unit	1AC		--				
 **3P, 400 V AC**													
80	4.5	▶	**5SP4380-7**		1	1 unit	1AC		**5SP4380-8**		1	1 unit	1AA
100		▶	**5SP4391-7**		1	1 unit	1AC		**5SP4391-8**		1	1 unit	1AA
125			**5SP4392-7**		1	1 unit	1AC		--				
 **4P, 400 V AC**													
80	6		**5SP4480-7**		1	1 unit	1AC		**5SP4480-8**		1	1 unit	1AA
100			**5SP4491-7**		1	1 unit	1AC		**5SP4491-8**		1	1 unit	1AA
125			**5SP4492-7**		1	1 unit	1AC		--				

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

10000 / 3	I_n	Mounting width	SD	Characteristic B: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 10000 A, universal current														
	**1P, 230/400 V AC, 220 V DC**													
	0.3	1		--						**5SY5114-7**		1	1 unit	1AC
	0.5			--						**5SY5105-7**		1	1 unit	1AC
	1			--						**5SY5101-7**		1	1 unit	1AC
	1.6			--						**5SY5115-7**		1	1 unit	1AC
	2			**5SY5102-6**		1	1 unit	1AB		**5SY5102-7**		1	1 unit	1AC
	3			--						**5SY5103-7**		1	1 unit	1AC
	4			**5SY5104-6**		1	1 unit	1AB		**5SY5104-7**		1	1 unit	1AC
	6			**5SY5106-6**		1	1 unit	1AB		**5SY5106-7**		1	1 unit	1AC
	8			--						**5SY5108-7**		1	1 unit	1AC
	10			**5SY5110-6**		1	1 unit	1AB		**5SY5110-7**		1	1 unit	1AC
	13			**5SY5113-6**		1	1 unit	1AB		**5SY5113-7**		1	1 unit	1AC
	16			**5SY5116-6**		1	1 unit	1AB		**5SY5116-7**		1	1 unit	1AC
	20			**5SY5120-6**		1	1 unit	1AB		**5SY5120-7**		1	1 unit	1AC
	25			**5SY5125-6**		1	1 unit	1AB		**5SY5125-7**		1	1 unit	1AC
	32			**5SY5132-6**		1	1 unit	1AB		**5SY5132-7**		1	1 unit	1AC
	40			**5SY5140-6**		1	1 unit	1AB		**5SY5140-7**		1	1 unit	1AC
	50			**5SY5150-6**		1	1 unit	1AB		**5SY5150-7**		1	1 unit	1AC
	63			**5SY5163-6**		1	1 unit	1AB		**5SY5163-7**		1	1 unit	1AC
	**2P, 400 V AC, 440 V DC**													
	0.3	2		--						**5SY5214-7**		1	1 unit	1AC
	0.5			--						**5SY5205-7**		1	1 unit	1AC
	1			--						**5SY5201-7**		1	1 unit	1AC
	1.6			--						**5SY5215-7**		1	1 unit	1AC
	2			--						**5SY5202-7**		1	1 unit	1AC
	3			--						**5SY5203-7**		1	1 unit	1AC
	4			--						**5SY5204-7**		1	1 unit	1AC
	6			**5SY5206-6**		1	1 unit	1AB	▶	**5SY5206-7**		1	1 unit	1AC
	8			--						**5SY5208-7**		1	1 unit	1AC
	10			**5SY5210-6**		1	1 unit	1AB		**5SY5210-7**		1	1 unit	1AC
	13			**5SY5213-6**		1	1 unit	1AB		**5SY5213-7**		1	1 unit	1AC
	16			**5SY5216-6**		1	1 unit	1AB		**5SY5216-7**		1	1 unit	1AC
	20			**5SY5220-6**		1	1 unit	1AB		**5SY5220-7**		1	1 unit	1AC
	25			**5SY5225-6**		1	1 unit	1AB		**5SY5225-7**		1	1 unit	1AC
	32			**5SY5232-6**		1	1 unit	1AB		**5SY5232-7**		1	1 unit	1AC
	40			**5SY5240-6**		1	1 unit	1AB		**5SY5240-7**		1	1 unit	1AC
	50			**5SY5250-6**		1	1 unit	1AB		**5SY5250-7**		1	1 unit	1AC
	63			**5SY5263-6**		1	1 unit	1AB		**5SY5263-7**		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

For application examples, see Configuration Manual "Miniature Circuit Breakers" at: www.siemens.com/lowvoltage/manuals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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10000 / 3		I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	MW[1]	d						d					
Miniature circuit breakers 10000 A, universal current															
	**4P, 400 V AC, 880 V DC (max. 1000 V DC)**														
		0.3	1		--						**5SY5414-7**		1	1 unit	1AC
		0.5			--						**5SY5405-7**		1	1 unit	1AC
		1			--						**5SY5401-7**		1	1 unit	1AC
		1.6			--						**5SY5415-7**		1	1 unit	1AC
		2			--						**5SY5402-7**		1	1 unit	1AC
		3			--						**5SY5403-7**		1	1 unit	1AC
		4			--						**5SY5404-7**		1	1 unit	1AC
		6			**5SY5406-6**		1	1 unit	1AB		**5SY5406-7**		1	1 unit	1AC
		8			--						**5SY5408-7**		1	1 unit	1AC
		10			**5SY5410-6**		1	1 unit	1AB		**5SY5410-7**		1	1 unit	1AC
		13			**5SY5413-6**		1	1 unit	1AB		**5SY5413-7**		1	1 unit	1AC
		16			**5SY5416-6**		1	1 unit	1AB		**5SY5416-7**		1	1 unit	1AC
		20			**5SY5420-6**		1	1 unit	1AB		**5SY5420-7**		1	1 unit	1AC
		25			**5SY5425-6**		1	1 unit	1AB		**5SY5425-7**		1	1 unit	1AC
		32			**5SY5432-6**		1	1 unit	1AB		**5SY5432-7**		1	1 unit	1AC
		40			**5SY5440-6**		1	1 unit	1AB		**5SY5440-7**		1	1 unit	1AC
		50			**5SY5450-6**		1	1 unit	1AB		**5SY5450-7**		1	1 unit	1AC
		63			**5SY5463-6**		1	1 unit	1AB		**5SY5463-7**		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

Note:

The 5ST3600 or 5ST3630 busbars enable simple wiring of 4-pole miniature circuit breakers, see page 3/49.

For application examples, see Configuration Manual "Miniature Circuit Breakers" at: www.siemens.com/lowvoltage/manuals.

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Selection and ordering data

15000	I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d					
Miniature circuit breakers 15000 A								
	**1P, 230/400 V AC**							
	6	1		**5SY7106-6**		1	1 unit	1AB
	10			**5SY7110-6**		1	1 unit	1AB
	13			**5SY7113-6**		1	1 unit	1AB
	16			**5SY7116-6**		1	1 unit	1AB
	20			**5SY7120-6**		1	1 unit	1AB
	25			**5SY7125-6**		1	1 unit	1AB
	32			**5SY7132-6**		1	1 unit	1AB
	40			**5SY7140-6**		1	1 unit	1AB
	50			**5SY7150-6**		1	1 unit	1AB
	63			**5SY7163-6**		1	1 unit	1AB
	**1P+N, 230 V AC**							
	6	2		**5SY7506-6**		1	1 unit	1AB
	10			**5SY7510-6**		1	1 unit	1AB
	13			**5SY7513-6**		1	1 unit	1AB
	16			**5SY7516-6**		1	1 unit	1AB
	20			**5SY7520-6**		1	1 unit	1AB
	25			**5SY7525-6**		1	1 unit	1AB
	32			**5SY7532-6**		1	1 unit	1AB
	40			**5SY7540-6**		1	1 unit	1AB
	50			**5SY7550-6**		1	1 unit	1AB
	63			**5SY7563-6**		1	1 unit	1AB
	**2P, 400 V AC**							
	6	2		**5SY7206-6**		1	1 unit	1AB
	10			**5SY7210-6**		1	1 unit	1AB
	13			**5SY7213-6**		1	1 unit	1AB
	16			**5SY7216-6**		1	1 unit	1AB
	20			**5SY7220-6**		1	1 unit	1AB
	25			**5SY7225-6**		1	1 unit	1AB
	32			**5SY7232-6**		1	1 unit	1AB
	40			**5SY7240-6**		1	1 unit	1AB
	50			**5SY7250-6**		1	1 unit	1AB
	63			**5SY7263-6**		1	1 unit	1AB
	**3P, 400 V AC**							
	6	3		**5SY7306-6**		1	1 unit	1AB
	10			**5SY7310-6**		1	1 unit	1AB
	13			**5SY7313-6**		1	1 unit	1AB
	16			**5SY7316-6**		1	1 unit	1AB
	20			**5SY7320-6**		1	1 unit	1AB
	25			**5SY7325-6**		1	1 unit	1AB
	32			**5SY7332-6**		1	1 unit	1AB
	40			**5SY7340-6**		1	1 unit	1AB
	50			**5SY7350-6**		1	1 unit	1AB
	63			**5SY7363-6**		1	1 unit	1AB
	**3P+N, 400 V AC**							
	6	4		**5SY7606-6**		1	1 unit	1AB
	10			**5SY7610-6**		1	1 unit	1AB
	13			**5SY7613-6**		1	1 unit	1AB
	16			**5SY7616-6**		1	1 unit	1AB
	20			**5SY7620-6**		1	1 unit	1AB
	25			**5SY7625-6**		1	1 unit	1AB
	32			**5SY7632-6**		1	1 unit	1AB
	40			**5SY7640-6**		1	1 unit	1AB
	50			**5SY7650-6**		1	1 unit	1AB
	63			**5SY7663-6**		1	1 unit	1AB
	**4P, 400 V AC**							
	6	4		**5SY7406-6**		1	1 unit	1AB
	10			**5SY7410-6**		1	1 unit	1AB
	13			**5SY7413-6**		1	1 unit	1AB
	16			**5SY7416-6**		1	1 unit	1AB
	20			**5SY7420-6**		1	1 unit	1AB
	25			**5SY7425-6**		1	1 unit	1AB
	32			**5SY7432-6**		1	1 unit	1AB
	40			**5SY7440-6**		1	1 unit	1AB
	50			**5SY7450-6**		1	1 unit	1AB
	63			**5SY7463-6**		1	1 unit	1AB

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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15000

I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A	MW[1]	d						d					
Miniature circuit breakers 15000 A													
1P, 230/400 V AC													
0.3	1		**5SY7114-7**		1	1 unit	1AC		**5SY7114-8**		1	1 unit	1AA
0.5			**5SY7105-7**		1	1 unit	1AC		**5SY7105-8**		1	1 unit	1AA
1			**5SY7101-7**		1	1 unit	1AC		**5SY7101-8**		1	1 unit	1AA
1.6			**5SY7115-7**		1	1 unit	1AC		**5SY7115-8**		1	1 unit	1AA
2			**5SY7102-7**		1	1 unit	1AC		**5SY7102-8**		1	1 unit	1AA
3			**5SY7103-7**		1	1 unit	1AC		**5SY7103-8**		1	1 unit	1AA
4			**5SY7104-7**		1	1 unit	1AC		**5SY7104-8**		1	1 unit	1AA
6			**5SY7106-7**		1	1 unit	1AC		**5SY7106-8**		1	1 unit	1AA
8			**5SY7108-7**		1	1 unit	1AC		**5SY7108-8**		1	1 unit	1AA
10			**5SY7110-7**		1	1 unit	1AC		**5SY7110-8**		1	1 unit	1AA
13			**5SY7113-7**		1	1 unit	1AC		**5SY7113-8**		1	1 unit	1AA
16			**5SY7116-7**		1	1 unit	1AC		**5SY7116-8**		1	1 unit	1AA
20			**5SY7120-7**		1	1 unit	1AC		**5SY7120-8**		1	1 unit	1AA
25			**5SY7125-7**		1	1 unit	1AC		**5SY7125-8**		1	1 unit	1AA
32			**5SY7132-7**		1	1 unit	1AC		**5SY7132-8**		1	1 unit	1AA
40			**5SY7140-7**		1	1 unit	1AC		**5SY7140-8**		1	1 unit	1AA
50			**5SY7150-7**		1	1 unit	1AC		**5SY7150-8**		1	1 unit	1AA
63			**5SY7163-7**		1	1 unit	1AC		**5SY7163-8**		1	1 unit	1AA
1P+N, 230 V AC													
0.3	2		**5SY7514-7**		1	1 unit	1AC		**5SY7514-8**		1	1 unit	1AA
0.5			**5SY7505-7**		1	1 unit	1AC		**5SY7505-8**		1	1 unit	1AA
1			**5SY7501-7**		1	1 unit	1AC		**5SY7501-8**		1	1 unit	1AA
1.6			**5SY7515-7**		1	1 unit	1AC		**5SY7515-8**		1	1 unit	1AA
2			**5SY7502-7**		1	1 unit	1AC		**5SY7502-8**		1	1 unit	1AA
3			**5SY7503-7**		1	1 unit	1AC		**5SY7503-8**		1	1 unit	1AA
4			**5SY7504-7**		1	1 unit	1AC		**5SY7504-8**		1	1 unit	1AA
6			**5SY7506-7**		1	1 unit	1AC		**5SY7506-8**		1	1 unit	1AA
8			**5SY7508-7**		1	1 unit	1AC		**5SY7508-8**		1	1 unit	1AA
10			**5SY7510-7**		1	1 unit	1AC		**5SY7510-8**		1	1 unit	1AA
13			**5SY7513-7**		1	1 unit	1AC		**5SY7513-8**		1	1 unit	1AA
16			**5SY7516-7**		1	1 unit	1AC		**5SY7516-8**		1	1 unit	1AA
20			**5SY7520-7**		1	1 unit	1AC		**5SY7520-8**		1	1 unit	1AA
25			**5SY7525-7**		1	1 unit	1AC		**5SY7525-8**		1	1 unit	1AA
32			**5SY7532-7**		1	1 unit	1AC		**5SY7532-8**		1	1 unit	1AA
40			**5SY7540-7**		1	1 unit	1AC		**5SY7540-8**		1	1 unit	1AA
50			**5SY7550-7**		1	1 unit	1AC		**5SY7550-8**		1	1 unit	1AA
63			**5SY7563-7**		1	1 unit	1AC		**5SY7563-8**		1	1 unit	1AA
2P, 400 V AC													
0.3	2		**5SY7214-7**		1	1 unit	1AC		**5SY7214-8**		1	1 unit	1AA
0.5			**5SY7205-7**		1	1 unit	1AC		**5SY7205-8**		1	1 unit	1AA
1			**5SY7201-7**		1	1 unit	1AC		**5SY7201-8**		1	1 unit	1AA
1.6			**5SY7215-7**		1	1 unit	1AC		**5SY7215-8**		1	1 unit	1AA
2			**5SY7202-7**		1	1 unit	1AC		**5SY7202-8**		1	1 unit	1AA
3			**5SY7203-7**		1	1 unit	1AC		**5SY7203-8**		1	1 unit	1AA
4			**5SY7204-7**		1	1 unit	1AC		**5SY7204-8**		1	1 unit	1AA
6			**5SY7206-7**		1	1 unit	1AC		**5SY7206-8**		1	1 unit	1AA
8			**5SY7208-7**		1	1 unit	1AC		**5SY7208-8**		1	1 unit	1AA
10			**5SY7210-7**		1	1 unit	1AC		**5SY7210-8**		1	1 unit	1AA
13			**5SY7213-7**		1	1 unit	1AC		**5SY7213-8**		1	1 unit	1AA
16			**5SY7216-7**		1	1 unit	1AC		**5SY7216-8**		1	1 unit	1AA
20			**5SY7220-7**		1	1 unit	1AC		**5SY7220-8**		1	1 unit	1AA
25			**5SY7225-7**		1	1 unit	1AC		**5SY7225-8**		1	1 unit	1AA
32			**5SY7232-7**		1	1 unit	1AC		**5SY7232-8**		1	1 unit	1AA
40			**5SY7240-7**		1	1 unit	1AC		**5SY7240-8**		1	1 unit	1AA
50			**5SY7250-7**		1	1 unit	1AC		**5SY7250-8**		1	1 unit	1AA
63			**5SY7263-7**		1	1 unit	1AC		**5SY7263-8**		1	1 unit	1AA

[1] 1 MW (modular width) = 18 mm.

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15000	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 15000 A														
	**3P, 400 V AC**													
	0.3	3		**5SY7314-7**		1	1 unit	1AC		**5SY7314-8**		1	1 unit	1AA
	0.5			**5SY7305-7**		1	1 unit	1AC		**5SY7305-8**		1	1 unit	1AA
	1			**5SY7301-7**		1	1 unit	1AC		**5SY7301-8**		1	1 unit	1AA
	1.6			**5SY7315-7**		1	1 unit	1AC		**5SY7315-8**		1	1 unit	1AA
	2			**5SY7302-7**		1	1 unit	1AC		**5SY7302-8**		1	1 unit	1AA
	3			**5SY7303-7**		1	1 unit	1AC		**5SY7303-8**		1	1 unit	1AA
	4			**5SY7304-7**		1	1 unit	1AC		**5SY7304-8**		1	1 unit	1AA
	6			**5SY7306-7**		1	1 unit	1AC		**5SY7306-8**		1	1 unit	1AA
	8			**5SY7308-7**		1	1 unit	1AC		**5SY7308-8**		1	1 unit	1AA
	10			**5SY7310-7**		1	1 unit	1AC		**5SY7310-8**		1	1 unit	1AA
	13			**5SY7313-7**		1	1 unit	1AC		**5SY7313-8**		1	1 unit	1AA
	16			**5SY7316-7**		1	1 unit	1AC		**5SY7316-8**		1	1 unit	1AA
	20			**5SY7320-7**		1	1 unit	1AC		**5SY7320-8**		1	1 unit	1AA
	25			**5SY7325-7**		1	1 unit	1AC		**5SY7325-8**		1	1 unit	1AA
	32			**5SY7332-7**		1	1 unit	1AC		**5SY7332-8**		1	1 unit	1AA
	40			**5SY7340-7**		1	1 unit	1AC		**5SY7340-8**		1	1 unit	1AA
	50			**5SY7350-7**		1	1 unit	1AC		**5SY7350-8**		1	1 unit	1AA
	63			**5SY7363-7**		1	1 unit	1AC		**5SY7363-8**		1	1 unit	1AA
	**3P+N, 400 V AC**													
	0.3	4		**5SY7614-7**		1	1 unit	1AC		**5SY7614-8**		1	1 unit	1AA
	0.5			**5SY7605-7**		1	1 unit	1AC		**5SY7605-8**		1	1 unit	1AA
	1			**5SY7601-7**		1	1 unit	1AC		**5SY7601-8**		1	1 unit	1AA
	1.6			**5SY7615-7**		1	1 unit	1AC		**5SY7615-8**		1	1 unit	1AA
	2			**5SY7602-7**		1	1 unit	1AC		**5SY7602-8**		1	1 unit	1AA
	3			**5SY7603-7**		1	1 unit	1AC		**5SY7603-8**		1	1 unit	1AA
	4			**5SY7604-7**		1	1 unit	1AC		**5SY7604-8**		1	1 unit	1AA
	6			**5SY7606-7**		1	1 unit	1AC		**5SY7606-8**		1	1 unit	1AA
	8			**5SY7608-7**		1	1 unit	1AC		**5SY7608-8**		1	1 unit	1AA
	10			**5SY7610-7**		1	1 unit	1AC		**5SY7610-8**		1	1 unit	1AA
	13			**5SY7613-7**		1	1 unit	1AC		**5SY7613-8**		1	1 unit	1AA
	16			**5SY7616-7**		1	1 unit	1AC		**5SY7616-8**		1	1 unit	1AA
	20			**5SY7620-7**		1	1 unit	1AC		**5SY7620-8**		1	1 unit	1AA
	25			**5SY7625-7**		1	1 unit	1AC		**5SY7625-8**		1	1 unit	1AA
	32			**5SY7632-7**		1	1 unit	1AC		**5SY7632-8**		1	1 unit	1AA
	40			**5SY7640-7**		1	1 unit	1AC		**5SY7640-8**		1	1 unit	1AA
	50			**5SY7650-7**		1	1 unit	1AC		**5SY7650-8**		1	1 unit	1AA
	63			**5SY7663-7**		1	1 unit	1AC		**5SY7663-8**		1	1 unit	1AA
	**4P, 400 V AC**													
	0.3	4		**5SY7414-7**		1	1 unit	1AC		**5SY7414-8**		1	1 unit	1AA
	0.5			**5SY7405-7**		1	1 unit	1AC		**5SY7405-8**		1	1 unit	1AA
	1			**5SY7401-7**		1	1 unit	1AC		**5SY7401-8**		1	1 unit	1AA
	1.6			**5SY7415-7**		1	1 unit	1AC		**5SY7415-8**		1	1 unit	1AA
	2			**5SY7402-7**		1	1 unit	1AC		**5SY7402-8**		1	1 unit	1AA
	3			**5SY7403-7**		1	1 unit	1AC		**5SY7403-8**		1	1 unit	1AA
	4			**5SY7404-7**		1	1 unit	1AC		**5SY7404-8**		1	1 unit	1AA
	6			**5SY7406-7**		1	1 unit	1AC		**5SY7406-8**		1	1 unit	1AA
	8			**5SY7408-7**		1	1 unit	1AC		**5SY7408-8**		1	1 unit	1AA
	10			**5SY7410-7**		1	1 unit	1AC		**5SY7410-8**		1	1 unit	1AA
	13			**5SY7413-7**		1	1 unit	1AC		**5SY7413-8**		1	1 unit	1AA
	16			**5SY7416-7**		1	1 unit	1AC		**5SY7416-8**		1	1 unit	1AA
	20			**5SY7420-7**		1	1 unit	1AC		**5SY7420-8**		1	1 unit	1AA
	25			**5SY7425-7**		1	1 unit	1AC		**5SY7425-8**		1	1 unit	1AA
	32			**5SY7432-7**		1	1 unit	1AC		**5SY7432-8**		1	1 unit	1AA
	40			**5SY7440-7**		1	1 unit	1AC		**5SY7440-8**		1	1 unit	1AA
	50			**5SY7450-7**		1	1 unit	1AC		**5SY7450-8**		1	1 unit	1AA
	63			**5SY7463-7**		1	1 unit	1AC		**5SY7463-8**		1	1 unit	1AA

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 25000 A														
	1P, 230/400 V AC													
	0.3	1		**5SY8114-7**		1	1 unit	1AC		**5SY8114-8**		1	1 unit	1AA
	0.5			**5SY8105-7**		1	1 unit	1AC		**5SY8105-8**		1	1 unit	1AA
	1			**5SY8101-7**		1	1 unit	1AC		**5SY8101-8**		1	1 unit	1AA
	1.6			**5SY8115-7**		1	1 unit	1AC		**5SY8115-8**		1	1 unit	1AA
	2			**5SY8102-7**		1	1 unit	1AC		**5SY8102-8**		1	1 unit	1AA
	3			**5SY8103-7**		1	1 unit	1AC		**5SY8103-8**		1	1 unit	1AA
	4			**5SY8104-7**		1	1 unit	1AC		**5SY8104-8**		1	1 unit	1AA
	6			**5SY8106-7**		1	1 unit	1AC		**5SY8106-8**		1	1 unit	1AA
	8			**5SY8108-7**		1	1 unit	1AC		**5SY8108-8**		1	1 unit	1AA
	10			**5SY8110-7**		1	1 unit	1AC		**5SY8110-8**		1	1 unit	1AA
	13			**5SY8113-7**		1	1 unit	1AC		**5SY8113-8**		1	1 unit	1AA
	16			**5SY8116-7**		1	1 unit	1AC		**5SY8116-8**		1	1 unit	1AA
	20			**5SY8120-7**		1	1 unit	1AC		**5SY8120-8**		1	1 unit	1AA
	25			**5SY8125-7**		1	1 unit	1AC		**5SY8125-8**		1	1 unit	1AA
	32			**5SY8132-7**		1	1 unit	1AC		**5SY8132-8**		1	1 unit	1AA
	40			**5SY8140-7**		1	1 unit	1AC		**5SY8140-8**		1	1 unit	1AA
	50			**5SY8150-7**		1	1 unit	1AC		**5SY8150-8**		1	1 unit	1AA
	63			**5SY8163-7**		1	1 unit	1AC		**5SY8163-8**		1	1 unit	1AA
	1P+N, 230 V AC													
	0.3	2		**5SY8514-7**		1	1 unit	1AC		**5SY8514-8**		1	1 unit	1AA
	0.5			**5SY8505-7**		1	1 unit	1AC		**5SY8505-8**		1	1 unit	1AA
	1			**5SY8501-7**		1	1 unit	1AC		**5SY8501-8**		1	1 unit	1AA
	1.6			**5SY8515-7**		1	1 unit	1AC		**5SY8515-8**		1	1 unit	1AA
	2			**5SY8502-7**		1	1 unit	1AC		**5SY8502-8**		1	1 unit	1AA
	3			**5SY8503-7**		1	1 unit	1AC		**5SY8503-8**		1	1 unit	1AA
	4			**5SY8504-7**		1	1 unit	1AC		**5SY8504-8**		1	1 unit	1AA
	6			**5SY8506-7**		1	1 unit	1AC		**5SY8506-8**		1	1 unit	1AA
	8			**5SY8508-7**		1	1 unit	1AC		**5SY8508-8**		1	1 unit	1AA
	10			**5SY8510-7**		1	1 unit	1AC		**5SY8510-8**		1	1 unit	1AA
	13			**5SY8513-7**		1	1 unit	1AC		**5SY8513-8**		1	1 unit	1AA
	16			**5SY8516-7**		1	1 unit	1AC		**5SY8516-8**		1	1 unit	1AA
	20			**5SY8520-7**		1	1 unit	1AC		**5SY8520-8**		1	1 unit	1AA
	25			**5SY8525-7**		1	1 unit	1AC		**5SY8525-8**		1	1 unit	1AA
	32			**5SY8532-7**		1	1 unit	1AC		**5SY8532-8**		1	1 unit	1AA
	40			**5SY8540-7**		1	1 unit	1AC		**5SY8540-8**		1	1 unit	1AA
	50			**5SY8550-7**		1	1 unit	1AC		**5SY8550-8**		1	1 unit	1AA
	63			**5SY8563-7**		1	1 unit	1AC		**5SY8563-8**		1	1 unit	1AA
	2P, 400 V AC													
	0.3	2		**5SY8214-7**		1	1 unit	1AC		**5SY8214-8**		1	1 unit	1AA
	0.5			**5SY8205-7**		1	1 unit	1AC		**5SY8205-8**		1	1 unit	1AA
	1			**5SY8201-7**		1	1 unit	1AC		**5SY8201-8**		1	1 unit	1AA
	1.6			**5SY8215-7**		1	1 unit	1AC		**5SY8215-8**		1	1 unit	1AA
	2			**5SY8202-7**		1	1 unit	1AC		**5SY8202-8**		1	1 unit	1AA
	3			**5SY8203-7**		1	1 unit	1AC		**5SY8203-8**		1	1 unit	1AA
	4			**5SY8204-7**		1	1 unit	1AC		**5SY8204-8**		1	1 unit	1AA
	6			**5SY8206-7**		1	1 unit	1AC		**5SY8206-8**		1	1 unit	1AA
	8			**5SY8208-7**		1	1 unit	1AC		**5SY8208-8**		1	1 unit	1AA
	10			**5SY8210-7**		1	1 unit	1AC		**5SY8210-8**		1	1 unit	1AA
	13			**5SY8213-7**		1	1 unit	1AC		**5SY8213-8**		1	1 unit	1AA
	16			**5SY8216-7**		1	1 unit	1AC		**5SY8216-8**		1	1 unit	1AA
	20			**5SY8220-7**		1	1 unit	1AC		**5SY8220-8**		1	1 unit	1AA
	25			**5SY8225-7**		1	1 unit	1AC		**5SY8225-8**		1	1 unit	1AA
	32			**5SY8232-7**		1	1 unit	1AC		**5SY8232-8**		1	1 unit	1AA
	40			**5SY8240-7**		1	1 unit	1AC		**5SY8240-8**		1	1 unit	1AA
	50			**5SY8250-7**		1	1 unit	1AC		**5SY8250-8**		1	1 unit	1AA
	63			**5SY8263-7**		1	1 unit	1AC		**5SY8263-8**		1	1 unit	1AA

[1] 1 MW (modular width) = 18 mm.

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	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers 25000 A														
	**3P, 400 V AC**													
	0.3	3		**5SY8314-7**		1	1 unit	1AC		**5SY8314-8**		1	1 unit	1AA
	0.5			**5SY8305-7**		1	1 unit	1AC		**5SY8305-8**		1	1 unit	1AA
	1			**5SY8301-7**		1	1 unit	1AC		**5SY8301-8**		1	1 unit	1AA
	1.6			**5SY8315-7**		1	1 unit	1AC		**5SY8315-8**		1	1 unit	1AA
	2			**5SY8302-7**		1	1 unit	1AC		**5SY8302-8**		1	1 unit	1AA
	3			**5SY8303-7**		1	1 unit	1AC		**5SY8303-8**		1	1 unit	1AA
	4			**5SY8304-7**		1	1 unit	1AC		**5SY8304-8**		1	1 unit	1AA
	6			**5SY8306-7**		1	1 unit	1AC		**5SY8306-8**		1	1 unit	1AA
	8			**5SY8308-7**		1	1 unit	1AC		**5SY8308-8**		1	1 unit	1AA
	10			**5SY8310-7**		1	1 unit	1AC		**5SY8310-8**		1	1 unit	1AA
	13			**5SY8313-7**		1	1 unit	1AC		**5SY8313-8**		1	1 unit	1AA
	16			**5SY8316-7**		1	1 unit	1AC		**5SY8316-8**		1	1 unit	1AA
	20			**5SY8320-7**		1	1 unit	1AC		**5SY8320-8**		1	1 unit	1AA
	25			**5SY8325-7**		1	1 unit	1AC		**5SY8325-8**		1	1 unit	1AA
	32			**5SY8332-7**		1	1 unit	1AC		**5SY8332-8**		1	1 unit	1AA
	40			**5SY8340-7**		1	1 unit	1AC		**5SY8340-8**		1	1 unit	1AA
	50			**5SY8350-7**		1	1 unit	1AC		**5SY8350-8**		1	1 unit	1AA
	63			**5SY8363-7**		1	1 unit	1AC		**5SY8363-8**		1	1 unit	1AA
	**3P+N, 400 V AC**													
	0.3	4		**5SY8614-7**		1	1 unit	1AC		**5SY8614-8**		1	1 unit	1AA
	0.5			**5SY8605-7**		1	1 unit	1AC		**5SY8605-8**		1	1 unit	1AA
	1			**5SY8601-7**		1	1 unit	1AC		**5SY8601-8**		1	1 unit	1AA
	1.6			**5SY8615-7**		1	1 unit	1AC		**5SY8615-8**		1	1 unit	1AA
	2			**5SY8602-7**		1	1 unit	1AC		**5SY8602-8**		1	1 unit	1AA
	3			**5SY8603-7**		1	1 unit	1AC		**5SY8603-8**		1	1 unit	1AA
	4			**5SY8604-7**		1	1 unit	1AC		**5SY8604-8**		1	1 unit	1AA
	6			**5SY8606-7**		1	1 unit	1AC		**5SY8606-8**		1	1 unit	1AA
	8			**5SY8608-7**		1	1 unit	1AC		**5SY8608-8**		1	1 unit	1AA
	10			**5SY8610-7**		1	1 unit	1AC		**5SY8610-8**		1	1 unit	1AA
	13			**5SY8613-7**		1	1 unit	1AC		**5SY8613-8**		1	1 unit	1AA
	16			**5SY8616-7**		1	1 unit	1AC		**5SY8616-8**		1	1 unit	1AA
	20			**5SY8620-7**		1	1 unit	1AC		**5SY8620-8**		1	1 unit	1AA
	25			**5SY8625-7**		1	1 unit	1AC		**5SY8625-8**		1	1 unit	1AA
	32			**5SY8632-7**		1	1 unit	1AC		**5SY8632-8**		1	1 unit	1AA
	40			**5SY8640-7**		1	1 unit	1AC		**5SY8640-8**		1	1 unit	1AA
	50			**5SY8650-7**		1	1 unit	1AC		**5SY8650-8**		1	1 unit	1AA
	63			**5SY8663-7**		1	1 unit	1AC		**5SY8663-8**		1	1 unit	1AA
	**4P, 400 V AC**													
	0.3	4		**5SY8414-7**		1	1 unit	1AC		**5SY8414-8**		1	1 unit	1AA
	0.5			**5SY8405-7**		1	1 unit	1AC		**5SY8405-8**		1	1 unit	1AA
	1			**5SY8401-7**		1	1 unit	1AC		**5SY8401-8**		1	1 unit	1AA
	1.6			**5SY8415-7**		1	1 unit	1AC		**5SY8415-8**		1	1 unit	1AA
	2			**5SY8402-7**		1	1 unit	1AC		**5SY8402-8**		1	1 unit	1AA
	3			**5SY8403-7**		1	1 unit	1AC		**5SY8403-8**		1	1 unit	1AA
	4			**5SY8404-7**		1	1 unit	1AC		**5SY8404-8**		1	1 unit	1AA
	6			**5SY8406-7**		1	1 unit	1AC		**5SY8406-8**		1	1 unit	1AA
	8			**5SY8408-7**		1	1 unit	1AC		**5SY8408-8**		1	1 unit	1AA
	10			**5SY8410-7**		1	1 unit	1AC		**5SY8410-8**		1	1 unit	1AA
	13			**5SY8413-7**		1	1 unit	1AC		**5SY8413-8**		1	1 unit	1AA
	16			**5SY8416-7**		1	1 unit	1AC		**5SY8416-8**		1	1 unit	1AA
	20			**5SY8420-7**		1	1 unit	1AC		**5SY8420-8**		1	1 unit	1AA
	25			**5SY8425-7**		1	1 unit	1AC		**5SY8425-8**		1	1 unit	1AA
	32			**5SY8432-7**		1	1 unit	1AC		**5SY8432-8**		1	1 unit	1AA
	40			**5SY8440-7**		1	1 unit	1AC		**5SY8440-8**		1	1 unit	1AA
	50			**5SY8450-7**		1	1 unit	1AC		**5SY8450-8**		1	1 unit	1AA
	63			**5SY8463-7**		1	1 unit	1AC		**5SY8463-8**		1	1 unit	1AA

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Miniature circuit breakers with plug-in terminals are used for the protection of socket outlets and lighting circuits with the most common rated currents of 10 to 20 A.

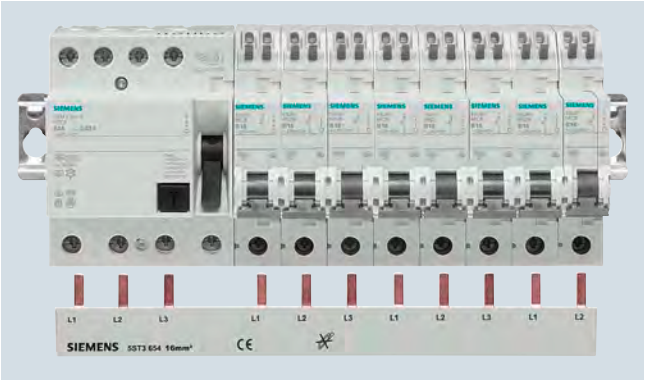
Benefits



- Double, self-contained, screwless outgoing terminals for fast connection of conductors.



- Removal of individual conductors requires no tools and ensures high operating reliability.
- No end sleeves required for finely stranded conductors. This saves mounting time.



- Conventional pin busbars are used for the incoming terminal. This ensures clear, manageable and convenient access to all terminals as part of the uniform Siemens connection concept.

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3

Technical specifications

			5SJ6...-.KS
Standards			EN 60898-1
Approvals			see chapter "Appendix"
Rated voltage U_n		V AC	230/400
Operational voltage			
• Min.		V AC/DC/pole	24
• Max.		V AC V DC/pole	250/440 60[1]
Rated breaking capacity	Acc. to EN 60898-1	kA AC	6
Insulation coordination			
• Rated insulation voltage • Pollution degree for overvoltage category		V AC	250/440 2/III
Rated frequency		Hz	50/60
Touch protection	Acc. to EN 50274		Yes
Handle end position, sealable			Yes
Degree of protection	Acc. to EN 60529		IP20 with connected conductors, IP40 in the area of the handle with distribution cover
CFC and silicone-free			Yes
Terminals			Screwless terminals on the outgoing terminals for 1.5 ... 4 mm^2
Conductor cross-sections			
• Top, plug-in terminals - Solid, stranded and finely stranded, without end sleeve - Finely stranded, with end sleeve		 mm^2 mm^2	 1.5 ... 4 1.5 ... 2.5
• Bottom, tunnel terminal - Solid, stranded or finely stranded, with end sleeve	± screw (Pozidriv)	 mm^2	2 0.75 ... 25
Mounting position			Any
Service life, On average, with rated load			20000 actuations
Ambient temperature		°C	-25 ... +45, occasionally +55, max. 95% humidity
Storage temperature		°C	-40 ... +75
Resistance to climate	Acc. to IEC 60068-2-30		6 cycles

[1] The operational voltage 60 V DC/pole takes into account a battery charging voltage with a peak value of 72 V.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

6000 / 3	I_n	Mounting width	SD	Characteristic B: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers with plug-in terminal														
	**1P**													
	10	1		**5SJ6110-6KS**		1	1 unit	1AB		**5SJ6110-7KS**		1	1 unit	1AC
	13			**5SJ6113-6KS**		1	1 unit	1AB		**5SJ6113-7KS**		1	1 unit	1AC
	16			**5SJ6116-6KS**		1	1 unit	1AB		**5SJ6116-7KS**		1	1 unit	1AC
	20			**5SJ6120-6KS**		1	1 unit	1AB		**5SJ6120-7KS**		1	1 unit	1AC
	**1P+N**													
	10	2		**5SJ6510-6KS**		1	1 unit	1AB		**5SJ6510-7KS**		1	1 unit	1AC
	13			**5SJ6513-6KS**		1	1 unit	1AB		**5SJ6513-7KS**		1	1 unit	1AC
	16			**5SJ6516-6KS**		1	1 unit	1AB		**5SJ6516-7KS**		1	1 unit	1AC
	20			**5SJ6520-6KS**		1	1 unit	1AB		**5SJ6520-7KS**		1	1 unit	1AC
	**2P**													
	10	2		**5SJ6210-6KS**		1	1 unit	1AB		**5SJ6210-7KS**		1	1 unit	1AC
	13			**5SJ6213-6KS**		1	1 unit	1AB		**5SJ6213-7KS**		1	1 unit	1AC
	16			**5SJ6216-6KS**		1	1 unit	1AB		**5SJ6216-7KS**		1	1 unit	1AC
	20			**5SJ6220-6KS**		1	1 unit	1AB		**5SJ6220-7KS**		1	1 unit	1AC
	**3P**													
	10	3		**5SJ6310-6KS**		1	1 unit	1AB		**5SJ6310-7KS**		1	1 unit	1AC
	13			**5SJ6313-6KS**		1	1 unit	1AB		**5SJ6313-7KS**		1	1 unit	1AC
	16			**5SJ6316-6KS**		1	1 unit	1AB		**5SJ6316-7KS**		1	1 unit	1AC
	20			**5SJ6320-6KS**		1	1 unit	1AB		**5SJ6320-7KS**		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

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Introduction

Overview

These miniature circuit breakers are used for the protection of systems and installations with switched neutral conductors in distribution boards with little space. They are just a single modular width.

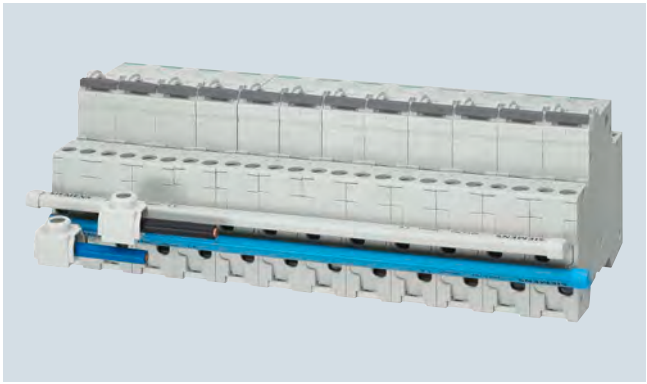
Compact busbars facilitate installation in space-saving distribution boards.

3

Benefits



- Auxiliary switches and fault signal contacts from the high-capacity range can be freely mounted on these miniature circuit breakers. This increases availability and cuts down on logistics.



- The infeed can be implemented either from the top or the bottom. Additional terminals with lateral cable entry facilitate mounting when using large conductor cross-sections.

Technical specifications

			5SY30..	5SY60..
Standards			EN 60898-1	
Approvals			see chapter "Appendix"	
Rated voltage U_n		V AC	230	
Operational voltage				
• Min.		V AC/DC	24	
• Max.		V AC V DC/pole	250 72	
Rated making and breaking capacity I_{cn}		kA AC	4.5	6
Insulation coordination • Rated insulation voltage • Pollution degree for overvoltage category		V AC	250 2/III	
Rated frequency		Hz	50/60	
Touch protection	Acc. to EN 50274		Yes	
Handle end position, sealable			Yes	
Degree of protection	Acc. to EN 60259		IP20 with connected conductors, IP40 in the area of the handle with distribution cover	
CFC and silicone-free			Yes	
Terminals	± screw (Pozidriv)		2	
• Solid and stranded, top and bottom terminal		mm^2	0.75 ... 16	
• Finely stranded, with end sleeve, top and bottom terminal		mm^2	0.75 ... 10	
• Terminal tightening torque		Nm	2.0 ... 2.5	
Mounting position			Any	
Service life On average, with rated load			20000 actuations at 2 A/4 A and 40 A: 8000 actuations	
Ambient temperature		°C	-25 ... +45, occasionally +55, max. 95% humidity	
Storage temperature		°C	-40 ... +75	
Resistance to climate	Acc. to IEC 60068-2-30		6 cycles	
Resistance to vibrations	Acc. to IEC 60068-2-6	m/s^2	50 at 25 ... 150 Hz and 60 at 35 Hz (4 s)	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

4 500 / 3	I_n	Mounting width	SD	Characteristic B Article No.	Price per PU	SD	Characteristic C Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d			d					
Miniature circuit breakers 4500 A											
	**1P+N, 230 V AC**										
	N connection, right										
	2			--			**5SY3002-7**		1	1 unit	1AE
	4			--			**5SY3004-7**		1	1 unit	1AE
	6			--			**5SY3006-7**		1	1 unit	1AE
	8			--			**5SY3008-7**		1	1 unit	1AE
	10			--			**5SY3010-7**		1	1 unit	1AE
	13			--			**5SY3013-7**		1	1 unit	1AE
	16			--			**5SY3016-7**		1	1 unit	1AE
	20			--			**5SY3020-7**		1	1 unit	1AE
	25			--			**5SY3025-7**		1	1 unit	1AE
	32			--			**5SY3032-7**		1	1 unit	1AE
	40			--			**5SY3040-7**		1	1 unit	1AE
	N connection, left										
	2			--			**5SY3002-7KL**		1	1 unit	1AE
	4			--			**5SY3004-7KL**		1	1 unit	1AE
	6			--			**5SY3006-7KL**		1	1 unit	1AE
	8			--			**5SY3008-7KL**		1	1 unit	1AE
	10			--			**5SY3010-7KL**		1	1 unit	1AE
	13			--			**5SY3013-7KL**		1	1 unit	1AE
	16			--			**5SY3016-7KL**		1	1 unit	1AE
	20			--			**5SY3020-7KL**		1	1 unit	1AE
	25			--			**5SY3025-7KL**		1	1 unit	1AE
	32			--			**5SY3032-7KL**		1	1 unit	1AE
	40			--			**5SY3040-7KL**		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

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Selection and ordering data

6000 / 3	I_n	Mounting width	SD	Characteristic B: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic C: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
Miniature circuit breakers, compact, 1+N (1P+N), 230 V AC														
	**N pole, right**													
	2	1		--						**5SY6002-7**		1	1 unit	1AC
	4			--						**5SY6004-7**		1	1 unit	1AC
	6			**5SY6006-6**		1	1 unit	1AB		**5SY6006-7**		1	1 unit	1AC
	8			--						**5SY6008-7**		1	1 unit	1AC
	10			**5SY6010-6**		1	1 unit	1AB		**5SY6010-7**		1	1 unit	1AC
	13			**5SY6013-6**		1	1 unit	1AB		**5SY6013-7**		1	1 unit	1AC
	16			**5SY6016-6**		1	1 unit	1AB		**5SY6016-7**		1	1 unit	1AC
	20			**5SY6020-6**		1	1 unit	1AB		**5SY6020-7**		1	1 unit	1AC
	25			**5SY6025-6**		1	1 unit	1AB		**5SY6025-7**		1	1 unit	1AC
	32			**5SY6032-6**		1	1 unit	1AB		**5SY6032-7**		1	1 unit	1AC
	40			**5SY6040-6**		1	1 unit	1AB		**5SY6040-7**		1	1 unit	1AC
	**N pole, left**													
	2	1		--						**5SY6002-7KL**		1	1 unit	1AC
	4			--						**5SY6004-7KL**		1	1 unit	1AC
	6			--						**5SY6006-7KL**		1	1 unit	1AC
	8			--						**5SY6008-7KL**		1	1 unit	1AC
	10			--						**5SY6010-7KL**		1	1 unit	1AC
	13			--						**5SY6013-7KL**		1	1 unit	1AC
	16			--						**5SY6016-7KL**		1	1 unit	1AC
	20			--						**5SY6020-7KL**		1	1 unit	1AC
	25			--						**5SY6025-7KL**		1	1 unit	1AC
	32			--						**5SY6032-7KL**		1	1 unit	1AC
	40			--						**5SY6040-7KL**		1	1 unit	1AC

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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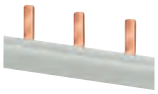
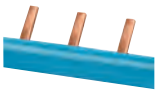
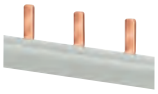
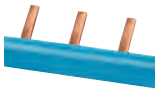
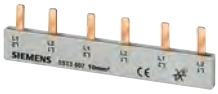
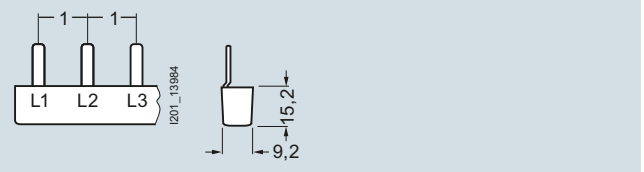
		Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW[1]	mm	d					
5ST37 busbar system, 10 mm², for 1+N miniature circuit breakers in 1 MW of the compact range, can be cut, with end caps									
	Single-phase, 12 MW								
	For 12 MCBs 1+N, gray	1	216		**5ST3762**		1	10 units	1AD
	For 12 MCBs 1+N, blue		216		**5ST3763**		1	10 units	1AD
	Single-phase								
	For MCBs 1+N, gray	1	1016		**5ST3764**		1	10 units	1AD
	For MCBs 1+N, blue		1016		**5ST3765**		1	10 units	1AD
End caps for 5ST376 busbars									
	1 set comprises a right and a left cap								
	Gray				**5ST3766**		1	10 sets	1AD
	Blue				**5ST3767**		1	10 sets	1AD
5ST36 busbar systems, 10 mm², for miniature circuit breakers, fixed lengths, cannot be cut, fully insulated									
	Three-phase								
	For 6 MCBs 1+N	1	102		**5ST3613**		1	10 units	1AD
	For 9 MCBs 1+N		257.5		**5ST3614**		1	10 units	1AD
	For 12 MCBs 1+N		210	▶	**5ST3615**		1	10 units	1AD

[1] 1 MW (modular width) = 18 mm.

Dimensional drawings

5ST36
Pin spacing in MW

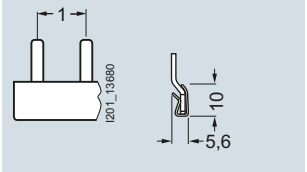
Dimensions of side view in mm (approx.).



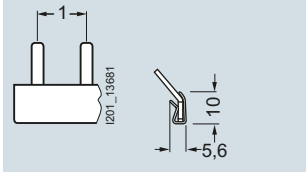
5ST3613
5ST3614
5ST3615

5ST37
Pin spacing in MW

Dimensions of side view in mm (approx.).



5ST3762
5ST3764



5ST3763
5ST3765

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3

Overview

The Siemens mounting concept supports the combination of all 5ST3 additional components with 5SY and 5SP miniature circuit breakers and with 5SU1 RCBOs.

5SL and 5SY60. . miniature circuit breakers are suitable for mounting auxiliary switches and fault signal contacts. Auxiliary switches can also be mounted on 5TE8 flush-mounting circuit breakers and 5SG71 MINIZED switch disconnectors.

Auxiliary switches (AS)

The auxiliary switch (AS) always signals the contact position of the miniature circuit breaker, regardless of whether the miniature circuit breaker was tripped manually or as the result of a fault. An additional version is also available for the switching of small currents and voltages for the control of programmable control systems (PLCs) according to EN 61131-2. The auxiliary switch with test button enables the testing of control circuits without the need to switch the miniature circuit breaker.

Fault signal contacts (FC)

The fault signal contact (FC) signals the automatic tripping of the miniature circuit breaker in the event of a fault, such as an overload or a short circuit. If the fault signal contact is activated, the contact position does not change if the miniature circuit breaker is tripped manually. Fault signal contacts with TEST and RESET buttons enable the testing of control circuits without the need to trip the miniature circuit breaker. The red RESET button integrated in the handle also indicates the automatic tripping of the MCB. The signal can be acknowledged manually using the RESET button.

Shunt trips (ST)

Shunt trips are used for remote tripping of miniature circuit breakers.

Undervoltage releases (UR)

Undervoltage releases are integrated (e.g. in EMERGENCY-STOP loops), thus ensuring that the miniature circuit breaker trips in the event of an emergency, which, in turn, ensures disconnection of the control circuit according to EN 60204. In the event that the voltage is interrupted or too low, it also trips, i.e. prevents activation of the miniature circuit breaker.

RC units

RC units can be combined with miniature circuit breakers of characteristics A, B, C and D. They then form a combination of RCCB and miniature circuit breakers for personnel, fire and line protection. The combinations can be tailored to meet individual requirements.

For information on RC units, see chapter "Residual Current Protective Devices / Arc Fault Detection Devices (AFDDs)"

Remote controlled mechanisms (RC) NEW

Remote controlled mechanisms are used for the remote ON/OFF switching of miniature circuit breakers with or without RC unit, residual current operated circuit breakers, RCBOs or isolators and also enable local manual switching of these devices. A tripped combination must be acknowledged prior to switching back on.

The device combination with the auto reclose device (ARD) types tries up to three times to switch on again in the event of a fault. If a fault continues to exist, the combination remains switched off. The remote controlled mechanism has an mode selector switch with the functions: "Locked", "Manual" and "Remote Switching".

Selector switch position:
OFF (for the 177 - 270 V devices): The remote controlled mechanism Power is switched off, blocked mechanically and can be sealed and/or locked.
RC OFF: Only manual operation is possible.
RC ON: Both manual and remote operation are possible (except for in the case of the basic 12 - 48 V devices).

In the event that a device is tripped by a fault, the handle of the basic device and remote controlled mechanism switches to the OFF position. If, depending on the device version, the combination has switched off, an attempt can be made either via ARD or remotely to switch on again. If a fault continues to exist, the combination is switched off and can only be switched on again locally manually.

Matching adapters have to be ordered additionally to enable the remote controlled mechanisms to be combined with the residual current operated circuit breakers, miniature circuit breakers, RCBOs and on/off switches.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits

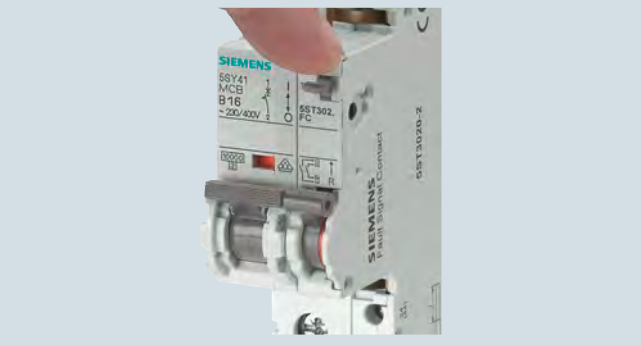
Can be universally retrofitted with all additional components



- The 5SL, 5SY and 5SP miniature circuit breakers are ideal for the quick and easy mounting of auxiliary switches and fault signal contacts.
  Captive metal brackets on the additional components ensure the quick and easy mounting of devices on the miniature circuit breakers without the need for tools.



- Fault signal contacts with TEST and RESET button enable the simple testing of auxiliary circuits and, in the event of a fault, acknowledgement of the fault over the RESET button, without the need to switch the miniature circuit breakers.



- The auxiliary switches with TEST button enable the simple manual testing of control circuits during operation of the entire installation, without the need to switch the miniature circuit breakers.

Remote controlled mechanisms NEW



- Remote controlled mechanisms with ARD and power have integrated auxiliary switches and fault signal contacts.
- More 5ST3... additional components, such as AS, FC, ST and UR, can be added to the right-hand side of the remote controlled mechanism in line with the Siemens mounting concept.
- The remote controlled mechanisms with ARD and power have an LED display on the front of the device to show the switching state and for diagnostics.

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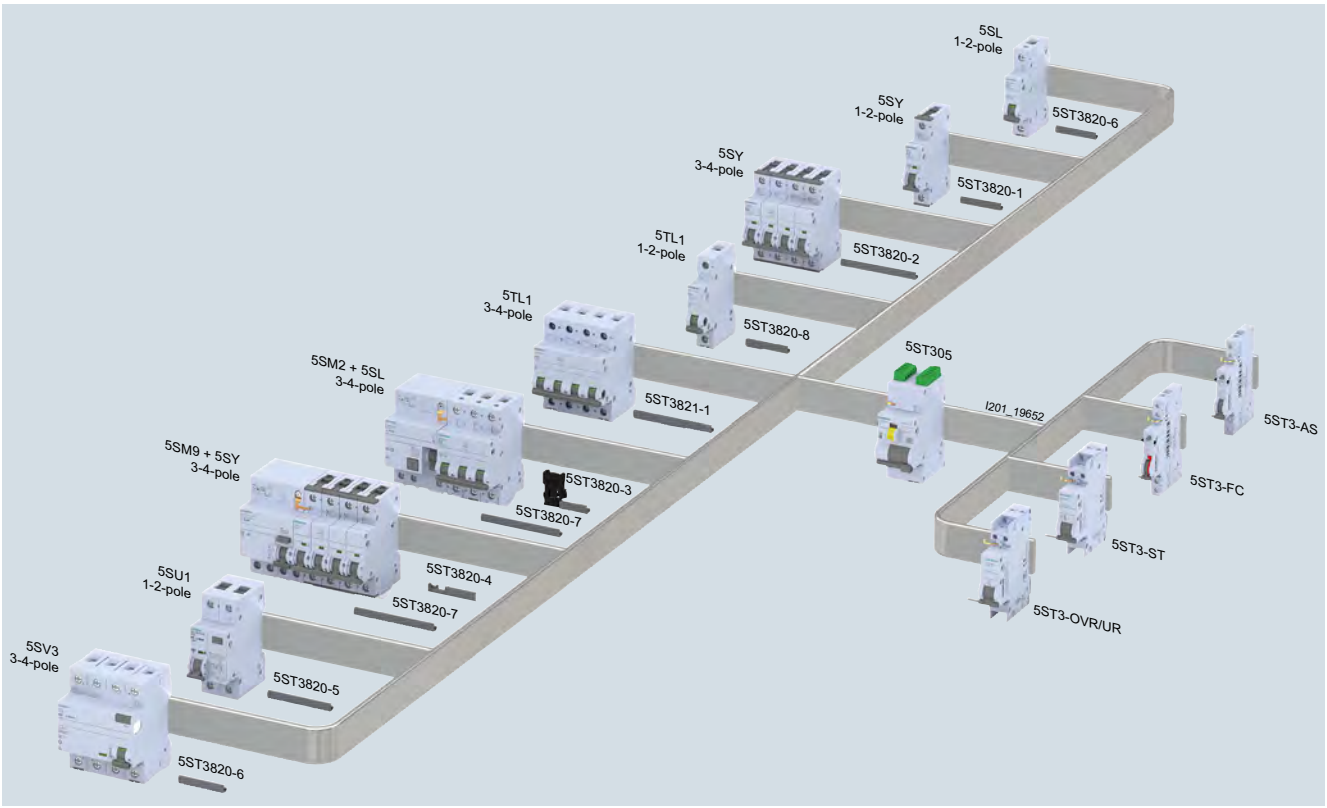
Electrical components

Portfolio overview



Minimum order quantity (PS) or a multiple thereof can be ordered.

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Combination options remote controlled mechanism – adapter – mount-on device

		5SL6/4 1-2-pole	5SL6/4 3-4-pole	5SY4/5/6/7/8 1-2-pole	5SY4/5/6/7/8 3-4-pole	5SY60	5SU1	5SM2 + 5SL 1-2-pole
								
	**RC mech. basic (1.5 MW) – 5ST3053** 12 V - 30 V AC 12 V - 48 V DC	Adapter 5ST3820-6	Adapter 5ST3820-7	Adapter 5ST3820-1	Adapter 5ST3820-2	Adapter 5ST3820-1	up to 3 MW Adapter 5ST3820-5	not compatible
	**RC mech. basic (2 MW) – 5ST3054** 230 V AC	Adapter 5ST3820-6	Adapter 5ST3820-7	Adapter 5ST3820-1	Adapter 5ST3820-2	Adapter 5ST3820-1	up to 3 MW Adapter 5ST3820-5	not compatible
	**RC mech. power (2 MW) – 5ST3055** 12 V - 30 V AC 12 V - 48 V DC	Adapter 5ST3820-6	Adapter 5ST3820-7	Adapter 5ST3820-1	Adapter 5ST3820-2	Adapter 5ST3820-1	Adapter 5ST3820-5	Adapter 5ST3820-3 add'l 5ST3820-6
	**RC mech. power (2 MW) – 5ST3056** 230 V AC	Adapter 5ST3820-6	Adapter 5ST3820-7	Adapter 5ST3820-1	Adapter 5ST3820-2	Adapter 5ST3820-1	Adapter 5ST3820-5	Adapter 5ST3820-3 add'l 5ST3820-6
	**RC mech. ARD* (2 MW) – 5ST3057** 12 V - 30 V AC 12 V - 48 V DC	Adapter 5ST3820-6	Adapter 5ST3820-7	Adapter 5ST3820-1	Adapter 5ST3820-2	Adapter 5ST3820-1	Adapter 5ST3820-5	Adapter 5ST3820-3 add'l 5ST3820-6
	**RC mech. ARD* (2 MW) – 5ST3058** 230 V AC	Adapter 5ST3820-6	Adapter 5ST3820-7	Adapter 5ST3820-1	Adapter 5ST3820-2	Adapter 5ST3820-1	Adapter 5ST3820-5	Adapter 5ST3820-3 add'l 5ST3820-6

* ARD = Auto Reclose Device

I201_19651

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Electrical components

Combination options remote controlled mechanism – adapter – mount-on device (continued)

5SM2 + 5SL 3-4-pole	5SM2 + 5SY 1-2-pole	5SM2 + 5SY 3-4-pole	5SM9 + LS 5SY..CC 1-2-pole	5SM9 + LS 5SY..CC 3-4-pole	5SV3	5TL1 1-2-pole	5TL1 3-4-pole
							
not compatible	not compatible	not compatible	not compatible	not compatible	not compatible	 Adapter 5ST3820-8	 Adapter 5ST3821-1
not compatible	not compatible	not compatible	not compatible	not compatible	not compatible	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	 Adapter 5ST3820-4 add'l 5ST3820-7	 Adapter 5ST3820-6	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	 Adapter 5ST3820-4 add'l 5ST3820-7	 Adapter 5ST3820-6	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	 Adapter 5ST3820-4 add'l 5ST3820-7	 Adapter 5ST3820-6	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	Adapter 5ST3820-4 add'l 5ST3820-7	Adapter 5ST3820-6	Adapter 5ST3820-8	Adapter 5ST3821-1

I201_19651

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

		Remote controlled mechanisms NEW					
		5ST3053	**5ST3054**	**5ST3055**	**5ST3056**	**5ST3057**	**5ST3058**
Standards		IEC/EN 62606					
Rated voltages U_n	V AC	12 ... 30	177 ... 270	12 ... 30	177 ... 270	12 ... 30	177 ... 270
	V DC	12 ... 48		12 ... 48		12 ... 48	
• Rated frequency f_n	Hz	50 ... 60					
Rated power dissipation	VA	≤ 1 in standby					
Ambient temperature	°C	-25 ... +45					
Storage temperature	°C	-40 ... +55					
Degree of protection		IP20					
Service life, on average, with rated load		20 000 actuations					
Conductor cross-sections	mm^2	0.1… 2.5					
	AWG	14 … 30					
Terminals							
• Terminal tightening torque	Nm	0.2					
	lb/in	2.0					
Cable length in the control circuit	m	≤ 1500					
Switching frequency		2 switching cycles per minute					
Number of automatic reclose attempts		--				3	
Integrated auxiliary switches		--		1 NO + 1 NC, 2 A, 250 V			
Integrated fault signal contact		--		1 NO + 1 NC, 2 A, 250 V			
Locking device		No	Yes	Yes	Yes	Yes	Yes

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Selection and ordering data

		Rated voltage U_n V	Mounting width MW[1]	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**Remote controlled mechanisms (RC mech.)** NEW								
	• Remote controlled mechanisms Basic	12 ... 30 V AC 12 ... 48 V DC	1.5		**5ST3053**		1	1 unit	1AD
		177 ... 270 V AC	2		**5ST3054**		1	1 unit	1AD
	• Remote controlled mechanisms Power	12 ... 30 V AC 12 ... 48 V DC	2		**5ST3055**		1	1 unit	1AD
		177 ... 270 V AC			**5ST3056**		1	1 unit	1AD
	• Remote controlled mechanisms Power with automatic reclose function	12 ... 30 V AC 12 ... 48 V DC	2		**5ST3057**		1	1 unit	1AD
		177 ... 270 V AC			**5ST3058**		1	1 unit	1AD
	Note Matching adapters must be ordered separately.								
	**Accessories for remote controlled mechanisms** NEW								
	• Adapters for 5SY MCBs 1-2-pole				**5ST3820-1**		1	1 unit	1AD
	• Adapters for 5SY MCBs 3-4-pole				**5ST3820-2**		1	1 unit	1AD
	• Adapters for 5SM2 RC units				**5ST3820-3**		1	1 unit	1AD
	• Adapters for 5SU1 RCBOs				**5ST3820-5**		1	1 unit	1AD
	• Adapters for 5SL MCBs 1-2-pole, 5SV3 residual current switches				**5ST3820-6**		1	1 unit	1AD
	• Adapters for 5SL MCBs, 3-4-pole				**5ST3820-7**		1	1 unit	1AD
	• Adapters for 5TL1 ON/OFF switches 1-2-pole				**5ST3820-8**		1	1 unit	1AD
	• Adapters for 5TL1 ON/OFF switches 3-4-pole				**5ST3821-1**		1	1 unit	1AD

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

			Auxiliary switches (AS)		Fault signal contacts (FC)
			5ST3010, 5ST3010-2 5ST3011, 5ST3011-2 5ST3012, 5ST3012-2	5ST3013[1], 5ST3013-2[2] 5ST3014[1], 5ST3014-2[2] 5ST3015[1], 5ST3015-2[2]	5ST3020, 5ST3020-2 5ST3021, 5ST3021-2 5ST3022, 5ST3022-2
Standards			IEC/EN 62019; IEC/EN 60947-5-1; UL 1077; CSA C22.2 No. 235		
Approvals			see chapter "Appendix"		
Short-circuit protection			• < 500 A: 5SL B6/C6 miniature circuit breakers • Up to 1 kA: 5SY B6/C6 miniature circuit breakers or • Up to 1 kA: fuse gG 6 A		
Contact load					
• Min.			50 mA, 24 V	1 mA/5 V DC	50 mA, 24 V
• Max.			--	[1] = 100 mA/30 V DC [2] = 50 mA/30 V DC	--
• Acc. to IEC/EN 62019 and 60947-5-1:					
- 400 V AC, AC-14, NO		A	2	--	2
- 230 V AC, AC-14, NO		A	6	--	6
- 400 V AC, AC-13, NC		A	2	--	2
- 230 V AC, AC-13, NC		A	6	--	6
• Acc. to IEC/EN 62019 (acc. to IEC/EN 60947-5-1):					
- 220 V DC, DC-13, NO + NC		A	1 (0.5)	--	1 (0.5)
- 110 V DC, DC-13, NO + NC		A	1 (0.75)	--	1 (0.75)
- 60 V DC, DC-13, NO + NC		A	3 (1.5)	--	3 (1.5)
- 24 V DC, DC-13, NO + NC		A	6 (3)	--	6 (3)
Service life, on average, with rated load			20000 actuations	20000 actuations	20000 actuations
Conductor cross-sections		mm^2 AWG	0.5 ... 2.5 22 ... 14	0.5 ... 2.5 22 ... 14	0.5 ... 2.5 22 ... 14
Terminals					
• Terminal tightening torque		Nm lb/in	0.5 4.5	0.5 4.5	0.5 4.5
Rated frequency		Hz	50/60		
Mounting position			Any	Any	Any
Ambient temperature		°C	-25 ... +55	-25 ... +55	-25 ... +55
Storage temperature		°C	-40 ... +75	-40 ... +75	-40 ... +75
Resistance to climate	Acc. to IEC 60068-2-30	Cycles	28		
Shock	Acc. to IEC 60068-2-27	m/s	50 at 11 ms half-sine		
Resistance to vibrations	Acc. to IEC 60068-2-6	m/s^2	50 at 10 ... 150 Hz		

			Undervoltage releases (UR)	Shunt trips (ST)	
			5ST304.	5ST3030	5ST3031
Standards			EN 60947-1		
Rated voltages U_n		V AC	230	110 ... 415	24 ... 48
		V DC	24, 110	110	24 ... 48
• Operating range U_n			0.85 ... 1.1 x U_n	0.7 ... 1.1 x U_n	
• Rated frequency f_n		Hz	--	50 ... 60	
Response limits: Tripping			< 0.35 ... 0.7 × U_n	--	
Short-circuit protection			Miniature circuit breakers B/C 6 A or fuse gG 6 A		
Minimum contact load			50 mA, 24 V	50 mA, 24 V	
Tripping operations			max. 2000	max. 2000	
Service life, on average, with rated load			20000 actuations	20000 actuations	
Conductor cross-sections		mm^2 AWG	0.5 ... 2.5 22 ... 14	0.5 ... 2.5 22 ... 14	
Terminals					
• Terminal tightening torque		Nm lb/in	0.8 6.8	0.8 6.8	
Mounting position			Any	Any	
Ambient temperature		°C	-25 ... +55	-25 ... +55	
Storage temperature		°C	-40 ... +75	-40 ... +75	
Resistance to climate	Acc. to IEC 60068-2-30	Cycles	28		
Shock	Acc. to IEC 60068-2-27	m/s	50 at 11 ms half-sine		
Resistance to vibrations	Acc. to IEC 60068-2-6	m/s^2	50 at 10 ... 150 Hz		
Switching frequency			--		
Switching duration		s	--		
Minimum command duration		s	--		
Rated power dissipation		VA	--		
Rated frequency		Hz	50/60		
Behavior in the event of control voltage failure			--		

For technical specifications of RC units, see chapter "Residual Current Protective Devices / Arc Fault Detection Devices (AFDDs)".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

		Rated voltage U_n V	Mounting width MW[1]	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**Auxiliary switches (AS)**								
	For 5SL, 5SY, 5SP and 5TL1 miniature circuit breakers, 5SU1 RCBOs, for 5SV residual current protective devices and 5TE8 switches								
	1 NO + 1 NC		0.5	▶	**5ST3010**		1	1 unit	1AD
	For low power			▶	**5ST3013**		1	1 unit	1AD
	2 NO				**5ST3011**		1	1 unit	1AD
	For low power				**5ST3014**		1	1 unit	1AD
	2 NC				**5ST3012**		1	1 unit	1AD
	For low power				**5ST3015**		1	1 unit	1AD
	**Auxiliary switches (AS) with TEST button**								
	For 5SL, 5SY, 5SP and 5TL1 miniature circuit breakers, 5SU1, 5TL1 RCBOs, for 5SV residual current protective devices and 5TE8 switches								
	1 NO + 1 NC		0.5		**5ST3010-2**		1	1 unit	1AD
	For low power				**5ST3013-2**		1	1 unit	1AD
	2 NO				**5ST3011-2**		1	1 unit	1AD
	For low power				**5ST3014-2**		1	1 unit	1AD
	2 NC				**5ST3012-2**		1	1 unit	1AD
	For low power				**5ST3015-2**		1	1 unit	1AD
	**Fault signal contacts (FC)**								
	For 5SL, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, for 5SV residual current protective devices								
	1 NO + 1 NC		0.5	▶	**5ST3020**		1	1 unit	1AD
	2 NO				**5ST3021**		1	1 unit	1AD
	2 NC				**5ST3022**		1	1 unit	1AD
	**Fault signal contacts (FC) with TEST and ACKNOWLEDGE button**								
	For 5SL, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, for 5SV residual current protective devices								
	1 NO + 1 NC		0.5	▶	**5ST3020-2**		1	1 unit	1AD
	2 NO				**5ST3021-2**		1	1 unit	1AD
	2 NC				**5ST3022-2**		1	1 unit	1AD
	**Undervoltage releases (UR)**								
	For 5SL4, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, for 5SV residual current protective devices, but not for 5SY60.. and 5SL6 miniature circuit breakers								
	With integrated auxiliary switch								
		230 AC	1	▶	**5ST3040**		1	1 unit	1AD
		110 DC			**5ST3041**		1	1 unit	1AD
		24 DC			**5ST3042**		1	1 unit	1AD
	Without integrated auxiliary switch								
		230 AC	1	▶	**5ST3043**		1	1 unit	1AD
		110 DC			**5ST3044**		1	1 unit	1AD
		24 DC			**5ST3045**		1	1 unit	1AD
	**Shunt trips (ST)**								
	For 5SL4, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, for 5SV residual current protective devices, but not for 5SY60.. and 5SL6 miniature circuit breakers								
		110 ... 415 V AC	1	▶	**5ST3030**		1	1 unit	1AD
		24 ... 48 V AC/DC	1	▶	**5ST3031**		1	1 unit	1AD

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Rated residual current	Rated current	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n							
	mA	A	MW[1]	d					
RC units									
	**For further information on RC units,** see chapter "Residual Current Protective Devices / Arc Fault Detection Devices (AFDDs)".								

[1] 1 MW (modular width) = 18 mm.

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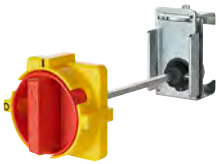
Selection and ordering data

	Version	Mounting width MW[1]	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**Mechanical rotary operating mechanism complete with handle** • For 5SY, but not for 5SYx0 1+N in 1 MW • For 5SP4, 5SL, 5TL1, 5TE2, 5TE8, 5SU1							
	Versions							
	• Handle black			**5ST3060**		1	1 unit	1AD
	• Handle red/yellow			**5ST3061**		1	1 unit	1AD
	**Terminal covers** For miniature circuit breakers, but not for 5SY60. . For additional covering of the screw openings per pole, sealable. In the case of 5SY, also prevents removal of device from the standard mounting rail.		►	**5ST3800**		1	10 units	1AD
	**Handle locking devices** Sealable to prevent undesired mechanical ON/OFF switching For 5SP and 5SY miniature circuit breakers For padlock with max. 3 mm shackle			**5ST3801**		1	1 unit	1AD
	For 5SL, 5SV, 5TL1 miniature circuit breakers For padlock with 3 ... 6 mm shackle			**5ST3806**		1	5 units	1AD
	**Padlocks** Padlocks for 5ST3801 and 5ST3806 locking devices, 5ST305. remote controlled mechanisms			**5ST3802**		1	1 unit	1AD
	Locking devices For 5SP and 5SY miniature circuit breakers comprising 5ST3801 handle locking device and 5ST3802 padlock			**5ST3803**		1	1 set	1AD
	Locking devices For 5SL, 5SV, 5TL1 miniature circuit breakers, comprising 5ST3806 handle locking device and 5ST3802 padlock			**5ST3807**		1	1 set	1AD
	**Spacers** Can be placed on either side of the standard mounting rail. Two spacers allow for convenient cable routing	0.5		**5TG8240**		1	2 units	1BK
	**Fixing parts** Made of plastic, for use on a mounting plate			**5ST2201**		1	1 unit	1AD
	**Device labels** Adhesive, for modular installation devices, e.g. 5SY, 5SL, 5TL1, etc.							
	Versions							
	• 15 mm x 6 mm, white (WIN 098)			**8WH8210-0AA35**		100	3740 units	1BT
	• 15 mm x 6 mm, yellow (WIN 099)			**8WH8210-0AA36**		100	3740 units	1BT

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Labeling system						
	Available from:		Murrplastik Systemtechnik GmbH Postfach 1143 71570 Oppenweiler, Germany Telephone: +49 7191-482-0 Email: info@murrplastik.de				
	**Terminal covers, gray** For surface mounting, degree of protection IP40, sealable, with 35 mm standard mounting rail						
	• Up to 2.5 MW		**5SW3004**		1	1 unit	1BE
	• Up to 4.5 MW		**5SW3005**		1	1 unit	1BE
	**Wall enclosures, gray** For flush mounting, degree of protection IP40, with 35 mm standard mounting rail						
	• Up to 2.5 MW		**5SW3006**		1	1 unit	1BE
	• Up to 4.5 MW		**5SW3007**		1	1 unit	1BE
	**Molded-plastic enclosures, gray** For surface mounting, degree of protection IP54, with 35 mm standard mounting rail, sealable, with transparent hinged lid						
	For 4.5 MW		**5SW1200**		1	1 unit	1BE
	**Covers** Can be assembled as mini distribution board, suitable for all devices, cover parts prepared for rail mounting of conventional label caps, comprising:						
	• End plates (for snapping onto standard mounting rail)	▶	**5ST2134**		1	10 units	1AD
	• Angled profile (approx. 1 m long)		**5ST2135**		1	5 units	1AD
	• Alternative flat profiles (as a cover between the rows of devices, length approx. 1 m)		**5ST2136**		1	5 units	1AD
	**Holders for front panel installation** Universal use for devices from 1 to 6 MW Cutout dimensions: Height $45^{+0.5}$ mm Width 23, 41, 59, 77, 95 or 113 mm		**7LF9006**		1	1 unit	1BK
	**Intermediate frames for 70 mm devices in 55 mm ALPHA SIMBOX small distribution boards** Versions						
	• 1-tier		**8GB4561**		1	1 unit	1BO
	• 2-tier		**8GB4562**		1	1 unit	1BO
	• 3-tier		**8GB4563**		1	1 unit	1BO
	• 4-tier		**8GB4564**		1	1 unit	1BO

For further information on ALPHA distribution boards, ALPHA SIMBOX small distribution boards and intermediate frames, see chapter "Power Distribution Boards / Distribution Boards"

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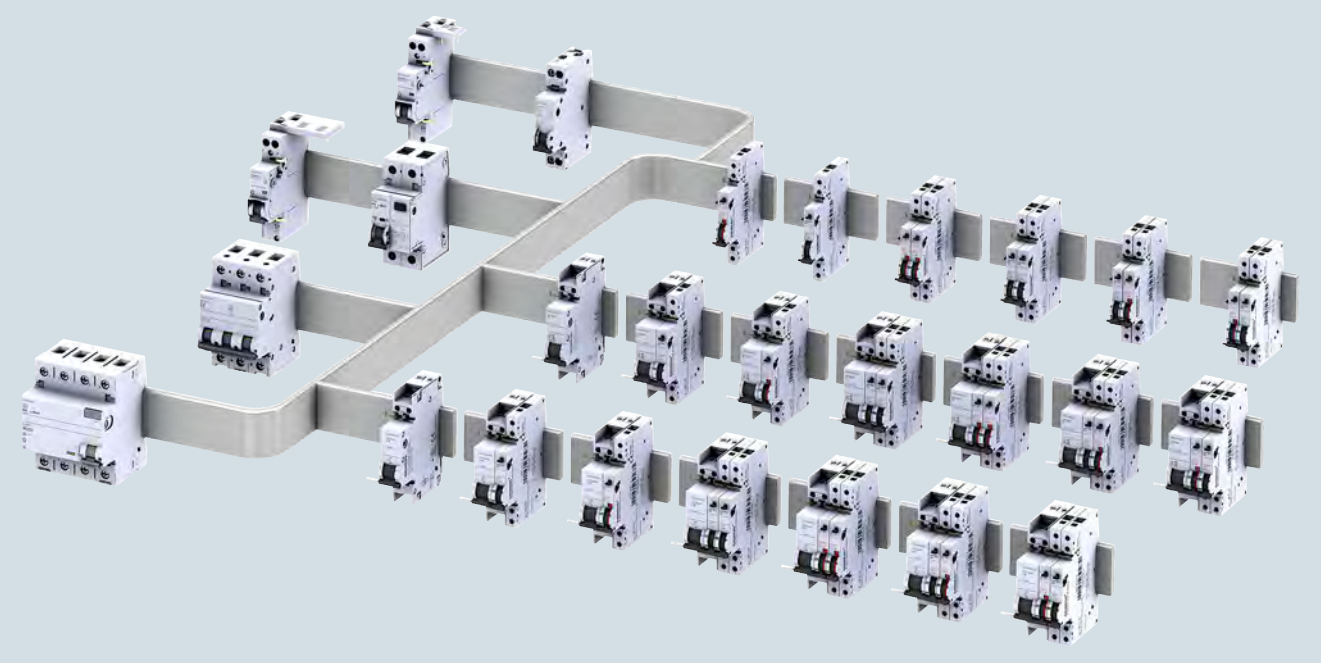
More information

The Siemens mounting concept supports the combination of all 5ST3 additional components with miniature circuit breakers of the 5SY and 5SP series and RCBOs of the 5SU1 series.

5SL and 5SY60.. miniature circuit breakers are suitable for mounting auxiliary switches and fault signal contacts. Auxiliary switches can also be mounted on 5TE8 flush-mounting circuit breakers and 5SG71 MINIZED switch disconnectors. In the case of the 5SY6 miniature circuit breaker and in the case of the RCBO, the arc fault detection device can be mounted on the left-hand side.



For further information on the mounting concept for RCBOs, see chapter "Residual Current Protective Devices / Arc Fault Detection Devices (AFDDs)".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The busbar system with pin-type connections can be used for all 5SL6, 5SJ6 ...-.KS and 5SY miniature circuit breakers with or without mounted auxiliary switch (AS) or fault signal contact (FC).

Busbars in 10 mm^2 and 16 mm^2 versions are available.

With bars that can be cut to length, the 5ST37 busbar system can be tailored to any requirements.

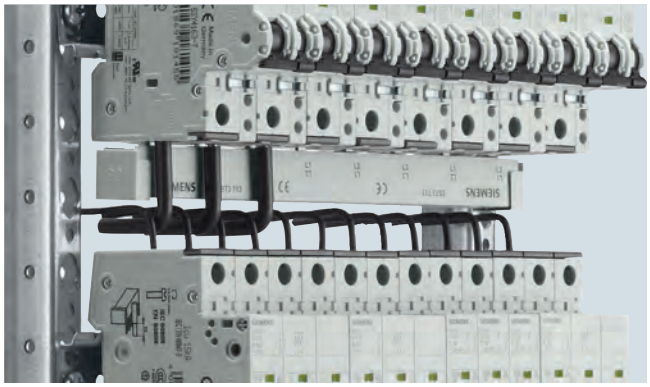
The extremely flexible 5ST36 busbar system with fixed lengths also enables installation in any length as the busbars can be overlapped.

There is no further need for time-consuming tasks, such as cutting, cutting to length, deburring, cleaning of cut surfaces and mounting of end caps.

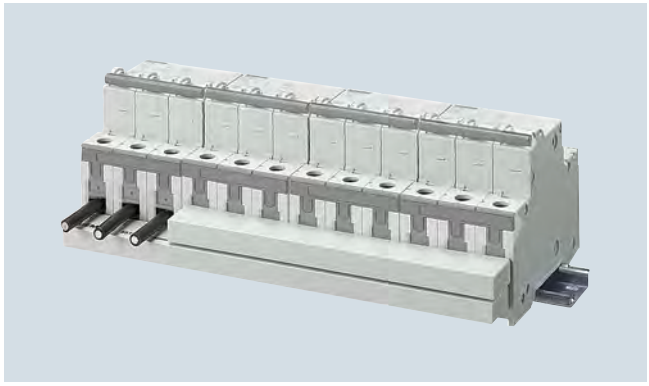
Any free pins on the busbars can be made safe by covering with touch protection.

For further information on the bus-mounting of miniature circuit breakers with residual current operated circuit breakers, see chapter "Residual Current Protective Devices / Arc Fault Detection Devices (AFDDs)".

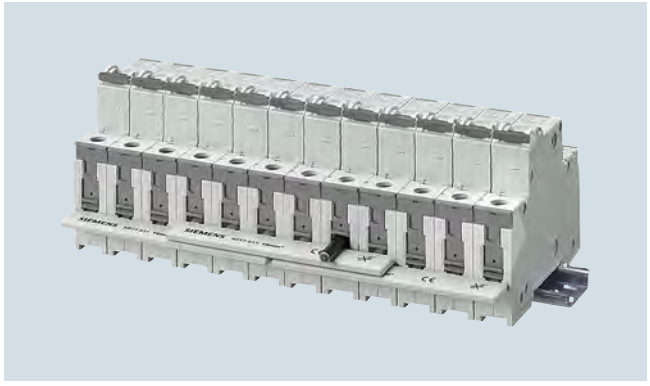
Benefits



- Between the rows of devices, the busbar, which is located at the bottom and behind the conductor, provides an optimum wiring space with easy view of the inserted conductor. This enables easy control of connections.



- The ability to overlap when mounting the busbars enables a cross-section enlargement of up to 32 mm^2 using the respective components, 10 mm^2 and 16 mm^2.



- By overlapping the busbars with fixed lengths, it is possible to achieve device combinations with any number of devices.



- The fact that the connection of the conductor is always clearly visible facilitates cable entry of all pole types and considerably reduces mounting times.

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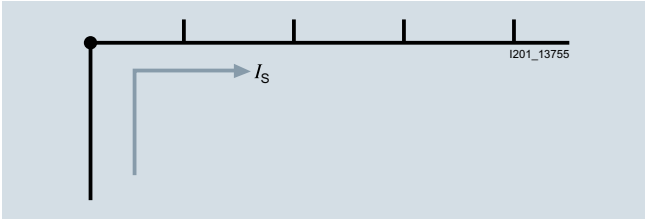
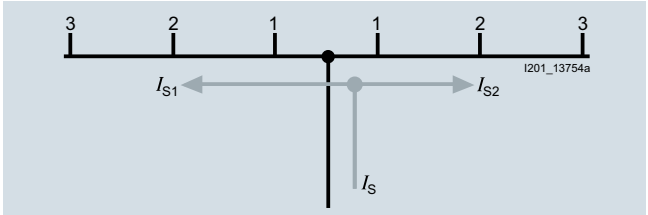
Technical specifications

			5ST3
Standards			EN 60439-1 (VDE 0660-500): 2005-01
Busbar material			SF-Cu F 24
Partition material			Plastic, Cycoloy 3600 heat-resistant over 90 °C flame-retardant and self-extinguishing, dioxin and halogen-free
Rated operational voltage U_c		V AC	400
Rated current I_n			
• Cross-section 10 mm^2		A	63
• Cross-section 16 mm^2		A	80
Rated impulse withstand voltage U_{imp}		kV	4
Test pulse voltage (1.2/50)		kV	6.2
Rated conditional short-circuit current I_{cc}		kA	25
Resistance to climate			
• Constant atmosphere	Acc. to DIN 50015		23/83; 40/92; 55/20
• Humid heat	Acc. to IEC 60068-2-30		28 cycles
Insulation coordination			
• Overvoltage category			III
• Pollution degree			2
Maximum busbar current I_S per phase			
• Infeed at the start of the busbar			
- Cross-section 10 mm^2		A	63
- Cross-section 16 mm^2		A	80
• Infeed at the center of the busbar			
- Cross-section 10 mm^2		A	100
- Cross-section 16 mm^2		A	130

Infeed at the start or end of the busbar



Infeed along the busbar or midpoint infeed



The sum of the outgoing current per branch (1, 2, 3 .. n) must not be greater than the max. busbar current I_S/phase.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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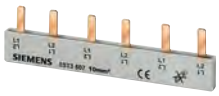
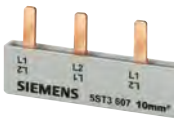
Selection and ordering data

	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	MW[1]	mm	d					
5ST36 busbar systems, 10 mm², for miniature circuit breakers, fixed lengths, cannot be cut, fully insulated								
 **Single-phase**								
For 2 MCBs 1P	1	33		**5ST3600**		1	10 units	1AD
For 6 MCBs 1P		105		**5ST3601**		1	10 units	1AD
For 12 MCBs 1P		210		**5ST3602**		1	10 units	1AD
Single-phase, for MCBs with AS or FC								
For 2 MCBs 1P	1.5	40		**5ST3603**		1	10 units	1AD
For 6 MCBs 1P		156.5		**5ST3604**		1	10 units	1AD
For 9 MCBs 1P		237		**5ST3605**		1	10 units	1AD
 **Two-phase**								
For 2 MCBs 2P	1	75.5		**5ST3606**		1	10 units	1AD
For 3 MCBs 2P		105		**5ST3607**		1	10 units	1AD
For 6 MCBs 2P		210		**5ST3608**		1	10 units	1AD
Three-phase								
For 2 MCBs 3P	1	102		**5ST3613**		1	10 units	1AD
For 3 MCBs 3P		157.5		**5ST3614**		1	10 units	1AD
For 4 MCBs 3P		210	▶	**5ST3615**		1	10 units	1AD
Three-phase, for MCBs with AS or FC								
For 2 MCBs 3P	1+1+1.5	115		**5ST3616**		1	10 units	1AD
For 4 MCBs 3P		237		**5ST3617**		1	10 units	1AD
For 6 MCBs 1P	1.5	125		**5ST3618**		1	10 units	1AD
For 9 MCBs 1P		229		**5ST3620**		1	10 units	1AD
Three-phase								
For 1 RCCB 4P N right and 8 MCBs 1P	1	210		**5ST3624**		1	10 units	1AD
For 1 RCCB 4P N left and 8 MCBs 1P	1	192		**5ST3667**		1	10 units	1AD
Four-phase								
For 2 MCBs 4P or 3P+N	1	145		**5ST3621**		1	10 units	1AD
For 3 MCBs 4P or 3P+N		215		**5ST3622**		1	10 units	1AD
For 6 MCBs 2P or 1P+N		215		**5ST3623**		1	10 units	1AD
5ST36 busbars, 16 mm², for miniature circuit breakers, fixed lengths, cannot be cut, fully insulated								
 **Single-phase**								
For 2 MCBs 1P	1	33		**5ST3630**		1	10 units	1AD
For 6 MCBs 1P		105		**5ST3631**		1	10 units	1AD
For 12 MCBs 1P		210		**5ST3632**		1	10 units	1AD
Single-phase, for MCBs with AS or FC								
For 2 MCBs 1P	1.5	40		**5ST3633**		1	10 units	1AD
For 6 MCBs 1P		156.5		**5ST3634**		1	10 units	1AD
For 9 MCBs 1P		237		**5ST3635**		1	10 units	1AD
 **Two-phase**								
For 2 MCBs 2P	1	75.5		**5ST3636**		1	10 units	1AD
For 3 MCBs 2P		105		**5ST3637**		1	10 units	1AD
For 6 MCBs 2P		210		**5ST3638**		1	10 units	1AD
Two-phase, for MCBs with AS or FC								
For 2 MCBs 2P	1 + 1.5	75.5		**5ST3640**		1	10 units	1AD
For 3 MCBs 2P		120.5		**5ST3641**		1	10 units	1AD
For 5 MCBs 2P		210		**5ST3642**		1	10 units	1AD

[1] 1 MW (modular width) = 18 mm.

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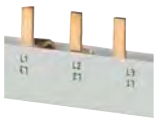
5ST standard busbars

	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	MW[1]	mm	d					
5ST36 busbars, 16 mm², for miniature circuit breakers, fixed lengths, cannot be cut, fully insulated								
Three-phase								
For 2 MCBs 3P	1	102.5		**5ST3643**		1	10 units	1AD
For 3 MCBs 3P		157.5		**5ST3644**		1	10 units	1AD
For 4 MCBs 3P		210	▶	**5ST3645**		1	10 units	1AD
Three-phase, for MCBs with AS or FC								
For 2 MCBs 3P	1+1+1.5	115		**5ST3646**		1	10 units	1AD
For 4 MCBs 3P		237		**5ST3647**		1	10 units	1AD
For 6 MCBs 1P	1.5	156		**5ST3648**		1	10 units	1AD
For 9 MCBs 1P		245		**5ST3650**		1	10 units	1AD
Three-phase								
For 1 RCCB 4P N right and 8 MCBs 1P	1	210		**5ST3654**		1	10 units	1AD
For 1 RCCB 4P N left and 8 MCBs 1P	1	210		**5ST3668**		1	10 units	1AD
Four-phase								
For 2 MCBs 4P or 3P+N	1			**5ST3651**		1	10 units	1AD
For 3 MCBs 4P or 3P+N				**5ST3652**		1	10 units	1AD
For 6 MCBs 2P or 1P+N				**5ST3653**		1	10 units	1AD
Touch protection								
For free connections, yellow (RAL 1004) 5 x 1 pin			▶	**5ST3655**		1	10 units	1AD
 **10 mm²**								
20 × 5ST3613 + 10 × 5ST3614 + 50 × 5ST3615 + 50 × 5ST3655				**5ST3656**		1	1 set	1AD
16 mm²								
20 × 5ST3643 + 10 × 5ST3644 + 50 × 5ST3645 + 50 × 5ST3655				**5ST3657**		1	1 set	1AD
5ST37 busbar system, 10 mm², 12 MW for miniature circuit breakers, can be cut, with end caps								
 **Single-phase, angled**								
For 12 MCBs 1P	1	214		**5ST3730**		1	1 unit	1AD
For 9 MCBs 1P with AS or FC	1.5			**5ST3732**		1	1 unit	1AD
Two-phase								
For 6 MCBs 2P	1			**5ST3734**		1	1 unit	1AD
For 4 MCBs 2P with AS or FC	1+1.5			**5ST3736**		1	1 unit	1AD
Three-phase								
For 4 MCBs 3P	1		▶	**5ST3738**		1	1 unit	1AD
For 3 MCBs 3P with AS or FC	1+1+1.5			**5ST3741**		1	1 unit	1AD
For 3 MCBs 1P with AS or FC	1.5			**5ST3743**		1	1 unit	1AD
Four-phase								
For 3 MCBs 4P or 3P+N	1			**5ST3745**		1	1 unit	1AD
5ST37 busbar system, 10 mm², 56 MW for miniature circuit breakers, can be cut, without end caps								
 **Single-phase, angled**								
For MCBs 1P	1	1016		**5ST3731**		1	1 unit	1AD
For MCBs 1P with AS or FC	1.5			**5ST3733**		1	1 unit	1AD
Two-phase								
For MCBs 1P and UR or AR	2			**5ST3735-2**		1	1 unit	1AD
For MCBs 2P	1			**5ST3735**		1	1 unit	1AD
For MCBs 2P with AS or FC	1+1.5			**5ST3737**		1	1 unit	1AD
Three-phase								
For MCBs 3P	1		▶	**5ST3740**		1	1 unit	1AD
For MCBs 3P with AS or FC	1+1+1.5			**5ST3742**		1	1 unit	1AD
For MCBs 1P with AS or FC	1.5			**5ST3744**		1	1 unit	1AD
Four-phase								
For MCBs 4P or 3P+N	1			**5ST3746**		1	1 unit	1AD
For MCBs 2P with AS or FC and RCBOs 1P+N with AS or FC	1+1.5			**5ST3746-2**		1	1 unit	1AD

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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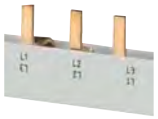
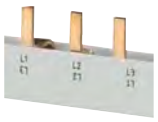
	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	MW[1]	mm	d					
5ST37 busbar system, 16 mm², 12 MW for miniature circuit breakers, can be cut, with end caps								
 **Single-phase, angled**								
For MCBs 1P	1	214	▶	**5ST3700**		1	1 unit	1AD
For MCBs 1P with AS or FC	1.5			**5ST3702**		1	1 unit	1AD
Two-phase								
For MCBs 2P	1		▶	**5ST3704**		1	1 unit	1AD
For MCBs 2P with AS or FC	1+1.5			**5ST3706**		1	1 unit	1AD
Three-phase								
For MCBs 3P	1		▶	**5ST3708**		1	1 unit	1AD
For MCBs 3P with AS or FC	1+1+1.5			**5ST3711**		1	1 unit	1AD
For MCBs 1P with AS or FC	1.5			**5ST3713**		1	1 unit	1AD
Four-phase								
For MCBs 4P or 3P+N	1			**5ST3715**		1	1 unit	1AD
5ST37 busbar system, 16 mm², 56 MW for miniature circuit breakers, can be cut, without end caps								
Single-phase, angled								
For MCBs 1P	1	1016	▶	**5ST3701**		1	1 unit	1AD
For MCBs 1P with AS or FC	1.5		▶	**5ST3703**		1	1 unit	1AD
 **Two-phase**								
For MCBs 2P	1		▶	**5ST3705**		1	1 unit	1AD
For MCBs 2P with AS or FC	1+1.5			**5ST3707**		1	1 unit	1AD
Three-phase								
For MCBs 3P	1		▶	**5ST3710**		1	1 unit	1AD
For MCBs 3P with AS or FC	1+1+1.5		▶	**5ST3712**		1	1 unit	1AD
For MCBs 1P with AS or FC	1.5			**5ST3714**		1	1 unit	1AD
Four-phase								
For MCBs 4P or 3P+N	1			**5ST3716**		1	1 unit	1AD
5ST37 busbar system, 10 mm², 56 MW can be cut, without end caps, with touch protection								
Four-phase								
For MCBs 2P and RCBOs 1P+N	1	1000		**5ST3770-2**		1	10 units	1AD
5ST37 busbar system, 16 mm², 56 MW can be cut, without end caps, with touch protection								
Four-phase								
For MCBs 2P and RCBOs 1P+N	1	1000		**5ST3770-3**		1	10 units	1AD
5ST37 busbar system, 10 mm², 16 MW can be cut, with end caps, with touch protection								
Four-phase								
For RCCBs 4P, N right and 6 MCBs 1P+N	1	292		**5ST3770-4**		1	10 units	1AD
5ST37 busbar system, 16 mm², 16 MW can be cut, with end caps, with touch protection								
Four-phase								
For RCCBs 4P, N right and 6 MCBs 1P+N	1	292		**5ST3770-5**		1	10 units	1AD
End caps for 5ST37, can be cut								
 For single-phase busbars			▶	**5ST3748**		1	10 units	1AD
For two-phase and three-phase busbars			▶	**5ST3750**		1	10 units	1AD
For four-phase busbars			▶	**5ST3718**		1	10 units	1AD
Terminals for 5ST36 and 5ST37 busbars *NEW*								
 **Terminals for conductors up to 25 mm²**								
• With cable entry in the center				**5ST3768-3**		1	10 units	1AD
• With cable entry on the left				**5ST3768-4**		1	10 units	1AD
• With cable entry on the right				**5ST3768-5**		1	10 units	1AD
Terminals for conductors up to 50 mm²								
• With cable entry in the center				**5ST3760-3**		1	10 units	1AD
• With cable entry on the left				**5ST3760-4**		1	10 units	1AD
• With cable entry on the right				**5ST3760-5**		1	10 units	1AD
Note								
The terminals are not suitable for 5ST376.								

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5ST standard busbars

	Length of cable	Number of phases	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm		d					
Series connectors, 10 mm² NEW								
								
• N-conductor blue	125	1		**5ST3781-0**		1	5 units	1AD
• Cable black				**5ST3791-0**		1	5 units	1AD
• Cable black		3		**5ST3793-0**		1	3 sets	1AD
• N-conductor blue	150	1		**5ST3781-1**		1	5 units	1AD
• Cable black				**5ST3791-1**		1	5 units	1AD
• Cable black		3		**5ST3793-1**		1	3 sets	1AD
Series connectors, 16 mm² NEW								
								
• N-conductor blue	125	1		**5ST3782-0**		1	5 units	1AD
• Cable black				**5ST3792-0**		1	5 units	1AD
• Cable black		3		**5ST3794-0**		1	3 units	1AD
• N-conductor blue	150	1		**5ST3782-1**		1	5 units	1AD
• Cable black				**5ST3792-1**		1	5 units	1AD
• Cable black		3		**5ST3794-1**		1	3 units	1AD
• N-conductor blue	200	1		**5ST3781-2**		1	10 units	1AD
• Cable black				**5ST3791-2**		1	10 units	1AD
• Cable black		3		**5ST3793-2**		1	3 units	1AD
• Cables: - 3 x black - 1 x blue		3+N		**5ST3793-3**		1	3 units	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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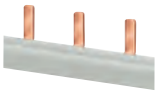
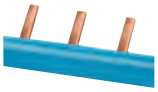
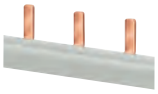
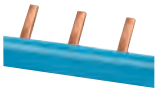
		Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW[1]	mm	d					
5ST37 busbar system, 10 mm², 12 MW for 1+N miniature circuit breakers in 1 MW of the compact range, can be cut, with end caps									
	Single-phase								
	For 12 MCBs 1+N, gray	1	216		**5ST3762**		1	10 units	1AD
	For 12 MCBs 1+N, blue	1			**5ST3763**		1	10 units	1AD
5ST37 busbar system, 10 mm², 56 MW for 1+N miniature circuit breakers in 1 MW of the compact range, can be cut, without end caps									
	Single-phase								
	For MCBs 1+N, gray	1	1016		**5ST3764**		1	10 units	1AD
	For MCBs 1+N, blue	1			**5ST3765**		1	10 units	1AD
End caps for 5ST376									
	1 set comprises a right and a left cap								
	Gray				**5ST3766**		1	10 sets	1AD
	Blue				**5ST3767**		1	10 sets	1AD
Terminals NEW									
	**Terminals, short** • For conductors up to 25 mm² • Infeed on side • Specially for single-phase busbars and for 5ST3615-1 three-phase busbars			►	**5ST3768**		1	25 units	1AD
	Terminals, short, IP20 • For conductors up to 25 mm² • Infeed on side • Specially for single-phase busbars and for 5ST3615-1 three-phase busbars				**5ST3771-2**		1	10 units	1AD

[1] 1 MW (modular width) = 18 mm.

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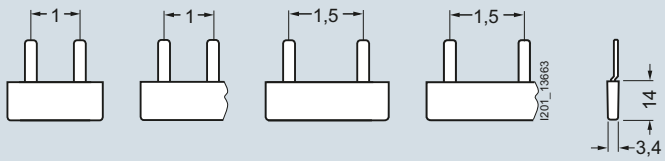
3

Dimensional drawings

5ST36
Pin spacing in MW (modular width; 1 MW = 18 mm)

Dimensions of side view in mm (approx.)

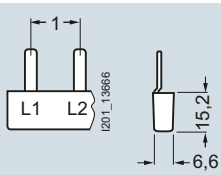


5ST3600
5ST3630

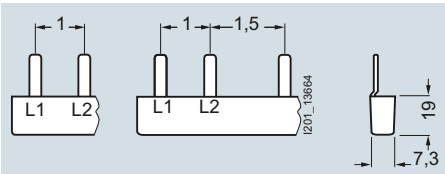
5ST3601
5ST3602
5ST3631
5ST3632

5ST3603
5ST3633

5ST3604
5ST3605
5ST3634
5ST3635



5ST3606
5ST3607
5ST3608



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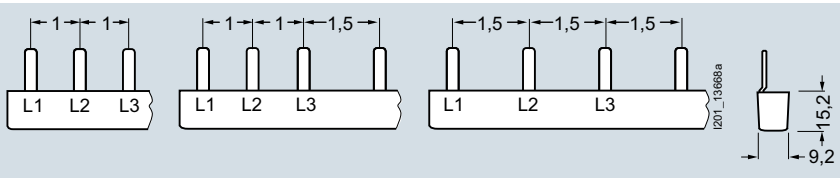
5ST3637
5ST3638

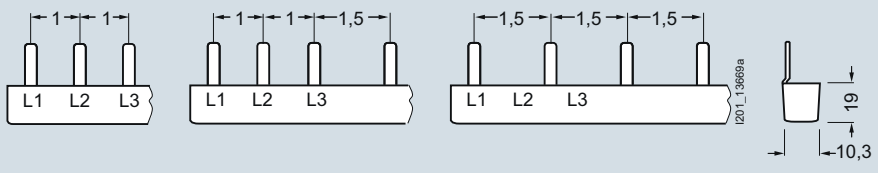
5ST3640
5ST3641
5ST3642



5ST3613
5ST3614
5ST3615
5ST3667

5ST3616
5ST3617

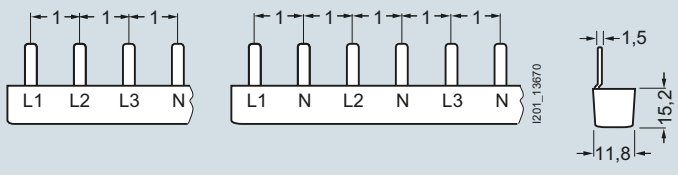
5ST3618
5ST3620



5ST3643
5ST3644
5ST3645
5ST3668

5ST3646
5ST3647

5ST3648
5ST3650



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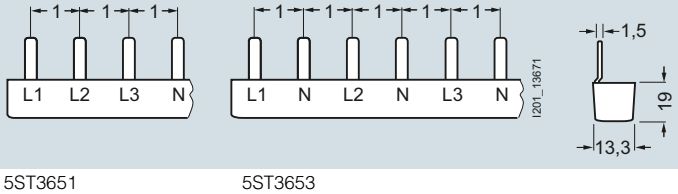
5ST3622

5ST3623



5ST3651
5ST3652

5ST3653

Minimum order quantity (PS) or a multiple thereof can be ordered.

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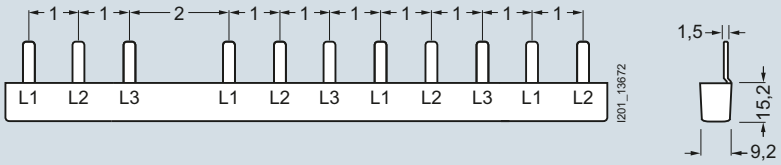
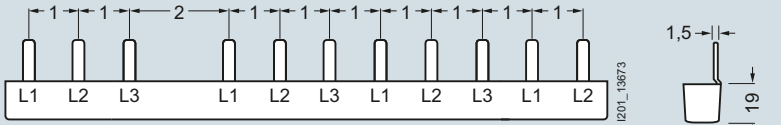
5ST36
Pin spacing in MW (modular width; 1 MW = 18 mm)

Dimensions of side view in mm (approx.)



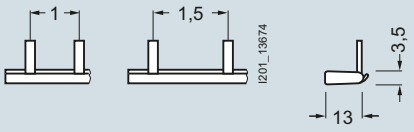
5ST3624



5ST3654

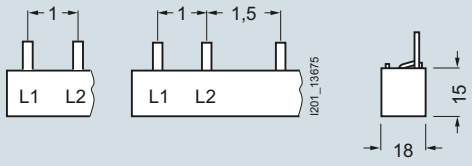
5ST37
Pin spacing in MW (modular width; 1 MW = 18 mm)

Dimensions of side view in mm (approx.)



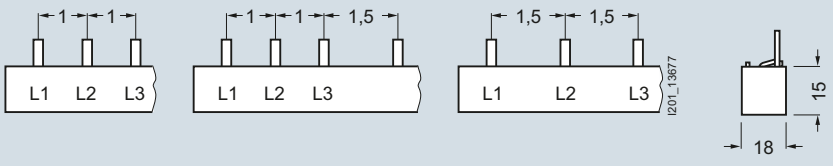
5ST3700
5ST3701
5ST3730
5ST3731
Single-phase

5ST3702
5ST3703
5ST3732
5ST3733
Single-phase



5ST3704
5ST3705
5ST3734
5ST3735
Two-phase

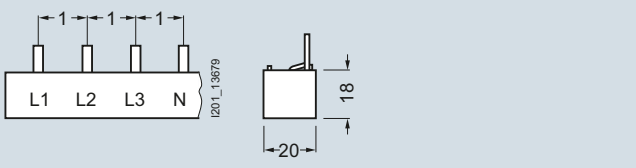
5ST3706
5ST3707
5ST3736
5ST3737
Two-phase



5ST3708
5ST3710
5ST3738
5ST3740

5ST3711
5ST3712
5ST3741
5ST3742

5ST3713
5ST3714
5ST3743
5ST3744



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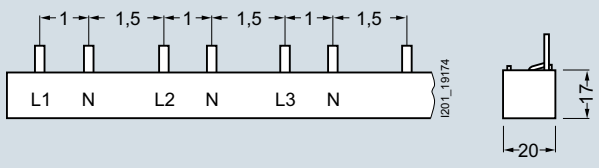
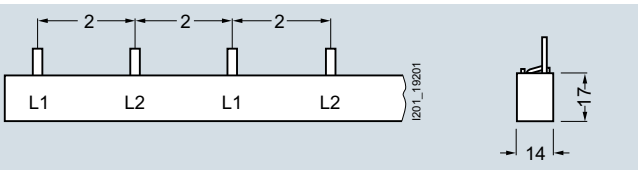
5ST3716
5ST3745
5ST3746



5ST3746-2



5ST3735-2

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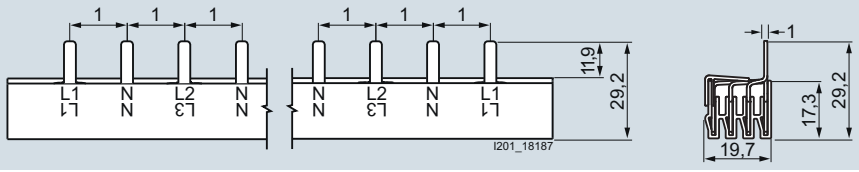
5ST standard busbars

5ST37
Pin spacing in MW (modular width; 1 MW = 18 mm)

Dimensions of side view in mm (approx.)



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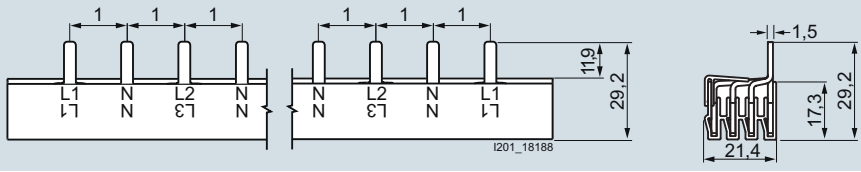
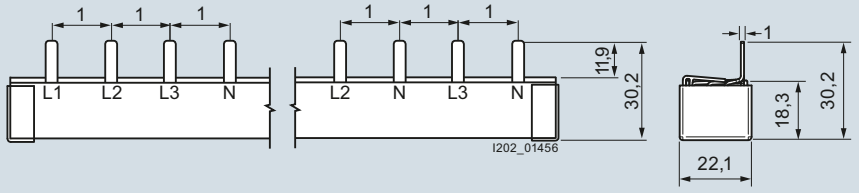


5ST3770-3



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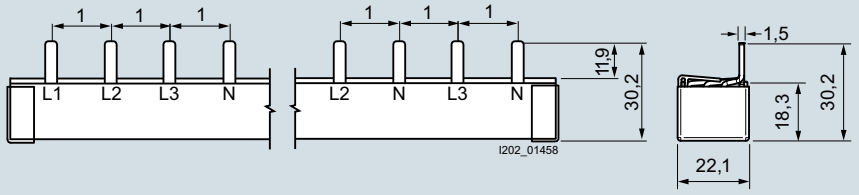
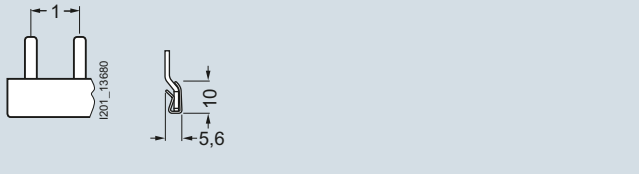
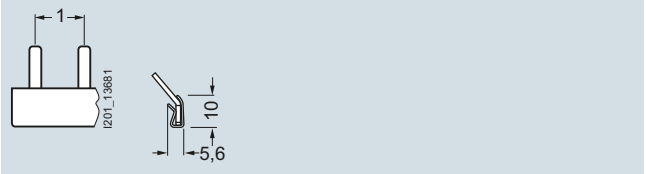


5ST3770-5



5ST3762
5ST3764



5ST3763
5ST3765

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

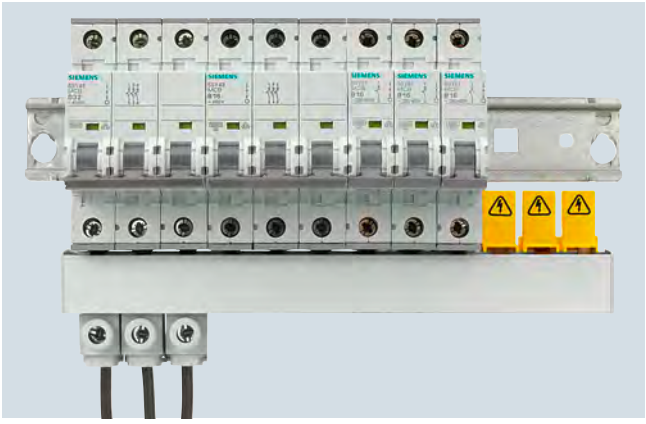
Products according to UL standards are used in North America, but also in several other countries. This is important in particular for exporting machines or electrical switchboard assemblies and equipment to the USA. Acceptance and delivery are possible only if the relevant UL standards are satisfied.

The 5ST37 busbar system according to UL 508 and CSA is suitable for both universal use worldwide with all 5SY and 5SP miniature circuit breakers for "Supplementary Protection" certified according to UL 1077 and for 3NW and 3NC fuse holders certified according to UL 512. Not approved for use in feeder circuits.

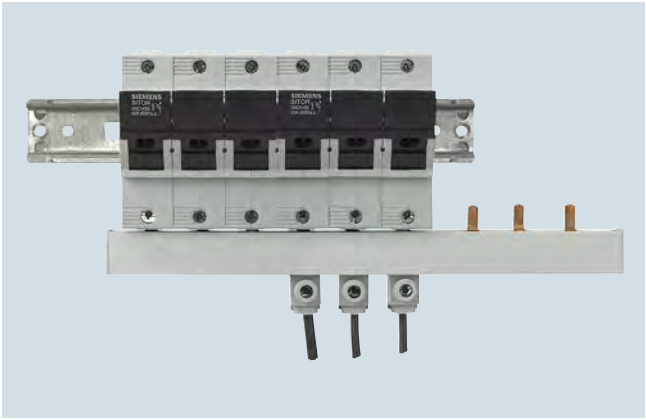
The busbars are available in single-, two- and three-phase versions with different pin spacings and with two cross-sections, 18 mm^2 and 25 mm^2. Infeed can be directly into the terminals of the miniature circuit breaker or through connection terminals.

The connection terminals are available in two versions – for direct infeed at the busbar or for infeed directly at the miniature circuit breaker/fuse holder. Pins that are not required can be covered with touch protection covers.

Benefits



- Busbar with infeed through a connection terminal directly on the miniature circuit breaker up to a conductor cross-section of 35 mm^2.



- Bus mounting with infeed at the fuse holder for conductor cross-sections up to 35 mm^2.



- Infeed directly on the miniature circuit breaker up to a conductor cross-section of 35 mm^2 and connection terminal for connection directly on the busbar up to a conductor cross-section of 50 mm^2
- Suitable for universal use according to both IEC and UL standards
- Can be used for 5SY, 5SP miniature circuit breakers and for Class CC, SITOR cylindrical and semiconductor fuse holders
- UL-tested combination – device and busbar
- Different cross-sections 18 mm^2 and 25 mm^2.

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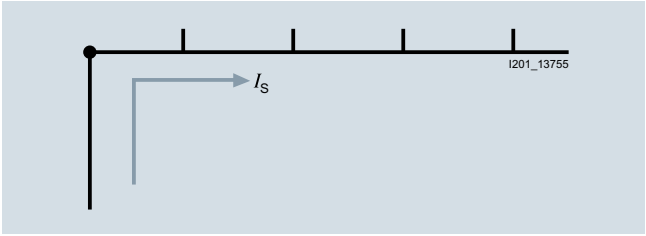
3

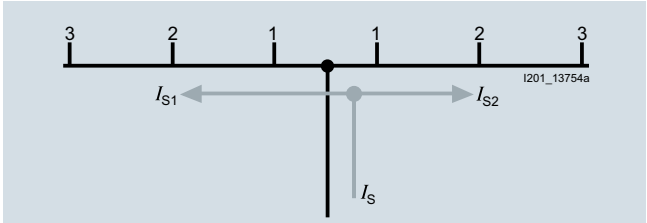
Technical specifications

			5ST37..-0HG	5ST37..-2HG	5ST3770-0HG	5ST3770-1HG
Standards			UL 508, CSA C22.2 No. 14-M 95 / IEC 60999			
Approvals			UL 508 File No. E328403 CSA			
Operational voltage						
• Acc. to IEC		V AC	690			
• Acc. to UL 508		V AC	600			
Rated conditional short-circuit current		kA	10			
• Dielectric strength		kV/mm	25			
• Surge strength		kV	> 9.5			
Max. current	UL	A	--	--	115	
	IEC	A	--	--	160	
Maximum busbar current I_S per phase						
• Infeed at the start of the busbar		A	80	100	--	--
• Infeed at the center of the busbar		A	160	200	--	--
Insulation coordination						
• Overvoltage category			III			
• Pollution degree			2			
Short-circuit current load capability			10000 A RMS sym. 600 V for three circuits			
	18 mm^2		100000 A RMS sym. for protection with Class J 175 A			
	25 mm^2		100000 A RMS sym. for protection with Class J 200 A			
Busbar cross-section		mm^2 Cu	18	25	--	--
Infeed			Any			
Conductor cross-sections	Solid	AWG	--	--	10 ... 1/0	10 ... 1
		mm^2	--	--	6 ... 35 (Cu 60 °C)	6 ... 50 (Cu 75 °C)
	Stranded	AWG	--	--	10 ... 2	
		mm^2	--	--	6 ... 35	
Terminals	± screw (Pozidriv)		--	--	2	2
• Terminal tightening torque		Nm	--	--	5	3.5
		lbs/in	--	--	50	35

Infeed at the start or end of the busbar



Infeed along the busbar or midpoint infeed



The sum of the outgoing current per branch (1, 2, 3 ... n) must not be greater than the max. busbar current I_S/phase.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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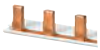
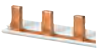
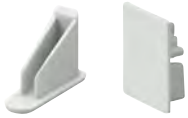
Selection and ordering data

		Pin spacing MW[1]	Length mm	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
5ST37..-.HG busbars acc. to UL 508, 18 mm², can be cut, without end caps									
	**Single-phase**								
	• For MCBs 1P (5SY) or fuse holders 10 x 38 mm/class CC (3NC1091, 3NW7513-0HG)	1	1000		**5ST3701-0HG**		1	1 unit	1AE
	• For MCBs 1P (5SY, 5SP) with AS or FC or fuse holders 14 x 51 mm (3NC1491, 3NW7111)	1.5	1000		**5ST3703-0HG**		1	1 unit	1AE
	**Two-phase**								
	• For MCBs 2P (5SY) or fuse holders 10 x 38 mm/class CC (3NC1092, 3NW7523-0HG)	1	1000		**5ST3705-0HG**		1	1 unit	1AE
	• For MCBs 2P (5SY) with AS or FC	1+1.5	1000		**5ST3707-0HG**		1	1 unit	1AE
	**Three-phase**								
	• For MCBs 3P (5SY) or fuse holders 10 x 38 mm/class CC (3NC1093, 3NW7533-0HG)	1	1000		**5ST3710-0HG**		1	1 unit	1AE
	• For MCBs 3P (5SY) with AS or FC	1+1+1.5	1000		**5ST3712-0HG**		1	1 unit	1AE
	• For MCBs 1P (5SY, 5SP) with AS or FC or fuse holders 14 x 51 mm (3NC1493, 3NW7131)	1.5	1000		**5ST3714-0HG**		1	1 unit	1AE
5ST37..-.HG busbars acc. to UL 508, 25 mm², can be cut, without end caps									
	**Single-phase**								
	For MCBs 1P (5SP) or fuse holders 14 x 51 mm (3NC1491, 3NW7111)	1.5	1000		**5ST3701-2HG**		1	1 unit	1AE
	**Two-phase**								
	For MCBs 2P (5SP) or fuse holders 14 x 51 mm (3NC1492, 3NW7121)	1.5	1000		**5ST3705-2HG**		1	1 unit	1AE
	**Three-phase**								
	For MCBs 3P (5SP) or fuse holders 14 x 51 mm (3NC1493, 3NW7131)	1.5	1000		**5ST3710-2HG**		1	1 unit	1AE
End caps for 5ST37..-.HG									
	• For single-phase busbars				**5ST3748-0HG**		1	10 units	1AE
	• For two- and three-phase busbars				**5ST3750-0HG**		1	10 units	1AE
Terminals according to UL 508									
	**Infeed to device**								
	35 mm²				**5ST3770-0HG**		1	10 units	1AE
	**Infeed to busbar**								
	50 mm²				**5ST3770-1HG**		1	10 units	1AE
Touch protection cover for busbars according to UL 508									
	5 x 1 pin				**5ST3655-0HG**		1	10 units	1AE

[1] 1 MW (modular width) = 18 mm.

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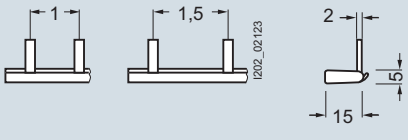
5ST3 busbars acc. to UL 508

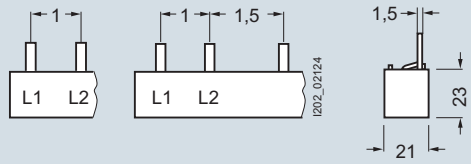
Dimensional drawings

5ST37 busbars
Pin spacing in MW (modular width; 1 MW = 18 mm)

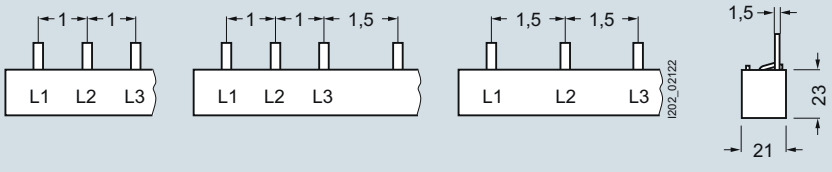
Dimensions of side view in mm (approx.)



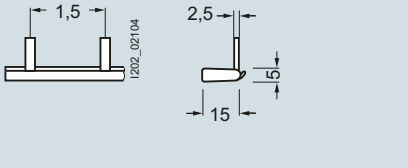
5ST3701-0HG 5ST3703-0HG



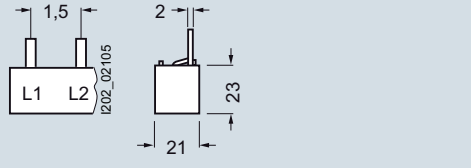
5ST3705-0HG 5ST3707-0HG



5ST3710-0HG 5ST3712-0HG 5ST3714-0HG



5ST3701-2HG



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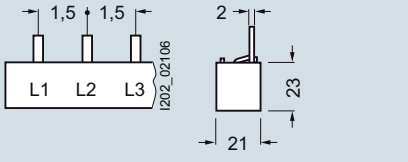
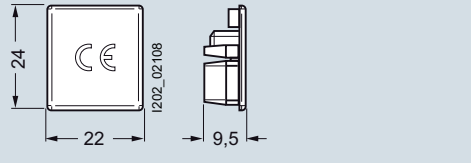
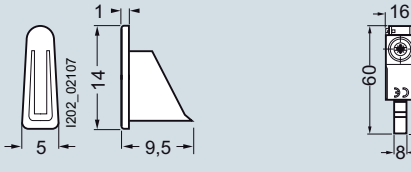


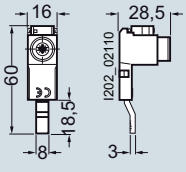
5ST3710-2HG



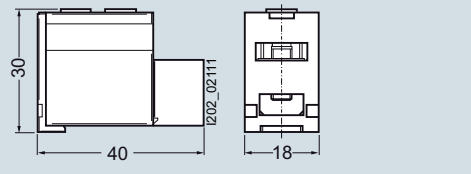
5ST3750-0HG



5ST3748-0HG



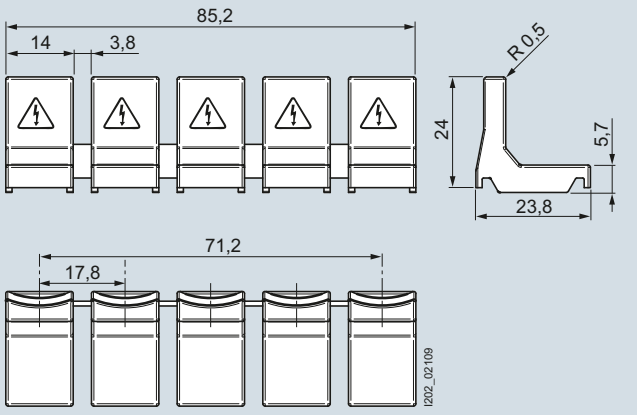
5ST3770-0HG



5ST3770-1HG

5ST36 touch protection covers
Pin spacing in MW (modular width; 1 MW = 18 mm)

Dimensions of side view in mm (approx.)



5ST3655-0HG

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Distribution blocks for standard rail mounting

Using distribution blocks it is possible to implement one-, two-, three- and four-phase systems with a rated current of up to 400 A. This allows supply terminals to be divided into several load circuits with different cable cross-sections.

The distribution blocks are made of thermoplastic with electrical and mechanical components, which enables their use under high thermal and mechanical load acc. to IEC 60947-7-1.

Technical specifications

				5ST2501	5ST2502	5ST2503
Standards, certifications				IEC 60947-7-1		
Degree of protection				IP20		
Poles				4		
Approved cable				Copper		
Conductor cross-section						
• Inputs per pole						
- Solid/stranded conductor acc. to IEC			mm²	1 x 2.5 … 16	1 x 6 … 35	1 x 10 … 50
	Neutral conductor		mm²	1 x 1.5 … 16	1 x 6 … 35	--
- Finely stranded with end sleeve			mm²	1 x 1.5 … 10	1 x 6 … 25	1 x 10 … 35
	Neutral conductor		mm²	--	1 x 6 … 25	--
• Outputs per pole						
- Solid/stranded conductor acc. to IEC		Large	mm²	8 x 1.5 … 10	2 x 4 … 16	3 x 10 … 35
		Small	mm²	--	5 x 1.5 … 6	8 x 2.5 … 16
	Neutral conductor	Large	mm²	--	6 x 4 … 16	--
		Small	mm²	--	4 x 1.5 … 10	--
- Finely stranded with end sleeve		Large	mm²	8 x 1.5 … 10	2 x 4 … 10	3 x 10 … 25
		Small		--	5 x 1.5 ... 6	8 x 1.5 … 16
	Neutral conductor	Large	mm²	--	6 x 4 … 10	--
		Small		--	4 x 1.5 ... 6	--
Tightening torque						
• Inputs			lb/in	13.5	13.5	3.5 ... 5
			Nm	1.5	1.5	2
	Plug-in connection			PZ2	PZ2	PZ2
• Outputs	Large		lb/in	13.5	13.5	13.5
			Nm	1.5	1.5	1.5
	Plug-in connection			PZ1	PZ2	PZ2
	Small		lb/in	--	7.2	13.5
			Nm	--	0.8	1.5
	Plug-in connection			--	PZ1	PZ2
Operational voltage						
• IEC, max.			V	690	690	690
Overcurrent protection						
• Max. rated current			A	80	125	160
• Rated peak withstand current (I_{pk})			kA	21.6	24	20
• Rated short-time withstand current	(I_{cw} 1 s)		kA	3	4.2	6.2
Block dimensions (D x H x W)			mm	88 x 49 x 85	75 x 45 x 98	102 x 47 x 87

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5ST2 distribution blocks

UL types

			5ST2504	5ST2505	5ST2507	5ST2508	5ST2511
Standards, certifications			UL 1059 / UL 486E / IEC 60947-7-1 UL File No. E80027 / XCFR2 C22.2 No. 158 -1987 / XCFR8			UL 1059 / UL 486E / IEC 60947-7-1 UL File No. E80027 / XCFR2	
Degree of protection			IP20				
Poles			1				
Approved cable			Copper				
Wiring type **• Front/back**			Factory and field wiring Pressure wire connector				
Conductor cross-section							
• Inputs							
- Solid and stranded conductor acc. to UL	Large	AWG	3 x 14 … 4	1 x 8 … 2	1 x 8 … 2 / 0	1 x 2 … 4 / 0	1 x 3 / 0 … 350 MCM
- Solid and stranded acc. to IEC		mm^2	3 x 2.5 … 25	10 ... 35	10 ... 70	35 ... 120	95 … 185
- Solid and stranded conductor acc. to UL	Small	AWG	--	1 x 14 … 6	--		
- Solid and stranded acc. to IEC		mm^2	--	2.5 ... 25	--		
- Finely stranded with end sleeve acc. to UL	Large	AWG	3 x 14 … 6	1 x 8 … 2	1 x 8 … 1	1 x 2 … 3 / 0	3 / 0 … 300 MCM
- Finely stranded with end sleeve acc. to IEC		mm^2	3 x 2.5 … 16	10 ... 35	10 ... 50	35 ... 95	95 … 150
- Finely stranded with end sleeve acc. to UL	Small	AWG	--	1 x 14 … 6	--		
- Finely stranded with end sleeve acc. to IEC		mm^2	--	2.5 ... 25	--		
• Outputs							
- Solid and stranded conductor acc. to UL	Top	AWG	4 x 14 … 10	6 x 14 … 4	6 x 14 … 4	4 x 16 … 8	2 x 14 … 2
- Solid and stranded acc. to IEC		mm^2	2.5 ... 6	2.5 ... 16	2.5 ... 16	2.5 ... 10	2 x 2.5 … 35
- Solid and stranded conductor acc. to UL	Center	AWG	--			5 x 14 … 6	
- Solid and stranded acc. to IEC		mm^2	--			2.5 ... 16	5 x 2.5 … 16
- Solid and stranded conductor acc. to UL	Bottom	AWG	4 x 14 … 10	--		2 x 14 … 2	4 x 14 … 8
- Solid and stranded acc. to IEC		mm^2	2.5 ... 6	--		2 x 2.5 … 35	4 x 2.5 … 10
- Finely stranded with end sleeve acc. to UL	Top	AWG	4 x 14 … 10	6 x 14 … 6	6 x 14 … 6	2 x 14 … 4	
- Finely stranded with end sleeve acc. to IEC		mm^2	2.5 ... 6	2.5 ... 16	2.5 ... 16	2 x 2.5 … 25	
- Finely stranded with end sleeve acc. to UL	Bottom	AWG	4 x 14 … 10	--		2 x 14 … 4	5 x 14 … 4
- Finely stranded with end sleeve acc. to IEC		mm^2	2.5 ... 6	--		2 x 2.5 … 25	4 x 2.5 … 25
Tightening torque							
• Inputs		lb/in	13.2 … 26.5	31 ... 44	44 ... 53	170 … 186	222
		Nm	1.5 ... 3	3.5 ... 5	5 ... 6	19 … 21	25
	Plug-in connection			Allen key (4 mm)	Allen key (5 mm)	Allen key (6 mm)	Allen key (8 mm)
• Outputs	Large	lb/in	13.2 … 26.5	17.7 … 26.5	13.2 … 26.5	31 ... 62	
		Nm	1.5 ... 3	2 ... 3	1.5 ... 3	3.5 ... 7	
	Plug-in connection		PZ2			Standard screwdriver	
	Small	lb/in	7 … 13.2	--		18 … 27	
		Nm	0.8 ... 1.5	--		2 ... 3	
	Plug-in connection		PZ1	--		Standard screwdriver	
Amperes per pole, max. (UL/IEC)		A	80/80	115/125	160/160	230/250	310/400
Operational voltage							
• UL, max. (AC)		V	600				
• IEC, max. (AC/DC)		V	1000/1500				
Overcurrent protection							
• Required class			J				
• Max. rated current (UL/IEC)		A	80/80	115/125	160/160	230/250	310/400
• SCCR RMS Sym A		kA	100				
• Rated peak withstand current (I_{pk})		kA	2.7	30		51	
• Rated short-time withstand current	(I_{cw} 1 s)	kA	1.9	4.2	11	21	
Clearance							
• Air		inches (mm)	3 / 8 (9.5)				
• Creepage distance		inches (mm)	1 / 2 (12.7)				
Fire class			UL 94V-0				
Block dimensions (D x H x W)		mm	66 x 47 x 27	74 x 47 x 27	92 x 49 x 35	96 x 49 x 45	96 x 49 x 45
Connections			With cable up to 16 mm^2	With connector or cable up to 16 mm^2 [1]	Lateral incoming feeder for parallel connection with copper bar (max. 16 x 5 mm)	--	--

[1] Copper jumper is tested for a rated current of 100 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

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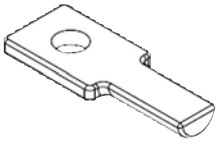
Selection and ordering data

	Version	Standard	*I*	*U*	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			A	V	MW	d					
Distribution blocks											
 5ST2504	**1-pole**	UL 1059 / UL 486E / IEC 60947-7-1	80	600	1.5		**5ST2504**		1	1 unit	1AD
			125	600	1.5		**5ST2505**		1	1 unit	1AD
		UL File No. E80027 / XCFR2 C22.2 No158 -1987 / XCFR8	160	600	2	►	**5ST2507**		1	1 unit	1AD
		UL 486E / IEC 60947-7-1	250	600	2.5	►	**5ST2508**		1	1 unit	1AD
		UL File No. E80027 / XCFR2	350	600	2.5	►	**5ST2511**		1	1 unit	1AD
 5ST2501	**4-pole**	IEC 60947-7-1	80	500	5		**5ST2501**		1	1 unit	1AD
 5ST2502		IEC 60947-7-1	125	690	5.5		**5ST2502**		1	1 unit	1AD
 5ST2503		IEC 60947-7-1	160	500	9		**5ST2503**		1	1 unit	1AD
Accessories											
 5ST2506	**Connector for 5ST2505 distribution board** • With touch protection • 20 mm² • Single-phase • 32 mm		--	--	--		**5ST2506**		1	10 units	1AD
	**Terminal lug ring terminal end for distribution block**										
	Versions										
	• For 5ST2508 distribution block						**5ST2510**		1	10 units	1AD
	• For 5ST2511 distribution block						**5ST2512**		1	10 units	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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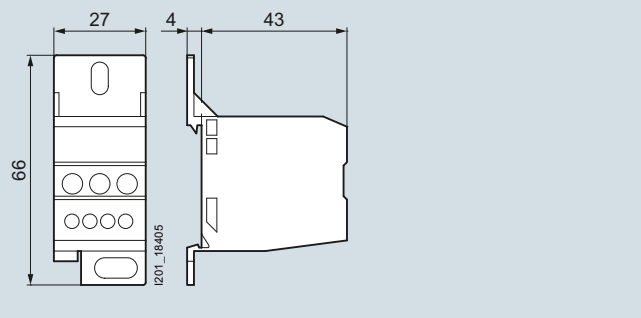
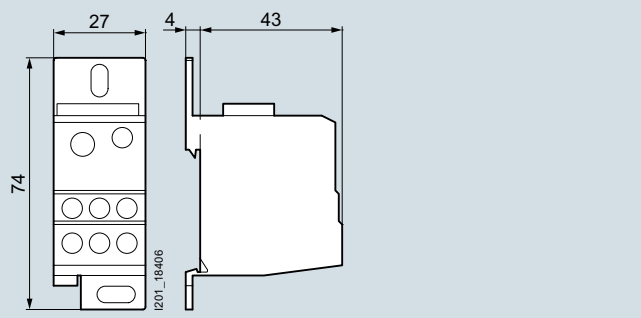
Dimensional drawings



5ST2504



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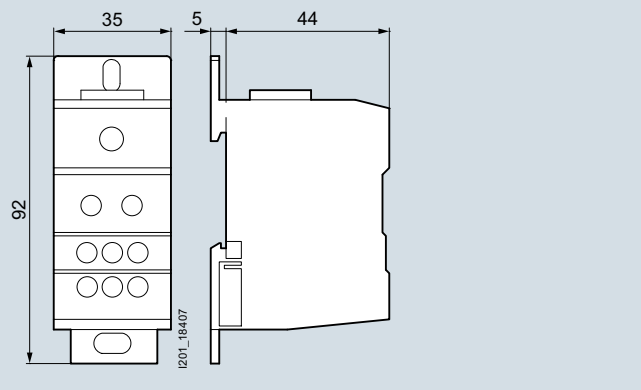

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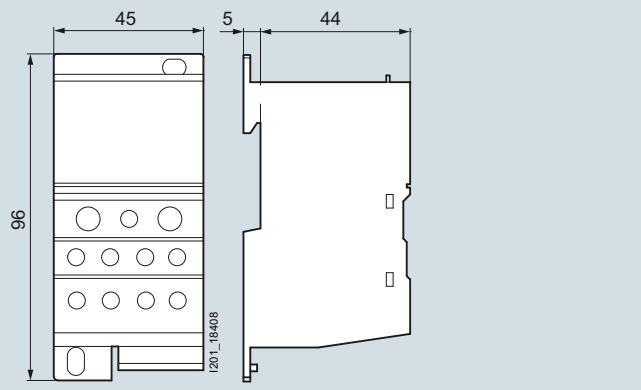

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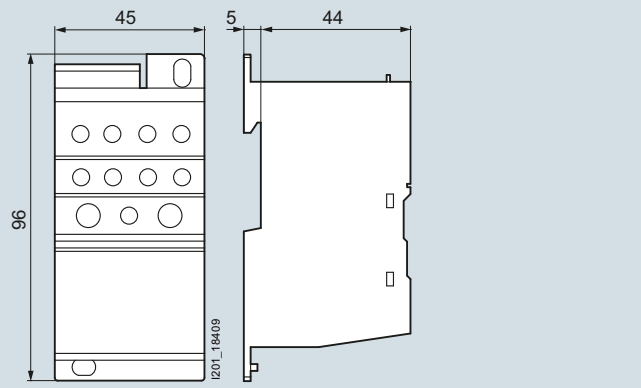

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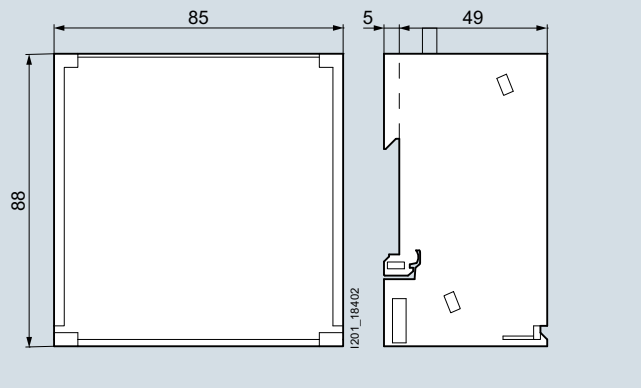

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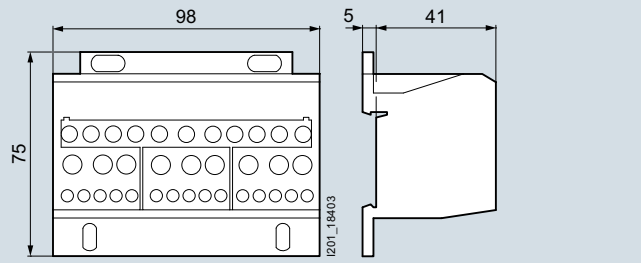

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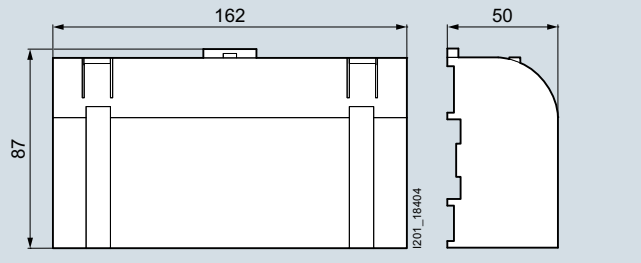

5ST2503

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

SIKclip is a fast wiring system that simplifies the connection of control switches:

- For mounting directly on the rear vertical CU busbar system
- Mounting using brackets on the rear of the DIN rail.

The 4-pole busbar can handle loads of up to 250 A, each individual contact up to 63 A.

High degree of protection because each contact is locked individually.

SIKclip is made of thermoplastic acc. to IEC 60439-3 and is suitable for high thermal loads.

Technical specifications

		5ST25..
Test specifications		EN 60947-1, EN 61439-1
Degree of protection		IP20
Max. rated current I_n	A	250 at 40 °C ambient temperature
Max. rated output current I_n	A	63 at 40 °C ambient temperature
Rated operational voltage U_n	V AC	400
Rated insulation voltage	V AC	660
Test voltage	kV	2.5, 50 Hz
Connecting cables		40 A (6 mm^2), 63 A (10 mm^2)
Connecting cable type		H07VK
Ambient temperature	°C	-5 ... +60

Selection and ordering data

	Length	Conductor cross-section	Color of insulation	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm^2		d					
	**SIKclip busbar**								
	12 MW				**5ST2520**		1	1 unit	1AD
	24 MW			▶	**5ST2521**		1	1 unit	1AD
	36 MW			▶	**5ST2522**		1	1 unit	1AD
	**Connecting cables with plug**								
	120	6	Black	▶	**5ST2523**		1	10 units	1AD
			Blue	▶	**5ST2524**		1	10 units	1AD
		10	Black		**5ST2525**		1	10 units	1AD
			Blue		**5ST2526**		1	10 units	1AD
	220	6	Black		**5ST2527**		1	10 units	1AD
			Blue		**5ST2528**		1	10 units	1AD
		10	Black		**5ST2530**		1	10 units	1AD
			Blue		**5ST2531**		1	10 units	1AD
	**Crimp connectors**				**5ST2532**		1	20 units	1AD
	For connection to cables 4/6 mm^2								
	**Fixing brackets**			▶	**5ST2533**		1	2 units	1AD
	For mounting on the rear of the standard mounting rail (pair)								

Note:

To install the SIKclip wiring system in the ALPHA AS, the busbars must be installed in a vertical rear position, but not recessed. If the busbars are in a recessed position the cables will not reach the circuit breakers.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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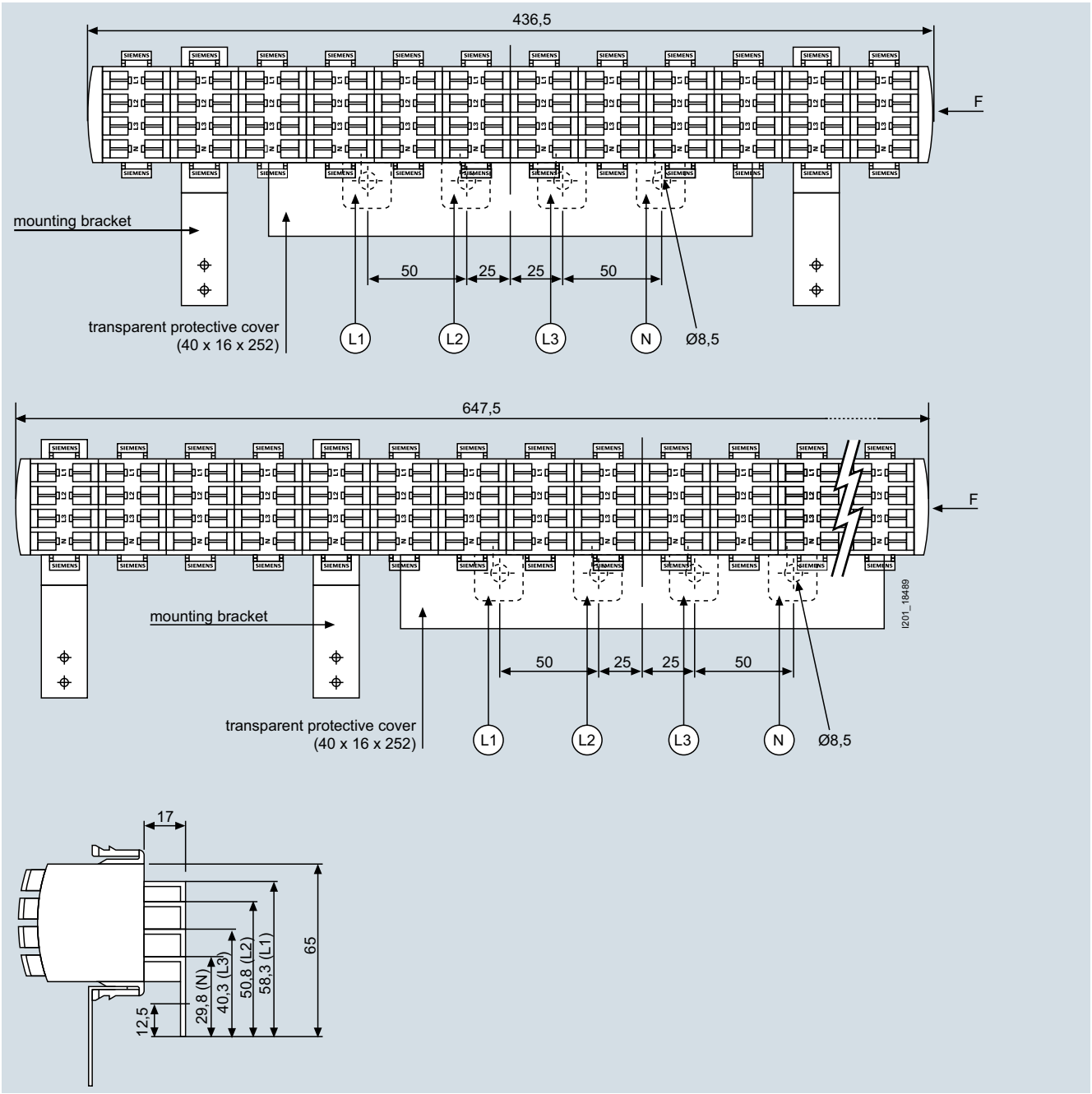
Dimensional drawings



Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

UL standards are used in North America as well as in several other countries. This is of particular importance to European exporters of electrical switchboard assemblies and equipment for machines who export to the USA, as their products will only be accepted if they meet the relevant UL standards.

A wide range of low-voltage circuit protection devices from Siemens comply with UL standards and are therefore suitable for implementation worldwide in both IEC/EN and UL applications within the framework of their specified use.

Miniature circuit breakers certified to UL 489 permit use as an all-round solution for protection tasks in distribution boards, control cabinets and control systems to UL 508A as "branch protectors". In particular, they are also approved for the protection of electrical circuits in heating, ventilating and cooling systems (HVAC), as well as for DC applications up to 60 V/125 V.

This covers a wide range of protection tasks, both in residential and non-residential buildings, as well as in industry. The tripping characteristics B, C and D to IEC/EN 60898-1 have been adapted so that they fall in the permissible tripping range according to UL 489, as well as for applications at 25 °C and 40 °C.

This means that the devices are approved for use according to both standards. The enclosure dimensions of the devices correspond to DIN format. This means that the device series are suitable for universal use worldwide according to IEC or UL standards.

The key difference between the three device series is their application in different power supply systems.

- 5SJ4…-.HG40: 240/120 V AC, 1-pole, "same polarity only",
- 5SJ4…-.HG41: 240 V AC, 1-, 2- and 3-pole,
- 5SJ4…-.HG42: 480Y/277 V AC, 1-, 2- and 3-pole.

The terminals are suitable for "field wiring". This means that the devices can be installed not only in factory-built distribution boards and control cabinets, but also on-site in a customer system.

Using this mounting concept, all 5ST3. . .-.HG additional components can be combined with miniature circuit breakers of the 5SJ4…-.HG range. The auxiliary switch (AS) signals the contact position. In the event of a fault, the fault signal contact (FC) signals the automatic tripping of the miniature circuit breaker as well as the contact position. Shunt trips (ST) are used for remote tripping of miniature circuit breakers. Captive metal brackets on the additional components ensure fast mounting on the devices.

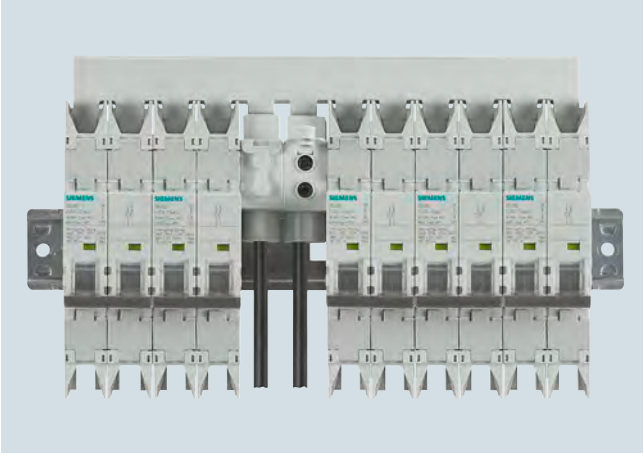
Single-, two- and three-phase busbars in 3 lengths with 6, 12 or 18 pins are available as accessories for all device series for "field wiring". The infeed is via connection terminals, which are available in two versions, for direct infeed at either the busbar or the miniature circuit breakers. Pins that are not required can be covered with touch protection covers.

Benefits

- Can be used globally for all applications in residential, non-residential and industrial buildings. This facilitates the planning of installations and enhances export opportunities
- The devices can be used according to IEC/EN 60898-1 and UL 489, which means they can be installed anywhere in the world
- Miniature circuit breakers with 480Y/277 V up to 40 A, with 240/120 V and 240 V up to 63 A
- Can be used for both AC voltage and DC voltage up to 125 V
- Rated making and breaking capacity up to 14 kA in acc. with UL 489 and up to 15 kA in acc. with IEC 60947-2
- Fast mounting with busbars up to 115 A and feeder terminals up to 50 mm^2.



- Infeed directly at miniature circuit breaker for conductor cross-sections up to 35 mm^2



- Bus mounting with central infeed directly on the busbar up to conductor cross-section of 50 mm^2



- Accessories: Auxiliary switches, fault signal contacts and shunt trips up to 480 V can be easily mounted onto the miniature circuit breaker

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Technical specifications

			5SJ4...-.HG40	5SJ4...-.HG41	5SJ4...-.HG42
Standards			EN 60947-2; UL 489 (UL File E243414); UL 489A (UL File E332105); CSA C22.2 No. 5-02		
Approvals			see chapter "Appendix"		
Tripping characteristic			B, C, D	C, D	
Rated voltage					
• Acc. to EN 60947-2		V AC	230/400	230/400	230/400
• Acc. to UL 489 and CSA C22.2 No 5-02		V AC V DC/1P V DC/2P	240/120 60 --	240 60 125	480/277 60 125
Operational voltage	Min.	V AC/DC per pole	24		
• Acc. to IEC 60898-1	Max. Max.	V DC/pole V AC	60 250/440		
• Acc. to UL 489	Max.	V DC/pole	72		
Rated breaking capacity					
• I_{cn} acc. to IEC 60898-1		kA AC	10		
• I_{cu} acc. to IEC 60947-2		kA AC	10		
• Acc. to UL 489/UL 489A and CSA C22.2 No. 5-02		kA AC	14/10[1)]	14/10[1)]	10[1)]
Insulation coordination					
• Rated insulation voltage		V AC	250	250/440	
• Pollution degree for overvoltage category			3/III		
Rated frequency		Hz	50/60		
Touch protection acc. to EN 50274			Yes		
Handle end position, sealable			Yes		
Degree of protection acc. to EN 60529			IP40 in the area of the handle		
CFC and silicone-free			Yes		
Mounting			On standard mounting rail		
Terminals	± screw (Pozidriv)		2		
• Combined terminals at both ends			Yes		
• Terminal tightening torque, only for Cu, 60/75 °C		Nm lbs/in.	3.5 31		
Conductor cross-sections					
• Solid and stranded, acc. to UL 489 and CSA C22.2 No 5-02		AWG	14 ... 4		
• Solid and stranded, acc. to IEC 60898-1		mm^2	1.5 ... 25		
• Finely stranded, with end sleeve		mm^2	1.5 ... 25		
Mains connection			Any		
Mounting position			Any		
Service life, on average, with rated load			20000 actuations		
EMC environment					
• Acc. to EN 60947-2			Suitable for environment "B" (immunity to interference not applicable)		
Ambient temperature		°C	-25 ... +55, max. 95% humidity		
Storage temperature		°C	-40 ... +75		
Resistance to climate acc. to IEC 60068-2-30			6 cycles		
Resistance to vibrations acc. to IEC 60068-2-6		m/s^2	50 at 25 ... 150 Hz and 60 at 35 Hz (4 s)		

1) For detailed information about rated switching capacity, see Configuration Manual "Miniature circuit breakers" at: www.siemens.com/lowvoltage/manuals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Additional components			Auxiliary switches (AS)			Fault signal contacts (FC)	Shunt trips (ST)	
			5ST3010-0HG 5ST3011-0HG 5ST3012-0HG			5ST3020-0HG 5ST3021-0HG 5ST3022-0HG	5ST3030-0HG	5ST3031-0HG
Standards			UL 489, UL File E321559; CSA 22.2 No. 5-02 IEC/EN 62019, IEC/EN 60947-5-1				IEC/EN 60947-1	
Operational voltage/operational current (load)								
• Acc. to IEC/EN 62019 (acc. to IEC/EN 60947-5-1)		V AC	400	230			110 ... 415	24 ... 60
		NC: AC13 A, NO: AC14 A	2	6			--	--
		V DC	220	110	60	24	--	24 ... 60
		DC13 A	1 (0.5)	1 (0.75)	3 (1.5)	6 (3)	--	--
• Acc. to UL		V AC	480	277	240	120	110 ... 480	24 ... 60
		A AC	1.5	3	4	6	--	--
		V DC	125	60			--	24 ... 60
		A DC	1	3			--	--
Rated frequency		Hz	50/60					
Short-circuit protection			Miniature circuit breaker or 6 A fuse					
Minimum contact load			50 mA, 24 V					
Tripping operations			--			--	Max. 2000	
Service life, on average, with rated load			12000 actuations					
Primary operating range		x U_n	--				0.7 ... 1.1	
Conductor cross-sections		AWG	22 ... 14				22 ... 14	
		mm^2	0.5 ... 2.5				0.5 ... 2.5	
Terminals	± screw (Pozidriv)		1			1	1	
• Terminal tightening torque		Nm	0.5				0.8	
		lb/in	4.5				6.8	

Version		Busbars	Busbars, can be cut	Terminals		
Type		**5ST3663-.HG[1)] 5ST3664-.HG[1)] 5ST3665-.HG[1)]**	**5ST3701-3HG 5ST3703-3HG 5ST3705-3HG 5ST3707-3HG 5ST3710-3HG 5ST3712-3HG 5ST3714-3HG**	**5ST3666-0HG[1)]**	**5ST3666-2HG[1)]**	**5ST3770-3HG**
Standards		UL 489; UL File No. E321559	UL 489; UL File No. E315616	UL 489; UL File No. E321559		UL 489; UL File No. E315616
Operational voltage						
• Acc. to IEC	V AC	1000/1-pole		600/2- to 3-pole		
• Acc. to UL 489	V AC	1000/1-pole		600/2- to 3-pole (60 Hz)		
Rated conditional short-circuit current	kA	10 kA at 600 V	10 kA at 600 V with J 175 A fuse	10 kA at 600 V		10 kA at 600 V with J 175 A fuse
• Dielectric strength	kV/mm	35				
• Surge strength	kV	> 9.5	> 10	> 9.5		> 10
Rated current	A	115 at 40 °C ambient temperature	80 (infeed end) 160 (infeed center) at 35 °C ambient temperature	115 (Cu 75 °C) 95 (Cu 60 °C) at 40 °C ambient temperature	115 (Cu 75 °C) 110 (Cu 60 °C) at 40 °C ambient temperature	115 (Cu 75 °C) 95 (Cu 60 °C) at 35 °C ambient temperature
Insulation coordination						
• Pollution degree		2				
• Overvoltage category		III				
Busbar cross-section (Cu)	mm^2	16	18	16		18
Infeed		Any				
Conductor cross-sections						
• AWG cables	AWG	--		14 ... 2	14 ... 1	14 ... 2
• Solid and stranded	mm^2	--		2.5 ... 35	2.5 ... 50	2.5 ... 35
Terminals		--		6 mm Allen key	± Screw (Pozidriv) 2	6 mm Allen key
• Terminal tightening torque	Nm	--		5.5	4	5.5
	lbs/in.	--		50	35	50
Temperature resistance	°C	125 – UL 94-V0/0.4 mm				
Interrupting rating		10 kA at 600 V AC/DC				

[1)] Note:

The busbars and terminals are suitable for applications up to 80 A if installed in distribution boards with min. dimensions of 18 x 18 x 6.25 inches, or up to 115 A if installed in distribution boards with min. dimensions of 30 x 30 x 10 inches.

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Selection and ordering data

	I_n	Mounting width	SD	Characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d					
	Miniature circuit breakers "same polarity only" 1P, 240 V AC							
	6	1		**5SJ4106-6HG40**		1	1 unit	1AE
	10			**5SJ4110-6HG40**		1	1 unit	1AE
	13			**5SJ4113-6HG40**		1	1 unit	1AE
	15			**5SJ4118-6HG40**		1	1 unit	1AE
	16			**5SJ4116-6HG40**		1	1 unit	1AE
	20			**5SJ4120-6HG40**		1	1 unit	1AE
	25			**5SJ4125-6HG40**		1	1 unit	1AE
	30			**5SJ4130-6HG40**		1	1 unit	1AE
	32			**5SJ4132-6HG40**		1	1 unit	1AE
	35			**5SJ4135-6HG40**		1	1 unit	1AE
	40			**5SJ4140-6HG40**		1	1 unit	1AE
	45			**5SJ4145-6HG40**		1	1 unit	1AE
	50			**5SJ4150-6HG40**		1	1 unit	1AE
	60			**5SJ4160-6HG40**		1	1 unit	1AE
	63			**5SJ4163-6HG40**		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
	Miniature circuit breakers "same polarity only" 1P, 240 V AC													
	0.3	1		**5SJ4114-7HG40**		1	1 unit	1AE		**5SJ4114-8HG40**		1	1 unit	1AE
	0.5			**5SJ4105-7HG40**		1	1 unit	1AE		**5SJ4105-8HG40**		1	1 unit	1AE
	1			**5SJ4101-7HG40**		1	1 unit	1AE		**5SJ4101-8HG40**		1	1 unit	1AE
	1.6			**5SJ4115-7HG40**		1	1 unit	1AE		**5SJ4115-8HG40**		1	1 unit	1AE
	2			**5SJ4102-7HG40**		1	1 unit	1AE		**5SJ4102-8HG40**		1	1 unit	1AE
	3			**5SJ4103-7HG40**		1	1 unit	1AE		**5SJ4103-8HG40**		1	1 unit	1AE
	4			**5SJ4104-7HG40**		1	1 unit	1AE		**5SJ4104-8HG40**		1	1 unit	1AE
	5			**5SJ4111-7HG40**		1	1 unit	1AE		**5SJ4111-8HG40**		1	1 unit	1AE
	6			**5SJ4106-7HG40**		1	1 unit	1AE		**5SJ4106-8HG40**		1	1 unit	1AE
	8			**5SJ4108-7HG40**		1	1 unit	1AE		**5SJ4108-8HG40**		1	1 unit	1AE
	10			**5SJ4110-7HG40**		1	1 unit	1AE		**5SJ4110-8HG40**		1	1 unit	1AE
	13			**5SJ4113-7HG40**		1	1 unit	1AE		**5SJ4113-8HG40**		1	1 unit	1AE
	15			**5SJ4118-7HG40**		1	1 unit	1AE		**5SJ4118-8HG40**		1	1 unit	1AE
	16			**5SJ4116-7HG40**		1	1 unit	1AE		**5SJ4116-8HG40**		1	1 unit	1AE
	20			**5SJ4120-7HG40**		1	1 unit	1AE		**5SJ4120-8HG40**		1	1 unit	1AE
	25			**5SJ4125-7HG40**		1	1 unit	1AE		**5SJ4125-8HG40**		1	1 unit	1AE
	30			**5SJ4130-7HG40**		1	1 unit	1AE		**5SJ4130-8HG40**		1	1 unit	1AE
	32			**5SJ4132-7HG40**		1	1 unit	1AE		**5SJ4132-8HG40**		1	1 unit	1AE
	35			**5SJ4135-7HG40**		1	1 unit	1AE		**5SJ4135-8HG40**		1	1 unit	1AE
	40			**5SJ4140-7HG40**		1	1 unit	1AE		**5SJ4140-8HG40**		1	1 unit	1AE
	45			**5SJ4145-7HG40**		1	1 unit	1AE		**5SJ4145-8HG40**		1	1 unit	1AE
	50			**5SJ4150-7HG40**		1	1 unit	1AE		**5SJ4150-8HG40**		1	1 unit	1AE
	60			**5SJ4160-7HG40**		1	1 unit	1AE		**5SJ4160-8HG40**		1	1 unit	1AE
	63			**5SJ4163-7HG40**		1	1 unit	1AE		**5SJ4163-8HG40**		1	1 unit	1AE
	Miniature circuit breakers 1P, 240 V AC													
	0.3	1		**5SJ4114-7HG41**		1	1 unit	1AE		**5SJ4114-8HG41**		1	1 unit	1AE
	0.5			**5SJ4105-7HG41**		1	1 unit	1AE		**5SJ4105-8HG41**		1	1 unit	1AE
	1			**5SJ4101-7HG41**		1	1 unit	1AE		**5SJ4101-8HG41**		1	1 unit	1AE
	1.6			**5SJ4115-7HG41**		1	1 unit	1AE		**5SJ4115-8HG41**		1	1 unit	1AE
	2			**5SJ4102-7HG41**		1	1 unit	1AE		**5SJ4102-8HG41**		1	1 unit	1AE
	3			**5SJ4103-7HG41**		1	1 unit	1AE		**5SJ4103-8HG41**		1	1 unit	1AE
	4			**5SJ4104-7HG41**		1	1 unit	1AE		**5SJ4104-8HG41**		1	1 unit	1AE
	5			**5SJ4111-7HG41**		1	1 unit	1AE		**5SJ4111-8HG41**		1	1 unit	1AE
	6			**5SJ4106-7HG41**		1	1 unit	1AE		**5SJ4106-8HG41**		1	1 unit	1AE
	8			**5SJ4108-7HG41**		1	1 unit	1AE		**5SJ4108-8HG41**		1	1 unit	1AE
	10			**5SJ4110-7HG41**		1	1 unit	1AE		**5SJ4110-8HG41**		1	1 unit	1AE
	13			**5SJ4113-7HG41**		1	1 unit	1AE		**5SJ4113-8HG41**		1	1 unit	1AE
	15			**5SJ4118-7HG41**		1	1 unit	1AE		**5SJ4118-8HG41**		1	1 unit	1AE
	16			**5SJ4116-7HG41**		1	1 unit	1AE		**5SJ4116-8HG41**		1	1 unit	1AE
	20			**5SJ4120-7HG41**		1	1 unit	1AE		**5SJ4120-8HG41**		1	1 unit	1AE
	25			**5SJ4125-7HG41**		1	1 unit	1AE		**5SJ4125-8HG41**		1	1 unit	1AE
	30			**5SJ4130-7HG41**		1	1 unit	1AE		**5SJ4130-8HG41**		1	1 unit	1AE
	32			**5SJ4132-7HG41**		1	1 unit	1AE		**5SJ4132-8HG41**		1	1 unit	1AE
	35			**5SJ4135-7HG41**		1	1 unit	1AE		**5SJ4135-8HG41**		1	1 unit	1AE
	40			**5SJ4140-7HG41**		1	1 unit	1AE		**5SJ4140-8HG41**		1	1 unit	1AE
	45			**5SJ4145-7HG41**		1	1 unit	1AE		**5SJ4145-8HG41**		1	1 unit	1AE
	50			**5SJ4150-7HG41**		1	1 unit	1AE		**5SJ4150-8HG41**		1	1 unit	1AE
	60			**5SJ4160-7HG41**		1	1 unit	1AE		**5SJ4160-8HG41**		1	1 unit	1AE
	63			**5SJ4163-7HG41**		1	1 unit	1AE		**5SJ4163-8HG41**		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

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5SJ4. . . - .HG miniature circuit breakers acc. to UL 489 and IEC, and accessories

	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
	Miniature circuit breakers 2P, 240 V AC													
	0.3	2		**5SJ4214-7HG41**		1	1 unit	1AE		**5SJ4214-8HG41**		1	1 unit	1AE
	0.5			**5SJ4205-7HG41**		1	1 unit	1AE		**5SJ4205-8HG41**		1	1 unit	1AE
	1			**5SJ4201-7HG41**		1	1 unit	1AE		**5SJ4201-8HG41**		1	1 unit	1AE
	1.6			**5SJ4215-7HG41**		1	1 unit	1AE		**5SJ4215-8HG41**		1	1 unit	1AE
	2			**5SJ4202-7HG41**		1	1 unit	1AE		**5SJ4202-8HG41**		1	1 unit	1AE
	3			**5SJ4203-7HG41**		1	1 unit	1AE		**5SJ4203-8HG41**		1	1 unit	1AE
	4			**5SJ4204-7HG41**		1	1 unit	1AE		**5SJ4204-8HG41**		1	1 unit	1AE
	5			**5SJ4211-7HG41**		1	1 unit	1AE		**5SJ4211-8HG41**		1	1 unit	1AE
	6			**5SJ4206-7HG41**		1	1 unit	1AE		**5SJ4206-8HG41**		1	1 unit	1AE
	8			**5SJ4208-7HG41**		1	1 unit	1AE		**5SJ4208-8HG41**		1	1 unit	1AE
	10			**5SJ4210-7HG41**		1	1 unit	1AE		**5SJ4210-8HG41**		1	1 unit	1AE
	13			**5SJ4213-7HG41**		1	1 unit	1AE		**5SJ4213-8HG41**		1	1 unit	1AE
	15			**5SJ4218-7HG41**		1	1 unit	1AE		**5SJ4218-8HG41**		1	1 unit	1AE
	16			**5SJ4216-7HG41**		1	1 unit	1AE		**5SJ4216-8HG41**		1	1 unit	1AE
	20			**5SJ4220-7HG41**		1	1 unit	1AE		**5SJ4220-8HG41**		1	1 unit	1AE
	25			**5SJ4225-7HG41**		1	1 unit	1AE		**5SJ4225-8HG41**		1	1 unit	1AE
	30			**5SJ4230-7HG41**		1	1 unit	1AE		**5SJ4230-8HG41**		1	1 unit	1AE
	32			**5SJ4232-7HG41**		1	1 unit	1AE		**5SJ4232-8HG41**		1	1 unit	1AE
	35			**5SJ4235-7HG41**		1	1 unit	1AE		**5SJ4235-8HG41**		1	1 unit	1AE
	40			**5SJ4240-7HG41**		1	1 unit	1AE		**5SJ4240-8HG41**		1	1 unit	1AE
	45			**5SJ4245-7HG41**		1	1 unit	1AE		**5SJ4245-8HG41**		1	1 unit	1AE
	50			**5SJ4250-7HG41**		1	1 unit	1AE		**5SJ4250-8HG41**		1	1 unit	1AE
	60			**5SJ4260-7HG41**		1	1 unit	1AE		**5SJ4260-8HG41**		1	1 unit	1AE
	63			**5SJ4263-7HG41**		1	1 unit	1AE		**5SJ4263-8HG41**		1	1 unit	1AE
	Miniature circuit breakers 3P, 240 V AC													
	0.3	3		**5SJ4314-7HG41**		1	1 unit	1AE		**5SJ4314-8HG41**		1	1 unit	1AE
	0.5			**5SJ4305-7HG41**		1	1 unit	1AE		**5SJ4305-8HG41**		1	1 unit	1AE
	1			**5SJ4301-7HG41**		1	1 unit	1AE		**5SJ4301-8HG41**		1	1 unit	1AE
	1.6			**5SJ4315-7HG41**		1	1 unit	1AE		**5SJ4315-8HG41**		1	1 unit	1AE
	2			**5SJ4302-7HG41**		1	1 unit	1AE		**5SJ4302-8HG41**		1	1 unit	1AE
	3			**5SJ4303-7HG41**		1	1 unit	1AE		**5SJ4303-8HG41**		1	1 unit	1AE
	4			**5SJ4304-7HG41**		1	1 unit	1AE		**5SJ4304-8HG41**		1	1 unit	1AE
	5			**5SJ4311-7HG41**		1	1 unit	1AE		**5SJ4311-8HG41**		1	1 unit	1AE
	6			**5SJ4306-7HG41**		1	1 unit	1AE		**5SJ4306-8HG41**		1	1 unit	1AE
	8			**5SJ4308-7HG41**		1	1 unit	1AE		**5SJ4308-8HG41**		1	1 unit	1AE
	10			**5SJ4310-7HG41**		1	1 unit	1AE		**5SJ4310-8HG41**		1	1 unit	1AE
	13			**5SJ4313-7HG41**		1	1 unit	1AE		**5SJ4313-8HG41**		1	1 unit	1AE
	15			**5SJ4318-7HG41**		1	1 unit	1AE		**5SJ4318-8HG41**		1	1 unit	1AE
	16			**5SJ4316-7HG41**		1	1 unit	1AE		**5SJ4316-8HG41**		1	1 unit	1AE
	20			**5SJ4320-7HG41**		1	1 unit	1AE		**5SJ4320-8HG41**		1	1 unit	1AE
	25			**5SJ4325-7HG41**		1	1 unit	1AE		**5SJ4325-8HG41**		1	1 unit	1AE
	30			**5SJ4330-7HG41**		1	1 unit	1AE		**5SJ4330-8HG41**		1	1 unit	1AE
	32			**5SJ4332-7HG41**		1	1 unit	1AE		**5SJ4332-8HG41**		1	1 unit	1AE
	35			**5SJ4335-7HG41**		1	1 unit	1AE		**5SJ4335-8HG41**		1	1 unit	1AE
	40			**5SJ4340-7HG41**		1	1 unit	1AE		**5SJ4340-8HG41**		1	1 unit	1AE
	45			**5SJ4345-7HG41**		1	1 unit	1AE		**5SJ4345-8HG41**		1	1 unit	1AE
	50			**5SJ4350-7HG41**		1	1 unit	1AE		**5SJ4350-8HG41**		1	1 unit	1AE
	60			**5SJ4360-7HG41**		1	1 unit	1AE		**5SJ4360-8HG41**		1	1 unit	1AE
	63			**5SJ4363-7HG41**		1	1 unit	1AE		**5SJ4363-8HG41**		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
	Miniature circuit breakers 1P, 480Y/277 V AC													
	0.3	1		**5SJ4114-7HG42**		1	1 unit	1AE		**5SJ4114-8HG42**		1	1 unit	1AE
	0.5			**5SJ4105-7HG42**		1	1 unit	1AE		**5SJ4105-8HG42**		1	1 unit	1AE
	1			**5SJ4101-7HG42**		1	1 unit	1AE		**5SJ4101-8HG42**		1	1 unit	1AE
	1.6			**5SJ4115-7HG42**		1	1 unit	1AE		**5SJ4115-8HG42**		1	1 unit	1AE
	2			**5SJ4102-7HG42**		1	1 unit	1AE		**5SJ4102-8HG42**		1	1 unit	1AE
	3			**5SJ4103-7HG42**		1	1 unit	1AE		**5SJ4103-8HG42**		1	1 unit	1AE
	4			**5SJ4104-7HG42**		1	1 unit	1AE		**5SJ4104-8HG42**		1	1 unit	1AE
	5			**5SJ4111-7HG42**		1	1 unit	1AE		**5SJ4111-8HG42**		1	1 unit	1AE
	6			**5SJ4106-7HG42**		1	1 unit	1AE		**5SJ4106-8HG42**		1	1 unit	1AE
	8			**5SJ4108-7HG42**		1	1 unit	1AE		**5SJ4108-8HG42**		1	1 unit	1AE
	10			**5SJ4110-7HG42**		1	1 unit	1AE		**5SJ4110-8HG42**		1	1 unit	1AE
	13			**5SJ4113-7HG42**		1	1 unit	1AE		**5SJ4113-8HG42**		1	1 unit	1AE
	15			**5SJ4118-7HG42**		1	1 unit	1AE		**5SJ4118-8HG42**		1	1 unit	1AE
	16			**5SJ4116-7HG42**		1	1 unit	1AE		**5SJ4116-8HG42**		1	1 unit	1AE
	20			**5SJ4120-7HG42**		1	1 unit	1AE		**5SJ4120-8HG42**		1	1 unit	1AE
	25			**5SJ4125-7HG42**		1	1 unit	1AE		**5SJ4125-8HG42**		1	1 unit	1AE
	30			**5SJ4130-7HG42**		1	1 unit	1AE		**5SJ4130-8HG42**		1	1 unit	1AE
	32			**5SJ4132-7HG42**		1	1 unit	1AE		**5SJ4132-8HG42**		1	1 unit	1AE
	35			**5SJ4135-7HG42**		1	1 unit	1AE		**--**				
	40			**5SJ4140-7HG42**		1	1 unit	1AE		**--**				
	Miniature circuit breakers 2P, 480Y/277 V AC													
	0.3	2		**5SJ4214-7HG42**		1	1 unit	1AE		**5SJ4214-8HG42**		1	1 unit	1AE
	0.5			**5SJ4205-7HG42**		1	1 unit	1AE		**5SJ4205-8HG42**		1	1 unit	1AE
	1			**5SJ4201-7HG42**		1	1 unit	1AE		**5SJ4201-8HG42**		1	1 unit	1AE
	1.6			**5SJ4215-7HG42**		1	1 unit	1AE		**5SJ4215-8HG42**		1	1 unit	1AE
	2			**5SJ4202-7HG42**		1	1 unit	1AE		**5SJ4202-8HG42**		1	1 unit	1AE
	3			**5SJ4203-7HG42**		1	1 unit	1AE		**5SJ4203-8HG42**		1	1 unit	1AE
	4			**5SJ4204-7HG42**		1	1 unit	1AE		**5SJ4204-8HG42**		1	1 unit	1AE
	5			**5SJ4211-7HG42**		1	1 unit	1AE		**5SJ4211-8HG42**		1	1 unit	1AE
	6			**5SJ4206-7HG42**		1	1 unit	1AE		**5SJ4206-8HG42**		1	1 unit	1AE
	8			**5SJ4208-7HG42**		1	1 unit	1AE		**5SJ4208-8HG42**		1	1 unit	1AE
	10			**5SJ4210-7HG42**		1	1 unit	1AE		**5SJ4210-8HG42**		1	1 unit	1AE
	13			**5SJ4213-7HG42**		1	1 unit	1AE		**5SJ4213-8HG42**		1	1 unit	1AE
	15			**5SJ4218-7HG42**		1	1 unit	1AE		**5SJ4218-8HG42**		1	1 unit	1AE
	16			**5SJ4216-7HG42**		1	1 unit	1AE		**5SJ4216-8HG42**		1	1 unit	1AE
	20			**5SJ4220-7HG42**		1	1 unit	1AE		**5SJ4220-8HG42**		1	1 unit	1AE
	25			**5SJ4225-7HG42**		1	1 unit	1AE		**5SJ4225-8HG42**		1	1 unit	1AE
	30			**5SJ4230-7HG42**		1	1 unit	1AE		**5SJ4230-8HG42**		1	1 unit	1AE
	32			**5SJ4232-7HG42**		1	1 unit	1AE		**5SJ4232-8HG42**		1	1 unit	1AE
	35			**5SJ4235-7HG42**		1	1 unit	1AE		**--**				
	40			**5SJ4240-7HG42**		1	1 unit	1AE		**--**				

[1] 1 MW (modular width) = 18 mm.

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5SJ4. . . - .HG miniature circuit breakers acc. to UL 489 and IEC, and accessories

	I_n	Mounting width	SD	Characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Characteristic D Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d						d					
	Miniature circuit breakers 3P, 480Y/277 V AC													
	0.3	3		**5SJ4314-7HG42**		1	1 unit	1AE		**5SJ4314-8HG42**		1	1 unit	1AE
	0.5			**5SJ4305-7HG42**		1	1 unit	1AE		**5SJ4305-8HG42**		1	1 unit	1AE
	1			**5SJ4301-7HG42**		1	1 unit	1AE		**5SJ4301-8HG42**		1	1 unit	1AE
	1.6			**5SJ4315-7HG42**		1	1 unit	1AE		**5SJ4315-8HG42**		1	1 unit	1AE
	2			**5SJ4302-7HG42**		1	1 unit	1AE		**5SJ4302-8HG42**		1	1 unit	1AE
	3			**5SJ4303-7HG42**		1	1 unit	1AE		**5SJ4303-8HG42**		1	1 unit	1AE
	4			**5SJ4304-7HG42**		1	1 unit	1AE		**5SJ4304-8HG42**		1	1 unit	1AE
	5			**5SJ4311-7HG42**		1	1 unit	1AE		**5SJ4311-8HG42**		1	1 unit	1AE
	6			**5SJ4306-7HG42**		1	1 unit	1AE		**5SJ4306-8HG42**		1	1 unit	1AE
	8			**5SJ4308-7HG42**		1	1 unit	1AE		**5SJ4308-8HG42**		1	1 unit	1AE
	10			**5SJ4310-7HG42**		1	1 unit	1AE		**5SJ4310-8HG42**		1	1 unit	1AE
	13			**5SJ4313-7HG42**		1	1 unit	1AE		**5SJ4313-8HG42**		1	1 unit	1AE
	15			**5SJ4318-7HG42**		1	1 unit	1AE		**5SJ4318-8HG42**		1	1 unit	1AE
	16			**5SJ4316-7HG42**		1	1 unit	1AE		**5SJ4316-8HG42**		1	1 unit	1AE
	20			**5SJ4320-7HG42**		1	1 unit	1AE		**5SJ4320-8HG42**		1	1 unit	1AE
	25			**5SJ4325-7HG42**		1	1 unit	1AE		**5SJ4325-8HG42**		1	1 unit	1AE
	30			**5SJ4330-7HG42**		1	1 unit	1AE		**5SJ4330-8HG42**		1	1 unit	1AE
	32			**5SJ4332-7HG42**		1	1 unit	1AE		**5SJ4332-8HG42**		1	1 unit	1AE
	35			**5SJ4335-7HG42**		1	1 unit	1AE		**--**				
	40			**5SJ4340-7HG42**		1	1 unit	1AE		**--**				

		Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW[1]	d					
	**Auxiliary switches (AS) acc. to UL 489**							
	1 NO + 1 NC	0.5		**5ST3010-0HG**		1	1 unit	1AE
	2 NO			**5ST3011-0HG**		1	1 unit	1AE
	2 NC			**5ST3012-0HG**		1	1 unit	1AE
	**Fault signal contacts (FC) acc. to UL 489**							
	1 NO + 1 NC	0.5		**5ST3020-0HG**		1	1 unit	1AE
	2 NO			**5ST3021-0HG**		1	1 unit	1AE
	2 NC			**5ST3022-0HG**		1	1 unit	1AE
	**Shunt trips (ST) acc. to UL 489**							
	110 ... 480 V AC	1		**5ST3030-0HG**		1	1 unit	1AE
	24 ... 60 V AC/DC		▶	**5ST3031-0HG**		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Accessories

		Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW[1]	mm	d					
Busbars acc. to UL 489 specially for 5SJ4... -.HG.. miniature circuit breakers, fixed lengths, cannot be cut[2], UL File E321559									
	**Single-phase**								
	For 6 MCBs 1P	1	100		**5ST3663-0HG**		1	10 units	1AE
	For 12 MCBs 1P		205		**5ST3663-1HG**		1	10 units	1AE
	For 18 MCBs 1P		310		**5ST3663-2HG**		1	10 units	1AE
	Two-phase								
	For 3 MCBs 2P	1	100		**5ST3664-0HG**		1	10 units	1AE
	For 6 MCBs 2P		205		**5ST3664-1HG**		1	10 units	1AE
	For 9 MCBs 2P		310		**5ST3664-2HG**		1	10 units	1AE
	Three-phase								
	For 2 MCBs 3P	1	100		**5ST3665-0HG**		1	10 units	1AE
	For 4 MCBs 3P		205		**5ST3665-1HG**		1	10 units	1AE
	For 6 MCBs 3P		310		**5ST3665-2HG**		1	10 units	1AE
Busbars acc. to UL 489 specially for 5SJ4... -.HG.. miniature circuit breakers, can be cut, UL File E315616									
	**Single-phase**								
	For MCBs 1P	1	1016		**5ST3701-3HG**		1	1 unit	1AE
	For MCBs 1P with AS or FC		1016		**5ST3703-3HG**		1	1 unit	1AE
	Two-phase								
	For MCBs 2P	1	1016		**5ST3705-3HG**		1	1 unit	1AE
	For MCBs 2P with AS or FC		1016		**5ST3707-3HG**		1	1 unit	1AE
	Three-phase								
	For MCBs 3P	1	1016		**5ST3710-3HG**		1	1 unit	1AE
	For MCBs 3P with AS or FC	1+1+1.5	1016		**5ST3712-3HG**		1	1 unit	1AE
	For MCBs 3x (1P with AS or FC)		1016		**5ST3714-3HG**		1	1 unit	1AE
	Note								
	For the UL 489 busbars that can be cut, use only the associated separate infeed, end cap and touch protection cover.								
Terminals according to UL 489									
	**Infeed at the miniature circuit breaker** • Specially for 5SJ4... -.HG.. miniature circuit breakers • Max. 35 mm^2				**5ST3666-0HG**		1	10 units	1AE
	**Infeed at the miniature circuit breaker** • Specially for 5SJ4... -.HG.. miniature circuit breakers • For 5ST37..-3HG busbars that can be cut only • Max. 35 mm^2				**5ST3770-3HG**		1	10 units	1AE
	**Infeed at the busbar** Max. 50 mm^2				**5ST3666-2HG**		1	10 units	1AE
End cap for 5ST37..-3HG, can be cut acc. to UL 489									
	**End cap** For single-, two-, three-phase busbars				**5ST3750-3HG**		1	10 units	1AE

[1] 1 MW (modular width) = 18 mm.

[2] All unassigned pins of the busbar must be covered with 5ST3666-1HG touch protection covers.

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5SJ4. . . - .HG miniature circuit breakers acc. to UL 489 and IEC, and accessories

	Pin spacing MW[1]	Length mm	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Touch protection covers for busbars acc. to UL 489								
 **Touch protection covers** 3 × 1 pin				**5ST3666-1HG**		1	10 units	1AE
Touch protection covers • For 5ST337..-3HG busbars that can be cut only • 3 × 1 pin				**5ST3655-3HG**		1	10 units	1AE
Handle locking devices acc. to UL, UL File E321559								
 Can be sealed against undesired manual ON/OFF switching, sealable, for padlock With max. 3 mm shackle				**5ST3801**		1	1 unit	1AD
Padlocks								
 For 5ST3801 handle locking device				**5ST3802**		1	1 unit	1AD

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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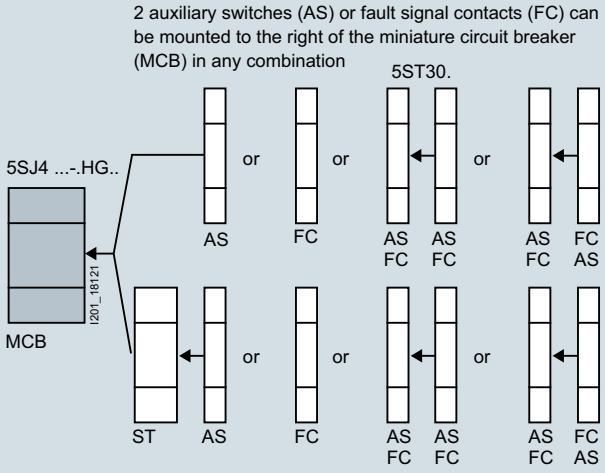
More information

Mounting concept for mounting 5ST30..-0HG accessories on 5SJ4. . .-.HG miniature circuit breakers

The diagram shows which additional components can be mounted on the right.



MCB: Miniature circuit breaker
ST: Shunt trip
AS: Auxiliary switch
FC: Fault signal contact

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SHU 5SP3 main miniature circuit breakers

Overview

The selective main miniature circuit breaker is used as a circuit breaker on meter panels.

Characteristic E is adapted to the special application requirements for cascade circuits between melting fuses and miniature circuit breakers in distributor circuits.

Used in conjunction with downstream miniature circuit breakers, SHU 5SP3 main miniature circuit breakers ensure effective protection and optimum availability of the plant.

Benefits

- Quick and easy installation on busbar and standard mounting rail
- Reliable and high selectivity
- Optimum availability of the consumer load
- The SHU 5SP3 main miniature circuit breaker operates on a voltage-independent basis
- High and safe selectivity between sub-distribution and meter panel ensures the continued supply of the unaffected circuits in the event of a fault, thus improving system availability
- In the event of a fault, the SHU 5SP3 main miniature circuit breaker prevents an existing short-circuit from being reconnected until the cause of the fault has been eliminated
- The SHU 5SP3 selective main miniature circuit breaker ensures fast and safe disconnection and reconnection of loads
- It complies with all the requirements of TAB 2007 and can therefore be used in metering systems

Technical specifications

			5SP37.., 5SP37..-1	5SP37..-2, 5SP37..-2KK0.	5SP38..-2
Standards			DIN VDE 0645	DIN VDE 0641-21	
Rated voltage U_n					
• 1-pole		V AC	230/400		--
• 3 x 1-pole		V AC	400	--	400
Operational voltage	Min.	V AC	110		
	Max.	V AC	440		
Rated frequency		Hz	50 ... 60		
Rated current I_n		A	16 ... 100	16 ... 63	
Rated insulation voltage U_i		V AC	690		
Rated making and breaking capacity I_{cn}		A	25000		
Insulation coordination					
• Overvoltage category			IV		
• Pollution degree			3		
Impulse withstand voltage U_{imp}		kV	6		
Impact resistance			30 g, at least 3 impacts, impact duration 11 ms		
Resistance to vibrations			2 g, 20 frequency cycles 5 ... 150 ... 15 Hz		
Switching position indication			OFF = green, ON = red		
Main switch characteristics	Acc. to EN 60204-1		Yes		
Handle end position, sealable			Yes		
Cutoff		ON/OFF	--	Locking slide with lock, additional wire seal, cable ties and Antilux	
Device depth		mm	92		
Degree of protection			IP20 with connected conductors		
Mains connection			Any		
Mounting position			Any		
Mounting			On standard mounting rail or interface adapter	Direct tool-free mounting on the busbar system	
Service life, on average, with rated load		Actuations	20000		
Wire connections			Saddle terminals at both ends		
• Top				Screwless spring terminal for flexible cables, in particular for meter connecting cables acc. to DIN 43870-3	
• Bottom				Box terminal, also for infeed to the busbar system, up to 100 A infeed current	
Conductor cross-sections					
• Top and bottom, solid and stranded		mm^2	2.5 ... 70	--	
• Top and bottom, finely stranded		mm^2	2.5 ... 50	--	
• Top, finely stranded		mm^2	--	2.5 ... 16	
• Bottom, solid, stranded and finely stranded, with end sleeve		mm^2	--	2.5 ... 50	
Storage temperature		°C	-40 ... +70		
Ambient temperature		°C	-25 ... +55		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	I_n	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d					
	**Main miniature circuit breakers, 1P, L1**							
	For direct busbar mounting (spacing: 40 mm), no further accessories required							
	16	1.5		**5SP3716-2KK01**		1	1 unit	1AE
	20			**5SP3720-2KK01**		1	1 unit	1AE
	25			**5SP3725-2KK01**		1	1 unit	1AE
	35			**5SP3735-2KK01**		1	1 unit	1AE
	40			**5SP3740-2KK01**		1	1 unit	1AE
	50			**5SP3750-2KK01**		1	1 unit	1AE
	63			**5SP3763-2KK01**		1	1 unit	1AE
	**Main miniature circuit breakers, 1P, L2**							
	For direct busbar mounting (spacing: 40 mm), no further accessories required							
	16	1.5		**5SP3716-2KK02**		1	1 unit	1AE
	20			**5SP3720-2KK02**		1	1 unit	1AE
	25			**5SP3725-2KK02**		1	1 unit	1AE
	35			**5SP3735-2KK02**		1	1 unit	1AE
	40			**5SP3740-2KK02**		1	1 unit	1AE
	50			**5SP3750-2KK02**		1	1 unit	1AE
	63			**5SP3763-2KK02**		1	1 unit	1AE
	**Main miniature circuit breakers, 1P, L3**							
	For direct busbar mounting (spacing: 40 mm), no further accessories required							
	16	1.5		**5SP3716-2KK03**		1	1 unit	1AE
	20			**5SP3720-2KK03**		1	1 unit	1AE
	25			**5SP3725-2KK03**		1	1 unit	1AE
	35			**5SP3735-2KK03**		1	1 unit	1AE
	40			**5SP3740-2KK03**		1	1 unit	1AE
	50			**5SP3750-2KK03**		1	1 unit	1AE
	63			**5SP3763-2KK03**		1	1 unit	1AE
	**Main miniature circuit breakers, 1P each 1 x L1, L2, L3, packaged as a set**							
	For direct busbar mounting (spacing: 40 mm), no further accessories required							
	16	3 x 1.5		**5SP3716-2**		1	1 set	1AE
	20			**5SP3720-2**		1	1 set	1AE
	25			**5SP3725-2**		1	1 set	1AE
	35			**5SP3735-2**		1	1 set	1AE
	40			**5SP3740-2**		1	1 set	1AE
	50			**5SP3750-2**		1	1 set	1AE
	63			**5SP3763-2**		1	1 set	1AE
	**Main miniature circuit breakers, 3 x 1P single-pole switching**							
	For direct busbar mounting (spacing: 40 mm), no further accessories required							
	16	4.5		**5SP3816-2**		1	1 unit	1AE
	20			**5SP3820-2**		1	1 unit	1AE
	25			**5SP3825-2**		1	1 unit	1AE
	35			**5SP3835-2**		1	1 unit	1AE
	40			**5SP3840-2**		1	1 unit	1AE
	50			**5SP3850-2**		1	1 unit	1AE
	63			**5SP3863-2**		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

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SHU 5SP3 main miniature circuit breakers

	I_n	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d					
Acc. to DIN 0641-21 for mounting on 35 mm DIN rail								
	**Main miniature circuit breakers, 1P**							
	16	1.5		**5SP3716-3**		1	1 unit	1AE
	20			**5SP3720-3**		1	1 unit	1AE
	25			**5SP3725-3**		1	1 unit	1AE
	35			**5SP3735-3**		1	1 unit	1AE
	40			**5SP3740-3**		1	1 unit	1AE
	50			**5SP3750-3**		1	1 unit	1AE
	63			**5SP3763-3**		1	1 unit	1AE
	**Main miniature circuit breakers, 3 x 1P**							
	16	4.5		**5SP3816-3**		1	1 unit	1AE
	20			**5SP3820-3**		1	1 unit	1AE
	25			**5SP3825-3**		1	1 unit	1AE
	35			**5SP3835-3**		1	1 unit	1AE
	40			**5SP3840-3**		1	1 unit	1AE
	50			**5SP3850-3**		1	1 unit	1AE
	63			**5SP3863-3**		1	1 unit	1AE
	**Main miniature circuit breakers, 2P**							
	16	3		**5SP3216-3**		1	1 unit	1AE
	20			**5SP3220-3**		1	1 unit	1AE
	25			**5SP3225-3**		1	1 unit	1AE
	35			**5SP3235-3**		1	1 unit	1AE
	40			**5SP3240-3**		1	1 unit	1AE
	50			**5SP3250-3**		1	1 unit	1AE
	63			**5SP3263-3**		1	1 unit	1AE
	**Main miniature circuit breakers, 3P**							
	16	4.5		**5SP3316-3**		1	1 unit	1AE
	20			**5SP3320-3**		1	1 unit	1AE
	25			**5SP3325-3**		1	1 unit	1AE
	35			**5SP3335-3**		1	1 unit	1AE
	40			**5SP3340-3**		1	1 unit	1AE
	50			**5SP3350-3**		1	1 unit	1AE
	63			**5SP3363-3**		1	1 unit	1AE
	**Main miniature circuit breakers, 4P**							
	16	6		**5SP3416-3**		1	1 unit	1AE
	20			**5SP3420-3**		1	1 unit	1AE
	25			**5SP3425-3**		1	1 unit	1AE
	35			**5SP3435-3**		1	1 unit	1AE
	40			**5SP3440-3**		1	1 unit	1AE
	50			**5SP3450-3**		1	1 unit	1AE
	63			**5SP3463-3**		1	1 unit	1AE

[1] 1 MW (modular width) = 18 mm.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	I_n	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	MW[1]	d					
	**Main miniature circuit breakers, 1P** For mounting on standard mounting rail, busbar (spacing: 40 mm, with 5ST1 busbar adapter), or for screw fixing							
	80			**5SP3780**		1	1 unit	1AE
	100			**5SP3791**		1	1 unit	1AE
	**Main miniature circuit breakers, 3 x 1P** Premounted on 5ST1324 busbar adapter; can be clipped onto busbars (spacing: 40 mm); including three 5ST1323 transparent operating protective covers							
	80	6		**5SP3780-1**		1	1 set	1AE
	100			**5SP3791-1**		1	1 set	1AE
	**Mounting plates** For mounting on standard mounting rails according to EN 50022							
	For 1 or 2 standard mounting rails, universal application, tier spacing 125 mm		►	**5ST1322**		1	10 units	1AE
	**Busbar adapters for 5SP37.. and 5SP37..-1** Suitable for busbar spacing 40 mm can be equipped with 3 selective main miniature circuit breakers			**5ST1328**		1	1 unit	1AE
	**Breaker blocking covers for 5SP37.. and 5SP37..-1** To prevent manual switching OFF			**5ST1318**		1	10 units	1AE
	**Operating protective covers, transparent, for 5SP37.. and 5SP37..-1** Multiple locking options against accidental and intentional operation • Padlocks • Phillips screwdrivers • Special wrenches (Antilux) • These can be installed by the operator or the power utility			**5ST1323**		1	3 units	1AE
	**Terminal covers for 5SP37.. and 5SP37..-1** 2 units required per device Terminal covers in compliance with cladding dimensions acc. to DIN 43880			**5ST1316**		1	6 units	1AE

[1] 1 MW (modular width) = 18 mm.

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Notes

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4/2	**Introduction**
4/4	**5SV RCCBs**
4/14	**5SM3 RCCBs**
4/17	**SIQUENCE 5SM3/5SU1 universal current-sensitive RCCBs, type B and type B+**
4/22	**Additional components**
4/33	**5SM2 RC units**
4/41	**5SU1 RCBOs**
4/50	**5SM6 arc fault detection devices (AFDDs)** NEW
4/54	**5ST busbars for modular installation devices**
4/57	**5SM1 and 5SZ9 RCCB socket outlets**
4/58	**Accessories**
4/59	**Configuration**

For further technical product information:

Configuration Manual

Residual Current Protective Devices / Arc Fault Detection Devices (AFDDs)
Article No.: 3ZW1012-5SM33-0AC1

Siemens Industry Online Support:

www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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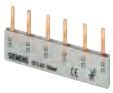
Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**5SV RCCBs**	4/4	Personnel, material and fire protection, as well as protection against direct contact. SIGRES with active condensation protection for use in harsh environments. Super resistant and selective versions	IEC/EN 61008 ÖVE EN 61008 ÖVE/ÖNORM E 8601 IEC/EN 62423	✓	✓	✓
	**5SM3 RCCBs**	4/14	Personnel, material and fire protection, as well as protection against direct contact	IEC/EN 61008 ÖVE EN 61008 ÖVE/ÖNORM E 8601 IEC/EN 62423	✓	✓	✓
	**SIQUENCE 5SM3/5SU1 universal current-sensitive RCCBs, type B and type B+**	4/17	SIQUENCE, the technology of universal current-sensitive residual current protective devices	VDE 0664-100 VDE 0664-200 VDE V 0664-110	✓	--	✓
	**Additional components**	4/22	Remote controlled mechanisms, auxiliary switches for all residual current operated circuit breakers Leakage current measurement device for fault locating and optimum selection of RCCBs	IEC/EN 62019	✓	--	✓
	**5SM2 RC units**	4/33	The freely selectable combination of RC units with miniature circuit breakers permits the flexible configuration of RCBO combinations	IEC/EN 61009	✓	--	✓
	**5SU1 RCBOs**	4/41	The ideal protection combination for all electrical circuits due to the compact device versions of RCCBs and miniature circuit breakers in a single device	IEC/EN 61009	✓	✓	✓
	**5SM6 AFD units**	4/50	Enhanced fire protection through the detection and isolation of arcing faults	IEC/EN 62606	✓	✓	--
	**5ST busbars for modular installation devices**	4/54	Busbars in 10 mm^2 and 16 mm^2 save space in the distribution board and time during mounting	--	✓	✓	✓
	**5SM1 and 5SZ9 RCCB socket outlets**	4/57	For retrofitting in existing installations	VDE 0664	✓	✓	✓
	**Accessories**	4/58	Locking devices, covers – everything you need for mounting	--	✓	✓	✓
	**5SV8 residual current monitors**	Ch. 13	For monitoring of residual currents in electrical plants with indication if a specified limit value is exceeded see chapter "Monitoring Devices" —> Monitoring devices for electrical values —> Residual current monitors"	IEC 62020 EN 62020	✓	--	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SIGRES

SIGRES RCCBs were developed for use in harsh ambient conditions, such as swimming baths as protection against chlorine and ozone, in the agricultural sector (ammonia), on building sites and in the chemical industry (nitrogen oxide, sulfur dioxide, solvents), in the food processing industry (hydrogen sulfide) and in unheated rooms (dampness). The patented active condensation protection requires a continuous power supply and bottom infeed if the RCCB is switched off.

When used in ambient conditions as defined in product standard EN 61008-1, the operation interval for pressing the test button can be extended to once a year.

Super resistant K

Super resistant (short-time delayed) RCCBs meet the maximum permissible break times for instantaneous devices. However, by implementing a short-time delay they prevent unnecessary tripping operations, and thus plant faults, when pulse-shaped leakage currents occur – as is the case when capacitors are switched on.

Selective S

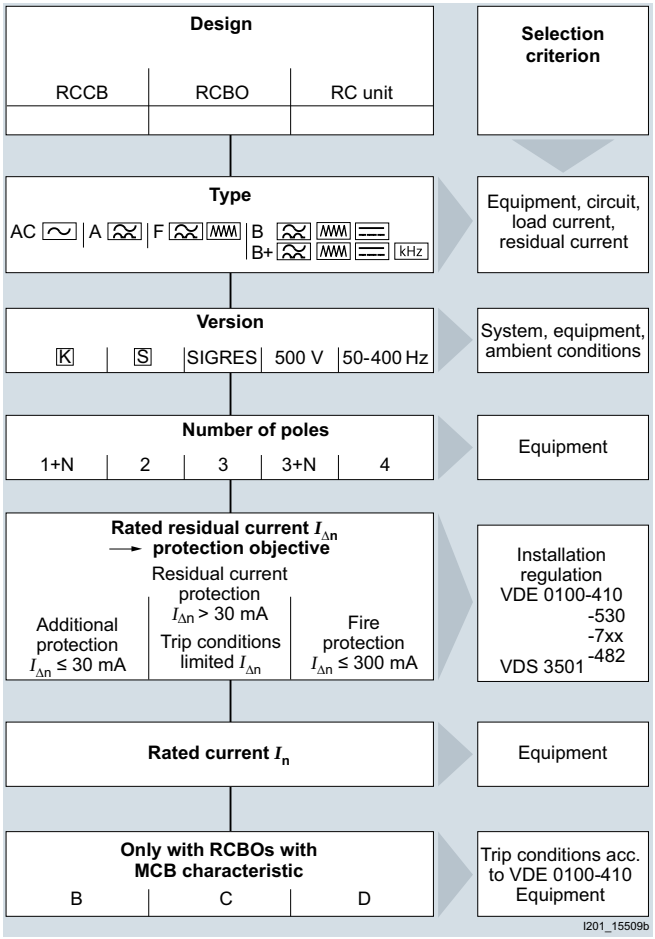
Can be used as upstream group switch for selective tripping contrary to downstream, instantaneous or short-time delayed RCCBs.

Short-time delayed G

If installations/equipment whose inadvertent tripping could lead to personal injury or material damage (such as freezers, computers) are protected by residual current protective devices, the tripping time of these devices must be at least 10 ms as defined according to ÖVE/ÖNORM E 8001-1.

Note:

You will find further information on the subject of residual current protective devices in the technology primer "Residual Current Protective Devices", Article No.: E10003-E38-2B-G0090 and in the Configuration Manual "Residual Current Protective Devices/Arc Fault Detection Devices (AFDDs)" at: www.siemens.com/lowvoltage/manuals.



Selection aid for finding the appropriate residual current protective device

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Overview

RCCBs are used in all systems up to 240/415 V AC. Devices of type AC trip in the event of sinusoidal AC residual currents, type A also trips in the event of pulsating DC residual currents.

In addition, RCCBs type F also detect residual currents with mixed frequencies up to 1 kHz.

RCCBs with a rated residual current of maximum 30 mA are used for personnel, material and fire protection, as well as for protection against direct contact. RCCBs with a rated residual current of 10 mA are primarily used in areas that represent an increased risk for personnel.

Since the introduction of DIN VDE 0100-410, all socket outlet current circuits up to 20 A must also be fitted with residual current protective devices with a rated residual current of max. 30 mA. This also applies to outdoor electrical circuits up to 32 A for the connection of portable equipment.

Devices with a rated residual current of maximum 300 mA are used as preventive fire protection in case of insulation faults. RCCBs with a rated residual current of 100 mA are primarily used in European countries outside Germany.

Benefits

- Instantaneous residual current operated circuit breakers with the N connection on the left or right-hand side enable simple bus mounting with standard pin busbars with miniature circuit breakers installed on the right-hand side.
- Instantaneous type A devices have a surge current withstand capability with current waveform 8/20 µs of more than 1 kA, super resistant devices of more than 3 kA and selective devices of more than 5 kA. This ensures safe operation.
- SIGRES has an extremely long service life due to patented active condensation protection, and identical dimensions enable the quick and easy replacement of existing instantaneous RCCBs.
- Super resistant devices increase system availability, as unnecessary tripping is prevented in power supply systems with short-time glitches.
- Selective RCCBs increase system availability as a staggered tripping time enables the selective tripping of RCCBs connected in series in the event of a fault.
- Auxiliary switches, fault signal contacts, undervoltage releases and shunt trips are also available as additional components.
- By means of internal contacts, effective touch protection is provided when grasping and manually operating the latching slide.
- To facilitate entry of pin busbars with connection cables up to 35 mm^2, the devices are equipped with rectangular terminals for the accommodation of funnel-shaped cable entries.
- By means of standardized clearances of the terminals in modular width dimensions, the RCCBs and MCBs can be optionally connected to busbars on the top or on the bottom.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

			Instantaneous	SIGRES	Super resistant	Selective
Standards			IEC/DIN EN 61008-1 (VDE 0664-10); IEC/EN 61008-2-1 (VDE 0664-11); IEC/EN 61543 (VDE 0664-30); IEC/EN 62423 (VDE 0664-40)			
Surge current withstand capability						
• Type A with current waveform 8/20 µs	Acc. to EN 60060-2 (VDE 0432-2)	kA	> 1		> 3	> 5
• Type F with current waveform 8/20 µs	Acc. to EN 60060-2 (VDE 0432-2)	kA	--	--	> 3	--
Minimum operational voltage for test function operation						
• 30-mA devices		V AC	195			
• Non-30-mA devices		V AC	100			
• 24-V devices		V AC	20			
Test cycles			1/2 year	1 year	1/2 year	
Insulation coordination						
• Overvoltage category			III			
Pollution degree			2			
Terminal conductor cross-sections						
• 1-wire						
- Solid (≤ 10 mm^2) / stranded (≥ 16 mm^2)		mm^2	0.75 ... 35			
- Finely stranded with non-insulated end sleeve		mm^2	0.75 ... 25			
- Finely stranded with insulated end sleeve		mm^2	0.75 ... 25			
- Finely stranded without end sleeve		mm^2	1 ... 35			
• 2-wire, same cross-section, same conductor type						
- Solid (≤ 10 mm^2) / stranded (≥ 16 mm^2)		mm^2	0.75 ... 10			
- Finely stranded with non-insulated end sleeve		mm^2	0.75 ... 4			
- Finely stranded with insulated end sleeve		mm^2	0.75 ... 4			
- Finely stranded without end sleeve		mm^2	1 ... 4			
• 1-wire + busbar (pin thickness 1.5 mm)						
- Solid (≤ 10 mm^2) / stranded (≥ 16 mm^2)		mm^2	10 ... 25			
- Finely stranded with non-insulated end sleeve		mm^2	6 ... 25			
- Finely stranded with insulated end sleeve		mm^2	6 ... 16			
Terminal tightening torque						
• Up to I_n = 80 A		Nm	2.5			
• At I_n = 100 A, 125 A		Nm	3.0 ... 3.5			
Mains connection			Optionally top or bottom (top for the SIGRES function to also be effective in the deactivated state)			
Rated frequency		Hz	50	50	50/60	50/60
Mounting position (on a standard mounting rail)			Any			
Degree of protection	Acc. to EN 60529 (VDE 0470-1)		IP20, if the distribution board is installed, with connected conductors			
Touch protection	Acc. to EN 50274 (VDE 0660-514)		Finger and back-of-hand safe			
Service life	Average number of operating cycles Test cycle acc. to IEC/EN 61008		> 10000			
Storage temperature		°C	-40 ... +75			
Ambient temperature		°C	-25 ... +45, marked with -25			
Resistance to climate	Acc. to IEC 60068-2-30		28 cycles (55 °C; 95% rel. air humidity)			
CFC and silicone-free			Yes			

4

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5SV RCCBs

Thermal overload protection (only relevant for Austria)

According to ÖVE/ÖNORM E 8001-1 § 12.1.4, RCCBs must be protected against thermal overload.

Rated current I_n of residual current protective device	Minimum wiring cross-section	Maximum rated current I_n of back-up fuse for overload protection	
		Miniature circuit breakers	Melting fuses
A	mm^2	A	A
5SM3 standard types			
16	1.5	10	10
	2.5	16	16
25	2.5	16	16
	4.0	25	25
40	6.0	25	25
	10.0	32	35
63	10.0	40	40
	16.0	50	50
80	16.0	63	50
	25.0	80	63
100	35.0	80	80
	50.0	100	100
125	35.0	80	80
	50.0	100	100
5SM3 ...-.LA special types, can be protected against overload with rated current			
40	6.0	32	35 (25 at 2 MW mounting width)
	10.0	40	40 (35 at 2 MW mounting width)
63	10.0	50	50
	16.0	63	63

Rated current I_n of residual current protective device	Minimum wiring cross-section	Maximum rated current I_n of back-up fuse for overload protection	
		Miniature circuit breakers	Melting fuses
A	mm^2	A	A
5SV standard types			
16	1.5	10	10
	2.5	16	16
25	2.5	16	16
	4.0	25	25
40	6.0	25	25
	10.0	32	35
63	10.0	40	40
	16.0	50	50
80	16.0	63	63
	25.0	63	63
5SV ...-.LA special types, can be protected against overload with rated current			
40	6.0	32	35
	10.0	40	40
63	10.0	50	50
	16.0	63	63

System dimensioning (e.g. taking into account rated load factors) must be such that the rated current of the RCCB is not exceeded by a continuous load.

The specified protective devices for thermal overload protection are designed to protect the RCCB against damage in unforeseen and non-permissible plant states.

Application

- Personnel, material and fire protection
  - $I_{\Delta n} \leq$ 30 mA: additional protection in case of direct contact
  - $I_{\Delta n} \leq$ 300 mA: preventive fire protection in the case of ground fault currents
- Product standards: ÖVE/ÖNORM EN 61008; ÖVE/ÖNORM E 8601
- U_n 230/400 V; 50 to 60 Hz; for use in systems up to: 240/415 V AC
- G G type: at least 10 ms trip delay. High surge current withstand capability: > 3 kA.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

(Type AC)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
RCCBs, type AC, instantaneous										
	1P+N; 230 V AC									
	N connection, right									
	10	16	63	2		**5SV4111-0**		1	1 unit	1AI
	30	16	63	2		**5SV4311-0**		1	1 unit	1AI
		25				**5SV4312-0**		1	1 unit	1AI
			Bulk packaging 36 units			**5SV4312-0GV01**		1	36 units	1AI
		40	63			**5SV4314-0**		1	1 unit	1AI
			Bulk packaging 36 units			**5SV4314-0GV01**		1	36 units	1AI
		63	80			**5SV4316-0**		1	1 unit	1AI
		80				**5SV4317-0**		1	1 unit	1AI
	100	25	63	2		**5SV4412-0**		1	1 unit	1AI
		40				**5SV4414-0**		1	1 unit	1AI
		63	80			**5SV4416-0**		1	1 unit	1AI
		80				**5SV4417-0**		1	1 unit	1AI
	300	25	63	2		**5SV4612-0**		1	1 unit	1AI
		40				**5SV4614-0**		1	1 unit	1AI
		63	80			**5SV4616-0**		1	1 unit	1AI
		80				**5SV4617-0**		1	1 unit	1AI
	3P+N; 400 V AC									
	N connection, right									
	30	25	80	4		**5SV4342-0**		1	1 unit	1AI
			Bulk packaging 18 units			**5SV4342-0GV01**		1	18 units	1AI
		40	80			**5SV4344-0**		1	1 unit	1AI
			Bulk packaging 18 units			**5SV4344-0GV01**		1	18 units	1AI
		63	100			**5SV4346-0**		1	1 unit	1AI
		80				**5SV4347-0**		1	1 unit	1AI
	100	25	80	4		**5SV4442-0**		1	1 unit	1AI
		40				**5SV4444-0**		1	1 unit	1AI
		63	100			**5SV4446-0**		1	1 unit	1AI
		80				**5SV4447-0**		1	1 unit	1AI
	300	25	80	4		**5SV4642-0**		1	1 unit	1AI
		40				**5SV4644-0**		1	1 unit	1AI
		63	100			**5SV4646-0**		1	1 unit	1AI
		80				**5SV4647-0**		1	1 unit	1AI
	500	25	80	4		**5SV4742-0**		1	1 unit	1AI
		40				**5SV4744-0**		1	1 unit	1AI
		63	100			**5SV4746-0**		1	1 unit	1AI
		80				**5SV4747-0**		1	1 unit	1AI
	1P+N; 230 V AC									
	N connection, left									
	10	16	63	2		**5SV4111-0KL**		1	1 unit	1AI
	30	16	63	2		**5SV4311-0KL**		1	1 unit	1AI
		25				**5SV4312-0KL**		1	1 unit	1AI
		40				**5SV4314-0KL**		1	1 unit	1AI
			Bulk packaging 36 units			**5SV4314-0GV02**		1	36 units	1AI
		63	80			**5SV4316-0KL**		1	1 unit	1AI
		80				**5SV4317-0KL**		1	1 unit	1AI
	100	40	63	2		**5SV4414-0KL**		1	1 unit	1AI
		63	80			**5SV4416-0KL**		1	1 unit	1AI
	300	25	63	2		**5SV4612-0KL**		1	1 unit	1AI
		40				**5SV4614-0KL**		1	1 unit	1AI
		63	80			**5SV4616-0KL**		1	1 unit	1AI
		80				**5SV4617-0KL**		1	1 unit	1AI
	3P+N; 400 V AC									
	N connection, left									
	30	25	80	4		**5SV4342-0KL**		1	1 unit	1AI
		40				**5SV4344-0KL**		1	1 unit	1AI
		63				**5SV4346-0KL**		1	1 unit	1AI
		80				**5SV4347-0KL**		1	1 unit	1AI
	300	25	80	4		**5SV4642-0KL**		1	1 unit	1AI
		40				**5SV4644-0KL**		1	1 unit	1AI
		63				**5SV4646-0KL**		1	1 unit	1AI
		80				**5SV4647-0KL**		1	1 unit	1AI

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5SV RCCBs

(Type AC)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
RCCBs, type AC, instantaneous High surge current withstand capability: > 1 kA (only available in Austria)[1)]										
	**1P+N; 230 V AC**									
	N connection, right									
	30	40	63	2		**5SV4314-0LA**		1	1 unit	1AI
	**3P+N; 400 V AC**									
	N connection, right									
	30	40	80	4		**5SV4344-0LA**		1	1 unit	1AI
		63	100			**5SV4346-0LA**		1	1 unit	1AI
	100	40	80			**5SV4444-0LA**		1	1 unit	1AI
		63	100			**5SV4446-0LA**		1	1 unit	1AI
RCCBs, type AC, short-time delayed G										
	**1P+N; 230 V AC**									
	N connection, right									
	30	40	63	2		**5SV4314-0LA01**		1	1 unit	1AI
	**3P+N, 400 V AC**									
	N connection, right									
	30	40	100	4		**5SV4344-0LA01**		1	1 unit	1AI
		63				**5SV4346-0LA01**		1	1 unit	1AI
	100	40				**5SV4444-0LA01**		1	1 unit	1AI
		63				**5SV4446-0LA01**		1	1 unit	1AI

[1)] Thermal overload protection according to ÖVE/ÖNORM E 8001 possible up to rated current of the RCCB (40 A, 63 A).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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(Type A) ÖVE	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Max. permissible short-circuit back-up fuse 10000 A	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
RCCBs, type A, instantaneous										
	1P+N; 230 V AC									
	N connection, right									
	10	16	63	2		**5SV3111-6**		1	1 unit	1AH
	30	16	63	2		**5SV3311-6**		1	1 unit	1AH
			Bulk packaging 36 units			**5SV3311-6GV01**		1	36 units	1AH
		25	63			**5SV3312-6**		1	1 unit	1AH
			Bulk packaging 36 units			**5SV3312-6GV01**		1	36 units	1AH
		40	63			**5SV3314-6**		1	1 unit	1AH
			Bulk packaging 36 units			**5SV3314-6GV01**		1	36 units	1AH
		40 [1]	63			**5SV3314-6LA**		1	1 unit	1AH
		63	80			**5SV3316-6**		1	1 unit	1AH
		80				**5SV3317-6**		1	1 unit	1AH
	100	25	63	2		**5SV3412-6**		1	1 unit	1AH
		40				**5SV3414-6**		1	1 unit	1AH
		63	80			**5SV3416-6**		1	1 unit	1AH
		80				**5SV3417-6**		1	1 unit	1AH
	300	25	63	2		**5SV3612-6**		1	1 unit	1AH
		40				**5SV3614-6**		1	1 unit	1AH
		63	80			**5SV3616-6**		1	1 unit	1AH
		80				**5SV3617-6**		1	1 unit	1AH
	3P+N; 400 V AC									
	N connection, right									
	30	25	80	4		**5SV3342-6**		1	1 unit	1AH
			Bulk packaging 18 units			**5SV3342-6GV01**		1	18 units	1AH
		40	80			**5SV3344-6**		1	1 unit	1AH
			Bulk packaging 18 units			**5SV3344-6GV01**		1	18 units	1AH
		40 [1]	80			**5SV3344-6LA**		1	1 unit	1AH
		63	100			**5SV3346-6**		1	1 unit	1AH
			Bulk packaging 18 units			**5SV3346-6GV01**		1	18 units	1AH
		63 [1]	80			**5SV3346-6LA**		1	1 unit	1AH
		80	100			**5SV3347-6**		1	1 unit	1AH
	100	25	80	4		**5SV3442-6**		1	1 unit	1AH
		40				**5SV3444-6**		1	1 unit	1AH
		40 [1]	80			**5SV3444-6LA**		1	1 unit	1AH
		63	100			**5SV3446-6**		1	1 unit	1AH
		63 [1]	100			**5SV3446-6LA**		1	1 unit	1AH
		80				**5SV3447-6**		1	1 unit	1AH
	300	25	80	4		**5SV3642-6**		1	1 unit	1AH
		40				**5SV3644-6**		1	1 unit	1AH
		63	100			**5SV3646-6**		1	1 unit	1AH
		80				**5SV3647-6**		1	1 unit	1AH
	500	25	80	4		**5SV3742-6**		1	1 unit	1AH
		40				**5SV3744-6**		1	1 unit	1AH
		63	100			**5SV3746-6**		1	1 unit	1AH
			Bulk packaging 18 units			**5SV3746-6GV01**		1	18 units	1AH
		80				**5SV3747-6**		1	1 unit	1AH
	1P+N; 230 V AC									
	N connection, left									
	10	16	63	2		**5SV3111-6KL**		1	1 unit	1AH
	30	16	63	2		**5SV3311-6KL**		1	1 unit	1AH
		25				**5SV3312-6KL**		1	1 unit	1AH
		40				**5SV3314-6KL**		1	1 unit	1AH
		63	80			**5SV3316-6KL**		1	1 unit	1AH
		80				**5SV3317-6KL**		1	1 unit	1AH
	100	25	63	2		**5SV3412-6KL**		1	1 unit	1AH
		40				**5SV3414-6KL**		1	1 unit	1AH
		63	80			**5SV3416-6KL**		1	1 unit	1AH
		80				**5SV3417-6KL**		1	1 unit	1AH
	300	25	63	2		**5SV3612-6KL**		1	1 unit	1AH
		40				**5SV3614-6KL**		1	1 unit	1AH
		63	80			**5SV3616-6KL**		1	1 unit	1AH
		80				**5SV3617-6KL**		1	1 unit	1AH

[1] Thermal overload protection according to ÖVE/ÖNORM E 8001 possible up to rated current of the RCCB (40 A, 63 A).
These products are only available in Austria!

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5SV RCCBs

(Type A)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
	**3P+N; 400 V AC**									
	N connection, left									
	30	25	80	4		**5SV3342-6KL**		1	1 unit	1AH
		40				**5SV3344-6KL**		1	1 unit	1AH
			Bulk packaging 18 units			**5SV3344-6GV02**		1	18 units	1AH
		63	80			**5SV3346-6KL**		1	1 unit	1AH
		80				**5SV3347-6KL**		1	1 unit	1AH
	300	25	80	4		**5SV3642-6KL**		1	1 unit	1AH
		40				**5SV3644-6KL**		1	1 unit	1AH
		63				**5SV3646-6KL**		1	1 unit	1AH
		80				**5SV3647-6KL**		1	1 unit	1AH
	500	63	80	4		**5SV3746-6KL**		1	1 unit	1AH
RCCBs, type A, short-time delayed G (only available in Austria)[1]										
	**2P, 125 ... 230 V AC**									
	N connection, right									
	30	40[1]	63	2		**5SV3314-6LA01**		1	1 unit	1AH
	**4P, 230 ... 400 V AC**									
	N connection, right									
	30	40[2]	100	4		**5SV3344-6LB01**				
		40[1]				**5SV3344-6LA01**		1	1 unit	1AH
		63[2]				**5SV3346-6LB01**				
		63[1]				**5SV3346-6LA01**		1	1 unit	1AH
	100	40[2]	100	4		**5SV3444-6LB01**				
		40[1]				**5SV3444-6LA01**		1	1 unit	1AH
		63[2]				**5SV3446-6LB01**				
		63[1]				**5SV3446-6LA01**		1	1 unit	1AH
RCCBs, type A, super resistant K										
	**1P+N; 230 V AC**									
	N connection, right									
	30	25	63	2		**5SV3312-6KK01**		1	1 unit	1AH
		40				**5SV3314-6KK01**		1	1 unit	1AH
		63	80			**5SV3316-6KK01**		1	1 unit	1AH
		80				**5SV3317-6KK01**		1	1 unit	1AH
	300	25	63	2		**5SV3612-6KK01**		1	1 unit	1AH
		40				**5SV3614-6KK01**		1	1 unit	1AH
		63	80			**5SV3616-6KK01**		1	1 unit	1AH
		80				**5SV3617-6KK01**		1	1 unit	1AH
	**3P+N; 400 V AC**									
	N connection, right									
	30	25	100	4		**5SV3342-6KK01**		1	1 unit	1AH
		40				**5SV3344-6KK01**		1	1 unit	1AH
		63				**5SV3346-6KK01**		1	1 unit	1AH
		80				**5SV3347-6KK01**		1	1 unit	1AH
	300	25	100	4		**5SV3642-6KK01**		1	1 unit	1AH
		40				**5SV3644-6KK01**		1	1 unit	1AH
		63				**5SV3646-6KK01**		1	1 unit	1AH
		80				**5SV3647-6KK01**		1	1 unit	1AH
RCCBs, type A, selective S										
	**1P+N; 230 V AC**									
	N connection, right									
	100	63	80	2		**5SV3416-8**		1	1 unit	1AH
	300	25	63	2		**5SV3612-8**		1	1 unit	1AH
		40				**5SV3614-8**		1	1 unit	1AH
		63	80			**5SV3616-8**		1	1 unit	1AH
		80				**5SV3617-8**		1	1 unit	1AH

[1] Thermal overload protection according to ÖVE/ÖNORM E 8001 possible up to rated current of the RCCB (40 A, 63 A).
These products are only available in Austria!

[2] Start of delivery scheduled for 1st quarter 2018

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(Type A) ÖVE	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
	**3P+N; 400 V AC**									
	N connection, right									
	100	40	100	4		**5SV3444-8**		1	1 unit	1AH
		40 [1]				**5SV3444-8LA**		1	1 unit	1AH
		63				**5SV3446-8**		1	1 unit	1AH
		63 [1]				**5SV3446-8LA**		1	1 unit	1AH
	300	25	100	4		**5SV3642-8**		1	1 unit	1AH
		40				**5SV3644-8**		1	1 unit	1AH
		40 [1]				**5SV3644-8LA**		1	1 unit	1AH
		63				**5SV3646-8**		1	1 unit	1AH
		63 [1]				**5SV3646-8LA**		1	1 unit	1AH
		80				**5SV3647-8**		1	1 unit	1AH
	1000	63	100	4		**5SV3846-8**		1	1 unit	1AH
	**1P+N; 230 V AC**									
	N connection, left									
	300	40	63	2		**5SV3614-8KL**		1	1 unit	1AH
		63	80			**5SV3616-8KL**		1	1 unit	1AH
	**3P+N; 400 V AC**									
	N connection, left									
	300	63	80	4		**5SV3646-8KL**		1	1 unit	1AH
RCCBs, type A, SIGRES, instantaneous										
	**1P+N; 230 V AC**									
	N connection, right									
	30	16	63	2		**5SV3311-6KK12**		1	1 unit	1AH
		25				**5SV3312-6KK12**		1	1 unit	1AH
		40				**5SV3314-6KK12**		1	1 unit	1AH
		63	80			**5SV3316-6KK12**		1	1 unit	1AH
	**3P+N; 400 V AC**									
	N connection, right									
	30	25	100	4		**5SV3342-6KK12**		1	1 unit	1AH
		40				**5SV3344-6KK12**		1	1 unit	1AH
		63				**5SV3346-6KK12**		1	1 unit	1AH
		80				**5SV3347-6KK12**		1	1 unit	1AH
	300	25	100	4		**5SV3642-6KK12**		1	1 unit	1AH
		40				**5SV3644-6KK12**		1	1 unit	1AH
		63				**5SV3646-6KK12**		1	1 unit	1AH
		80				**5SV3647-6KK12**		1	1 unit	1AH
RCCBs, type A, SIGRES, selective S										
	3P+N; 400 V AC									
	N connection, right									
	300	63	100	4		**5SV3646-8KK12**		1	1 unit	1AH

[1] Thermal overload protection according to ÖVE/ÖNORM E 8001 possible up to rated current of the RCCB (40 A, 63 A).
These products are only available in Austria!

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Selection and ordering data

(Type F)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
RCCBs, type F, super resistant K										
	**1P + N; 230 V AC**									
	N connection, right									
	30	25	63	2		**5SV3312-3**		1	1 unit	1AH
		40				**5SV3314-3**		1	1 unit	1AH
		63	80			**5SV3316-3**		1	1 unit	1AH
		80				**5SV3317-3**		1	1 unit	1AH
	300	25	63	2		**5SV3612-3**		1	1 unit	1AH
		40				**5SV3614-3**		1	1 unit	1AH
		63	80			**5SV3616-3**		1	1 unit	1AH
		80				**5SV3617-3**		1	1 unit	1AH
	**3P + N; 400 V AC**									
	N connection, right									
	30	25	100	4		**5SV3342-3**		1	1 unit	1AH
		40				**5SV3344-3**		1	1 unit	1AH
		63				**5SV3346-3**		1	1 unit	1AH
		80				**5SV3347-3**		1	1 unit	1AH
	300	25	100	4		**5SV3642-3**		1	1 unit	1AH
		40				**5SV3644-3**		1	1 unit	1AH
		63				**5SV3646-3**		1	1 unit	1AH
		80				**5SV3647-3**		1	1 unit	1AH
RCCBs, type F, selective S										
	**1P + N; 230 V AC**									
	N connection, right									
	300	40	63	2		**5SV3614-7**		1	1 unit	1AH
		80	80			**5SV3617-7**		1	1 unit	1AH
	**3P + N; 400 V AC**									
	N connection, right									
	300	40	100	4		**5SV3644-7**		1	1 unit	1AH
		80				**5SV3647-7**		1	1 unit	1AH

Minimum order quantity (PS) or a multiple thereof can be ordered.

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(Type A)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
RCCBs, type A, instantaneous										
	**1P+N; 24 ... 125 V AC**									
	N connection, right									
	30	16	63	2		**5SV3311-6KK13**		1	1 unit	1AH
	30	25		2		**5SV3312-6KK13**		1	1 unit	1AH
	30	40		2		**5SV3314-6KK13**		1	1 unit	1AH
	30	63	80	2		**5SV3316-6KK13**		1	1 unit	1AH
	**3P+N; 500 V AC**									
	N connection, right									
	30	25	63	4		**5SV3352-6**		1	1 unit	1AH
	30	40		4		**5SV3354-6**		1	1 unit	1AH
	30	63		4		**5SV3356-6**		1	1 unit	1AH
	30	80	80	4		**5SV3357-6**		1	1 unit	1AH
	300	25	63	4		**5SV3652-6**		1	1 unit	1AH
	300	40		4		**5SV3654-6**		1	1 unit	1AH
	300	63		4		**5SV3656-6**		1	1 unit	1AH
	300	80	80	4		**5SV3657-6**		1	1 unit	1AH
	3P+N; 230 V AC; 400 Hz									
	N connection, right									
	30	25	80	4		**5SV3342-6KK03**		1	1 unit	1AH
	30	40		4		**5SV3344-6KK03**		1	1 unit	1AH

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Overview

RCCBs are used in all systems up to 240/415 V AC. Devices of type AC trip in the event of sinusoidal AC residual currents, type A also trips in the event of pulsating DC residual currents.

In addition, RCCBs type F also detect residual currents with mixed frequencies up to 1 kHz.

RCCBs with a rated residual current of maximum 30 mA are used for personnel, material and fire protection, as well as for protection against direct contact. RCCBs with a rated residual current of 10 mA are primarily used in areas that represent an increased risk for personnel.

Since the introduction of DIN VDE 0100-410, all socket outlet current circuits up to 20 A must also be fitted with residual current protective devices with a rated residual current of max. 30 mA. This also applies to outdoor electrical circuits up to 32 A for the connection of portable equipment.

Devices with a rated residual current of maximum 300 mA are used as preventive fire protection in case of insulation faults. RCCBs with a rated residual current of 100 mA are primarily used in European countries outside German.

Benefits

- Instantaneous RCCBs with the N connection on the left-hand side enable simple bus mounting with standard pin busbars with miniature circuit breakers installed on the right-hand side.
- Instantaneous RCCBs with the N connection on the right-hand side can be bus-mounted with miniature circuit breakers using a special pin busbar.
- Instantaneous type A devices have a surge current withstand capability with current waveform 8/20 µs of more than 1 kA, super resistant devices of more than 3 kA and selective devices of more than 5 kA. This ensures safe operation.
- Super resistant devices increase system availability, as unnecessary tripping is prevented in power supply systems with short-time glitches.
- Selective RCCBs increase system availability as a staggered tripping time enables the selective tripping of RCCBs connected in series in the event of a fault.

Technical specifications

			Instantaneous	Selective
Standards			IEC/DIN EN 61008-1 (VDE 0664-10); IEC/EN 61008-2-1 (VDE 0664-11); IEC/EN 61543 (VDE 0664-30); IEC/EN 62423 (VDE 0664-40)	
Surge current withstand capability				
• Type A with current waveform 8/20 µs	Acc. to EN 60060-2 (VDE 0432-2)	kA	> 1	> 5
Minimum operational voltage for test function operation		V AC	195	
Test cycles			1/2 year	
Insulation coordination				
• Overvoltage category			III	
Pollution degree			2	
Terminal conductor cross-sections				
• 2 MW	I_n = 100 A, 125 A	mm^2	1.5 ... 50	
• 4 MW	I_n = 100 A, 125 A	mm^2	2.5 ... 50	
Terminal tightening torque				
• I_n = 100 A, 125 A		Nm	3.0 ... 3.5	
Mains connection			Top or bottom	
Mounting position (on a standard mounting rail)			Any	
Degree of protection	Acc. to EN 60529 (VDE 0470-1)		IP20, if the distribution board is installed, with connected conductors	
Touch protection	Acc. to EN 50274 (VDE 0660-514)		Finger and back-of-hand safe	
Service life	Average number of switching cycles		> 10000	
Storage temperature		°C	-40 ... +75	
Ambient temperature		°C	-25 ... +45, marked with -25	
Resistance to climate	Acc. to IEC 60068-2-30		28 cycles (55 °C; 95% rel. air humidity)	
CFC and silicone-free			Yes	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

(Type AC)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
RCCBs, type AC, instantaneous										
	1P+N; 230 V AC									
	N connection, right									
	30	100	125	2		**5SM3318-0KK**		1	1 unit	1AI
		125				**5SM3315-0KK**		1	1 unit	1AI
	100	100	125			**5SM3418-0KK**		1	1 unit	1AI
		125				**5SM3415-0KK**		1	1 unit	1AI
	300	100	125			**5SM3618-0KK**		1	1 unit	1AI
		125				**5SM3615-0KK**		1	1 unit	1AI
	3P+N; 400 V AC									
	N connection, right									
	30	100	100	4		**5SM3348-0**		1	1 unit	1AI
		125	125			**5SM3345-0**		1	1 unit	1AI
	100	100	100		►	**5SM3448-0**		1	1 unit	1AI
		125	125			**5SM3445-0**		1	1 unit	1AI
	300	100	100			**5SM3648-0**		1	1 unit	1AI
		125	125			**5SM3645-0**		1	1 unit	1AI
	500	100	100		►	**5SM3748-0**		1	1 unit	1AI
		125	125			**5SM3745-0**		1	1 unit	1AI
RCCBs, type AC, selective										
	3P+N, 400 V AC									
	N connection, right									
	300	100	100	4		**5SM3648-2**		1	1 unit	1AI

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5SM3 RCCBs

(Type A)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
RCCBs, type A, instantaneous										
	**1P+N; 230 V AC; 50 Hz**									
	N connection, right									
	30	100	125			**5SM3318-6KK**		1	1 unit	1AH
		125				**5SM3315-6KK**		1	1 unit	1AH
	100	100	125			**5SM3418-6KK**		1	1 unit	1AH
		125				**5SM3415-6KK**		1	1 unit	1AH
	300	100	125			**5SM3618-6KK**		1	1 unit	1AH
		125				**5SM3615-6KK**		1	1 unit	1AH
	**3P+N, 400 V AC; 50 Hz**									
	N connection, right									
	30	100	100		▶	**5SM3348-6**		1	1 unit	1AH
		125	125			**5SM3345-6**		1	1 unit	1AH
	100	100	100		▶	**5SM3448-6**		1	1 unit	1AH
		125	125			**5SM3445-6**		1	1 unit	1AH
	300	100	100		▶	**5SM3648-6**		1	1 unit	1AH
		125	125			**5SM3645-6**		1	1 unit	1AH
	500	100	100		▶	**5SM3748-6**		1	1 unit	1AH
		125	125			**5SM3745-6**		1	1 unit	1AH
RCCBs, type A, selective S										
	**3P+N, 400 V AC; 50 Hz**									
	N connection, right									
	300	100	100	4		**5SM3648-8**		1	1 unit	1AH
		125	125			**5SM3645-8**		1	1 unit	1AH
	500	125	125	4		**5SM3745-8**		1	1 unit	1AH

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Frequency converters, medical devices and UPS systems are seeing increasing use in industry. Smooth DC residual currents or currents with low residual ripple may occur in the event of faults on these devices.

Type A residual current protective devices are unable to detect these smooth DC residual currents. Furthermore, such smooth DC residual currents make type A devices increasingly insensitive to AC residual currents and pulsating DC residual currents. If a fault occurs, there is therefore no tripping and the desired protective function is no longer assured.

UC-sensitive residual current protective devices of types B and B+ have an additional transformer which is supplied with a control signal. This enables an evaluation of the change of the transformer's operating range caused by smooth DC residual currents, thus ensuring the desired protective function.

The residual current protective devices of type B are suitable for use in three-phase current systems before input circuits with rectifiers. They are not intended for use in DC systems and in networks with operating frequencies other than 50 Hz or 60 Hz.

The devices in this series are designed as residual current operated circuit breakers (RCCBs) up to 80 A and as residual current circuit breakers with integral overcurrent protection (RCBOs) for 100 A or 125 A in Characteristics C or D.

Type B+ residual current protective devices also offer enhanced, preventive fire protection. In these versions, the tripping value is limited to a maximum of 420 mA up to 20 kHz.

All universal current-sensitive RCCBs, type B or B+ are now also available in a SIGRES version, meaning they are also ideal for use in harsh ambient conditions.

When used in ambient conditions as defined in product standard EN 61008-1, the operation interval for pressing the test button can be extended to once a year.

Benefits

- Universal current-sensitive residual current protective devices detect not only AC residual currents and pulsating DC residual currents, but also smooth DC residual currents, thus ensuring the desired protective function with all types of residual current
- With type B, the tripping characteristic is adapted to suit the increase of leakage currents at higher frequencies in systems with capacitive impedances, thus ensuring greater operating safety
- Type B+ versions offer enhanced preventive fire protection and correspond to the prestandards DIN V VDE V 0664-110 and/or DIN V VDE V 0664-210 and VdS Directive 3501
- The RCBO is a compact device for up to 125 A. It provides not only personnel, material and fire protection but also overload and short-circuit protection for cables. This reduces wiring and mounting outlay
- The RCBOs offer external remote tripping over terminals Y1/Y2. This supports implementation of central OFF circuits

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Technical specifications

		SIQUENCE, 5SM3 RCCBs, type B and type B+		SIQUENCE, 5SU1 RCBOs type B and type B+
Standards		IEC/EN 62423 (VDE 0664-40); IEC/EN 61543 (VDE 0664-30); additionally applicable for type B+ DIN VDE 0664-400		IEC/EN 62423 (VDE 0664-40); IEC/EN 61543 (VDE 0664-30); additionally applicable for type B+ DIN VDE 0664-401
Versions		1P+N	3P+N	4P
Tripping characteristic		--	--	C, D
Surge current withstand capability With current waveform 8/20 µs acc. to EN 60060-2 (VDE 0432-2)				
• Super resistant	kA	> 3	> 3	> 3
• Selective	kA	--	> 5	> 5
Minimum operational voltage for test function operation	V AC	195	195	195
Rated voltages U_n	V AC	230	400	400, 480
Rated frequency f_n	Hz	50 ... 60		
Rated currents I_n	A	16, 25, 40, 63	25, 40, 63, 80	100, 125
Rated residual currents $I_{\Delta n}$	mA	30, 300	30, 300, 500	30, 300
Rated breaking capacity				
• I_m	A	800		--
• I_{cn}	kA	--		10
Insulation coordination				
• Overvoltage category		III		
Conductor cross-sections				
• Solid and stranded	mm^2	1.5 ... 25		6 ... 50
• Finely stranded, with end sleeve	mm^2	1.5 ... 16		6 ... 35
Terminal tightening torque For all devices	Nm	2.5 ... 3.0		3.0 ... 3.5
Mains connection		Optionally top or bottom (bottom for the SIGRES function to also be effective in the deactivated state)		
Mounting position (on a standard mounting rail)		Any		
Degree of protection according to EN 60529 (VDE 0470-1)		IP20, if the distribution board is installed, with connected conductors		
Touch protection Acc. to EN 50274 (VDE 0660-514)		Finger and back-of-hand safe		
Service life Average number of switching cycles		> 10000 switching cycles		
Storage temperature	°C	-40 ... +75		
Ambient temperature	°C	-25 ... +45, marked with 		
Resistance to climate acc. to IEC 60068-2-30		28 cycles (55 °C; 95% rel. air humidity)		
CFC and silicone-free		Yes		

For details of I^2 characteristics, see Configuration Manual "Residual Current Protective Devices/Arc Fault Detection Devices (AFDDs)" at: www.siemens.com/lowvoltage/manuals

Power losses per conducting path under rated current load

Note:
0.4 W per unit must be added for SIGRES versions.

Number of poles	Rated current	Rated residual current $I_{\Delta n}$ [mA]	Power losses per conducting path P_v [W]
2/4	16	30/300	0.17
	25	30/300	0.42
	40	30/300	1.09
	63	30/300/500	2.7
	80	30/300/500	4.35

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

(Type B/type B+)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
SIQUENCE RCCBs, type B, super resistant K										
	**1P+N; 230 V AC; 50 ... 60 Hz**									
	30	16	100	4		**5SM3321-4**		1	1 unit	1AJ
		25				**5SM3322-4**		1	1 unit	1AJ
		40				**5SM3324-4**		1	1 unit	1AJ
		63				**5SM3326-4**		1	1 unit	1AJ
	300	16	100	4		**5SM3621-4**		1	1 unit	1AJ
		25				**5SM3622-4**		1	1 unit	1AJ
		40				**5SM3624-4**		1	1 unit	1AJ
		63				**5SM3626-4**		1	1 unit	1AJ
	**3P+N; 230 ... 400 V AC; 50 ... 60 Hz**									
	30	25	100	4		**5SM3342-4**		1	1 unit	1AJ
		40				**5SM3344-4**		1	1 unit	1AJ
		63				**5SM3346-4**		1	1 unit	1AJ
		80				**5SM3347-4**		1	1 unit	1AJ
	300	25	100	4		**5SM3642-4**		1	1 unit	1AJ
		40				**5SM3644-4**		1	1 unit	1AJ
		63				**5SM3646-4**		1	1 unit	1AJ
		80				**5SM3647-4**		1	1 unit	1AJ
	500	63	100	4		**5SM3746-4**		1	1 unit	1AJ
		80				**5SM3747-4**		1	1 unit	1AJ
SIQUENCE RCCBs, type B, selective S										
	**3P+N; 230 ... 400 V AC; 50 ... 60 Hz**									
	300	63	100	4		**5SM3646-5**		1	1 unit	1AJ
		80				**5SM3647-5**		1	1 unit	1AJ
	500	63	100	4		**5SM3746-5**		1	1 unit	1AJ
		80				**5SM3747-5**		1	1 unit	1AJ
SIQUENCE RCCBs, type B+, super resistant K										
	**1P+N; 230 V AC; 50 ... 60 Hz**									
	30	16	100	4		**5SM3321-4KK14**		1	1 unit	1AJ
		25				**5SM3322-4KK14**		1	1 unit	1AJ
		40				**5SM3324-4KK14**		1	1 unit	1AJ
		63				**5SM3326-4KK14**		1	1 unit	1AJ
	300	16	100	4		**5SM3621-4KK14**		1	1 unit	1AJ
		25				**5SM3622-4KK14**		1	1 unit	1AJ
		40				**5SM3624-4KK14**		1	1 unit	1AJ
		63				**5SM3626-4KK14**		1	1 unit	1AJ
	**3P+N; 230 ... 400 V AC; 50 ... 60 Hz**									
	30	25	100	4		**5SM3342-4KK14**		1	1 unit	1AJ
		40				**5SM3344-4KK14**		1	1 unit	1AJ
		63				**5SM3346-4KK14**		1	1 unit	1AJ
		80				**5SM3347-4KK14**		1	1 unit	1AJ
	300	25	100	4		**5SM3642-4KK14**		1	1 unit	1AJ
		40				**5SM3644-4KK14**		1	1 unit	1AJ
		63				**5SM3646-4KK14**		1	1 unit	1AJ
		80				**5SM3647-4KK14**		1	1 unit	1AJ
SIQUENCE RCCBs, type B+, selective S										
	**3P+N; 230 ... 400 V AC; 50 ... 60 Hz**									
	300	63	100	4		**5SM3646-5KK14**		1	1 unit	1AJ
		80				**5SM3647-5KK14**		1	1 unit	1AJ

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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SIQUENCE 5SM3/5SU1 universal current-sensitive RCCBs, type B and type B+

(Type B/type B+)	Rated residual current	Rated current	Max. permissible short-circuit back-up fuse	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n	10000							
	mA	A	A	MW	d					
SIQUENCE RCBOs, type B, super resistant K, rated breaking capacity 10 kA										
	**4P, 400 V AC, 50 ... 60 Hz**									
	Characteristic C									
	30	100	--	11		**5SU1374-7AK81**		1	1 unit	1BD
		125				**5SU1374-7AK82**		1	1 unit	1BD
	300	100	--	11		**5SU1674-7AK81**		1	1 unit	1BD
		125				**5SU1674-7AK82**		1	1 unit	1BD
	Characteristic D									
	30	100	--	11		**5SU1374-8AK81**		1	1 unit	1BD
	300	100	--	11		**5SU1674-8AK81**		1	1 unit	1BD
	4P, 480 V AC, 50 ... 60 Hz									
	Characteristic C									
	300	100	--	11		**5SU1674-7CK81**		1	1 unit	1BD
		125				**5SU1674-7CK82**		1	1 unit	1BD
SIQUENCE RCBOs, type B, selective S, rated breaking capacity 10 kA										
	**4P, 400 V AC, 50 ... 60 Hz**									
	Characteristic C									
	300	125	--	11		**5SU1674-7BK82**		1	1 unit	1BD
	Characteristic D									
	300	100	--	11		**5SU1674-8BK81**		1	1 unit	1BD
SIQUENCE RCBOs, type B+, super resistant K, rated breaking capacity 10 kA										
	**4P, 400 V AC, 50 ... 60 Hz**									
	Characteristic C									
	30	100	--	11		**5SU1374-7DK81**		1	1 unit	1BD
		125				**5SU1374-7DK82**		1	1 unit	1BD
	300	100	--	11		**5SU1674-7DK81**		1	1 unit	1BD
		125				**5SU1674-7DK82**		1	1 unit	1BD
	Characteristic D									
	30	100	--	11		**5SU1374-8DK81**		1	1 unit	1BD
	300	100	--	11		**5SU1674-8DK81**		1	1 unit	1BD
	4P, 480 V AC, 50 ... 60 Hz									
	Characteristic C									
	300	100	--	11		**5SU1674-7FK81**		1	1 unit	1BD
		125				**5SU1674-7FK82**		1	1 unit	1BD
SIQUENCE RCBOs, type B+, selective S, rated breaking capacity 10 kA										
	**4P, 400 V AC, 50 ... 60 Hz**									
	Characteristic C									
	300	125	--	11		**5SU1674-7EK82**		1	1 unit	1BD
	Characteristic D									
	300	100	--	11		**5SU1674-8EK81**		1	1 unit	1BD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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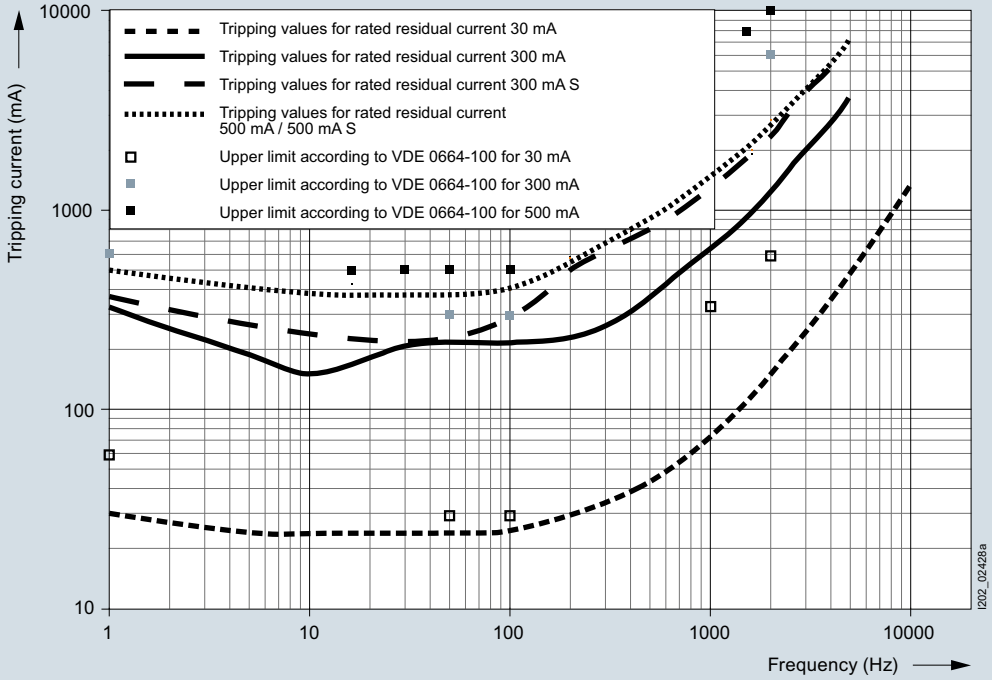
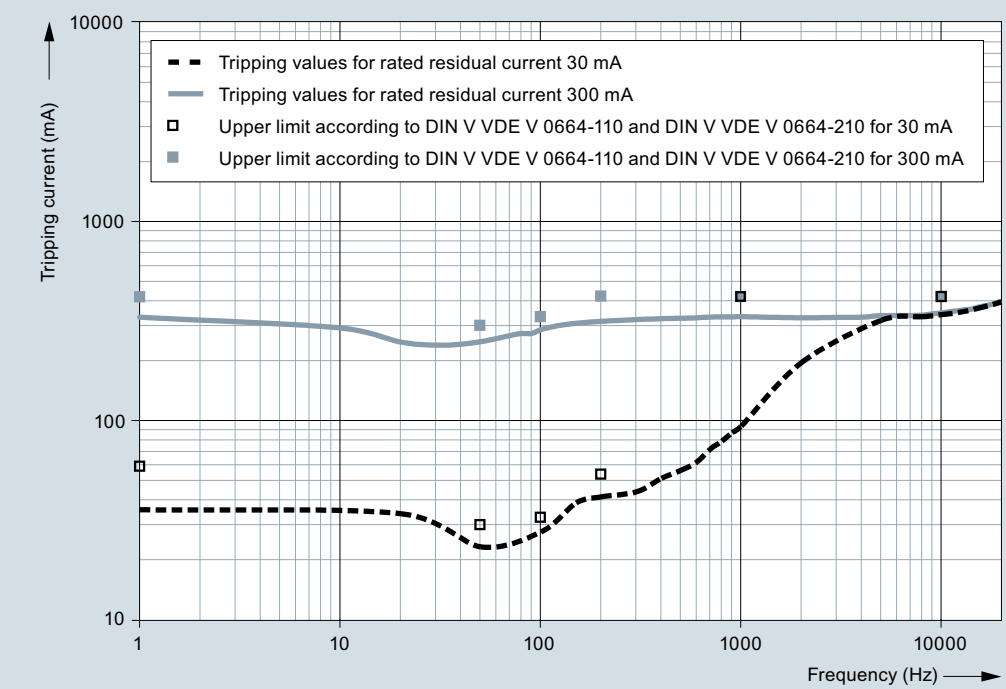
Characteristic curves



Tripping current as a function of frequency for type B



Tripping current as a function of frequency for type B+

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4

Overview

Auxiliary switches (AS)

The auxiliary switch (AS) always signals the contact position, regardless of whether the RCCB was tripped manually or as the result of a fault. An additional version is also available for the switching of small currents and voltages for the control of programmable control systems (PLCs) according to EN 61131-2. The auxiliary switch with test button enables the testing of control circuits without the need to switch the RCCB.

Fault signal contacts (FC)

The fault signal contact (FC) signals automatic breaking in the event of a fault. If the fault signal contact is activated, the contact position does not change if the RCCB is tripped manually. Fault signal contacts with TEST and RESET buttons enable testing of control circuits without the need to trip the RCCB. The red RESET button integrated in the handle also indicates automatic tripping of the RCCB. The signal can be acknowledged manually using the RESET button.

Shunt trips (ST)

Shunt trips are used for the remote tripping of RCCBs.

Undervoltage releases (UR)

Undervoltage releases are integrated (e.g. in EMERGENCY-STOP loops), thus ensuring tripping in the event of an emergency, which, in turn, ensures disconnection of the control circuit according to EN 60204. In the event that the voltage is interrupted or too low, it also trips, i.e. prevents activation of the RCCB.

Remote controlled mechanisms (RC) NEW

Remote controlled mechanisms are used for the remote ON/OFF switching of miniature circuit breakers with or without RC unit, residual current operated circuit breakers, RCBOs or isolators and also enable local manual switching of these devices.
A tripped combination must be acknowledged prior to switching back on.

The device combination with the automatic restart device (ARD) types tries up to three times to switch on again in the event of a fault. If a fault continues to exist, the combination remains switched off. The remote controlled mechanism has a mode selector switch with the functions: "Locked", "Manual" and "Remote Switching".

Selector switch position:
OFF (for the 177 - 270 V devices): The remote controlled mechanism Power is switched off, blocked mechanically and can be sealed and/or locked.
RC OFF: Only manual operation is possible.
RC ON: Both manual and remote operation are possible (except for in the case of the basic 12 - 48 V devices).

In the event that a device is tripped by a fault, the handle of the basic device and remote controlled mechanism switches to the OFF position. If, depending on the device version, the combination has switched off, an attempt can be made either via ARD or remotely to switch on again. If a fault continues to exist, the combination is switched off and can only be switched on again locally manually.

Matching adapters have to be ordered additionally to enable the remote controlled mechanisms to be combined with the residual current operated circuit breakers, miniature circuit breakers, RCBOs and on/off switches.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits

Can be universally retrofitted with all additional components

- Captive metal brackets on the additional components ensure the quick and easy mounting of devices without the need for tools.
- Fault signal contacts with TEST and RESET button enable simple testing of auxiliary circuits and, in the event of a fault, acknowledgement of the fault over the RESET button without the need to switch the RCCBs.
- The auxiliary switches with TEST button enable simple manual testing of control circuits during operation of the entire installation without the need to switch the RCCBs.
- Bus systems, such as *instabus* KNX, AS-Interface bus or PROFIBUS, can be integrated in the communication over binary inputs
- The leakage current measurement device enables the systematic selection of the rated residual current, thus preventing inadvertent tripping of an RCCB.

Remote controlled mechanisms NEW



- Remote controlled mechanisms with ARD and Power have integrated auxiliary switches and fault signal contacts.
- More 5ST3... additional components, such as AS, FC, ST and UR, can be added to the right-hand side of the remote controlled mechanism in line with the Siemens mounting concept.
- The remote controlled mechanisms with ARD and Power have an LED display on the front of the device to show the switching state and for diagnostics.

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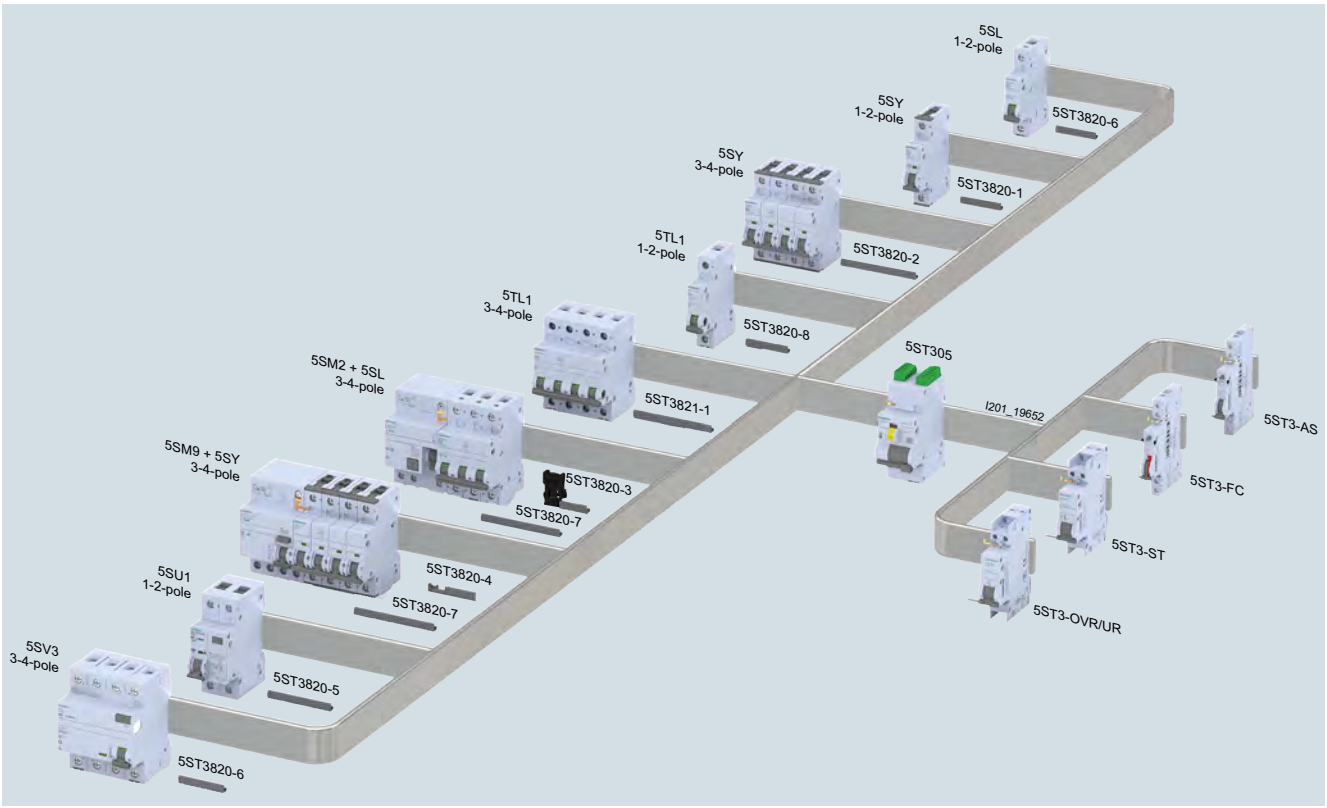
Additional components

Portfolio overview



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Combination options remote controlled mechanism – adapter – mount-on device

		5SL6/4 1-2-pole	5SL6/4 3-4-pole	5SY4/5/6/7/8 1-2-pole	5SY4/5/6/7/8 3-4-pole	5SY60	5SU1	5SM2 + 5SL 1-2-pole
								
	**RC mech. basic (1.5 MW) – 5ST3053** 12 V - 30 V AC 12 V - 48 V DC	 Adapter 5ST3820-6	 Adapter 5ST3820-7	 Adapter 5ST3820-1	 Adapter 5ST3820-2	 Adapter 5ST3820-1	 up to 3 MW Adapter 5ST3820-5	not compatible
	**RC mech. basic (2 MW) – 5ST3054** 230 V AC	 Adapter 5ST3820-6	 Adapter 5ST3820-7	 Adapter 5ST3820-1	 Adapter 5ST3820-2	 Adapter 5ST3820-1	 up to 3 MW Adapter 5ST3820-5	not compatible
	**RC mech. power (2 MW) – 5ST3055** 12 V - 30 V AC 12 V - 48 V DC	 Adapter 5ST3820-6	 Adapter 5ST3820-7	 Adapter 5ST3820-1	 Adapter 5ST3820-2	 Adapter 5ST3820-1	 Adapter 5ST3820-5	 Adapter 5ST3820-3 add'l 5ST3820-6
	**RC mech. power (2 MW) – 5ST3056** 230 V AC	 Adapter 5ST3820-6	 Adapter 5ST3820-7	 Adapter 5ST3820-1	 Adapter 5ST3820-2	 Adapter 5ST3820-1	 Adapter 5ST3820-5	 Adapter 5ST3820-3 add'l 5ST3820-6
	**RC mech. ARD* (2 MW) – 5ST3057** 12 V - 30 V AC 12 V - 48 V DC	 Adapter 5ST3820-6	 Adapter 5ST3820-7	 Adapter 5ST3820-1	 Adapter 5ST3820-2	 Adapter 5ST3820-1	 Adapter 5ST3820-5	 Adapter 5ST3820-3 add'l 5ST3820-6
	RC mech. ARD* (2 MW) – 5ST3058 230 V AC	 Adapter 5ST3820-6	 Adapter 5ST3820-7	 Adapter 5ST3820-1	 Adapter 5ST3820-2	 Adapter 5ST3820-1	 Adapter 5ST3820-5	 Adapter 5ST3820-3 add'l 5ST3820-6

* ARD = Auto Reclose Device

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Additional components

Combination options remote controlled mechanism – adapter – mount-on device (continued)

5SM2 + 5SL 3-4-pole	5SM2 + 5SY 1-2-pole	5SM2 + 5SY 3-4-pole	5SM9 + LS 5SY..CC 1-2-pole	5SM9 + LS 5SY..CC 3-4-pole	5SV3	5TL1 1-2-pole	5TL1 3-4-pole
							
not compatible	not compatible	not compatible	not compatible	not compatible	not compatible	 Adapter 5ST3820-8	 Adapter 5ST3821-1
not compatible	not compatible	not compatible	not compatible	not compatible	not compatible	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	 Adapter 5ST3820-4 add'l 5ST3820-7	 Adapter 5ST3820-6	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	 Adapter 5ST3820-4 add'l 5ST3820-7	 Adapter 5ST3820-6	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	 Adapter 5ST3820-4 add'l 5ST3820-7	 Adapter 5ST3820-6	 Adapter 5ST3820-8	 Adapter 5ST3821-1
 Adapter 5ST3820-3 add'l 5ST3820-7	 Adapter 5ST3820-3 add'l 5ST3820-1	 Adapter 5ST3820-3 add'l 5ST3820-2	 Adapter 5ST3820-4 add'l 5ST3820-6	Adapter 5ST3820-4 add'l 5ST3820-7	Adapter 5ST3820-6	Adapter 5ST3820-8	Adapter 5ST3821-1

I201_19651

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

		Remote controlled mechanisms NEW					
		5ST3053	**5ST3054**	**5ST3055**	**5ST3056**	**5ST3057**	**5ST3058**
Standards		IEC/EN 62606					
Rated voltages U_n	V AC	12 ... 30	177 ... 270	12 ... 30	177 ... 270	12 ... 30	177 ... 270
	V DC	12 ... 48		12 ... 48		12 ... 48	
• Rated frequency f_n	Hz	50 ... 60					
Rated power dissipation	VA	≤ 1 in standby					
Ambient temperature	°C	-25 ... +45					
Storage temperature	°C	-40 ... +55					
Degree of protection		IP20					
Service life, on average, with rated load		20 000 actuations					
Conductor cross-sections	mm^2 AWG	0.1… 2.5 14 … 30					
Terminals							
• Terminal tightening torque	Nm lb/in	0.2 2.0					
Cable length in the control circuit	m	≤ 1500					
Switching frequency		2 switching cycles per minute					
Number of automatic reclose attempts		--				3	
Integrated auxiliary switches		--		1 NO + 1 NC, 2 A, 250 V			
Integrated fault signal contact		--		1 NO + 1 NC, 2 A, 250 V			
Locking device		No	Yes	Yes	Yes	Yes	Yes

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Selection and ordering data

		Rated voltage	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**Remote controlled mechanisms (RC mech.)** NEW								
	• Remote controlled mechanisms Basic	12 ... 30 V AC 12 ... 48 V DC	1.5		**5ST3053**		1	1 unit	1AD
		177 ... 270 V AC	2		**5ST3054**		1	1 unit	1AD
	• Remote controlled mechanisms Power	12 ... 30 V AC 12 ... 48 V DC	2		**5ST3055**		1	1 unit	1AD
		177 ... 270 V AC			**5ST3056**		1	1 unit	1AD
	• Remote controlled mechanisms Power with automatic reclose function	12 ... 30 V AC 12 ... 48 V DC	2		**5ST3057**		1	1 unit	1AD
		177 ... 270 V AC			**5ST3058**		1	1 unit	1AD
	Note Matching adapters must be ordered separately.								
	**Accessories for remote controlled mechanisms** NEW								
	• Adapters for 5SY MCBs 1-2-pole				**5ST3820-1**		1	1 unit	1AD
	• Adapters for 5SY MCBs 3-4-pole				**5ST3820-2**		1	1 unit	1AD
	• Adapters for 5SM2 RC units				**5ST3820-3**		1	1 unit	1AD
	• Adapters for 5SU1 RCBOs				**5ST3820-5**		1	1 unit	1AD
	• Adapters for 5SL MCBs 1-2-pole, 5SV3 residual current switches				**5ST3820-6**		1	1 unit	1AD
	• Adapters for 5SL MCBs, 3-4-pole				**5ST3820-7**		1	1 unit	1AD
	• Adapters for 5TL1 ON/OFF switches 1-2-pole				**5ST3820-8**		1	1 unit	1AD
	• Adapters for 5TL1 ON/OFF switches 3-4-pole				**5ST3821-1**		1	1 unit	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

		Auxiliary switches (AS) 5SW330.	Auxiliary switches (AS) 5SW3330
Standards		EN 62019	
Terminals			
• Conductor cross-section	mm^2	0.75 ... 2.5	
• Tightening torque	Nm	0.5	
Short-circuit protection		B6 or C6 or gL/gG 6 A fuse	
Min. contact load		50 mA/24 V	
Max. contact load			
• 230 V AC, AC-12	A	6	5
• 230 V AC, AC-14	A	3.6	--
• 220 V DC, DC-12	A	1	0.5

			Auxiliary switches (AS)		Fault signal contacts (FC)
			5ST3010, 5ST3010-2 5ST3011, 5ST3011-2 5ST3012, 5ST3012-2	5ST3013, 5ST3013-2 5ST3014, 5ST3014-2 5ST3015, 5ST3015-2	5ST3020, 5ST3020-2 5ST3021, 5ST3021-2 5ST3022, 5ST3022-2
Standards			EN 62019; IEC/EN 60947-5-1; UL 1077; CSA C22.2 No. 235		
Approvals			see chapter "Appendix"		
Short-circuit protection			Miniature circuit breakers or gG 6 A fuse		
Contact load					
• Min. • Max.			50 mA, 24 V --	1 mA/5 V DC 50 mA/30 V DC	50 mA, 24 V --
• 400 V AC, AC-14, NO • 230 V AC, AC-14, NO • 400 V AC, AC-13, NC • 230 V AC, AC-13, NC		A A A A	2 6 2 6	-- -- -- --	2 6 2 6
• 220 V DC, DC-13, NO + NC • 110 V DC, DC-13, NO + NC • 60 V DC, DC-13, NO + NC • 24 V DC, DC-13, NO + NC		A A A A	1 1 3 6	-- -- -- --	1 1 3 6
Service life, on average, with rated load			20000 actuations	20000 actuations	20000 actuations
Conductor cross-sections		mm^2 AWG	0.5 ... 2.5 22 ... 14	0.5 ... 2.5 22 ... 14	0.5 ... 2.5 22 ... 14
Terminals					
• Terminal tightening torque		Nm lb/in	0.5 4.5	0.5 4.5	0.5 4.5
Mounting position			Any	Any	Any
Ambient temperature		°C	-25 ... +55	-25 ... +55	-25 ... +55
Storage temperature		°C	-40 ... +75	-40 ... +75	-40 ... +75
Resistance to climate	Acc. to IEC 60068-2-30	Cycles	28		
Shock	Acc. to IEC 60068-2-27	m/s	50 at 11 ms half-sine		
Resistance to vibrations	Acc. to IEC 60068-2-6	m/s^2	50 at 10 ... 150 Hz		

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Additional components

			Undervoltage releases (UR)	Shunt trips (ST)	
			5ST304.	5ST3030	5ST3031
Standards			EN 60947-1		
Rated voltages U_n		V AC	230	110 ... 415	24 ... 48
		V DC	24, 110	110	24 ... 48
• Operating range U_n			0.85 ... 1.1 x U_n	0.7 ... 1.1 x U_n	
• Rated frequency f_n		Hz	--	50 ... 60	
Response limits					
• Tripping			< 0.35 ... 0.7 × U_n	--	
Short-circuit protection			Miniature circuit breakers B/C 6 A or fuse gG 6 A		
Minimum contact load			50 mA, 24 V	50 mA, 24 V	
Tripping operations			max. 2000	max. 2000	
Service life, on average, with rated load			20000 actuations	20000 actuations	
Conductor cross-sections		mm^2 AWG	0.5 ... 2.5 22 ... 14	0.5 ... 2.5 22 ... 14	
Terminals					
• Terminal tightening torque		Nm lb/in	0.8 6.8	0.8 6.8	
Mounting position			Any	Any	
Ambient temperature		°C	-25 ... +55	-25 ... +55	
Storage temperature		°C	-40 ... +75	-40 ... +75	
Resistance to climate	Acc. to IEC 60068-2-30	Cycles	28		
Shock	Acc. to IEC 60068-2-27	m/s	50 at 11 ms half-sine		
Resistance to vibrations	Acc. to IEC 60068-2-6	m/s^2	50 at 10 ... 150 Hz		
Switching frequency			--		
Switching duration		s	--		
Minimum command duration		s	--		
Rated power dissipation		VA	--		
Behavior in the event of control voltage failure			--		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Rated voltage	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**Auxiliary switches (AS)**							
	For 5SM3 residual current protective devices up to 80 A							
	1 NO + 1 NC	0.5	▶	**5SW3300**		1	1 unit	1BE
	2 NC	0.5		**5SW3301**		1	1 unit	1BE
	2 NO	0.5		**5SW3302**		1	1 unit	1BE
	**Auxiliary switches (AS)**							
	For 5SM3 residual current protective devices, 100 ... 125 A, 3P+N							
	1 NO + 1 NC	0.5		**5SW3330**		1	1 unit	1BE
	**Auxiliary switches (AS)**							
	For 5SL, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, for 5SV residual current protective devices and 5TE8 switches (for 5SU1 the 5ST3805-1 handle coupler is required)							
	1 NO + 1 NC	0.5	▶	**5ST3010**		1	1 unit	1AD
	For low power		▶	**5ST3013**		1	1 unit	1AD
	2 NO			**5ST3011**		1	1 unit	1AD
	For low power			**5ST3014**		1	1 unit	1AD
	2 NC			**5ST3012**		1	1 unit	1AD
	For low power			**5ST3015**		1	1 unit	1AD
	**Auxiliary switches (AS) with TEST button**							
	For 5SL, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, for 5SV residual current protective devices and 5TE8 switches (for 5SU1 the 5ST3805-1 handle coupler is required)							
	1 NO + 1 NC	0.5		**5ST3010-2**		1	1 unit	1AD
	For low power			**5ST3013-2**		1	1 unit	1AD
	2 NO			**5ST3011-2**		1	1 unit	1AD
	For low power			**5ST3014-2**		1	1 unit	1AD
	2 NC			**5ST3012-2**		1	1 unit	1AD
	For low power			**5ST3015-2**		1	1 unit	1AD
	**Fault signal contacts (FC)**							
	For 5SL, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, and for 5SV residual current protective devices (for 5SU1 the 5ST3805-1 handle coupler is required)							
	1 NO + 1 NC	0.5	▶	**5ST3020**		1	1 unit	1AD
	2 NO			**5ST3021**		1	1 unit	1AD
	2 NC			**5ST3022**		1	1 unit	1AD
	**Fault signal contacts (FC) with TEST and ACKNOWLEDGE button**							
	For 5SL, 5SY, 5SP miniature circuit breakers, 5SU1 RCBOs, and for 5SV residual current protective devices (for 5SU1 the 5ST3805-1 handle coupler is required)							
	1 NO + 1 NC	0.5	▶	**5ST3020-2**		1	1 unit	1AD
	2 NO			**5ST3021-2**		1	1 unit	1AD
	2 NC			**5ST3022-2**		1	1 unit	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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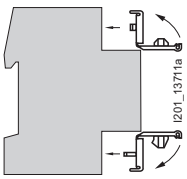
Additional components

	Rated voltage	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
								
Undervoltage releases (UR)								
For 5SY, 5SP miniature circuit breakers, 5SV residual current protective devices and 5SU1 RCBOs (for 5SU1 the 5ST3805-1 handle coupler is required)								
With integrated auxiliary switch	230 AC	1	▶	**5ST3040**		1	1 unit	1AD
	110 DC			**5ST3041**		1	1 unit	1AD
	24 DC			**5ST3042**		1	1 unit	1AD
Without integrated auxiliary switch	230 AC	1	▶	**5ST3043**		1	1 unit	1AD
	110 DC			**5ST3044**		1	1 unit	1AD
	24 DC			**5ST3045**		1	1 unit	1AD
								
Shunt trips (ST)								
For 5SY, 5SP miniature circuit breakers, 5SV residual current protective devices and 5SU1 RCBOs (for 5SU1 the 5ST3805-1 handle coupler is required)								
	110 ... 415 V AC	1	▶	**5ST3030**		1	1 unit	1AD
	24 ... 48 V AC/DC	1	▶	**5ST3031**		1	1 unit	1AD
								
Covers for connection terminals								
For 5SM3 RCCBs up to 80 A, sealable (2 units in plastic bag)								
		2		**5SW3010**		1	1 unit	1BE
		2.5		**5SW3011**		1	1 unit	1BE
		4		**5SW3008**		1	1 unit	1BE
								
Locking device								
For 5SM3 RCCBs up to 80 A, sealable and lockable								
4.5 mm lock hasp diameter				**5SW3303**		1	10 units	1BE
								
Handle locking devices								
• For 5SV RCCBs • For padlock with 3 ... 6 mm shackle				**5ST3806**		1	5 units	1AD
								
Padlocks								
For 5SW3303 locking device				**5ST3802**		1	1 unit	1AD
Locking devices with padlock								
Comprising 5SW3303 locking device and 5ST3802 padlock				**5SW3312**		1	1 set	1BE

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

RC units are used in all supply systems up to 240/415 V AC. Devices of type AC trip in the event of sinusoidal AC residual currents, type A also trips in the event of pulsating DC residual currents.

In addition, RC units type F also detect residual currents with mixed frequencies up to 1 kHz.

RCCBs with a rated residual current of maximum 30 mA are used for personnel, material and fire protection, as well as for protection against direct contact.

Devices with a rated residual current of maximum 300 mA are used as preventive fire protection in case of insulation faults.

RC units are combined with miniature circuit breakers with A, B, C and D characteristics, provided that these are available in the MCB range. The two components are simply plugged together without the need for any tools.

They then form a combination of RCCB and miniature circuit breaker for personnel, fire and line protection.

The dimensioning of the rated residual current depends on the size of the plant.

Benefits

- Our wide variety of RC unit types and comprehensive range of miniature circuit breakers offer a huge spectrum of combinations for all applications.
- Instantaneous type A devices have a surge current withstand capability with current waveform 8/20 µs of more than 1 kA, super resistant devices of more than 3 kA and selective devices of more than 5 kA. This ensures safe operation.
- All additional components for miniature circuit breakers can be retrofitted on the right-hand side.
- All 100 A and 125 A RC units offer external remote tripping over terminals Y1/Y2. This supports implementation of central OFF circuits.
- Both components can be simply plugged into each other and secured with captive metal brackets - no tools required. This saves considerable time when mounting



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Technical specifications

			5SM2
Standards			IEC/EN 61009-1 (VDE 0664-20), IEC/EN 61009-2-1 (VDE 0664-21), IEC/EN 61543 (VDE 0664-30), IEC/EN 62423 (VDE 0664-40)
Surge current withstand capability			
• Type A with current waveform 8/20 µs	Acc. to EN 60060-2 (VDE 0432-2)		
- Instantaneous		kA	> 1
- Super resistant		kA	> 3
- Selective		kA	> 5
• Type F with current waveform 8/20 µs	Acc. to EN 60060-2 (VDE 0432-2)	kA	> 3
Minimum operational voltage for test function operation		V AC	195
Rated voltage U_n		V AC	230 ... 400
Rated currents I_n		A	0.3 ... 16; 0.3 ... 40; 0.3 ... 63; 80 ... 100
Rated residual currents $I_{\Delta n}$		mA	10, 30, 100, 300, 500, 1000
Insulation coordination			
• Overvoltage category			III
Pollution degree			2
Terminal conductor cross-sections			
• Up to I_n = 63 A		mm^2	1.0 ... 25
• At I_n = 80 ... 100 A		mm^2	6.0 ... 50
Terminal tightening torque		Nm	2.5 ... 3.0
Mains connection			Either top or bottom
Mounting position (on a standard mounting rail)			Any
Degree of protection	Acc. to EN 60529 (VDE 0470-1)		IP20, if the distribution board is installed, with connected conductors
Touch protection	Acc. to EN 50274 (VDE 0660-514)		Finger and back-of-hand safe
Service life	Average number of switching cycles		> 10000 switching cycles
Storage temperature		°C	-40 ... +75
Ambient temperature		°C	-25 ... +45, marked with -25
Resistance to climate	Acc. to IEC 60068-2-30		28 cycles (55 °C; 95% rel. air humidity)
CFC and silicone-free			Yes

Power losses per conducting path under rated current load

Number of poles	Rated current	Rated residual current $I_{\Delta n}$ [A]	Power losses per conducting path P_v [W]
2	16	0.01	2.5
2/3/4	40	0.03	3.6
	63	0.03	4.6
	40	0.3/0.5/1	1.9
	63	0.1/0.3/0.5/1	3.0
2/4	80	0.3	4.8
	80	0.3/1	4.0
	100	0.3	6.0
	100	0.3/1	5.0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

(Type AC)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
RC units, type AC, instantaneous									
	For 5SY miniature circuit breakers, not suitable for use with 5SY5, 5SY30 and 5SY60								
	**2P, 230 ... 400 V AC**								
	10[1]	0.3 ... 40	2		**5SM2121-0**		1	1 unit	1AI
	30				**5SM2322-0**		1	1 unit	1AI
	300				**5SM2622-0**		1	1 unit	1AI
	30	0.3 ... 63			**5SM2325-0**		1	1 unit	1AI
	300				**5SM2625-0**		1	1 unit	1AI
	500				**5SM2725-0**		1	1 unit	1AI
	1000				**5SM2825-0**		1	1 unit	1AI
	**3P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2332-0**		1	1 unit	1AI
	300				**5SM2632-0**		1	1 unit	1AI
	30	0.3 ... 63			**5SM2335-0**		1	1 unit	1AI
	300				**5SM2635-0**		1	1 unit	1AI
	500				**5SM2735-0**		1	1 unit	1AI
	**4P, 230 ... 400 V AC**								
	30	0.3 ... 40	3	▶	**5SM2342-0**		1	1 unit	1AI
	300			▶	**5SM2642-0**		1	1 unit	1AI
	30	0.3 ... 63			**5SM2345-0**		1	1 unit	1AI
	300				**5SM2645-0**		1	1 unit	1AI
	500				**5SM2745-0**		1	1 unit	1AI
	For 5SL4 miniature circuit breakers								
	**2P, 230 ... 400 V AC**								
	30	0.3 ... 40	2		**5SM2323-0**		1	1 unit	1AI
	300				**5SM2623-0**		1	1 unit	1AI
	30	0.3 ... 63			**5SM2326-0**		1	1 unit	1AI
	300				**5SM2626-0**		1	1 unit	1AI
	**3P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2333-0**		1	1 unit	1AI
	300				**5SM2633-0**		1	1 unit	1AI
	30	0.3 ... 63			**5SM2336-0**		1	1 unit	1AI
	300				**5SM2636-0**		1	1 unit	1AI
	**4P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2343-0**		1	1 unit	1AI
	300				**5SM2643-0**		1	1 unit	1AI
	30	0.3 ... 63			**5SM2346-0**		1	1 unit	1AI
	300				**5SM2646-0**		1	1 unit	1AI

[1] 5SM2 RC units with $I_{\Delta n}$ = 10 mA can be combined with switches I_n = 16 A

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5SM2 RC units

(Type AC)	Rated residual current	Rated current	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n							
	mA	A	MW	d					
RC units, type AC, selective S									
	***For 5SY miniature circuit breakers,*** not suitable for use with 5SY5, 5SY30 and 5SY60								
	2P, 230 ... 400 V AC								
	300	0.3 ... 40	2		**5SM2622-2**		1	1 unit	1AI
	300	0.3 ... 63			**5SM2625-2**		1	1 unit	1AI
	**4P, 230 ... 400 V AC**								
	300	0.3 ... 63	3		**5SM2645-2**		1	1 unit	1AI
	1000				**5SM2845-2**		1	1 unit	1AI
	***For 5SL4 miniature circuit breakers***								
	2P, 230 ... 400 V AC								
	300	0.3 ... 40	2		**5SM2623-2**		1	1 unit	1AI
		0.3 ... 63			**5SM2626-2**		1	1 unit	1AI
	**4P, 230 ... 400 V AC**								
	300	0.3 ... 63	4		**5SM2646-2**		1	1 unit	1AI
RC units, type AC, instantaneous									
	***For 5SP4 miniature circuit breakers (B and C characteristics)***								
	2P, 230 ... 400 V AC								
	30	80 ... 100	3.5		**5SM2327-0**		1	1 unit	1AI
	300				**5SM2627-0**		1	1 unit	1AI
	**4P, 230 ... 400 V AC**								
	30	80 ... 100	5		**5SM2347-0**		1	1 unit	1AI
	300				**5SM2647-0**		1	1 unit	1AI

Minimum order quantity (PS) or a multiple thereof can be ordered.

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(Type A)	Rated residual current	Rated current	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$ mA	I_n A	MW	d					
RC units, type A, instantaneous									
	For 5SY miniature circuit breakers, not suitable for use with 5SY5, 5SY8 and 5SY60. . ,								
	**2P, 230 ... 400 V AC**								
	10	0.3 ... 16	2		**5SM2121-6**		1	1 unit	1AH
	30	0.3 ... 40		▶	**5SM2322-6**		1	1 unit	1AH
	300				**5SM2622-6**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2325-6**		1	1 unit	1AH
	100				**5SM2425-6**		1	1 unit	1AH
	300				**5SM2625-6**		1	1 unit	1AH
	500				**5SM2725-6**		1	1 unit	1AH
	**3P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2332-6**		1	1 unit	1AH
	300				**5SM2632-6**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2335-6**		1	1 unit	1AH
	100				**5SM2435-6**		1	1 unit	1AH
	300				**5SM2635-6**		1	1 unit	1AH
	500				**5SM2735-6**		1	1 unit	1AH
	**4P, 230 ... 400 V AC**								
	30	0.3 ... 40	3	▶	**5SM2342-6**		1	1 unit	1AH
	300			▶	**5SM2642-6**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2345-6**		1	1 unit	1AH
	100				**5SM2445-6**		1	1 unit	1AH
	300				**5SM2645-6**		1	1 unit	1AH
	500				**5SM2745-6**		1	1 unit	1AH
	For 5SL4 miniature circuit breakers								
	**2P, 230 ... 400 V AC**								
	30	0.3 ... 40	2		**5SM2323-6**		1	1 unit	1AH
	300				**5SM2623-6**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2326-6**		1	1 unit	1AH
	300				**5SM2626-6**		1	1 unit	1AH
	**3P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2333-6**		1	1 unit	1AH
	300				**5SM2633-6**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2336-6**		1	1 unit	1AH
	300				**5SM2636-6**		1	1 unit	1AH
	**4P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2343-6**		1	1 unit	1AH
	300				**5SM2643-6**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2346-6**		1	1 unit	1AH
	300				**5SM2646-6**		1	1 unit	1AH

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5SM2 RC units

(Type A)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	For 5SP4 miniature circuit breakers (B and C characteristics)								
	**2P, 125 ... 230 V AC**								
	30	80 ... 100	3.5		**5SM2327-6**		1	1 unit	1AH
	300				**5SM2627-6**		1	1 unit	1AH
	**4P, 230 ... 400 V AC**								
	30	80 ... 100	5		**5SM2347-6**		1	1 unit	1AH
	300				**5SM2647-6**		1	1 unit	1AH
RC units, type A, super resistant K									
	For 5SY miniature circuit breakers, not suitable for use with 5SY5, 5SY8 and 5SY60. . ,								
	**2P, 230 ... 400 V AC**								
	30	0.3 ... 40	2		**5SM2322-6KK01**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2325-6KK01**		1	1 unit	1AH
	**3P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2332-6KK01**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2335-6KK01**		1	1 unit	1AH
	**4P, 230 ... 400 V AC**								
	30	0.3 ... 40	3		**5SM2342-6KK01**		1	1 unit	1AH
	30	0.3 ... 63			**5SM2345-6KK01**		1	1 unit	1AH

Minimum order quantity (PS) or a multiple thereof can be ordered.

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(Type A)	Rated residual current	Rated current	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n							
	mA	A	MW	d					
RC units, type A, selective S									
	For 5SY miniature circuit breakers, not suitable for use with 5SY5, 5SY8 and 5SY60. . ,								
	**2P, 230 ... 400 V AC**								
	300	0.3 ... 40	2		**5SM2622-8**		1	1 unit	1AH
	1000				**5SM2822-8**		1	1 unit	1AH
	300	0.3 ... 63			**5SM2625-8**		1	1 unit	1AH
	1000				**5SM2825-8**		1	1 unit	1AH
	**3P, 230 ... 400 V AC**								
	1000	0.3 ... 40	3		**5SM2832-8**		1	1 unit	1AH
	300	0.3 ... 63	3		**5SM2635-8**		1	1 unit	1AH
	500				**5SM2735-8**		1	1 unit	1AH
	1000				**5SM2835-8**		1	1 unit	1AH
	**4P, 230 ... 400 V AC**								
	1000	0.3 ... 40	3		**5SM2842-8**		1	1 unit	1AH
	300	0.3 ... 63			**5SM2645-8**		1	1 unit	1AH
	500				**5SM2745-8**		1	1 unit	1AH
	1000				**5SM2845-8**		1	1 unit	1AH
	For 5SL4 miniature circuit breakers								
	**2P, 230 ... 400 V AC**								
	300	0.3 ... 40	2		**5SM2623-8**		1	1 unit	1AH
	300	0.3 ... 63			**5SM2626-8**		1	1 unit	1AH
	**3P, 230 ... 400 V AC**								
	300	0.3 ... 63	3		**5SM2636-8**		1	1 unit	1AH
	**4P, 230 ... 400 V AC**								
	300	0.3 ... 63	3		**5SM2646-8**		1	1 unit	1AH

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5SM2 RC units

(Type A)	Rated residual current	Rated current	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	$I_{\Delta n}$	I_n							
	mA	A	MW	d					
	For 5SP4 miniature circuit breakers (B and C characteristics)								
	2P, 125 ... 230 V AC								
	300	80 ... 100	3.5		**5SM2627-8**		1	1 unit	1AH
	1000	80 ... 100	3.5		**5SM2827-8**		1	1 unit	1AH
	4P, 230 ... 400 V AC								
	300	80 ... 100	5		**5SM2647-8**		1	1 unit	1AH
	1000				**5SM2847-8**		1	1 unit	1AH
RC units, type F, super resistant									
	For 5SY miniature circuit breakers, not suitable for use with 5SY5, 5SY8 and 5SY60..,								
	2P, 230 ... 400 V AC								
	30	0.3 ... 40	2		**5SM2322-3**		1	1 unit	1AH
	30	0.3 ... 63	2		**5SM2325-3**		1	1 unit	1AH

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

RCBOs are a combination of an RCCB and a miniature circuit breaker in a compact design for personnel, fire and line protection. For personnel protection and fire protection, the residual current part of the type AC trips in the event of sinusoidal AC residual currents, type A also trips in the event of pulsating DC residual currents.

In addition, RCBOs type F also detect residual currents with mixed frequencies up to 1 kHz.

RCBOs with a rated residual current of maximum 30 mA are used for personnel, material and fire protection, as well as for protection against direct contact. RCBOs with a rated residual current of 10 mA are primarily used in areas that represent an increased risk for personnel and in the outdoor installations of residential buildings.

Devices with a rated residual current of maximum 300 mA are used as preventive fire protection in case of insulation faults.

The MCB part of the RCBO protects lines against overload and short circuits and is available in characteristics B and C.

Since DIN VDE 0100-410 came into effect in June 2007, all socket outlet current circuits up to 20 A must now also be fitted with residual current protective devices with a rated residual current of max. 30 mA. This also applies to outdoor electrical circuits up to 32 A for the connection of portable equipment.

In order to implement this protection, we recommend the use of RCBOs with 30 mA on a country-specific basis.

Assignment to each individual branch circuit helps prevent the undesired tripping of fault-free circuits induced by the accumulation of operation-related leakage currents or by transient current pulses during switching operations.

Additional components of the 5SY miniature circuit breakers can be mounted at the side and carry out additional functions.

For further details on additional components, see chapter "Miniature Circuit Breakers".

RCBOs comprise one part for fault-current detection and one part for overcurrent detection. They are equipped with a delayed overload/time-dependent thermal release (thermal bimetal) for low overcurrents and with an instantaneous electromagnetic release for higher overload and short-circuit currents.

The special contact materials used guarantee a long service life and offer a high degree of protection against contact welding.

Benefits





For all versions

- Clear and visible conductor connection in front of the rear busbar facilitates controls
- Large and easily accessible wiring space enables easy insertion of conductors in the terminals
- The surge current withstand capability of over 1 kA ensures safe and reliable operation
- All additional components for miniature circuit breakers can be retrofitted on the right-hand side

For all 10 kA versions up to 40 A

- Integrated movable terminal covers located at the cable entries ensure the terminals are fully insulated when the screws are tightened. The effective touch protection when grasping the device considerably exceeds the requirements of BGV A3
- The RCBOs can be quickly and easily removed from the assembly by hand if connections need to be changed. Time-saving replacement of parts as busbars no longer need to be freed from adjacent miniature circuit breakers

For all 125 A versions

- The RCBOs offer external remote tripping over terminals Y1/Y2. This supports implementation of central OFF circuits.

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Technical specifications

			Up to 40 A	125 A
Standards			IEC/EN 61009-1 (VDE 0664-20); IEC/EN 61009-2-1 (VDE 0664-21) IEC/EN 61543 (VDE 0664-30); IEC/EN 62423 (VDE 0664-40)	
Rated voltages U_n		V AC	230	400
Rated currents I_n		A	6, 8, 10, 13, 16, 20, 25, 32, 40	125
Rated residual currents $I_{\Delta n}$		mA	10, 30, 100, 300	30, 300, 1000
Rated breaking capacity		kA	6 / 10	10
Energy limitation class			3	--
Surge current withstand capability type A				
• With current waveform 8/20 µs	Acc. to EN 60060-2 (VDE 0432-2)			
- Instantaneous		kA	> 1	
- Super resistant		kA	> 3	--
- Selective		kA	> 5	
• Type F with current waveform 8/20 µs		kA	> 3	--
Minimum voltage for operation of the test equipment		V AC	195	
Insulation coordination				
• Overvoltage category			III	
Pollution degree			2	
Terminal conductor cross-sections				
• Solid and stranded		mm^2	0.75 ... 35	6 ... 50
• Finely stranded with end sleeve		mm^2	0.75 ... 25	6 ... 35
Terminal tightening torque		Nm	2.5 ... 3.0	3.0 ... 3.5
Mains connection			Top or bottom	
Mounting position (on a standard mounting rail)			Any	
Degree of protection	Acc. to EN 60529 (VDE 0470-1)		IP20, if the distribution board is installed, with connected conductors	
Touch protection	Acc. to EN 50274 (VDE 0660-514)		Finger and back-of-hand safe	
Service life	Average number of switching cycles		> 10000	
Storage temperature		°C	-40 ... +75	
Ambient temperature		°C	-25 ... +45, marked with -25	
Resistance to climate	Acc. to IEC 60068-2-30		28 cycles (55 °C; 95% rel. air humidity)	
CFC and silicone-free			Yes	

Power losses

Note:

All data under loading with rated current I_n.

Rated current I_n [A]	Rated residual current $I_{\Delta n}$ [mA]	Power losses per conducting path P_v [W]	
		Characteristic B	Characteristic C
6	10	2.8	2.2
	30 ... 300	2.7	1.9
8	30 ... 300	--	1.2
10	10	2.4	2.2
	30 ... 300	1.8	1.6
13	10	3.5	3.3
	30 ... 300	2.4	2.2
16	10	4.7	4.5
	30 ... 300	3.0	2.8
20	30 ... 300	3.7	3.3
25	30 ... 300	5.1	5.1
32	30 ... 300	5.7	5.7
40	30 ... 300	7.8	7.8

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

(Type AC)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Tripping characteristic B Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	Tripping characteristic C Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
RCBOs, type AC, instantaneous															
1P + N; 230 V AC															
4 500 / 3															
N connection, right															
	30	6	2		--						**5SU1353-1KK06**		1	1 unit	1BB
		8			--						**5SU1353-1KK08**		1	1 unit	1BB
		10			--						**5SU1353-1KK10**		1	1 unit	1BB
	Bulk packaging 36 units NEW				--						**5SU1353-1GV10**		1	36 units	1BB
		13			--						**5SU1353-1KK13**		1	1 unit	1BB
		16			--						**5SU1353-1KK16**		1	1 unit	1BB
	Bulk packaging 36 units NEW				--						**5SU1353-1GV16**		1	36 units	1BB
		20			--						**5SU1353-1KK20**		1	1 unit	1BB
		25			--						**5SU1353-1KK25**		1	1 unit	1BB
		32			--						**5SU1353-1KK32**		1	1 unit	1BB
		40			--						**5SU1353-1KK40**		1	1 unit	1BB
	300	6	2		--						**5SU1653-1KK06**		1	1 unit	1BB
		10			--						**5SU1653-1KK10**		1	1 unit	1BB
		13			--						**5SU1653-1KK13**		1	1 unit	1BB
		16			--						**5SU1653-1KK16**		1	1 unit	1BB
	Bulk packaging 36 units NEW				--						**5SU1653-1GV16**		1	36 units	1BB
		20			--						**5SU1653-1KK20**		1	1 unit	1BB
		25			--						**5SU1653-1KK25**		1	1 unit	1BB
		32			--						**5SU1653-1KK32**		1	1 unit	1BB
		40			--						**5SU1653-1KK40**		1	1 unit	1BB
N connection, left															
	30	6	2		--						**5SU1353-1KL06**		1	1 unit	1BB
		10			--						**5SU1353-1KL10**		1	1 unit	1BB
		13			--						**5SU1353-1KL13**		1	1 unit	1BB
		16			--						**5SU1353-1KL16**		1	1 unit	1BB
		20			--						**5SU1353-1KL20**		1	1 unit	1BB
		25			--						**5SU1353-1KL25**		1	1 unit	1BB
		32			--						**5SU1353-1KL32**		1	1 unit	1BB
		40			--						**5SU1353-1KL40**		1	1 unit	1BB
	300	6	2		--						**5SU1653-1KL06**		1	1 unit	1BB
		10			--						**5SU1653-1KL10**		1	1 unit	1BB
		16			--						**5SU1653-1KL16**		1	1 unit	1BB
		20			--						**5SU1653-1KL20**		1	1 unit	1BB
		25			--						**5SU1653-1KL25**		1	1 unit	1BB
		32			--						**5SU1653-1KL32**		1	1 unit	1BB
		40			--						**5SU1653-1KL40**		1	1 unit	1BB

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5SU1 RCBOs

RCBOs, type AC, instantaneous (only available in Austria)

1P + N; 230 V AC

6 000
3

N connection, right



(Type AC)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Tripping characteristic B Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	Tripping characteristic C Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	30	6	2		**5SU1356-0KK06**		1	1 unit	1BB		**5SU1356-1KK06**		1	1 unit	1BB
		8			**--**						**5SU1356-1KK08**		1	1 unit	1BB
		10			**5SU1356-0KK10**		1	1 unit	1BB		**5SU1356-1KK10**		1	1 unit	1BB
		13			**5SU1356-0KK13**		1	1 unit	1BB		**5SU1356-1KK13**		1	1 unit	1BB
		16			**5SU1356-0KK16**		1	1 unit	1BB		**5SU1356-1KK16**		1	1 unit	1BB
	Bulk packaging 36 units NEW				**--**						**5SU1356-1GV16**		1	36 units	1BB
		20			**5SU1356-0KK20**		1	1 unit	1BB		**5SU1356-1KK20**		1	1 unit	1BB
		25			**5SU1356-0KK25**		1	1 unit	1BB		**5SU1356-1KK25**		1	1 unit	1BB
		32			**5SU1356-0KK32**		1	1 unit	1BB		**5SU1356-1KK32**		1	1 unit	1BB
		40			**5SU1356-0KK40**		1	1 unit	1BB		**5SU1356-1KK40**		1	1 unit	1BB
	300	6	2		**5SU1656-0KK06**		1	1 unit	1BB		**5SU1656-1KK06**		1	1 unit	1BB
		10			**5SU1656-0KK10**		1	1 unit	1BB		**5SU1656-1KK10**		1	1 unit	1BB
		13			**5SU1656-0KK13**		1	1 unit	1BB		**5SU1656-1KK13**		1	1 unit	1BB
		16			**5SU1656-0KK16**		1	1 unit	1BB		**5SU1656-1KK16**		1	1 unit	1BB
		20			**5SU1656-0KK20**		1	1 unit	1BB		**5SU1656-1KK20**		1	1 unit	1BB
		25			**5SU1656-0KK25**		1	1 unit	1BB		**5SU1656-1KK25**		1	1 unit	1BB
		32			**5SU1656-0KK32**		1	1 unit	1BB		**5SU1656-1KK32**		1	1 unit	1BB
		40			**5SU1656-0KK40**		1	1 unit	1BB		**5SU1656-1KK40**		1	1 unit	1BB

RCBOs, type AC, instantaneous

1P + N; 230 V AC

10 000
3



	30	6	2		**5SU1354-0KK06**		1	1 unit	1BB		**5SU1354-1KK06**		1	1 unit	1BB
		8			**--**						**5SU1354-1KK08**		1	1 unit	1BB
		10			**5SU1354-0KK10**		1	1 unit	1BB		**5SU1354-1KK10**		1	1 unit	1BB
		13			**5SU1354-0KK13**		1	1 unit	1BB		**5SU1354-1KK13**		1	1 unit	1BB
		16			**5SU1354-0KK16**		1	1 unit	1BB		**5SU1354-1KK16**		1	1 unit	1BB
		20			**5SU1354-0KK20**		1	1 unit	1BB		**5SU1354-1KK20**		1	1 unit	1BB
		25			**5SU1354-0KK25**		1	1 unit	1BB		**5SU1354-1KK25**		1	1 unit	1BB
		32			**5SU1354-0KK32**		1	1 unit	1BB		**5SU1354-1KK32**		1	1 unit	1BB
		40			**5SU1354-0KK40**		1	1 unit	1BB		**5SU1354-1KK40**		1	1 unit	1BB
	100	6	2		**--**						**5SU1454-1KK06**		1	1 unit	1BB
		10			**--**						**5SU1454-1KK10**		1	1 unit	1BB
		13			**--**						**5SU1454-1KK13**		1	1 unit	1BB
		16			**--**						**5SU1454-1KK16**		1	1 unit	1BB
		20			**--**						**5SU1454-1KK20**		1	1 unit	1BB
		25			**--**						**5SU1454-1KK25**		1	1 unit	1BB
		32			**--**						**5SU1454-1KK32**		1	1 unit	1BB
		40			**--**						**5SU1454-1KK40**		1	1 unit	1BB
	300	6	2		**5SU1654-0KK06**		1	1 unit	1BB		**5SU1654-1KK06**		1	1 unit	1BB
		10			**5SU1654-0KK10**		1	1 unit	1BB		**5SU1654-1KK10**		1	1 unit	1BB
		13			**5SU1654-0KK13**		1	1 unit	1BB		**5SU1654-1KK13**		1	1 unit	1BB
		16			**5SU1654-0KK16**		1	1 unit	1BB		**5SU1654-1KK16**		1	1 unit	1BB
		20			**5SU1654-0KK20**		1	1 unit	1BB		**5SU1654-1KK20**		1	1 unit	1BB
		25			**5SU1654-0KK25**		1	1 unit	1BB		**5SU1654-1KK25**		1	1 unit	1BB
		32			**5SU1654-0KK32**		1	1 unit	1BB		**5SU1654-1KK32**		1	1 unit	1BB
		40			**5SU1654-0KK40**		1	1 unit	1BB		**5SU1654-1KK40**		1	1 unit	1BB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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(Type AC)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Tripping characteristic B Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	Tripping characteristic C Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
RCBOs, type AC, short-time delayed G (only available in Austria)															
	**1P+N; 230 V AC**														
	10 000														
	3														
	30	10	2		**5SU1354-0LB10**		1	1 unit	1BB		**5SU1354-1LB10**		1	1 unit	1BB
		13			**5SU1354-0LB13**		1	1 unit	1BB		**5SU1354-1LB13**		1	1 unit	1BB
		16			**5SU1354-0LB16**		1	1 unit	1BB		**5SU1354-1LB16**		1	1 unit	1BB
		20			**5SU1354-0LB20**		1	1 unit	1BB		**5SU1354-1LB20**		1	1 unit	1BB
		25			**5SU1354-0LB25**		1	1 unit	1BB		**5SU1354-1LB25**		1	1 unit	1BB
		32			**5SU1354-0LB32**		1	1 unit	1BB		**5SU1354-1LB32**		1	1 unit	1BB
		40			**5SU1354-0LB40**		1	1 unit	1BB		**5SU1354-1LB40**		1	1 unit	1BB
RCBOs, type AC, instantaneous (only available in Austria)															
	**2P, 400 V AC**														
	10 000														
	30	125	6.5		**5SU1324-0KK82**		1	1 unit	1BB		**5SU1324-1KK82**		1	1 unit	1BB
	300	125			**5SU1624-0KK82**		1	1 unit	1BB		**5SU1624-1KK82**		1	1 unit	1BB
	**4P, 400 V AC**														
	10 000														
	30	125	11		**5SU1344-0KK82**		1	1 unit	1BB		**5SU1344-1KK82**		1	1 unit	1BB
	300	125			**5SU1644-0KK82**		1	1 unit	1BB		**5SU1644-1KK82**		1	1 unit	1BB

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5SU1 RCBOs

RCBOs, type A, instantaneous

(Type A)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Tripping characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	Tripping characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
1P+N; 230 V AC															
4 500 / 3															
N connection, right															
	30	6	2		--						**5SU1353-7KK06**		1	1 unit	1BC
		8			--						**5SU1353-7KK08**		1	1 unit	1BC
		10			--						**5SU1353-7KK10**		1	1 unit	1BC
		13			--						**5SU1353-7KK13**		1	1 unit	1BC
		16			--						**5SU1353-7KK16**		1	1 unit	1BC
		20			--						**5SU1353-7KK20**		1	1 unit	1BC
		25			--						**5SU1353-7KK25**		1	1 unit	1BC
		32			--						**5SU1353-7KK32**		1	1 unit	1BC
		40			--						**5SU1353-7KK40**		1	1 unit	1BC
	300	6	2		--						**5SU1653-7KK06**		1	1 unit	1BC
		10			--						**5SU1653-7KK10**		1	1 unit	1BC
		13			--						**5SU1653-7KK13**		1	1 unit	1BC
		16			--						**5SU1653-7KK16**		1	1 unit	1BC
		20			--						**5SU1653-7KK20**		1	1 unit	1BC
		25			--						**5SU1653-7KK25**		1	1 unit	1BC
		32			--						**5SU1653-7KK32**		1	1 unit	1BC
		40			--						**5SU1653-7KK40**		1	1 unit	1BC
N connection, left															
	30	6	2		--						**5SU1353-7KL06**		1	1 unit	1BC
		10			--						**5SU1353-7KL10**		1	1 unit	1BC
		16			--						**5SU1353-7KL16**		1	1 unit	1BC
		20			--						**5SU1353-7KL20**		1	1 unit	1BC
		25			--						**5SU1353-7KL25**		1	1 unit	1BC
		32			--						**5SU1353-7KL32**		1	1 unit	1BC
		40			--						**5SU1353-7KL40**		1	1 unit	1BC
1P+N; 230 V AC															
6 000 / 3															
N connection, right															
	30	6	2		**5SU1356-6KK06**		1	1 unit	1BC		**5SU1356-7KK06**		1	1 unit	1BC
		8			--						**5SU1356-7KK08**		1	1 unit	1BC
		10			**5SU1356-6KK10**		1	1 unit	1BC	▶	**5SU1356-7KK10**		1	1 unit	1BC
	Bulk packaging 36 units NEW				**5SU1356-6GV10**		1	36 units	1BC		**5SU1356-7GV10**		1	36 units	1BC
		13			**5SU1356-6KK13**		1	1 unit	1BC		**5SU1356-7KK13**		1	1 unit	1BC
		16		▶	**5SU1356-6KK16**		1	1 unit	1BC	▶	**5SU1356-7KK16**		1	1 unit	1BC
	Bulk packaging 36 units NEW				**5SU1356-6GV16**		1	36 units	1BC		**5SU1356-7GV16**		1	36 units	1BC
		20			**5SU1356-6KK20**		1	1 unit	1BC		**5SU1356-7KK20**		1	1 unit	1BC
		25			**5SU1356-6KK25**		1	1 unit	1BC		**5SU1356-7KK25**		1	1 unit	1BC
		32			**5SU1356-6KK32**		1	1 unit	1BC		**5SU1356-7KK32**		1	1 unit	1BC
		40			**5SU1356-6KK40**		1	1 unit	1BC		**5SU1356-7KK40**		1	1 unit	1BC
	300	6	2		**5SU1656-6KK06**		1	1 unit	1BC		**5SU1656-7KK06**		1	1 unit	1BC
		10			**5SU1656-6KK10**		1	1 unit	1BC		**5SU1656-7KK10**		1	1 unit	1BC
		13			**5SU1656-6KK13**		1	1 unit	1BC		**5SU1656-7KK13**		1	1 unit	1BC
		16			**5SU1656-6KK16**		1	1 unit	1BC		**5SU1656-7KK16**		1	1 unit	1BC
		20			**5SU1656-6KK20**		1	1 unit	1BC		**5SU1656-7KK20**		1	1 unit	1BC
		25			**5SU1656-6KK25**		1	1 unit	1BC		**5SU1656-7KK25**		1	1 unit	1BC
		32			**5SU1656-6KK32**		1	1 unit	1BC		**5SU1656-7KK32**		1	1 unit	1BC
		40			**5SU1656-6KK40**		1	1 unit	1BC		**5SU1656-7KK40**		1	1 unit	1BC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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(Type A)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Tripping characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	Tripping characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**1P+N; 230 V AC** 10 000 / 3														
	10	6	2		**5SU1154-6KK06**		1	1 unit	1BC		**5SU1154-7KK06**		1	1 unit	1BC
		10			**5SU1154-6KK10**		1	1 unit	1BC		**5SU1154-7KK10**		1	1 unit	1BC
		13			**5SU1154-6KK13**		1	1 unit	1BC		**5SU1154-7KK13**		1	1 unit	1BC
		16			**5SU1154-6KK16**		1	1 unit	1BC	▶	**5SU1154-7KK16**		1	1 unit	1BC
	30	6	2		**5SU1354-6KK06**		1	1 unit	1BC	▶	**5SU1354-7KK06**		1	1 unit	1BC
		8			--						**5SU1354-7KK08**		1	1 unit	1BC
		10			**5SU1354-6KK10**		1	1 unit	1BC	▶	**5SU1354-7KK10**		1	1 unit	1BC
	Bulk packaging 36 units NEW				**5SU1354-6GV10**		1	36 units	1BC		**5SU1354-7GV10**		1	36 units	1BC
		13			**5SU1354-6KK13**		1	1 unit	1BC		**5SU1354-7KK13**		1	1 unit	1BC
		16		▶	**5SU1354-6KK16**		1	1 unit	1BC	▶	**5SU1354-7KK16**		1	1 unit	1BC
	Bulk packaging 36 units NEW				**5SU1354-6GV16**		1	36 units	1BC		**5SU1354-7GV16**		1	36 units	1BC
		20			**5SU1354-6KK20**		1	1 unit	1BC		**5SU1354-7KK20**		1	1 unit	1BC
		25			**5SU1354-6KK25**		1	1 unit	1BC		**5SU1354-7KK25**		1	1 unit	1BC
		32			**5SU1354-6KK32**		1	1 unit	1BC		**5SU1354-7KK32**		1	1 unit	1BC
		40			**5SU1354-6KK40**		1	1 unit	1BC		**5SU1354-7KK40**		1	1 unit	1BC
	300	6	2		**5SU1654-6KK06**		1	1 unit	1BC		**5SU1654-7KK06**		1	1 unit	1BC
		10			**5SU1654-6KK10**		1	1 unit	1BC		**5SU1654-7KK10**		1	1 unit	1BC
		13			**5SU1654-6KK13**		1	1 unit	1BC		**5SU1654-7KK13**		1	1 unit	1BC
		16			**5SU1654-6KK16**		1	1 unit	1BC		**5SU1654-7KK16**		1	1 unit	1BC
		20			**5SU1654-6KK20**		1	1 unit	1BC		**5SU1654-7KK20**		1	1 unit	1BC
		25			**5SU1654-6KK25**		1	1 unit	1BC		**5SU1654-7KK25**		1	1 unit	1BC
		32			**5SU1654-6KK32**		1	1 unit	1BC		**5SU1654-7KK32**		1	1 unit	1BC
		40			**5SU1654-6KK40**		1	1 unit	1BC		**5SU1654-7KK40**		1	1 unit	1BC
	**2P, 230 V AC** 10 000 / 3														
	30	6	3		**5SU1324-6FA06**		1	1 unit	1BC		**5SU1324-7FA06**		1	1 unit	1BC
		10		▶	**5SU1324-6FA10**		1	1 unit	1BC	▶	**5SU1324-7FA10**		1	1 unit	1BC
		13			**5SU1324-6FA13**		1	1 unit	1BC		**5SU1324-7FA13**		1	1 unit	1BC
		16		▶	**5SU1324-6FA16**		1	1 unit	1BC	▶	**5SU1324-7FA16**		1	1 unit	1BC
		20			**5SU1324-6FA20**		1	1 unit	1BC		**5SU1324-7FA20**		1	1 unit	1BC
		25			**5SU1324-6FA25**		1	1 unit	1BC		**5SU1324-7FA25**		1	1 unit	1BC
		32			**5SU1324-6FA32**		1	1 unit	1BC		**5SU1324-7FA32**		1	1 unit	1BC
		40			**5SU1324-6FA40**		1	1 unit	1BC		**5SU1324-7FA40**		1	1 unit	1BC
	**2P, 110 V AC** NEW 10 000 / 3														
	30	6	3		**5SU1324-6KX06**		1	1 unit	1BC		**5SU1324-7KX06**		1	1 unit	1BC
		10			**5SU1324-6KX10**		1	1 unit	1BC		**5SU1324-7KX10**		1	1 unit	1BC
		13			**5SU1324-6KX13**		1	1 unit	1BC		**5SU1324-7KX13**		1	1 unit	1BC
		16			**5SU1324-6KX16**		1	1 unit	1BC		**5SU1324-7KX16**		1	1 unit	1BC
		20			**5SU1324-6KX20**		1	1 unit	1BC		**5SU1324-7KX20**		1	1 unit	1BC
		25			**5SU1324-6KX25**		1	1 unit	1BC		**5SU1324-7KX25**		1	1 unit	1BC
		32			**5SU1324-6KX32**		1	1 unit	1BC		**5SU1324-7KX32**		1	1 unit	1BC
		40			**5SU1324-6KX40**		1	1 unit	1BC		**5SU1324-7KX40**		1	1 unit	1BC
	**2P, 400 V AC** 10 000														
	30	125	6.5		**5SU1324-6KK82**		1	1 unit	1BC		**5SU1324-7KK82**		1	1 unit	1BC
	300	125			**5SU1624-6KK82**		1	1 unit	1BC		**5SU1624-7KK82**		1	1 unit	1BC
	**4P, 400 V AC** 10 000														
	30	125	11		**5SU1344-6KK82**		1	1 unit	1BC		**5SU1344-7KK82**		1	1 unit	1BC
	300	125			**5SU1644-6KK82**		1	1 unit	1BC		**5SU1644-7KK82**		1	1 unit	1BC

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5SU1 RCBOs

(Type A)	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	Mounting width MW	SD d	Tripping characteristic B Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD d	Tripping characteristic C Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
RCBOs, type A, super resistant K															
	**1P+N; 230 V AC** 10 000 / 3														
	30	10	2		--						**5SU1354-7VK10**		1	1 unit	1BC
		16			--						**5SU1354-7VK16**		1	1 unit	1BC
		20			--						**5SU1354-7VK20**		1	1 unit	1BC
		25			--						**5SU1354-7VK25**		1	1 unit	1BC
		32			--						**5SU1354-7VK32**		1	1 unit	1BC
		40			--						**5SU1354-7VK40**		1	1 unit	1BC
RCBOs, type A, short-time delayed G (only available in Austria)															
	**1P+N; 230 V AC** 10 000 / 3														
	30	10			**5SU1354-6LB10**		1	1 unit	1BC		**5SU1354-7LB10**		1	1 unit	1BC
		13			**5SU1354-6LB13**		1	1 unit	1BC		**5SU1354-7LB13**		1	1 unit	1BC
		16			**5SU1354-6LB16**		1	1 unit	1BC		**5SU1354-7LB16**		1	1 unit	1BC
		20			**5SU1354-6LB20**		1	1 unit	1BC		**5SU1354-7LB20**		1	1 unit	1BC
		25			**5SU1354-6LB25**		1	1 unit	1BC		**5SU1354-7LB25**		1	1 unit	1BC
		32			**5SU1354-6LB32**		1	1 unit	1BC		**5SU1354-7LB32**		1	1 unit	1BC
		40			**5SU1354-6LB40**		1	1 unit	1BC		**5SU1354-7LB40**		1	1 unit	1BC
RCBOs, type A, selective S															
	**2P, 400 V AC** 10 000														
	300	125	6.5		**5SU1624-6WK82**		1	1 unit	1BC		**5SU1624-7WK82**		1	1 unit	1BC
	**4P, 400 V AC** 10 000														
	300	125	11		**5SU1644-6WK82**		1	1 unit	1BC		**5SU1644-7WK82**		1	1 unit	1BC
	1000	125			**5SU1844-6WK82**		1	1 unit	1BC		**5SU1844-7WK82**		1	1 unit	1BC
RCBOs, type F, super resistant															
	**1P+N, 230 V AC** 10 000 / 3														
	30	6	2		**5SU1354-3KK06**		1	1 unit	1BC		**5SU1354-4KK06**		1	1 unit	1BC
		10			**5SU1354-3KK10**		1	1 unit	1BC		**5SU1354-4KK10**		1	1 unit	1BC
		13			**5SU1354-3KK13**		1	1 unit	1BC		**5SU1354-4KK13**		1	1 unit	1BC
		16			**5SU1354-3KK16**		1	1 unit	1BC		**5SU1354-4KK16**		1	1 unit	1BC
		20			**5SU1354-3KK20**		1	1 unit	1BC		**5SU1354-4KK20**		1	1 unit	1BC
		25			**5SU1354-3KK25**		1	1 unit	1BC		**5SU1354-4KK25**		1	1 unit	1BC
		32			**5SU1354-3KK32**		1	1 unit	1BC		**5SU1354-4KK32**		1	1 unit	1BC
		40			**5SU1354-3KK40**		1	1 unit	1BC		**5SU1354-4KK40**		1	1 unit	1BC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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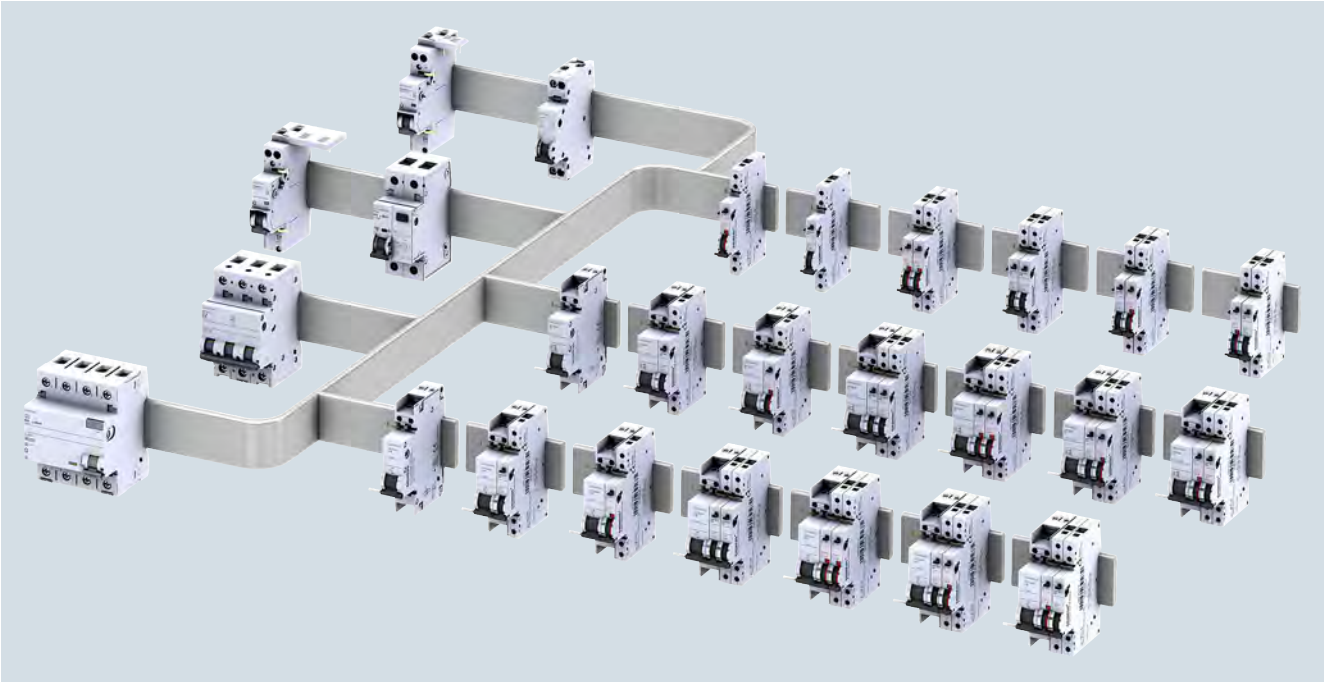
Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	**Handle couplers for additional components** For mounting the additional components auxiliary switches, fault signal contacts, shunt trips and undervoltage releases onto 5SU1 RCBOs, you require a handle coupler (1 set = 5 units)	►	**5ST3805-1**		1	1 set	1AD
	**Locking device** For RCBOs, sealable and lockable		**5ST3801-1**		1	1 unit	1AD

Note:

The same additional components are used for RCBOs as for miniature circuit breakers, see chapter "Miniature Circuit Breakers".



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5SM6 arc fault detection devices (AFDDs)

Overview





Characteristics

The Siemens portfolio of protective devices has been proving itself in the field for many years. This range of fuses, miniature circuit breakers and residual current protective devices has now been expanded to include AFDDs (arc fault detection devices). These AFDDs detect arcing faults caused by serial faults or loose contacts or as a result of insulation faults that enable contact between phase conductors or between phase and protective conductors. They therefore offer extremely effective protection against fires started by electrical faults.

Generally speaking, arcing faults in the circuit can result from damage to cables and other insulations and from contamination. Insulation faults result, for example, from vibrations, thermal expansion and contraction, mechanical loads and aging.

A distinction is made between 3 types of arcing faults:

Serial arcing faults

These are caused by breaks in the conductor or when a loose contact is in the circuit in series with the load. As the current flow in such cases is always lower than the operational load current, miniature circuit breakers and residual current protective devices are unable to detect such faults and initiate tripping.

The AFDD is specially designed to detect the specific characteristics of these arcing faults, and it reliably disconnects the affected circuit as soon as the limit values are exceeded.

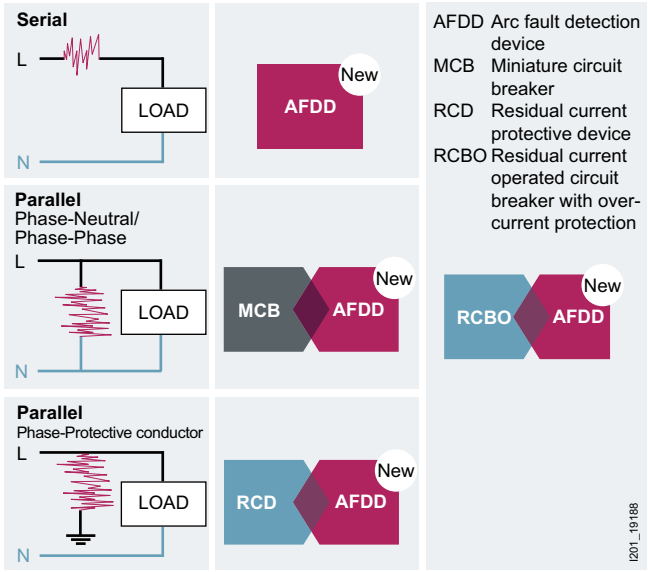
Parallel arcing faults between phase conductor/neutral conductor or phase conductor/phase conductor

These are caused by electric arcs resulting from damage to the insulation that permits contact between the two conductors. In this case, the level of current is determined by the impedances in the circuit. Depending on the rated current of the overcurrent protection device (for instance a miniature circuit breaker), this can be disconnected. However, if the impedance in the circuit is too high to reach the trip current of the overcurrent protection device, no tripping takes place. AFDDs disconnect the currents of arcing faults upwards of 2.5 A, thus providing reliable protection in the case of such faults.

Parallel arcing faults between phase conductor/protective conductor

Arcing faults against the protective conductor are reliably detected and shut down by residual current protective devices. Residual current protective devices with rated residual currents up to max. 300 mA have already been providing effective fire protection in such cases for many years. AFDDs also detect these arcing faults and provide adequate fire protection where no residual current protective device is implemented.

Closing of the safety gap on the IEC market



Preventing undesired tripping operations

Electric arcs and high-frequency signals occur during normal operation in networks with multiple electrical loads (e.g. electric motors, light switches, dimmers). The AFDD must not break the circuit in such cases.

Thanks to the sophisticated detection logic of our AFDDs, they are able to clearly distinguish between normal operational interference signals and hazardous arcing faults.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Product versions and application

Siemens offers four product versions which can be used in various combinations with a range of 1MW/2MW wide miniature circuit breakers and/or RCBOs up to 16 A or 40 A rated current.

This simplifies product selection and reduces inventory, while enabling coverage of every conceivable application. It also means that our tried and tested protective devices (MCBs, RCBOs) can be combined with the new functionality provided by arc fault protection. In particular, the version with RCBOs offers a protective device that provides comprehensive personnel, short-circuit, overload and fire protection in a single device.

The version combined with a compact miniature circuit breaker in 1 MW is a space-saving alternative that is ideal for retrofitting.

Whether auxiliary switch or fault signal contact – the 5SM6 AFD units can be combined at random with the versatile range of additional components from the familiar portfolio of 5SY miniature circuit breakers and 5SU1 RCBOs.

This also enables connection to a higher-level I&C system.

The 5SM6 AFD units can be connected easily and quickly. The miniature circuit breakers or RCBOs can be mounted quickly and simply by just snapping them onto the mounting rail without the need for tools. For a fast and reliable power supply, the infeed can be implemented via a busbar assembly.

The AFDDs are primarily intended for protection of final circuits in cases where

- There is an increased risk of fire due to flammable materials being stored or processed (e.g. wood processing)
- Flammable building materials are in use (e.g. wood paneling)
- Valuable goods need to be protected (e.g. museums)
- There are rooms in which a fire might not be noticed immediately (e.g. bedrooms, children's bedrooms)

Status displays and self tests

In order to facilitate fault locating in the event of tripping, AFDDs have a display with 5 LEDs that provide information on the cause of tripping (serial/parallel arcing faults, overvoltage). The sophisticated detection electronics system also automatically checks the functionality of the AFDD. If the self-monitoring process detects a fault, the AFDD switches off and displays the corresponding indication.

	Arc fault detection device (5SM6) fault indication
	Device functional
	Serial or parallel arcing fault detected
	Overvoltage (> 275 V)
	Self-test failed
	No power supply

Integrated overvoltage protection

Depending on the load distribution in the three-phase current system, an interruption on the infeed side of the neutral conductor may cause a shift of the neutral point and thus an increase in voltage between the phase conductor and the neutral conductor. This increase in voltage can damage the loads or present a fire risk due to overloaded components.

In order to ensure all-round protection, the AFDDs are fitted with an overvoltage release that disconnects when the voltage between phase conductor and neutral conductor exceeds 275 V, thus isolating downstream loads from the hazardous line voltage.

Technical specifications

Standards			IEC/EN 62606
Versions			2-pole
Rated voltage U_n		V	230
Rated current I_n		A	Up to 16/40
Rated frequency		Hz	50
Mains connection			Bottom
Tripping in the event of overvoltage		V	> 275
Degree of protection	Acc. to EN 60529 (VDE 0470-1)		IP20, with connected conductors
Touch protection	Acc. to EN 50274 (VDE 0660-514)		Finger and back-of-hand safe
Terminal tightening torque		Nm	2.0 ... 2.5
Terminal/conductor cross-sections • Solid and stranded • Finely stranded with end sleeve		 mm^2 mm^2	 0.75 ... 16 0.75 ... 10
Overvoltage category			III
Mounting position			Any
Service life average number of switching cycles			> 10000
Ambient temperature		°C	-25 ... +40, marked with 
Storage temperature		°C	-40 ... +75
Resistance to climate	Acc. to IEC 60068-2-30		28 cycles (55 °C; 95% rel. air humidity)
Pollution degree			2
CFC and silicone-free			Yes
Power loss		W	0.6

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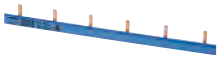
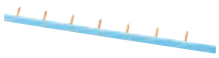
5SM6 arc fault detection devices (AFDDs)

Selection and ordering data

	Version	Rated current I_n	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	MW	d					
	AFD units NEW								
	For 5SY60 miniature circuit breakers (1 MW) 2-pole, 230 V AC; 50 Hz	Up to 16	1		**5SM6011-2**		1	1 unit	1BA
		Up to 40			**5SM6014-2**		1	1 unit	1BA
	For 5SU1.5 (2 MW) RCBOs, 5SU1 ... FA (3 MW) RCBOs, and 5SY/5SL4 (2 MW) miniature circuit breakers, but not suitable for 5SY5, 5SY8, 5SY60 2-pole; 230 V AC; 50 Hz	Up to 16	1		**5SM6021-2**		1	1 unit	1BA
		Up to 40			**5SM6024-2**		1	1 unit	1BA

	Version	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	mm	d					
	Pin busbars for AFDDs (1+N)								
	10 mm², can be cut								
	Single-phase, for 5SM601.-.								
	Insulation, gray	2	962		**5ST3764-1**		1	10 units	1AD
	Single-phase, for 5SM601.-.								
	Insulation, blue, not angled NEW	2	962		**5ST3765-2**		1	10 units	1AD
	Insulation, blue, angled	2	962		**5ST3765-1**		1	10 units	1AD
	Three-phase, for 5SM601.-.								
	Insulation, gray	2	1032		**5ST3740-1**		1	1 unit	1AD
	Two-phase (1+N), for 5SM602.-.								
	Insulation, gray	1+2	996		**5ST3735-1**		1	1 unit	1AD
	Four-phase (3+N), for 5SM602.-.								
	Insulation, gray	1+2	926		**5ST3746-1**		1	1 unit	1AD
	10 mm², fixed length, cannot be cut NEW								
	Three-phase, for 5SM601.-.								
	Insulation, gray	2	216		**5ST3615-1**		1	10 units	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminals							
	**Terminals, long** NEW • For conductors up to 25 mm^2 • Infeed on side • Specially for two-, three-, four-phase busbars		**5ST3771-1**		1	25 units	1AD
	Terminals, short • For conductors up to 25 mm^2 • Infeed on side • Specially for single-phase busbars and for 5ST3615-1 three-phase busbars	▶	**5ST3768**		1	25 units	1AD
	Terminals, short, IP20 NEW • For conductors up to 25 mm^2 • Infeed on side • Specially for single-phase busbars and for 5ST3615-1 three-phase busbars		**5ST3771-2**		1	10 units	1AD
	**End caps for 5ST37, can be cut**						
	• For two-phase and three-phase busbars	▶	**5ST3750**		1	10 units	1AD
	• For four-phase busbars	▶	**5ST3718**		1	10 units	1AD

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5ST busbars for modular installation devices

Overview

4-pole 5SM3 RCCBs are bus-mounted either together or in combination with miniature circuit breakers. RCCBs with an N wire connection on the left-hand side facilitate installation because the same type of standard busbars is used as for bus mounting miniature circuit breakers.

Busbars in 10 mm^2 and 16 mm^2 versions are available.

The extremely flexible 5ST36 busbar system with fixed lengths enables installation in any length as the busbars can be overlapped.

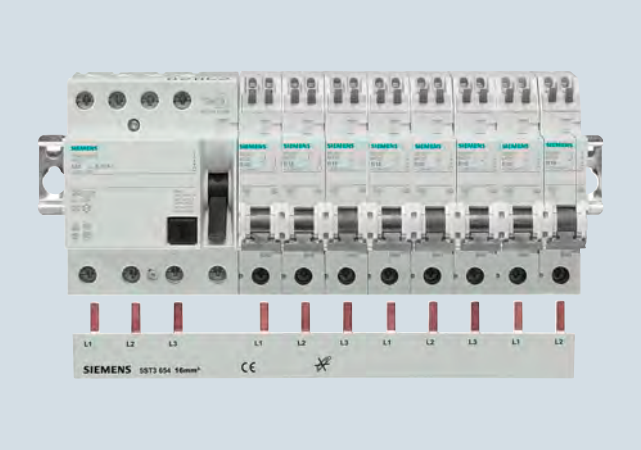
No further need for time-consuming tasks, such as cutting, cutting to length, deburring, cleaning of cut surfaces and mounting of end caps.

Any free pins on the busbars can be made safe by covering with touch protection.

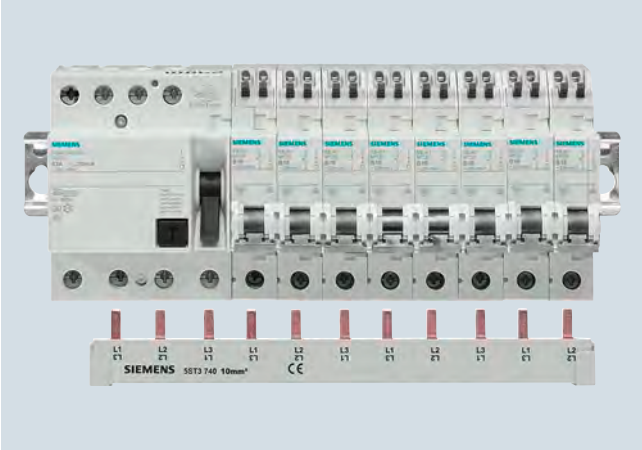
If several RCBOs are bus-mounted together, this is implemented with two-phase busbars, which are used as 1+N busbars.

Benefits

- Connection of miniature circuit breakers to 4-pole RCCBs with N connection right and three-phase busbar, using busbar specially designed for this application. No cutting or end caps required.



- Connection of miniature circuit breakers to 4-pole RCCBs with N connection left, with three-phase busbar that can be cut. No additional items to be stored and busbars that are always available.



- Connection of 1P+N RCBOs with two-phase busbar. No cutting or end caps required.



- Bus-mounting of residual current protective devices on busbar (three-phase + N) that can be cut. A proven and frequently used application.



Minimum order quantity (PS) or a multiple thereof can be ordered.

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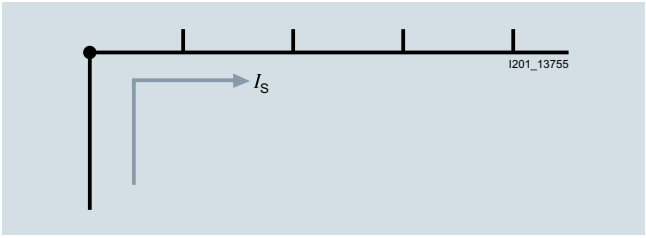
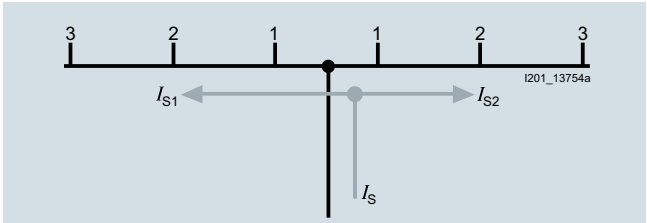
Technical specifications

			5ST3, 5ST2
Standards			EN 60439-1 (VDE 0660-500): 2005-01
Busbar material			SF-Cu F 24
Partition material			Plastic, Cycoloy 3600 Heat-resistant over 90 °C flame-retardant self-extinguishing dioxin and halogen-free
Rated operational voltage U_e		V AC	400
Rated current I_n			
• Cross-section 10 mm²		A	63
• Cross-section 16 mm²		A	80
Rated impulse withstand voltage U_{imp}		kV	4
Test pulse voltage (1.2/50)		kV	6.2
Rated conditional short-circuit current I_{cc}		kA	25
Resistance to climate			
• Constant atmosphere	Acc. to DIN 50015		23/83; 40/92; 55/20
• Humid heat	Corresponds to IEC 68-2-30		28 cycles
Insulation coordination	Acc. to IEC 60664-1 (VDE 0110-1)		
• Overvoltage category			III
• Pollution degree			2
Maximum busbar current I_S per phase			
• Infeed at the start of the busbar			
- Cross-section 10 mm²		A	63
- Cross-section 16 mm²		A	80
• Infeed at the center of the busbar			
- Cross-section 10 mm²		A	100
- Cross-section 16 mm²		A	130

Infeed at the start or end of the busbar

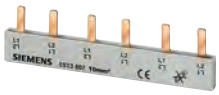
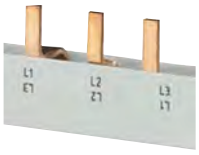


Infeed along the busbar or midpoint infeed



The sum of the outgoing current per branch (1, 2, 3 ... n) must not be greater than the max. busbar current I_S/phase.

Selection and ordering data

	Version	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	mm	d					
	**5ST36 busbars, fixed lengths, cannot be cut, fully insulated**								
	For 1 RCCB 4P, N connection right, and 8 MCB 1P								
	• Three-phase, 10 mm²	1	210		**5ST3624**		1	10 units	1AD
	• Three-phase, 16 mm²	1	210		**5ST3654**		1	10 units	1AD
	For 6 RCBOs 1P+N together								
	• Two-phase, 10 mm²	1	210		**5ST3608**		1	10 units	1AD
	• Two-phase, 16 mm²	1	210		**5ST3638**		1	10 units	1AD
	**5ST37 busbars, 12 MW, can be cut, with end caps**								
	For 6 RCBOs 1P+N								
	• Two-phase, 10 mm²	1	216		**5ST3734**		1	1 unit	1AD
	• Two-phase, 16 mm²	1	216	▶	**5ST3704**		1	1 unit	1AD
	**5ST36 busbars, 10 mm², four-phase fixed lengths, cannot be cut, fully insulated**								
	For 6 RCBOs 1P+N	1	215		**5ST3623**		1	10 units	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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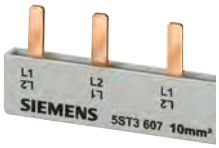
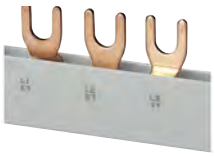
5ST busbars for modular installation devices

	Version	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	mm	d					
	**5ST36 busbars, 16 mm², four-phase fixed lengths, cannot be cut, fully insulated**								
	For 6 RCBOs 1P+N	1	215		**5ST3653**		1	10 units	1AD
	**5ST37 busbars, with end caps, can be cut, with touch protection**								
	For RCBO 1P+N and MCB 2P								
	• Four-phase, 10 mm²	1	1008		**5ST3770-2**		1	10 units	1AD
	• Four-phase, 16 mm²	1	1008		**5ST3770-3**		1	10 units	1AD
	For RCCBs 4P, N connection right and 6 MCBs 1P+N								
	• Four-phase, 10 mm²	1	288		**5ST3770-4**		1	10 units	1AD
	• Four-phase, 16 mm²	1	288		**5ST3770-5**		1	10 units	1AD
	**End caps for 5ST37, can be cut**								
	• For two-phase and three-phase busbars			▶	**5ST3750**		1	10 units	1AD
	• For four-phase busbars			▶	**5ST3718**		1	10 units	1AD
	**Touch protection**								
	For free connections, yellow (RAL 1004) 5 x 1 pin			▶	**5ST3655**		1	10 units	1AD
	**Busbar, 12 MW, with fork-type connections, can be cut, with end caps**								
	For bus mounting 5SM3 RCCBs together								
	Three-phase + N, 16 mm²	1	216		**5ST2145**		1	1 unit	1AD
	**End caps for 5ST2145 busbars, can be cut**								
	For three-phase busbars			▶	**5ST2156**		1	10 units	1AD
	**Terminals up to 35 mm² (stranded), for direct infeed of 5ST2145 busbar**								
	Side-by-side mounting possible				**5ST2157**		1	5 units	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

	Number of poles	Rated current I_n A	Rated residual currents $I_{\Delta n}$ mA	~ (Type A)
RCCB protective socket outlets				
• For mounting onto device box, equipped with RCCB and 2 SCHUKO® socket outlets	2	16	10, 30	✓
• Molded-plastic enclosures, equipped with RCCB and SCHUKO® socket outlet	2	16	10	✓

~ = Type A for AC and pulsating DC residual currents

Application

RCCB protective socket outlets

- Molded-plastic enclosure equipped with RCCB and flush-mounted SCHUKO® socket outlet or flush-mounted SCHUKO® double socket outlet
- For electrical devices where there is a risk of accidental contact with live parts in the event of damage
- Rated voltage: 230 V AC, 50 Hz to 60 Hz
- For outdoor connection of gardening equipment and socket outlets in workshops or for agricultural purposes
- Degree of protection IP21 (5SM1920-.), degree of protection IP54 (5SZ92.6)

Selection and ordering data

	Rated residual current $I_{\Delta n}$ mA	Rated current I_n A	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	RCCB protective socket outlets							
	• RCCB protective socket outlets according to VDE 0664, for mounting on device boxes, equipped with residual current operated circuit breaker and 2 childproof SCHUKO® socket outlets, degree of protection IP21							
	10	16		**5SM1920-5**		1	1 unit	1BE
	30			**5SM1920-8**		1	1 unit	1BE
	• RCCB protective socket outlet according to VDE 0664 in molded-plastic enclosure, equipped with residual current operated circuit breaker and flush-mounted SCHUKO® socket outlet, degree of protection IP54							
	10	16		**5SZ9206**		1	1 unit	1BE
	30			**5SZ9216**		1	1 unit	1BE

Minimum order quantity (PS) or a multiple thereof can be ordered.

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4

Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	**Terminal covers, gray** For surface mounting, degree of protection IP40, sealable, with 35 mm standard mounting rail						
	• Up to 2.5 MW		**5SW3004**		1	1 unit	1BE
	• Up to 4.5 MW		**5SW3005**		1	1 unit	1BE
	**Wall enclosures, gray** For flush mounting, degree of protection IP40, with 35 mm standard mounting rail						
	• Up to 2.5 MW		**5SW3006**		1	1 unit	1BE
	• Up to 4.5 MW		**5SW3007**		1	1 unit	1BE
	**Molded-plastic enclosures, gray** For surface mounting, degree of protection IP54, sealable, with 35 mm standard mounting rail, with transparent hinged lid For 4.5 MW		**5SW1200**		1	1 unit	1BE
	**Covers** Can be assembled as mini distribution board, suitable for all devices, cover parts prepared for rail mounting of conventional label caps, comprising:						
	• End plates (for snapping onto standard mounting rail) ►		**5ST2134**		1	10 units	1AD
	• Angled profile (approx. 1 m long)		**5ST2135**		1	5 units	1AD
	• Alternative flat profiles (as a cover between the rows of devices, length approx. 1 m)		**5ST2136**		1	5 units	1AD
	**Touch protection** For 5SM3 RCCBs up to 80 A 1 set contains 12 units		**5SW3313**		1	1 set	1BE
	**Fixing parts** Plastic 4 MW		**5ST2201**		1	1 unit	1AD
	**Device labels** Adhesive, for modular installation devices, e.g. 5SY, 5SL, 5TL1, etc.						
	Versions						
	• 15 mm x 6 mm, white (WIN 098)		**8WH8210-0AA35**		100	3740 units	1BT
	• 15 mm x 6 mm, yellow (WIN 099)		**8WH8210-0AA36**		100	3740 units	1BT
	Labeling system Available from:		Murrplastik Systemtechnik GmbH Postfach 1143 71570 Oppenweiler, Germany Telephone: +49 7191-482-0 Email: info@murrplastik.de				

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Application

Standards	Application	Required $I_{\Delta n}$ [mA]	Recommended Siemens residual current protective devices			
			Type A	Type F	SIQUENCE type B/type B+	SIGRES
DIN VDE 0100-410	Protection against electric shock	30 ... 500	✓	✓	✓	✓
	Socket outlets up to 20 A, outdoor plants	10 ... 30	✓	✓	--	--
DIN VDE 0100-482	Fire protection for particular risks or safety hazards	30, 300	✓	✓	✓	--
DIN VDE 0100-701	Rooms WITH baths or showers, socket outlets in zone 3	10 ... 30	✓	✓	--	--
DIN VDE 0100-702	Basins for swimming pools and other basins	10 ... 30	✓	--	--	✓
DIN VDE 0100-703	Rooms and cabins with sauna heating	10 ... 30	✓	--	--	✓
DIN VDE 0100-704 BGI 608	Building sites, socket outlet current circuits up to 32 A and for handheld equipment, plug-and-socket devices I_n > 32 A	≤ 30	✓	✓	✓	✓
		≤ 500	✓	✓	✓	✓
DIN VDE 0100-705	Agricultural and general horticultural premises, socket outlet current circuits	≤ 500	✓	✓	--	✓
		≤ 30	✓	✓	--	✓
DIN VDE 0100-706	Conductive areas with limited freedom of movement, permanently mounted equipment	10 ... 30	✓	--	--	--
DIN VDE 0100-708	Electrical installations on camping sites, fixed feeding points for every socket outlet and every final circuit	10 ... 30	✓	--	--	✓
DIN VDE 0100-710	Medical premises in TN-S system, depending on application group 1 or 2 and equipment	10 ... 30	✓	--	✓	--
		≤ 300	✓	--	✓	--
DIN VDE 0100-712	Solar PV power supply systems (without simple separation)	≤ 300	--	--	✓	--
DIN VDE 0100-723	Classrooms with experiment equipment	10 ... 30	--	--	✓	--
DIN VDE 0100-739	Additional protection against direct contact in homes	10 ... 30	✓	--	--	--
EN 50178 (VDE 0160)	Fitting of power installations with electronic equipment	General requirements for correct selection when using res. current protection	✓	✓	✓	--
EN 50293 (VDE 0832-100)	Traffic signal systems • Class T1 • Class U1	 ≤ 300 ≤ 30	 ✓ ✓	 -- --	 -- --	 ✓ ✓
	Food processing and chemical industry	≤ 30 (recommended)	✓	--	--	✓

Note:

For reasons of basic fire protection, we recommend the use of residual current protective devices with maximum 300 mA rated residual current.

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Notes

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5/2 **Introduction**

NEOZED fuse systems
5/4 Introduction
5/7 NEOZED fuse links
5/8 MINIZED switch disconnectors and MINIZED fuse switch disconnectors
5/9 NEOZED fuse bases and accessories NEW

5/12 **DIAZED fuse systems**

Cylindrical fuse systems
5/18 Cylindrical fuse links and cylindrical fuse holders
5/22 Fuse holders in size 10 x 38 mm and Class CC

Fuse systems acc. to UL
5/26 Class CC fuse systems
5/29 Class J fuse systems NEW

5/31 **Busbar systems**

3NA, 3ND LV HRC fuse systems
5/37 LV HRC fuse links
5/46 LV HRC signal detectors
5/48 LV HRC fuse bases and accessories

SITOR semiconductor fuses
5/56 LV HRC design
5/66 Cylindrical fuse design
5/70 NEOZED, DIAZED design

Photovoltaic fuses
5/72 Introduction
5/73 PV cylindrical fuses
5/75 PV cumulative fuses

For further technical product information:

Configuration Manual

Fuse Systems
Article No.: 3ZW1012-3NW10-0AC1

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**NEOZED fuse systems**	5/4	MINIZED switch disconnectors, bases, fuse links from 2 A to 63 A of operational class gG and accessories. Everything you need for a complete system.	Fuse system: IEC 60269-3; DIN VDE 0636-3 Fuse switching devices: IEC/EN 60947-3 DIN VDE 0638; EN 60947-3 (VDE 0660-107)	✓	✓	✓
	**DIAZED fuse systems**	5/12	Fuse links from 2 A to 100 A in various operational classes, base versions with classic screw base connections. A widely used fuse system.	IEC 60269-3; DIN VDE 0635; DIN VDE 0636-3; CEE 16	✓	✓	✓
Cylindrical fuse systems							
	**Cylindrical fuse links and cylindrical fuse holders**	5/18	Line protection or protection of switching devices. The fuse holders with touch protection ensure the safe "no-voltage" replacement of fuse links. Auxiliary switches can be retrofitted.	IEC 60269-1, -2, -3; NF C 60-200; NF C 63-210, -211; NBN C 63269-2, CEI 32-4, -12 Fuse holders: File No. E171267	✓	✓	✓
	**Fuse holders in size 10 x 38 mm and Class CC**	5/22	For installing fused loaded motor starter combinations.	IEC 60269-1,-2; IEC 60947-4; UL 4248-1, File No. E171267 CSA 250269, 6225-01 Auxiliary switches: UL 508, File No. E334003	✓	--	✓
	**Class CC and Class J fuse systems**	5/26	Class CC and Class J comply with the American standard and have UL and CSA approval, for customers exporting OEM products and machine builders. Modern design with touch protection according to BGV A3 for use in "branch circuit protection".	Fuse holders: UL 4248-1, E171267 CSA 22.2 Fuse links: UL 248-4, File No. E258218, CSA 231237, 1422-02 and 1422-82	✓	✓	✓
	**Busbar systems**	5/31	Busbars for NEOZED fuse bases, NEOZED fuse disconnectors, MINIZED switch disconnectors, DIAZED fuse systems and for the cylindrical fuse systems. Compact cylindrical fuse holders for busbars	EN 60439-1 (VDE 0660-500) UL 4248-1, E337131	✓	✓	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
3NA, 3ND LV HRC fuse systems							
	**LV HRC fuse links**	5/37	Fuse links from 2 A to 1250 A for selective line protection and system protection in non-residential buildings, industry and power utilities.	IEC 60269-1, -2; EN 60269-1; DIN VDE 0636-2; CSA 16325 - 1422-02	✓	✓	✓
	**LV HRC signal detectors**	5/46	Signal detectors for when a fuse is tripped on all LV HRC fuse links with combination or front indicators with non-insulated grip lugs. Plus the comprehensive accessory range required for LV HRC fuse systems.	--	✓	✓	✓
	**LV HRC fuse bases and accessories**	5/48	Fuse bases for screw or snap-on mounting onto standard mounting rails, available as 1-pole or 3-pole version.	IEC 60269-1, -2; EN 60269-1; DIN VDE 0636-2 UL 4248-1, File No. E171267-IZLT2 (only downstream from branch circuit protection) CSA C22.2 No. 4248.1-07	✓	✓	✓
SITOR semiconductor fuses							
	**LV HRC design**	5/56	Fuse links in LV HRC design and a huge variety of models support a wide range of applications from 500 V to 1500 V and 150 A to 1600 A. Fuses with slotted blade contacts, bolt-on links or female thread and special designs.	UL 4248-13, File No. E167357-JFHR2	--	--	✓
	**Cylindrical fuse design**	5/66	Fuse links, fuse holders – usable as fuse switch disconnectors and fuse bases up to 600/690 V AC and 400/700 V DC from 1 A to 100 A in the sizes 10 × 38 mm, 14 × 51 mm and 22 × 58 mm.	Fuse links: UL 4248-13, File No. E167357-JFHR2 CSA 248170, 1422-30 Fuse holders: UL 4248-1, File No. E171267- IZLT CSA 248170, 6225-01	--	--	✓
	**NEOZED, DIAZED design**	5/70	NEOZED fuse links for 400 V AC and 250 V DC and DIAZED for 500 V AC and 500 V DC.	--	--	--	✓
Photovoltaic fuses							
	**PV cylindrical fuses**	5/73	Fuses with a rated voltage of 1000 V and 1500 V DC and gPV operational class for the protection of photovoltaic modules, their connecting cables and other components.	IEC 60269-6	✓	✓	✓
	**PV cumulative fuses**	5/75	Fuses with a rated voltage of 1000 V and 1500 V DC, a rated current of 63 A to 630 A and operational class gPV for the protection of connecting cables and other components.	IEC60269-6	✓	✓	✓

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Introduction

Overview

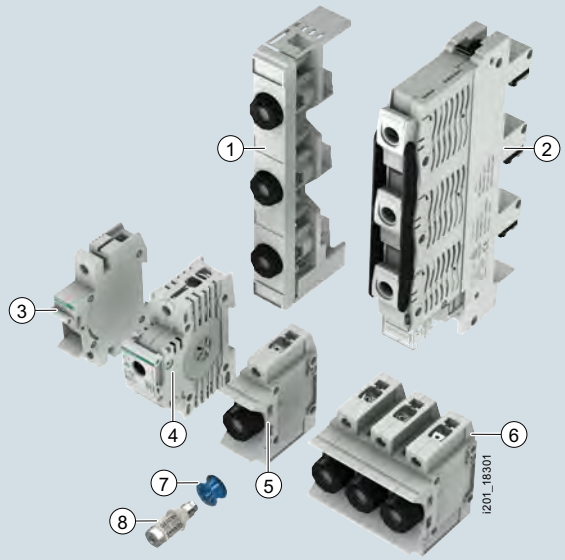
The NEOZED fuse system is primarily used in distribution technology and industrial switchboard assemblies. The system is easy to use and is also approved for domestic installation.

The MINIZED switch disconnectors are primarily used in switchboard assemblies and control engineering. They are approved for switching loads as well as for safe switching in the event of short circuits. The MINIZED D02 is also suitable for use upstream of the meter in household applications in compliance with the recommendations of the VDEW according to TAB.

Due to its compact design, the MINIZED D01 fuse switch disconnector is primarily used in control engineering.

The NEOZED fuse bases are the most cost-effective solution for using NEOZED fuses. All NEOZED bases must be fed from the bottom to ensure that the threaded ring is insulated during removal of the fuse link. The terminals of the NEOZED bases are available in different versions and designs to support the various installation methods.

Benefits



1. NEOZED D02 bus-mounting base for 60 mm busbar system, with NEOZED screw cap
2. NEOZED D02 bus-mounting switch disconnector for 60 mm busbar system
3. MINIZED D01 fuse switch disconnector
4. MINIZED D02 switch disconnector
5. NEOZED comfort base, 1-pole (fuse base with touch protection BGV A3), with NEOZED screw cap
6. NEOZED comfort base, 3-pole (fuse base with touch protection BGV A3), with NEOZED screw cap
7. NEOZED adapter sleeve
8. NEOZED fuse link

Compared to the older DIAZED fuse system, the NEOZED fuse system is significantly more modern:

- Much more compact which saves space in the distribution board
- Modern devices like the MINIZED switching devices, which combine the functions of a switch disconnector and a fuse base
- Wide range of accessories, such as busbars for one, two, or three-phase wiring
- Modern terminals for MINIZED D02 and NEOZED comfort bases: visible, clear and controllable connection simplifies cable entry

Double terminal chambers permit connection of two wires of different cross-sections

- Lower power loss of the fuse links

Even when compared to the internationally prevalent cylindrical fuse system, the NEOZED fuse system has considerable advantages:

- Non-interchangeability – thanks to use of adapter sleeves (i.e. it is not possible to insert a fuse for larger currents). This is a requirement of numerous wiring regulations in Germany and other European countries.
- Switching devices with load switching characteristics allow the safe switching of load currents up to 63 A.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

		NEOZED fuse links 5SE2
Standards		IEC 60269-3; DIN VDE 0636-3
Operational class		gG
Rated voltage U_n	V AC	400
	V DC	250
Rated current I_n	A	2 ... 100
Rated breaking capacity	kA AC	50
	kA DC	8
Non-interchangeability		Using adapter sleeves
Resistance to climate	°C	Up to 45 at 95% rel. humidity
Ambient temperature	°C	-5 ... +40°C, humidity 90% at 20°C

		MINIZED switch disconnec-tors	MINIZED fuse switch disconnec-tors	Fuse bases, made of ceramic			Comfort bases	Fuse bases
		D02	D01	D01	D02	D03	D01/02	D01/02
		5SG71	5SG76	5SG15 5SG55	5SG16 5SG56	5SG18	5SG1301 5SG1701 5SG5301 5SG5701	5SG1302 5SG1702 5SG5302 5SG5702
Standards		DIN VDE 0638; EN 60947-3 (VDE 0660-107) IEC/EN 60947-3		IEC 60269-3; DIN VDE 0636-3				
Main switch characteristic EN 60204-1		Yes	--	--				
Insulation characteristic EN 60664-1		Yes	--	--				
Rated voltage U_n	V AC	230/400, 240/415		400				
• 1P	V DC	65	48	250				
• 2P in series	V DC	130	110	250				
Rated current I_n	A	63	16	16	63	100	16/63	16/63
Rated conditional short-circuit current	kA	50						
Rated insulation voltage	V AC	500	690	--				
Rated impulse withstand voltage	kV AC	6	6	--				
Overvoltage category		IV	IV	--				
Utilization category acc. to VDE 0638								
• AC-22	A	63	16	--				
Utilization category acc. to EN 60947-3								
• AC-22 A	A	--	16	--				
• AC-22 B	A	63	--	--				
• AC-23 B	A	35	--	--				
• DC-22 B	A	63	--	--				
Sealable when switched on		Yes		Yes, with sealable screw caps				
Mounting position		Any, preferably vertical						
Reduction factor of I_n with 18 pole								
• Side-by-side mounting		0.9	--					
• On top of one another, with vertical standard mounting rail		0.87	--					
Degree of protection acc. to IEC 60529		IP20, with connected conductors[1)]						
Terminals with touch protection acc. to BGV A3		Yes		No			Yes	
Ambient temperature	°C	-5 ... +40°C, humidity 90% at 20°C						
Terminal versions		Box terminal	Box terminal	B	K, S	K/S	Box terminal	Box terminal
Conductor cross-sections	mm^2							
• Solid								Input 1 ... 35, Output 1 ... 25
• Solid and stranded	mm^2	1.5 ... 35	1.5 ... 16	1.5 ... 4	2.5 ... 25	10 ... 50	0.75 ... 35	Input 1.5 ... 25, Output 1 ... 25
• Flexible								Input 1.5 ... 25, Output 1 ... 25
• Flexible, with end sleeve	mm^2	1.5 ... 35	1.5 ... 10	1.5 ... 4	1.5 ... 16	10 ... 35	--	Input 0.75 ... 35, Output 1 ... 25
Tightening torque	Nm	2.5 ... 3	2	1.2	2	3.5/2.5	3.5	3

[1)] Degree of protection IP20 is tested according to regulations using a straight test finger (from the front), with the device mounted and equipped with a cover, housing or some other enclosure.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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More information



Fuse bases D01 with terminal version BB

- Incoming feeders, clamp-type terminal B
- Outgoing feeders, clamp-type terminal B



Fuse bases D02, with terminal version KS

- Incoming feeders, screw head contact K
- Outgoing feeders, saddle terminal S



Fuse bases D02, with terminal version SS

- Incoming feeders, saddle terminal S
- Outgoing feeders, saddle terminal S

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	I_n	Identification color	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A		MW	d					
	NEOZED fuse links, rated voltage 400 V AC/250 V DC, operational class gG									
	D01	2	Pink	--	▶	**5SE2302**		1	10 units	1BM
		4	Brown		▶	**5SE2304**		1	10 units	1BM
		6	Green			**5SE2306**		1	10 units	1BM
		10	Red	--	▶	**5SE2310**		1	10 units	1BM
		13	Black			**5SE2013-2A**		1	10 units	1BM
		16	Gray		▶	**5SE2316**		1	10 units	1BM
	D02	20[1]	Blue	--		**5SE2320**		1	10 units	1BM
		25[1]	Yellow		▶	**5SE2325**		1	10 units	1BM
		32[1]	Violet			**5SE2332**		1	10 units	1BM
		35[1]	Black	--		**5SE2335**		1	10 units	1BM
		40[2]	Black			**5SE2340**		1	10 units	1BM
		50[2]	White			**5SE2350**		1	10 units	1BM
		63[2]	Copper			**5SE2363**		1	10 units	1BM
	D03	80	Blue	--		**5SE2280**		1	10 units	1BM
		100	Red			**5SE2300**		1	10 units	1BM

[1] With tin-coated contacts
[2] With silver-plated contacts

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MINIZED switch disconnectors and MINIZED fuse switch disconnectors

Selection and ordering data

	Size	Number of poles	I_n	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			A	MW	d					
	MINIZED switch disconnectors with fuses Using draw-out technology with touch protection to BGV A3 (adapter sleeves not included in the scope of delivery)[2]									
	D02	1P	63	1.5		**5SG7113**		1	1 unit	1BM
		1P+N	63	3		**5SG7153**		1	1 unit	1BM
		2P	63	3		**5SG7123**		1	1 unit	1BM
		3P	63	4.5		**5SG7133**		1	1 unit	1BM
		3P+N	63	6		**5SG7163**		1	1 unit	1BM
	Versions for Austria only, with permanently fitted adapter sleeves, incl. fuse link[2]									
	D02	3P	25	4.5		**5SG7133-8BA25**		1	1 unit	1BM
			35			**5SG7133-8BA35**		1	1 unit	1BM
			50			**5SG7133-8BA50**		1	1 unit	1BM
	Reducers									
	For fuse links D01 in MINIZED switch disconnectors D02					**5SH5527**		1	10 units	1CU
	Auxiliary switches (AS)									
	For MINIZED D02 switch disconnectors									
	1 NO + 1 NC			0.5	▶	**5ST3010**		1	1 unit	1AD
	2 NO					**5ST3011**		1	1 unit	1AD
	2 NC					**5ST3012**		1	1 unit	1AD
	Technical specifications see chapter "Miniature Circuit Breakers" –> Additional components"									
	Auxiliary switches (AS) with TEST button									
	For MINIZED D02 switch disconnectors									
	1 NO + 1 NC			0.5		**5ST3010-2**		1	1 unit	1AD
	2 NO					**5ST3011-2**		1	1 unit	1AD
	2 NC					**5ST3012-2**		1	1 unit	1AD
	Technical specifications see chapter "Miniature Circuit Breakers" –> Additional components"									
	MINIZED fuse switch disconnectors Using draw-out technology with touch protection acc. to BGV A3									
	D01	1P	6[1]	1		**5SG7611-0KK06**		1	12 units	1BM
		3P	6[1]	3		**5SG7631-0KK06**		1	4 units	1BM
		1P	10	1		**5SG7611-0KK10**		1	12 units	1BM
		3P	10	3		**5SG7631-0KK10**		1	4 units	1BM
		1P	16	1		**5SG7611-0KK16**		1	12 units	1BM
		1P+N	16	2		**5SG7651-0KK16**		1	6 units	1BM
		2P	16	2		**5SG7621-0KK16**		1	6 units	1BM
		3P	16	3		**5SG7631-0KK16**		1	4 units	1BM
		3P+N	16	4		**5SG7661-0KK16**		1	3 units	1BM

[1] For 2 A, 4 A, 6 A fuses.

[2] Do not use fuse links with nickel-plated contact caps.

For busbars, see page 5/33.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	Number of poles	I_n	Matching cover[1]	Terminals[2]	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			A			MW	d					
	NEOZED comfort bases made of molded plastic											
	With touch protection according to BGV A3											
	D01	1P	16	--	--	1.5		**5SG1301**		1	3 units	1BM
	D02		63	--	--			**5SG1701**		1	3 units	1BM
	D01	3P	16	--	--	4.5		**5SG5301**		1	1 unit	1BM
	D02		63	--	--			**5SG5701**		1	1 unit	1BM
	NEOZED fuse bases made of molded plastic NEW											
	With touch protection according to BGV A3											
	D01	1P	16	--	--	1.5	▶	**5SG1302**		1	15 units	1BM
	D02		63	--	--	1.5	▶	**5SG1702**		1	15 units	1BM
	D01	3P	16	--	--	4.5	▶	**5SG5302**		1	5 units	1BM
	D02		63	--	--	4.5	▶	**5SG5702**		1	5 units	1BM
	With touch protection according to BGV A3, with LED signal detector[3]											
	D01	1P	16	--	--	1.5	▶	**5SG1302-1**		1	15 units	1BM
	D02		63	--	--	1.5	▶	**5SG1702-1**		1	15 units	1BM
	D01	3P	16	--	--	4.5	▶	**5SG5302-1**		1	5 units	1BM
	D02		63	--	--	4.5	▶	**5SG5702-1**		1	5 units	1BM
	NEOZED fuse bases made of ceramic											
	For snap-on mounting on standard mounting rails, with cover											
	D01	1P	16	(A4)	BB	1.5		**5SG1553**		1	6 units	1BM
	D02		63	(A10)	SS	1.5		**5SG1653**		1	6 units	1BM
	D02		63	(A10)	KS	1.5		**5SG1693**		1	6 units	1BM
	For snap-on mounting on standard mounting rails, without cover											
	D01	1P	16	A4, A8	BB	1.5		**5SG1595**		1	6 units	1BM
	D02		63	A10, A8	SS	1.5		**5SG1655**		1	6 units	1BM
	D02		63	A10, A8	KS	1.5		**5SG1695**		1	6 units	1BM
	D03		100	A6, A9	KS	2.5		**5SG1812**		1	10 units	1BM
	For snap-on mounting on standard mounting rails, with cover											
	D01	3P	16		BB	4.5		**5SG5553**		1	2 units	1BM
	D02		63		SS	4.5		**5SG5653**		1	2 units	1BM
	D02		63		KS	4.5		**5SG5693**		1	2 units	1BM

[1] Covers with brackets are part of the scope of delivery.
Covers without brackets are not part of the scope of delivery.

[2] For terminal versions, see page 5/6.

[3] At least 50 V AC/DC

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NEOZED fuse bases and accessories

	Size	Matching cover	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			MW	d					
	NEOZED covers								
	Made of molded plastic, plug-in, for fuse bases made of molded plastic								
	D01, D02	A1	1.5		**5SH5244**		1	15 units	1BM
	For fuse bases made of ceramic								
	D01	A4	1.5		**5SH5251**		1	15 units	1BM
	D02	A10	1.5		**5SH5253**		1	15 units	1BM
	Screw-on								
	D03	A6	2.5		**5SH5233**		1	20 units	1BM
	NEOZED caps								
	Made of molded plastic, plug-in								
	D01, D02	A8			**5SH5235**		1	5 units	1BM
	Screw-on								
	D03	A9			**5SH5234**		1	10 units	1BM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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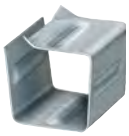
	Size	For fuse links A	Identification color	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	NEOZED screw caps									
	Molded plastic, with inspection hole									
	D01					**5SH4116**		1	10 units	1BM
	D02					**5SH4163**		1	10 units	1BM
	Ceramic									
	D01, sealable					**5SH4316**		1	20 units	1BM
	D02, sealable					**5SH4363**		1	20 units	1BM
	D03					**5SH4100**		1	10 units	1BM
	Ceramic, with inspection hole									
	D01					**5SH4317**		1	20 units	1BM
	D02					**5SH4362**		1	20 units	1BM
	NEOZED adapter sleeves									
	D01	2	Pink			**5SH5002**		1	50 units	1BM
		4	Brown			**5SH5004**		1	50 units	1BM
		6	Green			**5SH5006**		1	50 units	1BM
		10/13	Red			**5SH5010**		1	50 units	1BM
	D02	20	Blue			**5SH5020**		1	50 units	1BM
		25	Yellow			**5SH5025**		1	50 units	1BM
		32	Violet			**5SH5032**		1	50 units	1BM
		35/40	Black			**5SH5035**		1	50 units	1BM
		50	White			**5SH5050**		1	50 units	1BM
	D03	80	Silver			**5SH5080**		1	25 units	1BM
	For fuse links D01 in base D02 and MINIZED D02 switch disconnectors									
	D02	2	Pink			**5SH5402**		1	10 units	1BM
		4	Brown			**5SH5404**		1	10 units	1BM
		6	Green			**5SH5406**		1	10 units	1BM
		10/13	Red			**5SH5410**		1	10 units	1BM
		16	Gray			**5SH5416**		1	10 units	1BM
	NEOZED adapter sleeve fitters									
						**5SH5100**		1	1 unit	1BM
	NEOZED retaining springs									
	For fuse links D01 in screw caps									
	D02	2 ... 16				**5SH5400**		1	25 units	1BM

5

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5

Overview

The DIAZED fuse system is one of the oldest fuse systems in the world. It was developed by Siemens as far back as 1906. It is still the standard fuse system in many countries to this day. It is particularly widely used in the harsh environments of industrial applications.

The series is available with rated voltages from 500 V to 750 V.

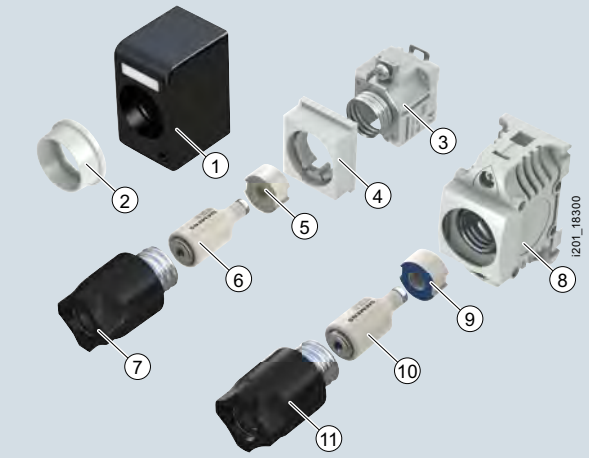
All DIAZED bases must be fed from the bottom to ensure an insulated threaded ring when the fuse link is being removed. Reliable contact of the fuse links is only ensured when used together with DIAZED screw adapters.

The terminals of the DIAZED bases are available in different versions and designs to support the various installation methods.

The high-performing EZR bus-mounting system for screw fixing is an outstanding feature. The busbars, which are particularly suited for bus-mounting bases, have a load capacity of up to 150 A with lateral infeed.

DIAZED stands for **Dia**metral gestuftes **z**weiteiliges Sicherungssystem mit **Ed**isongewinde (diametral two-step fuse system with Edison screw).

Benefits



1 DIAZED cap for fuse bases
2 DIAZED collar for fuse bases
3 DIAZED fuse bases
4 DIAZED cover for fuse bases
5 9 DIAZED screw adapter
6 10 DIAZED fuse link
7 11 DIAZED screw cap
8 DIAZED fuse base (with touch protection BGV A3)

Technical specifications

			5SA, 5SB, 5SC, 5SD, 5SF
Standards			IEC 60269-3; DIN VDE 0635; DIN VDE 0636-3; CEE 16
Operational class	Acc. to IEC 60269; DIN VDE 0636		gG
Characteristic	Acc. to DIN VDE 0635		Slow and quick-acting
Rated voltage U_n		V AC V DC	500, 690, 750 500, 600, 750
Rated current I_n		A	2 ... 100
Rated breaking capacity		kA AC kA DC	50, 40 at E16 8, 1.6 at E16
Overvoltage category			III II (DIAZED fuse bases made of molded plastic for use at 690 V AC / 600 V DC)
Mounting position			Any, preferably vertical
Non-interchangeability			Using screw adapter or adapter sleeves
Degree of protection	Acc. to IEC 60529		IP20, with connected conductors[1)]
Resistance to climate		°C	Up to 45, at 95% rel. humidity
Ambient temperature		°C	-5 ... +40°C, humidity 90% at 20°C

1) Degree of protection IP20 is tested according to regulations using a straight test finger (from the front), with the device mounted and equipped with a cover, housing or some other enclosure.

		Terminal version								
		B		K			S		R	
Size		DII	DIII	NDz	DII	DIII	DIII	DIV	DII	DIII
Conductor cross-sections										
• Rigid, min.	mm^2	1.5	2.5	1.0	1.5	2.5	2.5	10	1.5	1.5
• Rigid, max.	mm^2	10	25	6	10	25	25	50	35	35
• Flexible, with end sleeve	mm^2	10	25	6	10	25	25	50	35	35
Tightening torque										
• Screw M4	Nm	1.2							--	
• Screw M5	Nm	2.0							--	
• Screw M6	Nm	2.5							3.0	
• Screw M8	Nm	3.5							--	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	U_n	I_n	Identification color	Thread	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC/V DC	A			d					
	DIAZED fuse links										
	Operational class gG										
	DII	500/500	2	Pink	E27		**5SB211**		1	25 units	1BM
			4	Brown			**5SB221**		1	25 units	1BM
			6	Green			**5SB231**		1	25 units	1BM
			10	Red			**5SB251**		1	25 units	1BM
			16	Gray			**5SB261**		1	25 units	1BM
			20	Blue			**5SB271**		1	25 units	1BM
			25	Yellow			**5SB281**		1	25 units	1BM
	DIII	500/500	32	Violet	E33		**5SB4010**		1	25 units	1BM
			35	Black			**5SB411**		1	25 units	1BM
			50	White			**5SB421**		1	25 units	1BM
			63	Copper			**5SB431**		1	25 units	1BM
	DIV	500/400	80	Silver	R1¼"		**5SC211**		1	3 units	1BM
			100	Red			**5SC221**		1	3 units	1BM
	Characteristic: slow										
	TNDz	500/500	2	Pink	E16		**5SA211**		1	10 units	1BM
			4	Brown			**5SA221**		1	10 units	1BM
			6	Green			**5SA231**		1	10 units	1BM
			10	Red			**5SA251**		1	10 units	1BM
			16	Gray			**5SA261**		1	10 units	1BM
			20	Blue			**5SA271**		1	10 units	1BM
			25	Yellow			**5SA281**		1	10 units	1BM
	For operational class gG, use 5SF1 and 5SF5 fuse base made of ceramic **For 2 A ... 25 A, use screw adapter DII**										
	DIII	690/600	2	Pink	E33		**5SD8002**		1	5 units	1BM
			4	Brown			**5SD8004**		1	5 units	1BM
			6	Green			**5SD8006**		1	5 units	1BM
			10	Red			**5SD8010**		1	5 units	1BM
			16	Gray			**5SD8016**		1	5 units	1BM
			20	Blue			**5SD8020**		1	5 units	1BM
			25	Yellow			**5SD8025**		1	5 units	1BM
			35	Black			**5SD8035**		1	5 units	1BM
			50	White			**5SD8050**		1	5 units	1BM
			63	Copper			**5SD8063**		1	5 units	1BM

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DIAZED fuse systems

	Size	U_n	I_n	Identification color	Thread	Terminals	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC/V DC	A				d					
	DIAZED fuse links											
	Characteristic: quick-acting, also for direct current railway facilities For 2 A ... 25 A, use screw adapter DII											
	DIII	750/750	2	Pink	E33			**5SD601**		1	5 units	1BM
			4	Brown				**5SD602**		1	5 units	1BM
			6	Green				**5SD603**		1	5 units	1BM
			10	Red				**5SD604**		1	5 units	1BM
			16	Gray				**5SD605**		1	5 units	1BM
			20	Blue				**5SD606**		1	5 units	1BM
			25	Yellow				**5SD607**		1	5 units	1BM
			35	Black				**5SD608**		1	5 units	1BM
			50	White				**5SD610**		1	5 units	1BM
			63	Copper				**5SD611**		1	5 units	1BM
	DIAZED fuse bases made of ceramic											
	1P, for standard mounting rail											
	NDz	500/500	25		E16	KK[2]		**5SF1012**		1	5 units	1BM
	DII		25		E27	BB[2]		**5SF1005**		1	5 units	1BM
	DIII[1]		63		E33	BS[2]		**5SF1205**		1	5 units	1BM
	DIII[1]		63		E33	SS[2]		**5SF1215**		1	5 units	1BM
	1P, for screw fixing											
	NDz	500/500	25		E16	KK[2]		**5SF101**		1	5 units	1BM
	DII		25		E27	BB[2]		**5SF1024**		1	5 units	1BM
	DIII[1]		63		E33	BS[2]		**5SF1224**		1	5 units	1BM
	DIAZED fuse bases made of molded plastic With touch protection according to BGV A3											
	1P, for standard mounting rail or screw fixing											
	DII	500/500	25		E27	RR		**5SF1060**		1	3 units	1BM
	DIII[1]		63		E33	RR		**5SF1260**		1	3 units	1BM
	3P, for standard mounting rail or screw fixing											
	DII	500/500	25		E27	RR		**5SF5068**		1	1 unit	1BM
	DIII[1]		63		E33	RR		**5SF5268**		1	1 unit	1BM
	DIAZED EZR bus-mounting bases											
	1P, to snap onto EZR busbars for screw fixing											
	DII	500/500	25	E27	B[2]			**5SF6005**		1	5 units	1BM
	DIII	500/500	63	E33	B[2]			**5SF6205**		1	5 units	1BM

[1] Also for 690 V AC/600 V DC. For overvoltage category, see page 5/12.

[2] For terminal versions, see page 5/17.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	U_n	I_n	Thread	Terminals	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC/V DC	A			d					
	DIAZED components 750 V										
	DIAZED fuse bases 1P, for screw fixing with fine thread and cap										
	DIII	750/750	63	E33S	KK[1]		**5SF4230**		1	1 unit	1BM
	DIAZED screw caps made of ceramic, with fine thread										
	DIII	750/750	63	E33S			**5SH1161**		1	5 units	1BM
	DIAZED screw caps										
	Molded plastic, with inspection hole, black, not for SILIZED fuse links										
	NDz	500/500	25	E16			**5SH1112**		1	20 units	1BM
	DII		25	E27			**5SH1221**		1	5 units	1BM
	DIII		63	E33			**5SH1231**		1	5 units	1BM
	Ceramic										
	DII	500/500	25	E27			**5SH112**		1	50 units	1BM
	DIII		63	E33			**5SH113**		1	30 units	1BM
	Ceramic, with inspection hole, sealable										
	DII	500/500	25	E27			**5SH122**		1	50 units	1BM
	DIII		63	E33			**5SH123**		1	30 units	1BM
	Ceramic, extended version										
	DIII	690/600	63	E33			**5SH1170**		1	5 units	1BM

[1] For terminal versions, see page 5/17.

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DIAZED fuse systems

	Size	Thread	For fuse links A	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	DIAZED screw adapters								
	NDz	E16	2		**5SH328**		1	20 units	1BM
			4		**5SH331**		1	20 units	1BM
			6		**5SH305**		1	20 units	1BM
			10		**5SH306**		1	20 units	1BM
			16		**5SH307**		1	20 units	1BM
	Also for 5SF230 to 750 V								
	DII	E27	2		**5SH310**		1	25 units	1BM
			4		**5SH311**		1	25 units	1BM
			6		**5SH312**		1	25 units	1BM
			10		**5SH313**		1	25 units	1BM
			16		**5SH314**		1	25 units	1BM
			20		**5SH315**		1	25 units	1BM
			25		**5SH316**		1	25 units	1BM
	Also for 5SF230 to 750 V								
	DIII	E33	32		**5SH327**		1	25 units	1BM
			35		**5SH317**		1	25 units	1BM
			50		**5SH318**		1	25 units	1BM
			63		**5SH320**		1	25 units	1BM
	**DIAZED adapter sleeves for screw caps**								
	For DII fuse links in DIII base				**5SH302**		1	10 units	1BM
	**DIAZED adapter sleeve fitters**								
	DII/DIII				**5SH3703**		1	10 units	1BM
	**DIAZED caps**								
	Molded plastic								
	NDz	E16			**5SH201**		1	5 units	1BM
	DII	E27			**5SH202**		1	5 units	1BM
	DIII	E33			**5SH222**		1	5 units	1BM

	Size	Thread	DT	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS*/ P. unit	PG
	DIAZED cover rings							
	Ceramic DII and DIII, also for EZR bus-mounting base							
	DII	E27		**5SH332**		1	10 units	1BM
	DIII	E33		**5SH334**		1	10 units	1BM
	Molded plastic, also for EZR bus-mounting base							
	DII	E27		**5SH3401**		1	5 units	1BM
	DIII	E33		**5SH3411**		1	5 units	1BM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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More information



DIII fuse bases with terminal version BS
- Outgoing feeders (top), saddle terminal S
- Incoming feeders (bottom), clamp-type terminal B



NDZ fuse bases with terminal version KK
- Outgoing feeders (top), screw head contact K
- Incoming feeders (bottom), screw head contact K



DII fuse bases with terminal version BB
- Outgoing feeders (top), clamp-type terminal B
- Incoming feeders (bottom), clamp-type terminal B



DIII fuse bases with terminal version SS
- Outgoing feeders (top), saddle terminal S
- Incoming feeders (bottom), saddle terminal S

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Cylindrical fuse links and cylindrical fuse holders

Overview

Cylindrical fuses are standard in Europe. There are a range of different cylindrical fuse links and holders that comply with the standards IEC 60269-1, -2 and -3, and which are suitable for use in industrial applications. In South West Europe they are also approved for use in residential buildings.

The cylindrical fuse holders are also approved according to UL 512. The cylindrical fuse holders are tested and approved as fuse disconnectors according to the switching device standard IEC 60947-3. They are not suitable for switching loads.

Cylindrical fuse holders can be supplied with or without signal detectors. In the case of devices with signal detector, a small electronic device with LED is located behind an inspection window in the plug-in module. If the inserted fuse link is tripped, this is indicated by the LED flashing.

The switching state of the fuse holder can be signaled over a laterally retrofitted auxiliary switch, which enables the integration of the fuses in the automation process.

Benefits

- Devices with pole number 1P+N are available in a single modular width. This reduces the footprint by 50%
- The sliding catch for type ranges 8 x 32 mm and 10 x 38 mm enables the removal of individual devices from the assembly
- Space for a spare fuse in the plug-in module enables the fast replacement of fuses. This saves time and money and increases system availability
- A flashing LED signals that a fuse link has been tripped. This enables fast detection during runtime

Technical specifications

		Cylindrical fuse links						
		3NW63..	**3NW60..**	**3NW61..**	**3NW62..**	**3NW80..**	**3NW81..**	**3NW82..**
Size	mm × mm	8 × 32	10 × 38	14 × 51	22 × 58	10 × 38	14 × 51	22 × 58
Standards		IEC 60269-1, -2; NF C 60-200; NF C 63-210, -211; NBN C 63269-2, CEI 32-4, -12						
Operational class		gG				aM		
Rated voltages U_n	V AC	400	400 or 500					
Rated current I_n	A	2 ... 20	0.5 ... 32	4 ... 50	8 ... 100	0.5 ... 32	2 ... 50	10 ... 100
Rated breaking capacity								
• 500 V versions	kA AC	--	120	100		120	100	
• 400 V versions	kA AC	20	120	20		120	20	
Mounting position		Any, preferably vertical						

			Cylindrical fuse holders			
			3NW73..	**3NW70..**	**3NW71..**	**3NW72..**
Size		mm × mm	8 × 32	10 × 38	14 × 51	22 × 58
Standards			IEC 60269-1, -2, -3; NF C 60-200, NF C 63-210, -211; NBN C 63269-2-1; CEI 32-4, -12; UL 4248-1			
Approvals	Acc. to UL		--			--
	Acc. to CSA		--		--	--
Rated voltage U_n		V AC	400	690		
	Acc. to UL/CSA	V AC	400	600		
Rated current I_n		A AC	20	32	50	100
Rated breaking capacity		kA	20	100		
Breaking capacity • Utilization category			AC-20B (switching without load), DC-20B			
No-voltage changing of fuse links			Yes			
Sealable when installed			Yes			
Mounting position			Any, preferably vertical			
Degree of protection	Acc. to IEC 60529		IP20, with connected conductors[1]			
Terminals with touch protection according to BGV A3 at incoming and outgoing feeder			Yes			
Ambient temperature		°C	-5 ... +40°C, humidity 90% at +20°C			
Conductor cross-sections						
• Rigid		mm^2	0.5 ... 10		2.5 ... 10	4 ... 10
• Stranded		mm^2	0.5 ... 10		2.5 ... 25	4 ... 50
• Finely stranded, with end sleeve		mm^2	0.5 ... 10[2]		2.5 ... 16	4 ... 35
• AWG (American Wire Gauge)		AWG	--	10 ... 20	6 ... 10	--
Tightening torque		Nm	1.2		2.0	2.5

1) Degree of protection IP20 is tested according to regulations using a straight test finger (from the front), with the device mounted and equipped with a cover, housing or some other enclosure.

2) Max. cross-section 10 mm^2 with K28 crimper from Klauke.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	I_n	U_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm × mm	A	V AC	d					
	Cylindrical fuse links, operational class gG								
	8 × 32	2	400		**3NW6302-1**		1	10 units	1BM
		4			**3NW6304-1**		1	10 units	1BM
		6			**3NW6301-1**		1	10 units	1BM
		10			**3NW6303-1**		1	10 units	1BM
		16			**3NW6305-1**		1	10 units	1BM
		20			**3NW6307-1**		1	10 units	1BM
	10 × 38	0.5	500		**3NW6000-1**		1	10 units	1BM
		1			**3NW6011-1**		1	10 units	1BM
		2			**3NW6002-1**		1	10 units	1BM
		4			**3NW6004-1**		1	10 units	1BM
		6			**3NW6001-1**		1	10 units	1BM
		8			**3NW6008-1**		1	10 units	1BM
		10			**3NW6003-1**		1	10 units	1BM
		12			**3NW6006-1**		1	10 units	1BM
		16			**3NW6005-1**		1	20 units	1BM
		20			**3NW6007-1**		1	20 units	1BM
		25			**3NW6010-1**		1	20 units	1BM
		32	400		**3NW6012-1**		1	20 units	1BM
	14 × 51	4	500		**3NW6104-1**		1	10 units	1BM
		6			**3NW6101-1**		1	10 units	1BM
		8			**3NW6108-1**		1	10 units	1BM
		10			**3NW6103-1**		1	10 units	1BM
		12			**3NW6106-1**		1	10 units	1BM
		16			**3NW6105-1**		1	10 units	1BM
		20			**3NW6107-1**		1	10 units	1BM
		25			**3NW6110-1**		1	10 units	1BM
		32			**3NW6112-1**		1	10 units	1BM
		40			**3NW6117-1**		1	10 units	1BM
		50	400		**3NW6120-1**		1	10 units	1BM
	22 × 58	16	500		**3NW6205-1**		1	10 units	1BM
		20			**3NW6207-1**		1	10 units	1BM
		25			**3NW6210-1**		1	10 units	1BM
		32			**3NW6212-1**		1	10 units	1BM
		40			**3NW6217-1**		1	10 units	1BM
		50			**3NW6220-1**		1	10 units	1BM
		63			**3NW6222-1**		1	10 units	1BM
		80			**3NW6224-1**		1	10 units	1BM
		100	400		**3NW6230-1**		1	10 units	1BM
	Cylindrical fuse links, operational class aM								
	10 × 38	0.5	500		**3NW8000-1**		1	10 units	1BM
		1			**3NW8011-1**		1	10 units	1BM
		2			**3NW8002-1**		1	10 units	1BM
		4			**3NW8004-1**		1	10 units	1BM
		6			**3NW8001-1**		1	10 units	1BM
		8			**3NW8008-1**		1	10 units	1BM
		10			**3NW8003-1**		1	10 units	1BM
		12			**3NW8006-1**		1	10 units	1BM
		16			**3NW8005-1**		1	20 units	1BM
		20	400		**3NW8007-1**		1	20 units	1BM
		25			**3NW8010-1**		1	20 units	1BM
		32			**3NW8012-1**		1	20 units	1BM
	14 × 51	2	500		**3NW8102-1**		1	10 units	1BM
		4			**3NW8104-1**		1	10 units	1BM
		6			**3NW8101-1**		1	10 units	1BM
		8			**3NW8108-1**		1	10 units	1BM
		10			**3NW8103-1**		1	10 units	1BM
		12			**3NW8106-1**		1	10 units	1BM
		16			**3NW8105-1**		1	10 units	1BM
		20			**3NW8107-1**		1	10 units	1BM
		25			**3NW8110-1**		1	10 units	1BM
		32			**3NW8112-1**		1	10 units	1BM
		40			**3NW8117-1**		1	10 units	1BM
		50	400		**3NW8120-1**		1	10 units	1BM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Cylindrical fuse links and cylindrical fuse holders

	Size	I_n	U_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm × mm	A	V AC	d					
	22 × 58	16	500		**3NW8205-1**		1	10 units	1BM
		20			**3NW8207-1**		1	10 units	1BM
		25			**3NW8210-1**		1	10 units	1BM
		32			**3NW8212-1**		1	10 units	1BM
		40			**3NW8217-1**		1	10 units	1BM
		50			**3NW8220-1**		1	10 units	1BM
		63			**3NW8222-1**		1	10 units	1BM
		80			**3NW8224-1**		1	10 units	1BM
		100	400		**3NW8230-1**		1	10 units	1BM

	Number of poles	I_n	For fuse links of size	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	mm × mm	MW	d					
	Cylindrical fuse holders with signal detector[1]									
	1P									
		20	8 × 32	1		**3NW7314**		1	1 unit	1BM
		32	10 × 38	1		**3NW7014**		1	1 unit	1BM
		50	14 × 51	1.5		**3NW7112**		1	1 unit	1BM
		100	22 × 58	2		**3NW7212**		1	1 unit	1BM
	1P+N									
		20	8 × 32	1		**3NW7354**		1	1 unit	1BM
		32	10 × 38	1		**3NW7054**		1	1 unit	1BM
		50	14 × 51	3		**3NW7152**		1	1 unit	1BM
		100	22 × 58	4		**3NW7252**		1	1 unit	1BM
	2P									
		20	8 × 32	2		**3NW7324**		1	1 unit	1BM
		32	10 × 38	2		**3NW7024**		1	1 unit	1BM
		50	14 × 51	3		**3NW7122**		1	1 unit	1BM
		100	22 × 58	4		**3NW7222**		1	1 unit	1BM
	3P									
		20	8 × 32	3		**3NW7334**		1	1 unit	1BM
		32	10 × 38	3		**3NW7034**		1	1 unit	1BM
		50	14 × 51	4.5		**3NW7132**		1	1 unit	1BM
		100	22 × 58	6		**3NW7232**		1	1 unit	1BM
	3P+N									
		20	8 × 32	3		**3NW7364**		1	1 unit	1BM
		32	10 × 38	3		**3NW7064**		1	1 unit	1BM
		50	14 × 51	6		**3NW7162**		1	1 unit	1BM
		100	22 × 58	8		**3NW7262**		1	1 unit	1BM
	Cylindrical fuse holders without signal detector									
	1P									
		20	8 × 32	1		**3NW7313**		1	1 unit	1BM
		32	10 × 38	1		**3NW7013**		1	1 unit	1BM
		50	14 × 51	1.5		**3NW7111**		1	1 unit	1BM
		100	22 × 58	2		**3NW7211**		1	1 unit	1BM
	1P+N									
		20	8 × 32	1		**3NW7353**		1	1 unit	1BM
		32	10 × 38	1		**3NW7053**		1	1 unit	1BM
		50	14 × 51	3		**3NW7151**		1	1 unit	1BM
		100	22 × 58	4		**3NW7251**		1	1 unit	1BM
	2P									
		20	8 × 32	2		**3NW7323**		1	1 unit	1BM
		32	10 × 38	2		**3NW7023**		1	1 unit	1BM
		50	14 × 51	3		**3NW7121**		1	1 unit	1BM
		100	22 × 58	4		**3NW7221**		1	1 unit	1BM

[1] Min. voltage of the signal detector: 48 V AC/DC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Number of poles	I_n	For fuse links of size	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	mm × mm	MW	d					
	Cylindrical fuse holders without signal detector									
	3P									
		20	8 × 32	3		**3NW7333**		1	1 unit	1BM
		32	10 × 38	3		**3NW7033**		1	1 unit	1BM
		50	14 × 51	4.5		**3NW7131**		1	1 unit	1BM
		100	22 × 58	6		**3NW7231**		1	1 unit	1BM
	3P+N									
		20	8 × 32	3		**3NW7363**		1	1 unit	1BM
		32	10 × 38	3		**3NW7063**		1	1 unit	1BM
		50	14 × 51	6		**3NW7161**		1	1 unit	1BM
		100	22 × 58	8		**3NW7261**		1	1 unit	1BM
	**Auxiliary switches**									
	For indicating disconnection of the fuse link, solely for application of striker fuse links. For retrofitting using the factory-fitted brackets. Contact: 250 V AC, 5 A Minimum contact load: 12 V, 25 mA									
	For fuse bases		14 × 51	0.5		**3NW7901**		1	1 unit	1BM
	For fuse bases		22 × 58			**3NW7902**		1	1 unit	1BM
	For indicating the switching state of the fuse holder. For retrofitting using the factory-fitted brackets. Contact: 230 V AC, 6 A/110 V DC, 1 A Minimum contact load: 12 V, 25 mA Terminals 1.5 mm^2 - 0.5 Nm									
	For fuse holders		10 × 38 and 8 x 32	0.5		**3NW7903**		1	1 unit	1BM

More information

Mounting

Fuse holders, sizes 8 × 32 mm and 10 × 38 mm, have a sliding catch that enables the removal of individual devices from the assembly.

The infeed can be from the top or the bottom. Because the cylindrical fuse holders are fitted with the same anti-slip terminals at the top and the bottom, the devices can also be bus-mounted at the top or the bottom.

Auxiliary switches

Auxiliary switches are available for the cylindrical fuse holders. These are simply clipped onto the base using the factory-fitted brackets.

Sizes 8 × 32 mm and 10 × 38 mm:
The auxiliary switches support the remote display of the switching state ON or OFF of the fuse holder.

Sizes 14 × 51 mm and 22 × 58 mm:
The auxiliary switches support the remote display of fuse failure. However, fuse links with strikers are required for this function. When the fuse is tripped, a small striking pin – the striker – shoots out of the front of the fuse. Over an armature link in the auxiliary switch, the kinetic energy of this striker is used to switch a mini switch, which then initializes this signal over a floating contact.

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Fuse holders in size 10 x 38 mm and Class CC

Overview

A key feature of our three-pole fuse holders is their ultra compact design. With a width of only 45 mm, they are ideal for use with fused motor starter combinations. Because the contactor and the fuse holder have the same 45 mm width, they are easy to mount on top of one another. The strong current-limiting fuses ensure a type 2 protection level (coordination according to IEC 60947-4, no damage protection) for the contactors.

The UL version has an SCCR value of 200 kA. The accessories are generally UL-certified.

Customers can mount an auxiliary switch which signals the switching state or prevents the fuse holder from switching off under load by interrupting the contactor control, thus increasing safety for the operator and process. Busbars and a matching three-phase feeder terminal complete the product range.

Benefits

- Compact design, especially for motor starter combinations
- For IEC fuses of size 10 x 38 mm up to 32 A and Class CC UL fuses up to 30 A
- Meets the requirements of UL 508 with regard to clearances
- UL-approved microswitches, busbars and adapters for 60 mm busbar systems
- Optical signal detector for fast fault locating



Compact fuse holder Class CC with signal detector and mounted auxiliary switch.



Installation configuration of a cylindrical fuse holder and a SIRIUS contactor on busbar device adapter for the 60 mm busbar system.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

		Cylindrical fuse holders 3NW70..-1	Fuse holders 3NW75..-1HG
Size	mm × mm	10 × 38	Class CC
Standards		IEC 60269; UL4248-1; CSA	UL4248-1; CSA
Approvals • Acc. to UL • Acc. to CSA		, UL File Number E171267 	, UL File Number E171267
Rated voltage U_n	V AC	690	600
Rated current I_n	A AC	32	30
Rated short-circuit strength	kA	120 (at 500 V) 80 (at 690 V)	200
Breaking capacity • Utilization category		AC-20B (switching without load)	--
Rated impulse withstand voltage	kV	6	
Overvoltage category		III	
Pollution degree		2	
Max. power dissipation of the fuse link	W	3	
No-voltage changing of fuse links	°C	-5 ... +40°C, humidity 90% at +20°C	
Sealable when installed		Yes	
Lockable with padlock		Yes	
Mounting position		Any, preferably vertical	
Current direction		Any	
Degree of protection Acc. to IEC 60529		IP20, with connected conductors[1)]	
Terminals with touch protection according to BGV A3 at incoming and outgoing feeder		Yes	
Ambient temperature	°C	-5 ... +40°C, humidity 90% at +20°C	
Conductor cross-sections • Finely stranded, with end sleeve • AWG cables (American Wire Gauge)	 mm^2 AWG	 1 ... 4 18 ... 10	
Tightening torque • Terminal screws	Nm lb-in	1.5 13 PZ2	

1) Degree of protection IP20 is tested according to regulations using a straight test finger (from the front), with the device mounted and equipped with a cover, housing or some other enclosure.

		Auxiliary switches 3NW7903-1							
Standards		IEC 60947							
Approvals		, , UL 508, UL File Number E334003							
Utilization category		AC-12	DC-13			AC-15			Acc. to UL
Rated voltage U_n	V AC V DC	250 --	-- 24	-- 120	-- 240	24 --	120 --	240 --	240 --
Rated current I_n	A	5	2	0.5	0.25	4	3	1.5	5

		Busbars 5ST260.	
For cylindrical fuse holders		3NW70..-1	3NW75..-1HG
Pin spacing	mm	15	
Standards		EN 60974-1 (VDE 0660-100), IEC 60947-1:2004, UL 508, CSA 22.2	
Approvals		, UL 4248-1, UL File Number E337131	
Busbar material		E-Cu 58 F25	
Partition material		PA66-V0	
Lamp wire resistance/1.5 mm^2	°C	960	
Insulation coordination		Overvoltage category III, degree of pollution 2	
Rated operating voltage U_n • Acc. to UL • Acc. to IEC	 V AC V AC	 -- 690	 600 --
Maximum busbar current I_n • Acc. to UL • Acc. to IEC	 A A	 -- 80	 65 --

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Fuse holders in size 10 x 38 mm and Class CC

		Terminals 5ST2600	
For cylindrical fuse holders		3NW70..-1	3NW75..-1HG
Pin spacing	mm	15	
Standards		IEC 60999:2000, UL 508	
Approvals		UL, UL 4248-1, UL File Number E337131	
Enclosure/cover material		PA66-V0	
Lamp wire resistance/1 mm²	°C	960	
Temperature resistance PA66-V0, HDT B ISO 179, UL 94-V0/1.5	°C	200	
Insulation coordination		Overvoltage category III, degree of pollution 2	
Maximum operating voltage U_{max}			
• Acc. to UL	V AC	--	600
• Acc. to IEC	V AC	690	--
Maximum electrical load I_{max}			
• Acc. to UL	A	--	65
• Acc. to IEC	A	80	--
Rated current I_n	A	63	
Conductor cross-sections			
• Solid/stranded	mm²	2.5 ... 35	
• Finely stranded, with end sleeve	mm²	2.5 ... 25	
Tightening torque of clamping screw	Nm	2.5 ... 3.5	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Number of poles	I_n	For fuse links of size	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	mm x mm	MW	d					
3NW7 cylindrical fuse holders										
	**Cylindrical fuse holders**									
	3P	32	10 x 38	2.5						
	Without signal detector					**3NW7033-1**		1	1 unit	1BM
	With signal detector					**3NW7034-1**		1	1 unit	1BM
	Fuse holders Class CC									
	3P	30	Class CC	2.5						
	Without signal detector					**3NW7533-1HG**		1	1 unit	1DN
	With signal detector					**3NW7534-1HG**		1	1 unit	1DN
Accessories										
	Auxiliary switches									
	AC-12, 5 A, max. 250 V, 1 NO, 1 NC			2.5		**3NW7903-1**		1	1 unit	1BM

	Version	I_n	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	mm	mm	d					
5ST2 60. busbar system										
	**Busbars**									
	2 x 3P	63	15	45		**5ST2601**		1	10 units	1AD
	3 x 3P			90		**5ST2602**		1	10 units	1AD
	4 x 3P			135		**5ST2603**		1	10 units	1AD
	5 x 3P			180		**5ST2604**		1	10 units	1AD
Accessories										
	**Terminals**									
	For conductor cross-sections 2.5 mm^2 ... 35 mm^2					**5ST2600**		1	10 units	1AD

		Length of adapter	Width of adapter	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	d					
Device adapters									
	**Busbar device adapters**[1] **with connecting cables (above)**								
	Size S00, rated voltage 690 V AC, rated current 25 A, 1 support rail (35 mm), connecting cable AWG 12								
		200	45		**8US1251-5DS10**		1	1 unit	1CU
		260			**8US1251-5DT10**		1	1 unit	1CU
Accessories									
	**Mounting rails for busbar device adapter**								
	For assembly of additional devices		45		**8US1998-7CB45**		1	10 units	1CU

[1] For further device adapters and accessories, see chapter "Busbar Systems".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Class CC fuse systems

Overview

Class CC fuses are used for "branch circuit protection".

The characteristic of the fuse links is designed and tested to comply with the US National Electrical Code NEC 210.20(A). This means that when subject to continuous operation, only 80% of the rated current is permissible as operational current.

An operational current of 100% of the rated current (30 A) is only permissible short-time.

The devices are prepared for the inscription labels of the ALPHA FIX terminal blocks 8WH8120-7AA15 and 8WH8120-7XA05.

There are three different series:

- Characteristic: Slow 3NW1...-0HG
  For the protection of control transformers, reactors, inductances. Significantly slower than the minimum requirements specified by UL for Class CC fuses of 12 s at 2 × I_n.
- Characteristic: Quick-acting 3NW2...-0HG
  For a wide range of applications, for the protection of lighting installations, heating, control systems.
- Characteristic: Slow, current-limiting, 3NW3...-0HG
  Slow for overloads and quick-acting for short circuits. High current limitation for the protection of motor circuits.

Note:

For Class CC compact fuse holders for motor starter combinations, see page 5/25.

Benefits

- For switchboard assemblies and machine manufacturers who export their systems to the USA or Canada
- Easier export due to UL and CSA approvals for typical applications
- Modern design with touch protection to BGV A3 ensures safe installation.

Technical specifications

		Class CC fuse holders 3NW75.3-0HG
Standards **Approvals**		UL 4248-1; CSA C22.2 UL 4248-1; UL File Number E171267; CSA C22.2
Rated voltage U_n	V	AC: 600 / DC: 300
Rated current I_n	A	30
Rated conditional short-circuit current	kA	200
Breaking capacity • Utilization category		AC-20B (switching without load)
Max. power dissipation of the fuse link • With cable, 6 mm² • With cable, 10 mm²	 W W	 3 4.3
Rated impulse withstand voltage	kV	6
Overvoltage category		II
Pollution degree		2
No-voltage changing of fuse links		Yes
Sealable when installed		Yes
Mounting position		Any
Current direction		Any
Degree of protection acc. to IEC 60529		IP20[1)]
Terminals with touch protection according to BGV A3 at incoming and outgoing feeder		Yes
Ambient temperature	°C	45 -> from -5 to +40
Conductor cross-sections • Solid and stranded • AWG conductor cross-section, solid and stranded	 mm² AWG	 1.5 ... 16 15 ... 5
Tightening torque	Nm	2.5 (22 lb.in)

[1)] Degree of protection IP20 is tested according to regulations using a straight test finger (from the front), with the device mounted and equipped with a cover, housing or some other enclosure.

		Class CC fuse links		
		3NW1...-0HG	**3NW2...-0HG**	**3NW3...-0HG**
Standards **Approvals**		UL 248-4; CSA C22.2 UL 248-4; UL File Number E258218; CSA C22.2		
Characteristic		Slow	Quick-acting	Slow, current limiting
Rated voltage	V AC	600	600	600
	V DC	--	--	150 (3 .... 15 A) 300 (< 3 A, > 15 A)
Rated breaking capacity	kA AC	200		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Number of poles	U_n	I_n	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V	A	MW	d					
	**Class CC fuse holders**									
	1P	600	30	1		**3NW7513-0HG**		1	12 units	1DN
	2P	600	30	2		**3NW7523-0HG**		1	6 units	1DN
	3P	600	30	3		**3NW7533-0HG**		1	4 units	1DN

	I_N [1]	SD	**Characteristic: slow** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A						
	**Class CC fuse links**						
	0.6 (6/10) [1]		**3NW1006-0HG**		1	10 units	1DN
	0.8 (8/10) [1]		**3NW1008-0HG**		1	10 units	1DN
	1		**3NW1010-0HG**		1	10 units	1DN
	1.5 (1 ½) [1]		**3NW1015-0HG**		1	10 units	1DN
	2		**3NW1020-0HG**		1	10 units	1DN
	2.5		**3NW1025-0HG**		1	10 units	1DN
	3		**3NW1030-0HG**		1	10 units	1DN
	4		**3NW1040-0HG**		1	10 units	1DN
	5		**3NW1050-0HG**		1	10 units	1DN
	6		**3NW1060-0HG**		1	10 units	1DN
	7.5		**3NW1075-0HG**		1	10 units	1DN
	8		**3NW1080-0HG**		1	10 units	1DN
	10		**3NW1100-0HG**		1	10 units	1DN
	12		--				
	15		**3NW1150-0HG**		1	10 units	1DN
	20		**3NW1200-0HG**		1	10 units	1DN
	25		**3NW1250-0HG**		1	10 units	1DN
	30		**3NW1300-0HG**		1	10 units	1DN

	I_N [1]	SD	**Characteristic: quick-acting** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
	**Class CC fuse links**						
	0.6 (6/10) [1]		--				
	0.8 (8/10) [1]		--				
	1		**3NW2010-0HG**		1	10 units	1DN
	1.5 (1 ½) [1]		--				
	2		**3NW2020-0HG**		1	10 units	1DN
	2.5		--				
	3		**3NW2030-0HG**		1	10 units	1DN
	4		**3NW2040-0HG**		1	10 units	1DN
	5		**3NW2050-0HG**		1	10 units	1DN
	6		**3NW2060-0HG**		1	10 units	1DN
	7.5		--				
	8		**3NW2080-0HG**		1	10 units	1DN
	10		**3NW2100-0HG**		1	10 units	1DN
	12		**3NW2120-0HG**		1	10 units	1DN
	15		**3NW2150-0HG**		1	10 units	1DN
	20		**3NW2200-0HG**		1	10 units	1DN
	25		**3NW2250-0HG**		1	10 units	1DN
	30		**3NW2300-0HG**		1	10 units	1DN

[1] Values in brackets, American English wording.

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Class CC fuse systems

	I_n	SD	Characteristic: slow, current-limiting Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
	**Class CC fuse links**						
	1		**3NW3010-0HG**		1	10 units	1DN
	2		**3NW3020-0HG**		1	10 units	1DN
	3		**3NW3030-0HG**		1	10 units	1DN
	4		**3NW3040-0HG**		1	10 units	1DN
	5		**3NW3050-0HG**		1	10 units	1DN
	6		**3NW3060-0HG**		1	10 units	1DN
	8		**3NW3080-0HG**		1	10 units	1DN
	10		**3NW3100-0HG**		1	10 units	1DN
	12		**3NW3120-0HG**		1	10 units	1DN
	15		**3NW3150-0HG**		1	10 units	1DN
	20		**3NW3200-0HG**		1	10 units	1DN
	25		**3NW3250-0HG**		1	10 units	1DN
	30		**3NW3300-0HG**		1	10 units	1DN

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Class J fuse links are used for "branch circuit protection" and in the "feeder circuit". Two type series that each have six different sizes are available for the different applications: Characteristic: slow and characteristic: quick-acting. Both type series have identical dimensions. The types from 3 A up to and including 60 A have a cylindrical design: contact is made via cylindrical contact caps. The other types have a design with contact pins that are used for making contact.

The 30 A and 60 A fuse holders are modular installation devices for mounting on a DIN rail (standard mounting rail). These devices can also be mounted on the 60 mm busbar system using busbar adapters of appropriate width, see chapter "Busbar systems". The 100 A, 200 A and 400 A fuse holders are available as versions either for screwing onto a mounting plate or for directly mounting on the 60 mm busbar system. We do not currently offer any fuse holders for the 500 A and 600 A fuse links. The fuse links can be optionally mounted on busbars.

Note:

For more information, see chapter "Busbar Systems"

Benefits

- For switchboard assemblies and machine manufacturers who export their switchboards to the USA or Canada
- Easier export due to UL and CSA approvals
- Modern fuse holder design with touch protection to BGV A3 ensures safe installation
- Fuse holders up to 200 A enable fuses to be changed in de-energized condition
- Efficient power distribution thanks to mounting the devices on 60 mm busbar system.

Technical specifications

		Class J fuse holders 3NW75.3-0HG				
Standards		UL 4248-1 Ed.1, UL 4248-8 Ed.1, UL File-no. E171267 CSA C22.2 No.39-M1987, certificate no. 70029219, EAC				
Approvals		UL, CSA		c UL us		UL, CSA c UL us (busbar device)
Rated current I_n	A	30	60	100	200	400
Rated voltage U_n acc. to UL	V AC V DC	600 600				
Conditional rated current (SCCR withstand rating)		200				200 65 (busbar device)
Switching capacity Utilization category		AC-20B (switching without load) DC-20B (switching without load)				
Rated impulse withstand voltage	kV	No information as the devices are only tested and certified to UL/CSA and not to IEC				
Overvoltage category						
Pollution degree						
No-voltage changing of fuse links		Yes				No
Sealable when installed		Yes				
Mounting position		Any, preferably vertical				
Current direction		Any for surface mounting devices, for busbar devices: output via terminals				
Degree of protection acc. to IEC 60529		IP20				
Ambient temperature		-5 ... +40 °C				
Plastics		Self-extinguishing acc. to UL 94, tracking resistance min. CTI 200, halogen-free				
Temperature resistance		up to 125°C		up to 120°C		up to 125°C
Conductor cross-sections						
• Acc. to IEC/EN	mm^2	0.75 ... 50	2.5 ... 50	1.5 ... 70	35 ... 150	16 ... 300
• Acc. to UL/CSA	AWG	AWG 18 ... AWG 1	AWG 14 ... AWG 1	AWG 12 ... AWG 2/0	AWG 2 ... MCM 300	AWG 4 ... MCM 600
Tightening torque		up to 1 mm^2/>1 mm^2:				
• Acc. to IEC/EN	Nm	2.0 ... 2.5/3.5 ... 4.0	4.0	5	6	38
• Acc. to UL/CSA	lb-in	18 ... 22/31 ... 35	35	45	53	336
Busbar devices						
Conductor cross-sections						
• Acc. to IEC/EN	mm^2	--	--	1.5 ... 70	35 ... 150	16 ... 300
• Acc. to UL/CSA	AWG			AWG 12 ... AWG 2/0	AWG 2 ... MCM 300	AWG 4 ... MCM 600
Tightening torque						
• Acc. to IEC/EN	Nm	--	--	5	6	32
• Acc. to UL/CSA	lb-in			45	53	285

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Selection and ordering data

	Size (d x l)	I_n	SD	Characteristic: slow Article No. www.siemens.com/product?Article No.	Price per PU	PG	SD	Characteristic: quick-acting Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	d				d					
	Class J fuse links NEW											
	• Cylindrical design											
	21 mm x 57 mm	3		**3NW4113-2HG**		1DN		**3NW4113-1HG**		1	10 units	1DN
		4		**3NW4104-2HG**		1DN		**3NW4104-1HG**		1	10 units	1DN
		6		**3NW4101-2HG**		1DN		**3NW4101-1HG**		1	10 units	1DN
		10		**3NW4103-2HG**		1DN		**3NW4103-1HG**		1	10 units	1DN
		15		**3NW4105-2HG**		1DN		**3NW4105-1HG**		1	10 units	1DN
		20		**3NW4107-2HG**		1DN		**3NW4107-1HG**		1	10 units	1DN
		25		**3NW4110-2HG**		1DN		**3NW4110-1HG**		1	10 units	1DN
		30		**3NW4112-2HG**		1DN		**3NW4112-1HG**		1	10 units	1DN
	27 mm x 60 mm	35		**3NW4214-2HG**		1DN		**3NW4214-1HG**		1	10 units	1DN
		40		**3NW4217-2HG**		1DN		**3NW4217-1HG**		1	10 units	1DN
		45		**3NW4218-2HG**		1DN		**3NW4218-1HG**		1	10 units	1DN
		50		**3NW4220-2HG**		1DN		**3NW4220-1HG**		1	10 units	1DN
		60		**3NW4221-2HG**				**3NW4221-1HG**		1	10 units	1DN
	• Cylindrical design, with blade contacts											
	28 mm x 118 mm	70		**3NW4323-2HG**		1DN		**3NW4323-1HG**		1	10 units	1DN
		80		**3NW4324-2HG**		1DN		**3NW4324-1HG**		1	10 units	1DN
		90		**3NW4325-2HG**		1DN		**3NW4325-1HG**		1	10 units	1DN
		100		**3NW4330-2HG**		1DN		**3NW4330-1HG**		1	10 units	1DN
	41 mm x 146 mm	110		**3NW4431-2HG**		1DN		--				
		125		**3NW4432-2HG**		1DN		--				
		150		**3NW4434-2HG**		1DN		--				
		175		**3NW4437-2HG**		1DN		--				
		200		**3NW4440-2HG**		1DN		--				
	54 mm x 181 mm	250		**3NW4544-2HG**		1DN		**3NW4544-1HG**		1	1 unit	1DN
		300		**3NW4550-2HG**		1DN		**3NW4550-1HG**		1	1 unit	1DN
		350		**3NW4554-2HG**		1DN		**3NW4554-1HG**		1	1 unit	1DN
		400		**3NW4560-2HG**		1DN		**3NW4560-1HG**		1	1 unit	1DN
	66 mm x 203 mm	500		**3NW4665-2HG**		1DN		**3NW4665-1HG**		1	1 unit	1DN
		600		**3NW4670-2HG**		1DN		**3NW4670-1HG**		1	1 unit	1DN

	Number of poles	U_n	I_n	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V	A	mm	d					
	Class J fuse holders NEW									
	• Modular devices for mounting on DIN mounting rail									
	1P	600	30	36 (2 MW)		**3NW7511-3HG**		1	6 units	1DN
	2P	600	30	72 (4 MW)		**3NW7521-3HG**		1	3 units	1DN
	3P	600	30	108 (6 MW)		**3NW7531-3HG**		1	2 units	1DN
	1P	600	60	40		**3NW7511-5HG**		1	6 units	1DN
	2P	600	60	80		**3NW7521-5HG**		1	3 units	1DN
	3P	600	60	120		**3NW7531-5HG**		1	2 units	1DN
	• For screwing onto mounting plate[1]									
	3P	600	100	106		**3NW7531-6HG**		1	1 unit	1DN
	3P	600	200	184		**3NW7531-7HG**		1	1 unit	1DN
	3P	600	400	256		**3NW7531-8HG**		1	1 unit	1DN

[1] For versions for direct mounting on 60 mm busbar system see page 11/1

Minimum order quantity (PS) or a multiple thereof can be ordered.

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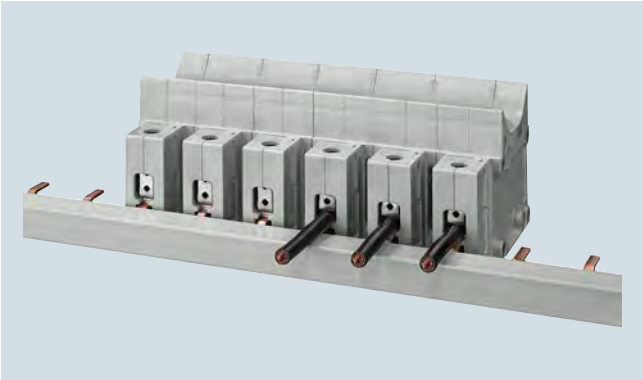
Overview

Busbars with pin-type connections can be used for NEOZED fuse switching devices and fuse bases. Busbars in 10 mm^2 and 16 mm^2 versions are available.

Busbars with fork plugs are used for the most frequently used NEOZED fuse bases made of ceramic.

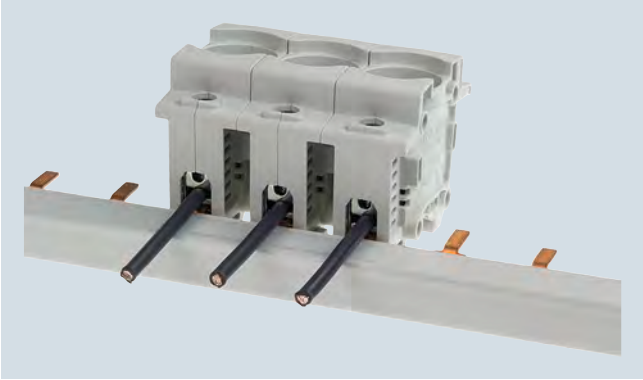
Benefits



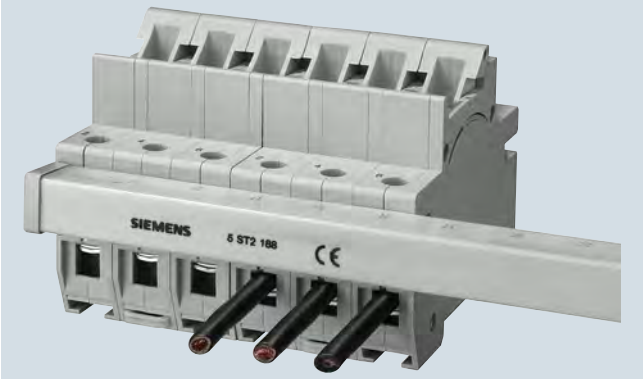
- Clear and visible conductor connection that can be easily checked when using the NEOZED D02 comfort base and which facilitates cable entry



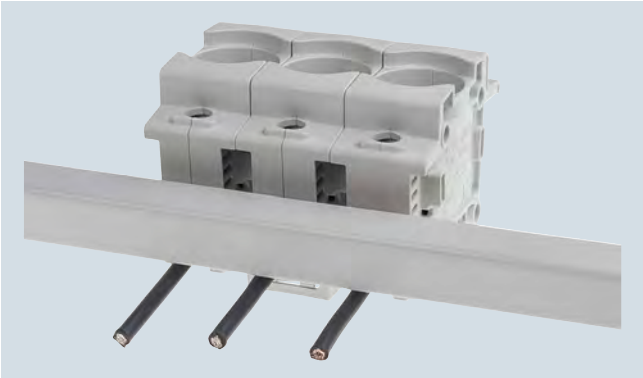
- Bus-mounting of NEOZED fuse bases made of ceramic on three-phase busbar with fork plug, which can be cut to length



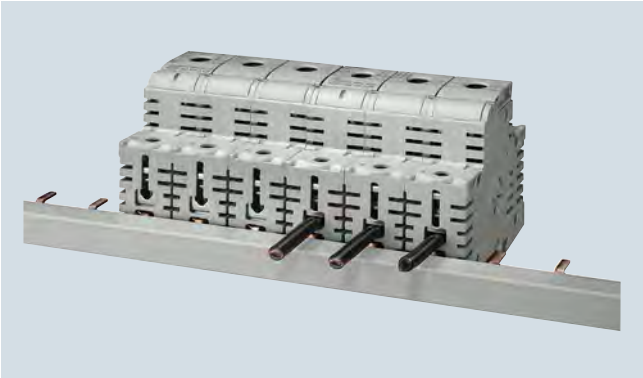
- Bus-mounting of the new NEOZED fuse base made of molded plastic on three-phase busbar with pin-type connection which can be cut to length, busbar at top for easily visible conductor connection



- Bus-mounting of MINIZED D01 fuse switch disconnectors on three-phase busbar with fork plug, can be cut to length



- Bus-mounting of the new NEOZED fuse base made of molded plastic on three-phase busbar with pin-type connection which can be cut to length, busbar at bottom for maximum conductor connection



- Clear and visible conductor connection that can be easily checked when using MINIZED D02 switch disconnectors. This facilitates cable entry and saves time

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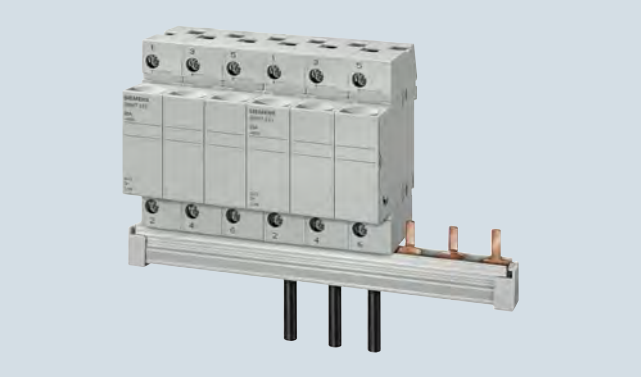
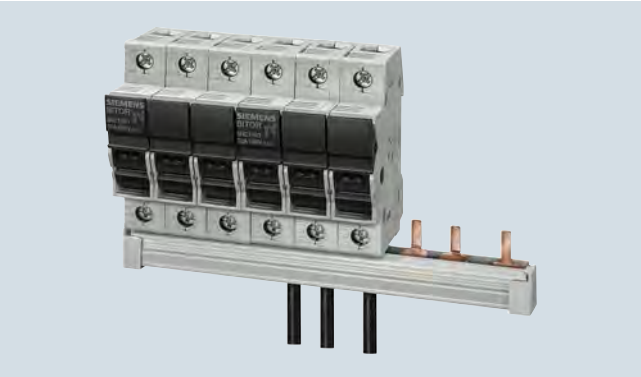
Busbar systems



- Bus-mounting of cylindrical fuse holders 8 × 32 mm and 10 × 38 mm with three-phase pin busbar that can be cut to length



- Bus mounting with infeed through a connection terminal directly on the fuse holder up to a conductor cross-section of 25 mm²



- Bus-mounting of SITOR cylindrical fuse holders 10 x 38 mm with the same terminal connection as Class CC fuse holders with three-phase pin busbar that can be cut to length

Technical specifications

			5ST, 5SH
Standards			EN 60439-1 (VDE 0660-500): 2005-01
Busbar material			SF-Cu F 24
Partition material			Plastic, Cycoloy 3600, Heat-resistant over 90 °C, flame-retardant, self-extinguishing, dioxin and halogen-free
Rated operational voltage U_c		V AC	400
Rated current I_n			
• Cross-section 10 mm²		A	63
• Cross-section 16 mm²		A	80
Rated impulse withstand voltage U_{imp}		kV	4
Test pulse voltage (1.2/50)		kV	6.2
Rated conditional short-circuit current I_{cc}		kA	25
Resistance to climate			
• Constant atmosphere	Acc. to DIN 50015		23/83; 40/92; 55/20
• Humid heat	Acc. to IEC 60068-2-30		28 cycles
Insulation coordination			
• Overvoltage category			III
• Pollution degree			2
Maximum busbar current I_S per phase			
• Infeed at the start of the busbar			
- Cross-section 10 mm²		A	63
- Cross-section 16 mm²		A	80
• Infeed at the center of the busbar			
- Cross-section 10 mm²		A	100
- Cross-section 16 mm²		A	130

Minimum order quantity (PS) or a multiple thereof can be ordered.

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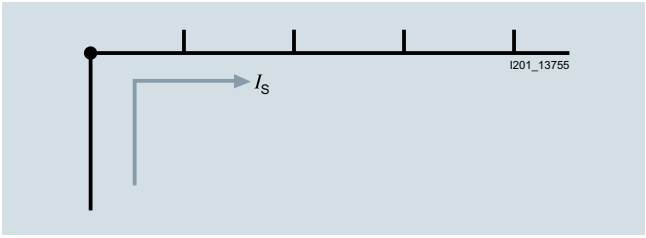
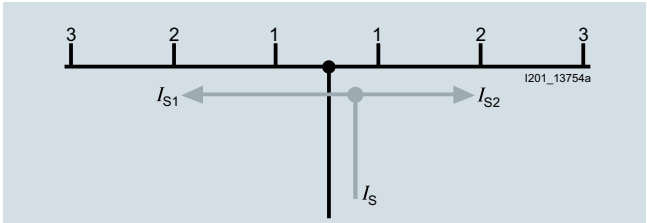
5ST37 . . - .HG busbars acc. to UL 508

		5ST37..-0HG	5ST37..-2HG	5ST3770-0HG	5ST3770-1HG
Standards		UL 508, CSA C22.2 No. 14-M 95			
Approvals		UL 508 File No. E328403 CSA			
Operational voltage					
• Acc. to IEC	V AC	690			
• Acc. to UL 489	V AC	600			
Rated conditional short-circuit current	kA	10 (RMS symmetrical 600 V for three cycles)			
• Dielectric strength	kV/mm	25			
• Surge strength	kV	> 9.5			
Rated current	A	--	--	115	
Maximum busbar current I_S per phase					
• Infeed at the start of the busbar	A	80	100	--	--
• Infeed at the center of the busbar	A	160	200	--	--
Insulation coordination					
• Overvoltage category		III			
• Pollution degree		2			
Busbar cross-section	mm^2 Cu	18	25	--	--
Infeed		Any			
Conductor cross-sections	AWG	--	--	10 ... 1/0	14 ... 1
	mm^2	--	--	6 ... 35	1.5 ... 50
Terminals					
• Terminal tightening torque	Nm	--	--	5	3.5
	lb-in	--	--	50	35

Infeed at the start of the busbar



Infeed along the busbar or midpoint infeed



The sum of the output current per branch must not be greater than the busbar current $I_{S1,2}$/phase.

Selection and ordering data

	Phases	Conductor cross-section	Load capacity up to	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm^2	A	MW	mm	d					
Busbars											
	For MINIZED D02 switch disconnectors **For NEOZED D01/D02 comfort bases** made of molded plastic 5SG1301, 5SG1701, 5SG5301, 5SG5701 **For NEOZED D01/D02 fuse bases** made of ceramic terminal version S (saddle terminal) **For cylindrical fuse holder 14 × 51 mm** **For cylindrical fuse holder SITOR 14 × 51 mm** Can be cut to length, without end caps										
	Single-phase	16	130	1.5	1016	▶	**5ST3703**		1	1 unit	1AD
	Three-phase	16	120	1.5	1016		**5ST3714**		1	1 unit	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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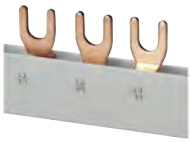
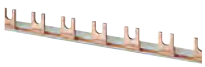
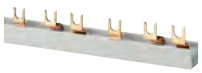
	Phases	Conductor cross-section	Load capacity up to	Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm²	A	MW	mm	d					
	For MINIZED D01 fuse switch disconnectors										
	Can be cut to length, without end caps										
	Single-phase	16	120	1	1000		**5ST2190**		1	1 unit	1AD
	Two-phase						**5ST2191**		1	1 unit	1AD
	Three-phase						**5ST2192**		1	1 unit	1AD
	Can be cut to length, with 2 end caps										
	Single-phase	16	120	1	220		**5ST2186**		1	1 unit	1AD
	Two-phase						**5ST2187**		1	1 unit	1AD
	Three-phase						**5ST2188**		1	1 unit	1AD
	For NEOZED D01/D02 fuse bases										
	• 5SG1.30, 5SG1.31, 5SG5.30 made of molded plastic • Made of ceramic, terminal version B and K (clamp-type terminal, screw head contact)										
	Non-insulated										
	Single-phase	36	168	1.5			**5SH5322**		1	1 unit	1BM
	Can be cut to length, without end caps										
	Single-phase	24	160	1.5	1000		**5SH5517**		1	1 unit	1BM
	Three-phase	16	120	1.5	1000		**5SH5320**		1	1 unit	1BM
											
	For cylindrical fuse holder 8 × 32 mm and 10 × 38 mm **For cylindrical fuse holder SITOR 10 × 38 mm** **For class CC fuse holder** [1]										
	Can be cut to length, without end caps										
	Single-phase	16	120	1	1016	▶	**5ST3701**		1	1 unit	1AD
	Two-phase		120	1		▶	**5ST3705**		1	1 unit	1AD
	Three-phase	16	120	1	1016	▶	**5ST3710**		1	1 unit	1AD
	Can be cut to length, with end caps										
	Single-phase	16		1	214	▶	**5ST3700**		1	1 unit	1AD
	Two-phase			1		▶	**5ST3704**		1	1 unit	1AD
	Three-phase			1		▶	**5ST3708**		1	1 unit	1AD
	End caps for busbars										
	For single-phase 5ST2190 busbars						**5ST2196**		1	10 units	1AD
	For two-phase 5ST2191 busbars and for three-phase 5ST2192 busbars						**5ST2197**		1	10 units	1AD
	For single-phase 5ST37, 5SH55 busbars					▶	**5ST3748**		1	10 units	1AD
	For two-phase and three-phase 5ST37 and 5SH5320 busbars					▶	**5ST3750**		1	10 units	1AD

[1] For UL-approved busbars, see page 5/36.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Phases	Conductor cross-section	Load capacity up to	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm^2	A	mm	d					
	**Touch protection for free connection of pin busbars**									
	Yellow (RAL 1004) 5 x 1 pin				►	**5ST3655**		1	10 units	1AD
	Terminals									
	For NEOZED fuse bases D01/D02 made of ceramic For DIAZED fuse bases DII/DIII made of ceramic									
	Terminal version S For conductors	2 ... 25				**5SH5327**		1	10 units	1BM
	Terminal versions B and K For conductors	6 ... 25				**5SH5328**		1	10 units	1BM
	For the infeed of fork-type or pin busbars For conductors	6 ... 35				**5ST2157**		1	5 units	1AD
	Busbars **For single-pole DIAZED fuse bases made of ceramic with terminal versions BB and BS**									
	Size DII, for 19 bases Single-phase	24	80	1000		**5SH3500**				
	Size DIII, for 25 bases Single-phase	39	120	1000		**5SH3501**				
	Bus-mounting terminals For DIAZED EZR bus-mounting bases									
	Non-insulated									
	For conductors	1.5 ... 16				**8JH4122**		1	10 units	1BR
	For conductors	10 ... 35				**8JH4124**		1	10 units	1BR

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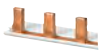
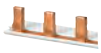
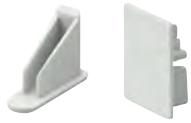
Busbar systems

5ST37 . . - .HG busbars acc. to UL 508

		Pin spacing	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	mm	d					
	5ST37..-.HG busbars acc. to UL 508, 18 mm², can be cut, without end caps								
	Single-phase								
	• For fuse holders 10 x 38 mm class CC (3NC1091, 3NW7513-0HG) or MCBs 1P (5SY)	1	1000		**5ST3701-0HG**		1	1 unit	1AE
	• For fuse holders 14 x 51 mm (3NC1491, 3NW7111) or MCBs 1P (5SY, 5SP) with AS or FC	1.5	1000		**5ST3703-0HG**		1	1 unit	1AE
	Two-phase								
	• For fuse holders 10 x 38mm/class CC (3NC1092, 3NW7523-0HG) or MCBs 2P (5SY)	1	1000		**5ST3705-0HG**		1	1 unit	1AE
	Three-phase								
	• For fuse holders 10 x 38 mm/class CC (3NC1093, 3NW7533-0HG) or MCBs 3P (5SY)	1	1000		**5ST3710-0HG**		1	1 unit	1AE
	• For fuse holders 14 x 51 mm (3NC1493, 3NW7131) or MCBs 1P (5SY, 5SP) with AS or FC	1.5	1000		**5ST3714-0HG**		1	1 unit	1AE
	5ST37..-.HG busbars acc. to UL 508, 25 mm², can be cut, without end caps								
	Single-phase								
	• For fuse holders 14 x 51 mm (3NC1491, 3NW7111) or MCBs 1P (5SP)	1.5	1000		**5ST3701-2HG**		1	1 unit	1AE
	Two-phase								
	• For fuse holders 14 x 51 mm (3NC1492, 3NW7121) or MCBs 2P (5SP)	1.5	1000		**5ST3705-2HG**		1	1 unit	1AE
	Three-phase								
	• For fuse holders 14 x 51 mm (3NC1493, 3NW7131) or MCBs 3P (5SP)	1.5	1000		**5ST3710-2HG**		1	1 unit	1AE
	**End caps for 5ST37..-.HG**								
	• For single-phase busbars				**5ST3748-0HG**		1	10 units	1AE
	• For two- and three-phase busbars				**5ST3750-0HG**		1	10 units	1AE
	**Terminals according to UL 508**								
	Infeed to device								
	• 35 mm²				**5ST3770-0HG**		1	10 units	1AE
	Infeed to busbar								
	• 50 mm²				**5ST3770-1HG**		1	10 units	1AE
	**Touch protection cover for busbars according to UL 508**								
	• 5 x 1 pin				**5ST3655-0HG**		1	10 units	1AE

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

LV HRC fuse systems (NH type) are used for installation systems in non-residential, commercial and industrial buildings as well as in switchboard assemblies of power utilities. They therefore protect essential building parts and systems.

LV HRC fuse systems (NH type) are fuse systems designed for operation by experts. There are no constructional requirements for non-interchangeability of rated current and touch protection.

The components and auxiliary equipment are designed in such a way as to ensure the safe replacement of LV HRC fuse systems or isolation of systems.

LV HRC fuse links are available in the sizes 000, 00, 0, 1, 2, 3, 4 and 4a.

LV HRC fuse links are available in the following operational classes:

- gG for cable and line protection
- aM for short-circuit protection of switching devices in motor circuits
- gR or aR for protection of power semiconductors
- gS: The new gS operational class combines cable and line protection with semiconductor protection

LV HRC fuse links of size 000 can also be used in LV HRC fuse bases, LV HRC fuse switch disconnectors, LV HRC fuse strips as well as LV HRC in-line fuse switch disconnectors of size 00.

The fuse links 300 A, 355 A and 425 A comply with the standard but do not have the VDE mark.

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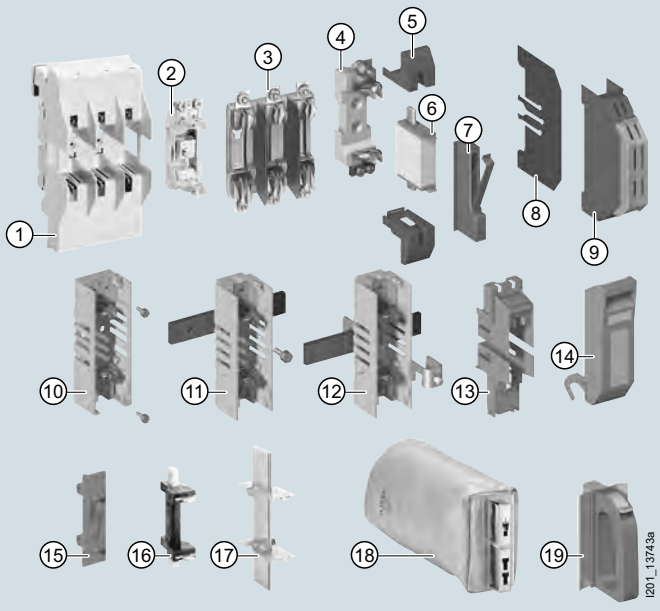
LV HRC components



1. LV HRC fuse base from the SR60 busbar system
2. LV HRC fuse base for busbar mounting
3. LV HRC fuse base, 3-pole
4. LV HRC fuse base, 1-pole
5. LV HRC contact covers
6. LV HRC fuse link
7. LV HRC signal detector
8. LV HRC partition
9. LV HRC protective cover

LV HRC fuse bases with swivel mechanisms,

10. - for screw fixing on mounting plate
11. - for screw fixing on busbar system
12. - for claw fixing on busbar
13. LV HRC protective cover for LV HRC fuse bases with swivel mechanism
14. LV HRC swivel mechanism
15. LV HRC fuse base cover
16. LV HRC isolating blade with insulated grip lugs
17. LV HRC isolating blade with non-insulated grip lugs
18. LV HRC fuse puller with sleeve
19. LV HRC fuse puller

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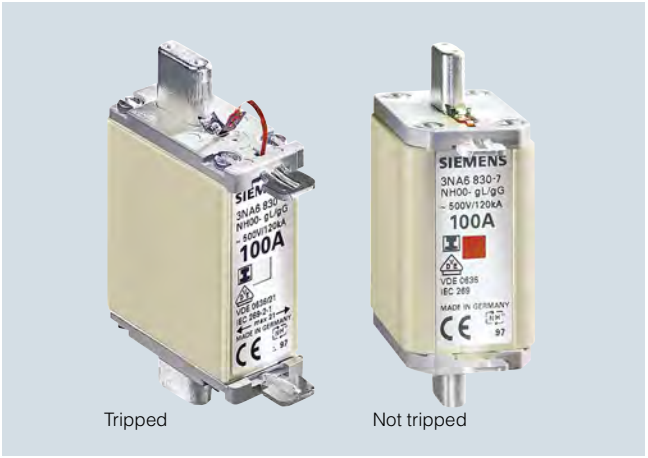
LV HRC fuse links

Benefits



- LV HRC fuse links with combination alarm signal the tripping of a fuse by a clear color change from red to white. This enables fast identification and replacement of the tripped fuse links. This increases system availability
- The insulated grip lugs made of metal are integrated in the top and bottom covers of the fuse link in molded plastic and provide greater safety during replacement. The following mark shown indicates that the grip lugs are insulated



- In the standard series with front indicator, the front-mounted red indicator signals the tripping of a fuse
- LV HRC fuse links are always equipped with silver-plated contact pins. This means that they are non-corroding and have less contact resistance. This ensures the long-term operational safety of the plant

Technical specifications

		LV HRC fuse links					
		Operational class gG					Operational class aM
		3NA6...-4 3NA6...-4KK 3NA383.-8	3NA6... 3NA6...-7 3NA7... 3NA7...-7	3NA3... 3NA3...-7	3NA6...-6 3NA7...-6	3NA3...-6	3ND1 3ND2
Standards **Approvals**		IEC 60269-1, -2; EN 60269-1; DIN VDE 0636 DIN VDE 0636-2; CSA 22.2 No.106, File Number 016325_0_00 (CSA approval of fuses 500 V for 600 V)					
Rated voltage U_n							
• Sizes 000 and 00	V AC V DC	400 --	500 250	500 250	690[1] 250	690[1] 250	500 --
• Sizes 1 and 2	V AC V DC	400 --	500 440	500 440	690[1] 440	690[1] 440	690 --
• Size 3	V AC V DC	-- --	-- --	500 440	-- --	690[1] 440	690 --
• Sizes 4 and 4a (IEC design)	V AC V DC	-- --	-- --	500 440	-- --	-- --	-- --
Rated current I_n	A	10 ... 400	2 ... 400	2 ... 1250	2 ... 315	2 ... 500	6 ... 630
Rated breaking capacity	kA AC	120					
	kA DC	--	25				--
Contact pins		Non-corroding, silver-plated					
Resistance to climate	°C	-20 ... +50 at 95% relative humidity					

[1] Manufacturer's confirmation for 690 V +10% rated voltage available on request.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	Mounting width	I_n	U_n	SD	Insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	A	V AC/V DC	d					
	LV HRC fuse links with combination alarm, operational class gG									
	000	21	10	400/--		**3NA6803-4**		1	3 units	1BM
			16			**3NA6805-4**		1	3 units	1BM
			20			**3NA6807-4**		1	3 units	1BM
			25			**3NA6810-4**		1	3 units	1BM
			32			**3NA6812-4**		1	3 units	1BM
			35			**3NA6814-4**		1	3 units	1BM
			40			**3NA6817-4**		1	3 units	1BM
			50			**3NA6820-4**		1	3 units	1BM
			63			**3NA6822-4**		1	3 units	1BM
			80			**3NA6824-4**		1	3 units	1BM
			100			**3NA6830-4**		1	3 units	1BM
	00	30	80	400/--		**3NA6824-4KK**		1	3 units	1BM
			100			**3NA6830-4KK**		1	3 units	1BM
			125			**3NA6832-4**		1	3 units	1BM
			160			**3NA6836-4**		1	3 units	1BM
	1	30	35	400/--		**3NA6114-4**		1	3 units	1BM
			40			**3NA6117-4**		1	3 units	1BM
			50			**3NA6120-4**		1	3 units	1BM
			63			**3NA6122-4**		1	3 units	1BM
			80			**3NA6124-4**		1	3 units	1BM
			100			**3NA6130-4**		1	3 units	1BM
			125			**3NA6132-4**		1	3 units	1BM
			160			**3NA6136-4**		1	3 units	1BM
		47.2	200			**3NA6140-4**		1	3 units	1BM
			224			**3NA6142-4**		1	3 units	1BM
			250			**3NA6144-4**		1	3 units	1BM
	2	47.2	50	400/--		**3NA6220-4**		1	3 units	1BM
			63			**3NA6222-4**		1	3 units	1BM
			80			**3NA6224-4**		1	3 units	1BM
			100			**3NA6230-4**		1	3 units	1BM
			125			**3NA6232-4**		1	3 units	1BM
			160			**3NA6236-4**		1	3 units	1BM
			200			**3NA6240-4**		1	3 units	1BM
			224			**3NA6242-4**		1	3 units	1BM
			250			**3NA6244-4**		1	3 units	1BM
		57.8	300			**3NA6250-4**		1	3 units	1BM
			315			**3NA6252-4**		1	3 units	1BM
			355			**3NA6254-4**		1	3 units	1BM
			400			**3NA6260-4**		1	3 units	1BM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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LV HRC fuse links

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	Size	Mounting width	I_n	U_n	SD	Non-insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PG	SD	Insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	A	V AC/ V DC					d					
	LV HRC fuse links with combination alarm, operational class gG													
	000	21	2	500/ 250		**3NA7802**		1BM		**3NA6802**		1	3 units	1BM
			4			**3NA7804**		1BM		**3NA6804**		1	3 units	1BM
			6			**3NA7801**		1BM		**3NA6801**		1	3 units	1BM
			10			**3NA7803**		1BM		**3NA6803**		1	3 units	1BM
			16			**3NA7805**		1BM		**3NA6805**		1	3 units	1BM
			20			**3NA7807**		1BM		**3NA6807**		1	3 units	1BM
			25			**3NA7810**		1BM		**3NA6810**		1	3 units	1BM
			32			**3NA7812**		1BM		**3NA6812**		1	3 units	1BM
			35			**3NA7814**		1BM		**3NA6814**		1	3 units	1BM
			40			**3NA7817**		1BM		**3NA6817**		1	3 units	1BM
			50			**3NA7820**		1BM		**3NA6820**		1	3 units	1BM
			63			**3NA7822**		1BM		**3NA6822**		1	3 units	1BM
			80			**3NA7824**		1BM		**3NA6824**		1	3 units	1BM
			100			**3NA7830**		1BM		**3NA6830**		1	3 units	1BM
	00	30	80	500/ 250		**3NA7824-7**		1BM		**3NA6824-7**		1	3 units	1BM
			100			**3NA7830-7**		1BM		**3NA6830-7**		1	3 units	1BM
			125			**3NA7832**		1BM		**3NA6832**		1	3 units	1BM
			160			**3NA7836**		1BM		**3NA6836**		1	3 units	1BM
	1	30	16	500/ 440		**3NA7105**		1BM		**3NA6105**		1	3 units	1BM
			20			**3NA7107**		1BM		**3NA6107**		1	3 units	1BM
			25			**3NA7110**		1BM		**3NA6110**		1	3 units	1BM
			35			**3NA7114**		1BM		**3NA6114**		1	3 units	1BM
			40			**3NA7117**		1BM		**3NA6117**		1	3 units	1BM
			50			**3NA7120**		1BM		**3NA6120**		1	3 units	1BM
			63			**3NA7122**		1BM		**3NA6122**		1	3 units	1BM
			80			**3NA7124**		1BM		**3NA6124**		1	3 units	1BM
			100			**3NA7130**		1BM		**3NA6130**		1	3 units	1BM
			125			**3NA7132**		1BM		**3NA6132**		1	3 units	1BM
			160			**3NA7136**		1BM		**3NA6136**		1	3 units	1BM
		47.2	200			**3NA7140**		1BM		**3NA6140**		1	3 units	1BM
			224			**3NA7142**		1BM		**3NA6142**		1	3 units	1BM
			250			**3NA7144**		1BM		**3NA6144**		1	3 units	1BM
	2	47.2	35	500/ 440		**3NA7214**		1BM		**3NA6214**		1	3 units	1BM
			50			**3NA7220**		1BM		**3NA6220**		1	3 units	1BM
			63			**3NA7222**		1BM		**3NA6222**		1	3 units	1BM
			80			**3NA7224**		1BM		**3NA6224**		1	3 units	1BM
			100			**3NA7230**		1BM		**3NA6230**		1	3 units	1BM
			125			**3NA7232**		1BM		**3NA6232**		1	3 units	1BM
			160			**3NA7236**		1BM		**3NA6236**		1	3 units	1BM
			200			**3NA7240**		1BM		**3NA6240**		1	3 units	1BM
			224			**3NA7242**		1BM		**3NA6242**		1	3 units	1BM
			250			**3NA7244**		1BM		**3NA6244**		1	3 units	1BM
		57.8	300			--				**3NA6250**		1	3 units	1BM
			315			**3NA7252**		1BM		**3NA6252**		1	3 units	1BM
			355			--				**3NA6254**		1	3 units	1BM
			400			**3NA7260**		1BM		**3NA6260**		1	3 units	1BM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	Mounting width	I_n	U_n	SD	Non-insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	A	V AC/V DC	d					
	LV HRC fuse links with front indicator, operational class gG									
	000	21	2	500/250		**3NA3802**		1	3 units	1BM
			4			**3NA3804**		1	3 units	1BM
			6			**3NA3801**		1	3 units	1BM
			10			**3NA3803**		1	3 units	1BM
			16			**3NA3805**		1	3 units	1BM
			20			**3NA3807**		1	3 units	1BM
			25			**3NA3810**		1	3 units	1BM
			32			**3NA3812**		1	3 units	1BM
			35			**3NA3814**		1	3 units	1BM
			40			**3NA3817**		1	3 units	1BM
			50			**3NA3820**		1	3 units	1BM
			63			**3NA3822**		1	3 units	1BM
			80			**3NA3824**		1	3 units	1BM
			100			**3NA3830**		1	3 units	1BM
			125	400/250		**3NA3832-8**		1	3 units	1BM
			160			**3NA3836-8**		1	3 units	1BM
	00	30	35	500/250		**3NA3814-7**		1	3 units	1BM
			50			**3NA3820-7**		1	3 units	1BM
			63			**3NA3822-7**		1	3 units	1BM
			80			**3NA3824-7**		1	3 units	1BM
			100			**3NA3830-7**		1	3 units	1BM
			125			**3NA3832**		1	3 units	1BM
			160			**3NA3836**		1	3 units	1BM
	0	30	6	500/440		**3NA3001**		1	3 units	1BM
			10			**3NA3003**		1	3 units	1BM
			16			**3NA3005**		1	3 units	1BM
			20			**3NA3007**		1	3 units	1BM
			25			**3NA3010**		1	3 units	1BM
			32			**3NA3012**		1	3 units	1BM
			35			**3NA3014**		1	3 units	1BM
			40			**3NA3017**		1	3 units	1BM
			50			**3NA3020**		1	3 units	1BM
			63			**3NA3022**		1	3 units	1BM
			80			**3NA3024**		1	3 units	1BM
			100			**3NA3030**		1	3 units	1BM
			125			**3NA3032**		1	3 units	1BM
			160			**3NA3036**		1	3 units	1BM
	1	30	16	500/440		**3NA3105**		1	3 units	1BM
			20			**3NA3107**		1	3 units	1BM
			25			**3NA3110**		1	3 units	1BM
			35			**3NA3114**		1	3 units	1BM
			40			**3NA3117**		1	3 units	1BM
			50			**3NA3120**		1	3 units	1BM
			63			**3NA3122**		1	3 units	1BM
			80			**3NA3124**		1	3 units	1BM
			100			**3NA3130**		1	3 units	1BM
			125			**3NA3132**		1	3 units	1BM
			160			**3NA3136**		1	3 units	1BM
		47.2	200			**3NA3140**		1	3 units	1BM
			224			**3NA3142**		1	3 units	1BM
			250			**3NA3144**		1	3 units	1BM

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LV HRC fuse links

	Size	Mounting width	I_n	U_n	SD	Non-insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	A	V AC/V DC	d					
	LV HRC fuse links with front indicator, operational class gG									
	2	47.2	35	500/440		**3NA3214**		1	3 units	1BM
			50			**3NA3220**		1	3 units	1BM
			63			**3NA3222**		1	3 units	1BM
			80			**3NA3224**		1	3 units	1BM
			100			**3NA3230**		1	3 units	1BM
			125			**3NA3232**		1	3 units	1BM
			160			**3NA3236**		1	3 units	1BM
			200			**3NA3240**		1	3 units	1BM
			224			**3NA3242**		1	3 units	1BM
			250			**3NA3244**		1	3 units	1BM
		57.8	300			**3NA3250**		1	3 units	1BM
			315			**3NA3252**		1	3 units	1BM
			355			**3NA3254**		1	3 units	1BM
			400			**3NA3260**		1	3 units	1BM
	3	57.8	200	500/440		**3NA3340**		1	3 units	1BM
			224			**3NA3342**		1	3 units	1BM
			250			**3NA3344**		1	3 units	1BM
			300			**3NA3350**		1	3 units	1BM
			315			**3NA3352**		1	3 units	1BM
			355			**3NA3354**		1	3 units	1BM
			400			**3NA3360**		1	3 units	1BM
		71.2	425			**3NA3362**		1	3 units	1BM
			500			**3NA3365**		1	3 units	1BM
			630			**3NA3372**		1	3 units	1BM
	Can only be used for 3NH3530 LV HRC fuse base									
	4 (IEC design)	101.8	630	500/440		**3NA3472**		1	1 unit	1BM
			800			**3NA3475**		1	1 unit	1BM
			1000			**3NA3480**		1	1 unit	1BM
			1250			**3NA3482**		1	1 unit	1BM
	Only for LV HRC base 3NH7520 or usable for fuse switch disconnectors with in-line design 3NJ5643-0BB00									
	4a	101.8	500	500/440		**3NA3665**		1	1 unit	1BM
			630			**3NA3672**		1	1 unit	1BM
			800			**3NA3675**		1	1 unit	1BM
			1000			**3NA3680**		1	1 unit	1BM
			1250			**3NA3682**		1	1 unit	1BM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	Mounting width	I_n	U_n	SD	Non-insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PG	SD	Insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	A	V AC/ V DC					d					
	LV HRC fuse links with combination alarm, operational class gG													
	000	21	2	690[1]/		**3NA7802-6**		1BM		**3NA6802-6**		1	3 units	1BM
			4	250		**3NA7804-6**		1BM		**3NA6804-6**		1	3 units	1BM
			6			**3NA7801-6**		1BM		**3NA6801-6**		1	3 units	1BM
			10			**3NA7803-6**		1BM		**3NA6803-6**		1	3 units	1BM
			16			**3NA7805-6**		1BM		**3NA6805-6**		1	3 units	1BM
			20			**3NA7807-6**		1BM		**3NA6807-6**		1	3 units	1BM
			25			**3NA7810-6**		1BM		**3NA6810-6**		1	3 units	1BM
			32			**3NA7812-6**		1BM		**3NA6812-6**		1	3 units	1BM
			35			**3NA7814-6**		1BM		**3NA6814-6**		1	3 units	1BM
			40			**3NA7817-6KJ**		1BM		**3NA6817-6KJ**		1	3 units	1BM
			50			**3NA7820-6KJ**		1BM		**3NA6820-6KJ**		1	3 units	1BM
	00	30	40	690[1]/		**3NA7817-6**		1BM		**3NA6817-6**		1	3 units	1BM
			50	250		**3NA7820-6**		1BM		**3NA6820-6**		1	3 units	1BM
			63			**3NA7822-6**		1BM		**3NA6822-6**		1	3 units	1BM
			80			**3NA7824-6**		1BM		**3NA6824-6**		1	3 units	1BM
			100			**3NA7830-6**		1BM		**3NA6830-6**		1	3 units	1BM
	1	30	50	690[1]/		**3NA7120-6**		1BM		**3NA6120-6**		1	3 units	1BM
			63	440		**3NA7122-6**		1BM		**3NA6122-6**		1	3 units	1BM
			80			**3NA7124-6**		1BM		**3NA6124-6**		1	3 units	1BM
			100			**3NA7130-6**		1BM		**3NA6130-6**		1	3 units	1BM
			125			**3NA7132-6**		1BM		**3NA6132-6**		1	3 units	1BM
			160			**3NA7136-6**		1BM		**3NA6136-6**		1	3 units	1BM
		47.2	200			**3NA7140-6**		1BM		**3NA6140-6**		1	3 units	1BM
	2	47.2	80	690[1]/		**3NA7224-6**		1BM		**3NA6224-6**		1	3 units	1BM
			100	440		**3NA7230-6**		1BM		**3NA6230-6**		1	3 units	1BM
			125			**3NA7232-6**		1BM		**3NA6232-6**		1	3 units	1BM
			160			**3NA7236-6**		1BM		**3NA6236-6**		1	3 units	1BM
			200			**3NA7240-6**		1BM		**3NA6240-6**		1	3 units	1BM
		57.8	224			**3NA7242-6**		1BM		**3NA6242-6**		1	3 units	1BM
			250			**3NA7244-6**		1BM		**3NA6244-6**		1	3 units	1BM
			300			**3NA7250-6**		1BM		**3NA6250-6**		1	3 units	1BM
			315			**3NA7252-6**		1BM		**3NA6252-6**		1	3 units	1BM

[1] Manufacturer's confirmation for 690 V +10% rated voltage available on request.

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LV HRC fuse links

	Size	Mounting width	I_n	U_n	SD	Non-insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	A	V AC/V DC	d					
	LV HRC fuse links with front indicator, operational class gG									
	000	21	2	690[1]/250		**3NA3802-6**		1	3 units	1BM
			4			**3NA3804-6**		1	3 units	1BM
			6			**3NA3801-6**		1	3 units	1BM
			10			**3NA3803-6**		1	3 units	1BM
			16			**3NA3805-6**		1	3 units	1BM
			20			**3NA3807-6**		1	3 units	1BM
			25			**3NA3810-6**		1	3 units	1BM
			32			**3NA3812-6**		1	3 units	1BM
			35			**3NA3814-6**		1	3 units	1BM
			40			**3NA3817-6KJ**		1	3 units	1BM
			50			**3NA3820-6KJ**		1	3 units	1BM
	00	30	40	690[1]/250		**3NA3817-6**		1	3 units	1BM
			50			**3NA3820-6**		1	3 units	1BM
			63			**3NA3822-6**		1	3 units	1BM
			80			**3NA3824-6**		1	3 units	1BM
			100			**3NA3830-6**		1	3 units	1BM
	1	30	50	690[1]/440		**3NA3120-6**		1	3 units	1BM
			63			**3NA3122-6**		1	3 units	1BM
			80			**3NA3124-6**		1	3 units	1BM
			100			**3NA3130-6**		1	3 units	1BM
			125			**3NA3132-6**		1	3 units	1BM
			160			**3NA3136-6**		1	3 units	1BM
		47.2	200			**3NA3140-6**		1	3 units	1BM
	2	47.2	80	690[1]/440		**3NA3224-6**		1	3 units	1BM
			100			**3NA3230-6**		1	3 units	1BM
			125			**3NA3232-6**		1	3 units	1BM
			160			**3NA3236-6**		1	3 units	1BM
			200			**3NA3240-6**		1	3 units	1BM
		57.8	224			**3NA3242-6**		1	3 units	1BM
			250			**3NA3244-6**		1	3 units	1BM
			300			**3NA3250-6**		1	3 units	1BM
			315			**3NA3252-6**		1	3 units	1BM
	3	57.8	250	690[1]/440		**3NA3344-6**		1	3 units	1BM
			315			**3NA3352-6**		1	3 units	1BM
		71.2	355			**3NA3354-6**		1	3 units	1BM
			400			**3NA3360-6**		1	3 units	1BM
			425			**3NA3362-6**		1	3 units	1BM
			500			**3NA3365-6**		1	3 units	1BM

[1] Manufacturer's confirmation for 690 V +10% rated voltage available on request.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	Mounting width	I_n	U_n	SD	Non-insulated grip lugs Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	A	V AC/V DC	d					
	LV HRC fuse links with front indicator, operational class aM									
	000	21	6	500/--		**3ND1801**		1	3 units	1BM
			10			**3ND1803**		1	3 units	1BM
			16			**3ND1805**		1	3 units	1BM
			20			**3ND1807**		1	3 units	1BM
			25			**3ND1810**		1	3 units	1BM
			32			**3ND1812**		1	3 units	1BM
			35			**3ND1814**		1	3 units	1BM
			40			**3ND1817**		1	3 units	1BM
			50			**3ND1820**		1	3 units	1BM
			63			**3ND1822**		1	3 units	1BM
			80			**3ND1824**		1	3 units	1BM
			100			**3ND1830-8**		1	3 units	1BM
	00	30	100	500/--		**3ND1830**		1	3 units	1BM
			125			**3ND1832**		1	3 units	1BM
			160			**3ND1836**		1	3 units	1BM
	1	30	63	690/--		**3ND2122**		1	3 units	1BM
			80			**3ND2124**		1	3 units	1BM
			100			**3ND2130**		1	3 units	1BM
		47.2	125			**3ND2132**		1	3 units	1BM
			160			**3ND2136**		1	3 units	1BM
			200			**3ND2140**		1	3 units	1BM
			250			**3ND2144**		1	3 units	1BM
	2	47.2	125	690/--		**3ND2232**		1	3 units	1BM
			160			**3ND2236**		1	3 units	1BM
			200			**3ND2240**		1	3 units	1BM
			250			**3ND2244**		1	3 units	1BM
		57.8	315			**3ND2252**		1	3 units	1BM
			355			**3ND2254**		1	3 units	1BM
			400			**3ND2260**		1	3 units	1BM
	3	57.8	315	690/--		**3ND2352**		1	3 units	1BM
			355			**3ND2354**		1	3 units	1BM
			400			**3ND2360**		1	3 units	1BM
		71.2	500			**3ND1365**		1	3 units	1BM
			630			**3ND1372**		1	3 units	1BM

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LV HRC signal detectors

Overview

LV HRC signal detectors are used for remotely indicating that the LV HRC fuse links have been tripped. Three different solutions are available:

- 3NX1021 signal detectors with signal detector link
  The LV HRC signal detectors with signal detector link support monitoring of LV HRC fuse links with non-insulated grip lugs of sizes 000 to 4 at 10 A or more. The signal detector link is connected in parallel to the LV HRC fuse link. In the event of a fault, the LV HRC fuse links are released simultaneously with the LV HRC fuse detector link. A trip pin switches a floating microswitch.
- 3NX1024 signal detector top
  The signal detector top can be used with LV HRC fuse links, sizes 000, 00, 1 and 2, which are equipped with non-insulated grip lugs and have a front indicator or combination alarm. It is simply plugged into the grip lugs.
- 5TT3170 fuse monitor
  If a fuse is tripped, the front indicator springs open and switches a floating microswitch. This solution should not be used for safety-relevant systems. For this purpose, we recommend our electronic fuse monitors.

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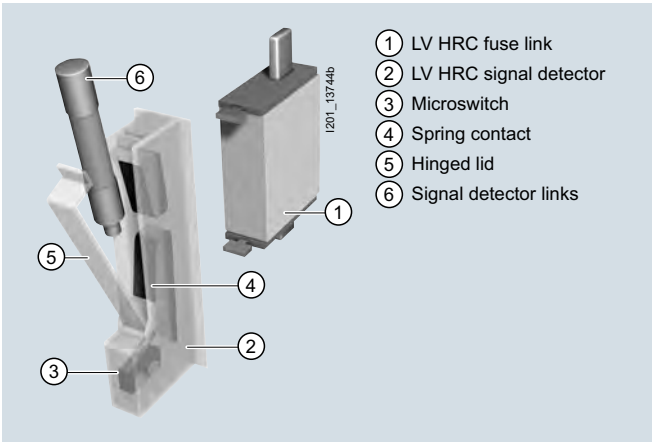
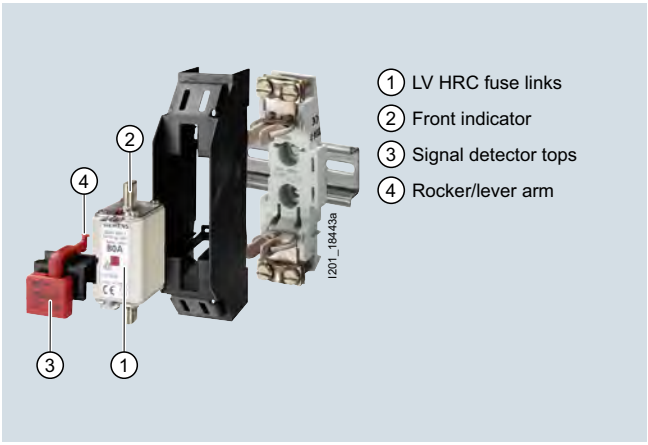
Benefits

Uniform solution for all sizes

LV HRC signal detectors reliably indicate when a fuse has tripped. Tripped fuses are quickly located. This saves time and increases system availability.

The LV HRC signal detector top is a cost-effective solution for the monitoring of Siemens LV HRC fuse links of sizes 000, 00, 1 and 2.





Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

		Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
	**LV HRC signal detectors** Only for SIEMENS 3NA3, 3NA7, 3ND LV HRC fuse links with non-insulated grip lugs • Rated voltage up to 690 V AC/600 V DC • Contact: Microswitches 250 V AC, 6 A • Connection: Flat termination 2.3 mm	000 ... 4		**3NX1021**		1	1 unit	1BM
	**Signal detector links** • Rated voltage up to 690 V AC/600 V DC							
	Response value > 9 V; 2.5 A; for standard applications	000 ... 4		**3NX1022**		1	3 units	1BM
	Response value > 2 V; 7 A; only for meshed networks			**3NX1023**		1	3 units	1BM
	**Signal detector tops** Only for SIEMENS 3NA3, 3NA7, 3ND LV HRC fuse links with non-insulated grip lugs • Rated voltage up to 690 V AC/600 V DC • Contact: Microswitch 230 V AC, 5 A, 1 CO • Connection: Flat termination 2.3 mm	000, 00, 1, 2		**3NX1024**		1	1 unit	1BM

	U_e	I_n	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V AC	A	V	MW	d					
	**Fuse monitors** For all low-voltage fuse systems. Can be used in asymmetric systems afflicted with harmonics and regenerative feedback motors. Signal also for disconnected loads.									
	230	4	380 ... 415 3 AC	2	▶	**5TT3170**		1	1 unit	1BK
	**Electronic fuse monitoring for remote display of tripped fuses: 3KF9010-1AA00** see chapter "Switch Disconnectors".									

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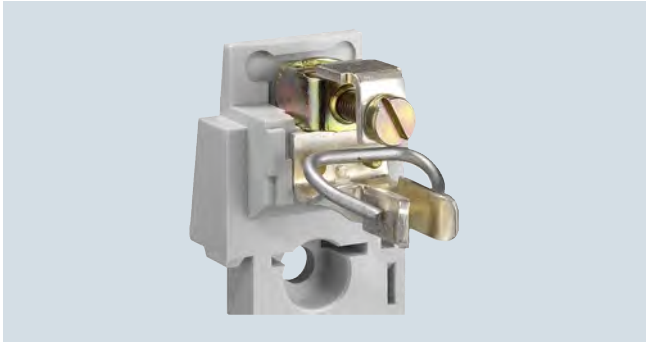
Overview

Terminals for all applications



Flat terminals with screws are suitable for connecting busbars or cable lugs. They have a torsion-proof screw connection with shim, spring washer and nut. When tightening the nut, always ensure compliance with the specified torque due to the considerable leverage effect.

The double busbar terminal differs from the flat terminal in that it supports connection of two busbars, one on the top and one at the bottom of the flat terminal.



The modern box terminal ensures efficient and reliable connection to the conductors. They support connection of conductors with or without end sleeves.



The plug-in terminal is equipped for connecting two conductors.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits



- The silver-plated Lyra contact provides a large contact area for the pin of the LV HRC fuse link. This improves heat transmission and lowers the temperature. It also minimizes ageing of the fuse link in the maximum load range, in particular when using SITOR semiconductor fuses
- The large contact area also facilitates replacement of LV HRC fuse links
- The spring washer tensioning the contact is mechanically galvanized. This will prevent hydrogen embrittlement. The contact is resistant to aging and there will be no dreaded annealing of contacts, which considerably improves operating safety

Technical specifications

		LV HRC fuse bases, LV HRC bus-mounting bases					
Size		**000/00**	**0**	**1**	**2**	**3**	**4**
Standards		IEC 60269-1, -2; EN 60269-1; DIN VDE 0636-2, UL 4248-1 (only downstream from the branch protection)					
Approvals		KEMA, UL File No: E171267-IZLT2					
Rated current I_n	A	160	160	250	400	630	1250
Rated voltage U_n	V AC	690[1)]	690[1)]				690
	V DC	250	440				440
Rated short-circuit strength	kA AC	120					
	kA DC	25					
Max. power dissipation of fuse links	W	12	25	32	45	60	90
Flat terminal							
Screw		M8		M10		M12	
Nut		M8	--				
Max. tightening torque	Nm	14		38			65
Plug-in terminal							
Conductor cross-section	mm^2	2.5 ... 50		--			
Saddle-type terminal							
Conductor cross-section	mm^2	6 ... 70	--				
Box terminal							
Conductor cross-section	mm^2	2.5 ... 50					
Terminal strips							
Conductor cross-section, 3-wire	mm^2	1.5 ... 16	--				
Max. torque for attachment of LV HRC fuse base	Nm	2		2.5			--

[1)] Extended rated voltage up to 1000 V (except LV HRC bus-mounting bases).

		LV HRC fuse bases with swivel mechanism			
Size		**000/00**	**1**	**3**	**4a**
Rated voltage U_n	V AC	690			
	V DC	440			
Max. power dissipation of fuse links	W	12	32	48	110
Flat terminal					
Screw		M8	M10	M12	M16
Nut		M8	--		
Max. tightening torque	Nm	14	38		65

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Selection and ordering data

	Size	I_n	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A		d					
	LV HRC fuse bases								
	Made of molded plastic, for standard rail mounting or screw fixing								
	**000/00**		1P						
		160	With flat terminals, screw		**3NH3051**		1	1 unit	1BM
		125	With box terminals, up to 50 mm^2		**3NH3053**		1	1 unit	1BM
	Made of ceramic for screw fixing								
	000/00	160	1P						
			With flat terminals, screw		**3NH3030**		1	3 units	1BM
			With plug-in terminals		**3NH3031**		1	3 units	1BM
			With saddle-type terminals		**3NH3032**		1	3 units	1BM
			3P (incl. two partitions)						
			With flat terminals		**3NH4030**		1	1 unit	1BM
			With saddle-type terminals		**3NH4032**		1	1 unit	1BM
	Made of ceramic for screw fixing								
	0	160	1P						
			With flat terminals		**3NH3120**		1	3 units	1BM
	Made of ceramic for screw fixing								
	1	250	1P						
			With flat terminals		**3NH3230**		1	3 units	1BM
			With double busbar terminals		**3NH3220**		1	3 units	1BM
	Ceramic supports on base plate for screw fixing								
	1	250	3P (incl. two partitions)						
			With flat terminals		**3NH4230**		1	1 unit	1BM
	Made of ceramic for screw fixing								
	2	400	1P						
			With flat terminals		**3NH3330**		1	1 unit	1BM
			With double busbar terminals		**3NH3320**		1	1 unit	1BM
	Made of ceramic for screw fixing								
	3	630	1P						
			With flat terminals		**3NH3430**		1	1 unit	1BM
			With double busbar terminals		**3NH3420**		1	1 unit	1BM

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	I_n	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A		d					
	LV HRC fuse bases								
	Ceramic supports on base plate for screw fixing (IEC design)								
	4	1250	1P With flat terminals		**3NH3530**		1	1 unit	1BM
	LV HRC fuse bases with swivel mechanism With flat terminals[1)]								
	**000/00**	160	1P						
			With screw fixing for mounting plate		**3NH7030**		1	1 unit	1BM
	1	250	1P						
			With screw fixing for mounting plate		**3NH7230**		1	1 unit	1BM
	Can also be used for fuse links of size 2								
	3	630	1P						
			With screw fixing for mounting plate		**3NH7330**		1	1 unit	1BM

1) Size 000/00 with additionally enclosed saddle-type terminals

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LV HRC fuse bases and accessories

	Size	I_n	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A		d					
	LV HRC fuse bases with swivel mechanism								
	**4a**	1250	1P With screw fixing for mounting plate		**3NH7520**		1	1 unit	1BM
	LV HRC protective covers for LV HRC fuse bases								
	As touch protection for contact pieces								
	000/00				**3NX3105**		1	2 units	1BM
	0				**3NX3114**		1	2 units	1BM
	1				**3NX3106**		1	2 units	1BM
	2				**3NX3107**		1	2 units	1BM
	3				**3NX3108**		1	2 units	1BM
	LV HRC partitions for LV HRC fuse bases								
	As intermediate phase and end barrier								
			Type						
	000/00		3NH30/3NH40		**3NX2023**		1	2 units	1BM
	0		3NH31		**3NX2030**		1	2 units	1BM
	1		3NH32		**3NX2024**		1	2 units	1BM
	2		3NH33		**3NX2025**		1	2 units	1BM
	3		3NH34		**3NX2026**		1	2 units	1BM
	LV HRC protective covers								
	**000/00**		1P and 3P		**3NX3115**		1	10 units	1BM
	**000/00**		When using fuse links with non-insulated grip lugs		**3NX3116**		1	10 units	1BM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**Fuse base covers**							
	For LV HRC fuse bases, red, with inscription "Isolating point"							
	000/00			**3NX1003**		1	3 units	1BM
	1[1], **2, 3**			**3NX1004**		1	3 units	1BM
	[1] Note: Restriction: Observe width 60 mm of the blank insert when using for LV HRC fuse bases or LV HRC fuse switching devices of size 1!							
	**Fuse pullers**							
	000 to 3	For LV HRC fuse links						
		Without sleeve		**3NX1013**		1	1 unit	1BM
		With sleeve		**3NX1014**		1	1 unit	1BM
								
	**Isolating blades** **For LV HRC fuse bases and fuse switch disconnectors**							
	With insulated grip lugs							
	000/00	Silver-plated		**3NG1002**		1	3 units	1BM
	0			**3NG1102**		1	1 unit	1BM
	1			**3NG1202**		1	1 unit	1BM
	2			**3NG1302**		1	1 unit	1BM
	3			**3NG1402**		1	1 unit	1BM
	With non-insulated grip lugs							
	4	Tinned		**3NG1503**		1	3 units	1BM
	4a	Nickel-plated		**3NG1505**		1	1 unit	1BM

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LV HRC fuse bases and accessories

SITOR semiconductor fuses for 3NH bases: Assignment table

3NH bases are generally suitable for all LV HRC type fuses. LV HRC type fuses for SITOR semiconductor protection can also be used, although it must be noted that, compared to cable and line protection fuses, these get much hotter during operation. The following table contains the permissible load currents of the SITOR semiconductor fuses for installation in 3NH.

For installation in a base, it may therefore be necessary to operate the fuse under I_n (derating).

The values were determined using the conductor cross-sections specified in the table. If using smaller cross-sections, a considerably higher derating is required due to the lower heat dissipation.

SITOR semiconductor fuse data						**Permissible load currents of fuse when installed in: 3NH**		
Type[1]	Rated current I_n	Rated voltage U_n	Operational class	Size	Required conductor cross-section	Type	Size	Permissible load current[2]
--	A	V AC	--	--	mm² Cu	--	--	A
3NC2423-0C/3C	150	500	gR	3	70	3NH3430/20	3	150
3NC2425-0C/3C	200	500	gR	3	95	3NH3430/20	3	190
3NC2427-0C/3C	250	500	gR	3	120	3NH3430/20	3	240
3NC2428-0C/3C	300	500	gR	3	185	3NH3430/20	3	285
3NC2431-0C/3C	350	500	gR	3	240	3NH3430/20	3	330
3NC2432-0C/3C	400	500	aR	3	240	3NH3430/20	3	400
3NC3336-1U	630	1000	aR	3	2 x (40 x 5)	3NH3430/20	3	560
3NC3337-1U	710	1000	aR	3	2 x (50 x 5)	3NH3430/20	3	600
3NC3338-1U	800	1000	aR	3	2 x (40 x 8)	3NH3430/20	3	660
3NC3340-1U	900	1000	aR	3	2 x (40 x 8)	3NH3430/20	3	750
3NC3341-1U	1000	1000	aR	3	2 x (50 x 8)	3NH3430/20	3	850
3NC3342-1U	1100	800	aR	3	2 x (50 x 8)	3NH3430/20	3	900
3NC3343-1U	1250	800	aR	3	2 x (50 x 8)	3NH3430/20	3	950
3NC3430-1U	315	1250	aR	3	2 x 95	3NH3430/20	3	310
3NC3432-1U	400	1250	aR	3	2 x 120	3NH3430/20	3	390
3NC3434-1U	500	1250	aR	3	2 x 150	3NH3430/20	3	460
3NC3436-1U	630	1250	aR	3	2 x (40 x 5)	3NH3430/20	3	560
3NC3438-1U	800	1100	aR	3	2 x (40 x 8)	3NH3430/20	3	690
3NC8423-0C/3C	150	690	gR	3	70	3NH3430/20	3	135
3NC8425-0C/3C	200	690	gR	3	95	3NH3430/20	3	180
3NC8427-0C/3C	250	690	gR	3	120	3NH3430/20	3	250
3NC8431-0C/3C	350	690	gR	3	240	3NH3430/20	3	315
3NC8434-0C/3C	500	690	gR	3	2 x 150	3NH3430/20	3	450
3NC8444-3C	1000	600	aR	3	2 x (60 x 6)	3NH3430/20	3	800
3NE1020-2	80	690	gR	00	25	3NH3030/4030	00	80
3NE1021-0	100	690	gS	00	35	3NH3030/4030	00	100
3NE1021-2	100	690	gR	00	35	3NH3030/4030	00	100
3NE1022-0	125	690	gS	00	50	3NH3030/4030	00	125
3NE1022-2	125	690	gR	00	50	3NH3030/4030	00	125
3NE1224-0	160	690	gS	1	70	3NH3230/4230	1	160
3NE1224-2/-3	160	690	gR	1	70	3NH3230/4230	1	160
3NE1225-0	200	690	gS	1	95	3NH3230/4230	1	200
3NE1225-2/-3	200	690	gR	1	95	3NH3230/4230	1	200/190
3NE1227-0	250	690	gS	1	120	3NH3230/4230	1	250
3NE1227-2/-3	250	690	gR	1	120	3NH3230/4230	1	250/235
3NE1230-0	315	690	gS	1	2 x 70	3NH3330/20	2	315
3NE1230-2/-3	315	690	gR	1	2 x 70	3NH3330/20	2	315
3NE1331-0	350	690	gS	2	2 x 95	3NH3330/20	2	350
3NE1331-2/-3	350	690	gR	2	2 x 95	3NH3330/20	2	350
3NE1332-0	400	690	gS	2	2 x 95	3NH3330/20	2	400
3NE1332-2/-3	400	690	gR	2	2 x 95	3NH3330/20	2	400
3NE1333-0	450	690	gS	2	2 x 120	3NH3430/20	3	450
3NE1333-2/-3	450	690	gR	2	2 x 120	3NH3430/20	3	450
3NE1334-0	500	690	gS	2	2 x 120	3NH3430/20	3	500
3NE1334-2/-3	500	690	gR	2	2 x 120	3NH3430/20	3	500
3NE1435-0	560	690	gS	3	2 x 150	3NH3430/20	3	560
3NE1435-2/-3	560	690	gR	3	2 x 150	3NH3430/20	3	560
3NE1436-0	630	690	gS	3	2 x 185	3NH3430/20	3	630
3NE1436-2/-3	630	690	gR	3	2 x 185	3NH3430/20	3	630
3NE1437-0	710	690	gS	3	2 x (40 x 5)	3NH3430/20	3	710
3NE1437-1	710	600	gR	3	2 x (40 x 5)	3NH3430/20	3	690
3NE1437-2/-3	710	690	gR	3	2 x (40 x 5)	3NH3430/20	3	710
3NE1438-0	800	690	gS	3	2 x (50 x 5)	3NH3430/20	3	800
3NE1438-1	800	600	gR	3	2 x (50 x 5)	3NH3430/20	3	750
3NE1438-2/-3	800	690	gR	3	2 x (50 x 5)	3NH3430/20	3	800
3NE1447-2/-3	670	690	gR	3	2 x (40 x 5)	3NH3430/20	3	670
3NE1448-2/-3	850	690	gR	3	2 x (40 x 8)	3NH3430/20	3	850
3NE1802-0	40	690	gS	000	10	3NH3030/4030	00	40
3NE1803-0	35	690	gS	000	6	3NH3030/4030	00	35
3NE1813-0	16	690	gS	000	1.5	3NH3030/4030	00	16
3NE1814-0	20	690	gS	000	2.5	3NH3030/4030	00	20

[1] For permissible load currents for 3NE8…-0MK, see Configuration Manual "Fuse Systems" or on request.

[2] In the case of cyclic loads, the currents may have to be further reduced (precise values on request).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SITOR semiconductor fuse data						**Permissible load currents of fuse when installed in: 3NH**		
Type[1]	Rated current I_n	Rated voltage U_n	Operational class	Size	Required conductor cross-section	Type	Size	Permissible load current[2]
--	A	V AC	--	--	mm² Cu	--	--	A
3NE1815-0	25	690	gS	000	4	3NH3030/4030	00	25
3NE1817-0	50	690	gS	000	10	3NH3030/4030	00	50
3NE1818-0	63	690	gS	000	16	3NH3030/4030	00	63
3NE1820-0	80	690	gS	000	25	3NH3030/4030	00	80
3NE3221	100	1000	aR	1	35	3NH3230/4230	1	100
3NE3222	125	1000	aR	1	50	3NH3230/4230	1	125
3NE3224	160	1000	aR	1	70	3NH3230/4230	1	160
3NE3225	200	1000	aR	1	95	3NH3230/4230	1	200
3NE3227	250	1000	aR	1	120	3NH3230/4230	1	250
3NE3230-0B	315	1000	aR	1	185	3NH3330/20	2	305
3NE3231	350	1000	aR	1	240	3NH3330/20	2	335
3NE3232-0B	400	1000	aR	1	240	3NH3330/20	2	380
3NE3233	450	1000	aR	1	2 x 150	3NH3330/20	2	425
3NE3332-0B	400	1000	aR	2	240	3NH3430/20	3	400
3NE3333	450	1000	aR	2	2 x 150	3NH3430/20	3	450
3NE3334-0B	500	1000	aR	2	2 x 150	3NH3430/20	3	500
3NE3335	560	1000	aR	2	2 x 185	3NH3430/20	3	560
3NE3336	630	1000	aR	2	2 x 185	3NH3430/20	3	630
3NE3337-8	710	900	aR	2	2 x (40 x 5)	3NH3430/20	3	680
3NE3338-8	800	800	aR	2	2 x 240	3NH3430/20	3	700
3NE3340-8	900	690	aR	2	2 x (40 x 8)	3NH3430/20	3	750
3NE4101	32	1000	gR	0	6	3NH3120/4230	0/1	32
3NE4102	40	1000	gR	0	10	3NH3120/4230	0/1	40
3NE4117	50	1000	gR	0	10	3NH3120/4230	0/1	50
3NE4118	63	1000	aR	0	16	3NH3120/4230	0/1	63
3NE4120	80	1000	aR	0	25	3NH3120/4230	0/1	80
3NE4121	100	1000	aR	0	35	3NH3120/4230	0/1	100
3NE4122	125	1000	aR	0	50	3NH3120/4230	0/1	125
3NE4124	160	1000	aR	0	70	3NH3120/4230	0/1	160
3NE4327-0B	250	800	aR	2	150	3NH3330/20	2	240
3NE4330-0B	315	800	aR	2	240	3NH3330/20	2	300
3NE4333-0B	450	800	aR	2	2 x (30 x 5)	3NH3430/20	3	425
3NE4334-0B	500	800	aR	2	2 x (30 x 5)	3NH3430/20	3	475
3NE4337	710	800	aR	2	2 x (50 x 5)	3NH3430/20	3	630
3NE8015-1	25	690	gR	00	4	3NH3030/4030	00	25
3NE8003-1	35	690	gR	00	6	3NH3030/4030	00	35
3NE8017-1	50	690	gR	00	10	3NH3030/4030	00	50
3NE8018-1	63	690	gR	00	16	3NH3030/4030	00	63
3NE8020-1	80	690	aR	00	25	3NH3030/4030	00	80
3NE8021-1	100	690	aR	00	35	3NH3030/4030	00	100
3NE8022-1	125	690	aR	00	50	3NH3030/4030	00	125
3NE8024-1	160	690	aR	00	70	3NH3030/4030	00	160

[1] For permissible load currents for 3NE8…-0MK, see Configuration Manual "Fuse Systems" or on request.

[2] In the case of cyclic loads, the currents may have to be further reduced (precise values on request).

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Overview

SITOR semiconductor fuses protect power semiconductors from the effects of short circuits because the super-quick-acting disconnect characteristic is far quicker than with conventional LV HRC fuses. They protect high-quality devices and system components, such as converters with fuses in the input and the DC link, UPS systems and soft starters for motors.

Panel mounting requirements have given rise to various connection versions and designs.

The fuses with blade contacts comply with IEC 60269-2 and are suitable for installation in 3NH LV HRC fuse bases, in LV HRC fuse switch disconnectors and switch disconnectors with fuses. They also include fuses with slotted blade contacts for screw fixing with 110 mm mounting dimension, whose sizes are according to IEC 60269-4.

Fuses with slotted blade contacts for screw fixing with 80 mm or 110 mm mounting dimension are often screwed directly onto busbars for optimum heat dissipation. Even better heat transmission is provided by the compact fuses with M10 or M12 female thread, which are also mounted directly onto busbars.

Bolt-on links with 80 mm mounting dimension are another panel-mounting version for direct busbar mounting.

The fuses for SITOR thyristor sets, railway rectifiers or electrolysis systems were developed specially for these applications.

3NH LV HRC fuse bases suitable for use with SITOR semiconductor fuses and fuse switching devices can also be found in this chapter, see page 5/48 ff.

Fuse characteristics, configuration notes and the assignments of SITOR semiconductor fuses to the fuse bases and 3NP fuse switch disconnectors and 3KL switch disconnectors with fuses can be found in the Configuration Manual, "Fuse Systems" at: www.siemens.com/lowvoltage/manuals.

The new size 3 type ranges have a round ceramic body instead of a square one. These series are characterized by small I^2t values with low power dissipation and high capability under alternating load. The dimensions and functional values correspond to the current standards IEC 60269-4/EN 60269-4 (VDE 0636-4).

Note:

The ordering data of the fuses are listed in ascending order of the rated voltage in the selection tables.

Benefits

- SITOR semiconductor fuses have a high varying load factor, which ensures a high level of operational safety and plant availability – even when subject to constant load change
- The use of SITOR semiconductor fuses in 3NH LV HRC fuse bases or Siemens switch disconnectors has been tested with regard to heat dissipation and maximum current loading. This makes planning and dimensioning easier and prevents consequential damage
- Our high standard of quality ensures good compliance with the characteristic curve and accuracy. This ensures long-term protection of devices

Operational classes

Fuses are categorized according to function and operational classes. SITOR semiconductor fuses, in LV HRC design, are available in the following operational classes:

- aR: for the short-circuit protection of power semiconductors (partial range protection)
- gR: for the protection of power semiconductors (full range protection)
- gS: The gS operational class combines cable and line protection with semiconductor protection (full range protection)

Parallel-connected fuses

Parallel-connected fuses offer maximum current and energy limiting that is clearly better than in the case of comparable single fuses. They also fulfill the special requirements for UL-certified fuses according to which fuses must be connected in parallel at the factory. Here is the original wording of the NEC document: *240.8 Fuses and circuit breakers shall be permitted to be connected in parallel where they are factory assembled in parallel and listed as a unit. Individual fuses, circuit breakers, or combinations thereof shall not otherwise be connected in parallel.*

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	I_n	U_n	Operational class	Breaking value I^2t	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC/ V DC		A^2s	W		d					
	LV HRC design												
	With slotted blade contacts with 2 oblong slots for M10 screw fixing, mounting dimension: 110 mm, or for installation in 3NA3 LV HRC fuse bases or switch disconnectors												
	3	150	500	gR	33000	35	0.85		**3NC2423-0C**		1	3 units	1DM
		200			64000	40	0.85		**3NC2425-0C**		1	3 units	1DM
		250			99000	50	0.85		**3NC2427-0C**		1	3 units	1DM
		300			132000	65	0.85		**3NC2428-0C**		1	3 units	1DM
		350			249000	60	0.85		**3NC2431-0C**		1	3 units	1DM
		400		aR	390000	50	0.85		**3NC2432-0C**		1	3 units	1DM
	With slotted blade contacts for M10 screw fixing, mounting dimension: 110 mm, or for installation in 3NA3 LV HRC fuse bases or switch disconnectors												
	3	150	500	gR	33000	35	0.85		**3NC2423-3C**		1	3 units	1DM
		200			64000	40	0.85		**3NC2425-3C**		1	3 units	1DM
		250			99000	50	0.85		**3NC2427-3C**		1	3 units	1DM
		300			132000	65	0.85		**3NC2428-3C**		1	3 units	1DM
		350			249000	60	0.85		**3NC2431-3C**		1	3 units	1DM
		400		aR	390000	50	0.85		**3NC2432-3C**		1	3 units	1DM
	1	160	690	gR	18600	32	1.0		**3NE1224-3**		1	3 units	1DM
		200			51 800	35	1.0		**3NE1225-3**		1	3 units	1DM
		250			80 900	37	1.0		**3NE1227-3**		1	3 units	1DM
		315			168 000	40	1.0		**3NE1230-3**		1	3 units	1DM
	2	350	690	gR	177000	43	1.0		**3NE1331-3**		1	3 units	1DM
		400			224000	50	1.0		**3NE1332-3**		1	3 units	1DM
		450			276500	58	1.0		**3NE1333-3**		1	3 units	1DM
		500			398000	64	1.0		**3NE1334-3**		1	3 units	1DM
	3	150	690	gR	17600	40	0.85		**3NC8423-3C**		1	3 units	1DM
		200			38400	55	0.85		**3NC8425-3C**		1	3 units	1DM
		250			70400	72	0.85		**3NC8427-3C**		1	3 units	1DM
		350			176000	95	0.85		**3NC8431-3C**		1	3 units	1DM
		500			448000	130	0.85		**3NC8434-3C**		1	3 units	1DM
		1000	600	aR	2480000	140	0.95		**3NC8444-3C**		1	3 units	1DM
	With slotted blade contacts for M12 screw fixing, mounting dimension: 110 mm, or for installation in 3NA3 LV HRC fuse bases or switch disconnectors												
	3	560	690	gR	890000	60	1.0		**3NE1435-3**		1	3 units	1DM
		630			1390000	60	1.0		**3NE1436-3**		1	3 units	1DM
		670			1640000	64	1.0		**3NE1447-3**		1	3 units	1DM
		710			1818000	72	1.0		**3NE1437-3**		1	3 units	1DM
		800			2475000	84	1.0		**3NE1438-3**		1	3 units	1DM
		850			3640000	76	1.0		**3NE1448-3**		1	3 units	1DM
	With M8 bolt-on links, mounting dimension: 80 mm, for screwing onto busbars or onto 3NH5423 fuse base												
	1	100	690/ 440	aR	3200	25	On req.		**3NE8221-3MK**		1	3 units	1DM
		125			6000	28	On req.		**3NE8222-3MK**		1	3 units	1DM
		160			10500	35	On req.		**3NE8224-3MK**		1	3 units	1DM
		200			17500	42	On req.		**3NE8225-3MK**		1	3 units	1DM
		250			28500	53.5	On req.		**3NE8227-3MK**		1	3 units	1DM
		315			53500	61	On req.		**3NE8230-3MK**		1	3 units	1DM
		350			66000	69	On req.		**3NE8231-3MK**		1	3 units	1DM
		400			110000	70.5	On req.		**3NE8232-3MK**		1	3 units	1DM
		450			180000	71	On req.		**3NE8233-3MK**		1	3 units	1DM
		500			215000	84	On req.		**3NE8234-3MK**		1	3 units	1DM
		550			290000	87	On req.		**3NE8235-3MK**		1	3 units	1DM
		630			440000	96	On req.		**3NE8236-3MK**		1	3 units	1DM

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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LV HRC design

	Size	I_n	U_n	Operational class	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC		A^2s	W		d					
	LV HRC design												
	With slotted blade contacts for M12 screw fixing, mounting dimension: 80 mm												
	3	630	690	aR	244000	120	0.85		**3NC3236-1U**		1	3 units	1DM
		710			346000	130	0.85		**3NC3237-1U**		1	3 units	1DM
		800			498000	135	0.9		**3NC3238-1U**		1	3 units	1DM
		900			677000	145	0.9		**3NC3240-1U**		1	3 units	1DM
		1 000			975000	155	0.95		**3NC3241-1U**		1	3 units	1DM
		1 100			1382000	165	0.95		**3NC3242-1U**		1	3 units	1DM
		1250			1990000	175	0.95		**3NC3243-1U**		1	3 units	1DM
		1 400	500		2100000	200	0.95		**3NC3244-1U**		1	3 units	1DM
		1 600			2860000	240	0.9		**3NC3245-1U**		1	3 units	1DM
	With slotted blade contacts with 2 oblong slots for M10 screw fixing, mounting dimension: 110 mm, or for installation in 3NA3 LV HRC fuse bases or switch disconnectors												
	3	150	690	gR	17600	40	0.85		**3NC8423-0C**		1	3 units	1DM
		200			38400	55	0.85		**3NC8425-0C**		1	3 units	1DM
		250			70400	72	0.85		**3NC8427-0C**		1	3 units	1DM
		350			176000	95	0.85		**3NC8431-0C**		1	3 units	1DM
		500			448000	130	0.85		**3NC8434-0C**		1	3 units	1DM
	With blade contacts for mounting in 3NA3 LV HRC fuse bases or switch disconnectors												
	3	710	600	gR	2460000	65	1.0		**3NE1437-1**		1	3 units	1DM
		800			3350000	72	1.0		**3NE1438-1**		1	3 units	1DM
	000	16	690	gS	200	4.0	1.0		**3NE1813-0**		1	3 units	1DM
		20			430	5.0	1.0		**3NE1814-0**		1	3 units	1DM
		25			780	5.0	1.0		**3NE1815-0**		1	3 units	1DM
		35			1700	3.5	1.0		**3NE1803-0**		1	3 units	1DM
		40			3000	3.0	1.0		**3NE1802-0**		1	3 units	1DM
		50			4400	6.0	1.0		**3NE1817-0**		1	3 units	1DM
		63			9000	7.0	1.0		**3NE1818-0**		1	3 units	1DM
		80			18000	8.0	1.0		**3NE1820-0**		1	3 units	1DM
	00	100	690	gS	33000	10	1.0		**3NE1021-0**		1	3 units	1DM
		125			63000	11	1.0		**3NE1022-0**		1	3 units	1DM
	1	160	690	gS	60000	24	1.0		**3NE1224-0**		1	3 units	1DM
		200			100000	27	1.0		**3NE1225-0**		1	3 units	1DM
		250			200000	30	1.0		**3NE1227-0**		1	3 units	1DM
		315			310000	38	1.0		**3NE1230-0**		1	3 units	1DM
	2	350	690	gS	430000	42	1.0		**3NE1331-0**		1	3 units	1DM
		400			590000	45	1.0		**3NE1332-0**		1	3 units	1DM
		450			750000	53	1.0		**3NE1333-0**		1	3 units	1DM
		500			950000	56	1.0		**3NE1334-0**		1	3 units	1DM
	3	560	690	gS	1700000	50	1.0		**3NE1435-0**		1	3 units	1DM
		630			2350000	55	1.0		**3NE1436-0**		1	3 units	1DM
		710			3400000	58	1.0		**3NE1437-0**		1	3 units	1DM
		800			5000000	58	1.0		**3NE1438-0**		1	3 units	1DM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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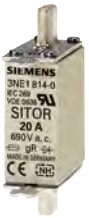
	Size	I_n	U_n	Operational class	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC/ V DC		A^2s	W		d					
	LV HRC design												
	With blade contacts for mounting in 3NH3 LV HRC fuse bases or switch disconnectors												
	000	6	690/ 440	gR	37	2.7	On req.		**3NE8810-0MK**		1	3 units	1DM
		10			50	4.5	On req.		**3NE8812-0MK**		1	3 units	1DM
		16			73	6.7	On req.		**3NE8813-0MK**		1	3 units	1DM
		20			90	8	On req.		**3NE8814-0MK**		1	3 units	1DM
		25			150	8.1	On req.		**3NE8815-0MK**		1	3 units	1DM
		32			350	10.5	On req.		**3NE8801-0MK**		1	3 units	1DM
		40			480	12	On req.		**3NE8802-0MK**		1	3 units	1DM
		50			1050	14.5	On req.		**3NE8817-0MK**		1	3 units	1DM
		63			1960	23	On req.		**3NE8818-0MK**		1	3 units	1DM
		80		aR	2200	23.3	On req.		**3NE8820-0MK**		1	3 units	1DM
		100			3650	27	On req.		**3NE8821-0MK**		1	3 units	1DM
		125			7800	30	On req.		**3NE8822-0MK**		1	3 units	1DM
		160	500/ 440		14000	34	On req.		**3NE8824-0MK**		1	3 units	1DM
	With blade contacts for mounting in 3NA3 LV HRC fuse bases or switch disconnectors												
	00	25	690	gR	180	7	0.95		**3NE8015-1**		1	3 units	1DM
		35			400	9	0.95		**3NE8003-1**		1	3 units	1DM
		50			700	14	0.90		**3NE8017-1**		1	3 units	1DM
		63			1400	16	0.95		**3NE8018-1**		1	3 units	1DM
		80			5800	10.5	1.0		**3NE1020-2**		1	3 units	1DM
		100			11000	12	1.0		**3NE1021-2**		1	3 units	1DM
		125			23000	13.5	1.0		**3NE1022-2**		1	3 units	1DM
		80		aR	2400	19	0.95		**3NE8020-1**		1	3 units	1DM
		100			4200	22	0.95		**3NE8021-1**		1	3 units	1DM
		125			6500	28	0.95		**3NE8022-1**		1	3 units	1DM
		160			13000	38	0.95		**3NE8024-1**		1	3 units	1DM
	1	100	690/ 440	aR	6050	25.5	On req.		**3NE8221-0MK**		1	3 units	1DM
		125			8900	28.5	On req.		**3NE8222-0MK**		1	3 units	1DM
		160			16200	37	On req.		**3NE8224-0MK**		1	3 units	1DM
		200			26000	49	On req.		**3NE8225-0MK**		1	3 units	1DM
		250			59000	52	On req.		**3NE8227-0MK**		1	3 units	1DM
		315			120000	68	On req.		**3NE8230-0MK**		1	3 units	1DM
		160	690	gR	18600	32	1.0		**3NE1224-2**		1	3 units	1DM
		200			51800	35	1.0		**3NE1225-2**		1	3 units	1DM
		250			80900	37	1.0		**3NE1227-2**		1	3 units	1DM
		315			168000	40	1.0		**3NE1230-2**		1	3 units	1DM
	2	350	690/ 440	aR	83500	68.6	On req.		**3NE8331-0MK**		1	3 units	1DM
		400			136000	72.8	On req.		**3NE8332-0MK**		1	3 units	1DM
		450			207000	80.1	On req.		**3NE8333-0MK**		1	3 units	1DM
		500			318000	77.5	On req.		**3NE8334-0MK**		1	3 units	1DM
		550			399000	86.4	On req.		**3NE8335-0MK**		1	3 units	1DM
		630			740000	90.7	On req.		**3NE8336-0MK**		1	3 units	1DM
		350	690	gR	177000	43	1.0		**3NE1331-2**		1	3 units	1DM
		400			224000	50	1.0		**3NE1332-2**		1	3 units	1DM
		450			276500	58	1.0		**3NE1333-2**		1	3 units	1DM
		500			398000	64	1.0		**3NE1334-2**		1	3 units	1DM
	3	560	690	gR	890000	60	1.0		**3NE1435-2**		1	3 units	1DM
		630			1390000	60	1.0		**3NE1436-2**		1	3 units	1DM
		670			1640000	64	1.0		**3NE1447-2**		1	3 units	1DM
		710			1818000	72	1.0		**3NE1437-2**		1	3 units	1DM
		800			2475000	84	1.0		**3NE1438-2**		1	3 units	1DM
		850			3640000	76	1.0		**3NE1448-2**		1	3 units	1DM
	0	32	1 000	gR	280	12	0.9		**3NE4101**		1	3 units	1DM
		40			500	13	0.9		**3NE4102**		1	3 units	1DM
		50			800	16	0.9		**3NE4117**		1	3 units	1DM
		63		aR	1500	20	0.9		**3NE4118**		1	3 units	1DM
		80			3000	22	0.9		**3NE4120**		1	3 units	1DM
		100			6000	24	0.9		**3NE4121**		1	3 units	1DM
		125			14000	30	0.9		**3NE4122**		1	3 units	1DM
		160			29000	35	0.9		**3NE4124**		1	3 units	1DM

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LV HRC design

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	Size	I_n	U_n	Operational classes	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC/ V DC		A^2s	W		d					
	LV HRC design												
	With M8 bolt-on links, mounting dimension: 80 mm, for screwing onto busbars												
	000	20	690/ 700[1]	gR	83	7	0.9		**3NE8714-1**		1	10 units	1DM
		25			140	9	0.9		**3NE8715-1**		1	10 units	1DM
		32			285	10	0.9		**3NE8701-1**		1	10 units	1DM
		40			490	12	0.9		**3NE8702-1**		1	10 units	1DM
		50			815	15	0.9		**3NE8717-1**		1	10 units	1DM
		63		aR	1550	16	0.95		**3NE8718-1**		1	10 units	1DM
		80			2700	18	0.9		**3NE8720-1**		1	10 units	1DM
		100			4950	19	0.95		**3NE8721-1**		1	10 units	1DM
		125			9100	23	0.95		**3NE8722-1**		1	10 units	1DM
		160			17000	31	0.9		**3NE8724-1**		1	10 units	1DM
		200			30000	36	0.9		**3NE8725-1**		1	10 units	1DM
		250			55000	42	0.9		**3NE8727-1**		1	10 units	1DM
		315			85500	54	0.85		**3NE8731-1**		1	10 units	1DM
	With M10 bolt-on links, mounting dimension: 80 mm, for screwing onto busbars or onto 3NH5323 fuse base												
	00	80	690/ 440	gR	3200	23.0	On req.		**3NE8020-3MK**		1	3 units	1DM
		100			5200	29.0	On req.		**3NE8021-3MK**		1	3 units	1DM
		350		aR	135000	58.8	On req.		**3NE8031-3MK**		1	3 units	1DM
		400			170000	74.5	On req.		**3NE8032-3MK**		1	3 units	1DM

[1] Observe DC voltage acc. to UL, time constants and minimum breaking current MBC (see "Technical specifications").

	Size	I_n	U_n	Operational classes	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC/ V DC		A^2s	W		d					
	LV HRC design												
	Parallel-connected fuses with slotted blade contacts for M12 screw fixing, mounting dimension: 110 mm (lateral 90 mm)												
	2 x 3	1000	690	gR	1400 000	138	1.0		**3NB3350-1KK26**		1	1 unit	1DM
		1100			3000 000	110			**3NB3351-1KK26**		1	1 unit	1DM
	2 x 3	1250			4100 000	104	1.0		**3NB3352-1KK26**		1	1 unit	1DM
		1350			4800 000	126			**3NB3354-1KK26**		1	1 unit	1DM
		1400			5200 000	127			**3NB3355-1KK26**		1	1 unit	1DM
	2 x 3	1600			6900 000	152	1.0		**3NB3357-1KK26**		1	1 unit	1DM
		1700			10000 000	143			**3NB3358-1KK26**		1	1 unit	1DM
	3 x 3	1700			6400000	179	1.0		**3NB3358-1KK27**		1	1 unit	1DM
		1900			8200 000	196			**3NB3362-1KK27**		1	1 unit	1DM
	With slotted blade contacts for M10 screw fixing, mounting dimension: 110 mm, or for installation in 3NA3 LV HRC fuse bases or switch disconnectors												
	2	250	800	aR	29700	105	0.85		**3NE4327-0B**		1	3 units	1DM
		315			60700	120	0.85		**3NE4330-0B**		1	3 units	1DM
		450			191000	140	0.85		**3NE4333-0B**		1	3 units	1DM
		500			276000	155	0.85		**3NE4334-0B**		1	3 units	1DM
		710			923000	155	0.95		**3NE4337**		1	3 units	1DM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Size	I_n	U_n	Operational classes	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	V AC/ V DC		A^2s	W		d					
With slotted blade contacts for screw fixing M10, 110 mm mounting dimension, or for installation in 3NH3 LV HRC fuse bases or fuse switch disconnectors or on 3NH5463 fuse base												
1	32[1]	1000/ 600	gR	4500	9	On req.		**3NE3201-0MK**		1	3 units	1DM
	40[1]			6000	13	On req.		**3NE3202-0MK**		1	3 units	1DM
	50[1]			8000	18	On req.		**3NE3217-0MK**		1	3 units	1DM
	63[1]			9000	25	On req.		**3NE3218-0MK**		1	3 units	1DM
	100	1000	aR	4800	28	0.95		**3NE3221**		1	3 units	1DM
	125			7200	36	0.95		**3NE3222**		1	3 units	1DM
	160			13000	42	1.0		**3NE3224**		1	3 units	1DM
	200			30000	42	1.0		**3NE3225**		1	3 units	1DM
	250			48000	50	1.0		**3NE3227**		1	3 units	1DM
	315			80000	60	0.95		**3NE3230-0B**		1	3 units	1DM
	350			100000	75	0.95		**3NE3231**		1	3 units	1DM
	400			135000	85	0.9		**3NE3232-0B**		1	3 units	1DM
	450			175000	95	0.9		**3NE3233**		1	3 units	1DM
	500[1]	1000/ 600		500000	105	On req.		**3NE3234-0MK08**		1	3 units	1DM
	550[1]			700000	110	On req.		**3NE3235-0MK08**		1	3 units	1DM
	630[1]			850000	127	On req.		**3NE3236-0MK08**		1	3 units	1DM
[1] No grip lugs and therefore not suitable for mounting in 3NH3 LV HRC fuse bases or switch disconnectors												
2	400	1000	aR	135000	80	1.0		**3NE3332-0B**		1	3 units	1DM
	450			175000	90	1.0		**3NE3333**		1	3 units	1DM
	500			260000	90	1.0		**3NE3334-0B**		1	3 units	1DM
	560			360000	95	1.0		**3NE3335**		1	3 units	1DM
	630			600000	100	1.0		**3NE3336**		1	3 units	1DM
	710	900	aR	800000	105	1.0		**3NE3337-8**		1	3 units	1DM
	800	800		850000	130	0.95		**3NE3338-8**		1	3 units	1DM
	900	690		920000	165	0.95		**3NE3340-8**		1	3 units	1DM
With slotted blade contacts for M10 screw fixing, mounting dimension: 130 mm												
3	100	1000	aR	13500	25	1.0		**3NE3421-0C**		1	3 units	1DM
	224			54000	85	1.0		**3NE3626-0C**		1	3 units	1DM
	315			218000	80	1.0		**3NE3430-0C**		1	3 units	1DM
	400			364000	110	1.0		**3NE3432-0C**		1	3 units	1DM
	450			488000	110	1.0		**3NE3635-0C**		1	3 units	1DM
	500			870000	95	1.0		**3NE3434-0C**		1	3 units	1DM
	630			1280000	132	1.0		**3NE3636-0C**		1	3 units	1DM
	710			1950000	145	1.0		**3NE3637-0C**		1	3 units	1DM
With slotted blade contacts for M12 screw fixing, mounting dimension: 140 mm												
3	710	1000	aR	1950000	145	1.0		**3NE3637-1C**		1	3 units	1DM
With slotted blade contacts for M12 screw fixing, mounting dimension: 110 mm, or for installation in 3NA3 LV HRC fuse bases or switch disconnectors												
3	630	1000	aR	418000	145	0.85		**3NC3336-1U**		1	3 units	1DM
	710			569000	150	0.85		**3NC3337-1U**		1	3 units	1DM
	800			819000	155	0.85		**3NC3338-1U**		1	3 units	1DM
	900			1160000	165	0.9		**3NC3340-1U**		1	3 units	1DM
	1000			1670000	170	0.9		**3NC3341-1U**		1	3 units	1DM
	1100	800		1910000	185	0.9		**3NC3342-1U**		1	3 units	1DM
	1250			2600000	210	0.9		**3NC3343-1U**		1	3 units	1DM
3	315	1250	aR	72500	80	0.95		**3NC3430-1U**		1	3 units	1DM
	400			163000	95	0.95		**3NC3432-1U**		1	3 units	1DM
	500			290000	115	0.90		**3NC3434-1U**		1	3 units	1DM
	630			650000	120	0.95		**3NC3436-1U**		1	3 units	1DM
	800	1100		985000	145	0.90		**3NC3438-1U**		1	3 units	1DM

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LV HRC design

	Size	I_n	U_n	Operational class	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC/ V DC		A^2s	W		d					
	LV HRC design												
	With slotted blade contacts for M10 screw fixing, mounting dimension: 210 mm												
	3	160	1 500	aR	54000	56	1.0		**3NE5424-0C**		1	2 units	1DM
		224			138000	80	1.0		**3NE5426-0C**		1	2 units	1DM
		315			311000	115	1.0		**3NE5430-0C**		1	2 units	1DM
		350			428000	135	1.0		**3NE5431-0C**		1	2 units	1DM
		450			870000	145	0.95		**3NE5433-0C**		1	2 units	1DM
	With slotted blade contacts for M12 screw fixing, mounting dimension: 210 mm												
		450	1500	aR	870000	145	0.95		**3NE5433-1C**		1	2 units	1DM
	With slotted blade contacts for M10 screw fixing, mounting dimension: 170 mm												
	3	250	1500	aR	84000	130	1.0		**3NE5627-0C**		1	3 units	1DM
		450			590000	160	1.0		**3NE5633-0C**		1	3 units	1DM
		600			1950000	145	1.0		**3NE5643-0C**		1	3 units	1DM
	With slotted blade contacts for screw fixing M10, 170 mm mounting dimension, for bolting onto busbars or onto 3NH5473 fuse base												
	2	40	1500/ 1000	gR	900	26	On req.		**3NE5302-0MK06**		1	1 unit	1DM
		50			1800	27	On req.		**3NE5317-0MK06**		1	1 unit	1DM
		63			3100	34	On req.		**3NE5318-0MK06**		1	1 unit	1DM
		80		aR	3900	42	On req.		**3NE5320-0MK06**		1	1 unit	1DM
		100			8700	45	On req.		**3NE5321-0MK06**		1	1 unit	1DM
		125			11800	59	On req.		**3NE5322-0MK06**		1	1 unit	1DM
		160			37000	54	On req.		**3NE5324-0MK06**		1	1 unit	1DM
		200			70000	56	On req.		**3NE5325-0MK06**		1	1 unit	1DM
		250			165000	59	On req.		**3NE5327-0MK06**		1	1 unit	1DM
		315			250000	76	On req.		**3NE5330-0MK06**		1	1 unit	1DM
		400	1 500/ 1 000		470000	89	On req.		**3NE5332-0MK06**		1	1 unit	1DM
		500			800000	109	On req.		**3NE5334-0MK06**		1	1 unit	1DM
		630			1100000	163	On req.		**3NE5336-0MK06**		1	1 unit	1DM
	2*	630	1 500/ 1000	aR	1100000	163	On req.		**3NE5336-0MK66**		1	1 unit	1DM
	* Special version with extended contacts, 190 mm mounting dimension, with fastening holes												
	With slotted blade contacts for M10 screw fixing, mounting dimension: 210 mm												
	3	200	2 000	aR	138000	75	1.0		**3NE7425-0U**		1	2 units	1DM
		250			218000	110	1.0		**3NE7427-0U**		1	2 units	1DM
		350			555000	120	1.0		**3NE7431-0U**		1	2 units	1DM
		400			870000	150	1.0		**3NE7432-0U**		1	2 units	1DM
		450			960000	160	1.0		**3NE7633-0U**		1	2 units	1DM
		630			1 950000	220	1.0		**3NE7636-0U**		1	2 units	1DM
	With slotted blade contacts for M12 screw fixing, mounting dimension: 210 mm												
	3	450	2 000	aR	960000	160	1.0		**3NE7633-1U**		1	2 units	1DM
		525			1120000	210	1.0		**3NE7648-1U**		1	2 units	1DM
		630			1950000	220	1.0		**3NE7636-1U**		1	2 units	1DM
		710			3110000	275	1.0		**3NE7637-1U**		1	2 units	1DM
	With slotted blade contacts for M12 screw fixing, mounting dimension: 260 mm												
	3	125	2 500	aR	34500	78	1.0		**3NE9622-1C**		1	1 unit	1DM
		400			620000	205	1.0		**3NE9632-1C**		1	1 unit	1DM
		500			1270000	235	1.0		**3NE9634-1C**		1	1 unit	1DM
		630			2800000	275	1.0		**3NE9636-1C**		1	1 unit	1DM
	2	315	--/ 3 000	aR	300000	245	On req.		**3NE9330-0MK07**		1	1 unit	1DM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	I_n	U_n	Operational class	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC		A^2s	W		d					
	LV HRC design												
	With M12 female thread at both ends for direct busbar mounting, flange dimensions 52 mm												
	3	630	690	aR	244000	125	0.9		**3NC3236-6U**		1	3 units	1DM
		710			346000	130	0.9		**3NC3237-6U**		1	3 units	1DM
		800			498000	135	0.95		**3NC3238-6U**		1	3 units	1DM
		900			677000	140	0.95		**3NC3240-6U**		1	3 units	1DM
		1 000			975000	145	1.0		**3NC3241-6U**		1	3 units	1DM
		1 100			1382000	150	1.0		**3NC3242-6U**		1	3 units	1DM
		1250			1990000	155	1.0		**3NC3243-6U**		1	3 units	1DM
		1 400	500		2100000	175	1.0		**3NC3244-6U**		1	3 units	1DM
		1 600			2860000	195	0.95		**3NC3245-6U**		1	3 units	1DM
	With M10 female thread at both ends for direct busbar mounting, flange dimensions 109 mm												
	3	450	1 000	aR	488000	110	1.0		**3NE3635-6**		1	3 units	1DM
	With M12 female thread at both ends for direct busbar mounting, flange dimensions 73 mm												
	3	630	1 000	aR	418000	130	0.90		**3NC3336-6U**		1	3 units	1DM
		710			569000	140	0.90		**3NC3337-6U**		1	3 units	1DM
		800			819000	150	0.90		**3NC3338-6U**		1	3 units	1DM
		900			1160000	160	0.95		**3NC3340-6U**		1	3 units	1DM
		1 000			1670000	165	0.95		**3NC3341-6U**		1	3 units	1DM
		1 100	800		1910000	175	0.95		**3NC3342-6U**		1	3 units	1DM
		1250			2600000	185	0.95		**3NC3343-6U**		1	3 units	1DM
	3	315	1250	aR	72500	80	0.95		**3NC3430-6U**		1	3 units	1DM
		400			163000	95	0.95		**3NC3432-6U**		1	3 units	1DM
		500			290000	115	0.90		**3NC3434-6U**		1	3 units	1DM
		630			650000	120	0.95		**3NC3436-6U**		1	3 units	1DM
		800	1100		985000	145	0.95		**3NC3438-6U**		1	3 units	1DM

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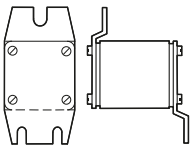
LV HRC design

	Size	I_n	U_n	Operational classes	Breaking I^2t value	Power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC		A^2s	W		d					
	Fuses for special applications												
	For screwing onto water-cooled busbars, for rectifiers in electrolysis systems												
	--[1]	350	800	aR	260000	80	0.9		**3NC5531**		1	3 units	1DM
		600	1000		888000	150	0.9		**3NC5840**		1	3 units	1DM
		630	800		888000	145	0.9		**3NC5841**		1	3 units	1DM
		800	1000		1728000	170	0.9		**3NC5838**		1	3 units	1DM
		710	900		620000	150	0.9		**3NE6437-7**		1	3 units	1DM
		1250	600		2480000	210	0.9		**3NE9450-7**		1	3 units	1DM
	With M10 female thread at both ends for direct busbar mounting, flange dimensions 89 (99)[2] mm, for air-cooled rectifiers in electrolysis systems												
	--[1]	710	900	aR	620000	150	0.9		**3NE6437**		1	3 units	1DM
		850	600	gR	2480000	85	1.0		**3NE9440-6**		1	3 units	1DM
		900	900	aR	1920000	170	0.9		**3NE6444**		1	3 units	1DM
		1250	600	aR	2480000	210	0.9		**3NE9450**		1	3 units	1DM
	Fuses with installation holder for SITOR 6QG10 thyristor sets												
	--[1]	200	1000	aR	44000	50	0.85		**3NE3525-5**		1	2 units	1DM
		450			395000	90	0.85		**3NE3535-5**		1	2 units	1DM
	Fuses with installation holder for SITOR 6QG11 thyristor sets												
	--[1]	50	1000	gR	1100	20	0.85		**3NE4117-5**		1	2 units	1DM
		100		aR	7400	35	0.85		**3NE4121-5**		1	2 units	1DM
		170		aR	60500	43	0.85		**3NE4146-5**		1	2 units	1DM
	Fuses for special applications												
	With female thread at both ends for SITOR 6QG12 thyristor sets, flange dimensions 77 mm												
	--[1]	250	800	aR	29700	105	0.85		**3NE4327-6B**		1	3 units	1DM
		315			60700	120	0.85		**3NE4330-6B**		1	3 units	1DM
		450			191000	140	0.85		**3NE4333-6B**		1	3 units	1DM
		500			276000	155	0.85		**3NE4334-6B**		1	3 units	1DM
		710			923000	155	0.95		**3NE4337-6**		1	3 units	1DM
	Special design for mounting directly in the railway supply rectifier												
	--[1]	250	680	aR	635000	25	0.9		**3NC7327-2**		1	3 units	1DM
		350			1430000	32	0.9		**3NC7331-2**		1	3 units	1DM

[1] Special design.

[2] Flange dimensions 99 mm only for 3NE6444.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	I_n	U_n	Operational classes	Breaking I^2t value	P_v power loss	Varying load factor *WL*	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V DC		A^2s	W		d					
	Fuses for special applications												
	DC fuses with slotted blade contacts for M12 screw fixing												
	2L	400	900	gR	240000[1]	75	--		**3NB1234-3KK20**		1	2 units	1DM
	1L	200	1250	aR	39000[2]	50	--		**3NB1126-4KK11**		1	2 units	1DM
		250			80500[2]	51	--		**3NB1128-4KK11**		1	2 units	1DM
	2L	315			129000[2]	63	--		**3NB1231-4KK11**		1	2 units	1DM
		400			290000[2]	68	--		**3NB1234-4KK11**		1	2 units	1DM
	3L	500			600000[2]	89	--		**3NB1337-4KK11**		1	2 units	1DM
		800			1910000[2]	135	--		**3NB1345-4KK11**		1	2 units	1DM
	Parallel-connected DC fuses with slotted blade contacts for M12 screw fixing												
	2 x 3L	800	1250	aR	1150000[2]	160	--		**3NB2345-4KK16**		1	1 unit	1DM
		1000			2250000[2]	195	--		**3NB2350-4KK16**		1	1 unit	1DM
		1400			5100000[2]	250	--		**3NB2355-4KK16**		1	1 unit	1DM
		1600			7450000[2]	275	--		**3NB2357-4KK16**		1	1 unit	1DM
	3 x 3L	2100			1195000[2]	365	--		**3NB2364-4KK17**		1	1 unit	1DM
		2400			18100000[2]	445	--		**3NB2366-4KK17**		1	1 unit	1DM

[1] I^2t at U_{VSI} 1400 V, I^2t at U_n 900 V is 180000 A^2s

[2] I^2t at U_{VSI} 1500 V; I^2t at U_n 1250 V is reduced with factor k = 0.79.

Note:

VSI is the abbreviation for Voltage Sourced Inverter. The VSI voltage U_{VSI} is a DC test voltage defined in IEC 60269-4 specially for use in applications with energy stores. The extremely steep current rise in the event of a fault is characteristic of such applications.

For SITOR 3NB1 and 3NB2 semiconductor fuses, the VSI voltage and the applicable I^2t value are specified in the "Technical specifications" table; for all other SITOR semiconductor fuses, these values are available on request.

	Version*	For fuse series	I_n	U_n	Connection bolt	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm		A	V AC / DC		d					
	**Fuse bases for SITOR fuses** • With bolt-on links or slotted blade contacts • 1-pole										
	75	3NC18	50	690	M5		**3NH5723**		1	3 units	1BM
	80	3NE87, 3NC26	315	690	M8		**3NH5023**		1	3 units	1BM
		3NE80..-3MK	400	690	M10		**3NH5323**		1	3 units	1BM
		3NC32..-1U, 3NE82..-3MK	1600	690	M10		**3NH5423**		1	3 units	1BM
	110	3NC24, 3NC33..-1U, 3NC34..-1U, 3NC84, 3NE1…-3, 3NE32, 3NE33, 3NE34	1250	1250	M10		**3NH5463**		1	3 units	1BM
	170	3NE53, 3NE56	630	1800	M10		**3NH5473**		1	3 units	1BM

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Cylindrical fuse design

Overview

SITOR cylindrical fuses protect power semiconductors from the effects of short circuits because the super-quick-acting disconnect characteristic is far quicker than that of conventional fuses. They protect high-quality devices and system components such as semiconductor contactors, electronic relays (solid state), converters with fuses in the input and in the DC link, UPS systems and soft starters for motors up to 100 A.

The cylindrical design is approved for industrial applications. The cylindrical fuse links comply with IEC 60269.

Cylindrical fuse holders also comply with IEC 60269 and UL 512. The cylindrical fuse holders for 10 x 38 mm and 14 x 51 mm have been tested and approved as fuse switch disconnectors and the cylindrical fuse holders for 22 x 58 mm as fuse disconnectors according to the switching device standard IEC 60947-3. The utilization category and the tested current and voltage values are specified in the Table "Technical specifications".

The cylindrical fuse holders have been specially developed for the application of SITOR fuse links with regard to heat tolerance and heat dissipation and are therefore not recommended for standard applications.

Cylindrical fuse bases do not offer the same comprehensive touch protection as the fuse holders, but have better heat dissipation. The single-pole cylindrical fuse bases for 14 × 51 mm and 22 × 58 mm allow modular expansion to multi-pole bases.

Benefits

- Cylindrical fuses have an extremely compact design and a correspondingly small footprint
- The cylindrical fuses have IEC and UL approval and are suitable for universal use worldwide
- The use of SITOR cylindrical fuses in the cylindrical fuse holders and bases has been tested with regard to heat dissipation and maximum current loading. This makes planning and dimensioning easier and prevents consequential damage
- The use of fuse holders as switch disconnectors expands the area of application of these devices and increases operating safety

Technical specifications

		Cylindrical fuse holders		
		3NC10	**3NC14**	**3NC22**
Size	mm × mm	10 × 38	14 × 51	22 × 58
Standards		UL 4248-1; CSA C22.2; IEC 60269-2, IEC 60947-3		
Certifications		UL, CC, CSA	UL, CC, CSA	UL, CSA
Approvals		UL 4248-1; UL File Number E171267; CSA C22.2 No. 39-M		
Rated voltage U_n	V AC V DC	690; 600 acc. to UL/CSA 800		
Rated current I_n	A AC	32 30 acc. to UL/CSA	50 50 acc. to UL 40 acc. to CSA	100 80 acc. to UL/CSA
Rated conditional short-circuit current	kA	50	50 (100 at 400 V)	50 (100 at 500 V)
Breaking capacity • Utilization category		AC-22B (400 V)	AC-22B (400 V)	AC-20B (690 V)
Max. power dissipation of fuse links (conductor cross-section used)	W	3 (6 mm^2) 4.3 (10 mm^2)	5 (10 mm^2) 6.5 (25 mm^2)	9.5 (35 mm^2) 11 (50 mm^2)
Rated impulse withstand voltage	kV	6		
Overvoltage category		II		
Pollution degree		2		
No-voltage changing of fuse links		Yes		
Sealable when installed		Yes		
Mounting position		Any		
Current direction		Any		
Degree of protection acc. to IEC 60529		IP20, with connected conductors[1]		
Terminals with touch protection according to BGV A3 at incoming and outgoing feeder		Yes		
Ambient temperature	°C	45		
Conductor cross-sections • Finely stranded, with end sleeve • AWG (American Wire Gauge)	 mm^2 AWG	 1.5 ... 16 15 ... 5	 1.5 ... 35 14 ... 2	 4 ... 50 10 ... 1/0
Tightening torque	Nm lbs/in.	2.5 22	2.5 ... 3 22 ... 26	3.5 ... 4 31 ... 35

[1] Degree of protection IP20 is tested according to regulations using a straight test finger (from the front), with the device mounted and equipped with a cover, housing or some other enclosure.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	I_n	U_n	Breaking I^2t value	P_v power loss	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm × mm	A	V AC/ V DC	A^2s	W	d					
	**Cylindrical fuse links, operational class gR**										
	10 × 38	6	690/440	6.5	2.5		**3NC1006-0MK**		1	20 units	1DM
		10		18	3.3		**3NC1010-0MK**		1	20 units	1DM
		12		35	4		**3NC1012-0MK**		1	20 units	1DM
		16		45	6		**3NC1016-0MK**		1	20 units	1DM
		20	690/250	110	7.8		**3NC1020-0MK**		1	20 units	1DM
		25		140	8.7		**3NC1025-0MK**		1	20 units	1DM
		32		450	12		**3NC1032-0MK**		1	20 units	1DM
	14 × 51	6	690/700	3.5	3.1		**3NC1406-0MK**		1	10 units	1DM
		10		15	4.6		**3NC1410-0MK**		1	10 units	1DM
		16	690/600	32	6.7		**3NC1416-0MK**		1	10 units	1DM
		20		68	7.4		**3NC1420-0MK**		1	10 units	1DM
		25		108	8.4		**3NC1425-0MK**		1	10 units	1DM
		32		175	12.3		**3NC1432-0MK**		1	10 units	1DM
		40	690/440	470	11.7		**3NC1440-0MK**		1	10 units	1DM
		50	690/250	830	16.3		**3NC1450-0MK**		1	10 units	1DM
	22 × 58	25	690/700	180	8.1		**3NC2225-0MK**		1	10 units	1DM
		32	690/600	420	9		**3NC2232-0MK**		1	10 units	1DM
		40	690/440	700	12.5		**3NC2240-0MK**		1	10 units	1DM
		50	690/250	1250	15.2		**3NC2250-0MK**		1	10 units	1DM
		63		2400	17.5		**3NC2263-0MK**		1	10 units	1DM
		80		4400	23		**3NC2280-0MK**		1	10 units	1DM
		100		11500	28.7		**3NC2200-0MK**		1	10 units	1DM
	**Cylindrical fuse links, operational class aR**										
	10 × 38[2]	3	600/700[1]	8	1.2		**3NC1003**		1	10 units	1DM
		6		20	1.5		**3NC1006**		1	10 units	1DM
		8		30	2		**3NC1008**		1	10 units	1DM
		10		60	2.5		**3NC1010**		1	10 units	1DM
		12		110	3		**3NC1012**		1	10 units	1DM
		16		150	3.5		**3NC1016**		1	10 units	1DM
		20		200	4.8		**3NC1020**		1	10 units	1DM
		25		250	6		**3NC1025**		1	10 units	1DM
		32	600/--	500	7.5		**3NC1032**		1	10 units	1DM
	14 × 51	1	660/--	1.2	5		**3NC1401**		1	10 units	1DM
		2		10	3		**3NC1402**		1	10 units	1DM
		3		15	2.5		**3NC1403**		1	10 units	1DM
		4		25	3		**3NC1404**		1	10 units	1DM
		5	690/700[1]	11	1.5		**3NC1405**		1	10 units	1DM
		6		11	1.5		**3NC1406**		1	10 units	1DM
		10		22	4		**3NC1410**		1	10 units	1DM
		15		70	5.5		**3NC1415**		1	10 units	1DM
		20		100	6		**3NC1420**		1	10 units	1DM
		25		320	7		**3NC1425**		1	10 units	1DM
		30		400	9		**3NC1430**		1	10 units	1DM
		32		600	7.6		**3NC1432**		1	10 units	1DM
		40		750	8		**3NC1440**		1	10 units	1DM
		50		1800	9		**3NC1450**		1	10 units	1DM
		63	690/250	2100	16.7		**3NC1463-0MK**		1	10 units	1DM
	22 × 58	20	690/700[1]	220	4.6		**3NC2220**		1	5 units	1DM
		25		300	5.6		**3NC2225**		1	5 units	1DM
		32		450	7		**3NC2232**		1	5 units	1DM
		40		700	8.5		**3NC2240**		1	5 units	1DM
		50		1350	9.5		**3NC2250**		1	5 units	1DM
		63		2600	11		**3NC2263**		1	5 units	1DM
		80		5500	13.5		**3NC2280**		1	5 units	1DM
		100		8000	16		**3NC2200**		1	5 units	1DM
		125	690/250	29000	35.3		**3NC2211-0MK**		1	10 units	1DM

[1] Observe DC voltage acc. to UL, time constants and minimum breaking current MBC (see "Technical specifications").
[2] CCC approval

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Cylindrical fuse design

	Size	I_n	U_n	Breaking I^2t value	P_v power loss	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm × mm	A	V AC/ V DC	A^2s	W	d					
	Cylindrical fuse links with striking pin, operational class aR										
	14 × 51	10	690/600[1]	32	4		**3NC1410-5**		1	10 units	1DM
		15		63	5.5		**3NC1415-5**		1	10 units	1DM
		20		234	6		**3NC1420-5**		1	10 units	1DM
		25		378	7		**3NC1425-5**		1	10 units	1DM
		30		466	9		**3NC1430-5**		1	10 units	1DM
		32		600	7.6		**3NC1432-5**		1	10 units	1DM
		40		750	8		**3NC1440-5**		1	10 units	1DM
		50		1800	9		**3NC1450-5**		1	10 units	1DM
	22 × 58	20	690/500[1]	240	5		**3NC2220-5**		1	5 units	1DM
		25		350	6		**3NC2225-5**		1	5 units	1DM
		32		500	8		**3NC2232-5**		1	5 units	1DM
		40		800	9		**3NC2240-5**		1	5 units	1DM
		50		1500	9.5		**3NC2250-5**		1	5 units	1DM
		63		3000	11		**3NC2263-5**		1	5 units	1DM
		80		6000	13.5		**3NC2280-5**		1	5 units	1DM
	22 × 58	100	600/500[1]	8500	16		**3NC2200-5**		1	5 units	1DM
	Cylindrical fuse links										
	Operational class gS										
	22 × 127	1	1500/ 1000	2	2		**3NC2301-0MK**		1	5 units	1DM
		2		4.4	2.5		**3NC2302-0MK**		1	5 units	1DM
		4		55	5.3		**3NC2304-0MK**		1	5 units	1DM
		6		150	6.4		**3NC2306-0MK**		1	5 units	1DM
		10		540	3.1		**3NC2310-0MK**		1	5 units	1DM
		16		1120	4.7		**3NC2316-0MK**		1	5 units	1DM
		20		2850	5.4		**3NC2320-0MK**		1	5 units	1DM
		25		3300	6.9		**3NC2325-0MK**		1	5 units	1DM
		32		9050	6.7		**3NC2332-0MK**		1	5 units	1DM
	Operational class gR										
	22 × 127	40	1500/ 1000	18500	9.4		**3NC2340-0MK**		1	5 units	1DM
	Operational class aR										
	22 × 127	50	1500/ 1000	26000	11.6		**3NC2350-0MK**		1	5 units	1DM
	**Cylindrical fuse links, with M8 bolt-on links**										
	With bolt-on links: Mounting dimension 75 mm, for screwing onto busbars or onto 5SH5723 fuse base										
	Operational class gR										
	18 x 88	10	690/ 440	17	4.3		**3NC1810-0MK**		1	3 units	1DM
		16		52	4.4		**3NC1816-0MK**		1	3 units	1DM
		20		90	6.5		**3NC1820-0MK**		1	3 units	1DM
		25		160	8.5		**3NC1825-0MK**		1	3 units	1DM
		32		400	8.9		**3NC1832-0MK**		1	3 units	1DM
		40		600	11		**3NC1840-0MK**		1	3 units	1DM
		50		1250	13.8		**3NC1850-0MK**		1	3 units	1DM
	With bolt-on links: Mounting dimension 80 mm, for screwing onto busbars or onto 5SH5023 fuse base										
	Operational class gR										
	26 x 103	25	690/ 440	120	9.5		**3NC2625-0MK**		1	3 units	1DM
		32		220	12.3		**3NC2632-0MK**		1	3 units	1DM
		40		400	14.8		**3NC2640-0MK**		1	3 units	1DM
		50		980	17.5		**3NC2650-0MK**		1	3 units	1DM
		63		2050	18.8		**3NC2663-0MK**		1	3 units	1DM
	Operational class aR										
		80		3500	22.5		**3NC2680-0MK**		1	3 units	1DM
		100		5400	31.5		**3NC2600-0MK**		1	3 units	1DM
		125		11800	39		**3NC2611-0MK**		1	3 units	1DM

[1] DC voltage acc. to UL.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version*	For fuse series	I_n	U_n	Connection bolt	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm		A	V DC		d					
	**Fuse bases for SITOR fuses** With bolt-on links or slotted blade contacts, 1-pole										
	75	3NC18	50	690	M5		**3NH5723**		1	3 units	1BM
	80	3NE87, 3NC26	315	690	M8		**3NH5023**		1	3 units	1BM

	Size	Version	Rated voltage	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm × mm		V AC/V DC	d					
	**Cylindrical fuse holders** Can be used as switch disconnectors[1]								
	10 × 38	1P	690/800		**3NC1091**		1	12 units	1DM
		2P			**3NC1092**		1	6 units	1DM
		3P			**3NC1093**		1	4 units	1DM
	14 × 51	1P			**3NC1491**		1	6 units	1DM
		2P			**3NC1492**		1	3 units	1DM
		3P			**3NC1493**		1	2 units	1DM
	22 × 58	1P			**3NC2291**		1	1 units	1DM
		2P			**3NC2292**		1	3 units	1DM
		3P			**3NC2293**		1	2 units	1DM
	22 × 127	1P	1500/1000		**3NC2391-0MK**		1	4 units	1DM
		2P			**3NC2392-0MK**		1	2 units	1DM
		3P			**3NC2393-0MK**		1	1 unit	1DM
	**Cylindrical fuse holders** Can be used as fuse switch disconnectors[1] With signaling switches for fuse links with striking pin[2]								
	14 × 51	1P	690/800		**3NC1491-5**		1	6 units	1DM
	22 × 58	1P			**3NC2291-5**		1	6 units	1DM
	**Cylindrical fuse bases**								
	10 × 38	1P	600/--		**3NC1038-1**		1	10 units	1DM
		2P			**3NC1038-2**		1	8 units	1DM
		3P			**3NC1038-3**		1	6 units	1DM
	**Fuse tongs**								
	10 × 38, 14 × 51, 22 × 58				**3NC1000**		1	1 unit	1DM

[1] Please note the utilization category and current/voltage values; see "Technical specifications", page 5/70.

[2] Microswitch 5 A (250 V AC)

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5

Overview

SILIZED is the brand name for NEOZED fuses (D0 fuses) and DIAZED fuses (D fuses) with super-quick-acting characteristic for semiconductor protection.
The fuses are used in combination with fuse bases, fuse screw caps and accessory parts of the standard fuse system.

SILIZED semiconductor fuses protect power semiconductors from the effects of short circuits because the super-quick-acting characteristic is far quicker than that of conventional fuses. They protect high-quality devices and system components, such as semiconductor contactors, static relays, converters with fuses in the input and in the DC link, UPS systems and soft starters for motors up to 100 A.

When using fuse bases and fuse screw caps made of molded plastic, always heed the maximum permissible power loss values due to the high power loss (power dissipation) of the SILIZED fuses. When using these components, the following maximum permissible power loss applies:
- NEOZED D02: 5.5 W
- DIAZED DII: 4.5 W
- DIAZED DIII: 7.0 W

This enables a partial thermal permanent load of only 50%.

The DIAZED screw adapter DII for 25 A is used for the 30 A fuse link.

Benefits

- SILIZED semiconductor fuses have an extremely compact design. This means they have a very small footprint – particularly the NEOZED version
- The rugged and well-known DIAZED design complies with IEC 60269-3. It is globally renowned and can be used in many countries
- A wide range of fuse bases and accessories is available for the NEOZED and DIAZED versions of the SILIZED semiconductor fuses. This increases the application options in many devices

Technical specifications

		5SE13 NEOZED design fuse links	5SD4 DIAZED design fuse links
Standards		DIN VDE 0636-3; IEC 60269-3; EN 60269-4 (VDE 0636-4); IEC 60269-4	
Operational class		gR	
Characteristic		Super-quick-acting	
Rated voltage U_n	V AC V DC	400 250	500 500
Rated current I_n	A	10 ... 63	16 ... 100
Rated breaking capacity	kA AC kA DC	50 8	
Mounting position		Any, preferably vertical	
Non-interchangeability		Using adapter sleeves	Using screw adapter or adapter sleeves
Resistance to climate	°C	Up to 45 at 95% rel. humidity	
Ambient temperature	°C	-5 ... +40°C, humidity 90% at 20°C	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Size	I_e	U_e	Breaking I^2t value	Power loss	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC/ V DC	A^2s	W	d					
	SILIZED fuse links, operational class gR										
	D01	10	400/250	73	6.9		**5SE1310**		1	10 units	1DM
		16		120	6.2		**5SE1316**		1	10 units	1DM
	D02	20		190	8.1		**5SE1320**		1	10 units	1DM
		25		215	8.2		**5SE1325**		1	10 units	1DM
		35		470	16.7		**5SE1335**		1	10 units	1DM
		50		1960	12.0		**5SE1350**		1	10 units	1DM
		63		4230	15.5		**5SE1363**		1	10 units	1DM
	DII	16	500/500	60	12.1		**5SD420**		1	5 units	1DM
		20		139	12.3		**5SD430**		1	5 units	1DM
		25		205	12.5		**5SD440**		1	5 units	1DM
		30		310	13.5		**5SD480**		1	5 units	1DM
	DIII	35		539	14.8		**5SD450**		1	5 units	1DM
		50		1250	18.5		**5SD460**		1	5 units	1DM
		63		1890	28		**5SD470**		1	5 units	1DM
	DIV	80		4200	34.3		**5SD510**		1	3 units	1DM
		100		8450	41.5		**5SD520**		1	3 units	1DM

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Introduction

Overview

Special demands are made on fuses for application in photovoltaic systems. These fuses have a high DC rated voltage and a tripping characteristic specially designed to protect PV modules and their connecting cables (the newly defined operational class gPV). It is also crucial that the PV fuses do not age in spite of strongly alternating load currents, in order to ensure high plant availability throughout the service life of the PV system. The fuses must also be able to withstand high temperature fluctuations without damage. These requirements were only incorporated into an international standard in recent years and have now been published as IEC 60269-6. All Siemens photovoltaic fuse systems comply with this new standard. Furthermore, they also already comply with the recently agreed corrections to the characteristic curves, which will be incorporated in the next standard update.

The IEC cylindrical fuses used as phase fuses also correspond to the characteristic curves specified in UL standard UL 2579. The non-fusing current I_{nf} and fusing current I_f test currents are crucial to the shape of the characteristic curves.

Standard	I_{nf}	I_f
Current IEC standard	1.13 x I_n	1.45 x I_n
UL standard	1.0 x I_n	1.35 x I_n
Future IEC standard	1.05 x I_n	1.35 x I_n
Siemens fuses	1.13 x I_n	1.35 x I_n

These test currents of gPV phase fuses to 32 A apply to a conventional test duration of one hour; at I_{nf}, the fuse must not trip within an hour, at I_f, it must trip within an hour.

The PV cylindrical fuses of size 10 mm x 38 mm offer an especially space-saving solution for the protection of the strings.

The fuse holders of size 10 x 38 mm can be supplied in single-pole and two-pole versions with and without signal detectors. In the case of devices with signal detector, a small electronic device with LED is located behind an inspection window in the plug-in module. If the inserted fuse link is tripped, this is indicated by the LED flashing. The devices have a sliding catch that enables removal of individual devices from the assembly. The infeed can be from the top or the bottom. Because the cylindrical fuse holders are fitted with the same anti-slip terminals at the top and the bottom, the devices can also be bus-mounted at the top or the bottom.

The PV fuses in LV HRC design are usually used as cumulative fuses upstream of the inverter. In addition, they can also be used for protecting groups (PV subarrays). For the PV cumulative fuses of size 1, the standard LV HRC fuse bases are available. For PV cumulative fuses of size 1L, 1XL, 2L, 2XL and 3L, we have developed a special 3NH7...-4 fuse base with a swiveling mechanism which combines maximum touch protection with maximum user-friendliness. This makes it possible to change fuses safely and without the need for any tools, such as a fuse handle. This provides safe and fast access even in an emergency.

Our cylindrical fuse holders and fuse bases with swiveling mechanism comply with the IEC 60269-2 standard and are considered as fuse disconnectors as defined in the IEC 60947 switchgear and controlgear standard. Under no circumstances are they suitable for switching loads.

To ensure that PV fuses are correctly selected and dimensioned, the specific operating conditions and the PV module data must be taken into account when calculating voltage and current ratings.

Benefits

- Protection of the modules and their connecting cables in the event of reverse currents
- Safe tripping in case of fault currents reduces the risk of fire due to DC electric arcs
- Safe separation when the fuse holder/fuse base is open



PV cylindrical fuse system, 3NW70..-4, 3NW60..-4



PV LV HRC fuse systems, 3NH73..-4, 3NE13..-4D

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

		Cylindrical fuse links		Cylindrical fuse holders	
		3NW60..-4	**3NW66..-4**	**3NW70..-4**	**3NW76..-4**
Size	mm x mm	10 x 38	10 x 85		
Standards		IEC 60269-6		IEC 60269, IEC 60269-2, IEC 60947, UL 4248-1, -18	IEC 60269, IEC 60269-2, IEC 60947, UL 4248-1, -18
Approvals		UL 248-13, waiver certification for China (2 to 16 A)	(File No. E469670)	(File No. E355487), , (variants without signal detector)	(E355487)
Operational class		gPV			
Rated voltage U_n	V DC	1000	1500 (20 A: 1200 V)	1000	1500
Rated current I_n	A DC	2 to 20	4 to 20	30	32
Rated short-circuit strength	kA	--		30	
Rated breaking capacity	kA DC	30	10	--	
Breaking capacity • Utilization category		--		AC-20B, DC-20B	
Max. power dissipation of the fuse link	W	--		4	6
Rated impulse withstand voltage	kV	--		6	--
Overvoltage category		--		II	--
Pollution degree		--		2	--
No-voltage changing of fuse links		--		Yes	
Sealable when installed		--		Yes	
Mounting position		Any, preferably vertical			
Current direction		--		Any (signal detector with antiparallel LED)	
Degree of protection acc. to IEC 60529		--		IP20, with connected conductors[1]	
Terminals with touch protection according to BGV A3 at incoming and outgoing feeder		--		Yes	
Ambient temperature	°C	-25 ... +55°C, humidity 90% at +20°C			
Conductor cross-sections • Finely stranded, with end sleeve • AWG (American Wire Gauge)	 mm^2 AWG	 -- --		 0.75 ... 25 18 ... 4	
Tightening torque	Nm	--		2.5	

1) Degree of protection IP20 is tested according to regulations using a straight test finger (from the front), with the device mounted and equipped with a cover, housing or some other enclosure.

Selection and ordering data

	Size	I_n	U_n	P_v	P_v at 70%[1]	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm x mm	A DC	V DC	W	W	d					
	Cylindrical fuse links, operational class gPV										
	10 x 38	2	1000	1.4	0.6	▶	**3NW6002-4**		1	20 units	1DN
		4		1.6	0.7		**3NW6004-4**		1	20 units	1DN
		6		1.7	0.7		**3NW6001-4**		1	20 units	1DN
		8		1.9	0.8		**3NW6008-4**		1	20 units	1DN
		10		2.3	1.0		**3NW6003-4**		1	20 units	1DN
		12		2.7	1.1		**3NW6006-4**		1	20 units	1DN
		16		3.2	1.3		**3NW6005-4**		1	20 units	1DN
		20		3.4	1.4		**3NW6007-4**		1	20 units	1DN
	10 x 85	4	1500	2.7	1.1		**3NW6604-4**		1	10 units	1DN
		6		3.0	1.2		**3NW6601-4**		1	10 units	1DN
		8		3.6	1.5		**3NW6608-4**		1	10 units	1DN
		10		3.7	1.6		**3NW6603-4**		1	10 units	1DN
		12		3.3	1.4		**3NW6606-4**		1	10 units	1DN
		16		3.7	1.6		**3NW6605-4**		1	10 units	1DN
		20	1200	4.0	1.7		**3NW6607-4**		1	10 units	1DN

3NW6004-4

3NW6604-4

1) Tested in the fuse holder 3NW7013-4 or 3NW7613-4.

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PV cylindrical fuses

	Number of poles	I_n	For fuse links of size	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A DC	mm x mm	MW	d					
 3NW7014-4	**Cylindrical fuse holders, 1000 V with signal detector**									
	1P	30	10 x 38	1		**3NW7014-4**		1	12 units	1DN
	2P	30	10 x 38	2		**3NW7024-4**		1	6 units	1DN
	Without signal detector									
	1P	30	10 x 38	1		**3NW7013-4**		1	12 units	1DN
	2P	30	10 x 38	2		**3NW7023-4**		1	6 units	1DN
 3NW7613-4	**Cylindrical fuse holders, 1500 V**									
	1P	32	10 x 85	1.3		**3NW7613-4**		1	5 units	1DN

Minimum order quantity (PS) or a multiple thereof can be ordered.

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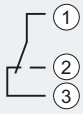
Technical specifications

		Fuse links 3NE1...-4 / -4D / -4E / -5E						Fuse bases 3NH7...-4					
Size		1	1L	2L	3L	1XL	2XL	1	1L	2L	3L	1XL	2XL
Standards		IEC 60269-6						IEC 60269, IEC 60269-2, IEC 60947					
Operational class		gPV											
Rated voltage U_n	V DC	1000 at time constant (L/R) 3 ms 1500 at time constant (L/R) 3 ms						1000				1500	
Rated current I_n	A DC	63 ... 160	200/250	315/400	500/630	63 ... 200	250/315	160	250	400	630	250	400
Rated short-circuit strength	kA	--						30					
Rated breaking capacity	kA DC	30						--					
Breaking capacity • Utilization category		--						AC-20B, DC-20B (switching without load)					
Max. power dissipation of the fuse link	W	--						40	90	110	130	90	110
No-voltage changing of fuse links		--						Yes					
Sealable when installed		--						Yes					
Mounting position		Any, preferably vertical											
Current direction		--						Any					
Ambient temperature	°C	-25 ... +55°C, humidity 90% at +20°C											
Tightening torque	Nm	--						20					
Microswitch for tripped signaling 5 A/250 V AC, 0.2 A/250 V DC		In the "fuse not blown" state, contacts 1 and 3 are closed. 											

Selection and ordering data

	Size	I_n	U_n	P_v at U_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A DC	V DC	W	d					
	Fuse links operational class gPV									
 3NE1330-4D	1	63	1000	19		**3NE1218-4**		1	2 units	1DN
		80		20		**3NE1220-4**		1	2 units	1DN
		100		24		**3NE1221-4**		1	2 units	1DN
		125		26		**3NE1222-4**		1	2 units	1DN
		160		32		**3NE1224-4**		1	2 units	1DN
	1L	200		51		**3NE1225-4D**		1	2 units	1DN
		250		54		**3NE1227-4D**		1	2 units	1DN
	2L	315		73		**3NE1330-4D**		1	2 units	1DN
		400		82		**3NE1332-4D**		1	2 units	1DN
	3L	500		100		**3NE1434-4E**		1	2 units	1DN
		630		110		**3NE1436-4E**		1	2 units	1DN
	1XL	63	1500	20		**3NE1218-5E**		1	2 units	1DN
		80		25		**3NE1220-5E**		1	2 units	1DN
		100		30		**3NE1221-5E**		1	2 units	1DN
		125		29		**3NE1222-5E**		1	2 units	1DN
		160		34		**3NE1224-5E**		1	2 units	1DN
		200		41		**3NE1225-5E**		1	2 units	1DN
	2XL	250		53		**3NE1327-5E**		1	2 units	1DN
		315		63		**3NE1330-5E**		1	2 units	1DN

Minimum order quantity (PS) or a multiple thereof can be ordered.

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PV cumulative fuses

	For fuse links of size	I_n	U_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A DC		d					
	Fuse bases with flat terminal								
	Standard ceramic fuse base [1]								
 3NH3230	1	250	1000		**3NH3230**		1	3 units	1BM
	Fuse bases with swiveling mechanism								
 3NH7360-4	1L	250	1000		**3NH7260-4**		1	1 unit	1DN
	2L	400	1000		**3NH7360-4**		1	1 unit	1DN
	3L	630	1000/1500		**3NH7460-4**		1	1 unit	1DN
	1XL	250	1500		**3NH7261-4**		1	1 unit	1DN
	2XL	400	1500		**3NH7361-4**		1	1 unit	1DN
	Fuse bases with swiveling mechanism and microswitch for tripped signaling of the fuse[2]								
	1	250	1000		**3NH7262-4KK01**		1	1 unit	1DN
	2L	400	1000		**3NH7360-4KK01**		1	1 unit	1DN
Accessories									
	Terminal covers for PV fuse bases with swiveling mechanism								
 3NX3121	1, 1L, 1XL				**3NX3121**		1	1 unit	1DN
	2L, 2XL				**3NX3122**		1	1 unit	1DN
	3L				**3NX3123**		1	1 unit	1DN

[1] For more information, see Catalog LV 11.

[2] Fuse must be inserted upside down.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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6/2 **Introduction**

6/3 **5SD7 lightning arresters, type 1**

6/5 **5SD7 combination surge arresters, type 1 + type 2**

6/7 **5SD7 combination surge arresters, type 1 / type 2**

6/9 **5SD7 surge arresters, type 2**

6/13 **5SD7 surge arresters, type 3**

6/14 **Configuration**

6/17 **5SD7 surge arresters, for measuring and control technology**

For further technical product information:

Configuration Manual

Overvoltage Protection Devices
Article No.: 3ZW1012-5SD74-0AC1

Siemens Industry Online Support:

www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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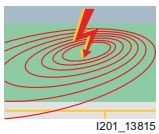
Overview

Devices		Page	Application	Standards
	**5SD7 lightning arresters, type 1**	6/3	With plug-in protective modules for TN-C, TN-S and TT systems. Rated voltage 350 V AC for lightning currents from 25 kA to 100 kA. All versions with remote signaling contact. For installation in main distribution boards, upstream or downstream of the counter.	EN 61643-11
	**5SD7 combination surge arresters, type 1 + type 2**	6/5	With plug-in protective modules for TN-C, TN-S and TT systems. Rated voltage 350 V AC for lightning currents from 25 kA to 100 kA. All versions with remote signaling contact. For installation in main distribution boards downstream of the counter.	EN 61643-11
	**5SD7 combination surge arresters, type 1 / type 2**	6/7	With plug-in protective modules for TN-C, TN-S and TT systems. Rated voltage 335 V AC for lightning currents or discharge surge currents up to 50 kA. Versions with or without remote signaling.	EN 61643-11
	**5SD7 surge arresters, type 2**	6/9	With plug-in protective modules for TN-C, TN-S and TT systems. Rated voltage 350 V AC, rated discharge current 20 kA and discharge surge current 40 kA. For installation in sub-distribution boards.	EN 61643-11
	**5SD7 surge arresters, type 3**	6/13	With plug-in protective modules for single-phase and three-phase systems. Rated voltage, single-phase 24 V, 120 V, 230 V AC and three-phase 230/400 V AC. For installation as close as possible upstream from the terminal equipment.	EN 61643-11
	**Configuration**	6/14	Everything you need to know about overvoltage protection: function, mounting and technical connections.	
	**5SD7 surge arresters, for measuring and control technology**	6/17	With plug-in protective modules for measuring and control technology for installation in signal circuits.	EN 61643-21

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Type 1 lightning arresters are the most powerful overvoltage protection. They protect low-voltage systems against any overvoltage or high impulse currents that may be triggered by a direct or indirect lightning strike.

All lightning arresters are fitted with a mechanical fault indication, which does not require an extra power supply. For this reason, the lightning conductors can also be used in the precounter area.

The protective modules are available as connectors. The majority of lightning arresters have a remote signaling contact, which signals if the device fails.

Technical specifications

		5SD7411-2	5SD7412-1	5SD7413-1	5SD7414-1
Standards		IEC 61643-11, EN 61643-11			
Approvals			KEMA, UL/cUL		
Rated voltage U_N	V AC	690	240	240/415	
Rated arrester voltage U_C	V AC	800	350	350	350
Lightning impulse current I_{imp} (10/350 µs)					
• L-N or L-(PE)N, 1P/3P	kA	35	25	25/75	25/75
• N-PE	kA	--	100	--	100
Rated discharge surge current I_n (8/20 µs)					
• L-N or L-(PE)N, 1P/3P	kA	35	25	25/75	25/75
• N-PE	kA	--	100	--	100
Protection level U_p					
• L-(PE)N	kV	≤ 4.50	≤ 1.50	≤ 1.50	≤ 1.50
• L-PE	kV	--	≤ 2.50	--	≤ 2.50
• N-PE	kV	--	≤ 1.50	--	≤ 1.50
Follow current discharge capacity I_{fi} (AC)					
• L-N or L-(PE)N for 264 V/350 V	kA	--	50/25	50/25	50/25
• N-PE	A	--	100	--	100
Response time t_A					
• L-N or L-(PE)N	ns	≤ 100	≤ 100	≤ 100	≤ 100
• L-(N)-PE	ns	--	≤ 100	--	≤ 100
Max. back-up fuse acc. to IEC 61643-1					
• For stub wiring	A	400 gL/gG	315 gL/gG	315 gL/gG	315 gL/gG
• For V-wiring	A	125 gL/gG	125 gL/gG	125 gL/gG	125 gL/gG
Short-circuit withstand current With max. back-up fuse	kA	50	50	50	50
Temperature range	°C	-40 ... +80			
Degree of protection		IP20, with connected conductors			
Conductor cross-section					
• Finely stranded	mm^2	16 ... 50	2.5 ... 25	2.5 ... 25	2.5 ... 25
• Solid	mm^2	16 ... 50	2.5 ... 35	2.5 ... 35	2.5 ... 35

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Selection and ordering data

	Version	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Lightning arresters								
	**1-pole** With remote signaling	--[1]		**5SD7411-2**		1	1 unit	1BK
	**2-pole** For TN-S and TT systems With remote signaling	4		**5SD7412-1**		1	1 unit	1BK
	**3-pole** For TN-C systems With remote signaling	6		**5SD7413-1**		1	1 unit	1BK
	**4-pole** For TN-S and TT systems With remote signaling	8		**5SD7414-1**		1	1 unit	1BK
Replacement plugs								
	**N-PE:** • 5SD7412-1 • 5SD7414-1			**5SD7418-0**		1	1 unit	1BK
	**L-N / L-PEN:** • 5SD7412-1 • 5SD7413-1 • 5SD7414-1			**5SD7418-1**		1	1 unit	1BK

[1] No modular installation device.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Combination surge arresters, type 1 + type 2 are compact designs comprising lightning arresters (type 1) and surge arresters (type 2). They protect low-voltage systems against overvoltages triggered by lightning strikes or by switching operations in the network.

A thermal isolating arrester for the varistors offers a high degree of protection against overload. The protective modules are available as connectors. All combination surge arresters have a remote signaling contact, which signals if the device fails.

Technical specifications

			5SD7442-1	5SD7443-1	5SD7444-1
Standards			IEC 61643-11; EN 61643-11		
Approvals			KEMA, UL/cUL		
Rated voltage U_N		V AC	240	240/415	
Rated arrester voltage U_C		V AC	350		
Lightning impulse current I_{imp} (10/350 µs)					
• L-N or L-(PE)N		kA	25	25	25
• N-PE		kA	100	--	100
Rated discharge surge current I_n (8/20 µs)					
• L-N or L-(PE)N		kA	25	25	25
• N-PE		kA	100	--	100
Protection level U_p					
• L-(PE)N		kV	≤ 1.50	≤ 1.50	≤ 1.50
• L-PE		kV	≤ 2.20	--	≤ 2.20
• N-PE		kV	≤ 1.50	--	≤ 1.50
Follow current discharge capacity I_{fi} (AC)					
• L-N or L-(PE)N		kA	25	25	25
• N-PE		kA	100	--	100
Response time t_A					
• L-N or L-(PE)N		ns	≤ 25	≤ 25	≤ 25
• L-(N)-PE		ns	≤ 100	--	≤ 100
Max. back-up fuse	Acc. to IEC 61643-1				
• For stub wiring		A	315 gL/gG		
• For V-wiring		A	125 gL/gG		
Short-circuit withstand current					
With max. back-up fuse		kA	25		
Temperature range		°C	-40 ... +80		
Degree of protection			IP20, with connected conductors		
Conductor cross-section					
• Finely stranded		mm^2	2.5 ... 25		
• Solid		mm^2	2.5 ... 35		
Mounting width	Acc. to DIN 43880	MW	4	6	8
Visual function/fault indication			Yes		

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5SD7 combination surge arresters, type 1 + type 2

Selection and ordering data

	Version	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Combination surge arresters								
	**2-pole** For TN-S and TT systems With remote signaling	4		**5SD7442-1**		1	1 unit	1BK
	**3-pole** For TN-C systems With remote signaling	6		**5SD7443-1**		1	1 unit	1BK
	**4-pole** For TN-S and TT systems With remote signaling	8		**5SD7444-1**		1	1 unit	1BK
Replacement plugs								
	**N-PE:** • 5SD7442-1 • 5SD7444-1			**5SD7418-0**		1	1 unit	1BK
	**L-N / L-PEN (type 2):** • 5SD7442-1 • 5SD7443-1 • 5SD7444-1			**5SD7428-1**		1	1 unit	1BK
	**L-N / L-PEN (type 1):** • 5SD7442-1 • 5SD7443-1 • 5SD7444-1			**5SD7448-1**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Combination surge arresters type 1 / type 2 are compact designs which can be used as both lightning arresters type 1 and surge arresters type 2.

They protect low-voltage systems against overvoltages triggered by lightning strikes or by switching operations in the network.

A thermal isolating arrester for the varistors offers a high degree of protection against overload. The protective modules are available as connectors. The combination surge arresters can be fitted either with or without a remote signaling contact, which signals if the device fails.

Technical specifications

		5SD7411-2	5SD7412-2	5SD7413-2 5SD7413-3	5SD7414-2 5SD7414-3	5SD7483-6
Standards **Approvals**		IEC 61643-11	KEMA			EN 50539
Rated voltage U_N	V AC	690	240	240/415		--
Rated arrester voltage U_C						
• L-L-N, N-PE, L-(PE)N	V	800 AC	335 AC			1000 DC
Lightning impulse current I_{imp} (10/350 µs)						
• L-N or L-(PE)N	kA	35	12.5	12.5	12.5	≤ 5
• N-PE	kA	--	50	--	50	--
Rated discharge surge current I_n (8/20 µs)						
• L-N or L-(PE)N	kA	35	12.5	12.5	12.5	15
• N-PE	kA	--	50	--		--
Max. discharge surge current I_{max} (8/20 µs)						
• L-N	kA	100	12.5	50	50	40
• N-PE	kA	--	50	--	50	--
Protection level U_p						
• L-(PE)N	kV	≤ 4.50	≤ 1.20	≤ 1.20	≤ 1.20	≤ 3.50
• L-PE	kV	--	--	--	≤ 2.0	--
• N-PE	kV	--	≤ 1.70	--	≤ 1.70	--
Response time t_A						
• L-N or L-(PE)N	ns	≤ 100	≤ 25			
• L-(N)-PE	ns	--	≤ 100	--	≤ 100	≤ 25
Max. back-up fuse acc. to IEC 61643-1						
• For stub wiring	A	400 gL/gG	160 gL/gG			--
• For V-wiring	A	125 gL/gG	80 gL/gG			--
Short-circuit withstand current With max. back-up fuse	kA	50	25			
Temperature range	°C	-40 ... +80				
Degree of protection		IP20, with connected conductors				
Conductor cross-section						
• Finely stranded	mm^2	16 ... 50	1.5 ... 25			
• Solid	mm^2	16 ... 50	1.5 ... 35			

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Combination surge arresters								
	**1-pole** With remote signaling	--[1]		**5SD7411-2**		1	1 unit	1BK
	**2-pole** For TN-S and TT systems • Without remote signaling	2		**5SD7412-2**		1	1 unit	1BK
	**3-pole** For TN-C systems • Without remote signaling • With remote signaling	3 3		**5SD7413-2** **5SD7413-3**		1 1	1 unit 1 unit	1BK 1BK
	**4-pole** For TN-S and TT systems • Without remote signaling • With remote signaling	4 4		**5SD7414-2** **5SD7414-3**		1 1	1 unit 1 unit	1BK 1BK
For photovoltaic systems								
	**3-pole, plug-in** For protecting the DC part of **photovoltaic systems** up to 1000 V DC acc. to EN 50539-11 • Without remote signaling	3		**5SD7483-6**		1	1 unit	1BK
Replacement plugs								
	**N-PE:** • 5SD7412-2, 5SD7412-3 • 5SD7414-2, 5SD7414-3			**5SD7418-2**		1	1 unit	1BK
	**L-N / L-PEN:** • 5SD7412-2, 5SD7412-3 • 5SD7413-2, 5SD7413-3 • 5SD7414-2, 5SD7414-3			**5SD7418-3**		1	1 unit	1BK
	**L-PE (PV):** • 5SD7483-6, 5SD7483-7			**5SD7498-3**		1	1 unit	1BK

[1] No modular installation device.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Surge arresters type 2 are used downstream of lightning arresters type 1 in main distribution boards or sub-distribution boards. They protect low-voltage systems against transient overvoltages, such as those triggered by switching operations.

A thermal isolating arrester for the varistors offers a high degree of protection against overload. The protective modules are available as connectors. The surge arresters have an optional remote signaling contact, which signals if the device fails.

Technical specifications

		Standard design						
		N-PE						
		5SD7481-0	5SD7461-0 5SD7461-1	5SD7481-1	5SD7463-0 5SD7463-1	5SD7464-0 5SD7464-1	5SD7473-1	5SD7483-5
Standards **Approvals**		IEC 61643-11; EN 61643-11 KEMA					--	KEMA, UL/cUL
Rated voltage U_N	V AC	240/415	240/415	400/690	240/415	240/415	400/690	554/960
Rated arrester voltage U_C								
• L-N or L-(PE)N	V AC	--	350	800	350	350	580	760
• N-PE	V AC	260	--	--	--	260	--	--
Rated discharge surge current I_n (8/20 µs)								
• L-N or L-(PE)N	kA	--	20	15	20	20	15	15
• N-PE	kA	20	--	--	--	20	--	--
Max. discharge surge current I_{max} (8/20 µs)								
• L-N or L-(PE)N	kA	--	40	30	40	40	30	30
• N-PE	kA	40	--	--	--	40	--	--
Protection level U_p								
• L-(PE)N	kV	--	≤ 1.50	≤ 5	≤ 1.50	≤ 1.60	≤ 2.50	≤ 2.90
• L-PE	kV	--	--	--	--	≤ 1.90	--	--
• N-PE	kV	≤ 1.50	--	--	--	≤ 1.50	--	--
Response time t_A								
• L-N or L-(PE)N	ns	--	≤ 25	≤ 100	≤ 25	≤ 25	≤ 25	≤ 25
• N-PE	ns	≤ 100	--	--	--	≤ 100	--	--
Max. back-up fuse acc. to IEC 61643-1								
• For stub wiring	A	--	125 gL/gG	100 gL/gG	125 gL/gG			100 gL/gG
• For V-wiring	A	--	--	80 gL/gG	80 gL/gG			80 gL/gG
Short-circuit withstand current With max. back-up fuse	kA	25						
Temperature range	°C	-40 ... +80						
Degree of protection		IP20, with connected conductors						
Conductor cross-section								
• Finely stranded	mm^2	1.5 ... 25						
• Solid	mm^2	1.5 ... 35						
Mounting width acc. to DIN 43880	MW	1	1	2	3	4	3	3
Visual function/fault indication		Yes						

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5SD7 surge arresters, type 2

			Narrow design		
			5SD7422-0 5SD7422-1	5SD7424-0 5SD7424-1	5SD7424-2 5SD7424-3
Standards **Approvals**			IEC 61643-11; EN 61643-11 KEMA/UL/cUL		KEMA
Rated voltage U_N		V AC	240	240/415	240/415
Rated arrester voltage U_C					
• L-N or L-(PE)N		V AC	350	350	350
• N-PE		V AC	264	264	264
Rated discharge surge current I_n (8/20 µs)					
• L-N or L-(PE)N		kA	20	20	20
• N-PE		kA	20	20	40
Max. discharge surge current I_{max} (8/20 µs)					
• L-N or L-(PE)N		kA	40	40	40
• N-PE		kA	40	40	80
Protection level U_p					
• L-(PE)N		kV	≤ 1.50	≤ 1.50	≤ 1.50
• L-PE		kV	≤ 1.90	≤ 1.90	≤ 1.90
• N-PE		kV	≤ 1.50	≤ 1.50	≤ 1.50
Response time t_A					
• L-N		ns	≤ 25	≤ 25	≤ 25
• N-PE		ns	≤ 100	≤ 100	≤ 100
Max. back-up fuse	Acc. to IEC 61643-1				
• For stub wiring		A	315 gL/gG		
• For V-wiring		A	63 gL/gG		
Short-circuit withstand current					
With max. back-up fuse		kA	25	25	25
Temperature range		°C	-40 ... +80		
Degree of protection			IP20, with connected conductors		
Conductor cross-section					
• Finely stranded		mm^2	1.5 ... 16		
• Solid		mm^2	1.5 ... 25		
Mounting width	Acc. to DIN 43880	mm	26	50	50
Visual function/fault indication			Yes		

Selection and ordering data

	Version	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	d					
Surge arresters, standard design								
	**1-pole, N-PE**							
	• Without remote signaling	1		**5SD7481-0**		1	1 unit	1BK
	**1-pole**							
	• Without remote signaling	1		**5SD7461-0**		1	1 unit	1BK
	• With remote signaling	1		**5SD7461-1**		1	1 unit	1BK
	• With remote signaling	2		**5SD7481-1**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Mounting width MW	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**3-pole, 3+0 circuit**							
	For TN-C systems							
	• Without remote signaling	3		**5SD7463-0**		1	1 unit	1BK
	• With remote signaling	3		**5SD7463-1**		1	1 unit	1BK
	For IT systems							
	• With remote signaling	3		**5SD7473-1**		1	1 unit	1BK
	• With remote signaling	3		**5SD7483-5**		1	1 unit	1BK
	**4-pole, 3+1 circuit**							
	For TN-S and TT systems							
	• Without remote signaling	4		**5SD7464-0**		1	1 unit	1BK
	• With remote signaling	4		**5SD7464-1**		1	1 unit	1BK
Replacement plugs								
	**N-PE:** • 5SD7481-0 • 5SD7464-0, 5SD7464-1			**5SD7488-0**		1	1 unit	1BK
	L-N / L-PEN: • 5SD7461-0, 5SD7461-1 • 5SD7463-0, 5SD7463-1 • 5SD7464-0, 5SD7464-1			**5SD7468-1**		1	1 unit	1BK
	L-PEN: • 5SD7481-1, • 5SD7483-5			**5SD7488-2**		1	1 unit	1BK
	L-PEN: • 5SD7481-1			**5SD7488-4**		1	1 unit	1BK
	L-PE (IT/PV): • 5SD7473-0, 5SD7473-1 • 5SD7483-0, 5SD7483-1			**5SD7498-1**		1	1 unit	1BK

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5SD7 surge arresters, type 2

	Version	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	d					
Surge arresters, narrow design								
	**2-pole** For TN-S and TT systems							
	- Without remote signaling	24 (1 1/3)		**5SD7422-0**		1	1 unit	1BK
	- With remote signaling	24 (1 1/3)		**5SD7422-1**		1	1 unit	1BK
	**4-pole** For TN-S and TT systems							
	- Without remote signaling	48 (2 2/3)		**5SD7424-0**		1	1 unit	1BK
	- With remote signaling	48 (2 2/3)		**5SD7424-1**		1	1 unit	1BK
	- Without remote signaling	48 (2 2/3)		**5SD7424-2**		1	1 unit	1BK
	- With remote signaling	48 (2 2/3)		**5SD7424-3**		1	1 unit	1BK
Replacement plugs								
	**N-PE:** • 5SD7422-0, 5SD7422-1 • 5SD7424-0, 5SD7424-1			**5SD7428-0**		1	1 unit	1BK
	**N-PE:** • 5SD7424-2, 5SD7424-3			**5SD7428-2**		1	1 unit	1BK
	**L-N / L-PEN:** • 5SD7422-0, 5SD7422-1 • 5SD7423-0, 5SD7423-1 • 5SD7424-0, 5SD7424-1			**5SD7428-1**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Type 3 surge arresters are installed downstream of type 2 surge arresters in sub-distribution boards as close as possible to the load. The protective modules are available as connectors. In the event of a power failure, a remote signal is output over an opto-coupler with open collector output.

Technical specifications

			2-pole			4-pole
			5SD7432-1	5SD7432-2	5SD7432-4	5SD7434-1
Standards			IEC 61643-11; EN 61643-11			
Approvals			KEMA/UL/cUL			--
Rated voltage U_N		V AC	230	120	24	230/400
Rated load current I_L (at 30 °C)		A	26	26	26	3 × 26
Rated arrester voltage U_C		V AC	264	150	34	335
Rated discharge surge current I_n (8/20 µs)		kA	3	3	1	1.5
Combined surge U_{oc}		kV	6	6	2	4
Protection level U_p	L-N / L-PE, N-PE	V	≤ 1350/≤ 1500	≤ 850/≤ 950	≤ 250/≤ 650	≤ 1200/≤ 1500
Response time t_A		ns	≤ 100	≤ 100	≤ 100	≤ 100
Required back-up fuse, max.		A (gG/B/C)	25	25	25	25
Temperature range		°C	-40 ... +80			
Degree of protection			IP20, with connected conductors			
Conductor cross-section						
• Finely stranded		mm^2	0.2 ... 2.5			
• Solid		mm^2	0.2 ... 4			
Mounting width	Acc. to DIN 43880	MW	1	1	1	2
Visual function/fault indication			Yes			

Selection and ordering data

	Version	Rated voltage U_N	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	MW	d					
	Surge arresters, plug-in								
	• 2-pole								
	With remote signaling	24	1		**5SD7432-4**		1	1 unit	1BK
		120	1		**5SD7432-2**		1	1 unit	1BK
		230	1		**5SD7432-1**		1	1 unit	1BK
	• 4-pole								
	With remote signaling	230/400	2		**5SD7434-1**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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More information

Selection of overvoltage protection devices

Situation Which type of building do you want to protect? Generally speaking, all our devices are suitable for residential buildings, office buildings, industrial and commercial buildings.	Systems	Basic protection For installation in main distribution boards or in combined main/sub-distribution boards
Low-risk buildings  - No outer lightning protection - Power supply via ground conductor	**TN-S and TT system**	**Surge arresters, type 2** 5SD7424-2, 5SD7424-3 **Combination surge arresters, type 1 / type 2** 5SD7414-2, 5SD7414-3 
	TN-C system	**Surge arresters, type 2** 5SD7463-0, 5SD7463-1 **Combination surge arresters, type 1 / type 2** 5SD7413-2, 5SD7413-3 
High-risk buildings  - Outer lightning protection system  - Power supply via overhead lines  - Grounded antenna structures	**TN-S and TT system**	**Lightning arresters, type 1** 5SD7414-2, 5SD7414-3, 5SD7414-1 
	TN-C system	**Lightning arresters, type 1** 5SD7413-2, 5SD7413-3, 5SD7413-1 
	TN-S and TT system	**Combination surge arresters, type 1 + type 2** 5SD7444-1 
	TN-C system	**Combination surge arresters, type 1 + type 2** 5SD7443-1, 5SD7441-1 
	IT systems without N conductor incorporated in the cable	Typically, IT systems are only installed in special building sections. In the area of the main distribution board, TN-C, TN-S or TT systems are generally still used. In this case, the protective devices shown above must be installed.

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Medium protection For installation upstream of counters in main distribution boards or in combined main/sub-distribution boards	Fine protection For installation directly upstream of the terminal equipment
Surge arresters, type 2 5SD7424-0, 5SD7424-1, 5SD7464-0, 5SD7464-1  Only required if the distance between the main and sub-distribution boards is **> 10 m**	 **Surge arresters, type 3** For installation in sub-distribution boards or control cabinets 5SD7432-x and 5SD7434-1 With remote signaling
Surge arresters, type 2 5SD7463-0, 5SD7463-1  Only required if the distance between the main and sub-distribution boards is **> 10 m**	
Surge arresters, type 2 5SD7424-0, 5SD7424-1, 5SD7464-0, 5SD7464-1 	
Surge arresters, type 2 5SD7463-0, 5SD7463-1 	
Surge arresters, type 2 5SD7424-0, 5SD7424-1, 5SD7464-0, 5SD7464-1  Only required if the distance between the main and sub-distribution boards is **> 10 m**	
Surge arresters, type 2 5SD7463-0, 5SD7463-1  Only required if the distance between the main and sub-distribution boards is **> 10 m**	
Surge arresters, type 2 5SD7473-1 3-pole, (3+0 circuit) U_c = 580 V AC 	

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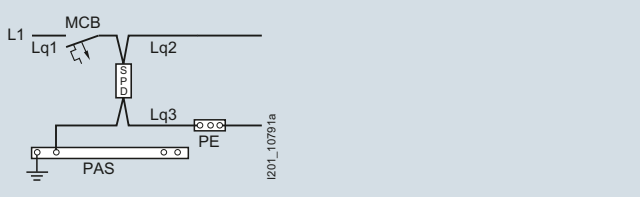
Configuration

Dimensioning of conductor cross-sections

The different conductor cross-sections (Lq 1 to Lq 3) must be dimensioned according to the rated current of the miniature circuit breaker or of the fuse.

V-wiring



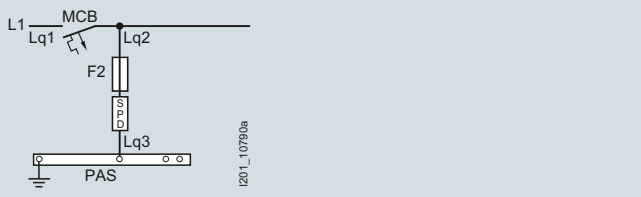
a) Protection of the SPD using miniature circuit breakers



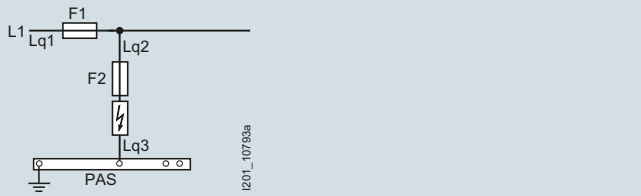
b) Protection of the SPD using fuses

PAS = Equipotential bonding strip

Stub wiring



a) Protection of the SPD using miniature circuit breakers



b) Protection of the SPD using fuses

Conductor cross-sections for lightning arresters (type 1) and combination surge arresters (type 1 + type 2) for V-wiring

MCB/fuse (F1) upstream [A gL/gG]	Lq 2 [mm²]	Lq 3 [mm²]
25	10	16
35	10	16
40	10	16
50	10	16
63	10	16
80	16	16
100	25	16
125	35	16

Conductor cross-sections for surge arresters (type 2) for V-wiring

MCB/fuse (F1) upstream [A gL/gG]	Lq 2 [mm²]	Lq 3 [mm²]
25	6	6
35	6	6
40	6	6
50	10	10
63	10	10

Conductor cross-sections for lightning arresters (type 1) and combination surge arresters (type 1 + type 2) for stub wiring

MCB/fuse (F1) upstream [A gL/gG]	Lq 2 [mm²]	Lq 3 [mm²]	F2 fuse [A gL/gG]
25	6	16	/
35	10	16	/
40	10	16	/
50	10	16	/
63	10	16	/
80	10	16	/
100	16	16	/
125	16	16	/
160	25	25	/
200	35	35	160[1)]
250	35	35	160[1)]
315	50	50	160[1)]
> 315	50	50	160[1)]

[1)] Recommended fuse.

Conductor cross-sections for surge arresters (type 2) for stub wiring

MCB/fuse (F1) upstream [A gL/gG]	Lq 2 [mm²]	Lq 3 [mm²]	F2 fuse [A gL/gG]
25	6	6	/
32	6	6	/
40	6	6	/
50	6	6	/
63	10	10	/
80	10	10	/
100	16	16	/
125	16	16	/
> 125	16	16	125

In the case of surge arresters type 3, the following conductor cross-sections are generally used:

- Rigid: up to 4 mm²
- Flexible: up to 2.5 mm²

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The surge arresters for measuring and control technology are overvoltage protection modules that comprise two parts, a basic element and a plug-in part. Their application area is the protection of signal circuits.

The cable shields of basic elements can be either directly or indirectly grounded.

The mounting width of the surge arresters is 1 MW.

Through the number of integrated paths, it is possible to protect up to four signal cores or two double cores against overvoltages.

The arresters are made up of two parts (plug-in part and base element).

A mechanical encoding ensures protection against reverse polarity.

Technical specifications

			5SD7502-0KB	5SD7522-7KA 5SD7522-7KB	5SD7530-4KA 5SD7530-4KB	5SD7540-6KB	5SD7541-7KB	5SD7550-4KA 5SD7550-4KB
IEC category/EN type			C1/C2/C3/D1	C1/C2/C3/D1	C1/C2/C3/D1	C1/C2/C3/D1	C1/C2/C3/D1	C1/C2/C3/D1
Maximum continuous voltage U_C								
• Direct voltage		V DC	68	40	14	27	40	14
• AC voltage		V AC	48	28	8.3	18.6	28	9.8
Rated current I_N		mA	2000	450	450	2000	300	450
Lightning test current I_{imp} 10/350 µs	Per path	kA	5	2.5	2.5	2.5	2.5	2.5
Rated discharge current I_n	8/20 µs							
• Core – Core		kA	--	10	10	0.365	--	10
• Core – Ground		kA	20	10	10	0.365	10	10
Total surge current I_N	8/20 µs	kA	40	20	20	20	20	20
Output voltage limit at 1 kV/µs								
• Core – Core		V	--	≤ 55	25	25	--	≤ 25
• Core – Ground		V	≤ 600	≤ 450	40	40	≤ 55	≤ 25
Residual voltage at I_n								
• Core – Core		V	--	≤ 55	--	--	--	≤ 25
• Core – Ground		V	--	--	--	--	≤ 55	≤ 40
Response time t_A								
• Core – Core		ns	--	≤ 1	≤ 500	≤ 1	--	≤ 500
• Core – Ground		ns	≤ 100	≤ 100	≤ 500	≤ 100	≤ 1	≤ 500
Insertion loss a_E								
• Symmetrical in the 50 Ω system		dB	--	Typ. 0.5 (1.5 MHz)	--	0.1 dB to 1 MHz	--	--
• Asymmetrical in the 50 Ω system		dB	0.1 (1 MHz)	--	--	--	0.5 (1.5 MHz)	--
• Symmetrical in the 100 Ω system		dB	--	--	0.2 (5 MHz)	--	--	0.2 (5 MHz)
Limit frequency f_G (3 dB)								
• Symmetrical in the 50 Ω system		MHz	--	Typ. 8	--	6 MHz (typ.)	--	--
• Asymmetrical in the 50 Ω system		MHz	--	--	--	--	Typ. 8	--
• Symmetrical in the 100 Ω system		MHz	--	--	Typ. 70	--	--	Typ. 70
Resistance per path		Ω	--	2.2	--	--	4.7	2.2
Temperature range		°C	-40 ... +85					
Degree of protection acc. to IEC 60529/EN 60529			IP20					
Flammability class acc. to UL 94			V0					
Test standards			EN 61643-21/ EN 61643-21	EN 61643-21/ EN 61643-21	IEC 61643-21/ EN 61643-21	IEC 61643-21/ EN 61643-21	EN 61643-21/ EN 61643-21	IEC 61643-21

KA: Basic element grounded via gas arrester
KB: Basic element directly grounded

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5SD7 surge arresters, for measuring and control technology

			5SD7581-2	5SD7581-3	5SD7581-5	5SD7581-6
IEC category/EN type			B2/C1/C2/C3/D1	B2/C1/C2/C3/D1	B2/C1/C2/C3/D1	B2/C1/C2/C3/D1
Maximum continuous voltage U_C						
• Direct voltage		V DC	185	3.3	12	15
• AC voltage		V AC	128	2.3	8.3	10.4
Rated current I_N		mA	380	1500	380	1000
Rated discharge current I_n	8/20 µs					
• Core – Core		kA	5	0.10	5	0.25
• Core – Ground		kA	5	2	5	0.25
Total surge current I_N	8/20 µs	kA	10	10	10	5
Output voltage limit at 1 kV/µs						
• Core – Core		V	≤ 250	≤ 9	≤ 25	≤ 25
• Core – Ground		V	≤ 250	≤ 700	≤ 700	≤ 650
Residual voltage at I_n						
• Core – Core		V	≤ 120	≤ 15	≤ 25	≤ 55
• Core – Ground		V	≤ 120	≤ 700	≤ 55	≤ 700
Response time t_A						
• Core – Core		ns	≤ 100	≤ 1	≤ 100	≤ 1
• Core – Ground		ns	≤ 100	≤ 100	≤ 100	≤ 100
Insertion loss a_E						
• Symmetrical in the 50 Ω system		dB	--	--	--	--
• Asymmetrical in the 50 Ω system		dB	--	--	--	--
• Symmetrical in the 100 Ω system		dB	--	≤ 1	0.3	--
Temperature range		°C	-40 ... +85			
Degree of protection acc. to IEC 60529/EN 60529			IP20			
Test standards			EN 61643-21	EN 61643-21	EN 61643-21	EN 61643-21

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Surge arresters							
	**Coarse protection for 2 single-sided grounded signal lines**		**5SD7502-0KB**		1	1 unit	1BK
	Protection for 2-wire signal circuits grounded via gas arresters		**5SD7522-7KA**		1	1 unit	1BK
	Protection for 2-wire signal circuits grounded directly		**5SD7522-7KB**		1	1 unit	1BK
	Protection for 2 signal cores with shared reference potential, grounded via gas arresters		**5SD7530-4KA**		1	1 unit	1BK
	Protection for 2 signal cores with shared reference potential, grounded directly		**5SD7530-4KB**		1	1 unit	1BK
	Protection for one 4-wire signal circuit, operated without potential to ground, grounded directly		**5SD7540-6KB**		1	1 unit	1BK
	Protection for 4 signal cores with shared reference potential, grounded directly		**5SD7541-7KB**		1	1 unit	1BK
	Protection for fieldbus systems and signal circuits in 3-wire or 4-wire method, grounded via gas arresters		**5SD7550-4KA**		1	1 unit	1BK
	Protection for fieldbus systems and signal circuits in 3-wire or 4-wire method, grounded directly		**5SD7550-4KB**		1	1 unit	1BK
	**Overvoltage protection for analog and digital telecommunication interfaces, connection: RJ45**		**5SD7581-2**		1	1 unit	1BK
	**Overvoltage protection for Ethernet interfaces up to 10 Gbits**		**5SD7581-3**		1	1 unit	1BK
	**D-SUB-9 intermediate connectors with overvoltage protection for RS 485 interfaces**		**5SD7581-5**		1	1 unit	1BK
	**D-SUB-9 intermediate connectors with overvoltage protection for V.24 interface**		**5SD7581-6**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Notes

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For further technical product information:

Configuration Manual

Switch disconnectors
Article No.: 3ZW1012-3NP11-0AC1

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
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FAQ
Manual
Product note
Software archive
Technical data

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Switch Disconnectors

Introduction

Overview

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Fuseless switch disconnectors			
 3LD3	**Main control and EMERGENCY-STOP switches from 16 A to 250 A** Main control and EMERGENCY-STOP switches from 16 A to 63 A NEW • Front/floor mounting, door-coupling rotary operating mechanism and mounting in distribution boards • Front mounting via center hole mounting • 3 and 4-pole versions Main control and EMERGENCY-STOP switches from 16 A to 250 A • Front/floor mounting, door-coupling rotary operating mechanism, distribution board mounting and in molded-plastic enclosures • Front mounting with four-hole and center hole arrangement • 3, 4 and 6-pole versions • 3 and 4-pole load transfer switches • DC isolators 800 V DC	**3LD** 3LD3 3LD2	7/3
 3LD2			
	**Switch disconnectors from 100 A to 200 A** • For floor and distribution board mounting • 2, 3 and 4-pole versions	**5TE1**	7/82
	**Switch disconnectors up to 1600 A** • Compact design allowing it to be used where space is limited. • Complete assemblies: 3 and 4-pole switch disconnectors with front operating mechanisms, connections in form of box terminal or flat terminal including direct operating mechanism with gray handle • Basic units for individual configuration, with front operating mechanism without handle, 3 and 4-pole variants, connection by box terminal or flat terminal, operating mechanism module in center or on left-hand side of switch disconnector	**3KD**	7/45
	**Switch disconnectors from 63 A to 1000 A** • Devices for floor mounting with handle, with door-coupling rotary operating mechanism, in molded-plastic enclosures and for mounting in control cabinet side panels • 3 and 4-pole versions • Accessories for use as load transfer switches and parallel switches	**3KA, 3KE**	7/87
	**Switch disconnectors from 160 A to 1600 A** • Compact design allowing it to be used where space is limited. • 3 and 4-pole versions • Coordinated, comprehensive range of accessories for greater functionality, e.g. - Motorized operating mechanisms - Shunt and undervoltage releases for remote control - Switching state interrogation by means of auxiliary and alarm switches	**3VT**	7/98
Switch disconnectors with fuses			
	**Switch disconnectors with fuses up to 800 A** NEW • Devices for floor mounting and for mounting in control cabinet side panels • 3 and 4-pole versions • Complete assemblies: Connections by box terminal or flat terminal including direct operating mechanism • Basic units for individual configuration, with front operating mechanism without handle, rotary operating mechanism, connection by box terminal or flat terminal, operating mechanism module in center or on left-hand side of switch disconnector • Suitable for LV HRC fuses	**3KF**	7/122
	**Switch disconnectors with fuses up to 800 A** • Devices for floor mounting with door-coupling rotary operating mechanism and for mounting in control cabinet side panels • 3KM versions with isolating plug connector for mounting on vertical busbars • 3 and 4-pole versions • Suitable for LV HRC and BS 88 fuses	**3KL, 3KM**	7/148
	**In-line switch disconnectors with fuses, plug-in type, up to 630 A** • 2, 3 and 4-pole versions • Suitable for LV HRC and BS 88 fuses • Manually operated or with motorized operating mechanism • Optionally with integrated current transformers, auxiliary switches, and electronic fuse monitoring	**3NJ62**	7/165
Fuse switch disconnectors			
	**3NP fuse switch disconnectors** • Rated current up to 630 A • Connection components are available for flat connection, saddle terminal connection, prism terminal connection and box terminal connection • Electromechanical and electronic fuse monitoring with/without network monitoring function • Mounting versions for floor mounting and 40/60 mm busbar system	**3NP1, 3NP5**	7/200
	**In-line fuse switch disconnectors up to 2000 A** • 1 and 3-pole switchable versions • Versions for secondary-side protection of transformers • In-line infeed block versions up to 2000 A with isolating blades • Connection components are available for flat connection, stud bolt connection, saddle terminal connection, prism terminal connection and box terminal connection • Versions with/without integratable current transformer • Versions with/without electronic fuse monitoring	**3NJ4, 3NJ5**	7/233

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

3LD3 switch



3LD2 switch



The 3LD main control and EMERGENCY-STOP switches are manually operated switch disconnectors according to IEC 60947-3/VDE 0660 Part 107 (EN 60947-3) and comply with the conditions for switch disconnectors.

In EN 60204-1 (VDE 0113 Part 1), these are called "disconnector units", while EMERGENCY-STOP switches are termed "devices for emergency shutdown".

The 3LD2 switches for 16 to 250 A are approved according to UL 508 and can be used as "manual motor controllers" and "motor disconnects". In addition, the 3LD switch disconnectors have CCC certification.

Maintenance personnel can protect themselves against unauthorized startup with padlocks (up to three can be fitted).

The 3LD switches can be used in any mounting position.

Application

The 3LD switches are used for switching main and auxiliary circuits, but also for switching three-phase motors and other devices during maintenance and repair work.

They can be used as:

- ON-OFF switches
- EMERGENCY-STOP switches
- Main control switches according to EN 60204-1 (3LD2 only)

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General data

Overview

Type (rated current I_n)		3LD30 (16 A)	3LD20 (16 A)	3LD31 (25 A)	3LD21 (25 A)	3LD32 (32 A)
Operating mechanism, red/yellow						
Operating mechanism, black						
Mounting type						
Front mounting						
• Center-hole mounting		✓	✓	✓	✓	✓
• Four-hole mounting		--	✓	--	✓	--
Floor mounting						
• Center-hole mounting		✓	✓	✓	✓	✓
• Four-hole mounting		--	✓	--	✓	--
Types of use						
Distribution board mounting		✓	✓	✓	✓	✓
Molded-plastic enclosure		--	✓	--	✓	--
DC isolator		--	--	--	--	--
Transfer switch, see chapter "Transfer Switching Equipment and Load Transfer Switches"		--	--	--	✓	--
Technical features						
Number of poles						
• 3-pole		✓	✓	✓	✓	✓
• 4-pole		✓	✓	✓	✓	✓
• 6-pole		--	--	--	✓	--
Short-circuit behavior						
• Rated conditional short-circuit current with upstream fuses at AC 50/60 Hz, 690 V	kA rms	6	50	6	50	6
• Rated short-time withstand current (1 s current, rms value)	A	500	340	500	640	500
Endurance mechanical (operating cycles)		100000	100000	100000	100000	100000
Switching frequency	1/h	50	50	50	50	50
Conductor cross-sections for main conductors [1]						
• Solid or stranded	mm^2	1x (2.5 ... 16 mm^2)	1 ... 6	1x (2.5 ... 16 mm^2)	1.5 ... 16	1x (2.5 ... 16 mm^2)
• Finely stranded with end sleeve (max.)	mm^2	1x (2.5 ... 16 mm^2)	4	1x (2.5 ... 16 mm^2)	10	1x (2.5 ... 16 mm^2)
• Conductor cross-sections	AWG	14 ... 6	18 ... 10	14 ... 6	14 ... 8	14 ... 6
• Torque for terminal	Nm	3	1.5 ... 2	3	2 ... 2.5	3
Accessories						
Auxiliary switches						
• 1 NO + 1 NC		✓	✓	✓	✓	✓
• 2 NO		--	✓	--	✓	--
Further accessories						
• 4th pole		✓	--	✓	✓	✓
• N or PE terminals		✓	✓	✓	✓	✓

[1] Depending on the cable infeed, only small cross-sections are possible with 3LD2 devices in molded-plastic enclosures.

✓ Available
-- Not available

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3LD22 (32 A)	3LD33 (40 A)	3LD34 (63 A)	3LD25 (63 A)	3LD27 (100 A)	3LD28 (125 A)	3LD23 (160 A)	3LD24 (250 A)
							
							
✓	✓	✓	✓	--	--	--	--
✓	--	--	✓	✓	✓	✓	✓
✓	--	✓	✓	--	--	--	--
✓	--	--	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓	✓
✓	--	--	✓	✓	✓	--	--
✓	--	--	--	--	--	--	--
✓	--	--	✓	✓	--	✓	✓
✓	✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	--	--	✓	✓
✓	--	--	✓	--	--	✓	✓
50	6	6	50	50	20	50	50
640	1000	1000	1260	2000	2000	4000	4000
100000	100000	100000	100000	100000	100000	100000	100000
50	50	50	50	50	50	50	50
1.5 ... 16	1x (2.5 ... 16 mm²)	1x (2.5 ... 16 mm²)	2.5 ... 35	4 ... 50	4 ... 50	16 ... 185	16 ... 185
10	1x (2.5 ... 16 mm²)	1x (2.5 ... 16 mm²)	16	35	35	150	150
14 ... 8	14 ... 6	14 ... 6	14 ... 6	12 ...1	12 ...1		
2 ... 2.5	3	3	2.5 ... 3	2.5 ... 3	2.5 ... 3	9.5 ... 60	9.5 ... 60
✓	✓	✓	✓	✓	✓	✓	✓
✓	--	--	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓	✓

✓ Available
-- Not available

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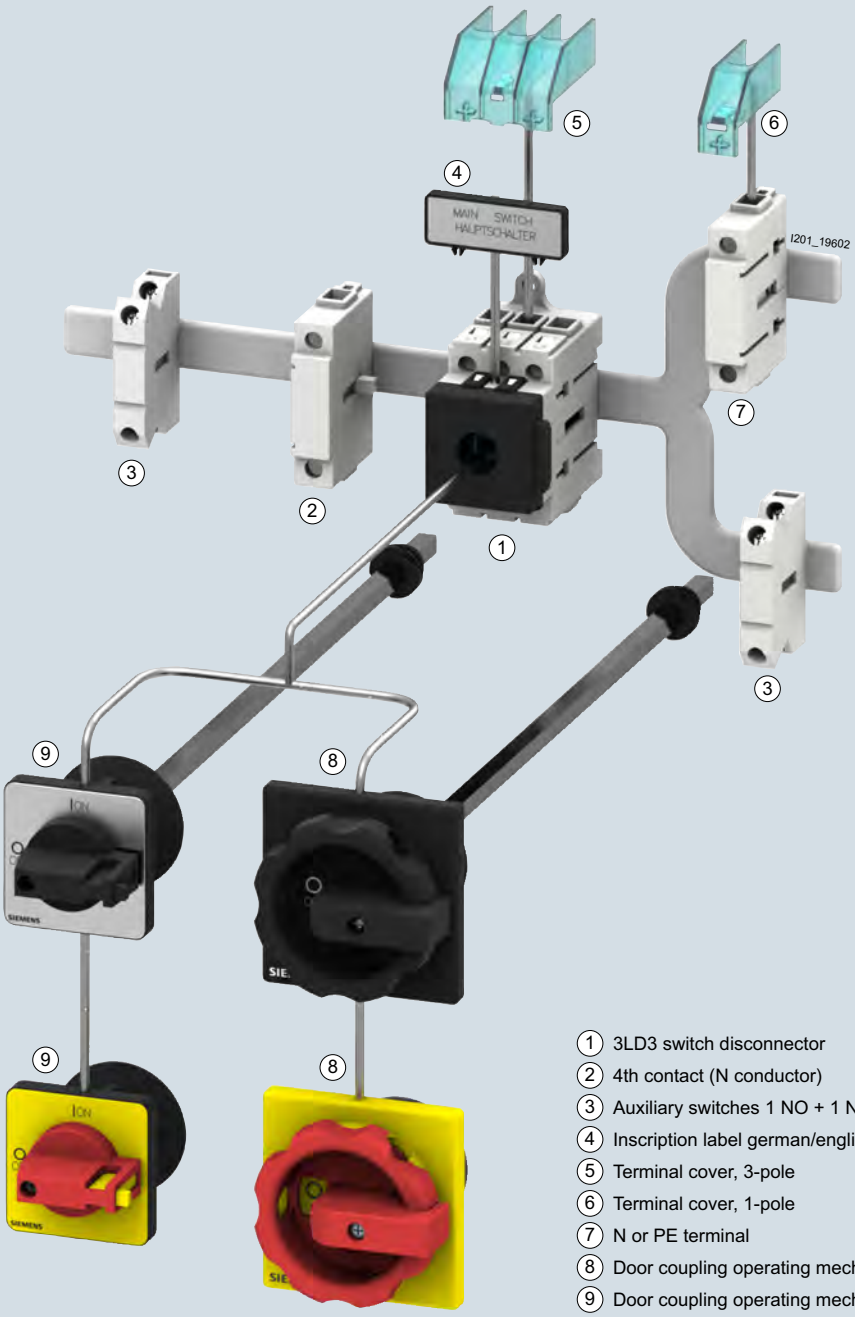
Overview



1. 3LD3 switch disconnector
2. 4th contact (N conductor)
3. Auxiliary switches 1 NO + 1 NC, for mounting on side left and/or right
4. Inscription label german/english
5. Terminal cover, 3-pole
6. Terminal cover, 1-pole
7. N or PE terminal
8. Door coupling operating mechanism
9. Door coupling operating mechanism

The 3LD3 main control and EMERGENCY-STOP switches are suitable for a current range from 16 to 63 A. As main control switches for small tools, as load EMERGENCY-STOP switches and as load maintenance switches, they meet all the relevant IEC requirements.

Versions and accessories

- One size with box terminal in 3 and 4-pole version
- Installation via front and floor mounting or distribution board mounting
- Auxiliary switches for querying the switch positions
- Door-coupling rotary operating mechanism for operation of switch disconnector outside the control cabinet door

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits

- Compact, narrow design saves space
- Flexibility thanks to numerous application options
- Locking capability during maintenance work
- A wide range of accessories available
- Comprehensive support through provision of CAx data

Application

The 3LD3 switches are used for switching machines as well as three-phase motors and other loads in cases of maintenance and repair.

The 3LD3 switches can be used as follows:

- ON-OFF switches
- EMERGENCY-STOP switches

Design

Design of the contacts

Each switch has three adjacent contact elements. A 4th leading contact for switching the N conductor, a continuous PE terminal, an auxiliary switch (1 NO + 1 NC) can be fitted to each side of the switch. The auxiliary switches operate as leading contacts on opening. On opening, the NO contact opens before the main contacts, so that a contactor carries the switching capacity in the circuit and the maintenance or safety switch switches at zero current. On closing, the auxiliary switch switches later than or at the same time as the main contacts.

Design of rotary operating mechanisms

The rotary operating mechanisms of the switches for front or floor mounting are mounted on control cabinet doors, or on front or side panels via center-hole mounting with a standard diameter of 22.5 mm and are operated from the outside. In their OFF position, they can be locked with 1 to 3 padlocks with a hasp thickness of 4 to 8 mm.

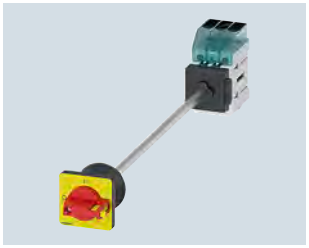
- Switch position indicator:
  The switch position is clearly marked with direction arrows and an "O" for OFF and an "I" for ON at the front.
- Switches for front mounting:
  The switches for front mounting are connected directly to the rotary operating mechanism through the fixing screws or – in the case of center-hole mounting – a special-purpose coupling.
- Switches for floor mounting:
  The switches for floor mounting are snapped onto 35 mm standard mounting rails according to EN 60715 or screw-mounted on mounting plates. The actuators are connected to the lower section of the switch through a door coupling, which can be released in its zero position, and a 300 mm long switch shaft. When the control cabinet door is open, the switch can be protected against inadvertent operation by removing the switch shaft from the lower section of the switch.
  The overall depth can be adapted to individual requirements by adjusting the switch shaft length.
- Switches for distribution board mounting:
  The switches for distribution board mounting are suited for operation in distribution boards and for switching inside control cabinets or distribution boards. They have cap and mounting dimensions to DIN 43880 and can be fitted under the same cover together with miniature circuit breakers. The selector switches can be locked in their OFF position with no more than one padlock with a hasp thickness of 4 to 6 mm.



3LD3050-0TK13 switch for front mounting with rotary operating mechanism



3LD3050-0TK11 switch for front mounting with knob



3LD3040-0TK13 switch for floor mounting with knob and door coupling



3LD3030-0TK11 switch for distribution board mounting with knob



3LD3048-0TK51 switch for floor mounting with rotary operating mechanism and door coupling

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Technical specifications

Article number		3LD30...	3LD31...	3LD32...	3LD33...	3LD34...
Continuous current rated value	A	16	25	32	40	63
Insulation voltage rated value	V	690	690	690	690	690
Operational voltage for AC at 50/60 Hz, rated value	V	690	690	690	690	690
Operating frequency	Hz	50 ... 60	50 ... 60	50 ... 60	50 ... 60	50 ... 60
Impulse withstand voltage rated value	kV	6	6	6	6	6
Short-time withstand current (I_{cw}) / limited to 1 s, rated value	kA	500	500	500	1 000	1 000
Design of fuse link required for short-circuit protection of the main circuit		Fuse gL/gG: 16 A	Fuse gL/gG: 25 A	Fuse gL/gG: 32 A	Fuse gL/gG: 40 A	Fuse gL/gG: 63 A
Conditional short-circuit current with line-side fuse at 690 V via gG fuse, rated value	kA	6	6	6	6	6
Let-through current with closed switch at 690 V for combination switch + gG fuse, maximum permissible	kA	3	3.5	4.5	5	6
Operational power						
• At AC-3 at 240 V, rated value	kW	3	4	5.5	7.5	11
• At AC-3 at 440 V, rated value	kW	5.5	7.5	9.5	11.5	18.5
• At AC-3 at400 V, rated value	kW	5.5	7.5	9.5	11.5	18.5
• At AC-3 at 690 V, rated value	kW	5.5	7.5	9.5	11.5	15
• At AC-23 A at 400 V, rated value	kW	7.5	9.5	11.5	18.5	22
• At AC-23 A at 690 V, rated value	kW	7.5	9	11.5	15	18.5
• At AC-23 A at 240 V, rated value	kW	3	4	6	7.5	11
• At AC-23 A at 440 V, rated value	kW	7.5	9	11.5	15	22
Typical power loss for each conductor	W	0.5	1.1	1.1	1.8	4.5
Typical mechanical endurance (operating cycles)		100 000				
Electrical endurance (operating cycles) at AC-23 A at 690 V at 50/60 Hz		6 000				
Ambient temperature						
• During operation		-25 ... +55				
• During storage		-25 ... +55				
Type of connectable conductor cross-sections						
• Solid for auxiliary contacts		2x (0.75 ... 2.5 mm²), 1x 4 mm²				
• Finely stranded with end sleeve for auxiliary contacts		2x (0.75 ... 1.5 mm²), 1x 2.5 mm²				
• Stranded for auxiliary contacts		2x (0.75 ... 2.5 mm²), 1x 4 mm²				
• Solid for copper conductors		1x (2.5 ... 16 mm²)				
• Stranded for copper conductors		1x (2.5 ... 16 mm²)				
• Finely stranded with end sleeve for copper conductors		1x (2.5 ... 16 mm²)				
Design of electrical connection						
• For main circuit		Box terminal				
• For auxiliary contacts		Terminals				
Auxiliary switches						
Design of fuse link required for short-circuit protection of the auxiliary switch		Fuse gL/gG: 10 A				
Insulation voltage for the auxiliary switch, rated value	V	500				

Minimum order quantity (PS) or a multiple thereof can be ordered.

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NEW 3LD3 main control and EMERGENCY-STOP switches from 16 to 63 A > Front mounting

Selection and ordering data

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 400 V		Color of the operating mechanism	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A	I_u/ AC-21A							
		kW	A		d					
Main control and EMERGENCY-STOP switches with direct operating mechanism (rotary operating mechanism) • Lockable in 0 position with up to 3 padlocks with a hasp thickness of 4 to 8 mm • Degree of protection at front side IP65 • All versions with rotary operating mechanism • Including terminal cover for the infeed side • Front plate 66 x 66 mm										
3	--	7.5	16	Black		**3LD3054-0TK51**		1	1 unit	1CL
	--	7.5	16	Red/yellow		**3LD3054-0TK53**		1	1 unit	1CL
	--	9.0	25	Black		**3LD3154-0TK51**		1	1 unit	1CL
	--	9.0	25	Red/yellow		**3LD3154-0TK53**		1	1 unit	1CL
	--	11.5	32	Black		**3LD3254-0TK51**		1	1 unit	1CL
	--	11.5	32	Red/yellow		**3LD3254-0TK53**		1	1 unit	1CL
	--	15.0	40	Black		**3LD3354-0TK51**		1	1 unit	1CL
	--	15.0	40	Red/yellow		**3LD3354-0TK53**		1	1 unit	1CL
	--	22.0	63	Black		**3LD3454-0TK51**		1	1 unit	1CL
	--	22.0	63	Red/yellow		**3LD3454-0TK53**		1	1 unit	1CL
	1 NC + 1 NO	7.5	16	Black		**3LD3054-1TK51**		1	1 unit	1CL
		7.5	16	Red/yellow		**3LD3054-1TK53**		1	1 unit	1CL
		9.0	25	Black		**3LD3154-1TK51**		1	1 unit	1CL
		9.0	25	Red/yellow		**3LD3154-1TK53**		1	1 unit	1CL
		11.5	32	Black		**3LD3254-1TK51**		1	1 unit	1CL
		11.5	32	Red/yellow		**3LD3254-1TK53**		1	1 unit	1CL
		15.0	40	Black		**3LD3354-1TK51**		1	1 unit	1CL
		15.0	40	Red/yellow		**3LD3354-1TK53**		1	1 unit	1CL
		22.0	63	Black		**3LD3454-1TK51**		1	1 unit	1CL
		22.0	63	Red/yellow		**3LD3454-1TK53**		1	1 unit	1CL
3 + N	--	7.5	16	Black		**3LD3054-0TL51**		1	1 unit	1CL
	--	7.5	16	Red/yellow		**3LD3054-0TL53**		1	1 unit	1CL
	--	9.0	25	Black		**3LD3154-0TL51**		1	1 unit	1CL
	--	9.0	25	Red/yellow		**3LD3154-0TL53**		1	1 unit	1CL
	--	11.5	32	Black		**3LD3254-0TL51**		1	1 unit	1CL
	--	11.5	32	Red/yellow		**3LD3254-0TL53**		1	1 unit	1CL
	--	15.0	40	Black		**3LD3354-0TL51**		1	1 unit	1CL
	--	15.0	40	Red/yellow		**3LD3354-0TL53**		1	1 unit	1CL
	--	22.0	63	Black		**3LD3454-0TL51**		1	1 unit	1CL
	--	22.0	63	Red/yellow		**3LD3454-0TL53**		1	1 unit	1CL
	1 NO + 1 NC	7.5	16	Black		**3LD3054-1TL51**		1	1 unit	1CL
		7.5	16	Red/yellow		**3LD3054-1TL53**		1	1 unit	1CL
		9.0	25	Black		**3LD3154-1TL51**		1	1 unit	1CL
		9.0	25	Red/yellow		**3LD3154-1TL53**		1	1 unit	1CL
		11.5	32	Black		**3LD3254-1TL51**		1	1 unit	1CL
		11.5	32	Red/yellow		**3LD3254-1TL53**		1	1 unit	1CL
		15.0	40	Black		**3LD3354-1TL51**		1	1 unit	1CL
		15.0	40	Red/yellow		**3LD3354-1TL53**		1	1 unit	1CL
		22.0	63	Black		**3LD3454-1TL51**		1	1 unit	1CL
		22.0	63	Red/yellow		**3LD3454-1TL53**		1	1 unit	1CL


3LD3054-1TK51


3LD3054-0TK53


3LD3054-1TL51


3LD3054-0TL53

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3LD3 main control and EMERGENCY-STOP switches from 16 to 63 A > Front mounting NEW

Number and version of the contacts		Rated data at 50 ... 60 Hz, 400 V		Size of front plate	Color of the operating mecha-nism	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A	I_u								
		kW	A	mm		d					

Main control and EMERGENCY-STOP switches with direct operating mechanism (knob-operated mechanism)

- Lockable in 0 position (can be modified to I position) with max. 2 padlocks with a hasp thickness of 4 to 6 mm
- Degree of protection at front side IP65
- Including terminal cover for the infeed side
- Front plate: 48 x 48 mm or 66 x 66 mm

Center-hole mounting Ø 22.5 mm



3LD3050-0TK11



3LD3050-0TK13

3	--	7.5	16	48x48	Black		**3LD3050-0TK11**	1	1 unit	1CL
	--	7.5	16	48x48	Red/yellow		**3LD3050-0TK13**	1	1 unit	1CL
	--	9.0	25	48x48	Black		**3LD3150-0TK11**	1	1 unit	1CL
	--	9.0	25	48x48	Red/yellow		**3LD3150-0TK13**	1	1 unit	1CL
	--	9.0	25	66x66	Black		**3LD3154-0TK51**	1	1 unit	1CL
	--	9.0	25	66x66	Red/yellow		**3LD3154-0TK53**	1	1 unit	1CL
	--	11.5	32	48x48	Black		**3LD3250-0TK11**	1	1 unit	1CL
	--	11.5	32	48x48	Red/yellow		**3LD3250-0TK13**	1	1 unit	1CL
	--	15.0	40	48x48	Black		**3LD3350-0TK11**	1	1 unit	1CL
	--	15.0	40	48x48	Red/yellow		**3LD3350-0TK13**	1	1 unit	1CL
	--	15.0	40	66x66	Black		**3LD3354-0TK51**	1	1 unit	1CL
	--	15.0	40	66x66	Red/yellow		**3LD3354-0TK53**	1	1 unit	1CL
	--	22.0	63	48x48	Black		**3LD3450-0TK11**	1	1 unit	1CL
	--	22.0	63	48x48	Red/yellow		**3LD3450-0TK13**	1	1 unit	1CL
	--	22.0	63	66x66	Black		**3LD3454-0TK51**	1	1 unit	1CL
	--	22.0	63	66x66	Red/yellow		**3LD3454-0TK53**	1	1 unit	1CL
	1 NO + 1 NC	7.5	16	48x48	Black		**3LD3050-1TK11**	1	1 unit	1CL
		7.5	16	48x48	Red/yellow		**3LD3050-1TK13**	1	1 unit	1CL
		9.0	25	48x48	Black		**3LD3150-1TK11**	1	1 unit	1CL
		9.0	25	48x48	Red/yellow		**3LD3150-1TK13**	1	1 unit	1CL
		9.0	25	66x66	Black		**3LD3154-1TK51**	1	1 unit	1CL
		9.0	25	66x66	Red/yellow		**3LD3154-1TK53**	1	1 unit	1CL
		11.5	32	48x48	Black		**3LD3250-1TK11**	1	1 unit	1CL
		11.5	32	48x48	Red/yellow		**3LD3250-1TK13**	1	1 unit	1CL
		15.0	40	48x48	Black		**3LD3350-1TK11**	1	1 unit	1CL
		15.0	40	48x48	Red/yellow		**3LD3350-1TK13**	1	1 unit	1CL
		15.0	40	66x66	Black		**3LD3354-1TK51**	1	1 unit	1CL
		15.0	40	66x66	Red/yellow		**3LD3354-1TK53**	1	1 unit	1CL
		22.0	63	48x48	Black		**3LD3450-1TK11**	1	1 unit	1CL
		22.0	63	48x48	Red/yellow		**3LD3450-1TK13**	1	1 unit	1CL
		22.0	63	66x66	Black		**3LD3454-1TK51**	1	1 unit	1CL
		22.0	63	66x66	Red/yellow		**3LD3454-1TK53**	1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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NEW 3LD3 main control and EMERGENCY-STOP switches from 16 to 63 A > Front mounting

	Number and version of the contacts		Rated data at 50 ... 60 Hz, 400 V		Size of front plate	Color of the operating mecha-nism	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Auxiliary contact elements	P/AC-23A	I_u								
			kW	A	mm		d					
 3LD3050-0TL11	3+N	--	7.5	16	48x48	Black		**3LD3050-0TL11**		1	1 unit	1CL
		--	7.5	16	48x48	Red/yellow		**3LD3050-0TL13**		1	1 unit	1CL
		--	9.0	25	48x48	Black		**3LD3150-0TL11**		1	1 unit	1CL
		--	9.0	25	48x48	Red/yellow		**3LD3150-0TL13**		1	1 unit	1CL
		--	9.0	25	66x66	Black		**3LD3154-0TL51**		1	1 unit	1CL
		--	9.0	25	66x66	Red/yellow		**3LD3154-0TL53**		1	1 unit	1CL
		--	11.5	32	48x48	Black		**3LD3250-0TL11**		1	1 unit	1CL
		--	11.5	32	48x48	Red/yellow		**3LD3250-0TL13**		1	1 unit	1CL
		--	15.0	40	48x48	Black		**3LD3350-0TL11**		1	1 unit	1CL
		--	15.0	40	48x48	Red/yellow		**3LD3350-0TL13**		1	1 unit	1CL
		--	15.0	40	66x66	Black		**3LD3354-0TL51**		1	1 unit	1CL
		--	15.0	40	66x66	Red/yellow		**3LD3354-0TL53**		1	1 unit	1CL
		--	22.0	63	48x48	Black		**3LD3450-0TL11**		1	1 unit	1CL
		--	22.0	63	48x48	Red/yellow		**3LD3450-0TL13**		1	1 unit	1CL
		--	22.0	63	66x66	Black		**3LD3454-0TL51**		1	1 unit	1CL
 3LD3050-0TL13		--	22.0	63	66x66	Red/yellow		**3LD3454-0TL53**		1	1 unit	1CL
		1 NO + 1 NC	7.5	16	48x48	Black		**3LD3050-1TL11**		1	1 unit	1CL
			7.5	16	48x48	Red/yellow		**3LD3050-1TL13**		1	1 unit	1CL
			9.0	25	48x48	Black		**3LD3150-1TL11**		1	1 unit	1CL
			9.0	25	48x48	Red/yellow		**3LD3150-1TL13**		1	1 unit	1CL
			9.0	25	66x66	Black		**3LD3154-1TL51**		1	1 unit	1CL
			9.0	25	66x66	Red/yellow		**3LD3154-1TL53**		1	1 unit	1CL
			11.5	32	48x48	Black		**3LD3250-1TL11**		1	1 unit	1CL
			11.5	32	48x48	Red/yellow		**3LD3250-1TL13**		1	1 unit	1CL
			15.0	40	48x48	Black		**3LD3350-1TL11**		1	1 unit	1CL
			15.0	40	48x48	Red/yellow		**3LD3350-1TL13**		1	1 unit	1CL
			15.0	40	66x66	Black		**3LD3354-1TL51**		1	1 unit	1CL
			15.0	40	66x66	Red/yellow		**3LD3354-1TL53**		1	1 unit	1CL
			22.0	63	48x48	Black		**3LD3450-1TL11**		1	1 unit	1CL
			22.0	63	48x48	Red/yellow		**3LD3450-1TL13**		1	1 unit	1CL
			22.0	63	66x66	Black		**3LD3454-1TL51**		1	1 unit	1CL
			22.0	63	66x66	Red/yellow		**3LD3454-1TL53**		1	1 unit	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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3LD3 main control and EMERGENCY-STOP switches from 16 to 63 A > Floor mounting NEW

Selection and ordering data

	Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		Color of the operating mechanism	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Auxiliary contact elements	P/AC-23A kW	I_u/AC-21A A		d					
	Main control and EMERGENCY-STOP switches with door-coupling (rotary operating mechanism) • Lockable in 0 position with up to 3 padlocks with a hasp thickness of 4 to 8 mm • Degree of protection at front side IP65 • All versions with rotary operating mechanism • Including terminal cover for the infeed side • Front plate 66 x 66 mm										
Center-hole mounting Ø 22.5 mm											
 3LD3048-0TK51	3	--	7.5	16	Black		**3LD3048-0TK51**		1	1 unit	1CL
		--	7.5	16	Red/yellow		**3LD3048-0TK53**		1	1 unit	1CL
		--	9.0	25	Black		**3LD3148-0TK51**		1	1 unit	1CL
		--	9.0	25	Red/yellow		**3LD3148-0TK53**		1	1 unit	1CL
		--	11.5	32	Black		**3LD3248-0TK51**		1	1 unit	1CL
		--	11.5	32	Red/yellow		**3LD3248-0TK53**		1	1 unit	1CL
		--	15.0	40	Black		**3LD3348-0TK51**		1	1 unit	1CL
		--	15.0	40	Red/yellow		**3LD3348-0TK53**		1	1 unit	1CL
		--	22.0	63	Black		**3LD3448-0TK51**		1	1 unit	1CL
		--	22.0	63	Red/yellow		**3LD3448-0TK53**		1	1 unit	1CL
 3LD3048-0TK53		1 NO + 1 NC	7.5	16	Black		**3LD3048-1TK51**		1	1 unit	1CL
			7.5	16	Red/yellow		**3LD3048-1TK53**		1	1 unit	1CL
			9.0	25	Black		**3LD3148-1TK51**		1	1 unit	1CL
			9.0	25	Red/yellow		**3LD3148-1TK53**		1	1 unit	1CL
			11.5	32	Black		**3LD3248-1TK51**		1	1 unit	1CL
			11.5	32	Red/yellow		**3LD3248-1TK53**		1	1 unit	1CL
			15.0	40	Black		**3LD3348-1TK51**		1	1 unit	1CL
			15.0	40	Red/yellow		**3LD3348-1TK53**		1	1 unit	1CL
			22.0	63	Black		**3LD3448-1TK51**		1	1 unit	1CL
			22.0	63	Red/yellow		**3LD3448-1TK53**		1	1 unit	1CL
 3LD3050-0TL11	3 + N	--	7.5	16	Black		**3LD3048-0TL51**		1	1 unit	1CL
		--	7.5	16	Red/yellow		**3LD3048-0TL53**		1	1 unit	1CL
		--	9.0	25	Black		**3LD3148-0TL51**		1	1 unit	1CL
		--	9.0	25	Red/yellow		**3LD3148-0TL53**		1	1 unit	1CL
		--	11.5	32	Black		**3LD3248-0TL51**		1	1 unit	1CL
		--	11.5	32	Red/yellow		**3LD3248-0TL53**		1	1 unit	1CL
		--	15.0	40	Black		**3LD3348-0TL51**		1	1 unit	1CL
		--	15.0	40	Red/yellow		**3LD3348-0TL53**		1	1 unit	1CL
		--	22.0	63	Black		**3LD3448-0TL51**		1	1 unit	1CL
		--	22.0	63	Red/yellow		**3LD3448-0TL53**		1	1 unit	1CL
 3LD3048-0TL53		1 NO + 1 NC	7.5	16	Black		**3LD3048-1TL51**		1	1 unit	1CL
			7.5	16	Red/yellow		**3LD3048-1TL53**		1	1 unit	1CL
			9.0	25	Black		**3LD3148-1TL51**		1	1 unit	1CL
			9.0	25	Red/yellow		**3LD3148-1TL53**		1	1 unit	1CL
			11.5	32	Black		**3LD3248-1TL51**		1	1 unit	1CL
			11.5	32	Red/yellow		**3LD3248-1TL53**		1	1 unit	1CL
			15.0	40	Black		**3LD3348-1TL51**		1	1 unit	1CL
			15.0	40	Red/yellow		**3LD3348-1TL53**		1	1 unit	1CL
			22.0	63	Black		**3LD3448-1TL51**		1	1 unit	1CL
			22.0	63	Red/yellow		**3LD3448-1TL53**		1	1 unit	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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NEW 3LD3 main control and EMERGENCY-STOP switches from 16 to 63 A > Floor mounting

	Number and version of the contacts		Rated data at 50 ... 60 Hz, 400 V		Color of the operating mecha-nism	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Auxiliary contact elements	P/ AC-23A	I_u/ AC-21A							
			kW	A		d					
	Main control and EMERGENCY-STOP switches with door-coupling (knob-operated mechanism) • Lockable in 0 position with up to 2 padlocks with a hasp thickness of 4 to 6 mm • Degree of protection at front side IP65 • All versions with rotary operating mechanism • Including terminal cover for the infeed side • Front plate 48 x 48 mm										
Center-hole mounting Ø 22.5 mm											
 3LD3048-0TK51	3	--	7.5	16	Black		**3LD3040-0TK11**		1	1 unit	1CL
		--	7.5	16	Red/yellow		**3LD3040-0TK13**		1	1 unit	1CL
		--	9.0	25	Black		**3LD3140-0TK11**		1	1 unit	1CL
		--	9.0	25	Red/yellow		**3LD3140-0TK13**		1	1 unit	1CL
		--	11.5	32	Black		**3LD3240-0TK11**		1	1 unit	1CL
		--	11.5	32	Red/yellow		**3LD3240-0TK13**		1	1 unit	1CL
		--	15.0	40	Black		**3LD3340-0TK11**		1	1 unit	1CL
		--	15.0	40	Red/yellow		**3LD3340-0TK13**		1	1 unit	1CL
		--	22.0	63	Black		**3LD3440-0TK11**		1	1 unit	1CL
		--	22.0	63	Red/yellow		**3LD3440-0TK13**		1	1 unit	1CL
 3LD3048-0TK53		1 NO + 1 NC	7.5	16	Black		**3LD3040-1TK11**		1	1 unit	1CL
			7.5	16	Red/yellow		**3LD3040-1TK13**		1	1 unit	1CL
			9.0	25	Black		**3LD3140-1TK11**		1	1 unit	1CL
			9.0	25	Red/yellow		**3LD3140-1TK13**		1	1 unit	1CL
			11.5	32	Black		**3LD3240-1TK11**		1	1 unit	1CL
			11.5	32	Red/yellow		**3LD3240-1TK13**		1	1 unit	1CL
			15.0	40	Black		**3LD3340-1TK11**		1	1 unit	1CL
			15.0	40	Red/yellow		**3LD3340-1TK13**		1	1 unit	1CL
			22.0	63	Black		**3LD3440-1TK11**		1	1 unit	1CL
			22.0	63	Red/yellow		**3LD3440-1TK13**		1	1 unit	1CL
 3LD3040-0TL11	3 + N	--	7.5	16	Black		**3LD3040-0TL11**		1	1 unit	1CL
		--	7.5	16	Red/yellow		**3LD3040-0TL13**		1	1 unit	1CL
		--	9.0	25	Black		**3LD3140-0TL11**		1	1 unit	1CL
		--	9.0	25	Red/yellow		**3LD3140-0TL13**		1	1 unit	1CL
		--	11.5	32	Black		**3LD3240-0TL11**		1	1 unit	1CL
		--	11.5	32	Red/yellow		**3LD3240-0TL13**		1	1 unit	1CL
		--	15.0	40	Black		**3LD3340-0TL11**		1	1 unit	1CL
		--	15.0	40	Red/yellow		**3LD3340-0TL13**		1	1 unit	1CL
		--	22.0	63	Black		**3LD3440-0TL11**		1	1 unit	1CL
		--	22.0	63	Red/yellow		**3LD3440-0TL13**		1	1 unit	1CL
 3LD3040-0TL13		1 NO + 1 NC	7.5	16	Black		**3LD3040-1TL11**		1	1 unit	1CL
			7.5	16	Red/yellow		**3LD3040-1TL13**		1	1 unit	1CL
			9.0	25	Black		**3LD3140-1TL11**		1	1 unit	1CL
			9.0	25	Red/yellow		**3LD3140-1TL13**		1	1 unit	1CL
			11.5	32	Black		**3LD3240-1TL11**		1	1 unit	1CL
			11.5	32	Red/yellow		**3LD3240-1TL13**		1	1 unit	1CL
			15.0	40	Black		**3LD3340-1TL11**		1	1 unit	1CL
			15.0	40	Red/yellow		**3LD3340-1TL13**		1	1 unit	1CL
			22.0	63	Black		**3LD3440-1TL11**		1	1 unit	1CL
			22.0	63	Red/yellow		**3LD3440-1TL13**		1	1 unit	1CL

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3LD3 main control and EMERGENCY-STOP switches from 16 to 63 A > Distribution board mounting NEW

Selection and ordering data

ON/OFF and EMERGENCY-STOP switches, basic switch, with masking plate and selector knob

- With screw fixing
- With snap-on mounting on 35 mm standard mounting rail
- Lockable in 0 position with up to 2 padlocks with a hasp thickness of 4 to 6 mm
- Degree of protection at front side IP40
- Including terminal cover for the infeed side

Distribution board mounting, standard rail mounting

Number and version of the contacts		Rated data at 50 ... 60 Hz, 400 V		Color of the operating mechanism	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A kW	I_u A		d					
3	--	7.5	16	Black		**3LD3030-0TK11**		1	1 unit	1CL
	--	7.5	16	Red/yellow		**3LD3030-0TK13**		1	1 unit	1CL
	--	9.0	25	Black		**3LD3130-0TK11**		1	1 unit	1CL
	--	9.0	25	Red/yellow		**3LD3130-0TK13**		1	1 unit	1CL
	--	11.5	32	Black		**3LD3230-0TK11**		1	1 unit	1CL
	--	11.5	32	Red/yellow		**3LD3230-0TK13**		1	1 unit	1CL
	--	15.0	40	Black		**3LD3330-0TK11**		1	1 unit	1CL
	--	15.0	40	Red/yellow		**3LD3330-0TK13**		1	1 unit	1CL
	--	22.0	63	Black		**3LD3430-0TK11**		1	1 unit	1CL
	--	22.0	63	Red/yellow		**3LD3430-0TK13**		1	1 unit	1CL
	1 NO + 1 NC	7.5	16	Black		**3LD3030-1TK11**		1	1 unit	1CL
		7.5	16	Red/yellow		**3LD3030-1TK13**		1	1 unit	1CL
		9.0	25	Black		**3LD3130-1TK11**		1	1 unit	1CL
		9.0	25	Red/yellow		**3LD3130-1TK13**		1	1 unit	1CL
		11.5	32	Black		**3LD3230-1TK11**		1	1 unit	1CL
		11.5	32	Red/yellow		**3LD3230-1TK13**		1	1 unit	1CL
		15.0	40	Black		**3LD3330-1TK11**		1	1 unit	1CL
		15.0	40	Red/yellow		**3LD3330-1TK13**		1	1 unit	1CL
		22.0	63	Black		**3LD3430-1TK11**		1	1 unit	1CL
		22.0	63	Red/yellow		**3LD3430-1TK13**		1	1 unit	1CL
3 + N	--	7.5	16	Black		**3LD3030-0TL11**		1	1 unit	1CL
	--	7.5	16	Red/yellow		**3LD3030-0TL13**		1	1 unit	1CL
	--	9.0	25	Black		**3LD3130-0TL11**		1	1 unit	1CL
	--	9.0	25	Red/yellow		**3LD3130-0TL13**		1	1 unit	1CL
	--	11.5	32	Black		**3LD3230-0TL11**		1	1 unit	1CL
	--	11.5	32	Red/yellow		**3LD3230-0TL13**		1	1 unit	1CL
	--	15.0	40	Black		**3LD3330-0TL11**		1	1 unit	1CL
	--	15.0	40	Red/yellow		**3LD3330-0TL13**		1	1 unit	1CL
	--	22.0	63	Black		**3LD3430-0TL11**		1	1 unit	1CL
	--	22.0	63	Red/yellow		**3LD3430-0TL13**		1	1 unit	1CL
	1 NO + 1 NC	7.5	16	Black		**3LD3030-1TL11**		1	1 unit	1CL
		7.5	16	Red/yellow		**3LD3030-1TL13**		1	1 unit	1CL
		9.0	25	Black		**3LD3130-1TL11**		1	1 unit	1CL
		9.0	25	Red/yellow		**3LD3130-1TL13**		1	1 unit	1CL
		11.5	32	Black		**3LD3230-1TL11**		1	1 unit	1CL
		11.5	32	Red/yellow		**3LD3230-1TL13**		1	1 unit	1CL
		15.0	40	Black		**3LD3330-1TL11**		1	1 unit	1CL
		15.0	40	Red/yellow		**3LD3330-1TL13**		1	1 unit	1CL
		22.0	63	Black		**3LD3430-1TL11**		1	1 unit	1CL
		22.0	63	Red/yellow		**3LD3430-1TL13**		1	1 unit	1CL


3LD3030-0TK11


3LD3030-0TK13


3LD3040-0TL11


3LD3040-0TL13

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Auxiliary contact elements	P/ AC-23A	I_u/ AC-21A						
			kW	A	d					
	Main control and EMERGENCY-STOP switches, basic switch without knob-operated mechanism • Degree of protection at front side IP20 • Including terminal cover for the infeed side • Front plate									
Center-hole mounting Ø 22.5 mm										
 3LD3010-0TK05	3	--	7.5	16		**3LD3010-0TK05**		1	1 unit	1CL
		--	9.0	25		**3LD3110-0TK05**		1	1 unit	1CL
		--	11.5	32		**3LD3210-0TK05**		1	1 unit	1CL
		--	15.0	40		**3LD3310-0TK05**		1	1 unit	1CL
		--	22.0	63		**3LD3410-0TK05**		1	1 unit	1CL
		1 NO + 1 NC	7.5	16		**3LD3010-1TK05**		1	1 unit	1CL
			9.0	25		**3LD3110-1TK05**		1	1 unit	1CL
			11.5	32		**3LD3210-1TK05**		1	1 unit	1CL
			15.0	40		**3LD3310-1TK05**		1	1 unit	1CL
			22.0	63		**3LD3410-1TK05**		1	1 unit	1CL
 3LD3010-0TL05	3 + N	--	7.5	16		**3LD3010-0TL05**		1	1 unit	1CL
		--	9.0	25		**3LD3110-0TL05**		1	1 unit	1CL
		--	11.5	32		**3LD3210-0TL05**		1	1 unit	1CL
		--	15.0	40		**3LD3310-0TL05**		1	1 unit	1CL
		--	22.0	63		**3LD3410-0TL05**		1	1 unit	1CL
		1 NO + 1 NC	7.5	16		**3LD3010-1TL05**		1	1 unit	1CL
			9.0	25		**3LD3110-1TL05**		1	1 unit	1CL
			11.5	32		**3LD3210-1TL05**		1	1 unit	1CL
			15.0	40		**3LD3310-1TL05**		1	1 unit	1CL
			22.0	63		**3LD3410-1TL05**		1	1 unit	1CL

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Selection and ordering data

	Accessory part	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3LD9340-0B (left) 3LD9340-0C (right)	**N switching contacts**	• Front mounting, leading		**3LD9340-0B**		1	1 unit	1CL
		• Floor mounting, leading		**3LD9340-0C**		1	1 unit	1CL
 3LD9340-2B (left) 33LD9340-2C (right)	**N terminals**	• Front mounting, through-type		**3LD9340-2B**		1	1 unit	1CL
		• Floor mounting, through-type		**3LD9340-2C**		1	1 unit	1CL
 3LD9340-3B (left) 33LD9340-3C (right)	**PE terminals**	• Front mounting, through-type		**3LD9340-3B**		1	1 unit	1CL
		• Floor mounting, through-type		**3LD9340-3C**		1	1 unit	1CL
 3LD9340-6B (left) 33LD9340-6C (right)	**Auxiliary switches**	• Front mounting, 1 NO + 1 NC		**3LD9340-6B**		1	1 unit	1CL
		• Floor mounting, 1 NO + 1 NC		**3LD9340-6C**		1	1 unit	1CL
	**Terminal covers**	For 3LD3 3-pole switch disconnectors		**3LD9341-0A**		1	4 units	1CL
		For switch disconnectors with fourth pole		**3LD9341-2A**		1	4 units	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Accessory part	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
	**Rotary operating mechanisms**	Black Center-hole mounting 22.5 mm, front mounting with 66 x 66 mm masking plate, floor mounting for 3LD3.40 and 3LD3.48 For 6 x 6 mm shaft		**3LD9344-2C**		1	1 unit	1CL
		Red/yellow Center-hole mounting 22.5 mm, front mounting with 66 x 66 mm masking plate, floor mounting for 3LD3.40 and 3LD3.48 For 6 x 6 mm shaft		**3LD9344-3C**		1	1 unit	1CL
		Black Center-hole mounting 22.5 mm, front mounting for 3LD3.50 For 6 x 6 mm shaft		**3LD9344-4C**		1	1 unit	1CL
		Red/yellow Center-hole mounting 22.5 mm, front mounting for 3LD3.50 For 6 x 6 mm shaft		**3LD9344-5C**		1	1 unit	1CL
	**Knob-operated mechanisms**	Black, front mounting 48 x 48 mm, with coupling element		**3LD9343-4C**		1	1 unit	1CL
		Red/yellow, front mounting 48 x 48 mm, with coupling element		**3LD9343-5C**		1	1 unit	1CL
		Black, front mounting 48 x 48 mm, for shaft		**3LD9343-6C**		1	1 unit	1CL
		Red/yellow, front mounting 48 x 48 mm, for shaft		**3LD9343-7C**		1	1 unit	1CL

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3LD3 main control and EMERGENCY-STOP switches from 16 to 63 A > Accessories NEW

	Accessory part	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**Door-coupling operating mechanisms**	Red/yellow, knob-operated mechanism 48 x 48 mm, front mounting, with coupling element and shaft		**3LD9343-5CA**		1	1 unit	1CL
		Black, knob-operated mechanism 48 x 48 mm, front mounting, with coupling element and shaft		**3LD9343-4CA**		1	1 unit	1CL
		Red/yellow, rotary operating mechanism 66 x 66 mm, front mounting, with coupling element and shaft		**3LD9344-3CA**		1	1 unit	1CL
		Black, rotary operating mechanism 66 x 66 mm, front mounting, with coupling element and shaft		**3LD9344-2CA**		1	1 unit	1CL
	**Additional labels**	German/English, "Hauptschalter/Main Switch" (10 units in package)		**3LD9346-1A**		1	10 units	1CL
		English/French "Main Switch/Interrupteur principal" (10 units in package)		**3LD9346-2A**		1	10 units	1CL
		Without inscription (10 units in package)		**3LD9346-3A**		1	10 units	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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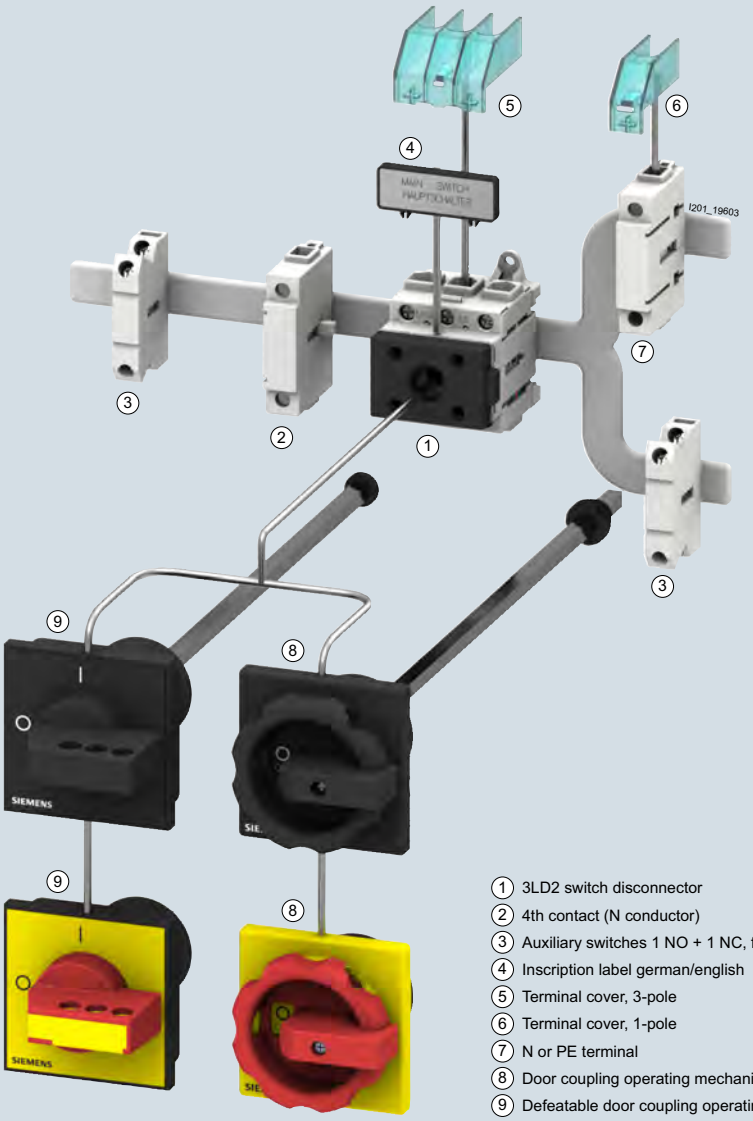
Overview



1. 3LD2 switch disconnector
2. 4th contact (N conductor)
3. Auxiliary switches 1 NO + 1 NC, for mounting on side left and/or right
4. Inscription label german/english
5. Terminal cover, 3-pole
6. Terminal cover, 1-pole
7. N or PE terminal
8. Door coupling operating mechanism
9. Defeatable door coupling operating mechanism

The 3LD2 main control and EMERGENCY-STOP switches are manually operated switch disconnectors according to IEC 60947-3/VDE 0660 Part 107 (EN 60947-3) and comply with the conditions for switch disconnectors. In EN 60204-1 (VDE 0113 Part 1), these are called "disconnector units", while EMERGENCY-STOP switches are termed "devices for emergency shutdown".

The 3LD2 switches for 16 to 250 A are approved according to UL 508 and can be used as "manual motor controllers" and "motor disconnects". In addition, the 3LD switch disconnectors have CCC certification.

The 3LD2 main control and EMERGENCY-STOP switches are suitable for a current range from 16 to 250 A. These are suitable for main control, EMERGENCY-STOP, or repair switches and thus fulfill a wide range of requirements.

They are approved in line with IEC, UL, EAC, CSA, and CCC, as well as for use in shipbuilding.

Versions

- Five sizes with box terminal in 3, 4, and 6-pole version
- Front-mounting and floor mounting or distribution board mounting
- Front mounting by means of four-hole or center-hole mounting
- Switches in molded-plastic enclosure with degree of protection IP65
- DC isolators 800 V DC for PV installations
- Door-coupling rotary operating mechanism for operation of switch disconnector outside the control cabinet door
- Auxiliary switches for querying the switch positions, pre-installed or retrofittable

Benefits

- Compact design saves space
- High rated short-circuit currents
- Locking capability during maintenance work
- Comprehensive range of retrofittable accessories
- Comprehensive support through provision of CAx data

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Application

The 3LD2 switches are used in almost all power distribution systems for industry and infrastructure, but particularly those in main and auxiliary power distribution systems of commercial buildings and in domestic power supplies upstream of meters (e.g., SIPRO system).

Particularly for processing machines in mechanical and conveyor system engineering and in the chemical or food and beverage industries, these switches are now an essential part of the hardware architecture as main control and EMERGENCY-STOP switches.

The 3LD2 switches can be used as:

- ON-OFF switches
- EMERGENCY-STOP switches
- Main control switches according to EN 60204-1

Design

Design of the contacts

Each switch has three adjacent contact elements[1]. A fourth leading contact element for switching the N conductor, a continuous PE terminal, an auxiliary switch (1 NO + 1 NC) can be fitted to each side of the switch. The auxiliary switches operate as leading contacts on opening. On opening, the NO contact opens before the main contacts, so that a contactor carries the switching power in the circuit and the maintenance or safety switch switches at zero current. On closing, the auxiliary switch switches later than or at the same time as the main contacts.

Design of rotary operating mechanisms

The rotary operating mechanisms of the switches for front or floor mounting are mounted on control cabinet doors, or on front or side panels with four-hole or center-hole mounting with a standard diameter of 22.5 mm and are operated from the outside. In their OFF position, they can be locked with up to three padlocks with a hasp thickness of 4 to 8 mm. Switching devices with defeatable door-coupling rotary operating mechanism are available in addition.

- Switch position indicator:
  The switch position is clearly marked with direction arrows and an "O" for OFF and a "I" for ON at the front.
- Switches for front mounting:
  The switches for front mounting are connected directly to the rotary operating mechanism through the fixing screws or – in the case of center-hole mounting – a special-purpose coupling.
- Switches for floor mounting:
  The switches for floor mounting are snapped onto 35 mm standard mounting rails according to EN 60715 or screw-mounted on mounting plates. The actuators are connected to the lower section of the switch through a door coupling, which can be released in its zero position, and a 300 mm long switch shaft. When the control cabinet door is open, the switch can be protected against inadvertent operation by removing the switch shaft from the lower section of the switch.
  The overall depth can be adapted to individual requirements by adjusting the switch shaft length.
- Switches for distribution board mounting:
  The switches for distribution board mounting are suited for operation in distribution boards and for switching inside control cabinets or distribution boards. They have cap and mounting dimensions to DIN 43880 and can be fitted under the same cover together with miniature circuit breakers. The selector switches can be locked in their OFF position with up to 2 padlocks with a hasp thickness of 4 to 6 mm.
- Switches in molded-plastic enclosure:
  For surface mounting of individual main control and EMERGENCY-STOP switches, molded plastic-enclosed switches to degree of protection IP65 are used. The actuators can be locked in their OFF position with three padlocks with a hasp thickness of 4 to 8 mm. The molded-plastic enclosures each contain an N and/or a PE terminal.

[1] 16 A versions have four contact elements;
3-pole transfer switches, see chapter "Transfer Switching Equipment and Load Transfer Switches" and six 6-pole contact elements.



3LD2704-0TK53 switch for front mounting with rotary operating mechanism



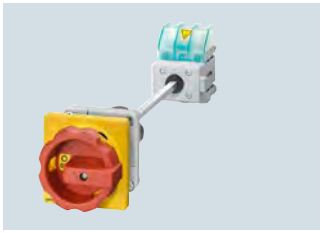
3LD2222-0TK1 switch for front mounting with knob



3LD2122-7UK01 3-pole transfer switch for front mounting with knob, see chapter "Transfer Switching Equipment and Load Transfer Switches"



3LD2103-3VK53 6-pole switch for front mounting with rotary operating mechanism



3LD2144-0TK53 switch for floor mounting with rotary operating mechanism and door coupling



3LD2530-0TK11 switch for distribution board mounting with knob



3LD2264-0TB5 switch in molded-plastic enclosure



3LD2217-1TL13 switch for floor mounting with rotary operating mechanism and defeatable door coupling



3LD2265-8VQ51-0AF6 DC isolator



3LD2418-0TK13 switch for floor mounting, 250 A, with rotary operating mechanism and door coupling

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards			DIN VDE 0660, IEC 60947						
Switches		Type	**3LD20**	**3LD21**	**3LD22**	**3LD25**	**3LD27**	**3LD28**	**3LD23**	**3LD24**
Rated insulation voltage U_i		V	690							
Rated operational voltage U_e		V AC	690							
Rated frequency		Hz	50 ... 60							
Rated impulse withstand voltage U_{imp}		kV	6	6	6	6	6	6	6	6
Rated short-time withstand current (1 s current, rms value)		A	340	640	640	1260	2000	2000	4000	4000
Short-circuit protection, max. back-up fuse (gL)		A	20	25	40	63	100	125	160	250
Rated conditional short-circuit current with upstream fuses at AC 50/60 Hz, 690 V		kA_{rms}	50	50	50	50	50	20	50	50
Maximum permissible let-through I^2t value		kA^2s	2.5	4	9	21	64	104	185	557
Permissible let-through current of the fuse		kA	3	3.5	4.5	6	10	10	15	15
Rated uninterrupted current I_u		A	16	25	32	63	100	125	160	250
AC-21A load-break switch	Rated operational current I_e	A	16	25	32	63	100	125	160	250
AC-3 motor load switches Operational switching of individual motors	Rated operational power At 220 ... 240 V At 380 ... 440 V At 660/690 V	 kW kW kW	 3.0 5.5 5.5	 4.0 7.5 7.5	 5.5 9.5 9.5	 11.0 18.5 15.0	 18.5 30.0 22.0	 22.0 37.0 30.0	 35.0 50.0 37.0	 55.0 110.0 45.0
AC-23A main control switch Repair switch frequent, but not operational switching of individual motors	Rated operational power At 220 ... 240 V At 380 ... 440 V At 660/690 V	 kW kW kW	 4.0 7.5 7.5	 5.0 9.5 9.5	 6.0 11.5 11.5	 11.0 22.0 18.5	 18.5 37.0 30.0	 22.0 45.0 37.0	 45.0 75.0 45.0	 75.0 132.0 55.0
Power loss per current path at I_e		W	0.5	1.1	1.8	4.5	7.5	12.0	36.0	36.0
Endurance mechanical	Operating cycles		100 000							
Switching frequency		1/h	50							
Permissible ambient temperature		°C	-25 ... +55							
Isolating features	Up to max.	V	690							
Conductor cross-sections for main conductors [1]										
Solid or stranded Finely stranded with end sleeve (max.)		mm^2 mm^2	1 ... 6 4	1.5 ... 16 10	1.5 ... 16 10	2.5 ... 35 16	4 ... 50 35	4 ... 50 35	16 ...185 150	16 ... 185 150
Conductor cross-sections	Copper cable	AWG	18 ... 10	14 ... 8	14 ... 8	14 ... 6	12 ... 1	12 ... 1		
Torque for terminal		Nm	1.5 ... 2	2 ... 2.5	2 ... 2.5	2.5 ... 3	2.5 ... 3	2.5 ... 3	9.5 ... 10	9.5 ... 10
Touch protection according to EN 50274			Yes							
Auxiliary switches										
Rated insulation voltage U_i		V	500							
Rated operational voltage U_e		V AC	500							
Rated uninterrupted current I_u		A	10							
Rated operational current I_e, AC-15	At 120 V At 220 ... 240 V At 380 ... 415 V At 500 V	A A A A	6 3 1.8 1.4							
Short-circuit protection, aux. switch, max. back-up fuse (gL/gG)		A	10							
Conductor cross-sections for auxiliary conductors										
Connection type			Screw terminals							
Solid or stranded Finely stranded with end sleeve		mm^2 mm^2	2 × (0.75 ... 2.5), 1 × 4 2 × (0.75 ... 1.5), 1 x 2.5							
Torque for terminal		Nm	0.8							

[1] Depending on the cable infeed, only small cross-sections are possible with devices in molded-plastic enclosures.

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3LD switches for UL/CSA as "manual motor controllers" [1]

Standards			UL/CSA							
Switches		Type	**3LD20**	**3LD21**	**3LD22**	**3LD25**	**3LD27**	**3LD28**	**3LD23**	**3LD24**
Rated operational voltage U_e		V AC	600	600	600	600	600	600	600	600
Rated uninterrupted current I_u		A	10	20	30	60	100	125	160	250
	Current rating		A 600	A 600	A 600	--	--	--	--	--
	Pilot duty		P 600	P 600	P 600	--	--	--	--	--
Conventional thermal current I_{th}		A	16	25	32	63	100	125	160	250
Maximum rated power (AC-3)	3 ~ 120 V	HP	1	3	3	5	10	15	--	--
Alternating current motors 40 ... 60 Hz	240 V	HP	3	7.5	10 (7.5)[2]	15	30	40	40	50
(HP = PS)	480 V	HP	7.5	10	20 (15)[2]	40	60	75	75	100
	600 V	HP	10	15	30 (20)[2]	50	75	100	75	75
	1 ~ 120 V	HP	0.5	2	2	3	--	--	--	--
	240 V	HP	1.5	3	3	10	--	--	--	--
Conductor cross-sections	Cu cable	AWG	18 ... 10	14 ... 8	14 ... 8	14 ... 6	12 ... 1	12 ... 1	1 ... MCM400	
Torque		Nm	1.5 ... 2	2 ... 2.5	2 ... 2.5	2.5 ... 3	2.5 ... 3	2.5 ... 3	10	10

1) The 3LD switches for UL/CSA are approved in accordance with UL/CSA as "manual motor controllers", and they can be used as repair switches in the molded-plastic enclosure, for example. However, they do not have UL approval.

2) Values in brackets apply to devices in molded-plastic enclosure.

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-3	P/AC-23A	I_u/ AC-21A						
		kW	kW	A	d					
Main control and EMERGENCY-STOP switches with rotary operating mechanism/knob-operated mechanism • Lockable in 0 position with up to 3 padlocks: - 3LD20 to 3LD28: Hasp thickness from 4 to 8 mm - 3LD23 and 3LD24: Hasp thickness from 4 to 6 mm • Degree of protection at front side IP65 • All versions with rotary operating mechanism, exception: 3LD23, 3LD24 with knob-operated mechanism • Including terminal cover for the infeed side • Front plate: - 3LD20, 3LD21, 3LD22: 67 x 67 mm - 3LD25 to 3LD28: 90 x 90 mm - 3LD23 to 3LD24: 96 x 96 mm										
Four-hole mounting										
3	--	5.5	7.5	16		**3LD2003-0TK5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2103-0TK5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2203-0TK5☐**		1	1 unit	1CL
		18.5	22.0	63		**3LD2504-0TK5☐**		1	1 unit	1CL
		30	37.0	100		**3LD2704-0TK5☐**		1	1 unit	1CL
		37	45.0	125		**3LD2804-0TK5☐**		1	1 unit	1CL
		50	75.0	160		**3LD2305-0TK1☐**		1	1 unit	1CL
		110	132.0	250		**3LD2405-0TK1☐**		1	1 unit	1CL
3 + N	--	5.5	7.5	16		**3LD2003-1TL5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2103-1TL5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2203-1TL5☐**		1	1 unit	1CL
		18.5	22.0	63		**3LD2504-1TL5☐**		1	1 unit	1CL
		30.0	37.0	100		**3LD2704-0TK5☐** + [1]		1	1 unit	1CL
						3LD9280-0B		1	1 unit	1CL
		37.0	45.0	125		**3LD2804-0TK5☐** + [1]		1	1 unit	1CL
						3LD9280-0B		1	1 unit	1CL
		50	75.0	160		**3LD2305-1TL1☐**		1	1 unit	1CL
		110	132.0	250		**3LD2405-1TL1☐**		1	1 unit	1CL
3	1 NO + 1 NC	5.5	7.5	16		**3LD2003-1TP5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2103-1TP5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2203-1TP5☐**		1	1 unit	1CL
		18.5	22.0	63		**3LD2504-1TP5☐**		1	1 unit	1CL
		30.0	37.0	100		**3LD2704-1TP5☐**		1	1 unit	1CL
		37	45.0	125		**3LD2804-1TP5☐**		1	1 unit	1CL
		50.0	75.0	160		**3LD2305-0TK1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
		110.0	132.0	250		**3LD2405-0TK1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
3 + N	1 NO + 1 NC	5.5	7.5	16		**3LD2003-2EP5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2103-2EP5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2203-1TL5☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
		18.5	22.0	63		**3LD2504-1TP5☐** + [1]		1	1 unit	1CL
						3LD9250-0BA		1	1 unit	1CL
		30.0	37.0	100		**3LD2704-0TK5☐** + [1]		1	1 unit	1CL
						3LD9280-0B + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
		37.0	45.0	125		**3LD2804-0TK5☐** + [1]		1	1 unit	1CL
						3LD9280-0B + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
		50.0	75.0	160		**3LD2305-1TL1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
		110.0	132.0	250		**3LD2405-1TL1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL


3LD2203-0TK51


3LD2704-0TK53

[1] 4th contact element as N conductor ordered separately, see page 7/39, Accessories.

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories.

Actuator color
Black 1
Red/yellow (EMERGENCY-STOP) 3

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3LD2 main control and EMERGENCY-STOP switches from 16 to 250 A > Front mounting

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-3	P/AC-23A	I_u/ AC-21A						
		kW	kW	A	d					
Main control and EMERGENCY-STOP switches with direct operating mechanism (rotary operating mechanism) • Lockable in 0 position with up to 3 padlocks with a hasp thickness of 4 to 8 mm • Degree of protection at front side IP65 • All versions with rotary operating mechanism • Including terminal cover for the infeed side • Front plate - 3LD20, 3LD21, 3LD22: 67 x 67 mm - 3LD25: 90 x 90 mm										
Center-hole mounting Ø 22.5 mm										
3	--	5.5	7.5	16		**3LD2054-0TK5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2154-0TK5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2254-0TK5☐**		1	1 unit	1CL
		18.5	22	63		**3LD2555-0TK5☐**		1	1 unit	1CL
3 + N	--	5.5	7.5	16		**3LD2054-1TL5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2154-1TL5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2254-1TL5☐**		1	1 unit	1CL
		18.5	22	63		**3LD2555-0TK5☐** + [1]		1	1 unit	1CL
						3LD9250-0BA		1	1 unit	1CL
3	1 NO + 1 NC	5.5	7.5	16		**3LD2054-1TP5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2154-1TP5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2254-0TK5☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
		18.5	22	63		**3LD2555-0TK5☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
3 + N	1 NO + 1 NC	5.5	7.5	16		**3LD2054-2EP5☐**		1	1 unit	1CL
		7.5	9.5	25		**3LD2154-2EP5☐**		1	1 unit	1CL
		9.5	11.5	32		**3LD2254-1TL5☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
		18.5	22	63		**3LD2555-0TK5☐** + [1]		1	1 unit	1CL
						3LD9250-0BA + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL



3LD2254-0TK53

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, Accessories.

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Number and version of the contacts		Rated data 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Auxiliary contact elements	P/AC-23A kW	I_u A	d					
	Main control and EMERGENCY-STOP switches with direct operating mechanism (knob-operated mechanism) • Lockable in 0 position (can be modified to I position) with max. 2 padlocks with a hasp thickness of 4 to 6 mm • Degree of protection at front side IP65 • Including terminal cover for the infeed side • Front plate - 48 x 48 mm									
Four-hole mounting										
 3LD2222-0TK11	3	--	7.5	16		**3LD2022-0TK1☐**		1	1 unit	1CL
			9.5	25		**3LD2122-0TK1☐**		1	1 unit	1CL
			11.5	32		**3LD2222-0TK1☐**		1	1 unit	1CL
	3 + N	--	7.5	16		**3LD2022-1TL1☐**		1	1 unit	1CL
			9.5	25		**3LD2122-1TL1☐**		1	1 unit	1CL
			11.5	32		**3LD2222-0TK1☐** + [1]		1	1 unit	1CL
						3LD9220-0B		1	1 unit	1CL
	3	1 NO + 1 NC	7.5	16		**3LD2022-0TK1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
			9.5	25		**3LD2122-0TK1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
			11.5	32		**3LD2222-0TK1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
	3 + N	1 NO + 1 NC	7.5	16		**3LD2022-1TL1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
			9.5	25		**3LD2122-1TL1☐** + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL
			11.5	32		**3LD2222-0TK1☐** + [1]		1	1 unit	1CL
						3LD9220-0B + [2]		1	1 unit	1CL
						3LD9200-5B		1	1 unit	1CL

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, Accessories.

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3LD2 main control and EMERGENCY-STOP switches from 16 to 250 A > Front mounting

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A	I_u						
		kW	A	d					
Main control and EMERGENCY-STOP switches with direct operating mechanism (knob-operated mechanism) • Lockable in 0 position (can be modified to I position) with max. 2 padlocks with a hasp thickness of 4 to 6 mm • Degree of protection at front side IP65 • Including terminal cover for the infeed side • Front plate: 48 x 48 mm									
Center-hole mounting Ø 22.5 mm									
3	--	7.5	16		**3LD2050-0TK1☐**		1	1 unit	1CL
		9.5	25		**3LD2150-0TK1☐**		1	1 unit	1CL
		11.5	32		**3LD2250-0TK1☐**		1	1 unit	1CL
3 + N	--	7.5	16		**3LD2050-1TL1☐**		1	1 unit	1CL
		9.5	25		**3LD2150-0TK1☐**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL
		11.5	32		**3LD2250-0TK1☐**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL
3	1 NO + 1 NC	7.5	16		**3LD2050-0TK1☐**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL
		9.5	25		**3LD2150-0TK1☐**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL
		11.5	32		**3LD2250-0TK1☐**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL
3 + N	1 NO + 1 NC	7.5	16		**3LD2050-1TL1☐**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL
		9.5	25		**3LD2150-0TK1☐**		1	1 unit	1CL
					+[1] **3LD9220-0B**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL
		11.5	32		**3LD2250-0TK1☐**		1	1 unit	1CL
					+[1] **3LD9220-0B**		1	1 unit	1CL
					+[2] **3LD9200-5B**		1	1 unit	1CL



3LD2150-0TK13

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, Accessories.

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Auxiliary contact elements	P/AC-3	P/AC-23A	I_u						
			kW	kW	A	d					
	Main control and EMERGENCY-STOP switches with direct operating mechanism (rotary operating mechanism/knob-operated mechanism), 6-pole • Lockable in 0 position with up to 3 padlocks: - 3LD20 to 3LD28: Hasp thickness from 4 to 8 mm - 3LD23 and 3LD24: Hasp thickness from 4 to 6 mm • Degree of protection at front side IP65 • All versions with rotary operating mechanism Exception: 3LD23 and 3LD24 with knob-operated mechanism • Including terminal cover for the infeed side • Front plate - 3LD20, 3LD21, 3LD22: 67 x 67 mm - 3LD25: 90 x 90 mm - 3LD23 to 3LD24: 96 x 96 mm										
Four-hole mounting											
 3LD2103-3VK53	6	--	7.5	9.5	25		**3LD2103-3VK5☐**		1	1 unit	1CL
			9.5	11.5	32		**3LD2203-3VK5☐**		1	1 unit	1CL
			18.5	22.0	63		**3LD2504-3VK5☐**		1	1 unit	1CL
			50	75	160		**3LD2305-3VK1☐**		1	1 unit	1CL
			110	132	250		**3LD2405-3VK1☐**		1	1 unit	1CL
	6	1 NO + 1 NC	7.5	9.5	25		**3LD2103-4VP5☐**		1	1 unit	1CL

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

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Selection and ordering data

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A	I_u						
		kW	A	d					

Main control and EMERGENCY-STOP switches with door-coupling rotary operating mechanism

- With shaft
- Lockable in 0 position with up to 3 padlocks:
  - 3LD20 to 3LD28: Hasp thickness from 4 to 8 mm
  - 3LD23 and 3LD24: Hasp thickness from 4 to 6 mm
- Degree of protection at front side IP65
- Door-coupling rotary operating mechanism with integrated tolerance compensation (16 to 125 A)
- All versions with rotary operating mechanism
  Exception: 3LD23 and 3LD24 with knob-operated mechanism
- Mounting using screws or snap-on mounting on 35 mm standard mounting rail (16 to 125 A)
- Including terminal cover for the infeed side
- Front plate
  - 3LD20, 3LD21, 3LD22: 67 x 67 mm
  - 3LD25 to 3LD28: 90 x 90 mm
  - 3LD23 to 3LD24: 96 x 96 mm
- Mounting dimensions
  - 3LD20, 3LD21, 3LD22: 380 mm
  - 3LD25 to 3LD28: 390 mm
  - 3LD23 to 3LD24: 600 mm

Four-hole mounting



3LD2213-0TK53

3	--	7.5	16		**3LD2013-0TK5☐**	1	1 unit	1CL
		9.5	25		**3LD2113-0TK5☐**	1	1 unit	1CL
		11.5	32		**3LD2213-0TK5☐**	1	1 unit	1CL
		22	63		**3LD2514-0TK5☐**	1	1 unit	1CL
		37	100		**3LD2714-0TK5☐**	1	1 unit	1CL
		45	125		**3LD2814-0TK5☐**	1	1 unit	1CL
		75	160		**3LD2318-0TK1☐**	1	1 unit	1CL
		132	250		**3LD2418-0TK1☐**	1	1 unit	1CL
3 + N	--	7.5	16		**3LD2013-1TL5☐**	1	1 unit	1CL
		9.5	25		**3LD2113-1TL5☐**	1	1 unit	1CL
		11.5	32		**3LD2213-1TL5☐**	1	1 unit	1CL
		22	63		**3LD2514-1TL5☐**	1	1 unit	1CL
		37	100		**3LD2714-0TK5☐** + [1]	1	1 unit	1CL
					3LD9280-0C	1	1 unit	1CL
		45	125		**3LD2814-0TK5☐** + [1]	1	1 unit	1CL
					3LD9280-0C	1	1 unit	1CL
		75	160		**3LD2318-1TL1☐**	1	1 unit	1CL
		132	250		**3LD2418-1TL1☐**	1	1 unit	1CL

Actuator color

Black	**1**
Red/yellow (EMERGENCY-STOP)	**3**

[1] 4th contact element as N conductor to be ordered separately,
see page 7/39, Accessories.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3LD2213-0TK53

Number and version of the contacts		Rated data at 50 .. 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A	I_u						
		kW	A	d					
3	1 NO + 1 NC	7.5	16		**3LD2013-0TK5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		9.5	25		**3LD2113-0TK5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		11.5	32		**3LD2213-0TK5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		22	63		**3LD2514-0TK5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		37	100		**3LD2714-0TK5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		45	125		**3LD2814-0TK5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		75	160		**3LD2318-0TK1□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		132	250		**3LD2418-0TK1□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
3 + N	1 NO + 1 NC	7.5	16		**3LD2013-1TL5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		9.5	25		**3LD2113-1TL5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		11.5	32		**3LD2213-1TL5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		22	63		**3LD2514-1TL5□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		37	100		**3LD2714-0TK5□**		1	1 unit	1CL
					+[1] **3LD9280-0C**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		45	125		**3LD2814-0TK5□**		1	1 unit	1CL
					+[1] **3LD9280-0C**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		75	160		**3LD2318-1TL1□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL
		132	250		**3LD2418-1TL1□**		1	1 unit	1CL
					+[2] **3LD9200-5C**		1	1 unit	1CL

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, Accessories.

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories.

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3LD2 main control and EMERGENCY-STOP switches from 16 to 250 A > Floor mounting

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A	I_u						
		kW	A	d					
Main control and EMERGENCY-STOP switches with door-coupling rotary operating mechanism									
• With shaft									
• Lockable in 0 position with up to 3 padlocks: - 3LD20 to 3LD28: Hasp thickness from 4 to 8 mm - 3LD23 and 3LD24: Hasp thickness from 4 to 6 mm									
• Degree of protection at front side IP65									
• Door-coupling rotary operating mechanism with integrated tolerance compensation (16 to 125 A)									
• All versions with rotary operating mechanism									
• Mounting using screws or snap-on mounting on 35 mm standard mounting rail (16 to 125 A)									
• Including terminal cover for the infeed side									
• Front plate - 3LD20, 3LD21, 3LD22: 67 x 67 mm - 3LD25: 90 x 90 mm									
• Mounting dimensions - 3LD20, 3LD21, 3LD22: 380 mm - 3LD25: 390 mm									
Center-hole mounting Ø 22.5 mm									
3	--	7.5	16		**3LD2044-0TK5☐**		1	1 unit	1CL
		9.5	25		**3LD2144-0TK5☐**		1	1 unit	1CL
		11.5	32		**3LD2244-0TK5☐**		1	1 unit	1CL
		22	63		**3LD2545-0TK5☐**		1	1 unit	1CL
3 + N	--	7.5	16		**3LD2044-1TL5☐**		1	1 unit	1CL
		9.5	25		**3LD2144-1TL5☐**		1	1 unit	1CL
		11.5	32		**3LD2244-1TL5☐**		1	1 unit	1CL
		22	63		**3LD2545-0TK5☐** + [1]		1	1 unit	1CL
					3LD9250-0CA		1	1 unit	1CL
3	1 NO + 1 NC	7.5	16		**3LD2044-0TK5☐** + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL
		9.5	25		**3LD2144-0TK5☐** + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL
		11.5	32		**3LD2244-0TK5☐** + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL
		22	63		**3LD2545-0TK5☐** + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL
3 + N	1 NO + 1 NC	7.5	16		**3LD2044-1TL5☐** + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL
		9.5	25		**3LD2144-1TL5☐** + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL
		11.5	32		**3LD2244-1TL5☐** + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL
		22	63		**3LD2545-0TK5☐** + [1]		1	1 unit	1CL
					3LD9250-0CA + [2]		1	1 unit	1CL
					3LD9200-5C		1	1 unit	1CL



3LD2144-0TK53

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, Accessories.

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Number and version of the contacts		Rated data at 50 Hz ... 60 Hz, 380 V ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-3	P/AC-23A	I_u						
		kW	kW	A	d					
Main control and EMERGENCY-STOP switches with door-coupling rotary operating mechanism (6-pole)										
• Lockable in 0 position with up to 3 padlocks with a hasp thickness of 4 to 8 mm • Degree of protection at front side IP65 • Door-coupling rotary operating mechanism with integrated tolerance compensation (for 3LD21) • All versions with rotary operating mechanism Exception: 3LD23 and 3LD24 with door-coupling rotary operating mechanism as selector switch • Mounting using screws or snap-on mounting on 35 mm standard mounting rails • Including terminal cover for the infeed side • Front plate - 3LD20, 3LD21, 3LD22: 67 x 67 mm - 3LD23, 3LD24: 96 x 96 mm										
Four-hole mounting										
6	--	7.5	9.5	25		**3LD2113-3VK5☐**		1	1 unit	1CL
6	--	50	75	160		**3LD2318-3VK1☐**		1	1 unit	1CL
6	--	110	132	250		**3LD2418-3VK1☐**		1	1 unit	1CL
6	1 NO + 1 NC	9.5	9.5	25		**3LD2113-4VP5☐**		1	1 unit	1CL



3LD2113-3VK51

Actuator color

Black	**1**
Red/yellow (EMERGENCY-STOP)	**3**

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3LD2 main control and EMERGENCY-STOP switches from 16 to 250 A > Floor mounting

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A	I_u						
		kW	A	d					

Main control and EMERGENCY-STOP switches with defeatable door-coupling rotary operating mechanism (as knob-operated mechanism)

The 3LD main control and EMERGENCY-STOP switch with defeatable door-coupling rotary operating mechanism enables you to conduct repairs, maintenance work or tests on electrical plants and machines without having to interrupt their operation. With the help of the defeatable door-coupling rotary operating mechanism, an electrician can bypass locking in the ON position and open the control cabinet door with the plant activated.

3LD main control and EMERGENCY-STOP switches with defeatable door-coupling rotary operating mechanism are approved according to UL 508.

- With 300 mm switch shaft
- Lockable in 0 position with up to 3 padlocks with a hasp thickness of 4 to 6 mm
- Degree of protection at front side IP65
- Door-coupling rotary operating mechanism as knob-operated mechanism with integrated tolerance compensation
- Mounting using screws or snap-on mounting on 35 mm standard mounting rails
- Including terminal cover for the infeed side
- Front plate 65 x 65 mm

Four-hole mounting



3LD2017-0TK..

3	--	7.5	16		**3LD2017-0TK1☐**	1	1 unit	1CL
		11.5	32		**3LD2217-0TK1☐**	1	1 unit	1CL
		22	63		**3LD2517-0TK1☐**	1	1 unit	1CL
3 + N	--	7.5	16		**3LD2017-1TL1☐**	1	1 unit	1CL
		11.5	32		**3LD2217-1TL1☐**	1	1 unit	1CL
		22	63		**3LD2517-1TL1☐**	1	1 unit	1CL

Actuator color

Black	**1**
Red/yellow (EMERGENCY-STOP)	**3**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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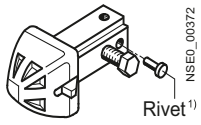
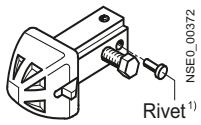
Accessories

Defeatable door-coupling rotary operating mechanisms from 100 A to 250 A

For switch disconnectors with door-coupling rotary operating mechanisms, a defeatable door-coupling rotary operating mechanism can be assembled with the following components from the 8UC7 series.

The following components are to be used for this purpose:

- For switch disconnectors with 3LD27 and 3LD28 door-coupling rotary operating mechanisms:
  - 8UC7110-1BB
  - 8UC7120-3BB
  - 8UC6011
- For switch disconnectors with 3LD23 and 3LD24 door-coupling rotary operating mechanisms:
  - 8UC7210-1BB
  - 8UC7220-3BB
  - 8UC6012

	Rotary operating mechanisms	Size	Cross-section of the actuating shaft	Version [2]	SD	Individual parts for 8UC7 door-coupling rotary operating mechanisms Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Type		mm x mm		d					
Components for 3LD27, 3LD28										
 8UC71	8UC71	1	6 x 6	Standard		**8UC7110-1BB**		1	1 unit	1CL
				EMERGENCY-STOP		**8UC7120-3BB**		1	1 unit	1CL
 8UC6011	8UC71	1	6 x 6	--		**8UC6011**		1	1 unit	1CL
Components for 3LD23, 3LD24										
 8UC74	8UC72	2	8 x 8	Standard		**8UC7210-1BB**		1	1 unit	1CL
				EMERGENCY-STOP		**8UC7220-3BB**		1	1 unit	1CL
 8UC6012	8UC72	2	8 x 8	--		**8UC6012**		1	1 unit	1CL

1) Non-interchangeability features.

2) Standard: Ti-gray handle, light-gray masking plate;
EMERGENCY-STOP: Red handle, yellow masking plate.

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Selection and ordering data

Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements	P/AC-23A kW	I_u A	d					
ON/OFF and EMERGENCY-STOP switches with masking plate and selector knob • With screw fixing • With snap-on mounting on 35 mm standard mounting rail (16 to 125 A) • Lockable in 0 position with up to 2 padlocks with a hasp thickness of 4 to 6 mm (160 A) or up to 3 padlocks with a hasp thickness of 4 to 6 mm (250 A) • Degree of protection at front side IP44 • Including terminal cover for the infeed side (160 A and 250 A only)									
3	--	7.5	16		**3LD2030-0TK1☐**		1	1 unit	1CL
		9.5	25		**3LD2130-0TK1☐**		1	1 unit	1CL
		11.5	32		**3LD2230-0TK1☐**		1	1 unit	1CL
		22	63		**3LD2530-0TK1☐**		1	1 unit	1CL
		37	100		**3LD2730-0TK1☐**		1	1 unit	1CL
		45	125		**3LD2830-0TK1☐**		1	1 unit	1CL
		75	160		**3LD2330-0TK1☐**		1	1 unit	1CL
		132	250		**3LD2430-0TK1☐**		1	1 unit	1CL
3 + N	--	7.5	16		**3LD2030-1TL1☐**		1	1 unit	1CL
		9.5	25		**3LD2130-0TK1☐** + [1]		1	1 unit	1CL
					3LD9220-0C		1	1 unit	1CL
		11.5	32		**3LD2230-0TK1☐** + [1]		1	1 unit	1CL
					3LD9220-0C		1	1 unit	1CL
		22	63		**3LD2530-0TK1☐** + [1]		1	1 unit	1CL
					3LD9250-0CA		1	1 unit	1CL
		37	100		**3LD2730-0TK1☐** + [1]		1	1 unit	1CL
					3LD9280-0C		1	1 unit	1CL
		45	125		**3LD2830-0TK1☐** + [1]		1	1 unit	1CL
					3LD9280-0C		1	1 unit	1CL
		75	160		**3LD2330-0TK1☐** + [1]		1	1 unit	1CL
					3LD9240-0C		1	1 unit	1CL
		132	250		**3LD2430-0TK1☐** + [1]		1	1 unit	1CL
					3LD9240-0C		1	1 unit	1CL



3LD2530-0TK13



3LD2330-0TK11

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, "Accessories, accessories for floor mounting".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Auxiliary contact elements	P/AC-23A	I_u						
			kW	A	d					
 3LD2530-0TK11	3	1 NO + 1 NC	7.5	16		**3LD2030-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			9.5	25		**3LD2130-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			11.5	32		**3LD2230-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			22	63		**3LD2530-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			37	100		**3LD2730-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			45	125		**3LD2830-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			75	160		**3LD2330-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			132	250		**3LD2430-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
	3 + N	1 NO + 1 NC	7.5	16		**3LD2030-1TL1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
			9.5	25		**3LD2130-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
						+ [1] **3LD9220-0C**		1	1 unit	1CL
			11.5	32		**3LD2230-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
						+ [1] **3LD9220-0C**		1	1 unit	1CL
			22	63		**3LD2530-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
						+ [1] **3LD9250-0CA**		1	1 unit	1CL
			37	100		**3LD2730-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
						+ [1] **3LD9280-0C**		1	1 unit	1CL
			45	125		**3LD2830-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
						+ [1] **3LD9280-0C**		1	1 unit	1CL
			75	160		**3LD2330-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
						+ [1] **3LD9240-0C**		1	1 unit	1CL
			132	250		**3LD2430-0TK1☐**		1	1 unit	1CL
						+ [2] **3LD9200-5C**		1	1 unit	1CL
						+ [1] **3LD9240-0C**		1	1 unit	1CL

Actuator color

Black	**1**
Red/yellow (EMERGENCY-STOP)	**3**

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, Accessories for floor mounting.

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories.

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Selection and ordering data

Number and version of the contacts		Base terminal	Rated data at 50 ... 60 Hz, 380 ... 440 V		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements		P/AC-23A	I_u						
			kW	A	d					
Main control and EMERGENCY-STOP switches										
• With N and/or PE/ground base terminals										
• Lockable in 0 position with up to 3 padlocks with a hasp thickness of 4 to 8 mm										
• Degree of protection IP65										
• Rotary operating mechanisms with center-hole mounting										
• For floor-mounted auxiliary switches										
• Metric screw connection										
3	--	PE + N	7.5	16		**3LD2064-0TB5☐**		1	1 unit	1CL
		PE + N	9.5	25		**3LD2164-0TB5☐**		1	1 unit	1CL
		PE + N	11.5	32		**3LD2264-0TB5☐**		1	1 unit	1CL
		PE + N	22	63		**3LD2565-0TB5☐**		1	1 unit	1CL
		PE + N	37	100		**3LD2766-0TB5☐**		1	1 unit	1CL
		PE + N	45	125		**3LD2866-0TB5☐**		1	1 unit	1CL
3 + N	--	PE	7.5	16		**3LD2064-1TC5☐**		1	1 unit	1CL
		PE	9.5	25		**3LD2164-1TC5☐**		1	1 unit	1CL
		PE	11.5	32		**3LD2264-1TC5☐**		1	1 unit	1CL
		PE	22	63		**3LD2565-1TC5☐**		1	1 unit	1CL
		PE + N	37	100		**3LD2766-0TB5☐** + [1] **3LD9280-0C**		1 1	1 unit 1 unit	1CL 1CL
		PE + N	45	125		**3LD2866-0TB5☐** + [1] **3LD9280-0C**		1 1	1 unit 1 unit	1CL 1CL
3	1 NO + 1 NC	N	7.5	16		**3LD2064-1GP5☐**		1	1 unit	1CL
		N	9.5	25		**3LD2164-1GP5☐**		1	1 unit	1CL
		N	11.5	32		**3LD2264-1GP5☐**		1	1 unit	1CL
		N	22	63		**3LD2565-1GP5☐**		1	1 unit	1CL
		N	37	100		**3LD2766-1GP5☐**		1	1 unit	1CL
		N	45	125		**3LD2866-1GP5☐**		1	1 unit	1CL
3 + N	1 NO + 1 NC	PE	7.5	16		**3LD2064-1TC5☐** + [2] **3LD9200-5C**		1 1	1 unit 1 unit	1CL 1CL
		PE	9.5	25		**3LD2164-1TC5☐** + [2] **3LD9200-5C**		1 1	1 unit 1 unit	1CL 1CL
		PE	11.5	32		**3LD2264-1TC5☐** + [2] **3LD9200-5C**		1 1	1 unit 1 unit	1CL 1CL
		PE	22	63		**3LD2565-1TC5☐** + [2] **3LD9200-5C**		1 1	1 unit 1 unit	1CL 1CL
		N	37	100		**3LD2766-1GP5☐** + [1] **3LD9280-0C**		1 1	1 unit 1 unit	1CL 1CL
		N	45	125		**3LD2866-1GP5☐** + [1] **3LD9280-0C**		1 1	1 unit 1 unit	1CL 1CL



3LD2164-0TB53

Actuator color

Black	1
Red/yellow (EMERGENCY-STOP)	3

[1] 4th contact element as N conductor to be ordered separately, see page 7/39, Accessories for floor mounting

[2] Auxiliary switches 1 NO + 1 NC to be ordered separately, see page 7/39, Accessories

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Number and version of the contacts		Base terminal	Rated data at 50 ... 60 Hz, 380 ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Auxiliary contact elements		P/AC-3	P/AC-23A	I_u						
			kW	kW	A	d					
Main control and EMERGENCY-STOP switches with rotary operating mechanism (6-pole)											
• With N and/or PE/ground base terminals											
• Degree of protection IP65											
• Metric screw connection											
6	--	PE + N	7.5	9.5	25		**3LD2165-3VB5☐**		1	1 unit	1CL
		PE + N	9.5	11.5	32		**3LD2265-3VB5☐**		1	1 unit	1CL
		PE + N	18.5	22.0	63		**3LD2566-3VB5☐**		1	1 unit	1CL
6	1 NO + 1 NC	N	7.5	9.5	25		**3LD2165-4VD5☐**		1	1 unit	1CL
		N	9.5	11.5	32		**3LD2265-4VD5☐**		1	1 unit	1CL
		PE + N	18.5	22.0	63		**3LD2566-4VD5☐**		1	1 unit	1CL



3LD2165-3VB53

Actuator color

Black	**1**
Red/yellow (EMERGENCY-STOP)	**3**

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Selection and ordering data

	Mains voltage	Rated current I_e at 800 V DC		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Max.	DC-21A	DC-22A						
	V DC	A	A	d					
	DC isolators in molded-plastic enclosure								
	• Molded-plastic enclosure IP65								
	• Metric screw connection								
	• (B x H x D) 146 x 199 x 136 mm								
	• Conductor cross-sections:								
	- Solid and stranded 1.5 … 16 mm^2								
	- Finely stranded with end sleeve max. 10 mm^2								
	• Lockable								
 3LD2265-8VQ5.-0AF6	800	32	16		**3LD2265-8VQ5□-0AF6**		1	1 unit	1CL

Actuator color

Black	**1**
Red/yellow (EMERGENCY-STOP)	**3**

	Mains voltage	Rated current I_e at 800 V DC		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Max.	DC-21A	DC-22A						
	V DC	A	A	d					
	DC isolators for distribution board mounting								
	• Conductor cross-sections:								
	- Solid and stranded 1.5 … 16 mm^2								
	- Finely stranded with end sleeve max. 10 mm^2								
	• Actuator color: Black								
 3LD2265-8VQ11-0AF6	800	32	16		**3LD2230-8VQ11-0AF6**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD d	3LD20 Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For front mounting							
 3LD9200-2B	**N or PE terminals** Through-type		**3LD9200-2B**		1	1 unit	1CL
 3LD9200-5B	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off • 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, with gold-plated contacts for requesting electronic information, leading switch-off • 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
For floor mounting, distribution board mounting or molded-plastic enclosures							
 3LD9200-2C	**N or PE terminals** Through-type		**3LD9200-2C**		1	1 unit	1CL
 3LD9200-5C (left) 3LD9200-6C (right)	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off • 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
	• 2 NO		**3LD9200-6C**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, with gold-plated contacts for requesting electronic information, leading switch-off • 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL
For front and floor mounting							
 3LD9224-1B	**Rotary operating mechanisms** Lockable in 0 position with up to 3 padlocks • For four-hole mounting, including seal						
	- Black		**3LD9224-1B**		1	1 unit	1CL
	- Red/yellow		**3LD9224-3B**		1	1 unit	1CL
	• For center-hole mounting, including seal and nut						
 3LD9224-3D	- Black		**3LD9224-1D**		1	1 unit	1CL
	- Red/yellow		**3LD9224-3D**		1	1 unit	1CL
 3LD9256-0A	**Mounting tools** For center-hole mounting with nut		**3LD9256-0A**		1	5 units	1CL
	Switching shafts 6 x 6 mm						
	Length 300 mm		**3LD9205-0C**		1	5 units	1CL
	Length 600 mm		**3LD9205-2C**		1	5 units	1CL
 3LD9286-1A	**Inscription labels**						
	With English/German inscription (MAIN SWITCH/HAUPTSCHALTER)		**3LD9286-1A**		1	10 units	1CL
	Without inscription		**3LD9286-4A**		1	10 units	1CL
 3LD9201-2A	**Terminal covers as additional touch protection (also for distribution board mounting)** Can be snapped on at top and bottom						
	• 1-pole		**3LD9201-2A**		100	4 units	1CL
	• 4-pole		**3LD9201-1A**		1	4 units	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	3LD21 and 3LD22		PU (UNIT, SET, M)	PS	PG
		d	Article No. www.siemens.com/product?Article No.	Price per PU			
For front mounting							
 3LD9220-0B (left) 3LD9220-2B (right)	**4th contact element (N conductor)** Leading switch-on, lagging switch-off		**3LD9220-0B**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9220-2B**		1	1 unit	1CL
 3LD9200-5B	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
For floor mounting, distribution board mounting or molded-plastic enclosures							
 3LD9220-0C	**4th contact element (N conductor)** Leading switch-on, lagging switch-off		**3LD9220-0C**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9220-2C**		1	1 unit	1CL
 3LD9200-5C (left) 3LD9200-6C (right)	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
	• 2 NO		**3LD9200-6C**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL
For front and floor mounting							
 3LD9224-1B	**Rotary operating mechanisms** Lockable in 0 position with up to 3 padlocks						
	• For four-hole mounting including seal						
	- Black		**3LD9224-1B**		1	1 unit	1CL
	- Red/yellow		**3LD9224-3B**		1	1 unit	1CL
 3LD9224-3D	• For center-hole mounting, including seal and nut						
	- Black		**3LD9224-1D**		1	1 unit	1CL
	- Red/yellow		**3LD9224-3D**		1	1 unit	1CL
 3LD9256-0A	**Mounting tools** For center-hole mounting with nut		**3LD9256-0A**		1	5 units	1CL
	Switching shafts 6 x 6 mm						
	Length 300 mm		**3LD9205-0C**		1	5 units	1CL
	Length 600 mm		**3LD9205-2C**		1	5 units	1CL
 3LD9286-1A	**Inscription labels**						
	With English/German inscription (MAIN SWITCH/HAUPTSCHALTER)		**3LD9286-1A**		1	10 units	1CL
	Without inscription		**3LD9286-4A**		1	10 units	1CL
 3LD9221-2A (left) 3LD9221-0A (right)	**Terminal covers as additional touch protection (also for distribution board mounting)** Can be snapped on at top and bottom						
	• 1-pole		**3LD9221-2A**		100	4 units	1CL
	• 3-pole		**3LD9221-0A**		1	4 units	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	3LD25 Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For front mounting							
 3LD9250-0BA (left) 3LD9250-2BA (right)	**4th contact element (N conductor)**		**3LD9250-0BA**		1	1 unit	1CL
	Leading switch-on, lagging switch-off						
	N or PE terminals		**3LD9250-2BA**		1	1 unit	1CL
	Through-type						
 3LD9200-5B	**Auxiliary switches**						
	For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
For floor mounting, distribution board mounting or molded-plastic enclosures							
 3LD9250-0CA (left) 3LD9250-2CA (right)	**4th contact element (N conductor)**		**3LD9250-0CA**		1	1 unit	1CL
	Leading switch-on, lagging switch-off						
	N or PE terminals		**3LD9250-2CA**		1	1 unit	1CL
	Through-type						
 3LD9200-5C (left) 3LD9200-6C (right)	**Auxiliary switches**						
	For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
	• 2 NO		**3LD9200-6C**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL
For front and floor mounting							
 3LD9284-1B	**Rotary operating mechanisms**						
	Lockable in 0 position with up to 3 padlocks						
	• For four-hole mounting, including seal						
	- Black		**3LD9284-1B**		1	1 unit	1CL
	- Red/yellow		**3LD9284-3B**		1	1 unit	1CL
 3LD9284-3D	• For center-hole mounting, including seal and nut						
	- Black		**3LD9284-1D**		1	1 unit	1CL
	- Red/yellow		**3LD9284-3D**		1	1 unit	1CL
 3LD9256-0A	**Mounting tools**						
	For center-hole mounting with nut		**3LD9256-0A**		1	5 units	1CL
	Switching shafts 6 x 6 mm						
	Length 300 mm		**3LD9205-0C**		1	5 units	1CL
	Length 600 mm		**3LD9205-2C**		1	5 units	1CL
 3LD9286-1A	**Inscription labels**						
	With English/German inscription (MAIN SWITCH/HAUPTSCHALTER)		**3LD9286-1A**		1	10 units	1CL
	Without inscription		**3LD9286-4A**		1	10 units	1CL
 3LD9251-2A (left) 3LD9251-0A (right)	**Terminal covers as additional touch protection (also for distribution board mounting)**						
	Can be snapped on at top and bottom						
	• 1-pole		**3LD9251-2A**		100	4 units	1CL
	• 3-pole		**3LD9251-0A**		1	4 units	1CL

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Version	SD	3LD27 and 3LD28 Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
For front mounting						
 3LD9280-0B (left) 3LD9280-2B (right)						
4th contact element (N conductor)		**3LD9280-0B**		1	1 unit	1CL
Leading switch-on, lagging switch-off						
N or PE terminals		**3LD9280-2B**		1	1 unit	1CL
Through-type						
 3LD9200-5B						
Auxiliary switches						
For mounting on the left and/or right, lagging switch-on, leading switch-off						
• 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
• 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
For floor mounting, distribution board mounting or molded-plastic enclosures						
 3LD9280-0C (left) 3LD9280-2C (right)						
4th contact element (N conductor)		**3LD9280-0C**		1	1 unit	1CL
Leading switch-on, lagging switch-off						
N or PE terminals		**3LD9280-2C**		1	1 unit	1CL
Through-type						
 3LD9200-5C (left) 3LD9200-6C (right)						
Auxiliary switches						
For mounting on the left and/or right, lagging switch-on, leading switch-off						
• 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
• 2 NO		**3LD9200-6C**		1	1 unit	1CL
For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
• 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL
For front and floor mounting						
 3LD9284-1B						
Rotary operating mechanisms						
Lockable in 0 position with up to 3 padlocks						
• For four-hole mounting, including seal						
- Black		**3LD9284-1B**		1	1 unit	1CL
- Red/yellow		**3LD9284-3B**		1	1 unit	1CL
• For center-hole mounting, including seal and nut						
- Black		**3LD9284-1D**		1	1 unit	1CL
- Red/yellow		**3LD9284-3D**		1	1 unit	1CL
 3LD9284-3D						
Switching shafts 6 x 6 mm						
Length 300 mm		**3LD9205-0C**		1	5 units	1CL
Length 600 mm		**3LD9205-2C**		1	5 units	1CL
 3LD9286-1A						
Inscription labels						
With English/German inscription (MAIN SWITCH/HAUPTSCHALTER)		**3LD9286-1A**		1	10 units	1CL
Without inscription		**3LD9286-4A**		1	10 units	1CL
 3LD9281-2A						
Terminal covers as additional touch protection (also for distribution board mounting)						
Can be snapped on at top and bottom						
• 1-pole (1 pack = 4 units)		**3LD9281-2A**		1	4 units	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	3LD23 and 3LD24		PU (UNIT, SET, M)	PS	PG
		d	Article No. www.siemens.com/product?Article No.	Price per PU			
For front mounting							
 3LD9240-0B (left) 3LD9240-2B (right)	**4th contact element (N conductor)**		**3LD9240-0B**		1	1 unit	1CL
	Leading switch-on, lagging switch-off						
	N or PE terminals		**3LD9240-2B**		1	1 unit	1CL
	Through-type						
 3LD9200-5B	**Auxiliary switches**						
	For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
	• For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
For floor and distribution board mounting							
 3LD9242-4F	**Coupling piece**						
	Without ON-lock		**3LD9242-4F**		1	5 units	1CL
 3LD9240-0C (left) 3LD9240-2C (right)	**4th contact element (N conductor)**		**3LD9240-0C**		1	1 unit	1CL
	Leading switch-on, lagging switch-off						
	N or PE terminals		**3LD9240-2C**		1	1 unit	1CL
	Through-type						
 3LD9200-5C (left) 3LD9200-6C (right)	**Auxiliary switches**						
	For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
	• 2 NO		**3LD9200-6C**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL
For front and floor mounting							
 3LD9243-1B	**Knob-operated mechanism (also for distribution board mounting)**						
	Lockable in 0 position with up to 3 padlocks						
	• For four-hole mounting, including seal						
	- Black		**3LD9243-1B**		1	1 unit	1CL
	- Red/yellow		**3LD9243-3B**		1	1 unit	1CL
	Switching shafts 8 x 8 mm						
	Length 300 mm		**3LD9245-0C**		1	5 units	1CL
	Length 600 mm		**3LD9245-2C**		1	5 units	1CL
 3LD9241-2A	**Terminal covers as additional touch protection (also for distribution board mounting)**						
	Can be snapped on at top and bottom						
	• 1-pole		**3LD9241-2A**		1	4 units	1CL

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Introduction

Overview

Devices		Description	Page
Complete assemblies			
	**Complete assemblies with direct operating mechanisms**	Ready-to-install combinations comprising switch disconnectors and operating mechanisms • 3 and 4-pole switch disconnectors with front operating mechanisms • Connections in form of box terminal or flat terminal incl. direct operating mechanism with gray handle	7/65
Basic units			
	**Front operating mechanisms** 3/4-pole up to 690 V AC / 440 V DC	Switch disconnectors with front operating mechanisms without handle • 3 and 4-pole versions • Connections in form of flat terminal (size 2 to 5) or box terminal (size 1 and 2) • Operating mechanism module in center or on left-hand side of switch disconnector	7/66
	**Side operating mechanisms**	Switch disconnectors with side operating mechanisms • 3 and 4-pole versions • Connections in form of flat terminal (size 2 to 5) or box terminal (size 1 and 2) • Operating mechanism module on right or left-hand side of switch disconnector	7/67
	**DC applications, front operating mechanisms** 6-pole up to 1200 V DC	Switch disconnectors with front operating mechanisms without handle • 6-pole versions for DC applications • Connections in form of flat terminal (size 2 to 5) or box terminal (size 1 and 2) • Operating mechanism module in center of switch disconnector	7/70
Accessories and spare parts			
 Left: Box terminal Right: Flat terminal	**Additional poles**	Additional poles for enhanced functionality • 4th contact element (switching pole) • N terminal (neutral conductor terminal with removable jumper) • N/PE terminal (with permanent jumper)	7/70
	**Direct operating mechanisms**	Different handles for mounting on basic units • Direct operating mechanisms for direct mounting on switch disconnector • Handles available in colors gray or red/yellow	7/71
	**Door-coupling rotary operating mechanisms**	Different handles for mounting on basic units • Door-coupling rotary operating mechanisms for operation of switch disconnector outside the control cabinet door • 8UD1 series or 8UC/3KD series • Handles available in colors gray or red/yellow	7/72
	**Auxiliary switches**	Auxiliary switches • For querying the switch position • Optionally available with leading NO contacts (auxiliary switch contacts open before the main contacts of the 3KD switch disconnector) • Optionally available with test function (switch can be tested without closure of main contacts)	7/77
	**Accessories for DC applications**	• Connecting bridge for series connection of two poles • Cable connection cover for connecting bridge	7/78
	**Other accessories**	• Phase barriers • Cable connection cover As touch protection for termination area (for installation outside control cabinet) • Mounting bracket for wall mounting (spare part)	7/79

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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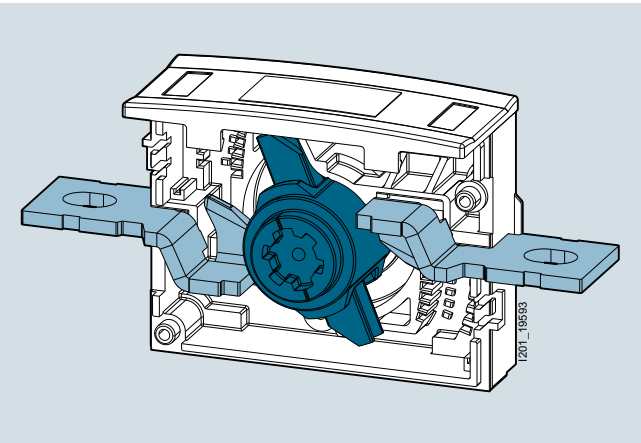
Overview



3KD switch disconnector, complete assembly, 3-pole

Features

- 3-pole, 4-pole, and 6-pole versions in 5 different sizes
- Supplied as a complete assembly including direct operating mechanism or as a basic unit without a handle
- Direct operating mechanism with handle on switch disconnector
- Door-coupling rotary operating mechanism for operation of switch disconnector outside the control cabinet door
- Versions with side operating mechanisms
- Connections in the form of box terminals or flat terminals
- Floor mounting or mounting on a standard mounting rail (sizes 1 and 2)
- Additional poles can be retrofitted: 4th contact element, N or N/PE terminals
- Auxiliary switches for querying the switch positions
- Suitable for AC applications up to 690 V + 10 % (wind power)
- Suitable for DC applications up to 1200 V
- The 3KD offers high reliability thanks to the double break technology.



Double contact break principle

Benefits

- Enhanced touch protection
- Contact position is clearly visible
- Locking functions help to prevent unauthorized operation
- Enhanced protection against inter-phase arcing
- Safe use in wind farms
- Compact design saves space
- Wide variety of applications thanks to a range of different operating mechanism designs
- Supplementary functions can be retrofitted
- Various service positions are possible thanks to optimized heat dissipation
- Test function to ensure safe commissioning
- Comprehensive support through provision of CAx data

Application

3KD switch disconnectors are designed for applications with exacting requirements. They are deployed as main control switches, EMERGENCY-STOP switches and repair switches in industrial plants, infrastructure and buildings. 3KD switch disconnectors are designed to switch the specified rated current on and off under load. At the same time, they constitute a safety isolating function and isolating distance in all low-voltage circuits.

All 3KD switch disconnectors are climate-proof and meet the requirements of IEC 60947-1, IEC 60947-3 and VDE 0660-107.

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General data

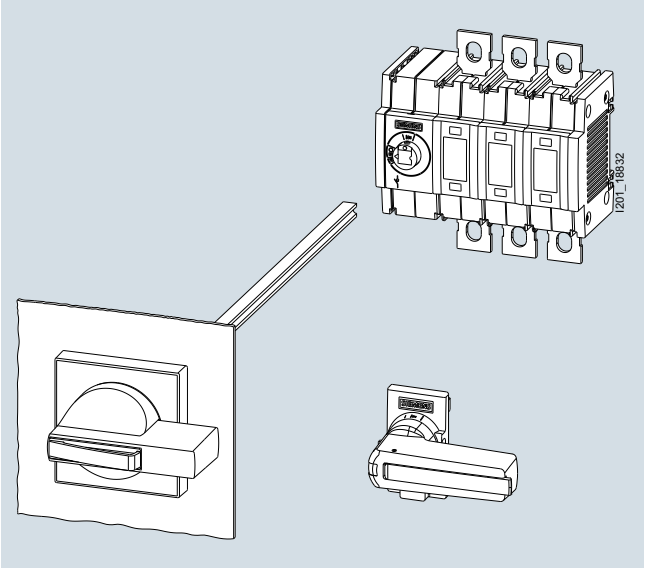
Design

A 3KD switch disconnector consists of an operating mechanism module, three, four or six switching poles and a handle to operate the switch disconnector.

Handles

The direct operating mechanism version of the handle is mounted directly on the switch disconnector. It can also be supplied in the form of a door-coupling rotary operating mechanism for actuation of the switch disconnector outside the control cabinet door. The handle is available in gray, or colored red/yellow for use as an EMERGENCY-STOP switch.

Commonly used switch disconnector variants comprising basic unit and handle are available as complete assemblies.

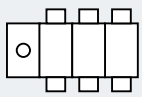
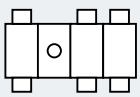
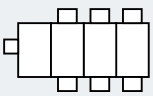
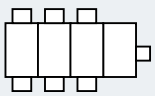
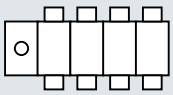
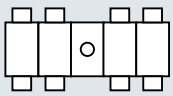
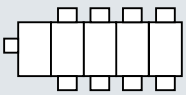
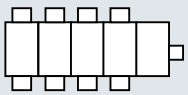
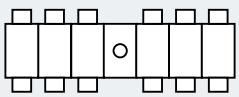


Handle either as direct operating mechanism or door-coupling rotary operating mechanism

Position of operating mechanism modules

To allow optimum utilization of the available installation space, units with front operating mechanisms can be supplied with the operating mechanism module in various positions – mounted on the left-hand side of the 3KD switch disconnector or in the center between the switching poles.

On units with side operating mechanisms, the operating mechanism module is positioned on the right or left-hand side of the 3KD switch disconnector.

Number of poles/ application	Front operating mechanism on side	Front operating mechanism in center	Side operating mechanism, left	Side operating mechanism, right
3-pole				
4-pole				
For 1200 V DC	--		--	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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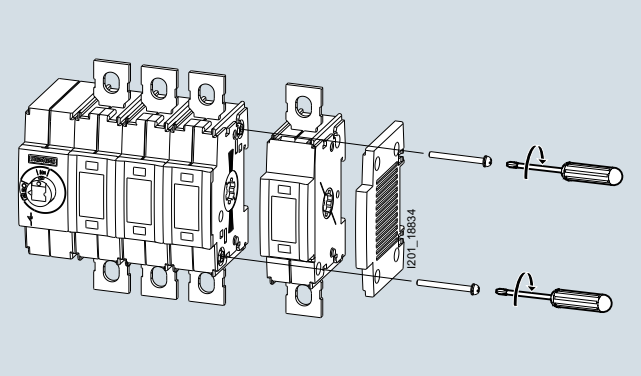
Additional poles

All sizes of the 3KD switch disconnectors can be retrofitted with additional poles on a modular basis.

When installing additional poles, it is important to note that only a 3-pole 3KD switch disconnector may be retrofitted with an additional switching pole with contact system (4th contact element).

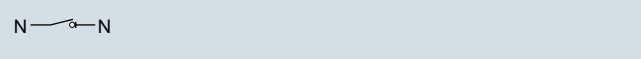
Additional poles (4th contact element, N or N/PE terminal) must always be mounted directly adjacent to the switch disconnector on the left or right. Accordingly, an auxiliary switch module must not be mounted between the basic unit and an additional pole on sizes 1 and 2.



Installation of an additional pole

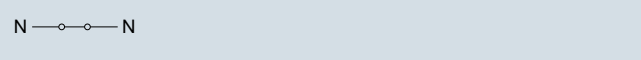
Available versions:

4th contact element:
The 4th contact element includes a contact system and is identical to the poles installed at the factory. It can be installed to upgrade a 3-pole switch disconnector to a disconnector with 4 poles.



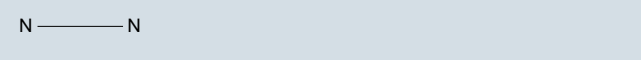
Fourth contact element as an additional pole

N terminal (neutral conductor terminal):
The N terminal does not include a contact system. A jumper can be removed in order to interrupt the electrical connection between the two terminals. An N terminal can be installed to add a non-switching N pole to a 3-pole disconnector.



N terminal as non-switching pole

N/PE terminal:
The N/PE terminal is identical to the neutral conductor terminal. However, the electrical connection between the two terminals is permanent and cannot be interrupted by removal of a jumper. The N/PE terminal is normally deployed for applications in which it is vital to ensure that this connection can never be interrupted.



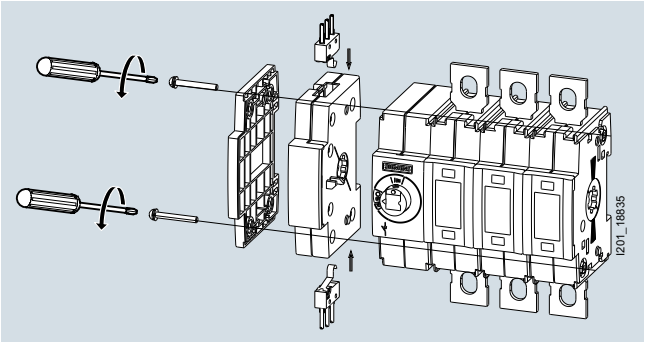
N/PE terminal with permanent connections

Auxiliary switches

Auxiliary switches allow remote interrogation of the contact position of the switch disconnector.

Installation of auxiliary switches for sizes 1 and 2

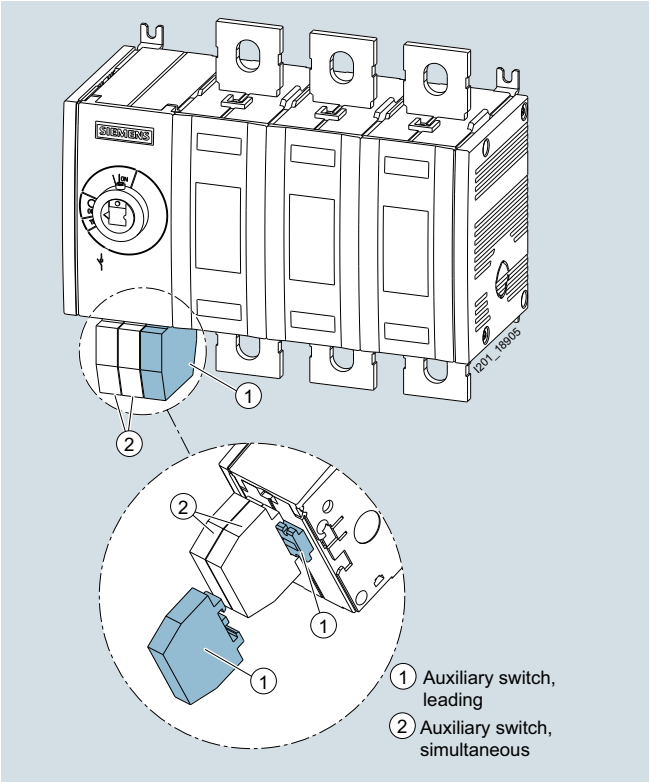
The auxiliary switches used for sizes 1 and 2 are microswitches (changeover contacts) which can be snapped into an auxiliary switch module. This auxiliary switch module is mounted on the side of the switch disconnector in the same way as an additional pole. A maximum of two microswitches can be installed in each auxiliary switch module.



Auxiliary switches with auxiliary switch module for sizes 1 and 2

Installation of auxiliary switches for sizes 3 to 5

With sizes 3 to 5, the auxiliary switches are directly attached to the operating mechanism module. The auxiliary switch with the leading switch function is always installed in the right-hand mounting location. The other locations are provided for simultaneously switching with the main contacts.



Auxiliary switches directly attached to the operating mechanism module with sizes 3 to 5. The leading auxiliary switch is highlighted in the drawing.

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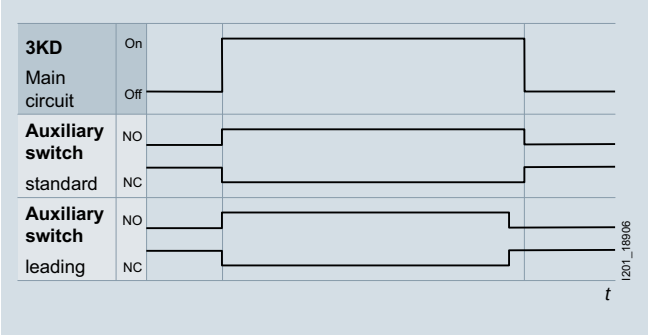
General data

Switching instants of auxiliary switches

The auxiliary switches can operate either simultaneously with the main contacts or function as leading switches with all sizes.



One of the possible functions of leading auxiliary switches is to disconnect the circuit with the assistance of a higher-level switching device, such as a circuit breaker, before the main contacts of the 3KD switch disconnector open.

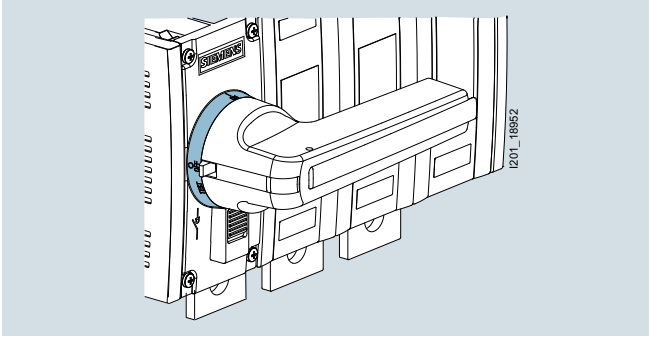
With sizes 1 and 2, the selection of the appropriate auxiliary switch module determines whether the switching instant will be leading or simultaneous.

With sizes 3, 4 and 5, the switching instant is determined by the selection of the mounting location for the auxiliary switch on the operating mechanism module.

Test function for auxiliary switches

The test function allows a wiring check to be performed on the auxiliary switches without necessitating closure of the main contacts of the 3KD switch disconnector. The test function can be used as part of the commissioning process.

The test function is activated by turning the handle of a direct operating mechanism in the OFF position by 25° in the counter-clockwise direction. The handle must be turned 90° in the clock-wise direction in order to switch the main contacts.



The auxiliary switch module including test function must be used for sizes 1 and 2. With sizes 3, 4 and 5, all installed auxiliary switches are switched when the test function is activated.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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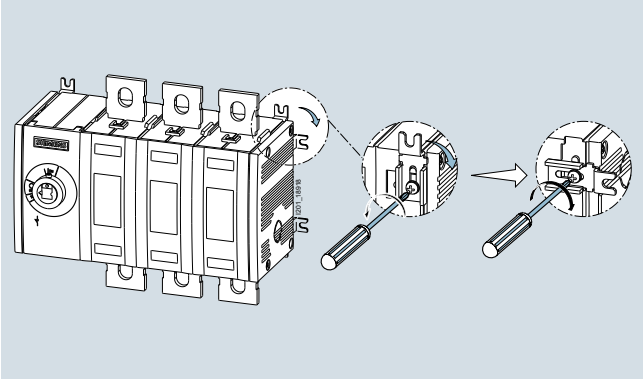
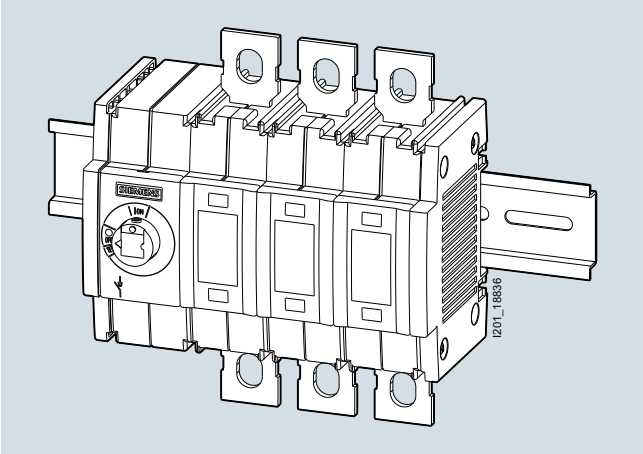
Types of mounting

All 3KD switch disconnectors are designed for floor mounting. To ensure that the switch can be flexibly adapted to the relevant installation conditions, the mounting bracket can be rotated through 90° with size 3 or larger.



Floor mounting method

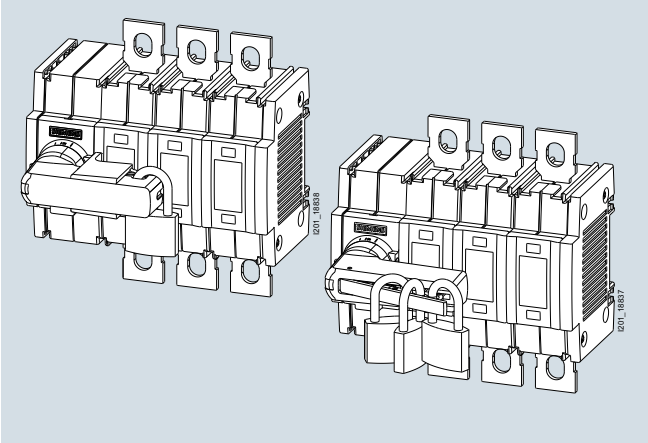
Sizes 1 and 2 can be snapped onto a standard mounting rail (TH35 according to EN 60715) as an alternative mounting method.



Mounting on a standard mounting rail

Locking functions

3KD switch disconnectors can be locked by up to three padlocks in order to prevent unauthorized switch operation. A flat version of the direct operating mechanisms is available for use in confined installation spaces. This can be secured with a lock without increasing the required mounting depth.



Locking functions involving one or more padlocks

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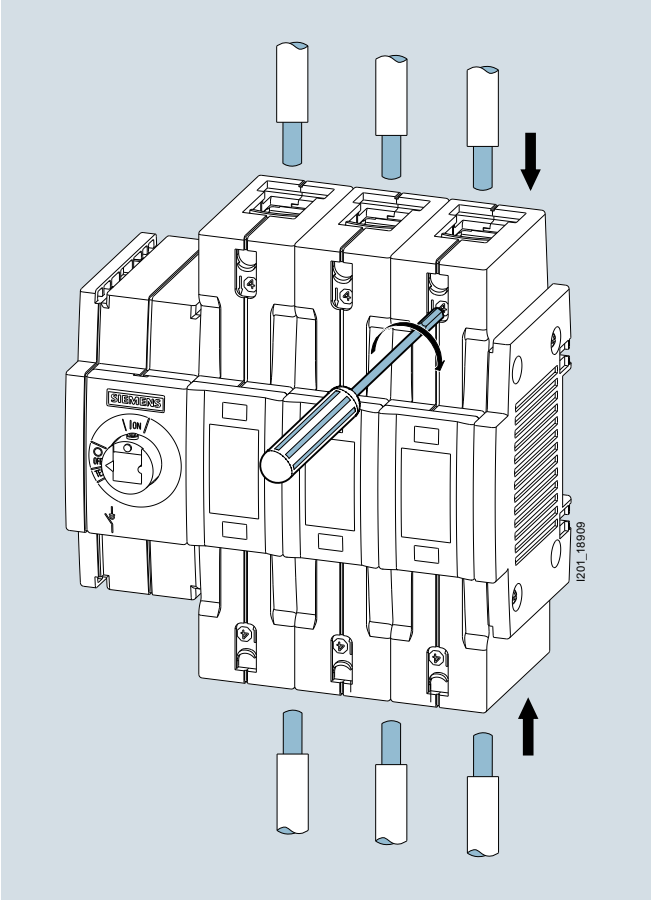
General data

Electrical connection

3KD switch disconnectors are available with a number of different terminal types.

Box terminals

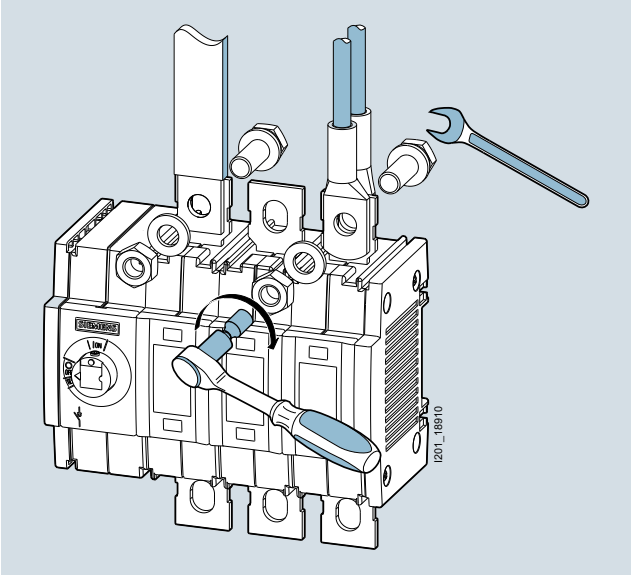
Box terminals for sizes 1 and 2 (rated currents 16 A to 160 A) are designed to allow the speedy connection of stripped conductors.



Connection via box terminals

Flat terminals

Sizes 2 to 5 (rated currents 80 A to 1600 A) are available with flat terminals – for the connection of cable lugs or busbar systems.



Connection via flat terminals

Terminal covers and phase barriers can be supplied for 3KD switch disconnectors with flat terminals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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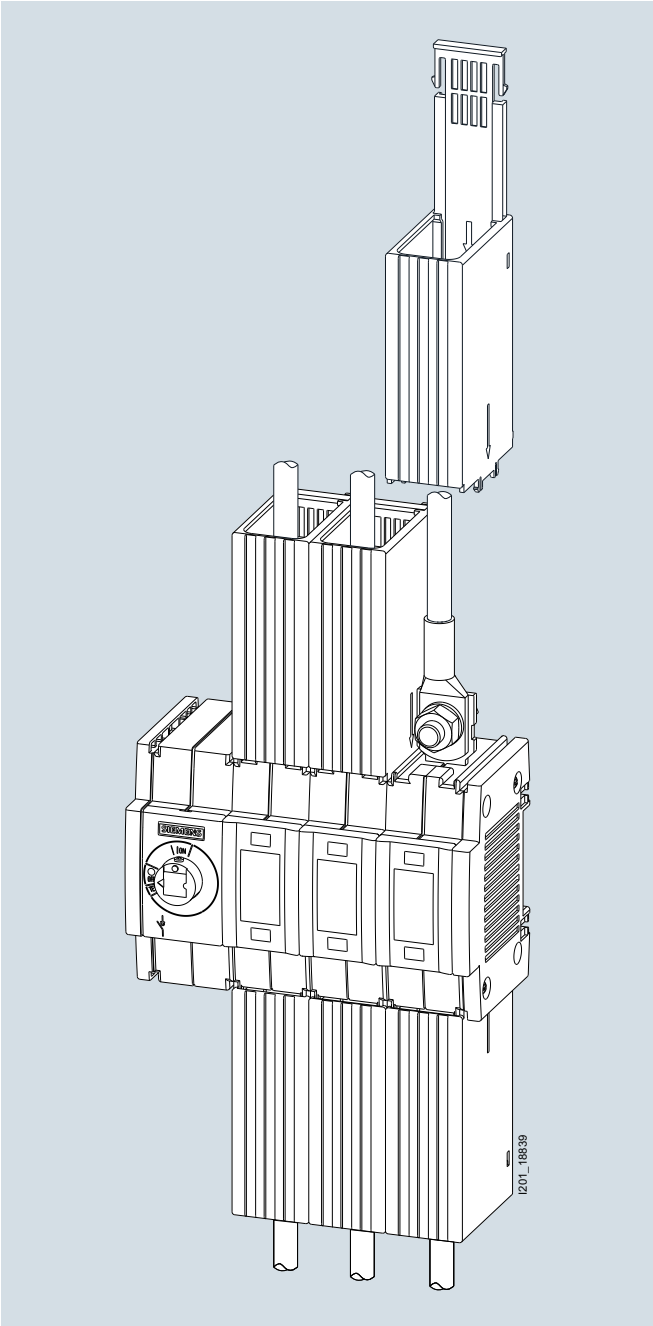
Terminal covers

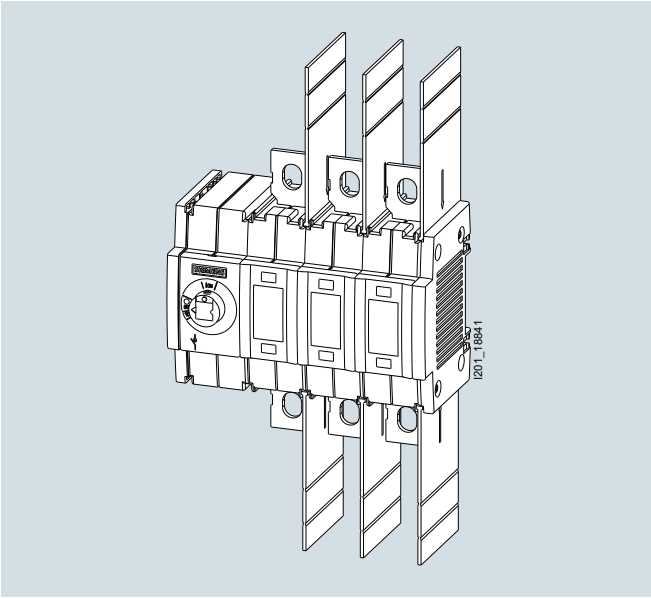
If the 3KD switch disconnector is erected outside a control cabinet, terminal covers can be installed to provide touch protection for all terminals.



Terminal covers

Phase barriers

When long, non-insulated cable lugs are used, phase barriers provide enhanced protection against arcing.



Phase barriers

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Overview

3LD main control and EMERGENCY-STOP switches																
3KD switch disconnectors: Box terminals																
3KD switch disconnectors: Flat terminals																
Size					**1**						**2**					
Type		**3LD20**	**3LD21**	**3LD22**	**3LD25**	**3KD....-.M**			**3LD27**	**3LD28**	**3LD23**	**3KD....-.N**				
		3LD main control and EMERGENCY-STOP switches				**3KD switch disconnectors**			**3LD main control and EMERGENCY-STOP switches**			**3KD switch disconnectors**				
Rated current I_n	A	16	25	32	63	16	32	63	100	125	160	80	100	125	160	200
Number of poles																
• 3		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
• 4		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
• 6		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Connection																
• Flat terminals		--	--	--	--	--	--	--	--	--	--	✓	✓	✓	✓	✓
• Box terminals		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	--
Operating mechanisms																
• Front operating mechanism		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
• Side operating mechanisms		--	--	--	--	✓	✓	✓	--	--	--	✓	✓	✓	✓	✓
Operating and short-circuit behavior																
• Rated short-time withstand current I_{cw} (1 s current, rms value)	kA	0.34	0.64	0.64	1.26	3	3	3	2	2	4	4	4	4	4	4
• Rated conditional short-circuit current with upstream fuses at 690 V[1]	kA_{rms}	50	50	50	50	100	100	100	50	20	50	65	65	65	65	50

[1] Valid for the combination of 3KD switch disconnector and fuse type 3NA..., characteristic gG

✓ Available

-- Not available

For further information about 3LD main control and EMERGENCY-STOP switches,

- see page 7/3
- Industry Mall, section "Building Technologies and Electrical Distribution" --> "Low-Voltage Components" --> "SENTRON Protection, Switching, Measuring and Monitoring Devices" --> "Switching Devices" --> "Switch Disconnectors" --> "3LD Main Control and EMERGENCY-STOP Switches up to 250 A"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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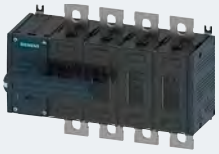
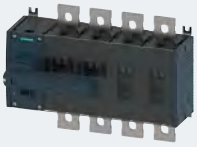
Overview (continued)

3LD main control and EMERGENCY-STOP switches												
3KD switch disconnectors: Box terminals												
3KD switch disconnectors: Flat terminals												
Size			**3**				**4**			**5**		
Type		**3LD24**	**3KD....-.P**				**3KD....-.Q**			**3KD....-.R**		
		3LD main control and EMERGENCY-STOP switches	**3KD switch disconnectors**									
Rated current I_n	A	250	200	250	315	400	500	630	800	1000	1250	1600
Number of poles												
• 3		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
• 4		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
• 6		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Connection												
• Flat terminals		--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
• Box terminals		✓	--	--	--	--	--	--	--	--	--	--
Operating mechanisms												
• Front operating mechanism		✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
• Side operating mechanisms		--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Operating and short-circuit behavior												
• Rated short-time withstand current I_{cw} (1 s current, rms value)	kA	4	13	13	13	13	30	30	30	50	50	50
• Rated conditional short-circuit current with upstream fuses at 690 V[1)]	kA_{rms}	50	65	65	35	35	65	65	50	--	--	--

1) Valid for the combination of 3KD switch disconnector and fuse type 3NA…, characteristic gG

✓ Available

-- Not available

For further information about 3LD main control and EMERGENCY-STOP switches,

- see page 7/3
- See the Industry Mall, section "Building Technologies and Electrical Distribution" --> "Low-Voltage Components" --> "SENTRON Protection, Switching, Measuring and Monitoring Devices" --> "Switching Devices" --> "Switch Disconnectors" --> "3LD Main Control and EMERGENCY-STOP Switches up to 250 A"

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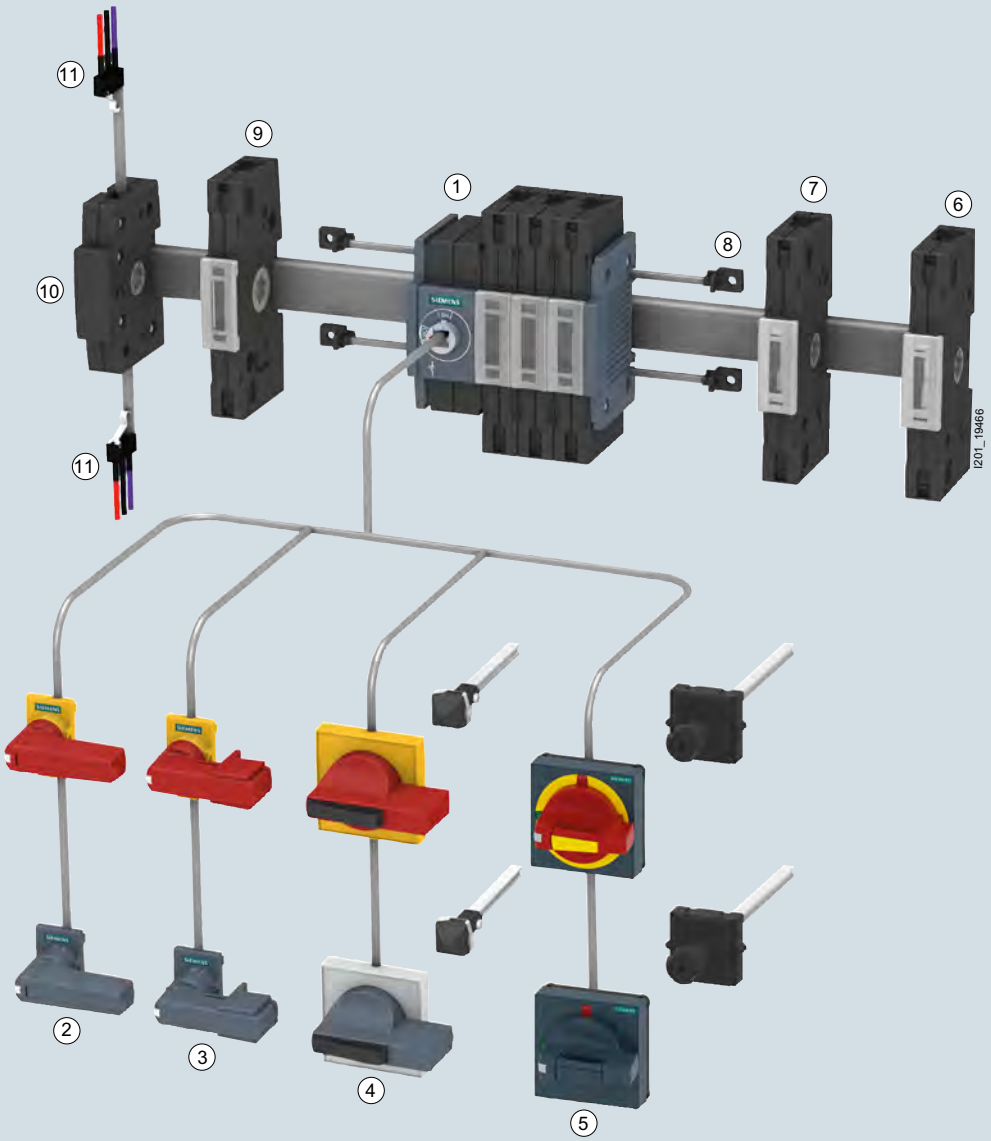
Technical features

Overview of components and accessories: 3KD switch disconnectors, 3/4-pole, sizes 1 and 2, box terminal



1. 3KD switch disconnectors
2. Direct operating mechanism (standard version)
3. Direct operating mechanism (suitable for distribution boards)
4. 8UC/3KD9 door-coupling rotary operating mechanism
5. 8UD1 door-coupling rotary operating mechanism
6. N/PE terminal (with permanent jumper)
7. Neutral conductor terminal (with removable jumper)
8. Mounting bracket (spare part)
9. 4th contact element
10. Auxiliary switch module
11. Auxiliary switch

Minimum order quantity (PS) or a multiple thereof can be ordered.

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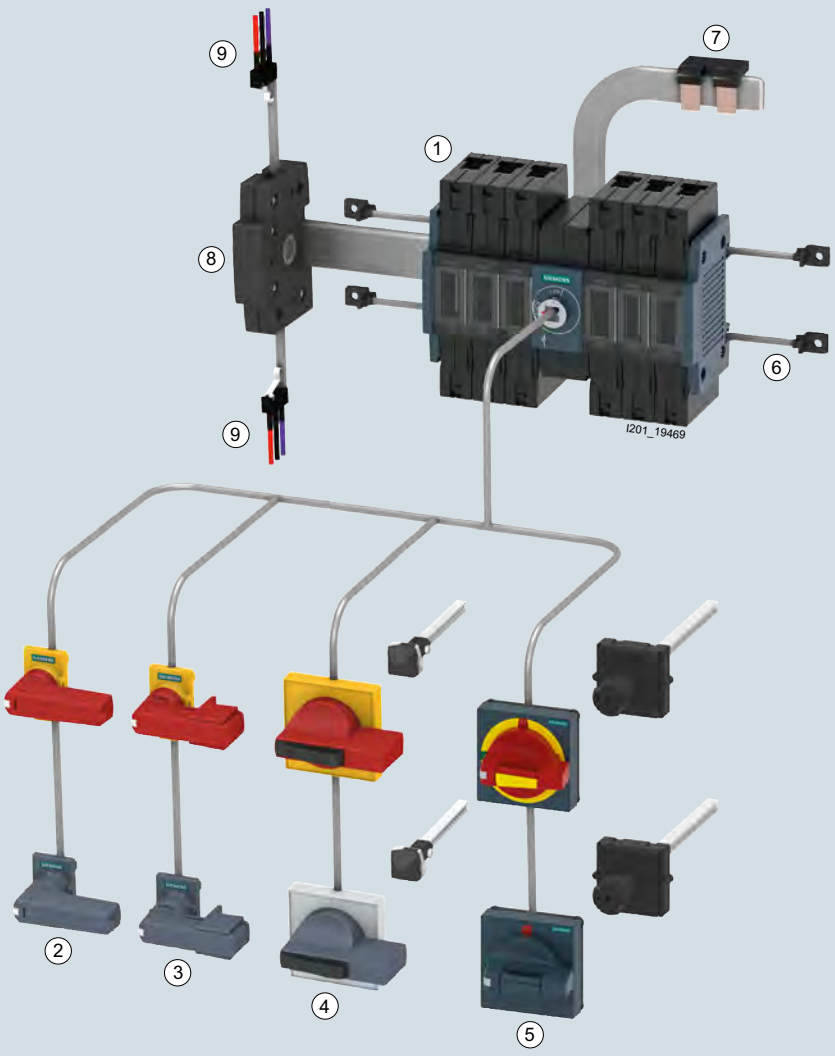
Overview of components and accessories: 3KD switch disconnectors, 6-pole for DC applications, sizes 1 and 2, box terminal



1 3KD switch disconnectors
2 Direct operating mechanism (standard version)
3 Direct operating mechanism (suitable for distribution boards)
4 8UC/3KD9 door-coupling rotary operating mechanism
5 8UD1 door-coupling rotary operating mechanism
6 Mounting bracket (spare part)
7 Bridging bar
8 Auxiliary switch module
9 Auxiliary switch

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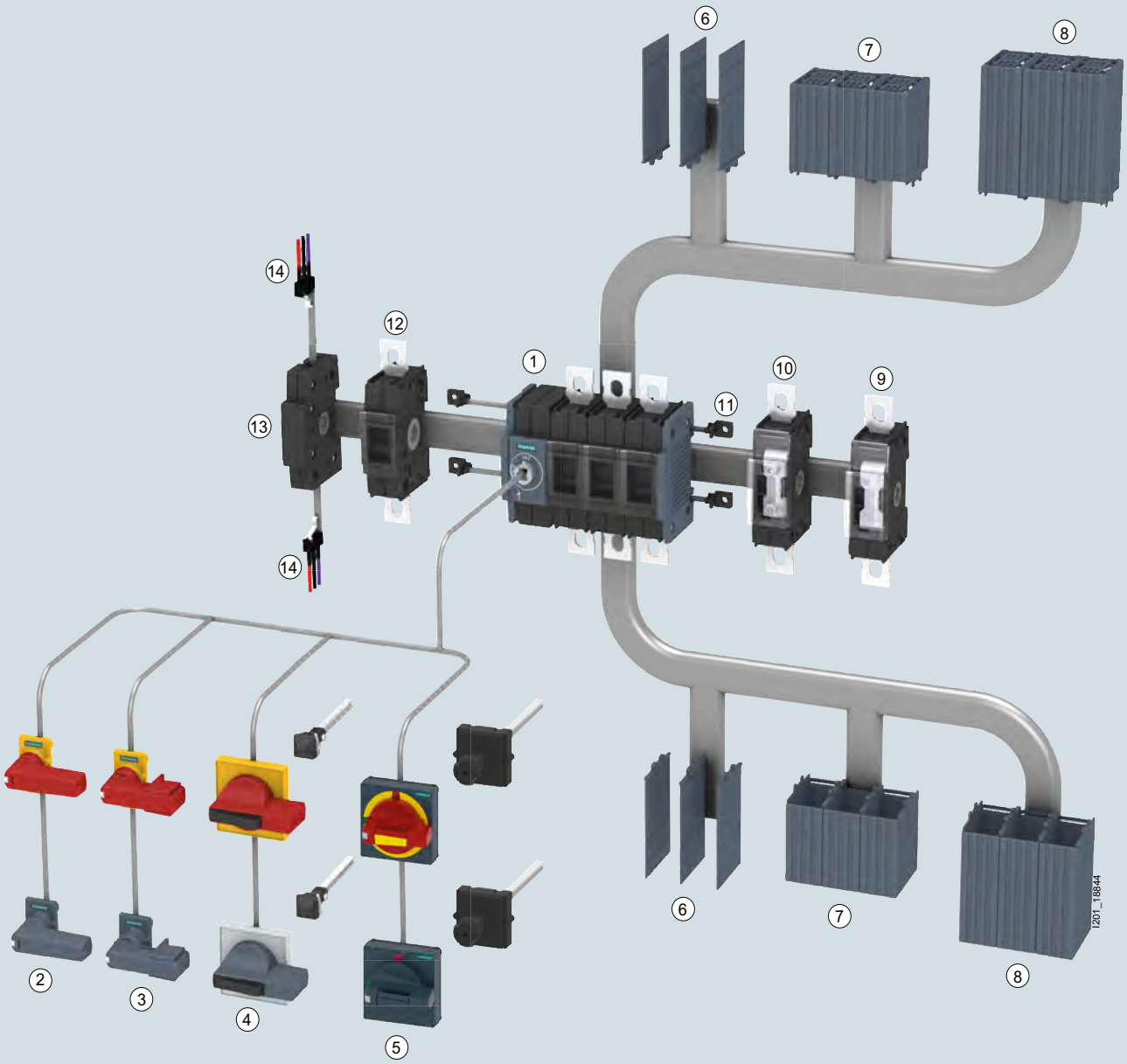
Technical features

Overview of components and accessories: 3KD switch disconnectors, 3/4-pole, size 2, flat terminal



1 3KD switch disconnectors
2 Direct operating mechanism (standard version)
3 Direct operating mechanism (suitable for distribution boards)
4 8UC/3KD9 door-coupling rotary operating mechanism
5 8UD1 door-coupling rotary operating mechanism
6 Phase barriers
7 Cable connection covers, short
8 Cable connection covers
9 N/PE terminal (with permanent jumper)
10 Neutral conductor terminal (with removable jumper)
11 Mounting bracket (spare part)
12 4th contact element
13 Auxiliary switch module
14 Auxiliary switch

Minimum order quantity (PS) or a multiple thereof can be ordered.

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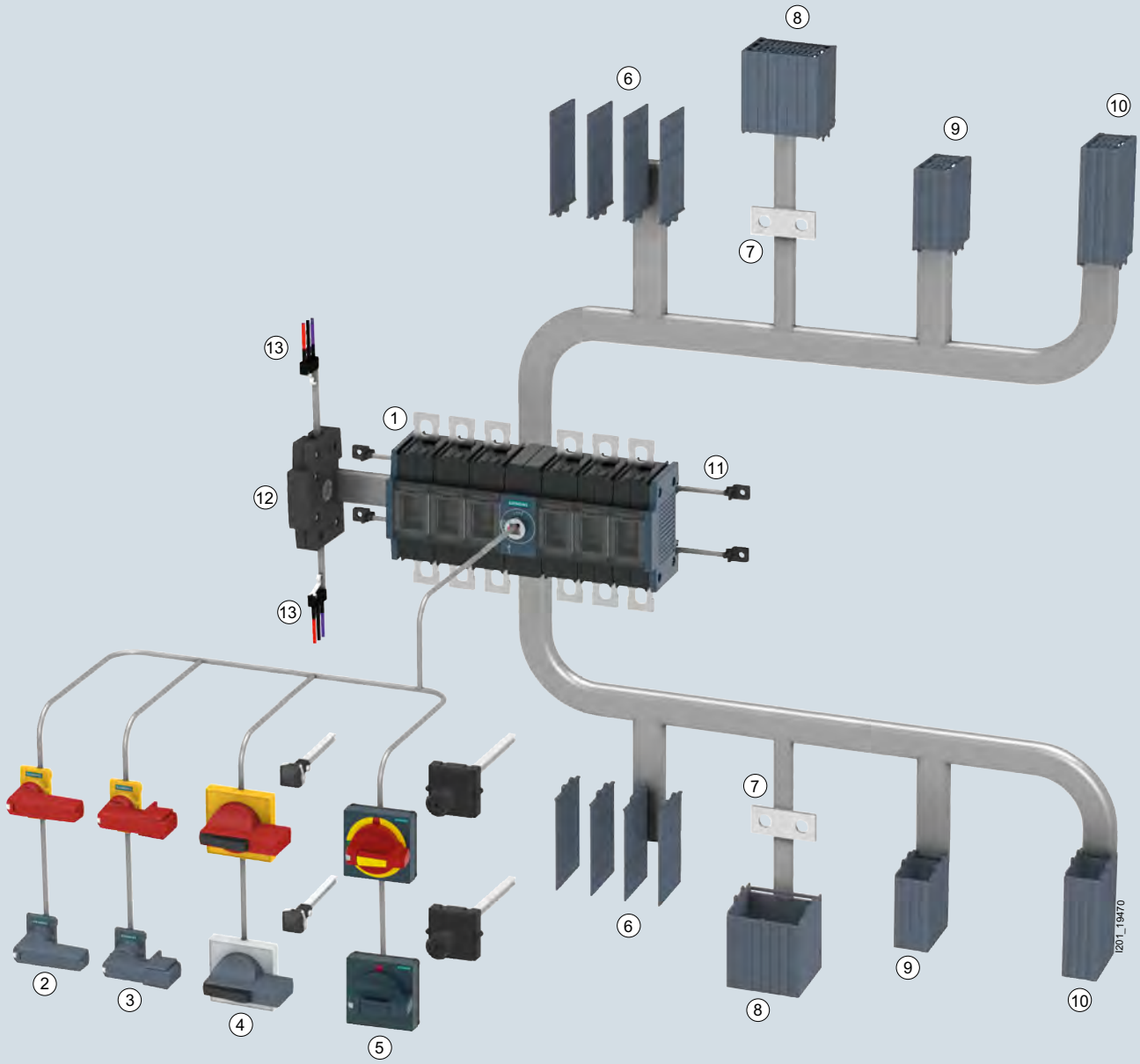
Overview of components and accessories: 3KD switch disconnectors, 6-pole, size 2, flat terminal



1 3KD switch disconnectors
2 Direct operating mechanism (standard version)
3 Direct operating mechanism (suitable for distribution boards)
4 8UC/3KD9 door-coupling rotary operating mechanism
5 8UD1 door-coupling rotary operating mechanism
6 Phase barriers
7 Bridging bar
8 Cable connection cover for bridging bars
9 Cable connection cover, short
10 Cable connection cover
11 Mounting bracket (spare part)
12 Auxiliary switch module
13 Auxiliary switch

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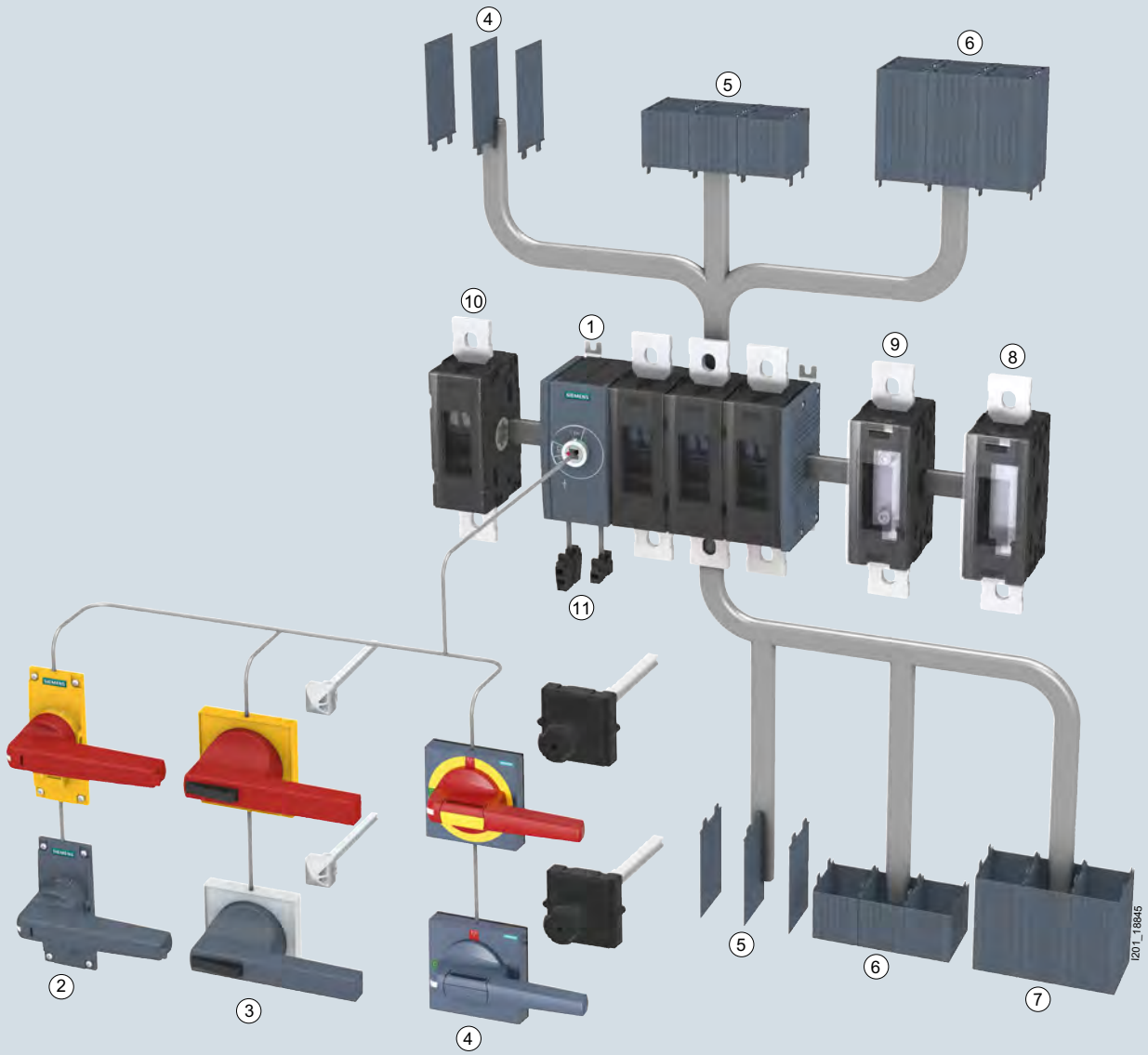
Technical features

Overview of components and accessories: 3KD switch disconnectors, 3/4-pole, size 3 to 5, flat terminal



1. 3KD switch disconnectors
2. Direct operating mechanism
3. 8UC/3KD9 door-coupling rotary operating mechanism
4. 8UD1 door-coupling rotary operating mechanism
5. Phase barriers
6. Cable connection covers, short
7. Cable connection covers
8. N/PE terminal (with permanent jumper)
9. Neutral conductor (with removable jumper)
10. 4th contact element
11. Auxiliary switch

Minimum order quantity (PS) or a multiple thereof can be ordered.

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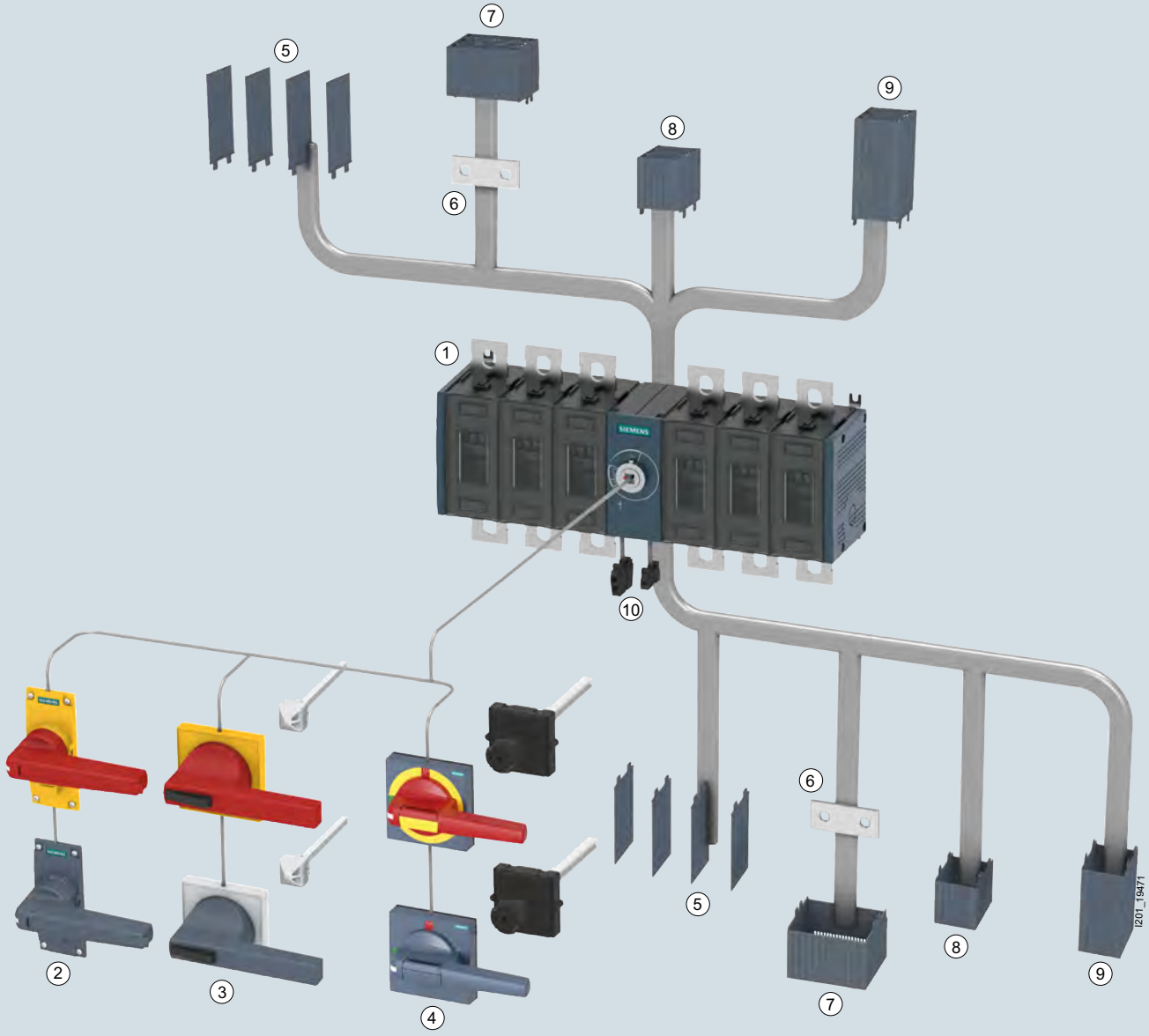
Overview of components and accessories: 3KD switch disconnectors, 6-pole for DC applications, sizes 3 to 5, flat terminal



1 3KD switch disconnectors
2 Direct operating mechanism
3 8UC/3KD9 door-coupling rotary operating mechanism
4 8UD1 door-coupling rotary operating mechanism
5 Phase barriers
6 Bridging bar
7 Cable connection cover for bridging bars
8 Cable connection cover, short
9 Cable connection cover
10 Auxiliary switch

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Technical features

Technical specifications

3KD switch disconnectors, 3/4-pole, size 1 and 2

Standards		**IEC 60947-1, IEC 60947-3**							
Type		**3KD16**	**3KD22**	**3KD26**	**3KD28**	**3KD30**	**3KD32**	**3KD34**	**3KD36...N**
Size		**1**	**1**	**1**	**2**	**2**	**2**	**2**	**2**
General technical details									
Rated uninterrupted current I_u	A	16	32	63	80	100	125	160	200
Conventional free air thermal current I_{th}[1]	A	16	32	63	80	100	125	160	200
Rated operational voltage U_e									
• At 50/60 Hz AC (tolerance up to +10% permissible)	V	690							
• At DC - 2 conducting paths series-connected	V	220							
• At DC - 3 conducting paths series-connected	V	440							
Rated insulation voltage U_i	V	1000							
Rated impulse withstand voltage U_{imp}	kV	8	8	8	8	8	8	8	8
Overvoltage category		III	III	III	III	III	III	III	III
Pollution degree		3	3	3	3	3	3	3	3
Operating and short-circuit behavior									
Rated operational current I_e									
• At AC-21A, AC-22A, 400 to 690 V	A	16	32	63	80	100	125	160	200
• At AC-23, 400 V	A	16	32	63	80	100	125	160	160
• At AC-23, 500 V	A	16	32	63	80	100	125	160	160
• At AC-23, 690 V	A	16	32	63	80	100	125	125	125
• At DC-21A, 220/440 V	A	16	32	63	80	100	125	160	160
• At DC-22A, 220/440 V	A	16	32	63	80	100	125	160	160
• At DC-23A, 220/440 V	A	16	32	63	80	100	125	160	160
Motor switching capacity AC-23A[2]									
• At 400 V	kW	7.5	15	30	37	55	55	90	90
• At 500 V	kW	7.5	18.5	37	55	55	75	110	110
• At 690 V	kW	11	30	55	75	90	110	110	110
Rated short-time withstand current I_{cw} (with t = 1 s, rms value, 690 V AC/440 V DC)	kA	3	3	3	4	4	4	4	4
Rated short-circuit making capacity I_{cm}	kA	7	7	7	12	12	12	12	12
Rated current of upstream fuse[3] [4]	A	63	63	63	160	160	160	160	200
Rated conditional short-circuit current with upstream fuses[3]									
• At 400/500 V AC	kA	100	100	100	100	100	100	100	50
• At 690 V AC	kA	100	100	100	65	65	65	65	50
Let-through current combined with upstream fuse[3]									
• At 400/500 V AC	kA	7	7	7	17.9	17.9	17.9	17.9	18
• At 690 V AC	kA	7.5	7.5	7.5	18.7	18.7	18.7	18.7	19
Let-through I^2t value combined with upstream fuse[3]									
• At 400/500 V	kA^2s	13.3	13.3	13.3	135.6	135.6	135.6	135.6	211
• At 690 V	kA^2s	13.7	13.7	13.7	178.3	178.3	178.3	178.3	226
Power loss per pole with thermal current I_{th}	W	0.1	0.4	1	1.1	1.8	3.2	4.6	6.4
Service life, operating cycles									
• Mechanical		15000	15000	15000	15000	15000	15000	15000	15000
• Electrical, at AC-23A, 690 V/50...60 Hz		6000	6000	6000	1500	1500	1500	1500	1500
• Electrical, at DC-23A, 220/440 V		1500	1500	1500	1500	1500	1000	1000	1000
Degree of protection									
• With masking plate or cable connection cover		IP20	IP20	IP20	IP20	IP20	IP20	IP20	IP20
• Without masking plate or terminal cover		IP20	IP20	IP20	IP00[5]/IP20				IP00
Ambient conditions									
• Ambient temperature during operation	°C	-25 ... +70 (no derating of I_{th} at -5 to +55 °C)							
• Ambient temperature during storage	°C	-50 ... +80							
• Mounting position[6]		Any							
Main conductor connections									
Conductor cross-section, max.	mm^2	35	35	35	70 (95)[7]	70 (95)[7]	70 (95)[7]	70 (95)[7]	95
Busbar systems, max. dimensions (number x width x thickness)									
• Flat terminals	mm	--			1 x 20 x 3[8]				
• Box terminals	mm	1 x 9 x 2			1 x 14 x 3				
Tightening torque									
• Flat terminals	Nm	--			15 ... 22				
• Box terminals	Nm	5 ... 6.5			6.5 ... 8				

1) Configuring note: Max. permissible operating temperature at connections 125 °C.

2) Values are provided as a guide only and may vary depending on the make of motor.

3) Valid for the combination of 3KD and fuse type 3NA38 for I_u = 16 ... 160 A; 3NA31 for I_u = 200 A, characteristic gG.

4) Maximum rated current of the upstream fuse; a fuse with a lower rated current can also be used.

5) Relevant only for devices with flat terminals.

6) With mounting positions other than the vertical, please contact Technical Support.

7) 95 mm^2 valid for variants with flat terminals.

8) When using busbars that are 20 mm wide, these must be insulated.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications (continued)

3KD switch disconnectors, 3/4-pole, sizes 3 to 5

Standards		**IEC 60947-1, IEC 60947-3**									
Type		**3KD36..-.P**	**3KD38**	**3KD40**	**3KD42**	**3KD44**	**3KD46**	**3KD48**	**3KD50**	**3KD52**	**3KD54**
Size		**3**	**3**	**3**	**3**	**4**	**4**	**4**	**5**	**5**	**5**
General technical details											
Rated uninterrupted current I_u	A	200	250	315	400	500	630	800	1000	1250	1600
Conventional free air thermal current I_{th}[1]	A	200	250	315	400	500	630	800	1000	1250	1600
Rated operational voltage U_e											
• At 50/60 Hz AC (tolerance up to +10% permissible)	V	690									
• At DC - 2 conducting paths series-connected	V	220									
• At DC - 3 conducting paths series-connected	V	440									
Rated insulation voltage U_i	V	1000									
Rated impulse withstand voltage U_{imp}	kV	12	12	12	12	12	12	12	12	12	12
Overvoltage category		IV	IV	IV	IV	IV	IV	IV	IV	IV	IV
Pollution degree		3	3	3	3	3	3	3	3	3	3
Operating and short-circuit behavior											
Rated operational current I_e[2] [3]											
• At AC-21A, AC-22A, 400 to 690 V	A	200	250	315	400	500	630	800	1000	1250	1600
• At AC-23, 400 V	A	200	250	315	400	500	630	670	800	800	800
• At AC-23, 500 V	A	200	250	315	350	500	630	630	800	800	800
• At AC-23, 690 V	A	200	250	315	315	500	500	500	800	800	800
• At DC-21A, 220/440 V	A	200	250	315	400	500	630	800	1000	1250	1600
• At DC-22A, 220/440 V	A	200	250	315	400	500	630	800	--	--	--
• At DC-23A, 220/440 V	A	200	250	315	400	500	630	800	--	--	--
Motor switching capacity AC-23A[4]											
• At 400 V	kW	110	132	160	220	280	355	355	400	400	400
• At 500 V	kW	132	160	220	250	355	400	400	560	560	560
• At 690 V	kW	185	220	280	315	500	500	500	800	800	800
Rated short-time withstand current I_{cw} (with t = 1 s, rms value, 690 V AC/440 V DC)	kA	13	13	13	13	30	30	30	50	50	50
Rated short-circuit making capacity I_{cm} (at 690 V AC/440 V DC)	kA	26	26	26	26	63	63	63	105	105	105
Rated current of upstream fuse[5] [6]	A	250	250	400	400	630	630	800	1000	1250	1600
Rated conditional short-circuit current with upstream fuses[5]											
• At 400/500 V AC	kA	100	100	65	65	100	100	100	100	80	80
• At 690 V AC	kA	65	65	35	35	65	65	50	--	--	--
Let-through current combined with upstream fuse[5]											
• At 400/500 V AC	kA	25.1	25.1	35.2	35.2	61.6	61.6	63.7	95.9	103.4	110
• At 690 V AC	kA	22.7	22.7	27.96	27.96	54.5	54.5	70.4	--	--	--
Let-through I^2t value combined with upstream fuse[5]											
• At 400/500 V	kA^2s	427	427	1165	1165	3687	3687	7471	15400	25960	30900
• At 690 V	kA^2s	348	348	1157	1157	4450	4450	10300	--	--	--
Power loss per pole with thermal current I_{th}	W	4	6	10	14	12	17	25	20	32	57
Service life, operating cycles											
• Mechanical		10000	10000	10000	10000	8000	8000	8000	6000	6000	6000
• Electrical, at AC-23A, 690 V/50...60 Hz		1000	1000	1000	1000	1000	1000	1000	500	500	500
• Electrical, at DC-23A, 220/440 V		1000	1000	1000	1000	1000	1000	500	500	500	500
Degree of protection											
• With masking plate or cable connection cover		IP20	IP20	IP20	IP20	IP20	IP20	IP20	IP20	IP20	IP20
• Without masking plate or terminal cover		IP00	IP00	IP00	IP00	IP00	IP00	IP00	IP00	IP00	IP00
Ambient conditions											
• Ambient temperature during operation	°C	-25 ... +70 (no derating of I_{th} at -5 ... +55 °C)									
• Ambient temperature during storage	°C	-50 ... +80									
• Mounting position[7]		Any									
Main conductor connections											
Conductor cross-section, max.	mm^2	240				2 x 240			2 x 240		
Busbar systems, max. dimensions (number x width x thickness)											
• Flat terminals	mm	1 x 30 x 10				2 x 40 x 5			2 x 60 x 10		
• Box terminals	mm	1 x 30 x 10				2 x 40 x 5			2 x 60 x 10		
Tightening torque											
• Flat terminals	Nm	30 ... 44				50 ... 75			50 ... 75		
• Box terminals	Nm	--				--			--		

1) Max. permissible operating temperature at connections 125 °C.

2) For size 3, phase barriers or contact connection covers (accessories) are required for busbar systems (AC-21A, AC-22A, and U_e > 400 V, AC-23A) and when connecting cable lugs.

3) With size 4 at AC-23A, phase barriers or terminal covers must be installed (accessories).

4) Values are provided as a guide only and may vary depending on the make of motor.

5) Valid for the combination of 3KD and fuse type 3NA..., characteristic gG.

6) Maximum rated current of the upstream fuse; a fuse with a lower rated current can also be used.

7) Contact Technical Support for other mounting positions.

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Technical specifications (continued)

3KD switch disconnectors, 6-pole for DC applications up to 1200 V, sizes 1 and 2

Standards		**IEC 60947-1, IEC 60947-3**						
Type		**3KD16**	**3KD22**	**3KD26**	**3KD28**	**3KD30**	**3KD32**	**3KD34**
Size		**1**	**1**	**1**	**2**	**2**	**2**	**2**
General technical details								
Rated uninterrupted current I_u	A	16	32	63	80	100	125	160
Conventional free air thermal current I_{th} [1]	A	16	32	63	80	100	125	160
Rated operational voltage U_e								
• At DC - with pollution degree 2	V	1200	1200	1200	1200	1200	1200	1200
• At DC - with pollution degree 3	V	1000	1000	1000	1000[2]	1000[2]	1000[2]	1000[2]
Rated insulation voltage U_i								
• At DC - with pollution degree 2	V	1250	1250	1250	1250	1250	1250	1250
• At DC - with pollution degree 3	V	1000	1000	1000	1000[3]	1000[3]	1000[3]	1000[3]
Rated impulse withstand voltage U_{imp}	kV	8	8	8	8	8	8	8
Overvoltage category		III	III	III	III	III	III	III
Operating and short-circuit behavior								
Rated operational current I_e								
• At DC-21A, 1200 V	A	16	32	63	80	100	125	160
• At DC-21B, 1200 V	A	16	32	63	80	100	125	160
Rated short-time withstand current I_{cw}								
• with t = 1 s, rms value, 1200 V DC	kA	3	3	3	4	4	4	4
Rated short-circuit making capacity I_{cm}								
• At 1200 V DC	kA	4.3	4.3	4.3	5.7	5.7	5.7	5.7
Power loss per pole with thermal current I_{th}	W	0.1	0.4	1	1.1	1.8	3.2	4.6
Service life, operating cycles								
• Mechanical		15000	15000	15000	15000	15000	15000	15000
• Electrical, at DC-21, 1200 V		1500	1500	1500	1500	1500	1500	1500
Degree of protection								
• With masking plate or cable connection cover		IP20	IP20	IP20	IP20	IP20	IP20	IP20
• Without masking plate or terminal cover		IP20	IP20	IP20	IP00[4] / IP20			
Ambient conditions								
• Ambient temperature during operation	°C	-25 ... +70 (no derating of I_{th} at -5 to +40 °C)						
• Ambient temperature during storage	°C	-50 ... +80						
• Mounting position		Any						
Main conductor connections								
Conductor cross-section, max.	mm^2	35	35	35	70	70	70	70
Busbar systems, max. dimensions (number x width x thickness)								
• Flat terminals	mm	--			1 x 20 x 3[5]			
• Box terminals	mm	1 x 9 x 2			1 x 14 x 3			
Tightening torque								
• Flat terminals	Nm	--			15 ... 22			
• Box terminals	Nm	5 ... 6.5			6.5 ... 8			

1) Configuring note: Max. permissible operating temperature at connections 110 °C.

2) Valid for version with box terminal, version with flat terminal max. 1200 V.

3) Valid for version with box terminal, version with flat terminal max. 1250 V.

4) Relevant only for devices with flat terminals.

5) When using busbars that are 20 mm wide, these must be insulated.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications (continued)

3KD switch disconnectors, 6-pole for DC applications up to 1200 V, sizes 3 to 5

Standards		**IEC 60947-1, IEC 60947-3**									
Type		**3KD36**	**3KD38**	**3KD40**	**3KD42**	**3KD44**	**3KD46**	**3KD48**	**3KD50**	**3KD52**	**3KD54**
Size		**3**	**3**	**3**	**3**	**4**	**4**	**4**	**5**	**5**	**5**
General technical details											
Rated uninterrupted current I_u	A	200	250	315	400	500	630	800	1000	1250	1600
Conventional free air thermal current I_{th} [1]	A	200	250	315	400	500	630	800	1000	1250	1600
Rated operational voltage U_e											
• At DC - with pollution degree 2	V	1200	1200	1200	1200	1200	1200	1200	1200	1200	1200
• At DC - with pollution degree 3	V	1200	1200	1200	1200	1000	1000	1000	1200	1200	1200
Rated insulation voltage U_i											
• At DC - with pollution degree 2	V	1250	1250	1250	1250	1250	1250	1250	1250	1250	1250
• At DC - with pollution degree 3	V	1250	1250	1250	1250	1000	1000	1000	1250	1250	1250
Rated impulse withstand voltage U_{imp}	kV	12	12	12	12	12	12	12	12	12	12
Overvoltage category		IV	IV	IV	IV	IV	IV	IV	IV	IV	IV
Operating and short-circuit behavior											
Rated operational current I_e [2]											
• At DC-21A, 1200 V	A	--	--	--	--	--	--	--	--	--	--
• At DC-21B, 1200 V	A	200	250	315	400	500	630	800	1000	1250	1600
Rated short-time withstand current I_{cw}											
• with t = 1 s, rms value, 1200 V DC	kA	10	10	10	10	20	20	20	20	20	20
Rated short-circuit making capacity I_{cm}											
• At 1200 V DC	kA	14.2	14.2	14.2	14.2	28.4	28.4	28.4	28.4	28.4	28.4
Power loss per pole with thermal current I_{th}	W	4	6	10	14	12	17	25	20	32	57
Service life, operating cycles											
• Mechanical		10000	10000	10000	10000	8000	8000	8000	6000	6000	6000
• Electrical, at DC-21, 1200 V		200	200	200	200	100	100	100	100	100	100
Degree of protection											
• With masking plate or cable connection cover		IP20	IP20	IP20	IP20	IP20	IP20	IP20	IP20	IP20	IP20
• Without masking plate or terminal cover		IP00	IP00	IP00	IP00	IP00	IP00	IP00	IP00	IP00	IP00
Ambient conditions											
• Ambient temperature during operation	°C	-25 ... +70 (no derating of I_{th} at -5 to +40 °C)									
• Ambient temperature during storage	°C	-50 ... +80									
• Mounting position		Any									
Main conductor connections											
Conductor cross-section, max.	mm^2	240				2 x 240			2 x 240		
Busbar systems, max. dimensions (number x width x thickness)											
• Flat terminals	mm	1 x 30 x 10				2 x 40 x 5			2 x 60 x 10		
• Box terminals	mm	--				--			--		
Tightening torque											
• Flat terminals	Nm	30 ... 44				50 ... 75			50 ... 75		
• Box terminals	Nm	--				--			--		

[1] Configuring note: Max. permissible operating temperature at connections 110 °C.

[2] For sizes 3 and 4, phase barriers or contact connection covers (accessories) are required when connecting cable lugs.

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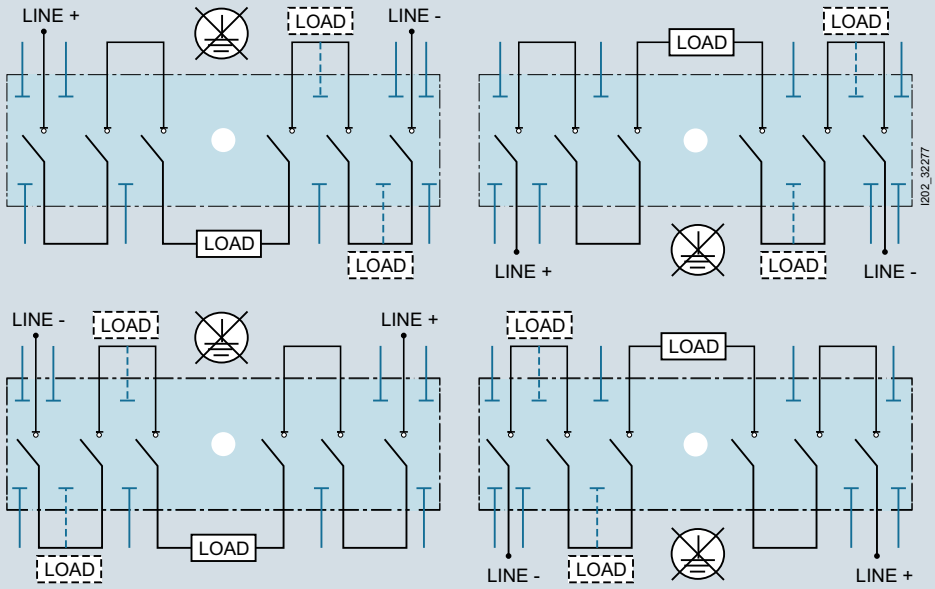
Circuit diagrams

3KD switch disconnectors, 6-pole for DC applications up to 1200 V, all sizes



Typical circuit diagrams for 3KD 6-pole for DC applications up to 1200 V, all sizes in which 3 of the 6 poles in each case are to be connected in series using the connecting bridges, see page 7/78.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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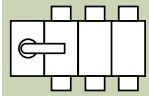
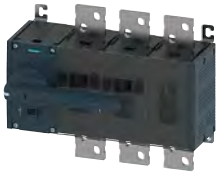
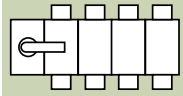
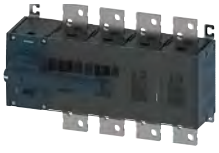
Selection and ordering data

Complete assemblies with direct operating mechanism, gray, front operating mechanism

- The switch disconnectors are designed for floor mounting; sizes 1 and 2 can optionally be mounted on standard mounting rails.
- The complete assemblies are not suitable for conversion to door-coupling rotary operating mechanisms; the basic units are to be used for this purpose.

	Rated uninterrupted current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
	3-pole							
 3KD2832-0NE10-0	**Flat terminals**[1]							
	80	2		**3KD2832-0NE10-0**		1	1 unit	1CL
	100			**3KD3032-0NE10-0**		1	1 unit	1CL
	125			**3KD3232-0NE10-0**		1	1 unit	1CL
	160			**3KD3432-0NE10-0**		1	1 unit	1CL
	200			**3KD3632-0NE10-0**		1	1 unit	1CL
 3KD3632-0PE10-0	200	3		**3KD3632-0PE10-0**		1	1 unit	1CL
	250			**3KD3832-0PE10-0**		1	1 unit	1CL
	315			**3KD4032-0PE10-0**		1	1 unit	1CL
	400			**3KD4232-0PE10-0**		1	1 unit	1CL
	500	4		**3KD4432-0QE10-0**		1	1 unit	1CL
	630			**3KD4632-0QE10-0**		1	1 unit	1CL
	800			**3KD4832-0QE10-0**		1	1 unit	1CL
	1000	5		**3KD5032-0RE10-0**		1	1 unit	1CL
	1250			**3KD5232-0RE10-0**		1	1 unit	1CL
	1600			**3KD5432-0RE10-0**		1	1 unit	1CL
 3KD2832-2NE10-0	**Box terminals**							
	16	1		**3KD1632-2ME10-0**		1	1 unit	1CL
	32			**3KD2232-2ME10-0**		1	1 unit	1CL
	63			**3KD2632-2ME10-0**		1	1 unit	1CL
	80	2		**3KD2832-2NE10-0**		1	1 unit	1CL
	100			**3KD3032-2NE10-0**		1	1 unit	1CL
	125			**3KD3232-2NE10-0**		1	1 unit	1CL
	160			**3KD3432-2NE10-0**		1	1 unit	1CL
	4-pole							
 3KD2842-0NE10-0	**Flat terminals**[1]							
	80	2		**3KD2842-0NE10-0**		1	1 unit	1CL
	100			**3KD3042-0NE10-0**		1	1 unit	1CL
	125			**3KD3242-0NE10-0**		1	1 unit	1CL
	160			**3KD3442-0NE10-0**		1	1 unit	1CL
	200			**3KD3642-0NE10-0**		1	1 unit	1CL
 3KD5042-0RE10-0	200	3		**3KD3642-0PE10-0**		1	1 unit	1CL
	250			**3KD3842-0PE10-0**		1	1 unit	1CL
	315			**3KD4042-0PE10-0**		1	1 unit	1CL
	400			**3KD4242-0PE10-0**		1	1 unit	1CL
	500	4		**3KD4442-0QE10-0**		1	1 unit	1CL
	630			**3KD4642-0QE10-0**		1	1 unit	1CL
	800			**3KD4842-0QE10-0**		1	1 unit	1CL
	1000	5		**3KD5042-0RE10-0**		1	1 unit	1CL
	1250			**3KD5242-0RE10-0**		1	1 unit	1CL
	1600			**3KD5442-0RE10-0**		1	1 unit	1CL
 3KD2842-2NE10-0	**Box terminals**							
	16	1		**3KD1642-2ME10-0**		1	1 unit	1CL
	32			**3KD2242-2ME10-0**		1	1 unit	1CL
	63			**3KD2642-2ME10-0**		1	1 unit	1CL
	80	2		**3KD2842-2NE10-0**		1	1 unit	1CL
	100			**3KD3042-2NE10-0**		1	1 unit	1CL
	125			**3KD3242-2NE10-0**		1	1 unit	1CL
	160			**3KD3442-2NE10-0**		1	1 unit	1CL

[1] Cable connection covers must be provided for switch disconnectors with flat terminals and direct operating mechanisms.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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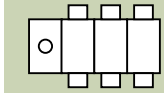
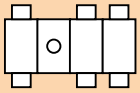
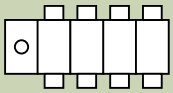
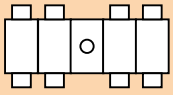
Basic units

Selection and ordering data

Rated uninterrupted current I_u	Size	SD	Operating mechanism on left: Article No. www.siemens.com/product?Article No.	Price per PU	SD	Operating mechanism in center: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A		d			d					
Basic units without handle, front operating mechanism										
• The switch disconnectors are designed for floor mounting; sizes 1 and 2 can optionally be mounted on standard mounting rails. • The basic units without handles are suitable for use with door coupling rotary operating mechanisms or with direct operating mechanisms.										
3-pole										
Flat terminals[1]										
80	2		**3KD2830-0NE10-0**			**3KD2830-0NE20-0**		1	1 unit	1CL
100			**3KD3030-0NE10-0**			**3KD3030-0NE20-0**		1	1 unit	1CL
125			**3KD3230-0NE10-0**			**3KD3230-0NE20-0**		1	1 unit	1CL
160			**3KD3430-0NE10-0**			**3KD3430-0NE20-0**		1	1 unit	1CL
200			**3KD3630-0NE10-0**			**3KD3630-0NE20-0**		1	1 unit	1CL
200	3		**3KD3630-0PE10-0**			**3KD3630-0PE20-0**		1	1 unit	1CL
250			**3KD3830-0PE10-0**			**3KD3830-0PE20-0**		1	1 unit	1CL
315			**3KD4030-0PE10-0**			**3KD4030-0PE20-0**		1	1 unit	1CL
400			**3KD4230-0PE10-0**			**3KD4230-0PE20-0**		1	1 unit	1CL
500	4		**3KD4430-0QE10-0**			**3KD4430-0QE20-0**		1	1 unit	1CL
630			**3KD4630-0QE10-0**			**3KD4630-0QE20-0**		1	1 unit	1CL
800			**3KD4830-0QE10-0**			**3KD4830-0QE20-0**		1	1 unit	1CL
1000	5		**3KD5030-0RE10-0**			**3KD5030-0RE20-0**		1	1 unit	1CL
1250			**3KD5230-0RE10-0**			**3KD5230-0RE20-0**		1	1 unit	1CL
1600			**3KD5430-0RE10-0**			**3KD5430-0RE20-0**		1	1 unit	1CL
Box terminals										
16	1		**3KD1630-2ME10-0**			**3KD1630-2ME20-0**		1	1 unit	1CL
32			**3KD2230-2ME10-0**			**3KD2230-2ME20-0**		1	1 unit	1CL
63			**3KD2630-2ME10-0**			**3KD2630-2ME20-0**		1	1 unit	1CL
80	2		**3KD2830-2NE10-0**			**3KD2830-2NE20-0**		1	1 unit	1CL
100			**3KD3030-2NE10-0**			**3KD3030-2NE20-0**		1	1 unit	1CL
125			**3KD3230-2NE10-0**			**3KD3230-2NE20-0**		1	1 unit	1CL
160			**3KD3430-2NE10-0**			**3KD3430-2NE20-0**		1	1 unit	1CL
4-pole										
Flat terminals[1]										
80	2		**3KD2840-0NE10-0**			**3KD2840-0NE20-0**		1	1 unit	1CL
100			**3KD3040-0NE10-0**			**3KD3040-0NE20-0**		1	1 unit	1CL
125			**3KD3240-0NE10-0**			**3KD3240-0NE20-0**		1	1 unit	1CL
160			**3KD3440-0NE10-0**			**3KD3440-0NE20-0**		1	1 unit	1CL
200			**3KD3640-0NE10-0**			**3KD3640-0NE20-0**		1	1 unit	1CL
200	3		**3KD3640-0PE10-0**			**3KD3640-0PE20-0**		1	1 unit	1CL
250			**3KD3840-0PE10-0**			**3KD3840-0PE20-0**		1	1 unit	1CL
315			**3KD4040-0PE10-0**			**3KD4040-0PE20-0**		1	1 unit	1CL
400			**3KD4240-0PE10-0**			**3KD4240-0PE20-0**		1	1 unit	1CL
500	4		**3KD4440-0QE10-0**			**3KD4440-0QE20-0**		1	1 unit	1CL
630			**3KD4640-0QE10-0**			**3KD4640-0QE20-0**		1	1 unit	1CL
800			**3KD4840-0QE10-0**			**3KD4840-0QE20-0**		1	1 unit	1CL
1000	5		**3KD5040-0RE10-0**			**3KD5040-0RE20-0**		1	1 unit	1CL
1250			**3KD5240-0RE10-0**			**3KD5240-0RE20-0**		1	1 unit	1CL
1600			**3KD5440-0RE10-0**			**3KD5440-0RE20-0**		1	1 unit	1CL
Box terminals										
16	1		**3KD1640-2ME10-0**			**3KD1640-2ME20-0**		1	1 unit	1CL
32			**3KD2240-2ME10-0**			**3KD2240-2ME20-0**		1	1 unit	1CL
63			**3KD2640-2ME10-0**			**3KD2640-2ME20-0**		1	1 unit	1CL
80	2		**3KD2840-2NE10-0**			**3KD2840-2NE20-0**		1	1 unit	1CL
100			**3KD3040-2NE10-0**			**3KD3040-2NE20-0**		1	1 unit	1CL
125			**3KD3240-2NE10-0**			**3KD3240-2NE20-0**		1	1 unit	1CL
160			**3KD3440-2NE10-0**			**3KD3440-2NE20-0**		1	1 unit	1CL


3KD2830-0NE10-0


3KD5030-0RE20-0


3KD2830-2NE10-0


3KD2840-0NE10-0


3KD5440-0RE20-0


3KD2840-2NE10-0

[1] Phase barriers for size 2 included in scope of supply

Minimum order quantity (PS) or a multiple thereof can be ordered.

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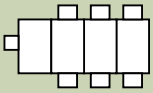
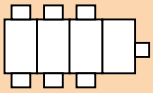
Basic units without handle, side operating mechanism

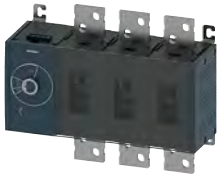
The switch disconnectors with side operating mechanism are suitable for door-coupling rotary operating mechanisms.

Rated uninterrupted current I_u	Size	SD	Operating mechanism on left: Article No. www.siemens.com/product?Article No.	Price per PU	SD	Operating mechanism on right: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A		d			d					
3-pole										
Flat terminals										
80	2		**3KD2834-0NE10-0**			**3KD2834-0NE40-0**		1	1 unit	1CL
100	2		**3KD3034-0NE10-0**			**3KD3034-0NE40-0**		1	1 unit	1CL
125	2		**3KD3234-0NE10-0**			**3KD3234-0NE40-0**		1	1 unit	1CL
160	2		**3KD3434-0NE10-0**			**3KD3434-0NE40-0**		1	1 unit	1CL
200	2		**3KD3634-0NE10-0**			**3KD3634-0NE40-0**		1	1 unit	1CL
200	3		**3KD3634-0PE10-0**			**3KD3634-0PE40-0**		1	1 unit	1CL
250	3		**3KD3834-0PE10-0**			**3KD3834-0PE40-0**		1	1 unit	1CL
315	3		**3KD4034-0PE10-0**			**3KD4034-0PE40-0**		1	1 unit	1CL
400	3		**3KD4234-0PE10-0**			**3KD4234-0PE40-0**		1	1 unit	1CL
500	4		**3KD4434-0QE10-0**			**3KD4434-0QE40-0**		1	1 unit	1CL
630	4		**3KD4634-0QE10-0**			**3KD4634-0QE40-0**		1	1 unit	1CL
800	4		**3KD4834-0QE10-0**			**3KD4834-0QE40-0**		1	1 unit	1CL
1000	5		**3KD5034-0RE10-0**			**3KD5034-0RE40-0**		1	1 unit	1CL
1250	5		**3KD5234-0RE10-0**			**3KD5234-0RE40-0**		1	1 unit	1CL
1600	5		**3KD5434-0RE10-0**			**3KD5434-0RE40-0**		1	1 unit	1CL
Box terminals										
16	1		**3KD1634-2ME10-0**			**3KD1634-2ME40-0**		1	1 unit	1CL
32	1		**3KD2234-2ME10-0**			**3KD2234-2ME40-0**		1	1 unit	1CL
63	1		**3KD2634-2ME10-0**			**3KD2634-2ME40-0**		1	1 unit	1CL
80	2		**3KD2834-2NE10-0**			**3KD2834-2NE40-0**		1	1 unit	1CL
100	2		**3KD3034-2NE10-0**			**3KD3034-2NE40-0**		1	1 unit	1CL
125	2		**3KD3234-2NE10-0**			**3KD3234-2NE40-0**		1	1 unit	1CL
160	2		**3KD3434-2NE10-0**			**3KD3434-2NE40-0**		1	1 unit	1CL


3KD2834-0NE40-0


3KD3634-0PE10-0


3KD4434-0QE40-0


3KD5034-0RE10-0


3KD1634-2ME40-0


3KD2834-2NE10-0

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Basic units

Basic units without handle, side operating mechanism (continued)

The switch disconnectors with side operating mechanism are suitable for door-coupling rotary operating mechanisms.

4-pole

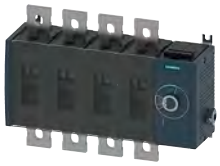
Rated uninterrupted current I_u	Size	SD	Operating mechanism on left: Article No. www.siemens.com/product?Article No.	Price per PU	SD	Operating mechanism on right: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A		d			d					
Flat terminals										
80	2		**3KD2844-0NE10-0**			**3KD2844-0NE40-0**		1	1 unit	1CL
100	2		**3KD3044-0NE10-0**			**3KD3044-0NE40-0**		1	1 unit	1CL
125	2		**3KD3244-0NE10-0**			**3KD3244-0NE40-0**		1	1 unit	1CL
160	2		**3KD3444-0NE10-0**			**3KD3444-0NE40-0**		1	1 unit	1CL
200	2		**3KD3644-0NE10-0**			**3KD3644-0NE40-0**		1	1 unit	1CL


3KD2844-0NE40-0

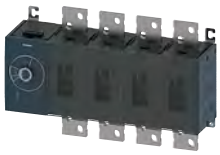
200	3		**3KD3644-0PE10-0**			**3KD3644-0PE40-0**		1	1 unit	1CL
250	3		**3KD3844-0PE10-0**			**3KD3844-0PE40-0**		1	1 unit	1CL
315	3		**3KD4044-0PE10-0**			**3KD4044-0PE40-0**		1	1 unit	1CL
400	3		**3KD4244-0PE10-0**			**3KD4244-0PE40-0**		1	1 unit	1CL


3KD3644-0PE10-0

500	4		**3KD4444-0QE10-0**			**3KD4444-0QE40-0**		1	1 unit	1CL
630	4		**3KD4644-0QE10-0**			**3KD4644-0QE40-0**		1	1 unit	1CL
800	4		**3KD4844-0QE10-0**			**3KD4844-0QE40-0**		1	1 unit	1CL


3KD4444-0QE40-0

1000	5		**3KD5044-0RE10-0**			**3KD5044-0RE40-0**		1	1 unit	1CL
1250	5		**3KD5244-0RE10-0**			**3KD5244-0RE40-0**		1	1 unit	1CL
1600	5		**3KD5444-0RE10-0**			**3KD5444-0RE40-0**		1	1 unit	1CL


3KD5044-0RE10-0

Box terminals										
16	1		**3KD1644-2ME10-0**			**3KD1644-2ME40-0**		1	1 unit	1CL
32	1		**3KD2244-2ME10-0**			**3KD2244-2ME40-0**		1	1 unit	1CL
63	1		**3KD2644-2ME10-0**			**3KD2644-2ME40-0**		1	1 unit	1CL


3KD1644-2ME40-0

80	2		**3KD2844-2NE10-0**			**3KD2844-2NE40-0**		1	1 unit	1CL
100	2		**3KD3044-2NE10-0**			**3KD3044-2NE40-0**		1	1 unit	1CL
125	2		**3KD3244-2NE10-0**			**3KD3244-2NE40-0**		1	1 unit	1CL
160	2		**3KD3444-2NE10-0**			**3KD3444-2NE40-0**		1	1 unit	1CL


3KD2844-2NE10-0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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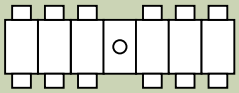
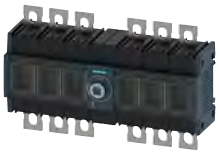
Basic units without handle, front operating mechanism

- The switch disconnectors are designed for floor mounting. Sizes 1 and 2 can optionally also be mounted on standard mounting rails.
- The basic units without handles are suitable for use with door-coupling rotary operating mechanisms or with direct operating mechanisms.

Up to 1200 V DC



Rated uninterrupted current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A		d					
Flat terminals							
80	2		**3KD2860-0NE20-0**		1	1 unit	1CL
100	2		**3KD3060-0NE20-0**		1	1 unit	1CL
125	2		**3KD3260-0NE20-0**		1	1 unit	1CL
160	2		**3KD3460-0NE20-0**		1	1 unit	1CL
200	3		**3KD3660-0PE20-0**		1	1 unit	1CL
250	3		**3KD3860-0PE20-0**		1	1 unit	1CL
315	3		**3KD4060-0PE20-0**		1	1 unit	1CL
400	3		**3KD4260-0PE20-0**		1	1 unit	1CL
500	4		**3KD4460-0QE20-0**		1	1 unit	1CL
630	4		**3KD4660-0QE20-0**		1	1 unit	1CL
800	4		**3KD4860-0QE20-0**		1	1 unit	1CL
1000	5		**3KD5060-0RE20-0**		1	1 unit	1CL
1250	5		**3KD5260-0RE20-0**		1	1 unit	1CL
1600	5		**3KD5460-0RE20-0**		1	1 unit	1CL
Box terminals							
16	1		**3KD1660-2ME20-0**		1	1 unit	1CL
32	1		**3KD2260-2ME20-0**		1	1 unit	1CL
63	1		**3KD2660-2ME20-0**		1	1 unit	1CL
80	2		**3KD2860-2NE20-0**		1	1 unit	1CL
100	2		**3KD3060-2NE20-0**		1	1 unit	1CL
125	2		**3KD3260-2NE20-0**		1	1 unit	1CL
160	2		**3KD3460-2NE20-0**		1	1 unit	1CL



3KD2860-0NE20-0



3KD3660-0PE20-0



3KD4460-0QE20-0



3KD5060-0RE20-0



3KD1660-2ME20-0



3KD2860-2NE20-0

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Selection and ordering data

Additional poles

	Version	Circuit symbol	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	d					
	4th contact element (switching pole)	N N						
 4th contact element, flat terminal, for frame size 2	**Flat terminals**							
	• For size 2; 3KD....-.N	--		**3KD9205-0**		1	1 unit	1CL
	• For size 3; 3KD....-.P			**3KD9305-0**		1	1 unit	1CL
	• For size 4; 3KD....-.Q			**3KD9405-0**		1	1 unit	1CL
	• For size 5; 3KD....-.R			**3KD9505-0**		1	1 unit	1CL
 4th contact element, box terminal, for size 2	**Box terminals**							
	• For size 1; 3KD....-.M			**3KD9105-2**		1	1 unit	1CL
	• For size 2; 3KD....-.N			**3KD9205-2**		1	1 unit	1CL
	Neutral conductor terminals with removable jumper							
 Neutral conductor terminal, flat terminal, for size 2	**Flat terminals**							
	• For size 2; 3KD....-.N			**3KD9206-0**		1	1 unit	1CL
	• For size 3; 3KD....-.P			**3KD9306-0**		1	1 unit	1CL
	• For size 4; 3KD....-.Q			**3KD9406-0**		1	1 unit	1CL
	• For size 5; 3KD....-.R			**3KD9506-0**		1	1 unit	1CL
 Neutral conductor terminal, box terminal, for size 2	**Box terminals**							
	• For size 1; 3KD....-.M			**3KD9106-2**		1	1 unit	1CL
	• For size 2; 3KD....-.N			**3KD9206-2**		1	1 unit	1CL
	N/PE terminals with permanent jumper							
 N/PE terminal, flat terminal, for size 2	**Flat terminals**							
	• For size 2; 3KD....-.N			**3KD9206-7**		1	1 unit	1CL
	• For size 3; 3KD....-.P			**3KD9306-7**		1	1 unit	1CL
	• For size 4; 3KD....-.Q			**3KD9406-7**		1	1 unit	1CL
	• For size 5; 3KD....-.R			**3KD9506-7**		1	1 unit	1CL
 N/PE terminal, box terminal, for size 2	**Box terminals**							
	• For size 1; 3KD....-.M			**3KD9106-8**		1	1 unit	1CL
	• For size 2; 3KD....-.N			**3KD9206-8**		1	1 unit	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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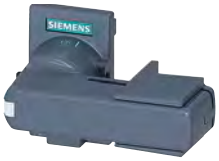
Direct operating mechanisms

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Direct operating mechanisms in standard version and flat version							
	Standard version, labeling Test - 0 - I						
	• Can be locked with up to max. 3 padlocks						
	• Requires additional mounting depth in locked state						
	• Labeling Test - 0 - I						
 Direct operating mechanism, gray, for size 2	**Gray**						
	• For size 1; 3KD....-.M		**3KD9101-1**		1	1 unit	1CL
	• For size 2; 3KD....-.N		**3KD9201-1**		1	1 unit	1CL
	• For size 3; 3KD....-.P		**3KD9301-1**		1	1 unit	1CL
	• For size 4; 3KD....-.Q		**3KD9401-1**		1	1 unit	1CL
	• For size 5; 3KD....-.R		**3KD9501-1**		1	1 unit	1CL
 Direct operating mechanism, red/yellow, for size 2	**Red/yellow**						
	• For size 1; 3KD....-.M		**3KD9101-2**		1	1 unit	1CL
	• For size 2; 3KD....-.N		**3KD9201-2**		1	1 unit	1CL
	• For size 3; 3KD....-.P		**3KD9301-2**		1	1 unit	1CL
	• For size 4; 3KD....-.Q		**3KD9401-2**		1	1 unit	1CL
	• For size 5; 3KD....-.R		**3KD9501-2**		1	1 unit	1CL
	Flat version, labeling Test - 0 - I (suitable for distribution boards)						
 Direct operating mechanism, flat version, gray, for size 2	• Can be locked with 1 padlock						
	• No additional mounting depth in locked state						
	• Labeling Test - 0 - I						
	Gray						
	• For size 1; 3KD....-.M		**3KD9101-0**		1	1 unit	1CL
	• For size 2; 3KD....-.N		**3KD9201-0**		1	1 unit	1CL
 Direct operating mechanism, flat version, red/yellow, for size 2	**Red/yellow**						
	• For size 1; 3KD....-.M		**3KD9101-8**		1	1 unit	1CL
	• For size 2; 3KD....-.N		**3KD9201-8**		1	1 unit	1CL

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Accessories and spare parts

Door-coupling rotary operating mechanisms

Note

For 3KD switch disconnectors with side operating mechanism (left or right), only door-coupling rotary operating mechanisms without "Test" can be used.

If door-coupling rotary operating mechanisms without "Test" are used on 3KD, the test function must be mechanically blocked on the switch. The blocking pin required for this is included in the scope of supply of the 3KD.

	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Door-coupling rotary operating mechanisms, complete, 8UD1 series									
	Door-coupling rotary operating mechanism, complete, labeling 0 - I • Handle with masking plate • Coupling driver without tolerance compensation • Shaft 300 mm • Can be locked with up to max. 3 padlocks • Labeling 0 - I								
	**Gray**								
	For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1171-2AD11**		1	1 unit	1CL
	**Red/yellow**								
	For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1171-2AD15**		1	1 unit	1CL
	Door-coupling rotary operating mechanism, complete, labeling Test - 0 - I • Handle with masking plate • Mounting tolerance compensation • Shaft 300 mm • Can be locked with up to max. 3 padlocks • Labeling Test - 0 - I								
	**Gray**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1171-2AF21**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1141-2AF21**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1151-3AF21**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1161-4AF21**		1	1 unit	1CL
	**Red/yellow**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1171-2AF25**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1141-2AF25**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1151-3AF25**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1161-4AF25**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Handles for door-coupling rotary operating mechanisms, 8UD1 series									
	Handles without extension shaft and coupling driver, labeling 0 - I								
	• With masking plate								
	• Can be locked with up to max. 3 padlocks								
	• Labeling 0 - I								
 Handle without extension shaft, gray, for sizes 1/2	**Gray**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2AD01**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2AD01**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3AD01**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4AD01**		1	1 unit	1CL
 Handle without extension shaft, red/yellow, for sizes 1/2	**Red/yellow**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2AD05**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2AD05**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3AD05**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4AD05**		1	1 unit	1CL
	Handles without extension shaft and coupling driver, labeling Test - 0 - I								
	• With masking plate								
	• Can be locked with up to max. 3 padlocks								
	• Labeling Test - 0 - I								
 Handle without extension shaft, gray, for sizes 1/2	**Gray**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2AF01**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2AF01**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3AF01**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4AF01**		1	1 unit	1CL
 Handle without extension shaft, red/yellow, for sizes 1/2	**Red/yellow**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2AF05**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2AF05**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3AF05**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4AF05**		1	1 unit	1CL

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Accessories and spare parts

	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
	Handles, illuminated, without extension shaft and coupling driver, labeling 0 - I								
	• With masking plate								
	• Illuminated								
	• Can be locked with up to max. 3 padlocks								
	• Labeling 0 - I								
 Handle without extension shaft, gray, for sizes 1/2	**Gray**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2CD01**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2CD01**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3CD01**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4CD01**		1	1 unit	1CL
 Handle without extension shaft, red/yellow, for sizes 1/2	**Red/yellow**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2CD05**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2CD05**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3CD05**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4CD05**		1	1 unit	1CL
	Handles, illuminated, without extension shaft and coupling driver, labeling Test - 0 - I								
	• With masking plate								
	• Illuminated								
	• Can be locked with up to max. 3 padlocks								
	• Labeling Test - 0 - I								
 Handle without extension shaft, gray, for sizes 1/2	**Gray**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2CF01**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2CF01**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3CF01**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4CF01**		1	1 unit	1CL
 Handle without extension shaft, red/yellow, for sizes 1/2	**Red/yellow**								
	• For sizes 1/2; 3KD....-.M/N	45	8 x 8		**8UD1771-2CF05**		1	1 unit	1CL
	• For size 3; 3KD....-.P	100	8 x 8		**8UD1841-2CF05**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	140	10 x 10		**8UD1851-3CF05**		1	1 unit	1CL
	• For size 5; 3KD....-.R	200	12 x 12		**8UD1861-4CF05**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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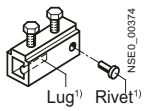
	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Other accessories for door-coupling rotary operating mechanisms, 8UD1 series									
	Extension shafts								
 8UC6032	**300 mm long**								
	• For sizes 1/2/3, 3KD....-.M/N/P	--	8 x 8		**8UC6032**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	--	10 x 10		**8UC6033**		1	1 unit	1CL
	• For size 5; 3KD....-.R	--	12 x 12		**8UC6034**		1	1 unit	1CL
 8UC6082	**600 mm long**								
	A shaft jack is required for the 8UD handle when the 600 mm long shaft is used and for sizes 1/2.								
	• For sizes 1/2/3, 3KD....-.M/N/P	--	8 x 8		**8UC6082**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	--	10 x 10		**8UC6083**		1	1 unit	1CL
	• For size 5; 3KD....-.R	--	12 x 12		**8UC6084**		1	1 unit	1CL
 8UD1900-0FA00	**Shaft jack for 8UD handle for shaft, 600 mm** *NEW*								
	For sizes 1/2, 3KD....-.M/N	--	8 x 8		**8UD1900-0FA00**		1	1 unit	1CL
	Coupling drivers with tolerance compensation								
 8UD1900-2GA00	• For sizes 1/2, 3KD....-.M/N	--	8 x 8		**8UD1900-2GA00**		1	1 unit	1CB
	• For size 3; 3KD....-.P		8 x 8		**8UD1900-6GA00**		1	1 unit	1CL
	• For size 4; 3KD....-.Q		10 x 10		**8UD1900-3GA00**		1	1 unit	1CL
	• For size 5; 3KD....-.R		12 x 12		**8UD1900-4GA00**		1	1 unit	1CL
	Coupling drivers without tolerance compensation								
 8UD1900-2HA00	• For sizes 1/2, 3KD....-.M/N	--	8 x 8		**8UD1900-2HA00**		1	1 unit	1CB
	• For size 3; 3KD....-.P		8 x 8		**8UD1900-6HA00**		1	1 unit	1CL
	• For size 4; 3KD....-.Q		10 x 10		**8UD1900-3HA00**		1	1 unit	1CL
	• For size 5; 3KD....-.R		12 x 12		**8UD1900-4HA00**		1	1 unit	1CL
	Shaft couplings								
 8UC6021 to 8UC6024	• For sizes 1/2/3, 3KD....-.M/N/P	--	8 x 8		**8UC6022**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	--	10 x 10		**8UC6023**		1	1 unit	1CL
	• For size 5; 3KD....-.R	--	12 x 12		**8UC6024**		1	1 unit	1CL

1) Non-interchangeability features.

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Accessories and spare parts

	Version	Shaft size handle end[1]	Shaft size switch end[1]	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm x mm	mm x mm	d					
Door-coupling rotary operating mechanisms, 8UC/3KD9 series									
	Door-coupling rotary operating mechanisms including 300 mm extension shaft and coupling driver								
	Lockable with up to 5 padlocks. Degree of protection when installed is IP65.								
	**Gray**								
Door-coupling rotary operating mechanism, gray, for sizes 1/2	• For size 1; 3KD....-.M	8 x 8	8 x 8		**3KD9115-1**		1	1 unit	1CL
	• For size 2; 3KD....-.N	8 x 8	8 x 8		**3KD9215-1**		1	1 unit	1CL
	• For size 3; 3KD....-.P	10 x 10	8 x 8		**3KD9315-1**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	10 x 10	10 x 10		**3KD9415-1**		1	1 unit	1CL
	• For size 5; 3KD....-.R	12 x 12	12 x 12		**3KD9515-1**		1	1 unit	1CL
	**Red/yellow**								
Door-coupling rotary operating mechanism, red/yellow, for sizes 1/2	• For size 1; 3KD....-.M	8 x 8	8 x 8		**3KD9115-2**		1	1 unit	1CL
	• For size 2; 3KD....-.N	8 x 8	8 x 8		**3KD9215-2**		1	1 unit	1CL
	• For size 3; 3KD....-.P	10 x 10	8 x 8		**3KD9315-2**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	10 x 10	10 x 10		**3KD9415-2**		1	1 unit	1CL
	• For size 5; 3KD....-.R	12 x 12	12 x 12		**3KD9515-2**		1	1 unit	1CL
Handles for door-coupling rotary operating mechanisms, 8UC/3KD9 series									
	Handles without extension shaft and coupling driver								
	**Gray**								
Handle without extension shaft, gray, for sizes 1/2	• For size 1; 3KD....-.M	8 x 8	--		**3KD9115-3**		1	1 unit	1CL
	• For size 2; 3KD....-.N	8 x 8	--		**3KD9215-3**		1	1 unit	1CL
	• For size 3; 3KD....-.P	10 x 10	--		**3KD9315-3**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	10 x 10	--		**3KD9415-3**		1	1 unit	1CL
	• For size 5; 3KD....-.R	12 x 12	--		**3KD9515-3**		1	1 unit	1CL
	**Red/yellow**								
Handle without extension shaft, red/yellow, for sizes 1/2	• For size 1; 3KD....-.M	8 x 8	--		**3KD9115-4**		1	1 unit	1CL
	• For size 2; 3KD....-.N	8 x 8	--		**3KD9215-4**		1	1 unit	1CL
	• For size 3; 3KD....-.P	10 x 10	--		**3KD9315-4**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	10 x 10	--		**3KD9415-4**		1	1 unit	1CL
	• For size 5; 3KD....-.R	12 x 12	--		**3KD9515-4**		1	1 unit	1CL

[1] With different shaft sizes – at the handle/at the switch – the shaft cross-section changes over the length of the shaft (does not apply to sizes 1 and 2).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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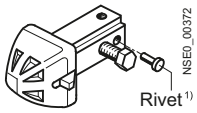
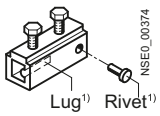
	Version	Shaft size handle end[1]	Shaft size switch end[1]	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm x mm	mm x mm	d					
Other accessories for door-coupling rotary operating mechanisms, 8UC/3KD9 series									
	Extension shafts								
	**300 mm long**								
3KD9302-0, extension shaft, 300 mm long, for size 3	• For sizes 1/2, 3KD....-.M/N	8 x 8	8 x 8		**8UC6032**		1	1 unit	1CL
	• For size 3; 3KD....-.P	10 x 10	8 x 8		**3KD9302-0**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	10 x 10	10 x 10		**8UC6033**		1	1 unit	1CL
	• For size 5; 3KD....-.R	12 x 12	12 x 12		**8UC6034**		1	1 unit	1CL
	**600 mm long**								
3KD9302-1, extension shaft, 600 mm long, for size 3	• For sizes 1/2, 3KD....-.M/N	8 x 8	8 x 8		**8UC6082**		1	1 unit	1CL
	• For size 3; 3KD....-.P	10 x 10	8 x 8		**3KD9302-1**		1	1 unit	1CL
	• For size 4; 3KD....-.Q	10 x 10	10 x 10		**8UC6083**		1	1 unit	1CL
	• For size 5; 3KD....-.R	12 x 12	12 x 12		**8UC6084**		1	1 unit	1CL
	Coupling drivers								
	• For 8 x 8 mm shafts				**8UC6017-2AA**		1	1 unit	1CL
8UC6013 coupling driver	• For 10 x 10 mm shafts				**8UC6013**		1	1 unit	1CL
	• For 12 x 12 mm shafts				**8UC6014**		1	1 unit	1CL
	Shaft couplings								
	• For 8 x 8 mm shafts				**8UC6022**		1	1 unit	1CL
Shaft coupling	• For 10 x 10 mm shafts				**8UC6023**		1	1 unit	1CL
	• For 12 x 12 mm shafts				**8UC6024**		1	1 unit	1CL

[1] Non-interchangeability features.

Auxiliary switches

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Auxiliary switch modules for sizes 1 and 2						
	Unit is supplied without auxiliary switches, a maximum of 2 auxiliary switches can be installed.						
Auxiliary switch module, standard version	• Standard version		**3KD9103-5**		1	1 unit	1CL
	• Version with test function		**3KD9103-6**		1	1 unit	1CL
	• Version with leading NO contact + test function		**3KD9103-7**		1	1 unit	1CL
	Auxiliary switches for sizes 1 and 2						
	With soldered-on 50 cm connecting cables						
3KD9103-3	• 1 CO contact		**3KD9103-1**		1	1 unit	1CL
	• 1 CO contact, solid-state compatible		**3KD9103-3**		1	1 unit	1CL

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Accessories and spare parts

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 3KD9103-2	**Auxiliary switches for sizes 1 and 2**						
	Without soldered-on connecting cables						
	• 1 CO		**3KD9103-2**		1	1 unit	1CL
	• 1 CO contact, solid-state compatible		**3KD9103-4**		1	1 unit	1CL
 3SB3400-0B auxiliary switch	**Auxiliary switches for sizes 3 to 5**						
	Auxiliary switches with screw terminal for installation on operating mechanism module. Auxiliary switches with spring-type terminal 3SB3403-.. from the 3SB3 program can also be used						
	• 1 NO	▶	**3SB3400-0B**		1	1 unit	41J
	• 1 NO with gold-plated contacts		**3SB3400-0BA**		1	1 unit	41J
	• 1 NC	▶	**3SB3400-0C**		1	1 unit	41J
	• 1 NC with gold-plated contacts		**3SB3400-0CA**		1	1 unit	41J
 3SB3400-0A auxiliary switch	• 1 NO + 1 NC	▶	**3SB3400-0A**		1	1 unit	41J
	• 1 NO + 1 NC with gold-plated contacts		**3SB3400-0AA**		1	1 unit	41J
	• 2 NO		**3SB3400-0D**		1	1 unit	41J
	• 2 NO with gold-plated contacts		**3SB3400-0DA**		1	1 unit	41J
	• 2 NC		**3SB3400-0E**		1	1 unit	41J
	• 2 NC with gold-plated contacts		**3SB3400-0EA**		1	1 unit	41J

Accessories for DC applications

	Version	For size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Connecting bridges								
	For connecting two poles							
 3KD9218-0	***Flat terminals***							
		2; 3KD....-.N		**3KD9218-0**		1	1 unit	1CL
	For 400 A, two units are required	3; 3KD....-.P		**3KD9318-0**		1	1 unit	1CL
	For 800 A, two units are required	4; 3KD....-.Q		**3KD9418-0**		1	1 unit	1CL
	For 1250 A and 1600 A, two units are required	5; 3KD....-.R		**3KD9518-0**		1	1 unit	1CL
 3KD9518-0								
 3KD9118-1	***Box terminals***							
		1; 3KD....-.M		**3KD9118-1**		1	1 unit	1CL
		2; 3KD....-.N		**3KD9218-1**		1	1 unit	1CL
Cable connection covers for connecting bridges								
	As touch protection for flat terminals							
 3KD9204-0		2; 3KD....-.N		**3KD9204-0**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9304-0**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9404-0**		1	1 unit	1CL
		5; 3KD....-.R		**3KD9504-0**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Other accessories

	Version	For size	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Phase barriers								
 Phase barrier for size 2 devices with 3 or 4 poles	For 3KD with flat terminals							
	For 3-pole devices (6 units)							
		2; 3KD....-.N		**3KD9108-6**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9308-6**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9408-6**		1	1 unit	1CL
		5; 3KD....-.R		**3KD9508-6**		1	1 unit	1CL
	For 4-pole devices (8 units)							
		2; 3KD....-.N		**3KD9108-8**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9308-8**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9408-8**		1	1 unit	1CL
		5; 3KD....-.R		**3KD9508-8**		1	1 unit	1CL
Cable connection covers								
	For 3KD with flat terminals							
	For 3-pole devices (6 units)							
 3KD9204-6	**Standard length**							
		2; 3KD....-.N		**3KD9204-6**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9304-6**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9404-6**		1	1 unit	1CL
		5; 3KD....-.R		**3KD9504-6**		1	1 unit	1CL
 3KD9204-7	**Short version**							
		2; 3KD....-.N		**3KD9204-7**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9304-7**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9404-7**		1	1 unit	1CL
	For 4-pole devices (8 units)							
 3KD9204-8	**Standard length**							
		2; 3KD....-.N		**3KD9204-8**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9304-8**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9404-8**		1	1 unit	1CL
		5; 3KD....-.R		**3KD9504-8**		1	1 unit	1CL
 3KD9204-5	**Short version**							
		2; 3KD....-.N		**3KD9204-5**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9304-5**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9404-5**		1	1 unit	1CL
	Spare cable connection cover (1 unit)							
	Standard length							
		5; 3KD....-.R		**3KD9504-1**		1	1 unit	1CL
	Short version							
		2; 3KD....-.N		**3KD9204-1**		1	1 unit	1CL
		3; 3KD....-.P		**3KD9304-1**		1	1 unit	1CL
		4; 3KD....-.Q		**3KD9404-1**		1	1 unit	1CL

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Accessories and spare parts

	Version	For size	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Blocking pin test function								
	Enables permanent deactivation of the test function for auxiliary switches; it is installed in the operating mechanism module of the 3KD switch disconnector Scope of supply: Blocking pins for 10 3KD switch disconnectors							
		1 and 2		**3KF9112-1AA00**		1	1 unit	1DL
		3 and 4		**3KF9412-1AA00**		1	1 unit	1DL
		5		**3KF9512-1AA00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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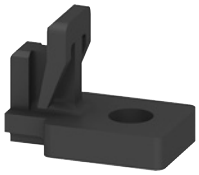
Spare parts

	Version	For size	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Mounting brackets (4 units)								
	**Mounting brackets** Spare part, is included in the scope of supply of the 3KD.	1 and 2		**3KD9120-1**		1	1 unit	1CL
		3		**3KF9212-0AA00**		1	1 unit	1DL
		4		**3KF9412-0AA00**		1	1 unit	1DL
		5		**3KF9512-0AA00**		1	1 unit	1DL
Slide for mounting on a standard mounting rail								
	Spare part, is included in the scope of supply of the 3KD. Contains 5 parts	1 and 2		**3KF9112-0BA00**		1	1 unit	1DL

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Introduction

Overview

The 5TE1 switch disconnectors are available from 100 A to 200 A in 3 and 4-pole versions and can be used as main control switches, repair switches, outgoing feeder switches and emergency mains switching off device.

The series corresponds to the requirements of IEC/EN 60947-3 and its key features are its compact and robust design, high short-circuit strength, high DC breaking capacity and comprehensive accessories.

Its small footprint means it is easy to install in all types of enclosures, distribution boards and control cabinets.

The devices are approved to UL 508 and KEMA certified.

Benefits

- Transparent enclosures ensure that the contact position is always visible
- Contacts with double breaks ensure reliable insulation characteristics
- Can be locked in the OFF position to allow for maintenance work
- With a red knob and yellow cap, it can also be used as an emergency switching off device.

Technical specifications

					5TE1.1	5TE1.2	5TE1.3	5TE1.4
Standards **Approvals**					IEC/EN 60947-3, UL 508 UL 508 for the following types: 5TE1320, 5TE1330, 5TE1340, 5TE1420, 5TE1430 and 5TE1440. UL File No. E302554			
Rated operational current I_e With utilization category AC-21A	Per conduct. path	At U_e =	400 V 415 V 500 V 690 V	A A A A	100 100 100 100	125 125 125 125	160 160 160 160	200 200 200 200
Rated operational current I_e With utilization category AC-22A	Per conduct. path	At U_e =	400 V 415 V 500 V 690 V	A A A A	100 100 100 63	125 125 100 63	160 160 160 160	200 200 200 200
Rated operational current I_e With utilization category AC-23A	Per conduct. path	At U_e =	400 V 415 V 500 V 690 V	A A A A	80 80 50 40		125 125 125 63	160 160 125 80
Rated operational current I_e With utilization category DC-23A	2 poles in series 2 poles in series 4 poles in series		110 V 220 V 220 V	A A A	100 -- 100		160 100 160	
Rated operational voltage U_e				V AC	According to UL: 480, acc. to IEC: 690			
Rated insulation voltage U_i				V AC	690			
Rated impulse withstand voltage U_{imp}	2000 m			kV	8			
Impulse test voltage	At sea level			kV	12.3			
Max. rated operational power With utilization category AC-23A		At U_e =	400 V 415 V 500 V 690 V	kW kW kW kW	44 46 35 36		69 72 86 60	88 92 86 76
Thermal rated current I_{th}	At 40 °C, 50 °C and 60 °C			A	100	125	160	200
Rated making capacity	At 415 V AC-23A			A	1875		3200	4000
Rated breaking capacity	At 415 V AC-23A			A	1000		1920	2400
Rated ultimate short-circuit making capacity I_{cm}	Per conduct. path	At U_e =	400 V 415 V 500 V 690 V	kA kA kA kA	10 10 6.7 6.7			
Rated short-time withstand current I_{cw} (peak value)	Per conduct. path		0.25 s 1 s	kA kA	5 2.5		6 3	
Rated conditional short-circuit current With back-up protection with back-up fuse With identical rated current		At U_e =	400 V 415 V 500 V 690 V	kA kA kA kA	50 50 50 33	33	20	18
Capacitive load	At 400 V			kVar	50	60	77	97
Number of poles					2/3/4			
Rated power dissipation P_v	Per pole			VA	2.9	4.5	6.5	10
Frequency				Hz	50/60			
Conductor cross-sections • Solid and stranded • AWG cables • Copper busbars				 mm^2 AWG mm^2	 6 ... 50 10 ... 1/0 --		 -- 8 max. 20 × 6	
Service life	Electrical Mechanical			Switching cycles	1500 20000		1000 10000	
Acc. to UL 508 **UL 508 General Use 480 V** **UL 508 Manual Motor Controller 230 V** **UL 508 Manual Motor Controller 480 V** **UL 508 Short-circuit at 480 V**	I_n FLA (full load amperes) Power Power With Class H or K5 fuses With J fuses			A A hp hp kA kA	-- -- -- -- -- --	80 28 10 20 10 50	100 34 25 15	125 40 30 15

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	I_e	U_e	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A AC	V AC	MW	d					
	**Switch disconnectors, lockable, with gray knob and transparent enclosure, mounting depth 92 mm**									
	2 NO									
		100	690	5		**5TE1210**		1	1 unit	1BK
		125				**5TE1220**		1	1 unit	1BK
		160		8		**5TE1230**		1	1 unit	1BK
		200				**5TE1240**		1	1 unit	1BK
	3 NO									
		100	690	5		**5TE1310**		1	1 unit	1BK
		125				**5TE1320**		1	1 unit	1BK
		160		8		**5TE1330**		1	1 unit	1BK
		200				**5TE1340**		1	1 unit	1BK
	4 NO									
		100	690	5		**5TE1410**		1	1 unit	1BK
		125				**5TE1420**		1	1 unit	1BK
		160		8		**5TE1430**		1	1 unit	1BK
		200				**5TE1440**		1	1 unit	1BK
	3 NO with N-conductor through-type terminal									
		100	690	5		**5TE1610**		1	1 unit	1BK
		125				**5TE1620**		1	1 unit	1BK
		160		8		**5TE1630**		1	1 unit	1BK
		200				**5TE1640**		1	1 unit	1BK
	**Switch disconnectors with red knob and yellow cap, can be used as emergency mains switching off device acc. to IEC 60204-1, EN 60204-1 (VDE 0113-1) if switch is easily accessible, mounting depth 92 mm**									
	3 NO									
		100	690	5		**5TE1315**		1	1 unit	1BK
		125				**5TE1325**		1	1 unit	1BK
		160		8		**5TE1335**		1	1 unit	1BK
		200				**5TE1345**		1	1 unit	1BK
	4 NO									
		100	690	5		**5TE1415**		1	1 unit	1BK
		125				**5TE1425**		1	1 unit	1BK
		160		8		**5TE1435**		1	1 unit	1BK
		200				**5TE1445**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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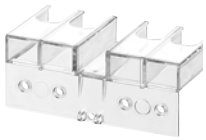
Accessories

	Version	I_e	U_e	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A AC	V AC	d					
 5TE9000	**Terminal covers** Sealable								
	For 100 A and 125 A switch disconnectors				**5TE9000**		1	1 unit	1BK
	For 160 A and 200 A switch disconnectors				**5TE9001**		1	1 unit	1BK
 5TE9001									
	**Cage terminals** For 160 A and 200 A switch disconnectors, 14.5 mm terminal diameter for 35 mm^2 cables, hexagonal socket head screw 5 mm								
	1 set = 3 units				**5TE9003**		1	1 set	1BK
	1 set = 4 units				**5TE9004**		1	1 set	1BK
	**Auxiliary switches** Can be mounted optionally left or right or both sides (2 units); minimum contact load 24 V, 50 mA								
	1 CO	6	230		**5TE9005**		1	1 unit	1BK
	2 CO	6	230		**5TE9006**		1	1 unit	1BK
	**Locking units**								
	For up to three padlocks with max. ∅ 8 mm				**5TE9014**		1	1 unit	1BK
	**Conversion kits, 4-pole, for 100 A and 125 A for the connection of busbars or cables with cable lugs**								
	For busbars max. 15 mm wide including terminal cover				**5TE9015**		1	1 set	1BK
 5TE9010	**Rotary operating mechanisms with extension shafts for mounting on hinged doors or enclosure lids, lockable, IP65**								
	Black knob								
	Shaft length 200 mm				**5TE9010**		1	1 unit	1BK
	Shaft length 400 mm				**5TE9011**		1	1 unit	1BK
	Red knob								
	Shaft length 200 mm				**5TE9012**		1	1 unit	1BK
	Shaft length 400 mm				**5TE9013**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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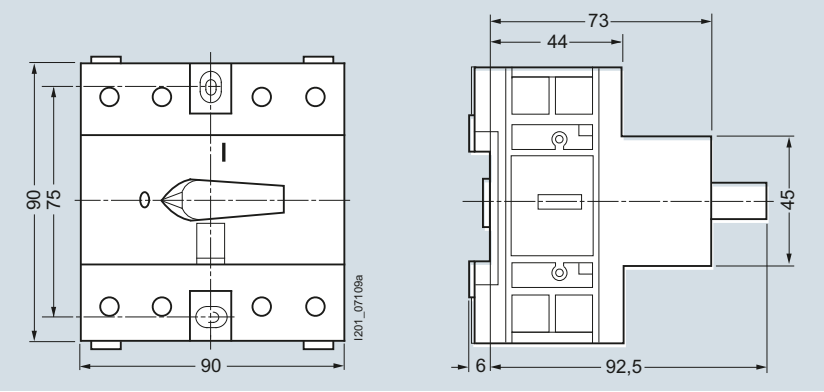
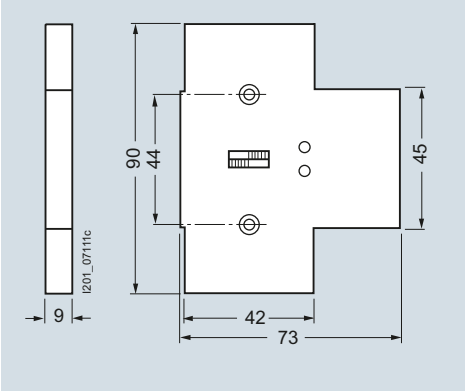
Dimensional drawings

5TE1 switch disconnectors, 100 A and 125 A



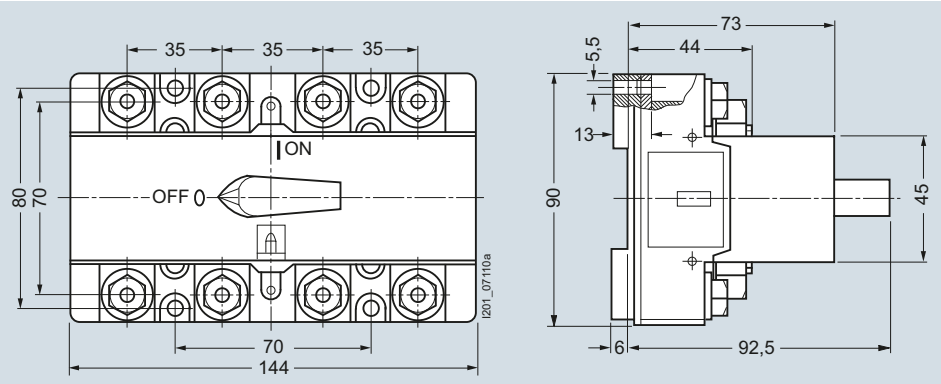
5TE1210 5TE1310 5TE1410 5TE1610
5TE1220 5TE1315 5TE1415 5TE1620
5TE1320 5TE1420
5TE1325 5TE1425

5TE9 auxiliary switches



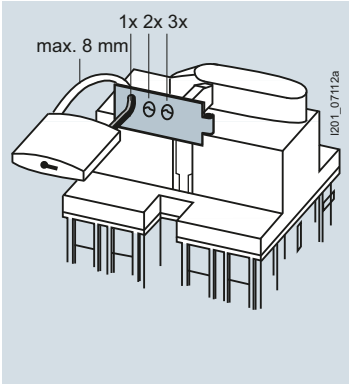
5TE9005
5TE9006

5TE1 switch disconnectors, 160 A and 200 A

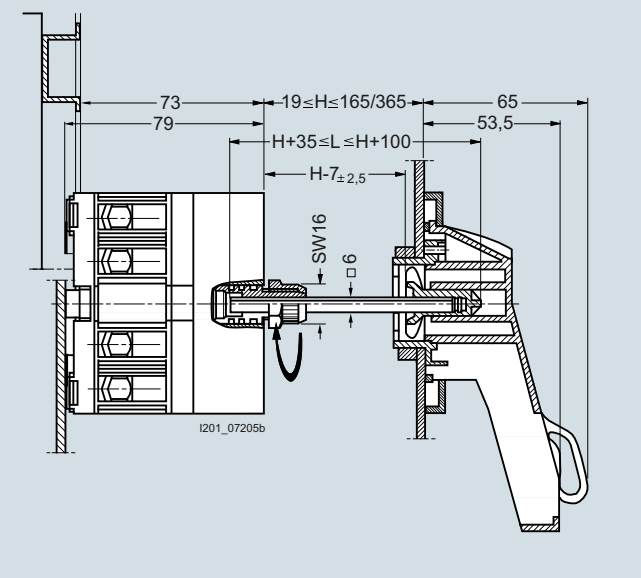


5TE1230 5TE1330 5TE1430 5TE1630
5TE1240 5TE1335 5TE1435 5TE1640
5TE1340 5TE1440
5TE1345 5TE1445

5TE9014 locking units

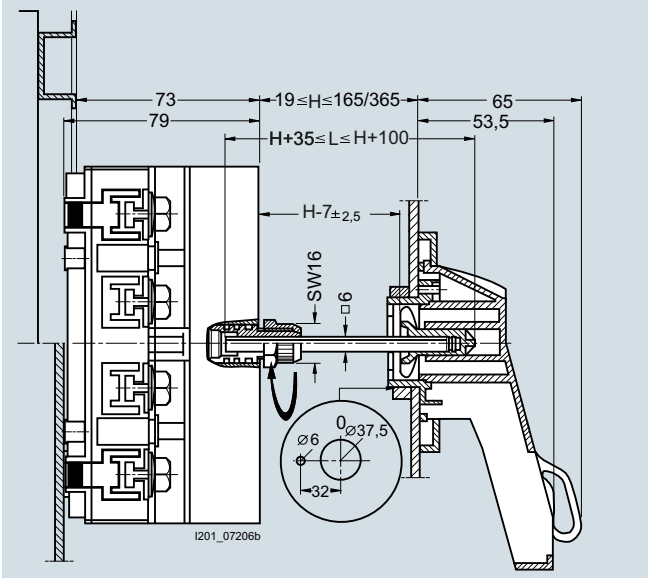


5TE9 rotary actuators with extension shaft



With switch disconnectors 100 A and 125 A
5TE9010, 5TE9011,
5TE9012, 5TE9013

It is possible to open the door in a disconnected state.



With switch disconnectors 160 A and 200 A
5TE9010, 5TE9011,
5TE9012, 5TE9013

It is possible to open the door in a disconnected state.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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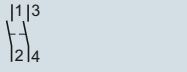
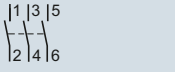
General data

Circuit diagrams

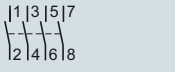
Graphical symbols



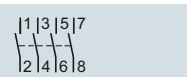
5TE1210
5TE1220
5TE1230
5TE1240



5TE1310
5TE1320
5TE1330
5TE1340



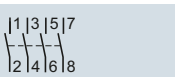
5TE1410
5TE1420
5TE1430
5TE1440



5TE1610
5TE1620
5TE1630
5TE1640

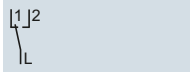


5TE1315
5TE1325
5TE1335
5TE1345

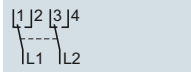


5TE1415
5TE1425
5TE1435
5TE1445

5TE9 auxiliary switches



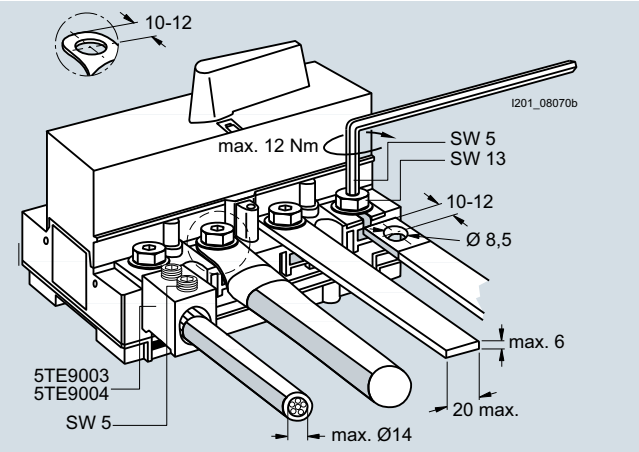
5TE9005



5TE9006

More information

Connection of 5TE1.3 and 5TE1.4 switches, 160 A and 200 A



Design

- From 160 A: Supplied with one terminal cover
- 160 A and 200 A: Version for connection with cable lug
- Screw fixing on base plate
- Installation on standard mounting rail to EN 60715, which is raised at least 5 mm from the base plate.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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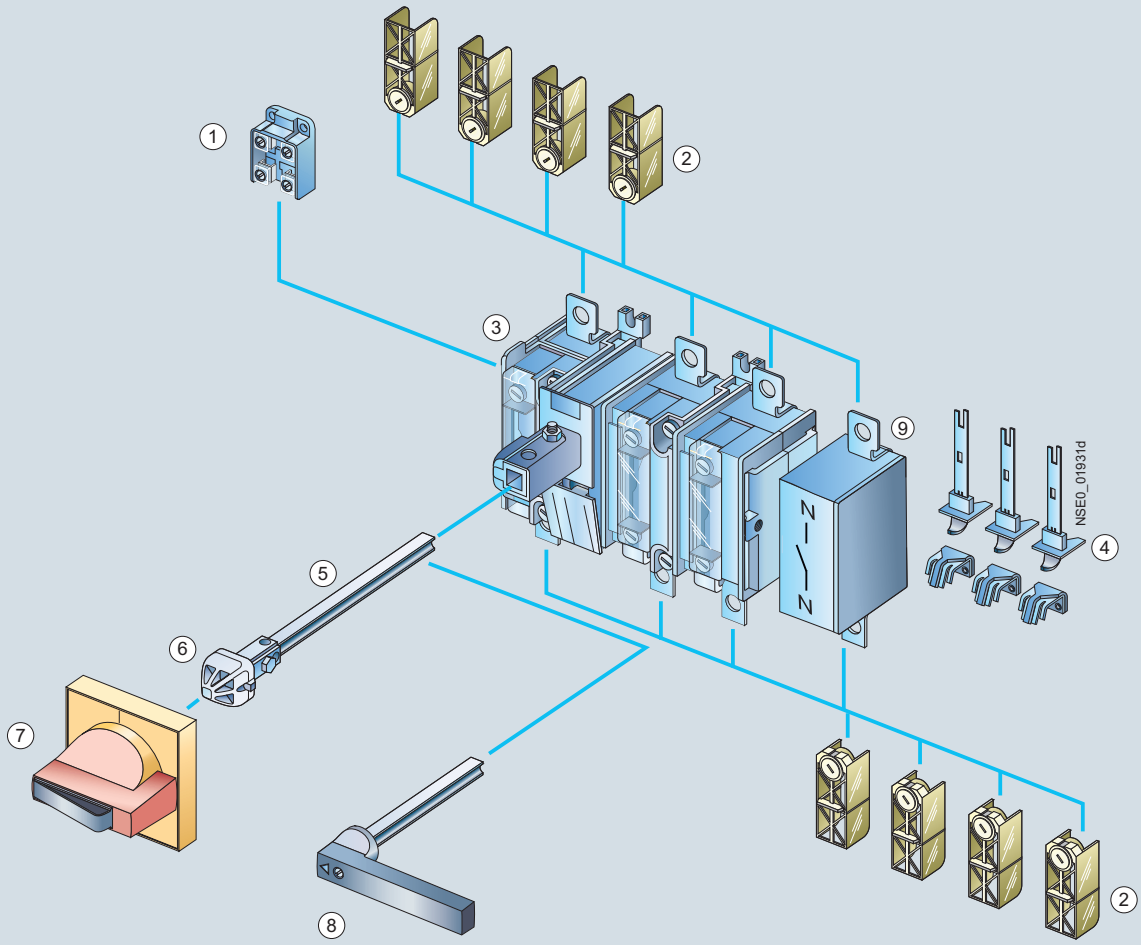
Overview



① Auxiliary switch (3SB for 3KA; 3KX for 3KE)
② IP20 terminal cover (Operator side)
③ 3K switch disconnector
④ Arcing contacts (only for 3KE)
⑤ Extension shaft
⑥ Coupling driver
⑦ 8UC7 door-coupling rotary operating mechanism in standard version (ti-grey) or EMERGENCY-STOP version (red/yellow).

All components from the switch to the actuator are provided with non-interchangeability features.

⑧ 8UC9 handle for fixed mounting in standard version (black) or EMERGENCY-STOP version (red).
⑨ 4th pole (optional, only for 3KA)

For the 3KA switch disconnectors, complete kits for standard and EMERGENCY-STOP application are available for installation in the side and rear panels of control cabinets.

A changeover operating mechanism is available for the use of two switch disconnectors of the 3KE series as load changeover switches.

A switch coupling permits simultaneous switching of two 3KE switch disconnectors with identical or different rated operational currents.

Identical accessories for 3KA switch disconnectors and for 3KL and 3KM switch disconnectors with fuses simplify stock keeping.

Application

3KA and 3KE switch disconnectors are used as main control, EMERGENCY-STOP, maintenance and transfer switches in distribution boards for residential and non-residential buildings as well as industrial switchboards. As 3 and 4-pole versions, they ensure making and breaking of the specified rated current under load. At the same time, they constitute a safety isolating function and isolating distance in all low-voltage circuits.

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Technical specifications

Standards		**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**						
Type		**3KA50**	**3KA51**	**3KA52[1)]**	**3KA53[1)]**	**3KA55[1)]**	**3KA57[1)]**	**3KA58[1)]**
Rated uninterrupted current I_u	A	63	80	125	160	250	400	630[3)]
Conventional free air thermal current I_{th}[2)]	A	63	80	125	160	250	400	630[3)]
Rated insulation voltage U_i	V	690	690	1000	1000	1000	1000	1000
Rated impulse withstand voltage U_{imp}	kV	6	6	8	8	8	8	8
Rated operational voltage U_e								
50/60 Hz AC	V	690						
DC	V	440 (3 conducting paths series-connected)						
	V	220 (2 conducting paths series-connected)						
	V	110 (1 conducting path)						
Rated short-circuit making capacity with upstream fuses[4)] At 50/60 Hz, 690 V AC, peak value	kA	220	220	220	220	176	176	105
Rated conditional short-circuit current with upstream fuses[4)] At 50/60 Hz AC, 690 V, rms value	kA	100	100	100	100	80	80	50
Max. rated current I_n of fuses	A	63	80	160	160	400	400	630
Permissible let-through current of the fuses	kA	8	10	17	17	30[5)]	30[5)]	40[5)]
Maximum permissible let-through I^2t value	kA^2s	55	55	223	223	1000	1000	2600
Permissible let-through current of an upstream circuit breaker At 50/60 Hz, 690 V AC, peak value	kA	7	8	8	15	25	25	32
Rated ultimate short-circuit making capacity I_{cm} without fuses At 50/60 Hz, 690 V AC, peak value	kA	7	7	7	9	20	25	35
Breaking capacity (infeed from the top or bottom)								
At 400 V AC								
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	650	1000	1280	2000	3200	5040
• Rated operational current I_e at								
- AC-21A, AC-22A, AC-23A	A	63	80	125	160	250	400	630[6)]
• Motor switching capacity AC-23A	kW	30	40	65	80	132	200	350
At 500 V AC								
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	640	1000	1280	2000	3200	3200
• Rated operational current I_e at								
- AC-21A, AC-22A	A	63	80	125	160	250	400	630
- AC-23A	A	63	80	125	160	250	400	400
• Motor switching capacity AC-23A	kW	40	50	90	110	185	280	280
At 690 V AC								
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	500	1000	1280	2000	3200	3200
• Rated operational current I_e at								
- AC-21A, AC-22A	A	63	80	125	160	250	400	630
- AC-23A	A	63	63	125	160	250	400	400
• Motor switching capacity AC-23A	kW	50	50	110	150	220	375	375
At 440 V DC (3 conducting paths series-connected)[7)]								
• Breaking current I_c (L/R = 15 ms)	A	250	260	500	640	1000[8)]	1600	1600
• Rated operational current I_e at DC-23A	A	63	63	125	160	250[9)]	400	400
Rated short-time current I_{cw} (1 s current, rms value)	kA	2.5	2.5	3.2	3.2	8	11	15
Permissible ambient temperature	°C	-25 ... +55 for operation[3)]						
	°C	-50 ... +80 during storage						
Mechanical endurance, operating cycles		15 000	15 000	15 000	15 000	12 000	12 000	12 000
Degree of protection		IP00/IP20 (from the operator side, with busbar and terminal covers)						
Power loss of the switch at I_{th}	W	7	12	22	22	33	72	170
Main conductor connections								
Busbar systems, max. dimensions (W x T)	mm	25 x 9	25 x 9	45 x 10	45 x 10	40 x 12	40 x 12	40 x 15
Cable lug, max. conductor cross-section (stranded)	mm^2	35	35	70	120	150	2 x 150 or 1 x 240	2 x 240
Tightening torque	Nm	6 ... 7.5	6 ... 7.5	7 ... 10	18 ... 22	35 ... 45	35 ... 45	35 ... 45
Terminal screws		M6	M6	M6	M8	M10	M10	M10
Protective conductor connections								
Flat bars	mm	--	--	--	--	20 x 2.5	20 x 2.5	20 x 2.5
Cable lug, max. conductor cross-section (stranded)	mm^2	--	--	--	--	70	120	120

1) Technical specifications for approval on request.

2) Configuring note: Max. permissible operating temperature at connections 100 °C.

3) With 3KA58 for operation -25 °C ... +35 °C, 570 A at 55 °C.

4) Only available with fuses 3NA3 8, 3NA3 2 or 3ND1 8, 3ND1 2 (otherwise only 105 kA/50 kA).

5) 3ND1 switching device protection fuse.

6) AC-23B.

7) 220 V DC (L1 and L3 series-connected) or 110 V DC (one conducting path) at DC-23A.

8) At 440 V L/R = 4 ms, at 220 V L/R = 15 ms.

9) At 440 V DC-22A, at 220 V DC-23A.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Standards		**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**			
Type		**3KE42**	**3KE43**	**3KE44**	**3KE45**
Rated uninterrupted current I_u	A	250	400	630	1000
Rated insulation voltage U_i	V	1000 AC, 1200 DC			
Rated impulse withstand voltage U_{imp}	kV	8	8	8	8
Rated operational voltage U_e					
50/60 Hz AC	V	690			
DC	V	440 (3 conducting paths series-connected)			
	V	220 (2 conducting paths series-connected)			
Rated short-circuit making capacity I_{cm} At 50/60 Hz AC, 690 V (peak value)	kA	35	35	60	60
Rated short-circuit making capacity with upstream fuses At 50/60 Hz AC, 690 V (peak value)	kA	105	105	105	84
Rated conditional short-circuit current with upstream fuses At 50/60 Hz AC, 690 V (rms value)	kA	50	50	50	40
Maximum permissible let-through I^2t value	kA^2s	2150	2150	5400	19000
Permissible let-through current of an upstream circuit breaker					
At 50/60 Hz AC, 690 V (peak value)	kA	35	35	60	60
Max. rated current I_n of fuse	A	400	400	630	1000
Permissible let-through current of the fuses (peak value)	kA	38	38	60	75
Breaking capacity (infeed from the top or bottom)					
At 400 V AC					
• Breaking current I_c (rms value at p.f. = 0.35)	A	1000	1000	2520	2520
• Rated operational current I_e at					
- AC-21A	A	250	400	630	1000
- AC-22A	A	250	330	630	800
- AC-23A	A	125	125	315	315
At 500 V AC					
• Breaking current I_c (rms value at p.f. = 0.35)	A	1000	1000	2520	2520
• Rated operational current I_e at					
- AC-21A	A	250	400	630	1000
- AC-22A	A	250	330	630	800
- AC-23A	A	125	125	315	315
At 690 V AC					
• Breaking current I_c (rms value at p.f. = 0.35)	A	1000	1000	2520	2520
• Rated operational current I_e at					
- AC-21A	A	250	400	630	1000
- AC-22A	A	250	330	630	800
- AC-23A	A	125	125	315	315
At 440 V DC (3 conducting paths series-connected)					
• Breaking current I_c (L/R = 5 ms)	A	1000	1000	2520	2520
• Rated operational current I_e at					
- DC-21A	A	250	400	630	1000
- DC-22A	A	250	250	630	630
Rated short-time current I_{cw} (1 s current, rms value)	kA	12.5	12.5	21	21
Permissible ambient temperature	°C	-25 ... +55 for operation			
	°C	-50 ... +80 during storage			
Mechanical endurance, operating cycles		10000			
Degree of protection		IP00			
Power loss of the switch at I_{th}	W	15	33	78	180
Main conductor connections					
Busbar systems, max. dimensions (W x T)	mm	25 x 10	25 x 10	2 x 40 x 10	2 x 40 x 10
Cable lug, max. conductor cross-section (stranded)	mm^2	2 x 150	2 x 150, 1 x 240	2 x 240	2 x 240

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Floor mounting

Application

3KA switch disconnectors are implemented as main control switches and EMERGENCY-STOP switches for operational switching and isolation of main circuits and auxiliary circuits. Another field of application is the switching of three-phase motors and other loads in the event of maintenance and repair.

Main control and EMERGENCY-STOP switches are manually operated switch disconnectors according to IEC 60947-3 and VDE 0660 Part 107 (EN 60947-3) and comply with the conditions for switch disconnectors and the requirements of the machinery directive EN 60204-1.

Selection and ordering data

All switch disconnectors with degree of protection IP00
The conductor connecting screws are included in the scope of delivery.

	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS*	PG
	A	d					
Complete versions with 8UC7 door-coupling rotary operating mechanism (black handle)							
	3-pole for motor loads and for power distribution						
	63		**3KA5030-1GE01**		1	1 unit	1CL
	80		**3KA5130-1GE01**		1	1 unit	1CL
	125		**3KA5230-1GE01**		1	1 unit	1CL
	160		**3KA5330-1GE01**		1	1 unit	1CL
	250		**3KA5530-1GE01**		1	1 unit	1CL
	400		**3KA5730-1GE01**		1	1 unit	1CL
	630		**3KA5830-1GE01**		1	1 unit	1CL
	4-pole[1] for power distribution						
	63		**3KA5040-1GE01**		1	1 unit	1CL
	80		**3KA5140-1GE01**		1	1 unit	1CL
	125		**3KA5240-1GE01**		1	1 unit	1CL
	160		**3KA5340-1GE01**		1	1 unit	1CL
	250		**3KA5540-1GE01**		1	1 unit	1CL
	400		**3KA5740-1GE01**		1	1 unit	1CL
	630		**3KA5840-1GE01**		1	1 unit	1CL
Basic switch versions without handle							
 3KA5330-1AE01	**3-pole for motor loads and for power distribution**						
	63		**3KA5030-1AE01**		1	1 unit	1CL
	80		**3KA5130-1AE01**		1	1 unit	1CL
	125		**3KA5230-1AE01**		1	1 unit	1CL
	160	▶	**3KA5330-1AE01**		1	1 unit	1CL
	250		**3KA5530-1AE01**		1	1 unit	1CL
	400		**3KA5730-1AE01**		1	1 unit	1CL
	630		**3KA5830-1AE01**		1	1 unit	1CL
 3KA5340-1AE01	**4-pole[1] for power distribution**						
	63		**3KA5040-1AE01**		1	1 unit	1CL
	80		**3KA5140-1AE01**		1	1 unit	1CL
	125		**3KA5240-1AE01**		1	1 unit	1CL
	160		**3KA5340-1AE01**		1	1 unit	1CL
	250		**3KA5540-1AE01**		1	1 unit	1CL
	400		**3KA5740-1AE01**		1	1 unit	1CL
	630		**3KA5840-1AE01**		1	1 unit	1CL
8UC7 EMERGENCY-STOP door-coupling rotary operating mechanism (red handle, yellow indicator plate) for basic switch versions without handle							
 8UC7121-3BB10	**3-pole for motor loads and for power distribution**						
	63		**8UC7121-3BB10**		1	1 unit	1CL
	80		**8UC7121-3BB10**		1	1 unit	1CL
	125		**8UC7222-3BB20**		1	1 unit	1CL
	160		**8UC7222-3BB20**		1	1 unit	1CL
	250		**8UC7323-3BB30**		1	1 unit	1CL
	400		**8UC7323-3BB30**		1	1 unit	1CL
	630		**8UC7323-3BB30**		1	1 unit	1CL
	4-pole[1] for power distribution						
	63		**8UC7222-3BB20**		1	1 unit	1CL
	80		**8UC7222-3BB20**		1	1 unit	1CL
	125		**8UC7222-3BB20**		1	1 unit	1CL
	160		**8UC7222-3BB20**		1	1 unit	1CL
	250		**8UC7323-3BB30**		1	1 unit	1CL
	400		**8UC7323-3BB30**		1	1 unit	1CL
	630		**8UC7323-3BB30**		1	1 unit	1CL

[1] Rated values reduced in the event of strong harmonics caused by frequency converter operation.

8UC7 EMERGENCY-STOP door-coupling rotary operating mechanisms (red handle, yellow indicator plate), see page 7/95

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Rated uninterrupted current I_u	SD	**3-pole, assembly kits for mounting in control cabinet side panels** **Assembly kits (front IP40)** Comprising: Lockable handle and three terminal covers for the infeed side	PU (UNIT, SET, M)	PS	PG
	A	d	Article No. www.siemens.com/product?Article No. — Price per PU			
Black handle						
 3KA5330-1AE01 with 3KX3536-2AA	63		**3KX3516-2AA**	1	1 unit	1CL
	80		**3KX3516-2AA**	1	1 unit	1CL
	125		**3KX3536-2AA**	1	1 unit	1CL
	160		**3KX3536-2AA**	1	1 unit	1CL
	250		**3KX3556-2AA**	1	1 unit	1CL
	400		**3KX3556-2AA**	1	1 unit	1CL
	630		**3KX3556-2AA**	1	1 unit	1CL
EMERGENCY-STOP red handle						
	63		**3KX3516-2BA**	1	1 unit	1CL
	80		**3KX3516-2BA**	1	1 unit	1CL
	125		**3KX3536-2BA**	1	1 unit	1CL
	160		**3KX3536-2BA**	1	1 unit	1CL
	250		**3KX3556-2BA**	1	1 unit	1CL
	400		**3KX3556-2BA**	1	1 unit	1CL
	630		**3KX3556-2BA**	1	1 unit	1CL

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Floor mounting

All switch disconnectors with degree of protection IP00
With high speed closing and opening
The conductor connecting screws are generally included in the scope of supply.

Rated uninterrupted current I_u A	SD d	3-pole, operating mechanism and actuation from the front Direct operating mechanisms Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Complete versions with black handle						
250		**3KE4230-0BA**		1	1 unit	1CL
400		**3KE4330-0BA**		1	1 unit	1CL
630		**3KE4430-0BA**		1	1 unit	1CL
1000		**3KE4530-0BA**		1	1 unit	1CL
Basic switch versions without handle						
250		**3KE4230-0AA**		1	1 unit	1CL
400		**3KE4330-0AA**		1	1 unit	1CL
630		**3KE4430-0AA**		1	1 unit	1CL
1000		**3KE4530-0AA**		1	1 unit	1CL
EMERGENCY-STOP red handles + coupling sockets for basic switch versions without handle						
250		**8UC9371**		1	1 unit	1CL
		+				
		3KX2210-0H		1	1 unit	1CL
400		**8UC9371**		1	1 unit	1CL
		+				
		3KX2210-0H		1	1 unit	1CL
630		**8UC9375**		1	1 unit	1CL
		+				
		3KX2210-0H		1	1 unit	1CL
1000		**8UC9375**		1	1 unit	1CL
		+				
		3KX2210-0H		1	1 unit	1CL


3KE4330-0BA

Rated uninterrupted current I_u A	SD d	3-pole, operating mechanism and actuation from the front Door-coupling rotary operating mechanisms (lockable) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Complete versions with 8UC7 door-coupling rotary operating mechanism (black handle)						
250		**3KE4230-0GA**		1	1 unit	1CL
400		**3KE4330-0GA**		1	1 unit	1CL
630		**3KE4430-0GA**		1	1 unit	1CL
1000		**3KE4530-0GA**		1	1 unit	1CL
Basic switch versions without handle						
250		**3KE4230-0AA**		1	1 unit	1CL
400		**3KE4330-0AA**		1	1 unit	1CL
630		**3KE4430-0AA**		1	1 unit	1CL
1000		**3KE4530-0AA**		1	1 unit	1CL
8UC7 EMERGENCY-STOP door-coupling rotary operating mechanisms (red handle, yellow indicator plate) for basic switch versions without handle						
250, 400, 630, 1000		**8UC7324-3BB44**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Rated uninterrupted current I_u	SD	3-pole, rear operating mechanisms and actuation	PU (UNIT, SET, M)	PS	PG
A	d	Article No. www.siemens.com/product?Article No. Price per PU			
Basic switch versions without handle					
Direct operating mechanisms					
250		**3KE4230-0CA**	1	1 unit	1CL
400		**3KE4330-0CA**	1	1 unit	1CL
630		**3KE4430-0CA**	1	1 unit	1CL
1000		**3KE4530-0CA**	1	1 unit	1CL
Direct operating mechanisms (lockable)					
250		**3KE4230-0CA**	1	1 unit	1CL
400		**3KE4330-0CA**	1	1 unit	1CL
630		**3KE4430-0CA**	1	1 unit	1CL
1000		**3KE4530-0CA**	1	1 unit	1CL
Handles (black) + masking plates + display plates (silver) for basic switch versions without handle					
Direct operating mechanisms					
250		**8UC9370**	1	1 unit	1CL
		+			
		8UB9530	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL
400		**8UC9370**	1	1 unit	1CL
		+			
		8UB9530	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL
630		**8UC9374**	1	1 unit	1CL
		+			
		8UB9530	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL
1000		**8UC9374**	1	1 unit	1CL
		+			
		8UB9530	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL
Direct operating mechanisms (lockable)					
250		**8UC9370**	1	1 unit	1CL
		+			
		8UC9563	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL
400		**8UC9370**	1	1 unit	1CL
		+			
		8UC9563	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL
630		**8UC9374**	1	1 unit	1CL
		+			
		8UC9563	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL
1000		**8UC9374**	1	1 unit	1CL
		+			
		8UC9563	1	1 unit	1CL
		+			
		8UC9631-0B	1	1 unit	1CL

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Floor mounting

Rated uninterrupted current I_u A	SD d	3-pole, rear operating mechanisms and actuation Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
EMERGENCY-STOP red handles + masking plates + display plates (yellow) for basic switch versions without handle						
Direct operating mechanisms						
250		**8UC9371** + **8UB9530** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL
400		**8UC9371** + **8UB9530** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL
630		**8UC9375** + **8UB9530** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL
1000		**8UC9375** + **8UB9530** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL
Direct operating mechanisms (lockable)						
250		**8UC9371** + **8UC9563** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL
400		**8UC9371** + **8UC9563** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL
630		**8UC9375** + **8UC9563** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL
1000		**8UC9375** + **8UC9563** + **8UC9633-0B**		1 1 1	1 unit 1 unit 1 unit	1CL 1CL 1CL

Rated uninterrupted current I_u A	SD d	3-pole, rear rotary operating mechanisms (lockable) Door-coupling rotary operating mechanisms (lockable) Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Basic switch versions without handle						
250		**3KE4230-0CA**		1	1 unit	1CL
400		**3KE4330-0CA**		1	1 unit	1CL
630		**3KE4430-0CA**		1	1 unit	1CL
1000		**3KE4530-0CA**		1	1 unit	1CL
8UC7 door-coupling rotary operating mechanisms (black handle) for basic switch versions without handle						
250, 400, 630, 1000		**8UC7314-1BB44**		1	1 unit	1CL
8UC7 EMERGENCY-STOP door-coupling rotary operating mechanisms (red handle, yellow indicator plate) for basic switch versions without handle						
250, 400, 630, 1000		**8UC7324-3BB44**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
3KA50 30/3KA51 30							
 3KX3552-3DA01	**Terminal covers**						
	For 3-pole devices (1 set = 6 units)	▶	**3KX3552-3DA01**		1	1 unit	1CL
	For 4-pole devices (1 set = 8 units)		**3KX3552-3DB01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65						
	Black handle, shaft 300 mm		**8UC7111-1BB10**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7121-3BB10**		1	1 unit	1CL
 3KX3516-1AA	**Operating mechanisms for fixed mounting**	▶	**3KX3516-1AA**		1	1 unit	1CL
	Black handle, shaft 250 mm						
	Extension shaft 300 mm long		**8UC6031**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6081**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6021**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches**						
	1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
3KA50 40/3KA51 40/3KA52/3KA53							
 3KX3552-3DA01	**Terminal covers**						
	For 3-pole 3KA52 devices (1 set = 6 units)	▶	**3KX3552-3DA01**		1	1 unit	1CL
	For 3KA53	▶	**3KX3553-3DA01**		1	1 unit	1CL
	For 4-pole 3KA52 devices (1 set = 8 units)		**3KX3552-3DB01**		1	1 unit	1CL
	For 3KA53		**3KX3553-3DB01**		1	1 unit	1CL
 8UC7412-1BB20	**Door-coupling rotary operating mechanisms IP65**						
	Black handle, shaft 300 mm		**8UC7212-1BB20**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7222-3BB20**		1	1 unit	1CL
	Operating mechanisms for fixed mounting	▶	**3KX3536-1AA**		1	1 unit	1CL
	Black handle, shaft 250 mm						
	Extension shaft 300 mm long		**8UC6032**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6082**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6022**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches**						
	1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
	1 NO + 1 NC, 20 ms leading		**3KX3552-3EA01**		1	1 unit	1CL
3KA55/3KA57/3KA58							
	Terminal covers						
	For 3-pole devices (1 set = 6 units)	▶	**3KX3557-3DA01**		1	1 unit	1CL
	For 4-pole devices (1 set = 8 units)		**3KX3557-3DB01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65						
	Black handle, shaft 300 mm		**8UC7313-1BB30**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7323-3BB30**		1	1 unit	1CL
 3KX3176-1E	**Operating mechanisms for fixed mounting**	▶	**3KX3176-1E**		1	1 unit	1CL
	Black handle, shaft 250 mm						
	Extension shaft 300 mm long		**8UC6033**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6083**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6023**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches**						
	1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
	1 NO + 1 NC, 20 ms leading		**3KX3552-3EA01**		1	1 unit	1CL

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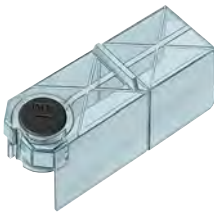
Accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
3KE42/3KE43							
	Changeover switches						
 3KX2210-0D	**Changeover switches with break-before-make feature** Switch I ON – Switch II OFF Switch I OFF – Switch II OFF Switch I OFF – Switch II ON		**3KX2210-0D**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Black handle for changeover switch with break-before-make feature, shaft 300 mm		**8UC7414-1BF44**		1	1 unit	1CL
	Direct operating mechanisms Handle (black) for fixed mounting		**8UC9381**		1	1 unit	1CL
	Changeover switches without break-before-make feature Switch I ON – Switch II OFF Switch I ON – Switch II ON Switch I OFF – Switch II ON		**3KX2210-0E**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Black handle for changeover switch without break-before-make feature, shaft 300 mm		**8UC7414-1FG44**		1	1 unit	1CL
	Direct operating mechanisms Handle (black) for fixed mounting		**8UC9381**		1	1 unit	1CL
	Parallel switches Switch I ON – Switch II ON Switch I OFF – Switch II OFF		**3KX2250-1A**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Handle (black), shaft 300 mm		**8UC7414-1BB44**		1	1 unit	1CL
	EMERGENCY-STOP door-coupling rotary operating mechanisms IP65 Handle (red), shaft 300 mm		**8UC7424-3BB44**		1	1 unit	1CL
	Direct operating mechanisms Handle (black) for fixed mounting		**8UC9381**		1	1 unit	1CL
	Further accessories						
 3KX3557-3DA01	**Terminal covers** (1 set = 6 units)	▶	**3KX3557-3DA01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Black handle, shaft 300 mm EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7314-1BB44** **8UC7324-3BB44**		1 1	1 unit 1 unit	1CL 1CL
	Extension shaft 300 mm long		**8UC6034**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6084**		1	1 unit	1CL
 3KX2231-1A	**Auxiliary switches with switching cam** 1 NO + 1 NC (complete mounting kit)		**3KX2231-1A**		1	1 unit	1CL
	Grounding brackets		**3KX2252-1A**		1	1 unit	1CL
	Arc chutes (spare part with 3 arc-splitter assemblies)		**3KY2202-0B**		1	1 unit	1CL
 3KY2204-0A	**Arcing contacts** (spare part with 3 fixed and 3 movable contacts)		**3KY2204-0A**		1	1 unit	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
3KE44/3KE45							
 3KX2210-0D	***Changeover switches***						
	Changeover switches with break-before-make feature Switch I ON – Switch II OFF Switch I OFF – Switch II OFF Switch I OFF – Switch II ON		**3KX2210-0D**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Black handle for changeover switch with break-before-make feature, shaft 300 mm		**8UC7414-1BF44**		1	1 unit	1CL
	Direct operating mechanisms Handle (black) for fixed mounting		**8UC9381**		1	1 unit	1CL
	Changeover switches without break-before-make feature Switch I ON – Switch II OFF Switch I ON – Switch II ON Switch I OFF – Switch II ON		**3KX2210-0E**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Black handle for changeover switch without break-before-make feature, shaft 300 mm		**8UC7414-1FG44**		1	1 unit	1CL
	Direct operating mechanisms Handle (black) for fixed mounting		**8UC9381**		1	1 unit	1CL
	Parallel switches Switch I ON – Switch II ON Switch I OFF – Switch II OFF		**3KX2250-1A**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Handle (black), shaft 300 mm		**8UC7414-1BB44**		1	1 unit	1CL
	EMERGENCY-STOP door-coupling rotary operating mechanisms IP65 Handle (red), shaft 300 mm		**8UC7424-3BB44**		1	1 unit	1CL
	Direct operating mechanisms Handle (black) for fixed mounting		**8UC9381**		1	1 unit	1CL
	Further accessories						
	Terminal covers (top and bottom)		**3KX2252-0C**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Black handle, shaft 300 mm EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7314-1BB44** **8UC7324-3BB44**		1 1	1 unit 1 unit	1CL 1CL
	Extension shaft 300 mm long		**8UC6034**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6084**		1	1 unit	1CL
 3KX2231-1A	**Auxiliary switches** 1 NO + 1 NC (complete mounting kit)		**3KX2231-1A**		1	1 unit	1CL
	Grounding brackets		**3KX2252-1A**		1	1 unit	1CL
 3KY2232-0A	**Arc chutes** (spare part with 3 arc-splitter assemblies)		**3KY2232-0A**		1	1 unit	1CL
	Arcing contacts Spare part with 3 fixed and 3 movable contacts		**3KY2234-0A**		1	1 unit	1CL

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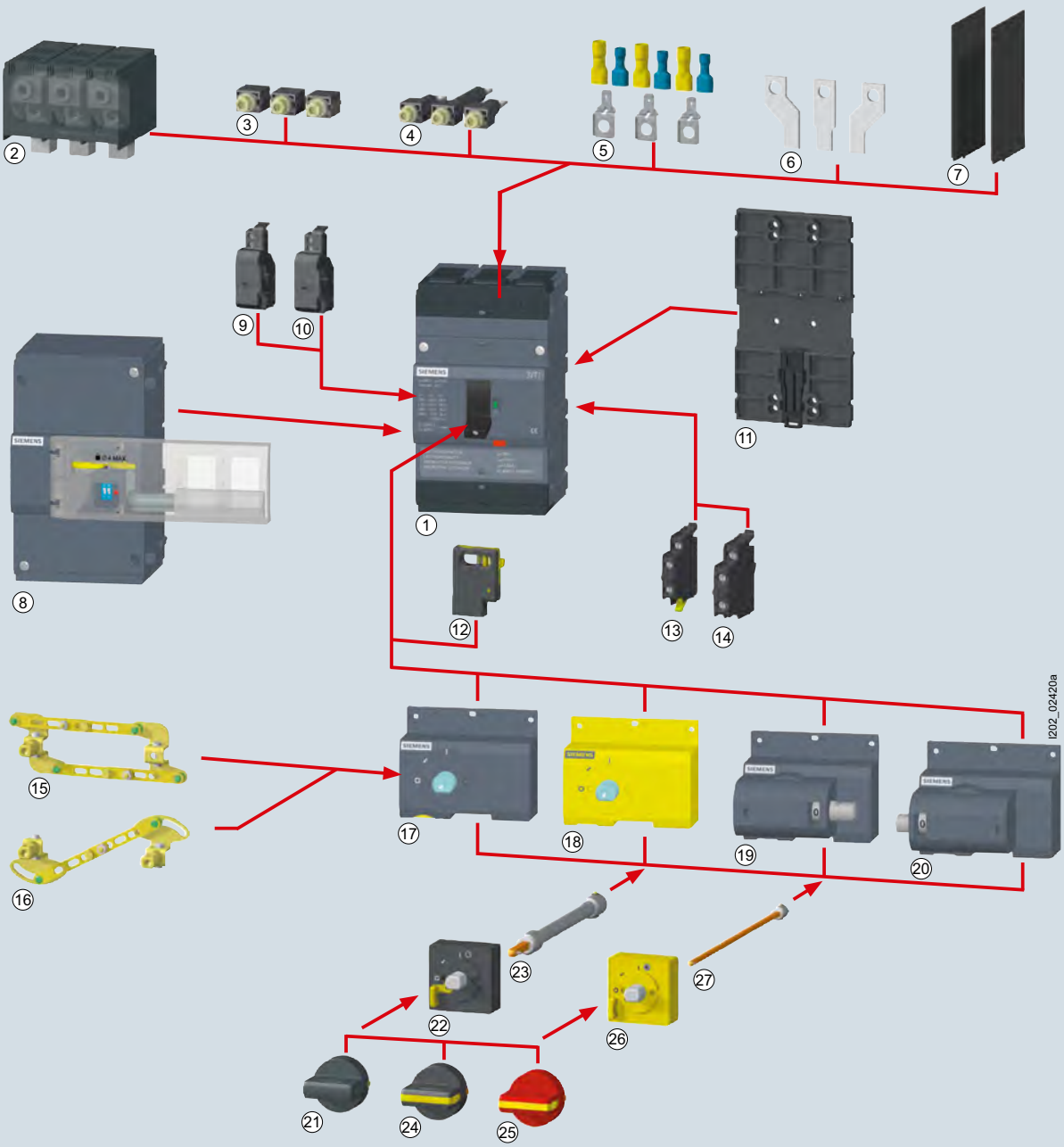
Overview



1 Switch disconnector
2 Circular conductor terminal
3 Front connection
4 Rear connection
5 Auxiliary conductor terminal
6 Front connecting bus with increased pole spacing
7 Insulating barriers
8 Lateral rotary operating mechanism
9 Shunt release
10 Undervoltage release
11 Adapter to install on 35 mm DIN rail
12 Locking device type lever
13 Signal switch
14 Auxiliary switch
15 Mechanical parallel switching
16 Mechanical interlocking
17 Front rotary operating mechanism
18 Front rotary operating mechanism
19 Lateral rotary operating mechanism (right)
20 Lateral rotary operating mechanism (left)
21 Non lockable knob
22 Coupling driver
23 Telescopic extension shaft
24 Lockable knob
25 Lockable knob
26 Coupling driver
27 Extension shaft

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Application

3VT switch disconnectors can be used as main control switches for sub-distribution boards, repair and transfer switches for cables, busbars or unit combinations.

As three and four-pole versions, they ensure making and breaking of the specified rated current under load. At the same time, they constitute a safety isolating function and isolating distance in all low-voltage circuits.

The position of the locking device type lever always matches that of the contacts (positive operation).

All 3VT switch disconnectors meet the requirements of IEC 60947-1 and IEC 60947-3.

Technical specifications

Type		3VT1	3VT2	3VT3	3VT4	3VT5
Standards		**IEC 60947-1, IEC 60947-3**				
						
Rated uninterrupted current I_u	A	160	250	630	1000	1600
Number of poles		3 and 4	3 and 4	3 and 4	3	3
Rated insulation voltage U_i	V	690				
Utilization category						
• 690 V AC		AC-23A	AC-23B			
• 440 V DC		DC-22A	DC-23B			
Rated operational voltage U_e						
• 50/60 Hz AC	V	690				
• DC		440 (3 conducting paths series-connected)				
Rated short-time withstand current I_{cw}	kA_{rms}	2/1 s	3/5 s	7.5/5 s	15/1 s	20/1 s
Rated impulse withstand voltage U_{imp}	kV	8				
Rated short-circuit making capacity I_{cm}						
• At 415 V AC	kA	2.8	4	14	30	40
• At 440 V DC	kA	2.8	4	14	30	40
Service life						
• Mechanical	Operating cycles	20000	30000	20000	10000	10000
• Electrical at 415 V AC	Operating cycles	6000	3000	5000	4000	4000
Switching frequency	Operating cycles/h	120	120	120	120	120
Power loss per pole	W	15	18	75	100	120

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VT1 switch disconnectors up to 160 A

Selection and ordering data

	Version	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	d					
3VT1 switch disconnectors								
	3-pole	160		**3VT1716-2DE36-0AA0**		1	1 unit	1CC
	4-pole	160		**3VT1716-2EE46-0AA0**		1	1 unit	1CC

Accessories

Auxiliary switches and auxiliary releases

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Auxiliary switches								
	**Changeover contact (1 CO)**							
	• 60 ... 250 AC/DC	50/60		**3VT9100-2AB10**		1	1 unit	1CC
	• 5 ... 60 AC/DC	50/60		**3VT9100-2AB20**		1	1 unit	1CC
Alarm switches								
	**Changeover contact (1 CO)**							
	• 60 ... 250 AC/DC	50/60		**3VT9100-2AH10**		1	1 unit	1CC
	• 5 ... 60 AC/DC	50/60		**3VT9100-2AH20**		1	1 unit	1CC
Shunt releases								
	• 12 DC	--		**3VT9100-1SB00**		1	1 unit	1CC
	• 24, 48 AC/DC	50/60		**3VT9100-1SC00**		1	1 unit	1CC
	• 110, 230 AC 110, 220 DC	50/60		**3VT9100-1SD00**		1	1 unit	1CC
	• 230, 400 AC 220 DC	50/60		**3VT9100-1SE00**		1	1 unit	1CC
Undervoltage releases								
	• 24, 48 AC	50/60		**3VT9100-1UC00**		1	1 unit	1CC
	• 110, 230 AC	50/60		**3VT9100-1UD00**		1	1 unit	1CC
	• 230, 400 AC	50/60		**3VT9100-1UE00**		1	1 unit	1CC
	• 24, 48 DC	--		**3VT9100-1UU00**		1	1 unit	1CC
	• 110, 220 DC	--		**3VT9100-1UV00**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Manual operating mechanisms

	Version	Color	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Rotary operating mechanisms								
	Manual rotary operating mechanisms							
	• Not lockable	Gray		**3VT9100-3HA10**		1	1 unit	1CC
	• Lockable with padlock	Gray		**3VT9100-3HA20**		1	1 unit	1CC
	• Lockable with padlock	Yellow		**3VT9100-3HB20**		1	1 unit	1CC
	• For lateral operation, mounted on left side, not lockable	Gray		**3VT9100-3HC10**		1	1 unit	1CC
	• For lateral operation, mounted on right side, not lockable	Gray		**3VT9100-3HD10**		1	1 unit	1CC
	Handle for manual rotary operating mechanisms							
	• Not lockable	Black		**3VT9100-3HE10**		1	1 unit	1CC
	• Lockable with padlock	Black		**3VT9100-3HE20**		1	1 unit	1CC
	• Lockable with padlock	Red		**3VT9100-3HF20**		1	1 unit	1CC
	Masking plates for door-coupling rotary operating mechanism, defeatable							
	For use with black handle 3VT9100-3HE..							
	• Degree of protection IP40	Black		**3VT9100-3HG10**		1	1 unit	1CC
	• Degree of protection IP66	Black		**3VT9100-3HG20**		1	1 unit	1CC
	For use with red handle 3VT9100-3HF20							
	• Degree of protection IP40	Yellow		**3VT9100-3HH10**		1	1 unit	1CC
	• Degree of protection IP66	Yellow		**3VT9100-3HH20**		1	1 unit	1CC

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3VT1 switch disconnectors up to 160 A

	Version	Color	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Extension shafts							
	• Length 361 mm, can be shortened			**3VT9100-3HJ10**		1	1 unit	1CC
	• Length 215 ... 363 mm, extendable			**3VT9100-3HJ20**		1	1 unit	1CC
Mechanical interlocks								
	**Mechanical interlocks**			**3VT9100-8LA00**		1	1 unit	1CC
Mechanical link for paralleling								
	**Mechanical link for paralleling**			**3VT9100-8LB00**		1	1 unit	1CC

Motorized operating mechanisms

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Motorized operating mechanisms, lateral mounting								
	**With locking mechanism for 3 padlocks**							
	24 AC/DC	50/60		**3VT9100-3MA00**		1	1 unit	1CC
	48 AC/DC	50/60		**3VT9100-3MB00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9100-3MD00**		1	1 unit	1CC
	230 AC/220 DC	50/60		**3VT9100-3ME00**		1	1 unit	1CC
Accessories for motorized operating mechanisms								
	**Extension cables for motorized operating mechanism** 12 cables, length 60 cm			**3VT9100-3MF00**		1	1 unit	1CC

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Connection accessories

	Version	Conductor cross-sections	Connection type	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm^2		d					
Connection methods									
	3-pole								
	**Front connecting bars** For increased pole spacing (1 set = 3 units)	--	Al/Cu busbars, cable lugs		**3VT9100-4ED30**		1	1 unit	1CC
	**Front terminals** (1 set = 3 units)	--	Al/Cu busbars, cable lugs		**3VT9100-4TA30**		1	1 unit	1CC
	**Rear terminals** (1 set = 3 units)	--	Al/Cu busbars, cable lugs		**3VT9100-4RC30**		1	1 unit	1CC
 	**Multiple feed-in terminals** Terminal covers, degree of protection IP20 (included in scope of supply) (1 set = 3 units)	2 x 25 ... 120	Cu/Al cables		**3VT9100-4TF30**		1	1 unit	1CC
	**Auxiliary conductor terminals** (1 set = 3 units)	1.5 ... 2.5; 4 ... 6	Flexible Cu conductors		**3VT9100-4TN30**		1	1 unit	1CC
	4-pole								
	**Front terminals** For 4th pole (for use with 3VT9100-4TA30 connection method) (1 set = 1 unit)	--	Al/Cu busbars, cable lugs		**3VT9100-4TA00**		1	1 unit	1CC
	**Rear terminals** For 4th pole (for use with 3VT9100-4RC30 connection method) (1 set = 1 unit)	--	Al/Cu busbars, cable lugs		**3VT9100-4RC00**		1	1 unit	1CC
 	**Multiple feed-in terminals** Terminal covers, degree of protection IP20 (included in scope of supply) (1 set = 1 unit)	2 x 25 ... 120	Cu/Al cables		**3VT9100-4TF40**		1	1 unit	1CC
	**Auxiliary conductor terminals** For 4th pole (for use with 3VT9100-4TN30 connection method) (1 set = 1 unit)	1.5 ... 2.5; 4 ... 6	Flexible Cu conductors		**3VT9100-4TN00**		1	1 unit	1CC

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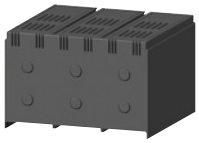
3VT1 switch disconnectors up to 160 A

Further accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Phase barriers, covers, locking devices							
	**Phase barriers** Included in scope of supply of switch disconnector. If infeed is from below, the switch disconnectors must also be fitted on the sides of terminals 2, 4 and 6 with these phase barriers.						
	• For 3-pole version, 2 units		**3VT9100-8CE30**		1	1 unit	1CC
	• For 4-pole version, 1 unit (for use with 3VT9100-8CE30)		**3VT9100-8CE00**		1	1 unit	1CC
	**Terminal covers, degree of protection IP20** Increases degree of protection of connection point to IP20, e.g. when used with cable lugs.						
	• 3-pole version		**3VT9100-8CA30**		1	1 unit	1CC
	• 4-pole version		**3VT9100-8CA40**		1	1 unit	1CC
	**Locking devices for toggle levers** • Allows the switch disconnector to be locked in the "manual off" position. • Locking is by means of a padlock with a diameter of 3 ... 4 mm.		**3VT9100-3HL00**		1	1 unit	1CC
Mounting adapters							
	3/4-pole version						
	**Mounting adapters for mounting on a 35 mm standard mounting rail**		**3VT9100-4PP30**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	d					
3VT2 switch disconnectors								
	3-pole	250		**3VT2725-2DE36-0AA0**		1	1 unit	1CC
	4-pole	250		**3VT2725-2EE46-0AA0**		1	1 unit	1CC

Accessories

Auxiliary switches and auxiliary releases

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Auxiliary switches and alarm switches								
	With NO contact (1 NO)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AC10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AC20**		1	1 unit	1CC
	With NC contact (1 NC)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AD10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AD20**		1	1 unit	1CC
	With double contact (2 NC)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AE10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AE20**		1	1 unit	1CC
	With double contact **(1 NO and 1 NC)**							
	60 ... 500 AC/DC	50/60		**3VT9300-2AF10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AF20**		1	1 unit	1CC
	With double contact **(2 NO)**							
	60 ... 500 AC/DC	50/60		**3VT9300-2AG10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AG20**		1	1 unit	1CC
	Changeover contact (1 CO)							
	60 ... 250 AC/DC	50/60		**3VT9300-2AH10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AH20**		1	1 unit	1CC
	Leading contacts Leading against the main contacts when switching off (70 ... 150 ms)							
	250 AC	50/60		**3VT9300-2AJ00**		1	1 unit	1CC

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3VT2 switch disconnectors up to 250 A

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Shunt releases								
	12 DC	--		**3VT9300-1SB00**		1	1 unit	1CC
	24, 40, 48 AC/DC	50/60		**3VT9300-1SC00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9300-1SD00**		1	1 unit	1CC
	230, 400, 500 AC/220 DC	50/60		**3VT9300-1SE00**		1	1 unit	1CC
Undervoltage releases								
	24, 40, 48 AC/DC	50/60		**3VT9300-1UC00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9300-1UD00**		1	1 unit	1CC
	230, 400, 500 AC/220 DC	50/60		**3VT9300-1UE00**		1	1 unit	1CC
	With leading contact • Leading against the main contacts when switching on (70 ... 150 ms) • Not suitable for 3VT9200-3M..0 motorized operating mechanism							
	24, 40, 48 AC/DC	50/60		**3VT9300-1UC10**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9300-1UD10**		1	1 unit	1CC
	230, 400, 500 AC/220 DC	50/60		**3VT9300-1UE10**		1	1 unit	1CC

Manual operating mechanisms

	Version	Color	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Rotary operating mechanisms								
	Manual rotary operating mechanisms							
	• Not lockable	Gray		**3VT9200-3HA10**		1	1 unit	1CC
	• Lockable with padlock	Gray		**3VT9200-3HA20**		1	1 unit	1CC
	• Lockable with padlock	Yellow label		**3VT9200-3HB20**		1	1 unit	1CC
	• For lateral operation, mounted on left side, not lockable	Gray		**3VT9200-3HC10**		1	1 unit	1CC
	• For lateral operation, mounted on right side, not lockable	Gray		**3VT9200-3HD10**		1	1 unit	1CC
	Handle for manual rotary operating mechanisms							
	• Not lockable	Black		**3VT9300-3HE10**		1	1 unit	1CC
	• Lockable with padlock	Black		**3VT9300-3HE20**		1	1 unit	1CC
	• Lockable with padlock	Red		**3VT9300-3HF20**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Color	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Masking plates for door-coupling rotary operating mechanism							
	For use with black handle 3VT9300-3HE..							
	• Degree of protection IP40	Black		**3VT9300-3HG10**		1	1 unit	1CC
	• Degree of protection IP66	Black		**3VT9300-3HG20**		1	1 unit	1CC
	For use with red handle 3VT9300-3HF20							
	• Degree of protection IP40	Yellow		**3VT9300-3HH10**		1	1 unit	1CC
	• Degree of protection IP66	Yellow		**3VT9300-3HH20**		1	1 unit	1CC
	Masking plates for door-coupling rotary operating mechanism, defeatable							
	For use with black handle 3VT9300-3HE..							
	• Degree of protection IP40	Black		**3VT9300-3HG30**		1	1 unit	1CC
	For use with red handle 3VT9300-3HF20							
	• Degree of protection IP40	Yellow		**3VT9300-3HH30**		1	1 unit	1CC
	Extension shafts							
	• Length 365 mm, can be shortened			**3VT9300-3HJ10**		1	1 unit	1CC
	• Length 252 ... 416 mm, extendable			**3VT9300-3HJ20**		1	1 unit	1CC

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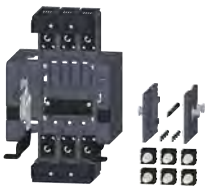
3VT2 switch disconnectors up to 250 A

Motorized operating mechanisms

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Motorized operating mechanisms with stored-energy mechanism								
	**With locking mechanism for 3 padlocks, degree of protection IP00**							
	24 AC/DC	50/60		**3VT9200-3MJ00**		1	1 unit	1CC
	48 AC/DC	50/60		**3VT9200-3ML00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9200-3MN00**		1	1 unit	1CC
	230 AC/220 DC	50/60		**3VT9200-3MQ00**		1	1 unit	1CC
	Motorized operating mechanism with operating cycle counter							
	24 AC/DC	50/60		**3VT9200-3MJ10**		1	1 unit	1CC
	48 AC/DC	50/60		**3VT9200-3ML10**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9200-3MN10**		1	1 unit	1CC
	230 AC/220 DC	50/60		**3VT9200-3MQ10**		1	1 unit	1CC
Accessories for motorized operating mechanisms								
	**Operating cycle counter with cable** Length 110 cm			**3VT9300-3MF10**		1	1 unit	1CC
	**Extension cables for motorized operating mechanism** 12 cables, length 60 cm			**3VT9300-3MF00**		1	1 unit	1CC

Mounting accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Plug-in base assembly kits							
	**3-pole**		**3VT9200-4PA30**		1	1 unit	1CC
	4-pole		**3VT9200-4PA40**		1	1 unit	1CC
Withdrawable unit kits							
	**3-pole**		**3VT9200-4WA30**		1	1 unit	1CC
	4-pole		**3VT9200-4WA40**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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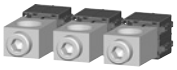
Connection accessories

	Version	Conductor cross-sections	Connection type	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm^2		d					
Connection methods									
	3-pole								
	Front connecting bars								
	For increased pole spacing, short (1 set = 3 units)	--	Al/Cu busbars, cable lugs, flexibars		**3VT9200-4ED30**		1	1 unit	1CC
	For increased pole spacing, long (1 set = 3 units)	--	Al/Cu busbars, cable lugs, flexibars		**3VT9200-4EE30**		1	1 unit	1CC
	Front terminals Included in scope of supply of all switch disconnectors (1 set = 3 units)	--	Al/Cu busbars, cable lugs, flexibars		**3VT9200-4TA30**		1	1 unit	1CC
	**Rear terminals** (1 set = 3 units)	--	Al/Cu busbars, cable lugs		**3VT9200-4RC30**		1	1 unit	1CC
	Multiple feed-in terminals[1]								
	For 1 cable	1 x 25 ... 150	Cu/Al cables		**3VT9215-4TD30**		1	1 unit	1CC
	(1 set = 3 units)	1 x 150 ... 240	Cu/Al cables		**3VT9224-4TD30**		1	1 unit	1CC
	For 2 cables	2 x 25 ... 150	Cu/Al cables		**3VT9215-4TF30**		1	1 unit	1CC
	(1 set = 3 units)	2 x 150 ... 240	Cu/Al cables		**3VT9224-4TF30**		1	1 unit	1CC
	For 6 cables (1 set = 3 units)	6 x 6 ... 35	Cu/Al cables		**3VT9203-4TF30**		1	1 unit	1CC
	**Auxiliary conductor terminals** (1 set = 3 units)	1.5 ... 2.5; 4 ... 6	Flexible Cu conductors		**3VT9200-4TN30**		1	1 unit	1CC
	**Box terminals** (1 set = 3 units)	16 ... 150	Cu cables, flexibars		**3VT9200-4TC30**		1	1 unit	1CC
	4-pole								
	Rear connections for the 4th pole								
	Use with 3VT9200-4RC30 connection method (1 set = 1 unit)	--	Al/Cu busbars/ cable lugs		**3VT9200-4RC00**		1	1 unit	1CC
	Multiple feed-in terminals for the 4th pole								
	Use with 3VT9215-4TD30 or 3VT9224-4TD30 connection method, for 1 cable	1 x 25 ... 150	Cu/Al cables		**3VT9215-4TD00**		1	1 unit	1CC
		1 x 150 ... 240	Cu/Al cables		**3VT9224-4TD00**		1	1 unit	1CC
	(1 set = 1 unit)								
	Use with 3VT9215-4TF30 or 3VT9224-4TF30 connection method, for 2 cables	2 x 25 ... 150	Cu/Al cables		**3VT9215-4TF00**		1	1 unit	1CC
		2 x 150 ... 240	Cu/Al cables		**3VT9224-4TF00**		1	1 unit	1CC
	(1 set = 1 unit)								
	Use with 3VT9203-4TF30 connection method, for 6 cables (1 set = 1 unit)	6 x 6 ... 35	Cu/Al cables		**3VT9203-4TF00**		1	1 unit	1CC
	Box terminals for the 4th pole								
	Use with 3VT9200-4TC30 connection method (1 set = 1 unit)	16 ... 150	Cu cables, flexibars		**3VT9200-4TC00**		1	1 unit	1CC

[1] Use terminal cover 3VT9200-8CB30 to increase termination point protection to IP20.

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3VT2 switch disconnectors up to 250 A

Further accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Phase barriers, covers, locking devices							
	**Phase barriers** Included in scope of supply of switch disconnector If infeed is from below, the switch disconnectors must also be fitted on the sides of terminals 2, 4 and 6 with these phase barriers. • For 3-pole version, 2 units • For 4-pole version, 1 unit for use with 3VT9300-8CE30		**3VT9300-8CE30** **3VT9300-8CE00**		1 1	1 unit 1 unit	1CC 1CC
	**Terminal covers, degree of protection IP20** Increases degree of protection of termination point to IP20, e.g. when used with circular conductor terminals, intended for fixed mounting, plug-in and withdrawable versions • 3-pole version • 4-pole version		**3VT9200-8CB30** **3VT9200-8CB40**		1 1	1 unit 1 unit	1CC 1CC
	**Locking devices for toggle levers** • Allows the switch disconnector to be locked in the "manual off" position. • Locking is by means of up to 3 padlocks with a diameter of 4 ... 6 mm.		**3VT9200-3HL00**		1	1 unit	1CC
	**Sealing devices** Sealing for: • Overcurrent releases • Accessory compartment covers • Terminal covers • Manual operating mechanisms • Motorized operating mechanisms		**3VT9200-8BN00**		1	2 units	1CC
	**Connecting cables** For connecting switch disconnector accessories for withdrawable versions (can also be used for plug-in and fixed-mounted versions)		**3VT9300-4PL00**		1	1 unit	1CC
	**Position signaling switches** For indicating the position of the switch disconnector in plug-in or withdrawable devices		**3VT9300-4WL00**		1	1 unit	1CC
	**Coding sets** Prevents use of the wrong switching unit in plug-in or withdrawable devices		**3VT9200-4WN00**		1	1 unit	1CC
	**Covers for pushbuttons** For motorized operating mechanisms; the cover may be equipped with a sealing device.		**3VT9300-3MF20**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	d					
3VT3 switch disconnectors								
	3-pole	630		**3VT3763-2DE36-0AA0**		1	1 unit	1CC
	4-pole	630		**3VT3763-2EE46-0AA0**		1	1 unit	1CC

Accessories

Auxiliary switches and auxiliary releases

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Auxiliary switches and alarm switches								
	With NO contact (1 NO)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AC10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AC20**		1	1 unit	1CC
	With NC contact (1 NC)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AD10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AD20**		1	1 unit	1CC
	With double contact (2 NC)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AE10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AE20**		1	1 unit	1CC
	With double contact (1 NO + 1 NC)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AF10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AF20**		1	1 unit	1CC
	With double contact (2 NO)							
	60 ... 500 AC/DC	50/60		**3VT9300-2AG10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AG20**		1	1 unit	1CC
	Changeover contact (1 CO)							
	60 ... 250 AC/DC	50/60		**3VT9300-2AH10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9300-2AH20**		1	1 unit	1CC
	Leading contacts Leading against the main contacts when switching off (70 ... 150 ms)							
	250 AC	50/60		**3VT9300-2AJ00**		1	1 unit	1CC

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3VT3 switch disconnectors up to 630 A

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Shunt releases								
	12 DC	--		**3VT9300-1SB00**		1	1 unit	1CC
	24, 40, 48 AC/DC	50/60		**3VT9300-1SC00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9300-1SD00**		1	1 unit	1CC
	230, 400, 500 AC/220 DC	50/60		**3VT9300-1SE00**		1	1 unit	1CC
Undervoltage releases								
	24, 40, 48 AC/DC	50/60		**3VT9300-1UC00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9300-1UD00**		1	1 unit	1CC
	230, 400, 500 AC/220 DC	50/60		**3VT9300-1UE00**		1	1 unit	1CC
	With leading contact • Leading against the main contacts when switching on (70 ... 150 ms) • Not suitable for 3VT9200-3M..0 motorized operating mechanism							
	24, 40, 48 AC/DC	50/60		**3VT9300-1UC10**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9300-1UD10**		1	1 unit	1CC
	230, 400, 500 AC/220 DC	50/60		**3VT9300-1UE10**		1	1 unit	1CC

Manual operating mechanisms

	Version	Color	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Rotary operating mechanisms								
	Manual rotary operating mechanisms							
	• Not lockable	Gray		**3VT9300-3HA10**		1	1 unit	1CC
	• Lockable with padlock	Gray		**3VT9300-3HA20**		1	1 unit	1CC
	• Lockable with padlock	Yellow label		**3VT9300-3HB20**		1	1 unit	1CC
	• For lateral operation, mounted on left side, not lockable	Gray		**3VT9300-3HC10**		1	1 unit	1CC
	• For lateral operation, mounted on right side, not lockable	Gray		**3VT9300-3HD10**		1	1 unit	1CC
	Handle for manual rotary operating mechanisms							
	• Not lockable	Black		**3VT9300-3HE10**		1	1 unit	1CC
	• Lockable with padlock	Black		**3VT9300-3HE20**		1	1 unit	1CC
	• Lockable with padlock	Red		**3VT9300-3HF20**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Color	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Masking plates for door-coupling rotary operating mechanism							
	For use with black handle 3VT9300-3HE...							
	• Degree of protection IP40	Black		**3VT9300-3HG10**		1	1 unit	1CC
	• Degree of protection IP66	Black		**3VT9300-3HG20**		1	1 unit	1CC
	For use with red handle 3VT9300-3HF20							
	• Degree of protection IP40	Yellow		**3VT9300-3HH10**		1	1 unit	1CC
	• Degree of protection IP66	Yellow		**3VT9300-3HH20**		1	1 unit	1CC
	Masking plates for door-coupling rotary operating mechanism, defeatable							
	For use with black handle 3VT9300-3HE..							
	• Degree of protection IP40	Black		**3VT9300-3HG30**		1	1 unit	1CC
	For use with red handle 3VT9300-3HF20							
	• Degree of protection IP40	Yellow		**3VT9300-3HH30**		1	1 unit	1CC
	Extension shafts							
	• Length 365 mm, can be shortened			**3VT9300-3HJ10**		1	1 unit	1CC
	• Length 252 ... 416 mm, extendable			**3VT9300-3HJ20**		1	1 unit	1CC

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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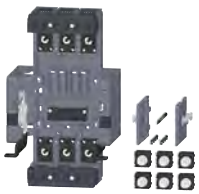
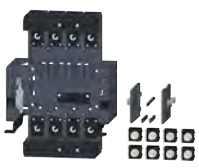
3VT3 switch disconnectors up to 630 A

Motorized operating mechanisms

	Rated operational voltage U_s	Frequency (with AC)	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Motorized operating mechanism with stored energy mechanism								
	**With locking mechanism for 3 padlocks, degree of protection IP00**							
	24 V AC/DC	50/60		**3VT9300-3MJ00**		1	1 unit	1CC
	48 V AC/DC	50/60		**3VT9300-3ML00**		1	1 unit	1CC
	110 V AC/DC	50/60		**3VT9300-3MN00**		1	1 unit	1CC
	230 V AC/220 V DC	50/60		**3VT9300-3MQ00**		1	1 unit	1CC
	Motorized operating mechanism with operating cycle counter							
	24 V AC/DC	50/60		**3VT9300-3MJ10**		1	1 unit	1CC
	48 V AC/DC	50/60		**3VT9300-3ML10**		1	1 unit	1CC
	110 V AC/DC	50/60		**3VT9300-3MN10**		1	1 unit	1CC
	230 V AC/220 V DC	50/60		**3VT9300-3MQ10**		1	1 unit	1CC
Accessories for motorized operating mechanisms								
	**Operating cycle counter with cable** Length 110 cm			**3VT9300-3MF10**		1	1 unit	1CC
	**Extension cables for motorized operating mechanism** 12 cables, length 60 cm			**3VT9300-3MF00**		1	1 unit	1CC

Mounting accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Plug-in base assembly kits							
	**3-pole**		**3VT9300-4PA30**		1	1 unit	1CC
	**4-pole**		**3VT9300-4PA40**		1	1 unit	1CC
Withdrawable unit kits							
	**3-pole**		**3VT9300-4WA30**		1	1 unit	1CC
	**4-pole**		**3VT9300-4WA40**		1	1 unit	1CC

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Connection accessories

	Version	Conductor cross-sections mm²	Connection type	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Connection methods									
	3-pole								
	Front connecting bars[1]								
	For increased pole spacing, short (1 set = 3 units)	--	Al/Cu busbars, cable lugs, flexibars		**3VT9300-4ED30**		1	1 unit	1CC
	For increased pole spacing, long (1 set = 3 units)	--	Al/Cu busbars, cable lugs, flexibars		**3VT9300-4EE30**		1	1 unit	1CC
	Front terminals Included in scope of supply of all switch disconnectors (1 set = 3 units)	--	Al/Cu busbars, cable lugs, flexibars		**3VT9300-4TA30**		1	1 unit	1CC
	**Rear terminals** (1 set = 3 units)	--	Al/Cu busbars, cable lugs		**3VT9300-4RC30**		1	1 unit	1CC
	Multiple feed-in terminals[2]								
	For 1 cable (1 set = 3 units)	1 x 25 ... 150	Cu/Al cables		**3VT9315-4TD30**		1	1 unit	1CC
		1 x 150 ... 240	Cu/Al cables		**3VT9324-4TD30**		1	1 unit	1CC
	For 2 cables [3] (1 set = 3 units)	2 x 25 ... 150	Cu/Al cables		**3VT9315-4TF30**		1	1 unit	1CC
		2 x 150 ... 240	Cu/Al cables		**3VT9324-4TF30**		1	1 unit	1CC
	For 6 cables (1 set = 3 units)	6 x 6 ... 35	Cu/Al cables		**3VT9303-4TF30**		1	1 unit	1CC
	**Auxiliary conductor terminals** (1 set = 3 units)	1.5 ... 2.5; 4 ... 6	Flexible Cu conductors		**3VT9300-4TN30**		1	1 unit	1CC
	**Box terminals** (1 set = 3 units)	35 ... 240	Cu cables, flexibars		**3VT9300-4TC30**		1	1 unit	1CC
	4-pole								
	Rear connections for the 4th pole								
	Use with 3VT9300-4RC30 connection method (1 set = 1 unit)	--	Al/Cu busbars, cable lugs		**3VT9300-4RC00**		1	1 unit	1CC
	Multiple feed-in terminals for the 4th pole								
	Use with 3VT9315-4TD30 or 3VT9324-4TD30 connection method, for 1 cable (1 set = 1 unit)	1 x 25 ... 150	Cu/Al cables		**3VT9315-4TD00**		1	1 unit	1CC
		1 x 150 ... 240	Cu/Al cables		**3VT9324-4TD00**		1	1 unit	1CC
	Use with 3VT9315-4TF30 or 3VT9324-4TF30 connection method, for 2 cables (1 set = 1 unit) [3]	2 x 25 ... 150	Cu/Al cables		**3VT9315-4TF00**		1	1 unit	1CC
		2 x 150 ... 240	Cu/Al cables		**3VT9324-4TF00**		1	1 unit	1CC
	Use with 3VT9303-4TF30 connection method, for 6 cables (1 set = 1 unit)	6 x 6 ... 35	Cu/Al cables		**3VT9303-4TF00**		1	1 unit	1CC
	Box terminals for the 4th pole								
	Use with 3VT9300-4TC30 connection method (1 set = 1 unit)	35 ... 240	Cu cables, flexibars		**3VT9300-4TC00**		1	1 unit	1CC

[1] For use in IT systems U_e = 690 V AC, the insulation film 3VT9300-8CJ00 must be used, see next page.

[2] Use terminal cover 3VT9300-8CB30 to increase terminal point protection to IP20, see next page.

[3] For use in IT systems $U_e \geq$ 500 V AC, the insulation film 3VT9300-8CJ00 must be used, see next page.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VT3 switch disconnectors up to 630 A

Further accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Phase barriers, covers, locking devices							
	**Phase barriers** Included in scope of supply of switch disconnector. If infeed is from below, the switch disconnectors must also be fitted on the sides of terminals 2, 4 and 6 with these phase barriers.						
	• For 3-pole version, 2 units		**3VT9300-8CE30**		1	1 unit	1CC
	• For 4-pole version, 1 unit for use with 3VT9300-8CE30		**3VT9300-8CE00**		1	1 unit	1CC
	**Terminal covers, degree of protection IP20** Increases degree of protection of termination point to IP20, e.g. when used with circular conductor terminals. Intended for fixed-mounted, plug-in and withdrawable versions.						
	• 3-pole version		**3VT9300-8CB30**		1	1 unit	1CC
	• 4-pole version		**3VT9300-8CB40**		1	1 unit	1CC
	**Locking devices for toggle levers** • Allows the switch disconnector to be locked in the "manual off" position. • Locking is by means of up to 3 padlocks with a diameter of 4 ... 6 mm.		**3VT9300-3HL00**		1	1 unit	1CC
	**Sealing devices** Sealing for: • Overcurrent releases • Accessory compartment covers • Terminal covers • Manual operating mechanisms • Motorized operating mechanisms		**3VT9300-8BN00**		1	2 units	1CC
	**Connecting cables** For connecting switch disconnector accessories for withdrawable versions (can also be used for plug-in and fixed-mounted versions)		**3VT9300-4PL00**		1	1 unit	1CC
	**Position signaling switches** For indicating the position of the switch disconnector in plug-in or withdrawable versions		**3VT9300-4WL00**		1	1 unit	1CC
	**Coding sets** Prevents use of the wrong switching unit in plug-in or withdrawable devices		**3VT9300-4WN00**		1	1 unit	1CC
	**Covers for pushbuttons** For motorized operating mechanisms; the cover may be equipped with a sealing device		**3VT9300-3MF20**		1	1 unit	1CC
	Insulation film NEW For use in IT systems for • Busbar connection (for U_e = 690 V AC) • Multiple feed-in terminals (for $U_e \geq$ 500 V AC): 3VT9315-4TF30, 3VT9315-4TF00 3VT9324-4TF30, 3VT9324-4TF00 For 0 mm clearance between the switch disconnector and the grounded control cabinet panel		**3VT9300-8CJ00**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	d					
3VT4 switch disconnectors								
	3-pole	1000		**3VT4710-2DE36-0AA0**		1	1 unit	1CC

For accessories, see "3VT5 switch disconnectors up to 1600 A", next page.

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3VT5 switch disconnectors up to 1600 A

Selection and ordering data

	Version	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	d					
3VT5 switch disconnectors								
	3-pole	1600		**3VT5716-2DE36-0AA0**		1	1 unit	1CC

Accessories

Auxiliary switches and auxiliary releases

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Auxiliary switches and alarm switches								
	2 x NC, 2 x NO							
	60 ... 500 AC / 60 ... 240 AC	50/60		**3VT9500-2AF10**		1	1 unit	1CC
	5 ... 60 AC/DC	50/60		**3VT9500-2AF20**		1	1 unit	1CC
Shunt releases								
	24 AC/DC	50/60		**3VT9500-1SF00**		1	1 unit	1CC
	48 AC/DC	50/60		**3VT9500-1SG00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9500-1SH00**		1	1 unit	1CC
	230 AC/220 DC	50/60		**3VT9500-1SJ00**		1	1 unit	1CC
	400 AC	50/60		**3VT9500-1SK00**		1	1 unit	1CC
	500 AC	50/60		**3VT9500-1SL00**		1	1 unit	1CC
Undervoltage releases								
	24 AC/DC	50/60		**3VT9500-1UF00**		1	1 unit	1CC
	48 AC/DC	50/60		**3VT9500-1UG00**		1	1 unit	1CC
	110 AC/DC	50/60		**3VT9500-1UH00**		1	1 unit	1CC
	230 AC/220 DC	50/60		**3VT9500-1UJ00**		1	1 unit	1CC
	400 AC	50/60		**3VT9500-1UK00**		1	1 unit	1CC
	500 AC	50/60		**3VT9500-1UL00**		1	1 unit	1CC

Minimum order quantity (PS) or a multiple thereof can be ordered.

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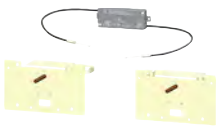
Manual operating mechanisms

	Version	Color	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Rotary operating mechanisms								
	**Manual rotary operating mechanisms**							
	• Lockable with padlock	Gray		**3VT9500-3HA10**		1	1 unit	1CC
	**Handle for manual rotary operating mechanisms**							
	• Lockable with padlock	Black		**3VT9500-3HE10**		1	1 unit	1CC
	• Lockable with padlock	Red		**3VT9500-3HF10**		1	1 unit	1CC
	**Masking plates for door-coupling rotary operating mechanism**							
	• Degree of protection IP44			**3VT9500-3HG10**		1	1 unit	1CC
	• Degree of protection IP66			**3VT9500-3HG20**		1	1 unit	1CC
	**Extension shafts**							
	• Length 315 mm, can be shortened			**3VT9500-3HJ10**		1	1 unit	1CC
Mechanical interlocks								
	**Mechanical interlocks**							
	• For manual operating mechanisms • For switch disconnectors, fixed-mounted versions • Both switch disconnectors must be equipped with at least one rotary operating mechanism and one handle			**3VT9500-8LA00**		1	1 unit	1CC
	**Mechanical interlocks** by means of Bowden wire							
	• For switch disconnectors, fixed-mounted versions			**3VT9500-8LC10**		1	1 unit	1CC

Motorized operating mechanisms

	Rated operational voltage U_s	Frequency	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V	Hz	d					
Motorized operating mechanisms								
	**Motorized operating mechanisms**							
	110 AC/DC	50/60		**3VT9500-3MN00**		1	1 unit	1CC
	230 AC/220 DC	50/60		**3VT9500-3MQ00**		1	1 unit	1CC
	Motorized operating mechanism with operating cycle counter							
	110 AC/DC	50/60		**3VT9500-3MN10**		1	1 unit	1CC
	230 AC/220 DC	50/60		**3VT9500-3MQ10**		1	1 unit	1CC

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3VT5 switch disconnectors up to 1600 A

Connection accessories

	Version	Max. permissible cross-section *S*	Cable type	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm²		d					
Connection methods									
	3-pole								
	**Box terminals, double** Two 3VT9524-4TG30 methods can be used to connect 4 x 70 ... 240 mm². 1 set = 3 units	2 x 70 ... 240	Cu/Al cables		**3VT9524-4TG30**		1	1 unit	1CC
	**Box terminals** It is possible to combine the connection methods 3VT9524-4TG30 and 3VT9524-4TF30 to connect 3 x 70 ... 240 mm² cables for each pole. 1 set = 3 units	70 ... 240 mm	Cu/Al cables		**3VT9524-4TF30**		1	1 unit	1CC
	Rear terminals								
	• Up to 1000 A (1 set = 3 units)	--	Busbars		**3VT9400-4RC30**		1	1 unit	1CC
	• Up to 1600 A (1 set = 3 units)	--	Busbars		**3VT9500-4RC30**		1	1 unit	1CC
	**Front terminals**[1] for withdrawable version (1 set = 3 units)	--	Busbars		**3VT9500-4EF30**		1	1 unit	1CC
	**Rear terminals** for withdrawable version (1 set = 3 units)	--	Busbars		**3VT9500-4RD30**		1	1 unit	1CC
	Multiple feed-in terminals [1) 2) 3)]								
	• For 2 cables (1 set = 3 units)	150 ... 300	Cu/Al cables		**3VT9532-4TF30**		1	1 unit	1CC
	• For 3 cables (1 set = 3 units)	150 ... 300	Cu/Al cables		**3VT9533-4TF30**		1	1 unit	1CC
	• For 4 cables (1 set = 3 units)	150 ... 300	Cu/Al cables		**3VT9534-4TF30**		1	1 unit	1CC

1) For use in IT systems U_e = 500 V AC, the insulation film 3VT9400-8CJ00 must be used, see next page.

2) Has auxiliary conductor terminals, 1.5 ... 6 mm².

3) It is necessary to use phase barriers or terminal covers (not included in the scope of supply).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Further accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Phase barriers, covers, locking devices							
 Left: 3VT9500-8CE30 Right: 3VT9500-8CF30	**Phase barriers** If infeed is from below, the switch disconnectors must also be fitted on the sides of terminals 2, 4 and 6 with these phase barriers. Not included in scope of supply of switch disconnector.						
	• For fixed-mounted versions		**3VT9500-8CE30**		1	1 unit	1CC
	• For withdrawable versions		**3VT9500-8CF30**		1	1 unit	1CC
	Insulation film NEW For insulation when used in IT systems for 3VT4: • Busbar connection (for U_e = 500 V AC) • Multiple feed-in terminals (for U_e = 500 V AC): 3VT9532-4TF30, 3VT9533-4TF30, 3VT9534-4TF30 For 0 mm clearance between the switch disconnector and the grounded control cabinet panel		**3VT9400-8CJ00**		1	1 unit	1CC
	**Terminal covers** Increases degree of protection of terminal point to IP20. To improve safety during maintenance of the switch disconnector, we recommend installation of a terminal cover on both sides of the withdrawable device. • For fixed-mounted versions with rear terminals		**3VT9500-8CD30**		1	1 unit	1CC
	• For withdrawable versions with front terminals		**3VT9500-8CC30**		1	1 unit	1CC
	• For fixed-mounted versions with rear terminals		**3VT9500-8CH30**		1	1 unit	1CC
	**Insulation seals** Designed for fixed-mounted and withdrawable versions of switch disconnectors with rear terminals. The insulation seals are used to insulate the connection methods for rear connection of the switchboard. Use of the insulation seals is recommended for all connection methods with rear terminals. • For rear terminals		**3VT9500-8CG30**		1	1 unit	1CC
	**Locking devices for toggle levers** • Allows the switch disconnector to be locked in the "manual off" position. • Locking is by means of up to 3 padlocks with a diameter of 4 ... 6 mm.		**3VT9500-3HL00**		1	1 unit	1CC
	**Sealing devices** Sealing for: • Overcurrent releases • Accessory compartment covers		**3VT9500-8BN00**		1	2 units	1CC
	**Fixing screws** • For withdrawable versions		**3VT9500-4SA40**		1	1 unit	1CC
	**Covers for pushbuttons** • For motorized operating mechanism • The cover may be equipped with a sealing device		**3VT9500-3MF20**		1	1 unit	1CC

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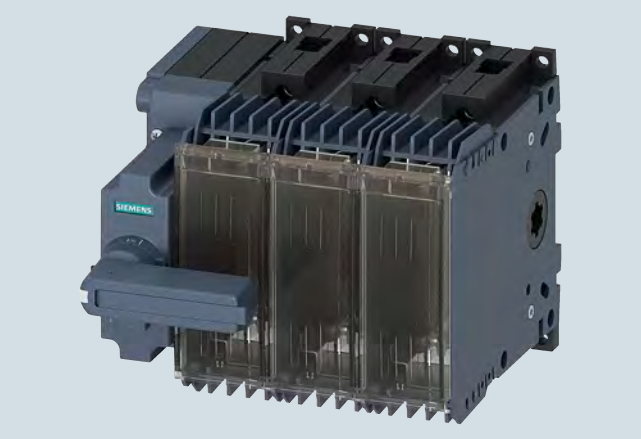
Overview



3KF switch disconnector with fuses, complete assembly, 3-pole

Features

- 3 and 4-pole versions in 5 different sizes
- Supplied as a complete assembly including direct operating mechanism or as a basic unit without a handle
- Direct operating mechanism with handle on switch disconnector with fuses
- Door-coupling rotary operating mechanism for operation of switch disconnector outside the control cabinet door
- Versions with side wall operating mechanism left and right
- Connections in the form of box terminals or flat terminals
- Floor mounting or mounting on a standard mounting rail (size 1)
- Additional poles can be retrofitted: 4th contact element, N or N/PE terminals
- Auxiliary switches for querying the switch positions
- Suitable for AC applications up to 690 V + 10% (wind power)
- Suitable for DC applications up to 440 V
- Suitable LV HRC fuse links up to 800 A
- Double contact break

Benefits

- Enhanced touch protection
- Locking function helps to prevent unauthorized operation
- Enhanced protection against inter-phase arcing
- Safe use in wind farms
- Compact design saves space
- Wide variety of applications thanks to a range of different operating mechanism designs
- Supplementary functions can be retrofitted
- Various service positions are possible thanks to optimized heat dissipation
- Test function to ensure safe commissioning
- Comprehensive support through provision of CAx data
- Protection against short-circuit and overload

Application

3KF switch disconnectors with fuses protect against overload and short-circuits as main control and EMERGENCY-STOP switches of switchboard assemblies, power distribution boards, power supply and motor outgoing feeders.

3KF switch disconnectors with fuses are designed to switch the specified rated current on and off under load. At the same time, they constitute a safety isolating function and isolating distance in all low-voltage circuits.

All 3KF switch disconnectors with fuses are climate-proof and meet the requirements of IEC 60947-1, IEC 60947-3 and VDE 0660-107.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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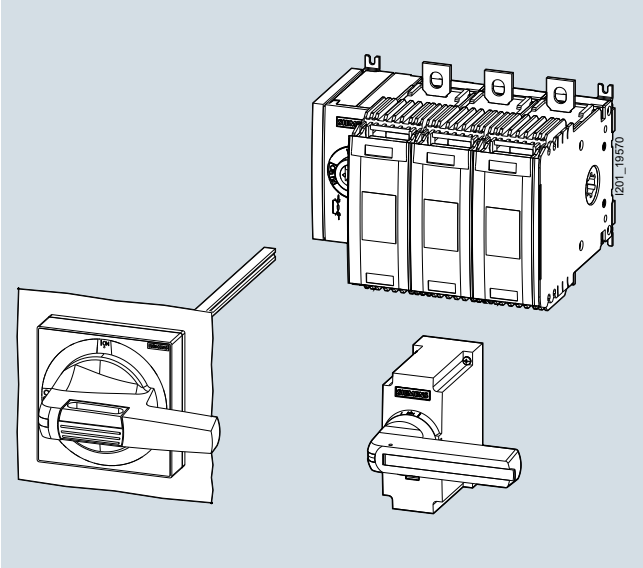
Design

A 3KF switch disconnector with fuses consists of an operating mechanism module, three or four switching poles and a handle to operate the switch disconnector.

Handles

The direct operating mechanism version of the handle is mounted directly on the switch disconnector. It can also be supplied in the form of a door-coupling rotary operating mechanism for actuation of the switch disconnector outside the control cabinet door. The handle is available in gray, or colored red/yellow for use as an EMERGENCY-STOP switch.

Commonly used switch disconnector variants comprising basic unit and handle are available as complete assemblies.

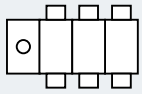
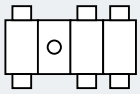
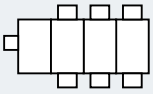
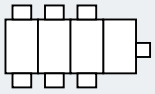
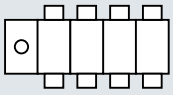
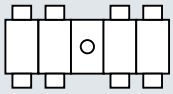
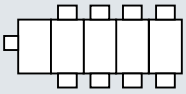
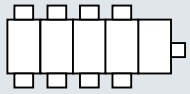


Handle either as direct operating mechanism or door-coupling rotary operating mechanism

Position of operating mechanism modules

To allow optimum utilization of the available installation space, units with front operating mechanisms can be supplied with the operating mechanism module in various positions – mounted on the left-hand side of the 3KF switch disconnector with fuses or in the center between the switching poles.

On units with side operating mechanisms, the operating mechanism module is positioned on the right or left-hand side of the 3KF switch disconnector with fuses.

Number of poles	Front operating mechanism on side	Front operating mechanism in center	Side operating mechanism, left	Side operating mechanism, right
3-pole				
4-pole				

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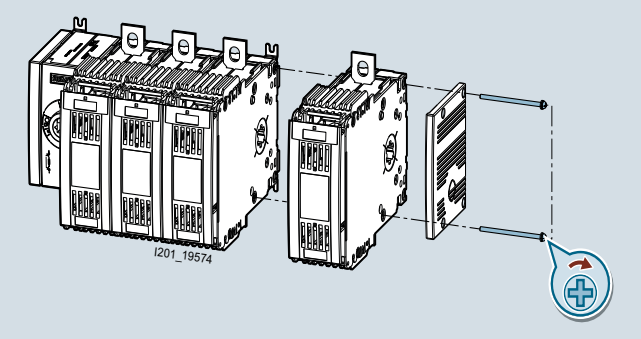
General data

Additional poles

All sizes of the 3KF switch disconnectors with fuses can be retrofitted with additional poles on a modular basis.

When installing additional poles, it is important to note that only a 3KF 3-pole switch disconnector with fuses may be retrofitted with an additional switching pole with contact system (4th contact element).

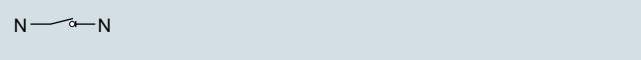
Additional poles (4th contact element, N or N/PE terminal) must always be mounted directly adjacent to the switch disconnector on the left or right, therefore, it is not permissible to install an auxiliary switch module between the basic unit and an additional pole for size 1.



Installation of an additional pole

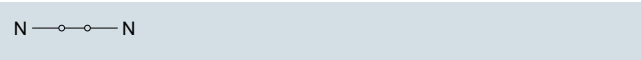
Available versions:

4th contact element:
The 4th contact element includes a contact system and is identical to the poles installed at the factory. It can be installed to upgrade a 3-pole switch disconnector to a disconnector with 4 poles.



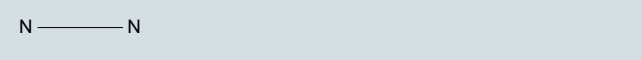
Fourth contact element as an additional pole

N terminal (neutral conductor terminal):
The N terminal does not include a contact system. A jumper can be removed in order to interrupt the electrical connection between the two terminals. An N terminal can be installed to add a non-switching N pole to a 3-pole disconnector.



N terminal as non-switching pole

N/PE terminal:
The N/PE terminal is identical to the neutral conductor terminal. However, the electrical connection between the two terminals is permanent and cannot be interrupted by removal of a jumper. The N/PE terminal is normally deployed for applications in which it is vital to ensure that this connection can never be interrupted.



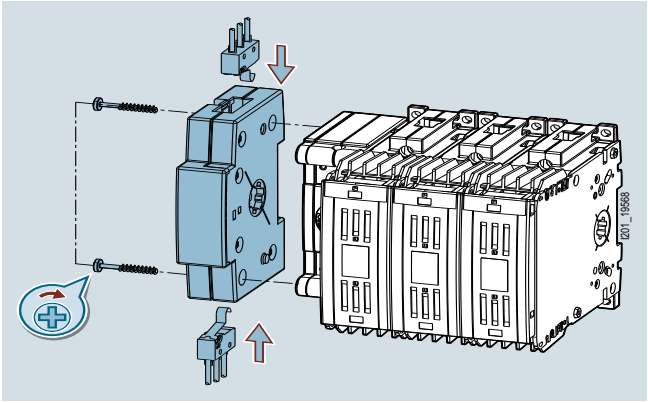
N/PE terminal with permanent connections

Auxiliary switches

Auxiliary switches allow remote interrogation of the contact position of the 3KF switch disconnector with fuses.

Installation of auxiliary switches for size 1

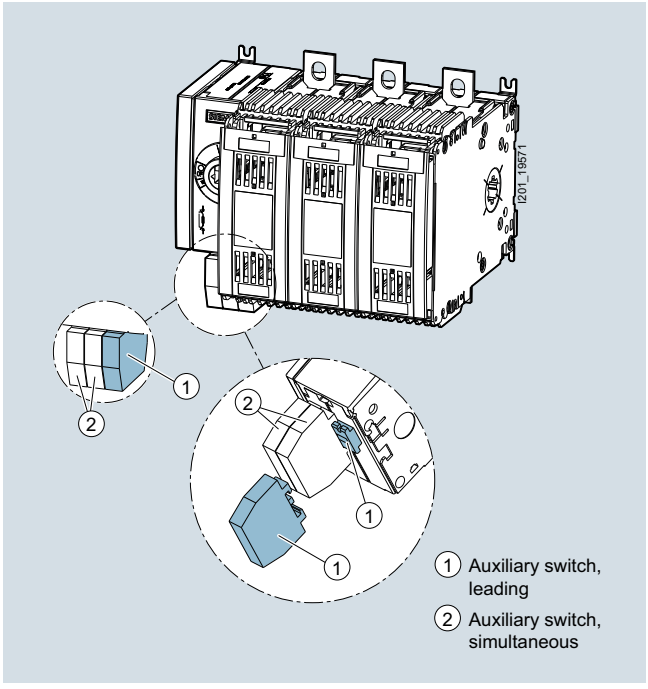
The auxiliary switches used for size 1 are microswitches (changeover contacts), which can be snapped into an auxiliary switch module. This auxiliary switch module is mounted on the side of the switch disconnector with fuses in the same way as an additional pole. A maximum of two microswitches can be installed in each auxiliary switch module.



Auxiliary switch with auxiliary switch module for size 1

Installation of auxiliary switches for sizes 2 to 5

With sizes 2 to 5, the auxiliary switches are directly attached to the operating mechanism module. The auxiliary switch with the leading switch function is always installed in the right-hand mounting location. The other locations are provided for simultaneously switching with the main contacts.



Auxiliary switches directly attached to the operating mechanism module with sizes 2 to 5. The leading auxiliary switch is highlighted in the drawing.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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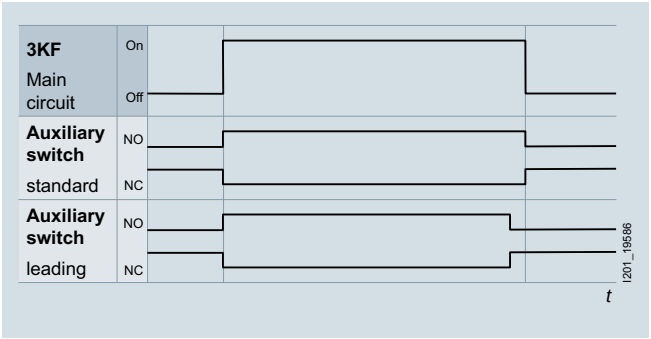
Switching instants of auxiliary switches

The auxiliary switches can operate either simultaneously with the main contacts or function as leading switches with all sizes.



One of the possible functions of leading auxiliary switches is to disconnect the circuit with the assistance of a higher-level switching device, such as a circuit breaker, before the main contacts of the 3KF switch disconnector with fuses open.

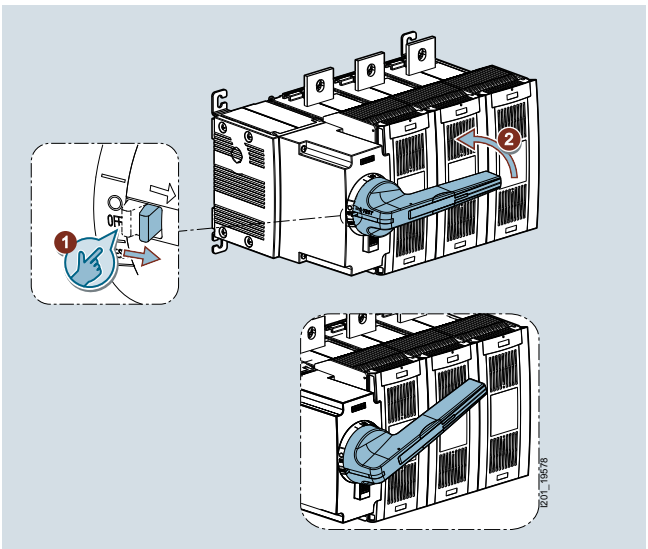
With size 1, the selection of the appropriate auxiliary switch module determines whether the switching instant will be leading or simultaneous.

With sizes 2 to 5, the switching instant is determined by the selection of the mounting location for the auxiliary switch on the operating mechanism module.

Test function for auxiliary switches

The test function allows a wiring check to be performed on the auxiliary switches without necessitating closure of the main contacts of the 3KF switch disconnector with fuses. The test function can be used as part of the commissioning process.

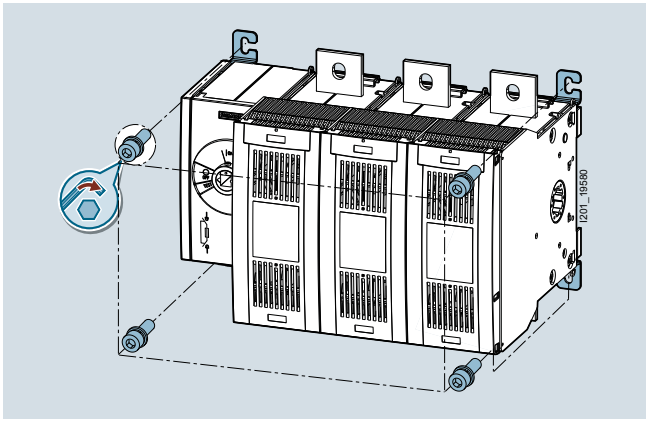
The test function is activated by turning the handle of a direct operating mechanism in the OFF position by 25° in the counter-clockwise direction. The handle must be turned 90° in the clock-wise direction in order to switch the main contacts.



The auxiliary switch module including test function must be used for size 1. With sizes 2 to 5, all installed auxiliary switches are switched when the test function is activated.

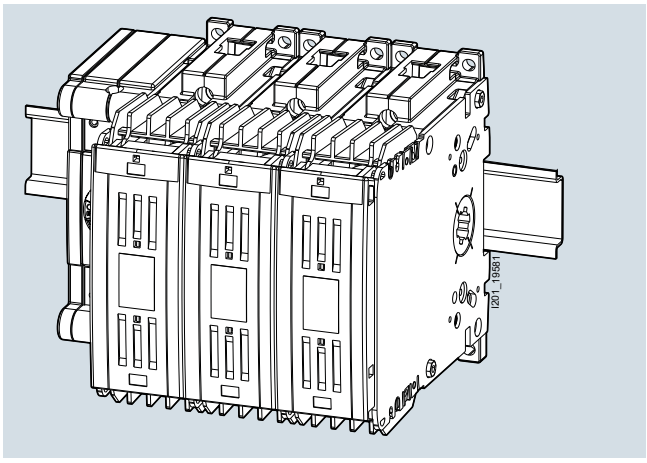
Types of mounting

All 3KF switch disconnectors with fuses are designed for floor mounting. To ensure that the switch can be flexibly adapted to the relevant installation conditions, the mounting bracket can be rotated through 90° with size 2 or larger.



Floor mounting method

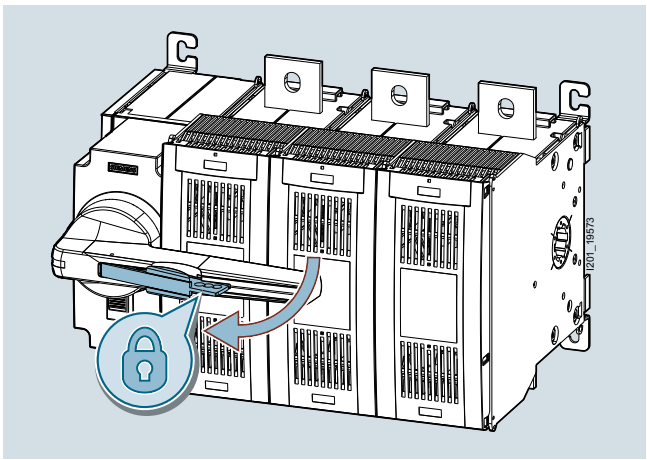
Sizes 1 and 2 can be snapped onto a standard mounting rail (TH35 according to EN 60715) as an alternative mounting method.



Mounting on a standard mounting rail

Locking functions

3KF switch disconnectors with fuses can be locked by up to three padlocks to prevent unauthorized switch operation.



Locking functions involving one or more padlocks

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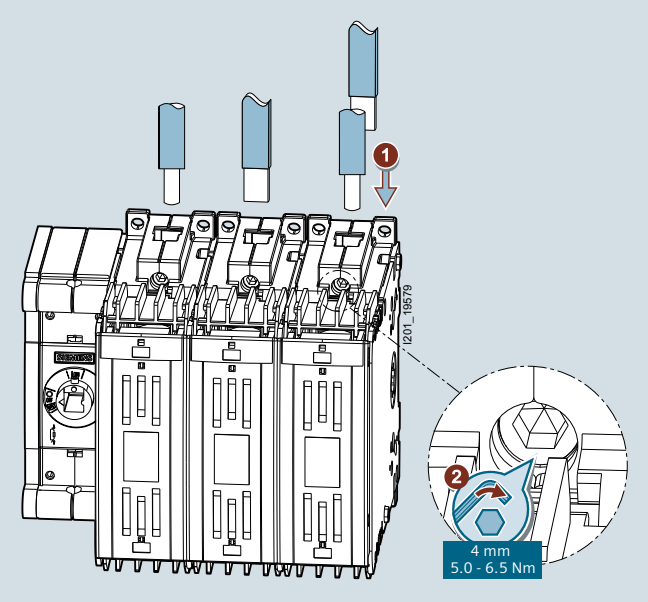
General data

Electrical connection

3KF switch disconnectors with fuses feature different connection options.

Box terminals

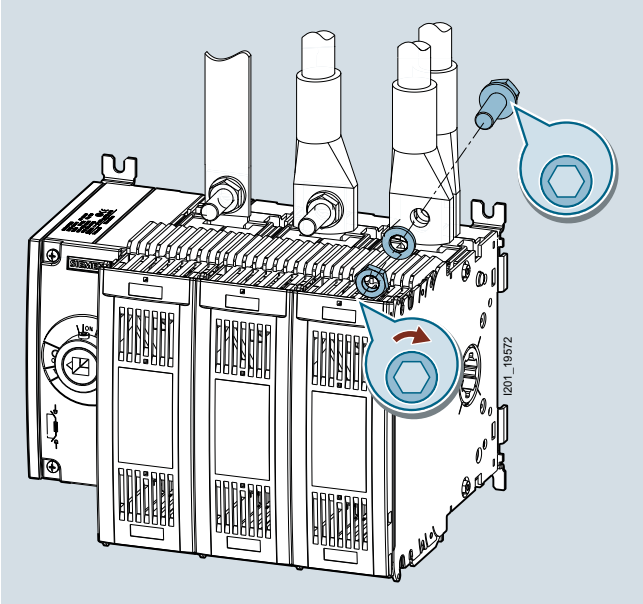
Box terminals for size 1 (rated currents 32 A to 80 A) are designed to allow the speedy connection of stripped conductors.



Connection via box terminals

Flat terminals

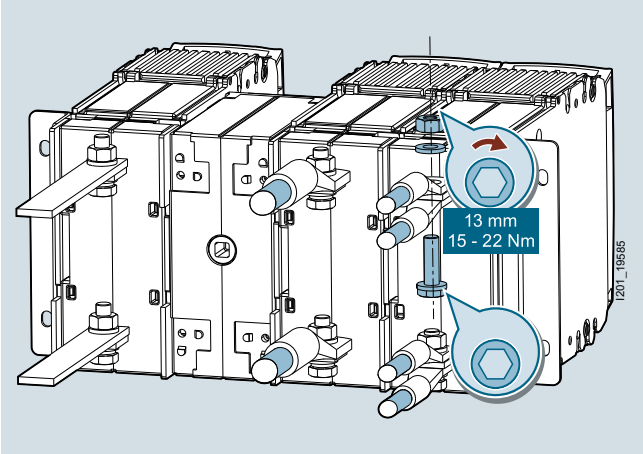
Sizes 2 to 5 (rated currents 125 to 800 A) are available with flat terminals for the connection of cable lugs or busbar systems.



Connection via flat terminals

Flat terminals at rear

Sizes 1 to 2 (rated currents up to 125 A) are available with rear flat terminals for the connection of cable lugs or busbar systems.



Connection via rear flat terminals

Minimum order quantity (PS) or a multiple thereof can be ordered.

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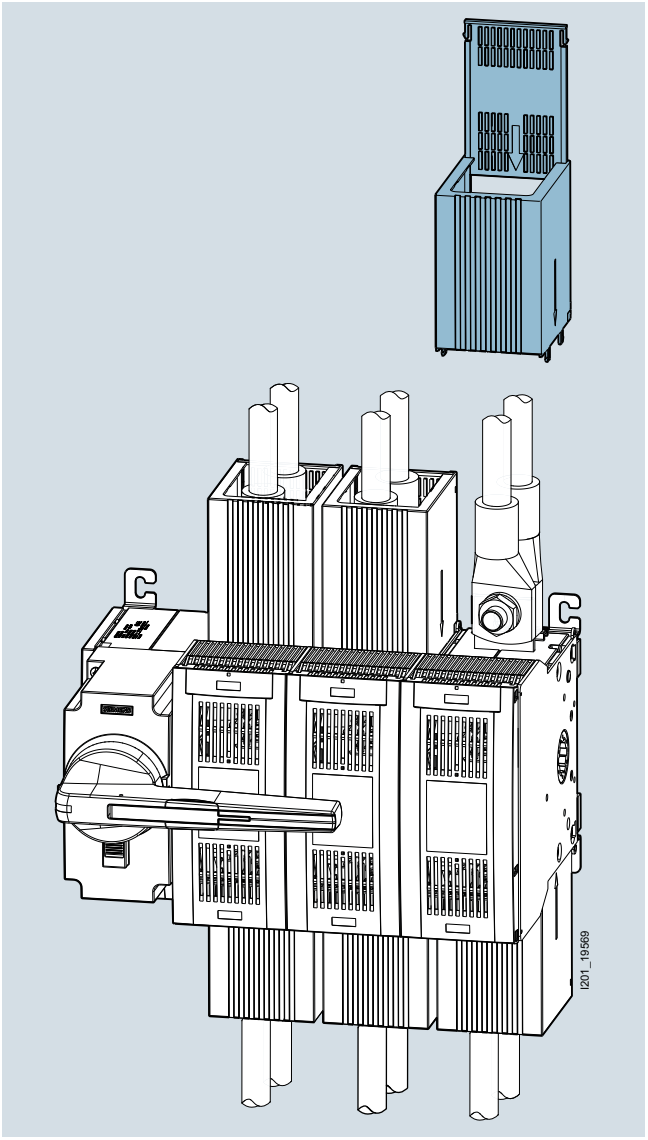
Terminal covers and phase barriers can be supplied for 3KF switch disconnectors with fuses with flat terminals.

Terminal covers

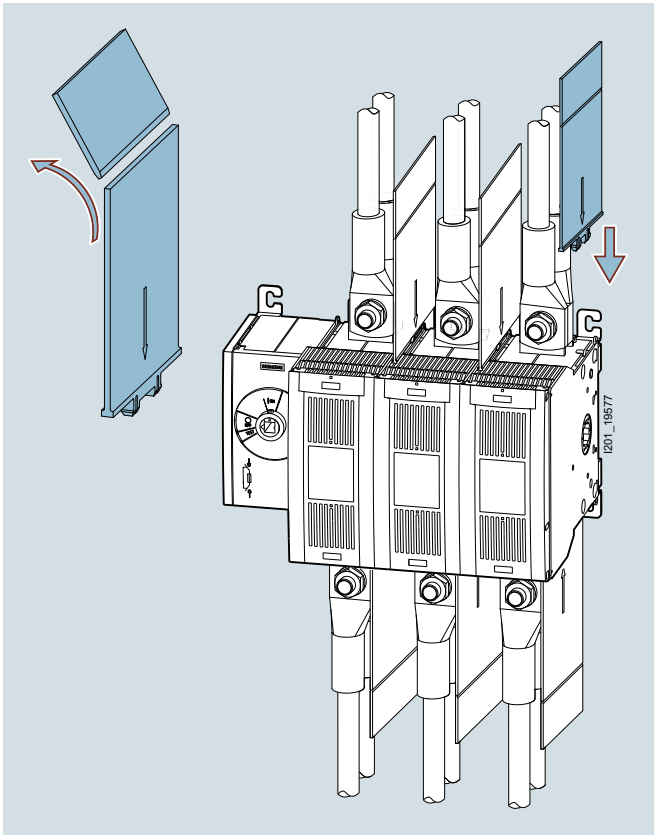
If the 3KF switch disconnector is erected outside a control cabinet, terminal covers can be installed to provide touch protection for all terminals.



Terminal covers

Phase barriers

When long, non-insulated cable lugs are used, phase barriers provide enhanced protection against arcing.



Phase barriers

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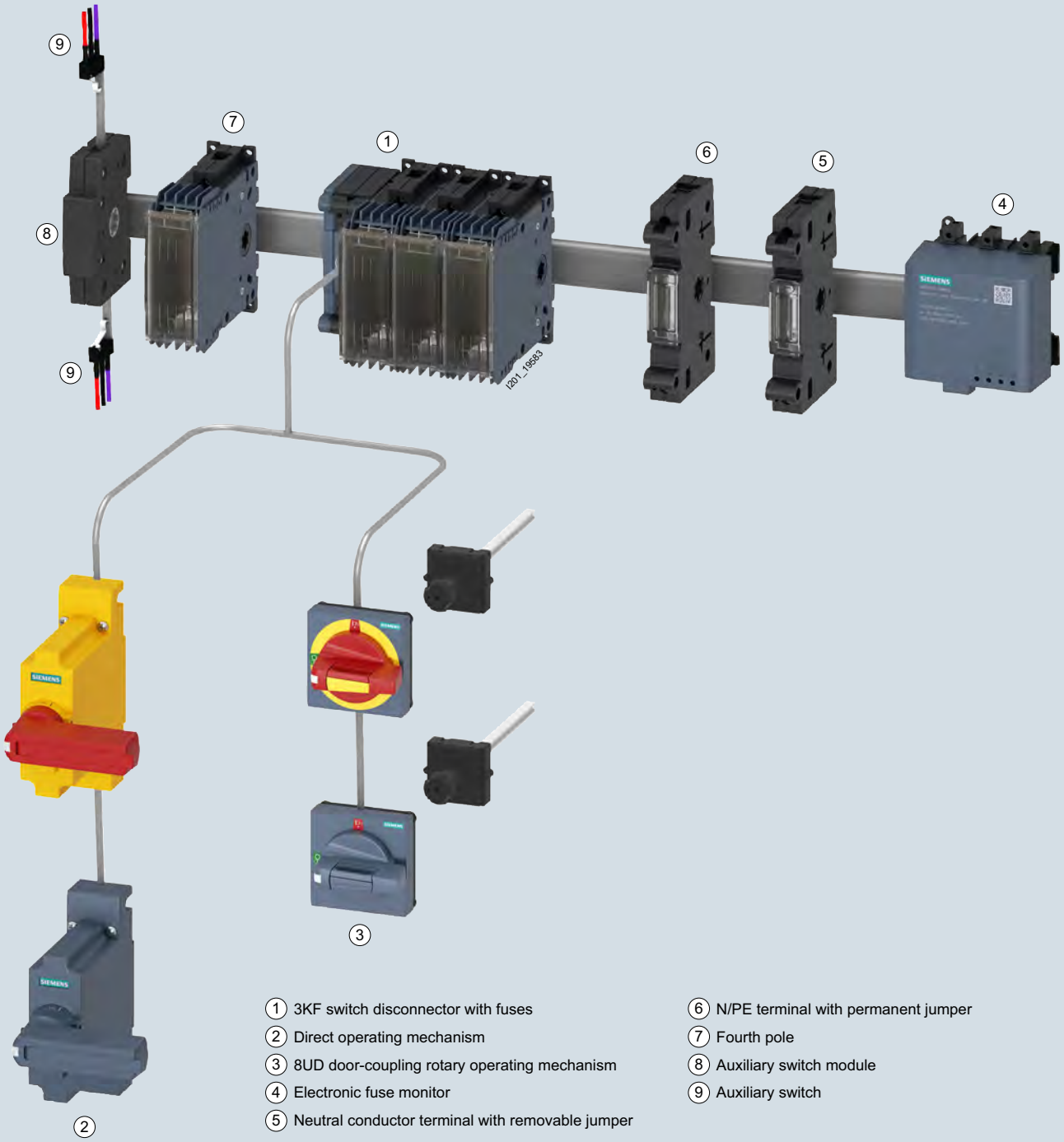
General data

Overview of components and accessories: 3KF switch disconnectors with fuses in size 1



1. 3KF switch disconnector with fuses
2. Direct operating mechanism
3. 8UD door-coupling rotary operating mechanism
4. Electronic fuse monitor
5. Neutral conductor terminal with removable jumper
6. N/PE terminal with permanent jumper
7. Fourth pole
8. Auxiliary switch module
9. Auxiliary switch

Minimum order quantity (PS) or a multiple thereof can be ordered.

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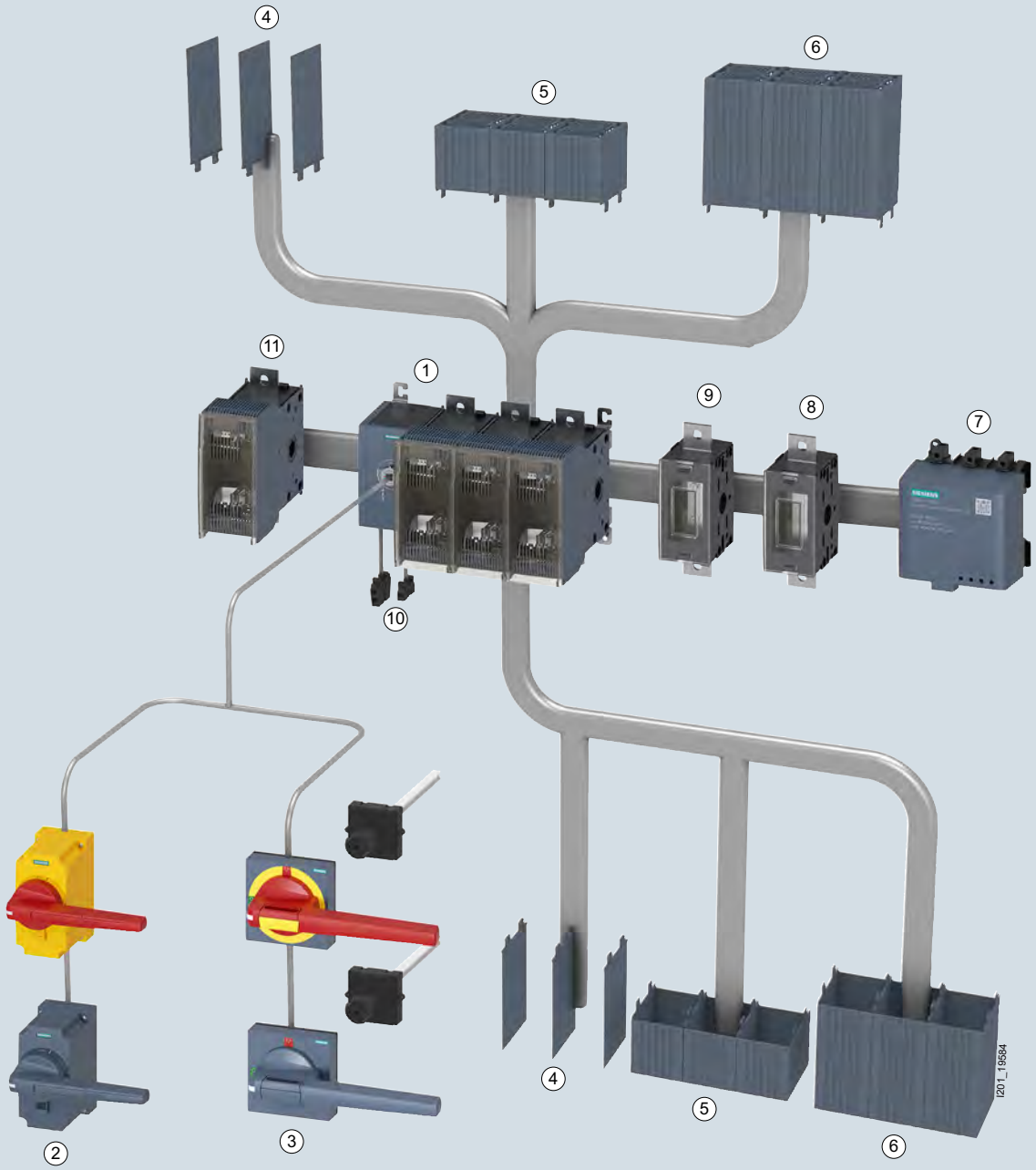
Overview of components and accessories: 3KF switch disconnector with fuses in sizes 2 to 5



1 3KF switch disconnector with fuses
2 Direct operating mechanism
3 8UD door-coupling rotary operating mechanism
4 Phase barriers
5 Cable connection cover, short
6 Cable connection cover
7 Electronic fuse monitor
8 N/PE terminal (with permanent jumper)
9 Neutral conductor terminal (with removable jumper)
10 Auxiliary switch
11 Fourth pole

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Technical specifications

To some extent, values do not apply to 3KF with rear flat terminals – For details, see Siemens Industry Online Support

Standards		**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**								
Size		**1**			**2**		**3**	**4**	**5**	
General technical details										
Rated uninterrupted current I_u	A	32	63	80	125	160	250	400	630	800
Conventional free air thermal current I_{th}[1]	A	32	63	80	125	160	250	400	630	800
For fuse links acc. to IEC 60269-2		00 and 000					1 and 0	2 and 1	3 and 2	
Rated operational voltage U_e										
• At 50 Hz/60 Hz AC (tolerance up to +10% permissible)	V	690								
• With DC (3 conducting paths series-connected)	V	440								
• At DC (2 conducting paths series-connected)	V	220								
Rated insulation voltage U_i	V	1000								
Rated impulse withstand voltage U_{imp}	kV	12								
Overvoltage category		IV								
Operating and short-circuit behavior										
Rated operational current I_e[2]										
• At AC-21A, AC-22A, AC-23A, 400 … 690 V	A	32	63	80	125	160	250	400	630	800
• At DC-21A, DC-22A, DC-23A, 220 …440 V	A	32	63	80	125	160	250	400	630	800
Motor switching capacity AC-23A[3]										
• At 400 V	kW	15	30	37	55	90	132	220	355	400
• At 500 V	kW	18.5	37	55	75	110	160	280	400	560
• At 690 V	kW	30	55	75	110	132	250	400	630	800
Rated short-time withstand current I_{cw} (with t = 1 s, rms value, 690 V AC/440 V DC)	kA	2.5			5		8	12	22	
Rated short-circuit making capacity I_{cm} (at 690 V AC/440 V DC)	kA	3.55			7.65		13.6	24	44	
Rated conditional short-circuit current with fuse[4]										
• At 400/500 V AC	kA	100								
• At 690 V AC	kA	100							80	
Let-through current I_c combined with fuse[4]										
• At 400/500 V AC	kA	10.4			18.2		28.7	39.4	58.5	
• At 690 V AC	kA	11.2			16.87		30.31	41.14	49.95	
Let-through I^2t value combined with fuse[4]										
• At 400/500 V AC	kA²s	33.2			150.6		437.0	1205	4100	
• At 690 V AC	kA²s	40.7			89.64		490.1	1300	2050	
Let-through current I_c of usable fuses, max.										
• At 400/500 V AC	kA	11.8			18		33.7	37.1	77.4	
• At 690 V AC	kA	11.5			25.5		37.7	47	65	
Let-through I^2t value of usable fuses, max.										
• At 400/500 V AC	kA²s	34			223		1500	2150	10400	
• At 690 V AC	kA²s	55			360		940	2600	7000	
Power loss per pole of the switch at I_{th} (plus fuses)	W	0.4	1.7	2.8	4.2	7.2	15	26	40	50
Maximum power loss of the usable fuses (per fuse)	W	6.5	7.5	8.5	11	12	25.5	34	48	60
Service life, operating cycles										
• Mechanical		15000			12000		10000	8000	6000	
• Electrical, at AC-23A, 690 V/50 … 60 Hz		6000			5000		4000	2000	1000	
• Electrical, at AC-23A, 440 V/50 … 60 Hz		10000			8000		5000	3000	1500	
• Electrical, at DC-23A, 440 V		1500			1000					500
Degree of protection (operator side)										
• With masking plate or cable connection cover		IP20								
• Without masking plate or terminal cover		IP20			IP00					
Ambient conditions										
• Ambient temperature during operation	°C	-25 … +70								
• Ambient temperature during storage	°C	-50 … +80								
• Mounting position		Any								
Main conductor connections										
Conductor cross-section, max.	mm²	25			95		240	2 x 150	2 x 300	
Busbar systems, max. dimensions (number x width x thickness)	mm	1 x 9 x 2			1 x 20 x 3		1 x 25 x 3	1 x 30 x 10	1 x 50 x 10	
Tightening torque	Nm	5 … 6.5			15 … 22		30 … 44	30 … 44	50 … 75	

[1] Max. permissible operating temperature at connections 125 °C

[2] Values valid even at +10% line voltage tolerance in case of AC

[3] Values are provided as a guide only and may vary depending on the make of motor

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Devices		Description	Page
Complete assemblies			
	**Complete assemblies with direct operating mechanisms**	Ready-to-install combinations comprising switch disconnectors and operating mechanisms • 3 and 4-pole switch disconnectors with front operating mechanisms • Connections in form of box terminal or flat terminal incl. direct operating mechanism with gray handle	7/132
Basic units			
	**Front operating mechanisms** 3/4-pole up to 690 V AC / 440 V DC	Switch disconnectors with front operating mechanisms without handle • 3 and 4-pole versions • Connections in form of flat terminal (size 2 to 5) or box terminal (size 1 and 2) • Operating mechanism module in center or on left-hand side of switch disconnector	7/133 7/133
	**Side operating mechanisms**	Switch disconnectors with side operating mechanisms • 3 and 4-pole versions • Connections in form of flat terminal (size 2 to 5) or box terminal (size 1 and 2) • Operating mechanism module on the right or left-hand side of switch disconnector	7/135
Accessories and spare parts			
 Left: Box terminal Right: Flat terminals	**Additional poles**	Additional poles for enhanced functionality • 4th contact element (switching pole) • N terminal (neutral conductor terminal with removable jumper) • N/PE terminal (with permanent jumper)	7/137
	**Direct operating mechanisms**	Different handles for mounting on basic units • Direct operating mechanisms for direct mounting on switch disconnector • Handles available in colors gray or red/yellow	7/138
 Door-coupling rotary operating mechanism, gray, for size 1	**Door-coupling rotary operating mechanisms**	Different handles for mounting on basic units • Door-coupling rotary operating mechanisms for operation of switch disconnector outside the control cabinet door • Handles available in colors gray or red/yellow	7/139
	**Auxiliary switches**	Auxiliary switches • For querying the switch position • Optionally available with leading NO contacts (auxiliary switch contacts open before the main contacts of the 3KD switch disconnector) • Optionally available with test function (switch can be tested without closure of main contacts)	7/143
 Left: Cable connection cover Right: Phase barrier	**Other accessories**	• Terminal covers • Phase barriers • Cable connection cover As touch protection for termination area (for installation outside control cabinet) • Mounting bracket for wall mounting (spare part)	7/144

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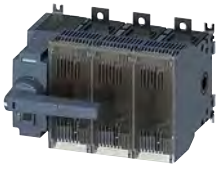
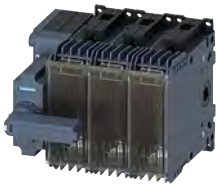
Selection and ordering data

	Rated uninterrupted current I_u	For LV HRC fuse	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A			d					
Complete assemblies with direct operating mechanism, gray, front operating mechanism, for LV HRC fuses									
The switch disconnectors are designed for floor mounting; size 1 can optionally be mounted on standard mounting rails									
3-pole									
 3-pole, flat terminal, size 2	**Flat terminals**								
	125	00/000	2		**3KF2312-2LF11**		1	1 unit	1DL
	160	00/000	2		**3KF2316-2LF11**		1	1 unit	1DL
	250	1	3		**3KF3325-2LF11**		1	1 unit	1DL
	400	2/1	4		**3KF4340-2LF11**		1	1 unit	1DL
 3-pole, flat terminal, size 4	630	3/2	5		**3KF5363-2LF11**		1	1 unit	1DL
	800	3/2	5		**3KF5380-2LF11**		1	1 unit	1DL
 3-pole, flat terminal, size 5									
	Box terminals								
 3-pole, box terminal, size 2	32	00/000	1		**3KF1303-2LB11**		1	1 unit	1DL
	63	00/000	1		**3KF1306-2LB11**		1	1 unit	1DL
	80	00/000	1		**3KF1308-2LB11**		1	1 unit	1DL
4-pole									
 4-pole, flat terminal, size 2	**Flat terminals**								
	125	00/000	2		**3KF2412-2LF11**		1	1 unit	1DL
	160	00/000	2		**3KF2416-2LF11**		1	1 unit	1DL
	250	1	3		**3KF3425-2LF11**		1	1 unit	1DL
	400	2/1	4		**3KF4440-2LF11**		1	1 unit	1DL
 4-pole, flat terminal, size 5	630	3/2	5		**3KF5463-2LF11**		1	1 unit	1DL
	800	3/2	5		**3KF5480-2LF11**		1	1 unit	1DL
	Box terminals								
 4-pole, box terminal, size 1	32	00/000	1		**3KF1403-2LB11**		1	1 unit	1DL
	63	00/000	1		**3KF1406-2LB11**		1	1 unit	1DL
	80	00/000	1		**3KF1408-2LB11**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Basic units without handle, front operating mechanisms, for LV HRC fuses

The switch disconnectors are designed for floor mounting; size 1 can optionally be mounted on standard mounting rails



3-pole, flat terminal, size 2, operating mechanism on left



3-pole, flat terminal, size 5, operating mechanism on left



3-pole, flat terminal, size 2, operating mechanism in center



3-pole, flat terminal, size 5, operating mechanism in center



3-pole, flat terminal at rear, size 2



3-pole, box terminal, size 1, operating mechanism on left



3-pole, box terminal, size 1, operating mechanism in center

Rated uninterrupted current I_u	For LV HRC fuse	Size	SD	Operating mechanism on left: Article No. www.siemens.com/product?Article No.	Price per PU	SD	Operating mechanism in center: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A			d			d					
3-pole											
Flat terminals											
125	00/000	2		**3KF2312-0LF11**			**3KF2312-0MF11**		1	1 unit	1DL
160	00/000	2		**3KF2316-0LF11**			**3KF2316-0MF11**		1	1 unit	1DL
250	1??	3		**3KF3325-0LF11**			**3KF3325-0MF11**		1	1 unit	1DL
400	2/1	4		**3KF4340-0LF11**			**3KF4340-0MF11**		1	1 unit	1DL
630	3/2	5		**3KF5363-0LF11**			**3KF5363-0MF11**		1	1 unit	1DL
800	3/2	5		**3KF5380-0LF11**			**3KF5380-0MF11**		1	1 unit	1DL
Flat terminals at rear											
32	00/000	1		---			**3KF1303-0MR11**		1	1 unit	1DL
63	00/000	1		---			**3KF1306-0MR11**		1	1 unit	1DL
125	00/000	2		---			**3KF2312-0MR11**		1	1 unit	1DL
Box terminals											
32	00/000	1		**3KF1303-0LB11**			**3KF1303-0MB11**		1	1 unit	1DL
63	00/000	1		**3KF1306-0LB11**			**3KF1306-0MB11**		1	1 unit	1DL
80	00/000	1		**3KF1308-0LB11**			**3KF1308-0MB11**		1	1 unit	1DL

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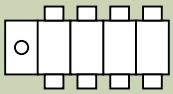
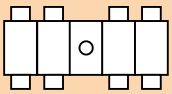
Basic units

	Rated uninterrupted current I_u	For LV HRC fuse	Size	SD	Operating mechanism on left: Article No. www.siemens.com/product?Article No.	Price per PU	SD	Operating mechanism in center: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A			d			d					
	4-pole											
 4-pole, flat terminal, size 2, operating mechanism on left	**Flat terminals**											
	125	00/000	2		**3KF2412-0LF11**			**3KF2412-0MF11**		1	1 unit	1DL
	160	00/000	2		**3KF2416-0LF11**			**3KF2416-0MF11**		1	1 unit	1DL
 4-pole, flat terminal, size 2, operating mechanism on left	250	1	3		**3KF3425-0LF11**			**3KF3425-0MF11**		1	1 unit	1DL
	400	2/1	4		**3KF4440-0LF11**			**3KF4440-0MF11**		1	1 unit	1DL
 4-pole, flat terminal, size 2, operating mechanism in center	630	3/2	5		**3KF5463-0LF11**			**3KF5463-0MF11**		1	1 unit	1DL
	800	3/2	5		**3KF5480-0LF11**			**3KF5480-0MF11**		1	1 unit	1DL
 4-pole, flat terminal, size 5, operating mechanism in center												
	Box terminals											
 4-pole, flat terminal, size 1, operating mechanism on left	32	00/000	1		**3KF1403-0LB11**			**3KF1403-0MB11**		1	1 unit	1DL
	63	00/000	1		**3KF1406-0LB11**			**3KF1406-0MB11**		1	1 unit	1DL
 4-pole, flat terminal, size 1, operating mechanism in center	80	00/000	1		**3KF1408-0LB11**			**3KF1408-0MB11**		1	1 unit	1DL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Basic units without handle, side operating mechanisms

The switch disconnectors with side operating mechanism are suitable for door-coupling rotary operating mechanisms.



3-pole, flat terminal, size 2, operating mechanism on left



3-pole, flat terminal, size 5, operating mechanism on left



3-pole, flat terminal, size 2, operating mechanism on right



3-pole, flat terminal, size 5, operating mechanism on right



3-pole, box terminal, size 1, operating mechanism on left



3-pole, box terminal, size 1, operating mechanism on right

Rated uninterrupted current I_u	For LV HRC fuse	Size	SD	Operating mechanism on left: Article No. www.siemens.com/product?Article No.	Price per PU	SD	Operating mechanism on right: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A			d			d					
3-pole											
Flat terminals											
125	00/000	2		**3KF2312-4LF11**			**3KF2312-4RF11**		1	1 unit	1DL
160	00/000	2		**3KF2316-4LF11**			**3KF2316-4RF11**		1	1 unit	1DL
250	1	3		**3KF3325-4LF11**			**3KF3325-4RF11**		1	1 unit	1DL
400	2/1	4		**3KF4340-4LF11**			**3KF4340-4RF11**		1	1 unit	1DL
630	3/2	5		**3KF5363-4LF11**			**3KF5363-4RF11**		1	1 unit	1DL
800	3/2	5		**3KF5380-4LF11**			**3KF5380-4RF11**		1	1 unit	1DL
Box terminals											
32	00/000	1		**3KF1303-4LB11**			**3KF1303-4RB11**		1	1 unit	1DL
63	00/000	1		**3KF1306-4LB11**			**3KF1306-4RB11**		1	1 unit	1DL
80	00/000	1		**3KF1308-4LB11**			**3KF1308-4RB11**		1	1 unit	1DL

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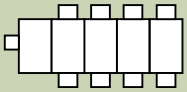
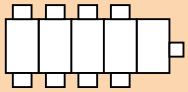
Basic units

	Rated uninterrupted current I_u	For LV HRC fuse	Size	SD	Operating mechanism on left: Article No. www.siemens.com/product?Article No.	Price per PU	SD	Operating mechanism on right: Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A			d			d					
	4-pole											
	Flat terminals											
 3-pole, flat terminal, size 2, operating mechanism on left	125	00/000	2		**3KF2412-4LF11**			**3KF2412-4RF11**		1	1 unit	1DL
	160	00/000	2		**3KF2416-4LF11**			**3KF2416-4RF11**		1	1 unit	1DL
	250	1	3		**3KF3425-4LF11**			**3KF3425-4RF11**		1	1 unit	1DL
	400	2/1	4		**3KF4440-4LF11**			**3KF4440-4RF11**		1	1 unit	1DL
	630	3/2	5		**3KF5463-4LF11**			**3KF5463-4RF11**		1	1 unit	1DL
	800	3/2	5		**3KF5480-4LF11**			**3KF5480-4RF11**		1	1 unit	1DL
 3-pole, flat terminal, size 5, operating mechanism on left												
 4-pole, flat terminal, size 2, operating mechanism on right												
 4-pole, flat terminal, size 5, operating mechanism on right												
	Box terminals											
 4-pole, flat terminal, size 1, operating mechanism on right	32	00/000	1		**3KF1403-4LB11**			**3KF1403-4RB11**		1	1 unit	1DL
	63	00/000	1		**3KF1406-4LB11**			**3KF1406-4RB11**		1	1 unit	1DL
	80	00/000	1		**3KF1408-4LB11**			**3KF1408-4RB11**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Additional poles

	Version	For LV HRC fuse	Circuit symbol	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	d					
	4th contact element (switching pole) for LV HRC fuses If a 4th contact element is used in a three-phase four-conductor system with neutral conductor (3 + N), an isolating blade must be used with the neutral conductor.		N—⌀—N						
 3KF9205-0AA00	**Flat terminals**								
	• For size 2; 3KF2...	00/000			**3KF9205-0AA00**		1	1 unit	1DL
	• For size 3; 3KF3...	1			**3KF9305-0AA00**		1	1 unit	1DL
	• For size 4; 3KF4...	2/1			**3KF9405-0AA00**		1	1 unit	1DL
	• For size 5; 3KF5...	3/2			**3KF9505-0AA00**		1	1 unit	1DL
 3KF9105-1AA00	**Flat terminals at rear**								
	• For size 1; 3KF1...	00/000			**3KF9105-1AA00**		1	1 unit	1DL
	• For size 2; 3KF2...	00/000			**3KF9205-1AA00**		1	1 unit	1DL
 3KF9105-2AA00	**Box terminals**								
	• For size 1; 3KF1...	00/000			**3KF9105-2AA00**		1	1 unit	1DL
 3KF9206-0AA00	***Neutral conductor terminals with removable jumper***		—●—●—						
	Flat terminals								
	• For size 2; 3KF2...				**3KF9206-0AA00**		1	1 unit	1DL
	• For size 3; 3KF3...				**3KF9306-0AA00**		1	1 unit	1DL
	• For size 4; 3KF4...				**3KF9406-0AA00**		1	1 unit	1DL
	• For size 5; 3KF5...				**3KF9506-0AA00**		1	1 unit	1DL
 3KF9106-1AA00	**Flat terminals at rear**								
	• For size 1; 3KF1...				**3KF9106-1AA00**		1	1 unit	1DL
	• For size 2; 3KF2...				**3KF9206-1AA00**		1	1 unit	1DL
 3KF9106-2AA00	**Box terminals**								
	• For size 1; 3KF1...				**3KF9106-2AA00**		1	1 unit	1DL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Accessories and spare parts

	Version	For LV HRC fuse	Circuit symbol	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	d					
	N/PE terminals with permanent jumper								
 3KF9206-7AA00	**Flat terminals**								
	• For size 2; 3KF2...				**3KF9206-7AA00**		1	1 unit	1DL
	• For size 3; 3KF3...				**3KF9306-7AA00**		1	1 unit	1DL
	• For size 4; 3KF4...				**3KF9406-7AA00**		1	1 unit	1DL
	• For size 5; 3KF5...				**3KF9506-7AA00**		1	1 unit	1DL
 3KF9106-6AA00	**Flat terminals at rear**								
	• For size 1; 3KF1...				**3KF9106-6AA00**		1	1 unit	1DL
	• For size 2; 3KF2...				**3KF9206-6AA00**		1	1 unit	1DL
 3KF9106-8AA00	**Box terminals**								
	• For size 1; 3KF1...				**3KF9106-8AA00**		1	1 unit	1DL

Direct operating mechanisms

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Direct operating mechanisms							
 Direct operating mechanism, gray, for size 1	Can be locked with up to max. 3 padlocks						
	Gray						
	• For size 1; 3KF1...		**3KF9101-1AA00**		1	1 unit	1DL
	• For size 2; 3KF2...		**3KF9201-1AA00**		1	1 unit	1DL
	• For size 3; 3KF3...		**3KF9301-1AA00**		1	1 unit	1DL
	• For size 4; 3KF4...		**3KF9401-1AA00**		1	1 unit	1DL
	• For size 5; 3KF5...		**3KF9501-1AA00**		1	1 unit	1DL
 Direct operating mechanism, red/yellow, for size 1	**Red/yellow**						
	• For size 1; 3KF1...		**3KF9101-2AA00**		1	1 unit	1DL
	• For size 2; 3KF2...		**3KF9201-2AA00**		1	1 unit	1DL
	• For size 3; 3KF3...		**3KF9301-2AA00**		1	1 unit	1DL
	• For size 4; 3KF4...		**3KF9401-2AA00**		1	1 unit	1DL
	• For size 5; 3KF5...		**3KF9501-2AA00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Door-coupling rotary operating mechanisms

Note

For 3KF switch disconnectors with fuses and side operating mechanism (left or right), only door-coupling rotary operating mechanisms without "Test" can be used.

	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Door-coupling rotary operating mechanisms, complete									
 Door-coupling rotary operating mechanism, gray, for size 1	***Labeling TEST - 0 - I*** • Handle with masking plate • Coupling driver with tolerance compensation • Shaft 300 mm • Labeling Test - 0 - I								
	Gray								
	• For size 1; 3KF1...	45	8 x 8		**8UD1171-2AF21**		1	1 unit	1CL
	• For size 2; 3KF2...	100	8 x 8		**8UD1141-2AF21**		1	1 unit	1CL
	• For size 3; 3KF3...	100	10 x 10		**8UD1141-3AF21**		1	1 unit	1CL
	• For size 4; 3KF4...	140	10 x 10		**8UD1151-3AF21**		1	1 unit	1CL
	• For size 5; 3KF5...	200	12 x 12		**8UD1161-4AF21**		1	1 unit	1CL
 Door-coupling rotary operating mechanism, gray, for size 1	**Red/yellow**								
	• For size 1; 3KF1...	45	8 x 8		**8UD1171-2AF25**		1	1 unit	1CL
	• For size 2; 3KF2...	100	8 x 8		**8UD1141-2AF25**		1	1 unit	1CL
	• For size 3; 3KF3...	100	10 x 10		**8UD1141-3AF25**		1	1 unit	1CL
	• For size 4; 3KF4...	140	10 x 10		**8UD1151-3AF25**		1	1 unit	1CL
	• For size 5; 3KF5...	200	12 x 12		**8UD1161-4AF25**		1	1 unit	1CL

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Accessories and spare parts

	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Handles for door-coupling rotary operating mechanisms									
	Handles without extension shaft and coupling driver, labeling 0 - I								
	• With masking plate								
	• Labeling 0 - I								
 Handle, gray, for size 1	**Gray**								
	• For size 1; 3KF1..	45	--		**8UD1771-2AD01**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2AD01**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3AD01**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4AD01**		1	1 unit	1CL
 Handle, red/yellow, for size 1	**Red/yellow**								
	• For size 1; 3KF1..	45	--		**8UD1771-2AD05**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2AD05**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3AD05**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4AD05**		1	1 unit	1CL
	Handles without extension shaft and coupling driver, labeling Test - 0 - I								
	• With masking plate								
	• Labeling Test - 0 - I								
 Handle, gray, for size 1	**Gray**								
	• For size 1; 3KF1..	45	--		**8UD1771-2AF01**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2AF01**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3AF01**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4AF01**		1	1 unit	1CL
 Handle, red/yellow, for size 1	**Red/yellow**								
	• For size 1; 3KF1..	45	--		**8UD1771-2AF05**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2AF05**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3AF05**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4AF05**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
	Handles, illuminated, without extension shaft and coupling driver, labeling 0 - I • With masking plate • Illuminated • Labeling 0 - I								
 Handle without extension shaft, gray, for sizes 1/2	**Gray**								
	• For size 1; 3KF1...	45	--		**8UD1771-2CD01**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2CD01**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3CD01**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4CD01**		1	1 unit	1CL
 Handle without extension shaft, red/yellow, for sizes 1/2	**Red/yellow**								
	• For size 1; 3KF1...	45	--		**8UD1771-2CD05**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2CD05**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3CD05**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4CD05**		1	1 unit	1CL
	Handles, illuminated, without extension shaft and coupling driver, labeling Test - 0 - I • With masking plate • Illuminated • Labeling Test - 0 - I								
 Handle with lighting, without extension shaft, gray, for sizes 1/2	**Gray**								
	• For size 1; 3KF1...	45	--		**8UD1771-2CF01**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2CF01**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3CF01**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4CF01**		1	1 unit	1CL
 Handle with lighting, without extension shaft, red/yellow, for sizes 1/2	**Red/yellow**								
	• For size 1; 3KF1...	45	--		**8UD1771-2CF05**		1	1 unit	1CL
	• For sizes 2/3; 3KF2/3...	100	--		**8UD1841-2CF05**		1	1 unit	1CL
	• For size 4; 3KF4...	140	--		**8UD1851-3CF05**		1	1 unit	1CL
	• For size 5; 3KF5...	200	--		**8UD1861-4CF05**		1	1 unit	1CL

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Accessories and spare parts

	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Other accessories for door-coupling rotary operating mechanisms, 8UD1 series									
 8UC6032	***Extension shafts***								
	300 mm long								
	• For sizes 1/2; 3KF1/2...	--	8 x 8		**8UC6032**		1	1 unit	1CL
	• For sizes 3/4; 3KF3/4...	--	10 x 10		**8UC6033**		1	1 unit	1CL
	• For size 5; 3KF5...	--	12 x 12		**8UC6034**		1	1 unit	1CL
 8UC6082	**600 mm long**								
	A shaft jack is required for the 8UD handle when the 600 mm long shaft is used and for size 1.								
	• For sizes 1/2; 3KF1/2...	--	8 x 8		**8UC6082**		1	1 unit	1CL
	• For sizes 3/4; 3KF3/4...	--	10 x 10		**8UC6083**		1	1 unit	1CL
	• For size 5; 3KF5...	--	12 x 12		**8UC6084**		1	1 unit	1CL
 8UD1900-0FA00	**Shaft jack for 8UD handle for shaft, 600 mm** NEW								
	• For size 1; 3KF1...	--	8 x 8		**8UD1900-0FA00**		1	1 unit	1CL
 8UD1900-2GA00	***Coupling drivers with tolerance compensation***								
	For size 1; 3KF1...	--	8 x 8		**8UD1900-2GA00**		1	1 unit	1CB
	• For size 2; 3KF2...	--	8 x 8		**8UD1900-6GA00**		1	1 unit	1CL
	• For sizes 3/4; 3KF3/4...	--	10 x 10		**8UD1900-3GA00**		1	1 unit	1CL
	• For size 5; 3KF5...	--	12 x 12		**8UD1900-4GA00**		1	1 unit	1CL
 8UD1900-2HA00	***Coupling drivers without tolerance compensation***								
	• For size 1; 3KF1	--	8 x 8		**8UD1900-2HA00**		1	1 unit	1CB
	• For size 2; 3KF2...	--	8 x 8		**8UD1900-6HA00**		1	1 unit	1CL
	• For sizes 3/4; 3KF3/4...	--	10 x 10		**8UD1900-3HA00**		1	1 unit	1CL
	• For size 5; 3KF5...	--	12 x 12		**8UD1900-4HA00**		1	1 unit	1CL
	Shaft couplings								
	• For size 1/2 3KF1/2...	--	8 x 8		**8UC6022**		1	1 unit	1CL
	• For sizes 3/4; 3KF3/4...	--	10 x 10		**8UC6023**		1	1 unit	1CL
	• For size 5; 3KF5...	--	12 x 12		**8UC6024**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Auxiliary switches

	Version	For size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
 3KD9103-3	**Auxiliary switches for size 1**							
	With soldered-on 50 cm connecting cables							
	• 1 CO contact	1		**3KD9103-1**		1	1 unit	1CL
	• 1 CO contact, solid-state compatible	1		**3KD9103-3**		1	1 unit	1CL
 3KD9103-2/-4	**Auxiliary switches for size 1**							
	Without soldered-on connecting cables							
	• 1 CO contact	1		**3KD9103-2**		1	1 unit	1CL
	• 1 CO contact, solid-state compatible	1		**3KD9103-4**		1	1 unit	1CL
 3KD9103-5/-6/-7	**Auxiliary switch modules for size 1[1)]**							
	• Standard	1		**3KD9103-5**		1	1 unit	1CL
	• With test function[2)]	1		**3KD9103-6**		1	1 unit	1CL
	• With leading NO contact and with test function[2)]	1		**3KD9103-7**		1	1 unit	1CL
	**Mounting brackets for auxiliary switch modules**							
	• For mounting auxiliary switch modules on 3KF switch disconnectors with rear terminal	1		**3KF9112-0AB00**		1	1 unit	1DL
 3SB3400-0B auxiliary switch	**Auxiliary switches for sizes 2 to 5**							
	Auxiliary switches with screw terminal for installation on operating mechanism module. Auxiliary switches with spring-type terminal 3SB3403-.. from the 3SB3 program can also be used							
	• 1 NO	2 to 5	▶	**3SB3400-0B**		1	1 unit	41J
	• 1 NO with gold-plated contacts	2 to 5		**3SB3400-0BA**		1	1 unit	41J
	• 1 NC	2 to 5	▶	**3SB3400-0C**		1	1 unit	41J
	• 1 NC with gold-plated contacts	2 to 5		**3SB3400-0CA**		1	1 unit	41J
 3SB3400-0A auxiliary switch	• 1 NO + 1 NC	2 to 5	▶	**3SB3400-0A**		1	1 unit	41J
	• 1 NO + 1 NC with gold-plated contacts	2 to 5		**3SB3400-0AA**		1	1 unit	41J
	• 2 NO	2 to 5		**3SB3400-0D**		1	1 unit	41J
	• 2 NO with gold-plated contacts	2 to 5		**3SB3400-0DA**		1	1 unit	41J
	• 2 NC	2 to 5		**3SB3400-0E**		1	1 unit	41J
	• 2 NC with gold-plated contacts	2 to 5		**3SB3400-0EA**		1	1 unit	41J

[1)] Unit is supplied without auxiliary switches; a maximum of 2 auxiliary switches can be installed. The 3KF9112-0AB00 mounting bracket is additionally required for mounting the auxiliary switch modules with rear terminal.

[2)] Can only be used with 3KF with front and left operating mechanism.

Fuse monitoring

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	**Electronic fuse monitoring for remote display of tripped fuses**						
	Remote display by auxiliary contact (1 CO), Local detection by integrated LED						
	• For all sizes		**3KF9010-1AA00**		1	1 unit	1DL

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Accessories and spare parts

Other accessories

	Version	For size/ for fuse LV HRC	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Phase barriers								
 Phase barrier for 3/4-pole units in size 2	For 3KF with flat terminals							
	For 3-pole devices (6 units)							
		2		**3KD9308-6**		1	1 unit	1CL
		3...4		**3KD9408-6**		1	1 unit	1CL
		5		**3KD9508-6**		1	1 unit	1CL
	For 4-pole devices (8 units)							
		2		**3KD9308-8**		1	1 unit	1CL
		3...4		**3KD9408-8**		1	1 unit	1CL
		5		**3KD9508-8**		1	1 unit	1CL
Cable connection covers								
 Standard length, for size 2 devices with 3 poles	For 3KD with flat terminals							
	For 3-pole devices (6 units)							
	Standard length							
		2		**3KD9304-6**		1	1 unit	1CL
		3		**3KF9304-6**		1	1 unit	1DL
		4		**3KD9404-6**		1	1 unit	1CL
		5		**3KD9504-6**		1	1 unit	1CL
 Short version, for size 2 devices with 3 poles	**Short version**							
		2		**3KD9304-7**		1	1 unit	1CL
		3		**3KF9304-7**		1	1 unit	1DL
		4		**3KD9404-7**		1	1 unit	1CL
 Standard length, for size 2 devices with 4 poles	***For 4-pole devices (8 units)***							
	Standard length							
		2		**3KD9304-8**		1	1 unit	1CL
		3		**3KF9304-8**		1	1 unit	1DL
		4		**3KD9404-8**		1	1 unit	1CL
		5		**3KD9504-8**		1	1 unit	1CL
 Short version, for size 2 devices with 3 poles	**Short version**							
		2		**3KD9304-5**		1	1 unit	1CL
		3		**3KF9304-5**		1	1 unit	1DL
		4		**3KD9404-5**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For size/ for fuse LV HRC	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Spare cable connection cover (1 unit)							
	**Standard length**	5		**3KD9504-1**		1	1 unit	1CL
	Short version							
		2		**3KD9304-1**		1	1 unit	1CL
		3		**3KF9304-1**		1	1 unit	1DL
		4		**3KD9404-1**		1	1 unit	1CL
LV HRC isolating blades								
	with insulated grip lugs							
		LV HRC 000/00		**3NG1002**		1	3 units	1BM
		LV HRC 1		**3NG1202**		1	1 unit	1BM
		LV HRC 2		**3NG1302**		1	1 unit	1BM
		LV HRC 3		**3NG1402**		1	1 unit	1BM
Blocking pin test function								
	Enables permanent deactivation of the test function for auxiliary switches; it is installed in the operating mechanism module of the 3KF switch disconnector Scope of supply: Blocking pins for 10 3KF switch disconnectors							
		1		**3KF9112-1AA00**		1	1 unit	1DL
		2 and 4		**3KF9412-1AA00**		1	1 unit	1DL
		5		**3KF9512-1AA00**		1	1 unit	1DL

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Accessories and spare parts

Spare parts

	Version	For size/ for fuse LV HRC	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	All parts are included in scope of supply of the 3KF switch disconnector.							
Mounting brackets[1]								
	Mounting brackets for one 3KF switch disconnector are included in the scope of supply	1[1]		**3KF9112-0AA00**		1	1 unit	1DL
		2[1]		**3KF9212-0AA00**		1	1 unit	1DL
		3 and 4		**3KF9412-0AA00**		1	1 unit	1DL
		5		**3KF9512-0AA00**		1	1 unit	1DL
	Mounting brackets for 3KF switch disconnectors with rear flat terminal[2] • Scope of supply: 2 units (2 units are required for one 3KF switch disconnector)	1 and 2		**3KF9212-0AB00**		1	1 unit	1DL
Slide for mounting on a standard mounting rail								
	• Spare part is included in the scope of supply of the 3KF • Contains 5 parts	1		**3KF9112-0BA00**		1	1 unit	1DL

[1] Cannot be used for 3KF with rear flat terminal.

[2] The 3KF9112-0AB00 mounting bracket is needed if an auxiliary switch module is mounted on a 3KF1 switch disconnector with rear flat terminal (delivered quantity: 1 unit).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For size/ for fuse LV HRC	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	All parts are included in scope of supply of the 3KF switch disconnector.							
Fuse covers								
		1		**3KF9112-0CA00**		1	1 unit	1DL
		2[1)]		**3KF9212-0CA00**		1	1 unit	1DL
		3		**3KF9312-0CA00**		1	1 unit	1DL
		4		**3KF9412-0CA00**		1	1 unit	1DL
		5		**3KF9512-0CA00**		1	1 unit	1DL

[1)] Use 3KF9212-0CB00 fuse cover for 3KF2 with rear terminal.

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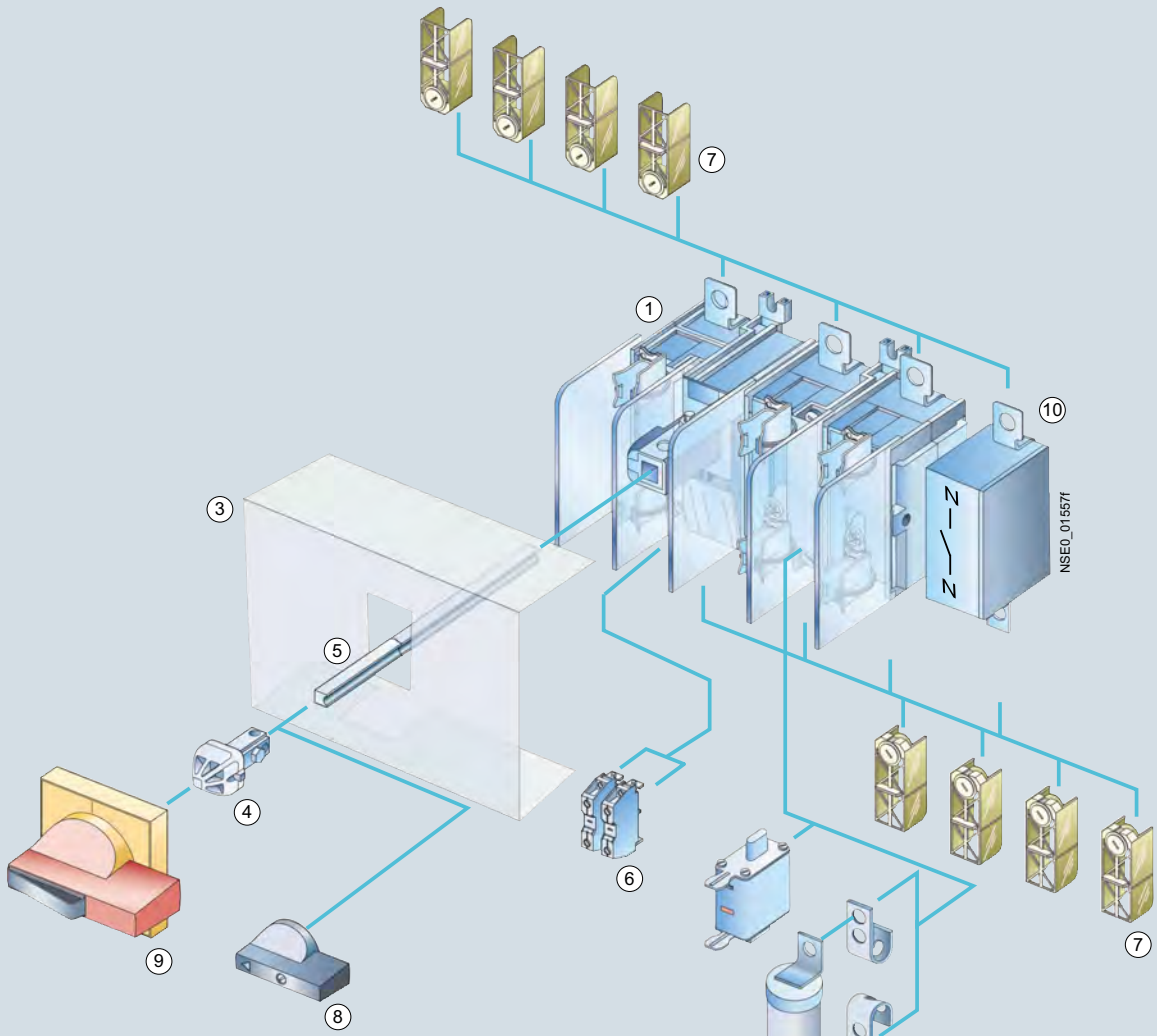
Introduction

Overview



1. 3KL basic device
2. Fuses, optionally BS-88 or LV HRC fuses
3. Terminal cover, IP20 (vertical to operator side)
4. Coupling driver
5. Extension shaft
6. Standard products from the Siemens 3SB1 range are used as auxiliary switches.

All components from the switch to the actuator are provided with non-interchangeability features.

Optional

7. Single-pole terminal cover from 63 A to 630 A, IP20 (vertical to operator side)
8. 8UC9 knob for fixed mounting in standard version (black) or EMERGENCY-STOP version (red), or
9. 8UC7 door-coupling rotary operating mechanism in standard version (ti-gray) or EMERGENCY-STOP version (red/yellow)
10. 4th pole (optional)

All switch disconnectors feature double contact interruption and an isolating distance. As a result, the fuses of the switch disconnectors are de-energized in the OFF position. Generally, all 3K.5 switch disconnectors can be secured to the shaft with a padlock to prevent unauthorized reclosing.

Identical accessories for 3KA switch disconnectors and 3KL and 3KM switch disconnectors with fuses simplify stock keeping. Please inquire about a special version with reduced values that is particularly resistant to atmospheres high in sulfur, e.g. in the paper and cellulose processing industries.

Application

3KL switch disconnectors with fuses protect against overload and short-circuits as main control and EMERGENCY-STOP switches of switchboard assemblies, distribution boards, power supply and motor outgoing feeders. In conjunction with Siemens SITOR semiconductor fuses, they are also used in UPS systems, frequency converters and capacitor control systems.

All 3K switch disconnectors are climate-proof and meet the requirements of IEC 60947-1, IEC 60947-3 and VDE 0660 Part 107.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards		**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**						
Type		**3KL50**	**3KL52**[1]	**3KL53**[1]	**3KL55**[1]	**3KL57**[1]	**3KL61**[1]	**3KL62**[1]
Rated uninterrupted current I_u For fuse links according to DIN 43620, (when SITOR semiconductor fuses are used, a reduction of rated current is necessary, see reference to technical information at start of chapter)	A Size	63 00 and 000	125 00 and 000	160 00 and 000	250 1 and 2	400 1 and 2	630 3 and 2	800 3 and 2
Conventional free air thermal current I_{th}[2]	A	63	125	160	250	400	630	800
Rated insulation voltage U_i	V	690	1000	1000	1000	1000	1000	1000
Rated impulse withstand voltage U_{imp}	kV	6	8	8	8	8	8	8
Rated operational voltage U_e								
50/60 Hz AC	V	690						
DC	V	440 (3 conducting paths series-connected) 220 (2 conducting paths series-connected)[3]						
Rated short-circuit making capacity with fuses Peak value at 50/60 Hz 690 V AC	kA	220	220	220	176	176	105	105
Rated conditional short-circuit current with fuses	kA	100	100	100	80	80	50	50
Rms value, at 50/60 Hz 690 V AC								
Max. rated current I_n of fuses	A	80	160	160	400	400	630[4]	800
Max. permissible power loss of the installed fuse								
• LV-HRC	W	6	9	11.5	32	45	48	62
• BS	W	8 (A2/A3)	11.5 (A4)	11.5	32	45	48	60.5
Permissible let-through current of the fuses	kA	8	17	17	30[5]	30[5]	50	50
Max. permissible let-through I^2t value	kA^2s	55	223	223	1000	1000	5400	10500
Breaking capacity (infeed from the top or bottom)								
At 400 V AC								
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	1000	1280	2000	3200	5100	6400
• Rated operational current I_e at AC-21A, AC-22A, AC-23A	A	63	125	160	250	400	630[6]	800[6]
• Motor switching capacity AC-23A	kW	30	65	80	132	200	335	400
At 500 V AC								
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	1000	1280	2000	3200	5100	6400
• Rated operational current I_e at AC-21A, AC-22A, AC-23A	A	63	125	160	250	400	630[6]	800[6]
• Motor switching capacity AC-23A	kW	40	90	110	185	280	425	500
At 690 V AC								
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	1000	1280	2000	3200	5100	6400
• Rated operational current I_e at AC-21A, AC-22A, AC-23A	A	63	125	160	250	400	630[5]	800[5]
• Motor switching capacity AC-23A	kW	50	110	150	220	375	560	700
At 440 V DC (3 conducting paths series-connected)[7]								
• Breaking current I_c (L/R = 15 ms)	A	250	500	640	1000[8]	1600	2520[9]	2520[9]
• Rated operational current I_e at DC-23A	A	63	125	160	250[10]	400	630[10]	630[10]
Rated short-time current I_{cw} (1 s current, rms value)	kA	2.5	3.2	3.2	8	11	32	32
Permissible ambient temperature	°C °C	-25 ... +55 for operation[4], -50 ... +80 during storage						
Mechanical endurance, operating cycles		15000	15000	15000	12000	12000	3000	3000
Degree of protection		IP00/IP20 (from the operator side, with fuse and terminal covers)						
Power loss of the switch at I_{th} (plus power loss of the fuses)	W	8.5	22	36	33	86	140	225
Main conductor connections								
Busbar systems, max. dimensions (W x T)	mm	25 x 9	45 x 10	45 x 10	40 x 12	40 x 15	40 x 17	40 x 17
Cable lug, max. conductor cross-section (stranded)	mm^2	35	70	120	150	2 x 150 or 1 x 240	2 x 240	2 x 240
Tightening torque Terminal screws	Nm	6 ... 7.5 M6	7 ... 10 M6	18 ... 22 M8	35 ... 45 M10	35 ... 45 M10	56 M12	56 M12
Protective conductor connections								
Flat bars	mm	--	--	--	20 x 2.5	20 x 2.5	--	--
Cable lug, max. conductor cross-section (stranded)	mm^2	--	--	--	70	120	--	--

1) Technical specifications for approval on request.

2) Configuring note: Max. permissible operating temperature for fuse blades 135 °C, for connections 100 °C.

3) 110 V (one conducting path).

4) With 3KL61 for operation -25 °C ... +35 °C, at +55 °C: I_{th} = 570 A.

5) With 3ND1 switchboard protection fuse.

6) AC-23B.

7) 220 V DC (L1 and L3 series-connected) or 110 V DC (one conducting path) at DC-23A.

8) At 440 V L/R = 4 ms, at 220 V L/R = 15 ms.

9) DC-22A only (L/R = 2.5 ms).

10) At 440 V DC-22A, at 220 V DC-23A.

Note:

For the 3KL switch disconnectors, complete kits for standard and EMERGENCY-STOP application are available for installation in the side and rear panels of control cabinets.

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Floor mounting

Selection and ordering data

All switch disconnectors with degree of protection IP00
Conductor connecting screws and fuse partitions are generally included in the scope of supply.

	Rated uninterrupted current I_u	LV HRC fuse links[1] according to DIN 43620[2]		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		Size	Operational class						
	A			d					
Complete versions with 8UC7 door-coupling rotary operating mechanism (black handle)									
	3-pole for LV HRC fuse systems								
	63	00 and 000	gG, aM		**3KL5030-1GB01**		1	1 unit	1CL
	125	00 and 000	gG, aM		**3KL5230-1GB01**		1	1 unit	1CL
	160	00 and 000	gG, aM		**3KL5330-1GB01**		1	1 unit	1CL
	250	1 and 2	gG, aM		**3KL5530-1GB01**		1	1 unit	1CL
	400	2 and 1	gG, aM		**3KL5730-1GB01**		1	1 unit	1CL
	630	3 and 2	gG, aM		**3KL6130-1GB00**		1	1 unit	1CL
	630[3]	3 and 2[3]	gG, aM[3]		**3KL6130-1GB02**		1	1 unit	1CL
	800[3]	3 and 2[3]	gG, aM[3]		**3KL6230-1GB02**		1	1 unit	1CL
	4-pole for LV HRC fuse systems								
	63	00 and 000	gG, aM		**3KL5040-1GB01**		1	1 unit	1CL
	125	00 and 000	gG, aM		**3KL5240-1GB01**		1	1 unit	1CL
	160	00 and 000	gG, aM		**3KL5340-1GB01**		1	1 unit	1CL
	250	1 and 2	gG, aM		**3KL5540-1GB01**		1	1 unit	1CL
	400	2 and 1	gG, aM		**3KL5740-1GB01**		1	1 unit	1CL
	630	3 and 2	gG, aM		**3KL6140-1GB00**		1	1 unit	1CL
	3-pole for fuses acc. to BS 88								
	63	Form A2/A3			**3KL5030-1GG01**		1	1 unit	1CL
	125	Form A2/A3			**3KL5230-1GG01**		1	1 unit	1CL
	125	Form A4			**3KL5230-1GJ01**		1	1 unit	1CL
	160	Form A4			**3KL5330-1GJ01**		1	1 unit	1CL
	250	Form B1-B3			**3KL5530-1GG01**		1	1 unit	1CL
	400	Form B1-B3			**3KL5730-1GG01**		1	1 unit	1CL
	630	Form C1-C3			**3KL6130-1GG00**		1	1 unit	1CL
	4-pole for fuses acc. to BS 88								
	63	Form A2/A3			**3KL5040-1GG01**		1	1 unit	1CL
	125	Form A2/A3			**3KL5240-1GG01**		1	1 unit	1CL
	125	Form A4			**3KL5240-1GJ01**		1	1 unit	1CL
	160	Form A4			**3KL5340-1GJ01**		1	1 unit	1CL
	250	Form B1-B3			**3KL5540-1GG01**		1	1 unit	1CL
	400	Form B1-B3			**3KL5740-1GG01**		1	1 unit	1CL
	630	Form C1-C3			**3KL6140-1GG00**		1	1 unit	1CL
Basic switch versions without handle									
 3KL5230-1AB01	**3-pole for LV HRC fuse systems**								
	63	00 and 000	gG, aM	▶	**3KL5030-1AB01**		1	1 unit	1CL
	125	00 and 000	gG, aM	▶	**3KL5230-1AB01**		1	1 unit	1CL
	160	00 and 000	gG, aM	▶	**3KL5330-1AB01**		1	1 unit	1CL
	250	1 and 2	gG, aM	▶	**3KL5530-1AB01**		1	1 unit	1CL
	400	2 and 1	gG, aM	▶	**3KL5730-1AB01**		1	1 unit	1CL
	630	3 and 2	gG, aM		**3KL6130-1AB0**		1	1 unit	1CL
	630[3]	3 and 2[3]	gG, aM[3]		**3KL6130-1AB02**		1	1 unit	1CL
	800[3]	3 and 2[3]	gG, aM[3]		**3KL6230-1AB02**		1	1 unit	1CL
 3KL5240-1AB01	**4-pole for LV HRC fuse systems**								
	63	00 and 000	gG, aM		**3KL5040-1AB01**		1	1 unit	1CL
	125	00 and 000	gG, aM		**3KL5240-1AB01**		1	1 unit	1CL
	160	00 and 000	gG, aM		**3KL5340-1AB01**		1	1 unit	1CL
	250	1 and 2	gG, aM		**3KL5540-1AB01**		1	1 unit	1CL
	400	2 and 1	gG, aM		**3KL5740-1AB01**		1	1 unit	1CL
	630	3 and 2	gG, aM		**3KL6140-1AB00**		1	1 unit	1CL
 3KL5230-1AJ01	**3-pole for fuses acc. to BS 88**								
	63	Form A2/A3			**3KL5030-1AG01**		1	1 unit	1CL
	125	Form A2/A3			**3KL5230-1AG01**		1	1 unit	1CL
	125	Form A4			**3KL5230-1AJ01**		1	1 unit	1CL
	160	Form A4			**3KL5330-1AJ01**		1	1 unit	1CL
	250	Form B1-B3			**3KL5530-1AG01**		1	1 unit	1CL
	400	Form B1-B3			**3KL5730-1AG01**		1	1 unit	1CL
	630	Form C1-C3			**3KL6130-1AG00**		1	1 unit	1CL

Fuse monitoring through 5TT3170 safety monitor with a floating signaling contact 1 NO, see chapter "Fuse Systems".

Footnotes, see page 7/151.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Rated uninterrupted current I_u	LV HRC fuse links[1] according to DIN 43620[2]		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		Size	Operational class						
	A			d					
 3KL5240-1AJ01 with fuses	**4-pole for fuses acc. to BS 88**								
	63	Form A2/A3			**3KL5040-1AG01**		1	1 unit	1CL
	125	Form A2/A3			**3KL5240-1AG01**		1	1 unit	1CL
	125	Form A4			**3KL5240-1AJ01**		1	1 unit	1CL
	160	Form A4			**3KL5340-1AJ01**		1	1 unit	1CL
	250	Form B1-B3			**3KL5540-1AG01**		1	1 unit	1CL
	400	Form B1-B3			**3KL5740-1AG01**		1	1 unit	1CL
	630	Form C1-C3			**3KL6140-1AG00**		1	1 unit	1CL
8UC7 EMERGENCY-STOP door-coupling rotary operating mechanisms (red handle, yellow indicator plate) for basic switch versions without handle									
 8UC7121-3BB10	**3-pole for LV HRC fuse systems**								
	63	00 and 000	gG, aM		**8UC7121-3BB10**		1	1 unit	1CL
	125	00 and 000	gG, aM		**8UC7222-3BB20**		1	1 unit	1CL
	160	00 and 000	gG, aM		**8UC7222-3BB20**		1	1 unit	1CL
	250	1 and 2	gG, aM		**8UC7323-3BB30**		1	1 unit	1CL
	400	2 and 1	gG, aM		**8UC7323-3BB30**		1	1 unit	1CL
	630	3 and 2	gG, aM		**8UC7424-3BB44** +		1	1 unit	1CL
				▶	**8UC9253**		1	1 unit	1CL
	800	3 and 2	gG, aM		**8UC7424-3BB44** +		1	1 unit	1CL
				▶	**8UC9253**		1	1 unit	1CL
	4-pole for LV HRC fuse systems								
	63	00 and 000	gG, aM		**8UC7222-3BB20**		1	1 unit	1CL
	125	00 and 000	gG, aM		**8UC7222-3BB20**		1	1 unit	1CL
	160	00 and 000	gG, aM		**8UC7222-3BB20**		1	1 unit	1CL
	250	1 and 2	gG, aM		**8UC7323-3BB30**		1	1 unit	1CL
	400	2 and 1	gG, aM		**8UC7323-3BB30**		1	1 unit	1CL
	630	3 and 2	gG, aM		**8UC7424-3BB44** +		1	1 unit	1CL
				▶	**8UC9253**		1	1 unit	1CL
	3-pole for fuses acc. to BS 88								
	63	Form A2/A3			**8UC7121-3BB10**		1	1 unit	1CL
	125	Form A2/A3			**8UC7222-3BB20**		1	1 unit	1CL
	125	Form A4			**8UC7222-3BB20**		1	1 unit	1CL
	160	Form A4			**8UC7222-3BB20**		1	1 unit	1CL
	250	Form B1-B3			**8UC7323-3BB30**		1	1 unit	1CL
	400	Form B1-B3			**8UC7323-3BB30**		1	1 unit	1CL
	630	Form C1-C3			**8UC7424-3BB44** +		1	1 unit	1CL
				▶	**8UC9253**		1	1 unit	1CL
	800	Form C1-C3			**8UC7424-3BB44** +		1	1 unit	1CL
				▶	**8UC9253**		1	1 unit	1CL
	4-pole for fuses acc. to BS 88								
	63	Form A2/A3			**8UC7222-3BB20**		1	1 unit	1CL
	125	Form A2/A3			**8UC7222-3BB20**		1	1 unit	1CL
	125	Form A4			**8UC7222-3BB20**		1	1 unit	1CL
	160	Form A4			**8UC7222-3BB20**		1	1 unit	1CL
	250	Form B1-B3			**8UC7323-3BB30**		1	1 unit	1CL
	400	Form B1-B3			**8UC7323-3BB30**		1	1 unit	1CL
	630	Form C1-C3			**8UC7424-3BB44** +		1	1 unit	1CL
				▶	**8UC9253**		1	1 unit	1CL

Fuse monitoring through 5TT3170 safety monitor with a floating signaling contact 1 NO, see chapter "Fuse Systems".

Footnotes for page 7/150 and page 7/151:

1) Silver-plated fuse blades. Silver-plated isolating blades can be used if desired.

2) For the assignment of semiconductor fuses, see page 7/156.

3) With SITOR 3NE fuse links cULus-approved.

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Selection and ordering data

All switch disconnectors with degree of protection IP00
Conductor connecting screws and fuse partitions are generally included in the scope of supply.

Rated uninterrupted current I_u	LV HRC fuse links[1] according to DIN 43620[2]		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Size	Operational class						
A			d					
Assembly kits (IP40) comprising: Lockable handle, cover for LV HRC fuse systems (locked in ON state) and three terminal covers for infeed side for basic switch versions without handle								
3-pole, assembly kits for mounting in control cabinet side panels								
• Black handle								
63	00	gG, aM		**3KX3516-3AA**		1	1 unit	1CL
125	00	gG, aM		**3KX3526-3AA**		1	1 unit	1CL
160	00	gG, aM		**3KX3536-3AA**		1	1 unit	1CL
250	1 and 2	gG, aM		**3KX3556-3AA**		1	1 unit	1CL
400	2 and 1	gG, aM		**3KX3556-3AA**		1	1 unit	1CL
• EMERGENCY-STOP red handle								
63	00	gG, aM		**3KX3516-3BA**		1	1 unit	1CL
125	00	gG, aM		**3KX3526-3BA**		1	1 unit	1CL
160	00	gG, aM		**3KX3536-3BA**		1	1 unit	1CL
250	1 and 2	gG, aM		**3KX3556-3BA**		1	1 unit	1CL
400	2 and 1	gG, aM		**3KX3556-3BA**		1	1 unit	1CL

Fuse monitoring through 5TT3170 safety monitor with a floating signaling contact 1 NO, see chapter "Fuse Systems".

1) Silver-plated fuse blades. Silver-plated isolating blades can be used if desired.

2) For the assignment of semiconductor fuses, see page 7/156.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
3KL50 30							
 3KX3552-3DA01	**Terminal covers** For 3-pole devices (1 set = 6 units)	►	**3KX3552-3DA01**		1	1 unit	1CL
 3KX35.7-3AA	**Fuse covers** (interlock only detachable in the OFF position)	►	**3KX3517-3AA**		1	1 unit	1CL
	Cover IP20 For 3-pole devices	►	**3KX3507-0CA02**		1	1 unit	1CL
	Fuse partitions (1 set = 5 units)	►	**3KX3507-0AA01**		1	1 unit	1CL
 3KX3507-0BA01	**Lyre-shaped fuse covers** (1 set = 6 units)		**3KX3507-0BA01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65 Black handle, shaft 300 mm EMERGENCY-STOP (yellow/red), shaft 300 mm		 **8UC7111-1BB10** **8UC7121-3BB10**		 1 1	 1 unit 1 unit	 1CL 1CL
	Operating mechanisms for fixed mounting Black handle, shaft 250 mm	►	**3KX3516-1AA**		1	1 unit	1CL
	Extension shaft 300 mm long		**8UC6031**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6081**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6021**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches** 1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
	Fuse monitor connections (1 set = 6 units)		**3KX3505-0AA**		1	1 unit	1CL

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Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	3KL50 40/3KL52/3KL53						
 3KX3552-3DA01	**Terminal covers** For 3-pole devices (1 set = 6 units)						
	• 3KL52	►	**3KX3552-3DA01**		1	1 unit	1CL
	• 3KL53	►	**3KX3553-3DA01**		1	1 unit	1CL
	For 4-pole devices (1 set = 8 units)						
	• 3KL50 40, 3KL52		**3KX3552-3DB01**		1	1 unit	1CL
	• 3KL53		**3KX3553-3DB01**		1	1 unit	1CL
 3KX35.7-3AA	**Fuse covers**[1] (interlock only detachable in the OFF position)	►	**3KX3527-3AA**		1	1 unit	1CL
	Cover IP20 For 3KL52 3-pole devices	►	**3KX3527-0CA02**		1	1 unit	1CL
	Cover IP20 For 3KL53 3-pole devices	►	**3KX3537-0CA02**		1	1 unit	1CL
	Fuse partitions (1 set = 5 units)	►	**3KX3507-0AA01**		1	1 unit	1CL
 3KX3507-0BA01	**Lyre-shaped fuse covers** (1 set = 6 units)		**3KX3507-0BA01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65						
	Black handle, shaft 300 mm		**8UC7212-1BB20**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7222-3BB20**		1	1 unit	1CL
	Operating mechanisms for fixed mounting Black handle, shaft 250 mm	►	**3KX3536-1AA**		1	1 unit	1CL
	Extension shaft 300 mm long		**8UC6032**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6082**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6022**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches**						
	1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
	1 NO + 1 NC, 20 ms leading		**3KX3552-3EA01**		1	1 unit	1CL
	Fuse monitor connections (1 set = 6 units)		**3KX3505-0AA**		1	1 unit	1CL

[1] For 3KX3527-3AA: Not suitable for use with type A4 BS fuses.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
3KL55/3KL57							
	Terminal covers						
	For 3-pole devices (1 set = 6 units)	►	**3KX3557-3DA01**		1	1 unit	1CL
	For 4-pole devices (1 set = 8 units)		**3KX3557-3DB01**		1	1 unit	1CL
	Fuse covers (interlock only detachable in the OFF position)	►	**3KX3557-3AA**		1	1 unit	1CL
	Cover IP20 For 3-pole devices	►	**3KX3557-0CA02**		1	1 unit	1CL
	Fuse partitions (1 set = 5 units)	►	**3KX3557-0AA01**		1	1 unit	1CL
 3KX35.7-3AA	**Door-coupling rotary operating mechanisms IP65**						
	Black handle, shaft 300 mm		**8UC7313-1BB30**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7323-3BB30**		1	1 unit	1CL
 3KX3176-1E	**Operating mechanisms for fixed mounting, size 3** Black handle, shaft 250 mm	►	**3KX3176-1E**		1	1 unit	1CL
	Extension shaft 300 mm long		**8UC6033**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6083**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6023**		1	1 unit	1CL
	Auxiliary switches						
 3SB1400-0A	1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
	1 NO + 1 NC, 20 ms leading		**3KX3552-3EA01**		1	1 unit	1CL
	Fuse monitor connections (1 set = 6 units)		**3KX3505-0AA**		1	1 unit	1CL
3KL61/3KL62							
	Terminal covers						
	For 3-pole devices (1 set = 6 units)	►	**3KX3561-3DA01**		1	1 unit	1CL
	For 4-pole devices (1 set = 8 units)		**3KX3561-3DB01**		1	1 unit	1CL
	Fuse covers						
	Cover plate		**3KX3561-0AA00**		1	1 unit	1CL
	Complete covers[1]		**3KX3561-1AA00**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65						
	Black handle, shaft 300 mm		**8UC7414-1BB44** +				
		►	**8UC9253**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7424-3BB44** +				
 8UC9253		►	**8UC9253**		1	1 unit	1CL
	Operating mechanisms for fixed mounting, size 5 Black handle, shaft 250 mm	►	**3KX3616-1A**		1	1 unit	1CL
	Extension shaft 300 mm long		**8UC6034**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6084**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6024**		1	1 unit	1CL
	Auxiliary switches [2]						
	1 NO + 1 NC		**3KX3612-1B**		1	1 unit	1CL

[1] Only for LV HRC fuse systems.

[2] For more 3SB3400-0. contact blocks with other contact types, see Catalog IC 10, chapter "Commanding and Signaling Devices".

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Overview

The 3KL switch disconnectors with fuses are suitable for all fuses in LV HRC design, see chapter "Fuse Systems". SITOR semiconductor fuses in LV HRC design can also be used, although it must be noted that, compared to cable and line protection fuses, these get much hotter during operation. For this reason, the fuse must be operated below the rated current I_n of the device (derating) when installed in a closed switching device.

The following table shows the permissible load currents of the SITOR semiconductor fuses for installation in 3KL. The values were determined using the conductor cross-sections specified in the table.

Note

If using smaller cross-sections, a considerably higher derating is required due to the lower heat dissipation.

SITOR semiconductor fuses for 3KL fuse switch disconnectors: Assignment table

SITOR semiconductor fuse data						Permissible load currents of fuse when installed in 3KL for floor mounting					
						Type 3KL			Alternative type 3KL		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4)]
	A	V AC			mm²			A			A
3NC423..	150	500	gR	3	70	3KL61	3	145	3KL62	3	150
3NC425..	200	500	gR	3	95	3KL61	3	180	3KL62	3	190
3NC427..	250	500	gR	3	120	3KL61	3	225	3KL62	3	240
3NC428..	300	500	gR	3	185	3KL61	3	255	3KL62	3	270
3NC431..	350	500	gR	3	240	3KL61	3	330	3KL62	3	345
3NC432..	400	500	aR	3	240	3KL61	3	400	3KL62	3	400
3NC3336-1	630	1000	aR	3	2x (40x5)	3KL62	3	500	3KL61	3	480
3NC3337-1	710	1000	aR	3	2x (50x5)	3KL62	3	540	--	--	--
3NC3338-1	800	1000	aR	3	2x (40x8)	3KL62	3	600	--	--	--
3NC3340-1	900	1000	aR	3	2x (40x8)	3KL62	3	650	--	--	--
3NC3341-1	1000	1000	aR	3	2x (50x8)	3KL62	3	720	--	--	--
3NC3342-1	1100	800	aR	3	2x (50x8)	3KL62	3	800	--	--	--
3NC3343-1	1250	800	aR	3	2x (50x8)	3KL62	3	800	--	--	--
3NC3430-1	315	1250	aR	3	2x95	3KL61	3	285	3KL62	3	300
3NC3432-1	400	1250	aR	3	2x120	3KL61	3	365	3KL62	3	380
3NC3434-1	500	1250	aR	3	2x150	3KL61	3	425	3KL62	3	450
3NC3436-1	630	1250	aR	3	2x (40x5)	3KL61	3	500	3KL62	3	540
3NC3438-1	800	1100	aR	3	2x (40x8)	3KL62	3	650	--	--	--
3NC8423..	150	660	gR	3	70	3KL61	3	135	3KL62	3	140
3NC8425..	200	660	gR	3	95	3KL61	3	180	3KL62	3	190
3NC8427..	250	660	gR	3	120	3KL61	3	225	3KL62	3	240
3NC8431..	350	660	gR	3	240	3KL61	3	300	3KL62	3	315
3NC8434..	500	660	gR	3	2x 150	3KL61	3	425	3KL62	3	450
3NC8444..	1000	600	aR	3	2x (60x6)	3KL62	3	800	3KL61	3	630
3NE1020-2	80	690	gR	00	25	3KL52	00	80	3KL53	00	80
3NE1021-0	100	690	gS	00	35	3KL52	00	100	3KL53	00	100
3NE1021-2	100	690	gR	00	35	3KL52	00	100	3KL53	00	100
3NE1022-0	125	690	gS	00	50	3KL52	00	125	3KL53	00	125
3NE1022-2	125	690	gR	00	50	3KL52	00	125	3KL53	00	125
3NE1224-0	160	690	gS	1	70	3KL55	1	160	3KL57	2	160
3NE1224-2/-3	160	690	gR	1	70	3KL55	1	160	3KL57	2	160
3NE1225-0	200	690	gS	1	95	3KL55	1	200	3KL57	2	200
3NE1225-2/-3	200	690	gR	1	95	3KL55	1	200	3KL57	2	200
3NE1227-0	250	690	gS	1	120	3KL55	1	250	3KL57	2	250
3NE1227-2/-3	250	690	gR	1	120	3KL55	1	245	3KL57	2	250
3NE1230-0	315	690	gS	1	2x 70	3KL57	2	315	--	--	--
3NE1230-2/-3	315	690	gR	1	2x 70	3KL57	2	280	--	--	--
3NE1331-0	350	690	gS	2	2x 95	3KL57	2	330	3KL61	3	350
3NE1331-2/-3	350	690	gR	2	2x 95	3KL57	2	300	3KL61	3	350
3NE1332-0	400	690	gS	2	2x 95	3KL57	2	375	3KL61	3	400
3NE1332-2/-3	400	690	gR	2	2x 95	3KL57	2	340	3KL61	3	400
3NE1333-0	450	690	gS	2	2x 120	3KL61	3	450	3KL62	3	450
3NE1333-2/-3	450	690	gR	2	2x 120	3KL61	3	450	3KL62	3	450
3NE1334-0	500	690	gS	2	2x 120	3KL61	3	500	3KL62	3	500
3NE1334-2/-3	500	690	gR	2	2x 120	3KL61	3	500	3KL62	3	500
3NE1435-0	560	690	gS	3	2x 150	3KL61	3	560	3KL62	3	560
3NE1435-2/-3	560	690	gR	3	2x 150	3KL61	3	560	3KL62	3	560

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SITOR semiconductor fuse data						Permissible load currents of fuse when installed in 3KL for floor mounting					
						Type 3KL			Alternative type 3KL		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current [4)]
	A	V AC			mm²			A			A
3NE1436-0	630	690	gS	3	2x 185	3KL61	3	630	3KL62	3	630
3NE1436-2/-3	630	690	gR	3	2x 185	3KL61	3	615	3KL62	3	630
3NE1437-0	710	690	gS	3	2x (40x5)	3KL61	3	630	3KL62	3	710
3NE1437-1	710	600	gR	3	2x (40x5)	3KL61	3	630	3KL62	3	710
3NE1437-2/-3	710	690	gR	3	2x (40x5)	3KL61	3	630	3KL62	3	700
3NE1438-0	800	690	gS	3	2x (50x5)	3KL61	3	630	3KL62	3	800
3NE1438-1	800	600	gR	3	2x (50x5)	3KL61	3	630	3KL62	3	800
3NE1438-2/-3	800	690	gR	3	2x (50x5)	3KL61	3	630	3KL62	3	760
3NE1447-2/-3	670	690	gR	3	2x (40x5)	3KL61	3	630	3KL62	3	670
3NE1448-2/-3	850	690	gR	3	2x (40x8)	3KL61	3	630	3KL62	3	790
3NE1802-0	40	690	gS	000	10	3KL50	00	40	3KL52	00	40
3NE1803-0	35	690	gS	000	6	3KL50	00	35	3KL52	00	35
3NE1813-0	16	690	gS	000	1.5	3KL50	00	16	3KL52	00	16
3NE1814-0	20	690	gS	000	2.5	3KL50	00	20	3KL52	00	20
3NE1815-0	25	690	gS	000	4	3KL50	00	25	3KL52	00	25
3NE1817-0	50	690	gS	000	10	3KL50	00	50	3KL52	00	50
3NE1818-0	63	690	gS	000	16	3KL50	00	63	3KL52	00	63
3NE1820-0	80	690	gS	000	25	3KL52	00	80	--	--	--
3NE3221	100	1000	aR	1	35	3KL55	1	90	3KL57	2	95
3NE3222	125	1000	aR	1	50	3KL55	1	110	3KL57	2	115
3NE3224	160	1000	aR	1	70	3KL55	1	140	3KL57	2	150
3NE3225	200	1000	aR	1	95	3KL55	1	175	3KL57	2	180
3NE3227	250	1000	aR	1	120	3KL55	1	210	3KL57	2	220
3NE3230-0B	315	1000	aR	1	185	3KL57	2	240	--	--	--
3NE3231	350	1000	aR	1	240	3KL57	2	265	--	--	--
3NE3232-0B	400	1000	aR	1	240	3KL57	2	290	--	--	--
3NE3233	450	1000	aR	1	2x 150	3KL57	2	320	--	--	--
3NE3332-0B	400	1000	aR	2	240	3KL61	3	340	3KL62	3	360
3NE3333	450	1000	aR	2	2x 150	3KL61	3	380	3KL62	3	400
3NE3334-0B	500	1000	aR	2	2x 150	3KL61	3	440	3KL62	3	470
3NE3335	560	1000	aR	2	2x 185	3KL61	3	500	3KL62	3	530
3NE3336	630	1000	aR	2	2x 185	3KL61	3	540	3KL62	3	580
3NE3337-8	710	900	aR	2	2x (40x5)	3KL61	3	600	3KL62	3	640
3NE3338-8	800	800	aR	2	2x 240	3KL61	3	630	3KL62	3	720
3NE3340-8	900	690	aR	2	2x (40x8)	3KL61	3	630	3KL62	3	800
3NE4101	32	1000	gR	0	6	3KL55	1	32	--	--	--
3NE4102	40	1000	gR	0	10	3KL55	1	40	--	--	--
3NE4117	50	1000	gR	0	10	3KL55	1	50	--	--	--
3NE4118	63	1000	aR	0	16	3KL55	1	63	--	--	--
3NE4120	80	1000	aR	0	25	3KL55	1	80	--	--	--
3NE4121	100	1000	aR	0	35	3KL55	1	95	--	--	--
3NE4122	125	1000	aR	0	50	3KL55	1	120	--	--	--
3NE4124	160	1000	aR	0	70	3KL55	1	150	--	--	--
3NE4327-0B	250	800	aR	2	150	3KL57	2	175	3KL61	3	200
3NE4330-0B	315	800	aR	2	240	3KL57	2	230	3KL61	3	260
3NE4333-0B	450	800	aR	2	2x (30x5)	3KL57	2	340	3KL61	3	370
3NE4334-0B	500	800	aR	2	2x (30x5)	3KL61	3	425	3KL62	3	450
3NE4337	710	800	aR	2	2x (50x5)	3KL61	3	600	3KL62	3	630
3NE8015-1	25	690	gR	00	4	3KL50	00	25	3KL52	00	25
3NE8003-1	35	690	gR	00	6	3KL50	00	33	3KL52	00	35
3NE8017-1	50	690	gR	00	10	3KL50	00	45	3KL52	00	50
3NE8018-1	63	690	gR	00	16	3KL50	00	54	3KL52	00	60
3NE8020-1	80	690	aR	00	25	3KL52	00	68	--	--	--
3NE8021-1	100	690	aR	00	35	3KL52	00	89	--	--	--
3NE8022-1	125	690	aR	00	50	3KL52	00	106	--	--	--
3NE8024-1	160	690	aR	00	70	3KL52	00	130[5)]	--	--	--

1) Due to the mechanical stress on the relatively long fuse blades, SITOR 3NE41 semiconductor fuses should only be switched occasionally and only at zero current.

2) For permissible load currents for 3NE8…-0MK, see Configuration Manual "Fuse Systems", or on request.

3) Fuses with a rated voltage of > 690 V may only be operated at max. 690 V (rated voltage of the 3KL) when installed in 3KL.

4) In the case of cyclic loads, the currents may have to be further reduced (precise values on request).

5) The fuse can also be operated at a higher rated uninterrupted current than the 125 A current of the 3KL52. However, in this case, the 3KL52 must not be switched under load (utilization category AC-20).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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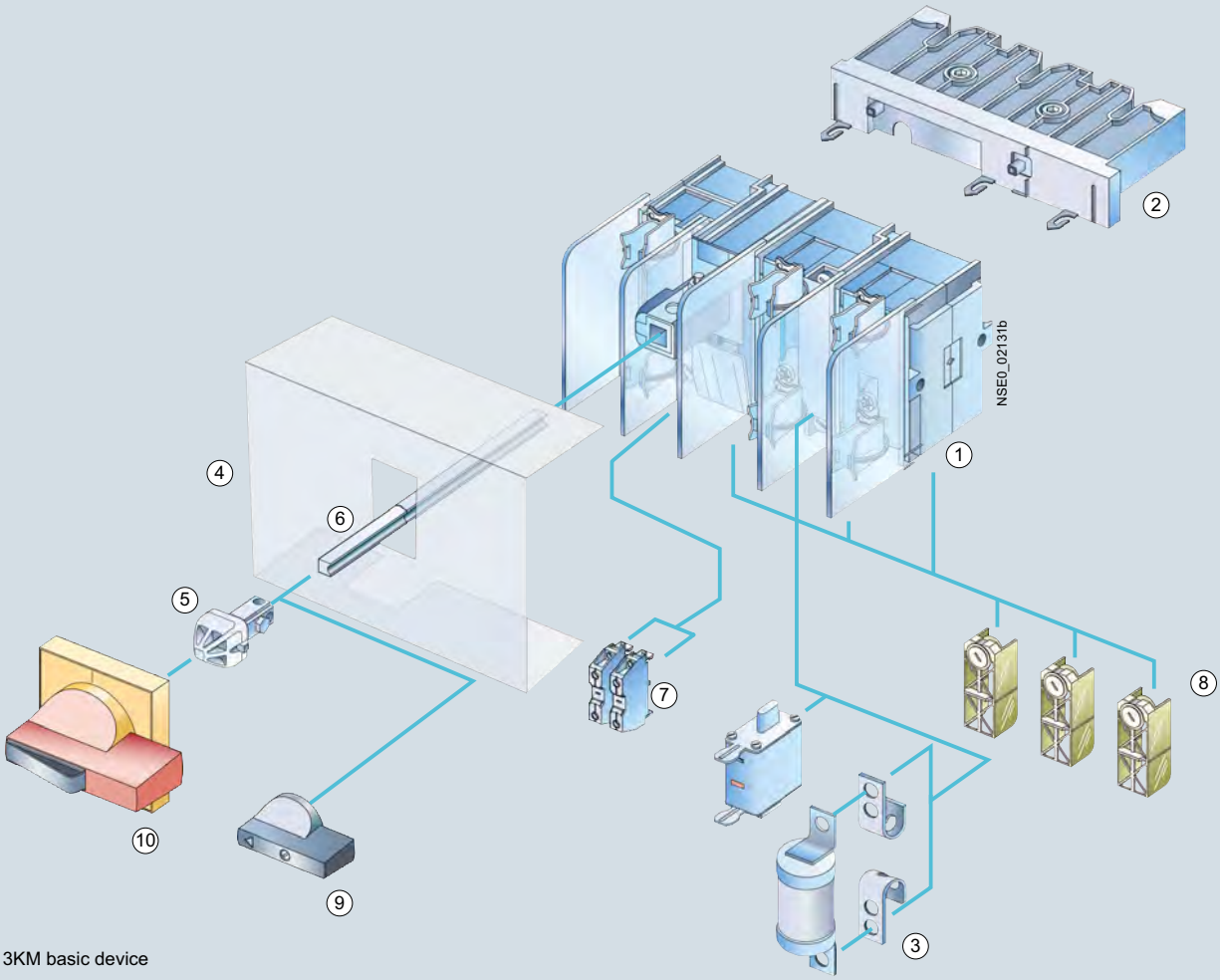
Introduction

Overview



1. 3KM basic device
2. Plug-in contact strip for 3KM (part of basic device)
3. Fuses, optionally BS 88 or LV HRC fuses
4. Terminal cover, IP20 (vertical to operator side)
5. Coupling driver
6. Extension shaft
7. Standard products from the Siemens 3SB1 range are used as auxiliary switches.

All components from the switch to the actuator are provided with non-interchangeability features.

Optional

8. Single-pole terminal cover from 63 A to 630 A, IP20 (vertical to operator side)
9. 8UC9 knob for fixed mounting in standard version (black) or EMERGENCY-STOP version (red), or
10. 8UC7 door-coupling rotary operating mechanism in standard version (ti-gray) or EMERGENCY-STOP version (red/yellow)

All switch disconnectors feature double contact interruption and an isolating distance. As a result, the fuses are de-energized when the switch disconnectors are in the disconnected position.

The 3KM switch disconnectors with fuses also feature an isolating plug connector. This facilitates mounting and contact establishment in motor control centers (MCCs) in conjunction with vertical busbars. Generally, all 3K. 5 switch disconnectors can be secured to the shaft with a padlock to prevent unauthorized reclosing.

Identical accessories for 3KA switch disconnectors and for 3KL and 3KM switch disconnectors with fuses simplify stock keeping. Please inquire about a special variant with reduced values that is particularly resistant to atmospheres high in sulfur, e.g. in the paper and cellulose processing industries.

Application

3KM switch disconnectors with fuses protect against overload and short-circuits as main control and EMERGENCY-STOP switches of switchboard assemblies, distribution boards, power supply and motor outgoing feeders. In conjunction with SITOR semiconductor fuses, they are also used in UPS systems, frequency converters and capacitor control systems.

All 3K switch disconnectors are climate-proof and meet the requirements of IEC 60947-1, IEC 60947-3 and VDE 0660 Part 107.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards		**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**				
Type		**3KM50**	**3KM52**	**3KM53**	**3KM55**	**3KM57**
Rated uninterrupted current I_u For fuse links according to DIN 43620, (when SITOR semiconductor fuses are used, a reduction of rated current is necessary, see reference to technical information at start of chapter)	A Size	63 00 and 000	125 00 and 000	160 00 and 000	250 1 and 2	400 1 and 2
Conventional free air thermal current I_{th}[1]	A	63	125	160	250	400
Rated insulation voltage U_i	V	690	1000	1000	1000	1000
Rated impulse withstand voltage U_{imp}	kV	6	8	8	8	8
Rated operational voltage U_e						
50/60 Hz AC	V	690				
DC	V V	440 (3 conducting paths series-connected) 220 (2 conducting paths series-connected)[2]				
Rated short-circuit making capacity with fuses (peak value, at 50/60 Hz 690 V AC)	kA	220	220	220	176	176
Rated conditional short-circuit current with fuses At 50/60 Hz 690 V AC (rms value)	kA	100	100	100	80	80
Max. rated current I_n of fuses	A	80	160	160	400	400
Max. permissible power loss of the installed fuse						
• LV HRC	W	6	9	11.5	32	45
• BS	W	8 (A2/A3)	11.5 (A4)	11.5	32	45
Permissible let-through current of the fuses	kA	8	17	17	30[3]	30[3]
Maximum permissible let-through I^2t value	kA^2s	55	223	223	1000	1000
Breaking capacity (infeed from the top or bottom)						
At 400 V AC						
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	1000	1280	2000	3200
• Rated operational current I_e at AC-21A, AC-22A, AC-23A	A	63	125	160	250	400
• Motor switching capacity AC-23A	kW	30	65	80	132	200
At 500 V AC						
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	1000	1280	2000	3200
• Rated operational current I_e at AC-21A, AC-22A, AC-23A	A	63	125	160	250	400
• Motor switching capacity AC-23A	kW	40	90	110	185	280
At 690 V AC						
• Breaking current I_c (at p.f. = 0.35, rms value)	A	500	1000	1280	2000	3200
• Rated operational current I_e at AC-21A, AC-22A, AC-23A	A	63	125	160	250	400
• Motor switching capacity AC-23A	kW	50	110	150	220	375
At 440 V DC (3 conducting paths series-connected)[4]						
• Breaking current I_c (L/R = 15 ms)	A	250	500	640	1000[4]	1600
• Rated operational current I_e at DC-23A	A	63	125	160	250[5]	400
Rated short-time current (1 s current), rms value	kA	2.5	3.2	3.2	8	11
Permissible ambient temperature	°C °C	-25 ... +55 for operation[6] -50 ... +80 during storage				
Mechanical endurance, operating cycles		15000	15000	15000	12000	12000
Degree of protection		IP00/IP20 (from the operator side, with fuse and terminal covers)				
Power loss of the switch at I_{th} (plus power loss of the fuses)	W	8.5	22	36	33	86
Main conductor connections						
Busbar systems, max. dimensions (W x T)	mm	25 x 9	45 x 10	45 x 10	40 x 12	40 x 15
Cable lug, max. conductor cross-section (stranded)	mm^2	35	70	120	150	2 x 150 or 1 x 240
Busbar systems, max. dimensions (W x T)	mm	25 x 9	45 x 10	45 x 10	40 x 12	40 x 15
Tightening torque	Nm	6 ... 7.5	7 ... 10	18 ... 22	35 ... 45	35 ... 45
Terminal screws		M6	M6	M8	M10	M10
Protective conductor connections						
Flat bars	mm	--	--	--	20 x 2.5	20 x 2.5
Cable lug, max. conductor cross-section (stranded)	mm^2	--	--	--	70	120

1) Configuring note: Max. permissible operating temperature for fuse blades 135 °C, for connections 100 °C.

2) 110 V (one conducting path).

3) 220 V DC (L1 and L3 series-connected) or 110 V DC (one conducting path) at DC-23A.

4) At 440 V L/R = 4 ms, at 220 V L/R = 1 ms.

5) At 440 V DC-22A, at 220 V DC-23A.

6) 3ND1 switching device protection fuse.

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For snapping onto busbar system

Selection and ordering data

All switch disconnectors with degree of protection IP00:

- Mounting on vertical busbars with busbar center-to-center spacing of 60 mm and bar thickness from 5 mm to 6.35 mm
- Conductor connecting screws and fuse partitions are generally included in the scope of supply.

Rated uninterrupted current I_u	LV HRC fuse links[1] according to DIN 43620[2]		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Size	Operational class						
A			d					
Complete versions with 8UC7 door-coupling rotary operating mechanism								
3-pole for LV HRC fuse systems								
• (black handle)								
63	00 and 000	gG, aM		**3KM5030-1GB01**		1	1 unit	1CL
125	00 and 000	gG, aM		**3KM5230-1GB01**		1	1 unit	1CL
160	00 and 000	gG, aM		**3KM5330-1GB01**		1	1 unit	1CL
250	1 and 2	gG, aM		**3KM5530-1GB01**		1	1 unit	1CL
400	2 and 1	gG, aM		**3KM5730-1GB01**		1	1 unit	1CL
3-pole for fuses acc. to BS 88								
• Complete versions with 8UC7 door-coupling rotary operating mechanism (black handle)								
125	Form A2/A3			**3KM5230-1GG01**		1	1 unit	1CL
125	Form A4			**3KM5230-1GJ01**		1	1 unit	1CL
160	Form A4			**3KM5330-1GJ01**		1	1 unit	1CL
250	Form B1-B3			**3KM5530-1GG01**		1	1 unit	1CL
400	Form B1-B3			**3KM5730-1GG01**		1	1 unit	1CL
Basic switch versions without handle								
3-pole for LV HRC fuse systems								
63	00 and 000	gG, aM		**3KM5030-1AB01**		1	1 unit	1CL
125	00 and 000	gG, aM		**3KM5230-1AB01**		1	1 unit	1CL
160	00 and 000	gG, aM		**3KM5330-1AB01**		1	1 unit	1CL
250	1 and 2	gG, aM		**3KM5530-1AB01**		1	1 unit	1CL
400	2 and 1	gG, aM		**3KM5730-1AB01**		1	1 unit	1CL
3-pole for fuses acc. to BS 88								
63	Form A2/A3			**3KM5030-1AG01**		1	1 unit	1CL
125	Form A2/A3			**3KM5230-1AG01**		1	1 unit	1CL
125	Form A4			**3KM5230-1AJ01**		1	1 unit	1CL
160	Form A4			**3KM5330-1AJ01**		1	1 unit	1CL
250	Form B1-B3			**3KM5530-1AG01**		1	1 unit	1CL
400	Form B1-B3			**3KM5730-1AG01**		1	1 unit	1CL
8UC7 EMERGENCY-STOP door-coupling rotary operating mechanisms (red handle, yellow indicator plate) for basic switch versions without handle								
63	00 and 000	gG, aM		**8UC7121-3BB10**		1	1 unit	1CL
125	00 and 000	gG, aM		**8UC7222-3BB20**		1	1 unit	1CL
160	00 and 000	gG, aM		**8UC7222-3BB20**		1	1 unit	1CL
250	1 and 2	gG, aM		**8UC7323-3BB30**		1	1 unit	1CL
400	2 and 1	gG, aM		**8UC7323-3BB30**		1	1 unit	1CL
• 8UC7 EMERGENCY-STOP door-coupling rotary operating mechanisms (red handle, yellow indicator plate)								
63	Form A2/A3			**8UC7121-3BB10**		1	1 unit	1CL
125	Form A2/A3			**8UC7222-3BB20**		1	1 unit	1CL
125	Form A4			**8UC7222-3BB20**		1	1 unit	1CL
160	Form A4			**8UC7222-3BB20**		1	1 unit	1CL
250	Form B1-B3			**8UC7323-3BB30**		1	1 unit	1CL
400	Form B1-B3			**8UC7323-3BB30**		1	1 unit	1CL



3KM5330-1AB01
with fuses



3KM5530-1AG01
with fuses



8UC7121-3BB10

Fuse monitoring through 5TT3 170 safety monitor with a floating signaling contact 1 NO, see chapter "Fuse Systems".

[1] Silver-plated fuse blades. Silver-plated isolating blades can be used if desired.

[2] For assignment of semiconductor fuses, see page 7/163.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
3KM50								
	Terminal covers For 3-pole devices (1 set = 6 units)		▶	**3KX3552-3DA01**		1	1 unit	1CL
 3KX35.7-3AA	**Fuse covers** (interlock only detachable in the OFF position)		▶	**3KX3517-3AA**		1	1 unit	1CL
	Fuse partitions (1 set = 5 units)		▶	**3KX3507-0AA01**		1	1 unit	1CL
 3KX3507-0BA01	**Lyre-shaped fuse covers** (1 set = 6 units)			**3KX3507-0BA01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65							
	Black handle, shaft 300 mm			**8UC7111-1BB10**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm			**8UC7121-3BB10**		1	1 unit	1CL
	Operating mechanisms for fixed mounting Black handle, shaft 250 mm		▶	**3KX3516-1AA**		1	1 unit	1CL
	Extension shaft 300 mm long			**8UC6031**		1	1 unit	1CL
	Extension shaft 600 mm long			**8UC6081**		1	1 unit	1CL
	Shaft connecting pieces			**8UC6021**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches** 1 NO + 1 NC			**3SB1400-0A**		1	1 unit	41J
	Fuse monitor connections (1 set = 6 units)			**3KX3505-0AA**		1	1 unit	1CL
3KM52/3KM53								
	Terminal covers							
	For 3-pole devices (1 set = 6 units)	3KM52	▶	**3KX3552-3DA01**		1	1 unit	1CL
		3KM53	▶	**3KX3553-3DA01**		1	1 unit	1CL
 3KX35.7-3AA	**Fuse covers**[1] (interlock only detachable in the OFF position)		▶	**3KX3527-3AA**		1	1 unit	1CL
	Fuse partitions (1 set = 5 units)		▶	**3KX3507-0AA01**		1	1 unit	1CL
 3KX3507-0BA01	**Lyre-shaped fuse covers** (1 set = 6 units)			**3KX3507-0BA01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65							
	Black handle, shaft 300 mm			**8UC7212-1BB20**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm			**8UC7222-3BB20**		1	1 unit	1CL
	Operating mechanisms for fixed mounting Black handle, shaft 250 mm		▶	**3KX3536-1AA**		1	1 unit	1CL

[1] For 3KX3527-3AA: Not suitable for use with type A4 BS fuses.

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Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Extension shaft 300 mm long		**8UC6032**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6082**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6022**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches**						
	1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
	20 ms leading, 1 NO + 1 NC		**3KX3552-3EA01**		1	1 unit	1CL
	Fuse monitor connections (1 set = 6 units)		**3KX3505-0AA**		1	1 unit	1CL
3KM55/3KM57							
	Terminal covers						
	For 3-pole devices (1 set = 6 units)	►	**3KX3557-3DA01**		1	1 unit	1CL
	For 4-pole devices (1 set = 8 units)		**3KX3557-3DB01**		1	1 unit	1CL
 3KX35.7-3AA	**Fuse covers** (interlock only detachable in the OFF position)	►	**3KX3557-3AA**		1	1 unit	1CL
 3KX3557-0AA01	**Fuse partitions** (1 set = 5 units)	►	**3KX3557-0AA01**		1	1 unit	1CL
	Door-coupling rotary operating mechanisms IP65						
	Black handle, shaft 300 mm		**8UC7313-1BB30**		1	1 unit	1CL
	EMERGENCY-STOP (yellow/red), shaft 300 mm		**8UC7323-3BB30**		1	1 unit	1CL
 3KX3176-1E	**Operating mechanisms for fixed mounting, size 3** Black handle, shaft 250 mm	►	**3KX3176-1E**		1	1 unit	1CL
	Extension shaft 300 mm long		**8UC6033**		1	1 unit	1CL
	Extension shaft 600 mm long		**8UC6083**		1	1 unit	1CL
	Shaft connecting pieces		**8UC6023**		1	1 unit	1CL
 3SB1400-0A	**Auxiliary switches**						
	1 NO + 1 NC		**3SB1400-0A**		1	1 unit	41J
	20 ms leading, 1 NO + 1 NC		**3KX3552-3EA01**		1	1 unit	1CL
	Fuse monitor connections (1 set = 6 units)		**3KX3505-0AA**		1	1 unit	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The 3KM switch disconnectors with fuses are suitable for all fuses in LV HRC design, see chapter "Fuse Systems".

SITOR semiconductor fuses in LV HRC design can also be used, although it must be noted that, compared to cable and line protection fuses, these get much hotter during operation. For this reason, the fuse must be operated below the rated current I_n of the device (derating) when installed in a closed switching device.

The following table shows the permissible load currents of the SITOR semiconductor fuses for installation in 3KM. The values were determined using the conductor cross-sections specified in the table.

Note

If using smaller cross-sections, a considerably higher derating is required due to the lower heat dissipation.

SITOR semiconductor fuses for 3KM fuse switch disconnectors: Assignment table

SITOR semiconductor fuse data						**Permissible rated currents of fuse when installed in 3KM for busbar mounting**					
						Type 3KM			**Alternative type 3KM**		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4)]
	A	V AC			mm²			A			A
3NE1020-2	80	690	gR	00	25	3KM52	00	80	3KM53	00	80
3NE1021-0	100	690	gS	00	35	3KM52	00	100	3KM53	00	100
3NE1021-2	100	690	gR	00	35	3KM52	00	100	3KM53	00	100
3NE1022-0	125	690	gS	00	50	3KM52	00	125	3KM53	00	125
3NE1022-2	125	690	gR	00	50	3KM52	00	125	3KM53	00	125
3NE1224-0	160	690	gS	1	70	3KM55	1	160	3KM57	2	160
3NE1224-2/-3	160	690	gR	1	70	3KM55	1	160	3KM57	2	160
3NE1225-0	200	690	gS	1	95	3KM55	1	200	3KM57	2	200
3NE1225-2/-3	200	690	gR	1	95	3KM55	1	200	3KM57	2	200
3NE1227-0	250	690	gS	1	120	3KM55	1	250	3KM57	2	250
3NE1227-2/-3	250	690	gR	1	120	3KM55	1	245	3KM57	2	250
3NE1230-0	315	690	gS	1	2x 70	3KM57	2	315	--	--	--
3NE1230-2/-3	315	690	gR	1	2x 70	3KM57	2	280	--	--	--
3NE1331-0	350	690	gS	2	2x 95	3KM57	2	330	--	--	--
3NE1331-2/-3	350	690	gR	2	2x 95	3KM57	2	300	--	--	--
3NE1332-0	400	690	gS	2	2x 95	3KM57	2	375	--	--	--
3NE1332-2/-3	400	690	gR	2	2x 95	3KM57	2	315	--	--	--
3NE1333-0	450	690	gS	2	2x 120	3KM57	2	400	--	--	--
3NE1333-2/-3	450	690	gR	2	2x 120	3KM57	2	325	--	--	--
3NE1334-0	500	690	gS	2	2x 120	3KM57	2	400	--	--	--
3NE1334-2/-3	500	690	gR	2	2x 120	3KM57	2	350	--	--	--
3NE1802-0	40	690	gS	000	10	3KM50	00	40	3KM52	00	40
3NE1803-0	35	690	gS	000	6	3KM50	00	35	3KM52	00	35
3NE1813-0	16	690	gS	000	1.5	3KM50	00	16	3KM52	00	16
3NE1814-0	20	690	gS	000	2.5	3KM50	00	20	3KM52	00	20
3NE1815-0	25	690	gS	000	4	3KM50	00	25	3KM52	00	25
3NE1817-0	50	690	gS	000	10	3KM50	00	50	3KM52	00	50
3NE1818-0	63	690	gS	000	16	3KM50	00	63	3KM52	00	63
3NE1820-0	80	690	gS	000	25	3KM52	00	80	--	--	--
3NE3221	100	1000	aR	1	35	3KM55	1	90	3KM57	2	95
3NE3222	125	1000	aR	1	50	3KM55	1	110	3KM57	2	115
3NE3224	160	1000	aR	1	70	3KM55	1	140	3KM57	2	150
3NE3225	200	1000	aR	1	95	3KM55	1	175	3KM57	2	180
3NE3227	250	1000	aR	1	120	3KM55	1	210	3KM57	2	220
3NE3230-0B	315	1000	aR	1	185	3KM57	2	240	--	--	--
3NE3231	350	1000	aR	1	240	3KM57	2	265	--	--	--
3NE3232-0B	400	1000	aR	1	240	3KM57	2	290	--	--	--
3NE3233	450	1000	aR	1	2x 150	3KM57	2	320	--	--	--
3NE3332-0B	400	1000	aR	2	240	3KM57	2	290	--	--	--
3NE3333	450	1000	aR	2	2x 150	3KM57	2	320	--	--	--
3NE3334-0B	500	1000	aR	2	2x 150	3KM57	2	360	--	--	--
3NE3335	560	1000	aR	2	2x 185	3KM57	2	400	--	--	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Fuses

SITOR semiconductor fuse data						Permissible rated currents of fuse when installed in 3KM for busbar mounting					
						Type 3KM			Alternative type 3KM		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4)]
	A	V AC			mm²			A			A
3NE3336	630	1000	aR	2	2x 185	3KM57	2	400	--	--	--
3NE3337-8	710	900	aR	2	2x (40x5)	3KM57	2	400	--	--	--
3NE3338-8	800	800	aR	2	2x 240	3KM57	2	400	--	--	--
3NE3340-8	900	690	aR	2	2x (40x8)	3KM57	2	400	--	--	--
3NE4101	32	1000	gR	0	6	3KM55	1	32	--	--	--
3NE4102	40	1000	gR	0	10	3KM55	1	40	--	--	--
3NE4117	50	1000	gR	0	10	3KM55	1	50	--	--	--
3NE4118	63	1000	aR	0	16	3KM55	1	63	--	--	--
3NE4120	80	1000	aR	0	25	3KM55	1	80	--	--	--
3NE4121	100	1000	aR	0	35	3KM55	1	95	--	--	--
3NE4122	125	1000	aR	0	50	3KM55	1	120	--	--	--
3NE4124	160	1000	aR	0	70	3KM55	1	150	--	--	--
3NE4327-0B	250	800	aR	2	150	3KM57	2	175	--	--	--
3NE4330-0B	315	800	aR	2	240	3KM57	2	230	--	--	--
3NE4333-0B	450	800	aR	2	2x (30x5)	3KM57	2	340	--	--	--
3NE4334-0B	500	800	aR	2	2x (30x5)	3KM57	2	380	--	--	--
3NE4337	710	800	aR	2	2x (50x5)	3KM57	2	400	--	--	--
3NE8015-1	25	690	gR	00	4	3KM50	00	25	3KM52	00	25
3NE8003-1	35	690	gR	00	6	3KM50	00	33	3KM52	00	35
3NE8017-1	50	690	gR	00	10	3KM50	00	45	3KM52	00	50
3NE8018-1	63	690	gR	00	16	3KM50	00	54	3KM52	00	60
3NE8020-1	80	690	aR	00	25	3KM52	00	68	--	--	--
3NE8021-1	100	690	aR	00	35	3KM52	00	89	--	--	--
3NE8022-1	125	690	aR	00	50	3KM52	00	106	--	--	--
3NE8024-1	160	690	aR	00	70	3KM52	00	130[5)]	--	--	--

1) Due to the mechanical stress on the relatively long fuse blades, SITOR 3NE41 semiconductor fuses should only be switched occasionally and only at zero current.

2) For permissible load currents for 3NE8…-0MK, see Configuration Manual "Fuse Systems", or on request.

3) Fuses with a rated voltage > 690 V may only be operated at max. 690 V when installed in 3KM (rated voltage of the 3KM).

4) In the case of cyclic loads, the currents may have to be further reduced (precise values on request).

5) The fuse can also be operated at a higher rated uninterrupted current than the 125 A current of the 3KM52. However, in this case, the 3KM52 must not be switched under load (utilization category AC-20).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

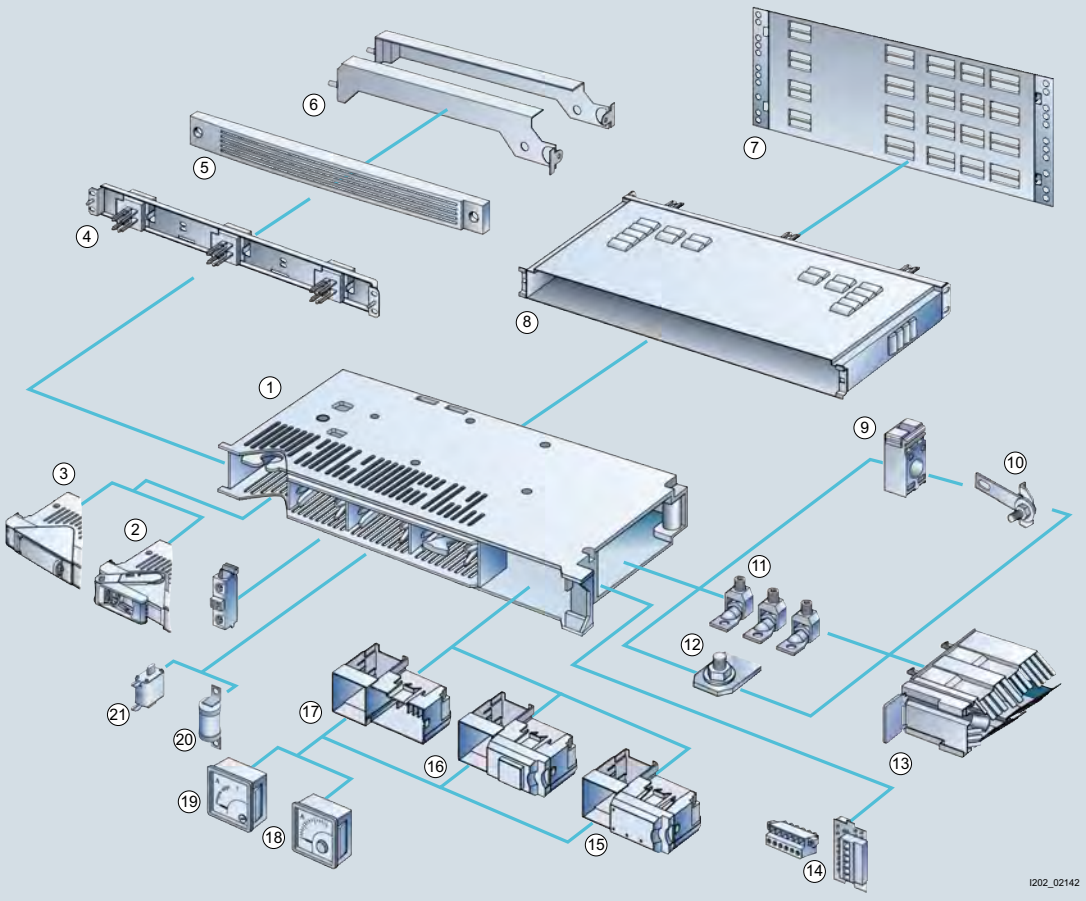


3NJ62 switch disconnectors with fuses

All key product features at a glance

- In-line design
- Type-tested according to IEC EN 60947-3
- Voltage levels up to 690 V AC/440 V DC
- 160 A to 630 A for LV HRC and BS 88 fuse links, according to IEC 60269-1/EN 60269-1
- 2, 3 and 4-pole versions available
- 185 mm phase center distance of plug-in contacts
- Manually operated or with motorized operating mechanism
- Electronic fuse monitoring (EFM)
- Developed for switchboard in plug-in design
- Horizontal or vertical mounting position
- Front panel locked in ON position
- Degree of protection IP41

Overview of all components and accessory parts



1. 3NJ62 switch disconnector basic device here in size 00, open, without front cover
2. Manual operating mechanism
3. Motorized operating mechanism
4. Connection module
6. Blanking cover
5. Guide rails
7. Busbar cover
8. Contact extension
9. Current transformer
10. Current transformer bar
11. Connection terminals
12. Stud terminal
13. Terminal cover
14. Multifunction plug
15. Holder for measuring device with electronic fuse monotoring (EFM 10)
16. Holder for measuring device with electronic fuse monotoring (EFM 20/25)
17. Holder for measuring device without EFM
18. Bimetal current measuring device
19. Moving-iron current measuring device
20. BS fuse
21. LV HRC fuse
22. Auxiliary switch

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Introduction

Benefits

Key advantages for switchboard manufacturers thanks to the following:

- Compact, modular design
- Simple and efficient mounting due to incoming plug-in contact
- High packing density in the field
- Cable connection with cable clamps or cable lugs
- Can be mounted in different control cabinet depths
- Comprehensive range of accessories

The advantages for users are:

- Conversion, retrofitting and replacement without switching off the switchboard
- Dead-state fuse replacement
- Maintenance-free
- High personal safety
- Operating handle can be locked in OFF position
- Clear and unambiguous switch position indicator

Application

The plug-in 3NJ62 switch disconnectors with fuses are installed in low-voltage distribution boards where a minimum amount of space is available for a maximum number of cable ducts to the power distribution. They can be easily fitted in all common control cabinets (minimum depth: 400 mm).

The plug-in 3NJ62 switch disconnectors with fuses are available for rated uninterrupted currents from 160 A to 630 A.

LV HRC fuse links according to IEC 60269-1/EN 60269-1 (sizes NH 00 to NH 3) or BS fuse links according to BS 88 provide overload and short-circuit protection up to 690 V AC.

The switch disconnectors can be retrofitted at any time with auxiliary switches, an ammeter (48 mm x 48 mm) and current transformers, with no extra space required. For installation in control cabinets with a depth > 400 mm, the mounting depth of the disconnectors can be increased by 200 mm using a contact extension. Further installation accessories, such as guide rails and blanking covers, complete the product range.

Function

Fuse monitoring

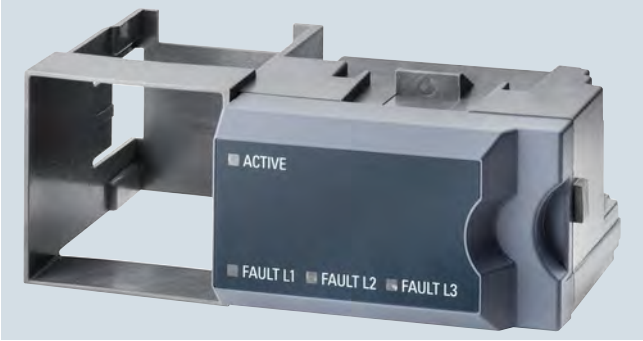
Fuse monitoring is used to detect, indicate and report faults. The electronic fuse monitoring devices are available in 2 versions.

EFM10 electronic fuse monitoring devices:

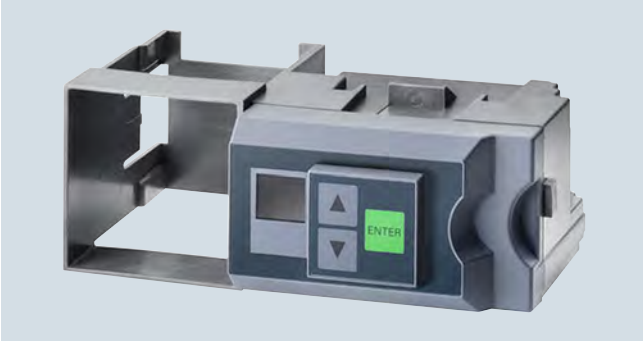
- For use up to 690 V AC
- Operational voltage < 20 V
- Display: Ready-to-run
- Individual fault display per phase
- 1 CO contact as centralized fault signaling unit

EFM20/25 electronic fuse monitoring and line monitoring devices:

- EFM20 for use up to 690 V AC, EFM25 for use up to 440 V DC
- Operational voltage < 13 V (EFM20) < 20 V (EFM25)
- Test function
- Closed-circuit principle or open-circuit principle
- 2 CO contacts as centralized fault signaling unit incl. line monitoring functions with phase failure detection (EFM20), undervoltage/overvoltage detection



EFM10 electronic fuse monitoring device



EFM20/25 electronic fuse monitoring device

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Main devices of sizes 00 and 1

Size		**00**								**1**			
Switch disconnectors with fuses type 3NJ62...	**LV HRC**			**...02-3 ...02-4**		**...03-1 ...04-1 ...04-2**		**...03-3 ...03-4**		**...12-3 ...12-4**		**...13-1 ...14-1 ...14-2**	**...13-3 ...13-4**
	BS	**...43-3**	**...53-3**	**...62-3 ...62-4**				**...63-3 ...63-4**		**...72-3 ...72-4**		**...74-1 ...74-2**	**...73-3 ...73-4**
Breaking capacity		H	H	H		S		H		H		S	H
Rated insulation voltage U_i	V	1000											
Rated impulse withstand voltage U_{imp}	V	8000											
Rated operational current I_e	A	63	100	160	-	160	125	160	125	250			
For LV HRC fuse links acc. to IEC 60269		-	-	for 00 and 000						1			
For BS fuse links acc. to BS 88		A3	A3	00T[1]						B2			
Rated operational voltage U_e													
• At 50/60 Hz rated frequency	V	690		--	--	500	690	500	690	690			
• At DC	V	--	--	230	440	--	--	--	--	230	440	-	-
Utilization category		AC23B		DC23B	DC21B	AC22B		AC23B		DC23B	DC21B	AC22B	AC23B
Rated conditional short-circuit current													
• Short-circuit strength (rms value)	kA	100		60		100		100		60		100	
• Short-circuit making capacity (rms value)	kA	66		60		55		66		60		55	66
Rated making capacity													
• p.f. = 0.65	A	--	--	--	--	480	375	--	--	--	--	750	--
• p.f. = 0.45	A	630	1000	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	--	--	--	1600	1250	--	--	--	2500
Rated breaking capacity													
• p.f. = 0.65	A	--	--	--	--	480	375	--	--	--	--	750	--
• p.f. = 0.45	A	504	800	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	--	--	--	1280	1000	--	--	--	2000
Service life													
Operating cycles total		2000		1600						1600			
• Electrical (690 V, p.f. = 0.65)		300		200						200			
Power loss (no fuse links)	W	7	17	43						78			
Permissible ambient temperature	°C	-5 ... +55											
Permissible mounting position		Horizontal and vertical with bottom connection											
Degree of protection (in operating state)		IP41											
Connection type		Main conductor connections											
Cable lug connection													
• Conductor cross-section (Al/Cu, solid or stranded) according to DIN 46235 (Cu) and DIN 46239 (Al)	mm^2	1x 10-95 2x 16-70								1x 25-240 2x 25-70			
• Screw size		M8								M12			
• Torque	Nm	15								30			
Terminal connection													
• Conductor cross-section (Al/Cu), rm	mm^2	1x 10-50								1x 16-185			
• Conductor cross-section (Al/Cu), re	mm^2	1x 10-50								1x 16-150			
• Conductor cross-section (Al/Cu), sm	mm^2	1x 16-95								1x 35-240			
• Conductor cross-section (Al/Cu), se	mm^2	1x 16-95								1x 35-300			
• Required torque	Nm	15								25			

[1] The fuse is available from Lawson Fuses (UK) and does not correspond to BS 88.

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Introduction

Main devices of sizes 2 and 3

Size		**2**				**3**					
Switch disconnectors with fuses type 3NJ62...	**LV HRC**	**...22-3 ...22-4**		**...23-1 ...24-1 ...24-2**	**...23-3 ...23-4**	**...32-3 ...32-4**		**...33-1 ...34-1 ...34-2**		**...33-3 ...33-4**	
	BS	**...82-3 ...82-4**			**...83-3 ...83-4**	**...92-3 ...92-4**		**...94-1 ...94-2**		**...93-3 ...93-4 ...33-3 ...33-4**	
Breaking capacity		H		S	H	H		S		H	
Rated insulation voltage U_i	V	1000									
Rated impulse withstand voltage U_{imp}	V	8000									
Rated operational current I_e											
• For fuse links acc. to IEC 60269/ BS88	A	400				630			500	630	500
For fuse links acc. to IEC 60269		2 and 1				3 and 2					
For BS fuse links acc. to BS 88		B4				3T[1)]					
Rated operational voltage U_e											
• At 50/60 Hz rated frequency	V	--	--	690		230	440	500	690	500	690
• At DC	V	230	440	--		--	--	--	--	--	--
Utilization category		DC23B	DC21B	AC22B	AC23B	DC23B	DC21B	AC22B		AC23B	
Rated conditional short-circuit current											
• Short-circuit strength (rms value)	kA	60		100		60		100			
• Short-circuit making capacity (rms value)	kA	60		55	66	60		55		66	
Rated making capacity											
• p.f. = 0.65	A	--	--	1200	--	--	--	1890	1500	--	--
• p.f. = 0.45	A	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	4000	--	--	--	--	6300	5000
Rated breaking capacity											
• p.f. = 0.65	A	--	--	1200	--	--	--	1890	1500	--	--
• p.f. = 0.45	A	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	3200	--	--	--	--	5040	4000
Service life											
Operating cycles total		1000				1000					
• Electrical (690 V, p.f. = 0.65)		200				200					
Power loss (no fuse links)	W	158				357					
Permissible ambient temperature	°C	-5 ... +55									
Permissible mounting position		Horizontal and vertical with bottom connection									
Degree of protection (in operating state)		IP41									
Connection type		Main conductor connections									
Cable lug connection											
Conductor cross-section	mm^2	1x 25-300				1x 25-300					
• Conductor cross-section (Al/Cu, solid or stranded) according to DIN 46235 (Cu) and DIN 46239 (Al)		2x 25-240				2x 25-240					
• Screw size		2x M12				2x M12					
• Torque	Nm	30				30					
Terminal connection											
• Conductor cross-section (Al/Cu), rm	mm^2	2x 16-185				2x 16-185					
• Conductor cross-section (Al/Cu), re	mm^2	2x 16-150				2x 16-150					
• Conductor cross-section (Al/Cu), sm	mm^2	2x 35-240				2x 35-240					
• Conductor cross-section (Al/Cu), se	mm^2	2x 35-300				2x 35-300					
• Required torque	Nm	25				25					

1) The fuse is available from Lawson Fuses (UK) and does not correspond to BS 88.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Auxiliary switches

Acc. to IEC 60947-5-1		
Rated insulation voltage U_i	V	690
Rated impulse withstand voltage U_{imp}	V	8000
Rated operational current I_e		
• At AC 15, U_e = 120 V	A	8
• At AC 15, U_e = 230 V	A	6
• At AC 15, U_e = 400 V	A	4
• At AC 15, U_e = 690 V	A	2

Electronic fuse monitoring devices, AC version (EFM 10)

Size		00	1	2/3
Apparent power consumption *S*	VA	Approx. 2.5		
Internal resist. of measurement circuit	MΩ	R_{in} > 6		
Storage temperature	°C	- 20 ... + 80		
Operating temperature	°C	- 5 ... + 55		
Operating temperature (500 V or 500 A)	°C	- 5 ... + 35		
Degree of protection in closed in-line connector		IP40		
Rated operating voltage of the main control switching devices	V AC Hz	230 ... 690 50/60		
Voltage limits	%	±15		
Signaling relay acc. to IEC 60947-5-1	A kV V	I_{th} = 1.5 U_{imp} = 4 U_i = 250		
Load capacity of the signaling relay				
• U_e	V	24	125	240
• DC - 13; I_e	A	1	0.2	0.1
• AC - 15; I_e	A	1.5		
Short-circuit protection		Max. fuse protection DIAZED 2 A gLgG		

Electronic fuse monitoring devices, AC version (EFM 20)

Size		00	1	2/3
Apparent power consumption *S*	VA	Approx. 2.5		
Internal resist. of measurement circuit	MΩ	R_{in} > 6		
Storage temperature	°C	- 20 ... + 80		
Operating temperature	°C	- 5 ... + 55		
Operating temperature (500 V or 500 A)	°C	- 5 ... + 35		
Degree of protection in closed in-line connector		IP40		
Rated operating voltage of the main control switching devices	V AC Hz	230 ... 690 50/60		
Voltage limits	%	±15		
Undervoltage	V	375		
Overvoltage	V	425		
Voltage drop for faulty fuses	V	> 13		
Delay time	s	0.1		
Relay 2		As relay 1 (fuse monitoring)		
Storage function		Off		
Open/closed-circuit principle		Closed-circuit principle		
Mode		Run mode		
Menu option		Display of voltage values / signals		
Signaling relay acc. to IEC 60947-5-1	A kV V	I_{th} = 1.5 U_{imp} = 4 U_i = 250		
Signaling relay 1 **Signaling relay 2**		1 changeover contact for fuse monitoring only 1 changeover contact as output for central fault OR as signaling relay 1 (presetting)		
Load capacity of the signaling relay				
• U_e	V	24	125	240
• DC - 13; I_e	A	1	0.2	0.1
• AC - 15; I_e	A	1.5		
Short-circuit protection		Max. fuse protection DIAZED 2 A gLgG		

Electronic fuse monitoring devices, DC version (EFM 25)

Size		00	1	2 / 3
Apparent power consumption *S*	VA	Approx. 2.5		
Internal resist. of measurement circuit	MΩ	R_{in} > 6		
Storage temperature	°C	- 20 ... + 80		
Operating temperature	°C	- 5 ... + 55		
Operating temperature (500 V or 500 A)	°C	- 5 ... + 35		
Degree of protection in closed in-line connector		IP40		
Rated operating voltage of the main control switching devices	V DC	220 ... 440		
Voltage limits	%	±15		
Undervoltage	V	200		
Overvoltage	V	240		
Voltage drop for faulty fuses	V	> 20		
Delay time	s	0.1		
Relay 2		As relay 1 (fuse monitoring)		
Storage function		Off		
Open/closed-circuit principle		Closed-circuit principle		
Mode		Run mode		
Menu option		Display of voltage values / signals		
Signaling relay acc. to IEC 60947-5-1	A kV V	I_{th} = 1.5 U_{imp} = 4 U_i = 250		
Signaling relay 1 **Signaling relay 2**		1 changeover contact for fuse monitoring only 1 changeover contact as output for central fault OR as signaling relay 1 (presetting)		
Load capacity of the signaling relay				
• U_e	V	24	125	240
• DC - 13; I_e	A	1	0.2	0.1
• AC - 15; I_e	A	1.5		
Short-circuit protection		Max. fuse protection DIAZED 2 A gLgG		

Ammeters

Inputs		x/1 A or x/5 A
Overload		
• Moving-iron measuring instruments		1.2 times
• Bi-metal measuring instruments		Double
Slave pointer		
• Moving-iron measuring instruments	min	--
• Bi-metal measuring instruments	min	15
Power consumption		
• Moving-iron measuring instruments	VA	0.6
• Bi-metal measuring instruments	VA	1

Motorized operating mechanism

Size		00	1	2/3
Control supply voltage	V DC	24 ± 2		
Power consumption	A	1.1	1.3	2.8
Service life (no limitation of switch disconnector according to IEC 60947-3)				
Operating cycles total		1600		
Operating cycles under load		200		
Signal duration	s	Min. 0.5 or continuous signal		

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For LV HRC fuse links

Selection and ordering data

Rated current I_n A	Size	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
2-pole, high breaking capacity H							
							
Manually operated							
160	00		**3NJ6202-3AA0□-0AA0**		1	1 unit	1DL
250	1		**3NJ6212-3AA0□-0AA0**		1	1 unit	1DL
400	2		**3NJ6222-3AA0□-0AA0**		1	1 unit	1DL
630	3		**3NJ6232-3AA0□-0AA0**		1	1 unit	1DL
Manually operated, EFM 25							
160	00		**3NJ6202-3AE0□-0AA0**		1	1 unit	1DL
250	1		**3NJ6212-3AE0□-0AA0**		1	1 unit	1DL
400	2		**3NJ6222-3AE0□-0AA0**		1	1 unit	1DL
630	3		**3NJ6232-3AE0□-0AA0**		1	1 unit	1DL
Motorized operating mechanism							
160	00		**3NJ6202-4AA0□-0AA0**		1	1 unit	1DL
250	1		**3NJ6212-4AA0□-0AA0**		1	1 unit	1DL
400	2		**3NJ6222-4AA0□-0AA0**		1	1 unit	1DL
630	3		**3NJ6232-4AA0□-0AA0**		1	1 unit	1DL
Motorized operating mechanism, EFM 25							
160	00		**3NJ6202-4AE0□-0AA0**		1	1 unit	1DL
250	1		**3NJ6212-4AE0□-0AA0**		1	1 unit	1DL
400	2		**3NJ6222-4AE0□-0AA0**		1	1 unit	1DL
630	3		**3NJ6232-4AE0□-0AA0**		1	1 unit	1DL
3-pole, standard breaking capacity S							
							
Manually operated							
160	00		**3NJ6203-1AA0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-1AA0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-1AA0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-1AA0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 10							
160	00		**3NJ6203-1AB0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-1AB0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-1AB0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-1AB0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 20							
160	00		**3NJ6203-1AC0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-1AC0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-1AC0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-1AC0□-□□□□**		1	1 unit	1DL
3-pole, high breaking capacity H							
							
Manually operated							
160	00		**3NJ6203-3AA0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-3AA0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-3AA0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-3AA0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 10							
160	00		**3NJ6203-3AB0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-3AB0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-3AB0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-3AB0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 20							
160	00		**3NJ6203-3AC0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-3AC0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-3AC0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-3AC0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism							
160	00		**3NJ6203-4AA0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-4AA0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-4AA0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-4AA0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 10							
160	00		**3NJ6203-4AB0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-4AB0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-4AB0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-4AB0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 20							
160	00		**3NJ6203-4AC0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6213-4AC0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6223-4AC0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6233-4AC0□-□□□□**		1	1 unit	1DL

Article No. supplement	Add. price
0 0AA0	None

Standard Article No. supplement
(for more Article No. supplements, see page 7/174)
Without auxiliary switches, ammeters or current transformers ►

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Rated current I_n	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A		d					
4-pole, standard breaking capacity S							
Manually operated							
160	00		**3NJ6204-1AA0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6214-1AA0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6224-1AA0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6234-1AA0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 10							
160	00		**3NJ6204-1AB0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6214-1AB0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6224-1AB0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6234-1AB0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 20							
160	00		**3NJ6204-1AC0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6214-1AC0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6224-1AC0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6234-1AC0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism							
160	00		**3NJ6204-2AA0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6214-2AA0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6224-2AA0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6234-2AA0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 10							
160	00		**3NJ6204-2AB0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6214-2AB0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6224-2AB0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6234-2AB0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 20							
160	00		**3NJ6204-2AC0□-□□□□**		1	1 unit	1DL
250	1		**3NJ6214-2AC0□-□□□□**		1	1 unit	1DL
400	2		**3NJ6224-2AC0□-□□□□**		1	1 unit	1DL
630	3		**3NJ6234-2AC0□-□□□□**		1	1 unit	1DL
			Article No. supplement	Additional price			
Standard Article No. supplement (for more Article No. supplements, see page 7/174)							
Without auxiliary switches, ammeters or current transformers		►	**0 0AA0**	None			

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For BS fuse links

Selection and ordering data

Rated current I_n	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A		d					
2-pole, high breaking capacity H							
Manually operated							
160	00T[1]		**3NJ6262-3AA0□-0AA0**		1	1 unit	1DL
250	B2		**3NJ6272-3AA0□-0AA0**		1	1 unit	1DL
400	B4		**3NJ6282-3AA0□-0AA0**		1	1 unit	1DL
630	3T[1]		**3NJ6292-3AA0□-0AA0**		1	1 unit	1DL
Manually operated, EFM 25							
160	00T[1]		**3NJ6262-3AE0□-0AA0**		1	1 unit	1DL
250	B2		**3NJ6272-3AE0□-0AA0**		1	1 unit	1DL
400	B4		**3NJ6282-3AE0□-0AA0**		1	1 unit	1DL
630	3T[1]		**3NJ6292-3AE0□-0AA0**		1	1 unit	1DL
Motorized operating mechanism							
160	00T[1]		**3NJ6262-4AA0□-0AA0**		1	1 unit	1DL
250	B2		**3NJ6272-4AA0□-0AA0**		1	1 unit	1DL
400	B4		**3NJ6282-4AA0□-0AA0**		1	1 unit	1DL
630	3T[1]		**3NJ6292-4AA0□-0AA0**		1	1 unit	1DL
Motorized operating mechanism, EFM 25							
160	00T[1]		**3NJ6262-4AE0□-0AA0**		1	1 unit	1DL
250	B2		**3NJ6272-4AE0□-0AA0**		1	1 unit	1DL
400	B4		**3NJ6282-4AE0□-0AA0**		1	1 unit	1DL
630	3T[1]		**3NJ6292-4AE0□-0AA0**		1	1 unit	1DL
3-pole, high breaking capacity H							
Manually operated							
63	A3		**3NJ6243-3AA0□-□□□□**		1	1 unit	1DL
100	A3		**3NJ6253-3AA0□-□□□□**		1	1 unit	1DL
160	00T[1]		**3NJ6263-3AA0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6273-3AA0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6283-3AA0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6293-3AA0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 10							
160	00T[1]		**3NJ6263-3AB0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6273-3AB0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6283-3AB0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6293-3AB0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 20							
160	00T[1]		**3NJ6263-3AC0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6273-3AC0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6283-3AC0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6293-3AC0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism							
160	00T[1]		**3NJ6263-4AA0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6273-4AA0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6283-4AA0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6293-4AA0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 10							
160	00T[1]		**3NJ6263-4AB0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6273-4AB0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6283-4AB0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6293-4AB0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 20							
160	00T[1]		**3NJ6263-4AC0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6273-4AC0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6283-4AC0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6293-4AC0□-□□□□**		1	1 unit	1DL

	Article No. supplement	Additional price
Standard Article No. supplement (for more Article No. supplements, see page 7/174)		
Without auxiliary switches, ammeters or current transformers ►	**0 0AA0**	None

[1] The fuse is available from Lawson Fuses (UK) and does not correspond to BS 88.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Rated current I_n	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A		d					
4-pole, standard breaking capacity S							
Manually operated							
160	00T[1]		**3NJ6264-1AA0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6274-1AA0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6284-1AA0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6294-1AA0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 10							
160	00T[1]		**3NJ6264-1AB0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6274-1AB0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6284-1AB0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6294-1AB0□-□□□□**		1	1 unit	1DL
Manually operated, EFM 20							
160	00T[1]		**3NJ6264-1AC0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6274-1AC0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6284-1AC0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6294-1AC0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism							
160	00T[1]		**3NJ6264-2AA0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6274-2AA0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6284-2AA0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6294-2AA0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 10							
160	00T[1]		**3NJ6264-2AB0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6274-2AB0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6284-2AB0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6294-2AB0□-□□□□**		1	1 unit	1DL
Motorized operating mechanism, EFM 20							
160	00T[1]		**3NJ6264-2AC0□-□□□□**		1	1 unit	1DL
250	B2		**3NJ6274-2AC0□-□□□□**		1	1 unit	1DL
400	B4		**3NJ6284-2AC0□-□□□□**		1	1 unit	1DL
630	3T[1]		**3NJ6294-2AC0□-□□□□**		1	1 unit	1DL

	Article No. supplement	Additional price
Standard Article No. supplement (for more Article No. supplements, see page 7/174)		
Without auxiliary switches, ammeters or current transformers ►	**0 0AA0**	None

[1] The fuse is available from Lawson Fuses (UK) and does not correspond to BS 88.

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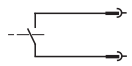
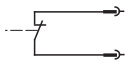
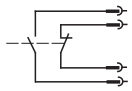
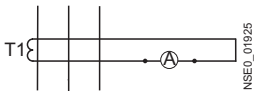
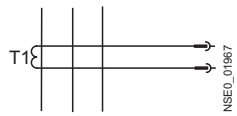
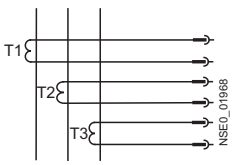
For LV HRC and BS fuse links

Options

1st Article No. supplement:
Auxiliary switch wired to multi-function plug

	SD	Article No. supplement 3NJ62 ..-....□-....	Additional price	PS
	d			
Without	▶	**0**	**None**	1 unit
 1 NO contact		**1**	✓	1 unit
 1 NC contact		**2**	✓	1 unit
 1 NO contact + 1 NC contact		**3**	✓	1 unit

2nd Article No. supplement:
Ammeter and current transformer wired

	Ammeters	Current transformers: Primary current	Current transformers: Secondary current	Current transformers: Accuracy class	SD	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
		A	A		d			
For sizes 00 and 00T								
	Without	Without	Without	Without	▶	**0AA0**	**None**	1 unit
	1 current transformer to 1 ammeter							
	Moving iron	50	1	1		**1DB1**	✓	1 unit
	Moving iron	50	5	1		**1DB4**	✓	1 unit
	Moving iron	100	1	1		**1DD1**	✓	1 unit
	Moving iron	100	5	1		**1DD4**	✓	1 unit
	Moving iron	150	1	1		**1DE1**	✓	1 unit
	Moving iron	150	5	1		**1DE4**	✓	1 unit
	Bi-metal	50	1	1		**2DB1**	✓	1 unit
	Bi-metal	50	5	1		**2DB4**	✓	1 unit
	Bi-metal	100	1	1		**2DD1**	✓	1 unit
	Bi-metal	100	5	1		**2DD4**	✓	1 unit
	Bi-metal	150	1	1		**2DE1**	✓	1 unit
	Bi-metal	150	5	1		**2DE4**	✓	1 unit
	1 current transformer to multi-function plug							
	Without	50	1	1		**0BB1**	✓	1 unit
	Without	50	5	1		**0BB4**	✓	1 unit
	Without	100	1	1		**0BD1**	✓	1 unit
	Without	100	1	0.5		**0BD2**	✓	1 unit
	Without	100	1	0.5 calibrated		**0BD3**	✓	1 unit
	Without	100	5	1		**0BD4**	✓	1 unit
	Without	100	5	0.5		**0BD5**	✓	1 unit
	Without	100	5	0.5 calibrated		**0BD6**	✓	1 unit
	Without	150	1	1		**0BE1**	✓	1 unit
	Without	150	1	0.5		**0BE2**	✓	1 unit
	Without	150	1	0.5 calibrated		**0BE3**	✓	1 unit
	Without	150	5	1		**0BE4**	✓	1 unit
	Without	150	5	0.5		**0BE5**	✓	1 unit
	Without	150	5	0.5 calibrated		**0BE6**	✓	1 unit
	3 current transformers to multi-function plug							
	Without	50	1	1		**0CB1**	✓	1 unit
	Without	50	5	1		**0CB4**	✓	1 unit
	Without	100	1	1		**0CD1**	✓	1 unit
	Without	100	1	0.5		**0CD2**	✓	1 unit
	Without	100	1	0.5 calibrated		**0CD3**	✓	1 unit
	Without	100	5	1		**0CD4**	✓	1 unit
	Without	100	5	0.5		**0CD5**	✓	1 unit
	Without	100	5	0.5 calibrated		**0CD6**	✓	1 unit
	Without	150	1	1		**0CE1**	✓	1 unit
	Without	150	1	0.5		**0CE2**	✓	1 unit
	Without	150	1	0.5 calibrated		**0CE3**	✓	1 unit
	Without	150	5	1		**0CE4**	✓	1 unit
	Without	150	5	0.5		**0CE5**	✓	1 unit
	Without	150	5	0.5 calibrated		**0CE6**	✓	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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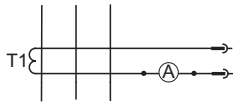
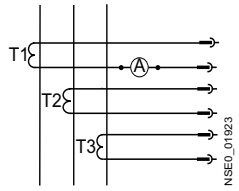
	Ammeters	Current transformers			SD	Article No. supplement	Additional	PS
		Primary current	Secondary current	Accuracy class		3NJ62 ..-.....-□□□□	price	
		A	A		d			
For sizes 00 and 00T (continued)								
	1 current transformer to 1 ammeter and multi-function plug							
	Moving iron	50	1	1		**1EB1**	✓	1 unit
	Moving iron	50	5	1		**1EB4**	✓	1 unit
	Moving iron	100	1	1		**1ED1**	✓	1 unit
	Moving iron	100	1	0.5		**1ED2**	✓	1 unit
	Moving iron	100	1	0.5 calibrated		**1ED3**	✓	1 unit
	Moving iron	100	5	1		**1ED4**	✓	1 unit
	Moving iron	100	5	0.5		**1ED5**	✓	1 unit
	Moving iron	100	5	0.5 calibrated		**1ED6**	✓	1 unit
	Moving iron	150	1	1		**1EE1**	✓	1 unit
	Moving iron	150	1	0.5		**1EE2**	✓	1 unit
	Moving iron	150	1	0.5 calibrated		**1EE3**	✓	1 unit
	Moving iron	150	5	1		**1EE4**	✓	1 unit
	Moving iron	150	5	0.5		**1EE5**	✓	1 unit
	Moving iron	150	5	0.5 calibrated		**1EE6**	✓	1 unit
	Bi-metal	50	1	1		**2EB1**	✓	1 unit
	Bi-metal	50	5	1		**2EB4**	✓	1 unit
	Bi-metal	100	1	1		**2ED1**	✓	1 unit
	Bi-metal	100	1	0.5		**2ED2**	✓	1 unit
	Bi-metal	100	1	0.5 calibrated		**2ED3**	✓	1 unit
	Bi-metal	100	5	1		**2ED4**	✓	1 unit
	Bi-metal	100	5	0.5		**2ED5**	✓	1 unit
	Bi-metal	100	5	0.5 calibrated		**2ED6**	✓	1 unit
	Bi-metal	150	1	1		**2EE1**	✓	1 unit
	Bi-metal	150	1	0.5		**2EE2**	✓	1 unit
	Bi-metal	150	1	0.5 calibrated		**2EE3**	✓	1 unit
	Bi-metal	150	5	1		**2EE4**	✓	1 unit
	Bi-metal	150	5	0.5		**2EE5**	✓	1 unit
	Bi-metal	150	5	0.5 calibrated		**2EE6**	✓	1 unit
	3 current transformers to 1 ammeter and multi-function plug							
	Moving iron	50	1	1		**1FB1**	✓	1 unit
	Moving iron	50	5	1		**1FB4**	✓	1 unit
	Moving iron	100	1	1		**1FD1**	✓	1 unit
	Moving iron	100	1	0.5		**1FD2**	✓	1 unit
	Moving iron	100	1	0.5 calibrated		**1FD3**	✓	1 unit
	Moving iron	100	5	1		**1FD4**	✓	1 unit
	Moving iron	100	5	0.5		**1FD5**	✓	1 unit
	Moving iron	100	5	0.5 calibrated		**1FD6**	✓	1 unit
	Moving iron	150	1	1		**1FE1**	✓	1 unit
	Moving iron	150	5	0.5		**1FE2**	✓	1 unit
	Moving iron	150	5	0.5 calibrated		**1FE3**	✓	1 unit
	Moving iron	150	5	1		**1FE4**	✓	1 unit
	Moving iron	150	5	0.5		**1FE5**	✓	1 unit
	Moving iron	150	5	0.5 calibrated		**1FE6**	✓	1 unit
	Bi-metal	50	1	1		**2FB1**	✓	1 unit
	Bi-metal	50	5	1		**2FB4**	✓	1 unit
	Bi-metal	100	1	1		**2FD1**	✓	1 unit
	Bi-metal	100	1	0.5		**2FD2**	✓	1 unit
	Bi-metal	100	1	0.5 calibrated		**2FD3**	✓	1 unit
	Bi-metal	100	5	1		**2FD4**	✓	1 unit
	Bi-metal	100	5	0.5		**2FD5**	✓	1 unit
	Bi-metal	100	5	0.5 calibrated		**2FD6**	✓	1 unit
	Bi-metal	150	1	1		**2FE1**	✓	1 unit
	Bi-metal	150	1	0.5		**2FE2**	✓	1 unit
	Bi-metal	150	1	0.5 calibrated		**2FE3**	✓	1 unit
	Bi-metal	150	5	1		**2FE4**	✓	1 unit
	Bi-metal	150	5	0.5		**2FE5**	✓	1 unit
	Bi-metal	150	5	0.5 calibrated		**2FE6**	✓	1 unit

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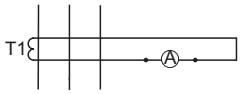
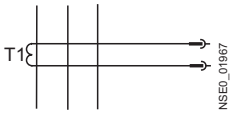
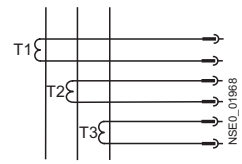
For LV HRC and BS fuse links

	Ammeters	Current transformers: Primary current	Current transformers: Secondary current	Current transformers: Accuracy class	SD	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
		A	A		d			
For sizes 1 and B2								
	Without	Without	Without	Without	▶	**0AA0**	**None**	1 unit
	1 current transformer to 1 ammeter							
	Moving iron	50	1	1		**1DB1**	✓	1 unit
	Moving iron	50	5	1		**1DB4**	✓	1 unit
	Moving iron	100	1	1		**1DD1**	✓	1 unit
	Moving iron	100	5	1		**1DD4**	✓	1 unit
	Moving iron	150	1	1		**1DE1**	✓	1 unit
	Moving iron	150	5	1		**1DE4**	✓	1 unit
	Moving iron	200	1	1		**1DF1**	✓	1 unit
	Moving iron	200	5	1		**1DF4**	✓	1 unit
	Moving iron	250	1	1		**1DG1**	✓	1 unit
	Moving iron	250	5	1		**1DG4**	✓	1 unit
	Bi-metal	50	1	1		**2DB1**	✓	1 unit
	Bi-metal	50	5	1		**2DB4**	✓	1 unit
	Bi-metal	100	1	1		**2DD1**	✓	1 unit
	Bi-metal	100	5	1		**2DD4**	✓	1 unit
	Bi-metal	150	1	1		**2DE1**	✓	1 unit
	Bi-metal	150	5	1		**2DE4**	✓	1 unit
	Bi-metal	200	1	1		**2DF1**	✓	1 unit
	Bi-metal	200	5	1		**2DF4**	✓	1 unit
	Bi-metal	250	1	1		**2DG1**	✓	1 unit
	Bi-metal	250	5	1		**2DG4**	✓	1 unit
	1 current transformer to multi-function plug							
	Without	50	1	1		**0BB1**	✓	1 unit
	Without	50	5	1		**0BB4**	✓	1 unit
	Without	100	1	1		**0BD1**	✓	1 unit
	Without	100	1	0.5		**0BD2**	✓	1 unit
	Without	100	5	1		**0BD4**	✓	1 unit
	Without	100	5	0.5		**0BD5**	✓	1 unit
	Without	150	1	1		**0BE1**	✓	1 unit
	Without	150	1	0.5		**0BE2**	✓	1 unit
	Without	150	5	1		**0BE4**	✓	1 unit
	Without	150	5	0.5		**0BE5**	✓	1 unit
	Without	200	1	1		**0BF1**	✓	1 unit
	Without	200	1	0.5		**0BF2**	✓	1 unit
	Without	200	5	1		**0BF4**	✓	1 unit
	Without	200	5	0.5		**0BF5**	✓	1 unit
	Without	250	1	1		**0BG1**	✓	1 unit
	Without	250	1	0.5		**0BG2**	✓	1 unit
	Without	250	5	1		**0BG4**	✓	1 unit
	Without	250	5	0.5		**0BG5**	✓	1 unit
	3 current transformers to multi-function plug							
	Without	50	1	1		**0CB1**	✓	1 unit
	Without	50	5	1		**0CB4**	✓	1 unit
	Without	100	1	1		**0CD1**	✓	1 unit
	Without	100	1	0.5		**0CD2**	✓	1 unit
	Without	100	5	1		**0CD4**	✓	1 unit
	Without	100	5	0.5		**0CD5**	✓	1 unit
	Without	150	1	1		**0CE1**	✓	1 unit
	Without	150	1	0.5		**0CE2**	✓	1 unit
	Without	150	5	1		**0CE4**	✓	1 unit
	Without	150	5	0.5		**0CE5**	✓	1 unit
	Without	200	1	1		**0CF1**	✓	1 unit
	Without	200	1	0.5		**0CF2**	✓	1 unit
	Without	200	5	1		**0CF4**	✓	1 unit
	Without	200	5	0.5		**0CF5**	✓	1 unit
	Without	250	1	1		**0CG1**	✓	1 unit
	Without	250	1	0.5		**0CG2**	✓	1 unit
	Without	250	5	1		**0CG4**	✓	1 unit
	Without	250	5	0.5		**0CG5**	✓	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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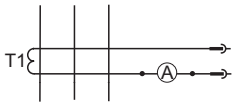
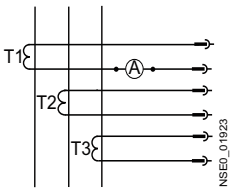
For sizes 1 and B2 (continued)

	Ammeters	Current transformers: Primary current	Current transformers: Secondary current	Current transformers: Accuracy class	SD	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
		A	A		d			
	1 current transformer to 1 ammeter and multi-function plug							
	Moving iron	50	1	1		**1EB1**	✓	1 unit
	Moving iron	50	5	1		**1EB4**	✓	1 unit
	Moving iron	100	1	1		**1ED1**	✓	1 unit
	Moving iron	100	1	0.5		**1ED2**	✓	1 unit
	Moving iron	100	5	1		**1ED4**	✓	1 unit
	Moving iron	100	5	0.5		**1ED5**	✓	1 unit
	Moving iron	150	1	1		**1EE1**	✓	1 unit
	Moving iron	150	1	0.5		**1EE2**	✓	1 unit
	Moving iron	150	5	1		**1EE4**	✓	1 unit
	Moving iron	150	5	0.5		**1EE5**	✓	1 unit
	Moving iron	200	1	1		**1EF1**	✓	1 unit
	Moving iron	200	1	0.5		**1EF2**	✓	1 unit
	Moving iron	200	5	1		**1EF4**	✓	1 unit
	Moving iron	200	5	0.5		**1EF5**	✓	1 unit
	Moving iron	250	1	1		**1EG1**	✓	1 unit
	Moving iron	250	1	0.5		**1EG2**	✓	1 unit
	Moving iron	250	5	1		**1EG4**	✓	1 unit
	Moving iron	250	5	0.5		**1EG5**	✓	1 unit
	Bi-metal	50	1	1		**2EB1**	✓	1 unit
	Bi-metal	50	5	1		**2EB4**	✓	1 unit
	Bi-metal	100	1	1		**2ED1**	✓	1 unit
	Bi-metal	100	1	0.5		**2ED2**	✓	1 unit
	Bi-metal	100	5	1		**2ED4**	✓	1 unit
	Bi-metal	100	5	0.5		**2ED5**	✓	1 unit
	Bi-metal	150	1	1		**2EE1**	✓	1 unit
	Bi-metal	150	1	0.5		**2EE2**	✓	1 unit
	Bi-metal	150	5	1		**2EE4**	✓	1 unit
	Bi-metal	150	5	0.5		**2EE5**	✓	1 unit
	Bi-metal	200	1	1		**2EF1**	✓	1 unit
	Bi-metal	200	1	0.5		**2EF2**	✓	1 unit
	Bi-metal	200	5	1		**2EF4**	✓	1 unit
	Bi-metal	200	5	0.5		**2EF5**	✓	1 unit
	Bi-metal	250	1	1		**2EG1**	✓	1 unit
	Bi-metal	250	1	0.5		**2EG2**	✓	1 unit
	Bi-metal	250	5	1		**2EG4**	✓	1 unit
	Bi-metal	250	5	0.5		**2EG5**	✓	1 unit
	3 current transformers to 1 ammeter and multi-function plug							
	Moving iron	50	1	1		**1FB1**	✓	1 unit
	Moving iron	50	5	1		**1FB4**	✓	1 unit
	Moving iron	100	1	1		**1FD1**	✓	1 unit
	Moving iron	100	1	0.5		**1FD2**	✓	1 unit
	Moving iron	100	5	1		**1FD4**	✓	1 unit
	Moving iron	100	5	0.5		**1FD5**	✓	1 unit
	Moving iron	150	1	1		**1FE1**	✓	1 unit
	Moving iron	150	1	0.5		**1FE2**	✓	1 unit
	Moving iron	150	5	1		**1FE4**	✓	1 unit
	Moving iron	150	5	0.5		**1FE5**	✓	1 unit
	Moving iron	200	1	1		**1FF1**	✓	1 unit
	Moving iron	200	1	0.5		**1FF2**	✓	1 unit
	Moving iron	200	5	1		**1FF4**	✓	1 unit
	Moving iron	200	5	0.5		**1FF5**	✓	1 unit
	Moving iron	250	1	1		**1FG1**	✓	1 unit
	Moving iron	250	1	0.5		**1FG2**	✓	1 unit
	Moving iron	250	5	1		**1FG4**	✓	1 unit
	Moving iron	250	5	0.5		**1FG5**	✓	1 unit
	Bi-metal	50	1	1		**2FB1**	✓	1 unit
	Bi-metal	50	5	1		**2FB4**	✓	1 unit
	Bi-metal	100	1	1		**2FD1**	✓	1 unit
	Bi-metal	100	1	0.5		**2FD2**	✓	1 unit
	Bi-metal	100	5	1		**2FD4**	✓	1 unit
	Bi-metal	100	5	0.5		**2FD5**	✓	1 unit
	Bi-metal	150	1	1		**2FE1**	✓	1 unit
	Bi-metal	150	1	0.5		**2FE2**	✓	1 unit
	Bi-metal	150	5	1		**2FE4**	✓	1 unit
	Bi-metal	150	5	0.5		**2FE5**	✓	1 unit
	Bi-metal	200	1	1		**2FF1**	✓	1 unit
	Bi-metal	200	1	0.5		**2FF2**	✓	1 unit
	Bi-metal	200	5	1		**2FF4**	✓	1 unit
	Bi-metal	200	5	0.5		**2FF5**	✓	1 unit
	Bi-metal	250	1	1		**2FG1**	✓	1 unit
	Bi-metal	250	1	0.5		**2FG2**	✓	1 unit
	Bi-metal	250	5	1		**2FG4**	✓	1 unit
	Bi-metal	250	5	0.5		**2FG5**	✓	1 unit

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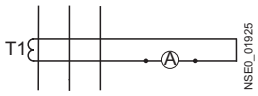
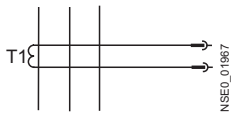
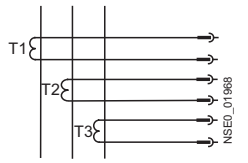
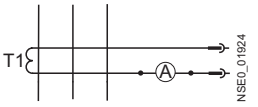
For LV HRC and BS fuse links

	Ammeters	Current transformers			SD	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
		Primary current	Secondary current	Accuracy class				
		A	A		d			
For sizes 2 and B4								
	Without	Without	Without		▶	**0AA0**	**None**	1 unit
	1 current transformer to 1 ammeter							
	Moving iron	300	1	1		**1DH1**	✓	1 unit
	Moving iron	300	5	1		**1DH4**	✓	1 unit
	Moving iron	400	1	1		**1DJ1**	✓	1 unit
	Moving iron	400	5	1		**1DJ4**	✓	1 unit
	Bi-metal	300	1	1		**2DH1**	✓	1 unit
	Bi-metal	300	5	1		**2DH4**	✓	1 unit
	Bi-metal	400	1	1		**2DJ1**	✓	1 unit
	Bi-metal	400	5	1		**2DJ4**	✓	1 unit
	1 current transformer to multi-function plug							
	Without	300	1	1		**0BH1**	✓	1 unit
	Without	300	1	0.5		**0BH2**	✓	1 unit
	Without	300	1	0.5 calibrated		**0BH3**	✓	1 unit
	Without	300	5	1		**0BH4**	✓	1 unit
	Without	300	5	0.5		**0BH5**	✓	1 unit
	Without	300	5	0.5 calibrated		**0BH6**	✓	1 unit
	Without	400	1	1		**0BJ1**	✓	1 unit
	Without	400	1	0.5		**0BJ2**	✓	1 unit
	Without	400	1	0.5 calibrated		**0BJ3**	✓	1 unit
	Without	400	5	1		**0BJ4**	✓	1 unit
	Without	400	5	0.5		**0BJ5**	✓	1 unit
	Without	400	5	0.5 calibrated		**0BJ6**	✓	1 unit
	3 current transformers to multi-function plug							
	Without	300	1	1		**0CH1**	✓	1 unit
	Without	300	1	0.5		**0CH2**	✓	1 unit
	Without	300	1	0.5 calibrated		**0CH3**	✓	1 unit
	Without	300	5	1		**0CH4**	✓	1 unit
	Without	300	5	0.5		**0CH5**	✓	1 unit
	Without	300	5	0.5 calibrated		**0CH6**	✓	1 unit
	Without	400	1	1		**0CJ1**	✓	1 unit
	Without	400	1	0.5		**0CJ2**	✓	1 unit
	Without	400	1	0.5 calibrated		**0CJ3**	✓	1 unit
	Without	400	5	1		**0CJ4**	✓	1 unit
	Without	400	5	0.5		**0CJ5**	✓	1 unit
	Without	400	5	0.5 calibrated		**0CJ6**	✓	1 unit
	1 current transformer to 1 ammeter and multi-function plug							
	Moving iron	300	1	1		**1EH1**	✓	1 unit
	Moving iron	300	1	0.5		**1EH2**	✓	1 unit
	Moving iron	300	1	0.5 calibrated		**1EH3**	✓	1 unit
	Moving iron	300	5	1		**1EH4**	✓	1 unit
	Moving iron	300	5	0.5		**1EH5**	✓	1 unit
	Moving iron	300	5	0.5 calibrated		**1EH6**	✓	1 unit
	Moving iron	400	1	1		**1EJ1**	✓	1 unit
	Moving iron	400	1	0.5		**1EJ2**	✓	1 unit
	Moving iron	400	1	0.5 calibrated		**1EJ3**	✓	1 unit
	Moving iron	400	5	1		**1EJ4**	✓	1 unit
	Moving iron	400	5	0.5		**1EJ5**	✓	1 unit
	Moving iron	400	5	0.5 calibrated		**1EJ6**	✓	1 unit
	Bi-metal	300	1	1		**2EH1**	✓	1 unit
	Bi-metal	300	1	0.5		**2EH2**	✓	1 unit
	Bi-metal	300	1	0.5 calibrated		**2EH3**	✓	1 unit
	Bi-metal	300	5	1		**2EH4**	✓	1 unit
	Bi-metal	300	5	0.5		**2EH5**	✓	1 unit
	Bi-metal	300	5	0.5 calibrated		**2EH6**	✓	1 unit
	Bi-metal	400	1	1		**2EJ1**	✓	1 unit
	Bi-metal	400	1	0.5		**2EJ2**	✓	1 unit
	Bi-metal	400	1	0.5 calibrated		**2EJ3**	✓	1 unit
	Bi-metal	400	5	1		**2EJ4**	✓	1 unit
	Bi-metal	400	5	0.5		**2EJ5**	✓	1 unit
	Bi-metal	400	5	0.5 calibrated		**2EJ6**	✓	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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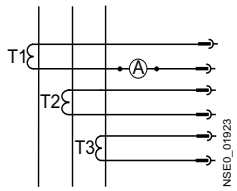
For sizes 2 and B4 (continued)



3 current transformers to 1 ammeter and multi-function plug

Ammeters	Current transformers: Primary current	Current transformers: Secondary current	Current transformers: Accuracy class	SD	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
	A	A		d			
Moving iron	300	1	1		**1FH1**	✓	1 unit
Moving iron	300	1	0.5		**1FH2**	✓	1 unit
Moving iron	300	1	0.5 calibrated		**1FH3**	✓	1 unit
Moving iron	300	5	1		**1FH4**	✓	1 unit
Moving iron	300	5	0.5		**1FH5**	✓	1 unit
Moving iron	300	5	0.5 calibrated		**1FH6**	✓	1 unit
Moving iron	400	1	1		**1FJ1**	✓	1 unit
Moving iron	400	1	0.5		**1FJ2**	✓	1 unit
Moving iron	400	1	0.5 calibrated		**1FJ3**	✓	1 unit
Moving iron	400	5	1		**1FJ4**	✓	1 unit
Moving iron	400	5	0.5		**1FJ5**	✓	1 unit
Moving iron	400	5	0.5 calibrated		**1FJ6**	✓	1 unit
Bi-metal	300	1	1		**2FH1**	✓	1 unit
Bi-metal	300	1	0.5		**2FH2**	✓	1 unit
Bi-metal	300	1	0.5 calibrated		**2FH3**	✓	1 unit
Bi-metal	300	5	1		**2FH4**	✓	1 unit
Bi-metal	300	5	0.5		**2FH5**	✓	1 unit
Bi-metal	300	5	0.5 calibrated		**2FH6**	✓	1 unit
Bi-metal	400	1	1		**2FJ1**	✓	1 unit
Bi-metal	400	1	0.5		**2FJ2**	✓	1 unit
Bi-metal	400	1	0.5 calibrated		**2FJ3**	✓	1 unit
Bi-metal	400	5	1		**2FJ4**	✓	1 unit
Bi-metal	400	5	0.5		**2FJ5**	✓	1 unit
Bi-metal	400	5	0.5 calibrated		**2FJ6**	✓	1 unit

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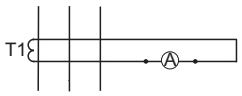
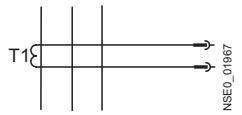
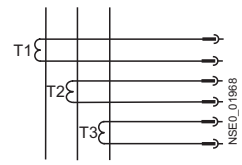
For LV HRC and BS fuse links

	Ammeters	Current transformers: Primary current	Current transformers: Secondary current	Current transformers: Accuracy class	SD	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
		A	A		d			
For sizes 3 and 3T								
	Without	Without	Without	Without	►	**0AA0**	**None**	1 unit
	1 current transformer to 1 ammeter							
	Moving iron	300	1	1		**1DH1**	✓	1 unit
	Moving iron	300	5	1		**1DH4**	✓	1 unit
	Moving iron	400	1	1		**1DJ1**	✓	1 unit
	Moving iron	400	5	1		**1DJ4**	✓	1 unit
	Moving iron	500	1	1		**1DK1**	✓	1 unit
	Moving iron	500	5	1		**1DK4**	✓	1 unit
	Moving iron	600	1	1		**1DL1**	✓	1 unit
	Moving iron	600	5	1		**1DL4**	✓	1 unit
	Bi-metal	300	1	1		**2DH1**	✓	1 unit
	Bi-metal	300	5	1		**2DH4**	✓	1 unit
	Bi-metal	400	1	1		**2DJ1**	✓	1 unit
	Bi-metal	400	5	1		**2DJ4**	✓	1 unit
	Bi-metal	500	1	1		**2DK1**	✓	1 unit
	Bi-metal	500	5	1		**2DK4**	✓	1 unit
	Bi-metal	600	1	1		**2DL1**	✓	1 unit
	Bi-metal	600	5	1		**2DL4**	✓	1 unit
	1 current transformer to multi-function plug							
	Without	300	1	1		**0BH1**	✓	1 unit
	Without	300	1	0.5		**0BH2**	✓	1 unit
	Without	300	1	0.5 calibrated		**0BH3**	✓	1 unit
	Without	300	5	1		**0BH4**	✓	1 unit
	Without	300	5	0.5		**0BH5**	✓	1 unit
	Without	300	5	0.5 calibrated		**0BH6**	✓	1 unit
	Without	400	1	1		**0BJ1**	✓	1 unit
	Without	400	1	0.5		**0BJ2**	✓	1 unit
	Without	400	1	0.5 calibrated		**0BJ3**	✓	1 unit
	Without	400	5	1		**0BJ4**	✓	1 unit
	Without	400	5	0.5		**0BJ5**	✓	1 unit
	Without	400	5	0.5 calibrated		**0BJ6**	✓	1 unit
	Without	500	1	1		**0BK1**	✓	1 unit
	Without	500	1	0.5		**0BK2**	✓	1 unit
	Without	500	1	0.5 calibrated		**0BK3**	✓	1 unit
	Without	500	5	1		**0BK4**	✓	1 unit
	Without	500	5	0.5		**0BK5**	✓	1 unit
	Without	500	5	0.5 calibrated		**0BK6**	✓	1 unit
	Without	600	1	1		**0BL1**	✓	1 unit
	Without	600	1	0.5		**0BL2**	✓	1 unit
	Without	600	1	0.5 calibrated		**0BL3**	✓	1 unit
	Without	600	5	1		**0BL4**	✓	1 unit
	Without	600	5	0.5		**0BL5**	✓	1 unit
	Without	600	5	0.5 calibrated		**0BL6**	✓	1 unit
	3 current transformers to multi-function plug							
	Without	300	1	1		**0CH1**	✓	1 unit
	Without	300	1	0.5		**0CH2**	✓	1 unit
	Without	300	1	0.5 calibrated		**0CH3**	✓	1 unit
	Without	300	5	1		**0CH4**	✓	1 unit
	Without	300	5	0.5		**0CH5**	✓	1 unit
	Without	300	5	0.5 calibrated		**0CH6**	✓	1 unit
	Without	400	1	1		**0CJ1**	✓	1 unit
	Without	400	1	0.5		**0CJ2**	✓	1 unit
	Without	400	1	0.5 calibrated		**0CJ3**	✓	1 unit
	Without	400	5	1		**0CJ4**	✓	1 unit
	Without	400	5	0.5		**0CJ5**	✓	1 unit
	Without	400	5	0.5 calibrated		**0CJ6**	✓	1 unit
	Without	500	1	1		**0CK1**	✓	1 unit
	Without	500	1	0.5		**0CK2**	✓	1 unit
	Without	500	1	0.5 calibrated		**0CK3**	✓	1 unit
	Without	500	5	1		**0CK4**	✓	1 unit
	Without	500	5	0.5		**0CK5**	✓	1 unit
	Without	500	5	0.5 calibrated		**0CK6**	✓	1 unit
	Without	600	1	1		**0CL1**	✓	1 unit
	Without	600	1	0.5		**0CL2**	✓	1 unit
	Without	600	1	0.5 calibrated		**0CL3**	✓	1 unit
	Without	600	5	1		**0CL4**	✓	1 unit
	Without	600	5	0.5		**0CL5**	✓	1 unit
	Without	600	5	0.5 calibrated		**0CL6**	✓	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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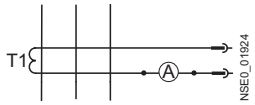
For sizes 3 and 3T (continued)

1 current transformer to 1 ammeter and multi-function plug



Ammeters	Current transformers: Primary current A	Current transformers: Secondary current A	Current transformers: Accuracy class	SD d	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
Moving iron	400	1	1		**1EH1**	✓	1 unit
Moving iron	400	1	0.5		**1EH2**	✓	1 unit
Moving iron	300	1	0.5 calibrated		**1EH3**	✓	1 unit
Moving iron	300	5	1		**1EH4**	✓	1 unit
Moving iron	300	5	0.5		**1EH5**	✓	1 unit
Moving iron	300	5	0.5 calibrated		**1EH6**	✓	1 unit
Moving iron	400	1	1		**1EJ1**	✓	1 unit
Moving iron	400	1	0.5		**1EJ2**	✓	1 unit
Moving iron	400	1	0.5 calibrated		**1EJ3**	✓	1 unit
Moving iron	400	5	1		**1EJ4**	✓	1 unit
Moving iron	400	5	0.5		**1EJ5**	✓	1 unit
Moving iron	400	5	0.5 calibrated		**1EJ6**	✓	1 unit
Moving iron	500	1	1		**1EK1**	✓	1 unit
Moving iron	500	1	0.5		**1EK2**	✓	1 unit
Moving iron	500	1	0.5 calibrated		**1EK3**	✓	1 unit
Moving iron	500	5	1		**1EK4**	✓	1 unit
Moving iron	500	5	0.5		**1EK5**	✓	1 unit
Moving iron	500	5	0.5 calibrated		**1EK6**	✓	1 unit
Moving iron	600	1	1		**1EL1**	✓	1 unit
Moving iron	600	1	0.5		**1EL2**	✓	1 unit
Moving iron	600	1	0.5 calibrated		**1EL3**	✓	1 unit
Moving iron	600	5	1		**1EL4**	✓	1 unit
Moving iron	600	5	0.5		**1EL5**	✓	1 unit
Moving iron	600	5	0.5 calibrated		**1EL6**	✓	1 unit
Bi-metal	300	1	1		**2EH1**	✓	1 unit
Bi-metal	300	1	0.5		**2EH2**	✓	1 unit
Bi-metal	300	1	0.5 calibrated		**2EH3**	✓	1 unit
Bi-metal	300	5	1		**2EH4**	✓	1 unit
Bi-metal	300	5	0.5		**2EH5**	✓	1 unit
Bi-metal	300	5	0.5 calibrated		**2EH6**	✓	1 unit
Bi-metal	400	1	1		**2EJ1**	✓	1 unit
Bi-metal	400	1	0.5		**2EJ2**	✓	1 unit
Bi-metal	400	1	0.5 calibrated		**2EJ3**	✓	1 unit
Bi-metal	400	5	1		**2EJ4**	✓	1 unit
Bi-metal	400	5	0.5		**2EJ5**	✓	1 unit
Bi-metal	400	5	0.5 calibrated		**2EJ6**	✓	1 unit
Bi-metal	500	1	1		**2EK1**	✓	1 unit
Bi-metal	500	1	0.5		**2EK2**	✓	1 unit
Bi-metal	500	1	0.5 calibrated		**2EK3**	✓	1 unit
Bi-metal	500	5	1		**2EK4**	✓	1 unit
Bi-metal	500	5	0.5		**2EK5**	✓	1 unit
Bi-metal	500	5	0.5 calibrated		**2EK6**	✓	1 unit
Bi-metal	600	1	1		**2EL1**	✓	1 unit
Bi-metal	600	1	0.5		**2EL2**	✓	1 unit
Bi-metal	600	1	0.5 calibrated		**2EL3**	✓	1 unit
Bi-metal	600	5	1		**2EL4**	✓	1 unit
Bi-metal	600	5	0.5		**2EL5**	✓	1 unit
Bi-metal	600	5	0.5 calibrated		**2EL6**	✓	1 unit

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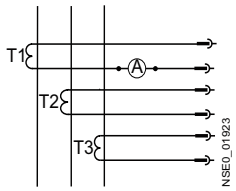
For LV HRC and BS fuse links

For sizes 3 and 3T (continued)

3 current transformers to 1 ammeter and multi-function plug



Ammeters	Current transformers: Primary current A	Current transformers: Secondary current A	Current transformers: Accuracy class	SD d	Article No. supplement 3NJ62 ..-.....-□□□□	Additional price	PS
Moving iron	300	1	1		**1FH1**	✓	1 unit
Moving iron	300	1	0.5		**1FH2**	✓	1 unit
Moving iron	300	1	0.5 calibrated		**1FH3**	✓	1 unit
Moving iron	300	5	1		**1FH4**	✓	1 unit
Moving iron	300	5	0.5		**1FH5**	✓	1 unit
Moving iron	300	5	0.5 calibrated		**1FH6**	✓	1 unit
Moving iron	400	1	1		**1FJ1**	✓	1 unit
Moving iron	400	1	0.5		**1FJ2**	✓	1 unit
Moving iron	400	1	0.5 calibrated		**1FJ3**	✓	1 unit
Moving iron	400	5	1		**1FJ4**	✓	1 unit
Moving iron	400	5	0.5		**1FJ5**	✓	1 unit
Moving iron	400	5	0.5 calibrated		**1FJ6**	✓	1 unit
Moving iron	500	1	1		**1FK1**	✓	1 unit
Moving iron	500	1	0.5		**1FK2**	✓	1 unit
Moving iron	500	1	0.5 calibrated		**1FK3**	✓	1 unit
Moving iron	500	5	1		**1FK4**	✓	1 unit
Moving iron	500	5	0.5		**1FK5**	✓	1 unit
Moving iron	500	5	0.5 calibrated		**1FK6**	✓	1 unit
Moving iron	600	1	1		**1FL1**	✓	1 unit
Moving iron	600	1	0.5		**1FL2**	✓	1 unit
Moving iron	600	1	0.5 calibrated		**1FL3**	✓	1 unit
Moving iron	600	5	1		**1FL4**	✓	1 unit
Moving iron	600	5	0.5		**1FL5**	✓	1 unit
Moving iron	600	5	0.5 calibrated		**1FL6**	✓	1 unit
Bi-metal	300	1	1		**2FH1**	✓	1 unit
Bi-metal	300	1	0.5		**2FH2**	✓	1 unit
Bi-metal	300	1	0.5 calibrated		**2FH3**	✓	1 unit
Bi-metal	300	5	1		**2FH4**	✓	1 unit
Bi-metal	300	5	0.5		**2FH5**	✓	1 unit
Bi-metal	300	5	0.5 calibrated		**2FH6**	✓	1 unit
Bi-metal	400	1	1		**2FJ1**	✓	1 unit
Bi-metal	400	1	0.5		**2FJ2**	✓	1 unit
Bi-metal	400	1	0.5 calibrated		**2FJ3**	✓	1 unit
Bi-metal	400	5	1		**2FJ4**	✓	1 unit
Bi-metal	400	5	0.5		**2FJ5**	✓	1 unit
Bi-metal	400	5	0.5 calibrated		**2FJ6**	✓	1 unit
Bi-metal	500	1	1		**2FK1**	✓	1 unit
Bi-metal	500	1	0.5		**2FK2**	✓	1 unit
Bi-metal	500	1	0.5 calibrated		**2FK3**	✓	1 unit
Bi-metal	500	5	1		**2FK4**	✓	1 unit
Bi-metal	500	5	0.5		**2FK5**	✓	1 unit
Bi-metal	500	5	0.5 calibrated		**2FK6**	✓	1 unit
Bi-metal	600	1	1		**2FL1**	✓	1 unit
Bi-metal	600	1	0.5		**2FL2**	✓	1 unit
Bi-metal	600	1	0.5 calibrated		**2FL3**	✓	1 unit
Bi-metal	600	5	1		**2FL4**	✓	1 unit
Bi-metal	600	5	0.5		**2FL5**	✓	1 unit
Bi-metal	600	5	0.5 calibrated		**2FL6**	✓	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
For sizes 00, A3 and 00T						
Terminals						
 3NJ6923-1BA00						
Single terminal for 2/3-pole devices, 10 ... 95 mm^2 (1 set = 3 units)		**3NJ6923-1BA00**		1	1 unit	1DL
Single terminal for 4-pole devices, 10 ... 95 mm^2 (1 set = 4 units)		**3NJ6924-1BA00**		1	1 unit	1DL
Terminal covers						
 3NJ6923-1DA00						
For 2/3-pole devices		**3NJ6923-1DA00**		1	1 unit	1DL
Only for 4th pole		**3NJ6904-1DA00**		1	1 unit	1DL
Contact extensions						
 3NJ6923-1EB00						
3-pole		**3NJ6923-1EB00**		1	1 unit	1DL
4-pole		**3NJ6924-1EB00**		1	1 unit	1DL
Electronic fuse monitoring and line monitoring devices						
 3NJ6923-3FB00						
EFM 10, fuse monitoring for AC networks		**3NJ6920-3FB00**		1	1 unit	1DL
EFM 20, fuse monitoring and line monitoring for AC networks		**3NJ6920-3FC00**		1	1 unit	1DL
EFM 25, fuse monitoring and line monitoring for DC networks		**3NJ6920-3FE00**		1	1 unit	1DL
 3NJ6923-3FC00						
Auxiliary switches						
 3NJ6920-2BB00						
1 NO contact (1 NO) with cover		**3NJ6920-2BB00**		1	1 unit	1DL
1 NO contact (1 NO)		**3NJ6900-2BC00**		1	1 unit	1DL
 3NJ6900-2BC00						
1 NC contact (1 NC) with cover		**3NJ6920-2CB00**		1	1 unit	1DL
1 NC contact (1 NC)		**3NJ6900-2CC00**		1	1 unit	1DL
Current transformers for main devices and contact extensions						
∅ = Feed-through opening diameter						
The current transformers can also be used with the 7KM PAC measuring devices, see chapter "Measuring Devices and Power Monitoring".						
 3NJ6920-3BD11						
50 A/1 A	Class 1	1 VA, ∅ 21 mm	**3NJ6920-3BB11**	1	1 unit	1DL
50 A/5 A	Class 1	1 VA, ∅ 21 mm	**3NJ6920-3BB21**	1	1 unit	1DL
100 A/1 A	Class 1	2.5 VA, ∅ 21 mm	**3NJ6920-3BD11**	1	1 unit	1DL
100 A/1 A	Class 0.5	1.5 VA, ∅ 21 mm	**3NJ6920-3BD12**	1	1 unit	1DL
100 A/1 A	Class 0.5 calibrated	1.5 VA, ∅ 14 mm	**3NJ6920-3BD13**	1	1 unit	1DL
100 A/5 A	Class 1	2.5 VA, ∅ 21 mm	**3NJ6920-3BD21**	1	1 unit	1DL
100 A/5 A	Class 0.5	1.5 VA, ∅ 21 mm	**3NJ6920-3BD22**	1	1 unit	1DL
100 A/5 A	Class 0.5 calibrated	1.5 VA, ∅ 14 mm	**3NJ6920-3BD23**	1	1 unit	1DL
150 A/1 A	Class 1	2.5 VA, ∅ 21 mm	**3NJ6920-3BE11**	1	1 unit	1DL
150 A/1 A	Class 0.5	1.5 VA, ∅ 21 mm	**3NJ6920-3BE12**	1	1 unit	1DL
150 A/1 A	Class 0.5 calibrated	2.5 VA, ∅ 14 mm	**3NJ6920-3BE13**	1	1 unit	1DL
150 A/5 A	Class 1	1.5 VA, ∅ 21 mm	**3NJ6920-3BE21**	1	1 unit	1DL
150 A/5 A	Class 0.5	1.5 VA, ∅ 21 mm	**3NJ6920-3BE22**	1	1 unit	1DL
150 A/5 A	Class 0.5 calibrated	2.5 VA, ∅ 14 mm	**3NJ6920-3BE23**	1	1 unit	1DL

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Accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For sizes 00, A3 and 00T (continued)							
 3NJ6920-3DB00	**Current transformer busbars for current transformers with feed-through opening ∅ 21 mm**						
	For 1 current transformer		**3NJ6920-3DB00**		1	1 unit	1DL
	For 3 current transformers		**3NJ6920-3DC00**		1	1 unit	1DL
	For 4 current transformers[1]		**3NJ6920-3DD00**		1	1 unit	1DL
 3NJ6920-3DC00	**Current transformer busbars for current transformers with feed-through opening ∅ 14 mm**						
	For 1 current transformer		**3NJ6920-3DE00**		1	1 unit	1DL
	For 3 current transformers		**3NJ6920-3DF00**		1	1 unit	1DL
 3NJ6920-3DD00	For 4 current transformers[1]		**3NJ6920-3DG00**		1	1 unit	1DL
 3NJ6900-4GA00	**Holders for ammeters** For sizes 00, 1, 2, 3		**3NJ6900-4GA00**		1	1 unit	1DL
 3NJ6900-4H...	**Ammeters** **Moving-iron measuring instruments for measurements on transformer x/1 A with double overload**						
	50 A/1 A 0.6 VA		**3NJ6900-4HB11**		1	1 unit	1DL
	100 A/1 A 0.6 VA		**3NJ6900-4HD11**		1	1 unit	1DL
	150 A/1 A 0.6 VA		**3NJ6900-4HE11**		1	1 unit	1DL
	Moving-iron measuring instruments for measurements on transformer x/5 A with double overload						
	50 A/5 A 0.6 VA		**3NJ6900-4HB21**		1	1 unit	1DL
	100 A/5 A 0.6 VA		**3NJ6900-4HD21**		1	1 unit	1DL
	150 A/5 A 0.6 VA		**3NJ6900-4HE21**		1	1 unit	1DL
 3NJ6900-4H...	**Bi-metal measuring instruments with slave pointer for measurements on transformer x/1 A with 1.2-times overload**						
	50 A/1 A 1 VA		**3NJ6900-4HB12**		1	1 unit	1DL
	100 A/1 A 1 VA		**3NJ6900-4HD12**		1	1 unit	1DL
	150 A/1 A 1 VA		**3NJ6900-4HE12**		1	1 unit	1DL
	Bi-metal measuring instruments with slave pointer for measurements on transformer x/5 A with 1.2-times overload						
	50 A/5 A 1 VA		**3NJ6900-4HB22**		1	1 unit	1DL
	100 A/5 A 1 VA		**3NJ6900-4HD22**		1	1 unit	1DL
	150 A/5 A 1 VA		**3NJ6900-4HE22**		1	1 unit	1DL
 3NJ6920-3EB00	**Multi-function plugs**						
	6 x 2.5 mm^2, with fixing screws		**3NJ6920-3EB00**		1	1 unit	1DL
 3NJ6920-3ED00	8 x 2.5 mm^2, without fixing screws		**3NJ6920-3ED00**		1	1 unit	1DL
 3NJ6920-3EE00	10 x 1.5 mm^2 and 8 x 2.5 mm^2, without fixing screws		**3NJ6920-3EE00**		1	1 unit	1DL
 3NJ6923-4BB00	**Front panels**						
	For NH: 3NJ6203-1AA... and 3NJ6203-3AA... without/with EFM		**3NJ6923-4BB00**		1	1 unit	1DL
	For BS: 3NJ6203-1AA... and 3NJ6203-3AA... without/with EFM		**3NJ6923-4BC00**		1	1 unit	1DL

[1] Not available in combination with multi-function plugs.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For sizes 1 and B2							
 3NJ6933-1BA00	**Terminals**						
	Single terminal for 2/3-pole devices, 16 ... 300 mm² (1 set = 3 units)		**3NJ6933-1BA00**		1	1 unit	1DL
	Single terminal for 4-pole devices, 16 ... 300 mm² (1 set = 4 units)		**3NJ6934-1BA00**		1	1 unit	1DL
 3NJ6933-1DB00	**Terminal covers**						
	For 2/3-pole devices		**3NJ6933-1DA01**		1	1 unit	1DL
	Internal terminal covers for 2/3-pole devices		**3NJ6933-1DB00**		1	1 unit	1DL
	Only for 4th pole		**3NJ6904-1DA00**		1	1 unit	1DL
 3NJ6933-1EB00	**Contact extensions**						
	3-pole		**3NJ6933-1EB00**		1	1 unit	1DL
	4-pole		**3NJ6934-1EB00**		1	1 unit	1DL
 3NJ6923-3FB00	**Electronic fuse monitoring and line monitoring devices**						
	EFM 10, fuse monitoring for AC networks		**3NJ6930-3FB00**		1	1 unit	1DL
	EFM 20, fuse monitoring and line monitoring for AC networks		**3NJ6930-3FC00**		1	1 unit	1DL
	EFM 25, fuse monitoring and line monitoring for DC networks		**3NJ6930-3FE00**		1	1 unit	1DL
 3NJ6923-3FC00							
 3NJ6930-2BB00	**Auxiliary switches**						
	1 NO contact (1 NO) with cover		**3NJ6930-2BB00**		1	1 unit	1DL
	1 NO contact (1 NO)		**3NJ6900-2BC00**		1	1 unit	1DL
	1 NC contact (1 NC) with cover		**3NJ6930-2CB00**		1	1 unit	1DL
	1 NC contact (1 NC)		**3NJ6900-2CC00**		1	1 unit	1DL
 3NJ6900-2BC00							
	Current transformers for main devices and contact extensions ∅ = Feed-through opening diameter						
	The current transformers can also be used with the 7KM PAC measuring devices, see chapter "Measuring Devices and Power Monitoring".						
 3NJ6920-3BD11	50 A/1 A Class 1 1 VA, ∅ 21 mm		**3NJ6920-3BB11**		1	1 unit	1DL
	50 A/5 A Class 1 1 VA, ∅ 21 mm		**3NJ6920-3BB21**		1	1 unit	1DL
	100 A/1 A Class 1 2.5 VA, ∅ 21 mm		**3NJ6920-3BD11**		1	1 unit	1DL
	100 A/1 A Class 0.5 1.5 VA, ∅ 21 mm		**3NJ6920-3BD12**		1	1 unit	1DL
	100 A/5 A Class 1 2.5 VA, ∅ 21 mm		**3NJ6920-3BD21**		1	1 unit	1DL
	100 A/5 A Class 0.5 1.5 VA, ∅ 21 mm		**3NJ6920-3BD22**		1	1 unit	1DL
	150 A/1 A Class 1 2.5 VA, ∅ 21 mm		**3NJ6920-3BE11**		1	1 unit	1DL
	150 A/1 A Class 0.5 1.5 VA, ∅ 21 mm		**3NJ6920-3BE12**		1	1 unit	1DL
	150 A/5 A Class 1 1.5 VA, ∅ 21 mm		**3NJ6920-3BE21**		1	1 unit	1DL
	150 A/5 A Class 0.5 1.5 VA, ∅ 21 mm		**3NJ6920-3BE22**		1	1 unit	1DL
	200 A/1 A Class 1 2.5 VA, ∅ 21 mm		**3NJ6930-3BF11**		1	1 unit	1DL
	200 A/1 A Class 0.5 5 VA, ∅ 21 mm		**3NJ6930-3BF12**		1	1 unit	1DL
	200 A/5 A Class 1 2.5 VA, ∅ 21 mm		**3NJ6930-3BF21**		1	1 unit	1DL
	200 A/5 A Class 0.5 2.5 VA, ∅ 21 mm		**3NJ6930-3BF22**		1	1 unit	1DL
	250 A/1 A Class 1 5 VA, ∅ 21 mm		**3NJ6930-3BG11**		1	1 unit	1DL
	250 A/1 A Class 0.5 5 VA, ∅ 21 mm		**3NJ6930-3BG12**		1	1 unit	1DL
	250 A/5 A Class 1 2.5 VA, ∅ 21 mm		**3NJ6930-3BG21**		1	1 unit	1DL
	250 A/5 A Class 0.5 2.5 VA, ∅ 21 mm		**3NJ6930-3BG22**		1	1 unit	1DL

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Accessories

For sizes 1 and B2 (continued)

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3NJ6930-3DB00	**Current transformer busbars for current transformers with feed-through opening ∅ 21 mm**						
	For 1 current transformer		**3NJ6930-3DB00**		1	1 unit	1DL
	For 3 current transformers		**3NJ6930-3DC00**		1	1 unit	1DL
	For 4 current transformers[1]		**3NJ6930-3DD00**		1	1 unit	1DL
 3NJ6930-3DC00							
 3NJ6930-3DD00							
 3NJ6900-4GA00	**Holders for ammeters**		**3NJ6900-4GA00**		1	1 unit	1DL
	For sizes 00, 1, 2, 3						
 3NJ6900-4H...	**Ammeters**						
	Moving-iron measuring instruments for measurements on transformer x/1 A with double overload						
	50 A/1 A 0.6 VA		**3NJ6900-4HB11**		1	1 unit	1DL
	100 A/1 A 0.6 VA		**3NJ6900-4HD11**		1	1 unit	1DL
	150 A/1 A 0.6 VA		**3NJ6900-4HE11**		1	1 unit	1DL
	200 A/1 A 0.6 VA		**3NJ6900-4HF11**		1	1 unit	1DL
	250 A/1 A 0.6 VA		**3NJ6900-4HG11**		1	1 unit	1DL
	Moving-iron measuring instruments for measurements on transformer x/5 A with double overload						
	50 A/5 A 0.6 VA		**3NJ6900-4HB21**		1	1 unit	1DL
	100 A/5 A 0.6 VA		**3NJ6900-4HD21**		1	1 unit	1DL
	150 A/5 A 0.6 VA		**3NJ6900-4HE21**		1	1 unit	1DL
	200 A/5 A 0.6 VA		**3NJ6900-4HF21**		1	1 unit	1DL
	250 A/5 A 0.6 VA		**3NJ6900-4HG21**		1	1 unit	1DL
 3NJ6900-4H...	**Bi-metal measuring instruments with slave pointer for measurements on transformer x/1 A with 1.2-times overload**						
	50 A/1 A 1 VA		**3NJ6900-4HB12**		1	1 unit	1DL
	100 A/1 A 1 VA		**3NJ6900-4HD12**		1	1 unit	1DL
	150 A/1 A 1 VA		**3NJ6900-4HE12**		1	1 unit	1DL
	200 A/1 A 1 VA		**3NJ6900-4HF12**		1	1 unit	1DL
	250 A/1 A 1 VA		**3NJ6900-4HG12**		1	1 unit	1DL
	Bi-metal measuring instruments with slave pointer for measurements on transformer x/5 A with 1.2-times overload						
	50 A/5 A 1 VA		**3NJ6900-4HB22**		1	1 unit	1DL
	100 A/5 A 1 VA		**3NJ6900-4HD22**		1	1 unit	1DL
	150 A/5 A 1 VA		**3NJ6900-4HE22**		1	1 unit	1DL
	200 A/5 A 1 VA		**3NJ6900-4HF22**		1	1 unit	1DL
	250 A/5 A 1 VA		**3NJ6900-4HG22**		1	1 unit	1DL
 3NJ6920-3EB00	**Multi-function plugs**						
	6 x 2.5 mm^2, with fixing screws		**3NJ6920-3EB00**		1	1 unit	1DL
	8 x 2.5 mm^2, without fixing screws		**3NJ6920-3ED00**		1	1 unit	1DL
 3NJ6940-3EE00	10 x 1.5 mm^2 and 8 x 2.5 mm^2, without fixing screws		**3NJ6920-3EE00**		1	1 unit	1DL
 3NJ6933-4BB00	**Front panels**						
	For NH: 3NJ6213-1AA... and 3NJ6213-3AA... without/with EFM		**3NJ6933-4BB00**		1	1 unit	1DL
	For BS: 3NJ6213-1AA... and 3NJ6213-3AA... without/with EFM		**3NJ6933-4BC00**		1	1 unit	1DL

[1] Not available in combination with multi-function plugs.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For sizes 2, 3, B4 and 3T							
 3NJ6943-1CA00	**Terminals**						
	Double terminals for 2/3-pole devices, 2 x (16 mm^2 ... 300 mm^2, 1 set = 6 units)		**3NJ6943-1CA00**		1	1 unit	1DL
	Double terminals for 4-pole devices, 2 x (16 mm^2 ... 300 mm^2, 1 set = 8 units)		**3NJ6944-1CA00**		1	1 unit	1DL
 3NJ6943-1DA00	**Terminal covers**						
	For 2/3-pole devices		**3NJ6943-1DA00**		1	1 unit	1DL
	Only for 4th pole		**3NJ6904-1DA00**		1	1 unit	1DL
 3NJ6944-1EB00	**Contact extensions**						
	3-pole		**3NJ6943-1EB00**		1	1 unit	1DL
	4-pole		**3NJ6944-1EB00**		1	1 unit	1DL
 3NJ6923-3FB00	**Electronic fuse monitoring and line monitoring devices**						
	EFM 10, fuse monitoring for AC networks		**3NJ6940-3FB00**		1	1 unit	1DL
	EFM 20, fuse monitoring and line monitoring for AC networks		**3NJ6940-3FC00**		1	1 unit	1DL
	EFM 25, fuse monitoring and line monitoring for DC networks		**3NJ6940-3FE00**		1	1 unit	1DL
 3NJ6923-3FC00							
 3NJ6940-2BB00	**Auxiliary switches**						
	1 NO contact (1 NO) with cover		**3NJ6940-2BB00**		1	1 unit	1DL
	1 NO contact (1 NO)		**3NJ6900-2BC00**		1	1 unit	1DL
	1 NC contact (1 NC) with cover		**3NJ6940-2CB00**		1	1 unit	1DL
	1 NC contact (1 NC)		**3NJ6900-2CC00**		1	1 unit	1DL
 3NJ6900-2BC00							
	Current transformers for main devices and contact extensions						
 3NJ6940-3B...	300 A/1 A	Class 1	5 VA	**3NJ6940-3BH11**	1	1 unit	1DL
	300 A/1 A	Class 0.5	5 VA	**3NJ6940-3BH12**	1	1 unit	1DL
	300 A/1 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BH13**	1	1 unit	1DL
	300 A/5 A	Class 1	5 VA	**3NJ6940-3BH21**	1	1 unit	1DL
	300 A/5 A	Class 0.5	5 VA	**3NJ6940-3BH22**	1	1 unit	1DL
	300 A/5 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BH23**	1	1 unit	1DL
	400 A/1 A	Class 1	5 VA	**3NJ6940-3BJ11**	1	1 unit	1DL
	400 A/1 A	Class 0.5	5 VA	**3NJ6940-3BJ12**	1	1 unit	1DL
	400 A/1 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BJ13**	1	1 unit	1DL
	400 A/5 A	Class 1	5 VA	**3NJ6940-3BJ21**	1	1 unit	1DL
	400 A/5 A	Class 0.5	5 VA	**3NJ6940-3BJ22**	1	1 unit	1DL
	400 A/5 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BJ23**	1	1 unit	1DL
	500 A/1 A	Class 1	5 VA	**3NJ6940-3BK11**	1	1 unit	1DL
	500 A/1 A	Class 0.5	5 VA	**3NJ6940-3BK12**	1	1 unit	1DL
	500 A/1 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BK13**	1	1 unit	1DL
	500 A/5 A	Class 1	5 VA	**3NJ6940-3BK21**	1	1 unit	1DL
	500 A/5 A	Class 0.5	5 VA	**3NJ6940-3BK22**	1	1 unit	1DL
	500 A/5 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BK23**	1	1 unit	1DL
	600 A/1 A	Class 1	5 VA	**3NJ6940-3BL11**	1	1 unit	1DL
	600 A/1 A	Class 0.5	5 VA	**3NJ6940-3BL12**	1	1 unit	1DL
	600 A/1 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BL13**	1	1 unit	1DL
	600 A/5 A	Class 1	5 VA	**3NJ6940-3BL21**	1	1 unit	1DL
	600 A/5 A	Class 0.5	5 VA	**3NJ6940-3BL22**	1	1 unit	1DL
	600 A/5 A	Class 0.5 calibrated	5 VA	**3NJ6940-3BL23**	1	1 unit	1DL

The current transformers can also be used with the 7KM PAC measuring devices, see chapter "Measuring Devices and Power Monitoring".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Accessories

For sizes 2, 3, B4 and 3T (continued)

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3NJ6900-4GA00	**Holders for ammeters** For sizes 00, 1, 2, 3		**3NJ6900-4GA00**		1	1 unit	1DL
 3NJ6900-4H...	**Ammeters** **Moving-iron measuring instruments for measuring input on transformer x/1 A with double overload**						
	300 A/1 A 0.6 VA		**3NJ6900-4HH11**		1	1 unit	1DL
	400 A/1 A 0.6 VA		**3NJ6900-4HJ11**		1	1 unit	1DL
	500 A/1 A 0.6 VA		**3NJ6900-4HK11**		1	1 unit	1DL
	600 A/1 A 0.6 VA		**3NJ6900-4HL11**		1	1 unit	1DL
	Moving-iron measuring instruments for measuring input on transformer x/5 A with double overload						
	300 A/5 A 0.6 VA		**3NJ6900-4HH21**		1	1 unit	1DL
	400 A/5 A 0.6 VA		**3NJ6900-4HJ21**		1	1 unit	1DL
	500 A/5 A 0.6 VA		**3NJ6900-4HK21**		1	1 unit	1DL
	600 A/5 A 0.6 VA		**3NJ6900-4HL21**		1	1 unit	1DL
 3NJ6900-4H...	**Bi-metal measuring instruments with slave pointer for measurements on transformer x/1 A with 1.2-times overload**						
	300 A/1 A 1 VA		**3NJ6900-4HH12**		1	1 unit	1DL
	400 A/1 A 1 VA		**3NJ6900-4HJ12**		1	1 unit	1DL
	500 A/1 A 1 VA		**3NJ6900-4HK12**		1	1 unit	1DL
	600 A/1 A 1 VA		**3NJ6900-4HL12**		1	1 unit	1DL
	Bi-metal measuring instruments with slave pointer for measurements on transformer x/5 A with 1.2-times overload						
	300 A/5 A 1 VA		**3NJ6900-4HH22**		1	1 unit	1DL
	400 A/5 A 1 VA		**3NJ6900-4HJ22**		1	1 unit	1DL
	500 A/5 A 1 VA		**3NJ6900-4HK22**		1	1 unit	1DL
	600 A/5 A 1 VA		**3NJ6900-4HL22**		1	1 unit	1DL
 3NJ6940-3EC00	**Multi-function plugs**						
	8 x 2.5 mm^2, with fixing screws		**3NJ6940-3EC00**		1	1 unit	1DL
 3NJ6940-3ED00	8 x 2.5 mm^2, without fixing screws		**3NJ6940-3ED00**		1	1 unit	1DL
 3NJ6940-3EF00	12 x 1.5 mm^2 and 8 x 2.5 mm^2, without fixing screws		**3NJ6940-3EF00**		1	1 unit	1DL
 3NJ6943-4BB00	**Front panels**						
	For NH: 3NJ6223-1AA... and 3NJ6223-3AA... without/with EFM		**3NJ6943-4BB00**		1	1 unit	1DL
	For BS: 3NJ6223-1AA... and 3NJ6223-3AA... without/with EFM		**3NJ6943-4BC00**		1	1 unit	1DL
	For NH: 3NJ6233-1AA... and 3NJ6233-3AA... without/with EFM		**3NJ6953-4BB00**		1	1 unit	1DL
	For BS: 3NJ6233-1AA... and 3NJ6233-3AA... without/with EFM		**3NJ6953-4BC00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Common accessories							
 3NJ6916-4EA00	**Busbar covers**						
	Mounting height 200 mm, IP20		**3NJ6916-4EA00**		1	1 unit	1CL
 3NJ6900-4CB00	**Blanking covers**						
	Mounting height 50 mm, IP41		**3NJ6900-4CB00**		1	1 unit	1DL
 3NJ6915-3BA00	**Connection modules**						
	For power takeoff from field distribution bus up to 400 A		**3NJ6915-3BA00**		1	1 unit	1CL
 3NJ6900-4FB00	**Guide rails**						
	Overall depth 200 mm (1 x left and 1 x right)		**3NJ6900-4FB00**		1	1 unit	1DL
	Overall depth 400 mm (1 x left and 1 x right)		**3NJ6900-4FC00**		1	1 unit	1DL
 3NJ6900-4FC00							
	LV HRC fuse puller tongs						
	For NH00		**XPT:8PT9624**		1	1 unit	1EA
	For NH1, 2, 3		**XPT:8PT9625**		1	1 unit	1EA
	Locking devices for padlocks						
	For all devices		**3NJ6900-4LL**		1	1 unit	1DL

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For 3KD and 3KF switch disconnectors

Overview



8UD1 rotary operating mechanisms in STANDARD version in gray (ti-gray, left) and EMERGENCY-STOP version in red/yellow (right)

With door-coupling rotary operating mechanisms it is also possible to operate switch disconnectors from the outside with the control cabinet doors closed.

The rotary operating mechanisms are available in "STANDARD" and "EMERGENCY-STOP" versions with the following differences:

- STANDARD version: Masking plates in light-gray with black inscription, handles in ti-gray
- EMERGENCY-STOP version: Masking plates in yellow with black inscription, handles in red

Degree of protection

Degree of protection when installed is IP65.

Standards

8UD1 door-coupling rotary operating mechanisms are in line with the following standards, for example:

Standard	Title
IEC 60204-1, EN 60204-1 (VDE 0113 Part 1)	Safety of machinery; electrical equipment of machines
IEC 60439-1, EN 60439-1 (VDE 0660 Part 500)	Low-voltage switchgear and controlgear assemblies
IEC 60947-3, EN 60947-3 (VDE 0660 Part 107)	Low-voltage switchgear and controlgear; Switches, disconnectors, switch disconnectors and fuse-combination units

Benefits

Lockability

The retractable locking device integrated in the handles is suitable for padlocks with shackle diameters of 4.5 mm to 9.5 mm (locks according to DIN 7465).

Up to three padlocks with a shackle diameter of 9.5 mm can be fitted simultaneously.

Non-interchangeability

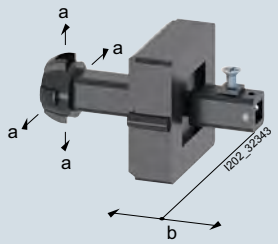
In order to ensure that, when installing switches and door-coupling operating mechanisms, all components are assembled in the correct position with respect to one another, the components are provided with non-interchangeability features (rivet and lug).

Stops

Stops are used to prevent damage occurring as the result of excessive torque. These stops are supplied loose with the rotary operating mechanisms and can be fitted as required. Stops are fitted at the factory to size 1 and 2 rotary operating mechanisms with a 90° operating angle (exception: 3RV motor starter protectors/circuit breakers).

Tolerance compensation

8UD1 rotary operating mechanisms are capable of taking up a radial eccentricity of max. 8 mm between the actuating shaft of the switching device and the door-coupling rotary operating mechanism. Supporting the extension shaft is recommended with greater tolerances.



Coupling drivers	a	b	Shaft length
With tolerance compensation	± 8	± 5	x
Without tolerance compensation	+ 1.5	± 2.5	x + 23.5

Permissible radial eccentricity and axial tolerance compensation in mm

Pull-out strength

The pull-out strength of interlocked operating mechanisms, e.g. pulling off the shaft or destruction of the operating mechanism, amounts to 800 N when the pulling force acts directly onto the operating mechanism in the direction of the shaft.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Application

8UD1 door-coupling rotary operating mechanisms can be used in electrical controls, distribution boards and switchboards in cases where switches have to be mounted behind covers, end plates and doors that must be opened and where they are to be operated manually from outside.

Interlocking conditions

The basic versions of the rotary operating mechanisms comply with the following interlocking conditions:

- Operating mechanism and switch in "0" (OFF) position: The control cabinet door can be opened. With padlocks fitted, the control cabinet door remains locked however.
- Operating mechanism and switch in "I" (ON) position: The control cabinet door cannot be opened in this position. However, the lock can be overridden and the control cabinet door opened by trained personnel for performing checks. No padlocks can be fitted in "I" position.

Other interlocking conditions:

- If no door interlock is desired, it can be deactivated.

Operating conditions and ambient conditions

The temperature range for operation of the rotary operating mechanisms is between -25 °C and +60 °C.

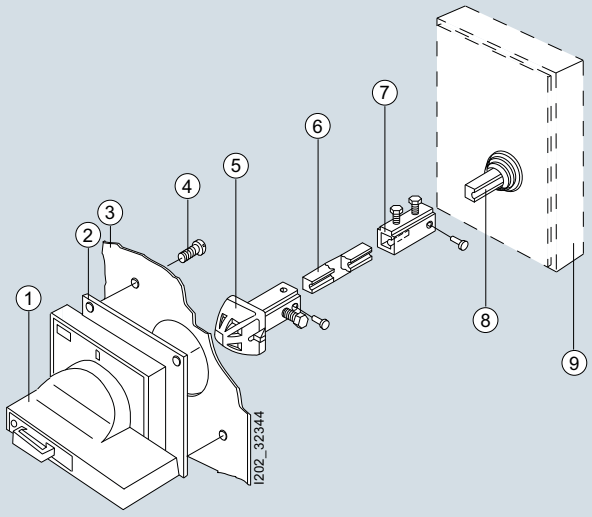
Thanks to the use of glass fiber-reinforced molded plastic for handles and masking plates as well as metal components with surface protection, the rotary operating mechanisms are suitable for rough conditions, high air humidity and aggressive atmospheres.

Design

Components

The rotary operating mechanisms consist of a masking plate with handle, including seal and fixing screws for door installation, an extension shaft (300 mm) and a coupling driver to be mounted onto the switch shaft.

Operating mechanisms for 3KD switch disconnectors do not have a shaft coupling since the extension shaft is fitted directly into the switch. Extension shafts with a length of 600 mm are also available.

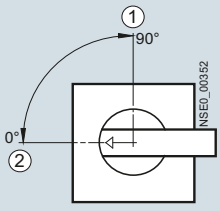


1 Handle with masking frame
2 Seal
3 Door
4 Fixing screws
5 Coupling driver
6 Extension shaft
7 Adapter
8 Operating shaft of switching device
9 Switching device

Design, schematic representation

Switch position

In order to ensure compliance with locking and interlocking conditions, the controls and operating mechanisms must be installed such that, with two-position switches the "0" position lies at 9 o'clock and the "I" position at 12 o'clock.



1 12 o'clock position
2 9 o'clock position

Positions for two-position switches with 90° operating angle

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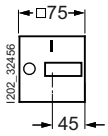
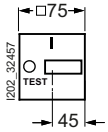
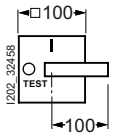
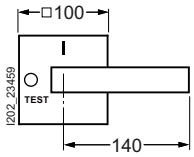
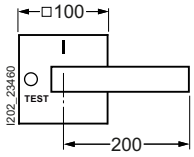
For 3KD and 3KF switch disconnectors

Selection and ordering data

Door-coupling rotary operating mechanisms, fully lockable with padlocks, with door interlock, supplied with seal and fixing screws

Switching device	Rated current	Cross-section of the actuating shaft	Torque	Illustrated: Handle, masking plate
Type	A	mm	Nm	
8UD1 for 3KD switch disconnectors sizes 1 and 2				
	**Labeling 0-I**			
3KD....-.M/N	16 ... 200	8 x 8	3	
	**Labeling TEST-0-I**			
3KD....-.M/N	16 ... 200	8 x 8	3	
8UD1 for 3KD switch disconnectors size 3				
	**Labeling TEST-0-I**			
3KD....-.P	200 ... 400	8 x 8	7.5	
8UD1 for 3KD switch disconnectors size 4				
	**Labeling TEST-0-I**			
3KD....-.Q	500 ... 800	10 x 10	16	
8UD1 for 3KD switch disconnectors size 5				
	**Labeling TEST-0-I**			
3KD....-.R	1000 ... 1600	12 x 12	30	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version	SD	Rotary operating mechanisms, complete		PU (UNIT, SET, M)	PS	PG	Individual parts: Handles illuminated/ without illumination Other handles see page 7/73	Coupling drivers with tolerance compensation/ without tolerance compensation	Extension shaft length 300 mm/ length 600 mm	Shaft coupling
	d	Article No. www.siemens.com/product?Article No.	Price per PU				Article No.	Article No.	Article No.	Article No.
								☐ 8 mm	☐ 8 mm	☐ 8 by 8 mm
Standard		**8UD1171-2AD11**		1	1 unit	1CL	8UD1771-2CD01/ 8UD1771-2AD01	8UD1900-2GA00 8UD1900-2HA00	8UC6032/ 8UC6082	8UC6022
EMERGENCY-STOP		**8UD1171-2AD15**		1	1 unit	1CL	8UD1771-2CD05 8UD1771-2AD05	8UD1900-2GA00 8UD1900-2HA00	8UC6032/ 8UC6082	8UC6022
								☐ 8 mm	☐ 8 mm	☐ 8 by 8 mm
Standard		**8UD1171-2AF21**		1	1 unit	1CL	8UD1771-2CF01/ 8UD1771-2AF01	8UD1900-2GA00/ 8UD1900-2HA00	8UC6032/ 8UC6082	8UC6022
EMERGENCY-STOP		**8UD1171-2AF25**		1	1 unit	1CL	8UD1771-2CF05/ 8UD1771-2AF05	8UD1900-2GA00 8UD1900-2HA00	8UC6032/ 8UC6082	8UC6022
								☐ 8 mm	☐ 8 mm	☐ 8 by 8 mm
Standard		**8UD1141-2AF21**		1	1 unit	1CL	8UD1841-2CF01/ 8UD1841-2AF01	8UD1900-6GA00/ 8UD1900-6HA00	8UC6032/ 8UC6082	8UC6022
EMERGENCY-STOP		**8UD1141-2AF25**		1	1 unit	1CL	8UD1841-2CF05/ 8UD1841-2AF05	8UD1900-6GA00/ 8UD1900-6HA00	8UC6032/ 8UC6082	8UC6022
								☐ 10 mm	☐ 10 mm	☐ 10 by 10 mm
Standard		**8UD1151-3AF21**		1	1 unit	1CL	8UD1851-3CF01/ 8UD1851-3AF01	8UD1900-3GA00/ 8UD1900-3HA00	8UC6033/ 8UC6083	8UC6023
EMERGENCY-STOP		**8UD1151-3AF25**		1	1 unit	1CL	8UD1851-3CF05/ 8UD1851-3AF05	8UD1900-3GA00/ 8UD1900-3HA00	8UC6033/ 8UC6083	8UC6023
								☐ 12 mm	☐ 12 mm	☐ 12 by 12 mm
Standard		**8UD1161-4AF21**		1	1 unit	1CL	8UD1861-4CF01/ 8UD1861-4AF01	8UD1900-4GA00/ 8UD1900-4HA00	8UC6034/ 8UC6084	8UC6024
EMERGENCY-STOP		**8UD1161-4AF25**		1	1 unit	1CL	8UD1861-4CF05/ 8UD1861-4AF05	8UD1900-4GA00/ 8UD1900-4HA00	8UC6034/ 8UC6084	8UC6024

Minimum order quantity (PS) or a multiple thereof can be ordered.

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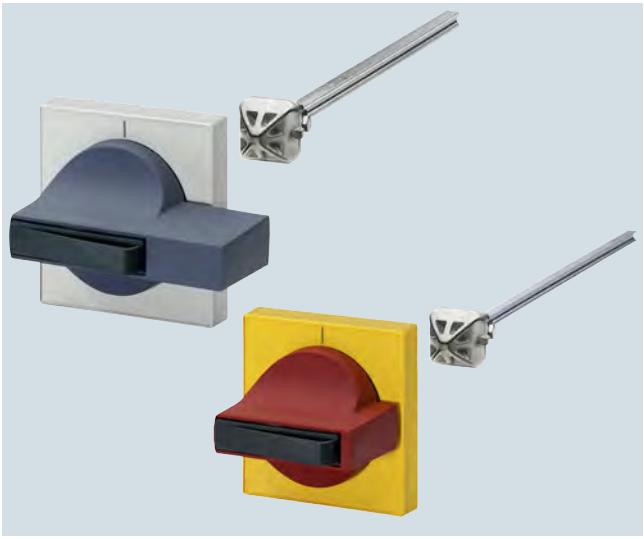
For 3KA/3KE, 3KL, 3KM switch disconnectors

Overview



8UC7 rotary operating mechanism in STANDARD version (left) and EMERGENCY-STOP version (right)

With door-coupling rotary operating mechanisms it is also possible to operate switch disconnectors from the outside with the control cabinet doors closed.

The rotary operating mechanisms are available in "STANDARD" and "EMERGENCY-STOP" versions with the following differences:

- STANDARD version: Masking plates in light-gray with black inscription, handles in ti-gray
- EMERGENCY-STOP version: Masking plates in yellow with black inscription, handles in red

Available sizes

Rotary operating mechanisms	Size	Rated torque[1]	Shaft profile	Masking plate
		Nm	mm x mm	mm x mm
8UC71	1	4	6 x 6	75 x 75
8UC72	2	9	8 x 8	75 x 75
8UC73	3	25	10 x 10 or 12 x 12	100 x 100
8UC74	4	40/55[2]	12 x 12	100 x 100

[1] Operating mechanisms tested with triple torque (according to EN 60947-3). They are therefore also suitable for switch disconnectors.

[2] Operation with two hands.

Degree of protection

Degree of protection when installed is IP65.

Standards

8UC7 door-coupling rotary operating mechanisms are in line with the following standards, for example:

Standard	Title
IEC 60204-1, EN 60204-1 (VDE 0113 Part 1)	Safety of machinery; electrical equipment of machines
IEC 60439-1, EN 60439-1 (VDE 0660 Part 500)	Low-voltage switchgear and controlgear assemblies
IEC 60947-3, EN 60947-3 (VDE 0660 Part 107)	Low-voltage switchgear and controlgear; Switches, disconnectors, switch disconnectors and fuse-combination units

Benefits

Lockability

The retractable locking device integrated in the handles is suitable for padlocks with shackle diameters of 4.5 mm to 8.5 mm (locks according to DIN 7465).

Up to three padlocks with a shackle diameter of 8.5 mm and up to five padlocks with a shackle diameter of 6 mm can be fitted simultaneously.

Non-interchangeability

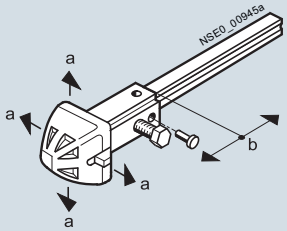
In order to ensure that, when installing switches and door-coupling operating mechanisms, all components are assembled in the correct position with respect to one another, the components are provided with non-interchangeability features (rivet and lug).

Stops

Stops are used to prevent damage occurring as the result of excessive torque. These stops are supplied loose with the rotary operating mechanisms and can be fitted as required. Stops are fitted at the factory to size 1 and 2 rotary operating mechanisms with a 90° operating angle (exception: 3RV motor starter protectors/circuit breakers).

Tolerance compensation

8UC7 rotary operating mechanisms are capable of taking up a radial eccentricity of max. 3 mm between the actuating shaft of the switching device and the door-coupling rotary operating mechanism. Supporting the extension shaft is recommended with greater tolerances.



Coupling drivers	a	b	Shaft length
With tolerance compensation	+3	±5	x
Without tolerance compensation	+1.5	±2.5	x+23.5

Permissible radial eccentricity and axial tolerance compensation in mm

Pull-out strength

The pull-out strength of interlocked operating mechanisms, e.g. pulling off the shaft or destruction of the operating mechanism, amounts to 800 N when the pulling force acts directly onto the operating mechanism in the direction of the shaft.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Application

8UC7 door-coupling rotary operating mechanisms can be used in electrical controls, distribution boards and switchboards in cases where switches have to be mounted behind covers, end plates and doors that must be opened and where they are to be operated manually from outside.

Interlocking conditions

The basic versions of the rotary operating mechanisms comply with the following interlocking conditions:

- Operating mechanism and switch in "0" (OFF) position: The control cabinet door can be opened. With padlocks fitted, the control cabinet door remains locked however.
- Operating mechanism and switch in "I" (ON) position: The control cabinet door cannot be opened in this position. However, the lock can be overridden and the control cabinet door opened by trained personnel for performing checks. No padlocks can be fitted in "I" position.

Other interlocking conditions:

- If no door interlock is required, the user can remove the door interlocking plate of the rotary operating mechanism.
- It is easy for the user to fit padlocks to the rotary operating mechanisms in the "I" position as well. In this case the door cannot be opened, the operating mechanism cannot be actuated and the door interlock cannot be overridden.

Operating conditions and ambient conditions

The temperature range for operation of the rotary operating mechanisms is between -25 °C and +60 °C.

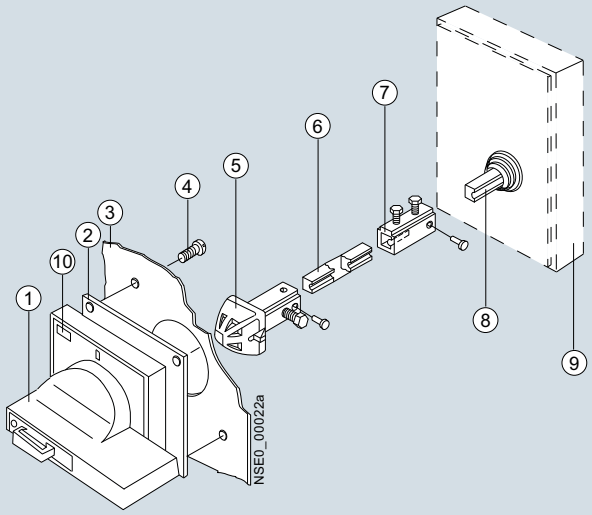
Thanks to the use of glass fiber-reinforced molded plastic for handles and masking plates as well as metal components with surface protection, the rotary operating mechanisms are suitable for rough conditions, high air humidity and aggressive atmospheres.

Design

Components

The rotary operating mechanisms consist of a masking plate with handle, including seal and fixing screws for door installation, an extension shaft (300 mm) and a coupling driver to be mounted onto the switch shaft.

Operating mechanisms for 3KA / 3KL / 3KM switch disconnectors do not have a shaft coupling since the extension shaft is fitted directly into the switch. Extension shafts with a length of 600 mm are also available.

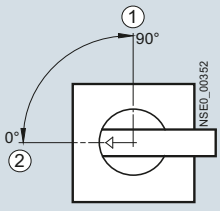


1 Handle with masking frame
2 Seal
3 Door
4 Fixing screws
5 Coupling driver
6 Extension shaft
7 Adapter
8 Operating shaft of switching device
9 Switching device
10 Tripped plate (can be glued on if required)

Design, schematic representation

Switch position

In order to ensure compliance with locking and interlocking conditions, the controls and operating mechanisms must be installed such that, with two-position switches the "0" position lies at 9 o'clock and the "I" position at 12 o'clock.



1 12 o'clock position
2 9 o'clock position

Positions for two-position switches with 90° operating angle

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For 3KA/3KE, 3KL, 3KM switch disconnectors

Selection and ordering data

Door-coupling rotary operating mechanisms, fully lockable with padlocks, with door interlock, supplied with seal and fixing screws

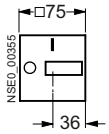
Switching device	Rated current	Cross-section of the actuating shaft	Torque	Rotary operating mechanisms	Illustrated: Handle, masking plate
Type	A	mm	Nm	Size	

8UC71



For switch disconnectors with or without fuses

3KL50[1], 3KM50[1]	63	6 x 6	3	1
3KA50[1]	63	6 x 6	3	
3KA51[1]	80	6 x 6	3	

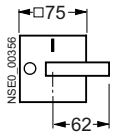


8UC72



For switch disconnectors with or without fuses

3KL52, 3KM52	125	8 x 8	7.5	2
3KL53, 3KM53	160	8 x 8	7.5	
3KA52	125	8 x 8	7.5	
3KA53	160	8 x 8	7.5	

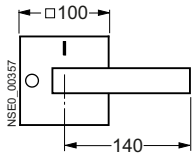


8UC73



For switch disconnectors with or without fuses

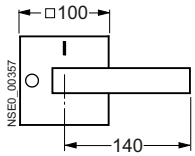
3KL55, 3KM55	250	10 x 10	16	3
3KL57, 3KM57	400	10 x 10	16	
3KA55	250	10 x 10	16	
3KA57	400	10 x 10	16	
3KA58	630	10 x 10	16	





For switch disconnectors without fuses

3KE42	250	12 x 12	15	3
3KE43	400	12 x 12	15	
3KE44	630	12 x 12	24	
3KE45	1000	12 x 12	24	

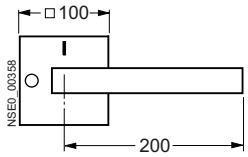


8UC74



For switch disconnectors with fuses

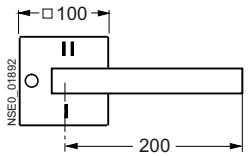
3KL61[2]	630	12 x 12	30	4
3KL62[2]	800	12 x 12	30	





For switch disconnectors as changeover switches with break-before-make feature

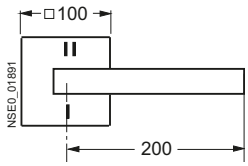
3KE42 (2 units)	250	12 x 12	20	4
3KE43 (2 units)	400	12 x 12	20	
3KE44 (2 units)	630	12 x 12	30	
3KE45 (2 units)	1000	12 x 12	30	





For switch disconnectors as changeover switches without make-before-break feature[3]

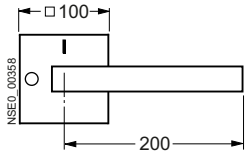
3KE42 (2 units)	250	12 x 12	40	4
3KE43 (2 units)	400	12 x 12	40	
3KE44 (2 units)	630	12 x 12	55	
3KE45 (2 units)	1000	12 x 12	55	





For switch disconnectors as parallel switches

3KE42 (2 units)	250	12 x 12	40	4
3KE43 (2 units)	400	12 x 12	40	
3KE44 (2 units)	630	12 x 12	55	
3KE45 (2 units)	1000	12 x 12	55	



[1] Valid only for 3-pole switching devices. For 4-pole switching devices, an operating mechanism with 8 x 8 mm actuating shaft must be used, see row below for 3KA52, 3KL52 or 3KM52.

[2] Additionally required for 3KL61: 1 shaft coupling, Article No. 8UC9253, see page 7/198.

[3] The door interlocking plate must be removed.

[4] With shortened 8UC6016/8UC6017 coupling driver and reduced tolerance compensation.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version	SD d	Rotary operating mechanisms, complete Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	Individual parts Handle with masking plate Article No.	Coupling drivers Article No.	Extension shaft length 300 mm Article No.	Shaft coupling Article No.
								☐ 6 mm	**☐ 6 mm**	**☐ 6 mm by 6 mm**
Standard		**8UC7111-1BB10**		1	1 unit	1CL	8UC7110-1BB	8UC6011	8UC6031	Not required
Standard[4)]		**8UC7161-1BB10**		1	1 unit	1CL	8UC7110-1BB	8UC6016	8UC6031	Not required
EMERGENCY-STOP		**8UC7121-3BB10**		1	1 unit	1CL	8UC7120-3BB	8UC6011	8UC6031	Not required
								☐ 8 mm	**☐ 8 mm**	**☐ 8 mm by 8 mm**
Standard		**8UC7212-1BB20**		1	1 unit	1CL	8UC7210-1BB	8UC6012	8UC6032	Not required
Standard[4)]		**8UC7262-1BB20**		1	1 unit	1CL	8UC7210-1BB	8UC6017	8UC6032	Not required
EMERGENCY-STOP		**8UC7222-3BB20**		1	1 unit	1CL	8UC7220-3BB	8UC6012	8UC6032	Not required
								☐ 10 mm	**☐ 10 mm**	**☐ 10 mm by 10 mm**
Standard		**8UC7313-1BB30**		1	1 unit	1CL	8UC7310-1BB	8UC6013	8UC6033	Not required
EMERGENCY-STOP		**8UC7323-3BB30**		1	1 unit	1CL	8UC7320-3BB	8UC6013	8UC6033	Not required
								☐ 12 mm	**☐ 12 mm**	**☐ 12 mm by 12 mm**
Standard		**8UC7314-1BB44**		1	1 unit	1CL	8UC7310-1BB	8UC6014	8UC6034	8UC6024
EMERGENCY-STOP		**8UC7324-3BB44**		1	1 unit	1CL	8UC7320-3BB	8UC6014	8UC6034	8UC6024
								☐ 12 mm	**☐ 12 mm**	**☐ 12 mm by 12 mm**
Standard		**8UC7414-1BB44**		1	1 unit	1CL	8UC7410-1BB	8UC6014	8UC6034	8UC6024
EMERGENCY-STOP		**8UC7424-3BB44**		1	1 unit	1CL	8UC7420-3BB	8UC6014	8UC6034	8UC6024
								☐ 12 mm	**☐ 12 mm**	**☐ 12 mm by 12 mm**
Standard		**8UC7414-1BF44**		1	1 unit	1CL	8UC7410-1BF	8UC6014	8UC6034	8UC6024
								☐ 12 mm	**☐ 12 mm**	**☐ 12 mm by 12 mm**
Standard		**8UC7414-1FG44**		1	1 unit	1CL	8UC7410-1FG	8UC6014	8UC6034	8UC6024
								☐ 12 mm	**☐ 12 mm**	**☐ 12 mm by 12 mm**
Standard		**8UC7414-1BB44**		1	1 unit	1CL	8UC7410-1BB	8UC6014	8UC6034	8UC6024

Minimum order quantity (PS) or a multiple thereof can be ordered.

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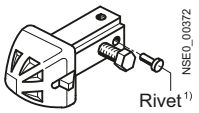
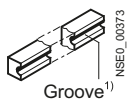
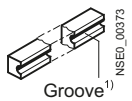
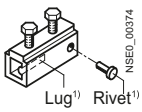
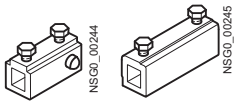
Individual parts

Selection and ordering data

	Switching device	Rotary operating mechanisms	Size	Cross-section of the actuating shaft	Version [4]	SD	Individual parts for 8UC7 door-coupling rotary operating mechanisms Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Type	Type		mm x mm		d					
Handles with masking plate (including flat gasket and fixing screws)											
 8UC71	3KL50, 3KM50, 3KA50, 3KA51	8UC71	1	6 x 6	Standard		**8UC7110-1BB**		1	1 unit	1CL
					EMERGENCY-STOP		**8UC7120-3BB**		1	1 unit	1CL
 8UC74	3KL52, 3KM52, 3KL53, 3KM53, 3KA52, 3KA53	8UC72	2	8 x 8	Standard		**8UC7210-1BB**		1	1 unit	1CL
					EMERGENCY-STOP		**8UC7220-3BB**		1	1 unit	1CL
 8UC74	3KL55, 3KM55, 3KL57, 3KM57, 3KA55, 3KA57, 3KE42, 3KE43, 3KE44, 3KE45	8UC73	3	10 x 10 or 12 x 12	Standard		**8UC7310-1BB**		1	1 unit	1CL
					EMERGENCY-STOP		**8UC7320-3BB**		1	1 unit	1CL
 8UC74	3KL61, 3KL62	8UC74	4	12 x 12	Standard		**8UC7410-1BB**		1	1 unit	1CL
					EMERGENCY-STOP		**8UC7420-3BB**		1	1 unit	1CL
	3KE42, 3KE43, 3KE44, 3KE45	8UC74[3]	4	12 x 12	Standard		**8UC7410-1BF**		1	1 unit	1CL
					Standard		**8UC7410-1FG**		1	1 unit	1CL
					Standard		**8UC7410-1BB**		1	1 unit	1CL

	Rotary operating mechanisms	Cross-section of the actuating shaft	SD	Individual parts for 8UC6 door-coupling rotary operating mechanisms Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Type	mm x mm	d					
Coupling drivers, extension shafts, shaft couplings and reducers								
 8UC6011	**Coupling drivers for 3K**							
	8UC71	6 x 6		**8UC6011**		1	1 unit	1CL
	8UC71[2]	6 x 6		**8UC6016**		1	1 unit	1CL
	8UC72	8 x 8		**8UC6012**		1	1 unit	1CL
	8UC72[2]	8 x 8		**8UC6017**		1	1 unit	1CL
	8UC73	10 x 10		**8UC6013**		1	1 unit	1CL
	8UC73/74	12 x 12		**8UC6014**		1	1 unit	1CL
 8UC6031 ... 34	**Extension shafts 300 mm long**							
	8UC71	6 x 6		**8UC6031**		1	1 unit	1CL
	8UC72	8 x 8		**8UC6032**		1	1 unit	1CL
	8UC73	10 x 10		**8UC6033**		1	1 unit	1CL
	8UC73/74	12 x 12		**8UC6034**		1	1 unit	1CL
 8UC6081 ... 84	**Extension shafts 600 mm long**							
	8UC71	6 x 6		**8UC6081**		1	1 unit	1CL
	8UC72	8 x 8		**8UC6082**		1	1 unit	1CL
	8UC73	10 x 10		**8UC6083**		1	1 unit	1CL
	8UC73/74	12 x 12		**8UC6084**		1	1 unit	1CL
 8UC6021 to 8UC6024	**Shaft couplings**							
	8UC71	6 x 6		**8UC6021**		1	1 unit	1CL
	8UC72	8 x 8		**8UC6022**		1	1 unit	1CL
	8UC73	10 x 10		**8UC6023**		1	1 unit	1CL
	8UC73/74	12 x 12		**8UC6024**		1	1 unit	1CL
	8UC74(3KL61)	12 x 12	►	**8UC9253**		1	1 unit	1CL
 8UC7058 8UC7050	**Reducers**							
	8UC71	8 x 8 by 6 x 6		**8UC7058**		1	1 unit	1CL
	8UC72	12 x 12 by 8 x 8		**8UC7050**		1	1 unit	1CL

1) Non-interchangeability features.

2) Shortened coupling driver with reduced tolerance compensation.

3) For switch disconnectors as changeover switches in various versions, see page 7/196.

4) Standard: Ti-gray handle, light-gray masking plate; EMERGENCY-STOP: Red handle, yellow masking plate.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Switching device	Cross-section of the actuating shaft	Torque of the operating mechanism[1]	Size of the operating mechanism	Color of handle	SD	Operating mechanisms for fixed mounting Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Type	mm x mm	Nm			d					
 8UC9354	3KA50, 3KA51, 3KL50, 3KM50	6 x 6	4	1	Black	[2]	**8UC9354**		1	1 unit	1CL
 8UC9360	3KA50, 3KA51, 3KL50, 3KM50	6 x 6	7.5	2	Black	[2]	**8UC9360**		1	1 unit	1CL
 8UC9362	3KA52, 3KA53, 3KL52, 3KM52, 3KL53, 3KM53	8 x 8	7.5	2	Black		**8UC9362**		1	1 unit	1CL
					Red		**8UC9363**		1	1 unit	1CL
 8UC9365	3KA55, 3KA57, 3KA58, 3KL55, 3KM55, 3KL57, 3KM57	10 x 10	16	3	Black		**8UC9365**		1	1 unit	1CL
					Red		**8UC9366**		1	1 unit	1CL
	3KE42, 3KE43	12 x 12	16	3	Black	[3]	**8UC9370**		1	1 unit	1CL
					Red	[3]	**8UC9371**		1	1 unit	1CL
 8UC9374	3KE44, 3KE45	12 x 12	30	4	Black	[3]	**8UC9374**		1	1 unit	1CL
					Red	[3]	**8UC9375**		1	1 unit	1CL
 8UC9381	3KL61	12 x 12	55	5	Black		**8UC9381**		1	1 unit	1CL
					Red		**8UC9382**		1	1 unit	1CL

[1] Operating mechanisms were tested with triple torque (DIN VDE 0660 Part 107). They are therefore qualified for use in all controls, especially for disconnectors.

[2] Red handle available on request.

[3] Also required: 3KX2210-0H coupling socket.

7

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Introduction

Overview



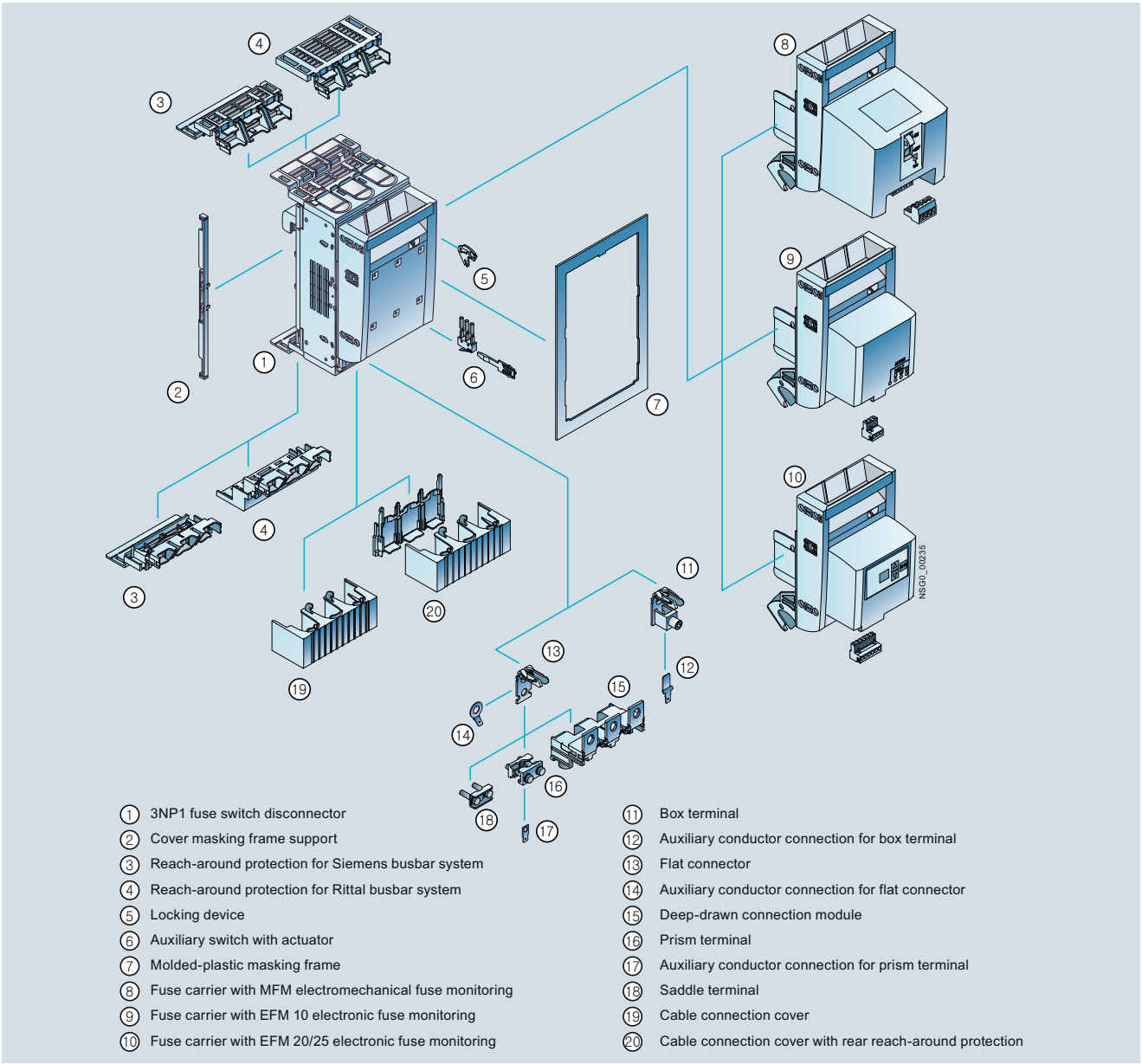
3NP1 fuse switch disconnectors

All key product features at a glance

- Box terminals available for all sizes
- Connection of circular conductors and laminated conductors
- Fuse monitoring possible throughout
- Busbar supports can be built over
- Conversion of 5/10 mm thick busbars without parts which can be lost or broken off
- Convertibility of cable feeder at top/bottom without intervention in the internal conducting paths
- Optimum integration in various system environments through cover levels and on busbar systems with/without base
- Touch protection also with rear incoming feeder
- Fuses are removed using a release shaft without the fuses being touched
- All units can be sealed and locked

7

Overview of all components and accessory parts



1 3NP1 fuse switch disconnector
2 Cover masking frame support
3 Reach-around protection for Siemens busbar system
4 Reach-around protection for Rittal busbar system
5 Locking device
6 Auxiliary switch with actuator
7 Molded-plastic masking frame
8 Fuse carrier with MFM electromechanical fuse monitoring
9 Fuse carrier with EFM 10 electronic fuse monitoring
10 Fuse carrier with EFM 20/25 electronic fuse monitoring
11 Box terminal
12 Auxiliary conductor connection for box terminal
13 Flat connector
14 Auxiliary conductor connection for flat connector
15 Deep-drawn connection module
16 Prism terminal
17 Auxiliary conductor connection for prism terminal
18 Saddle terminal
19 Cable connection cover
20 Cable connection cover with rear reach-around protection

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits

Advantages during planning and configuration

- Low level of equipment variation due to easy convertibility of cable feeder at top/bottom (delivered from factory with cable feeder at bottom).
- Only one device variant for applications in industry and infrastructure thanks to touch and reach-around protection as a standard feature.
- Uniform grid sizes for easy configuration.

Advantages during operation and service

- The optional rear covers for the cable connections ensure optimum touch protection even for switchboard assemblies with rear access.
- Innovative design enables the highest safety for equipment and personnel.
- Fuses can be released and removed using a release shaft.
- Lockable and sealable design enables safe working and prevents unauthorized access.

Advantages during installation

- Only one device version is required for cable feeders at top/bottom and there is no need to intervene in the internal conducting paths.
- One device version with very high short-circuit values dispenses with having to order and install arc splitters to increase the electrical values.
- On all sizes it is possible to install 2 CO contacts for indicating the switching position.
- All devices feature all-round touch protection.
- Box terminals are available for all sizes and shorten the mounting time appreciably.
- Snapping on the sizes NH000 and NH00 shortens the mounting time greatly compared to fixing with screws.
- The screw-fixing method on sizes NH1, NH2 and NH3 provides for easy positioning and at the same time secure contacting of the larger and heavier device versions.
- Small space requirement through compact devices and busbar supports which can be built over.
- Device versions for busbar mounting can be converted to 5 mm or 10 mm thick busbars without parts which can be lost or broken off.

Application

Possible uses

3NP1 fuse switch disconnectors can be used for protecting and switching the most diverse electrical loads:

- Motor starter combinations
- In conjunction with SITOR semiconductor fuses for the protection of frequency converters and soft starters
- Fusing of compensation modules
- Cable feeders
- Group fusing of small loads

The devices are optimized for operation in all kinds of system environments:

- Low-voltage switchboard assemblies for power distribution and MCCs (e.g. main and sub-distribution boards)
- Distribution systems with cover levels of 32 and 70 mm or 45 and 70 mm
- Mechanical engineering
- Railway applications

Fuse monitoring

Fuse monitoring devices are used to detect, indicate and report faults:

- MFM – electromechanical fuse monitoring for AC/DC networks
- EFM 10 – electronic fuse monitoring for AC networks
- EFM 20 – electronic fuse monitoring with line monitoring for AC networks
- EFM 25 – electronic fuse monitoring with line monitoring for DC networks

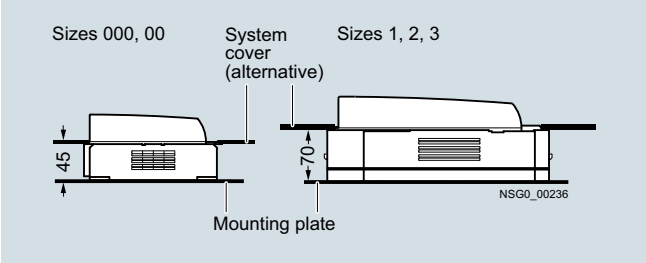
Standards and regulations

The 3NP1 fuse switch disconnectors are compliant with:

- IEC 60947-1, EN 60947-1
- IEC 60947-3, EN 60947-3

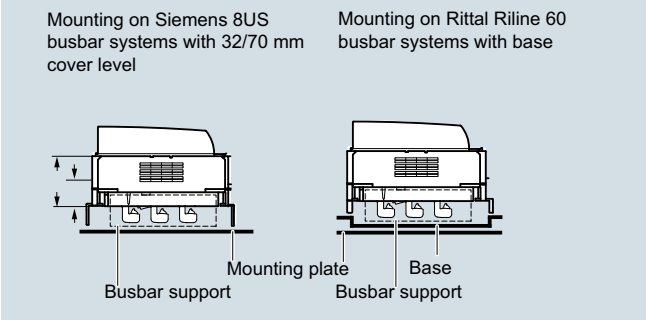
Mounting

Floor mounting



3NP1 fuse switch disconnector for floor mounting

Busbar mounting



3NP1 fuse switch disconnector for busbar mounting

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Technical specifications

Standards			**IEC / EN 60947-1, IEC / EN 60947-3, VDE 0660 Part 7**				
Type			**3NP1123...**	**3NP1133...**	**3NP1143...**	**3NP1153...**	**3NP1163...**
Rated uninterrupted current I_u		A	160[1]	160	250	400	630
For fuse links acc. to IEC 60269-2		Size	000	00 and 000	1 and 0	2 and 1	3 and 2
Conventional free-air thermal current I_{th}		A	160	160	250	400	630
Rated operational voltage U_e							
• At 50 Hz/60 Hz AC		V	690	690	690	690	690
• At DC (3 conducting paths series-connected)		V	440	440	440	440	440
• At DC (2 conducting paths series-connected)		V	220/240	220/240	220/240	220/240	220/240
• For utilization category AC-20B or DC-20B	Max.	V	1000	1000	1000	1000	1000
Rated insulation voltage U_i[2]		V	1000	1000	1000	1000	1000
Rated impulse withstand voltage U_{imp}		kV	8	8	8	8	8
Rated cond. short-circuit current with fuses (by fast switch on)		Size/A	000/160	00/160	1/250	2/400	3/630
• Rated current at 500 V/690 V AC		kA	80/50	80/50	80/50	80/50	80/50
• Permissible let-through current of the fuses, peak value		kA	10	15	25	40	50
Short-circuit strength with fuses (with closed disconnector)		Size/A	000/160	00/160	1/250	2/400	3/630
• Rated current at 500 V/690 V, rms value		kA	120/100	120/100	120/100	100/100	100/100
• Let-through I^2t value		kA^2s	56	158	780	2150	5400
• Permissible let-through current of the fuses, peak value		kA	15	23	32	40	60
Rated making capacity with isolating blades at 500 V AC		kA	2	6	17	17	17
Rated making and breaking capacity							
• At AC-21B, 22B, 23B	400 V AC	A	160	160	250	400	630
• At AC-21B	500 V AC	A	160	160	250	400	630
• At AC-22B	500 V AC	A	125	160	250	400	630
• At AC-23B	500 V AC	A	40	63	200	315	500
• At AC-21B	690 V AC	A	160	160	250	400	630
• At AC-22B	690 V AC	A	50	125	250	400	500
• At AC-23B	690 V AC	A	25	35	100	125	200
• At DC-21B (2 conducting paths series-connected)	240 V DC	A	160	160	250	400	630
• At DC-22B (2 conducting paths series-connected)	240 V DC	A	100	160	250	400	630
• At DC-23B (2 conducting paths series-connected)	240 V DC	A	80	100	200	250	400
• At DC-21B (3 conducting paths series-connected)	440 V DC	A	100	160	250	400	630
• At DC-22B (3 conducting paths series-connected)	440 V DC	A	50	125	200	315	500
• At DC-23B (3 conducting paths series-connected)	440 V DC	A	25	63	100	160	250
Capacitor switching capacity							
At 400 V AC							
• Capacitor rating		kvar	50	50	50	50	50
• Rated current I_n		A	72	72	72	72	72
At 525 V AC							
• Capacitor rating		kvar	50	50	50	50	50
• Rated current I_n		A	55	55	55	55	55
Permissible ambient temperature[3]		°C	-25 ... +55 for operation, -50 ... +80 during storage				
Mechanical endurance, operating cycles			2000	2000	1600	1000	1000
Degree of protection (operator side)							
Without molded-plastic masking frame/cable lug cover			IP30 (switch closed) / IP20 (switch open)				
With molded-plastic masking frame/cable lug cover			IP40 (switch closed) / IP20 (switch open)				
Power loss of switch at I_{th} (plus fuses)		W	9	12	23	34	48
Maximum power loss of the usable fuses (per fuse)[4]		W	7.5[5]	12	23	34	48
Max. conductor cross-section of main conductor connection							
Flat terminals		mm^2		Up to 95 (M8)	Up to 150 (M10)	Up to 240 (M10)	Up to 300 (M10)
Box terminal		mm^2	1.5 ... 50	6 ... 70	70 ... 185	120 ... 240	150 ... 300
Prism terminals		mm^2	--	35 ... 95	70 ... 150	120 ... 240	150 ... 300
Saddle terminals		mm^2	--	1.5 ... 70	70 ... 120	120 ... 240	150 ... 300
Laminated conductors in box terminal		mm	8 x 8	9 x 8	10 x 20	10 x 32	20 x 32
Rated operational current of auxiliary switch (at max. 250 V AC)							
3NP19...-1FA00 auxiliary switch		A	0.25 (I_{th} = 5 A)				
3NP19...-1FB00 auxiliary switch (solid-state compatible)		A	0.1 (I_{th} = 0.1 A)				
Permissible mounting position			Vertical and horizontal (no derating)				

1) 160 A available in combination with feeder terminal 3NP1923-1BD00, otherwise max. 100 A.

2) Up to pollution degree 2, above this U_i = 690 V.

3) Only with isolating blades; otherwise, please observe specifications of fuse manufacturer.

4) Values are valid when using LV HRC fuse systems with characteristic gG. If using fuses for semiconductor protection, please refer to the assignment table, see page 7/217.

5) For operation up to 160 A, max. 9 W.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Rated current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
For 45 mm cover level								
	Basic units							
	Flat terminals							
 3NP133-1CA20	160	00	▶	**3NP1133-1CA10**		1	1 unit	1DL
	Box terminals							
	100[1)]	000	▶	**3NP1123-1CA20**		1	1 unit	1DL
	160	00	▶	**3NP1133-1CA20**		1	1 unit	1DL
	With MFM electromechanical fuse monitoring							
	Flat terminals							
 3NP1133-1CA21	160	00		**3NP1133-1CA11**		1	1 unit	1DL
	Box terminals							
	160	00		**3NP1133-1CA21**		1	1 unit	1DL
	With EFM 10 electronic fuse monitoring							
	Flat terminals							
 3NP1133-1CA22	160	00		**3NP1133-1CA12**		1	1 unit	1DL
	Box terminals							
	100[1)]	000		**3NP1123-1CA22**		1	1 unit	1DL
	160	00		**3NP1133-1CA22**		1	1 unit	1DL
	With EFM 20 electronic fuse monitoring and line monitoring							
	Flat terminals							
 3NP1133-1CA23	160	00		**3NP1133-1CA13**		1	1 unit	1DL
	Box terminals							
	100[1)]	000		**3NP1123-1CA23**		1	1 unit	1DL
	160	00		**3NP1133-1CA23**		1	1 unit	1DL

[1)] 160 A available in combination with feeder terminal 3NP1923-1BD00.

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Floor mounting

For 70 mm cover level

	Rated current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
	Basic units							
	Flat terminals							
 3NP1143-1DA20	250	1	►	**3NP1143-1DA10**		1	1 unit	1DL
	400	2	►	**3NP1153-1DA10**		1	1 unit	1DL
	630	3	►	**3NP1163-1DA10**		1	1 unit	1DL
	Box terminals							
	250	1		**3NP1143-1DA20**		1	1 unit	1DL
	400	2		**3NP1153-1DA20**		1	1 unit	1DL
	630	3		**3NP1163-1DA20**		1	1 unit	1DL
	With MFM electromechanical fuse monitoring							
	Flat terminals							
 3NP1143-1DA21	250	1		**3NP1143-1DA11**		1	1 unit	1DL
	400	2		**3NP1153-1DA11**		1	1 unit	1DL
	630	3		**3NP1163-1DA11**		1	1 unit	1DL
	Box terminals							
	250	1		**3NP1143-1DA21**		1	1 unit	1DL
	400	2		**3NP1153-1DA21**		1	1 unit	1DL
	630	3		**3NP1163-1DA21**		1	1 unit	1DL
	With EFM 10 electronic fuse monitoring							
	Flat terminals							
 3NP1143-1DA22	250	1		**3NP1143-1DA12**		1	1 unit	1DL
	400	2		**3NP1153-1DA12**		1	1 unit	1DL
	630	3		**3NP1163-1DA12**		1	1 unit	1DL
	Box terminals							
	250	1		**3NP1143-1DA22**		1	1 unit	1DL
	400	2		**3NP1153-1DA22**		1	1 unit	1DL
	630	3		**3NP1163-1DA22**		1	1 unit	1DL
	With EFM 20 electronic fuse monitoring and line monitoring							
	Flat terminals							
 3NP1143-1DA23	250	1		**3NP1143-1DA13**		1	1 unit	1DL
	400	2		**3NP1153-1DA13**		1	1 unit	1DL
	630	3		**3NP1163-1DA13**		1	1 unit	1DL
	Box terminals							
	250	1		**3NP1143-1DA23**		1	1 unit	1DL
	400	2		**3NP1153-1DA23**		1	1 unit	1DL
	630	3		**3NP1163-1DA23**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Rated current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
With reach-around protection suitable for Siemens 8US busbar system and Rittal 40 mm busbar system without base[1]								
	Basic units							
 3NP1133-1BB20	**Flat terminals**							
	160	00		**3NP1133-1BB10**		1	1 unit	1DL
	Box terminals							
	100[2]	000		**3NP1123-1BB20**		1	1 unit	1DL
	160	00		**3NP1133-1BB20**		1	1 unit	1DL
	With MFM electromechanical fuse monitoring							
 3NP1133-1BB21	**Flat terminals**							
	160	00		**3NP1133-1BB11**		1	1 unit	1DL
	Box terminals							
	160	00		**3NP1133-1BB21**		1	1 unit	1DL
	With EFM 10 electronic fuse monitoring							
 3NP1133-1BB22	**Flat terminals**							
	160	00		**3NP1133-1BB12**		1	1 unit	1DL
	Box terminals							
	100[2]	000		**3NP1123-1BB22**		1	1 unit	1DL
	160	00		**3NP1133-1BB22**		1	1 unit	1DL
	With EFM 20 electronic fuse monitoring and line monitoring							
 3NP1133-1BB23	**Flat terminals**							
	160	00		**3NP1133-1BB13**		1	1 unit	1DL
	Box terminals							
	100[2]	000		**3NP1123-1BB23**		1	1 unit	1DL
	160	00		**3NP1133-1BB23**		1	1 unit	1DL

[1] Cannot be used with T profile rails.

[2] 160 A available in combination with feeder terminal 3NP1923-1BD00.

Note:

Delivered from factory with cable feeder at bottom and convertible by the customer.

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For 40 mm busbar system

	Rated current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
With reach-around protection suitable for Rittal 40 mm busbar system with base[1]								
	Basic units							
 3NP1133-1JB20	**Flat terminals**							
	160	00		**3NP1133-1JB10**		1	1 unit	1DL
	Box terminals							
	100[2]	000		**3NP1123-1JB20**		1	1 unit	1DL
	160	00		**3NP1133-1JB20**		1	1 unit	1DL
	With MFM electromechanical fuse monitoring							
 3NP1133-1JB21	**Flat terminals**							
	160	00		**3NP1133-1JB11**		1	1 unit	1DL
	Box terminals							
	160	00		**3NP1133-1JB21**		1	1 unit	1DL
	With EFM 10 electronic fuse monitoring							
 3NP1133-1JB22	**Flat terminals**							
	160	00		**3NP1133-1JB12**		1	1 unit	1DL
	Box terminals							
	100[2]	000		**3NP1123-1JB22**		1	1 unit	1DL
	160	00		**3NP1133-1JB22**		1	1 unit	1DL
	With EFM 20 electronic fuse monitoring and line monitoring							
 3NP1133-1JB23	**Flat terminals**							
	160	00		**3NP1133-1JB13**		1	1 unit	1DL
	Box terminals							
	100[2]	000		**3NP1123-1JB23**		1	1 unit	1DL
	160	00		**3NP1133-1JB23**		1	1 unit	1DL

[1] Cannot be used with T profile rails.

[2] 160 A available in combination with feeder terminal 3NP1923-1BD00.

Note:

Delivered from factory with cable feeder at bottom and convertible by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Rated current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
With reach-around protection suitable for Siemens 8US, Wöhner Classic, and Rittal RiLine60 busbar systems without base								
	Basic units							
	Flat terminals							
 3NP1133-1BC20	160	00	▶	**3NP1133-1BC10**		1	1 unit	1DL
	250	1	▶	**3NP1143-1BC10**		1	1 unit	1DL
	400	2		**3NP1153-1BC10**		1	1 unit	1DL
	630	3		**3NP1163-1BC10**		1	1 unit	1DL
	Box terminals							
	100[1)]	000	▶	**3NP1123-1BC20**		1	1 unit	1DL
	160	00	▶	**3NP1133-1BC20**		1	1 unit	1DL
	250	1	▶	**3NP1143-1BC20**		1	1 unit	1DL
	400	2		**3NP1153-1BC20**		1	1 unit	1DL
	630	3		**3NP1163-1BC20**		1	1 unit	1DL
	With MFM electromechanical fuse monitoring							
	Flat terminals							
 3NP1133-1BC21	160	00		**3NP1133-1BC11**		1	1 unit	1DL
	250	1		**3NP1143-1BC11**		1	1 unit	1DL
	400	2		**3NP1153-1BC11**		1	1 unit	1DL
	630	3		**3NP1163-1BC11**		1	1 unit	1DL
	Box terminals							
	160	00		**3NP1133-1BC21**		1	1 unit	1DL
	250	1		**3NP1143-1BC21**		1	1 unit	1DL
	400	2		**3NP1153-1BC21**		1	1 unit	1DL
	630	3		**3NP1163-1BC21**		1	1 unit	1DL
	With EFM 10 electronic fuse monitoring							
	Flat terminals							
 3NP1133-1BC22	160	00		**3NP1133-1BC12**		1	1 unit	1DL
	250	1		**3NP1143-1BC12**		1	1 unit	1DL
	400	2		**3NP1153-1BC12**		1	1 unit	1DL
	630	3		**3NP1163-1BC12**		1	1 unit	1DL
	Box terminals							
	100[1)]	000		**3NP1123-1BC22**		1	1 unit	1DL
	160	00		**3NP1133-1BC22**		1	1 unit	1DL
	250	1		**3NP1143-1BC22**		1	1 unit	1DL
	400	2		**3NP1153-1BC22**		1	1 unit	1DL
	630	3		**3NP1163-1BC22**		1	1 unit	1DL
	With EFM 20 electronic fuse monitoring and line monitoring							
	Flat terminals							
 3NP1133-1BC23	160	00		**3NP1133-1BC13**		1	1 unit	1DL
	250	1		**3NP1143-1BC13**		1	1 unit	1DL
	400	2		**3NP1153-1BC13**		1	1 unit	1DL
	630	3		**3NP1163-1BC13**		1	1 unit	1DL
	Box terminals							
	100[1)]	000		**3NP1123-1BC23**		1	1 unit	1DL
	160	00		**3NP1133-1BC23**		1	1 unit	1DL
	250	1		**3NP1143-1BC23**		1	1 unit	1DL
	400	2		**3NP1153-1BC23**		1	1 unit	1DL
	630	3		**3NP1163-1BC23**		1	1 unit	1DL

[1)] 160 A available in combination with feeder terminal 3NP1923-1BD00.

Note:

Delivered from factory with cable feeder at bottom and convertible by the customer.

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For 60 mm busbar system

With reach-around protection suitable for Rittal RiLine60 busbar system with base

	Rated current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
	Basic units							
	Flat terminals							
	160	00		**3NP1133-1JC10**		1	1 unit	1DL
	250	1		**3NP1143-1JC10**		1	1 unit	1DL
	400	2		**3NP1153-1JC10**		1	1 unit	1DL
	630	3		**3NP1163-1JC10**		1	1 unit	1DL
	Box terminals							
	100[1)]	000		**3NP1123-1JC20**		1	1 unit	1DL
3NP1133-1JC20	160	00		**3NP1133-1JC20**		1	1 unit	1DL
	250	1		**3NP1143-1JC20**		1	1 unit	1DL
	400	2		**3NP1153-1JC20**		1	1 unit	1DL
	630	3		**3NP1163-1JC20**		1	1 unit	1DL
	With MFM electromechanical fuse monitoring							
	Flat terminals							
	160	00		**3NP1133-1JC11**		1	1 unit	1DL
	250	1		**3NP1143-1JC11**		1	1 unit	1DL
	400	2		**3NP1153-1JC11**		1	1 unit	1DL
	630	3		**3NP1163-1JC11**		1	1 unit	1DL
	Box terminals							
3NP1133-1JC21	160	00		**3NP1133-1JC21**		1	1 unit	1DL
	250	1		**3NP1143-1JC21**		1	1 unit	1DL
	400	2		**3NP1153-1JC21**		1	1 unit	1DL
	630	3		**3NP1163-1JC21**		1	1 unit	1DL
	With EFM 10 electronic fuse monitoring							
	Flat terminals							
	160	00		**3NP1133-1JC12**		1	1 unit	1DL
	250	1		**3NP1143-1JC12**		1	1 unit	1DL
	400	2		**3NP1153-1JC12**		1	1 unit	1DL
	630	3		**3NP1163-1JC12**		1	1 unit	1DL
	Box terminals							
	100[1)]	000		**3NP1123-1JC22**		1	1 unit	1DL
3NP1133-1JC22	160	00		**3NP1133-1JC22**		1	1 unit	1DL
	250	1		**3NP1143-1JC22**		1	1 unit	1DL
	400	2		**3NP1153-1JC22**		1	1 unit	1DL
	630	3		**3NP1163-1JC22**		1	1 unit	1DL
	With EFM 20 electronic fuse monitoring and line monitoring							
	Flat terminals							
	160	00		**3NP1133-1JC13**		1	1 unit	1DL
	250	1		**3NP1143-1JC13**		1	1 unit	1DL
	400	2		**3NP1153-1JC13**		1	1 unit	1DL
	630	3		**3NP1163-1JC13**		1	1 unit	1DL
	Box terminals							
	100[1)]	000		**3NP1123-1JC23**		1	1 unit	1DL
	160	00		**3NP1133-1JC23**		1	1 unit	1DL
3NP1133-1JC23	250	1		**3NP1143-1JC23**		1	1 unit	1DL
	400	2		**3NP1153-1JC23**		1	1 unit	1DL
	630	3		**3NP1163-1JC23**		1	1 unit	1DL

[1)] 160 A available in combination with feeder terminal 3NP1923-1BD00.

Note:

Delivered from factory with cable feeder at bottom and convertible by the customer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For size 000							
	Connection methods						
 3NP1923-1BD00	**Feeder terminals**, 16 ... 95 mm^2 (1 set = 3 units) • For 3NP1123 with box terminal for use up to 160 A • For infeed when using the three-phase busbar • For connection of copper conductors		**3NP1923-1BD00**		1	1 unit	1DL
 3NP1923-1BE20	**Three-tier terminals**, 3 x 2.5 ... 16 mm^2 (1 set = 3 units) • For 3NP1123 with box terminal • For connection of copper conductors		**3NP1923-1BE20**		1	1 unit	1DL
 3NP1923-1BF10	**Covering caps** For 1 blank space on a three-phase busbar (1 set = 20 units)		**3NP1923-1BF10**		1	1 unit	1DL
 3NP1933-1BF30	**Three-phase busbar** I_u = max. 225 A						
	• For 2x NH000		**3NP1923-1BF20**		1	1 unit	1DL
	• For 3x NH000		**3NP1923-1BF30**		1	1 unit	1DL
	• For 4x NH000		**3NP1923-1BF40**		1	1 unit	1DL
 3NP1933-1BF50	**Link rail**, I_u = max. 225 A For three-phase busbars		**3NP1923-1BF50**		1	1 unit	1DL
 3NP1933-1BG40	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A (1 set = 3 units) For 3NP1123 with box terminal		**3NP1923-1BG40**		1	1 unit	1DL

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Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For size 000 (continued)							
	Device covers, auxiliary switches						
 3NP1923-1CA10	**Reach-around protection for busbar mounting** 1x top, 1x bottom Spare part, included in scope of delivery of the 3NP1, can also be used for retrofitting to a different busbar system						
	• For Siemens 8US system		**3NP1923-1CA10**		1	1 unit	1DL
	• For Rittal system		**3NP1923-1CA20**		1	1 unit	1DL
 3NP1923-1CB00	**Cable connection covers** Only for busbar systems 40 mm / 60 mm, top and bottom		**3NP1923-1CB00**		1	1 unit	1DL
 3NP1923-1CF00	**Masking frame supports** (1 set = 2 units)		**3NP1923-1CF00**		1	1 unit	1DL
	Covers						
	External dimensions (H x W) 215 x 130 mm		**3NP1923-1DA00**		1	1 unit	1DL
  3NP1923-1EA00	**Fixing kits** For 1 standard mounting rail	►	**3NP1923-1EA00**		1	1 unit	1DL
 3NP1920-1FA00	**Auxiliary switches** 1 CO	►	**3NP1920-1FA00**		1	1 unit	1DL
	1 CO contact, solid-state compatible		**3NP1920-1FB00**		1	1 unit	1DL
	Fuse carriers						
 3NP1923-1GA00	Spare part, included in scope of delivery of the 3NP1, fuse monitoring can be retrofitted by replacing the fuse carrier		**3NP1923-1GA00**		1	1 unit	1DL
	• Standard		**3NP1923-1GA00**		1	1 unit	1DL
	• With EFM 10 electronic fuse monitoring		**3NP1923-1GB20**		1	1 unit	1DL
	• With EFM 20 electronic fuse monitoring and line monitoring		**3NP1923-1GB30**		1	1 unit	1DL
	• With EFM 25 electronic fuse monitoring and line monitoring		**3NP1923-1GB50**		1	1 unit	1DL
 3NP1900-1HA00	**Locking devices** (1 set = 10 units)		**3NP1900-1HA00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For size 00							
	Connection methods						
 3NP1933-1BA00	**Saddle terminals**, 1.5 ... 70 mm^2 (1 set = 3 units) • For 3NP1133 with flat terminal • For connection of copper conductors		**3NP1933-1BA00**		1	1 unit	1DL
 3NP1933-1BB10	**Prism terminals** single, 35... 95 mm^2 (1 set = 3 units) • For 3NP1133 with flat terminal • For connection of copper or aluminum conductors		**3NP1933-1BB10**		1	1 unit	1DL
 3NP1933-1BC00	**Terminal modules**, 6 ... 70 mm^2 For 32-mm cover level with box terminal • For 3NP1133 with flat terminal • For connection of copper conductors		**3NP1933-1BC00**		1	1 unit	1DL
 3NP1933-1BE10	**Three-tier terminals**, 3 x 2.5 ... 16 mm^2 (1 set = 3 units) • For 3NP1133 with flat terminal • For connection of copper conductors		**3NP1933-1BE10**		1	1 unit	1DL
 3NP1923-1BE20	**Three-tier terminals**, 3 x 2.5 ... 16 mm^2 (1 set = 3 units) • For 3NP1133 with box terminal • For connection of copper conductors		**3NP1923-1BE20**		1	1 unit	1DL
 3NP1933-1BG10	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For flat terminal (1 set = 3 units)		**3NP1933-1BG10**		1	1 unit	1DL
 3NP1933-1BG30	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For prism terminal (1 set = 3 units)		**3NP1933-1BG30**		1	1 unit	1DL
 3NP1933-1BG40	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For box terminal (1 set = 3 units)		**3NP1933-1BG40**		1	1 unit	1DL

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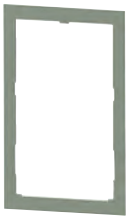
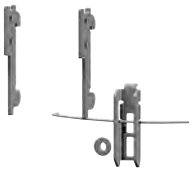
Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For size 00 (continued)							
	Device covers, auxiliary switches						
 3NP1933-1CA10	**Reach-around protection for busbar mounting** 1x top, 1x bottom Spare part, included in scope of delivery of the 3NP1, can also be used for retrofitting to a different busbar system						
	• For Siemens 8US system		**3NP1933-1CA10**		1	1 unit	1DL
	• For Rittal system		**3NP1933-1CA20**		1	1 unit	1DL
 3NP1933-1CB00	**Cable connection covers** (at top and bottom) For flat terminal	►	**3NP1933-1CB00**		1	1 unit	1DL
  3NP1933-1CC00	**Cable connection covers** with rear reach-around protection in case of busbar mounting (at top and bottom) For flat terminal	►	**3NP1933-1CC00**		1	1 unit	1DL
  3NP1933-1CD00	**Cable connection covers** with rear reach-around protection in case of floor mounting (at top and bottom) For flat terminal	►	**3NP1933-1CD00**		1	1 unit	1DL
	Masking frame supports (1 set = 2 units)		**3NP1933-1CF00**		1	1 unit	1DL
 3NP1933-1DA00	**Covers** External dimensions (H x W) 215 x 130 mm		**3NP1933-1DA00**		1	1 unit	1DL
 3NP1933-1EB00	**Fixing kits** For 2 standard mounting rails 125/150 mm	►	**3NP1933-1EB00**		1	1 unit	1DL
	Auxiliary switches						
 3NP1930-1FB00	1 CO contact	►	**3NP1930-1FA00**		1	1 unit	1DL
	1 CO contact, solid-state compatible		**3NP1930-1FB00**		1	1 unit	1DL
	Fuse carriers						
 3NP1933-1GB10	Spare part, included in scope of delivery of the 3NP1, fuse monitoring can be retrofitted by replacing the fuse carrier						
	• Standard		**3NP1933-1GA00**		1	1 unit	1DL
	• With MFM electromechanical fuse monitoring		**3NP1933-1GB10**		1	1 unit	1DL
	• With EFM 10 electronic fuse monitoring		**3NP1933-1GB20**		1	1 unit	1DL
	• With EFM 20 electronic fuse monitoring and line monitoring		**3NP1933-1GB30**		1	1 unit	1DL
	• With EFM 25 electronic fuse monitoring and line monitoring		**3NP1933-1GB50**		1	1 unit	1DL
	Locking devices						
	(1 set = 10 units)		**3NP1900-1HA00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For size 1							
	Connection methods						
 3NP1943-1BA00	**Saddle terminals**, 70 ... 120 mm^2 (1 set = 3 units) • For 3NP1143 with flat terminal • For connection of copper conductors		**3NP1943-1BA00**		1	1 unit	1DL
 3NP1943-1BB10	**Prism terminals** single, 70 ... 150 mm^2 (1 set = 3 units) • For 3NP1143 with flat terminal • For connection of copper or aluminum conductors		**3NP1943-1BB10**		1	1 unit	1DL
 3NP1943-1BB20	**Prism terminals** double, 2 x 35 ... 70 mm^2 (1 set = 3 units) • For 3NP1143 with flat terminal • For connection of copper or aluminum conductors		**3NP1943-1BB20**		1	1 unit	1DL
 3NP1943-1BG10	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For flat terminal (1 set = 3 units)		**3NP1943-1BG10**		1	1 unit	1DL
 3NP1943-1BG30	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm; max. 5 A For saddle-type or prism terminals (1 set = 3 units)		**3NP1943-1BG30**		1	1 unit	1DL
 3NP1943-1BG40	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm; max. 5 A For box terminal (1 set = 3 units)		**3NP1943-1BG40**		1	1 unit	1DL

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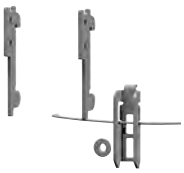
Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For size 1 (continued)							
	Device covers, auxiliary switches						
 3NP1943-1CA10	**Reach-around protection for busbar mounting** 1x top, 1x bottom Spare part, included in scope of delivery of the 3NP1, can also be used for retrofitting to a different busbar system						
	• For Siemens 8US system		**3NP1943-1CA10**		1	1 unit	1DL
	• For Rittal system		**3NP1943-1CA20**		1	1 unit	1DL
 3NP1943-1CB00	**Cable connection covers** (at top and bottom)	►	**3NP1943-1CB00**		1	1 unit	1DL
  3NP1943-1CD00	**Cable connection covers** With rear reach-around protection (at top and bottom)	►	**3NP1943-1CD00**		1	1 unit	1DL
	Masking frame supports (1 set = 2 units)		**3NP1943-1CF00**		1	1 unit	1DL
	Covers						
	External dimensions (H x W) 375 x 220 mm		**3NP1943-1DA00**		1	1 unit	1DL
 3NP1943-1EB00	**Fixing kits** For 2 standard mounting rails 125/150 mm		**3NP1943-1EB00**		1	1 unit	1DL
	Auxiliary switches						
 3NP1940-1FA00	1 CO contact	►	**3NP1940-1FA00**		1	1 unit	1DL
	1 CO contact, solid-state compatible		**3NP1940-1FB00**		1	1 unit	1DL
 3NP1943-1GB20	**Fuse carriers** Spare part, included in scope of delivery of the 3NP1, fuse monitoring can be retrofitted by replacing the fuse carrier						
	• Standard		**3NP1943-1GA00**		1	1 unit	1DL
	• With MFM electromechanical fuse monitoring		**3NP1943-1GB10**		1	1 unit	1DL
	• With EFM 10 electronic fuse monitoring		**3NP1943-1GB20**		1	1 unit	1DL
	• With EFM 20 electronic fuse monitoring and line monitoring		**3NP1943-1GB30**		1	1 unit	1DL
	• With EFM 25 electronic fuse monitoring and line monitoring		**3NP1943-1GB50**		1	1 unit	1DL
	Locking devices						
	(1 set = 10 units)		**3NP1900-1HA00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For size 2							
	Connection methods						
 3NP1953-1BA00	**Saddle terminals**, 120 ... 240 mm^2 (1 set = 3 units) • For 3NP1153 with flat terminal • For connection of copper conductors		**3NP1953-1BA00**		1	1 unit	1DL
 3NP1953-1BB10	**Prism terminals** single, 120 ... 240 mm^2 (1 set = 3 units) • For 3NP1153 with flat terminal • For connection of copper or aluminum conductors		**3NP1953-1BB10**		1	1 unit	1DL
 3NP1953-1BB20	**Prism terminals** double, 2 x 70 ... 120 mm^2 (1 set = 3 units) • For 3NP1153 with flat terminal • For connection of copper or aluminum conductors		**3NP1953-1BB20**		1	1 unit	1DL
 3NP1943-1BG10	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For flat terminal (1 set = 3 units)		**3NP1943-1BG10**		1	1 unit	1DL
 3NP1953-1BG30	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm; max. 5 A For saddle-type or prism terminals (1 set = 3 units)		**3NP1953-1BG30**		1	1 unit	1DL
 3NP1953-1BG40	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm; max. 5 A For box terminal (1 set = 3 units)		**3NP1953-1BG40**		1	1 unit	1DL
	Device covers, auxiliary switches						
 3NP1953-1CA10	**Reach-around protection for busbar mounting** 1x top, 1x bottom Spare part, included in scope of delivery of the 3NP1, can also be used for retrofitting to a different busbar system						
	• For Siemens 8US system		**3NP1953-1CA10**		1	1 unit	1DL
	• For Rittal system		**3NP1953-1CA20**		1	1 unit	1DL
 3NP1953-1CB00	**Cable connection covers** (at top and bottom)	►	**3NP1953-1CB00**		1	1 unit	1DL
	Cable connection covers With rear reach-around protection (at top and bottom)	►	**3NP1953-1CD00**		1	1 unit	1DL
	Masking frame supports (1 set = 2 units)		**3NP1943-1CF00**		1	1 unit	1DL
	Covers						
	External dimensions (H x W) 375 x 245 mm		**3NP1953-1DA00**		1	1 unit	1DL
	Auxiliary switches						
 3NP1940-1FA00	1 CO contact	►	**3NP1940-1FA00**		1	1 unit	1DL
	1 CO contact, solid-state compatible		**3NP1940-1FB00**		1	1 unit	1DL
 3NP1953-1GB30	**Fuse carriers** Spare part, included in scope of delivery of the 3NP1, fuse monitoring can be retrofitted by replacing the fuse carrier						
	• Standard		**3NP1953-1GA00**		1	1 unit	1DL
	• With MFM electromechanical fuse monitoring		**3NP1953-1GB10**		1	1 unit	1DL
	• With EFM 10 electronic fuse monitoring		**3NP1953-1GB20**		1	1 unit	1DL
	• With EFM 20 electronic fuse monitoring and line monitoring		**3NP1953-1GB30**		1	1 unit	1DL
	• With EFM 25 electronic fuse monitoring and line monitoring		**3NP1953-1GB50**		1	1 unit	1DL
	Locking devices						
	(1 set = 10 units)		**3NP1900-1HA00**		1	1 unit	1DL

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Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For size 3							
	Connection methods						
 3NP1963-1BA00	**Saddle terminals**, 150 ... 300 mm^2 (1 set = 3 units) • For 3NP1163 with flat terminal • For connection of copper conductors		**3NP1963-1BA00**		1	1 unit	1DL
 3NP1963-1BB10	**Prism terminals** single, 150 ... 300 mm^2 (1 set = 3 units) • For 3NP1163 with flat terminal • For connection of copper or aluminum conductors		**3NP1963-1BB10**		1	1 unit	1DL
 3NP1963-1BB20	**Prism terminals** double, 2 x 150 ... 185 mm^2 (1 set = 3 units) • For 3NP1163 with flat terminal • For connection of copper or aluminum conductors		**3NP1963-1BB20**		1	1 unit	1DL
 3NP1943-1BG10	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For flat terminal (1 set = 3 units)		**3NP1943-1BG10**		1	1 unit	1DL
 3NP1953-1BG30	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For saddle-type or prism terminal (1 set = 3 units)		**3NP1953-1BG30**		1	1 unit	1DL
 3NP1953-1BG40	**Auxiliary conductor connections** For flat tab sleeve 6.3 x 0.8 mm, max. 5 A For box terminal (1 set = 3 units)		**3NP1953-1BG40**		1	1 unit	1DL
	Device covers, auxiliary switches						
 3NP1963-1CA10	**Reach-around protection for busbar mounting** 1x top, 1x bottom Spare part, included in scope of delivery of the 3NP1, can also be used for retrofitting to a different busbar system						
	• For Siemens 8US system		**3NP1963-1CA10**		1	1 unit	1DL
	• For Rittal system		**3NP1963-1CA20**		1	1 unit	1DL
 3NP1963-1CB00	**Cable connection covers** (at top and bottom)	►	**3NP1963-1CB00**		1	1 unit	1DL
	Cable connection cover With rear reach-around protection (at top and bottom)	►	**3NP1963-1CD00**		1	1 unit	1DL
	Masking frame supports (1 set = 2 units)		**3NP1943-1CF00**		1	1 unit	1DL
	Covers						
	External dimensions (H x W) 375 x 290 mm		**3NP1963-1DA00**		1	1 unit	1DL
	Auxiliary switches						
 3NP1940-1FA00	1 CO contact	►	**3NP1940-1FA00**		1	1 unit	1DL
	1 CO contact, solid-state compatible		**3NP1940-1FB00**		1	1 unit	1DL
	Fuse carriers						
 3NP1963-1GB50	Spare part, included in scope of delivery of the 3NP1, fuse monitoring can be retrofitted by replacing the fuse carrier						
	• Standard		**3NP1963-1GA00**		1	1 unit	1DL
	• With MFM electromechanical fuse monitoring		**3NP1963-1GB10**		1	1 unit	1DL
	• With EFM 10 electronic fuse monitoring		**3NP1963-1GB20**		1	1 unit	1DL
	• With EFM 20 electronic fuse monitoring and line monitoring		**3NP1963-1GB30**		1	1 unit	1DL
	• With EFM 25 electronic fuse monitoring and line monitoring		**3NP1963-1GB50**		1	1 unit	1DL
	Locking devices						
	(1 set = 10 units)		**3NP1900-1HA00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The 3NP1 fuse switch disconnectors are suitable for all fuses in LV HRC design, see chapter "Fuse Systems".

SITOR semiconductor fuses in LV HRC design can also be used, although it must be noted that, compared to cable and line protection fuses, these get much hotter during operation. For this reason, the fuse must be operated below the rated current I_n of the device (derating) when installed in a closed switching device.

The following table shows the permissible load currents of the SITOR semiconductor fuses for installation in 3NP1. The values were determined using the conductor cross-sections specified in the table.

Note

If using smaller cross-sections, a considerably higher derating is required due to the lower heat dissipation.

SITOR semiconductor fuses for 3NP1 fuse switch disconnectors: Assignment table

SITOR semiconductor fuse data						**Permissible load currents of fuse when installed in:**					
						3NP1 for floor mounting			**3NP1 for busbar mounting**		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4) 5)]
	A	V AC			mm²			A			A
3NC23..	150	500	gR	3	70	3NP1163	3	140	3NP1163	3	150
3NC2425..	200	500	gR	3	95	3NP1163	3	175	3NP1163	3	190
3NC2427..	250	500	gR	3	120	3NP1163	3	220	3NP1163	3	237
3NC2428..	300	500	gR	3	185	3NP1163	3	250	3NP1163	3	285
3NC2431..	350	500	gR	3	240	3NP1163	3	320	3NP1163	3	332
3NC2432..	400	500	aR	3	240	3NP1163	3	370	3NP1163	3	380
3NC3336-1	630	1000	aR	3	2x (40x5)	3NP1163	3	500	3NP1163	3	500
3NC3430-1	315	1250	aR	3	2x95	3NP1163	3	280	3NP1163	3	285
3NC3432-1	400	1250	aR	3	2x120	3NP1163	3	340	3NP1163	3	340
3NC3434-1	500	1250	aR	3	2x150	3NP1163	3	400	3NP1163	3	425
3NC3436-1	630	1250	aR	3	2x (40x5)	3NP1163	3	460	3NP1163	3	535
3NC8423..	150	660	gR	3	70	3NP1163	3	120	3NP1163	3	140
3NC8425..	200	660	gR	3	95	3NP1163	3	160	3NP1163	3	190
3NC8427..	250	660	gR	3	120	3NP1163	3	200	3NP1163	3	240
3NC8431..	350	660	gR	3	240	3NP1163	3	270	3NP1163	3	300
3NC8434..	500	660	gR	3	2x 150	3NP1163	3	385	3NP1163	3	385
3NE1020-2	80	690	gR	00	25	3NP1133	00	80	3NP1133	00	80
3NE1021-0	100	690	gS	00	35	3NP1133	00	100	3NP1133	00	100
3NE1021-2	100	690	gR	00	35	3NP1133	00	95	3NP1133	00	95
3NE1022-0	125	690	gS	00	50	3NP1133	00	120	3NP1133	00	120
3NE1022-2	125	690	gR	00	50	3NP1133	00	115	3NP1133	00	115
3NE1224-0	160	690	gS	1	70	3NP1143 3NP1153	1 2	160 160	3NP1143 3NP1153	1 2	160 160
3NE1224-2/-3	160	690	gR	1	70	3NP1143 3NP1153	1 2	150 200	3NP1143 3NP1153	1 2	152 200
3NE1224-2/-3	160	690	gR	1	70	3NP1143 3NP1153	1 2	150 160	3NP1143 3NP1153	1 2	152 160
3NE1225-2/-3	200	690	gR	1	95	3NP1143 3NP1153	1 2	180 190	3NP1143 3NP1153	1 2	180 190
3NE1227-0	250	690	gS	1	120	3NP1143 3NP1153	1 2	235 250	3NP1143 3NP1153	1 2	238 250
3NE1227-2/-3	250	690	gR	1	120	3NP1143 3NP1153	1 2	220 235	3NP1143 3NP1153	1 2	213 235
3NE1230-0	315	690	gS	1	2x 70	3NP1153	2	290	3NP1153	2	315
3NE1230-2/-3	315	690	gR	1	2x 70	3NP1153 3NP1163	2 3	278 380	3NP1153 3NP1163	2 3	315 400
3NE1331-0	350	690	gS	2	2x 95	3NP1153 3NP1163	2 3	315 340	3NP1153 3NP1163	2 3	350 350
3NE1331-2/-3	350	690	gR	2	2x 95	3NP1153 3NP1163	2 3	300 330	3NP1153 3NP1163	2 3	330 350
3NE1332-0	400	690	gS	2	2x 95	3NP1153	2	340	3NP1153	2	380
3NE1332-2/-3	400	690	gR	2	2x 95	3NP1153 3NP1163	2 3	328 370	3NP1153 3NP1163	2 3	360 400
3NE1333-0	450	690	gS	2	2x 120	3NP1163	3	450	3NP1163	3	430
3NE1333-2/-3	450	690	gR	2	2x 120	3NP1163	3	430	3NP1163	3	420

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Fuses

SITOR semiconductor fuse data						Permissible load currents of fuse when installed in:					
						3NP1 for floor mounting			3NP1 for busbar mounting		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4) 5)]
	A	V AC			mm²			A			A
3NE1334-0	500	690	gS	2	2x 120	3NP1163	3	500	3NP1163	3	450
3NE1334-2/-3	500	690	gR	2	2x 120	3NP1163	3	475	3NP1163	3	450
3NE1435-0	560	690	gS	3	2x 150	3NP1163	3	560	3NP1163	3	520
3NE1435-2/-3	560	690	gR	3	2x 150	3NP1163	3	555	3NP1163	3	510
3NE1436-0	630	690	gS	3	2x 185	3NP1163	3	630	3NP1163	3	585
3NE1436-2/-3	630	690	gR	3	2x 185	3NP1163	3	620	3NP1163	3	570
3NE1437-0	710	690	gS	3	2x (40x5)	--	--	--	3NP1163	3	605
3NE1437-1	710	600	gR	3	2x (40x5)	--	--	--	3NP1163	3	590
3NE1437-2/-3	710	690	gR	3	2x (40x5)	--	--	--	3NP1163	3	580
3NE1438-0	800	690	gS	3	2x (50x5)	--	--	--	3NP1163	3	630
3NE1438-1	800	600	gR	3	2x (50x5)	--	--	--	3NP1163	3	610
3NE1438-2/-3	800	690	gR	3	2x (50x5)	--	--	--	3NP1163	3	600
3NE1447-2/-3	670	690	gR	3	2x (40x5)	--	--	--	3NP1163	3	575
3NE1448-2/-3	850	690	gR	3	2x (40x8)	--	--	--	3NP1163	3	630
3NE1802-0	40	690	gS	000	10	3NP1123 3NP1133	000 00	40 40	3NP1123 3NP1133	000 00	40 40
3NE1803-0	35	690	gS	000	6	3NP1123 3NP1133	000 00	35 35	3NP1123 3NP1133	000 00	35 35
3NE1813-0	16	690	gS	000	1.5	3NP1123 3NP1133	000 00	16 16	3NP1123 3NP1133	000 00	16 16
3NE1814-0	20	690	gS	000	2.5	3NP1123 3NP1133	000 00	20 20	3NP1123 3NP1133	000 00	20 20
3NE1815-0	25	690	gS	000	4	3NP1123 3NP1133	000 00	25 25	3NP1123 3NP1133	000 00	25 25
3NE1817-0	50	690	gS	000	10	3NP1123 3NP1133	000 00	50 50	3NP1123 3NP1133	000 00	50 50
3NE1818-0	63	690	gS	000	16	3NP1123 3NP1133	000 00	63 63	3NP1123 3NP1133	000 00	63 63
3NE1820-0	80	690	gS	000	25	3NP1123 3NP1133	000 00	80 80	3NP1123 3NP1133	000 00	80 80
3NE3221	100	1000	aR	1	35	3NP1143 3NP1153	1 2	88 95	3NP1143 3NP1153	1 2	95 100
3NE3222	125	1000	aR	1	50	3NP1143 3NP1153	1 2	102 110	3NP1143 3NP1153	1 2	113 125
3NE3224	160	1000	aR	1	70	3NP1143 3NP1153	1 2	130 140	3NP1143 3NP1153	1 2	140 150
3NE3225	200	1000	aR	1	95	3NP1143 3NP1153	1 2	163 175	3NP1143 3NP1153	1 2	170 180
3NE3227	250	1000	aR	1	120	3NP1143 3NP1153	1 2	195 210	3NP1143 3NP1153	1 2	200 215
3NE3230-0B	315	1000	aR	1	185	3NP1153	2	270	3NP1153	2	265
3NE3231	350	1000	aR	1	240	3NP1153	2	290	3NP1153	2	280
3NE3232-0B	400	1000	aR	1	240	3NP1153	2	320	3NP1153	2	310
3NE3233	450	1000	aR	1	2x 150	3NP1153	2	360	3NP1153	2	330
3NE3332-0B	400	1000	aR	2	240	3NP1153 3NP1163	2 3	330 360	3NP1163 --	3 --	360 --
3NE3333	450	1000	aR	2	2x 150	3NP1163	3	375	3NP1163	3	390
3NE3334-0B	500	1000	aR	2	2x 150	3NP1163	3	420	3NP1163	3	415
3NE3335	560	1000	aR	2	2x 185	3NP1163	3	475	3NP1163	3	460
3NE3336	630	1000	aR	2	2x 185	3NP1163	3	540	3NP1163	3	500
3NE3337-8	710	900	aR	2	2x (40x5)	3NP1163	3	580	3NP1163	3	500
3NE3338-8	800	800	aR	2	2x 240	3NP1163	3	605	3NP1163	3	500
3NE3340-8	900	690	aR	2	2x (40x8)	3NP1163	3	630	3NP1163	3	500
3NE4101	32	1000	gR	0	6	3NP1143	1	30	3NP1143	1	32
3NE4102	40	1000	gR	0	10	3NP1143	1	35	3NP1143	1	40
3NE4117	50	1000	gR	0	10	3NP1143	1	42	3NP1143	1	50
3NE4118	63	1000	aR	0	16	3NP1143	1	55	3NP1143	1	60
3NE4120	80	1000	aR	0	25	3NP1143	1	71	3NP1143	1	76
3NE4121	100	1000	aR	0	35	3NP1143	1	84	3NP1143	1	93
3NE4122	125	1000	aR	0	50	3NP1143	1	107	3NP1143	1	115
3NE4124	160	1000	aR	0	70	3NP1143	1	134	3NP1143	1	144
3NE4327-0B	250	800	aR	2	150	3NP1153 3NP1163	2 3	195 215	3NP1163 3NP1163	3 3	220 220

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SITOR semiconductor fuse data						Permissible load currents of fuse when installed in:					
						3NP1 for floor mounting			3NP1 for busbar mounting		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4) 5)]
	A	V AC			mm²			A			A
3NE4330-0B	315	800	aR	2	240	3NP1153 3NP1163	2 3	240 270	3NP1163 --	3 --	255 --
3NE4333-0B	450	800	aR	2	2x (30x5)	3NP1163	3	370	3NP1163	3	355
3NE4334-0B	500	800	aR	2	2x (30x5)	3NP1163	3	410	3NP1163	3	390
3NE4337	710	800	aR	2	2x (50x5)	3NP1163	3	540	3NP1163	3	500
3NE8015-1	25	690	gR	00	4	3NP1133	00	25	3NP1133	00	25
3NE8003-1	35	690	gR	00	6	3NP1133	00	32	3NP1133	00	35
3NE8017-1	50	690	gR	00	10	3NP1133	00	43	3NP1133	00	50
3NE8018-1	63	690	gR	00	16	3NP1133	00	52	3NP1133	00	60
3NE8020-1	80	690	aR	00	25	3NP1133	00	65	3NP1133	00	72
3NE8021-1	100	690	aR	00	35	3NP1133	00	85	3NP1133	00	85
3NE8022-1	125	690	aR	00	50	3NP1133	00	100	3NP1133	00	100
3NE8024-1	160	690	aR	00	70	3NP1133	00	120	3NP1133	00	115

1) Due to the mechanical stress on the relatively long fuse blades, SITOR 3NE41 semiconductor fuses should only be switched occasionally and only at zero current.

2) For permissible load currents for 3NE8…-0MK, see Configuration Manual "Fuse Systems", or on request.

3) 3NP1 fuse switch disconnectors may be operated at up to 1000 V AC/DC with the following restrictions:
- Degree of pollution 2 (instead of 3)
- AC20 or DC20 – i.e. switching only without load

4) In the case of cyclic loads, the currents may have to be further reduced (precise values on request).

5) Values apply if used with 30 x 10 mm rails; for size 00: 12 x 5 mm and top busbar connection – values for other configurations available on request.

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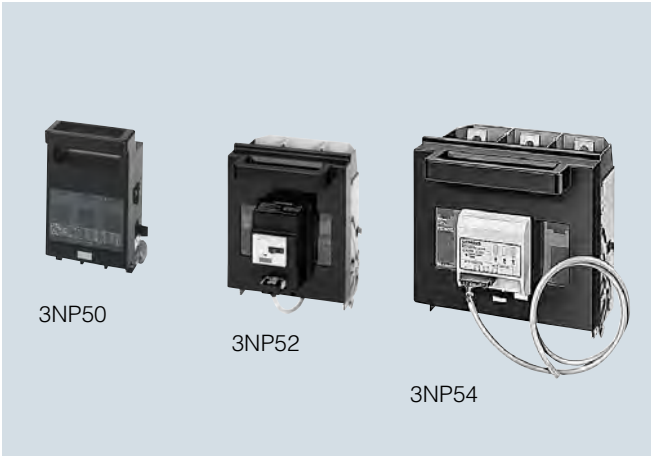
Introduction

Overview



3NP5 fuse switch disconnector range

3NP5 fuse switch disconnectors are controls for the occasional manual switching/isolating of loads and distribution boards. They are able to switch on, control and switch off the specified rated current (including a specific overload).

With the 3NP5 fuse switch disconnectors, all poles of downstream electric loads can be safely disconnected from the system under load.

Application

The 3NP5 fuse switch disconnectors are ideally suited for surface mounting and installation in the ALPHA distribution boards and SIVACON sicube 8MF1 system cubicles.

The ability to mount them on a range of different busbar systems allows their very diverse implementation in switchboard cabinet and control engineering.

The 3NP5 fuse switch disconnectors are ideal for operation in combination with other switching devices, for example in capacitor modules for reactive-power compensation.

In conjunction with semiconductor protection fuses (e.g. SITOR), these are used for the effective protection of frequency converters and soft starters.

The 3NP5 fuse switch disconnectors are suitable for use in any climate and comply with standards IEC 60947-1, IEC 60947-3 and DIN VDE 0660 Part 107.

In addition, the 3NP5 series of fuse switch disconnectors complies with the requirements of BS 5419 and is also approved for operation in marine applications.

All 3NP5 fuse switch disconnectors can be sealed as standard (or can be sealed through accessories).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards		**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**						
Type		**3NP50**	**3NP52**		**3NP53**		**3NP54**	
Rated uninterrupted current I_u	A	160	250		400		630	
For fuse links acc. to IEC 60269-2	Size	00	1 and 0		2 and 1		3 and 2	
Conventional free-air thermal current I_{th}	A	160	250		400		630	
Rated operational voltage U_e								
• 50/60 Hz AC	V	690						
• DC	V	440 (3 conducting paths series-connected), 220 (2 conducting paths series-connected, with fuse monitoring through 3RV)						
Rated insulation voltage U_i	V	690[1]	690[1]		690[1]		690[1]	
Rated impulse withstand voltage U_{imp}	kV	6	6		6		6	
Rated cond. short-circuit current with fuses (by fast switch on)								
Rated current	Size/A	00/160	1/250		2/400		3/630	
• At 500 V AC (rms value)	kA	50	50		50		50	
Permissible let-through current of the fuses (peak value)	kA	15	25		40		50	
Short-circuit strength with fuses (with closed disconnector)								
• Rated current	Size/A	00/160	1/250		2/400		3/630	
• At 500 V AC (rms value)	kA	100	100		50		50	
• Maximum permissible let-through I^2t value	kA^2s	223	780		2150		5400	
• Permissible let-through current of the fuses (peak value)	kA	23	32		40		60	
Rated short-circuit making capacity with isolating blades[2]	Size	00	1		2		3	
• At 500 V AC (peak value)	kA	6	17		17		17	
Rated making and breaking capacity[2] (infeed from top or bottom)[3]	Size	00	1	0	2	1	3	2
Breaking current I_c								
• At p.f. = 0.35, rms value at 500 V	A	1300	2500	1600	4000	2500	5040	4000
• At p.f. = 0.35, rms value at 690 V	A	800	1280	1000	2520	1600	3200	2520
• At p.f. = 0.35 and 400 V AC, with fuse links, rms value	A	1600	2500	1600	4000	2500	5040	4000
Rated operational current I_e								
• At AC-21B, AC-22B, AC-23B at 400 V AC, with fuse links	A	160	250	160	400	250	630	400
• At AC-21B, AC-22B, AC-23B at 500 V AC, with fuse links	A	160	250	160	400	250	630	400
• At AC-21B, AC-22B at AC 690 V	A	160	250	160	400	250	630	400
• At AC-23B at AC 690 V	A	100	160	125	315	200	400	315
At 220 (440) V DC, with 2 (3) conducting paths series-connected and fuse links:								
• Breaking current I_c (L/R = 15 ms)	A	640	1000	640	1600	1600	2520	1600
• Rated operational current I_e at DC-23B	A	160	250	160	400	250	630	400
Capacitor switching capacity								
• Capacitor rating at 400 V AC	kvar	80	90		150		250	
• Rated current I_n at 525 V AC	A	116	130		216		361	
• Capacitor rating	kvar	100	125		200		300	
• Rated current I_n	A	110	137		220		330	
Permissible ambient temperature[4]	°C	-25 ... +55 for operation[5], -50 ... +80 during storage						
Mechanical endurance, operating cycles		1600						
Degree of protection								
• Without molded-plastic masking frame		IP00, for 3NP52 with terminal clamp connection, degree of protection IP10						
• With molded-plastic masking frame with closed fuse carrier on the operator side		IP30						
• With molded-plastic masking frame with open fuse carrier		IP10						
Power loss of the switch at I_{th} (without power loss of the fuse links)								
• Without busbar adapter	W	7.8 (16.3)[5]	7.5		15		39	
Maximum power loss of the usable fuses (per fuse)[6]	W	12	23		37		50	
Main conductor connections								
Flat terminal for connection of								
• Crimped cable lugs acc. to DIN 46234 (conductor cross-section, stranded)	mm^2	2.5 ... 120	6 ... 150		6 ... 240		6 ... 2 × 240	
• Pressed cable lugs acc. to DIN 46235 (conductor cross-section, stranded)	mm^2	16 ... 70	16 ... 150		16 ... 240		16 ... 2 × 240	
• Busbars (usable busbar width)	mm	16 ... 22	22 ... 30		22 ... 30		22 ... 30	
Clamp terminals	mm^2	2.5 ... 50[7]	35 ... 120		--		--	
Auxiliary switch 1 NO + 1 NC (accessories)		The same voltage potential must be applied to the NO and NC contacts						
• At 50 Hz/60 Hz to 400 V AC, rated operational current I_e at AC-12/AC-15 A	A	16/6						
• Flat plug-in terminals (DIN 46244)		A 6.3 ... 0.8						
Permissible mounting position		Vertical or horizontal installation (switching capacity may be reduced with horizontal installation)						
Signaling contact for electronic fuse monitoring		1 NO + 1 NC						
• Rated operational current I_e at 250 V, DC-13	A	0.27						
• Rated operational current $I_e$at 240 V, AC-15	A	1.5						
• Thermal free-air rated current I_{th}	A	5						

1) When observing degree of pollution 2 (instead of 3) operation is also possible up to U_i = 1000 V.

2) Rated making and breaking current according to IEC 60947-3:
Rated making current
I = 10 × I_e (AC-23); 3 × I_e (AC-22); 1.5 × I_e (AC-21);
Rated breaking current
I_e = 8 × I_e (AC-23); 3 × I_e (AC-22); 1.5 × I_e (AC-21).

3) When electronic fuse monitoring devices are used, infeed must befrom the top.

4) When using isolating blades. If using fuse links, please observe specifications of fuse manufacturer.

5) With busbar adapter.

6) Values are valid when using LV HRC fuse systems with characteristic gG. If using fuses for semiconductor protection, please refer to the assignment table, see page 7/230.

7) When connecting one conductor.
For 2 conductors max. 1 x 50 mm^2 and 1 x 35 mm^2.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Floor mounting

Selection and ordering data

	Rated uninterrupted current I_u	Connection type	Size	Auxiliary switches at the switch disconnectors Version	SD	**Degree of protection IP00, without fuse links, without isolating blades, with terminal screws** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A				d					
Completely compartmentalized, with high speed closing feature										
 3NP5060-0CA00	160	Flat terminals[1]	00	Without[2]	►	**3NP5060-0CA00**		1	1 unit	1CL
				1 NO + 1 NC		**3NP5060-0CA10**		1	1 unit	1CL
		Clamp terminals	00	Without[2]		**3NP5060-0CB00**		1	1 unit	1CL
				1 NO + 1 NC		**3NP5060-0CB10**		1	1 unit	1CL
 3NP5260-0CA00	250	Flat terminals	1	Without	►	**3NP5260-0CA00**		1	1 unit	1CL
				1 NO + 1 NC		**3NP5260-0CA10**		1	1 unit	1CL
		Clamp terminals	1	Without		**3NP5260-0CB00**		1	1 unit	1CL
				1 NO + 1 NC		**3NP5260-0CB10**		1	1 unit	1CL
 3NP5360-0CA00	400	Flat terminals	2	Without	►	**3NP5360-0CA00**		1	1 unit	1CL
				1 NO + 1 NC		**3NP5360-0CA10**		1	1 unit	1CL
 3NP5460-0CA00	630	Flat terminals	3	Without	►	**3NP5460-0CA00**		1	1 unit	1CL
				1 NO + 1 NC		**3NP5460-0CA10**		1	1 unit	1CL

[1] For 3NP5060 with flat terminals, appropriate 3NY1106 cable lug covers must be used to provide a finger-safe cover, according to DIN VDE 0106 Part 100, see page 7/228, Accessories.

[2] If the auxiliary switch is retrofitted, additional drill holes are required on the switch.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data -

Rated uninterrupted current I_u	Connection type	Size	Auxiliary switches at the switch disconnectors Version	SD	**Degree of protection IP00, without fuse links, without isolating blades, with terminal screws** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A				d					
Completely compartmentalized, with high speed closing feature[1)]									
For busbars with a width of 12 mm and a thickness of 5 mm or 10 mm									
160	Flat terminals	00	Without		**3NP5065-1CF00**		1	1 unit	1CL
			1 NO + 1 NC		**3NP5065-1CF10**		1	1 unit	1CL
	Clamp terminals	00	Without		**3NP5065-1CG00**		1	1 unit	1CL
			1 NO + 1 NC		**3NP5065-1CG10**		1	1 unit	1CL

1) For accessories and more devices on busbar systems, see page 7/228, Accessories.

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For 60 mm busbar system

Overview

Note:

For disconnector versions "for installation in any distribution board" and busbar adapters, see page 7/229.

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Selection and ordering data

Fuse monitoring by circuit breakers

Floor mounting

Rated uninterrupted current I_u	Connection type	Size	Auxiliary switches: At switch disconnectors	Auxiliary switches: At circuit breakers	SD	**Degree of protection IP00, without fuse links, without isolating blades, with terminal screws** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A			Version	Version	d					
Completely compartmentalized, with high speed closing feature with fuse monitoring by SIRIUS circuit breakers										
With plug-in connection of the auxiliary switch connecting cable (length approx. 1 m) to the circuit breakers										
160	Flat terminals[1]	00	1 NO + 1 NC	1 NO + 1 NC	▶	**3NP5060-0EA86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5060-0EA26**		1	1 unit	1CL
	Clamp terminals	00	1 NO + 1 NC	1 NO + 1 NC		**3NP5060-0EB86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5060-0EB26**		1	1 unit	1CL
250	Flat terminals	1	1 NO + 1 NC	1 NO + 1 NC	▶	**3NP5260-0EA86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5260-0EA26**		1	1 unit	1CL
	Clamp terminals	1	1 NO + 1 NC	1 NO + 1 NC		**3NP5260-0EB86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5260-0EB26**		1	1 unit	1CL
400	Flat terminals	2	1 NO + 1 NC	1 NO + 1 NC	▶	**3NP5360-0EA86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5360-0EA26**		1	1 unit	1CL
630	Flat terminals	3	1 NO + 1 NC	1 NO + 1 NC	▶	**3NP5460-0EA86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5460-0EA26**		1	1 unit	1CL


3NP5260-0EA86


3NP5360-0EA86


3NP5460-0EA86

[1] For 3NP5060 with flat terminals, appropriate 3NY1106 cable lug covers must be used to provide a finger-safe cover, according to DIN VDE 0106 Part 100, see page 7/228, Accessories.

For 40 mm busbar system

Rated uninterrupted current I_u	Connection type	Size	Auxiliary switches: At switch disconnectors	Auxiliary switches: At circuit breakers	SD	**Degree of protection IP00, without fuse links, without isolating blades, with terminal screws** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
A			Version	Version	d					
Completely compartmentalized, with high speed closing feature with fuse monitoring by SIRIUS circuit breakers[1]										
For busbars with a width of 12 mm and a thickness of 5 mm or 10 mm										
160	Flat terminals	00	1 NO + 1 NC	1 NO + 1 NC		**3NP5065-1EF86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5065-1EF26**		1	1 unit	1CL
	Clamp terminals	00	1 NO + 1 NC	1 NO + 1 NC		**3NP5065-1EG86**		1	1 unit	1CL
			1 NO + 1 NC	2 NO		**3NP5065-1EG26**		1	1 unit	1CL

[1] For accessories and more devices on busbar systems, see chapter "Busbar Systems".

For 60 mm busbar system

Note:

For disconnector versions "for installation in any distribution board" and busbar adapters, see chapter "Busbar Systems".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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With fuse monitoring

Fuse monitoring by electronic fuse monitoring devices

Floor mounting

	Rated uninterrupted current I_u	Connection type	Size	Auxiliary switches		SD	**Degree of protection IP00, without fuse links, without isolating blades, with terminal screws**		PU (UNIT, SET, M)	PS	PG
				At switch disconnectors	At fuse monitoring devices						
	A			Version	Version	d	Article No. www.siemens.com/product?Article No.	Price per PU			
Completely compartmentalized, with high-speed closing feature with EFM electronic fuse monitoring (self-powered), open-circuit principle											
	For rated operational voltages U_e from 400 V to 500 V AC, infeed must come from above! With plug-in connection for connecting cables from auxiliary switches (approx. 1 m long) to the fuse monitoring device, - Status indicator: Green LED illuminated, - Fault indication: Green LED flashing, - Fuse failure: Red LED (display per phase)										
 3NP5060-0HA13	160	Flat terminals[1]	00	1 NO + 1 NC	2 NO + 1 NC		**3NP5060-0HA13**		1	1 unit	1CL
		Clamp terminals	00	1 NO + 1 NC	2 NO + 1 NC		**3NP5060-0HB13**		1	1 unit	1CL
 3NP5260-0HA13	250	Flat terminals	1	1 NO + 1 NC	2 NO + 1 NC		**3NP5260-0HA13**		1	1 unit	1CL
 3NP5360-0HA13	400	Flat terminals	2	1 NO + 1 NC	2 NO + 1 NC		**3NP5360-0HA13**		1	1 unit	1CL
 3NP5460-0HA13	630	Flat terminals	3	1 NO + 1 NC	2 NO + 1 NC		**3NP5460-0HA13**		1	1 unit	1CL

[1] For 3NP5060 with flat terminals, appropriate 3NY1106 cable lug covers must be used to provide a finger-safe cover, according to DIN VDE 0106 Part 100, see page 7/228, Accessories.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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For 40 mm busbar system

	Rated uninterrupted current I_u	Connection type	Size	Auxiliary switches		SD	**Degree of protection IP00, without fuse links, without isolating blades, with terminal screws**		PU (UNIT, SET, M)	PS	PG
				At switch disconnectors	At fuse monitoring devices						
	A			Version	Version	d	Article No. www.siemens.com/product?Article No.	Price per PU			
Completely compartmentalized, with high-speed closing feature with EFM electronic fuse monitoring (self-powered), open-circuit principle											
	For rated operational voltages U_e from 400 V to 500 V AC, infeed must come from above!										
	For busbars with a width of 12 mm and thickness of 5 mm or 10 mm										
 3NP5065-1HF13	160	Flat terminals	00	1 NO + 1 NC	2 NO + 1 NC		**3NP5065-1HF13**		1	1 unit	1CL

For 60 mm busbar system

Note:

For disconnector versions "for installation in any distribution board" and busbar adapters, see page 7/229.

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Selection and ordering data

	Version		For fuse switch disconnectors	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Fuse carriers								
 3NY1074			3NP506.-.C..0		**3NY1074**		1	1 unit	1CL
			3NP5260-.C..0		**3NY1371**		1	1 unit	1CL
			3NP5360-.C..0		**3NY1372**		1	1 unit	1CL
			3NP5460-.C..0		**3NY1373**		1	1 unit	1CL
	With fuse monitoring by 3RV1 circuit breakers (with auxiliary switch 1 NO + 1 NC), with plug-in connection, without connector and connecting cable		3NP506.-.E..6		**3NY1420**		1	1 unit	1CL
			3NP5260-.E..6		**3NY1421**		1	1 unit	1CL
			3NP5360-.E..6		**3NY1422**		1	1 unit	1CL
			3NP5460-.E..6		**3NY1423**		1	1 unit	1CL
	Connector and connecting cable								
	1 m long		3NP5 with 3RV1		**3NY1910**		1	1 unit	1CL
	3 m long				**3NY1911**		1	1 unit	1CL
 3NY1513-3	With electronic fuse monitoring for 400 V ... 500 V (with auxiliary switch 1 NO + 1 NC), with plug-in connection, without connector and connecting cable		3NP506.-.H.13		**3NY1513-0**		1	1 unit	1CL
			3NP5260-.H.13		**3NY1513-2**		1	1 unit	1CL
			3NP5360-.H.13		**3NY1513-3**		1	1 unit	1CL
			3NP5460-.H.13		**3NY1513-4**		1	1 unit	1CL
 3NY1915	Connector and connecting cable (6-pole) 3 m long		3NP5 with EFM		**3NY1915**		1	1 unit	1CL
	Auxiliary switch 1 NO + 1 NC								
 3NY3033	With actuating cams, screws and washers (mounting kit)		3NP50[1)]		**3NY3033**		1	1 unit	1CL
 3NY3034	With fixing bracket and screws (mounting kit)		3NP52 ... 3NP54		**3NY3034**		1	1 unit	1CL
	Arc chutes								
 3NY4031	(3 units each are required for 3NP52, 3NP53 and 3NP54)		3NP50		**3NY4031**		1	1 unit	1CL
			3NP52		**3NY4011**		1	1 unit	1CL
 3NY4011			3NP53, 3NP54		**3NY4012**		1	1 unit	1CL
	Molded-plastic masking frames								
	As replacement for masking frames from assembly kits for flush mounting (without fixing brackets and small components)	300 x 220 mm	3NY1210		**3NY1102**		1	1 unit	1CL
		300 x 245 mm	3NY1211		**3NY1103**		1	1 unit	1CL
		300 x 290 mm	3NY1212		**3NY1104**		1	1 unit	1CL

[1)] If retrofitted, drill holes are required.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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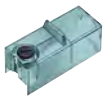
Assembly kits for distribution systems

	Version	For fuse switch disconnectors	Dimensions mm	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For installation in any distribution board									
	Molded-plastic masking frames		Height x width						
	For installation in cabinet	3NP50 with and without auxiliary switch	215 x 135		**3NY1105**		1	1 unit	1CL
		With auxiliary switch	215 x 135		**3NY1115**		1	1 unit	1CL
	For installation in metal front panels	With and without auxiliary switch	220 x 160		**3NY1125**		1	1 unit	1CL
 3NY1107	For covering connection terminals	3NP50 with and without auxiliary switch	265 x 135		**3NY1107**		1	1 unit	1CL
 3NY1106	For covering cable lug connections	3NP50 with and without auxiliary switch	290 x 135		**3NY1106**		1	1 unit	1CL
	For separate covering of top and bottom cable lug connections	With auxiliary switch	290 x 135		**3NY1116**		1	1 unit	1CL
		3NP50 with and without auxiliary switch	290 x 135		**3NY1108**		1	1 unit	1CL
 3NY1212	**Assembly kits for flush mounting**								
	With molded-plastic masking frame, fixing brackets and small components; for disconnectors with and without auxiliary switches	3NP5060	250 x 149		**3NY1208**		1	1 unit	1CL
		3NP5260	300 x 220		**3NY1210**		1	1 unit	1CL
		3NP5360	300 x 245		**3NY1211**		1	1 unit	1CL
		3NP5460	300 x 290		**3NY1212**		1	1 unit	1CL
	Covers for cable lug connections		Cover length						
 3TX6546-3B	Can be screwed onto free screw end to protect against accidental touch (1 set = 6 units)	3NP52	99		**3NY1241**		1	1 unit	1CL
		3NP53/3NP54	95		**3TX6546-3B**		1	1 unit	41B
			120		**3NY1245**		1	1 unit	1CL
 3NY1907	**Clamp terminals** (1 set = 3 units)		Conductor cross-section						
		3NP50	2.5 ... 50 mm² [1]		**3NY1903**		1	1 unit	1CL
		3NP52	35 ... 120 mm²		**3NY1907**		1	1 unit	1CL
 8US1210-4AG00	**Busbar adapters**		Busbar width						
	For 60 mm busbar system	3NP50	108		**8US1291-4SB00**		1	1 unit	1CU
		3NP52, 3NP53, 3NP54 [2]	250 (length 320 mm, M10 terminal screws, connecting cables must be manufactured)		**8US1210-4AG00**		1	1 unit	1CU

[1] Also available in 2-wire version: 1 x 2.5 ... 50 mm² and 1 x 2.5 ... 35 mm².

[2] Disconnector is wider than adapter. The adapter can, however, be expanded to 276 mm with two 8US1998-2BM00 side modules.

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Overview

3NP5 fuse switch disconnectors are suitable for all fuses in LV HRC design, see chapter "Fuse Systems".

SITOR semiconductor fuses in LV HRC design can also be used, although it must be noted that, compared to cable and line protection fuses, these get much hotter during operation. For this reason, the fuse must be operated below the rated current I_n of the device (derating) when installed in a closed switching device.

The following table shows the permissible load currents of the SITOR semiconductor fuses for installation in 3NP5. The values were determined using the conductor cross-sections specified in the table.

Note

If using smaller cross-sections, a considerably higher derating is required due to the lower heat dissipation.

SITOR semiconductor fuses for 3NP5 fuse switch disconnectors: Assignment table

SITOR semiconductor fuse data						Permissible load currents of fuse when installed in 3NP5 for floor mounting					
						Type 3NP5			Alternative type 3NP5		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4)]
	A	V AC			mm²			A			A
3NC2423..	150	500	gR	3	70	3NP54	3	145	--	--	--
3NC2425..	200	500	gR	3	95	3NP54	3	180	--	--	--
3NC2427..	250	500	gR	3	120	3NP54	3	225	--	--	--
3NC2428..	300	500	gR	3	185	3NP54	3	255	--	--	--
3NC2431..	350	500	gR	3	240	3NP54	3	330	--	--	--
3NC2432..	400	500	aR	3	240	3NP54	3	400	--	--	--
3NC3336-1	630	1000	aR	3	2x (40x5)	3NP54	3	530	--	--	--
3NC3337-1	710	1000	aR	3	2x (50x5)	3NP54	3	570	--	--	--
3NC3338-1	800	1000	aR	3	2x (40x8)	3NP54	3	630	--	--	--
3NC3340-1	900	1000	aR	3	2x (40x8)	3NP54	3	700[5)]	--	--	--
3NC3341-1	1000	1000	aR	3	2x (50x8)	3NP54	3	770[5)]	--	--	--
3NC3342-1	1100	800	aR	3	2x (50x8)	3NP54	3	800[5)]	--	--	--
3NC3343-1	1250	800	aR	3	2x (50x8)	3NP54	3	850[5)]	--	--	--
3NC3430-1	315	1250	aR	3	2x95	3NP54	3	295	--	--	--
3NC3432-1	400	1250	aR	3	2x120	3NP54	3	355	--	--	--
3NC3434-1	500	1250	aR	3	2x150	3NP54	3	440	--	--	--
3NC3436-1	630	1250	aR	3	2x (40x5)	3NP54	3	520	--	--	--
3NC3438-1	800	1100	aR	3	2x (40x8)	3NP54	3	625	--	--	--
3NC8423..	150	660	gR	3	70	3NP54	3	135	--	--	--
3NC8425..	200	660	gR	3	95	3NP54	3	180	--	--	--
3NC8427..	250	660	gR	3	120	3NP54	3	225	--	--	--
3NC8431..	350	660	gR	3	240	3NP54	3	300	--	--	--
3NC8434..	500	660	gR	3	2x 150	3NP54	3	425	--	--	--
3NC8444-3C	1000	600	aR	3	2x (60x6)	3NP54	3	800[5)]	--	--	--
3NE1020-2	80	690	gR	00	25	3NP50	00	80	--	--	--
3NE1021-0	100	690	gS	00	35	3NP50	00	100	--	--	--
3NE1021-2	100	690	gR	00	35	3NP50	00	100	--	--	--
3NE1022-0	125	690	gS	00	50	3NP50	00	125	--	--	--
3NE1022-2	125	690	gR	00	50	3NP50	00	125	--	--	--
3NE1224-0	160	690	gS	1	70	3NP52	1	160	3NP53	2	160
3NE1224-2/-3	160	690	gR	1	70	3NP52	1	160	3NP53	2	160
3NE1225-0	200	690	gS	1	95	3NP52	1	200	3NP53	2	200
3NE1225-2	200	690	gR	1	95	3NP52	1	200	3NP53	2	200
3NE1225-3	200	690	gR	1	95	3NP52	1	190	3NP53	2	200
3NE1227-0	250	690	gS	1	120	3NP52	1	250	3NP53	2	250
3NE1227-2	250	690	gR	1	120	3NP52	1	250	3NP53	2	250
3NE1227-3	250	690	gR	1	120	3NP52	1	235	3NP53	2	250
3NE1230-0	315	690	gS	1	2x 70	3NP53	2	315	--	--	--
3NE1230-2/-3	315	690	gR	1	2x 70	3NP53	2	315	--	--	--
3NE1331-0	350	690	gS	2	2x 95	3NP53	2	350	3NP54	3	350
3NE1331-2/-3	350	690	gR	2	2x 95	3NP53	2	350	3NP54	3	350

Minimum order quantity (PS) or a multiple thereof can be ordered.

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SITOR semiconductor fuse data						Permissible load currents of fuse when installed in 3NP5 for floor mounting					
						Type 3NP5			Alternative type 3NP5		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4)]
	A	V AC			mm²			A			A
3NE1332-0	400	690	gS	2	2x 95	3NP53	2	400	3NP54	3	400
3NE1332-2/-3	400	690	gR	2	2x 95	3NP53	2	400	3NP54	3	400
3NE1333-0	450	690	gS	2	2x 120	3NP54	3	450	--	--	--
3NE1333-2/-3	450	690	gR	2	2x 120	3NP54	3	450	--	--	--
3NE1334-0	500	690	gS	2	2x 120	3NP54	3	500	--	--	--
3NE1334-2/-3	500	690	gR	2	2x 120	3NP54	3	500	--	--	--
3NE1435-0	560	690	gS	3	2x 150	3NP54	3	560	--	--	--
3NE1435-2/-3	560	690	gR	3	2x 150	3NP54	3	560	--	--	--
3NE1436-0	630	690	gS	3	2x 185	3NP54	3	630	--	--	--
3NE1436-2/-3	630	690	gR	3	2x 185	3NP54	3	625	--	--	--
3NE1437-0	710	690	gS	3	2x (40x5)	3NP54	3	710[5)]	--	--	--
3NE1437-1	710	600	gR	3	2x (40x5)	3NP54	3	690[5)]	--	--	--
3NE1437-2/-3	710	690	gR	3	2x (40x5)	3NP54	3	685[5)]	--	--	--
3NE1438-0	800	690	gS	3	2x (50x5)	3NP54	3	800[5)]	--	--	--
3NE1438-1	800	600	gR	3	2x (50x5)	3NP54	3	750[5)]	--	--	--
3NE1438-2/-3	800	690	gR	3	2x (50x5)	3NP54	3	770[5)]	--	--	--
3NE1447-2/-3	670	690	gR	3	2x (40x5)	3NP54	3	655[5)]	--	--	--
3NE1448-2/-3	850	690	gR	3	2x (40x8)	3NP54	3	820[5)]	--	--	--
3NE1802-0	40	690	gS	000	10	3NP50	00	40	--	--	--
3NE1803-0	35	690	gS	000	6	3NP50	00	35	--	--	--
3NE1813-0	16	690	gS	000	1.5	3NP50	00	16	--	--	--
3NE1814-0	20	690	gS	000	2.5	3NP50	00	20	--	--	--
3NE1815-0	25	690	gS	000	4	3NP50	00	25	--	--	--
3NE1817-0	50	690	gS	000	10	3NP50	00	50	--	--	--
3NE1818-0	63	690	gS	000	16	3NP50	00	63	--	--	--
3NE1820-0	80	690	gS	000	25	3NP50	00	80	--	--	--
3NE3221	100	1000	aR	1	35	3NP52	1	95	3NP53	2	100
3NE3222	125	1000	aR	1	50	3NP52	1	110	3NP53	2	120
3NE3224	160	1000	aR	1	70	3NP52	1	140	3NP53	2	150
3NE3225	200	1000	aR	1	95	3NP52	1	175	3NP53	2	190
3NE3227	250	1000	aR	1	120	3NP52	1	210	3NP53	2	230
3NE3230-0B	315	1000	aR	1	185	3NP53	2	285	--	--	--
3NE3231	350	1000	aR	1	240	3NP53	2	310	--	--	--
3NE3232-0B	400	1000	aR	1	240	3NP53	2	330	--	--	--
3NE3233	450	1000	aR	1	2x 150	3NP53	2	360	--	--	--
3NE3332-0B	400	1000	aR	2	240	3NP54	3	360	--	--	--
3NE3333	450	1000	aR	2	2x 150	3NP54	3	400	--	--	--
3NE3334-0B	500	1000	aR	2	2x 150	3NP54	3	450	--	--	--
3NE3335	560	1000	aR	2	2x 185	3NP54	3	510	--	--	--
3NE3336	630	1000	aR	2	2x 185	3NP54	3	580	--	--	--
3NE3337-8	710	900	aR	2	2x (40x5)	3NP54	3	630	--	--	--
3NE3338-8	800	800	aR	2	2x 240	3NP54	3	630	--	--	--
3NE3340-8	900	690	aR	2	2x (40x8)	3NP54	3	630	--	--	--
3NE4101	32	1000	gR	0	6	3NP52	1	32	--	--	--
3NE4102	40	1000	gR	0	10	3NP52	1	40	--	--	--
3NE4117	50	1000	gR	0	10	3NP52	1	50	--	--	--
3NE4118	63	1000	aR	0	16	3NP52	1	63	--	--	--
3NE4120	80	1000	aR	0	25	3NP52	1	80	--	--	--
3NE4121	100	1000	aR	0	35	3NP52	1	95	--	--	--
3NE4122	125	1000	aR	0	50	3NP52	1	120	--	--	--
3NE4124	160	1000	aR	0	70	3NP52	1	150	--	--	--
3NE4327-0B	250	800	aR	2	150	3NP53	2	210	3NP54	3	220
3NE4330-0B	315	800	aR	2	240	3NP53	2	270	3NP54	3	285
3NE4333-0B	450	800	aR	2	2x (30x5)	3NP53	2	400	3NP54	3	420

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Fuses

SITOR semiconductor fuse data						Permissible load currents of fuse when installed in 3NP5 for floor mounting					
						Type 3NP5			Alternative type 3NP5		
Type[1) 2)]	Rated current I_n	Rated voltage[3)]	Operational class	Size	Required conductor cross-section Cu	Type	Size	Permissible load current[4)]	Type	Size	Permissible load current[4)]
	A	V AC			mm²			A			A
3NE4334-0B	500	800	aR	2	2x (30x5)	3NP54	3	450	--	--	--
3NE4337	710	800	aR	2	2x (50x5)	3NP54	3	600	--	--	--
3NE8015-1	25	690	gR	00	4	3NP50	00	25	--	--	--
3NE8003-1	35	690	gR	00	6	3NP50	00	33	--	--	--
3NE8017-1	50	690	gR	00	10	3NP50	00	45	--	--	--
3NE8018-1	63	690	gR	00	16	3NP50	00	54	--	--	--
3NE8020-1	80	690	aR	00	25	3NP50	00	68	--	--	--
3NE8021-1	100	690	aR	00	35	3NP50	00	89	--	--	--
3NE8022-1	125	690	aR	00	50	3NP50	00	106	--	--	--
3NE8024-1	160	690	aR	00	70	3NP50	00	130	--	--	--

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1) Due to the mechanical stress on the relatively long fuse blades, SITOR 3NE41 semiconductor fuses should only be switched occasionally and only at zero current.

2) For permissible load currents for 3NE8…-0MK, see Configuration Manual "Fuse Systems", or on request.

3) 3NP1 fuse switch disconnectors may be operated at up to 1000 V AC/DC with the following restrictions:
- Degree of pollution 2 (instead of 3)
- AC20 or DC20 – i.e. switching only without load.

4) In the case of cyclic loads, the currents may have to be further reduced (precise values on request).

5) The fuse can also be operated at a higher rated uninterrupted current than the 630 A current of the 3NP54. However, in this case, the 3NP54 must not be switched under load (utilization category AC-20).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



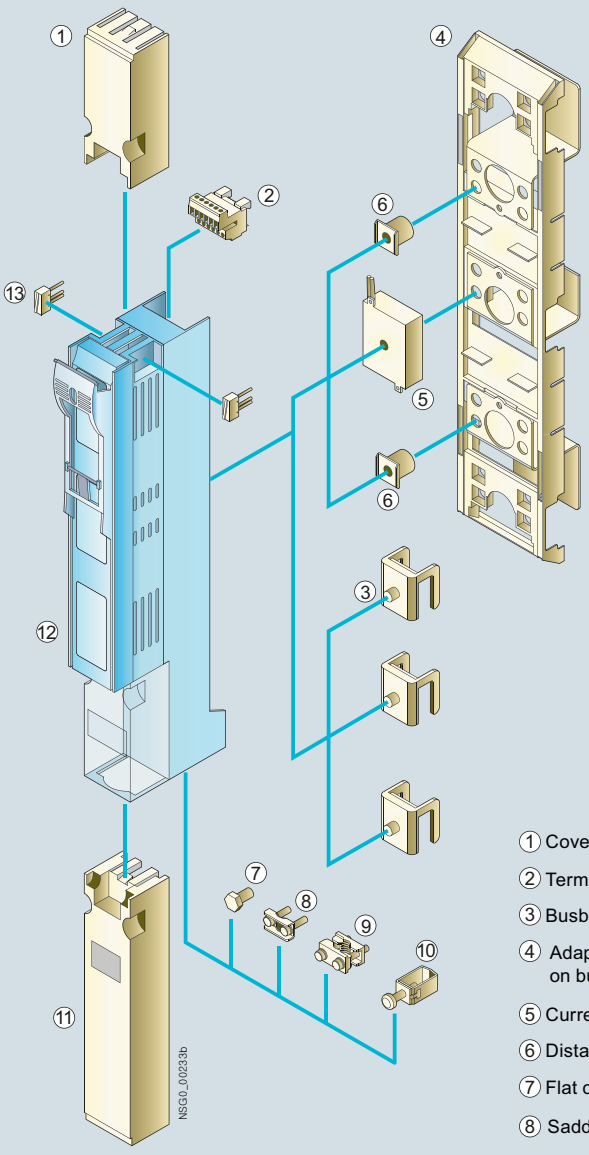
3NJ4/3NJ5 fuse switch disconnectors

All key product features at a glance

- Compliant with IEC/EN 60439-1, IEC/EN 60947-3
- Voltage levels up to 690 V AC
- Rated operational current from 160 A to 2000 A
- Fuse links according to IEC 60269 Part 1 can be used – nickel-plated fuse blades are not permissible due to the high transfer resistance
- In open position safe from touch by the back of the hand (exception 3NJ56: IP00)
- Parking position for maintenance
- 1-pole or 3-pole switchable
- Vertical and horizontal mounting position
- Climate-proof
- Degree of protection IP30 with closed fuse carriers, IP10 with open fuse carriers (exception 3NJ56: IP00)

7

Overview of all components and accessory parts: 3NJ4/3NJ5 in size 00



① Cover
② Terminal strip
③ Busbar terminal
④ Adapter for screw fixing on busbar systems
⑤ Current transformer
⑥ Distance compensation
⑦ Flat connector
⑧ Saddle terminal
⑨ Prism terminal
⑩ Box terminal
⑪ Cover
⑫ 3NJ4/5 fuse switch disconnector Basic device size 00
⑬ Auxiliary switch mounting kit

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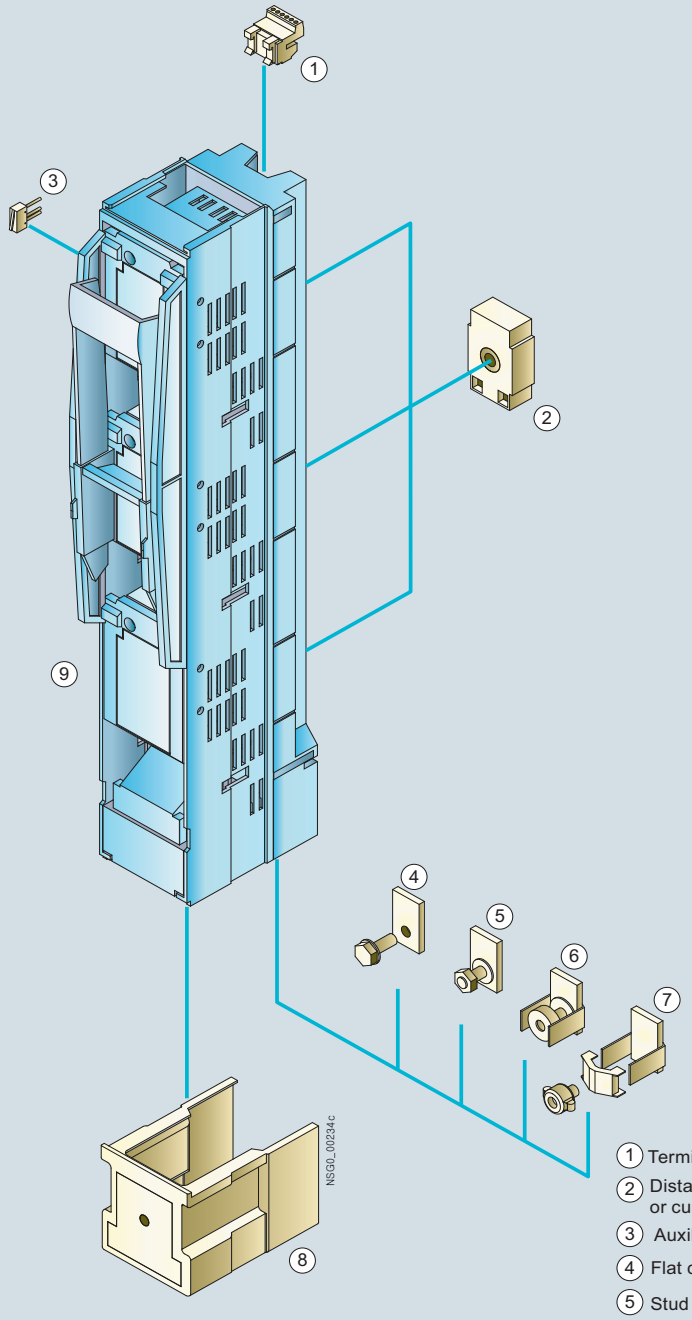
Introduction

Overview of all components and accessory parts: 3NJ4/3NJ5 in sizes 1 to 3



1 Terminal strip
2 Distance compensation or current transformer
3 Auxiliary switch
4 Flat connector
5 Stud terminal
6 V terminal
7 Box terminal
8 Cover
9 3NJ4/5 fuse switch disconnector Basic device sizes 1/2/3

Benefits

Parking position

For maintenance, e.g. of 1-pole switchable in-line fuse switch disconnectors – sizes 1 to 3 – and for 3-pole switchable in-line fuse switch disconnectors – size 00 – the fuse carriers can be mounted after being turned by 180° (fuse facing outwards).

This results in the following advantages:
- Visible disconnection point
- Depot for fuse links (parking position)
- No opportunity for mistakes when replacing the fuse links
- Additional touch protection in the vicinity of the lyre-shaped contacts

Application

3NJ41 and 3NJ56 single-pole and 3-pole in-line fuse switch disconnectors can be installed in low-voltage distribution boards, substations and cable distribution cubicles.

Note:

For 1-pole switchable fuse switch disconnectors the following applies acc. to EC/EN 60947-3: *These devices are intended for power distribution systems that may require the switching and/or disconnection of individual outer conductors. They should not be used for switching the primary circuits of three-phase equipment.*

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards			**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**								
Type			**3NJ410**	**3NJ412**	**3NJ413**	**3NJ414**	**3NJ56**	**3NJ415**	**3NJ418**	**3NJ416**	**3NJ417**
Conventional thermal current											
Free-air with gG fuses, I_{th}		A	160	250	400	630	1250	630	800	1260	1600
Free-air with isolating blade, I_{th}		A	--	--	--	800	--	1000	1250	1600	2000
Free-air with gTr fuses, I_{th}		A	--	--	--	--	1154	722	910	1154	1444
Rated apparent power of the transformer, S_n		kVA	--	--	--	--	800	500	630	800	1000
For fuse links and isolating blades		Size	00	1	2	3	4a	3	3	2 x 3	2 x 3
gG according to IEC 60269, I_n		A	160	250	400	630	1250	630	800	2 x 630	2 x 800
Free-air with isolating blade, I_n		A	--	--	--	--	--	1000	1250	2 x 800	2 x 1000
gTr according to VDE 0636-2011, I_{rat}		A	--	--	--	--	1154	722	909	2 x 577	2 x 722
gTr according to VDE 0636-2011, S_n		kVA	--	--	--	--	800	500	630	2 x 400	2 x 500
Rated operational voltage U_e At 40 Hz ... 60 Hz AC		V	690	690	690	690	690	690	400	690	400
Rated insulation voltage U_i		V	800	1000	1000	1000	1000	1000	690	1000	690
Rated impulse withstand voltage U_{imp}		kV	8	12	12	12	12	12	8	12	8
Rated conditional short-circuit current with fuses, at 500 V AC											
With gG fuse (rms value)		kA	80/120	120	120	120	80	120	50	80	50
With gTr fuse (rms value)		kA	--	--	--	--	--	--	50	--	--
Max. permissible power loss per fuse link		W	12	32	45	48	110	51	61	48	51
Rated short-time withstand current I_{cw} rms value		kA	--	14.5	14.5	14.5	35	14.5	14.5	25	25
Rated making and breaking capacity											
Rated operational current I_e for gG fuses											
At AC-21B	400 V AC	A	160	250	400	630	1250	630	800	2 x 630	2 x 800
AC-22B	400 V AC	A	160	250	400	630	1250	630	800	2 x 630	2 x 800
AC-23B	400 V AC	A	--	250	400	--	--	--	--	--	--
AC-21B	500 V AC	A	160	250	400	630	1250	--	--	--	--
AC-22B	500 V AC	A	160	250	400	630	1250	--	--	--	--
AC-23B	500 V AC	A	--	--	--	--	--	--	--	--	--
AC-21B	690 V AC	A	100	250	400	630	1250	--	--	--	--
AC-22B	690 V AC	A	100	250	--	--	--	--	--	--	--
AC-23B	690 V AC	A	--	--	--	--	--	--	--	--	--
Rated operational current I_e for gTr fuses											
At AC-22B	400 V AC	A	--	--	--	--	--	722	910	2 x 577	2 x 722
Rated operational current I_e for isolating blades											
At AC-22B	400 V AC	A	--	--	--	--	--	1000	1250	2 x 800	2 x 1000
Capacitive switching capacity		kvar	--	105 ... 115	155 ... 185	250 ... 300	--	--	--	--	--
Permissible ambient temperature		°C	-25 ... +55, > 35 °C with derating factors								
Mechanical endurance, operating cycles			1400	1400	800	800	500	800	500	500	500
Electrical endurance, operating cycles			200	200	200	200	100	100	100	100	100
Degree of protection											
With closed fuse carrier, with terminal cover and peripheral cover			IP30	IP30	IP30	IP30	IP10	IP30	IP30	IP30	IP30
With open fuse carrier			IP10	IP10	IP10	IP10	IP00	IP10	IP10	IP10	IP10
Power loss of the main conducting paths at I_{th}		W	18	23	54	115	190	275	155	350	375
Main conductor connections											
Terminal screws			M8	M10	M12	M12	M16	2 × M12	2 × M12	3 × M12	4 × M12
Flat bars		mm	20	30	30	30	80	80 x 10	80 x 10	--	--
Cable lug, max. conductor cross-section (stranded)		mm^2	95	240	240	240	2 × 300	2 × 300	2 × 300	3 × 300 4 x 185	4 × 300 4 x 185
Tightening torque		Nm	12 ... 15	30 ... 35	35 ... 40	35 ... 40	50 ... 60	35 ... 40	35 ... 40	35 ... 40	35 ... 40
Clamp/V terminals		mm^2	1.5 ... 70	25 ... 300	25 ... 300	25 ... 300	--	--	--	--	--
Fixing screws			M8	M12	M12	M12	M16	M12	M12	M12	M12
Required tightening torque for mounting on busbars		Nm	16 ... 18	35 ... 40	35 ... 40	35 ... 40	50 ... 60	35 ... 40	35 ... 40	35 ... 40	35 ... 40

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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1-pole switchable

Selection and ordering data

	Rated operational current I_e	For fuse links acc. to IEC 60269-1	Busbar center-to-center spacing	Connection type (terminal screws/ clamp-type terminals included in the scope of supply)[1], optionally top or bottom (rotatable!)	For conductor material	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	Size	mm			d					
In-line fuse switch disconnectors, 1-pole switchable											
	160	00 and 000	185[2]	M8 flat connector	Cu/Al[3]		**3NJ4101-3BF01**		1	1 unit	1DL
	250	1	185	M10 flat connector	Cu/Al[3]		**3NJ4121-3BF01**		1	1 unit	1DL
	400	2 and 1	185	M12 flat connector	Cu/Al[3]		**3NJ4131-3BF01**		1	1 unit	1DL
	630	3 and 2	185	M12 flat connector	Cu/Al[3]		**3NJ4141-3BF01**		1	1 unit	1DL
	1250	4a	185	M16 × 60 stud terminal	Cu/Al[3]		**3NJ5643-0BB00**		1	1 unit	1DL

3NJ4101-3BF01



3NJ4121-3BF01

In-line fuse switch disconnectors, 1-pole switchable, for integratable current transformers											
	250	1	185	M10 flat connector	Cu/Al[3]		**3NJ4121-3BF11**		1	1 unit	1DL
	400	2 and 1	185	M12 flat connector	Cu/Al[3]		**3NJ4131-3BF11**		1	1 unit	1DL
	630	3 and 2	185	M12 flat connector	Cu/Al[3]		**3NJ4141-3BF11**		1	1 unit	1DL

3NJ4121-3BF11

[1] Fixing screws for mounting on busbars must be ordered separately.

[2] A 3NJ5930-3BB adapter is needed to compensate the height for joint fitting with device sizes NH1 to 3.

[3] Cu/Al when using suitable cable lugs or terminals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Rated operational current I_e	For fuse links acc. to IEC 60269-1	Busbar center-to-center spacing	Connection type (terminal screws/ clamp-type terminals included in the scope of supply)[1] optionally top or bottom (rotatable!)	For conductor material	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	Size	mm			d					
In-line fuse switch disconnectors, 3-pole switchable											
 Left: 3NJ4103-3BF01 Right: 3NJ4123-3BF01	160	00 and 000	100	M8 flat connector	Cu/Al[2]		**3NJ4103-3BF02**		1	1 unit	1DL
				F70 box terminal	Cu		**3NJ4103-3BR02**		1	1 unit	1DL
	160	00 and 000	185[3]	M8 flat connector	Cu/Al[2]		**3NJ4103-3BF01**		1	1 unit	1DL
	250	1	185	M10 flat connector	Cu/Al[2]		**3NJ4123-3BF01**		1	1 unit	1DL
				M12 stud terminal	Cu/Al[2]		**3NJ4123-3BJ01**		1	1 unit	1DL
				V terminal	Cu/Al[2]		**3NJ4123-3BT01**		1	1 unit	1DL
	400	2 and 1	185	M12 flat connector	Cu/Al[2]		**3NJ4133-3BF01**		1	1 unit	1DL
				M12 stud terminal	Cu/Al[2]		**3NJ4133-3BJ01**		1	1 unit	1DL
				V terminal	Cu/Al[2]		**3NJ4133-3BT01**		1	1 unit	1DL
	630	3 and 2	185	M12 flat connector	Cu/Al[2]		**3NJ4143-3BF01**		1	1 unit	1DL
				M12 stud terminal	Cu/Al[2]		**3NJ4143-3BJ01**		1	1 unit	1DL
				V terminal	Cu/Al[2]		**3NJ4143-3BT01**		1	1 unit	1DL
In-line fuse switch disconnectors, 3-pole switchable, with electronic fuse monitoring (EFM)											
 3NJ41.3-3CF..	160	00 and 000	100	M8 flat connector	Cu/Al[2]		**3NJ4103-3CF02**		1	1 unit	1DL
	250	1	185	M10 flat connector	Cu/Al[2]		**3NJ4123-3CF01**		1	1 unit	1DL
	400	2 and 1	185	M12 flat connector	Cu/Al[2]		**3NJ4133-3CF01**		1	1 unit	1DL
	630	3 and 2	185	M12 flat connector	Cu/Al[2]		**3NJ4143-3CF01**		1	1 unit	1DL
In-line fuse switch disconnectors, 3-pole switchable, for integratable current transformers											
	160	00 and 000	100	M8 flat connector	Cu/Al[2]		**3NJ4103-3BF12**		1	1 unit	1DL
	250	1	185	M10 flat connector	Cu/Al[2]		**3NJ4123-3BF11**		1	1 unit	1DL
	400	2 and 1	185	M12 flat connector	Cu/Al[2]		**3NJ4133-3BF11**		1	1 unit	1DL
	630	3 and 2	185	M12 flat connector	Cu/Al[2]		**3NJ4143-3BF11**		1	1 unit	1DL
In-line fuse switch disconnectors, 3-pole switchable, for integratable current transformers, with electronic fuse monitoring (EFM)											
	160	00 and 000	100	M8 flat connector	Cu/Al[2]		**3NJ4103-3CF12**		1	1 unit	1DL
	250	1	185	M10 flat connector	Cu/Al[2]		**3NJ4123-3CF11**		1	1 unit	1DL
	400	2 and 1	185	M12 flat connector	Cu/Al[2]		**3NJ4133-3CF11**		1	1 unit	1DL
	630	3 and 2	185	M12 flat connector	Cu/Al[2]		**3NJ4143-3CF11**		1	1 unit	1DL

	Transformer apparent power	Rated apparent power of the gTr fuses	Busbar center-to-center spacing	Rated current of gTr fuses	Rated operational current I_e with disconnecting blades 3NJ4914-8BA00		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	kVA	kVA	mm	A	A		d					
In-line fuse switch disconnectors, 3-pole switchable, for secondary-side fusing of transformers and incoming block												
 3NJ4163-3BF01	500	500	185	722	1000	Cu/Al[2]		**3NJ4153-3BF01**		1	1 unit	1DL
	630	630	185	909	1250	Cu/Al[2]		**3NJ4183-3BF01**		1	1 unit	1DL
	800	2 x 400	185	2 x 577	1600	Cu/Al[2]		**3NJ4163-3BF01**		1	1 unit	1DL
	1000	2 x 500	185	2 x 722	2000	Cu/Al[2]		**3NJ4173-3BF01**		1	1 unit	1DL

[1] Fixing screws for mounting on busbars must be ordered separately.

[2] Cu/Al when using suitable cable lugs or terminals.

[3] A 3NJ5930-3BB adapter is needed to compensate the height for joint fitting with device sizes NH1 to 3.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	For in-line fuse switch disconnectors or dimensions	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Covers							
 3NJ4912-1FA01	Size 00, additional touch protection when using cable lugs and as spacer • 100 mm for bottom	3NJ4101-3BF01, 3NJ4103-3BF01		**3NJ4912-1FA01**		1	1 unit	1DL
 3NJ4912-1FA00	Size 00, additional touch protection when using cable lugs and as spacer • 132 mm for top	3NJ4101-3BF01, 3NJ4103-3BF01		**3NJ4912-1FA00**		1	1 unit	1DL
 3NJ4912-1AA01	**Covers**[1] Sizes 1 to 3 Additional touch protection with use of cable lugs or connection from above	3NJ412 to 3NJ414, 3NJ415, 3NJ418		**3NJ4912-1AA01**		1	1 unit	1DL
 3NJ4912-1EA00	**Covers** Size 3 For double in-line disconnectors	3NJ414		**3NJ4912-1EA00**		1	1 unit	1DL
 3NJ4912-1DA02	**Covers** Size 00 (can also be used as spacer) Top and bottom To cover long cable lugs and compensate for combination of 3NJ4103 with terminals 3NJ412 to 3NJ414 (1 set = 2 units: short and long[2])	3NJ4103-3BF02		**3NJ4912-1DA02**		1	1 unit	1DL
 3NJ4912-2AA00	**Blanking covers** For panel cutout 633 mm long	50 mm wide		**3NJ4912-2AA00**		1	1 unit	1DL
 3NJ4912-2BA00	For panel cutout 633 mm long	100 mm wide		**3NJ4912-2BA00**		1	1 unit	1DL
 3NJ4912-2CA00	For panel cutout 299 mm long	50 mm wide		**3NJ4912-2CA00**		1	1 unit	1DL

[1] With cable lugs and connection from above, the terminal cover can be extended by connecting two units together.

[2] Can be shortened (in exchange for short cover, included in the scope of supply of the in-line disconnector).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For in-line fuse switch disconnectors or dimensions	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
3NJ4912-2DA00	**Lateral masking frame supports** For NH00 ... NH3, 3 clips with T profile	Length 665 mm		**3NJ4912-2DA00**		1	2 units	1DL
 3NJ4918-0AA00	**Fixing clips** 2 units per side, for fixing the cover of the control panel front (1 set = 4 units, including fixing accessories)	3NJ41		**3NJ4918-0AA00**		1	1 unit	1DL
 ① ② ③	**Unequipped section covers for busbars** To be fitted directly in the drilled holes of the busbars							
	① Busbar center-to-center spacing 185 mm	50 mm wide		**3NJ4912-3AA00**		1	1 unit	1DL
	② Busbar center-to-center spacing 185 mm	100 mm wide		**3NJ4912-3BA01**		1	1 unit	1DL
	③ Busbar center-to-center spacing 100 mm	50 mm wide		**3NJ4912-3CA00**		1	1 unit	1DL
	Also for covering a blank space on 3NJ4918-0DA02 or 3NJ5930-3BB							
 3NJ4918-0DA02	**Adapters for screw fixing on busbar systems**							
	• For fitting two 100 mm fuse switch disconnectors onto the busbar system with 185 mm center-to-center spacing, including adaptation to sizes 1 to 3	3NJ4103-3BF02, 3NJ4103-3BR02, 3NJ4103-3CF02, 3NJ4103-3BF12, 3NJ4103-3CF12		**3NJ4918-0DA02**		1	1 unit	1DL
	• For fitting two 185 mm fuse switch disconnectors onto the busbar system with 185 mm center-to-center spacing, including adaptation to sizes 1 to 3	3NJ4103-3BF01, 3NJ4101-3BF01		**3NJ5930-3BB**		1	1 unit	1DL
	• For fitting two 100 mm fuse switch disconnectors onto the busbar system with 185 mm center-to-center spacing and **busbar terminal** , including adaptation to sizes 1 to 3	3NJ4103-3BF02 3NJ4103-3BR02 3NJ4103-3CF02 3NJ4103-3BF12 3NJ4103-3CF12		**3NJ4918-0DB02**		1	1 unit	1DL
 3NJ4918-0EA00	• For fitting one fuse switch disconnector (= 3 separate brackets) onto the busbar system with 60 mm center-to-center spacing	3NJ4103-3BF02, 3NJ4103-3BR02, 3NJ4103-3CF02, 3NJ4103-3BF12, 3NJ4103-3CF12		**3NJ4918-0EA00**		1	1 unit	1DL
	Fixing screws For fitting 3NJ4103 switch disconnectors with integratable current transformers onto adapters (1 set = 3 units)	3NJ4103		**3NJ4918-0DC02**		1	1 unit	1DL

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Accessories

	Version	For in-line fuse switch disconnectors or dimensions	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3NJ5974-0AB	**Busbar supports** For 100 mm and 185 mm center-to-center spacing, for screwing on of busbars	3NJ41 and 3NJ5		**3NJ5974-0AB**		1	1 unit	1DL
 3NJ4910-1AA00	**Grounding kit with connecting cable 25 mm²**	3NJ414 to 3NJ418		**3NJ4910-1AA00**		1	1 unit	1DL
 3NJ4911-3AA00	**Busbar terminals** For each fuse switch disconnector, 3 units are required; Not for devices with transformer installation	3NJ4103 3NJ4101		**3NJ4911-3AA00**		1	1 unit	1DL
 3NJ4911-3BA01	For rapid mounting of the switch disconnectors onto the busbars (1 set = 3 units) Not for devices with transformer installation	3NJ412 to 3NJ414		**3NJ4911-3BA01**		1	1 unit	1DL
 3NJ4911-4AA00	**Saddle terminals** Cu connector 1.5 ... 70 mm² (1 set = 3 units)	3NJ4103		**3NJ4911-4AA00**		1	1 unit	1DL
 3NJ4911-1AA00	**Prism terminal assembly kits** Al/Cu connector 10 ... 70 mm² (1 set = 3 units)	3NJ4103 3NJ4101		**3NJ4911-1AA00**		1	1 unit	1DL
 3NJ4911-2BQ00	**Box terminal assembly kits** Al/Cu connector 95 ... 240 mm² (for connection to version with flat connector) (1 set = 3 units)	3NJ412 to 3NJ414		**3NJ4911-2BQ00**		1	1 unit	1DL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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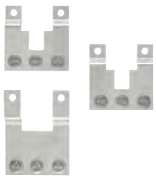
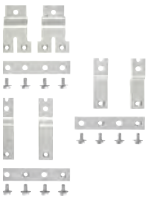
	Version	For in-line fuse switch disconnectors or dimensions	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Busbar connection assembly kits for NH 1, 2, 3 With flat connector							
 3NJ4911-5AA00	2 x 240 mm^2 With M12 screws	3NJ412 to 3NJ414		**3NJ4911-5AA00**		1	1 unit	1DL
 3NJ4911-5BA00	2 x 300 mm^2 / 3x 120 mm^2 With M12 screws	3NJ412 to 3NJ414		**3NJ4911-5BA00**		1	1 unit	1DL
 3NJ4911-5CA00	1 x 400 mm^2 With M16 screws	3NJ412 to 3NJ414		**3NJ4911-5CA00**		1	1 unit	1DL
 3NJ4911-6AA00	**Busbar connection assembly kits for NH3 as double in-line disconnectors** 3 x 300 mm^2 / 4 x 185 mm^2	3NJ413, 3NJ414		**3NJ4911-6AA00**		1	1 unit	1DL
 3NJ4911-6BA00	Mechanical coupling of operating handles, required in addition for coupling two switch disconnectors	3NJ413 3NJ414		**3NJ4911-6CA00**		1	1 unit	1DL
 3NJ4911-6BA00	**Busbar connection assembly kits for NH3 as double in-line disconnectors** 4 x 240 mm^2	3NJ413, 3NJ414		**3NJ4911-6BA00**		1	1 unit	1DL
 3NJ4911-6BA00	Mechanical coupling of operating handles, required in addition for coupling two switch disconnectors	3NJ413 3NJ414		**3NJ4911-6CA00**		1	1 unit	1DL
 3NJ4913-6AA02	**Auxiliary switch mounting kit** For sizes 00 to 3 with connecting cables, 1 CO contact, for 3-pole switchable switch disconnectors only	3NJ41		**3NJ4913-1AA01**		1	1 unit	1DL
	Fuse 630 kVA 909 A **Size NH 3** Specially for the protection of transformers (minimum order quantity 3 units)	3NJ418		**3NJ4914-8AA00**		1	3 units	1DL

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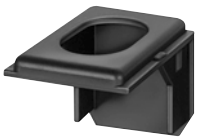
Accessories

	Version	For in-line fuse switch disconnectors or dimensions	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 3NJ4914-8BA00	**Isolating blades** Size NH3, 1250 A	3NJ4153, 3NJ4163, 3NJ4173, 3NJ4183		**3NJ4914-8BA00**		1	1 unit	1DL
 3NJ4918-1AA00	**Mounting hooks** (one per in-line disconnector required)	3NJ4121 to 3NJ4143		**3NJ4918-1AA00**		1	1 unit	1DL
 3NJ4915-1BA00	**Distance compensation**	3NJ4103		**3NJ4915-1BA00**		1	1 unit	1DL
 3NJ4915-2BA00	Distance compensation for fuse switch disconnectors with integratable current transformers if no current transformer is built in.	3NJ412 to 3NJ414		**3NJ4915-2BA00**		1	1 unit	1DL
 3NJ4915-1CA00	**Terminal strips**	3NJ4103		**3NJ4915-1CA00**		1	1 unit	1DL
 3NJ4915-2CA00		3NJ412 to 3NJ414		**3NJ4915-2CA00**		1	1 unit	1DL
 3NJ4915-1FB20	**Current transformers .../1 A**							
	100/1 A, Cl. 0.5, 1.5 VA	3NJ4103		**3NJ4915-1EA10**		1	1 unit	1DL
	100/1 A, Cl. 1, 2.0 VA	3NJ4103		**3NJ4915-1EA20**		1	1 unit	1DL
	150/1 A, Cl. 0.5, 2.5 VA	3NJ4103		**3NJ4915-1FA10**		1	1 unit	1DL
	150/1 A, Cl. 0.5 calibrated, 2.5 VA	3NJ4103		**3NJ4915-1FA11**		1	1 unit	1DL
	150/1 A, Cl. 1, 3.0 VA	3NJ4103		**3NJ4915-1FA20**		1	1 unit	1DL
	75/1 A, Cl. 1, 1.5 VA	3NJ412 to 3NJ414		**3NJ4915-2DA20**		1	1 unit	1DL
	100/1 A, Cl. 0.5, 1.5 VA	3NJ412 to 3NJ414		**3NJ4915-2EA10**		1	1 unit	1DL
	100/1 A, Cl. 1, 2.0 VA	3NJ412 to 3NJ414		**3NJ4915-2EA20**		1	1 unit	1DL
	150/1 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2FA10**		1	1 unit	1DL
	150/1 A, Cl. 1, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2FA20**		1	1 unit	1DL
	250/1 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2GA10**		1	1 unit	1DL
	250/1 A, Cl. 0.5 calibrated, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2GA11**		1	1 unit	1DL
	250/1 A, Cl. 1, 5.0 VA	3NJ412 to 3NJ414		**3NJ4915-2GA20**		1	1 unit	1DL
 3NJ4915-2HA20	400/1 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2HA10**		1	1 unit	1DL
	400/1 A, Cl. 0.5 calibrated, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2HA11**		1	1 unit	1DL
	400/1 A, Cl. 1, 5.0 VA	3NJ412 to 3NJ414		**3NJ4915-2HA20**		1	1 unit	1DL
	500/1 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2JA10**		1	1 unit	1DL
	500/1 A, Cl. 1, 5.0 VA	3NJ412 to 3NJ414		**3NJ4915-2JA20**		1	1 unit	1DL
	600/1 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2KA10**		1	1 unit	1DL
	600/1 A, Cl. 0.5 calibrated, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2KA11**		1	1 unit	1DL
	600/1 A, Cl. 1, 5.0 VA	3NJ412 to 3NJ414		**3NJ4915-2KA20**		1	1 unit	1DL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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3NJ4915-1FB20



3NJ4915-2HB20

Version	For in-line fuse switch disconnectors or dimensions	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Current transformers .../5 A							
100/5 A, Cl. 0.5, 1.0 VA	3NJ4103		**3NJ4915-1EB10**		1	1 unit	1DL
100/5 A, Cl. 1, 1.5 VA	3NJ4103		**3NJ4915-1EB20**		1	1 unit	1DL
150/5 A, Cl. 0.5, 1.5 VA	3NJ4103		**3NJ4915-1FB10**		1	1 unit	1DL
150/5 A, Cl. 0.5 calibrated, 1.5 VA	3NJ4103		**3NJ4915-1FB11**		1	1 unit	1DL
150/5 A, Cl. 1, 2.5 VA	3NJ4103		**3NJ4915-1FB20**		1	1 unit	1DL
75/5 A, Cl. 1, 1.5 VA	3NJ412 to 3NJ414		**3NJ4915-2DB20**		1	1 unit	1DL
100/5 A, Cl. 0.5, 1.0 VA	3NJ412 to 3NJ414		**3NJ4915-2EB10**		1	1 unit	1DL
100/5 A, Cl. 1, 2.0 VA	3NJ412 to 3NJ414		**3NJ4915-2EB20**		1	1 unit	1DL
150/5 A, Cl. 0.5, 1.5 VA	3NJ412 to 3NJ414		**3NJ4915-2FB10**		1	1 unit	1DL
150/5 A, Cl. 1, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2FB20**		1	1 unit	1DL
250/5 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2GB10**		1	1 unit	1DL
250/5 A, Cl. 0.5 calibrated, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2GB11**		1	1 unit	1DL
250/5 A, Cl. 1, 3.75 VA	3NJ412 to 3NJ414		**3NJ4915-2GB20**		1	1 unit	1DL
400/5 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2HB10**		1	1 unit	1DL
400/5 A, Cl. 0.5 calibrated, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2HB11**		1	1 unit	1DL
400/5 A, Cl. 1, 5.0 VA	3NJ412 to 3NJ414		**3NJ4915-2HB20**		1	1 unit	1DL
500/5 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2JB10**		1	1 unit	1DL
500/5 A, Cl. 1, 5.0 VA	3NJ412 to 3NJ414		**3NJ4915-2JB20**		1	1 unit	1DL
600/5 A, Cl. 0.5, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2KB10**		1	1 unit	1DL
600/5 A, Cl. 0.5 calibrated, 2.5 VA	3NJ412 to 3NJ414		**3NJ4915-2KB11**		1	1 unit	1DL
600/5 A, Cl. 1, 5.0 VA	3NJ412 to 3NJ414		**3NJ4915-2KB20**		1	1 unit	1DL

Note

The current transformers can also be used with the 7KM PAC measuring devices, see chapter "Measuring Devices and Power Monitoring".

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Notes

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3LD2 load transfer switches up to 250 A

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3KC transfer switching equipment up to 3200 A NEW

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For further technical product information:

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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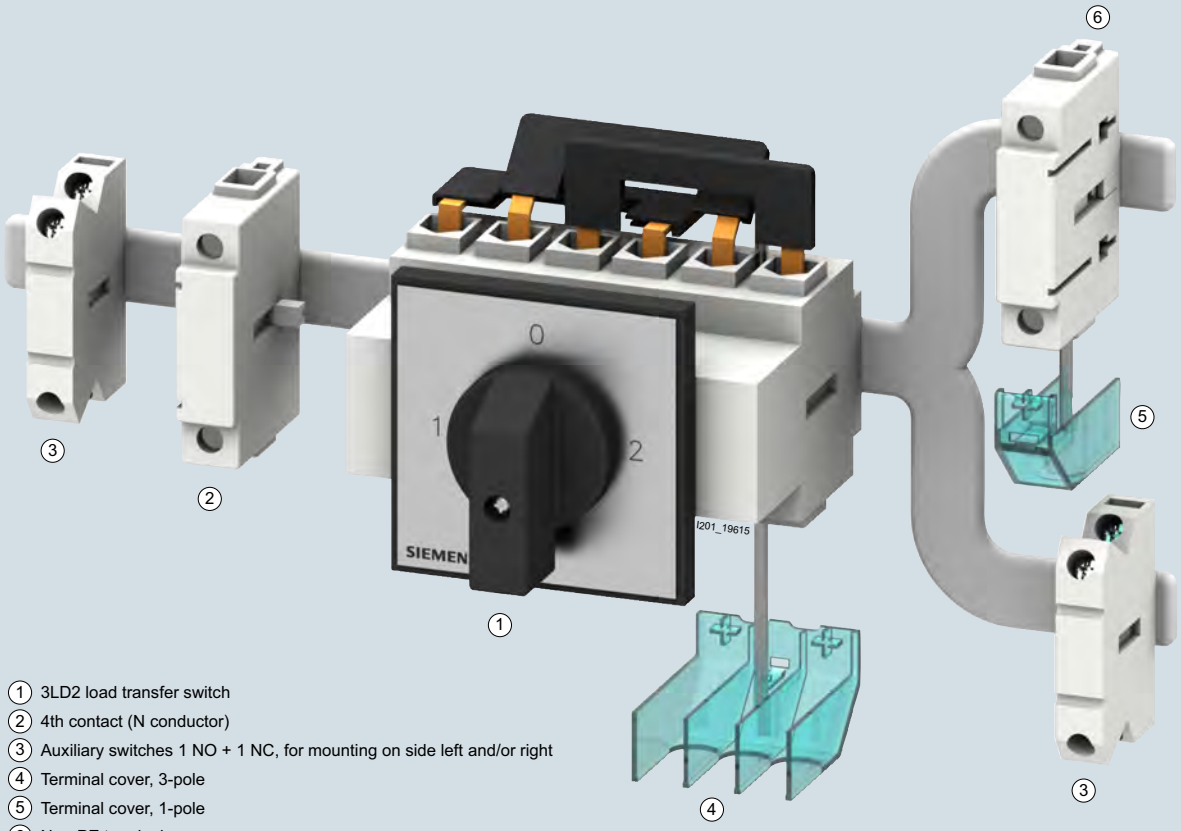
Overview



1. 3LD2 load transfer switch
2. 4th contact (N conductor)
3. Auxiliary switches 1 NO + 1 NC, for mounting on side left and/or right
4. Terminal cover, 3-pole
5. Terminal cover, 1-pole
6. N or PE terminal

The 3LD2 load transfer switches are based on the 3LD2 main control and EMERGENCY-STOP switches and are manually operated switch disconnectors according to IEC 60947-3 / VDE 0660 Part 107 (EN 60947-3) and comply with the conditions for switch disconnectors.

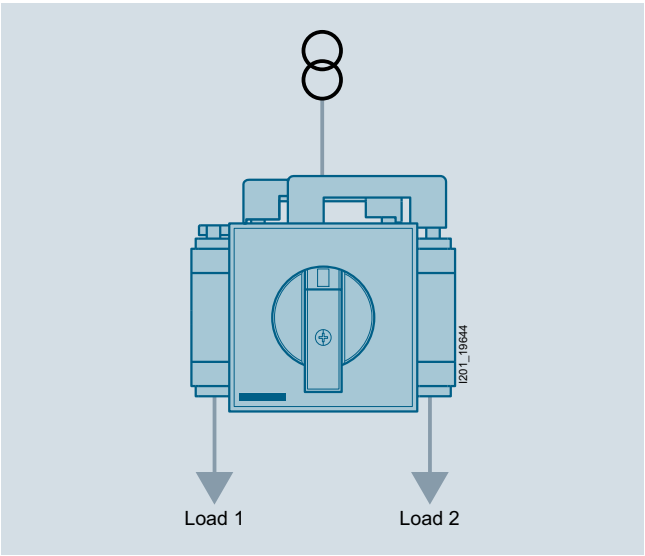
The load transfer switches from 25 to 250 A are approved according to UL 508 and can be used as "manual motor controllers" and "motor disconnects".

In addition, the 3LD load transfer switches have CCC certification.

Application

The 3LD2 load transfer switches are used for alternate switching between two loads with an incoming power supply. They have the switch position I-0-II which means that one of the two loads can be switched on alternately. This means it is possible to switch between two three-phase motors and other loads.

Load transfer (schematic representation)



Load transfer switches (IEC 60947-3)

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards			DIN VDE 0660, IEC 60947					
Switches		Type	**3LD21**	**3LD22**	**3LD25**	**3LD27**	**3LD23**	**3LD24**
Rated insulation voltage U_i		V	690					
Rated operational voltage U_e		V AC	690					
Rated frequency		Hz	50 ... 60					
Rated impulse withstand voltage U_{imp}		kV	6	6	6	6	6	6
Rated short-time withstand current (1 s current, rms value)		A	640	640	1260	2000	4000	4000
Short-circuit protection, max. back-up fuse (gL)		A	25	40	63	100	160	250
Rated conditional short-circuit current with upstream fuses at 690 V AC 50/60 Hz		kArms	50	50	50	50	50	50
Maximum permissible let-through I^2t value		kA^2s	4	9	21	64	185	557
Permissible let-through current of the fuse		kA	3.5	4.5	6	10	15	15
Rated uninterrupted current I_u		A	25	32	63	100	160	250
AC-21A load-break switch	Rated operational current I_e	A	25	32	63	100	160	250
AC-3 motor load switch	Rating							
In-service switching	At 220 ... 240 V	kW	4.0	5.5	11.0	18.5	35.0	55.0
of individual motors	At 380 ... 440 V	kW	7.5	9.5	18.5	30.0	50.0	110.0
	At 660/690 V	kW	7.5	9.5	15.0	22.0	37.0	45.0
AC-23A main control switch	Rating							
Repair switch	At 220 ... 240 V	kW	5.0	6.0	11.0	18.5	45.0	75.0
Frequent, but not in-service switching	At 380 ... 440 V	kW	9.5	11.5	22.0	37.0	75.0	132.0
of individual motors	At 660/690 V	kW	9.5	11.5	18.5	30.0	45.0	55.0
Power loss per conducting path at I_e		W	1.1	1.8	4.5	7.5	36.0	36.0
Endurance mechanical	Operating cycles		100 000					
Switching frequency		1/h	50					
Permissible ambient temperature		°C	-25 ... +55					
Isolating features	Up to max.	V	690					
Conductor cross-sections for main conductors [1]								
Solid or stranded		mm^2	1.5 ... 16	1.5 ... 16	2.5 ... 35	4 ... 50	16 ...185	16 ... 185
Finely stranded with end sleeve (max.)		mm^2	10	10	16	35	150	150
Conductor cross-sections	Copper cable	AWG	14 ... 8	14 ... 8	14 ... 6	12 ... 1		
Torque for terminal		Nm	2 ... 2.5	2 ... 2.5	2.5 ... 3	2.5 ... 3	9.5 ... 10	9.5 ... 10
Touch protection according to EN 50274			Yes					
Auxiliary switches								
Rated insulation voltage U_i		V	500					
Rated operational voltage U_e		V AC	500					
Rated uninterrupted current I_u		A	10					
Rated operational current I_e, AC-15	At 120 V	A	6					
	At 220 ... 240 V	A	3					
	At 380 ... 415 V	A	1.8					
	At 500 V	A	1.4					
Short-circuit protection, aux. switch, max. back-up fuse (gL/gG)		A	10					
Conductor cross-sections for auxiliary conductors								
Connection type			Screw terminals					
Solid or stranded		mm^2	2 × (0.75 ... 2.5), 1 × 4					
Finely stranded with end sleeve		mm^2	2 × (0.75 ... 1.5), 1 x 2.5					
Torque for terminal		Nm	0.8					

[1] Depending on the cable infeed, only small cross-sections are possible with devices in molded-plastic enclosures.

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Technical features

3LD switches for UL/CSA as "manual motor controllers" [1]

Standards			UL/CSA					
Switches		Type	**3LD21**	**3LD22**	**3LD25**	**3LD27**	**3LD23**	**3LD24**
Rated operational voltage U_e		V AC	600	600	600	600	600	600
Rated uninterrupted current I_u		A	20	30	60	100	160	250
	Current rating		A 600	A 600	--	--	--	--
	Pilot duty		P 600	P 600	--	--	--	--
Conventional thermal current I_{th}		A	25	32	63	100	160	250
Maximum rated power (AC-3)	3 ~ 120 V	HP	3	3	5	10	--	--
Alternating current motors 40 ... 60 Hz	240 V	HP	7.5	10 (7.5)[2]	15	30	40	50
(HP = PS)	480 V	HP	10	20 (15)[2]	40	60	75	100
	600 V	HP	15	30 (20)[2]	50	75	75	75
	1 ~ 120 V	HP	2	2	3	--	--	--
	240 V	HP	3	3	10	--	--	--
Conductor cross-sections	Cu cable	AWG	14 ... 8	14 ... 8	14 ... 6	12 ... 1	1 ... MCM400	
Torque		Nm	2 ... 2.5	2 ... 2.5	2.5 ... 3	2.5 ... 3	10	

[1] The 3LD switches for UL/CSA are approved in accordance with UL/CSA as "manual motor controllers", and they can be used as repair switches in the molded-plastic enclosure, for example. However, they do not have UL approval as main control switches.

[2] Values in brackets apply to devices in molded-plastic enclosure.

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Number and version of the contacts		Rated data at 50 ... 60 Hz, 380 ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Main contact elements	Aux. cont. elements	P/AC-3	P/AC-23A	I_u						
			kW	kW	A	d					
	Transfer switches with direct operating mechanism (knob-operated mechanism) • Black actuator • Knob-operated mechanism: - on 3LD23, 3LD24 lockable with up to 3 padlocks, shackle diameter from 4 to 6 mm - on all other versions non-lockable • Degree of protection at front side IP65 • Bridging bars already pre-mounted										
Four-hole mounting											
 3LD2123-7UK01	3	--	7.5	9.5	25		**3LD2123-7UK01**		1	1 unit	1CL
			9.5	11.5	32		**3LD2223-7UK01**		1	1 unit	1CL
			18.5	22.0	63		**3LD2524-7UK01**		1	1 unit	1CL
			30.0	37.0	100		**3LD2724-7UK01**		1	1 unit	1CL
			50	75	160		**3LD2305-7UK01**		1	1 unit	1CL
			110	132	250		**3LD2405-7UK01**		1	1 unit	1CL
 3LD2405-7UL01	3 + N	--	50	75	160		**3LD2305-7UL01**		1	1 unit	1CL
			110	132	250		**3LD2405-7UL01**		1	1 unit	1CL

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Floor mounting

Selection and ordering data

Number and version of the contacts		Rated data at 50 Hz ... 60 Hz, 380 V ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Aux. cont. elements	P/AC-3	P/AC-23A	I_u						
		kW	kW	A	d					
Transfer switches with door-coupling rotary operating mechanism • Lockable in 0 position with up to 3 padlocks, shackle diameter from 4 to 6 mm • Handle and cover black • Door-coupling rotary operating mechanism as selector switch • Degree of protection at front side IP65 • Bridging bars already pre-mounted											
Four-hole mounting										
3		50	75	160		**3LD2318-7UK01**		1	1 unit	1CL
		110	132	250		**3LD2418-7UK01**		1	1 unit	1CL
3 + N		50	75	160		**3LD2318-7UL01**		1	1 unit	1CL
		110	132	250		**3LD2418-7UL01**		1	1 unit	1CL



3LD2318-7UK01

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Selection and ordering data

Number and version of the contacts		Base terminal	Rated data at 50 ... 60 Hz, 380 ... 440 V			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Main contact elements	Aux. contact elements		P/AC-3	P/AC-23A	I_u						
			kW	kW	A	d					
Transfer switches with direct operating mechanism (knob-operated mechanism) • With N and PE base terminal • Black actuator • Lockable in 0 position with up to 3 padlocks, shackle diameter from 4 to 6 mm (for 25 A and 32 A) • Metric screw connection • Degree of protection IP65 • Bridging bars already pre-mounted											
3	--	PE + N	7.5	9.5	25		**3LD2165-7UB01**		1	1 unit	1CL
		PE + N	9.5	11.5	32		**3LD2265-7UB01**		1	1 unit	1CL
		PE + N	18.5	22.0	63		**3LD2566-7UB01**		1	1 unit	1CL
		PE + N	30.0	37.0	100		**3LD2766-7UB01**		1	1 unit	1CL



3LD2165-7UB01

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Selection and ordering data

Version	SD	3LD21 (25 A) and 3LD22 (32 A)		PU (UNIT, SET, M)	PS	PG
	d	Article No. www.siemens.com/product?Article No.	Price per PU			
For front mounting						
 3LD9220-0B (left) 3LD9220-2B (right)						
4th contact (N conductor)		**3LD9220-0B**		1	1 unit	1CL
• Leading switch-on, lagging switch-off						
• Bridging bars for the switchable N pole are not included in the scope of supply						
N or PE terminals Through-type		**3LD9220-2B**		1	1 unit	1CL
 3LD9200-5B						
Auxiliary switches						
For mounting on the left and/or right, lagging switch-on, leading switch-off						
• 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
• 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
Terminal covers as additional touch protection						
Can be snapped on at top and bottom						
• 1-pole		**3LD9221-2A**		100	4 units	1CL
• 3-pole		**3LD9221-0A**		1	4 units	1CL
 3LD9221-2A (left) 3LD9221-0A (right)						
For molded-plastic enclosures						
 3LD9220-0C						
4th contact (N conductor)		**3LD9220-0C**		1	1 unit	1CL
• Leading switch-on, lagging switch-off						
• Bridging bars for the switchable N pole are not included in the scope of supply						
N or PE terminals Through-type		**3LD9220-2C**		1	1 unit	1CL
 3LD9200-5C or 3LD9200-5CF (left) 3LD9200-6C (right)						
Auxiliary switches						
For mounting on the left and/or right, lagging switch-on, leading switch-off						
• 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
• 2 NO		**3LD9200-6C**		1	1 unit	1CL
For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
• 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL

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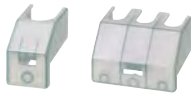
	Version	SD	3LD25 (63 A)		PU (UNIT, SET, M)	PS	PG
		d	Article No. www.siemens.com/product?Article No.	Price per PU			
For front mounting							
 3LD9250-0BA (left) 3LD9250-2BA (right)	**4th contact (N conductor)** • Leading switch-on, lagging switch-off • Bridging bars for the switchable N pole are not included in the scope of supply		**3LD9250-0BA**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9250-2BA**		1	1 unit	1CL
 3LD9200-5B	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
 3LD9251-2A (left) 3LD9251-0A (right)	**Terminal covers as additional touch protection** Can be snapped on at top and bottom						
	• 1-pole		**3LD9251-2A**		100	4 units	1CL
	• 3-pole		**3LD9251-0A**		1	4 units	1CL
For molded-plastic enclosures							
 3LD9250-0CA (left) 3LD9250-2CA (right)	**4th contact (N conductor)** • Leading switch-on, lagging switch-off • Bridging bars for the switchable N pole are not included in the scope of supply		**3LD9250-0CA**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9250-2CA**		1	1 unit	1CL
 3LD9200-5C or 3LD9200-5CF (left) 3LD9200-6C (right)	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
	• 2 NO		**3LD9200-6C**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL

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Accessories

	Version	SD	3LD27 (100 A)		PU (UNIT, SET, M)	PS	PG
		d	Article No. www.siemens.com/product?Article No.	Price per PU			
For front mounting							
 3LD9280-0B (left) 3LD9280-2B (right)	**4th contact (N conductor)** • Leading switch-on, lagging switch-off • Bridging bars for the switchable N pole are not included in the scope of supply		**3LD9280-0B**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9280-2B**		1	1 unit	1CL
 3LD9200-5B or 3LD9200-5BF	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off • 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information • 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
 3LD9281-2A	**Terminal covers as additional touch protection** Can be snapped on at top and bottom • 1-pole (1 pack = 4 units)		**3LD9281-2A**		1	4 units	1CL
For molded-plastic enclosures							
 3LD9280-0C (left) 3LD9280-2C (right)	**4th contact (N conductor)** • Leading switch-on, lagging switch-off • Bridging bars for the switchable N pole are not included in the scope of supply		**3LD9280-0C**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9280-2C**		1	1 unit	1CL
 3LD9200-5C or 3LD9200-5CF (left) 3LD9200-6C (right)	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off • 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
	• 2 NO		**3LD9200-6C**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information • 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL

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	Version	SD	3LD23 (160 A) and 3LD24 (250 A)		PU (UNIT, SET, M)	PS	PG
		d	Article No. www.siemens.com/product?Article No.	Price per PU			
For front mounting							
 3LD9240-0B (left) 3LD9240-2B (right)	**4th contact (N conductor)** Leading switch-on, lagging switch-off		**3LD9240-0B**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9240-2B**		1	1 unit	1CL
 3LD9200-5B or 3LD9200-5BF	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5B**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5BF**		1	1 unit	1CL
For front and floor mounting							
 3LD9241-2A	**Terminal covers as additional touch protection** Can be snapped on at top and bottom						
	• 1-pole		**3LD9241-2A**		1	4 units	1CL
For floor mounting							
 3LD9242-4F	**Shaft coupling** No ON-lock		**3LD9242-4F**		1	5 units	1CL
 3LD9240-0C (left) 3LD9240-2C (right)	**4th contact (N conductor)** Leading switch-on, lagging switch-off		**3LD9240-0C**		1	1 unit	1CL
	N or PE terminals Through-type		**3LD9240-2C**		1	1 unit	1CL
 3LD9200-5C or 3LD9200-5CF (left) 3LD9200-6C (right)	**Auxiliary switches** For mounting on the left and/or right, lagging switch-on, leading switch-off						
	• 1 NO + 1 NC		**3LD9200-5C**		1	1 unit	1CL
	• 2 NO		**3LD9200-6C**		1	1 unit	1CL
	For mounting on the left and/or right, lagging switch-on, leading switch-off, with gold-plated contacts for requesting electronic information						
	• 1 NO + 1 NC		**3LD9200-5CF**		1	1 unit	1CL

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Overview

3KC0 manual transfer switching equipment (MTSE) for 16 to 160 A

Rated current I_n (A)	16	32	63	80	100	125	160



Manual transfer switching equipment (MTSE)							
Size (MTSE type)	**1 (3KC0...-.M)**			**2 (3KC0...-.N)**			
Number of poles							
• 3-pole	✓	✓	✓	✓	✓	✓	✓
• 4-pole	✓	✓	✓	✓	✓	✓	✓
Connection							
• Flat terminals	--	--	--	--	--	--	--
• Box terminals	✓	✓	✓	✓	✓	✓	✓

3KC3/6 transfer switching equipment with motorized operating mechanism for 40 to 160 A (RTSE/ATSE)

Rated current I_n (A)	40	63	80	100	125	160



Remote transfer switching equipment (RTSE)						
RTSE type	**3KC3424**	**3KC3426**	**3KC3428**	**3KC3430**	**3KC3432**	**3KC3434**
Number of poles						
• 3-pole	--	--	--	--	--	--
• 4-pole	✓	✓	✓	✓	✓	✓
Connection						
• Flat terminals	--	--	--	--	--	--
• Box terminals	✓	✓	✓	✓	✓	✓



Automatic transfer switching equipment (ATSE)						
ATSE type	**3KC6424**	**3KC6426**	**3KC6428**	**3KC6430**	**3KC6432**	**3KC6434**
Number of poles						
• 3-pole	--	--	--	--	--	--
• 4-pole	✓	✓	✓	✓	✓	✓
Connection						
• Flat terminals	--	--	--	--	--	--
• Box terminals	✓	✓	✓	✓	✓	✓

✓ Available
-- Not available

Minimum order quantity (PS) or a multiple thereof can be ordered.

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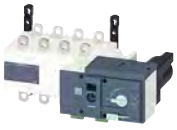
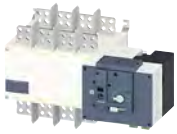
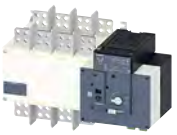
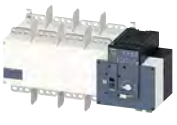
3KC0 manual transfer switching equipment (MTSE) for 200 to 1600 A

200	250	315	400	500	630	800	1000	1250	1600
									
									
3 (3KC0...-.P)				4 (3KC0...-.Q)			5 (3KC0...-.R)		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
--	--	--	--	--	--	--	--	--	--

3KC4/8 transfer switching equipment with motorized operating mechanism for 250 to 3200 A (RTSE/ATSE)

250	400	630	800/1000	1250	1600	2000/2500/3200
						
3KC4.38	3KC4.42	3KC4.46	3KC4.48/50	3KC4.52	3KC4.54	3KC4.56/58/60
✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓
--	--	--	--	--	--	--
						
3KC8.38	3KC8.42	3KC8.46	3KC8.48/50	3KC8.52	3KC8.54	3KC8.56/58/60
✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓
✓	✓	✓	✓	✓	✓	✓
--	--	--	--	--	--	--

✓ Available
-- Not available

Minimum order quantity (PS) or a multiple thereof can be ordered.

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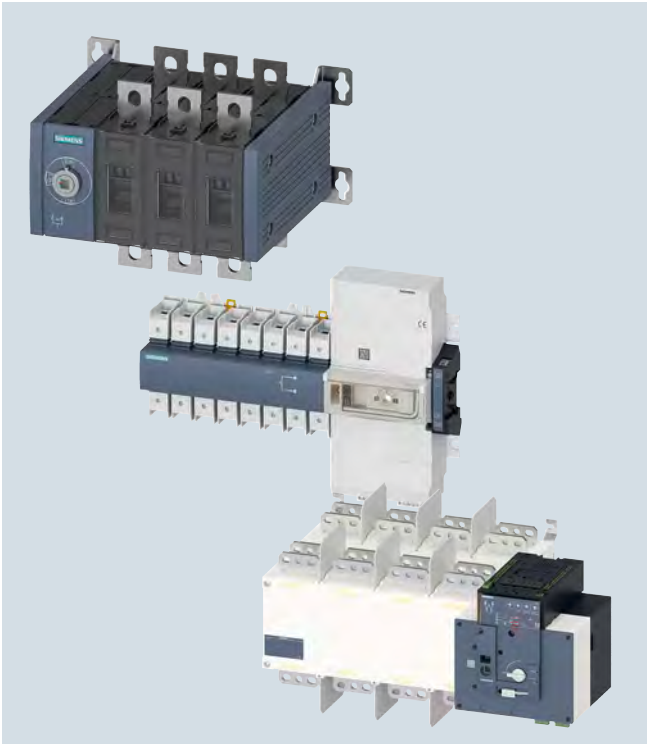
Overview



3KC transfer switching equipment:
top left MTSE up to 1600 A, center RTSE up to 160 A,
bottom right ATSE up to 3200 A

3KC transfer switching equipment of class PC offers a convenient and safe solution for switching over from one supply network to an alternative network in the event of network fluctuations.

Systems are switched over with an interruption of the power supply during the switching operation. Fast transfer switching in the case of the ATSE ensures a short load downtime. Integration of transfer switching and control in one single unit enables the combination of high performance and easy installation.

Features

Common features

- Simple installation
- Conformity with IEC 90947-6-1 and IEC 90947-3

Integrated solution

- Particularly easy installation of a complete solution with an integrated ATSE for the entire 40 ... 3200 A current range

Modular design for the MTSE and the RTSE/ATSE from 250 A and higher

- Controller (electronic module) and motorized operating mechanism can be replaced individually on the RTSE/ATSE
- MTSE can be expanded by an additional pole

Maximum safety

- Maximum safety thanks to electrical and mechanical interlocking of switches (I, II)
- RTSE/ATSE: Supplied as standard with a manual emergency handle to enable fast intervention in an emergency
- Switching position indication
- Shutting off with a padlock in position 0 enables safe maintenance work
- In the case of RTSE/ATSE transfer switches up to 160 A, locking with a padlock can be configured for every position before installation: I, 0 or II
- Ensuring device availability by means of constant monitoring of the device's operating conditions

Easy installation in the case of transfer switches up to 160 A

- Compact design of the ATSE with integrated controller, already wired ready for operation (including power supply)
- Easy access to network connection thanks to an extremely low overall depth
- Fast and easy mounting on a standard mounting rail or a mounting plate
- Easy wiring thanks to box terminals and the bridging bars provided for them, enabling a common outgoing assembly point. Thanks to the bridging bars, the connection capacity of the box terminal is not reduced

High switching capacity

- Closing and opening under load, also for inductive loads (AC-33)
- Resilient to voltage fluctuations in the supply system thanks to stable switch positions. The switching operations are fault-tolerant by a fail-safe power supply that is either integrated in the controller or is connected separately
- High dynamic strength for enhanced safety when switching to a short-circuit
- For RTSE up to 160 A: Extremely low load downtimes (< 90 ms) thanks to electromagnetic operating mechanism

Minimum order quantity (PS) or a multiple thereof can be ordered.

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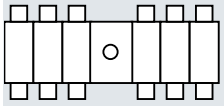
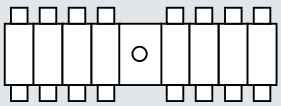
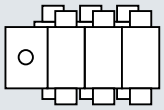
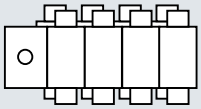
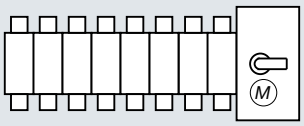
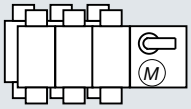
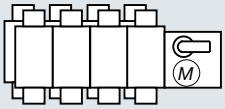
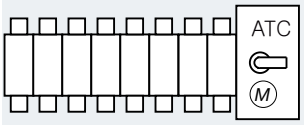
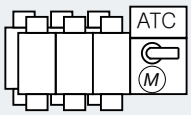
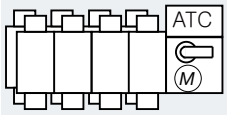
Switch versions

The following versions of the 3KC transfer switching equipment are available:

- Manual transfer switching equipment (MTSE)
- Remote transfer switching equipment (RTSE)
- Automatic transfer switching equipment (ATSE)

Number of poles	3-pole	4-pole	3-pole	4-pole
Rated current	16 ... 160 A		200 ... 1600 A	
MTSE 3KC0				
Rated current	40 ... 160 A		250 ... 3200 A	
RTSE	--	3KC3 	3KC4 	
ATSE	--	3KC6 	3KC8 	

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Benefits

- 3/4-pole version
- Transfer switching equipment up to 3200 A (MTSE up to 1600 A)
- Very short switching time (for transfer switches up to 160 A)
- Compact design in the case of transfer switches up to 160 A
- Switching from network to network and from network to generator for ATSE from 250 A
- No additional software needed for parameterization
- Auto-configuration of voltage and frequency levels
- Watchdog relay ensures operability of the switch
- Direct control of the generator via a control signal for ATSE from 250 A
- Integrated dual power supply for ATSE from 250 A
- Resistant to shock and vibrations
- Additionally fail-safe mechanical interlock
- External display for installation in control cabinet door

Application

Industries

Residential/non-residential:

- Safety devices in high buildings
- Computing centers (banks, insurance companies, etc.)
- Fire pumps, air conditioning systems, cold rooms
- Lighting systems in shopping malls

Industry:

- Production lines in continuous operation
- Engine rooms
- Auxiliary facilities in essentially important thermal power stations
- Pumps
- Cooling systems
- Fans

Infrastructure:

- Installations in ports and loading stations
- Airports
- Lighting

Network configurations

All versions of the 3KC transfer switching equipment can be used for all conventional network configurations, including:

- TT systems
- TN systems
  - TN-C systems
  - TN-C-S systems
  - TN-S systems
- IT systems

Minimum order quantity (PS) or a multiple thereof can be ordered.

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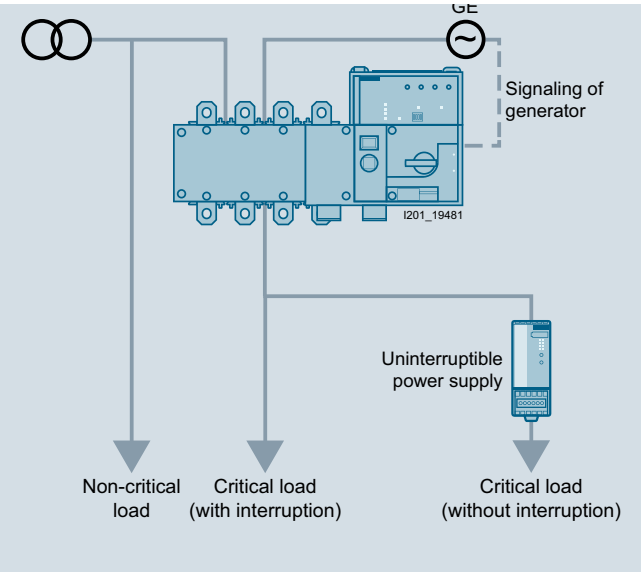
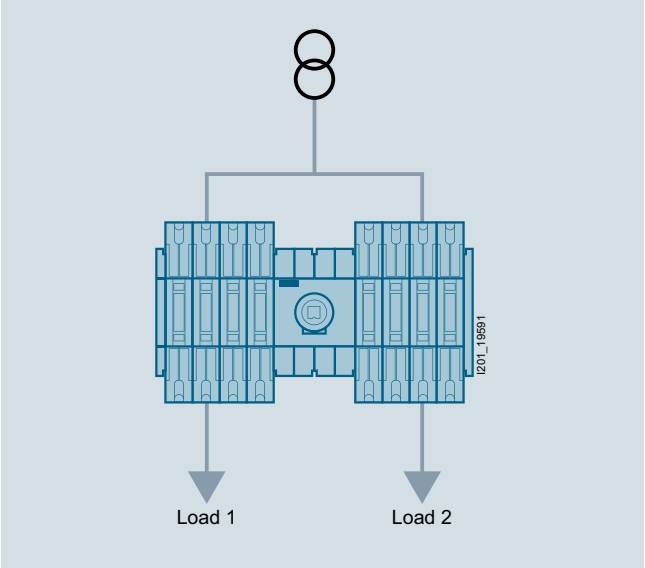
Applications

Network/generator transfer



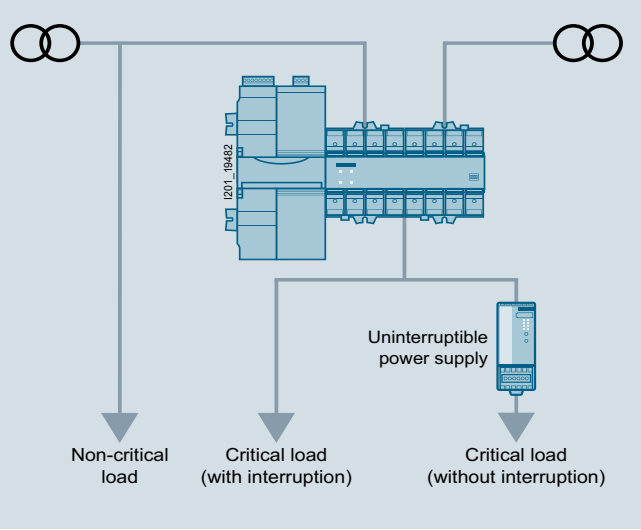
Network/generator operation (IEC 60947-6-1)

Load transfer



Load transfer switches (IEC 60947-3)

Network/network transfer



Network/network operation (IEC 60947-6-1)

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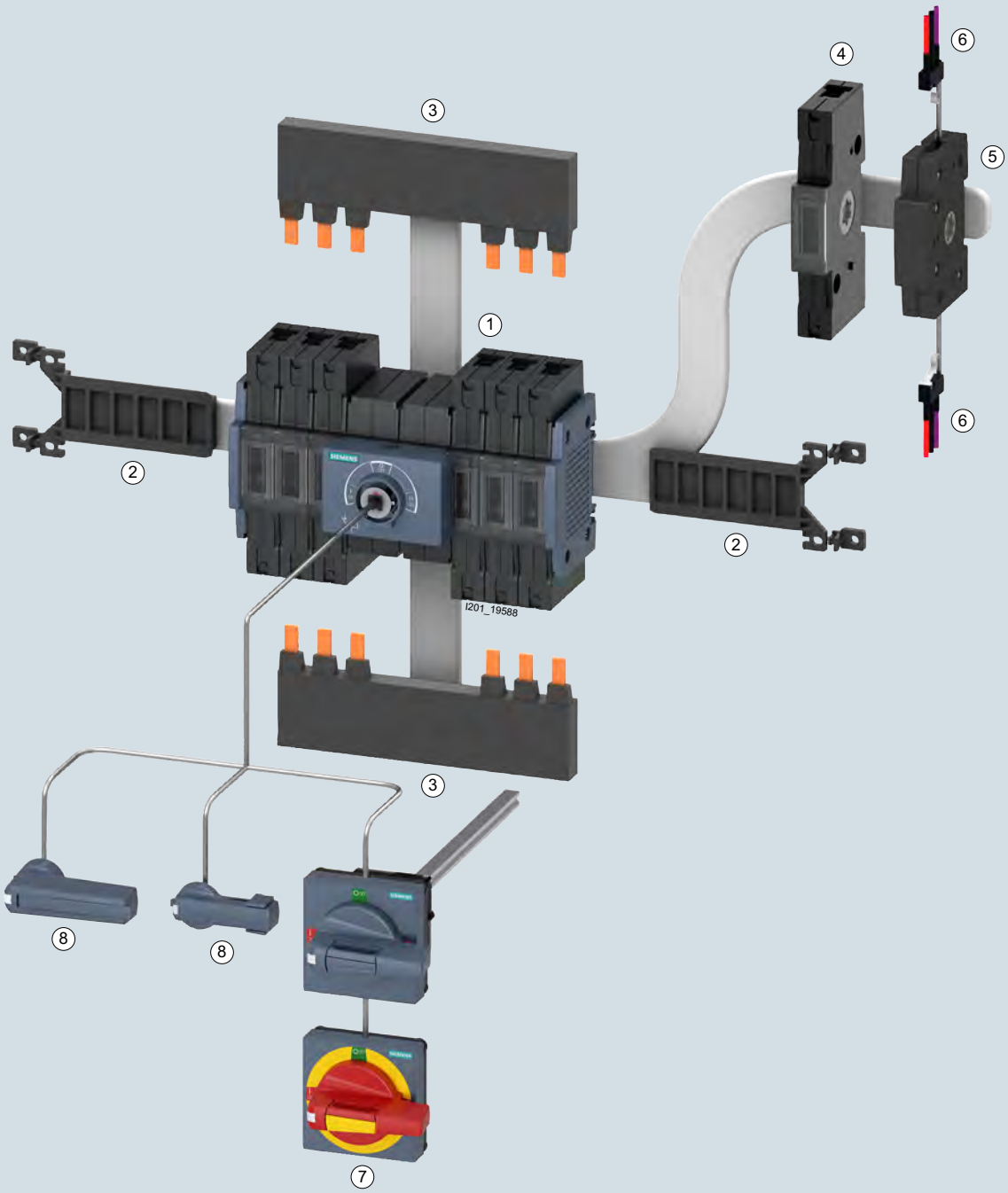
General data

Overview of components and accessories: 3KC0 manual transfer switching equipment (MTSE) for 16 to 160 A, 3/4-pole



1 3KC manual transfer switching equipment
2 Mounting kit for floor mounting
3 Bridging bars
4 4th pole
5 Auxiliary switch module
6 Auxiliary switches
7 Door-coupling rotary operating mechanism
8 Direct operating mechanism

Minimum order quantity (PS) or a multiple thereof can be ordered.

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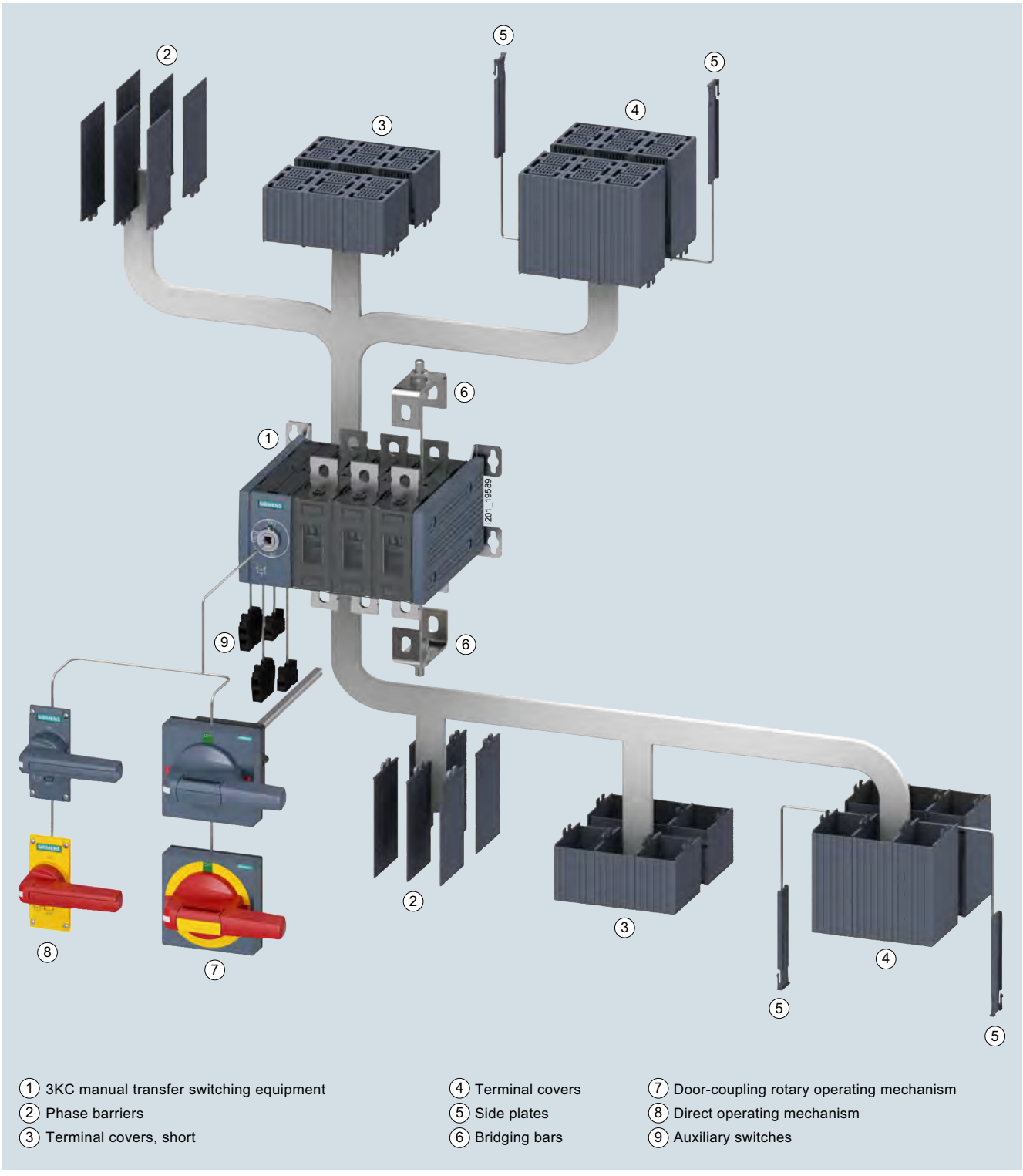
Overview of components and accessories: 3KC0 manual transfer switching equipment (MTSE) in sizes 3 to 5, for 200 to 1600 A, 3/4-pole



1 3KC manual transfer switching equipment
2 Phase barriers
3 Terminal covers, short
4 Terminal covers
5 Side plates
6 Bridging bars
7 Door-coupling rotary operating mechanism
8 Direct operating mechanism
9 Auxiliary switches

8

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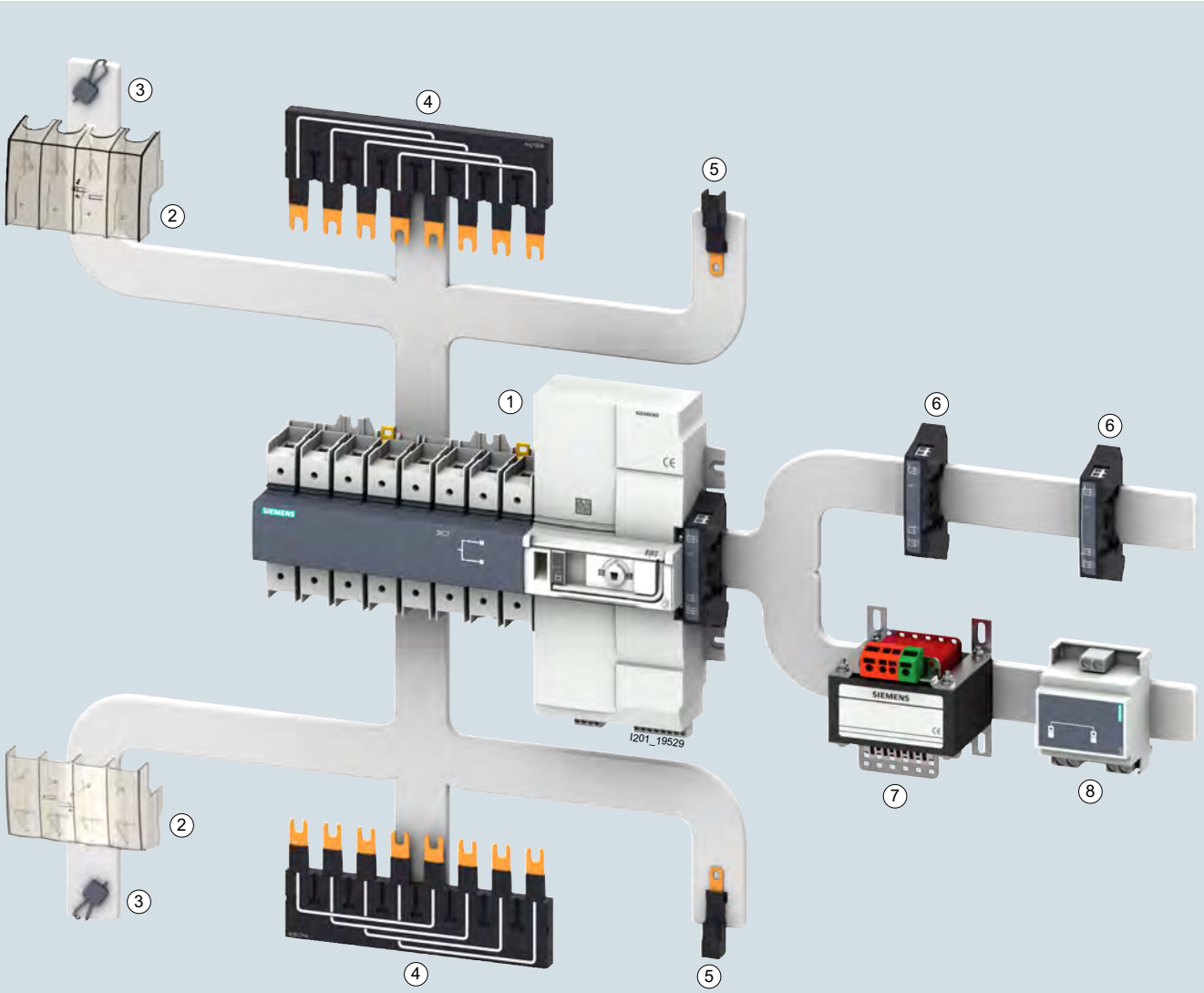
General data

Overview of components and accessories: 3KC3 remote transfer switching equipment (RTSE) for 40 to 160 A, 4-pole



1 3KC remote transfer switching equipment
2 Terminal covers
3 Sealing ribbon
4 Bridging bar
5 Auxiliary conductor terminal
6 Auxiliary switches
7 Autotransformer
8 Dual power supply

Minimum order quantity (PS) or a multiple thereof can be ordered.

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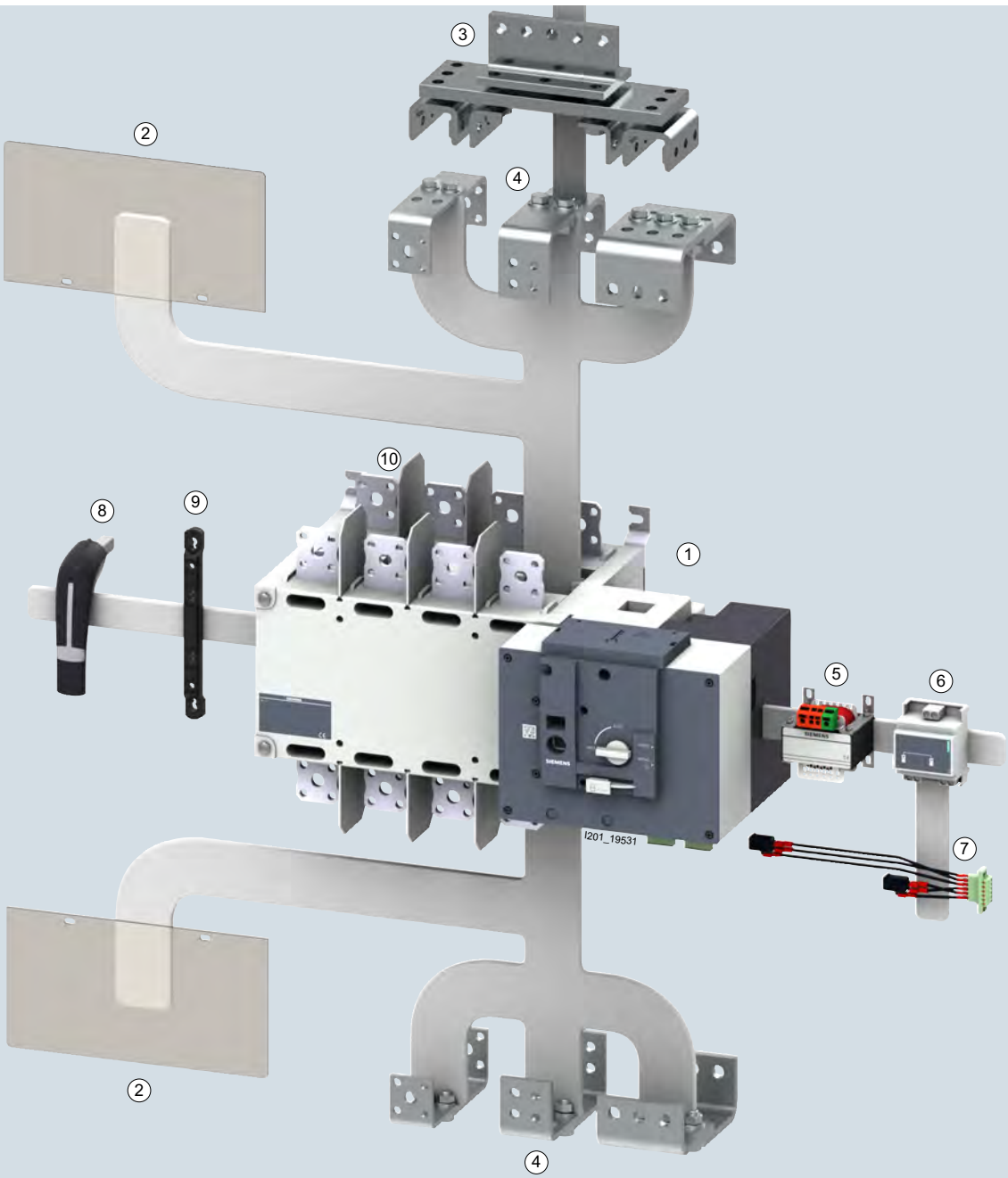
Overview of components and accessories: 3KC4 remote transfer switching equipment (RTSE) for 250 to 3200 A, 3/4-pole



1 3KC remote transfer switching equipment
2 Terminal plates
3 Copper bar connection kit
4 Bridging bars
5 Autotransformer
6 Dual power supply
7 Auxiliary switch
8 Direct handle
9 Mounting spacers
10 Phase barriers

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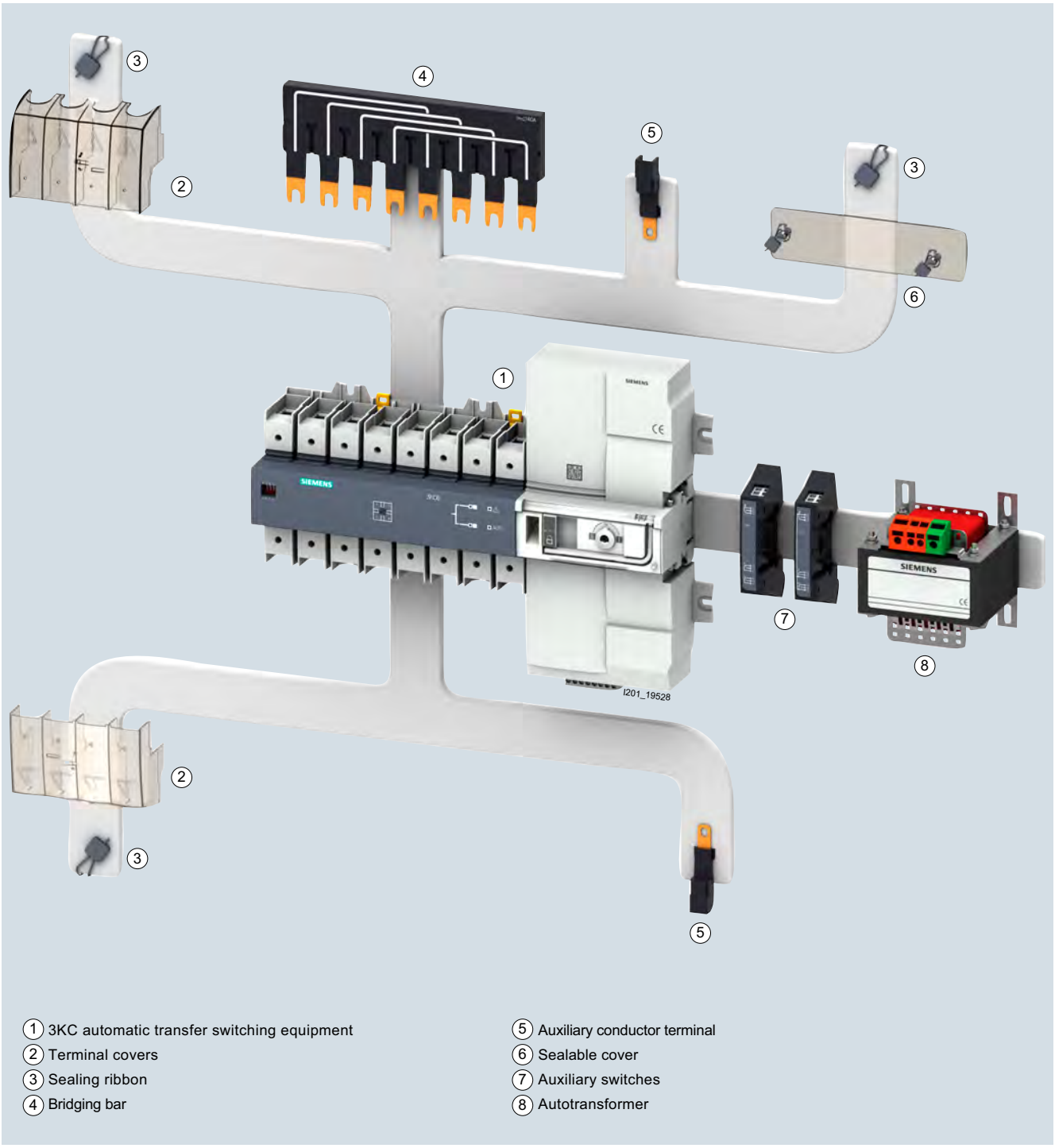
General data

Overview of components and accessories: 3KC6 automatic transfer switching equipment (ATSE) for 40 to 160 A, 4-pole



1 3KC automatic transfer switching equipment
2 Terminal covers
3 Sealing ribbon
4 Bridging bar
5 Auxiliary conductor terminal
6 Sealable cover
7 Auxiliary switches
8 Autotransformer

Minimum order quantity (PS) or a multiple thereof can be ordered.

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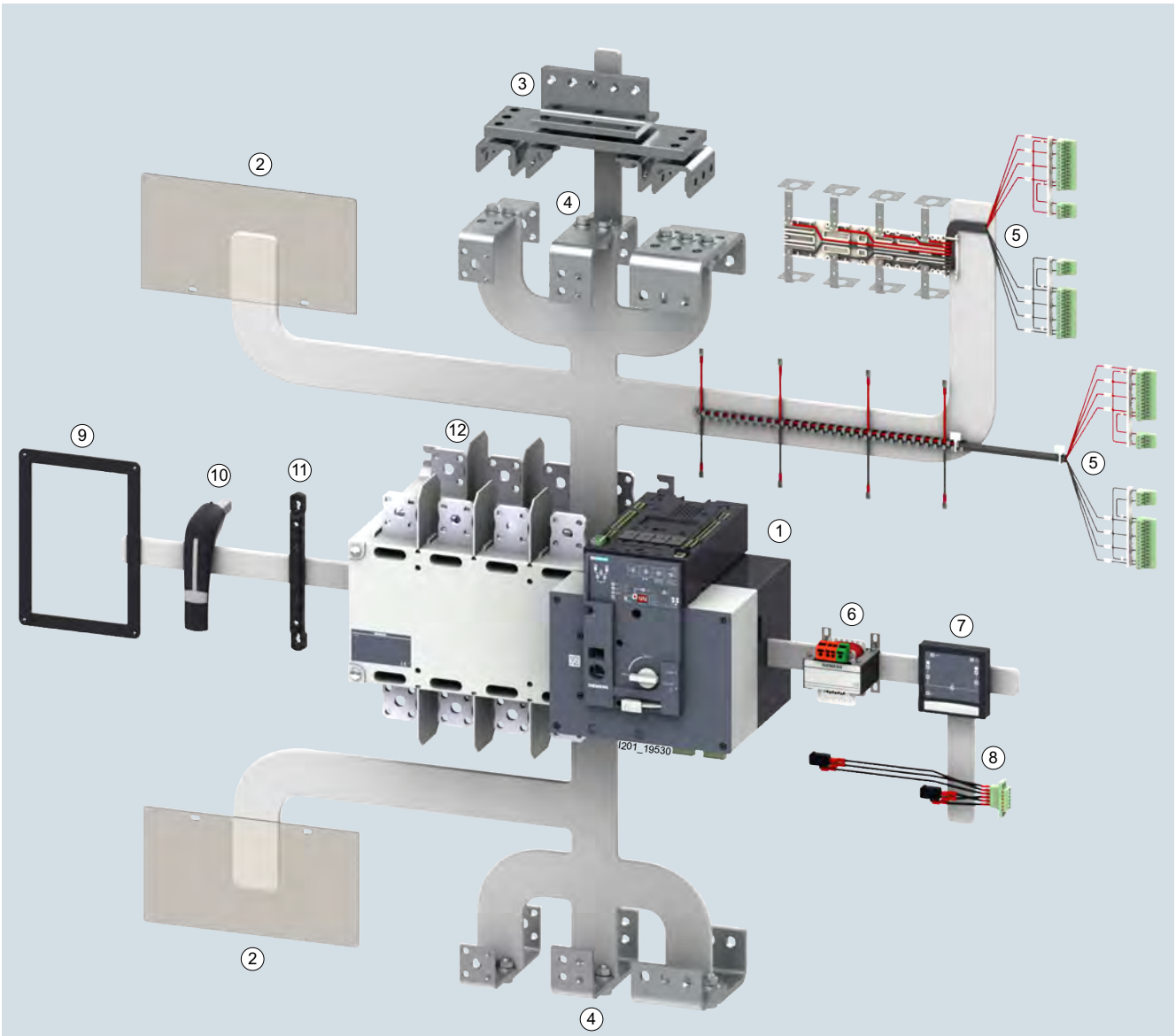
Overview of components and accessories: 3KC8 automatic transfer switching equipment (ATSE) for 250 to 3200 A, 3/4-pole



1 3KC automatic transfer switching equipment
2 Terminal plates
3 Copper bar connection kit
4 Bridging bars
5 Power supply kit
6 Autotransformer
7 External display
8 Auxiliary switch
9 Escutcheon
10 Direct handle
11 Mounting spacers
12 Phase barriers

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Manual transfer switching equipment (MTSE)

Technical specifications

Manual transfer switching equipment (MTSE) from 16 to 160 A, 3KC0....		16-.M	22-...M	..26-.M	28-.N	30.-..N	32.-.N	34-.N
Size		1			2			
Continuous current	A	16	32	63	80	100	125	160
General technical details								
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-6-1	V	415						
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-3	V	690						
Insulation voltage (U_i)	V	AC 1000						
Impulse withstand voltage (U_{imp})	kV	8						
Overvoltage category with pollution degree 3		III						
Operational current in compliance with IEC 60947-6-1:								
• AC-31 B, at 415 V	A	16	32	63	80	100	125	160
• AC-32 B, at 415 V	A	16	32	63	80	100	125	160
• AC-33 B, at 415 V	A	16	32	63	80	100	125	160
• AC-35 B, at 400 V	A	16	32	63	80	100	125	160
Operational current in compliance with IEC 60947-3:								
• AC-21 A, at AC-22 A, at 415 … 690 V	A	16	32	63	80	100	125	160
• AC-23 A, at 415 V	A	16	32	63	80	100	125	160
• AC-23 A, at 500 V	A	16	32	63	80	100	125	160
• AC-23 A, at 690 V	A	16	32	63	80	100	125	160
Operational power in compliance with IEC 60947-3:								
• AC-23 A, at 415 V	kW	7.5	15	30	37	55	55	90
• AC-23 A, at 500 V	kW	7.5	18.5	37	55	55	75	110
• AC-23 A, at 690 V	kW	11	30	55	75	90	110	110
Short-circuit behavior								
Short-circuit current ratings in compliance with IEC 60947-6-1:								
• Short-time withstand current (I_{cw}, 100 ms, 415 V) in compliance with IEC 60947-6-1	kA	5			10			
• Short-circuit current making capacity (I_{cm}, 415 V) in compliance with IEC 60947-6-1	kA	7.7			17			
Short-circuit current ratings in compliance with IEC 60947-3:								
• Short-time withstand current (I_{cw}, 1s, 415 V / 690 V) in compliance with IEC 60947-3	kA	3			4			
• Short-circuit current making capacity (I_{cm}, 690 V) in compliance with IEC 60947-3	kA	7			12			
Conditional short-circuit current with fuse:								
• Continuous current of upstream gG fuse, 500 V / 690 V	A	63			160			
• Conditional short-circuit current with gG fuse (415 V) in compliance with IEC 60947-6-1	kA	100			100			
• Conditional short-circuit current with gG fuse (415 V) in compliance with IEC 60947-3	kA	100			100			
• Conditional short-circuit current with gG fuse (690 V) in compliance with IEC 60947-3	kA	100			65			
• Let-through current of gG fuse 500 V; max. permissible	kA	8.1			18			
• Let-through current of gG fuse 690 V; max. permissible	kA	8.8			16			
• I^2t value of gG fuse 500 V; max. permissible	kA^2s	13.3			135.6			
• I^2t value of gG fuse 690 V; max. permissible	kA^2s	13.7			178.3			
Main conductor connections[1]								
Cu conductor, solid	mm^2	1 x (1 ... 16)			1 x (2.5 ... 16)			
Cu conductor, stranded	mm^2	1 x (6 ... 35)			1 x (10 … 70)			
With cable lug (DIN 46234)	mm^2	--			--			
Cu busbar	mm	1 x 2 x 9			1 x 3 x 14			
Tightening torque for main contacts	Nm	5 … 6.5			6.5 … 8			
Other properties								
Power loss per pole with thermal current I_{th}	W	0.1	0.4	1	1.1	1.8	3.2	4.6
Mechanical endurance		15000			15000			
Electrical endurance (AC-23A at 415 V / 690 V)		6000			1500			
IP protection class / with cover		IP20			IP20			
Ambient temperature								
• Operation	°C	-20 … +70						
• Storage	°C	-50 … +80						
Width x height x depth (3-pole transfer switching equipment)	mm	201.6 x 119 x 84.5			255.6 x 126 x 84.5			
Width x height x depth (4-pole transfer switching equipment)	mm	237.6 x 119 x 84.5			309.6 x 126 x 84.5			

[1] Values for connection of aluminum cables can be found in the product data sheet, see Siemens Industry Online Support at www.siemens.com/lowvoltage/product-support

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Manual transfer switching equipment (MTSE) from 200 to 500 A, 3KC0....		**36-.P**	**38-.P**	**40-.P**	**42-.P**	**44-.Q**
Size		**3**				**4**
Continuous current	**A**	**200**	**250**	**315**	**400**	**500**
General technical details						
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-6-1	V	415				
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-3	V	690				
Insulation voltage (U_i)	V AC	1000				
Impulse withstand voltage (U_{imp})	kV	12				
Overvoltage category with pollution degree 3		IV				
Operational current in compliance with IEC 60947-6-1:						
• AC-31 B, at 415 V	A	200	250	315	400	500
• AC-32 B, at 415 V	A	200	250	315	350	500
• AC-33 B, at 415 V	A	200	250	315	315	500
• AC-35 B, at 400 V	A	200	250	315	350	500
Operational current in compliance with IEC 60947-3:						
• AC-21 A, at AC-22 A, at 415 … 690 V	A	200	250	315	400	500
• AC-23 A, at 415 V	A	200	250	315	400	500
• AC-23 A, at 500 V	A	200	250	315	350	500
• AC-23 A, at 690 V	A	200	250	315	315	500
Operational power in compliance with IEC 60947-3:						
• AC-23 A, at 415 V	kW	110	132	160	220	280
• AC-23 A, at 500 V	kW	132	160	220	250	355
• AC-23 A, at 690 V	kW	185	220	280	355	500
Short-circuit behavior						
Short-circuit current ratings in compliance with IEC 60947-6-1:						
• Short-time withstand current (I_{cw}, 100 ms, 415 V) in compliance with IEC 60947-6-1	kA	18				30
• Short-circuit current making capacity (I_{cm}, 415 V) in compliance with IEC 60947-6-1	kA	36				63
Short-circuit current ratings in compliance with IEC 60947-3:						
• Short-time withstand current (I_{cw}, 1 s, 415 V / 690 V) in compliance with IEC 60947-3	kA	13				30
• Short-circuit current making capacity (I_{cm}, 690 V) in compliance with IEC 60947-3	kA	26				63
Conditional short-circuit current with fuse:						
• Continuous current of upstream gG fuse, 500 V / 690 V	A	250		400		630
• Conditional short-circuit current with gG fuse (415 V) in compliance with IEC 60947-6-1	kA	100		65		100
• Conditional short-circuit current with gG fuse (415 V) in compliance with IEC 60947-3	kA	100		65		100
• Conditional short-circuit current with gG fuse (690 V) in compliance with IEC 60947-3	kA	65		35		65
• Let-through current of gG fuse 500 V; max. permissible	kA	24.8		34.3		65.5
• Let-through current of gG fuse 690 V; max. permissible	kA	25		33		54
• I^2t value of gG fuse 500 V; max. permissible	kA^2s	426.5	426.5	1165	1165	3687.5
• I^2t value of gG fuse 690 V; max. permissible	kA^2s	348	348	1157.5	1157.5	4450
Main conductor connections[1)]						
Cu conductor, solid	mm^2	-				-
Cu conductor, stranded	mm^2	-				-
With cable lug (DIN 46234)	mm^2	1 x (6 ... 240), 2 x (6 ... 150)				1 x (25 ... 240), 2 x (25 ... 240)
Cu busbar	mm	1 x 30 x 10				1 x 40 x 10, 2 x 40 x 5
Tightening torque for main contacts	Nm	30 ... 44				50 ... 75
Other properties						
Power loss per pole with thermal current I_{th}	W	4	6	10	14	12
Mechanical endurance		10000				8000
Electrical endurance (AC-23A at 415 V / 690 V)		1000				1000
IP protection class / with cover		IP00 / IP20				IP00 / IP20
Ambient temperature:						
• Operation	°C	-20 ... +70				
• Storage	°C	-50 ... +80				
Width x height x depth (3-pole transfer switching equipment)	mm	235 x 164 x 197.2				319 x 235 x 232.5
Width x height x depth (4-pole transfer switching equipment)	mm	279 x 164 x 197.2				379 x 235 x 232.5

[1)] Values for connection of aluminum cables can be found in the product data sheet, see Siemens Industry Online Support www.siemens.com/lowvoltage/product-support

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Manual transfer switching equipment (MTSE)

Manual transfer switching equipment (MTSE) from 630 to 1600 A, 3KC0....		46-.Q	48-.Q	50-.R	52-.R	54-.R
Size		4		5		
Continuous current	A	630	800	1000	1250	1600
General technical details						
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-6-1	V	415				
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-3	V	690				
Insulation voltage (U_i)	V	AC 1000				
Impulse withstand voltage (U_{imp})	kV	12				
Overvoltage category with pollution degree 3		IV				
Operational current in compliance with IEC 60947-6-1:						
• AC-31 B, at 415 V	A	630	800	1000	1250	1600
• AC-32 B. at 415 V	A	630	800	1000	1250	1250
• AC-33 B, at 415 V	A	500	500	800	800	800
• AC-35 B, at 400 V	A	630	800	1000	1250	1250
Operational current in compliance with IEC 60947-3:						
• AC-21 A, at AC-22 A, at 415 … 690 V	A	630	800	1000	1250	1600
• AC-23 A, at 415 V	A	630	670	800	800	800
• AC-23 A, at 500 V	A	630	630	800	800	800
• AC-23 A, at 690 V	A	500	500	800	800	800
Operational power in compliance with IEC 60947-3:						
• AC-23 A, at 415 V	kW	355	355	400	400	400
• AC-23 A, at 500 V	kW	400	400	560	560	560
• AC-23 A, at 690 V	kW	500	500	800	800	800
Short-circuit behavior						
Short-circuit current ratings in compliance with IEC 60947-6-1:						
• Short-time withstand current (I_{cw}, 100 ms, 415 V) in compliance with IEC 60947-6-1	kA	30		50		
• Short-circuit current making capacity (I_{cm}, 415 V) in compliance with IEC 60947-6-1	kA	63		105		
Short-circuit current ratings in compliance with IEC 60947-3:						
• Short-time withstand current (I_{cw}, 1 s, 415 V / 690 V) in compliance with IEC 60947-3	kA	30		50		
• Short-circuit current making capacity (I_{cm}, 690 V) in compliance with IEC 60947-3	kA	63		105		
Conditional short-circuit current with fuse:						
• Continuous current of upstream gG fuse, 500 V / 690 V	A	630	800	1000/-	1250/-	1600/-
• Conditional short-circuit current with gG fuse (415 V) in compliance with IEC 60947-6-1	kA	100	65	100	80	80
• Conditional short-circuit current with gG fuse (415 V) in compliance with IEC 60947-3	kA	100	65	100	80	80
• Conditional short-circuit current with gG fuse (690 V) in compliance with IEC 60947-3	kA	65	50	-	-	-
• Let-through current of gG fuse 500 V; max. permissible	kA	65.5	70.8	95.2	112.6	112.6
• Let-through current of gG fuse 690 V; max. permissible	kA	54	65	-	-	-
• I^2t value of gG fuse 500 V; max. permissible	kA^2s	3687.5	7471.7	15400	25960	30900
• I^2t value of gG fuse 690 V; max. permissible	kA^2s	4450	103000	-	-	-
Main conductor connections[1]						
Cu conductor, solid	mm^2	--		--		
Cu conductor, stranded	mm^2	--		--		
With cable lug (DIN 46234)	mm^2	1 x (25 ... 240), 2 x (25 ... 240)		1 x (120 ... 240), 2 x (95 ... 240)		
Cu busbar	mm	1 x 40 x 10, 2 x 40 x 5		2 x 60 x 10		
Tightening torque for main contacts	Nm	50 ... 75		50 … 75		
Other properties						
Power loss per pole with thermal current I_{th}	W	17	25	20	32	57
Mechanical endurance		8000		6000		
Electrical endurance (AC-23A at 415 V / 690 V)		1000		500		
IP protection class / with cover		IP00 / IP20		IP00 / IP20		
Ambient temperature:						
• Operation	°C	-20 ... +70				
• Storage	°C	-50 ... +80				
Width x height x depth (3-pole transfer switching equipment)	mm	319 x 235 x 232.5		475 x 310 x 311.5		
Width x height x depth (4-pole transfer switching equipment)	mm	379 x 235 x 232.5		565 x 310 x 311.5		

[1] Values for connection of aluminum cables can be found in the product data sheet, see Siemens Industry Online Support at www.siemens.com/lowvoltage/product-support

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

3KC3 transfer switching equipment (RTSE) from 40 to 160 A		**3KC3424**	**3KC3426**	**3KC3428**	**3KC3430**	**3KC3432**	**3KC3434**
3KC6 transfer switching equipment (ATSE) from 40 to 160 A		**3KC6424**	**3KC6426**	**3KC6428**	**3KC6430**	**3KC6432**	**3KC6434**
Continuous current	**A**	**40**	**63**	**80**	**100**	**125**	**160**
General technical details							
Operating voltage at 50/60 Hz AC	V	415					
Insulation voltage	V	800 AC					
Impulse withstand voltage (U_{imp}) of the main circuit	kV	6					
Impulse withstand voltage (U_{imp}) of the control circuit	kV	RTSE: 4 / ATSE: 2.5					
Overvoltage category with pollution degree 3		RTSE: III / ATSE: II					
Operational current in compliance with IEC 60947-6-1:							
• AC-31 A/B, at 415 V	A	40	63	80	100	100/125	100/160
• AC-32 A/B, at 415 V	A	40	63	80	100	100/125	100/160
• AC-33 B, at 415 V	A	40	63	80	100	125	125
Operational current in compliance with IEC 60947-3:							
• AC-21 A/B, at 415 V	A	40	63	80	100	125	125/160
• AC-21 A/B, at 690 V	A	40	63	80	100	125	125
• AC-22 A/B, at 415 V	A	40	63	80	100	125	125/160
• AC-22 A/B, at 690 V	A	40	63	80	80	100/125	100/125
• AC-23 A/B, at 415 V	A	40	63	80	100	125	125/160
• AC-23 A/B, at 690 V	A	40	63	63	80	80	80
Operational power in compliance with IEC 60947-3:							
• AC-23 A/B, at 415 V	kW	22	37	45	55	60	75
• AC-23 A/B, at 690 V	kW	37	55	55	75	75	75
Short-circuit behavior							
Short-circuit current ratings in compliance with IEC 60947-3:							
• Short-time withstand current (I_{cw}, 1 s, 415 V)	kA	4					
• Short-time withstand current (I_{cw}, 50 ms, 415 V)	kA	10					
• Short-circuit current making capacity (I_{cm}, 415 V)	kA	5.88					
Conditional short-circuit current with fuse							
• Continuous current of series-connected fuse	A	40	63	80	100	125	160
• Conditional short-circuit current with fuse (415 V), IEC 60947-6-1	kA	50	50	50	50	50	40
• Conditional short-circuit current with fuse (415 V), IEC 60947-3	kA	50	50	50	50	50	40
• Let-through current of gG fuse at 415 V; max. permissible	kA	14	14	14	14	14	17
• I^2t value of gG fuse at 400/500 V; max. permissible	kA^2s	61.3	61.3	61.3	61.3	64.3	109
Transfer switching properties							
Switching time I-0 & II-0	ms	45					
Switch-off time I-0-II & II-0-I, IEC 60947-6-1	ms	150					
Transfer time I-0-II & II-0-I, IEC 60947-6-1	ms	180					
Transfer time I-0-II & II-0-I, IEC 60947-6-1 with network monitoring	s	1.4					
Motorized operating mechanism rated apparent power at 230 V AC	VA	6					
Motorized operating mechanism peak inrush current at 230 V AC	A	30					
Main conductor connections[1]							
• Cu conductor, solid	mm^2	1 x (10 … 70)					
• Cu conductor, stranded	mm^2	1 x (10 … 70)					
• with cable lug (DIN 46234)	mm^2	--					
• Cu busbar	mm	--					
Tightening torque for main contacts	Nm	5					
Other properties							
Real power loss per pole	W	0.5	1.2	2.2	4	5.2	8.7
Mechanical endurance		8500				7000	
Electrical endurance (AC-23A at 415 V)		1500				1000	
IP protection class / with cover		IP00 / IP20					
Ambient temperature:							
• Operation	°C	-20 … +70					
• Storage	°C	-40 … +70					
Width x height x depth (4-pole switch)	mm	340 x 245 x 73.5					

[1] Values for connection of aluminum cables can be found in the product data sheet, see Siemens Industry Online Support at www.siemens.com/lowvoltage/product-support

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Remote transfer switching equipment (RTSE) / Automatic transfer switching equipment (ATSE)

Technical specifications

3KC4 transfer switching equipment (RTSE) from 250 A to 1000 A		**3KC4.38**	**3KC4.42**	**3KC4.46**	**3KC4.48**	**3KC4.50**
3KC8 transfer switching equipment (ATSE) from 250 A to 1000 A		**3KC8.38**	**3KC8.42**	**3KC8.46**	**3KC8.48**	**3KC8.50**
Continuous current	**A**	**250**	**400**	**630**	**800**	**1000**
General technical details						
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-6-1	V	415				
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-3	V	690				
Insulation voltage	V	1000 AC / 1000 DC				
Impulse withstand voltage (U_{imp}) of the main circuit	kV	12	12	12	12	12
Impulse withstand voltage (U_{imp}) of the control circuit	kV	4	4	4	4	4
Overvoltage category with pollution degree 3		RTSE: IV / ATSE: III				
Operational current in compliance with IEC 60947-6-1:						
• AC-31 B, at 415 V	A	250	400	630	800	1000
• AC-32 B, at 415 V	A	200	400	500	800	1000
• AC-33 B, at 415 V	A	200	200	400	800	800
Operational current in compliance with IEC 60947-3:						
• AC-21 A/B, at 415 V	A	250	400	630	800	1000
• AC-21 A/B, at 690 V	A	200	200	500	800	1000
• AC-22 A/B, at 415 V	A	250	400	630	800	1000
• AC-22 A/B, at 690 V	A	160	160	400	630	800
• AC-23 A/B, at 415 V	A	200	400	500/630	800	1000
• AC-23 A/B, at 690 V	A	125	125	400	630	630
• DC-21/-22 A, at 220 V	A	250	250	630	800	1000
• DC-21/-22/-23 A 440 V; DC-23 220 V	A	200	200	630	800	1000
Operational power in compliance with IEC 60947-3:						
• AC-23 A/B 415 V	kW	110	220	335	450	700
• AC-23 A/B 690 V	kW	110	110	400	400	630
Short-circuit behavior						
Short-circuit current ratings acc. to IEC 60947-6-1						
• Short-time withstand current (I_{cw}, 60 ms, 415 V)	kA	10 at 30 ms	10 at 30 ms	12.6	20	20
• Short-circuit current making capacity (I_{cm}, at 415 V)	kA	17	17	25.2	40	40
Short-circuit current ratings in compliance with IEC 60947-3:						
• Short-time withstand current (I_{cw}, 60 ms, 415 V)	kA	8 at 690 V	8 at 690 V	10 at 690 V	35	35
• Short-circuit current making capacity (I_{cm}, at 415 V)	kA	22 at 690 V	30 at 690 V	17 at 690 V	73.5	73.5
Conditional short-circuit current with fuse:						
• Continuous current of series-connected fuse	A	250	400	630	800	1000
• Conditional short-circuit current with fuse (690 V), IEC 60947-3	kA	50	50	50	50	50
• Conditional short-circuit current with fuse (415 V), IEC 60947-6-1	kA	50	50	50	50	50
• Let-through current of gG fuse at 415 V; max. permissible	kA	22	30	42	51	60
• I^2t value of gG fuse at 400/500 V; max. permissible	kA^2s	200	600	3000	6000	6300
Transfer switching properties						
Switching time I-0 & II-0	s	0.5	0.5	0.6	1.4	1.4
Switch-off time I-0-II & II-0-I, IEC 60947-6-1	s	0.4	0.4	0.4	1.4	1.4
Transfer time I-0-II & II-0-I, IEC 60947-6-1	s	0.9	0.9	1	2.8	2.8
Transfer time I-0-II & II-0-I, IEC 60947-6-1 with network monitoring	s	1	1	1.1	3.1	3.1
Motorized operating mechanism rated apparent power at 230 V AC	VA	115	115	150	184	184
Motorized operating mechanism peak inrush current at 230 V AC	A	1.2	1.2	1.2	2	2
Main conductor connections						
• Cu conductor, solid	mm^2	1 x (95 … 150)	1 x (185 … 240)	2 x (150 … 300)	2 x (185 … 300)	2 x 240 … 4 x 185
• Cu conductor, stranded	mm^2	1 x (95 … 150)	1 x (185 … 240)	2 x (150 … 300)	2 x (185 … 300)	2 x 240 … 4 x 185
• with cable lug (DIN 46234)	mm^2	1 x 150	1 x 240	2 x 300	2 x 300	4 x 185
• Cu busbar	mm	1 x 32 x 5	1 x 32 x 8	2 x 40 x 5	2 x 50 x 5	2 x 60 x 5
• Tightening torque for main contacts	Nm	20 … 26	20 … 26	40 … 45	8.3 ... 13	8.3 ... 13
Other properties						
Real power loss per pole	W	5.9	15.1	32.4	41.7	46.9
Mechanical endurance		7000	4000	4000	2500	2500
Electrical endurance (AC-23B at 415 V)		1000	1000	1000	500	500
IP protection class / with cover		IP00 / IP20				
Ambient temperature during operation	°C	-20 … +70				
Ambient temperature during storage	°C	-40 … +70				
Width x height x depth (3-pole switch)	mm	328 x 160 x 292	328 x 170 x 292	377 x 260 x 369	504 x 370 x 440	504 x 370 x 440
Width x height x depth (4-pole switch)	mm	378 x 160 x 292	378 x 170 x 292	437 x 260 x 369	584 x 370 x 440	584 x 370 x 440

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3KC4 transfer switching equipment (RTSE) from 1250 to 3200 A		**3KC4.52**	**3KC4.54**	**3KC4.56**	**3KC4.58**	**3KC4.60**
3KC8 transfer switching equipment (ATSE) from 1250 to 3200 A		**3KC8.52**	**3KC8.54**	**3KC8.56**	**3KC8.58**	**3KC8.60**
Continuous current	**A**	**1250**	**1600**	**2000**	**2500**	**3200**
General technical details						
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-6-1	V	415				
Operating voltage at 50/60 Hz AC in compliance with IEC 60947-3	V	690				
Insulation voltage	V	1000 AC / 1000 DC				
Impulse withstand voltage (U_{imp}) of the main circuit	kV	12	12	12	12	12
Impulse withstand voltage (U_{imp}) of the control circuit	kV	4	4	4	4	4
Overvoltage category with pollution degree 3		RTSE: IV / ATSE: III				
Operational current in compliance with IEC 60947-6-1:						
• AC-31 B, at 415 V	A	1250	1600	2000	2500	3200
• AC-32 B, at 415 V	A	1250	1600	2000	2000	2000
• AC-33 B, at 415 V	A	1000	1000	1250	1250	1250
Operational current in compliance with IEC 60947-3:						
• AC-21 A/B, at 415 V	A	1250	1600	-/2000	-/2500	-/3200
• AC-21 A/B, at 690 V	A	1250	1600	-/2000	-/2000	-/2000
• AC-22 A/B, at 415 V	A	1250	1600	-/2000	-/2500	-/3200
• AC-22 A/B, at 690 V	A	1000	1000	-	-	-
• AC-23 A/B, at 415 V	A	1250	1250	-/1600	-/1600	-/1600
• AC-23 A/B, at 690 V	A	800	800	-	-	-
• DC-21/-22 A, at 220 V	A	1250	1250	--	--	--
• DC-21/-22/-23 A, at 440 V; DC-23 220 V	A	1250	1250	--	--	--
Operational power in compliance with IEC 60947-3:						
• AC-23 A/B, at 415 V	kW	800	900	--	--	--
• AC-23 A/B, at 690 V	kW	800	800	--	--	--
Short-circuit behavior						
Short-circuit current ratings acc. to IEC 60947-6-1:						
• Short-time withstand current (I_{cw}, 60 ms, 415 V)	kA	25	32	50	50	50
• Short-circuit current making capacity (I_{cm}, 415 V)	kA	52.5	67.2	105	105	105
Short-circuit current ratings in compliance with IEC 60947-3:						
• Short-time withstand current (I_{cw}, 60 ms, 415 V)	kA	35	50	50	50	50
• Short-circuit current making capacity (I_{cm}, 415 V)	kA	73.5	105	105	105	105
Conditional short-circuit current with fuse:						
• Continuous current of series-connected fuse	A	1250	2 x 800	--	--	--
• Conditional short-circuit current with fuse (690 V), IEC 60947-3	kA	100	100	--	--	--
• Conditional short-circuit current with fuse (415 V), IEC 60947-6-1	kA	100	100	--	--	--
• Let-through current of gG fuse at 415 V; max. permissible	kA	100	100	--	--	--
• I^2t value of gG fuse at 400/500 V; max. permissible	kA^2s	--	--	--	--	--
Transfer switching properties						
Switching time I-0 & II-0 RTSE / ATSE	s	1.4	1.4	1.6	1.6	1.6
Switch-off time I-0-II & II-0-I, IEC 60947-6-1	s	1.4	1.5	1.2	1.2	1.2
Transfer time I-0-II & II-0-I, IEC 60947-6-1	s	2.8	2.9	2.8	2.8	2.8
Transfer time I-0-II & II-0-I, IEC 60947-6-1 with network monitoring	s	3.1	3.3	2.8	2.8	2.8
Motorized operating mechanism rated apparent power at 230 V AC	VA	184	230	322	322	322
Motorized operating mechanism peak inrush current at 230 V AC	A	2	2	3.5	3.5	3.5
Main conductor connections						
• Cu conductor, solid	mm^2	4 x 185	6 x 185	--	--	--
• Cu conductor, stranded	mm^2	4 x 185	6 x 185	--	--	--
• with cable lug (DIN 46234)	mm^2	4 x 185	6 x 185	--	--	--
• Cu busbar	mm	2 x 60 x 7	2 x 100 x 5	3 x 100 x 5	2 x 100 x 10	3 x 100 x 10
• Tightening torque for main contacts	Nm	20 … 26	40 … 45	40 … 45	40 … 45	40 … 45
Other properties						
Real power loss per pole	W	93.3	122	178	255	330
Mechanical endurance		2500	2500	1500	1500	1500
Electrical endurance (AC-23B at 415 V)		500	500	500	500	500
IP protection class / with cover		IP00 / IP20				
Ambient temperature during operation	°C	-20 … +70				
Ambient temperature during storage	°C	-40 … +70				
Width x height x depth (3-pole switch)	mm	504 x 370 x 440	596 x 380 x 440	596 x 380 x 569	596 x 380 x 569	596 x 380 x 569
Width x height x depth (4-pole switch)	mm	584 x 370 x 440	716 x 380 x 440	716 x 380 x 569	716 x 380 x 569	716 x 380 x 569

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Integrated controllers of the ATSE 40 to 160 A and 250 to 3200 A

Technical specifications

		3KC6 (40 to 160 A)	3KC8 (250 to 3200 A)
ATS settings			
• Network variants		3, 3 + N	1+N, 3, 3+N
• Transfer delay	s	0 … 30	0 … 60
• Return transfer delay	min	0 … 30	0 … 60
• Frequency deviation	%	10 or 20	±3 … 10
• Voltage	%	10 or 20	±5 … 20
Metering inputs			
Maximum rated voltage (U_n)			
• Phase-phase	V AC	415	480
• Phase-neutral	V AC	230	277
Metering range (L-N)	V	166 … 288	30 … 332
Metering range (L-L)	V	288 … 498	30 … 600
Measuring frequency	Hz	30 … 70	30 … 70
Input impedance (L-L)	MΩ	5.5	12
Number of monitored phases		3	1 or 3
Measuring method		Three-phase, true RMS	True RMS
Relative error of measurement method	%	1	0.5
Auxiliary supply			
Connection type		Integrated dual power supply with internal wiring	Integrated dual power supply
Rated voltage (AC)	V	230	230
Supply voltage range (AC)	V	176 … 288	166 … 332
Frequency	Hz	45 … 65	45 … 65
Real power loss (230V AC)[1]	W	2	2.5
Impulse withstand voltage (U_{imp}) of the control circuit kV	kV	2.5	4
Overvoltage category of the control circuit		III	III
Digital inputs			
Number of inputs		3	Motorized operating mechanism: 5 Electronic module: 6
Digital input[2]		0 position; inhibition of automatic mode selection of system priority	Motorized operating mechanism: 0 position, I position, II position, 0 position with priority, release for remote control mode Electronic module: inhibition of automatic mode, inhibition of automatic return transfer, priority and selection of system, test off load, test on load, priority for test on load, deactivation of stabilization delay
Input delay time	ms	30	46
Number of relay outputs		1 NO: 2A/250 V AC / 2A/30 V DC	Motor unit: 4 NO Electronic module: 1 NO + 1 CO 2A/250 V AC / 2A/24 V DC
Supplementary notes on relay outputs[2]		Plant availability	Motorized operating mechanism: Availability of the motorized operating mechanism, switch positions I, 0, II Electronic module: Availability of the device, generator start/stop signal
Connections			
Terminals		Removable/insertable	Removable/insertable
Connectable conductor cross-section / stranded, solid	mm²	0.5 ... 1.5	1.5 ... 2.5
Connectable conductor cross-section / solid	AWG	20 … 14	16 … 14
Connectable conductor cross-section / stranded	AWG	20 … 16	16 … 14
Tightening torque	Nm	0.5	0.5 ... 0.6

[1] In addition to power loss of motorized operating mechanism

[2] For more information, see 3KC manual at www.siemens.com/lowvoltage/manuals

Minimum order quantity (PS) or a multiple thereof can be ordered.

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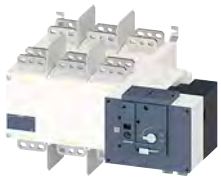
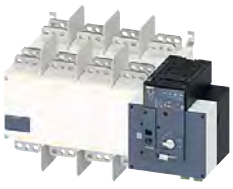
Overview

Devices			Description	Page
Switch versions				
3-pole	**4-pole**			
		**3KC0 (MTSE) from 16 ... 1600 A**	Manual transfer switching equipment (MTSE) • Ready-to-install combinations comprising switch disconnectors and operating mechanisms • 3 and 4-pole switch disconnectors with front operating mechanisms • 3KC0 (MTSE) from 16 ... 160 A: Connection via box terminals, operating mechanism in the center • 3KC0 (MTSE) from 200 ... 1600 A: Connection via flat terminals, operating mechanism in the center	8/32
3KC0 (MTSE) from 16 ... 160 A	3KC0 (MTSE) from 16 ... 160 A			
				
3KC0 (MTSE) from 200 ... 1600 A	3KC0 (MTSE) from 200 ... 1600 A			
--		**3KC3 (RTSE) from 40 ... 160 A**	Remote transfer switching equipment (RTSE) • Ready-to-install combinations comprising switch disconnectors, motorized operating mechanisms and handle • External control supported • 4-pole switch disconnectors with motorized operating mechanism on the right • Connection via box terminals	8/43
		**3KC4 (RTSE) from 250 ... 3200 A**	Remote transfer switching equipment (RTSE) • Ready-to-install combinations comprising switch disconnectors, motorized operating mechanisms and handle • External control supported • 3- and 4-pole switch disconnectors with motorized operating mechanism on the right • Connection via flat terminals	8/44
--		**3KC6 (ATSE) from 40 ... 160 A**	Automatic transfer switching equipment (ATSE) • Ready-to-install combinations comprising switch disconnectors, motorized operating mechanism, handle and integrated controller • Already wired ready for operation • 4-pole switch disconnectors with motorized operating mechanism on the right • Connection via box terminals	8/46
		**3KC8 (ATSE) from 250 ... 3200 A**	Automatic transfer switching equipment (ATSE) • Ready-to-install combinations comprising switch disconnectors, motorized operating mechanism, handle and integrated controller • Direct control signal for generator supported • 3- and 4-pole switch disconnectors with motorized operating mechanism on the right • Connection via flat terminals	8/47

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Selection and ordering data

	Rated uninterrupted current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
MTSE basic units without handle, front operating mechanism								
Bridging bars are additionally required for the connection side.								
	3-pole							
	Box terminals							
The transfer switches are suitable for standard rail mounting and can also optionally be used for base mounting (assembly kit for base mounting necessary)								
	16	1		**3KC0316-2ME00-0AA0**		1	1 unit	1CL
	32			**3KC0322-2ME00-0AA0**		1	1 unit	1CL
	63			**3KC0326-2ME00-0AA0**		1	1 unit	1CL
	80	2		**3KC0328-2NE00-0AA0**		1	1 unit	1CL
	100			**3KC0330-2NE00-0AA0**		1	1 unit	1CL
	125			**3KC0332-2NE00-0AA0**		1	1 unit	1CL
	160			**3KC0334-2NE00-0AA0**		1	1 unit	1CL
	3-pole							
	Flat terminals							
The transfer switches are designed for base mounting								
	200	3		**3KC0336-0PE00-0AA0**		1	1 unit	1CL
	250			**3KC0338-0PE00-0AA0**		1	1 unit	1CL
	315			**3KC0340-0PE00-0AA0**		1	1 unit	1CL
	400			**3KC0342-0PE00-0AA0**		1	1 unit	1CL
	500	4		**3KC0344-0QE00-0AA0**		1	1 unit	1CL
	630			**3KC0346-0QE00-0AA0**		1	1 unit	1CL
	800			**3KC0348-0QE00-0AA0**		1	1 unit	1CL
	1000	5		**3KC0350-0RE00-0AA0**		1	1 unit	1CL
	1250			**3KC0352-0RE00-0AA0**		1	1 unit	1CL
	1600			**3KC0354-0RE00-0AA0**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Rated uninterrupted current I_u	Size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		d					
	4-pole							
	Box terminals							
The transfer switches are suitable for standard rail mounting and can also optionally be used for base mounting (assembly kit for base mounting necessary)								
	16	1		**3KC0416-2ME00-0AA0**		1	1 unit	1CL
	32			**3KC0422-2ME00-0AA0**		1	1 unit	1CL
	63			**3KC0426-2ME00-0AA0**		1	1 unit	1CL
	80	2		**3KC0428-2NE00-0AA0**		1	1 unit	1CL
	100			**3KC0430-2NE00-0AA0**		1	1 unit	1CL
	125			**3KC0432-2NE00-0AA0**		1	1 unit	1CL
	160			**3KC0434-2NE00-0AA0**		1	1 unit	1CL
	4-pole							
	Flat terminals							
The transfer switches are designed for base mounting								
	200	3		**3KC0436-0PE00-0AA0**		1	1 unit	1CL
	250			**3KC0438-0PE00-0AA0**		1	1 unit	1CL
	315			**3KC0440-0PE00-0AA0**		1	1 unit	1CL
	400			**3KC0442-0PE00-0AA0**		1	1 unit	1CL
	500	4		**3KC0444-0QE00-0AA0**		1	1 unit	1CL
	630			**3KC0446-0QE00-0AA0**		1	1 unit	1CL
	800			**3KC0448-0QE00-0AA0**		1	1 unit	1CL
	1000	5		**3KC0450-0RE00-0AA0**		1	1 unit	1CL
	1250			**3KC0452-0RE00-0AA0**		1	1 unit	1CL
	1600			**3KC0454-0RE00-0AA0**		1	1 unit	1CL

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Accessories and spare parts

Selection and ordering data

Additional poles

	Version	Circuit symbol	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	d					
	4th contact element (switching pole)	N—N						
	Box terminals							
 3KD9205-2	for size 1; 3KC0...-.M			**3KD9105-2**		1	1 unit	1CL
	for size 2, 3KC0...-.N			**3KD9205-2**		1	1 unit	1CL

Direct operating mechanisms

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Direct operating mechanisms in standard version and flat version						
	Standard version						
	• Can be locked with up to max. 3 padlocks						
	• Requires additional mounting depth in locked state						
	Gray						
	for sizes 1/2, 3KC0...-.M/N		**3KC9201-3**		1	1 unit	1CL
	for size 3, 3KC0...-.P		**3KC9301-1**		1	1 unit	1CL
	for size 4, 3KC0...-.Q		**3KC9401-1**		1	1 unit	1CL
	for size 5, 3KC0...-.R		**3KC9501-1**		1	1 unit	1CL
	Red/yellow						
	for size 3, 3KC0...-.P		**3KC9301-2**		1	1 unit	1CL

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	for size 4, 3KC0...-.Q		**3KC9401-2**		1	1 unit	1CL
	for size 5, 3KC0...-.R		**3KC9501-2**		1	1 unit	1CL
	***Flat version (suitable for distribution boards)*** • Can be locked with one padlock • No additional mounting depth in locked state **Gray** for size 1; 3KC0...-.M		**3KC9101-4**		1	1 unit	1CL

Door-coupling rotary operating mechanisms

	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Door-coupling rotary operating mechanisms, complete, 8UD1 series									
	Door-coupling rotary operating mechanisms, complete, labeling I - 0 - II • Handle with masking plate • Coupling driver with tolerance compensation • Shaft 300 mm • Can be locked with up to max. 3 padlocks • Labeling I - 0 - II **Gray**								
	for sizes 1/2, 3KC0...-.M/N	55	8 x 8		**8UD1131-2AE21**		1	1 unit	1CL
	for size 3, 3KC0...-.P	100	8 x 8		**8UD1141-2AE21**		1	1 unit	1CL
	for size 4, 3KC0...-.Q	140	10 x 10		**8UD1151-3AE21**		1	1 unit	1CL
	for size 5, 3KC0...-.R	200	12 x 12		**8UD1161-4AE21**		1	1 unit	1CL

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Accessories and spare parts

	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Handles for door-coupling rotary operating mechanisms, 8UD1 series									
	Handles without extension shaft, without coupling driver, labeling I - 0 - II • With masking plate • Can be locked with up to max. 3 padlocks • Labeling I - -0 - II								
	Gray								
	for sizes 1/2, 3KC0...-.M/N	55	8 x 8		**8UD1731-2AE01**		1	1 unit	1CL
	for size 3, 3KC0...-.P	100	8 x 8		**8UD1841-2AE01**		1	1 unit	1CL
	for size 4, 3KC0...-.Q	140	10 x 10		**8UD1851-3AE01**		1	1 unit	1CL
	for size 5, 3KC0...-.R	200	12 x 12		**8UD1861-4AE01**		1	1 unit	1CL
	Red/yellow								
	for sizes 1/2, 3KC0...-.M/N	55	8 x 8		**8UD1731-2AE05**		1	1 unit	1CL
	for size 3, 3KC0...-.P	100	8 x 8		**8UD1841-2AE05**		1	1 unit	1CL
	for size 4, 3KC0...-.Q	140	10 x 10		**8UD1851-3AE05**		1	1 unit	1CL
	for size 5, 3KC0...-.R	200	12 x 12		**8UD1861-4AE05**		1	1 unit	1CL

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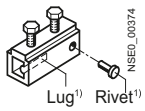
	Version	Handle length	Shaft size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm x mm	d					
Other accessories for door-coupling rotary operating mechanisms, 8UD1 series									
	Extension shafts								
 8UC6032	**300 mm long**								
	• for sizes 1/2/3, 3KC0...-.M/N	--	8 x 8		**8UC6032**		1	1 unit	1CL
	• for size 4, 3KC0...-.Q	--	10 x 10		**8UC6033**		1	1 unit	1CL
	• for size 5, 3KC0...-.R	--	12 x 12		**8UC6034**		1	1 unit	1CL
 3KD9302-1	**600 mm long**								
	A shaft jack is required for the 8UD handle when the 600 mm long shaft is used and for sizes 1/2.								
	• for sizes 1/2	8 x 8	8 x 8		**8UC6082**		1	1 unit	1CL
	• for size 3, 3KD....-.P	10 x 10	8 x 8		**3KD9302-1**		1	1 unit	1CL
	• for size 4, 3KD....-.Q	10 x 10	10 x 10		**8UC6083**		1	1 unit	1CL
	• for size 5, 3KD....-.R	12 x 12	12 x 12		**8UC6084**		1	1 unit	1CL
 8UD1900-0FA00	**Shaft jack for 8UD handle for 600 mm shaft** NEW								
	• for size 1/2, 3KD....-.M/N	--	8 x 8		**8UD1900-0FA00**		1	1 unit	1CL
	Coupling drivers with tolerance compensation								
 8UD1900-2GA00	• for sizes 1/2, 3KC0...-.M/N	--	8 x 8		**8UD1900-2GA00**		1	1 unit	1CB
 8UD1900-6GA00	• for size 3, 3KC0...-.P	--	8 x 8		**8UD1900-6GA00**		1	1 unit	1CL
	• for size 4, 3KC0...-.Q	--	10 x 10		**8UD1900-3GA00**		1	1 unit	1CL
	• for size 5, 3KC0...-.R	--	12 x 12		**8UD1900-4GA00**		1	1 unit	1CL
	Coupling drivers without tolerance compensation								
 8UD1900-2HA00	• for sizes 1/2, 3KC0...-.M/N	--	8 x 8		**8UD1900-2HA00**		1	1 unit	1CB
 8UD1900-6HA00	• for size 3, 3KC0...-.P	--	8 x 8		**8UD1900-6HA00**		1	1 unit	1CL
	• for size 4, 3KC0...-.Q	--	10 x 10		**8UD1900-3HA00**		1	1 unit	1CL
	• for size 5, 3KC0...-.R	--	12 x 12		**8UD1900-4HA00**		1	1 unit	1CL
	Shaft couplings								
 8UC6022 to 8UC6024	• for sizes 1/2, 3KC0...-.M/N	--	8 x 8		**8UC6022**		1	1 unit	1CL
	• for size 3, 3KC0...-.P	--	8 x 8		**8UC6022**		1	1 unit	1CL
	• for size 4, 3KC0...-.Q	--	10 x 10		**8UC6023**		1	1 unit	1CL
	• for size 5, 3KC0...-.R	--	12 x 12		**8UC6024**		1	1 unit	1CL

1) Non-interchangeability features

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Accessories and spare parts

Auxiliary switches

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 3KD9103-5	**Auxiliary switch modules**						
	Unit is supplied without auxiliary switches; a maximum of 2 auxiliary switches can be installed						
	• for sizes 1/2, 3KC0...-.M/N		**3KD9103-5**		1	1 unit	1CL
 3KD9103-3	**Auxiliary switches for sizes 1 and 2**						
	With soldered-on 50 cm connecting cables						
	• 1 CO contact		**3KD9103-1**		1	1 unit	1CL
	• 1 CO contact, solid-state compatible		**3KD9103-3**		1	1 unit	1CL
 3KD9103-2	Without soldered-on connecting cables						
	• 1 CO contact		**3KD9103-2**		1	1 unit	1CL
	• 1 CO contact, solid-state compatible		**3KD9103-4**		1	1 unit	1CL
	Auxiliary switches for sizes 3 to 5						
 3SB3400-0B auxiliary switch	• Auxiliary switches with screw terminal						
	• Installation on operating mechanism module						
	• Auxiliary switches with spring-type terminal 3SB3403-.. from the 3SB3 program can also be used						
	• 1 NO	▶	**3SB3400-0B**		1	1 unit	41J
	• 1 NO with gold-plated contacts		**3SB3400-0BA**		1	1 unit	41J
	• 1 NC	▶	**3SB3400-0C**		1	1 unit	41J
	• 1 NC with gold-plated contacts		**3SB3400-0CA**		1	1 unit	41J
 3SB3400-0A auxiliary switch	• 1 NO + 1 NC	▶	**3SB3400-0A**		1	1 unit	41J
	• 1 NO + 1 NC with gold-plated contacts		**3SB3400-0AA**		1	1 unit	41J
	• 2 NO		**3SB3400-0D**		1	1 unit	41J
	• 2 NO with gold-plated contacts		**3SB3400-0DA**		1	1 unit	41J
	• 2 NC		**3SB3400-0E**		1	1 unit	41J
	• 2 NC with gold-plated contacts		**3SB3400-0EA**		1	1 unit	41J

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Bridging bars

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Bridging bars for sizes 1 and 2							
	for load-side connection						
	3-pole						
	for size 1; 3KC....-.M		**3KC9118-1**		1	1 unit	1CL
	for size 2; 3KC....-.N		**3KC9218-1**		1	1 unit	1CL
	4-pole						
	for size 1; 3KC....-.M		**3KC9118-2**		1	1 unit	1CL
	for size 2; 3KC....-.N		**3KC9218-2**		1	1 unit	1CL
Bridging bars for sizes 3 ... 5							
	• for load-side connection • single-pole • contains 1 unit • for 3-pole transfer switches 3 units, for 4-pole transfer switches 4 units are required						
	Flat terminals						
	for size 3, 3KC0...-.P		**3KC9318-0**		1	1 unit	1CL
	for size 4, 3KC0...-.Q		**3KC9418-0**		1	1 unit	1CL
	for size 5, 3KC0...-.R		**3KC9518-0**		1	1 unit	1CL

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Accessories and spare parts

Other accessories

	Version	For size	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Phase barriers								
 3KD9308-6	• for 3KC MTSE with flat terminals • for the line side one pack (6 or 8 units) is required • for the load side one pack (6 or 8 units) is required							
	For 3-pole devices (6 units)							
		3; 3KC0...-.P		**3KD9308-6**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KD9408-6**		1	1 unit	1CL
		5; 3KC0...-.R		**3KD9508-6**		1	1 unit	1CL
	For 4-pole devices (8 units)							
		3; 3KC0...-.P		**3KD9308-8**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KD9408-8**		1	1 unit	1CL
		5; 3KC0...-.R		**3KD9508-8**		1	1 unit	1CL
Terminal covers								
	• for 3KC MTSE with flat terminals • for the line side one pack (6 or 8 units) is required • for the load side one pack (6 or 8 units) is required • additional side plates for terminal covers are required for the terminal side, where bridging bars are used (normally the load side)							
	For 3-pole devices (6 units)							
 3KD9304-6	**Standard length**							
		3; 3KC0...-.P		**3KD9304-6**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KD9404-6**		1	1 unit	1CL
		5; 3KC0...-.R		**3KD9504-6**		1	1 unit	1CL
 3KD9304-7	**Short version**							
		3; 3KC0...-.P		**3KD9304-7**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KD9404-7**		1	1 unit	1CL
	For 4-pole devices (8 units)							
 3KD9304-8	**Standard length**							
		3; 3KC0...-.P		**3KD9304-8**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KD9404-8**		1	1 unit	1CL
		5; 3KC0...-.R		**3KD9504-8**		1	1 unit	1CL
 3KD9304-5	**Short version**							
		3; 3KC0...-.P		**3KD9304-5**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KD9404-5**		1	1 unit	1CL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	For size	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Spare part for terminal cover (1 unit)							
	Standard length							
		5; 3KC0...-.R		**3KD9504-1**		1	1 unit	1CL
	Short version							
 3KD9304-1		3; 3KC0...-.P		**3KD9304-1**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KD9404-1**		1	1 unit	1CL
	Terminal covers, side plates							
	• for lateral touch protection on the terminal side, where bridging bars are used (normally the load side)							
	• suitable for terminal covers in standard length							
	• contains 2 units							
 3KC9304-0		3; 3KC0...-.P		**3KC9304-0**		1	1 unit	1CL
		4; 3KC0...-.Q		**3KC9404-0**		1	1 unit	1CL
		5; 3KC0...-.R		**3KC9504-0**		1	1 unit	1CL

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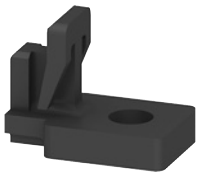
Accessories and spare parts

	Version	For size	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Mounting accessories								
 3KC9120-1	***Mounting, assembly kit for base mounting*** • For base mounting for sizes 1 and 2 • Contains 4 mounting brackets and two mounting plates • For 3-pole and 4-pole devices	1/2, 3KC0...-.M/N		**3KC9120-1**		1	1 unit	1CL
 3KD9120-1	***Mounting bracket*** Spare part, included in the scope of supply of the assembly kit for base mounting for sizes 1 to 2 • Contains 4 units • For 3-pole and 4-pole devices	1/2, 3KC0...-.M/N		**3KD9120-1**		1	1 unit	1CL
Slide for mounting on a standard mounting rail								
	• Spare part, included in the scope of supply of the 3KC • Contains 5 parts	1 and 2		**3KF9112-0BA00**		1	1 unit	1DL

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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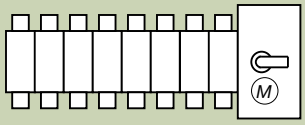
Selection and ordering data

	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
RTSE with motorized operating mechanism, with additional handle, operating mechanism on the right							
• The transfer switches are suitable for screw and standard rail mounting. • One 3KC9603-1 auxiliary switch is already included with the RTSE 3KC3. • A bridging bar is additionally required for the terminal side.							
4-pole							
Box terminals							
	40		**3KC3424-2AA22-0AA3**		1	1 unit	1CL
	63		**3KC3426-2AA22-0AA3**		1	1 unit	1CL
	80		**3KC3428-2AA22-0AA3**		1	1 unit	1CL
	100		**3KC3430-2AA22-0AA3**		1	1 unit	1CL
	125		**3KC3432-2AA22-0AA3**		1	1 unit	1CL
	160		**3KC3434-2AA22-0AA3**		1	1 unit	1CL



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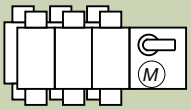
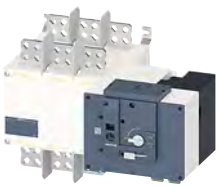
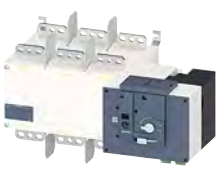
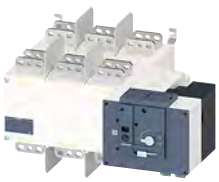
Selection and ordering data

	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
RTSE with motorized operating mechanism, with additional handle, operating mechanism on the right							
• The transfer switches are suitable for screw mounting.							
• Bridging bars are additionally required for the terminal side.							
3-pole							
Flat terminals							
	250		**3KC4338-0CA21-0AA3**		1	1 unit	1CL
	400		**3KC4342-0DA21-0AA3**		1	1 unit	1CL
	630		**3KC4346-0EA21-0AA3**		1	1 unit	1CL
	800		**3KC4348-0FA21-0AA3**		1	1 unit	1CL
	1000		**3KC4350-0FA21-0AA3**		1	1 unit	1CL
	1250		**3KC4352-0GA21-0AA3**		1	1 unit	1CL
	1600		**3KC4354-0HA21-0AA3**		1	1 unit	1CL
	2000		**3KC4356-0JA21-0AA3**		1	1 unit	1CL
	2500		**3KC4358-0JA21-0AA3**		1	1 unit	1CL
	3200		**3KC4360-0JA21-0AA3**		1	1 unit	1CL

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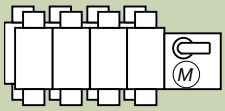
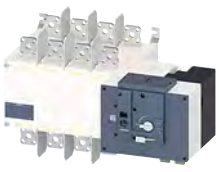
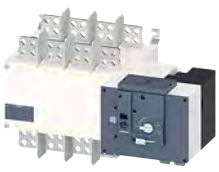
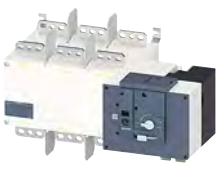
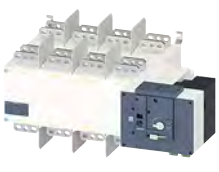
	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
	4-pole						
	Flat terminals						
	250		**3KC4438-0CA21-0AA3**		1	1 unit	1CL
	400		**3KC4442-0DA21-0AA3**		1	1 unit	1CL
	630		**3KC4446-0EA21-0AA3**		1	1 unit	1CL
	800		**3KC4448-0FA21-0AA3**		1	1 unit	1CL
	1000		**3KC4450-0FA21-0AA3**		1	1 unit	1CL
	1250		**3KC4452-0GA21-0AA3**		1	1 unit	1CL
	1600		**3KC4454-0HA21-0AA3**		1	1 unit	1CL
	2000		**3KC4456-0JA21-0AA3**		1	1 unit	1CL
	2500		**3KC4458-0JA21-0AA3**		1	1 unit	1CL
	3200		**3KC4460-0JA21-0AA3**		1	1 unit	1CL

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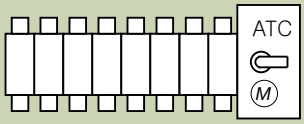
Selection and ordering data

	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
ATSE with motorized operating mechanism and integrated controller, with additional handle, operating mechanism on the right							
• The transfer switches are suitable for screw and standard rail mounting. • The 3KC6 (ATSE) is already wired ready for operation (including power supply) • A bridging bar is additionally required for the terminal side.							
4-pole							
Box terminals							
	40		**3KC6424-2TA20-0TA3**		1	1 unit	1CL
	63		**3KC6426-2TA20-0TA3**		1	1 unit	1CL
	80		**3KC6428-2TA20-0TA3**		1	1 unit	1CL
	100		**3KC6430-2TA20-0TA3**		1	1 unit	1CL
	125		**3KC6432-2TA20-0TA3**		1	1 unit	1CL
	160		**3KC6434-2TA20-0TA3**		1	1 unit	1CL



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Minimum order quantity (PS) or a multiple thereof can be ordered.

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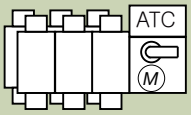
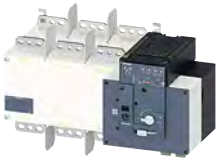
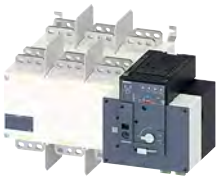
Selection and ordering data

	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
ATSE with motorized operating mechanism and integrated controller, with additional handle, operating mechanism on the right							
• The transfer switches are suitable for screw mounting. • Bridging bars are additionally required for the terminal side as well as a power supply and voltage sensing cable for ATSE.							
3-pole							
Flat terminals							
	250		**3KC8338-0CA22-0GA3**		1	1 unit	1CL
	400		**3KC8342-0DA22-0GA3**		1	1 unit	1CL
	630		**3KC8346-0EA22-0GA3**		1	1 unit	1CL
	800		**3KC8348-0FA22-0GA3**		1	1 unit	1CL
	1000		**3KC8350-0FA22-0GA3**		1	1 unit	1CL
	1250		**3KC8352-0GA22-0GA3**		1	1 unit	1CL
	1600		**3KC8354-0HA22-0GA3**		1	1 unit	1CL
	2000		**3KC8356-0JA22-0GA3**		1	1 unit	1CL
	2500		**3KC8358-0JA22-0GA3**		1	1 unit	1CL
	3200		**3KC8360-0JA22-0GA3**		1	1 unit	1CL

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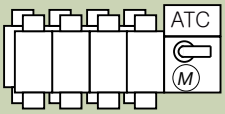
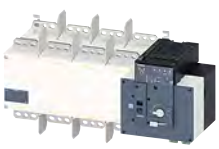
Basic units

	Rated uninterrupted current I_u	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A	d					
	4-pole						
	Flat terminals						
	250		**3KC8438-0CA22-0GA3**		1	1 unit	1CL
	400		**3KC8442-0DA22-0GA3**		1	1 unit	1CL
	630		**3KC8446-0EA22-0GA3**		1	1 unit	1CL
	800		**3KC8448-0FA22-0GA3**		1	1 unit	1CL
	1000		**3KC8450-0FA22-0GA3**		1	1 unit	1CL
	1250		**3KC8452-0GA22-0GA3**		1	1 unit	1CL
	1600		**3KC8454-0HA22-0GA3**		1	1 unit	1CL
	2000		**3KC8456-0JA22-0GA3**		1	1 unit	1CL
	2500		**3KC8458-0JA22-0GA3**		1	1 unit	1CL
	3200		**3KC8460-0JA22-0GA3**		1	1 unit	1CL

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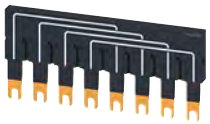
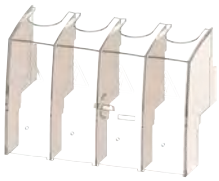
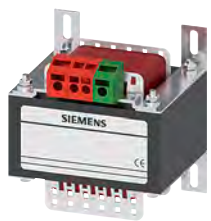
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Bridging bars							
	For load-side connection • for 40 ... 125 A • for 160 A		**3KC9618-2** **3KC9618-3**		1 1	1 unit 1 unit	1CL 1CL
Terminal covers							
	• for 40 ... 160 A, contains 2 units, 1 unit covers 4 poles		**3KC9604-2**		1	1 unit	1CL
Auxiliary conductor terminals							
	• for 40 ... 160 A, contains 2 units		**3KC9622-2**		1	1 unit	1CL
Auxiliary switches							
 3KC9603-1, 3KC9603-2	Auxiliary switches for 40 ... 160 A, for 250 V AC / 5 A or for 24 V DC / 2 A, 1 changeover contact for each position 0, I, II Max. 2 auxiliary switches can be mounted per transfer switching unit • with separate contacts • with linked common contacts		 **3KC9603-1** **3KC9603-2**		 1 1	 1 unit 1 unit	 1CL 1CL
Sealing units							
 3KC9721-1	**Sealable cover** • for 3KC6 (ATSE) 40 ... 160 A (incl. bolt set and sealing ribbons) **Sealing ribbon** • also as spare part for sealable cover • for 40 ... 3200 A, 10 units		 **3KC9721-1** **3KC9621-2**		 1 1	 1 unit 1 unit	 1CL 1CL
Autotransformers							
	• for 40 ... 160 A • 400 V/230 V AC; 400 VA		**3KC9624-1**		1	1 unit	1CL
Dual power supply							
	• for 3KC3 and 3KC4 (RTSE) 40 ... 3200 A • 240 V AC, 3 A		**3KC9625-1**		1	1 unit	1CL

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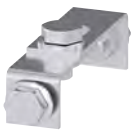
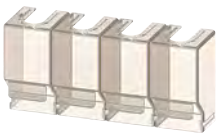
Accessories and spare parts

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Bridging bars							
	For load-side connection • single-pole • contains 1 unit • for 3-pole transfer switches 3 units, for 4-pole transfer switches 4 units are required.						
	• for 250 A		**3KC9818-2**		1	1 unit	1CL
	• for 400 A		**3KC9818-3**		1	1 unit	1CL
	• for 630 A		**3KC9818-4**		1	1 unit	1CL
	• for 800 ... 1000 A		**3KC9818-5**		1	1 unit	1CL
	• for 1250 A		**3KC9818-6**		1	1 unit	1CL
	• for 1600 A		**3KC9818-7**		1	1 unit	1CL
Terminal covers							
	• for 250 ... 400 A, 3 units, 1 unit covers one pole		**3KC9804-1**		1	1 unit	1CL
	• for 630 A, 3 units, 1 unit covers one pole		**3KC9804-3**		1	1 unit	1CL
	• for 250 ... 400 A, 4 units, 1 unit covers one pole		**3KC9804-2**		1	1 unit	1CL
	• for 630 A, 4 units, 1 unit covers one pole		**3KC9804-4**		1	1 unit	1CL

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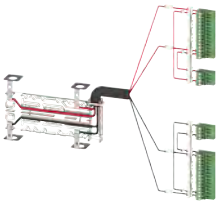
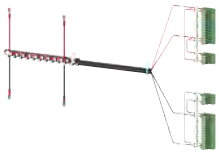
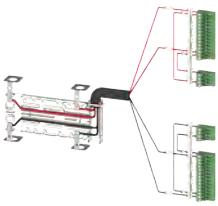
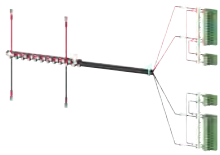
	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Copper bar connection kit							
	Suitable quantities see page 8/57						
	• for 2000 ... 2500 A, C-bracket, part A		**3KC9811-0**		1	1 unit	1CL
	• for 2000 ... 3200 A, bolt set, part B, 45 mm		**3KC9811-1**		1	1 unit	1CL
	• for 2000 ... 3200 A, bolt set, part B, 35 mm, short length		**3KC9811-2**		1	1 unit	1CL
	• for 2000 ... 3200 A, T-bracket, part C		**3KC9811-3**		1	1 unit	1CL
	• for 2000 ... 3200 A, L-bracket, part D, contains 2 units		**3KC9811-4**		1	1 unit	1CL
	• for 2000 ... 3200 A, bridging bar, part E		**3KC9818-8**		1	1 unit	1CL
Power supply and voltage sensing cables for ATSE							
	For 2-pole applications, infeed from below, with power supply						
	• for 250 A, 3-pole switch		**3KC9833-1**		1	1 unit	1CL
	• for 400 A, 3-pole switch		**3KC9833-2**		1	1 unit	1CL
	• for 630 A, 3-pole switch		**3KC9833-3**		1	1 unit	1CL
	• for 800 ... 1000 A, 3-pole switch		**3KC9833-4**		1	1 unit	1CL
	• for 1250 A, 3-pole switch		**3KC9833-5**		1	1 unit	1CL
	• for 1600 A, 3-pole switch		**3KC9833-6**		1	1 unit	1CL
	• for 2000 ... 3200 A, 3-pole switch		**3KC9833-7**		1	1 unit	1CL
	For 2-pole applications, infeed from above, with power supply						
	• for 250 A, 3-pole switch		**3KC9834-1**		1	1 unit	1CL
	• for 400 A, 3-pole switch		**3KC9834-2**		1	1 unit	1CL
	• for 630 A, 3-pole switch		**3KC9834-3**		1	1 unit	1CL
	• for 800 ... 1000 A, 3-pole switch		**3KC9834-4**		1	1 unit	1CL
	• for 1250 A, 3-pole switch		**3KC9834-5**		1	1 unit	1CL
	• for 1600 A, 3-pole switch		**3KC9834-6**		1	1 unit	1CL
	• for 2000 ... 3200 A, 3-pole switch		**3KC9834-7**		1	1 unit	1CL

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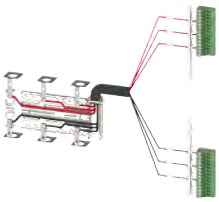
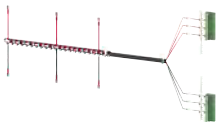
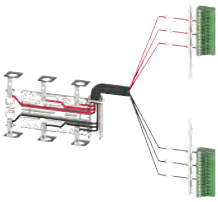
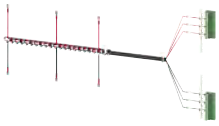
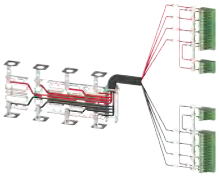
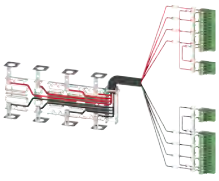
Accessories and spare parts

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	For 3-pole applications, infeed from below[1)]						
	• for 250 A, 3-pole switch		**3KC9822-1**		1	1 unit	1CL
	• for 400 A, 3-pole switch		**3KC9822-2**		1	1 unit	1CL
	• for 630 A, 3-pole switch		**3KC9822-3**		1	1 unit	1CL
	• for 800 ... 1000 A, 3-pole switch		**3KC9822-4**		1	1 unit	1CL
	• for 1250 A, 3-pole switch		**3KC9822-5**		1	1 unit	1CL
	• for 1600 A, 3-pole switch		**3KC9822-6**		1	1 unit	1CL
	• for 2000 ... 3200 A, 3-pole switch		**3KC9822-7**		1	1 unit	1CL
	For 3-pole applications, infeed from above[1)]						
	• for 250 A, 3-pole switch		**3KC9832-1**		1	1 unit	1CL
	• for 400 A, 3-pole switch		**3KC9832-2**		1	1 unit	1CL
	• for 630 A, 3-pole switch		**3KC9832-3**		1	1 unit	1CL
	• for 800 ... 1000 A, 3-pole switch		**3KC9832-4**		1	1 unit	1CL
	• for 1250 A, 3-pole switch		**3KC9832-5**		1	1 unit	1CL
	• for 1600 A, 3-pole switch		**3KC9832-6**		1	1 unit	1CL
	• for 2000 ... 3200 A, 3-pole switch		**3KC9832-7**		1	1 unit	1CL
	For 4-pole applications, infeed from below, with power supply						
	• for 250 A, 4-pole switch		**3KC9830-1**		1	1 unit	1CL
	• for 400 A, 4-pole switch		**3KC9830-2**		1	1 unit	1CL
	• for 630 A, 4-pole switch		**3KC9830-3**		1	1 unit	1CL
	• for 800 ... 1000 A, 4-pole switch		**3KC9830-4**		1	1 unit	1CL
	• for 1250 A, 4-pole switch		**3KC9830-5**		1	1 unit	1CL
	• for 1600 A, 4-pole switch		**3KC9830-6**		1	1 unit	1CL
	• for 2000 ... 3200 A, 4-pole switch		**3KC9830-7**		1	1 unit	1CL
	For 4-pole applications, infeed from above, with power supply						
	• for 250 A, 4-pole switch		**3KC9831-1**		1	1 unit	1CL
	• for 400 A, 4-pole switch		**3KC9831-2**		1	1 unit	1CL
	• for 630 A, 4-pole switch		**3KC9831-3**		1	1 unit	1CL
	• for 800 ... 1000 A, 4-pole switch		**3KC9831-4**		1	1 unit	1CL
	• for 1250 A, 4-pole switch		**3KC9831-5**		1	1 unit	1CL
	• for 1600 A, 4-pole switch		**3KC9831-6**		1	1 unit	1CL
	• for 2000 ... 3200 A, 4-pole switch		**3KC9831-7**		1	1 unit	1CL

[1)] Power supply not available for 3-pole cables; see manual for installation with transformer and/or with DPS in Siemens Industry Online Support at www.siemens.com/lowvoltage/manuals

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Auxiliary switches							
	One auxiliary switch contains 2 leading changeover contacts, one changeover contact for position I and one changeover contact for position II (incl. bolt set) Max. two auxiliary switches can be installed per transfer switching unit 250 V AC/12 A (AC-13) or for 24 V DC/14 A (DC-13)						
	• for 250 ... 630 A		**3KC9803-1**		1	1 unit	1CL
	• for 800 ... 1600 A		**3KC9803-2**		1	1 unit	1CL
	• for 2000 ... 3200 A: included in the basic unit		**--**				
Phase barriers							
	• for 250 ... 400 A, contains 2 units (for 3P)		**3KC9808-1**		1	1 unit	1CL
	• for 250 ... 400 A, contains 3 units (for 4P)		**3KC9808-6**		1	1 unit	1CL
	• for 630 A, contains 2 units (for 3P)		**3KC9808-2**		1	1 unit	1CL
	• for 630 A, contains 3 units (for 4P)		**3KC9808-7**		1	1 unit	1CL
	• for 800 ... 3200 A: included in the scope of supply of the basic unit						
Mounting accessories							
	Cover frame The cover frame helps to implement a clean and safe door cut-out to enable access to the front of the 3KC8 transfer switching equipment (electronic module and operation of the motorized operating mechanism)						
	• for ATSE 250 ... 630 A		**3KC9820-4**		1	1 unit	1CL
	• for ATSE 800 ... 3200 A		**3KC9820-5**		1	1 unit	1CL
	Spacers Increase the space between the mounting rail and the cabinet rear panel or the mounting frame						
	• for 250 ... 630 A, contains 2 units		**3KC9820-3**		1	1 unit	1CL
Sealing units							
	Sealable cover						
	• for controller (electronic module) ATSE 250 ... 3200 A, (incl. bolt set and sealing ribbons)		**3KC9821-0**		1	1 unit	1CL
	Sealing ribbon						
	• also as spare part for sealable cover		**3KC9621-2**		1	1 unit	1CL
	• for 40 ... 3200 A, 10 units						


3KC9821-0

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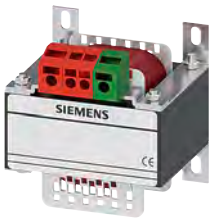
Accessories and spare parts

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Autotransformers							
	• for 250 ... 3200 A, 3-pole • 400 V/230 V AC, 200 VA		**3KC9824-1**		1	1 unit	1CL
Dual power supply							
	• for 3KC3 and 3KC4 (RTSE) 40 ... 3200 A • 240 V AC, 3 A		**3KC9625-1**		1	1 unit	1CL
External display							
	**Display** For installing in the cubicle door • for 3KC8 (ATSE) 250 ... 3200 A		**3KC9823-0**		1	1 unit	1CL
	Connection cable • for external display, 250 ... 3200 A, RJ45 cable, 3 m		**3KC9823-2**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal plates							
	For protecting the front side at the upper and lower connecting terminals						
	• for 250 ... 400 A, 3-pole		**3KC9827-1**		1	1 unit	1CL
	• for 250 ... 400 A, 4-pole		**3KC9828-1**		1	1 unit	1CL
	• for 630 A, 3-pole		**3KC9827-2**		1	1 unit	1CL
	• for 630 A, 4-pole		**3KC9828-2**		1	1 unit	1CL
	• for 800 ... 1250 A, 3-pole		**3KC9827-3**		1	1 unit	1CL
	• for 800 ... 1250 A, 4-pole		**3KC9828-3**		1	1 unit	1CL
	• for 1600 A, 3-pole		**3KC9827-4**		1	1 unit	1CL
	• for 1600 A, 4-pole		**3KC9828-4**		1	1 unit	1CL
	• for 2000 ... 3200 A, 3-pole		**3KC9827-5**		1	1 unit	1CL
	• for 2000 ... 3200 A, 4-pole		**3KC9828-5**		1	1 unit	1CL
							

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Accessories and spare parts

Spare parts

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Motorized operating mechanisms						
	• for 250 ... 400 A		**3KC9826-1**		1	1 unit	1CL
	• for 630 A		**3KC9826-2**		1	1 unit	1CL
	• for 800 ... 1250 A		**3KC9826-3**		1	1 unit	1CL
	• for 1600 A		**3KC9826-4**		1	1 unit	1CL
	• for 2000 ... 3200 A		**3KC9826-5**		1	1 unit	1CL
	Controller (electronic module)						
	• for ATSE 250 ... 3200 A		**3KC9826-0**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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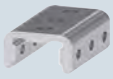
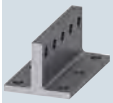
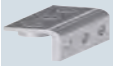
More information

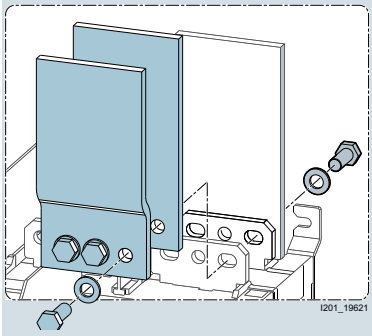
Direct connections

	Copper bar connection kit for transfer switching equipment from 2000 to 2000 A	Number of poles	C-bracket  3KC9811-0	Bolt set, 45 mm 3KC9811-1	Bolt set, 35 mm 3KC9811-2	T-piece  3KC9811-3	L-bracket  3KC9811-4	Bridging bars  3KC9818-8
Line side	Direct connection 2 x 100 x 10 mm; 4 x 100 x 5 mm	3	-	-	6 x	-	-	-
		4	-	-	8 x	-	-	-
	Direct connection, rotated 90° 2 x 100 x 10 mm; 4 x 100 x 5 mm	3	6 x	-	-	6 x	6 x	-
		4	8 x	-	-	8 x	8 x	-
	Direct connection 3 x 100 x 10 mm (necessary for 3200 A)	3	Included[1]	3 x	3 x	-	-	-
		4	Included[1]	4 x	4 x	-	-	-
	Direct connection, rotated 90° 3 x 100 x 10 mm (necessary for 3200 A)[2]	3	Included[1]	-	-	6 x	6 x	-
		4	Included[1]	-	-	8 x	8 x	-
Load side	Direct connection, rotated 90° 2 x 100 x 10 mm; 4 x 100 x 5 mm	3	6 x	-	-	6 x	6 x	-
		4	8 x	-	-	8 x	8 x	-
	Direct connection, rotated 90° with bridging bar 2 x 100 x 10 mm; 4 x 100 x 5 mm	3	6 x	6 x	-	-	-	3 x
		4	8 x	8 x	-	-	-	4 x
	Direct connection, rotated 90° 3 x 100 x 10 mm (necessary for 3200 A)	3	Included[1]	-	-	6 x	6 x	-
		4	Included[1]	-	-	8 x	8 x	-
	Direct connection, rotated 90° with bridging bar 3 x 100 x 10 mm (necessary for 3200 A)	3	Included[1]	6 x	-	-	-	3 x
		4	Included[1]	8 x	-	-	-	4 x

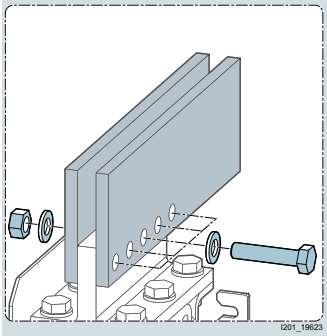
[1] 3KC9811-0 is included for all 3KC transfer switches for 3200 A. For connection of 3KC transfer switches for 2000 ... 2500 A to 3 x 100 x 10 mm busbars, the following must be ordered:
- 3KC9811-0, 6 units for 3-pole switches
- 3KC9811-0, 8 units for 4-pole switches

[2] Vertical connection is approved up to 2900 A; horizontal connection is approved up to 3200 A.

Line side

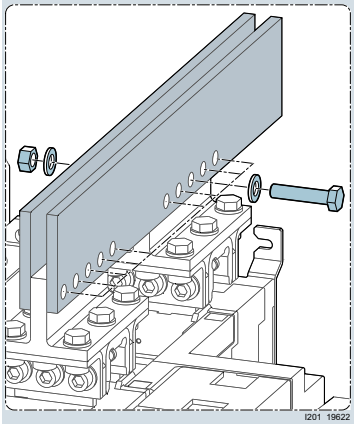


Infeed side, direct connection (2000 to 2500 A)

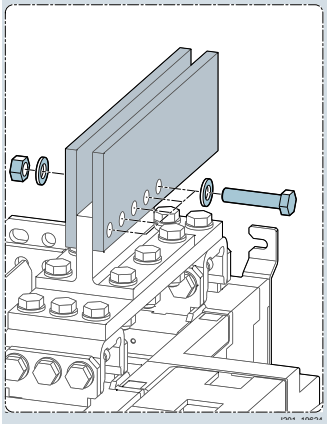


Infeed side, direct connection, rotated 90° (2000 to 2500 A)

Load side



Load side, direct connection, rotated 90° (2000 to 2500 A)



Load side, direct connection, rotated 90°, with bridging bar (2000 to 2500 A)

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Introduction

Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
Transfer control devices							
	**3KC ATC5300 transfer control devices**	8/61	The 3KC ATC5300 transfer control device equipped with two circuit breakers with motorized operating mechanism serves as a transfer system that automatically or manually switches between two power supply systems in low-voltage power distribution applications. The 3KC ATC5300 transfer control device offers several programmable inputs and outputs, communication interfacing and displays. Settings are defined via user-friendly software.	IEC 60947-6-1; DIN VDE 0660-114; UL 508; CSA 22.2 No. 14	✓	✓	✓
	**3KC ATC3100 transfer control devices**	8/62	The 3KC ATC3100 transfer control device constitutes the transfer control system together with two circuit breakers with motorized operating mechanism. It is a simplified version of the 3KC ATC5300 and enables fast parameterization without software.	IEC 60947-6-1; GB 14048.11	✓	✓	✓

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



3KC ATC5300 and 3KC ATC3100 transfer control devices

Automatic transfer with the 3KC ATC5300 or 3KC ATC3100 transfer control device

The 3KC ATC5300 and ATC3100 transfer control devices, equipped with two circuit breakers with motorized operating mechanism, serve as an open transfer system that automatically or manually switches between two power supply systems in low-voltage power distribution applications.

In particular, the 3KC ATC5300 or 3KC ATC3100 transfer control device is deployed wherever a power failure is especially critical, e.g. distributed power supply systems with UPS supply (e.g. air-conditioning of control cabinets), in industrial processes and the emergency power supply of public buildings, such as hotels.

Mode of operation

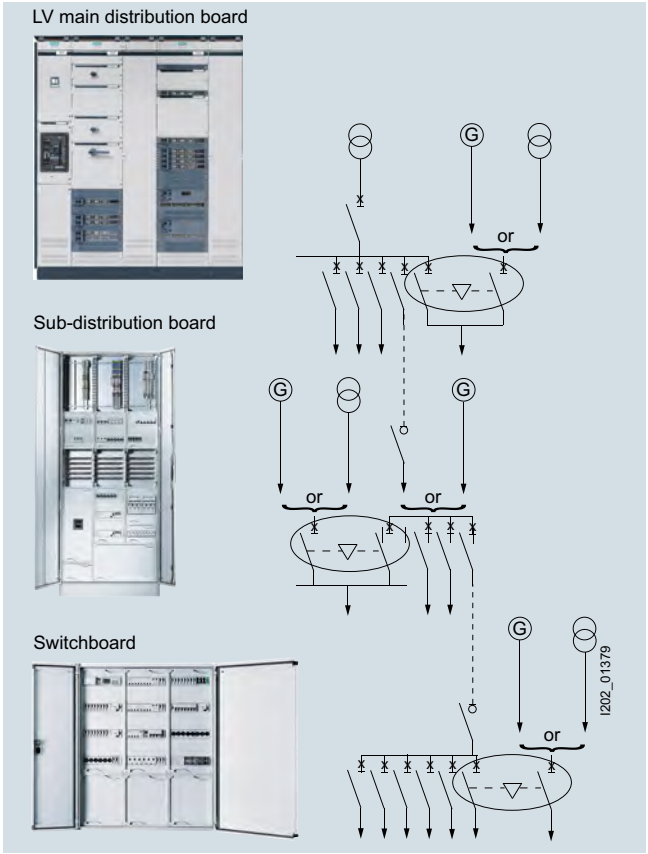
The 3KC ATC5300 and ATC3100 transfer control devices control the transfer between the main and standby power supplies fully automatically, while incorporating set limit values and delay times. They detect fluctuations occurring in the main power supply quickly and switch to the standby power supply. The control devices only switch to the standby power supply after they have ensured that the standby supply is delivering the required power supply quality. The devices switch back to the main power supply taking into consideration the set parameters once the required power supply quality is available again. If the standby power supply and/or the main power supply is fed by a generator, the control devices also offer a wide range of settings, such as a generator lead time, generator delay time, and generator start test at specified times.

The 3KC ATC transfer control devices can control air circuit breakers, molded case circuit breakers, switch disconnectors and contactors. The circuit breakers are controlled via the related motorized operating mechanisms.

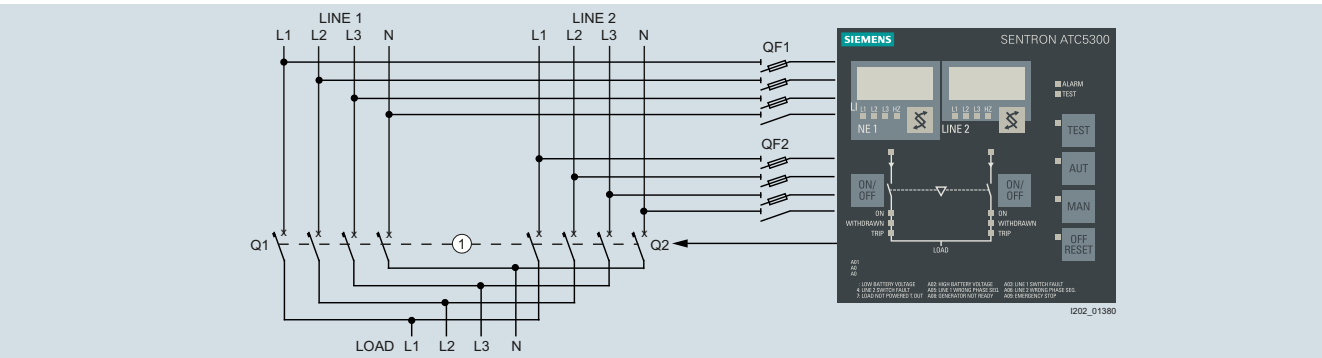
Q1 and Q2, configured with circuit breakers

All circuit breakers connected to the 3KC ATC5300 or ATC3100 transfer control device must be equipped with the following accessories:

- 3VL/3VA molded case circuit breakers
  The following is also required for each molded case circuit breaker:
  - One motorized operating mechanism
  - One alarm switch
  - Two auxiliary switches 1 NO/1 NC
- 3WL air circuit breakers
  The following is also required for each air circuit breaker:
  - One motorized operating mechanism
  - One closing solenoid
  - One auxiliary release (shunt release)
  - One tripped signal switch
  - One auxiliary switch block 2 NO/2 NC (standard fittings)



Applications in low-voltage power distribution



Implementation of an automatic transfer (according to IEC 60947-6-1); ① interlocking

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Technical specifications

		ATC5300	ATC3100
Metering inputs			
Max. rated voltage U_n			
• Phase-phase	V AC	690	400
• Phase-neutral	V AC	400	230
Phase-phase measuring range	V AC	80 ... 800	161 ... 264
Frequency range	Hz	45 ... 65	50 ... 60
Measuring method		RMS value (true RMS)	
Measuring input impedance			
• Phase-phase	MΩ	> 1.1	
• Phase-neutral	MΩ	> 0.5	> 1.1
Connection method		1, 2 or 3-phase system	4-phase system
Measuring errors		± 0.25%, value range ± 5%	
Auxiliary supply			
Operating range			
• AC	V AC	187 ... 264	161 ... 264
• DC	V DC	9 ... 70	18 ... 36
Rated voltage U_n			
• AC	V AC	220 ... 240	
• DC	V DC	12/24/48	24
Frequency	Hz	45 ... 65	50 ... 60
Max. power consumption at U_n = 240 V AC	VA	9	18 ... 36
Max. power loss			
• At 240 V AC	W	6.3	4
• At 48 V DC	W	4.1	4
Max. power consumption			
• At 12 V DC	mA	300	--
• At 24 V DC	mA	180	120
• At 48 V DC	mA	90	--
Safety in the event of short interruptions	ms	50	--
Digital inputs			
Number of inputs		8, 6 of which are programmable	5
Type of input		Negative	--
Input current	mA	≤ 10	--
Input signal			
• Logic state "0"	V	≤ 1.5 (typical 2.9)	--
• Logic state "1"	V	≥ 5.3 (typical 4.3)	--
Input signal delay	ms	≥ 50	--
Relay outputs			
Number of outputs		7, 5 of which are programmable	7
Contact configuration			
• 2 relays		1 NO, 12 A, 250 V AC (AC1)	
• 3 relays		1 NO, 8 A, 250 V AC (AC1)	
• 2 relays		1 CO, 8 A, 250 V AC (AC1)	
• 1 relay		1 NO, 12 A, 250 V AC	
• 4 relays		1 NO, 8 A, 250 V AC	
• 2 relays		2 CO, 8 A, 250 V AC	
Reversing time of control device	s	1	0.5
Communication cables			
RS 232 serial interface • With programmable transmission rate • Connection through RJ6/6 connector	bit/s	1200 ... 38400	--
RS 485 serial interface • Optically insulated • With programmable transmission rate • Connection through plug-in terminals	bit/s	1200 … 38400	--
Real-time clock			
Energy storage		Stored-energy capacitors	--
Operating time without supply voltage	days	Approx. 12 ... 15	--

		ATC5300	ATC3100
Insulation voltage			
Rated insulation voltage U_i	V	690	400
Ambient conditions			
Operating temperature	°C	-20 … +60	-25 … +70
Storage temperature	°C	-30 … +80	-40 … +80
Relative humidity	%	< 90	95
Max. pollution degree		3	
Overvoltage category		3	
Measuring category		CAT III	CAT IV
Connections			
Terminal type		Removable/pluggable	
Cable cross-section	mm^2	0.2 ... 2.5 (24 ... 12 AWG)	
Max. tightening torque	Nm	0.5 (4.5 lbf·in)	0.4
Enclosure			
Enclosure material		Thermoplast LEXAN 3412R	Thermoplast Bayblend FR3010
Version		Door installation	Door installation, standard rail mounting, floor mounting
Degree of protection		IP41 front, IP20 rear	
Weight	g	950	1050
Certificates and conformity			
Tested ATS/ATSE standards:		IEC60947-6-1	
		GB14048.11	
		UL 508	--
		CSA 22.2 No. 14	--
ATS/ATSE standard fulfilled in combination with:		3WL, 3VL, 3VA	3WL, 3VL
EMC		Acc. to IEC 60947-6-1	

For more information, see manual at:
www.siemens.com/lowvoltage/manuals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



3KC ATC5300 transfer control device

Communication with Modbus protocol

For communication, the 3KC ATC5300 supports the Modbus RTU and Modbus ASCII protocol through the RS 232 and RS 485 interfaces. The 3KC ATC5300 provides all available data of the transfer control system and the networks through these interfaces. Additionally, the ATC5300 can be controlled through these interfaces. These functions make it possible to integrate the ATC5300 into additional monitoring software (e.g. SCADA) or other intelligent devices that support Modbus (e.g. Siemens PLCs) and to control it.

Compatibility with 3VA

The 3KC ATC5300 fulfils the IEC 60947-6-1 (ATS/ATSE) standard in combination with the 3VA molded case circuit breakers.
You will find further information on the 3VA molded case circuit breakers in the manual:
www.siemens.com/lowvoltage/manuals.

Parameterizing and monitoring using 3KC ATC5300 software or Siemens powerconfig

In addition to operation and parameterization on-site, you can also monitor and set the parameters of the controllers using the 3KC ATC5300 and Siemens powerconfig software. Both offer a high level of convenience and quick access to all device settings, e.g. complex settings that arise when connecting generators.

Benefits

The advantages of the 3KC ATC5300 transfer control device at a glance:

- Two measuring inputs for single-phase and multi-phase power supply systems
- Costs of installing the transformer are dispensed with
- Has two voltage supply units to cover all standard AC/DC voltage supplies, alternative supply via main and standby system possible
- Two displays for monitoring the normal/standby system and displaying the phase and interlinked cable voltages
- Calendar clock
- 8 digital inputs, 6 of which are programmable, and 7 relay outputs, 5 of which are programmable
- Data, parameters and logged events (e.g. power failure, faults) remain accessible and unaltered even after a power failure or restarting a device
- Logging and statistical processing of occurring events possible
- The illuminated LED display makes reading measured values and parameters easy, even in unfavorable lighting conditions
- The 3KC ATC5300 programming or powerconfig software saves considerable time when setting parameters and setting up the 3KC ATC5300 transfer control device
- Generator test run function for mandatory testing intervals

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price pro PU	PU (UNIT, SET, M)	PS	PG
			Screw connection				
	**3KC ATC5300 transfer control device** Control panel instrument 144 x 144 x 94 mm with the following features: • Screw terminal connection • AC/DC power supply unit • 220 … 240 V AC, 45 ... 65 Hz • 9 ... 70 V DC • Rated setting range: 100 … 690 V AC		**3KC9000-8TL30**		1	1 unit	
	**3KC ATC5300 software** Software for setting parameters and remote control operations, incl. connection cable from control device to PC, cable length 1.8 m • CD incl. software and manuals • Minimum hardware and software requirements: - Pentium, 64 MB RAM - COM interface (serial RS 232) - CD drive - Windows 95/98/2000/XP/Vista		**3KC9000-8TL70**		1	1 unit	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3KC ATC3100 transfer control devices

Overview



3KC ATC3100 transfer control device

Convenient handling

The 3KC ATC3100 transfer control device offers customers flexible and fast commissioning for implementing simple applications. The 3KC ATC3100 can be mounted in a control cabinet door, on a standard rail or on a rear panel without additional accessories. By default, the transfer control device is supplied with a lockable safety cover (IP41). The connecting cable is pre-assembled to assist fast cabling.
The 3KC ATC3100 can be configured without software. Thanks to the well-thought-out concept, automatic changeover applications can be implemented with ease.

3KC ATC3100 connecting cable for MCCB/ACB

You need the pre-assembled connecting cable (3KC9000-8EL62) to connect 3VL or 3WL molded case circuit breakers.

With this cable, connection of the molded case circuit breakers is fast and easy.

Benefits

The advantages of the 3KC ATC3100 transfer control device at a glance:

- Costs of installing the transformer are dispensed with
- Integrated DPS (double power supply) powers the motorized operating mechanisms of the connected circuit breakers for reliable switching
- Good readability of the system status by means of 10 LEDs
- 3 mounting options without additional accessories: door installation, standard rail mounting and floor mounting
- Pre-assembled cable set for fast wiring to 3VL and 3WL molded case circuit breakers
- Terminal available for external 24 V DC power supply unit

Integration

Implementation of an automatic transfer

The 3KC ATC3100 transfer control device is used to automatically and manually switch from a main power supply to a standby power supply and vice versa. In the event that system faults occur, the 3KC ATC3100 transfer control device controls the switching operations fully automatically. This ensures a very high level of operational continuity.

The 3KC ATC3100 transfer control device allows implementation of an automatic transfer in conjunction with molded case circuit breakers, air circuit breakers and switch disconnectors.

The following devices are ideally matched to the 3KC ATC3100 transfer control device:

- 3VA molded case circuit breakers
- 3VL molded case circuit breakers
- 3WL air circuit breakers

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price pro PU	PU (UNIT, SET, M)	PS	PG
			Screw connection				
	**3KC ATC3100 transfer control device** [1] Control panel instrument 171 x 131 x 99 mm with the following features: • Screw terminal connection • Rated setting range: 280 – 460 V AC • Aux. 24 V DC voltage • English labeling (Chinese labeling on request)		**3KC9000-8EL10**		1	1 unit	
	3KC ATC3100 connecting cable Necessary measurement and control cable for connection of 3KC ATC3100 to 3VL or 3WL • Cable 1.8 m long		**3KC9000-8EL62**		1	1 unit	

[1] For the 3KC ATC3100 transfer control device you additionally need the 3KC ATC3100 connecting cable (3KC9000-8EL62).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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9/2 **Introduction**

9/5 **5TE8 control switches**

9/8 **5TE48 pushbuttons**

9/11 **5TE58 light indicators**

9/13 **5TE81/82 On/Off switches**

9/16 **5TL1 On/Off switches**

9/20 **5TE DC isolators**

9/22 **5ST busbars for modular installation devices**

9/24 **5TT4 remote control switches** NEW

9/32 **5TT4 switching relays**

5TT5 Insta contactors
9/34 5TT50 Insta contactors, AC/DC technology
9/37 5TT58 Insta contactors, AC technology

9/41 **5TT3 soft-starting devices**

7LF, 5TT3 timers
9/42 7LF4 digital time switches
9/47 7LF5 mechanical time switches
9/50 7LF6 timers for buildings
9/53 5TT3 timers for industrial applications

For further technical product information:

Configuration Manual

Switching Devices
Article No.: 3ZW1012-5TT57-0AC1

Siemens Industry Online Support:

www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Introduction

Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**5TE8 control switches**	9/5	For the switching of lighting and other electrical devices up to 20 A. For use in control cabinets for the logical linking of functions.	IEC/EN 60947-3, (VDE 0660-107); IEC/EN 60669-1, (VDE 0632-1); GB 14048.3 CCC	✓	✓	✓
	**5TE48 pushbuttons**	9/8	To be used as pushbuttons in control systems, e.g. to switch on seal-in circuits or as pushbuttons with maintained-contact function for manual use, as control switches or for the switching of loads up to 20 A.	IEC/EN 60947-3, (VDE 0660-107); IEC/EN 60669-1, (VDE 0632-1); GB 14048.3 CCC	✓	--	✓
	**5TE58 light indicators**	9/11	Light indicators for signaling switching states or faults in systems.	DIN VDE 0710-1-11	✓	--	✓
	**5TE81/82 On/Off switches**	9/13	For switching of lighting, motors and other electrical devices. TE81: 20 A TE82: 32 A.	20 A: IEC/EN 60947-3, (VDE 0660-107); IEC/EN 60669-1 32 A: IEC/EN 60947-3, (VDE 0660-107)	✓	✓	✓
	**5TL1 On/Off switches**	9/16	On/Off switches used for lighting control and for switching motors and other electric loads, for example.	32 A ... 125 A: IEC/EN 60947-3, (VDE 0660-107)	✓	✓	✓
	**5TE DC isolators**	9/20	The DC isolator is a special switch disconnector for switching DC loads.	IEC/EN 60947-3; IEC/EN 60669-1; GB 14048.3 CCC	✓	✓	✓
	**5ST busbars for modular installation devices**	9/22	For fast and safe connection.	IEC/EN 60439-1, (VDE 0660-500)	✓	--	✓

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**5TT4 remote control switches**	9/24	For the switching of lighting up to 63 A in rooms using several pushbuttons and central On/Off switches.	IEC 60669-1; IEC 60669-2-2; EN 60669-1-1, (VDE 0632) EN 60669-2-2, (VDE 0632-2-2)	✓	✓	✓
	**5TT4 switching relays**	9/32	For the switching of small loads up to 16 A or as coupling devices in control systems.	EN 60947-5-1, (VDE 0660-200) EN 60947-1, (VDE 0660-100) GB 14048.5 CCC	✓	--	✓
5TT5 Insta contactors							
	**5TT50 Insta contactors, AC/DC technology**	9/34	Insta contactors 20 A, 25 A, 40 A and 63 A for the switching of heating, lighting, such as fluorescent lamps, incandescent lamps, ohmic or inductive loads.	IEC 60947-4-1; IEC 60947-5-1; IEC 61095; EN 60947-4-1; EN 60947-5-1; EN 61095; VDE 0660; UL 508; GB 14048.4 CCC	✓	✓	✓
	**5TT58 Insta contactors, AC technology**	9/37	Insta contactors 20 A, 25 A, 40 A and 63 A for the switching of heating, lighting, such as fluorescent lamps, incandescent lamps, ohmic or inductive loads.	IEC 60947-4-1; IEC 60947-5-1; IEC 61095; EN 60947-4-1; EN 60947-5-1; EN 61095; VDE 0660; NF C 61-480, (NF EN 61095)	✓	✓	✓
	**5TT3 soft-starting devices**	9/41	Protection of machines with transmission, belt or chain drives, conveyor belts, fans, pumps, compressors, packing machines or door operating mechanisms.	EN 60947-4-2, (VDE 0660-117)	--	--	✓

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Introduction

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
7LF, 5TT3 timers							
	**7LF4 digital time switches**	9/42	Minute-precise switching of devices and system components in day, week and year programs. Unique due to the wide variety of functions offered by the Mini and Top versions; for PC programming Astro, Profi and Expert.	IEC 60730-1 and IEC 60730-2-7; EN 60730-1 and EN 60730-2-7; VDE 0631-1 and -2-7	✓	✓	✓
	**7LF5 mechanical time switches**	9/47	Accurate and 15-minute switching accuracy. With automatic time setting during commissioning and automatic switching to daylight savings.	IEC 60730-1 and IEC 60730-2-7; EN 60730-1 and EN 60730-2-7; VDE 0631-1 and -2-7; UL 60730 UL 917	✓	✓	✓
	**7LF6 timers for buildings**	9/50	Lighting controls with stairwell lighting timers ensure the safe use of stairwells and save energy. Expanded applications for common rooms and garages, as well as the time switching of ventilators and fluorescent lamps.	IEC 60699; EN 60669, DIN 18015	✓	✓	--
	**5TT3 timers for industrial applications**	9/53	Multifunctional, delay, wiper, flashing and Off-delay timers in control circuits expand the use of distribution boards in both small and large plants.	IEC 60255; EN 60255	--	--	✓

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Two-way switches are used in control cabinets and distribution boards for switching small loads on/off or over.

Group switches with center position permit the positions open/stop/closed, for example to control counter-clockwise rotation – Off – clockwise rotation.

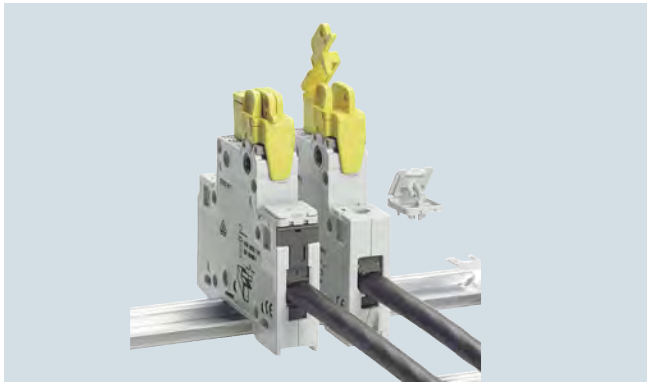
Control switches in a range of contact versions have an integral control lamp for the On setting.

The auxiliary switch (AS) signals the contact position of the switch. It has the same design as the auxiliary switch used for the miniature circuit breakers (see chapter "Miniature Circuit Breakers").

Benefits



- The control switches can be bus-mounted with each other or with 5TE48 pushbuttons, 5TE58 light indicators or 5TT41 remote control switches and 5TT42 switching relays
- For busbars, see from page 9/22 onwards



- The handle locking device prevents undesired/inadvertent mechanical on/off switching
- The handle locking device is a universal accessory for all switches and miniature circuit breakers

Technical specifications

			5TE81
Standards			IEC/EN 60947-3 (VDE 0660-107); IEC/EN 60669-1 (VDE 0632-1)
Approvals			IEC/EN 60947-3 (VDE 0660-107) GB 14048.3-2008 CCC
Rated operational current I_e	Per conduct. path	A	20
Rated operational voltage U_e	1-pole Multi-pole	V AC V AC	230 400
Rated power dissipation P_v	Contact per pole	VA	0.7
Thermal rated current I_{th}		A	20
Rated breaking capacity	At p.f. = 0.65	A	60
Rated making capacity	At p.f. = 0.65	A	60
Short-circuit strength In conjunction with fuse of the same rated operational current	EN 60269 gL/gG	kA	10
Rated impulse withstand voltage U_{imp}		kV	> 5
Clearances	Open contacts Between the poles	mm mm	2 x > 2 > 7
Creepage distances		mm	> 7
Mechanical service life	Switching cycles		25000
Electrical service life	Switching cycles		10000
Minimum contact load		V; mA	10; 300
Rated short-time currents Per conducting path at p.f. = 0.7 (The respective rated surge current can be calculated by multiplying by a factor of 1.5).	 Up to 0.2 s Up to 0.5 s Up to 1 s Up to 3 s	 A A A A	 650 400 290 170
Terminals Max. tightening torque	± Screw (Pozidriv)	 Nm	1 0.8 ... 1.0
Conductor cross-sections	Rigid Flexible, with end sleeve	mm^2 mm^2	1 ... 6 1 ... 6
Permissible ambient temperature		°C	-5 ... +40
Resistance to climate At 95% relative humidity	Acc. to DIN 50015	°C	45

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	I_e	U_e	Conductor cross-sections	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC	up to mm²	MW	d					
	**Two-way switches (20 A)**										
	With sealable switch position, separate handle locking device can be retrofitted										
	Retroffitable auxiliary switch										
	1 NO, 1 NC	20	400	6	1	▶	**5TE8151**		1	1 unit	1BK
	Auxiliary switch cannot be retrofitted										
	2 NO, 2 NC	20	400	6	1		**5TE8152**		1	1 unit	1BK
	3 NO, 1 NC	20	400	6	1		**5TE8153**		1	1 unit	1BK
	1 CO	20	230	6	1	▶	**5TE8161**		1	1 unit	1BK
	2 CO	20	400	6	1	▶	**5TE8162**		1	1 unit	1BK
	**Group switches with center position (20 A)**										
	With sealable switch position, separate handle locking device can be retrofitted										
	Auxiliary switch cannot be retrofitted										
	1 CO	20	230	6	1	▶	**5TE8141**		1	1 unit	1BK
	2 CO	20	400	6	1	▶	**5TE8142**		1	1 unit	1BK
	**Control switches (20 A)**										
	With fixed mounted glow lamp 230 V or diode 48 V, with replaceable, white transparent luminescent cap, with sealable switch position, separate handle locking device can be retrofitted										
	Auxiliary switch cannot be retrofitted										
	1 NO	20	230	6	1	▶	**5TE8101**		1	1 unit	1BK
		20	48	6	1		**5TE8101-3**		1	1 unit	1BK
	1 NO, for max. 150 m cable length										
		20	230	6	1		**5TE8105**		1	1 unit	1BK
	2 NO	20	400	6	1		**5TE8102**		1	1 unit	1BK
	3 NO	20	400	6	1		**5TE8103**		1	1 unit	1BK
	With mounted auxiliary switch (1 NO, 1 NC)										
	3 NO	20	400	6	1.5		**5TE8108**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	d					
	**Auxiliary switches (AS)** For right-hand-side retrofitting with factory-fitted brackets, for further technical specifications, see chapter "Miniature Circuit Breakers"							
	1 NO + 1 NC	0.5	▶	**5ST3010**		1	1 unit	1AD
	2 NO	0.5		**5ST3011**		1	1 unit	1AD
	2 NC	0.5		**5ST3012**		1	1 unit	1AD
	**Handle locking devices** For all 5TE8 switches, can be sealed against undesired/inadvertent mechanical On/Off switching, for padlock with max. 3 mm shackle	--		**5ST3801**		1	1 unit	1AD
	**Spacers** Contour for modular devices with a mounting depth of 70 mm; can be snapped onto either side of the busbar, so that two spacers allow for convenient cable routing	0.5		**5TG8240**		1	2 units	1BK
	**Cap sets** For manual changing of the luminous plates for 5TE810 control switches Cap set comprising 1 red, green, yellow, white and blue plate each	--		**5TG8068**		1	1 set	1BK

For busbars for control switches, see page 9/22.

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5TE48 pushbuttons

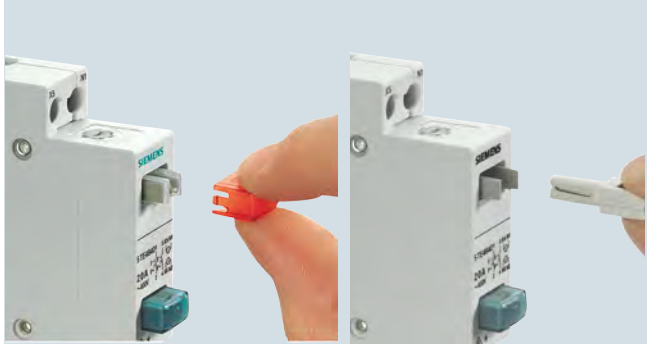
Overview

The pushbuttons are used in control systems, e.g. to switch on seal-in circuits or as pushbuttons with maintained-contact function for manual use, as control switches or for the switching of loads up to 20 A.

Benefits



- Pushbuttons with setting function for momentary-contact or maintained-contact operation can be changed over after installation and connection
- Pushbuttons and light indicators with separate infeed in one device. This means they can also be used for voltages other than the switching voltage
- In the case of devices with two pushbuttons and two lamps, each pushbutton must be set separately



- Pilot lights and caps can also be safely replaced during operation without the use of tools. Functionality is quickly restored.
- Transparent caps in different colors are used to indicate system states according to IEC 60073. Three indications are possible for each device – this saves space

9

Technical specifications

			5TE48
Standards			IEC/EN 60947-3; IEC/EN 60669-1
Approvals			IEC/EN 60947-3 (VDE 0660-107)
Rated operational current I_e	Per conduct. path	A	20
Rated operational voltage U_e	1-pole Multi-pole	V AC V AC	230 400
Rated power dissipation P_v	Per pole	VA	0.6
Thermal rated current I_{th}		A	20
Rated breaking capacity	At p.f. = 0.65	A	60
Rated making capacity	At p.f. = 0.65	A	60
Rated impulse withstand voltage U_{imp}		kV	> 5
Clearances	Open contacts Between the poles	mm mm	2 × > 2 > 7
Creepage distances		mm	> 7
Mechanical service life	Switching cycles		25000
Minimum contact load		V; mA	10; 300
Rated short-time currents Per conducting path at p.f. = 0.7 (The respective rated surge current can be calculated by multiplying by a factor of 1.5).	 Up to 0.2 s Up to 0.5 s Up to 1 s Up to 3 s	 A A A A	 650 400 290 170
Terminals Max. tightening torque	± Screw (Pozidriv)	 Nm	1 0.8 ... 1.0
Conductor cross-sections	Rigid Flexible, with end sleeve	mm^2 mm^2	1 ... 6 1 ... 6
Permissible ambient temperature		°C	-5 ... +40
Resistance to climate At 95% relative humidity	 Acc. to DIN 50015	 °C	 45

Power loss of 5TG805.-. LEDs		**5TG805.-.**
Rated power dissipation P_v • LED	 VA	 0.4

Color	**Color coding according to IEC 60073**		
	Safety of people or environment	Process state	System state
Red	Danger	Emergency	Faulty
Yellow	Warning/Caution	Abnormal	
Green	Safety	Normal	
Blue	Stipulation		
White, Gray, Black	No special significance assigned		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	I_e	U_e	Conductor cross-sections	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC	up to mm²	MW	d					
	**Pushbuttons without maintained-contact function**										
	1 NO, 1 NC										
	1 gray pushbutton	20	400	6	1	▶	**5TE4800**		1	1 unit	1BK
	1 red pushbutton	20	400	6	1		**5TE4805**		1	1 unit	1BK
	1 green pushbutton	20	400	6	1		**5TE4806**		1	1 unit	1BK
	1 yellow pushbutton	20	400	6	1		**5TE4807**		1	1 unit	1BK
	1 blue pushbutton	20	400	6	1		**5TE4808**		1	1 unit	1BK
	2 NO, 2 NC NEW										
	1 gray pushbutton	20	400	6	1		**5TE4801-2**		1	1 unit	1BK
	3 NO, 1 NC NEW										
	1 gray pushbutton	20	400	6	1		**5TE4802**		1	1 unit	1BK
	1 NO, 1 NO										
	1 green pushbutton, 1 blue pushbutton	20	400	6	1		**5TE4804**		1	1 unit	1BK
	Pushbuttons with maintained-contact function										
	1 NO, 1 NC										
	1 gray pushbutton	20	400	6	1		**5TE4810**		1	1 unit	1BK
	2 NO										
	1 gray pushbutton	20	400	6	1		**5TE4811**		1	1 unit	1BK
	2 NO, 2 NC NEW										
	1 gray pushbutton	20	400	6	1		**5TE48011-2**				
	3 NO + N										
	1 gray pushbutton	20	400	6	1		**5TE4812**		1	1 unit	1BK
	4 NC										
	1 gray pushbutton	20	400	6	1		**5TE4813**		1	1 unit	1BK
	3 NO, 1 NC NEW										
	1 gray pushbutton	20	400	6	1		**5TE4812-1**		1	1 unit	1BK
	2 CO										
	1 gray pushbutton	20	400	6	1		**5TE4814**		1	1 unit	1BK
	**Control pushbuttons with maintained-contact function or momentary-contact function and lamp, 230 V, for max. 5 m cable length**										
	1 NO, 1 NC										
	1 red pushbutton	20	400	6	1	▶	**5TE4820**		1	1 unit	1BK
	1 NO										
	1 red pushbutton	20	230	6	1	▶	**5TE4821**		1	1 unit	1BK
	2 NO										
	1 red pushbutton	20	400	6	1		**5TE4823**		1	1 unit	1BK
	2 NC										
	1 red pushbutton	20	400	6	1		**5TE4824**		1	1 unit	1BK
	Control pushbuttons with maintained-contact function or momentary-contact function and lamp, 230 V, for max. 150 m cable length										
	1 NO										
	1 red pushbutton	20	230	6	1		**5TE4822**		1	1 unit	1BK
	**Double pushbuttons with maintained-contact function and/or momentary-contact function**										
	1 NO and 1 NC, 1 green pushbutton, 1 red pushbutton	20	400	6	1		**5TE4830**		1	1 unit	1BK
	1 NO, 1 NC and 1 NO, 1 NC 1 green pushbutton, 1 red pushbutton	20	400	6	1		**5TE4831**		1	1 unit	1BK
	**Double pushbuttons with maintained-contact function and/or momentary-contact function and two lamps, 230 V, for max. 5 m cable length**										
	1 NO and 1 NO, 1 green pushbutton, 1 red pushbutton	20	400	6	1		**5TE4840**		1	1 unit	1BK
	1 NO and 1 NC, 1 green pushbutton, 1 red pushbutton	20	400	6	1		**5TE4841**		1	1 unit	1BK

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	Version	I_e	U_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mA	V	d					
	**LEDs for manual replacement**								
	White	0.4	12 ... 60 AC/DC		**5TG8056-0**		1	5 units	1BK
	Red				**5TG8056-1**		1	5 units	1BK
	Yellow				**5TG8056-2**		1	5 units	1BK
	Green				**5TG8056-3**		1	5 units	1BK
	Blue				**5TG8056-4**		1	5 units	1BK
	White	0.4	115 AC/DC		**5TG8057-0**		1	5 units	1BK
	Red				**5TG8057-1**		1	5 units	1BK
	Yellow				**5TG8057-2**		1	5 units	1BK
	Green				**5TG8057-3**		1	5 units	1BK
	Blue				**5TG8057-4**		1	5 units	1BK
	White	0.4	230 AC		**5TG8058-0**		1	5 units	1BK
	Red				**5TG8058-1**		1	5 units	1BK
	Yellow				**5TG8058-2**		1	5 units	1BK
	Green				**5TG8058-3**		1	5 units	1BK
	Blue				**5TG8058-4**		1	5 units	1BK
	Cap sets, manually replaceable with colored caps with or without lamps								
	Gray, non-transparent (1 set = 5 units)				**5TG8060**		1	1 set	1BK
	Red, transparent (1 set = 5 units)				**5TG8061**		1	1 set	1BK
	Green, transparent (1 set = 5 units)				**5TG8062**		1	1 set	1BK
	Yellow, transparent (1 set = 5 units)				**5TG8063**		1	1 set	1BK
	Blue, transparent (1 set = 5 units)				**5TG8064**		1	1 set	1BK
	Black, non-transparent (1 set = 5 units)				**5TG8065**		1	1 set	1BK
	White, transparent (1 set = 5 units)				**5TG8066**		1	1 set	1BK
	Red and green (1 set contains 10 lamps per color), Yellow, blue and white (1 set contains 5 lamps per color)				**5TG8067**		1	1 set	1BK
	Red, green, yellow (1 set = 3 units)				**5TG8070**		1	1 set	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Light indicators are used to signal switching states or faults in systems.

They are available as single, double or triple light indicators.

Benefits



- Pilot lights and caps can also be safely replaced during operation without the use of tools
- Transparent caps in different colors are used to indicate system states according to IEC 60073. Three indications are possible for each device
- The lamps are mounted in a slotted base, which protects against polarity reversal. This ensures the correct polarization for all DC applications
- The devices have preferred positions for the N terminals, so that it is possible to bus-mount several devices. This ensures fast and simple installation
- A light indicator with three lamps enables three-phase signaling and "traffic-light signaling" in a single modular width

Technical specifications

			5TE58
Standards			DIN VDE 0710-1-11
Rated operational voltage U_e	Max.	V AC	230 (for different voltages, see 5TG8 lamps)
Rated power dissipation P_V		VA	See 5TG8 lamps
Clearances	Between the terminals	mm	> 7
Terminals Max. tightening torque	± Screw (Pozidriv)	 Nm	1 1.2
Conductor cross-sections	Rigid Flexible, with end sleeve	mm^2 mm^2	1.5 .. 6 1 ... 6
Permissible ambient temperature		°C	-5 ... +40
Resistance to climate At 95% relative humidity	Acc. to DIN 50015	°C	 45

		5TG805.
Rated power dissipation P_V • LED	VA	 0.4

Color coding according to IEC 60073

	Meaning		
Color	Safety of people and environment	Process state	System state
Red	Danger	Emergency	Faulty
Yellow	Warning/Caution	Abnormal	
Green	Safety	Normal	
Blue	Stipulation		
White	No special significance assigned		

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Selection and ordering data

	Version	U_e	Conductor cross-sections	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	up to mm²	MW	d					
	**Light indicators for a max. cable length of up to 5 m**									
	With 1 red lamp	230	6	1	▶	**5TE5800**		1	1 unit	1BK
	With 2 lamps, green and red				▶	**5TE5801**		1	1 unit	1BK
	With 3 green lamps				▶	**5TE5802**		1	1 unit	1BK
	With 3 lamps, red, yellow and green				▶	**5TE5803**		1	1 unit	1BK
	**Light indicators for a max. cable length of up to 250 m**									
	With 1 red lamp	230	6	1		**5TE5804**		1	1 unit	1BK

	Version	I_e	U_e	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mA	V	d					
	**LEDs for manual replacement**								
	White	0.4	12 ... 60 AC/DC		**5TG8056-0**		1	5 units	1BK
	Red				**5TG8056-1**		1	5 units	1BK
	Yellow				**5TG8056-2**		1	5 units	1BK
	Green				**5TG8056-3**		1	5 units	1BK
	Blue				**5TG8056-4**		1	5 units	1BK
	White	0.4	115 AC/DC		**5TG8057-0**		1	5 units	1BK
	Red				**5TG8057-1**		1	5 units	1BK
	Yellow				**5TG8057-2**		1	5 units	1BK
	Green				**5TG8057-3**		1	5 units	1BK
	Blue				**5TG8057-4**		1	5 units	1BK
	White	0.4	230 AC		**5TG8058-0**		1	5 units	1BK
	Red				**5TG8058-1**		1	5 units	1BK
	Yellow				**5TG8058-2**		1	5 units	1BK
	Green				**5TG8058-3**		1	5 units	1BK
	Blue				**5TG8058-4**		1	5 units	1BK
	Cap sets for manual changing of colored caps								
	Red, transparent (1 set = 5 units)				**5TG8061**		1	1 set	1BK
	Green, transparent (1 set = 5 units)				**5TG8062**		1	1 set	1BK
	Yellow, transparent (1 set = 5 units)				**5TG8063**		1	1 set	1BK
	Blue, transparent (1 set = 5 units)				**5TG8064**		1	1 set	1BK
	White, transparent (1 set = 5 units)				**5TG8066**		1	1 set	1BK
	Red and green (1 set = 10 lamps per color) Yellow, blue and white (1 set = 5 lamps per color)				**5TG8067**		1	1 set	1BK
	Red, green, yellow (1 set = 3 units)				**5TG8070**		1	1 set	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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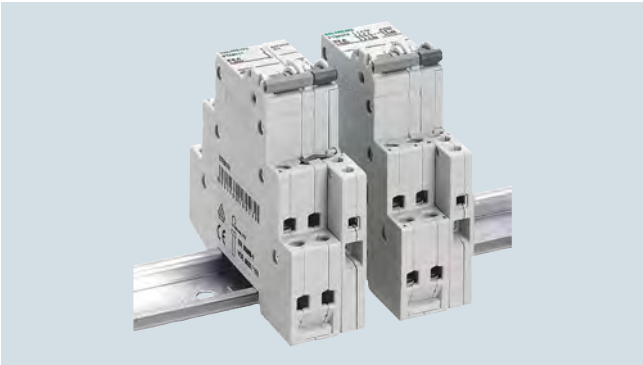
Overview

The devices are used for the switching of lighting, motors and other electrical devices.

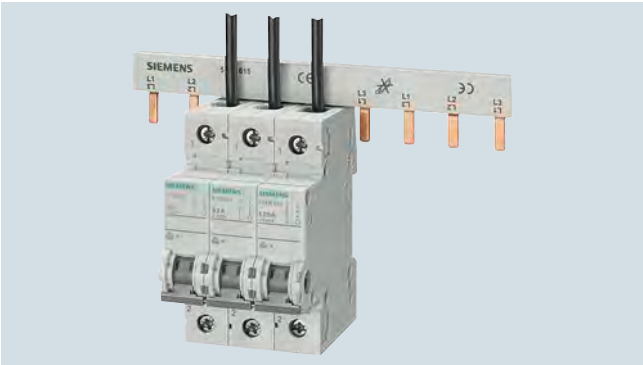
For rated currents of 20 A and 32 A, a compact series in a space-saving design is available with up to 4 NO contacts in one MW.

In addition, the 5TE2 device versions can be used as switch disconnectors according to EN 60947-1 And serve as main control switches for the disconnection or isolation of plants according to EN 60204-1.

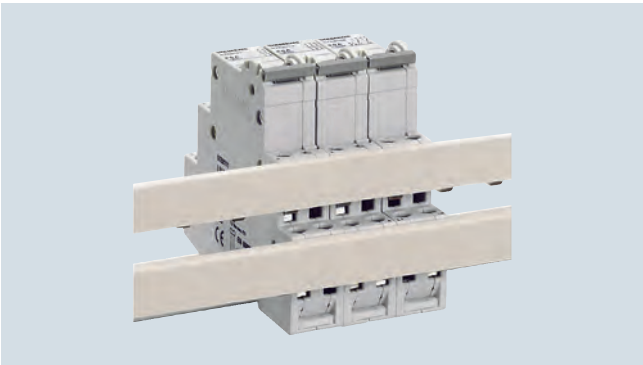
Benefits



- The switches can be retrofitted with auxiliary switches without the need for tools
- Uniform auxiliary switches for miniature circuit breakers and switches



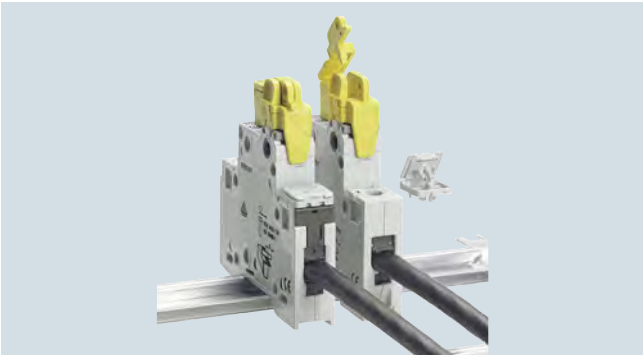
- Clear and visible conductor connection in front of the busbar for safe and easy mounting
- Optional top or bottom infeed as the terminals are identical



- The 20 A and 32 A switches can be bus-mounted with each other or with 5TE48 pushbuttons, 5TE58 light indicators or 5TT41 remote control switches and 5TT42 switching relays
- For busbars, see page 9/22



- Spacers can be used as compensating elements and have a width of 0.5 MW. They come with an integrated wiring duct for the insertion of conductors
- Two spacers installed on opposing side therefore offer space for large conductor cross-sections up to 15 mm in diameter



- The handle locking device prevents undesired/inadvertent mechanical on/off switching

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Technical specifications

			5TE81	5TE82
Standards			IEC/EN 60947-3, (VDE 0660-107); IEC/EN 60669-1	IEC/EN 60947-3, (VDE 0660-107)
Approvals			IEC/EN 60947-3 (VDE 0660-107)	
Rated operational current I_e	Per conduct. path	A	20	32
Rated operational voltage U_e	1-pole Multi-pole	V AC V AC	230 400	
Rated power dissipation P_v	Per pole, max.	VA	0.7	
Thermal rated current I_{th}		A	20	32
Rated breaking capacity	At p.f. = 0.65	A	60	96
Rated making capacity	At p.f. = 0.65	A	60	96
Rated short-circuit making capacity I_{cm} In conjunction with fuse of the same rated operational current	EN 60269 gL/gG	kA	10	
Rated impulse withstand voltage U_{imp}		kV	> 5	
Clearances	Open contacts Between the poles	mm mm	2 × > 2 > 7	
Creepage distances		mm	> 7	
Mechanical service life		Switching cycles	25000	
Electrical service life		Switching cycles	10000	
Minimum contact load		V; mA	10; 300	
Rated short-time withstand current I_{cw} Per conducting path at p.f. = 0.7 (The corresponding rated surge current can be established by multiplying by factor 1.5.)	Up to 0.2 s Up to 0.5 s Up to 1 s Up to 3 s	A A A A	650 400 290 170	1000 630 450 250
Terminals Max. tightening torque	± Screw (Pozidriv)	 Nm	1 1.2	
Conductor cross-sections	Rigid Flexible, with end sleeve	mm^2 mm^2	1.5 .. 6 1 ... 6	
Permissible ambient temperature		°C	-5 ... +40	
Resistance to climate At 95% relative humidity	Acc. to DIN 50015	°C	45	

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	I_e	U_e	Conductor cross-sections	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC	up to mm²	MW	d					
	**On/Off switches (20 A and 32 A)**										
	With sealable switch position, separate handle locking device can be retrofitted										
	Retroffitable auxiliary switch										
	1 NO	20	230	6	1	▶	**5TE8111**		1	1 unit	1BK
		32					**5TE8211**		1	1 unit	1BK
	2 NO	20	400	6	1	▶	**5TE8112**		1	1 unit	1BK
		32				▶	**5TE8212**		1	1 unit	1BK
	3 NO	20	400	6	1		**5TE8113**		1	1 unit	1BK
		32					**5TE8213**		1	1 unit	1BK
	Auxiliary switch cannot be retrofitted										
	3 NO + N	20	400	6	1		**5TE8114**		1	1 unit	1BK
		32				▶	**5TE8214**		1	1 unit	1BK
	With mounted auxiliary switch										
	3 NO + N	20	400	6	1.5		**5TE8118**		1	1 unit	1BK
		32					**5TE8218**		1	1 unit	1BK
	**Auxiliary switches (AS)**										
	For all 5TE8 switches, for right-hand-side retrofitting with factory-fitted brackets, for further technical specifications, see chapter "Miniature Circuit Breakers"										
	1 NO + 1 NC				0.5	▶	**5ST3010**		1	1 unit	1AD
	2 NO				0.5		**5ST3011**		1	1 unit	1AD
	2 NC				0.5		**5ST3012**		1	1 unit	1AD
	Auxiliary switches for low power										
	1 NO + 1 NC				0.5	▶	**5ST3013**		1	1 unit	1AD
	2 NO				0.5		**5ST3014**		1	1 unit	1AD
	2 NC				0.5		**5ST3015**		1	1 unit	1AD
	**Handle locking devices**										
	For all 5TE8 switches, can be sealed against undesired/inadvertent mechanical On/Off switching, for padlock with max. 3 mm shackle						**5ST3801**		1	1 unit	1AD
	**Terminal covers**										
	For all 5TE85 to 5TE88 switches, in 1 MW per pole version, for covering screw openings, sealable					▶	**5ST3800**		1	10 units	1AD
	**Spacers**										
	Contour for modular devices with a mounting depth of 70 mm; can be snapped onto either side of the busbar, so that two spacers allow for convenient cable routing				0.5		**5TG8240**		1	2 units	1BK

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5TL1 On/Off switches

Overview

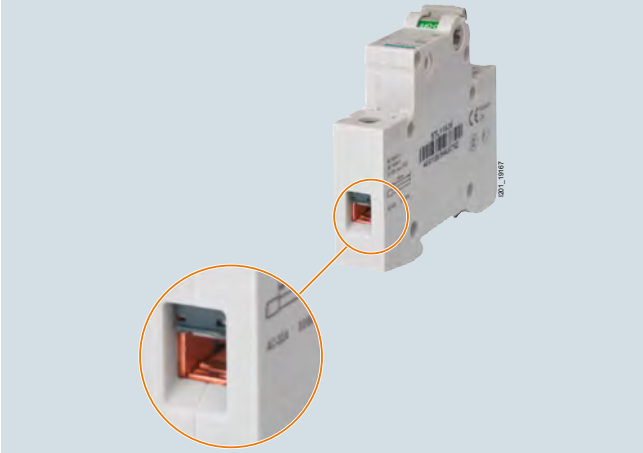
The new 5TL1 On/Off switches are used for the switching of lighting, motors and other electrical devices. Rated currents range between 32 A and 125 A. The new design of the 5TL1 On/Off switches allows them to be optically perfectly integrated in the series of RCCBs and MCBs.

In addition, the 5TL1 device versions can be used as switch disconnectors according to EN 60947-1. And serve as main control switches for the disconnection or isolation of plants according to EN 60204-1.

Benefits



- Attractive design
- Easily recognizable, colored switch position indication integrated in the operating handle
- Actuating elements in gray
- Ergonomically shaped handle and enclosure contours for user-friendly switching



- Simplified cable entry, thanks to square terminal design for joint accommodation of pin busbars with cables from 0.75 to 25 mm^2



- Effective shock-hazard protection when grasping
- Manual operation of the snap slide with latch-down option



- Terminal for accommodating 2 conductors of the same cross-section (single-wire up to 2 x 10 mm^2, finely stranded with end sleeve 2 x 4 mm^2)

Minimum order quantity (PS) or a multiple thereof can be ordered.

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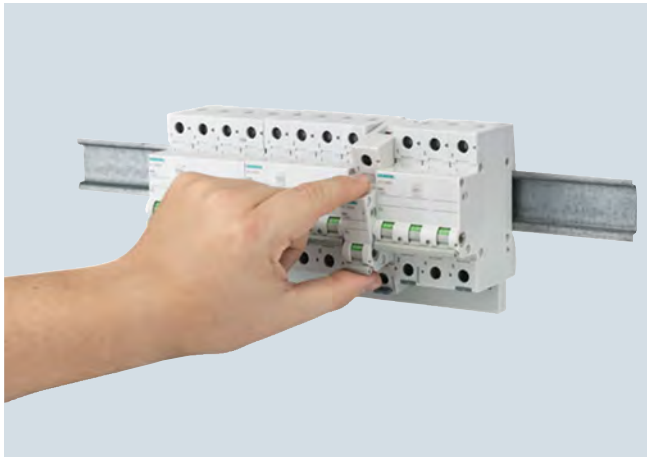

- Replacement of a device from the busbar-mounted assembly requires no tools



- The On/Off switches are ideal for quick and easy mounting of auxiliary switches

Technical specifications

			5TL1132 5TL1232 5TL1332 5TL1432 5TL1632	5TL1140 5TL1240 5TL1340 5TL1440 5TL1640	5TL1163 5TL1263 5TL1363 5TL1463 5TL1663	5TL1180 5TL1280 5TL1380 5TL1480 5TL1680	5TL1191 5TL1291 5TL1391 5TL1491 5TL1691	5TL1192 5TL1292 5TL1392 5TL1492 5TL1692
Standards			IEC/EN 60947-3 (VDE 0660-107)					
Approvals			EN 60669-1					
Rated operational current I_e	Per conduct. path	A	32	40	63	80	100	125
Rated operational voltage U_e	1-pole Multi-pole	V AC V AC	250 440					
Rated power dissipation P_v	Per pole, max.	VA	0.7	0.9	2.2	3.5	5.5	8.6
Thermal rated current I_{th}		A	32	40	63	80	100	125
Rated breaking capacity AC-22A	At p.f. = 0.65	A	96	120	196	240	300	375
Rated making capacity AC-22A	At p.f. = 0.65	A	96	120	196	240	300	375
Rated short-circuit making capacity I_{cm} In conjunction with fuse of the same rated operational current	EN 60269 gL/gG	kA	10					
Rated impulse withstand voltage U_{imp}		kV	>5					
Clearances	Open contacts Between the poles	mm mm	>7 >7					
Creepage distances		mm	>7					
Mechanical service life		Switching cycles	20000					
Electrical service life		Switching cycles	10000		5000	2000		
Minimum contact load		V; mA	24; 300					
Rated power Switching of resistive loads including moderate overload AC-21	1-pole 2-pole 3/4-pole	kW kW kW	5 9 15	6.5 11 15	10 18 30	13 22 39	16 28 48	16 28 48
Rated short-time withstand current I_{cw} Per conducting path at p.f. = 0.7 (The corresponding rated surge current can be established by multiplying by factor 1.5.)	Up to 0.2 s Up to 0.5 s Up to 1 s Up to 3 s	A A A A	760 500 400 280	950 630 500 350	1500 1000 800 560	2700 1650 1350 800	3400 2100 1700 1000	3400 2100 1700 1000
Terminals Max. tightening torque	± Screw (Pozidriv)	Nm	2 3.5					
Conductor cross-sections	Rigid Flexible, with end sleeve	mm^2 mm^2	1 ... 35 1 ... 25			2.5 ... 50 2.5 ... 50		
Permissible ambient temperature		°C	-5 ... +40					
Resistance to climate At 95% relative humidity	Acc. to DIN 50015	°C	45					

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	I_e	U_e	Conductor cross-sections	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			V AC	up to mm^2	MW	d					
	**On/Off switches (32 A to 125 A) can be used as switch disconnectors according to EN 60947-1**										
	With sealable switch position, separate handle locking device can be retrofitted, auxiliary switches can be retrofitted										
	1 NO, red handle	63	230	35	1		**5TL1163-1**		1	1 unit	1BK
		100		50			**5TL1191-1**		1	1 unit	1BK
	1 NO, gray handle	32		35			**5TL1132-0**		1	1 unit	1BK
		40					**5TL1140-0**		1	1 unit	1BK
		63					**5TL1163-0**		1	1 unit	1BK
		80		50			**5TL1180-0**		1	1 unit	1BK
		100					**5TL1191-0**		1	1 unit	1BK
		125					**5TL1192-0**		1	1 unit	1BK
	2 NO, red handle	63	400	35	2		**5TL1263-1**		1	1 unit	1BK
		100		50			**5TL1291-1**		1	1 unit	1BK
	2 NO, gray handle	32		35			**5TL1232-0**		1	1 unit	1BK
		40					**5TL1240-0**		1	1 unit	1BK
		63					**5TL1263-0**		1	1 unit	1BK
		80		50			**5TL1280-0**		1	1 unit	1BK
		100					**5TL1291-0**		1	1 unit	1BK
		125					**5TL1292-0**		1	1 unit	1BK
	3 NO, red handle	63	400	35	3		**5TL1363-1**		1	1 unit	1BK
		100		50			**5TL1391-1**		1	1 unit	1BK
	3 NO, gray handle	32		35			**5TL1332-0**		1	1 unit	1BK
		40					**5TL1340-0**		1	1 unit	1BK
		63					**5TL1363-0**		1	1 unit	1BK
		80		50			**5TL1380-0**		1	1 unit	1BK
		100					**5TL1391-0**		1	1 unit	1BK
		125					**5TL1392-0**		1	1 unit	1BK
	3 NO + N, red handle	63	400	35	4		**5TL1663-1**		1	1 unit	1BK
		100		50			**5TL1691-1**		1	1 unit	1BK
	3 NO + N, gray handle	32		35			**5TL1632-0**		1	1 unit	1BK
		40					**5TL1640-0**		1	1 unit	1BK
		63					**5TL1663-0**		1	1 unit	1BK
		80		50			**5TL1680-0**		1	1 unit	1BK
		100					**5TL1691-0**		1	1 unit	1BK
		125					**5TL1692-0**		1	1 unit	1BK
	4 NO, gray handle	32		35	4		**5TL1432-0**		1	1 unit	1BK
		40					**5TL1440-0**		1	1 unit	1BK
		63					**5TL1463-0**		1	1 unit	1BK
		80		50			**5TL1480-0**		1	1 unit	1BK
		100					**5TL1491-0**		1	1 unit	1BK
		125					**5TL1492-0**		1	1 unit	1BK
	**Auxiliary switches (AS)**										
	For all 5TL1 switches, for right-hand-side retrofitting with factory-fitted brackets, for further technical specifications, see chapter "Miniature Circuit Breakers"										
	1 NO + 1 NC				0.5	►	**5ST3010**		1	1 unit	1AD
	2 NO				0.5		**5ST3011**		1	1 unit	1AD
	2 NC				0.5		**5ST3012**		1	1 unit	1AD
	Auxiliary switches for low power										
	1 NO + 1 NC				0.5	►	**5ST3013**		1	1 unit	1AD
	2 NO				0.5		**5ST3014**		1	1 unit	1AD
	2 NC				0.5		**5ST3015**		1	1 unit	1AD

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	I_e	U_e	Conductor cross-sections	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC	up to mm^2	MW	d					
	**Handle locking devices** For all 5TL1 switches, can be sealed against undesired/inadvertent mechanical On/Off switching, for padlock with max. 3 mm shackle						**5ST3806**		1	5 units	1AD
	**Terminal covers** For all 5TL1 switches, in 1 MW per pole version, for covering screw openings, sealable					►	**5ST3800**		1	10 units	1AD
	**Spacers** Contour for modular devices with a mounting depth of 70 mm; can be snapped onto either side of the busbar, so that two spacers allow for convenient cable routing				0.5		**5TG8240**		1	2 units	1BK
	**Phase connectors** For easier wiring in various wiring versions and bus mountings or as a support terminal for conductors from 2.5 mm^2 to 50 mm2 1P	125	230	50	1		**5TL1192-4**		1	1 unit	1BK
	**N conductor connectors** For easier wiring in various circuit versions and bus mountings or as a support terminal for N conductors from 2.5 mm^2 to 50 mm^2 with blue color marking 1P	125	230	50	1		**5TL1192-3**		1	1 unit	1BK

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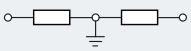
5TE DC isolators

Benefits

- Compact DIN rail device for applications up to 1000 V DC
- Separate switching position indication for unambiguous indication of the switching state
- Compatible with all miniature circuit breaker accessories – reduced stock-keeping
- The effective touch protection when grasping the device considerably exceeds the requirements of BGV A3
- Manual snap-on fixing and release systems that require no tools enable fast assembly and disassembly of switch disconnectors
- Clear and visible conductor connection that can be easily checked in front of the busbar

Technical specifications

			5TE2515-1
Standards			IEC/EN 60947-3, IEC/EN 60669-1, GB14048.3 CCC
Rated operational current I_e		A	63
Rated operational voltage U_e	For 4 poles in series	V DC	880
Rated power dissipation P_v	Per pole, max.	W	4.4
Rated short-time withstand current I_{cw}	1000 V DC, 4-pole	A	760
Rated short-circuit making capacity I_{cm}	1000 V DC, 4-pole	A	500
Rated impulse withstand voltage U_{imp}		kV	> 4
Maximum operating voltage U_{max}		V DC	1000
Overvoltage category			II at U = 880 V ... 440 V  I at U = 1000 V 
Mechanical service life		Switching cycles	10000
Electrical service life		Switching cycles	5000
Utilization category			DC-21B
Minimum contact load		V; mA	24; 300
Terminals Max. tightening torque	± Screw (Pozidriv)	 Nm	PZ 2 2.5 ... 3
Conductor cross-sections	Rigid Flexible, with end sleeve	mm^2 mm^2	0.75 ... 35 0.75 ... 25
Permissible ambient temperature		°C	-25 ... +45
Resistance to climate At 95% relative humidity	Acc. to DIN 50015	°C	45

Selection and ordering data

	Version	I_e	U_e	Conductor cross-sections	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V AC	up to mm^2	MW	d					
	**DC isolators** 1000 V DC, can be used as switch disconnectors according to EN 60947-3, with sealable switch position, separate handle locking device can be retrofitted, auxiliary switch can be retrofitted										
	4 NO	63	--	35	4		**5TE2515-1**		1	1 unit	1BK
	**Auxiliary switches (AS)** For all 5TE2 DC isolators, for right-hand-side retrofitting with factory-fitted brackets, for further technical specifications, see chapter "Miniature Circuit Breakers"										
	1 NO + 1 NC				0.5	▶	**5ST3010**		1	1 unit	1AD
	2 NO				0.5		**5ST3011**		1	1 unit	1AD
	2 NC				0.5		**5ST3012**		1	1 unit	1AD
	Auxiliary switches for low power										
	1 NO + 1 NC				0.5	▶	**5ST3013**		1	1 unit	1AD
	2 NO				0.5		**5ST3014**		1	1 unit	1AD
	2 NC				0.5		**5ST3015**		1	1 unit	1AD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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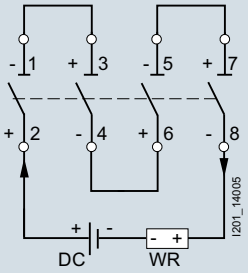
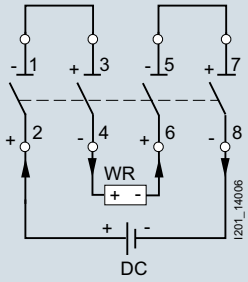
Configuration

For DC voltages up to 1000 V, the four poles need to be connected in series. In contrast to normal flush-mounting switches, these devices are also fitted with arcing chambers and permanent solenoids to aid the positive quenching of the electric arc in direct currents.

For this reason it is essential to comply with the polarity specifications of the switches when connecting the conductor. Suitable precautions should be taken during plant configuration to ensure there can be no polarity reversal in DC operation.





Legend:
WR: Inverter

9

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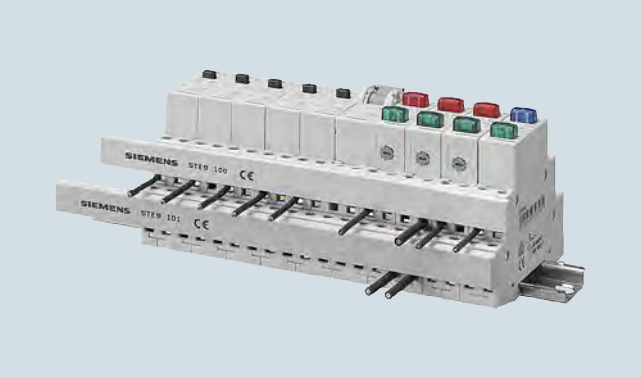
5ST busbars for modular installation devices

Overview

Siemens has developed a rail-mounting concept which makes the linking of switching devices just as easy as that of miniature circuit breakers.

The arrangement of the terminals on the devices is adapted to the bus mounting. With only two busbars, this saves considerable mounting time.

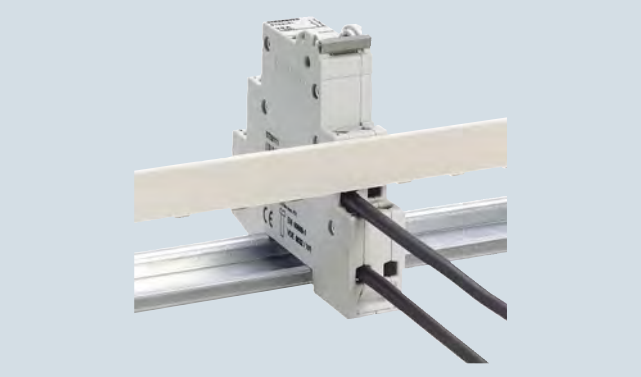
Benefits



- All 5TE8 switches (20 A and 32 A), 5TE48 pushbuttons, 5TE58 light indicators and 5TT41 remote control switches, 5TT42 switching relays and 5TL1 On/Off switches can be bus-mounted



- All 5TE8 switches (20 A and 32 A) in 1 MW can be fed via the single or two-phase busbars. Thus 2 two-phase busbars support a 4-pole infeed



- Infeed: The phase busbar is fed in at the tunnel terminal for conductors up to 6 mm^2 up to 32 A. No additional feeder terminals required

Minimum order quantity (PS) or a multiple thereof can be ordered.

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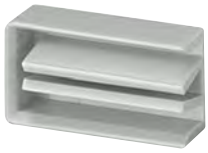
Selection and ordering data

	Version	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	d					
	**Single-phase busbars** For all 5TE8, 20 A and 32 A switches In the 12 MW version for the cutting of unused terminal lugs to ensure insulation clearances if one device terminal is to be supplied separately despite being mounted on the bus, modular clearance = 1 MW Busbar infeed to unit terminal with conductor cross-section of 6 mm^2 up to 32 A. Can be mounted top or bottom in the front or rear terminal area Note: An end cap is not required on single-phase busbars	210		**5TE9100**		1	10 units	1BK
	**Two-phase busbars** For all 5TE8, 20 A and 32 A switches In 12 MW version with 1 MW division, whereby the two busbars are offset by 0.5 MW Both copper conductors of the two-phase busbar are insulated together Busbar infeed to unit terminal with conductor cross-section of 6 mm^2 up to 32 A. Can be mounted from top or bottom, or in the front or rear terminal area, thus allowing realization of a 4-conductor connection using 2 two-phase busbars	220		**5TE9101**		1	10 units	1BK
	**End caps for two-phase busbars** End caps for 5TE9101 two-phase busbars to maintain insulation clearances when the bar is being cut 1 set = 10 units	--		**5TE9102**		1	1 set	1BK
	**5ST36 and 5ST37 busbar systems** All busbars of the 5ST36 and 5ST37 busbar systems can also be used for all 5TE8 switches from 32 A to 125 A in 1 MW per pole versions (see chapter "Miniature Circuit Breakers").	--						

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5TT4 remote control switches

Overview

Remote control switches up to 16 A and 20 up to 63 A NEW



5TT4101-0 remote control switch for AC applications, up to 16 A, 2 NO contacts (left)
5TT44 remote control switch for AC applications, 2 CO contacts (center)
5TT4930 auxiliary switch for 5TT44 remote control switches, 1 NO + 1 NC (right)

Remote control switches are used in residential and non-residential buildings, as well as the switchboard engineering sector. They trip in the event of "current inrushes", i.e. pulses, and then electromechanically save the switching position, even in the event of a power failure.

All the devices have the CE mark and can also be equipped with an additional auxiliary switch. All devices have a switching position indication and are operated manually. The switching noise is particularly quiet and meets the requirements of residential buildings.

In addition to the 5TT41 remote control switch for up to 16 A, the 5TT44 version is now also available for 20 ... 63 A (up to 32 A DC).

Benefits

- Remote control switches with central/group switching support convenient and high feature applications
- High functional reliability due to electromechanical design without fault-prone electronics
- The devices have no standby losses
- All devices have a switching position indication and are operated manually
- All the remote control switches can be fitted with an additional auxiliary switch
- The remote control switches can be bus-mounted on 5TE9100 and 5TE9101 busbars; e.g.: bus mounting of the N conductor and/or infeed

Central switching functions

Versions with central On/Off function allow the central switching of all connected remote control switches. This type of central switching can also be actuated using a time switch. All remote control switches can be switched to the ON or OFF switching state, regardless of their current switching state.

Note:

Synchronous switching of the contacts cannot be guaranteed with parallel switching.
Products with central/group switching must be used for the mutual control of several remote control switches.

Contact sequences for remote control switches up to 16 A

1 – 2 – 1+2 – 0 or 1 – 0 – 2 – 0 means:

0: No contact closed

1: Only contact 1 closed

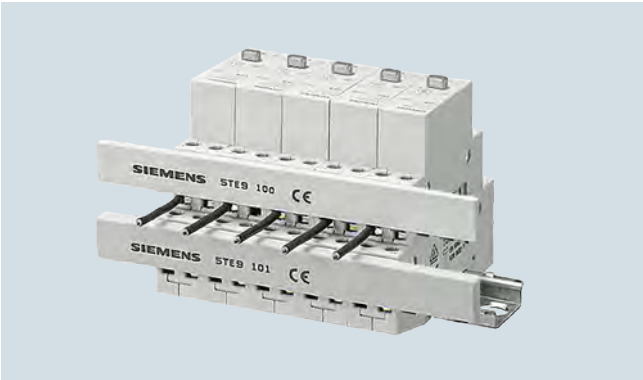
2: Only contact 2 closed

1+2: Contact 1 and contact 2 are closed.

The contact positions are constantly changing with each pushbutton impulse.

Note:
Synchronous switching of the contacts cannot be guaranteed with parallel switching. Products with central/group switching must be used for the mutual control of several remote control switches.

Bus mounting



All 5TT41 remote control switches up to 16 A and 5TT44 from 20 ... 63 A can be bus-mounted with each other.

Note:

For suitable busbars, see page 9/22.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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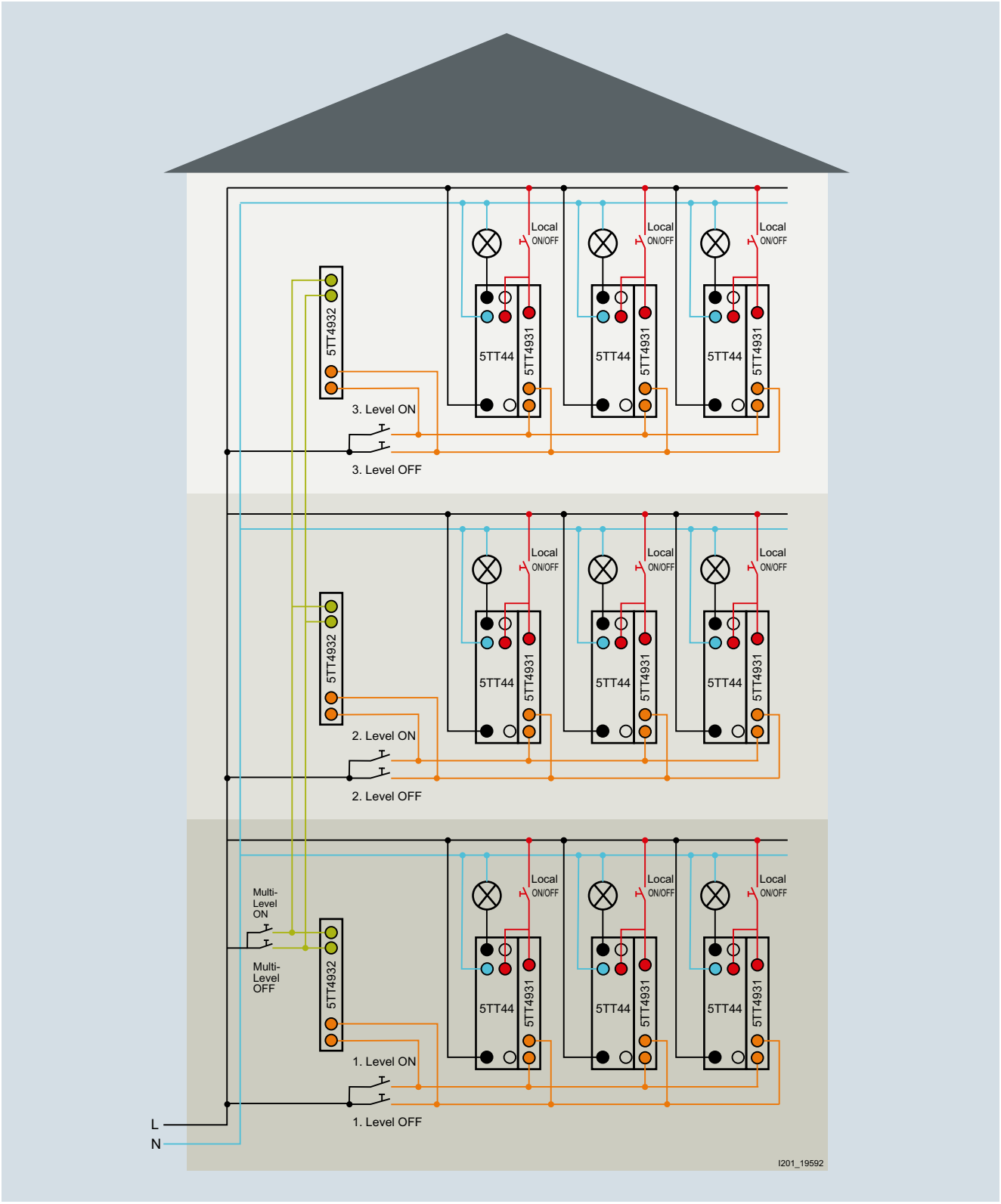
Application

Example for 5TT44 remote control switches up to 63 A NEW



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Technical specifications

		5TT41 remote control switches up to 16 A				Auxiliary switches for 5TT41		5TT44 remote control switches from 20 ... 63 A	Auxiliary switches for 5TT44		
		5TT4101 5TT4102 5TT4105 5TT4111 5TT4112 5TT4114 5TT4115	5TT4103 5TT4104	5TT412 5TT415	5TT413 5TT414	5TT4900	5TT4901		5TT4930	5TT4931	5TT4932
Standards		IEC 60669-1, IEC 60669-2, IEC 60669-3, EN 60669 (VDE 0632), EN 60669-2-2, EN 60669-2-2/A1				EN 60947-1 (VDE 0660 Part 100) EN 60947-5-1 (VDE 0660 Part 200)		IEC 60669-2-2 (up to 32 A) EN IEC 60947-4-1 (40 ... 63 A)	IEC/EN60947-5-1		
Approvals		VDE						CE, CCC (only 20 A, 25 A)	CE, EAC		
Contact type		1 NO 2 NO 1 NO + 1 NC	3 NO 4 NO	1 NO 2 NO 3 NO 1 NO + 1 NC	Series Shutter/ blind	1 CO	1 CO	2 NO 4 NO 1 NO + 1 NC 2 NO + 2 NC 1 CO 2 CO	1 NO + 1 NC	Central	Group
Manual operation		Yes				--		Yes	No		
Switching position indication		Yes			--	--		Yes	No		
Rated control voltage U_c	V AC V DC	8 ... 230 12 ... 110				-- --		230, 24 24	250 --		
Primary operating range	× U_c	0.8 ... 1.1				--		--	--		
Rated frequency f_c (AC types)	Hz	50				--		50/60	50/60		
Rated impulse withstand voltage U_{imp}	kV	4				1		3	1		
Rated power dissipation P_v	W	--				--	--	--	0.3 per pole		
• Magnet coil, only pulse at 16 A	W/VA	4.5/7	9/13	4.5/7		--	--	--	--	--	--
• Magnet coil, for "on" pulse at 20...25 A	W/VA	--	--	--	--	--	--	13/18; DC: 9/9	--	--	--
• Magnet coil, for "on" pulse at 40...63 A	W/VA	--	--	--	--	--	--	12/26	--	--	--
• Per contact at 16 A	W	1.2				--	--	--	--	--	--
• Per contact at 20 A	W	--				--	--	1.5	--	--	--
• Per contact at 25 A	W	--				--	--	2	--	--	--
• Per contact at 32 A	W	--				--	--	3	--	--	--
• Per contact at 40 A	W	--				--	--	3	--	--	--
• Per contact at 63 A	W	--				--	--	3.5	--	--	--
Minimum contact load	V; mA	10; 100 AC					AC/DC 5;1	10; 100 AC	12; 5	--	--
Rated operational current I_e At p.f. = 0.6 ... 1 (AC-15)	A	16						5TT440../41..: 20 5TT442../43..: 25 5TT445..: 32 5TT446..: 40 5TT447..: 63	4	--	--
Rated operational voltage U_e	V AC	--						--	--	250	250
• 1 NO	V AC	250	--	250	--	250	30 AC/DC	--	--		
• 2 NO	V AC	400	--	400	250	--		440	--		
• 3 NO	V AC	--	400	400	--	--		440	--		
• 4 NO	V AC	400	400	--	--	--		440	--		
• 1 NO + 1 NC	V AC	250	--	250	--	--		440	250		
Glow lamp load at 230 V	mA	5				--		--	--		
• With 1 5TT4920 compensator	mA	25				--		--	--		
• With 2 5TT4920 compensators	mA	45				--		--	--		
Incandescent lamp load With AC-5b (230V) switching of incandescent lamps for 15000 switching cycles	W	1200				--		5TT440../41..: 4400 5TT442../43..: 5500 5TT445..: 7000 5TT446..: 8800 5TT447..: 13800	--		
Rated operational power (AC-3)											
• Single-phase, at 230 V	kW	--	--	--	--	--	--	5TT440../41..: 0.5 5TT442../43..: 0.75 5TT445..: 1.1 5TT446..: 2.2 5TT447..: 4	--		
• Three-phase, at 230 V	kW	--	--	--	--	--	--	5TT440../41..: 1.5 5TT442../43..: 2.2 5TT445..: 3 5TT446..: 5.5 5TT447..: 11	--		
• Three-phase, at 400 V	kW	--	--	--	--	--	--	5TT440../41..: 3 5TT442../43..: 4 5TT445..: 5.5 5TT446..: 11 5TT447..: 18.5	--		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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		5TT41 remote control switches up to 16 A				Auxiliary switches for 5TT41		5TT44 remote control switches from 20 ... 63 A	Auxiliary switches for 5TT44		
		5TT4101 5TT4102 5TT4105 5TT4111 5TT4112 5TT4114 5TT4115	5TT4103 5TT4104	5TT412 5TT415	5TT413 5TT414	5TT4900	5TT4901		5TT4930	5TT4931	5TT4932
Different phases Between magnet coil/contact		Permissible				--	--	Permissible	--		
Contact gap	mm	> 1.2				< 1.2		> 3			
Safe separation Creepage distances and clearances between magnet coil/ contact	mm	> 6						--	--		
Pushbutton malfunction Protected against continuous voltage, safe due to design		Yes	PTC	Yes[1]	Yes	Yes	Yes	Yes	--		
Minimum pulse duration	ms	50						--	--		
Max. switching speed In switching cycles per hour	h^{-1}	--						5TT440../41..: 600 5TT442../43..: 450 5TT445../43..: 450 5TT446..: 360 5TT447..: 360	--		
Electrical service life At I_e/U_e, p.f. = 0.6; incandescent lamp load 600 W (switching cycles)		50000						50000	100000	--	
Terminals ± screw (Pozidriv)		1						Coil: 1; Contact: 2	1		
Torque	Nm	0.8 ... 1.0				max. 0.5		see conductor cross-sections	0.8		
Conductor cross-sections											
• Rigid	mm^2	1 ... 6				0.5 ... 2.5		**Coil:** 1 ...4, Torque: 0.6 Nm **Contacts**: 20 ... 32 A: 1 ...10, Torque: 1.2 Nm 40 ... 63 A: 2.5 ... 25, Tightening torque: 2.0 Nm	1 ... 4		
• Flexible, with end sleeve	mm^2	1 ... 6				0.5 ... 2.5		**Coil:** 1 ...4, Torque: 0.6 Nm **Contacts**: 20 ... 32 A: 1 ...10 Torque: 1.2 Nm 40 ... 63 A: 2.5 ... 25 Torque: 2.0 Nm	1 ... 4		
Resistance to climate At 95% relative humidity acc. to DIN 50015	°C	35						55	55		
Permissible ambient temperature	°C	-10 ... +40						Storage temperature: -30 ....+80 Operating temperature: -25 ....+55	Storage temperature: -30 ....+80 Operating temperature: -25 ....+70		
Degree of protection Acc. to EN 60529		IP20, with connected conductors						IP20	IP20		
Mounting position		Any						Any (not upside down)			

[1] For 2.5 MW 5TT4123-0 devices with PTC.

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5TT4 remote control switches

Selection and ordering data

	Contacts	U_e	I_e	U_c	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	V DC	MW	d					
5TT41 remote control switches up to 16 A												
	Remote control switches, auxiliary switches can be retrofitted											
	1 NO	250	16	230		1	▶	**5TT4101-0**		1	1 unit	1BK
				115				**5TT4101-1**		1	1 unit	1BK
				24			▶	**5TT4101-2**		1	1 unit	1BK
				12				**5TT4101-3**		1	1 unit	1BK
				8				**5TT4101-4**		1	1 unit	1BK
	2 NO	400	16	230		1	▶	**5TT4102-0**		1	1 unit	1BK
				115				**5TT4102-1**		1	1 unit	1BK
				24			▶	**5TT4102-2**		1	1 unit	1BK
				12				**5TT4102-3**		1	1 unit	1BK
				8				**5TT4102-4**		1	1 unit	1BK
	3 NO	400	16	230		2	▶	**5TT4103-0**		1	1 unit	1BK
				24			▶	**5TT4103-2**		1	1 unit	1BK
	4 NO	400	16	230		2	▶	**5TT4104-0**		1	1 unit	1BK
				24			▶	**5TT4104-2**		1	1 unit	1BK
	1 NO + 1 NC	250	16	230		1	▶	**5TT4105-0**		1	1 unit	1BK
				115				**5TT4105-1**		1	1 unit	1BK
				24			▶	**5TT4105-2**		1	1 unit	1BK
				12				**5TT4105-3**		1	1 unit	1BK
				8				**5TT4105-4**		1	1 unit	1BK
	Remote control switches DC applications											
	1 NO	250	16		110	1	▶	**5TT4111-1**		1	1 unit	1BK
					24		▶	**5TT4111-2**		1	1 unit	1BK
					12		▶	**5TT4111-3**		1	1 unit	1BK
	2 NO	400	16		110	1	▶	**5TT4112-1**		1	1 unit	1BK
					24		▶	**5TT4112-2**		1	1 unit	1BK
					12		▶	**5TT4112-3**		1	1 unit	1BK
	1 NO + 1 NC	250	16		110	1	▶	**5TT4115-1**		1	1 unit	1BK
					24		▶	**5TT4115-2**		1	1 unit	1BK
					12		▶	**5TT4115-3**		1	1 unit	1BK
	4 NO	400	16		110	2	▶	**5TT4114-1**		1	1 unit	1BK
					24		▶	**5TT4114-2**		1	1 unit	1BK
	**Remote control switches with central On/Off switching, auxiliary switch cannot be retrofitted**											
	1 NO	250	16	230		1.5	▶	**5TT4121-0**		1	1 unit	1BK
				24			▶	**5TT4121-2**		1	1 unit	1BK
	2 NO	400	16	230		1.5	▶	**5TT4122-0**		1	1 unit	1BK
				24			▶	**5TT4122-2**		1	1 unit	1BK
	3 NO	400	16	230		2.5	▶	**5TT4123-0**		1	1 unit	1BK
	1 NO + 1 NC	250	16	230		1.5	▶	**5TT4125-0**		1	1 unit	1BK
	**Remote control switches, with central and group On/Off switching, auxiliary switch cannot be retrofitted**											
	1 NO	250	16	230		1.5	▶	**5TT4151-0**		1	1 unit	1BK
				24		1.5	▶	**5TT4151-2**		1	1 unit	1BK
	2 NO	400	16	230		1.5	▶	**5TT4152-0**		1	1 unit	1BK
				24		1.5	▶	**5TT4152-2**		1	1 unit	1BK
	**Series remote control switches Contact sequence 1 – 2 – 1+2 – 0 auxiliary switch cannot be retrofitted**											
	2 NO	250	16	230		1	▶	**5TT4132-0**		1	1 unit	1BK
				12			▶	**5TT4132-3**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Contacts	U_e	I_e	U_c	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	V DC	MW	d					
	**Blinds remote control switches** **Contact sequence 1 – 0 – 2 – 0** **auxiliary switch cannot be retrofitted**											
	2 NO	250	16	230 24 12		1	▶	**5TT4142-0** **5TT4142-2** **5TT4142-3**		1 1 1	1 unit 1 unit 1 unit	1BK 1BK 1BK
Auxiliary switches for 5TT41 remote control switches												
	**Auxiliary switches** **One device can be retrofitted per remote control switch**											
	1 CO	250	5			0.5	▶	**5TT4900**		1	1 unit	1BK
	1 CO for low power	30 AC/DC	0.1			0.5	▶	**5TT4901**		1	1 unit	1BK
	**Compensators** **for increasing the glow lamp load by 20 mA**											
		250	--			1	▶	**5TT4920**		1	1 unit	1BK

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5TT4 remote control switches

5TT44 remote control switches from 20 ... 63 A NEW

5TT44 remote control switches for AC applications

	Contacts	U_e	I_e	U_c	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	V DC	MW	d					
 2 NO	2 NO	440 AC	20 AC	230	--	1		**5TT4402-0**		1	1 unit	1BK
		440 AC		24	--	1		**5TT4402-2**		1	1 unit	1BK
	1 NO + 1 NC	440 AC		230	--	1		**5TT4405-0**		1	1 unit	1BK
		440 AC		24	--	1		**5TT4405-2**		1	1 unit	1BK
	1 CO	440 AC		230	--	1		**5TT4407-0**		1	1 unit	1BK
		440 AC		24	--	1		**5TT4407-2**		1	1 unit	1BK
 1 NO + 1 NC	2 NO	440 AC	25 AC	230	--	1		**5TT4422-0**		1	1 unit	1BK
		440 AC		24	--	1		**5TT4422-2**		1	1 unit	1BK
	1 NO + 1 NC	440 AC		230	--	1		**5TT4425-0**		1	1 unit	1BK
		440 AC		24	--	1		**5TT4425-2**		1	1 unit	1BK
	2 CO	440 AC		230	--	2		**5TT4428-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4428-2**		1	1 unit	1BK
	4 NO	440 AC		230	--	2		**5TT4424-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4424-2**		1	1 unit	1BK
	2 NO + 2 NC	440 AC		230	--	2		**5TT4426-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4426-2**		1	1 unit	1BK
 1 CO	2 NO	440 AC	32 AC	230	--	1		**5TT4452-0**		1	1 unit	1BK
		440 AC		24	--	1		**5TT4452-2**		1	1 unit	1BK
	1 NO + 1 NC	440 AC		230	--	1		**5TT4455-0**		1	1 unit	1BK
		440 AC		24	--	1		**5TT4455-2**		1	1 unit	1BK
	2 CO	440 AC		230	--	2		**5TT4458-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4458-2**		1	1 unit	1BK
	4 NO	440 AC		230	--	2		**5TT4454-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4454-2**		1	1 unit	1BK
 2 CO	2 NO + 2 NC	440 AC		230	--	2		**5TT4456-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4456-2**		1	1 unit	1BK
	2 NO	440 AC	40 AC	230	--	2		**5TT4462-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4462-2**		1	1 unit	1BK
	1 NO + 1 NC	440 AC		230	--	2		**5TT4465-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4465-2**		1	1 unit	1BK
	2 CO	440 AC		230	--	2		**5TT4468-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4468-2**		1	1 unit	1BK
 4 NO	4 NO	440 AC		230	--	4		**5TT4464-0**		1	1 unit	1BK
		440 AC		24	--	4		**5TT4464-2**		1	1 unit	1BK
	2 NO + 2 NC	440 AC		230	--	4		**5TT4466-0**		1	1 unit	1BK
		440 AC		24	--	4		**5TT4466-2**		1	1 unit	1BK
	2 NO	440 AC	63 AC	230	--	2		**5TT4472-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4472-2**		1	1 unit	1BK
	1 NO + 1 NC	440 AC		230	--	2		**5TT4475-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4475-2**		1	1 unit	1BK
 2 NO + 2 NC	2 CO	440 AC		230	--	2		**5TT4478-0**		1	1 unit	1BK
		440 AC		24	--	2		**5TT4478-2**		1	1 unit	1BK
	4 NO	440 AC		230	--	4		**5TT4474-0**		1	1 unit	1BK
		440 AC		24	--	4		**5TT4474-2**		1	1 unit	1BK
	2 NO + 2 NC	440 AC		230	--	4		**5TT4476-0**		1	1 unit	1BK
		440 AC		24	--	4		**5TT4476-2**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Contacts	U_e	I_e	U_c	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	V DC	MW	d					
	5TT44 remote control switches for DC applications											
 2 NO	2 NO	440 AC	20 DC	--	24	1		**5TT4412-5**		1	1 unit	1BK
	2 NO	440 AC	25 DC	--	24	1		**5TT4432-5**		1	1 unit	1BK
	2 NO	440 AC	32 DC	--	24	1		**5TT4452-5**		1	1 unit	1BK
 1 NO + 1 NC	1 NO + 1 NC	440 AC	20 DC	--	24	1		**5TT4415-5**		1	1 unit	1BK
	1 NO + 1 NC	440 AC	25 DC	--	24	1		**5TT4435-5**		1	1 unit	1BK
	1 NO + 1 NC	440 AC	32 DC	--	24	1		**5TT4455-5**		1	1 unit	1BK
 1 CO	1 CO	440 AC	20 DC	--	24	1		**5TT4417-5**		1	1 unit	1BK
	1 CO	440 AC	25 DC	--	24	1		**5TT4437-5**		1	1 unit	1BK
	1 CO	440 AC	32 DC	--	24	1		**5TT4457-5**		1	1 unit	1BK
 1 NO	1 NO	440 AC	20 DC	--	24	1		**5TT4411-5**		1	1 unit	1BK
	1 NO	440 AC	25 DC	--	24	1		**5TT4431-5**		1	1 unit	1BK
	1 NO	440 AC	32 DC	--	24	1		**5TT4451-5**		1	1 unit	1BK
Auxiliary switches for 5TT44 remote control switches NEW												
	**Auxiliary switches**											
	1 NO + 1 NC	250 AC	16	--	--	0.5		**5TT4930**		1	1 unit	1BK
	**Auxiliary switches, central with diode** For central function (no auxiliary switch)											
	--	250 AC	--	--	--	0.5		**5TT4931**		1	1 unit	1BK
	**Auxiliary switches, group with several diodes** For group function (no auxiliary switch)											
	--	250 AC	--	--	--	0.5		**5TT4932**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT4 switching relays

Overview

Switching relays are used in residential, non-residential and industrial buildings for the purpose of contact multiplication. They can be used with safe isolation between coil voltage and contact.

With the 5TE9100 and 5TE9101 busbars, the switching relays can be mounted quickly and safely, e.g. by bus mounting the N conductor and/or infeed.

Note:

For suitable busbars for the 5TT42 switching relays, see page 9/22.

Benefits

- Easy installation due to busbar mounting
- Switching position indication when checking the plant for enhanced safety
- Manual intervention through manual operation

Bus mounting



All 5TT42 switching relays can be bus-mounted with each other.

Technical specifications

			5TT4201-.	5TT4202-.	5TT4204-.	5TT4205-.	5TT4206-.	5TT4207-.	5TT4217-.
Standards			EN 60947-5-1, EN 60669-2-2						
Approvals			VDE, CCC						
Contact type			1 NO	2 NO	4 NO	1 NO + 1 NC	1 CO	2 CO	2 CO
Manual operation			Yes						
Rated control voltage U_c		V AC V DC	8 ... 230 --						-- 12 ... 110
Primary operating range		× U_c	0.8 ... 1.1						
Rated frequency f_c		Hz	50						
Rated impulse withstand voltage U_{imp}		kV	4						
Rated power dissipation P_v • Magnet coil • Per contact at 16 A		W/VA W	2.4/3.0 1.0	2.4/3.0	4.8/6.0	2.4/3.0	2.4/3.0	2.4/3.0	1.7
Minimum contact load		V AC; mA	10; 100						
Rated operational current I_e At p.f. = 0.6 ... 1		A	16						
Rated operational voltage U_e			250	400	400	400	250	400	400
Different phases Between magnet coil/contact			Permissible						
Contact gap		mm	> 1.2				< 1.2		
Safe separation		mm	> 6						
Electrical service life At I_e/U_e, p.f. = 0.6; incandescent lamp load 600 W		Switching cycles	50000						
Terminals	± Screw (Pozidriv)		1						
Torque		Nm	0.8 ... 1						
Conductor cross-sections • Rigid • Flexible, with end sleeve		mm^2 mm^2	1 ... 6 1 ... 6						
Resistance to climate At 95% relative humidity	Acc. to DIN 50015	°C	35						
Permissible ambient temperature		°C	-10 ... +40						
Degree of protection	Acc. to EN 60529		IP20, with connected conductors						
Mounting position			Any						

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Contacts	U_e	I_e	U_c	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	V DC	MW	d					
	**Switching relays for AC voltage**											
	1 NO	250	16	230	--	1	▶	**5TT4201-0**		1	1 unit	1BK
				115				**5TT4201-1**		1	1 unit	1BK
				24			▶	**5TT4201-2**		1	1 unit	1BK
				12			▶	**5TT4201-3**		1	1 unit	1BK
				8			▶	**5TT4201-4**		1	1 unit	1BK
	2 NO	400	16	230	--	1	▶	**5TT4202-0**		1	1 unit	1BK
				115				**5TT4202-1**		1	1 unit	1BK
				24			▶	**5TT4202-2**		1	1 unit	1BK
				12				**5TT4202-3**		1	1 unit	1BK
				8				**5TT4202-4**		1	1 unit	1BK
	4 NO	400	16	230	--	2	▶	**5TT4204-0**		1	1 unit	1BK
				115				**5TT4204-1**		1	1 unit	1BK
				24			▶	**5TT4204-2**		1	1 unit	1BK
				12				**5TT4204-3**		1	1 unit	1BK
				8				**5TT4204-4**		1	1 unit	1BK
	1 NO + 1 NC	400	16	230	--	1	▶	**5TT4205-0**		1	1 unit	1BK
				115				**5TT4205-1**		1	1 unit	1BK
				24			▶	**5TT4205-2**		1	1 unit	1BK
				12				**5TT4205-3**		1	1 unit	1BK
				8				**5TT4205-4**		1	1 unit	1BK
	1 CO	250	16	230	--	1	▶	**5TT4206-0**		1	1 unit	1BK
				115				**5TT4206-1**		1	1 unit	1BK
				24			▶	**5TT4206-2**		1	1 unit	1BK
				12				**5TT4206-3**		1	1 unit	1BK
				8				**5TT4206-4**		1	1 unit	1BK
	2 CO	400	16	230	--	1	▶	**5TT4207-0**		1	1 unit	1BK
				115				**5TT4207-1**		1	1 unit	1BK
				24			▶	**5TT4207-2**		1	1 unit	1BK
				12				**5TT4207-3**		1	1 unit	1BK
				8				**5TT4207-4**		1	1 unit	1BK
	**Switching relays for direct voltage**											
	2 CO	400	16	--	110	1	▶	**5TT4217-1**		1	1 unit	1BK
					30		▶	**5TT4217-6**		1	1 unit	1BK
					24		▶	**5TT4217-2**		1	1 unit	1BK
					12		▶	**5TT4217-3**		1	1 unit	1BK
	**Spacers**											
	In the case of higher ambient temperatures, we recommend placing a spacer after every second switching relay for better heat dissipation.					0.5		**5TG8240**		1	2 units	1BK

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5TT50 Insta contactors, AC/DC technology

Overview

The Insta contactors are the ideal switching devices for controlling AC/DC control voltage in industrial applications and infrastructure.

In addition to their basic function, they can also be used for the On/Off switching of single-phase and three-phase electrical motors. The 5TT50 Insta contactors meet the requirements of EN 60947 and are approved to UL 508.

The simultaneous switching of lamp loads at varying phases can be achieved with a single contactor, whereby it is essential to strive for/ensure a symmetrical load of the phases. Upstream short-circuit detection devices must disconnect at all poles or must be equipped with phase failure detection. Violations of the specified capacitor load limits may cause excessive inrush peak currents. The level of inrush peak currents is also affected by the following factors:

- Length and cross-section of the installed supply lines
- Type of electronic ballasts
- Brand/make of lamp
- Hum-free

Benefits



- Insta contactors with O/I automatic function enable the testing of a plant via manual switch without the need to apply a control voltage



- Switching position indication for fast recognition of operating states offers greater safety when checking the plant

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

			5TT500 2-pole	5TT503 4-pole	5TT504 4-pole	5TT505 4-pole
Standards			EN 60947-4-1; EN 60947-5-1; EN 61095			
Approvals			UL 508; UL File No. E303328; CCC			
Rated frequency at AC f_n		Hz	50/60			
Rated operational voltage U_c		V AC V DC	24, 230 24, 220	24, 115, 230 24, 110, 220	24, 230 24, 230	
Primary operating range		× U_c	0.85 ... 1.1			
Rated operational voltage U_e		V	230	400		
Rated operational current I_e		At V AC	Acc. to UL 480; acc. to IEC 440			
• AC-1/AC-7a, NO contacts		A	20	25	40	63
• AC-1/AC-7a, NC contacts		A	20	25	40	63
• AC-3/AC-7b, NO contacts		A	9	8.5	22	30
• AC-3/AC-7b, NC contacts		A	6	8.5	22	30
Rated power dissipation P_v						
• Pick-up power (without manual switch or manual switch in "I" position)		VA/W	2.1/2.1	2.6/2.6	5/5	5/5
• Pick-up power (with manual switch in "AUTO" position)		VA/W	2.1/4.1	2.6/2.6	5/5	5/5
• Holding power		VA/W	2.1/2.1	2.6/2.6	5/5	5/5
• Per contact AC-1/AC-7a		VA	1.7	2.2	4	8
Switching times						
• Closing (NO contacts)		ms	15 - 45	15 - 45	15 - 20	
• Opening (NO contacts)		ms	20 - 50	20 - 70	35 - 45	
Rated impulse withstand voltage U_{imp}		kV	≤ 4			
Contact gap (NO contacts) min.		mm	3.6			
Electrical service life						
At I_e and load	AC-1/AC-7a	For switching cycles	200000		100000	
	AC-3/AC-7b	For switching cycles	300000	500000		150000
Mechanical service life		For switching cycles	3 million			
Maximum switching frequency						
At load	AC-1/AC-7a	Switching cycles/h	600			
	AC-3/AC-7b	Switching cycles/h	600			
Switching of resistive loads AC-1		V AC	230	400		
For rated operational power P_s (NO contacts)						
• Single-phase		kW	4	5.4	8.7	13.3
• Three-phase		kW	--	16	26	40
Switching of three-phase asynchronous motors AC-3		V AC	230	400		
For rated operational power P_s (NO contacts)						
• Single-phase		kW	1.3/0.75	1.3/1.3	3.7/3.7	5/5
• Three-phase		kW	--	4	11	15
Minimum switching capacity		V; mA	≥ 17; 50			
Overload withstand capability						
Per conducting path (NO contacts only)	At 10 s	A	72	68	176	240
Short-circuit protection, according to coordination type 1						
Back-up fuse characteristic gL/gG		A	20	25	63	80
Terminals	± screw (Pozidriv)					
• Coil connection			1	1		
• Main connection			1	2		
Tightening torques						
• Coil connection		Nm	0.6	0.6		
• Main connection		Nm	1.2	3.5		
Conductor cross-sections						
• Coil connection						
- Solid		mm^2	1.0 ... 2.5			
- Stranded, with end sleeve		mm^2	1.0 ... 2.5			
- AWG cables		AWG	16 ... 10			
Tightening torque		lbs/in.	8			
• Main connection						
- Solid		mm^2	1.0 ... 10	1.5 ... 25		
- Stranded, with end sleeve		mm^2	1.0 ... 6	1.5 ... 16		
- AWG cables		AWG	16 ... 8	16 ... 4		
Tightening torque		lbs/in.	9	20		
Permissible ambient temperature						
• For operation		°C	-15 ... +55[1)]			
• For storage		°C	-50 ... +80			
Degree of protection	Acc. to EN 60529		IP 20, with connected conductors			
Acc. to UL 508	I_n	A	20	25	40	63
UL 508 General Use 240 V/480 V	FLA	A	20	25	40	63
UL 508 AC discharge lamps		A	20	25	30	40
UL 508 motor load 240 V	Power	hp	1	3	7.5	10
UL 508 motor load 480 V	Power	hp	--	5	15	20
UL 508 short-circuit at 480 V	K5 fuses	A	20	25	60	70
		kA	5			

[1)] Contactors can be operated at ambient temperatures of between -25 °C and +70 °C, but only under special conditions. For more information, please contact Siemens Support. For questions concerning heat dissipation, please refer to the instructions in the Configuration Manual "Switching Devices".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT50 Insta contactors, AC/DC technology

Selection and ordering data

	Contacts	U_e	I_e	U_c		Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	V DC	MW	d					
 5TT5000-0	**Insta contactors** For AC or DC continuous operation, with switching position indication, with DC magnetic system											
	2 NO	230	20	230	220	1		**5TT5000-0**		1	1 unit	1BK
				24	24			**5TT5000-2**		1	1 unit	1BK
	1 NO, 1 NC	230	20	230	220	1		**5TT5001-0**		1	1 unit	1BK
				24	24			**5TT5001-2**		1	1 unit	1BK
	2 NC	230	20	230	220	1		**5TT5002-0**		1	1 unit	1BK
				24	24			**5TT5002-2**		1	1 unit	1BK
	4 NO	400	25	230	220	2		**5TT5030-0**		1	1 unit	1BK
				115	110			**5TT5030-1**		1	1 unit	1BK
				24	24			**5TT5030-2**		1	1 unit	1BK
	3 NO, 1 NC	400	25	230	220	2		**5TT5031-0**		1	1 unit	1BK
				24	24			**5TT5031-2**		1	1 unit	1BK
	2 NO, 2 NC	400	25	230	220	2		**5TT5032-0**		1	1 unit	1BK
				24	24			**5TT5032-2**		1	1 unit	1BK
	4 NC	400	25	230	220	2		**5TT5033-0**		1	1 unit	1BK
				24	24			**5TT5033-2**		1	1 unit	1BK
	4 NO	400	40	230	220	3		**5TT5040-0**		1	1 unit	1BK
				24	24			**5TT5040-2**		1	1 unit	1BK
	3 NO, 1 NC	400	40	230	220	3		**5TT5041-0**		1	1 unit	1BK
				24	24			**5TT5041-2**		1	1 unit	1BK
	2 NO, 2 NC	400	40	230	220	3		**5TT5042-0**		1	1 unit	1BK
				24	24			**5TT5042-2**		1	1 unit	1BK
	4 NC	400	40	230	220	3		**5TT5043-0**		1	1 unit	1BK
				24	24			**5TT5043-2**		1	1 unit	1BK
	4 NO	400	63	230	220	3		**5TT5050-0**		1	1 unit	1BK
				24	24			**5TT5050-2**		1	1 unit	1BK
	3 NO, 1 NC	400	63	230	220	3		**5TT5051-0**		1	1 unit	1BK
				24	24			**5TT5051-2**		1	1 unit	1BK
	2 NO, 2 NC	400	63	230	220	3		**5TT5052-0**		1	1 unit	1BK
				24	24			**5TT5052-2**		1	1 unit	1BK
 5TT5000-6	**Automatic Insta contactors** For AC or DC continuous operation, with switching position indication, with DC magnetic system											
	2 NO	230	20	230	220	1		**5TT5000-6**		1	1 unit	1BK
				24	24			**5TT5000-8**		1	1 unit	1BK
	1 NO, 1 NC	230	20	230	220	1		**5TT5001-6**		1	1 unit	1BK
				24	24			**5TT5001-8**		1	1 unit	1BK
	4 NO	400	25	230	220	2		**5TT5030-6**		1	1 unit	1BK
				24	24			**5TT5030-8**		1	1 unit	1BK
	3 NO, 1 NC	400	25	230	220	2		**5TT5031-6**		1	1 unit	1BK
				24	24			**5TT5031-8**		1	1 unit	1BK
 5TT5910-0	**Auxiliary switches** For mounting on right-hand side Max. one auxiliary switch per Insta contactor											
	2 NO	230, AC-15	6	--	--	0.5	▶	**5TT5910-0**		1	1 unit	1BK
	1 NO, 1 NC	230, AC-15	6	--	--		▶	**5TT5910-1**		1	1 unit	1BK
	**Sealable terminal covers**											
	For Insta contactor 20 A					1		**5TT5910-5**		1	2 units	1BK
	For Insta contactor 25 A					2		**5TT5910-6**		1	2 units	1BK
	For Insta contactors 40 A and 63 A					3		**5TT5910-7**		1	2 units	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The 5TT58 Insta contactors are equipped with an AC magnetic system and are ideal for use under harsh conditions. The auxiliary switches can be mounted without tools. When equipped with terminal covers, the devices can also be sealed.

Insta contactors without manual switch

Insta contactors are ideal for a wide range of uses in industry, such as for motors where distribution technology plays a major role, e.g. in installations for heat pumps and air conditioning technology. In addition to their basic function, they can also be used for the On/Off switching of single-phase and three-phase electrical motors.

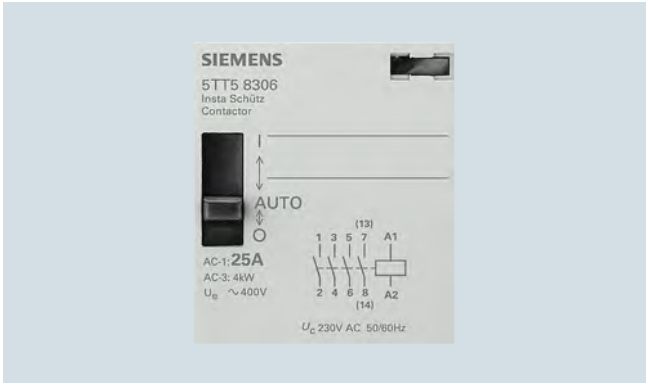
Insta contactors with manual switch

Insta contactors with manual operation can be switched on and off by hand.

Benefits



- Extremely long service life of 3 million switching cycles
- Safe cable routing through the cable entry funnel
- Insulated right through to the cable entry funnel
- Auxiliary switches can be retrofitted on all versions – even on the 20 A type



- Insta contactors with O/I/Automatic function enable the testing of a plant by manual switch without the need to apply a control voltage
- Switching position indication for fast recognition of operating states offers greater safety when checking the plant

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5TT58 Insta contactors, AC technology

Technical specifications

			Insta contactors				Auxiliary switches
			5TT580.	**5TT582., 5TT583.**	**5TT584.**	**5TT585.**	**5TT5910**
Standards			IEC 60947-4-1, IEC 60947-5-1, IEC 61095; EN 60947-4-1, EN 60947-5-1, EN 61095, VDE 0660				IEC 60947-5-1
Approvals			CCC				
Number of poles			2	4	4	4	2
Rated frequency at AC		Hz	50/60				
Rated operational voltage U_c		V AC	24, 230	24, 115, 230	24, 230	24, 230	--
Primary operating range		× U_c	0.85 ... 1.1				--
Rated operational voltage U_e		V AC	230	400			230/400
Rated operational current I_e		A	20	25	40	63	6/4 (230/400 V)
Rated power dissipation P_v							
• Pick-up power (without manual switch or manual switch in "I" position)		VA/W	6/3.8	10/5	15.4/6		--
• Pick-up power (with manual switch in "AUTO" position)		VA/W	12/10	33/25	62/50		--
• Holding power		VA/W	2.8/1.2	5.5/1.6	7.7/3		--
• Per contact		VA	1.7	2.2	4	8	--
Switching times							
• Closing (NO contacts)		ms	15 ... 25	10 ... 20	15 ... 20		--
• Opening (NO contacts)		ms	20	20	10		--
• Closing (NC contacts)		ms	20 ... 30	20 ... 30	5 ... 10		--
• Opening (NC contacts)		ms	10	10	10 ... 15		--
Rated impulse withstand voltage U_{imp}		kV	4				
Rated insulation voltage U_i		V	440		500		
Contact gap, minimum		mm	3.6		3.4		4
Electrical service life							
At I_e and load							
• AC-1/AC-7a		For switching cycles	200000		100000		--
• AC-3/AC-7b			300000	500000	150000		--
Mechanical service life		For switching cycles	3 million				
Maximum switching frequency							
At load		In switching cycles/h	600				
Switching of resistive loads AC-1/AC-7a							
For rated operational power P_s							
• Single-phase 230 V		kW	4	5.4	8.7	13.3	--
• Three-phase 400 V		kW	--	16	26	40	--
Switching of three-phase asynchronous motors AC-3/AC-7b							
For rated operational power P_s							
• Single-phase 230 V		kW	1.3[1)]	1.3	3.7	5	--
• Three-phase 400 V		kW	--	4	11	15	--
Minimum switching capacity		V; mA	17; 50				12; 5
Overload withstand capability							
Per conducting path (NO contacts only)	At 10 s	A	72	68	176	240	--
Short-circuit protection, according to coordination type 1							
Back-up fuse characteristic gL/gG		A	20	25	63	80	6
Terminals	± Screw (Pozidriv)						
• Coil connection			1		1.2		--
• Main connection			1		3.5		1
Tightening torques							
• Coil connection		Nm	0.6				--
• Main connection		Nm	1.2		2		0.8
Conductor cross-sections							
• Coil connection	Rigid	mm^2	1.0 ... 2.5				--
	Flexible, with end sleeve	mm^2	1.0 ... 2.5				--
• Main connection	Rigid	mm^2	1.0 ... 10		1 ... 25		1 ... 2.5
	Flexible, with end sleeve	mm^2	1.0 ... 6		1 ... 16		1 ... 2.5
Permissible ambient temperature[2)]							
• For operation		°C	-5 ... +55				
• For storage		°C	-30 ... +80				
Degree of protection	Acc. to EN 60529		IP20, with connected conductors				

[1)] For NO contacts only.

[2)] For questions concerning heat dissipation, please refer to the instructions in the Configuration Manual "Switching Devices".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
 5TT5800-0	**Insta contactors without manual switch** For alternating current continuous operation, with switching position indication, with AC magnetic system										
	2 NO	230	20	230	1	▶	**5TT5800-0**		1	1 unit	1BK
				24		▶	**5TT5800-2**		1	1 unit	1BK
	1 NO, 1 NC	230	20	230		▶	**5TT5801-0**		1	1 unit	1BK
				24		▶	**5TT5801-2**		1	1 unit	1BK
	2 NC	230	20	230		▶	**5TT5802-0**		1	1 unit	1BK
				24		▶	**5TT5802-2**		1	1 unit	1BK
 5TT5830-0	4 NO	400	25	230	2	▶	**5TT5830-0**		1	1 unit	1BK
				115			**5TT5830-1**		1	1 unit	1BK
				24		▶	**5TT5830-2**		1	1 unit	1BK
	3 NO, 1 NC	400	25	230		▶	**5TT5831-0**		1	1 unit	1BK
				115			**5TT5831-1**		1	1 unit	1BK
				24			**5TT5831-2**		1	1 unit	1BK
	4 NO for high capacitive loads up to 150 µF	400	25	230	2		**5TT5820-0**		1	1 unit	1BK
	2 NO, 2 NC	400	25	230		▶	**5TT5832-0**		1	1 unit	1BK
				24		▶	**5TT5832-2**		1	1 unit	1BK
	4 NC	400	25	230		▶	**5TT5833-0**		1	1 unit	1BK
				24			**5TT5833-2**		1	1 unit	1BK
 5TT5840-0	4 NO	400	40	230	3	▶	**5TT5840-0**		1	1 unit	1BK
				24		▶	**5TT5840-2**		1	1 unit	1BK
	3 NO, 1 NC	400	40	230			**5TT5841-0**		1	1 unit	1BK
				24			**5TT5841-2**		1	1 unit	1BK
	2 NO, 2 NC	400	40	230			**5TT5842-0**		1	1 unit	1BK
				24			**5TT5842-2**		1	1 unit	1BK
	4 NC	400	40	230		▶	**5TT5843-0**		1	1 unit	1BK
				24			**5TT5843-2**		1	1 unit	1BK
	4 NO	400	63	230	3	▶	**5TT5850-0**		1	1 unit	1BK
				24		▶	**5TT5850-2**		1	1 unit	1BK
	3 NO, 1 NC	400	63	230		▶	**5TT5851-0**		1	1 unit	1BK
				24			**5TT5851-2**		1	1 unit	1BK
	2 NO, 2 NC	400	63	230			**5TT5852-0**		1	1 unit	1BK
				24			**5TT5852-2**		1	1 unit	1BK
	4 NC	400	63	230		▶	**5TT5853-0**		1	1 unit	1BK
				24			**5TT5853-2**		1	1 unit	1BK
 5TT5910-0	**Auxiliary switches** For mounting on right-hand side Max. one auxiliary switch per Insta contactor										
	2 NO	230, AC-15	6	--	0.5	▶	**5TT5910-0**		1	1 unit	1BK
	1 NO, 1 NC	230, AC-15	6	--		▶	**5TT5910-1**		1	1 unit	1BK
	**Sealable terminal covers**										
	For Insta contactor 20 A				1		**5TT5910-5**		1	2 units	1BK
	For Insta contactor 25 A				2		**5TT5910-6**		1	2 units	1BK
	For Insta contactors 40 A and 63 A				3		**5TT5910-7**		1	2 units	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT58 Insta contactors, AC technology

	Version	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	Insta contactors with manual switch O/I/Automatic										
	For alternating current continuous operation, with switching position indication, with AC magnetic system										
 5TT5800-6	2 NO	230	20	230	1	▶	**5TT5800-6**		1	1 unit	1BK
				24		▶	**5TT5800-8**		1	1 unit	1BK
	1 NO, 1 NC	230	20	230			**5TT5801-6**		1	1 unit	1BK
				24			**5TT5801-8**		1	1 unit	1BK
 5TT5830-6	4 NO	400	25	230	2	▶	**5TT5830-6**		1	1 unit	1BK
				24		▶	**5TT5830-8**		1	1 unit	1BK
	3 NO, 1 NC	400	25	230		▶	**5TT5831-6**		1	1 unit	1BK
				24			**5TT5831-8**		1	1 unit	1BK
 5TT5840-6	4 NO	400	40	230	3	▶	**5TT5840-6**		1	1 unit	1BK
				24			**5TT5840-8**		1	1 unit	1BK
	3 NO, 1 NC	400	40	230			**5TT5841-6**		1	1 unit	1BK
				24			**5TT5841-8**		1	1 unit	1BK
	4 NO	400	63	230		▶	**5TT5850-6**		1	1 unit	1BK
	**Auxiliary switches**										
	For mounting on right-hand side Max. one auxiliary switch per Insta contactor										
	2 NO	230, AC-15	6	--	0.5	▶	**5TT5910-0**		1	1 unit	1BK
	1 NO, 1 NC	230, AC-15	6	--		▶	**5TT5910-1**		1	1 unit	1BK
	**Sealable terminal covers**										
	For Insta contactor 20 A				1		**5TT5910-5**		1	2 units	1BK
	For Insta contactor 25 A				2		**5TT5910-6**		1	2 units	1BK
	For Insta contactors 40 A and 63 A				3		**5TT5910-7**		1	2 units	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Soft-starting devices are rugged electronic control devices for soft starting of three-phase asynchronous machines. By means of phase-angle control, two of the motor's three phases are influenced in such a way that the current in these phases rises constantly. The motor torque behaves in the same way during start-up. This ensures that the drive can start without jolting. This rules out damage to drive elements because the starting torque does not rise abruptly on direct activation. This characteristic permits a low-cost design of the drive elements.

A clear reduction in starting noise can also be witnessed. On belt conveyor systems, sliding or tilting over of the goods conveyed is avoided. After starting, the power electronics is bypassed by means of an internal relay contact to minimize losses in the device.

Benefits

- Extends the service life of asynchronous motors and mechanical drive components.
- Separate possibility of setting the start-up time and the initial torque. Can be combined with motor brake devices.
- Two-phase motor control
- For motor power outputs up to 5.5 kW

Technical specifications

			5TT3440
Standards			EN 60947-4-2 (VDE 0660-117)
Supply/motor voltage		V AC	400
Primary operating range		× U_c	0.8 ... 1.1
Rated power		VA	3.5
Rated frequency		Hz	50/60
Rated power dissipation P_v	Coil/drive Contacts[1] per pole		3.5 4.6
Rated output of motor - Max. - Min.	 At 400 V At 400 V	 VA VA	 5500 300
Startup voltage		%	30 ... 70
Starting ramp		s	0.1 ... 10
Recovery time		ms	100
Switching frequency 3 × I_N, T_{AN} = 10 s, ν_u = 20% 3 × I_N, T_{AN} = 10 s, ν_u = 20%		 Switching cycles/h Switching cycles/h	 36 (up to 3 kW) 20 (from 3 ... 5.5 kW)
Semiconductor fuse	Quick-acting	A	35
Conductor cross-sections	Rigid Flexible, with end sleeve	max. mm² min. mm²	2 × 2.5 1 × 0.5
Permissible ambient temperature		°C	-20 ... +60
Resistance to climate	Acc. to EN 60068-1		20/60/4

[1] For rated operational current.

Selection and ordering data

	Version	U_e	P_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	W	MW	d					
	**Soft-starting devices, mounting depth 55 mm**									
	Three-phase, two-phase motor control	400	300 ... 5500	6		**5TT3440**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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7LF4 digital time switches

Overview

Top, Profi, Astro and Expert digital time switches

Text-assisted programming directly on the device.



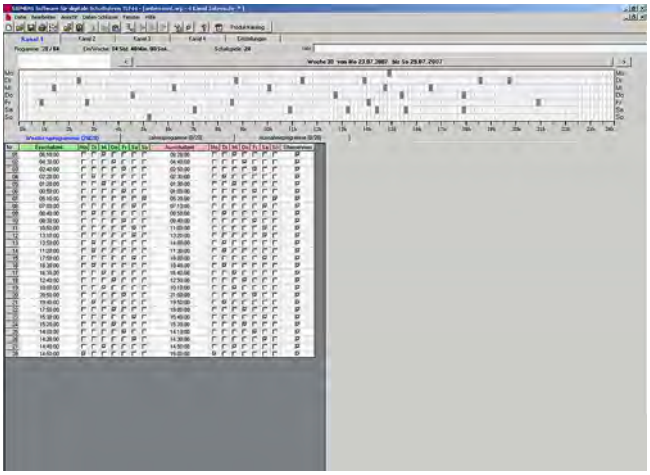


The Profi, Astro and Expert digital time switches support plug-in data keys.

USB adapter



The Profi, Astro and Expert time switches are easy to program at the PC using the data key with the USB adapter and software.



- Clear data on the annual ON time of the load enables a precise statement on the annual power consumption
- You can create switching programs conveniently at the PC, store it on the data key and transfer it locally to the time switch
- Time saving during program creation, commissioning and maintenance

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

			Mini 7LF4401-5	Top 7LF4511 7LF4512	Profi 7LF4521 7LF4522	Astro 7LF4531 7LF4532	Expert 7LF4444	Expert GPS 7LF4541 7LF4542
Standards			EN 60730-1, -2-7; VDE 0631-1, -2-7					
Approvals			--		UL File No. E301698		--	UL File No. E301698
Supply								
• Rated control supply voltage U_c		V AC V AC/DC	110 ... 240 --	230 --	230 24	230 --	120/230 24	230 --
- Primary operating range		× U_c	0.85 ... 1.1	0.85 ... 1.1	0.85 ... 1.1[1]	0.85 ... 1.1	80 .. 253 V[1]	0.85 ... 1.1
- Frequency ranges		Hz	50 ... 60	50 ... 60	50 ... 60[2]	50 ... 60	50 ... 60[2]	50 ... 60
• Rated power dissipation P_v		VA	0.035	2	2	2	2.5/4[3]	2
Channels/contacts								
• Switching channels			1	1 or 2			4	1 or 2
- Rated operational voltage U_e		V AC	250					
- Rated operational current I_e	At p.f. = 1	A	16					
	At p.f. = 0.6	A	10					
• Contacts			1 CO	1 or 2 CO			4 CO	7LF4541: 1 CO 7LF4542: 1 CO + 1 NO
- Mechanical switching cycles (in millions)			> 5	10				
- Electrical switching cycles	At p.f. = 1		6000 (20 A)	100000				
• Minimum contact load		V; mA	12; 100					
- Incandescent lamp load		A	5	8				
- Fluorescent lamp load		VA	58	60	600		58	600
	Uncorrected	VA	1400	2300	2000		1400	2000
- Energy-saving lamp load		W	100	60 VA	1000		100	1000
Safety								
• Different phases permissible between actuator/contact[7]			Yes					
• Rated impulse withstand voltage U_{imp}		kV	4.0					
- EMC: Burst	Acc. to IEC 61000-4-4	kV	> 4.4					
- EMC: Surge	Acc. to IEC 61000-4-5	kV	> 2.0					
- Electrostatic discharge	Acc. to IEC 61000-4-2	kV	> 8.0					
• Power reserve storage	Mains/battery	a	6/2	3	5			
- Battery type			Li primary cell					
• Program memory	Captive		--	No	Yes			
• Overvoltage category	Acc. to EN 61010-1		III					
Function								
• Minimum switching sequences			1 min		1 s			
• Make and break cycles			1 min		1 s			
• Clock errors per day	Typical	s/day	+0.3 ± 1	± 1.5	0.1	± 0.1	± 0.2	[5]
• Control input	Terminal S		--	No		Yes (only in the case of 1K clock)		[6]
• Memory spaces								
- Programs[4]			28	28 (2 × 14)	56 (2 × 28)	56 (2 × 28)	4 × 3 × 28	84 (3 x 28)
Connections								
• Terminals ± Screw (Pozidriv)			PZ 1					
• Conductor cross-sections of main current paths								
- Rigid, max.		mm^2	4					
- Rigid, min.		mm^2	1.5					
- Flexible with end sleeve	Max.	mm^2	2.5					
Environmental conditions								
• Permissible ambient temperature		°C	-10 ... +55	-20 ... +55				
• Storage temperature		°C	-20 ... +60					
• Resistance to climate	Acc. to EN 60068-1		10/055/21	20/055/21				
• Degree of protection	Acc. to EN 60529		IP20, with connected conductors					
• Safety class	Acc. to EN 60730-1		II					

1) For 24 V devices (7LF4521-2, 7LF4522-2 and 7LF4444-2): Tolerance -10/+10%; operating range 0.9 ... 1.1 × U_c.

2) For 24 V devices (7LF4521-2, 7LF4522-2 and 7LF4444-2): Frequency range 0 ... 60 Hz.

3) For 24 V device (7LF4444-2): P_v = 4 VA.

4) A program consists of an ON time, an OFF time and assigned ON and OFF days or day blocks.

5) DCF/ GPS atomic clock error, without antenna: +/- 0.1 s/day

6) Control input for connection of the time signal + local coordinates (GPS) from the antenna power supply module

7) The combination of line voltage (230 V) and SELV in combination with a 2K clock is not admissible. This requirement is, however, admissible in the case of 1K clocks and the Expert 4K.

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7LF4 digital time switches

Selection and ordering data

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	**Mini digital time switches**										
	• Weekly program • 1 channel										
	1 CO	250	16	110 ... 240	1	▶	**7LF4401-5**		1	1 unit	1BK
	**Top digital time switches**										
	• Weekly program • With text-assisted programming concept – language: English • Manual daylight-saving adjustment • 1 channel • 28 programs										
	1 CO	250	16	230	2		**7LF4511-0**		1	1 unit	1BK
	• 2 channels • 28 programs (14 per channel)										
	2 CO	250	16	230	2		**7LF4512-0**		1	1 unit	1BK
	**Profi digital time switches**										
	• Weekly program • With text-assisted programming concept languages: 15 languages • Simple program creation by means of PC using the software included with the 7LF4941-0 USB adapter • Vacation program • Random program • Operating hours counter, counting range: 65535 h • Synchronization 50/60 Hz • Cycle function • Expert mode • Accurate to the second hh:mm:ss • Automatic daylight-saving adjustment										
	• 1 channel • 56 programs										
	1 CO	250	16	230	2		**7LF4521-0**		1	1 unit	1BK
	1 CO	250	16	24 AC/DC	2		**7LF4521-2**		1	1 unit	1BK
	• 2 channels • 56 programs (28 per channel) • Channel changeover function										
	2 CO	250	16	230	2		**7LF4522-0**		1	1 unit	1BK
	2 CO	250	16	24 AC/DC	2		**7LF4522-2**		1	1 unit	1BK
	**Astro digital time switches**										
	• Weekly program • Astro function • With text-assisted programming concept languages: 15 languages • Simple program creation by means of PC using the software included with the 7LF4941-0 USB adapter • Vacation program • 1 h test • Input disable via PIN code • Operating hours counter, counting range: 65535 h • Random program • Automatic daylight-saving adjustment • Daylight-saving adjustment half-year correction • Expert mode • Synchronization 50/60 Hz • Accurate to the second hh:mm:ss										
	• 1 channel • 56 programs • With control input, delay time 0 min ... 23 h 59 min										
	1 CO	250	16	230	2		**7LF4531-0**		1	1 unit	1BK
	• 2 channels • 56 programs (28 per channel) • Channel changeover function										
	2 CO	250	16	230	2		**7LF4532-0**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	Expert digital time switches										
	• Weekly program • Year program • 84 programs per channel • Exception program (priority program) • Astro function • Simple program creation by means of PC using the software included with the 7LF4941-0 USB adapter • Vacation function • 1 h test • Input disable via PIN code • Operating hours counter, counting range: 65535 h										
	• Expert GPS • Use Profi/Astro data key Article No. 7LF4941-1. • With text-assisted programming concept languages: 15 languages • Cycle function can be chosen for channel 1 and channel 2 • Time synchronization possible in combination with GPS antenna 7LF4541-5 + power supply unit for GPS antenna 7LF4541-4. • 1 channel										
	1 CO	250	16	230	2		**7LF4541-0**		1	1 unit	1BK
	• 2 channels (with channel change function)										
	1 CO + 1 NO	250	16	230	2		**7LF4542-0**		1	1 unit	1BK
	• Expert • Use Expert data key, Article No. 7LF4940-2. • With text-assisted programming concept – languages: German, English, French, Italian, Dutch, Spanish • Cycle function can be chosen for channel 1 only • 4 channels										
	4 CO	250	16	120/230	6	▶	**7LF4444-0**		1	1 unit	1BK
	4 CO	250	16	24 AC/DC	6	▶	**7LF4444-2**		1	1 unit	1BK
	**Data keys for Profi and Astro digital time switches** • Programming at the PC (7LF4941-0 USB adapter and software required) • Read-in of programs to the time switch • Writing of programs from the time switch • Transfer of programs - From PC to time switch and vice versa - From time switch to time switch						**7LF4941-1**		1	1 unit	1BK
	**Data keys for Expert digital time switch** • Programming at the PC (7LF4940-0 or 7LF4941-0 USB adapter and software required) • Read-in of programs to the time switch • Writing of programs from the time switch • Transfer of programs - From PC to time switch and vice versa - From time switch to time switch					▶	**7LF4940-2**		1	1 unit	1BK
	**USB adapter and software for Profi, Astro and Expert digital time switches** • For the reading and writing of data keys at the PC • With programming software • With one Profi/Astro data key 7FL4941-1 • Compatible with Profi/Astro data key predecessor model 7LF4940-1 and Expert data key 7LF4940-2 • Can be connected over USB interface • System requirements: - Windows 7, Windows Vista, Windows 2000, Windows ME, Windows XP or Windows 98 Second Edition - USB connection - 40 MB free disk space						**7LF4941-0**		1	1 unit	1BK

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7LF4 digital time switches

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	**Starter kit** • For upgrading with already available USB adapter (7LF4940-0), thus establishing compatibility with new Profi/Astro 7LF4941-1 data keys • Compatible with Expert 7LF4940-2 data key and with predecessor model Profi/Astro 7LF4940-1 data key • Including Profi/Astro 7LF4941-1 data key + software						**7LF4941-3**		1	1 unit	1BK
	**Holders for front panel installation** • Universal application for devices from 1 MW to 6 MW • Cutout dimensions: - Height $45^{+0.5}$ mm - Width 23 mm, 41 mm, 59 mm, 77 mm, 95 mm or 113 mm						**7LF9006**		1	1 unit	1BK
	**Power supply unit for GPS antenna** • For connection between Expert GPS 7LF4541-0 or 7LF4542-0 and GPS antenna 7LF4941-5 • 230 V, 50/60 Hz • Up to 4 Expert GPS per power supply unit				1		**7LF4941-4**		1	1 unit	1BK
	**GPS antenna** • Accessories for 7LF4541-0 and 7LF4542-0 • Cable, max. 50 m • IP 65 • Only to be used in combination with the power supply unit for GPS antenna 7LF4941-4						**7LF4941-5**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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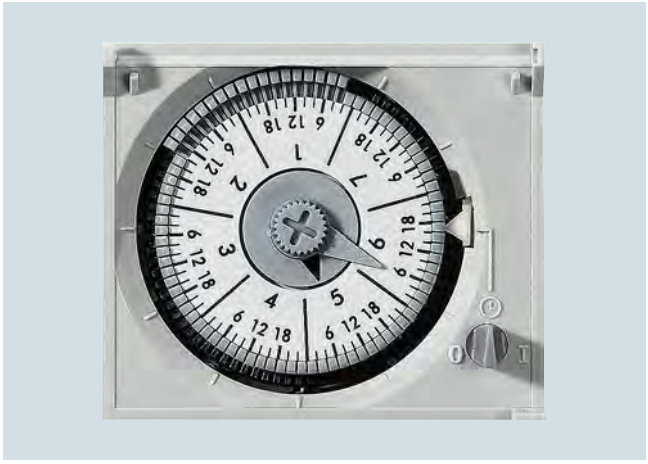
Overview



Mechanical time switches with day disk



Mechanical time switches with week disk

Synchronous time switches without power reserve

The control gear is driven by a synchronous motor so it is dependent on the power supply frequency. If this frequency is unstable, the devices cannot be used. In the event of a power failure, the time switch will stop.

Quartz-clock time switches with power reserve

A quartz electronic circuit supplies the drive with a stabilized frequency so that the time switch is not dependent on the power supply frequency. In the event of a power failure, the time switch continues to operate on its power reserve.

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7LF5 mechanical time switches

Technical specifications

		Synchronous time switches without power reserve				Quartz-clock time switches with power reserve					
		7LF5 300-1	**7LF5 300-5**	**7LF5 300-6**	**7LF5 301-0**	**7LF5 301-1**	**7LF5 301-4**	**7LF5 301-5**	**7LF5 301-6**	**7LF5 301-7**	**7LF5 305-0**
Standards		EN 60730-1, -2-7, UL 917, UL 917, CSA C22.2 No. 14 and 177									
Approvals		VDE, UL file: E301698									
Operating mode		Synchronous				Quartz					
• Time program		Day	Day	Week	Day	Day	Day	Week	Day	Week	Day
Supply											
• Rated control supply voltage U_c	V AC	230				230					
- Primary operating range	× U_c	0.85 ... 1.1				0.85 ... 1.1					
• Rated frequency	Hz	50				50					
- Frequency ranges	Hz	50				50/60					
• Rated power dissipation P_v	VA	1				1	0.2	0.2	1	1	1
Channels/contacts											
• Switching channels		1				1					
- Rated operational voltage U_e	V AC	250				250					
- Rated operational current I_e											
At p.f. = 1	A	16				16					
At p.f. = 0.6	A	4				4					
• Contacts		1 NO	1 CO	1 CO	1 CO	1 NO	1 CO	1 CO	1 CO	1 CO	1 CO
- Mechanical switching cycles	in millions	20				20					
- Electrical switching cycles at p.f. = 1		100000				100000					
• Minimum contact load	V; mA	4; 1				4; 1					
- Incandescent lamp load	A	5				5					
- Fluorescent lamps											
At 7 µA	VA	60				60					
Uncorrected	VA	1400				1400					
Safety											
• Different phases permissible between actuator/contact		Yes				Yes					
• Electrical isolation, creepage distances and clearances, actuator/contact	mm	8/6				8/6					
• Rated impulse withstand voltage U_{imp} actuator/contact	kV	4				4					
- EMC: Burst acc. to IEC 61000-4-4	kV	> 4.4				> 4.4					
- EMC: Surge acc. to IEC 61000-4-5	kV	> 2.0				> 2.0					
- Electrostatic discharge according to IEC 61000-4-2	kV	> 8.0				> 8.0					
• Power reserve storage	a	--				100 h	6		100 h		
- Minimum loading time	h	--				48	--		48		
- Battery type		--				NiMH cell	Li primary cell		NiMH cell		
- Service life of battery											
At 20 °C	a	--				6	10		6		
At 40 °C	a	--				5					
• Overvoltage category acc. to EN 61010-1		III				III					
Function											
• Minimum switching sequences	min	30		240	30	30		240	30	240	30
• Make and break cycles	min	15		120	10	15		120	15	120	10
• Switching accuracy	min	± 5		± 30	± 5	± 5		± 30	± 5	± 30	± 5
• Clock errors per day		System-synchronized				± 2.5 s	± 60 s/year		± 2.5 s		
Connections											
• Terminals ± Screw (Pozidriv)		PZ 1				PZ 1					
• Conductor cross-sections of main current paths											
- Rigid, max.	mm^2	4				4					
- Rigid, min.	mm^2	1.5				1.5					
- Flexible, with end sleeve	mm^2	2.5				2.5					
- Flexible, without end sleeve	mm^2	4				4					
Environmental conditions											
• Permissible ambient temperature	°C	-10 ... +55				-10 ... +55					
• Storage temperature	°C	-10 ... +60				-10 ... +60					
• Resistance to climate	Acc. to EN 60068-1	10/055/21				10/055/21					
• Degree of protection	Acc. to EN 60529	IP20, with connected conductors				IP20, with connected conductors					
• Safety class	Acc. to EN 61140	II				II					

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	**Synchronous time switches without power reserve, 1 MW**										
	• Day disk										
	1 NO	250	16	230	1	▶	**7LF5300-1**		1	1 unit	1BK
	**Synchronous time switches without power reserve, 3 MW**										
	• Day disk										
	1 CO	250	16	230	3	▶	**7LF5300-5**		1	1 unit	1BK
	• Week disk										
	1 CO	250	16	230	3	▶	**7LF5300-6**		1	1 unit	1BK
	**Synchronous time switches without power reserve, for wall mounting**										
	• Day disk										
	1 CO	250	16	230	--	▶	**7LF5301-0**		1	1 unit	1BK
	**Quartz-clock time switches with power reserve**										
	• Day disk										
	1 NO	250	16	230	1	▶	**7LF5301-1**		1	1 unit	1BK
	**Quartz-clock time switches with power reserve and automatic time setting for Central European time zone**										
	• Time set automatically during commissioning • Automatic daylight savings • With quartz clock mechanism • Clock accuracy ± 0.2 s/day • 5-year power reserve (time buffer in the event of a power failure)										
	• Day disk										
	1 CO	250	16	230	3	▶	**7LF5301-4**		1	1 unit	1BK
	• Week disk										
	1 CO	250	16	230	3	▶	**7LF5301-5**		1	1 unit	1BK
	Quartz-clock time switches with power reserve										
	Clock accuracy ± 2.5 s/day										
	• Day disk										
	1 CO	250	16	230	3	▶	**7LF5301-6**		1	1 unit	1BK
	• Week disk										
	1 CO	250	16	230	3	▶	**7LF5301-7**		1	1 unit	1BK
	**Quartz-clock time switches with power reserve, for wall mounting (surface mounting)**										
	• Day disk										
	1 CO	250	16	230	--	▶	**7LF5305-0**		1	1 unit	1BK
	**Holders for front panel installation**										
	Universal use for devices from 1 to 6 MW										
	Cutout dimensions: Height $45^{+0.5}$ mm Width 23 mm, 41 mm, 59 mm, 77 mm, 95 mm or 113 mm						**7LF9006**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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7LF6 timers for buildings

Overview

Siemens stairwell lighting timers enable the required time to be set precisely without tools using the push-to-lock knurling wheel. The stairwell lighting timers in four-wire installations can be switched back on again at any time by simply pressing the switch. A maintained light switch prevents the need for repeated pressing, for example when moving house. The various types are also available with warning of impending switch-off.

Benefits

- Durable switching of different illuminants thanks to patented contact design
- Suitable for energy-saving lamps
- Quiet switching of stairwell lighting timers
- Warning of impending switch-off in accordance with DIN 18015-2 for stairwell lighting in apartment blocks

Technical specifications

			7LF6110	7LF6111	7LF6114	7LF6115
Standards			IEC 60669, EN 60669			
Supply						
• Rated control supply voltage U_c		V AC	230			
- Primary operating range	At 50/60 Hz	× U_c	0.9 ... 1.1			
• Rated power dissipation P_v		VA	Approx. 5			
Setting range		min	0.5 ... 10		0.5 ... 10	3 ... 60
• Accuracy		s	± 30			
Manual switches	Automatic/permanent		Yes			
Minimum push duration		ms	30			
Voltage endurance	At pushbutton input (pushbutton malfunction)		Yes			
Short-circuit strength		A	700		700	
Channels/contacts						
• Switching channels						
- Rated operational voltage U_e		V AC	250			
- Rated operational current I_e	At p.f. = 1	A	16		16	
• Contact gap		mm	> 3		> 3	
• Minimum contact load		V; mA	10; 300			
Max. incandescent lamp load		W	2000		2000	
Max. energy-saving lamp load 14 W		Unit(s)	20		20	
Fluorescent lamp load 58 W						
- Uncorrected		Unit(s)	20		20	
- DUO circuit		Unit(s)	2 × 20		2 × 20	
- Siemens ECG	1 lamp	Unit(s)	10		10	
	2 lamps	Unit(s)	2 × 5		2 × 5	
Glow lamp load		mA	50		50	
Max. fan load		VA	--			
Connections						
• Terminals ± Screw (Pozidriv)			PZ 1			
• Conductor cross-sections of main current paths						
- Rigid		mm^2	1.5 .. 6			
- Flexible, with end sleeve	Min.	mm^2	1			
Environmental conditions						
• Resistance to climate	Acc. to EN 60068-1	°C	-20 ... +50			
• Degree of protection	Acc. to EN 60529		IP20, with connected conductors			

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	**Stairwell lighting timers**										
	With switch for continuous light and push-to-lock knurling wheel setting, setting range 0.5 ... 10 minutes										
	For 3-wire circuit, L-momentary contact, not resettable	250	16	230	1	►	**7LF6110**		1	1 unit	1BK
	For 4-wire circuit, L-momentary contact, resettable, or 3-wire circuit, N-momentary contact, resettable	250	16	230	1	►	**7LF6111**		1	1 unit	1BK
	With warning by flashing prior to switching off, for 4-wire circuit, L-momentary contact, resettable, or 3-wire circuit, N-momentary contact, resettable	250	16	230	1	►	**7LF6113**		1	1 unit	1BK
	**Lighting timers**										
	With switch for continuous light and push-to-lock knurling wheel setting, with warning by flashing prior to switch-off, setting range 0.5 ... 10 minutes, 4-fold extension of runtime by pressing the pushbutton for 1 second, for 4-wire circuit, L-momentary contact, or 3-wire circuit, N-momentary contact	250	16	230	1	►	**7LF6114**		1	1 unit	1BK
	**Energy-saving timers**										
	With switch for continuous light and push-to-lock knurling wheel setting, with warning by flashing prior to switch-off, setting range 3 ... 60 minutes, switch off by pressing pushbutton second time as with remote control switch, for 4-wire circuit, L-momentary contact, resettable, or 3-wire circuit, N-momentary contact, resettable	250	16	230	1	►	**7LF6115**		1	1 unit	1BK

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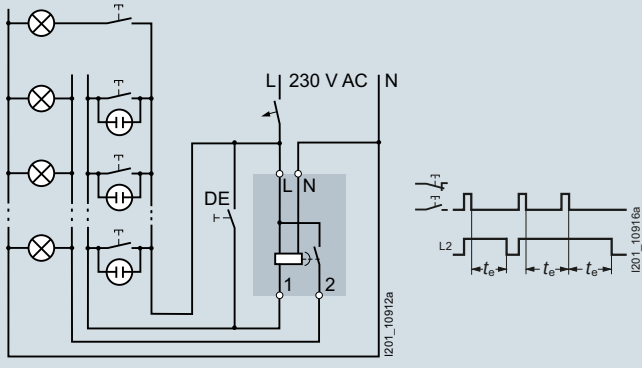
Circuit diagrams

Typical circuit for 7LF6111 timer in 4-wire circuit, L-momentary, resettable

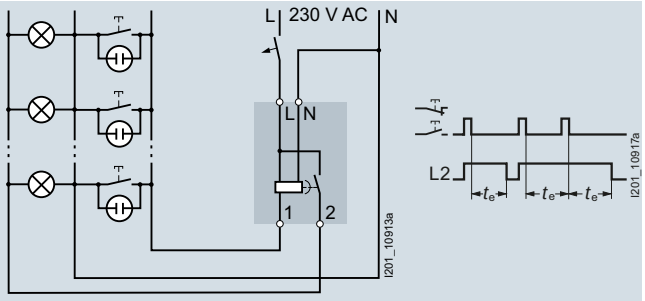
Usual circuit for new installation with separate cable routing for pushbuttons and lights. The additional DI switch allows external switching to continuous light or a time switch can also be used for this purpose. An additional attic circuit is also available, which operates independently of the timer, but on the same electrical circuit. The timer can be restarted before the set time expires.



t_e = runtime

Typical circuit for 7LF6111 timer in 3-wire circuit, N-momentary, resettable

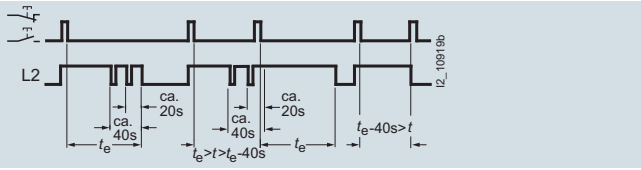
Can only be used with a limited number of wires. The timer can be restarted before the set time expires. While this 3-wire circuit with N-momentary contact is technically possible, it does not comply with DIN VDE 0100-460. However, it is used in legacy systems for replacement purposes.



t_e = runtime

Typical circuit for 7LF6115 energy-saving timer with advance warning

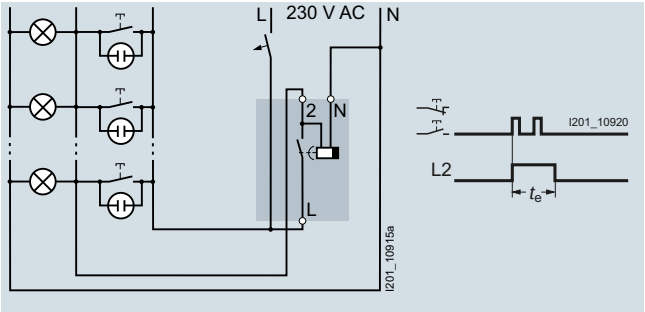
The timer is connected in the same way as the 7LF6111 timer in a 4-wire or 3-wire circuit. The energy-saving timer switches on if pressed once and switches off when it is pressed again. If it is not switched off manually, it is automatically switched off after the set time, max. 60 minutes. 20 and 40 seconds before expiry, the light flashes briefly twice (50 ms) to warn of the impending tripping. This allows time to reset the switch while the light is still on. Prior to the warning time, a push of the button ends the timing interval.



t_e = runtime

Typical circuit for 7LF6110 timer in 3-wire circuit, L-momentary contact, not resettable

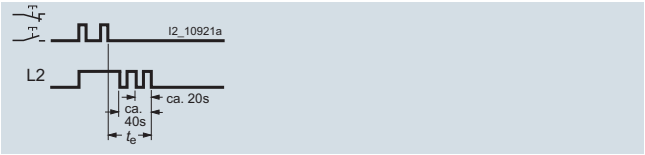
Circuit for new installation with shared cable routing for pushbuttons and lights. The timer can only be restarted after the set time expires.



t_e = runtime

Typical circuit for 7LF6113 energy-saving timer with advance warning

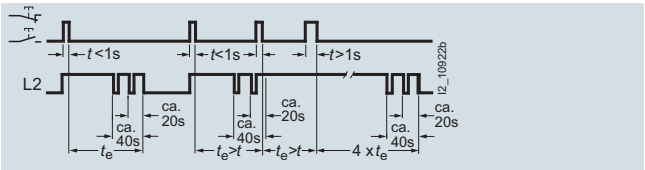
The timer is connected in the same way as the 7LF6111 timer in a 4-wire or 3-wire circuit. 20 and 40 seconds before expiry, the light flashes briefly twice (50 ms) to warn of the impending tripping. This allows time to reset the switch while the light is still on.



t_e = runtime

Typical circuit for 7LF6114 energy-saving timer with advance warning

The timer is connected in the same way as the 7LF6111 timer in a 4-wire or 3-wire circuit. When pressed, the lighting timer switches on for the set runtime, up to 10 minutes. If the switch is pressed for more than one second, the light is switched on for four times the set time, i.e. up to 40 minutes. The last press of the pushbutton is definitive. 20 and 40 seconds before expiry, the light flashes briefly twice (50 ms) to warn of the impending tripping. This allows time to reset the switch while the light is still on. The timing interval restarts each time the button is pressed.



t_e = runtime

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Time relays are primarily used in series applications where the use of PLC controls is too labor and cost-intensive. Multifunction relays with a range of functionalities and clear and intuitive operation are now market standard.

Benefits

- Suitable for universal use because the devices can be operated with 12 - 240 V AC/DC and work across a broad range from seconds to hours
- An off-delay without auxiliary power supports expanded application

Technical specifications

			5TT3185	5TT3181
Standards			DIN EN 60255; DIN VDE 0435-110	
Supply				
• Rated control supply voltage U_c		V AC V DC	12 ... 240 12 ... 240	220 ... 240 --
- Primary operating range		× U_c	0.8 ... 1.1	
• Rated frequency f_n		Hz	45 ... 400	50/60
• Rated power dissipation P_v		VA	Approx. 1.5	Approx. 5
Setting ranges			See setting ranges, timing intervals	
Recovery time		ms	15 ... 80	Approx. 40
Contacts				
• Switching channels - Rated operational voltage U_e - Rated operational current I_e		 V AC A	 250 4	 8
• Contact gap - Minimum contact load		mm V; mA	µ contact 10; 300	
Rated impulse withstand voltage U_{imp}	Input/output	kV	> 4	
Electrical service life	In switching cycles At AC-15	1 A	1.5×10^5 --	-- 1.5×10^5
Connections				
• Terminals ± Screw (Pozidriv)			2	
• Conductor cross-sections of main current paths - Rigid, max. - Flexible, with end sleeve, min.		 mm2 mm2	 2 × 2.5 2 × 1.5	
Environmental conditions				
• Permissible ambient temperature		°C	-40 ... +60	
• Resistance to climate	Acc. to EN 60068-1		40/60/4	

Selection and ordering data

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V	MW	d					
	**Multifunction timers** Programmable for: response delay; passing make contact function; delayed pulse generator; clock generator starting with impulse; off-delay; pulse converter; passing break contact function; response/off-delay										
	1 CO	250	4	12 ... 240 DC 12 ... 240 AC	1	▶	**5TT3185**		1	1 unit	1BK
	Delay timers										
	1 CO	250	8	220 ... 240 AC	1	▶	**5TT3181**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT3 timers for industrial applications

More information

5TT3185 multifunction timers

Setting aids

The period of the flashing of the green LED 1 when set for a timing interval is 1 s ± 4%, which can therefore be used as a setting aid. This is particularly useful in the lower time setting range and for long delay times because of the accuracy of the multiplication factors between the individual time ranges.

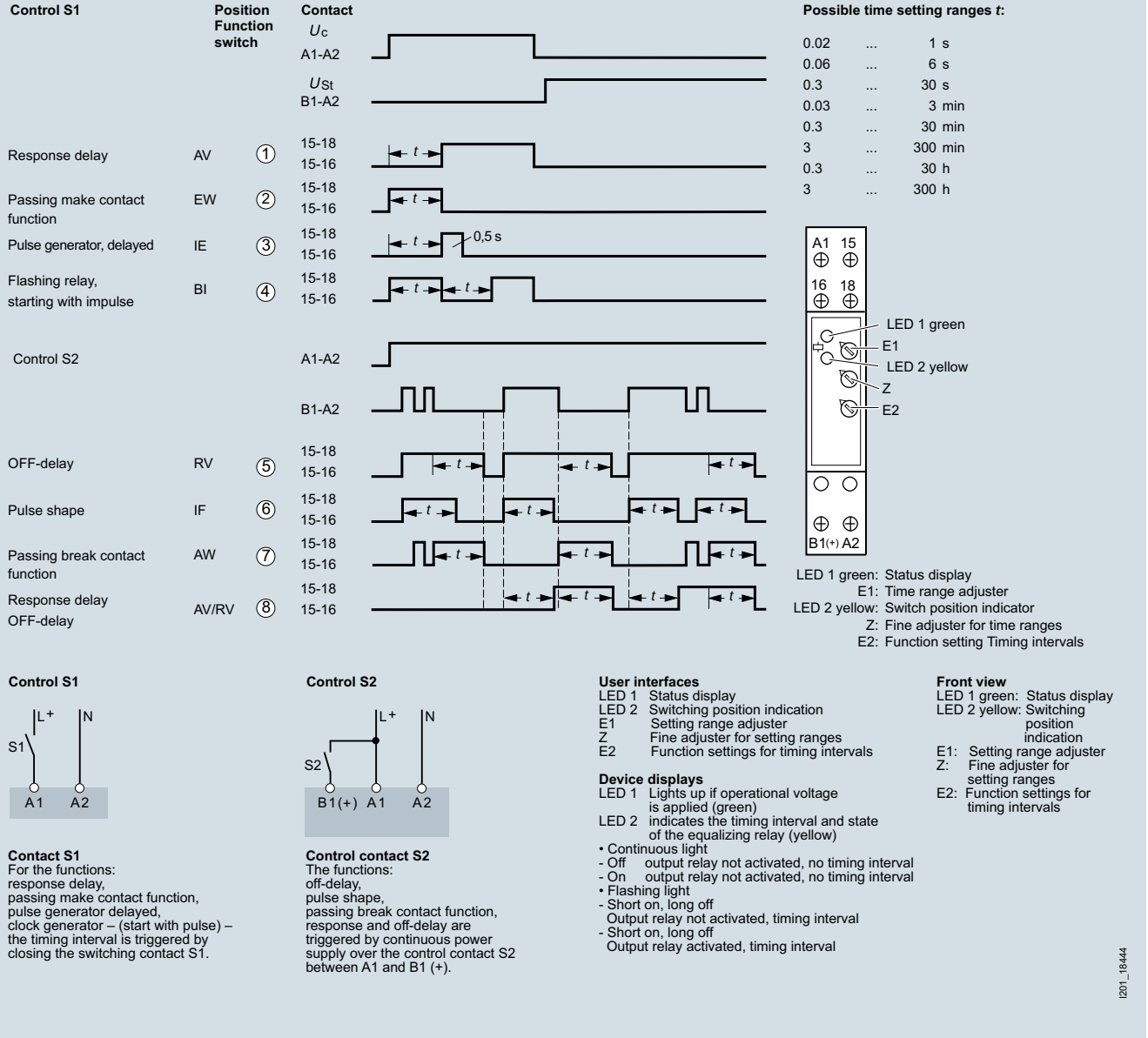
Example:
Delay time to be set: 40 min.
Using the fine setting, this delay time can be set within the setting range 3 ... 300 min. However, in this case it takes a long time to check the time and requires several operational sequences in real time. To speed up the setting process, the setting range is switched to 0.03 ... 3 min. In this case, the required value corresponds to a delay time of 0.4 min (= 24 s). The timing interval is triggered and the potentiometer is set to 24 flashing periods of the yellow LED 2. The device is then set back to the setting range 3 ... 300 min and the setting process is completed.

Time operation interruption/time addition

For the functions AV, EW, IE, BI, the timing interval can be interrupted at any time by activating B1 (+) and continued again by removing the control voltage (time addition).

Control input B1

The functions RV, IF, AW, AV/RV can be controlled using the control input B1 (+) with potential against terminal A2. The auxiliary voltage of terminal A1 can be used for this purpose, as well as any other voltage within the range 12 ... 240 V AC/DC. The operation of parallel loads (e. g. contactors) from B1 (+) to A2 is also permissible.
If voltage is simultaneously applied to the control input B1 (+) and A1 for the IF function, this triggers an output pulse with the set time interval t_1.



Control S1

Contact S1
For the functions:
response delay,
passing make contact function,
pulse generator delayed,
clock generator – (start with pulse) –
the timing interval is triggered by
closing the switching contact S1.

Control S2

Control contact S2
The functions:
off-delay,
pulse shape,
passing break contact function,
response and off-delay are
triggered by continuous power
supply over the control contact S2
between A1 and B1 (+).

User interfaces
LED 1 Status display
LED 2 Switching position indication
E1 Setting range adjuster
Z Fine adjuster for setting ranges
E2 Function settings for timing intervals

Device displays
LED 1 Lights up if operational voltage is applied (green)
LED 2 indicates the timing interval and state of the equalizing relay (yellow)
• Continuous light
- Off output relay not activated, no timing interval
- On output relay not activated, no timing interval
• Flashing light
- Short on, long off
Output relay not activated, timing interval
- Short on, long off
Output relay activated, timing interval

Front view
LED 1 green: Status display
LED 2 yellow: Switching position indication
E1: Setting range adjuster
Z: Fine adjuster for setting ranges
E2: Function settings for timing intervals

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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10/2 **Introduction**

10/3 **4AC3 bell transformers**

10/4 **4AC3 safety transformers**

10/5 **4AC2 power supply units**

10/6 **5TE6 REG socket outlets**

For further technical product information:

Configuration Manual

Transformers, Power Supply Units and Socket Outlets
Article No.: 3ZW1012-4AC32-0AC1

Siemens Industry Online Support:

www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Introduction

Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**4AC3 bell transformers**	10/3	Power supply up to 18 VA as safety extra-low voltage (SELV) in residential buildings for the supply of gongs, buzzers, bells, door openers and remote control switches	EN 61558-1 EN 61558-2-8	✓	✓	--
	**4AC3 safety transformers**	10/4	Power supply up to 63 VA as safety extra-low voltage (SELV) for the supply of control circuits, switching relays and Insta contactors	EN 61558-1 EN 61558-2-6	✓	--	✓
	**4AC2 power supply units**	10/5	Direct voltage power supply up to 24 V DC and 2 A as safety extra-low voltage (SELV) for the supply of gongs, buzzers, bells, door openers, switching relays and Insta contactors	EN 61558-2-6	✓	✓	✓
	**5TE6 REG socket outlets**	10/6	For power supply during maintenance in distribution boards in DIN VDE, CEE 7, CEI 23-50 and UL 498 versions	DIN VDE 0620-1, CEE 7 standard sheet V, CEI 23-50, UL 498	✓	✓	✓

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Overview

A typical application for these bell transformers is short-time use, as occurs with bells, gongs, door openers or remote control switches in residential buildings.

Siemens bell transformers are protected against short-circuit or moderate overload by a PTC resistor. After a short-circuit, the primary current must be briefly disconnected from the mains before restarting.

Higher output voltages will occur in the event of low-load or no-load operation.

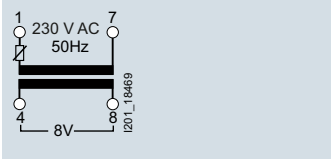
Technical specifications

			4AC3208-0	4AC3208-1	4AC3214-0	4AC3218-0
Standards			EN 61558-1, EN 61558-2-8			
Rated operational power P_S		VA	8	8	14	18
Rated operational voltage U_e		V AC	230			
Operating range at 50 Hz		× U_e	1.04			
Rated frequency		Hz	50			
Rated secondary voltage U_{sec}						
		V AC	--	--	--	4
		V AC	8	8	8	8
		V AC	--	12	12	12
		V AC	--	--	24	--
Rated secondary current I_{sec}						
• At 4 V		A AC	--	--	--	2.0
• At 8 V		A AC	1.0	1.0	2.0	2.0
• At 12 V		A AC	--	0.6	1.3	1.5
• At 24 V		A AC	--	--	0.6	--
Rated power dissipation P_v						
• In no-load operation		W	1.2	1.2	1.3	1.3
• At a rated voltage of 4 V		W	--	--	--	5.5
• At a rated voltage of 8 V		W	5.7	5.7	10.5	8.1
• At a rated voltage of 12 V		W	--	3.8	7.4	8.4
• At a rated voltage of 24 V		W	--	--	4.2	--
Safe separation						
• Creepage distances and clearances		mm	> 6			
Insulation class			E			
Test voltage, 50 Hz, 1 second						
• Primary against secondary winding		kV	4			
Conductor cross-sections						
• Rigid		mm^2	1 x 4 or 2 x 2.5			
• Flexible, with end sleeve		mm^2	1 x 2.5 or 2 x 1.5			
Permissible ambient temperature		°C	40	35	40	40
Permissible humidity		%	91			
Degree of protection	Acc. to EN 60629		IP20			
Safety class	Acc. to EN 61140 (VDE 0140-1)		II			

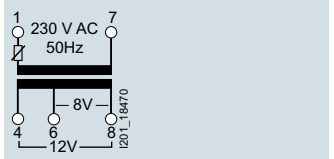
Selection and ordering data

	U_e	U_{sec}	I_{sec}	P_s	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS/ P. unit	PG
	V AC	V AC	A AC	VA	MW	d					
	Bell transformers										
	230	8	1.0	8	2	A	**4AC3208-0**		1	1 unit	12H
		8/12	1.0/0.6	8	2	A	**4AC3208-1**		1	1 unit	12H
		8/12/24	2.0/1.3/0.6	14	2	A	**4AC3214-0**		1	1 unit	12H
		4/8/12	2.0/2.0/1.5	18	2	A	**4AC3218-0**		1	1 unit	12H

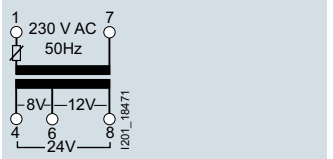
Circuit diagrams



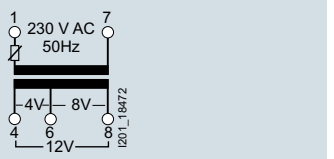
4AC3208-0



4AC3208-1



4AC3214-0



4AC3218-0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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4AC3 safety transformers

Overview

These transformers up to 63 VA provide a safety extra-low voltage for supplying control circuits, switching relays or Insta contactors in continuous operation as alternating voltage power supply for 8 V, 12 V, 16 V, 24 V and 32 V AC.

Higher output voltages will occur in the event of low-load or no-load operation. Siemens safety transformers are protected against short-circuit or moderate overload by a PTC resistor. After a short-circuit, the primary current must be briefly disconnected from the mains before restarting.

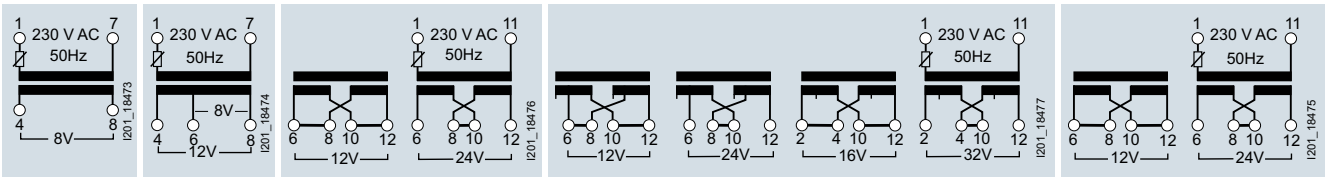
Technical specifications

			4AC3716-0	4AC3724-0	4AC3740-0	4AC3740-1	4AC3763-0
Standards			EN 61558-1, EN 61558-2-6				
Rated operational power P_S		VA	16	24	40	40	63
Rated operational voltage U_e		V AC	230				
Operating range at 50 Hz		× U_e	1.04				
Rated frequency		Hz	50				
Rated secondary voltage U_{sec}							
		V AC	8	8	--	--	--
		V AC	--	--	12	12	2 × 12
		V AC	--	12	--	--	--
		V AC	--	--	--	16	--
		V AC	--	--	24	24	24
		V AC	--	--	--	32	--
Rated secondary current I_{sec}							
• At 8 V		A AC	2.0	2.0	--	--	--
• At 12 V		A AC	--	2.0	3.3	3.3	5.2
• At 16 V		A AC	--	--	--	2.5	--
• At 24 V		A AC	--	--	1.6	1.6	2.6
• At 32 V		A AC	--	--	--	1.2	--
Rated power dissipation P_v							
• In no-load operation		W	1.1	1.1	3.5	3.9	3.9
• At a rated voltage of 8 V		W	6.8	4.6	--	--	--
• At a rated voltage of 12 V		W	--	7.6	7.1	7.5	13.2
• At a rated voltage of 16 V		W	--	--	--	7.7	--
• At a rated voltage of 24 V		W	--	--	7.7	8.1	13.5
• At a rated voltage of 32 V		W	--	--	--	7.6	--
Safe separation							
• Creepage distances and clearances		mm	> 6				
Insulation class			E		F		
Test voltage, 50 Hz, 1 second							
• Primary against secondary winding		kV	4				
Conductor cross-sections							
• Rigid		mm^2	1 x 4 or 2 x 2.5				
• Flexible, with end sleeve		mm^2	1 x 2.5 or 2 x 1.5				
Permissible ambient temperature		°C	25				
Permissible humidity		%	91				
Degree of protection	Acc. to EN 60529		IP20				
Safety class	Acc. to EN 61140 (VDE 0140-1)		II				

Selection and ordering data

	U_e	U_{sec}	I_{sec}	P_s	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS/ P. unit	PG
	V AC	V AC	A AC	VA	MW	d					
	Safety transformers										
		8	2.0	16	2	A	**4AC3716-0**		1	1 unit	12H
		8/12	2.0/2.0	24	3	A	**4AC3724-0**		1	1 unit	12H
	230	12/16/24/32	3.3/2.5/1.6/1.2	40	5	A	**4AC3740-1**		1	1 unit	12H
		12/24	3.3/1.6	40	5	A	**4AC3740-0**		1	1 unit	12H
		2 x 12/24	5.2/2.6	63	5	A	**4AC3763-0**		1	1 unit	12H

Circuit diagrams



4AC3716-0 4AC3724-0 4AC3740-0 4AC3740-1 4AC3763-0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The electronic power supply unit provides a 24 V DC supply to systems with an operational voltage of 85 to 265 V AC or 85 to 300 V DC. The device operates in the lower class for minimum power supply with a safety extra-low voltage (SELV).

The electronic power supply unit is suitable for supplying the 5TT71 GSM alarm modules within a supply voltage range of 150 to 230 V AC.

Technical specifications

			4AC2402
Standards			EN 60068-2, EN 61558-1, EN 61000-4
Approvals			--
Rated operational power P_S		W	8.4
Rated operational voltage U_e		V AC V DC	85 ... 265 85 ... 300
Permissible operational voltage For the 5TT71 GSM alarm modules		V AC/DC	150 ... 265
Primary operating range	At 50/60 Hz	× U_e	--
Rated frequency		Hz	50/60
Operating frequency range		Hz	--
Rated secondary voltage U_{sec}		V DC	24 ± 5 %
Rated secondary current I_{sec}		A DC	0.35
Current limitation			Electronic overload protection
Residual ripple		mV	< 100
Rated power dissipation P_v	In no-load operation At rated load	W W	-- --
Hum-free	Core molded		--
Safe separation	Creepage distances and clearances	mm	> 5.5
Insulation class			--
Test voltage Primary against secondary winding	50 Hz, 1 min	kV	--
Insulation resistance		kV	4
Rated impulse withstand voltage/ degree of pollution	Acc. to IEC 60664-1		6 kV/2
Static discharge	Acc. to IEC/EN 61000-4-2	kV	8
RF irradiation	Acc. to IEC/EN 61000-4-3	V/m	10
Transient overvoltage (burst)	Acc. to IEC/EN 61000-4-4	kV	4
Transient overvoltage (surge) Acc. to IEC/EN 61000-4-5			
• Supply lines A1, A2		kV	1
• A1/A2 and ground		kV	2
RF, conducted disturbance	Acc. to IEC/EN 61000-4-6	V	10
Interference suppression to lower limit class	Acc. to EN 61000-6-3		Complied with
Terminals			
• Screw (slotted-head)			M2.5
• ± screw (Pozidriv)			--
Conductor cross-sections			
• Rigid		mm^2	0.5 ... 2.5
• Flexible, with end sleeve, min.		mm^2	0.5 ... 1.5
Permissible ambient temperature		°C	-20 ... +60
Resistance to climate	Acc. to IEC/EN 60068-1		20/045/04
Resistance to vibrations Frequency 10 ... 55 Hz	Acc. to IEC/EN 60068-2-6	mm	0.35 amplitude
Degree of protection	Acc. to EN 60529		IP20, with connected conductors
Safety class	Acc. to EN 61140		II

Selection and ordering data

	U_e		U_{sec}	I_{sec}	P_s	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS/ P. unit	PG
	V AC	V DC	V DC	A DC	W	MW	d					
	**Electronic power supply unit** SELV, short-circuit resistant											
	85 ... 265	85 ... 300	24 ± 5 %	0.35	8.4	2	B	**4AC2402**		1	1 unit	12H

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TE6 REG socket outlets

Overview

The socket outlets for mounting in distribution boards to DIN 43880 and on standard mounting rails to DIN 60715 have since become standard in modern switchgear assemblies/distribution boards. The socket outlet range complies with a number of different standards and is available according to the standards of the following countries: VDE for Germany, CEE7 for Belgium/France, CEI for Italy and UL for USA.

In distribution boards with 55 mm mounting depth, the socket outlet can only be used without the hinged lid. The lids can be retrofitted on all devices. In system components where equipment is still live even after the main switch has been disconnected, this must be indicated according to EN 50110-1 (VDE 0105-1) and IEC/EN 60204-1/VDE 0113-1. Yellow socket outlets are used for these applications.

Technical specifications

		5TE6800	5TE6801	5TE6810	5TE6802	5TE6803	5TE6804
Standards		**VDE 0620-1**	**VDE 0620-1**	**VDE 0620-1**	**CEI 23-50**	**CEE 7 standard sheet V**	**UL 498**
Approvals		VDE 0620-1			--		UL File No. E258598/ CSA C22.2 No. 182.3M
Rated operational voltage U_e	V AC	230					125
Rated operational current I_e	A AC	16					15
Terminals ± screw (Pozidriv)		PZ1					
Terminal tightening torque, max.	N	1.2					
Stripped length	mm	10					
Conductor cross-sections							
• Rigid	mm^2	1.5 .. 6					
• Flexible, with end sleeve	mm^2	0.5 ... 4					
• Rigid	AWG	10 ... 14					
• Flexible	AWG	14					
Permissible ambient temperature	°C	-10 ... +55					
Degree of protection Acc. to EN 60529		IP20, with connected conductors					
Mounting position		Without cover: any, with cover: vertical or horizontal					

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Selection and ordering data

	U_e	I_e	Conductor cross-section	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS/ P. unit	PG
	V AC	A	mm^2	MW	d					
	**SCHUKO® socket outlets according to DIN VDE 0620-1**									
	• Without hinged lid									
	230	16	6	2.5	▶	**5TE6800**		1	1 unit	13D
	**SCHUKO® socket outlets according to DIN VDE 0620-1**									
	• With hinged lid									
	230	16	6	2.5	▶	**5TE6801**		1	1 unit	13D

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	U_e	I_e	Conductor cross-section	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS/ P. unit	PG
	V AC	A	mm^2	MW	d					
	**SCHUKO® socket outlets according to DIN VDE 0620-1**									
	• Without hinged lid, yellow RAL 1018									
	230	16	6	2.5	▶	**5TE6810**		1	1 unit	13D
	**Socket outlets according to CEI 23-50**									
	• With hinged lid									
	230	16	6	2.5	▶	**5TE6802**		1	1/48 units	13D
	**Socket outlets according to CEE 7 standard sheet V**									
	• Without hinged lid, with grounding pin									
	230	16	6	2.5	▶	**5TE6803**		1	1/48 units	13D
	**UL 498 socket outlets**									
	• Without hinged lid									
	125	15	6	2.5	▶	**5TE6804**		1	1 unit	13D
	**Hinged lids for 5TE6 socket outlets**			2.5	C	**5TE9120**		1	1 unit	13D

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Notes

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11/2 System overview
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11/9 Introduction
11/10 Basic assemblies

8US 60 mm compact busbar systems up to 360 A
3-/5-pole
11/11 Introduction
11/12 Basic assemblies
3-pole
11/13 Infeeds and connection methods
11/14 Built-in components
11/15 Device adapters and device holders
11/16 Accessories
5-pole (up to 200 A)
11/17 Infeeds and connection methods
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11/19 Accessories

8US 60 mm busbar systems up to 1600 A
11/20 Introduction
11/21 Basic assemblies up to 630 A
11/24 Basic assemblies up to 1600 A
11/25 Infeeds and connection methods
11/28 Built-in components
11/34 Device adapters and device holders
11/41 Accessories

For further technical product information:

Configuration Manual

8US Busbar Systems
Article No.: 3ZW1012-8US10-0AC1

Siemens Industry Online Support:

www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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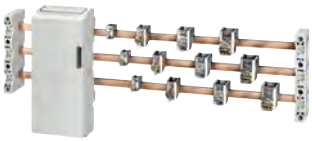
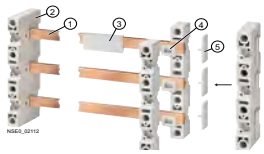
System overview

Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**8US 40 mm busbar systems up to 400 A**	11/9	Basic assemblies up to 400 A, busbar supports, busbars, touch protection covers	EN 13601 IEC 61439-1, IEC 61439-2	✓	--	✓
	Basic assemblies	11/10	Basic assemblies up to 400 A, busbar supports, busbars, touch protection covers	EN 13601 IEC 61439-1, IEC 61439-2	✓	--	✓
	**60 mm compact busbar systems up to 360 A**	11/11		EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	3-/5-pole: Basic assemblies	11/12	Basic assemblies up to 360 A, busbar supports, busbars, touch protection covers	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	3-pole: Infeeds and connection methods	11/13	Infeed for busbar systems, terminals	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	3-pole: Built-in components	11/14	3-pole NEOZED bus-mounting bases	IEC 60947-3, EN 60947-3 (VDE 0660) IEC 60269, EN 60269 (VDE 0636)	✓	--	✓
	3-pole: Device adapters and device holders	11/15	Busbar device adapters and device holders for the assembly of 3RV2/3RT2 load feeders	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	5-pole: Infeeds and connection methods	11/17	Infeed for busbar systems, terminals	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	5-pole: Device adapters and device holders	11/18	Busbar device adapters and device holders for the assembly of 3RV2/3RT2 load feeders	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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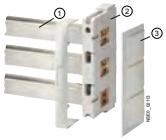
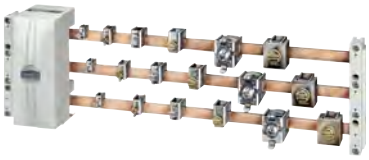
Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**8US 60 mm busbar systems up to 1600 A**	11/20		EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	Basic assemblies up to 630 A	11/21	Basic assemblies up to 630 A, busbar supports, busbars, touch protection covers	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	Basic assemblies up to 1600 A	11/24	Basic assemblies up to 1600 A, busbar supports, busbars, touch protection covers	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	Infeeds and connection methods	11/25	Infeed for busbar systems, terminals ...	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓
	Built-in components	11/28	3-pole NEOZED bus-mounting bases or DIAZED bus-mounting bases, NEOZED bus-mounting switch disconnectors, fuse switch disconnectors and busbar device adapters	IEC 60947-3, EN 60947-3 (VDE 0660) IEC 60269, EN 60269 (VDE 0636)	✓	--	✓
	Device adapters and device holders	11/34	Busbar device adapters and device holders for the assembly of 3RV2/3RT2 load feeders	EN 13601 IEC 61439-1, IEC 61439-2 UL 508 A	✓	--	✓

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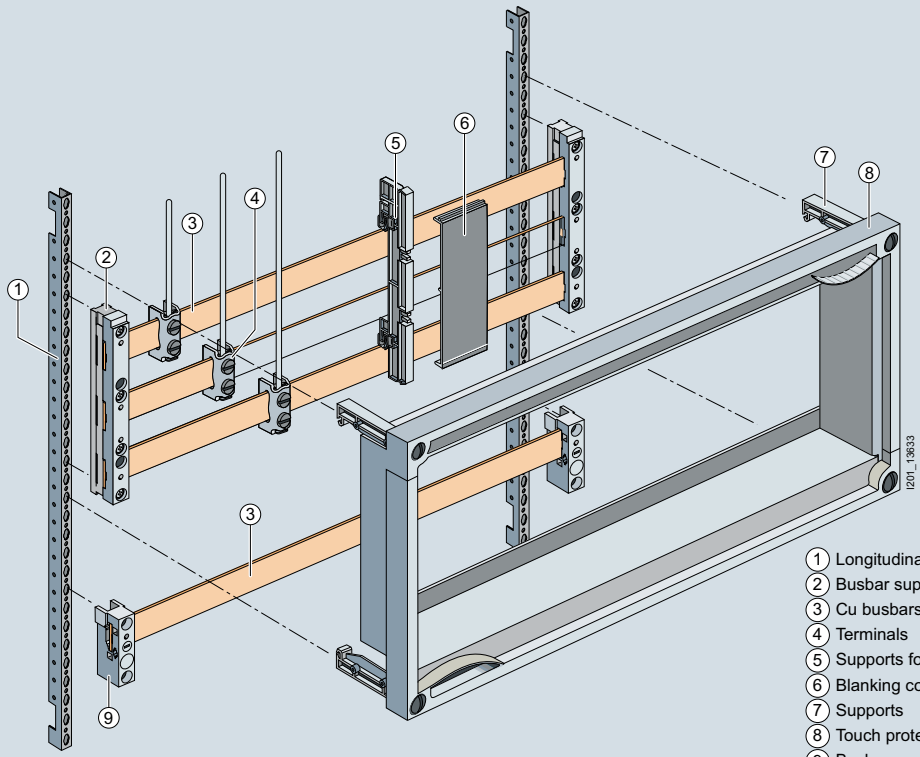
General data

Overview

The use of busbar systems with their versatile rail-adaptable connection, switching and installation devices is an ideal and cost-effective electrotechnical enhancement of modern distribution boards thanks to their small footprint, compact design and quick assembly contacts. Mounting is implemented on longitudinal stays. The standard busbar spacing is 60 mm. However, 40 mm, 100 mm and 185 mm systems are also in use.



1 Longitudinal stays
2 Busbar supports, three-phase
3 Cu busbars
4 Terminals
5 Supports for blanking covers
6 Blanking covers
7 Supports
8 Touch protection cover
9 Busbar supports, single-phase

11

Benefits

Notable cost reduction compared to conventional installation in switchgear and control cabinets due to the following reasons:

- Mechanical fixing and electrical contacting in a single step
- No access wiring and fewer busbar terminals used
- Double use of the busbar space
- Clear arrangement
- Straightforward replacement of individual devices or whole combinations
- High operational safety through finger-safe cover of the adapters and device holders

All the above advantages are felt especially in cases where many tap-off units of the same performance range are required.

Application

8US busbar systems are used for the direct busbar-mounting of current-limiting devices (protective devices) such as fuse switch disconnectors and circuit breakers as well as complete load feeders.

8US busbar systems are designed for horizontal mounting of the busbars.

Design

8US busbar systems with 60 mm busbar center-to-center spacing as well as flat copper profiles have become firmly established on the world market.

The permissible busbar temperature is decisive when dimensioning the busbars. The busbar temperature is dependent on the current and the current distribution, on the busbar cross-section and the busbar surface, on the position of the busbars, convection and the ambient temperature. The values stated in the following table can only be considered as guide values because the conditions vary with each location. The values are based on continuous current over the whole busbar length.

The busbar runs prove most advantageous when the infeed is centrally located and the load is distributed symmetrically on both sides.

Function

Short-circuit strength

The short-circuit strength of the busbar system is dependent on the distance of the busbar supports and on the busbar cross-section.

The short-circuit strength of the whole system is dependent on the short-circuit strength of the busbars and of the adapters with circuit breakers or switch disconnectors. If one of these values is lower than the prospective short-circuit current at the installation site, a current-limiting protective device has to be mounted upstream of the 8US busbar system. This may also be mounted as a feeder circuit breaker on the busbar system itself.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Continuous current for busbars, E-Cu bare, at 35 °C ambient temperature according to DIN 43671

Busbar dimensions	System	Continuous current at a busbar temperature of		
		65 °C	85 °C	105 °C
mm	mm	A	A	A
12 × 5 15 × 5	40 + 60 40 + 60	188 222	248 293	295 349
20 × 5 25 × 5 30 × 5	60 60 60	274 327 379	362 432 500	430 513 595
12 × 10 20 × 10 30 × 10	40 + 60 60 60	302 427 573	398 564 756	474 670 900
Special profile up to 1600 A	60	1020	1020	1600

General technical specifications

Rated insulation voltage U_i	V AC	1000
Short-circuit strength		
Of 8US1 busbar device adapter		Current limitation due to associated motor starter protectors/circuit breakers/load feeders up to 50 kA
Of the busbar systems		see "Characteristic curves as a function of rated peak withstand current"
Material of the 8US1 busbar supports, busbar device adapters and device holders		Glass-fiber reinforced polyamide
Color		RAL 7035, light gray
Thermal stability (minimum values)		
Busbar supports, busbar device adapters, device holders, infeed and caps	°C	120
AWG connecting cables	°C	105 / 150
Cover profiles	°C	110
Bases, partitions, edge profiles and blanking covers	°C	70
Machining of plastic profiles		Take care when machining that no cracks are formed. A cross-cut circular saw with the following characteristic values has proven successful in cutting cover profiles for busbars: • D = 300 mm, B = 2.2 mm, • T = 120 R (5° negative replaceable tooth at a cutting rate of 50 ... 60 m/s) • Tooth feed 0.05 ... 0.1 mm The plastic parts have to be secured so that vibration is ruled out.
Approvals		
Busbar supports, busbar device adapters, device holders and terminals		UR, CSA, c UL us- listed

Technical specifications of the system components

Infeed, connection modules, three-phase		5SH3538	5SH3535	8US1921-1BA00	8US1921-1AA00
Busbar center-to-center spacing	mm	60	60	60	60
Current carrying capacity of the terminal points The specified current carrying capacities reflect the thermal load capability of the terminal points under favorable conditions (with the largest conductors it is possible to connect). This does not invalidate the assignment of conductor cross-sections and current carrying capacities as defined in national and international specifications.	A	80	560	300	440
Tightening torque	Nm	--	30	8 ... 10	12 ... 15
Clamping space W × H	mm	--	--	10 × 15	15 × 15
Conductors that can be used	mm^2	1.5 ... 16 Cu, re, rm, f, f+AE (reduction of the maximum conductor cross-sections may be required)	150 ... 300 Cu, Al (connections with aluminum conductors are not maintenance free), rm, sm, f	6 ... 50 (70) Cu, rm, f, f+AE (reduction of the maximum conductor cross-sections may be required), Cu 6 × 9 × 0.8	35 ... 120 Cu, rm, f, f+AE (reduction of the maximum conductor cross-sections may be required), Cu 6/10 × 15.5 × 0.8

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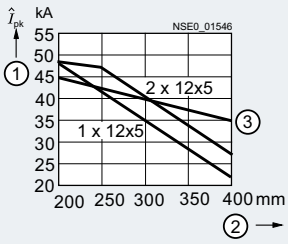
General data

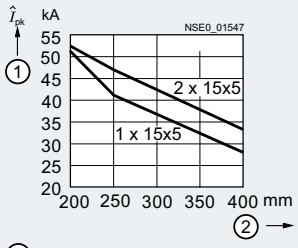
Characteristic curves

Characteristic curves as a function of rated peak withstand current

40 mm busbar systems

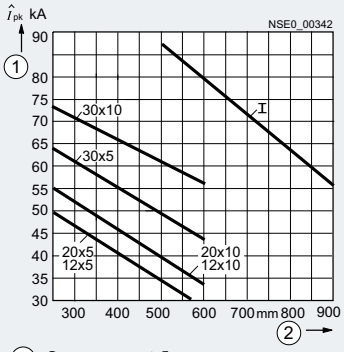


① Surge current I_{pk}
② Spacing of busbar supports
③ 5-pole busbar supports



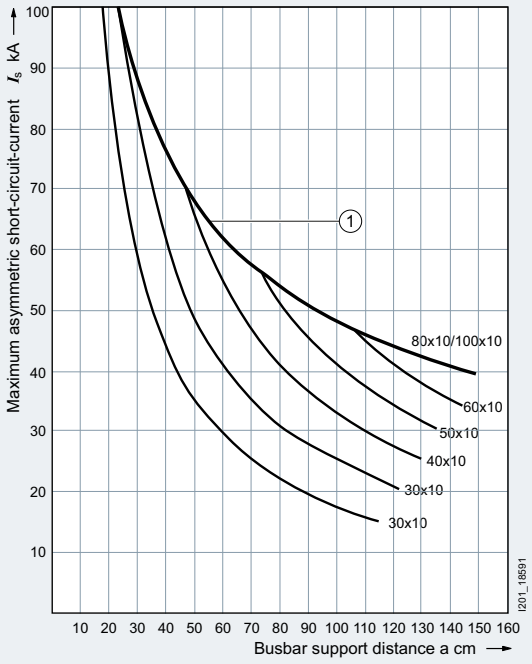
① Surge current I_{pk}
② Spacing of busbar supports

60 mm busbar systems



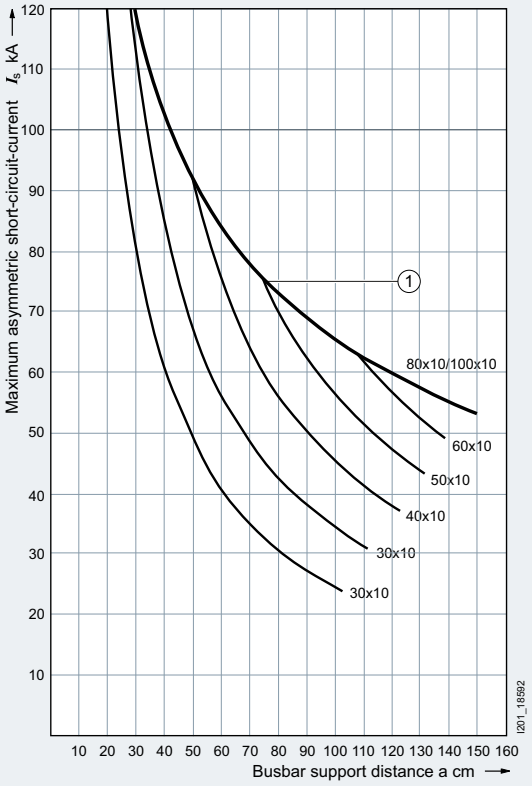
① Surge current I_{pk}
② Spacing of busbar supports

100 mm busbar system for 3NJ4/3NJ5



① Maximum limit load on busbar system

185 mm busbar system for 3NJ4/3NJ5



① Maximum limit load on busbar system

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Current-carrying capacity values for flat bars acc. to DIN 43671

According to DIN 43671, current-carrying capacity values for flat bars are defined at 35 °C ambient temperature and 65 °C busbar temperature.

If a higher busbar temperature than 65 °C is possible, the busbars can be operated with higher current values according to the following formula: $I = I_n \, k_2$

Example

Under normal operating conditions (35 °C ambient temperature and 65 °C busbar temperature), a 30 x 10 mm busbar can handle loads up to 630 A. However, you want the busbar to handle a higher current, at the expense of an increased busbar temperature of max. 85 °C.

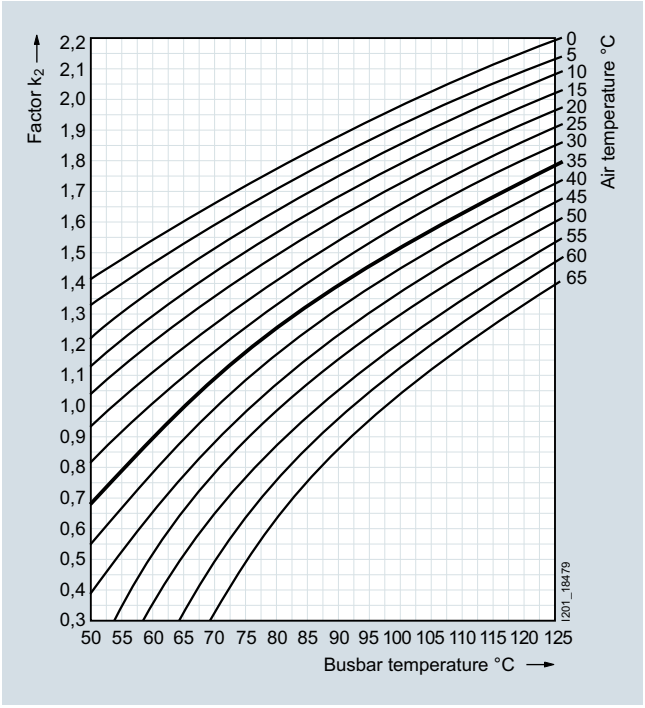
The following applies:

- Bar type: Busbar
- Busbar size: 30 x 10 mm
- Max. bar temperature: 85 °C
- Ambient temperature: 35 °C

The figure on the right shows the correction factor k_2 = 1.3 for the current-carrying capacity.

This results in a higher value of 630 A x 1.3 = 819 A.

If the 30 x 10 mm busbar is to be operated with a bar temperature of 85 °C, it may be loaded with maximum 819 A.



Current-carrying capacity values for 30 x 10 mm flat bars acc. to DIN 43671, depending on ambient and bar temperature

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UL applications

Overview

Short-circuit strength

The short-circuit strength of the busbar system is dependent on the distance of the busbar supports and on the busbar cross-section.

The short-circuit strength of the whole system is dependent on the short-circuit strength of the busbars and of the adapters with circuit breakers or switch disconnectors. If one of these values is lower than the prospective short-circuit current at the installation site, a current-limiting protective device has to be mounted upstream of the 8US busbar system. This may also be mounted as a feeder circuit breaker on the busbar system itself. The table below provides a selection aid for this purpose.

Selection aid for UL applications

An updated roundup of all available busbar adapters can be found at found at

www.siemens.com/lowvoltage/8US-UL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



The 40 mm busbar system for the lower performance range up to 400 A: Terminals and covers for infeed and connection methods

The 40 mm busbar system is used in machine engineering and distribution boards, in meter cabinets and in power distribution systems of the low performance range up to 400 A.

The busbar cross-sections are adapted to the rated currents and are available in the sizes 12 x 5 mm, 12 x 10 mm, 15 x 5 mm and 15 x 10 mm. The basic system is configured without covers. If touch protection is required, this is possible with busbar covers.

Terminals round off the product range of the 40 mm busbar system.

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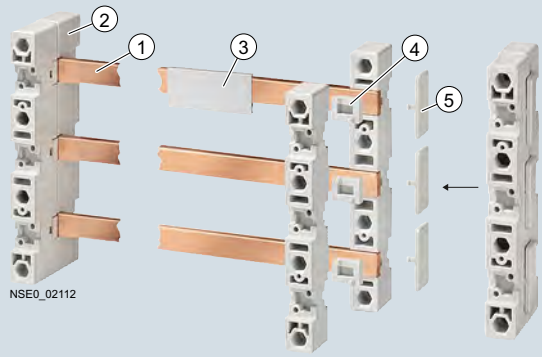
Basic assemblies

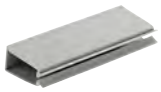
Overview



① Flat copper profile
② Busbar support
③ Cover profile
④ Inlay part
⑤ Covering cap

40 mm busbar system: Basic assembly up to 400 A

Selection and ordering data

	Description		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
	②④⑤ **Busbar supports**							
	End and intermediate holders for flat copper profiles							
 8US1903-3AB00	12 x 5 mm, 12 x 10 mm, 15 x 5 mm, 15 x 10 mm 3-pole, with inside fixing (PU = 2 busbar supports including inlay parts for bar thickness 5 mm and lateral finger-safe covers)			**8US1903-3AB00**		1	1 unit	1CU
 8US1903-5AA00	5-pole, 12 x 5 mm and 12 x 10 mm with inside fixing	L1–L3 + N + PE/N		**8US1903-5AA00**		1	1 unit	1CU
	① **Flat copper profiles (flat profile, approx. 2.4 m long, bare, according to EN 12167)**							
 8WC5	12 × 5 mm			**8WC5123**		1	1 unit	1CU
	15 × 5 mm			**8WC5121**		1	1 unit	1CU
	③ **Cover profiles for busbars**							
 8US1922-2CA00	12 × 5 mm	1000 mm long		**8US1922-2CA00**		1	10 units	1CU
	15 × 5 mm	1000 mm long		**8US1922-2AA00**		1	10 units	1CU

Minimum order quantity (PS) or a multiple thereof can be ordered.

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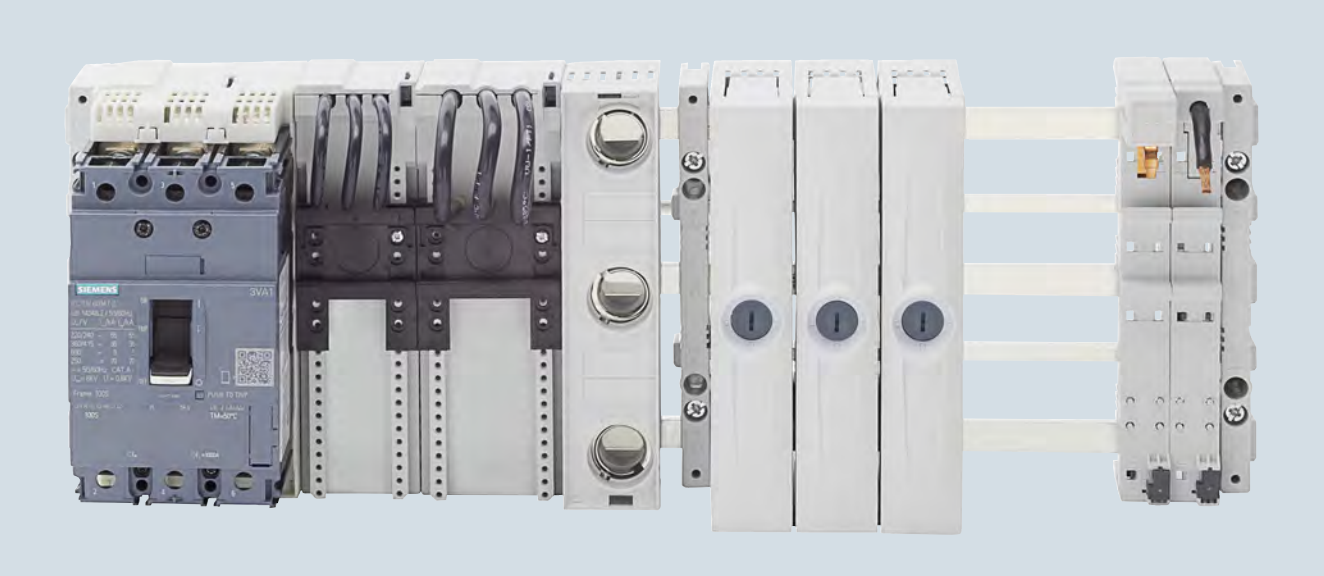
Overview



The 60 mm compact busbar system for the lower performance range up to 360 A

The 60 mm compact busbar system is used especially as a space-saving solution in distribution boards with 12 x 5 or 12 x 10 mm busbars up to 360 A.

Thanks to its maximum height of 160 mm, it offers significant space benefits over other assemblies, and with the comparable dimensions of a 40 mm busbar system it offers an ideal alternative with the benefits of a 60 mm busbar system.

Another important benefit is provided by the option of combining with devices from the basic assemblies up to 400 A.

In addition, most components of the system in the 3-pole version meet the requirement regarding clearances in accordance with UL 508.

Another benefit is expansion to a 5-pole system with the same mounting height of 160 mm. The N and PE conductors are each arranged between the phases. The busbar supports are already prepared for a 5-pole system.

The 5-pole compact system is approved for 12 x 5 mm busbars and for applications up to a maximum of 200 A.

Benefits

- Significant space advantage compared to other assemblies
- Combination option with devices from the basic assemblies up to 400 A
- Comply with the clearances stipulated by UL 508
- Expansion to a 5-pole system up to 200 A possible

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Basic assemblies

Overview



The 3-/5-pole 60 mm compact busbar system for the lower performance range up to 360 A; the 5-pole element is only designed for up to 200 A

Selection and ordering data

Assembly of 3-/5-pole 60 mm compact busbar systems (up to 200/360 A for 12 x 5/10 mm busbars)

	Description	Size	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm		d					
	Busbar supports, 3P+N+PE, with end cover • Rated voltage U_e - 690 V AC for IEC applications - 600 V AC for UL 508 • SCCR for UL 508 - 5-pole: 22 kA - 3-pole: 36 kA • Minimum order quantity 10 units	12 x 160 x 45	UL 508		**8US1923-5CA02**		1	10 units	1CU
	UL spacers, height 18 mm • For use under 8US1923-5CA02 busbar support • Minimum order quantity 10 units	12 x 160 x 18			**8US1922-1CA02**		1	10 units	1CU
	Stabilizing modules • For protecting the N and PE busbars against bending. • Minimum order quantity 10 units	2 x 160 x 47			**8US1928-5CA02**		1	10 units	1CU
	Cover profiles • Minimum order quantity 2 units	700 x 160 x 63			**8US1922-2CB02**		1	2 units	1CU
	Holders • For 8US1922-2CB02 cover profile • Minimum order quantity 10 units	5 x 156 x 55			**8US1922-2CA02**		1	10 units	1CU

Minimum order quantity (PS) or a multiple thereof can be ordered.

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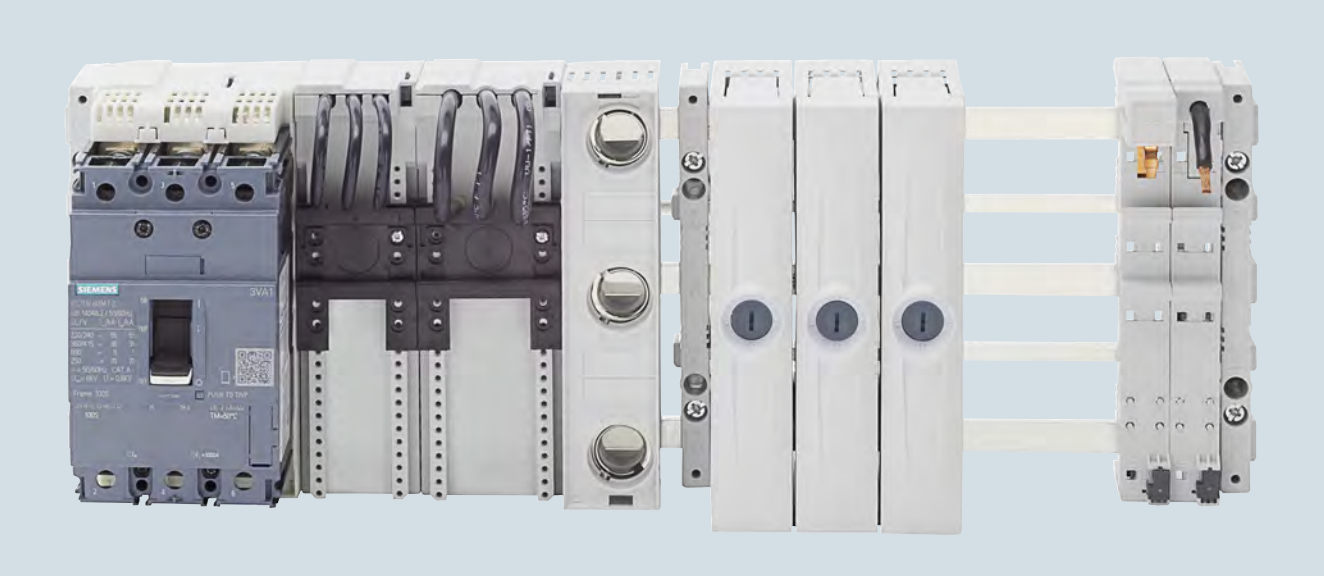
Overview



The 3-/5-pole 60 mm compact busbar system for the lower performance range up to 360 A: Infeeds and connection methods

Assembly of 3-pole 60 mm compact busbar systems (up to 200/360 A for 12 x 5/10 mm busbars)

	Description	Size	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm		d					
	Infeed system 3-pole for busbar 12 x 5 mm, 12 x 10 mm								
	Connection modules 16 mm^2, 3-pole with spring terminal 1.5 ...16 mm^2 • Rated current I_e - 80 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications • Minimum order quantity 6 units	20 x 160 x 91			**8US1921-1BA02**		1	6 units	1CU
	Connecting terminal plates, 3-pole • Terminals 6 ... 50 mm^2 • Rated current I_e - 300 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications - 600 V AC for UL 508	54 x 160 x 115	UL 508		**8US1921-1CB02**		1	1 unit	1CU
	Connecting terminal plates, 3-pole • Terminals 35 - 150 mm^2 • Rated current I_e - 480 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications	90 x 160 x 115			**8US1921-1CC02**		1	1 unit	1CU

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You can order this quantity or a multiple thereof.

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Built-in components

Overview



Bus-mounting base for 3-pole compact busbar systems

Melting fuses are capable of safely switching off faulty circuits. NEOZED fuses have a high short-circuit breaking capacity of 50 kA and a high short-circuit current limitation.

The NEOZED bus-mounting fuse bases in size D02 enable the direct use of 20 A to 63 A NEOZED fuse links. Adapter sleeves and a special retaining spring (5SH5400) are available for use with smaller rated currents up to 16 A.

Thanks to their 36-mm-wide design, NEOZED bus-mounting fuse bases are highly thermally emissive, thus enabling high operating currents under continuous load.

For more information on NEOZED fuse systems, see chapter "Fuse Systems"

Technical specifications

Bus-mounting bases

		NEOZED bus-mounting bases for 60 mm compact busbar systems
		5SG6208
Size		**D02**
Standards		IEC 60269-3, DIN VDE 0636-3
Rated voltage	V AC V DC	400 250
Rated frequency	Hz	50
Rated current	A	63
Rated conditional short-circuit current	kA AC kA DC	50 8
For fuse links with power losses per phase	W	5.5
Busbar center-to-center spacing	mm	60
Box terminals for wire connection	mm^2 mm^2 mm^2	Cu 1.5 … 10 (re) Cu 1.5 … 25 (f) Cu 1.5 … 25 (f+AE)
Tightening torque	Nm	3
Material		Temperature-resistant up to min. 120 °C, self-extinguishing acc. to UL 94 min. CTI 200

Selection and ordering data

	Size	Rated current	Rated voltage	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V	MW	d					
	**NEOZED bus-mounting bases with touch protection, 3P** NEW • For 5/10 mm busbars • 36 mm wide For NEOZED screw caps, NEOZED adapter sleeves and NEOZED fuse links, see chapter "Fuse Systems", "NEOZED fuse systems"									
	D02	63	400	2		**5SG6208**		1	6 units	1CU

Minimum order quantity (PS) or a multiple thereof can be ordered.

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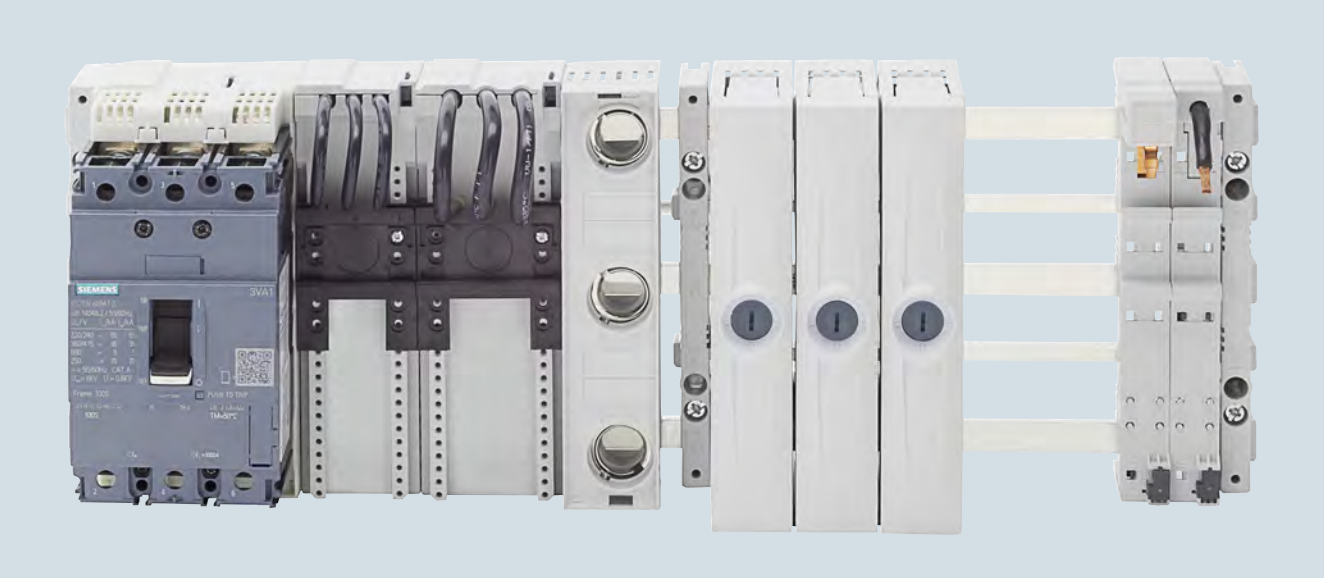
Overview



The 3-/5-pole 60 mm compact busbar system for the lower performance range up to 360 A: Device adapters and device holders

Assembly of 3-pole 60 mm compact busbar systems (up to 200/360 A for 12 x 5/10 mm busbars)

	Busbar device adapters for	Size (H x W x D)	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm		d					
	Universal applications, 3-pole								
 8US1651-5DK02	Adapters 32 A, 1 support rail • Rated current I_e - 32 A for IEC applications - 25 A for UL 508 • Rated voltage U_e - 690 V AC for IEC applications - 600 V AC for UL 508 • Minimum order quantity 4 units	160 x 45 x 63	UL 508		**8US1651-5DK02**		1	4 units	1CU
 8US1661-5FK02	Adapters 63 A, 1 support rail • Rated current I_e - 63 A for IEC applications - 65 A for UL 508 • Rated voltage U_e - 690 V AC for IEC applications - 600 V AC for UL 508 • Minimum order quantity 4 units	160 x 54 x 63	UL 508		**8US1661-5FK02**		1	4 units	1CU
	3VA10/11 molded case circuit breakers, 3-pole • With latching function • For rails 12 x 5 mm, 12 x 10 mm • Rated current I_e - 144 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications								
 8US1613-4AU01	3VA10/11	200 x 77			**8US1613-4AU01**		1	1 unit	1CU

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Accessories

Overview

For 12 x 5 mm busbars (up to 200 A)

	Description	Size	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm		d					
 8US1620-5AK02	Support modules • Minimum order quantity 6 units	18 x 160 x 54			**8US1620-5AK02**		1	6 units	1CU
 8US1998-2BH02	Lateral modules • Minimum order quantity 12 units	9 x 160 x 47			**8US1998-2BH02**		1	12 units	1CU
 8US1998-1AA02	Set of connectors • For connecting adapters	--			**8US1998-1AA02**		1	1 unit	1CU

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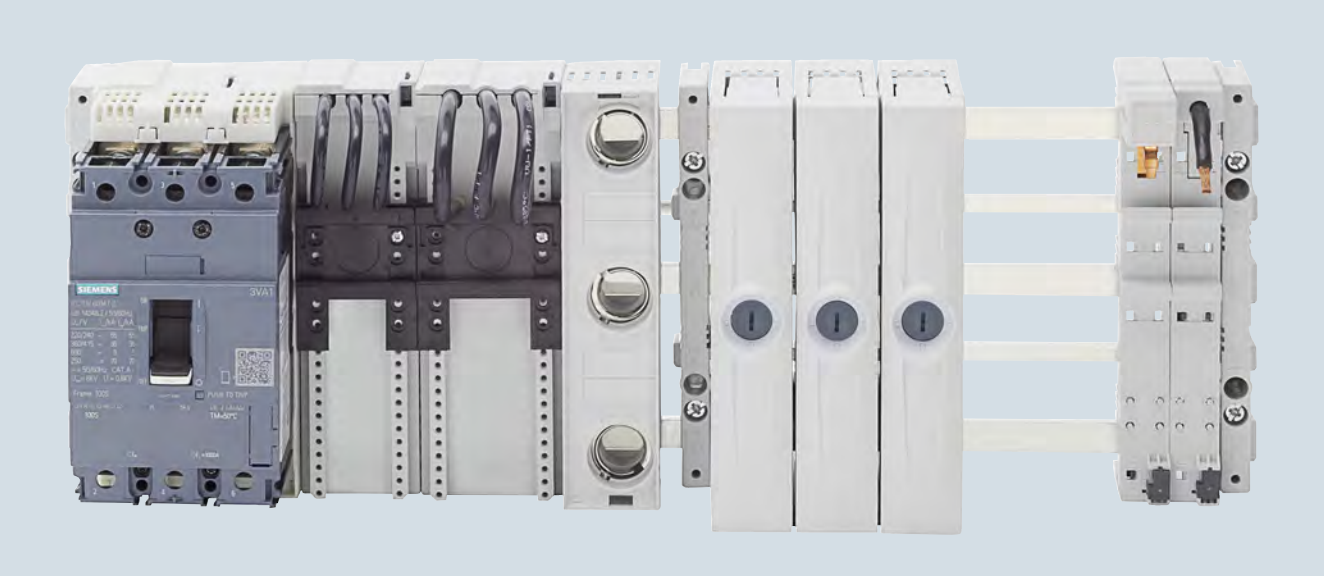
Overview



The 3-/5-pole 60 mm compact busbar system for the lower performance range up to 360 A: Infeed and connection methods

Assembly of 5-pole 60 mm compact busbar systems (up to 200 A for 12 x 5 mm busbars)

	Description	Size	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm		d					
	Infeed system 5-pole for busbar 12 x 5 mm								
	Connecting terminal plates, 3-pole • 10 ... 120 mm² • Rated current I_e - 250 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications - 600 V AC for UL 508	90 x 160 x 80			**8US1921-1CD02**		1	1 unit	1CU
	N connection modules • Terminals 10 ... 120 mm² • Rated voltage U_e - 690 V AC for IEC applications	30 x 160 x 80			**8US1921-1CE02**		1	1 unit	1CU
	PE connection modules • Terminals 10 ... 120 mm² • Rated voltage U_e - 690 V AC for IEC applications	30 x 160 x 80			**8US1921-1CF02**		1	1 unit	1CU

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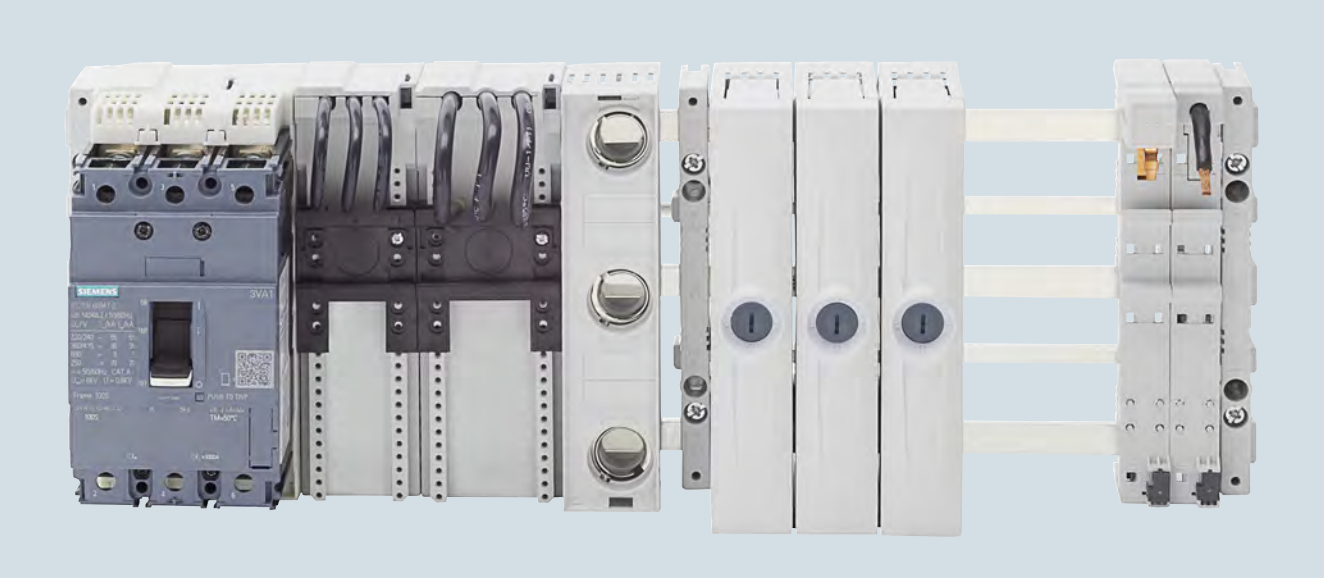
Device adapters and device holders

Overview



The 3-/5-pole 60 mm compact busbar system for the lower performance range up to 360 A: Device adapters and device holders

Assembly of 5-pole 60 mm compact busbar systems (up to 200 A for 12 x 5 mm busbars)

	Busbar device adapters for	Size	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm		d					
	Universal applications								
 8US1621-2NJ02	Adapters, single-pole, 32 A • Standard version • Rated current I_e - 32 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications • Minimum order quantity 12 units	18 x 160 x 73			**8US1621-2NJ02**		1	12 units	1CU
 8US1621-2FK02	Adapters, single-pole, 63 A • Standard version • Rated current I_e - 63 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications • Minimum order quantity 12 units	18 x 160 x 73			**8US1621-2FK02**		1	12 units	1CU
 8US1624-2FK02	Adapters, single-pole, 63 A • For 5SY miniature circuit breakers • Rated current I_e - 63 A for IEC applications • Rated voltage U_e - 690 V AC for IEC applications • Minimum order quantity 12 units	18 x 160 x 82			**8US1624-2FK02**		1	12 units	1CU

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

For 12 x 5 mm busbars (up to 200 A)

	Description	Size	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm		d					
 8US1600-0RE02	N modules • Terminals 1.5 ... 16 mm^2 • Rated voltage U_e - 690 V AC for IEC applications • Minimum order quantity 12 units	9 x 160 x 114			**8US1600-0RE02**		1	12 units	1CU
 8US1600-0RF02	PE modules • Terminals 1.5 ... 16 mm^2 • Rated voltage U_e - 690 V AC for IEC applications • Minimum order quantity 12 units	9 x 160 x 114			**8US1600-0RF02**		1	12 units	1CU
 8US1620-5AK02	Support modules • Minimum order quantity 6 units	18 x 160 x 54			**8US1620-5AK02**		1	6 units	1CU
 8US1998-2BH02	Lateral modules • Minimum order quantity 12 units	9 x 160 x 47			**8US1998-2BH02**		1	12 units	1CU
 8US1998-1AA02	Module connectors (1 pack = 100 units) • For connecting adapters	--			**8US1998-1AA02**		1	1 unit	1CU

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Introduction

Overview



The 60 mm busbar system for the medium and top performance range up to 1600 A, here for example with the 3NP1 switch disconnector, size 3

The 60 mm busbar system is used preferably in control cabinet installation, in motor control centers and in power distribution systems of the medium power range (630 A) and top performance range (1600 A, special profile).

The 60 mm busbar system can be configured as a basic system without covers. The busbar cross-sections are available in the sizes 12 x 5 mm to 30 x 10 mm and as a special profile.

Busbar adapters for SIRIUS devices, 3VL circuit breakers, 3KA and 3KL switch disconnectors, and 3NP1 and 3NP5 fuse switch disconnectors offer numerous options for configuring this busbar system. Infeed units, terminals and other accessories open up a large range of applications.

Busbars with a special profile are suitable for applications up to 1600 A. All components of the 60 mm busbar system can be fitted.

SIRIUS motor starter combinations

SIRIUS motor starter combinations can be configured with and without fuses.

The compact 3NW7 ... -1 cylindrical fuse holders for IEC fuses, size 10 x 38 mm, or 3NW7... -1HG cylindrical fuse holders for Class CC UL fuses are suitable for use with fused motor starter combinations.

With a width of 45 mm, SIRIUS motor starter combinations are the same width as the majority of contactors.

For further information and accessories,
see chapter "Fuse Systems" → Cylindrical fuse systems → Fuse holders in size 10 x 38 mm and Class CC



Installation configuration of a cylindrical fuse holder and a SIRIUS contactor on busbar device adapter for the 60 mm busbar system

Minimum order quantity (PS) or a multiple thereof can be ordered.

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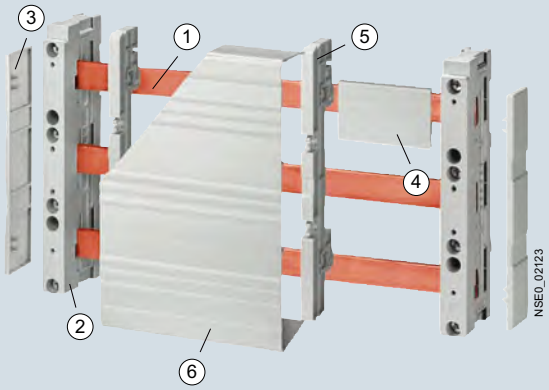
Overview



1 Flat copper profile
2 Busbar supports
3 End cover
4 Cover profile
5 Support for blanking covers
6 Blanking cover

60 mm busbar system: Basic assemblies up to 630 A

Selection and ordering data

Busbar support and end cover

	Description	Connections	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
	② Busbar supports								
	End and intermediate holders for flat copper profiles 12, 15, 20, 25, 30 x 5, 10 mm								
	3-pole, with outside fixing	L1–L3			**8US1923-2AA01**		1	10 units	1CU
 8US1923-3AA01	3-pole, with inside fixing	L1–L3			**8US1923-3AA01**		1	10 units	1CU
	4-pole, with inside fixing	L1–L3 + PE/N			**8US1923-4AA00**		1	10 units	1CU
 8US1923-5AA00	2-pole, with outside fixing				**8US1923-5AA00**		1	10 units	1CU
	N/PE busbar supports 12, 20, 30 x 5, 10 mm								
 5SH3540	1-pole, for flat copper profile for 5/10 mm busbars	PE/N			**5SH3540**		1	1 unit	1CU

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Basic assemblies up to 630 A

	Description	Connections	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
 8US1923-1AA01	**N/PE busbar supports, 6 x 6 mm 12, 15, 20, 25, 30 x 5, 10 mm** 1-pole, for copper profiles for mounting on 8US1923-2AA01 3-pole busbar supports or free standing	PE/N	UL 508		**8US1923-1AA01**		1	1 unit	1CU
 8US1923-3UA01	**End and intermediate holders for flat copper profiles 5 x 20 mm, 10 x 20 mm, 10 x 30 mm** 3-pole, with inside fixing	L1–L3	UL 508[1)]		**8US1923-3UA01**		1	10 units	1CU
 8US1922-1AC00	③ **End covers** For covering free busbar ends • For 8US1923-2AA01, 3AA01 and 3UA01	L1–L3	UL 508		**8US1922-1AC00**		1	10 units	1CU

[1)] Only with base plate 8US1922-2UA01

Covers, supports for blanking covers, flat copper profiles and busbar connection parts

	Description	Length	Width	Depth	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	mm		d					
 8US1922-2CA00	④ **Cover profiles for busbars** 12 × 5 mm	1000	15	10			**8US1922-2CA00**		1	10 units	1CU
 8US1922-2AA00	15 × 5 mm, 20 × 5 mm, 25 × 5 mm, 30 × 5 mm	1000	40	9	UL 508		**8US1922-2AA00**		1	10 units	1CU
	12 × 10 mm, 15 × 10 mm, 20 × 10 mm, 25 × 10 mm, 30 × 10 mm	1000	40	14	UL 508		**8US1922-2BA00**		1	10 units	1CU
 8US1922-2EA0.	⑤ **Supports for blanking covers** Mounting on busbar, 32 mm depth (2 units per section of blanking cover)				UL 508		**8US1922-2EA00**		1	4 units	1CU
	Mounting on busbar, 107 mm depth (2 units per section of blanking cover)				UL 508		**8US1922-2EA01**		1	8 units	1CU
 8US1922-2EB00	⑥ **Blanking covers** Mounting on 8US1922-2EA.. support for blanking covers Height 195 mm, Depth 63 mm, Length 700 mm				UL 508		**8US1922-2EB00**		1	2 units	1CU

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	Description	Length	Cross-section	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm^2		d					
 8US1922-2UA01	**Base plates** For 3-pole system, width 240 mm	1100	--	UL 508		**8US1922-2UA01**		1	2 units	1CU
	① **Flat copper profiles (flat profile, bare)** Flat copper profiles for universal applications									
	• 12 × 5 mm, current intensity 200 A	2400	60	EN 12167		**8WC5123**		1	1 unit	1CU
	• 15 × 5 mm, current intensity 250 A	2400	75	EN 12167		**8WC5121**		1	1 unit	1CU
	• 20 × 5 mm, current intensity 320 A	2400	100	EN 12167		**8WC5126**		1	1 unit	1CU
	• 25 × 5 mm, current intensity 400 A	1100	125	EN 12167		**8WC5031-1AA00**		1	1 unit	1CU
	• 25 × 5 mm, current intensity 400 A	2400	125	EN 12167		**8WC5131**		1	1 unit	1CU
	• 30 × 5 mm, current intensity 447 A	1100	150	EN 12167		**8WC5033-1AA00**		1	1 unit	1CU
	• 30 × 5 mm, current intensity 447 A	2400	150	EN 12167		**8WC5133**		1	1 unit	1CU
	• 20 × 10 mm, current intensity 520 A	2400	200	EN 12167		**8WC5128**		1	1 unit	1CU
	• 30 × 10 mm, current intensity 630 A	2400	300	EN 12167		**8WC5134**		1	1 unit	1CU
	① **Flat copper profiles, tinned**									
	• 12 × 5 mm, current intensity 200 A	2000	60	EN 12167		**8WC5051**		1	1 unit	1CU
	• 15 × 5 mm, current intensity 250 A	2000	75	EN 12167		**8WC5052**		1	1 unit	1CU
	• 20 × 5 mm, current intensity 320 A	2000	100	EN 12167		**8WC5053**		1	1 unit	1CU
	• 25 × 5 mm, current intensity 400 A	2000	125	EN 12167		**8WC5054**		1	1 unit	1CU
	• 30 × 5 mm, current intensity 447 A	2000	150	EN 12167		**8WC5055**		1	1 unit	1CU
	• 20 × 10 mm, current intensity 520 A	2000	200	EN 12167		**8WC5063**		1	1 unit	1CU
	• 30 × 10 mm, current intensity 630 A	2000	300	EN 12167		**8WC5065**		1	1 unit	1CU
	For further flat copper profiles, see chapter "Power Distribution Boards / Distribution Boards"									
 8JK320	**Extension terminals** For busbars 12 × 5 mm, tightening torque 6.0 Nm (busbar not included in scope of supply, 1 set = 2 units)	--	--	--		**8JK3201**		1	10 sets	1BR
	Busbar connection pieces for bars									
 8US1921-2BE00	For flat profiles (max. 630 A) 20 × 5 mm, 20 × 10 mm, 25 × 5 mm, 25 × 10 mm, 30 × 5 mm, 30 × 10 mm	40	--	--		**8US1921-2BE00**		1	6 units	1CU
 8US1921-2BF00	For flat profiles (max. 630 A) 12 × 5 mm, 12 × 10 mm, 15 × 5 mm, 15 × 10 mm, 20 × 5 mm, 20 × 10 mm	55	--	--		**8US1921-2BF00**		1	12 units	1CU

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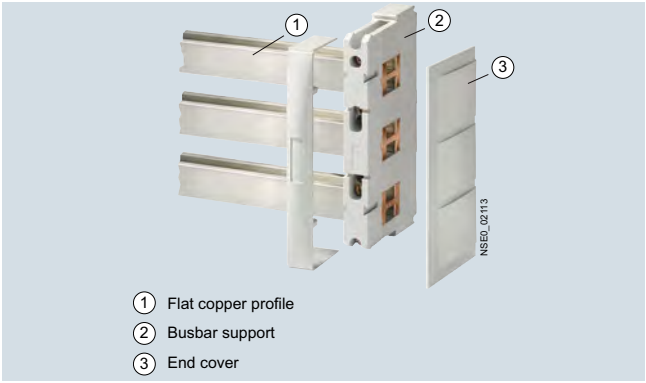
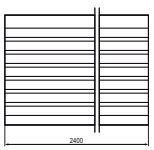
Basic assemblies up to 1600 A

Overview



60 mm busbar system: Basic assembly up to 1600 A

Selection and ordering data

	Description		Standard	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8US1943-3AA00	**Busbar supports**								
	3-pole, for TT special profiles End and intermediate holder with finger-safe busbar cover (1 pack = 2 busbar supports + finger-safe end covers)	L1–L3	UL 508		**8US1943-3AA00**		1	1 unit	1CU
 8US1948-2AA00	**Flat copper profiles (approx. 2.4 m long, tinned)**								
	TT special profile up to 1600 A, cross-section 720 mm^2				**8US1948-2AA00**		1	1 unit	1CU
 8US1922-2DA00	**Cover profiles**								
	For flat copper profiles, length 1000 mm				**8US1922-2DA00**		1	5 units	1CU
 8US1941-2BF01	**Busbar connection pieces**								
	For special profiles/TT profiles up to 1600 A				**8US1941-2BF01**		1	6 units	1CU
 8US1922-1JA00	**Partitions, closed** 76 mm wide, 2400 mm long For additional lateral touch protection at the top/bottom				**8US1922-1JA00**		1	1 unit	1CU
 8US1922-2EA0.	**Supports (for blanking covers)**								
	Mounting on busbar, 32 mm depth (2 units per section of blanking cover)		UL 508		**8US1922-2EA00**		1	4 units	1CU
	Mounting on busbar, 107 mm depth (2 units per section of blanking cover)		UL 508		**8US1922-2EA01**		1	8 units	1CU
 8US1922-2EB00	**Blanking covers**								
	Mounting on 8US1922-2EA.. support for blanking covers Height 195 mm, Depth 63 mm, Length 700 mm		UL 508		**8US1922-2EB00**		1	2 units	1CU

Minimum order quantity (PS) or a multiple thereof can be ordered.

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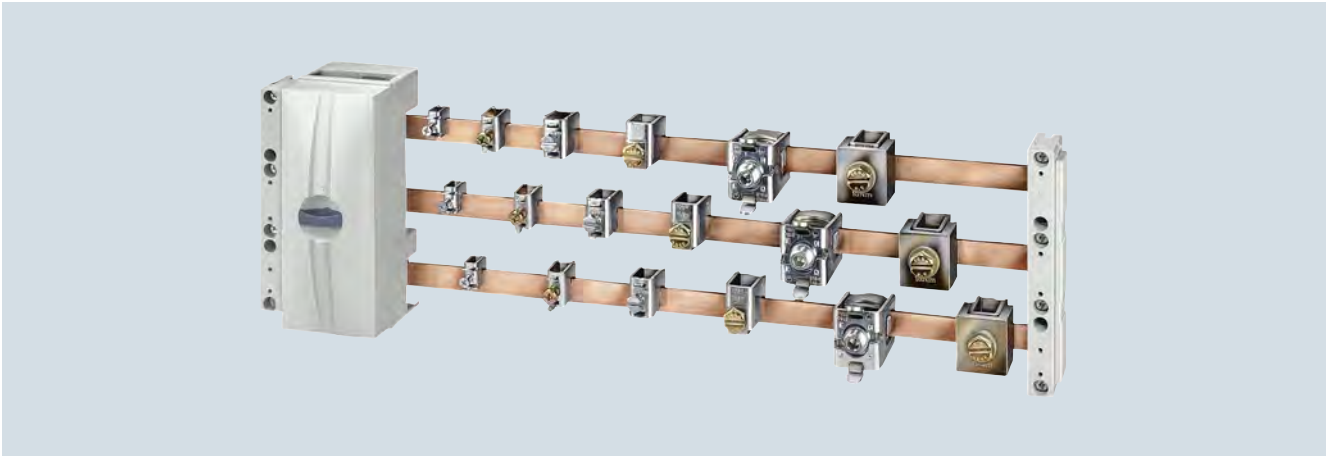
Overview



60 mm busbar system: Terminals and covers for infeed and connection methods

Selection and ordering data

	Description	Length	Width	Max. current	Conductor cross-section	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	A	mm^2		d					
 8US1921-1AA00	**Infeed**											
	Connecting terminal plate with cover											
	• 3-pole	200	20	80	1.5 ...16	UL 508		**5SH3538**		1	5 units	1CU
	• 3-pole	200	54	300	6 ... 50	UL 508		**8US1921-1BA00**		1	1 unit	1CU
	• 3-pole	200	81	400	35 ... 120	UL 508		**8US1921-1AA00**		1	1 unit	1CU
 8US1200-0AA00	**Outgoing modules for PE/N**											
	Connection module for 4th pole (PE/N) up to 16 mm, must be mounted onto adapter/ device holder	242	18	--	--	--		**8US1200-0AA00**		1	1 unit	1CU
 5SH3535	**SR60 connecting terminal plates**											
	3-pole with cover, suitable for aluminum conductors (shown without cover)			560	150 ... 300	--		**5SH3535**		1	1 unit	1CU
 8US1941-2AA03	**Terminal sets**											
	3-pole without cover for round cables, suitable for aluminum conductors			560	95 ... 300	UL 508		**8US1941-2AA03**		1	1 unit	1CU

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Infeeds and connection methods

	Description	Max. current	Conductor cross-section	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm²		d					
 8US1941-2AA04	**Terminal sets**									
	3-pole without cover for flat bars up to 32 x 20 mm	800	--	UL 508		**8US1941-2AA04**		1	1 unit	1CU
 8US1922-1GC00	Covers for 8US1941-2AA03/04 terminal set	--	--	--		**8US1922-1GC00**		1	1 unit	1CU
 Terminals	**Terminals for circular conductors** **Busbar thickness 5 mm**[1] 12 × 5 mm, 15 × 5 mm, 20 × 5 mm, 25 × 5 mm, 30 × 5 mm									
		180	1.5 ... 16			**8US1921-2AA00**		100	100 units	1CU
		270	4 ... 35			**8US1921-2AB00**		100	50 units	1CU
		400	16 ... 70			**8US1921-2AD00**		1	50 units	1CU
		440	16 ... 120			**8US1921-2AC00**		1	50 units	1CU
		180	1.5 ... 16			**8US1921-2AA01**		1	15 units	1CU
		270	4 ... 35			**8US1921-2AB01**		1	15 units	1CU
		400	16 ... 70			**8US1921-2AD01**		1	15 units	1CU
		440	16 ... 120			**8US1921-2AC01**		1	15 units	1CU
 Terminals	**10 mm busbar thickness** 12 × 10 mm,[1] 15 × 10 mm,[1] 20 × 10 mm, 25 × 10 mm, 30 × 10 mm									
		180	1.5 ... 16			**8US1921-2BA00**		1	100 units	1CU
		270	4 ... 35			**8US1921-2BB00**		1	50 units	1CU
		400	16 ... 70			**8US1921-2BD00**		1	50 units	1CU
		440	16 ... 120			**8US1921-2BC00**		1	50 units	1CU
		180	1.5 ... 16			**8US1921-2BA01**		1	15 units	1CU
		270	4 ... 35			**8US1921-2BB01**		1	15 units	1CU
		400	16 ... 70			**8US1921-2BD01**		1	15 units	1CU
		440	16 ... 120			**8US1921-2BC01**		1	15 units	1CU
 8US1941-2AA01	20 × 5 mm, 25 × 5 mm, 30 × 5 mm									
		500	95 ... 185			**8US1941-2AA01**		1	6 units	1CU
 8US1941-2AA02		600	95 ... 300			**8US1941-2AA02**		1	3 units	1CU

[1] Cannot be used on a special profile up to 1600 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Description	Max. current	Conductor cross-section	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm^2		d					
	Terminal covers for circular conductors (fixing to busbar)									
 8US1922-1GA00	For terminals up to 120 mm^2 200 mm long, 84 mm wide		--	--		**8US1922-1GA00**		1	10 units	1CU
	For terminals up to 300 mm^2 [1] 200 mm long, 270 mm wide		--	--		**8US1922-1GA02**		1	1 unit	1CU
	Terminals									
 8US1941-2AC00	For cable lugs up to 240 mm^2, 10 mm bar thickness (threaded bolts M10)	630	--	--		**8US1941-2AC00**		1	6 units	1CU
 8US1941-2BB00	For copper bars or laminated conductors 20 x 5 mm, 20 x 10 mm, 25 x 5 mm, 25 x 10 mm, 30 x 5 mm, 30 x 10 mm	750	--	--		**8US1941-2BB00**		1	6 units	1CU
 8US1941-2BA00	For 2 x 40 x 10 mm, for TT flat copper profile 30 x 10 mm profile for flat bars up to 40 x 25 mm	1250	--	--		**8US1941-2BA00**		1	3 units	1CU

[1] Only for 20 × 5 mm, 20 × 10 mm, 25 × 5 mm, 25 × 10 mm, 30 × 5 mm and 30 × 10 mm

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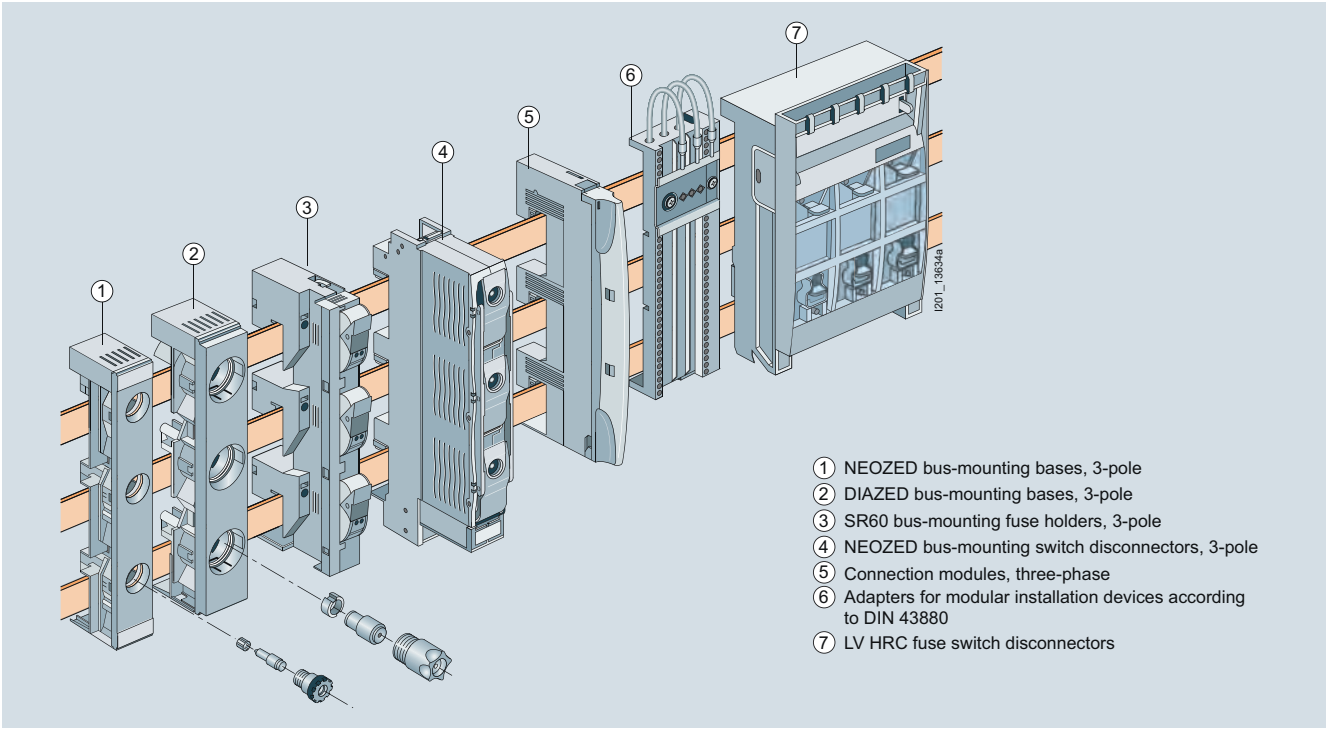
Built-in components

Overview



NEOZED and DIAZED built-in components

Rail-adaptable built-in components, such as NEOZED and DIAZED bus-mounting bases, adapters for modular installation devices, fuse switch disconnectors and NEOZED bus-mounting fuse switch disconnectors are made of glass-fiber reinforced, thermoplastic polyester. The material ensures the required mechanical, chemical and electrical properties.

Efficient power distribution up to 630 A.
Users have several options for mounting the SR60 busbar system:

1. Mounting in distribution boards

The busbar supports are mounted on longitudinal stays. Once the built-in components are mounted and connected, the touch protection cover (section cover) protects against accidental contact with live parts.

2. Mounting in industrial control panels

The demand for comprehensive touch protection has generated new solutions: Built-in components, such as busbar fuse bases have integrated reach-through guards, enable the implementation of cost-effective overall solutions.

Previously two optional solutions were provided, which can now be replaced using new technology: Touch protection via base and edges or touch protection via partitions.

Higher overall efficiency and cost savings in the plant engineering industry.

Fuse holders, fuse switch disconnectors, switch disconnectors with fuse and 16 mm^2 connection modules with screwless terminals are available; this offers users maximum safety and comfort.

Class CC and Class J fuse systems

Class CC and Class J fuse links acc. to the UL and CSA standards are used for "branch circuit protection" and in the "feeder circuit". Different characteristics are available for different applications.

The Class CC and Class J 30 A and 60 A fuse holders are modular installation devices for mounting on a DIN rail (standard mounting rail) that are available in one-, two- and three-pole versions. A three-pole device for mounting Class CC fuses on a 60 mm busbar system is also available.

The Class J 100 A, 200 A and 400 A fuse holders are available as versions either for screwing onto a mounting plate or for directly mounting on the 60 mm busbar system.

We do not currently offer any fuse holders for the 500 A and 600 A Class J fuse links. The fuse links can be optionally mounted on busbars.

The fuse holders for cylindrical fuses, size 10 x 38 and for American fuses, Class CC and Class J, can be used in the international plant engineering industry. In addition, Siemens offers a broad range of UL-approved components for the design of switchboards according to UL 508 A.

Advantages:

- For switchboard assemblies and machine manufacturers who export their switchboards to the USA or Canada.
- Easier export due to UL and CSA approvals
- Modern fuse holder design with touch protection to BGV A3 ensures safe installation.
- Fuse holders up to 200 A enable fuses to be changed in the de-energized state.
- Efficient power distribution thanks to mounting the devices on 60 mm busbar system.

For further information

For more information, see chapter "Fuse Systems".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Planning dimensions

	Width mm	Width MW
NEOZED bus-mounting bases D02		
Covers	27	1.5
Covers, extra wide	36	2.0
Covers, double width	54	3.0
DIAZED bus-mounting bases DII		
Covers	42	2.3
DIAZED bus-mounting bases DIII		
Covers	57	3.2
NEOZED bus-mounting switch disconnectors	27	1.5
LV HRC fuse switch disconnectors size 00	108	6
Bus-mounting fuse holders	27	1.5
Class J bus-mounting fuse holders		
100 A	106	5.9
200 A	184	10.2
400 A	256	14.2

Benefits

- The direct contact of the rail-adaptable switching and installation devices on the Cu busbars reduces distribution panels and mounting times
- Compared to conventional installation, the transfer resistance of the connections is drastically reduced. This prevents unnecessary temperature rise
- New built-in components with touch protection ensure comprehensive touch protection without the previously required partitions
- International application due to UL-approved components
- Enhanced effectiveness and increased safety due to screwless terminals

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Technical specifications

Bus-mounting bases

		NEOZED SR60 bus-mounting bases		DIAZED SR60 bus-mounting bases	
		5SG6202 5SG6206 5SG6207		5SF6014 5SF6015 5SF6020	5SF6214 5SF6215 5SF6220
		D01	D02	DII	DIII
Standards		IEC 60269-3, DIN VDE 0636-3			
Rated voltage	V AC V DC	400 250		500 --	690 600
Rated frequency	Hz	50			
Rated current	A	16 (with 5SH5400 retaining springs)	63	25	63
Rated conditional short-circuit current	kA AC kA DC	50 8		50 8	
For fuse links with power losses per phase	W	2.5	5.5	4	7
Busbar center-to-center spacing	mm	60		60	
Box terminals for wire connection	mm^2	1.5 … 10 (re)		1.5 … 10 (re)	
	mm^2	1.5 … 25 (f)		1.5 … 35 (f)	
	mm^2	1.5 … 25 (f+AE)		1.5 … 35 (f+AE)	
Tightening torque	Nm	3		4	
Material		Temperature-resistant up to min. 125 °C, self-extinguishing acc. to UL 94, CTI 600		Temperature-resistant up to min. 125 °C, self-extinguishing acc. to UL 94, min. CTI 225	

Bus-mounting fuse holders

		3NW7431	3NW7431-0HG
Standards		IEC 60269-2, IEC 60947-3 UL 512, CSA C22.2	UL 512, CSA C22.2
Approvals		, CSA	UL, CSA
Size		10 × 38	Class CC
Rated frequency	Hz	50/60	
Max. rated voltage U_e • IEC/EN • UL/CSA	 V AC V AC	 690 600	 -- 600
Max. rated operating current I_e (When several devices are used next to each other, it is essential to comply with the rated load factor according to EN 60439-1 (VDE 0660-500), Table 1.) • IEC/EN • UL/CSA	 A A	 32 30	 -- 30
Utilization categories • IEC/EN • UL/CSA	 	 AC-22B (500 V) AC-21B (690 V, 30 A) Can only be used as fuse holder	
Rated conditional short-circuit current (Type-tested with fuse links, operational class gG) • IEC/EN • UL/CSA	 kA kA	 100 (400 V, 500 V, 690 V) 50 (600 V)	 -- 200
For fuse links with power losses per phase	W	3	--
Screwless wire connections • IEC/EN • UL/CSA	 mm^2 AWG	 Cu 1.5 … 6 (f) 16 … 10 (str)	

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Bus-mounting switch disconnectors with fuses

		5SG7230	5SG7234-1 5SG7234-2
Standards		HD 60269-3 (VDE 0636-3), IEC 60269-3, EN 60947-3 (VDE 0660-107), IEC 60947-3	
Approvals		VDE, EAC	
Size		D02 (D01)	D02
Rated frequency	Hz	50/60	50/60
Rated voltage U_e	V AC V DC	400 110	400
Rated insulation voltage U_i	V	800	500
Rated impulse withstand voltage U_{imp}	kV	6	6
Rated current I_e	A	63[1)]	63[2)]
Utilization categories (Type-tested with 3-pole, switchable version)		AC-23A (400 V) DC-21B (48 V), 1 pole DC-21B (110 V), 2 pole	AC-22 B (400 V)
Box terminals for wire connection	mm^2 mm^2 mm^2	Cu 1.5 … 6 (re) Cu 1.5 … 16 (f) Cu 1.5 … 16 (f+AE)	Cu 1.5 … 6 (re) Cu 1.5 … 16 (f) Cu 1.5 … 16 (f+AE)
Signaling switches for the display of switching positions		1 CO	LED signal detector (5SG7234-2)
Cable terminals		Bottom	On side (right)
Busbar thickness	mm	Through combination foot for 5, 10 mm	
Rated conditional short-circuit current (Type-tested with fuse links of operational class gG)	kA AC kA DC	50 8	50
Permissible power loss of fuse links per phase For stand-alone operation without lateral modules or for group operation with lateral modules	W	5.5	5.5
Material		Temperature-resistant up to min. 125 °C, self-extinguishing acc. to UL 94, min. CTI 125	Temperature-resistant up to min. 120 °C, self-extinguishing according to UL 94, min. CTI 200

1) In the case of permanent load over 35 A, we recommend the use of 5SH5526 lateral modules. Please observe EN 60439-1, Table 1.

2) In the case of permanent load over 35 A, we recommend the use of 5SH5533 lateral modules. Please observe EN 60439-1, Table 1.

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Selection and ordering data

	Size	Rated current	Rated voltage	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V	MW/mm	d					
	**NEOZED SR60 bus-mounting bases with touch protection, 3P** For 5/10 mm busbars									
	27 mm wide									
	D02	63	400	1.5		**5SG6206**		1	4 units	1CU
	36 mm wide									
	D02	63	400	2		**5SG6207**		1	4 units	1CU
	**NEOZED SR60 bus-mounting bases, 3P standard version** For 5/10 mm busbars									
	D02	63	400	1.5		**5SG6202**		1	4 units	1CU

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Built-in components

	Size	Rated current	Rated voltage	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V	MW/mm	d					
	**NEOZED SR60 covers for standard version**									
	D02			1.5		**5SH5241**		1	4 units	1CU
	D02, extra wide			2		**5SH5242**		1	4 units	1CU
	D02, with double width			3		**5SH5243**		1	4 units	1CU
	**DIAZED SR60 bus-mounting bases with touch protection, 3P**									
	For use with DIAZED screw adapters									
	DII	25	500	2.3		**5SF6020**		1	4 units	1CU
	DIII	63	500 V AC/DC (according to DIN VDE 0636-3 also 690 V AC/600 V DC)	3.2		**5SF6220**		1	4 units	1CU
	**DIAZED SR60 bus-mounting bases, 3P standard version**									
	For use with DIAZED screw adapters									
	DII	25	500	2.3		**5SF6015**		1	2 units	1CU
	DIII	63	500 V AC/DC (according to DIN VDE 0636-3 also 690 V AC/600 V DC)	3.2		**5SF6215**		1	2 units	1CU
	**DIAZED SR60 covers for standard version**									
	DII			2.3		**5SH2042**		1	2 units	1CU
	DIII			3.2		**5SH2242**		1	2 units	1CU
	**SR60 bus-mounting fuse holders, 3P**									
	For 5/10 mm busbars with screwless terminals									
	For cylindrical fuses, 10 × 38 mm									
	--	30	690	1.5		**3NW7431**		1	1 unit	1CU
	For UL fuses, Class CC									
	--	30	600	1.5		**3NW7431-0HG**		1	1 unit	1CU
	For NEOZED screw caps, NEOZED adapter sleeves and NEOZED fuse links, see chapter "Fuse Systems", "NEOZED fuse systems"									

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Size	Rated current	Rated voltage	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		A	V	MW/mm	d					
	**NEOZED SR60 bus-mounting switch disconnectors, 3P** For 5/10 mm busbars									
	D02	63*	400	1.5		**5SG7230**		1	1 unit	1CU
	* From 35 A load use 5SH5526 lateral module									
	**NEOZED SR60 bus-mounting switch disconnectors, 3P** NEW For 5/10 mm busbars, with screwless terminals									
	• without LED signal detector									
	D02	63*	400	1.5		**5SG7234-1**		1	1 unit	1CU
	• with LED signal detector									
	D02	63*	400	1.5		**5SG7234-2**		1	1 unit	1BM
	* From 35 A load use 5SH5526 lateral module									
	**Class J bus-mounting fuse holders, 3P** NEW For 5/10 mm busbars, UL,CSA, cURus									
		100	600	106		**3NW7431-6HG**		1	1 unit	1DN
		200	600	184		**3NW7431-7HG**		1	1 unit	1DN
		400	600	256		**3NW7431-8HG**		1	1 unit	1DN

For Class J fuse links and more information on Class J fuse holders:
see chapter "Fuse Systems"

Other accessories

	Version	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	d					
 5SH5525	**Auxiliary switches for signaling the switching state for NEOZED SR60 bus-mounting switch disconnectors (5SG7230)**							
	1 CO	0.5		**5SH5525**		1	1 unit	1CU
 5SH5526	**Lateral modules** For greater heat dissipation for loads from 35 A with 5SG7230 bus-mounting switch disconnectors							
		0.5		**5SH5526**		1	5 units	1CU
 5SH5533	**Lateral modules** NEW For greater heat dissipation for loads from 35 A with 5SG7 234-1 and 5SG7 234-2 bus-mounting switch disconnectors							
		0.5		**5SH5533**		1	5 units	1CU
 5SH5527	**Reducers** For NEOZED fuse links D01 in SR60 bus-mounting switch disconnectors	--		**5SH5527**		1	10 units	1CU

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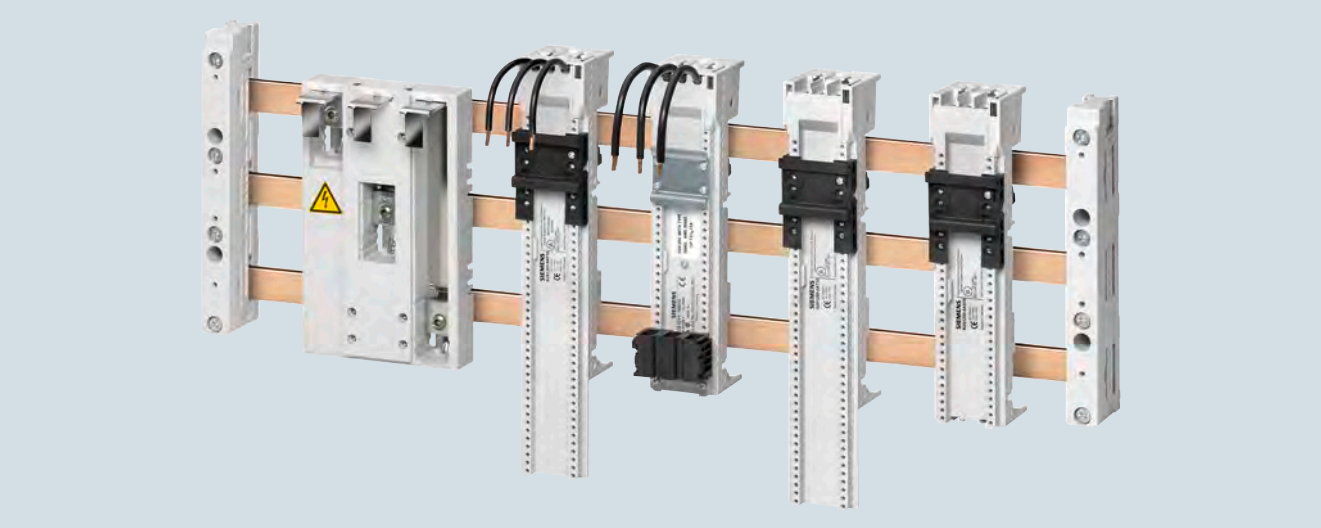
Device adapters and device holders

Overview



60 mm busbar system: Busbar device adapters and device holders

All busbar device adapters and device holders are designed for copper busbars according to DIN 46433, width 12 to 30 mm, thickness 5 mm and 10 mm, and special profiles up to 1600 A.

Selection and ordering data

For SIRIUS 3RV2/3RT2 load feeders

Welded connecting cable resistant up to 150 °C

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	Busbar device adapters for	Number of support rails (35 mm)	Adapters Length	Adapters Width	Connecting cable Cross-section	Connecting cable Temperature max.	Connecting cable Rated current	Connecting cable Rated voltage	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	AWG	°C	A	V		d					
	Size S00 devices with screw connection														
	Circuit breakers	1	200	45	12	150	25	690 600[1]	UL 508		**8US1251-5DS10**		1	1 unit	1CU
	Direct-on-line starters	1	200	45	12	150	25	690 600[1]	UL 508		**8US1251-5DS10**		1	1 unit	1CU
		1	260	45	12	150	25	690 600[1]	UL 508		**8US1251-5DT10**		1	1 unit	1CU
	Reversing starters	1	200	45	12	150	25	690 600[1]	UL 508		**8US1251-5DS10**		1	1 unit	1CU
Device holder with 3RA2120	+ Device holders	1	200	45	--	--	--	--	UL 508		+ **8US1250-5AS10**		1	1 unit	1CU
	Size S00 devices with spring-type terminals														
	Circuit breakers	1	200	45	12	150	25	690 600[1]	UL 508		**8US1251-5DS11**		1	1 unit	1CU
	Circuit breakers	1	260	45	12	150	25	690 600[1]	UL 508		**8US1251-5DT11**		1	1 unit	1CU
	Direct-on-line starters	1	260	45	12	150	25	690 600[1]	UL 508		**8US1251-5DT11**		1	1 unit	1CU
	Reversing starters	1	260	45	12	150	25	690 600[1]	UL 508		**8US1251-5DT11**		1	1 unit	1CU
Device holder with 3RA2120	+ Device holders	1	260	45	--	--	--	--	UL 508		+ **8US1250-5AT10**		1	1 unit	1CU

[1] Value applies to UL 508

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Busbar device adapters for	Number of support rails (35 mm)	Adapters Length	Adapters Width	Connecting cable Cross-section	Connecting cable Temperature max.	Connecting cable Rated current	Connecting cable Rated voltage	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	AWG	°C	A	V		d					
	Size S0 devices with screw connection														
 Device holder with 3RA2220	Circuit breakers	1	200	45	12	150	25	690 600[1)]	UL 508		**8US1251-5DS10**		1	1 unit	1CU
	Circuit breakers NEW	1	200	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NS10**		1	1 unit	1CU
	Circuit breakers	1	260	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NT10**		1	1 unit	1CU
	Direct-on-line starters	1	260	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NT10**		1	1 unit	1CU
	Reversing starters	1	260	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NT10**		1	1 unit	1CU
	+										+				
	Device holders	1	260	45	--	--	--	--	UL 508		**8US1250-5AT10**		1	1 unit	1CU
	Size S0 devices with spring-type terminals														
 Device holder with 3RA2220	Circuit breakers NEW	1	200	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NS11**		1	1 unit	1CU
	Circuit breakers	1	260	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NT11**		1	1 unit	1CU
	Direct-on-line starters	1	260	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NT11**		1	1 unit	1CU
	Reversing starters	1	260	45	10	150	32	690 600[1)]	UL 508		**8US1251-5NT11**		1	1 unit	1CU
	+										+				
	Device holders	1	260	45	--	--	--	--	UL 508		**8US1250-5AT10**		1	1 unit	1CU
	Size S2 devices														
	Circuit breakers	1	200	54	4	150	80	690 600[1)]	UL 508		**8US1261-5MS13**		1	1 unit	1CU
	Direct feeders	1	260	54	4	150	80	690 600[1)]	UL 508		**8US1261-6MT10**		1	1 unit	1CU
	Reversing feeders	1	260	119	4	150	80	690 600[1)]	UL 508		**8US1211-6MT10**		1	1 unit	1CU
	Vibration & shock kit S2 NEW										**8US1998-1DA10**		1	1 unit	1CU

[1)] Value applies to UL 508

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Device adapters and device holders

For SIRIUS 3RV1/3RT1 load feeders

	Busbar device adapters for	Number of support rails (35 mm)	Adapters Length	Adapters Width	Connecting cable Cross-section	Connecting cable Temperature max.	Connecting cable Rated current	Connecting cable Rated voltage	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	AWG	°C	A	V		d					
 Device holder	**Size S3 devices with screw connection** Busbar device adapter with connecting cables for contact with busbars, welded connecting cable resistant up to 150 °C														
	Circuit breakers	--	215	72	4	150	80	600	UL 508		**8US1211-4TR00**		1	1 unit	1CU

Lateral modules for busbar device adapters

	Description	Length	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	d					
	**Lateral modules** For extending busbar device adapters and device holders of the same length	200	9		**8US1998-2BJ10**		1	10 units	1CU

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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For circuit breakers and switch disconnectors which require busbar device adapters for mounting on busbars

	Busbar device adapters for	Adapters Length	Adapters Width	Connecting cable Type	Connecting cable Rated current	Connecting cable Rated voltage	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm		A	V		d					
	3VA molded case circuit breakers, 3 pole												
 8US1240-5MA00	NGG, HGG, LGG NEW	200	81	Screw connection, AWG 4	80	600	UL 508		**8US1240-5MA00**		1	1 unit	1CU
 8US1211-4SS00	3VA51, NGG, HGG, LGG NEW	200	90	Cu laminated 6 x 9 x 0.8 mm	125	600	UL 508		**8US1211-4SS00**		1	1 unit	1CU
 8US1213-4AU01	3VA10/11	200	77	Busbars	144	690			**8US1213-4AU01**		1	1 unit	1CU
 8US1213-4AP03	3VA12/20/21/22	240	105	Tubular contacts	250	690			**8US1213-4AP03**		1	1 unit	1CU
	3VA52/61/62	240	105	Tubular contacts	250	600	UL 508		**8US1213-4AP03**		1	1 unit	1CU
 8US1213-4AH04	3VA23, 3VA24	300	140	Tubular contacts	590	690			**8US1213-4AH04**		1	1 unit	1CU
	3VA63 3VA64	300	140	Tubular contacts	600	600	UL 508		**8US1213-4AH04**		1	1 unit	1CU
	3VL molded case circuit breakers[1], 3-pole												
 8US1211-4SL01	3VL1[2]	175	108	Busbars	160	690			**8US1211-4SL01**		1	1 unit	1CU
	3VL2[2]	175	108	Busbars	160	690			**8US1211-4SL01**		1	1 unit	1CU
	3VL3[3]	175	108	Busbars	250	690			**8US1211-4SL00**		1	1 unit	1CU
	3VL1 to 3VL4 and also with RCD module[2] see chapter "Molded Case Circuit Breakers"	320	184	M10 pin connector	400	690			**8US1210-4AF00** + **8US1927-4AF01**		1	1 unit	1CU
	3VL5	325	184	Tubular contacts	580	690			**8US1213-4AF00**		1	1 unit	1CU

Footnotes, see next page.

You can order this quantity or a multiple thereof.

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Device adapters and device holders

	Busbar device adapters for	Adapters Length	Adapters Width	Connecting cable Type	Connecting cable Rated current	Connecting cable Rated voltage	Stan-dard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm		A	V		d					
	3VL UL circuit breakers, 3-pole												
 8US1213-4AQ01	VL150X UL CG frame	190	105	Tubular contacts	150	690 600[4]	UL 508		**8US1213-4AQ01**		1	1 unit	1CU
	VL150 UL DG frame	190	105	Tubular contacts	150	690 600[4]	UL 508		**8US1213-4AQ03**		1	1 unit	1CU
	VL250 UL FG frame	190	105	Tubular contacts	250	690 600[4]	UL 508		**8US1213-4AQ03**		1	1 unit	1CU
 8US1213-4AH00	VL400 UL JG frame	296	140	Tubular contacts	400	690 600[4]	UL 508		**8US1213-4AH00**		1	1 unit	1CU
	VL400X UL LG frame	296	140	Tubular contacts	540	690 600[4]	UL 508		**8US1213-4AH00**		1	1 unit	1CU
	3KA and 3KL switch disconnectors, 3-pole												
	3KA52[5] 3KA53[5] 3KL52[5] 3KL53[5]	320	184	M10 pin connector	630	690			**8US1210-4AF00**		1	1 unit	1CU
	3KA55[5] 3KA57[5] 3KA58[5] 3KL55[5] 3KL57[5]	320	250	M10 pin connector	630	690			**8US1210-4AG00**		1	1 unit	1CU
	3NP5 fuse switch disconnectors, 3-pole												
	3NP5060 (NH00)	175	108	Busbars	160	690			**8US1291-4SB00**		1	1 unit	1CU
	3NP52 3NP53 3NP54[6]	320	250	M10 pin connector	630	690 600[4]	UL 508		**8US1210-4AG00**		1	1 unit	1CU
	3VA molded case circuit breakers, 4-pole NEW												
 8US1313-4AH03	3VA12	270	140	Tubular contacts	250	690			**8US1313-4AH03**		1	1 unit	1CU
 8US1313-4AM04	3VA23/24	300	185	Tubular contacts	590	690			**8US1313-4AM04**		1	1 unit	1CU

1) Observe the short-circuit strength of the busbar system: Short-circuit strength > 50 kA on request.

2) Usable only for 3VL circuit breakers with line-side box terminals.

3) Only for 3VL 250 A circuit breakers, for screw fixing with metric thread, for flat terminals.

4) Value applies to UL 508.

5) Without connecting cables. The connecting cable between adapter and device should be manufactured in accordance with the rated current as a round cable, e.g. H07V-R with cable lug, or as a flat conductor for an M10 pin connector.

6) Without connecting cables. The connecting cable between adapter and device should be manufactured in accordance with the rated current as a round cable, e.g. H07V-R, bared at both ends for tunnel terminals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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For SIRIUS 3RA6 compact starters according to IEC and UL

Welded connecting cable resistant up to 105 °C

	Busbar device adapter for	Number of support rails (35 mm)	Adapters Length	Adapters Width	Connecting cable Cross-section	Connecting cable Temperature max.	Rated current	Rated voltage	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	AWG	°C	A	V		d					
 Device holder	**Size equivalent to 3RA61**														
	Direct-on-line starters	1	200	45	10	105	32	690	UR, CSA		**8US1211-1NS10**		1	1 unit	1CU
 Device holder	**Size equivalent to 3RA62**														
	Reversing starters	1	200	45	10	105	32	690	UR, CSA		**8US1211-1NS10**		1	1 unit	1CU
	+										+				
	Device holders	1	200	45	--	--	--	--	UL 508		**8US1250-1AA10**		1	1 unit	1CU

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Device adapters and device holders

For universal device design

	Number of support rails (35 mm)	Adapters Length	Adapters Width	Connecting cable Cross-section	Connecting cable Temperature max.	Connecting cable Length	Connecting cable Rated current	Connecting cable Rated voltage	Standard	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	AWG	°C	mm	A	V		d					
	Devices 45 mm wide														
	Device holder for side mounting onto busbar device adapter, no electrical contact														
 8US1250-1AA10	1	200	45	--	--	--	--	--	UL 508		**8US1250-1AA10**		1	1 unit	1CU
 8US1250-5AS10	1	200	45	--	--	--	--	--	UL 508		**8US1250-5AS10**		1	1 unit	1CU
 8US1250-5AT10	1	260	45	--	--	--	--	--	UL 508		**8US1250-5AT10**		1	1 unit	1CU
	Devices 45 mm and 72 mm wide														
	Busbar device adapter with connecting cables for contact with busbars, welded connecting cable resistant up to 150 °C														
 8US1261-5MS13	1	200	45	12	150	167	25	690/600[1)]	UL 508		**8US1251-5DS11**		1	1 unit	1CU
	1	200	45	12	150	99	25	690/600[1)]	UL 508		**8US1251-5DS10**		1	1 unit	1CU
	1	200	45	10	105	118	32	690/600[1)]	UL 508		**8US1211-1NS10**		1	1 unit	1CU
	1 NEW	200	45	10	150	99	32	690/600[1)]	UL 508		**8US1251-5NS10**		1	1 unit	1CU
	1 NEW	200	45	10	150	167	32	690/600[1)]	UL 508		**8US1251-5NS11**		1	1 unit	1CU
	1	200	54	4	150	150	80	690/600[1)]	UL 508		**8US1261-5MS13**		1	1 unit	1CU
 8US1261-6MT10	--	215	72	4	105	210	100	690/600[1)]	UL 508		**8US1211-4TR00**		1	1 unit	1CU
	1	260	45	12	150	99	25	690/600[1)]	UL 508		**8US1251-5DT10**		1	1 unit	1CU
	1	260	45	12	150	167	25	690/600[1)]	UL 508		**8US1251-5DT11**		1	1 unit	1CU
	1	260	45	10	150	99	32	690/600[1)]	UL 508		**8US1251-5NT10**		1	1 unit	1CU
	1	260	45	10	150	167	32	690/600[1)]	UL 508		**8US1251-5NT11**		1	1 unit	1CU
	1	260	54	4	150	150	80	690/600[1)]	UL 508		**8US1261-6MT10**		1	1 unit	1CU
	1	260	119	4	150	150	80	690/600[1)]	UL 508		**8US1211-6MT10**		1	1 unit	1CU
	Lateral modules														
	For extending busbar device adapters and device holders of the same length														
 8US1998-2BJ10	--	200	9	--	--	--	--	--			**8US1998-2BJ10**		1	10 units	1CU

[1)] Value applies to UL 508.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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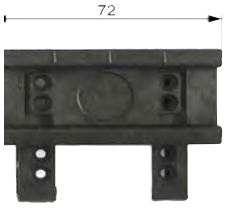
Selection and ordering data

Accessories for SIRIUS 3RV2/3RT2 load feeders

Accessories for SIRIUS 3RV2/3RT2 load feeders are designed for:

- 60 mm 8US busbar system (Cu busbars according to DIN 46433)
- Width 12 to 30 mm, thickness 5 and 10 mm
- And special profiles of up to 1600 A

	Description	Length	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	d					
	Busbar connection pieces for bars								
 8US1921-2BE00	20 x 5 mm, 20 x10 mm, 25 x 5 mm, 25 x10 mm, 30 x 5 mm, 30 x 10 mm	40	--		**8US1921-2BE00**		1	6 units	1CU
 8US1921-2BF00	12 x 5 mm, 12 x 10 mm, 15 x 5 mm, 15 x 10 mm, 20 x 5 mm, 20 x 10 mm	55	--		**8US1921-2BF00**		1	12 units	1CU
	Support rails (35 mm)								
	Support rails made of plastic with fixing screws	--	45		**8US1998-7CB45**		1	10 units	1CU
	Support rails made of plastic with fixing screws	--	54		**8US1998-7CB54**		1	10 units	1CU
	Support rails made of plastic with fixing screws	--	72		**8US1998-7CB72**		1	10 units	1CU

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You can order this quantity or a multiple thereof.

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Accessories

	Description	Length	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	d					
	**Positioning pieces** NEW For pushing on, secures the adaptable devices on the adapter								
	• for 45 mm adapters	--	45		**8US1998-1DA45**		1	10 units	1CU
	• for 54 mm adapters	--	54		**8US1998-1DA54**		1	10 units	1CU
	**Connecting elements** For connecting busbar adapters and device holders	--	--		**8US1998-1AA10**		1	50 units	1CU
	**Spacers** Fix the feeder to the busbar adapter	--	--		**8US1998-1BA10**		1	50 units	1CU
	Vibration & shock kit				**8US1998-1CA10**		1	2 units	1CU
	**Lateral modules** For extending busbar device adapters and device holders of the same length	200	9		**8US1998-2BJ10**		1	10 units	1CU

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Power monitoring
12/2 Power monitoring system
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12/6 Hardware and software components
12/9 PC-based power monitoring system
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7KM PAC measuring devices
12/13 Introduction
12/15 7KM PAC2200 measuring devices NEW
12/16 7KM PAC3100 measuring devices
12/17 7KM PAC3200T measuring devices NEW
12/18 7KM PAC3200 measuring devices
12/20 7KM PAC4200 measuring devices
12/22 7KM PAC5100 measuring devices
12/23 7KM PAC5200 measuring devices
12/25 Accessories for 7KM PAC
12/26 7KM PAC expansion modules NEW

7KT PAC measuring devices
12/29 Introduction
12/30 7KT PAC1200 multichannel current measuring system
12/35 7KT PAC1500 three-phase measuring devices
12/37 7KT PAC1500 single-phase measuring devices
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Other measuring devices
12/39 Digital voltmeters and ammeters
12/41 Time and pulse counters for standard rail mounting
12/43 Time counters for front-panel mounting

Accessories
12/44 Introduction
12/45 4NC current transformers NEW
12/49 7KT12 current transformers
12/50 7KT90 measuring selector switches

For further technical product information:

Configuration Manual

Measuring Devices and Power Monitoring
Article No.: 3ZW1012-7KM42-0AC1

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Overview

Power monitoring made simple

Simplified installation, a wide range of measuring devices, and easy-to-use software: the system from the SENTRON portfolio is optimally suited for small and medium-sized businesses in industry and infrastructure.

Advantages of our power monitoring system

A scalable system

The power monitoring system requires no expert knowledge for commissioning and is available in small, entry-level starter packages. Both hardware and software can be easily expanded.

Industrie 4.0 and smart buildings

It's not just large companies but SMEs as well that can benefit from digitalization and automation – without incurring high procurement costs. Our power monitoring system gathers the data.

Focus on power quality

A decreasing power quality can cause malfunctions in production facilities and terminal equipment. Our power monitoring system analyzes power quality, thus ensuring higher plant availability.

Audits and standards

Companies have to deal with laws and regulations governing energy efficiency. Our power monitoring system has been certified by the German TÜV, thus providing the basis for energy management in conformance with requirements.

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New in our range

New additions to our comprehensive power monitoring portfolio:

The compact standard mounting rail measuring devices

- 7KM PAC3200T and
- 7KM PAC2200

for the simple and low-cost introduction to energy monitoring as well as the

- I(N), I(Diff), analog expansion module

for N conductors and residual current monitoring as well as the measuring of non-electrical quantities using 0/4 ... 20 mA current signals.



New hardware components of the power monitoring system

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



Power management is a matter for decision at the top level

Responsible use of valuable energy resources

Global climate change, scarce energy resources and the increasing demand for energy mean that there is an urgent need for action. The industrialized nations have therefore committed to continuously reduce their annual CO_2 emissions by 2020. The European Council has set a target of improving energy efficiency by 20 percent by 2020. In Germany, the aim is to reduce energy consumption compared with 2008 by 10 percent by 2020, and by 25 percent by 2050.

The international standard ISO 50001 specifies the basic conditions for establishing a corporate energy management system for improved energy efficiency and sustained reduction in a company's energy consumption. Our TÜV-certified power monitoring system from the SENTRON portfolio provides the technical foundation for this. It enables energy flows to be recorded, visualized and analyzed to derive specific measures for optimizing energy use.

A systematic approach to energy efficiency

The standard ISO 50001 supports companies with a specific process description for introducing a corporate energy management system. Standard-compliant energy management optimizes energy utilization, while continuously enhancing energy efficiency.

Defining energy policy objectives

A central management task is the formulation of an in-house energy policy. It defines relevant strategic and operational objectives. Ongoing planning will include the identification of additional optimization potential for the business areas under scrutiny, and the development of relevant improvement measures.

Introducing process optimization

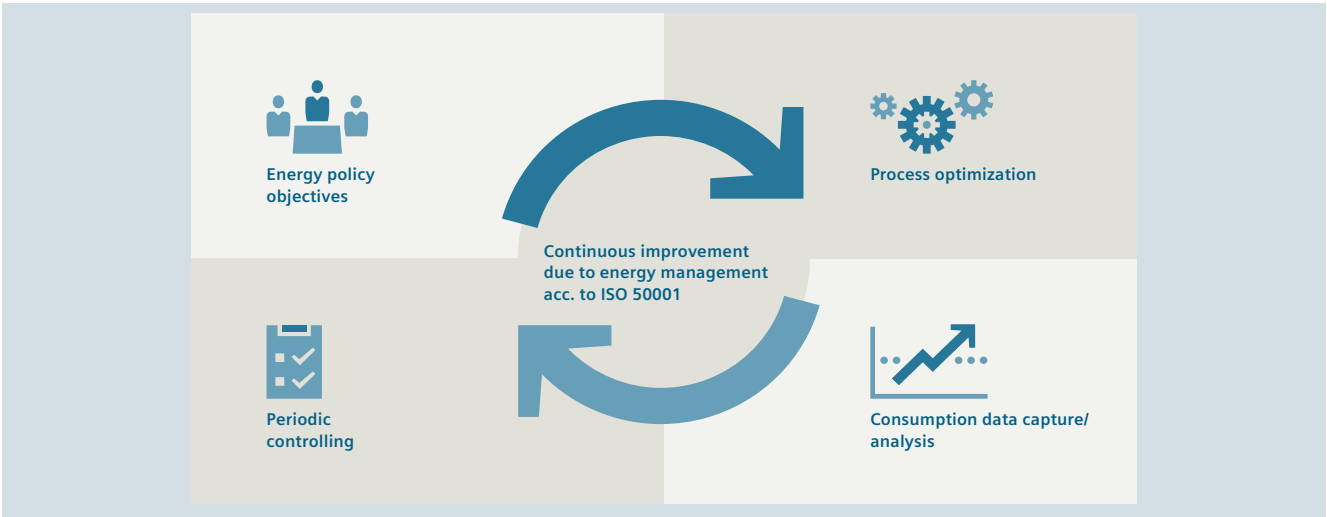
As a first step, an energy manager must be identified and nominated. He will then evaluate captured data, and derive and implement appropriate optimization measures. He will report the achieved results to corporate management.

Making energy flows transparent

As a second step, basic energy consumption and cost data, as well as information on in-house energy production must be collected and documented clearly and verifiably. This requires the development of a reliable and precise system for the capture and analysis of consumption data. The objective is to recognize sustainable savings potential, to derive appropriate measures for that potential, and to implement these measures systematically.

Periodic controlling

Periodic checks will ensure that your energy management system functions correctly, and that objectives are reached. Corrective and preventative measures can then be implemented as needed.



Introduction of a corporate energy management system in accordance with ISO 50001 for continuous improvement of energy efficiency by reducing energy consumption and costs.

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Energy management in accordance with ISO 50001

Providing the basis with power monitoring

The power monitoring system from the SENTRON portfolio is suitable for infrastructure, industrial applications, and buildings. The 7KT/7KM PAC measuring devices record the data of outgoing feeders or individual loads.

The 3WL/3VA/3VL circuit breakers supply measured values and important information for diagnostics, fault detection, and maintenance via standardized bus systems.

With the powermanager power monitoring software, the recorded measured values can be easily visualized, analyzed, archived, and monitored.

Recording of generated energy using MID measuring devices

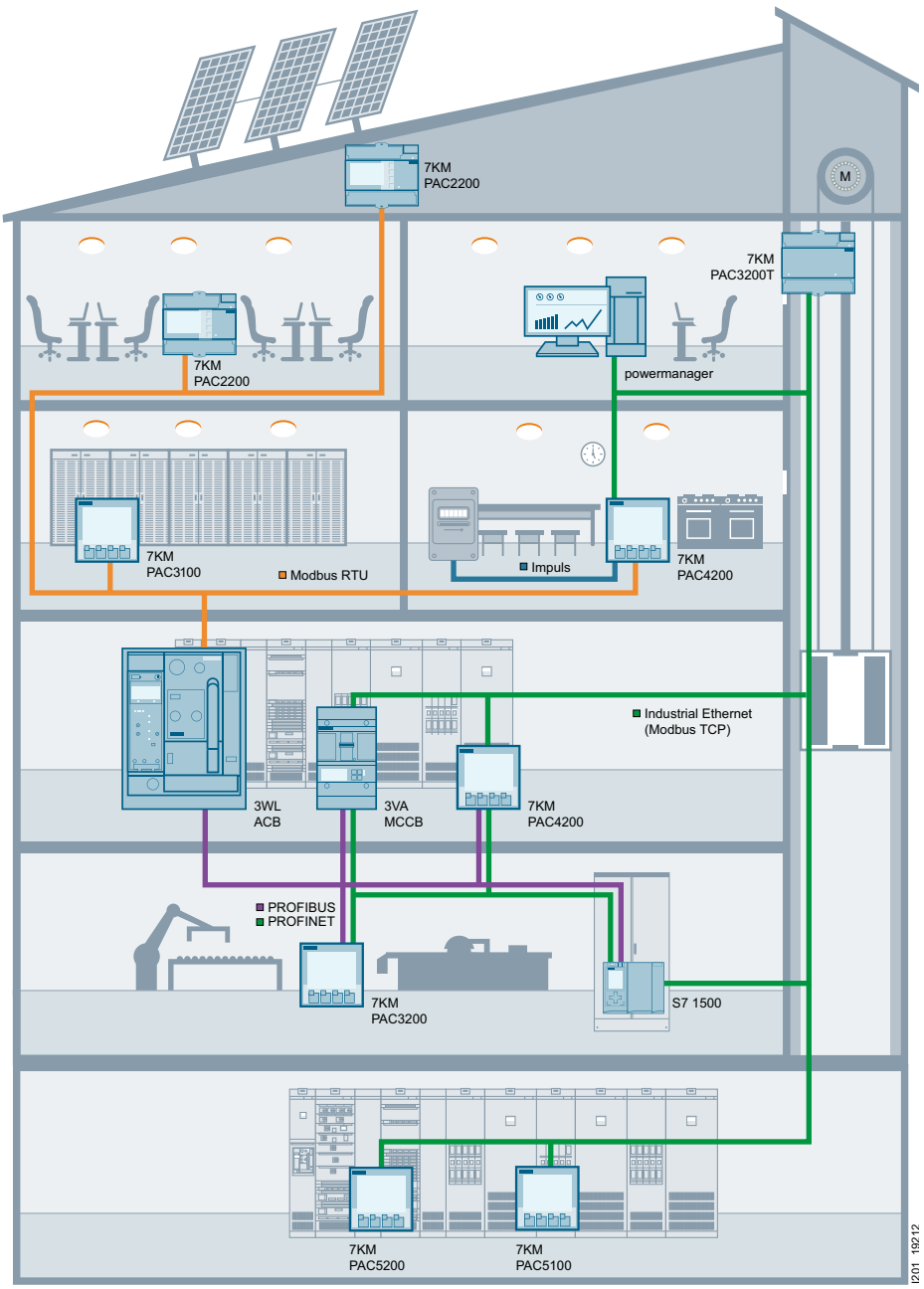
Derivation of optimization measures through transparency of the energy flows

Increased availability of energy through monitoring of critical states in the power supply

Increased system availability through continuous monitoring of switching states

Increased productivity through optimization of energy consumption and energy costs

Transparency at the infeed thanks to seamless recording of the power supply quality



Minimum order quantity (PS) or a multiple thereof can be ordered.

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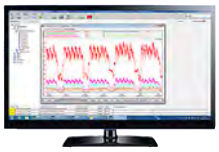
Continuously increasing energy efficiency

Precise cost center accounting for consumers



- Precise allocation of energy costs to cost centers
- Benchmarking between different cost centers
- Increased energy awareness

Detection of energy guzzlers, reduction of load peaks



- Detection of energy-intensive processes and loads
- Cost savings created by amending the power supply agreement
- Tax savings by seamless documentation of application-specific consumption

Protection of sensitive areas for high plant safety



- Avoidance of equipment failures due to overload
- Protection of sensitive devices against harmonics
- Early intervention possible by means of notifications

Monitoring of protective devices for high system availability



- Increased system availability
- Optimization of maintenance
- Fast response to service call-outs

Multi-site power monitoring



- Centralized, multi-site power monitoring via standard IT networks
- Benchmarking of various corporate units increases energy awareness
- Improvement of power supply conditions by bundling supply volumes

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Hardware and software components

Overview

Measuring devices and circuit breakers

	7KT PAC1200	7KT PAC1500	7KM PAC2200 NEW	7KM PAC3100	7KM PAC3200T NEW
					
	The flexible solution for multichannel monitoring in the final circuit	The entry-level solution when it comes to energy measurement	The energy meter solution for the standard mounting rail	The cost-effective solution for digital measurement	The compact solution for precise energy measurement
Measuring range/connection					
Max. input voltage L-L/L-N	400 V/230 V	400 V/230 V	480 V/277 V	480 V/276 V	480 V/277 V
Transformer connection version	x/5 A	x/5 A	x/1 A or x/5 A	x/5 A	x/1 A or x/5 A
Direct connection version	40/63 A	80 A/125 A	–	–	–
DC power supply unit with extra-low volt. version	–	–	–	–	–
Single-phase counter version	–	✓	✓	–	–
Electrically isolated voltage inputs	–	–	–	–	–
Version without display (with web server)	–	–	–	–	✓
Measured quantities					
Voltage, current, frequency,	✓	✓[2]	✓	✓	✓
Power, power factor	✓	✓[2]	✓	✓	✓
Energy measurement					
• Apparent, active, reactive energy, cos phi	– I ✓ I ✓ I –	– I ✓ I ✓I –	✓ I ✓ I ✓I –	– I ✓ I ✓I –	✓ I ✓ I ✓I –
Extended measured quantities					
• Distortion factor THD (voltage, current)	–	–	–	–	✓
• Harmonics (voltage, current)	–	–	–	–	–
• Phase angle/phase chart	–	–	–	–	–
• Load profile recording	–	–	–	–	–
• Flicker acc. to IEC 61000-4-15	–	–	–	–	–
Monitoring functions					
Operating hours counter	–	–	✓	–	✓
Limit monitoring	–	–	–	–	✓
Logic functions	–	–	–	–	✓
Event log	–	–	–	–	–
Gateway function	–	–	–	–	–
Reporting acc. to EN 50160	–	–	–	–	–
Integrated fault recorder	–	–	–	–	–
System integration and communication					
Digital inputs/digital outputs	–	–	1/1	2/2	1/1
S0 interface	–	✓	✓	✓	✓
4DI/2DO expansion module	–	–	–	–	–
M-Bus	–	Optional	✓	–	–
Instabus KNX	–	Optional	–	–	–
Modbus RTU	–	Optional	✓	✓	–
Ethernet with Modbus TCP	✓	–	✓	–	✓
PROFIBUS DPV1	–	–	–	–	–
PROFINET IO/ PROFIenergy	–	–	–	–	–
Expansion module I(N), I(Diff), analog NEW	–	–	–	–	–
Parameterization software	powerconfig	powerconfig	powerconfig	powerconfig	powerconfig
Integration of power monitoring system	powermanager	powermanager	powermanager	powermanager	powermanager
Web servers	✓	–	✓	–	✓
General data					
Measuring accuracy, active/reactive energy	2	1 I 2	1 I 3	1 I 3	0.5 S I 2
MID version	–	✓	✓	–	–
Installation	Standard mounting rail	Standard mounting rail	Standard mounting rail	Front mounting	Standard mounting rail
Dimensions in MW (1 MW = 18 mm) or in mm	4 MW	2 / 4 / 6 MW	6 MW	96 × 96 × 56	6 MW

1) With the exception of devices with power supply units with extra-low voltage.
2) On the display – energy and power values only. Additional measured quantities are transmitted via optional expansion modules 7KT Modbus / 7KT M-Bus
3) THD indication.
4) Measuring accuracy including current transformer
5) DSP800, see chapter "Molded Case Circuit Breakers"

✓ Available / possible -- Not available / not possible

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	7KM PAC3200	7KM PAC4200	7KM PAC5100	7KM PAC5200	3WL	3VA ETU8
						
	The specialist solution for precise energy measurement	The professional solution for communication and monitoring	The specialist solution for measured value acquisition	The expert solution for power supply quality	The specialist solution for protection and energy measurement	The specialist solution for protection and energy measurement
	690 V/400 V[1]	690 V/400 V[1]	690 V/400 V	690 V/400 V	690 V/400 V	690 V/400 V
	x/1 A or x/5 A	x/1 A or x/5 A	x/1 A or x/5 A	x/1 A or x/5 A	Integrated	Integrated
	–	–	–	–	–	–
	22 ... 65 V	22 ... 65 V	–	–	24 V	24 V
	–	–	–	–	–	–
	–	–	✓	✓	–	–
	–	–	✓	✓	–	–
	✓	✓	✓	✓	✓	✓
	✓	✓	✓	✓	✓	✓
	✓ I ✓ I ✓ I –	✓ I ✓ I ✓ I ✓	✓ I ✓ I ✓ I ✓	✓ I ✓ I ✓ I ✓	✓ I ✓ I ✓ I ✓	✓ I ✓ I ✓ I ✓
	✓[3]	✓	✓	✓	✓	✓
	–	3. ... 31.	2. ... 40.	2. ... 40.	–	–
	–	✓	✓	✓	–	–
	–	✓	–	✓	✓	✓
	–	–	–	✓	–	–
	✓	✓	–	–	✓	✓
	✓	✓	✓	✓	✓	✓
	✓	✓	✓	✓	–	–
	–	> 4000 events	✓	✓	✓	✓
	–	✓	–	–	–	–
	–	–	–	✓	–	–
	–	–	–	✓	–	–
	1/1	2/2	0/2	0/2	–	–
	✓	✓	–	–	Optional	Optional
	–	Optional	–	–	Optional	Optional
	–	–	–	–	–	–
	–	–	–	–	–	–
	Optional	Optional	–	–	Optional	Optional
	✓	✓	✓	✓	✓	✓
	Optional	Optional	–	–	Optional	Optional
	Optional	Optional	–	–	Optional	Optional
	Optional	Optional	–	–	--	--
	powerconfig, TIA Portal V14	powerconfig, TIA Portal V14	powerconfig	powerconfig	powerconfig	powerconfig, TIA Portal V14
	powermanager SIMATIC Energy Suite	powermanager SIMATIC Energy Suite	powermanager	powermanager	powermanager	powermanager SIMATIC Energy Suite
	–	–	✓	✓	–	–
	0.5 S I 2	0.2 S I 2	0.5 S I 2	0.5 S I 2	2 S I 2[4]	2 S I 2[4]
	–	–	–	–	–	–
	Front mounting	Front mounting	Front installation/standard rail		see Chapter 1	see Chapter 2
	96 × 96 × 56	96 × 96 × 82	96 × 96 × 100	96 × 96 × 100	96 × 96 × 82[5]	96 × 96 × 82[5]

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Hardware and software components

Expansion modules for 7KT PAC measuring devices

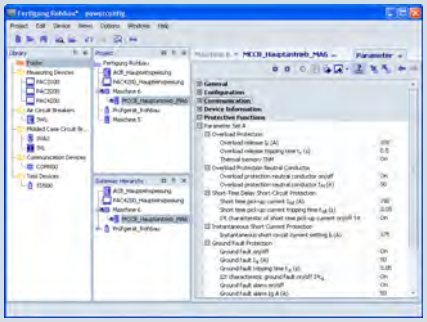
			
	M-Bus	Modbus RTU	KNX
Specification	Up to 9600 bit/s	Up to 115200 bit/s	Up to 19200 bit/s

Expansion modules for 7KM PAC measuring devices

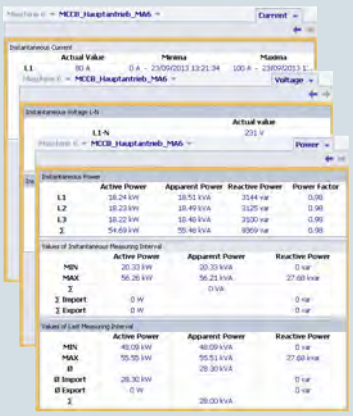
					
	Switched Ethernet For 7KM PAC3200, 7KM PAC4200 and 3VA COM100/COM800	PROFIBUS DP For 7KM PAC3200, 7KM PAC4200 and 3VA COM100/COM800	RS 485 For 7KM PAC3200, 7KM PAC4200 and 3VA COM100/COM800	4DI/2DO For 7KM PAC4200 (number of digital inputs/outputs per module 4/2)	7KM PAC I(N), I(Diff), analog NEW For 7KM PAC4200 and 3200
Protocol	PROFINET IO PROFIenergy Modbus TCP	DPV1	Modbus RTU	--	--
Maximum number of connectable expansion modules of the same type	1	1	1	2	1

The powerconfig software for commissioning

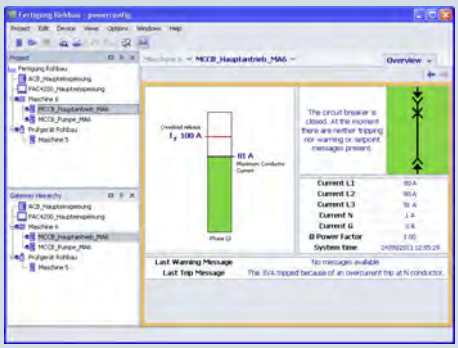
	Software tool for the efficient commissioning and diagnosis of communication-capable SENTRON components
License	Free use
Supported devices	All PAC measuring devices, incl. expansion modules 3WL/3VL/3VA/ATC5300 circuit breakers
General range of functions	The PC-based tool facilitates parameterization of the devices, resulting in substantial time savings, particularly when several devices have to be set up. The device settings can be stored in the PC and printed out. The tool enables monitoring of instantaneous measured quantities, which can be printed out if required. Execution of specific device functions, such as resetting of devices and setting of energy counters
Supported languages	German, English, Chinese, Spanish, Portuguese
Service functions	Firmware updates and switching of language packs for 7KM PAC measuring devices
Functional scope with 7KM PAC4200 and 3VA	Readout of data stored in the device (events; load profile history; daily energy counters), which are saved in csv format



Setting of parameter values



Display of actual measured quantities



Display of the circuit breaker state

For more information about powerconfig, see chapter "Software"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



Hardware components of the PC-based power monitoring system



Software component of the power monitoring software: powermanager

Power monitoring system with SENTRON components

The TÜV-certified power monitoring system from the SENTRON portfolio consists of the 7KT/7KM PAC measuring devices, the 3WL/3VA/3VL circuit breakers, and the powermanager power monitoring software. This forms the technical basis for supporting a corporate energy management system as specified by ISO 50001.

The hardware and software components are optimally coordinated with each other. For example, special drivers for the SENTRON devices are integrated in the powermanager power monitoring software. They enable energy data to be captured without any great configuration effort and they indicate the key measured values or the status by means of predefined views.

This reduces the engineering overhead. The device functions are optimally supported in the software.

Features of the powermanager power monitoring software

The powermanager power monitoring software constitutes the optimum technical basis for supporting a corporate power monitoring system as specified by ISO 50001 and EN 16247:

- Independent power monitoring software
- Can be operated using a Windows PC and measuring devices with Ethernet connection
- Easy getting started with basic license (Basic Package), can be extended with flexible licensing concept according to customer requirements
- Fully scalable, relative to number of devices and software functions
- Optimum integration of 7KT/7KM PAC measuring devices, 3WL/3VL/3VA circuit breakers, 7KM PAC 5200 power quality devices and any other Modbus devices
- Support of the various device and communication interfaces (Modbus RTU, Modbus TCP)
- Status display of devices
- Available languages: German, English, Spanish, Portuguese, Italian, French, Turkish, Chinese

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PC-based power monitoring system

Application

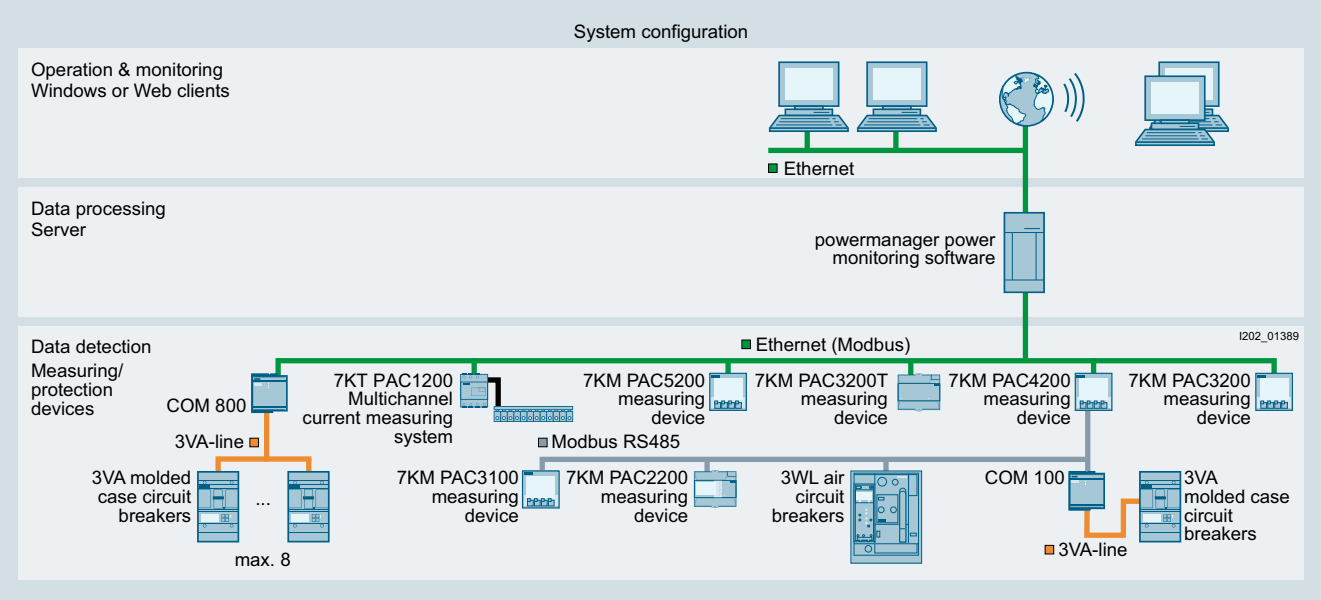
Industries

An energy-efficient production system enhances both the image and the productivity of the company, and thus its competitiveness.

Power monitoring as the technical basis for energy management for increasing a company's energy efficiency is thus of interest to all areas, from industrial applications to infrastructure, and buildings in the service sector.

System configuration

- Integration of measuring devices by means of predefined device templates for the 7KT/7KM PAC measuring devices and the 3WL/3VA/3VL circuit breakers
- Easy integration of existing modbus-capable measuring devices
- Communication through Standard Ethernet
- Integration of devices with RS 485 interface (ModbusRTU) through Modbus gateway, e.g. the 7KM PAC4200 measuring device can be used as the gateway

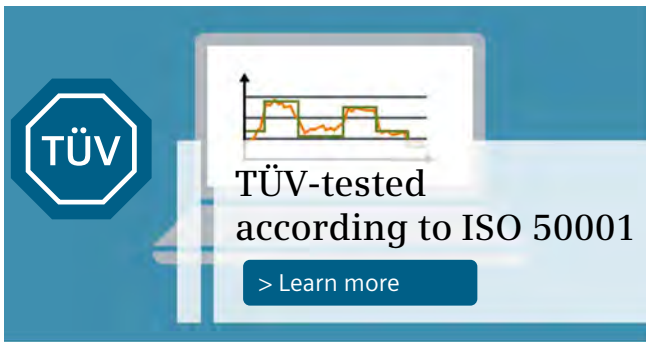


Typical topology of a power monitoring system

12

More information

TÜV certification



The TÜV certificate is available from

www.siemens.com/tuev-certificate-of-conformity

Hardware of the PC-based power monitoring system

The hardware components of the PC-based power monitoring system are

- 7KM PAC measuring devices, see this chapter
- 3WL air circuit breakers, see chapter "Air Circuit Breakers"
- 3VL molded case circuit breakers, see chapter "Molded Case Circuit Breakers"
- 3VA molded case circuit breakers, see chapter "Molded Case Circuit Breakers"

Software of the PC-based power monitoring system

The software of the PC-based power monitoring system is powermanager; see chapter "Software".

Powermanager system packages with software and hardware are an easy and low-cost way to get started with a power monitoring system; see chapter "Software".

Internet

You can find more information on the Internet at:
www.siemens.com/powermonitoring

Minimum order quantity (PS) or a multiple thereof can be ordered.

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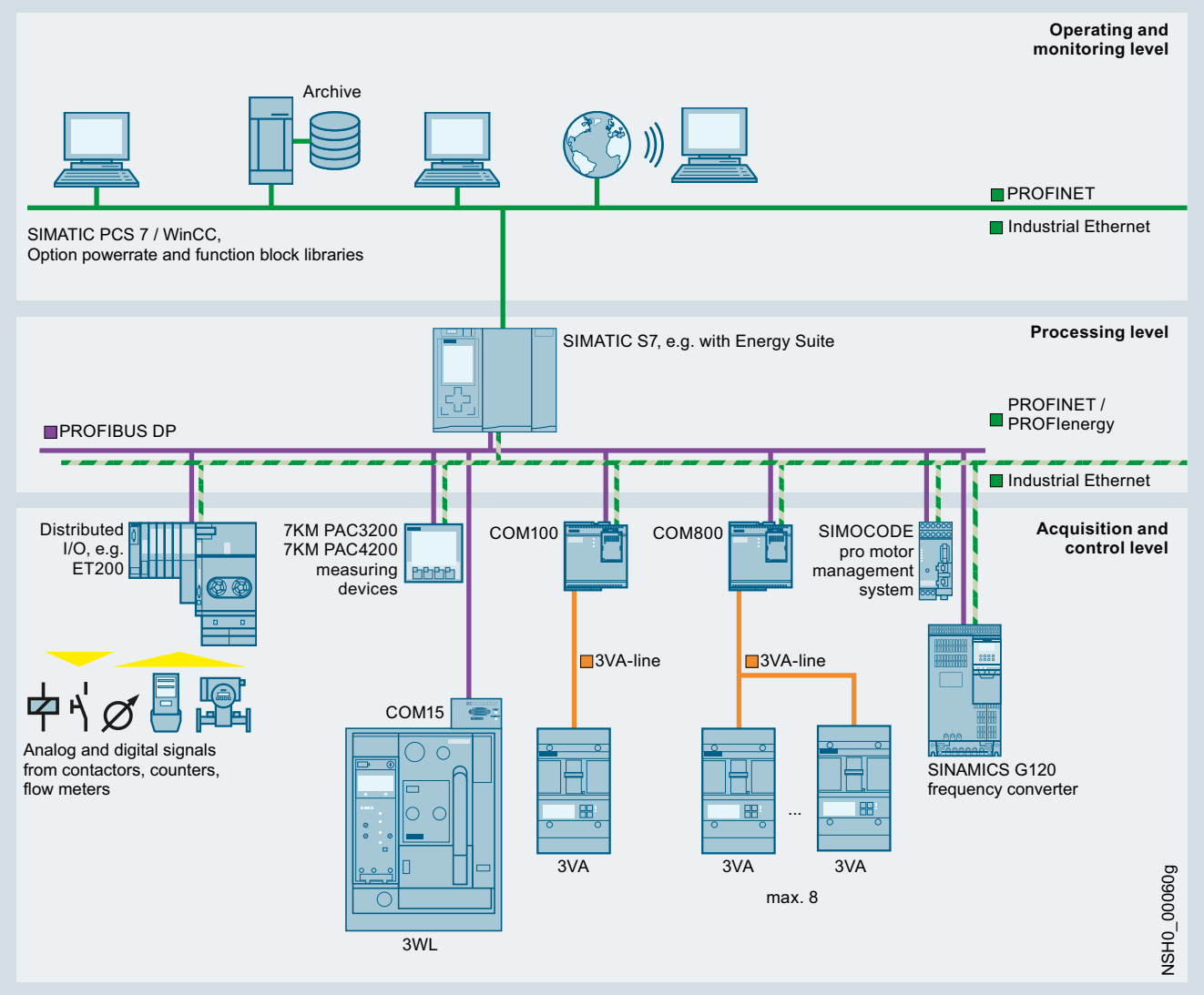
Overview



SIMATIC-based solutions for the process and manufacturing industry

A key feature of the process and manufacturing industry is frequently high energy consumption. It therefore makes sense to integrate a power data management system in existing systems.

Communication via PROFIBUS DP

PROFIBUS DP enables integration of a wide range of devices:

- For the protection of distribution boards and loads: Protective devices, such as circuit breakers
- For open-loop and closed-loop control: Frequency converters, motor management systems and soft starters
- For detection
  - Electrical measured quantities: Via the 7KM PAC3200/4200 measuring devices
  - Non-electrical measured quantities: Via analog/digital converters

PROFINET and PROFIenergy

An increasing number of devices in automation technology offer PROFINET. The 7KM PAC Switched Ethernet PROFINET expansion module enables the 7KM PAC3200/PAC4200 measuring devices and 3VA circuit breakers to be connected to the automation systems.

PROFIenergy is a "Common Application Profile" from Profibus International. Thanks to PROFIenergy it is possible to create a power data management system with standardized device interfaces.

Function block libraries for SIMATIC PCS 7 and WinCC

The function block library for SIMATIC PCS 7 and WinCC ensures device integration as follows:

- Measured quantities and states can be connected via CFC
- Structured display of measured quantities and protection parameters for the 3WL/3VA/3VL circuit breakers
- Limit value violations are displayed, archived and acknowledged in the relevant communications system in the usual way
- Circuit breakers can be program-controlled or manually operated with the appropriate user authorization

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SIMATIC-based power data management system

Benefits

- Increased energy efficiency due to precise knowledge of the load profile
- Optimization of power supply agreements
- Allocation of power costs to cost centers
- Optimization of plant maintenance
- Identification of critical plant conditions
- Reliable monitoring of the power limit through automatic load management

Application

The SIMATIC-based power data management system is used in all industries in which PCS 7 and WinCC are used, and the transparency and monitoring of power flows is crucial.

More information

Hardware components

The hardware components of the SIMATIC-based power data management system are

- 7KM PAC measuring devices, see this chapter
- 3WL air circuit breakers, see chapter "Air Circuit Breakers"
- 3VL molded case circuit breakers, see chapter "Molded Case Circuit Breakers"
- 3VA molded case circuit breakers, see chapter "Molded Case Circuit Breakers"

Software components

The software components of the SIMATIC-based power data management system are

- Energy Suite
- SIMATIC Modbus/TCP SENTRON PAC
- Library 7KM PAC3200 for SIMATIC WinCC

For information about all the software components, see chapter "Software"

Internet

You can find more information on the Internet at: www.siemens.com/powermonitoring

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Devices	Page	Application	Standards	Used in: Non-residential buildings	Residential buildings	Industry
7KM PAC measuring devices						
		The 7KM PAC measuring devices are used to measure and display all relevant system parameters in low-voltage power distribution. They can be used for both single-phase and multi-phase measurements in 3 and 4-conductor power supply systems (TN, TT, IT). They record energy values for main distribution boards, electrical branches or individual loads precisely and reliably, and also supply key measured values for assessment of the state of the plant and the quality of the power supply.				
	**7KM PAC2200 measuring device** *NEW* Screw terminals	12/16	Standard rail instrument with graphics display, one integrated digital input and output and an integrated communication interface (Mobus TCP -3 simultaneous connections, Modbus RTU, M-Bus) for the transmission of measured values and for configuration. Display of 30 electrical measured values and consumption values in switchboard assemblies, infeeds or outgoing feeders. International standards and multi-lingual displays for worldwide use.	Measurement accuracy for energy acc. to IEC 61557-12	✓	--	✓
	**7KM PAC3100 measuring device** AC/DC wide-range power supply unit, screw connection	12/16	Control panel instrument with graphics display, integrated digital inputs and outputs and an RS 485 interface for the transmission of measured values and for configuration. Display of 30 electrical measured values and consumption values in switchboard assemblies, infeeds or outgoing feeders. International standards and multi-lingual displays for worldwide use.	Measurement accuracy for energy acc. to IEC 61557-12	✓	--	✓
	**7KM PAC3200T measuring device** *NEW* Screw terminals	12/16	Standard rail instrument without graphics display with integrated web server, one integrated digital input and output and a Modbus TCP interface for the transmission (3 simultaneous connections) of measured values and for configuration. Display of 50 electrical measured values and consumption values in switchboard assemblies, infeeds or outgoing feeders. International standards for worldwide use.	Measurement accuracy for energy acc. to IEC 61557-12	✓	--	✓
	**7KM PAC3200 measuring device** 3 versions: • AC/DC wide-range power supply unit, screw connection • DC power supply unit with extra-low voltage, screw connection • AC/DC wide-range power supply unit, ring cable lug connection	12/18	Control panel instrument with graphics display, integrated digital inputs and outputs and an integrated Ethernet interface for the transmission of measured values and for configuration. Display of over 50 electrical measured values for switchboard assemblies, infeeds or outgoing feeders. Dual-tariff measuring devices for precise energy measurement for power import and feedback. The following expansion modules are available: • 7KM PAC Switched Ethernet PROFINET • 7KM PAC RS 485 • 7KM PAC PROFIBUS DP • 7KM PAC I(N), I(Diff), analog	Measuring accuracy for energy acc. to IEC 62053-22/23 and IEC 61557-12	✓	--	✓
	**7KM PAC4200 measuring device** 3 versions: • AC/DC wide-range power supply unit, screw connection • DC power supply unit with extra-low voltage, screw connection • AC/DC wide-range power supply unit, ring cable lug connection	12/20	Control panel instrument with graphics display, user-defined displays, memory, clock and calendar function, digital inputs and outputs and an integrated Ethernet interface with gateway function to transfer measured values and configurations. Display of over 200 electrical measured values for switchboard assemblies, infeeds or outgoing feeders. Extensive functions for precise energy measurement for power import and feedback and assessment of the system quality. The following expansion modules are available: • 7KM PAC Switched Ethernet PROFINET • 7KM PAC RS 485 • 7KM PAC PROFIBUS DP • 7KM PAC 4DI/2DO • 7KM PAC I(N), I(Diff), analog	Measuring accuracy for energy acc. to IEC 62053-22/23 and IEC 61557-12	✓	--	✓

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Introduction

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**7KM PAC5100 measuring device** 2 versions: • Control panel instrument with graphics display • Standard rail instrument without display	12/22	Control panel instrument with graphics display and user-defined displays, or instrument for standard rail mounting in accordance with EN 60750, web server for parameterization, visualization and data management, 2 binary outputs, electrically isolated voltage inputs, synchronization via internal RTC clock or externally via NTP, 4 freely parameterizable LEDs for device status or limit violations, as well as an integrated RJ45 Ethernet interface. Recording of more than 250 electrical measured values for switchboard assemblies, infeeds or outgoing feeders, extensive functions for precise energy measurement for power import and feedback, and for assessment of the system quality.	Measuring accuracy for energy acc. to IEC 62053-22/23 and IEC 61557-12	✓	--	✓
	**7KM PAC5200 measuring device** 2 versions: • Control panel instrument with graphics display • Standard rail instrument without display	12/23	Control panel instrument with graphics display and user-defined displays or instrument for standard rail mounting in accordance with EN 60750, web server for parameterization, visualization and data management, 2 binary outputs, electrically isolated voltage inputs, flicker in accordance with IEC 61000-4-15, synchronization via internal RTC clock or externally via NTP, 4 freely parameterizable LEDs for device status or limit violations, 2 GB memory, integrated fault recorder, reporting in accordance with EN 50160, rms recorder, as well as an integrated RJ45 Ethernet interface. Recording of more than 250 electrical measured values for switchboard assemblies, infeeds or outgoing feeders. Extensive functions for precise energy measurement for power import and feedback and assessment of the system quality.	Measuring accuracy for energy acc. to IEC 62053-22/23 and IEC 61557-12	✓	--	✓
	**7KM PAC expansion modules**	12/26	• The 7KM PAC Switched Ethernet PROFINET expansion module is used to connect the 7KM PAC3200 and 7KM PAC4200 measuring devices and 3VA molded case circuit breakers to Switched Ethernet PROFINET (PROFIenergy). • The 7KM PAC PROFIBUS DP expansion module is used to connect the 7KM PAC3200 and 7KM PAC4200 measuring devices and 3VA molded case circuit breakers to the PROFIBUS DPV1 • The 7KM PAC RS 485 expansion module is used to connect simple devices with RS 485 interface, such as the 7KM PAC3200 and 3VA molded case circuit breaker, and supports the Modbus RTU protocol. • The 7KM PAC 4DI/2DO expansion module is used to expand the 7KM PAC4200 measuring device to up to 10 digital inputs and 6 digital outputs. • The 7KM PAC I(N), I(Diff), analog expansion module adds the following functions for 7KM PAC3200 and 7KM PAC4200 devices: - N-conductor measurement - Two analog inputs with 0/4 ... 20 mA signaling to measure electrical and non-electrical quantities - Residual current measurement	IEC 61784-2 IEC 61158 RS 485 IEC 62053-31	✓	--	✓

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



7KM PAC2200 measuring device

The 7KM PAC2200 measuring device is a standard rail instrument with a graphical display and integrated web server for acquiring important measured values to evaluate the plant state and power quality.

The 7KM PAC2200 measuring device has

- an integrated Ethernet interface with Modbus TCP protocol, which enables up to 3 simultaneous connections
- an M-Bus interface or
- a Modbus RTU interface

An expansion module is not required for this.

The 7KM PAC2200 measuring device

- is also suitable for direct measurement up to 480 V UL-L, CATIII
- is designed for current measurement via x/1 A or x/5 A transformers, or directly up to 65 A (CATIII)
- is powered by the measurement voltage

Benefits

- Simple mounting and commissioning on standard mounting rail
- Compact design, directly in the control panel
- Worldwide use
- Interface to power monitoring system
- Low mounting depth
- Free, intuitive configuration software, powerconfig, see chapter "Software"
- Interface possible to power monitoring software, powermanager, see chapter "Software"

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
		d				
 7KM2200-2EA30-1CA1	**7KM PAC2200 measuring device**		**Screw connection** ⏚			
	Standard rail instrument 6 MW Screw connections for current and voltage connection Measuring inputs U_e: max. 480/277 V 3 AC, 50/60 Hz					
	7KM PAC2200 measuring device, x/1 A or x/5 A transformer measurement					
	• With M-Bus interface		**7KM2200-2EA30-1CA1**	1	1 unit	1DD
	• With Modbus RTU interface		**7KM2200-2EA30-1DA1**	1	1 unit	1DD
	• With Modbus TCP interface		**7KM2200-2EA30-1EA1**	1	1 unit	1DD
	7KM PAC2200 measuring device, direct measurement 65 A					
	• With M-Bus interface		**7KM2200-2EA40-1CA1**	1	1 unit	1DD
	• With Modbus RTU interface		**7KM2200-2EA40-1DA1**	1	1 unit	1DD
	• With Modbus TCP interface		**7KM2200-2EA40-1EA1**	1	1 unit	1DD

More information

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

For other accessories, see page 12/44

powerconfig is available free of charge at http://support.automation.siemens.com/WW/view/en/63452759

For more information about powerconfig and powermanager, see chapter "Software"

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7KM PAC3100 measuring devices

Overview



7KM PAC3100 measuring device

The 7KM PAC3100 measuring device is a control panel instrument for acquiring important measured values to evaluate the plant state and power quality.

The 7KM PAC3100 measuring device is fitted with an integrated Modbus RTU interface via RS 485, no expansion module is required.

Benefits

- Simple mounting and commissioning
- High IP65 degree of protection (front side, when installed) permits usage in extremely dusty and wet environments
- Intuitive operation using 4 function buttons and multilingual plain text displays
- Easy adaptation to different systems using integrated and optional
  - Digital inputs and outputs
  - Communication interfaces
- Worldwide use
  - At least 8 languages
  - International approvals
  - Developed and tested to European and international standards
- Low mounting depth
- Free, intuitive configuration software, powerconfig, see chapter "Software"

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
		d				
 7KM3133-0BA00-3AA0	**7KM PAC3100 measuring device** Control panel instrument, 96 x 96 mm Screw connections for current and voltage connection AC/DC wide-voltage power supply unit U_{AUX}: 100 … 240 V AC ± 10%, 50/60 Hz 110 … 250 V DC ± 10% Measuring inputs U_e: max. 480/277 V 3 AC, 50/60 Hz I_e: /5 A		**Screw connection** ⊕			
			7KM3133-0BA00-3AA0	1	1 unit	1DD

More information

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

For other accessories, see page 12/44

powerconfig is available free of charge at http://support.automation.siemens.com/WW/view/en/63452759

For more information about powerconfig, see chapter "Software"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



7KM PAC3200T measuring device

The 7KM PAC3200T measuring device is a standard rail instrument without a display but with an integrated web server for acquiring important measured values to evaluate the plant state and power quality.

The 7KM PAC3200T measuring device has an integrated Ethernet interface with Modbus TCP protocol, which enables up to 3 simultaneous connections. An expansion module is not required for this.

The 7KM PAC3200T measuring device

- is also suitable for direct measurement up to 480 V UL-L, CATIII or via current transformer
- is for x/1A or x/5A transformer current measurement and
- meets the high requirements of IEC 61557-1,

Benefits

- Simple mounting and commissioning on standard mounting rail
- Compact design, directly in the control panel
- Worldwide use
- Interface to power monitoring system, powermanager, see chapter "Software"
- Low mounting depth
- Free, intuitive configuration software, powerconfig, see chapter "Software"

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
 7KM3200-0CA01-1AA0	**7KM PAC3200T measuring device** • Standard rail instrument 6 MW without display, with integrated web server • Screw connections for current and voltage connection • AC/DC wide-voltage power supply unit U_{AUX}: 90 … 276 V AC 50/60 Hz 110 … 275 V DC • Measuring inputs U_e: max. 480/277 V 3 AC, 50/60 Hz		**Screw connection** ⏚ **7KM3200-0CA01-1AA0**	1	1 unit	1DD

More information

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

For other accessories, see page 12/44

powerconfig is available free of charge at http://support.automation.siemens.com/WW/view/en/63452759

For more information about powerconfig, see chapter "Software"

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7KM PAC3200 measuring devices

Overview



7KM PAC3200 measuring device

The 7KM PAC3200 measuring device is a control panel instrument for acquiring important measured values to evaluate the plant state and power quality.

The 7KM PAC3200 measuring device is fitted with an integrated Modbus TCP interface via Ethernet, no expansion module is required.

Power distribution in the TIA Portal

The devices fit seamlessly into V14 or higher of TIA Portal, thus enabling parameter assignment, commissioning and automation of power distribution in the application itself.

The benefits for you:

- Engineering with one tool only
- Intuitive configuration of power distribution
- Access to measured and diagnostic data

More information

www.siemens.com/lowvoltage/tia-portal

Benefits

- Simple mounting and commissioning
- High IP65 degree of protection (front side, when installed) permits usage in extremely dusty and wet environments
- Intuitive operation using 4 function buttons and multilingual plain text displays
- Easy adaptation to different systems using integrated and optional
  - Digital inputs and outputs
  - Communication interfaces
- Worldwide use
  - At least 8 languages
  - International approvals
  - Developed and tested to European and international standards
- Low mounting depth

Additional performance characteristics of the 7KM PAC3200

- Precise energy measurement
- Versatile system integration
  - Integrated Ethernet interface
  - Optional communication modules available
  - Multifunctional digital inputs and outputs
  - Limit monitoring
- Can be connected directly to power supply systems up to 690 V AC (UL-L) and CATIII without voltage transformers (with the exception of devices with power supply units with extra-low voltage)
- User-friendly configuration software, powerconfig, see chapter "Software"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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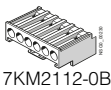
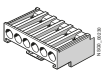
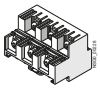
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
  7KM2112-0BA00-3AA0	**7KM PAC3200 measuring device** Control panel instrument, 96 x 96 mm Screw connections for current and voltage connection AC/DC wide-voltage power supply unit U_{AUX}: 95 … 240 V AC ± 10%, 50/60 Hz 110 … 340 V DC ± 10% Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM2112-0BA00-3AA0**	1	1 unit	1DD
  7KM2111-1BA00-3AA0	**7KM PAC3200 measuring device** Control panel instrument, 96 x 96 mm Screw connections for current and voltage connection DC power supply unit with extra-low voltage U_{AUX}: 22 … 65 V DC ± 10% Measuring inputs U_e: max. 500/289 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM2111-1BA00-3AA0**	1	1 unit	1DD
  7KM2112-0BA00-2AA0	**7KM PAC3200 measuring device** Control panel instrument, 96 x 96 mm Ring cable lug connections for current and voltage connection AC/DC wide-range power supply U_{AUX}: 95 … 240 V AC ± 10%, 50/60 Hz 110 … 340 V DC ± 10% Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Ring cable lug connection** **7KM2112-0BA00-2AA0**	1	1 unit	1DD

More information

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

For other accessories, see page 12/44

powerconfig is available free of charge at http://support.automation.siemens.com/WW/view/en/63452759

For more information about powerconfig, see chapter "Software"

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7KM PAC4200 measuring devices

Overview



7KM PAC4200 measuring device

The 7KM PAC4200 measuring device is a control panel instrument for acquiring important measured values to evaluate the plant state and power quality.

The 7KM PAC4200 measuring device is fitted with an integrated Modbus TCP interface via Ethernet, no expansion module is required.

Power distribution in the TIA Portal

The devices fit seamlessly into V14 or higher of TIA Portal, thus enabling parameter assignment, commissioning and automation of power distribution in the application itself.

The benefits for you:

- Engineering with one tool only
- Intuitive configuration of power distribution
- Access to measured and diagnostic data

More information:

www.siemens.com/lowvoltage/tia-portal

Benefits

- Simple mounting and commissioning
- High IP65 degree of protection (front side, when installed) permits usage in extremely dusty and wet environments
- Intuitive operation using 4 function buttons and multilingual plain text displays
- Easy adaptation to different systems using integrated and optional
  - Digital inputs and outputs
  - Communication interfaces
- Worldwide use
  - At least 8 languages
  - International approvals
  - Developed and tested to European and international standards
- Low mounting depth

Additional performance characteristics of the 7KM PAC4200:

- Precise energy measurement
- Versatile system integration
  - Integrated Ethernet interface
  - Optional communication modules available
  - Multifunctional digital inputs and outputs
  - Limit monitoring
- Can be connected directly to power supply systems up to 690 V AC (UL-L) and CATIII without voltage transformers (with the exception of devices with extra-low voltage power supply units)
- User-friendly configuration software, powerconfig, see chapter "Software"
- Monitoring of plant status and power supply quality
  - Basic information for evaluating the power supply quality
  - Logging of plant history in the form of operation, control and system-related events
- Recording of the power range through power averaging (load profile)
- Daily energy meters for apparent, active and reactive energy across 365 days for cut-off date assessment
- Detection of gas, water, compressed air or other energy sources via pulse counter to the digital inputs
- Can be expanded using modules to up to 10 digital inputs and 6 digital outputs
- Counters for apparent, active and reactive energy for the precise detection of the power consumption of a partial process or manufacturing process
- 10/100 Mbit/s Ethernet interface with gateway function for the easy connection of devices with serial RS 485 interface via 7KM PAC RS 485 expansion module to an Ethernet network
- Comprehensive user-friendly indicators, such as user-defined displays, bar and status indicators, phase diagram and list and histogram graphics
- Satisfies the accuracy requirements of class 0.1 S high-precision meters used by power supply companies according to IEC 62053-22, which are normally reserved for exacting industrial applications

Minimum order quantity (PS) or a multiple thereof can be ordered.

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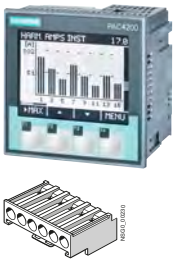
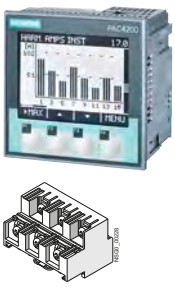
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
 7KM4212-0BA00-3AA0	**7KM PAC4200 measuring device** Control panel instrument, 96 x 96 mm Screw connections for current and voltage connection AC/DC wide-voltage power supply unit U_{AUX}: 95 … 240 V AC ± 10%, 50/60 Hz 110 … 340 V DC ± 10% Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM4212-0BA00-3AA0**	1	1 unit	1DD
 7KM4211-1BA00-3AA0	**7KM PAC4200 measuring device** Control panel instrument, 96 x 96 mm Screw connections for current and voltage connection DC power supply unit with extra-low voltage U_{AUX}: 22 … 65 V DC ± 10% Measuring inputs U_e: max. 500/289 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM4211-1BA00-3AA0**	1	1 unit	1DD
 7KM4212-0BA00-2AA0	**7KM PAC4200 measuring device** Control panel instrument, 96 x 96 mm Ring cable lug connections for current and voltage connection AC/DC wide-range power supply U_{AUX}: 95 … 240 V AC ± 10%, 50/60 Hz 110 … 340 V DC ± 10% Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Ring cable lug connection** **7KM4212-0BA00-2AA0**	1	1 unit	1DD

More information

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

For other accessories, see page 12/44

powerconfig is available free of charge at http://support.automation.siemens.com/WW/view/en/63452759

For more information about powerconfig, see chapter "Software"

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7KM PAC5100 measuring devices

Overview



7KM PAC5100 measuring device

The 7KM PAC5100 measuring device is a control panel instrument for acquiring important measured values to evaluate the plant state and power quality.

The 7KM PAC5100 measuring device has an integrated Modbus TCP interface via Ethernet and a web server for parameterization, visualization and data management.

Benefits

- Simple mounting and commissioning
- Intuitive operation via 4 function keys
- Integrated web server for parameterization, display and evaluation
- 4 parameterizable LEDs
- Worldwide use
  - International approvals
  - Developed and tested to European and international standards
- Low mounting depth
- Precise energy measurement
- Versatile system integration
  - Integrated Ethernet interface
  - Multifunctional digital outputs
  - Limit monitoring
- Can be directly connected to power supply networks up to 690 V AC (UL-L), CATIII without voltage transformer
- Electrically isolated voltage inputs
- Monitoring of plant status and power supply quality
  - Basic information for evaluating the power supply quality
  - Logging of plant history in the form of operation, control and system-related events
- Energy counters for apparent energy, active energy, reactive energy, as well as import, supply, inductive and capacitive
- Comprehensive user-friendly indicators, such as user-defined displays, bar and status indicators
- Measurement up to the 40th individual harmonic of current and voltage

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
 7KM5212-6BA00-1EA2	**7KM PAC5100 measuring device** Control panel instrument, 96 x 96 mm Screw connections for current and voltage connection AC/DC wide-voltage power supply unit U_{AUX}: 110 … 230 V AC ± 10 %, 50/60 Hz 24 … 250 V DC ± 10 % Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM5212-6BA00-1EA2**	1	1 unit	1DD
 7KM5212-6CA00-1EA8	**7KM PAC5100 measuring device** Standard rail instrument without display Screw connections for current and voltage connection AC/DC wide-voltage power supply unit U_{AUX}: 110 … 230 V AC ± 10 %, 50/60 Hz 24 … 250 V DC ± 10 % Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM5212-6CA00-1EA8**	1	1 unit	1DD

More information

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



7KM PAC5200 measuring device

The 7KM PAC5200 power quality measuring device is

- a control panel instrument
- or a standard rail instrument without display

for acquiring important measured values to evaluate the plant state and power quality.

It has an integrated Modbus TCP interface via Ethernet as well as a web server for parameterization, visualization and data management.

Benefits

- Simple mounting and commissioning
- Intuitive operation via 4 function keys
- 4 parameterizable LEDs
- Integrated web server for parameterization, display and evaluation
- Worldwide use
  - International approvals
  - Developed and tested to European and international standards
- Low mounting depth
- Precise energy measurement
- Versatile system integration
  - Integrated Ethernet interface
  - Multifunctional digital outputs
  - Limit monitoring
- Can be directly connected to power supply networks up to 690 V AC (UL-L), CATIII without voltage transformer
- Electrically isolated voltage inputs
- Monitoring the plant status and the power supply quality:
  - Basic information for evaluating the power supply quality
  - Logging of plant history in the form of operation, control and system-related events
  - Flicker acc. to IEC 61000-4-15
- Energy counters for apparent energy, active energy, reactive energy, as well as import, supply, inductive and capacitive
- Comprehensive user-friendly indicators, such as user-defined displays, bar and status indicators
- Measurement up to the 40th individual harmonic of current and voltage
- Integrated 2 GB SD card for recorder functions
- Flexible recorder:
  - Measured value recorder
  - Trend recorder
  - Event recorder
  - Fault recorder
- Integrated PQ recording and reporting in accordance with EN 50160
- Data export:
  - COMTRADE
  - PQDif
- Classification of events
- ITIC /CBEMA evaluation in the device

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7KM PAC5200 measuring devices

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
 7KM5412-6BA00-1EA2	**7KM PAC5200 measuring device** Control panel instrument, 96 x 96 mm Screw connections for current and voltage connection AC/DC wide-voltage power supply unit U_{AUX}: 110 … 230 V AC ± 10 %, 50/60 Hz 24 … 250 V DC ± 10 % Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM5412-6BA00-1EA2**	1	1 unit	1DD
 7KM5412-6CA00-1EA8	**7KM PAC5200 measuring device** Standard rail instrument without display Screw connections for current and voltage connection AC/DC wide-voltage power supply unit U_{AUX}: 110 … 230 V AC ± 10 %, 50/60 Hz 24 … 250 V DC ± 10 % Measuring inputs U_e: max. 690/400 V 3 AC, 50/60 Hz I_e: /1 A or /5 A		**Screw connection** **7KM5412-6CA00-1EA8**	1	1 unit	1DD

More information

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

for 7KM PAC3100/3200/4200

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
 7KM9900-0XA00-0AA0	**7KM PAC TMP2 standard mounting rail adapter** Two-tier adapter for mounting a measuring device on a standard mounting rail • Front display • For manual intervention		**7KM9900-0XA00-0AA0**	1	1 unit	1DD
 7KM9900-0YA00-0AA0	**7KM PAC TMP mounting plate** Adapter for mounting a measuring device on standard mounting rail • Display faces backwards towards standard mounting rail • Readout and evaluation of measurements solely via mains operation		**7KM9900-0YA00-0AA0**	1	1 unit	1DD
 7KM9900-0GA00-0AA0	**Compact holder** Device holder for 7KM PAC3100/3200/4200: • 10 holders for 5 PAC devices • For seamless side-by-side mounting of the devices (without spaces)		**7KM9900-0GA00-0AA0**	1	1 unit	1DD
 7KM9900-0SA00-0AA0	**7KM PAC spare parts** Spare parts comprising: • Device holders for panel mounting (2X) • Screw terminal for connection of voltage inputs • Screw terminal for connection of current inputs • Terminal block inputs/outputs for 7KM PAC3100/4200 • Terminal block inputs/outputs for 7KM PAC3200 • RS 485 terminal block for 7KM PAC3100		**7KM9900-0SA00-0AA0**	1	1 unit	1DD

More information

Current transformers

For current transformers, see page 12/45 or see chapter "Switch Disconnectors"

Software components

For more information about the software components, see chapter "Software" and on the internet at www.siemens.com/lowvoltage/powermonitoring

More information

More information is available on the internet at www.siemens.com/lowvoltage/powermonitoring

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7KM PAC expansion modules

Overview



Expansion modules are used as communication interfaces and for expanding the digital inputs/outputs and measuring inputs for 7KM PAC measuring devices.

The expansion modules are plugged in at the back of the measuring device. The device identifies the module automatically and presents the relevant parameters for this module for selection in the parameterization menu.

Versions

The following expansion modules are available (shown from left to right in the adjacent figure):

- 7KM PAC Switched Ethernet PROFINET expansion module
- 7KM PAC PROFIBUS DP expansion module
- 7KM PAC RS 485 expansion module
- 7KM PAC 4DI/2DO expansion module
- 7KM PAC I(N), I(Diff), analog expansion module

Connection for 3VA molded case circuit breakers

The following expansion modules can also be mounted on the front of the COM800/COM100 breaker data servers of the 3VA molded case circuit breaker:

- 7KM PAC Switched Ethernet PROFINET and
- 7KM PAC PROFIBUS DP
- 7KM PAC RS 485

For further details, see chapter "Molded Case Circuit Breakers" or in the manual at http://support.automation.siemens.com/DE/view/en/90318775

More information

For more information about the software components, see chapter "Software" and on the internet at www.siemens.com/lowvoltage/powermonitoring

Version	Use in 7KM PAC							3VA
	PAC2200	PAC3100	PAC3200T	PAC3200	PAC4200	PAC5100	PAC5200	COM800/ COM100
7KM PAC expansion modules								
 **7KM PAC Switched Ethernet PROFINET expansion module** The 7KM PAC Switched Ethernet PROFINET expansion module is a plug-in communication module for 7KM PAC3200 and 7KM PAC4200 measuring devices and 3VA molded case circuit breakers. It provides the following features: • Standardized PROFIenergy interface to the measured quantities • The measured quantities can be individually selected using a GSDML file. This permits use of cost-effective S7 CPUs • Easy parameter assignment using the device display and STEP 7 • Integrated Ethernet switching allows networking with short cables without additional switches • Direct integration in production machine networks using IRT (IRT = Isochronous-Real-Time) • Full support of PROFINET IO (DHC, DNS, SNMP, SNTP) • Device replacement without PG in the PROFINET assembly using LLDP • Deterministic reversing time through ring redundancy (MRP) • Modbus TCP communication • Communication with powermanager or powerconfig • 2 x Ethernet (RJ45) sockets • Transmission rates 10 and 100 Mbit/s • Protocols PROFINET IO, PROFIenergy and Modbus TCP • No external auxiliary power necessary • Additional display via the device display and via LEDs on the module All measured variables from 7KM PAC3200 and 7KM PAC4200 can be individually selected and cyclically transmitted by means of the GSDML file. This enables optimum use of the process image of the PROFINET controller, e.g. CPU 315-2 PN/DP of SIMATIC S7. The measured quantities can be read out in acyclic mode using PROFIenergy, a PNO protocol profile. Thanks to PROFIenergy, it is possible to assemble a power monitoring system with devices from various manufacturers using PROFINET.	--	--	--	✓	✓	--	--	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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7KM PAC expansion modules

Version		Use in 7KM PAC							3VA
		PAC2200	PAC3100	PAC3200T	PAC3200	PAC4200	PAC5100	PAC5200	COM800/ COM100
	**7KM PAC PROFIBUS DP expansion module** The 7KM PAC PROFIBUS DP expansion module is a plug-in communication module for 7KM PAC3200 and 7KM PAC4200 measuring devices and 3VA molded case circuit breakers. The 7KM PAC PROFIBUS DP expansion module has the following features: • Plug-in communication module for measuring devices for connection to PROFIBUS DPV1 • For 7KM PAC3200 and 7KM PAC4200 • Parameterizable via device front or using parameterization software • Data can be transferred both cyclically and acyclically via PROFIBUS DPV1 • Easy engineering thanks to integration in SIMATIC STEP 7 and/or simple integration via GSD file for other programming systems • Optimum use of process image of a control system for selection of individual measured quantities for cyclical transfer • Supports all baud rates from 9.6 kbit/s up to 12 Mbit/s • Connection through 9-pole Sub-D connector according to IEC 61158 • No external auxiliary power necessary • Additional display via the device display and via LEDs on the module	--	--	--	✓	✓	--	--	✓
	**7KM PAC RS 485 expansion module** The 7KM PAC RS 485 expansion module has the following features: • Plug-in 7KM PAC RS 485 communication module for 7KM PAC3200 and 7KM PAC4200 measuring devices and 3VA molded case circuit breakers • Parameterizable via device front or using parameterization software • Support for the Modbus RTU protocol • Plug and play • Supports transmission rates of 4.8/9.6/19.2 and 38.4 kbit/s • Connection by means of 6-pole screw terminals • No external auxiliary power necessary • Status indication by LED on the module • The 7KM PAC RS 485 expansion module is required for the gateway function of the 7KM PAC4200 for communication with simple devices with RS 485 interface, such as the 7KM PAC3100, via Ethernet (Modbus TCP).	--	--	--	✓	✓	--	--	✓
	**7KM PAC 4DI/2DO expansion module** The 7KM PAC 4DI/2DO expansion module is used to expand the 7KM PAC4200 measuring device to up to 10 digital inputs and 6 digital outputs and offers the following features: • Up to two 7KM PAC 4DI/2DO modules can be plugged onto a 7KM PAC4200. • The 7KM PAC 4DI/2DO expansion modules mean that the internal digital inputs and outputs can be expanded by up to 8 inputs and 4 outputs. • The 7KM PAC 4DI/2DO expansion modules can be configured locally at the front of the device or via the powerconfig parameterization software. • The digital inputs can be used without the need for an external power supply as they are self-powered. This is particularly useful for the integration of non-electric measuring devices, such as water or compressed-air counters • All functions of the integrated multifunctional inputs/outputs on the 7KM PAC4200 are also available in the 7KM PAC 4DI/2DO expansion module • Inputs and outputs can be used as an S0 interface conforming to IEC 62053-31 • The connection is made via a 9-pole screw terminal • No external auxiliary power supply is required	--	--	--	--	✓	--	--	--
	**7KM PAC I(N), I(Diff), analog expansion module** NEW The 7KM PAC I(N), I(Diff), analog expansion module adds the following features for 7KM PAC4200 and 7KM PAC3200 devices: • N-conductor measurement (IN), Class 1, in accordance with IEC 61557-12 via x/5A current transformers • Two analog inputs: The analog inputs can be used without an external voltage source via imposed direct currents from 0/4 to 20mA. This is especially advantageous for measuring non-electrical quantities such as temperature, water or air pressure. • Residual current measurement: One of the two analog inputs can be used for residual current measurement via Type A or Type B summation current transformers. • The 7KM PAC I(N), I(Diff), analog expansion module can be configured locally at the front of the device or via the powerconfig parameterization software. • The connection is made via a 6-pole screw terminal • One 7KM PAC I(N), I(Diff), analog module can be plugged onto a 7KM PAC4200 or 7KM PAC3200. • No external auxiliary power supply is required	--	--	--	✓	✓	--	--	--

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7KM PAC expansion modules

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
 7KM9300-0AE01-0AA0	**7KM PAC Switched Ethernet PROFINET expansion module** Expansion module for 7KM PAC3200 and 7KM PAC4200 (PROFIenergy) and COM100/800 (3VA) breaker data server		**7KM9300-0AE01-0AA0**	1	1 unit	1DD
 7KM9300-0AB01-0AA0	**7KM PAC PROFIBUS DP expansion module** Expansion module for 7KM PAC3200 and 7KM PAC4200 (PROFIBUS DPV1) and COM100/800 (3VA) breaker data server		**7KM9300-0AB01-0AA0**	1	1 unit	1DD
 7KM9300-0AM00-0AA0	**7KM PAC RS 485 expansion module** Expansion module for 7KM PAC3200 and 7KM PAC4200 (Modbus RTU) and COM100/800 (3VA) breaker data server		**7KM9300-0AM00-0AA0**	1	1 unit	1DD
 7KM9200-0AB00-0AA0	**7KM PAC 4DI/2DO expansion module** Expansion module for 7KM PAC4200		**7KM9200-0AB00-0AA0**	1	1 unit	1DD
 7KM9200-0AD00-0AA0	**7KM PAC I(N), I(Diff), analog expansion module** NEW Expansion module for 7KM PAC3200 and 7KM PAC4200 to add the following functions to the measuring inputs: • N-conductor measurement • Two analog inputs, also for measuring non-electrical quantities such as temperature, water or air pressure • Residual current measurement via Type A or Type B summation current transformers, see chapter "Monitoring Devices"		**7KM9200-0AD00-0AA0**	1	1 unit	1DD

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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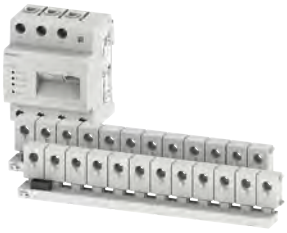
Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
7KT PAC measuring devices							
	**7KT PAC1200 multichannel current measuring system** 7KT12	12/30	Measurement of individual feeders – thus direct comparison of consumers Detection of current peaks – thus avoidance of high energy costs Web server and app representation – thus plug-and-play visualization of measured values and consumption values		✓	✓	✓
	**7KT PAC1500 three-phase measuring device** 7KT154	12/35	Measurement of consumption data in three-phase systems of plant sections, offices or holiday apartments.	EN 50470-1, EN 50470-3 EN 62052-23, EN 62053-31	✓	✓	✓
	**7KT PAC1500 single-phase measuring device** 7KT153	12/37	For measurement of consumption data in single-phase systems, e.g. in industrial plants, offices and apartments in apartment blocks.	EN 50740-1, EN 50470-3, EN 62053-31	✓	✓	✓
	**7KT PAC expansion modules** 7KT19	12/38	Communication interfaces with IrDA infra-red interface for 7KT PAC1500 measuring devices. Modules are available for the following bus systems: • M-Bus • Modbus RTU • KNX/EIB	EN 13321-1, EN 13757 ISO/IEC 14543-3 EN 50090	✓	✓	✓

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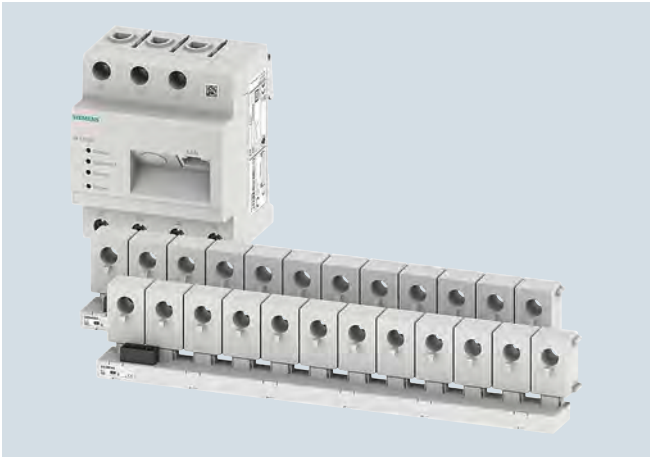
7KT PAC1200 multichannel current measuring system

Overview



7KT PAC1200 multichannel current measuring system

The 7KT PAC1200 multichannel current measuring system is used for the transparent representation of energy consumption. The current values themselves are measured by means of sensors that are fitted above the miniature circuit breakers. The simple cost center allocation enables maximum transparency over the entire application.

Scalability

The 7KT PAC1200 multichannel current measuring system monitors and displays the energy consumption of up to 96 outgoing feeders. A maximum of eight sensor bars can be configured. Up to eight different, selectable consumption sources can be compared with each other. The system can be scaled to individual needs and application scenarios. The individual sensors can be named individually and compared with each other. The system can be configured flexibly as the number of sensor bars can be varied.

Consumption statistics

The statistics shows the overall consumption of selected sensors. The consumption can be shown both in euros and in kWh. The results can be displayed in the form of a pie chart or a bar chart, depending on selection. The periods that can be selected are as follows:

- Days
- Weeks
- Months
- Year

Both the overall consumption and the individual consumption of a sensor can be displayed.
It is also possible to generate a history so that any deviations can be investigated. To do this, select a date using the button below the chart.

Representation of the current values

Under the navigation item "Current values" you can see how high the consumption at a particular moment in time is. The value behind "Current" indicates this consumption. "Min/Max" indicates the minimum and maximum consumption. The kW values consumed at a certain time are shown in a curve diagram. Here also, either the overall consumption or the consumption of an individual sensor can be displayed. It is also possible to switch between various modes in this view.

- History
- Current values: for individual sensors
  - Current
  - Voltage
  - Power factor of the individual phases
- Counter reading

Installation in an ALPHA power distribution board, for example



7KT PAC1200 multichannel current measuring system installed

Benefits

- Measurement of individual feeders – thus direct comparison of consumers
- Detection of current peaks – thus avoidance of high energy costs
- Web server and app representation – thus plug-and-play visualization of measured values and consumption values
- Scalability – thus number of measuring points can be adjusted to size of the power distribution system
- 1 GB internal memory – thus long-time data recording over one year possible

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Application

Use cases

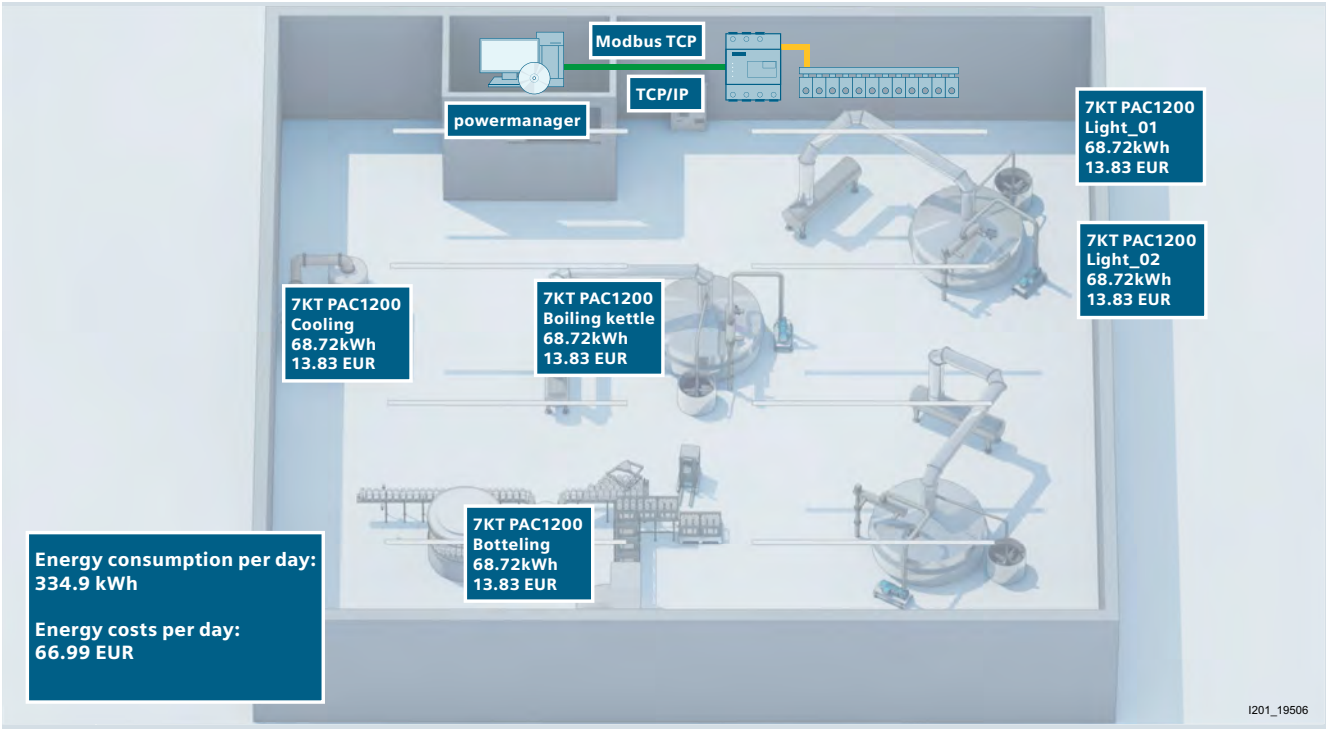
Energy measurement on

- Strip lighting
- Production machines
- Motors

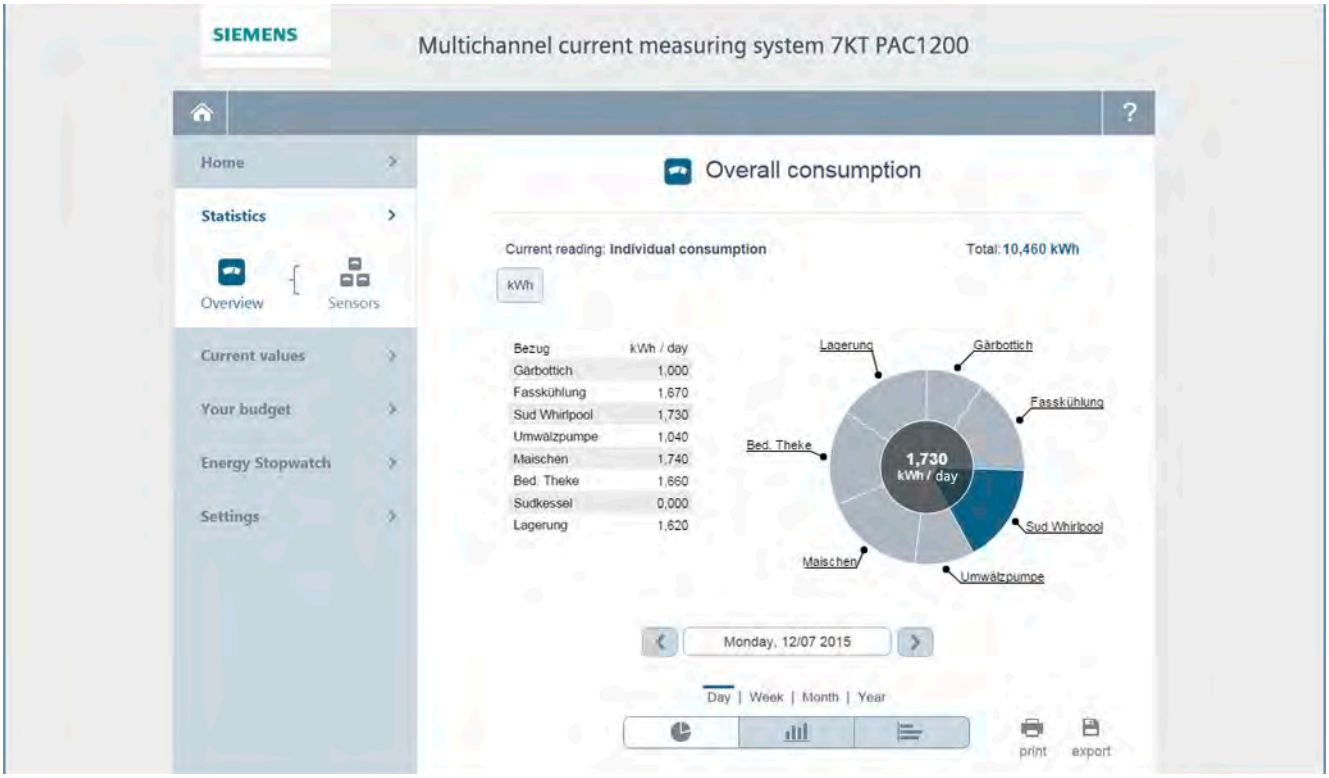
Application areas

- Carpenters' and joiners' workshops, locksmiths' shops
- Large bakeries, breweries, slaughterhouses
- Municipal utilities
- Banks, etc.

Application example



Result: For example, display of overall energy consumption (from application example above)



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7KT PAC1200 multichannel current measuring system

Technical specifications

7KT PAC 1200 multichannel current measuring system		7KT1222 1 x 18 bundle	7KT1223 1 x 24 bundle	7KT1260 Data manager	7KT123./4. Sensor bar	7KT125. Sensor
Product designation		Starter kit	Starter kit	Data manager	Sensor bar	Sensor
Version		2x9 with system, 40 A	2x12 with system, 40 A		3/6/9/12-bar	40 A / 63 A
Measuring input						
• Connection type		--	--	Direct / transformer 5 A	--	--
• Current I_e	A	--	--	63	--	40 / 63
Measuring accuracy		Total accuracy +/- 2% (of full-scale value / class 2)				
Measurable line frequency	Hz	50/60 +/- 5%	50/60 +/- 5%	50/60 +/- 5%	--	--
Communication						
• Sensor bar connection to data manager		RS 485				--
• Data manager connection to web browser		Ethernet via RJ 45, Modbus TCP protocol (10 / 100 Mbit/s)			--	--
Dimensions and weights						
• Height	mm			85	3-bar: 54.5 6-bar: 105.5 9-bar: 159.5 12-bar: 212.4	32
• Width	mm			70	21	17.7
• Data manager width	MW[1)]	4	4	4	--	--
• Depth	mm			32.7	14.8	13

[1)] 1 MW = 1 modular width = 18 mm

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Selection and ordering data

		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	**7KT PAC1200 multichannel current measuring system** Multichannel current measuring system for locating high consumption values and cost center allocation 1 x 18 bundle, containing: • 2 x 9-sensor bar 7KT1238 • 1 x data manager 7KT1260 • 18 x sensors 40 A, 7KT1254		**7KT1222**		1	1 unit	1BK
	**7KT PAC1200 multichannel current measuring system** Multichannel current measuring system for locating high consumption values and cost center allocation 1 x 24 bundle, containing: • 2 x 12-sensor bar 7KT1242 • 1 x data manager 7KT1260 • 24 x sensors 40 A, 7KT1254		**7KT1223**		1	1 unit	1BK
	**7KT PAC1200 data manager** Fully integrated smart meter, containing • Three-phase active power and reactive power energy measurement • Measurement of energy as balancing counter • Direct connection up to 63 A • Optional use with external measuring transformer for extending the measuring range (e.g. 100 ... 600 A) • Standard rail mounting (4 MW) • Operator input / configuration: Web interface • Support of up to 96 sensors for single-phase measurement		**7KT1260**		1	1 unit	1BK
	7KT PAC1200 sensor bars						
	• 3-sensor bar		**7KT1233**		1	1 unit	1BK
	• 6-sensor bar		**7KT1236**		1	1 unit	1BK
	• 9-sensor bar		**7KT1238**		1	1 unit	1BK
	• 12-sensor bar		**7KT1242**		1	1 unit	1BK
	Sensors						
	• Sensor 40 A		**7KT1254**		1	3 units	1BK
	• Sensor 63 A		**7KT1255**		1	3 units	1BK

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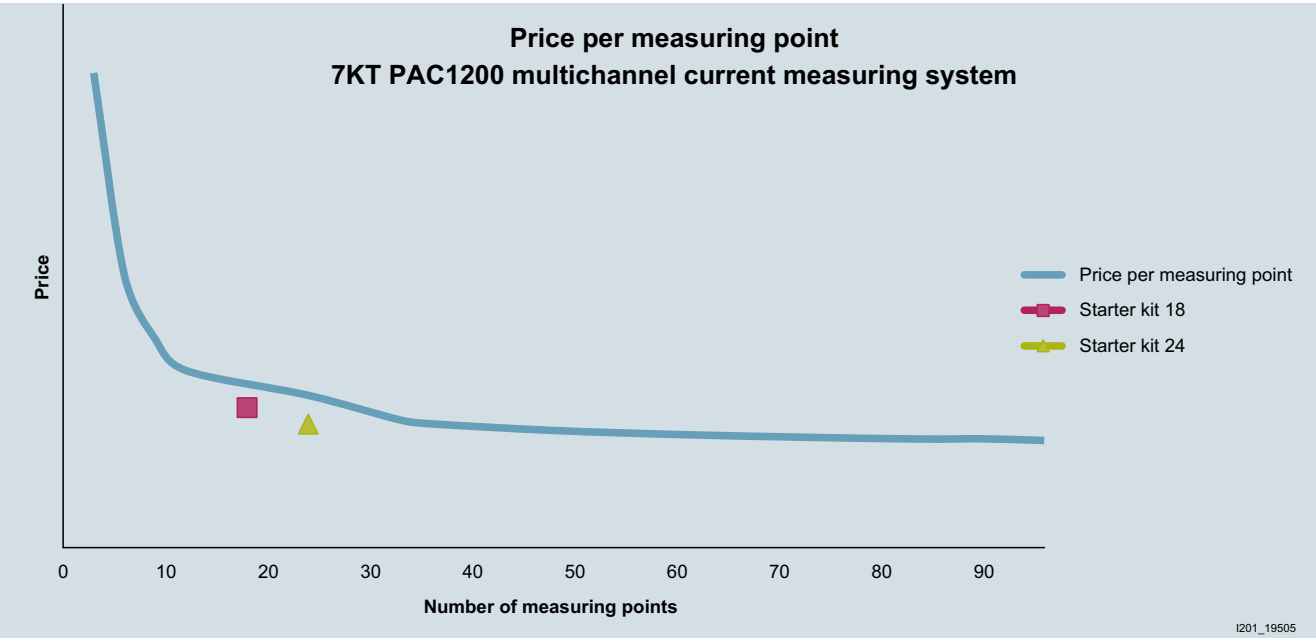
More information

Procurement costs: The more measuring points (sensors) the lower the costs



Internet

You can find more information on the internet at www.siemens.com/powermonitoring.

Apple iOS

Download on the App Store

7KT PAC1200 App iOS

Android

GET IT ON Google Play

7KT PAC1200 App ANDROID

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



7KT PAC1500 three-phase measuring devices for direct connection up to 80 A / 125 A

The measuring devices (power meters) are used to record the amount of electrical energy and power exported and imported. Siemens compact measuring devices are designed as modular devices for alternating current and can be mounted on standard mounting rails. They comply with the metering equipment standard EN 50470 (Parts 1 and 3) and come with an LCD.

The three-phase measuring devices for direct connection are available up to 125 A and in versions with transformer connections (…/5 A to 10000/5 A).

The measuring devices store active and reactive energy and all comply with accuracy class 1 (for active energy).

All measuring devices have a pulse output (S0) and are designed for 2-tariff measurements.

The measuring devices also have an integrated optical interface (IrDA) for connecting communication modules, which enables their integration in a range of other systems, such as power management systems.

Technical specifications

7KT PAC1500 three-phase measuring device			**7KT1540 7KT1542**	**7KT1543 7KT1545**	**7KT1546 7KT1548**
Standards			EN 50470-1, EN 50470-3, EN 62053-23, EN 62053-31		
Connection					
• Direct connection			--	80 A	125 A
• Transformer current connection			.../5 A	--	--
General data					
• Enclosure	Acc. to DIN 43880	MW (1 MW = 18 mm)	4	4	6
• Mounting	Acc. to EN 60715		35 mm		
• Mounting height		mm	70		
Function					
• Connection	Single-phase or three-phase	Number of conductors	4	2 ... 4	2 ... 4
• Storage of setting and counter reading	Via (EEPROM)		Yes	Yes	Yes
• Tariffs	For active and reactive energy		T1/T2	T1/T2	T1/T2
Supply (via measuring terminals)					
• Rated control supply voltage U_n		V AC	230		
• Voltage range		V	110... 276		
• Rated frequency f_n		Hz	50		
Measuring accuracy (at 23 ±1 °C)	Based on nominal value				
• Active energy and active power	Acc. to EN 50470-3		Class B		
• Reactive energy and reactive power	Acc. to EN 62053-23		Class 2		
Measuring input					
• Connection type			Transformer TA-TC .../5 A	Direct	Direct
• Terminal capacity	Rigid, min. (max.) Flexible min. (max.)	mm^2 mm^2	1.5 (6) 1.5 (6)	1.5 (35) 1.5 (35)	5 (50) 5 (50)
• Voltage U_n	Phase/phase Phase/N	V V	400 230		
• Operating range voltage	Phase/phase Phase/N	V V	190 ... 480 110 ... 276		
• Current I_{ref}		A	--	5	5
• Current I_n		A	5	--	--
• Current I_{min}		A	0.05	0.25	0.25
• Current operating range (I_{st} … I_{max})	Direct connection Transformer connection	A A	-- 0.003 ... 6	0.015 ... 80 --	0.020 ... 125 --
• Transformer current	Primary current of the transformer Smallest input step	A A	5 ... 10000 5	-- --	-- --
• Input ripple form			Sinusoidal		
• Operational starting current I_{st}		mA	3	15	20
S0 interface	Acc. to EN 62053-31				
• Pulse outputs for absorbed active and reactive energy T1 + T2			Yes		
• Pulse count	For input current I_{max} Automatic for transformers	Pulses/kWh Pulses/kWh	-- 100 - 10 - 1	500 --	500 --
IR interface					
• At the side for connecting communication modules			M-Bus/Modbus RTU/KNX		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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7KT PAC1500 three-phase measuring devices

Selection and ordering data

		U_n	I_{max}	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	MW	d					
	**7KT PAC1500 three-phase measuring device**									
	Digital measuring device									
	• For transformer connection, double tariff	230	Transformer /5	4		**7KT1540**		1	1 unit	1DD
	• For transformer connection, double tariff, MID	230	Transformer /5	4		**7KT1542**		1	1 unit	1DD
	• For direct connection, double tariff	230	80	4		**7KT1543**		1	1 unit	1DD
	• For direct connection, double tariff, MID	230	80	4		**7KT1545**		1	1 unit	1DD
	• For direct connection, double tariff	230	125	6		**7KT1546**		1	1 unit	1DD
	• For direct connection, double tariff, MID	230	125	6		**7KT1548**		1	1 unit	1DD

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



The 7KT PAC1500 single-phase measuring devices (power meters) are used to record the amount of electrical energy and power exported and imported. They comply with the metering equipment standard EN 50470 (Parts 1 and 3) and come with an LCD.

The 7KT PAC1500 single-phase measuring devices for direct connection are available up to 80 A. They store active and reactive energy, and all comply with accuracy class 1 (for active energy).

All measuring devices have a pulse output (S0) and are designed for 1-tariff or 2-tariff measurements, depending on the version.

The measuring devices (with the exception of 7KT1530) also have an integrated optical interface (IrDA) for connecting communication modules.

Technical specifications

7KT PAC1500 measuring device, single-phase direct connection up to 80 A			**7KT1530**	**7KT1531 7KT1533**
Standards			EN 50470-1, EN 50470-3, EN 62053-23, EN 62053-31	
General data				
• Enclosure	Acc. to DIN 43880	MW	2	
• Mounting	Acc. to EN 60715		35 mm	
• Mounting height		mm	70	
Function				
• Operating mode	Single-phase loads	Conductors	2	
• Storage of setting and counter reading	Via (EEPROM)		Yes	
• Tariff	For active energy For reactive energy		T1 T1	T1 + T2 T1 + T2
Supply (via measuring terminals)				
• Rated control supply voltage U_n		V AC	230	
• Voltage range		V	110 ... 276	
• Rated frequency f_n		Hz	50	
Measuring accuracy (at 23 ±1 °C)	Based on nominal value			
• Active energy and active power	Acc. to EN 50470-3		Class B	
• Reactive energy and reactive power	Acc. to EN 62053-23		Class 2	
Measuring input				
• Connection type	Phase/N		Direct	
• Terminal capacity	Rigid, min. (max.) Flexible min. (max.)	mm^2 mm^2	1.5 (35) 1.5 (35)	1.5 (35) 1.5 (35)
• Operating range voltage	Phase/N	V AC	110... 276	
• Current I_{ref}		A	5	
• Current I_{min}		A	0.25	
• Current operating range (I_{st} ... I_{max})	Direct connection	A	0.015 ... 80	
• Current waveform			Sinusoidal	
• Operational starting current I_{st}		mA	15	
S0 interface	Acc. to EN 62053-31			
• Pulse outputs for absorbed active and reactive energy			Yes	
• Pulse count		Pulses/kWh	1000	
IR interface				
• At the side for connecting communication modules (M-Bus/Modbus RTU/KNX)			--	Yes

Selection and ordering data

		U_n	I_{max}	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	MW	d					
	**7KT PAC1500 single-phase measuring devices** Digital measuring device									
	• For direct connection, single tariff	230	80	2		**7KT1530**		1	1 unit	1DD
	• For direct connection, double tariff	230	80	2		**7KT1531**		1	1 unit	1DD
	• For direct connection, double tariff, MID	230	80	2		**7KT1533**		1	1 unit	1DD

Minimum order quantity (PS) or a multiple thereof can be ordered.

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7KT PAC expansion modules

Overview



Expansion modules for 7KT PAC1500 measuring devices, from left to right: Expansion modules for M-Bus, Modbus RTU, Instabus KNX

Expansion modules are used as communication interfaces for 7KT PAC1500 measuring devices. They have the following features:

- The expansion modules can be selected independently of the measuring device. This means they can also be retrofitted in already installed measuring devices.
- Data transmission between the measuring devices and expansion modules is executed via the IrDA infrared interface.
- The expansion modules are placed alongside the measuring devices in the installation direction so that their IrDA interfaces are exactly opposite each other.

7KT PAC M-Bus expansion module (7KT1908)

- Power supply through bus cable
- Baud rates: 300 to 9600 kbit/s
- Status indication by LED on the module
- Can be parameterized using M-Bus master software

7KT PAC Modbus RTU expansion module (7KT1907)

- Power supply: 230 V AC
- Baud rates: 4.8/9.6/19.2 and 38.4 kbit/s
- Status indication by LED on the module
- Configurable via RS 485 master software

7KT PAC 7KNX expansion module (7KT1900)

- Power supply through the KNX/EIB bus cable
- Status indication by LED on the module

Selection and ordering data

	Version	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		MW	d					
 7KT1908	**7KT PAC M-Bus expansion module** For connecting 7KT PAC1500 measuring devices to M-Bus	1		**7KT1908**		1	1 unit	1DD
 7KT1907	**7KT PAC Modbus RTU expansion module** For connecting 7KT PAC1500 measuring devices to Modbus RTU	1		**7KT1907**		1	1 unit	1DD
 7KT1900	**7KT PAC KNX expansion module** For connecting 7KT PAC1500 measuring devices to Instabus KNX	1		**7KT1900**		1	1 unit	1DD

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



Digital measuring devices: 7KT1 voltmeter (left), 7KT1 ammeter (right)

These devices for measuring voltages and currents can be used for monitoring incoming and outgoing currents or device currents in electric plants.

They are suitable for direct connection in a single-phase system or with measuring transducers in three-phase systems.

The measuring ranges of the ammeter are set locally at the device using a coding switch.

Benefits

- The ammeters have 14 measuring ranges from 0 A to 20 A and 0 A to 999 A, which can be set using a coding switch. This ensures universal application.

Technical specifications

			7KT1110	7KT1120
Standards			DIN 43751-1, -2	
Rated voltage U_e		V AC	230	
Primary operating range	x U_e		0.9 ... 1.15	
Rated frequency		Hz	50/60	
Rated operational power P_S		VA	<2	
7+1-segment display			3 digits	
Measuring range				
• Voltage	Direct measurement	V AC	12 ... 600 (U_n)	--
• Current	Direct measurement	A AC	--	0.4 ... 20 (I_n)
	Transformer measurement	A AC	--	x/5 A
Lower display value	From the full-scale value	%	2	
Measuring shunt				
• Current	Direct measurement 20 A	mΩ	--	5
	Transformer measurement	mΩ	--	10
• Voltage	Direct measurement 600 V	MΩ	1	--
Measuring frequency		Hz	45 65	
Measurement cycle		/s	4	
Measuring accuracy	At 23 °C ±1 °C	%	±0.5 ±1 digit	
Temperature influence		%/°C	±0.03	
Overload capability				
• Voltage	Continuous	V	1.2 x U_n	--
	Short-time for 1 s	V	1.3 x U_n	--
• Current	Continuous, direct	A	--	1.1 x I_n
	Short-time for 1 s, direct	A	--	10 x I_n
Terminals	±screw (Pozidriv)		1	
Conductor cross-sections	Rigid, max.	mm^2	1 × 6/2 × 4	
	Flexible, with end sleeve, min.	mm^2	0.75	
Degree of protection			IP20, with connected conductors	
Permissible ambient temperature			IP20, with connected conductors	
• Operation		°C	-10 ... +55	
• Storage		°C	-40 ... +70	

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Digital voltmeters and ammeters

Selection and ordering data

	Version	U_e	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	MW	d					
	**Digital voltmeter** Measuring range 12 ... 600 V AC	230	2		**7KT1110**		1	1 unit	1BK
	**Digital ammeter for direct and transformer connection** Measuring range Direct: 0.4 ... 20 A Transformer: 0.1 ... 1000 A/5	230	2		**7KT1120**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



Time counters: Electromechanical (left), electronic (right)

Time and pulse counters are used for the reliable monitoring of production and service times, which enables the exact planning and monitoring of production sequences, maintenance cycles and warranty times.
As well as the proven electromechanical time and pulse counters for mounting in distribution boards, we also supply digital time and pulse counters.
The fields of application for both counter types are very diverse, such as the recording of operating hours of machines, systems or building management systems, as well as pulse counting for general volume flow counting, registration of starting frequencies, starting cycles or production quantities in systems and machines.

Benefits

- Time and pulse counters help to plan maintenance intervals, which safeguard and ensure high plant availability
- Versions without zero position and with electric or manual zero position for all applications
- Flexible application of the digital counters for power supplies of 12 V to 150 V DC and 24 V to 240 V AC in a single device

Technical specifications

			7KT5801	7KT5802	7KT5803	7KT5804	7KT5806	7KT5807
Standards **Approvals**			DIN VDE 0435-110; EN 60255-6; UL 863 UL 863, UL File No. E300537, CSA C22.2 No. 6 and 55					
Rated control supply voltage U_c		V AC V DC	-- 12 ... 24	24 --	115	230	115	230
Primary operating range	At 50/60 Hz	× U_c	0.9 ... 1.1					
Rated frequency		Hz	--	50			60	
Rated power loss P_v		VA	< 1		< 2			
Method of operation	Counting of		Hours					
Display	Drum-type register	h	00000.00					
Terminals	±screw (Phillips)		1					
Conductor cross-sections	Rigid Flexible, with end sleeve, min.	mm^2 mm^2	1.5 0.75					
Permissible ambient temperature		°C	-10 ... +70					
Degree of protection	Acc. to EN 60529		IP20, with connected conductors					
Safety class	Acc. to EN 61140/VDE 0140-1		II					
Permissible humidity		%	< 80					

			7KT5811	7KT5812	7KT5814	7KT5821	7KT5822	7KT5823	7KT5833
Standards **Approvals**			DIN VDE 0435-110; EN 60255-6; UL 863 UL 863, UL File No. E300537, CSA C22.2 No. 6 and 55						
Rated control supply voltage U_c		V AC V DC	-- 12 ... 24	24 --	230 --	24 ... 240 12 ... 150			
Primary operating range	At 50/60 Hz	× U_c	0.9 ... 1.1						
Rated frequency		Hz	--	50/60					
Rated power dissipation P_v		VA	< 1		< 2	< 1			
Method of operation	Counting of		Pulses			Hours			Pulses
Display	Drum-type register		0000000			--			--
	LCD	h	--			000000.0			--
			--			--			0000000
Counting frequency		Hz	10			--			10
Pulse duration		ms	50			--			50
Resetting	Electrical Mechanical		-- --				Yes	Yes	
Terminals	±screw (Phillips)		1						
Conductor cross-sections	Rigid Flexible, with end sleeve, min.	mm^2 mm^2	1.5 0.75						
Permissible ambient temperature		°C	-10 ... +70						
Degree of protection	Acc. to EN 60529		IP20, with connected conductors						
Safety class	Acc. to EN 61140/VDE 0140-1		II						
Permissible humidity		%	< 80						

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Time and pulse counters for standard rail mounting

Selection and ordering data

		U_c	Frequency	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V	Hz	MW	d					
	**Time counter**									
	Mechanical counting mechanism, display 00000.00 h without resetting									
		12 ... 24 DC	--	2		**7KT5801**		1	1 unit	1BK
		24 AC	50			**7KT5802**		1	1 unit	1BK
		115 AC				**7KT5803**		1	1 unit	1BK
		230 AC				**7KT5804**		1	1 unit	1BK
		115 AC	60			**7KT5806**		1	1 unit	1BK
		230 AC				**7KT5807**		1	1 unit	1BK
	Pulse counter									
	Mechanical counting mechanism, display 0000000 ⎍ without resetting									
		12 ... 24 DC	--	2		**7KT5811**		1	1 unit	1BK
		24 AC	50/60			**7KT5812**		1	1 unit	1BK
		230 AC				**7KT5814**		1	1 unit	1BK
	**Electronic time counter**									
	LCD 000000.0h without resetting									
		12 ... 150 DC, 24 ... 240 AC	-- 50/60	2		**7KT5821**		1	1 unit	1BK
	With electrical resetting									
		12 ... 150 DC, 24 ... 240 AC	-- 50/60			**7KT5822**		1	1 unit	1BK
	With electrical and mechanical resetting									
		12 ... 150 DC, 24 ... 240 AC	-- 50/60			**7KT5823**		1	1 unit	1BK
	Electronic pulse counter									
	LCD 0000000 ⎍									
	With electrical and mechanical resetting									
		12 ... 150 DC, 24 ... 240 AC	-- 50/60	2		**7KT5833**		1	1 unit	1BK

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More information

Time counters count the time in hours with an accuracy of two decimal places (hundredths of hours). The pulse counter adds the number of pulses, e.g. the making operations of devices.

A power supply is required at terminals 1 and 2 of the electronic counters so that the device can constantly display the measured values. Once terminal 3 is supplied with voltage (for DC "+"), the counting procedure starts. If terminal 4 is supplied for a short time with voltage (for DC "+"), the counter is reset.

In the case of electronic counters, the counting result is saved indefinitely in the event of a power failure (EEPROM). On recovery of the power, the counting is continued from the saved value. As well as a modern design, the electronic counter has a 7-digit LCD, which can be reset electrically or manually.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



Time counters: Counting mechanism (left), counting mechanism with front frame (right)

Time and pulse counters for control cabinets, control systems and mechanical engineering are used, e.g. in boilers, machine tools or compressors. The pulse counters count the starting frequencies. This supports planning for preventative maintenance.

In-time and regular maintenance is the best protection against unexpected shutdowns.

Benefits

- Time and pulse counters help to plan maintenance intervals, which safeguard and ensure high plant availability

Technical specifications

			7KT5500	7KT5501	7KT5502	7KT5503	7KT5504	7KT5505
Standards			DIN VDE 0435-110; EN 60255-6					
Rated control supply voltage U_c		V AC V DC	-- 10 ... 80	115 --	230	115	230	24
Rated frequency		Hz	--	50		60		50
Front-panel mounting • Without masking frame 55 × 55 mm • With masking frame 55 × 55 mm	Switchboard cutout	mm × mm Ø mm	45.2 × 45.2$^{+0.3}$ 50.2$^{+0.3}$					

			7KT5600	7KT5601	7KT5602	7KT5603	7KT5604
Standards			DIN VDE 0435-110; EN 60255-6				
Rated control supply voltage U_c		V AC V DC	-- 10 ... 50	115 --	230	115	230
Rated frequency		Hz	--	50		60	
Front-panel mounting	Switchboard cutout	mm × mm	68$^{+0.5}$ × 68$^{+0.5}$				

Selection and ordering data

		U_c	Frequency	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V	Hz	MW	d					
	**Time counter** Mechanical counting mechanism, display 00000.00 h, For front-panel mounting, front frame 48 × 48 mm									
		10 ... 80 DC	–			**7KT5500**		1	1 unit	1BK
		24 AC 115 AC 230 AC	50			**7KT5505** **7KT5501** **7KT5502**		1 1 1	1 unit 1 unit 1 unit	1BK 1BK 1BK
		115 AC 230 AC	60			**7KT5503** **7KT5504**		1 1	1 unit 1 unit	1BK 1BK
	For front-panel mounting, front frame 72 × 72 mm, with narrow frame according to DIN 43700									
		10 ... 50 DC	–	2		**7KT5600**		1	1 unit	1BK
		115 AC 230 AC	50			**7KT5601** **7KT5602**		1 1	1 unit 1 unit	1BK 1BK
		115 AC 230 AC	60			**7KT5603** **7KT5604**		1 1	1 unit 1 unit	1BK 1BK
	Cover for 7KT55 time counters									
	55 × 55 mm					**7KT9020**		1	1 unit	1BK
	Sealing rings for 7KT9020 covers									
	IP43 installation in switchboards with smooth surfaces (1 set = 5 units)					**7KT9000**		1	1 set	1BK
	Terminal cover for 7KT56 time counters									
	Degree of protection, IP20, with connected conductors					**7KT9021**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Introduction

Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
Accessories							
	**4NC current transformers** NEW	12/45	Window-type/pin-wound current transformers	EN 61869-1 EN 61869-2 VDE 0414-9-2	✓	--	✓
	**7KT12 current transformers**	12/49	Straight-through transformers for installation in distribution boards and non-contact measuring of primary currents. Ideal for combination with switch disconnectors, measuring devices and counters.	IEC 60044-1, EN 60044-1 (VDE 0414 T 44-1)	✓	--	✓
	**7KT90 measuring selector switches**	12/50	For switching over the phases for voltmeters and ammeters		✓	--	✓

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



4NC current transformer

Technical specifications

4NC current transformers for measuring purposes

Standards	EN 61869-1, EN 61869-2, VDE 0414-9-2
Window-type current transformers	The conductor to be measured (busbar or cable) is passed through the window opening and constitutes the primary circuit of the window-type current transformer. Pin-wound transformers: An economical solution especially for small primary currents of 5 ... 75 A are window-type current transformers when the conductor to be measured is pin-wound several times.
Rated primary current I_{pr}	Current transformers can be continuously loaded with 1.3 times the rated primary current (I_{pn}).
Rated secondary current I_{sr}	
1 A	Particularly suitable for longer measuring leads. Cable losses of only 4% in contrast to 5 A current transformers.
5 A	5 A current transformers generate 25 times the power losses on measuring leads as compared with 1 A current transformers. These stray losses result in higher power in the case of long cables. Only recommended for use with short measuring leads.
Accuracy class	
Class 0.2S	Operation measurement, internal metering, current error ±0.2% at 1 x I_{pr} and 1.2 x I_{pr}
Class 0.5	Operation measurement, internal metering, current error ±0.5% at 1 x I_{pr} and 1.2 x I_{pr}
Class 1	Operation measurement, internal metering, current error ±1% at 1 x I_{pr} and 1.2 x I_{pr}
Rated power P_n	The rated power of transformers is specified in VA. The actual load rating should be similar to the rated power; a lower actual load rating (underburden) increases the overcurrent factor and measuring devices are not sufficiently protected in case of a short-circuit, a higher actual load rating (overburden) has a negative effect on the accuracy. With a frequency of 60 Hz the rated power increases by a factor of 1.2. With $16^2/_3$ Hz the output power decreases to $^1/_3$ of the rated power.
Maximum voltage for equipment U_m	This is the rms value of the maximum voltage between the conductors of a system. For this voltage the insulation must be rated at normal operating conditions. 4NC5 current transformers are suitable for 720 V.
Overcurrent limiting factor *FS*	The overcurrent limiting factor is expressed using the characters FS and a factor, e.g. FS5 or FS10. When a short-circuit current flows through the primary winding of a current transformer, the stress on the measuring devices connected to the current transformer is the lower the smaller the overcurrent limiting factor is.
Rated short-time thermal current I_{th}	The rated short-time thermal current I_{th} is the rms value of the primary current with a duration of one second, whose heat effect the current transformer can resist without being damaged in the event of a short-circuited secondary winding.
Rated impulse current I_{dyn}	The rated impulse current I_{dyn} is the highest instantaneous value of the current after a short-circuit whose force the current transformer can resist without being damaged. The rated impulse current is specified as peak value.

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4NC current transformers NEW

4NC51 window-type current transformers, used as pin-wound transformers, class 1 from 5 A to 150 A

Pin-winding increases the primary current of the current transformer. Consequently, window-type current transformers can also be used for low primary currents.



4NC51 used as pin-wound transformer

		Basic type -->	4NC5112	4NC5113	4NC5115	4NC5117	4NC5121
Rated primary current I_{pr} (without pin-winding)	A		50	60	75	100	150
Rated power P_n							
• For transformers with rated secondary current I_{sr} = 1 A	VA		2.5	2.5	2.5	2.5	2.5
• For transformers with rated secondary current I_{sr} = 5 A	VA		1.2	1.2	2.5	2.5	2.5
Primary current to be measured			Number of required pin windings				
		• I_{pr} = 5 A	10	--	--	--	--
		• I_{pr} = 10 A	5	6	--	10	--
		• I_{pr} = 15 A	--	4	5	--	10
		• I_{pr} = 20 A	--	3	--	5	--
		• I_{pr} = 25 A	2	--	3	4	6
		• I_{pr} = 30 A	--	2	--	--	5
		• I_{pr} = 40 A	--	--	--	--	--
		• I_{pr} = 50 A	--	--	--	2	3
		• I_{pr} = 75 A	--	--	--	--	2

Selection and ordering data

4NC current transformers for measuring purposes, rated secondary current I_{sr} = 5 A



	Accuracy class	Size	Rated primary current I_{pr}	Rated power P_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			A	VA	d					
	Class 0.2s	1	150	1.0		**4NC5121-2FA21**		1	1 unit	1CL
			200	2.5		**4NC5122-2FC21**		1	1 unit	1CL
			250	2.5		**4NC5123-2FC21**		1	1 unit	1CL
			300	5		**4NC5124-2FE21**		1	1 unit	1CL
			400	5		**4NC5125-2FE21**		1	1 unit	1CL
			500	5		**4NC5126-2FE21**		1	1 unit	1CL
		5	600	5		**4NC5227-2FE21**		1	1 unit	1CL
			700	5		**4NC5228-2FE21**		1	1 unit	1CL
			800	5		**4NC5231-2FE21**		1	1 unit	1CL
			1000	5		**4NC5232-2FE21**		1	1 unit	1CL

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Accuracy class	Size	Rated primary current I_{pr}	Rated power P_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			A	VA	d					
	**Class 0.5**	1	100	1		**4NC5117-2DA21**		1	1 unit	1CL
			150	2.5		**4NC5121-2DC21**		1	1 unit	1CL
			200	5		**4NC5122-2DE21**		1	1 unit	1CL
			250	5		**4NC5123-2DE21**		1	1 unit	1CL
		2	200	5		**4NC5222-2DE21**		1	1 unit	1CL
			250	5		**4NC5223-2DE21**		1	1 unit	1CL
			300	5		**4NC5224-2DE21**		1	1 unit	1CL
			400	5		**4NC5225-2DE21**		1	1 unit	1CL
		3	400	5		**4NC5325-2DE21**		1	1 unit	1CL
			500	5		**4NC5326-2DE21**		1	1 unit	1CL
			600	5		**4NC5327-2DE21**		1	1 unit	1CL
			750	5		**4NC5330-2DE21**		1	1 unit	1CL
			800	5		**4NC5331-2DE21**		1	1 unit	1CL
		4	800	10		**4NC5431-2DH21**		1	1 unit	1CL
			1000	10		**4NC5432-2DH21**		1	1 unit	1CL
			1200	10		**4NC5433-2DH21**		1	1 unit	1CL
			1500	10		**4NC5435-2DH21**		1	1 unit	1CL
			1600	15		**4NC5436-2DK21**		1	1 unit	1CL
			2000	20		**4NC5438-2DL21**		1	1 unit	1CL
			2500	25		**4NC5440-2DM21**		1	1 unit	1CL
			3000	30		**4NC5441-2DN21**		1	1 unit	1CL
	**Class 1.0**	1	50	1.2		**4NC5112-2CB21**		1	1 unit	1CL
			60	1.2		**4NC5113-2CB21**		1	1 unit	1CL
			75	2.5		**4NC5115-2CC21**		1	1 unit	1CL
			100	2.5		**4NC5117-2CC21**		1	1 unit	1CL
			150	2.5		**4NC5121-2CC21**		1	1 unit	1CL
			200	5		**4NC5122-2CE21**		1	1 unit	1CL
			250	5		**4NC5123-2CE21**		1	1 unit	1CL
		2	200	5		**4NC5222-2CE21**		1	1 unit	1CL
			250	5		**4NC5223-2CE21**		1	1 unit	1CL
			300	5		**4NC5224-2CE21**		1	1 unit	1CL
			400	5		**4NC5225-2CE21**		1	1 unit	1CL
		3	400	5		**4NC5325-2CE21**		1	1 unit	1CL
			500	5		**4NC5326-2CE21**		1	1 unit	1CL
			600	5		**4NC5327-2CE21**		1	1 unit	1CL
			750	5		**4NC5330-2CE21**		1	1 unit	1CL
		4	800	10		**4NC5431-2CH21**		1	1 unit	1CL
			1000	10		**4NC5432-2CH21**		1	1 unit	1CL
			1250	10		**4NC5434-2CH21**		1	1 unit	1CL
			1500	10		**4NC5435-2CH21**		1	1 unit	1CL
			2000	12.5		**4NC5438-2CJ21**		1	1 unit	1CL
			2500	12.5		**4NC5440-2CJ21**		1	1 unit	1CL
			3000	30		**4NC5441-2CN21**		1	1 unit	1CL

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4NC current transformers NEW

4NC current transformers for measuring purposes, rated secondary current I_{sr} = 1 A

	Accuracy class	Size	Rated primary current I_{pr}	Rated power P_n	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			A	VA	d					
	**Class 0.5**	1	100	1		**4NC5117-0DA21**		1	1 unit	1CL
			150	2.5		**4NC5121-0DC21**		1	1 unit	1CL
			200	5		**4NC5122-0DE21**		1	1 unit	1CL
			250	5		**4NC5123-0DE21**		1	1 unit	1CL
		2	200	5		**4NC5222-0DE21**		1	1 unit	1CL
			250	5		**4NC5223-0DE21**		1	1 unit	1CL
			300	5		**4NC5224-0DE21**		1	1 unit	1CL
			400	5		**4NC5225-0DE21**		1	1 unit	1CL
		3	400	5		**4NC5325-0DE21**		1	1 unit	1CL
			500	5		**4NC5326-0DE21**		1	1 unit	1CL
			600	5		**4NC5327-0DE21**		1	1 unit	1CL
			750	5		**4NC5330-0DE21**		1	1 unit	1CL
		4	800	10		**4NC5431-0DH21**		1	1 unit	1CL
			1000	10		**4NC5432-0DH21**		1	1 unit	1CL
			1200	10		**4NC5433-0DH21**		1	1 unit	1CL
			1500	10		**4NC5435-0DH21**		1	1 unit	1CL
	**Class 1.0**	1	50	1.2		**4NC5112-0CB21**		1	1 unit	1CL
			60	1.2		**4NC5113-0CB21**		1	1 unit	1CL
			75	2.5		**4NC5115-0CC21**		1	1 unit	1CL
			100	2.5		**4NC5117-0CC21**		1	1 unit	1CL
			150	2.5		**4NC5121-0CC21**		1	1 unit	1CL
			200	5		**4NC5122-0CE21**		1	1 unit	1CL
			250	5		**4NC5123-0CE21**		1	1 unit	1CL
		2	200	5		**4NC5222-0CE21**		1	1 unit	1CL
			250	5		**4NC5223-0CE21**		1	1 unit	1CL
			300	5		**4NC5224-0CE21**		1	1 unit	1CL
			400	5		**4NC5225-0CE21**		1	1 unit	1CL
		3	400	5		**4NC5325-0CE21**		1	1 unit	1CL
			500	5		**4NC5326-0CE21**		1	1 unit	1CL
			600	5		**4NC5327-0CE21**		1	1 unit	1CL
			750	5		**4NC5330-0CE21**		1	1 unit	1CL
		4	800	10		**4NC5431-0CH21**		1	1 unit	1CL
			1000	10		**4NC5432-0CH21**		1	1 unit	1CL
			1250	10		**4NC5434-0CH21**		1	1 unit	1CL
			1500	10		**4NC5435-0CH21**		1	1 unit	1CL
			2000	12.5		**4NC5438-0CJ21**		1	1 unit	1CL
			2500	12.5		**4NC5440-0CJ21**		1	1 unit	1CL

Accessories

	For transformer size	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Standard rail mounting							
	1, 5		**4NC5923-5LT21**		1	1 unit	1CL
	2		**4NC5925-5LT21**		1	1 unit	1CL
	3		**4NC5930-5LT21**		1	1 unit	1CL
	4		**4NC5940-5LT21**		1	1 unit	1CL

More information

Other current transformers for measuring purposes,
see chapter "Switch Disconnectors"
and summation current transformers,
see chapter "Monitoring Devices"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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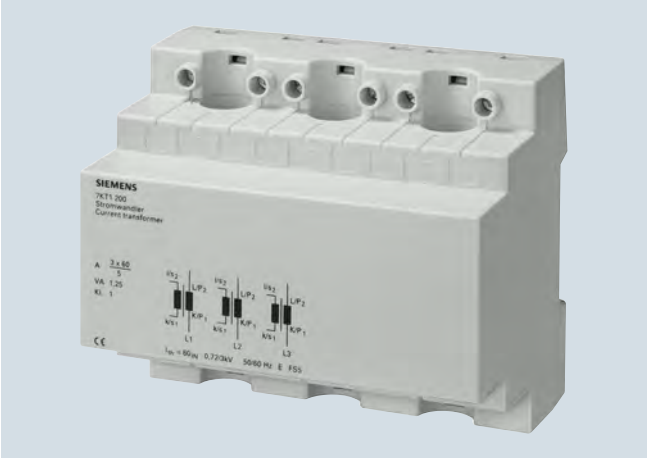
Overview



7KT12 current transformer

The three-phase 7KT12 current transformer can be used in distribution boards according to DIN 43880. The measuring leads are routed vertically through to the standard mounting rail.

This type of current transformer is suitable for infeeds or outgoing lines in connection with the installation of a 5TE8 switch or a 5TE1 disconnector, as the primary connecting leads do not have to be interrupted.

The current transformer is designed for cables of up to 13 mm in diameter, e.g. H07V-R with 50 mm^2 conductor cross-section.

Benefits

- The current transformer has accuracy class 1 in accordance with EN 60044-1.
- The versions designed for a transformer ratio of 60/5 A, 100/5 A and 150/5 A enable an even broader range of applications.

Technical specifications

			7KT1200	7KT1201	7KT1202
Standards			DIN EN 60044-1		
Secondary rated current strength		A	5		
Accuracy class		Cl.	1		
Rated power		VA	1.25	2.5	3.75
Rated frequency f_n		Hz	50/60		
Thermal current limit I_{th}	Short-time	A	60 × I_e		
Thermal continuous current		A	1 × I_e		
Overcurrent limit factor		FS	5		
Rated impulse withstand voltage U_{imp}		kV	> 3		
Creepage distances and clearances		mm	> 3		
Rated operational voltage U_e		V AC	720		
Rated operational current I_e		A AC	3 × 60	3 × 100	3 × 150
Terminals ±screw (Pozidriv)			PZ 1		
Conductor cross-sections					
- Rigid		mm^2	0.5 ... 4		
- Flexible, with end sleeve		mm^2	0.5 ... 2.5		
Permissible ambient temperature		°C	-5 ... +60		
Resistance to climate	Acc. to EN 60068-1		20/60/4		

Selection and ordering data

		U_e	I_e	I_{sek}	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	A AC	MW	d					
	**Current transformer**										
		720	3 × 60	5	6		**7KT1200**		1	1 unit	1BK
			3 × 100				**7KT1201**		1	1 unit	1BK
			3 × 150				**7KT1202**		1	1 unit	1BK

More information

Other current transformers for measuring purposes,
see chapter "Switch Disconnectors"
and summation current transformers,
see chapter "Monitoring Devices"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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7KT90 measuring selector switches

Overview



Measuring selector switch (voltmeter selector switch)

Measuring selector switches are used as CO contacts of the phases for voltages and currents in three-phase systems for voltmeters and ammeters.

The design of these switches is adapted to match the modular installation devices. They support use in compliance with EN 60947-3.

Benefits

The devices have a rated insulation voltage of 660 V. This permits use in many systems.

Selection and ordering data

		U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS*/ P. unit	PG
		V AC	A AC	V AC	MW	d					
	**Voltmeter selector switch**	400	12	6	3		**7KT9010**		1	1 unit	1BK
	**Ammeter selector switch for operation with current transformer**	400	12	6	3		**7KT9011**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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13/2 **Introduction**

Monitoring devices for electrical values
5SV8 residual current monitors and modular residual current devices
13/5 - General data
13/6 - Type A
13/11 - Type B NEW
13/15 5TT3 voltage relays
13/18 5TT3 voltage and frequency relays
13/20 5TT6 current relays
13/22 5TT3 fuse monitors
13/23 5TT3 phase and phase sequence monitors
13/24 5TT3 insulation monitors for industrial applications

Monitoring devices for plants and equipment
13/25 5TT3 fault signaling units
13/26 5TT5 EMERGENCY STOP modules
13/27 5TT3 level relays
13/29 5TT3 line circuit relays

Charging infrastructure for electric vehicles
5TT3 charging units
13/30 - Introduction
13/31 - WB140A charging units
13/32 - CC100A charging cables

For further technical product information:

Configuration Manual

Monitoring Devices
Article No.: 3ZW1012-5SV80-0AC1

Siemens Industry Online Support:

www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Introduction

Overview

Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
Monitoring devices for electrical values							
	**5SV8 residual current monitors**	13/5	To increase system availability and operating safety through continuous monitoring of residual current in electrical systems and signaling if a defined threshold is exceeded.	IEC 62020; EN 62020	✓	--	✓
	**Modular residual current devices (MRCD), type A, type B** NEW	13/6	The MRCDs are modular residual current devices for personnel and fire protection.	EN 60947-2 (Annex M); IEC 60947-2 (Annex M)	✓	--	✓
	**5TT3 voltage relays**	13/15	Monitoring the voltage of emergency lighting in public buildings, short-time failures of 20 ms, for ensuring operational parameters for devices or system components or monitoring the neutral conductor for breaks.	IEC 60255; DIN VDE 0435-303; DIN VDE 0108; DIN VDE 0435; DIN VDE 0633	✓	--	✓
	**5TT3 voltage and frequency relays**	13/18	The voltage and frequency relay monitors the status of the grid in the case of in-plant generation systems. Violation of an upper or lower limit results in shutdown and disconnection of the generation system from the grid. This ensures a stable incoming supply system.	IEC/EN 60255-1; IEC/EN 61000; VDE-AR-N-4105	✓	✓	✓
	**5TT6 current relays**	13/20	Monitoring of emergency and signal lighting and motors. All current relays can be short-time overloaded and connected either with direct measurement or through transformers.	IEC 60255; DIN VDE 0435-303	✓	--	✓
	**5TT3 fuse monitors**	13/22	Monitoring of all types of low-voltage fuses. Can be used in asymmetric systems afflicted with harmonics and regenerative feedback motors.	IEC 60255; DIN VDE 0435	✓	--	✓

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Devices		Page	Application	Standards	Used in		
					Non-residential buildings	Residential buildings	Industry
	**5TT3 phase and phase sequence monitors**	13/23	For the visual signaling of phase failures or phase sequences in three-phase systems. The phase sequence is arbitrary. The device is also suitable for single-, two- or three-phase operation.	IEC 60255; DIN VDE 0435	--	--	✓
	**5TT3 insulation monitors for industrial applications**	13/24	To increase system availability and operating safety through continuous monitoring of the isolation resistance in non-grounded direct voltage or AC voltage systems.	IEC 60255; IEC 61557	--	--	✓
Monitoring devices for plants and equipment							
	**5TT3 fault signaling units**	13/25	Evaluation and display of fault alarms and alarm signals for monitoring industrial plants and control systems. With 4 inputs and connections for 39 expansion fault signaling units.	IEC 60255, DIN VDE 0435-303	✓	--	✓
	**5TT5 EMERGENCY STOP modules**	13/26	For EMERGENCY-OFF switching in accordance with the Directive 98/37/EC on Safety of Machines. Safe types of circuits for machines, plants or test stations in industrial, commercial and private enterprise applications.	According to the Machinery Directive 98/37/EC; EN 954-1	✓	--	✓
	**5TT3 level relays**	13/27	Control of liquid levels in containers with 3 electrode connections for 1-step and 2-step level control. High immunity to interference of the measuring circuit isolated from the system.	IEC 60255, DIN VDE 0435	✓	--	✓
	**5TT3 line circuit relays**	13/29	For disconnecting the voltage of unused lines when loads are disabled.	IEC 60255, DIN VDE 0435	--	✓	--

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Introduction

Devices	Page	Application	Standards	Used in		
				Non-residential buildings	Residential buildings	Industry
Charging infrastructure for electric vehicles						
 **WB140A charging units**	13/30	The WB140A charging unit can be used to charge electric vehicles in charging mode 3 acc. to IEC 61851. The charging cable type 2 is fixed to the charging unit and is equipped with residual current and line protection.	IEC/EN 61851-1; IEC/EN 61851-22; IEC/EN 62196-1; IEC 62196-2; IEC 60439-3; DIN 43880	✓	✓	✓
 **CC100A charging cables**	13/32	The CC100A charging cable in charging mode 2 in compliance with IEC 61851-1 is a safe and convenient alternative to using charging units or posts. The mobile charging cable for home and travel can be connected easily to common household plug-and-socket devices. The range includes versions that cater for most common plug sockets in Europe. Type 1 or type 2 vehicle charging couplers are available at the vehicle end.	IEC/EN 61851-1; IEC/EN 62196; IEC 62335	✓	✓	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Plant safety and operating safety are becoming increasingly important alongside the protection of personnel. Shutdowns due to the unexpected tripping of protective devices cause high costs. However, it is possible to detect residual currents in the electrical installation before the protective device responds.

Residual current monitors (RCM)

Residual current monitors (RCM) monitor residual current in electrical installations and issue a signal when the residual current exceeds a set value.

RCMs are used in plants where a fault should result in a signal, but not in disconnection. This enables plant operators to detect faults and eliminate their causes before the protective devices disconnect the installation, which increases plant and operating safety and cuts costs.

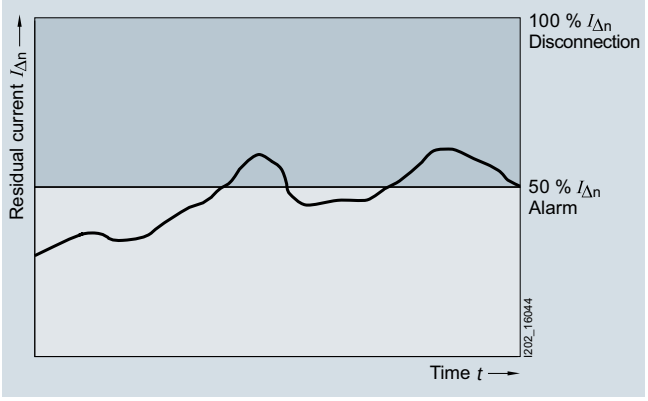
Modular residual current devices (MRCD)

Modular residual current devices (MRCD) monitor residual currents in electrical systems and trip the molded case circuit breaker via a shunt trip or an undervoltage release after an adjustable advance warning if the residual current exceeds a defined value.

This makes it possible for you to offer molded case circuit breakers (MCCBs) with personnel and fire protection in compliance with EN 60947-2 (Annex M) (also as a retrofit).

Summation current transformer

The summation current transformer detects all conductors required to conduct the current, i.e. including the neutral conductor. In a fault-free system, the magnetizing effects of the conductors through which current is flowing cancel each other out for the summation current transformer, i.e. the sum of all currents is zero. If a residual current is flowing due to an insulation fault, a residual magnetic field is left in the core of the transformer and produces a voltage. This voltage is evaluated using the electronics of the RCM/MRCD. The switched contact can be used to operate an acoustic/optical signaling device, a higher-level control system or a circuit breaker for example.



Time characteristic of the rated residual current $I_{\Delta n}$

Benefits

- Higher plant availability and operating safety through permanent monitoring of residual currents
- Adjustable limit values for residual current and response time enable timely detection and signaling – plant shutdowns are often avoidable
- Devices for every application:
  The summation current transformers are available in various sizes
- Additional fire protection can be implemented using the monitoring system

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Overview

The residual current monitors and modular residual current devices with residual current characteristic A detect sinusoidal AC and pulsating DC residual currents.

Technical specifications

		5SV8000-6KK	5SV8001-6KK	5SV8200-6KK	5SV8101-6KK
Standards		EN 62020, IEC 62020			EN 60947-2 (Annex M), IEC 60947-2 (Annex M)
Approvals		--	UL		--
Rated operational voltage U_e	V AC	230			230 from a single-phase auxiliary voltage source (also externally)
• Frequency	Hz	50/60			
Rated residual current $I_{\Delta n}$					
• Type A	A	0.03 ... 3	0.03 ... 3	0.03 ... 3	0.03 ... 3 (default setting: 30 mA)
• Type AC	A	> 3	5 ... 30	5 ... 30	--
Response time Δt	s	0.02 ... 5	0.02 ... 10, INS, SEL[1]	0.02 ... 10, INS, SEL[1]	$I_{\Delta n}$ = 30 mA: INS instantaneous $I_{\Delta n}$ > 30 mA: INS - SEL - 0.06 ... 10[1] (default INS)
Relay contacts		1 × alarm	1 × pre-alarm, 1 × alarm	1 × pre-alarm, 4 × alarm	1 × alarm, 1 × tripping operation
• Rated voltage	V AC	230	230	230	230
• Rated current	A	6	6	6	6
Summation current transformer	mm ∅	20 ... 210			35 ... 210
Maximum cable length RCM/CT (shielded cable)	m	10			
Conductor cross-section	mm^2	1.5			0.125 ... 2.08
Test/reset		Yes/Yes			
External tripping operation/external reset		--/Yes	Yes/Yes	Yes/Yes	Yes/Yes
Mounting width	MW	2	3	3	3
Degree of protection					
• Contacts		IP20			
• Front		IP41			
Operating temperature	°C	-10 ... +50			

[1] INS: Instantaneous, SEL: Selective.

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Rated operational voltage	Rated residual current	Response time	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	U_e	$I_{\Delta n}$	Δt							
	V AC	A	s	MW	d					
Residual current monitors										
	**RCM analog**									
	230, 50/60 Hz	0.03 ... 5 (Type A) > 3 (Type AC)	0.02 ... 5	2		**5SV8000-6KK**		1	1 unit	1BE
	**RCM digital**									
	230, 50/60 Hz	0.03 ... 3 (Type A) 5 ... 30 (Type AC)	0.02 ... 10, INS, SEL[1]	3		**5SV8001-6KK**		1	1 unit	1BE
	**RCM digital, 4 channels**									
	230, 50/60 Hz	0.03 ... 3 (Type A) 5 ... 30 (Type AC)	0.02 ... 10, INS, SEL[1]	3		**5SV8200-6KK**		1	1 unit	1BE
Modular residual current devices										
	**MRCD**									
	230, 50/60 Hz	0.03 ... 3 (Type A)	0.02 ... 10 INS, SEL[1]	3		**5SV8101-6KK**		1	1 unit	1BE

[1] INS: Instantaneous, SEL: Selective.

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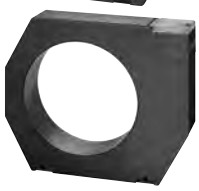
		Internal diameter	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	d					
Summation current transformers								
	Summation current transformers							
	Including holder for standard mounting rail[1] UL	20		**5SV8700-0KK**		1	1 unit	1BE
		30		**5SV8701-0KK**		1	1 unit	1BE
	Including holder for wall mounting[2] UL	35		**5SV8702-0KK**		1	1 unit	1BE
		70		**5SV8703-0KK**		1	1 unit	1BE
		105		**5SV8704-0KK**		1	1 unit	1BE
	Including holder for wall mounting UL	140		**5SV8705-0KK**		1	1 unit	1BE
		210		**5SV8706-0KK**		1	1 unit	1BE
	**Holders for standard mounting rail** [3]			**5SV8900-1KK**		1	2 units	1BE
	Suitable for summation current transformer with internal diameter of 20 mm, 30 mm, 35 mm, 70 mm							
Accessories for summation current transformers								
	Magnetic field centering sleeves							
	35 mm			**5SV8902-1KK**		1	1 unit	1BE
	70 mm			**5SV8903-1KK**		1	1 unit	1BE
	105 mm			**5SV8904-1KK**		1	1 unit	1BE
	140 mm			**5SV8905-1KK**		1	1 unit	1BE
	210 mm			**5SV8906-1KK**		1	1 unit	1BE

1) Not for MRCD.

2) Mounting on standard mounting rail with optional holder for standard mounting rail also possible.

3) Cannot be used together with magnetic field centering sleeves.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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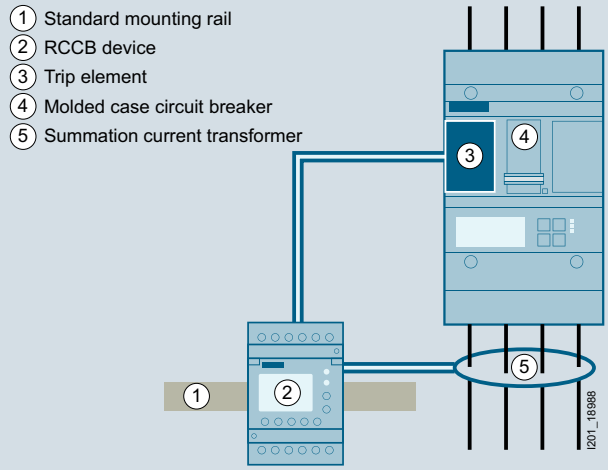
More information

Combination options for residual current protective device



5SV8101-6KK (tested combinations)				
2	5SV8101-6KK			
1	EN 60715 - TH35 - 7.5 35 - 15			
5	Summation current transformers		Magnetic field centering sleeves	
	5SV8702-0KK	35 mm		5SV8902-1KK
	5SV8703-0KK	70 mm		5SV8903-1KK
	5SV8704-0KK	105 mm		5SV8904-1KK
	5SV8705-0KK	140 mm		5SV8905-1KK
	5SV8706-0KK	210 mm		5SV8906-1KK
4			3	3
3VL17...			3VL9400-1ST00	3VL9400-1UP00
3VL27...			3VL9400-1ST00	3VL9400-1UP00
3VL37...			3VL9400-1ST00	3VL9400-1UP00
3VL47...			3VL9400-1ST00	3VL9400-1UP00
3VA20... 3VA21... 3VA22...			3VA9988-0BL30 3VA9988-0BL32 3VA9988-0BL33	3VA9908-0BB11 3VA9908-0BB20 3VA9908-0BB24 3VA9908-0BB25
3VA10... 3VA11...			3VA9988-0BL30 3VA9988-0BL32 3VA9988-0BL33	3VA9908-0BB11 3VA9908-0BB20 3VA9908-0BB24 3VA9908-0BB25

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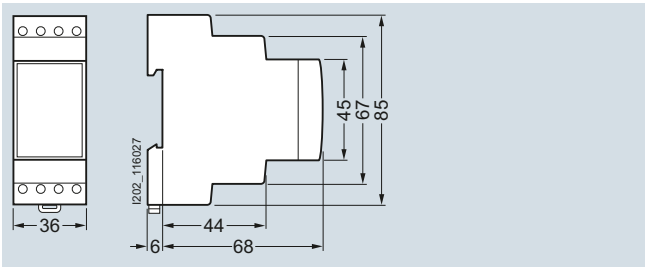
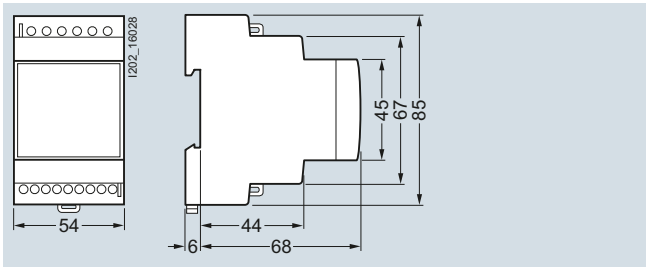
Dimensional drawings

RCM/MRCD

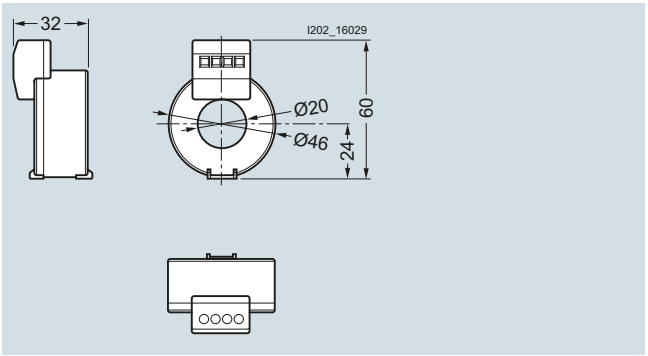


RCM analog, 5SV8000-6KK

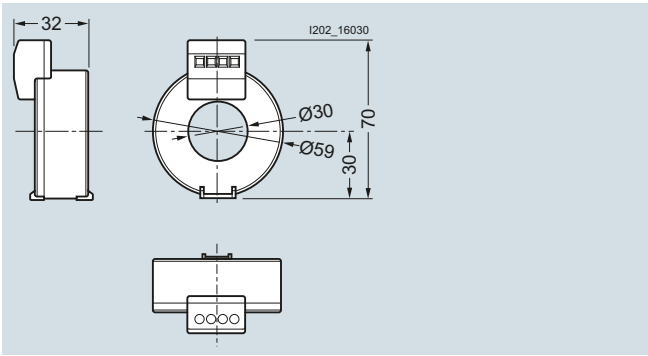


RCM digital, 5SV8001-6KK, 5SV8200-6KK, MRCD, 5SV8101-6KK

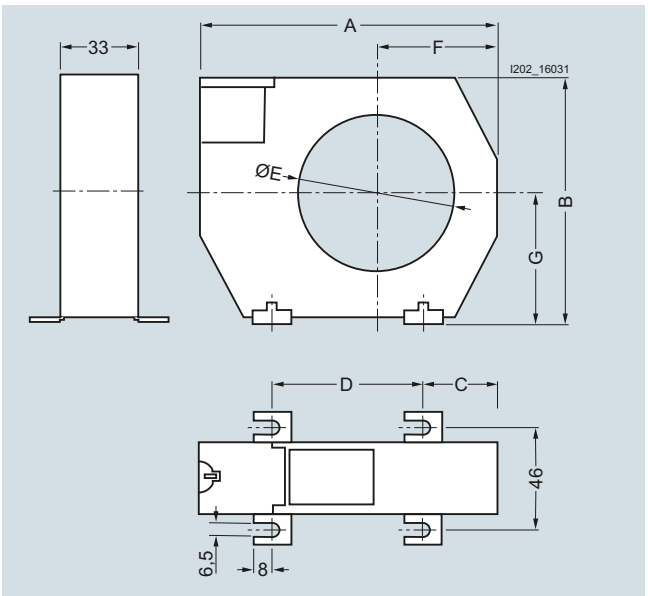
Summation current transformers



Summation current transformer, 5SV8700-0KK



Summation current transformer, 5SV8701-0KK



Summation current transformer, 5SV8702-0KK, 5SV8703-0KK, 5SV8704-0KK, 5SV8705-0KK, 5SV8706-0KK

Type	Dimensions	A	B	C	D	E	F	G
5SV8702-0KK		100	79	26	49	35	35	43
5SV8703-0KK		130	110	32	66	70	52	57
5SV8704-0KK		170	146	38	94	105	72	73
5SV8705-0KK		230	196	49	123	140	97	98
5SV8706-0KK		299	284	69	161	210	141	142

Type	Rated current	Maximum current[1)]
5SV8700-0KK	≤ 40 A	240 A
5SV8701-0KK	≤ 63 A	380 A
5SV8702-0KK	≤ 80 A	480 A
5SV8703-0KK	≤ 200 A	1200 A
5SV8704-0KK	≤ 250 A	1500 A
5SV8705-0KK	≤ 500 A	3000 A
5SV8706-0KK	≤ 600 A	3600 A

1) Short-time starting current, up to 2 s

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The modular residual current protective devices with residual current characteristic B measure pulsating and smooth DC and AC residual currents up to 2 kHz.

Technical specifications

		5SV8101-4KK	5SV8111-4KK
Standards		EN 60947-2 (Annex M), IEC 60947-2 (Annex M)	
Mechanical data			
Width	mm	36 (2MW)	
Depth	mm	64	
Height	mm	85	
Weight	g	150	
Mounting		Standard mounting rail	
Enclosure material		Polycarbonate	
Overvoltage category		III	
Pollution degree		3	
Degree of protection			
• Components (IEC 60529)		IP30	
• Terminals (IEC 60529)		IP20	
Electrical connections		Screw terminals	
• Rigid	mm^2	0.2 ... 4	
• Flexible	mm^2	0.2 … 2.5 (AWG 24 … 12)	
Stripped length	mm	8 ... 9	
Tightening torque	Nm	0.5 ... 0.6	
Electrical data			
Supply voltage U_S		230 V AC (70 ... 300 V AC)	24 V DC (9.6 ... 94 V DC)
• Frequency		50/60 Hz	--
Power consumption	VA	< 6.5	
Relay contacts		1 x alarm, 1 x tripping operation	
• Rated voltage	V	250 AC	
• Rated current	A	5	
External summation current transformer		Internal diameter 35 ... 210 mm (5SV8701-2KK, 5SV8701-2KP, 5SV8702-2KK, 5SV8702-2KP, 5SV8703-2KK, 5SV8704-2KK)	
Rated voltage (summation current transformer)	V	690	
Response characteristic according to IEC 60947-2 (M)		Type B	
Rated frequency	kHz	0 ... 2	
Response residual current			
• $I_{\Delta n}1$ (alarm AL1)		50 ... 100% of $I_{\Delta n}2$ (factory setting: 50%)	
• $I_{\Delta n}2$ (tripping TP2)		30 mA ... 1 A (factory setting: 30 mA)	
Response delay			
• $t_{on}1$ (alarm)	s	0 ... 10 (factory setting: 1 s)	
• $t_{on}2$ (tripping operation)	s	0 ... 10 (factory setting: 0 s)	
Password		off / 0 … 999 (factory setting: 0)	
Max. cable length MRCD/CT	m	10 (6 x 0.75 mm^2)	
EMC		IEC 60947-2 (M)	
Operating temperature	°C	-25 ... +55	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5SV8 residual current monitors and protective devices > Type B NEW

Selection and ordering data

	Rated operational voltage	Rated residual current	Response time	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	U_e	$I_{\Delta n}$	Δt							
	V	A	s	MW						
Residual current monitors										
	**MRCD digital**									
	230 AC, 50/60 Hz	0.03 ... 1	0 ... 10	2		**5SV8101-4KK**		1	1 unit	1BE
	24 DC	0.03 ... 1	0 ... 10	2		**5SV8111-4KK**		1	1 unit	1BE

Accessories

		Internal diameter	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm						
Summation current transformer								
	--	35		**5SV8701-2KK**		1	1 unit	1BE
	With shield	35		**5SV8701-2KP**		1	1 unit	1BE
	**Holders for standard mounting rail** Suitable for summation current transformers 5SV8701-2KK, 5SV8701-2KP			**5SV8900-2KK**		1	1 unit	1BE
	--	60		**5SV8702-2KK**		1	1 unit	1BE
	With shield	60		**5SV8702-2KP**		1	1 unit	1BE
	**Holders for standard mounting rail** Suitable for summation current transformers 5SV8702-2KK, 5SV8702-2KP			**5SV8900-3KK**		1	1 unit	1BE
	--	120		**5SV8703-2KK**		1	1 unit	1BE
	--	210		**5SV8704-2KK**		1	1 unit	1BE

Minimum order quantity (PS) or a multiple thereof can be ordered.

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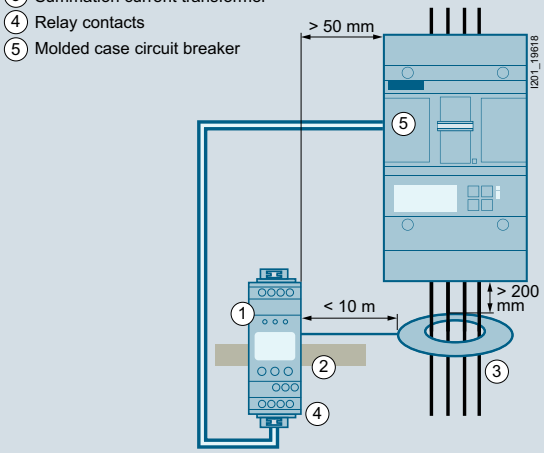
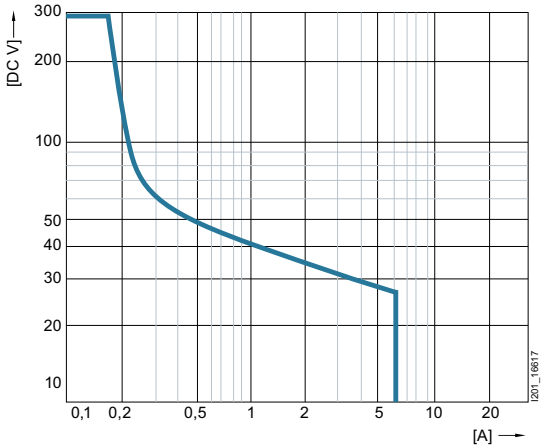
More information

Combination options for modular residual current device



5SV8101-4KK / 5SV8111-4KK (tested combinations)			
1	5SV8101-4KK / 5SV8111-4KK		
2	EN 60715 - TH35 - 7.5 35 - 15		
3	5SV8701-2KK / 5SV8701-2KP 5SV8702-2KK / 5SV8702-2KP 5SV8703-2KK 5SV8704-2KK	35 mm 60 mm 120 mm 210 mm	
4	Relay contacts		
	DC		AC
			Max. 230 V AC 5 A
5	3VA1... 3VA20... 3VA21... 3VA22...	3VA9988-0BL30 3VA9988-0BL32 3VA9988-0BL33	3VA9908-0BB11 3VA9908-0BB24 3VA9908-0BB25
	3VA23... 3VA24...	3VA9988-0BL30 3VA9988-0BL32 3VA9988-0BL33	3VA9908-0BB11 3VA9908-0BB25

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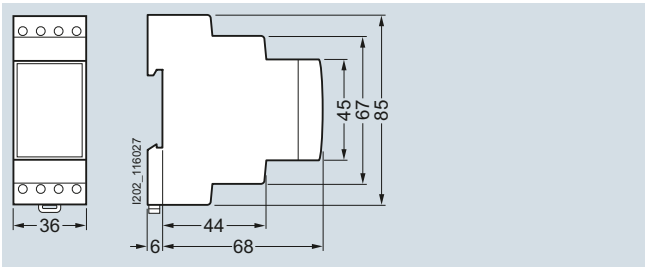
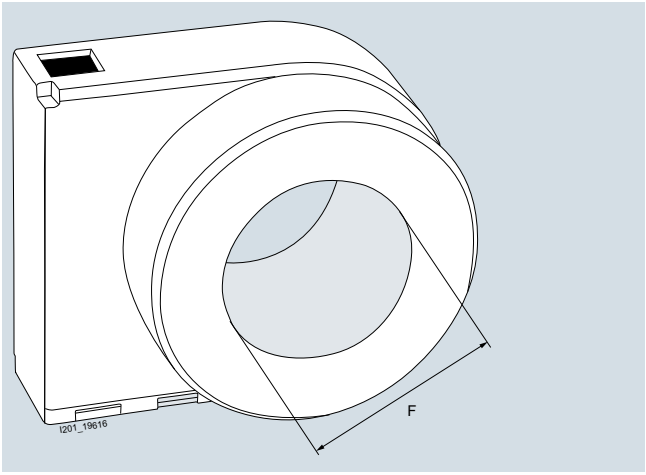
Dimensional drawings

Residual current monitor



MRCD, digital, type B
5SV8701-2KK/2KP, 5SV8702-2KK/2KP, 5SV8703-2KK, 5SV8704-2KK

Summation current transformer



Summation current transformer, 5SV8701-2KK, 5SV8701-2KP, 5SV8702-2KK, 5SV8702-2KP, 5SV8703-2KK, 5SV8704-2KK

Type	Internal diameter F	$I_{\Delta n\ min}$	Rated current I_n	Maximum current[1] I_{max}
5SV8701-2KK/2KP	35 mm	10 mA	≤ 80 A	500 A
5SV8702-2KK/2KP	60 mm	10 mA	≤ 160 A	1000 A
5SV8703-2KK	120 mm	100 mA	≤ 330 A	2000 A
5SV8704-2KK	210 mm	300 mA	≤ 630 A	3800 A

[1] Short-time starting current, up to 2 s

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Voltage relays are used for device and plant protection, supplying safety light devices and the detection of N-conductor breaks and short-time voltage interruptions.

They are available as undervoltage, overvoltage and under/overvoltage relays. The devices are equipped with different functions, depending on their intended use, and comply with the pertinent regulations.

Benefits

- Complete voltage protection in a compact design for overvoltage and undervoltage monitoring in a single device
- Plants and devices are reliably and easily protected by phase-failure relays
- Overvoltages and consequential damage due to high voltages are prevented through N-conductor monitoring
- Asymmetry monitoring in the voltage relay also protects three-phase AC motors against operation with voltage skew

Technical specifications

			5TT3400 5TT3401 5TT3402 5TT3403	**5TT3404 5TT3405**	**5TT3406**	**5TT3195**
Standards			IEC 60255; DIN VDE 0435-110, -303			
Rated control circuit voltage U_c		V AC	230/400			400
Operating range (overload capability)		× U_c	1.1			1.35
Rated frequency		Hz	50/60			
Response values	ON-switching OFF-switching	× U_c	0.9/0.95 0.7/0.85		4% hysteresis 0.7 ... 0.95	 0.9 ... 1.3
Minimum contact load		V; mA	10; 100			
Phase asymmetry	Setting accuracy Repeat accuracy	% %	-- --	Approx. 5 ... 10 1		Approx. 5 ... 10 1
Phase failure detection	At L1 or L2 or L3	ms	100			--
N-conductor monitoring			--	Yes		--
Rated insulation voltage U_i	Between coil/contact	kV	4			
Contacts	μ contact (AC-11)	A	4			
Electrical isolation	Creepage distances and clearances Actuator/contact	 mm	 3	 5.5		
Rated impulse withstand voltage U_{imp}	Actuator/contact	kV	> 2.5	> 4		
Terminals	± screw (Pozidriv)		1			
Conductor cross-sections • Rigid, max. • Flexible, with end sleeve, min.		 mm^2 mm^2	 2 × 2.5 0.5			
Permissible ambient temperature		°C	-20 ... +60			
Resistance to climate	Acc. to EN 60068-1		20/60/4			

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT3 voltage relays

			5TT3407	5TT3408
Standards			IEC 60255; DIN VDE 0435-303	
Rated control circuit voltage U_c		V AC	230/400	
Operating range (overload capability)		× U_c	1.1	1.35
Rated frequency		Hz	50/60	
Back-up fuse	Terminals L1/L2/L3	A	2	
Response values	Overvoltage: OFF-switching ON-switching	 × U_c	 -- --	 0.9 ... 1.3 4% hysteresis
	Undervoltage: OFF-switching ON-switching	 × U_c	 0.8 0.85	 0.7 ... 1.1 4% hysteresis
Minimum contact load		V; mA	10; 100	
Phase asymmetry	Setting accuracy	%	Approx. 5 ... 10	
	Repeat accuracy	%	1	
Phase failure detection	At L1, L2 or L3	ms	≥ 20	100
OFF-delay		s	--	0.1 ... 20
Automatic reclosing delay		s	0.2 ... 2	--
Rated insulation voltage U_i	Between coil/contact	kV	4	
Contacts	μ contact (AC-11)	A	3	1
Electrical isolation	Creepage distances and clearances Contact/contact Actuator/contact	 mm mm	 -- 4	 4
Rated impulse withstand voltage U_{imp}	Actuator/contact	kV	> 4	
Rated operational power P_s	AC operation: 230 V and p.f. = 1 230 V and p.f. = 0.4	 VA VA	 2000 1250	 -- --
	DC operation: U_e = 24 V and I_e = 6 A U_e = 60 V and I_e = 1 A U_e = 110 V and I_e = 0.6 A U_e = 220 V and I_e = 0.5 A	 W W W W	 max. 100 max. 100 max. 100 max. 100	 -- -- -- --
Terminals	± screw (Pozidriv)		1	
Conductor cross-sections • Rigid, max. • Flexible, with end sleeve, min.		 mm^2 mm^2	 2 × 2.5 0.5	
Permissible ambient temperature		°C	-20 ... +60	
Humidity class	Acc. to IEC 60068-2-30		F	

			5TT3414	5TT3415
Rated control circuit voltage U_c		V AC	230/400	
Overload capability		× U_c	1.15	1.15
Rated frequency		Hz	50/60	50/60
Response values	ON-switching		5%	
	OFF-switching	× U_c	0.85	
Minimum contact load		V/mA	10/100	10/100
Phase failure detection	At L1, L2 or L3	ms	500	
N-conductor monitoring			--	--
Rated insulation voltage U_i	Between coil/contact	kV	--	
Contacts	AC-15 NO contacts		--	
	AC-15 NC contacts		--	
	AC-15 CO contacts		1	2
Electrical service life in switching cycles	AC-15, 1 A, 230 V AC		1 × 10^5	
Rated impulse withstand voltage	Acc. to IEC 60664-1	kV	6	
Pollution degree			2	2
Terminals	± screw (Pozidriv) – screw (slot)		-- 3.5	
Conductor cross-sections • Rigid • Flexible, with end sleeve		 mm^2 mm^2	 1 x 4 1 x 2.5	
Permissible ambient temperature		°C	-25 … +60	
Resistance to climate	Acc. to EN 60068-1		20/060/04	20/060/04

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A	V	MW	d					
	Overvoltage relays										
	For the monitoring of 3 phases against N, with N-conductor monitoring, switching thresholds: 0.9 ... 1.3 × U_c, 4% hysteresis, adjustable										
	2 CO	230	4	230/400 AC	2		**5TT3195**		1	1 unit	1BK
	Undervoltage relays										
 5TT3400	For the monitoring of 1, 2 or 3 phases against N, with phase failure detection,										
	• Switching thresholds: 0.7 and 0.9 x U_c, not adjustable										
	1 CO	230	4	230/400 AC	1	►	**5TT3400**		1	1 unit	1BK
	2 CO	230	4	230/400 AC	2	►	**5TT3402**		1	1 unit	1BK
	• Switching thresholds: 0.9 ... 0.95 × U_s										
	2 CO	230	4	230/400 AC	2		**5TT3403**		1	1 unit	1BK
 5TT3402	For the monitoring of 1, 2 or 3 phases against N, with phase failure detection, switching thresholds: 0.85 and 0.95 x U_c, not adjustable										
	1 CO	230	4	230/400 AC	1	►	**5TT3401**		1	1 unit	1BK
	For the monitoring of 3 phases against N, with asymmetry, reverse voltage and phase failure detection, with N-conductor monitoring										
	• Switching thresholds: 0.7 and 0.9 x U_c, not adjustable										
	2 CO	230	4	230/400 AC	2		**5TT3404**		1	1 unit	1BK
	• Switching thresholds: 0.7 ... 0.95 × U_c, 5% hysteresis, adjustable										
	2 CO	230	4	230/400 AC	2		**5TT3406**		1	1 unit	1BK
 5TT4404	For the monitoring of 3 phases against N, with asymmetry, reverse voltage and phase failure detection, with N-conductor monitoring, switching thresholds: 0.85 and 0.95 x U_c, not adjustable										
	2 CO	230	4	230/400 AC	2		**5TT3405**		1	1 unit	1BK
	For the monitoring of 1, 2 or 3 phases against N, switching thresholds: 0.85 x U_c, not adjustable, response delay 0.5 s, off-delay 60 s										
	1 CO	230	4	230/400 AC	1		**5TT3414**		1	1 unit	1BK
 5TT3415	• With TEST pushbutton										
	2 CO	230	4	230/400 AC	1		**5TT3415**		1	1 unit	1BK
	Short-time relays										
	For the monitoring of short-time failure detection ≥ 20 ms of 1, 2 or 3 phases against N, with phase failure detection and N-conductor monitoring, switching thresholds: 0.8 ... 0.85 × U_c, not adjustable										
	2 CO	230	4	230/400	2		**5TT3407**		1	1 unit	1BK
	Undervoltage and overvoltage relays										
	For the monitoring of 3 phases against N, with asymmetry, reverse voltage and phase failure detection, with N-conductor monitoring and adjustable time delay of 0.1 ... 20 s, switching thresholds: Undervoltage: 0.7 ... 1.1 × U_c, 4% hysteresis, adjustable Overvoltage 0.9 ... 1.3 × U_c, 4% hysteresis, adjustable										
	2 CO	230	4	230/400	2		**5TT3408**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT3 voltage and frequency relays

Overview

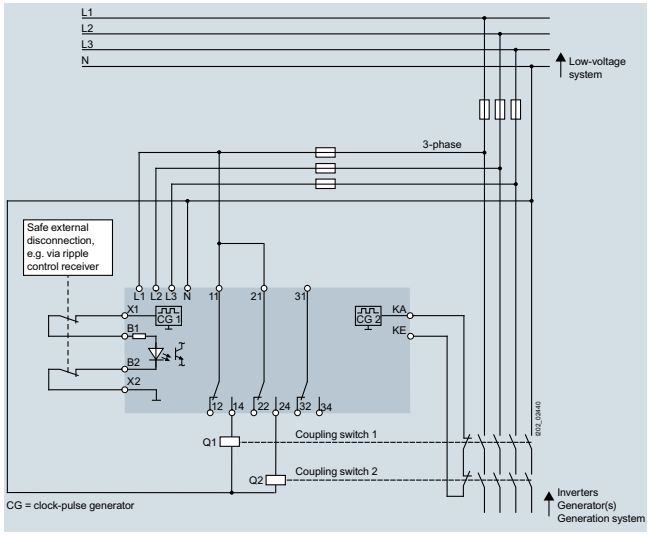


The voltage and frequency relay monitors the status of the grid in the case of in-plant generation systems. Violation of an upper or lower limit results in shutdown and disconnection of the generation system from the grid. Connection or automatic re-connection of the generation system to the grid only takes place when the grid frequency and the grid voltage have remained within their respective tolerance ranges without interruption for the duration of an adjustable time delay t_W. Following shutdown due to a brief interruption, re-connection takes place when the grid frequency and grid voltage have remained within the tolerance range for 5 s without interruption.

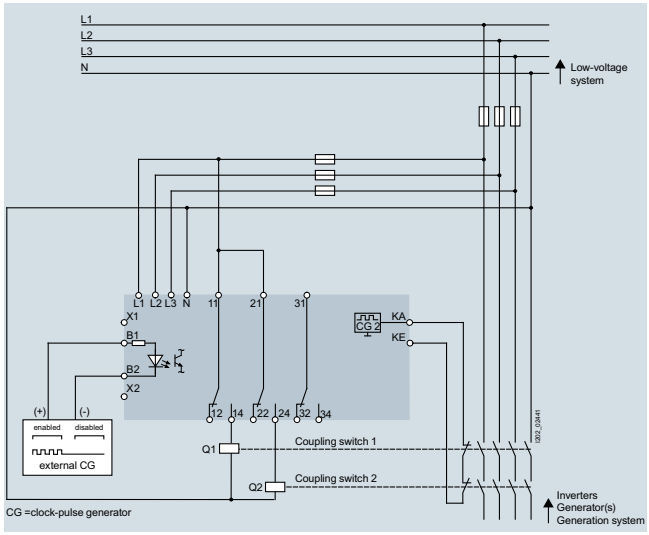
Benefits

- Clearance certification of the German Employer's Liability Association (Energy, Textile, Electrical and Media Products)
- Default settings in accordance with VDE-AR-N-4105
- The voltage and frequency relay meets the high requirements of VDE AR-N 4105
- It can be used both for centralized and integrated grid and plant protection
- The latching rotary switches enable fast and easy setting of the required values
- An illuminated LCD provides plant status information
- The voltage and frequency relay ensures single-fault tolerance as stipulated in the VDE-AR-N 4105 application guide
- Passive procedure for detecting islanding

Application



Enable via external contact



Enable using external voltage 24 V AC, 40 ... 400 Hz

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

			Voltage and frequency relays
			5TT3427
Standards			IEC/EN 60255-1; IEC/EN 61000; VDE-AR-N-4105
Supply voltage U_v		V AC	3 x 85 ... 288
Supply voltage B1/B2		V AC	24 (at 40 ... 400 Hz)
Rated control circuit voltage U_c		V AC	230/400
Rated impulse withstand voltage	Acc. to IEC 60664-1		
• Contact 31, 32, 34		kV	6
• KA, KE and measuring circuit		kV	4
• Pollution degree			2
Recommended fuse Measurement inputs	gG/gL	A	6
Temperature range		°C	-20 ... +60 (in the range 0 °C ... -20 °C, there may be restrictions to the functionality of the LCD)
Conductor cross-sections			
• Rigid, flexible		mm^2	0.5 ... 4
• Flexible with end sleeve		mm^2	0.5 ... 2.5
• Multi-conductor connection 2 conductors of same cross-section		mm^2	0.5 ... 1.5
Output relay			
Mode of operation			Quiescent current
Contacts			
• NO contacts	AC15	A AC/V AC	3/230
• NC contacts	AC15	A AC/V AC	1/230
Thermal current		A AC	5
Electrical service life			
• NO contacts	AC15, 1A, AC230	Switching cycles	300000
Rise in frequency		Hz	50.2 ... 51.2
Drop in frequency		Hz	47.0 ... 49.8
Rise in voltage			
• Phase/neutral		V AC	253 ... 288
• Phase/phase		V AC	438 ... 498
Drop in voltage			
• Phase/neutral		V AC	184
• Phase/phase		V AC	319
Mean rise in voltage over 10 minutes			
• Phase/neutral		V AC	253 ... 267
• Phase/phase		V AC	438 ... 462
Re-connection time t_w		s	0 ... 600
Disconnection response time		ms	< 100
Connection condition			
• Frequency		%	5
• Voltage		Hz	47.5 ... 50.05
Accuracy			
• Frequency		% (± 1 digit)	≤ ±1
• Voltage		% (± 1 digit)	≤ ±0.02
Dimensions		W x H x D	70 x 90 x 71 mm

Selection and ordering data

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V	A	V AC	MW	d					
	**Voltage and frequency relays** For monitoring of grid infeeds > 30 kVA										
	3 CO	230	5	230/400	4		**5TT3427**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT6 current relays

Overview

Current relays monitor single and three-phase systems for the flow of current, e.g. in emergency lighting installations, and the loading of motors. They are available as undercurrent, overcurrent and under/overcurrent relays.

Benefits

- Devices with an extremely broad range of applications of minimum 0.1 A to maximum 15 A without transformer
- Permanent overload capability up to 20 A or 30 A max. for up to 3 seconds, protect the function against uncontrolled plant states and increase plant availability
- Range changing enables the precise setting of current values through a high resolution
- Ultra compact current relays require only the smallest of space and save costs

Technical specifications

			5TT6111	5TT6112
Standards			IEC 60255	
Rated control current I_c		A	1 ... 10	
Rated control circuit voltage U_c		V AC	230	
Primary operating range **Overload capability, continuous** **Overload capability, short-time**	 At 50 °C ambient temperature max. 3 s	 × U_c A A	0.9 ... 1.1 15 20	
Rated frequency		Hz	50/60	
Response values	ON-switching OFF-switching		Infinitely variable Permanent, 4% hysteresis	
Switching delay t_v	Infinitely adjustable	s	0.1 ... 20	
Response time	Non-adjustable	ms	Current corresponds to the rated operational power of the continuous-flow heater	
Minimum contact load		V; mA	10; 100	
Rated insulation voltage U_i	Between coil/contact	kV	2.5	
Contacts µ contact (AC-15)	 NO contacts NC contacts	 A A	 3 1	
Electrical isolation	Creepage distances and clearances Actuator/contact	mm	3	
Rated impulse withstand voltage U_{imp}	Actuator/contact	kV	> 4	
Terminals	± screw (Pozidriv)		1	
Conductor cross-sections	Rigid Flexible, with end sleeve	max. mm^2 min. mm^2	2 × 2.5 1 × 0.5	
Permissible ambient temperature		°C	-20 ... +60	
Resistance to climate	Acc. to EN 60068-1		20/60/4	

			5TT6113	5TT6114	5TT6115
Standards			IEC 60255; DIN VDE 0435-303		
Rated control current I_c		 A A A A	4 ranges 0.1 ... 1 0.5 ... 5 1 ... 10 1.5 ... 15		
Rated control circuit voltage U_c		V AC	230		
Primary operating range **Overload capability, continuous** **Overload capability independent of measuring range**	 Max. 3 s	 × U_c A A	0.9 ... 1.1 20 30		
Rated frequency		Hz	50/60		
Response values	ON-switching OFF-switching		Infinitely variable Permanent, 4% hysteresis		
Switching delay t_v	Infinitely adjustable	s	0.1 ... 20		
Response time	Non-adjustable	ms	See Siemens Service and Support Portal, search term "Article No.", e.g. "5TT6113"		
Minimum contact load		V; mA	10; 100		
Rated insulation voltage U_i	Between coil/contact	kV	2.5		
Contacts µ contact (AC-15)	 NO contacts NC contacts	 A A	 5 1		
Electrical isolation	Creepage distances and clearances Actuator/contact	mm	3		
Rated impulse withstand voltage U_{imp}	Actuator/contact	kV	> 4		
Terminals	± screw (Pozidriv)		1		
Conductor cross-sections	Rigid Flexible, with end sleeve	max. mm^2 min. mm^2	2 × 2.5 1 × 0.5		
Permissible ambient temperature		°C	-20 ... +60		
Resistance to climate	Acc. to EN 60068-1		20/60/4		

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Contacts	U_e	I_e	Measuring range	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A	A AC	MW	d					
	**Current relays for single-phase loads up to 230 V AC, auxiliary voltage and measuring circuit not isolated**										
	Undervoltage monitoring, single-phase										
	1 CO	230	5	1 ... 10	1		**5TT6111**		1	1 unit	1BK
	Overcurrent monitoring, single-phase										
	1 CO	230	5	1 ... 10	1		**5TT6112**		1	1 unit	1BK
	**Current relays for single-phase loads up to 230 V AC, auxiliary voltage and measuring circuit electrically isolated**										
	Undervoltage monitoring, single-phase										
	2 CO	230	5	4 ranges 0.1 ... 1 0.5 ... 5 1 ... 10 1.5 ... 15	2		**5TT6113**		1	1 unit	1BK
	Overcurrent monitoring, single-phase										
	2 CO	230	5	4 ranges 0.1 ... 1 0.5 ... 5 1 ... 10 1.5 ... 15	2		**5TT6114**		1	1 unit	1BK
	Over/undervoltage monitoring, single-phase										
	2 CO	230	5	4 ranges 0.1 ... 1 0.5 ... 5 1 ... 10 1.5 ... 15	2		**5TT6115**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT3 fuse monitors

Overview

Fuse monitors serve to monitor all types and versions of melting fuses that cannot be equipped with a fault signal contact. This enables integration in fault signaling circuits or a central alarm in order to improve plant availability.

Benefits

- Increase in plant availability, because fuse failures – which could cause considerable damage to the plant – are detected in plenty of time
- A fuse failure is detected even if the load is switched off. This ensures the highest level of plant availability

Technical specifications

			5TT3170
Standards			IEC 60255; DIN VDE 0435-110
Rated control circuit voltage U_c		V	380 ... 415 3 AC
Primary operating range		× U_c	0.8 ... 1.1
Rated frequency		Hz	50 ... 400
Internal resistance of measuring paths		Ω/V	> 1000
Max. permissible rear feed		%	90
Response/release time		ms	< 50
Rated impulse withstand voltage U_{imp} Input/output		kV	> 4
Rated operational voltage U_e		V AC	250
Rated operational current I_e	AC-1	A	4
Electrical service life	AC-11	In switching cycles at 1 A	1.5×10^5
Terminals	± screw (Pozidriv)		1
Conductor cross-sections	Rigid, max. Flexible, with end sleeve, min.	mm^2 mm^2	2 × 2.5 1 × 0.5
Permissible ambient temperature		°C	-20 ... +45
Resistance to climate	Acc. to EN 60068-1		20/45/4

Selection and ordering data

		U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A	3 V AC	MW	d					
	**Fuse monitors** For all low-voltage fuse systems. Can be used in asymmetric systems afflicted with harmonics and regenerative feedback motors. Signal also for disconnected loads.	230	4	380 ... 415	2	►	**5TT3170**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Phase monitors monitor the voltages in three-phase system and signal the power failure of one or more phases over a floating contact. Phase sequence monitors monitor the phase sequence in three-phase systems and signal any changes in the phase sequence – change of rotating field – over a floating changeover contact.

Benefits

- The three-phase LED display in the phase monitor and the LED display in the phase sequence monitors provide constant information on the switching state of the plant
- The compact design in 1 MW saves space

Technical specifications

			5TT3421	5TT3423
Standards			IEC 60255; DIN VDE 0435	
Rated control circuit voltage U_c		V AC	230/400	400
Primary operating range		× U_c	0.8 ... 1.1	
Rated frequency		Hz	50/60	
Rated power dissipation P_v	Electronics Contacts	VA VA	9 0.2	
Rated operational voltage U_e		V AC	250	
Rated operational current I_e		A	4	
Minimum contact load		V; mA	10; 100	
Rated insulation voltage U_i	Between coil/contact	kV	4	
Contacts	µ contact (AC-11)	A	3	
Electrical isolation	Creepage distances and clearances Actuator/contact	 mm	 4	
Rated impulse withstand voltage U_{imp}	Actuator/contact	kV	> 2.5	
Terminals	± screw (Pozidriv)		1	
Conductor cross-sections	Rigid, max. Flexible, with end sleeve, min.	mm^2 mm^2	2 × 2.5 --	
Degree of protection	Acc. to EN 60529		IP20, with connected conductors	
Safety class	Acc. to EN 61140/VDE 0140-1		II	
Permissible ambient temperature		°C	-20 ... +60	
Resistance to climate	Acc. to EN 60068-1		20/60/4	

Selection and ordering data

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A	V AC	MW	d					
	**Phase monitors** With 3 green LEDs for 3 phases										
	1 CO	250	4	230/400	1	▶	**5TT3421**		1	1 unit	1BK
	**Phase sequence monitors** With one green LED, which lights up for right-rotating field										
	1 CO	250	4	400	1	▶	**5TT3423**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT3 insulation monitors for industrial applications

Overview

Insulation monitors are used for protection of persons and against fire in non-grounded systems (IT systems). The insulation resistance of the system being monitored is measured against ground.

These types of measurements are specified according to DIN VDE 0100-410 – Power installations up to 1000 V – Protection against electric shock.

Technical specifications

			5TT3470	5TT3471
Supply voltage U_c		V AC V DC	220 ... 240 --	-- --
Primary operating range	For AC supply For DC supply	× U_c V DC	0.8 ... 1.1 --	-- --
Frequency range for U_c		Hz	45 ... 400	--
Rated power dissipation P_v	 For DC supply	VA W	Approx. 2 --	-- Approx. 1
Rated impulse withstand voltage U_{imp}	Terminals A1 to A2 Terminals L to PE Terminals A1, A2 to L, PE Terminals against contacts	kV kV kV kV	< 4 < 4 < 4 < 6	< 4 < 4 < 3 < 6
Measuring circuit			For three-phase and AC systems	For direct voltage systems
Measurement voltage range U_{meas}		V AC V DC	0 ... 500 --	-- 12 ... 280
Primary operating range		× U_{meas}	0 ... 1.1	0.9 ... 1.1
Frequency range for U_{meas}		Hz	10 ... 10000	--
Alarm values	Measuring shunt R_{AL}	kΩ	5 ... 100	5 ... 200
Setting of alarm value	On absolute scale		Infinitely variable	Infinitely variable
Alternating current internal resistance	Internal testing resistance	kΩ	> 250	--
Direct current internal resistance	Internal testing resistance L+ and L- to PE	kΩ kΩ	> 250 --	-- 75 each
Measurement voltage U_{meas}	Internal	V DC	Approx. 15	--
Max. measurement current I_{meas}	Short circuit	mA	< 0.1	0.2 ... 4 depending on the voltage
Direct interference voltage	Max. permissible	V DC	500	--
Response delay	At R_{AL} 50 kΩ and 1µF and ∞ to 0.9 × R_{meas} and R_{meas} from ∞ to 0 Ω	 s s	 < 1.3 < 0.7	 0.8 0.4
Switching hysteresis	At R_{meas} 50 kΩ	%	15	10 ... 15
Contacts	µ contact		2 CO	2 CO
Rated operational voltage U_e		V	230 AC	12 ... 280 DC
Rated operational current I_s	Thermal current I_{th} DC-13 at 24 V DC DC-13 at 250 V DC AC-15 AC-15 NO contacts AC-15 NC contacts	A A A A A A	4 -- -- -- 5 2	4 2 0.2 3 -- --
Terminals	± screw (Pozidriv)		2	2
Conductor cross-sections	Rigid, max. Flexible, with end sleeve, min.	mm^2 mm^2	2 × 2.5 1 × 0.50	
Permissible ambient temperature		°C	-20 ... +60	
Degree of protection	Terminals (according to EN 60529) Enclosure (according to EN 60529)		IP20 IP40	
Resistance to climate	Acc. to EN 60068-1		20/060/04	

Selection and ordering data

	Contacts	U_c	U_e	Measuring range	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	V	kΩ	MW	d					
	**Insulation monitors**										
	For monitoring the insulation resistance in non-grounded three-phase and AC systems from 10 ... 1000 Hz against ground										
	2 CO	230	0 ... 500 V AC	5 ... 100	2		**5TT3470**		1	1 unit	1BK
	For monitoring the insulation resistance in non-grounded DC systems against ground										
	2 CO	--	12 ... 280 V DC	5 ... 200	2		**5TT3471**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Fault signaling units are used in small plants where the installation of complex fault signaling systems would be too labor-intensive and too expensive. In the event of a fault, they enable fast fault localization of all monitoring devices and limit monitors installed in a plant from a central location. This increases plant availability. With the correct sensor configuration, they also provide the option of preventative maintenance.

- 4 fault signal inputs with LED
- 1 LED as centralized fault indicator
- One unit each for centralized fault indication and acoustic signaling
- With acknowledgment for acoustic indicators
- Open-/closed-circuit principle to the 4 inputs can be adjusted via jumpers X1 – X2
- A maximum of 39 5TT3461 expansion fault signaling units can be connected to the 5TT3460 centralized fault signaling unit
- The maximum possible cable length between 5TT3460 centralized fault signaling units and 5TT3461 expansion fault signaling units is approx. 100 m with a conductor cross-section of 1.5 mm^2.

Benefits

- Ultra compact device designs that only require the smallest of spaces in distribution boards
- The modular design means that it is easy to add devices as your system expands

Technical specifications

			5TT3460	5TT3461
Standards			IEC 60255; DIN VDE 0435-110, -303	
Rated control circuit voltage U_c		V AC	230	
Primary operating range		× U_c	0.8 ... 1.1	
Rated frequency f_n		Hz	50/60	
Fault signaling inputs S1 ... S4		V AC	230	
Signal voltage		V	7 ... 10	
To terminals S and H				
Noise pulse duration		ms	≥ 100	
Acknowledgment pulse duration		ms	≥ 200	
Contacts				
• Rated operational voltage U_e		V AC	230	--
• Rated operational current I_e		A	5	--
• Minimum contact load		V; mA	10; 100	--
Connections				
• Terminals	± screw (Pozidriv)		PZ 1	
• Conductor cross-sections				
- Rigid, max.		mm^2	2 × 2.5	
- Flexible, with end sleeve, min.		mm^2	1 × 0.5	
Permissible ambient temperature		°C	-20 ... +60	
Humidity class	Acc. to IEC 60068-2-30		F	

Selection and ordering data

	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	V AC	A AC	V AC	MW	d					
Centralized fault signaling units with transparent cap										
	230	5	230	2		**5TT3460**		1	1 unit	1BK
Expansion fault signaling units with transparent cap										
	230	--	--	2		**5TT3461**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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5TT5 EMERGENCY STOP modules

Overview

EMERGENCY STOP circuits are common safety measures in all laboratory equipment and industrial plants. The EMERGENCY STOP modules used here must meet the most rigorous demands with regard to functional reliability. Benchmark is the degree of self-monitoring.

Benefits

- The electrical isolation between electric circuit and control meets the requirements of the standard
- An LED for the operating and switching state provides constant information on the operating state

Technical specifications

				5TT5200
Standards				IEC 60204-1; EN 60204-1 (VDE 0113-1)
Supply				
• Rated control circuit voltage U_c			V AC	230
- Primary operating range			× U_c	0.8 ... 1.1
• Rated frequency f_n			Hz	50
• Rated power dissipation P_v	Coil/drive			3.5
	Contact per pole		VA	0.8
Control voltage	Terminal Y1		V AC/DC	24
Control current	Terminal Y1		mA DC	45
Recovery time			ms	500
Safety				
• Electrical isolation, creepage distances and clearances, actuator/contact			mm	3
• Rated impulse withstand voltage U_{imp} actuator/contact			kV	> 4
Contacts				
• Contacts	NO contacts	AC-15	A	3
	NC contacts	AC-15	A	2
	NO contact/ NC contact	AC-1	A	5
• Contact gap			mm	> 1
• Electrical service life	AC-15, 2 A, 230 V AC		Switching cycles	10^5
• Reliable switching frequency			Switching cycles/h	600
Vibration resistance				
Amplitude	Acc. to EN 60068-2-610	Up to 55 Hz	mm	0.35
Connections				
• Terminals	± screw (Pozidriv)			PZ 1
• Conductor cross-sections of main current paths				
- Rigid	Max.		mm^2	2 × 2.5
- Flexible, with end sleeve	Min.		mm^2	1 × 0.5
Permissible ambient temperature			°C	0 ... +50
Resistance to climate	Acc. to EN 60068-1			0/55/04

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Selection and ordering data

		U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	**EMERGENCY STOP modules**										
		400	5	230	4		**5TT5200**		1	1 unit	1BK

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Level relays are used for the monitoring and control of conductive, non-combustible liquids and powders. They ensure overflow and dry run protection. Due to their sensor performance, the devices can also be used for general resistance monitoring.

LED displays:

- Green LED: Lights up when operational voltage is applied
- Yellow LED: Lights up if MIN output relay is activated
- Red LED: Lights up if MAX output relay is activated

Benefits

The measuring range up to 450 kΩ enables a differentiation between foam and liquid. It also increases the universal application for resistance measurements.

Due to its low-frequency, electrically isolated measuring circuit, the device has a high immunity to interference against system coupling, which enables cable lengths of up to 1500 m and suppresses the effects of electrolysis in the liquid

- The two outputs for minimum and maximum control can also be used for the advance warning and tripping of limit values
- 3 electrode connections for 1-step and 2-step level control
- All standard products can be used as electrodes
- High immunity to interference of the measuring circuit isolated from the system
- Programmable for open-circuit principle (with bridge X2 COM) or closed-circuit principle (without jumper)
- Separately adjustable delay times for $t_{v\,min}$ and $t_{v\,max}$, 0.2 s to 2 s

Technical specifications

			5TT3435
Standards			IEC 60255; DIN VDE 0435-110
Supply			
• Rated control circuit voltage U_c		V AC	230
- Primary operating range		× U_c	0.8 ... 1.1
• Rated frequency f_n		Hz	50/60
Setting range of the liquid level		kΩ	2 ... 450
Switching point hysteresis of set value			
• At 450 kΩ		%	3
• At 2 kΩ		%	6
Voltage temperature influence	From set value	%	< 2
Max. cable length to the electrodes at 100 µF/km	Setting kΩ		
	450	m	50
	100	m	200
	35	m	500
	10	m	1500
	5	m	3000
Electrode voltage	Max.	V AC	Approx. 10
Electrode current	Max.	mA AC	Approx. 1.5
Response delay	Adjustable	s	0.2 ... 20
OFF-delay	Adjustable	s	0.2 ... 20
Rated operational voltage U_e		V	250
Rated operational current I_e		A	5
Test voltage			
	Input/auxiliary circuit	kV	4
	Input/output circuit	kV	4
	Auxiliary/output circuit	kV	4
Connections			
• Terminals	± screw (Pozidriv)		PZ 2
• Conductor cross-sections			
- Rigid	Max.	mm^2	2 × 2.5
- Flexible, with end sleeve	Min.	mm^2	1 × 0.5
Permissible ambient temperature		°C	-20 ... +60
Resistance to climate	Acc. to EN 60068-1		20/60/4

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

		U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	**Level relays**	230	4	230	2		**5TT3435**		1	1 unit	1BK
	**Immersion electrodes** • Made of stainless steel, with PG13 sealing cap • Temperature range 0 ... 60 °C • Suitable for pure water in open containers With terminal connection						**5TG8223**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Line circuit relays are used to interrupt circuits and prevent electromagnetic fields in circuits where there are currently no active loads. If the loads are disconnected, and the line circuit relay measures a usage of only 2 to 20 VA – adjustable – it disconnects the cable to the supply voltage and switches over to extra-low voltage. As soon as loads are reconnected, the line circuit relay detects the increase in usage and switches back to the supply voltage. While the line circuit relay switches off any unnecessary system components, it is not a device for ensuring isolation in the sense of safe disconnection.

The line circuit relay is unable to detect consumers with electronic power supply units, e.g. electronically controlled vacuum cleaners. It is expedient to connect such devices to a base load resistor (PTC resistor) so that the line circuit relay is reset to supply voltage.

Benefits

- High availability to a wide range of loads, as all resistive, capacitive and inductive loads are detected
- Adjustable from 2 to 20 VA
- With status display for contact adjustment
- With switch continuously ON
- With safety information on stickers for socket outlets and distribution boards

Technical specifications

			5TT3171
Standards			IEC 60255; DIN VDE 0435-110
Rated control circuit voltage U_c		V AC	230
Primary operating range		× U_c	0.85 ... 1.15
Rated frequency		Hz	50/60
Rated power dissipation P_v	Electronics Contacts	VA VA	5 2.6
Monitoring voltage		V	3
Response value	Adjustable	VA	2 ... 20
Release value	% of the response value		70
Rated impulse withstand voltage U_{imp}	Input/output	kV	> 4
Rated operational voltage U_e		V AC	250
Rated operational current I_e	AC-1 AC-11	A A	16 3
Contacts			μ contact
Electrical service life	In switching cycles at 3 A	AC-11	5×10^5
Terminals	± screw (Pozidriv)		PZ 1
Conductor cross-sections			
• Rigid • Flexible, with end sleeve	Max. Min.	mm^2 mm^2	2 × 2.5 1 × 0.5
Permissible ambient temperature		°C	-20 ... +45
Degree of protection	Acc. to IEC/EN 60529		IP20, with connected conductors
Safety class	Acc. to EN 61140/VDE 0140-1		II
Humidity class	Acc. to IEC 60068-2-30		F

Selection and ordering data

	Contacts	U_e	I_e	U_c	Mounting width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		V AC	A AC	V AC	MW	d					
	**Line circuit relays** For disconnecting the voltage of electrical systems even when loads are disabled										
	1 NC	250	16	230	1		**5TT3171**		1	1 unit	1BK
	Base load resistors for electronic devices With 15 cm connection wires, end sleeves and shrink sleeving						**5TG8222**		1	1 unit	1BK

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Introduction

Overview

IEC/EN 61851 describes the safety requirements that must be met by conductive charging systems for electric vehicles. Standard-compliant AC charging in charging mode 3 requires a charging station with safety-relevant functions.

Application

Our charging units are system-tested, CE-compliant charging stations for charging electric vehicles in operational mode 3 according to IEC/EN 61851 and IEC/EN 62196 for indoor and outdoor use, such as carports, garages, workshops, underground parking garages or multistory parking garages.

Design

Charging unit for wall mounting



The modern functional design of the WB140A combines with its ease of handling to provide an optimal solution. It complies with the revised standard IEC 62196-2 and comes with the new charging coupler Type 2 Generation 2. This ensures compatibility with future generations of electric vehicles.

Installing electric vehicle chargers in older buildings can be a challenge. With the WB140A charging unit, the maximum value for the charging current can be adjusted by an electrical expert to match facility capability. The settings range from a maximum current of 32/20 A to 10 A. The charging unit cable can be connected optionally from the rear or from below. The delay function supports setting a charging delay in two-hour increments (2/4/6/8 hours) up to a max. of 8 hours. This allows charging with PV current or utilizing off-peak tariffs. The charging process starts automatically after the time delay has elapsed.

Large LEDs at top right and top left in the housing indicate the current operational status even from a distance. The following states are displayed:
"Ready-to-charge" / "Charging" / "Fault".

Charging cable for home and travel



Charge flexibly and safely

Charging with the new CC100A charging cable in charging mode 2 in compliance with IEC 61851-1 is a safe and convenient alternative to using charging stations or posts. The mobile charging station for home and travel can be simply connected to common household plug-and-socket devices. The intuitive control box enables fast and easy adaptation of the charging current to any building installation. The integrated type A RCCB circuit breaker meets the requirements for safe charging of electric vehicles in compliance with IEC 61851.

Functions for more safety

The clearly arranged LED indications on the control box indicate faults that cause automatic interruption of charging. Multiple-level temperature management interrupts charging if temperatures are too high or too low. Multiple-level temperature management therefore prevents a thermal overload. Charging is continued automatically once the temperature returns to a normal level. During the self-test before the start of every charging operation, wiring faults and welded contacts are also detected and are indicated to users by LEDs. The circuit is interrupted immediately in the event of a fault, thus providing comprehensive protection for users and electric vehicles.

Practical, robust enclosure

The CC100A charging cable's functional and ergonomic design permits easy operation and space-saving storage. The enclosure and the charging coupler are resistant to vehicles passing over them and also to soiling, moisture and temperature fluctuations. The control box even achieves the high IP67 degree of protection.

Universal in use

The range includes versions that cater for most common plug sockets in Europe. And e.g. the internationally used camping plug (CEE blue 6h) enables faster single-phase charging at 16 A (charging power 3.7 kW). The new CC100A charging cable is available with type-1 or type-2 vehicle charging couplers, enabling connection to virtually any commercially available vehicle.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

		WB140A		
		5TT3201-1KK25	**5TT3201-1KK27**	**5TT3201-1KK37**
Standards		IEC/EN 61851-1; IEC/EN 61851-22; IEC/EN 62196-1; IEC 62196-2;		
Operational voltage	V AC	230	230/400	
Rated frequency	Hz	50/60		
Rated current	A	1 x 20	3 x 20	3 x 32
Degree of protection		IP44		
Safety class		I		
Touch protection according to EN 50274		Finger and back-of-hand safe		
Ambient conditions				
• Ambient temperature	°C	-25 ... +40		
• Storage temperature	°C	-30 ... +60		
• Relative humidity	%	≤ 95		
• Installation location		Suitable for interior and exterior use		
Mains connection		Bottom/rear		
Conductor cross-sections	mm^2	1.50 ... 6		2.5 ... 10
Enclosure				
• Material		Plastic		
• Color		RAL 7035 (light gray)		
• Dimensions (H x W x D)	mm	420 x 420 x 483		
• Weight	kg	5.5	5.8	6.6
• Door/hinged lid		Plastic		
• Lock		--		
Charging outlet				
• Charging mode according to IEC 61851-1		3		
• Connection type according to IEC 62192		C, charging cable with charging coupler Type 2 Gen 2		
Charging outlet contactor				
• Rated operating current	A	40	40	40
• Number of poles		2 NO	4 NO	4 NO
Residual current protective device				
• RCCBs		--		
• Version		--		
• Rated current	A	--		
• Rated residual current	mA	--		
Conductor protection				
• Miniature circuit breaker		--		
• Tripping characteristic		--		
• Rated current	A	--		
• Rated breaking capacity	kA	--		
Operator controls		PAUSE (STOP/START charging process) DELAY 2, 4, 6, 8 hours (charging process delay)		
Displays		LED, green, orange, red, blue		
Length of charging cable	m	4		

Selection and ordering data

	Rated current	Plug type	Rated operational voltage	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		V AC						
	**WB140A charging unit with charging cable and charging coupler**								
	20	2 Gen 2	230		**5TT3201-1KK25**		1	1 unit	1DA
	20	2 Gen 2	230/400		**5TT3201-1KK27**		1	1 unit	1DA
	32	2 Gen 2	230/400		**5TT3201-1KK37**		1	1 unit	1DA

Minimum order quantity (PS) or a multiple thereof can be ordered.

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CC100A charging cable

Overview



1 Adjustment of max. charging current
2 Display of selected charging current
3 Status display for electric vehicles
4 Status display for building infrastructure

CC100A charging cable

Benefits

User-friendliness

- Intuitive operation with self-explanatory symbols and unambiguous display elements.
- The large keys for setting the maximum load current are easy to operate, even when wearing gloves.
- Following a power failure, the charging process continues automatically. No action is necessary on the part of the user.
- The charging cable can be used in extreme environmental conditions without issue. Temperatures down to -32 °C, snow, salt or moisture are not a problem for the cable or control box – and they can also cope with water jets, such as from a garden hose (degree of protection IP65). The control box has even been tested for leaks while submerged up to 1 m under water (IP67).
  While plugged in, the building-end plug and the vehicle-end charging coupler are protected against water splashed on all sides (IP44), thus enabling easy charging of a vehicle outdoors in any weather.
- The durable, rugged housing is resistant to the considerable strains of everyday use on the move. The electronic circuitry is protected even if a vehicle inadvertently rolls over it, in accordance with the requirements of IEC 62335.
- The rounded design of the control box makes it easy to roll up the cable.

Automatic temperature control

In the event of inadmissible heat development due to a defect in the building socket (e.g. worn plug contacts or loose screw connections) or during charging in a hot environment, the unit and the socket are protected against damage by a temperature sensor in the plug and in the control box:

- The charging current is reduced automatically if an excess temperature is detected in the control box or in the plug.
- During active current reduction, the charging process is continued with the minimum current (6 A) and users are informed by a flashing LED. The operation is continued with the set charging current as soon as the temperature is within the normal temperature range again.
- Camping plugs and camping sockets are designed for continuous operation with loads of 16 A, and as such, these cable versions do not require temperature monitoring in the camping plug. The temperature is nevertheless still monitored in the control box, even for these versions.

Safety features

- The maximum charging current can be adjusted to country-specific restrictions or older building installations in which only low charging currents are allowed. This avoids any dangerous overloading of the building's electrical installation.
- The control box contains an electronic RCCB to also ensure that persons are protected – regardless of the local electrical system. This ensures compliance with IEC 61851 for charging mode 2.
- The integrated RCCB circuit breaker opens on response of the L, N and PE cables' relay contacts. The inclusion of the PE cable in residual current protection ensures that persons are also protected in the event of certain hazardous wiring faults (e.g. protection against electrocution in the event that the L and PE contacts in the building socket have been inadvertently swapped during wiring and so PE is live).
- A fully automatic self-test of the cable, which checks all safety attributes – including the continuity of the PE conductor connection in the on-site infrastructure – is performed during commissioning and before the start of every charging operation.
- Users are warned immediately by a red LED fault indication if relay contacts are welded.
- If a fault occurs during charging, e.g. if the vehicle PE conductor is defective, charging is interrupted and the relay contacts are opened. Users are warned straight away by a red LED fault indication.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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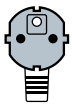
Technical specifications

CC100A charging cable		5TT3201-...			
		-1KK80	-1KK81	-1KK82	-1KK83
Line-side plug type					
• With SCHUKO R combination plug 90° (CEE 7/7) 		✔	✔	--	--
• With camping plug (CEE blue 6 h) 		--	--	✔	✔
Charging coupler (on vehicle)					
• With type 1 charging coupler 		--	✔	--	✔
• With type 2 charging coupler 		✔	--	✔	--
Length of cable					
• Total length of cable	m	4	8		
• Cable length (building end)	m	1.4		0.3	
Charging mode according to IEC 61851-1		Charging mode 2, keys for setting the charging current			
Standards		IEC/EN 61851-1; IEC/EN 62196; IEC 62335			
Supply voltage	V AC	230			
Frequency	Hz	50 Hz			
Line system configuration		TN, TNC, TNS, TT			
Max. rated current	A	13		16	
Adjustable charging current	A	6, 8, 10, 13		6, 8, 10, 13, 16	
Max. charging power	kW	3		3.7	
Power loss	W	< 9			
Rated residual current	mA	30			
RCCBs (electronic)	Type	A			
Degree of protection acc. to IEC/EN 60529					
• Control box		IP67			
• Charging coupler (on vehicle)		IP44			
• Plug (line-side)		IP44			
Safety class		II			
Overvoltage category		CAT II			
Touch protection according to EN 50274		Finger and back-of-hand safe			
Ambient conditions					
• Operating temperature	°C	-32 ... +40			
• Storage temperature	°C	-40 ... +75			
• Relative humidity	%	max. 95			
• Installation location		Suitable for interior and exterior use			
Enclosure					
• Material		Plastic			
• Color		Light gray (RAL 7035) and black			
• Dimensions (H x W x D)	mm	52 x 240 x 100			
• Weight	kg	2.5	2.9	3.2	2.8
Displays		LEDs, green and red			

Selection and ordering data

	Rated current (max. charging current)	Charging coupler Type	Rated operational voltage	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	A		V AC	d					
	CC100A charging cable with SCHUKO combination plug								
	13	2	230		**5TT3201-1KK80**		1	1 unit	1DA
	13	1	230		**5TT3201-1KK81**		1	1 unit	1DA
	CC100A charging cable with camping plug								
	16	2	230		**5TT3201-1KK82**		1	1 unit	1DA
	16	1	230		**5TT3201-1KK83**		1	1 unit	1DA

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Notes

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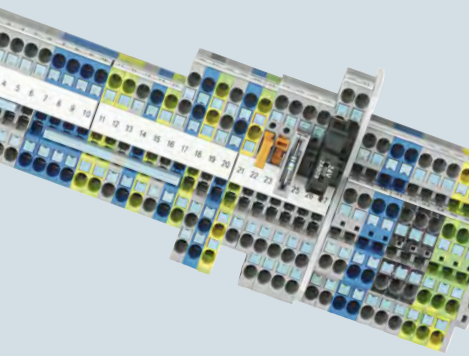

14/2 **Introduction**
14/2 General data
14/3 Support rails/protective conductor busbars
14/4 8WH order selection

8WH6 iPo plug-in terminals
14/9 Introduction
14/10 General data
14/11 8WH6 through-type terminals
14/18 8WH6 through-type terminals (high-current terminals) NEW
14/21 8WH6 two-tier terminals
14/23 8WH6 fuse terminals
14/24 8WH6 isolating blade terminals
14/26 8WH6 isolating terminals
14/28 8WH6 initiator/actuator terminals NEW

8WH6 iPo installation terminals
14/32 Introduction
14/33 General data
14/34 8WH through-type terminals
14/36 8WH through-type screw terminals
14/38 8WH N-conductor isolating terminals
14/40 8WH N-conductor isolating screw terminals
14/42 8WH installation terminals

8WH2 spring-loaded terminals
14/45 Introduction
14/46 General data
14/50 8WH through-type terminals
14/61 8WH hybrid through-type terminals
14/64 8WH fuse terminals
14/66 8WH isolating blade terminals
14/68 8WH isolating terminals
14/70 8WH two-tier terminals
14/76 8WH three-tier terminals
14/78 8WH four-tier motor terminals
14/80 8WH diode terminals
14/82 8WH two-tier diode terminals

8WH5 combination plug-in terminals
14/84 Introduction
14/87 8WH5 through-type terminals
14/89 8WH5 hybrid through-type terminal with iPo connection
14/90 8WH9 plugs

8WH3 insulation displacement terminals
14/93 Introduction
14/96 8WH through-type terminals
14/100 8WH two-tier terminals
14/102 8WH isolating terminals

8WH1 screw terminals
14/104 Introduction
14/105 General data on 8WH
14/106 8WH through-type terminals
14/110 8WH fuse terminals
14/112 8WH isolating blade terminals
14/113 8WH isolating terminals
14/114 8WH two-tier terminals
14/117 8WH two-tier terminals with isolating function/isolating blade
14/119 8WH measuring transformer terminals
14/122 8WH diode terminals
14/123 8WH two-tier diode terminals
14/126 8WH high-current terminals
14/130 8WH shield terminals

Accessories for 8WH terminal blocks
14/135 Accessories for labeling system
14/136 Standard labeling system
14/141 Mounting accessories

8WA1 screw terminals
14/144 Introduction
14/145 General data on 8WA
14/151 8WA through-type terminals
14/157 8WA N-conductor isolating and branch terminals
14/159 8WA Insta or three-tier terminals
14/161 8WA two-tier terminals
14/163 8WA two-tier terminals with electronic components
14/165 8WA diode and isolating terminals
14/166 8WA terminals for components
14/167 8WA fuse terminals
14/168 8WA through-type terminals with soldered and plug-in connection
14/169 8WA measuring transformer terminals

8WA2 spring-loaded terminals
14/172 8WA initiator/actuator terminals

Accessories for 8WA terminal blocks
14/175 Accessories for labeling system
14/176 Standard labeling system
14/178 Mounting accessories

For further technical product information:

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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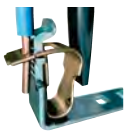
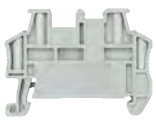
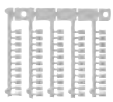
General data

Overview

	Connection system	Page	Special features
8WH terminal blocks			
 	8WH6 iPo plug-in terminals (iPo: in-Push-out)	14/9	The iPo connection method combines the advantages of spring-loaded and plug-in terminals – both rigid and flexible wires are easy to insert without the need for tools. Fast installation – with a minimum of effort and maximum contact stability.
 	8WH6 iPo installation terminals	14/32	The iPo connection method combines the advantages of spring-loaded and plug-in terminals – both rigid and flexible wires are easy to insert without the need for tools. Fast installation – with a minimum of effort and maximum contact stability. Fast removal by simply pressing the unlatching button.
 	8WH2 spring-loaded terminals	14/45	With the spring-loaded connection method, the tension spring exerts constant pressure on the conductor, which ensures excellent contact stability – even with applications subject to high levels of vibration. Fast removal by simply pressing the unlatching button.
 	8WH5 combination plug-in terminals	14/84	Combination plug-in terminals are used where high availability is essential in the event of a fault. The contact system is able to withstand even extreme levels of vibration and both the terminal and the connector are fingerproof.
 	8WH3 insulation displacement terminals	14/93	Thanks to the use of insulation displacement terminals, there is no need to strip the conductor. This ensures secure contact between the conductor and the connecting wire of the terminal.
 	8WH1 screw terminals	14/104	The screw terminals have an impressively compact design and offer optimum handling. The elastic deformation capability of the terminal body prevents any creepage of the clamped conductor. Suitable for applications up to 1000 V DC.
  	Accessories for 8WH	14/135	The 8WH accessories supplement the 8WH product range with the additional components required for installation.
8WA terminal blocks			
 	8WA1 screw terminals	14/144	The tried and tested screw terminals are insulated on both sides and enclosed at both ends. These terminals are extremely robust and can withstand high mechanical and thermal loads.
	8WA2 spring-loaded terminals • 8WA2 initiator/actuator terminals	14/172	Fast and cost-effective connection of signal transmitters.
 	Accessories for 8WA	14/175	The 8WA terminal block accessories supplement the 8WA product range with the additional components required for installation.

14

Rated short-time withstand current

Our terminals are able to withstand a rated short-time current corresponding to a current density of 120 A/mm^2 specific to the rated cross-section for one second.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Support rail type							Excerpt from IEC 60947-7-2/EN 60947-7-2/ VDE 0611 Part 3		
Width	Height	Thick-ness	Perforation type	Material	Surface	Rail profile	Short-circuit strength (Cu conductor)	Short-time withstand current, 1 s	Max. permissible thermal rated current with PEN function
mm	mm	mm					mm^2 [1]	kA	A
35	7.5	1.5	Non-perforated	Steel	Chromated	Standard mounting rail, acc. to EN 60715 – 35 × 7.5	16	1.92	[1]
35	7.5	1.5	Perforated	Steel	Chromated	Standard mounting rail, acc. to EN 60715 – 35 × 7.5	16	1.92	[2]
35	7.5	1.5	Non-perforated	Steel	Galvanized	Standard mounting rail, dimensions acc. to EN 60 715 – 35 × 7.5	16	1.92	[2]
35	7.5	1.5	Perforated	Steel	Galvanized	Standard mounting rail, dimensions acc. to EN 60 715 – 35 × 7.5	16	1.92	[2]
35	7.5	1.5	Non-perforated	V2A high-grade steel	Chromated	Standard mounting rail, dimensions acc. to EN 60 715 – 35 × 7.5	16	1.92	[2]
35	7.5	1.5	Non-perforated	Copper	Chromated	Standard mounting rail, dimensions acc. to EN 60 715 – 35 × 7.5	50	6.0	150
35	7.5	1.5	Non-perforated	Aluminum	Chromated	Standard mounting rail, dimensions acc. to EN 60 715 – 35 × 7.5	35	4.2	125
35	15	2.3	Non-perforated	Steel	Chromated	Standard mounting rail, acc. to EN 60 715 – 35 × 15	50	6.0	[2]
35	15	1.5	Non-perforated	Steel	Chromated	Standard mounting rail, similar to EN 60 715 – 35 × 15	35	4.2	[2]
35	15	1.5	Perforated	Steel	Chromated	Standard mounting rail, similar to EN 60 715 – 35 × 15	35	4.2	[2]
35	15	1.5	Non-perforated	Steel	Galvanized	Standard mounting rail, similar to EN 60 715 – 35 × 15	35	4.2	[2]
35	15	1.5	Perforated	Steel	Galvanized	Standard mounting rail, similar to EN 60 715 – 35 × 15	35	4.2	[2]
35	15	1.5	Non-perforated	Copper	Chromated	Standard mounting rail, similar to EN 60 715 – 35 × 15	95	11.4	232
35	15	1.5	Non-perforated	Aluminum	Chromated	Standard mounting rail, similar to EN 60 715 – 35 × 15	70	8.4	192

[1] Cross-sections calculated acc. to IEC 60439-1 / EN 60439-1 / EN 60439-1 / VDE 0660 Part 500.

[2] Steel protective conductor busbars are not permissible for PEN function.

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8WH order selection

Terminal type	Connection type	Design	Number of terminals	Version	MLFB digits 1...9 / MLFB digits 8...12	
Installation terminals	iPo	Standard	2	L	8WH6001-	
			4	L/L	8WH6001-	
			4	L/N	8WH6001-	
			5	PE/L/L	8WH6001-	
			5	PE/L/N	8WH6001-	
			5	PE/L/NT	8WH6001-	
			5	PE/L/N isolating blade	8WH6001-	
			5	PE/L/L isolating blade	8WH6001-	
			5	PE/L/L through-type term. for isolat. term.	8WH6001-	
			5	PE/L/L isolation	8WH6001-	
	Spring-loaded terminals	Two-tier	4	L/PE	8WH2020-	
			4	N/PE	8WH2020-	
			4	N/L	8WH2020-	
		Three-tier	6	PE/L/N	8WH2030-	
			6	PE/L/L	8WH2030-	

Article No., e.g. 8WH6001- 4FF00

Insta terminal: Plug-in design · 5 connection points 2.5 mm² · Range of functions

The table above uses a sample order to provide an initial overview of the article numbering system for iPo installation terminals.

This table does not, however, show the complete range of 8WH iPo installation terminals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	1.5 mm²			2.5 mm²				4 mm²		
	Through-type terminal, gray	Through-type terminal, blue	PE terminal, green/yellow	Through-type terminal, gray	Through-type terminal, blue	PE terminal	Terminals with range of functions	Through-type terminal, gray	Through-type terminal, blue	PE terminal, green/yellow
							4QF00			
							4DF00			
							4CF00			
							4HF00			
							4EF00			
							4FF00			
							4GF00			
							4NF00			
							4PF00			
							4MF00			
							4AF00			
							4BF00			
							4CF00			
							4EF00			
							4HF00			

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14

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8WH order selection

Connection type	Terminals	Design	Number of terminals	MLFB digits 1...7 / MLFB digits 8...12	1.5 mm²				2.5 mm²							
					Through-type terminal, gray	Through-type terminal, colored	Through-type terminal, blue	PE terminal, green/yellow	Through-type terminal, gray	Through-type terminal, colored	Through-type terminal, blue	Instrument isolating terminal, blue	Isolating terminal, gray	Instrument isolating terminal, gray	PE terminal, green/yellow	
Screw terminal	Standard		2	8WH1000-					0AF00		0AF01				0CF07	
		Two-tier	4	8WH1020-					0AF00		0AF01				0CF07	
		Two-tier	4	8WH1025-					0AF00							
Spring-loaded termina	Standard		2	8WH2000-	0AE00	0AE0[1)]	0AE01	0CE07	0AF00	0AF0[1)]	0AF01		6AF00	6CF00	0CF07	
			3	8WH2003-	0AE00		0AE01	0CE07	0AF00		0AF01		6AF00	6CF00	0CF07	
			4	8WH2004-	0AE00		0AE01	0CE07	0AF00		0AF01	6CF01	6AF00	6CF00	0CF07	
		Two-tier	4	8WH2020-	0AE00		0AE01	0CE07	0AF00		0AF01				0CF07	
			6	8WH2023-					0AF00		0AF01				0CF07	
		Two-tier 1 pol.	6	8WH2022-					0AF00							
			4	8WH2025-	0AE00				0AF00		0AF01					
		Three-tier	6	8WH2030-					0AF00		0AF01					
		Three-tier	6	8WH2035-					0AF00						0CF07	
		Four-tier	8	8WH2040-					4LF00							
	Molded-case		2	8WH2500-					0AF00		0AF01		6AF00	6CF00	0CF07	
			3	8WH2503-					0AF00		0AF01				0CF07	
			4	8WH2504-					0AF00		0AF01				0CF07	
		Two-tier	4	8WH2520-					0AF00		0AF01				0CF07	
iPo	Standard		2	8WH6000-					0AF00		0AF01				0CF07	
			3	8WH6003-					0AF00		0AF01				0CF07	
			4	8WH6004-					0AF00		0AF01				0CF07	
		Two-tier	4	8WH6020-					0AF00		0AF01				0CF07	
Combi-nation plugs	Standard		2	8WH5000-					0AF00		0AF01				0CF07	
			4	8WH5004-					0AF00		0AF01				0CF07	
Insulation displace-ment terminal technology (IDC)	Standard		2	8WH3000-	0AE00		0AE01	0CE07	0AF00		0AF01				0CF07	
			3	8WH3003-	0AE00		0AE01	0CE07	0AF00		0AF01				0CF07	
			4	8WH3004-	0AE00		0AE01	0CE07								
		Two-tier	4	8WH3020-	0AE00		0AE01	0CE07								

Article No., e.g. 8WH2500- 0AF00

Standard terminal: Spring-loaded terminal · compact · 2 connection points · 2.5 mm² · Through-type terminal, gray

The table above uses a sample order to provide an initial overview of the article numbering system.

This table does not, however, show the complete 8WH range.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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4 mm²						6 mm²				10 mm²			16 mm²			35 mm²		
Through-type terminal, gray	Through-type terminal, colored	Through-type terminal, blue	Isolating terminal, gray	Instrument isolating terminal, gray	PE terminal, green/yellow	Through-type terminal, gray	Through-type terminal, blue	Isolating terminal, blue	PE terminal, green/yellow	Through-type terminal, gray	Through-type terminal, blue	PE terminal, green/yellow	Through-type terminal, gray	Through-type terminal, blue	PE terminal, green/yellow	Through-type terminal, gray	Through-type terminal, blue	PE terminal, green/yellow
0AG00		0AG01	6AG00	6CG00	0CG07	0AH00	0AH01	6AH00	0CH07	0AJ00	0AJ01	0CJ07	0AK00	0AK01	0CK07	0AM00	0AM01	0CM07
0AG00		0AG01	6AG00	6AC00	0CG07													
0AG00																		
0AG00	0AG0[1)]	0AG01	6AG00	6CG00	0CG07	0AH00	0AH01		0CH07	0AJ00	0AJ01	0CJ07	0AK00	0AK01	0CK07	0AM00	0AM01	0CM07
0AG00		0AG01			0CG07	0AH00	0AH01		0CH07									
0AG00		0AG01			0CG07	0AH00	0AH01		0CH07									
0AG00		0AG01			0CG07													
0AG00																		
4GL00																		
0AG00		0AG01			0CG07	0AH00	0AH01		0CH07									
0AG00		0AG01			0CG07	0AH00	0AH01		0CH07									
0AG00		0AG01			0CG07													
0AG00		0AG01			0CG07													
0AG00		0AG01			0CG07	0AH00	0AH01		0CH07	0AJ00	0AJ01	0CJ07	0AK00	0AK01	0CK07	0AM00	0AM01	0CM07
0AG00		0AG01			0CG07													
0AG00		0AG01			0CG07													

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[1)]

Red	Green	Orange	White	Yellow	Black
0AE02	0AE03	0AE04	0AE05	0AE06	0AE08

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Notes

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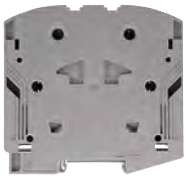
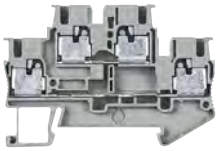
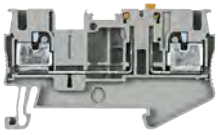
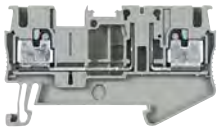
Overview

	Devices	Page	Function
	Through-type terminals	14/11	Connection of incoming and outgoing conductors
	Through-type terminals (high-current terminals) NEW	14/18	Connection of incoming and outgoing conductors with larger cross-sections 50 ... 150 mm^2
	Two-tier terminals	14/21	Compact form of the terminal blocks in which two connection wires can be installed
	Fuse terminals	14/23	Terminals which can be used to protect control circuits, for example
	Isolating blade terminals	14/24	Isolation of the circuit, e.g. for test purposes
	Isolating terminals	14/26	Isolation of the circuit, e.g. for test purposes
	8WH6 initiator-actuator terminals NEW	14/28	Fast and cost-effective connection of signal transmitters to the controller

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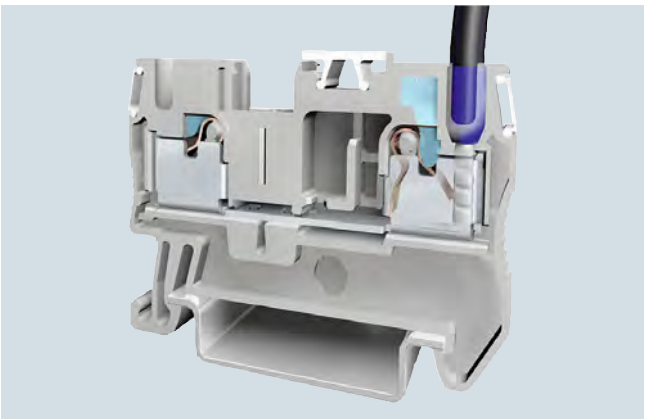
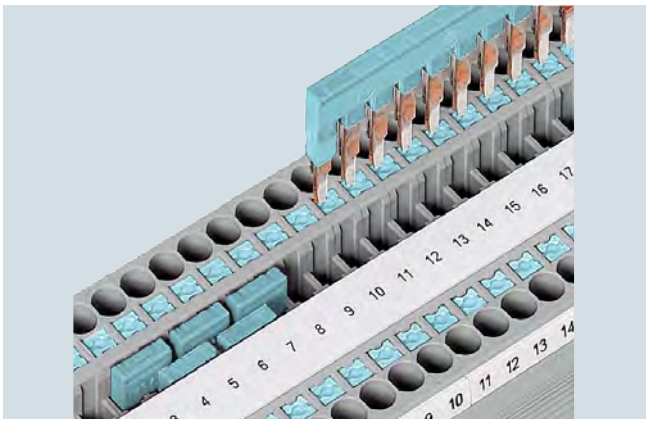
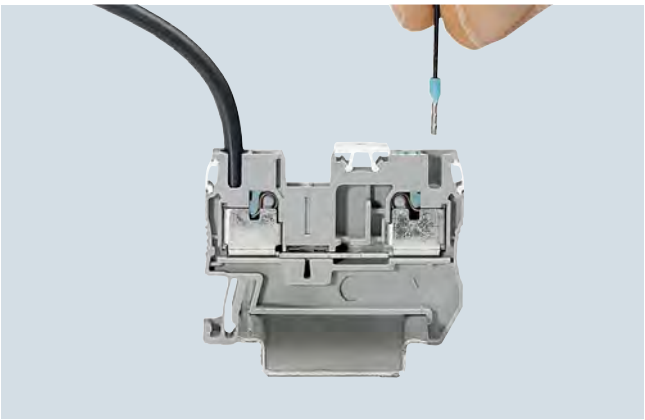
Overview



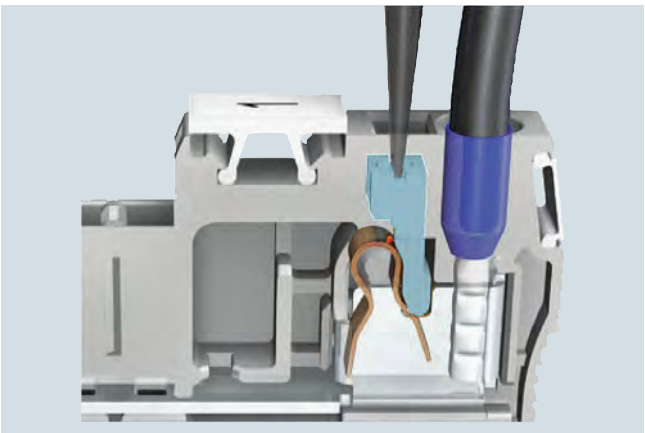
iPo connection method: Characterized by its simple and direct conductor connection, this series utilizes all the benefits of the 8WH system.



Easy bridging: The double bridge shaft supports the interconnection of any number of terminals using 2-pole jumpers. The 2-pole to 50-pole jumpers enable up to 50 terminals to be connected in a single step.



Super-light insertion: With an up to 50% lower insertion force, the iPo connection method permits easy and direct insertion of rigid and flexible conductors with end sleeves with a cross-section of more than 0.34 mm^2.



Pusher button function: The actuation button is used to open the spring to either release the conductor or to connect smaller cross-sections from 0.14 mm^2. It can be operated by any tool.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



8WH6 through-type terminals are ideal for the direct tool-free wiring of conductors with end sleeve or rigid conductors. Easy insertion of flexible conductors with end sleeves upwards of 0.34 mm^2. The actuation button can be used to open the clamping point with any type of screwdriver in order to unwire or wire small conductors. The compact design and front connection permit wiring in the narrowest of spaces. The double bridge shaft enables fast creation of an individual potential distribution and infeed, e.g. using a screw terminal.

A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

Technical specifications

	8WH6000-0AF00 8WH6000-0AF01 2.5 mm^2	**8WH6003-0AF00 8WH6003-0AF01 2.5 mm^2**	**8WH6004-0AF00 8WH6004-0AF01 2.5 mm^2**
Dimensions			
• Width / length / height (NS 35/7.5) in mm	5.2 / 48.5 / 36.5	5.2 / 60.5 / 36.5	5.2 / 72 / 36.5
Max. technical specifications			
• I_{max} in A	30	30[1)]	
• U_{max} in V	800		
• Max. Ø in mm^2	0.14 ... 4		
• AWG	26 ... 12		
Rating according to IEC 60947-7-1			
• Rated voltage in V (IEC / UL/CSA)	800 / 600		800 / --
• Rated current in A / cross-section in mm^2			
- IEC	24 / 2.5	24[1)] / 2.5	
- UL/CSA	20 / --		--
• Rated cross-section in mm^2	2.5		
• AWG cross-section range (IEC / UL/CSA)	26 ... 12 / 24 ... 12		26 ... 12 / --
Connection capacities			
• 1 conductor			
- Rigid in mm^2	0.14 ... 4		
- Flexible in mm^2	0.14 ... 2.5		
- End sleeve with/without plastic sleeve in mm^2	0.14 ... 2.5		
• Conductor cross-section, direct plug-in			
- Rigid in mm^2	0.34 ... 4		
- End sleeve with/without plastic sleeve in mm^2	0.34 ... 2.5		
General data			
• Stripped length in mm	10		
• Molded plastic	PA		
• Flammability Class acc. to UL 94	V0		

1) The total current through all connected conductors must not exceed the maximum load current.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8WH6 through-type terminals

	8WH6000-0CF07 2.5 mm²	8WH6003-0CF07 2.5 mm²	8WH6004-0CF07 2.5 mm²
Dimensions			
• Width / length / height (NS 35/7.5) in mm	5.2 / 48.5 / 36.5	5.2 / 60.5 / 36.5	5.2 / 72 / 36.5
Max. technical specifications			
• Max. Ø in mm²	0.14 ... 4		
• AWG	26 ... 12		
Rating according to IEC 60947-7-1			
• Rated cross-section in mm²	2.5		
• AWG cross-section range (IEC / UL/CSA)	26 ... 12 / 24 ... 12		26 ... 12 / --
Connection capacities			
• 1 conductor			
- Rigid in mm²	0.14 ... 4		
- Flexible in mm²	0.14 ... 2.5		
- End sleeve with/without plastic sleeve in mm²	0.14 ... 2.5		
• Conductor cross-section, direct plug-in			
- Rigid in mm²	0.34 ... 4		
- End sleeve with/without plastic sleeve in mm²	0.34 ... 2.5		
General data			
• Stripped length in mm	10		
• Molded plastic	PA		
• Flammability Class acc. to UL 94	V0		

	8WH6000-0AG00 8WH6000-0AG01 4 mm²	8WH6003-0AG00 8WH6003-0AG01 4 mm²	8WH6004-0AG00 8WH6004-0AG01 4 mm²
Dimensions			
• Width / length / height in mm	6.2 / 56 / 36.5	6.2 / 66.5 / 36.5	6.2 / 77 / 36.5
Max. technical specifications			
• I_{max} in A	38	38[1)]	38[1)]
• U_{max} in V	800	800	800
• Max. Ø in mm²	0.2 ... 6	0.2 ... 6	0.2 ... 6
• AWG	24 ... 10	24 ... 10	24 ... 10
Rating according to IEC 60947-7-1			
• Rated voltage in V (IEC / UL/CSA)	800 / 600	800 / 600	800 / 600
• Rated current in A / cross-section in mm²			
- IEC	32/ 4	32[1)] / 4	32[1)]/ 4
- UL/CSA	30 / --	30 / --	30 / --
• Rated cross-section in mm²	4	4	4
• AWG cross-section range (IEC / UL/CSA)	24 ... 10 / 24 ... 10	24 ... 10 / 24 ... 10	24 ... 10 / 24 ... 10
Connection capacities			
• 1 conductor			
- Rigid in mm²	0.2 ... 6	0.2 ... 6	0.2 ... 6
- Flexible in mm²	0.2 ... 4	0.2 ... 4	0.2 ... 4
- End sleeve with/without plastic sleeve in mm²	0.25 ... 4	0.25 ... 4	0.25 ... 4
• Conductor cross-section, direct plug-in			
- Rigid in mm²	0.5 ... 6	0.2 ... 6	0.5 ... 6
- End sleeve with/without plastic sleeve in mm²	0.5 ... 4	0.5 ... 4	0.5 ... 4
General data			
• Stripped length in mm	12	12	12
• Molded plastic	PA	PA	PA
• Flammability Class acc. to UL 94	V0	V0	V0

1) The total current through all connected conductors must not exceed the maximum load current.

	8WH6000-0CG07 4 mm²	8WH6003-0CG07 4 mm²	8WH6004-0CG07 4 mm²
Dimensions			
• Width / length / height (NS 35/7.5) in mm	6.2 / 56 / 36.5	6.2 / 66.5 / 36.5	6.2 / 77 / 36.5
Max. technical specifications			
• Max. Ø in mm²	0.2 ... 6	0.2 ... 6	0.2 ... 6
• AWG	24 ... 10	24 ... 10	24 ... 10
Rating according to IEC 60947-7-1			
• Rated cross-section in mm²	4	4	4
• AWG cross-section range (IEC / UL/CSA)	24 ... 10 / 24 ... 10	24 ... 10 / 24 ... 10	24 ... 10 / 24 ... 10
Connection capacities			
• 1 conductor			
- Rigid in mm²	0.2 ... 6	0.2 ... 6	0.2 ... 6
- Flexible in mm²	0.2 ... 4	0.2 ... 6	0.2 ... 6
- End sleeve with/without plastic sleeve in mm²	0.25 ... 4	0.2 ... 4	0.2 ... 4
• Conductor cross-section, direct plug-in			
- Rigid in mm²	0.5 ... 6		
- End sleeve with/without plastic sleeve in mm²	0.5 ... 4		
General data			
• Stripped length in mm	12	12	12
• Molded plastic	PA	PA	PA
• Flammability Class acc. to UL 94	V0	V0	V0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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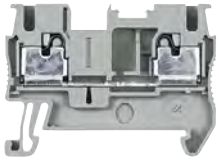
	8WH6000-0AH00 **8WH6000-0AH01** **6 mm²**	**8WH6000-0CH0** **6 mm²**	**8WH6000-0AJ00** **8WH6000-0AJ01** **10 mm²**	**8WH6000-0CJ07** **10 mm²**
Dimensions				
• Width/length/cover width in mm	8.2 / 57.7 / 2.2	8.2 /57.7 / 2.2	8.2 /57.7 / 2.2	8.2 /57.7 / 2.2
• Height (NS 35/7.5 / NS 35/15) in mm	43.5 / 51	43.5 / 51	43.5 / 51	43.5 / 51
Technical specifications acc. to IEC/DIN VDE				
• Max. load current in A / cross-section in mm²	51 / 10	--	65 / 16	--
• Rated voltage in V	1000	--	1000	--
• Rated impulse withstand voltage in kV / pollution degree	8 / 3	8 / 3	8 / 3	8 / 3
• Overvoltage category / molded plastic group	III / I	III / I	III / I	III / I
Connection capacities				
• Flexible with end sleeve, with plastic sleeve in mm²	0.5 ... 6	0.5 ... 6	0.5 ... 10	0.5 ... 10
• Flexible with end sleeve, without plastic sleeve in mm²	0.5 ... 6	0.5 ... 6	0.5 ... 10	0.5 ... 10
• Rigid in mm²	0.5 ... 10	0.5 ... 10	0.5 ... 16	0.5 ... 16
• Flexible in mm²	0.5 ... 6	0.5 ... 6	0.5 ... 10	0.5 ... 10
Stripped length in mm	12	12	18	18
Plug gauge (IEC 60947-1)	A5	A5	A6	A6
Molded plastic type	PA	PA	PA	PA
• Flammability Class acc. to UL 94	V0	V0	V0	V0
Approval data (UL/cUL and CSA)				
• Rated voltage / rated current / conductor sizes				
- UL/cUL: in V / A / AWG	600 / 40 / 20 ... 8	-- / -- / 20 ... 8	600 / 60 / 20 ... 6	-- / -- / 20 ... 6
- CSA: in V / A / AWG	--	--		--

	8WH6000-0AK00 **8WH6000-0AK01** **16 mm²**	**8WH6000-0CK07** **16 mm²**	**8WH6000-0AM00** **8WH6000-0AM01** **35 mm²**	**8WH6000-0CM07** **35 mm²**
Dimensions				
• Width/length/cover width in mm	12.2 / 75.4 / 2.2	12.2 / 75.4 / 2.2	16 / 91.6 / 2.2	16 / 91.6 / 2.2
• Height (NS 35/7.5 / NS 35/15) in mm	52.6 / 60.1	52.6 / 60.1	-- / 62.3	-- / 62.3
Technical specifications acc. to IEC/DIN VDE				
• Max. load current in A / cross-section in mm²	90 / 25	--	125 / 35	--
• Rated voltage in V	1000	--	1000	--
• Rated impulse withstand voltage in kV / pollution degree	8 / 3	8 / 3	8 / 3	8 / 3
• Overvoltage category / molded plastic group	III	III	III	III
Connection capacities				
• Flexible with end sleeve, with plastic sleeve in mm²	0.5 ... 16	0.5 ... 16	6 ... 35	6 ... 35
• Flexible with end sleeve, without plastic sleeve in mm²	0.5 ... 16	0.5 ... 16	6 ... 35	6 ... 35
• Rigid in mm² / AWG	0.5 ... 25 / 20 ... 4	0.5 ... 25 / 20 ... 4	6 ... 35 / 10 ... 2	6 ... 35 / 10 ... 2
• Flexible in mm²/ AWG	0.5 ... 16 / 20 ... 6	0.5 ... 16 / 20 ... 6	6 ... 35 / 10 ... 2	6 ... 35 / 10 ... 2
Stripped length in mm	18	18	25	25
Plug gauge (IEC 60947-1)	A7	A7	--	--
Molded plastic type	PA	PA	PA	PA
• Flammability Class acc. to UL 94	V0	V0	V0	V0
Approval data (UL/cUL and CSA)				
• Rated voltage / rated current / conductor sizes				
- UL/cUL: in V/A / AWG	--	--	--	--
- CSA: in V/A / AWG	--	--	--	--

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH6000-0AF00	**Through-type terminals, terminal size 2.5 mm²** • c UL US • Terminal width 5.2 mm • I_{max} = 30 A • U_{max} = 800 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm²						
	Versions						
	• Two clamping points						
	- Gray		**8WH6000-0AF00**		1	50 units	1BT
	- Blue		**8WH6000-0AF01**		1	50 units	1BT
	• Three clamping points						
	- Gray		**8WH6003-0AF00**		1	50 units	1BT
	- Blue		**8WH6003-0AF01**		1	50 units	1BT
	• Four clamping points						
	- Gray		**8WH6004-0AF00**		1	50 units	1BT
	- Blue		**8WH6004-0AF01**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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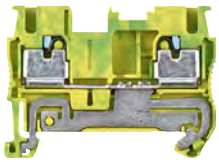
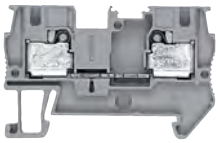
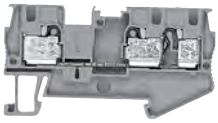
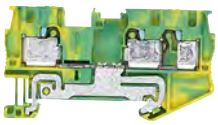
8WH6 through-type terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WH6000-0CF07	**PE through-type terminals, terminal size 2.5 mm²** • cULus • Terminal width 5.2 mm • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm² • Green-yellow						
	Versions						
	• Two clamping points		**8WH6000-0CF07**		1	50 units	1BT
	• Three clamping points		**8WH6003-0CF07**		1	50 units	1BT
	• Four clamping points		**8WH6004-0CF07**		1	50 units	1BT
Terminal size 4 mm²							
 8WH6000-0AG00	**Through-type terminals, terminal size 4 mm²** • cULus • Terminal width 6.2 mm • I_{max} = 38 A • U_{max} = 800 V • AWG 24 ... 10 • Connection capacity, one conductor - Rigid 0.2 ... 6 mm² - Flexible 0.2 ... 4 mm²						
 8WH6003-0AG00	Versions						
	• Two clamping points						
	- Gray		**8WH6000-0AG00**		1	50 units	1BT
	- Blue		**8WH6000-0AG01**		1	50 units	1BT
 8WH6003-0AG01	• Three clamping points						
	- Gray		**8WH6003-0AG00**		1	50 units	1BT
	- Blue		**8WH6003-0AG01**		1	50 units	1BT
 8WH6004-0AG00	• Four clamping points						
	- Gray		**8WH6004-0AG00**		1	50 units	1BT
	- Blue		**8WH6004-0AG01**		1	50 units	1BT
 8WH6004-0AG01							
 8WH6000-0CG07	**PE through-type terminals, terminal size 4 mm²** • cULus • Terminal width 6.2 mm • AWG 24 ... 10 • Connection capacity, one conductor - Rigid 0.2 ... 6 mm² - Flexible 0.2 ... 4 mm² • Green-yellow						
 8WH6003-0CG07	Versions						
	• Two clamping points		**8WH6000-0CG07**		1	50 units	1BT
	• Three clamping points		**8WH6003-0CG07**		1	50 units	1BT
 8WH6004-0CG07	• Four clamping points		**8WH6004-0CG07**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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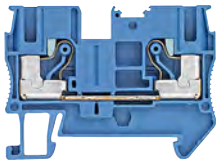
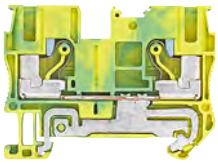
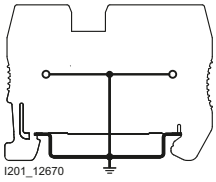
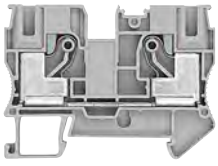
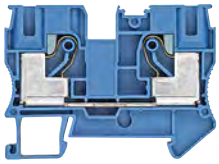
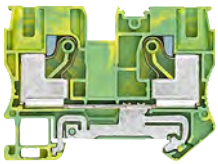
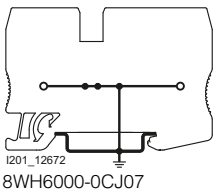
	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 6 mm²							
 8WH6000-0AH00	**Through-type terminals, terminal size 6 mm², two clamping points** • Terminal width 8.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.5 ... 10 mm² - Flexible 0.5 ... 6 mm² - AWG 20 ... 8 - I = 41 A - U = 1000 V						
 8WH6000-0AH01	Versions						
	• Gray		**8WH6000-0AH00**		1	50 units	1BT
	• Blue		**8WH6000-0AH01**		1	50 units	1BT
 8WH6000-0CH07	**PE through-type terminals, terminal size 6 mm², two clamping points** • Terminal width 8.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.5 ... 10 mm² - Flexible 0.5 ... 6 mm² - AWG 20 ... 8 • Green-yellow		**8WH6000-0CH07**		1	50 units	1BT
 I201_12670 8WH6000-0CH07							
Terminal size 10 mm²							
 8WH6000-0AJ00	**Through-type terminals, terminal size 10 mm²** • Terminal width 10.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.5 ... 16 mm² - Flexible 0.5 ... 6 mm² - AWG 20 ... 6 - I = 57 A - U = 1000 V						
 8WH6000-0AJ01	Versions						
	• Gray		**8WH6000-0AJ00**		1	50 units	1BT
	• Blue		**8WH6000-0AJ01**		1	50 units	1BT
 8WH6000-0CJ07	**PE through-type terminals, terminal size 10 mm²** • Terminal width 10.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.5 ... 10 mm² - Flexible 0.5 ... 10 mm² - AWG 20 ... 6 • Green-yellow		**8WH6000-0CJ07**		1	50 units	1BT
 I201_12672 8WH6000-0CJ07							

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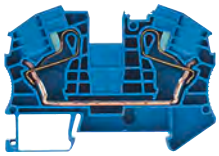
8WH6 through-type terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 16 mm²							
 8WH6000-0AK00	**Through-type terminals, terminal size 16 mm²** • Terminal width 12.2 mm • IEC 60947-7-1 - Rigid 0.5 ... 25 mm² - Flexible 0.5 ... 16 mm² - AWG 20 ... 4 - I = 90 A - U = 1000 V						
	Versions						
 8WH6000-0AK01	• Gray • Blue		**8WH6000-0AK00** **8WH6000-0AK01**		1 1	50 units 50 units	1BT 1BT
 8WH6000-0CK07	**PE through-type terminals, terminal size 16 mm²** • Terminal width 12.2 mm • IEC 60947-7-2 - Rigid 0.5 ... 25 mm² - Flexible 0.5 ... 16 mm² - AWG 20 ... 4 • Green-yellow		**8WH6000-0CK07**		1	50 units	1BT
Terminal size 35 mm²							
 8WH6000-0AM00	**Through-type terminals, terminal size 35 mm²** • Terminal width 16 mm • Enclosed at both ends • IEC 60947-7-1 - Rigid 6 ... 35 mm² - Flexible 6 ... 35 mm² - AWG 10 ... 2 - I = 125 A - U = 1000 V						
	Versions						
 8WH6000-0AM01	• Gray • Blue		**8WH6000-0AM00** **8WH6000-0AM01**		1 1	10 units 10 units	1BT 1BT
 8WH6000-0CM07	**PE through-type terminals, terminal size 35 mm²** • Terminal width 16 mm • Enclosed at both ends • IEC 60947-7-2 - Rigid 6 ... 35 mm² - Flexible 6 ... 35 mm² - AWG 10 ... 2		**8WH6000-0CM07**		1	10 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
	**Covers, for terminal size 2.5 mm², width 2.2 mm**						
	Versions						
	• For two clamping points		**8WH9000-1GA00**		100	50 units	1BT
	• For three clamping points		**8WH9000-2GA00**		100	50 units	1BT
	• For four clamping points		**8WH9000-4GA00**		100	50 units	1BT
	For general accessories for 8WH terminal blocks, see page 14/135.						
 8WH9003-1GA00	**Covers, for terminal size 4 mm², width 2.2 mm**						
	Versions						
	• For two clamping points		**8WH9003-1GA00**		100	50 units	1BT
	• For three clamping points		**8WH9003-2SA00**		1	50 units	1BT
	• For four clamping points		**8WH9003-4SA00**		1	50 units	1BT
 8WH9004-3SA00	**Covers, for through-type terminals, width 2.2 mm**						
	Versions						
	• For two clamping points 6 mm²		**8WH9004-3SA00**		100	50 units	1BT
	• For two clamping points 10 mm²		**8WH9005-1SA00**		100	50 units	1BT
 8WH9005-1SA00							
 8WH9006-1SA00	**End covers, for terminal size 16 mm², width 2.2 mm** • For closing the open terminal side • Length 75.4 mm						
	Versions						
	• Gray		**8WH9006-1SA00**		100	50 units	1BT
 8WH9070-0AA00	**Partitions, for terminal sizes 2.5 ... 4 mm², width 2.0 mm** • For visual and electrical separation of terminal groups • Gray						
	Versions						
	• For two clamping points		**8WH9070-0AA00**		100	50 units	1BT
	• For three clamping points		**8WH9070-0GA00**		100	50 units	1BT
	• For four clamping points		**8WH9070-0HA00**		100	50 units	1BT
 8WH9000-0GA00	**Cover segments, for terminal size 2.5 mm²** For covering multi-wire terminals when mounting two-wire terminals side-by-side		**8WH9000-0GA00**		100	10 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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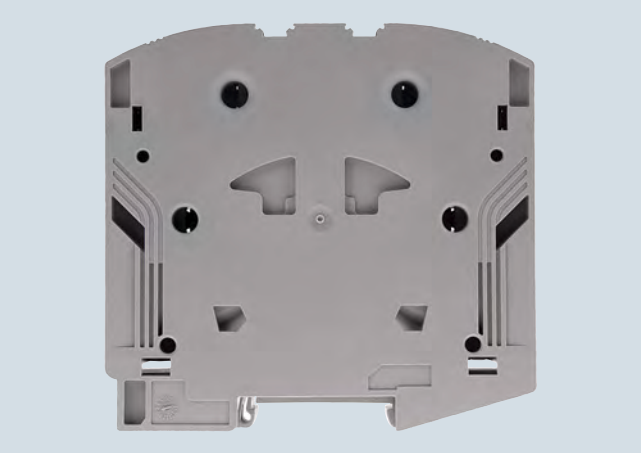
8WH6 through-type terminals (high-current terminals) NEW

Overview



The 8WH6 through-type terminals for high-current applications are ideal for the direct wiring of conductors. They offer two options for wiring: With a standard screwdriver and a single lever movement, large conductors can by connected quickly and easily.

Alternatively, conductors can be inserted directly, even when the lever is closed.

There is a possibility of distributing the potentials using insertable jumpers. These are easily installed without the need for tools and also latch in the clamping space. Due to their special shape, they also remain recognizable after the conductor has been connected.

As an option, a latching tap-off terminal can be installed.

Technical specifications

	8WH6000-0AN00 8WH6000-0AN01 50 mm²	**8WH6000-0CN07 50 mm²**	**8WH6000-0AQ00 8WH6000-0AQ01 95 mm²**	**8WH6000-0CQ07 95 mm²**
Dimensions • Width / length • Height (NS 35/7.5 / NS 35/15) in mm	 20 / 101 -- / 105	 20 / 101 -- / 105	 25 / 105.5 -- / 108.7	 25 / 105.5 -- / 108.7
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm² • Rated voltage in V • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 150 / 70 1000 AC / 1500 DC 8 / 3 III	 -- -- 8 / 3 III	 232 / 95 1000 AC / 1500 DC 8 / 3 III	 -- -- 8 / 3 III
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm² • Flexible with end sleeve, without plastic sleeve in mm² • Rigid in mm² / AWG • Flexible in mm² / AWG	 10 ... 50 10 ... 50 10 ... 70 / 8 ... 2/0 10 ... 70 / 8 ... 2/0	 10 ... 50 10 ... 50 10 ... 70 / 8 ... 2/0 10 ... 70 / 8 ... 2/0	 25 ... 95 25 ... 95 25 ... 95 / 4 ... 3/0 25 ... 95 / 4 ... 3/0	 25 ... 95 25 ... 95 25 ... 95 / 4 ... 3/0 25 ... 95 / 4 ... 3/0
Stripped length in mm	30	30	40	40
Plug gauge (IEC 60947-1)	A7	A7	--	--
Molded plastic type • Flammability Class acc. to UL 94	PA V0	PA V0	PA V0	PA V0

	8WH6000-0AS00, 8WH6000-0AS01, 150 mm²
Dimensions • Width / length • Height (NS 35/7.5 / NS 35/15) in mm	 31/116.4 -- / 116.5
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm² • Rated voltage in V • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 309/ 150 1000 AC / 1500 DC 8 / 3 III
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm² • Flexible with end sleeve, without plastic sleeve in mm² • Rigid in mm² / AWG • Flexible in mm²/ AWG	 50 ... 95 50 ... 95 50 ... 150 / 1/0 ... 300 kcmil 50 ... 150 / 1/0 ... 300 kcmil
Stripped length in mm	40
Plug gauge (IEC 60947-1)	B14
Molded plastic type • Flammability Class acc. to UL 94	PA V0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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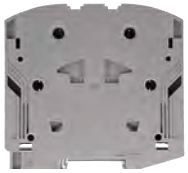
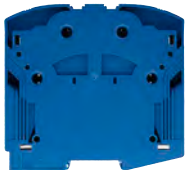
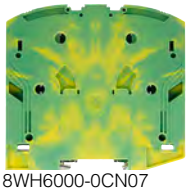
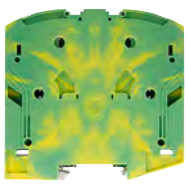
NEW 8WH6 through-type terminals (high-current terminals)

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 50 mm²							
 8WH6000-0AN00	**Through-type terminals, terminal size 50 mm²** • Terminal width 20 mm • Enclosed at both ends • IEC 60947-7-1 - Rigid 10 ... 70 mm² - Flexible 10 ... 50 mm² - AWG 8 ... 2/0 - *I* = 150 A - *U* = 1000 V AC, *U* = 1500 V DC						
 8WH6000-0AN01	Versions • Gray • Blue		**8WH6000-0AN00** **8WH6000-0AN01**		1 1	10 units 10 units	1BT 1BT
 8WH6000-0CN07	**PE through-type terminals, terminal size 50 mm²** • Terminal width 20 mm • Enclosed at both ends • IEC 60947-7-2 - Rigid 7 ... 70 mm² - Flexible 10 ... 50 mm² - AWG 8 ... 2/0		**8WH6000-0CN07**		1	10 units	1BT
Terminal size 95 mm²							
 8WH6000-0AQ00	**Through-type terminals, terminal size 95 mm²** • Terminal width 20 mm • Enclosed at both ends • IEC 60947-7-1 - Rigid 25 ... 95 mm² - Flexible 25 ... 95 mm² - AWG 4 ... 3/0 - *I* = 232 A - *U* = 1000 V AC, *U* = 1500 V DC						
 8WH6000-0AQ01	Versions • Gray • Blue		**8WH6000-0AQ00** **8WH6000-0AQ01**		1 1	10 units 10 units	1BT 1BT
 8WH6000-0CQ07	**PE through-type terminals, terminal size 95 mm²** • Terminal width 20 mm • Enclosed at both ends • IEC 60947-7-1 - Rigid 25 ... 95 mm² - Flexible 25 ... 95 mm² - AWG 4 ... 3/0		**8WH6000-0CQ07**		1	10 units	1BT

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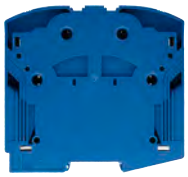
8WH6 through-type terminals (high-current terminals) NEW

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 150 mm²							
 8WH6000-0AS00	**Through-type terminals, terminal size 150 mm²** • Terminal width 31 mm • Enclosed at both ends • IEC 60947-7-1 - Rigid 50 ... 150 mm² - Flexible 50 ... 95 mm² - AWG 1/0 ... 300 kcmil - I = 309 A - U = 1000 V AC, U = 1500 V DC						
	Versions						
 8WH6000-0AS01	• Gray		**8WH6000-0AS00**		1	3 units	1BT
	• Blue		**8WH6000-0AS01**		1	3 units	1BT
Accessories							
 8WH9020-3AB00	**Jumpers**						
	Versions						
	• 2-pole, 50 mm²		**8WH9020-3AB00**		1	5 units	1BT
	• 3-pole, 50 mm²		**8WH9020-3AC00**		1	5 units	1BT
	• 2-pole, 95 mm²		**8WH9020-3AD00**		1	5 units	1BT
	• 3-pole, 95 mm²		**8WH9020-3AE00**		1	5 units	1BT
	• 2-pole, 150 mm²		**8WH9020-3AF00**		1	5 units	1BT
 8WH9020-3AG00	• 3-pole, 150 mm²		**8WH9020-3AG00**		1	5 units	1BT
 8WH9120-0DA00	**Tap-off terminals, for terminal sizes 50, 95 and 150 mm²** 1-pole, 0.5 ... 10 mm²		**8WH9120-0DA00**		1	10 units	1BT
 8WH9010-0MB00	**Insulating sleeves for test plugs, for terminal sizes 50, 95 and 150 mm²** Color: Red		**8WH9010-0MB02**		1	10 units	1BT
 8WH9010-0NB00	**Test plugs for insulating sleeves, for terminal sizes 50, 95 and 150 mm²** Color: metal		**8WH9010-0NB00**		1	10 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



With the two voltage levels routed through two tiers, the 8WH6 two-tier terminals require 50% less space than equivalent single-tier terminals. To implement a wide range of wiring tasks, connecting combs can be fitted to both tiers of the two-tier terminal series. Facilities for inscription are provided at each clamping point.

Two-tier terminals with equipotential bonding for the upper and lower tiers are also available.

With the same contour as 8WH6 two-tier terminals, 8WH6 two-tier PE terminals round off the product range. Perfect mechanical and electrical contact with the support rail is provided by simply snapping the terminals onto the rail. 8WH6 two-tier PE terminals comply with all the requirements of IEC 60947-7-2. These include in particular:

- Low contact resistance
- Stainless clamping points
- Green-yellow enclosure
- Additional inscription options

An inscription label can be mounted flat at each clamping point by simply snapping it on.

Technical specifications

	8WH6020-0AF00 8WH6020-0AF01 2.5 mm²	**8WH6025-0AF00 2.5 mm²**	**8WH6020-0CF07 2.5 mm²**	**8WH6020-0AG00 8WH6020-0AG01 4 mm²**	**8WH6025-0AG00 4 mm²**	**8WH6020-0CG07 4 mm²**
Dimensions						
• Width / length / height (NS 35/7.5) in mm	5.2 / 68 / 47.5	5.2 / 78 / 55		6.2 / 83.5 / 47.5		
Max. electrical data						
• I_{max} in A	26	26[1)]	--	32		--
• U_{max} in V	500		--	500		--
• Max. Ø in mm²	0.14 ... 4			0.2 ... 6		
• AWG	26 ... 12			24 ... 10		
Rating according to IEC 60947-7-1						
• Rated voltage in V (IEC)	500		--	500 / 600		--
• Rated current in A / cross-section in mm²						
- IEC	20 / 2.5	20[1)] / 2.5	-- / --			-- / --
- UL/CSA				30 / --		-- / --
• Rated cross-section in mm² (IEC)	2.5			4		
• AWG cross-section range (IEC)	26 ... 12			24 ... 10 / 24 ... 10		
Connection capacities						
• 1 conductor						
- Rigid in mm²	0.14 ... 4			0.2 ... 6		
- Flexible in mm²	0.14 ... 2.5			0.2 ... 4		
- End sleeve with/without plastic sleeve in mm²	0.14 ... 2.5			0.25 ... 4		
• Conductor cross-section, direct plug-in						
- Rigid in mm²	0.34 ... 4			0.5 ... 6		
- End sleeve with/without plastic sleeve in mm²	0.34 ... 2.5			0.5 ... 4		
General data						
• Stripped length in mm	10			12		
• Molded plastic	PA			PA		
• Flammability Class acc. to UL 94	V0			V0		

[1)] The total current through all connected conductors must not exceed the maximum load current.

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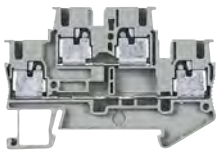
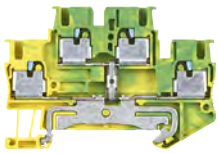
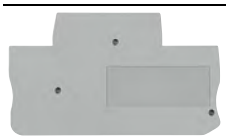
8WH6 two-tier terminals

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH6020-0AF00	**Two-tier terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • I_{max} = 26 A • U_{max} = 500 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm²						
	Versions						
	• Without equipotential bonding						
	- Gray		**8WH6020-0AF00**		1	50 units	1BT
	- Blue		**8WH6020-0AF01**		1	50 units	1BT
	• With equipotential bonding		**8WH6025-0AF00**		1	50 units	1BT
 8WH6020-0CF07	**PE two-tier terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm² • Green-yellow		**8WH6020-0CF07**		1	50 units	1BT
	Note						
	Bridging the terminal is only possible in the top tier (in the center).						
Terminal size 4 mm²							
 8WH6025-0AG00	**Two-tier terminals, terminal size 4 mm²** • Terminal width 6.2 mm • I_{max} = 32 A • U_{max} = 500 V • AWG 24 ... 10 • Connection capacity, one conductor - Rigid 0.2 ... 6 mm² - Flexible 0.2 ... 4 mm²						
	Versions						
	• Without equipotential bonding						
	- Gray		**8WH6020-0AG00**		1	50 units	1BT
	- Blue		**8WH6020-0AG01**		1	50 units	1BT
	• With equipotential bonding		**8WH6025-0AG00**		1	50 units	1BT
 8WH6020-0CG07	**PE two-tier terminals, terminal size 4 mm²** • Terminal width 6.2 mm • AWG 24 ... 10 • Connection capacity, one conductor - Rigid 0.2 ... 6 mm² - Flexible 0.2 ... 4 mm² • Green-yellow		**8WH6020-0CG07**		1	50 units	1BT
	Note						
	Bridging the terminal is only possible in the top tier (in the center).						
Accessories							
 8WH9000-4SE00	**Covers, for terminal sizes 1.5 ... 2.5 mm²** • Width 2.2 mm • Gray		**8WH9000-4SE00**		100	50 units	1BT
 8WH9003-1VA00	**Covers, for terminal sizes 1.5 ... 4 mm²** • For two clamping points • Width 2.2 mm		**8WH9003-1VA00**		100	50 units	1BT
 8WH9070-0BA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²** • For visual and electrical separation of terminal groups • 2 mm thick • Gray		**8WH9070-0BA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



The fuse terminals are characterized by their compact design and have the same contour as through-type terminals and function terminals. Double bridging is possible. Versions with LED display for signaling a fuse are also available.

Fuse terminals can be inscribed at their clamping points with flat labels.

Fuses must not be replaced under load.

Technical specifications

	8WH6000-1GG08	8WH6000-1KG38	8WH6000-1MG88
Dimensions			
• Width / length / height (NS 35/7.5) in mm	6.2 /56 / 62.5		
Max. electrical data			
• I_{max} in A	6.3[1)]		
• U_{max} in V	500		
• Max. Ø in mm²	0.2 ... 6		
• AWG	24 ... 10		
Rating according to IEC 60947-7-1			
• Rated voltage in V (IEC / UL/CSA)	500 / 300		
• Rated current in A / cross-section in mm²			
- IEC	6.3/ 1		
- UL/CSA	6.3 / --		
• Rated cross-section in mm²	4		
• AWG cross-section range (IEC / UL/CSA)	24 ... 10 / 24 ... 10		
Connection capacities			
• 1 conductor			
- Rigid in mm²	0.2 ... 6		
- Flexible in mm²	0.2 ... 4		
- End sleeve with/without plastic sleeve in mm²	0.25 ... 4		
• Conductor cross-section, direct plug-in			
- Rigid in mm²	0.5 ... 6		
- End sleeve with/without plastic sleeve in mm²	0.5 ... 4		
General data			
• Stripped length in mm	12		
• Molded plastic	PA		
• Flammability Class acc. to UL 94	V0		

[1)] The total current through all connected conductors must not exceed the maximum load current.

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm²							
 8WH6000-1GG08	**Fuse terminals, terminal size 4 mm², for G fuse links 5 x 20 mm** • cULus, CSA • Terminal width 6.2 mm • I_{max} = 6.3 A • U_{max} = 500 V • AWG 24 ... 10 • Connection capacity, one conductor - Rigid 0.2 ... 4 mm² - Flexible 0.2 ... 4 mm² • Black						
	Versions						
	• Without LED		**8WH6000-1GG08**		1	50 units	1BT
	• With LED 10 ... 30 V AC/DC		**8WH6000-1KG38**		1	50 units	1BT
	• With LED 110 ... 250 V AC/DC		**8WH6000-1MG88**		1	50 units	1BT
Accessories							
 8WA9003-1GA00	**Covers, for terminal size 4 mm²** • For two clamping points • Width 2.2 mm		**8WH9003-1GA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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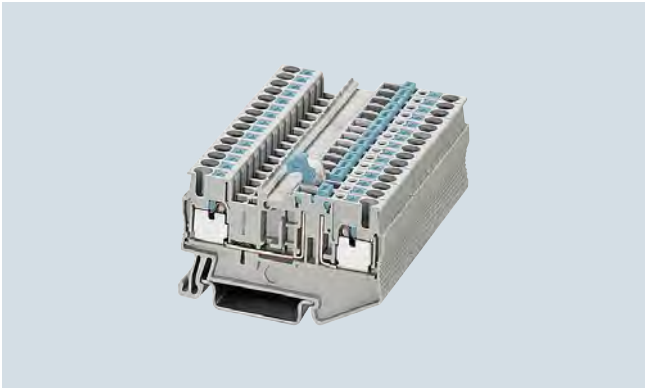
8WH6 isolating blade terminals

Overview



Through-type terminals with isolating blade capability are the most commonly used terminal types in measuring and control technology. Key features of the 8WH6 isolating blade terminals are the slim design of only 5.2 mm and their high current-carrying capacity. Convenient testing is made possible by the integral double function shaft located on one side of the isolating point and the integrated test contact located on the other. Standard connecting combs allow easy execution of all potential-distribution tasks. Three and four-wire terminals up to 2.5 mm^2 available for the multi-conductor connection.

A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

The isolating element must not be replaced under load.

Technical specifications

	8WH6000-6AF00	8WH6003-6AF00	8WH6004-6AF00
Dimensions			
• Width / length / height (NS 35/7.5) in mm	5.2 / 60.5 / 36.5	5.2 / 74 / 36.5	5.2 / 84 / 36.5
Max. electrical data			
• I_{max} in A	20	20[1)]	
• U_{max} in V	400		
• Max. Ø in mm^2	0.14 ... 4		
• AWG	26 ... 12		
Rating according to IEC 60947-7-1			
• Rated voltage in V (IEC)	400		
• Rated current in A / cross-section in mm^2 (IEC)	20 / 2.5	20[1)] / 2.5	
• Rated cross-section in mm^2	2.5		
• AWG cross-section range (IEC)	26 ... 12		
Connection capacities			
• 1 conductor			
- Rigid in mm^2	0.14 ... 4		
- Flexible in mm^2	0.14 ... 2.5		
- End sleeve with/without plastic sleeve in mm^2	0.14 ... 2.5		
• Conductor cross-section, direct plug-in			
- Rigid in mm^2	0.34 ... 4		
- End sleeve with/without plastic sleeve in mm^2	0.34 ... 2.5		
General data			
• Stripped length in mm	10		
• Molded plastic	PA		
• Flammability Class acc. to UL 94	V0		

1) The total current through all connected conductors must not exceed the maximum load current.

	8WH6000-6CG00
Dimensions	
• Width / length / height (NS 35/7.5) in mm	6.2 / 54 / 36.5
Max. electrical data	
• I_{max} in A	20
• U_{max} in V	400
• Max. Ø in mm^2	0.2 ... 6
• AWG	24 ... 10
Rating according to IEC 60947-7-1	
• Rated voltage in V (IEC / UL/CSA)	400 / 300
• Rated current in A / cross-section in mm^2	
- IEC	20 / 2.5
- UL/CSA	20 / --
• Rated cross-section in mm^2	4
• AWG cross-section range (IEC / UL/CSA)	24 ... 10 / 24 ... 10
Connection capacities	
• 1 conductor	
- Rigid in mm^2	0.2 ... 6
- Flexible in mm^2	0.2 ... 4
- End sleeve with/without plastic sleeve in mm^2	0.25 ... 4
• Conductor cross-section, direct plug-in	
- Rigid in mm^2	0.5 ... 6
- End sleeve with/without plastic sleeve in mm^2	0.5 ... 4
General data	
• Stripped length in mm	12
• Molded plastic	PA
• Flammability Class acc. to UL 94	V0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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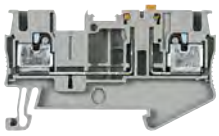
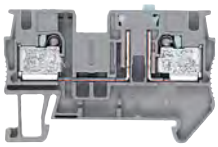
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH6000-6AF00	**Isolating blade terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • I_{max} = 20 A • U_{max} = 400 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm²						
	Versions						
	• Two clamping points		**8WH6000-6AF00**		1	50 units	1BT
	• Three clamping points		**8WH6003-6AF00**		1	50 units	1BT
	• Four clamping points		**8WH6004-6AF00**		1	50 units	1BT
Terminal size 4 mm²							
 8WH6000-6CG00	**Isolating blade terminals, terminal size 4 mm²** • With 2 clamping points • Terminal width 6.2 mm • I_{max} = 20 A • U_{max} = 400 V • AWG 24 ... 10 • Connection capacity, one conductor - Rigid 0.2 ... 6 mm² - Flexible 0.2 ... 4 mm² • Connection capacity, two conductors - Rigid 0.5 ... 6 mm²		**8WH6000-6CG00**		1	50 units	1BT
Accessories							
 8WH9000-3SC00	**Covers, for terminal size 2.5 mm²** Width 2.2 mm						
	• For two clamping points		**8WH9000-3SC00**		100	50 units	1BT
	• For three clamping points		**8WH9000-3SD00**		100	50 units	1BT
	• For four clamping points		**8WH9000-5GA00**		100	50 units	1BT
 8WA9003-1GA00	**Covers, for terminal size 4 mm²** • For two clamping points • Width 2.2 mm		**8WH9003-1GA00**		100	50 units	1BT
 8WH9070-0AA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²** • For two clamping points • For visual and electrical separation of terminal groups • 2 mm thick • Gray		**8WH9070-0AA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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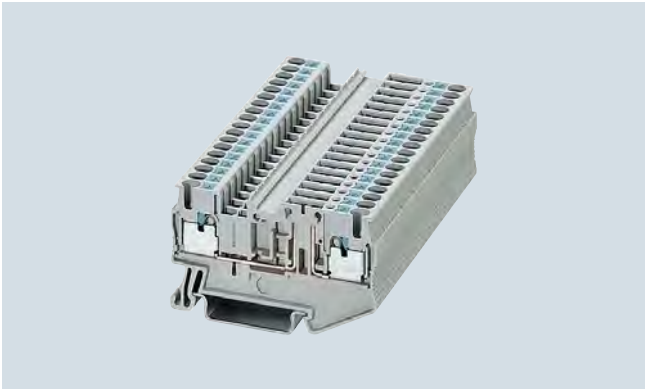
8WH6 isolating terminals

Overview



8WH6 isolating terminals in iPo connection technology are available for special wiring tasks. With the same contour as the isolating blade terminals, 8WH6 isolating terminals are fitted with a universal plug-in zone in the middle of the terminal. Numerous wiring tasks can be performed on a terminal width of 5.2 mm by integrating the isolated through-type connector, the isolating plug, the component connector or the fused plug.

A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

The isolating element must not be replaced under load.

Technical specifications

	8WH6000-6CF00	8WH6003-6CF00	8WH6004-6CF00
Dimensions			
• Width / length / height (NS 35/7.5) in mm	5.2 / 60.5 / 36.5	5.2 / 74 / 36.5	5.2 / 84 / 36.5
Max. electrical data			
• I_{max} in A	20	20[1]	
• U_{max} in V	400[2]		
• Max. Ø in mm²	0.14 ... 4		
• AWG	26 ... 12		
Rating according to IEC 60947-7-1			
• Rated voltage in V (IEC)	400[2]		
• Rated current in A / cross-section in mm² (IEC)	20 / 2.5	20[1] / 2.5	
• Rated cross-section in mm² (IEC)	2.5		
• AWG cross-section range (IEC)	26 ... 12		
Connection capacities			
• 1 conductor			
- Rigid in mm²	0.14 ... 4		
- Flexible in mm²	0.14 ... 2.5		
- End sleeve with/without plastic sleeve in mm²	0.14 ... 2.5		
• Conductor cross-section, direct plug-in			
- Rigid in mm²	0.34 ... 4		
- End sleeve with/without plastic sleeve in mm²	0.34 ... 2.5		
General data			
• Stripped length in mm	10		
• Molded plastic	PA		
• Flammability Class acc. to UL 94	V0		

	8WH6000-6AG00
Dimensions	
• Width / length / height (NS 35/7.5) in mm	6.2 / 56 / 36.5
Max. electrical data	
• I_{max} in A	20
• U_{max} in V	400[2]
• Max. Ø in mm²	0.2 ... 6
• AWG	24 ... 10
Rating according to IEC 60947-7-1	
• Rated voltage in V (IEC / UL/CSA)	400 / 300
• Rated current in A / cross-section in mm²	
- IEC	20 / 2.5
- UL/CSA	20 / --
• Rated cross-section in mm²	4
• AWG cross-section range (IEC / UL/CSA)	24 ... 10 / 24 ... 10
Connection capacities	
• 1 conductor	
- Rigid in mm²	0.2 ... 6
- Flexible in mm²	0.25 ... 4
- End sleeve with/without plastic sleeve in mm²	0.25 ... 4
• Conductor cross-section, direct plug-in	
- Rigid in mm²	0.5 ... 6
- End sleeve with/without plastic sleeve in mm²	0.5 ... 4
General data	
• Stripped length in mm	12
• Molded plastic	PA
• Flammability Class acc. to UL 94	V0

1) The total current through all connected conductors must not exceed the maximum load current.

2) Current and voltage are determined by the fitted plug.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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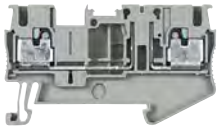
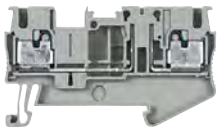
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH6000-6CF00	**Isolating terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • I_{max} = 20 A • U_{max} = 400 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm²						
	Versions						
	• Two clamping points		**8WH6000-6CF00**		1	50 units	1BT
	• Three clamping points		**8WH6003-6CF00**		1	50 units	1BT
	• Four clamping points		**8WH6004-6CF00**		1	50 units	1BT
Terminal size 4 mm²							
 8WH6000-6AG00	**Isolating terminal, terminal size 4 mm²** • With two clamping points • Terminal width 6.2 mm • I_{max} = 20 A • U_{max} = 400 V • AWG 24 ... 10 • Connection capacity, one conductor - Rigid 0.2 ... 6 mm² - Flexible 0.2 ... 4 mm²		**8WH6000-6AG00**		1	50 units	1BT
Accessories							
 8WH9000-3SC00	**Covers, for terminal size 2.5 mm²** Width 2.2 mm						
	• For two clamping points		**8WH9000-3SC00**		100	50 units	1BT
	• For three clamping points		**8WH9000-3SD00**		100	50 units	1BT
	• For four clamping points		**8WH9000-5GA00**		100	50 units	1BT
 8WA9003-1GA00	**Covers, for terminal size 4 mm²** • For two clamping points • Width 2.2 mm		**8WH9003-1GA00**		100	50 units	1BT
 8WH9070-0AA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²** • For two clamping points • For visual and electrical separation of terminal groups • Width 2.2 mm • Gray		**8WH9070-0AA00**		100	50 units	1BT
 8WH9070-0GA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²** • For three clamping points • For visual and electrical separation of terminal groups • Width 2.2 mm • Gray		**8WH9070-0GA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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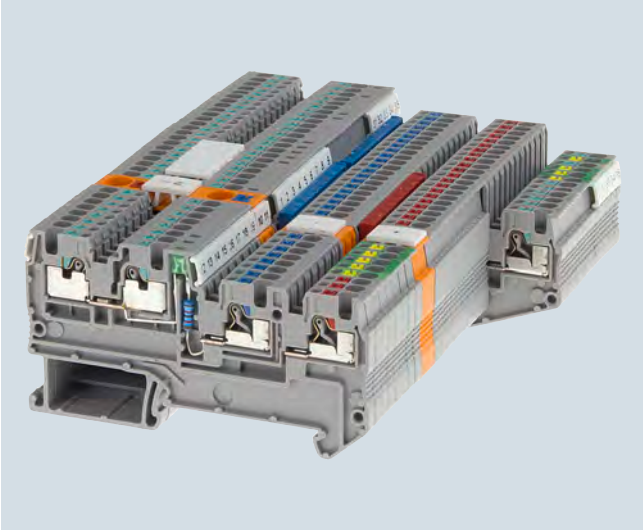
8WH6 initiator/actor terminals NEW

Overview



Terminal block with 3-wire initiator terminals and 4-wire actuator terminals

Thanks to their compact design, the initiator/actuator terminals are ideally suitable for the wiring of modern machine control systems. These terminals have identical contours and can be bridged throughout with the insertable jumper system, offering you maximum flexibility.

The feeder terminals are fitted with an additional negative outgoing feeder which can be used to supply isolated digital input/output modules. This enables the protective earth (PE) conductor to be bridged via the terminals.

Features

- Wide variety of products due to versions with PE function or illuminated display
- Optimum clarity of signal connections thanks to wide variety of marking options
- Modular expansion possible up to 40 poles, as feeder terminals have same contours

Reduced wiring outlay

The initiator/actuator terminals enable the number of cables used to be reduced:

- Sensors and actuators with 3 or 4 wires can be connected.
- The plus/minus potential can be connected with the jumpers.
- Apart from the standard terminals, versions with illuminated displays are available.

Technical specifications

Initiator terminals (3-wire connection, 8WH6003-....), actuator terminals (4-wire connection, 8WH6004-....)

	8WH600.-0DE00 **1.5 mm²**	**8WH600.-0FE00** **1.5 mm²**	**8WH600.-0HE00** **1.5 mm²**	**8WH600.-0DF04** **Feeder terminal** **2.5 mm²**
Dimensions				
• Width/length/cover width in mm	3.5 / 74.4 (90.8[1])/ 2.2	3.5 / 74.4 (90.8[1])/ 2.2	3.5 / 74.4 (90.8[1])/ 2.2	7.0 / 74.4 (90.8[1]) / 2.2
• Height (NS 35/7.5 / NS 35/15) in mm	41.5/ 49	41.5/ 49	41.5/ 49	41.5/ 49
Integrated LED (if available)				
• Color	--	Green	--	--
• Current consumption in mA	--	0.31 ... 0.95	--	--
• Rated voltage in V		24		
• Voltage range in V	--	15 ... 50 AC/DC	--	--
Technical specifications acc. to IEC/DIN VDE				
• Max. load current in A / cross-section in mm²	13.5 / 1.5	13.5 / 1.5	13.5 / 1.5	20 / 2.5
• Rated impulse withstand voltage in kV / pollution degree	4 / 3	4 / 3	4 / 3	4 / 3
• Overvoltage category / molded plastic group	III / I	III / I	III / I	III / I
Connection capacities in accordance with IEC 60947-7-1:				
• Flexible with end sleeve, with plastic sleeve in mm²	0.14 ... 1.0	0.14 ... 1.0	0.14 ... 1.0	0.14 ... 1.0
• Flexible with end sleeve, without plastic sleeve in mm²	0.14 ... 1.5	0.14 ... 1.5	0.14 ... 1.5	0.14 ... 1.5
• AWG	26 ... 14	26 ... 14	26 ... 14	24 ... 12
Stripped length in mm	8 ... 10	8 ... 10	8 ... 10	8 ... 10
Plug gauge (IEC 60947-1)	A1 / B1	A1 / B1	A1 / B1	A3
Molded plastic type	PA	PA	PA	PA
• Flammability Class acc. to UL 94	V0	V0	V0	V0
Approval data (UL/cUL and CSA), Category B				
• Rated voltage / rated current / conductor sizes				
- UL/cUL: in V/A / AWG	300/ 15 / 26 ... 14	300/ 15 / 26 ... 14	300/ 15 / 26 ... 14	300/ 16 / 24 ... 12
- CSA: in V/A / AWG	300/ 10 / 26 ... 14	300/ 10 / 26 ... 14	--/ -- / 26 ... 14	300/ 10 / 24 ... 10
Support rails/protective conductor busbars	see page 14/3, section "Support rails"			

[1] Length of actuator terminals (4-wire connection, 8WH6004-....).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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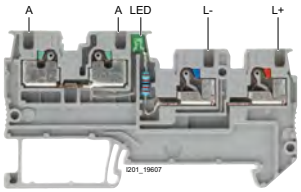
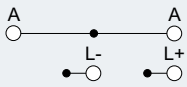
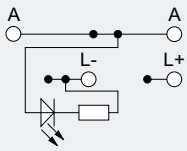
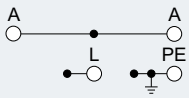
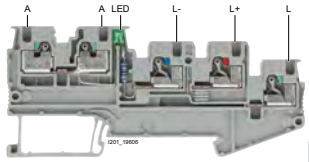
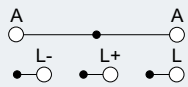
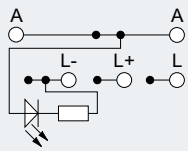
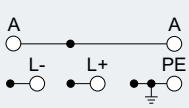
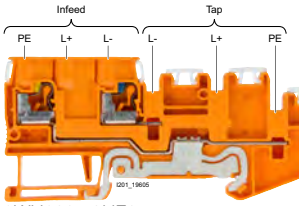
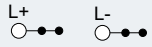
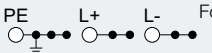
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	General details • Thermoplastic insulating body • Front connection with spring-loaded terminal • L+ = red L- = blue A (output) = petrol L = petrol PE (ground) = green-yellow • Terminal open on one side						
Terminal size 1.5 mm²							
 8WH6003-0FE00	**Initiator terminals, terminal size 1.5 mm²** • Light gray • Rated uninterrupted current 13.5 A • Rated insulation voltage 250 V • Mounting width 3.5 mm • For 250 V, pollution degree 3 • Current consumption with LED 0.31 ... 0.95 mA						
	Circuit diagram:  — For 3-wire, L+, L-, A, without LED		**8WH6003-0DE00**		1	50 units	1BT
	Circuit diagram:  — For 3-wire, L+, L-, A, with green LED, 24 V (15 ... 30 V DC)		**8WH6003-0FE00**		1	50 units	1BT
	Circuit diagram:  — For 3-wire, L-, A, PE, without LED		**8WH6003-0HE00**		1	50 units	1BT
 8WH6004-0FE00	**Actuator terminals, terminal size 1.5 mm²** • Light gray • Rated uninterrupted current 10 A • Rated insulation voltage 65 V • Mounting width 3.5 mm • For 250 V, pollution degree 2 • Current consumption with LED 0.31 ... 0.95 mA						
	Circuit diagram:  — For 4-wire, L+, L-, L, A		**8WH6004-0DE00**		1	50 units	1BT
	Circuit diagram:  — For 4-wire, L+, L-, L, A, with green LED, 24 V (15 ... 30 V DC)		**8WH6004-0FE00**		1	50 units	1BT
	Circuit diagram:  — For 4-wire, L+, L-, PE, A, without LED		**8WH6004-0HE00**		1	50 units	1BT
Terminal size 2.5 mm²							
 8WH6004-0HE04	**Feeder terminals, terminal size 2.5 mm²** • Orange • Rated uninterrupted current 20 A • Rated insulation voltage 250 V • Mounting width 7 mm • For 250 V, pollution degree 3 • Open on both sides						
	Circuit diagram:  — For 3-wire terminals, L+, L-, without PE		**8WH6003-0DF04**		1	50 units	1BT
	Circuit diagram:  — For 4-wire terminals, L+, L-, PE		**8WH6004-0HE04**		1	50 units	1BT

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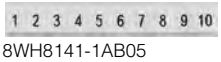
8WH6 initiator/actor terminals NEW

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Accessories							
 8WH9001-4VE00	**Covers, for terminal size 1.5 mm²** Width 2.2 mm						
	• For 3-wire initiator terminals		**8WH9001-2VD00**		100	50 units	1BT
	• For 4-wire actuator terminals		**8WH9001-4VE00**		100	50 units	1BT
 8WH9020-6JC05	**Connecting combs 3.5 mm**						
	Versions / Max. load current I_{max}						
	• For terminal width 3.5 mm and terminal size 1.5 mm², red	17.5 A					
	- 2-pole		**8WH9020-6JC02**		1	50 units	1BT
	- 3-pole		**8WH9020-6JD02**		1	50 units	1BT
	- 4-pole		**8WH9020-6JE02**		1	50 units	1BT
	- 5-pole		**8WH9020-6JF02**		1	50 units	1BT
	- 10-pole		**8WH9020-6JL02**		1	10 units	1BT
	- 20-pole		**8WH9020-6JS02**		1	10 units	1BT
 8WH9020-6JF01	• For terminal width 3.5 mm and terminal size 1.5 mm², blue	17.5 A					
	- 2-pole		**8WH9020-6JC01**		1	50 units	1BT
	- 3-pole		**8WH9020-6JD01**		1	50 units	1BT
	- 4-pole		**8WH9020-6JE01**		1	50 units	1BT
	- 5-pole		**8WH9020-6JF01**		1	50 units	1BT
	- 10-pole		**8WH9020-6JL01**		1	10 units	1BT
	- 20-pole		**8WH9020-6JS01**		1	10 units	1BT
 8WH9020-6JF00	• For terminal width 3.5 mm and terminal size 1.5 mm², gray	17.5 A					
	- 2-pole		**8WH9020-6JC00**		1	50 units	1BT
	- 3-pole		**8WH9020-6JD00**		1	50 units	1BT
	- 4-pole		**8WH9020-6JE00**		1	50 units	1BT
	- 5-pole		**8WH9020-6JF00**		1	50 units	1BT
	- 10-pole		**8WH9020-6JL00**		1	10 units	1BT
	- 20-pole		**8WH9020-6JS00**		1	10 units	1BT
 8WH8111-1AA05	**Labels, front, for terminal width 3.5 mm and terminal size 1.5 mm²**						
	Versions						
	• Blank		**8WH8111-1AA05**		100	100 units	1BT
 8WH8120-2XA05	• Special inscription, vertical can only be ordered with the order code -ZY01		**8WH8120-2XA05 -Z and Y01**		100	100 units	1BT
 8WH8140-1AX05	• Special inscription, horizontal can only be ordered with the order code -ZY01		**8WH8140-2XA05 -Z and Y01**		100	100 units	1BT
 8WH8141-1AB05	**Labels, flat, for terminal width 3.5 mm and terminal size 1.5 mm², printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8141-1A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8141-1XA05 -Z and Y01**		100	100 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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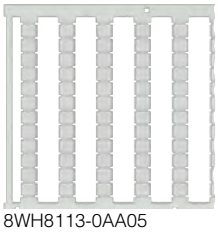
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Labels, flat, for terminal width 3.5 mm and terminal size 1.5 mm², printed horizontally						
 8WH8121-1AB05	Versions						
	• Consecutive numbering		**8WH8121-1A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8121-1XA05 -Z and Y01**		100	100 units	1BT
 8WH8111-1AA05	**Labels, flat, for terminal width 3.5 mm and terminal size 1.5 mm², unprinted**		**8WH8111-1AA05**		100	100 units	1BT
 8WH8113-0AA05	**Labels, without inscription, for 8WH initiator/actuator terminals for labeling system**						
	Versions						
	• Front - For 3.5 mm terminal width (WIN 486)		**8WH8112-0AA05**		100	1800 units	1BT
	• Flat - For 3.5 mm terminal width (WIN 416)		**8WH8113-0AA05**		100	3000 units	1BT
	For more information, see see page 14/135 Section "Accessories for labeling system"						

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Overview

	Devices	Page	Function
	8WH through-type terminals	14/34	Connection of incoming and outgoing conductors up to 6 mm^2
	8WH through-type screw terminals	14/36	Connection of incoming and outgoing conductors up to 35 mm^2 with screw terminals
	8WH N-conductor isolating terminals	14/38	Terminal blocks up to 6 mm^2 and connection of an N-busbar 10 × 3 mm
	8WH N-conductor isolating screw terminals	14/40	Terminal blocks with screw connection up to 35 mm^2 and connection of an N-busbar 10 × 3 mm
	8WH installation terminals	14/42	Terminal blocks for connection of an N-busbar 10 × 3 mm. These terminals offer up to three terminal functions in a single enclosure and are optimized for distribution board applications in installation technology.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Conductor cross-section	Terminal type[1]		Color	Connection type → Screw terminals Design → Standard No. of clamping points → 2 Article No. (digits 1 ... 7) → 8WH1001	iPo technology Insta 8WH6001	Article No. (digits 8 ... 12)
2.5 mm²	Through-type		Gray	--	✔	0AF00
			Blue	--	✔	0AF01
	N-conductor isolating		Blue	--	✔	0BF01
	PE		Green-yellow	--	✔	0CF07
	Insta	L	Gray	--	✔	4QF00
		L/L		--	✔	4DF00
		L/N		--	✔	4CF00
		PE/L/L		--	✔	4HF00
		PE/L/N		--	✔	4EF00
		PE/L/NT		--	✔	4FF00
		PE/L/N isolating blade		--	✔	4GF00
		PE/L/L isolating blade		--	✔	4NF00
4 mm²	Through-type		Gray	--	✔	0AG00
			Blue	--	✔	0AG01
	N-conductor isolating		Blue	--	✔	0BG01
	PE		Green-yellow	--	✔	0CG07
6 mm²	Through-type		Gray	--	✔	0AH00
			Blue	--	✔	0AH01
	N-conductor isolating		Blue	--	✔	0BH01
	PE		Green-yellow	--	✔	0CH07
10 mm²	N-conductor isolating		Blue	✔	--	0BJ01
16 mm²	Through-type		Gray	✔	--	0AK00
			Blue	✔	--	0AK01
	N-conductor isolating		Blue	✔	--	0BK01
	PE		Green-yellow	✔	--	0CK07
35 mm²	Through-type		Gray	✔	--	0AM00
			Blue	✔	--	0AM01
	N-conductor isolating		Blue	✔	--	0BM01
	PE		Green-yellow	✔	--	0CM07

1) Only the main terminal types are listed here. You will find further versions on the following pages.

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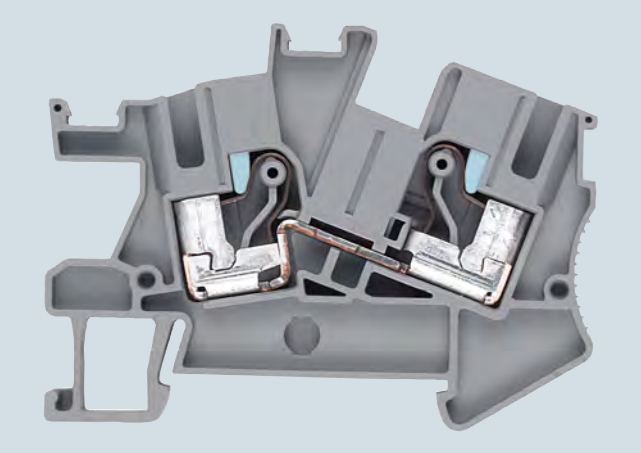
8WH through-type terminals

Overview



All types of conductors can be used with 8WH6 iPo technology.

Rigid conductors and crimped flexible conductors are plugged directly into the terminal.

Flexible, untreated conductors can be connected using a screwdriver.

These terminals can be used interconnected with the N-busbar 10 × 3 mm.

An inscription label can be snapped on to the middle of each terminal at the front. Labels can also be mounted flat on the clamping points of the terminals.

Technical specifications

		8WH6001-0AF00 8WH6001-0AF01	8WH6001-0CF07	8WH6001-0AG00 8WH6001-0AG01	8WH6000-0CG07	8WH6001-0AH00 8WH6001-0AH01	8WH6001-0AH07
Cross-section	mm^2	2.5	2.5 (PE)	4	4 (PE)	6	6 (PE)
Dimensions							
• Width / length / width of cover	mm	5.2 / 59.5 / 2.2		6.2 / 66 / 2.2		8.2 / 66 / 2.2	
• Height (TS 35/7.5 / TS 35/15)	mm	43 / 50.5		46.3 / 53.8		50 / 57.5	
Rated current I_n / cross-section	A / mm^2	24 / 2.5	-- / 2.5	32 / 4	-- / 4	41 / 6	-- / 6
Max. load current I_{max} / cross-section	A / mm^2	24 / 4	-- / 4	32 / 6	-- / 6	50/10	-- / 10
Rated voltage U_n	V	800	--	800	--	800	--
Connection capacities							
• Rigid	mm^2	0.14 ... 4		0.2 ... 6		0.5 ... 10	
• Flexible with end sleeve	mm^2	0.25 ... 2.5		0.25 ... 4		0.5 ... 6	
Stripped length	mm	10		12	12	12	
Molded plastic type		PA					
Flammability Class acc. to UL 94		V0					
Support rails/protective conductor busbars		--	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm^2							
 8WH6001-0AF00	**Through-type terminals, terminal size 2.5 mm^2, acc. to IEC 60 947-7-1** • Terminal width 5.2 mm, terminal length 59.5 mm, • Terminal height (NS 35/7.5) 43 mm • Max. load current I_{max} = 24 A • Rated voltage U_n = 800 V • Rigid 0.14 ... 4 mm^2 • Flexible with end sleeve 0.14 ... 2.5 mm^2 • AWG 26 ... 12						
	Versions						
	• Gray		**8WH6001-0AF00**		1	50 units	1BT
	• Blue		**8WH6001-0AF01**		1	50 units	1BT
 8WH6001-0CF07	**PE through-type terminals, terminal size 2.5 mm^2, acc. to IEC 60 947-7-2** • Green-yellow • Terminal width 5.2 mm, terminal length 59.5 mm, • Terminal height 43 mm • Cross-section max. 4 mm^2 • Rigid 0.2 ... 4 mm^2 • Flexible with end sleeve 0.2 ... 2.5 mm^2 • AWG 24 ... 12		**8WH6001-0CF07**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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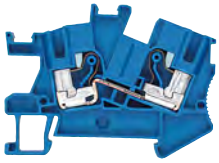
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm²							
 8WH6001-0AG00	**Through-type terminals, terminal size 4 mm², acc. to IEC 60947-7-1** • Terminal width 6.2 mm • Terminal length 66 mm • Terminal height 46.3 mm • Max. load current I_{max} = 32 A • Rated voltage U_n = 800 V • Rigid 0.2 ... 6 mm² • Flexible with end sleeve 0.2 ... 4 mm² • AWG 24 ... 10						
	Versions						
	• Gray		**8WH6001-0AG00**		1	50 units	1BT
	• Blue		**8WH6001-0AG01**		1	50 units	1BT
 8WH6001-0AG07	**PE through-type terminals, terminal size 4 mm², acc. to IEC 60947-7-2** • Green-yellow • Terminal width 6.2 mm • Terminal length 66 mm • Terminal height 46.3 mm • Rigid 0.2 ... 6 mm² • Flexible with end sleeve 0.2 ... 4 mm² • AWG 24 ... 10		**8WH6001-0CG07**		1	50 units	1BT
Terminal size 6 mm²							
 8WH6001-0AH00	**Through-type terminals, terminal size 6 mm², acc. to IEC 60947-7-1** • Terminal width 8.2 mm • Terminal length 66 mm • Terminal height 50 mm • Max. load current I_{max} = 41 A • Rated voltage U_n = 800 V • Rigid 0.5 ... 10 mm² • Flexible with end sleeve 0.5 ... 6 mm² • AWG 20 ... 8						
	Versions						
 8WH6001-0AH01	• Gray		**8WH6001-0AH00**		1	50 units	1BT
	• Blue		**8WH6001-0AH01**		1	50 units	1BT
 8WH6001-0AH07	**PE through-type terminals, terminal size 6 mm², acc. to IEC 60947-7-2** • Green-yellow • Terminal width 8.2 mm • Terminal length 66 mm • Terminal height 50 mm • Rigid 0.5 ... 10 mm² • Flexible without end sleeve 0.5 ...10 mm² • Flexible with end sleeve 0.5 ... 6 mm² • AWG 20 ... 8		**8WH6001-0CH07**		1	50 units	1BT
Accessories							
 8WH9143-0AF01	**Support brackets** • Made of blue molded plastic • For holding the N-busbar						
	Versions						
	• For terminal size 2.5 ... 4 mm²		**8WH9143-0AF01**		1	50 units	1BT
	• For terminal size 6 mm²		**8WH9143-0AH01**		1	50 units	1BT
 8WH9000-1WA00	**Covers** Gray						
	Versions						
	• For terminal size 2.5 mm²		**8WH9000-1WA00**		100	50 units	1BT
	• For terminal size 4 mm²		**8WH9003-7WA00**		100	50 units	1BT
	• For terminal size 6 mm²		**8WH9004-1WA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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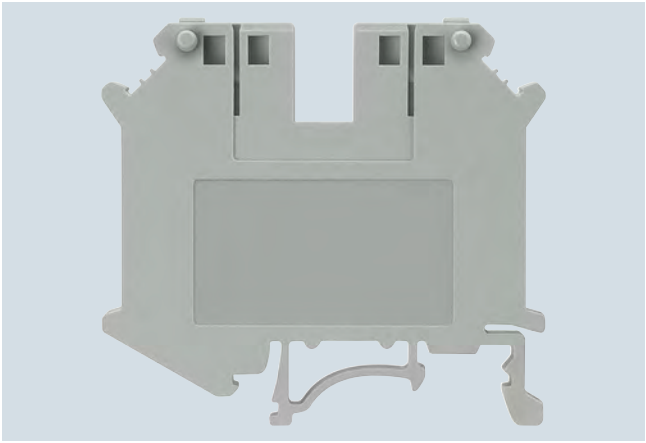
Overview



We offer a comprehensive range of installation terminals with iPo technology for use in building management systems. We also offer a range of compact, cost-effective terminal blocks with screw terminals for connecting larger cross-sections.

Terminal blocks mounted on N-busbars are most commonly used in building management systems. In order to enable the butt-mounting of different terminals, contact to the N-busbar is always on the same mounting level. This means that 8WH1001 screw terminals and 8WH6001 plug-in terminals can be combined as required and mounted on a single support rail.

Labels can be affixed at each clamping point by simply snapping them on at the front.

Technical specifications

		8WH1001-0AK00 8WH1001-0AK01	8WH1001-0CK07	8WH1001-0AM00 8WH1001-0AM01	8WH1001-0CM07
Cross-section	mm^2	16	16 (PE)	35	35 (PE)
Max. cross-section with comb (rigid / flexible)	mm^2	16 / 16	--	35 / 35	--
Dimensions					
• Width / length / width of cover	mm	12.2 / 42.5 / 1.8	12.2 / 42.5 / --	15.2 / 55 / --	15.2 / 55 / --
• Height (TS 35/7.5 / TS 35/15)	mm	47 / 54.5 / 52	47 / 54.5 / 52	51 / 58.5 / 56	51 / 58.5 / 56
Max. load current I_{max} / cross-section	A/mm^2	101 / 25	101 / 25	125 / 35	125 / 35
Rated impulse withstand voltage / pollution degree	kV	6 / 3	6 / 3	8 / 3	8 / 3
Overvoltage category / molded plastic group		III / I	III / I	III / I	III / I
Connection capacities					
• For one conductor					
- Rigid	mm^2	1.5 ... 16	1.5 ... 16	0.75 ... 35	0.75 ... 35
- Flexible with end sleeve	mm^2	1.5 ... 16	1.5 ... 16	0.75 ... 35	0.75 ... 35
• For two conductors of same cross-section					
- Rigid / flexible	mm^2	1.5 ... 6 / 1.5 ... 6	1.5 ... 6 / 1.5 ... 4	0.75 ... 10 / 0.75 ... 10	0.75 ... 10 / 0.75 ... 10
- Flexible with end sleeve	mm^2	1.5 ... 4	1.5 ... 6	0.75 ... 10	0.75 ... 10
Stripped length	mm	11	11	16	16
Plug gauge (IEC 60947-1)		B7	B7	B9	B9
Clamping point: screw thread / tightening torque	Nm	M4 / 1.5 ... 1.8	M4 / 1.5 ... 1.8	M6 / 3.2... 3.7	M5 / 3.2... 3.7
Fixing: screw thread / tightening torque	Nm	--	M4 / 1.5 ... 1.8	--	M5 / 2.5... 3
Molded plastic type		PA	PA	PA	PA
Flammability Class acc. to UL 94		V2	V2	V2	V2
Approval data (UL/cUL and CSA)					
• UL/cUL					
- Rated voltage / rated current / conductor sizes	V/A/AWG	600 / 85 / 22 ... 4	-- / -- / 22 ... 4	600 / 115 / 18 ... 2	-- / -- / 18 ... 2
• CSA					
- Rated voltage / rated current / conductor sizes	V/A/AWG	600 / 85 / 22 ... 4	-- / -- / 22 ... 4	600 / 130 / 18 ... 2	-- / -- / --

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 16 mm^2							
 8WH1001-0AK00	**Through-type screw terminals, terminal size 16 mm^2** Width 12.2 mm						
	Versions						
	• Gray		**8WH1001-0AK00**		1	50 units	1BT
	• Blue		**8WH1001-0AK01**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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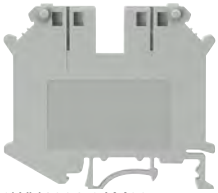
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 16 mm² (continued)							
 8WH1001-0CK07	**PE through-type screw terminals, terminal size 16 mm²** • Width 12.2 mm • Enclosed at both ends • Green-yellow		**8WH1001-0CK07**		1	50 units	1BT
Terminal size 35 mm²							
 8WH1001-0AM00	**Through-type screw terminals, terminal size 35 mm²** • Width 16 mm • Enclosed at both ends Versions • Gray • Blue		**8WH1001-0AM00** **8WH1001-0AM01**		1 1	50 units 50 units	1BT 1BT
 8WH1001-0CM07	**PE through-type screw terminals, terminal size 35 mm²** • Width 16 mm • Enclosed at both ends • Green-yellow		**8WH1001-0CM07**		1	50 units	1BT
Accessories							
 8WH9005-3PA00	**Covers, for screw terminals** • 10/16 mm² • Width 2 mm • Gray		**8WH9005-3PA00**		100	50 units	1BT
 8WH9030-6AL00	**Connecting combs, 10-pole** For through-type terminals, 16 mm², gray and blue		**8WH9030-6AL00**		1	10 units	1BT
 8WH9030-6BC00	**Connecting combs, 2-pole** For through-type terminals, 35 mm², gray and blue		**8WH9030-6BC00**		1	10 units	1BT
 8WH9030-6BD00	**Connecting combs, 3-pole** For through-type terminals, 35 mm², gray and blue		**8WH9030-6BD00**		1	10 units	1BT
 8WH9070-6HA00	**Compartment partitions** For through-type terminals, 16 mm², gray and blue		**8WH9070-6HA00**		100	50 units	1BT
 8WH9070-6GA00	**Insulation plates** For through-type terminals, 16 and 35 mm², gray and blue		**8WH9070-6GA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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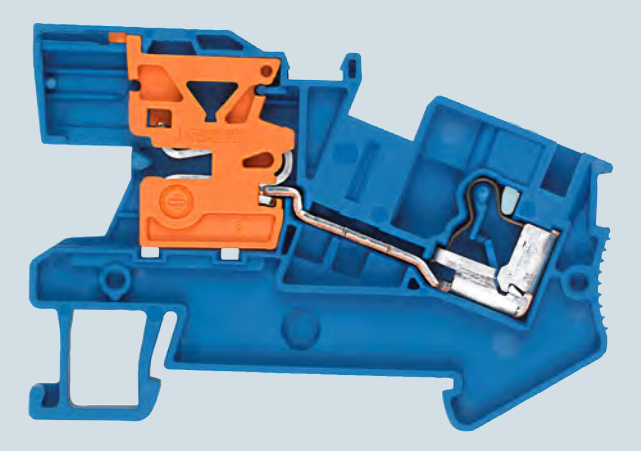
8WH N-conductor isolating terminals

Overview



The N-conductor disconnect slides are located in the same position on all 8WH6001 terminals with an iPo plug-in connection.

A 10 × 3 mm busbar is used.

Notice: Only use Cu busbars.

Installation instructions: To ensure that the N-busbars are securely mounted, the support brackets must be placed at the beginning and end of each terminal strip (in the case of longer terminal strips: every 20 cm).

A label can be snapped on to the middle of the terminal at the front. Labels can also be mounted flat on the clamping points of the terminals (not with N-busbar connection).

Technical specifications

		8WH6001-0BF01	8WH6001-0BG01	8WH6001-0BH01
Cross-section	mm^2	2.5	4	6
Dimensions				
• Width / length / width of cover	mm	5.2 / 59 / 2.2	6.2 / 66 / 2.2	8.2 / 66 / 2.2
• Height (NS 35/7.5 / NS 35/15)	mm	46.3 / 53.8	46.3 / 53.8	50 / 57.5
Rated current I_n / cross-section	A / mm^2	24 / 2.5	32 / 4	41 / 6
Rated voltage U_n	V	250	250	400
Connection capacities				
• Rigid	mm^2	0.14 ... 4	0.2 ... 6	0.5 ... 10
• Flexible with end sleeve	mm^2	0.25 ... 2.5	0.25 ... 4	0.5 ... 6
Stripped length	mm	10	10	12
Molded plastic type		PA	PA	PA
• Flammability Class acc. to UL 94		V0	V0	V0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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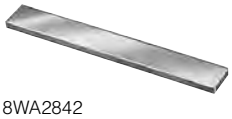
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 2.5 mm²							
 8WH6001-0BF01	**N-conductor isolating terminals, terminal size 2.5 mm², acc. to IEC 60947-7-1** • Two clamping points • Terminal width 5.2 mm • Terminal length 59 mm • Terminal height (NS 35/7.5) 46.3 mm • Rated current I_n / cross-section = 24 A / 2.5 mm² • Rated voltage U_n = 250 V • Rigid 0.14 ... 4 mm² • Flexible with end sleeve 0.14 ... 2.5 mm² • AWG 26 ... 12		**8WH6001-0BF01**		1	50 units	1BT
Terminal size 4 mm²							
 8WH6001-0BG01	**N-conductor isolating terminals, terminal size 4 mm², acc. to IEC 60947-7-1** • Two clamping points • Terminal width 6.2 mm • Terminal length 66 mm • Terminal height (NS 35/7.5) 46.3 mm • Rated current I_n / cross-section = 32 A / 4 mm² • Rated voltage U_n = 250 V • Rigid 0.2 ... 6 mm² • Flexible with end sleeve 0.25 ... 4 mm² • AWG 24 ... 10		**8WH6001-0BG01**		1	50 units	1BT
Terminal size 6 mm²							
 8WH6001-0BH01	**N-conductor isolating terminals, terminal size 6 mm², acc. to IEC 60947-7-1** • Two clamping points • Terminal width 8.2 mm • Terminal length 66.3 mm • Terminal height (NS 35/7.5) 50 mm • Max. load current I_{max} = 41 A • Rated current I_n / cross-section = 41 A / 6 mm² • Rated voltage U_n = 400 V • Rigid 0.5 ... 10 mm² • Flexible with end sleeve 0.5 ... 6 mm² • AWG 20 ... 8		**8WH6001-0BH01**		1	50 units	1BT
Accessories							
 8WH9143-0AF01	**Support brackets** • Made of blue molded plastic • For holding the N-busbar Versions • For terminal size 2.5 ... 4 mm² • For terminal size 6 mm²		**8WH9143-0AF01** **8WH9143-0AH01**		1 1	50 units 50 units	1BT 1BT
 8WH9000-1SA00	**Covers** Gray Versions • For terminal size 2.5 mm² • For terminal size 4 mm² • For terminal size 6 mm²		**8WH9000-1SA00** **8WH9003-1SA00** **8WH9004-1SA00**		100 100 100	50 units 50 units 50 units	1BT 1BT 1BT
 8WA2867/8WA2868/ 8WA2870	**Feeder terminals, for N-busbars** • 6 × 6 mm and 10 × 3 mm • Bare Versions • Rated uninterrupted current 32 A, for connection of up to 4 mm² • Rated uninterrupted current 76 A, for connection of up to 25 mm² • Rated uninterrupted current 125 A, for connection of up to 35 mm²		**8WA2867** **8WA2868** **8WA2870**		1 1 1	50 units 50 units 50 units	1BT 1BT 1BT
 8WA2842	**N-busbars, 10 x 3 mm** • Tin-plated • 1000 mm long		**8WA2842**		1	1 unit	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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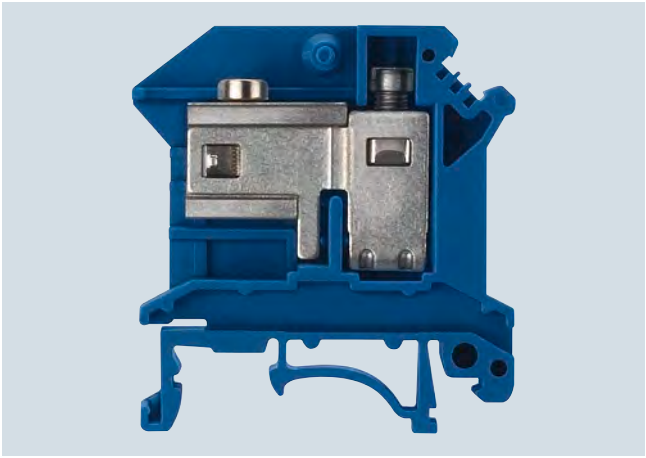
8WH N-conductor isolating screw terminals

Overview



We offer a comprehensive range of installation terminals with iPo plug-in technology for use in building management systems. We also offer a range of compact, cost-effective terminal blocks with screw terminals for connecting larger cross-sections.

Terminal blocks mounted on N-busbars are most commonly used in building management systems. In order to enable the butt-mounting of different terminals, contact to the N-busbar is always on the same mounting level. This means that 8WH1001 screw terminals and 8WH6001 plug-in terminals can be combined as required and mounted on a single support rail.

The compact design of our N-conductor isolating terminals makes for a neat and clearly arranged terminal strip. The N-busbar can be connected over the terminal or over the disconnect slide of the N-conductor isolating terminal. The N-conductor isolating terminal also makes it easy to perform insulation measurements.

Labels can be affixed on the clamping points (screw) by simply snapping them on at the front.

Notice: Only use Cu busbars.

Technical specifications

		8WH1001-0BJ01	8WH1001-0BK01	8WH1001-0BM01
Cross-section	mm^2	10	16	35
Dimensions				
• Width / length / width of cover	mm	10.2 / 43.5 / 1.8	12.2 / 43.5 / 1.5	16 / 55 / --
• Height (TS 35/7.5 / TS 35/15)	mm	47 / 54.5 / 52	54 / 61.5 / 59	51 / 58.5 / 56
Max. load current I_{max} / cross-section	A/mm^2	63 / 16	90 / 25	110 / 35
Rated impulse withstand voltage / pollution degree	kV	6 / 3	6 / 3	6 / 3
Overvoltage category / molded plastic group		III / I	III / I	III / I
Connection capacities				
• For one conductor				
- Rigid	mm^2	1.5 ... 10	1.5 ... 16	0.75 ... 35
- Flexible with end sleeve	mm^2	1.5 ... 6	1.5 ... 16	0.75 ... 35
• For two conductors of same cross-section				
- Rigid / flexible	mm^2	1.5 ... 4 / 0.5 ... 4	1.5 ... 6 / 1.5 ... 4	0.75 ... 10 / 0.75 ... 10
- Flexible with end sleeve	mm^2	1.5 ... 2.5	1.5 ... 8	0.75 ... 10
Stripped length	mm	12	11	16
Plug gauge (IEC 60947-1)		B5	B6	B9
Clamping point: screw thread / tightening torque	Nm	M4 / 1.5 ... 1.8	M4 / 1.5 ... 1.8	M6 / 3.2 ... 3.7
Fixing: screw thread / tightening torque	Nm	M3 / 0.6 ... 0.8	M3 / 0.6 ... 0.8	M5 / 2.5 ... 3
Molded plastic type		PA	PA	PA
Flammability Class acc. to UL 94		V2	V2	V2

Minimum order quantity (PS) or a multiple thereof can be ordered.

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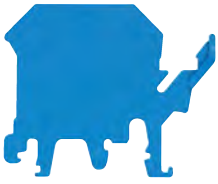
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 10 mm²							
 8WH1001-0BJ01	**N-conductor isolating screw terminals, terminal size 10 mm²** • Width 10 mm • Blue • For 10 x 3 mm N-busbar		**8WH1001-0BJ01**		1	50 units	1BT
Terminal size 16 mm²							
 8WH1001-0BK01	**N-conductor isolating screw terminals, terminal size 16 mm²** • Width 12 mm • Blue • For 10 x 3 mm N-busbar		**8WH1001-0BK01**		1	50 units	1BT
Terminal size 35 mm²							
 8WH1001-0BM01	**N-conductor isolating screw terminals, terminal size 35 mm²** • Width 16 mm • Enclosed at both ends • Blue		**8WH1001-0BM01**		1	50 units	1BT
Accessories							
 8WH9005-3PA00	**Covers, for screw terminals** • 10/16 mm² • Width 2 mm • Gray		**8WH9005-3PA00**		100	50 units	1BT
 8WH9141-0BA01	**Support brackets for N-conductor isolating screw terminals, terminal size 10 ... 35 mm²** • For holding the N-busbar • To be placed every 20 cm • 2 mm wide		**8WH9141-0BA01**		1	50 units	1BT
 8WH9126-0BA01	**Terminals** Blue Versions • Up to 16 mm², Width: 10.3 mm		**8WH9126-0BA01**		1	50 units	1BT
 8WA2842	**N-busbars, 10 x 3 mm** • Made of copper, tin-plated • 1000 mm long		**8WA2842**		1	1 unit	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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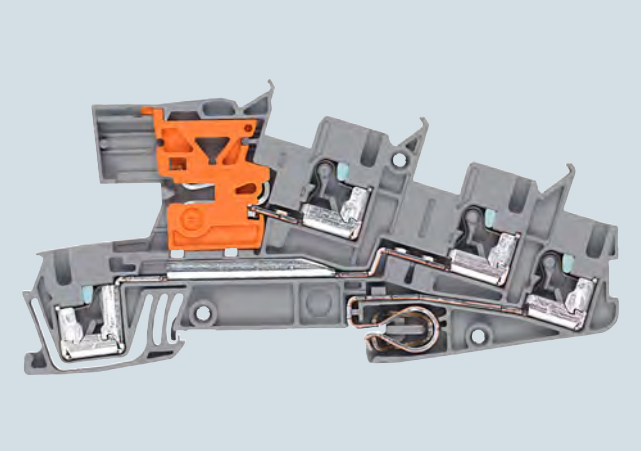
Overview



The three-tier plug-in terminals offer optimum operating characteristics for modern building installations. The plug-in connection allows tool-free wiring of the solid conductors.

These terminals can be used interconnected with the N-busbar 10 × 3 mm.

Notice: Only use Cu busbars.

Thanks to their compact design, the three-tier terminals can be installed in all types of building distribution boards. A load circuit can be quickly and easily wired, for example using a 5.2-mm-wide installation terminal with terminal size 2.5 mm^2 and PE/L/NT connections.

The double bridge shafts support a multitude of individual wiring tasks. This also means it is practical and convenient to make subsequent modifications to the installation.

Labels can be mounted flat on the clamping points of the terminals.

Technical specifications

Installation terminals, standard version **Installation terminals with isolating function**		**8WH6001-4QF00** **8WH6001-4DF00** **8WH6001-4CF00**	**8WH6001-0HF00** **8WH6001-4EF00** **8WH6001-4GF00** **8WH6001-4NF00** **8WH6001-4PF00** **8WH6001-4MF00**	**8WH6001-4FF00**
Cross-section	mm^2	2.5		
Dimensions				
• Width / length / width of cover	mm	5.5 /101 / 2.2		
• Height (TS 35/7.5 / TS 35/15)	mm	50.5 / 58		
Rated current I_n / cross-section	A / mm^2	24 / 4		
Max. load current I_{max} / cross-section	A / mm^2	30[1] / 4		
Rated voltage U_n	V	400 (L-L)		
		250 (L-N or L-PE)		
Connection capacities				
• Rigid	mm^2	0.14 ... 4		
• Flexible with end sleeve	mm^2	0.14 ... 2.5		
Stripped length without insulation stop sleeve (no insulation stop sleeves should be used when using end sleeves)	mm	10		
Stripped length with insulation stop sleeve (no insulation stop sleeves should be used when using end sleeves)	mm	10		
Plug gauge (IEC 60947-1)		A3		
Molded plastic type		PA		
Flammability Class acc. to UL 94		V0		

[1] 3-pole terminal block

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH6001-4QF00	**Installation terminals, terminal size 2.5 mm², standard version for N-busbar** • Gray • Terminal width 5.2 mm • Rigid 0.14 ... 4 mm² • Flexible with end sleeve 0.14 ... 2.5 mm² • AWG 26 ... 12 • Rated current / cross section I_n = 24 A / 4 mm² • Rated voltage U_n = 400 V (L-L) U_n = 250 V (L-N or L-PE)						
 8WH6001-4DF00	Versions						
	• L		**8WH6001-4QF00**		1	50 units	1BT
	• L/L		**8WH6001-4DF00**		1	50 units	1BT
	• L/N		**8WH6001-4CF00**		1	50 units	1BT
 8WH6001-4HF00	• PE/L/L		**8WH6001-4HF00**		1	50 units	1BT
	• PE/L/N		**8WH6001-4EF00**		1	50 units	1BT
	• PE/L/NT		**8WH6001-4FF00**		1	50 units	1BT
 8WH6001-4FF00							
 8WH6001-4NF00	**Installation terminals, terminal size 2.5 mm², with isolating blade** • Gray • Terminal width 5.2 mm • Rigid 0.25 ... 4 mm² • Flexible with end sleeve 0.25 ... 2.5 mm² • AWG 22 ... 12 • Rated current / cross section I_n = 24 A / 4 mm² • Rated voltage U_n = 400 V (L-L) U_n = 250 V (L-N or L-PE) • The isolating element must not be replaced under load.						
	Versions						
	• PE/L/L (standard version, suitable for isolating terminals)		**8WH6001-4PF00**		1	50 units	1BT
	• PE/L/N isolating blade		**8WH6001-4GF00**		1	50 units	1BT
	• PE/L/L isolating blade		**8WH6001-4NF00**		1	50 units	1BT
 8WH6001-4PF00	**Installation terminals, terminal size 2.5 mm², for isolating function** • Gray • Terminal width 5.2 mm • Rigid 0.25 ... 4 mm² • Flexible with end sleeve 0.25 ... 2.5 mm² • AWG 22 ... 12 • Rated current / cross section I_n = 24 A / 4 mm² • Rated voltage U_n = 400 V (L-L) U_n = 250 V, (L-PE) • The isolating element must not be replaced under load.						
	Versions						
	• PE/L/L (standard version, suitable for isolating terminals)		**8WH6001-4PF00**		1	50 units	1BT
	• PE/L/L isolation		**8WH6001-4MF00**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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8WH installation terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
 8WH9142-0AF01	**Support brackets, for terminal size 2.5 mm²** • For holding the N-busbar • To be placed every 20 cm • 2 mm wide		**8WH9142-0AF01**		1	50 units	1BT
 8WH9000-3SA00	**Covers, for terminal size 2.5 mm²** gray		**8WH9000-3SA00**		1	50 units	1BT
 8WH9000-6SA00	**Covers, for terminal size 2.5 mm² and isolating terminal in the contour** gray		**8WH9000-6SA00**		1	50 units	1BT
 8WA2867/8WA2868/ 8WA2870	**Feeder terminals, for N-busbars** • 6 × 6 mm and 10 × 3 mm • Bare						
	Versions						
	• Rated uninterrupted current 32 A, for connection of up to 4 mm²		**8WA2867**		1	50 units	1BT
	• Rated uninterrupted current 76 A, for connection of up to 25 mm²		**8WA2868**		1	50 units	1BT
	• Rated uninterrupted current 125 A, for connection of up to 35 mm²		**8WA2870**		1	50 units	1BT
 8WA2842	**N-busbars, 10 x 3 mm** • Made of copper, tin-plated • 1000 mm long		**8WA2842**		1	1 unit	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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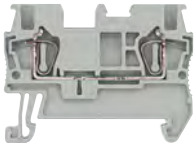
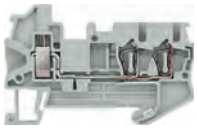
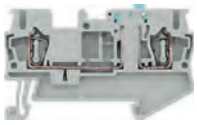
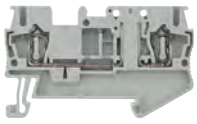
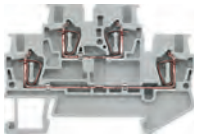
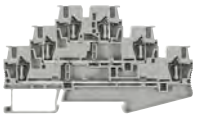
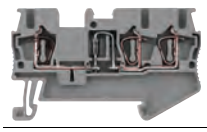
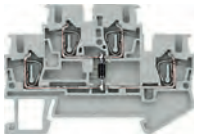
Overview

	Devices	Page	Application
8WH terminals			
	Through-type terminals	14/50	Connection of incoming and outgoing conductors up to 35 mm^2
	Hybrid through-type terminals	14/61	Terminals with a range of connection methods
	Fuse terminals	14/64	Terminals which can be used to protect control circuits, for example
	Isolating blade terminals	14/66	Isolation of the circuit, e.g. for test purposes
	Isolating terminals	14/68	Isolation of the circuit, e.g. for test purposes
	Two-tier terminals	14/70	Compact form of the terminal blocks in which two connection wires can be installed
	Three-tier terminals	14/76	Compact terminal blocks up to 2.5 mm^2, in which three connection wires can be installed
	Four-tier motor terminals	14/78	Compact terminal blocks up to 4 mm^2, in which three connection wires plus PE can be installed
	Diode terminals	14/80	Terminal blocks with integrated diodes
	Two-tier diode terminals	14/82	Terminal blocks with integrated diodes

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General data

Overview

Conductor cross-section	Terminal type[1]	Color	Connection type → Standard spring-loaded connection Design → Standard No. of clamping points → 2 Article No. (digits 1 ... 7) → 8WH2000	3 8WH2003	4 8WH2004	Two-tier 4 8WH2020	6 8WH2023	Article No. (digits 8 ... 12)
1.5 mm²	Through-type	Gray	✔	✔	✔	✔	--	0AE00
		Blue	✔	✔	✔	✔	--	0AE01
	PE	Green-yellow	✔	✔	✔	✔	--	0CE07
2.5 mm²	Through-type	Gray	✔	✔	✔	✔	✔	0AF00
		Blue	✔	✔	✔	✔	✔	0AF01
	Isolating	Gray	✔	✔	✔	--	--	6AF00
	Isolating blade	Gray	✔	✔	✔	--	--	0CF00
	PE	Green-yellow	✔	✔	✔	✔	✔	0CF07
4 mm²	Through-type	Gray	✔	✔	✔	✔	--	0AG00
		Blue	✔	✔	✔	✔	--	0AG01
	Isolating	Gray	✔	--	--	--	--	6AG00
	Isolating blade	Gray	✔	--	--	--	--	6CG00
	PE	Green-yellow	✔	✔	✔	✔	--	0CG07
6 mm²	Through-type	Gray	✔	✔	--	--	--	0AH00
		Blue	✔	✔	--	--	--	0AH01
	PE	Green-yellow	✔	✔	--	--	--	0CH07
10 mm²	Through-type	Gray	✔	--	--	--	--	0AJ00
		Blue	✔	--	--	--	--	0AJ01
	PE	Green-yellow	✔	--	--	--	--	0CJ07
16 mm²	Through-type	Gray	✔	--	--	--	--	0AK00
		Blue	✔	--	--	--	--	0AK01
	PE	Green-yellow	✔	--	--	--	--	0CK07
35 mm²	Through-type	Gray	✔	--	--	--	--	0AM00
		Blue	✔	--	--	--	--	0AM01
	PE	Green-yellow	✔	--	--	--	--	0CM07

1) Only the main terminal types are listed here. You will find further versions on the following pages.

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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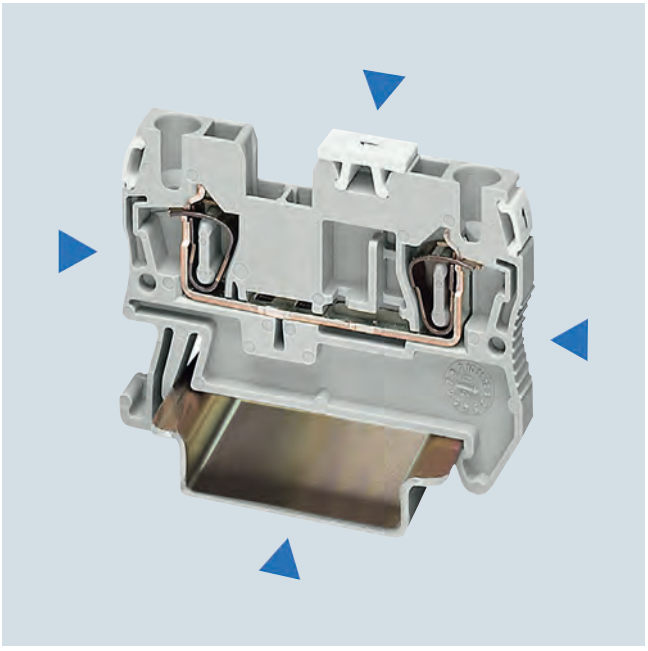


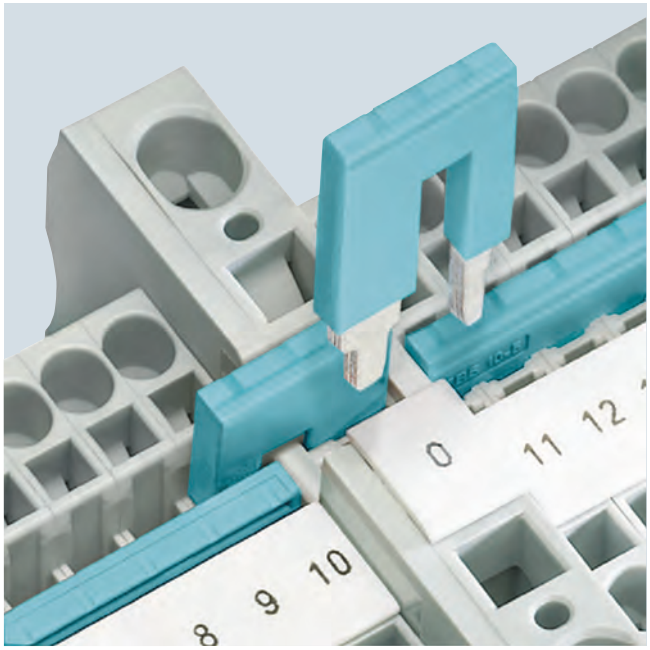
The space-saving design and conductor routing from above make spring-loaded terminals ideal for controlgear installations with minimum available space. The terminals are open at one end and can be closed using the appropriate covers.



The large and unambiguous marking in the center of the terminal is essential for ensuring reliable installation in minimum time. Each clamping point can also be separately labeled.



Spring-loaded terminals provide a large connection compartment for fast wiring of flexible and rigid conductors, including conductors with nominal cross-section and a fitted end sleeve.



Reducing combs enable easy connection of terminals with various nominal cross-sections. For example, they can be used for the fast creation of infeed blocks, e.g. by connecting a 10 mm^2 spring-loaded terminal with a 2.5 or 4 mm^2 spring-loaded terminal.

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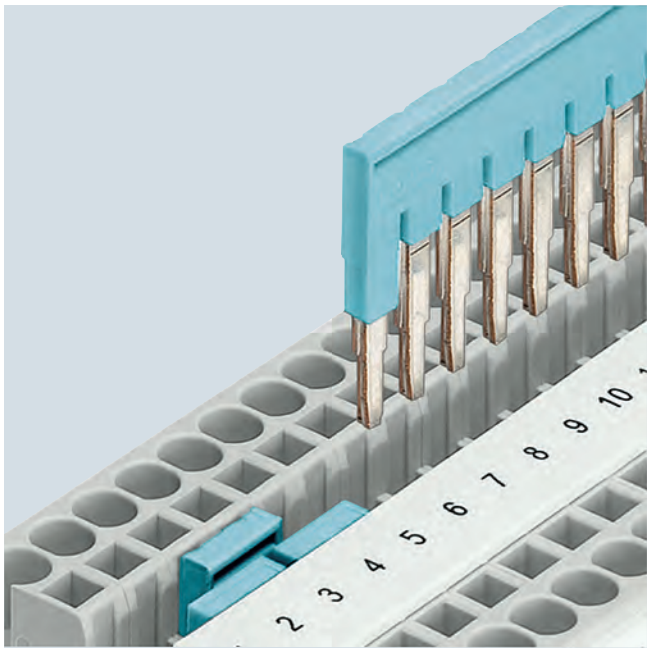
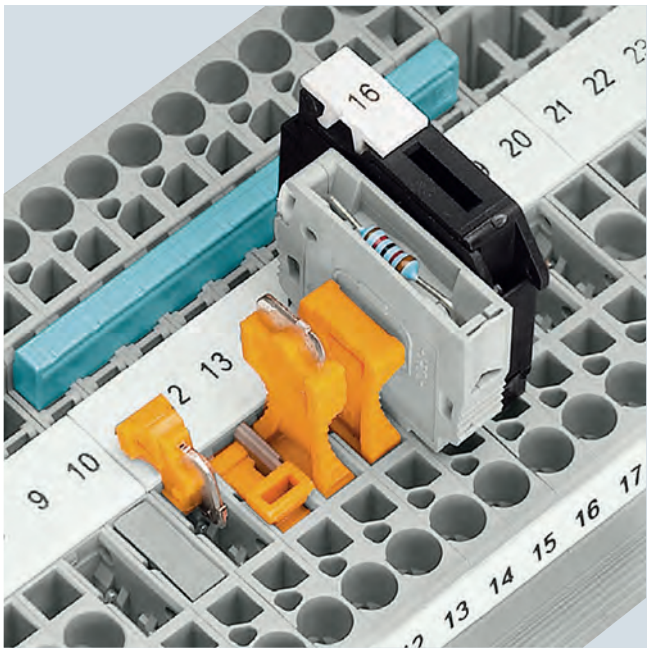
General data

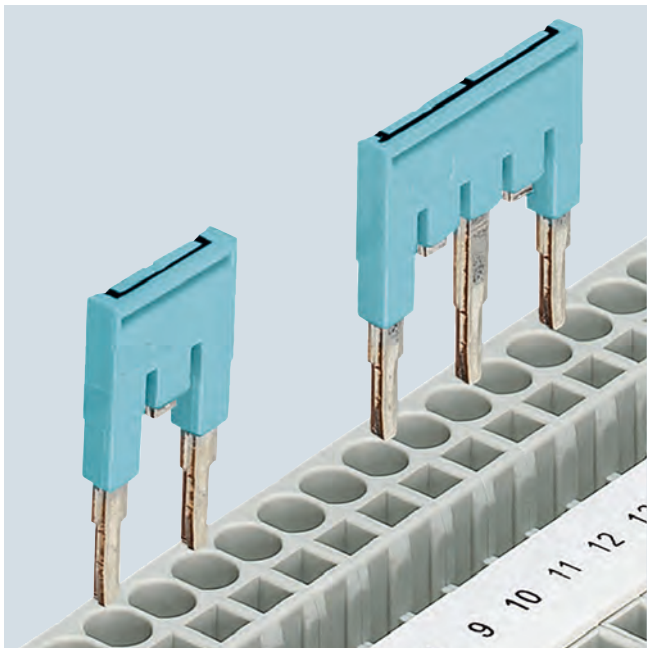


The 2 to 50-pole connecting combs also considerably reduce the time needed for assembly and wiring as they enable up to 50 terminals to be connected in a single step.

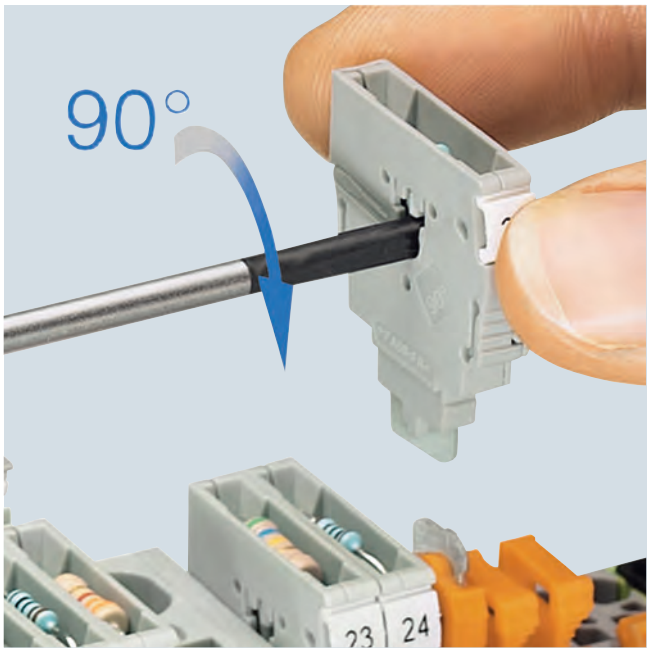


The universal plug-in zones of the isolating terminal can accommodate the isolated through-type connectors, isolating plugs, component connectors and fused connectors.

The isolating element (isolating plug) must not be replaced under load.



Contact tabs can be removed from the standard comb in order to skip individual terminals. This means that two potentials can run in parallel on a single terminal strip. The contact points can additionally be marked.



The component connector enables the convenient equipping with electronic components. One turn of the screwdriver opens the contact points and the component is easily inserted.

The isolating element must not be replaced under load.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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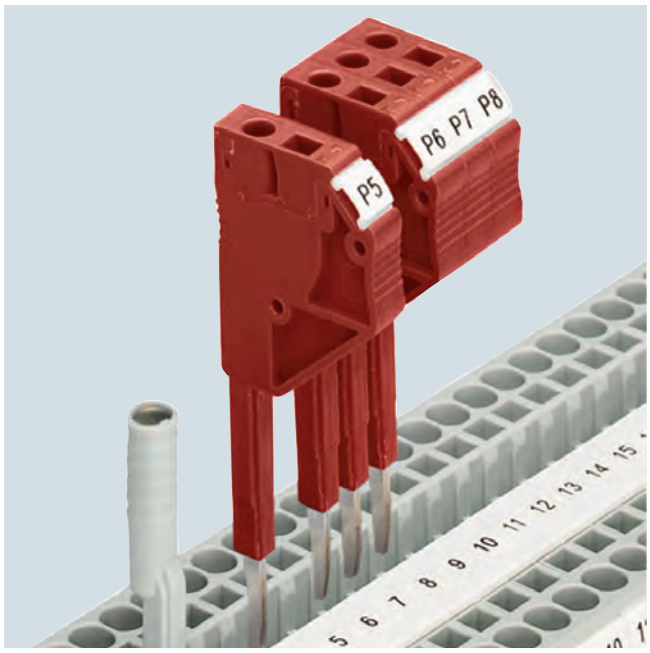
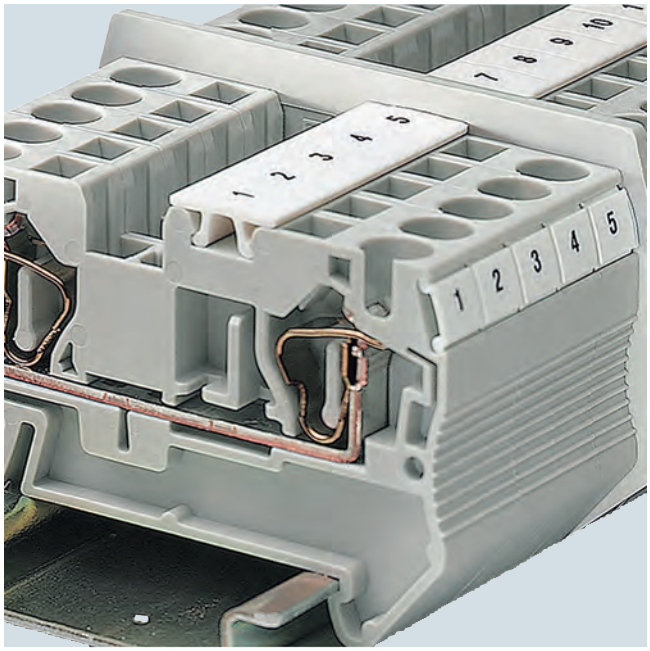


A comprehensive range of test accessories is also available for the spring-loaded terminal series. The test adapters for Ø 4 mm test plugs and modular test plugs enable all measuring and testing jobs to be performed in minimum time.



Cover segments are used to cover the projecting terminal segments of three and four-wire terminals when mounting two-wire terminals side-by-side. This ensures touch protection.

Note: The accessories for 8WH can only be used for 8WH terminals.



The compartment partitions project beyond the contours of the terminals and separate the groups both visually and electrically.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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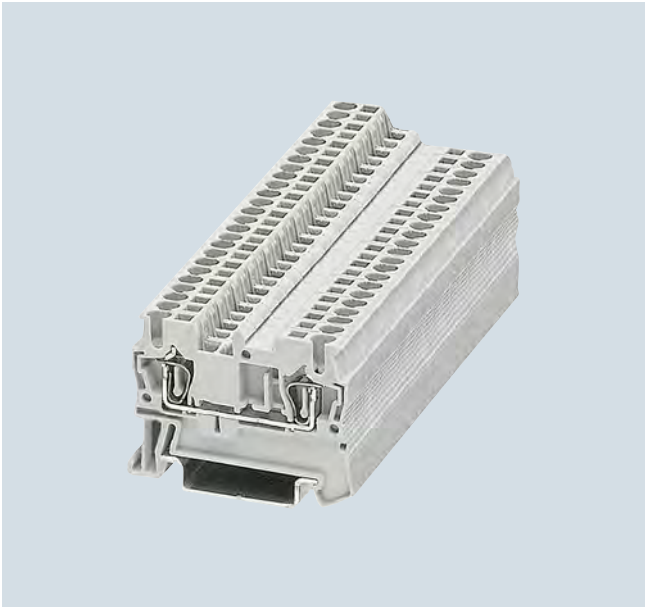
Overview



With two clamping points

The through-type terminals have an impressive space-saving design and offer optimized handling. With its front connection arrangement this series provides additional space between the cable ducts for wiring.

The double bridge shaft enables individual chain bridging with connecting combs. Accessories are available for testing and labeling.

With three clamping points

Terminals with three clamping points are a space-saving alternative to the standard through-type terminals for branching the potential.

It is often necessary for three conductors to be routed to a single terminal. This three-clamping-point version enables this without the need for additional terminals and jumpers.

With four clamping points

The double connection of the through-type terminals with four clamping points enables four conductors to be connected to a single potential. These versions with four clamping points are therefore suitable for use as compact potential distributors.

A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

PE/ground conductor function

The PE through-type terminals are available with the same contour as the through-type terminals. Simply snap the terminals onto the support rail to achieve full mechanical and electrical contact with the support rail.

The PE through-type terminals meet all the requirements of IEC 60947-7-2:

- Low contact resistance
- Stainless clamping points
- Green-yellow enclosure
- Additional inscription options

Technical specifications

	8WH2000-0AE0.	8WH2000-0CE07	8WH2003-0AE00 8WH2003-0AE01	8WH2003-0CE07	8WH2004-0AE00 8WH2004-0AE01
Dimensions					
• Width/length/cover width in mm	4.2 / 48.5 / 2.2		4.2 / 60.5 / 2.2		4.2 / 72 / 2.2
• Height (NS 35/7.5 / NS 35/15) in mm	36.8 / 44		36.5 / 44		
Technical specifications acc. to IEC/DIN VDE					
• Max. load current in A / cross-section in mm^2	17.5 / 1.5	--	17.5 / 1.5	--	17.5 / 1.5
• Rated impulse withstand voltage in kV / pollution degree	6 / 3				
• Overvoltage category / molded plastic group	III / I				
Connection capacities					
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 1.5				
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 1.5				
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5				
Stripped length in mm	10				
Plug gauge (IEC 60947-1)	A1				
Molded plastic type	PA				
• Flammability Class acc. to UL 94	V0				
Approval data (UL/cUL and CSA)					
• Rated voltage / rated current / conductor sizes					
- UL/cUL: in V/A / AWG	300 / 15 / 26 ... 14	-- / -- / 26 ... 14	300 / 15 / 26 ... 14	-- / -- / 26 ... 14	300 / 15 / 26 ... 14
- CSA: in V/A / AWG	300 / 15 / 26 ... 14	-- / -- / 26 ... 14	300 / 15 / 26 ... 14	--	300 / 15 / 26 ... 14
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	8WH2004-0CE07	8WH2000-0AF0.	8WH2000-0CF07	8WH2003-0AF00 8WH2003-0AF01	8WH2003-0CF07
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 4.2 / 72 / 2.2 36.5 / 44	 5.2 / 48.5 / 2.2 36.8 / 44		 5.2 / 60.5 / 2.2 36.5 / 44	
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 -- 6 / 3 III / I	 31 / 4 8 / 3	--	 28 / 4	--
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 1.5 0.25 ... 1.5 0.5	 0.25 ... 2.5 0.25 ... 2.5			
Stripped length in mm	10				
Plug gauge (IEC 60947-1)	A1	A3			
Molded plastic type • Flammability Class acc. to UL 94	PA V0				
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 -- / -- / 26 ... 14 -- / -- / 26 ... 14	 300 / 20 / 26 ... 12 --	 -- / -- / 26 ... 12	 600 / 20 / 26 ... 12	 -- / -- / 26 ... 12
Support rails/protective conductor busbars	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"

	8WH2004-0AF00 8WH2004-0AF01	8WH2004-0CF07	8WH2000-0AG0.	8WH2003-0AG00 8WH2003-0AG01	8WH2004-0AG00 8WH2004-0AG01
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 5.2 / 72 / 2.2 36.5 / 44		 6.2 / 56 / 2.2 36.8 / 44	 6.2 / 71.5 / 2.2 36.5 / 44	 6.2 / 87 / 2.2
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 28 / 4 8 / 3 III / I	--	 40 / 6		
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 2.5 0.25 ... 2.5 0.5		 0.25 ... 4 0.25 ... 4 0.5 ... 1		
Stripped length in mm	10				
Plug gauge (IEC 60947-1)	A3		A4		
Molded plastic type • Flammability Class acc. to UL 94	PA V0				
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 600 / 20 / 26 ... 12 --	 -- / -- / 26 ... 12	 600 / 30 / 20 ... 10		
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"	--	--	--

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8WH through-type terminals

	8WH2000-0CG07	8WH2003-0CG07	8WH2004-0CG07	8WH2000-0AH00 8WH2000-0AH01	8WH2003-0AH00 8WH2003-0AH01
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 6.2 / 56 / 2.2 36.8 / 44	 6.2 / 71.5 / 2.2 36.5 / 44	 6.2 / 87 / 2.2	 8.2 / 69.5 / 2.2 43.5 / 51	 8.2 / 90.5 / 2.2
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 -- 8 / 3 III / I			 52 / 10	
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 4 0.25 ... 4 0.5 ... 1			 0.25 ... 6 0.25 ... 6 0.5 ... 1.5	
Stripped length in mm	10			12	
Plug gauge (IEC 60947-1)	A4			A5	
Molded plastic type • Flammability Class acc. to UL 94	PA V0				
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 -- / -- / 20 ... 10 --			 600 / 50 / 20 ... 8	
Support rails/protective conductor busbars	see page 14/3, section "Support rails"	see page 14/3, section "Support rails"	see page 14/3, section "Support rails"	--	--

	8WH2000-0CH07	8WH2003-0CH07	8WH2000-0AJ00 8WH2000-0AJ01	8WH2000-0CJ07
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 8.2 / 69.5 / 2.2 43.5 / 51	 8.2 / 90.5 / 2.2	 10 / 71.5 / 2.2 50.5 / 58	
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 -- 8 / 3 III / I		 65 / 16	
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 6 0.25 ... 6 0.5 ... 1.5		 0.25 ... 10 0.25 ... 10 1.5 ... 2.5	
Stripped length in mm	12		18	
Plug gauge (IEC 60947-1)	A5		A6	
Molded plastic type • Flammability Class acc. to UL 94	PA V0			
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 -- / -- / 20 ... 8 --		 600 / 65 / 16 ... 6	 -- / -- / 16 ... 6
Support rails/protective conductor busbars	see page 14/3, section "Support rails"	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"

	8WH2000-0AK00 8WH2000-0AK01	8WH2000-0CK07	8WH2000-0AM00 8WH2000-0AM01	8WH2000-0CM07
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 12 / 80 / 2.2 51 / 58.5		 16 / 100 / -- 59 / 66.5	
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 90 / 25 8 / 3 III / I		 125 / 35	
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 16 0.25 ... 16 1.5 ... 4		 2.5 ... 35 2.5 ... 35 2.5 ... 10	
Stripped length in mm	18		25	
Plug gauge (IEC 60947-1)	A7		A8	
Molded plastic type • Flammability Class acc. to UL 94	PA V0			
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 600 / 85 / 16 ... 4 --	 -- / -- / 16 ... 4	 600 / 115 / 14 ... 2 600 / 115 / 14 ... 2	 -- / -- / 14 ... 2 -- / -- / 14 ... 2
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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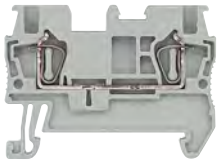
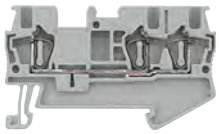
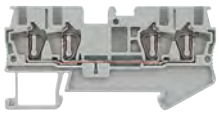
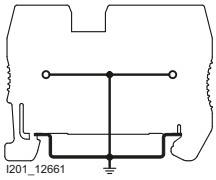
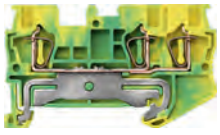
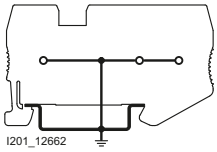
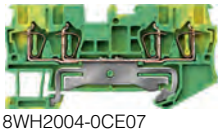
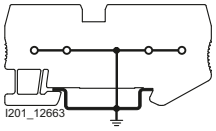
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 1.5 mm²							
 8WH2000-0AE00	**Through-type terminals, terminal size 1.5 mm²** • Terminal width 4.2 mm, c UL us • IEC 60947-7-1 - Rigid 0.08 ... 1.5 mm² - Flexible 0.08 ... 1.5 mm² - AWG 28 ... 16 - *I* = 17.5 A - The total current through all connected conductors must not exceed the max. load current - *U* = 500 V						
 8WH2003-0AE00	Versions						
 8WH2004-0AE00	• Two clamping points						
	- Gray		**8WH2000-0AE00**		1	50 units	1BT
	- Blue		**8WH2000-0AE01**		1	50 units	1BT
	- Orange		**8WH2000-0AE04**		1	50 units	1BT
	- Red		**8WH2000-0AE02**		1	50 units	1BT
	- Black		**8WH2000-0AE08**		1	50 units	1BT
	- Green		**8WH2000-0AE03**		1	50 units	1BT
	- White		**8WH2000-0AE05**		1	50 units	1BT
	- Yellow		**8WH2000-0AE06**		1	50 units	1BT
	• Three clamping points						
	- Gray,		**8WH2003-0AE00**		1	50 units	1BT
	- Blue		**8WH2003-0AE01**		1	50 units	1BT
	- Orange		**8WH2003-0AF04**		1	50 units	1BT
	• Four clamping points						
	- Gray,		**8WH2004-0AE00**		1	50 units	1BT
	- Blue		**8WH2004-0AE01**		1	50 units	1BT
	- Orange		**8WH2004-0AF04**		1	50 units	1BT
 8WH2000-0CE07	**PE through-type terminals, terminal size 1.5 mm²** • Terminal width 4.2 mm, c UL us • IEC 60947-7-1 - Rigid 0.08 ... 1.5 mm² - Flexible 0.08 ... 1.5 mm² - AWG 28 ... 16 • Green-yellow						
	Versions						
 8WH2000-0CE07	• Two clamping points,		**8WH2000-0CE07**		1	50 units	1BT
 8WH2003-0CE07	• Three clamping points		**8WH2003-0CE07**		1	50 units	1BT
 8WH2003-0CE07	• Four clamping points,		**8WH2004-0CE07**		1	50 units	1BT
 8WH2004-0CE07							
 8WH2004-0CE07							

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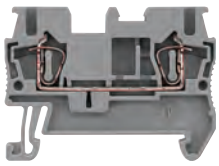
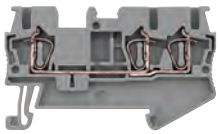
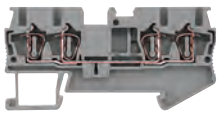
8WH through-type terminals

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 2.5 mm²							
 8WH2000-0AF00	**Through-type terminals, terminal size 2.5 mm², two clamping points** • Terminal width 5.2 mm, c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 31 A - *U* = 800 V						
	Versions						
	• Gray		**8WH2000-0AF00**		1	50 units	1BT
	• Blue		**8WH2000-0AF01**		1	50 units	1BT
	• Orange		**8WH2000-0AF04**		1	50 units	1BT
	• Red		**8WH2000-0AF02**		1	50 units	1BT
	• Black		**8WH2000-0AF08**		1	50 units	1BT
	• Green		**8WH2000-0AF03**		1	50 units	1BT
	• White		**8WH2000-0AF05**		1	50 units	1BT
	• Yellow		**8WH2000-0AF06**		1	50 units	1BT
 8WH2003-0AF00	**Through-type terminals, terminal size 2.5 mm², three clamping points** • Terminal width 5.2 mm, c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 28 A - The total current through all connected conductors must not exceed the max. load current - *U* = 800 V						
	Versions						
	• Gray		**8WH2003-0AF00**		1	50 units	1BT
	• Blue		**8WH2003-0AF01**		1	50 units	1BT
	• Orange		**8WH2003-0AF04**		1	50 units	1BT
 8WH2004-0AF00	**Through-type terminals, terminal size 2.5 mm², four clamping points** • Terminal width 5.2 mm, c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 28 A - The total current through all connected conductors must not exceed the max. load current - *U* = 800 V						
	Versions						
	• Gray		**8WH2004-0AF00**		1	50 units	1BT
	• Blue		**8WH2004-0AF01**		1	50 units	1BT
	• Orange		**8WH2004-0AF04**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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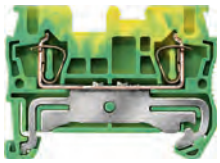
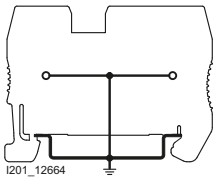
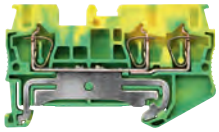
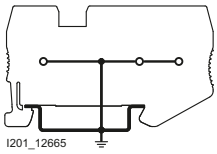
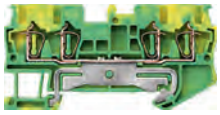
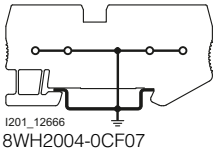
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WH2000-0CF07	**PE through-type terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 • Green-yellow						
	Versions						
 I201_12664 8WH2000-0CF07	• Two clamping points		**8WH2000-0CF07**		1	50 units	1BT
 8WH2003-0CF07	• Three clamping points		**8WH2003-0CF07**		1	50 units	1BT
 I201_12665 8WH2003-0CF07	• Four clamping points		**8WH2004-0CF07**		1	50 units	1BT
 8WH2004-0CF07							
 I201_12666 8WH2004-0CF07							

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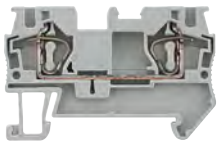
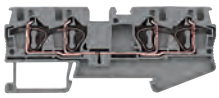
8WH through-type terminals

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 4 mm²							
 8WH2000-0AG00	**Through-type terminals, terminal size 4 mm², two clamping points** • Terminal width 6.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - *I* = 40 A, *U* = 800 V						
	Versions						
	• Gray		**8WH2000-0AG00**		1	50 units	1BT
	• Blue		**8WH2000-0AG01**		1	50 units	1BT
	• Orange		**8WH2000-0AG04**		1	50 units	1BT
	• Red		**8WH2000-0AG02**		1	50 units	1BT
	• Black		**8WH2000-0AG08**		1	50 units	1BT
	• Green		**8WH2000-0AG03**		1	50 units	1BT
	• White		**8WH2000-0AG05**		1	50 units	1BT
	• Yellow		**8WH2000-0AG06**		1	50 units	1BT
 8WH2003-0AG00	**Through-type terminals, terminal size 4 mm², three clamping points** • Terminal width 6.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - *I* = 40 A, the total current through all connected conductors must not exceed the maximum load current - *U* = 800 V						
	Versions						
	• Gray		**8WH2003-0AG00**		1	50 units	1BT
	• Blue		**8WH2003-0AG01**		1	50 units	1BT
 8WH2004-0AG00	**Through-type terminals, terminal size 4 mm², four clamping points** • Terminal width 6.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - *I* = 40 A, the total current through all connected conductors must not exceed the maximum load current - *U* = 800 V						
	Versions						
	• Gray		**8WH2004-0AG00**		1	50 units	1BT
	• Blue		**8WH2004-0AG01**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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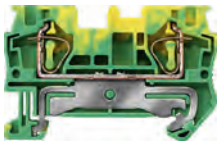
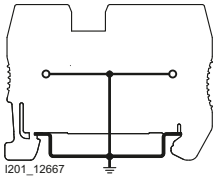
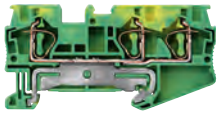
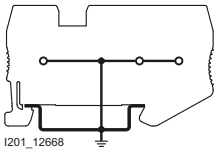
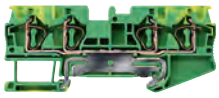
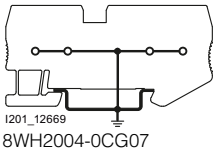
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WH2000-0CG07	**PE through-type terminals, terminal size 4 mm²** • Terminal width 6.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 • Green-yellow						
	Versions						
 I201_12667 8WH2000-0CE07	• Two clamping points		**8WH2000-0CG07**		1	50 units	1BT
 8WH2003-0CG07	• Three clamping points		**8WH2003-0CG07**		1	50 units	1BT
 I201_12668 8WH2003-0CG07	• Four clamping points		**8WH2004-0CG07**		1	50 units	1BT
 8WH2004-0CG07							
 I201_12669 8WH2004-0CG07							

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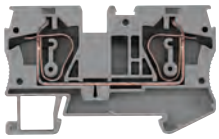
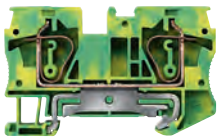
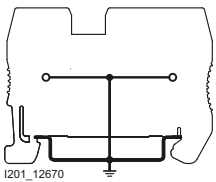
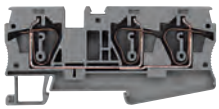
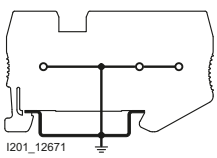
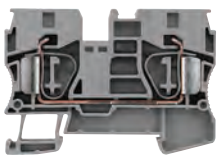
8WH through-type terminals

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 6 mm²							
 8WH2000-0AH00	**Through-type terminals, terminal size 6 mm², two clamping points** • Terminal width 8.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.2 ... 10 mm² - Flexible 0.2 ... 6 mm² - AWG 24 ... 8 - *I* = 52 A - *U* = 1000 V						
	Versions						
	• Gray		**8WH2000-0AH00**		1	50 units	1BT
	• Blue		**8WH2000-0AH01**		1	50 units	1BT
 8WH2000-0CH07	**PE through-type terminals, terminal size 6 mm², two clamping points** • Terminal width 8.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.2 ... 10 mm² - Flexible 0.2 ... 6 mm² - AWG 24 ... 8 • Green-yellow		**8WH2000-0CH07**		1	50 units	1BT
 I201_12670 8WH2000-0CE07							
 8WH2003-0AH00	**Through-type terminals, terminal size 6 mm², three clamping points** • Terminal width 8.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.2 ... 10 mm² - Flexible 0.2 ... 6 mm² - AWG 24 ... 8 - *I* = 52 A - The total current through all connected conductors must not exceed the max. load current - *U* = 1000 V						
	Versions						
	• Gray		**8WH2003-0AH00**		1	50 units	1BT
	• Blue		**8WH2003-0AH01**		1	50 units	1BT
 8WH2003-0CH07	**PE through-type terminals, terminal size 6 mm², three clamping points** • Terminal width 8.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.2 ... 10 mm² - Flexible 0.2 ... 6 mm² - AWG 24 ... 8 • Green-yellow		**8WH2003-0CH07**		1	50 units	1BT
 I201_12671 8WH2003-0CE07							
Terminal size 10 mm²							
 8WH2000-0AJ00	**Through-type terminals, terminal size 10 mm²** • Terminal width 10.2 mm • c UL us • IEC 60947-7-1 - Rigid 1.5 ... 16 mm² - Flexible 1.5 ... 10 mm² - AWG 24 ... 6 - *I* = 65 A - *U* = 1000 V						
	Versions						
	• Gray		**8WH2000-0AJ00**		1	50 units	1BT
	• Blue		**8WH2000-0AJ01**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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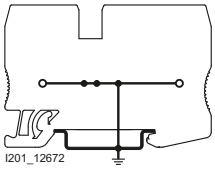
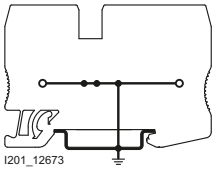
	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH2000-0CJ07  8WH2000-0CJ07	**PE through-type terminals, terminal size 10 mm²** • Terminal width 10.2 mm • c UL us • IEC 60947-7-2 - Rigid 1.5 ... 16 mm² - Flexible 1.5 ... 10 mm² - AWG 24 ... 6 - *I* = 65 A • Green-yellow		**8WH2000-0CJ07**		1	50 units	1BT
Terminal size 16 mm²							
 8WH2000-0AK00	**Through-type terminals, terminal size 16 mm²** • Terminal width 12 mm • c UL us • IEC 60947-7-1 - Rigid 1.5 ... 25 mm² - Flexible 1.5 ... 16 mm² - AWG 24 ... 4 - *I* = 90 A - *U* = 1000 V						
	Versions						
	• Gray		**8WH2000-0AK00**		1	50 units	1BT
	• Blue		**8WH2000-0AK01**		1	50 units	1BT
 8WH2000-0CK07  8WH2000-0CK07	**PE through-type terminals, terminal size 16 mm²** • Terminal width 12 mm • c UL us • IEC 60947-7-2 - Rigid 1.5 ... 25 mm² - Flexible 1.5 ... 16 mm² - AWG 24 ... 4 - *I* = 90 A • Green-yellow		**8WH2000-0CK07**		1	25 units	1BT

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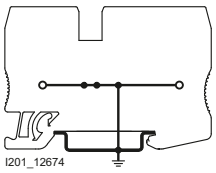
8WH through-type terminals

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 35 mm²							
 8WH2000-0AM00	**Through-type terminals, terminal size 35 mm²** • Terminal width 16 mm • c UL us • IEC 60947-7-1 - Rigid 2.5 ... 35 mm² - Flexible 2.5 ... 35 mm² - AWG 14 ... 2 - *I* = 125 A - *U* = 1000 V • Enclosed at both ends						
	Versions						
	• Gray,		**8WH2000-0AM00**		1	10 units	1BT
	• Blue		**8WH2000-0AM01**		1	10 units	1BT
 8WH2000-0CM07	**PE through-type terminals, terminal size 35 mm²** • Terminal width 16 mm • c UL us, • IEC 60947-7-2 - Rigid 2.5 ... 35 mm² - Flexible 2.5 ... 35 mm² - AWG 14 ... 2 - *I* = 125 A • Enclosed at both ends • Green-yellow		**8WH2000-0CM07**		1	10 units	1BT
 I201_12674 8WH2000-0CM07							
Accessories							
 8WH9070-0AA00	**Compartment partitions** • For visual and electrical separation of terminal groups • 2 mm thick						
	Versions						
	• For terminal sizes 1.5 ... 4 mm² and two clamping points		**8WH9070-0AA00**		100	50 units	1BT
	• For terminal sizes 1.5 ... 4 mm² and three clamping points		**8WH9070-0GA00**		100	50 units	1BT
	• For terminal sizes 1.5 ... 4 mm² and four clamping points		**8WH9070-0HA00**		100	50 units	1BT
	• For terminal size 6 mm²		**8WH9070-0DA00**		100	50 units	1BT
 8WH9000-1GA00	**Covers** Gray						
	Versions						
	• For terminal sizes 1.5 ... 2.5 mm² and two clamping points		**8WH9000-1GA00**		100	50 units	1BT
	• For terminal sizes 1.5 ... 2.5 mm² and three clamping points		**8WH9000-2GA00**		100	50 units	1BT
	• For terminal sizes 1.5 ... 2.5 mm² and four clamping points		**8WH9000-4GA00**		100	50 units	1BT
	• For terminal size 4 mm² and two clamping points		**8WH9003-1GA00**		100	50 units	1BT
	• For terminal size 4 mm² and three clamping points		**8WH9003-2GA00**		100	50 units	1BT
	• For terminal size 4 mm² and four clamping points		**8WH9003-4GA00**		100	50 units	1BT
	• For terminal size 6 mm² and two clamping points		**8WH9004-1GA00**		100	50 units	1BT
	• For terminal size 6 mm² and three clamping points		**8WH9004-2GA00**		100	50 units	1BT
	• For terminal size 10 mm²		**8WH9005-1GA00**		100	50 units	1BT
	• For terminal size 16 mm²		**8WH9006-1GA00**		100	50 units	1BT
 8WH9000-0GA00	**Cover segments** • Gray • For covering multi-wire terminals when mounting two-wire terminals side-by-side						
	Versions						
	• For terminal sizes 1.5 ... 2.5 mm²		**8WH9000-0GA00**		100	10 units	1BT
	• For terminal size 4 mm²		**8WH9003-0GA00**		100	10 units	1BT
 8WH9061-5AA06	**Warning covers** Note: For the operating shafts of 8WH2 through-type terminals						
	Versions						
	• For terminal size 1.5 mm²		**8WH9061-5AA06**		100	50 units	1BT
	• For terminal size 2.5 mm²		**8WH9060-5AA06**		100	50 units	1BT
	• For terminal size 4 mm²		**8WH9063-5AA06**		100	50 units	1BT
	• For terminal size 6 mm²		**8WH9064-5AA06**		100	10 units	1BT
	• For terminal size 10 mm²		**8WH9065-5AA06**		100	25 units	1BT
	• For terminal size 16 mm²		**8WH9066-5AA06**		100	25 units	1BT
	• For terminal size 35 mm²		**8WH9067-5AA06**		100	10 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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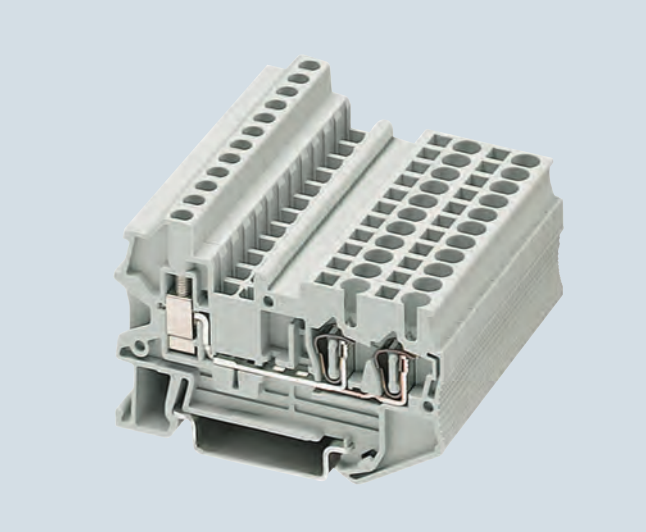
Overview



The terminal connection compartment, on the spring-loaded side as well as on the screw side, enables connection to a nominal cross-section of 2.5 mm^2 or 4 mm^2, with or without end sleeves. The advantages of the different connection types are due to the fact that the spring-loaded terminal of the hybrid through-type terminal is used inside the control cabinet and the universal screw terminal is used at the end-user's side. A PE terminal with the same contour is available for the three-wire terminal. Contact is made by simply snapping the terminal onto the support rail.

This meets the following requirements of IEC 60947-7-2:

- Low contact resistance
- Stainless clamping points
- Green-yellow enclosure
- Additional inscription options

A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

Technical specifications

	8WH2103-2BF00 8WH2103-2BF01	8WH2103-3BF07	8WH2103-2BG00 8WH2103-2BG01	8WH2103-3BG07
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 5.2 / 65.3 / 2.2 42.8 / 50.3		 6.2 / 74.4 / 2.2	
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 28 / 4 8 / 3 III / I	--	 32 / 6	--
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 2.5 0.25 ... 2.5 0.5 ... 1		 0.25 ... 4 0.25 ... 4	
Stripped length in mm	10			
Plug gauge (IEC 60947-1)	A3		A4	
Connection capacity of screw terminal • Flexible with end sleeves with/without plastic sleeve in mm^2	 0.25 ... 2.5 / 0.25 ... 2.5		 0.25 ... 4 / 0.25 ... 4	
Multi-conductor connection (two conductors of same cross-section) • Rigid / flexible in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.14 ... 1.5 / 0.14 ... 1.5 0.25 ... 1.5 0.5 ... 1.5		 0.5 ... 2.5	
Stripped length in mm	9			
Plug gauge (IEC 60947-1)	A3		A4	
Tightening torque in Nm	0.6 ... 0.8		0.6 ... 0.8	
Molded plastic type • Flammability Class acc. to UL 94	PA V0			
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 Applied for Applied for			
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"

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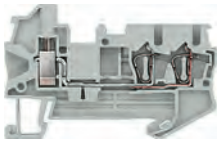
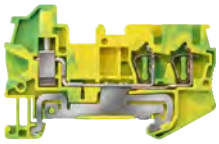
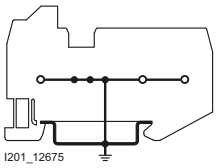
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH2103-2BF00	**Hybrid through-type terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • IEC 60947-7-1 • Spring - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - I = 28 A - The total current through all connected conductors must not exceed the max. load current - U = 800 V • Screw - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm² - AWG 26 ... 14 - I = 28 A - U = 800 V						
	Versions						
	• Gray		**8WH2103-2BF00**		1	50 units	1BT
	• Blue		**8WH2103-2BF01**		1	50 units	1BT
 8WH2103-3BF07	**PE hybrid through-type terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • IEC 60947-7-2 • Spring - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 • Screw - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm² - AWG 26 ... 14		**8WH2103-3BF07**		1	50 units	1BT
 I201_12675 8WH2103-3BF07							

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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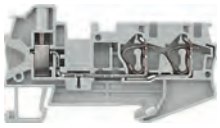
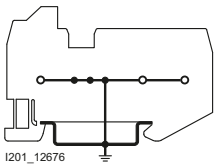
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm²							
 8WH2103-2BG00	**Hybrid through-type terminals, terminal size 4 mm²** • Terminal width 6.2 mm • IEC 60947-7-1 • Spring - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 - I = 32 A - The total current through all connected conductors must not exceed the max. load current - U = 800 V • Screw - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 4 mm² - AWG 26 ... 10 - I = 32 A - U = 800 V						
	Versions						
	• Gray		**8WH2103-2BG00**		1	50 units	1BT
	• Blue		**8WH2103-2BG01**		1	50 units	1BT
 8WH2103-3BG07  I201_12676 8WH2103-3BG07	**PE hybrid through-type terminals, terminal size 4 mm²** • Terminal width 6.2 mm • IEC 60947-7-2 • Spring - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 • Screw - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 4 mm² - AWG 26 ... 10		**8WH2103-3BG07**		1	50 units	1BT
Accessories							
 8WH9000-2HA00	**Covers** Gray						
	Versions						
	• For terminal size 2.5 mm² and three clamping points		**8WH9000-2HA00**		100	50 units	1BT
	• For terminal size 4 mm² and three clamping points		**8WH9003-2HA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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Overview



Fuse terminals for blade-type fuses

The fuse terminals for blade-type fuses accommodate blade-type fuses according to ISO/DIS 8820 / DIN 72581-3. Terminals with LED display are available for fast fault diagnosis "at a glance".

Fuse terminals for G fuse links

Fuse terminals perform two important tasks in connected electrical systems. Firstly, they act as a fuse carrier and, secondly, as a potential distributor.

The full-length bridge shaft enables uninterrupted bridging between the through-type terminals and the fuse terminals.

Fuse terminals for G fuse links are available for standardized electrical fuse formats 5 × 20 mm and 6.3 × 32 mm (inch fuse) – and are optionally available with LED display to signal a blown fuse.

A label can be snapped on to the middle of the terminal at the front. Further labels can also be mounted flat on the side of the terminals.

Fuses must not be replaced under load.

Technical specifications

	8WH2000-1AG08 8WH2000-1BG28 8WH2000-1BG38	**8WH2000-1GG08 8WH2000-1JG38 8WH2000-1JG68 8WH2000-1MG08**	**8WH2000-1HG08 8WH2000-1NG38 8WH2000-1NG68 8WH2000-1RG08**
Dimensions			
• Width/length in mm	8.2 / 86.5	6.2 / 61.5	8.2 / 76.5
• Height (NS 35/7.5 / NS 35/15) in mm	43.5 / 51	62.5 / 70	69 / 76.5
Technical specifications acc. to IEC/DIN VDE			
• Fuse type ISO/DIS 8820 / DIN 72581-3 / dimensions in mm	C	G / 5 × 20	G / 6.3 × 32
• Maximum current for single arrangement in A	30	3.3	10
Max. power loss at 23 °C acc. to IEC 60647-7-3 in W [1]			
• *U* in V	--	250	400
• Overload protection			
- Individually in W	--	1.6	
- As group in W	--	1.6	
• Only short-circuit protection			
- Individually in W	--	4	
- As group in W	--	2.5	
• I_{max} in A	--	6.3	10
• Rated impulse withstand voltage in kV / pollution degree	6 / 3	4 / 3	6 / 3
• Overvoltage category / molded plastic group	III / I		
Connection capacities			
• Flexible with end sleeves with/without plastic sleeve in mm^2	0.25 ... 4 / 0.25 ... 4		
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5		
Stripped length in mm	10		
Plug gauge (IEC 60947-1)	A4	A3	A4
Molded plastic type	PA		
• Flammability Class acc. to UL 94	V0		
Approval data (UL/cUL and CSA)			
• Rated voltage / rated current / conductor sizes			
- UL/cUL: in V/A / AWG	600 / 30 / 24 ... 10	300 / 6.3 / 24 ... 10	300 / 10 / 24 ... 10
- CSA: in V/A / AWG	--		

[1] Please note: The G fuse holders must be selected according to the maximum power loss (heat dissipation) of the G fuse links. Depending on the application and method of installation, the heat rise conditions in closed fuse holders must be tested. Higher ambient temperatures represent an additional load for the fuse links. A shift in rated current should therefore be taken into account in such applications. When selecting G fuse links, make sure that they do not exceed the specified maximum power loss.
For specification details, contact the fuse manufacturer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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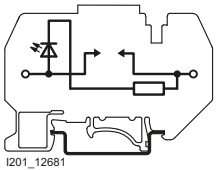
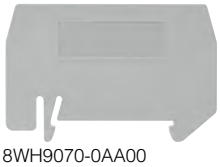
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 4 mm²							
 8WH2000-1AG08  8WH2000-1BG28  I201_12681 8WH2000-1BG28	**Fuse terminals, terminal size 4 mm², for blade-type fuses acc. to ISO/DIS8820/DIN72581-3** • Terminal width 8.2 mm • c UL us • Connection data - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 - I = 30 A - U = 400 V • Enclosed at both ends Versions • Without LED display • LED display 12 V • LED display 24 V		**8WH2000-1AG08** **8WH2000-1BG28** **8WH2000-1BG38**		1 50 units 1 50 units 1 50 units	1BT 1BT 1BT
 8WH2000-1GG08  8WH2000-1JG38	**Fuse terminals, terminal size 4 mm², for 5 x 20 mm G fuse links** • Terminal width 6.2 mm • c UL us • IEC 60947-7-3 • With fuse - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - I_{max} = 6.3 A, only short-circuit protection, single 4 W, group 2.5 W - U = 250 V, overload protection, single 4 W, group 1.6 W • As isolating terminal - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - I = 6.3 A, U = 250 V • Enclosed at both ends Versions • Without LED display • LED display 15 ... 30 V • LED display 30 ... 60 V • LED display 110 ... 250 V		**8WH2000-1GG08** **8WH2000-1JG38** **8WH2000-1JG68** **8WH2000-1MG08**		1 50 units 1 50 units 1 50 units 1 50 units	1BT 1BT 1BT 1BT
 8WH2000-1HG08	**Fuse terminals, terminal size 4 mm², for G fuse links 6.3 x 32 mm (inch fuses)** • Terminal width 8.2 mm • c UL us • IEC 60947-7-3 • With fuse - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - I = 10 A, - U = 400 V - Current and voltage are determined by the fitted fuse or the selected LED display • As isolating terminal - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - I = 10 A, U = 400 V • Enclosed at both ends Versions • Without LED display • With LED display 100 ... 250 V		**8WH2000-1HG08** **8WH2000-1RG08**		1 50 units 1 50 units	1BT 1BT
Accessories							
 8WH9070-0AA00	**Compartment partitions, for terminal sizes 1.5 and 4 mm²** Versions • Two clamping points		**8WH9070-0AA00**		100 50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8WH isolating blade terminals

Overview



Through-type terminals with isolating blade capability are the most commonly used terminal types in measuring and control technology.

The isolating blade terminals with nominal cross-section of 2.5 mm^2 are characterized in particular by their slim design of 5.2 mm and their high current-carrying capacity of 16 A. In addition the terminals provide a test tap parallel to the isolation point for 2.3-mm-⌀-test plugs. Potential distributors can be conveniently assembled using connecting combs.

Terminals with three and four clamping points are available for multi-conductor connection. With their compact design these terminals can also be used in small terminal boxes and their front connection arrangement enables user-friendly wiring.

The isolating blade is secured to the terminal so that it cannot be lost.

A label can be snapped on to the middle of the terminal at the front. Further labels can also be mounted flat on the side of the terminals.

The isolating element must not be replaced under load.

Technical specifications

	8WH2000-6CF00	8WH2500-6CF00	8WH2003-6CF00	8WH2004-6CF00	8WH2000-6CG00
Dimensions					
• Width/length/cover width in mm	5.2 / 60.5 / 2.2	5.2 / 51 / 2.2	5.2 / 72 / 2.2	5.2 / 84 / 2.2	6.2 / 61.5 / --
• Height (NS 35/7.5 / NS 35/15) in mm	36.5 / 44	43 / 50.5	36.5 / 44		
Technical specifications acc. to IEC/DIN VDE					
• Max. load current in A / cross-section in mm^2	16 / 4				16 / 6
• Rated impulse withstand voltage in kV / pollution degree	6 / 3				
• Overvoltage category / molded plastic group	III / I				
Connection capacities					
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5				0.25 ... 4
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5				0.25 ... 4
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5				
Stripped length in mm	10				
Plug gauge (IEC 60947-1)	A4	A3	A4	A3	
Molded plastic type	PA				
• Flammability Class acc. to UL 94	V0				
Approval data (UL/cUL and CSA)					
• Rated voltage / rated current / conductor sizes					
- UL/cUL: in V/A / AWG	600 / 16 / 26 ... 12	600 / 16 / 24 ... 12	600 / 16 / 26 ... 12		300 / 6.3 / 24 ... 10
- CSA: in V/A / AWG	--				

Minimum order quantity (PS) or a multiple thereof can be ordered.

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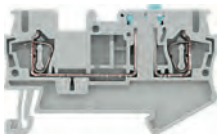
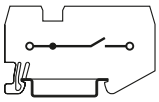
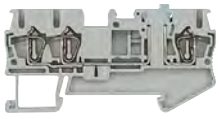
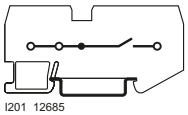
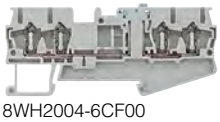
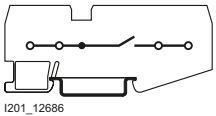
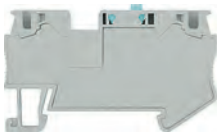
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 2.5 mm²							
 8WH2000-6CF00  I201_12684 8WH2000-6CF00	**Isolating blade terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - I = 16 A - U = 400 V • For 3 and 4 clamping points: - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 2.5 mm² - AWG 26 ... 14 Versions • Gray - Two clamping points - Three clamping points - Four clamping points Note On terminals with three and four clamping points, the total current through all connected conductors must not exceed the max. load current.		**8WH2000-6CF00** **8WH2003-6CF00** **8WH2004-6CF00**		1 1 1	50 units 50 units 50 units	1BT 1BT 1BT
 8WH2003-6CF00  I201_12685 8WH2003-6CF00							
 8WH2004-6CF00  I201_12686 8WH2004-6CF00							
 8WH2000-6CG00	**Isolating blade terminals, terminal size 4 mm², two clamping points** • Gray • Terminal width 6.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 6 mm², flexible 0.08 ... 4 mm², AWG 28 ... 10 - I = 16 A, U = 400 V • Enclosed at both ends		**8WH2000-6CG00**		1	50 units	1BT
Accessories							
 8WH9070-0AA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²** Versions • Two clamping points • Three clamping points • Four clamping points		**8WH9070-0AA00** **8WH9070-0GA00** **8WH9070-0HA00**		100 100 100	50 units 50 units 50 units	1BT 1BT 1BT
 8WH9000-2GA00	**Covers, for terminal sizes 1.5 ... 2.5 mm²** Versions • For two clamping points • For three clamping points • For four clamping points		**8WH9000-2GA00** **8WH9000-4GA00** **8WH9000-5GA00**		100 100 100	50 units 50 units 50 units	1BT 1BT 1BT
 8WH9000-0GA00	**Cover segments, for terminal size 2.5 mm² and three or four clamping points**		**8WH9000-0GA00**		100	10 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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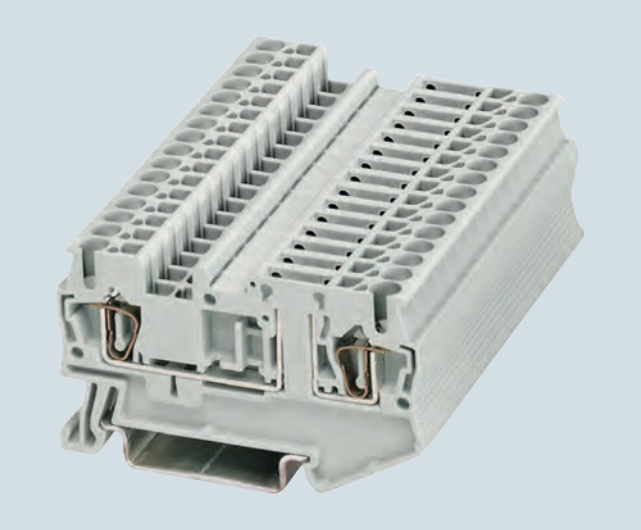
8WH isolating terminals

Overview



The isolating terminals are available with the same contour as the isolating blade terminals. The terminals excel with their narrow width of only 5.2 mm and their high current load rating of 16 A.

There is a test option for 2.3 mm ∅ test plugs at both ends of the isolating point.

The 6.2 mm wide isolating terminal with terminal size 4 mm^2 is a base terminal for accommodating:

- Isolating plugs,
- Through-type connectors,
- Fused connectors and
- Component connectors.

A label can be snapped on to the middle of the terminal at the front. Further labels can also be mounted flat on the side of the terminals.

The isolating element must not be replaced under load.

Technical specifications

	8WH2000-6AF00	8WH2500-6AF00	8WH2003-6AF00	8WH2004-6AF00	8WH2000-6AG00
Dimensions					
• Width/length/cover width in mm	5.2 / 60.5 / 2.2	5.2 / 51 / 2.2	5.2 / 72 / 2.2	5.5 / 84 / 2.2	6.2 / 61.5 / --
• Height (NS 35/7.5 / NS 35/15) in mm	36.5 / 44	43 / 50.5	36.5 / 44		
Technical specifications acc. to IEC/DIN VDE					
• Max. load current in A / cross-section in mm^2	16 / 4				16 / 6
• Rated impulse withstand voltage in kV / pollution degree	6 / 3				
• Overvoltage category / molded plastic group	III / I				
Connection capacities					
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5				0.25 ... 4
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5				0.25 ... 4
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5				
Stripped length in mm	10				
Plug gauge (IEC 60947-1)	A3				A4
Molded plastic type	PA				
• Flammability Class acc. to UL 94	V0				
Approval data (UL/cUL and CSA)					
• Rated voltage / rated current / conductor sizes					
- UL/cUL: in V/A / AWG	300 / 16 / 26 ... 12	300 / 16 / 24 ... 12	300 / 16 / 26 ... 12		300 / 6.3 / 24 ... 10
- CSA: in V/A / AWG	--				

Minimum order quantity (PS) or a multiple thereof can be ordered.

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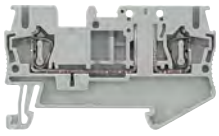
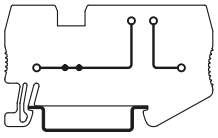
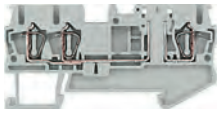
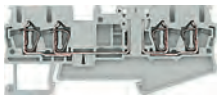
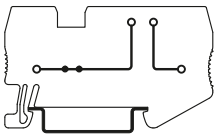
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH2000-6AF00	**Isolating terminals, terminal size 2.5 mm²** • Gray • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - Current and voltage are determined by the fitted plug - I = 16 A - U = 400 V						
 I201_12682 8WH2000-6AF00	Versions • Two clamping points		**8WH2000-6AF00**		1	50 units	1BT
 8WH2003-6AF00	• Three clamping points		**8WH2003-6AF00**		1	50 units	1BT
 8WH2004-6AF00	• Four clamping points		**8WH2004-6AF00**		1	50 units	1BT
Terminal size 4 mm²							
 8WH2000-6AG00	**Isolating terminals, terminal size 4 mm², two clamping points** • Gray • Terminal width 6.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 - Current and voltage are determined by the fitted plug - I = 16 A - U = 400 V • Enclosed at both ends		**8WH2000-6AG00**		1	50 units	1BT
 I201_12682 8WH2000-6AG00							
Accessories							
 8WH9070-0GA00	**Compartment partitions** Versions • For terminal size 2.5 mm² - For three clamping points		**8WH9070-0GA00**		100	50 units	1BT
	- For four clamping points		**8WH9070-0HA00**		100	50 units	1BT
	• For terminal size 4 mm² - For two clamping points		**8WH9070-0AA00**		100	50 units	1BT
 8WH9000-2GA00	**Covers** Gray Versions • For terminal sizes 1.5 ... 2.5 mm² and two clamping points		**8WH9000-2GA00**		100	50 units	1BT
	• For terminal size 2.5 mm² and three clamping points		**8WH9000-4GA00**		100	50 units	1BT
	• For terminal size 2.5 mm² and four clamping points		**8WH9000-5GA00**		100	50 units	1BT
 8WH9000-0GA00	**Cover segments, for terminal sizes 1.5 and 2.5 mm² and three or four clamping points** Gray		**8WH9000-0GA00**		100	10 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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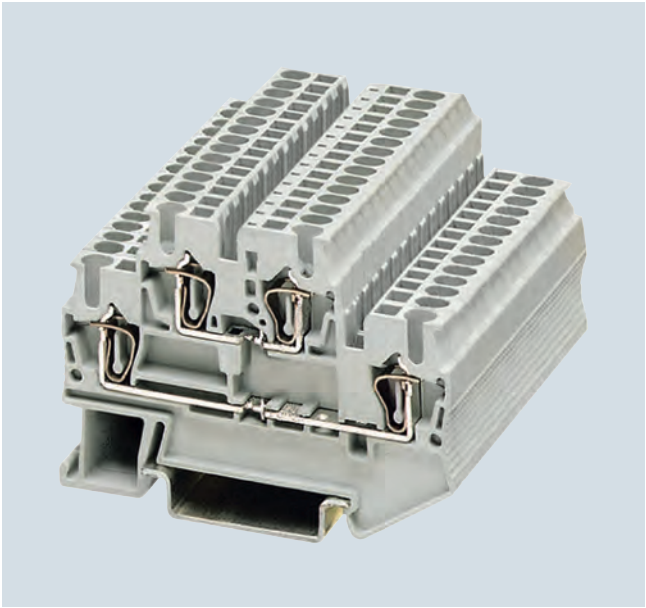
Overview



Standard two-tier terminals

With the two voltage levels routed through two separate tiers, the two-tier terminals require 50% less space than equivalent single-tier terminals. To implement a wide range of wiring tasks, connecting combs can be fitted to both tiers of the spring-loaded terminal series. Facilities for inscription are provided at each clamping point.

PE/ground conductor function

Perfect mechanical and electrical contact with the support rail is provided by simply snapping the terminals onto the rail.

The PE two-tier terminals meet all the requirements of IEC 60947-7-2:

- Low contact resistance
- Stainless clamping points
- Green-yellow enclosure
- Additional inscription options

PE/L and PE/N types

The PE/L and PE/N types provide a PE/ground contact to the support rail in the lower tier. The upper tier is designed as a through-type tier. Color coding of the PE and neutral tiers enables clear and unambiguous distribution of the potential.

The clamping points of two-tier terminals can be inscribed with flat labels.

Technical specifications

	8WH2020-0AE00 8WH2020-0AE01 8WH2025-0AE00	8WH0020-0CE07	8WH2020-0AF00 8WH2020-0AF01 8WH2025-0AF00	8WH2023-0AF00 8WH2023-0AF01 8WH2022-0AF00	8WH2020-0CF07
Dimensions					
• Width/length/cover width in mm	4.2 / 67.5 / 2.2		5.2 / 67.5 / 2.2	5.2 / 91.5 / 2.2	5.2 / 67.5 / 2.2
• Height (NS 35/7.5 / NS 35/15) in mm	47.5 / 55				
Technical specifications acc. to IEC/DIN VDE					
• Max. load current in A / cross-section in mm^2	17.5 / 1.5	--	26 / 4	--	--
• Maximum data / rated data in A / mm^2	--			26 / 4 or 22 / 2.5	--
• Rated impulse withstand voltage in kV / pollution degree	6 / 3				
• Overvoltage category / molded plastic group	III / I				
Connection capacities					
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 1.5		0.25 ... 2.5		
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 1.5		0.25 ... 2.5		
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5				
Stripped length in mm	10				
Plug gauge (IEC 60947-1)	A1		A3		
Molded plastic type	PA				
• Flammability Class acc. to UL 94	V0				
Approval data (UL/cUL and CSA)					
• Rated voltage / rated current / conductor sizes					
- UL/cUL: in V/A / AWG	300 / 15 / 26 ... 14	-- / -- / 26 ... 14	600 / 20 / 26 ... 12	300 / 20 / 26 ... 12	-- / -- / 26 ... 12
- CSA: in V/A / AWG	300 / 15 / 26 ... 14	-- / -- / 26 ... 14	--		-- / -- / 26 ... 12
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"	--		see page 14/3, section "Support rails"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	8WH2023-0CF07
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 5.2 / 91.5 / 2.2 47.5 / 55
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 -- 6 / 3 III / I
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 2.5 0.25 ... 2.5 0.5
Stripped length in mm	10
Plug gauge (IEC 60947-1)	A3
Molded plastic type • Flammability Class acc. to UL 94	PA V0
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 -- / -- / 26 ... 12 -- / -- / 26 ... 12
Support rails/protective conductor busbars	see page 14/3, section "Support rails"

	8WH2020-4CF00	**8WH2020-0AG00 8WH2020-0AG01 8WH2025-0AG00**	**8WH2020-0CG07**
Dimensions • Width/length/cover width in mm • Height (NS 35/7.5 / NS 35/15) in mm	 5.2 / 67.5 / 2.2 47.5 / 55	6.2 / 83.5 / 2.2	6.2 / 83.5 / 2.2
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 26 / 4 6 / 3 III / I	32 / 6	--
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 2.5 0.25 ... 2.5 0.5	 0.25 ... 4 0.25 ... 4 0.5 ... 1	 0.25 ... 4 0.25 ... 4 0.5 ... 1
Stripped length in mm	10		
Plug gauge (IEC 60947-1)	A3	A4	
Molded plastic type • Flammability Class acc. to UL 94	PA V0		
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in AWG - CSA: in AWG	 300 / 20 / 26 ... 12 -- / -- / 26 ... 12	 300 / 30 / 20 ... 10	 20 ... 10 20 ... 10
Support rails/protective conductor busbars	--		see page 14/3, section "Support rails"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
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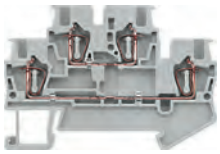
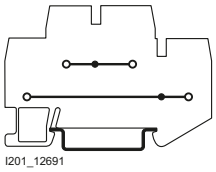
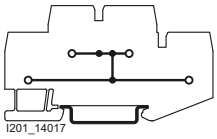
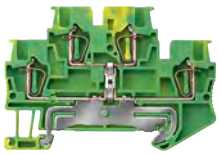
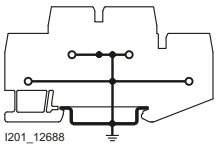
Terminal size 1.5 mm²							
 8WH2020-0AE00	**Two-tier terminals, terminal size 1.5 mm²** • Terminal width 4.2 mm • c UL us, CE • IEC 60947-7-1 - Rigid 0.08 ... 1.5 mm² - Flexible 0.08 ... 1.5 mm² - AWG 28 ... 16 - *I* = 17.5 A - The total current through all connected conductors must not exceed the max. load current - *U* = 500 V						
 I201_12691 8WH2020-0AE00	Versions • Gray - Without equipotential bonding, 2-pole, CE - With equipotential bonding, 1-pole • Blue, 2-pole		**8WH2020-0AE00** **8WH2025-0AE00** **8WH2020-0AE01**		1 1 1	50 units 50 units 50 units	1BT 1BT 1BT
 I201_14017 8WH2025-0AE00							
 8WH2020-0CE07	**PE two-tier terminals, terminal size 1.5 mm²** • Terminal width 4.2 mm • c UL us, CE • IEC 60947-7-1 - Rigid 0.08 ... 1.5 mm² - Flexible 0.08 ... 1.5 mm² - AWG 28 ... 16 • Green-yellow		**8WH2020-0CE07**		1	50 units	1BT
 I201_12688 8WH2020-0CE07							

14

Minimum order quantity (PS) or a multiple thereof can be ordered.

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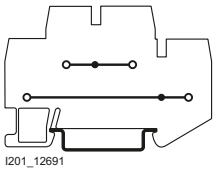
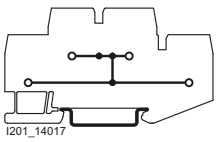
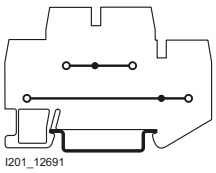
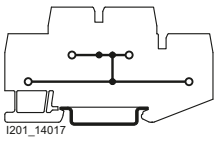
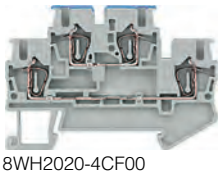
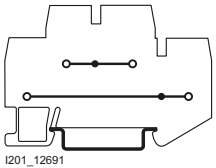
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH2020-0AF00	**Two-tier terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - I = 26 A - The total current through all connected conductors must not exceed the max. load current - U = 500 V						
 I201_12691 8WH2020-0AF00	Versions • Gray - Without equipotential bonding, 2-pole - With equipotential bonding, 1-pole • Blue - Without equipotential bonding, 2-pole - With equipotential bonding, 1-pole		**8WH2020-0AF00** **8WH2025-0AF00** **8WH2020-0AF01** **8WH2025-0AF01**		1 50 units 1 50 units 1 50 units 1 50 units		1BT 1BT 1BT 1BT
 I201_14017 8WH2025-0AF00							
 8WH2023-0AF00	**Two-tier terminals, terminal size 2.5 mm², three clamping points on one level** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - I = 26 A - The total current through all connected conductors must not exceed the max. load current - U = 500 V						
 I201_12691 8WH2023-0AF00	Versions • Gray - Without equipotential bonding, 2-pole - With equipotential bonding, 1-pole • Blue, 2-pole		**8WH2023-0AF00** **8WH2022-0AF00** **8WH2023-0AF01**		1 50 units 1 50 units 1 50 units		1BT 1BT 1BT
 I201_14017 8WH2022-0AF00							
 8WH2020-4CF00	**Two-tier terminals, terminal size 2.5 mm², N at top and L at bottom** • Gray • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - I = 26 A - U = 500 V		**8WH2020-4CF00**		1 50 units		1BT
 I201_12691 8WH2020-4CF00							

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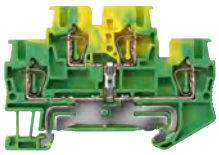
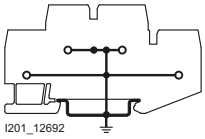
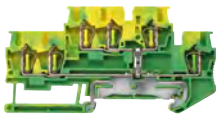
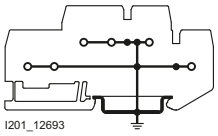
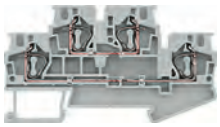
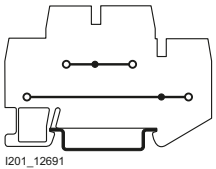
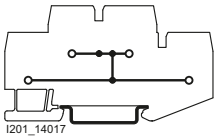
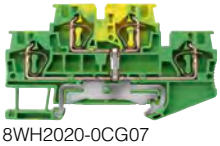
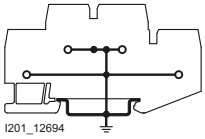
8WH two-tier terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WH2020-0CF07  I201_12692 8WH2020-0CF07	**PE two-tier terminals, terminal size 2.5 mm², two clamping points on one level** • Terminal width 5.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 • Green-yellow		**8WH2020-0CF07**		1	50 units	1BT
 8WH2023-0CF07  I201_12693 8WH2023-0CF07	**PE two-tier terminals, terminal size 2.5 mm², three clamping points on one level** • Terminal width 5.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 • Green-yellow		**8WH2023-0CF07**		1	50 units	1BT
Terminal size 4 mm²							
 8WH2020-0AG00  I201_12691 8WH2020-0AG00  I201_14017 8WH2025-0AG00	**Two-tier terminals, terminal size 4 mm²** • Terminal width 6.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 - I = 32 A - The total current through all connected conductors must not exceed the max. load current - U = 500 V Versions • Gray - Without equipotential bonding, 2-pole - With equipotential bonding, 1-pole • Blue, 2-pole		**8WH2020-0AG00** **8WH2025-0AG00** **8WH2020-0AG01**		1 1 1	50 units 50 units 50 units	1BT 1BT 1BT
 8WH2020-0CG07  I201_12694 8WH2020-0CG07	**PE two-tier terminals, terminal size 4 mm²** • Terminal width 6.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 • Green-yellow		**8WH2020-0CG07**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
 8WH9070-0BA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²** • For visual and electrical separation of terminal groups • 2 mm thick		**8WH9070-0BA00**		100	50 units	1BT
 8WH9000-1VA00	**Covers** Gray						
	Versions						
	• For terminal sizes 1.5 ... 2.5 mm² • For terminal size 2.5 mm² and three clamping points • For terminal size 4 mm²		**8WH9000-1VA00** **8WH9000-2VA00** **8WH9003-1VA00**		100 100 100	50 units 50 units 50 units	1BT 1BT 1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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8WH three-tier terminals

Overview



Our three-tier terminals offer three feed-through levels in a slim 5.2 mm terminal enclosure. They enable high wiring density – ideal for switchboards where space is at a premium.

With one bridge shaft per tier, these terminal blocks are ideal for use as compact potential distributors or initiator terminals. All six clamping points are interconnected on the equipotential bonding versions.

The three-tier terminal range is rounded off with a PE terminal with the same contour.

Inscription

Each tier of three-tier terminals can be inscribed with flat labels. If a label holder is used, the labels can be inserted at the front.

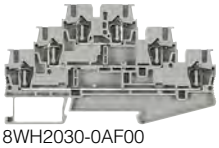
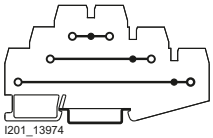
Benefits

- Three feed-through levels with minimum footprint
- Comprehensive range of inscription options
- Matching accessories for 8WH terminal range
- One bridge shaft per tier
- Label holder is inserted

Technical specifications

	8WH2030-0AF00 8WH2030-0AF01 8WH2035-0AF00 8WH2035-0AF01	**8WH2035-0CF07**	**8WH2030-4EF00 8WH2030-4HF00**
Dimensions			
• Width / length in mm	5.2 / 99.5	5.2 / 99.5	5.2 / 99.5
• Height (TS 35/7.5 / TS 35/15 / TS 32) in mm	58 / 65.5	58 / 65.5	58 / 65.5
Technical specifications acc. to IEC/DIN VDE			
• Max. load current in A / cross-section in mm^2	28 / 4	--	28 / 4
• Rated impulse withstand voltage in kV / pollution degree	6 / 3	6 / 3	6 / 3
• Overvoltage category / molded plastic group	III / I	III / I	III / I
Connection capacities			
• Flexible with end sleeve, with/without plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 2.5	0.25 ... 2.5
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 2.5	0.25 ... 2.5
• Flexible with TWIN end sleeve, with plastic sleeve in mm^2	0.5	0.5	0.5
Stripped length in mm	10	10	10
Plug gauge (IEC 60947-1)	A3	A3	A3
Molded plastic type	PA	PA	PA
• Flammability Class acc. to UL 94	V0	V0	V0
Approval data (UL/CUR and CSA)			
• Rated voltage / rated current / conductor sizes			
- UL/CUR: V/A/AWG	600 / 20 / 26 ... 12	-- / -- / 24 ... 12	300 / 20 / 26 ... 12
- CSA: V/A/AWG	--	--	--

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 2.5 mm^2							
 8WH2030-0AF00	**Three-tier terminals, terminal size 2.5 mm^2** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm^2 - Flexible 0.08 ... 2.5 mm^2 - AWG 28 ... 12 - I = 28 A - U = 500 V						
 I201_13974 8WH2030-0AF00	Versions • Gray • Blue		**8WH2030-0AF00** **8WH2030-0AF01**		1 1	50 units 50 units	1BT 1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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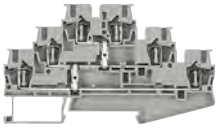
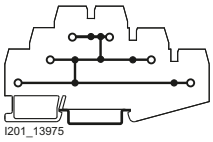
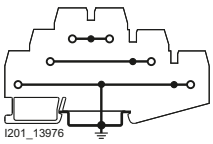
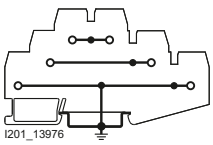
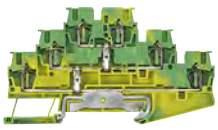
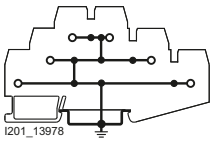
	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH2035-0AF00  I201_13975 8WH2035-0AF00	**Three-tier terminals, with equipotential bonding, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 28 A - *U* = 500 V Versions • Gray • Blue Note The total current through all connected conductors must not exceed the maximum load current.		**8WH2035-0AF00** **8WH2035-0AF01**		1 1	50 units 50 units	1BT 1BT
 8WH2030-4EF00  I201_13976 8WH2030-4EF00	**Three-tier terminals, "PE/L/N", terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 + IEC 60947-7-2 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12		**8WH2030-4EF00**		1	50 units	1BT
 8WH2030-4HF00  I201_13976 8WH2030-4HF00	**Three-tier terminals, "PE/L/L", terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 + IEC 60947-7-2 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 28 A - *U* = 500 V		**8WH2030-4HF00**		1	50 units	1BT
 8WH2035-0CF07  I201_13978 8WH2035-0CF07	**PE three-tier terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-2 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12		**8WH2035-0CF07**		1	50 units	1BT
Accessories							
 8WH9000-1GD00	**Covers, for three-tier terminals**		**8WH9000-1GD00**		100	50 units	1BT
 8WH9060-4BA00	**Label holders, for three-tier terminals**		**8WH9060-4BA00**		100	100 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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8WH four-tier motor terminals

Overview



Terminal size 2.5 mm²

The four-tier motor terminals with terminal size 2.5 mm² are ideal for the compact wiring of AC loads. They have three through-levels and one PE connection which is contacted by simply snapping it onto the mounting rail.

No cross-bridging option.

Terminal size 4 mm²

Like the 2.5 mm² version, the four-tier motor terminal with 4 mm² terminal size also allows the wiring of three phases and the PE in a single terminal. This terminal is enclosed at both ends.

No cross-bridging option.

Integrated PE/ground conductor function

PE contact with the support rail is made by simply snapping the terminal onto the rail. This makes the four-tier motor terminals with terminal size 4 mm² ideal for the space-saving wiring of AC motors.

Inscription

Each clamping point has a facility for inscription and a test option for 2.3 mm ⌀ test plugs.

There is also sufficient space for labeling in the middle of the terminal on the front.

Labels can be mounted flat at the side of the terminals by simply snapping on.

Technical specifications

	8WH2040-4LF00	8WH2040-4LG00
Dimensions		
• Width/length/cover width in mm	5.2 / 98.5 / 2.2	6.2 / 101 / --
• Height (NS 35/7.5 / NS 35/15) in mm	73.5 / 81	83.5 / 91
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A / cross-section in mm²	26 / 4	32 / 6
• Rated impulse withstand voltage in kV / pollution degree	8 / 3	
• Overvoltage category / molded plastic group	III / I	
Connection capacities		
• Flexible with end sleeve, with plastic sleeve in mm²	0.25 ... 2.5	0.25 ... 4
• Flexible with end sleeve, without plastic sleeve in mm²	0.25 ... 2.5	0.25 ... 4
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm²	--	0.5 ... 1
Stripped length in mm	10	
Plug gauge (IEC 60947-1)	A3	A4
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	-- / -- / 26 ... 12	--
- CSA: in V/A / AWG	--	600 / 30 / 28-10

Minimum order quantity (PS) or a multiple thereof can be ordered.

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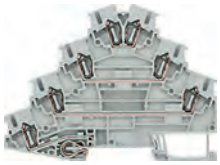
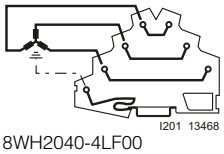
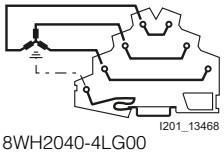
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 2.5 mm²							
 8WH2040-4LF00  8WH2040-4LF00	**Four-tier motor terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 60947-7-1 and IEC 60947-7-2 - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - I = 26 A - U = 800 V		**8WH2040-4LF00**		1	50 units	1BT
Terminal size 4 mm²							
 8WH2040-4LG00  8WH2040-4LG00	**Four-tier motor terminals, terminal size 4 mm²** • Terminal width 6.2 mm • c UL us • IEC 60947-7-1 and IEC 60947-7-2 - Rigid 0.08 ... 6 mm² - Flexible 0.08 ... 4 mm² - AWG 28 ... 10 - I = 32 A - U = 800 V • Enclosed at both ends		**8WH2040-4LG00**		1	50 units	1BT
Accessories							
 8WH9000-1GE00	**Covers** **For four-tier motor terminals, terminal size 2.5 mm²**		**8WH9000-1GE00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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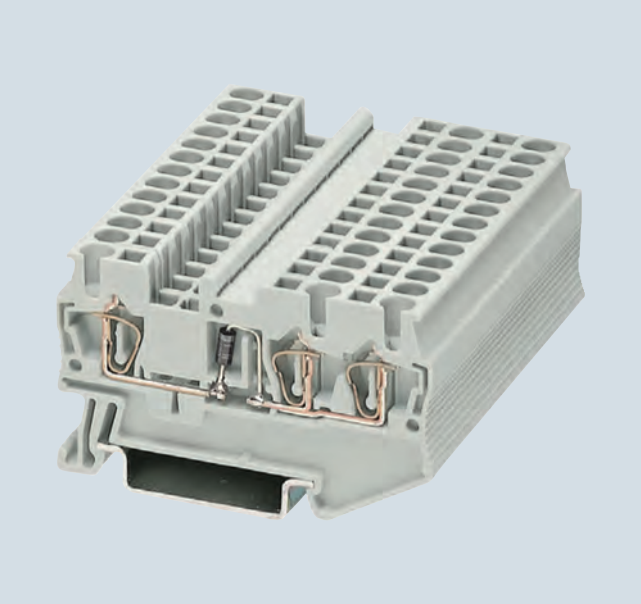
8WH diode terminals

Overview



Diode terminals with a nominal cross-section of 2.5 mm^2 and a mounting width of just 5.2 mm can be used to implement many different wiring tasks. The diode is soldered in from left to right or vice versa as required.

A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

Technical specifications

	8WH2003-5DF00 **8WH2003-5CF00**
Dimensions	
• Width/length/cover width in mm	5.5 / 60.5 / 2.2
• Height HV-M... (NS 35/7.5 / NS 35/15) in mm	36.5 / 44
Technical specifications acc. to IEC/DIN VDE	
• Max. load current in A / cross-section in mm^2	Determined by the diode / 4
• Rated impulse withstand voltage in kV / pollution degree	4 / 3
• Overvoltage category / molded plastic group	III / I
Connection capacities	
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5
Stripped length in mm	10
Plug gauge (IEC 60947-1)	A3
Molded plastic type	PA
• Flammability Class acc. to UL 94	V0
Approval data (UL/cUL and CSA)	
• Rated voltage / rated current / conductor sizes	
- UL/cUL: V / A / AWG	600 / 20 / 26 ... 12
- CSA: V / A / AWG	--

Minimum order quantity (PS) or a multiple thereof can be ordered.

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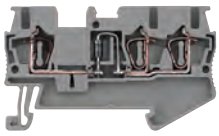
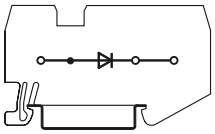
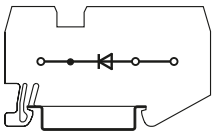
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 2.5 mm²							
 8WH2003-5DF00	**Diode terminals, terminal size 2.5 mm², with three clamping points** • Uninterrupted limiting current: 0.5 A • Blocking voltage: 1300 V • Terminal width 5.2 mm • c UL us • Connection data - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - I = the maximum current is determined by the diode - U = 500 V • With integrated diode • Integrated: Diode 1N 4007						
 I201_12712 8WH2003-5DF00	Versions • Let-through from left to right		**8WH2003-5DF00**		1	50 units	1BT
 I201_12713 8WH2003-5CF00	• Let-through from right to left		**8WH2003-5CF00**		1	50 units	1BT
Accessories							
 8WH9070-0GA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm² and three clamping points**		**8WH9070-0GA00**		100	50 units	1BT
 8WH9000-4GA00	**Covers, for terminal sizes 1.5 ... 2.5 mm² and three clamping points**		**8WH9000-4GA00**		100	50 units	1BT
 8WH9000-0GA00	**Cover segments, for terminal sizes 1.5 and 2.5 mm² and three clamping points**		**8WH9000-0GA00**		100	10 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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8WH two-tier diode terminals

Overview



Two-tier diode terminals can be used together with different versions to implement many different wiring tasks.

The following circuits are possible in the tightest spaces:

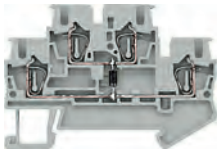
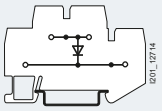
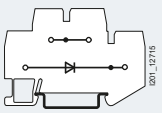
- Freewheel diode circuits
- Lamp test circuits
- Signaling and fault signaling circuits

The clamping points of two-tier terminals can be inscribed with flat labels.

Technical specifications

	8WH2020-5AF00, 8WH2020-5DF00	8WH2020-5KF00	8WH2020-5JF30
Dimensions			
• Width/length/cover width in mm	5.2 / 67.5 / 2.2		
• Height (NS 35/7.5 / NS 35/15) in mm	47.5 / 55		
Technical specifications acc. to IEC/DIN VDE			
• Max. load current in A (not via diodes) / cross-section in mm^2	26 / 4		
• Rated impulse withstand voltage in kV / pollution degree	4 / 3		
• Overvoltage category / molded plastic group	III / I		
Connection capacities			
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5		
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5		
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5		
Stripped length in mm	10		
Plug gauge (IEC 60947-1)	A3		
Molded plastic type	PA		
• Flammability Class acc. to UL 94	V0		
Approval data (UL/cUL and CSA)			
• Rated voltage / rated current / conductor sizes			
- UL/cUL: in V/A / AWG	300 / 20 / 26 ... 12		
- CSA: in V/A / AWG	300 / 20 / 26 ... 12		

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details						
	cULus Approved						
Terminal size 2.5 mm^2							
 8WH2020-5AF00	**Two-tier terminals, terminal size 2.5 mm^2, with one diode** • Terminal width 5.2 mm • Connection data - Rigid 0.08 ... 4 mm^2, flexible 0.08 ... 2.5 mm^2, AWG 28 ... 12 - I = 26 A, U = 500 V • Maximum current determined by diode • Integrated: Diode 1N 4007 - Blocking voltage: 1300 V, uninterrupted limiting current: 0.5 A						
	Circuit diagram: 		**8WH2020-5AF00**		1	50 units	1BT
	Let-through from top to bottom						
	Circuit diagram: 		**8WH2020-5DF00**		1	50 units	1BT
	Let-through from bottom left to bottom right						

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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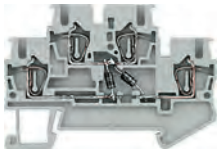
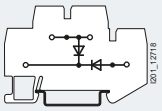
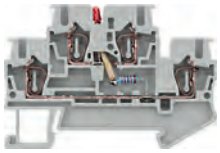
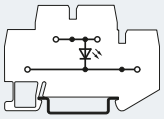
8WH two-tier diode terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WH2020-5KF00	**Two-tier diode terminals, terminal size 2.5 mm², with two diodes** • Terminal width 5.2 mm • Connection data - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 26 A, *U* = 500 V • Maximum current determined by diode • Integrated: Diode 1N 4007 - Blocking voltage: 1300 V - Uninterrupted limiting current: 0.5 A Circuit diagram:  Version: Let-through from top to bottom left and from bottom right to bottom left		**8WH2020-5KF00**		1	50 units	1BT
 8WH2020-5JF30	**Two-tier diode terminals, terminal size 2.5 mm², with illuminated display** • Terminal width 5.2 mm • Connection data - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 26 A - *U* = 500 V Circuit diagram:  Version: 15 ... 30 V DC / 2.5 ... 7.5 A		**8WH2020-5JF30**		1	50 units	1BT
Accessories							
 8WH9070-0BA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²**		**8WH9070-0BA00**		100	50 units	1BT
 8WH9000-1VA00	**Covers, for terminal sizes 1.5 and 2.5 mm²**		**8WH9000-1VA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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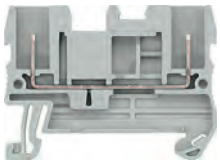
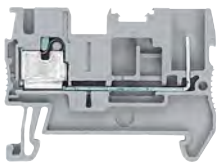
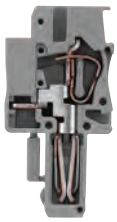
Overview

	Devices	Page	Function
	8WH5 through-type terminals	14/87	Terminals for the connection of combination plug-in terminals
	8WH5 hybrid through-type terminals with iPo connection	14/89	Terminals for the connection of combination plug-in terminals
	8WH9 plugs	14/90	For connection of combination plugs for fast wiring

Features

			Connection type →	Combination plugs		Article No. (digits 8 ... 12)
			Design →	Standard		
			No. of clamping points →	2	4	
			Article No. (digits 1 ... 7) →	8WH5000	8WH5004	
Conductor cross-section	**Terminal type**	**Color**				
2.5 mm^2	Through-type	Gray		✔	✔	0AF00
		Blue		✔	✔	0AF01
	PE	Green-yellow		✔	✔	0CF07

Minimum order quantity (PS) or a multiple thereof can be ordered.

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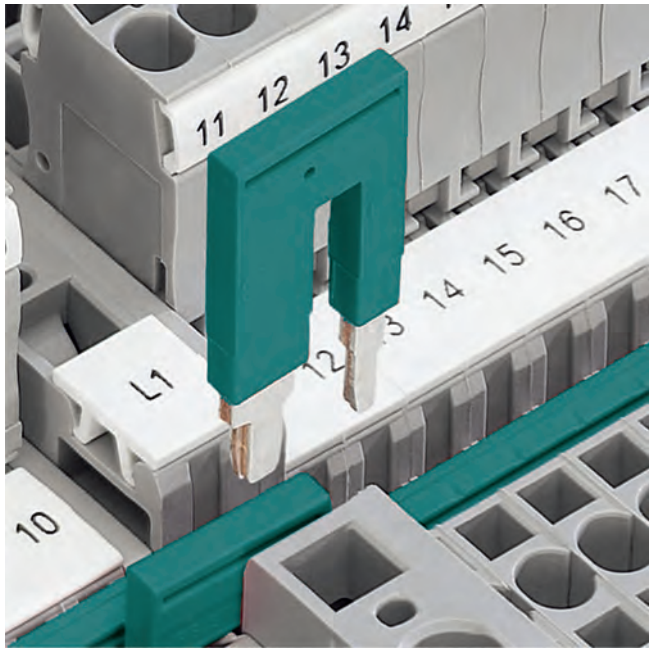
Benefits

High-performance contact



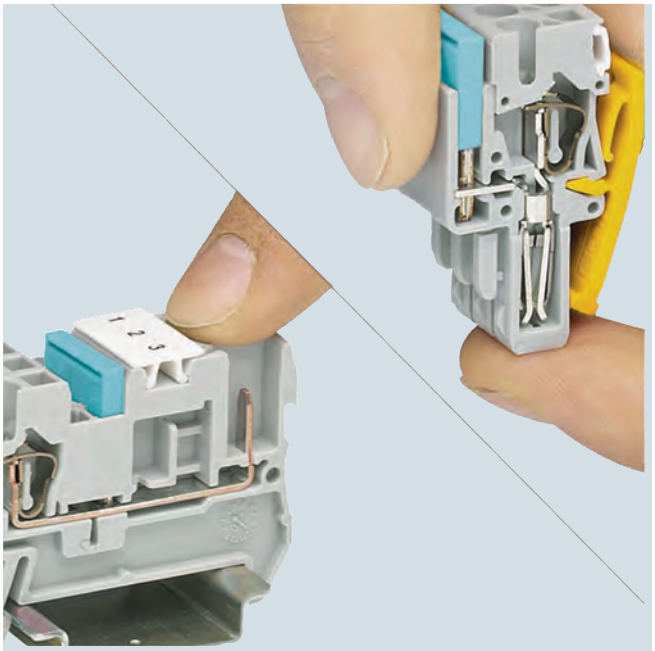
The advanced plug-in system of the combination plug-in terminals enables plug-in wiring up to a rated current of 24 A and a rated voltage of 800 V. The contact system withstands extreme vibration thanks to the integral overspring.

Time and cost-saving potential distribution



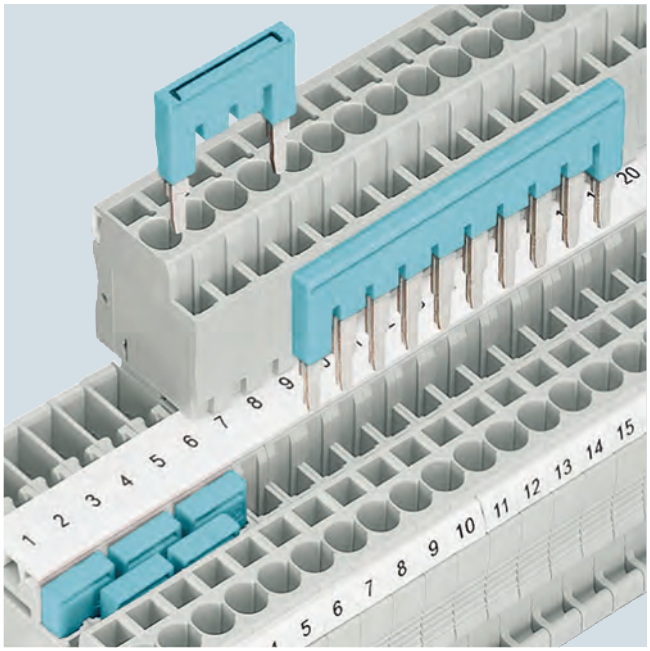
When feeding in large cross-sections, the reducing comb enables time and cost-saving distribution of the potential. For example, it can link a 10 mm^2 through-type terminal to a 2.5 mm^2 through-type terminal and two clamping points.

Fingerproof design



With its fingerproof base terminals and plugs, the combination plug-in terminal system provides maximum user protection. As well as enhancing safety, this provides exceptional flexibility during configuration: the power can be supplied either through the terminals or the plugs.

Standardized connecting comb system



The standardized connecting comb system allows up to 50 terminals to be connected efficiently and quickly with a single jumper. Teeth can be removed to skip individual terminals.

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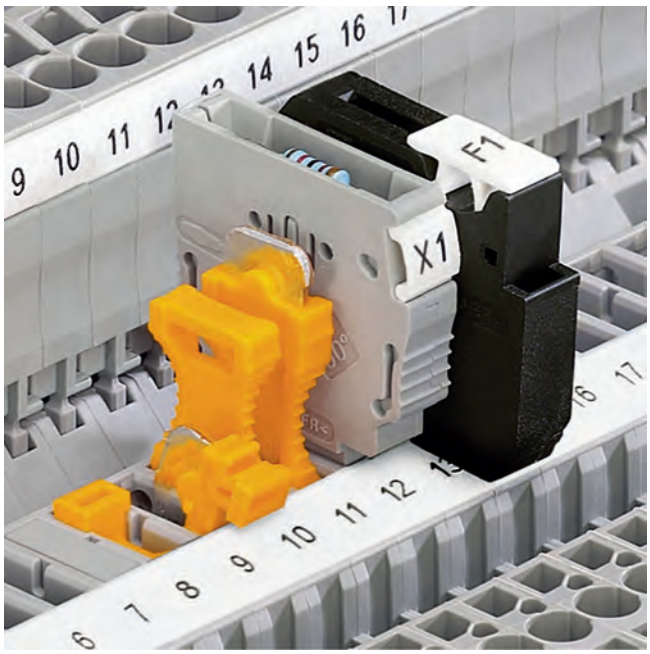
Introduction

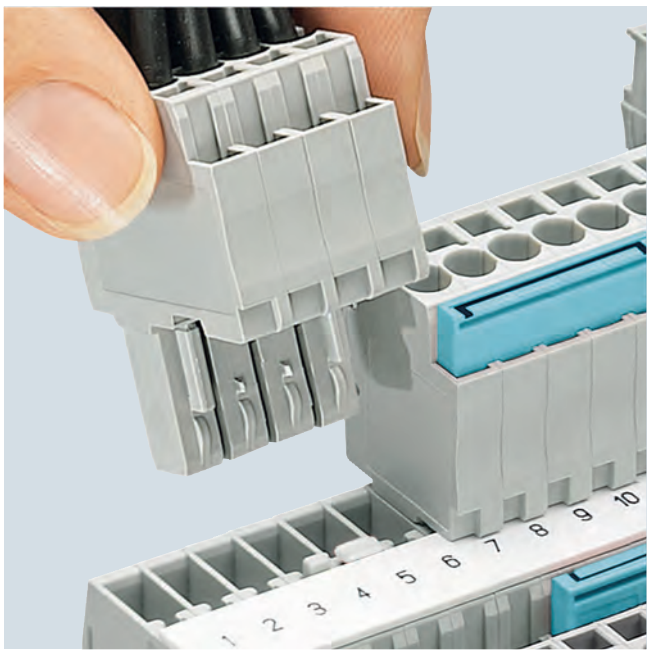
Universal plug-in zone



The universal plug-in zone of the isolating terminal can accommodate isolated through-type connectors, isolating plugs, component connectors and fused connectors.

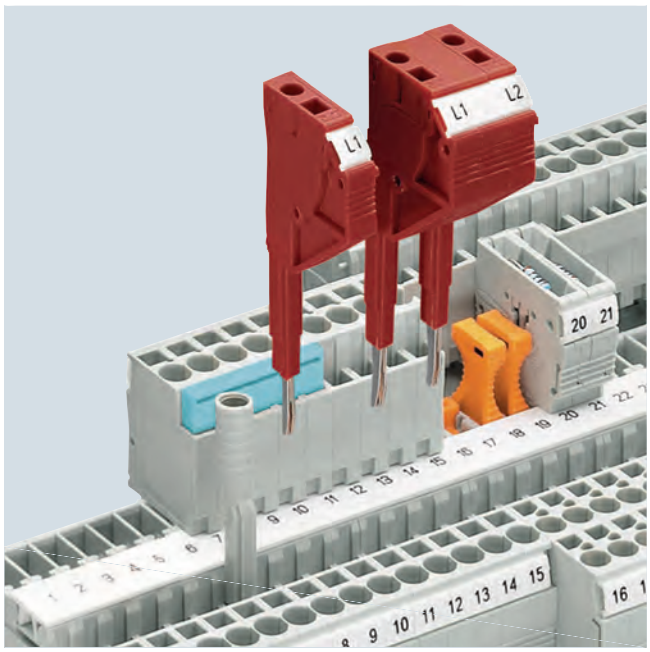
The isolating element must not be replaced under load.

Coding the combination plug-in terminals



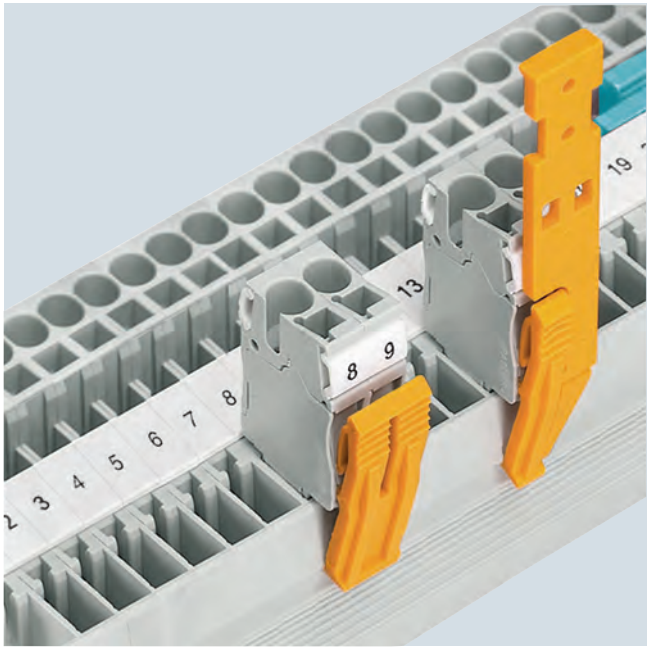
The combination plug-in terminals can be coded with the pin on the plug. The pin is simply removed from the plug, rotated and fitted in the coding position of the base terminal.

Assembling test adapters



Test adapters are available for Ø 4 mm test and safety test plugs. Test plugs can be individually assembled, thanks to the modular design of the test plugs. Measuring leads can be connected over a 1.5 mm^2 spring-loaded terminal.

Snap-on strain relief



Snap-on clamps are available to relieve cable strain at the plugs. Latches are also available to secure the plugs firmly to the base terminals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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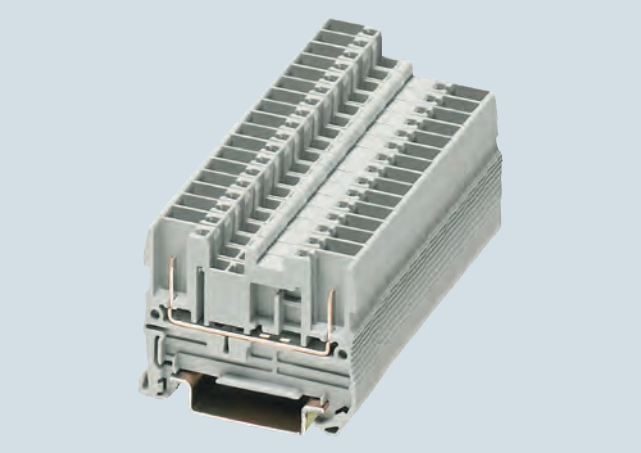
Overview



Plugs can be connected at both ends of the terminal using the through-type terminals of the combination plug-in terminals. This makes the combination plug-in terminal system even more flexible and allows the terminals to be used as connecting elements between modules.

The plugs used have a terminal size of 2.5 mm^2, thus enabling continued use of familiar accessories, such as latches, strain relief and shield connectors.

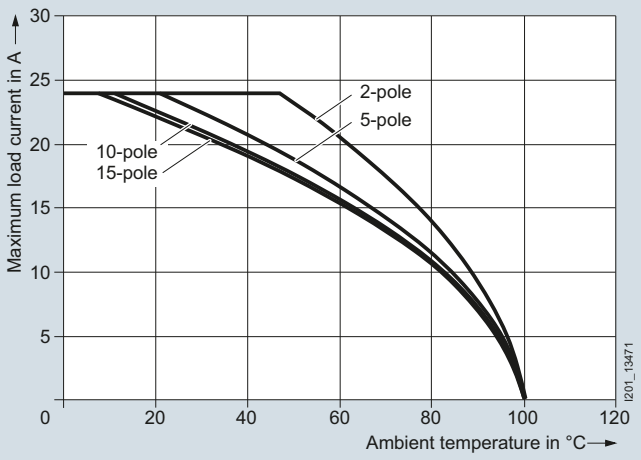
PE terminals with the same contour are available for the base terminals. These are simply snapped onto the support rail to establish a connection to ground potential.

A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

Technical specifications

	8WH5000-0AF00, 8WH5000-0AF01	8WH5000-0CF07
Dimensions		
• Width/length/cover width in mm	5.2 / 48.5 / 2.2	5.2 / 48.5 / 2.2
• Height (TS 35/7.5 / TS 35/15) in mm	36.5 / 44	36.5 / 44
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A[1] / cross-section in mm^2	24 / 4	--
• Rated impulse withstand voltage in kV / pollution degree	6 / 3	
• Overvoltage category / molded plastic group	III / I	
Connection capacities		
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5	
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5	
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5	
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	300 / 20 / --	-- / -- / --
		see page 14/90, section 8WH9 plugs
- CSA: in V/A / AWG	--	
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"

[1] Derating of the load current is necessary for higher temperatures and/or multi-pole combination plug versions.



Derating curve for 8WH5000-0AF00

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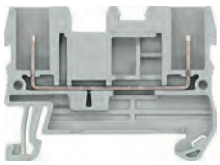
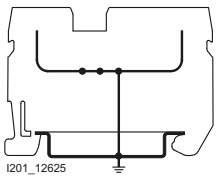
8WH5 through-type terminals

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH5000-0AF00	**Through-type terminals, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • IEC 61984 - I = 24 A - U = 500 V						
	Versions						
	• Gray - Two clamping points		**8WH5000-0AF00**		1	50 units	1BT
	• Blue - Two clamping points		**8WH5000-0AF01**		1	50 units	1BT
	Note						
	On the terminal with four clamping points, the total current through all connected conductors must not exceed the max. load current.						
 8WH5000-0CF07	**PE through-type terminals, terminal size 2.5 mm²** • Green-yellow • Terminal width 5.2 mm • c UL us • IEC 61984						
	Versions						
	• Two clamping points		**8WH5000-0CF07**		1	50 units	1BT
 I201_12625 8WH5000-0CF07							
Accessories							
 8WH9070-0AA00	**Compartment partitions, for terminal sizes 1.5 ... 4 mm²** • For visual and electrical separation of terminal groups • 2 mm thick						
	Versions						
	• For two clamping points		**8WH9070-0AA00**		100	50 units	1BT
 8WH9000-1GA00	**Covers, for terminal size 2.5 mm²** Gray						
	Versions						
	• Two clamping points		**8WH9000-1GA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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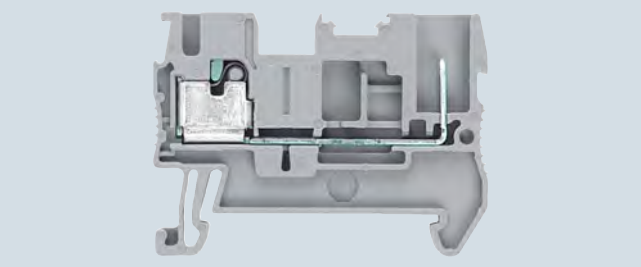
Overview



The 8WH5 hybrid through-type terminals with iPo connection provide a modular solution for fast, flexible wiring of plants and machines. They combine the advantages of the combination terminal system with those of the iPo terminals.

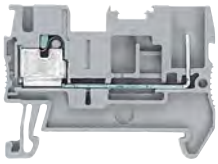
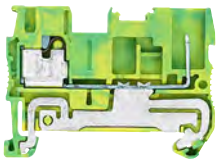
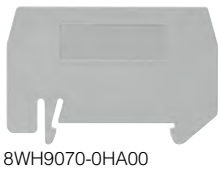
A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

Technical specifications

	8WH5100-2PF00	8WH5100-3PF07
Dimensions		
• Width/length/cover width in mm	5.2 / 48.5 / 2.2	
• Height (TS 35/7.5 / TS 35/15) in mm	36.5	
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A[1] / cross-section in mm^2	24	--
• Rated impulse withstand voltage in kV / pollution degree	500	--
Connection capacity, 1 conductor		
• Rigid	0.14 ... 2.5	
• Flexible with end sleeve with/without plastic sleeve in mm^2	0.14 ... 2.5	
Molded plastic type		
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	500 / 300 /26 ... 12	
- CSA: in V/A / AWG	-- / --	
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"

[1] Derating of the load current is necessary for higher temperatures and/or multi-pole combination plug versions.

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Hybrid through-type terminals with iPo connection, terminal size 2.5 mm^2							
 8WH5100-2PF00	**Hybrid through-type terminals, terminal size 2.5 mm^2** • Gray • Terminal width 5.2 mm • Rated current / cross section I_n = 24 A / 2.5 mm^2 • Rated voltage U_n = 500 V • Rigid 0.14 ... 4 mm^2 • Flexible with end sleeve 0.14 ... 2.5 mm^2 • Stripped length 10 mm		**8WH5100-2PF00**		1	50 units	1BT
 8WH5100-3PF07	**Hybrid PE through-type terminals, terminal size 2.5 mm^2** • Green-yellow • Terminal width 5.2 mm • Rigid 0.14 ... 4 mm^2 • Flexible with end sleeve 0.14 ... 2.5 mm^2 • Connection type: plug-in spring-loaded connection • Stripped length 10 mm		**8WH5100-3PF07**		1	50 units	1BT
Accessories							
 8WH9070-0HA00	**Compartment partitions** For terminal sizes 1.5 ... 4 mm^2 and four clamping points		**8WH9070-0HA00**		100	50 units	1BT
 8WH9000-1GA00	**Covers** For terminal size 2.5 mm^2 and two clamping points		**8WH9000-1GA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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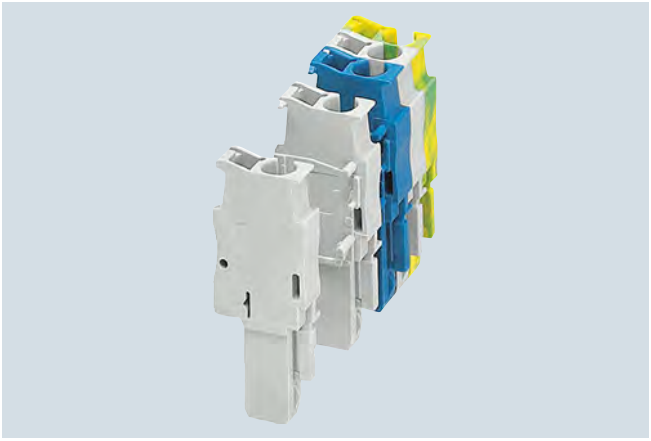
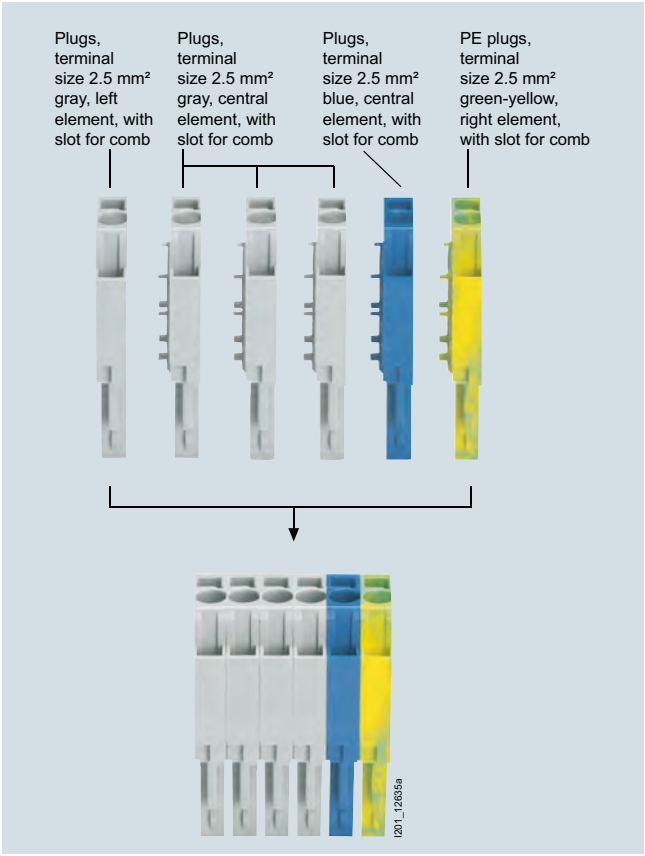
8WH9 plugs

Overview



Assembled by the user in-situ from single-pole plug elements, the combination plug-in terminals in kit form provide a customized solution for every task.
For the existing plugs with terminal sizes 2.5 mm^2, and the plug with comb connection and terminal size 2.5 mm^2, single-pole basic versions in the colors gray, blue and green-yellow are available.
A left element at the beginning of the plug and a right element at the end are needed for each multi-pole plug. The number of middle elements depends on the plug's required number of poles. The individual elements are simply pushed together and latched with securing pins. Pliers may be needed to push them together. The right-hand component has an integrated cover, which covers the plug block. Labels enable flat inscription of the plugs.

Design



Example of a 6-pole plug

Technical specifications

	8WH9040-1AB00 8WH9040-1AB01 8WH9040-1BB00 8WH9040-1BB01 8WH9040-1CB00 8WH9040-1CB01 8WH9040-1DB00 8WH9040-1DB01 8WH9040-1EB00 8WH9040-1EB01 8WH9040-1FB00 8WH9040-1FB01	8WH9040-1AB07 8WH9040-1BB07 8WH9040-1CB07 8WH9040-1DB07 8WH9040-1EB07 8WH9040-1FB07	8WH9050-1KB00 8WH9050-1KB01 8WH9050-1LB00 8WH9050-1LB01 8WH9050-1MB00 8WH9050-1MB01	8WH9050-1KB07 8WH9050-1LB07 8WH9050-1MB07
Dimensions • Width/length/cover width in mm • Height (TS 35/7.5 / TS 35/15) in mm	 -- --			
Technical specifications acc. to IEC/DIN VDE • Max. load current in A[1] / cross-section in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 24 / 4 6 / 3 III / I		 32 / 6 8 / 3	
Connection capacities • Flexible with end sleeve, with plastic sleeve in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2 • Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	 0.25 ... 2.5 0.25 ... 2.5 0.5		 0.25 ... 4 0.25 ... 4 0.5 ... 1	
Stripped length	10			
Plug gauge (IEC 60947-1)	A3		A4	
Molded plastic type • Flammability Class acc. to UL 94	PA V0			
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: in V/A / AWG - CSA: in V/A / AWG	 600 / 20 / 26 ... 12 --		 Applied for Applied for	
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"	--	see page 14/3, section "Support rails"

[1] Derating of the load current is necessary for higher temperatures and/or multi-pole combination plug versions.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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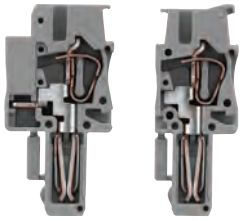
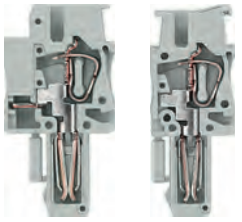
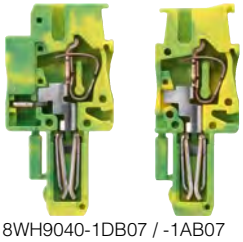
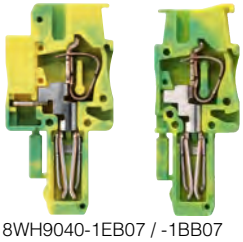
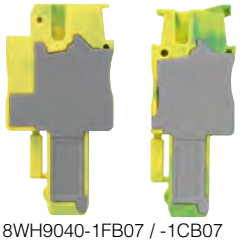
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH9040-1DB00 / -1AB00	**Plugs, terminal size 2.5 mm²** • Terminal width 5.2 mm • c UL us • Connection data - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 24 A - *U* = 500 V • Number of poles = 1						
	Versions						
	• Gray						
	- Left element, with slot for comb		**8WH9040-1DB00**		1	50 units	1BT
	- Central element, with slot for comb		**8WH9040-1EB00**		1	50 units	1BT
	- Right element, with slot for comb		**8WH9040-1FB00**		1	50 units	1BT
	- Left element, without slot for comb		**8WH9040-1AB00**		1	50 units	1BT
	- Central element, without slot for comb		**8WH9040-1BB00**		1	50 units	1BT
	- Right element, without slot for comb		**8WH9040-1CB00**		1	50 units	1BT
 8WH9040-1EB00 / -1BB00	• Blue						
	- Left element, with slot for comb		**8WH9040-1DB01**		1	50 units	1BT
	- Central element, with slot for comb		**8WH9040-1EB01**		1	50 units	1BT
	- Right element, with slot for comb		**8WH9040-1FB01**		1	50 units	1BT
	- Left element, without slot for comb		**8WH9040-1AB01**		1	50 units	1BT
	- Central element, without slot for comb		**8WH9040-1BB01**		1	50 units	1BT
	- Right element, without slot for comb		**8WH9040-1CB01**		1	50 units	1BT
 8WH9040-1FB00 / -1CB00							
 8WH9040-1DB07 / -1AB07	**PE plugs, terminal size 2.5 mm²** • Green-yellow • Terminal width 5.2 mm • c UL us • Connection data - Rigid 0.08 ... 4 mm² - Flexible 0.08 ... 2.5 mm² - AWG 28 ... 12 - *I* = 24 A - *U* = 500 V • Number of poles = 1						
	Versions						
	• Left element, with slot for comb		**8WH9040-1DB07**		1	50 units	1BT
	• Central element, with slot for comb		**8WH9040-1EB07**		1	50 units	1BT
	• Right element, with slot for comb		**8WH9040-1FB07**		1	50 units	1BT
	• Left element, without slot for comb		**8WH9040-1AB07**		1	50 units	1BT
	• Central element, without slot for comb		**8WH9040-1BB07**		1	50 units	1BT
	• Right element, without slot for comb		**8WH9040-1CB07**		1	50 units	1BT
 8WH9040-1EB07 / -1BB07							
 8WH9040-1FB07 / -1CB07							

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8WH9 plugs

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
 8WH9050-2BA04	**Latches** Number of poles: 2 Versions • With strain relief • Without strain relief		**8WH9050-2BA04** **8WH9050-2AA04**		100 100	50 units 50 units	1BT 1BT
 8WH9120-0DB08	**Shielding** • For connection of shielded cables • For cables with 5 ... 10 mm diameter • Color: black		**8WH9120-0DB08**		1	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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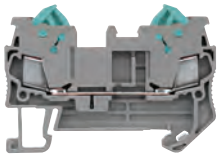
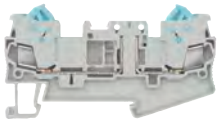
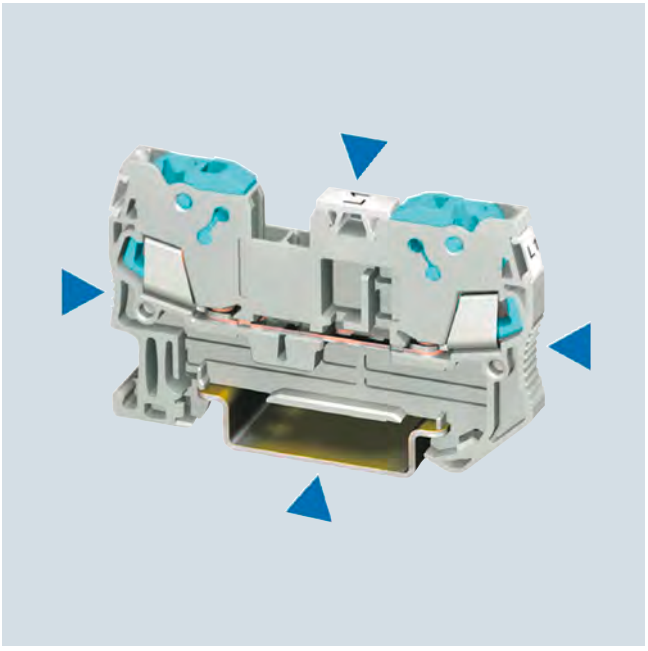
Overview

	Devices	Page	Function
	8WH through-type terminals	14/96	Connection up to 2.5 mm^2 of incoming and outgoing conductors
	8WH isolating terminals	14/102	Isolation of the circuit, e.g. for test purposes

1) Only the main terminal types are listed here. You will find further versions on the following pages.

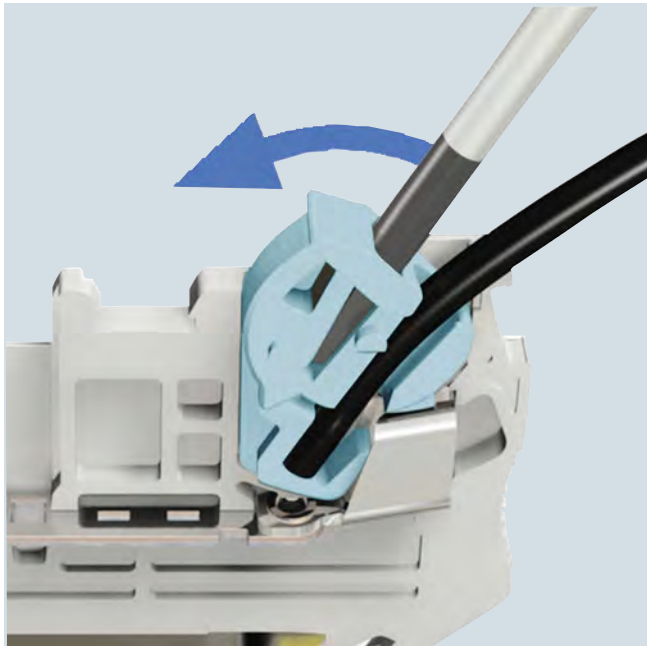
Features

			Connection type →	Insulation displacement				Article No. (digits 8 ... 12)
			Design →	Standard			Two-tier	
			No. of clamping points →	2	3	4	4	
			Article No. (digits 1 ... 7) →	8WH3000	8WH3003	8WH3004	8WH3020	
Conductor cross-section	**Terminal type**[1]	**Color**						
1.5 mm^2	Through-type	Gray		✔	✔	✔	✔	0AE00
		Blue		✔	✔	✔	✔	0AE01
	Isolating	Gray		✔	--	--	--	6AE00
	PE	Green-yellow		✔	✔	✔	✔	0CE07
2.5 mm^2	Through-type	Gray		✔	✔	--	--	0AF00
		Blue		✔	✔	--	--	0AF01
	Isolating	Gray		✔	--	--	--	6AF00
	PE	Green-yellow		✔	--	--	--	0CF07



A key feature of the insulation displacement series is its IDC rotary connection. This concept saves considerable space in the control cabinet without impairing other quality features, such as

- Large surface marking
- Maximum connection compartment
- Flexible connecting combs



Time savings of 60% and more compared to other connection systems.

With the quick-connect insulation displacement terminal system, there is no need to strip the insulation or protect the splice. The cables only need to be cut to length for contacting within seconds.

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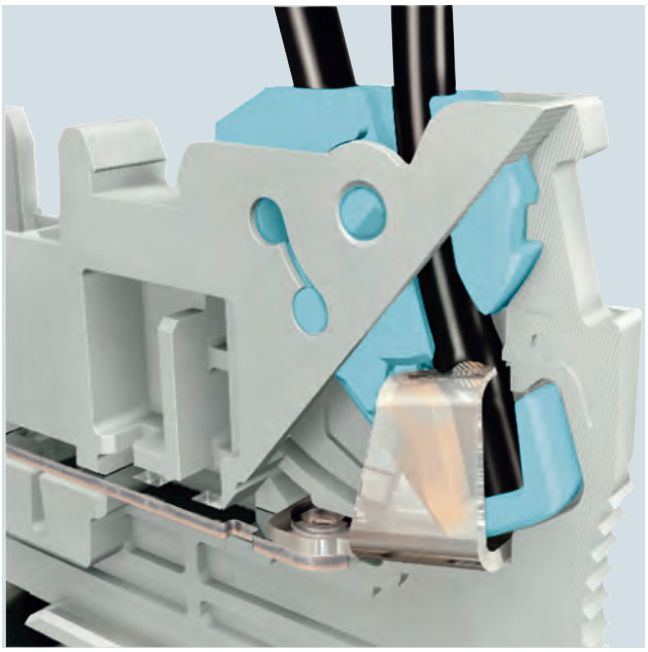
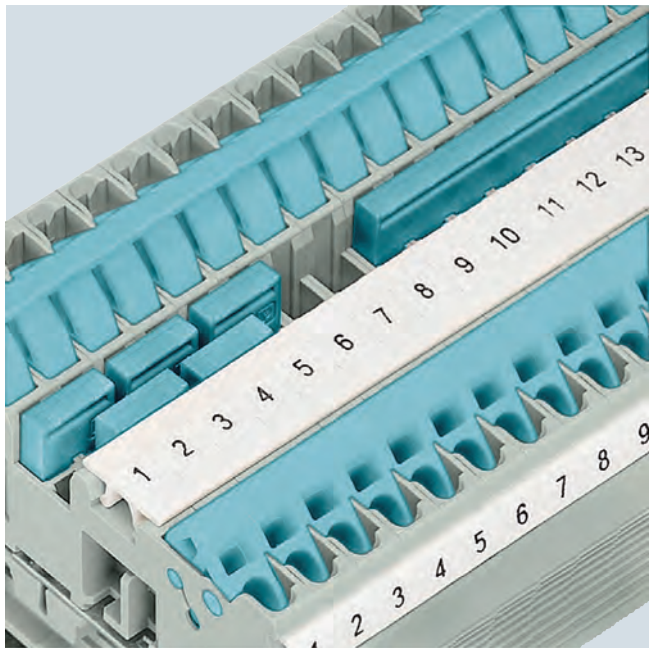
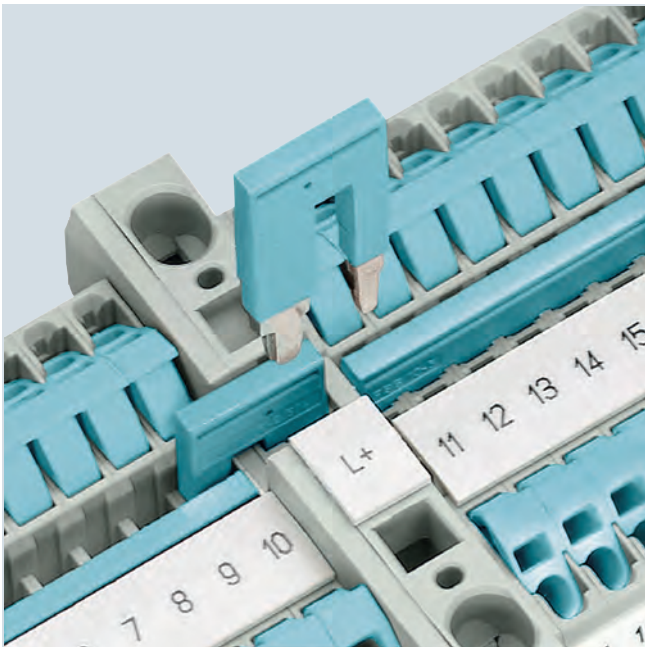
Introduction



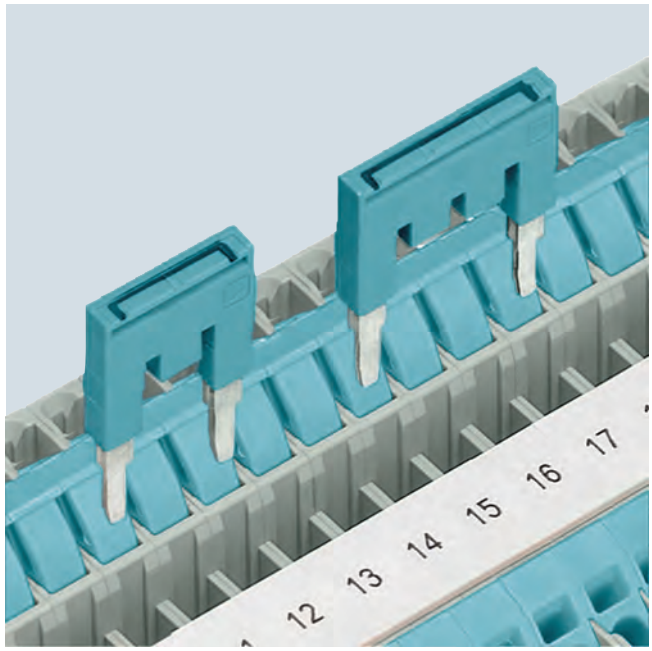
Conductor connections from 0.25 to 2.5 mm^2 are produced by the cutting contact. High-grade special alloys and latching of the switch states ensure reliable electrical connections at all times. Large, spring-loaded contact points ensure 24 A current load rating.



The standardized connecting comb system allows several terminals to be linked efficiently and quickly with a single jumper. The range covers 2 to 50-pole jumpers, which can help considerably to reduce the amount of wiring outlay.



When feeding in large cross-sections, the reducing comb enables time and cost-saving distribution of the potential. For example, it can link a 10 mm^2 spring-loaded through-type terminal to a 1.5 mm^2 insulation displacement through-type terminal and two clamping points – or to a 2.5 mm^2 insulation displacement through-type terminal and two clamping points.



Teeth can be removed from the standard comb in order to skip individual terminals, so that two potentials can run in parallel. A marking option is provided on the top of the connecting comb.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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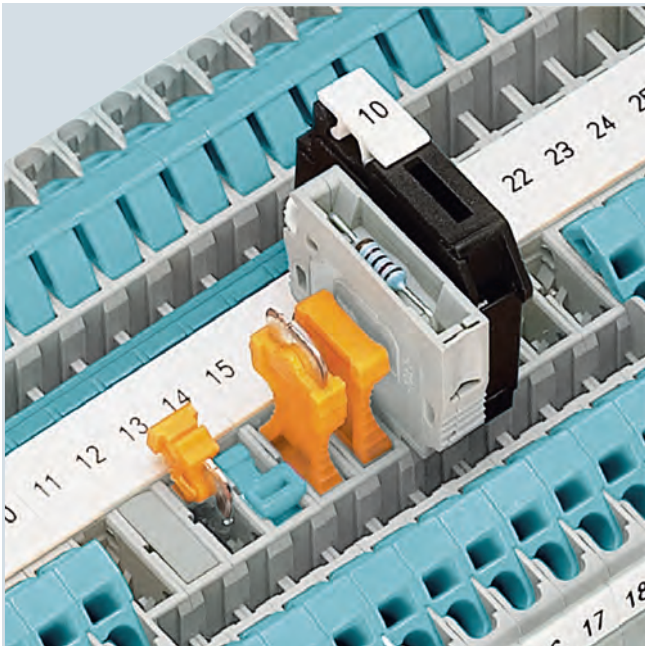
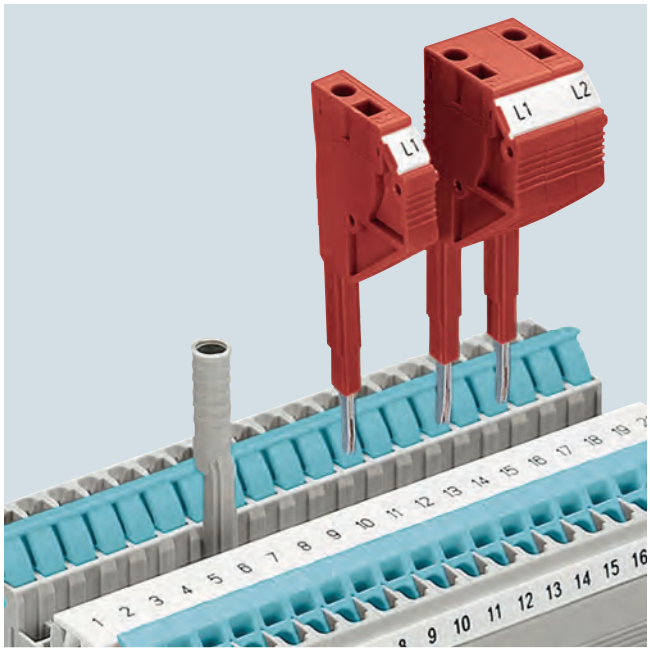


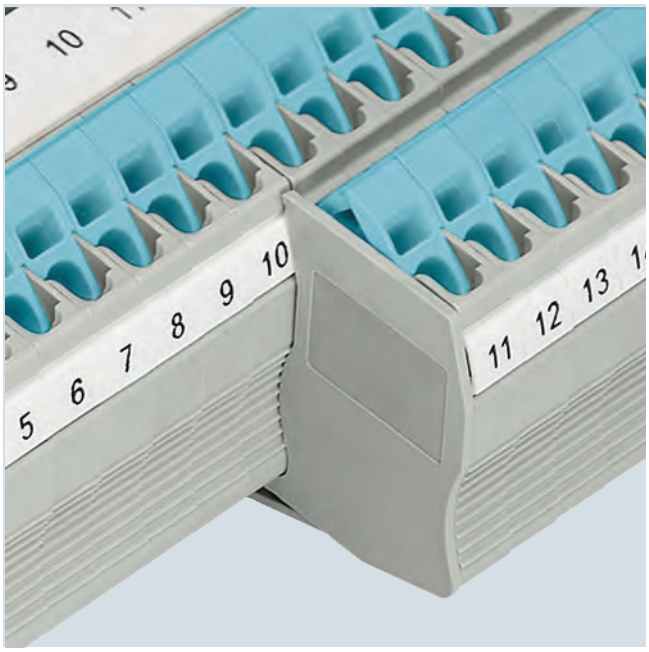
The universal plug-in zone of the isolating terminal can accommodate isolated through-type connectors, isolating plugs, component connectors and fused connectors.
The isolating element (isolating plug) must not be replaced under load.



The unambiguous and easy-to-read marking in the center of the terminal is essential for time-saving installation. In addition to the large inscription in the center, each clamping point can also be labeled separately.



Test adapters are available for Ø 4 mm test and safety test plugs. Test plugs can be individually assembled, thanks to the modular design of the test plugs. Measuring leads can be connected over a 1.5 mm^2 spring-loaded/insulation displacement terminal.



The cover segment is used to cover multi-wire terminals when mounting two-wire terminals side by side. These devices meet all fingerproof requirements.

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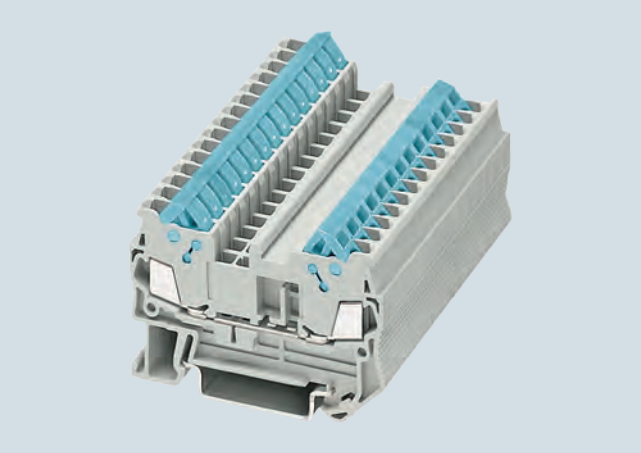
8WH through-type terminals

Overview



A key feature of the insulation displacement through-type terminal is its compact design. With its clear and space-saving front connection arrangement, this insulation displacement series provides additional space between the cable ducts for wiring. Using the double bridge shaft, it is also possible to use individual chain bridging, as well as a reducing comb, e.g. from a 2.5 mm^2 spring-loaded through-type terminal to a 35 mm^2 spring-loaded through-type terminal. Used in this way, reducing combs enable the quick and easy assembly of potential incoming feeders and distributors.

A label can be snapped on to the middle of the terminal at the front. Further labels can also be mounted flat on the side of the terminals.

Technical specifications

	8WH3000-0AE00 8WH3000-0AE01	8WH3003-0AE00 8WH3003-0AE01	8WH3004-0AE00 8WH3004-0AE01	8WH3000-0CE07	8WH3003-0CE07
Dimensions					
• Width/length/cover width in mm	5.2 / 58.8 / 2.2	5.2 / 76.4 / 2.2	5.2 / 94 / 2.2	5.2 / 58.8 / 2.2	5.2 / 76.4 / 2.2
• Height (TS 35/7.5 / TS 35/15) in mm	39.3 / 46.8				
Technical specifications acc. to IEC/DIN VDE					
• Max. load current in A / cross-section in mm^2	17.5 / 1.5			--	
• Rated impulse withstand voltage in kV / pollution degree	8 / 3				
• Overvoltage category / molded plastic group	III / I				
Conductor cross-section acc. to DIN VDE 0295					
• Core insulation	PVC / PE (other insulation types on request)				
• Solid/finely stranded H05V-U/R/K / H07V-U/R/K in mm^2	0.5 ... 1.0 / 1.5				
• Halogen-free H05Z-U/R/K / H07Z-U/R/K in mm^2	0.5 ... 1.0 / 1.5				
• Finely stranded / very finely stranded					
- (Strand ∅ ≥ 0.1 mm) in mm^2	0.25 ... 0.34				
- (Strand ∅ ≥ 0.19 mm) AWG	24 ... 16				
Number of circuits					
• At least 100x the same cross-section in mm^2	0.25 ... 1.5				
Molded plastic type	PA				
• Flammability Class acc. to UL 94	V0				
Approval data (UL/cUL and CSA)					
• Rated voltage / rated current / conductor sizes					
- UL/cUL: in V/A / AWG	600 / 10 / 24 ... 16			-- / -- / 24 ... 16	
- CSA: in V/A / AWG	--				
Support rails/protective conductor busbars	--			see page 14/3, section "Support rails"	

	8WH3004-0CE07	8WH3000-0AF00 8WH3000-0AF01	8WH3003-0AF00 8WH3003-AF01	8WH3000-0CF07	8WH3003-0CF07
Dimensions					
• Width/length/cover width in mm	5.2 / 94 / 2.2	6.2 / 62.6 / 2.2	6.2 / 82.5 / 2.2	6.2 / 62.6 / 2.2	6.2 / 82.5 / 2.2
• Height (TS 35/7.5 / TS 35/15) in mm	39.3 / 46.8		42.8 / 50.3	39.3 / 46.8	42.8 / 50.3
Technical specifications acc. to IEC/DIN VDE					
• Max. load current in A / cross-section in mm^2	--	24 / 2.5		--	
• Rated impulse withstand voltage in kV / pollution degree	8 / 3				
• Overvoltage category / molded plastic group	III / I				
Conductor cross-section acc. to DIN VDE 0295					
• Core insulation	PVC / PE (other insulation types on request)				
• Solid/finely stranded H05V-U/R/K / H07V-U/R/K in mm^2	0.5 ... 1.0 / 1.5	0.5 ... 1.5 / 1.5 ... 2.5			
• Halogen-free H05Z-U/R/K / H07Z-U/R/K in mm^2	0.5 ... 1.0 / 1.5	0.5 ... 1.5 / 1.5 ... 2.5			
• Finely stranded / very finely stranded					
- (Strand ∅ ≥ 0.1 mm) in mm^2	0.25 ... 0.34	--			
- (Strand ∅ ≥ 0.19 mm) AWG	24 ... 16	20 ... 14			
Number of circuits					
• At least 100x the same cross-section in mm^2	0.25 ... 1.5	0.5 ... 2.5			
Molded plastic type	PA				
• Flammability Class acc. to UL 94	V0				
Approval data (UL/cUL and CSA)					
• Rated voltage / rated current / conductor sizes					
- UL/cUL: in V/A / AWG	-- / -- / 24 ... 16	Applied for			
- CSA: in V/A / AWG	--	Applied for			
Support rails/protective conductor busbars	see page 14/3, section "Support rails"	--		see page 14/3, section "Support rails"	

14

Minimum order quantity (PS) or a multiple thereof can be ordered.

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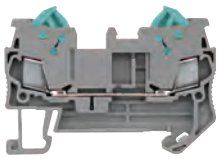
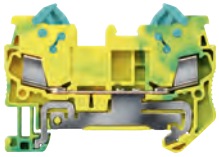
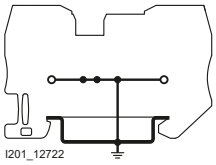
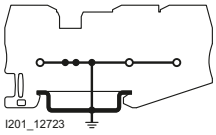
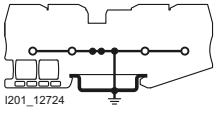
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 1.5 mm²							
 8WH3000-0AE00	**Through-type terminals, terminal size 1.5 mm²** • Terminal width 5.2 mm • Connection data - Rigid 0.25 ... 1.5 mm² - Flexible 0.25 ... 1.5 mm² - AWG 24 ... 16 - *I* = 17.5 A - *U* = 800 V • More information under *Technical specifications*						
 8WH3003-0AE00	Versions						
	• Gray						
	- Two clamping points		**8WH3000-0AE00**		1	50 units	1BT
	- Three clamping points		**8WH3003-0AE00**		1	50 units	1BT
	- Four clamping points		**8WH3004-0AE00**		1	50 units	1BT
 8WH3004-0AE00	• Blue						
	- Two clamping points		**8WH3000-0AE01**		1	50 units	1BT
	- Three clamping points		**8WH3003-0AE01**		1	50 units	1BT
	- Four clamping points		**8WH3004-0AE01**		1	50 units	1BT
	Note						
	On terminals with three and four clamping points, the total current through all connected conductors must not exceed the maximum load current.						
 8WH3000-0CE07	**PE through-type terminals, terminal size 1.5 mm²** • Green-yellow • Terminal width 5.2 mm • Connection data - Rigid 0.25 ... 1.5 mm² - Flexible 0.25 ... 1.5 mm² - AWG 24 ... 16 • More information under *Technical specifications*						
	Versions						
 I201_12722 8WH3000-0CE07	• Two clamping points		**8WH3000-0CE07**		1	50 units	1BT
	• Three clamping points		**8WH3003-0CE07**		1	50 units	1BT
	• Four clamping points		**8WH3004-0CE07**		1	50 units	1BT
 8WH3003-0CE07							
 I201_12723 8WH3003-0CE07							
 8WH3004-0CE07							
 I201_12724 8WH3004-0CE07							

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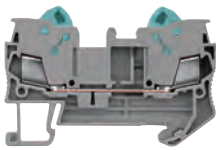
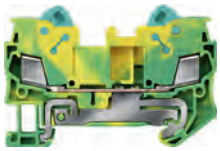
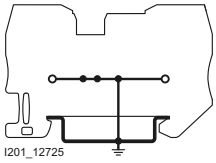
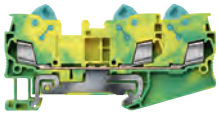
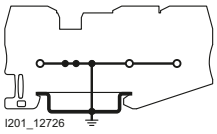
8WH through-type terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH3000-0AF00	**Through-type terminals, terminal size 2.5 mm²** • Terminal width 6.2 mm • Connection data - Rigid 0.5 ... 2.5 mm² - Flexible 0.5 ... 2.5 mm² - AWG 20 ... 14 - *I* = 24 A - *U* = 800 V						
	Versions						
 8WH3003-0AF00	• Gray - Two clamping points - Three clamping points		**8WH3000-0AF00** **8WH3003-0AF00**		1 1	50 units 50 units	1BT 1BT
	• Blue - Two clamping points - Three clamping points		**8WH3000-0AF01** **8WH3003-0AF01**		1 1	50 units 50 units	1BT 1BT
	Note						
	On terminals with three clamping points, the total current through all connected conductors must not exceed the max. load current.						
 8WH3000-0CF07	**PE through-type terminals, terminal size 2.5 mm²** • Green-yellow • Terminal width 6.2 mm • Connection data - Rigid 0.5 ... 2.5 mm² - Flexible 0.5 ... 2.5 mm² - AWG 20 ... 14						
	Versions						
 I201_12725 8WH3000-0CF07	• Two clamping points • Three clamping points		**8WH3000-0CF07** **8WH3003-0CF07**		1 1	50 units 50 units	1BT 1BT
 8WH3003-0CF07							
 I201_12726 8WH3003-0CF07							

14

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
 8WH9070-0JA00	**Compartment partitions, for terminal sizes 1.5 ... 2.5 mm²** • For visual and electrical separation of terminal groups • 2 mm thick						
	Versions						
	• Two clamping points		**8WH9070-0JA00**		100	50 units	1BT
	• Three clamping points		**8WH9070-0KA00**		100	50 units	1BT
 8WH9070-0LA00	**Compartment partitions, for terminal size 1.5 mm² and four connection points**		**8WH9070-0LA00**		100	50 units	1BT
 8WH9001-1AA00	**Covers, for terminal size 1.5 mm²** Gray						
	Versions						
	• Two clamping points		**8WH9001-1AA00**		100	50 units	1BT
	• Three clamping points		**8WH9001-2AA00**		100	50 units	1BT
	• Four clamping points		**8WH9001-4AA00**		100	50 units	1BT
 8WH9000-1AA00	**Covers, for terminal size 2.5 mm²** Gray						
	Versions						
	• Two clamping points		**8WH9000-1AA00**		100	50 units	1BT
	• Three clamping points		**8WH9000-2AA00**		100	50 units	1BT
 8WH9001-0AA00	**Cover segments, for three or four clamping points** • Gray • For covering multi-wire terminals when mounting two-wire terminals side-by-side						
	Versions						
	• For terminal size 2.5 mm²		**8WH9000-0AA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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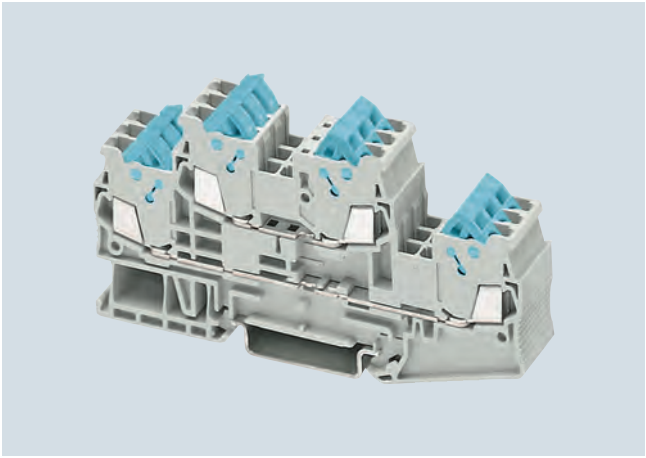
8WH two-tier terminals

Overview



Key features of the IDC two-tier terminals for terminal size 1.5 mm^2 are their ultra compact design and the double bridge shaft for each tier. This enables simultaneous bridging and testing.

With its clear and space-saving front connection arrangement, this two-tier terminal series provides additional space between the cable ducts for wiring.

The PE/ground conductor terminal of this range meets all the requirements of IEC 60 947-7-2.

These include in particular:

- Low contact resistance
- Stainless clamping points and PE mounting foot
- Green-yellow enclosure and
- Additional inscription options

The clamping points of two-tier terminals can be inscribed with flat labels.

Technical specifications

	8WH3020-0AE00 8WH3020-0AE01	**8WH3020-0CE07**
Dimensions		
• Width/length/cover width in mm	5.2 / 99.6 / 2.2	
• Height (TS 35/7.5 / TS 35/15) in mm	49.9 / 57.4	
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A / cross-section in mm^2	17.5 / 1.5	--
• Rated impulse withstand voltage in kV / pollution degree	6 / 3	
• Overvoltage category / molded plastic group	III / I	
Conductor cross-section acc. to DIN VDE 0295		
• Core insulation	PVC / PE (other insulation types on request)	
• Solid/finely stranded H05V-U/R/K / H07V-U/R/K in mm^2	0.4 ... 1.0 / 1.5	
• Halogen-free H05Z-U/R/K / H07Z-U/R/K in mm^2	0.5 ... 1.0 / 1.5	
• Finely stranded / very finely stranded		
- (Strand ∅ ≥ 0.1 mm) in mm^2	0.25 ... 0.34	
- (Strand ∅ ≥ 0.19 mm) AWG	24 ... 16	
Number of circuits		
• At least 100x the same cross-section in mm^2	0.25 ... 1.5	
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	600 / 10 / 24 ... 16	-- / -- / 24 ... 16
- CSA: in V/A / AWG	--	
Support rails/protective conductor busbars	--	see page 14/3, section "Support rails"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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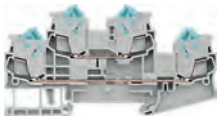
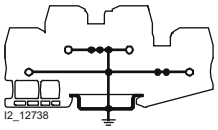
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 1.5 mm²							
 8WH3020-0AE00	**Two-tier terminals, terminal size 1.5 mm²** • Terminal width 5.2 mm • c UL us • Connection data - Rigid 0.25 ... 1.5 mm² - Flexible 0.25 ... 1.5 mm² - AWG 24 ... 16 - *I* = 17.5 A - *U* = 500 V • More information under *Technical specifications*						
	Versions						
	• Gray		**8WH3020-0AE00**		1	50 units	1BT
	• Blue		**8WH3020-0AE01**		1	50 units	1BT
 8WH3020-0CE07  8WH3020-0CE07	**PE two-tier terminals, terminal size 1.5 mm²** • Green-yellow • Terminal width 5.2 mm • c UL us • Connection data - Rigid 0.25 ... 1.5 mm² - Flexible 0.25 ... 1.5 mm² - AWG 24 ... 16 • More information under *Technical specifications*		**8WH3020-0CE07**		1	50 units	1BT
Accessories							
 8WH9070-0MA00	**Compartment partitions, for terminal size 1.5 mm²**		**8WH9070-0MA00**		100	50 units	1BT
 8WH9001-1BA00	**Covers, for terminal size 1.5 mm²**		**8WH9001-1BA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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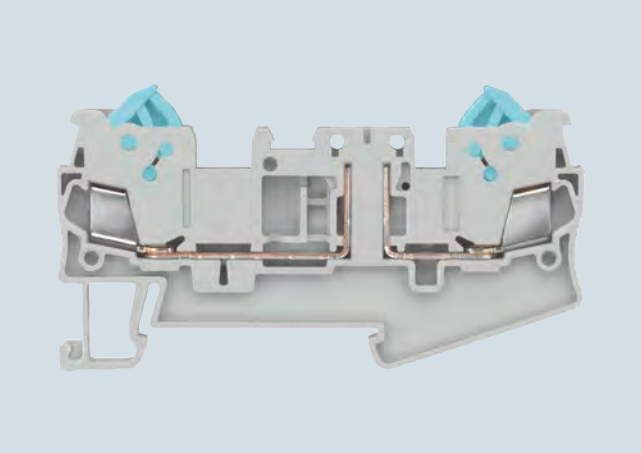
8WH isolating terminals

Overview



8WH3 isolating terminals using insulation displacement technology are available for special wiring tasks. Numerous wiring tasks can be performed on a terminal width of 5.2 mm by integrating the isolated through-type connector, the isolating plug, the component connector or the fused plug.

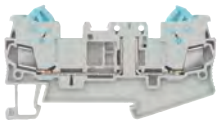
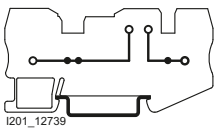
A label can be snapped on to the middle of each terminal at the front. Further labels can also be mounted flat on the side of the terminals.

The isolating element must not be replaced under load.

Technical specifications

	8WH3000-6AE00	8WH3000-6AF00
Dimensions		
• Width/length/cover width in mm	5.2 / 76.4 / 2.2	6.2 / 82.5 / 2.2
• Height (TS 35/7.5 / TS 35/15) in mm	39.3 / 46.8	42.8 / 50.3
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A / cross-section in mm^2	16 / 1.5	16 / 2.5
• Rated impulse withstand voltage in kV / pollution degree	6 / 3	
• Overvoltage category / molded plastic group	III / I	
Conductor cross-section acc. to DIN VDE 0295		
• Core insulation	PVC / PE (other insulation types on request)	
• Solid/finely stranded H05V-U/R/K / H07V-U/R/K in mm^2	0.5 ... 1.0 / 1.5	0.5 ... 1.0 / 1.5 ... 2.5
• Halogen-free H05Z-U/R/K / H07Z-U/R/K in mm^2	0.5 ... 1.0 / 1.5	0.5 ... 1.0 / 1.5 ... 2.5
• Finely stranded / very finely stranded		
- (Strand ∅ ≥ 0.1 mm) in mm^2	0.25 ... 0.34	--
- (Strand ∅ ≥ 0.19 mm) AWG	24 ... 16	20 ... 14
Number of circuits		
• At least 100x the same cross-section in mm^2	0.25 ... 1.5	0.5 ... 2.5
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	600 / 10 / 24 ... 16	Applied for
- CSA: in V/A / AWG	600 / 10 / 24 ... 16	Applied for

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 1.5 mm^2							
 8WH3000-6AE00	**Isolating terminals, terminal size 1.5 mm^2** • Gray • Terminal width 5.2 mm • c UL us • Connection data - Rigid 0.25 ... 1.5 mm^2 - Flexible 0.25 ... 1.5 mm^2 - AWG 24 ... 16 - I = 16 A - U = 400 V - Current and voltage are determined by the fitted plug • For further information, see Technical specifications		**8WH3000-6AE00**		1	50 units	1BT
 I201_12739 8WH3000-6AE00							

Minimum order quantity (PS) or a multiple thereof can be ordered.

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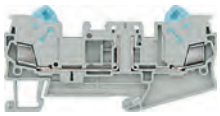
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH3000-6AF00	**Isolating terminals, terminal size 2.5 mm²** • Gray • Terminal width 6.2 mm • Connection data - Rigid 0.5 ... 2.5 mm² - Flexible 0.5 ... 2.5 mm² - AWG 20 ... 14 - *I* = 16 A - *U* = 400 V - Current and voltage are determined by the fitted plug • More information under *Technical specifications*		**8WH3000-6AF00**		1	50 units	1BT
Accessories							
 8WH9070-0KA00	**Compartment partitions, for terminal sizes 1.5 ... 2.5 mm² and three clamping points**		**8WH9070-0KA00**		100	50 units	1BT
 8WH9001-2AA00	**Covers**						
	Versions						
	• For terminal size 1.5 mm² and three clamping points		**8WH9001-2AA00**		100	50 units	1BT
	• For terminal size 2.5 mm² and three clamping points		**8WH9000-2AA00**		100	50 units	1BT
 8WH9001-0AA00	**Cover segments**						
	Versions						
	• For terminal size 1.5 mm² and three or four clamping points		**8WH9001-0AA00**		100	50 units	1BT
	• For terminal size 2.5 mm² and three or four clamping points		**8WH9000-0AA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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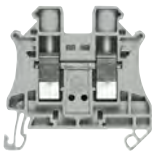
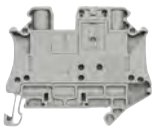
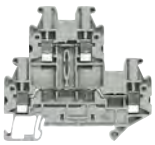
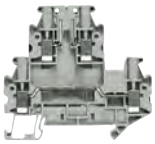
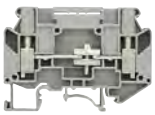
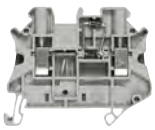
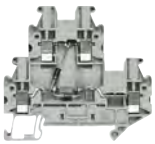
Overview

	Devices	Page	Function
	Through-type terminals	14/106	Connection of incoming and outgoing conductors up to 35 mm^2
	Fuse terminals	14/110	Terminals which can be used to protect control circuits, for example:
	Isolating blade terminals	14/112	Isolation of the circuit, e.g. for test purposes
	Isolating terminals	14/113	Isolation of the circuit, e.g. for test purposes
	Two-tier terminals	14/114	Compact form of the terminal blocks in which two connection wires can be installed
	Two-tier terminals with isolating function	14/117	Compact form of the terminal blocks in which two connection wires can be installed
	Measuring transformer terminals	14/119	Measuring transformer terminals permit clear and simple tests
	Diode terminals	14/122	Terminal blocks with integrated diodes
	Two-tier diode terminals	14/123	Terminal blocks with integrated diodes
	8WH high-current terminals	14/126	Connection of incoming and outgoing cables from 50 to 240 mm^2
	8WH shield terminals	14/130	Terminals for connection of shielded cables

Minimum order quantity (PS) or a multiple thereof can be ordered.

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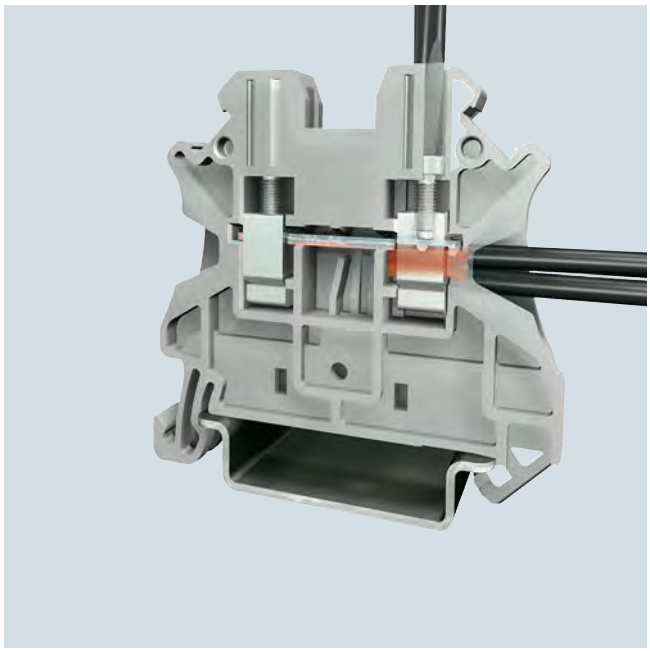
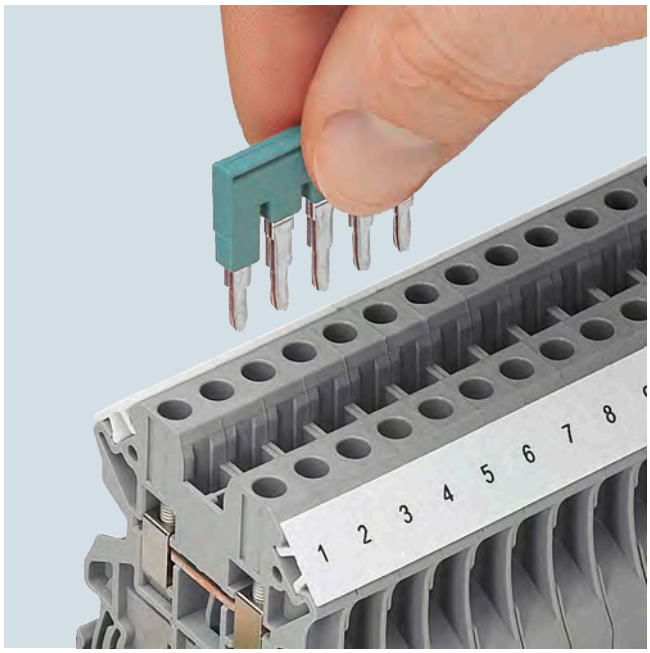
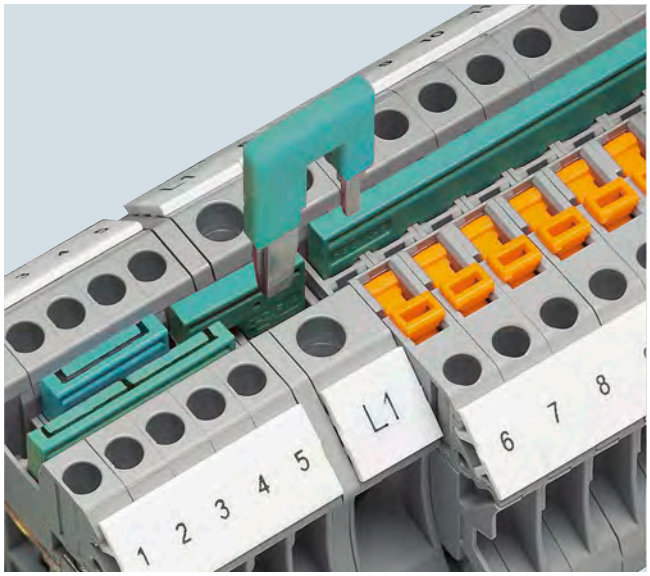
Overview



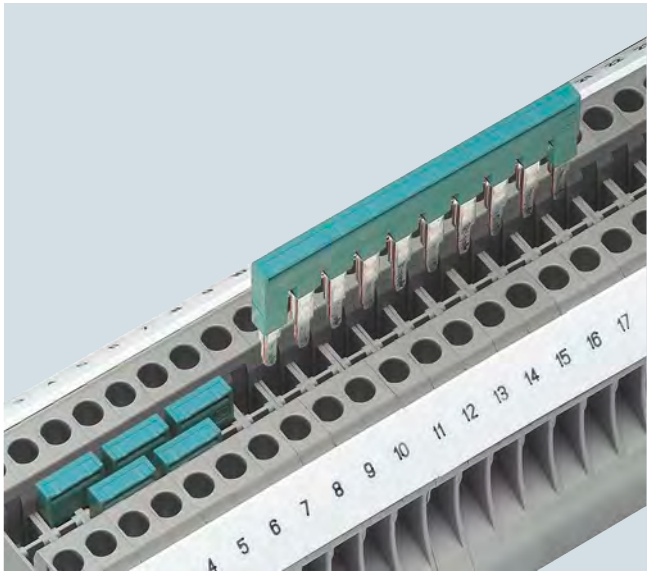
The screw terminal is characterized by its global standard, multi-conductor connection and maintenance-free design.



The potential distribution can be quickly implemented with the standardized connecting combs. Flexible chain bridging, level bridging, or skipping of several terminals are possible through two or more bridge shafts in all the terminals.



Reducing combs enable easy connection of terminals with various nominal cross-sections and terminal designs. Reducing combs can be used for the quick assembly of infeed blocks.



The double bridge shaft enables an assembly of any number of terminals with two-pole jumpers. The 2-pole to 50-pole jumpers enable up to 50 terminals to be connected in a single step.

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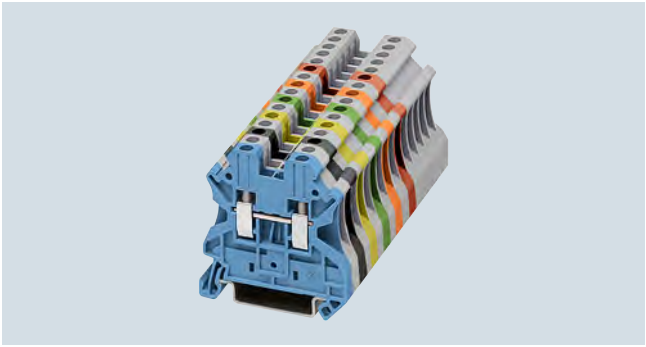
8WH through-type terminals

Overview



8WH through-type terminals are characterized by their compact design and optimum handling. They are available in conductor cross-section areas from 2.5 to 35 mm^2 and can be inscribed with labels. The double bridge shaft enables individual chain bridging by means of standard connecting combs. Corresponding accessories are available for testing and labeling. Secure electrical and mechanical contact with the support rail is established by simply snapping the terminals onto the rail.

The individual clamping points can be inscribed at the front using the labels.

Technical specifications

	8WH1000-0AF0.	8WH1000-0AG0.	8WH1000-0AH0.	8WH1000-0AJ0.	8WH1000-0AK0.	8WH1000-0AM0.
Dimensions						
• Width/length/cover width in mm	5.2 / 47.7 / 2.2	6.2 / 47.7 / 2.2	8.2 / 47.7 / 2.2	10.2 / 47.7 / 2.2	12 / 55.3 / 2.2	16 / 60.2 / --
• Height (NS 35/7.5 / NS 35/15) in mm	47.5 / 55				55 / 62.5	65.7 / 73.2
Technical specifications acc. to IEC/DIN VDE						
• Max. load current in A / cross-section in mm^2	32 / 4	41 / 6	57 / 10	76 / 16	101 / 25	150 / 50
• Rated impulse withstand voltage in kV / pollution degree	8 kV / 3					
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	1000					
• Overvoltage category / molded plastic group	III / I					
Connection capacities						
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 4	0.25 ... 6	0.5 ... 10	1.0 ... 16	1.5 ... 35
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 4	0.25 ... 6	0.5 ... 10	1.0 ... 16	1.5 ... 35
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 1.5	0.5 ... 2.5	0.5 ... 4	0.5 ... 6	0.75 ... 10	1.5 ... 10
• Rigid in mm^2	0.14 ... 4	0.14 ... 6	0.2 ... 10	0.5 ... 16	1.5 ... 25	1.5 ... 50
Stripped length in mm	9		10		14	18
Tightening torque in Nm	0.6 ... 0.8		1.5 ... 1.8		2.5 ... 3.0	3.2 ... 3.7
Molded plastic type	PA					
• Flammability Class acc. to UL 94	V0					
Approval data (UL/cUL and CSA)						
• Rated voltage / rated current / conductor sizes						
- UL/cUL: in V/A / AWG	600 / 20 / 26 ... 12	600 / 30 / 26 ... 10	600 / 50 / 24 ... 8	600 / 65 / 20 ... 6	600 / 85 / 16 ... 4	600 / 150 / 14-1/0
- CSA: in V/A / AWG	600 / 20 / 26 ... 12	600 / 30 / 26 ... 10	600 / 50 / 24 ... 8	600 / 65 / 20 ... 6	600 / 85 / 16 ... 4	600 / 150 / 14-1/0

	8WH1000-0CF07	8WH1000-0CG07	8WH1000-0CH07	8WH1000-0CJ07	8WH1000-0CK07	8WH1000-0CM07
Dimensions						
• Width/length/cover width in mm	5.2 / 47.7 / 2.2	6.2 / 47.7 / 2.2	8.2 / 47.7 / 2.2	10.2 / 47.7 / 2.2	12 / 55.3 / 2.2	16 / 60.2 / --
• Height (NS 35/7.5 / NS 35/15) in mm	47.5 / 55				55 / 62.5	65.7 / 73.2
Technical specifications acc. to IEC/DIN VDE						
• Max. load current in A / cross-section in mm^2	-- / 4	-- /6	-- /10	-- /16	101 / 25	125 / 35
• Rated impulse withstand voltage in kV / pollution degree	8 kV / 3					
• Overvoltage category / molded plastic group	III / I					
Connection capacities						
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 2.4	0.25 ... 6	0.5 ... 10	1.0 ... 16	1.5 ... 35
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 2.4	0.25 ... 6	0.5 ... 10	1.0 ... 16	1.5 ... 35
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 1.5	0.5 ... 2.5	0.5 ... 4	0.5 ... 6	0.75 ... 10	1.5 ... 10
• Rigid in mm^2	0.14 ... 4	0.14 ... 6	0.2 ... 10	0.5 ... 16	1.5 ... 25	1.5 ... 35
Stripped length in mm	9		10		14	18
Tightening torque in Nm	0.6 ... 0.8		1.6 ... 1.8	1.5 ... 1.8	2.5 ... 3.0	3.2 ... 3.7
Molded plastic type	PA					
• Flammability Class acc. to UL 94	V0					
Approval data (UL/cUL and CSA)						
• Rated voltage / rated current / conductor sizes						
- UL/cUL: in V/A / AWG	-- / -- / 26 ... 12	-- / -- / 26 ... 10	-- / -- / 24 ... 8	-- / -- / 20 ... 6	-- / -- / 16 ... 4	-- / -- / 14-1/0
- CSA: in V/A / AWG	-- / -- / 26 ... 12	-- / -- / 26 ... 10	-- / -- / 24 ... 8	-- / -- / 20 ... 6	-- / -- / 16 ... 4	-- / -- / 14-1/0

Minimum order quantity (PS) or a multiple thereof can be ordered.

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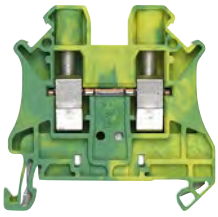
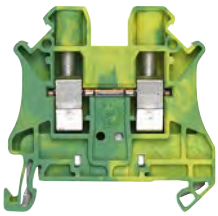
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH1000-0AF00	**Through-type terminals, terminal size 2.5 mm²** • c UL us, CSA • Terminal width 5.2 mm • I_{max} = 32 A • U_{max} = 1000 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 4 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm²						
	Versions						
	• Gray		**8WH1000-0AF00**		1	50 units	1BT
	• Blue		**8WH1000-0AF01**		1	50 units	1BT
	• Red		**8WH1000-0AF02**		1	50 units	1BT
	• Black		**8WH1000-0AF08**		1	50 units	1BT
	• Yellow		**8WH1000-0AF06**		1	50 units	1BT
	• Green		**8WH1000-0AF03**		1	50 units	1BT
	• Orange		**8WH1000-0AF04**		1	50 units	1BT
 8WH1000-0CF07	**PE through-type terminals, terminal size 2.5 mm²** • c UL us, CSA • Terminal width 5.2 mm • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 4 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • Green-yellow		**8WH1000-0CF07**		1	50 units	1BT
Terminal size 4 mm²							
 8WH1000-0AG00	**Through-type terminals, terminal size 4 mm²** • c UL us, CSA • Terminal width 6.2 mm • I_{max} = 41 A • U_{max} = 1000 V • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 6 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm²						
	Versions						
	• Gray		**8WH1000-0AG00**		1	50 units	1BT
	• Blue		**8WH1000-0AG01**		1	50 units	1BT
	• Red		**8WH1000-0AG02**		1	50 units	1BT
	• Black		**8WH1000-0AG08**		1	50 units	1BT
	• Orange		**8WH1000-0AG04**		1	50 units	1BT
 8WH1000-0CG07	**PE through-type terminals, terminal size 4 mm²** • c UL us, CSA • Terminal width 6.2 mm • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 6 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • Green-yellow		**8WH1000-0CG07**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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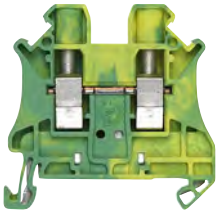
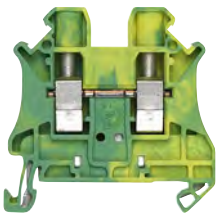
8WH through-type terminals

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal size 6 mm²							
 8WH1000-0AH00	**Through-type terminals, terminal size 6 mm²** • c UL us, CSA • Terminal width 8.2 mm • I_{max} = 57 A • U_{max} = 1000 V • AWG 24 ... 8 • Connection capacity, one conductor - Rigid 0.2 ... 10 mm² - Flexible 0.2 ... 10 mm² • Connection capacity, two conductors - Rigid 0.2 ... 2.5 mm² - Flexible 0.2 ... 2.5 mm²						
	Versions						
	• Gray		**8WH1000-0AH00**		1	50 units	1BT
	• Blue		**8WH1000-0AH01**		1	50 units	1BT
	• Red		**8WH1000-0AH02**		1	50 units	1BT
	• Black		**8WH1000-0AH08**		1	50 units	1BT
 8WH1000-0CH07	**PE through-type terminals, terminal size 6 mm²** • c UL us, CSA • Terminal width 8.2 mm • AWG 24 ... 8 • Connection capacity, one conductor - Rigid 0.2 ... 10 mm² - Flexible 0.2 ... 10 mm² • Connection capacity, two conductors - Rigid 0.2 ... 2.5 mm² - Flexible 0.2 ... 2.5 mm² • Green-yellow		**8WH1000-0CH07**		1	50 units	1BT
Terminal size 10 mm²							
 8WH1000-0AJ00	**Through-type terminals, terminal size 10 mm²** • c UL us, CSA • Terminal width 10.2 mm • I_{max} = 76 A • U_{max} = 1000 V • AWG 20 ... 6 • Connection capacity, one conductor - Rigid 0.5 ... 16 mm² - Flexible 0.5 ... 16 mm² • Connection capacity, two conductors - Rigid 0.5 ... 4 mm² - Flexible 0.5 ... 4 mm²						
	Versions						
	• Gray		**8WH1000-0AJ00**		1	50 units	1BT
	• Blue		**8WH1000-0AJ01**		1	50 units	1BT
 8WH1000-0CJ07	**PE through-type terminals, terminal size 10 mm²** • c UL us, CSA • Terminal width 10.2 mm • AWG 20 ... 6 • Connection capacity, one conductor - Rigid 0.5 ... 16 mm² - Flexible 0.5 ... 16 mm² • Connection capacity, two conductors - Rigid 0.5 ... 4 mm² - Flexible 0.5 ... 4 mm² • Green-yellow		**8WH1000-0CJ07**		1	50 units	1BT
Terminal size 16 mm²							
 8WH1000-0AK00	**Through-type terminals, terminal size 16 mm²** • c UL us, CSA • Terminal width 12.2 mm • I_{max} = 101 A • U_{max} = 1000 V • AWG 16 ... 4 • Connection capacity, one conductor - Rigid 1.5 ... 25 mm² - Flexible 1.5 ... 25 mm² • Connection capacity, two conductors - Rigid 1 ... 6 mm² - Flexible 1... 6 mm²						
	Versions						
	• Gray		**8WH1000-0AK00**		1	50 units	1BT
	• Blue		**8WH1000-0AK01**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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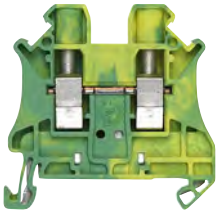
	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH1000-0CK07	**PE through-type terminals, terminal size 16 mm²** • c UL us, CSA • Terminal width 12.2 mm • AWG 16 ... 4 • Connection capacity, one conductor - Rigid 1.5 ... 25 mm² - Flexible 1.5 ... 25 mm² • Connection capacity, two conductors - Rigid 1 ... 6 mm² - Flexible 1... 6 mm² • Green-yellow		**8WH1000-0CK07**		1	50 units	1BT
Terminal size 35 mm²							
 8WH1000-0AM00	**Through-type terminals, terminal size 35 mm²** • c UL us, CSA • Terminal width 16 mm • I_{max} = 150 A • U_{max} = 1000 V • AWG 16 ... 1/0 • Connection capacity, one conductor - Rigid 1.5 ... 50 mm² - Flexible 1.5 ... 50 mm² • Connection capacity, two conductors - Rigid 1.5 ... 16 mm² - Flexible 1.5 ... 10 mm² • Enclosed at both ends						
	Versions						
	• Gray		**8WH1000-0AM00**		1	50 units	1BT
	• Blue		**8WH1000-0AM01**		1	50 units	1BT
 8WH1000-0CM07	**PE through-type terminals, terminal size 35 mm²** • c UL us, CSA • Terminal width 16 mm • AWG 16 ... 2 • Connection capacity, one conductor - Rigid 1.5 ... 35 mm² - Flexible 1.5 ... 35 mm² • Connection capacity, two conductors - Rigid 1.5 ... 16 mm² - Flexible 1.5 ... 10 mm² • Enclosed at both ends • Green-yellow		**8WH1000-0CM07**		1	50 units	1BT
Accessories							
 8WH9000-1PA00	**Covers, for through-type terminals** • 2.2 mm wide • Gray						
	Versions						
	• For terminal sizes 2.5 ... 10 mm², • For terminal size 16 mm²		**8WH9000-1PA00** **8WH9076-1PA00**		100 100	50 units 50 units	1BT 1BT
 8WH9002-8AC10	**Reducing combs, for connecting terminals, for 8WH1**						
	Versions						
	• From terminal size 6 mm² to 2.5 or 4 mm²						
	- From screw to screw		**8WH9002-8AC10**		1	10 units	1BT
	- From screw to spring		**8WH9002-8BC10**		1	10 units	1BT
	• From terminal size 10 mm² to 2.5 or 4 mm²						
	- From screw to screw		**8WH9002-8CC10**		1	10 units	1BT
	- From screw to spring		**8WH9002-8DC10**		1	10 units	1BT
	• From terminal size 16 mm² to 2.5 or 4 mm²						
	- From screw to screw		**8WH9002-8EC10**		1	10 units	1BT
	- From screw to spring		**8WH9002-8FC10**		1	10 units	1BT
	• From terminal size 35 mm² to 2.5 or 4 mm²						
	- From screw to screw		**8WH9002-8GC10**		1	10 units	1BT
	- From screw to spring		**8WH9002-8HC10**		1	10 units	1BT
	Compartment partitions, for through-type terminals, for terminal sizes 2.5 ... 10 mm², for 8WH1 • For visual and electrical separation of terminal groups • 2 mm thick		**8WH9070-6BA00**		100	50 units	1BT
 8WH9066-5BA06	**Warning covers, for 8WH1** • Lightning symbol, yellow						
	Versions						
	• For terminal size 2.5 mm², width 5.2 mm		**8WH9060-5BA06**		100	50 units	1BT
	• For terminal size 4 mm², width 6.2 mm		**8WH9063-5BA06**		100	50 units	1BT
	• For terminal size 6 mm², width 8.2 mm		**8WH9064-5BA06**		100	50 units	1BT
	• For terminal size 10 mm², width 10.2 mm		**8WH9065-5BA06**		100	50 units	1BT
	• For terminal size 16 mm², width 12.2 mm		**8WH9066-5BA06**		100	50 units	1BT
	• For terminal size 35 mm², width 16 mm		**8WH9067-5BA06**		100	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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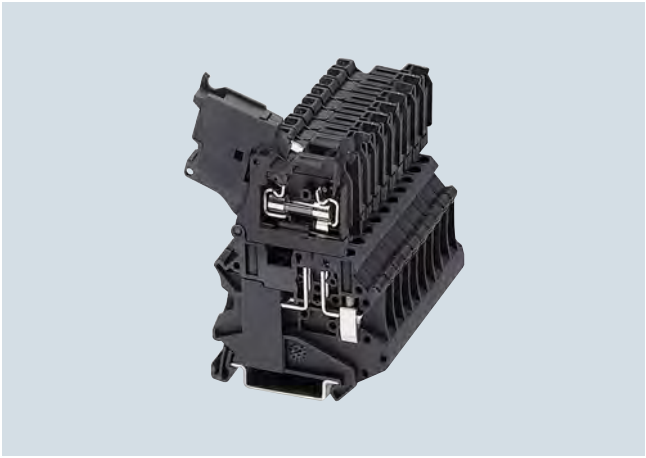
8WH fuse terminals

Overview



The 8WH fuse terminals adopt the function of the fuse holders for 5 × 20 mm and 6.3 × 32 mm G fuse links and all potential distribution tasks with the double bridge shaft.

The individual clamping points can be inscribed at the front using labels.

Fuses must not be replaced under load.

Technical specifications

	8WH1000-1GG08	8WH1000-1KG38	8WH1000-1MG88	8WH1000-1HH08	8WH1000-1PH38
Dimensions					
• Width/length/cover width in mm	6.2 / 57.8 / --			8.2 / 57.8 / --	
• Height (NS 35/7.5 / NS 35/15) in mm	73 / 80.5				
Technical specifications acc. to IEC/DIN VDE					
• Max. load current in A[1] / cross-section in mm^2	6.3 / 6			10 / 10	
• Rated impulse withstand voltage in kV / pollution degree	6 kV / 3	4 kV / 3		8 kV / 3	6 kV / 3
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500			630	
• Overvoltage category / molded plastic group	III / I				
Connection capacities					
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 4			0.25 ... 6	
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 4			0.25 ... 6	
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 2.5			0.5 ... 4	
• Rigid in mm^2	0.14 ... 6			0.2 ... 10	
Stripped length in mm	9			10	
Tightening torque in Nm	0.6 ... 0.8			1.5 ... 1.8	
Molded plastic type	PA				
• Flammability Class acc. to UL 94	V0				
Approval data (UL/cUL and CSA)					
• Rated voltage / rated current / conductor sizes					
- UL/cUL: in V/A / AWG	600 / 6.3 / 26 ... 10			600 / 16 / 24 ... 8	
- CSA: in V/A / AWG	600 / 6.3 / 26 ... 10			-- / -- / --	

[1] Please note the maximum power loss.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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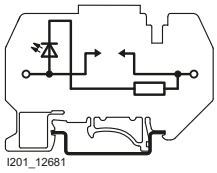
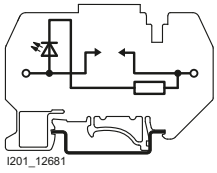
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm²							
 8WH1000-1GG08	**Fuse terminals, terminal size 4 mm², for G fuse links 5 x 20 mm** • cULus • Terminal width 6.2 mm • I_{max} = 6.3 A • U_{max} = 500 V • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 6 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • Enclosed at both ends • Black						
 I201_12681 8WH1000-1MG88	Versions • Without LED • With LED 10 ... 30 V AC/DC • With LED 110 ... 250 V AC/DC		**8WH1000-1GG08** **8WH1000-1KG38** **8WH1000-1MG88**		1 50 units 1 50 units 1 50 units		1BT 1BT 1BT
Terminal size 6 mm²							
 8WH1000-1HH08	**Fuse terminals, terminal size 6 mm², for G fuse links 6.3 x 32 mm (inch fuses)** • cULus • Terminal width 8.2 mm • I_{max} = 10 A • U_{max} = 630 V • AWG 24 ... 8 • Connection capacity, one conductor - Rigid 0.2 ... 10 mm² - Flexible 0.2 ... 10 mm² • Connection capacity, two conductors - Rigid 0.2 ... 2.5 mm² - Flexible 0.2 ... 2.5 mm² • Enclosed at both ends • Black						
 I201_12681 8WH1000-1PH38	Versions • Without LED • With LED 12 ... 30 V AC/DC		**8WH1000-1HH08** **8WH1000-1PH38**		1 50 units 1 50 units		1BT 1BT
Accessories							
 8WH9002-8AC10	**Reducing combs, for connecting terminals, from terminal size 6 mm² to 2.5 or 4 mm², from screw to screw**		**8WH9002-8AC10**		1 10 units		1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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8WH isolating blade terminals

Overview



Key features of the 8WH isolating blade terminals are their slim design and high current carrying capacity of 20 A. They can be bridged with standard terminal jumpers over the double bridge shaft.

The individual clamping points can be inscribed at the front using labels.

The isolating element must not be replaced under load.

Technical specifications

	8WH1000-6CG00
Dimensions	
• Width/length/cover width in mm	6.2 / 57.8 / --
• Height (NS 35/7.5 / NS 35/15) in mm	49.1 / 56.6
Technical specifications acc. to IEC/DIN VDE	
• Max. load current in A / cross-section in mm^2	20 / 6
• Rated impulse withstand voltage in kV / pollution degree	6 kV / 3
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500
• Overvoltage category / molded plastic group	III / I
Connection capacities	
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 4
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 4
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 2.5
• Rigid in mm^2	0.14 ... 6
Stripped length in mm	9
Tightening torque in Nm	0.6 ... 0.8
Molded plastic type	PA
• Flammability Class acc. to UL 94	V0
Approval data (UL/cUL and CSA)	
• Rated voltage / rated current / conductor sizes	
- UL/cUL: in V/A / AWG	600 / 16 / 26 ... 10
- CSA: in V/A / AWG	600 / 16 / 26 ... 10

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm^2							
 8WH1000-6CG00	**Isolating blade terminals, terminal size 4 mm^2** • cULus • Terminal width 6.2 mm • I_{max} = 20 A • U_{max} = 500 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm^2 - Flexible 0.14 ... 4 mm^2 • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm^2 - Flexible 0.14 ... 1.5 mm^2 • Enclosed at both ends • Gray		**8WH1000-6CG00**		1	50 units	1BT
Accessories							
	Warning covers, for terminal size 4 mm^2 • Lightning symbol • Width 6.2 mm • Yellow		**8WH9063-5BA06**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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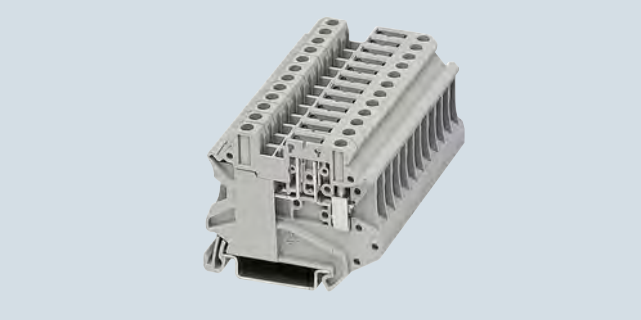
Overview



8WH isolating terminals serve for mounting various function plugs.

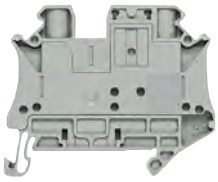
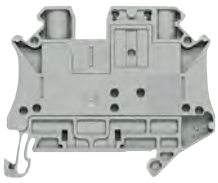
The individual clamping points can be inscribed at the front using labels.

The isolating element must not be replaced under load.

Technical specifications

	8WH1000-6AG00	8WH1000-6AH00
Dimensions		
• Width/length/cover width in mm	6.2 / 57.8 / --	
• Height (NS 35/7.5 / NS 35/15) in mm	49.1 / 56.6	73 / 80.5
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A / cross-section in mm^2	20 / 6	20 / 10
• Rated impulse withstand voltage in kV / pollution degree	6 kV / 3	
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500	
• Overvoltage category / molded plastic group	III / I	
Connection capacities		
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 4	0.26 ... 6
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 4	0.26 ... 6
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 2.5	0.5 ... 4
• Rigid in mm^2	0.14 ... 6	0.2 ... 10
Stripped length in mm	9	10
Tightening torque in Nm	0.6 ... 0.8	1.5 ... 1.8
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	600 / 16 / 26 ... 10	-- / -- / --
- CSA: in V/A / AWG	600 / 16 / 26 ... 10	-- / -- / --

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm^2							
 8WH1000-6AG00	**Isolating terminal, terminal size 4 mm^2** • c UL us • Terminal width 6.2 mm • I_{max} = 20 A • U_{max} = 400 V • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm^2 - Flexible 0.14 ... 6 mm^2 • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm^2 - Flexible 0.14 ... 1.5 mm^2 • Enclosed at both ends • Gray		**8WH1000-6AG00**		1	50 units	1BT
Terminal size 6 mm^2							
 8WH1000-6AH00	**Isolating terminal, terminal size 6 mm^2** • c UL us • Terminal width 8.2 mm • I_{max} = 20 A • U_{max} = 500 V • AWG 24 ... 8 • Connection capacity, one conductor - Rigid 0.2 ... 10 mm^2 - Flexible 0.2 ... 10 mm^2 • Connection capacity, two conductors - Rigid 0.2 ... 2.5 mm^2 - Flexible 0.2 ... 2.5 mm^2 • Enclosed at both ends • Gray		**8WH1000-6AH00**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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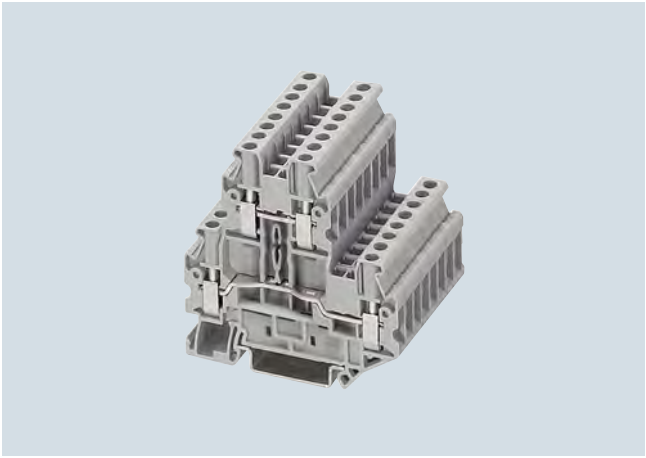
8WH two-tier terminals

Overview



The compact 8WH1 two-tier terminal is available in the nominal cross-sections 2.5 and 4 mm^2. The voltage levels routed in a 5.2 mm or 6.2 mm grid through two tiers reduce the space required in the control cabinet by a further 50%. Two integral bridge shafts per tier and two facilities for large inscriptions of all clamping points are provided.

With 8WH1025 two-tier terminals the upper and lower level are connected.

The tier offset on the 8WH two-tier terminals allows for excellent access to the lower level, even when fully wired. Spacer plates can be used to compensate for the tier offset if other terminals are mounted side by side.

The clamping points of the 8WH1 two-tier terminals can be inscribed at the front using the labels.

Technical specifications

	8WH1020-0AF00 8WH1020-0AF01	8WH1020-0AG00 8WH1020-0AG01	8WH1020-0CF07	8WH1020-0CG07
Dimensions				
• Width/length/cover width in mm	5.2 / 69.9 / 2.2	6.2 / 69.9 / 2.2	5.2 / 69.9 / 2.2	6.2 / 69.9 / 2.2
• Height (NS 35/7.5 / NS 35/15) in mm	65 / 72.5			
Technical specifications acc. to IEC/DIN VDE				
• Max. load current in A / cross-section in mm^2	28 / 4	36 / 6	-- / 4	-- / 6
• Rated impulse withstand voltage in kV / pollution degree	6 kV / 3	8 kV / 3		
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500	800	--	
• Overvoltage category / molded plastic group	III / I			
Connection capacities				
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 4	0.25 ... 2.5	0.25 ... 4
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 4	0.25 ... 2.5	0.25 ... 4
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 1.5	0.5 ... 2.5	0.5 ... 1.5	0.5 ... 2.5
• Rigid in mm^2	0.14 ... 4	0.14 ... 6	0.14 ... 4	0.14 ... 6
Stripped length in mm	9			
Tightening torque in Nm	0.5 ... 0.6	0.6 ... 0.8	0.5 ... 0.6	0.6 ... 0.8
Molded plastic type	PA			
• Flammability Class acc. to UL 94	V0			
Approval data (UL/cUL and CSA)				
• Rated voltage / rated current / conductor sizes				
- UL/cUL: in V/A / AWG	600 / 20 / 26 ... 12	600 / 30 / 26 ... 12	-- / -- / 26 ... 12	-- / -- / 26 ... 10
- CSA: in V/A / AWG	-- / -- / --			

	8WH1025-0AF00	8WH1025-0AG00
Dimensions		
• Width/length/cover width in mm	6.2 / 69.9 / 2.2	
• Height (NS 35/7.5 / NS 35/15) in mm	65 / 72.5	
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A / cross-section in mm^2	28 / 4	36 / 6
• Rated impulse withstand voltage in kV / pollution degree	6 kV / 3	8 kV / 3
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500	
• Overvoltage category / molded plastic group	III / I	
Connection capacities		
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 4
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5	0.25 ... 4
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 1.5	0.5 ... 2.5
• Rigid in mm^2	0.14 ... 4	0.14 ... 6
Stripped length in mm	9	
Tightening torque in Nm	0.5 ... 0.6	0.6 ... 0.8
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	600 / 20 / 26 ... 12	600 / 30 / 26 ... 10
- CSA: in V/A / AWG	-- / -- / --	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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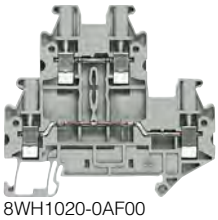
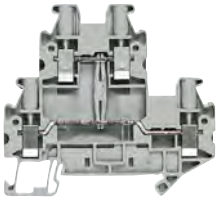
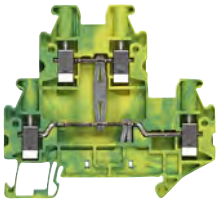
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 2.5 mm²							
 8WH1020-0AF00  8WH1025-0AF00	**Two-tier terminals, terminal size 2.5 mm²** • cULus • Terminal width 5.2 mm • I_{max} = 28 A • U_{max} = 500 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 4 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm²						
	Versions						
	• Gray						
	- Without equipotential bonding		**8WH1020-0AF00**		1	50 units	1BT
	- With equipotential bonding		**8WH1025-0AF00**		1	50 units	1BT
	• Blue						
	- Without equipotential bonding		**8WH1020-0AF01**		1	50 units	1BT
 8WH1020-0CF07	**PE two-tier terminals, terminal size 2.5 mm²** • cULus • Terminal width 5.2 mm • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 4 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • Green-yellow		**8WH1020-0CF07**		1	50 units	1BT

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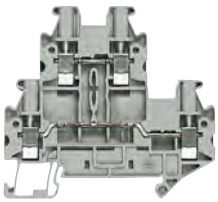
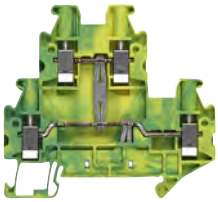
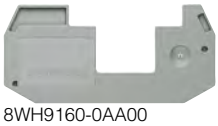
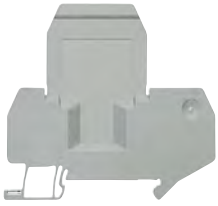
8WH two-tier terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm²							
 8WH1020-0AG00	**Two-tier terminals, terminal size 4 mm²** • cULus • Terminal width 6.2 mm • I_{max} = 36 A • U_{max} = 800 V • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 6 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm²						
	Versions						
	• Gray						
	- Without equipotential bonding		**8WH1020-0AG00**		1	50 units	1BT
	- With equipotential bonding		**8WH1025-0AG00**		1	50 units	1BT
	• Blue						
	- Without equipotential bonding		**8WH1020-0AG01**		1	50 units	1BT
 8WH1020-0CG07	**PE two-tier terminals, terminal size 4 mm²** • cULus • Terminal width 6.2 mm • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 6 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • Green-yellow		**8WH1020-0CG07**		1	50 units	1BT
Accessories							
 8WH9000-1QA00	**Covers, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • Width 2.2 mm • Gray		**8WH9000-1QA00**		100	100 units	1BT
 8WH9160-0AA00	**Spacer plates, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • Compensates for tier offset if other terminals are mounted side by side • 2.5 mm thick • Gray		**8WH9160-0AA00**		100	50 units	1BT
 8WH9070-6FA00	**Compartment partitions, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • For visual and electrical separation of terminal groups • 2 mm thick • Gray		**8WH9070-6FA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



Two-tier terminals with isolating function/isolating blades are also available with the same contour as 8WH1 two-tier terminals.

An increasing number of contact points need to be wired in the same space in the signal wiring. The two voltage levels routed through two separate tiers require 50% less space than equivalent single-tier terminals.

To implement a wide range of wiring tasks, particularly in measuring and control technology, an isolating blade or an isolating plug, a component plug or a fused plug for 5 × 20 mm glass tube fuses can be used in the standardized separation zone in the upper tier.

The looping of measuring devices is possible over the terminal screws with integrated test socket so that voltage and current measurements can be performed on both tiers without interruption. The tier offset makes access to the lower tier much easier.

The clamping points of two-tier terminals can be inscribed at the front using the labels.

The isolating element must not be replaced under load.

Technical specifications

	8WH1020-6AC00	8WH1020-6AG00
Dimensions		
• Width/length/cover width in mm	6.2 / 69.9 / 2.2	
• Height (NS 35/7.5 / NS 35/15) in mm	65 / 72.5	
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A / cross-section in mm^2	38[1] / 6	
• Rated impulse withstand voltage in kV / pollution degree	6 kV / 3	
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500	
• Overvoltage category / molded plastic group	III / I	
Connection capacities		
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 4	
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 4	
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 2.5	
• Rigid in mm^2	0.14 ... 6	
Stripped length in mm	9	
Tightening torque in Nm	0.6 ... 0.8	
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	600 / 5 / 26 ... 10	
- CSA: in V/A / AWG	-- / -- / --	

[1] Bottom level

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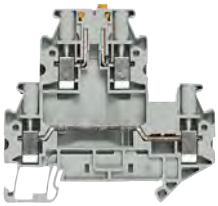
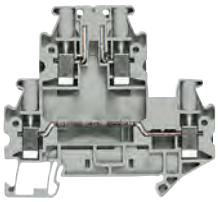
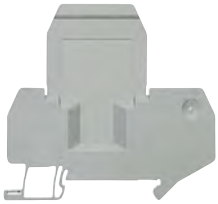
8WH two-tier terminals with isolating function/isolating blade

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm²							
 8WH1020-6AC00	**Two-tier terminals, with isolating function/isolating blade, terminal size 4 mm²** • c UL us • Terminal width 6.2 mm • I_{max} = 38 A • U_{max} = 500 V • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm² - Flexible 0.14 ... 6 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm²						
 8WH1020-6AG00	Versions						
	• Isolating blades in the upper tier		**8WH1020-6AC00**		1	50 units	1BT
	• Isolating terminal in the upper tier		**8WH1020-6AG00**		1	50 units	1BT
Accessories							
 8WH9000-1QA00	**Covers, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • Width 2.2 mm • Gray		**8WH9000-1QA00**		100	100 units	1BT
 8WH9160-0AA00	**Spacer plates, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • Compensates for tier offset if other terminals are mounted side by side • 2.5 mm thick • Gray		**8WH9160-0AA00**		100	50 units	1BT
 8WH9070-6FA00	**Compartment partitions, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • For visual and electrical separation of terminal groups • 2 mm thick • Gray		**8WH9070-6FA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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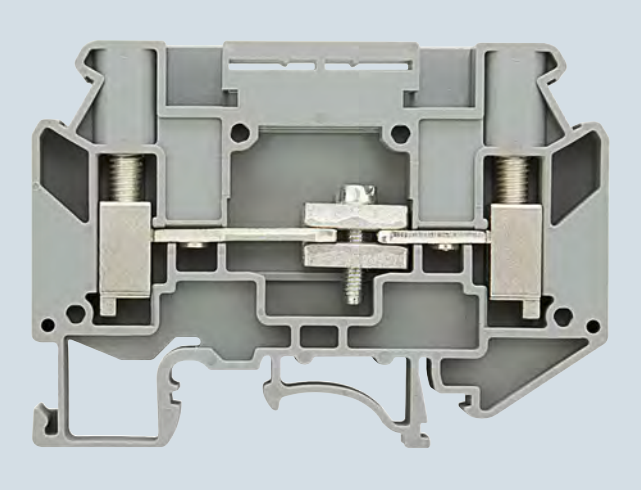
Overview



Measuring transformer terminals can be used for testing and isolating circuits without interrupting operation. In this way, they permit easy and transparent maintenance and commissioning.

The isolating and instrument isolating terminals contain an isolating device in the through-type connection. The isolating device permits electrical separation between the input and output of a terminal. Test sockets can be screwed into the front side of the through-type and isolating terminals.

Two adjacent terminals can be connected in parallel with the disconnecting link. The disconnecting link can be operated in any position of the isolating device. Two labels can be snapped on to the side of each terminal at the front.

The isolating element must not be replaced under load.

Instrument set for one transformer

The instrument set for one transformer makes the basic circuit of the transformer terminal blocks clear. This basic circuit is also included in much larger instrument sets, which is extended by adding on equivalent circuits. Links between the basic circuits provide many kinds of testing facilities, parallel outgoing lines to other measuring devices, connection of test equipment, etc.

Instrument set for three transformers

The simplest version of an instrument set for a three-phase circuit consists of three basic circuits strung together without any continuing links.

Instrument set for three transformers with neutral point

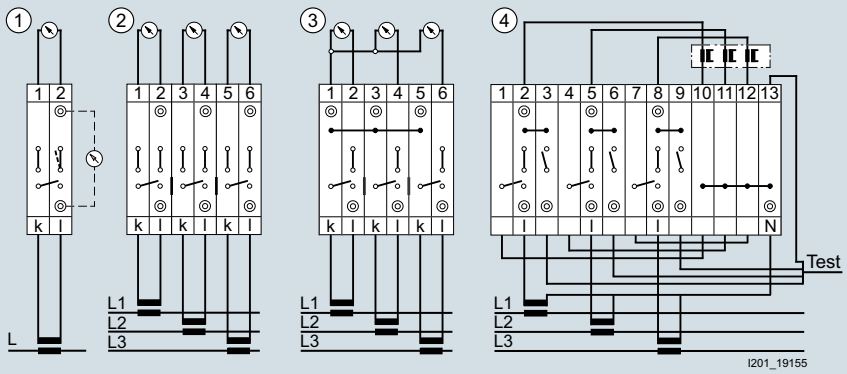
The instrument set with a neutral point is an extension of the previous circuit. Four instead of six cables are sufficient for connecting it with the measuring devices. The neutral point is produced on the measuring instruments on the one hand, and using a shortened 8WH9021-0AL00 connection bar on the other.

Note

The 8WH1000-7BH00 through-type terminals and their associated disconnecting links enable terminal sets for current transformers to be configured much more easily. Instead of the 12 isolating or instrument isolating terminals used previously, only 3 instrument isolating terminals and 3 through-type terminals now have to be used.

Instrument set with test facility

This instrument set represents a significant enhancement over previous types. In normal operation, terminals 2, 5 and 8 are closed. For testing a measuring instrument (e.g. a plotter), these terminals are opened and terminals 3, 6 and 9 are closed in order to feed in a test signal. The transformers first have to be short-circuited with the disconnecting links between terminals 1-2, 4-5 and 7-8. Wire jumpers connect terminals 1, 4 and 7 with the neutral point that is formed in terminals 10, 11, 12 and 13 with a shortened jumper 8WH9021-0AL00.



Test socket
Jumper, 10 pole, 8WH9021-0AL00 (separable)
Disconnecting link (closed)

(1) Instrument set for 1 transformer
(2) Instrument set for 3 transformers
(3) Instrument set for 3 transformers with neutral point
(4) Instrument set with testing facility

Type	Number required for:			
	(1)	(2)	(3)	(4)
8WH1000-7BH00	--	--	3	7
8WH1000-7AH00	2	6	3	6
8WH9021-0AL00 (sep.)	--	--	1	1
Jumper 2-pole/ colored test socket				
8WH8021-0AC00	1	3	3	3
8WH9010-0MB03	2	2	2	3
-0MB11	--	2	2	3
-0MB06	--	2	2	3

Connection option for measuring transformer terminals (instrument sets)

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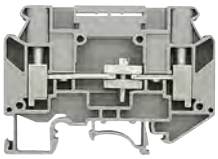
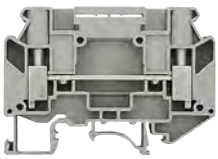
8WH measuring transformer terminals

Technical specifications

	8WH1000-7AH00	8WH1000-7BH00
Dimensions		
• Width/length/cover width in mm	8.2 / 66.5 / 2.2	
• Height (NS 35/7.5 / NS 35/15) in mm	48	
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A / cross-section in mm^2	57/ 10 mm^2	57/ 10 mm^2
• Rated uninterrupted current in A	41	41
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500	800
Connection capacities		
• Flexible with end sleeve, with plastic sleeve in mm^2	0.5 ... 6	0.5 ... 6
• Flexible with end sleeve, without plastic sleeve in mm^2	0.5 ... 6	0.5 ... 6
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 6	0.5 ... 6
• Rigid in mm^2	0.5 ... 10	0.5 ... 10
Stripped length in mm	10	10
Tightening torque in Nm	1.5 ... 1.6	1.5 ... 1.6
Flammability Class acc. to UL 94	V0	

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • With thermoplastic insulating body • Screw terminals at both ends and 2 recesses for screwing in the test adapters						
	Note: For labeling accessories, see ... — Section: Accessories — Page: 14/135						
Terminal size 6 mm^2							
 8WH1000-7AH00	**Measuring transformer isolating terminals, terminal size 6 mm^2** • Rated uninterrupted current 41 A • Rated insulation voltage 500 V • Mounting width 8.2 mm • Disconnect slide tightening torque 0.6 ... 0.8 Nm		**8WH1000-7AH00**		1	50 units	1BT
 8WH1000-7BH00	**Measuring transformer through-type terminals, terminal size 6 mm^2** • Rated uninterrupted current 41 A • Rated insulation voltage 800 V • Mounting width 8.2 mm		**8WH1000-7BH00**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Accessories							
 8WH9000-3UA00	**Covers, for measuring transformer terminals, size 6 mm²** • Width 2.2 mm • Gray		**8WH9000-3UA00**		100	50 units	1BT
 8WH9021-0AC00	**Disconnecting links, 2-pole** • For bridging two adjacent terminals • Cannot be used with the bare 8WH9010-0MB12 test socket • Tightening torque: 0.6 ... 0.8 Nm		**8WH9021-0AC00**		1	10 units	1BT
 8WH9021-0AL00	**Connecting combs, 10-pole (separable)** • Consisting of connecting wire, spacer sleeves and screws • For bridging terminals, the connecting wire is adjustable • Tightening torque: 0.6 ... 0.8 Nm • Cannot be used with the bare 8WH9010-0MB12 test socket		**8WH9021-0AL00**		1	10 units	1BT
 8WH9010-0MB03	**Test sockets, green** • For screwing into the measuring transformer terminals • Tightening torque: 0.6 ... 0.8 Nm • The 8WH9021-0AC00 disconnecting link shall be used for short-circuiting adjacent terminals.		**8WH9010-0MB03**		1	10 units	1BT
 8WH9010-0MB11	**Test sockets, violet** • For screwing into the measuring transformer terminals. • Tightening torque: 0.6 ... 0.8 Nm • The 8WH9021-0AC00 disconnecting link shall be used for short-circuiting adjacent terminals.		**8WH9010-0MB11**		1	10 units	1BT
 8WH9010-0MB06	**Test sockets, yellow** • For screwing into the measuring transformer terminals. • Tightening torque: 0.6 ... 0.8 Nm • The 8WH9021-0AC00 disconnecting link shall be used for short-circuiting adjacent terminals.		**8WH9010-0MB06**		1	10 units	1BT
 8WH9010-0MB12	**Test sockets, bare** • For screwing into the measuring transformer terminals • For simple transformer measurements • Tightening torque: 0.6 ... 0.8 Nm • For tapping with test plug • The 8WH9010-0BC08 short-circuiting plug shall be used for short-circuiting adjacent terminals.		**8WH9010-0MB12**		1	10 units	1BT
 8WH9010-0BC08	**Short-circuiting plugs, 2-pin** • For short-circuiting adjacent terminals • For simple transformer measurements • Tightening torque: 0.6 ... 0.8 Nm • Required when the bare 8WH9010-0MB12 test adapter is used in the measuring transformer terminal • Totally insulated • I_{max} = 20 A		**8WH9010-0BC08**		1	10 units	1BT

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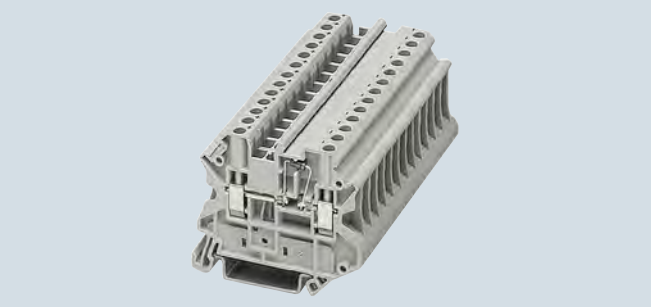
8WH diode terminals

Overview



8WH diode terminals can be used to implement many different wiring tasks. The 1N 4007 diode is soldered in from left to right or vice versa as required. The double bridge shaft allows for combination with all standard and function terminals.

The 8WH diode terminals have the same contour as the 8WH isolating, isolating blade and fuse terminals. This has the advantage of enabling consistent inscriptions on all clamping points. Secure electrical and mechanical contact with the support rail is assured by simply snapping the terminals onto the rail.

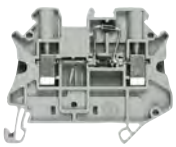
The clamping points of diode terminals can be inscribed at the front using the labels.

Technical specifications

	8WH1000-6KG00	8WH1000-6LG00
Dimensions		
• Width/length/cover width in mm	6.2 / 57.8 / 2.2	
• Height (NS 35/7.5 / NS 35/15) in mm	47.5 / 55	
Technical specifications acc. to IEC/DIN VDE		
• Max. load current in A[1] / cross-section in mm²	-- / 6	
• Rated impulse withstand voltage in kV / pollution degree	8 kV / 3	
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	800	
• Overvoltage category / molded plastic group	III / I	
Connection capacities		
• Flexible with end sleeve, with plastic sleeve in mm²	0.25 ... 4	
• Flexible with end sleeve, without plastic sleeve in mm²	0.25 ... 4	
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm²	0.5 ... 2.5	
• Rigid in mm²	0.14 ... 6	
Stripped length in mm	9	
Tightening torque in Nm	0.6 ... 0.8	
Molded plastic type	PA	
• Flammability Class acc. to UL 94	V0	
Approval data (UL/cUL and CSA)		
• Rated voltage / rated current / conductor sizes		
- UL/cUL: in V/A / AWG	600 / 1 / 26 ... 10	600 / 1 / 26 ... 10
- CSA: in V/A / AWG	600 / 1 / 26 ... 10	600 / 1 / 26 ... 10

[1] Maximum current determined by diode. A 1N 4007 diode is integrated, blocking voltage: 1300 V, max. average on-state current: 0.5 A

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 4 mm²							
 8WH1000-6KG00	**Diode terminals, terminal size 4 mm², gray,** • Terminal width 6.2 mm • I_{max} = 0.5 A, U_{max} = 800 V • AWG 26 ... 10 • Connection capacity, one conductor - Rigid 0.14 ... 6 mm², flexible 0.14 ... 6 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm², flexible 0.14 ... 1.5 mm² • With integrated diode: 1N 4007						
	Versions						
	• Let-through from left to right		**8WH1000-6LG00**		1	50 units	1BT
	• Let-through from right to left		**8WH1000-6KG00**		1	50 units	1BT
Accessories							
 8WH9000-2PA00	**Covers, for diode terminals, for terminal sizes 2.5 ... 4 mm²** • Width 2.2 mm • Gray		**8WH9000-2PA00**		100	50 units	1BT
	Warning covers, for terminal size 4 mm² • Lightning symbol, yellow		**8WH9063-5BA06**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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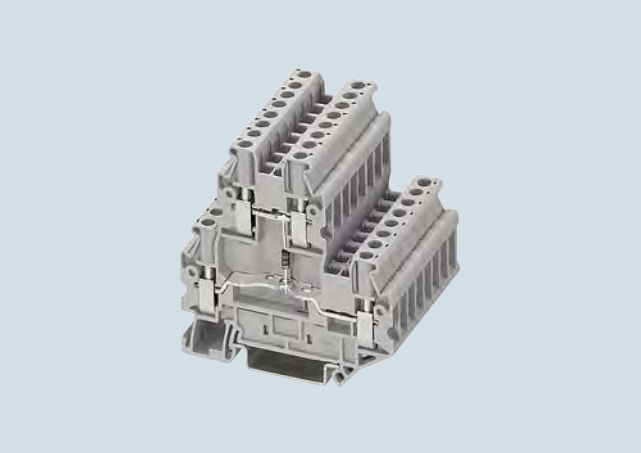
Overview



8WH two-tier diode terminals with a width of only 5.2 mm can be used to implement many different wiring tasks. This makes the following possible in the narrowest of spaces:

- Freewheel diode circuits
- Lamp test circuits
- Signaling and fault signaling circuits

The clamping points of the 8WH1 two-tier diode terminals can be inscribed at the front using the labels.

Technical specifications

	8WH1020-5AF00, 8WH1020-5BF00, 8WH1020-5DF00, 8WH1020-5FF00, 8WH1020-5HF00, 8WH1020-5JF30, 8WH1020-5LF00
Dimensions	
• Width/length/cover width in mm	5.2 / 69.9 / 2.2
• Height (NS 35/7.5 / NS 35/15) in mm	65 / 72.5
Technical specifications acc. to IEC/DIN VDE	
• Max. load current in A[1] / cross-section in mm^2	28 / 4
• Rated impulse withstand voltage in kV / pollution degree	6 kV / 3
• Rated insulation voltage U_i in V acc. to IEC 60497-7-1	500
• Overvoltage category / molded plastic group	III / I
Connection capacities	
• Flexible with end sleeve, with plastic sleeve in mm^2	0.25 ... 2.5
• Flexible with end sleeve, without plastic sleeve in mm^2	0.25 ... 2.5
• Flexible with two-wire connection end sleeve, with plastic sleeve in mm^2	0.5 ... 1.5
• Rigid in mm^2	0.14 ... 4
Stripped length in mm	9
Tightening torque in Nm	0.5 ... 0.6
Molded plastic type	PA
• Flammability Class acc. to UL 94	V0
Approval data (UL/cUL and CSA)	
• Rated voltage / rated current / conductor sizes	
- UL/cUL: in V/A / AWG	-- / -- / --
- CSA: in V/A / AWG	-- / -- / --

[1] Maximum current determined by diode.
Integrated: diode 1N 4007, blocking voltage: 1300 V
Max. average on-state current: 0.5 A

Minimum order quantity (PS) or a multiple thereof can be ordered.

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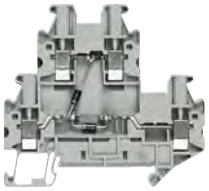
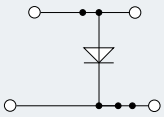
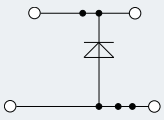
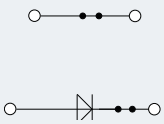
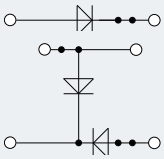
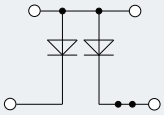
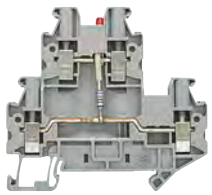
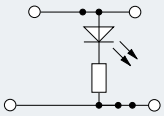
Selection and ordering data

	Version		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
Terminal size 2.5 mm²								
 8WH1020-5FF00	**Two-tier diode terminals, terminal size 2.5 mm²** • c UL us • Terminal width 5.2 mm • I_{max} = 28 A, through the diode 0.5 A • U_{max} = 500 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 4 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • With integrated diode: 1N 4007 • Gray							
Circuit diagram	Version							
	• With one integrated 1N 4007 diode • Let-through from top to bottom			**8WH1020-5AF00**		1	50 units	1BT
	• With one integrated 1N 4007 diode • Let-through from bottom to top			**8WH1020-5BF00**		1	50 units	1BT
	• With one integrated 1N 4007 diode • Let-through from bottom left to bottom right			**8WH1020-5DF00**		1	50 units	1BT
	• With two integrated 1N 4007 diodes • Let-through from top to bottom left and from bottom right to bottom left			**8WH1020-5FF00**		1	50 units	1BT
	• With two integrated 1N 4007 diodes • Let-through from top to bottom left and from top to bottom right			**8WH1020-5HF00**		1	50 units	1BT
 8WH1020-5JF30	**Two-tier terminals with LED 24 V DC, terminal size 2.5 mm²** For checking whether voltage is present • c UL us • Terminal width 5.2 mm • I_{max} = 28 A, through the diode 0.5 A • U_{max} = 500 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 4 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • With integrated diode: 1N 4007 • Gray							
Circuit diagram								
				**8WH1020-5JF30**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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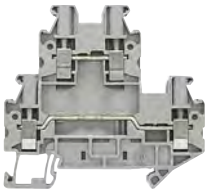
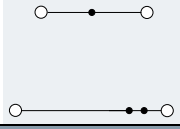
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WH1020-5FL00	**Two-tier terminals for soldering of components, terminal size 2.5 mm²** Supplied without components; the appropriate components (resistors, diodes, capacitors, ...) are to be soldered in by user • c UL us • Terminal width 5.2 mm • I_{max} = 28 A, through the diode 0.5 A • U_{max} = 500 V • AWG 26 ... 12 • Connection capacity, one conductor - Rigid 0.14 ... 4 mm² - Flexible 0.14 ... 4 mm² • Connection capacity, two conductors - Rigid 0.14 ... 1.5 mm² - Flexible 0.14 ... 1.5 mm² • With integrated diode: 1N 4007 • Gray Circuit diagram 		**8WH1020-5LF00**		1	50 units	1BT
Accessories							
 8WH9000-1QA00	**Covers, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • Width 2.2 mm • Gray		**8WH9000-1QA00**		100	100 units	1BT
 8WH9160-0AA00	**Spacer plates, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • Compensates for tier offset if other terminals are mounted side by side • 2.5 mm thick • Gray		**8WH9160-0AA00**		100	50 units	1BT
 8WH9070-6FA00	**Compartment partitions, for two-tier terminals, for terminal sizes 2.5 ... 4 mm²** • For visual and electrical separation of terminal groups • 2 mm thick • Gray		**8WH9070-6FA00**		100	50 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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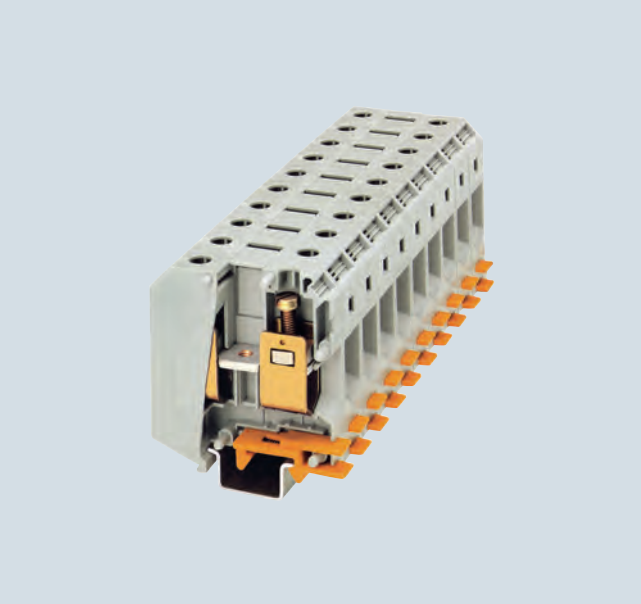
8WH high-current terminals

Overview



The high-current terminals cover cross-sectional areas from 16 to 240 mm^2. A reliable cable connection is ensured through effective design measures, such as:

- Three-point centering of the conductor in the prismatic sleeve base
- Low contact resistance of the contact area through grooved surface
- Screw locking through spring-loaded elements
- Terminals enclosed at both ends

The terminals have an enclosed insulating body made of polyamide 6.6.

The terminals are available in gray and blue.

8WH labels must be used at the front for inscription purposes.

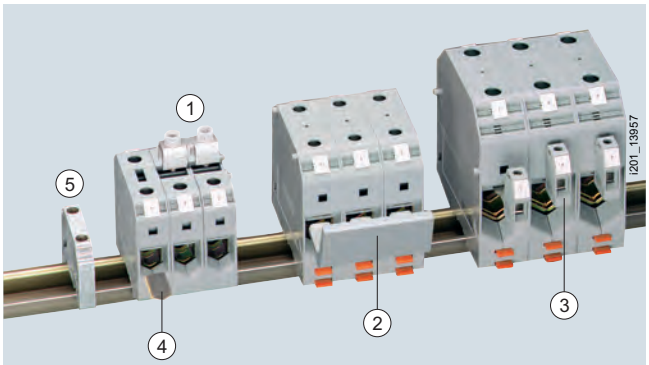
For terminals with terminal size up to 95 mm^2, green-yellow PE/ground conductor terminals are available.

Mounting on support rails acc. to IEC 60715.

Benefits

- Larger connection up to 240 mm^2
- The right terminal is always available – whatever the connection functions
- Simple inscription using 8WH standard
- Comprehensive range of accessories available
- Enclosed insulating body made of polyamide 6.6

Design



1 Permanent link
2 Comb
3 Tap-off terminal
4 Insertion profile
5 End retainer

Assembled terminal blocks

Using the 50 mm^2 terminals, permanent links can be mounted in 2- and 3-pole versions. Combs are required with 95 to 240-mm^2 terminals.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

	8WH1000-0AN00 8WH1000-0AN01	8WH1000-0CN07	8WH1000-0AQ00 8WH1000-0AQ01
Dimensions • Width / length in mm • Height (TS 35/7.5 / TS 35/15 / TS 32) in mm	 20 / 70.5 -- / 83.5 / 81.5		 25 / 83 -- / 97.5 / 95.5
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Max. cross-section with comb (rigid / flexible) in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 150 / 50 -- 8 / 3 III / I		 232 / 95 95 / 70
Connection capacities • Flexible with end sleeves with/without plastic sleeve in mm^2	 25 ... 50 / 25 ... 50		 35 ... 95 / 35 ... 95
Multi-conductor connection (two conductors of same cross-section) • Rigid / flexible in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2	 10 ... 16 / 10 ... 16 10 ... 16		 25 ... 35 / 25 ... 35 16 ... 35
Stripped length in mm	24		33
Plug gauge (IEC 60947-1)	B10		B12
Screw thread	M6	--	M8
Tightening torque in Nm	6 ... 8	--	15 ...20
Clamping point: screw thread / tightening torque in Nm	--	M6 / 6 ... 8	--
Fixing: screw thread / tightening torque in Nm	--	M6 / 6 ... 8	--
Molded plastic type • Flammability Class acc. to UL 94	PA V0		
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: V/A/AWG - CSA: V/A/AWG	 600 / 150 / 6 ... 0 600 / 125 / 6 ... 0	 6 ... 1 / 0 --	 600 / 230 / 2 - 000 600 / 230 / 1 - 000
Support rails / protective conductor busbars	--	see page 14/3, section "Support rails"	--

	8WH1000-0CQ07	8WH1000-0AS00 8WH1000-0AS01	8WH1000-0AU00 8WH1000-0AU01
Dimensions • Width / length in mm • Height (TS 35/7.5 / TS 35/15 / TS 32) in mm	 25 / 83 -- / 99 / 96.5	 31 / 100 -- / 118.5 / 116	 36 / 100 -- / 131.5 / 129.5
Technical specifications acc. to IEC/DIN VDE • Max. load current in A / cross-section in mm^2 • Max. cross-section with comb (rigid / flexible) in mm^2 • Rated impulse withstand voltage in kV / pollution degree • Overvoltage category / molded plastic group	 232 / 95 -- 8 / 3 III / I	 309 / 150 150 / 120	 415 / 240 240 / 185
Connection capacities • Flexible with end sleeves with/without plastic sleeve in mm^2		 50 ... 150 / 50 ... 150	 70 ... 185 / 70 ... 185
Multi-conductor connection (two conductors of same cross-section) • Rigid / flexible in mm^2 • Flexible with end sleeve, without plastic sleeve in mm^2	 25 ... 35 / 25 ... 35 16 ... 35	 25 ... 50 / 35 ... 50 25 ... 50	 35 ... 95 / 50 ... 95 35 ... 50
Stripped length in mm	30	40	
Plug gauge (IEC 60947-1)	B12	B14	B15
Screw thread	--	M10	
Tightening torque in Nm	--	25 ... 30	
Clamping point: screw thread / tightening torque in Nm	M8 / 15 ... 20 (hexagon socket-head screw)	--	--
Fixing: screw thread / tightening torque in Nm	M8 / 15 ... 20 (hexagon socket-head screw)	--	--
Molded plastic type • Flammability Class acc. to UL 94	PA V0		
Approval data (UL/cUL and CSA) • Rated voltage / rated current / conductor sizes - UL/cUL: V/A/AWG - CSA: V/A/AWG	 2 ... 4 / 0 2 ... 4 / 0	 600 / 285 / 2 AWG ...300 kcmil 600 / 275 / 2 AWG ... 300 kcmil	 600 / 380 / 00 ... 500 kcmil 600 / 400 / 0 ... 500 kcmil
Support rails / protective conductor busbars	see page 14/3, section "Support rails"	--	

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 50 mm²							
 8WH1000-0AN00	**High-current terminal, terminal size 50 mm²** • Enclosed at both ends • Terminal width 20 mm • c UL us • IEC 60947-7-1 - Rigid 16 ... 50 mm² - Flexible 25 ... 50 mm² - AWG 6 ... 0 - I = 150 A - U = 1000 V						
	Versions						
	• Gray		**8WH1000-0AN00**		1 10 units		1BT
	• Blue		**8WH1000-0AN01**		1 10 units		1BT
 8WH1000-0CN07	**PE high-current terminal, terminal size 50 mm²** • Green-yellow • Enclosed at both ends • Terminal width 20 mm • c UL us • IEC 60947-7-1 - Rigid 16 ... 50 mm² - Flexible 25 ... 50 mm² - AWG 6 ... 0 - I = 150 A - U = 1000 V		**8WH1000-0CN07**		1 10 units		1BT
Terminal size 95 mm²							
 8WH1000-0AQ00	**High-current terminal, terminal size 95 mm²** • Enclosed at both ends • Terminal width 25 mm • c UL us • IEC 60947-7-1 - Rigid 25 ... 95 mm² - Flexible 35 ... 95 mm² - AWG 4 ... 000 - I = 232 A - U = 1000 V						
	Versions						
	• Gray		**8WH1000-0AQ00**		1 10 units		1BT
	• Blue		**8WH1000-0AQ01**		1 10 units		1BT
 8WH1000-0CQ07	**PE high-current terminal, terminal size 95 mm²** • Green-yellow • Enclosed at both ends • Terminal width 25 mm • c UL us • IEC 60947-7-1 - Rigid 25 ... 95 mm² - Flexible 35 ... 95 mm² - AWG 4 ... 000 - I = 232 A - U = 1000 V		**8WH1000-0CQ07**		1 10 units		1BT
 8WA1010-1PQ00	**PE high-current terminals and PEN high-current terminals, terminal size 95 mm², two screw terminals** • Bare • For I = 232 A • Mounting width 16 mm • Terminal height 63 mm • Terminal length 75 mm • For 35 x 15 mm standard mounting rail only		**8WA1010-1PQ00**		1 5 units		1BT
	Note						
	8WH accessories do not match this terminal.						

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 150 mm²							
 8WH1000-0AS00	**High-current terminal, terminal size 150 mm²** • Enclosed at both ends • Terminal width 31 mm • c UL us • IEC 60947-7-1 - Rigid 35 ... 150 mm² - Flexible 50 ... 150 mm² - AWG 2 ... 300 - I = 309 A - U = 1000 V						
	Versions						
	• Gray		**8WH1000-0AS00**		1	10 units	1BT
	• Blue		**8WH1000-0AS01**		1	10 units	1BT
Terminal size 240 mm²							
 8WH1000-0AU00	**High-current terminal, terminal size 240 mm²** • Enclosed at both ends • Terminal width 36 mm • c UL us • IEC 60947-7-1 - Rigid 70 ... 240 mm² - Flexible 70 ... 240 mm² - AWG 00 ... 500 - I = 415 A - U = 1000 V						
	Versions						
	• Gray		**8WH1000-0AU00**		1	10 units	1BT
	• Blue		**8WH1000-0AU01**		1	10 units	1BT
Accessories							
 8WH9120-0AA00	**Tap-off terminals** • When wiring a tap-off with a smaller cross-section, observe the overload and short-circuit strength specified in VDE 0100 Part 430 • I_{max}: 57 A • Cross-section: 10 mm²						
	Versions						
	• For terminal size 50 mm²		**8WH9120-0AA00**		1	10 units	1BT
	• For terminal size 95 mm²		**8WH9120-0BA00**		1	10 units	1BT
	• For terminal size 150 ... 240 mm²		**8WH9120-0CA00**		1	10 units	1BT
 8WH9020-3AA00	**Combs** • Totally insulated • Fitted in the clamping sleeve and latched with the terminal enclosure						
	Versions						
	• For terminal size 95 mm², I_{max}: 232 A						
	- 2-pole		**8WH9020-3AA00**		1	10 units	1BT
	- 3-pole		**8WH9020-3BA00**		1	10 units	1BT
	• For terminal size 150 mm², I_{max}: 232 A						
	- 2-pole		**8WH9020-3CA00**		1	10 units	1BT
	- 3-pole		**8WH9020-3DA00**		1	10 units	1BT
	• For terminal size 240 mm², I_{max}: 320 A						
	- 2-pole		**8WH9020-3EA00**		1	10 units	1BT
	- 3-pole		**8WH9020-3FA00**		1	10 units	1BT
 8WH9020-3MA00	**Insertion profiles** Evens out the prismatic sleeve base when using flat conductors						
	Versions						
	• For terminal size 50 mm²		**8WH9020-3MA00**		1	10 units	1BT
	• For terminal size 95 mm²		**8WH9020-3NA00**		1	10 units	1BT
	• For terminal sizes 150 and 240 mm²		**8WH9020-3PA00**		1	10 units	1BT
 8WH9020-6HC00	**Permanent links, for terminal size 50 mm²** • For cross links • Screw heads with insulating collar • Remove partition first • I_{max}= 150 A						
	Versions						
	• 2-pole		**8WH9020-6HC00**		1	10 units	1BT
	• 3-pole		**8WH9020-6HD00**		1	10 units	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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Overview



In industrial process engineering, a high interference immunity is required for electrical measuring and control equipment. It is a decisive factor in the availability of industrial equipment. When designing low-interference systems, great importance is placed on cable shielding and the respective shield ground. The critical point is where the cable shield is connected to the enclosure ground. The connection should have a low resistance and a low inductive reactance, while being quick and easy to establish. The shield terminals are ideally suited for this purpose and can be used with all common cable shields.

The effectiveness of cable shields depends to a large extent on the contact quality of the shield connection. The shield terminals have a large, low-impedance contact area with the shield, which reduces the voltage drop across it. Connected at one end only, shields can help reduce only low-frequency, capacitive interference, such as that caused by high-voltage installations. To protect from the much more common inductive interference signals, the cable shield must be connected at both ends.

However, differences in the ground potential can cause a compensating current to flow through the cable shield.

To reduce this interference current, it is advisable to connect the shield at several points along its length. The shorter the spaces between the clamping points, the smaller the compensating currents in the cable shield. In systems where safety is especially important, triaxial shields are used. These consist of two braids that are insulated from each other, with the outer shield connected at both ends and the inner one at only one end. With this arrangement, the equipotential bonding currents and the inductive interference are conducted through the outer shield, and the capacitive interference dissipated through the inner shield.

Depending on the length of the terminal strip, two or more support brackets are fitted, which provide both an electrical and a mechanical connection from the busbar to the support rail and therefore to the enclosure ground. The shield terminal is simply fitted to the busbar after all wires have been connected.

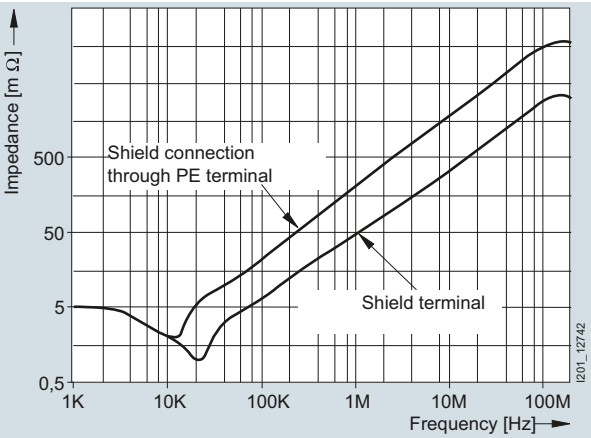
A spring-loaded pressure plate regulates the force applied to the cable to ensure an optimum contact with the busbar at all times.

If the cable shield is to be connected at another point of the control cabinet instead of directly in front of the terminal strip, we recommend using support brackets made of molded plastic.

Technical specifications

	8WH9130-0KA00	8WH9130-0LA00	8WH9130-0MA00	8WH9130-0NA00	8WH9130-0PA00
Dimensions	See dimensional drawing	See dimensional drawing	See dimensional drawing	See dimensional drawing	See dimensional drawing
Contact resistance in mΩ		< 1			
Connection data					
• Diameter	2 ... 5	3 ... 8	3 ... 14	3 ... 20	20 ... 35
• Tightening torque in Nm	0.4	0.6	0.8	0.8	1.5 ... 1.8

	8WH9130-0AA00	8WH9130-0BA00	8WH9130-0CA00	8WH9130-0DA00
Dimensions	See dimensional drawing	See dimensional drawing	See dimensional drawing	See dimensional drawing
Contact resistance in mΩ	The contact resistance is determined by the mounting area			
Connection data				
• Diameter	3 ... 8	3 ... 14	3 ... 20	20 ... 35
• Tightening torque in Nm	0.6	0.8	0.8	1.5 ... 1.8



Comparison of shield connection through PE terminal and through shield terminal

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details						
	Note						
	• The shield terminals must not be used for strain relief • Support brackets have galvanic connections from the busbar to the support rail or to the mounting block • Busbar 10 x 3 mm						
Terminal diameter 3 ... 8 mm							
 8WH9130-0AA00	**Shield terminal, terminal diameter 3 ... 8 mm**						
	Versions						
	• For direct shield attachment on conductive mounting plate - Sheet thickness 1 ... 2 mm		**8WH9130-0AA00**		1	10 units	1BT
	• For busbars		**8WH9130-0LA00**		1	10 units	1BT
 8WH9130-0LA00							
Terminal diameter 3 ... 14 mm							
 8WH9130-0BA00	**Shield terminal, terminal diameter 3 ... 14 mm**						
	Versions						
	• For direct shield attachment on conductive mounting plate - Sheet thickness 1 ... 2 mm		**8WH9130-0BA00**		1	10 units	1BT
	• For busbars		**8WH9130-0MA00**		1	10 units	1BT
 8WH9130-0MA00							

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8WH shield terminals

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Terminal diameter 3 ... 20 mm							
 8WH9130-0CA00	**Shield terminal, terminal diameter 3 ... 20 mm**						
	Versions						
	• For direct shield attachment on conductive mounting plate - Sheet thickness 1 ... 2 mm		**8WH9130-0CA00**		1	10 units	1BT
 8WH9130-0NA00	• For busbars		**8WH9130-0NA00**		1	10 units	1BT
Terminal diameter 20 ... 35 mm							
 8WH9130-0DA00	**Shield terminal, terminal diameter 20 ... 35 mm**						
	Versions						
	• For direct shield attachment on conductive mounting plate - Sheet thickness 1 ... 2 mm		**8WH9130-0DA00**		1	10 units	1BT
 8WH9130-0PA00	• For busbars		**8WH9130-0PA00**		1	10 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
 8WH9140-0DA00	**Support brackets** Versions • For terminal diameters 8 ... 35 mm, made of molded plastic and conductive connection - With retaining screw - For 10 x 3 mm busbars		**8WH9140-0DA00**		1	10 units	1BT
 8WH9140-0BA00	• For terminal diameters 8 ... 20 mm, for mounting rail with clearance of approx. 30 mm to the busbar - For 10 x 3 mm busbars		**8WH9140-0BA00**		1	10 units	1BT
 8WH9140-0CA00	• For terminal diameters 8 ... 20 mm, for mounting rail with clearance of approx. 65 mm to the busbar - For 10 x 3 mm busbars		**8WH9140-0CA00**		1	10 units	1BT
 8WA2842	**N-busbars, 10 x 3 mm** • Copper, aluminum • 1000 mm long		**8WA2842**		1	1 unit	1BT

For general accessories for 8WH terminal blocks, see page 14/135.

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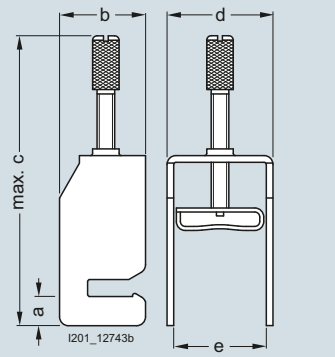
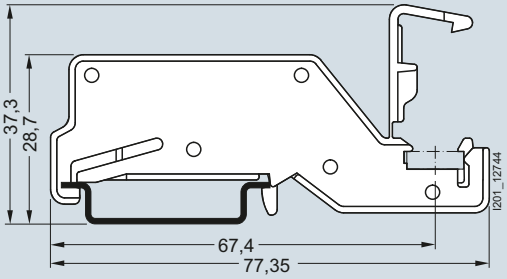
Dimensional drawings

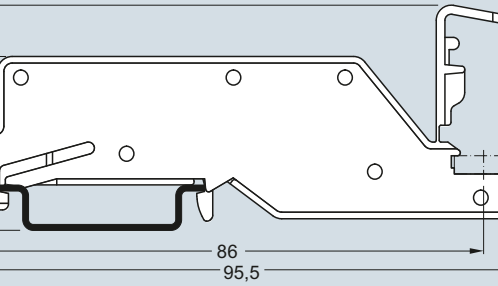


	a	b	c	d	e
8WH9130-0LA00	6,5	19,5	48,7	12,0	9,0
8WH9130-0MA00	6,5	19,5	59,3	17,0	14,0
8WH9130-0NA00	6,5	19,5	75,0	24,0	21,0
8WH9130-0PA00	6,5	20,0	106,5	40,0	36,0
8WH9130-0AA00	6,5	19,5	47,2	12,0	9,0
8WH9130-0BA00	6,5	19,5	57,8	17,0	14,0
8WH9130-0CA00	6,5	19,5	73,5	24,0	21,0
8WH9130-0DA00	6,5	20,0	105,0	40,0	36,0

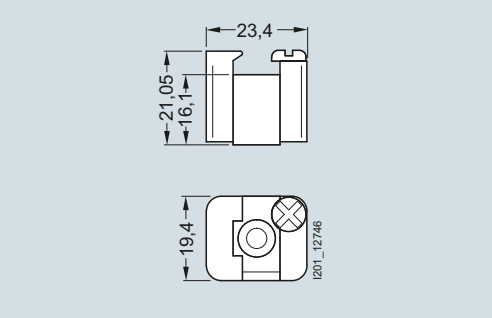
Shield terminals



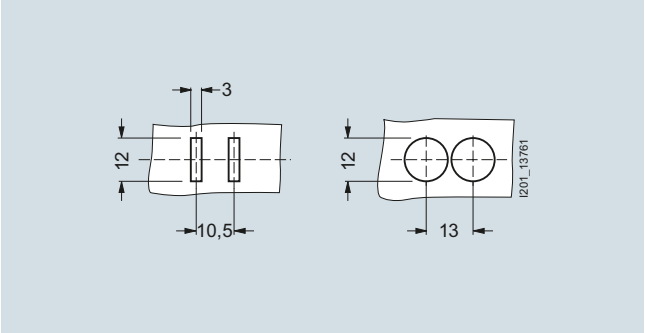
8WH9140-0BA00



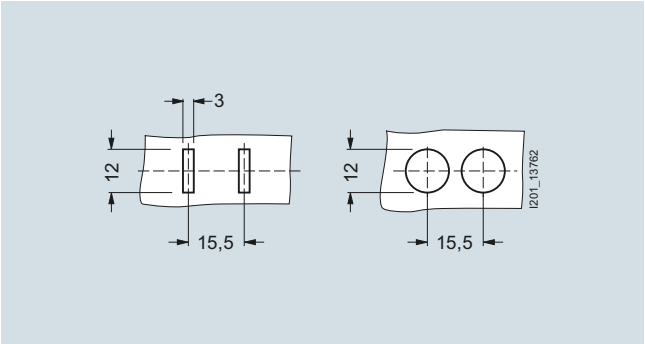
8WH9140-0CA00



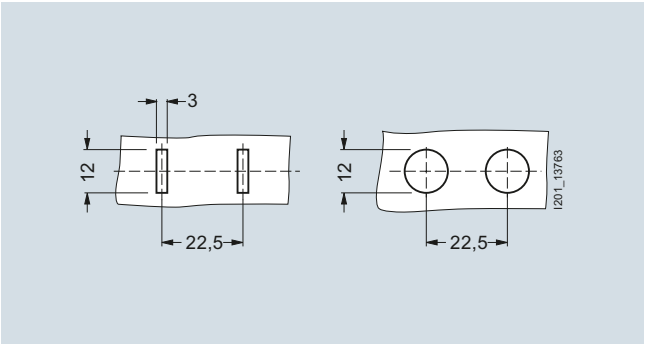
8WH9140-0DA00



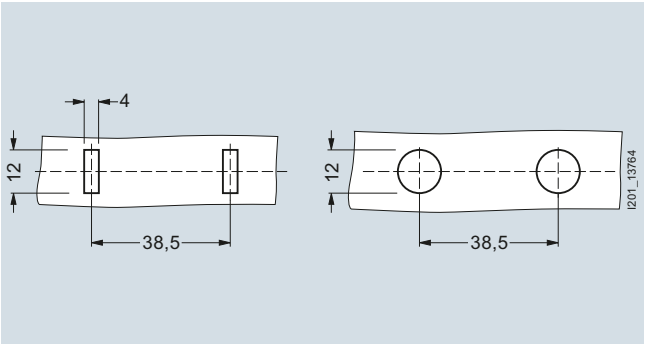
Punching template and drill plan for 8WH9130-0AA00



Punching template and drill plan for 8WH9130-0BA00



Punching template and drill plan for 8WH9130-0CA00



Punching template and drill plan for 8WH9130-0DA00

Minimum order quantity (PS) or a multiple thereof can be ordered.

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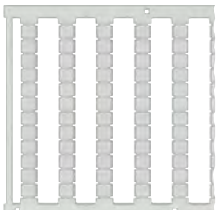
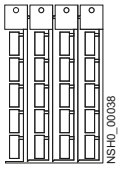
Selection and ordering data

Labeling system for individual inscription

Labeling systems for
- Terminal blocks
- Modular installation devices
- Circuit breakers
- Switch disconnectors

Available from:
Murrplastik Systemtechnik GmbH
Postfach 1143
71570 Oppenweiler
Germany
Telephone: +49 7191-482-0
email: info@murrplastik.de

Accessories for labeling system

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WH8113-1AA05	**Blank labels for 8WH8 terminal blocks**						
	Versions						
	• Front						
	- For 3.5 mm terminal width (WIN 97)		**8WH8112-0AA05**		100	1800 units	1BT
	- For 4.2 mm terminal width (WIN 97)		**8WH8112-1AA05**		100	1024 units	1BT
	- For 5.2 and 6.2 mm terminal width (WIN 88)		**8WH8112-2AA05**		100	1400 units	1BT
	- For 8.2, 10, 12 and 16 mm terminal width (WIN 40)		**8WH8112-4AA05**		100	1000 units	1BT
	• Flat						
	- For 3.5 mm terminal width (WIN 97)		**8WH8113-0AA05**		100	3000 units	1BT
	- For terminal width of 4.2 mm (WIN 180), 5.2 mm (WIN 182), 6.2 mm (WIN 184), 8.2 mm (WIN 186) and 10 mm (WIN 188)		**8WH8113-1AA05**		100	2000 units	1BT
	- For 12 and 16 mm terminal width (WIN 46Z)		**8WH8113-6AA05**		100	1080 units	1BT
	**Snap-on device labels**						
	For identification of, e.g. • Circuit breakers • Contactors • Control systems						
	Versions						
	• 20 x 7, white, snap-on hooks at side (WIN 95)		**8WH8210-0AA55**		100	340 units	1BT
	• 20 x 7, turquoise, snap-on hooks at side (WIN 95)		**8WH8210-0AA56**		100	340 units	1BT
	**Adhesive device labels**						
	For identification of, e.g. • Modular installation devices • Switch disconnectors						
	Versions						
	• 15 x 6 mm, white (WIN 098)		**8WH8210-0AA35**		100	3740 units	1BT
	• 15 x 6 mm, yellow (WIN 099)		**8WH8210-0AA36**		100	3740 units	1BT
	• 19 x 8 mm, white (WIN 088)		**8WH8210-0AA45**		100	2700 units	1BT
	• 19 x 8 mm, yellow (WIN 082)		**8WH8210-0AA46**		100	2700 units	1BT

Note:

The inscription labels can be inscribed with Murrplastik labeling systems or by hand.

The WIN designation facilitates assignment in the inscription software.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Standard labeling system

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH8120-1AB05	**Labels, front, for terminal width 4.2 mm and terminal size 1.5 mm² (except 8WH3), printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8120-1A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	- 61 ... 70 (10×)		**B65**				
	- 71 ... 80 (10×)		**B75**				
	- 81 ... 90 (10×)		**B85**				
	- 91 ... 100 (10×)		**C05**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8120-1XA05 -Z and Y01**		100	100 units	1BT
 8WH8140-1AB05	**Labels, front, for terminal width 4.2 mm and terminal size 1.5 mm² (except 8WH3), horizontally printed**						
	Versions						
	• Consecutive numbering		**8WH8140-1A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8140-1XA05 -Z and Y01**		100	100 units	1BT
 8WH8110-1AA05	**Labels, front, for terminal width 4.2 mm and terminal size 1.5 mm² (except 8WH3), blank**		**8WH8110-1AA05**		100	100 units	1BT
 8WH8121-1AB05	**Labels, flat, for terminal width 4.2 mm and terminal size 1.5 mm² (except 8WH3), printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8121-1A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8121-1XA05 -Z and Y01**		100	100 units	1BT
 8WH8141-1AB05	**Labels, flat, for terminal width 4.2 mm and terminal size 1.5 mm² (except 8WH3), printed horizontally**						
	Versions						
	• Consecutive numbering		**8WH8141-1A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8141-1XA05 -Z and Y01**		100	100 units	1BT
 8WH8111-1AA05	**Labels, flat, for terminal width 4.2 mm and terminal size 1.5 mm² (except 8WH3), blank**		**8WH8111-1AA05**		100	100 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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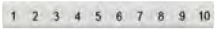
Standard labeling system

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
8WH8120-2AB05	**Labels, front, for terminal width 5.2 mm and terminal size 2.5 mm² (8WH3: 1.5 mm²), printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8120-2A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	- 61 ... 70 (10×)		**B65**				
	- 71 ... 80 (10×)		**B75**				
	- 81 ... 90 (10×)		**B85**				
	- 91 ... 100 (10×)		**C05**				
8WH8120-2AA15	• L1/L2/L3/N/PE		**A15**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8120-2XA05 -Z and Y01**		100	100 units	1BT
 8WH8140-2AB05	**Labels, front, for terminal width 5.2 mm and terminal size 2.5 mm² (8WH3: 1.5 mm²), printed horizontally**						
	Versions						
	• Consecutive numbering		**8WH8140-2A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	- 61 ... 70 (10×)		**B65**				
	- 71 ... 80 (10×)		**B75**				
	- 81 ... 90 (10×)		**B85**				
	- 91 ... 100 (10×)		**C05**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8140-2XA05 -Z and Y01**		100	100 units	1BT
 8WH8110-2AA05	**Labels, front, for terminal width 5.2 mm and terminal size 2.5 mm² (8WH3: 1.5 mm²), blank**		**8WH8110-2AA05**		100	100 units	1BT
 8WH8121-2AB15	**Labels, flat, for terminal width 5.2 mm and terminal size 2.5 mm² (8WH3: 1.5 mm²), printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8121-2A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	- 61 ... 70 (10×)		**B65**				
	- 71 ... 80 (10×)		**B75**				
	- 81 ... 90 (10×)		**B85**				
	- 91 ... 100 (10×)		**C05**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8121-2XA05 -Z and Y01**		100	100 units	1BT
 8WH8141-2AB15	**Labels, flat, for terminal width 5.2 mm and terminal size 2.5 mm² (8WH3: 1.5 mm²), printed horizontally**						
	Versions						
	• Consecutive numbering		**8WH8141-2A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	- 61 ... 70 (10×)		**B65**				
	- 71 ... 80 (10×)		**B75**				
	- 81 ... 90 (10×)		**B85**				
	- 91 ... 100 (10×)		**C05**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8141-2XA05 -Z and Y01**		100	100 units	1BT

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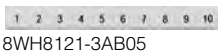
Standard labeling system

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH8111-2AA05	**Labels, flat, for terminal width 5.2 mm and terminal size 2.5 mm² (8WH3: 1.5 mm²), blank**		**8WH8111-2AA05**		100	100 units	1BT
 8WH8120-3AB05	**Labels, front, for terminal width 6.2 mm and terminal size 4 mm² (8WH3: 2.5 mm²), printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8120-3A□□□**		100	100 units	1BT
 8WH8120-3AA15	- 1 ... 10 (10×) - 11 ... 20 (10×) - 21 ... 30 (10×)		**B05** **B15** **B25**				
 8WH8120-3AA25	- 31 ... 40 (10×) - 41 ... 50 (10×) - 51 ... 60 (10×)		**B35** **B45** **B55**				
	- 61 ... 70 (10×) - 71 ... 80 (10×) - 81 ... 90 (10×) - 91 ... 100 (10×)		**B65** **B75** **B85** **C05**				
	• L1/L2/L3/N/PE		**A15**				
	• U/V/W/N/grounding		**A25**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8120-3XA05 -Z and Y01**		100	100 units	1BT
 8WH8140-3AB05	**Labels, front, for terminal width 6.2 mm and terminal size 4 mm² (8WH3: 2.5 mm²), printed horizontally**						
	Versions						
	• Consecutive numbering		**8WH8140-3A□□□**		100	100 units	1BT
	- 1 ... 10 (10×) - 11 ... 20 (10×) - 21 ... 30 (10×)		**B05** **B15** **B25**				
	- 31 ... 40 (10×) - 41 ... 50 (10×) - 51 ... 60 (10×)		**B35** **B45** **B55**				
	- 61 ... 70 (10×) - 71 ... 80 (10×) - 81 ... 90 (10×) - 91 ... 100 (10×)		**B65** **B75** **B85** **C05**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8140-3XA05 -Z and Y01**		100	100 units	1BT
8WH8110-3AA05	**Labels, front, for terminal width 6.2 mm and terminal size 4 mm² (8WH3: 2.5 mm²), blank**		**8WH8110-3AA05**		100	100 units	1BT
 8WH8121-3AB05	**Labels, flat, for terminal width 6.2 mm and terminal size 4 mm² (8WH3: 2.5 mm²), printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8121-3A□□□**		100	100 units	1BT
	- 1 ... 10 (10×) - 11 ... 20 (10×) - 21 ... 30 (10×)		**B05** **B15** **B25**				
	- 31 ... 40 (10×) - 41 ... 50 (10×) - 51 ... 60 (10×)		**B35** **B45** **B55**				
	- 61 ... 70 (10×) - 71 ... 80 (10×) - 81 ... 90 (10×) - 91 ... 100 (10×)		**B65** **B75** **B85** **C05**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8121-3XA05 -Z and Y01**		100	100 units	1BT
 8WH8141-3AB05	**Labels, flat, for terminal width 6.2 mm and terminal size 4 mm² (8WH3: 2.5 mm²), printed horizontally**						
	Versions						
	• Consecutive numbering - 1 ... 10 (10×)		**8WH8141-3AB05**		100	100 units	1BT
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8141-3XA05 -Z and Y01**		100	100 units	1BT
 8WH8111-3AA05	**Labels, flat, for terminal width 6.2 mm and terminal size 4 mm² (8WH3: 2.5 mm²), blank**		**8WH8111-3AA05**		100	100 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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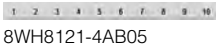
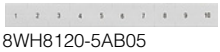
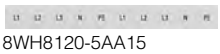
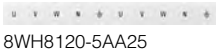
	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH8120-4AB05	**Labels, front, for terminal width 8.2 mm and terminal size 6 mm², printed vertically**						
	Versions						
 8WH8120-4AA15	• Consecutive numbering		**8WH8120-4A□□□** ▲▲▲		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	- 41 ... 50 (10×)		**B45**				
	- 51 ... 60 (10×)		**B55**				
	- 61 ... 70 (10×)		**B65**				
	- 71 ... 80 (10×)		**B75**				
	- 81 ... 90 (10×)		**B85**				
	- 91 ... 100 (10×)		**C05**				
	• L1/L2/L3/N/PE		**A15**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8120-4XA05 -Z and Y01**		100	100 units	1BT
 8WH8140-4AB05	**Labels, front, for terminal width 8.2 mm and terminal size 6 mm², printed horizontally**						
	Versions						
	• Consecutive numbering		**8WH8140-4A□□□** ▲▲▲		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8140-4XA05 -Z and Y01**		100	100 units	1BT
8WH8110-4AA05	**Labels, front, for terminal width 8.2 mm and terminal size 6 mm², blank**		**8WH8110-4AA05**		100	100 units	1BT
 8WH8121-4AB05	**Labels, flat, for terminal width 8.2 mm and terminal size 6 mm², printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8121-4A□□□** ▲▲▲		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8121-4XA05 -Z and Y01**		100	100 units	1BT
	Labels, flat, for terminal width 8.2 mm and terminal size 6 mm², printed horizontally						
	Versions						
	• Consecutive numbering		**8WH8141-4A□□□** ▲▲▲		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8141-4XA05 -Z and Y01**		100	100 units	1BT
 8WH8111-4AA05	**Labels, flat, for terminal width 8.2 mm and terminal size 6 mm², blank**		**8WH8111-4AA05**		100	100 units	1BT
 8WH8120-5AB05	**Labels, front, for terminal width 10 and 12 mm and terminal sizes 10 and 16 mm², printed vertically**						
	Versions						
 8WH8120-5AA15	• Consecutive numbering		**8WH8120-5A□□□** ▲▲▲		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
 8WH8120-5AA25	- 31 ... 40 (10×)		**B35**				
	• L1/L2/L3/N/PE		**A15**				
	• U/V/W/N/grounding		**A25**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8120-5XA05 -Z and Y01**		100	100 units	1BT

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Standard labeling system

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
8WH8140-5AB05	**Labels, front, for terminal width 10 and 12 mm and terminal sizes 10 and 16 mm², printed horizontally**						
	Versions						
	• Consecutive numbering		**8WH8140-5A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	- 31 ... 40 (10×)		**B35**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8140-5XA05 -Z and Y01**		100	100 units	1BT
8WH8110-5AA05	**Labels, front, for terminal width 10 and 12 mm and terminal sizes 10 and 16 mm², blank**		**8WH8110-5AA05**		100	100 units	1BT
 8WH8121-5AB05	**Labels, flat, for terminal width 10 and 12 mm and terminal sizes 10 and 16 mm², printed vertically**						
	Versions						
	• Consecutive numbering		**8WH8121-5A□□□**		100	100 units	1BT
	- 1 ... 10 (10×)		**B05**				
	- 11 ... 20 (10×)		**B15**				
	- 21 ... 30 (10×)		**B25**				
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8121-5XA05 -Z and Y01**		100	100 units	1BT
 8WH8141-5AB05	**Labels, flat, for terminal width 10 and 12 mm and terminal sizes 10 and 16 mm², printed horizontally**						
	Versions						
	• Consecutive numbering - 1 ... 10 (10×)		**8WH8141-5AB05**		100	100 units	1BT
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8141-5XA05 -Z and Y01**		100	100 units	1BT
8WH8111-5AA05	**Labels, flat, for terminal width 10 and 12 mm and terminal sizes 10 and 16 mm², blank**		**8WH8111-5AA05**		100	100 units	1BT
 8WH8120-7AA15	**Labels, front, for terminal width 16 mm and terminal size 35 mm², printed vertically**						
	Versions						
	• L1/L2/L3/N/PE		**8WH8120-7AA15**		100	50 units	1BT
	• Special inscription, can only be ordered with the order code -ZY01		**8WH8120-7XA05 -Z and Y01**		100	100 units	1BT
	Labels, front, for terminal width 16 mm and terminal size 35 mm², printed horizontally, with special inscription Can only be ordered with the order code -ZY01		**8WH8140-7XA05 -Z and Y01**		100	100 units	1BT
8WH8110-7AA05	**Labels, front, for terminal width 16 mm and terminal size 35 mm², blank**		**8WH8110-7AA05**		100	100 units	1BT
	Labels, flat, for terminal width 16 mm and terminal size 35 mm², blank		**8WH8111-7AA05**		100	100 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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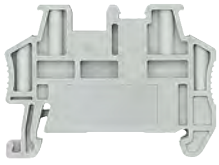
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH9010-0DB02	**Lateral mounting test plugs** For individual assembly of test plug connectors Versions • For terminal width 5.2 mm and terminal size 2.5 mm² [1]		**8WH9010-0EB02**		1	10 units	1BT
 8WH9010-2AA02	**Spacer plates** For skipping single terminals for individual test adapter assembly Versions • For terminal width 5.2 mm and terminal size 2.5 mm² [1]		**8WH9010-2BA02**		1	10 units	1BT
 8WH9150-1CA00	**Terminal strip markers, for end retainers** • Height-adjustable • For quick-fit end retainers • Inscription possible with terminal strip marker or two labels, front, for terminal width 10.2 mm • Labeling field size: 20 x 8 mm		**8WH9150-1CA00**		1	100 units	1BT
 8WH9010-0JB00	**Test adapters** • For 4 mm-∅ test plugs PS and 4 mm-∅ safety test plugs • Makes contact in the bridge slot		**8WH9010-0JB00**		1	10 units	1BT
 8WH9020-0FC10	**Reducing combs** Versions • For bridging of a through-type terminal, terminal size 2.5 or 4 mm² - To a through-type terminal, terminal size 1.5 mm² - To a through-type terminal, terminal size 6 mm² - To a through-type terminal, terminal size 10 mm² - To a through-type terminal, terminal size 16 mm² - To a through-type terminal, terminal size 35 mm² • For connecting a through-type terminal, terminal size 16 mm² - To a through-type terminal, terminal size 35 mm² Note Not for 8WH1 through-type terminals and 8WH3 insulation displacement terminals.		**8WH9020-0CC10** **8WH9020-0FC10** **8WH9020-0AC10** **8WH9020-0BC10** **8WH9020-0EC10** **8WH9020-0DC10**		1 1 1 1 1 1	10 units 10 units 10 units 10 units 10 units 10 units	1BT 1BT 1BT 1BT 1BT 1BT
 8WH9150-0CA00	**Quick-fit end retainers** For inscription with front labels, for terminal width 5.2 mm and terminal strip markers		**8WH9150-0CA00**		1	50 units	1BT

[1] Except 8WH3

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Mounting accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WH9200-0AA00	**Screwdrivers** For actuating the tension spring						
	Versions						
	• 0.4 × 2.5 mm		**8WH9200-0AA00**		1	10 units	1BT
	• 0.6 × 3.5 mm		**8WH9200-0AB00**		1	10 units	1BT
	• 0.8 × 4.0 mm		**8WH9200-0AC00**		1	10 units	1BT
	• 1.0 × 5.5 mm		**8WH9200-0AD00**		1	10 units	1BT
 8WH9020-6AC10	**Connecting combs**						
	Versions	Max. load current I_{max}					
	• For terminal width 4.2 mm and terminal size 1.5 mm² (except 8WH3)	17.5 A					
	- 2-pole		**8WH9020-6AC10**		1	50 units	1BT
	- 3-pole		**8WH9020-6AD10**		1	50 units	1BT
	- 4-pole		**8WH9020-6AE10**		1	50 units	1BT
	- 5-pole		**8WH9020-6AF10**		1	50 units	1BT
	- 10-pole		**8WH9020-6AL10**		1	10 units	1BT
	- 20-pole		**8WH9020-6AS10**		1	10 units	1BT
	• For terminal width 5.2 mm and terminal size 2.5 mm² (for 8WH3: 1.5 mm²)	24 A					
	- 2-pole		**8WH9020-6BC10**		1	50 units	1BT
	- 3-pole		**8WH9020-6BD10**		1	50 units	1BT
	- 4-pole		**8WH9020-6BE10**		1	50 units	1BT
	- 5-pole		**8WH9020-6BF10**		1	50 units	1BT
	- 10-pole		**8WH9020-6BL10**		1	10 units	1BT
	- 20-pole		**8WH9020-6BS10**		1	10 units	1BT
	- 50-pole		**8WH9020-6BT10**		1	10 units	1BT
	• For terminal width 6.2 mm and terminal size 4 mm² (for 8WH3: 2.5 mm²)	32 A					
	- 2-pole		**8WH9020-6CC10**		1	50 units	1BT
	- 3-pole		**8WH9020-6CD10**		1	50 units	1BT
	- 4-pole		**8WH9020-6CE10**		1	50 units	1BT
	- 5-pole		**8WH9020-6CF10**		1	50 units	1BT
	- 10-pole		**8WH9020-6CL10**		1	10 units	1BT
	- 20-pole		**8WH9020-6CS10**		1	10 units	1BT
	- 50-pole		**8WH9020-6CT10**		1	10 units	1BT
	• For terminal width 8.2 mm and terminal size 6 mm²	41 A					
	- 2-pole		**8WH9020-6DC10**		1	10 units	1BT
	- 3-pole		**8WH9020-6DD10**		1	10 units	1BT
	- 4-pole		**8WH9020-6DE10**		1	10 units	1BT
	- 5-pole		**8WH9020-6DF10**		1	10 units	1BT
	- 10-pole		**8WH9020-6DL10**		1	10 units	1BT
	• For terminal width 10 mm and terminal size 10 mm², 2-pole	57 A	**8WH9020-6EC10**		1	10 units	1BT
	• For terminal width 12 mm and terminal size 16 mm², 2-pole	76 A	**8WH9020-6FC10**		1	10 units	1BT
	• For terminal width 16 mm and terminal size 35 mm², 2-pole	101 A	**8WH9020-6GC10**		1	10 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Plug-in zone connectors, for isolating terminals						
	Versions						
 8WH9040-0DB04	• Isolating plugs - Orange		**8WH9040-0DB04**		1	50 units	1BT
 8WH9020-8AB00	• Through-type connectors - Gray - I_{max}: 16 A		**8WH9020-8AB00**		1	50 units	1BT
 8WH9040-3AB08	• Fused connectors - Black - I_{max}: 6.3 A - For inscription with labels, flat, for terminal width 6.2 mm - G fuses 5 x 20 mm						
	Versions						
	- With LED display for 12 ... 30 V, 1 ... 2.5 mA - With LED display for 110 ... 250 V, 0.5 ... 2.5 mA - Without LED display		**8WH9040-3AB08** **8WH9040-3CB08** **8WH9040-3DB08**		1 1 1	10 units 10 units 10 units	1BT 1BT 1BT
	Note						
	• The G fuse holders must be selected according to the maximum power loss (heat dissipation) of the G fuse links. Depending on the application and method of installation, the heat rise conditions in closed fuse holders must be tested. • Higher ambient temperatures represent an additional load for the fuse links. Hence in such cases of application it is necessary to allow in addition for adjustment of the rated current.						
 8WH9040-0BB00	• Component connectors - I_{max}: 6 A, depending on the power loss of the components, max. 1 W for stand-alone arrangement - For inscription with labels, flat, for terminal width 5.2 mm		**8WH9040-0BB00**		1	10 units	1BT
 8WA2867/8WA2868/ 8WA2870	**Feeder terminals, for N-busbars** • 6 × 6 mm and 10 × 3 mm • Bare						
	Versions						
	• Rated uninterrupted current 32 A, for connection of up to 4 mm^2 • Rated uninterrupted current 76 A, for connection of up to 25 mm^2 • Rated uninterrupted current 125 A, for connection of up to 35 mm^2		**8WA2867** **8WA2868** **8WA2870**		1 1 1	50 units 50 units 50 units	1BT 1BT 1BT
 8WA2842	**N-busbars, 10 x 3 mm** • Made of copper, tin-plated • 1000 mm long		**8WA2842**		1	1 unit	1BT

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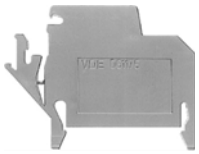
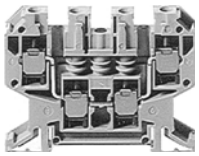
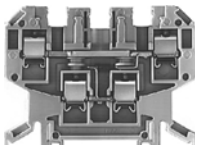
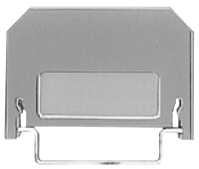
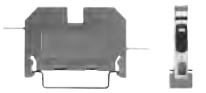
Overview

	Devices	Page	Function
	8WA through-type terminals	14/151	Connection of incoming and outgoing cables up to 70 mm^2
	8WA N-conductor isolating and branch terminals	14/157	N-conductor isolating terminals connected to N-busbar 6 × 6 mm
	8WA Insta or three-tier terminals	14/159	These terminals have up to three terminal functions in a single enclosure and may also have an N-conductor isolating terminal connection to an N-busbar 6 × 6 mm. They are optimized for distribution board applications in installation technology
	8WA two-tier terminals	14/161	Compact design of the terminal blocks, in which two connecting wires can be installed
	8WA two-tier terminals with electronic components	14/163	Terminal blocks with integrated diodes
	8WA diode and isolating terminals	14/165	Terminal blocks with integrated diodes or isolation for testing purposes
	8WA terminals for components	14/166	Terminals that enable installation of components in the circuit
	8WA fuse terminals	14/167	Terminals which can be used to protect control circuits, for example
	8WA through-type terminals with soldered and plug-in connection	14/168	Terminals with connection for soldered or plug-in connection
	8WA measuring transformer terminals	14/169	Measuring transformer terminals can be used for testing and isolating circuits in switchboards, control rooms, etc. without interrupting operation

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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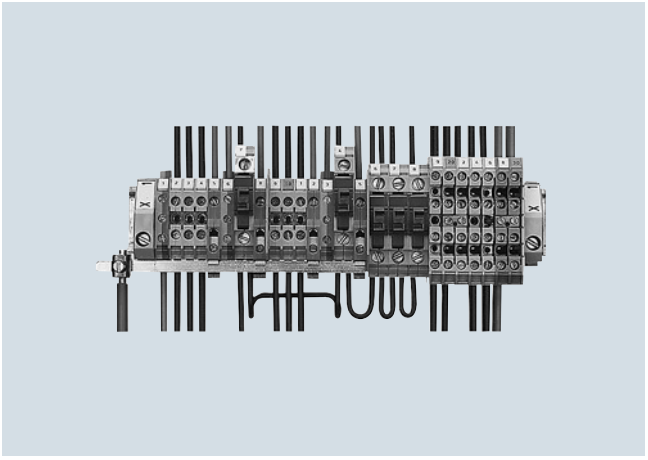
Overview



Terminal strips with different terminal blocks: 8WA1011-1DG11 terminal blocks, 8WA1011-1NG31 N-conductor isolating terminals with feeder terminal for N-busbar 6 × 6 mm, 8WA1011-1PG00 PE terminals, 8WA1011-1SF12 fuse terminals, and various two-tier terminals. The EN 50022-35-compliant standard mounting rail serves as the PE bar.

Terminal blocks are used for the space-saving connection of incoming and outgoing cables in switchboards and distribution boards.

Standards

EN 60664-1,
EN 60999 and
IEC 60 947-7-1 or
IEC 60 947-7-2.

The terminals are finger-safe acc. to IEC 60529 and EN 50274 (except for bare terminals and solder connections).
Through-type terminals are resistant to earthquakes according to IEC 60068-2-6.

Rated short-time withstand current

Our screw terminals are able to withstand a rated short-time current corresponding to a current density of 120 A/mm^2 specific to the rated cross-section for one second.

Colored terminal blocks

With colored wiring according to EN 60204-1, the connecting level can also be included in the colored markings:

- Red for control circuits with AC current
- Blue for control circuits with DC current or neutral conductor
- Orange for interlock circuits with AC or DC current which are fed from outside and are live when the main switch is turned off
- Green-yellow through-type terminals for protective conductors (without connection to the support rail)

Design

The terminal blocks are insulated at both ends, with the exception of two-tier, flat and bolt-type terminals, which are insulated on one side only.

The insulating material for terminal sizes up to 70 mm^2 made of thermoplastic, polyamide 6.6.

The materials used are environmentally sustainable:
For example, they are cadmium-free and contain no halogens or silicone.

The plastics used are flame-retardant and self-extinguishing according to EN 60695-2-2, VDE 0471, Part 2-2 and UL 94 V-2.

Clamping methods

The terminals are designed so that when the terminal screws are tightened, any tensile stress which occurs causes elastic deformation of the terminal bodies. This compensates for any creepage of the clamping conductor. Deformation of the thread part prevents loosening of the clamping screw, even in the event of heavy mechanical and thermal strain (e.g. vibration stress of 10 *g* or thermal cycles).

The following clamping methods are used:

- Terminal body with pressure plate for terminal sizes 16, 35 and 70 mm^2
- Strain-relief clamps for terminal sizes 2.5, 4 and 6 mm^2
- Screw with connection disk for fuse terminals and component terminals.

Terminal size

The terminal size corresponds to the nominal cross-section. According to EN 60947-7-1, a finely stranded copper conductor of nominal cross-section can be connected to any clamping point with or without end sleeve.

Mounting

The terminals are snapped onto 35 mm support rails according to IEC 60715 TH35 and secured against movement using end retainers.

A lateral mounting tolerance of 0.2 mm must be maintained between the terminals.

Conductor connection

Except for flat and bolt-type versions, all terminal bodies are designed so that solid, stranded and finely stranded conductors with or without end sleeves (according to DIN 46228) can be securely clamped (please observe cross-section).

Damage to the clamped conductors is prevented by pressure plates or strain-relief clamps. For the conductor cross-sections when 1 or 2 conductors are connected, see Technical Specifications.

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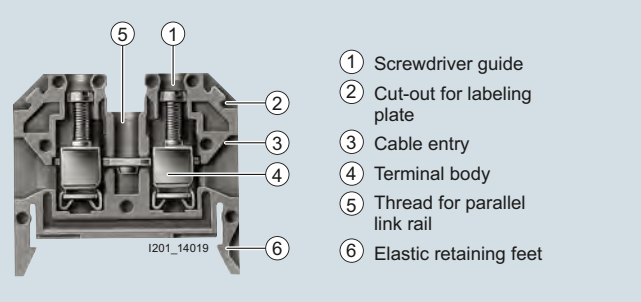
General data on 8WA

Connection of aluminum conductors

Siemens screw terminals are suitable for connecting aluminum conductors provided there is compliance with the normal processing guidelines, i.e. the brushing and greasing of the conductors before connection.

After a few days, the connection should be tightened again for safety reasons.



8WA1 through-type terminal with screw terminal at both ends, sectional view

PE and PEN terminals

In switchgear and controlgear systems the support rails for the terminal blocks are frequently used as protective ground busbars. The PE terminals establish the connection to the support rail.

The fact that there is no separate PE busbar means the PE terminals, the insulated main conductor terminals and N-conductor isolating terminals can be arranged according to user requirements. This makes the individual circuits clearly manageable.

The bare 8WA1010-1PH01 PE terminals are primarily used for connecting the shields of shielded cables. They are normally mounted on a standard mounting rail, which is supported by an 8WA1857 insulation carrier and which is equipped with only one PE terminal for connection to the PE conductor.

Accessories

Parallel connection bars

The connection bars are screwed into the terminals from above and allow parallel connection of up to 10 terminals up to terminal size 35 mm^2. The 10-pole connection bars can be shortened as required. On 70 mm^2 terminals the connection bars are two-pole.

Barriers

Barriers are yellow in color and project beyond the contours of the terminals. They serve the visual separation of groups of terminals, the electrical isolation of adjacent connection bars and the improvement of the rated insulation voltage.

Insulation plates

8WA1825 and 8WA1822-7TK00 insulation plates can be used with different terminals for providing electrical insulation between connection bars.

Disconnecting links

The 8WA1865 disconnecting links provide a detachable connection between two adjacent terminals of sizes 2.5 to 6 mm^2.

Covers with lightning symbol

The purpose of these covers is to identify the power input terminals. At the same time, they provide additional touch protection.

End retainers and end labeling plates

End retainers are available in thermoplastic or galvanized and chromated steel. The end labeling plate can be fitted in an 8WA1808 end retainer or, in any of three positions, in an 8WA1805 end retainer.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Continuous load at increased ambient temperatures

The 8WA1 terminal blocks can withstand an uninterrupted current at ambient temperatures of up to +55 °C. At higher ambient temperatures, a current reduction according to the following formula is required:

$I_{th2'} = I_{th2} \cdot k$

I_{th2} = Uninterrupted current according to selection tables, relative to the nominal cross-section
$I_{th2'}$ = Uninterrupted current at increased ambient temperature
k = Derating factor according to table

Ambient temperature	Derating factor *k*
60 °C	0.94
65 °C	0.88
70 °C	0.82
75 °C	0.75
80 °C	0.67
85 °C	0.58
90 °C	0.47
95 °C	0.33

The highest permissible clamping point overtemperature of 45 K specified in IEC 60947-7-1 is not exceeded at an ambient temperature of up to 100 °C.

Standard mounting rails as PEN rails

Only use Cu busbars.

They must have the same current carrying capacity as protective conductor busbars.

PEN busbars must carry only terminals and no devices.

Standard mounting rails as protective conductor busbars

Protective conductors with a larger cross-section than the protective conductor busbar, and with the same conductivity, can be connected to standard mounting rails that are also protective conductor busbars and carry current only under fault conditions.

Standard mounting rail acc. to EN 50022-35 and IEC 60715 TH35	Material	Type	Max. permissible cross-section of connected protective conductor mm²
35 × 7.5	Steel	5ST1141	16
	Steel, perforated	5ST1145	16
Similar to 35 × 15	Steel	5ST1142	35
	Steel	--	50
	Copper	8WA7551	150[1]

[1] With 8WA1010-1PQ00 terminal connection of up to 95 mm² finely stranded or 120 mm² stranded.

Clamping points

Terminal size	Type [1]	Thread diameter of terminal screws	Screwdriver blades acc. to DIN 5264 Form B	Tightening torque = test torque acc. to DIN VDE 0609 and DIN VDE 0611 Nm	Tensile forces acc. to IEC 60947-1 at max. conductor connection N	Stripped length mm
1.5	8WA1011-. SF. ., 8WA1011-1EE00	M3.5	0.8 × 4	0.8	40	10
2.5	8WA1. .1, 8WA1011-1BF11, 8WA1011-1EF . .	M2.5 and M3	0.5 × 3	0.5	50	11
	8WA1011- . . F . .	M2.5	0.8 × 4	0.5	50	11
4	8WA1011- . . G . .	M3	0.8 × 4	0.5	60	11
	8WA2867	M3.5		0.8 ... 1		
6	8WA1. .2, 8WA1011- . . H . .	M3.5	0.8 × 4	0.8	80	11
16	8WA1. .4, 8WA1011- . . K . .	M4	0.8 × 4	1.2	100	13
25	8WA2868	M5	1.2 × 6.5	2	135	
35	8WA1. .5, 8WA1011- . . M . .	M6	1.2 × 6.5	2.5	190	17
	8WA2870			2.5 ... 3		
50	8WH1000-0AN00, 8WH1000-0AN01, 8WH1000-0CN07	M6	1.2 × 8	6 ... 8	--	24
	8WH1070-0AN00	M6	--	3 ... 7	--	6 ... 25
70	8WA1. .6	M8	4 hexagon socket-head	6	285	25
95	8WA1010-1PQ00	M8	6 hexagon socket-head	15 ... 20		30
	8WH1000-0AQ00, 8WH1000-0AQ01	M8	6 hexagon socket-head	15 ... 20	--	33
	8WH1000-0CQ07	M8	6 hexagon socket-head	15 ... 20	--	30
	8WH1070-0AQ00	M8	--	6 ... 15	--	16... 25
	8WH1060-0AQ00	M8	--	25 ... 30	--	29
150	8WH1000-0AS0.	M10	8 hexagon socket-head	25 ... 30	--	40
	8WH1070-0AS00	M10	--	10 ... 18	--	10 ... 18
	8WH1060-0AS00	M10	--	25 ... 30	--	34
240	8WH1000-0AU0.	M10	10 hexagon socket-head	30 ... 35	--	40
	8WH1060-0AU00	M10	--	30 ... 35	--	34

[1] Tightening torque also applicable for accessories (socket, connection bars, etc.).

Minimum order quantity (PS) or a multiple thereof can be ordered.

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General data on 8WA

Rated impulse withstand voltage of terminal blocks

Values dependent on the rated voltage of the ≤ rated insulation voltage of terminal block; excerpt from EN 60947-1, table H.1.

Terminal blocks are tested acc. to overvoltage category III.

Rated mains voltage (≤ rated insulating voltage of the device)		Maximum rated operating voltage to ground	Preferred values for rated impulse withstand voltage as 1.2/50 µσ pulse			
			Overvoltage category			
RMS value V AC		RMS value V AC or V DC	I kV	II kV	III kV	IV kV
--		50	330	500	800	1500
66/115		100	500	800	1500	2500
120/208	127/220	150	800	1500	2500	4000
230/400	277/480	300	1500	2500	4000	6000
400/690		600	2500	4000	6000	8000
1000		1000	4000	6000	8000	12000

Connection

Terminal size	Type	Smallest conductor cross-section					Largest conductor cross-section				
		Solid	Stranded	Finely stranded	Finely stranded with end sleeve[1]		Solid	Stranded	Finely stranded	Finely stranded with end sleeve[1]	
mm²		mm²	mm²	mm²	mm²	Size	mm²	mm²	mm²	mm²	Size
Single-conductor connection											
1.5	8WA1011-.SF . . , 8WA1011-1EE00	1	--	--	0.75	0.75 ... 10	2.5	--	--	1.5	1.5 ... 10
2.5	8WA1211, 8WA1011-. .F. .	0.25[2]	0.5	0.5	0.5	0.5 ... 10	4	2.5	2.5	2.5	2.5 ... 12[4]
	8WA1011-3JF . .	0.25[2]	0.5	0.5	0.5	0.5 ... 10	4	2.5	2.5	2.5	2.5 ... 7
	8WA1501, 8WA1511, 8WA1011-1EF . .	0.25[2]	0.5	0.5	0.5	0.5 ... 10	4	2.5	2.5	2.5	1.5 ... 10
4	8WA9200	0.5	1.5	1.5	0.75	0.75 ... 10	6	4	4	4	4
	8WA286. Feeder terminal	1	1.5	1.5	0.75	0.75 ... 10	6	4	4	4	4 ... 12[4]
	8WA1011-. .G..	0.5	1.5	0.5	0.75	0.75 ... 10	6	4	4	4	4 ... 12[4]
6	8WA1011-1.H..	0.75	1.5	1.5	0.5	0.5 ... 10	10	6	6	6	6 ... 12
	8WA1010-1PH01	0.5	1.5	1.5	0.5	0.5 ... 10	10	6	6	6	6 ... 15
16	8WA1204, 8WA1304, 8WA1011-1BK11	1.5	2.5	2.5	1	1 ... 10[3]	16	25	16	16	16 ... 12
	8WA1604	1.5	2.5	4	1.5	1 ... 10[3]	16	25	16	16	16 ... 12
	8WA1011-1PK00	1.5	2.5	4	1.5	1.5 ... 7[6]	16	25	16	16	16 ... 15
	8WA286. Feeder terminal	1.5	2.5	4	2.5	2.5 ... 12	16	16	10	10	10 ... 12
25	8WH1060-0AL00	--	--	4	4	--	--	--	25	25	--
35	8WA1205, 8WA1305, 8WA1011-1BM11	4	10	6	6	6 ... 15	16[5]	50	35	35	35 ... 18[7]
	8WA1011-1PM00	4	10	10	6	6 ... 15	16[5]	50	35	25	25 ... 15
	8JH4114 feeder terminals	6	10	16	6	6 ... 15	16	35	25	25	25 ... 15
	8WA2870	6	10	16	6	6 ... 15	16	35	25	25	25 ... 15
50	8WH1000-0AN00	--	--	10	10	--	--	--	50	50	--
	8WH1000-0AN01	--	--	10	10	--	--	--	50	50	--
	8WH1000-0CN07	--	--	25	25	--	--	--	50	50	--
	8WH1070-0AN00	--	--	6[1]	--	--	--	--	--	35[1]	--
	8WH1060-0AN00	--	--	25	25	--	--	--	50	50	--
70	8WA1206	10	16	16	16	16 ... 12[6]	95	95	95	--	--
95	8WA1010-1PQ00	--	50	50	--	--	--	95	95	--	--
	8WH1000-0AQ00	--	--	35	35	--	--	--	95	95	--
	8WH1000-0AQ01	--	--	35	35	--	--	--	95	95	--
	8WH1000-0CQ07	--	--	35	35	--	--	--	35	95	--
	8WH1070-0AQ00	--	--	--	16[1]	--	--	--	--	35[1]	--
	8WH1060-0AQ00	--	--	35	35	--	--	--	95	95	--
150	8WH1000-0AS00, 8WH1000-0AS01	--	--	50	50	--	--	--	150	150	--
	8WH1060-0AS00	--	--	50	50	--	--	--	150	150	--
240	8WA1011-1DU..	--	--	--	--	--	--	240	240	--	--
	8WH1000-0AU00, 8WH1000-0AU01	--	--	70	70	--	--	--	185	185	--
	8WH1060-0AU00										

1) End sleeves acc. to DIN 46228 Sheet 1 without insulation. Size corresponds to sleeve nominal size.

2) 0.12/0.25 mm² corresponds to ∅ 0.4/0.6 mm.

3) For 0.75 mm² conductors, use end sleeves 1 to 10 and press on with insert E1 or PZ 1.5.

4) At voltages > 500 V, shorten end sleeves with inserted conductor to 10 mm before pressing on.

5) Tested up to 16 mm².

6) Fit and press on two end sleeves one after the other (up to stop).

7) Voltage reduction to 630 V required.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Terminal size	Type	Smallest conductor cross-section					Largest conductor cross-section				
		Solid	Stranded	Finely stranded	Finely stranded with end sleeve[1]		Solid	Stranded	Finely stranded	Finely stranded with end sleeve[1]	
mm^2		mm^2	mm^2	mm^2	mm^2	Size	mm^2	mm^2	mm^2	mm^2	Size
Two-wire connection, 2 conductors each of same cross-section; with end sleeves the two rectangular sleeves must be inserted in the same position.											
1.5	8WA1011-. SF . ., -1EE00	2 × 1	--	--	2 × 0.75	1 ... 10 [2]	2 × 2.5	--	--	2 × 1.5	1.5 ... 10
2.5	8WA1211, 8WA1011-. .F. .	2 × 0.12 [3]	2 × 0.5	2 × 0.5	2 × 0.5 [4]	0.75 ... 6	2 × 0.75	2 × 0.5	2 × 0.5	2 × 1.5 [4]	1.5 ... 10
	8WA1501, 8WA1511, 8WA1011-1EF. .	2 × 0.12 [3]	2 × 0.5	2 × 0.25	--	--	2 × 0.75	2 × 0.5	2 × 0.75	--	--
4	8WA1011-. .G. ., -1DG11	2 × 0.5	2 × 1	2 × 1	2 × 0.5	0.5 × 10	2 × 1.5	2 × 1.5	2 × 1.5	2 × 1.5	1.5 ... 10
	8WA1011-2DG11	2 × 0.5	2 × 1	2 × 1	2 × 0.5	0.5 × 10	2 × 1	2 × 1.5	2 × 1.5	2 × 1	1 ... 10
	8WA1011-6DG11, top	2 × 0.5	2 × 1	2 × 1	2 × 0.5	0.5 × 10	2 × 1.5	2 × 1.5	2 × 1.5	2 × 1	1 ... 10
	8WA1011-6DG11, bottom	2 × 0.5	2 × 1	2 × 1	2 × 0.5	0.5 × 10	2 × 1	2 × 1.5	2 × 1.5	2 × 1	1 ... 10
	8WA1011-1PG00	2 × 0.5	2 × 1	2 × 1	2 × 0.5	0.5 × 10	2 × 1	2 × 1.5	2 × 1.5	2 × 1	1 ... 10
	8WA1011-1PG11, -1NG01	2 × 0.5	2 × 1	2 × 1	2 × 0.5	0.5 × 10	2 × 1.5	2 × 1.5	2 × 1.5	2 × 1	1 ... 10
6	8WA1011-1 . H . ., -3DH21	2 × 0.5	2 × 0.75	2 × 0.75	2 × 0.5	0.5 × 10	2 × 1.5	2 × 1.5	2 × 1.5	2 × 1.5	1.5 ... 10
	8WA1010-1PH01	2 × 0.5	2 × 0.75	2 × 0.75	2 × 0.5	0.5 × 10	2 × 1.5	2 × 1.5	2 × 1.5	2 × 0.75	1 ... 10
16	8WA1204, 8WA1304, 8WA1604, 8WA1011-1BK11	2 × 1	2 × 2.5	2 × 2.5	2 × 1	1 ... 10	2 × 4	2 × 4	2 × 4	2 × 4	4 ... 12
	8WA1734	2 × 2.5	--	--	2 × 1.5	1.5 ... 7 [5]	2 × 4	2 × 4	2 × 4	2 × 4	4 ... 12
35	8WA1205, 8WA1305, 8WA1011-1BM11, 8WA1735	2 × 4	2 × 10	2 × 6	2 × 6	6 ... 15	2 × 10	2 × 10	2 × 10	2 × 10	10 ... 15
50	8WH1000-0AN00, 8WH1000-0AN01, 8WH1000-0CN07	2 × 10	2 × 10	2 × 10	2 × 10	--	2 × 35	2 × 35	2 × 35	2 × 35	--
70	8WA1206	2 × 10	2 × 10	2 × 10	2 × 10	10 ... 12 [5]	2 × 16	2 × 16	2 × 16	2 × 16	16 ... 12 [6]
95	8WH1000-0AQ00, 8WH1000-0AQ01, 8WH1000-0CQ07	2 × 25	2 × 25	2 × 25	2 × 25	--	2 × 35	2 × 35	2 × 35	2 × 35	--
150	8WH1000-0AS00, 8WH1000-0AS01	2 × 25	2 × 25	2 × 25	2 × 25	--	2 × 50	2 × 50	2 × 50	2 × 50	--
240	8WH1000-0AU00, 8WH1000-0AU01	2 × 35	2 × 35	2 × 35	2 × 35	--	2 × 95	2 × 95	2 × 95	2 × 95	--

1) End sleeves acc. to DIN 46228 Sheet 1 without insulation. Size corresponds to sleeve nominal size.

2) For 0.75 mm^2 conductors, use end sleeves 1 to 10 and press on with insert E1 or PZ 1.5 (crimping tool size 1.5).

3) 0.12/0.25 mm^2 corresponds to ∅ 0.4/0.6 mm.

4) With PZ 1.5 (crimping tool size 1.5) on top of one another

5) Fit and press on two end sleeves one after the other (up to stop).

6) Voltage reduction to 630 V required.

Conductor cross-sections to AWG "American Wire Gauge"

AWG No.	Wire diameter mm	Cross-section mm^2	AWG No.	Wire diameter mm	Cross-section mm^2	AWG No.	Wire diameter mm	Cross-section mm^2
30	0.254	0.051	18	1.024	0.82	6	4.115	13.30
29	0.287	0.065	17	1.151	1.04	5	4.620	16.77
28	0.320	0.081	16	1.290	1.31	4	5.189	21.15
27	0.363	0.102	15	1.450	1.65	3	5.827	26.66
26	0.404	0.128	14	1.628	2.08	2	6.543	33.62
25	0.455	0.163	13	1.829	2.63	1	7.348	42.41
24	0.511	0.205	12	2.052	3.31	1/0	8.252	53.52
23	0.574	0.259	11	2.304	4.17	2/0	9.266	67.43
22	0.643	0.33	10	2.588	5.26	3/0	10.404	85.01
21	0.724	0.41	9	2.906	6.63	4/0	11.684	107.21
20	0.813	0.52	8	3.268	8.37	5/0	--	135.35
19	0.912	0.65	7	3.665	10.55	6/0	--	170.50

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General data on 8WA

and ratings

Terminal size	Type	CSA rating			UR rating		
		AWG	Rated current I_n	Rated voltage U_e	AWG	Rated current I_n	Rated voltage U_e
mm²			A	V		A	V
1.5	8WA1011-1SF12	18 ... 14	6.3	600	18 ... 14	6.3	600
	8WA1011-1SF24, -2SF24, -4SF24	14	1	--	14 ... 12	1	AC 240/DC 60
	8WA1011-1SF25, -2SF25, -4SF25	14	2	--	14 ... 12	2	AC 240/DC 60
	8WA1011-1SF26, -2SF26, -4SF26	14	4	--	14 ... 12	4	AC 240/DC 60
	8WA1011-1SF27, -2SF27, -4SF27	14	6	--	14 ... 12	6	AC 240/DC 60
	8WA1011-1SF28, -2SF28, -4SF28	14	10	--	14 ... 12	10	AC 240/DC 60
2.5	8WA1011-1BF21, -1BF22, -1BF23, -1PF11	18 ... 12	25	600	22 ... 12	26	600
	8WA1011-1DF11, -3DF21, -0DF21, -0DF22	18 ... 12	25	600	22 ... 12	26	600
	8WA1011-1NF01, -1NF02	22 ... 12	26	600	22 ... 12	26	600
	8WA1011-3JF..	--	--	--	22 ... 12	26	300
	8WA1011-1PF00, 8WA1011-1PF01	22 ... 12	--	--	22 ... 12	--	--
	8WA1501	22 ... 12	10	300 D	22 ... 12	10	300
4	8WA1011-1PG00, 8WA1011-1PG01	18 ... 10	--	--	18 ... 10	--	--
	8WA1011-1BG11, -1BG21, -1BG22	18 ... 10	40	600	18 ... 10	35	600
	8WA1011-1DG11, -3DG21, -0DG21, -0DG22	18 ... 10	40	600	18 ... 10	35	600
	8WA1011-1NG31, -1NG32	18 ... 10	40	600	18 ... 10	35	600
	8WA1011-1PG11	18 ... 10	40	600	--	--	--
	8WA1011-2BG11, -2DG11	18 ... 10	40	300	18 ... 10	35	600
	8WA1011-6BG11, -6DG11	18 ... 10	40	300	18 ... 10	35	600
	8WA1011-6EG..	--	--	--	18 ... 10	34	300
	8WA9200	18 ... 10	25	300	18 ... 10	26	600
6	8WA1011-1PH00	--	--	--	14 ... 8	--	--
	8WA1011-1BH23, -1PH11	16 ... 10	35	600	14 ... 8	44	600
	8WA1011-1DH11, -3DH21	16 ... 8	35	600	14 ... 8	44	600
	8WA1011-1NH01, -1NH02	14 ... 8	44	600	14 ... 8	44	600
	8WA1011-1MH10, -1MH11, -1MH15	16 ... 10	35/40	600/300 C/D	14 ... 8	44	600/300
	8WA1232	--	--	--	--[1]	24	600
16	8WA1011-1BK11	14 ... 6	70	600	12 ... 4	79	600
	8WA1011-1PK00	12 ... 4	--	--	12 ... 4	--	--
	8WA1012-1DK10	--	--	--	--	79	600
	8WA1204, 8WA1304	14 ... 6	70	600	12 ... 4	79	600
	8WA1604	--	--	--	12 ... 4	73	300
25	8WH1060-0AL00	6 ... 4	100	600	6 ... 4	85	600
35	8WA1011-1BM11	12 ... 2	100	600	10 ... 1	120	600
	8WA1011-1PM00	10 ... 1	--	--	10 ... 1	--	--
	8WA1205, 8WA1305	12 ... 2	100	600	10 ... 1	120	600
50	8WH1000-0AN00, 8WH1000-0AN01	6 ... 0	125	600	6 ... 0	150	600
	8WH1000-0CN07	--	--	--	6 ... 1		
	8WH1060-0AN00	6 ... 0	125	600	6 ... 0	150	600
70	8WA1012-1DP14	2/0 ... 1	170	600	6 ... 3/0	--	600
	8WA1206	8 ... 1/0	150	600	8 ... 3/0	220	600
95	8WH1000-0AQ00, 8WH1000-0AQ01	1 ... 000	220	600	2 ... 000	230	600
	8WH1000-0CQ07	2 ... 4			2 ... 4		
	8WH1060-0AQ00	2 ... 000	200	600	2 ... 000	230	600
150	8WH1000-0AS0, 8WH1000-0AS01	2 ... 300 kcmil	275	600	2 ... 300 kcmil	285	600
	8WH1060-0AS00	2 ... 300 kcmil	275	600	2 ... 300 kcmil	285	600
240	8WH1000-0AU00, 8WH1000-0AU01	0 ... 500 kcmil	400	600	0 ... 500 kcmil	380	600
	8WH1000-0AU00	0 ... 500 kcmil	400	600	0 ... 500 kcmil	380	600

[1] Plug-in terminal

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • Thermoplastic insulating body • Screw terminal at both ends • Enclosed at both ends						
	Note — Section — Page						
	For labeling accessories, see ... — *Accessories* — 14/135						
	Terminal size 2.5 mm²						
 8WA1011-1DF11	**Through-type terminals, terminal size 2.5 mm²** • Rated uninterrupted current 24 A • Rated insulation voltage 800 V • Mounting width 6 mm • Terminal height 26 mm • Terminal length 41 mm • AWG 22 ... 12 • AWG 18 ... 12						
	Versions						
	• Single terminals						
	- Beige		**8WA1011-1DF11**		1	100 units	1BT
	- Blue		**8WA1011-1BF23**		1	50 units	1BT
	- Red		**8WA1011-1BF21**		1	50 units	1BT
 8WA1011-3DF21	- Orange		**8WA1011-1BF22**		1	50 units	1BT
	- Yellow		**8WA1011-1BF26**		1	50 units	1BT
	- Black		**8WA1011-1BF24**		1	50 units	1BT
	- Green		**8WA1011-1BF25**		1	50 units	1BT
	• Terminal blocks						
	- Beige, 3-pole, width 18 mm		**8WA1011-3DF21**		1	10 units	1BT
	- Beige, 10-pole, width 61 mm, with inscription 1 ... 10		**8WA1011-0DF22**		1	20 units	1BT
 8WA1011-0DF21	- Beige, 10-pole, width 61 mm, without inscription		**8WA1011-0DF21**		1	20 units	1BT
	Accessories — Section — Page						
	Covers						
	• With lightning symbol, for terminal size 1.5 ... 2.5 mm² — *Accessories* — 14/155		**8WA1810**		1	50 units	1BT
	• White, facility for labeling, terminal size 1.5 ... 2.5 mm² — *Accessories* — 14/155		**8WA1860**		1	50 units	1BT
	• For connection bars:						
	- Transparent, for terminal size 2.5 ... 6 mm² — *Accessories* — 14/155		**8WA1822-7AX01**		1	10 units	1BT
	- White, facility for labeling, for terminal sizes 2.5 ... 6 mm² — *Accessories* — 14/155		**8WA1822-7AX03**		1	10 units	1BT
	Jumper, for terminal size 2.5 mm² — *Accessories* — 14/155		**8WA1822-7VF01**		1	50 units	1BT
	Disconnecting links — *Accessories* — 14/156		**8WA1865**		1	50 units	1BT
	Note						
	Between terminals with terminal sizes 2.5 and 6 mm² two 8WH1820 barriers are required.						
	• Insulation plates, for terminal sizes 2.5 ... 6 mm² — *Accessories* — 14/156		**8WA1825**		1	50 units	1BT
	• Connection bars, for terminal size 2.5 mm²						
	- For two terminals — *Accessories* — 14/156		**8WA1895**		1	50 units	1BT
	- For three terminals — *Accessories* — 14/156		**8WA1896**		1	50 units	1BT
	- For four terminals — *Accessories* — 14/156		**8WA1897**		1	20 units	1BT
	- For ten terminals — *Accessories* — 14/156		**8WA1898**		1	10 units	1BT
	• Barriers, for terminal sizes 1.5 ... 4 mm² — *Accessories* — 14/156		**8WA1820**		1	50 units	1BT
 8WA1011-1PF01	**PE through-type terminals, terminal size 2.5 mm²** • Green-yellow • Mounting width 6 mm • Terminal height 26 mm • Terminal length 51 mm						
	Versions						
	• One screw terminal		**8WA1011-1PF01**		1	50 units	1BT
	• Two screw terminals		**8WA1011-1PF00**		1	50 units	1BT
	Accessories — Section — Page						
	Barriers, for terminal sizes 1.5 ... 4 mm² — *Accessories* — 14/156		**8WA1820**		1	50 units	1BT

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8WA through-type terminals

Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
Terminal size 4 mm²						
 8WA1011-1DG11						
Through-type terminals, terminal size 4 mm² • Rated uninterrupted current 32 A • Rated insulation voltage 800 V • Mounting width 6.5 mm • Terminal height 30 mm • Terminal length 41 mm • AWG 18 ... 10 • AWG 18 ... 10						
Versions						
• Single terminals						
- Beige		**8WA1011-1DG11**		1	100 units	1BT
- Blue		**8WA1011-1BG11**		1	50 units	1BT
- Red		**8WA1011-1BG21**		1	50 units	1BT
- Orange		**8WA1011-1BG22**		1	50 units	1BT
- Black		**8WA1011-1BG24**		1	50 units	1BT
• Terminal blocks						
- Beige, 3-pole, width 19.5 mm		**8WA1011-3DG21**		1	10 units	1BT
- Beige, 10-pole, width 65.5 mm, with inscription 1 ... 10		**8WA1011-0DG22**		1	20 units	1BT
- Beige, 10-pole, width 65.5 mm, without inscription		**8WA1011-0DG21**		1	20 units	1BT
 8WA1011-0DG21						
Accessories / Section / Page						
Covers						
• *With lightning symbol, for terminal sizes 4 and 6 mm²* — *Accessories* 14/155		**8WA1811**		1	50 units	1BT
• *White, facility for labeling, for terminal sizes 4 and 6 mm²* — *Accessories* 14/155		**8WA1862**		1	50 units	1BT
• *For connection bars:*						
- *Transparent, for terminal sizes 2.5 ... 6 mm²* — *Accessories* 14/155		**8WA1822-7AX01**		1	10 units	1BT
- *White, facility for labeling, for terminal sizes 2.5 ... 6 mm²* — *Accessories* 14/155		**8WA1822-7AX03**		1	10 units	1BT
Jumper, for terminal size 4 mm² — *Accessories* 14/155		**8WA1822-7VG00**		1	50 units	1BT
Disconnecting links — *Accessories* 14/156		**8WA1865**		1	50 units	1BT
Note						
Between terminals with terminal sizes 2.5 and 6 mm² two 8WH1820 barriers are required.						
• *Insulation plates, for terminal sizes 2.5 ... 6 mm²* — *Accessories* 14/156		**8WA1825**		1	50 units	1BT
• *Connection bars, for terminal size 4 mm²*						
- *For two terminals* — *Accessories* 14/156		**8WA1850**		1	50 units	1BT
- *For three terminals* — *Accessories* 14/156		**8WA1851**		1	50 units	1BT
- *For four terminals* — *Accessories* 14/156		**8WA1852**		1	20 units	1BT
- *For ten terminals* — *Accessories* 14/156		**8WA1853**		1	10 units	1BT
• *Barriers, for terminal sizes 1.5 ... 4 mm²* — *Accessories* 14/156		**8WA1820**		1	50 units	1BT
 8WA1011-1PG01						
PE through-type terminals, terminal size 4 mm² • Green-yellow • Mounting width 7.2 mm • Terminal height 30 mm • Terminal length 51 mm •						
Versions						
• One screw terminal		**8WA1011-1PG01**		1	50 units	1BT
• Two screw terminals		**8WA1011-1PG00**		1	50 units	1BT
Accessories / Section / Page						
Barriers, for terminal sizes 1.5 ... 4 mm² — *Accessories* 14/156		**8WA1820**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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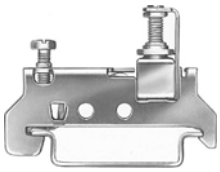
	Version			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
Terminal size 6 mm²									
 8WA1011-1DH11	**Through-type terminals, terminal size 6 mm²** • Rated uninterrupted current 41 A • Rated insulation voltage 800 V • Mounting width 8 mm • Terminal height 33 mm • Terminal length 41 mm • AWG 14 ... 8 • AWG 16 ... 8								
	Versions								
	• Single terminals								
	- Beige				**8WA1011-1DH11**		1	50 units	1BT
	- Blue				**8WA1011-1BH23**		1	50 units	1BT
	- Black				**8WA1011-1BH24**		1	50 units	1BT
 8WA1011-3DH21	• Terminal blocks								
	- Beige, 3-pole, width 24.5 mm				**8WA1011-3DH21**		1	20 units	1BT
	Accessories	Section	Page						
	• *Covers*								
	- *With lightning symbol, for terminal sizes 4 ... 6 mm²*	*Accessories*	14/155		**8WA1811**		1	50 units	1BT
	- *White, facility for labeling, for terminal sizes 4 and 6 mm²*	*Accessories*	14/155		**8WA1862**		1	50 units	1BT
	- *For connection bars, transparent, for terminal sizes 2.5 ... 6 mm²*	*Accessories*	14/155		**8WA1822-7AX01**		1	10 units	1BT
	• *Jumpers, for terminal size 6 mm²*	*Accessories*	14/155		**8WA1822-7VH00**		1	50 units	1BT
	• *Disconnecting links*	*Accessories*	14/156		**8WA1865**		1	50 units	1BT
	Note								
	Between terminals with terminal sizes 2.5 and 6 mm² two 8WH1820 barriers are required.								
	• *Insulation plates, for terminal sizes 2.5 ... 6 mm²*	*Accessories*	14/156		**8WA1825**		1	50 units	1BT
	• *Connection bars, for terminal size 6 mm²*								
	- *For two terminals*	*Accessories*	14/156		**8WA1885**		1	50 units	1BT
	- *For three terminals*	*Accessories*	14/156		**8WA1886**		1	50 units	1BT
	- *For four terminals*	*Accessories*	14/156		**8WA1887**		1	20 units	1BT
	- *For ten terminals*	*Accessories*	14/156		**8WA1888**		1	10 units	1BT
	• *Barriers, for terminal sizes 6 and 16 mm²*	*Accessories*	14/156		**8WA1821**		1	50 units	1BT
 8WA1010-1PH01	**PE through-type terminals, terminal size 6 mm², one screw terminal** • Bare • Mounting width 6 mm • Terminal height 25 mm • Terminal length 44 mm • Also for use as shield terminal				**8WA1010-1PH01**		1	50 units	1BT
	Accessories	Section	Page						
	Barriers, for terminal sizes 6 and 16 mm²	*Accessories*	14/156		**8WA1821**		1	50 units	1BT
 8WA1011-1PH00	**PE through-type terminals, terminal size 6 mm², two screw terminals** • Green-yellow • Mounting width 8 mm • Terminal height 33 mm • Terminal length 51 mm •				**8WA1011-1PH00**		1	50 units	1BT
	Accessories	Section	Page						
	Barriers, for terminal sizes 6 and 16 mm²	*Accessories*	14/156		**8WA1821**		1	50 units	1BT

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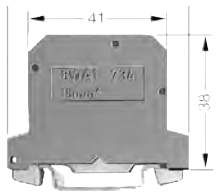
8WA through-type terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 16 mm²							
 8WA1204	**Through-type terminals, terminal size 16 mm²** • Rated uninterrupted current 76 A • Rated insulation voltage 800 V • Mounting width 10 mm • Terminal height 38 mm • Terminal length 41 mm • AWG 12 ... 4 • AWG 14 ... 6						
	Versions						
	• Single terminals						
	- Beige		**8WA1204**		1	20 units	1BT
	- Blue		**8WA1011-1BK11**		1	10 units	1BT
	• Terminal blocks						
 8WA1304	- 3-pole, width 30 mm		**8WA1304**		1	20 units	1BT
	Accessories	Section	Page				
	• *Covers*						
	- *With lightning symbol, for terminal size 16 mm²*	*Accessories*	14/155	**8WA1812**	1	50 units	1BT
	- *White, facility for labeling, for terminal size 16 mm²*	*Accessories*	14/155	**8WA1892**	1	50 units	1BT
	- *For connection bars, transparent, for terminal sizes 16 and 35 mm²*	*Accessories*	14/155	**8WA1822-7AX02**	1	10 units	1BT
	• *Insulation plates, for terminal size 16 and 35 mm²*	*Accessories*	14/156	**8WA1822-7TK00**	1	50 units	1BT
	• *Connection bars, for terminal size 16 mm²*						
	- *For two terminals*	*Accessories*	14/156	**8WA1842**	1	20 units	1BT
	- *For three terminals*	*Accessories*	14/156	**8WA1845**	1	20 units	1BT
	- *For four terminals*	*Accessories*	14/156	**8WA1848**	1	10 units	1BT
	- *For ten terminals*	*Accessories*	14/156	**8WA1802**	1	10 units	1BT
	• *Barriers, for terminal sizes 6 and 16 mm²*	*Accessories*	14/156	**8WA1821**	1	50 units	1BT
 8WA1011-1PK00	**PE through-type terminals and PEN through-type terminals, terminal size 16 mm²** • Green-yellow • For I = 76 A • Mounting width 12 mm • Terminal height 38 mm • Terminal length 53 mm • Two screw terminals •		**8WA1011-1PK00**		1	25 units	1BT
	Accessories	Section	Page				
	Barriers, for terminal sizes 6 and 16 mm²	*Accessories*	14/156	**8WA1821**	1	50 units	1BT
Terminal size 35 mm²							
 8WA1205	**Through-type terminals, terminal size 35 mm²** • Rated uninterrupted current 125 A • Rated insulation voltage 800 V • Mounting width 16 mm • Terminal height 50 mm • Terminal length 53 mm • AWG 10 ... 1 • AWG 12 ... 2						
	Versions						
	• Single terminals						
	- Beige		**8WA1205**		1	20 units	1BT
	- Blue		**8WA1011-1BM11**		1	10 units	1BT
	• Terminal blocks						
 8WA1305	- 3-pole, width 48 mm		**8WA1305**		1	20 units	1BT
	Accessories	Section	Page				
	• *Covers*						
	- *With lightning symbol, for terminal size 35 mm²*	*Accessories*	14/155	**8WA1813**	1	50 units	1BT
	- *White, facility for labeling, for terminal size 35 mm²*	*Accessories*	14/155	**8WA1893**	1	50 units	1BT
	- *For connection bars, transparent, for terminal sizes 16 and 35 mm²*	*Accessories*	14/155	**8WA1822-7AX02**	1	10 units	1BT
	• *Insulation plates, for terminal size 16 and 35 mm²*	*Accessories*	14/156	**8WA1822-7TK00**	1	50 units	1BT
	• *Connection bars, for terminal size 35 mm²*						
	- *For two terminals*	*Accessories*	14/156	**8WA1828**	1	20 units	1BT
	- *For three terminals*	*Accessories*	14/156	**8WA1803**	1	20 units	1BT
	- *For ten terminals*	*Accessories*	14/156	**8WA1804**	1	10 units	1BT
	• *Barriers, for terminal size 35 mm²*	*Accessories*	14/156	**8WA1823**	1	25 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WA1011-1PM00	**PE through-type terminals and PEN through-type terminals, terminal size 35 mm²** • Green-yellow • For I = 125 A • Mounting width 16 mm • Terminal height 50 mm • Terminal length 53 mm • Two screw terminals •		**8WA1011-1PM00**		1	25 units	1BT
	Accessories / Section / Page						
	Barriers, for terminal size 35 mm² / *Accessories* / 14/155		**8WA1823**		1	25 units	1BT
Terminal size 70 mm²							
 8WA1206	**Through-type terminals, terminal size 70 mm²** • Rated uninterrupted current 192 A • Rated insulation voltage 800 V • Mounting width 25 mm • Terminal height 64.5 mm • Terminal length 73.5 mm • AWG 8 ... 3/0 • AWG 8 ... 1/0						
	Versions						
	• Beige		**8WA1206**		1	10 units	1BT
	• Blue		**8WA1011-1BP11**		1	10 units	1BT
	Accessories / Section / Page						
	• *Covers, with lightning symbol, for terminal size 70 mm²* / *Accessories* / 14/155		**8WA1814**		1	50 units	1BT
	• *Connection bars, for terminal size 70 mm², for 2 terminals* / *Accessories* / 14/155		**8WA1216**		1	20 units	1BT
	• *Barriers, for terminal size 70 mm²* / *Accessories* / 14/155		**8WA1824**		1	25 units	1BT
Accessories							
	Covers						
	Versions						
 8WA1810	• With lightning symbol						
	- For terminal sizes 1.5 ... 2.5 mm²		**8WA1810**		1	50 units	1BT
	- For terminal sizes 4 and 6 mm²		**8WA1811**		1	50 units	1BT
	- For terminal size 16 mm²		**8WA1812**		1	50 units	1BT
	- For terminal size 35 mm²		**8WA1813**		1	50 units	1BT
	- For terminal size 70 mm²		**8WA1814**		1	50 units	1BT
 8WA1860	• White, facility for labeling						
	- For terminal sizes 1.5 ... 2.5 mm²		**8WA1860**		1	50 units	1BT
	- For terminal sizes 4 and 6 mm²		**8WA1862**		1	50 units	1BT
	- For terminal size 16 mm²		**8WA1892**		1	50 units	1BT
	- For terminal size 35 mm²		**8WA1893**		1	50 units	1BT
 8WA1822-7AX01	• For connection bars, transparent						
	- For terminal size 2.5 ... 6 mm²		**8WA1822-7AX01**		1	10 units	1BT
	- For terminal sizes 16 and 35 mm²		**8WA1822-7AX02**		1	10 units	1BT
	• White, facility for labeling, for terminal sizes 2.5 ... 6 mm²		**8WA1822-7AX03**		1	10 units	1BT
 8WA1822-7VF01	**Jumpers** For connection bars						
	Versions						
	• For terminal size 2.5 mm²		**8WA1822-7VF01**		1	50 units	1BT
	• For terminal size 4 mm²		**8WA1822-7VG00**		1	50 units	1BT
	• For terminal size 6 mm²		**8WA1822-7VH00**		1	50 units	1BT
 8WA1808	**End retainers, thermoplastic** Width 10 mm		**8WA1808**		1	50 units	1BT

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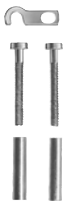
8WA through-type terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8WA1865	**Disconnecting links** Up to 32 A Note Between terminals with terminal sizes 2.5 and 6 mm² two 8WH1820 barriers are required.		**8WA1865**		1	50 units	1BT
 8WA1825	**Insulation plates** Versions						
	• For terminal size 2.5 ... 6 mm²		**8WA1825**		1	50 units	1BT
	• For terminal sizes 16 and 35 mm²		**8WA1822-7TK00**		1	50 units	1BT
 8WA1895	**Connection bars** Versions						
	• For terminal size 2.5 mm²						
	- For two terminals		**8WA1895**		1	50 units	1BT
	- For three terminals		**8WA1896**		1	50 units	1BT
	- For four terminals		**8WA1897**		1	20 units	1BT
	- For ten terminals		**8WA1898**		1	10 units	1BT
	• For terminal size 4 mm²						
	- For two terminals		**8WA1850**		1	50 units	1BT
	- For three terminals		**8WA1851**		1	50 units	1BT
	- For four terminals		**8WA1852**		1	20 units	1BT
	- For ten terminals		**8WA1853**		1	10 units	1BT
	• For terminal size 6 mm²						
	- For two terminals		**8WA1885**		1	50 units	1BT
	- For three terminals		**8WA1886**		1	50 units	1BT
	- For four terminals		**8WA1887**		1	20 units	1BT
	- For ten terminals		**8WA1888**		1	10 units	1BT
	• For terminal size 16 mm²						
	- For two terminals		**8WA1842**		1	20 units	1BT
	- For three terminals		**8WA1845**		1	20 units	1BT
	- For four terminals		**8WA1848**		1	10 units	1BT
	- For ten terminals		**8WA1802**		1	10 units	1BT
	• For terminal size 35 mm²						
	- For two terminals		**8WA1828**		1	20 units	1BT
	- For three terminals		**8WA1803**		1	20 units	1BT
	- For ten terminals		**8WA1804**		1	10 units	1BT
	• For terminal size 70 mm²						
	- For two terminals		**8WA1216**		1	20 units	1BT
 8WA1820	**Barriers** Versions						
	• For terminal sizes 1.5 ... 4 mm²		**8WA1820**		1	50 units	1BT
	• For terminal sizes 6 and 16 mm²		**8WA1821**		1	50 units	1BT
	• For terminal size 35 mm²		**8WA1823**		1	25 units	1BT
	• For terminal size 70 mm²		**8WA1824**		1	25 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

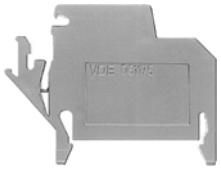
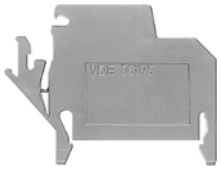
N-conductor isolating terminals permit an insulation test to be performed without disconnecting the neutral conductor according to DIN VDE 0108 and DIN VDE 0100 (Standards for the erection of power installations).

The branch terminals are used for the connection of cables (L), for example for power supplies, to the 6 × 6 mm busbar.

The rated voltage between two branch terminals (1 slide open) is 289 V.

When they are used as shield terminals according to DIN VDE 0160, they provide isolation between the central reference point (shield connection conductor) and the PE conductor.

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • 1 screw terminal and connection to the neutral conductor bar or 6 × 6 mm busbar acc. to DIN 1761 • Insulating body made of blue or beige thermoplastic • Enclosed at both ends						
	Note / Section / Page: *For labeling accessories, see ...* / *Accessories* / 14/175						
	Terminal size 2.5 mm²						
 8WA1011-1NF01	**N-conductor isolating terminals, terminal size 2.5 mm²** • Blue • Rated uninterrupted current 24 A • Rated insulation voltage 500 V • Mounting width 6 mm • Terminal height 35 mm • Terminal length 55 mm • With built-in test socket in the fixed part of the terminal • AWG 22 ... 12 • AWG 22 ... 12		**8WA1011-1NF01**		1	50 units	1BT
	Accessories / Section / Page						
	• *N-busbars, 6 × 6 mm* / *Accessories* / 14/158		**8GF9324-2**		1	10 units	1BP
	• *Label holders* / *Accessories* / 14/158		**3TX4210-0J**		100	100 units	41B
	Terminal size 4 mm²						
 8WA1011-1NG31	**N-conductor isolating terminals, terminal size 4 mm²** • Blue • Rated uninterrupted current 32 A • Rated insulation voltage 500 V • Mounting width 6.5 mm • Terminal height 35 mm • Terminal length 55 mm • With built-in test socket in the fixed part of the terminal • AWG 18 ... 10 • AWG 18 ... 10		**8WA1011-1NG31**		1	50 units	1BT
	Accessories / Section / Page						
	• *Feeder terminals, for N-busbars* / *Accessories* / 14/158		**8WA2867**		1	50 units	1BT
	• *N-busbars, 6 × 6 mm* / *Accessories* / 14/158		**8GF9324-2**		1	10 units	1BP
	• *Label holders* / *Accessories* / 14/158		**3TX4210-0J**		100	100 units	41B

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8WA N-conductor isolating and branch terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Terminal size 6 mm²							
 8WA1011-1NH01	**N-conductor isolating terminals, terminal size 6 mm²** • Blue • Rated uninterrupted current 41 A • Rated insulation voltage 500 V • Mounting width 8 mm • Terminal height 35 mm • Terminal length 55 mm • With built-in test socket in the fixed part of the terminal • AWG 14 ... 8 • AWG 14 ... 8		**8WA1011-1NH01**		1	50 units	1BT
	Accessories — Section — Page						
	• *N-busbars, 6 × 6 mm* — *Accessories* 14/158		**8GF9324-2**		1	10 units	1BP
	• *Label holders* — *Accessories* 14/158		**3TX4210-0J**		100	100 units	41B
Terminal size 16 mm²							
 8WA1604	**N-conductor isolating terminals, terminal size 16 mm²** • Blue • Rated uninterrupted current 76 A • Rated insulation voltage 500 V • Mounting width 10 mm • Terminal height 35 mm • Terminal length 55 mm • AWG 12 ... 4		**8WA1604**		1	50 units	1BT
	Accessories — Section — Page						
	• *Feeder terminals, for N-busbars* — *Accessories* 14/158		**8WA2868**		1	50 units	1BT
	• *N-busbars, 6 × 6 mm* — *Accessories* 14/158		**8GF9324-2**		1	10 units	1BP
	• *Label holders* — *Accessories* 14/158		**3TX4210-0J**		100	100 units	41B
Accessories							
 8WA2870 / 868 / 867	**Feeder terminals, for N-busbars** • 6 × 6 mm and 10 × 3 mm • Bare Versions • Rated uninterrupted current 32 A, for connection of up to 4 mm² • Rated uninterrupted current 76 A, for connection of up to 25 mm² • Rated uninterrupted current 125 A, for connection of up to 35 mm²		**8WA2867** **8WA2868** **8WA2870**		1 1 1	50 units 50 units 50 units	1BT 1BT 1BT
 8GF9324-2	**N-busbars, 6 × 6 mm** • Rated uninterrupted current 125 A • 1109 mm long • For four-field Note Prices apply for orders above € 25.00. For orders below € 25.00 a net processing charge of € 2.50 will be added.		**8GF9324-2**		1	10 units	1BP
	Label holders		**3TX4210-0J**		100	100 units	41B

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The Insta or three-tier terminals incorporate up to three different terminal functions in one insulating body of 6 mm width. The width of 3 Insta terminals corresponds to the modular width of 18 mm standardized in distribution board assembly. Tools are required to remove the terminals from the support rail.

All clamping points for incoming and outgoing cables have a cutout for an 8WA8 8.. inscription label. The protective conductor connections are already marked green-yellow and the neutral conductor connections blue.

The N-busbar has the same position for Insta terminals and N-conductor isolating terminals. This allows, for example, the use of a 16 mm^2 N-conductor isolating terminal as an infeed for the N-busbar.

8WA1011-3JF16, -3JF17 and -3JF18 allow the N-busbar to be routed with a mounting depth of 42.5 mm.

PE, L, NT Insta terminal

The 8WA1011-3JF20 terminal is the basic version for AC circuits. It comprises:

- Protective conductor connection
- Through-type connection for one phase conductor
- Neutral conductor connection that can be isolated from the 6 × 6 mm N-busbar.

PE, L, N Insta terminal

If no neutral conductor isolation is required, the 8WA1011-3JF17 terminal is used:

- Protective conductor connection
- Through-type connection for one phase conductor
- Through-type connection for the neutral conductor

PE, L, L Insta terminal

Design of 8WA1011-3JF16 terminal as previous version. Instead of the through-type connection for the neutral conductor, a through-type connection for a second phase conductor is fitted.

L, L Insta terminal

The 8AW1011-3JF18 terminal contains two through-type connections for two phase conductors. These are generally used for three-phase outgoing lines.

Selection and ordering data

Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					

General details
- Thermoplastic insulating body
- Screw terminal at both ends
- Enclosed at both ends
- Neutral terminal, 6 × 6 mm neutral conductor connection

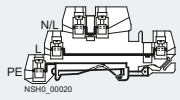
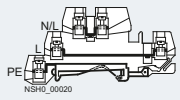
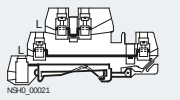
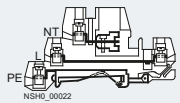
Note	Section	Page
For labeling accessories, see ...	*Accessories*	14/175

Terminal size 2.5 mm^2



8WA1011-3JF16

Terminal size 2.5 mm^2
- Rated uninterrupted current 24 A
- Rated insulation voltage
  - 400 V between phase conductors
  - 250 V between phase and protective conductors and for neutral isolating distance
- Mounting width 6 mm
- Terminal height 42.5 mm
- Terminal length 87 mm
- Screw terminals at both ends
- AWG 22 ... 12

Circuit diagram	Type					
	PE, L, L	**8WA1011-3JF16**		1	50 units	1BT
	PE, L, N	**8WA1011-3JF17**		1	50 units	1BT
	L, L	**8WA1011-3JF18**		1	50 units	1BT
	PE, L, NT	**8WA1011-3JF20**		1	50 units	1BT

Accessories	Section	Page				
Barriers, for Insta terminals, terminal size 2.5 mm^2 and measuring transformer terminals, terminal size 6 mm^2	*Accessories*	14/160	**8WA1822-7TH00**	1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8WA Insta or three-tier terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
	Covers Up to three terminals side-by-side						
	Versions						
	• With lightning symbol, for terminal sizes 4 and 6 mm²		**8WA1811**		1	50 units	1BT
	• White, facility for labeling, for terminal sizes 4 and 6 mm²		**8WA1862**		1	50 units	1BT
	• For connection bars, for terminal sizes 2.5 ... 6 mm²						
	- Transparent		**8WA1822-7AX01**		1	10 units	1BT
	- White		**8WA1822-7AX03**		1	10 units	1BT
 8WA2870 / 868 / 867	**Feeder terminals, for N-busbars** • 6 × 6 mm and 10 × 3 mm • Bare						
	Versions						
	• Connection up to 4 mm²		**8WA2867**		1	50 units	1BT
	• Connection up to 25 mm²		**8WA2868**		1	50 units	1BT
	• Connection up to 35 mm²		**8WA2870**		1	50 units	1BT
 8WA1808	**End retainers, thermoplastic** Width 10 mm		**8WA1808**		1	50 units	1BT
	Terminal strip labels • Suitable for 8WA1808 end retainer • Blank (WIN 67)		**8WA8212-0AA65**		100	380 units	1BT
 8WA1857	**Insulation carriers, for mounting insulated support rails**		**8WA1857**		1	20 units	1BT
	Labels, blank • Suitable for plotting • Label size 5 × 7 mm (WIN 68)		**8WA8348-2AY**		100	136 units	1BT
 8GF9324-2	**N-busbars, 6 × 6 mm** • Rated uninterrupted current 125 A • 1109 mm long • For four-field		**8GF9324-2**		1	10 units	1BP
	Note						
	Prices apply for orders above € 25.00. For orders below € 25.00 a net processing charge of € 2.50 will be added.						
	Connection bars, for Insta terminals						
	Versions						
	• For two terminals		**8WA1822-7VF02**		1	50 units	1BT
	• For three terminals		**8WA1822-7VF03**		1	50 units	1BT
	• For ten terminals		**8WA1822-7VF10**		1	10 units	1BT
	Barriers, for Insta terminals, terminal size 2.5 mm² and measuring transformer terminals, terminal size 6 mm²		**8WA1822-7TH00**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

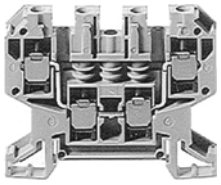
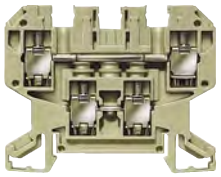
Two-tier terminals are a compact form of the terminal blocks. They are therefore open on one side. They can contain two connecting cables with two connections each or they can be laid out as terminal blocks with four connections on the same potential.

An advantage is the standardized front for mounting, bridging and labeling.

Technical specifications

	Rated voltage	
	AC	**DC**
Between connection bars		
• With insulation plate	400 V	450 V
• With end plate or barrier	800 V	900 V
• With disconnecting link opened	500 V	600 V
For alternately bent soldering tags	400 V	450 V
For adjacent terminals with soldering tags and insulated plugs	250 V	300 V

Selection and ordering data

Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
General details • Thermoplastic insulating body • Screw terminal at both ends						
Note / Section / Page						
For labeling accessories, see ... / *Accessories* / 14/175						
Terminal size 4 mm²						
 8WA1011-6DG11 **Two-tier terminals, terminal size 4 mm²** • Rated uninterrupted current 32 A • Rated insulation voltage 690 V (with end plate 800 V) • Mounting width 6.5 mm • Terminal height 45 mm • Terminal length 64 mm • AWG 18 ... 10 • AWG 18 ... 10						
Versions						
• Beige						
- 1-pole		**8WA1011-6DG11**		1	50 units	1BT
- 2-pole, with two isolated connections		**8WA1011-2DG11**		1	50 units	1BT
• Blue						
- 1-pole		**8WA1011-6BG11**		1	50 units	1BT
- 2-pole, with two isolated connections		**8WA1011-2BG11**		1	50 units	1BT
 8WA1011-2DG11						
Accessories / Section / Page						
Covers						
• *With lightning symbol, for terminal sizes 4 and 6 mm²* / *Accessories* / 14/162		**8WA1811**		1	50 units	1BT
• *White, facility for labeling, for terminal sizes 4 and 6 mm²* / *Accessories* / 14/162		**8WA1862**		1	50 units	1BT
• *For connection bars, for terminal sizes 2.5 ... 6 mm², transparent* / *Accessories* / 14/162		**8WA1822-7AX01**		1	10 units	1BT
Jumpers						
• *For upper tier of 2-pole terminals* / *Accessories* / 14/162		**8WA1822-7VG00**		1	50 units	1BT
• *For lower tier of 1 and 2-pole terminals* / *Accessories* / 14/162		**8WA1822-7VG01**		1	50 units	1BT
End plates / *Accessories* / 14/162		**8WA1817**		1	50 units	1BT
Disconnecting links / *Accessories* / 14/162		**8WA1865**		1	50 units	1BT
Insulation plates						
• *For upper tier of 2-pole terminals* / *Accessories* / 14/162		**8WA1825**		1	50 units	1BT
• *For lower tier of 1 and 2-pole terminals* / *Accessories* / 14/162		**8WA1825**		1	50 units	1BT
Connection bars						
• *For upper tier of 2-pole terminals*						
- *For two terminals* / *Accessories* / 14/162		**8WA1850**		1	50 units	1BT
- *For three terminals* / *Accessories* / 14/162		**8WA1851**		1	50 units	1BT
- *For four terminals* / *Accessories* / 14/162		**8WA1852**		1	20 units	1BT
- *For ten terminals* / *Accessories* / 14/162		**8WA1853**		1	10 units	1BT
• *For lower tier of 1 and 2-pole terminals*						
- *For two terminals* / *Accessories* / 14/162		**8WA1835**		1	50 units	1BT
- *For ten terminals* / *Accessories* / 14/162		**8WA1838**		1	10 units	1BT
Barriers / *Accessories* / 14/162		**8WA1823**		1	25 units	1BT

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8WA two-tier terminals

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories							
	Covers						
	Versions						
 8WA1811	• With lightning symbol, for terminal sizes 4 and 6 mm²		**8WA1811**		1	50 units	1BT
 8WA1862	• White, facility for labeling, for terminal sizes 4 and 6 mm²		**8WA1862**		1	50 units	1BT
 8WA1822-7AX01	• For connection bars, for terminal sizes 2.5 ... 6 mm², transparent		**8WA1822-7AX01**		1	10 units	1BT
	Jumpers • For connection bars • For terminal size 4 mm²						
	Versions						
	• For upper tier of 2-pole terminals		**8WA1822-7VG00**		1	50 units	1BT
	• For lower tier of 1 and 2-pole terminals		**8WA1822-7VG01**		1	50 units	1BT
	End plates, for two-tier terminals		**8WA1817**		1	50 units	1BT
 8WA1865	**Disconnecting links** For upper tier of 2-pole terminals		**8WA1865**		1	50 units	1BT
	Note						
	The terminals must be fitted with end plates and must be fitted with the end plates facing each other.						
 8WA1825	**Insulation plates, for terminal sizes 2.5 ... 6 mm²**		**8WA1825**		1	50 units	1BT
	Connection bars						
	Versions						
	• For upper tier of 2-pole terminals						
	- For two terminals		**8WA1850**		1	50 units	1BT
	- For three terminals		**8WA1851**		1	50 units	1BT
	- For four terminals		**8WA1852**		1	20 units	1BT
	- For ten terminals		**8WA1853**		1	10 units	1BT
	• For lower tier of 1 and 2-pole terminals						
	- For two terminals		**8WA1835**		1	50 units	1BT
	- For ten terminals		**8WA1838**		1	10 units	1BT
 8WA1823	**Barriers**		**8WA1823**		1	25 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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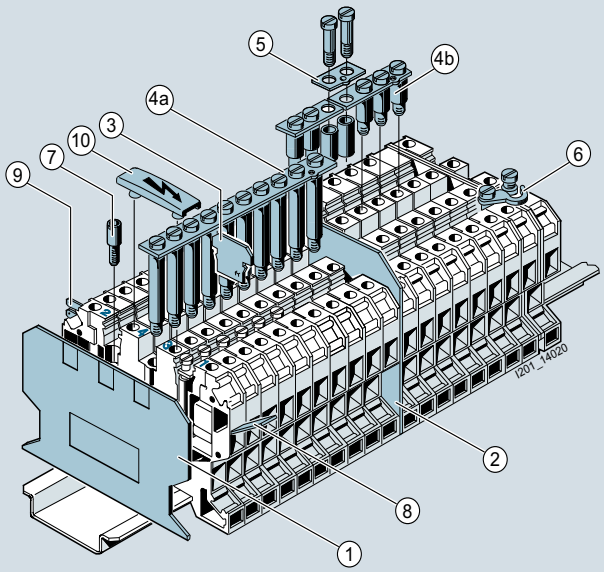
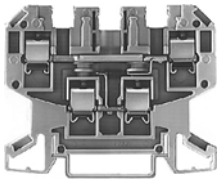
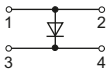
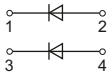
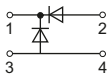
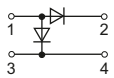
Design



1 End plate
2 Barrier
3 Insulation plate
4a Connection bar for lower tier
4b Connection bar for upper tier
5 Link for connection bar
6 Disconnecting link
7 Test socket
8 Soldering tag
9 Flat connector, slotted
10 Cover with lightning symbol

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • Thermoplastic insulating body • Screw terminal at both ends • Open on one side • Beige						
	Note / Section / Page *For labeling accessories, see ...* / *Accessories* / 14/175						
Terminal size 4 mm²							
 8WA1011-6EG20	**Diode terminals, terminal size 4 mm²** • Rated insulation voltage 250 V • Mounting width 6.5 mm • Terminal height 45 mm • Terminal length 64 mm • AWG 18 ... 10 • Jumpering not supported						
	Type						
	• Rated uninterrupted current 32/1 A		**8WA1011-6EG20**		1	10 units	1BT
	• Rated uninterrupted current 1 A		**8WA1011-6EG22**		1	10 units	1BT
	• Rated uninterrupted current 32/1 A		**8WA1011-6EG23**		1	10 units	1BT
	• Rated uninterrupted current 32/1 A		**8WA1011-6EG24**		1	10 units	1BT
	Accessories / Section / Page						
	End plates, for two-tier terminals / *Accessories* / 14/164		**8WA1817**		1	50 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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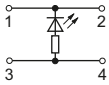
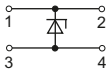
8WA two-tier terminals with electronic components

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Terminals with red LED, terminal size 4 mm² • Rated uninterrupted current 32 A • Rated insulation voltage 24 V DC • Mounting width 6.5 mm • Terminal height 45 mm • Terminal length 64 mm • cULus AWG 18 ... 10						
	Type						
	• Without diode for voltage limitation		**8WA1011-6EG25**		1	10 units	1BT
	**Zener diode terminals, terminal size 4 mm²** • Mounting width 6.5 mm • Terminal height 45 mm • Terminal length 64 mm • cULus AWG 18 ... 10 • Let-through current 0.25 A • Avalanche voltage U_Z = 2.4 V, ±5%		**8WA1011-6EG44**		1	10 units	1BT
	Accessories — Section — Page						
	End plates, for two-tier terminals — *Accessories* — 14/164		**8WA1817**		1	50 units	1BT
Accessories							
	End plates, for two-tier terminals		**8WA1817**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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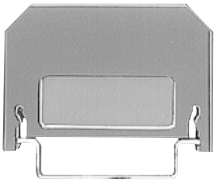
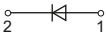
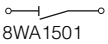
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • Thermoplastic insulating body • Enclosed at both ends Note: *For labeling accessories, see ...* — Section: *Accessories* — Page: 14/175						
Terminal size 2.5 mm²							
 8WA1011-1EF20  8WA1011-1EF20	**Diode terminals, terminal size 2.5 mm²** • Rated insulation voltage 250 V U_{RRM} • Mounting width 6 mm • Terminal height 26 mm • Terminal length 41 mm • Screw terminals at both ends with test options for Ø 2.3 mm test plug • Rated uninterrupted current 1 A • Peak blocking voltage 1000 V Accessories: • *Barriers, for terminal sizes 1.5 ... 4 mm²* — Section: *Accessories* — Page: 14/165		**8WA1011-1EF20** **8WA1820**		1 1	5 units 50 units	1BT 1BT
 8WA1501  8WA1501	**Through-type terminals, terminal size 2.5 mm² with sectionalizing feature** • Rated uninterrupted current 10 A • Rated insulation voltage 380 V AC, 450 V DC (with alternate outgoing soldering tags) - Open isolating distance 380 V AC, 450 V DC - For use of barriers up to 750 V AC, 900 V DC • Mounting width 6 mm • Terminal height 29 mm • Terminal length 41 mm • With 2 holes for Ø 2.3 mm test plug • With screw terminals at both ends Note: Through-type terminals with sectionalizing feature allow easy isolation of the current path without disconnection of conductors. The sockets of the terminal screws allow actions, such as the measuring of the loop resistance or connection of an ammeter to the circuit. The use of connecting combs reduces the conductor cross-section by one level. Accessories: • *Barriers, for terminal sizes 1.5 ... 4 mm²* — Section: *Accessories* — Page: 14/165		**8WA1501** **8WA1820**		1 1	10 units 50 units	1BT 1BT
Accessories							
 8WA1820	**Barriers, for terminal sizes 1.5 ... 4 mm²**		**8WA1820**		1	50 units	1BT

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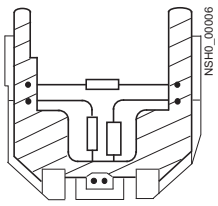
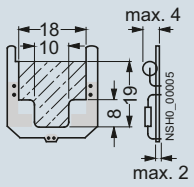
8WA terminals for components

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • Terminals for components • Screw terminal at both ends for 2 conductors each • Plugs with PCB for components • Enclosed at both ends						
	Note: *For labeling accessories, see ...* — Section: *Accessories* — Page: 14/175						
Terminal size 1.5 mm²							
 8WA1011-1EE00	**Terminals for components, terminal size 1.5 mm²** (enclosure only) • Rated uninterrupted current 6.3 A • Rated insulation voltage 500 V • Mounting width 10 mm • Terminal height 40 mm • Terminal length 57 mm • For self-fitting with components • To next terminal, determined internally through customer's components		**8WA1011-1EE00**		1	5 units	1BT
 8WA1822-7EE00	**Plugs for components, terminal size 1.5 mm²** • Rated uninterrupted current 6.3 A • Rated insulation voltage 500 V • Mounting width 10 mm • Plug height 29 mm • Plug length 41 mm • With PCB and inscription label (20 × 9 mm)		**8WA1822-7EE00**		1	1 unit	1BT
 Plugs, fully equipped, example							

Dimensional drawings



Space for components

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

8WA1011-1SF12 fuse terminals are used to protect control circuits against short-circuits.

The fuse terminals are intended for 5 × 20 mm and 5 × 25 mm G fuse links up to 6.3 A and 250 V and for isolating blades up to 16 A and 800 V and have a mounting for a replacement fuse link.

The fuse terminals are suitable for fuse links, sizes ¼" x 1", ¼" x $^{11}/_{4}$" (6.3 × 32 mm) up to 6.3 A and 250 V.

Fuse terminals are positive opening fuse-disconnectors.

The fuse links must be replaced at zero voltage. Finger safety is ensured in both closed and open positions.

The LED indicates the status of the disconnected fuse (residual current from 2 mA to 5 mA), but not if the plug is removed (floating).

The double connection is designed so that two conductors with different cross-sections can also be securely connected.

The fixing base of the G fuse terminal allows both centered and recessed mounting, allowing the unhindered routing of a 6 × 6 mm N-busbar. The G fuse terminal can therefore be joined into a single group with the other terminals of a branch.

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • With thermoplastic insulating body • Screw terminal at both ends for 2 conductors each • Enclosed at both ends						
	Note: *For labeling accessories,* see ... — Section: *Accessories* — Page: 14/175						
Terminal size 1.5 mm²							
 8WA1011-1SF12	**Fuse terminals, terminal size 1.5 mm²** • Rated uninterrupted current 6.3 A when using fuses • Rated uninterrupted current 16 A when using the isolating blade • Rated uninterrupted voltage 250 V when using fuses • Rated insulation voltage 800 V when using the isolating blade • Mounting width 10 mm • Terminal height 42 mm • Terminal length 57 mm • Open isolating distance 500 V • AWG 18 ... 14 • AWG 18 ... 14						
 8WA1011-1SF13	Versions						
	• For G-fuse						
	- Without LED		**8WA1011-1SF12**		1	10 units	1BT
	- With LED 24 V AC/DC		**8WA1011-1SF13**		1	10 units	1BT
	- With LED 230 V AC/DC		**8WA1011-1SF15**		1	10 units	1BT
	• For inch fuse						
	- Without LED		**8WA1011-1SF30**		1	10 units	1BT
	- With LED 24 V AC/DC		**8WA1011-1SF31**		1	10 units	1BT
	- With LED, 120 V AC/110 V DC		**8WA1011-1SF32**		1	10 units	1BT
Accessories							
 8WA1822-7EF16	**G fuse links** DIN 41660						
	Versions						
	• Quick-response, high breaking capacity						
	- Rated uninterrupted current 1 A		**8WA1822-7EF16**		1	10 units	1BT
	- Rated uninterrupted current 1.6 A		**8WA1822-7EF18**		1	10 units	1BT
	- Rated uninterrupted current 2.5 A		**8WA1822-7EF21**		1	10 units	1BT
	- Rated uninterrupted current 4 A		**8WA1822-7EF23**		1	10 units	1BT
	- Rated uninterrupted current 6.3 A		**8WA1822-7EF25**		1	10 units	1BT
	• Slow-response, low breaking capacity						
	- Rated uninterrupted current 1 A		**8WA1822-7EF76**		1	10 units	1BT
	- Rated uninterrupted current 1.6 A		**8WA1822-7EF78**		1	10 units	1BT
	- Rated uninterrupted current 2.5 A		**8WA1822-7EF81**		1	10 units	1BT
	- Rated uninterrupted current 4 A		**8WA1822-7EF83**		1	10 units	1BT
	- Rated uninterrupted current 6.3 A		**8WA1822-7EF85**		1	10 units	1BT
 8WA1891	**Isolating blades** 5 × 25 mm		**8WA1891**		1	10 units	1BT

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • With thermoplastic insulating body • Enclosed at both ends						
	Note: *For labeling accessories, see ...* — Section: *Accessories* — Page: 14/175						
Accessories							
 8WA1811	**Covers**						
	Versions						
	• With lightning symbol						
	- For terminal sizes 1 ... 2.5 mm²		**8WA1810**		1	50 units	1BT
	- For terminal size 6 mm²		**8WA1811**		1	50 units	1BT
	• White, facility for labeling						
	- For terminal sizes 1 ... 2.5 mm²		**8WA1860**		1	50 units	1BT
	- For terminal size 6 mm²		**8WA1862**		1	50 units	1BT
 8WA1822-7VH12	**Connection bars, for *through-type terminals, terminal size 6 mm², with plug-in connection***						
	Versions						
	• For two terminals		**8WA1822-7VH12**		1	50 units	1BT
	• For ten terminals		**8WA1822-7VH20**		1	10 units	1BT
 8WA1821	**Barriers**						
	Versions						
	• For terminal sizes 1.5 ... 4 mm²		**8WA1820**		1	50 units	1BT
	• For terminal sizes 6 ... 16 mm²		**8WA1821**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Measuring transformer terminals can be used for testing and isolating circuits in switchboards, control rooms, etc. without interrupting operation.

The isolating and instrument isolating terminals contain an isolating device in the through-type connection. The isolating device permits electrical separation between the input and output of a terminal.

Test sockets for plugs with a diameter of 4 mm can be screwed into the front side of the through-type and isolating terminals. The rated insulation voltage between colored test sockets is 125 V. The rated insulation voltage between test sockets and connection bars not connected to the terminal is 16 V (circuit 3, terminals 3 and 5).

Two adjacent terminals can be connected in parallel with the disconnecting link. The disconnecting link can be operated in any position of the isolating device.

Instrument set for one transformer

The instrument set for one transformer makes the basic circuit of the transformer terminal blocks clear. This basic circuit is also included in much larger instrument sets, which is extended by adding on equivalent circuits. Links between the basic circuits provide many kinds of testing facilities, parallel outgoing lines to other measuring devices, connection of test equipment, etc.

Instrument set for three transformers

The simplest version of an instrument set for a three-phase circuit consists of three basic circuits strung together without any continuing links or extensions. Instead of isolating terminals 1, 3 and 5, less expensive through-type terminals can also be used. On the other hand, it is also possible to use instrument isolating terminals for this purpose so that the terminal versions are all the same.

Instrument set for three transformers with neutral point

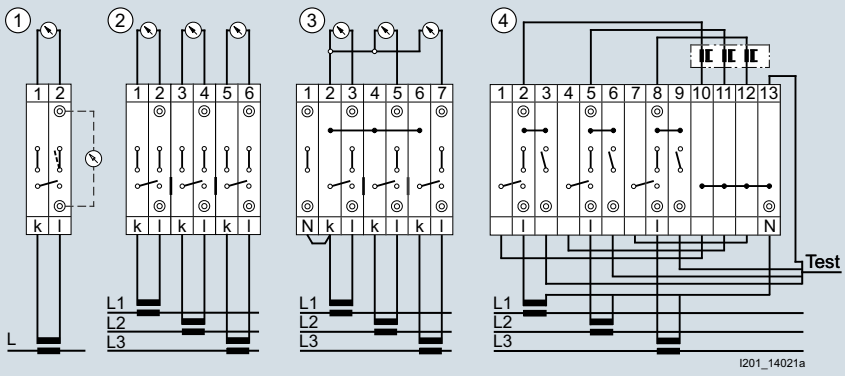
The instrument set with a neutral point is an extension of the previous circuit. Four instead of six cables are sufficient for connecting it with the measuring devices. The neutral point is produced on the measuring instruments on the one hand, and using a shortened 8WA1822-7VH10 connection bar on the other. The instrument isolating terminal 1 is connected to the neutral point using a connecting comb.

Note

The introduction of the 8WA1011-1MH10 through-type terminals and their associated disconnecting links has made it considerably easier to configure terminal sets for current transformers. Instead of the 12 isolating or instrument isolating terminals used previously, now only 4 instrument isolating terminals and 3 through-type terminals are required.

Instrument set with test facility

This instrument set represents a significant enhancement over previous types. In normal operation, terminals 2, 5 and 8 are closed. For testing a measuring instrument (e.g. a plotter), these terminals are opened and terminals 3, 6 and 9 are closed in order to feed in a test signal. The transformers first have to be short-circuited with the disconnecting links between terminals 1-2, 4-5 and 7-8. Wire jumpers connect terminals 1, 4 and 7 with the neutral point. It is formed in terminals 10, 11, 12 and 13 with an 8WA1887 connection bar.



Test socket
Connection bar
Insulation plate
Disconnecting link (closed)
Connecting comb, 2-pole

(1) Instrument set for 1 transformer
(2) Instrument set for 3 transformers
(3) Instrument set for 3 transformers with neutral point
(4) Instrument set with testing facility

Type	Number required for			
	(1)	(2)	(3)	(4)
8WA1011-1MH10			3	7
8WA1011-1MH11	1	3		3
8WA1011-1MH15	1	3	4	3
8WA1825 a)		2	2	
8WA1885				3
8WA1887				1
8WA1822-7VH10			1 b)	
8WA1822-7VH01	1	3	3	3
8WA1822-7PH00				4
8WA1822-7VH22			1	

a) In some cases additionally required between instrument sets
b) Shortened

Connection option for measuring transformer terminals (instrument sets)

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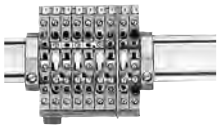
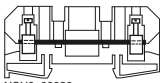
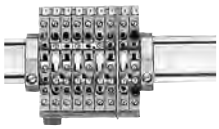
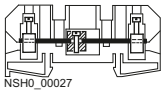
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • With thermoplastic insulating body • Screw terminals at both ends and two holes for test sockets for Ø 4 mm test plug, insulated at both ends • Enclosed at both ends						
	Note / Section / Page: *For labeling accessories, see ...* — *Accessories* — 14/175						
	Terminal size 6 mm²						
 8WA1011-1MH10	**Through-type terminals, terminal size 6 mm²** • Rated uninterrupted current 41 A • Rated insulation voltage 500 V • Mounting width 8 mm • Terminal height 33 mm • Terminal length 83 mm • Without test sockets • AWG 14 ... 8 • AWG 16 ... 10		**8WA1011-1MH10**		1	20 units	1BT
 Typical circuit diagram  NSH0_00026 8WA1011-1MH10	Accessories / Section / Page						
	Covers, for connection bars						
	• *Transparent* — *Accessories* — 14/171		**8WA1822-7AX01**		1	10 units	1BT
	Test sockets						
	• *Rated voltage between test socket and bypassed connection bar: 16 V, recessed* — *Accessories* — 14/171		**8WA1822-7PH00**		1	50 units	1BT
	Insulation plates, for terminal sizes 2.5 ... 6 mm² — *Accessories* — 14/171		**8WA1825**		1	50 units	1BT
	Connecting combs						
	• *10-pole for measuring transformer terminals, can be shortened as required* — *Accessories* — 14/171		**8WA7163**		1	10 units	1BT
	• *2-pole* — *Accessories* — 14/171		**8WA1822-7VH22**		1	10 units	1BT
	Connection bars, for terminal size 6 mm²						
	• *Two terminals* — *Accessories* — 14/171		**8WA1885**		1	50 units	1BT
	• *Three terminals* — *Accessories* — 14/171		**8WA1886**		1	50 units	1BT
	• *Four terminals* — *Accessories* — 14/171		**8WA1887**		1	20 units	1BT
	• *Ten terminals* — *Accessories* — 14/171		**8WA1888**		1	10 units	1BT
	• *Unmounted for ten terminals* — *Accessories* — 14/171		**8WA1822-7VH10**		1	50 units	1BT
	Barriers, for Insta terminals, terminal size 2.5 mm² and measuring transformer terminals, terminal size 6 mm² — *Accessories* — 14/171		**8WA1822-7TH00**		1	50 units	1BT
 8WA1011-1MH11	**Isolating terminals, terminal size 6 mm²** • Rated uninterrupted current 41 A • Rated insulation voltage 500 V • Mounting width 8 mm • Terminal height 33 mm • Terminal length 83 mm • Without test sockets • AWG 14 ... 8 • AWG 16 ... 10		**8WA1011-1MH11**		1	20 units	1BT
 Typical circuit diagram  NSH0_00027 8WA1011-1MH11	Accessories / Section / Page						
	Covers, for connection bars						
	• *Transparent* — *Accessories* — 14/171		**8WA1822-7AX01**		1	10 units	1BT
	• *White, facility for labeling* — *Accessories* — 14/171		**8WA1822-7AX03**		1	10 units	1BT
	Test sockets						
	• *Rated voltage between test socket and bypassed connection bar: 16 V, recessed* — *Accessories* — 14/171		**8WA1822-7PH00**		1	50 units	1BT
	Connecting combs						
	• *10-pole for measuring transformer terminals, can be shortened as required* — *Accessories* — 14/171		**8WA7163**		1	10 units	1BT
	• *2-pole* — *Accessories* — 14/171		**8WA1822-7VH22**		1	10 units	1BT
	Connection bars, for terminal size 6 mm²						
	• *Two terminals* — *Accessories* — 14/171		**8WA1885**		1	50 units	1BT
	• *Three terminals* — *Accessories* — 14/171		**8WA1886**		1	50 units	1BT
	• *Four terminals* — *Accessories* — 14/171		**8WA1887**		1	20 units	1BT
	• *Ten terminals* — *Accessories* — 14/171		**8WA1888**		1	10 units	1BT
	• *Unmounted for ten terminals* — *Accessories* — 14/171		**8WA1822-7VH10**		1	50 units	1BT
	Barriers, for Insta terminals, terminal size 2.5 mm² and measuring transformer terminals, terminal size 6 mm² — *Accessories* — 14/171		**8WA1822-7TH00**		1	50 units	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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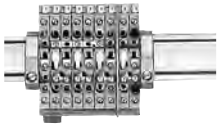
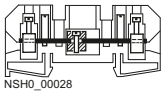
	Version			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
 8WA1011-1MH15	**Instrument isolating terminals, terminal size 6 mm²** • Mounting width 8 mm • Terminal height 33 mm • Terminal length 83 mm • Open isolating distance • With recessed test sockets • AWG 14 ... 8 • AWG 16 ... 10				**8WA1011-1MH15**		1	20 units	1BT
 Typical circuit diagram	Accessories	Section	Page						
	Covers, for connection bars								
	• *Transparent*	*Accessories*	14/171		**8WA1822-7AX01**		1	10 units	1BT
	Test sockets								
	• *Rated voltage between test socket and bypassed connection bar: 16 V, recessed*	*Accessories*	14/171		**8WA1822-7PH00**		1	50 units	1BT
	Insulation plates, for terminal sizes 2.5 ... 6 mm²	*Accessories*	14/171		**8WA1825**		1	50 units	1BT
	Connecting combs								
	• *10-pole for measuring transformer terminals, can be shortened as required*	*Accessories*	14/171		**8WA7163**		1	10 units	1BT
	• *2-pole*	*Accessories*	14/171		**8WA1822-7VH22**		1	10 units	1BT
 NSH0_00028 8WA1011-1MH15	*Connection bars, for terminal size 6 mm²*								
	• *Two terminals*	*Accessories*	14/171		**8WA1885**		1	50 units	1BT
	• *Three terminals*	*Accessories*	14/171		**8WA1886**		1	50 units	1BT
	• *Four terminals*	*Accessories*	14/171		**8WA1887**		1	20 units	1BT
	• *Ten terminals*	*Accessories*	14/171		**8WA1888**		1	10 units	1BT
	• *Unmounted for ten terminals*	*Accessories*	14/171		**8WA1822-7VH10**		1	50 units	1BT
	Barriers, for Insta terminals, terminal size 2.5 mm² and measuring transformer terminals, terminal size 6 mm²	*Accessories*	14/171		**8WA1822-7TH00**		1	50 units	1BT
Accessories									
	Covers, for connection bars For through-type terminals, sizes 2.5 ... 6 mm²								
	Versions								
	• Transparent				**8WA1822-7AX01**		1	10 units	1BT
	• White, facility for labeling				**8WA1822-7AX03**		1	10 units	1BT
 8WA1822-7PH00	**Test sockets** Ø 4 mm								
	Versions								
	• Rated voltage between test socket and bypassed connection bar: 16 V, recessed				**8WA1822-7PH00**		1	50 units	1BT
 8WA1822-7VH01	**Disconnecting links** Rated insulation voltage with disconnecting link open according to DIN VDE 0110: 125 V, size C or 250 V size B				**8WA1822-7VH01**		1	50 units	1BT
 8WA1825	**Insulation plates, for terminal sizes 2.5 ... 6 mm²**				**8WA1825**		1	50 units	1BT
 8WA7163	**Connecting combs** For inserting in the clamping points								
	Versions								
	• 10-pole for measuring transformer terminals, can be shortened as required				**8WA7163**		1	10 units	1BT
	• 2-pole				**8WA1822-7VH22**		1	10 units	1BT
 8WA1885	**Connection bars, for terminal size 6 mm²**								
	Versions								
	• Two terminals				**8WA1885**		1	50 units	1BT
	• Three terminals				**8WA1886**		1	50 units	1BT
	• Four terminals				**8WA1887**		1	20 units	1BT
	• Ten terminals				**8WA1888**		1	10 units	1BT
	• Unmounted for ten terminals				**8WA1822-7VH10**		1	50 units	1BT
 8WA1822-7TH00	**Barriers, for Insta terminals, terminal size 2.5 mm² and measuring transformer terminals, terminal size 6 mm²**				**8WA1822-7TH00**		1	50 units	1BT

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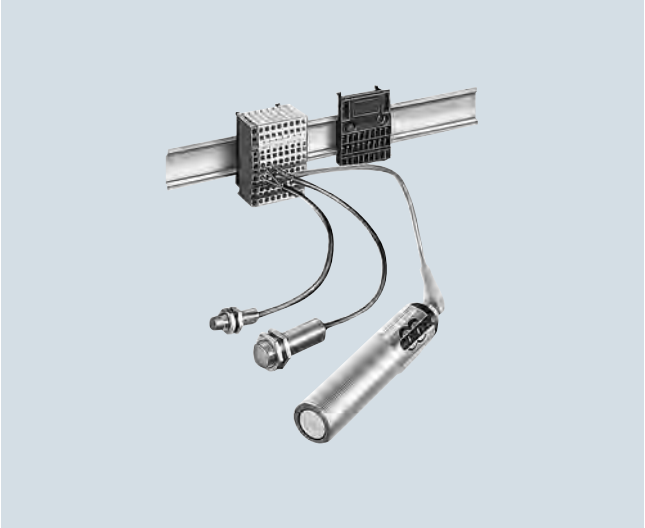
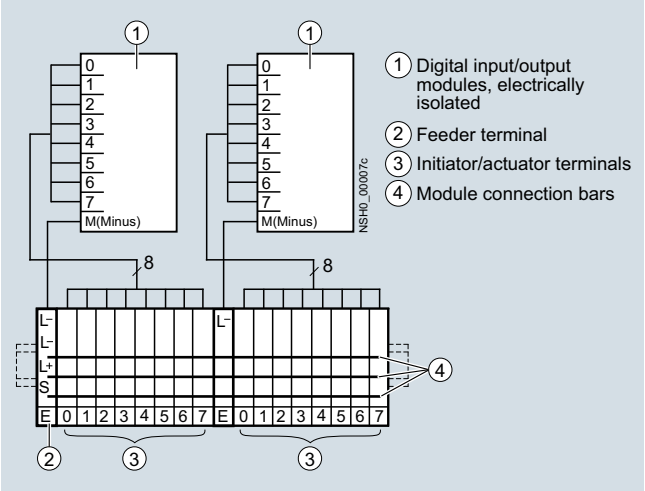
Overview

- Fast and cost-effective connection of signal transmitters to the controller
- Only 5 mm wide but still fitted with connection facility for proximity switches with up to three conductors plus shielding
- Connection is clear, simple and safe due to:
  - Front connection
  - Color coding of clamping points
  - Conductors from only 0.08 ... 1.5 mm^2 without end sleeves that are secured using spring-loaded terminals
- LEDs make the switch states or the application of voltage easy to see. It is no longer necessary to test with measuring instruments.
- Connection modules cut wiring requirements and time because the potentials of the terminals (L+, L- and S) are automatically connected; there is therefore no need for linking accessories.
- The modules contain a feeder terminal and 8 or 17 initiator/actuator terminals and can be snapped or screwed onto 35 mm standard mounting rails

The feeder terminals are fitted with an additional negative outgoing feeder which can be used to supply isolated digital input/output modules. The frame (M) can therefore be bridged by means of the terminals.



Terminals and connection modules (always order as combined unit)



Initiator/actuator terminals with electrically isolated digital input/output modules

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Continuous load at increased ambient temperatures

8WA2 terminal blocks can be loaded with their full uninterrupted current at ambient temperatures of up to +55 °C. At higher ambient temperatures, a current reduction according to the following formula is required:

$I_{th2'} = I_{th2} \cdot k$

I_{th} = Uninterrupted current according to selection tables, relative to the nominal cross-section

$I_{th2'}$ = Uninterrupted current at increased ambient temperature

k = Derating factor according to table

Ambient temperature	Derating factor *k*
60 °C	0.94
65 °C	0.88
70 °C	0.82
75 °C	0.75
80 °C	0.67
85 °C	0.58
90 °C	0.47
95 °C	0.33

The maximum permissible clamping point overtemperature of 45 K according to IEC 60947-7-1 and EN 60947-7-1, Part 1, is not exceeded at ambient temperatures up to 100 °C.

Clamping points

Terminal size	Type	Thread diameter of terminal screws	Screwdriver blades acc. to DIN 5264 8WA2803 or 8WA2804	Tightening torque = test torque	Tensile forces acc. to IEC 60947-1 at max. conductor connection	Stripped length
mm^2				Nm	N	mm
1.5	8WA2011-3KE	--	0.5 × 3.5	--	40	8 ... 9

Single-conductor connection

Terminal size	Type	Smallest conductor cross-section					Largest conductor cross-section				
		Solid	Stranded	Finely stranded	Finely stranded with end sleeve		Solid	Stranded	Finely stranded	Finely stranded with end sleeve	
mm^2		mm^2	mm^2	mm^2	mm^2	Size	mm^2	mm^2	mm^2	mm^2	Size
1.5	8WA2011-3KE . .	0.08	0.5	0.2	--	--	1.5	1.5	1.5	--	--

cULus and cULus ratings

Terminal size	Type	CSA rating			UR rating		
		AWG	Rated current I_n	Rated voltage U_e	AWG	Rated current I_n	Rated voltage U_e
mm^2			A	V		A	V
1.5	8WA2011-3KE	28 ... 16	10	65	22 ... 16	10	65

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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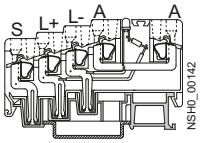
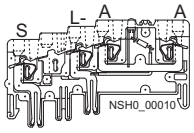
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	General details • Thermoplastic insulating body • Front connection with spring-loaded terminal • L+ = brown S (shield) = green L- = blue A (output), connection not colored • Enclosed at both ends						
	Note: *For labeling accessories, see ...* — Section: *8WA accessories* — Page: 14/175						
Terminal size 1.5 mm²							
 8WA2011-3KE00	**Feeder terminal, terminal size 1.5 mm²** • Orange • Rated uninterrupted current 10 A • Rated insulation voltage 65 V • Mounting width 5 mm • For 250 V, pollution degree 2						
	Versions						
	• PNP						
	- L+, L-, S, without LED		**8WA2011-3KE00**		1	20 units	1BT
	- L+, L-, without LED		**8WA2011-3KE01**		1	20 units	1BT
	- L+, L-, S, with green LED, 15 ... 30 V		**8WA2011-3KE02**		1	20 units	1BT
	• NPN						
	- L+, L-, S, without LED		**8WA2011-3KE00**		1	20 units	1BT
	- L+, L-, without LED, without ground connection		**8WA2011-3KE01**		1	20 units	1BT
 8WA2011-3KE13 initiator terminals with connection module	**Initiator terminals, terminal size 1.5 mm²** • Light gray • Rated uninterrupted current 10 A • Rated insulation voltage 65 V • Mounting width 5 mm • For 250 V, pollution degree 2 • Current consumption with LED 4.8 mA • PNP						
	Versions						
	• L+, L-, A, without LED		**8WA2011-3KE10**		1	20 units	1BT
	• L+, L-, S, A, without LED		**8WA2011-3KE11**		1	20 units	1BT
	• L+, L-, A, with yellow LED, 15 ... 30 V		**8WA2011-3KE12**		1	20 units	1BT
	• L+, L-, S, A, with yellow LED, 15 ... 30 V		**8WA2011-3KE13**		1	20 units	1BT
 8WA2011-3KE33 actuator terminals with LED	**Actuator terminals, terminal size 1.5 mm²** • Light gray • Rated uninterrupted current 10 A • Rated insulation voltage 65 V • Mounting width 5 mm • For 250 V, pollution degree 2 • Current consumption with LED 4.8 mA						
	Versions						
	• PNP						
	- L-, S, A, without LED		**8WA2011-3KE31**		1	20 units	1BT
	- L-, S, A, with yellow LED, 15 ... 30 V		**8WA2011-3KE33**		1	20 units	1BT
	• NPN						
	- L+, S, A, without LED		**8WA2011-3KE30**		1	20 units	1BT
 8WA2011-3KE50	**Connection modules, terminal size 1.5 mm², for all PNP and NPN terminals** • Black • Rated uninterrupted current 10 A • Rated insulation voltage 65 V • Mounting width 5 mm • For 250 V, pollution degree 2 • L+, L-, S integrated						
	Versions						
	• For 8 initiator/actuator terminals and one feeder terminal - Width 47 mm - Height 65 mm		**8WA2011-3KE50**		1	10 units	1BT
	• For 16 initiator/actuator terminals, one feeder terminal and space for one terminal for further bridging for subsequent module - Width 93 mm - Height 65 mm		**8WA2011-3KE51**		1	5 units	1BT

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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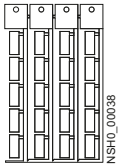
Selection and ordering data

Labeling system for individual inscription

Labeling systems for
- Terminal blocks
- Modular installation devices
- Circuit breakers
- Switch disconnectors

Available from:
Murrplastik Systemtechnik GmbH
Postfach 1143
71570 Oppenweiler
Germany
Telephone: +49 7191-482-0
email: info@murrplastik.de

Accessories for labeling system

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Terminal block labels, for labeling system						
	Versions						
	• For 8WA1 and 8WA2, individually removable - 5 × 7, white (WIN 68) - 5 × 10, white (WIN 68) Not for two-tier terminals (bottom tier); flat terminals: 8WA1010-1PQ00, 8WA1808		**8WA8850-2AY** **8WA8851-2AY**		100 100	1020 units 1020 units	1BT 1BT
	**Snap-on device labels**						
	For identification of, e.g. • Circuit breakers • Contactors • Control systems						
	Versions						
	• 20 x 7, white, snap-on hooks at side (WIN 95)		**8WH8210-0AA55**		100	340 units	1BT
	• 20 x 7, turquoise, snap-on hooks at side (WIN 95)		**8WH8210-0AA56**		100	340 units	1BT
	**Adhesive device labels**						
	For identification of, e.g. • Modular installation devices • Switch disconnectors						
	Versions						
	• 15 x 6 mm, white (WIN 098)		**8WH8210-0AA35**		100	3740 units	1BT
	• 15 x 6 mm, yellow (WIN 099)		**8WH8210-0AA36**		100	3740 units	1BT
	• 19 x 8 mm, white (WIN 088)		**8WH8210-0AA45**		100	2700 units	1BT
	• 19 x 8 mm, yellow (WIN 082)		**8WH8210-0AA46**		100	2700 units	1BT

Note:

The inscription labels can be inscribed with Murrplastik labeling systems or by hand.

The WIN designation facilitates assignment in the inscription software.

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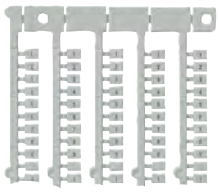
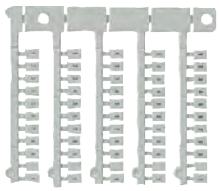
Selection and ordering data

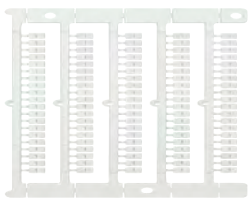
Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
Labels, blank • Suitable for plotting						
Versions						
• Label size 5 × 7 mm (WIN 68)		**8WA8348-2AY**		100	136 units	1BT
• Label size 5 × 10 mm (WIN 68)		**8WA8310-2AY**		100	136 units	1BT
Labels, with inscription • Label size 5 × 7 mm • Font height 2 mm						
Versions						
• Horizontal		**8WA8360-□□□**		100	204 units	
• Vertical		**8WA8361-□□□**		100	204 units	
Inscription		▲▲▲				
• 1…5, 3 cards each with [(13 x (1…5)) + (1 x (1…3))]		**0BA**				
• 1…9, 3 cards each with [(7 x (1…9)) + (1 x (1…5))] (only available as 8WA8361-0AA)		**0AA**				
• 6…10, 3 cards each with [(13 x (6…10)) + (1 x (6…8))]		**0BB**				
• 11…15, 3 cards each with [(13 x (11…15)) + (1 x (11…13))]		**0BC**				
• 16…20, 3 cards each with [(13 x (16…20)) + (1 x (16…18))]		**0BD**				
• 21…25, 3 cards each with [(13 x (21…25)) + (1 x (21…23))]		**0BE**				
• 26…30, 3 cards each with [(13 x (26…30)) + (1 x (26…28))]		**0BF**				
• 31…35, 3 cards each with [(13 x (31…35)) + (1 x (31…33))]		**0BG**				
• 36…40, 3 cards each with [(13 x (36…40)) + (1 x (36…38))]		**0BH**				
• 41…45, 3 cards each with [(13 x (41…45)) + (1 x (41…43))]		**0BJ**				
• 46…50, 3 cards each with [(13 x (46…50)) + (1 x (46…48))]		**0BK**				
• 51…55, 3 cards each with [(13 x (51…55)) + (1 x (51…53))] (only available as 8WA8361-0BL)		**0BL**				
• 56…60, 3 cards each with [(13 x (56…60)) + (1 x (56…58))]		**0BM**				
• 61…65, 3 cards each with [(13 x (61…65)) + (1 x (61…63))]		**0BN**				
• 66…70, 3 cards each with [(13 x (66…70)) + (1 x (66…68))] (only available as 8WA8361-0BP)		**0BP**				
• 71…75, 3 cards each with [(13 x (71…75)) + (1 x (71…73))]		**0BQ**				
• 76…80, 3 cards each with [(13 x (76…80)) + (1 x (76…78))]		**0BR**				
• 81…85, 3 cards each with [(13 x (81…85)) + (1 x (81…83))]		**0BS**				
• 86…90, 3 cards each with [(13 x (86…90)) + (1 x (86…88))] (only available as 8WA8361-0BT)		**0BT**				
• 91…95, 3 cards each with [(13 x (91…95)) + (1 x (61…93))]		**0BU**				
• 96…100, 3 cards each with [(13 x (96 …100)) + (1 x (96…98))]		**0BV**				
• 1…20, 3 cards each with 3 x (1…20) +1 x (1…8)		**0AB**				
• 1…40, 3 cards each with [(1 x (1…40)) + (1 x (1…28))]		**0AC**				
• 41…100, 3 cards each with [(1 x (41…100)) +1 x (41…48)]		**0AD**				
• 101…200, 3 cards, 2 x (101…200) +1 x (101…104)		**0AF**				
• 201…300, 3 cards, 2 x (201…300) +1 x (201…204)		**0AG**				
• 1…100, 3 cards, 2 x (1…100) +1 x (1…4)		**0AE**				
• A …T, 3 cards each with [(3 x (A…T)) + (1 x (A…H))]		**1AA**				
• U, V, W, X, Y, Z,+, -, 3 cards each with [(8 x (U…-)) + (1 x (U…X))]		**1AB**				
• L1, L2, L3, N, PE, 3 cards each with [(9 x (L1…PE)) + (1 x (L1…L3))]		**1AC**				
• U1, V1, W1, U2, V2, W2 3 cards each with [(11 x (U1…W2)) + (1 x (U1,V1))]		**1AD**				
Labels, type 347/348, with inscription • Label size 5 × 7 mm • Font height 2 mm						
Versions						
• Horizontal		**8WA8347-□□□**		100	136 units	
• Vertical		**8WA8348-□□□**		100	136 units	
Inscription		▲▲▲				
• L1		**2AC**				
• L2		**2AD**				
• L3		**2AE**				
• N		**1AR**				
• MP (only available as 8WA8348-2AB)		**2AB**				
• PE		**2AH**				
• L+		**2AF**				
• L-		**2AG**				
• N		**1AR**				
• X (only available as 8WA8348-1AG)		**1AG**				
• Y (only available as 8WA8348-1AH)		**1AH**				



Horizontal
(8WA8360-0BA)



Vertical
(8WA8361-0BA)



Horizontal
(8WA8347-2AC)

Vertical
(8WA8348-2AC)

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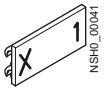
	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Labels, custom inscriptions • Label size 5 × 7 mm • Font height 2 mm • Specify required inscription in plain text						
	Versions						
	• Horizontal Can only be ordered with the order code -ZY01		**8WA8347-0XA -Z and Y01**		100	136 units	1BT
	• Vertical, can only be ordered with the order code -ZY01		**8WA8348-0XA -Z and Y01**		100	136 units	1BT
 8WA1806	**End labeling plates** • 21 × 42 mm • Paper label, inscription possible, with transparent cover • Suitable for 8WA1805, 8WA1808 and 8WA2808 end retainers		**8WA1806**		1	50 units	1BT
 8WA8826-0AA horizontal	**Terminal strip labels** Suitable for 8WA1808 end retainer						
	Versions						
	• Printed with "X1"		**8WA8826-0AA**		100	380 units	1BT
	• Printed with "X2"		**8WA8826-0AB**		100	100 units	1BT
	• Printed with "X3"		**8WA8826-0AC**		100	100 units	1BT
	• Blank (WIN 67)		**8WA8212-0AA65**		100	380 units	1BT

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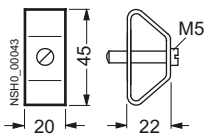
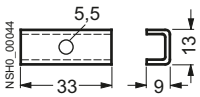
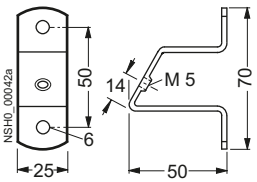
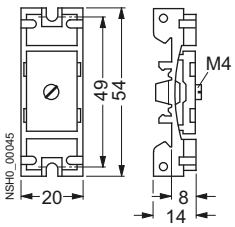
Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8WA1808	**End retainers, with screw fixing** • Mounting width 10 mm • Suitable for 8WA1806 end labeling plate or 8WA8826-0A. terminal strip identification label or 3TX4210-0H device label or four 8WA88. labels.		**8WA1808**		1	50 units	1BT
 8WA1805	**End retainers, steel** • Mounting width 10.3 mm • Suitable for 8WA1806 end label Note An 8WA1820 barrier must be inserted if using end retainers against an 8WA189. connection bar (size 2.5).		**8WA1805**		1	50 units	1BT
 5ST1141	**Standard mounting rails** Versions • Perforated - EN 50 022-35 × 7.5 - 2 m long, 1 mm thick - Steel, sendzimir-galvanized		**5ST1145**		1	20 units	1AD
	• Non-perforated		**5ST1141**		1	20 units	1AD
	• Non-perforated, copper - EN 50022-35 × 15 - 2 m long, 2.3 mm thick		**8WA7551**		1	1 unit	1BT
	• Non-perforated, steel, galvanized, chromated - Similar to EN 50022-35 × 15 - 2 m long, 1.5 mm thick		**5ST1142**		1	10 units	1AD
 8WA753	**Spacer brackets** For raised mounting of terminal strips		**8WA753**		1	50 units	1BT
 8WA752	**Spacers** • With 5.5 mm hole • For raised mounting of terminal strips		**8WA752**		1	100 units	1BT
 8WA746	**Mounting brackets** For support rails		**8WA746**		1	10 units	1BT
 8WA1857	**Insulation carriers** For insulated mounting of support rails onto plates, frame profiles and standard mounting rails EN 50022-35		**8WA1857**		1	20 units	1BT
 8WA2880	**Screwdrivers, for 8WA2** • 3.5 × 0.5 mm, partially insulated • Green • Approx. 175 mm long		**8WA2880**		1	1 unit	1BT

Minimum order quantity (PS) or a multiple thereof can be ordered.

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15/2 **Introduction**

Planning and visualizing the power distribution system with SIMARIS planning tools

15/3 General data
15/4 SIMARIS design
15/5 SIMARIS project
15/6 SIMARIS curves
15/7 SIMARIS configuration
15/8 SIMARIS control NEW
15/9 SIMARIS therm NEW

Configuring, visualizing and controlling with SIMATIC

Block libraries for SIMATIC
15/10 SIMATIC Modbus/TCP SENTRON PAC
15/12 PAC/3WL/3VA Library for SIMATIC PCS 7
15/14 Energy Suite

Configuring, visualizing and controlling with SENTRON

15/16 powermanager
15/21 powerconfig

For further technical product information:

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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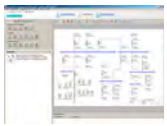
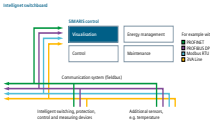
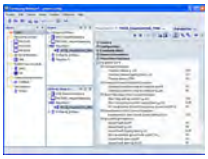
Introduction

Overview

		Article No.	Page
Planning and visualizing the power distribution system with SIMARIS planning tools			
	**SIMARIS design** SIMARIS design supports the electrical planner in network calculations and the dimensioning of electrical power distribution systems.	--	15/4
	**SIMARIS project** SIMARIS project supports the electrical planner in the calculation of space requirements and the electrical power distribution budget. Specifications for the systems planned for a specific project can be generated automatically.	--	15/5
	**SIMARIS curves** SIMARIS curves visualizes tripping characteristics and let-through current and let-through power characteristics of low-voltage protective equipment and fuses (IEC). SIMARIS curves is available both as a PC version and also as an app for use on a tablet PC or a smartphone.	--	15/6
	**SIMARIS configuration** The SIMARIS configuration software provides reliable support when it comes to configuring SIVACON/ALPHA power distribution boards and ALPHA distribution boards.	--	15/7
	**SIMARIS control** NEW SIMARIS control is the interface and monitoring system for the uniform operating and monitoring of intelligent switchboards.	--	15/8
	**SIMARIS therm** NEW With the SIMARIS therm software, you can easily and precisely dimension the heat dissipation of your control panels.	--	15/9
Configuring, visualizing and controlling with SIMATIC			
	Block libraries for SIMATIC The function block libraries enable seamless integration of the 7KM PAC3200/4200 measuring devices into the world of SIMATIC.		
	SIMATIC Modbus/TCP SENTRON PAC Software for communication of SIMATIC S7 with devices that support the Modbus/TCP protocol	**6AV6**	15/10
	**PAC/3WL/3VA LIBRARY for SIMATIC PCS 7** The PAC/3WL/3VA function block library enables seamless integration of 3WL/3VA/3VL circuit breakers and 7KM PAC3200/4200 measuring devices into the PCS 7 process world.	**3ZS2**	15/12
	Power monitoring with SIMATIC Energy Suite		
siemens.com/energysuite Ready for SIMATIC Energy Suite	**Energy Suite** Clearly simplified configuration of power-measuring components from the SIMATIC, SENTRON, SINAMICS, SIRIUS and SIMOCODE product families substantially reduces configuration effort.	--	15/14
Configuring, visualizing and controlling with SENTRON			
	**powermanager** Together with the 7KT/7KM PAC measuring devices, it forms the technical basis for a corporate energy management system in accordance with ISO 50001, and these are some of the functions it offers: • Identifying savings potential • Transparency of energy flows • Cutting energy costs • Ensuring power availability	**3ZS2**	15/16
	**powerconfig** Commissioning and service tool for communication-capable measuring devices and circuit breakers from the SENTRON product family with the following advantages: • Facilitates the parameterization of the devices • With powerconfig, the 3WL, 3VA, 3VL circuit breakers and the 7KM PAC measuring devices, as well as the ATC5300 transfer control device can be parameterized, documented, operated and monitored using various communication interfaces, as well as tested in the case of the 3VA.	--	15/21

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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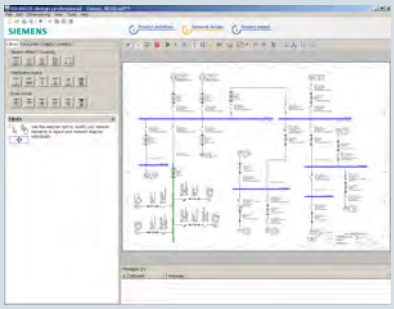
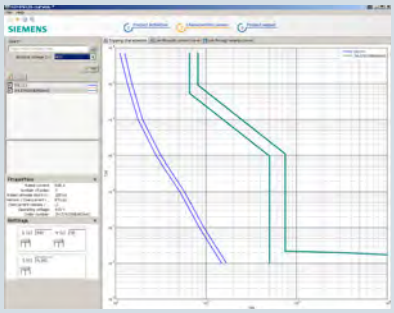
Overview







SIMARIS design

Planning tool for quick and effective network calculations and dimensioning of electrical power distribution systems for non-residential and industrial buildings from the medium-voltage supply to the load:

- Dimensioning of electrical networks on the basis of real products according to acknowledged rules of technology and the applicable standards (VDE, IEC)
- Automatic selection of the appropriate components from the integrated product database
- Calculation of short-circuit current, load flow, voltage drop and energy balance
- Possibility of storing frequently used modules in the favorites library
- High planning reliability combined with flexibility in the planning and realization process
- Possibility of automatic selectivity evaluation with the professional version: in addition to the time/current characteristic curve and the respective envelope curves, selectivity limits are automatically displayed

SIMARIS project

Planning tool for fast calculation of space requirements and electrical power distribution system budgets for non-residential and industrial buildings, and for preparing specifications:

- Automatic selection and placement of the appropriate systems based on the parameters entered
- Fast overview of space requirements and budget
- Thorough planning from the medium voltage supply to the distribution board
- Easy adaptation of project planning possible not only at the time of implementation, but also in the event of changes in use or expansions
- Storing of planned systems in the favorites library for further use in similar projects
- Automatic generation of specifications for the planned systems

SIMARIS curves

Planning tool for visualizing and evaluating characteristic curves of low-voltage protection equipment and fuses (IEC), including the possibility of simulating instrument settings:

- Visualization of tripping characteristics and let-through current and let-through power characteristics
- Device selection via article number or by entering known technical specifications using the selection aid
- Storing of frequently used devices as favorites
- Saving of several characteristic curves including selected settings as a complete project

More information about SIMARIS

You can find more information and downloads on the Internet at:

www.siemens.com/simaris

If you have any questions, please contact your Siemens Customer Support Center:

Tel.: +49 70 00 7 46 27 47

E-mail: technical-assistance@siemens.com

SIMARIS
Mobile Web

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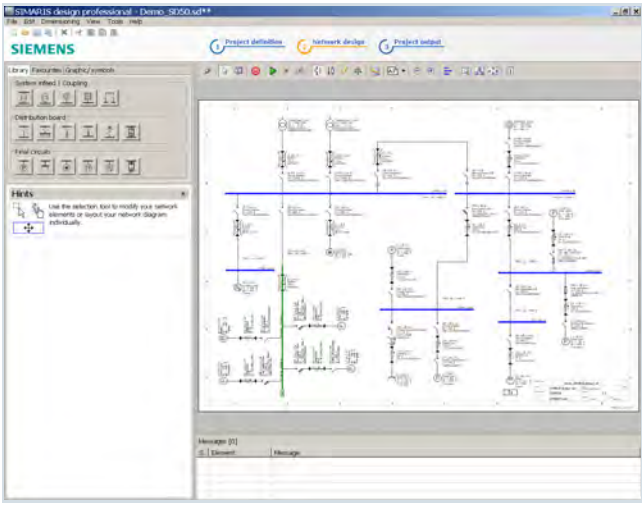
SIMARIS design

Overview



SIMARIS design is a planning tool for quick, effective network calculations and dimensioning of electrical power distribution systems for non-residential and industrial buildings.

As early as the planning phase, the power distribution network required for the project to be handled can be structured and dimensioned on the basis of real products. The network structure is first assembled from the stored modules for feeder units, couplings, distribution boards and branch circuits.
It is also possible to re-use stored favorites, such as those developed in previous, similar projects. Exactly the right components and distribution systems for the case in question are then selected automatically from the product database stored in SIMARIS design, based on the parameters and technical specifications selected specifically for the project. This avoids any additional costs which might be generated by uncoordinated systems in the implementation phase before they are incurred.

Every time an electrical power distribution system is configured, changes and the adaptations they require occur in both the planning and the implementation phases. SIMARIS design makes it easy to incorporate such changes into the supply concept and automatically check its reliability with regard to the acknowledged rules of technology and the standards currently applicable.

SIMARIS design professional, a program version with additional useful functions which is available for a fee. An analysis of selectivity, for example as required for safety power supply installations, can be performed and also documented. Similarly, the energy efficiency of the planned network can be analyzed and optimized.

The wide range of output options allow the project structure and the data gathered to be documented precisely in each phase of the project.

To support and facilitate system planning, it is also possible to export the project data for further processing of the planned project in SIMARIS project.

Benefits

- Reduction in workloads for projects
- Dimensioning of electrical networks on the basis of real products according to acknowledged rules of technology and the applicable standards (VDE, IEC)
- Automatic selection of the appropriate components from the integrated product database, from the medium voltage supply to connection of loads, so no detailed knowledge of products and systems is required
- Free definition of network operation modes and switching states
- Calculation of short-circuit current, load flow, voltage drop and energy balance
- Provision for the necessary personal, short-circuit and overload protection
- Possibility of providing for any necessary maintenance of functions in the calculation
- Displaying and dimensioning of the cables and busbar trunking systems for power transmission and distribution
- High planning reliability combined with flexibility in the planning and realization process
- Changes can be tracked by means of a change index
- Easy adaptation in the event of changes in use or expansion
- Possibility of storing frequently used modules in the favorites library
- Output of the network plan developed, together with detailed parts and data lists
- Country-specific product ranges taken into account
- Comprehensive documentation of planning results with simple data transfer (Office, CAD etc.)

Application

SIMARIS design is suitable for network calculations and dimensioning of electrical power distribution systems in all non-residential and industrial buildings. Whether you are planning a shopping mall, a hospital or a production building, with SIMARIS design it is possible to considerably reduce the amount of work required for the overall planning of power distribution systems and hence the time spent on selecting and dimensioning the necessary equipment.

More information

You can find more information and downloads on the Internet at:

www.siemens.com/simarisdesign

If you have any questions, please contact your Siemens Customer Support Center:

Tel.: +49 70 00 7 46 27 47

E-mail: technical-assistance@siemens.com

Minimum order quantity (PS) or a multiple thereof can be ordered.

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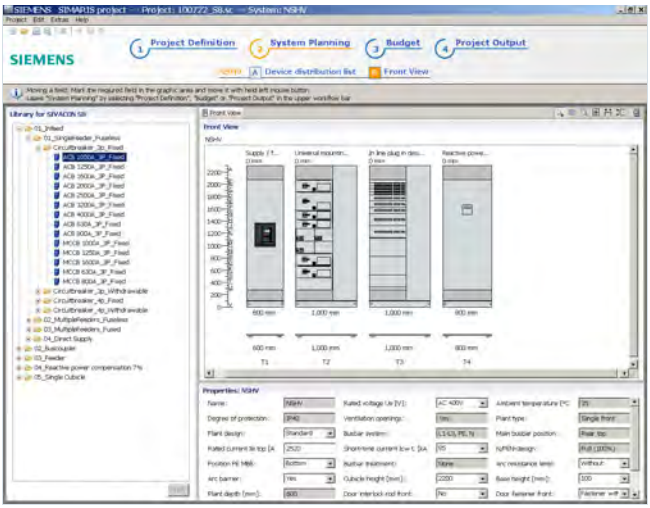
Overview



SIMARIS project is a planning tool for fast calculation of space requirements and electrical power distribution system budgets for non-residential and industrial buildings, and for generating specifications automatically.

The following is determined in SIMARIS project based on the pre-defined project structure and the basic technical specifications selected:

- For medium-voltage switchboards: selection of the required system and the required fields, then presentation of a front view with dimensions.
- After system selection for transformers, the required quantity is selected. Selected transformers are presented as a parts list.
- For low-voltage switchboards and distribution boards: selection of the required protection devices and switching devices per system. The most suitable distribution system is determined automatically based on the list of distribution devices thus created, is equipped with the devices and presented graphically in an automatically generated front view including dimensions.
- After system selection for busbar trunking systems: specification of the length and selection of the additionally required components, e.g. infeeds, junction units and tap-off units. All the resulting components are listed in a parts list.

Detailed information about Siemens units or their article numbers are not needed because SIMARIS project makes the selection automatically on the basis of the parameters entered. For each item of switchboard or each distribution board, SIMARIS project takes the wiring, control and measurement etc. into account.

A system plan drawn up in SIMARIS design can also be imported into SIMARIS project, which means that selecting devices becomes redundant and SIMARIS project builds up the project structure automatically.

Convenient output variants are available to document the results, including the automatic generation of specifications for the planned systems.

Typical versions of a system planned with SIMARIS project can be saved and imported continually into new projects from the favorites library. Automatically created systems can also be subsequently optimized or changed. This is particularly relevant if planning becomes more detailed and the budget needs to be reinforced as a result.

For detailed calculation of costs – on an up-to-date and regional basis – and for more project support please contact your Siemens representative.

Benefits

- Intuitive and easy to operate
- Automatic selection and placement of matching distribution systems
- Fast calculation of space requirements and budget for electrical power distribution systems
- Seamless planning, from the medium-voltage switchboard through transformers, low-voltage switchboards and busbar trunking systems to the distribution boards
- Easy adaptation of planning as requirements become more concrete in the course of a project, and also in the event of changes in use or expansion of the systems
- Saving planned systems for similar projects individually in the favorites library and importing them from there into new projects
- Possibility of providing for the necessary maintenance of functions for busbar systems
- Convenient output types for documentation purposes, such as graphic views, lists and specifications
- Importing of a project drawn up in SIMARIS design

Application

SIMARIS project is suitable for quickly establishing space requirements and budget, and for preparing specifications for electrical power distribution systems in non-residential and industrial buildings. From shopping malls to hospitals and production buildings – with SIMARIS project it is possible to considerably reduce the amount of work required for the overall planning of power distribution systems and hence the time spent on selecting and dimensioning the necessary equipment.

More information

You can find more information and downloads on the Internet at:
www.siemens.com/simarisproject

If you have any questions, please contact your Siemens Customer Support Center:

Tel.: +49 70 00 7 46 27 47

E-mail: technical-assistance@siemens.com

Minimum order quantity (PS) or a multiple thereof can be ordered.

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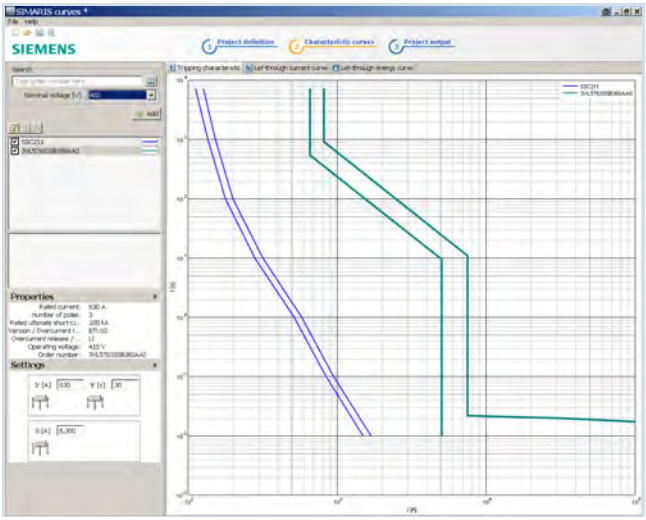
SIMARIS curves

Overview



SIMARIS curves is a planning tool for visualizing and evaluating characteristic curves of Siemens low-voltage protection equipment and fuses (IEC) quickly and easily, including the possibility of simulating instrument settings.

With SIMARIS curves it is possible to simulate parameter settings on protective devices. The respective characteristic curve is selected by direct entry of the Siemens article number, or with the aid of a user-friendly selection tool by entering known technical specifications. Individual products with default attributes can be stored as favorites and called up again.

In addition to simply displaying tripping characteristics with tolerance ranges, it is also possible to simulate parameter settings for the subsequent setting of the devices. In addition, the associated let-through current and let-through power characteristics can be displayed. A printout summary documents the characteristic curves selected and each of their settings.

Benefits

- Visualization and evaluation of tripping characteristics of low-voltage protection equipment and fuses (IEC), including the possibility of simulating instrument settings
- Visualization of let-through current and let-through power characteristics
- Clear product selection using article numbers or with the aid of technical specifications in the selection tool
- Saving of selected devices as favorites
- Saving of several characteristic curves including settings as complete project
- Country-specific product ranges taken into account
- User-friendly documentation
- SIMARIS curves is available both as a PC version and also as an app for use on a tablet PC or a smartphone

Application

SIMARIS curves is suitable for displaying tripping characteristics, let-through current and let-through power characteristics of Siemens low-voltage protective equipment and fuses.

From shopping malls through hospitals to production buildings – SIMARIS curves lets you call up the devices required and their characteristic curves quickly and documents them accordingly.

More information

You can find more information and downloads on the Internet at:

www.siemens.com/simariscurves

If you have any questions, please contact our Siemens Customer Support Center:

Tel.: +49 70 00 7 46 27 47

E-mail: technical-assistance@siemens.com

Minimum order quantity (PS) or a multiple thereof can be ordered.

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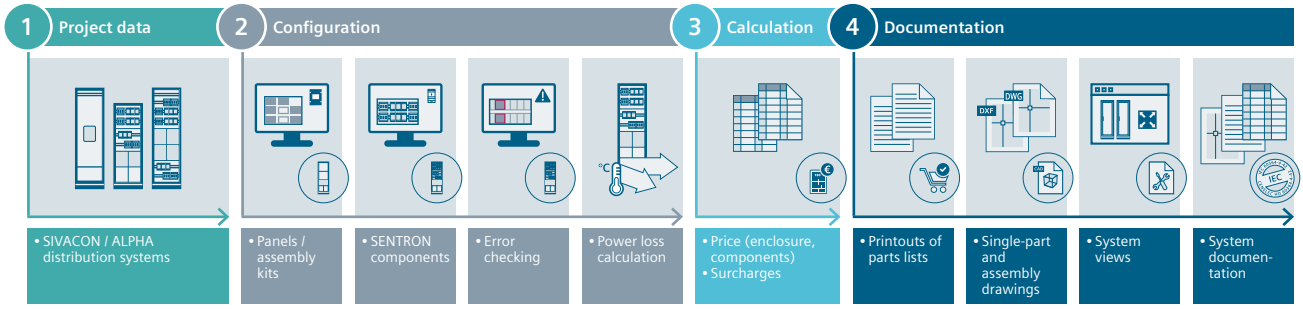
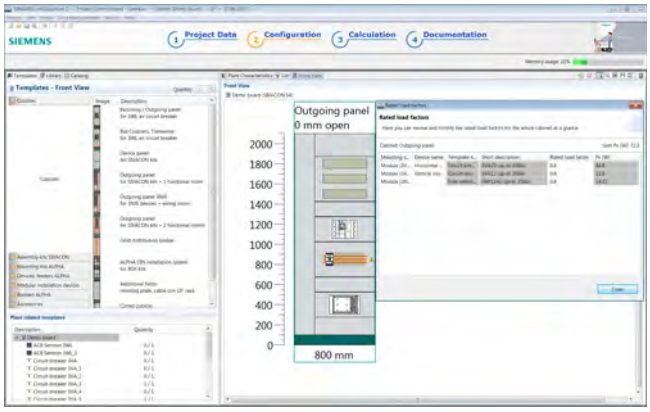
Overview



Configuration of SIVACON/ALPHA power distribution boards and ALPHA distribution boards with the SIMARIS configuration software

Increasing productivity throughout every phase of a project

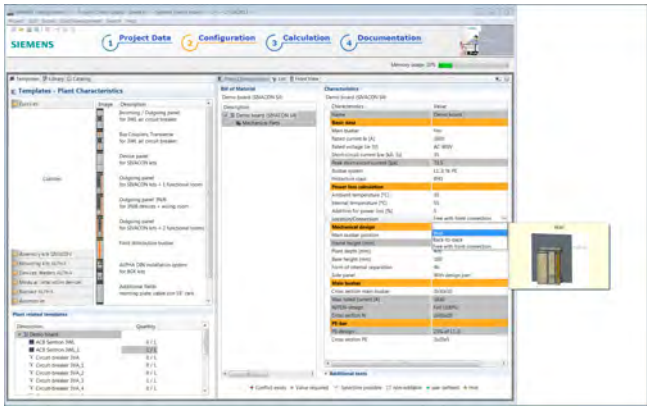
The SIMARIS configuration software provides reliable support when it comes to configuring SIVACON/ALPHA power distribution boards and ALPHA distribution boards. Intuitive operation, graphical display of selection options and intelligent device preselection ensure rapid configuration. Automatic error checking and integrated power loss calculations increase planning reliability. Comprehensive plant documentation rounds off our product and service offering.



Error checking for power loss calculations

Time savings thanks to menu-prompted configuration

The SIMARIS configuration software is intuitive to use. Structured menus and the graphical display of selection options simplify and accelerate the configuration process.



Menu navigation

Convenient quotation preparations with bill of materials and price calculation

Configuring the devices from the SENTRON portfolio with the exact article numbers vastly accelerates the quotation process in combination with the integrated price calculation feature. The software also performs the copper calculation. What is more, the creation of a bill of materials at the click of a mouse vastly simplifies the ordering process.

Ready to use quickly thanks to comprehensive plant documentation

View drawings, such front or cutout views in DXF or DWG format can be processed further in CAD programs, the single-line circuit diagram ensures easy plant documentation. Copper drawings can be output on a project-specific basis. The corresponding certificates and test certifications are provided in accordance with IEC 61439.

More information

You can find more information and downloads on the Internet at:

www.siemens.com/simarisconfig

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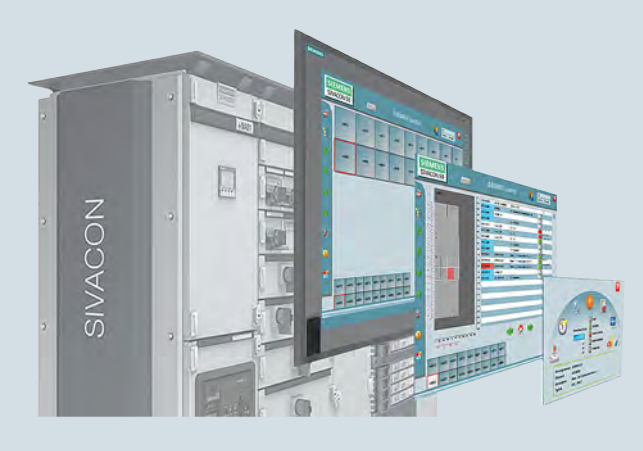
SIMARIS control NEW

Overview



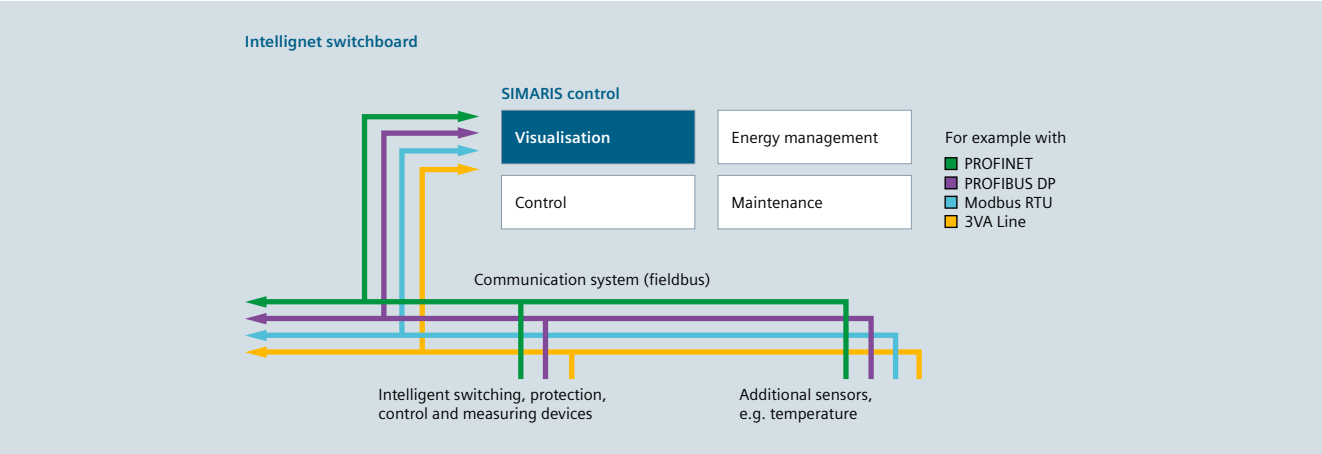
Fast diagnostics by means of structured and detailed fault information

Interface and monitoring system

SIMARIS control is an interface and monitoring system for the uniform operating and monitoring of intelligent switchboards.

SIMARIS control is the central interface to SIVACON S8^{plus} switchboards and can be used to operate and monitor intelligent measuring devices.

The system offers both convenient local control as well as remote control.



Enhanced switchboard availability thanks to the continuous monitoring and visualization of a range of communication-capable components

Benefits

- Simple operation thanks to clear display of all switching states, extensive measured values, status and diagnostics information in a central diagnostics station
- Flexible and expandable solution
- Fast diagnostics by means of structured and detailed fault information
- Transparent power flows help to identify potential energy savings
- Enhanced switchboard availability through continuous monitoring and preventive maintenance thanks to diagnostics information
- Simple representation and transfer of relevant data to higher-level automation and energy management systems
- Future-oriented solution provided by integration into cloud-based solutions

More information

More information on SIMARIS control,
see chapter "Switchboards"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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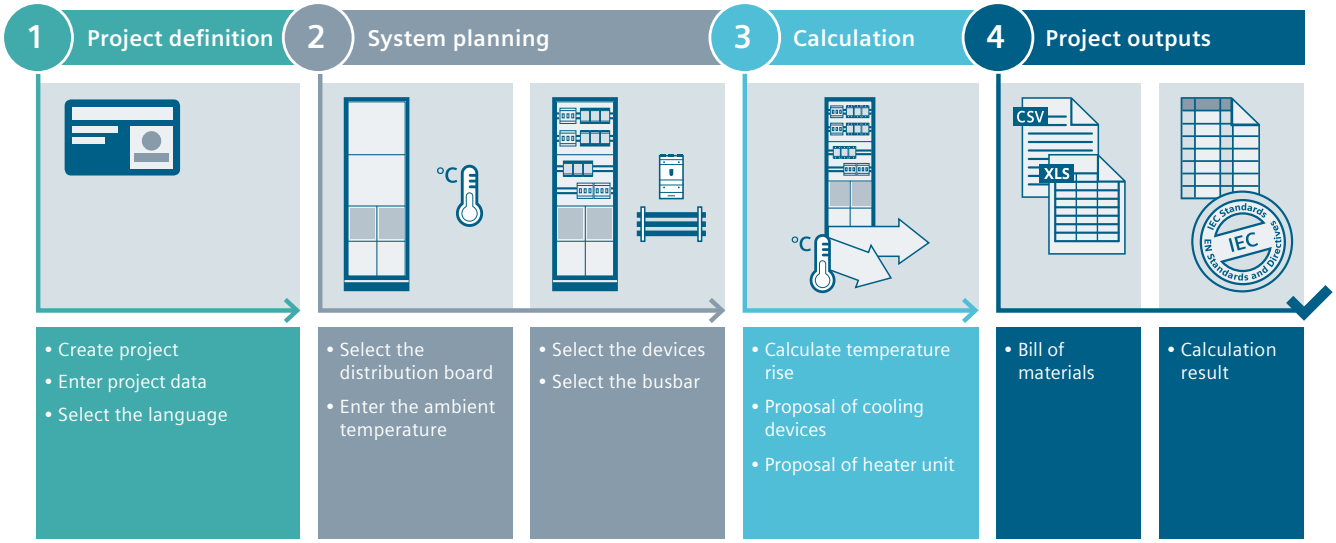
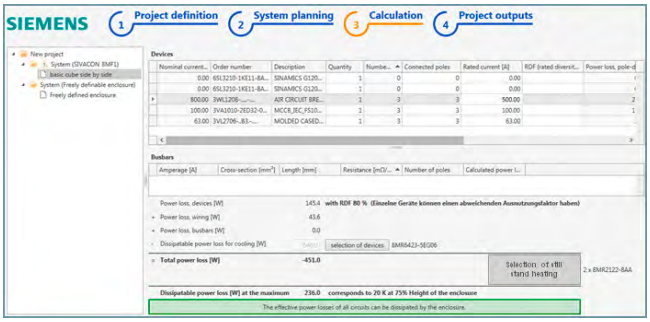
Overview



Power loss calculation with SIMARIS therm

Convenient power loss calculations

With the SIMARIS therm software, you can easily and precisely dimension the heat dissipation of your control cubicles by entering the ambient air temperature and selecting the relevant devices in the cubicle. The right SIVACON 8MF1 system cubicle can be selected according to the attributes for calculation of the maximum power loss via the software. Requisite devices from the SENTRON, SIRIUS, SIMATIC, SINAMICS, and SITOP portfolios can be integrated with the click of a mouse. The generated power loss value of the selected devices is calculated according to the actual application (e.g. according to the rated current, coincidence factor, etc.) With just the push of a button, the software generates a calculation result with all relevant data. This result can be used as certification of the relevant standards IEC 61439, IEC 60204-1, or IEC 60890.



SIMARIS therm

More information

SIMARIS therm is available free of charge at

www.siemens.com/simaristherm

Minimum order quantity (PS) or a multiple thereof can be ordered.

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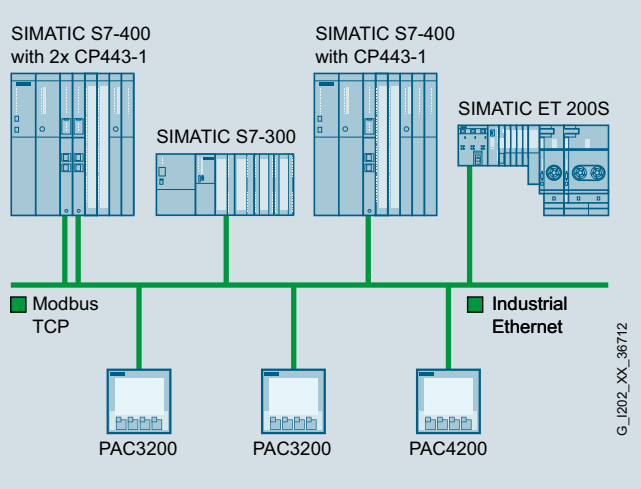
SIMATIC Modbus/TCP SENTRON PAC

Overview



- Software for communication of SIMATIC S7 with devices that support the Modbus/TCP protocol
- Expansion or modification of existing plants with SIMATIC automation systems
- Coupling controllers and systems from different manufacturers

System requirements

- Standard SIMATIC STEP 7 tool Version ≥ 5.5 or
- SIMATIC TIA Portal Version ≥11

Benefits

- Simple coupling of SENTRON PAC systems with SIMATIC automation systems via Industrial Ethernet
- No specific Modbus know-how required
- Engineering with the standard SIMATIC STEP 7 tool
- Fast configuration using a wizard

Application

MODBUS is a protocol that is in use around the world, openly disclosed to all users and supported by many manufacturers.

For use in modern networks, MODBUS/TCP was developed on the basis of it. Today, this protocol is an open Internet draft standard that was introduced to the IETF (Internet Engineering Task Force), the organization that is responsible for Internet standardization.

Thanks to this disclosure, any manufacturer and user can implement this protocol, an opportunity that many leading manufacturers have already taken advantage of.

With the increasing expansion of Ethernet communication, both in industry and in the office, MODBUS/TCP is being adopted to an ever greater extent in all industries. Heterogeneous system landscapes are particularly typical areas of use.

Design

Communication with Modbus/TCP stations takes place via the SIMATIC S7 CPU's integrated PN interface.

One SIMATIC S7 controller can communicate simultaneously with several Modbus/TCP stations depending on the number of connection resources the S7-CPU has.

SIMATIC Modbus/TCP SENTRON PAC supports the following CPUs of the SIMATIC S7:

- ET 200
  - IM 151-8 PN/DP CPU
  - IM 154-8 PN/DP CPU
- S7 300/400
  - CPU 314C-2 PN/DP
  - CPU 315-2 PN/DP
  - CPU 317-2 PN/DP
  - CPU 319-3 PN/DP
  - CPU 412-2 PN
  - CPU 414-3 PN/DP
  - CPU 416-3 PN/DP
- SENTRON PAC
  - PAC 3200, firmware V2.2.1 or higher
  - PAC 4200, firmware V1.5.1 or higher

Modbus/TCP products have been released for standard CPUs and F-CPUs.

Mode of operation

These function blocks are used to enable communication between a SIMATIC-CPU with an integrated PN interface and several 7KM PAC measuring devices.

During communication, basic type 3 and energy counter data are read from the PAC devices and written to S7 data blocks. Furthermore, defined counters in the 7KM PAC measuring device can be reset.

Depending on the license procured, the maximum number of 7KM PAC measuring devices that can be connected is 20, 100 or 512.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

	Modbus/TCP SENTRON PAC
Client functionality	3
Functions	• Reading the values of basic type 3 and of the energy counters • Resetting the operating hours counter, the maximum and minimum values and the energy counters
Enabled for multiple instances	
Max. number of parallel function block calls	• Unlimited number of function block calls • Number of simultaneously established connections depend on the CPU
Connection configuration	Dynamic connections via TCON and TDISCON
Communication	TSEND / TRCV
Memory requirements (depending on the function block)	
• FB	• 31 ... 36 KB
• IDB	• 7 ... 29 KB
Use in CFC / PCS7 possible	Yes
Redundancy functionality	No
Use of bit memories / timers	No

Selection and ordering data

Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
SIMATIC Modbus/TCP SENTRON PAC						
Modbus/TCP 20 SENTRON PAC • Single license • Communication via the integrated PN interface for reading values out of PAC 3200 and PAC 4200 devices, • Valid for 1 CPU and up to 20 SENTRON PACs		**6AV6676-6MA30-0AX0**		1	1 unit	2CP
Modbus/TCP 100 SENTRON PAC • Single license • Communication via the integrated PN interface for reading values out of PAC 3200 and PAC 4200 devices, • Valid for 1 CPU and up to 100 SENTRON PACs		**6AV6676-6MA30-1AX0**		1	1 unit	2CP
Modbus/TCP 512 SENTRON PAC • Single license • Communication via the integrated PN interface for reading values out of PAC 3200 and PAC 4200 devices, • Valid for 1 CPU and up to 512 SENTRON PACs		**6AV6676-6MA30-2AX0**		1	1 unit	2CP

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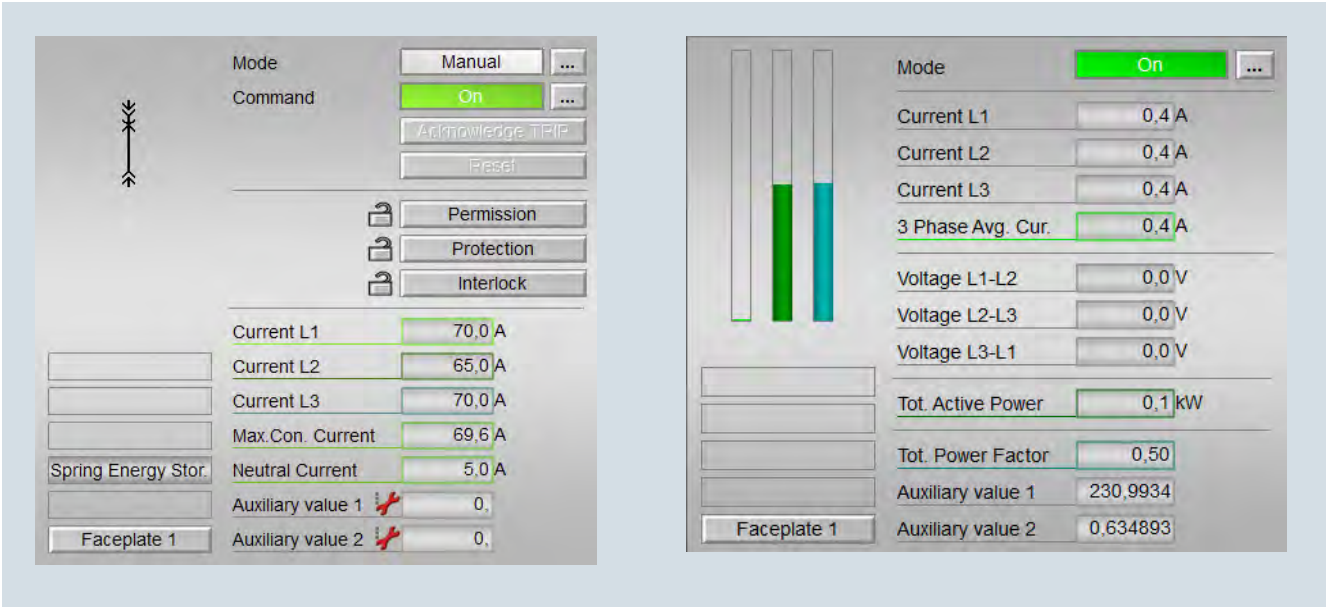
PAC/3WL/3VA Library for SIMATIC PCS 7

Overview



Faceplates for circuit breakers (left) and measuring devices (right)

With a driver block, diagnostics block and faceplates, the PAC/3WL/3VA function block library for SIMATIC PCS 7 enables seamless integration of 3WL/3VA/3VL circuit breakers and 7KM PAC3200/4200 measuring devices into the SIMATIC PCS 7 process control system.

The blocks that run in the CPUs of the controllers supply the faceplates in the operator stations of the process control system with, for example, energy and status data, and they generate signals and manage the connection to the SIMATIC PCS 7 Maintenance Station.

Note:

The PAC/3WL/3VA Library for SIMATIC PCS 7 can be used together with SIMATIC PCS 7 V7.1, V8.0, V8.1 and V8.2.
It supports all operating systems of these system versions.

Faceplates

The faceplates of the PAC/3WL/3VA function block library for SIMATIC PCS 7 are used in the operator stations of the process control system as the user interface for the supported measuring devices and circuit breakers. The technologically relevant values and functions of these devices can thus be displayed and operated as SIMATIC PCS 7 objects.

System-side bidirectional communication connections between faceplates and blocks, as well as between blocks, measuring devices and circuit breakers, support display of values in the faceplates and forwarding of input data to the devices.

Benefits

- Full integration of the 7KM PAC3200/4200 measuring devices and 3WL/3VA/3VL circuit breakers into the SIMATIC PCS 7 process control system
- Connection of all devices via PROFIBUS DPV1 possible
- 7KM PAC3200/4200 measuring devices and 3VA circuit breakers can also be integrated via PROFINET
- 7KM PAC4200 measuring device can be used within the function range of the 7KM PAC3200 measuring device
- Cyclic and acyclic communication (for pure visualization tasks)
- Inputting limit values for monitoring through the driver block
- Resetting values on the device (min/max values)
- Remote switching of the 3WL and 3VL circuit breakers
- Device monitoring and readout of maintenance information
- Automatic information in case of overload, short circuit and faults
- Reading out and displaying device data

Application

The PAC/3WL/3VA Library for SIMATIC PCS 7 is used in all industries where PCS 7 is used. Full integration in PCS 7 means that there is no need for a special system environment. Pre-defined modules and symbols give you the assurance of building on tested and certified product components.

For challenging measurements the 7KM PAC4200 can also be used in the functional scope of the 7KM PAC3200.

In addition to the cyclic connection, there is also an acyclic connection for pure visualization tasks. The process image of the SIMATIC CPUs can be used more efficiently with the acyclic connection.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

SIMATIC PCS 7 V8.0, V8.1, V8.2, SIMATIC PCS 7 V7.1

Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Function block library for 7KM PAC3200/4200 measuring devices and 3WL/3VA/3VL circuit breakers [1]						
PAC/3WL/3VA Library for SIMATIC PCS 7 • AS blocks and faceplates for integrating the 3WL/3VA/3VL circuit breakers into SIMATIC PCS 7 V7.1, V8.0 and V8.1 (one required for each SIMATIC PCS 7 Operator Station of the single station/server version), with: - Engineering license for one SIMATIC PCS 7 Operator Station of the single station/server version - Runtime license for one automation system (1 required per automation system, further AS runtime licenses can be ordered separately) • Engineering and runtime software, software class A, 2-language (German, English), single license for one installation • Type of delivery: software and electronic documentation on CD, engineering and runtime license as Certificate of License		**3ZS2787-1CC30-0YG0**		1	1 unit	1DD
AS Runtime license for PAC/3WL/3VA Library for SIMATIC PCS 7 • For one automation system in each case • Runtime software, software class A, 2-language (German, English), single license for one installation • Type of delivery: runtime license as Certificate of License without software and documentation		**3ZS2787-1CC30-6YH0**		1	1 unit	1DD

[1] Currently supported SIMATIC PCS 7 versions: see http://support.automation.siemens.com

More information

Send support requests to

Siemens AG
Energy Management Division
Low Voltage & Products
Nuremberg
Tel.: +49 911 895-7222
Fax: +49 911 895-7223

www.siemens.com/lowvoltage/technical-support

You can find more information on the Internet at:

www.siemens.com/lowvoltage

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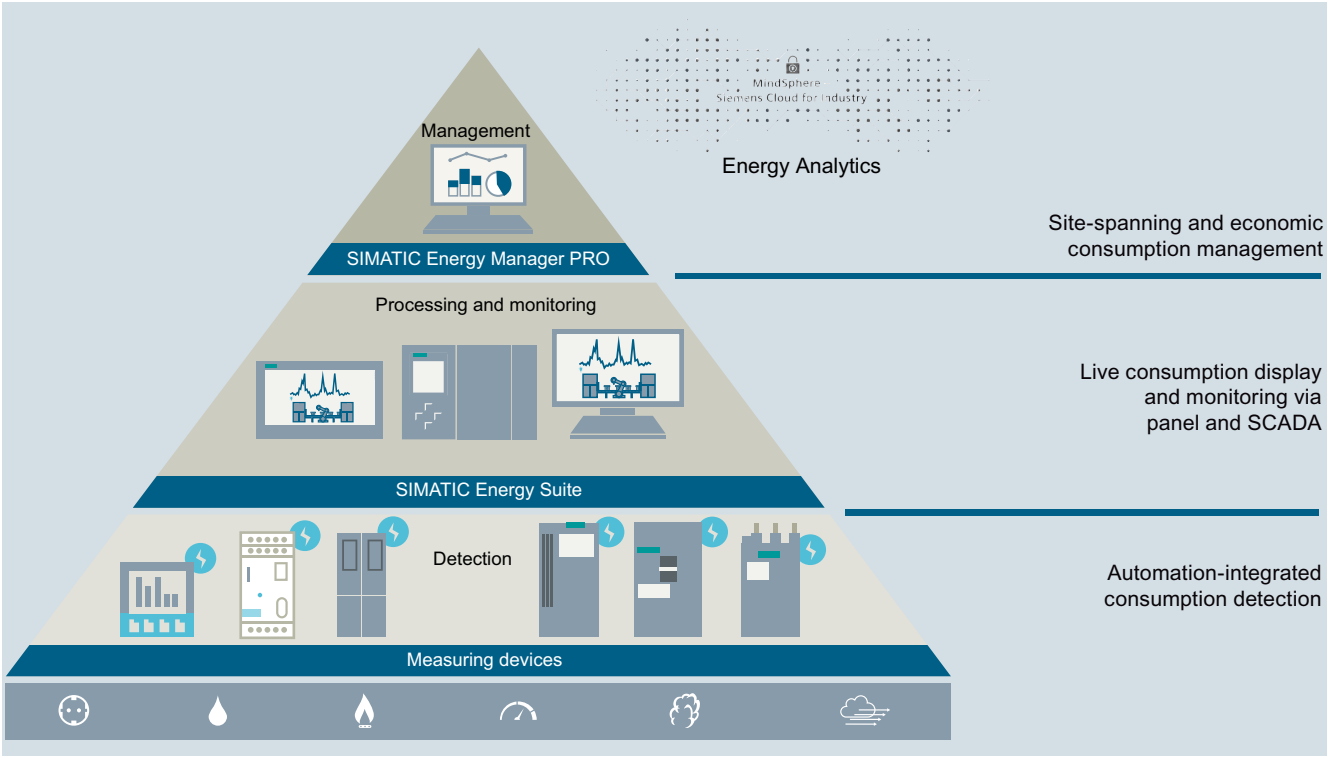
Overview



SIMATIC Energy Suite

A high energy consumption and automated production are typical for many industries.

If you want to keep your energy costs under control in the long term and you are already focusing on the digital future, you will equip your plant with integrated energy measuring technology, thus anchoring your energy management in the automation of your production processes – which is where most energy is consumed. SIMATIC Energy Suite as an integrated option for the TIA Portal efficiently links energy management with automation, thus creating energy transparency in production.

The significantly simplified configuration of power-measuring components from the SIMATIC, SENTRON, SINAMICS, SIRIUS and SIMOCODE product families[1] substantially reduces configuration effort. Thanks to consistent interfacing to SIMATIC Energy Manager PRO[2] or to the cloud-based Energy Analytics service, recorded energy data can be expanded seamlessly into a cross-location energy management system.

This way, businesses can also do justice to all other required economic and management energy aspects, from purchasing energy through planning to energy controlling.

siemens.com/energysuite

Ready for SIMATIC Energy Suite

[1] Products from the SIMATIC, SENTRON, SINAMICS, SIRIUS and SIMOCODE product families. You will find details of currently supported devices here: siemens.com/energysuite-hardware

[2] SIMATIC Energy Manager PRO is the planned and innovative successor of SIMATIC B.Data

Minimum order quantity (PS) or a multiple thereof can be ordered.

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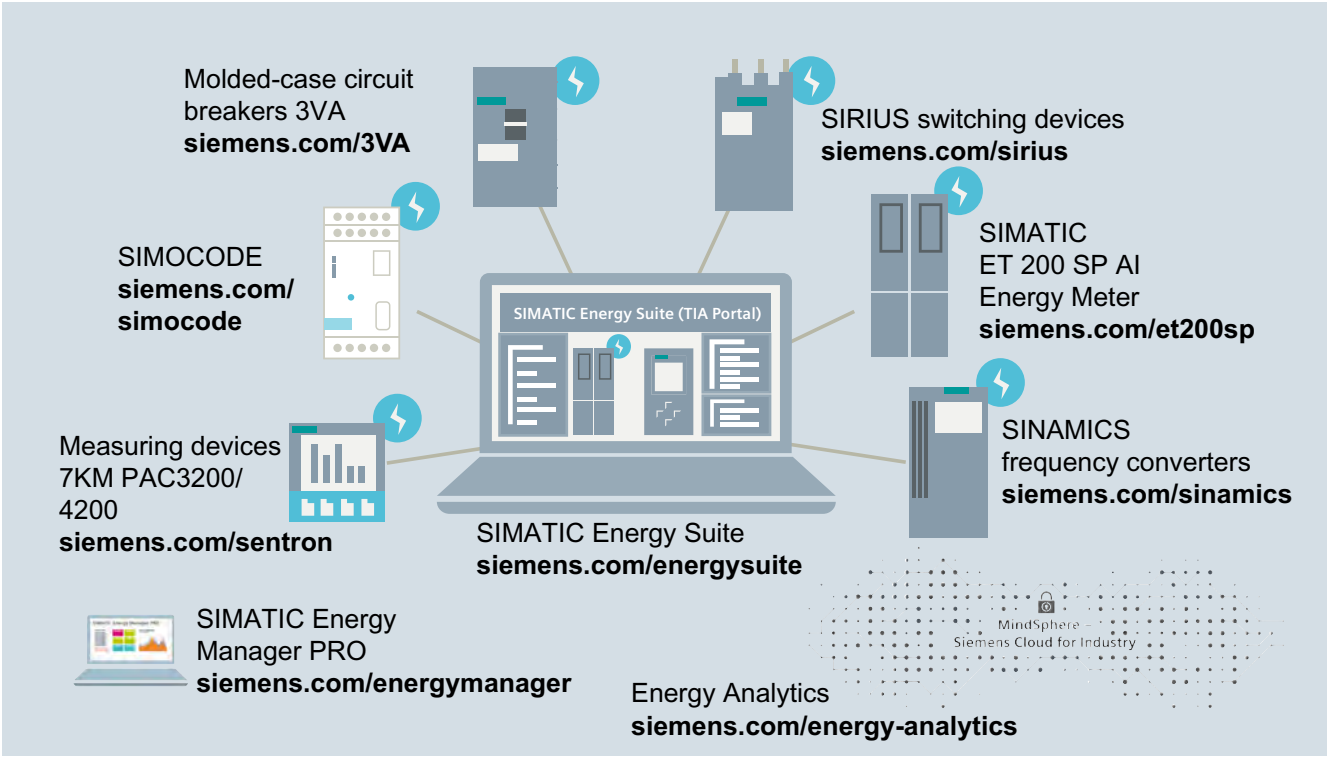
Highlights

- Simple and intuitive configuration instead of programming
- Automatic generation of the PLC energy program
- Convenient integration of measuring components from the Siemens portfolio and from other manufacturers
- Integrated into TIA Portal and the automation system
- Archiving in WinCC Professional or PLC
- Seamless interfacing to Energy Manager PRO and Energy Analytics



Benefits

The advantages at a glance:

- Automatic generation of energy management data
- Integration into TIA Portal and the automation system
- Easily configured

More information

For more information on SIMATIC Energy Suite:

www.siemens.com/energysuite

15

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Overview



Efficiency in power distribution

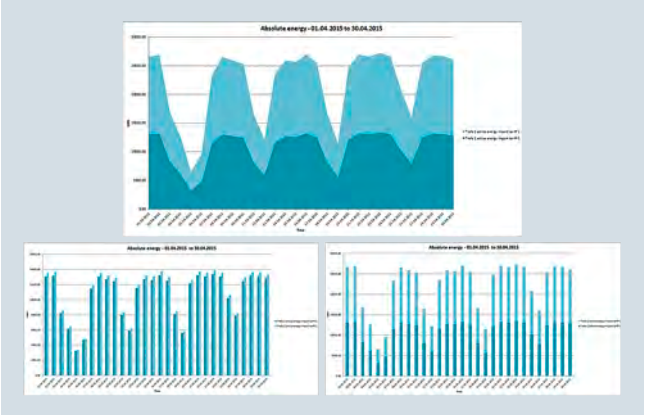
SENTRON switching, protection and measuring devices ensure safety and cost effectiveness in power distribution.

The devices are made even more efficient by software products for simple and fast configuration, reliable monitoring, or getting started in energy management – and they contribute in this way to cost savings and increased plant availability.

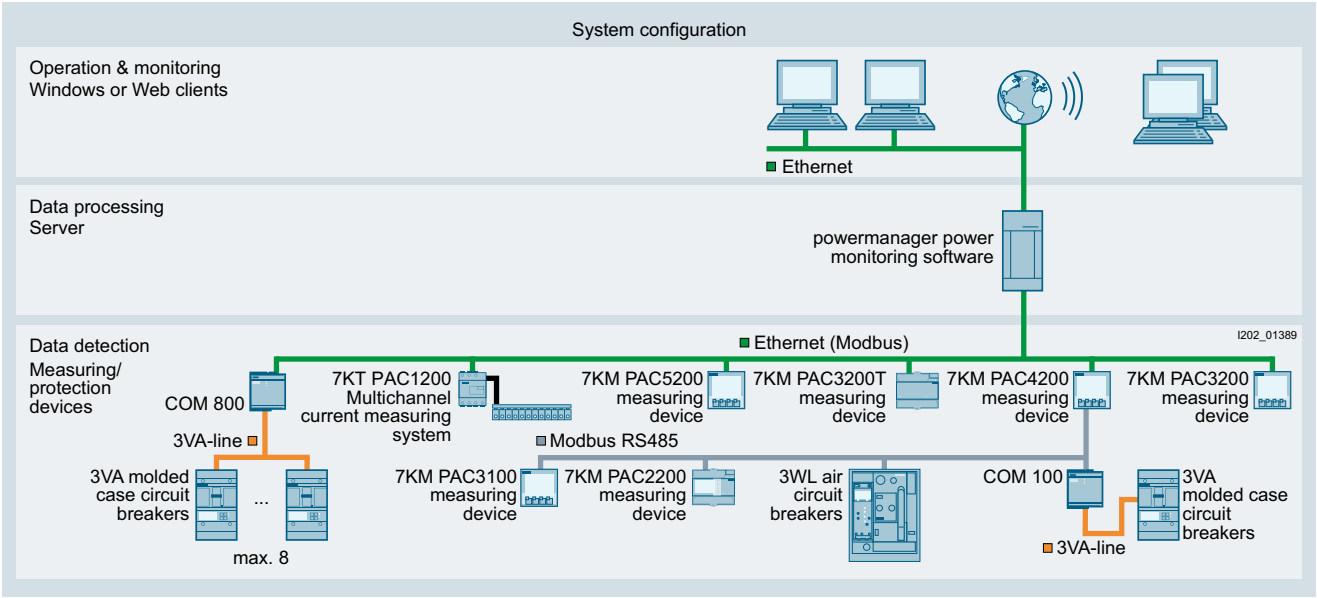
Characteristic / function	Benefits
Pre-configured project settings	Fast commissioning and easy to get started
Display of load profile and measured variables as a characteristic curve	Derivation of measures for saving energy
Pre-defined reports for the allocation of consumption and costs to any cost centers	Localizing unnecessary consumption Localizing faults quickly Increasing energy awareness
Limit monitoring using configurable alarms	Adapting energy consumption Avoiding load peaks

Benefits

- Integrated reporting to enable you to get started easily
- Reports available in .xls, .pdf and .csv formats
- Manual and time-driven generation
- Templates for:
  - Cost center allocation
  - Frequency distribution
  - Absolute and total energy consumption
  - Deviation analysis
  - Annual evaluation
  - Standard report
- Email with generated report via SMTP server (with/without login) – without MS Outlook
- Web-based (create, generate, view)



Application



Typical topology of a power monitoring system

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Design

Basic Package



The Basic Package contains the software for installation on a server and client and also up to ten devices and one client. One web and one reports license are also included.

The four option packages can be added to the basic license:

Device Pack



The number of devices can be increased flexibly.

"Expert" option pack



Any number of freely configured system images can be created and displayed.

"Client" option pack



One Windows client serves the purpose of project visualization and configuration of several PCs simultaneously.

The client license resides on the server.

"Distributed Systems" option pack



Linking of several autonomous powermanager systems.

Each system can access and display measured variables and alerts of the other systems.

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Function

- Independent PC-based energy monitoring for the energy monitoring system based on Modbus communication
- Expandable from the simple standard application to a fully flexible customer solution
- Scalable relative to number of devices and software functions
- Optimum integration of 7KT/7KM PAC measuring devices and 3WL/3VL/3VA circuit breakers
- Complete integration of the new 3VA molded case circuit breaker (ETU5, ETU8) including measured values and breaker status
- Integration of any third-party devices via a generic Modbus driver
- Recording, display, archiving and evaluation of measured quantities
- New uniform pre-defined measured value views across all device types (overview, bar view for energy values, trend view, demand curve for visualizing archived and online data)
- Basic reporting with templates for a simple introduction to the evaluations, available in PDF/XLS format as well as via web browser
  - Cost center allocation
  - Frequency distribution
  - Absolute and total energy consumption
  - Evaluations of consumption values
  - Deviation analysis
  - Annual evaluation
  - Standard (data export)
- Extended Excel-based reporting for tailored evaluations
- Monitoring of status and limits, with generation of signals
- Manual input of energy values
- Virtual measuring points and devices
- Dashboard displays for a rapid overview
- Control of digital outputs and teleswitching
- User administration with different authorization levels
- Distributed multi-server structure
- Client-server installation
- Access via web browser
- OPC interface
- Load monitoring
- Calculation and display of key performance indicators (KPIs)
- Modern color scheme
- Dashboard displays at device and system level
- Direct access to support pages on the Internet

New in powermanager 3.4

- Support for the new PAC devices:
  - PAC3200T
  - PAC1200
  - 7KM PAC I(N), I(Diff), analog expansion module
- Expansion of internal reporting options:
  - Top 10 loads
  - Sankey diagram
  - KPI reports

Configuration

- Easy start to project creation with a host of pre-defined settings
- Modern, intuitive operator interface with a menu structure and 5 different views and tools

System requirements

Hardware requirements

- Processor: Intel Core i3 processor, 2GHz
- RAM: at least 2 GB RAM
- Hard disk: HDD with 10 GB free storage space
- Display: VGA with at least 1280 x 1024 pixels and 16-bit color intensity

Supported operating systems

- Windows 7: Ultimate / Enterprise / Professional, SP1 (64-bit)
  Windows 8.1: Enterprise, Professional (64-bit)
  Windows 10: 64-bit
- Windows Server 2008: Server 2008 R2 (64-bit)
- Windows Server 2012: Server 2012 R2 (64-bit)

Supported Excel versions (extended report)

- Excel 2010 (32-bit)
- Excel 2013 (32-bit)

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
powermanager V3.4						
• **Basic package** Full product license up to 10 devices, installation for client/server, web access		**3ZS2711-0CC30-0YA0**		1	1 unit	1DD
• **Trial license** Up to 10 devices including "Expert" and "Web" option packs Full product license limited to 60 days Available free of charge from https://support.industry.siemens.com/cs/ww/en/view/64850998						
V3.x device expansions						
• **Device Pack (20)** Device expansion license for up to 20 devices		**3ZS2711-0CC30-0YD0**		1	1 unit	1DD
• **Device Pack (50)** Device expansion license for up to 50 devices		**3ZS2712-0CC30-0YD0**		1	1 unit	1DD
• **Device Pack (100)** Device expansion license for up to 100 devices		**3ZS2713-0CC30-0YD0**		1	1 unit	1DD
• **Device Pack (200)** Device expansion license for up to 200 devices		**3ZS2714-0CC30-0YD0**		1	1 unit	1DD
• **Device Pack (500)** Device expansion license for up to 500 devices		**3ZS2715-0CC30-0YD0**		1	1 unit	1DD
• **Device Pack (1000)** Device expansion license for up to 1000 devices		**3ZS2716-0CC30-0YD0**		1	1 unit	1DD
Option packs						
• **Option pack "Expert"** Option for creating/presenting any number of freely configured images		**3ZS2710-2CC20-0YH0**		1	1 unit	1DD
• **Option pack "Client (5)"** Expansion for up to 5 clients		**3ZS2710-3CC00-0YD0**		1	1 unit	1DD
• **Option pack "Distributed Systems (2)"** Option for the connection of 2 autonomous powermanager systems for the exchange of measured values and alarms		**3ZS2718-1CC00-0YH0**		1	1 unit	1DD
• **Option pack "Distributed Systems (5)"** Option for the connection of 5 autonomous powermanager systems for the exchange of measured values and alarms		**3ZS2718-2CC00-0YH0**		1	1 unit	1DD
• **Option pack "Distributed Systems (10)"** Option for the connection of 10 autonomous powermanager systems for the exchange of measured values and alarms		**3ZS2718-3CC00-0YH0**		1	1 unit	1DD
powermanager V2.0 to V3.0 update						
• **Update license** From V2.0 Lean to V3.x (10)		**3ZS2711-0CC30-0YE0**		1	1 unit	1DD
• **Update license** From V2.0 Standard to V3.x (50)		**3ZS2712-0CC30-0YE0**		1	1 unit	1DD
• **Update license** From V2.0 Advanced to V3.x (100)		**3ZS2713-0CC30-0YE0**		1	1 unit	1DD
• **Update license** From V2.0 Maximum to V3.x (200)		**3ZS2714-0CC30-0YE0**		1	1 unit	1DD
System packages						
• **System 1** Package comprising - 1 x powermanager Basic Package - 1 x 7KM PAC4200 (+RS 485 module) and - 1 x 7KM PAC3100		**3ZS2812-5CC20-0AY0**		1	1 unit	1DD
• **System 2** Package comprising - 1 x powermanager Basic Package - 1 x 7KM PAC4200 (+RS 485 module) and - 1 x 7KT PAC1500 (+Modbus module)		**3ZS2812-6CC20-0YA0**		1	1 unit	1DD
• **System 3** Package comprising - 1 x powermanager Basic Package - 3 x 7KM PAC 3200		**3ZS2813-2CC20-0YA0**		1	1 unit	1DD

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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More information

powermanager is available in the following languages

English, German, Simplified Chinese, Turkish, Spanish, French, Portuguese, Italian

Internet

To download the free powermanager trial license, see
http://support.automation.siemens.com/WW/view/en/64850998

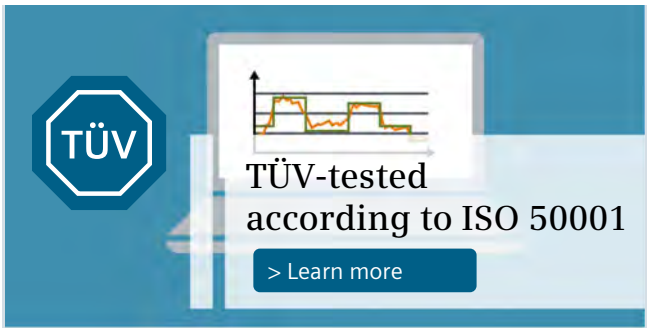
More information, see

www.siemens.com/powermanager

www.siemens.com/powermonitoring

German Technical Inspectorate (TÜV) Certificate of Conformity for energy management ISO 50001 and energy audits according to EN 16247-1

The TÜV Certificate of Conformity confirms that 7KT/7KM PAC measuring devices, 3VA molded case circuit breakers, 3WL air circuit breakers and the powermanager power monitoring software support the introduction of an operational energy management system in accordance with ISO 50001. The energy saving standard ISO 50001 provides companies with a definition of compulsory criteria for sustainable energy management.



The TÜV certificate is available from

http://w3.siemens.com/powerdistribution/global/SiteCollectionDocuments/dokumente-en/SENTRON_Certificate-of-conformity_EN_Text.pdf

Minimum order quantity (PS) or a multiple thereof can be ordered.

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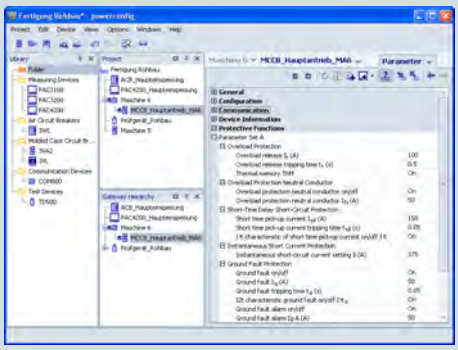
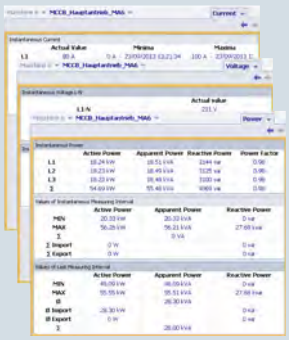
Overview

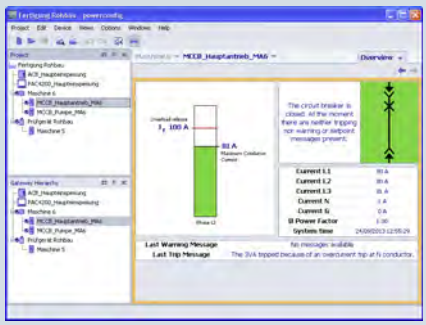
The powerconfig software for commissioning	
	Software tool for the efficient commissioning and diagnosis of communication-capable SENTRON components
License	Free use
Supported devices	All PAC measuring devices, incl. expansion modules 3WL/3VL/3VA/ATC5300 circuit breakers
General range of functions	The PC-based tool facilitates parameterization of the devices, resulting in substantial time savings, particularly when several devices have to be set up. The device settings can be saved and all system settings documented. The tool enables monitoring of instantaneous measured quantities, which can be printed out if required. Execution of specific device functions, such as resetting of devices and setting of energy counters
Supported languages	German, English, Chinese, Spanish, Portuguese, Italian, Turkish
Service functions	Firmware updates and switching of language packs for 7KM PAC measuring devices and 3VA communication components
Functional scope with 7KM PAC4200 and 3VA	Readout of data stored in the device (events; load profile history; daily energy counters), which are saved in .csv format



Setting of parameter values



Display of actual measured quantities



Display of the circuit breaker state

The powerconfig software is the combined commissioning and service tool for communication-capable measuring devices and circuit breakers from the SENTRON product family.
The PC-based tool facilitates parameterization of the devices, resulting in substantial time savings, particularly when several devices have to be set up.

With powerconfig, 3WL, 3VA and 3VL circuit breakers, all the PAC measuring devices and expansion modules, as well as the ATC5300 transfer control device, can be parameterized, documented, operated, and monitored using various communication interfaces.

Benefits

- Parameterization, documentation, operation and monitoring in one software, and also testing in the case of the 3VA
- User-friendly documentation of measured values and settings
- Clear presentation of the available parameters including validity testing of the inputs
- Display of the available device statuses and measured values in standardized views
- Parameterization of all electronic 3VA2/3VA6 components, e.g.
  - ETUs 5-series and 8-series
  - COM800/COM100 breaker data servers
  - EFB300 (External Function Box)
- Support of test functions for 3VA2/3VA6 using the TD500 test device for all ETUs
- Full support for 3WL air circuit breakers, that is, including display and triggering of curve shapes and all other functions
- Support for the ATC5300 transfer control device
- Project-oriented storage of device data
- Consistent operation and usability
- Support of the various communication interfaces (Modbus RTU, Modbus TCP, PROFIBUS, PROFINET)
- Communication with the 3VA2 circuit breaker via the TD500 at the USB interface, as a further possibility for Modbus TCP, PROFIBUS and PROFINET
- Supported languages: German, English, Chinese, Spanish, Portuguese, Italian, and Turkish
- Read-out and saving of message lists, load profiles and characteristic curves (device-dependent)
- Overview of circuit breaker states with currents and events
- Individually designable system documentation
- Update of the device firmware and loading of language packs (device-dependent)
- No programming knowledge required for operation
- powerconfig can be started on the PC as follows, with communication possible via PROFIBUS and PROFINET:
  - Directly from Windows
  - From STEP 7, V5.5 SP1
  - From TIA Portal with STEP 7 V12, V13 and V14

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Configuration

System requirements

Hardware requirements

- Processor: Intel Pentium III, 1 GHz (or higher)
- RAM: at least 512 MB
- Hard disk: at least 1 GB free
- Color monitor with a minimum resolution of 1024 x 768 pixels

Supported operating systems

- Windows 7 Professional SP1 (32-bit, 64-bit)
- Windows 7 Ultimate SP1 (32-bit, 64-bit)
- Windows 2008 Server (32-bit)
- Windows 8.1 (32-bit, 64-bit)
- Windows 10 (64-bit)

Required framework

- Microsoft .NET Framework acc. to readme file, currently V4.0

More information

powerconfig is available free of charge at
http://support.automation.siemens.com/WW/view/en/63452759
You can find more information on the Internet at:
www.siemens.com/sentron

Minimum order quantity (PS) or a multiple thereof can be ordered.

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16/2 Introduction

SIVACON S8 power distribution boards and motor control centers
16/4 General data

SIVACON S4 power distribution boards
16/6 System overview
16/8 Technical specifications

Frame and enclosure
Frame
16/9 Without main busbar
16/11 Main busbar at top
16/13 Main busbar at bottom
16/15 Main busbar at rear
16/17 Frame accessories
Enclosure
16/18 Paneling sections
16/26 Internal covers
16/28 Modular doors

Busbar systems
16/31 Main busbar
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Section expansion
16/42 3WL air circuit breakers
16/56 3VA molded case circuit breakers
16/77 3VL molded case circuit breakers
16/97 3VT molded case circuit breakers
16/99 3K switch disconnectors
16/102 3NP1 fuse switch disconnectors
16/103 3NJ4 in-line fuse switch disconnectors
16/106 3NJ6 in-line switch disconnectors with fuses
16/111 Modular devices
16/112 Cable section
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Internal separation
16/125 Introduction
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Accessories
16/136 Fasteners, extended delivery options
16/137 Transport aids, tools, other

For further technical product information:

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Overview



SIVACON S8 power distribution boards and motor control centers up to 7000 A

- Reliable, economical, flexible and communication-capable
- For all applications in infrastructure and process industry
- In circuit breaker design
- In 3NJ4 in-line design, fixed-mounted
- In 3NJ6 in-line design, plugged in
- In fixed-mounted design (infrastructure)
- Degree of protection up to IP54
- Design-verified according to IEC 61439-1/2 (type-tested according to IEC 60439-1)
- Tested for resistance to internal arcing faults in compliance with IEC/TR 61641
- Tested for resistance to earthquakes
- In universal mounting design for the combination of:
  - Withdrawable unit design
  - Fixed-mounted design
  - 3NJ6 in-line design, plugged in



SIVACON S4 power distribution boards up to 4000 A

- Reliable, economical and flexible for all infrastructure applications
- For all infrastructure applications
- In circuit breaker design
- In 3NJ4 in-line design, fixed-mounted
- In 3NJ6 in-line design, plugged in
- Fixed-mounted design for 3VA, 3NP1, modular installation devices
- Degree of protection up to IP55
- System for producing a switchgear and controlgear assembly in accordance with IEC 61439-1/2
- ALPHA 8GK modular installation system

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Design

Low-voltage switchboards form the link between the equipment used to produce electricity (generators), transmit it (cables, overhead lines) and transform it (transformers) on the one hand and loads such as motors, solenoid valves, actuators and devices for heating, lighting and air conditioning on the other.

As the majority of applications are supplied with low voltage, the low-voltage switchboard is of special significance in both public supply systems and industrial plants.

Reliable power supplies depend on good availability, flexibility to allow for changes and process-related modifications, and high operational reliability.

Power distribution in a low-voltage system usually takes place via a main switchboard (power center or main distribution board) and a number of sub-distribution boards. These sub-distribution boards are often motor distribution boards, which are also known as motor control centers (MCC) (see example opposite).

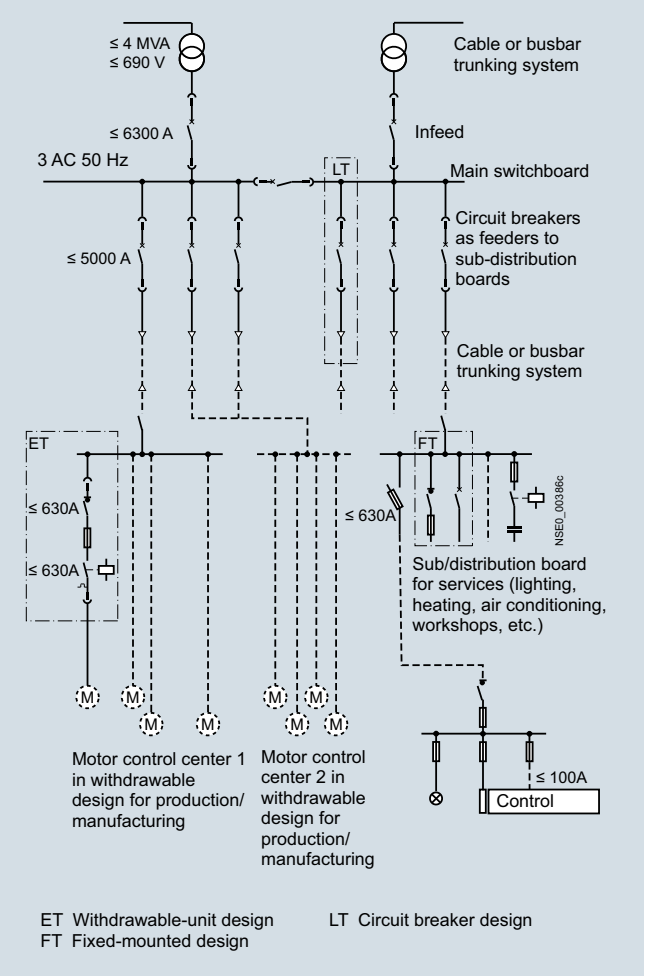
The SIVACON S4 and SIVACON S8 low-voltage power distribution boards offer optimal solutions for applications up to 7000 A.

The SIVACON S8 low-voltage power distribution board is produced by Siemens or by our SIVACON technology partner in your area.

The most important selection criteria are shown in the table below.

You can find more information on the Internet at:

www.siemens.com/sivacon



Power distribution in a low-voltage system

Technical specifications

Selection criteria	SIVACON S8		SIVACON S4	
Busbar position	**Top**	**Rear**	**Top**	**Bottom**
Rated currents				
• Busbars up to	6300 A	7010 A	4000 A	3200 A
• Infeed up to	6300 A	6300 A	4000 A	3200 A
Short-circuit strength				
• Rated short-time withstand current I_{cw} (1 s)	150 kA	150 kA	100 kA	100 kA
• Rated peak withstand current I_{pk}	330 kA	330 kA	220 kA	220 kA
Mounting design				
• Fixed-mounted design	✓[1]	✓[1]	✓[1]	✓[1]
• In-line design, fixed-mounted	✓	✓	✓	✓
• In-line design, plugged in	✓	✓	✓	--
• Withdrawable unit design	✓	✓	--	--
Type of installation				
• Free-standing/against wall	✓	✓	✓	✓
• Back to back	✓	✓	✓	✓
• Double-fronted	--	✓	--	--
Use				
• Motor control centers	✓	✓	--	--
• Power distribution boards	✓	✓	✓	✓
Manufactured by SIVACON Technology Partner	✓	✓	--	--

✓ Available
-- Not available

[1] Circuit breakers optionally in withdrawable unit design or on a plug-in base.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



SIVACON S8 low-voltage switchboard

The SIVACON S8 low-voltage switchboard sets new standards as a power distribution board or motor control center (MCC) for industrial applications or in infrastructure. The power distribution board system up to 7000 A for simple and consistent distribution of power ensures a high degree of personal and plant safety and, thanks to its optimal design, offers a wide range of possible uses.

SIVACON S8 is custom configured and constructed using design-verified functional modules.

We or our authorized contractual partners take care of the following:

- Customized configuration
- Mechanical and electrical construction
- Verification

Documentation specified by us serves as the basis for our authorized contractual partners.

Standards and regulations

The SIVACON S8 low-voltage power distribution board is a design-verified low-voltage switchgear and controlgear assembly according to IEC 61439-1/2 (formerly IEC 60439-1 TTA). The switchboard is designed to be resistant to arc faults according to IEC/TR 61641, EN 60439 (VDE 0660 part 500), supplement sheet 2.

SIVACON S8 can be used as a design-verified power distribution board and motor control center up to 7000 A.

Mounting designs

The SIVACON S8 low-voltage switchboard consists of standardized and typified components which can be flexibly combined as a cost-effective overall solution.

The following mounting designs are available:



1. Circuit breaker design with 3WL air circuit breaker up to 6300 A or 3V. molded case circuit breaker up to 1600 A
2. Protection against internal arcing, the extended active protection against internal arcing (option from the SIVACON S8^{plus} feature package)
3. Universal mounting design section for motor and cable feeders up to 630 A in withdrawable design with combination options with fixed-mounted design (modular door) and plug-in design
4. Fixed-mounted design with front covers for cable feeders up to 630 A
5. In-line design section, plugged-in, for outgoing cables up to 630 A
6. In-line design section, in vertical version for cable feeders up to 630 A
7. Reactive power compensation section up to 600 kvar

SIVACON S8 low-voltage switchboard with standardized and typified components

Universal mounting design

In many applications it is necessary for space reasons to integrate various mounting designs in one and the same section.

The universal mounting design from SIVACON S8 offers high efficiency, safety and high variability through the combination of

- withdrawable unit design,
- fixed-mounted design with modular doors and
- plug-in design.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Design

Withdrawable unit design

The flexible withdrawable unit design is suitable for different applications, e.g. as a motor control center. Following features are offered to improve personal and machine safety:

- Uniform operation for all withdrawable unit sizes
- Integrated operating error protection for all withdrawable units
- Unambiguous indication of withdrawable unit positions
- Separate actuation for main control switch and withdrawable unit position
- Test and disconnected position with door closed, without interruption of degree of protection
- Lockable disconnected position
- Withdrawable unit coding prevents swapping of withdrawable units of same size
- Swiveling instrument panel on standard withdrawable units for making settings during operation
- Small withdrawable units for motor and cable feeders up to 63 A

The withdrawable units are ergonomically designed and offer the required flexibility where requirements change frequently. Changing requirements include e.g. a new motor rating or adding new loads.

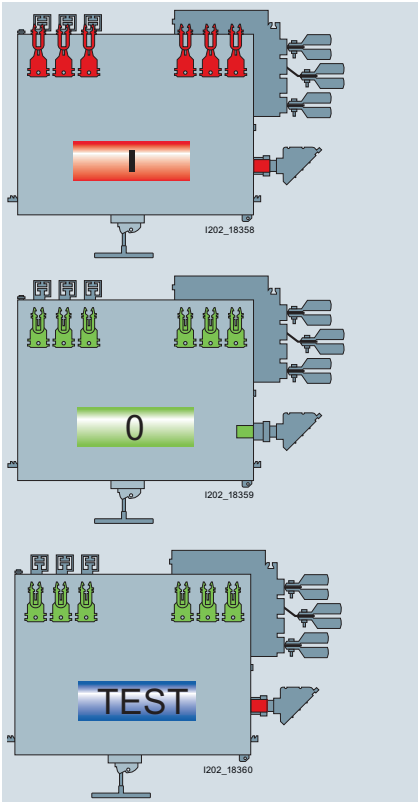
Simple and safe handling as well as fast changeover times ensure the high availability of the plant.

Withdrawable unit positions

Connected position
In the connected position, both power and control contacts are closed.

Disconnected position
Withdrawable units in the disconnected position are disconnected on the line side, the output side, and the control side.

Test position
The test position is used for testing the withdrawable units without load.



Withdrawable unit versions

Small withdrawable units:
- Size ¼ and ½
- Height 150 mm and 200 mm
- Up to 48 withdrawable units per section



Small withdrawable unit size 1/4 (left) and size 1/2 (right)

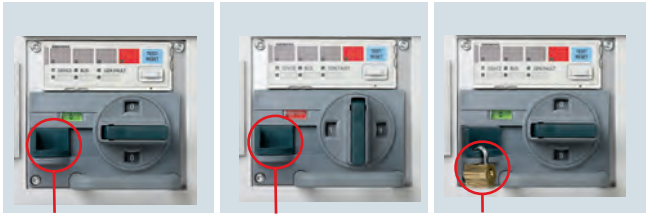
Standard withdrawable units:
- Height 100 mm to 700 mm
- Up to 18 withdrawable units per section



Standard withdrawable unit

Operating error protection

The operating error protection prevents movement of the isolating contacts with main control switch "ON".



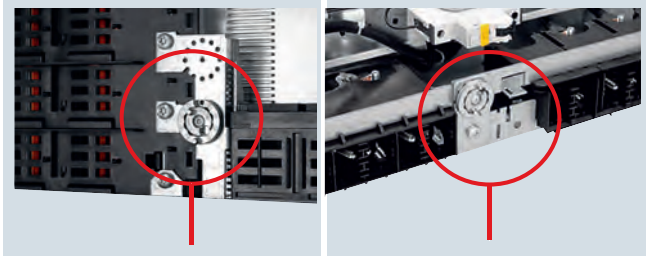
Operating error protection enabled, main control switch in position "0"

Operating error protection disabled, main control switch in position "1"

Lockable disconnected position

Withdrawable unit coding

The mechanical withdrawable unit coding with 96 (optionally up to 9216) coding variants prevents swapping of withdrawable units of the same size.



Withdrawable unit coding in the compartment

Withdrawable unit coding on the unit

More information

More information can be found on the Internet at www.siemens.com/sivacon-S8

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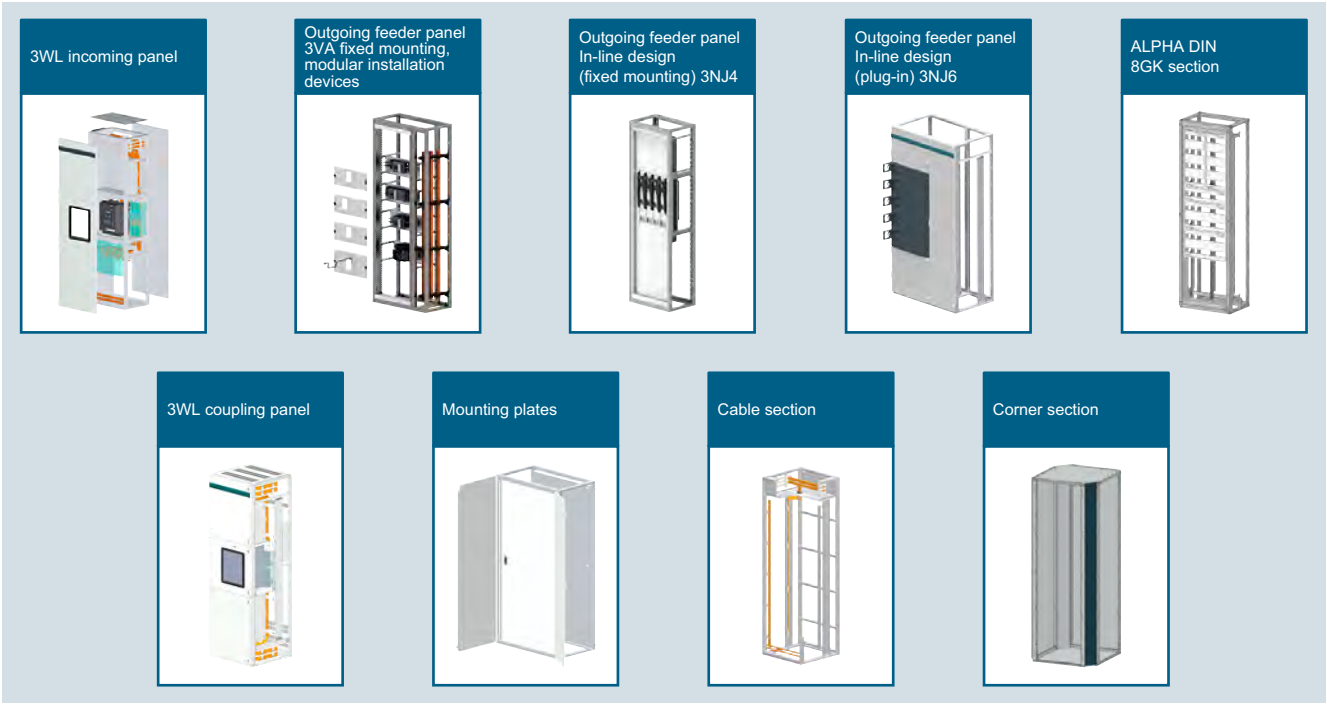
Overview



Area of application

SIVACON S4 is a system for producing a design-verified switchgear and controlgear assembly compliant with IEC 61439-1/2, which is used for supplying the infrastructure. Applications include:

- Administrative and special-purpose buildings
- Industrial and commercial buildings
- Public buildings
- Schools

The concept of the SIVACON S4 low-voltage power distribution board is characterized by a high level of personal and plant safety.

SIVACON S4 low-voltage power distribution boards are constructed according to a modular design system. Thanks to the use of requirements-based, standardized and series-produced assembly kits and the wide range of possible combinations offered, almost every need in connection with low-voltage power distribution can be optimally met.

Features at a glance

- System for producing a design-verified switchgear and controlgear assembly in accordance with IEC 61439-1/2
- Easy design and configuring with the SIMARIS configuration software tool (see chapter "Software")
- The construction of main busbars in separate phases enables the vast majority of connections to be made without the need for drilling and permits economical scaling of the copper bars
- Intelligent ventilation concept harmonized with the Siemens components reduces the derating to a minimum
- Extremely flexible application. Cables can be connected from top / bottom and rear
- Power distribution boards and components from a single source

Minimum order quantity (PS) or a multiple thereof can be ordered.

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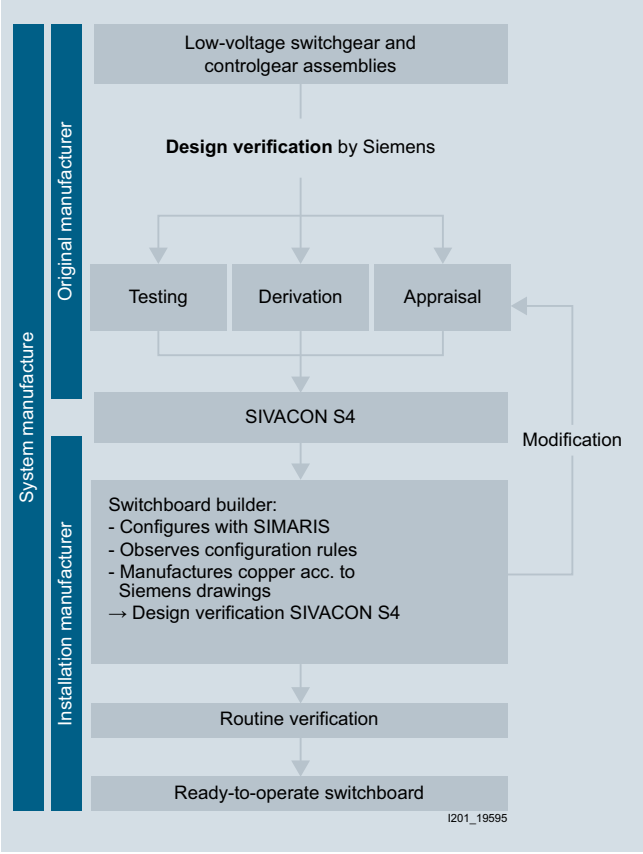
Benefits

Construction and testing modalities acc. to IEC 61439-1/-2

The area of responsibility of the units involved is clearly defined within the switchboard standard. With SIVACON S4 Siemens as the original manufacturer is offering a system for producing a design-verified switchgear and controlgear assembly.

The switchboard builder (manufacturer of the switchgear and controlgear assembly) combines it in accordance with the application and configuration rules specified by Siemens. The free-of-charge SIMARIS configuration software provides assistance in this regard. What is more, all the copper drawings and terminal diagrams of the devices are stored in this program. This means that the design verifications performed by Siemens still retain their validity. In the event of a customer-specific modification the switchboard builder naturally slips into the role of the original manufacturer and ensures compliance with applicable standards.

After carrying out the routine test and commissioning, a ready-to-operate switchgear and controlgear assembly is created which is then handed over to the owner of the plant. This regulated procedure creates trust and provides a reliable, uninterruptible power supply.



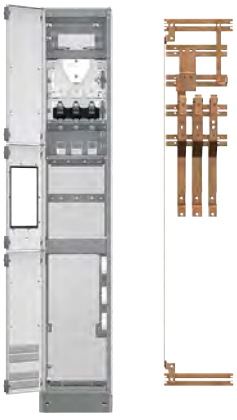
Delivery options



Flat-pack



Pre-assembled with copper



Pre-assembled without copper

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards and regulations	System for producing a design-verified switchgear and controlgear assembly	IEC 61439-1/2 EN 61439-1/2
Key electrical data		
	Rated operational voltage (U_e) Type of current Rated frequency	Up to 690 V AC 50/60 Hz
	Rated impulse withstand voltage (U_{imp}) Pollution degree Material group Rated insulation voltage (U_i)	Up to 12 kV 3 II 1000 V
	Rated current (I_n) Rated peak withstand current (I_{pk}) Rated short-time withstand current (I_{cw})	Up to 4000 A Up to 220 kA Up to 100 kA, 1 s
Arcing fault testing Main busbar in compliance with IEC TR 61641	Rated operational voltage Rated short-time alternating current Length of internal arc Length of internal arc with barrier	400 V 50 kA 100 ms 300 ms
Safety class	According to IEC 61140, EN 61140	I
Degree of protection	According to IEC 60529, EN 60529 Ventilated Non-ventilated	 IP30, IP31 [3NJ4 due to modular door] IP40, IP41 IP55
Form of internal separation		1 - No separation 2b - Separation, main busbars 3b - Separation, devices 4b - Separation, connections
Impact strength	According to IEC 62262, Paragraph 9.6 Front frame with quick-closing covers Top plate Door, side panel, rear panel	 IK08 IK09 IK10
Max. construction weight According to IEC 62208, Paragraph 9.3, 9.4	Static load	1200 kg
Operating conditions		
Observe correction factors for other conditions		
Ambient temperature Installation altitudes	24 hour mean value	≤ 35 °C ≤ 2000 m
Installation Operating personnel		Indoor installation Electrically skilled persons acc. to (IEC 61439-1, Paragraph 3.7.12)
Plate thickness	Frame Enclosure Covers	2.5 mm 1.5 mm 1.0 mm
Surface treatment		
Frame components and interior components Enclosure parts	Sendzimir-galvanized Epoxy polyester resin Iron phosphating Powder coating thickness	Min. 20 µm RAL 7035 100 µm (+/- 25 µm)
Dimensions		
Frame exterior dimensions	Height in mm Width in mm Depth in mm	2000 350, 400, 600, 800, 850, 1000, 1200 400, 600, 800
Hole pattern in frame acc. to DIN 43660	in mm	25
Base	Height in mm	100, 200

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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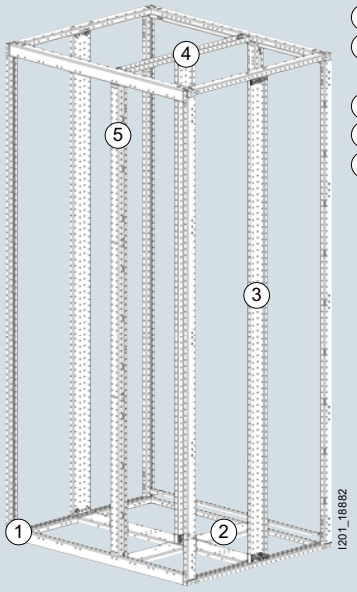
Overview

Features

Standardized grid dimensions

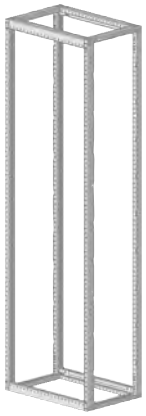
- Frame divisions: possible every 200 mm
- Assembly kits: 400, 600 and 800 mm
- Cable compartments: 200, 400 mm
- Vertical busbar: 200, 400 mm

Equipment height for assembly kits: 1800 mm



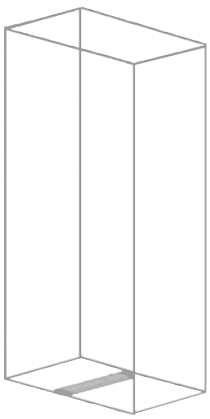
1 Frame
2 Bottom plate partition crossbar
3 Interior side upright
4 Section division
5 Exterior intermediate upright

Selection and ordering data



① **Frame**
Height: 2000 mm

Width in mm	Depth in mm	Article No. www.siemens.com/product?Article No.	PS
400	400	**8PQ1204-4BA01**	1 unit
	600	**8PQ1204-6BA01**	1 unit
	800	**8PQ1204-8BA01**	1 unit
600	400	**8PQ1206-4BA01**	1 unit
	600	**8PQ1206-6BA01**	1 unit
	800	**8PQ1206-8BA01**	1 unit
800	400	**8PQ1208-4BA01**	1 unit
	600	**8PQ1208-6BA01**	1 unit
	800	**8PQ1208-8BA01**	1 unit
1000	400	**8PQ1201-4BA02**	1 unit
	600	**8PQ1201-6BA02**	1 unit
	800	**8PQ1201-8BA03**	1 unit
1200	400	**8PQ1202-4BA02**	1 unit
	600	**8PQ1202-6BA02**	1 unit
	800	**8PQ1202-8BA02**	1 unit



② **Bottom plate partition crossbars**
For width 600 to 1200 mm

Depth in mm	Quantity	Article No. www.siemens.com/product?Article No.	PS
400	1 ×	**8PQ3000-1BA38**	1 unit
600	1 ×	**8PQ3000-1BA40**	1 unit
800	2 ×	**8PQ3000-1BA38**	1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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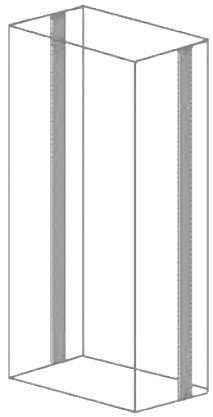
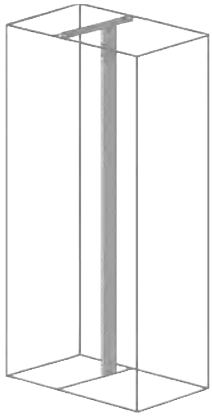
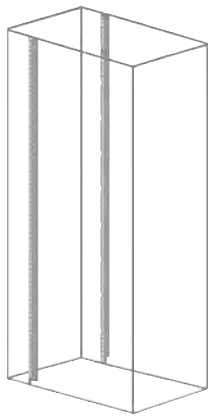
Without main busbar

	Version	Article No. www.siemens.com/product?Article No.	PS
	③ **Interior side uprights** • For width from 400 to 1200 mm • For depth from 600 to 800 mm • Not required for depth 400		
	Depth in mm		
	600	**8PQ3000-0BA03**	1 unit
	800		
	④ **Section division** • Not required for depth 400		
	Depth in mm		
	600	**8PQ3000-1BA36**	1 unit
	800	**8PQ3000-1BA37**	1 unit
	⑤ **Exterior intermediate uprights** For fitting • Outer covers • Section doors • Modular doors	**8PQ3000-1BA43**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

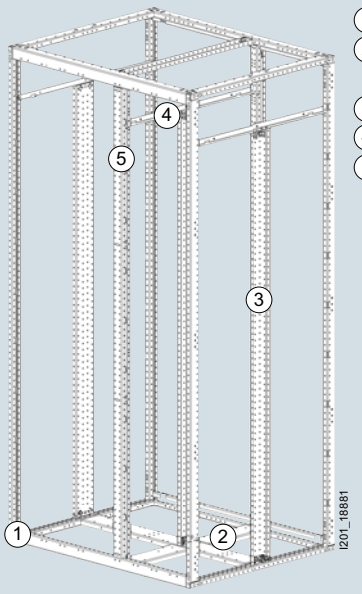
Frame divisions in a grid size of 200 mm are possible.

Features

Standardized section widths

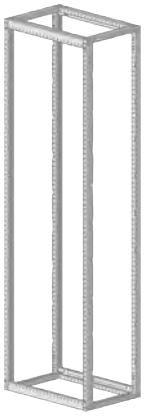
- Frame divisions: possible every 200 mm
- Assembly kits: 400, 600 and 800 mm
- Cable compartments: 200, 400 mm
- Vertical busbar: 200, 400 mm

Equipment height for assembly kits: 1600 mm



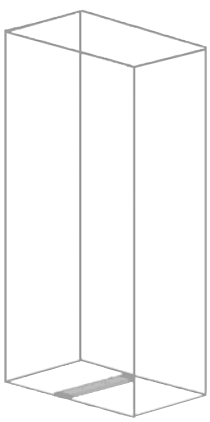
1 Frame
2 Bottom plate partition crossbar
3 Interior side upright
4 Section division
5 Exterior intermediate upright

Selection and ordering data



① **Frame**
Height: 2000 mm

Width in mm	Depth in mm	Article No. www.siemens.com/product?Article No.	PS
400	400	**8PQ1204-4BA01**	1 unit
	600	**8PQ1204-6BA01**	1 unit
	800	**8PQ1204-8BA01**	1 unit
600	400	**8PQ1206-4BA01**	1 unit
	600	**8PQ1206-6BA01**	1 unit
	800	**8PQ1206-8BA01**	1 unit
800	400	**8PQ1208-4BA01**	1 unit
	600	**8PQ1208-6BA01**	1 unit
	800	**8PQ1208-8BA01**	1 unit
1000	400	**8PQ1201-4BA02**	1 unit
	600	**8PQ1201-6BA02**	1 unit
	800	**8PQ1201-8BA03**	1 unit
1200	400	**8PQ1202-4BA02**	1 unit
	600	**8PQ1202-6BA02**	1 unit
	800	**8PQ1202-8BA02**	1 unit



② **Bottom plate partition crossbars**
For width 800 to 1200 mm

Depth in mm	Quantity	Article No. www.siemens.com/product?Article No.	PS
400	1 ×	**8PQ3000-1BA38**	1 unit
600	1 ×	**8PQ3000-1BA40**	1 unit
800	2 ×	**8PQ3000-1BA38**	1 unit

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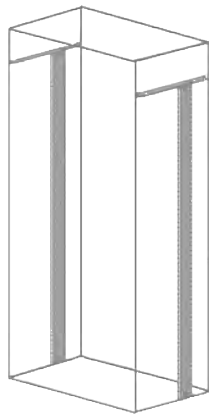
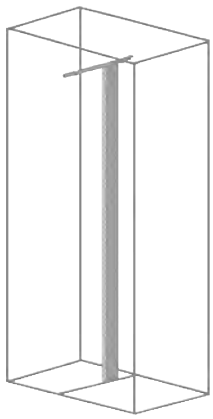
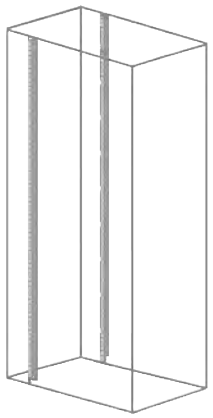
Main busbar at top

	Version	Article No. www.siemens.com/product?Article No.	PS
	③ **Interior side uprights** For width from 800 to 1200 mm		
	Depth in mm		
	400	**8PQ3000-0BA65**	1 unit
	600	**8PQ3000-0BA01**	1 unit
	800	**8PQ3000-0BA02**	1 unit
	④ **Section division**		
	Depth in mm		
	400	**8PQ3000-1BA31**	1 unit
	600	**8PQ3000-1BA32**	1 unit
	800	**8PQ3000-1BA34**	1 unit
	⑤ **Exterior intermediate uprights** For fitting • Outer covers • Section doors • Modular doors	**8PQ3000-1BA43**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Features

Standardized grid dimensions

- Frame divisions possible every 200 mm
- Assembly kits: 400, 600, 800 mm
- Cable compartments: 400, 600 mm
- Vertical busbar: 200, 400

Equipment height for assembly kits 1600 mm

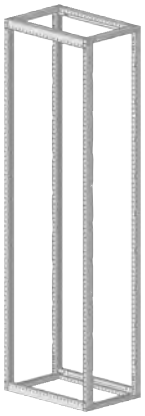
Configuration

Main busbar at bottom conditionally at least form 2b



1 Frame
2 Interior side upright
3 Section division
4 Exterior intermediate upright

Selection and ordering data



Version		Article No. www.siemens.com/product?Article No.	PS
① **Frame** Height: 2000 mm			
Width in mm	Depth in mm		
400	400	**8PQ1204-4BA01**	1 unit
	600	**8PQ1204-6BA01**	1 unit
	800	**8PQ1204-8BA01**	1 unit
600	400	**8PQ1206-4BA01**	1 unit
	600	**8PQ1206-6BA01**	1 unit
	800	**8PQ1206-8BA01**	1 unit
800	400	**8PQ1208-4BA01**	1 unit
	600	**8PQ1208-6BA01**	1 unit
	800	**8PQ1208-8BA01**	1 unit
1000	400	**8PQ1201-4BA02**	1 unit
	600	**8PQ1201-6BA02**	1 unit
	800	**8PQ1201-8BA03**	1 unit
1200	400	**8PQ1202-4BA02**	1 unit
	600	**8PQ1202-6BA02**	1 unit
	800	**8PQ1202-8BA02**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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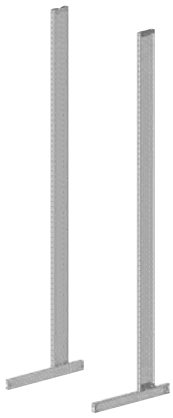
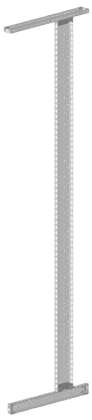
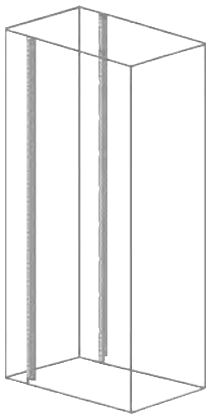
Main busbar at bottom

	Version	Article No. www.siemens.com/product?Article No.	PS
	② **Interior side uprights**		
	Depth in mm		
	400	**8PQ3000-0BA10**	1 unit
	600	**8PQ3000-3BA10**	1 unit
	800	**8PQ3000-3BA11**	1 unit
	③ **Section division**		
	Depth in mm		
	400	**8PQ3000-0BA10**	1 unit
	600	**8PQ3000-3BA47**	1 unit
	800	**8PQ3000-3BA48**	1 unit
	④ **Exterior intermediate uprights** For fitting • Outer covers • Section doors • Modular doors	**8PQ3000-1BA43**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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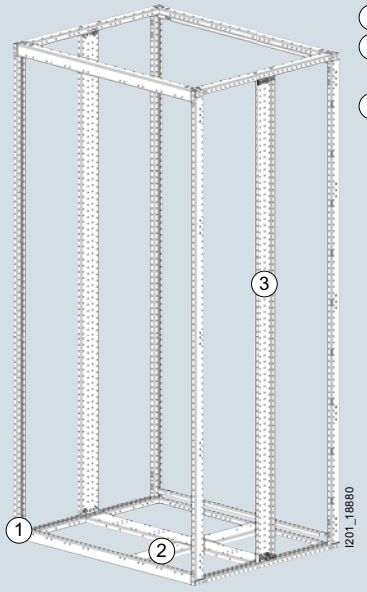
Overview

Features

Standardized section widths

- Frame divisions: possible every 200 mm
- Assembly kits: 400, 600 and 800 mm
- Cable compartments: 200, 400 mm
- Vertical busbar: 200, 400 mm

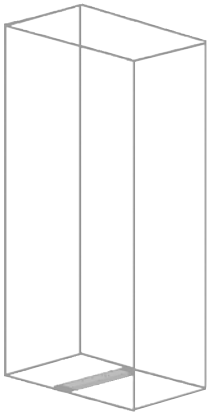


Selection and ordering data



① **Frame**
Height: 2000 mm

Depth in mm	Width in mm	Article No. www.siemens.com/product?Article No.	PS
800	400	**8PQ1204-8BA01**	1 unit
	600	**8PQ1206-8BA01**	1 unit
	800	**8PQ1208-8BA01**	1 unit
	1000	**8PQ1201-8BA03**	1 unit
	1200	**8PQ1202-8BA02**	1 unit



② **Bottom plate partition crossbars**
For width 600 to 1200 mm

Depth in mm	Quantity	Article No. www.siemens.com/product?Article No.	PS
800	2 ×	**8PQ3000-1BA38**	1 unit

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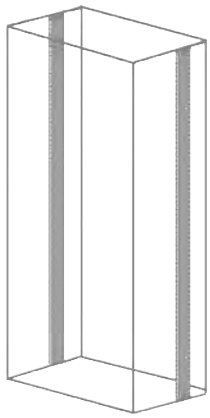
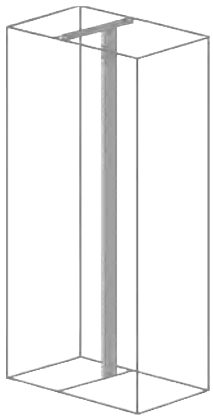
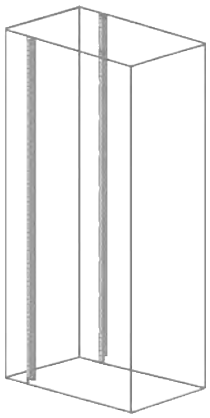
Main busbar at rear

	Version	Article No. www.siemens.com/product?Article No.	PS
	③ **Interior side uprights** • Equipment height: 1800 mm • For width from 400 to 1200 mm Depth in mm		
	800	**8PQ3000-0BA03**	1 unit
	**Section division** Depth in mm		
	800	**8PQ3000-1BA37**	1 unit
	**Exterior intermediate uprights** For fitting • Outer covers • Section doors • Modular doors	**8PQ3000-1BA43**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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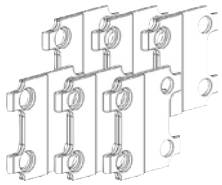
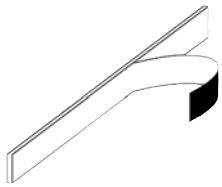
Selection and ordering data

	Version		Article No. www.siemens.com/product?Article No.	PS
	**Frame reinforcements** • Recommended for frame widths from 1000 mm • 1 set = 2 units		**8PQ9400-0BA35**	1 unit
	**Crossbar** • 1 set = 2 units			
	Frame width			
	For frame width in mm	Crossbar length in mm		
	400	350	**8PQ3000-0BA12**	1 unit
	600	550	**8PQ3000-0BA71**	1 unit
	800	750	**8PQ3000-0BA72**	1 unit
	1000	950	**8PQ3000-0BA84**	1/2 units
	1200	1150	**8PQ3000-0BA85**	1/2 units
	Frame depth without side uprights ③			
	For frame depth in mm	Crossbar length in mm		
	400	300	**8PQ3000-0BA10**	1 unit
	600	500	**8PQ3000-1BA24**	1/2 units
	800	700	**8PQ3000-1BA25**	1/2 units
	Frame depth with side uprights ③			
	For frame depth in mm	Crossbar length in mm		
	600 800	300	**8PQ3000-0BA10**	1 unit
	**Universal brackets** • For mounting expansion elements		**8MF1000-2CP**	10 units
	**Board coupling kits** 1 set = 6 units including fasteners		**8PQ1204-4BA05**	1 unit
	**Board coupling gasket kits** • 5.5 m gasket roll included in delivery • To maintain IP55 degree of protection		**8PQ1204-4BA04**	1 unit
	Self-tapping screws • For use with frame and crossbars			
	Cylinder-head screws			
 T30	External diameter × length in mm			
	M6 × 10		**8PQ9500-0BA34**	1 unit
	M6 × 16		**8PQ9500-0BA32**	1 unit
	M6 × 20		**8PQ9500-0BA31**	1 unit
	Cap, RAL 7035		**8PQ9400-0BA14**	1 unit
 T30	***Countersunk screws***			
	External diameter × length in mm			
	M6 × 12		**8PQ9500-1BA07**	1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



1 Base
2 Bottom plate
3 Rear panel
4 Side panel
5 Top plate
6 Doors / alternatively, frame paneling

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Version		Article No. www.siemens.com/product?Article No.	PS
① **Base corner pieces with front cover**			
			
Height in mm	Width in mm		
100	400	**8PQ1014-0BA01**	1 unit
	600	**8PQ1016-0BA01**	1 unit
	800	**8PQ1018-0BA01**	1 unit
	1000	**8PQ1011-0BA01**	1 unit
	1200	**8PQ1012-0BA01**	1 unit
			
Height in mm	Width in mm		
200	400	**8PQ1024-0BA01**	1 unit
	600	**8PQ1026-0BA01**	1 unit
	800	**8PQ1028-0BA01**	1 unit
	1000	**8PQ1021-0BA01**	1 unit
	1200	**8PQ1022-0BA01**	1 unit
			
Base covers, side			
Height in mm	Depth in mm		
100	400	**8PQ1010-4BA01**	1 unit
	600	**8PQ1010-6BA01**	1 unit
	800	**8PQ1010-8BA01**	1 unit
			
Base reinforcements for transport Height: 100 mm			
Frame width or depth in mm			
400		**8PQ1014-0BA02**	1 unit
600		**8PQ1016-0BA02**	1 unit
800		**8PQ1018-0BA02**	1 unit
1000		**8PQ1011-1BA01**	1/2 units
1200		**8PQ1012-2BA01**	1/2 units

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Paneling sections

Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS

② **Bottom plates**
For a frame depth of 800 mm, the bottom plates with a depth of 400 mm are needed **twice**.

• Main busbar at top





Depth in mm	Width in mm	Quantity	IP55		IP40, for cable entry	
400	200		**8PQ2302-4BA04**	1 unit	**--**	
	400		**8PQ2304-4BA05**	1 unit	**8PQ2304-4BA06**	1 unit
	600		**8PQ2306-4BA05**	1 unit	**8PQ2306-4BA06**	1 unit
	800		**8PQ2308-4BA05**	1 unit	**8PQ2308-4BA06**	1 unit
	1000		**8PQ2301-4BA04**	1 unit	**--**	
600	200		**8PQ2302-6BA04**	1 unit	**--**	
	400		**8PQ2306-4BA05**	1 unit	**8PQ2306-4BA06**	1 unit
	600		**8PQ2306-6BA05**	1 unit	**8PQ2306-6BA06**	1 unit
	800		**8PQ2308-6BA05**	1 unit	**8PQ2308-6BA06**	1 unit
800	200	2 ×	**8PQ2302-4BA04**	1 unit	**--**	
	400	2 ×	**8PQ2304-4BA05**	1 unit	**8PQ2304-4BA06**	1 unit
	600	2 ×	**8PQ2306-4BA05**	1 unit	**8PQ2306-4BA06**	1 unit
	800	2 ×	**8PQ2308-4BA05**	1 unit	**8PQ2308-4BA06**	1 unit
	1000	2 ×	**8PQ2301-4BA04**	1 unit	**--**	

• Main busbar at bottom



Depth in mm	Width in mm	IP20	
400	400	**8PQ2304-4BA14**	1 unit
	600	**8PQ2306-4BA10**	1 unit
	800	**8PQ2308-4BA13**	1 unit
	1000	**8PQ2301-4BA06**	1 unit
	1200	**8PQ2302-4BA05**	1 unit
600	400	**8PQ2304-6BA11**	1 unit
	600	**8PQ2306-6BA16**	1 unit
	800	**8PQ2308-6BA13**	1 unit
	1000	**8PQ2301-6BA05**	1 unit
	1200	**8PQ2302-6BA05**	1 unit
800	400	**8PQ2304-8BA05**	1 unit
	600	**8PQ2306-8BA05**	1 unit
	800	**8PQ2308-8BA10**	1 unit
	1000	**8PQ2301-8BA04**	1 unit
	1200	**8PQ2302-8BA04**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
③ **Rear panels**				
Width in mm	**IP40**		**IP55**	
400	**8PQ2420-4BA02**	1 unit	**8PQ2420-4BA01**	1 unit
600	**8PQ2420-6BA02**	1 unit	**8PQ2420-6BA01**	1 unit
800	**8PQ2420-8BA02**	1 unit	**8PQ2420-8BA01**	1 unit
1000	**8PQ2420-1BA02**	1 unit	**8PQ2420-1BA01**	1 unit
1200	**8PQ2420-2BA02**	1 unit	**8PQ2420-2BA01**	1 unit
④ **Side panels** 1 set = 2 units				
Depth in mm	**IP55**		**IP55, with design strip**	
400	**8PQ2520-4BA02**	1 unit	**8PQ2520-4BA01**	1 unit
600	**8PQ2520-6BA02**	1 unit	**8PQ2520-6BA01**	1 unit
800	**8PQ2520-8BA02**	1 unit	**8PQ2520-8BA01**	1 unit

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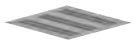
Paneling sections

Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
⑤ **Top plates**								
								
Depth in mm	Width in mm	**IP40**		**IPX1 upgrade**		**IP55**		**IP40, for cable entry**	
400	400	**8PQ2304-4BA02**	1 unit	**8PQ2304-4BA04**	1 unit	**8PQ2304-4BA01**	1 unit	**8PQ2304-4BA03**	1 unit
	600	**8PQ2306-4BA02**	1 unit	**8PQ2306-4BA04**	1 unit	**8PQ2306-4BA01**	1 unit	**8PQ2306-4BA03**	1 unit
	800	**8PQ2308-4BA02**	1 unit	**8PQ2308-4BA04**	1 unit	**8PQ2308-4BA01**	1 unit	**8PQ2308-4BA03**	1 unit
	1000	**8PQ2301-4BA02**	1 unit	**8PQ2301-4BA03**	1 unit	**8PQ2301-4BA01**	1 unit	**--**	
	1200	**8PQ2302-4BA02**	1 unit	**8PQ2302-4BA03**	1 unit	**8PQ2302-4BA01**	1 unit	**--**	
600	400	**8PQ2304-6BA02**	1 unit	**8PQ2304-6BA04**	1 unit	**8PQ2304-6BA01**	1 unit	**8PQ2304-6BA03**	1 unit
	600	**8PQ2306-6BA02**	1 unit	**8PQ2306-6BA04**	1 unit	**8PQ2306-6BA01**	1 unit	**8PQ2306-6BA03**	1 unit
	800	**8PQ2308-6BA02**	1 unit	**8PQ2308-6BA04**	1 unit	**8PQ2308-6BA01**	1 unit	**8PQ2308-6BA03**	1 unit
	1000	**8PQ2301-6BA02**	1 unit	**8PQ2301-6BA03**	1 unit	**8PQ2301-6BA01**	1 unit	**--**	
	1200	**8PQ2302-6BA02**	1 unit	**8PQ2302-6BA03**	1 unit	**8PQ2302-6BA01**	1 unit	**--**	
800	400	**8PQ2304-8BA02**	1 unit	**8PQ2304-8BA04**	1 unit	**8PQ2304-8BA01**	1 unit	**8PQ2304-8BA03**	1 unit
	600	**8PQ2306-8BA02**	1 unit	**8PQ2306-8BA04**	1 unit	**8PQ2306-8BA01**	1 unit	**8PQ2306-8BA03**	1 unit
	800	**8PQ2308-8BA02**	1 unit	**8PQ2308-8BA04**	1 unit	**8PQ2308-8BA01**	1 unit	**8PQ2308-8BA03**	1 unit
	1000	**8PQ2301-8BA02**	1 unit	**8PQ2301-8BA03**	1 unit	**8PQ2301-8BA01**	1 unit	**--**	
	1200	**8PQ2302-8BA02**	1 unit	**8PQ2302-8BA03**	1 unit	**8PQ2302-8BA01**	1 unit	**--**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Version		Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
⑥ **Doors with two-way interlocking system**							
Hinge position	Width in mm	**IP40**		**IP55**		**IP55, glass doors**	
Left	400	**8PQ2197-4BA08**	1 unit	**8PQ2197-4BA05**	1 unit	**--**	
	600	**8PQ2197-6BA06**	1 unit	**8PQ2197-6BA03**	1 unit	**8PQ2197-6BA10**	1 unit
	800	**8PQ2197-8BA06**	1 unit	**8PQ2197-8BA03**	1 unit	**8PQ2197-8BA10**	1 unit
	1000	**8PQ2197-1BA06**	1 unit	**8PQ2197-1BA03**	1 unit	**8PQ2197-1BA10**	1 unit
Right	400	**8PQ2197-4BA11**	1 unit	**8PQ2197-4BA10**	1 unit	**--**	
	600	**8PQ2197-6BA13**	1 unit	**8PQ2197-6BA12**	1 unit	**8PQ2197-6BA14**	1 unit
	800	**8PQ2197-8BA13**	1 unit	**8PQ2197-8BA12**	1 unit	**8PQ2197-8BA14**	1 unit
	1000	**8PQ2197-1BA18**	1 unit	**8PQ2197-1BA17**	1 unit	**8PQ2197-1BA20**	1 unit
Doors with rotary handle Suitable for installing semi-cylindrical profiles (available separately), see www.siemens.com/industrymall							
Hinge position	Width in mm	**IP40**		**IP55**		**IP55, glass doors**	
Left	400	**8PQ2197-4BA06**	1 unit	**8PQ2197-4BA03**	1 unit	**--**	
	600	**8PQ2197-6BA04**	1 unit	**8PQ2197-6BA01**	1 unit	**8PQ2197-6BA07**	1 unit
	800	**8PQ2197-8BA04**	1 unit	**8PQ2197-8BA01**	1 unit	**8PQ2197-8BA07**	1 unit
	1000	**8PQ2197-1BA07**	1 unit	**8PQ2197-1BA04**	1 unit	**8PQ2197-1BA11**	1 unit
Right	400	**8PQ2197-4BA07**	1 unit	**8PQ2197-4BA04**	1 unit	**--**	
	600	**8PQ2197-6BA05**	1 unit	**8PQ2197-6BA02**	1 unit	**8PQ2197-6BA08**	1 unit
	800	**8PQ2197-8BA05**	1 unit	**8PQ2197-8BA02**	1 unit	**8PQ2197-8BA08**	1 unit
	1000	**8PQ2197-1BA08**	1 unit	**8PQ2197-1BA05**	1 unit	**8PQ2197-1BA12**	1 unit
Outer covers Covering for cable compartment or vertical busbar							
Hinge position	Width in mm	**IP40**		**IP55**			
--	200	**8PQ2197-2BA15**	1 unit	**8PQ2197-2BA14**	1 unit		
	400	**8PQ2197-4BA02**	1 unit	**8PQ2197-4BA01**	1 unit		
Frame paneling Only in conjunction with internal covers							
Hinge position	Width in mm	**IP30**					
--	600	**8PQ2197-6BA11**	1 unit				
	800	**8PQ2197-8BA11**	1 unit				

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Paneling sections

Accessories

	Version	Article No. www.siemens.com/product?Article No.	PS
	Flat cylinders/two-way interlocking mechanism		
	Versions		
	Rotary handles with flat cylinder • Identical key type • Including key	**8PQ9400-0BA07**	1 unit
	Rotary handles with two-way interlocking mechanism	**8PQ9400-0BA08**	1 unit
	Coupling bars	**8PQ9400-0BA27**	1 unit
	Locking rods	**8PQ9400-0BA37**	1 unit
	Bar guides	**8PQ9400-0BA36**	1 unit

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	Version	Article No. www.siemens.com/product?Article No.	PS
	Semi-cylindrical profiles		
	Versions		
	Rotary handles with semi-cylindrical profile	**8PQ9400-0BA41**	1 unit
	Coupling bars	**8PQ9400-0BA28**	1 unit
	Locking rods	**8PQ9400-0BA38**	1 unit
	Bar guides	**8PQ9400-0BA36**	1 unit
	Semi-cylindrical profiles • Acc. to DIN 18252/18254 • 8 × 45° adjustable • Identical key type (key number 333) • Including key	**8PQ9400-0BA26**	1 unit
	**Door hinges** 1 set = 2 units	**8PQ9400-0BA55**	1/2 units
	**Cubicle keys** • 3 mm double bit • 1 pack = 10 units	**8PQ9400-0BA12**	1 unit
	**Inner door struts** • For use with section doors • Height 1975 mm	**8PQ2197-0BA10**	1 unit
	**Cubicle ID plates** SIVACON designed by Siemens	**8PQ9400-0BA06**	1 unit

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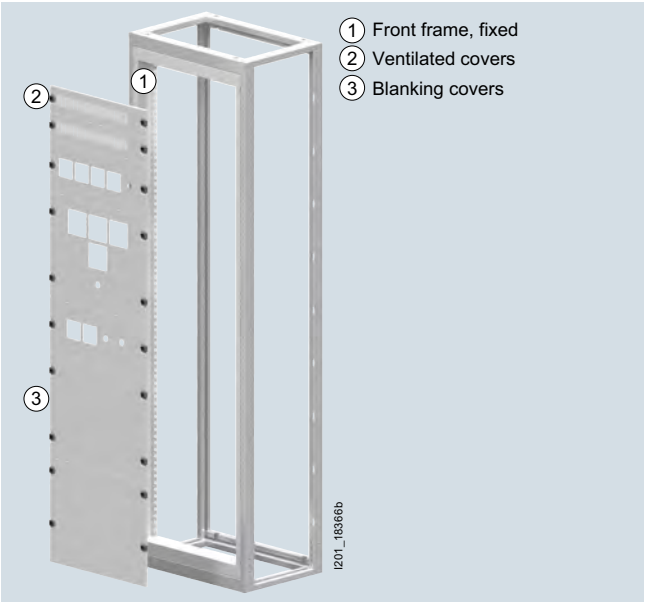
Internal covers

Overview

Configuration

- Can be combined with section doors and glazed doors and also frame paneling
- Internal covers not available in combination with modular doors
- Degree of protection: IP30 with door open or front frame



Selection and ordering data

Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
Front frames				
① **Without main busbar** Equipment height: 1800 mm				
Width in mm	**Fixed**		**Swivel**	
600	**8PQ2000-6BA04**	1 unit	**8PQ2000-6BA01**	1 unit
800	**8PQ2000-8BA04**	1 unit	**8PQ2000-8BA01**	1 unit
Main busbar at top Equipment height: 1600 mm				
Width in mm	**Fixed**		**Swivel**	
600	**8PQ2000-6BA03**	1 unit	**8PQ2000-6BA02**	1 unit
800	**8PQ2000-8BA03**	1 unit	**8PQ2000-8BA02**	1 unit
Covers				
② **Covers, ventilated**				
Height mm	Width mm			
100	600	**8PQ2010-6BA02**	1 unit	
	800	**8PQ2010-8BA02**	1 unit	

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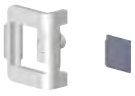
Version		Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
③ **Blanking covers**					
Height mm	Width mm	**Blanking cover**			
50	600	**8PQ2005-6BA01**	1 unit		
100		**8PQ2010-6BA01**	1 unit		
150		**8PQ2015-6BA02**	1 unit		
200		**8PQ2020-6BA01**	1 unit		
250		**8PQ2025-6BA01**	1 unit		
300		**8PQ2030-6BA01**	1 unit		
350		**8PQ2035-6BA01**	1 unit		
400		**8PQ2040-6BA01**	1 unit		
500		**8PQ2050-6BA01**	1 unit		
550		**8PQ2055-6BA01**	1 unit		
600		**8PQ2060-6BA01**	1 unit		
650		**8PQ2065-6BA01**	1 unit		
800		**8PQ2080-6BA01**	1 unit		
50	800	**8PQ2005-8BA01**	1 unit		
100		**8PQ2010-8BA01**	1 unit		
150		**8PQ2015-8BA02**	1 unit		
200		**8PQ2020-8BA01**	1 unit		
250		**8PQ2025-8BA01**	1 unit		
300		**8PQ2030-8BA01**	1 unit		
350		**8PQ2035-8BA01**	1 unit		
400		**8PQ2040-8BA01**	1 unit		
500		**8PQ2050-8BA01**	1 unit		
550		**8PQ2055-8BA01**	1 unit		
600		**8PQ2060-8BA01**	1 unit		
650		**8PQ2065-8BA01**	1 unit		
800		**8PQ2080-8BA01**	1 unit		
Accessories					
	**Hinges for cover** • Hinge position: left/right • 1 pack = 10 units	**8GK9120-0KK11**	10 units		
	**1/4 turn screws** • 1 pack = 20 units	**8PQ9400-0BA54**	1/20 units		

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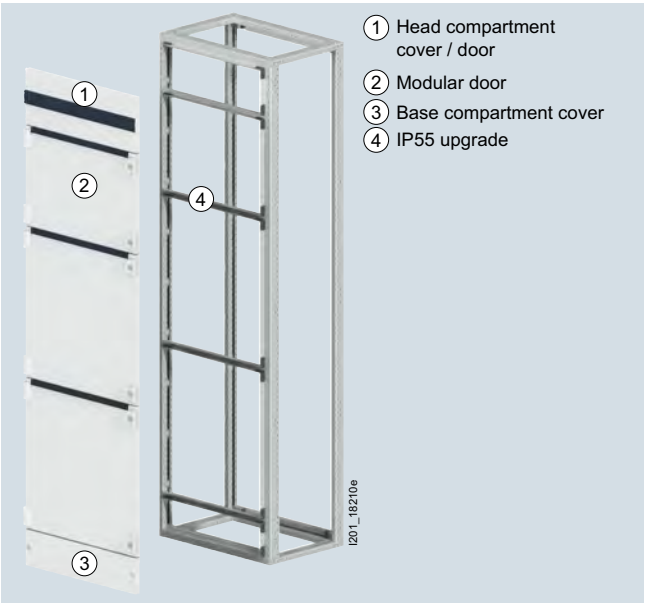
Overview

Configuration

- Modular doors cannot be combined with internal covers
- For load capacity of the doors, see Technical Specifications, page 16/8.



Selection and ordering data

Version		Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
Paneling for main busbar					
① **Head compartment covers**					
• For main busbar at top					
Width mm	Height mm	**IP4X**		**IP55 upgrade**	
400	225	**8PQ2022-4BA01**	1 unit	**8PQ2022-4BA03**	1 unit
600		**8PQ2022-6BA01**	1 unit	**8PQ2022-6BA02**	1 unit
800		**8PQ2022-8BA01**	1 unit	**8PQ2022-8BA02**	1 unit
• For main busbar at bottom					
Width mm	Height mm	**IP4X**		**IP55 upgrade**	
400	175	**8PQ2000-4BA02**	1 unit	**8PQ2022-4BA03**	1 unit
600		**8PQ2000-6BA08**	1 unit	**8PQ2022-6BA02**	1 unit
800		**8PQ2000-8BA08**	1 unit	**8PQ2022-8BA02**	1 unit
Head compartment doors					
Width mm	Height mm	**IP4X**		**IP55 upgrade**	
400	225	**8PQ2022-4BA04**	1 unit	**8PQ2022-4BA03**	1 unit
	725	**8PQ2072-4BA02**	1 unit	**8PQ2070-4BA06**	1 unit
600	225	**8PQ2022-6BA04**	1 unit	**8PQ2022-6BA02**	1 unit
	725	**8PQ2072-6BA01**	1 unit	**8PQ2070-6BA11**	1 unit
800	225	**8PQ2022-8BA03**	1 unit	**8PQ2022-8BA02**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version		Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
Compartment paneling					
② **Modular doors**					
Width mm	Height mm	**IP4X**		**IP55 upgrade**	
400	150	**8PQ2015-4BA04**	1 unit	**8PQ2015-4BA05**	1 unit
	200	**8PQ2020-4BA01**	1 unit	**8PQ2020-4BA03**	1 unit
	250	**8PQ2025-4BA01**	1 unit	**8PQ2025-4BA02**	1 unit
	300	**8PQ2030-4BA01**	1 unit	**8PQ2030-4BA02**	1 unit
	350	**8PQ2035-4BA01**	1 unit	**8PQ2035-4BA02**	1 unit
	400	**8PQ2040-4BA01**	1 unit	**8PQ2040-4BA03**	1 unit
	450	**8PQ2045-4BA01**	1 unit	**8PQ2045-4BA02**	1 unit
	500	**8PQ2050-4BA01**	1 unit	**8PQ2050-4BA02**	1 unit
	550	**8PQ2055-4BA11**	1 unit	**8PQ2055-4BA07**	1 unit
	600	**8PQ2060-4BA01**	1 unit	**8PQ2060-4BA03**	1 unit
	650	**8PQ2065-4BA01**	1 unit	**8PQ2065-4BA02**	1 unit
	700	**8PQ2070-4BA07**	1 unit	**8PQ2070-4BA08**	1 unit
	750	**8PQ2072-4BA01**	1 unit	**8PQ2075-4BA01**	1 unit
	800	**8PQ2080-4BA01**	1 unit	**8PQ2080-4BA04**	1 unit
600	150	**8PQ2015-6BA10**	1 unit	**8PQ2015-6BA12**	1 unit
	200	**8PQ2020-6BA14**	1 unit	**8PQ2020-6BA15**	1 unit
	250	**8PQ2025-6BA07**	1 unit	**8PQ2025-6BA08**	1 unit
	300	**8PQ2030-6BA10**	1 unit	**8PQ2030-6BA12**	1 unit
	350	**8PQ2035-6BA12**	1 unit	**8PQ2035-6BA13**	1 unit
	400	**8PQ2040-6BA12**	1 unit	**8PQ2040-6BA13**	1 unit
	450	**8PQ2045-6BA05**	1 unit	**8PQ2045-6BA06**	1 unit
	500	**8PQ2050-6BA03**	1 unit	**8PQ2050-6BA04**	1 unit
	550	**8PQ2055-6BA04**	1 unit	**8PQ2055-6BA06**	1 unit
	600	**8PQ2060-6BA06**	1 unit	**8PQ2060-6BA07**	1 unit
	650	**8PQ2065-6BA03**	1 unit	**8PQ2065-6BA04**	1 unit
	700	**8PQ2070-6BA03**	1 unit	**8PQ2070-6BA04**	1 unit
	750	**8PQ2075-6BA01**	1 unit	**8PQ2075-6BA02**	1 unit
	800	**8PQ2080-6BA03**	1 unit	**8PQ2080-6BA04**	1 unit
800	150	**8PQ2015-8BA05**	1 unit	**8PQ2015-8BA07**	1 unit
	200	**8PQ2020-8BA07**	1 unit	**8PQ2020-8BA08**	1 unit
	250	**8PQ2025-8BA04**	1 unit	**8PQ2025-8BA05**	1 unit
	300	**8PQ2030-8BA05**	1 unit	**8PQ2030-8BA06**	1 unit
	350	**8PQ2035-8BA06**	1 unit	**8PQ2035-8BA07**	1 unit
	400	**8PQ2040-8BA12**	1 unit	**8PQ2040-8BA13**	1 unit
	450	**8PQ2045-8BA03**	1 unit	**8PQ2045-8BA04**	1 unit
	500	**8PQ2050-8BA03**	1 unit	**8PQ2050-8BA04**	1 unit
	550	**8PQ2055-8BA03**	1 unit	**8PQ2055-8BA06**	1 unit
	600	**8PQ2060-8BA04**	1 unit	**8PQ2060-8BA05**	1 unit
	650	**8PQ2065-8BA03**	1 unit	**8PQ2065-8BA04**	1 unit
	700	**8PQ2070-8BA01**	1 unit	**8PQ2070-8BA02**	1 unit
	750	**8PQ2075-8BA01**	1 unit	**8PQ2075-8BA02**	1 unit
	800	**8PQ2080-8BA03**	1 unit	**8PQ2080-8BA04**	1 unit
Modular cover					
					
Width mm	Height mm	**IP4X**		**IP55 upgrade**	
400	50	**8PQ2005-4BA03**	1 unit	**8PQ2005-4BA01**	1 unit
	100	**8PQ2010-4BA02**	1 unit	**8PQ2010-4BA01**	1 unit
600	50	**8PQ2005-6BA04**	1 unit	**8PQ2005-6BA03**	1 unit
	100	**8PQ2010-6BA04**	1 unit	**8PQ2010-6BA03**	1 unit
800	50	**8PQ2005-8BA04**	1 unit	**8PQ2005-8BA03**	1 unit
	100	**8PQ2010-8BA04**	1 unit	**8PQ2010-8BA03**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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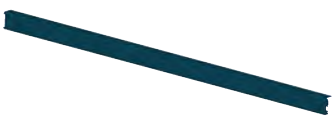
Modular doors

Version		Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
Paneling for PE bar					
③ **Base compartment covers** • Compartment height base compartment = cover height + 25 mm floor clearance					
Width mm	Height mm	**IP4X**		**IP55 upgrade**	
400	150	**8PQ2015-4BA01**	1 unit	**8PQ2015-4BA03**	1 unit
600		**8PQ2000-6BA07**	1 unit	**8PQ2015-6BA13**	1 unit
800		**8PQ2000-8BA07**	1 unit	**8PQ2015-8BA08**	1 unit
Base compartment doors • Compartment height base compartment = door height + 25 mm floor clearance					
Width mm	Height mm	**IP4X**		**IP55 upgrade**	
400	700	**8PQ2070-4BA01**	1 unit	**8PQ2070-4BA05**	1 unit
600		**8PQ2070-6BA05**	1 unit	**8PQ2070-6BA10**	1 unit
Accessories					
	**Door hinges** 1 set = 2 units	**8PQ9400-0BA55**	1/2 units		
	**Door locks with two-way interlocking mechanism**	**8PQ9400-0BA40**	1 unit		
	**Handles for modular door**				
	Version				
	• Standard • Lockable - Flat cylinders - Identical key type - Including key	**8PQ9400-0BA73** **8PQ9400-0BA72**			
	**ID strips** 1 pack = 6 units				
	Width in mm				
	400 600 800	**8PQ5000-3BA42** **8PQ5000-3BA43** **8PQ5000-3BA46**	1/6 units 1/6 units 1 unit		
	**Inner door struts** • 1 pair = 2 units				
	Height in mm				
	400 550 600/625 700/725 800	**8PQ2040-0BA06** **8PQ2055-0BA05** **8PQ2060-0BA14** **8PQ2070-0BA02** **8PQ2080-0BA07**	1 unit 1 unit 1 unit 1 unit 1 unit		
	**Cubicle keys** • 3 mm double bit • 1 pack = 10 units	**8PQ9400-0BA12**	1 unit		

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Features

- Appropriate scaling of rated currents, matched to standard transformers
- Division of the phases into bars enables installation without the need to drill holes and increased current carrying capacity
- Simplified handling of one or more cubicles

Configuration

- Compatible network configurations TN-C, TN-S, IT and TT

	Type	Positioning	Equipment height mm	Rated current A	Frame depth mm	Rated impulse withstand voltage U_{imp} kV
	Top	--	1600	Up to 3200	400	8
		Front	1600	Up to 3200	600	12
			1600	Up to 3200	800	12
		On two sides	1600	Up to 4000	800	12
	Rear	--	1800	Up to 3200	800	8

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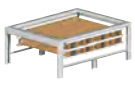
Main busbar

Main busbar top and bottom

Number of bars per phase	Cross-section	Rated operational current I_e [1]					
		Section depth 400 mm		Section depth 600 mm		Section depth 800 mm	
	mm	IP ≤ IP41	IP55	IP ≤ IP41	IP55	IP ≤ IP41	IP55
2 	20 × 10	1190	965	1190	965	1190	965
	30 × 10	1630	1310	1630	1310	1630	1310
4 	20 × 10	1920	1480	1920	1540	1930	1650
	30 × 10	2470	1870	2490	1950	2510	2110
	40 × 10	3010	2250	3040	2350	3100	2560
	50 × 10	3270	2450	3320	2570	3410	2820
2 × 4 	20 × 10	--	--	--	--	3700	3000
	30 × 10					4660	3680

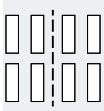
Main busbar at rear

Number of bars per phase	Cross-section	Rated operational current I_e [1]	
		Section depth 800 mm	
	mm	IP ≤ IP41	IP55
2 	20 × 10	1190	965
	30 × 10	1630	1310
4 	20 × 10	1930	1650
	30 × 10	2510	2110
	40 × 10	3100	2560
	50 × 10	3410	2820

[1] With an ambient temperature of 35 °C (average over 24 hours) and 500 W power loss per section.

PE bar cross-section

Depends on the external conductors in accordance with IEC 61439-1, Para. 8.4.3.2.2 Table 5.

Number of bars per phase PE bar	Cross-section PE bar	Number of bars per phase Main busbar	Cross-section Main busbar
	mm		mm
2 	20 × 5	2	20 × 10
	20 × 5		30 × 10
	20 × 5	4 	20 × 10
	30 × 5		30 × 10
	40 × 5		40 × 10
	30 × 10		50 × 10
	40 × 5	2 × 4 	20 × 10
	30 × 10		30 × 10

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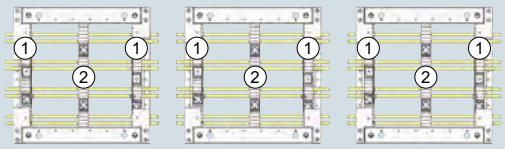
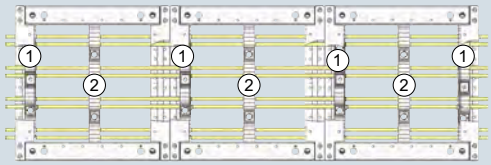
Required busbar reinforcements



Single-section transport unit



Multi-section transport unit

I201_18205

① Main busbar holder

② Reinforcement

- The number of reinforcements ② depends on the short-circuit currents and frame widths
- Correct configuration is automatically performed in SIMARIS configuration
- Further information is available in the SIVACON S4 Manual.

Busbar size		Section width	Number of reinforcements ② as a function of I_{pk}, I_{cw} and section width					
Number of bars per phase	Dimensions mm	mm	I_{cw} = 25 kA I_{pk} = 52.5 kA	I_{cw} = 35 kA I_{pk} = 73.5 kA	I_{cw} = 50 kA I_{pk} = 105 kA	I_{cw} = 65 kA I_{pk} = 143 kA	I_{cw} = 85 kA I_{pk} = 187 kA	I_{cw} = 100 kA I_{pk} = 220 kA
2	20 × 10	350	0	0	--	--	--	--
		400	0	0				
		600	0	0				
		800	1	1				
		850	1	1				
		1000	1	1				
		1200	2	2				
	30 × 10	350	--	0	0			
		400		0	0			
		600		0	1			
		800		1	1			
		850		1	1			
		1000		1	2			
		1200		2	2			
4	20 × 10	350		0	0	0		
		400		0	0	0		
		600		0	0	1		
		800		1	1	2		
		850		1	1	2		
		1000		2	2	3		
		1200		2	2	3		
	30 × 10	350		0	0	0	0	
		400		0	0	0	0	
		600		0	0	1	1	
		800		1	1	2	2	
		850		1	1	2	2	
		1000		2	2	3	3	
		1200		2	2	3	3	
	40 × 10	350		--	0	0	0	0
		400			0	0	0	0
		600			0	0	1	1
		800			1	1	2	2
		850			1	1	2	3
		1000			1	1	3	3
		1200			2	2	3	4
	50 × 10	350			0	0	0	0
		400			0	0	0	0
		600			0	0	1	1
		800			1	1	2	2
		850			1	1	2	3
		1000			1	1	3	3
		1200			2	2	3	4
2 × 4	20 × 10	350			--	0	0	0
		400				0	0	0
		600				2 × 1	2 × 1	2 × 1
		800				2 × 2	2 × 2	2 × 2
		850				2 × 3	2 × 3	2 × 3
		1000				2 × 3	2 × 3	2 × 3
		1200				2 × 4	2 × 4	2 × 4
	30 × 10	350				0	0	0
		400				0	0	0
		600				2 × 1	2 × 1	2 × 1
		800				2 × 2	2 × 2	2 × 2
		850				2 × 3	2 × 3	2 × 3
		1000				2 × 3	2 × 3	2 × 3
		1200				2 × 4	2 × 4	2 × 4

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Main busbar

Features

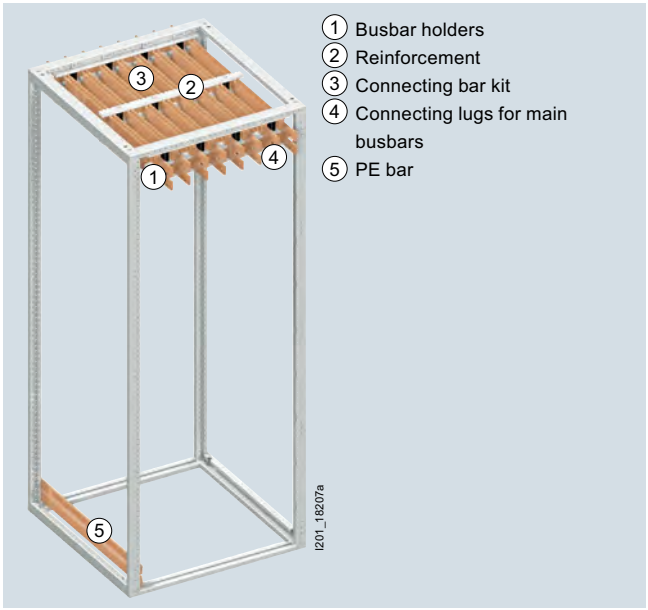
- Compatible busbar profiles



20 × 10
30 × 10
40 × 10
50 × 10

Configuration

Number of required reinforcements ② as a function of frame widths and rated short-time withstand current.



Selection and ordering data

	Version	Busbar cross-section mm × mm	Article No. www.siemens.com/product?Article No.	PS
Main busbar at top				
	① **Busbar holders** • Up to 3200 A • With PE bar connection to frame • 1 set = 2 units	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA04**	1 unit
	**Busbar holder** • > 3200 A • With PE bar connection to frame • 1 set = 2 units	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA60**	1 unit
	② **Reinforcements**	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA37**	1 unit
	③ **Connecting bar kits** • For busbar holders >3200 • Without fasteners	--	**8PQ4000-0BA62**	1 unit
	**Frame ground PEN** • For grounding the frame with PEN systems • One PE jumper is needed for each frame • Without fasteners • 1 pack = 10 units	--	**8PQ4000-0BA12**	1 unit
	**Arcing fault barriers** • Length of internal arc at main busbar up to 300 ms • One needed for each side panel • 1 set = 2 units	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ9400-0BA21**	1/2 units

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Main busbar at bottom

Features

- Compatible busbar profiles

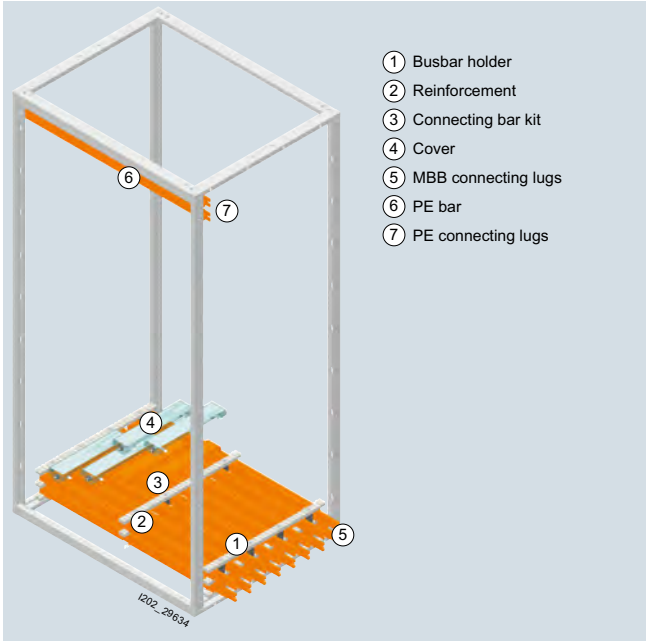


20 × 10
30 × 10
40 × 10
50 × 10

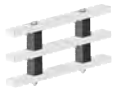
- Up to 3200 A rated current

Configuration

- Main busbar at bottom conditionally at least form 2b
- Number of required reinforcements ② as a function of frame widths and rated short-time withstand current.



Selection and ordering data

	Version	Busbar cross-section mm × mm	Article No. www.siemens.com/product?Article No.	PS
Main busbar at bottom				
	① **Busbar holders** • Up to 3200 A • With PE bar connection to frame • 1 set = 2 units	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA04**	1 unit
	**Busbar holder** • > 3200 A • With PE bar connection to frame • 1 set = 2 units	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA60**	1 unit
	② **Reinforcements**	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA37**	1 unit
	③ **Connecting bar kits** • For busbar holders >3200 • Without fasteners	--	**8PQ4000-0BA62**	1 unit
	④ **Covers** • For connecting bar kits • One cover per conductor	--	**8PQ4000-1BA25**	1 unit
	**Frame ground PEN** • For grounding the frame with PEN systems • One PE jumper is needed for each frame • Without fasteners • 1 pack = 10 units	--	**8PQ4000-0BA12**	1 unit
	**Arcing fault barriers** • Needed for arcing duration of between 100 ms and 300 ms. • One needed for each side panel • 1 set = 2 units	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ9400-0BA21**	1/2 units

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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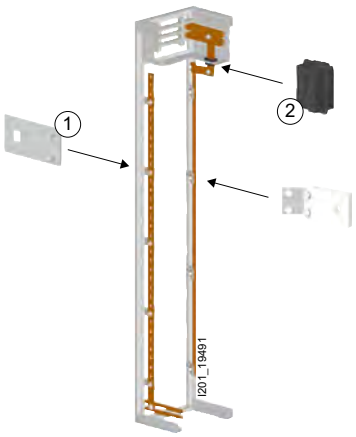
Main busbar

PE bar

	Version	Busbar cross-section mm × mm	Article No. www.siemens.com/product?Article No.	PS
	**Frame connection** 1 pack = 6 units Note The PE bar connection to the frame is included in the holder kit for the main busbar.	--	**8PQ4000-0BA82**	1 unit
	① PE connection Set contains 5 lugs for fixing the busbar. ② N / PEN connection As well as 4 mounted, insulated holders, the set contains two terminals for implementing separation 2B to the main busbar.		**8PQ4000-2BA22** **8PQ4000-2BA23**	1 unit 1 set

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Features

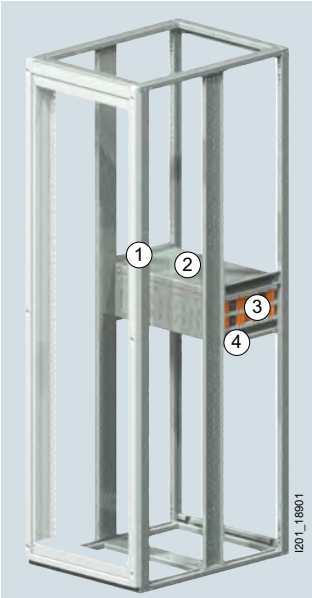
- Compatible busbar profiles



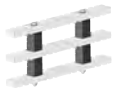
20 × 10
30 × 10
40 × 10
50 × 10

Configuration

Number of required reinforcements ② as a function of frame widths and rated short-time withstand current.



① Busbar holders
② Reinforcement
③ Connecting lugs
④ Crossbar

	Version	Busbar cross-section mm × mm	Article No. www.siemens.com/product?Article No.	PS
Main busbar at rear				
	① **Busbar holders** • Up to 3200 A • With PE bar connection to frame • 1 set = 2 units	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA04**	1 unit
	② **Reinforcements** Horizontal bar arrangement	20 × 10 30 × 10 40 × 10 50 × 10	**8PQ4000-0BA37**	1 unit
	④ **Crossbars** • Depth 400 mm • 1 set = 2 units	--	**8PQ3000-0BA10**	1 unit
	**PEN jumpers** • For main busbar at rear		**8PQ4000-2BA24**	1 set

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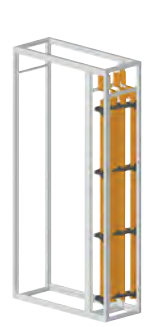
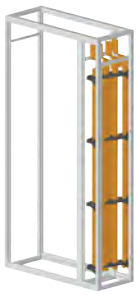
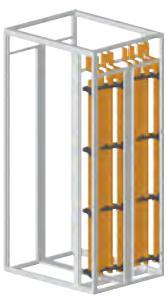
Overview

- The number of busbar holders depends on the short-circuit currents and frame widths
- Correct configuration is automatically performed in SIMARIS configuration
- Further information is available in the SIVACON S4 Manual.

Vertical busbar, cascaded

Number of bars per phase	Dimensions	Rated operational current I_e [1]		Required busbar holders			
				I_{cw} = 25 kA	I_{cw} = 35 kA	I_{cw} = 50 kA	I_{cw} = 65 kA
	mm	IP ≤ IP41	IP55	I_{pk} = 52.5 kA	I_{pk} = 73.5 kA	I_{pk} = 105 kA	I_{pk} = 143 kA
1 	30 × 10 40 × 10	910 1100	830 980	4 4	4 4	-- --	-- --
2 	30 × 10 40 × 10	1520 1640	1330 1330	4 4	4 4	4 4	6 6
2 × 2 	30 × 10 40 × 10	3040 3280	2660 2660	-- --	-- --	2 × 4 2 × 4	2 × 6 2 × 6

[1] With an ambient temperature of 35 °C (average over 24 hours, power loss 500 W per section and 95 K excess temperature)

Values of assumed loading

Acc. to IEC 61439-2, Table 101

Type of load	Assumed loading factor
Distribution - 2 and 3 circuits	0.9
Distribution - 4 and 5 circuits	0.8
Distribution - 6 and 9 circuits	0.7
Distribution - 10 or more circuits	0.6
Electric actuator	0.2
Motors ≤ 100 kW	0.8
Motors > 100 kW	1

Minimum order quantity (PS) or a multiple thereof can be ordered.

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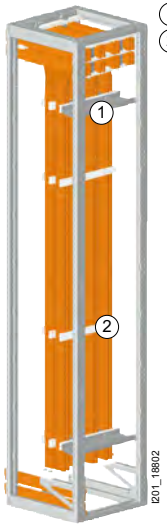
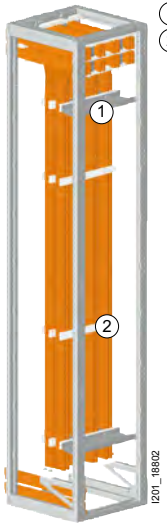
Vertical busbars, non-cascaded

Number of bars per phase	Dimensions mm	Rated operational current I_e [1] IP ≤ IP41	Rated operational current I_e [1] IP55	② Reinforcements I_{cw} = 25 kA I_{pk} = 52 kA	I_{cw} = 35 kA I_{pk} = 73 kA	I_{cw} = 50 kA I_{pk} = 105 kA	I_{cw} = 65 kA I_{pk} = 143 kA	I_{cw} = 85 kA I_{pk} = 187 kA	I_{cw} = 100 kA I_{pk} = 220 kA
2 ① Busbar holders ② Reinforcement  	20 × 10 30 × 10	1010 1360	830 1110	2 2	2 2	-- 3	-- --	-- --	-- --
4 ① Busbar holders ② Reinforcement  	20 × 10 30 × 10	1570 1930	1260 1580	2 2	2 2	3 3	4 4	-- 4	-- --
	40 × 10 50 × 10	2300 2490	1880 2030	2 2	2 2	2 2	2 2	4 4	4 4
2 × 4 	20 × 10 30 × 10	3140 3860	2520 3160	2 x 2 2 x 2	2 x 2 2 x 2	2 x 3 2 x 3	2 x 4 2 x 4	-- 2 x 4	-- --
	40 × 10 50 × 10	4600 4980	3760 4060	2 x 2 2 x 2	2 x 2 2 x 2	2 x 3 2 x 3	2 x 2 2 x 2	2 x 4 2 x 4	2 x 4 2 x 4

[1] With an ambient temperature of 35 °C (average over 24 hours) and 500 W power loss per section.

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Selection and ordering data

Cascaded

Features

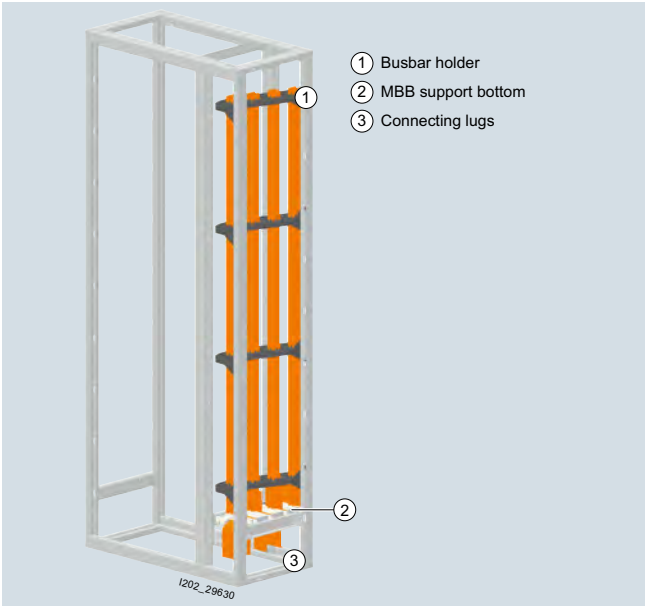
- For mounting on main busbar, top
- Compatible busbar profiles



30 × 10
40 × 10

Configuration

- Number of required busbar holders ① depends on the rated short-time withstand current.



Assembly kits

	Version		Article No. www.siemens.com/product?Article No.	PS
Cascaded				
	① **Busbar holders**			
	Compartment width mm	Busbar dimensions mm × mm		
	200	30 × 10 ▯ Flat copper	**8PQ4000-0BA32**	1 unit
		40 × 10 ▯ Flat copper	**8PQ4000-0BA63**	1 unit
	② **Copper supports** • For main busbar at bottom		**8PQ4000-1BA23**	1 unit
	**Busbar clamps** • For use with flat copper connection • For M10 screw • 1 pack = 20 units		**8PQ9400-0BA02**	1 unit
	**Square screws** • For use with busbar clamp • 1 pack = 50 units			
	External diameter × length in mm			
	M10 × 35		**8PQ9500-0BA14**	1 unit
	M10 × 45		**8PQ9500-0BA16**	1 unit
	M10 × 55		**8PQ9500-1BA36**	1 unit
	M10 × 65		**8PQ9500-1BA25**	1 unit
	**Clamping washers DIN 6796** 1 pack = 50 units			
	Screw type			
	M10		**8PQ9500-0BA60**	1 unit
	**Hexagonal nuts ISO 4032** 1 pack = 50 units			
	External diameter			
	M10		**8PQ9500-0BA05**	1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Non-cascaded

Features

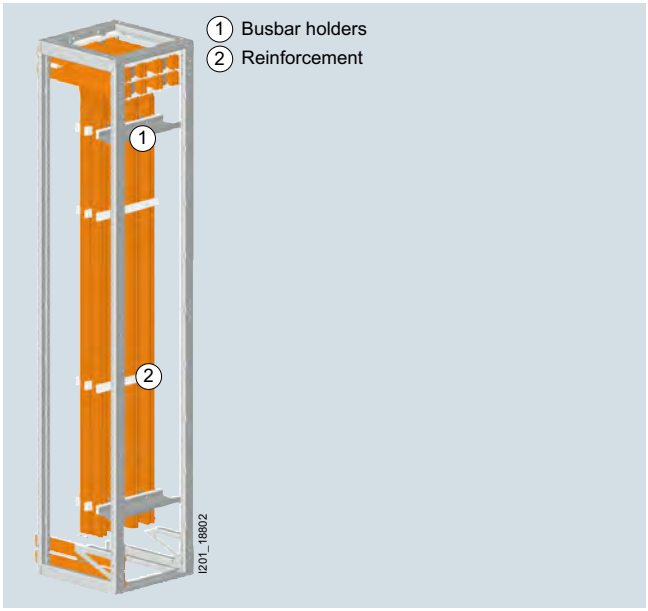
- For mounting on main busbar, top
- Compatible busbar profiles

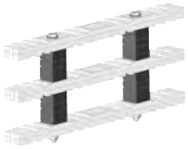


20 × 10
30 × 10
40 × 10
50 × 10

Configuration

- Number of required busbar holders ② depends on the rated short-time withstand current.



	Version			Article No. www.siemens.com/product?Article No.	PS
Non-cascaded					
	① **Busbar holders** 1 set = 2 units				
	Compartment width mm	Busbar dimensions mm × mm			
	200	20 × 10 30 × 10 40 × 10 50 × 10	Flat copper	**8PQ4000-2BA25**	1 unit
	400	20 × 10 30 × 10 40 × 10 50 × 10	Flat copper	**8PQ4000-2BA26**	1 unit
	② **Reinforcements**				
	Compartment width mm	Busbar dimensions mm × mm			
	--	20 × 10 30 × 10 40 × 10 50 × 10	Flat copper	**8PQ4000-0BA37**	1 unit
	③ **Supports**				
	Compartment width mm				
	200			**8PQ4000-0BA78**	1 unit
	400			**8PQ4000-0BA61**	1 unit

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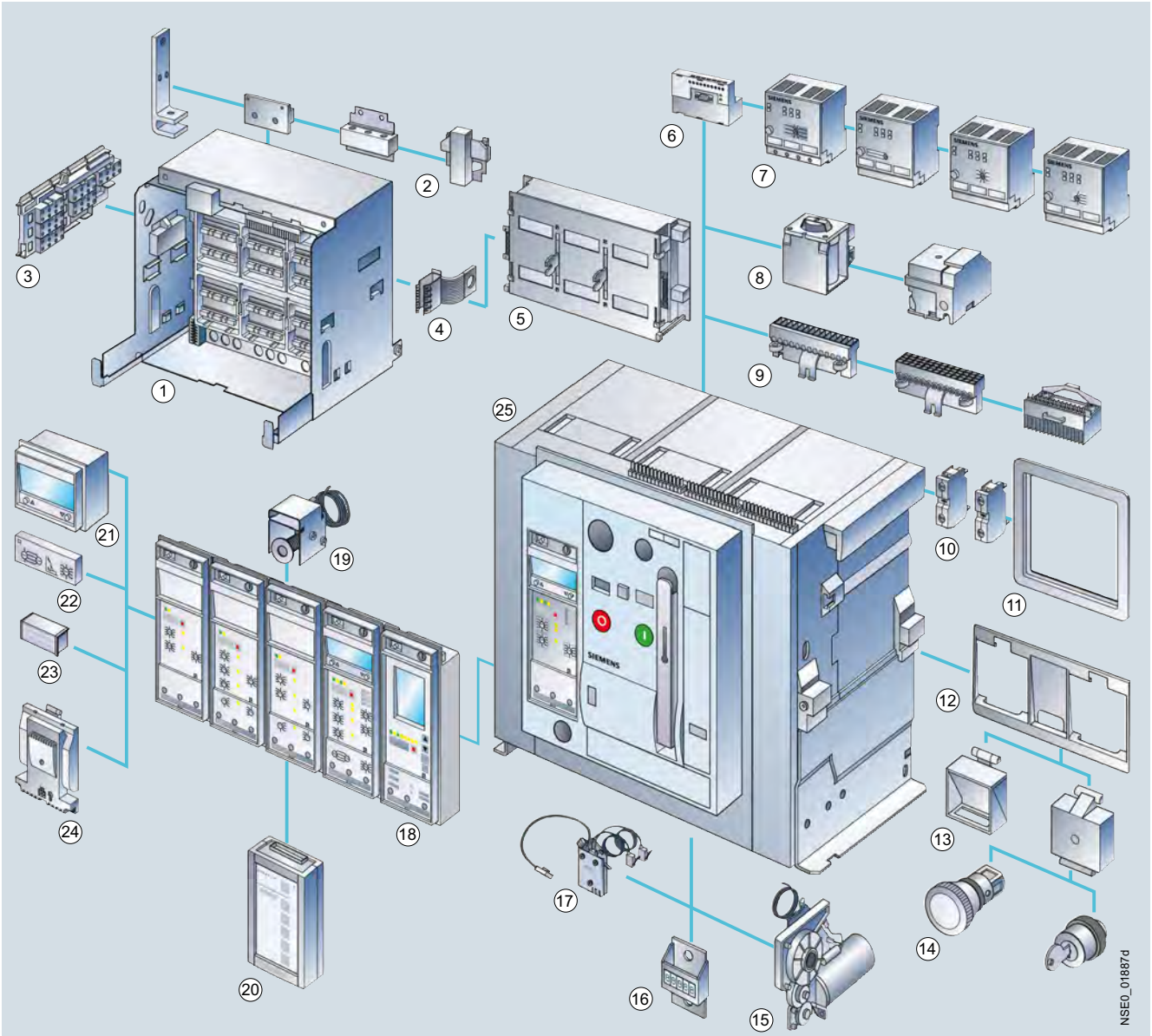
Overview



1 Guide frame
2 Main circuit connection front, flange, horizontal, vertical
3 Position signaling switch
4 Ground connection, leading
5 Shutters
6 COM15 PROFIBUS module or COM16 MODBUS module
7 External **Cubicle**BUS modules
8 Closing coil, auxiliary release
9 Auxiliary conductor plug-in system
10 Auxiliary switch block
11 Door sealing frame
12 Interlocking set for mechanical ON/OFF
13 Transparent panel, function insert
14 EMERGENCY-STOP pushbutton, key operated
15 Motorized operating mechanism
16 Operating cycles counter
17 Breaker Status Sensor (BSS)
18 Protective device with device holder, Electronic Trip Unit (ETU)
19 Remote reset solenoid
20 Breaker Data Adapter (BDA *Plus*)
21 Four-line display
22 Ground-fault protection module
23 Rating plug
24 Measurement function module
25 Air circuit breaker

Minimum order quantity (PS) or a multiple thereof can be ordered.

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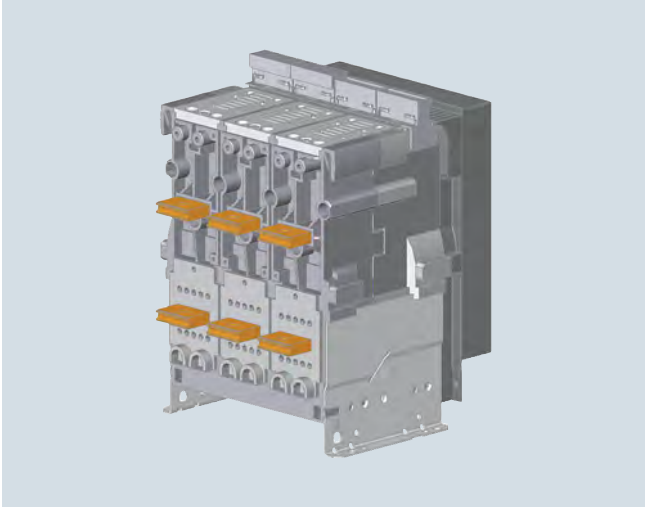
Size		I		II		
Type		**3WL11**		**3WL12**		
Switching capacity class		**N**	**S**	**N**	**S**	**H**
Rated short-circuit breaking capacity						
Rated operational voltage U_e up to 415 V AC						
I_{cu}	kA	55	66	66	80	100
I_{cs}	kA	55	66	66	80	100
I_{cm}	kA	121	145	145	176	220
Rated operational voltage U_e up to 500 V AC						
I_{cu}	kA	55	66	66	80	100
I_{cs}	kA	55	66	66	80	100
I_{cm}	kA	121	145	145	176	220
Rated operational voltage U_e up to 690 V AC						
I_{cu}	kA	42	50	50	75	85
I_{cs}	kA	42	50	50	75	85
I_{cm}	kA	88	105	105	165	187
Rated operational voltage U_e up to 1000/1150 V AC						
I_{cu}	kA	--	--	--	--	50
I_{cs}	kA	--	--	--	--	50
I_{cm}	kA	--	--	--	--	105
Rated short-time withstand current I_{cw} of the circuit breakers[3)]						
0.5 s	kA	55	66	66	80	100
1 s	kA	42	50	55	66	80
2 s	kA	29.5	35	39	46	65[1)]/70[2)]
3 s	kA	24	29	32	44	50[1)]/65[2)]
Short-circuit breaking capacity I_{cc} of the non-automatic air circuit breakers						
Up to 500 V AC	kA	55	66	66	80	100
Up to 690 V AC	kA	42	50	50	75	85
Up to 1000 V/1150 V AC	kA	--	--	--	--	50[4)]

1) Size II with $I_{n\,max} \leq 2500$ A.

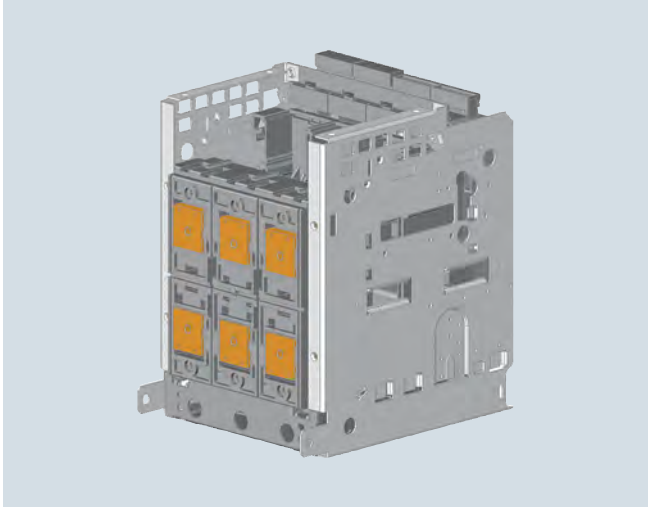
2) Size II with $I_{n\,max.} = 3200$ A and $I_{n\,max.} = 4000$ A.

3) At a rated voltage of ≥ 690 V, the I_{cw} value of the circuit breaker cannot be greater than the I_{cu} value or I_{cs} value at 690 V.

4) Rated operational voltage $U_e = 1150$ V.



3WL air circuit breaker with horizontal connections for fixed-mounted versions



3WL air circuit breaker with flange connections for draw-out versions

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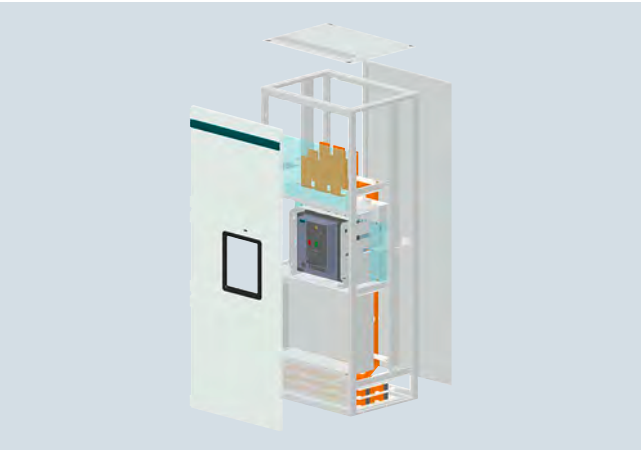
Incoming feeder bays

Main busbar at top



		Rated operational current I_{ec} ventilated in A							Rated operational current I_{ec} non-ventilated in A						
Size	I_n	**20 °C**	**25 °C**	**30 °C**	**35 °C**	**40 °C**	**45 °C**	**50 °C**	**20 °C**	**25 °C**	**30 °C**	**35 °C**	**40 °C**	**45 °C**	**50 °C**
I	1600	1600	1600	1590	**1550**	1510	1460	1420	1370	1340	1310	**1270**	1240	1200	1170
	2000	2000	2000	1990	**1940**	1890	1830	1780	1720	1680	1640	**1590**	1550	1510	1460
II	2000	2000	2000	2000	**2000**	2000	2000	2000	1960	1920	1870	**1820**	1780	1730	1670
	3200	2850	2790	2720	**2650**	2580	2510	2430	2260	2210	2160	**2100**	2050	1990	1930
III	4000	4000	4000	4000	**4000**	3950	3870	3780	3230	3150	3080	**3000**	2920	2840	2750

Main busbar at bottom



		Rated operational current I_{ec} ventilated in A							Rated operational current I_{ec} non-ventilated in A						
Size	I_n	**20 °C**	**25 °C**	**30 °C**	**35 °C**	**40 °C**	**45 °C**	**50 °C**	**20 °C**	**25 °C**	**30 °C**	**35 °C**	**40 °C**	**45 °C**	**50 °C**
I	1600	1540	1500	1470	**1430**	1390	1350	1310	1390	1350	1320	**1290**	1240	1190	1140
	2000	1930	1880	1840	**1790**	1740	1690	1640	1710	1670	1630	**1590**	1530	1470	1410
II	2000	2000	2000	2000	**2000**	1990	1920	1830	2000	1950	1880	**1820**	1750	1680	1610
	3200	2710	2640	2570	**2490**	2400	2300	2200	2320	2250	2180	**2100**	2030	1950	1860

Minimum order quantity (PS) or a multiple thereof can be ordered.

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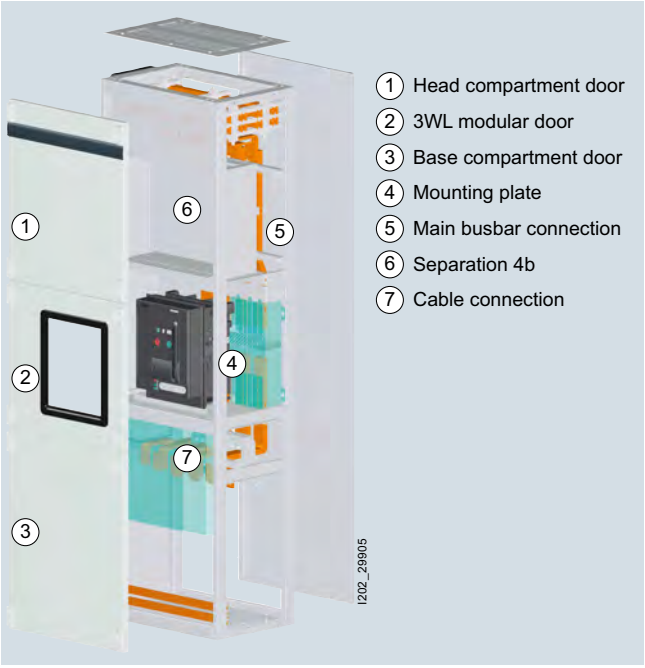
Main busbar at top

Features

- Combined 3-pole/4-pole assembly kits
- Incl. copper drawings

Configuration

- Separation 4b is recommended



1 Head compartment door
2 3WL modular door
3 Base compartment door
4 Mounting plate
5 Main busbar connection
6 Separation 4b
7 Cable connection

Selection and ordering data

Version			Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
① **Head compartment door**					
Size	Width mm	Height mm	**Head compartment door**	**IP55 upgrade**	
I	600	675	**8PQ2067-6BA01**	**8PQ2067-6BA02**	
II	800	675	**8PQ2067-8BA01**	**8PQ2067-8BA02**	
III	1000	675	**8PQ2067-1BA01**	**8PQ2067-1BA02**	
② **Modular door** • Door sealing frame 3WL9111-0AP01-0AA0 suitable for IP4X • Protective cover 3WL9111-0AP02-0AA0 suitable for IP55					
Size	Width mm	Height mm	**Modular door IP4X**	**Modular door IP55**	**IP55 upgrade**
I	600	550	**8PQ2055-6BA16**	**8PQ2055-6BA17**	**8PQ2055-6BA06**
II	800	550	**8PQ2055-8BA08**	**8PQ2055-8BA10**	**8PQ2055-8BA06**
III	1000	550	**8PQ2055-1BA03**	**8PQ2055-1BA04**	**8PQ2055-1BA06**
③ **Base compartment door**					
Size	Width mm	Height mm	**Base compartment door**	**IP55 upgrade**	
I	600	750	**8PQ2075-6BA01**	**8PQ2075-6BA03**	
II	800	750	**8PQ2075-8BA01**	**8PQ2075-8BA03**	
III	1000	750	**8PQ2075-1BA01**	**8PQ2075-1BA02**	

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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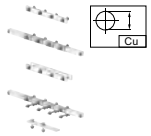
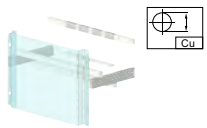
3WL air circuit breakers

Version			Article No. www.siemens.com/product?Article No.
④ **Mounting plate**			
Size	Width mm	Height mm	**Mounting plate**
I	600	550	**8PQ6000-5BA26**
II	800	550	**8PQ6000-5BA24**
III	1000	550	**8PQ6000-5BA23**
⑧ **Main busbar connection**			
Size	Width mm	Rated current A	**Mechanical system**
I	600	2000	**8PQ6000-6BA75**
II	800	3200	**8PQ6000-6BA76**
III	1000	4000	**8PQ6000-5BA33**
⑥ **Separation 4b**			

Size	Width mm	Depth mm	Position of main busbar	**Separation**
I	600	400	Top (front)	**8PQ5000-4BA28**
		600	Top (front)	**8PQ5000-4BA30**
		800	Top (front)	**8PQ5000-4BA31**
II	800	600	Top (front)	**8PQ5000-4BA32**
		800	Top (front)	**8PQ5000-4BA33**
III	1000	800	Top (double)	**8PQ5000-5BA11**

⑦ **Cable connection**
• Suitable for transformer installation



Size	Compartment width mm	Rated current A	Installation type	**Mechanical system**
I	600	2000	Fixed	**8PQ6000-5BA81**
			Draw-out	**8PQ6000-5BA82**
II	800	3200	Fixed	**8PQ6000-5BA83**
			Draw-out	**8PQ6000-5BA83**
III	1000	4000	Fixed	**8PQ6000-5BA84**
			Draw-out	**8PQ6000-5BA84**

⑧ **3WL insulation**

Required for
• 3WL, size I in draw-out version
• For main busbar connection ⑤ and cable connection ⑦



Insulation
8PQ6000-7BA28

Minimum order quantity (PS) or a multiple thereof can be ordered.

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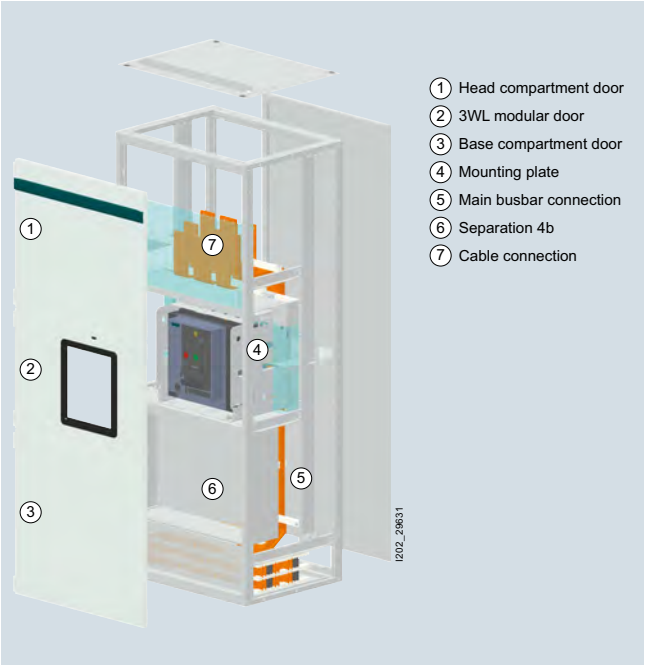
Main busbar at bottom

Features

- Combined 3-pole/4-pole assembly kits
- Incl. copper drawings

Configuration

- Separation 4b is recommended



Selection and ordering data

Version			Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
① **Head compartment door**					
Size	Width mm	Height mm	**Head compartment door**	**IP55 upgrade**	
I	600	675	**8PQ2067-6BA01**	**8PQ2067-6BA02**	
II	800	675	**8PQ2067-8BA01**	**8PQ2067-8BA02**	
② **3WL modular door** • Door sealing frame 3WL9111-0AP01-0AA0 suitable for IP4X • Protective cover 3WL9111-0AP02-0AA0 suitable for IP55					
Size	Width mm	Height mm	**Modular door IP4X**	**Modular door IP55**	**IP55 upgrade**
I	600	550	**8PQ2055-6BA16**	**8PQ2055-6BA17**	**8PQ2055-6BA06**
II	800	550	**8PQ2055-8BA08**	**8PQ2055-8BA10**	**8PQ2055-8BA06**
③ **Base compartment door**					
Size	Width mm	Height mm	**Base compartment doors**	**IP55 upgrade**	
I	600	750	**8PQ2075-6BA01**	**8PQ2075-6BA03**	
II	800	750	**8PQ2075-8BA01**	**8PQ2075-8BA03**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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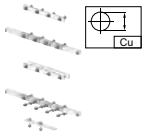
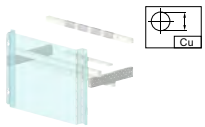
3WL air circuit breakers

Version			Article No. www.siemens.com/product?Article No.
④ **Mounting plate**			
Size	Width mm	Height mm	**Mounting plate**
I	600	550	**8PQ6000-5BA26**
II	800	550	**8PQ6000-5BA24**
⑤ **Main busbar connection**			
Size	Width mm	Rated current A	**Mechanical system**
I	600	2000	**8PQ6000-6BA75**
II	800	3200	**8PQ6000-6BA76**
⑥ **Separation 4b**			
Size	Width mm	Depth mm	Position of main busbar	**Separation**
I	600	400	Bottom (front)	**8PQ5000-4BA34**
		600	Bottom (front)	**8PQ5000-4BA35**
		800	Bottom (front)	**8PQ5000-4BA36**
II	800	600	Bottom (front)	**8PQ5000-4BA37**
		800	Bottom (front)	**8PQ5000-4BA38**
⑦ **Cable connection** • Suitable for transformer installation				
Size	Compartment width mm	Rated current A	Installation type	**Mechanical system**
I	600	2000	Fixed	**8PQ6000-5BA81**
			Draw-out	**8PQ6000-5BA82**
II	800	3200	Fixed	**8PQ6000-5BA83**
			Draw-out	**8PQ6000-5BA83**
⑧ **3WL insulation** Required for • 3WL, size I in draw-out version • For main busbar connection ⑤ and cable connection ⑦				 **Insulation** **8PQ6000-7BA28**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Coupling panels

Technical specifications

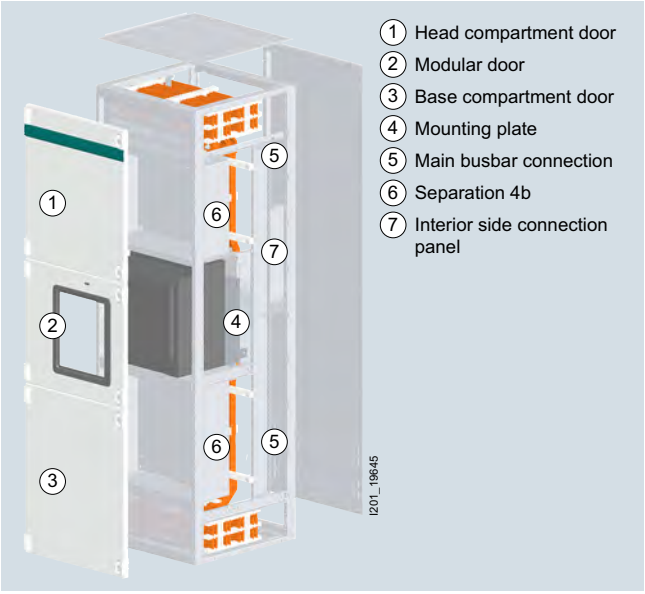
Features

- 3/4-pole combined
- Incl. copper drawing

Configuration

- Separation 4b is recommended

PEN systems are a requirement for section depth 400 mm (L1 … L3, PEN)



1 Head compartment door
2 Modular door
3 Base compartment door
4 Mounting plate
5 Main busbar connection
6 Separation 4b
7 Interior side connection panel

Version			Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
① **Head compartment door**					
Size	Width mm	Height mm	**Head compartment door**	**IP55 upgrade**	
I	600	675	**8PQ2067-6BA01**	**8PQ2067-6BA02**	
II	800	675	**8PQ2067-8BA01**	**8PQ2067-8BA02**	
② **Modular door** • Door sealing frame 3WL9111-0AP01-0AA0 suitable for IP4X • Protective cover 3WL9111-0AP02-0AA0 suitable for IP55					
Size	Width mm	Height mm	**Modular door IP4X**	**Modular door IP55**	**IP55 upgrade**
I	600	550	**8PQ2055-6BA16**	**8PQ2055-6BA17**	**8PQ2055-6BA06**
II	800	550	**8PQ2055-8BA08**	**8PQ2055-8BA10**	**8PQ2055-8BA06**
③ **Base compartment door**					
Size	Width mm	Height mm	**Base compartment doors**	**IP55 upgrade**	
I	600	750	**8PQ2075-6BA01**	**8PQ2075-6BA03**	
II	800	750	**8PQ2075-8BA01**	**8PQ2075-8BA03**	

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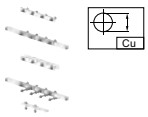
Version		Article No. www.siemens.com/product?Article No.
④ **Mounting plate**		



Size	Width mm	Height mm	**Mounting plate**
I	600	550	**8PQ6000-5BA26**
II	800	550	**8PQ6000-5BA24**

⑤ **Main busbar connection**
• Two units per section



Size	Width mm	Rated current A	Quantity	**Mechanical system**
I	600	2000	2x	**8PQ6000-6BA75**
II	800	3200	2x	**8PQ6000-6BA76**

⑥ **Separation 4b**



Size	Width mm	Depth mm	Position of main busbar	**Separation**
I	600	400	Top (front)	**8PQ5000-5BA12**
		600	Top (front)	**8PQ5000-5BA13**
		800	Top (front)	**8PQ5000-5BA14**
II	800	600	Top (front)	**8PQ5000-5BA15**
		800	Top (front)	**8PQ5000-5BA16**

⑦ **Interior side connection panel**
• Two units per section



Depth in mm	Quantity	
400		**--**
600	2x	**8PQ3000-3BA50**
800	2x	**8PQ3000-3BA51**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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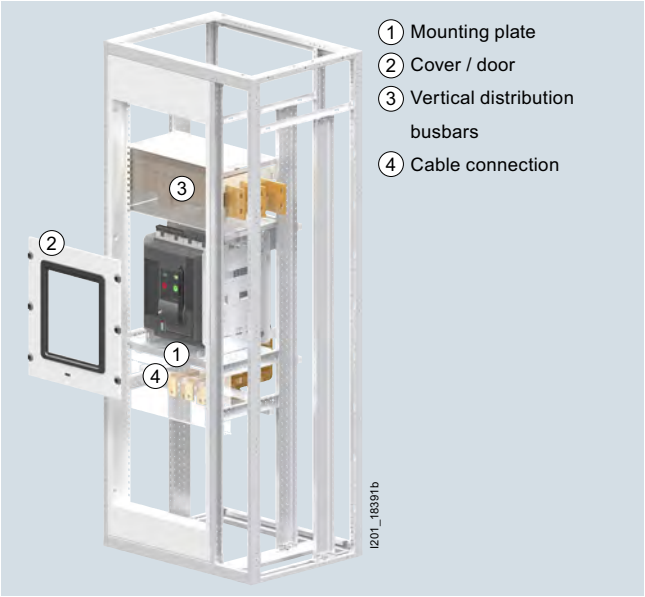
Vertical busbar connection

Features

- 3/4-pole combined
- Incl. copper drawings



Selection and ordering data

Version					Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Draw-out and fixed-mounted versions with cover • Door sealing frame 3WL9111-0AP01-0AA0 suitable for IP4X						
Size	Compartment width mm	No. of poles	Minimum depth mm	Height mm	① **Mounting plate**	② **Cover**
I	600	3	600	550	**8PQ6000-3BA31**	**8PQ2055-6BA05**
		4	600		**8PQ6000-3BA31**	**8PQ2055-6BA07**
	800	3/4	600		**8PQ6000-3BA32**	**8PQ2055-8BA04**
Draw-out and fixed-mounted versions with modular door • Door sealing frame 3WL9111-0AP01-0AA0 suitable for IP4X • Protective cover 3WL9111-0AP02-0AA0 suitable for IP55						 
Size	Compartment width mm	No. of poles	Minimum depth mm	Height mm	① **Mounting plate**	② **Modular door IP4X**	② **Modular door IP55**
I	400	3	400	550	**8PQ6000-5BA25**	**8PQ2055-4BA12**	--
	600	3/4	400		**8PQ6000-5BA26**	**8PQ2055-6BA16**	**8PQ2055-6BA17**

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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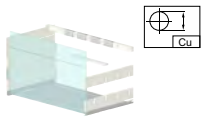
Selection and ordering data

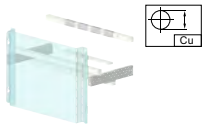
3WL connecting terminal kit

③ Vertical distribution busbars



Size	Enclosure	3WL rated current	Compartment width	Installation type	Height		Mechanical system
					Above circuit breaker	Below circuit breaker	
		A	mm		mm	mm	
I	Modular door	1600	400[1)]	Fixed	250	300	**8PQ6000-5BA48**
				Draw-out	250	300	**8PQ6000-5BA50**
			600	Fixed	250	300	**8PQ6000-5BA51**
				Draw-out	250	300	**8PQ6000-5BA52**
	Cover	1600	600	Fixed	250	300	**8PQ6000-5BA45**
				Draw-out	250	300	**8PQ6000-5BA45**
			800	Fixed	250	300	**8PQ6000-5BA46**
				Draw-out	250	300	**8PQ6000-5BA46**
	Modular door	2000	400[1)]	Fixed	300	350	**8PQ6000-7BA05**
				Draw-out	300	350	**8PQ6000-7BA06**
			600	Fixed	300	350	**8PQ6000-7BA07**
				Draw-out	300	350	**8PQ6000-7BA08**
	Cover	2000	600	Fixed	300	350	**8PQ6000-7BA03**
				Draw-out	300	350	**8PQ6000-7BA03**
			800	Fixed	300	350	**8PQ6000-7BA04**
				Draw-out	300	350	**8PQ6000-7BA04**

④ Cable connection
- To be able to anchor, bend and connect the cables it is necessary to leave enough space for the assembly operations
- Suitable for transformer installation



Size	Enclosure	3WL rated current	Compartment width	Installation type	Height	Mechanical system
		A	mm		mm	
I	Modular door	2000	400[1)]	Fixed	425	**8PQ6000-5BA78**
				Draw-out	425	**8PQ6000-5BA80**
			600	Fixed	425	**8PQ6000-5BA81**
				Draw-out	425	**8PQ6000-5BA82**
	Cover	2000	600	Fixed	250	**8PQ6000-5BA75**
				Draw-out	250	**8PQ6000-5BA75**
			800	Fixed	250	**8PQ6000-5BA76**
				Draw-out	250	**8PQ6000-5BA76**

⑤ 3WL insulation



Required for
- 3WL, size I in draw-out version
- For main busbar connection ⑤ and cable connection ⑦

Insulation
8PQ6000-7BA28

[1)] 3-pole corresponding to circuit breaker assembly kit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version	Article No. www.siemens.com/product?Article No.

Accessories

Busbar holder
1 set = 4 holders



Size	Number of poles	Width in mm	
I	3/4	600	**8PQ6000-4BA35**
II	3	600	**8PQ6000-4BA36**
I	3/4	800	**8PQ6000-4BA37**
II	3/4	800	**8PQ6000-4BA38**
III	3/4	1000	**8PQ6000-4BA40**

Busbar connection
For use with SIVACON 8PS



Size	Number of poles	Width in mm	**Mechanical system**
I	3/4	600	**8PQ3000-1BA70**
II	3	600	
I	3/4	800	**8PQ3000-1BA71**
II	3/4	800	
III	3/4	1000	**8PQ3000-1BA72**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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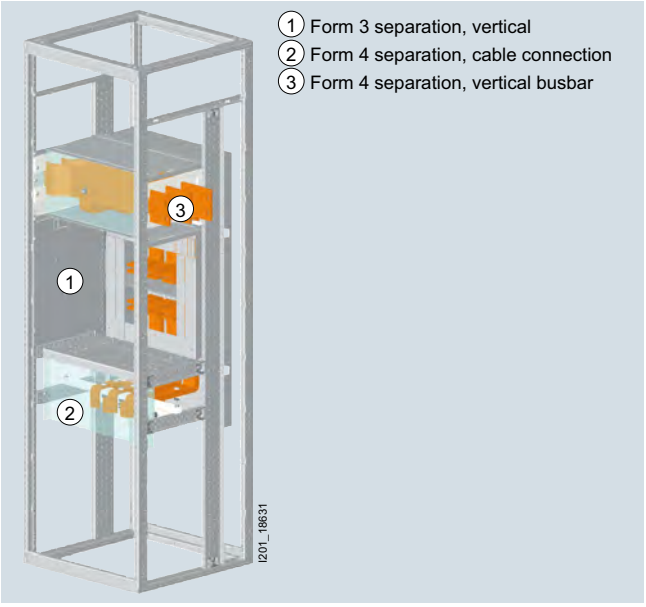
Separation 3WL modular

Overview

Features

- Compartmentalization for increasing the touch safety
- Form of internal separation up to 4b



Section with busbar connections and form 4b separation.

Selection and ordering data

	Version				Article No. www.siemens.com/product?Article No.	PS
	① **Form 3 separation, device compartments** Module height: 550 mm					
	Size	Modular cover at the front	Compartment width mm	Installation type		
	I	Door	400	Fixed/draw-out	**8PQ5000-3BA82**	1 unit
			600	Fixed/draw-out	**8PQ5000-3BA82**	1 unit
		Cover	600	Fixed	**8PQ5000-0BA08**	1 unit
				Draw-out	**8PQ5000-0BA07**	1 unit
			800	Fixed	**8PQ5000-1BA65**	1 unit
				Draw-out	**8PQ5000-1BA66**	1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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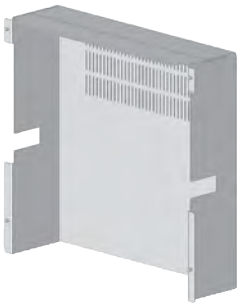

② **Form 4 separation, cable connection**
Installation type: Fixed-mounted and draw-out version

Size	Modular cover at the front	Compartment width mm	Section depth mm	Article No. www.siemens.com/product?Article No.	PS
I	Door	400	400	**8PQ5000-3BA84**	1 unit
			600/800	**8PQ5000-4BA00**	1 unit
		600	400	**8PQ5000-3BA86**	1 unit
			600/800	**8PQ5000-4BA01**	1 unit
	Cover	600	600/800	**8PQ5000-0BA30**	1 unit
		800	600/800	**8PQ5000-1BA68**	1 unit



③ **Form 4 separation, vertical busbars**
Installation type: Fixed-mounted and draw-out version

Size	Modular cover at the front	Compartment width mm	Section depth mm	Article No. www.siemens.com/product?Article No.	PS
I	Door	400	400	**8PQ5000-3BA84**	1 unit
			600/800	**8PQ5000-3BA85**	1 unit
		600	400	**8PQ5000-3BA86**	1 unit
			600/800	**8PQ5000-3BA87**	1 unit
	Cover	600	600/800	**8PQ5000-0BA14**	1 unit
		800	600/800	**8PQ5000-1BA67**	1 unit

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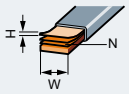
Technical specifications

Connection cross-sections for internal wiring

Rated current I_n	
	Cable cross-sections (stranded)
A	mm²
8	1
12	1.5
20	2.5
25	4
32	6
50	10
65	16
85	25
115	35
150	50
175	70 or 2 × 35
225	95 or 2 × 50
250	120 or 2 × 50
275	2 × 50
300	2 × 70
350	2 × 95
375	2 × 95
400	2 × 95
450	2 × 150 or 3 × 70
500	2 × 150 or 3 × 95
630	2 × 185

Device connection

The SIVACON S4 system only uses the following insulated connection media for connections:

Rated current I_n		
	Flexible busbar	
A	mm²	N × W × H in mm
250	120	5 × 24 × 1
400	256	8 × 32 × 1
630	256	8 × 32 × 1

Main busbar at top

		Rated operational current I_{ec} ventilated At 500 W, additional power loss in the section in A							
Type	**I_{cc}**	**I_n**	**20 °C**	**25 °C**	**30 °C**	**35 °C**	**40 °C***	**45 °C***	**50 °C***
3VA10	36	100	95	92	89	**86**	83	80	77
3VA11	70	160	143	139	135	**130**	125	120	115
3VA12	70	250	250	247	239	**231**	223	214	205
3VA20	150	25	25	25	25	**25**	25	25	25
		40	40	40	40	**40**	40	40	40
		63	63	63	63	**63**	63	63	63
		100	100	100	100	**100**	96	92	88
3VA21	150	25	25	25	25	**25**	25	25	25
		40	40	40	40	**40**	40	40	40
		63	63	63	63	**63**	63	63	63
		100	100	100	100	**100**	100	100	100
		160	160	160	160	**160**	154	147	140
3VA22	150	160	160	160	160	**160**	160	160	160
		250	250	250	250	**244**	234	224	214
3VA23	110	250	250	250	250	**250**	250	250	250
		400	375	365	355	**340**	325	315	300
3VA24	110	400	400	400	400	**393**	380	360	345
		630	435	420	410	**393**	380	360	345

*Without COM-60 module

I_{cc}: Rated conditional short-circuit current

I_{ec}: Rated operational current of the branch

I_n: Rated current of the device

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Internal cover – horizontal

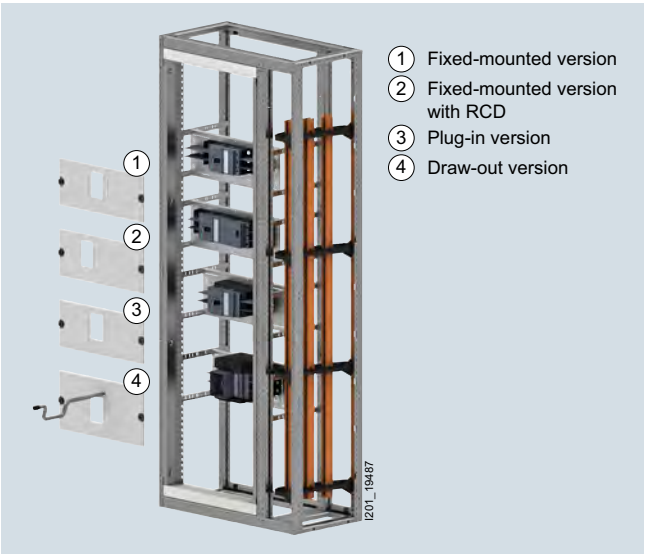
Overview

Features

- Front and rear connection possible
- Optimized for cost-effective use of flexible insulated copper busbars

Configuration

- At voltages >415 V, phase separators and insulating plates are required (see also insulation measures in the Manual).



Selection and ordering data

Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
								
Molded case circuit breakers	Width mm	Height mm	Operator type			**Mounting plate**	**Cover**	
① **Fixed-mounted version**								
3-pole								
3VA10 (100 A)	600	150	✔	✔		**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔		**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	150	✔	✔	✔	**8PQ6000-8BA03**	**8PQ2015-6BA28**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	600	200	✔	✔	✔	**8PQ6000-8BA23**	**8PQ2020-6BA41**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	600	200	✔	✔	✔	**8PQ6000-8BA23**	**8PQ2020-6BA41**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VA molded case circuit breakers

Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
								
Molded case circuit breakers	Width mm	Height mm	Operator type			**Mounting plate**	**Cover**	
4-pole								
3VA10 (100 A)	600	150	✔	✔		**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔		**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA05**	**8PQ2020-6BA36**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-8BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-8BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	600	250	✔	✔	✔	**8PQ6000-8BA25**	**8PQ2020-8BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2020-8BA14**	1 unit
3VA24 (630 A)	600	250	✔	✔	✔	**8PQ6000-8BA25**	**8PQ2020-8BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2020-8BA14**	1 unit
3-pole + N								
3VA10 (100 A)	600	150	✔	✔		**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔		**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA05**	**8PQ2020-6BA36**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	600	250	✔	✔	✔	**8PQ6000-8BA25**	**8PQ2025-6BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	600	250	✔	✔	✔	**8PQ6000-8BA25**	**8PQ2025-6BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
								
Molded case circuit breakers	Width mm	Height mm	Operator type			**Mounting plate**	**Cover**	
② **Fixed-mounted version with RCD**								
3-pole								
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA27**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	150	✔ 415 V[1)]	✔	✔	**8PQ6000-8BA03**	**8PQ2015-6BA30**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit
3-pole + N								
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA27**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	200	✔ 415 V[1)]	✔	✔	**8PQ6000-8BA05**	**8PQ2020-6BA37**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit
4-pole								
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA27**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	200	✔ 415 V[1)]	✔	✔	**8PQ6000-8BA05**	**8PQ2020-6BA37**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA11**	**8PQ2020-6BA40**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	800	250	✔	✔	✔	**8PQ6000-8BA27**	**8PQ2025-8BA14**	1 unit

[1)] For applications >415 V, front mounted rotary operator or motor operator required for compliance with safety clearances.

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3VA molded case circuit breakers

Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
								
Molded case circuit breakers	Width mm	Height mm	Operator type			**Mounting plate**	**Cover**	
③ **Plug-in version**								
3-pole								
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	150	✔	✔	✔	**8PQ6000-8BA04**	**8PQ2015-6BA28**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	600	200	✔	✔	✔	**8PQ6000-8BA24**	**8PQ2020-6BA41**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA28**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	600	200	✔	✔	✔	**8PQ6000-8BA24**	**8PQ2020-6BA41**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA28**	**8PQ2025-8BA14**	1 unit
4-pole								
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA06**	**8PQ2020-6BA36**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	600	250	✔	✔	✔	**8PQ6000-8BA26**	**8PQ2025-6BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA28**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	600	250	✔	✔	✔	**8PQ6000-8BA26**	**8PQ2025-6BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA28**	**8PQ2025-8BA14**	1 unit
3-pole + N								
3VA11 (160 A)	600	150	✔	✔	✔	**8PQ6000-8BA01**	**8PQ2015-6BA26**	1 unit
	800	150	✔	✔	✔	**8PQ6000-8BA02**	**8PQ2015-8BA11**	1 unit
3VA12 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA06**	**8PQ2020-6BA36**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA07**	**8PQ2020-8BA20**	1 unit
3VA20 (100 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA21 (160 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA22 (250 A)	600	200	✔	✔	✔	**8PQ6000-8BA08**	**8PQ2020-6BA38**	1 unit
	800	200	✔	✔	✔	**8PQ6000-8BA10**	**8PQ2020-8BA21**	1 unit
3VA23 (400 A)	600	250	✔	✔	✔	**8PQ6000-8BA26**	**8PQ2025-6BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA28**	**8PQ2025-8BA14**	1 unit
3VA24 (630 A)	600	250	✔	✔	✔	**8PQ6000-8BA26**	**8PQ2025-6BA23**	1 unit
	800	250	✔	✔	✔	**8PQ6000-8BA28**	**8PQ2025-8BA14**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
								
Molded case circuit breakers	Width mm	Module height [height of mounting plate] mm	Operator type			**Mounting plate**	**Cover**	
④ **Draw-out version**								
• Increase in module height required from form 3b								
• Increase = module height - [height of mounting plate]								
3-pole								
3VA12 (250 A)	600	250 [150]	✔		✔	**8PQ6000-8BA04**	**8PQ2025-6BA21**	1 unit
	800	250 [200]	✔		✔	**8PQ6000-8BA07**	**8PQ2025-8BA12**	1 unit
3VA20 (100 A)	600	250 [200]	✔		✔	**8PQ6000-8BA08**	**8PQ2025-6BA22**	1 unit
	800	250 [200]	✔		✔	**8PQ6000-8BA10**	**8PQ2025-8BA13**	1 unit
3VA21 (160 A)	600	250 [200]	✔		✔	**8PQ6000-8BA08**	**8PQ2025-6BA22**	1 unit
	800	250 [200]	✔		✔	**8PQ6000-8BA10**	**8PQ2025-8BA13**	1 unit
3VA22 (250 A)	600	250 [200]	✔		✔	**8PQ6000-8BA08**	**8PQ2025-6BA22**	1 unit
	800	250 [200]	✔		✔	**8PQ6000-8BA10**	**8PQ2025-8BA13**	1 unit
3VA23 (400 A)	600	300 [200]	✔			**8PQ6000-8BA24**	**8PQ2030-6BA27**	1 unit
	800	300 [250]	✔			**8PQ6000-8BA28**	**8PQ2030-8BA14**	1 unit
3VA24 (630 A)	600	300 [200]	✔			**8PQ6000-8BA24**	**8PQ2030-6BA27**	1 unit
	800	300 [250]	✔			**8PQ6000-8BA28**	**8PQ2030-8BA14**	1 unit
4-pole								
3VA12 (250 A)	600	300 [200]	✔		✔	**8PQ6000-8BA06**	**8PQ2030-6BA25**	1 unit
	800	300 [200]	✔		✔	**8PQ6000-8BA07**	**8PQ2030-8BA12**	1 unit
3VA20 (100 A)	600	300 [200]	✔		✔	**8PQ6000-8BA08**	**8PQ2030-6BA26**	1 unit
	800	300 [200]	✔		✔	**8PQ6000-8BA10**	**8PQ2030-8BA13**	1 unit
3VA21 (160 A)	600	300 [200]	✔		✔	**8PQ6000-8BA08**	**8PQ2030-6BA26**	1 unit
	800	300 [200]	✔		✔	**8PQ6000-8BA10**	**8PQ2030-8BA13**	1 unit
3VA22 (250 A)	600	300 [200]	✔		✔	**8PQ6000-8BA08**	**8PQ2030-6BA26**	1 unit
	800	300 [200]	✔		✔	**8PQ6000-8BA10**	**8PQ2030-8BA13**	1 unit
3VA23 (400 A)	600	350 [250]	✔			**8PQ6000-8BA26**	**8PQ2035-6BA25**	1 unit
	800	350 [250]	✔			**8PQ6000-8BA28**	**8PQ2035-8BA15**	1 unit
3VA24 (630 A)	600	350 [250]	✔			**8PQ6000-8BA26**	**8PQ2035-6BA25**	1 unit
	800	350 [250]	✔			**8PQ6000-8BA28**	**8PQ2035-8BA15**	1 unit

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3VA molded case circuit breakers

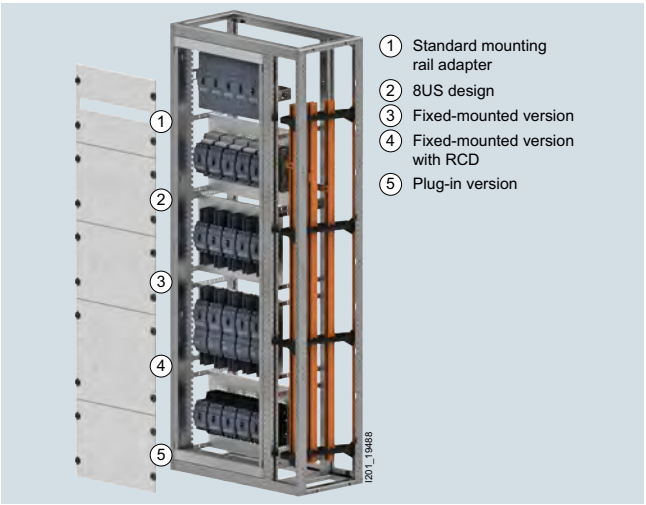
Internal cover – vertical

Features

- Front and rear connection possible
- Optimized for cost-effective use of flexible insulated copper busbars

Configuration

- Space for cable routing shall be provided above and below the assembly kits
- The space for cable routing is oriented around the selected cross-sections and their bending radii
- At voltages >415 V, phase separators and insulating plates are required (see also insulation measures in the Manual).

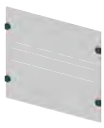


Version	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS





Molded case circuit breakers	Number of breakers	Width mm	Height mm	Operator type			Mounting plate	Cover	
① Standard mounting rail adapters									
3-pole									
3VA10 (100 A)	5	600	350	✔			**8PQ6000-3BA36**	**8PQ2035-6BA28**	1 unit
	8	800	350	✔			**8PQ6000-3BA37**	**8PQ2035-8BA18**	1 unit
3VA11 (160 A)	4	600	350	✔			**8PQ6000-3BA36**	**8PQ2035-6BA28**	1 unit
	5	800	350	✔			**8PQ6000-3BA37**	**8PQ2035-8BA18**	1 unit
4-pole									
3VA10 (100 A)	4	600	350	✔			**8PQ6000-3BA36**	**8PQ2035-6BA28**	1 unit
	6	800	350	✔			**8PQ6000-3BA37**	**8PQ2035-8BA18**	1 unit
3VA11 (160 A)	3	600	350	✔			**8PQ6000-3BA36**	**8PQ2035-6BA28**	1 unit
	4	800	350	✔			**8PQ6000-3BA37**	**8PQ2035-8BA18**	1 unit
② 8US design									
8US1923-3AA01 busbar holder (width 600 = 2 units, width 800 = 3 units) and 8US1922-1AC00 end cover are to be ordered separately									
3-pole									

							Mounting plate	Cover	
3VA10 (100 A)	5	600	350	✔	✔		**8PQ6000-8BA33**	**8PQ2035-6BA26**	1 unit
	7	800	350	✔	✔		**8PQ6000-8BA40**	**8PQ2035-8BA20**	1 unit
3VA11 (160 A)	5	600	350	✔	✔	✔	**8PQ6000-8BA33**	**8PQ2035-6BA26**	1 unit
	7	800	350	✔	✔	✔	**8PQ6000-8BA40**	**8PQ2035-8BA20**	1 unit
3VA12 (250 A)	3	600	400	✔	✔	✔	**8PQ6000-8BA36**	**8PQ2040-6BA26**	1 unit
	5	800	400	✔	✔	✔	**8PQ6000-8BA41**	**8PQ2040-8BA23**	1 unit
3VA20 (100 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA38**	**8PQ2045-6BA13**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA42**	**8PQ2045-8BA11**	1 unit
	5	800	450			✔	**8PQ6000-8BA42**	**8PQ2045-8BA15**	1 unit
3VA21 (160 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA42**	**8PQ2045-8BA11**	1 unit
3VA22 (250 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA42**	**8PQ2045-8BA11**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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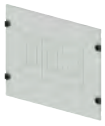
Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
									
Molded case circuit breakers	Number of breakers	Width mm	Height mm	Operator type			**Mounting plate**	**Cover**	
③ **Fixed-mounted version**									
3-pole									
3VA10 (100 A)	5	600	350	✔	✔		**8PQ6000-8BA33**	**8PQ2035-6BA26**	1 unit
	7	800	350	✔	✔		**8PQ6000-8BA47**	**8PQ2035-8BA16**	1 unit
3VA11 (160 A)	5	600	350	✔	✔	✔	**8PQ6000-8BA33**	**8PQ2035-6BA26**	1 unit
	7	800	350	✔	✔	✔	**8PQ6000-8BA47**	**8PQ2035-8BA16**	1 unit
3VA12 (250 A)	3	600	400	✔	✔	✔	**8PQ6000-8BA35**	**8PQ2040-6BA26**	1 unit
	5	800	400	✔	✔	✔	**8PQ6000-8BA43**	**8PQ2040-8BA23**	1 unit
3VA20 (100 A)	3	600	450	✔	✔		**8PQ6000-8BA37**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA37**	**8PQ2045-6BA13**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA50**	**8PQ2045-8BA11**	1 unit
	5	800	450			✔	**8PQ6000-8BA50**	**8PQ2045-8BA15**	1 unit
3VA21 (160 A)	3	600	450	✔	✔		**8PQ6000-8BA37**	**8PQ2045-6BA11**	1 unit
	5	800	450			✔	**8PQ6000-8BA50**	**8PQ2045-8BA15**	1 unit
3VA22 (250 A)	3	600	450	✔	✔		**8PQ6000-8BA37**	**8PQ2045-6BA11**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA50**	**8PQ2045-8BA11**	1 unit
3VA23 (400 A)	3	600	450	✔	✔	✔	**8PQ6000-8BA54**	**8PQ2045-6BA12**	1 unit
	4	800	450	✔	✔	✔	**8PQ6000-8BA57**	**8PQ2045-8BA13**	1 unit
3VA24 (630 A)	3	600	450	✔	✔	✔	**8PQ6000-8BA54**	**8PQ2045-6BA12**	1 unit
	4	800	450	✔	✔	✔	**8PQ6000-8BA57**	**8PQ2045-8BA13**	1 unit
4-pole									
3VA10 (100 A)	4	600	350	✔	✔		**8PQ6000-8BA34**	**8PQ2035-6BA27**	1 unit
	5	800	350	✔	✔		**8PQ6000-8BA48**	**8PQ2035-8BA17**	1 unit
3VA11 (160 A)	4	600	350	✔	✔	✔	**8PQ6000-8BA34**	**8PQ2035-6BA27**	1 unit
	5	800	350	✔	✔	✔	**8PQ6000-8BA48**	**8PQ2035-8BA17**	1 unit
3VA12 (250 A)	3	600	400	✔	✔	✔	**8PQ6000-8BA35**	**8PQ2040-6BA26**	1 unit
	4	800	400	✔	✔	✔	**8PQ6000-8BA45**	**8PQ2040-8BA24**	1 unit
3VA20 (100 A)	3	600	450	✔	✔		**8PQ6000-8BA37**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA37**	**8PQ2045-6BA13**	1 unit
	4	800	450	✔	✔		**8PQ6000-8BA52**	**8PQ2045-8BA12**	1 unit
	4	800	450			✔	**8PQ6000-8BA52**	**8PQ2045-8BA16**	1 unit
3VA21 (160 A)	3	600	450	✔	✔		**8PQ6000-8BA37**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA37**	**8PQ2045-6BA13**	1 unit
	4	800	450	✔	✔		**8PQ6000-8BA52**	**8PQ2045-8BA12**	1 unit
3VA22 (250 A)	3	600	450	✔	✔		**8PQ6000-8BA37**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA37**	**8PQ2045-6BA13**	1 unit
	4	800	450	✔	✔		**8PQ6000-8BA52**	**8PQ2045-8BA12**	1 unit
	4	800	450			✔	**8PQ6000-8BA52**	**8PQ2045-8BA16**	1 unit
3VA23 (400 A)	2	600	450	✔	✔	✔	**8PQ6000-8BA64**	**8PQ2045-6BA14**	1 unit
	3	800	450	✔	✔	✔	**8PQ6000-8BA61**	**8PQ2045-8BA14**	1 unit
3VA24 (630 A)	2	600	450	✔	✔	✔	**8PQ6000-8BA64**	**8PQ2045-6BA14**	1 unit
	3	800	450	✔	✔	✔	**8PQ6000-8BA61**	**8PQ2045-8BA14**	1 unit

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3VA molded case circuit breakers

Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
									
Molded case circuit breakers	Number of breakers	Width mm	Height mm	Operator type			**Mounting plate**	**Cover**	
④ **Fixed-mounted version with RCD**									
3-pole									
3VA11 (160 A)	5	600	450	✔	✔	✔	**8PQ6000-8BA33**	**8PQ2045-6BA08**	1 unit
	7	800	450	✔	✔	✔	**8PQ6000-8BA47**	**8PQ2045-8BA08**	1 unit
3VA12 (250 A)	3	600	500	✔	✔	✔	**8PQ6000-8BA35**	**8PQ2050-6BA10**	1 unit
	5	800	500	✔	✔	✔	**8PQ6000-8BA43**	**8PQ2050-8BA12**	1 unit
3VA20 (100 A)	3	600	550	✔	✔		**8PQ6000-8BA37**	**8PQ2055-6BA20**	1 unit
	3	600	550			✔	**8PQ6000-8BA37**	**8PQ2055-6BA21**	1 unit
	5	800	550	✔	✔		**8PQ6000-8BA50**	**8PQ2055-8BA11**	1 unit
	5	800	550			✔	**8PQ6000-8BA50**	**8PQ2055-8BA13**	1 unit
3VA21 (160 A)	3	600	550	✔	✔		**8PQ6000-8BA37**	**8PQ2055-6BA20**	1 unit
	5	800	550	✔	✔		**8PQ6000-8BA50**	**8PQ2055-8BA11**	1 unit
3VA22 (250 A)	3	600	550	✔	✔		**8PQ6000-8BA37**	**8PQ2055-6BA20**	1 unit
	5	800	550	✔	✔		**8PQ6000-8BA50**	**8PQ2055-8BA11**	1 unit
3VA23 (400 A)	3	600	600	✔	✔	✔	**8PQ6000-8BA55**	**8PQ2060-6BA25**	1 unit
	4	800	600	✔	✔	✔	**8PQ6000-8BA58**	**8PQ2060-8BA07**	1 unit
3VA24 (630 A)	3	600	600	✔	✔	✔	**8PQ6000-8BA55**	**8PQ2060-6BA25**	1 unit
	4	800	600	✔	✔	✔	**8PQ6000-8BA58**	**8PQ2060-8BA07**	1 unit
4-pole									
3VA11 (160 A)	4	600	450	✔	✔	✔	**8PQ6000-8BA34**	**8PQ2045-6BA10**	1 unit
	5	800	450	✔	✔	✔	**8PQ6000-8BA48**	**8PQ2045-8BA10**	1 unit
3VA12 (250 A)	3	600	500	✔	✔	✔	**8PQ6000-8BA35**	**8PQ2050-6BA10**	1 unit
	4	800	500	✔	✔	✔	**8PQ6000-8BA45**	**8PQ2050-8BA13**	1 unit
3VA20 (100 A)	3	600	550	✔	✔		**8PQ6000-8BA37**	**8PQ2055-6BA20**	1 unit
	3	600	550			✔	**8PQ6000-8BA37**	**8PQ2055-6BA21**	1 unit
	4	800	550	✔	✔		**8PQ6000-8BA52**	**8PQ2055-8BA12**	1 unit
	4	800	550			✔	**8PQ6000-8BA52**	**8PQ2055-8BA14**	1 unit
3VA21 (160 A)	3	600	550	✔	✔		**8PQ6000-8BA37**	**8PQ2055-6BA20**	1 unit
	3	600	550			✔	**8PQ6000-8BA37**	**8PQ2055-6BA21**	1 unit
	4	800	550	✔	✔		**8PQ6000-8BA52**	**8PQ2055-8BA12**	1 unit
	4	800	550			✔	**8PQ6000-8BA52**	**8PQ2055-8BA14**	1 unit
3VA22 (250 A)	3	600	550	✔	✔		**8PQ6000-8BA37**	**8PQ2055-6BA20**	1 unit
	4	800	550	✔	✔		**8PQ6000-8BA52**	**8PQ2055-8BA12**	1 unit
3VA23 (400 A)	2	600	600	✔	✔	✔	**8PQ6000-8BA65**	**8PQ2060-6BA26**	1 unit
	3	800	600	✔	✔	✔	**8PQ6000-8BA62**	**8PQ2060-8BA08**	1 unit
3VA24 (630 A)	2	600	600	✔	✔	✔	**8PQ6000-8BA65**	**8PQ2060-6BA26**	1 unit
	3	800	600	✔	✔	✔	**8PQ6000-8BA62**	**8PQ2060-8BA08**	1 unit

	Version	Article No. www.siemens.com/product?Article No.	PS
	**N-Link**		
	Version		
	• 3VA10 (up to 100 A); 3VA11 (up to 160 A), 3VA12 (up to 250 A)	**8PQ6000-8BA31**	1 unit
	• 3VA23 (up to 400 A); 3VA24 (up to 630 A)	**8PQ6000-8BA32**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
									
Molded case circuit breakers	Number of breakers	Width mm	Height mm	Operator type			**Mounting plate**	**Cover**	
⑤ **Plug-in version**									
3-pole									
3VA11 (160 A)	5	600	350	✔	✔	✔	**8PQ6000-8BA33**	**8PQ2035-6BA26**	1 unit
	7	800	350	✔	✔	✔	**8PQ6000-8BA47**	**8PQ2035-8BA16**	1 unit
3VA12 (250 A)	3	600	400	✔	✔	✔	**8PQ6000-8BA36**	**8PQ2040-6BA26**	1 unit
	5	800	400	✔	✔	✔	**8PQ6000-8BA44**	**8PQ2040-8BA23**	1 unit
3VA20 (100 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA38**	**8PQ2045-6BA13**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA51**	**8PQ2045-8BA11**	1 unit
	5	800	450			✔	**8PQ6000-8BA51**	**8PQ2045-8BA15**	1 unit
3VA21 (160 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA38**	**8PQ2045-6BA13**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA51**	**8PQ2045-8BA11**	1 unit
	5	800	450			✔	**8PQ6000-8BA51**	**8PQ2045-8BA15**	1 unit
3VA22 (250 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA38**	**8PQ2045-6BA13**	1 unit
	5	800	450	✔	✔		**8PQ6000-8BA51**	**8PQ2045-8BA11**	1 unit
	5	800	450			✔	**8PQ6000-8BA51**	**8PQ2045-8BA15**	1 unit
3VA23 (400 A)	3	600	450	✔	✔	✔	**8PQ6000-8BA56**	**8PQ2045-6BA12**	1 unit
	4	800	450	✔	✔	✔	**8PQ6000-8BA60**	**8PQ2045-8BA13**	1 unit
3VA24 (630 A)	3	600	450	✔	✔	✔	**8PQ6000-8BA56**	**8PQ2045-6BA12**	1 unit
	4	800	450	✔	✔	✔	**8PQ6000-8BA60**	**8PQ2045-8BA13**	1 unit
4-pole									
3VA11 (160 A)	4	600	350	✔	✔	✔	**8PQ6000-8BA34**	**8PQ2035-6BA27**	1 unit
	5	800	350	✔	✔	✔	**8PQ6000-8BA48**	**8PQ2035-8BA17**	1 unit
3VA12 (250 A)	3	600	400	✔	✔	✔	**8PQ6000-8BA36**	**8PQ2040-6BA26**	1 unit
	4	800	400	✔	✔	✔	**8PQ6000-8BA46**	**8PQ2040-8BA24**	1 unit
3VA20 (100 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA38**	**8PQ2045-6BA13**	1 unit
	4	800	450	✔	✔		**8PQ6000-8BA53**	**8PQ2045-8BA12**	1 unit
	4	800	450			✔	**8PQ6000-8BA53**	**8PQ2045-8BA16**	1 unit
3VA21 (160 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA38**	**8PQ2045-6BA13**	1 unit
	4	800	450	✔	✔		**8PQ6000-8BA53**	**8PQ2045-8BA12**	1 unit
	4	800	450			✔	**8PQ6000-8BA53**	**8PQ2045-8BA16**	1 unit
3VA22 (250 A)	3	600	450	✔	✔		**8PQ6000-8BA38**	**8PQ2045-6BA11**	1 unit
	3	600	450			✔	**8PQ6000-8BA38**	**8PQ2045-6BA13**	1 unit
	4	800	450	✔	✔		**8PQ6000-8BA53**	**8PQ2045-8BA12**	1 unit
	4	800	450			✔	**8PQ6000-8BA53**	**8PQ2045-8BA16**	1 unit
3VA23 (400 A)	2	600	450	✔	✔	✔	**8PQ6000-8BA66**	**8PQ2045-6BA14**	1 unit
	3	800	450	✔	✔	✔	**8PQ6000-8BA63**	**8PQ2045-8BA14**	1 unit
3VA24 (630 A)	2	600	450	✔	✔	✔	**8PQ6000-8BA66**	**8PQ2045-6BA14**	1 unit
	3	800	450	✔	✔	✔	**8PQ6000-8BA63**	**8PQ2045-8BA14**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VA molded case circuit breakers

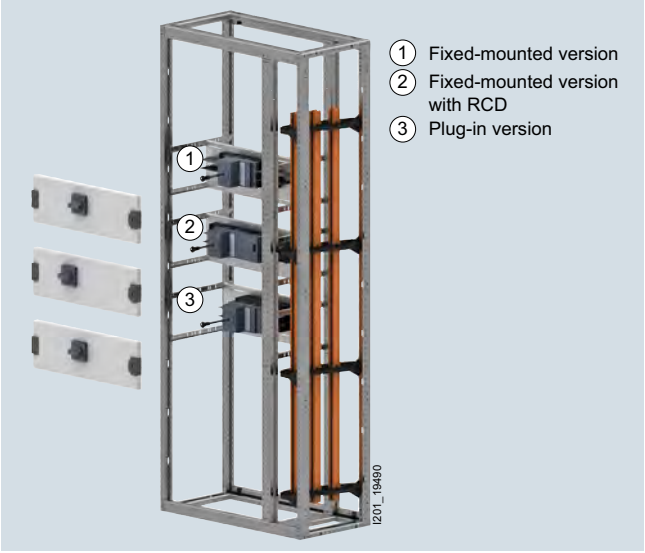
Modular door – horizontal

Features

- Front and rear connection possible
- Optimized for cost-effective use of flexible insulated copper busbars
- Modular doors prepared for 8UC door mounted rotary operators.

Configuration

- Space for cable routing shall be provided above and below the assembly kits
- The space for cable routing is oriented around the selected cross-sections and their bending radii
- At voltages >415 V, phase separators and insulating plates are required (see 3VA Manual).



① Fixed-mounted version
② Fixed-mounted version with RCD
③ Plug-in version

Version			Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
					
Molded case circuit breakers	Width mm	Height mm	**Mounting plate**	**Modular door**	
① **Fixed-mounted version**					
3/4-pole (unless otherwise specified)					
3VA10 (100 A)	600	150	**8PQ6000-8BA01**	**8PQ2015-6BA31**	1 unit
	800	150	**8PQ6000-8BA02**	**8PQ2015-8BA12**	1 unit
3VA11 (160 A)	600	150	**8PQ6000-8BA01**	**8PQ2015-6BA31**	1 unit
	800	150	**8PQ6000-8BA02**	**8PQ2015-8BA12**	1 unit
3VA12 (250 A)	600	150 (3-pole)	**8PQ6000-8BA03**	**8PQ2015-6BA34**	1 unit
	600	200	**8PQ6000-8BA05**	**8PQ2020-6BA42**	1 unit
	800	200	**8PQ6000-8BA07**	**8PQ2020-8BA22**	1 unit
3VA20 (100 A)	600	200	**8PQ6000-8BA08**	**8PQ2020-6BA44**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA21 (160 A)	600	200	**8PQ6000-8BA08**	**8PQ2020-6BA44**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA22 (250 A)	600	200	**8PQ6000-8BA08**	**8PQ2020-6BA44**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA23 (400 A)	600	200 (3-pole)	**8PQ6000-8BA23**	**8PQ2020-6BA46**	1 unit
	600	250	**8PQ6000-8BA25**	**8PQ2025-6BA24**	1 unit
	800	250	**8PQ6000-8BA27**	**8PQ2025-8BA15**	1 unit
3VA24 (630 A)	600	200 (3-pole)	**8PQ6000-8BA23**	**8PQ2020-6BA46**	1 unit
	600	250	**8PQ6000-8BA25**	**8PQ2025-6BA24**	1 unit
	800	250	**8PQ6000-8BA27**	**8PQ2025-8BA15**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version			Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
					
Molded case circuit breakers	Width mm	Height mm	**Mounting plate**	**Modular door**	
② **Fixed-mounted version with RCD**					
3/4-pole (unless otherwise specified)					
3VA11 (160 A)	600	150	**8PQ6000-8BA01**	**8PQ2015-6BA33**	1 unit
	800	150	**8PQ6000-8BA02**	**8PQ2015-8BA12**	1 unit
3VA12 (250 A)	600	150 (3-pole)	**8PQ6000-8BA03**	**8PQ2015-6BA35**	1 unit
	600	200	**8PQ6000-8BA05**	**8PQ2020-6BA43**	1 unit
	800	200	**8PQ6000-8BA07**	**8PQ2020-8BA22**	1 unit
3VA20 (100 A)	600	200	**8PQ6000-8BA11**	**8PQ2020-6BA45**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA21 (160 A)	600	200	**8PQ6000-8BA11**	**8PQ2020-6BA45**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA22 (250 A)	600	200	**8PQ6000-8BA11**	**8PQ2020-6BA45**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA23 (400 A)	800	250	**8PQ6000-8BA27**	**8PQ2025-8BA15**	1 unit
3VA24 (630 A)	800	250	**8PQ6000-8BA27**	**8PQ2025-8BA15**	1 unit
③ **Plug-in version**					
3/4-pole (unless otherwise specified)					
			Mounting plate	**Modular door**	
3VA11 (160 A)	600	150	**8PQ6000-8BA01**	**8PQ2015-6BA31**	1 unit
	800	150	**8PQ6000-8BA02**	**8PQ2015-8BA12**	1 unit
3VA12 (250 A)	600	150 (3-pole)	**8PQ6000-8BA04**	**8PQ2015-6BA34**	1 unit
	600	200	**8PQ6000-8BA06**	**8PQ2020-6BA42**	1 unit
	800	200	**8PQ6000-8BA07**	**8PQ2020-8BA22**	1 unit
3VA20 (100 A)	600	200	**8PQ6000-8BA08**	**8PQ2020-6BA44**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA21 (160 A)	600	200	**8PQ6000-8BA08**	**8PQ2020-6BA44**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA22 (250 A)	600	200	**8PQ6000-8BA08**	**8PQ2020-6BA44**	1 unit
	800	200	**8PQ6000-8BA10**	**8PQ2020-8BA23**	1 unit
3VA23 (400 A)	600	200 (3-pole)	**8PQ6000-8BA24**	**8PQ2020-6BA46**	1 unit
	600	250	**8PQ6000-8BA26**	**8PQ2025-6BA24**	1 unit
	800	250	**8PQ6000-8BA28**	**8PQ2025-8BA15**	1 unit
3VA24 (630 A)	600	200 (3-pole)	**8PQ6000-8BA24**	**8PQ2020-6BA46**	1 unit
	600	250	**8PQ6000-8BA26**	**8PQ2025-6BA24**	1 unit
	800	250	**8PQ6000-8BA28**	**8PQ2025-8BA15**	1 unit

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Overview

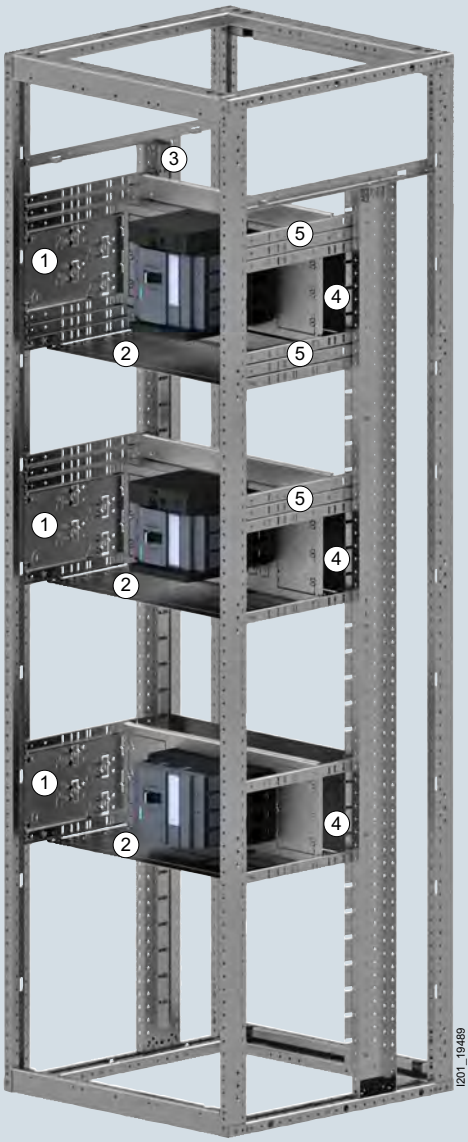
Form of internal separation – front connection

Features

- For implementation of forms 3b and 4b
- Suitable for connection with flexible busbars

Configuration

Increase in module height ⑤ required in the case of feeders with guide frame



① Cable connection
② Separation, horizontal
③ Plug-in rail
④ Separation, rear
⑤ Increase in module height

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.	PS
									
Molded case circuit breakers	Height mm	Installation system	Operator type				**Cable connection**	**Terminal**	
① **Cable connections**									
3-pole									
3VA12 (up to 250 A)	150	Fixed	✔	✔			**8PQ6000-8BA12**		1 unit
	150	Fixed			✔	✔	**8PQ6000-8BA13**		1 unit
	150	Plug-in socket	✔	✔			**8PQ6000-8BA13**		1 unit
	150	Plug-in socket			✔		**8PQ6000-8BA12**		1 unit
	150	Draw-out	✔		✔		**8PQ6000-8BA12**		1 unit
3VA22 (up to 250 A)	200	Fixed	✔	✔			**8PQ6000-8BA16**		1 unit
	200	Fixed			✔		**8PQ6000-8BA17**		1 unit
	200	Plug-in socket	✔	✔			**8PQ6000-8BA17**		1 unit
	200	Plug-in socket			✔	✔	**8PQ6000-8BA16**		1 unit
	200	Draw-out	✔		✔		**8PQ6000-8BA16**		1 unit
3VA23 (up to 400 A)	200	Fixed	✔	✔			**8PQ6000-8BA20**		1 unit
	200	Fixed			✔		**8PQ6000-8BA18**		1 unit
	200	Plug-in socket	✔	✔	✔	✔	**8PQ6000-8BA18**		1 unit
	200	Draw-out	✔				**8PQ6000-8BA20**		1 unit
3VA24 (up to 630 A)	200	Fixed	✔	✔			**8PQ6000-8BA20**		1 unit
	200	Fixed			✔	✔	**8PQ6000-8BA18**		1 unit
	200	Plug-in socket	✔	✔	✔	✔	**8PQ6000-8BA18**		1 unit
	200	Draw-out	✔				**8PQ6000-8BA20**		1 unit
4-pole									
For 3VA22, order connecting terminal ③ for fourth pole separately									
3VA12 (up to 250 A)	200	Fixed	✔	✔			**8PQ6000-8BA14**		1 unit
	200	Fixed			✔	✔	**8PQ6000-8BA15**		1 unit
	200	Plug-in socket	✔	✔			**8PQ6000-8BA15**		1 unit
	200	Plug-in socket			✔	✔	**8PQ6000-8BA14**		1 unit
	200	Draw-out	✔		✔		**8PQ6000-8BA14**		1 unit
3VA22 (up to 250 A)	200	Fixed	✔	✔			**8PQ6000-8BA16**	**8PQ5000-4BA58**	1 unit
	200	Fixed			✔	✔	**8PQ6000-8BA17**	**8PQ5000-4BA58**	1 unit
	200	Plug-in socket	✔	✔			**8PQ6000-8BA17**	**8PQ5000-4BA58**	1 unit
	200	Plug-in socket			✔	✔	**8PQ6000-8BA16**	**8PQ5000-4BA58**	1 unit
	200	Draw-out	✔		✔		**8PQ6000-8BA16**	**8PQ5000-4BA58**	1 unit
3VA23 (up to 400 A)	250	Fixed	✔	✔			**8PQ6000-8BA22**		1 unit
	250	Fixed			✔	✔	**8PQ6000-8BA21**		1 unit
	250	Plug-in socket	✔	✔	✔	✔	**8PQ6000-8BA21**		1 unit
	250	Draw-out	✔				**8PQ6000-8BA22**		1 unit
3VA24 (up to 630 A)	250	Fixed	✔	✔			**8PQ6000-8BA22**		1 unit
	250	Fixed			✔	✔	**8PQ6000-8BA21**		1 unit
	250	Plug-in socket	✔	✔	✔	✔	**8PQ6000-8BA21**		1 unit
	250	Draw-out	✔				**8PQ6000-8BA22**		1 unit

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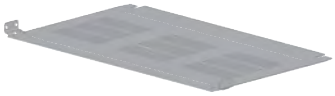


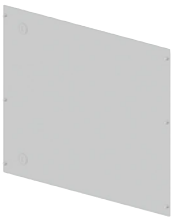
② Horizontal separation

Compartment width mm	Article No. www.siemens.com/product?Article No.	PS
400	**8PQ5000-3BA44**	1 unit
600	**8PQ5000-2BA61**	1 unit
800	**8PQ5000-2BA62**	1 unit



③ Plug-in rails

Equipment height mm	Busbar system	Article No. www.siemens.com/product?Article No.	PS
1600	Top	**8PQ3000-0BA82**	1 unit
1800	Rear or without	**8PQ3000-0BA83**	1 unit



④ Rear separation
Not applicable for frame depth 400

Compartment width mm	Mounting height mm	Article No. www.siemens.com/product?Article No.	PS
600	50	**8PQ5000-2BA51**	1 unit
	100	**8PQ5000-2BA52**	1 unit
	150	**8PQ5000-4BA40**	1 unit
	200	**8PQ5000-4BA41**	1 unit
	250	**8PQ5000-4BA42**	1 unit
	300	**8PQ5000-4BA43**	1 unit
	350	**8PQ5000-4BA44**	1 unit
	400	**8PQ5000-4BA45**	1 unit
	450	**8PQ5000-4BA46**	1 unit
	550	**8PQ5000-4BA47**	1 unit
800	50	**8PQ5000-2BA67**	1 unit
	100	**8PQ5000-2BA68**	1 unit
	200	**8PQ5000-4BA48**	1 unit
	250	**8PQ5000-4BA50**	1 unit
	350	**8PQ5000-4BA51**	1 unit
	400	**8PQ5000-4BA52**	1 unit
	450	**8PQ5000-4BA53**	1 unit



⑤ Increase in module height

Circuit breaker	No. of poles	Width mm	Number x height mm	Article No. www.siemens.com/product?Article No.	PS
3VA12	3	600	2 x 50	**8PQ5000-4BA60**	1 unit
3VA12	4	600	2 x 50	**8PQ5000-4BA60**	1 unit
3VA20,-21,-22	3	600	1 x 50	**8PQ5000-4BA62**	1 unit
3VA20,-21,-22	4	600	2 x 50	**8PQ5000-4BA62**	1 unit
3VA23,-24	3	600	2 x 50	**8PQ5000-4BA62**	1 unit
3VA23,-24	4	600	2 x 50	**8PQ5000-4BA62**	1 unit
3VA12	3	800	1 x 50	**8PQ5000-4BA61**	1 unit
3VA12	4	800	2 x 50	**8PQ5000-4BA61**	1 unit
3VA20,-21,-22	3	800	1 x 50	**8PQ5000-4BA63**	1 unit
3VA20,-21,-22	4	800	2 x 50	**8PQ5000-4BA63**	1 unit
3VA23,-24	3	800	1 x 50	**8PQ5000-4BA63**	1 unit
3VA23,-24	4	800	2 x 50	**8PQ5000-4BA63**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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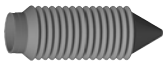
Version			Article No. www.siemens.com/product?Article No.	PS
• Separation				
Circuit breaker	No. of poles	Width mm		
3VA12	3	600	**8PQ5000-4BA68**	1 unit
3VA12	4	600	**8PQ5000-4BA68**	1 unit
3VA20,-21,-22	3	600	**8PQ5000-4BA70**	1 unit
3VA20,-21,-22	4	600	**8PQ5000-4BA70**	1 unit
3VA23,-24	3	600	**8PQ5000-4BA70**	1 unit
3VA23,-24	4	600	**8PQ5000-4BA70**	1 unit
3VA12	3	800	**8PQ5000-4BA71**	1 unit
3VA12	4	800	**8PQ5000-4BA71**	1 unit
3VA20,-21,-22	3	800	**8PQ5000-4BA72**	1 unit
3VA20,-21,-22	4	800	**8PQ5000-4BA72**	1 unit
3VA23,-24	3	800	**8PQ5000-4BA72**	1 unit
3VA23,-24	4	800	**8PQ5000-4BA72**	1 unit

Form 4b



Protective bellows
• For covering the cable connecting terminal
• 1 pack = 4 units

8PQ9400-0BA71 1 unit

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Overview

Form of internal separation – rear connection

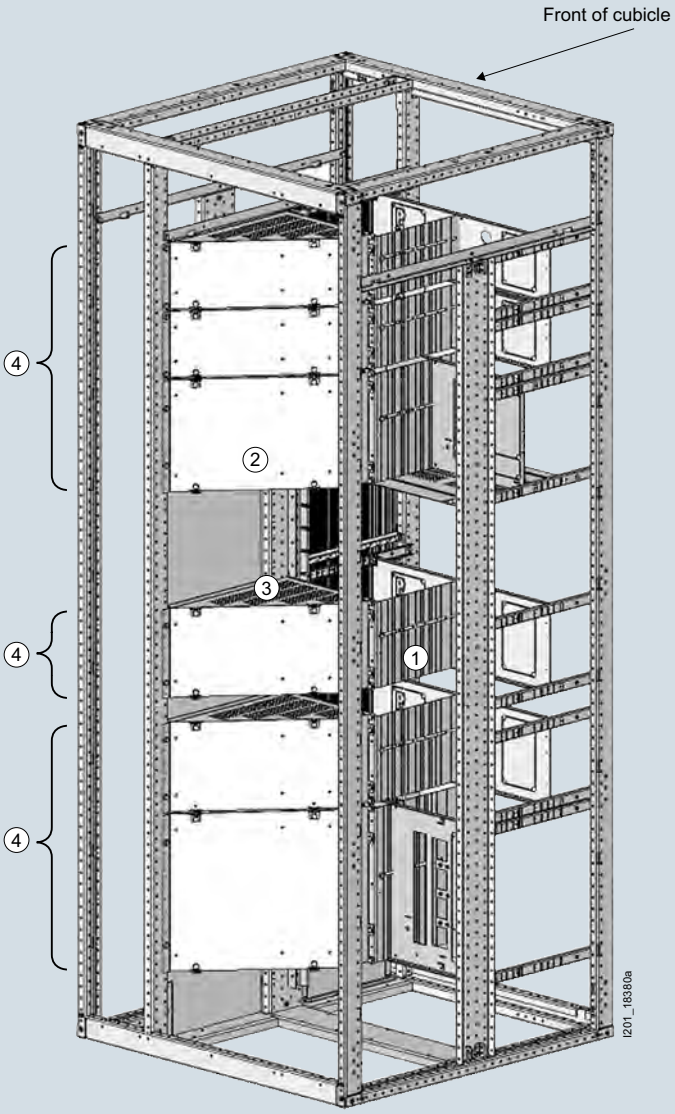
Features

- Modular system for rear device connection
- Connection is made by means of flexible insulated busbars

Configuration

- One basic module ① and vertical separation ② required for each separation kit
- Horizontal separation ③ forms top and bottom termination and is required once for each sub-segment.

Selection and ordering data



① Basic module
② Vertical separation
③ Horizontal separation
④ Sub-segments

Minimum order quantity (PS) or a multiple thereof can be ordered.

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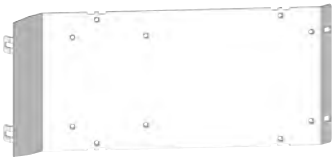
	Version		Article No. www.siemens.com/product?Article No.	PS
	① **Basic modules**			
	Compartment width mm	Module height mm		
	600	150	**8PQ5000-4BA73**	1 unit
		200	**8PQ5000-4BA74**	1 unit
		250	**8PQ5000-4BA75**	1 unit
	800	150	**8PQ5000-4BA76**	1 unit
		200	**8PQ5000-4BA77**	1 unit
		250	**8PQ5000-4BA78**	1 unit
	② **Vertical separation**			
	Compartment width mm	Module height mm		
	600	150	**8PQ5000-3BA52**	1 unit
		200	**8PQ5000-3BA53**	1 unit
		250	**8PQ5000-3BA54**	1 unit
		300	**8PQ5000-3BA55**	1 unit
		350	**8PQ5000-3BA56**	1 unit
		400	**8PQ5000-4BA06**	1 unit
	800	150	**8PQ5000-3BA57**	1 unit
		200	**8PQ5000-3BA58**	1 unit
		250	**8PQ5000-3BA60**	1 unit
		350	**8PQ5000-3BA61**	1 unit
		400	**8PQ5000-4BA07**	1 unit
		450	**8PQ5000-4BA08**	1 unit
	③ **Horizontal separation** • Forms the top and bottom terminations • Required 1 × for each sub-segment • 1 set = 2 units			
	Compartment width mm			
	600		**8PQ5000-3BA63**	1 unit
	800		**8PQ5000-3BA64**	1 unit

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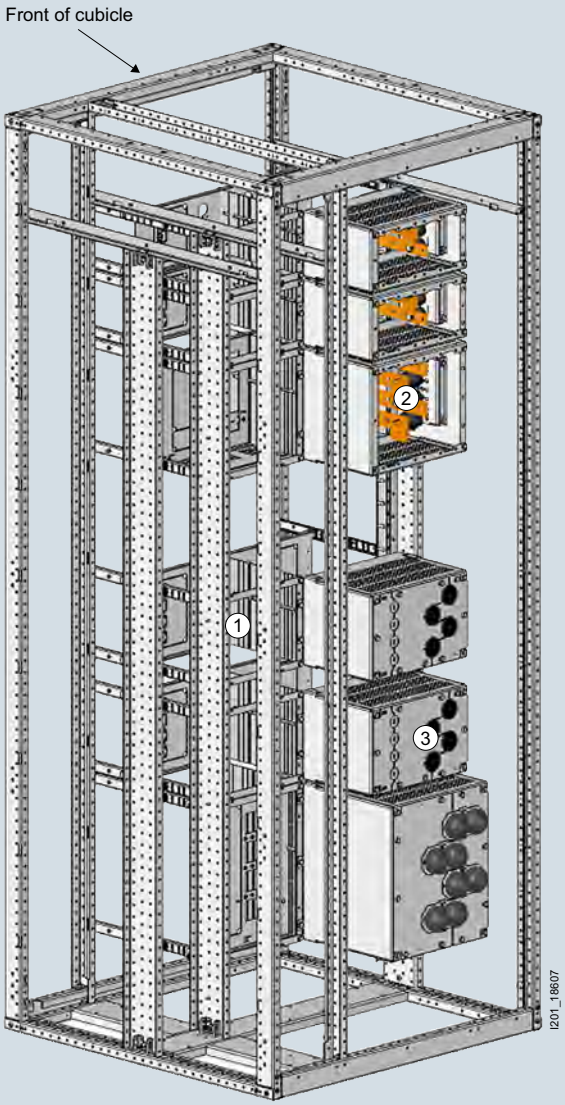
Configuration

For larger cable cross-sections an additional cable connection panel is required at the rear.



1 Basic module, rear connection
2 Cable connection compartment
3 Cover plate for cable connection compartment

Minimum order quantity (PS) or a multiple thereof can be ordered.

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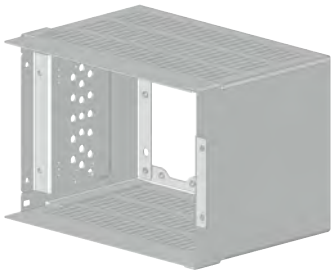
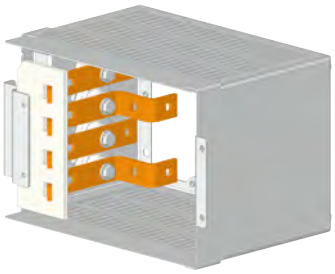
Version			Article No. www.siemens.com/product?Article No.	PS
① **Basic modules**				
Compartment width mm	Module height mm			
600	150		**8PQ5000-4BA73**	1 unit
	200		**8PQ5000-4BA74**	1 unit
	250		**8PQ5000-4BA75**	1 unit
800	150		**8PQ5000-4BA76**	1 unit
	200		**8PQ5000-4BA77**	1 unit
	250		**8PQ5000-4BA78**	1 unit



② **Cable connection compartments**
- Cables are connected via 8WH terminal blocks, see Catalog LV 52
- Kit prepared for mounting of DIN rails
- Not included in scope of supply

Versions	No. of poles	Module height mm		
3VA10, 3VA11	3	150	**8PQ6000-5BA13**	1 unit
	4		**8PQ6000-5BA13**	1 unit
3VA20, 3VA21	3	200	**8PQ6000-5BA14**	1 unit
	4		**8PQ6000-5BA14**	1 unit



Cable connecting bars made of copper

Versions	No. of poles	Module height mm		
3VA12	3	150	**8PQ6000-5BA15**	1 unit
	4	200	**8PQ6000-5BA17**	1 unit
3VA22	3	200	**8PQ6000-8BA30**	1 unit
	4	200	**8PQ6000-5BA17**	1 unit
3VA23	3	200	**8PQ6000-5BA18**	1 unit
	4	250	**8PQ6000-5BA20**	1 unit
3VA24	3	200	**8PQ6000-5BA18**	1 unit
	4	250	**8PQ6000-5BA20**	1 unit

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③ **Cover plates**

Version	No. of poles	Module height mm	Article No. www.siemens.com/product?Article No.	PS
3VA10, 3VA11	3	150	**8PQ5000-4BA80**	1 unit
3VA20, 3VA21	4	200	**8PQ5000-3BA72**	1 unit
3VA12	3	150	**8PQ5000-3BA71**	1 unit
	4	200	**8PQ5000-3BA72**	1 unit
3VA23	3	200	**8PQ5000-3BA73**	1 unit
	4	250	**8PQ5000-3BA74**	1 unit
3VA24	3	200	**8PQ5000-3BA73**	1 unit
	4	250	**8PQ5000-3BA74**	1 unit



① **Basic modules, fixed-mounted version**

Compartment width mm	Module height mm	Article No. www.siemens.com/product?Article No.	PS
600	350	**8PQ5000-3BA70**	1 unit
	400	**8PQ5000-4BA03**	1 unit
800	400	**8PQ5000-4BA04**	1 unit
	450	**8PQ5000-4BA05**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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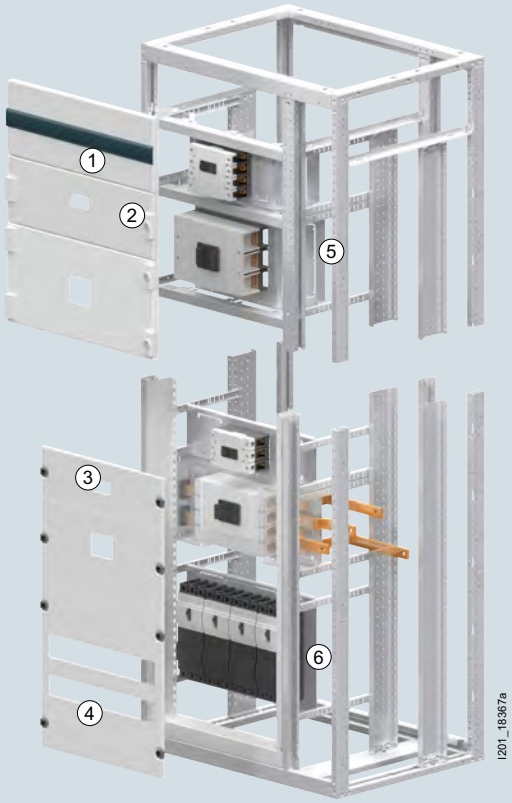
Overview



1. Head compartment cover
2. Modular door for direct operating mechanism
3. Cover for single branch unit
4. Cover for multiple branch unit
5. Assembly kit, horizontal
6. Assembly kit, vertical

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Internal cover – horizontal

Selection and ordering data

Configuration

- Extended terminal covers required for front connection.
- Cover is prepared for a motorized operating mechanism with spring energy store.

Version	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Fixed-mounted version		





Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Cover**
VL160X	600	3	Front, rear	Direct, rotary and motorized	150	**8PQ6000-4BA88**	**8PQ2015-6BA21**
		4	Front, rear	Direct, rotary and motorized	200	**8PQ6000-5BA01**	**8PQ2020-6BA26**
	800	3/4	Front, rear	Direct, rotary and motorized	200	**8PQ6000-4BA41**	**8PQ2020-8BA10**
VL160/250	600	3	Front, rear	Direct, rotary and motorized	150	**8PQ6000-5BA00**	**8PQ2015-6BA21**
		4	Front, rear	Direct, rotary and motorized	200	**8PQ6000-5BA02**	**8PQ2020-6BA26**
	800	3/4	Front, rear	Direct, rotary and motorized	200	**8PQ6000-4BA42**	**8PQ2020-8BA10**
VL400	600	3	Front, rear	Direct, rotary and motorized	200	**8PQ6000-2BA84**	**8PQ2020-6BA06**
		4	Front, rear	Direct, rotary and motorized	250	**8PQ6000-2BA87**	**8PQ2025-6BA02**
	800	3/4	Front, rear	Direct, rotary and motorized	250	**8PQ6000-4BA44**	**8PQ2025-8BA06**
VL630	600	3	Front, rear	Direct, rotary and motorized	300	**8PQ6000-3BA01**	**8PQ2030-6BA03**
		4	Front, rear	Direct, rotary and motorized	350	**8PQ6000-3BA10**	**8PQ2035-6BA04**
	800	3/4	Front, rear	Direct, rotary and motorized	350	**8PQ6000-4BA45**	**8PQ2035-8BA10**





Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Crossbar**	**Cover**
VL800	800	3/4	Front, rear	Direct, rotary and motorized	400	**8PQ6000-4BA46**	**8PQ2040-8BA21**
VL1250	800	3/4	Front, rear	Direct, motorized	450	**8PQ6000-4BA47**	**8PQ2045-8BA05**
VL1600	800	3/4	Front, rear	Direct, motorized	450	**8PQ6000-4BA48**	**8PQ2045-8BA05**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Configuration

- Extended terminal covers required for front connection.
- Cover is prepared for a motorized operating mechanism with spring energy store.

Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Fixed-mounted version with RCD							
							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Cover**
VL160X	600	3	Front, rear	Direct	150	**8PQ6000-4BA88**	**8PQ2015-6BA22**
		4	Front, rear	Direct	200	**8PQ6000-5BA01**	**8PQ2020-6BA27**
	800	3/4	Front, rear	Direct	200	**8PQ6000-4BA41**	**8PQ2020-8BA11**
VL160/250	600	3	Front, rear	Direct, rotary, motorized	150	**8PQ6000-5BA00**	**8PQ2015-6BA21**
		4	Front, rear	Direct, rotary, motorized	200	**8PQ6000-5BA02**	**8PQ2020-6BA26**
	800	3/4	Front, rear	Direct, rotary, motorized	200	**8PQ6000-4BA42**	**8PQ2020-8BA10**
VL400	800	4	Front, rear	Direct, rotary, motorized	250	**8PQ6000-4BA44**	**8PQ2025-8BA06**
Plug-in version							
							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Cover**
VL160X	600	3	Front, rear	Direct	150	**8PQ6000-3BA24**	**8PQ2015-6BA21**
		4	Front, rear	Direct	200	**8PQ6000-3BA27**	**8PQ2020-6BA26**
	800	3/4	Front, rear	Direct	200	**8PQ6000-4BA43**	**8PQ2020-8BA10**
VL160/250	600	3	Front, rear	Direct, rotary	150	**8PQ6000-3BA24**	**8PQ2015-6BA21**
		4	Front, rear	Direct, rotary	200	**8PQ6000-3BA27**	**8PQ2020-6BA26**
	800	3/4	Front, rear	Direct, rotary	200	**8PQ6000-4BA43**	**8PQ2020-8BA10**
VL400	600	3	Front, rear	Direct, rotary	200	**8PQ6000-2BA84**	**8PQ2020-6BA06**
		4	Front, rear	Direct, rotary	250	**8PQ6000-2BA87**	**8PQ2025-6BA02**
	800	3/4	Front, rear	Direct, rotary	250	**8PQ6000-4BA44**	**8PQ2025-8BA06**
VL630	600	3	Front, rear	Direct, rotary	300	**8PQ6000-3BA01**	**8PQ2030-6BA03**
		4	Front, rear	Direct, rotary	350	**8PQ6000-3BA10**	**8PQ2035-6BA04**
	800	3/4	Front, rear	Direct, rotary	350	**8PQ6000-4BA45**	**8PQ2035-8BA10**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Configuration

- Extended terminal covers required for front connection.
- To improve the stability of the kits for VL400 and VL630 in draw-out version it is necessary to fit a reinforcement kit for each branch unit.

Plug-in version with RCD

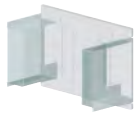



Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	Mounting plate	Cover
VL160X	600	3	Front, rear	Direct	150	**8PQ6000-2BA75**	**8PQ2015-6BA06**
		4	Front, rear	Direct	200	**8PQ6000-2BA81**	**8PQ2020-6BA07**
	800	3/4	Front, rear	Direct	200	**8PQ6000-4BA43**	**8PQ2020-8BA11**
VL160/250	600	3	Front, rear	Direct, rotary	150	**8PQ6000-2BA75**	**8PQ2015-6BA04**
		4	Front, rear	Direct, rotary	200	**8PQ6000-2BA81**	**8PQ2020-6BA05**
	800	3/4	Front, rear	Direct, rotary	200	**8PQ6000-4BA43**	**8PQ2020-8BA10**
VL400	800	4	Front, rear	Direct, rotary	250	**8PQ6000-4BA44**	**8PQ2025-8BA06**

Draw-out version




Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	Mounting plate	Cover
VL160/250	600	3/4	Front, rear	Direct, rotary	250	**8PQ6000-3BA27**	**8PQ2020-6BA21**
	800	3/4	Front, rear	Direct, rotary	250	**8PQ6000-4BA43**	**8PQ2025-8BA07**
VL400	600	3/4	Front, rear	Direct, rotary	300	**8PQ6000-2BA87**	**8PQ2025-6BA11**
	800	3/4	Front, rear	Direct, rotary	300	**8PQ6000-4BA44**	**8PQ2030-8BA08**
VL630	600	3	Front, rear	Direct, rotary	300	**8PQ6000-3BA01**	**8PQ2030-6BA17**
		4	Front, rear	Direct, rotary	350	**8PQ6000-3BA10**	**8PQ2035-6BA17**
	800	3/4	Front, rear	Direct, rotary	350	**8PQ6000-4BA45**	**8PQ2035-8BA11**




VL800	800	3/4	Front, rear	Direct	500	**8PQ6000-4BA56**	**8PQ2050-8BA05**
VL1250	800	3/4	Front, rear	Direct	500	**8PQ6000-4BA56**	**8PQ2050-8BA06**
VL1600	800	3/4	Front, rear	Direct	500	**8PQ6000-4BA56**	**8PQ2050-8BA06**

Reinforcement for draw-out version



Circuit breaker	No. of poles	Reinforcement
VL400	3/4	**8PQ6000-4BA17**
VL630	3	**8PQ6000-4BA20**
VL630	4	**8PQ6000-4BA18**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Internal cover – vertical

Selection and ordering data

Configuration

- Cover is prepared for a motorized operating mechanism with spring energy store.
- For vertical assembly kits that are equipped with a motorized operating mechanism, the adjacent mounting space must be left empty so that the mechanism can be tensioned by hand.

Version								Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Fixed-mounted version									
Circuit breaker		Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
VL160X		600	3	Front, rear	Direct, rotary, motorized	350	1 ... 4	**8PQ6000-2BA76**	**8PQ2035-6BA02**
			4	Front, rear	Direct, rotary, motorized	350	1 ... 3	**8PQ6000-2BA82**	**8PQ2035-6BA03**
		800	3	Front, rear	Direct, rotary, motorized	350	1 ... 5	**8PQ6000-2BA77**	**8PQ2035-8BA02**
			4	Front, rear	Direct, rotary, motorized	350	1 ... 4	**8PQ6000-2BA83**	**8PQ2035-8BA03**
VL160/250		600	3	Front, rear	Direct, rotary, motorized	350	1 ... 4	**8PQ6000-3BA16**	**8PQ2035-6BA02**
			4	Front, rear	Direct, rotary, motorized	350	1 ... 3	**8PQ6000-3BA22**	**8PQ2035-6BA03**
		800	3	Front, rear	Direct, rotary, motorized	350	1 ... 5	**8PQ6000-3BA17**	**8PQ2035-8BA02**
			4	Front, rear	Direct, rotary, motorized	350	1 ... 4	**8PQ6000-3BA23**	**8PQ2035-8BA03**
VL400	b	600	3	Front, rear	Direct, rotary, motorized	400	1 ... 3	**8PQ6000-2BA85**	**8PQ2040-6BA07**
	b		4	Front, rear	Direct, rotary, motorized	400	1 ... 2	**8PQ6000-2BA88**	**8PQ2040-6BA05**
	b	800	3	Front, rear	Direct, rotary, motorized	400	1 ... 4	**8PQ6000-2BA86**	**8PQ2040-8BA08**
	b		4	Front, rear	Direct, rotary, motorized	400	1 ... 3	**8PQ6000-3BA00**	**8PQ2040-8BA07**
VL630	b	600	3	Front, rear	Direct, rotary, motorized	400	1 ... 2	**8PQ6000-3BA02**	**8PQ2040-6BA06**
	b		4	Front, rear	Direct, rotary, motorized	400	1	**8PQ6000-3BA05**	**8PQ2040-6BA08**
	b	800	3	Front, rear	Direct, rotary, motorized	400	1 ... 3	**8PQ6000-3BA03**	**8PQ2040-8BA06**
	b		4	Front, rear	Direct, rotary, motorized	400	1 ... 2	**8PQ6000-3BA06**	**8PQ2040-8BA05**
									
Circuit breaker		Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Crossbar**	**Cover**
VL800	b	600	3/4	Front, rear	Direct, rotary, motorized	600	1	**8PQ6000-3BA07**	**8PQ2060-6BA02**
VL1250	b	600	3/4	Front, rear	Direct, motorized	600	1	**8PQ6000-3BA11**	**8PQ2060-6BA03**
VL1600	b	600	3/4	Front, rear	Direct, motorized	700	1	**8PQ6000-3BA12**	**8PQ2070-6BA01**

b For front terminal bars, two additional covers, height 100 mm each, are required. Moreover, extended terminal covers have to be ordered for the respective circuit breaker.

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Selection and ordering data

Configuration

- Cover is prepared for a motorized operating mechanism with spring energy store.
- For vertical assembly kits that are equipped with a motorized operating mechanism, the adjacent mounting space must be left empty so that the mechanism can be tensioned by hand.

Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Fixed-mounted version with RCD								
Circuit breaker	Compart-ment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
VL160X	600	3	Front, rear	Direct	500	1 ... 4	**8PQ6000-2BA76**	**8PQ2050-6BA05**
		4	Front, rear	Direct	500	1 ... 3	**8PQ6000-2BA82**	**8PQ2050-6BA06**
	800	3	Front, rear	Direct	500	1 ... 5	**8PQ6000-2BA77**	**8PQ2050-8BA07**
		4	Front, rear	Direct	500	1 ... 4	**8PQ6000-2BA83**	**8PQ2050-8BA08**
VL160/250	600	3	Front, rear	Direct, rotary, motorized	500	1 ... 4	**8PQ6000-3BA16**	**8PQ2050-6BA07**
		4	Front, rear	Direct, rotary, motorized	500	1 ... 3	**8PQ6000-3BA22**	**8PQ2050-6BA08**
	800	3	Front, rear	Direct, rotary, motorized	500	1 ... 5	**8PQ6000-3BA17**	**8PQ2050-8BA10**
		4	Front, rear	Direct, rotary, motorized	500	1 ... 4	**8PQ6000-3BA23**	**8PQ2050-8BA11**
Plug-in version								
Circuit breaker		Compart-ment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
VL160X	a	600	3	Front, rear	Direct, rotary	350	1 ... 4	**8PQ6000-3BA25**	**8PQ2035-6BA02**
	a		4	Front, rear	Direct, rotary	350	1 ... 3	**8PQ6000-3BA28**	**8PQ2035-6BA03**
	a	800	3	Front, rear	Direct, rotary	350	1 ... 5	**8PQ6000-3BA26**	**8PQ2035-8BA02**
	a		4	Front, rear	Direct, rotary	350	1 ... 4	**8PQ6000-3BA30**	**8PQ2035-8BA03**
VL160/250	a	600	3	Front, rear	Direct, rotary	350	1 ... 4	**8PQ6000-3BA25**	**8PQ2035-6BA02**
	a		4	Front, rear	Direct, rotary	350	1 ... 3	**8PQ6000-3BA28**	**8PQ2035-6BA03**
	a	800	3	Front, rear	Direct, rotary	350	1 ... 5	**8PQ6000-3BA26**	**8PQ2035-8BA02**
	a		4	Front, rear	Direct, rotary	350	1 ... 4	**8PQ6000-3BA30**	**8PQ2035-8BA03**
VL400	b	600	3	Front, rear	Direct, rotary	400	1 ... 3	**8PQ6000-2BA85**	**8PQ2040-6BA07**
	b		4	Front, rear	Direct, rotary	400	1 ... 2	**8PQ6000-2BA88**	**8PQ2040-6BA05**
	b	800	3	Front, rear	Direct, rotary	400	1 ... 4	**8PQ6000-2BA86**	**8PQ2040-8BA08**
	b		4	Front, rear	Direct, rotary	400	1 ... 3	**8PQ6000-3BA00**	**8PQ2040-8BA07**
VL630	b	600	3	Front, rear	Direct, rotary	400	1 ... 2	**8PQ6000-3BA02**	**8PQ2040-6BA06**
	b		4	Front, rear	Direct, rotary	400	1	**8PQ6000-3BA05**	**8PQ2040-6BA08**
	b	800	3	Front, rear	Direct, rotary	400	1 ... 3	**8PQ6000-3BA03**	**8PQ2040-8BA06**
	b		4	Front, rear	Direct, rotary	400	1 ... 2	**8PQ6000-3BA06**	**8PQ2040-8BA05**

a For front terminal bars, two additional covers, height 50 mm each, are required. Moreover, extended terminal covers have to be ordered for the respective circuit breaker.

b For front terminal bars, two additional covers, height 100 mm each, are required. Moreover, extended terminal covers have to be ordered for the respective circuit breaker.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Plug-in version with RCD								
Circuit breaker	Compart-ment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
VL160X	600	3	Front, rear	Direct	500	1 ... 4	**8PQ6000-3BA25**	**8PQ2050-6BA05**
		4	Front, rear	Direct	500	1 ... 3	**8PQ6000-3BA28**	**8PQ2050-6BA06**
	800	3	Front, rear	Direct	500	1 ... 5	**8PQ6000-3BA26**	**8PQ2050-8BA07**
		4	Front, rear	Direct	500	1 ... 4	**8PQ6000-3BA30**	**8PQ2050-8BA08**
VL160/250	600	3	Front, rear	Direct, rotary	500	1 ... 4	**8PQ6000-3BA25**	**8PQ2050-6BA07**
		4	Front, rear	Direct, rotary	500	1 ... 3	**8PQ6000-3BA28**	**8PQ2050-6BA08**
	800	3	Front, rear	Direct, rotary	500	1 ... 5	**8PQ6000-3BA26**	**8PQ2050-8BA10**
		4	Front, rear	Direct, rotary	500	1 ... 4	**8PQ6000-3BA30**	**8PQ2050-8BA11**
Draw-out version								
Circuit breaker		Compart-ment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
VL160/250	a	800	3	Front, rear	Direct, rotary	350	1 ... 3	**8PQ6000-3BA26**	**8PQ2035-8BA08**
	a		4	Front, rear	Direct, rotary	350	1 ... 2	**8PQ6000-3BA30**	**8PQ2040-8BA15**
VL400	b	600	3/4	Front, rear	Direct, rotary	400	1	**8PQ6000-2BA88**	**8PQ2040-6BA17**
	b	800	3	Front, rear	Direct, rotary	400	1 ... 2	**8PQ6000-2BA86**	**8PQ2040-8BA16**
	b		4	Front, rear	Direct, rotary	400	1	**8PQ6000-3BA00**	**8PQ2040-8BA17**
VL630	b	600	3/4	Front, rear	Direct, rotary	400	1	**8PQ6000-3BA05**	**8PQ2060-6BA12**
	b	800	3/4	Front, rear	Direct, rotary	400	1	**8PQ6000-3BA06**	**8PQ2040-8BA20**
Draw-out version Minimum frame depth: 600 mm								
Circuit breaker		Compart-ment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
VL800	b	600	3	Front, rear	Direct	600	1	**8PQ6000-3BA87**	**8PQ2060-6BA13**
	b		4	Front, rear	Direct	600	1	**8PQ6000-3BA88**	**8PQ2060-6BA14**
VL1250/1600	b	600	3	Front, rear	Direct	650	1	**8PQ6000-4BA00**	**8PQ2065-6BA05**
	b		4	Front, rear	Direct	650	1	**8PQ6000-4BA01**	**8PQ2065-6BA06**

a For front terminal bars, two additional covers, height 50 mm each, are required. Moreover, extended terminal covers have to be ordered for the respective circuit breaker.

b For front terminal bars, two additional covers, height 100 mm each, are required. Moreover, extended terminal covers have to be ordered for the respective circuit breaker.

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Modular door – horizontal

Selection and ordering data

Configuration

- Extended terminal covers required for front connection.

Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Fixed-mounted version with direct operating mechanism							
							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Modular door**
VL160X	600	3	Front, rear	Direct	150	**8PQ6000-6BA27**	**8PQ2015-6BA23**
		4	Front, rear	Direct	200	**8PQ6000-6BA34**	**8PQ2020-6BA30**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA41**	**8PQ2020-8BA15**
VL160/250	600	3	Front, rear	Direct	150	**8PQ6000-6BA30**	**8PQ2015-6BA23**
		4	Front, rear	Direct	200	**8PQ6000-6BA36**	**8PQ2020-6BA30**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA42**	**8PQ2020-8BA15**
VL400	600	3	Front, rear	Direct	200	**8PQ6000-6BA44**	**8PQ2020-6BA33**
		4	Front, rear	Direct	250	**8PQ6000-6BA45**	**8PQ2025-6BA20**
	800	3/4	Front, rear	Direct	250	**8PQ6000-6BA46**	**8PQ2025-8BA11**
VL630	600	3	Front, rear	Direct	300	**8PQ6000-6BA47**	**8PQ2030-6BA24**
		4	Front, rear	Direct	350	**8PQ6000-6BA48**	**8PQ2035-6BA23**
	800	3/4	Front, rear	Direct	350	**8PQ6000-6BA50**	**8PQ2035-8BA14**
							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Crossbar**	**Cover**
VL800	800	3/4	Front, rear	Direct	400	**8PQ6000-4BA46**	**8PQ2040-8BA22**
VL1250	800	3/4	Front, rear	Direct	450	**8PQ6000-4BA47**	**8PQ2045-8BA07**
VL1600	800	3/4	Front, rear	Direct	450	**8PQ6000-4BA48**	**8PQ2045-8BA07**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Fixed-mounted version with door-coupling rotary operating mechanism							
							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Modular door**
VL160X	600	3	Front, rear	8UC door coupling, size 1	150	**8PQ6000-4BA88**	**8PQ2015-6BA14**
		4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-5BA01**	**8PQ2020-6BA16**
	800	3/4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-4BA41**	**8PQ2020-8BA12**
VL160/250	600	3	Front, rear	8UC door coupling, size 1	150	**8PQ6000-5BA00**	**8PQ2015-6BA14**
		4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-5BA02**	**8PQ2020-6BA16**
	800	3/4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-4BA42**	**8PQ2020-8BA12**
VL400	600	3	Front, rear	8UC door coupling, size 2	200	**8PQ6000-2BA84**	**8PQ2020-6BA20**
		4	Front, rear	8UC door coupling, size 2	250	**8PQ6000-2BA87**	**8PQ2025-6BA10**
	800	3/4	Front, rear	8UC door coupling, size 2	250	**8PQ6000-4BA44**	**8PQ2025-8BA08**
VL630	600	3	Front, rear	8UC door coupling, size 2	300	**8PQ6000-3BA01**	**8PQ2030-6BA15**
		4	Front, rear	8UC door coupling, size 2	350	**8PQ6000-3BA10**	**8PQ2035-6BA15**
	800	3/4	Front, rear	8UC door coupling, size 2	350	**8PQ6000-4BA45**	**8PQ2035-8BA12**
							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Crossbar**	**Modular door**
VL800	800	3/4	Front, rear	8UC door coupling, size 2	400	**8PQ6000-4BA46**	**8PQ2035-8BA13**
VL1250	800	3/4	Front, rear	8UC door coupling, size 3	450	**8PQ6000-4BA47**	**8PQ2045-8BA06**
VL1600	800	3/4	Front, rear	8UC door coupling, size 3	450	**8PQ6000-4BA48**	**8PQ2045-8BA06**
Fixed-mounted version with RCD							
							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Modular door**
VL160X	600	3	Front, rear	Direct	150	**8PQ6000-6BA28**	**8PQ2015-6BA24**
		4	Front, rear		200	**8PQ6000-6BA35**	**8PQ2020-6BA31**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA41**	**8PQ2020-8BA16**
VL160/250	600	3	Front, rear	Direct	150	**8PQ6000-6BA31**	**8PQ2015-6BA25**
		4	Front, rear		200	**8PQ6000-6BA37**	**8PQ2020-6BA32**
		3	Front, rear	8UC door coupling, size 1	150	**8PQ6000-5BA00**	**8PQ2015-6BA16**
		4	Front, rear		200	**8PQ6000-5BA02**	**8PQ2020-6BA16**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA42**	**8PQ2020-8BA15**
		3/4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-4BA42**	**8PQ2020-8BA12**
VL400	800	4	Front, rear	Direct	250	**8PQ6000-6BA46**	**8PQ2025-8BA11**
		4	Front, rear	8UC door coupling, size 2	250	**8PQ6000-4BA44**	**8PQ2025-8BA08**

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3VL molded case circuit breakers

Version						Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Plug-in version with direct operating mechanism							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Modular door**
VL160X	600	3	Front, rear	Direct	150	**8PQ6000-6BA32**	**8PQ2015-6BA23**
		4	Front, rear	Direct	200	**8PQ6000-6BA38**	**8PQ2020-6BA30**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA43**	**8PQ2020-8BA15**
VL160/250	600	3	Front, rear	Direct	150	**8PQ6000-6BA32**	**8PQ2015-6BA24**
		4	Front, rear	Direct	200	**8PQ6000-6BA38**	**8PQ2020-6BA30**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA43**	**8PQ2020-8BA15**
VL400	600	3	Front, rear	Direct	200	**8PQ6000-6BA44**	**8PQ2020-6BA33**
		4	Front, rear	Direct	250	**8PQ6000-6BA45**	**8PQ2025-6BA20**
	800	3/4	Front, rear	Direct	250	**8PQ6000-6BA46**	**8PQ2025-8BA11**
VL630	600	3	Front, rear	Direct	300	**8PQ6000-6BA47**	**8PQ2030-6BA24**
		4	Front, rear	Direct	350	**8PQ6000-6BA48**	**8PQ2035-6BA23**
	800	3/4	Front, rear	Direct	350	**8PQ6000-6BA50**	**8PQ2035-8BA14**
Plug-in version with door-coupling rotary operating mechanism							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Modular door**
VL160X	600	3	Front, rear	8UC door coupling, size 1	150	**8PQ6000-3BA24**	**8PQ2015-6BA14**
		4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-3BA27**	**8PQ2020-6BA16**
	800	3/4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-4BA43**	**8PQ2020-8BA12**
VL160/250	600	3	Front, rear	8UC door coupling, size 1	150	**8PQ6000-3BA24**	**8PQ2015-6BA14**
		4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-3BA27**	**8PQ2020-6BA16**
	800	3/4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-4BA43**	**8PQ2020-8BA12**
VL400	600	3	Front, rear	8UC door coupling, size 2	200	**8PQ6000-2BA84**	**8PQ2020-6BA20**
		4	Front, rear	8UC door coupling, size 2	250	**8PQ6000-2BA87**	**8PQ2025-6BA10**
	800	3/4	Front, rear	8UC door coupling, size 2	250	**8PQ6000-4BA44**	**8PQ2025-8BA08**
VL630	600	3	Front, rear	8UC door coupling, size 2	300	**8PQ6000-3BA01**	**8PQ2030-6BA15**
		4	Front, rear	8UC door coupling, size 2	350	**8PQ6000-3BA10**	**8PQ2035-6BA15**
	800	3/4	Front, rear	8UC door coupling, size 2	350	**8PQ6000-4BA45**	**8PQ2035-8BA12**
Plug-in version with RCD							
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Modular door**
VL160X	600	3	Front, rear	Direct	150	**8PQ6000-6BA33**	**8PQ2015-6BA24**
		4	Front, rear		200	**8PQ6000-6BA40**	**8PQ2020-6BA31**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA43**	**8PQ2020-8BA16**
VL160/250	600	3	Front, rear	Direct	150	**8PQ6000-6BA33**	**8PQ2015-6BA25**
		4	Front, rear		200	**8PQ6000-6BA40**	**8PQ2020-6BA32**
		3	Front, rear	8UC door coupling, size 1	150	**8PQ6000-2BA75**	**8PQ2015-6BA16**
		4	Front, rear		200	**8PQ6000-2BA81**	**8PQ2020-6BA17**
	800	3/4	Front, rear	Direct	200	**8PQ6000-6BA43**	**8PQ2020-8BA15**
		3/4	Front, rear	8UC door coupling, size 1	200	**8PQ6000-4BA43**	**8PQ2020-8BA12**
VL400	800	4	Front, rear	Direct	250	**8PQ6000-6BA46**	**8PQ2025-8BA11**
		4	Front, rear	8UC door coupling, size 2	250	**8PQ6000-4BA44**	**8PQ2025-8BA08**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Modular door – vertical

Selection and ordering data

Configuration

- Extended terminal covers required for front connection.

Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Fixed-mounted version with direct operating mechanism								
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Modular door**
VL630	600	3/4	Front, rear	Direct	600	1	**8PQ6000-6BA51**	**8PQ2060-6BA24**
VL800	600	3/4	Front, rear	Direct	800	1	**8PQ6000-3BA12**	**8PQ2080-6BA11**
VL1250	600	3/4	Front, rear	Direct	800	1	**8PQ6000-3BA11**	**8PQ2080-6BA11**
VL1600	600	3/4	Front, rear	Direct	900	1	**8PQ6000-3BA07**	**8PQ2090-6BA04**
Fixed-mounted version with door-coupling rotary operating mechanism								
Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Modular door**
VL630	400	3/4	Front, rear	8UC door coupling, size 2	550	1	**8PQ6000-4BA60**	**8PQ2055-4BA13**
	600	3/4	Rear	8UC door coupling, size 2	400	1	**8PQ6000-3BA05**	**8PQ2040-6BA16**
		3/4	Front	8UC door coupling, size 2	600	1	**8PQ6000-3BA05**	**8PQ2060-6BA17**
VL800	400	3/4	Front, rear	8UC door coupling, size 2	550	1	**8PQ6000-4BA87**	**8PQ2055-4BA13**
	600	3/4	Rear	8UC door coupling, size 2	600	1	**8PQ6000-3BA07**	**8PQ2060-6BA10**
		3/4	Front	8UC door coupling, size 2	800	1	**8PQ6000-3BA07**	**8PQ2080-6BA05**
VL1250	400	3/4	Front, rear	8UC door coupling, size 3	550	1	**8PQ6000-4BA61**	**8PQ2055-4BA14**
	600	3/4	Rear	8UC door coupling, size 3	600	1	**8PQ6000-3BA11**	**8PQ2060-6BA11**
		3/4	Front	8UC door coupling, size 3	800	1	**8PQ6000-3BA11**	**8PQ2080-6BA06**
VL1600	400	3/4	Front, rear	8UC door coupling, size 3	550	1	**8PQ6000-4BA61**	**8PQ2055-4BA14**
	600	3/4	Rear	8UC door coupling, size 3	700	1	**8PQ6000-3BA12**	**8PQ2070-6BA02**
		3/4	Front	8UC door coupling, size 3	900	1	**8PQ6000-3BA12**	**8PQ2090-6BA01**
Touch protection cover cable connection								
Circuit breaker		Compartment width mm	No. of poles	Height mm			**Cover**	
VL630, VL800, VL1250, VL1600		400	3/4	400			**8PQ5000-3BA15**	

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3VL molded case circuit breakers

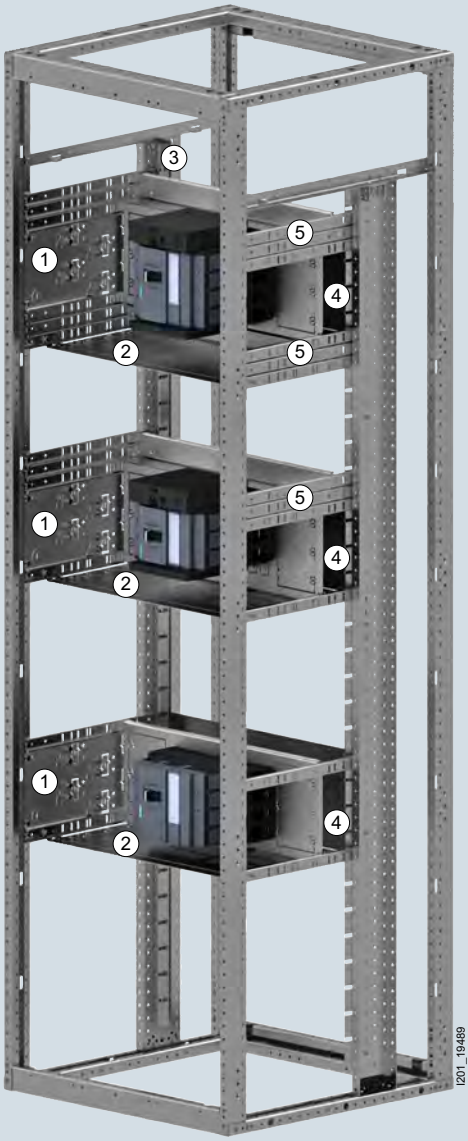
Form of internal separation – front connection

Features

- For implementation of forms 3b and 4b
- Suitable for connection with flexible busbars

Configuration

Increase in module height ⑤ required in the case of feeders with guide frame



① Cable connection
② Separation, horizontal
③ Plug-in rail
④ Separation, rear
⑤ Increase in module height

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

① **Cable connection for flexible busbars**



Circuit breaker	Compartment height in mm	No. of poles	Installation system	Operating mechanism	Article No. www.siemens.com/product?Article No.
VL250	150	3	Fixed	Direct, front	**8PQ6000-7BA55**
			Plug-in	Direct, door coupling, motorized	**8PQ6000-7BA56**
	200	4	Fixed	Direct, front	**8PQ6000-7BA57**
			Plug-in	Direct, door coupling, motorized	**8PQ6000-7BA58**
VL400	200	3	Fixed	Direct, front	**8PQ6000-7BA51**
			Plug-in	Direct, door coupling	**8PQ6000-7BA52**
	250	4	Fixed	Direct, front, motorized	**8PQ6000-7BA53**
			Plug-in	Direct, door coupling	**8PQ6000-7BA54**
VL630	300	3	Fixed	Direct, front, motorized	**8PQ6000-7BA36**
			Plug-in	Direct, door coupling	**8PQ6000-7BA37**
	350	4	Fixed	Direct, front, motorized	**8PQ6000-7BA38**
			Plug-in	Direct, door coupling	**8PQ6000-7BA50**

Cable connection for copper connection



Circuit breaker	Compartment height in mm	No. of poles	Installation system	Operating mechanism	Article No. www.siemens.com/product?Article No.
VL800	400	4	Fixed	Direct	**8PQ6000-7BA30**
			Fixed	Direct, door coupling	**8PQ6000-7BA31**
	500	4	Draw-out	Direct	**8PQ6000-7BA34**
VL1250, VL1600	450	4	Fixed	Direct	**8PQ6000-7BA32**
			Fixed	Door coupling	**8PQ6000-7BA33**
	500	4	Draw-out	Direct	**8PQ6000-7BA35**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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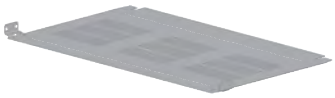
3VL molded case circuit breakers

Features

- Required for form of internal separation 3b and 4b

Configuration

- Increase in module height ⑤ required in the case of feeders with guide frame



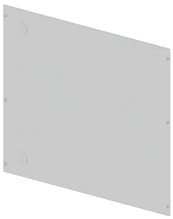
② Horizontal separation

Compartment width mm	Article No. www.siemens.com/product?Article No.	PS
400	**8PQ5000-3BA44**	1 unit
600	**8PQ5000-2BA61**	1 unit
800	**8PQ5000-2BA62**	1 unit



③ Plug-in rails

Equipment height mm	Busbar system	Article No. www.siemens.com/product?Article No.	PS
1600	Top	**8PQ3000-0BA82**	1 unit
1800	Rear or without	**8PQ3000-0BA83**	1 unit



④ Rear separation
Not applicable for frame depth 400

Compartment width mm	Mounting height mm	Article No. www.siemens.com/product?Article No.	PS
600	50	**8PQ5000-2BA51**	1 unit
	100	**8PQ5000-2BA52**	1 unit
	150	**8PQ5000-4BA40**	1 unit
	200	**8PQ5000-4BA41**	1 unit
	250	**8PQ5000-4BA42**	1 unit
	300	**8PQ5000-4BA43**	1 unit
	350	**8PQ5000-4BA44**	1 unit
	400	**8PQ5000-4BA45**	1 unit
	450	**8PQ5000-4BA46**	1 unit
	550	**8PQ5000-4BA47**	1 unit
800	50	**8PQ5000-2BA67**	1 unit
	100	**8PQ5000-2BA68**	1 unit
	200	**8PQ5000-4BA48**	1 unit
	250	**8PQ5000-4BA50**	1 unit
	350	**8PQ5000-4BA51**	1 unit
	400	**8PQ5000-4BA52**	1 unit
	450	**8PQ5000-4BA53**	1 unit



⑤ Increase in module height

Circuit breaker	No. of poles	Width mm	Height mm	Article No. www.siemens.com/product?Article No.	PS
VL160, VL250	3	600	50	**8PQ5000-4BA64**	1 unit
VL160, VL250	4	600	50	**8PQ5000-4BA64**	1 unit
VL400	3	600	50	**8PQ5000-4BA64**	1 unit
VL400	4	600	50	**8PQ5000-4BA64**	1 unit
VL160, VL250	3 / 4	800	50	**8PQ5000-4BA65**	1 unit
VL400	3 / 4	800	50	**8PQ5000-4BA65**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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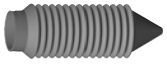
Version			Article No. www.siemens.com/product?Article No.	PS
• Separation				
Circuit breaker	No. of poles	Width mm		
VL160, VL250	3	600	**8PQ5000-4BA66**	1 unit
VL160, VL250	4	600	**8PQ5000-4BA66**	1 unit
VL400	3	600	**8PQ5000-4BA66**	1 unit
VL400	4	600	**8PQ5000-4BA66**	1 unit
VL160, VL250	3 / 4	800	**8PQ5000-4BA67**	1 unit
VL400	3 / 4	800	**8PQ5000-4BA67**	1 unit

Form 4b



Protective bellows
• For covering the cable connecting terminal
• 1 pack = 4 units

8PQ9400-0BA71 1 unit

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Overview

Form of internal separation – rear connection

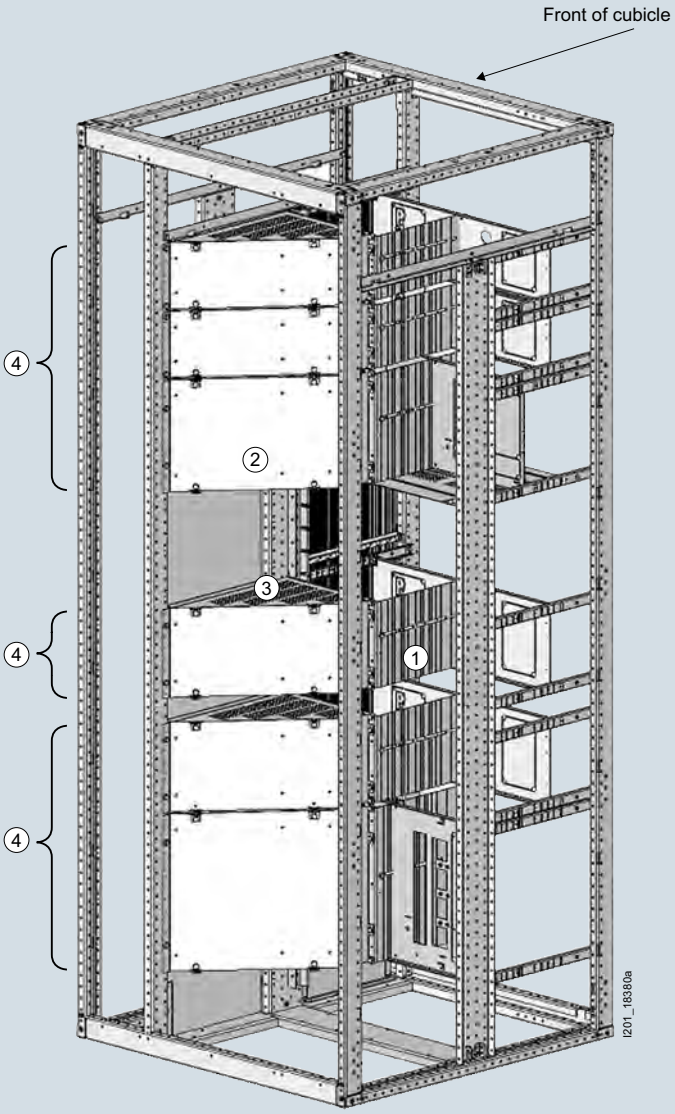
Features

- Modular system for rear device connection
- Connection is made by means of flexible insulated busbars

Configuration

- One basic module ① and vertical separation ② required for each separation kit
- Horizontal separation ③ forms top and bottom termination and is required once for each sub-segment.

Selection and ordering data



① Basic module
② Vertical separation
③ Horizontal separation
④ Sub-segments

Minimum order quantity (PS) or a multiple thereof can be ordered.

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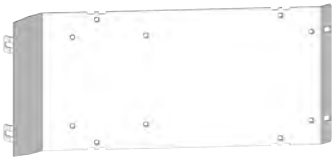
	Version		Article No. www.siemens.com/product?Article No.	PS
	① **Basic modules**			
	Compartment width mm	Module height mm		
	600	150	**8PQ5000-3BA65**	1 unit
		200	**8PQ5000-3BA66**	1 unit
		250	**8PQ5000-3BA67**	1 unit
		300	**8PQ5000-3BA68**	1 unit
		350	**8PQ5000-3BA70**	1 unit
		400	**8PQ5000-4BA03**	1 unit
	800	200	**8PQ5000-3BA77**	1 unit
		250	**8PQ5000-3BA78**	1 unit
		350	**8PQ5000-3BA80**	1 unit
		400	**8PQ5000-4BA04**	1 unit
		450	**8PQ5000-4BA05**	1 unit
	② **Vertical separation**			
	Compartment width mm	Module height mm		
	600	150	**8PQ5000-3BA52**	1 unit
		200	**8PQ5000-3BA53**	1 unit
		250	**8PQ5000-3BA54**	1 unit
		300	**8PQ5000-3BA55**	1 unit
		350	**8PQ5000-3BA56**	1 unit
		400	**8PQ5000-4BA06**	1 unit
	800	150	**8PQ5000-3BA57**	1 unit
		200	**8PQ5000-3BA58**	1 unit
		250	**8PQ5000-3BA60**	1 unit
		350	**8PQ5000-3BA61**	1 unit
		400	**8PQ5000-4BA07**	1 unit
		450	**8PQ5000-4BA08**	1 unit
	③ **Horizontal separation** • Forms the top and bottom terminations • Required 1 × for each sub-segment • 1 set = 2 units			
	Compartment width mm			
	600		**8PQ5000-3BA63**	1 unit
	800		**8PQ5000-3BA64**	1 unit

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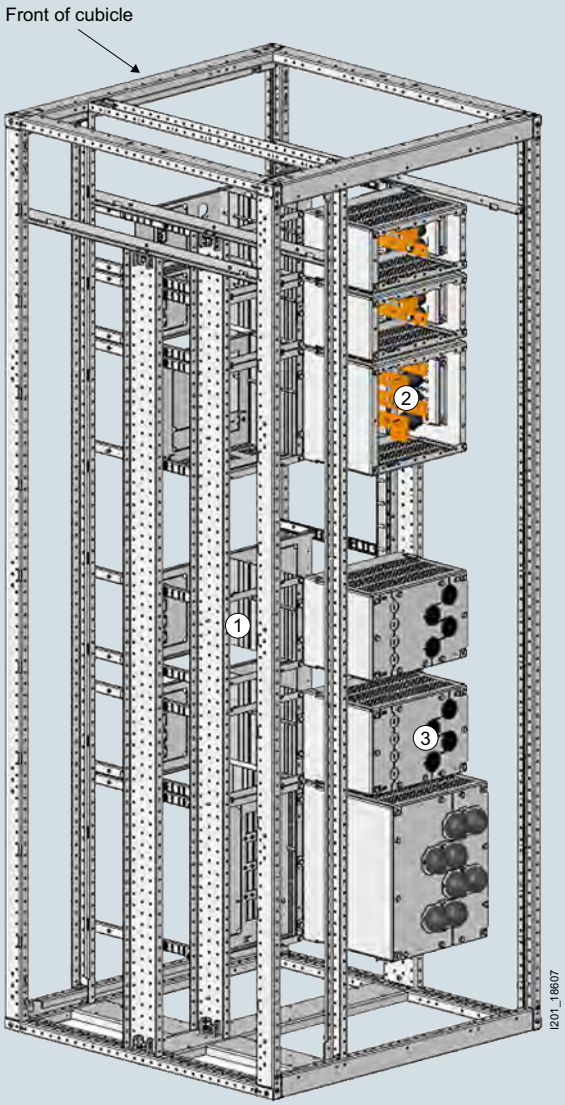
Configuration

For larger cable cross-sections an additional cable connection panel is required at the rear.



1 Basic module, rear connection
2 Cable connection compartment
3 Cover plate for cable connection compartment

Minimum order quantity (PS) or a multiple thereof can be ordered.

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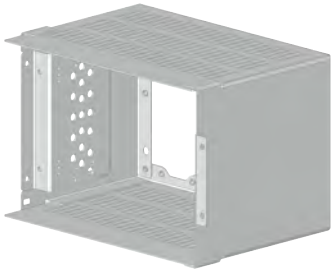
① Basic modules

Compartment width mm	Module height mm	Article No. www.siemens.com/product?Article No.	PS
600	150	**8PQ5000-3BA65**	1 unit
	200	**8PQ5000-3BA66**	1 unit
	250	**8PQ5000-3BA67**	1 unit
	300	**8PQ5000-3BA68**	1 unit
	350	**8PQ5000-3BA70**	1 unit
	400	**8PQ5000-4BA03**	1 unit
800	200	**8PQ5000-3BA77**	1 unit
	250	**8PQ5000-3BA78**	1 unit
	350	**8PQ5000-3BA80**	1 unit
	400	**8PQ5000-4BA04**	1 unit
	450	**8PQ5000-4BA05**	1 unit

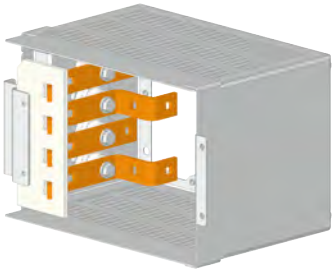


② Cable connection compartments

- Cables are connected via 8WH terminal blocks, see Catalog LV 52
- Kit prepared for mounting of DIN rails
- Not included in scope of supply

Versions	No. of poles	Module height mm	Article No. www.siemens.com/product?Article No.	PS
VL160X, VL160	3	150	**8PQ6000-5BA13**	1 unit
VL160X, VL160	4	200/250[1)]	**8PQ6000-5BA14**	1 unit

[1)] Compartment height, draw-out version



Cable connecting bars made of copper

Versions	No. of poles	Module height mm	Article No. www.siemens.com/product?Article No.	PS
VL250	3	150	**8PQ6000-5BA15**	1 unit
	4	200/250[1)]	**8PQ6000-5BA17**	1 unit
VL400	3	200	**8PQ6000-5BA18**	1 unit
	4	250/300[1)]	**8PQ6000-5BA20**	1 unit
VL630	3	300	**8PQ6000-5BA21**	1 unit
	4	350	**8PQ6000-5BA22**	1 unit

[1)] Compartment height, draw-out version

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③ Cover plates

Versions	No. of poles	Module height mm	Article No. www.siemens.com/product?Article No.	PS
VL160X, VL160, VL250	3	150	**8PQ5000-3BA71**	1 unit
VL160X, VL160, VL250	4	200	**8PQ5000-3BA72**	1 unit
VL400	3	200	**8PQ5000-3BA73**	1 unit
	4	250	**8PQ5000-3BA74**	1 unit
VL630	3	300	**8PQ5000-3BA75**	1 unit
	4	350	**8PQ5000-3BA76**	1 unit



① Basic modules, fixed-mounted version

Compartment width mm	Module height mm	Article No. www.siemens.com/product?Article No.	PS
600	350	**8PQ5000-3BA70**	1 unit
	400	**8PQ5000-4BA03**	1 unit
800	400	**8PQ5000-4BA04**	1 unit
	450	**8PQ5000-4BA05**	1 unit



② Connection modules, complete, fixed-mounted version

Compartment width mm	Circuit breaker	No. of poles	Operator type	Height mm	Article No. www.siemens.com/product?Article No.	PS
600	VL800	3	Direct	350	**8PQ6000-5BA87**	1 unit
			Motorized/door coupling	350	**8PQ6000-5BA88**	1 unit
			Rotary	350	**8PQ6000-6BA00**	1 unit
		4	Direct	400	**8PQ6000-6BA25**	1 unit
			Motorized/door coupling	400	**8PQ6000-6BA26**	1 unit
			Rotary	400	**8PQ6000-6BA24**	1 unit
800	VL800	3/4	Direct	400	**8PQ6000-6BA25**	1 unit
			Motorized/door coupling	400	**8PQ6000-6BA26**	1 unit
			Rotary	400	**8PQ6000-6BA24**	1 unit
	VL1250	3/4	Direct	450	**8PQ6000-6BA01**	1 unit
			Motorized/door coupling	450	**8PQ6000-6BA02**	1 unit
	VL1600	3/4	Direct	450	**8PQ6000-6BA03**	1 unit
			Motorized/door coupling	450	**8PQ6000-6BA04**	1 unit



① Basic modules, draw-out version

Compartment width mm	Module height mm	Article No. www.siemens.com/product?Article No.	PS
800	500	**8PQ5000-4BA10**	1 unit



② Connection modules, complete, draw-out version

Compartment width mm	Circuit breaker	No. of poles	Operator type	Height mm	Article No. www.siemens.com/product?Article No.	PS
800	VL800 VL1250 VL1600	3/4	Direct	500	**8PQ6000-6BA05**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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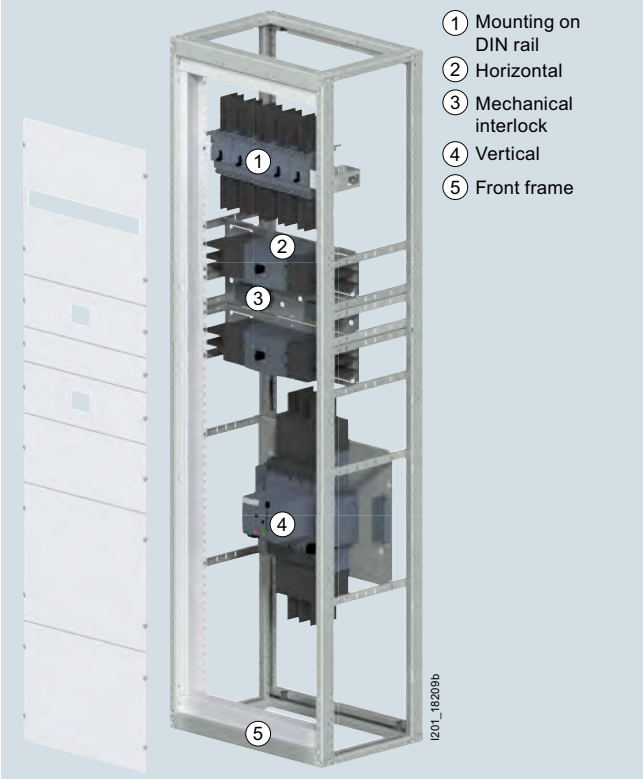
Overview

Configuration

For voltages >415 V, additional safety clearances are necessary.



Selection and ordering data

Version	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
① **Mounting on DIN rail**		

Circuit breaker	Compartment width mm	Operating mechanism	No. of poles	Connection	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
3VT1 (160 A)	600	Direct	3	Front	250	1 ... 5	**8PQ6000-3BA36**	**8PQ2025-6BA15**
			4	Front	250	1 ... 3	**8PQ6000-3BA36**	**8PQ2025-6BA15**
		Motorized	3	Front	250	1 ... 2	**8PQ6000-3BA36**	**8PQ2025-6BA15**
			4	Front	250	1 ... 2	**8PQ6000-3BA36**	**8PQ2025-6BA15**

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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3VT molded case circuit breakers

Version	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Horizontal installation		
② **Fixed-mounted and plug-in version**		

Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Cover**
3VT1 (160 A)	600[1)]	3/4	Front, rear	Direct	150	**8PQ6000-4BA21**	**8PQ2015-6BA17**
3VT2 (250 A)	600	3	Front, rear	Direct, motorized	150	**8PQ6000-4BA23**	**8PQ2015-6BA18**
3VT2 (250 A)	600	4	Front, rear	Direct, motorized	200	**8PQ6000-4BA24**	**8PQ2020-6BA22**
3VT3 (630 A)	600	3	Front, rear	Direct, motorized	200	**8PQ6000-4BA27**	**8PQ2020-6BA23**
3VT3 (630 A)	600	4	Front, rear	Direct, motorized	250	**8PQ6000-4BA26**	**8PQ2025-6BA14**

[1)] Mounting plate can be used only for fixed-mounted version.

② **Draw-out version**




Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Cover**
3VT2 (250 A)	600	3/4	Front, rear	Direct, motorized	250	**8PQ6000-4BA22**	**8PQ2025-6BA13**
3VT3 (630 A)	600	3/4	Front, rear	Direct, motorized	300	**8PQ6000-4BA25**	**8PQ2030-6BA20**

③ **Mechanical interlocks**

- Assembly kit for mechanical interlock
- Customized interlock (accessory) available for each device type




Circuit breaker	Compartment width mm	Height mm	**Mounting plate**	**Cover**
3VT2, 3VT3	600	100	**8PQ6000-4BA34**	**8PQ2010-6BA01**

Vertical installation

④ **Fixed-mounted and plug-in version**

- Front terminal bars and a breaking capacity of 35 kA require two additional covers, 150 mm each, phase separators and terminal covers
- Front terminal bars and a breaking capacity of 65 kA require two additional covers, 250 mm each, phase separators and terminal covers




Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
3VT2 (250 A)	600	3	Front, rear	Direct, motorized	350	1 ... 3	**8PQ6000-4BA28**	**8PQ2035-6BA18**
		4	Front, rear	Direct, motorized	350	1 ... 2	**8PQ6000-4BA30**	**8PQ2035-6BA20**
3VT3 (630 A)	600	3	Front, rear	Direct, motorized	400	1 ... 2	**8PQ6000-4BA31**	**8PQ2040-6BA18**
		4	Front, rear	Direct, motorized	400	1 ... 2	**8PQ6000-4BA32**	**8PQ2040-6BA20**

④ **Draw-out version**

- Front terminal bars and a breaking capacity of 35 kA require two additional covers, 150 mm each, phase separators and terminal covers
- Front terminal bars and a breaking capacity of 65 kA require two additional covers, 250 mm each, phase separators and terminal covers




Circuit breaker	Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
3VT2 (250 A)	600	3	Front, rear	Direct, motorized	350	1 ... 2	**8PQ6000-4BA28**	**8PQ2035-6BA18**
		4	Front, rear	Direct, motorized	350	1 ... 2	**8PQ6000-4BA30**	**8PQ2035-6BA20**
3VT3 (630 A)	600	3	Front, rear	Direct, motorized	400	1 ... 2	**8PQ6000-4BA31**	**8PQ2040-6BA18**
		4	Front, rear	Direct, motorized	400	1	**8PQ6000-4BA33**	**8PQ2040-6BA21**

Minimum order quantity (PS) or a multiple thereof can be ordered.

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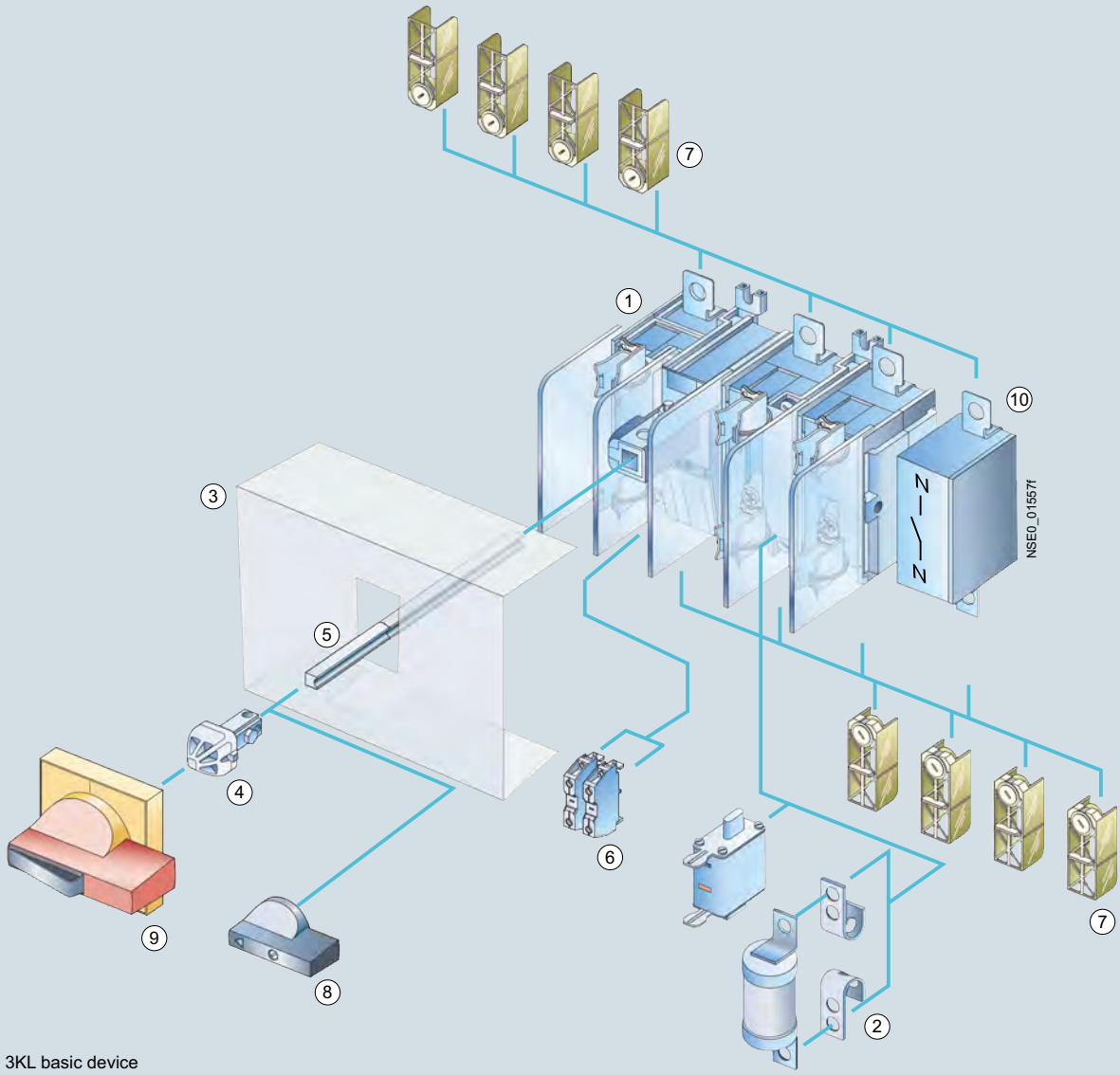
Overview



1. 3KL basic device
2. Fuses, optionally BS-88 or LV HRC fuses
3. Terminal cover, IP20 (vertical to operator side)
4. Coupling driver
5. Extension shaft
6. Standard products from the Siemens 3SB1 range are used as auxiliary switches.

All components from the switch to the actuator are provided with non-interchangeability features.

Optional

7. Single-pole terminal cover from 63 A to 630 A, IP20 (vertical to operator side)
8. 8UC9 knob for fixed mounting in standard version (black) or EMERGENCY-STOP version (red), or
9. 8UC7 door-coupling rotary operating mechanism in standard version (ti-grey) or EMERGENCY-STOP version (red/yellow)
10. 4th pole (optional)

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Technical specifications

Standards		IEC 60947-1, IEC 60947-3, VDE 0660 Part 107						
Type		**3KL50**	**3KL52**	**3KL53**	**3KL55**[1]	**3KL57**[1]	**3KL61**[1]	
3KL5, 3KL6								
Rated uninterrupted current I_u For fuse links according to DIN 43620	A Size	63 00 and 000	125 00 and 000	160 00 and 000	250 1 and 2	400 1 and 2	630 3 and 2	
Cable lug, max. conductor size (stranded)	mm^2	35	70	120	150	2 × 150 or 1 × 240	2 × 240	
Tightening torque Terminal screws	Nm	6 ... 7.5 M6	7 ... 10 M6	18 ... 22 M8	35 ... 45 M10	35 ... 45 M10	56 M12	
3KA711								
Rated uninterrupted current I_u	A	32	45	63	80	100	125	
Cable lug, max. conductor size (stranded)	mm^2	50	50	50	50	50	50	
Busbar size	mm^2	16 × 3	16 × 3	16 × 3	16 × 3	16 × 3	16 × 3	
3KA712								
Rated uninterrupted current I_u	A	160	200	250	--	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	120	120	120	--	--	--	--
Busbar size	mm^2	20 × 5	20 × 5	20 × 5	--	--	--	--
3KA713								
Rated uninterrupted current I_u	A	315	400	--	--	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	2 × 150	2 × 150	--	--	--	--	--
Busbar size	mm^2	2 × 25 × 5	2 × 25 × 5	--	--	--	--	--
3KA714								
Rated uninterrupted current I_u	A	630	--	--	--	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	2 × 185	--	--	--	--	--	--
Busbar size	mm^2	2 × 32 × 6	--	--	--	--	--	--
3KA715								
Rated uninterrupted current I_u	A	800	1000	1250	1600	2000	2500	3150
Cable lug, max. conductor size (stranded)	mm^2	2 × 240	--	--	--	--	--	--
Busbar size	mm^2	2 × 50 × 5	2 × 50 × 6	2 × 50 × 8	3 × 50 × 8	3 × 50 × 12	4 × 50 × 12	8 × 50 × 12
3KA716								
Rated uninterrupted current I_u	A	1600	2000	2500	3150	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	--	--	--	--	--	--	--
Busbar size	mm^2	2 × 80 × 10	2 × 80 × 10	3 × 80 × 10	3 × 100 × 10	--	--	--
3KL711								
Rated uninterrupted current I_u	A	32	45	63	80	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	25	25	25	25	--	--	--
Busbar size	mm^2	12 × 3	12 × 3	12 × 3	12 × 3	--	--	--
3KL712								
Rated uninterrupted current I_u	A	100	125	160	--	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	70	70	70	--	--	--	--
Busbar size	mm^2	16 × 4	16 × 4	16 × 4	--	--	--	--
3KL713								
Rated uninterrupted current I_u	A	200	250	--	--	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	120	120	--	--	--	--	--
Busbar size	mm^2	25 × 4	25 × 4	--	--	--	--	--
3KL714								
Rated uninterrupted current I_u	A	315	400	--	--	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	240	240	--	--	--	--	--
Busbar size	mm^2	32 × 5	32 × 5	--	--	--	--	--
3KL715								
Rated uninterrupted current I_u	A	630	800	--	--	--	--	--
Cable lug, max. conductor size (stranded)	mm^2	2 × 185	2 × 185	--	--	--	--	--
Busbar size	mm^2	2 × 40 × 6	2 × 40 × 6	--	--	--	--	--

[1] Technical specifications for CSA approval upon request.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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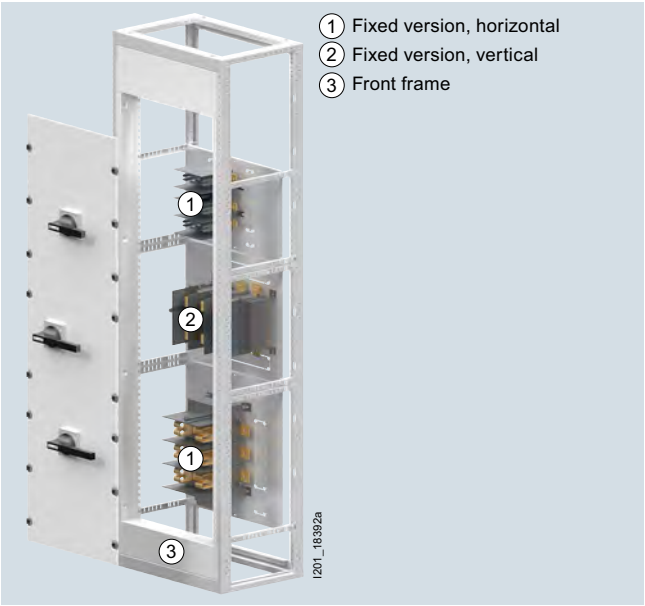
Selection and ordering data

General information

Cover prepared for direct operating mechanism

Configuration

In addition the terminal covers of the devices are required.



Version							Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
① **Fixed-mounted version, horizontal**								
								
Circuit breaker		Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Cover**
3KL50/3KL52		600	3/4	Front, rear	Door-coupling rotary operating mechanism	300	**8PQ6000-2BA65**	**8PQ2030-6BA06**
3KL55/3KL57		600	3/4	Front, rear	Door-coupling rotary operating mechanism	350	**8PQ6000-2BA71**	**8PQ2035-6BA08**
3KL61		600	3/4	Front, rear	Door-coupling rotary operating mechanism	550	**8PQ6000-2BA50**	**8PQ2055-6BA02**
3KL711/3KA711		600	3/4	Front, rear	Door-coupling rotary operating mechanism	200	**8PQ6000-2BA52**	**8PQ2020-6BA10**
3KL712/3KA712		600	3/4	Front, rear	Door-coupling rotary operating mechanism	250	**8PQ6000-2BA55**	**8PQ2025-6BA03**
3KL713/3KA713		600	3/4	Front, rear	Door-coupling rotary operating mechanism	300	**8PQ6000-2BA58**	**8PQ2030-6BA04**
3KL714/3KA714		600	3/4	Front, rear	Door-coupling rotary operating mechanism	350	**8PQ6000-2BA62**	**8PQ2035-6BA06**
3KL715/3KA715	a	600	3/4	Front, rear	Door-coupling rotary operating mechanism	450	**8PQ6000-2BA67**	**8PQ2045-6BA02**
② **Fixed-mounted version, vertical**								
								
Circuit breaker		Compartment width mm	No. of poles	Connection	Operating mechanism	Height mm	**Mounting plate**	**Cover**
3KL50/3KL52		600	3/4	Front, rear	Door-coupling rotary operating mechanism	250	**8PQ6000-2BA66**	**8PQ2025-6BA05**
3KL55/3KL57		600	3/4	Front, rear	Door-coupling rotary operating mechanism	350	**8PQ6000-2BA72**	**8PQ2035-6BA10**
3KL61		600	3	Front, rear	Door-coupling rotary operating mechanism	450	**8PQ6000-2BA51**	**8PQ2045-6BA01**
3KL711/3KA711		600	3/4	Front, rear	Door-coupling rotary operating mechanism	200	**8PQ6000-2BA53**	**8PQ2020-6BA11**
		800	3/4	Front, rear	Door-coupling rotary operating mechanism	200	**8PQ6000-2BA54**	**8PQ2020-8BA04**
3KL712/3KA712		600	3/4	Front, rear	Door-coupling rotary operating mechanism	250	**8PQ6000-2BA56**	**8PQ2025-6BA04**
		800	3/4	Front, rear	Door-coupling rotary operating mechanism	250	**8PQ6000-2BA57**	**8PQ2025-8BA02**
3KL713/3KA713		600	3/4	Front, rear	Door-coupling rotary operating mechanism	300	**8PQ6000-2BA60**	**8PQ2030-6BA05**
		800	3/4	Front, rear	Door-coupling rotary operating mechanism	300	**8PQ6000-2BA61**	**8PQ2030-8BA02**
3KL714/3KA714		600	3/4	Front, rear	Door-coupling rotary operating mechanism	350	**8PQ6000-2BA63**	**8PQ2035-6BA07**
		800	3/4	Front, rear	Door-coupling rotary operating mechanism	350	**8PQ6000-2BA64**	**8PQ2035-8BA04**
3KL715/3KA715	b	600	3/4	Front, rear	Door-coupling rotary operating mechanism	450	**8PQ6000-2BA68**	**8PQ2045-6BA03**
		800	3/4	Front, rear	Door-coupling rotary operating mechanism	450	**8PQ6000-2BA70**	**8PQ2045-8BA01**

a Due to the size of its handle, the 1250 A/50 kA 3KA715 disconnector requires an additional 200 mm cover.

b Due to the size of its handle, the 3KA715 disconnector can be installed only in versions up to 1250A/35 kA.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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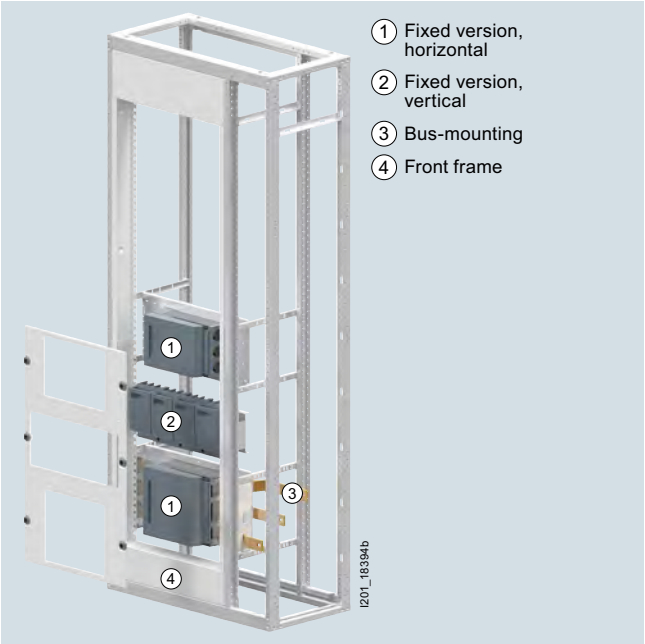
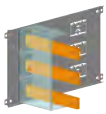
Selection and ordering data

Configuration

You can find fuse links in chapter "Fuse Systems".



Version					Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
① **Fixed-mounted version, horizontal**						
Circuit breaker	Compartment width mm	No. of poles	Height mm		**Mounting plate**	**Cover**
3NP1143	600	3	250		**8PQ6000-3BA75**	**8PQ2025-6BA16**
3NP1153	600	3	250		**8PQ6000-3BA75**	**8PQ2025-6BA17**
3NP1163	600	3	300		**8PQ6000-3BA77**	**8PQ2030-6BA22**
Bus mounting						
Circuit breaker	Compartment width mm	No. of poles	Height mm		**Vertical distribution busbar, cascaded**	**Cable connection form 3**
3NP1143	600	3	250		**8PQ6000-5BA68**	**8PQ6000-5BA72**
3NP1153	600	3	250		**8PQ6000-5BA70**	**8PQ6000-5BA73**
3NP1163	600	3	300		**8PQ6000-5BA71**	**8PQ6000-5BA74**
② **Fixed-mounted version, vertical**						
Circuit breaker	Compartment width mm	No. of poles	Height mm	No. of circuit breakers	**Mounting plate**	**Cover**
3NP1123	600	3	250	1 ... 4	**8PQ6000-3BA78**	**8PQ2025-6BA18**
	800	3	250	1 ... 6	**8PQ6000-3BA82**	**8PQ2025-8BA10**
3NP1133	600	3	300	1 ... 4	**8PQ6000-3BA78**	**8PQ2030-6BA23**
	800	3	300	1 ... 5	**8PQ6000-3BA82**	**8PQ2030-8BA11**

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Standards		**IEC 60947-1, IEC 60947-3, VDE 0660 Part 107**			
Type		**3NJ410**	**3NJ412**	**3NJ413**	**3NJ414**
Conventional thermal current					
Free-air with gG fuses, I_{th}	A	160	250	400	630
For fuse links and isolating blades	Size	00	1	2	3
gG according to IEC 60269, I_n	A	160	250	400	630
Rated operational voltage U_e At 40 Hz ... 60 Hz AC	V	690	690	690	690
Rated insulation voltage U_i	V	800	1000	1000	1000
Rated impulse withstand voltage U_{imp}	kV	8	12	12	12
Rated conditional short-circuit current with fuses, at 500 V AC					
With gG fuse (rms value)	kA	80/120	120	120	120
Max. permissible power loss per fuse link	W	12	32	45	48
Rated short-time withstand current I_{cw} rms value	kA	--	14.5	14.5	14.5
Capacitive switching capacity	kvar	--	105 ... 115	155 ... 185	250 ...300
Permissible ambient temperature	°C	-25 ... +55, >35 °C with derating factors			
Mechanical endurance, operating cycles		1400	1400	800	800
Electrical endurance, operating cycles		200	200	200	200
Degree of protection					
With closed fuse carrier, with terminal cover and peripheral cover		IP30	IP30	IP30	IP30
With open fuse carrier		IP10	IP10	IP10	IP10
Power loss of the main conducting paths at I_{th}	W	18	23	54	115
Main conductor connections					
Terminal screws		M8	M10	M12	M12
Flat bars	mm	20	30	30	30
Cable lug, max. conductor size (stranded)	mm^2	95	240	240	240
Tightening torque	Nm	12 ... 15	30 ... 35	35 ... 40	35 ... 40
Clamp/V terminals	mm^2	1.5 ... 70	25 ... 300	25 ... 300	25 ... 300
Fixing screws		M8	M12	M12	M12
Required tightening torque for mounting on busbars	Nm	16 ... 18	35 ... 40	35 ... 40	35 ... 40

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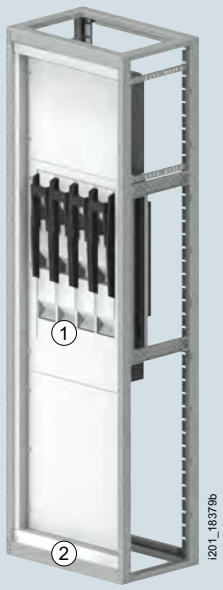
Selection and ordering data

General information

- 3NJ4 in-line switch disconnectors in fixed-mounted version
- Copper drawing for connection to cascaded vertical busbar available on request
- You can find fuse links in chapter "Fuse Systems".

Configuration

- Space for cable routing shall be provided above and below the assembly kits
- When operation is by means of modular doors, the degree of protection of the system is reduced to IP30
- In the case of NH00, adaptation to 185 mm busbar spacing (3NJ4918-0DA02) is necessary



1 Fixed version, vertical
2 Front frame

Version	Article No. www.siemens.com/product?Article No.	Quantity	Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
① **Fixed-mounted version with cover** • For installation behind section door • In combination with the swivel front frame, the maximum possible number of components is reduced by -1				

Circuit breaker	Compartment width mm	No. of poles	Installation system	Height mm	Circuit breakers per kit	**Mounting plate**		**Busbar holder**	**Cover**
3NJ4, BG 1, 2, 3	600	3	Fixed	800	1 ... 4	**8PQ6000-2BA48**	2 ×	**3NJ5974-0AB**	**8PQ2000-6BA06**
3NJ4, BG 1, 2, 3	800	3	Fixed	800	1 ... 6	**8PQ6000-2BA48**	2 ×	**3NJ5974-0AB**	**8PQ2000-8BA06**

Fixed-mounted version with modular door
• Operation through the door
• Degree of protection: IP 30





Circuit breaker	Compartment width mm	No. of poles	Installation system	Height mm	Circuit breakers per kit	**Mounting plate**		**Busbar holder**	**Modular door**
3NJ4, BG 1, 2, 3	600	3	Fixed	800	1 ... 4	**8PQ6000-2BA48**	2 ×	**3NJ5974-0AB**	**8PQ2080-6BA10**
3NJ4, BG 1, 2, 3	800	3	Fixed	800	1 ... 6	**8PQ6000-2BA48**	2 ×	**3NJ5974-0AB**	**8PQ2080-8BA05**

Blanking covers

Panel cutout	Width mm	**Blanking cover**			
3NJ4, BG 00	50	**3NJ4912-2AA00**			
3NJ4, BG 1, 2, 3	100	**3NJ4912-2BA00**			

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	Article No. www.siemens.com/product?Article No.	PS
Separation			
	**Form 3b** • For cable connection at the bottom **horizontal partition + support rail** required		
	Width mm		
	600	**8PQ5000-1BA70**	1 unit
	800	**8PQ5000-1BA71**	1 unit
	**Horizontal separation**		
	Compartment width mm		
	400	**8PQ5000-3BA44**	1 unit
	600	**8PQ5000-2BA61**	1 unit
	800	**8PQ5000-2BA62**	1 unit
	**Support rails** • Equipment height 25 mm	**8PQ5000-2BA63**	1/2 units

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Technical specifications

Main devices of sizes 00 and 1

Size		**00**								**1**			
In-line switch disconnectors with fuses type 3NJ62...	**LV HRC**			**...02-3 ...02-4**		**...03-1 ...04-1 ...04-2**		**...03-3 ...03-4**		**...12-3 ...12-4**		**...13-1 ...14-1 ...14-2**	**...13-3 ...13-4**
	BS	**...43-3**	**...53-3**	**...62-3 ...62-4**				**...63-3 ...63-4**		**...72-3 ...72-4**		**...74-1 ...74-2**	**...73-3 ...73-4**
Switching capacity		H	H	H		S		H		H		S	H
Rated insulation voltage U_i	V	1000											
Rated impulse withstand voltage U_{imp}	V	8000											
Rated operational current I_e	A	63	100	160	-	160	125	160	125	250			
For LV HRC fuse links acc. to IEC 60269		-	-	for 00 and 000						1			
For BS fuse links acc. to BS 88		A3	A3	00T[1]						B2			
Rated operational voltage U_e													
• At 50/60 Hz rated frequency	V	690		--	--	500	690	500	690	690			
• For DC	V	--	--	230	440	--	--	--	--	230	440	-	-
Utilization category		AC23B		DC23B	DC21B	AC22B		AC23B		DC23B	DC21B	AC22B	AC23B
Rated conditional short-circuit current													
• Short-circuit strength (rms value)	kA	100		60		100		100		60		100	
• Short-circuit making capacity (rms value)	kA	66		60		55		66		60		55	66
Rated making capacity													
• p.f. = 0.65	A	--	--	--	--	480	375	--	--	--	--	750	--
• p.f. = 0.45	A	630	1000	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	--	--	--	1600	1250	--	--	--	2500
Rated breaking capacity													
• p.f. = 0.65	A	--	--	--	--	480	375	--	--	--	--	750	--
• p.f. = 0.45	A	504	800	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	--	--	--	1280	1000	--	--	--	2000
Endurance													
Operating cycles total		2000		1600						1600			
• Electrical (690 V, p.f. = 0.65)		300		200						200			
Power loss (no fuse links)	W	7	17	43						78			
Permissible ambient temperature	°C	-5 ... +55											
Permissible operating position		Horizontal and vertical with bottom connection											
Connection type		Main conductor connection											
Cable lug connection													
• Conductor size (Al/Cu, solid or stranded) according to DIN 46235 (Cu) and DIN 46239 (Al)	mm^2	1x 10-95 2x 16-70								1x 25-240 2x 25-70			
• Screw size		M8								M12			
• Torque	Nm	15								30			
Clamp connection													
• Conductor size (Al/Cu), rm	mm^2	1x 10-50								1x 16-185			
• Conductor size (Al/Cu), re	mm^2	1x 10-50								1x 16-150			
• Conductor size (Al/Cu), sm	mm^2	1x 16-95								1x 35-240			
• Conductor size (Al/Cu), se	mm^2	1x 16-95								1x 35-300			
• Required torque	Nm	15								25			

[1] The fuse is available from Lawson Fuses (UK) and does not correspond to BS 88.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Main devices of sizes 2 and 3

Size		**2**				**3**					
In-line switch disconnectors with fuses type 3NJ62...	**LV HRC**	**...22-3 ...22-4**		**...23-1 ...24-1 ...24-2**	**...23-3 ...23-4**	**...32-3 ...32-4**		**...33-1 ...34-1 ...34-2**		**...33-3 ...33-4**	
	BS	**...82-3 ...82-4**			**...83-3 ...83-4**	**...92-3 ...92-4**		**...94-1 ...94-2**		**...93-3 ...93-4 ...33-3 ...33-4**	
Switching capacity		H		S	H	H		S		H	
Rated insulation voltage U_i	V	1000									
Rated impulse withstand voltage U_{imp}	V	8000									
Rated operational current I_e											
• For fuse links according to IEC 60269/ BS88	A	400				630			500	630	500
For fuse links acc. to IEC 60269		2 and 1				3 and 2					
For BS fuse links acc. to BS 88		B4				3T[1)]					
Rated operational voltage U_e											
• At 50/60 Hz rated frequency	V	--	--	690		230	440	500	690	500	690
• For DC	V	230	440	--		--	--	--	--	--	--
Utilization category		DC23B	DC21B	AC22B	AC23B	DC23B	DC21B	AC22B		AC23B	
Rated conditional short-circuit current											
• Short-circuit strength (rms value)	kA	60		100		60		100			
• Short-circuit making capacity (rms value)	kA	60		55	66	60		55		66	
Rated making capacity											
• p.f. = 0.65	A	--	--	1200	--	--	--	1890	1500	--	--
• p.f. = 0.45	A	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	4000	--	--	--	--	6300	5000
Rated breaking capacity											
• p.f. = 0.65	A	--	--	1200	--	--	--	1890	1500	--	--
• p.f. = 0.45	A	--	--	--	--	--	--	--	--	--	--
• p.f. = 0.35	A	--	--	--	3200	--	--	--	--	5040	4000
Endurance											
Operating cycles total		1000				1000					
• Electrical (690 V, p.f. = 0.65)		200				200					
Power loss (no fuse links)	W	158				357					
Permissible ambient temperature	°C	-5 ... +55									
Permissible operating position		Horizontal and vertical with bottom connection									
Degree of protection (in operating condition)		IP41									
Connection type		Main conductor connection									
Cable lug connection											
Conductor size	mm^2	1x 25-300				1x 25-300					
• Al/Cu, solid or stranded, acc. to DIN 46235 (Cu) and DIN 46239 (Al)		2x 25-240				2x 25-240					
• Screw size		2x M12				2x M12					
• Torque	Nm	30				30					
Clamp connection											
• Conductor size (Al/Cu), rm	mm^2	2x 16-185				2x 16-185					
• Conductor size (Al/Cu), re	mm^2	2x 16-150				2x 16-150					
• Conductor size (Al/Cu), sm	mm^2	2x 35-240				2x 35-240					
• Conductor size (Al/Cu), se	mm^2	2x 35-300				2x 35-300					
• Required torque	Nm	25				25					

[1)] The fuse is available from Lawson Fuses (UK) and does not correspond to BS 88.

Vertical busbar rated currents

Cross-section	**Rated operational current I_n ventilated** in A						
mm	**20 °C**	**25 °C**	**30 °C**	**35 °C**	**40 °C**	**45 °C**	**50 °C**
60 x 10	1680	1640	1600	**1560**	1520	1480	1430
80 x 10	2260	2210	2155	**2100**	2045	1985	1925

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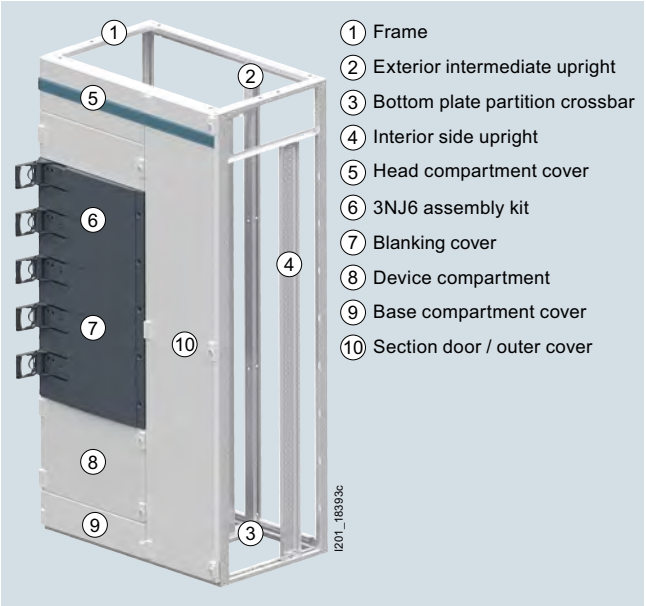
Selection and ordering data

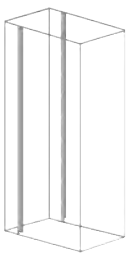
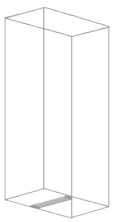
Features

- Suitable for 3 and 4-pole busbar arrangement
- Degree of protection IP40
- 3NJ6 plug-in in-line switch disconnectors

Configuration

- You can find fuse links in chapter "Fuse Systems".
- Due to the design of the devices, separation 2b already creates 3b.
- During planning, please note the equipment regulations published in the operating instructions: SIVACON S4 Manual.



Version			Article No. www.siemens.com/product?Article No.	PS
	① **Frame** Height 2000 mm			
	Width mm	Depth mm		
	1000	400	**8PQ1201-4BA02**	1 unit
		600	**8PQ1201-6BA02**	1 unit
		800	**8PQ1201-8BA03**	1 unit
	1200	400	**8PQ1202-4BA02**	1 unit
		600	**8PQ1202-6BA02**	1 unit
		800	**8PQ1202-8BA02**	1 unit
	② **Exterior intermediate uprights** For fitting • Outer covers • Section doors • Modular doors		**8PQ3000-1BA43**	1 unit
	③ **Bottom plate partition crossbars** For width 600 to 1200 mm			
	Depth in mm	Quantity		
	400	1 ×	**8PQ3000-1BA38**	1 unit
	600	1 ×	**8PQ3000-1BA40**	1 unit
	800	2 ×	**8PQ3000-1BA38**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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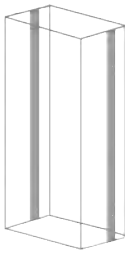
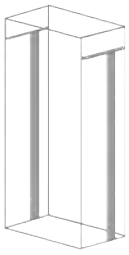
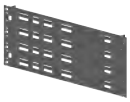
Version			Article No. www.siemens.com/product?Article No.	PS
	④ **Interior side uprights, without main busbar** • For width from 400 to 1200 mm • For depth from 600 to 800 mm			
	Depth in mm			
	600 800		**8PQ3000-0BA03**	1 unit
	④ **Interior side uprights, with main busbar at top** • For width from 800 to 1200 mm			
	Depth in mm			
	400 600 800		**8PQ3000-0BA65** **8PQ3000-0BA01** **8PQ3000-0BA02**	1 unit 1 unit 1 unit
	⑤ **Head compartment covers**			
	Height mm	Width mm		
	225	600	**8PQ2022-6BA01**	1 unit
	⑥ **Assembly kits for 3NJ6 in-line switch disconnectors with fuses** • Compatible cross-sections: 60 x 10, 80 x 10			
	Height mm	Width mm		
	1600	600	**8PQ3000-1BA48**	1 unit
	**Busbar covers** • Mounting height 200 mm • 8 units required per 3NJ6 assembly kit		**3NJ6916-4EA00**	1 unit
	⑦ **Blanking covers** • Mounting height 50 mm		**3NJ6900-4CB00**	1 unit

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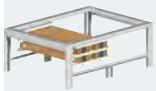
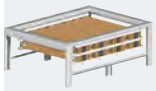
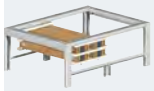
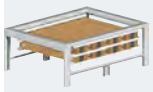
3NJ6 in-line switch disconnectors with fuses

Version			Article No. www.siemens.com/product?Article No.	PS
	⑧ **Device compartments**			
	Height mm	Width mm		
	200	600	**8PQ3000-1BA50**	1 unit
	400		**8PQ3000-1BA51**	1 unit
	⑨ **Base compartment covers, IP 4X**			
	Height mm	Width mm		
	175	600	**8PQ2000-6BA07**	1 unit
	⑩ **Section doors – doors with two-way interlocking system**			
	Hinge position	Width mm		
	Left	400	**8PQ2197-4BA08**	1 unit
		600	**8PQ2197-6BA06**	1 unit
	Right	400	**8PQ2197-4BA11**	1 unit
		600	**8PQ2197-6BA13**	1 unit
	⑩ **Section doors – doors for semi-cylindrical profile** Semi-cylindrical profile acc. to DIN 18252/18254, 8 × 45°			
	Hinge position	Width mm		
	Left	400	**8PQ2197-4BA06**	1 unit
		600	**8PQ2197-6BA04**	1 unit
	Right	400	**8PQ2197-4BA07**	1 unit
		600	**8PQ2197-6BA05**	1 unit
Separation				
	**Form 2b, equipment compartment** Separation from the main busbar			
	Position of main busbar mm	Frame depth mm	Width mm	
	Top, front 	400	600	**8PQ3000-1BA44**	1 unit
		600		**8PQ3000-1BA45**	1 unit
		800		**8PQ3000-1BA46**	1 unit
	Top, both sides 	800	600	**8PQ3000-1BA47**	1 unit
	**Form 2b, cable compartment**			
	Position of main busbar mm	Frame depth mm	Width mm	
	Top, front 	400	400	**8PQ3000-0BA67**	1 unit
		600		**8PQ3000-0BA52**	1 unit
		800		**8PQ3000-0BA55**	1 unit
		400	600	**8PQ3000-0BA68**	1 unit
		600		**8PQ3000-0BA53**	1 unit
		800		**8PQ3000-0BA56**	1 unit
	Top, both sides 	800	400	**8PQ3000-0BA58**	1 unit
			600	**8PQ3000-0BA60**	1 unit
	**Form 4b, terminal covers**			
	• Terminal covers			
	- For 2/3-pole devices			**3NJ6923-1DA00**	1 unit
	- Only for 4th pole			**3NJ6904-1DA00**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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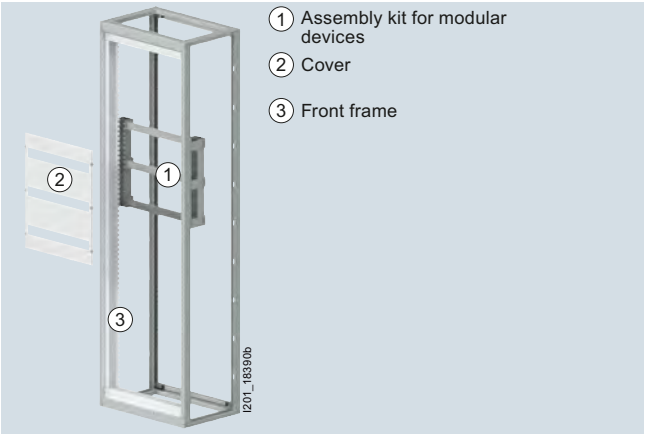
Selection and ordering data

Features

- Adjustable-depth multi-profile rail, 35 mm
- SIKclip snaps onto rear

Configuration

- One mounting plate ① for every row



① Assembly kit for modular devices
② Cover
③ Front frame

Version					Article No. www.siemens.com/product?Article No.	Article No. www.siemens.com/product?Article No.
Modular devices with cover						
Width mm	Rows × MW	Row center distance mm	Height mm	Quantity	① **Mounting plate**	② **Cover**
600	1 × 24	150	150	1 ×	**8PQ6000-3BA36**	**8PQ2015-6BA07**
600	1 × 24	200	200	1 ×	**8PQ6000-3BA36**	**8PQ2020-6BA12**
800	1 × 35	150	150	1 ×	**8PQ6000-3BA37**	**8PQ2015-8BA03**
800	1 × 35	200	200	1 ×	**8PQ6000-3BA37**	**8PQ2020-8BA05**
Width mm	Rows × MW	Row center distance mm	Height mm	Quantity	① **Mounting plate**	② **Cover**
600	2 × 24	150	300	2 ×	**8PQ6000-3BA36**	**8PQ2030-6BA07**
600	2 × 24	200	400	2 ×	**8PQ6000-3BA36**	**8PQ2040-6BA10**
800	2 × 35	150	300	2 ×	**8PQ6000-3BA37**	**8PQ2030-8BA03**
800	2 × 35	200	400	2 ×	**8PQ6000-3BA37**	**8PQ2040-8BA10**
Width mm	Rows × MW	Row center distance mm	Height mm	Quantity	① **Mounting plate**	② **Cover**
600	3 × 24	150	450	3 ×	**8PQ6000-3BA36**	**8PQ2045-6BA04**
600	3 × 24	200	600	3 ×	**8PQ6000-3BA36**	**8PQ2060-6BA04**
800	3 × 35	150	450	3 ×	**8PQ6000-3BA37**	**8PQ2045-8BA02**
800	3 × 35	200	600	3 ×	**8PQ6000-3BA37**	**8PQ2060-8BA02**
Modular devices with modular door						
Width mm	Rows × MW	Row center distance mm	Height mm	Quantity	**Mounting plate**	**Modular door**
600	1 × 24	200	200	1 ×	**8PQ6000-6BA52**	**8PQ2020-6BA28**
800	1 × 35	200	200	1 ×	**8PQ6000-6BA53**	**8PQ2020-8BA14**
Supports for raceway fastening						
Width mm					**Support**	
600					**8PQ6000-0BA16**	
800						
Blanking strips Color RAL 7035 (light gray)						
Versions						
• For 12 MW					**8GK9910-0KK00**	
• Length 1 m without pressure-relief joint, to cut to length					**8GK9910-0KK01**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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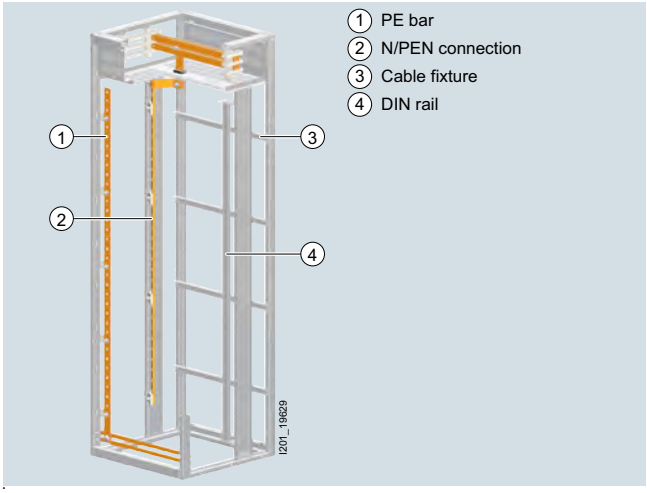
Overview

Features

- C-mounting rail ideally suited to the flexible attachment of terminal elements
- Multi-profile rails for mounting outgoing terminals.
- N/PEN rail tilted by 45° offers more convenient connections



Selection and ordering data

	Version	Article No. www.siemens.com/product?Article No.	PS
	① **PE bar** • Set consisting of 5 links	**8PQ4000-2BA23**	1 unit
	② **N/PEN connection** • 4 busbar holders • 2 connecting terminals (for 2b separation)	**8PQ4000-2BA22**	1 set
	③ **Cable fixtures** Mounting bracket • 1 pack = 10 units • Necessary when mounting on base of frame	**8PQ3000-0BA73**	1 unit
	***Mounting rail*** • C profile, 30 mm • 1 set = 5 units		
	Depth in mm		
	400, 600, 800	**8PQ3000-0BA38**	1 unit
	Width in mm		
	350	**8PQ3000-0BA38**	1 unit
	400	**8PQ3000-0BA41**	1 unit
	600	**8PQ3000-0BA42**	1 unit
	800	**8PQ3000-0BA43**	1 unit
	④ ***H profiles for output terminals*** **Mounting bracket** 1 pack = 10 units	**8PQ9400-0BA01**	1 unit
	**Multi-profile rails** • H profile = 35 mm • Length = 1600 mm • Made of aluminum	**8PQ9600-0BA01**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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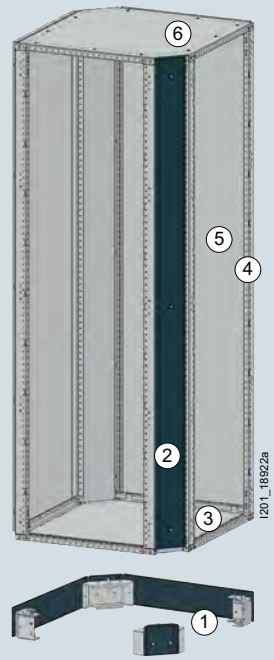
Overview

Features

- Consisting of a standard frame and special conversion kits for corner sections

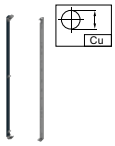
Configuration

The overall length of the unit's front increases by 100 mm in both room axes



1 Base
2 Corner section conversion kit
3 Bottom plate
4 Frame
5 Rear panel
6 Top plate

Selection and ordering data

Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
① Base corner pieces						
						
Depth in mm	**Height 100 mm**		**Height 200 mm**			
400	**8PQ1010-0BA04**	1 unit	**8PQ1024-4BA01**	1 unit		
600	**8PQ1010-0BA05**	1 unit	**8PQ1026-6BA01**	1 unit		
800	**8PQ1018-8BA01**	1 unit	**8PQ1028-8BA01**	1 unit		
② Corner section conversion kits						
Incl. copper drawing						
	Assembly kit					
	8PQ1200-0BA03	1 unit				
③ Bottom plates						
						
Depth in mm	**IP55** **Main busbar at top**		**IP20** **Main busbar at bottom**			
400	**8PQ2304-4BA12**	1 unit	**8PQ2300-4BA25**	1 unit		
600	**8PQ2306-6BA12**	1 unit	**8PQ2300-6BA27**	1 unit		
800	**8PQ2308-8BA08**	1 unit	**8PQ2300-8BA14**	1 unit		

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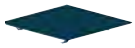
Corner sections

Version		Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
④ **Frame** Height: 2000 mm							
Depth in mm	Width in mm	**Frame**					
400	400	**8PQ1204-4BA01**	1 unit				
600	600	**8PQ1206-6BA01**	1 unit				
800	800	**8PQ1208-8BA01**	1 unit				
⑤ **Rear panels** Two units required for each corner section							
Width in mm		**IP40**		**IP55**			
400		**8PQ2420-4BA02**	1 unit	**8PQ2420-4BA01**	1 unit		
600		**8PQ2420-6BA02**	1 unit	**8PQ2420-6BA01**	1 unit		
800		**8PQ2420-8BA02**	1 unit	**8PQ2420-8BA01**	1 unit		
⑥ **Top plates**							
Depth in mm		**IP40**		**IP55**		**IPX1**	
400		**8PQ2304-4BA10**	1 unit	**8PQ2304-4BA08**	1 unit	**8PQ2304-4BA11**	1 unit
600		**8PQ2306-6BA10**	1 unit	**8PQ2306-6BA08**	1 unit	**8PQ2306-6BA11**	1 unit
800		**8PQ2308-8BA06**	1 unit	**8PQ2308-8BA05**	1 unit	**8PQ2308-8BA07**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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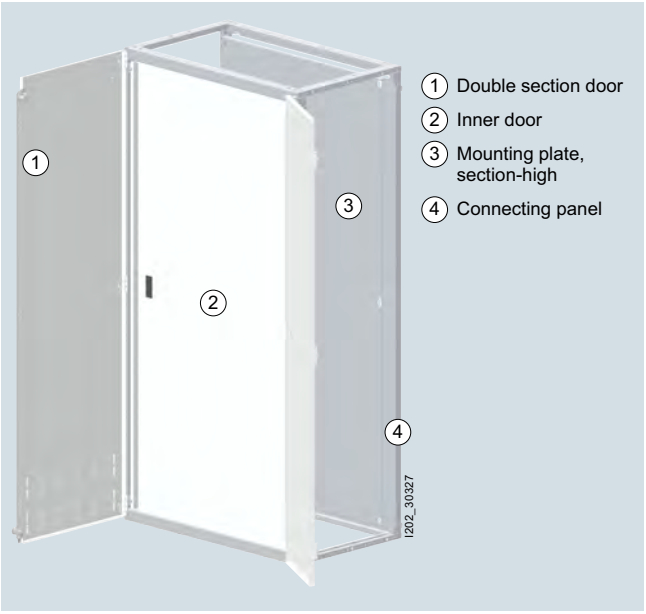
Overview

Features

- Double section door in combination with inner door and section-high mounting plates



Selection and ordering data

Version		Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
① **Double section doors – double-bit keys**					
Width mm	Division mm	**IP40**		**IP55**	
1000	600 + 400	**8PQ2197-1BA14**	1 unit	**8PQ2197-1BA13**	1 unit
1200	600 + 600	**8PQ2197-2BA11**	1 unit	**8PQ2197-2BA10**	1 unit
Double section doors – semi-cylindrical profile					
Width mm	Division mm	**IP40**		**IP55**	
1000	600 + 400	**8PQ2197-1BA16**	1 unit	**8PQ2197-1BA15**	1 unit
1200	600 + 600	**8PQ2197-2BA13**	1 unit	**8PQ2197-2BA12**	1 unit
② **Inner doors** • Suitable for installation behind section doors • Cannot be combined with front frames • Prepared for installation of inner door struts on the rear • One kit 8PQ2080-0BA07 (2 x 700 mm) each can be fitted at top and bottom					
Width mm	Height mm	**Inner door**		**Inner door strut 700 mm high**	
600	1900	**8PQ2000-6BA05**	1 unit	**8PQ2080-0BA07**	1 unit
800		**8PQ2000-8BA05**	1 unit	**8PQ2080-0BA07**	1 unit
1000		**8PQ2000-1BA01**	1 unit	**8PQ2080-0BA07**	1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Mounting plates

Version	Height mm	Width mm	Article No. www.siemens.com/product?Article No.	PS
③ **Mounting plates, section-high** • Material thickness: 2 mm				
	1600	400	**8PQ3000-0BA33**	1 unit
		600	**8PQ3000-0BA35**	1 unit
		800	**8PQ3000-0BA37**	1 unit
		1000	**8PQ3000-1BA06**	1 unit
		1200	**8PQ3000-1BA07**	1 unit
	1900	400	**8PQ3000-0BA32**	1 unit
		600	**8PQ3000-0BA34**	1 unit
		800	**8PQ3000-0BA36**	1 unit
		1000	**8PQ3000-1BA04**	1 unit
		1200	**8PQ3000-1BA05**	1 unit
④ **Connecting panels** • Connect two adjacent mounting plates				
	1600		**8PQ3000-1BA10**	1 unit
	1900		**8PQ3000-1BA08**	1 unit
Modular mounting plates • Adjustable depth • For free assembly within the outgoing feeder panel fixed-mounted version				
	150	400	**8PQ3000-2BA60**	1 unit
	200		**8PQ3000-2BA17**	1 unit
	300		**8PQ3000-2BA66**	1 unit
	400		**8PQ3000-2BA18**	1 unit
	600		**8PQ3000-2BA21**	1 unit
	800		**8PQ3000-2BA23**	1 unit
	150	600	**8PQ3000-2BA62**	1 unit
	200		**8PQ3000-1BA56**	1 unit
	300		**8PQ3000-2BA51**	1 unit
	400		**8PQ3000-1BA61**	1 unit
	550		**8PQ3000-3BA07**	1 unit
	600		**8PQ3000-1BA65**	1 unit
	800		**8PQ3000-1BA26**	1 unit
	150	800	**8PQ3000-2BA64**	1 unit
	200		**8PQ3000-1BA58**	1 unit
	300		**8PQ3000-2BA53**	1 unit
	400		**8PQ3000-1BA63**	1 unit
	550		**8PQ3000-3BA08**	1 unit
	600		**8PQ3000-1BA67**	1 unit
	800		**8PQ3000-1BA28**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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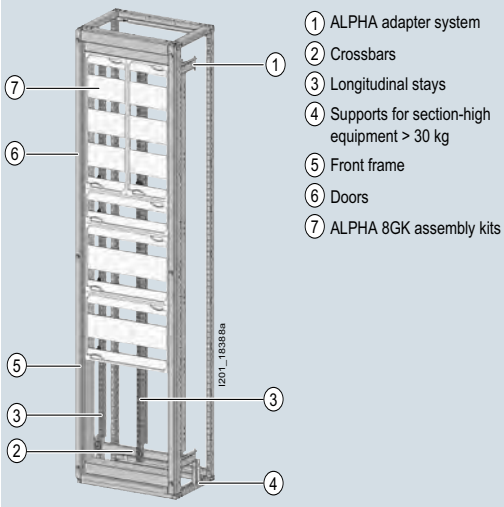
Overview

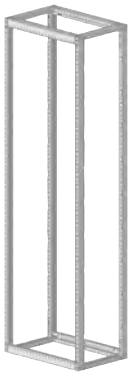
Configuration

- Equipment height 1650 mm with main busbar at top/bottom
- Equipment height 1800 mm



Configuration for sections without main busbar

Selection and ordering data

	Version			Article No. www.siemens.com/product?Article No.	PS
	**Frame** Height: 2000 mm				
	Width mm	Depth mm			
	350	400		**8PQ1200-4BA15**	1 unit
		600		**8PQ1200-6BA14**	1 unit
		800		**8PQ1200-8BA01**	1 unit
	600	400		**8PQ1206-4BA01**	1 unit
		600		**8PQ1206-6BA01**	1 unit
		800		**8PQ1206-8BA01**	1 unit
	850	400		**8PQ1200-4BA16**	1 unit
		600		**8PQ1200-6BA15**	1 unit
		800		**8PQ1200-8BA02**	1 unit
	① **Adapters** • For installing the ALPHA system • 1 set = 4 units			**8PQ3000-1BA74**	1 unit
	② **Crossbars** 1 set = 2 units				
	Height mm	Frame width mm	Width of 8GK mm		
	--	350	250	**8PQ3000-1BA76**	1 unit
	--	600	500	**8PQ3000-1BA78**	1 unit
	--	850	750	**8PQ3000-1BA80**	1 unit

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ALPHA DIN 8GK section

	Version		Article No. www.siemens.com/product?Article No.	PS
	③ **Uprights** 1 set = 2 units			
	Height mm	Frame width mm		
	1650	--	**8PQ3000-2BA88**	1 unit
	1800		**8PQ3000-1BA82**	1 unit
	④ **Supports** • 1 set = 2 units • For section-high equipment > 30 kg		**8PQ3000-1BA75**	1 unit
	⑤ **Front frames**			
	Height mm	Frame width mm		
	1650	350	**8PQ3000-2BA85**	1 unit
		600	**8PQ3000-2BA86**	1 unit
		850	**8PQ3000-2BA87**	1 unit
	1800	350	**8PQ3000-2BA45**	1 unit
		600	**8PQ3000-2BA46**	1 unit
		850	**8PQ3000-2BA47**	1 unit

⑥ For doors, see paneling sections on page 16/119.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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1 Base
2 Bottom plate
3 Rear panel
4 Side panel
5 Top plate
6 Doors / alternatively, frame paneling

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Version	Article No. www.siemens.com/product?Article No.	PS

① **Base corner pieces with front cover**



Height in mm	Width in mm	**Height 100 mm**	
100	350	**8PQ1010-0BA01**	1 unit
	600	**8PQ1016-0BA01**	1 unit
	850	**8PQ1010-0BA02**	1 unit



Height in mm	Width in mm	**Height 200 mm**	
200	350	**8PQ1020-0BA01**	1 unit
	600	**8PQ1026-0BA01**	1 unit
	850	**8PQ1020-0BA02**	1 unit



Base reinforcements for transport
Height: 100 mm

Width in mm	Depth in mm	**Height 100 mm**	
350	--	**8PQ1010-0BA06**	1 unit
600	--	**8PQ1016-0BA02**	1 unit
850	--	**8PQ1010-0BA07**	1 unit
--	400	**8PQ1014-0BA02**	1 unit
--	600	**8PQ1016-0BA02**	1 unit
--	800	**8PQ1018-0BA02**	1 unit



Base covers, lateral
Height: 100 mm

Depth in mm	**Height 100 mm**	
400	**8PQ1010-4BA01**	1 unit
600	**8PQ1010-6BA01**	1 unit
800	**8PQ1010-8BA01**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
② **Bottom plates** For 800 mm deep frames, order **two** 400 mm deep bottom plates in the corresponding width.				
				
Depth in mm / Width in mm	**IP55**		**IP40, for cable entry**	
400 / 350	**8PQ2300-4BA16**	1 unit	**8PQ2300-4BA18**	1 unit
400 / 600	**8PQ2306-4BA05**	1 unit	**8PQ2306-4BA06**	1 unit
400 / 850	**8PQ2300-4BA17**	1 unit	**8PQ2300-4BA20**	1 unit
600 / 350	**8PQ2300-6BA20**	1 unit	**8PQ2300-6BA22**	1 unit
600 / 600	**8PQ2306-6BA05**	1 unit	**8PQ2306-6BA06**	1 unit
600 / 850	**8PQ2300-6BA21**	1 unit	**8PQ2300-6BA23**	1 unit
② **Bottom plates for main busbar, bottom**				
				
Depth in mm / Width in mm	**IP20**			
400 / 350	**8PQ2300-4BA23**	1 unit	--	
400 / 600	**8PQ2306-4BA10**	1 unit	--	
400 / 850	**8PQ2300-4BA24**	1 unit	--	
600 / 350	**8PQ2300-6BA25**	1 unit	--	
600 / 600	**8PQ2306-6BA16**	1 unit	--	
600 / 850	**8PQ2300-6BA26**	1 unit	--	
800 / 350	**8PQ2300-8BA10**	1 unit	--	
800 / 600	**8PQ2306-8BA05**	1 unit	--	
800 / 850	**8PQ2300-8BA11**	1 unit	--	
③ **Rear panels**				
				
Width in mm	**IP40**		**IP55**	
350	**8PQ2420-0BA01**	1 unit	**8PQ2420-0BA03**	1 unit
600	**8PQ2420-6BA02**	1 unit	**8PQ2420-6BA01**	1 unit
850	**8PQ2420-0BA02**	1 unit	**8PQ2420-0BA04**	1 unit
④ **Side panels** 1 set = 2 units				
				
Depth in mm	**IP40, with design strip**		**IP55**	
400	**8PQ2520-4BA01**	1 unit	**8PQ2520-4BA02**	1 unit
600	**8PQ2520-6BA01**	1 unit	**8PQ2520-6BA02**	1 unit
800	**8PQ2520-8BA01**	1 unit	**8PQ2520-8BA02**	1 unit

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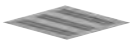
ALPHA DIN 8GK section

Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
⑤ **Top plates**								
								
Depth in mm / Width in mm	**IP40**		**IPX1 upgrade**		**IP55**		**IP40, with cable entry**	
400 / 350	**8PQ2300-4BA06**	1 unit	**8PQ2300-4BA11**	1 unit	**8PQ2300-4BA04**	1 unit	**8PQ2300-4BA14**	1 unit
600	**8PQ2306-4BA02**	1 unit	**8PQ2306-4BA04**	1 unit	**8PQ2306-4BA01**	1 unit	**8PQ2306-4BA03**	1 unit
850	**8PQ2300-4BA07**	1 unit	**8PQ2300-4BA12**	1 unit	**8PQ2300-4BA05**	1 unit	**8PQ2300-4BA15**	1 unit
600 / 350	**8PQ2300-6BA13**	1 unit	**8PQ2300-6BA15**	1 unit	**8PQ2300-6BA11**	1 unit	**8PQ2300-6BA17**	1 unit
600	**8PQ2306-6BA02**	1 unit	**8PQ2306-6BA04**	1 unit	**8PQ2306-6BA01**	1 unit	**8PQ2306-6BA03**	1 unit
850	**8PQ2300-6BA14**	1 unit	**8PQ2300-6BA16**	1 unit	**8PQ2300-6BA12**	1 unit	**8PQ2300-6BA18**	1 unit
800 / 350	**8PQ2300-8BA03**	1 unit	**8PQ2300-8BA05**	1 unit	**8PQ2300-8BA01**	1 unit	**8PQ2300-8BA07**	1 unit
600	**8PQ2306-8BA02**	1 unit	**8PQ2306-8BA04**	1 unit	**8PQ2306-8BA01**	1 unit	**8PQ2306-8BA03**	1 unit
850	**8PQ2300-8BA04**	1 unit	**8PQ2300-8BA06**	1 unit	**8PQ2300-8BA02**	1 unit	**8PQ2300-8BA08**	1 unit

Version	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS	Article No. www.siemens.com/product?Article No.	PS
⑥ **Doors with two-way interlocking system**						
						
Hinge position / Width in mm	**IP40**		**IP55**		**IP55, glass doors**	
Left / 350	**8PQ2197-0BA03**	1 unit	**8PQ2197-0BA06**	1 unit	**--**	
600	**8PQ2197-6BA06**	1 unit	**8PQ2197-6BA03**	1 unit	**8PQ2197-6BA10**	1 unit
850	**8PQ2197-0BA04**	1 unit	**8PQ2197-0BA07**	1 unit	**8PQ2197-0BA01**	1 unit
Right / 350	**8PQ2197-0BA16**	1 unit	**8PQ2197-0BA18**	1 unit	**--**	
600	**8PQ2197-6BA13**	1 unit	**8PQ2197-6BA12**	1 unit	**8PQ2197-6BA14**	1 unit
850	**8PQ2197-0BA17**	1 unit	**8PQ2197-0BA20**	1 unit	**8PQ2197-0BA21**	1 unit
Doors for semi-cylindrical profile • Semi-cylindrical profile acc. to DIN 18252/18254 • 8 × 45°						
Hinge position / Width in mm	**IP40**		**IP55**		**IP55, glass doors**	
Left / 350	**8PQ2197-0BA34**	1 unit	**8PQ2197-0BA31**	1 unit	**--**	
600	**8PQ2197-6BA04**	1 unit	**8PQ2197-6BA01**	1 unit	**8PQ2197-6BA07**	1 unit
850	**8PQ2197-0BA35**	1 unit	**8PQ2197-0BA32**	1 unit	**8PQ2197-0BA33**	1 unit
Right / 350	**8PQ2197-0BA40**	1 unit	**8PQ2197-0BA36**	1 unit	**--**	
600	**8PQ2197-6BA05**	1 unit	**8PQ2197-6BA02**	1 unit	**8PQ2197-6BA08**	1 unit
850	**8PQ2197-0BA41**	1 unit	**8PQ2197-0BA37**	1 unit	**8PQ2197-0BA38**	1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Accessories

	Version	Article No. www.siemens.com/product?Article No.	PS
	Flat cylinders/two-way interlocking mechanism		
	Versions		
	Rotary handles with flat cylinder • Identical key type • Including key	**8PQ9400-0BA07**	1 unit
	Rotary handles with two-way interlocking mechanism	**8PQ9400-0BA08**	1 unit
	Coupling bars	**8PQ9400-0BA27**	1 unit
	Locking rods	**8PQ9400-0BA37**	1 unit
	Bar guides	**8PQ9400-0BA36**	1 unit

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ALPHA DIN 8GK section

	Version	Article No. www.siemens.com/product?Article No.	PS
	Semi-cylindrical profiles		
	Versions		
	Rotary handles with semi-cylindrical profile	**8PQ9400-0BA41**	1 unit
	Coupling bars	**8PQ9400-0BA28**	1 unit
	Locking rods	**8PQ9400-0BA38**	1 unit
	Bar guides	**8PQ9400-0BA36**	1 unit
	Semi-cylindrical profiles • Acc. to DIN 18252/18254 • 8 × 45° adjustable • Identical key type • Further lock systems (RONIS, VW) on request • Including key	**8PQ9400-0BA26**	1 unit
	**Door hinges** 1 set = 2 units	**8PQ9400-0BA55**	1/2 units
	**Cubicle keys** • 3 mm double bit • 1 pack = 10 units	**8PQ9400-0BA12**	1 unit
	**Inner door struts** • For use with section doors • 1 pair = 2 units • Height 1975 mm	**8PQ2197-0BA10**	1 unit
SIVACON designed by SIEMENS	**Cubicle ID plates** SIVACON designed by Siemens	**8PQ9400-0BA06**	1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

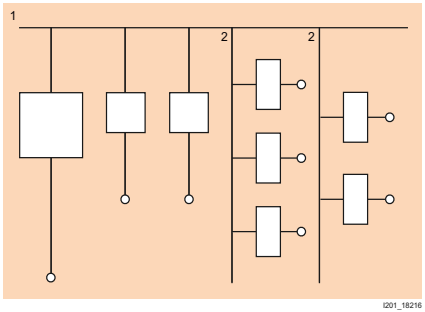
Features

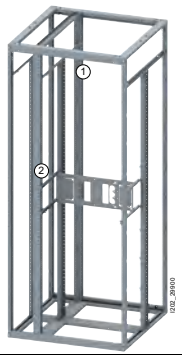
Internal separation is achieved with partitions, covers and device enclosures. Enclosed protectee thus created. Internal separation results in a higher level of safety for people and equipment.

Benefits

- Reduction of possible hazards during connection, scheduled maintenance
- Attenuation of the consequences of local faults and faster resumption of regular operation
- Protection against contact with hazardous parts and the adjacent functional units

Form 1

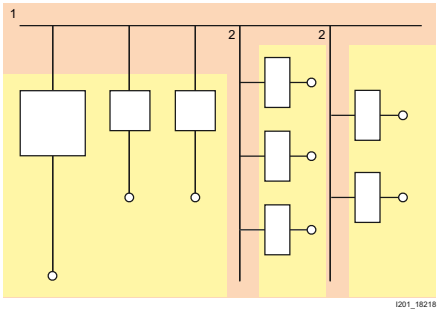


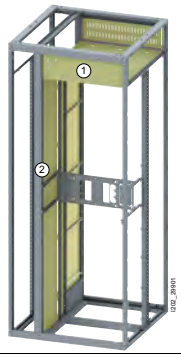


Outgoing feeder panel

- No internal separation

Form 2b

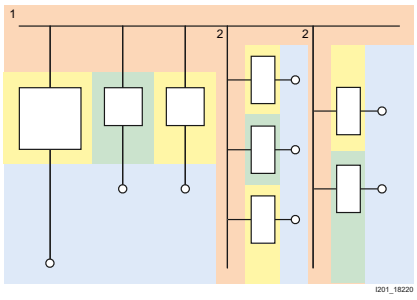


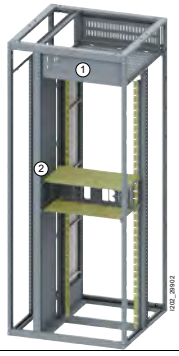


Outgoing feeder panel

+ Separation of the main busbar and the vertical busbar

Form 3b



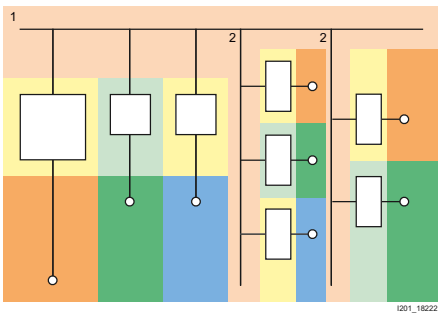


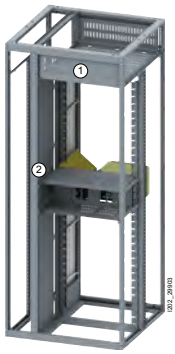
Outgoing feeder panel

- Separation of the main busbar and the vertical busbar

+ Separation of device compartments

Form 4b





Outgoing feeder panel

- Separation of the main busbar and the vertical busbar
- Separation of the devices

+ Separation of the connection points

Functional units

Connection point

① Main busbars

② Vertical busbar

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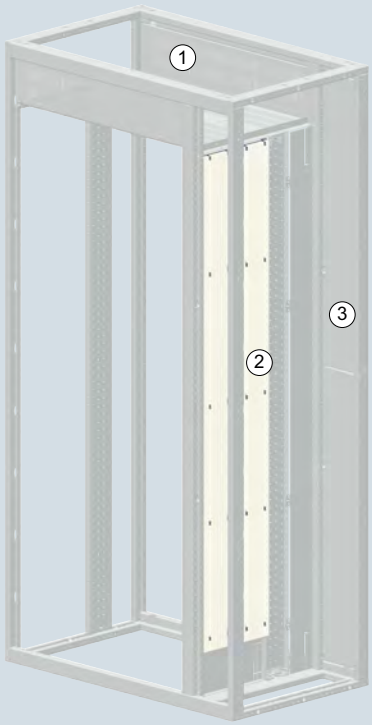
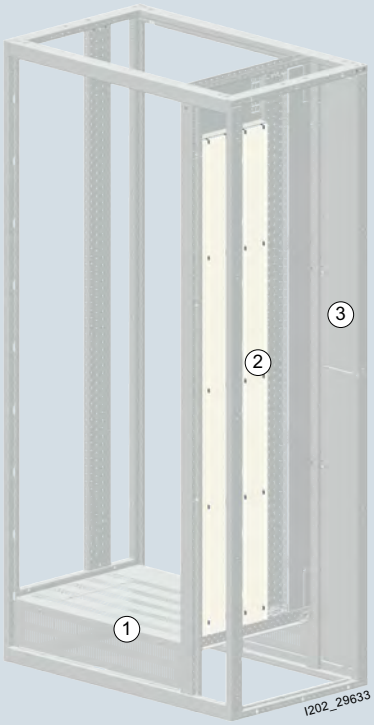
Introduction

Main busbar, top



Main busbar, bottom



① Separation, main busbar
② Separation, vertical busbar
③ Touch protection cover, vertical busbar

Features

- Separations, vertical busbar ② contain openings for cable routing
- With main busbar at bottom, form 2b is mandatory
- Sophisticated ventilation concept

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Configuration

One unit per frame division corresponding to the relative dimensions for equipment compartment or cable compartment.

Selection and ordering data

Separation form 2b, main busbar

	Version			Article No. www.siemens.com/product?Article No.	PS
	① **Main busbar at top** • Height: 225 mm				
	Frame depth mm	Position of main busbar	Compartment width mm	**Separation**	
	400	Top	200 350 400 600 800 850 1000 1200	**8PQ3000-1BA52** **8PQ3000-2BA68** **8PQ3000-0BA67** **8PQ3000-0BA68** **8PQ3000-0BA70** **8PQ3000-2BA70** **8PQ3000-1BA13** **8PQ3000-1BA15**	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit
	600	Top	200 350 400 600 800 850 1000 1200	**8PQ3000-1BA53** **8PQ3000-2BA71** **8PQ3000-0BA52** **8PQ3000-0BA53** **8PQ3000-0BA54** **8PQ3000-2BA72** **8PQ3000-1BA14** **8PQ3000-1BA16**	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit
	800	Top front / rear	200 350 400 600 800 850 1000 1200	**8PQ3000-1BA54** **8PQ3000-2BA73** **8PQ3000-0BA55** **8PQ3000-0BA56** **8PQ3000-0BA57** **8PQ3000-2BA74** **8PQ3000-1BA17** **8PQ3000-1BA18**	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit
	800	Top	200 350 400 600 800 850 1000 1200	**8PQ3000-1BA55** **8PQ3000-2BA75** **8PQ3000-0BA58** **8PQ3000-0BA60** **8PQ3000-0BA61** **8PQ3000-2BA76** **8PQ3000-1BA20** **8PQ3000-1BA21**	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Main busbar

	Version			Article No. www.siemens.com/product?Article No.	PS
	Main busbar at bottom • Height 225 mm				
	Frame depth mm	Position of main busbar	Frame width mm	**Separation**	
	400	Bottom	350 400 600 800 850 1000 1200	**8PQ3000-3BA13** **8PQ3000-3BA14** **8PQ3000-3BA15** **8PQ3000-3BA16** **8PQ3000-3BA17** **8PQ3000-3BA18** **8PQ3000-3BA20**	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit
	600	Bottom	350 400 600 800 850 1000 1200	**8PQ3000-3BA22** **8PQ3000-3BA23** **8PQ3000-3BA24** **8PQ3000-3BA25** **8PQ3000-3BA26** **8PQ3000-3BA27** **8PQ3000-3BA28**	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit
	800	Bottom double	350 400 600 800 850 1000 1200	**8PQ3000-3BA31** **8PQ3000-3BA32** **8PQ3000-3BA33** **8PQ3000-3BA34** **8PQ3000-3BA35** **8PQ3000-3BA36** **8PQ3000-3BA37**	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Main busbar at rear

• Height: 250 mm



Frame depth mm	Position of main busbar	Compartment width mm	Separation	PS
800	Rear	350	**8PQ3000-2BA77**	1 unit
		400	**8PQ3000-0BA78**	1 unit
		600	**8PQ3000-0BA80**	1 unit
		800	**8PQ3000-0BA81**	1 unit
		850	**8PQ3000-2BA78**	1 unit
		1000	**8PQ3000-1BA22**	1 unit
		1200	**8PQ3000-1BA23**	1 unit



Main busbar at rear

• With horizontal separations

Frame depth mm	Position of main busbar	Frame width mm	Separation	PS
800	Rear	400	**8PQ5000-4BA24**	1 unit
		600	**8PQ5000-4BA25**	1 unit
		800	**8PQ5000-4BA26**	1 unit
		1000	**8PQ5000-4BA27**	1 unit

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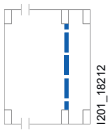
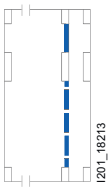
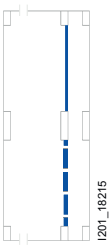
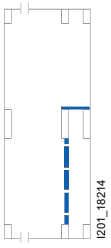
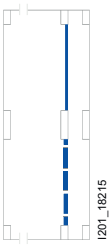
Selection and ordering data

	Version				Article No. www.siemens.com/product?Article No.	PS
	② **Vertical busbar, form 2b**					
	Position of main busbar	Positioning	Frame depth mm	Compartment width mm		
 I201_18212	Top	--	400	--	**8PQ4000-0BA05**	1 unit
 I201_18213			600	--	**8PQ4000-0BA07**	1 unit
 I201_18215	Top	On two sides	800		**8PQ4000-0BA64**	1 unit
 I201_18214	Top	Front/rear	800	200	**8PQ4000-0BA02**	1 unit
				400	**8PQ4000-0BA01**	1 unit
 I201_18215	Without	--	400	--	**8PQ4000-0BA06**	1 unit
			600	--	**8PQ4000-0BA03**	1 unit
			800	--	**8PQ4000-0BA76**	1 unit

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Version		Article No. www.siemens.com/product?Article No.	PS
③ **Touch protection covers, vertical busbar**			
• Height 1900 mm • Not for use with frame depth 400 mm			
Compartment width mm			
200		**8PQ3000-2BA50**	1 unit
400		**8PQ3000-0BA51**	1 unit



Version		Article No. www.siemens.com/product?Article No.	PS
④ **Vertical separation between sections**			
• Height 1900 mm • With removable pre-sectioning units for main busbar			
Frame depth mm	Quantity		
400	1 ×	**8PQ3000-0BA15**	1 unit
600	1 ×	**8PQ3000-0BA16**	1 unit
800	2 ×	**8PQ3000-0BA15**	1 unit

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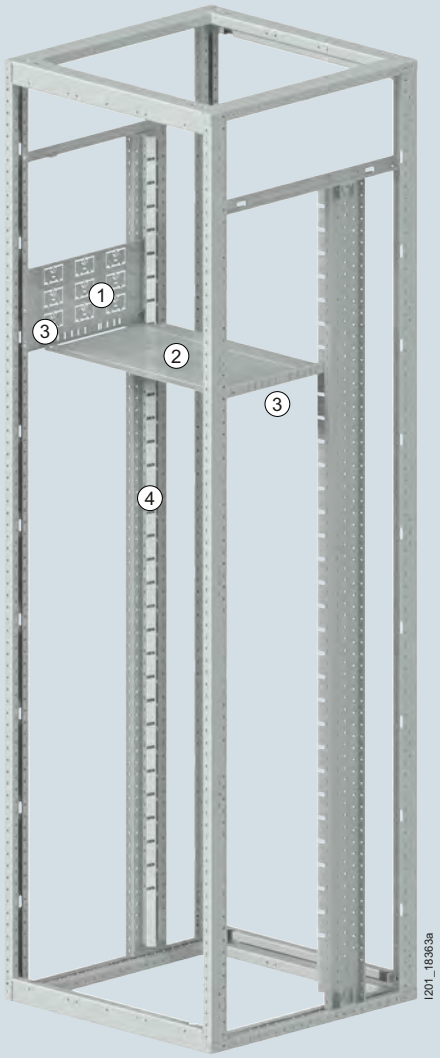
Overview

Features

- Modular system
- Separation 3b



1 Separation on the side

2 Horizontal separation

3 Support rails

4 Plug-in rails

Minimum order quantity (PS) or a multiple thereof can be ordered.

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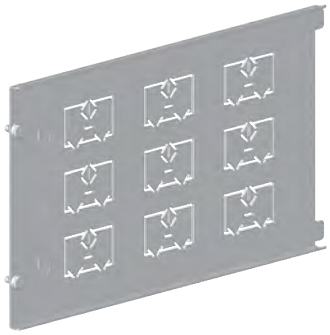
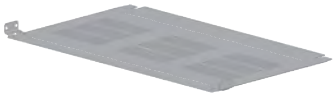
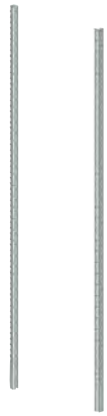
Selection and ordering data

	Version		Article No. www.siemens.com/product?Article No.	PS
	① **Side separation** • Kit version: support rails • Suitable for connection terminals			
	Mounting height mm	Branch current A		
	100	--	**8PQ5000-2BA27**	1 unit
	150	--	**8PQ5000-2BA28**	1 unit
	200	≤ 250	**8PQ5000-2BA30**	1 unit
		≥ 400	**8PQ5000-2BA31**	1 unit
	250	≤ 250	**8PQ5000-2BA32**	1 unit
		≥ 400	**8PQ5000-2BA33**	1 unit
	300	≤ 250	**8PQ5000-2BA34**	1 unit
		≥ 400	**8PQ5000-2BA35**	1 unit
	350	--	**8PQ5000-2BA36**	1 unit
	400	--	**8PQ5000-2BA37**	1 unit
	450	--	**8PQ5000-2BA38**	1 unit
	500	--	**8PQ5000-2BA40**	1 unit
	550	--	**8PQ5000-2BA41**	1 unit
	600	--	**8PQ5000-2BA42**	1 unit
	650	--	**8PQ5000-2BA43**	1 unit
	700	--	**8PQ5000-2BA44**	1 unit
	800	--	**8PQ5000-2BA45**	1 unit
	Side separation • Kit version: crossbars • Suitable for connection terminals			
	Mounting height mm	Branch current A		
	400	≥ 800	**8PQ5000-3BA50**	1 unit
	450	≥ 800	**8PQ5000-2BA65**	1 unit
	500	≥ 800	**8PQ5000-2BA66**	1 unit
	600	≥ 800	**8PQ5000-2BA48**	1 unit
	700	≥ 800	**8PQ5000-2BA50**	1 unit
	② **Horizontal separation**			
	Compartment width mm			
	400		**8PQ5000-3BA44**	1 unit
	600		**8PQ5000-2BA61**	1 unit
	800		**8PQ5000-2BA62**	1 unit
	③ **Support rails** • Equipment height 25 mm		**8PQ5000-2BA63**	1/2 units
	④ **Plug-in rails**			
	Equipment height mm	Busbar system		
	1600	At top or bottom	**8PQ3000-0BA82**	1 unit
	1800	Rear or without	**8PQ3000-0BA83**	1 unit

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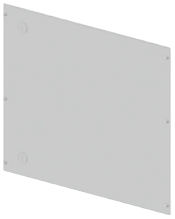
Modular kits



Version		Article No. www.siemens.com/product?Article No.	PS
⑤ **Rear separation** Not applicable for frame depth 400			
Compartment width mm	Mounting height mm		
600	50	**8PQ5000-2BA51**	1 unit
	100	**8PQ5000-2BA52**	1 unit
	150	**8PQ5000-4BA40**	1 unit
	200	**8PQ5000-4BA41**	1 unit
	250	**8PQ5000-4BA42**	1 unit
	300	**8PQ5000-4BA43**	1 unit
	350	**8PQ5000-4BA44**	1 unit
	400	**8PQ5000-4BA45**	1 unit
	450	**8PQ5000-4BA46**	1 unit
	550	**8PQ5000-4BA47**	1 unit
800	50	**8PQ5000-2BA67**	1 unit
	100	**8PQ5000-2BA68**	1 unit
	200	**8PQ5000-4BA48**	1 unit
	250	**8PQ5000-4BA50**	1 unit
	350	**8PQ5000-4BA51**	1 unit
	400	**8PQ5000-4BA52**	1 unit
	450	**8PQ5000-4BA53**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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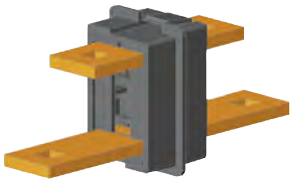
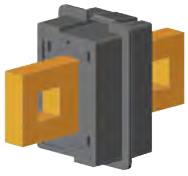
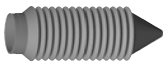
	Version			Article No. www.siemens.com/product?Article No.	PS
Accessories					
	Connecting terminals • Upgrade for separation 3b to 4a.				
	Package contents	Rated current I_n A	Busbar mm × mm		
	4 units	--	None	**8PQ5000-0BA05**	1 unit
	2 units	250	2 × 25 × 5	**8PQ5000-0BA72**	1 unit
	4 units	400 630	1 × 30 × 10 1 × 40 × 10	**8PQ5000-0BA73** **8PQ5000-0BA74**	1 unit 1 unit
Form 4b					
	**Protective bellows** • For covering the cable connecting terminal • 1 pack = 4 units			**8PQ9400-0BA71**	4 units

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Fasteners, extended delivery options

Selection and ordering data

	Version	Article No. www.siemens.com/product?Article No.	PS
Frame			
 T30	**Self-tapping screws** • 1 pack = 100 units • For use with frame and crossbars ***Cylinder-head screws***		
	External diameter × length in mm		
	M6 × 10	**8PQ9500-0BA34**	1 unit
	M6 × 16	**8PQ9500-0BA32**	1 unit
	M6 × 20	**8PQ9500-0BA31**	1 unit
	Cap, RAL 7035	**8PQ9400-0BA14**	1 unit
 T30	***Countersunk screws***		
	External diameter × length in mm		
	M6 × 12	**8PQ9500-1BA07**	1 unit
Vertical busbar connection			
	**Square screws DIN 603** 1 pack = 50 units		
	External diameter × length in mm		
	M10 × 35	**8PQ9500-0BA14**	1 unit
	M10 × 45	**8PQ9500-0BA16**	1 unit
	M10 × 55	**8PQ9500-1BA36**	1 unit
	M10 × 65	**8PQ9500-1BA25**	1 unit
	**Busbar clamps** 1 pack = 20 units	**8PQ9400-0BA02**	1 unit
Electrical connections			
	**Hexagonal nuts ISO 4032** 1 pack = 50 units		
	External diameter		
	M10	**8PQ9500-0BA05**	1 unit
	**Clamping washers DIN 6796** 1 pack = 50 units		
	Screw type		
	M10	**8PQ9500-0BA60**	1 unit
	**Washers DIN 125** 1 pack = 50 units		
	For screw type		
	M10	**8PQ9500-0BA67**	1 unit
	**Lock washers BN208012** 1 pack = 50 units		
	For screw type		
	M10	**8PQ9500-0BA50**	1 unit
Extended delivery options			
	Following prior agreement and individual offer via ALPHA-support.ic@siemens.com		
	Pre-assembled solutions • Based on SIMARIS configuration • In various expansion stages • Mechanically with or without copper insert	**8PQ9998-0BA20-Z**	1 unit
	Copper for system sections • Drawings from SIMARIS	**8PQ9998-0BA30-Z**	1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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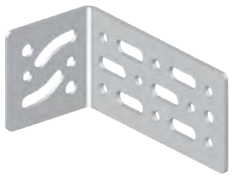
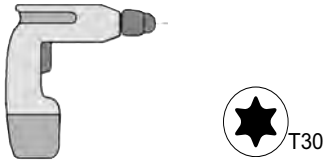
Selection and ordering data

	Version		Article No. www.siemens.com/product?Article No.	PS
	**Universal mounting brackets** 1 pack = 10 units		**8PQ9400-0BA01**	1 unit
	**Lifting eyebolts** 1 set = 4 units		**8PQ9400-0BA11**	1 unit
	**Lifting brackets** 1 set = 2 units			
	Frame width in mm			
	800		**8PQ3000-1BA01**	1 unit
	850		**8PQ3000-2BA38**	1 unit
	1000		**8PQ3000-1BA02**	1/2 units
	1200		**8PQ3000-1BA03**	1/2 units
	**Cable entries** 1 pack = 20 units • $\varnothing_{internal}$ = 20 mm • $\varnothing_{hole}$ = 25.5 mm • Plate thickness = 1.5 mm		**8PQ9400-0BA16**	1 unit
Tools				
	**Bits for screwdriver**			
	External diameter × length in mm	Package contents		
	M6 × 200	2 units	**8PQ9400-0BA10**	1 unit
	**Position switch for mounting as door contact**			
	• 1 NO + 1 NC		**8MF1000-2VL**	1 unit
	• 1 NO + 2 NC		**8MF1000-2VR**	1 unit

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Notes

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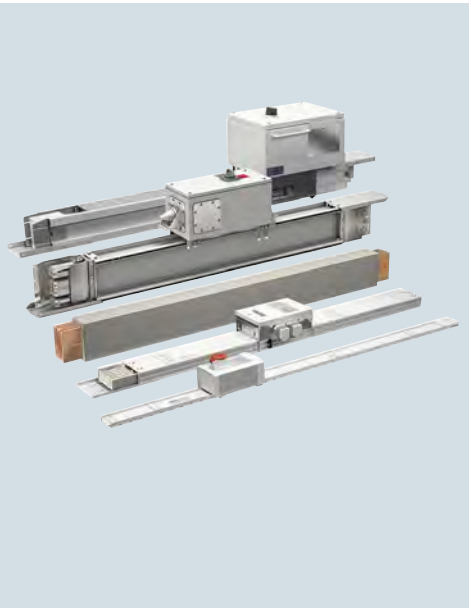

Introduction

17/2 Introduction
17/4 Features overview
17/6 Principles of busbar trunking planning

For further information,
see Catalog LV 70



For further technical product information:

Installation manual

SIVACON 8PS
- Installation with BD2 system
Article No.: A5E02126899-02

Planning Manual

SIVACON 8PS
- Planning with SIVACON 8PS
Article No.: A5E01541017-04

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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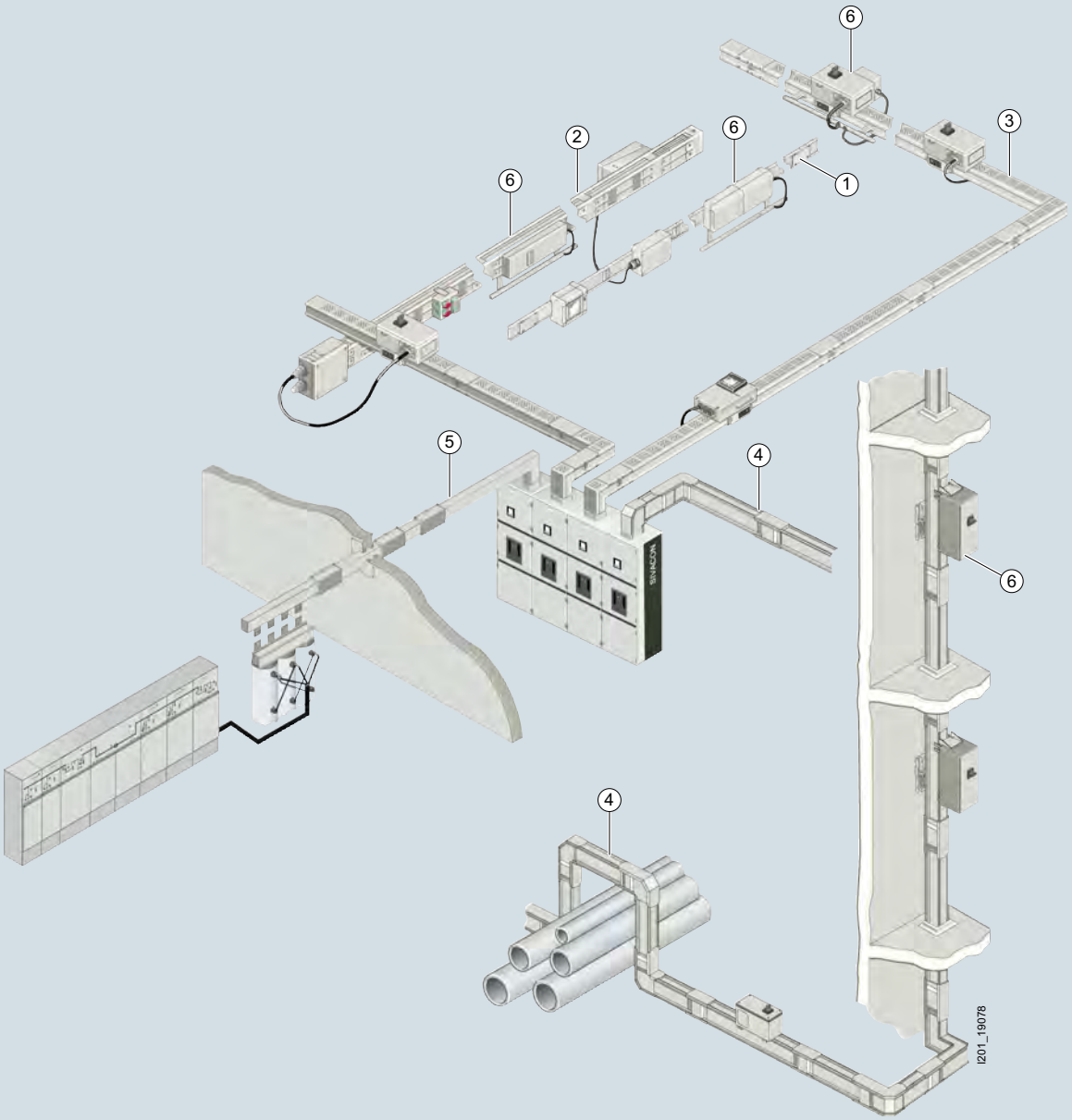
Overview



1 BD01 system
2 BD2 system
3 LD system
4 LI system
5 LR system
6 Communication-capable busbar trunking systems for connection to the following bus systems:
- KNX (EIB / Instabus)
- AS-Interface
- PROFIBUS
- PROFINET
- Modbus

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits

① *BD01 system up to 160 A*

The busbar trunking system for power distribution in the skilled trades and business:

- High degree of protection up to IP55
- Flexible power supply
- Easy and quick planning
- Time-saving mounting
- Reliable mechanical and electrical connection technology
- High stability, low weight
- Few basic modules required
- Storage-friendly system
- Variable changes of direction
- Versatile tap-off units
- Positive opening and closing of tap-off points

② *BD2 system up to 1250 A*

The busbar trunking system for operation in the harsh industrial world:

- High degree of protection up to IP55
- Easy and quick planning
- Time-saving and economical mounting
- Reliable and safe operation
- Flexible modular system with simple solutions for every application
- Early planning of the power distribution system without exact knowledge of load locations
- Early readiness for operation thanks to fast and simple mounting
- Innovative design: No more compensation boxes to compensate elongation
- Codable tap-off units and tap-off points
- Sealable throughout

③ *LD system up to 5000 A*

The busbar trunking system for optimized power distribution in industry:

- Degree of protection up to IP54
- Quick and easy mounting
- Reliable and safe operation
- Space-saving, compact design up to 5000 A in one enclosure
- Load outgoing feeders up to 1250 A
- Type-tested connection to distribution boards and transformers

④ *LI system up to 6300 A*

The busbar trunking system for power transmission and distribution in infrastructure – e.g. in multistory buildings – and in industrial applications:

- Reliable and easy mounting
- Reliable and safe operation
- Load outgoing feeders up to 1250 A
- Tested connection to distribution boards (type-tested connection to SIVACON S8) and transformers

⑤ *LR system up to 6300 A*

The busbar trunking system for power transmission under extreme ambient conditions (IP68).

Detailed information about this system is available from the Siemens branch located close to you.

⑥ *Communication-capable busbar trunking systems*

Communication-capable function expansions for combination with known tap-off units:

- Can be used with the BD01, BD2, LD and LI systems
- Uses:
  - Building control
  - Switching, reporting and remote operation
  - Consumption recording and remote monitoring of decentral power tap-off units
  - Interlinking of various trades
- Connection to the KNX (EIB/Instabus), AS-Interface and PROFIBUS, PROFINET and Modbus bus systems
- Integrated, efficient and future-proof solution thanks to the integration of measuring devices in energy management solutions according to ISO 50001
- Flexible with plug-in tap-off units including measuring devices
- Cost-efficient with greater transparency of the energy consumption
- Reliable thanks to central control of the power distribution

More information

Catalog LV 70 -
Busbar Trunking Systems BD01, BD2 up to 1250 A

German: Article No. E86060-K1870-A101-A8
English: Article No. E86060-K1870-A101-A8-7600

SIVACON 8PS busbar trunking systems configurator

Busbar trunking systems up to 1250 A can be ordered using the product configurator (selection aid).

The following configurators are available:

- SIVACON 8PS BD01 system, 40 ... 160 A
- SIVACON 8PS BD2 system, 160 ... 1250 A

This selection aid can be accessed through the Industry Mall and is also included in Interactive Catalog CA 01 on a DVD, which is available free of charge.

Manual

Planning with SIVACON 8PS - busbar trunking systems up to 6300 A
German: Article No. A5E01541017-04
English: Article No. A5E01541101-04

Leaflet

English: Energy: flexible, safe, everywhere!
SIVACON 8PS busbar trunking systems
German: Article No. IEMMS-B10032-00
English: Article No. EMMS-B10032-00-7600

Internet

www.siemens.com/busbar

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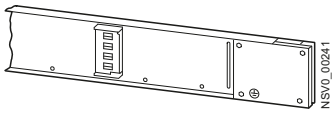
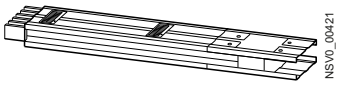
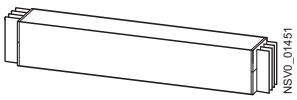
Features overview

Overview

Busbar trunking systems	Rated current A	Rated operational voltage V AC	Frequency Hz	Number of active conductors	Degree of protection	Ambient temperature, min./max. °C
BD01 	40 63 100 125 160	400	50	4 (PE = enclosure)	Up to IP55	-5/+40
BD2A **BD2C** 	160 ... 1000 160 ... 1250	690	50	5	Up to IP55	-5/+40
LDA1 ... LDA8 **LDC2 ... LDC8** 	1100 ... 4000 2000 ... 5000	1000	50	4 or 5	Up to IP54	-5/+40
LI-A0800 ... LI-A5000 **LI-C1000 ... LI-C6300** 	800 ... 5000 1000 ... 6300	1000	50	3, 4, 5, 6 (PE = enclosure)	Up to IP66	-5/+50
LRA01 ... LRA29 **LRC01 ... LRC29** 	400 ... 5000 630 ... 6300	1000	50	4, 5	IP68	-5/+40

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Mounting position	Length m	Tap-off points	Tap-off units	Material	Fire load kWh/m	Can be combined with communication-capable tap-off units for
Edgewise, flat (outgoing points downwards)	2 3	On one side every 0.5 or 1 m	Up to 63 A	Insulated Al or Cu conductors, painted sheet-steel enclosure	0.76	Lighting control
Edgewise, flat and vertical	0.5 ... 3.25	Without On two sides offset every 0.25 or 0.5 m	Up to 530 A	Al or Cu busbars, painted sheet-steel enclosure	0.6 ... 0.67 (without tap-off points)	Lighting control, remote switching, signaling and consumption recording
Horizontal, edgewise and vertical	0.5 ... 3.2	Without On one side every 1 m On two sides every 1 m	Up to 1250 A	Insulated Al or Cu busbars, painted sheet-steel enclosure	4.16 ... 8.83 (without tap-off points)	Remote switching, signaling and consumption recording
Horizontal, edgewise and vertical	0.35 ... 3	Without Up to 3 tap-off points on 3 m	Up to 1250 A	Insulated Al or Cu busbars, painted aluminum enclosure	2.13 ... 15.34	Remote switching, signaling and consumption recording
Horizontal, edgewise and vertical	0.5 ... 3	Without Selectable on one side	Up to 630 A	Epoxy resin system, Al or Cu busbars	--	--

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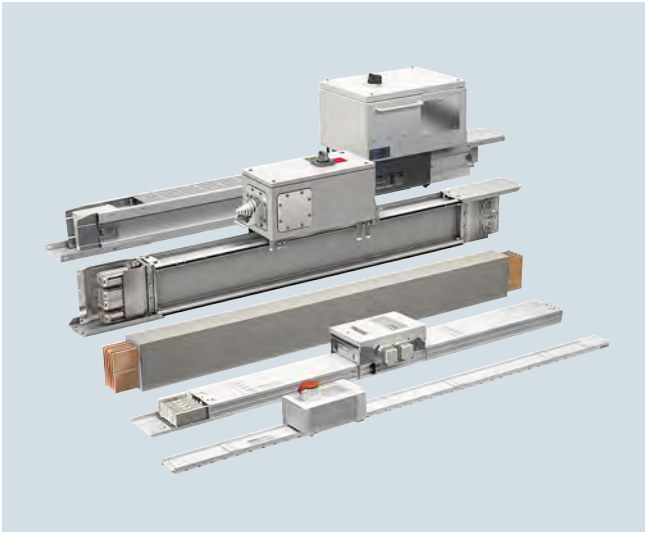
Overview



Trunking units for currents from 40 to 6300 A

When it comes to developing a power distribution concept complete with the configuration of systems and system components, the end user's requirements have to be coordinated with the manufacturer's possibilities.

Descriptions are provided accordingly of the individual systems, their technical features and their fields of application. Another element is the graphic representation of the various busbar trunking elements. All details of importance for the planning work are emphasized and explained.

You will find ideas for a ready-to-use planning solution under "Configuration information" in Chapters 3 and 4 of Catalog LV 70. For example, the basics of dimensioning are presented in detail along with in-depth information on topics such as system construction, short-circuit protection, fire protection and functional maintenance.

Services and engineering tools are available from Siemens to simplify the drawing up of customer specifications.

General information

When developing the planning concept of a power supply system, it is necessary not only to consider the standards and specifications in force but also to clarify the correlations between economy and technology. Electrical equipment such as distribution boards and transformers must be dimensioned and selected so that they represent an optimum in their entirety and not just individually.

All components must be sufficiently dimensioned for the loads which arise in the event of a fault as well as during operation at rated values. Other decisive points to be considered when drawing up the power concept are:

- The type, utilization and shape of building (e.g. high-rise, flat-roof and number of storys)
- Determination of load centers and selection of possible supply routes and locations for transformers and main distribution boards
- Determination of building-related connected loads according to specific loads per unit area dependent on the building's use
- Specifications and requirements imposed by the building authorities
- Requirements imposed by the power supply companies

The result will never be a single solution but several versions which must be assessed with regard to their technical and economic implications. The following requirements are paramount in this connection:

- Easy and clear-cut planning
- Long endurance
- High availability
- Low fire load
- Flexible adaptation to changes within the building

In most applications these requirements are easily met by the use of suitable busbar trunking systems. For this reason, busbar trunking systems rather than the cable installation method are being used more and more often by engineering offices for the transmission and distribution of power. Siemens offers busbar trunking systems from 40 to 6300 A:

- The BD01 busbar trunking system from 40 A to 160 A for supplying power to workshops with tap-off units up to 63 A
- The BD2 system from 160 A to 1250 A for supplying power to medium-size loads in buildings and in industry
- The ventilated LD system from 1100 A to 5000 A for supplying loads with medium power consumption in industry
- The LI sandwich system from 800 A to 6300 A for power distribution with IP55 and power transmission of high volumes of power up to IP66 in infrastructure – e.g. in multistory buildings – and in industrial applications
- The LR encapsulated system from 400 A to 6300 A for power transmission in extreme ambient conditions (IP68)

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SIVACON 8MF1 system cubicles

Introduction
18/2 System overview
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18/5 Corrosivity categories
18/6 Dimensions
18/7 Degrees of protection
18/8 Earthquake-prepared, unequipped, empty enclosures
18/9 Electromagnetically compatible unequipped, empty enclosures
18/10 Configuration information

Frame
18/11 General data
Frames for standard enclosure
18/12 - Enclosure
18/16 - Bases
18/17 - Covers
Frames for corner enclosure NEW
18/18 - Enclosure
18/19 - Bases
18/20 - Floors
18/21 - Roofs
18/22 Accessories
18/23 - Accessories, transport brackets

Enclosure
18/24 General data
18/25 Bases
18/28 Roofs
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18/33 - Intermediate panels
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Complete cubicles
18/60 System overview
18/62 General data
18/64 Stand-alone installation, IP40
18/66 Suite installation, IP40
18/68 Stand-alone installation, IP55
18/70 Suite installation, IP55
18/72 Stand-alone installation with ventilation openings, IP20
18/74 Suite installation with ventilation openings, IP20
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Preconfigured cubicles
18/78 Earthquake-reinforced cubicles

SIVACON 8MR system lighting
18/79 Compact/slimline lights
18/79 LED lights

SIVACON 8MR system air-conditioning
18/81 Introduction
18/84 Filter fans
18/87 Air conditioners/cooling devices
18/88 Heat exchangers
18/89 Heater units
18/90 Fan heaters
18/92 Thermostats, hygrostats, hygrotherms, switching modules

For further technical product information:

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Overview



One system, many possibilities

The basis for progress

Innovative technologies bring progress to the world, either by enabling machines and systems to operate independently or by integrating renewable energy sources and energy stores in the network. Whether in mechanical and plant engineering, in control technology, wind power or photovoltaics, every application and every industry has special requirements to fulfill. The new SIVACON sicube 8MF system cubicles are the perfect answer for every use. Your electrical and electronic components are in good hands here.

Modular system with many variants

With SIVACON sicube 8MF system cubicles, you are backing a system that adapts to your needs. Configure your required unequipped, empty enclosure yourself in only a few steps. Thanks to the modular system with many variants, you profit from a host of standard variants for your tailor-made special solution. The basis is the frame, which is available in 60 sizes. In further steps, you define which enclosure and expansion parts are to be installed on and in your unequipped, empty enclosure. You also have a choice as to how it is delivered, i.e. you can have the cubicle delivered completely pre-assembled or with individually packed components.

Individual modification

The flexibility of the SIVACON sicube 8MF system cubicles is your advantage. If required, we will develop an unequipped, empty enclosure that corresponds precisely to your specifications. We will take care of modifying the cubicle so that you can modify it further straight away, as soon as it is delivered. Paint finishes in special or functional colors, tailor-made cutouts or even EMC versions or cubicles prepared for earthquakes – no matter what your requirements, we will implement them.

Tailor-made solutions

Do you need a special cubicle for your application, e.g. in unusual dimensions or with an individual sheet metal interior to fit your components? Together with you, we will develop an enclosure that complies precisely with your requirements. With an optimized unequipped, empty enclosure to start off with, you can save installation effort, profiting from our consulting service here. Specific approvals or certification also present no problem: we can already offer you a host of certificates, and we can obtain others additionally on request.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standard	IEC 62208, IEC 61439 (see list on right)
Degree of protection	IP20 IP21 IP30 IP40 IP41 IP55
Safety class	I
Material	Sheet steel
Surface	Galvanized Powder-coated
Color	RAL 7035 (light gray)
Corrosivity category	In accordance with EN ISO 12944-2 C3 Layer thickness 100 µm (+/-25µm)

Tests in compliance with IEC 61439:

- Corrosion resistance
- Heat stability
- Resistance to extraordinary heat and fire
- Raising
- Impact test
- Degree of protection of enclosures
- Continuity of PE conductor connection
- Proof of power loss dissipation capacity

Note:

Other technical versions on request.

	Material/opening angle		Surface
Frame			
Frame	2.5 mm sheet steel	Screwed	Galvanized
Base	1.5 mm sheet steel	Bases, base covers	Powder-coated on both sides, RAL 7035
Trim strips		With Siemens logo, without cutout for indicator lights Without Siemens logo, without cutout for indicator lights With Siemens logo and cutout for indicator lights, left With Siemens logo and cutout for indicator lights, right	
Enclosure			
Base	2.0 mm sheet steel	Closed With sub-divisions With cable entry	Galvanized
Roof	1.5 mm sheet steel	Closed Closed, foamed seal Perforated With ventilation fins Roof trough	Galvanized
Side/rear panel	1.5 mm sheet steel		Powder-coated on both sides, RAL 7035
Intermediate panel	2.5 mm sheet steel		Galvanized
Door	1.5 mm sheet steel	Right-hand hinge Left-hand hinge With ventilation slits Glass Door halves	Powder-coated on both sides, RAL 7035
• Max. opening angle for stand-alone installation:	270°		
• Max. opening angle for suite installation:	180°		
Expansion			
Shelves	2.0 mm sheet steel		Galvanized
Mounting plate for:			
• Mounting with universal bracket	2.0 mm sheet steel	Closed Perforated	Galvanized
• Direct mounting on the frame	2.0 mm sheet steel	Closed Perforated	Galvanized
Rear mounting panel	2.5 mm sheet steel	Closed Perforated	Galvanized
Side mounting panel	2.5 mm sheet steel	Closed Perforated	Galvanized
19" versions	2.0 mm sheet steel 2.5 mm sheet steel	19" swing frame 19" fixed-mounted	Powder-coated, RAL 7035 Galvanized

Application

Typical areas of application

- Power station control systems
- Converters
- Transport
- Cubicles in industry

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Individual modification

Overview

Prices

	Additional price per modular element
Special machining	
• Punching an enclosure part[1)2)] or mounting panel/plate	✓
Standard paint finish RAL color group 1	
• Frame (electrogalvanized as standard)	✓
• Trim strip	None
• Per enclosure part that is painted as standard[1)]	None
• Per enclosure part that is electrogalvanized as standard[2)]	✓
• Swing frame (including mounting elements)	None
• Mounting panel/plate (electrogalvanized as standard)	✓
Special paint finish RAL color group 2	
• Frame (electrogalvanized as standard)	✓
• Trim strip	✓
• Per enclosure part that is painted as standard[1)]	✓
• Per enclosure part that is electrogalvanized as standard[2)]	✓
• Swing frame (including mounting elements)	✓
• Mounting panel/plate (electrogalvanized as standard)	✓
Special paint finish RAL color group 3	
• Frame (electrogalvanized as standard)	✓
• Trim strip	✓
• Per enclosure part that is painted as standard[1)]	✓
• Per enclosure part that is electrogalvanized as standard[2)]	✓
• Swing frame (including mounting elements)	✓
• Mounting panel/plate (electrogalvanized as standard)	✓
Special RAL paint finish: other colors	
• All parts	On request
Coating according to corrosivity category	
Corrosivity category C5-M in compliance with EN ISO 12944-2 RAL color group 1 (excluding sand blasting)	
• Frame (electrogalvanized as standard)	✓
• Per enclosure part[1)2)]	✓
Zinc plated: Zn 8 µm blue	
• 8MF1 frame (electrogalvanized as standard)	✓
• Swing frame (including mounting elements)	✓

Reinforced enclosure part[1)2)]	**Additional price per enclosure part**
Sheet 2 mm thick	✓

Cubicle in special dimensions	**Price per cubicle**
Max. dimensions H x W x D: 2200 x 1200 x 1000 mm	Corresponding to next larger cubicle

Data records for customized products	**Price per record**
3D model / 2D set of drawings for 8MF1	
• Frame including enclosure	✓
• Swing frame/mounting panel	✓
• Equipped mounting panel	✓

Colors

Color designation	Surface structure	Color
Color group 1		
RAL 7035, light gray	Smooth matt	
RAL 7035, light gray	Semi-gloss	
RAL 9016, traffic white	Smooth matt	
RAL 7032, pebble gray	Semi-gloss	
Color group 2		
RAL 7038, agate gray	Semi-gloss	
RAL 9002, gray white	Coarse structure matt	
RAL 9003, signal white	Semi-gloss	
RAL 5017, traffic blue	Coarse structure silky gloss	
RAL 5005, signal blue	Smooth semi-gloss	
RAL 5010, gentian blue	Smooth semi-gloss	
RAL 9001, cream	Smooth semi-gloss	
RAL 9010, pure white	Smooth semi-gloss	
SN 610 Siemens white	Semi-gloss	
SN 610 Siemens white	Silky gloss	
RAL 2000, yellow orange	Smooth semi-gloss	
RAL 6018, yellow green	Smooth semi-gloss	
RAL 9002, gray white	Smooth semi-gloss	
Color group 3		
RAL 9002, gray white	Smooth silky gloss	
RAL 9010, pure white	Semi-gloss	
RAL 3000, flame red	Silky gloss	
RAL 1003, signal yellow	Smooth semi-gloss	
RAL 7033, cement gray	Semi-gloss	

1) Rear panel, side panel, door
2) Roof plate, base plate, intermediate panel

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Corrosivity categories in compliance with EN ISO 12944-2

Corrosivity category	Nominal layer thickness in µm	Steam condensation in hours (h)	Impact of salt spray in hours (h)	Examples of typical environments (interior)
C1 insignificant	70	--	--	Heated buildings with neutral atmospheres, e.g. offices, shops, schools or hotels
	70	--	--	
	70	--	--	
C2 low	80	48	--	Unheated buildings where condensation can occur, e.g. warehouses or sports halls
	120	48	--	
	160	120	--	
C3 moderate	120	48	120	Production rooms with high humidity and slight amounts of air pollution, e.g. food production plants, laundries, breweries or dairies
	160	120	240	
	200	240	480	
C4 strong	160	120	240	Chemical plants, swimming baths or boatsheds above sea level
	200	240	480	
	240 ... 280	480	720	
C5-I very strong (industry)	200	240	480	Buildings or areas with almost permanent condensation and extreme pollution
	240 ... 280	480	720	
	320	720	1440	
C5-M very strong (sea)	200	240	480	Buildings or areas with almost permanent condensation and extreme pollution
	240 ... 280	480	720	
	320	720	1440	

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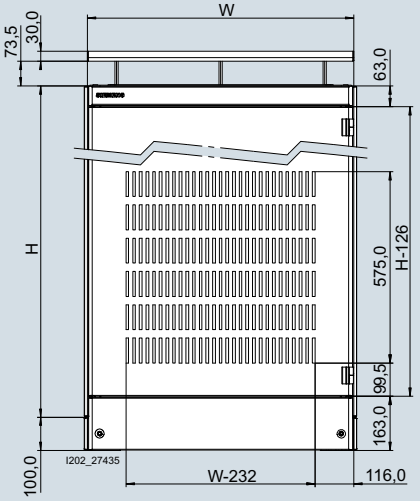
Dimensions

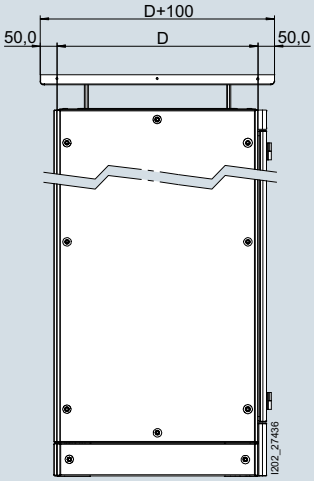
Dimensional drawings

Specimen cubicle

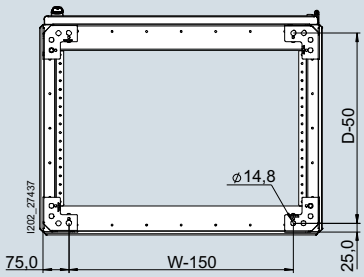
Front view



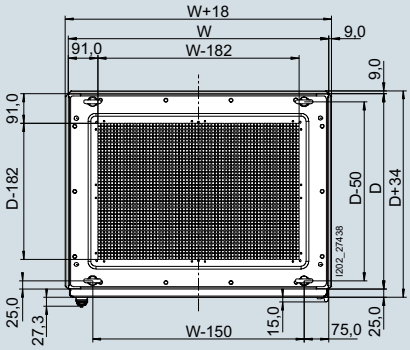
Side view from left



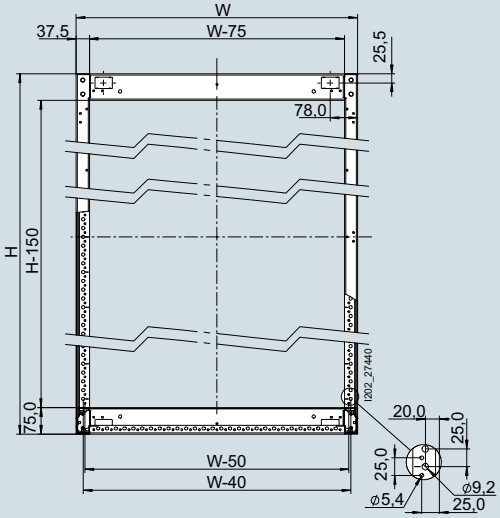
Bottom view

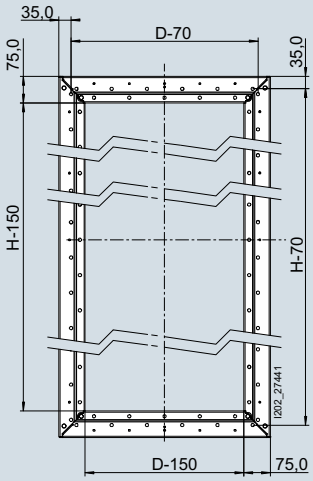


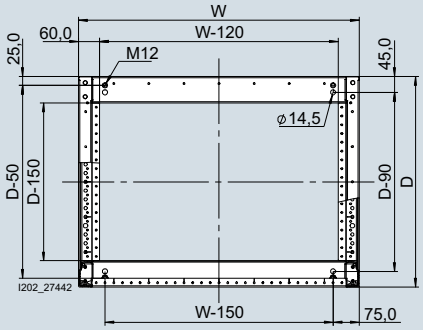
Top view



Frame







Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Degrees of protection in accordance with EN 60529

First code number	**Degree of protection (protection against contact and foreign objects)**		Second code number	**Degree of protection (protection against water)**	
	Description	Explanation		Description	Explanation
0	No protection	No particular protection for persons against accidental contact with live or moving parts. No protection of the equipment against the penetration of solid foreign objects.	0	No protection	No particular protection.
			1	Protection against vertically falling water drops	Vertically falling water drops must have no harmful effects.
1	Protection against solid foreign objects > 50 mm	Protection against accidental broad contact with live or internal moving parts, e.g. with the hand, but no protection against deliberate access to these parts. Protection against the penetration of solid foreign objects with a diameter greater than 50 mm.	2	Protection against water drops falling at an angle	Falling water drops must have no harmful effects at any angle up to 15° from the vertical.
			3	Protection against spraying water	Water spraying at any angle up to 60° from the vertical must have no harmful effects.
2	Protection against solid foreign objects > 12 mm	Protection against finger contact with live or internal moving parts. Protection against the penetration of solid foreign objects with a diameter greater than 12 mm.	4	Protection against splashing water	Water splashing against the equipment must have no harmful effects, irrespective of its direction.
			5	Protection against water jets	Water directed at the equipment from a nozzle must have no harmful effects, irrespective of its direction.
3	Protection against solid foreign objects > 2.5 mm	Protection against contact with live or internal moving parts with tools, wires or the like with a thickness greater than 2.5 mm. Protection against the penetration of solid foreign objects with a diameter greater than 2.5 mm.	6	Protection against flooding	Water must have no harmful effects in case of temporary flooding.
			7	Protection against immersion	Water must not ingress to such an extent that it causes harmful effects when the equipment is immersed in water in accordance with the defined pressure and time conditions.
4	Protection against solid foreign objects > 1 mm	Protection against contact with live or internal moving parts with tools, wires or the like with a thickness greater than 1 mm. Protection against the penetration of solid foreign objects with a diameter greater than 1 mm.	8	Protection against submersion	Water must not ingress to such an extent that it causes harmful effects when the equipment is immersed in water in accordance with the defined pressure conditions but for an unspecified time.
5	Protection against dust deposits	Full protection against contact with live or internal moving parts. Protection against harmful dust deposits. The ingress of dust is not fully prevented, but dust may not enter to such an extent that the functioning of the device is impaired.		Example for specification of a degree of protection:	Code letters: IP First code number: 4 Second code number: 0
6	Protection against dust ingress	Full protection against contact with live or internal moving parts. No ingress of dust.			

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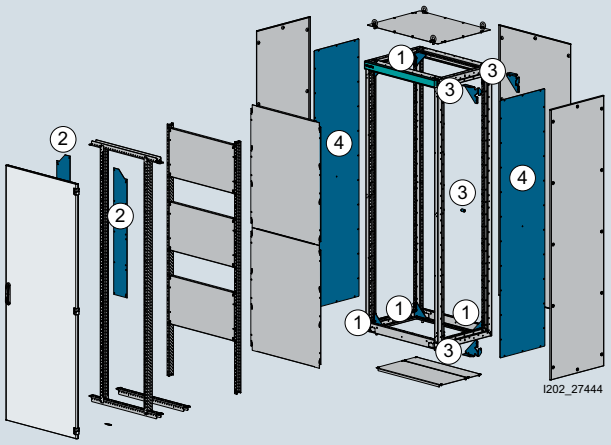
Earthquake-prepared, unequipped, empty enclosures

Overview

Components



1 Upgrade kit for earthquake reinforcement
2 Earthquake supplementary kit for swing frame
3 Earthquake supplementary kit for intermediate panel
4 Intermediate panel

Components of an earthquake-prepared empty enclosure

Purpose of an earthquake test

Checking electrical installation of the ready-for-operation cubicle under dynamic forces

- No control system failure
- No shutdown of processes

Earthquake protection cannot be warranted alone by using an earthquake-reinforced unequipped, empty enclosure.

SIVACON sicube offers users stability-enhancing elements.

The effectiveness of these stabilizing measures has been proven by successful tests in compliance with the following specifications:

- IEC 60068-2-6
- IEC 60980
- IEC 60068-2-57
- IBC 2012

Test report statement

An 8MF frame is enabled for dynamic stressing by additional parts.

The frame is loaded with a defined mass and subjected to a standardized earthquake simulation.

The frame withstands this defined dynamic stressing undamaged.

Applicability of the test

Applicability of the test to the removed cubicle depends on:

- Type of mounting arrangement, i.e. standalone or cubicle suite
- Dimensions of cubicles
- Installed mass
- Position of center of mass
- Required stress level of the earthquake simulation
- Necessary operability of installed devices and duration

Configuration information

Users can completely configure an earthquake-prepared cubicle themselves in all standard sizes, see page 18/10, Configuration information.

It is also possible to order a pre-configured complete cubicle, see page 18/10.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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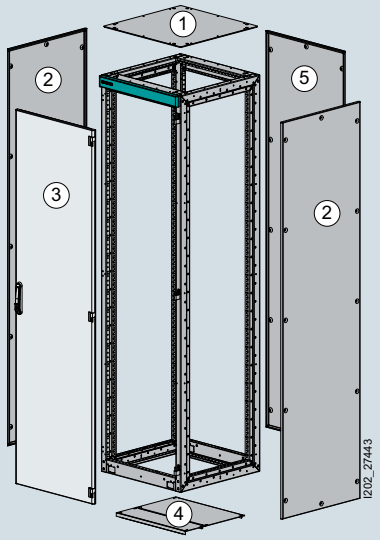
Overview

Components



1. Roof, sendzimir-galvanized with conductive seal
2. Side panel, powder-coated on one side with conductive seal
3. Door, powder-coated on one side with conductive seal
4. Base plate, sendzimir-galvanized with conductive seal
5. Rear panel, powder-coated on one side with conductive seal

Components of an EMC cubicle

Principles of EMC

Electromagnetic compatibility is achieved where the functioning of potentially susceptible devices is not influenced by the existing interference sources.

If two devices are not electromagnetically compatible, it is possible to either reduce the interference emission of the interference source or increase the immunity of the potentially susceptible device.

Interference emission and interference immunity

EMC is dependent on two properties of the devices involved:

- interference emission and
- immunity to interference

A device may be both an interference source and a potentially susceptible device. The power unit of a converter, for example, is to be seen as an interference source, whereas the sensor, the control section and the evaluation circuit represent a potentially susceptible device.

Interference immunity describes the behavior of a device when subjected to electromagnetic interference. The demands and evaluation criteria for the behavior of devices in industrial environments are laid down in the standard EN 50082-2.

What is electromagnetic compatibility (EMC)?

Electromagnetic compatibility (EMC) is the ability of a device, an installation or a system to operate satisfactorily in the electromagnetic environment without causing electromagnetic interference itself that would be unacceptable for all devices, installations or systems existing in that environment.

How does EMC screening work?

High-frequency, electromagnetic alternating fields can only be completely shielded with adequately thick electrically conductive, all-round enclosed shells. The cubicle interior is not coated and is thus electrically conductive. The EMC seal is required to ensure uninterrupted all-round contact, thus providing a sealed electrically conductive enclosure.

Configuration information

The size of the EMC unequipped, empty enclosure can be chosen freely within the scope of standard dimensions.

An EMC cubicle must be sheathed completely with EMC components (base, top, side panel, rear panel and door).

A suite of EMC cubicles is possible.

See page 18/10, Configuration information

Technical specifications

Degree of protection	IP40
Safety classes	I
Material	Sheet steel
Surface	On one side Powder-coated
Color	RAL 7035 (light gray)
Seal	Metallically conductive

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Configuration information

Overview

Cubicles in a defined degree of protection

Elements of the standard cubicle:

- Frame, roof plate, base plate, side panels, rear panel
- All single parts with a higher degree of protection can be installed

	Frame	Roof plate	Roof trough	Side panels	Rear panel	Door	Upgrade kit	Base plate	Trim strips
IP20	Yes	Ventilated	No	No seal	No seal	Ventilated	No	With sub-divisions	Yes
IP21	Yes	Ventilated	Yes	No seal	No seal	Ventilated	No	With sub-divisions	Yes
IP40	Yes	Closed/ ventilated	No	No seal	No seal	Closed/ ventilated	No/ Yes	Closed	Yes
IP41	Yes	Closed/ ventilated	Yes	No seal	No seal	Closed/ ventilated	No/ Yes	Closed	Yes
IP55	Yes	Closed/ with seal	No	With seal	With seal	Closed	No	Closed with seal	Yes

Earthquake-prepared cubicles

Installation with base is available on request; however this will impair the earthquake resistance properties of the cubicle.

	Frame	Roof plate	Partitions	Side panels	Upgrade kit	Door	Mounting plate[1)]	Base plate	Trim strips
V1	2200	Yes	2 units	Yes	Yes	Yes, but no glass door	2 x 1000 mm	Yes	Yes
V2	2000	Yes	2 units	Yes	Yes	Yes, but no glass door	1 x 1000 mm 1 x 800 mm	Yes	Yes
V3	1800	Yes	2 units	Yes	Yes	Yes, but no glass door	2 x 800 mm	Yes	Yes

Cubicles in EMC version

	Frame	Roof plate	Roof trough	Side panels	Rear panel	Door	Upgrade kit	Base plate	Trim strips
IP40 EMC	Yes	Roof EMC	No	Wall EMC	Wall EMC	Single door/ double door EMC	No	Base EMC	Yes

1) Mounting plates for direct mounting on the frame

Minimum order quantity (PS) or a multiple thereof can be ordered.

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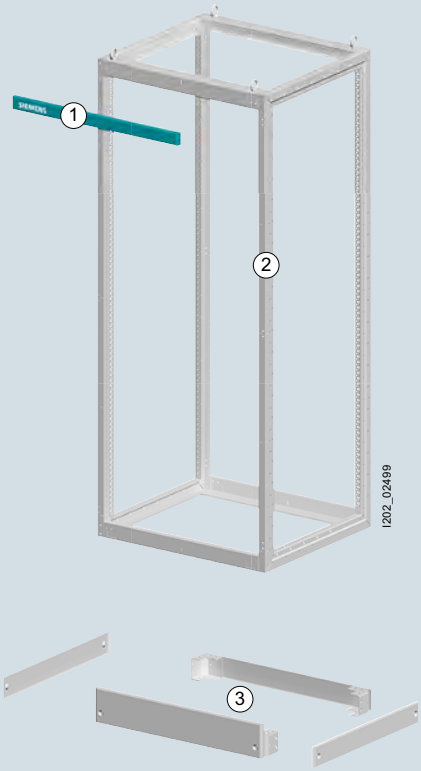
Overview

Frame parts



1 Trim strip
2 Frame
3 Base and base covers

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Overview

Note: The frames are delivered flat packed, i.e. non-assembled.

Selection and ordering data

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Powder-coated NEW									
	1 800	400	400		**8MF1844-2GS40**		1	1 unit	1BS
			500		**8MF1845-2GS40**		1	1 unit	1BS
			600		**8MF1846-2GS40**		1	1 unit	1BS
			800		**8MF1848-2GS40**		1	1 unit	1BS
			1 000		**8MF1840-2GS40**		1	1 unit	1BS
		600	400		**8MF1864-2GS40**		1	1 unit	1BS
			500		**8MF1865-2GS40**		1	1 unit	1BS
			600		**8MF1866-2GS40**		1	1 unit	1BS
			800		**8MF1868-2GS40**		1	1 unit	1BS
			1 000		**8MF1860-2GS40**		1	1 unit	1BS
		800	400		**8MF1884-2GS40**		1	1 unit	1BS
			500		**8MF1885-2GS40**		1	1 unit	1BS
			600		**8MF1886-2GS40**		1	1 unit	1BS
			800		**8MF1888-2GS40**		1	1 unit	1BS
			1 000		**8MF1880-2GS40**		1	1 unit	1BS
		900	400		**8MF1894-2GS40**		1	1 unit	1BS
			500		**8MF1895-2GS40**		1	1 unit	1BS
			600		**8MF1896-2GS40**		1	1 unit	1BS
			800		**8MF1898-2GS40**		1	1 unit	1BS
			1 000		**8MF1890-2GS40**		1	1 unit	1BS
		1 000	400		**8MF1804-2GS40**		1	1 unit	1BS
			500		**8MF1805-2GS40**		1	1 unit	1BS
			600		**8MF1806-2GS40**		1	1 unit	1BS
			800		**8MF1808-2GS40**		1	1 unit	1BS
			1 000		**8MF1800-2GS40**		1	1 unit	1BS
		1 200	400		**8MF1824-2GS40**		1	1 unit	1BS
			500		**8MF1825-2GS40**		1	1 unit	1BS
			600		**8MF1826-2GS40**		1	1 unit	1BS
			800		**8MF1828-2GS40**		1	1 unit	1BS
			1 000		**8MF1820-2GS40**		1	1 unit	1BS
	2 000	400	400		**8MF1044-2GS40**		1	1 unit	1BS
			500		**8MF1045-2GS40**		1	1 unit	1BS
			600		**8MF1046-2GS40**		1	1 unit	1BS
			800		**8MF1048-2GS40**		1	1 unit	1BS
			1 000		**8MF1040-2GS40**		1	1 unit	1BS
		600	400		**8MF1064-2GS40**		1	1 unit	1BS
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			1 000		**8MF1080-2GS40**		1	1 unit	1BS
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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400	400		**8MF1244-2GS40**		1	1 unit	1BS
		500		**8MF1245-2GS40**		1	1 unit	1BS
		600		**8MF1246-2GS40**		1	1 unit	1BS
		800		**8MF1248-2GS40**		1	1 unit	1BS
		1 000		**8MF1240-2GS40**		1	1 unit	1BS
	600	400		**8MF1264-2GS40**		1	1 unit	1BS
		500		**8MF1265-2GS40**		1	1 unit	1BS
		600		**8MF1266-2GS40**		1	1 unit	1BS
		800		**8MF1268-2GS40**		1	1 unit	1BS
		1 000		**8MF1260-2GS40**		1	1 unit	1BS
	800	400		**8MF1284-2GS40**		1	1 unit	1BS
		500		**8MF1285-2GS40**		1	1 unit	1BS
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		1 000		**8MF1280-2GS40**		1	1 unit	1BS
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		600		**8MF1296-2GS40**		1	1 unit	1BS
		800		**8MF1298-2GS40**		1	1 unit	1BS
		1 000		**8MF1290-2GS40**		1	1 unit	1BS
	1 000	400		**8MF1204-2GS40**		1	1 unit	1BS
		500		**8MF1205-2GS40**		1	1 unit	1BS
		600		**8MF1206-2GS40**		1	1 unit	1BS
		800		**8MF1208-2GS40**		1	1 unit	1BS
		1 000		**8MF1200-2GS40**		1	1 unit	1BS
	1 200	400		**8MF1224-2GS40**		1	1 unit	1BS
		500		**8MF1225-2GS40**		1	1 unit	1BS
		600		**8MF1226-2GS40**		1	1 unit	1BS
		800		**8MF1228-2GS40**		1	1 unit	1BS
		1 000		**8MF1220-2GS40**		1	1 unit	1BS

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Frames for standard enclosure > Enclosure

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Galvanized									
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			500 NEW		**8MF1845-2GS30**		1	1 unit	1BS
			600 NEW		**8MF1846-2GS30**		1	1 unit	1BS
			800 NEW		**8MF1848-2GS30**		1	1 unit	1BS
			1 000 NEW		**8MF1840-2GS30**		1	1 unit	1BS
		600	400		**8MF1864-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1865-2GS30**		1	1 unit	1BS
			600		**8MF1866-2GS30**		1	1 unit	1BS
			800		**8MF1868-2GS30**		1	1 unit	1BS
			1 000		**8MF1860-2GS30**		1	1 unit	1BS
		800	400		**8MF1884-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1885-2GS30**		1	1 unit	1BS
			600		**8MF1886-2GS30**		1	1 unit	1BS
			800		**8MF1888-2GS30**		1	1 unit	1BS
			1 000		**8MF1880-2GS30**		1	1 unit	1BS
		900	400		**8MF1894-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1895-2GS30**		1	1 unit	1BS
			600		**8MF1896-2GS30**		1	1 unit	1BS
			800		**8MF1898-2GS30**		1	1 unit	1BS
			1 000		**8MF1890-2GS30**		1	1 unit	1BS
		1 000	400		**8MF1804-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1805-2GS30**		1	1 unit	1BS
			600		**8MF1806-2GS30**		1	1 unit	1BS
			800		**8MF1808-2GS30**		1	1 unit	1BS
			1 000		**8MF1800-2GS30**		1	1 unit	1BS
		1 200	400		**8MF1824-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1825-2GS30**		1	1 unit	1BS
			600		**8MF1826-2GS30**		1	1 unit	1BS
			800		**8MF1828-2GS30**		1	1 unit	1BS
			1 000		**8MF1820-2GS30**		1	1 unit	1BS
	2 000	400	400 NEW		**8MF1044-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1045-2GS30**		1	1 unit	1BS
			600 NEW		**8MF1046-2GS30**		1	1 unit	1BS
			800 NEW		**8MF1048-2GS30**		1	1 unit	1BS
			1 000 NEW		**8MF1040-2GS30**		1	1 unit	1BS
		600	400		**8MF1064-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1065-2GS30**		1	1 unit	1BS
			600		**8MF1066-2GS30**		1	1 unit	1BS
			800		**8MF1068-2GS30**		1	1 unit	1BS
			1 000		**8MF1060-2GS30**		1	1 unit	1BS
		800	400		**8MF1084-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1085-2GS30**		1	1 unit	1BS
			600		**8MF1086-2GS30**		1	1 unit	1BS
			800		**8MF1088-2GS30**		1	1 unit	1BS
			1 000		**8MF1080-2GS30**		1	1 unit	1BS
		900	400		**8MF1094-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1095-2GS30**		1	1 unit	1BS
			600		**8MF1096-2GS30**		1	1 unit	1BS
			800		**8MF1098-2GS30**		1	1 unit	1BS
			1 000		**8MF1090-2GS30**		1	1 unit	1BS
		1 000	400		**8MF1004-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1005-2GS30**		1	1 unit	1BS
			600		**8MF1006-2GS30**		1	1 unit	1BS
			800		**8MF1008-2GS30**		1	1 unit	1BS
			1 000		**8MF1000-2GS30**		1	1 unit	1BS
		1 200	400		**8MF1024-2GS30**		1	1 unit	1BS
			500 NEW		**8MF1025-2GS30**		1	1 unit	1BS
			600		**8MF1026-2GS30**		1	1 unit	1BS
			800		**8MF1028-2GS30**		1	1 unit	1BS
			1 000		**8MF1020-2GS30**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400	400 NEW		**8MF1244-2GS30**		1	1 unit	1BS
		500 NEW		**8MF1245-2GS30**		1	1 unit	1BS
		600 NEW		**8MF1246-2GS30**		1	1 unit	1BS
		800 NEW		**8MF1248-2GS30**		1	1 unit	1BS
		1 000 NEW		**8MF1240-2GS30**		1	1 unit	1BS
	600	400		**8MF1264-2GS30**		1	1 unit	1BS
		500 NEW		**8MF1265-2GS30**		1	1 unit	1BS
		600		**8MF1266-2GS30**		1	1 unit	1BS
		800		**8MF1268-2GS30**		1	1 unit	1BS
		1 000		**8MF1260-2GS30**		1	1 unit	1BS
	800	400		**8MF1284-2GS30**		1	1 unit	1BS
		500 NEW		**8MF1285-2GS30**		1	1 unit	1BS
		600		**8MF1286-2GS30**		1	1 unit	1BS
		800		**8MF1288-2GS30**		1	1 unit	1BS
		1 000		**8MF1280-2GS30**		1	1 unit	1BS
	900	400		**8MF1294-2GS30**		1	1 unit	1BS
		500 NEW		**8MF1295-2GS30**		1	1 unit	1BS
		600		**8MF1296-2GS30**		1	1 unit	1BS
		800		**8MF1298-2GS30**		1	1 unit	1BS
		1 000		**8MF1290-2GS30**		1	1 unit	1BS
	1 000	400		**8MF1204-2GS30**		1	1 unit	1BS
		500 NEW		**8MF1205-2GS30**		1	1 unit	1BS
		600		**8MF1206-2GS30**		1	1 unit	1BS
		800		**8MF1208-2GS30**		1	1 unit	1BS
		1 000		**8MF1200-2GS30**		1	1 unit	1BS
	1 200	400		**8MF1224-2GS30**		1	1 unit	1BS
		500 NEW		**8MF1225-2GS30**		1	1 unit	1BS
		600		**8MF1226-2GS30**		1	1 unit	1BS
		800		**8MF1228-2GS30**		1	1 unit	1BS
		1 000		**8MF1220-2GS30**		1	1 unit	1BS

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Selection and ordering data

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Base									
For cubicles with door at the front and the rear NEW									
	100	400	--		**8MF1040-2CR**		1	1 unit	1BS
		600	--		**8MF1060-2CR**		1	1 unit	1BS
		800	--		**8MF1080-2CR**		1	1 unit	1BS
		900	--		**8MF1090-2CR**		1	1 unit	1BS
		1 000	--		**8MF1000-2CR**		1	1 unit	1BS
		1 200	--		**8MF1020-2CR**		1	1 unit	1BS
	200	400	--		**8MF1240-2CR**		1	1 unit	1BS
		600	--		**8MF1260-2CR**		1	1 unit	1BS
		800	--		**8MF1280-2CR**		1	1 unit	1BS
		900	--		**8MF1290-2CR**		1	1 unit	1BS
		1 000	--		**8MF1200-2CR**		1	1 unit	1BS
		1 200	--		**8MF1220-2CR**		1	1 unit	1BS
For cubicles with door at the front									
	100	400 NEW	--		**8MF1040-2CS**		1	1 unit	1BS
		600	--		**8MF1060-2CS**		1	1 unit	1BS
		800	--		**8MF1080-2CS**		1	1 unit	1BS
		900	--		**8MF1090-2CS**		1	1 unit	1BS
		1 000	--		**8MF1000-2CS**		1	1 unit	1BS
		1 200	--		**8MF1020-2CS**		1	1 unit	1BS
	200	400 NEW	--		**8MF1240-2CS**		1	1 unit	1BS
		600	--		**8MF1260-2CS**		1	1 unit	1BS
		800	--		**8MF1280-2CS**		1	1 unit	1BS
		900	--		**8MF1290-2CS**		1	1 unit	1BS
		1 000	--		**8MF1200-2CS**		1	1 unit	1BS
		1 200	--		**8MF1220-2CS**		1	1 unit	1BS
Base covers									
For cubicle sides									
	100	--	400		**8MF1004-2CT**		1	1 unit	1BS
			500 NEW		**8MF1005-2CT**		1	1 unit	1BS
			600		**8MF1006-2CT**		1	1 unit	1BS
			800		**8MF1008-2CT**		1	1 unit	1BS
			1 000		**8MF1000-2CT**		1	1 unit	1BS
	200	--	400		**8MF1204-2CT**		1	1 unit	1BS
			500 NEW		**8MF1205-2CT**		1	1 unit	1BS
			600		**8MF1206-2CT**		1	1 unit	1BS
			800		**8MF1208-2CT**		1	1 unit	1BS
			1 000		**8MF1200-2CT**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	m	d					
Separator								
For vertical division of the enclosure								
	1 800	--		**8MF1165-2AT30**		1	1 unit	1BS
	2 000	--		**8MF1185-2AT30**		1	1 unit	1BS
	2 200	--		**8MF1205-2AT30**		1	1 unit	1BS
Trim strip above the door								
With Siemens logo								
	--	0.4 NEW		**8MF1040-2CD10**		1	1 unit	1BS
		1		**8MF1000-2CD10**		1	1 unit	1BS
		0.6		**8MF1060-2CD10**		1	1 unit	1BS
		1.2		**8MF1020-2CD10**		1	1 unit	1BS
		0.8		**8MF1080-2CD10**		1	1 unit	1BS
		0.9		**8MF1090-2CD10**		1	1 unit	1BS
With Siemens logo, with cutout for indicator lights left								
	--	0.4 NEW		**8MF1040-2CD16**		1	1 unit	1BS
		1		**8MF1000-2CD16**		1	1 unit	1BS
		0.6		**8MF1060-2CD16**		1	1 unit	1BS
		1.2		**8MF1020-2CD16**		1	1 unit	1BS
		0.8		**8MF1080-2CD16**		1	1 unit	1BS
		0.9		**8MF1090-2CD16**		1	1 unit	1BS
With Siemens logo, with cutout for indicator lights right								
	--	0.4 NEW		**8MF1040-2CD17**		1	1 unit	1BS
		1		**8MF1000-2CD17**		1	1 unit	1BS
		0.6		**8MF1060-2CD17**		1	1 unit	1BS
		1.2		**8MF1020-2CD17**		1	1 unit	1BS
		0.8		**8MF1080-2CD17**		1	1 unit	1BS
		0.9		**8MF1090-2CD17**		1	1 unit	1BS
Unprocessed								
	--	0.4		**8MF1040-2CD00**		1	1 unit	1BS
		1		**8MF1000-2CD00**		1	1 unit	1BS
		0.6		**8MF1060-2CD00**		1	1 unit	1BS
		1.2		**8MF1020-2CD00**		1	1 unit	1BS
		0.8		**8MF1080-2CD00**		1	1 unit	1BS
		0.9		**8MF1090-2CD00**		1	1 unit	1BS
Trim strip below the door NEW								
Unprocessed								
	--	0.4		**8MF1040-2CD08**		1	1 unit	1BS
		1		**8MF1000-2CD08**		1	1 unit	1BS
		0.6		**8MF1060-2CD08**		1	1 unit	1BS
		1.2		**8MF1020-2CD08**		1	1 unit	1BS
		0.9		**8MF1090-2CD08**		1	1 unit	1BS
		0.8		**8MF1080-2CD08**		1	1 unit	1BS

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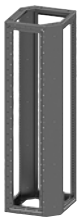
Frame for corner enclosure > Enclosure

Selection and ordering data

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Galvanized									
	1 800	400	400		**8MF1845-2GE30**		1	1 unit	1BS
		600	600		**8MF1867-2GE30**		1	1 unit	1BS
		800	800		**8MF1880-2GE30**		1	1 unit	1BS
		1 000	1 000		**8MF1801-2GE30**		1	1 unit	1BS
	2 000	400	400		**8MF1045-2GE30**		1	1 unit	1BS
		600	600		**8MF1067-2GE30**		1	1 unit	1BS
		800	800		**8MF1080-2GE30**		1	1 unit	1BS
		1 000	1 000		**8MF1001-2GE30**		1	1 unit	1BS
	2 200	400	400		**8MF1245-2GE30**		1	1 unit	1BS
		600	600		**8MF1267-2GE30**		1	1 unit	1BS
		800	800		**8MF1280-2GE30**		1	1 unit	1BS
		1 000	1 000		**8MF1201-2GE30**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm		d					
Base								
For corner cubicle								
	100	--		**8MF1000-2ES**		1	1 unit	1BS
	200	--		**8MF1200-2ES**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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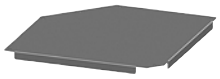
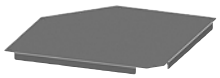
Selection and ordering data

	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	d					
For corner cubicle								
IP40								
	--	400		**8MF1004-2UE21-0**		1	1 unit	1BS
		600		**8MF1006-2UE21-0**		1	1 unit	1BS
		800		**8MF1008-2UE21-0**		1	1 unit	1BS
		1 000		**8MF1000-2UE21-0**		1	1 unit	1BS
IP55								
	--	400		**8MF1004-2UE11-0**		1	1 unit	1BS
		600		**8MF1006-2UE11-0**		1	1 unit	1BS
		800		**8MF1008-2UE11-0**		1	1 unit	1BS
		1 000		**8MF1000-2UE11-0**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Ventilation	EMC version	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			m	m	d					
Roof										
For corner cubicle										
IP40										
	No	No	0.4	0.4		**8MF1004-2UE10-0A**		1	1 unit	1BS
			1	1		**8MF1000-2UE10-0A**		1	1 unit	1BS
			0.6	0.6		**8MF1006-2UE10-0A**		1	1 unit	1BS
			0.8	0.8		**8MF1008-2UE10-0A**		1	1 unit	1BS
IP55										
	No	No	0.4	0.4		**8MF1004-2UE11-0A**		1	1 unit	1BS
			1	1		**8MF1000-2UE11-0A**		1	1 unit	1BS
			0.6	0.6		**8MF1006-2UE11-0A**		1	1 unit	1BS
			0.8	0.8		**8MF1008-2UE11-0A**		1	1 unit	1BS
For corner cubicle with ventilation openings										
IP20										
	Yes	No	--	400 mm		**8MF1004-2UE20-0A**		1	1 unit	1BS
				600 mm		**8MF1006-2UE20-0A**		1	1 unit	1BS
				800 mm		**8MF1008-2UE20-0A**		1	1 unit	1BS
				1 000 mm		**8MF1000-2UE20-0A**		1	1 unit	1BS
IP40										
	Yes	No	--	400 mm		**8MF1004-2UE30-0A**		1	1 unit	1BS
				600 mm		**8MF1006-2UE30-0A**		1	1 unit	1BS
				800 mm		**8MF1008-2UE30-0A**		1	1 unit	1BS
				1 000 mm		**8MF1000-2UE30-0A**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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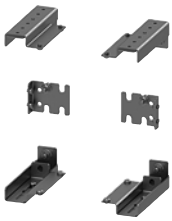
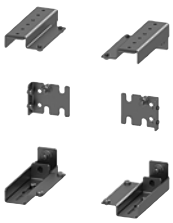
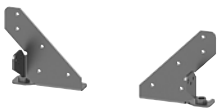
Accessories

Selection and ordering data

	Product version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Adapters NEW							
	For Lütze wiring system		**8MF1000-2HL**		1	1 unit	1BS
	For Promet wiring system		**8MF1000-2HP**		1	1 unit	1BS
Cubicle suites							
	Set of screws for cubicle suites		**8MF1000-2CA**		1	1 unit	1BS
	Sealing tape, for cubicle suites		**8MF1000-2CB**		1	1 unit	1BS
	Board coupling kit for cubicle suites		**8MF1000-2CE**		1	1 unit	1BS
Assembly kit NEW							
	For stabilization of the corner connections		**8MF1000-2HF**		1	1 unit	1BS
Grounding strap NEW							
	16 mm^2 31 mm^2		**8MF1000-2HK1** **8MF1000-2HK2**		1 1	1 unit 1 unit	1BS 1BS
Transport eyebolts							
	Load capacity up to 500 kg		**8MF1000-2CK**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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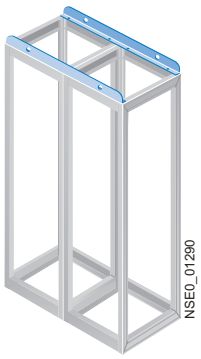
Selection and ordering data

	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	d					
Transport bracket							
Heavy duty							
	400		**8MF1040-2CW**		1	1 unit	1BS
	600		**8MF1060-2CW**		1	1 unit	1BS
	800		**8MF1080-2CW**		1	1 unit	1BS
	900		**8MF1090-2CW**		1	1 unit	1BS
	1 000		**8MF1000-2CW**		1	1 unit	1BS
	1 200		**8MF1020-2CW**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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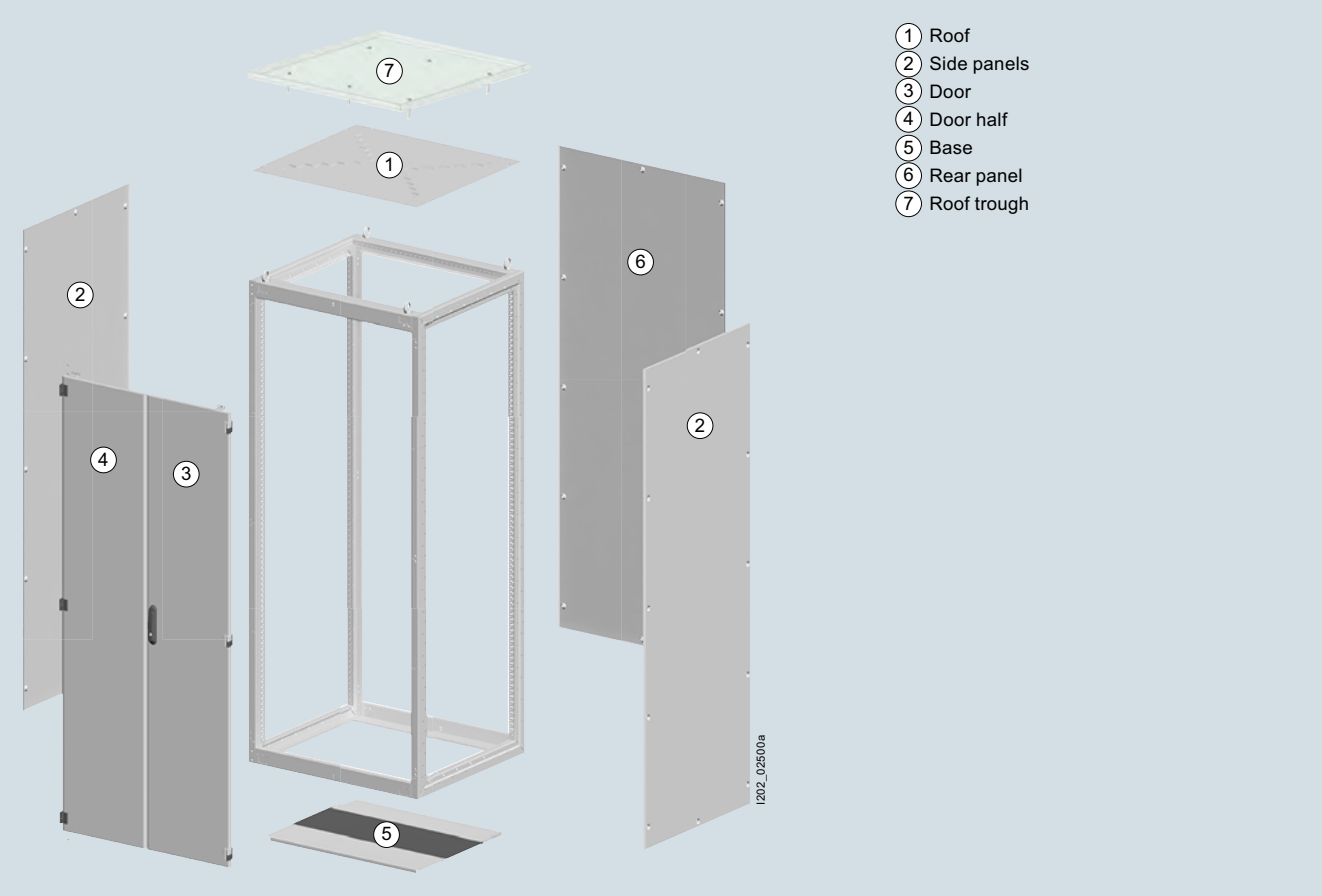
General data

Overview

Enclosure parts



SIVACON 8MF1 system cubicle

Minimum order quantity (PS) or a multiple thereof can be ordered.

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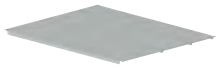
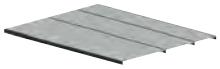
Selection and ordering data

Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	d					
EMC							
IP40							
							
400 NEW	400		**8MF1044-2UB42-0**		1	1 unit	1BS
	500		**8MF1045-2UB42-0**		1	1 unit	1BS
	600		**8MF1046-2UB42-0**		1	1 unit	1BS
	800		**8MF1048-2UB42-0**		1	1 unit	1BS
	1 000		**8MF1040-2UB42-0**		1	1 unit	1BS
600	400		**8MF1064-2UB42-0**		1	1 unit	1BS
	500 NEW		**8MF1065-2UB42-0**		1	1 unit	1BS
	600		**8MF1066-2UB42-0**		1	1 unit	1BS
	800		**8MF1068-2UB42-0**		1	1 unit	1BS
	1 000		**8MF1060-2UB42-0**		1	1 unit	1BS
800	400		**8MF1084-2UB42-0**		1	1 unit	1BS
	500 NEW		**8MF1085-2UB42-0**		1	1 unit	1BS
	600		**8MF1086-2UB42-0**		1	1 unit	1BS
	800		**8MF1088-2UB42-0**		1	1 unit	1BS
	1 000		**8MF1080-2UB42-0**		1	1 unit	1BS
900	400		**8MF1094-2UB42-0**		1	1 unit	1BS
	500 NEW		**8MF1095-2UB42-0**		1	1 unit	1BS
	600		**8MF1096-2UB42-0**		1	1 unit	1BS
	800		**8MF1098-2UB42-0**		1	1 unit	1BS
	1 000		**8MF1090-2UB42-0**		1	1 unit	1BS
1 000	400		**8MF1004-2UB42-0**		1	1 unit	1BS
	500 NEW		**8MF1005-2UB42-0**		1	1 unit	1BS
	600		**8MF1006-2UB42-0**		1	1 unit	1BS
	800		**8MF1008-2UB42-0**		1	1 unit	1BS
	1 000		**8MF1000-2UB42-0**		1	1 unit	1BS
1 200	400		**8MF1024-2UB42-0**		1	1 unit	1BS
	500 NEW		**8MF1025-2UB42-0**		1	1 unit	1BS
	600		**8MF1026-2UB42-0**		1	1 unit	1BS
	800		**8MF1028-2UB42-0**		1	1 unit	1BS
	1 000		**8MF1020-2UB42-0**		1	1 unit	1BS
Closed							
IP30							
							
400 NEW	400		**8MF1044-2UB22-0**		1	1 unit	1BS
	500		**8MF1045-2UB22-0**		1	1 unit	1BS
	600		**8MF1046-2UB22-0**		1	1 unit	1BS
	800		**8MF1048-2UB22-0**		1	1 unit	1BS
	1 000		**8MF1040-2UB22-0**		1	1 unit	1BS
600	400		**8MF1064-2UB22-0**		1	1 unit	1BS
	500 NEW		**8MF1065-2UB22-0**		1	1 unit	1BS
	600		**8MF1066-2UB22-0**		1	1 unit	1BS
	800		**8MF1068-2UB22-0**		1	1 unit	1BS
	1 000		**8MF1060-2UB22-0**		1	1 unit	1BS
800	400		**8MF1084-2UB22-0**		1	1 unit	1BS
	500 NEW		**8MF1085-2UB22-0**		1	1 unit	1BS
	600		**8MF1086-2UB22-0**		1	1 unit	1BS
	800		**8MF1088-2UB22-0**		1	1 unit	1BS
	1 000		**8MF1080-2UB22-0**		1	1 unit	1BS
900	400		**8MF1094-2UB22-0**		1	1 unit	1BS
	500 NEW		**8MF1095-2UB22-0**		1	1 unit	1BS
	600		**8MF1096-2UB22-0**		1	1 unit	1BS
	800		**8MF1098-2UB22-0**		1	1 unit	1BS
	1 000		**8MF1090-2UB22-0**		1	1 unit	1BS
1 000	400		**8MF1004-2UB22-0**		1	1 unit	1BS
	500 NEW		**8MF1005-2UB22-0**		1	1 unit	1BS
	600		**8MF1006-2UB22-0**		1	1 unit	1BS
	800		**8MF1008-2UB22-0**		1	1 unit	1BS
	1 000		**8MF1000-2UB22-0**		1	1 unit	1BS
1 200	400		**8MF1024-2UB22-0**		1	1 unit	1BS
	500 NEW		**8MF1025-2UB22-0**		1	1 unit	1BS
	600		**8MF1026-2UB22-0**		1	1 unit	1BS
	800		**8MF1028-2UB22-0**		1	1 unit	1BS
	1 000		**8MF1020-2UB22-0**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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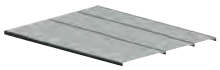
Floor

Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	d					
IP55							
							
400 NEW	400		**8MF1044-2UB12-0**		1	1 unit	1BS
	500		**8MF1045-2UB12-0**		1	1 unit	1BS
	600		**8MF1046-2UB12-0**		1	1 unit	1BS
	800		**8MF1048-2UB12-0**		1	1 unit	1BS
	1 000		**8MF1040-2UB12-0**		1	1 unit	1BS
600	400		**8MF1064-2UB12-0**		1	1 unit	1BS
	500 NEW		**8MF1065-2UB12-0**		1	1 unit	1BS
	600		**8MF1066-2UB12-0**		1	1 unit	1BS
	800		**8MF1068-2UB12-0**		1	1 unit	1BS
	1 000		**8MF1060-2UB12-0**		1	1 unit	1BS
800	400		**8MF1084-2UB12-0**		1	1 unit	1BS
	500 NEW		**8MF1085-2UB12-0**		1	1 unit	1BS
	600		**8MF1086-2UB12-0**		1	1 unit	1BS
	800		**8MF1088-2UB12-0**		1	1 unit	1BS
	1 000		**8MF1080-2UB12-0**		1	1 unit	1BS
900	400		**8MF1094-2UB12-0**		1	1 unit	1BS
	500 NEW		**8MF1095-2UB12-0**		1	1 unit	1BS
	600		**8MF1096-2UB12-0**		1	1 unit	1BS
	800		**8MF1098-2UB12-0**		1	1 unit	1BS
	1 000		**8MF1090-2UB12-0**		1	1 unit	1BS
1 000	400		**8MF1004-2UB12-0**		1	1 unit	1BS
	500 NEW		**8MF1005-2UB12-0**		1	1 unit	1BS
	600		**8MF1006-2UB12-0**		1	1 unit	1BS
	800		**8MF1008-2UB12-0**		1	1 unit	1BS
	1 000		**8MF1000-2UB12-0**		1	1 unit	1BS
1 200	400		**8MF1024-2UB12-0**		1	1 unit	1BS
	500 NEW		**8MF1025-2UB12-0**		1	1 unit	1BS
	600		**8MF1026-2UB12-0**		1	1 unit	1BS
	800		**8MF1028-2UB12-0**		1	1 unit	1BS
	1 000		**8MF1020-2UB12-0**		1	1 unit	1BS
With cutouts for flanges NEW							
IPXX							
							
400	400		**8MF1044-2UB52-0**		1	1 unit	1BS
	500		**8MF1045-2UB52-0**		1	1 unit	1BS
	600		**8MF1046-2UB52-0**		1	1 unit	1BS
	800		**8MF1048-2UB52-0**		1	1 unit	1BS
	1 000		**8MF1040-2UB52-0**		1	1 unit	1BS
600	400		**8MF1064-2UB52-0**		1	1 unit	1BS
	500		**8MF1065-2UB52-0**		1	1 unit	1BS
	600		**8MF1066-2UB52-0**		1	1 unit	1BS
	800		**8MF1068-2UB52-0**		1	1 unit	1BS
	1 000		**8MF1060-2UB52-0**		1	1 unit	1BS
800	400		**8MF1084-2UB52-0**		1	1 unit	1BS
	500		**8MF1085-2UB52-0**		1	1 unit	1BS
	600		**8MF1086-2UB52-0**		1	1 unit	1BS
	800		**8MF1088-2UB52-0**		1	1 unit	1BS
	1 000		**8MF1080-2UB52-0**		1	1 unit	1BS
900	400		**8MF1094-2UB52-0**		1	1 unit	1BS
	500		**8MF1095-2UB52-0**		1	1 unit	1BS
	600		**8MF1096-2UB52-0**		1	1 unit	1BS
	800		**8MF1098-2UB52-0**		1	1 unit	1BS
	1 000		**8MF1090-2UB52-0**		1	1 unit	1BS
1 000	400		**8MF1004-2UB52-0**		1	1 unit	1BS
	500		**8MF1005-2UB52-0**		1	1 unit	1BS
	600		**8MF1006-2UB52-0**		1	1 unit	1BS
	800		**8MF1008-2UB52-0**		1	1 unit	1BS
	1 000		**8MF1000-2UB52-0**		1	1 unit	1BS
1 200	400		**8MF1024-2UB52-0**		1	1 unit	1BS
	500		**8MF1025-2UB52-0**		1	1 unit	1BS
	600		**8MF1026-2UB52-0**		1	1 unit	1BS
	800		**8MF1028-2UB52-0**		1	1 unit	1BS
	1 000		**8MF1020-2UB52-0**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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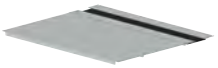
	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	d					
With cable entry								
IPXX								
	400 NEW	400		**8MF1044-2UB32-0**		1	1 unit	1BS
		500		**8MF1045-2UB32-0**		1	1 unit	1BS
		600		**8MF1046-2UB32-0**		1	1 unit	1BS
		800		**8MF1048-2UB32-0**		1	1 unit	1BS
		1 000		**8MF1040-2UB32-0**		1	1 unit	1BS
	600	400		**8MF1064-2UB32-0**		1	1 unit	1BS
		500 NEW		**8MF1065-2UB32-0**		1	1 unit	1BS
		600		**8MF1066-2UB32-0**		1	1 unit	1BS
		800		**8MF1068-2UB32-0**		1	1 unit	1BS
		1 000		**8MF1060-2UB32-0**		1	1 unit	1BS
	800	400		**8MF1084-2UB32-0**		1	1 unit	1BS
		500 NEW		**8MF1085-2UB32-0**		1	1 unit	1BS
		600		**8MF1086-2UB32-0**		1	1 unit	1BS
		800		**8MF1088-2UB32-0**		1	1 unit	1BS
		1 000		**8MF1080-2UB32-0**		1	1 unit	1BS
	900	400		**8MF1094-2UB32-0**		1	1 unit	1BS
		500 NEW		**8MF1095-2UB32-0**		1	1 unit	1BS
		600		**8MF1096-2UB32-0**		1	1 unit	1BS
		800		**8MF1098-2UB32-0**		1	1 unit	1BS
		1 000		**8MF1090-2UB32-0**		1	1 unit	1BS
	1 000	400		**8MF1004-2UB32-0**		1	1 unit	1BS
		500 NEW		**8MF1005-2UB32-0**		1	1 unit	1BS
		600		**8MF1006-2UB32-0**		1	1 unit	1BS
		800		**8MF1008-2UB32-0**		1	1 unit	1BS
		1 000		**8MF1000-2UB32-0**		1	1 unit	1BS
	1 200	400		**8MF1024-2UB32-0**		1	1 unit	1BS
		500 NEW		**8MF1025-2UB32-0**		1	1 unit	1BS
		600		**8MF1026-2UB32-0**		1	1 unit	1BS
		800		**8MF1028-2UB32-0**		1	1 unit	1BS
		1 000		**8MF1020-2UB32-0**		1	1 unit	1BS

	Ventilation	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	d					
With lateral cable entry NEW									
	No	600	600		**8MF1066-2UB51-2**		1	1 unit	1BS
			800		**8MF1068-2UB51-2**		1	1 unit	1BS
			1 000		**8MF1060-2UB51-2**		1	1 unit	1BS
		800	600		**8MF1086-2UB51-2**		1	1 unit	1BS
			800		**8MF1088-2UB51-2**		1	1 unit	1BS
			1 000		**8MF1080-2UB51-2**		1	1 unit	1BS
		900	600		**8MF1096-2UB51-2**		1	1 unit	1BS
			800		**8MF1098-2UB51-2**		1	1 unit	1BS
			1 000		**8MF1090-2UB51-2**		1	1 unit	1BS
		1 000	600		**8MF1006-2UB51-2**		1	1 unit	1BS
			800		**8MF1008-2UB51-2**		1	1 unit	1BS
			1 000		**8MF1000-2UB51-2**		1	1 unit	1BS
		1 200	600		**8MF1026-2UB51-2**		1	1 unit	1BS
			800		**8MF1028-2UB51-2**		1	1 unit	1BS
			1 000		**8MF1020-2UB51-2**		1	1 unit	1BS

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Selection and ordering data

Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	d					
Roof							
EMC, IP40							
400 NEW	400		**8MF1044-2UD12-0A**		1	1 unit	1BS
	500		**8MF1045-2UD12-0A**		1	1 unit	1BS
	600		**8MF1046-2UD12-0A**		1	1 unit	1BS
	800		**8MF1048-2UD12-0A**		1	1 unit	1BS
	1 000		**8MF1040-2UD12-0A**		1	1 unit	1BS
600	400		**8MF1064-2UD12-0A**		1	1 unit	1BS
	500 NEW		**8MF1065-2UD12-0A**		1	1 unit	1BS
	600		**8MF1066-2UD12-0A**		1	1 unit	1BS
	800		**8MF1068-2UD12-0A**		1	1 unit	1BS
	1 000		**8MF1060-2UD12-0A**		1	1 unit	1BS
800	400		**8MF1084-2UD12-0A**		1	1 unit	1BS
	500 NEW		**8MF1085-2UD12-0A**		1	1 unit	1BS
	600		**8MF1086-2UD12-0A**		1	1 unit	1BS
	800		**8MF1088-2UD12-0A**		1	1 unit	1BS
	1 000		**8MF1080-2UD12-0A**		1	1 unit	1BS
900	400		**8MF1094-2UD12-0A**		1	1 unit	1BS
	500 NEW		**8MF1095-2UD12-0A**		1	1 unit	1BS
	600		**8MF1096-2UD12-0A**		1	1 unit	1BS
	800		**8MF1098-2UD12-0A**		1	1 unit	1BS
	1 000		**8MF1090-2UD12-0A**		1	1 unit	1BS
1 000	400		**8MF1004-2UD12-0A**		1	1 unit	1BS
	500 NEW		**8MF1005-2UD12-0A**		1	1 unit	1BS
	600		**8MF1006-2UD12-0A**		1	1 unit	1BS
	800		**8MF1008-2UD12-0A**		1	1 unit	1BS
	1 000		**8MF1000-2UD12-0A**		1	1 unit	1BS
1 200	400		**8MF1024-2UD12-0A**		1	1 unit	1BS
	500 NEW		**8MF1025-2UD12-0A**		1	1 unit	1BS
	600		**8MF1026-2UD12-0A**		1	1 unit	1BS
	800		**8MF1028-2UD12-0A**		1	1 unit	1BS
	1 000		**8MF1020-2UD12-0A**		1	1 unit	1BS
Closed, IP40							
400 NEW	400		**8MF1044-2UD10-0A**		1	1 unit	1BS
	500		**8MF1045-2UD10-0A**		1	1 unit	1BS
	600		**8MF1046-2UD10-0A**		1	1 unit	1BS
	800		**8MF1048-2UD10-0A**		1	1 unit	1BS
	1 000		**8MF1040-2UD10-0A**		1	1 unit	1BS
600	400		**8MF1064-2UD10-0A**		1	1 unit	1BS
	500 NEW		**8MF1065-2UD10-0A**		1	1 unit	1BS
	600		**8MF1066-2UD10-0A**		1	1 unit	1BS
	800		**8MF1068-2UD10-0A**		1	1 unit	1BS
	1 000		**8MF1060-2UD10-0A**		1	1 unit	1BS
800	400		**8MF1084-2UD10-0A**		1	1 unit	1BS
	500 NEW		**8MF1085-2UD10-0A**		1	1 unit	1BS
	600		**8MF1086-2UD10-0A**		1	1 unit	1BS
	800		**8MF1088-2UD10-0A**		1	1 unit	1BS
	1 000		**8MF1080-2UD10-0A**		1	1 unit	1BS
900	400		**8MF1094-2UD10-0A**		1	1 unit	1BS
	500 NEW		**8MF1095-2UD10-0A**		1	1 unit	1BS
	600		**8MF1096-2UD10-0A**		1	1 unit	1BS
	800		**8MF1098-2UD10-0A**		1	1 unit	1BS
	1 000		**8MF1090-2UD10-0A**		1	1 unit	1BS
1 000	400		**8MF1004-2UD10-0A**		1	1 unit	1BS
	500 NEW		**8MF1005-2UD10-0A**		1	1 unit	1BS
	600		**8MF1006-2UD10-0A**		1	1 unit	1BS
	800		**8MF1008-2UD10-0A**		1	1 unit	1BS
	1 000		**8MF1000-2UD10-0A**		1	1 unit	1BS
1 200	400		**8MF1024-2UD10-0A**		1	1 unit	1BS
	500 NEW		**8MF1025-2UD10-0A**		1	1 unit	1BS
	600		**8MF1026-2UD10-0A**		1	1 unit	1BS
	800		**8MF1028-2UD10-0A**		1	1 unit	1BS
	1 000		**8MF1020-2UD10-0A**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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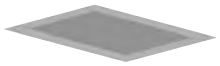
	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	d					
IP55								
	400 NEW	400		**8MF1044-2UD11-0A**		1	1 unit	1BS
		500		**8MF1045-2UD11-0A**		1	1 unit	1BS
		600		**8MF1046-2UD11-0A**		1	1 unit	1BS
		800		**8MF1048-2UD11-0A**		1	1 unit	1BS
		1 000		**8MF1040-2UD11-0A**		1	1 unit	1BS
	600	400		**8MF1064-2UD11-0A**		1	1 unit	1BS
		500 NEW		**8MF1065-2UD11-0A**		1	1 unit	1BS
		600		**8MF1066-2UD11-0A**		1	1 unit	1BS
		800		**8MF1068-2UD11-0A**		1	1 unit	1BS
		1 000		**8MF1060-2UD11-0A**		1	1 unit	1BS
	800	400		**8MF1084-2UD11-0A**		1	1 unit	1BS
		500 NEW		**8MF1085-2UD11-0A**		1	1 unit	1BS
		600		**8MF1086-2UD11-0A**		1	1 unit	1BS
		800		**8MF1088-2UD11-0A**		1	1 unit	1BS
		1 000		**8MF1080-2UD11-0A**		1	1 unit	1BS
	900	400		**8MF1094-2UD11-0A**		1	1 unit	1BS
		500 NEW		**8MF1095-2UD11-0A**		1	1 unit	1BS
		600		**8MF1096-2UD11-0A**		1	1 unit	1BS
		800		**8MF1098-2UD11-0A**		1	1 unit	1BS
		1 000		**8MF1090-2UD11-0A**		1	1 unit	1BS
	1 000	400		**8MF1004-2UD11-0A**		1	1 unit	1BS
		500 NEW		**8MF1005-2UD11-0A**		1	1 unit	1BS
		600		**8MF1006-2UD11-0A**		1	1 unit	1BS
		800		**8MF1008-2UD11-0A**		1	1 unit	1BS
		1 000		**8MF1000-2UD11-0A**		1	1 unit	1BS
	1 200	400		**8MF1024-2UD11-0A**		1	1 unit	1BS
		500 NEW		**8MF1025-2UD11-0A**		1	1 unit	1BS
		600		**8MF1026-2UD11-0A**		1	1 unit	1BS
		800		**8MF1028-2UD11-0A**		1	1 unit	1BS
		1 000		**8MF1020-2UD11-0A**		1	1 unit	1BS
With ventilation openings, IP20								
	400 NEW	400		**8MF1044-2UD20-0A**		1	1 unit	1BS
		500		**8MF1045-2UD20-0A**		1	1 unit	1BS
		600		**8MF1046-2UD20-0A**		1	1 unit	1BS
		800		**8MF1048-2UD20-0A**		1	1 unit	1BS
		1 000		**8MF1040-2UD20-0A**		1	1 unit	1BS
	600	400		**8MF1064-2UD20-0A**		1	1 unit	1BS
		500 NEW		**8MF1065-2UD20-0A**		1	1 unit	1BS
		600		**8MF1066-2UD20-0A**		1	1 unit	1BS
		800		**8MF1068-2UD20-0A**		1	1 unit	1BS
		1 000		**8MF1060-2UD20-0A**		1	1 unit	1BS
	800	400		**8MF1084-2UD20-0A**		1	1 unit	1BS
		500 NEW		**8MF1085-2UD20-0A**		1	1 unit	1BS
		600		**8MF1086-2UD20-0A**		1	1 unit	1BS
		800		**8MF1088-2UD20-0A**		1	1 unit	1BS
		1 000		**8MF1080-2UD20-0A**		1	1 unit	1BS
	900	400		**8MF1094-2UD20-0A**		1	1 unit	1BS
		500 NEW		**8MF1095-2UD20-0A**		1	1 unit	1BS
		600		**8MF1096-2UD20-0A**		1	1 unit	1BS
		800		**8MF1098-2UD20-0A**		1	1 unit	1BS
		1 000		**8MF1090-2UD20-0A**		1	1 unit	1BS
	1 000	400		**8MF1004-2UD20-0A**		1	1 unit	1BS
		500 NEW		**8MF1005-2UD20-0A**		1	1 unit	1BS
		600		**8MF1006-2UD20-0A**		1	1 unit	1BS
		800		**8MF1008-2UD20-0A**		1	1 unit	1BS
		1 000		**8MF1000-2UD20-0A**		1	1 unit	1BS
	1 200	400		**8MF1024-2UD20-0A**		1	1 unit	1BS
		500 NEW		**8MF1025-2UD20-0A**		1	1 unit	1BS
		600		**8MF1026-2UD20-0A**		1	1 unit	1BS
		800		**8MF1028-2UD20-0A**		1	1 unit	1BS
		1 000		**8MF1020-2UD20-0A**		1	1 unit	1BS

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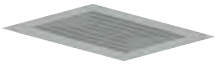
Roofs

	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	d					
IP40								
	400 NEW	400		**8MF1044-2UD30-0**		1	1 unit	1BS
		500		**8MF1045-2UD30-0A**		1	1 unit	1BS
		600		**8MF1046-2UD30-0A**		1	1 unit	1BS
		800		**8MF1048-2UD30-0A**		1	1 unit	1BS
		1 000		**8MF1040-2UD30-0A**		1	1 unit	1BS
	600	400		**8MF1064-2UD30-0A**		1	1 unit	1BS
		500 NEW		**8MF1065-2UD30-0A**		1	1 unit	1BS
		600		**8MF1066-2UD30-0A**		1	1 unit	1BS
		800		**8MF1068-2UD30-0A**		1	1 unit	1BS
		1 000		**8MF1060-2UD30-0A**		1	1 unit	1BS
	800	400		**8MF1084-2UD30-0A**		1	1 unit	1BS
		500 NEW		**8MF1085-2UD30-0A**		1	1 unit	1BS
		600		**8MF1086-2UD30-0A**		1	1 unit	1BS
		800		**8MF1088-2UD30-0A**		1	1 unit	1BS
		1 000		**8MF1080-2UD30-0A**		1	1 unit	1BS
	900	400		**8MF1094-2UD30-0A**		1	1 unit	1BS
		500 NEW		**8MF1095-2UD30-0A**		1	1 unit	1BS
		600		**8MF1096-2UD30-0A**		1	1 unit	1BS
		800		**8MF1098-2UD30-0A**		1	1 unit	1BS
		1 000		**8MF1090-2UD30-0A**		1	1 unit	1BS
	1 000	400		**8MF1004-2UD30-0A**		1	1 unit	1BS
		500 NEW		**8MF1005-2UD30-0A**		1	1 unit	1BS
		600		**8MF1006-2UD30-0A**		1	1 unit	1BS
		800		**8MF1008-2UD30-0A**		1	1 unit	1BS
		1 000		**8MF1000-2UD30-0A**		1	1 unit	1BS
	1 200	400		**8MF1024-2UD30-0A**		1	1 unit	1BS
		500 NEW		**8MF1025-2UD30-0A**		1	1 unit	1BS
		600		**8MF1026-2UD30-0A**		1	1 unit	1BS
		800		**8MF1028-2UD30-0A**		1	1 unit	1BS
		1 000		**8MF1020-2UD30-0A**		1	1 unit	1BS
Roof trough								
For increasing the degree of protection, IPX1								
	400 NEW	400		**8MF1044-2VH**		1	1 unit	1BS
		500		**8MF1045-2VH**		1	1 unit	1BS
		600		**8MF1046-2VH**		1	1 unit	1BS
		800		**8MF1048-2VH**		1	1 unit	1BS
		1 000		**8MF1040-2VH**		1	1 unit	1BS
	600	400		**8MF1064-2VH**		1	1 unit	1BS
		500 NEW		**8MF1065-2VH**		1	1 unit	1BS
		600		**8MF1066-2VH**		1	1 unit	1BS
		800		**8MF1068-2VH**		1	1 unit	1BS
		1 000		**8MF1060-2VH**		1	1 unit	1BS
	800	400		**8MF1084-2VH**		1	1 unit	1BS
		500 NEW		**8MF1085-2VH**		1	1 unit	1BS
		600		**8MF1086-2VH**		1	1 unit	1BS
		800		**8MF1088-2VH**		1	1 unit	1BS
		1 000		**8MF1080-2VH**		1	1 unit	1BS
	900	400		**8MF1094-2VH**		1	1 unit	1BS
		500 NEW		**8MF1095-2VH**		1	1 unit	1BS
		600		**8MF1096-2VH**		1	1 unit	1BS
		800		**8MF1098-2VH**		1	1 unit	1BS
		1 000		**8MF1090-2VH**		1	1 unit	1BS
	1 000	400		**8MF1004-2VH**		1	1 unit	1BS
		500 NEW		**8MF1005-2VH**		1	1 unit	1BS
		600		**8MF1006-2VH**		1	1 unit	1BS
		800		**8MF1008-2VH**		1	1 unit	1BS
		1 000		**8MF1000-2VH**		1	1 unit	1BS
	1 200	400		**8MF1024-2VH**		1	1 unit	1BS
		500 NEW		**8MF1025-2VH**		1	1 unit	1BS
		600		**8MF1026-2VH**		1	1 unit	1BS
		800		**8MF1028-2VH**		1	1 unit	1BS
		1 000		**8MF1020-2VH**		1	1 unit	1BS
Roof tray rim NEW								
For cubicle side, IPX1								
Two roof tray rims must be ordered for every cubicle/cubicle group with a roof trough.								
	--	400		**8MF1004-2VB**		1	1 unit	1BS
		500		**8MF1005-2VB**		1	1 unit	1BS
		600		**8MF1006-2VB**		1	1 unit	1BS
		800		**8MF1008-2VB**		1	1 unit	1BS
		1 000		**8MF1000-2VB**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	RAL color number	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		m	m	m	d					
Side panel/rear panel										
EMC										
IP40										
	RAL 7035	2	0.4	0.4		**8MF1040-2UW62-1B**		1	1 unit	1BS
			1	1		**8MF1000-2UW62-1B**		1	1 unit	1BS
			0.6	0.6		**8MF1060-2UW62-1B**		1	1 unit	1BS
			1.2	1.2		**8MF1020-2UW62-1B**		1	1 unit	1BS
			0.8	0.8		**8MF1080-2UW62-1B**		1	1 unit	1BS
			0.9	0.9		**8MF1090-2UW62-1B**		1	1 unit	1BS
		2.2	0.4	0.4		**8MF1240-2UW62-1B**		1	1 unit	1BS
			1	1		**8MF1200-2UW62-1B**		1	1 unit	1BS
			0.6	0.6		**8MF1260-2UW62-1B**		1	1 unit	1BS
			1.2	1.2		**8MF1220-2UW62-1B**		1	1 unit	1BS
			0.8	0.8		**8MF1280-2UW62-1B**		1	1 unit	1BS
			0.9	0.9		**8MF1290-2UW62-1B**		1	1 unit	1BS
		1.8	0.4	0.4		**8MF1840-2UW62-1B**		1	1 unit	1BS
			1	1		**8MF1800-2UW62-1B**		1	1 unit	1BS
			0.6	0.6		**8MF1860-2UW62-1B**		1	1 unit	1BS
			1.2	1.2		**8MF1820-2UW62-1B**		1	1 unit	1BS
			0.8	0.8		**8MF1880-2UW62-1B**		1	1 unit	1BS
			0.9	0.9		**8MF1890-2UW62-1B**		1	1 unit	1BS
Flat NEW										
IP40										
	RAL 7035	2	0.8	0.8		**8MF1080-2UW63-1C**		1	1 unit	1BS
		2.2	0.4	0.4		**8MF1240-2UW63-1C**		1	1 unit	1BS
			1	1		**8MF1200-2UW63-1C**		1	1 unit	1BS
		2	0.4	0.4		**8MF1040-2UW63-1C**		1	1 unit	1BS
			1	1		**8MF1000-2UW63-1C**		1	1 unit	1BS
			0.6	0.6		**8MF1060-2UW63-1C**		1	1 unit	1BS
		2.2	0.6	0.6		**8MF1260-2UW63-1C**		1	1 unit	1BS
		1.8	0.6	0.6		**8MF1860-2UW63-1C**		1	1 unit	1BS
			0.8	0.8		**8MF1880-2UW63-1C**		1	1 unit	1BS
			0.4	0.4		**8MF1840-2UW63-1C**		1	1 unit	1BS
		2.2	0.8	0.8		**8MF1280-2UW63-1C**		1	1 unit	1BS
		1.8	1	1		**8MF1800-2UW63-1C**		1	1 unit	1BS
Closed										
IP40										
	RAL 7035 NEW	2	0.5	0.5		**8MF1050-2UW60-1C**		1	1 unit	1BS
		2.2	0.5	0.5		**8MF1250-2UW60-1C**		1	1 unit	1BS
		1.8	0.5	0.5		**8MF1850-2UW60-1C**		1	1 unit	1BS
	RAL 7035	2	0.4	0.4		**8MF1040-2UW60-1C**		1	1 unit	1BS
			1	1		**8MF1000-2UW60-1C**		1	1 unit	1BS
			0.6	0.6		**8MF1060-2UW60-1C**		1	1 unit	1BS
			1.2	1.2		**8MF1020-2UW60-1C**		1	1 unit	1BS
			0.8	0.8		**8MF1080-2UW60-1C**		1	1 unit	1BS
			0.9	0.9		**8MF1090-2UW60-1C**		1	1 unit	1BS
		2.2	0.4	0.4		**8MF1240-2UW60-1C**		1	1 unit	1BS
			1	1		**8MF1200-2UW60-1C**		1	1 unit	1BS
			0.6	0.6		**8MF1260-2UW60-1C**		1	1 unit	1BS
			1.2	1.2		**8MF1220-2UW60-1C**		1	1 unit	1BS
			0.8	0.8		**8MF1280-2UW60-1C**		1	1 unit	1BS
			0.9	0.9		**8MF1290-2UW60-1C**		1	1 unit	1BS
		1.8	0.4	0.4		**8MF1840-2UW60-1C**		1	1 unit	1BS
			1	1		**8MF1800-2UW60-1C**		1	1 unit	1BS
			0.6	0.6		**8MF1860-2UW60-1C**		1	1 unit	1BS
			1.2	1.2		**8MF1820-2UW60-1C**		1	1 unit	1BS
			0.8	0.8		**8MF1880-2UW60-1C**		1	1 unit	1BS
			0.9	0.9		**8MF1890-2UW60-1C**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Panels

	RAL color number	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		m	m	m	d					
IP55										
	RAL 7035 NEW	2	0.5	0.5		**8MF1050-2UW61-1C**		1	1 unit	1BS
		2.2	0.5	0.5		**8MF1250-2UW61-1C**		1	1 unit	1BS
		1.8	0.5	0.5		**8MF1850-2UW61-1C**		1	1 unit	1BS
	RAL 7035	2	0.4	0.4		**8MF1040-2UW61-1C**		1	1 unit	1BS
			1	1		**8MF1000-2UW61-1C**		1	1 unit	1BS
			0.6	0.6		**8MF1060-2UW61-1C**		1	1 unit	1BS
			1.2	1.2		**8MF1020-2UW61-1C**		1	1 unit	1BS
			0.8	0.8		**8MF1080-2UW61-1C**		1	1 unit	1BS
			0.9	0.9		**8MF1090-2UW61-1C**		1	1 unit	1BS
		2.2	0.4	0.4		**8MF1240-2UW61-1C**		1	1 unit	1BS
			1	1		**8MF1200-2UW61-1C**		1	1 unit	1BS
			0.6	0.6		**8MF1260-2UW61-1C**		1	1 unit	1BS
			1.2	1.2		**8MF1220-2UW61-1C**		1	1 unit	1BS
			0.8	0.8		**8MF1280-2UW61-1C**		1	1 unit	1BS
			0.9	0.9		**8MF1290-2UW61-1C**		1	1 unit	1BS
		1.8	0.4	0.4		**8MF1840-2UW61-1C**		1	1 unit	1BS
			1	1		**8MF1800-2UW61-1C**		1	1 unit	1BS
			0.6	0.6		**8MF1860-2UW61-1C**		1	1 unit	1BS
			1.2	1.2		**8MF1820-2UW61-1C**		1	1 unit	1BS
			0.8	0.8		**8MF1880-2UW61-1C**		1	1 unit	1BS
			0.9	0.9		**8MF1890-2UW61-1C**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Width	Height	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm		d					
Partition									
For side-by-side enclosures									
	400	1 800	--		**8MF1840-2UW70-3C**		1	1 unit	1BS
		2 000	--		**8MF1040-2UW70-3C**		1	1 unit	1BS
		2 200	--		**8MF1240-2UW70-3C**		1	1 unit	1BS
	600	1 800	--		**8MF1860-2UW70-3C**		1	1 unit	1BS
		2 000	--		**8MF1060-2UW70-3C**		1	1 unit	1BS
		2 200	--		**8MF1260-2UW70-3C**		1	1 unit	1BS
	800	1 800	--		**8MF1880-2UW70-3C**		1	1 unit	1BS
		2 000	--		**8MF1080-2UW70-3C**		1	1 unit	1BS
		2 200	--		**8MF1280-2UW70-3C**		1	1 unit	1BS
	1 000	1 800	--		**8MF1800-2UW70-3C**		1	1 unit	1BS
		2 000	--		**8MF1000-2UW70-3C**		1	1 unit	1BS
		2 200	--		**8MF1200-2UW70-3C**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Doors > With rotary handle

Selection and ordering data

	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
Modular door										
Closed **IP40** Additional holes are required on the frame. These are installed at the factory when a mounted control cubicle is ordered.										
	Right	RAL 7035	300	600		**8MF1360-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1380-2UT34-0BA2**		1	1 unit	1BS
			400	600		**8MF1460-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1480-2UT34-0BA2**		1	1 unit	1BS
			500	600		**8MF1560-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1580-2UT34-0BA2**		1	1 unit	1BS
			600	600		**8MF1660-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1680-2UT34-0BA2**		1	1 unit	1BS
			700	600		**8MF1760-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1780-2UT34-0BA2**		1	1 unit	1BS
			800	600		**8MF1860-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1880-2UT34-0BA2**		1	1 unit	1BS
			900	600		**8MF1960-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1980-2UT34-0BA2**		1	1 unit	1BS
			1 000	600		**8MF1060-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1080-2UT34-0BA2**		1	1 unit	1BS
			1 100	600		**8MF1160-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1180-2UT34-0BA2**		1	1 unit	1BS
			1 200	600		**8MF1260-2UT34-0BA2**		1	1 unit	1BS
				800		**8MF1280-2UT34-0BA2**		1	1 unit	1BS
Limit plate for modular doors										
For a number n of modular doors, additionally order n-1 limit plates.										
	--	--	--	600		**8MF1060-2AK14-0**		1	1 unit	1BS
				800		**8MF1080-2AK14-0**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
Door										
Closed										
IP40 NEW										
	Left	RAL 7035	1 800	300		**8MF1830-2UT15-0CA1**		1	1 unit	1BS
				400		**8MF1840-2UT15-0CA1**		1	1 unit	1BS
				450		**8MF1870-2UT15-0CA1**		1	1 unit	1BS
				500		**8MF1850-2UT15-0CA1**		1	1 unit	1BS
				600		**8MF1860-2UT15-0CA1**		1	1 unit	1BS
				800		**8MF1880-2UT15-0CA1**		1	1 unit	1BS
				900		**8MF1890-2UT15-0CA1**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT15-0CA1**		1	1 unit	1BS
				400		**8MF1040-2UT15-0CA1**		1	1 unit	1BS
				450		**8MF1070-2UT15-0CA1**		1	1 unit	1BS
				500		**8MF1050-2UT15-0CA1**		1	1 unit	1BS
				600		**8MF1060-2UT15-0CA1**		1	1 unit	1BS
				800		**8MF1080-2UT15-0CA1**		1	1 unit	1BS
				900		**8MF1090-2UT15-0CA1**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT15-0CA1**		1	1 unit	1BS
				400		**8MF1240-2UT15-0CA1**		1	1 unit	1BS
				450		**8MF1270-2UT15-0CA1**		1	1 unit	1BS
				500		**8MF1250-2UT15-0CA1**		1	1 unit	1BS
				600		**8MF1260-2UT15-0CA1**		1	1 unit	1BS
				800		**8MF1280-2UT15-0CA1**		1	1 unit	1BS
				900		**8MF1290-2UT15-0CA1**		1	1 unit	1BS
	Right	RAL 7035	1 800	300		**8MF1830-2UT14-0CA1**		1	1 unit	1BS
				400		**8MF1840-2UT14-0CA1**		1	1 unit	1BS
				450		**8MF1870-2UT14-0CA1**		1	1 unit	1BS
				500		**8MF1850-2UT14-0CA1**		1	1 unit	1BS
				600		**8MF1860-2UT14-0CA1**		1	1 unit	1BS
				800		**8MF1880-2UT14-0CA1**		1	1 unit	1BS
				900		**8MF1890-2UT14-0CA1**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT14-0CA1**		1	1 unit	1BS
				400		**8MF1040-2UT14-0CA1**		1	1 unit	1BS
				450		**8MF1070-2UT14-0CA1**		1	1 unit	1BS
				500		**8MF1050-2UT14-0CA1**		1	1 unit	1BS
				600		**8MF1060-2UT14-0CA1**		1	1 unit	1BS
				800		**8MF1080-2UT14-0CA1**		1	1 unit	1BS
				900		**8MF1090-2UT14-0CA1**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT14-0CA1**		1	1 unit	1BS
				400		**8MF1240-2UT14-0CA1**		1	1 unit	1BS
				450		**8MF1270-2UT14-0CA1**		1	1 unit	1BS
				500		**8MF1250-2UT14-0CA1**		1	1 unit	1BS
				600		**8MF1260-2UT14-0CA1**		1	1 unit	1BS
				800		**8MF1280-2UT14-0CA1**		1	1 unit	1BS
				900		**8MF1290-2UT14-0CA1**		1	1 unit	1BS

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Doors > With rotary handle

	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
IP55										
	Left	RAL 7035	1 800	300		**8MF1830-2UT15-0BA2**		1	1 unit	1BS
				400		**8MF1840-2UT15-0BA2**		1	1 unit	1BS
				450		**8MF1870-2UT15-0BA2**		1	1 unit	1BS
				500		**8MF1850-2UT15-0BA2**		1	1 unit	1BS
				600		**8MF1860-2UT15-0BA2**		1	1 unit	1BS
				800		**8MF1880-2UT15-0BA2**		1	1 unit	1BS
				900		**8MF1890-2UT15-0BA2**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT15-0BA2**		1	1 unit	1BS
				400		**8MF1040-2UT15-0BA2**		1	1 unit	1BS
				450		**8MF1070-2UT15-0BA2**		1	1 unit	1BS
				500		**8MF1050-2UT15-0BA2**		1	1 unit	1BS
				600		**8MF1060-2UT15-0BA2**		1	1 unit	1BS
				800		**8MF1080-2UT15-0BA2**		1	1 unit	1BS
				900		**8MF1090-2UT15-0BA2**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT15-0BA2**		1	1 unit	1BS
				400		**8MF1240-2UT15-0BA2**		1	1 unit	1BS
				450		**8MF1270-2UT15-0BA2**		1	1 unit	1BS
				500		**8MF1250-2UT15-0BA2**		1	1 unit	1BS
				600		**8MF1260-2UT15-0BA2**		1	1 unit	1BS
				800		**8MF1280-2UT15-0BA2**		1	1 unit	1BS
				900		**8MF1290-2UT15-0BA2**		1	1 unit	1BS
	Right	RAL 7035	1 800	300		**8MF1830-2UT14-0BA2**		1	1 unit	1BS
				400		**8MF1840-2UT14-0BA2**		1	1 unit	1BS
				450		**8MF1870-2UT14-0BA2**		1	1 unit	1BS
				500		**8MF1850-2UT14-0BA2**		1	1 unit	1BS
				600		**8MF1860-2UT14-0BA2**		1	1 unit	1BS
				800		**8MF1880-2UT14-0BA2**		1	1 unit	1BS
				900		**8MF1890-2UT14-0BA2**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT14-0BA2**		1	1 unit	1BS
				400		**8MF1040-2UT14-0BA2**		1	1 unit	1BS
				450		**8MF1070-2UT14-0BA2**		1	1 unit	1BS
				500		**8MF1050-2UT14-0BA2**		1	1 unit	1BS
				600		**8MF1060-2UT14-0BA2**		1	1 unit	1BS
				800		**8MF1080-2UT14-0BA2**		1	1 unit	1BS
				900		**8MF1090-2UT14-0BA2**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT14-0BA2**		1	1 unit	1BS
				400		**8MF1240-2UT14-0BA2**		1	1 unit	1BS
				450		**8MF1270-2UT14-0BA2**		1	1 unit	1BS
				500		**8MF1250-2UT14-0BA2**		1	1 unit	1BS
				600		**8MF1260-2UT14-0BA2**		1	1 unit	1BS
				800		**8MF1280-2UT14-0BA2**		1	1 unit	1BS
				900		**8MF1290-2UT14-0BA2**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
With cutout for filter fan										
IPXX *NEW*										
	Left	RAL 7035	1 800	400		**8MF1840-2UT15-3BA2**		1	1 unit	1BS
				450		**8MF1870-2UT15-3BA2**		1	1 unit	1BS
				500		**8MF1850-2UT15-3BA2**		1	1 unit	1BS
				600		**8MF1860-2UT15-3BA2**		1	1 unit	1BS
				800		**8MF1880-2UT15-3BA2**		1	1 unit	1BS
				900		**8MF1890-2UT15-3BA2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT15-3BA2**		1	1 unit	1BS
				450		**8MF1070-2UT15-3BA2**		1	1 unit	1BS
				500		**8MF1050-2UT15-3BA2**		1	1 unit	1BS
				600		**8MF1060-2UT15-3BA2**		1	1 unit	1BS
				800		**8MF1080-2UT15-3BA2**		1	1 unit	1BS
				900		**8MF1090-2UT15-3BA2**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT15-3BA2**		1	1 unit	1BS
				450		**8MF1270-2UT15-3BA2**		1	1 unit	1BS
				500		**8MF1250-2UT15-3BA2**		1	1 unit	1BS
				600		**8MF1260-2UT15-3BA2**		1	1 unit	1BS
				800		**8MF1280-2UT15-3BA2**		1	1 unit	1BS
				900		**8MF1290-2UT15-3BA2**		1	1 unit	1BS
	Right	RAL 7035	1 800	400		**8MF1840-2UT14-3BA2**		1	1 unit	1BS
				450		**8MF1870-2UT14-3BA2**		1	1 unit	1BS
				500		**8MF1850-2UT14-3BA2**		1	1 unit	1BS
				600		**8MF1860-2UT14-3BA2**		1	1 unit	1BS
				800		**8MF1880-2UT14-3BA2**		1	1 unit	1BS
				900		**8MF1890-2UT14-3BA2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT14-3BA2**		1	1 unit	1BS
				450		**8MF1070-2UT14-3BA2**		1	1 unit	1BS
				500		**8MF1050-2UT14-3BA2**		1	1 unit	1BS
				600		**8MF1060-2UT14-3BA2**		1	1 unit	1BS
				800		**8MF1080-2UT14-3BA2**		1	1 unit	1BS
				900		**8MF1090-2UT14-3BA2**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT14-3BA2**		1	1 unit	1BS
				450		**8MF1270-2UT14-3BA2**		1	1 unit	1BS
				500		**8MF1250-2UT14-3BA2**		1	1 unit	1BS
				600		**8MF1260-2UT14-3BA2**		1	1 unit	1BS
				800		**8MF1280-2UT14-3BA2**		1	1 unit	1BS
				900		**8MF1290-2UT14-3BA2**		1	1 unit	1BS
With ventilation openings										
IP20										
Max. opening angle: • For suite installation: 180° • For stand-alone installation: 270°										
	Left	RAL 7035	1 800	300		**8MF1830-2UT15-1BA2**		1	1 unit	1BS
				400		**8MF1840-2UT15-1BA2**		1	1 unit	1BS
				450		**8MF1870-2UT15-1BA2**		1	1 unit	1BS
				500		**8MF1850-2UT15-1BA2**		1	1 unit	1BS
				600		**8MF1860-2UT15-1BA2**		1	1 unit	1BS
				800		**8MF1880-2UT15-1BA2**		1	1 unit	1BS
				900		**8MF1890-2UT15-1BA2**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT15-1BA2**		1	1 unit	1BS
				400		**8MF1040-2UT15-1BA2**		1	1 unit	1BS
				450		**8MF1070-2UT15-1BA2**		1	1 unit	1BS
				500		**8MF1050-2UT15-1BA2**		1	1 unit	1BS
				600		**8MF1060-2UT15-1BA2**		1	1 unit	1BS
				800		**8MF1080-2UT15-1BA2**		1	1 unit	1BS
				900		**8MF1090-2UT15-1BA2**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT15-1BA2**		1	1 unit	1BS
				400		**8MF1240-2UT15-1BA2**		1	1 unit	1BS
				450		**8MF1270-2UT15-1BA2**		1	1 unit	1BS
				500		**8MF1250-2UT15-1BA2**		1	1 unit	1BS
				600		**8MF1260-2UT15-1BA2**		1	1 unit	1BS
				800		**8MF1280-2UT15-1BA2**		1	1 unit	1BS
				900		**8MF1290-2UT15-1BA2**		1	1 unit	1BS

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Doors > With rotary handle

	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
	Right	RAL 7035	1 800	300		**8MF1830-2UT14-1BA2**		1	1 unit	1BS
				400		**8MF1840-2UT14-1BA2**		1	1 unit	1BS
				450		**8MF1870-2UT14-1BA2**		1	1 unit	1BS
				500		**8MF1850-2UT14-1BA2**		1	1 unit	1BS
				600		**8MF1860-2UT14-1BA2**		1	1 unit	1BS
				800		**8MF1880-2UT14-1BA2**		1	1 unit	1BS
				900		**8MF1890-2UT14-1BA2**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT14-1BA2**		1	1 unit	1BS
				400		**8MF1040-2UT14-1BA2**		1	1 unit	1BS
				450		**8MF1070-2UT14-1BA2**		1	1 unit	1BS
				500		**8MF1050-2UT14-1BA2**		1	1 unit	1BS
				600		**8MF1060-2UT14-1BA2**		1	1 unit	1BS
				800		**8MF1080-2UT14-1BA2**		1	1 unit	1BS
				900		**8MF1090-2UT14-1BA2**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT14-1BA2**		1	1 unit	1BS
				400		**8MF1240-2UT14-1BA2**		1	1 unit	1BS
				450		**8MF1270-2UT14-1BA2**		1	1 unit	1BS
				500		**8MF1250-2UT14-1BA2**		1	1 unit	1BS
				600		**8MF1260-2UT14-1BA2**		1	1 unit	1BS
				800		**8MF1280-2UT14-1BA2**		1	1 unit	1BS
				900		**8MF1290-2UT14-1BA2**		1	1 unit	1BS
IP40										
	Left	RAL 7035	1 800	300		**8MF1830-2UT15-2BA2**		1	1 unit	1BS
				400		**8MF1840-2UT15-2BA2**		1	1 unit	1BS
				450		**8MF1870-2UT15-2BA2**		1	1 unit	1BS
				500		**8MF1850-2UT15-2BA2**		1	1 unit	1BS
				600		**8MF1860-2UT15-2BA2**		1	1 unit	1BS
				800		**8MF1880-2UT15-2BA2**		1	1 unit	1BS
				900		**8MF1890-2UT15-2BA2**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT15-2BA2**		1	1 unit	1BS
				400		**8MF1040-2UT15-2BA2**		1	1 unit	1BS
				450		**8MF1070-2UT15-2BA2**		1	1 unit	1BS
				500		**8MF1050-2UT15-2BA2**		1	1 unit	1BS
				600		**8MF1060-2UT15-2BA2**		1	1 unit	1BS
				800		**8MF1080-2UT15-2BA2**		1	1 unit	1BS
				900		**8MF1090-2UT15-2BA2**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT15-2BA2**		1	1 unit	1BS
				400		**8MF1240-2UT15-2BA2**		1	1 unit	1BS
				450		**8MF1270-2UT15-2BA2**		1	1 unit	1BS
				500		**8MF1250-2UT15-2BA2**		1	1 unit	1BS
				600		**8MF1260-2UT15-2BA2**		1	1 unit	1BS
				800		**8MF1280-2UT15-2BA2**		1	1 unit	1BS
				900		**8MF1290-2UT15-2BA2**		1	1 unit	1BS
	Right	RAL 7035	1 800	300		**8MF1830-2UT14-2BA2**		1	1 unit	1BS
				400		**8MF1840-2UT14-2BA2**		1	1 unit	1BS
				450		**8MF1870-2UT14-2BA2**		1	1 unit	1BS
				500		**8MF1850-2UT14-2BA2**		1	1 unit	1BS
				600		**8MF1860-2UT14-2BA2**		1	1 unit	1BS
				800		**8MF1880-2UT14-2BA2**		1	1 unit	1BS
				900		**8MF1890-2UT14-2BA2**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT14-2BA2**		1	1 unit	1BS
				400		**8MF1040-2UT14-2BA2**		1	1 unit	1BS
				450		**8MF1070-2UT14-2BA2**		1	1 unit	1BS
				500		**8MF1050-2UT14-2BA2**		1	1 unit	1BS
				600		**8MF1060-2UT14-2BA2**		1	1 unit	1BS
				800		**8MF1080-2UT14-2BA2**		1	1 unit	1BS
				900		**8MF1090-2UT14-2BA2**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT14-2BA2**		1	1 unit	1BS
				400		**8MF1240-2UT14-2BA2**		1	1 unit	1BS
				450		**8MF1270-2UT14-2BA2**		1	1 unit	1BS
				500		**8MF1250-2UT14-2BA2**		1	1 unit	1BS
				600		**8MF1260-2UT14-2BA2**		1	1 unit	1BS
				800		**8MF1280-2UT14-2BA2**		1	1 unit	1BS
				900		**8MF1290-2UT14-2BA2**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
Inspection window										
IP55										
	Left	RAL 7035	1 800	400		**8MF1840-2UT15-0BE2**		1	1 unit	1BS
				450		**8MF1870-2UT15-0BE2**		1	1 unit	1BS
				500		**8MF1850-2UT15-0BE2**		1	1 unit	1BS
				600		**8MF1860-2UT15-0BE2**		1	1 unit	1BS
				800		**8MF1880-2UT15-0BE2**		1	1 unit	1BS
				900		**8MF1890-2UT15-0BE2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT15-0BE2**		1	1 unit	1BS
				450		**8MF1070-2UT15-0BE2**		1	1 unit	1BS
				500		**8MF1050-2UT15-0BE2**		1	1 unit	1BS
				600		**8MF1060-2UT15-0BE2**		1	1 unit	1BS
				800		**8MF1080-2UT15-0BE2**		1	1 unit	1BS
				900		**8MF1090-2UT15-0BE2**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT15-0BE2**		1	1 unit	1BS
				450		**8MF1270-2UT15-0BE2**		1	1 unit	1BS
				500		**8MF1250-2UT15-0BE2**		1	1 unit	1BS
				600		**8MF1260-2UT15-0BE2**		1	1 unit	1BS
				800		**8MF1280-2UT15-0BE2**		1	1 unit	1BS
				900		**8MF1290-2UT15-0BE2**		1	1 unit	1BS
	Right	RAL 7035	1 800	400		**8MF1840-2UT14-0BE2**		1	1 unit	1BS
				450		**8MF1870-2UT14-0BE2**		1	1 unit	1BS
				500		**8MF1850-2UT14-0BE2**		1	1 unit	1BS
				600		**8MF1860-2UT14-0BE2**		1	1 unit	1BS
				800		**8MF1880-2UT14-0BE2**		1	1 unit	1BS
				900		**8MF1890-2UT14-0BE2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT14-0BE2**		1	1 unit	1BS
						8MF1240-2UT14-0BE2		1	1 unit	1BS
				450		**8MF1070-2UT14-0BE2**		1	1 unit	1BS
				500		**8MF1050-2UT14-0BE2**		1	1 unit	1BS
				600		**8MF1060-2UT14-0BE2**		1	1 unit	1BS
				800		**8MF1080-2UT14-0BE2**		1	1 unit	1BS
				900		**8MF1090-2UT14-0BE2**		1	1 unit	1BS
			2 200	450		**8MF1270-2UT14-0BE2**		1	1 unit	1BS
				500		**8MF1250-2UT14-0BE2**		1	1 unit	1BS
				600		**8MF1260-2UT14-0BE2**		1	1 unit	1BS
				800		**8MF1280-2UT14-0BE2**		1	1 unit	1BS
				900		**8MF1290-2UT14-0BE2**		1	1 unit	1BS

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Selection and ordering data

	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
Door half										
Closed										
IP40										
	Left	RAL 7035	1 800	400		**8MF1840-2UT25-0CA1**		1	1 unit	1BS
				450		**8MF1870-2UT25-0CA1**		1	1 unit	1BS
				500		**8MF1850-2UT25-0CA1**		1	1 unit	1BS
				600		**8MF1860-2UT25-0CA1**		1	1 unit	1BS
				800		**8MF1880-2UT25-0CA1**		1	1 unit	1BS
				900		**8MF1890-2UT25-0CA1**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT25-0CA1**		1	1 unit	1BS
				450		**8MF1070-2UT25-0CA1**		1	1 unit	1BS
				500		**8MF1050-2UT25-0CA1**		1	1 unit	1BS
				600		**8MF1060-2UT25-0CA1**		1	1 unit	1BS
				800		**8MF1080-2UT25-0CA1**		1	1 unit	1BS
				900		**8MF1090-2UT25-0CA1**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT25-0CA1**		1	1 unit	1BS
				450		**8MF1270-2UT25-0CA1**		1	1 unit	1BS
				500		**8MF1250-2UT25-0CA1**		1	1 unit	1BS
				600		**8MF1260-2UT25-0CA1**		1	1 unit	1BS
				800		**8MF1280-2UT25-0CA1**		1	1 unit	1BS
				900		**8MF1290-2UT25-0CA1**		1	1 unit	1BS
IP55										
	Left	RAL 7035	1 800	400		**8MF1840-2UT25-0BA2**		1	1 unit	1BS
				450		**8MF1870-2UT25-0BA2**		1	1 unit	1BS
				500		**8MF1850-2UT25-0BA2**		1	1 unit	1BS
				600		**8MF1860-2UT25-0BA2**		1	1 unit	1BS
				800		**8MF1880-2UT25-0BA2**		1	1 unit	1BS
				900		**8MF1890-2UT25-0BA2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT25-0BA2**		1	1 unit	1BS
				450		**8MF1070-2UT25-0BA2**		1	1 unit	1BS
				500		**8MF1050-2UT25-0BA2**		1	1 unit	1BS
				600		**8MF1060-2UT25-0BA2**		1	1 unit	1BS
				800		**8MF1080-2UT25-0BA2**		1	1 unit	1BS
				900		**8MF1090-2UT25-0BA2**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT25-0BA2**		1	1 unit	1BS
				450		**8MF1270-2UT25-0BA2**		1	1 unit	1BS
				500		**8MF1250-2UT25-0BA2**		1	1 unit	1BS
				600		**8MF1260-2UT25-0BA2**		1	1 unit	1BS
				800		**8MF1280-2UT25-0BA2**		1	1 unit	1BS
				900		**8MF1290-2UT25-0BA2**		1	1 unit	1BS
With cutout for filter fan NEW										
IPXX										
	Left	RAL 7035	1 800	400		**8MF1840-2UT25-3BA2**		1	1 unit	1BS
				450		**8MF1870-2UT25-3BA2**		1	1 unit	1BS
				500		**8MF1850-2UT25-3BA2**		1	1 unit	1BS
				600		**8MF1860-2UT25-3BA2**		1	1 unit	1BS
				800		**8MF1880-2UT25-3BA2**		1	1 unit	1BS
				900		**8MF1890-2UT25-3BA2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT25-3BA2**		1	1 unit	1BS
				450		**8MF1070-2UT25-3BA2**		1	1 unit	1BS
				500		**8MF1050-2UT25-3BA2**		1	1 unit	1BS
				600		**8MF1060-2UT25-3BA2**		1	1 unit	1BS
				800		**8MF1080-2UT25-3BA2**		1	1 unit	1BS
				900		**8MF1090-2UT25-3BA2**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT25-3BA2**		1	1 unit	1BS
				450		**8MF1270-2UT25-3BA2**		1	1 unit	1BS
				500		**8MF1250-2UT25-3BA2**		1	1 unit	1BS
				600		**8MF1260-2UT25-3BA2**		1	1 unit	1BS
				800		**8MF1280-2UT25-3BA2**		1	1 unit	1BS
				900		**8MF1290-2UT25-3BA2**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
With ventilation openings										
IP20										
	Left	RAL 7035	1 800	400		**8MF1840-2UT25-1BA2**		1	1 unit	1BS
				450		**8MF1870-2UT25-1BA2**		1	1 unit	1BS
				500		**8MF1850-2UT25-1BA2**		1	1 unit	1BS
				600		**8MF1860-2UT25-1BA2**		1	1 unit	1BS
				800		**8MF1880-2UT25-1BA2**		1	1 unit	1BS
				900		**8MF1890-2UT25-1BA2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT25-1BA2**		1	1 unit	1BS
				450		**8MF1070-2UT25-1BA2**		1	1 unit	1BS
				500		**8MF1050-2UT25-1BA2**		1	1 unit	1BS
				600		**8MF1060-2UT25-1BA2**		1	1 unit	1BS
				800		**8MF1080-2UT25-1BA2**		1	1 unit	1BS
				900		**8MF1090-2UT25-1BA2**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT25-1BA2**		1	1 unit	1BS
				450		**8MF1270-2UT25-1BA2**		1	1 unit	1BS
				500		**8MF1250-2UT25-1BA2**		1	1 unit	1BS
				600		**8MF1260-2UT25-1BA2**		1	1 unit	1BS
				800		**8MF1280-2UT25-1BA2**		1	1 unit	1BS
				900		**8MF1290-2UT25-1BA2**		1	1 unit	1BS
IP40 NEW										
	Left	RAL 7035	1 800	300		**8MF1830-2UT25-2BA2**		1	1 unit	1BS
				400		**8MF1840-2UT25-2BA2**		1	1 unit	1BS
				450		**8MF1870-2UT25-2BA2**		1	1 unit	1BS
				500		**8MF1850-2UT25-2BA2**		1	1 unit	1BS
				600		**8MF1860-2UT25-2BA2**		1	1 unit	1BS
				800		**8MF1880-2UT25-2BA2**		1	1 unit	1BS
				900		**8MF1890-2UT25-2BA2**		1	1 unit	1BS
			2 000	300		**8MF1030-2UT25-2BA2**		1	1 unit	1BS
				400		**8MF1040-2UT25-2BA2**		1	1 unit	1BS
				450		**8MF1070-2UT25-2BA2**		1	1 unit	1BS
				500		**8MF1050-2UT25-2BA2**		1	1 unit	1BS
				600		**8MF1060-2UT25-2BA2**		1	1 unit	1BS
				800		**8MF1080-2UT25-2BA2**		1	1 unit	1BS
				900		**8MF1090-2UT25-2BA2**		1	1 unit	1BS
			2 200	300		**8MF1230-2UT25-2BA2**		1	1 unit	1BS
				400		**8MF1240-2UT25-2BA2**		1	1 unit	1BS
				450		**8MF1270-2UT25-2BA2**		1	1 unit	1BS
				500		**8MF1250-2UT25-2BA2**		1	1 unit	1BS
				600		**8MF1260-2UT25-2BA2**		1	1 unit	1BS
				800		**8MF1280-2UT25-2BA2**		1	1 unit	1BS
				900		**8MF1290-2UT25-2BA2**		1	1 unit	1BS
Inspection window										
IP55										
	Left	RAL 7035	1 800	400		**8MF1840-2UT25-0BE2**		1	1 unit	1BS
				450		**8MF1870-2UT25-0BE2**		1	1 unit	1BS
				500		**8MF1850-2UT25-0BE2**		1	1 unit	1BS
				600		**8MF1860-2UT25-0BE2**		1	1 unit	1BS
				800		**8MF1880-2UT25-0BE2**		1	1 unit	1BS
				900		**8MF1890-2UT25-0BE2**		1	1 unit	1BS
			2 000	400		**8MF1040-2UT25-0BE2**		1	1 unit	1BS
				450		**8MF1070-2UT25-0BE2**		1	1 unit	1BS
				500		**8MF1050-2UT25-0BE2**		1	1 unit	1BS
				600		**8MF1060-2UT25-0BE2**		1	1 unit	1BS
				800		**8MF1080-2UT25-0BE2**		1	1 unit	1BS
				900		**8MF1090-2UT25-0BE2**		1	1 unit	1BS
			2 200	400		**8MF1240-2UT25-0BE2**		1	1 unit	1BS
				450		**8MF1270-2UT25-0BE2**		1	1 unit	1BS
				500		**8MF1250-2UT25-0BE2**		1	1 unit	1BS
				600		**8MF1260-2UT25-0BE2**		1	1 unit	1BS
				800		**8MF1280-2UT25-0BE2**		1	1 unit	1BS
				900		**8MF1290-2UT25-0BE2**		1	1 unit	1BS

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Selection and ordering data

	Hinged side of door	RAL color number	Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	mm	d					
Door										
For cubicle interior NEW										
	Right	RAL 7035	2 000	600		**8MF1060-2UT14-4BA2**		1	1 unit	1BS
				800		**8MF1080-2UT14-4BA2**		1	1 unit	1BS
				1 000		**8MF1000-2UT14-4BA2**		1	1 unit	1BS
				1 200		**8MF1020-2UT14-4BA2**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Product version	Design of the surface	Height	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	d					
Cover NEW									
	For connecting side-by-side mounting panels	Galvanized	1 800 2 000 2 200		**8MF1800-2CH** **8MF1000-2CH** **8MF1200-2CH**		1 1 1	1 unit 1 unit 1 unit	1BS 1BS 1BS
Pocket in the door NEW									
	For door width 800 For door width 600	Galvanized Galvanized	-- --		**8MF1080-2VP** **8MF1060-2VP**		1 1	1 unit 1 unit	1BS 1BS
Grille									
	For upgrading from IP2X to IP4X	Galvanized	--		**8MF1030-2HM** **8MF1040-2HM** **8MF1050-2HM** **8MF1060-2HM** **8MF1070-2HM** **8MF1080-2HM** **8MF1090-2HM**		1 1 1 1 1 1 1	1 unit 1 unit 1 unit 1 unit 1 unit 1 unit 1 unit	1BS 1BS 1BS 1BS 1BS 1BS 1BS
Contact washer									
	Size 6	--	--		**8MF1000-2VJ**		1	1 unit	1BS
Strip [1]									
	For door reinforcement	Galvanized	1 800 2 000 2 200		**8MF1008-2VM** **8MF1000-2VM** **8MF1002-2VM**		1 1 1	1 unit 1 unit 1 unit	1BS 1BS 1BS
Position switch									
	1 NO + 1 NC 1 NO + 2 NC	-- --	-- --		**8MF1000-2VL** **8MF1000-2VR**		1 1	1 unit 1 unit	1BS 1BS
Circuit diagram pocket [1]									
	Plastic Steel	-- Galvanized	-- --		**8MF1000-2VK** **8MF1000-2VU**		1 1	1 unit 1 unit	1BS 1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Accessories

	Product version	Design of the surface	Height	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	d					
Hinge set									
	For left-hand hinge	--	--		**8MF1000-2VT**		1	1 unit	1BS
	For right-hand hinge	--	--		**8MF1000-2VW**		1	1 unit	1BS
Screw									
	M6x12	--	--		**8MF1000-2VS**		1	1 unit	1BS
Rotary handle									
	With padlock	--	--		**8MF1000-2VN**		1	1 unit	1BS
	Without insert	--	--		**8MF1000-2VP**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Product version	Design of the surface	Height	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			mm	d					
Rotary handle insert [2]									
	Double-bit key	--	--		**8MF1000-2VA**		1	1 unit	1BS
	Square key	--	--		**8MF1000-2VC**		1	1 unit	1BS
	Triangular key	--	--		**8MF1000-2VD**		1	1 unit	1BS
	Daimler	--	--		**8MF1000-2VE**		1	1 unit	1BS
	Cylinder lock	--	--		**8MF1000-2VF**		1	1 unit	1BS
Door stay									
	With variable opening angle	Galvanized	--		**8MF1000-2VG**		1	1 unit	1BS

[1] Cannot be used for glass doors
[2] Not suitable for door halves

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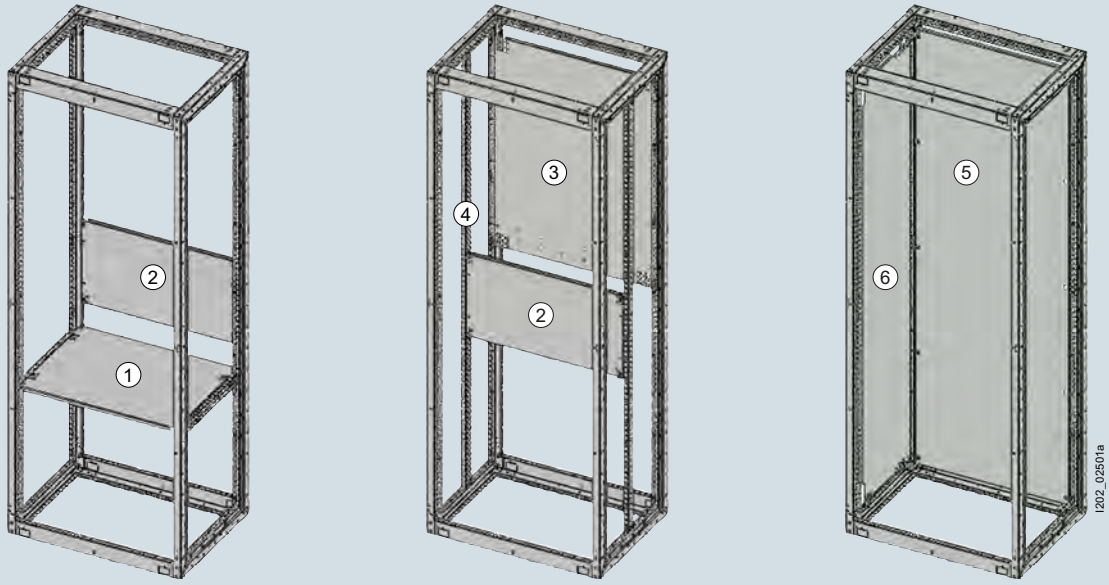
General data

Overview

Expansion parts



1 Shelf
2 Mounting plate for mounting with universal bracket
3 Mounting plate for direct mounting on the frame
4 Mounting rails (for installing the mounting plate in the depth)
5 Rear mounting panel
6 Side mounting panel

SIVACON 8MF1 system cubicle

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
For rear panel of cubicle									
	1 800	400 NEW	--		**8MF1840-2AL03-0**		1	1 unit	1BS
		600	--		**8MF1860-2AL03-0**		1	1 unit	1BS
		800	--		**8MF1880-2AL03-0**		1	1 unit	1BS
		900	--		**8MF1890-2AL03-0**		1	1 unit	1BS
		1 000	--		**8MF1800-2AL03-0**		1	1 unit	1BS
		1 200	--		**8MF1820-2AL03-0**		1	1 unit	1BS
	2 000	400	--		**8MF1040-2AL03-0**		1	1 unit	1BS
		600	--		**8MF1060-2AL03-0**		1	1 unit	1BS
		800	--		**8MF1080-2AL03-0**		1	1 unit	1BS
		900	--		**8MF1090-2AL03-0**		1	1 unit	1BS
		1 000	--		**8MF1000-2AL03-0**		1	1 unit	1BS
		1 200	--		**8MF1020-2AL03-0**		1	1 unit	1BS
	2 200	400	--		**8MF1240-2AL03-0**		1	1 unit	1BS
		600	--		**8MF1260-2AL03-0**		1	1 unit	1BS
		800	--		**8MF1280-2AL03-0**		1	1 unit	1BS
		900	--		**8MF1290-2AL03-0**		1	1 unit	1BS
		1 000	--		**8MF1200-2AL03-0**		1	1 unit	1BS
		1 200	--		**8MF1220-2AL03-0**		1	1 unit	1BS
For rear panel of cubicle, perforated									
	1 800	400 NEW	--		**8MF1840-2AL13-0**		1	1 unit	1BS
		600	--		**8MF1860-2AL13-0**		1	1 unit	1BS
		800	--		**8MF1880-2AL13-0**		1	1 unit	1BS
		900	--		**8MF1890-2AL13-0**		1	1 unit	1BS
		1 000	--		**8MF1800-2AL13-0**		1	1 unit	1BS
		1 200	--		**8MF1820-2AL13-0**		1	1 unit	1BS
	2 000	400 NEW	--		**8MF1040-2AL13-0**		1	1 unit	1BS
		600	--		**8MF1060-2AL13-0**		1	1 unit	1BS
		800	--		**8MF1080-2AL13-0**		1	1 unit	1BS
		900	--		**8MF1090-2AL13-0**		1	1 unit	1BS
		1 000	--		**8MF1000-2AL13-0**		1	1 unit	1BS
		1 200	--		**8MF1020-2AL13-0**		1	1 unit	1BS
	2 200	400 NEW	--		**8MF1240-2AL13-0**		1	1 unit	1BS
		600	--		**8MF1260-2AL13-0**		1	1 unit	1BS
		800	--		**8MF1280-2AL13-0**		1	1 unit	1BS
		900	--		**8MF1290-2AL13-0**		1	1 unit	1BS
		1 000	--		**8MF1200-2AL13-0**		1	1 unit	1BS
		1 200	--		**8MF1220-2AL13-0**		1	1 unit	1BS
For cubicle side									
	1 800	--	400		**8MF1804-2AK03-0**		1	1 unit	1BS
			500 NEW		**8MF1805-2AK03-0**		1	1 unit	1BS
			600		**8MF1806-2AK03-0**		1	1 unit	1BS
			800		**8MF1808-2AK03-0**		1	1 unit	1BS
			1 000		**8MF1800-2AK03-0**		1	1 unit	1BS
	2 000	--	400		**8MF1004-2AK03-0**		1	1 unit	1BS
			500 NEW		**8MF1005-2AK03-0**		1	1 unit	1BS
			600		**8MF1006-2AK03-0**		1	1 unit	1BS
			800		**8MF1008-2AK03-0**		1	1 unit	1BS
			1 000		**8MF1000-2AK03-0**		1	1 unit	1BS
	2 200	--	400		**8MF1204-2AK03-0**		1	1 unit	1BS
			500 NEW		**8MF1205-2AK03-0**		1	1 unit	1BS
			600		**8MF1206-2AK03-0**		1	1 unit	1BS
			800		**8MF1208-2AK03-0**		1	1 unit	1BS
			1 000		**8MF1200-2AK03-0**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Mounting panel

Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
For cubicle side, perforated								
1 800	--	400		**8MF1804-2AK13-0**		1	1 unit	1BS
		500 NEW		**8MF1805-2AK13-0**		1	1 unit	1BS
		600		**8MF1806-2AK13-0**		1	1 unit	1BS
		800		**8MF1808-2AK13-0**		1	1 unit	1BS
		1 000		**8MF1800-2AK13-0**		1	1 unit	1BS
2 000	--	400		**8MF1004-2AK13-0**		1	1 unit	1BS
		500 NEW		**8MF1005-2AK13-0**		1	1 unit	1BS
		600		**8MF1006-2AK13-0**		1	1 unit	1BS
		800		**8MF1008-2AK13-0**		1	1 unit	1BS
		1 000		**8MF1000-2AK13-0**		1	1 unit	1BS
2 200	--	400		**8MF1204-2AK13-0**		1	1 unit	1BS
		500 NEW		**8MF1205-2AK13-0**		1	1 unit	1BS
		600		**8MF1206-2AK13-0**		1	1 unit	1BS
		800		**8MF1208-2AK13-0**		1	1 unit	1BS
		1 000		**8MF1200-2AK13-0**		1	1 unit	1BS

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Selection and ordering data

Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	d					
Mounting with bracket [1]							
100	400 NEW		**8MF1140-2AM02-0**		1	1 unit	1BS
	600		**8MF1160-2AM02-0**		1	1 unit	1BS
	800		**8MF1180-2AM02-0**		1	1 unit	1BS
	900		**8MF1190-2AM02-0**		1	1 unit	1BS
	1 000		**8MF1100-2AM02-0**		1	1 unit	1BS
	1 200		**8MF1120-2AM02-0**		1	1 unit	1BS
200	400 NEW		**8MF1240-2AM02-0**		1	1 unit	1BS
	600		**8MF1260-2AM02-0**		1	1 unit	1BS
	800		**8MF1280-2AM02-0**		1	1 unit	1BS
	900		**8MF1290-2AM02-0**		1	1 unit	1BS
	1 000		**8MF1200-2AM02-0**		1	1 unit	1BS
	1 200		**8MF1220-2AM02-0**		1	1 unit	1BS
300	400 NEW		**8MF1340-2AM02-0**		1	1 unit	1BS
	600		**8MF1360-2AM02-0**		1	1 unit	1BS
	800		**8MF1380-2AM02-0**		1	1 unit	1BS
	900		**8MF1390-2AM02-0**		1	1 unit	1BS
	1 000		**8MF1300-2AM02-0**		1	1 unit	1BS
	1 200		**8MF1320-2AM02-0**		1	1 unit	1BS
400	400 NEW		**8MF1440-2AM02-0**		1	1 unit	1BS
	600		**8MF1460-2AM02-0**		1	1 unit	1BS
	800		**8MF1480-2AM02-0**		1	1 unit	1BS
	900		**8MF1490-2AM02-0**		1	1 unit	1BS
	1 000		**8MF1400-2AM02-0**		1	1 unit	1BS
	1 200		**8MF1420-2AM02-0**		1	1 unit	1BS
600	400 NEW		**8MF1640-2AM02-0**		1	1 unit	1BS
	600		**8MF1660-2AM02-0**		1	1 unit	1BS
	800		**8MF1680-2AM02-0**		1	1 unit	1BS
	900		**8MF1690-2AM02-0**		1	1 unit	1BS
	1 000		**8MF1600-2AM02-0**		1	1 unit	1BS
	1 200		**8MF1620-2AM02-0**		1	1 unit	1BS
800	400 NEW		**8MF1840-2AM02-0**		1	1 unit	1BS
	600		**8MF1860-2AM02-0**		1	1 unit	1BS
	800		**8MF1880-2AM02-0**		1	1 unit	1BS
	900		**8MF1890-2AM02-0**		1	1 unit	1BS
	1 000		**8MF1800-2AM02-0**		1	1 unit	1BS
	1 200		**8MF1820-2AM02-0**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Mounting plate

Height	Width	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	d					
Mounting with bracket, perforated [1]							
100	400 NEW		**8MF1140-2AM12-0**		1	1 unit	1BS
	600		**8MF1160-2AM12-0**		1	1 unit	1BS
	800		**8MF1180-2AM12-0**		1	1 unit	1BS
	900		**8MF1190-2AM12-0**		1	1 unit	1BS
	1 000		**8MF1100-2AM12-0**		1	1 unit	1BS
	1 200		**8MF1120-2AM12-0**		1	1 unit	1BS
200	400 NEW		**8MF1240-2AM12-0**		1	1 unit	1BS
	600		**8MF1260-2AM12-0**		1	1 unit	1BS
	800		**8MF1280-2AM12-0**		1	1 unit	1BS
	900		**8MF1290-2AM12-0**		1	1 unit	1BS
	1 000		**8MF1200-2AM12-0**		1	1 unit	1BS
	1 200		**8MF1220-2AM12-0**		1	1 unit	1BS
300	400 NEW		**8MF1340-2AM12-0**		1	1 unit	1BS
	600		**8MF1360-2AM12-0**		1	1 unit	1BS
	800		**8MF1380-2AM12-0**		1	1 unit	1BS
	900		**8MF1390-2AM12-0**		1	1 unit	1BS
	1 000		**8MF1300-2AM12-0**		1	1 unit	1BS
	1 200		**8MF1320-2AM12-0**		1	1 unit	1BS
400	400 NEW		**8MF1440-2AM12-0**		1	1 unit	1BS
	600		**8MF1460-2AM12-0**		1	1 unit	1BS
	800		**8MF1480-2AM12-0**		1	1 unit	1BS
	900		**8MF1490-2AM12-0**		1	1 unit	1BS
	1 000		**8MF1400-2AM12-0**		1	1 unit	1BS
	1 200		**8MF1420-2AM12-0**		1	1 unit	1BS
600	400 NEW		**8MF1640-2AM12-0**		1	1 unit	1BS
	600		**8MF1660-2AM12-0**		1	1 unit	1BS
	800		**8MF1680-2AM12-0**		1	1 unit	1BS
	900		**8MF1690-2AM12-0**		1	1 unit	1BS
	1 000		**8MF1600-2AM12-0**		1	1 unit	1BS
	1 200		**8MF1620-2AM12-0**		1	1 unit	1BS
800	400 NEW		**8MF1840-2AM12-0**		1	1 unit	1BS
	600		**8MF1860-2AM12-0**		1	1 unit	1BS
	800		**8MF1880-2AM12-0**		1	1 unit	1BS
	900		**8MF1890-2AM12-0**		1	1 unit	1BS
	1 000		**8MF1800-2AM12-0**		1	1 unit	1BS
	1 200		**8MF1820-2AM12-0**		1	1 unit	1BS
Quick assembly with screws							
800	400 NEW		**8MF1840-2AA02-0**		1	1 unit	1BS
	600		**8MF1860-2AA02-0**		1	1 unit	1BS
	800		**8MF1880-2AA02-0**		1	1 unit	1BS
	900		**8MF1890-2AA02-0**		1	1 unit	1BS
	1 000		**8MF1800-2AA02-0**		1	1 unit	1BS
	1 200		**8MF1820-2AA02-0**		1	1 unit	1BS
1 000	400 NEW		**8MF1040-2AA02-0**		1	1 unit	1BS
	600		**8MF1060-2AA02-0**		1	1 unit	1BS
	800		**8MF1080-2AA02-0**		1	1 unit	1BS
	900		**8MF1090-2AA02-0**		1	1 unit	1BS
	1 000		**8MF1000-2AA02-0**		1	1 unit	1BS
	1 200		**8MF1020-2AA02-0**		1	1 unit	1BS
Quick assembly with screws, perforated							
800	400 NEW		**8MF1840-2AA12-0**		1	1 unit	1BS
	600		**8MF1860-2AA12-0**		1	1 unit	1BS
	800		**8MF1880-2AA12-0**		1	1 unit	1BS
	900		**8MF1890-2AA12-0**		1	1 unit	1BS
	1 000		**8MF1800-2AA12-0**		1	1 unit	1BS
	1 200		**8MF1820-2AA12-0**		1	1 unit	1BS
1 000	400 NEW		**8MF1040-2AA12-0**		1	1 unit	1BS
	600		**8MF1060-2AA12-0**		1	1 unit	1BS
	800		**8MF1080-2AA12-0**		1	1 unit	1BS
	900		**8MF1090-2AA12-0**		1	1 unit	1BS
	1 000		**8MF1000-2AA12-0**		1	1 unit	1BS
	1 200		**8MF1020-2AA12-0**		1	1 unit	1BS

[1] Cannot be combined with shelves

Minimum order quantity (PS) or a multiple thereof can be ordered.

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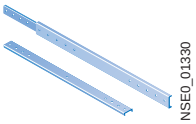
Selection and ordering data

	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	d					
Shelves								
For horizontal sub-division								
Cannot be combined with mounting panels								
	400 NEW	400		**8MF1044-2AF20**		1	1 unit	1BS
		600		**8MF1046-2AF20**		1	1 unit	1BS
		800		**8MF1048-2AF20**		1	1 unit	1BS
		1 000		**8MF1040-2AF20**		1	1 unit	1BS
	600	10		**8MF1060-2AF20**		1	1 unit	1BS
		40		**8MF1064-2AF20**		1	1 unit	1BS
		60		**8MF1066-2AF20**		1	1 unit	1BS
		80		**8MF1068-2AF20**		1	1 unit	1BS
	800	10		**8MF1080-2AF20**		1	1 unit	1BS
		40		**8MF1084-2AF20**		1	1 unit	1BS
		60		**8MF1086-2AF20**		1	1 unit	1BS
		80		**8MF1088-2AF20**		1	1 unit	1BS
	900	10		**8MF1090-2AF20**		1	1 unit	1BS
		40		**8MF1094-2AF20**		1	1 unit	1BS
		60		**8MF1096-2AF20**		1	1 unit	1BS
		80		**8MF1098-2AF20**		1	1 unit	1BS
	1 000	10		**8MF1000-2AF20**		1	1 unit	1BS
		40		**8MF1004-2AF20**		1	1 unit	1BS
		60		**8MF1006-2AF20**		1	1 unit	1BS
		80		**8MF1008-2AF20**		1	1 unit	1BS
	1 200	10		**8MF1020-2AF20**		1	1 unit	1BS
		40		**8MF1024-2AF20**		1	1 unit	1BS
		60		**8MF1026-2AF20**		1	1 unit	1BS
		80		**8MF1028-2AF20**		1	1 unit	1BS
Withdrawable NEW								
	600	400		**8MF1064-2AF30**		1	1 unit	1BS
		600		**8MF1066-2AF30**		1	1 unit	1BS
		800		**8MF1068-2AF30**		1	1 unit	1BS
	800	400		**8MF1084-2AF30**		1	1 unit	1BS
		600		**8MF1086-2AF30**		1	1 unit	1BS
		800		**8MF1088-2AF30**		1	1 unit	1BS
Telescopic rails								
For withdrawable shelves								
 NSE0_01330	Suitable for cubicle depth 400 and 600.			**8MF1003-2HF**		1	1 unit	1BS
	Suitable for cubicle depth 800 and 1000.			**8MF1006-2HF**		1	1 unit	1BS

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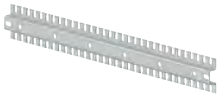
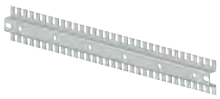
Mounting rail

Overview

- Choose rail 150 mm shorter than the applicable cubicle dimension for mounting in the depth and height (choose a rail with a length of 450 mm for a cubicle depth of 600 mm)
- Choose rail 75 mm shorter than the applicable cubicle dimension for mounting in the width (choose a rail with a length of 525 mm for a cubicle width of 600 mm)
- Universal brackets required for mounting included in the scope of supply
- Rail-to-rail mounting is also possible

Selection and ordering data

	Version	Length	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	d					
	50	325		**8MF1032-2AS30**		1	1 unit	1BS
		350		**8MF1035-2AS30**		1	1 unit	1BS
		425		**8MF1042-2AS30**		1	1 unit	1BS
		525		**8MF1052-2AS30**		1	1 unit	1BS
		550		**8MF1055-2AS30**		1	1 unit	1BS
		625		**8MF1062-2AS30**		1	1 unit	1BS
		750		**8MF1075-2AS30**		1	1 unit	1BS
		1 250		**8MF1125-2AS30**		1	1 unit	1BS
		1 350		**8MF1135-2AS30**		1	1 unit	1BS
		1 450		**8MF1145-2AS30**		1	1 unit	1BS
		1 550		**8MF1155-2AS30**		1	1 unit	1BS
		1 750		**8MF1175-2AS30**		1	1 unit	1BS
		1 950		**8MF1195-2AS30**		1	1 unit	1BS
		2 150		**8MF1215-2AS30**		1	1 unit	1BS
		2 250		**8MF1225-2AS30**		1	1 unit	1BS
	50, suitable for cubicle width 1000 mm	925		**8MF1092-2AS30**		1	1 unit	1BS
	50, suitable for cubicle width 1200 mm	1 125		**8MF1112-2AS30**		1	1 unit	1BS
	50, suitable for cubicle width 600 mm	525		**8MF1105-2AS30**		1	1 unit	1BS
	50, suitable for cubicle width 800 mm	725		**8MF1072-2AS30**		1	1 unit	1BS
	50er, suitable for cubicle width 900 mm	825		**8MF1082-2AS30**		1	1 unit	1BS
	50, suitable for cubicle height 1800 mm	1 650		**8MF1165-2AS30**		1	1 unit	1BS
	50, suitable for cubicle height 2000 mm	1 850		**8MF1185-2AS30**		1	1 unit	1BS
	50, suitable for cubicle height 2200 mm	2 050		**8MF1205-2AS30**		1	1 unit	1BS
	50, suitable for cubicle depth 1000 mm	850		**8MF1085-2AS30**		1	1 unit	1BS
	50, suitable for cubicle depth 400 mm	250		**8MF1025-2AS30**		1	1 unit	1BS
	50, suitable for cubicle depth 600 mm	450		**8MF1045-2AS30**		1	1 unit	1BS
	50, suitable for cubicle depth 800 mm	650		**8MF1065-2AS30**		1	1 unit	1BS
	Serrated	600		**8MF1060-2HC13-0**		1	1 unit	1BS
		800		**8MF1080-2HC13-0**		1	1 unit	1BS
		900		**8MF1090-2HC13-0**		1	1 unit	1BS
		1 000		**8MF1000-2HC13-0**		1	1 unit	1BS
		1 200		**8MF1020-2HC13-0**		1	1 unit	1BS
	Serrated, U shape	600		**8MF1060-2HC03-0**		1	1 unit	1BS
		800		**8MF1080-2HC03-0**		1	1 unit	1BS
		900		**8MF1090-2HC03-0**		1	1 unit	1BS
		1 000		**8MF1000-2HC03-0**		1	1 unit	1BS
		1 200		**8MF1020-2HC03-0**		1	1 unit	1BS
	Compact for cubicle width 1000 mm	966 NEW		**8MF1096-2AS30**		1	1 unit	1BS
	Compact for cubicle width 1200 mm	1 166 NEW		**8MF1006-2AS30**		1	1 unit	1BS
	Compact for cubicle width 500 mm	566 NEW		**8MF1056-2AS30**		1	1 unit	1BS
	Compact for door width 1000 mm	866 NEW		**8MF1086-2AS30**		1	1 unit	1BS
	Compact for door width 300 mm	166 NEW		**8MF1016-2AS30**		1	1 unit	1BS
	compact for door width 400 mm	266 NEW		**8MF1026-2AS30**		1	1 unit	1BS
	Compact for door width 450 mm	316 NEW		**8MF1031-2AS30**		1	1 unit	1BS
	Compact for door width 500 mm	366 NEW		**8MF1036-2AS30**		1	1 unit	1BS
	Compact for door width 600 mm	466 NEW		**8MF1046-2AS30**		1	1 unit	1BS
	Compact for door width 800 mm	666 NEW		**8MF1066-2AS30**		1	1 unit	1BS
	Compact for door width 900 mm	766 NEW		**8MF1076-2AS30**		1	1 unit	1BS
	Heavy duty Can also be used as a mounting aid for heavy, equipped mounting panels.							
		600		**8MF1060-2AH60**		1	1 unit	1BS
		800		**8MF1080-2AH60**		1	1 unit	1BS
		900		**8MF1090-2AH60**		1	1 unit	1BS
		1 000		**8MF1000-2AH60**		1	1 unit	1BS
		1 200		**8MF1020-2AH60**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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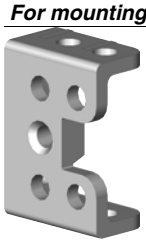
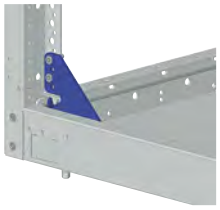
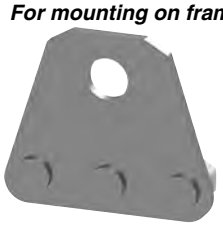
Selection and ordering data

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Mounting bracket									
For mounting expansion elements									
	--	--	--		**8MF1000-2CP**		1	10 units	1BS
Earthquake assembly kit									
For stabilization of the corner connections									
	--	--	--		**8MF1000-2HA**		1	1 unit	1BS
For the stabilization of an intermediate panel									
	--	--	--		**8MF1000-2HW**		1	1 unit	1BS
For the stabilization of a swing frame									
	--	--	--		**8MF1000-2HE**		1	1 unit	1BS
Grounding plate									
For mounting on frame									
	--	--	--		**8MF1000-2HK**		1	1 unit	1BS
Grounding cable									
For door 6 mm^2									
	--	--	--		**8MF1010-2HD3**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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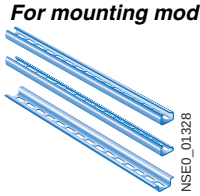
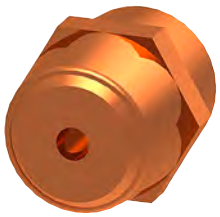
Accessories

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Grounding bar									
30 x 10 mm²									
	--	600	--		**8MF1060-2HD2**		1	1 unit	1BS
	--	800	--		**8MF1080-2HD2**		1	1 unit	1BS
	--	900	--		**8MF1090-2HD2**		1	1 unit	1BS
	--	1 000	--		**8MF1000-2HD2**		1	1 unit	1BS
	--	1 200	--		**8MF1020-2HD2**		1	1 unit	1BS
30 x 5 mm²									
	--	600	--		**8MF1060-2HD1**		1	1 unit	1BS
	--	800	--		**8MF1080-2HD1**		1	1 unit	1BS
	--	900	--		**8MF1090-2HD1**		1	1 unit	1BS
	--	1 000	--		**8MF1000-2HD1**		1	1 unit	1BS
	--	1 200	--		**8MF1020-2HD1**		1	1 unit	1BS
Grounding screw									
M12									
	--	--	--		**8MF1000-2HB**		1	1 unit	1BS
Heater plate									
For mounting a heater unit									
	--	--	--		**8MF1000-2HG**		1	1 unit	1BS
Standard mounting rail									
For mounting modular installation devices									
	--	--	--		**8MF1500-2HS**		1	1 unit	1BS
					8MF1100-2HS		1	1 unit	1BS
Insulated support NEW									
D40x50mm / M8 (PU 2 units)									
	--	--	--		**8MF1000-2VY**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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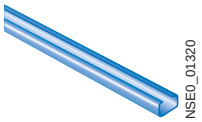
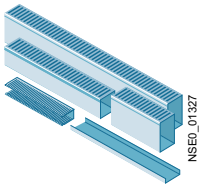
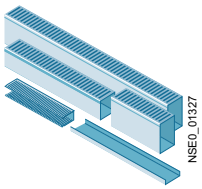
	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Cable clamping rail									
For strain relief									
 NSE0_01320	30	--	400		**8MF1304-2HH**		1	1 unit	1BS
		--	600		**8MF1306-2HH**		1	1 unit	1BS
		--	800		**8MF1308-2HH**		1	1 unit	1BS
		--	1 000		**8MF1301-2HH**		1	1 unit	1BS
		600	--		**8MF1360-2HH**		1	1 unit	1BS
		800	--		**8MF1380-2HH**		1	1 unit	1BS
		900	--		**8MF1390-2HH**		1	1 unit	1BS
		1 000	--		**8MF1310-2HH**		1	1 unit	1BS
		1 200	--		**8MF1320-2HH**		1	1 unit	1BS
	40	--	400		**8MF1404-2HH**		1	1 unit	1BS
		--	600		**8MF1406-2HH**		1	1 unit	1BS
		--	800		**8MF1408-2HH**		1	1 unit	1BS
		--	1 000		**8MF1401-2HH**		1	1 unit	1BS
		600	--		**8MF1460-2HH**		1	1 unit	1BS
		800	--		**8MF1480-2HH**		1	1 unit	1BS
		900	--		**8MF1490-2HH**		1	1 unit	1BS
		1 000	--		**8MF1410-2HH**		1	1 unit	1BS
		1 200	--		**8MF1420-2HH**		1	1 unit	1BS
	50	--	400		**8MF1504-2HH**		1	1 unit	1BS
		--	600		**8MF1506-2HH**		1	1 unit	1BS
		--	800		**8MF1508-2HH**		1	1 unit	1BS
		--	1 000		**8MF1501-2HH**		1	1 unit	1BS
		600	--		**8MF1560-2HH**		1	1 unit	1BS
		800	--		**8MF1580-2HH**		1	1 unit	1BS
		900	--		**8MF1590-2HH**		1	1 unit	1BS
		1 000	--		**8MF1510-2HH**		1	1 unit	1BS
		1 200	--		**8MF1520-2HH**		1	1 unit	1BS
Cable duct									
Halogen-free									
 NSE0_01327	37.5	25	--		**8MF1120-2HL7**		1	1 unit	1BS
	50	25	--		**8MF1220-2HL7**		1	1 unit	1BS
		37.5	--		**8MF1240-2HL7**		1	1 unit	1BS
		50	--		**8MF1250-2HL7**		1	1 unit	1BS
		75	--		**8MF1260-2HL7**		1	1 unit	1BS
	75	50	--		**8MF1350-2HL7**		1	1 unit	1BS
		75	--		**8MF1360-2HL7**		1	1 unit	1BS
		100	--		**8MF1370-2HL7**		1	1 unit	1BS
		125	--		**8MF1380-2HL7**		1	1 unit	1BS
	100	75	--		**8MF1460-2HL7**		1	1 unit	1BS
Standard									
 NSE0_01327	37.5	25	--		**8MF1120-2HL6**		1	1 unit	1BS
	50	25	--		**8MF1220-2HL6**		1	1 unit	1BS
		37.5	--		**8MF1240-2HL6**		1	1 unit	1BS
		50	--		**8MF1250-2HL6**		1	1 unit	1BS
		75	--		**8MF1260-2HL6**		1	1 unit	1BS
	75	50	--		**8MF1350-2HL6**		1	1 unit	1BS
		75	--		**8MF1360-2HL6**		1	1 unit	1BS
		100	--		**8MF1370-2HL6**		1	1 unit	1BS
		125	--		**8MF1380-2HL6**		1	1 unit	1BS
	100	75	--		**8MF1460-2HL6**		1	1 unit	1BS
Edge protection NEW									
9.5 mm x 6.5 mm									
	--	--	--		**8MF1000-2CD**		1	1 unit	1BS

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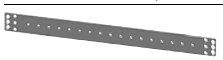
Accessories

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Mounting plate NEW									
122 mm x 91 mm	--	--	--		**8MF1000-2HH**		1	1 unit	1BS
									
122 mm x 92 mm with DIN rail	--	--	--		**8MF1000-2HH1**		1	1 unit	1BS
									
Rail for improving EMC NEW									
Installation in cubicle width	--	400	--		**8MF1040-2HN**		1	1 unit	1BS
	--	600	--		**8MF1060-2HN**		1	1 unit	1BS
	--	800	--		**8MF1080-2HN**		1	1 unit	1BS
	--	900	--		**8MF1090-2HN**		1	1 unit	1BS
	--	1 000	--		**8MF1000-2HN**		1	1 unit	1BS
	--	1 200	--		**8MF1020-2HN**		1	1 unit	1BS
Installation in cubicle depth	--	--	400		**8MF1004-2HN**		1	1 unit	1BS
			600		**8MF1006-2HN**		1	1 unit	1BS
			800		**8MF1008-2HN**		1	1 unit	1BS
			10 000		**8MF1001-2HN**		1	1 unit	1BS
Universal bracket for 19" components NEW									
For cable duct, DIN rail, C-rail	--	--	--		**8MF1000-2HH2**		1	1 unit	1BS
									
	--	--	--		**8MF1000-2HH3**		1	1 unit	1BS
									
For cable duct, DIN rail, C-rail, lamp	--	--	--		**8MF1000-2HH4**		1	1 unit	1BS
									

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Bracket NEW									
For variable mounting of cable clamping rails	--	--	--		**8MF1000-2HH5**		1	1 unit	1BS
									
Toothed bar									
Length: 100 mm Installed on mounting rail	--	--	--		**8MF1000-2HC**		1	1 unit	1BS
									

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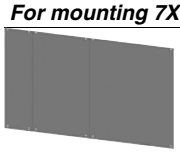
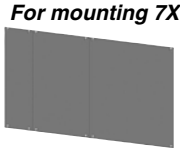
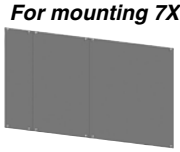
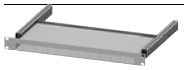
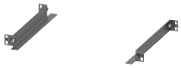
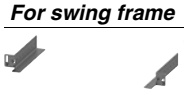
19" elements

Selection and ordering data

	Design of the surface	Height	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PE	PS	PG
		mm	mm	d					
19" cover									
For modular installation devices									
	--	3HU	--		**8MF1000-2AB31**		1	1 unit	1BS
For swing frame									
	--	2HU	--		**8MF1000-2AB32**		1	1 unit	1BS
	--	3HU			**8MF1000-2AB33**		1	1 unit	1BS
For 19" frame									
	Galvanized	--	--		**8MF1000-2AB01**		1	1 unit	1BS
					8MF1000-2AB02		1	1 unit	1BS
					8MF1000-2AB03		1	1 unit	1BS
					8MF1000-2AB04		1	1 unit	1BS
					8MF1000-2AB05		1	1 unit	1BS
					8MF1000-2AB06		1	1 unit	1BS
					8MF1000-2AB07		1	1 unit	1BS
For mounting 7XP 1/6 standard devices NEW									
	Galvanized	--	--		**8MF1000-2AB34**		1	1 unit	1BS
For mounting 7XP 2/6 standard devices NEW									
	Galvanized	--	--		**8MF1000-2AB35**		1	1 unit	1BS
For mounting 7XP 3/6 standard devices NEW									
	Galvanized	--	--		**8MF1000-2AB36**		1	1 unit	1BS
Shelve									
For 19" frame									
	Powder-coated	--	230		**8MF1000-2AB12**		1	1 unit	1BS
			400		**8MF1000-2AB14**		1	1 unit	1BS
	Galvanized NEW	--	--		**8MF1000-2HF12**		1	1 unit	1BS
Slide rail NEW									
For 19" fixed-mounted									
	Galvanized	--	400		**8MF1004-2HG12**		1	1 unit	1BS
			600		**8MF1006-2HG12**		1	1 unit	1BS
			800		**8MF1008-2HG12**		1	1 unit	1BS
			1 000		**8MF1000-2HG12**		1	1 unit	1BS
For swing frame									
	Galvanized	--	--		**8MF1000-2HS12**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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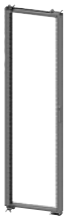
	Design of the surface	Height	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PE	PS	PG
		mm	mm	d					
Mounting plate									
For swing frames NEW									
	Galvanized	--	--		**8MF1010-2AB00**		1	1 unit	1BS
					8MF1020-2AB00		1	1 unit	1BS
					8MF1050-2AB00		1	1 unit	1BS
					8MF1210-2AB00		1	1 unit	1BS
					8MF1220-2AB00		1	1 unit	1BS
					8MF1250-2AB00		1	1 unit	1BS
					8MF1810-2AB00		1	1 unit	1BS
					8MF1820-2AB00		1	1 unit	1BS
					8MF1850-2AB00		1	1 unit	1BS
Frame									
For mounting test switches, 19"									
	Galvanized	--	--		**8MF1000-2AB30**		1	1 unit	1BS
Cubicle frame[1]									
For installation of 19" units									
	Galvanized	400	--		**8MF1100-2AN30**		1	1 unit	1BS
		600	--		**8MF1200-2AN30**		1	1 unit	1BS
		800	--		**8MF1300-2AN30**		1	1 unit	1BS
		1 000	--		**8MF1400-2AN30**		1	1 unit	1BS
		1 200	--		**8MF1500-2AN30**		1	1 unit	1BS
		1 400	--		**8MF1600-2AN30**		1	1 unit	1BS
		1 800	--		**8MF1700-2AN30**		1	1 unit	1BS
		2 000	--		**8MF1800-2AN30**		1	1 unit	1BS
		2 200	--		**8MF1900-2AN30**		1	1 unit	1BS
Swing frame[1]									
For installation of 19" units, screwed NEW									
	Galvanized	1 800	--		**8MF1800-2AR02-4**		1	1 unit	1BS
		2 000	--		**8MF1000-2AR02-4**		1	1 unit	1BS
		2 200	--		**8MF1200-2AR02-4**		1	1 unit	1BS
	Powder-coated	1 800	--		**8MF1800-2AR02-3**		1	1 unit	1BS
		2 000	--		**8MF1000-2AR02-3**		1	1 unit	1BS
		2 200	--		**8MF1200-2AR02-3**		1	1 unit	1BS
For installation of 19" units, welded									
	Powder-coated	1 800	--		**8MF1800-2AR02-2**		1	1 unit	1BS
		2 000	--		**8MF1000-2AR02-2**		1	1 unit	1BS
		2 200	--		**8MF1200-2AR02-2**		1	1 unit	1BS

[1] Additionally order 2x heavy duty mounting rails in cubicle width. The cubicle must be more than 600 mm wide.

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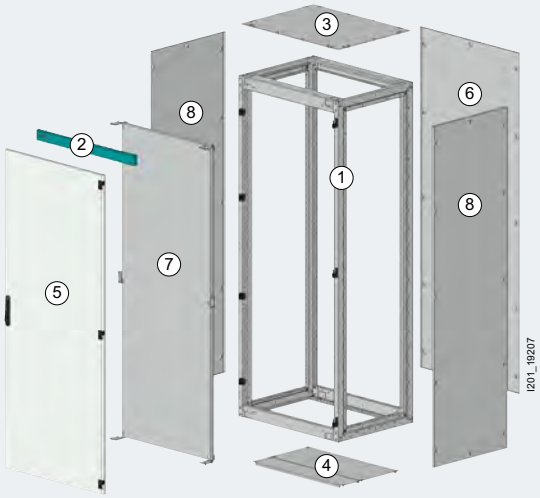
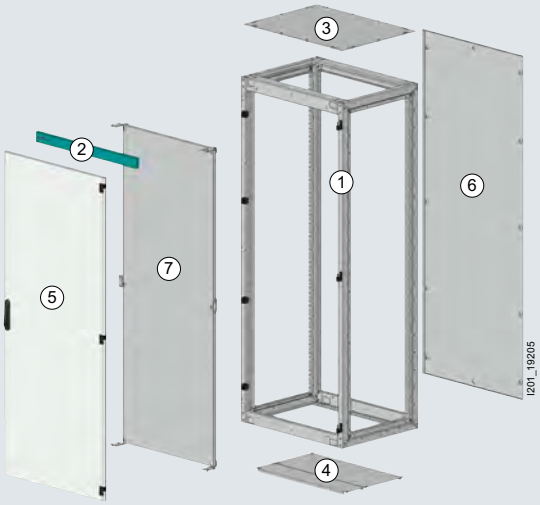
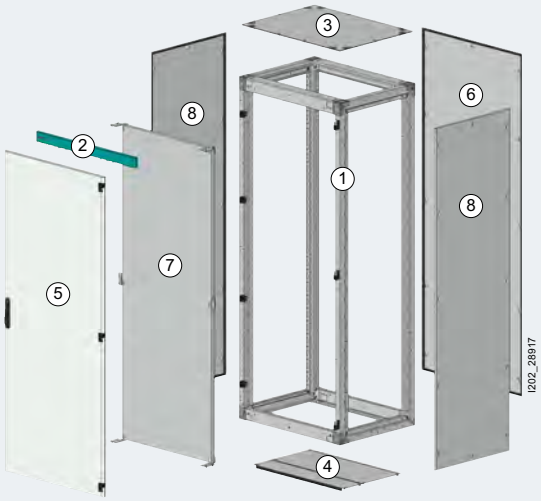
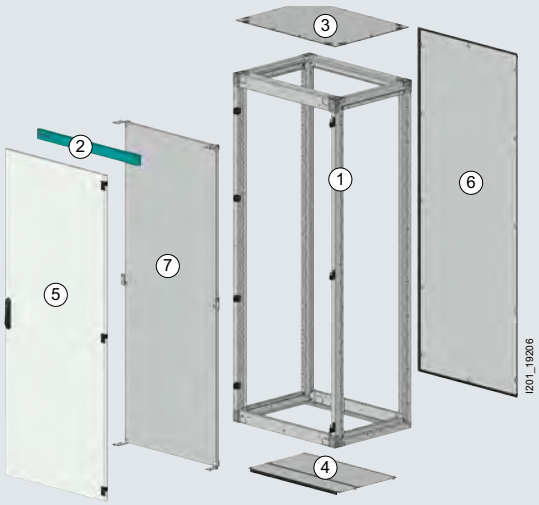
Overview

Complete cubicle versions

	Stand-alone installation (with side panels)	Suite installation (without side panels)
Basic cubicle, IP40		
	(1) Frame (2) Trim strip (3) Roof plate closed, IP40 (4) Base, split IP30 (5) Door, IP55 [1] (6) Rear panel, IP40 (7) Smooth mounting plate (8) Side panels, IP40	(1) Frame (2) Trim strip (3) Roof plate closed, IP40 (4) Base, split IP30 (5) Door, IP55 [1] (6) Rear panel, IP40 (7) Smooth mounting plate
Basic cubicle, IP55		
	(1) Frame (2) Trim strip (3) Roof plate, IP55 (4) Base, split IP55 (5) Door, IP55 [1] (6) Rear panel, IP55 (7) Smooth mounting plate (8) Side panels, IP55	(1) Frame (2) Trim strip (3) Roof plate, IP55 (4) Base, split IP55 (5) Door, IP55 [1] (6) Rear panel, IP55 (7) Smooth mounting plate

From a width of 900 mm, the cubicles are designed with symmetrically split double doors.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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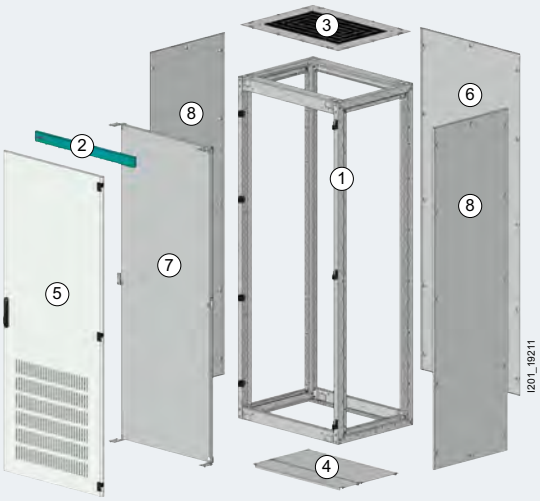
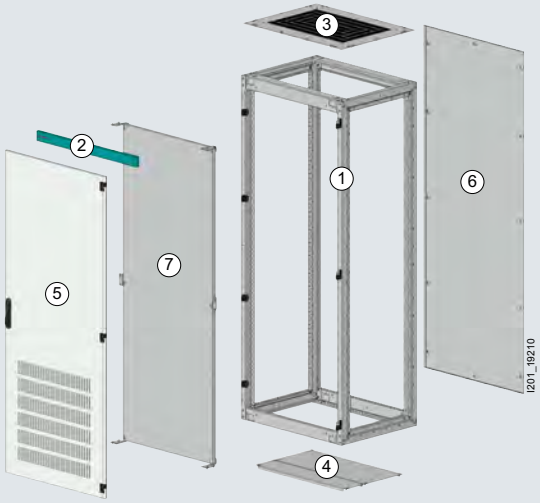
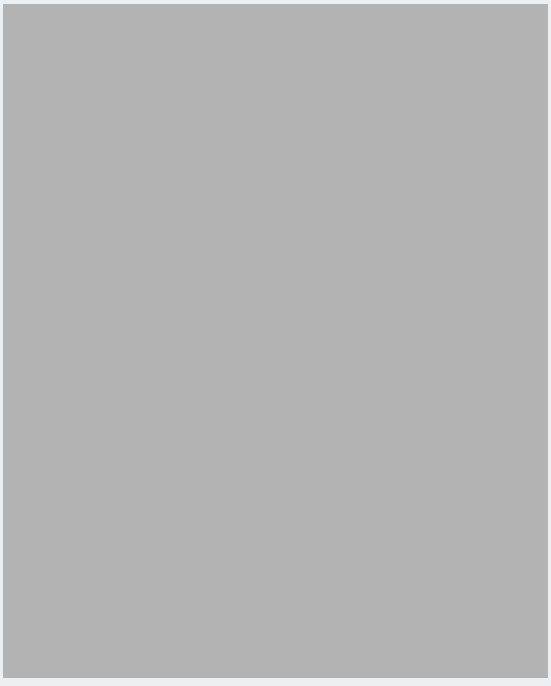
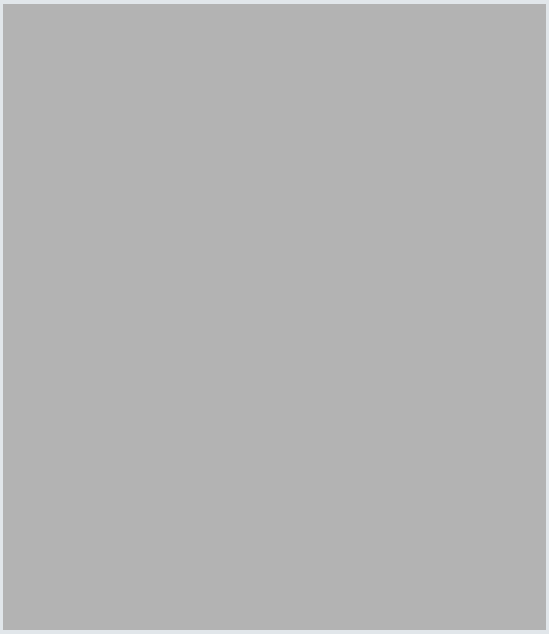
	Stand-alone installation (with side panels)	Suite installation (without side panels)
Ventilated cubicles, IP20	 ① Frame ② Trim strip ③ Roof with ventilation fins, IP40 ④ Base, split IP30 ⑤ Door with ventilation slits, IP20 [1] ⑥ Rear panel, IP40 ⑦ Smooth mounting plate ⑧ Side panels, IP40	 ① Frame ② Trim strip ③ Roof with ventilation fins, IP40 ④ Base, split IP30 ⑤ Door with ventilation slits, IP20 [1] ⑥ Rear panel, IP40 ⑦ Smooth mounting plate
Data cubicles, IP40		

From a width of 900 mm, the cubicles are designed with symmetrically split double doors.

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General data

Application

Typical areas of application

- Power station control systems
- Converters
- Transport
- Cubicles in industry

Design

Mounting components

Parts list		Basic cubicle				Ventilated cubicle		Data cubicle	
		IP40		IP55		IP20		IP40	
		□	□□□□	□	□□□□	□	□□□□	□	□□□□
Frame									
Frame		✓	✓	✓	✓	✓	✓	✓	✓
Trim strip with Siemens logo		✓	✓	✓	✓	✓	✓	✓	✓
Enclosure									
Floor	Closed, IP55	--	--	✓	✓	--	--	--	--
	With sub-divisions, IP40	✓	✓	--	--	✓	✓	✓	✓
Roof	Closed, IP40	✓	✓	--	--	--	--	--	--
	Closed, IP55	--	--	✓	✓	--	--	--	--
	With flange	--	--	--	--	--	--	✓	✓
	With ventilation fins	--	--	--	--	✓	✓	--	--
Door	Closed, IP55	✓	✓	✓	✓	--	--	✓	✓
	Ventilated, IP20	--	--	--	--	✓	✓	--	--
	With glass insert, IP55	--	--	--	--	--	--	✓	✓
Rear panel	Smooth, IP40	✓	✓	--	--	✓	✓	--	--
	Smooth, IP55	--	--	✓	✓	--	--	--	--
Side panel	Smooth, IP40	✓	--	--	--	✓	--	✓	--
	Smooth, IP55	--	--	✓	--	--	--	--	--
Expansion									
Rear smooth mounting panel		✓	✓	✓	✓	✓	✓	--	--
19" fixed-mounted		--	--	--	--	--	--	✓	✓
✓ Available or possible -- Not available or not possible		Stand-alone installation □		Suite installation □□□□					

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Degree of protection, standards, dimensions

	Basic cubicle		Ventilated cubicle	Data cubicle	Tests in compliance with IEC 61439:
Degree of protection	**IP40**	**IP55**	**IP20**	**IP40**	• Corrosion resistance
Standards	IEC 62208, IEC 61439-1				• Heat stability
Safety class	I				• Resistance to extraordinary heat and fire raising
Dimensions					
Height mm	2000 / 2200			2000	• Impact test
Width mm	600 / 800 / 900 / 1000 / 1200			600	• Degree of protection of enclosures
Depth mm	400 / 600 / 800 / 1000				• Continuity of PE conductor connection
					• Proof of power loss dissipation capacity

Material, surface

	Material	Surface
Frame		
Frame	2.5 mm sheet steel	Galvanized
Base	1.5 mm sheet steel	Powder-coated, RAL 7035
Trim strips	2.5 mm sheet steel	Powder-coated, petrol
Enclosure		
Floor	2.0 mm sheet steel	Galvanized
Roof	1.5 mm sheet steel	Galvanized
Side/rear panel	1.5 mm sheet steel	Powder-coated, RAL 7035
Intermediate panel	2.5 mm sheet steel	Galvanized
Door	1.5 mm sheet steel	Powder-coated, RAL 7035
Expansion		
Rear mounting panel	2.5 mm sheet steel	Galvanized
19" versions	2.5 mm sheet steel	Powder-coated, RAL 7035

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Stand-alone installation, IP40

Selection and ordering data



Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
1 800 NEW	400	400		**8MF1844-3BS4**		1	1 unit	1BS
		500		**8MF1845-3BS4**		1	1 unit	1BS
		600		**8MF1846-3BS4**		1	1 unit	1BS
		800		**8MF1848-3BS4**		1	1 unit	1BS
		1 000		**8MF1840-3BS4**		1	1 unit	1BS
	600	400		**8MF1864-3BS4**		1	1 unit	1BS
		500		**8MF1865-3BS4**		1	1 unit	1BS
		600		**8MF1866-3BS4**		1	1 unit	1BS
		800		**8MF1868-3BS4**		1	1 unit	1BS
		1 000		**8MF1860-3BS4**		1	1 unit	1BS
	800	400		**8MF1884-3BS4**		1	1 unit	1BS
		500		**8MF1885-3BS4**		1	1 unit	1BS
		600		**8MF1886-3BS4**		1	1 unit	1BS
		800		**8MF1888-3BS4**		1	1 unit	1BS
		1 000		**8MF1880-3BS4**		1	1 unit	1BS
	900	400		**8MF1894-3BS4**		1	1 unit	1BS
		500		**8MF1895-3BS4**		1	1 unit	1BS
		600		**8MF1896-3BS4**		1	1 unit	1BS
		800		**8MF1898-3BS4**		1	1 unit	1BS
		1 000		**8MF1890-3BS4**		1	1 unit	1BS
	1 000	400		**8MF1804-3BS4**		1	1 unit	1BS
		500		**8MF1805-3BS4**		1	1 unit	1BS
		600		**8MF1806-3BS4**		1	1 unit	1BS
		800		**8MF1808-3BS4**		1	1 unit	1BS
		1 000		**8MF1800-3BS4**		1	1 unit	1BS
	1 200	400		**8MF1824-3BS4**		1	1 unit	1BS
		500		**8MF1825-3BS4**		1	1 unit	1BS
		600		**8MF1826-3BS4**		1	1 unit	1BS
		800		**8MF1828-3BS4**		1	1 unit	1BS
		1 000		**8MF1820-3BS4**		1	1 unit	1BS
2 000	400 NEW	400		**8MF1044-3BS4**		1	1 unit	1BS
		500		**8MF1045-3BS4**		1	1 unit	1BS
		600		**8MF1046-3BS4**		1	1 unit	1BS
		800		**8MF1048-3BS4**		1	1 unit	1BS
		1 000		**8MF1040-3BS4**		1	1 unit	1BS
	600	400		**8MF1064-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1065-3BS4**		1	1 unit	1BS
		600		**8MF1066-3BS4**		1	1 unit	1BS
		800		**8MF1068-3BS4**		1	1 unit	1BS
		1 000		**8MF1060-3BS4**		1	1 unit	1BS
	800	400		**8MF1084-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1085-3BS4**		1	1 unit	1BS
		600		**8MF1086-3BS4**		1	1 unit	1BS
		800		**8MF1088-3BS4**		1	1 unit	1BS
		1 000		**8MF1080-3BS4**		1	1 unit	1BS
	900	400		**8MF1094-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1095-3BS4**		1	1 unit	1BS
		600		**8MF1096-3BS4**		1	1 unit	1BS
		800		**8MF1098-3BS4**		1	1 unit	1BS
		1 000		**8MF1090-3BS4**		1	1 unit	1BS
	1 000	400		**8MF1004-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1005-3BS4**		1	1 unit	1BS
		600		**8MF1006-3BS4**		1	1 unit	1BS
		800		**8MF1008-3BS4**		1	1 unit	1BS
		1 000		**8MF1000-3BS4**		1	1 unit	1BS
	1 200	400		**8MF1024-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1025-3BS4**		1	1 unit	1BS
		600		**8MF1026-3BS4**		1	1 unit	1BS
		800		**8MF1028-3BS4**		1	1 unit	1BS
		1 000		**8MF1020-3BS4**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Stand-alone installation, IP40

Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400 NEW	400		**8MF1244-3BS4**		1	1 unit	1BS
		500		**8MF1245-3BS4**		1	1 unit	1BS
		600		**8MF1246-3BS4**		1	1 unit	1BS
		800		**8MF1248-3BS4**		1	1 unit	1BS
		1 000		**8MF1240-3BS4**		1	1 unit	1BS
	600	400		**8MF1264-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1265-3BS4**		1	1 unit	1BS
		600		**8MF1266-3BS4**		1	1 unit	1BS
		800		**8MF1268-3BS4**		1	1 unit	1BS
		1 000		**8MF1260-3BS4**		1	1 unit	1BS
	800	400		**8MF1284-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1285-3BS4**		1	1 unit	1BS
		600		**8MF1286-3BS4**		1	1 unit	1BS
		800		**8MF1288-3BS4**		1	1 unit	1BS
		1 000		**8MF1280-3BS4**		1	1 unit	1BS
	900	400		**8MF1294-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1295-3BS4**		1	1 unit	1BS
		600		**8MF1296-3BS4**		1	1 unit	1BS
		800		**8MF1298-3BS4**		1	1 unit	1BS
		1 000		**8MF1290-3BS4**		1	1 unit	1BS
	1 000	400		**8MF1204-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1205-3BS4**		1	1 unit	1BS
		600		**8MF1206-3BS4**		1	1 unit	1BS
		800		**8MF1208-3BS4**		1	1 unit	1BS
		1 000		**8MF1200-3BS4**		1	1 unit	1BS
	1 200	400		**8MF1224-3BS4**		1	1 unit	1BS
		500 NEW		**8MF1225-3BS4**		1	1 unit	1BS
		600		**8MF1226-3BS4**		1	1 unit	1BS
		800		**8MF1228-3BS4**		1	1 unit	1BS
		1 000		**8MF1220-3BS4**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data



Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
1 800 NEW	400	400		**8MF1844-3BR4**		1	1 unit	1BS
		500		**8MF1845-3BR4**		1	1 unit	1BS
		600		**8MF1846-3BR4**		1	1 unit	1BS
		800		**8MF1848-3BR4**		1	1 unit	1BS
		1 000		**8MF1840-3BR4**		1	1 unit	1BS
	600	400		**8MF1864-3BR4**		1	1 unit	1BS
		500		**8MF1865-3BR4**		1	1 unit	1BS
		600		**8MF1866-3BR4**		1	1 unit	1BS
		800		**8MF1868-3BR4**		1	1 unit	1BS
		1 000		**8MF1860-3BR4**		1	1 unit	1BS
	800	400		**8MF1884-3BR4**		1	1 unit	1BS
		500		**8MF1885-3BR4**		1	1 unit	1BS
		600		**8MF1886-3BR4**		1	1 unit	1BS
		800		**8MF1888-3BR4**		1	1 unit	1BS
		1 000		**8MF1880-3BR4**		1	1 unit	1BS
	900	400		**8MF1894-3BR4**		1	1 unit	1BS
		500		**8MF1895-3BR4**		1	1 unit	1BS
		600		**8MF1896-3BR4**		1	1 unit	1BS
		800		**8MF1898-3BR4**		1	1 unit	1BS
		1 000		**8MF1890-3BR4**		1	1 unit	1BS
	1 000	400		**8MF1804-3BR4**		1	1 unit	1BS
		500		**8MF1805-3BR4**		1	1 unit	1BS
		600		**8MF1806-3BR4**		1	1 unit	1BS
		800		**8MF1808-3BR4**		1	1 unit	1BS
		1 000		**8MF1800-3BR4**		1	1 unit	1BS
	1 200	400		**8MF1824-3BR4**		1	1 unit	1BS
		500		**8MF1825-3BR4**		1	1 unit	1BS
		600		**8MF1826-3BR4**		1	1 unit	1BS
		800		**8MF1828-3BR4**		1	1 unit	1BS
		1 000		**8MF1820-3BR4**		1	1 unit	1BS
2 000	400	400		**8MF1044-3BR4**		1	1 unit	1BS
		500		**8MF1045-3BR4**		1	1 unit	1BS
		600		**8MF1046-3BR4**		1	1 unit	1BS
		800		**8MF1048-3BR4**		1	1 unit	1BS
		1 000		**8MF1040-3BR4**		1	1 unit	1BS
	600	400		**8MF1064-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1065-3BR4**		1	1 unit	1BS
		600		**8MF1066-3BR4**		1	1 unit	1BS
		800		**8MF1068-3BR4**		1	1 unit	1BS
		1 000		**8MF1060-3BR4**		1	1 unit	1BS
	800	400		**8MF1084-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1085-3BR4**		1	1 unit	1BS
		600		**8MF1086-3BR4**		1	1 unit	1BS
		800		**8MF1088-3BR4**		1	1 unit	1BS
		1 000		**8MF1080-3BR4**		1	1 unit	1BS
	900	400		**8MF1094-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1095-3BR4**		1	1 unit	1BS
		600		**8MF1096-3BR4**		1	1 unit	1BS
		800		**8MF1098-3BR4**		1	1 unit	1BS
		1 000		**8MF1090-3BR4**		1	1 unit	1BS
	1 000	400		**8MF1004-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1005-3BR4**		1	1 unit	1BS
		600		**8MF1006-3BR4**		1	1 unit	1BS
		800		**8MF1008-3BR4**		1	1 unit	1BS
		1 000		**8MF1000-3BR4**		1	1 unit	1BS
	1 200	400		**8MF1024-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1025-3BR4**		1	1 unit	1BS
		600		**8MF1026-3BR4**		1	1 unit	1BS
		800		**8MF1028-3BR4**		1	1 unit	1BS
		1 000		**8MF1020-3BR4**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Suite installation, IP40

Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400 NEW	400		**8MF1244-3BR4**		1	1 unit	1BS
		500		**8MF1245-3BR4**		1	1 unit	1BS
		600		**8MF1246-3BR4**		1	1 unit	1BS
		800		**8MF1248-3BR4**		1	1 unit	1BS
		1 000		**8MF1240-3BR4**		1	1 unit	1BS
	600	400		**8MF1264-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1265-3BR4**		1	1 unit	1BS
		600		**8MF1266-3BR4**		1	1 unit	1BS
		800		**8MF1268-3BR4**		1	1 unit	1BS
		1 000		**8MF1260-3BR4**		1	1 unit	1BS
	800	400		**8MF1284-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1285-3BR4**		1	1 unit	1BS
		600		**8MF1286-3BR4**		1	1 unit	1BS
		800		**8MF1288-3BR4**		1	1 unit	1BS
		1 000		**8MF1280-3BR4**		1	1 unit	1BS
	900	400		**8MF1294-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1295-3BR4**		1	1 unit	1BS
		600		**8MF1296-3BR4**		1	1 unit	1BS
		800		**8MF1298-3BR4**		1	1 unit	1BS
		1 000		**8MF1290-3BR4**		1	1 unit	1BS
	1 000	400		**8MF1204-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1205-3BR4**		1	1 unit	1BS
		600		**8MF1206-3BR4**		1	1 unit	1BS
		800		**8MF1208-3BR4**		1	1 unit	1BS
		1 000		**8MF1200-3BR4**		1	1 unit	1BS
	1 200	400		**8MF1224-3BR4**		1	1 unit	1BS
		500 NEW		**8MF1225-3BR4**		1	1 unit	1BS
		600		**8MF1226-3BR4**		1	1 unit	1BS
		800		**8MF1228-3BR4**		1	1 unit	1BS
		1 000		**8MF1220-3BR4**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Stand-alone installation, IP55

Selection and ordering data



Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
1 800 NEW	400	400		**8MF1844-3BS5**		1	1 unit	1BS
		500		**8MF1845-3BS5**		1	1 unit	1BS
		600		**8MF1846-3BS5**		1	1 unit	1BS
		800		**8MF1848-3BS5**		1	1 unit	1BS
		1 000		**8MF1840-3BS5**		1	1 unit	1BS
	600	400		**8MF1864-3BS5**		1	1 unit	1BS
		500		**8MF1865-3BS5**		1	1 unit	1BS
		600		**8MF1866-3BS5**		1	1 unit	1BS
		800		**8MF1868-3BS5**		1	1 unit	1BS
		1 000		**8MF1860-3BS5**		1	1 unit	1BS
	800	400		**8MF1884-3BS5**		1	1 unit	1BS
		500		**8MF1885-3BS5**		1	1 unit	1BS
		600		**8MF1886-3BS5**		1	1 unit	1BS
		800		**8MF1888-3BS5**		1	1 unit	1BS
		1 000		**8MF1880-3BS5**		1	1 unit	1BS
	900	400		**8MF1894-3BS5**		1	1 unit	1BS
		500		**8MF1895-3BS5**		1	1 unit	1BS
		600		**8MF1896-3BS5**		1	1 unit	1BS
		800		**8MF1898-3BS5**		1	1 unit	1BS
		1 000		**8MF1890-3BS5**		1	1 unit	1BS
	1 000	400		**8MF1804-3BS5**		1	1 unit	1BS
		500		**8MF1805-3BS5**		1	1 unit	1BS
		600		**8MF1806-3BS5**		1	1 unit	1BS
		800		**8MF1808-3BS5**		1	1 unit	1BS
		1 000		**8MF1800-3BS5**		1	1 unit	1BS
	1 200	400		**8MF1824-3BS5**		1	1 unit	1BS
		500		**8MF1825-3BS5**		1	1 unit	1BS
		600		**8MF1826-3BS5**		1	1 unit	1BS
		800		**8MF1828-3BS5**		1	1 unit	1BS
		1 000		**8MF1820-3BS5**		1	1 unit	1BS
2 000	400 NEW	400		**8MF1044-3BS5**		1	1 unit	1BS
		500		**8MF1045-3BS5**		1	1 unit	1BS
		600		**8MF1046-3BS5**		1	1 unit	1BS
		800		**8MF1048-3BS5**		1	1 unit	1BS
		1 000		**8MF1040-3BS5**		1	1 unit	1BS
	600	400		**8MF1064-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1065-3BS5**		1	1 unit	1BS
		600		**8MF1066-3BS5**		1	1 unit	1BS
		800		**8MF1068-3BS5**		1	1 unit	1BS
		1 000		**8MF1060-3BS5**		1	1 unit	1BS
	800	400		**8MF1084-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1085-3BS5**		1	1 unit	1BS
		600		**8MF1086-3BS5**		1	1 unit	1BS
		800		**8MF1088-3BS5**		1	1 unit	1BS
		1 000		**8MF1080-3BS5**		1	1 unit	1BS
	900	400		**8MF1094-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1095-3BS5**		1	1 unit	1BS
		600		**8MF1096-3BS5**		1	1 unit	1BS
		800		**8MF1098-3BS5**		1	1 unit	1BS
		1 000		**8MF1090-3BS5**		1	1 unit	1BS
	1 000	400		**8MF1004-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1005-3BS5**		1	1 unit	1BS
		600		**8MF1006-3BS5**		1	1 unit	1BS
		800		**8MF1008-3BS5**		1	1 unit	1BS
		1 000		**8MF1000-3BS5**		1	1 unit	1BS
	1 200	400		**8MF1024-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1025-3BS5**		1	1 unit	1BS
		600		**8MF1026-3BS5**		1	1 unit	1BS
		800		**8MF1028-3BS5**		1	1 unit	1BS
		1 000		**8MF1020-3BS5**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Stand-alone installation, IP55

Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400 NEW	400		**8MF1244-3BS5**		1	1 unit	1BS
		500		**8MF1245-3BS5**		1	1 unit	1BS
		600		**8MF1246-3BS5**		1	1 unit	1BS
		800		**8MF1248-3BS5**		1	1 unit	1BS
		1 000		**8MF1240-3BS5**		1	1 unit	1BS
	600	400		**8MF1264-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1265-3BS5**		1	1 unit	1BS
		600		**8MF1266-3BS5**		1	1 unit	1BS
		800		**8MF1268-3BS5**		1	1 unit	1BS
		1 000		**8MF1260-3BS5**		1	1 unit	1BS
	800	400		**8MF1284-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1285-3BS5**		1	1 unit	1BS
		600		**8MF1286-3BS5**		1	1 unit	1BS
		800		**8MF1288-3BS5**		1	1 unit	1BS
		1 000		**8MF1280-3BS5**		1	1 unit	1BS
	900	400		**8MF1294-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1295-3BS5**		1	1 unit	1BS
		600		**8MF1296-3BS5**		1	1 unit	1BS
		800		**8MF1298-3BS5**		1	1 unit	1BS
		1 000		**8MF1290-3BS5**		1	1 unit	1BS
	1 000	400		**8MF1204-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1205-3BS5**		1	1 unit	1BS
		600		**8MF1206-3BS5**		1	1 unit	1BS
		800		**8MF1208-3BS5**		1	1 unit	1BS
		1 000		**8MF1200-3BS5**		1	1 unit	1BS
	1 200	400		**8MF1224-3BS5**		1	1 unit	1BS
		500 NEW		**8MF1225-3BS5**		1	1 unit	1BS
		600		**8MF1226-3BS5**		1	1 unit	1BS
		800		**8MF1228-3BS5**		1	1 unit	1BS
		1 000		**8MF1220-3BS5**		1	1 unit	1BS

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Suite installation, IP55

Selection and ordering data



Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
1 800 NEW	400	400		**8MF1844-3BR5**		1	1 unit	1BS
		500		**8MF1845-3BR5**		1	1 unit	1BS
		600		**8MF1846-3BR5**		1	1 unit	1BS
		800		**8MF1848-3BR5**		1	1 unit	1BS
		1 000		**8MF1840-3BR5**		1	1 unit	1BS
	600	400		**8MF1864-3BR5**		1	1 unit	1BS
		500		**8MF1865-3BR5**		1	1 unit	1BS
		600		**8MF1866-3BR5**		1	1 unit	1BS
		800		**8MF1868-3BR5**		1	1 unit	1BS
		1 000		**8MF1860-3BR5**		1	1 unit	1BS
	800	400		**8MF1884-3BR5**		1	1 unit	1BS
		500		**8MF1885-3BR5**		1	1 unit	1BS
		600		**8MF1886-3BR5**		1	1 unit	1BS
		800		**8MF1888-3BR5**		1	1 unit	1BS
		1 000		**8MF1880-3BR5**		1	1 unit	1BS
	900	400		**8MF1894-3BR5**		1	1 unit	1BS
		500		**8MF1895-3BR5**		1	1 unit	1BS
		600		**8MF1896-3BR5**		1	1 unit	1BS
		800		**8MF1898-3BR5**		1	1 unit	1BS
		1 000		**8MF1890-3BR5**		1	1 unit	1BS
	1 000	400		**8MF1804-3BR5**		1	1 unit	1BS
		500		**8MF1805-3BR5**		1	1 unit	1BS
		600		**8MF1806-3BR5**		1	1 unit	1BS
		800		**8MF1808-3BR5**		1	1 unit	1BS
		1 000		**8MF1800-3BR5**		1	1 unit	1BS
	1 200	400		**8MF1824-3BR5**		1	1 unit	1BS
		500		**8MF1825-3BR5**		1	1 unit	1BS
		600		**8MF1826-3BR5**		1	1 unit	1BS
		800		**8MF1828-3BR5**		1	1 unit	1BS
		1 000		**8MF1820-3BR5**		1	1 unit	1BS
2 000	400 NEW	400		**8MF1044-3BR5**		1	1 unit	1BS
		500		**8MF1045-3BR5**		1	1 unit	1BS
		600		**8MF1046-3BR5**		1	1 unit	1BS
		800		**8MF1048-3BR5**		1	1 unit	1BS
		1 000		**8MF1040-3BR5**		1	1 unit	1BS
	600	400		**8MF1064-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1065-3BR5**		1	1 unit	1BS
		600		**8MF1066-3BR5**		1	1 unit	1BS
		800		**8MF1068-3BR5**		1	1 unit	1BS
		1 000		**8MF1060-3BR5**		1	1 unit	1BS
	800	400		**8MF1084-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1085-3BR5**		1	1 unit	1BS
		600		**8MF1086-3BR5**		1	1 unit	1BS
		800		**8MF1088-3BR5**		1	1 unit	1BS
		1 000		**8MF1080-3BR5**		1	1 unit	1BS
	900	400		**8MF1094-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1095-3BR5**		1	1 unit	1BS
		600		**8MF1096-3BR5**		1	1 unit	1BS
		800		**8MF1098-3BR5**		1	1 unit	1BS
		1 000		**8MF1090-3BR5**		1	1 unit	1BS
	1 000	400		**8MF1004-3BR5**		1	1 unit	1BS
		500		**8MF1005-3BR5**		1	1 unit	1BS
		600		**8MF1006-3BR5**		1	1 unit	1BS
		800		**8MF1008-3BR5**		1	1 unit	1BS
		1 000		**8MF1000-3BR5**		1	1 unit	1BS
	1 200	400		**8MF1024-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1025-3BR5**		1	1 unit	1BS
		600		**8MF1026-3BR5**		1	1 unit	1BS
		800		**8MF1028-3BR5**		1	1 unit	1BS
		1 000		**8MF1020-3BR5**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400 NEW	400		**8MF1244-3BR5**		1	1 unit	1BS
		500		**8MF1245-3BR5**		1	1 unit	1BS
		600		**8MF1246-3BR5**		1	1 unit	1BS
		800		**8MF1248-3BR5**		1	1 unit	1BS
		1 000		**8MF1240-3BR5**		1	1 unit	1BS
	600	400		**8MF1264-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1265-3BR5**		1	1 unit	1BS
		600		**8MF1266-3BR5**		1	1 unit	1BS
		800		**8MF1268-3BR5**		1	1 unit	1BS
		1 000		**8MF1260-3BR5**		1	1 unit	1BS
	800	400		**8MF1284-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1285-3BR5**		1	1 unit	1BS
		600		**8MF1286-3BR5**		1	1 unit	1BS
		800		**8MF1288-3BR5**		1	1 unit	1BS
		1 000		**8MF1280-3BR5**		1	1 unit	1BS
	900	400		**8MF1294-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1295-3BR5**		1	1 unit	1BS
		600		**8MF1296-3BR5**		1	1 unit	1BS
		800		**8MF1298-3BR5**		1	1 unit	1BS
		1 000		**8MF1290-3BR5**		1	1 unit	1BS
	1 000	400		**8MF1204-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1205-3BR5**		1	1 unit	1BS
		600		**8MF1206-3BR5**		1	1 unit	1BS
		800		**8MF1208-3BR5**		1	1 unit	1BS
		1 000		**8MF1200-3BR5**		1	1 unit	1BS
	1 200	400		**8MF1224-3BR5**		1	1 unit	1BS
		500 NEW		**8MF1225-3BR5**		1	1 unit	1BS
		600		**8MF1226-3BR5**		1	1 unit	1BS
		800		**8MF1228-3BR5**		1	1 unit	1BS
		1 000		**8MF1220-3BR5**		1	1 unit	1BS

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Stand-alone installation with ventilation openings, IP20

Selection and ordering data



Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
1 800	400	400		**8MF1844-3VS4**		1	1 unit	1BS
		500		**8MF1845-3VS4**		1	1 unit	1BS
		600		**8MF1846-3VS4**		1	1 unit	1BS
		800		**8MF1848-3VS4**		1	1 unit	1BS
		1 000		**8MF1840-3VS4**		1	1 unit	1BS
	600	400		**8MF1864-3VS4**		1	1 unit	1BS
		500		**8MF1865-3VS4**		1	1 unit	1BS
		600		**8MF1866-3VS4**		1	1 unit	1BS
		800		**8MF1868-3VS4**		1	1 unit	1BS
		1 000		**8MF1860-3VS4**		1	1 unit	1BS
	800	400		**8MF1884-3VS4**		1	1 unit	1BS
		500		**8MF1885-3VS4**		1	1 unit	1BS
		600		**8MF1886-3VS4**		1	1 unit	1BS
		800		**8MF1888-3VS4**		1	1 unit	1BS
		1 000		**8MF1880-3VS4**		1	1 unit	1BS
	900	400		**8MF1894-3VS4**		1	1 unit	1BS
		500		**8MF1895-3VS4**		1	1 unit	1BS
		600		**8MF1896-3VS4**		1	1 unit	1BS
		800		**8MF1898-3VS4**		1	1 unit	1BS
		1 000		**8MF1890-3VS4**		1	1 unit	1BS
	1 000	400		**8MF1804-3VS4**		1	1 unit	1BS
		500		**8MF1805-3VS4**		1	1 unit	1BS
		600		**8MF1806-3VS4**		1	1 unit	1BS
		800		**8MF1808-3VS4**		1	1 unit	1BS
		1 000		**8MF1800-3VS4**		1	1 unit	1BS
	1 200	400		**8MF1824-3VS4**		1	1 unit	1BS
		500		**8MF1825-3VS4**		1	1 unit	1BS
		600		**8MF1826-3VS4**		1	1 unit	1BS
		800		**8MF1828-3VS4**		1	1 unit	1BS
		1 000		**8MF1820-3VS4**		1	1 unit	1BS
2 000	400 NEW	400		**8MF1044-3VS4**		1	1 unit	1BS
		500		**8MF1045-3VS4**		1	1 unit	1BS
		600		**8MF1046-3VS4**		1	1 unit	1BS
		800		**8MF1048-3VS4**		1	1 unit	1BS
		1 000		**8MF1040-3VS4**		1	1 unit	1BS
	600	400		**8MF1064-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1065-3VS4**		1	1 unit	1BS
		600		**8MF1066-3VS4**		1	1 unit	1BS
		800		**8MF1068-3VS4**		1	1 unit	1BS
		1 000		**8MF1060-3VS4**		1	1 unit	1BS
	800	400		**8MF1084-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1085-3VS4**		1	1 unit	1BS
		600		**8MF1086-3VS4**		1	1 unit	1BS
		800		**8MF1088-3VS4**		1	1 unit	1BS
		1 000		**8MF1080-3VS4**		1	1 unit	1BS
	900	400		**8MF1094-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1095-3VS4**		1	1 unit	1BS
		600		**8MF1096-3VS4**		1	1 unit	1BS
		800		**8MF1098-3VS4**		1	1 unit	1BS
		1 000		**8MF1090-3VS4**		1	1 unit	1BS
	1 000	400		**8MF1004-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1005-3VS4**		1	1 unit	1BS
		600		**8MF1006-3VS4**		1	1 unit	1BS
		800		**8MF1008-3VS4**		1	1 unit	1BS
		1 000		**8MF1000-3VS4**		1	1 unit	1BS
	1 200	400		**8MF1024-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1025-3VS4**		1	1 unit	1BS
		600		**8MF1026-3VS4**		1	1 unit	1BS
		800		**8MF1028-3VS4**		1	1 unit	1BS
		1 000		**8MF1020-3VS4**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Stand-alone installation with ventilation openings, IP20

Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400 NEW	400		**8MF1244-3VS4**		1	1 unit	1BS
		500		**8MF1245-3VS4**		1	1 unit	1BS
		600		**8MF1246-3VS4**		1	1 unit	1BS
		800		**8MF1248-3VS4**		1	1 unit	1BS
		1 000		**8MF1240-3VS4**		1	1 unit	1BS
	600	400		**8MF1264-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1265-3VS4**		1	1 unit	1BS
		600		**8MF1266-3VS4**		1	1 unit	1BS
		800		**8MF1268-3VS4**		1	1 unit	1BS
		1 000		**8MF1260-3VS4**		1	1 unit	1BS
	800	400		**8MF1284-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1285-3VS4**		1	1 unit	1BS
		600		**8MF1286-3VS4**		1	1 unit	1BS
		800		**8MF1288-3VS4**		1	1 unit	1BS
		1 000		**8MF1280-3VS4**		1	1 unit	1BS
	900	400		**8MF1294-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1295-3VS4**		1	1 unit	1BS
		600		**8MF1296-3VS4**		1	1 unit	1BS
		800		**8MF1298-3VS4**		1	1 unit	1BS
		1 000		**8MF1290-3VS4**		1	1 unit	1BS
	1 000	400		**8MF1204-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1205-3VS4**		1	1 unit	1BS
		600		**8MF1206-3VS4**		1	1 unit	1BS
		800		**8MF1208-3VS4**		1	1 unit	1BS
		1 000		**8MF1200-3VS4**		1	1 unit	1BS
	1 200	400		**8MF1224-3VS4**		1	1 unit	1BS
		500 NEW		**8MF1225-3VS4**		1	1 unit	1BS
		600		**8MF1226-3VS4**		1	1 unit	1BS
		800		**8MF1228-3VS4**		1	1 unit	1BS
		1 000		**8MF1220-3VS4**		1	1 unit	1BS

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Suite installation with ventilation openings, IP20

Selection and ordering data



Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
1 800 NEW	400	400		**8MF1844-3VR4**		1	1 unit	1BS
		500		**8MF1845-3VR4**		1	1 unit	1BS
		600		**8MF1846-3VR4**		1	1 unit	1BS
		800		**8MF1848-3VR4**		1	1 unit	1BS
		1 000		**8MF1840-3VR4**		1	1 unit	1BS
	600	400		**8MF1864-3VR4**		1	1 unit	1BS
		500		**8MF1865-3VR4**		1	1 unit	1BS
		600		**8MF1866-3VR4**		1	1 unit	1BS
		800		**8MF1868-3VR4**		1	1 unit	1BS
		1 000		**8MF1860-3VR4**		1	1 unit	1BS
	800	400		**8MF1884-3VR4**		1	1 unit	1BS
		500		**8MF1885-3VR4**		1	1 unit	1BS
		600		**8MF1886-3VR4**		1	1 unit	1BS
		800		**8MF1888-3VR4**		1	1 unit	1BS
		1 000		**8MF1880-3VR4**		1	1 unit	1BS
	900	400		**8MF1894-3VR4**		1	1 unit	1BS
		500		**8MF1895-3VR4**		1	1 unit	1BS
		600		**8MF1896-3VR4**		1	1 unit	1BS
		800		**8MF1898-3VR4**		1	1 unit	1BS
		1 000		**8MF1890-3VR4**		1	1 unit	1BS
	1 000	400		**8MF1804-3VR4**		1	1 unit	1BS
		500		**8MF1805-3VR4**		1	1 unit	1BS
		600		**8MF1806-3VR4**		1	1 unit	1BS
		800		**8MF1808-3VR4**		1	1 unit	1BS
		1 000		**8MF1800-3VR4**		1	1 unit	1BS
	1 200	400		**8MF1824-3VR4**		1	1 unit	1BS
		500		**8MF1825-3VR4**		1	1 unit	1BS
		600		**8MF1826-3VR4**		1	1 unit	1BS
		800		**8MF1828-3VR4**		1	1 unit	1BS
		1 000		**8MF1820-3VR4**		1	1 unit	1BS
2 000	400	400		**8MF1044-3VR4**		1	1 unit	1BS
		500		**8MF1045-3VR4**		1	1 unit	1BS
		600		**8MF1046-3VR4**		1	1 unit	1BS
		800		**8MF1048-3VR4**		1	1 unit	1BS
		1 000		**8MF1040-3VR4**		1	1 unit	1BS
	600	400		**8MF1064-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1065-3VR4**		1	1 unit	1BS
		600		**8MF1066-3VR4**		1	1 unit	1BS
		800		**8MF1068-3VR4**		1	1 unit	1BS
		1 000		**8MF1060-3VR4**		1	1 unit	1BS
	800	400		**8MF1084-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1085-3VR4**		1	1 unit	1BS
		600		**8MF1086-3VR4**		1	1 unit	1BS
		800		**8MF1088-3VR4**		1	1 unit	1BS
		1 000		**8MF1080-3VR4**		1	1 unit	1BS
	900	400		**8MF1094-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1095-3VR4**		1	1 unit	1BS
		600		**8MF1096-3VR4**		1	1 unit	1BS
		800		**8MF1098-3VR4**		1	1 unit	1BS
		1 000		**8MF1090-3VR4**		1	1 unit	1BS
	1 000	400		**8MF1004-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1005-3VR4**		1	1 unit	1BS
		600		**8MF1006-3VR4**		1	1 unit	1BS
		800		**8MF1008-3VR4**		1	1 unit	1BS
		1 000		**8MF1000-3VR4**		1	1 unit	1BS
	1 200	400		**8MF1024-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1025-3VR4**		1	1 unit	1BS
		600		**8MF1026-3VR4**		1	1 unit	1BS
		800		**8MF1028-3VR4**		1	1 unit	1BS
		1 000		**8MF1020-3VR4**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Suite installation with ventilation openings, IP20

Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm	mm	d					
2 200	400	400		**8MF1244-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1245-3VR4**		1	1 unit	1BS
		600		**8MF1246-3VR4**		1	1 unit	1BS
		800		**8MF1248-3VR4**		1	1 unit	1BS
		1 000		**8MF1240-3VR4**		1	1 unit	1BS
	600	400		**8MF1264-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1265-3VR4**		1	1 unit	1BS
		600		**8MF1266-3VR4**		1	1 unit	1BS
		800		**8MF1268-3VR4**		1	1 unit	1BS
		1 000		**8MF1260-3VR4**		1	1 unit	1BS
	800	400		**8MF1284-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1285-3VR4**		1	1 unit	1BS
		600		**8MF1286-3VR4**		1	1 unit	1BS
		800		**8MF1288-3VR4**		1	1 unit	1BS
		1 000		**8MF1280-3VR4**		1	1 unit	1BS
	900	400		**8MF1294-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1295-3VR4**		1	1 unit	1BS
		600		**8MF1296-3VR4**		1	1 unit	1BS
		800		**8MF1298-3VR4**		1	1 unit	1BS
		1 000		**8MF1290-3VR4**		1	1 unit	1BS
	1 000	400		**8MF1204-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1205-3VR4**		1	1 unit	1BS
		600		**8MF1206-3VR4**		1	1 unit	1BS
		800		**8MF1208-3VR4**		1	1 unit	1BS
		1 000		**8MF1200-3VR4**		1	1 unit	1BS
	1 200	400		**8MF1224-3VR4**		1	1 unit	1BS
		500 NEW		**8MF1225-3VR4**		1	1 unit	1BS
		600		**8MF1226-3VR4**		1	1 unit	1BS
		800		**8MF1228-3VR4**		1	1 unit	1BS
		1 000		**8MF1220-3VR4**		1	1 unit	1BS

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Data cubicles, IP40

Selection and ordering data

	Enclosure that can be lined up	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		mm	mm	mm	d					
Empty control cubicle enclosure										
Steel										
Powder-coated										
	No	2 000	600	800		**8MF1068-3DS4**		1	1 unit	1BS
			800	600		**8MF1086-3DS4**		1	1 unit	1BS
				800		**8MF1088-3DS4**		1	1 unit	1BS
				1 000		**8MF1080-3DS4**		1	1 unit	1BS
	Yes	2 000	600	800		**8MF1068-3DR4**		1	1 unit	1BS
			800	600		**8MF1086-3DR4**		1	1 unit	1BS
				800		**8MF1088-3DR4**		1	1 unit	1BS
				1 000		**8MF1080-3DR4**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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More information

The same accessories can be used for the complete cubicles as for the individually configurable cubicles.

Specifically, these are:

- Frame accessories see page 18/22
- Enclosure accessories see page 18/43
- Rails see page 18/52
- 19" fixed-mounted see page 18/58
- Expansion accessories see page 18/53

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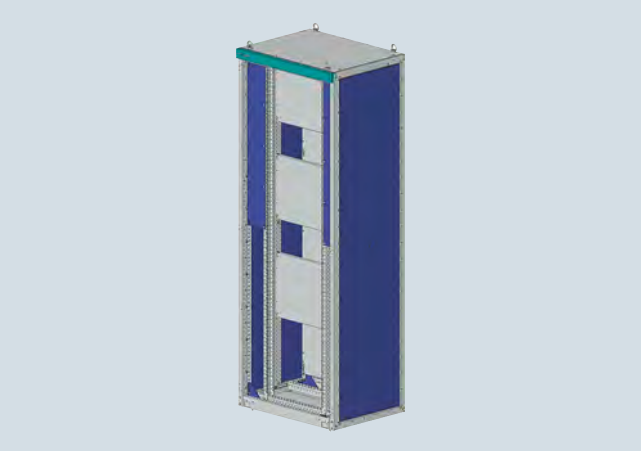
Earthquake-reinforced cubicles

Overview



Cubicle earthquake-prepared

Earthquake-reinforced cubicles can also be ordered as complete preconfigured cubicles.

Elements for boosting stability are already permanently installed in them.

Further information on earthquake preparation and testing see page 18/8.

Earthquake-reinforced cubicles are available in the following sizes:

- 2200 mm high, 600 mm wide, 600 mm deep
- 2200 mm high, 800 mm wide, 600 mm deep

Further sizes and expansion variants are available on request.

Selection and ordering data

	Height	Width	Depth	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm	mm	d					
Earthquake-prepared									
	2 200	600	600		**8MF1266-3ES5**		1	1 unit	1BS
		800	600		**8MF1286-3ES5**		1	1 unit	1BS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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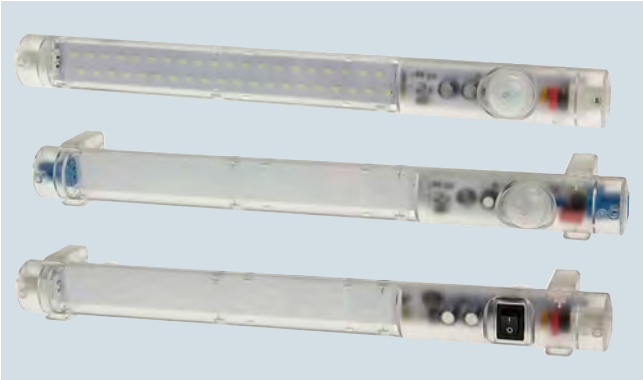
Overview



Top: LED light with motion detector, magnetic fixing
Center: LED light with motion detector, clip fixing
Bottom: LED light with On/Off switch, clip fixing

The LED lights with On/Off switch are particularly suitable for operation in cubicles and enclosures with a high density of built-in electrical/electronic components. LED lights with motion detectors are already switched on when the door is opened and enable work in the cubicle to be started immediately.

Thanks to the use of LED technology, these lights have a very long useful life.

The various types of fixing provide more flexibility for installation. By means of magnetic fixing, they can be fastened anywhere in steel cubicles without installation effort.

A version with screw fixing is still available that enables the lamp to be mounted securely in the cubicle in the case of applications involving shock loads or strong vibrations.

In the version with clip fixing, the lamp is simply snapped into the clip bracket and can be turned in both directions. A rotation angle of 180° ensures optimum illumination in the cubicle.

Connection is made using a socket on the lamp (switch side). Another lamp can be connected using a connector (non-switch side). Up to 10 lights can be connected in series in this way.

Technical specifications

		Technical details
Power consumption, max.	W	5 Light output corresponds to that of a 75 W incandescent lamp
Endurance		
• At 20 °C	h	60000
Connection		
• General		2-pin plug-in connection with lock
• AC version		Max. 2.5 A/240 V AC, color: white
• DC version		Max. 2.5 A/60 V DC, color: blue
Dimensions		
Length	mm	351
Light diameter	mm	32
Mounting width		
• Light with magnetic fixing	mm	34
• Light with screw fixing	mm	52
Permissible ambient temperature		
• Operation	°C	-30 ... +60
• Storage	°C	-40 ... +85
Degree of protection		IP20
Safety class		II (protective insulation)

Note:

Delivery does not include plugs, sockets and cables for electrical connection. These must be ordered separately.
See Accessories on next page.

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
LED lights with motion detector NEW							
	**Magnetic fixing**						
	• 100 ... 240 V AC, 50/60 Hz		**8MR2200-0A**		1	1 unit	1DS
	• 24 ... 48 V DC		**8MR2201-0A**		1	1 unit	1DS
	**Screw fixing**						
	• 100 ... 240 V AC, 50/60 Hz		**8MR2200-0B**		1	1 unit	1DS
	• 24 ... 48 V DC		**8MR2201-0B**		1	1 unit	1DS
	**Clip fixing**						
	• 100 ... 240 V AC, 50/60 Hz		**8MR2200-0C**		1	1 unit	1DS
	• 24 ... 48 V DC		**8MR2201-0C**		1	1 unit	1DS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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LED lights

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
LED lights with On/Off switch							
	**Magnetic fixing**						
	• 100 ... 240 V AC, 50/60 Hz		**8MR2200-1A**		1	1 unit	1DS
	• 24 ... 48 V DC		**8MR2201-1A**		1	1 unit	1DS
	Screw fixing						
	• 100 ... 240 V AC, 50/60 Hz		**8MR2200-1B**		1	1 unit	1DS
	• 24 ... 48 V DC		**8MR2201-1B**		1	1 unit	1DS
	Clip fixing NEW						
	• 100 ... 240 V AC, 50/60 Hz		**8MR2200-1C**		1	1 unit	1DS
	• 24 ... 48 V DC		**8MR2201-1C**		1	1 unit	1DS

Accessories

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Individual plugs or sockets							
	**AC socket for input side, white**						
8MR2210-1A	For connection of an LED light (switch side)		**8MR2210-1A**		1	5 units	1DS
	AC plug for output side, white						
	For looping through to another LED light		**8MR2210-2A**		1	5 units	1DS
	DC socket for input side, blue						
	For connection of an LED light (switch side)		**8MR2210-3A**		1	5 units	1DS
	DC plug for output side, blue						
	For looping through to another LED light		**8MR2210-4A**		1	5 units	1DS
	Note: Plugs and sockets are also separately available for self-assembling cables that deviate from standard lengths.						
Cables							
	**Connecting cable with socket and open end, each 2 m long**						
8MR2210-1B	For connection of a lamp (switch side)						
	• AC connecting cable 2 x 1.5 mm^2 with socket, VDE		**8MR2210-1B**		1	1 unit	1DS
	• AC connecting cable AWG 16 with socket, UL		**8MR2210-2B**		1	1 unit	1DS
	• DC connecting cable 2 x 1.5 mm^2 with socket, VDE		**8MR2210-3B**		1	1 unit	1DS
	• DC connecting cable AWG 16 with socket, UL		**8MR2210-4B**		1	1 unit	1DS
	Extension cable for cascading, each 1 m long, with socket and plug						
	• AC light plastic-sheathed cable 2 x 1.5 mm^2 with socket and plug, VDE		**8MR2210-1C**		1	1 unit	1DS
	• AC light plastic-sheathed cable AWG 16 with socket and plug, UL		**8MR2210-2C**		1	1 unit	1DS
8MR2210-1C							
	• DC light plastic-sheathed cable 2 x 1.5 mm^2 with socket and plug, VDE		**8MR2210-3C**		1	1 unit	1DS
	• DC light plastic-sheathed cable AWG 16 with socket and plug, UL		**8MR2210-4C**		1	1 unit	1DS
8MR2210-3C							

More information

Industry Mall

"Low-Voltage Systems" --> "SIVACON Switchboards and Busbar Trunking Systems" > "System Cubicles, System Lighting and System Air-Conditioning" > "SIVACON 8MF/8MR System Lighting"

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

	Control supply voltage or voltage for switching capacity			
	24/48 V DC	**115 V AC**	**230 V AC**	**400/440 V AC**
8MR system air-conditioning				
Filter fans				
Standard filter fans, IP54 or IP55				
• With or without additional EMC protection	✓	✓	✓	--
• Cooling capacity 8 W/K ... 282 W/K	✓	✓	✓	--
• Air rate 25 m^3/h ... 845 m^3/h	✓	✓	✓	--
• Size 92 x 92 mm to 292 x 292 mm	✓	✓	✓	--
• Color RAL 7035 or RAL 7032	✓	✓	✓	--
Roof filter fans, IP44				
• Cooling capacity 113 W/K ... 242 W/K	--	✓	✓	--
• Air rate 350 m^3/h ... 690 m^3/h	--	✓	✓	--
• Size 430 x 430 mm to 470 x 470 mm	--	✓	✓	--
• Color RAL 7035 or RAL 7032	--	✓	✓	--
Roof filter fans, IP54				
• Cooling capacity 18 W/K ... 184W/K	✓	✓	✓	--
• Air rate 71 m^3/h ... 840 m^3/h	✓	✓	✓	--
• Size 287 x 287 x 104 mm to 361 × 361 × 211 mm	✓	✓	✓	--
• Color RAL 7035	✓	✓	✓	--
Air conditioners/cooling devices				
For door and side mounting (recessed)				
• 380 ... 5800 W	--	--	✓	✓
For roof mounting				
• 410 ... 3850 W	--	--	✓	✓
Heat exchangers				
Standard				
• Air/air (at ΔT = 20 K)	--	✓	✓	--
For side and door mounting				
• 700 ... 1900 W	--	✓	✓	--
Heater units optionally without or with thermostat				
• 10 W ... 150 W	✓	✓	✓	--
Fan heaters optionally without or with thermostat				
• 100 W ... 1200 W	✓	✓	✓	--
• Setting ranges 0 ... +60 °C, +32 ... +140 °F	✓	✓	✓	--
Thermostats, hygrostats, hygrotherms, switching modules				
Thermostats, optionally NC, NO, CO contacts				
• Setting ranges -10 ... +80 °C	--	✓	✓	--
• Switching capacities up to 16 A	✓	✓	✓	--
Hygrostats, changeover contacts	✓	✓	✓	--
• 40 ... 95% relative air humidity	✓	✓	--	--
Hygrotherms, optionally NC, NO, CO contacts				
• Setting ranges 0 ... 60 °C, +32 ... +140 °F	--	✓	✓	--
• 50 ... 90% relative air humidity	--	✓	✓	--
• Switching capacities 6 (1) A ... 8 (1.6) A	✓	✓	✓	--
• Switching modules 16 A	✓	--	--	--

✓ Available or possible
-- Not available or not possible
The figures in brackets indicate inductive switching capacities.

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Introduction

Benefits

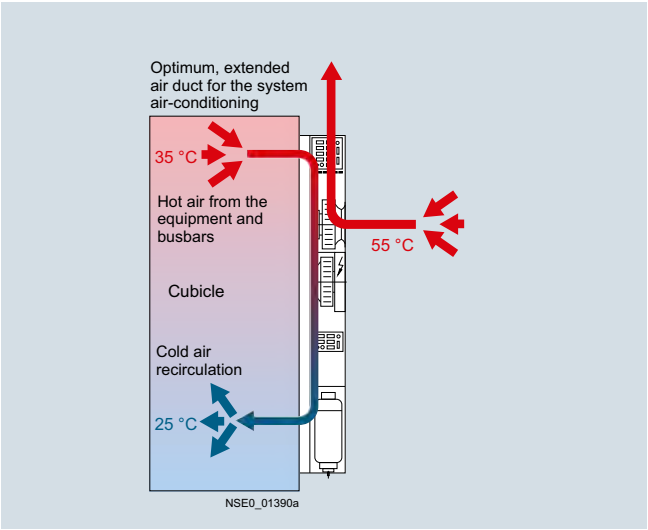
Installing air-conditioning equipment in SIVACON sicube 8MF system cubicles ensures high fault tolerance for switchboard and controlgear assemblies and consequently a high level of availability of machines and plants.

Application

In control cubicles, depending on the ambient conditions (e.g. heat, cold, air humidity etc.), there may be a tendency to overheat or for mold to form. In such cases the cubicles should be air-conditioned. The following air-conditioning equipment is available for this purpose:

- Filter fans
- Air conditioners/cooling devices
- Heat exchangers, air/air
- Heaters/thermostats

When selecting individual air-conditioning components, the ambient temperature, the power losses of the installed devices, the maximum permissible device temperature and the heat dissipation capacity of the cubicle used are the factors to be considered. In addition, it is necessary to take into account the required degree of protection.



System air-conditioning – optimum air guidance

More information

For further information, see the Industry Mall under: "Low-Voltage Systems" --> "SIVACON Switchboards and Busbar Trunking Systems" > "System Cubicles, System Lighting and System Air-Conditioning" > "SIVACON 8MR System Air-Conditioning".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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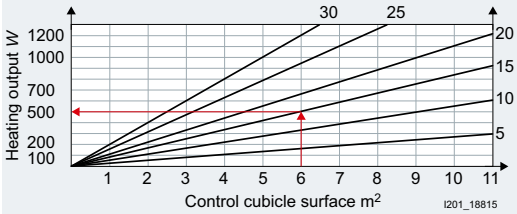
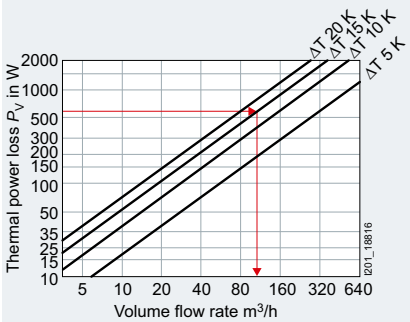
Configuring guide

	Calculation	Graphic representation or determination
Step 1: Dimensions Determine the cubicle's height, width and depth		
Step 2: Installation type Determine the cubicle's installation type in compliance with VDE 0660 T500	Legend for formulas below: *A* Cubicle area in m^2 *W* Width in m *H* Height in m *D* Depth in m	The diagrams below illustrate the installation types in the top view
• Single enclosure, free-standing on all sides	A = 1.8 x H x (W + D) + 1.4 x W x D	
• Single enclosure for wall mounting	A = 1.4 x W x (H + D) + 1.8 x D x H	
• Start and end enclosures, free-standing	A = 1.4 x D x (H + W) + 1.8 x W x H	
• Start and end enclosure for wall mounting	A = 1.4 x H x (W + D) + 1.4 x W x D	
• Middle enclosure, free-standing	A = 1.8 x W x H + 1.4 x W x D + D x H	
• Middle enclosure for wall mounting	A = 1.4 x W x (H + D) + D x H	
• Middle enclosure for wall mounting, with covered roof surfaces	A = 1.4 x W x H + 0.7 x W x D + D x H	
	Example: Cubicle, free-standing on all sides, 2000 mm high, 800 mm wide, 600 mm deep. A = 1.8 m x 2.0 m x (0.8 m+ 0.6 m) + 1.4 m x 0.8 m x 0.6 m = 5.712 m^2 Accordingly, the cubicle has an area of 5.712 m^2.	
Step 3: Cubicle material Determine the cubicle's material and its coefficient of heat transmission k in W/m^2K	Varnished sheet steel: k = 5.5 W/m^2K Stainless sheet steel: k = 4.5 W/m^2K Aluminum: k = 12 W/m^2K Aluminum, double-walled: k = 4.5 W/m^2K Polyester: k = 3.5 W/m^2K	
Step 4: Temperature difference Determine the required difference between interior and exterior temperature	$\Delta T = T_i - T_u$ Legend for formula: ΔT Temperature difference in K (Kelvin) T_i Interior temperature in °C T_u Exterior temperature in °C	
Step 5A: Heating output If heating is required, determine the required heating output either with the adjacent formula or from the diagram on the extreme right Note: If power loss P_V (intrinsic heating) is constant, it must be deducted from the calculated heating output	$P_H = A \times k \times \Delta T$ Legend for formula: P_H Required heating output in W *A* Cubicle area in m^2 *k* Coefficient of heat transmission in W/m^2K ΔT Temperature difference in K Example: Cubicle area A= 5.712 m^2, coefficient of heat transmission k = 5.5 W/m^2K, temperature difference = 15 K P_H = 5.712 m^2 x 5.5 W/m^2K x 15 K = 471.24 W A heater with 500 W heating output is required. When installed outdoors, the calculated heating output must be doubled.	Select required heating output from diagram: 
Step 5B: Cooling capacity If cooling is required, determine the necessary cooling capacity either according to the adjacent formula or from the diagram on the extreme right Note on the air constant f: The altitude at the point of use (above mean sea level) determines the air constant f. Decreasing barometric pressure or air density with rising altitude is taken into consideration via the air constant. f (0...100 m) = 3.1 m^3K/Wh f (100 ... 250 m) = 3.2 m^3K/Wh, f (250 ... 500 m) = 3.3 m^3K/Wh, f (500 ... 750 m) = 3.4 m^3K/Wh f (750 ... 1 000 m) = 3.5 m^3K/Wh	$V = f \times P_V/\Delta T$ Legend for formula: *V* Required volumetric flow in m^3/h f Air constant in m^3K/Wh (see bottom left) P_V Power loss in W ΔT Temperature difference in K Example: Installed power loss = 600 W, temperature difference = 15 K, installation altitude = 400 m above mean sea level *V* = 3.3m^3 K/Wh x 600 W/15 K = 132 m^3/h A fan with 160 m^3/h air capacity is required.	Select required cooling output from diagram: 

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Filter fans

Overview

Filter fans are the most cost-effective method – after heat dissipation through the surface of a control cubicle and/or ventilation openings in the enclosure parts of the control cubicles – for dissipating heat from control cubicles.

However, this can only achieve a control cubicle temperature which lies above the ambient temperature.

Filter fans with EC technology

The new energy-efficient drive concept is based on state-of-the-art EC technology with outstanding motor efficiency. When compared directly with AC fans of the same size, energy consumption is up to 77% lower. The external dimensions remain unchanged, making it possible to replace existing AC fans with EC technology at a later date.

Standard filter fans optionally in EMC version

When filter fans are used for air-conditioning, the cubicle must have openings which allow electromagnetic radiation to pass in and out unobstructed. Filter fans in EMC version offer additional protection when higher requirements are imposed on electromagnetic compatibility.

Filter fan versions

The following filter fans are available on request:

- Standard filter fan IP54, color RAL 7035/7032
- Standard filter fan IP55, color RAL 7035/7032
- Standard filter fan EMC, color RAL 7035/7032, IP54
- Standard filter fan EMC, color RAL 7035/7032, IP55

Selection and ordering data

Filter fans


8MR6411-5LE25


8MR6411-5LV10


8MR6511-5LV10

	Degree of protection	Size	Air current, free-blowing at 50 Hz	Cutout	Voltage	Input rating at 50 Hz	Color RAL	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
			m^3/h	mm	V	W		d				
	Filter fans with EC technology 50/60 Hz											
	IP54	2	62	125 x 125	115 AC	4.4	7035		**8MR6411-5LE25**	1	1 unit	1DS
					230 AC	4.4	7035		**8MR6423-5LE25**	1	1 unit	1DS
		3	120	177 x 177	115 AC	4.4	7035		**8MR6411-5LE30**	1	1 unit	1DS
					230 AC	4.4	7035		**8MR6423-5LE30**	1	1 unit	1DS
	Filter fans 50/60 Hz except 8MR6402-2LV41											
	IP54	1	25	92 x 92	115 AC	12	7035		**8MR6411-5LV10**	1	1 unit	1DS
					230 AC	12	7032		**8MR6423-2LV10**	1	1 unit	1DS
					230 AC	12	7035		**8MR6423-5LV10**	1	1 unit	1DS
		2	63	125 x 125	115 AC	20	7035		**8MR6411-5LV25**	1	1 unit	1DS
					230 AC	20	7032		**8MR6423-2LV25**	1	1 unit	1DS
					230 AC	20	7035		**8MR6423-5LV25**	1	1 unit	1DS
		3	115	177 x 177	115 AC	20	7035		**8MR6411-5LV30**	1	1 unit	1DS
					230 AC	20	7035		**8MR6423-5LV30**	1	1 unit	1DS
		4	160	223 x 223	115 AC	18	7035		**8MR6411-5LV45**	1	1 unit	1DS
					230 AC	18	7032		**8MR6423-2LV45**	1	1 unit	1DS
					230 AC	18	7035		**8MR6423-5LV45**	1	1 unit	1DS
			250	223 x 223	24 DC	16	7032		**8MR6402-2LV41**	1	1 unit	1DS
					115 AC	43	7035		**8MR6411-5LV41**	1	1 unit	1DS
					230 AC	45	7032		**8MR6423-2LV41**	1	1 unit	1DS
					230 AC	45	7035		**8MR6423-5LV41**	1	1 unit	1DS
		6	580	292 x 292	115 AC	64	7035		**8MR6411-5LV60**	1	1 unit	1DS
					230 AC	64	7032		**8MR6423-2LV60**	1	1 unit	1DS
					230 AC	64	7035		**8MR6423-5LV60**	1	1 unit	1DS
			930	292 x 292	115 AC	115	7035		**8MR6411-5LV80**	1	1 unit	1DS
					230 AC	135	7035		**8MR6423-5LV80**	1	1 unit	1DS
	IP55	2	58	125 x 125	115 AC	20	7035		**8MR6511-5LV25**	1	1 unit	1DS
					230 AC	20	7035		**8MR6523-5LV25**	1	1 unit	1DS
		3	105	177 x 177	115 AC	20	7035		**8MR6511-5LV30**	1	1 unit	1DS
					230 AC	20	7035		**8MR6523-5LV30**	1	1 unit	1DS
		4	147	223 x 223	115 AC	18	7035		**8MR6511-5LV45**	1	1 unit	1DS
					230 AC	18	7035		**8MR6523-5LV45**	1	1 unit	1DS
			230	223 x 223	115 AC	43	7035		**8MR6511-5LV41**	1	1 unit	1DS
					230 AC	45	7035		**8MR6423-5LV41**	1	1 unit	1DS
		6	531	292 x 292	115 AC	64	7035		**8MR6511-5LV60**	1	1 unit	1DS
					230 AC	64	7035		**8MR6523-5LV60**	1	1 unit	1DS
			850	292 x 292	115 AC	115	7035		**8MR6511-5LV80**	1	1 unit	1DS
					230 AC	135	7035		**8MR6523-5LV80**	1	1 unit	1DS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Degree of protection	Size	Air current, free-blowing at 50 Hz	Cutout	Voltage	Input rating at 50 Hz	Color RAL	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
			m^3/h	mm	V	W		d				
	EMC filter fans IP54											
 8MR6411-6LV30	IP54	3	115	177 x 177	115 AC 230 AC	20 20	7035 7035		**8MR6411-6LV30** **8MR6423-6LV30**	1 1	1 unit 1 unit	1DS 1DS
		4	160	223 x 223	115 AC 230 AC	18 18	7035 7035		**8MR6411-6LV45** **8MR6423-6LV45**	1 1	1 unit 1 unit	1DS 1DS
			250	223 x 223	115 AC 230 AC	43 45	7035 7035		**8MR6411-6LV41** **8MR6423-6LV41**	1 1	1 unit 1 unit	1DS 1DS
	EMC filter fans IP55											
 8MR6511-6LV30	IP55	3	105	177 x 177	115 AC 230 AC	20 20	7035 7035		**8MR6511-6LV30** **8MR6523-6LV30**	1 1	1 unit 1 unit	1DS 1DS
		4	147	223 x 223	115 AC 230 AC	18 18	7035 7035		**8MR6511-6LV45** **8MR6523-6LV45**	1 1	1 unit 1 unit	1DS 1DS
			230	223 x 223	115 AC 230 AC	43 45	7035 7035		**8MR6511-6LV41** **8MR6523-6LV41**	1 1	1 unit 1 unit	1DS 1DS

Outlet filters

	Size	Dimensions				Color RAL	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
		Cutout	External dimensions W x H	Mounting depth	Cover grille height						
		mm	mm	mm	mm		d				
	Outlet filters IP54										
 8MR6400-5GV67	1	92 x 92	105 x 105	12	4.5	7032 7035		**8MR6400-2GV10** **8MR6400-5GV10**	1 1	1 unit 1 unit	1DS 1DS
	2	125 x 125	148 x 148	23	5.5	7032 7035		**8MR6400-2GV25** **8MR6400-5GV25**	1 1	1 unit 1 unit	1DS 1DS
	3	177 x 177	204 x 204	26	6	7035		**8MR6400-5GV30**	1	1 unit	1DS
	4	223 x 223	250 x 250	32	6	7032 7035		**8MR6400-2GV45** **8MR6400-5GV45**	1 1	1 unit 1 unit	1DS 1DS
	6	292 x 292	323 x 323	33	6.5	7032 7035		**8MR6400-2GV67** **8MR6400-5GV67**	1 1	1 unit 1 unit	1DS 1DS
	Outlet filters IP55										
 8MR6500-5GV67	2	125 x 125	148 x 148	23	5.5	7035		**8MR6500-5GV25**	1	1 unit	1DS
	3	177 x 177	204 x 204	26	6	7035		**8MR6500-5GV30**	1	1 unit	1DS
	4	223 x 223	250 x 250	32	6	7035		**8MR6500-5GV45**	1	1 unit	1DS
	6	292 x 292	323 x 323	33	6.5	7035		**8MR6500-5GV67**	1	1 unit	1DS
	EMC outlet filters IP54										
 8MR6400-6GV30	3	177 x 177	204 x 204	26	6	7035		**8MR6400-6GV30**	1	1 unit	1DS
	4	223 x 223	250 x 250	32	6	7035		**8MR6400-6GV45**	1	1 unit	1DS
	EMC outlet filters IP55										
	3	177 x 177	204 x 204	26	6	7035		**8MR6500-6GV30**	1	1 unit	1DS
	4	223 x 223	250 x 250	32	6	7035		**8MR6500-6GV45**	1	1 unit	1DS

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Filter fans

Filter mats

	Size	Dimensions W x H	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
		mm	d				
	Filter mats for filter fans or outlet filters for IP54						
	1	89 x 89		**8MR6000-0AM10**	1	5 units	1DS
	2	118 x 118		**8MR6000-0AM25**	1	5 units	1DS
	3	171 x 171		**8MR6000-0AM30**	1	5 units	1DS
	4	216 x 216		**8MR6000-0AM45**	1	5 units	1DS
	6	283 x 283		**8MR6000-0AM67**	1	5 units	1DS
8MR6000-0AM10							
	Filter mats for filter fans or outlet filters for IP55 NEW						
	2	116 x 116		**8MR6000-0CF25**	1	1 unit	1DS
	3	169 x 169		**8MR6000-0CF30**	1	1 unit	1DS
	4	215 x 215		**8MR6000-0CF45**	1	1 unit	1DS
	6	281 x 281		**8MR6000-0CF67**	1	1 unit	1DS
8MR6000-0CF25							

Roof filter fans

	Air current, free-blowing at 50 Hz	Dimensions Cutout	External dimensions W x H x D	Voltage	Input rating	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
	m^3/h	mm	mm	V	W	d				
	Roof filter fans IP44 for 50/60 Hz, color RAL 7035									
	405	345 x 265	420 x 340 x 108	115 230	40/45 40/45		**8MR6311-5DL40** **8MR6323-5DL40**	1 1	1 unit 1 unit	1DS 1DS
	690	345 x 265	420 x 340 x 108	115 230	100/130 100/130		**8MR6311-5DL42** **8MR6323-5DL42**	1 1	1 unit 1 unit	1DS 1DS
8MR6323-5DL40										
	Roof filter fans IP54 for 50/60 Hz, color RAL 7035 NEW									
	71	223 x 223	287 x 287 x 104	230 115 24	40 48 8.8		**8MR6423-5VL44** **8MR6411-5VL44** **8MR6402-5VL44**	1 1 1	1 unit 1 unit 1 unit	1DS 1DS 1DS
	240	223 x 223	287 x 287 x 174	230 115 24	45 43 16		**8MR6423-5VL41** **8MR6411-5VL41** **8MR6402-5VL41**	1 1 1	1 unit 1 unit 1 unit	1DS 1DS 1DS
	300	223 x 223	287 x 287 x 174	230	45		**8MR6423-5VL55**	1	1 unit	1DS
8MR6423-5VL44	232	292 x 292	361 x 361 x 114	230 115 24	68 68 14		**8MR6423-5VL64** **8MR6411-5VL64** **8MR6402-5VL64**	1 1 1	1 unit 1 unit 1 unit	1DS 1DS 1DS
	550	292 x 292	361 x 361 x 211	230 115 24	64 64 55		**8MR6423-5VL60** **8MR6411-5VL60** **8MR6402-5VL60**	1 1 1	1 unit 1 unit 1 unit	1DS 1DS 1DS
	840	292 x 292	361 x 361 x 203	230 115 24	135 115 105		**8MR6423-5VL80** **8MR6411-5VL80** **8MR6402-5VL80**	1 1 1	1 unit 1 unit 1 unit	1DS 1DS 1DS

Roof outlet filters

	Air current, free-blowing at 50 Hz	Dimensions Cutout	External dimensions W x H x D	Voltage	Input rating	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
	m^3/h	mm	mm	V	W	d				
	Roof outlet filters IP44, color RAL 7035									
	Without fan	345 x 265	420 x 340 x 83	--	--		**8MR6000-5DE40**	1	1 unit	1DS
8MR6000-5DE40										
	Roof outlet filters IP54, color RAL 7035 NEW									
	Without fan	223 x 223	287 x 287 x 85	--	--		**8MR6400-5VE45**	1	1 unit	1DS
	Without fan	292 x 292	361 x 361 x 96	--	--		**8MR6400-5VE67**	1	1 unit	1DS
8MR6000-5VE45										

Minimum order quantity (PS) or a multiple thereof can be ordered.

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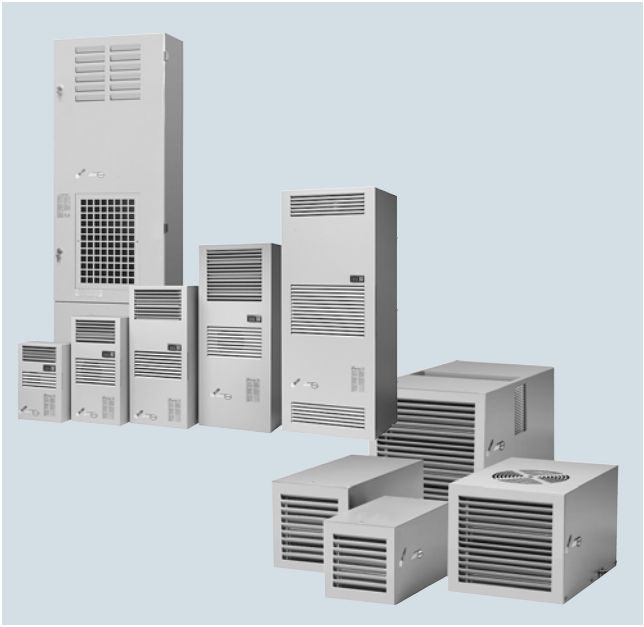
Overview



8MR6 cooling devices:
Door or side mounting top left, roof mounting bottom right

Where ambient temperatures are higher than the permissible device temperatures, air conditioners must be used.
All units operate with CFC-free refrigerants. Air conditioners dehumidify the air inside the control cubicle.

Cooling devices for door or side mounting and roof mounting

Two separate air circuits ensure that no ambient air enters the control cubicle. High-performance radial fans provide for good air circulation in the control cubicle.

Intelligent standard electronics with maximum customer benefits:

- Simple temperature control with an integrated thermostat
- Test mode
- Temperature limits
- Start-up delay
- Door contact function
- Alarm contact
- Local diagnostics
- CE-approved

Versions

Air conditioners/cooling devices are available in the following versions:

- For side and door mounting
- For roof mounting

Selection and ordering data

Cooling devices for door or side mounting, degree of protection inside IP54/outside IP34, color RAL 7035

	Cooling capacity	Rated power	Dimensions W x H x D	Air capacity internal/ external	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
	W	W	mm	m^3/h	d				
	Cooling devices for 230 V, 50/60 Hz[1]								
	380	280	285 x 460 x 180	280/280		**8MR6423-5EG04**	1	1 unit	1DS
	640	400	360 x 606 x 212	330/570		**8MR6423-5EG06**	1	1 unit	1DS
	820	440	348 x 783 x 215	330/570		**8MR6423-5EG08**	1	1 unit	1DS
	1050[2]	570	348 x 783 x 215	570/860		**8MR6423-5SK10**	1	1 unit	1DS
	1550[2]	880	400 x 950 x 233	570/1050		**8MR6423-5SK15**	1	1 unit	1DS
	2050[2]	1080	400 x 1265 x 236	860/1050		**8MR6423-5SK20**	1	1 unit	1DS
	Cooling devices for 400 V, 50/60 Hz[1]								
	2900	1220	500 x 1270 x 336	860/1450		**8MR6440-5EG30**	1	1 unit	1DS
	1780	1780	500 x 1270 x 336	1450/1450		**8MR6440-5EG40**	1	1 unit	1DS
	5800	2340	600 x 2000 x 380	1450/2900		**8MR6440-5EG60**	1	1 unit	1DS

8MR6423-5SK20

[1] Surface mounting and full integration possible.

[2] Partial integration possible.

Cooling devices for roof mounting, degree of protection inside IP54/outside IP34, color RAL 7035

	Cooling capacity	Rated power	Dimensions W x H x D	Air capacity internal/ external	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
	W	W	mm	m^3/h	d				
	Cooling devices for 230 V, 50/60 Hz								
	410	270	259 x 264 x 486	235/330		**8MR6423-5DE04**	1	1 unit	1DS
	820	510	340 x 340 x 600	330/570		**8MR6423-5DE08**	1	1 unit	1DS
	1150	550	401 x 415 x 567	570/1010		**8MR6423-5DE12**	1	1 unit	1DS
	1550	810	401 x 415 x 567	860/1820		**8MR6423-5DE15**	1	1 unit	1DS
	2050	1190	401 x 415 x 567	1050/1820		**8MR6423-5DE20**	1	1 unit	1DS
	Cooling devices for 400 V, 50/60 Hz								
	2900	1210	492 x 496 x 797	860/3410		**8MR6440-5DE30**	1	1 unit	1DS
	3850	1630	492 x 496 x 797	1450/3410		**8MR6440-5DE40**	1	1 unit	1DS



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Overview



Heat exchanger 80 W/K

Air/air principle

Heat exchangers designed on the air/air principle function with two completely separate air circuits: an internal and an external circuit. One fan draws in cool external air. A second fan then directs the warmed air inside the cubicle past a large-area finned partition element, which passes the heat to the external circuit.

Note:

The devices can be surface mounted and fully integrated.

Selection and ordering data

Air/air heat exchangers, degree of protection IP54, color RAL 7035

	Thermal power	Rated power	Dimensions W x H x D	Air capacity internal/external	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
	W/K	W	mm	m^3/h	d				
	Heat exchangers for 230 V, 50/60 Hz								
 8MR6423-5ML80	36	140	316 x 771 x 103	570/570		**8MR6423-5ML36**	1	1 unit	1DS
	80	240	317 x 1260 x 148	1050/1050		**8MR6423-5ML80**	1	1 unit	1DS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview



Small semiconductor heater unit, 8MR2131-0A

Control cubicle heater units are used for preventing malfunctions due to condensation water and corrosion and for controlling the temperature inside the control cubicle (observance of a minimum temperature).

The plastic enclosure is designed such that the surface temperatures on the touchable side areas are kept very low.

The heater units are designed for uninterrupted duty.

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
		d				
Heater units						
 8MR2130-1A	**Heater units, UL-approved, with PTC thermistor** 120 ... 240 V AC/DC					
	• 15W		**8MR2130-1A**	1	2 units	1DS
	• 30 W		**8MR2130-3A**	1	2 units	1DS
	• 45 W		**8MR2130-4A**	1	1 unit	1DS
	• 60 W		**8MR2130-6A**	1	1 unit	1DS
	• 75 W		**8MR2130-7A**	1	1 unit	1DS
	• 100 W		**8MR2130-0A**	1	1 unit	1DS
	• 150 W		**8MR2130-5A**	1	1 unit	1DS
 8MR2131-4A	**Semiconductor heater units without thermostat, degree of protection IP20, UL-approved, compact design** 120 ... 240 V AC/DC					
	• 50 W		**8MR2131-4A**	1	1 unit	1DS
	• 100 W		**8MR2131-0A**	1	1 unit	1DS
	• 150 W		**8MR2131-5A**	1	1 unit	1DS
 8MR2132-1A	**Semiconductor heater units with thermostat, degree of protection IP20, compact design** 120 ... 240 V AC/DC					
	• 50 W, 15 °C		**8MR2132-1A**	1	1 unit	1DS
	• 50 W, 25 °C		**8MR2132-1AB**	1	1 unit	1DS
	• 100 W, 15 °C		**8MR2132-0A**	1	1 unit	1DS
	• 100 W, 25 °C		**8MR2132-0AB**	1	1 unit	1DS
	• 150 W, 15 °C		**8MR2132-5A**	1	1 unit	1DS
	• 150 W, 25 °C		**8MR2132-5AB**	1	1 unit	1DS
 8MR2132-1A	**Semiconductor heater units** 12 ... 30 V AC/DC					
	• 15 W		**8MR2130-1BA**	1	1 unit	1DS
	• 30 W		**8MR2130-3BA**	1	1 unit	1DS
	• 45 W		**8MR2130-4BA**	1	1 unit	1DS
	• 60 W NEW		**8MR2130-6BA**	1	1 unit	1DS

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Fan heaters

Overview



Fan heaters with integrated thermostat or hygrostat

Where higher heating outputs (from 150 W) are required, fan heaters are used.

The integrated fans provide for better air circulation and hereby achieve a more uniform air temperature distribution in the control cubicle.

All units are also available in UL-approved versions and for special voltages.

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
Fan heaters						
 8MR2140-0A	**Fan heaters in standard version** UL-approved					
	• Without fan					
	- 230 V AC, 100 W		**8MR2140-0A**	1	1 unit	1DS
	- 230 V AC, 150 W		**8MR2140-1A**	1	1 unit	1DS
	- 230 V AC, 200 W		**8MR2140-2A**	1	1 unit	1DS
	- 230 V AC, 300 W		**8MR2140-3A**	1	1 unit	1DS
	- 230 V AC, 400 W		**8MR2140-4A**	1	1 unit	1DS
 8MR2140-0B	• With fan					
	- 230 V AC, 100 W		**8MR2140-0B**	1	1 unit	1DS
	- 230 V AC, 150 W		**8MR2140-1B**	1	1 unit	1DS
	- 230 V AC, 200 W		**8MR2140-2B**	1	1 unit	1DS
	- 230 V AC, 300 W		**8MR2140-3B**	1	1 unit	1DS
	- 230 V AC, 400 W		**8MR2140-4B**	1	1 unit	1DS
 8MR2122-4A	**Compact fan heaters**					
	• With fan, UL-certified					
	- 230 V AC, 250 W		**8MR2122-4A**	1	1 unit	1DS
	- 230 V AC, 400 W		**8MR2122-8A**	1	1 unit	1DS
	- 120 V AC, 250 W		**8MR2122-4B**	1	1 unit	1DS
	- 120 V AC, 400 W		**8MR2122-8B**	1	1 unit	1DS
	• With fan					
	- 24 V DC, 250 W		**8MR2122-4AB**	1	1 unit	1DS
	- 48 V DC, 250 W		**8MR2122-4AC**	1	1 unit	1DS
	- 48 V DC, 400 W		**8MR2122-8AA**	1	1 unit	1DS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
		d				
 8MR2150-0A	**Fan heaters with integrated thermostat or hygrostat** 230 V AC, 950 W					
	• Fan heaters, UL-approved, for floor mounting					
	- Temperature range 0 ... +60 °C		**8MR2150-0A**	1	1 unit	1DS
	- 65% relative air humidity		**8MR2150-0BA**	1	1 unit	1DS
 8MR2150-0C	• Fan heaters, UL-approved, for wall mounting					
	- Temperature range 0 ... +60 °C		**8MR2150-0C**	1	1 unit	1DS
	- 65% relative air humidity		**8MR2150-0CA**	1	1 unit	1DS
Semiconductor fan heaters						
 8MR2150-5AA	**Fan heaters** UL-approved					
	• With clip fixing for 35 mm standard mounting rail					
	- 230 V AC, 150 W		**8MR2150-2C**	1	1 unit	1DS
	- 230 V AC, 250 W		**8MR2150-5A**	1	1 unit	1DS
	- 230 V AC, 400 W		**8MR2150-4A**	1	1 unit	1DS
	- 120 V AC, 250 W		**8MR2150-5AA**	1	1 unit	1DS
	- 120 V AC, 400 W		**8MR2150-4AA**	1	1 unit	1DS
 8MR2150-5B	• With screw fixing					
	- 230 V AC, 150 W		**8MR2150-2D**	1	1 unit	1DS
	- 230 V AC, 250 W		**8MR2150-5B**	1	1 unit	1DS
	- 230 V AC, 400 W		**8MR2150-4B**	1	1 unit	1DS
	- 120 V AC, 250 W		**8MR2150-5AB**	1	1 unit	1DS
	- 120 V AC, 400 W		**8MR2150-4AB**	1	1 unit	1DS
 8MR2151-3A (illustration similar)	**PTC fan heaters for wall mounting** UL-approved, 1200 W, clip fixing for 35 mm standard mounting rail or screw fixing (M6)					
	• 230 V AC, with thermostat, 0 ... +60 °C		**8MR2150-3A**	1	1 unit	1DS
	• 230 V AC, without thermostat		**8MR2150-3B**	1	1 unit	1DS
	• 120 V AC, with thermostat +32 ... +140 °F		**8MR2151-3A**	1	1 unit	1DS
	• 120 V AC, without thermostat		**8MR2151-3B**	1	1 unit	1DS
 8MR2151-2A (illustration similar)	**PTC fan heaters for floor mounting** UL-approved, 1200 W, screw fixing (M5)					
	• 230 V AC, with thermostat, 0 ... +60 °C		**8MR2150-2A**	1	1 unit	1DS
	• 230 V AC, without thermostat		**8MR2150-2B**	1	1 unit	1DS
	• 120 V AC, with thermostat +32 ... +140 °F		**8MR2151-2A**	1	1 unit	1DS
	• 120 V AC, without thermostat		**8MR2151-2B**	1	1 unit	1DS

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Thermostats, hygrostats, hygrotherms, switching modules

Overview



Tamper-proof thermostat, NC contact

Thermostats

Thermostats (as NC, NO or CO contacts) are used to regulate cooling devices, filter fans and heat exchangers, as well as to trigger signals in case of excessive temperatures.

Hygrostats

Hygrostats are used to regulate heaters/fan heaters so that the temperature increase raises the dew point from a critical humidity of 65% in cubicles and enclosures with built-in electrical and electronic components. This prevents condensation on structural parts and electronic components.

Hygrotherms

Hygrotherms monitor both temperature and relative humidity in cubicles and enclosures with built-in electrical/electronic components and switch on a heater or fan upon reaching the selected values (temperature or relative humidity). This prevents condensation on structural parts and electronic components.

Switching modules

Switching modules are electronic relays for the switching of high-power DC devices.

Thermostats, hygrostats or hygrotherms can be connected to operate the switching modules.

Note:

The switching capacity values quoted in brackets refer to inductive loads.

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
Thermostats						
	Small thermostats UL-approved, max. switching capacity 250 V AC, 10 (2A)					
	• NC contacts					
 8MR2170-2BA	- Temperature range 0 ... +60 °C		**8MR2170-2BA**	1	1 unit	1DS
	- Temperature range -10 ... +50 °C		**8MR2170-1CA**	1	1 unit	1DS
	- Temperature range +20 ... +80 °C		**8MR2170-1DA**	1	1 unit	1DS
	• NO contacts					
	- Temperature range 0 ... +60 °C		**8MR2170-2BB**	1	1 unit	1DS
 8MR2170-2BB	- Temperature range -10 ... +50 °C		**8MR2170-1CB**	1	1 unit	1DS
	- Temperature range +20 ... +80 °C		**8MR2170-1DB**	1	1 unit	1DS
	Tamper-proof thermostats UL-approved, max. switching capacity 250 V AC, 5 (1.6 A)					
 8MR2171-1BA	• NC contacts					
	- Temperature range 15 °C / 59 °F (5 °C / 41 °F)		**8MR2171-1BA**	1	1 unit	1DS
	- Temperature range 25 °C / 77 °F (15 °C / 59 °F)		**8MR2171-2BA**	1	1 unit	1DS
	• NO contacts					
	- Temperature range 50 °C / 122 °F (40 °C / 104 °F)		**8MR2171-1BB**	1	1 unit	1DS
	- Temperature range 60 °C / 140 °F (50 °C / 122 °F)		**8MR2171-2BB**	1	1 unit	1DS
 8MR2171-1BA	- Temperature range 35 °C / 95 °F (25 °C / 77 °F)		**8MR2171-3BB**	1	1 unit	1DS

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
 8MR2171-1A	**Mechanical thermostats** UL-approved • Changeover contact +5 ... +60 °C, max. switching capacity 250 V AC, 10 (4 A)		**8MR2170-1A**	1	1 unit	1DS
	• Changeover contact -20 ... +30 °C, max. switching capacity 250 V AC, 10 (4 A)		**8MR2170-1B**	1	1 unit	1DS
 8MR2170-1GA	**Electronic thermostats** • Changeover contact -20 ... +60 °C, max. switching capacity 230 V AC, 8 (1.6 A)		**8MR2170-1GA**	1	1 unit	1DS
	• Changeover contact -4 ... +140 °F, max. switching capacity 120 V AC, 8 (1.6 A)		**8MR2170-1GB**	1	1 unit	1DS
	• Changeover contact (inverted) -20 ... +60 °C, max. switching capacity 230 V AC, 8 (1.6 A)		**8MR2170-1GC**	1	1 unit	1DS
	• Changeover contact, 0 ... +60 °C, max. switching capacity 24 V DC, 16 A		**8MR2170-2A**	1	1 unit	1DS
 8MR2170-1EA	**Twin thermostats** • NO and NO contacts, 0 ... +60 °C, max. switching capacity 250 V AC, 10 (2 A)		**8MR2170-1EA**	1	1 unit	1DS
	• NC and NO contacts, 0... +60 °C max. switching capacity 250 V AC, 10 (2A)		**8MR2170-1E**	1	1 unit	1DS
 8MR2172-1A	**Twin thermostats (tamper-proof)** • NC contact,15 °C/59 °F (5 °C / 41 °F) and NO contact, 50 °C / 122 °F (40 °C / 104 °F) max. switching capacity 250 V AC, 5 (1.6A)		**8MR2172-1A**	1	1 unit	1DS
	• NC contact, 25 °C/77 °F (15 °C/ 59 °F) and NO contact, 60 °C/140 °F (50 °C/122 °F) max. switching capacity 250 V AC, 5 (1.6A) or 30 W DC		**8MR2172-2A**	1	1 unit	1DS
	• NO contact, 50 °C/122 °F (40 °C/104 °F) and NO contact, 60 °C/140 °F (50 °C/122 °F) max. switching capacity 250 V AC, 5 (1.6A)		**8MR2172-1AB**	1	1 unit	1DS
Hygrostats						
	Hygrostats are used to regulate heaters/fan heaters so that the temperature increase raises the dew point					
	Mechanical hygrostats • UL-approved CO contact, 230 V AC, 35 ... 95% relative air humidity Max. switching capacity 250 V AC, 5 (0.2 A) or 20 W DC Min. switching capacity 20 V AC/DC, 100 mA		**8MR2170-1C**	1	1 unit	1DS
	Electronic hygrostats • 230 V AC 40 ... 90% relative air humidity Max. switching capacity 240 V AC, 8 (1.6) A		**8MR2170-1AF**	1	1 unit	1DS
 8MR2170-1AF	• 120 V AC 40 ... 90% relative air humidity Max. switching capacity 120 V AC, 8 (1.6 A)		**8MR2170-2AF**	1	1 unit	1DS
	• 230 V AC 65% relative air humidity Max. switching capacity 240 V AC, 8 (1.6) A		**8MR2170-1BF**	1	1 unit	1DS
 8MR2170-1BF	• 120 V AC, 65% relative air humidity Max. switching capacity 120 V AC, 8 (1.6A)		**8MR2170-2BF**	1	1 unit	1DS

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Thermostats, hygrostats, hygrotherms, switching modules

	Version	SD	Article No. www.siemens.com/product?Article No.	PU (UNIT, SET, M)	PS	PG
		d				
Hygrotherms						
 8MR2170-4F	**Electronic hygrotherms** UL-approved, 50 ... 90% relative air humidity, for simultaneously monitoring both temperature and relative humidity in cubicles and enclosures with electronic components, CO contacts					
	• 100 ... 240 V AC, +32 to +140 °F, max. switching capacity of NC contacts: 120 V AC, 6 (1) A, max. switching capacity of NO contacts: 120 V AC, 8 (1.6) A		**8MR2170-4F**	1	1 unit	1DS
	• 100 ... 240 V AC, 0 ... +60 °C, max. switching capacity of NC contacts: 100 ... 240 V AC, 6 (1) A, max. switching capacity of NO contacts: 100 ... 240 V AC, 8 (1.6) A		**8MR2170-4E**	1	1 unit	1DS
Switching modules						
 8MR2180-1A	**Switching modules** Electronic relay for switching high-power DC devices from thermostats, hygrostats or hygrotherms					
	• 24 V DC, 16 A		**8MR2180-1A**	1	1 unit	1DS
	• 48 V DC, 16 A		**8MR2180-1B**	1	1 unit	1DS

More information

For further information, see the Industry Mall under: "Low-Voltage Systems" --> "SIVACON Switchboards and Busbar Trunking Systems" > "System Cubicles, System Lighting and System Air-Conditioning" > "SIVACON 8MR System Air-Conditioning".

Minimum order quantity (PS) or a multiple thereof can be ordered.

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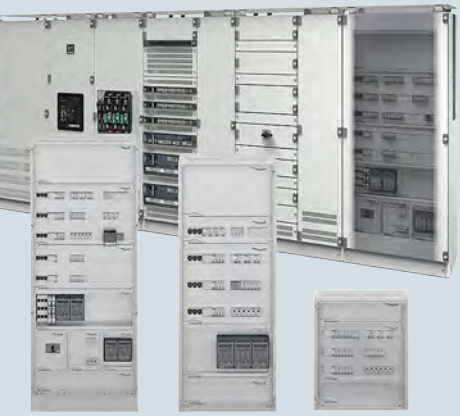

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Quick-assembly kits for unequipped distribution boards
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For further technical product information:

Siemens Industry Online Support:
www.siemens.com/lowvoltage/product-support

→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

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Introduction

Overview

The ALPHA 3200 power distribution board is ideally suited to use in building infrastructure. The modular system for producing a design-verified switchgear and controlgear assembly in accordance with IEC 61439-2 is perfectly matched to Siemens switching devices.



ALPHA 3200 power distribution boards up to 3200 A

Panel types:

- Incoming feeder panels 3WL air circuit breakers, 3VA, 3VL molded case circuit breakers
- Outgoing feeder panels in fixed-mounted design, 3VA, 3VL molded case circuit breakers, 3KA, 3KD switch disconnectors
- Outgoing feeder panels 3NJ4 fuse switch disconnectors, fixed-mounted
- Outgoing feeder panels 3NJ6 switch disconnectors with fuses, plugged in
- ALPHA outgoing feeder panels
- Coupling panels (longitudinal, transverse) for 3WL air circuit breakers

Benefits

- Compact, space-saving design, perfectly matched to the innovative SENTRON components from Siemens
- High integration density of a host of devices and their accessories from the SENTRON portfolio
- Fast, simple and reliable planning of the enclosure and required components with the configuration software SIMARIS configuration
- Comprehensive plant documentation (parts lists, calculation of losses, design graphics)

Application

The ALPHA 3200 low-voltage power distribution board rounds off the ALPHA portfolio and enables universal power distribution for applications in building infrastructure up to 3200 A.

Design

The ALPHA 3200 power distribution board is matched to the SENTRON protection, switching, measuring and monitoring devices. In addition, the assembly kits of the ALPHA distribution boards can be integrated into the switchboard.

Type of delivery



Pre-assembled with copper



Pre-assembled without copper

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Standards and regulations	System for producing a design-verified switchgear and controlgear assembly	IEC 61439-1/2 EN 61439-1/2
Clearance and creepage distances	Rated impulse withstand voltage (U_{imp})	8 kV
	Overvoltage category	III
	Pollution degree	3
Rated insulation voltage (U_i)		1000 V
Rated operational voltage (U_e)		Up to 690 V
Busbar 3-pole / 4-pole	Rated currents (I_n) of the main busbars	Up to 3200 A
	Rated peak withstand current (I_{pk})	Up to 165 kA
	Rated short-time withstand current (I_{cw})	Up to 75 kA, 1s
Degree of protection	According to IEC 60529, EN 60529	Up to IP41 (ventilated) IP54 (unventilated)
Form of internal separation	Acc. to IEC 61439-1, EN 61439-1, Section 7.7	Up to form 2b
Frame variants	Height	2000 mm
	Depth	600 mm
Operating conditions		
Observe correction factors for other conditions		
Ambient temperature Installation altitudes	24 hour mean value	≤ 35 °C ≤ 2000 m
Installation Operating personnel		Indoor installation Electrically skilled persons acc. to (IEC 61439-1, Paragraph 3.7.12)

More information

Software

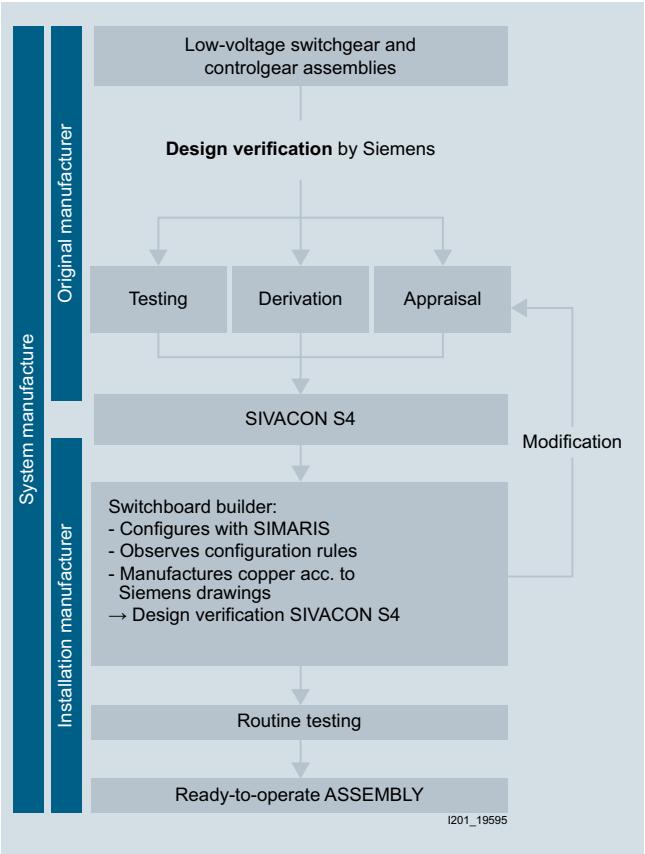
The ALPHA 3200 power distribution board is configured, ordered and documented using the configuring software SIMARIS configuration, siehe Kapitel "Software".

Construction and testing modalities acc. to IEC 61439-1/-2

The area of responsibility of the units involved is clearly defined within the switchboard standard. With SIVACON S4 Siemens as the original manufacturer is offering a system for producing a design-verified switchgear and controlgear assembly.

The switchboard builder (manufacturer of the switchgear and controlgear assembly) combines it in accordance with the application and configuration rules specified by Siemens. The free-of-charge SIMARIS configuration software provides assistance in this regard. What is more, all the copper drawings and terminal diagrams of the devices are stored in this program. This means that the design verifications performed by Siemens still retain their validity. In the event of a customer-specific modification the switchboard builder naturally slips into the role of the original manufacturer and ensures compliance with applicable standards.

After carrying out the routine test and commissioning, a ready-to-operate switchgear and controlgear assembly is created which is then handed over to the owner of the plant. This regulated procedure creates trust and provides a reliable, uninterruptible power supply.



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Overview

Overview

		Version	Page	Surface-mounting distribution boards	Flush-mounting distribution boards	Rated current	Cubicle depth	Safety class	
						A	mm	1	2
	ALPHA 1250 DIN technology distribution boards	Unequipped distribution board	19/10	✔	--	1250	400	✔	--
	ALPHA 630 DIN technology distribution boards	Unequipped distribution board, as flat pack	19/15	✔	--	630	210	✔	✔
		Unequipped distribution board	19/16	✔	--	630	210/250/320	✔	✔
		Unequipped distribution board, with open side panels	19/17	✔	--	630	250/320	✔	--
	ALPHA 400 DIN technology distribution boards	Unequipped distribution board, as flat pack	19/22	✔	--	400	210	✔	✔
		Unequipped distribution board	19/23	✔	✔	400	210	✔	✔
	ALPHA 160 DIN technology distribution boards	Cubicle, partially equipped	19/63	✔	✔	160	140	--	✔
		Unequipped distribution board	19/63	✔	✔	160	140	--	✔
	Small distribution boards	SIMBOX XL small distribution boards:							
		• Flush-mounting and hollow-wall distribution boards	19/71	--	✔	63	88[1)]	--	✔
		• IP30 surface-mounting distribution boards	19/79	✔	--	63	99	--	✔
		SIMBOX WP small distribution boards:							
		• IP65 surface-mounting distribution boards	19/83	✔	--	63	100/140/160	--	✔

1) Mounting depth

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Degree of protection	VDE	EN	DIN	IEC
	IP55	VDE 0660-600-1/-2	EN 61439-1/-2	--	Design verification according to IEC 61439-1/-2
	IP43	VDE 0660-600-1/-2	EN 61439-1/-2	--	IEC 61439-1/-2
	IP43 / IP55				
	IP55				
	IP43	VDE 0660-600-1/-2/-3	EN 61439-1/-2/-3	--	IEC 61439-1/-2/-3
	IP31 / IP43 / IP55				
	IP31 / IP43 / IP44	VDE 0660-600-1/-3	EN 61439-1/-3	--	IEC 61439-1/-3
	IP30	DIN VDE 0603	--	DIN 43871	IEC 61439-1/-3
	IP65	DIN VDE 0603-1, VDE 0660-500/-504	EN 61439-1/-3	DIN 43871	IEC 61439-1/-3

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Integrated system

The ALPHA distribution boards for currents from 63 to 1250 A cover all requirements placed on power distribution. The common platform structure ensures a universal system of expansion options of the ALPHA distribution boards.

Modular and flexible

The modular design of the board enables easy planning, configuration, calculation, ordering and mounting. Assembly kits that only require a one-size screwdriver for assembly are available for all mountable switching and modular installation devices.

Due to the platform structure and the modular layout, the device-specific assembly kits can be integrated in various distribution board versions. This simplifies assembly. The use of identical parts reduces stock keeping. The equipping is done individually and project-specifically.

Flat pack delivery

ALPHA distribution boards are also available as flat packs. This means that a distribution board is delivered in individual parts in a cardboard box. The cardboard boxes contain the individual parts, brief mounting instructions and all mounting accessories.

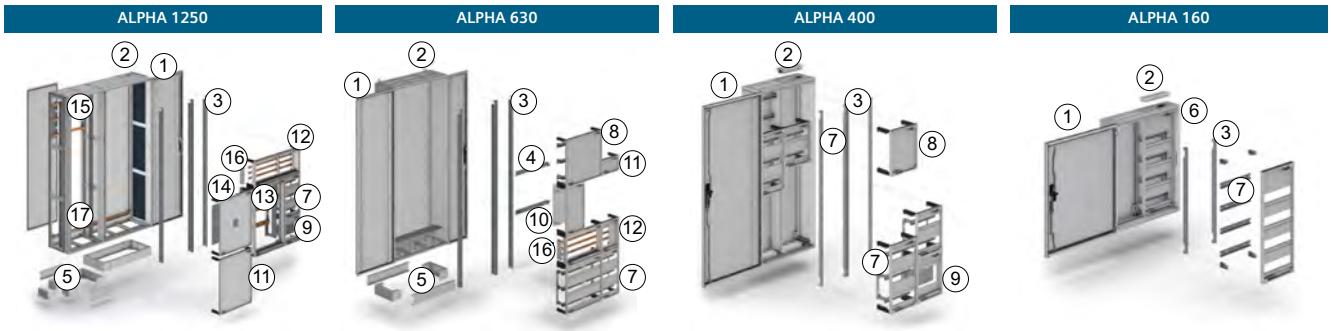
Only a few manual steps are required to assemble the individual system components to create wall or floor-mounted distribution boards of degree of protection IP43. The only tool required for such assembly is a one-size screwdriver.

This offers clear advantages and customer benefits: a considerable reduction in the delivery volume and storage space required. It goes without saying that the distribution boards can also be delivered in a pre-assembled form.



Unequipped distribution board delivery option

In the unequipped distribution board delivery option, ALPHA distribution boards are delivered as welded and riveted complete enclosures.







I201_19628

1 Enclosure with door
2 Flange
3 Stays
4 Crossbeam
5 Base
6 Quick-assembly kit
7 Assembly kit for modular installation devices
8 Assembly kit for terminal blocks
9 Assembly kit for fuse switch disconnectors
10 Assembly kit for mounting plate
11 Front cover
12 Assembly kit for busbar-adaptable units
13 Assembly kit for in-line fuse switch disconnectors
14 Assembly kit for molded case circuit breakers
15 Main busbar system
16 60 mm busbar system
17 PEN busbar

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Special colors additional price

Special colors	Color designation	Option	ALPHA 160 Surcharge	ALPHA 400 Surcharge	ALPHA 630 Surcharge	ALPHA 1250 Surcharge
	RAL 9016 traffic white semi-gloss smooth	**C10**	--	--	--	--
	RAL 7035 light gray semi-gloss smooth	**C11**	--	--	--	--
	RAL 7035 light gray semi-gloss textured	**C12**	✓	✓	✓	✓
	RAL 7032 pebble gray semi-gloss textured	**C13**	✓	✓	✓	✓
	RAL 7038 agate gray semi-gloss textured	**C14**	✓	✓	✓	✓
	RAL 9010 pure white semi-gloss smooth	**C15**	✓	✓	✓	✓
	SN 610 Siemens white semi-gloss textured	**C16**	✓	✓	✓	✓
	SN 610 Siemens white silky gloss textured	**C17**	✓	✓	✓	✓
	RAL 9002 gray white semi-gloss smooth	**C18**	✓	✓	✓	✓
	RAL 9002 gray white semi-gloss textured	**C19**	✓	✓	✓	✓
	RAL 9003 signal white semi-gloss textured	**C20**	✓	✓	✓	✓
	RAL 9001 cream semi-gloss smooth	**C21**	✓	✓	✓	✓
	RAL 5017 traffic blue silky gloss textured	**C22**	✓	✓	✓	✓
	RAL 5005 signal blue semi-gloss smooth	**C23**	✓	✓	✓	✓
	RAL 5010 gentian blue semi-gloss smooth	**C24**	✓	✓	✓	✓
	RAL 2000 yellow orange semi-gloss smooth	**C25**	✓	✓	✓	✓
	RAL 6018 yellow green semi-gloss smooth	**C26**	✓	✓	✓	✓
	RAL 1003 signal yellow semi-gloss smooth	**C27**	✓	✓	✓	✓
	RAL 7033 cement gray semi-gloss textured	**C28**	✓	✓	✓	✓
	RAL 9002 gray white silky gloss smooth	**C29**	✓	✓	✓	✓
	RAL 9010 pure white semi-gloss textured	**C30**	✓	✓	✓	✓
	RAL 3000 flame red silky gloss textured	**C31**	✓	✓	✓	✓

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Introduction

Overview

The system ALPHA 1250 DIN technology distribution boards (1250 A) comprise unequipped distribution boards with removable rear plates, doors, bases with degree of protection IP55, assembly kits for individual assembly, and an extensive range of accessories.

Enclosure

- Material: electrogalvanized and powder-coated sheet steel
- Sheet thickness, degree of protection IP43/IP55: body 1.25 mm, door 1 mm
- Color: RAL 7035 (light gray), further RAL colors available on request.
- For special colors, see page 19/7.

Assembly kits

The assembly kits are made of sendzimir-galvanized sheet steel and are equipped with molded-plastic covers for a wide range of equipping options, e.g. with switching devices and modular installation devices.

The largest switching devices that can be installed in the ALPHA 1250 are SENTRON switching devices with a rated current of up to 1250 A.

Benefits

- Busbars are routed to the rear panel through side-by-side cabinets
- Rear wall can be removed for easy installation
- Degree of protection IP55
- Safety class 1 (protective conductor connection)
- Easy planning thanks to modular design
- Flexible expansion with a wide range of mounting kits from the ALPHA 630 distribution board system
- Ample wiring space
- Easy assembly thanks to keyhole-fastened components and modules with quick-acting locks
- System concept according to DIN, EN and VDE standards
- High-quality surface finish: distribution boards made of electrogalvanized and powder-coated sheet steel, system components made of sendzimir-galvanized sheet steel, galvanized and transparently chromated small components and screws
- Doors can be hinged on the right or left
- Door opening angle of 170°
- Replaceable locking systems (accessories)
- Front cover with sealable 90° quick-acting locks
- Environmentally-friendly, recyclable plastics.

Application

The ALPHA 1250 DIN technology distribution board (1250 A) is used wherever busbar systems are to be routed through several side-by-side floor-mounted cabinets or where floor-mounted cabinets require a greater enclosure depth (e.g. in administrative, non-residential and industrial buildings). It rounds off the ALPHA range of floor-mounted distribution boards with an overall depth of 400 mm.

The modular distribution boards can be supplied in safety class 1 (protective conductor connection). IP55 degree of protection can be achieved with the necessary flanges.

With just a few standard components, it is possible to achieve a wide range of project-related mounting and equipping options.

40 mm, 60 mm and 185 mm busbar systems with dimensions up to 100 × 10 mm can be installed.



Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Overvoltage category	III
Rated impulse withstand voltage U_{imp} in kV	8
Clearance and creepage distances	EN 60664-1
Rated insulation voltage U_i in V	690
Rated operational voltage U_e in V AC/DC	690
Rated voltage U_n (40 Hz to 60 Hz AC) in V	690 for built-in devices
Rated current in A	1250
Rated peak withstand current I_{pk} in kA • With busbar support, 60 mm • With busbar support, 185 mm	 Up to 78.9[1)] Up to 110[1)]
Rated short-time current I_{cw} in kA • With busbar support, 60 mm • With busbar support, 185 mm	 Up to 34[1)] Up to 35[1)]
Protective measures	Safety class 1 (protective conductor connection)
Number of conductors in the busbar run	4/5
Degree of protection acc. to EN 60529	IP55 with door (with matching flanges)
Standard mounting rail tier spacing per standard mounting rail tier in mm	150
Modular width (MW)	18 mm, 12 MW
Pollution degree	3
Ambient temperature in °C	35 (24-h mean value)
Relative air humidity in %	50 at 40 °C
Test specifications	EN 61439-1/-2 (VDE 0660-600-1/-2)
Enclosure	Sheet steel
Mounting dimensions	DIN 43880
Surface	Electrogalvanized and powder-coated
Color[2)]	RAL 7035 (light gray)
Lock	3-point locking with integrated espagnolette lock (can be replaced with other locking systems if required)
Packing material	Shock-proof, environmentally-friendly

1) Depending on distance of busbar support.

2) Further RAL colors are available on request. For special colors, see page 19/7.

Cabinet dimensions

Cabinet (external dimensions)				
Height		**Width**	**Depth**	**Assembly kits in panel-size grid dimension**
mm	mm	mm	mm	Height × width in mm
External dimension: 1950 with base (100 mm)	Internal dimension: 1800	250/300 500/550 750/800 1000/1050 1250/1300	400	150 × 250

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Unequipped distribution boards

Selection and ordering data

Modular distribution boards

- Degree of protection IP55
- Color RAL 7035 (light gray)
- External height: 1950 mm
- External depth: 400 mm
- Type of delivery: welded and riveted unequipped distribution board, with removable
- Rear panel, door and open side panels
- Safety class 1 (protective conductor connection)
- Enclosure (with base) with door and espagnolette lock (can be replaced with other locking systems).
- Distribution boards with a width of 750 mm/800 mm or more will be supplied with a double door
- Flanges must be ordered separately

Internal/external dimensions with base		Panel width	SD	**Surface-mounting distribution boards**						
Height	Width			**Standard color, RAL 7035**		PU (UNIT, SET, M)	PS	PG	**Textured paint, RAL 7035**	
				Article No. www.siemens.com/product?Article No.	Price per PU				Article No. www.siemens.com/product?Article No.	
mm	mm		d						Article No. plus option **-Z-C12**	Special color surcharge
Cabinet depth 210 mm, safety class 1										
• Type of delivery: flat pack, degree of protection IP43										
1800/1950	250/300	□		**8GK1423-8KK15**		1	1 unit	1BP	**8GK1423-8KK15-Z-C12**	✓
	500/550	□□		**8GK1423-8KK25**		1	1 unit	1BP	**8GK1423-8KK25-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1423-8KK35**		1	1 unit	1BP	**8GK1423-8KK35-Z-C12**	
	1000/1050	□□□□		**8GK1423-8KK45**		1	1 unit	1BP	**8GK1423-8KK45-Z-C12**	
	1250/1300	□□□□		**8GK1423-8KK55**		1	1 unit	1BP	**8GK1423-8KK55-Z-C12**	

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PE	PU (UNIT, SET, M)	PS	PG
		d					
 8GK9513-8KK10	**Replacement door for cabinets** Height 1950 mm						
	Cubicle width mm / Door version / Door width mm						
	300 / Complete / 300		**8GK9513-8KK10**		1	1 unit	1BP
	550 / Complete / 550		**8GK9513-8KK20**		1	1 unit	1BP
	800/1050 / Left / 525		**8GK9513-8KK30**		1	1 unit	1BP
	800 / Right / 275		**8GK9513-8KK40**		1	1 unit	1BP
	1050/1300 / Right / 525		**8GK9513-8KK50**		1	1 unit	1BP
	1300 / Left / 775		**8GK9513-8KK60**		1	1 unit	1BP
 8GK9520-0KK05	**Side panels, modular distribution board** Depth 400 mm		**8GK9520-0KK05**		1	1 unit	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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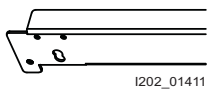
Unequipped distribution boards

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PE	PU (UNIT, SET, M)	PS	PG
Accessories							
 8GK4853-8KK02	**Longitudinal stays (latchable pivot stays)** • In order to mount the assembly kits in unequipped distribution boards, 2 longitudinal stays are required for each assembly kit width • Depth 250/320/400 mm • 1 set = 2 stays						
	Longitudinal stays mm						
	1800		**8GK4853-8KK02**		1	1 set	1BP
 8GK9910-0KK32	**Connecting kits for longitudinal stays** • Connecting plate for stays • 1 set = 4 units		**8GK9910-0KK32**		1	1 unit	1BP
 8GK9913-0KK30	**Assembly kits for masking frame for front cover** Height 1800 mm						
	Width in mm						
	250		**8GK9913-0KK10**		1	1 unit	1BP
	500		**8GK9913-0KK20**		1	1 unit	1BP
	750		**8GK9913-0KK30**		1	1 unit	1BP
	1000		**8GK9913-0KK40**		1	1 unit	1BP
	1250		**8GK9913-0KK50**		1	1 unit	1BP
	Note						
	Assembly kit only necessary if the mounting stays are mounted at the rear of the modular distribution board.						
 8GK9100-0KK04	**Flange plates** For lower flange opening (sheet steel closed)		**8GK9100-0KK04**		1	1 unit	1BP
Expansion parts for busbars							
 8GK9720-0KK00	**Busbar supports** • Busbar spacing 100/185 mm • Max. busbar current 1250 A • Max. Cu 1 × 80 × 10						
	Versions						
	• With matching support plate for mounting on the rear panel		**8GK9720-0KK00**		1	1 unit	1BP
	• Without support plate for mounting on the busbar (no fixing to the cabinet enclosure), including fixing screws		**8GK9720-0KK01**		1	1 unit	1BP
	Accessories						
	• PEN bar holder		**8GK9721-0KK00**		1	2 units	1BP
	• N/PE busbar supports		**8GK9110-0KK00**		1	1 unit	1BP
 I202_01411 8GK4854-0KK..	**Cross arm for N/PEN pin insulators and/or holders for PEN bars** Included in delivery: cross arm for N/PEN main busbar, 4 × fixing screws M5 × 10						
	Versions						
	• W = 250 mm		**8GK4854-0KK10**		1	1 unit	1BP
	• W = 500 mm		**8GK4854-0KK20**		1	1 unit	1BP
	• W = 750 mm		**8GK4854-0KK30**		1	1 unit	1BP
	• W = 1000 mm		**8GK4854-0KK40**		1	1 unit	1BP
	• W = 1250 mm		**8GK4854-0KK50**		1	1 unit	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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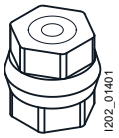
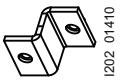
Unequipped distribution boards

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PE	PU (UNIT, SET, M)	PS	PG
 8GK9110-0KK00	**Pin insulator for N busbar including holder** Pin insulator, 1-pole, with M8 internal thread and holder		**8GK9110-0KK00**		1	1 unit	1BP
 8GK9721-0KK00	**ALPHA 1250 holder for PEN bar** PEN bar holder		**8GK9721-0KK00**		1	2 units	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

System

The ALPHA 630 floor-mounted distribution boards are available as unequipped distribution boards as flat packs (delivered in individual parts for customer assembly, see also Part 3) in degree of protection IP43, unequipped distribution boards welded and riveted in degree of protection IP55.

Enclosure

- Material: electrogalvanized and powder-coated sheet steel
- Sheet thickness, degree of protection IP43/IP55: body 1 mm, door 1 mm
- Color: RAL 7035 (light gray), further RAL colors available on request. For special colors, see page 19/7.

Benefits

- Plan and configure quickly, simply and conveniently with the software SIMARIS configuration.
- Types of delivery:
  - Flat pack (assembly kit for self-assembly)
  - Unequipped distribution board, welded and riveted
  - The cabinet-high quick-assembly kits can be mounted directly onto the platform (rear panel)
  - Additional mounting stays are required for mounting the assembly kits! 2 longitudinal stays per panel width must be ordered separately for the assembly kits.
- Easy planning thanks to modular design
- Ample wiring space behind the standard mounting rail
- Extensive range of assembly kits for ALPHA switching devices and modular installation devices for individual and project-related composition
- Easy assembly thanks to keyhole-fastened components and modules with quick-acting locks
- System concept according to DIN, EN and VDE standards
- Solid sheet-steel enclosure
- Degrees of protection IP43 and IP55
- Safety class 1 (protective conductor connection) and safety class 2 (total insulation)
- High-quality surface finish: distribution boards made of electrogalvanized and powder-coated sheet steel, system components made of sendzimir-galvanized sheet steel, galvanized and transparently chromated small components and screws
- Doors can be hinged on the right or left
- Door opening angle of 170°
- Replaceable locking systems (accessories)
- Front cover with sealable 90° quick-acting locks
- Environmentally-friendly, recyclable plastics.

Application

The ALPHA 630 DIN technology distribution boards round off the ALPHA distribution board product range with three different mounting depths: 210 mm, 250 mm and 320 mm.

With just a few standard components, it is possible to achieve a wide range of project-related mounting and equipping options.

The ALPHA 630 DIN technology distribution board range comprises wall-mounted distribution boards with up to 12 modular installation devices, each with 12 MW per mounting width (250 mm). The standard mounting rail tier spacing is 150 mm. A total of 5 cabinet mounting widths are available, each with an internal dimension of 250 mm.

The distribution boards are designed to meet safety class 1 (protective conductor connection) and safety class 2 (total insulation). For floor-mounted distribution boards the standard degrees of protection are IP43 with a depth of 210 mm (flat pack: delivery in individual parts) and IP55 (unequipped distribution board, welded and riveted) with depths of 250 mm and 320 mm. The rated current is 630 A.

40 mm or 60 mm busbar systems with dimensions up to 30 × 10 mm can be installed.

The modular design of the board enables easy planning, configuration, calculation, ordering and mounting.

Assembly kits that only require a one-size screwdriver for assembly are available for all mountable switching and modular installation devices.



Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Overvoltage category	III
Rated impulse withstand voltage U_{imp} in kV	6
Clearance and creepage distances	EN 60664-1
Rated insulation voltage U_i in V	690
Rated operational voltage U_e in V AC/DC	690
Rated voltage U_n (40 Hz to 60 Hz AC) in V	690 for built-in devices
Rated current in A	Up to 630
Rated peak withstand current I_{pk} in kA	Up to 76 (3-pole)[2]
Rated short-time current I_{cw} in kA	34, conduction interval of 1 s
Protective measures	Safety class 1 (protective conductor connection) Safety class 2 (total insulation)
Number of conductors in the busbar run	4/5
Degree of protection acc. to EN 60529	IP43 with door, IP55 with door (with matching flanges)
Standard mounting rail tier spacing per standard mounting rail tier in mm	150
Modular width (MW)	18 mm, 12 MW + 1 mountable MW
Pollution degree	3
Ambient temperature in °C	35 (24-h mean value)
Relative air humidity in %	50 at 40 °C
Test specifications	EN 61439-1/-2 (VDE 0660-600-1/-2)
Enclosure	Sheet steel
Mounting dimensions	DIN 43870
Surface	Electrogalvanized and powder-coated
Color[1]	RAL 7035 (light gray)
Lock	3-point locking with integrated espagnolette lock (can be replaced with other locking systems if required)
Packing material	Shock-proof, environmentally-friendly

1) Further RAL colors are available on request. For special colors, see page 19/7.

2) Busbar support spacing: 250 mm, Cu busbars 30 × 10 mm.

Cabinet dimensions

Cabinet (external dimensions)				
Height		**Width**	**Depth**	**Assembly kits in panel-size grid dimension**
mm		mm	mm	Height × width in mm
External dimension: 1950 with base (100 mm)	Internal dimension: 1800	250/300 500/550 750/800 1000/1050 1250/1300	210	150 × 250
External dimension: 1950 with base (100 mm)	Internal dimension: 1800	250/300 500/550 750/800 1000/1050 1250/1300	250	
External dimension: 1950 with base (100 mm)	Internal dimension: 1800	250/300 500/550 750/800 1000/1050 1250/1300	320	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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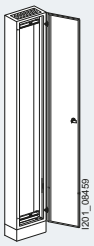
8GK1 surface-mounting distribution boards, IP43

Overview

- Types of delivery:
  - Flat pack (assembly kit for self-assembly)
  - Unequipped distribution board, welded and riveted
  - The cabinet-high quick-assembly kits can be mounted directly onto the platform (rear panel)
  - Additional mounting stays are required for mounting the assembly kits! 2 longitudinal stays per panel width must be ordered separately for the assembly kits.
- Cabinet depth 210 mm
- Safety class 1 (protective conductor) and 2 (total insulation)
- Degree of protection IP43
- Color RAL 7035 (light gray)
- For special colors, see page 19/7
- Unassembled enclosure (with base) with unassembled enclosed door or pre-assembled enclosure (with base) complete with door and espagnolette lock, which can be replaced with other locking systems. Distribution boards with a width of 750 mm/800 mm or more will be supplied with a double door
- Flanges: one 2-component flange at the top per panel width

Selection and ordering data

Internal/external dimensions with base				Surface-mounting distribution boards					
Height	Width	Panel width	SD	Standard color, RAL 7035		PU (UNIT, SET, M)	PS	PG	Textured paint, RAL 7035	
				Article No. www.siemens.com/product?Article No.	Price per PU				Article No. www.siemens.com/product?Article No.	
mm	mm		d						Article No. plus option **-Z-C12**	Special color surcharge
Cabinet depth 210 mm, flat pack										
• Type of delivery: flat pack, safety class 1, degree of protection IP43										
1800/1950 	250/300	□		**8GK1302-8KK12**		1	1 unit	1BP	--	
	500/550	□□		**8GK1302-8KK22**		1	1 unit	1BP	--	
	750/800	□□□		**8GK1302-8KK32**		1	1 unit	1BP	--	
	1000/1050	□□□□		**8GK1302-8KK42**		1	1 unit	1BP	--	
	1250/1300	□□□□□		**8GK1302-8KK52**		1	1 unit	1BP	--	
• Type of delivery: flat pack, safety class 2, degree of protection IP43										
1800/1950 	250/300	□		**8GK1312-8KK12**		1	1 unit	1BP	--	
	500/550	□□		**8GK1312-8KK22**		1	1 unit	1BP	--	
	750/800	□□□		**8GK1312-8KK32**		1	1 unit	1BP	--	
	1000/1050	□□□□		**8GK1312-8KK42**		1	1 unit	1BP	--	
	1250/1300	□□□□□		**8GK1312-8KK52**		1	1 unit	1BP	--	
Cabinet depth 210 mm, unequipped distribution board										
• Delivery as welded and riveted unequipped distribution board, safety class 1, degree of protection IP43										
1800/1950 	250/300	□		**8GK1322-8KA12**		1	1 unit	1BP	**8GK1322-8KA12-Z-C12**	✓
	500/550	□□		**8GK1322-8KA22**		1	1 unit	1BP	**8GK1322-8KA22-Z-C12**	Ordering example,
	750/800	□□□		**8GK1322-8KA32**		1	1 unit	1BP	**8GK1322-8KA32-Z-C12**	for further colors, see page 19/7
	1000/1050	□□□□		**8GK1322-8KA42**		1	1 unit	1BP	**8GK1322-8KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1322-8KA52**		1	1 unit	1BP	**8GK1322-8KA52-Z-C12**	
• Delivery as welded and riveted unequipped distribution board, safety class 2, degree of protection IP43										
1800/1950 	250/300	□		**8GK1332-8KA12**		1	1 unit	1BP	**8GK1332-8KA12-Z-C12**	✓
	500/550	□□		**8GK1332-8KA22**		1	1 unit	1BP	**8GK1332-8KA22-Z-C12**	Ordering example,
	750/800	□□□		**8GK1332-8KA32**		1	1 unit	1BP	**8GK1332-8KA32-Z-C12**	for further colors, see page 19/7
	1000/1050	□□□□		**8GK1332-8KA42**		1	1 unit	1BP	**8GK1332-8KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1332-8KA52**		1	1 unit	1BP	**8GK1332-8KA52-Z-C12**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8GK1 surface-mounting distribution boards, IP43

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Accessories							
 8GK4853-8KK00	**Longitudinal stays** • To mount the assembly kits in unequipped distribution boards, 2 longitudinal stays are required for each assembly kit width • Height 1800 mm, depth 210 mm • 1 set = 2 stays		**8GK4853-8KK00**		1	1 set	1BP
 8GK9910-0KK32	**Connecting kits for longitudinal stays** • Connecting plate for stays • 1 set = 4 units		**8GK9910-0KK32**		1	1 unit	1BP

For assembly kits, see page 19/30 onwards.
For accessories, see page 19/48 onwards.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8GK1 surface-mounting distribution boards, IP55

Overview

- Type of delivery: unequipped distribution board, welded and riveted
- Cabinet depths: 250 mm and 320 mm
- Safety class 1 (protective conductor connection) and safety class 2 (total insulation)
- Degree of protection IP55
- Color RAL 7035 (light gray)
- For special colors, see page 19/7
- Unassembled enclosure (with base) with unassembled enclosed door or pre-assembled enclosure (with base) complete with door and espagnolette lock, which can be replaced with other locking systems. Distribution boards with a width of 750 mm/800 mm or more will be supplied with a double door
- SCII flange:
  - Depth 250 mm: per panel width, one 2-component flange each at the top and bottom
  - Depth 320 mm: per panel width, two 2-component flanges each at the top and bottom
- SCI flange:
  - Depth 250 mm: per panel width, one 2-component flange each at the top
  - Depth 320 mm: two 2-component flanges per panel width at the top (to achieve degree of protection IP55, a 2-component flange is also required at the bottom; please order separately if required).

Selection and ordering data

Internal/external dimensions				**ALPHA 630 DIN technology distribution board, delivery as unequipped distribution board, degree of protection: IP55, color: RAL 7035**					
Height	Width	Panel width	SD	**Standard color** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	**Textured paint** Article No. www.siemens.com/product?Article No. Article No. plus option **-Z-C12**	Special color surcharge
mm	mm	mm	d							
With closed side panel, cabinet depth 250 mm, safety class 1										
1800/1950	300	□		**8GK1323-8KN13**		1	1 unit	1BP	**8GK1323-8KN13-Z-C12**	✓
	550	□□		**8GK1323-8KN23**		1	1 unit	1BP	**8GK1323-8KN23-Z-C12**	Ordering example, for further colors, see page 19/7
	800	□□□		**8GK1323-8KN33**		1	1 unit	1BP	**8GK1323-8KN33-Z-C12**	
	1050	□□□□		**8GK1323-8KN43**		1	1 unit	1BP	**8GK1323-8KN43-Z-C12**	
	1300	□□□□□		**8GK1323-8KN53**		1	1 unit	1BP	**8GK1323-8KN53-Z-C12**	
8GK1323-8KN23										
With closed side panel, cabinet depth 320 mm, safety class 1										
1800/1950	300	□		**8GK1323-8KN14**		1	1 unit	1BP	**8GK1323-8KN14-Z-C12**	✓
	550	□□		**8GK1323-8KN24**		1	1 unit	1BP	**8GK1323-8KN24-Z-C12**	Ordering example, for further colors, see page 19/7
	800	□□□		**8GK1323-8KN34**		1	1 unit	1BP	**8GK1323-8KN34-Z-C12**	
	1050	□□□□		**8GK1323-8KN44**		1	1 unit	1BP	**8GK1323-8KN44-Z-C12**	
	1300	□□□□□		**8GK1323-8KN54**		1	1 unit	1BP	**8GK1323-8KN54-Z-C12**	
With open side panel, cabinet depth 250 mm, safety class 1										
1800/1950	300	□		**8GK1323-8KP13**		1	1 unit	1BP	**8GK1323-8KP13-Z-C12**	✓
	550	□□		**8GK1323-8KP23**		1	1 unit	1BP	**8GK1323-8KP23-Z-C12**	Ordering example, for further colors, see page 19/7
	800	□□□		**8GK1323-8KP33**		1	1 unit	1BP	**8GK1323-8KP33-Z-C12**	
	1050	□□□□		**8GK1323-8KP43**		1	1 unit	1BP	**8GK1323-8KP43-Z-C12**	
	1300	□□□□□		**8GK1323-8KP53**		1	1 unit	1BP	**8GK1323-8KP53-Z-C12**	
8GK1323-8KP23										
With open side panel, cabinet depth 320 mm, safety class 1										
1800/1950	300	□		**8GK1323-8KP14**		1	1 unit	1BP	**8GK1323-8KP14-Z-C12**	✓
	550	□□		**8GK1323-8KP24**		1	1 unit	1BP	**8GK1323-8KP24-Z-C12**	Ordering example, for further colors, see page 19/7
	800	□□□		**8GK1323-8KP34**		1	1 unit	1BP	**8GK1323-8KP34-Z-C12**	
	1050	□□□□		**8GK1323-8KP44**		1	1 unit	1BP	**8GK1323-8KP44-Z-C12**	
	1300	□□□□□		**8GK1323-8KP54**		1	1 unit	1BP	**8GK1323-8KP54-Z-C12**	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8GK1 surface-mounting distribution boards, IP55

Internal/external dimensions				ALPHA 630 DIN technology distribution board, delivery as unequipped distribution board, degree of protection: IP55, color: RAL 7035						
Height	Width	Panel width	SD	Standard color Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	Textured paint Article No. www.siemens.com/product?Article No.	
mm	mm	mm	d						Article No. plus option **-Z-C12**	Special color surcharge
With closed side panel, cabinet depth 250 mm, safety class 2										
1800/1950	300	□		**8GK1333-8KN13**		1	1 unit	1BP	**8GK1333-8KN13-Z-C12**	✓
	550	□□		**8GK1333-8KN23**		1	1 unit	1BP	**8GK1333-8KN23-Z-C12**	Ordering example, for further colors, see page 19/7
	800	□□□		**8GK1333-8KN33**		1	1 unit	1BP	**8GK1333-8KN33-Z-C12**	
	1050	□□□□		**8GK1333-8KN43**		1	1 unit	1BP	**8GK1333-8KN43-Z-C12**	
	1300	□□□□□		**8GK1333-8KN53**		1	1 unit	1BP	**8GK1333-8KN53-Z-C12**	
8GK1323-8KN23										
With closed side panel, cabinet depth 320 mm, safety class 2										
1800/1950	300	□		**8GK1333-8KN14**		1	1 unit	1BP	**8GK1333-8KN14-Z-C12**	✓
	550	□□		**8GK1333-8KN24**		1	1 unit	1BP	**8GK1333-8KN24-Z-C12**	Ordering example, for further colors, see page 19/7
	800	□□□		**8GK1333-8KN34**		1	1 unit	1BP	**8GK1333-8KN34-Z-C12**	
	1050	□□□□		**8GK1333-8KN44**		1	1 unit	1BP	**8GK1333-8KN44-Z-C12**	
	1300	□□□□□		**8GK1333-8KN54**		1	1 unit	1BP	**8GK1333-8KN54-Z-C12**	

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	**Side panel** • Gray • Depth 250/320 mm		**8GK9520-0KK03**		1	1 set	1BP
8GK9520-0KK03							
Accessories							
	**Longitudinal stays (latchable pivot stays)** • In order to mount the assembly kits in unequipped distribution boards, 2 longitudinal stays are required for each assembly kit width • Height 1800 mm • Depth 250/320 mm • 1 set = 2 stays		**8GK4853-8KK02**		1	1 set	1BP
8GK4853-8KK02							
	**Connecting kits for longitudinal stays** • Connecting plate for stays • 1 set = 4 units		**8GK9910-0KK32**		1	1 unit	1BP
8GK9910-0KK32							
	**Masking frame** • Sheet steel • For recessed installation of stays • Height 1800 mm						
	Width in mm						
	250		**8GK9913-0KK10**		1	1 unit	1BP
	500		**8GK9913-0KK20**		1	1 unit	1BP
	750		**8GK9913-0KK30**		1	1 unit	1BP
	1000		**8GK9913-0KK40**		1	1 unit	1BP
	1250		**8GK9913-0KK50**		1	1 unit	1BP
8GK9913-0KK30							

For assembly kits, see page 19/30 onwards.

For accessories, see page 19/48 onwards.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

Surface-mounting distribution boards
Safety class 1
- Marshaling boxes for supporting the incoming/outgoing cables, option for terminal blocks available
- Large, foamed front cover with fixing screws
- Color RAL 7035 (light gray)

	Marshaling box depth in mm	Degree of protection	External dimensions in mm Height	Width	Panel width	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8GK1382-0KK12	210	IP43	350	300	□		**8GK1382-0KK12**		1	1 unit	1BP
				550	□□		**8GK1382-0KK22**		1	1 unit	1BP
				800	□□□		**8GK1382-0KK32**		1	1 unit	1BP
				1050	□□□□		**8GK1382-0KK42**		1	1 unit	1BP
				1300	□□□□□		**8GK1382-0KK52**		1	1 unit	1BP
 8GK1383-0KK13	250	IP55	350	300	□		**8GK1383-0KK13**		1	1 unit	1BP
				550	□□		**8GK1383-0KK23**		1	1 unit	1BP
				800	□□□		**8GK1383-0KK33**		1	1 unit	1BP
				1050	□□□□		**8GK1383-0KK43**		1	1 unit	1BP
				1300	□□□□□		**8GK1383-0KK53**		1	1 unit	1BP
 8GK1383-0KK14	320	IP55	350	300	□		**8GK1383-0KK14**		1	1 unit	1BP
				550	□□		**8GK1383-0KK24**		1	1 unit	1BP
				800	□□□		**8GK1383-0KK34**		1	1 unit	1BP
				1050	□□□□		**8GK1383-0KK44**		1	1 unit	1BP
				1300	□□□□□		**8GK1383-0KK54**		1	1 unit	1BP

Note

Flanges and 8GK9920-0KK31 connecting kit must be ordered separately, see accessories from page 19/48 onwards.

Accessories

 8GK4855-2KK02	**Longitudinal stays, for marshaling boxes** • Stays are available for mounting in the marshaling boxes • Height 300 mm, depth 210 mm / 250 mm / 320 mm • 1 set = 2 stays	**8GK4855-2KK02**	1	1 set	1BP

Replacement door for cabinets
Height 1950 mm

	Width mm	Door version	Door width mm					
 8GK9513-8KK10	300	Complete	300	**8GK9513-8KK10**	1	1 unit	1BP
	550	Complete	550	**8GK9513-8KK20**	1	1 unit	1BP
	800/1050	Left	525	**8GK9513-8KK30**	1	1 unit	1BP
	800	Right	275	**8GK9513-8KK40**	1	1 unit	1BP
	1050/1300	Right	525	**8GK9513-8KK50**	1	1 unit	1BP
	1300	Left	775	**8GK9513-8KK60**	1	1 unit	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Introduction

Overview



System

The system comprises unequipped distribution boards as flat pack for surface-mounting distribution boards (delivery in individual parts for self-assembly), unequipped distribution boards welded and riveted for surface-mounting and flush-mounting distribution boards, cabinet-height quick-assembly kits for ultra fast equipping and wiring, assembly kits as well as an extensive range of accessories.

Enclosure

- Material: electrogalvanized and powder-coated sheet steel
- Sheet thickness, degree of protection IP43: body 0.75 mm, door 1 mm
- Sheet thickness, degree of protection IP55: body 0.75 mm, door 1 mm
- Color: RAL 9016 (traffic white). Further RAL colors are available on request. For special colors, see page 19/7.

Quick-assembly kits and assembly kits

The assembly kits are made of sendzimir-galvanized sheet steel and are equipped with molded-plastic covers for a wide range of equipping options, e.g. with switching devices and modular installation devices.

The largest controls that can be installed in the ALPHA 400 DIN technology distribution boards are the ALPHA controls up to a rated current of 400 A.

Benefits

- Plan and configure quickly, simply and conveniently with the software SIMARIS configuration.
- Types of delivery:
  - Flat pack (assembly kit for self-assembly)
  - Unequipped distribution board, welded and riveted
  - The cabinet-high quick-assembly kits can be mounted directly onto the platform (rear panel)
  - Additional mounting stays are required for mounting the assembly kits! 2 longitudinal stays per panel width must be ordered separately for the assembly kits.
- Easy planning thanks to modular design
- Ample wiring space behind the standard mounting rail
- Comprehensive range of cabinet-high and frequently used quick-assembly kits and standard assembly kits for individual and project-related assembly
- Easy assembly thanks to keyhole-fastened components and modules with quick-acting locks
- Fast mounting times thanks to quick-assembly kits
- System concept according to DIN, EN and VDE standards
- Solid sheet-steel enclosure
- Degree of protection: surface-mounting version: IP43 with door, IP55 with door; flush-mounting version: IP31 with door and integrated masking frame
- Safety class 1 (protective conductor connection) or safety class 2 (total insulation)
- High-quality surface finish: distribution boards made of electrogalvanized and powder-coated sheet steel, system components made of sendzimir-galvanized sheet steel, galvanized and transparently chromated small components and screws
- Doors can be hinged on the right or left
- Door opening angle of 180°
- Replaceable locking systems (accessories)
- Front cover with sealable 90° quick-acting locks
- Environmentally-friendly, recyclable plastics.

Application

The ALPHA 400 DIN technology distribution boards are used for all applications for which the ALPHA 160 DIN technology distribution boards supplement the distribution board system with a depth of 210 mm.

The ALPHA 400 DIN technology distribution board range comprises wall-mounted distribution boards with up to 9 modular installation devices, each with 12 MW per mounting width (250 mm). The standard mounting rail tier spacing is 125 mm or 150 mm. A total of 5 cabinet mounting widths are available, each with an internal dimension of 250 mm.

The cabinets can be supplied in safety class 1 (protective conductor connection) or safety class 2 (total insulation). The standard degree of protection for surface-mounting distribution boards is IP43 and IP55. The standard degree of protection for flush-mounting distribution boards is IP31. The rated current is 400 A.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Overvoltage category	III
Rated impulse withstand voltage U_{imp} in kV	6
Clearance and creepage distances	EN 60664-1
Rated insulation voltage U_i in V	690
Rated operational voltage U_e in V AC/DC	690
Rated voltage U_n (40 Hz to 60 Hz AC) in V	690 for built-in devices
Rated current in A	Up to 400
Rated peak withstand current I_{pk} in kA	Up to 76 (3-pole)[2]
Rated short-time current I_{cw} in kA	34, conduction interval of 1 s
Protective measures	Safety class 1 (protective conductor connection) Safety class 2 (total insulation)
Number of conductors in the busbar run	4/5
Degree of protection acc. to EN 60529	Surface mounting: IP43 with door, IP55 with door Flush mounting: IP31 with door and integrated masking frame
Standard mounting rail tier spacing per standard mounting rail tier in mm	125/150
Modular width (MW)	18 mm, 12 MW + 1 mountable MW
Pollution degree	3
Ambient temperature in °C	35 (24-h mean value)
Relative air humidity in %	50 at 40 °C
Test specifications	EN 61439-1/-2/-3 (VDE 0660-600-1/-2/-3)
Enclosure	Sheet steel
Mounting dimensions	DIN 43870
Surface	Electrogalvanized and powder-coated
Color • Enclosure[1] • Covers	 RAL 9016 (traffic white) RAL 7035 (light gray)
Lock	Rotary handle – can be replaced by other locking systems if required
Packing material	Shock-proof, environmentally-friendly

[1] Further RAL colors are available on request. For special colors, see page 19/7.

[2] Busbar support spacing: 250 mm, Cu busbars 30 mm × 10 mm.

Cabinet dimensions

Surface-mounting distribution boards (external dimensions)		**Flush-mounting distribution boards with integrated masking frame (external dimensions)**		**Recess dimensions for flush-mounting distribution boards**	
Depth 210 mm		**Depth 210 mm**		**Depth 215 mm**	
Height	**Width**	**Height**	**Width**	**Height**	**Width**
mm	mm	mm	mm	mm	mm
800	550 800	858	608 858	860	610 860
950	550 800	1008	608 858	1010	610 860
1250	550 800	1308	608 858	1310	610 860
1400	550 800	1458	608 858	1460	610 860

All dimensions in mm.

- Height (internal/external dimensions): 600/650, 750/800, 900/950, 1050/1100, 1200/1250, 1350/1400
- Width (internal/external dimensions): 250/300, 500/550, 750/800, 1000/1050, 1250/1300
- Depth (external dimension): 210

Assembly kits in panel-size grid dimensions height × width: 150 × 250.

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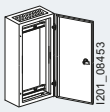
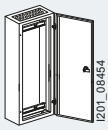
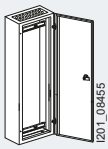
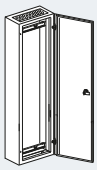
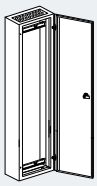
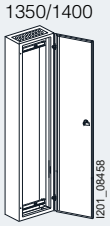
8GK1 surface-mounting distribution boards, IP43, flat pack

Overview

- Types of delivery:
  - **Flat pack** (assembly kit for self-assembly)
  - Unequipped distribution board
  - The cabinet-high quick-assembly kits can be mounted directly onto the platform (rear panel)
  - Additional mounting stays are required for mounting the assembly kits! 2 longitudinal stays per panel width must be ordered separately for the assembly kits.
- Cabinet depth 210 mm
- Degree of protection IP43
- Safety class 1 (protective conductor connection) or safety class 2 (total insulation)
- Color RAL 9016 (traffic white)
- For special colors, see page 19/7
- Unassembled enclosure with unassembled enclosed door and rotary handle, which can be replaced by other locking systems. Distribution boards with a width of 750 mm/800 mm or more will be supplied with a double door
- Flanges: one 1-component flange at the bottom and one 2-component flange at the top per panel width

Selection and ordering data

Internal/external dimensions		Panel width	SD	Surface-mounting distribution boards, IP43									
Height	Width			**Safety class 1** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	**Safety class 2** Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm		d						d					
600/650	250/300			**8GK1102-2KK12**		1	1 unit			**8GK1112-2KK12**		1	1 unit	
	500/550			**8GK1102-2KK22**		1	1 unit			**8GK1112-2KK22**		1	1 unit	
	750/800			**8GK1102-2KK32**		1	1 unit			**8GK1112-2KK32**		1	1 unit	
	1000/1050			**8GK1102-2KK42**		1	1 unit			**8GK1112-2KK42**		1	1 unit	
750/800	250/300			**8GK1102-3KK12**		1	1 unit			**8GK1112-3KK12**		1	1 unit	
	500/550			**8GK1102-3KK22**		1	1 unit			**8GK1112-3KK22**		1	1 unit	
	750/800			**8GK1102-3KK32**		1	1 unit			**8GK1112-3KK32**		1	1 unit	
	1000/1050			**8GK1102-3KK42**		1	1 unit			**8GK1112-3KK42**		1	1 unit	
900/950	250/300			**8GK1102-4KK12**		1	1 unit			**8GK1112-4KK12**		1	1 unit	
	500/550			**8GK1102-4KK22**		1	1 unit			**8GK1112-4KK22**		1	1 unit	
	750/800			**8GK1102-4KK32**		1	1 unit			**8GK1112-4KK32**		1	1 unit	
	1000/1050			**8GK1102-4KK42**		1	1 unit			**8GK1112-4KK42**		1	1 unit	
	1250/1300			**8GK1102-4KK52**		1	1 unit			**8GK1112-4KK52**		1	1 unit	
1050/1100	250/300			**8GK1102-5KK12**		1	1 unit			**8GK1112-5KK12**		1	1 unit	
	500/550			**8GK1102-5KK22**		1	1 unit			**8GK1112-5KK22**		1	1 unit	
	750/800			**8GK1102-5KK32**		1	1 unit			**8GK1112-5KK32**		1	1 unit	
	1000/1050			**8GK1102-5KK42**		1	1 unit			**8GK1112-5KK42**		1	1 unit	
	1250/1300			**8GK1102-5KK52**		1	1 unit			**8GK1112-5KK52**		1	1 unit	
1200/1250	250/300			**8GK1102-6KK12**		1	1 unit			**8GK1112-6KK12**		1	1 unit	
	500/550			**8GK1102-6KK22**		1	1 unit			**8GK1112-6KK22**		1	1 unit	
	750/800			**8GK1102-6KK32**		1	1 unit			**8GK1112-6KK32**		1	1 unit	
	1000/1050			**8GK1102-6KK42**		1	1 unit			**8GK1112-6KK42**		1	1 unit	
	1250/1300			**8GK1102-6KK52**		1	1 unit			**8GK1112-6KK52**		1	1 unit	
1350/1400	250/300			**8GK1102-7KK12**		1	1 unit			**8GK1112-7KK12**		1	1 unit	
	500/550			**8GK1102-7KK22**		1	1 unit			**8GK1112-7KK22**		1	1 unit	
	750/800			**8GK1102-7KK32**		1	1 unit			**8GK1112-7KK32**		1	1 unit	
	1000/1050			**8GK1102-7KK42**		1	1 unit			**8GK1112-7KK42**		1	1 unit	
	1250/1300			**8GK1102-7KK52**		1	1 unit			**8GK1112-7KK52**		1	1 unit	

For quick-assembly kits and assembly kits, see page 19/43.
For accessories, see page 19/48.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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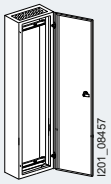
8GK1 surface-mounting distribution boards, IP43

Overview

- Cabinet depth 210 mm
- Degree of protection IP43
- Safety class 1 (protective conductor connection) or safety class 2 (total insulation)
- Color RAL 9016 (traffic white)
- For special colors, see page 19/7
- Enclosure welded and riveted with door and rotary handle, which can be replaced by other locking systems. Distribution boards with a width of 750 mm/800 mm or more will be supplied with a double door
- Flanges: per panel width, one 2-component flange each at the top and bottom

Selection and ordering data

Internal/external dimensions		Panel width		Surface-mounting distribution boards, IP43, safety class 1					
Height	Width		SD	Standard color, RAL 7035		PU (UNIT, SET, M)	PS	PG	Textured paint, RAL 7035
				Article No. www.siemens.com/product?Article No.	Price per PU				Article No. www.siemens.com/product?Article No.
mm	mm		d						Article No. plus option **-Z-C12** / Special color surcharge
600/650	250/300			**8GK1122-2KA12**		1	1 unit		**8GK1122-2KA12-Z-C12** ✓
	500/550			**8GK1122-2KA22**		1	1 unit		**8GK1122-2KA22-Z-C12** Ordering example, for further colors, see page 19/7
	750/800			**8GK1122-2KA32**		1	1 unit		**8GK1122-2KA32-Z-C12**
	1000/1050			**8GK1122-2KA42**		1	1 unit		**8GK1122-2KA42-Z-C12**
750/800	250/300			**8GK1122-3KA12**		1	1 unit		**8GK1122-3KA12-Z-C12** ✓
	500/550			**8GK1122-3KA22**		1	1 unit		**8GK1122-3KA22-Z-C12** Ordering example, for further colors, see page 19/7
	750/800			**8GK1122-3KA32**		1	1 unit		**8GK1122-3KA32-Z-C12**
	1000/1050			**8GK1122-3KA42**		1	1 unit		**8GK1122-3KA42-Z-C12**
900/950	250/300			**8GK1122-4KA12**		1	1 unit		**8GK1122-4KA12-Z-C12** ✓
	500/550			**8GK1122-4KA22**		1	1 unit		**8GK1122-4KA22-Z-C12** Ordering example, for further colors, see page 19/7
	750/800			**8GK1122-4KA32**		1	1 unit		**8GK1122-4KA32-Z-C12**
	1000/1050			**8GK1122-4KA42**		1	1 unit		**8GK1122-4KA42-Z-C12**
	1250/1300			**8GK1122-4KA52**		1	1 unit		**8GK1122-4KA52-Z-C12**
1050/1100	250/300			**8GK1122-5KA12**		1	1 unit		**8GK1122-5KA12-Z-C12** ✓
	500/550			**8GK1122-5KA22**		1	1 unit		**8GK1122-5KA22-Z-C12** Ordering example, for further colors, see page 19/7
	750/800			**8GK1122-5KA32**		1	1 unit		**8GK1122-5KA32-Z-C12**
	1000/1050			**8GK1122-5KA42**		1	1 unit		**8GK1122-5KA42-Z-C12**
	1250/1300			**8GK1122-5KA52**		1	1 unit		**8GK1122-5KA52-Z-C12**
1200/1250	250/300			**8GK1122-6KA12**		1	1 unit		**8GK1122-6KA12-Z-C12** ✓
	500/550			**8GK1122-6KA22**		1	1 unit		**8GK1122-6KA22-Z-C12** Ordering example, for further colors, see page 19/7
	750/800			**8GK1122-6KA32**		1	1 unit		**8GK1122-6KA32-Z-C12**
	1000/1050			**8GK1122-6KA42**		1	1 unit		**8GK1122-6KA42-Z-C12**
	1250/1300			**8GK1122-6KA52**		1	1 unit		**8GK1122-6KA52-Z-C12**
1350/1400	250/300			**8GK1122-7KA12**		1	1 unit		**8GK1122-7KA12-Z-C12** ✓
	500/550			**8GK1122-7KA22**		1	1 unit		**8GK1122-7KA22-Z-C12** Ordering example, for further colors, see page 19/7
	750/800			**8GK1122-7KA32**		1	1 unit		**8GK1122-7KA32-Z-C12**
	1000/1050			**8GK1122-7KA42**		1	1 unit		**8GK1122-7KA42-Z-C12**
	1250/1300			**8GK1122-7KA52**		1	1 unit		**8GK1122-7KA52-Z-C12**

For quick-assembly kits and assembly kits, see page 19/43.
For accessories, see page 19/48.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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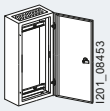
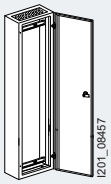
8GK1 surface-mounting distribution boards, IP43

Internal/external dimensions		Panel width	SD	Surface-mounting distribution boards, IP43, safety class 2					
Height	Width			**Standard color, RAL 9010**		PU (UNIT, SET, M)	PS	PG	**Textured paint, RAL 7035**
				Article No. www.siemens.com/product?Article No.	Price per PU				Article No. www.siemens.com/product?Article No.
mm	mm		d						Article No. plus option **-Z-C12**
600/650	250/300			**8GK1132-2KA12**		1	1 unit		**8GK1132-2KA12-Z-C12**
	500/550			**8GK1132-2KA22**		1	1 unit		**8GK1132-2KA22-Z-C12**
	750/800			**8GK1132-2KA32**		1	1 unit		**8GK1132-2KA32-Z-C12**
	1000/1050			**8GK1132-2KA42**		1	1 unit		**8GK1132-2KA42-Z-C12**
750/800	250/300			**8GK1132-3KA12**		1	1 unit		**8GK1132-3KA12-Z-C12**
	500/550			**8GK1132-3KA22**		1	1 unit		**8GK1132-3KA22-Z-C12**
	750/800			**8GK1132-3KA32**		1	1 unit		**8GK1132-3KA32-Z-C12**
	1000/1050			**8GK1132-3KA42**		1	1 unit		**8GK1132-3KA42-Z-C12**
900/950	250/300			**8GK1132-4KA12**		1	1 unit		**8GK1132-4KA12-Z-C12**
	500/550			**8GK1132-4KA22**		1	1 unit		**8GK1132-4KA22-Z-C12**
	750/800			**8GK1132-4KA32**		1	1 unit		**8GK1132-4KA32-Z-C12**
	1000/1050			**8GK1132-4KA42**		1	1 unit		**8GK1132-4KA42-Z-C12**
	1250/1300			**8GK1132-4KA52**		1	1 unit		**8GK1132-4KA52-Z-C12**
1050/1100	250/300			**8GK1132-5KA12**		1	1 unit		**8GK1132-5KA12-Z-C12**
	500/550			**8GK1132-5KA22**		1	1 unit		**8GK1132-5KA22-Z-C12**
	750/800			**8GK1132-5KA32**		1	1 unit		**8GK1132-5KA32-Z-C12**
	1000/1050			**8GK1132-5KA42**		1	1 unit		**8GK1132-5KA42-Z-C12**
	1250/1300			**8GK1132-5KA52**		1	1 unit		**8GK1132-5KA52-Z-C12**
1200/1250	250/300			**8GK1132-6KA12**		1	1 unit		**8GK1132-6KA12-Z-C12**
	500/550			**8GK1132-6KA22**		1	1 unit		**8GK1132-6KA22-Z-C12**
	750/800			**8GK1132-6KA32**		1	1 unit		**8GK1132-6KA32-Z-C12**
	1000/1050			**8GK1132-6KA42**		1	1 unit		**8GK1132-6KA42-Z-C12**
	1250/1300			**8GK1132-6KA52**		1	1 unit		**8GK1132-6KA52-Z-C12**
1350/1400	250/300			**8GK1132-7KA12**		1	1 unit		**8GK1132-7KA12-Z-C12**
	500/550			**8GK1132-7KA22**		1	1 unit		**8GK1132-7KA22-Z-C12**
	750/800			**8GK1132-7KA32**		1	1 unit		**8GK1132-7KA32-Z-C12**
	1000/1050			**8GK1132-7KA42**		1	1 unit		**8GK1132-7KA42-Z-C12**
	1250/1300			**8GK1132-7KA52**		1	1 unit		**8GK1132-7KA52-Z-C12**

Special color surcharge
✓ Ordering example, for further colors, see page 19/7

Minimum order quantity (PS) or a multiple thereof can be ordered.

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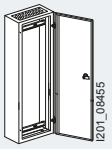
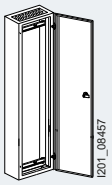
Overview

- Cabinet depth 210 mm
- Degree of protection IP55
- Safety class 1 (protective conductor connection) or safety class 2 (total insulation)
- Color RAL 9016 (traffic white)
- For special colors, see page 19/7
- Enclosure welded and riveted with door and rotary handle, which can be replaced by other locking systems. Distribution boards with a width of 750 mm/800 mm or more will be supplied with a double door
- Flanges: per panel width, one 2-component flange each at the top and bottom

Selection and ordering data

Internal/external dimensions		Panel width		Surface-mounting distribution boards, IP55, safety class 1					
Height	Width		SD	Standard color, RAL 9010		PU (UNIT, SET, M)	PS	PG	Textured paint, RAL 7035	
				Article No. www.siemens.com/product?Article No.	Price per PU				Article No. www.siemens.com/product?Article No.	
mm	mm		d						Article No. plus option **-Z-C12**	Special color surcharge
900/950	250/300	□		**8GK1123-4KA12**		1	1 unit		**8GK1123-4KA12-Z-C12**	✓
	500/550	□□		**8GK1123-4KA22**		1	1 unit		**8GK1123-4KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1123-4KA32**		1	1 unit		**8GK1123-4KA32-Z-C12**	
	1000/1050	□□□□		**8GK1123-4KA42**		1	1 unit		**8GK1123-4KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1123-4KA52**		1	1 unit		**8GK1133-4KA52-Z-C12**	
1050/1100	250/300	□		**8GK1123-5KA12**		1	1 unit		**8GK1123-5KA12-Z-C12**	✓
	500/550	□□		**8GK1123-5KA22**		1	1 unit		**8GK1123-5KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1123-5KA32**		1	1 unit		**8GK1123-5KA32-Z-C12**	
	1000/1050	□□□□		**8GK1123-5KA42**		1	1 unit		**8GK1123-5KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1123-5KA52**		1	1 unit		**8GK1123-5KA52-Z-C12**	
1200/1250	250/300	□		**8GK1123-6KA12**		1	1 unit		**8GK1123-6KA12-Z-C12**	✓
	500/550	□□		**8GK1123-6KA22**		1	1 unit		**8GK1123-6KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1123-6KA32**		1	1 unit		**8GK1123-6KA32-Z-C12**	
	1000/1050	□□□□		**8GK1123-6KA42**		1	1 unit		**8GK1123-6KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1123-6KA52**		1	1 unit		**8GK1123-6KA52-Z-C12**	
1350/1400	250/300	□		**8GK1123-7KA12**		1	1 unit		**8GK1123-7KA12-Z-C12**	✓
	500/550	□□		**8GK1123-7KA22**		1	1 unit		**8GK1123-7KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1123-7KA32**		1	1 unit		**8GK1123-7KA32-Z-C12**	
	1000/1050	□□□□		**8GK1123-7KA42**		1	1 unit		**8GK1123-7KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1123-7KA52**		1	1 unit		**8GK1123-7KA52-Z-C12**	

For quick-assembly kits and assembly kits, see page 19/43.
For accessories, see page 19/48.

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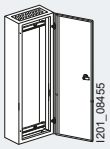
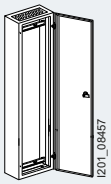
8GK1 surface-mounting distribution boards, IP55

Internal/external dimensions Height	Width	Panel width	SD	Surface-mounting distribution boards, IP55, safety class 2 Standard color, RAL 9010 Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	Textured paint, RAL 7035 Article No. www.siemens.com/product?Article No.	Special color surcharge
mm	mm		d						Article No. plus option **-Z-C12**	
900/950	250/300	□		**8GK1133-4KA12**		1	1 unit		**8GK1133-4KA12-Z-C12**	✓
	500/550	□□		**8GK1133-4KA22**		1	1 unit		**8GK1133-4KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1133-4KA32**		1	1 unit		**8GK1133-4KA32-Z-C12**	
	1000/1050	□□□□		**8GK1133-4KA42**		1	1 unit		**8GK1133-4KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1133-4KA52**		1	1 unit		**8GK1133-4KA52-Z-C12**	
1050/1100	250/300	□		**8GK1133-5KA12**		1	1 unit		**8GK1133-5KA12-Z-C12**	✓
	500/550	□□		**8GK1133-5KA22**		1	1 unit		**8GK1133-5KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1133-5KA32**		1	1 unit		**8GK1133-5KA32-Z-C12**	
	1000/1050	□□□□		**8GK1133-5KA42**		1	1 unit		**8GK1133-5KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1133-5KA52**		1	1 unit		**8GK1133-5KA52-Z-C12**	
1200/1250	250/300	□		**8GK1133-6KA12**		1	1 unit		**8GK1133-6KA12-Z-C12**	✓
	500/550	□□		**8GK1133-6KA22**		1	1 unit		**8GK1133-6KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1133-6KA32**		1	1 unit		**8GK1133-6KA32-Z-C12**	
	1000/1050	□□□□		**8GK1133-6KA42**		1	1 unit		**8GK1133-6KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1133-6KA52**		1	1 unit		**8GK1133-6KA52-Z-C12**	
1350/1400	250/300	□		**8GK1133-7KA12**		1	1 unit		**8GK1133-7KA12-Z-C12**	✓
	500/550	□□		**8GK1133-7KA22**		1	1 unit		**8GK1133-7KA22-Z-C12**	Ordering example, for further colors, see page 19/7
	750/800	□□□		**8GK1133-7KA32**		1	1 unit		**8GK1133-7KA32-Z-C12**	
	1000/1050	□□□□		**8GK1133-7KA42**		1	1 unit		**8GK1133-7KA42-Z-C12**	
	1250/1300	□□□□□		**8GK1133-7KA52**		1	1 unit		**8GK1133-7KA52-Z-C12**	

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GK4853-8KK02	**Longitudinal stays** see page 19/60.						

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8GK1 surface-mounting distribution boards, IP55


8GK9510-6KK10

Version			SD d	Article No. www.siemens.com/product?Article No.	Price per PE	PU (UNIT, SET, M)	PS	PG
Replacement door for cabinets								
Height 950 mm								
Cubicle width mm	Door version	Door width mm						
300	Complete	300		**8GK9510-6KK10**		1	1 unit	
550	Complete	550		**8GK9510-6KK20**		1	1 unit	
800/1050	Left	525		**8GK9510-6KK31**		1	1 unit	
1300	Left	775		**8GK9510-6KK51**		1	1 unit	
800	Right	275		**8GK9510-6KK42**		1	1 unit	
1050/1300	Right	525		**8GK9510-6KK52**		1	1 unit	
Height 1100 mm								
Cubicle width mm	Door version	Door width mm						
300	Complete	300		**8GK9510-7KK10**		1	1 unit	
550	Complete	550		**8GK9510-7KK20**		1	1 unit	
800/1050	Left	525		**8GK9510-7KK31**		1	1 unit	
1300	Left	775		**8GK9510-7KK41**		1	1 unit	
800	Right	275		**8GK9510-7KK32**		1	1 unit	
1050/1300	Right	525		**8GK9510-7KK42**		1	1 unit	
Height 1250 mm								
Cubicle width mm	Door version	Door width mm						
300	Complete	300		**8GK9510-8KK10**		1	1 unit	
550	Complete	550		**8GK9510-8KK20**		1	1 unit	
800/1050	Left	525		**8GK9510-8KK31**		1	1 unit	
1300	Left	775		**8GK9510-8KK41**		1	1 unit	
800	Right	275		**8GK9510-8KK32**		1	1 unit	
1050/1300	Right	525		**8GK9510-8KK52**		1	1 unit	
Height 1400 mm								
Cubicle width mm	Door version	Door width mm						
300	Complete	300		**8GK9510-8KK16**		1	1 unit	
550	Complete	550		**8GK9510-8KK26**		1	1 unit	
800/1050	Left	525		**8GK9510-8KK37**		1	1 unit	
1300	Left	775		**8GK9510-8KK47**		1	1 unit	
800	Right	275		**8GK9510-8KK38**		1	1 unit	
1050/1300	Right	525		**8GK9510-8KK58**		1	1 unit	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8GK1 surface-mounting distribution boards, IP55

Accessories


8GK4853-8KK02

Longitudinal stays
- In order to mount the assembly kits in unequipped distribution boards, 2 longitudinal stays are required for each assembly kit width
- Depth 210/250/320/400 mm
- 1 set = 2 stays

Version		SD	Article No. www.siemens.com/product?Article No.	Price per PE	PU (UNIT, SET, M)	PS	PG
Cubicle depth mm	Length mm	d					
210	300		**8GK4855-2KK02**		1	1 set	
	450		**8GK4851-3KK00**		1	1 set	
	600		**8GK4851-4KK00**		1	1 set	
	750		**8GK4851-5KK00**		1	1 set	
	900		**8GK4851-6KK00**		1	1 set	
	1050		**8GK4851-7KK00**		1	1 set	
	1200		**8GK4851-8KK00**		1	1 set	
	1350		**8GK4852-8KK00**		1	1 set	
	1800		**8GK4853-8KK00**		1	1 set	
250/320/400	1800		**8GK4853-8KK02**		1	1 set	


8GK9910-0KK32

Connecting kits for longitudinal stays
- Connecting plate for stays
- 1 set = 4 units

8GK9910-0KK32 | 1 | 1 unit

Minimum order quantity (PS) or a multiple thereof can be ordered.

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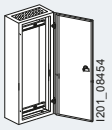
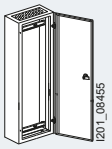
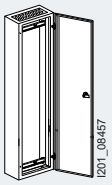
Overview

- Cabinet depth 210 mm
- Degree of protection: IP31 (flush-mounting design comes with an integrated masking frame)
- Safety class 1 (protective conductor connection) or safety class 2 (total insulation)
- Color RAL 9016 (traffic white)
- For special colors, see page 19/7
- Enclosure with door and rotary handle, which can be replaced by other locking systems. Distribution boards with a width of 750 mm/800 mm or more will be supplied with a double door
- Flanges:
  - Safety class 1 is delivered without flanges.

Note: Wall anchors are included in delivery with flush-mounting distribution boards.

Selection and ordering data

Internal/external dimensions		Panel width	SD	Flush-mounting distribution boards, IP31			
Height	Width			Safety class 1			
				Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
mm	mm		d					
750/800	500/550	□□		**8GK1121-3KK22**		1	1 unit	
	750/800	□□□		**8GK1121-3KK32**		1	1 unit	
900/950	500/550	□□		**8GK1121-4KK22**		1	1 unit	
	750/800	□□□		**8GK1121-4KK32**		1	1 unit	
1200/1250	500/550	□□		**8GK1121-6KK22**		1	1 unit	
	750/800	□□□		**8GK1121-6KK32**		1	1 unit	
1350/1400	500/550	□□		**8GK1121-7KK22**		1	1 unit	
	750/800	□□□		**8GK1121-7KK32**		1	1 unit	

For quick-assembly kits and assembly kits, see page 19/43.
For accessories, see page 19/48.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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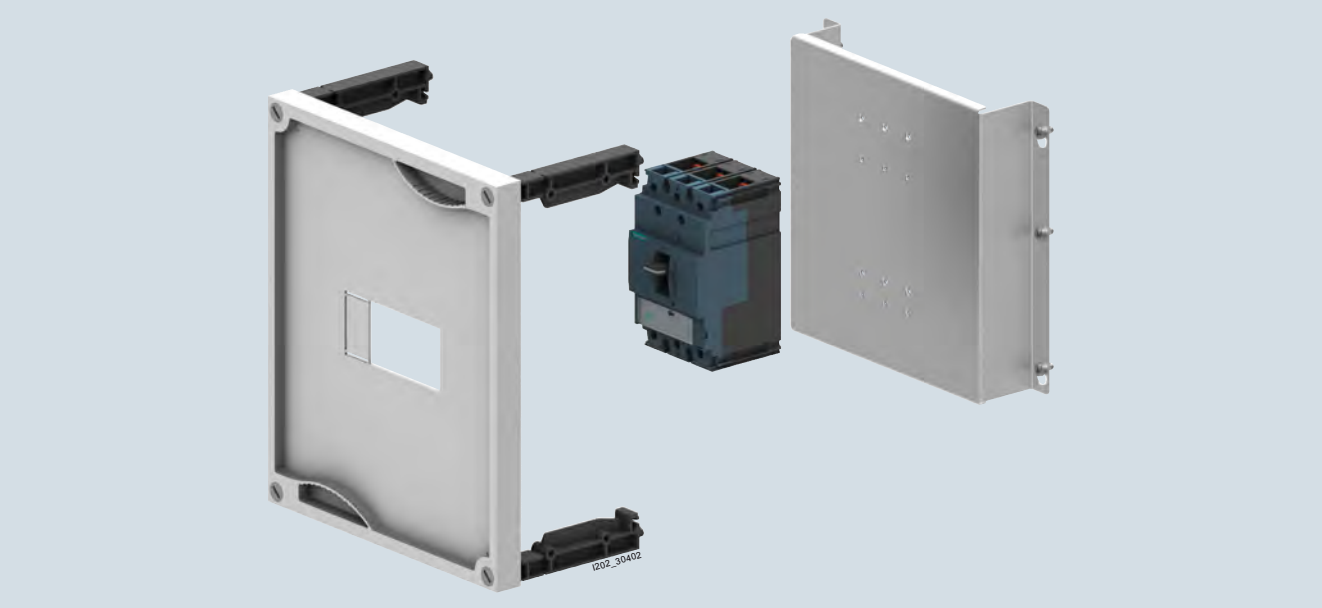
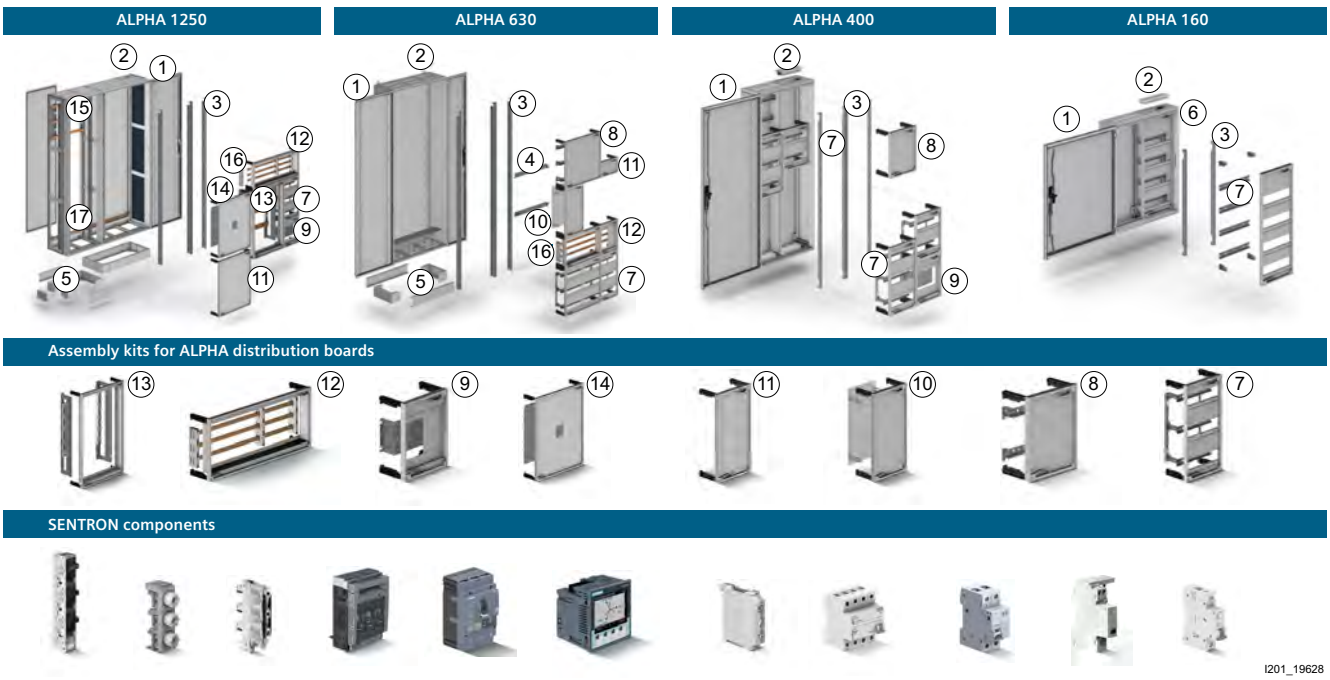
General

Overview

The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports.

Note:
For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).





1 Enclosure with door
2 Flange
3 Stays
4 Crossbeam
5 Base
6 Quick-assembly kit
7 Assembly kit for modular installation devices
8 Assembly kit for terminal blocks
9 Assembly kit for fuse switch disconnectors
10 Assembly kit for mounting plate
11 Front cover
12 Assembly kit for busbar-adaptable units
13 Assembly kit for in-line fuse switch disconnectors
14 Assembly kit for molded case circuit breakers
15 Main busbar system
16 60 mm busbar system
17 PEN busbar

Minimum order quantity (PS) or a multiple thereof can be ordered.

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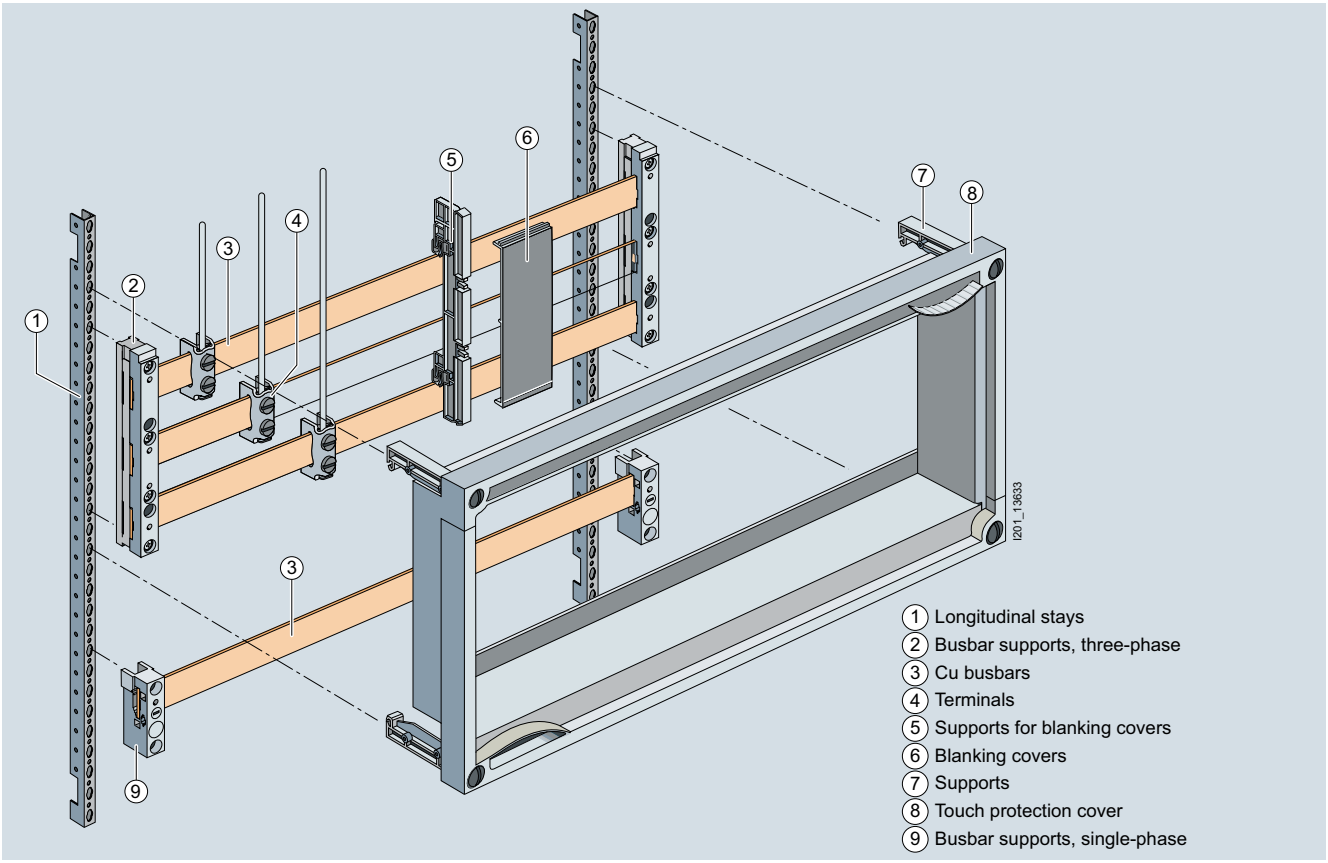
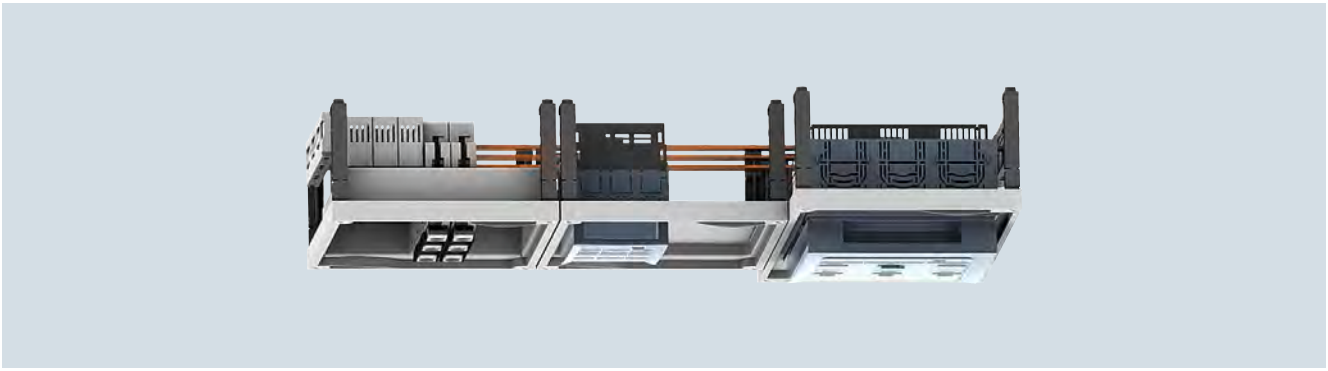


Distribution board components of the 8GK4 assembly kits for the SR60 busbar system, 60 mm



The easy-to-install busbar system enables the ALPHA distribution boards to be equipped economically. A host of busbar-adaptable connection, switching and protective devices of various different sizes can be mounted easily and quickly on the standard copper bar. The touch protection is implemented automatically by device-specific front covers.

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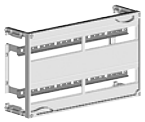
Assembly kits for unequipped distribution boards

	Version			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
	Assembly kits for modular installation devices • Tier spacing of 150 mm, without N/PE bar • Assembly kits for individual and project-related assembly, comprising: device racks, front cover including supports, screws and mounting accessories • Panel-size grid dimensions H × W (mm): 150 × 250 • The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports								
	External dimensions in mm Height	Width	Tiers/MW						
 8GK4351-1KK12	150	250 500 750	1/12 1/24 1/36		**8GK4351-1KK12** **8GK4351-1KK22** **8GK4351-1KK32**		1 1 1	1 unit 1 unit 1 unit	1BP 1BP 1BP
 8GK4351-2KK12	300	250 500 750	2/24 2/48 2/72		**8GK4351-2KK12** **8GK4351-2KK22** **8GK4351-2KK32**		1 1 1	1 unit 1 unit 1 unit	1BP 1BP 1BP
 8GK4351-3KK12	450	250 500 750	3/36 3/72 3/108		**8GK4351-3KK12** **8GK4351-3KK22** **8GK4351-3KK32**		1 1 1	1 unit 1 unit 1 unit	1BP 1BP 1BP
 8GK4351-4KK12	600	250 500 750	4/48 4/96 4/144		**8GK4351-4KK12** **8GK4351-4KK22** **8GK4351-4KK32**		1 1 1	1 unit 1 unit 1 unit	1BP 1BP 1BP
	Note								
	• For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60). • The assembly kits with a width of 250 mm are equipped with 7.5 mm standard mounting rails. • The assembly kits with a width of 500 mm/750 mm are equipped with 15 mm standard mounting rails. • For accessories, see page 19/48 onwards.								

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Assembly kits for unequipped distribution boards

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GK4401-3KK32	**Assembly kits for horizontal terminal blocks** • Terminal blocks with graded insulation design • With closed front cover • Assembly kits for individual and project-related assembly, comprising: device racks, front cover including supports, screws and mounting accessories • Panel-size grid dimensions H × W (mm): 150 × 250 • The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports						
	External dimensions in mm Height / Width						
	150 / 250		**8GK4401-1KK12**		1	1 unit	1BP
	300 / 250		**8GK4401-2KK12**		1	1 unit	1BP
	300 / 500		**8GK4401-2KK22**		1	1 unit	1BP
	300 / 750		**8GK4401-2KK32**		1	1 unit	1BP
	450 / 250		**8GK4401-3KK12**		1	1 unit	1BP
	450 / 500		**8GK4401-3KK22**		1	1 unit	1BP
	450 / 750		**8GK4401-3KK32**		1	1 unit	1BP
	Note • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60). • For accessories, see page 19/48 onwards.						
 8GK4402-4KK12	**Assembly kits for vertical terminal blocks** • Terminal blocks with insulation design • With closed front cover • Assembly kits for individual and project-related assembly, comprising: device racks, front cover including supports, screws and mounting accessories • Panel-size grid dimensions H × W (mm): 150 × 250 • The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports						
	External dimensions in mm Height / Width						
	300 / 250		**8GK4402-2KK12**		1	1 unit	1BP
	300 / 500		**8GK4402-2KK22**		1	1 unit	1BP
	300 / 750		**8GK4402-2KK32**		1	1 unit	1BP
	450 / 250		**8GK4402-3KK12**		1	1 unit	1BP
	450 / 500		**8GK4402-3KK22**		1	1 unit	1BP
	450 / 750		**8GK4402-3KK32**		1	1 unit	1BP
	600 / 250		**8GK4402-4KK12**		1	1 unit	1BP
	600 / 500		**8GK4402-4KK22**		1	1 unit	1BP
	600 / 750		**8GK4402-4KK32**		1	1 unit	1BP
	Note • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60). • For accessories, see page 19/48 onwards.						
 8GK4500-2KK20	**Assembly kit front covers, for measuring devices, cutout dimensions 92 mm x 92 mm**		**8GK4500-2KK20**		1	1 unit	1BP

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Assembly kits for unequipped distribution boards



8GK4501-4KK12

Assembly kits for unequipped panels
- Gray
- Assembly kits for individual and project-related assembly, comprising: front cover including supports, screws and mounting accessories
- Panel-size grid dimensions H × W (mm): 150 × 250
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports

External dimensions in mm Height	Width	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
75	250			**8GK4501-0KK12**		1	1 unit	1BP
	500			**8GK4501-0KK22**		1	1 unit	1BP
150	250			**8GK4501-1KK12**		1	1 unit	1BP
	500			**8GK4501-1KK22**		1	1 unit	1BP
	750			**8GK4501-1KK32**		1	1 unit	1BP
300	250			**8GK4501-2KK12**		1	1 unit	1BP
	500			**8GK4501-2KK22**		1	1 unit	1BP
	750			**8GK4501-2KK32**		1	1 unit	1BP
450	250			**8GK4501-3KK12**		1	1 unit	1BP
	500			**8GK4501-3KK22**		1	1 unit	1BP
	750			**8GK4501-3KK32**		1	1 unit	1BP
600	250			**8GK4501-4KK12**		1	1 unit	1BP
	500			**8GK4501-4KK22**		1	1 unit	1BP
	750			**8GK4501-4KK32**		1	1 unit	1BP
750	250			**8GK4501-5KK12**		1	1 unit	1BP
	500			**8GK4501-5KK22**		1	1 unit	1BP
	750			**8GK4501-5KK32**		1	1 unit	1BP

Note

For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).



8GK4501-3KK23

Assembly kits for unequipped panels with deep-drawn cover, 40 mm
- Assembly kits for individual and project-related assembly, comprising: front cover including supports, screws and mounting accessories
- Panel-size grid dimensions H × W (mm): 150 × 250
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports

External dimensions in mm Height	Width	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
300	250			**8GK4501-2KK13**		1	1 unit	1BP
	500			**8GK4501-2KK23**		1	1 unit	1BP
	750			**8GK4501-2KK33**		1	1 unit	1BP
450	250			**8GK4501-3KK13**		1	1 unit	1BP
	500			**8GK4501-3KK23**		1	1 unit	1BP
	750			**8GK4501-3KK33**		1	1 unit	1BP

Note

- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).
- For mounting size 000 fuse switch disconnectors you also need the cover 8GK9912-0KK00 (see page 19/35).
- For accessories, see page 19/48 onwards.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Assembly kits for unequipped distribution boards



8GK4451-4KK12

Assembly kits with mounting plates
- With closed front cover
- Assembly kits for individual and project-related assembly, comprising: mounting plate, front cover including supports, mounting brackets (depth-adjustable), screws and mounting accessories
- Panel-size grid dimensions H × W (mm): 150 × 250
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports

External dimensions (mm): Assembly kit Height	Width	Mounting plate dimensions in mm Height	Width	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
300	250	245	207.5	**8GK4451-2KK12**		1	1 unit	1BP
	500		457.5	**8GK4451-2KK22**		1	1 unit	1BP
	750		707.5	**8GK4451-2KK32**		1	1 unit	1BP
450	250	395	207.5	**8GK4451-3KK12**		1	1 unit	1BP
	500		457.5	**8GK4451-3KK22**		1	1 unit	1BP
	750		707.5	**8GK4451-3KK32**		1	1 unit	1BP
600	250	545	207.5	**8GK4451-4KK12**		1	1 unit	1BP
	500		457.5	**8GK4451-4KK22**		1	1 unit	1BP
	750		707.5	**8GK4451-4KK32**		1	1 unit	1BP

Note
- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60)
- If the fitted mounting plate extends over several panel widths, it is not possible to place a longitudinal stay in the middle.



8GK9533-0KK10

Cabinet-high mounting plates
- With fixing screws
- Sendzimir-galvanized sheet steel
- For mounting on longitudinal stays or the rear panel
- No covers available

Internal dimensions of cabinet in mm Height	Width	Mounting plate dimensions in mm Height	Width	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
1800	250	1680	242	**8GK9533-0KK10**		1	1 unit	1BP
	500		492	**8GK9533-0KK20**		1	1 unit	1BP
	750		742	**8GK9533-0KK30**		1	1 unit	1BP
	1000		992	**8GK9533-0KK40**		1	1 unit	1BP
	1250		1242	**8GK9533-0KK50**		1	1 unit	1BP

Note

For mounting on the rear panel you always need a mounting plate in the cabinet width.



8GK4550-2KK22

Assembly kits for 3NP1 fuse switch disconnectors, for mounting on support plates
- Assembly kits for individual and project-related assembly, comprising: support plate, front cover including supports, molded-plastic masking frame, screws and mounting accessories
- Panel-size grid dimensions H × W (mm): 150 × 250
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports

Number of assembly kits of size	Fuse switch disconnectors	Height in mm	Width in mm	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
2 × 00/000	2 × 3NP1123... / 3NP1 133...	300	250	**8GK4550-2KK12**		1	1 unit	1BP
4 × 00/000	4 × 3NP1123... / 3NP1 133...		500	**8GK4550-2KK22**		1	1 unit	1BP
1 × 1	1 × 3NP1143…	450	250	**8GK4550-3KK12**		1	1 unit	1BP
2 × 1	2 × 3NP1143…		500	**8GK4550-3KK22**		1	1 unit	1BP
1 × 2	1 × 3NP1153…	450	250	**8GK4551-3KK12**		1	1 unit	1BP
1 × 3	1 × 3NP1163…		500	**8GK4551-3KK22**		1	1 unit	1BP

Accessories

	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
• 3NP1123... cover, size 000 (required only for size 000 fuse switch disconnectors)	**8GK9912-0KK00**		1	1 unit	1BP
• Busbar supports					
- 40 mm, 5-pole	**8GK9650-0KK00**		1	1 unit	1BP
- 60 mm, 3-pole	**8GK9711-0KK03**		1	1 unit	1BP

Note
- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).
- For mounting size 000 fuse switch disconnectors you also need the cover 8GK9912-0KK00 (see page 19/35).
- For accessories, see page 19/48 onwards.

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Assembly kits for unequipped distribution boards


8GK4650-2KK12

Assembly kits for 3NP1 fuse switch disconnectors, for mounting on busbars
- Assembly kits for individual and project-related assembly, comprising: front cover including supports, molded-plastic masking frame, screws and mounting accessories
- Panel-size grid dimensions H × W (mm): 150 × 250
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports

Note

The Cu busbar and the busbar supports must be ordered separately (see page 19/48).

Number of assembly kits of size	Fuse switch disconnectors	Height in mm	Width in mm	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
2 × 00/000	2 × 3NP1123 ... / 3NP1133...	300	250		**8GK4650-2KK12**		1	1 unit	1BP
4 × 00/000	4 × 3NP1123 ... / 3NP1133...		500		**8GK4650-2KK22**		1	1 unit	1BP
2 × 00/000	2 × 3NP1123 ... / 3NP1133...	450	250		**8GK4650-3KK12**		1	1 unit	1BP
4 × 00/000	4 × 3NP1123 ... / 3NP1133...		500		**8GK4650-3KK22**		1	1 unit	1BP
1 × 1	1 × 3NP1143…	450	250		**8GK4651-3KK12**		1	1 unit	1BP
2 × 1	2 × 3NP1143…		500		**8GK4651-3KK22**		1	1 unit	1BP
1 × 2	1 × 3NP1153…		250		**8GK4652-3KK12**		1	1 unit	1BP

Accessories

• 3NP1123 ... cover, size 000 (required only for size 000 fuse switch disconnectors)			**8GK9912-0KK00**		1 unit	1BP
• Busbar supports						
- 40 mm, 5-pole			**8GK9650-0KK00**		1 unit	1BP
- 60 mm, 3-pole			**8GK9711-0KK03**		1 unit	1BP

Note

- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).
- For mounting size 000 fuse switch disconnectors you also need the cover 8GK9912-0KK00 (see page 19/35).
- For accessories, see page 19/48 onwards.

Assembly kits for 3VL molded case circuit breakers and 3VT switch disconnectors
- Assembly kits for individual and project-related assembly, comprising: support plate, front cover including supports, screws and mounting accessories
- Panel-size grid dimensions H × W (mm): 150 × 250
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports


8GK4704-4KK13


8GK4721-3KK10


8GK4722-3KK10

Versions	External dimensions in mm Height	Width	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
• 3 and 4-pole, 3VL molded case circuit breakers							
- 1 × 3VL160/3VL160X	300	250	**8GK4701-2KK12**		1	1 unit	1BP
- 1 × 3VL160X, 1 × 3VL160, 1 × 3VL250	450		**8GK4701-3KK12**		1	1 unit	1BP
- 1 × 3VL400	600		**8GK4702-4KK12**		1	1 unit	1BP
• 3-pole, 3VL molded case circuit breakers							
- 1 × 3VL630	600	250	**8GK4703-4KK13**		1	1 unit	1BP
- 1 × 3VL800			**8GK4704-4KK15**		1	1 unit	1BP
• 3/4-pole, 3VL molded case circuit breakers							
- 1 × 3VL630	600	500	**8GK4704-4KK13**		1	1 unit	1BP
- 1 × 3VL800			**8GK4704-4KK25**		1	1 unit	1BP
- 1 × 3VL1250/1600			**8GK4705-4KK25**		1	1 unit	1BP
• 3 and 4-pole, 3VT switch disconnectors							
- 2 × 3VT 1	300	250	**8GK4710-2KK10**		1	1 unit	1BP
- 1 × 3VT 2	450		**8GK4710-3KK10**		1	1 unit	1BP
- 1 × 3VT 3	600		**8GK4710-4KK10**		1	1 unit	1BP
• For installation with mounted RCD module							
- 1 × 3VL160X + RCD	450	250	**8GK4720-3KK10**		1	1 unit	1BP
- 1 × 3VL160/3VL250 + RCD			**8GK4721-3KK10**		1	1 unit	1BP
- 1 × 3VL400 + RCD	750	250	**8GK4720-5KK10**		1	1 unit	1BP
• For installation with front-operated rotary operating mechanism							
- 1 × 3VL160X/VL160/VL250	450	250	**8GK4722-3KK10**		1	1 unit	1BP
- 1 × 3VL400	600		**8GK4722-4KK10**		1	1 unit	1BP
- 1 × 3VL630 3-pole			**8GK4723-4KK10**		1	1 unit	1BP
- 1 × 3VL630 4-pole		500	**8GK4721-4KK20**		1	1 unit	1BP

Note

- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).
- For accessories, see page 19/48 onwards.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Assembly kits for unequipped distribution boards



8GK4730-2KK12

Assembly kits for 3VA10.. and 3VA11.. molded case circuit breakers (100 A / 160 A)
- Assembly kits comprising:
  - Matching device support plate
  - Front cover including supports
  - Fixing screws
- Assembly kit for 3-pole and 4-pole devices

External dimensions in mm Height	Width	Possible breakers	Operating mechanism	RCD	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
						d					
300 [1] NEW	250	1	--	--			**8GK4731-2KK12**		1	1 unit	1BP
		1	Motor [2]	--			**8GK4734-2KK12**		1	1 unit	1BP
	500	3	--	--			**8GK4731-2KK22**		1	1 unit	1BP
		3	Motor [2]	--			**8GK4734-2KK22**		1	1 unit	1BP
450	250	1	--	--			**8GK4730-2KK12**		1	1 unit	1BP
			Motor [2]	Infeed side			**8GK4734-3KK12**		1	1 unit	1BP
			--	Infeed side			**8GK4731-3KK12**		1	1 unit	1BP
			--	Lateral			**8GK4731-3KK10**		1	1 unit	1BP
	500	3	--	--			**8GK4730-2KK22**		1	1 unit	1BP
			Motor [2]	Infeed side			**8GK4734-3KK22**		1	1 unit	1BP
			--	Infeed side			**8GK4731-3KK22**		1	1 unit	1BP

Note
- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).



8GK4730-3KK10

Assembly kits for 3VA20.. and 3VA22.. molded case circuit breakers (100 A / 160 A / 250 A)
- Assembly kits comprising:
  - Matching device support plate
  - Front cover including supports
  - Fixing screws
- Assembly kit for 3-pole and 4-pole devices

External dimensions in mm Height	Width	Possible breakers	Operating mechanism	RCD	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
						d					
300 [1] NEW	250	1	--	--			**8GK4732-2KK12**		1	1 unit	1BP
			Motor [2]	--			**8GK4735-3KK10**		1	1 unit	1BP
	500	3	--	--			**8GK4732-2KK22**		1	1 unit	1BP
			Motor [2]	--			**8GK4732-3KK20**		1	1 unit	1BP
450	250	1	--	--			**8GK4733-3KK10**		1	1 unit	1BP
			Motor [2]	Lateral			**8GK4733-4KK10**		1	1 unit	1BP
	500	3	--	--			**8GK4731-3KK20**		1	1 unit	1BP
600	250	1	--	Infeed side			**8GK4732-4KK10**		1	1 unit	1BP

Note
- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).

[1] For insulated connection only

[2] Distribution board depth at least 250 mm

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Assembly kits for unequipped distribution boards

	Version			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
	Assembly kits for 3KD switch disconnectors NEW • Assembly kits comprising: - Special mounting plates - Front covers • Assembly kits for 3-pole and 4-pole switch disconnectors								
	External dimensions in mm Height	Width	Number of switch disconnectors						
• With direct operating mechanism									
	Size 1-2								
	300	250	• 2 (size 1, 3-pole devices only) • 1 (size 2)		**8GK4720-2KK10**		1	1 unit	1BP
	Size 3								
	450	250	• 1 (size 3)		**8GK4721-2KK10**		1	1 unit	1BP
• With door-coupling rotary operating mechanism in the front cover									
	Size 3-4								
	450	500	• 1 (size 3-4) • Only for distribution boards from depth 250 mm		**8GK4720-3KK20**		1	1 unit	1BP
 8GK4707-3KK17	**Assembly kits for 3KA switch disconnectors on support plate** • Panel-size grid dimensions H × W (mm): 150 × 250 • The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports								
	Type		Height in mm		Width in mm				
	• 1 × 3KA 50/51/52/53 (3-pole devices only)		300		250		**8GK4707-3KK17**		1 unit 1BP
	• 1 × 3KA 55/57/58				500		**8GK4707-4KK27**		1 unit 1BP
	Note • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60). • For accessories, see page 19/48 onwards.								

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Assembly kits for 3KF switch disconnectors with fuses *NEW*
- Vertical installation
- Assembly kits comprising:
  - Device-specific mounting plates
  - Front covers
  - Assembly kits for 3-pole and 4-pole 3KF switch disconnectors with fuses

Version	Rated current A	Depth (at least) mm	Height mm	Width mm	Operating mechanism	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
3KF1											
	80	210	300	250	Front operating mechanism, center		**8GK4722-2KK10**		1	1 unit	1BP
3KF2											
	160	210	300	500	Front operating mechanism, center		**8GK4723-2KK10**		1	1 unit	1BP
3KF3 / 3KF4											
	400	320	300	500	Door-coupling rotary operating mechanism in front cover		**8GK4722-2KK20**		1	1 unit	1BP

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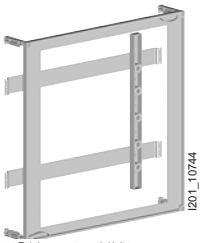
Assembly kits for unequipped distribution boards

Assembly kits for 3NJ4 in-line fuse switch disconnectors

- Assembly kits for individual and project-related assembly, comprising: front cover including supports, busbar holders on support plate, screws and mounting accessories
- Panel-size grid dimensions H × W (mm): 150 × 250
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports
- Note: Values in brackets below apply to bars with fixing claws

	Version	External dimensions in mm Height	Width	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8GK4751-4KK33	• Busbar center-to-center spacing of 100 mm, with busbar support								
	- 4 (3) × 3NJ4, size 00	600	250		**8GK4751-4KK13**		1	1 unit	1BP
	- 9 (8) × 3NJ4, size 00		500		**8GK4751-4KK23**		1	1 unit	1BP
	- 14 (13) × 3NJ4, size 00		750		**8GK4751-4KK33**		1	1 unit	1BP
 3NJ4912-2CA00	• Blanking covers								
	- Size 00	299	50		**3NJ4912-2CA00**		1	1 unit	1DL
 8GK4752-5KK35	• Busbar center-to-center spacing of 185 mm, with busbar support								
	- 2 × 3NJ4, sizes 1-3	750	250		**8GK4752-5KK15**		1	1 unit	1BP
	- 4 × 3NJ4, size 1-3	750	500		**8GK4752-5KK25**		1	1 unit	1BP
	- 7 × 3NJ4, size 1-3	750	750		**8GK4752-5KK35**		1	1 unit	1BP
 3NJ4912-2.A00	• Blanking covers								
	- Size 00	699	50		**3NJ4912-2AA00**		1	1 unit	1DL
	- Sizes 1-3	699	100		**3NJ4912-2BA00**		1	1 unit	1DL

Note

- Observe max. rated current of 630 A!
- For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60).
- The Cu busbar must be ordered separately (see page 19/48).
- The assembly kits for sizes 1-3 require a mounting depth of 320 mm.
- If the assembly kits are fully equipped, an incoming feeder bay is required.
- When mounting the in-line fuse switch disconnectors with 3NJ4911-3AA00 busbar terminals, the assembly kits cannot be fully equipped.
- For accessories, see page 19/48 onwards.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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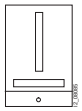
Assembly kits for unequipped distribution boards

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GK4801-2KK13	**Assembly kits for busbar-adaptable units, SR60** • Busbar center-to-center spacing of 60 mm • Assembly kits for individual and project-related assembly, comprising: deep-drawn front cover with supports • Panel-size grid dimensions H × W (mm): 150 × 250 • The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports						
	External dimensions in mm Height: 300; Width: 250		**8GK4801-2KK13**		1	1 unit	1BP
	Height: 300; Width: 500		**8GK4801-2KK23**		1	1 unit	1BP
	Height: 300; Width: 750		**8GK4801-2KK33**		1	1 unit	1BP
	Height: 450; Width: 250		**8GK4801-3KK13**		1	1 unit	1BP
	Height: 450; Width: 500		**8GK4801-3KK23**		1	1 unit	1BP
	Height: 450; Width: 750		**8GK4801-3KK33**		1	1 unit	1BP
	Note • Busbar supports (8GK9711-0KK03) not included in delivery. • Design of the 8GK4 assembly kits for the SR60 busbar system, 60 mm, see page 19/32. • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60). • The Cu busbar and the busbar supports must be ordered separately (see page 19/48).						
 8US1922-2EA00	**Supports for blanking covers**		**8US1922-2EA00**		1	4 units	1CU
 8US1922-2EB00	**Blanking covers**		**8US1922-2EB00**		1	2 units	1CU
 8GK4801-3KK12	**Assembly kits for bus-mounting fuse bases for mounting on busbar systems** • 3-pole • Busbar center-to-center spacing 60 mm • 7 × NEOZED D02 • Assembly kits for individual and project-related assembly, comprising: front cover including supports, busbar supports for bus-mounting fuse bases, screws and mounting accessories • Panel-size grid dimensions H × W (mm): 150 × 250 • The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports						
	External dimensions in mm Height: 300; Width: 250		**8GK4801-2KK12**		1	1 unit	1BP
	Height: 450; Width: 250		**8GK4801-3KK12**		1	1 unit	1BP
	Note • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60). • The Cu busbar must be ordered separately (see page 19/48). • For accessories, see page 19/48 onwards.						
Assembly kits, for meter mounting without top and bottom termination area							
	• Meter assembly kit including front cover • Not standardized, 375 mm • Height 450 mm (external dimension) • Width 250 mm (external dimension) • Panel-size grid dimensions H × W (mm): 150 × 250		**8GE3713-4**		1	1 unit	1BP
	Note • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60) • For accessories, see page 19/48.						

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Assembly kits for unequipped distribution boards

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Assembly kits, for meter mounting with top and bottom termination area							
	**Meter support plate** • H = 450 mm, W = 250 mm		**8GS4007-4**		1	1 unit	1BP
	**Cover for top/bottom termination area** • H = 150 mm, W = 250 mm		**8GS4006-0**		1	1 unit	1BP
	Cover for top/bottom termination area • H = 300 mm, W = 250 mm		**8GS4006-5**		1	1 unit	1BP
	**Front cover support (2 units)** • top/bottom termination area		**8GS4018-8**		1	1 set	1BP
	**Standard mounting rail** • top/bottom termination area		**8GS4010-6**		1	1 unit	1BP
	**Partition, order in appropriate height for neighboring panel**, see page 19/51 Note • Meter support plate cannot be placed on left or right in the cabinet! • A partition is required in the neighboring panel! • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/60) • For accessories, see page 19/48.						

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Quick-assembly kits are pre-assembled cabinet-high system components for the most common applications. Such kits already include the longitudinal stays and can be simply snapped into the unequipped distribution boards of the respective mounting height, thanks to the time-saving quick-locking technology.

Selection and ordering data

	External dimensions		Tiers/ MW	SD	Quick-assembly kits, for modular installation devices									
					Tier spacing of 125 mm, with N/PE bar		PU (UNIT, SET, M)	PS	PG	SD	**Tier spacing of 150 mm, without N/PE bar**		PU (UNIT, SET, M)	PS	PG
	Height	Width			Article No. www.siemens.com/product?Article No.	Price per PU					Article No. www.siemens.com/product?Article No.	Price per PU			
	mm	mm		d						d					
 8GK4001-4KK22	600	250	4/48		**8GK4001-4KK11**		1	1 unit	1BP		**--**				
		500	8/96		**8GK4001-4KK22**		1	1 unit	1BP		**--**				
 8GK4001-5KK22	750	250	5/60		**8GK4001-5KK11**		1	1 unit	1BP		**--**				
		500	10/120		**8GK4001-5KK22**		1	1 unit	1BP		**--**				
 8GK4001-6KK22	900	250	6/72		**8GK4001-6KK11**		1	1 unit	1BP		**8GK4051-6KK11**		1	1 unit	1BP
					8GK4003-6KK11 (with 2 N/PE bars)		1	1 unit	1BP		**--**				
		500	12/144		**8GK4001-6KK22**		1	1 unit	1BP		**8GK4101-6KK22**		1	1 unit	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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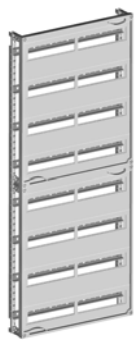
8GK4 quick-assembly kits for modular installation devices

	External dimensions		Tiers/ MW	SD	Quick-assembly kits, for modular installation devices									
					Tier spacing of 125 mm, with N/PE bar	PU (UNIT, SET, M)	PS	PG	SD	**Tier spacing of 150 mm, without N/PE bar**	PU (UNIT, SET, M)	PS	PG	
	Height	Width			Article No. www.siemens.com/product?Article No.	Price per PU				Article No. www.siemens.com/product?Article No.	Price per PU			
	mm	mm		d					d					
 8GK4001-7KK11	1050	250	7/84		**8GK4001-7KK11**	1	1 unit	1BP		**8GK4051-7KK11**	1	1 unit	1BP	
					8GK4003-7KK11 (with 2 N/PE bars)	1	1 unit	1BP		--				
		500	14/168		**8GK4001-7KK22**	1	1 unit	1BP		**8GK4101-7KK22**	1	1 unit	1BP	
 8GK4001-8KK12	1200	250	8/96		**8GK4001-8KK12**	1	1 unit	1BP		**8GK4101-8KK12**	1	1 unit	1BP	
					8GK4003-8KK12 (with 2 N/PE bars)	1	1 unit	1BP		--				
		500	16/192		**8GK4001-8KK22**	1	1 unit	1BP		**8GK4101-8KK22**	1	1 unit	1BP	
 8GK4002-8KK12	1350	250	9/108		**8GK4002-8KK12**	1	1 unit	1BP		**8GK4102-8KK12**	1	1 unit	1BP	
					8GK4003-8KK13 (with 2 N/PE bars)	1	1 unit	1BP		--				
		500	18/216		**8GK4002-8KK22**	1	1 unit	1BP		**8GK4102-8KK22**	1	1 unit	1BP	
	Note													
	• The quick-assembly kits with a width of 250 mm are equipped with 7.5 mm standard mounting rails. • The quick-assembly kits with a width of 500 mm are equipped with 15 mm standard mounting rails. • For accessories, see page 19/48.													

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	External dimensions		Tiers terminals/tiers REG/MW	SD	Quick-assembly kits, for modular installation devices			
					Tier spacing of 150 mm, without N/PE bar	PU (UNIT, SET, M)	PS	PG
	Height	Width			Article No. www.siemens.com/product?Article No.	Price per PU		
	mm	mm		d				
 8GK4100-6KK22	900	250	2/4/48		**8GK4100-6KK12**	1	1 unit	1BP
		500	4/8/96		**8GK4100-6KK22**	1	1 unit	1BP
		750	6/12/144		**8GK4100-6KK32**	1	1 unit	1BP
 8GK4100-7KK22	1050	250	2/5/60		**8GK4100-7KK12**	1	1 unit	1BP
		500	4/10/120		**8GK4100-7KK22**	1	1 unit	1BP
		750	6/15/180		**8GK4100-7KK32**	1	1 unit	1BP
 8GK4100-8KK22	1200	250	2/6/72		**8GK4100-8KK12**	1	1 unit	1BP
		500	4/12/144		**8GK4100-8KK22**	1	1 unit	1BP
		750	6/18/216		**8GK4100-8KK32**	1	1 unit	1BP
 8GK4110-8KK22	1350	250	3/6/72		**8GK4110-8KK12**	1	1 unit	1BP
		500	6/12/144		**8GK4110-8KK22**	1	1 unit	1BP
		750	9/18/216		**8GK4110-8KK32**	1	1 unit	1BP

Note

- The quick-assembly kits with a width of 250 mm are equipped with 7.5 mm standard mounting rails.
- The quick-assembly kits with a width of 500 mm/750 mm are equipped with 15 mm standard mounting rails.
- For accessories, see page 19/48.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8GK4 quick-assembly kits for modular installation devices

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For quick-assembly kits and assembly kits							
 8GS4016-1	**Mounting plates for telecommunication units** • Made of perforated steel plate • With insert nuts and quick-locking technology • With 1 set of captive nuts size M5, width 250 mm						
	Height in mm						
	900		**8GS4016-1**		1	1 unit	1BP
	1050		**8GS4016-2**		1	1 unit	1BP
	1200		**8GS4016-3**		1	1 unit	1BP
	1350		**8GS4016-4**		1	1 unit	1BP
Accessories							
 8GS4034-1	**N terminals** • For snap-on mounting onto the standard mounting rail • For distributing the neutral conductor when using several RCBBs • 2 × screw terminal, conductor cross-section max. 16 mm² • 14 × plug-in terminal, conductor cross-section max. 4 mm²	▶	**8GS4034-1**		1	1 unit	1BP
 8GS4034-2	**PE terminals** • For snap-on mounting onto the standard mounting rail • 2 × screw terminal, conductor cross-section max. 16 mm² • 14 × plug-in terminal, conductor cross-section max. 4 mm²	▶	**8GS4034-2**		1	1 unit	1BP
 8GS4034-3	**N/PE terminals** • For snap-on mounting onto the standard mounting rail • For distributing the neutral conductor when using several RCBBs • 1 × screw terminal, conductor cross-section max. 16 mm² 1) • 7 × plug-in terminal, conductor cross-section max. 4 mm² 1) Footnote 1) Per PE or N potential.	▶	**8GS4034-3**		1	1 unit	1BP
 8GS4034-4	**N/N terminals** • For snap-on mounting onto the standard mounting rail • For distributing the neutral conductor when using several RCBBs • 1 × screw terminal, conductor cross-section max. 16 mm² 1) • 7 × plug-in terminal, conductor cross-section max. 4 mm² 1) Footnote 1) Per PE or N potential.	▶	**8GS4034-4**		1	1 unit	1BP
	Terminals for circular conductors						
	Versions						
 8US1921-2AA00...AD00	• Busbar thickness 5 mm - Conductor cross-section 1.5 ... 16 mm² - Conductor cross-section 1.5 ... 35 mm² - Conductor cross-section 16 ... 70 mm² - Conductor cross-section 16 ... 120 mm²		**8US1921-2AA00** **8US1921-2AB00** **8US1921-2AD00** **8US1921-2AC00**		100 100 1 1	100 units 50 units 50 units 50 units	1CU 1CU 1CU 1CU
	• Busbar thickness 10 mm - Conductor cross-section 1.5 ... 16 mm² - Conductor cross-section 1.5 ... 35 mm² - Conductor cross-section 16 ... 70 mm² - Conductor cross-section 16 ... 120 mm²		**8US1921-2BA00** **8US1921-2BB00** **8US1921-2BD00** **8US1921-2BC00**		1 1 1 1	100 units 50 units 50 units 50 units	1CU 1CU 1CU 1CU
 8GK9920-0KK24	**Replacement door hinges** • For wall/floor-mounted distribution boards • 1 set = 2 hinges		**8GK9920-0KK24**		1	1 set	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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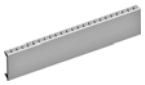
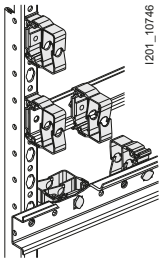
8GK4 quick-assembly kits for modular installation devices

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8GK9910-0KK00	**Blanking strips** Color RAL 7035 (light gray) Versions • For 12 MW (1 MW = 18 mm) • Length 1 m Without pressure-relief joint, to cut to length		**8GK9910-0KK00** **8GK9910-0KK01**		1 1	10 units 1 unit	1BP 1BP
 8GK9920-0KK31	**Connecting kits, IP43/IP55** • For side-by-side mounting of enclosures • Comprising: - Screws - Washers - Nuts - 10 m roll of sealing strip Note A bushing flange is required for electrical connections!		**8GK9920-0KK31**		1	1 unit	1BP
 8GK9910-0KK80	**Cable holders on standard mounting rail** • Height 45 mm • Width 40 mm		**8GK9910-0KK80**		1	200 units	1BP
 8GK9910-0KK34	**Extra-deep brackets** • For recessed installation of stand. mounting rails • 1 set = 2 brackets including mounting material		**8GK9910-0KK34**		1	1 set	1BP
 8GK9911-0KK00	**Screws** • Self-tapping • M5 x 10 • Large pack: 500 units		**8GK9911-0KK00**		1	500 units	1BP
 8GK9911-0KK01	**Extra-deep brackets** • Depth-adjustable • Large pack: 10 units		**8GK9911-0KK01**		1	10 units	1BP
 8GK9911-0KK02	**Drop-down brackets, universal** • Large pack: 10 units		**8GK9911-0KK02**		1	10 units	1BP
 8GK9911-0KK05	**Iso supports** • For insulated standard mounting rail assembly Versions in mm 12 31.5 55.5		**8GK9911-0KK04** **8GK9911-0KK05** **8GK9911-0KK06**		1 1 1	50 units 50 units 50 units	1BP 1BP 1BP

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Accessories for ALPHA 1250 / 630 / 400 distribution boards

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For assembly kits							
 8GK9650-0KK00	**Busbar supports**						
	Versions						
	• 1-pole - For Cu busbars 12 × 5 (10) mm, 20 × 5 (10) mm, 30 × 5 (10) mm - Height 150 mm		**5SH3540**		1	1 unit	1CU
 8GK9711-0KK03	• 3-pole - Busbar center-to-center spacing of 60 mm - For Cu busbars 12 × 5 (10) mm, 20 × 5 (10) mm, 30 × 5 (10) mm - For bus-mounting fuse bases and 3NP4076 switch disconnectors, used together with assembly kits (mounting directly on the stays)		**8GK9711-0KK03**		1	1 unit	1BP
	• 4-pole - Busbar center-to-center spacing of 60 mm - For Cu busbars 12 × 5 (10) mm, 30 × 5 (10) mm, - Interior mounting - Width: 20 mm		**8US1923-4AA00**		1	10 units	1CU
	• 5-pole - Busbar center-to-center spacing of 40 mm - For Cu busbars 12 × 5 (10) mm and for mounting 3NP fuse switch disconnectors - Height 300 mm		**8GK9650-0KK00**		1	1 unit	1BP
 8GK973.	**Cu busbars**						
	Versions						
	• Cu cross-section of 12 × 5 mm, current 250 A						
	- Length 250		**8GK9731-0KK10**		1	5 units	1BP
	- Length 500		**8GK9731-0KK20**		1	5 units	1BP
	- Length 750		**8GK9731-0KK30**		1	5 units	1BP
	- Length 1000		**8GK9731-0KK40**		1	5 units	1BP
	- Length 1250		**8GK9731-0KK50**		1	5 units	1BP
	• Cu cross-section of 20 × 5 mm, current 320 A						
	- Length 250		**8GK9733-0KK10**		1	5 units	1BP
	- Length 500		**8GK9733-0KK20**		1	5 units	1BP
	- Length 750		**8GK9733-0KK30**		1	5 units	1BP
	- Length 1000		**8GK9733-0KK40**		1	5 units	1BP
	- Length 1250		**8GK9733-0KK50**		1	5 units	1BP
	• Cu cross-section of 30 × 5 mm, current 450 A						
	- Length 250		**8GK9735-0KK10**		1	5 units	1BP
	- Length 500		**8GK9735-0KK20**		1	5 units	1BP
	- Length 750		**8GK9735-0KK30**		1	5 units	1BP
	- Length 1000		**8GK9735-0KK40**		1	5 units	1BP
	- Length 1250		**8GK9735-0KK50**		1	5 units	1BP
	• Cu cross-section of 30 × 10 mm, current 630 A						
	- Length 250		**8GK9736-0KK10**		1	5 units	1BP
	- Length 500		**8GK9736-0KK20**		1	5 units	1BP
	- Length 750		**8GK9736-0KK30**		1	5 units	1BP
	- Length 1000		**8GK9736-0KK40**		1	5 units	1BP
	- Length 1250		**8GK9736-0KK50**		1	5 units	1BP
 8GK9910-0KK30	**Supports for front covers as spare part** • Long version • Material: plastic • 1 set = 4 supports		**8GK9910-0KK30**		1	5 sets	1BP
 8GK9910-0KK11	**N/PE bars as plug-in terminals**						
	Versions						
	• Each with 6 screw terminals from 2.5 to 16 mm^2 and 21 plug-in terminals from 1.5 to 4 mm^2 for mounting on longitudinal stays at a 30° inclination		**8GK9910-0KK11**		1	1 unit	1BP
	• With 6 screw terminals from 2.5 to 16 mm^2 and 21 plug-in terminals from 1.5 to 4 mm^2, for PE bar and one neutral-bar each with 2 screw terminals from 2.5 to 16 mm^2 and 10 plug-in terminals from 1.5 to 4 mm^2, for mounting on longitudinal stays at a 30° inclination		**8GK9910-0KK12**		1	1 unit	1BP
 8GK9910-0KK26	**Quick-lock screws** • Material: plastic • Color RAL 7035		**8GK9910-0KK26**		1	20 units	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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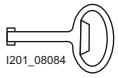
Accessories for ALPHA 1250 / 630 / 400 distribution boards

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8GK9918-0KK00	**Transport eyebolts** M12		**8GK9918-0KK00**		1	1 unit	1BP
 8GD9290	**Spare keys** For double-bit locking mechanism		**8GD9290**		1	1 unit	1BP
 8GK9910-0KK35	**Standard mounting rails, lowered**						
	Width						
	250 mm		**8GK9910-0KK35**		1	1 unit	1BP
	500 mm		**8GK9910-0KK40**		1	1 set	1BP
	750 mm		**8GK9910-0KK41**		1	1 set	1BP

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
For unequipped distribution boards							
 8GK9912-0KK10	**Wall mounting rails** • For all wall-mounted distribution boards • The distribution board can be quickly and precisely mounted by a single person						
	Length in mm						
	250		**8GK9912-0KK10**		1	1 unit	1BP
	500		**8GK9912-0KK20**		1	1 unit	1BP
	750		**8GK9912-0KK30**		1	1 unit	1BP
	1000		**8GK9912-0KK40**		1	1 unit	1BP
	1250		**8GK9912-0KK50**		1	1 unit	1BP
	Cabinet mounting lugs, flat						
	Versions						
	• For mounting and fixing a distribution board directly against the wall without a clearance (1 set = 4 lugs including screws)		**8GK9910-0KK36**		1	5 sets	1BP
	• For connecting 2 distribution boards and for mounting and fixing them directly against the wall without a clearance, 8GK9910-0KK36 is additionally required for the ends of a row of distribution boards (1 set = 2 lugs including screws)		**8GK9910-0KK37**		1	1 set	1BP
	Wall mounting lugs, standard • 1 set = 4 units		**8GK9920-0KK33**		1	1 set	1BP
	Hollow wall sets For fixing flush-mounting distribution boards in hollow walls		**8GK9910-0KK28**		1	1 set	1BP
 8GK9120-0KK30	**Ventilation grilles**		**8GK9120-0KK30**		1	4 units	1BP

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Accessories for ALPHA 1250 / 630 / 400 distribution boards

	Version		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
	Bases for flat pack floor-mounted distribution boards External height: 100 mm							
	External dimensions in mm Depth	Width						
 8GK99010KA12	210	300		**8GK9901-0KK12**		1	1 unit	1BP
		550		**8GK9901-0KK22**		1	1 unit	1BP
		800		**8GK9901-0KK32**		1	1 unit	1BP
		1050		**8GK9901-0KK42**		1	1 unit	1BP
		1300		**8GK9901-0KK52**		1	1 unit	1BP
	Bases for pre-assembled (welded) floor-mounted distribution boards External height: 100 mm							
	External dimensions in mm Depth	Width						
 8GK99010KA12	210	300		**8GK9901-0KA12**		1	1 unit	1BP
		550		**8GK9901-0KA22**		1	1 unit	1BP
		800		**8GK9901-0KA32**		1	1 unit	1BP
		1050		**8GK9901-0KA42**		1	1 unit	1BP
		1300		**8GK9901-0KA52**		1	1 unit	1BP
 8GK9900-0KK13	250	300		**8GK9900-0KK13**		1	1 unit	1BP
		550		**8GK9900-0KK23**		1	1 unit	1BP
		800		**8GK9900-0KK33**		1	1 unit	1BP
		1050		**8GK9900-0KK43**		1	1 unit	1BP
		1300		**8GK9900-0KK53**		1	1 unit	1BP
 8GK9900-0KK14	320	300		**8GK9900-0KK14**		1	1 unit	1BP
		550		**8GK9900-0KK24**		1	1 unit	1BP
		800		**8GK9900-0KK34**		1	1 unit	1BP
		1050		**8GK9900-0KK44**		1	1 unit	1BP
		1300		**8GK9900-0KK54**		1	1 unit	1BP
 8GK9902-0KK13	400	300		**8GK9902-0KK13**		1	1 unit	1BP
		550		**8GK9902-0KK23**		1	1 unit	1BP
		800		**8GK9902-0KK33**		1	1 unit	1BP
		1050		**8GK9902-0KK43**		1	1 unit	1BP
		1300		**8GK9902-0KK53**		1	1 unit	1BP
 8GK9100-0KK04	**Flange plates** • Degree of protection IP55 • Safety class 1 • For cabinet depth 320 mm, if center plate is removed • Sheet steel, without knockouts			**8GK9100-0KK04**		1	1 unit	1BP

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Partitions						
 8GK9301-2KK01	• For 210 mm depth - For the visual and spatial separation of different potentials - Material: plastic - For mounting depth 210 mm						
	Versions						
 8GK9103-0KK10	• Vertical						
	- Height 300 mm		**8GK9301-2KK01**		1	1 unit	1BP
	- Height 450 mm		**8GK9301-3KK01**		1	1 unit	1BP
	- Height 600 mm		**8GK9101-4KK01**		1	1 unit	1BP
	- Height 750 mm		**8GK9101-5KK01**		1	1 unit	1BP
	- Height 900 mm		**8GK9101-6KK01**		1	1 unit	1BP
	- Height 1050 mm		**8GK9101-7KK01**		1	1 unit	1BP
	- Height 1200 mm		**8GK9101-8KK01**		1	1 unit	1BP
	- Height 1350 mm		**8GK9102-8KK01**		1	1 unit	1BP
	• Horizontal						
	- Width 250 mm		**8GK9103-0KK10**		1	1 unit	1BP
	- Width 500 mm		**8GK9103-0KK20**		1	1 unit	1BP
	- Width 750 mm		**8GK9103-0KK30**		1	1 unit	1BP
	• For 250/320 mm depth - Sheet steel						
	Versions						
 8GK9520-8KK00	• Vertical (Vertical separation for 320 mm depth only: at a depth of 250 mm, the stays reach the rear panel) - Height 1800 mm		**8GK9520-8KK00**		1	1 unit	1BP
 8GK9520-0KK20	• Horizontal (For 250 mm depth: push separation back to break it off)						
	- Width 250 mm		**8GK9520-0KK10**		1	1 unit	1BP
	- Width 500 mm		**8GK9520-0KK20**		1	1 unit	1BP
	• For 400 mm depth						
	Versions						
 8GK9521-8KK00	• Vertical, height 1800 mm		**8GK9521-8KK00**		1	1 unit	1BP
 8GK9520-0KK30	• Horizontal, width 250 mm		**8GK9520-0KK30**		1	1 unit	1BP

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Accessories for ALPHA 1250 / 630 / 400 distribution boards

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Circuit diagram pockets						
	Versions						
 8GK9910-0KK22	• DIN A3, made of sheet steel, depth 10 mm		**8GK9910-0KK22**		1	1 unit	1BP
 8GK9910-0KK23	• DIN A4, transparent sleeve, adhered all-over		**8GK9910-0KK23**		1	20 units	1BP
 8GD9132	• DIN A4, made of plastic, depth 30 mm		**8GD9132**		1	1 unit	1BP
	Locking systems wall-mounted distribution boards						
	Versions						
 8GK9560-0KK04	• Standard locking devices - Color: black - Made of plastic - With rotary handle for wall-mounted distribution boards, degree of protection IP43 - Cannot be retrofitted to other locking devices		**8GK9560-0KK04**		1	1 unit	1BP
 8GK9560-0KK05	• Retrofit kits - For standard locking device to degree of protection IP44		**8GK9560-0KK05**		1	1 set	1BP
 8GK9560-0KK06	• Rotary handle locking devices for profile cylinders - For wall-mounted distribution boards with degree of protection IP43/IP55, with mounting option for a profile semicylinder (length 40 mm) - Suitable for E012 or Senat tumbler - Color: black		**8GK9560-0KK06**		1	1 unit	1BP
	• Lockable rotary handles - Including E012 lock and two keys		**8GK9560-0KK13**		1	1 unit	1BP
	Accessories						
	Spare key for E012 lock		**8GF9390-2**		1	1 unit	1BP

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	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Profile semicylinders						
	Versions						
 8GK9560-0KK07	• With E012 lock and two keys		**8GK9560-0KK07**		1	1 unit	1BP
 8GK9560-0KK08	• With Senat tumbler and two keys		**8GK9560-0KK08**		1	1 unit	1BP
 8GK9560-0KK10	• With 3-mm pin as double-bit lock		**8GK9560-0KK10**		1	1 unit	1BP
	Locking systems floor-mounted distribution boards						
	• For 210 mm depth						
	Versions						
 8GK9560-0KK04	• Standard locking devices - Made of plastic - Color: black - With rotary handle for wall-mounted distribution board, degree of protection IP43 - Cannot be retrofitted to other locking devices		**8GK9560-0KK04**		1	1 unit	1BP
	• For 250/320/400 mm depth						
	Versions						
 8GK9561-0KK01	• Rotary handles - Can be recessed, with pushbutton technique		**8GK9561-0KK01**		1	1 unit	1BP
	• Lock insert - For installation of profile semicylinders		**8GK9561-0KK02**		1	1 unit	1BP
	• Profile semicylinders, 40 mm, with E012 lock and 2 keys - With insert for the rotary handle - Only to be used together with the lock insert (this must be ordered separately)		**8GK9561-0KK00**		1	1 unit	1BP
	• Profile semicylinder with Senat tumbler		**8GK9560-0KK03**		1	1 unit	1BP
	Accessories						
 8GK9561-0KK02	Spare key for E012 lock		**8GF9390-2**		1	1 unit	1BP
 8GK9561-0KK00							
	Crossbeams						
	Versions						
 8GK4853-0KK20	• Width 500 mm • Width 750 mm		**8GK4853-0KK20** **8GK4853-0KK30**		1 1	2 units 2 units	1BP 1BP

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Accessories for ALPHA 1250 / 630 / 400 distribution boards

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8GK9911-0KK10	**Cable clamping rails** • For strain relief • C-profile 30 mm x 15 mm						
	Width in mm						
	250		**8GK9911-0KK10**		1	1 unit	1BP
	500		**8GK9911-0KK20**		1	1 unit	1BP
	750		**8GK9911-0KK30**		1	1 unit	1BP
	1000		**8GK9911-0KK40**		1	1 unit	1BP
	1250		**8GK9911-0KK50**		1	1 unit	1BP
 8GK9912-0KK00	**3NP1123 ... covers, size 000**		**8GK9912-0KK00**		1	1 unit	1BP
 8GK9100-0KK01	**Flanges** For fast and correct wiring						
	Versions						
	• 1-component flanges (for IP43 distribution boards, installed on bottom panel) - For bottom cable entry, with 11 possible knockouts - Max. ∅ 50.5 mm, plastic		**8GK9100-0KK00**		1	1 unit	1BP
 8GK9100-0KK03	• 2-component flanges (degree of protection: IP55) - For top/bottom cable entry - With 44 possible knockouts - Comprising 2 elastic components		**8GK9100-0KK01**		1	1 unit	1BP
 8GK9100-0KK10	• Flange plate made of sheet steel (only safety class 1) - For metric screw connections, degree of protection: IP55 (2 units)		**8GK9100-0KK03**		1	1 unit	1BP
	• Connecting flanges		**8GK9100-0KK10**		1	1 unit	1BP
 8GK9120-0KK30	**Ventilation grilles**		**8GK9120-0KK30**		1	4 units	1BP

	Version		SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Rubber cable entries • For inserting in ∅ 38 mm knockouts (= Pg29) • IP65							
	Number	Cross-section						
 8HP1805	1	∅ 12 ... 29 mm		**8HP1805**		1	10 units	1BR
 8HP1806	2	∅ 6 ... 15 mm		**8HP1806**		1	10 units	1BR
 8HP1807	3	∅ 4 ... 12.5 mm		**8HP1807**		1	10 units	1BR
 8HP1808	4	∅ 4 ... 12 mm		**8HP1808**		1	10 units	1BR
 8HC6900	**Cable entries for cable entry plate** • For cables ∅ 14 mm ... 65 mm • Suitable for 8HP1520 cable entry plate			**8HC6900**			on request	

Minimum order quantity (PS) or a multiple thereof can be ordered.

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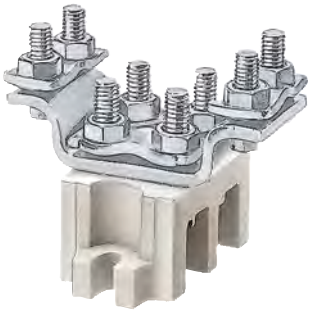
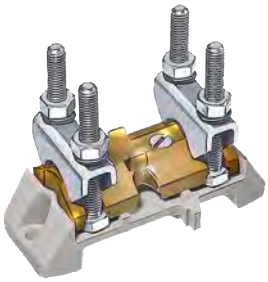
	Version				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
					d					
	Bases made of glass-fiber reinforced polyester resin									
	Incoming cables		Outgoing cables							
	Number	Cross-section in mm²	Number	Cross-section in mm²						
 8JK401	1	6 ... 70	1	6 ... 70		**8JK401**		1	1 unit	1BR
 8JH4044	1	4 ... 35	3	4 ... 35		**8JH4044**		1	1 unit	1BR
 8JK4061	1	50 ... 240	1	50 ... 240		**8JK4061**		1	1 unit	1BR
 8JK406	2	50 ... 240	2	50 ... 185		**8JK406**		1	1 unit	1BR
 8JH4122	**Incoming and outgoing terminals, for busbars 16 mm × 3 mm** Suitable for DIAZED bus-mounting rails and connecting kits									
	Conductor cross-section in mm² (solid or stranded)									
	1.5 ... 16					**8JH4122**		1	10 units	1BR
	10 ... 35					**8JH4124**		1	10 units	1BR
	16 ... 50					**8JH4125**		1	10 units	1BR
	10 ... 70					**8JK3441**		1	1 unit	1BR

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Accessories for ALPHA 1250 / 630 / 400 distribution boards

Incoming and outgoing terminals

	Version			SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
	• **For busbars 6 mm × 6 mm**								
	Conductor cross-section in mm² (solid or stranded)								
 8JH4114	16 ... 35 (can be retrofitted without dismantling the busbar)				**8JH4114**		1	10 units	1BR
	• **For busbars 20 mm × 8 mm or 2 × (20 mm × 8 mm)**								
	Conductor cross-section in mm² (solid or stranded)	Clamping points	Conductors per clamping point						
 8JK3171	50 ... 240	1	1		**8JK3171**		1	1 unit	1BR
 8JK3172	50 ... 240	1	2		**8JK3172**		1	1 unit	1BR
	• **For busbars 12 mm × 5 mm or 2 × (12 mm × 5 mm)**								
	Conductor cross-section in mm² (solid or stranded)								
	one bar	two bars							
 8JH4104	10 ... 35	--			**8JH4104**		1	10 units	1BR
 8JH4105	16 ... 70	16 ... 35			**8JH4105**		1	10 units	1BR

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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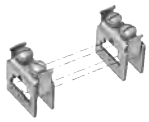
	Version		SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
	• For busbars 30 mm × 10 mm or 2 × (30 mm × 10 mm);							
	Conductor cross-section in mm^2 (solid or stranded)	Description						
 8JK3544	10 ... 70	In the case of double busbars, divide the terminals alternately between the two bars in order to even the load		**8JK3544**		1	1 unit	1BR
 8HP1724	M12, up to 2 × 240	Cable lug or bar connection		**8HP1724**		1	1 unit	1BR
	Extension terminals							
	Bar in mm^2	Description						
 8JK3201	• 12 × 5 2 × (12 × 5)	• 1 set = 2 terminals • When using single busbars, a copper connecting piece 12 × 5 mm must be made • When using 2 × Cu (12 × 5) mm the bars overlap in the area of the connection point		**8JK3201**		1	10 sets	1BR
 8JK3281	• 20 × 8 2 × (20 × 8)	• 1 set = 2 terminals • When using single busbars, a copper connecting piece 20 x 8 mm must be made • When using 2 × Cu (20 mm × 8 mm), the bars overlap in the area of the connection point.		**8JK3281**		1	1 unit	1BR
 8HP1728	• 2 × (30 × 10)	--		**8HP1728**		1	1 unit	1BR
 8HE8541	**Breathers, PG 16** • In the case of distribution boards used in an external environment – outside or in rooms with extreme temperature fluctuations – the breathers must be installed as low as possible on the underside of the distribution board to prevent condensation water forming • Degree of protection IP54			**8HE8541**			on request	
	8HP fixing lugs • 1 set = 4 lugs • For individual enclosures and small distribution boards complete with cylinder head screws M6 x 35			**8HC3800**			on request	

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Accessories for ALPHA 1250 / 630 / 400 distribution boards

	Version				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	Ceramic bases				d					
	Incoming cables		Outgoing cables							
	Number	Cross-section in mm²	Number	Cross-section in mm²						
 8JH404	1	4 ... 35	1	4 ... 35		**8JH404**		1	1 unit	1BR

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Unequipped distribution boards and partially equipped distribution boards							
	Hollow wall sets For fixing flush-mounting distribution boards in hollow walls		**8GK9910-0KK28**		1	1 set	1BP
SIEMENS 8GD9084	**Siemens nameplate** • Made of aluminum • Self-adhesive • Color: petrol		**8GD9084**		1	1 unit	1BP
 8GK9910-0KK11	**N/PE bars as plug-in terminals**						
	Versions						
	• Each with six screw terminals from 2.5 to 16 mm² and 21 plug-in connections from 1.5 to 4 mm² for mounting on longitudinal stays at a 30° inclination		**8GK9910-0KK11**		1	1 unit	1BP
	• With six screw terminals from 2.5 to 16 mm² and 21 plug-in connections from 1.5 to 4 mm², for PE bar and one N bar each with two screw terminals from 2.5 to 16 mm² and 10 plug-in connections from 1.5 to 4 mm², for mounting on longitudinal stays at a 30° inclination		**8GK9910-0KK12**		1	1 unit	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
For front covers							
 8GK9601-4KK10	**Front covers, closed** • Front covers in large order quantities (Big Pack) • Tier spacing: 150						
	External dimensions in mm Height / Width						
	75 / 250		**8GK9601-0KK10**		1	10 units	1BP
	150 / 250		**8GK9601-1KK10**		1	10 units	1BP
	150 / 500		**8GK9601-1KK20**		1	10 units	1BP
	150 / 750		**8GK9601-1KK30**		1	10 units	1BP
	300 / 250		**8GK9601-2KK10**		1	10 units	1BP
	300 / 500		**8GK9601-2KK20**		1	10 units	1BP
	300 / 750		**8GK9601-2KK30**		1	10 units	1BP
	450 / 250		**8GK9601-3KK10**		1	10 units	1BP
	450 / 500		**8GK9601-3KK20**		1	10 units	1BP
	450 / 750		**8GK9601-3KK30**		1	10 units	1BP
	600 / 250		**8GK9601-4KK10**		1	10 units	1BP
	600 / 500		**8GK9601-4KK20**		1	10 units	1BP
	600 / 750		**8GK9601-4KK30**		1	10 units	1BP
 8GK9601-4KK11	**Front covers, with cutout**						
	External dimensions in mm Height / Width / Tiers/MW						
	150 / 250 / 1/12		**8GK9601-1KK11**		1	10 units	1BP
	150 / 500 / 1/24		**8GK9601-1KK21**		1	10 units	1BP
	150 / 750 / 1/36		**8GK9601-1KK31**		1	10 units	1BP
	300 / 250 / 2/24		**8GK9601-2KK11**		1	10 units	1BP
	300 / 500 / 2/48		**8GK9601-2KK21**		1	10 units	1BP
	300 / 750 / 2/72		**8GK9601-2KK31**		1	10 units	1BP
	450 / 250 / 3/36		**8GK9601-3KK11**		1	10 units	1BP
	450 / 500 / 3/72		**8GK9601-3KK21**		1	10 units	1BP
	450 / 750 / 3/108		**8GK9601-3KK31**		1	10 units	1BP
	600 / 250 / 4/48		**8GK9601-4KK11**		1	10 units	1BP
	600 / 500 / 4/96		**8GK9601-4KK21**		1	10 units	1BP
	600 / 750 / 4/144		**8GK9601-4KK31**		1	10 units	1BP
For assembly kits							
 8GK9910-0KK31	**Supports for front cover** Material: plastic						
	Versions						
	• Long version (117 mm, for use when mounting a 15 mm standard mounting rail on standard mounting rail holders)		**8GK9910-0KK31**		1	100 units	1BP
	• Short version (61.5 mm, for use when mounting a 15 mm standard mounting rail directly on the stays)		**8GK9910-0KK24**		1	100 units	1BP
 8GK9910-0KK27	**Assembly tool** • For supports • Short and long version • With ergonomic handle		**8GK9910-0KK27**		1	1 unit	1BP
 8GK9911-0KK03	**Support extensions** • 7.5 mm		**8GK9911-0KK03**		1	100 units	1BP
 8GK9910-1KK10	**Standard mounting rail 15 mm**						
	Width in mm						
	250		**8GK9910-1KK10**		1	10 units	1BP
	500		**8GK9910-1KK20**		1	10 units	1BP
	750		**8GK9910-1KK30**		1	10 units	1BP
	1000		**8GK9910-1KK40**		1	10 units	1BP
	1250		**8GK9910-1KK50**		1	10 units	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Assembly kits

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GK9910-1KK83	**Standard mounting rail holders** • For standard mounting rail, 15 mm and supports • Long version • Comprising 1 left and 1 right holder • 1 set = 20 holders, 10 × left, 10 × right						
	Versions						
 8GK9910-1KK84	• For 1 standard mounting rail		**8GK9910-1KK81**		1	1 set	1BP
	• For 2 standard mounting rails		**8GK9910-1KK83**		1	1 set	1BP
	• For 3 standard mounting rails		**8GK9910-1KK84**		1	1 set	1BP
	• For 4 standard mounting rails		**8GK9910-1KK85**		1	1 set	1BP
 8GK9910-1KK85							
 8GK4853-8KK02	**Longitudinal stays** • In order to mount the assembly kits in unequipped distribution boards, 2 longitudinal stays are required for each assembly kit width • Depth 210/250/320/400 mm • 1 set = 2 stays						
	Cubicle depth mm / Length mm: 210 / 300		**8GK4855-2KK02**		1	1 set	1BP
	210 / 450		**8GK4851-3KK00**		1	1 set	1BP
	210 / 600		**8GK4851-4KK00**		1	1 set	1BP
	210 / 750		**8GK4851-5KK00**		1	1 set	1BP
	210 / 900		**8GK4851-6KK00**		1	1 set	1BP
	210 / 1050		**8GK4851-7KK00**		1	1 set	1BP
	210 / 1200		**8GK4851-8KK00**		1	1 set	1BP
	210 / 1350		**8GK4852-8KK00**		1	1 set	1BP
	210 / 1800		**8GK4853-8KK00**		1	1 set	1BP
	250/320/400 / 1800		**8GK4853-8KK02**		1	1 set	1BP

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GK9910-0KK38	**Stay supports** • For depth of 210 mm when mounting stays are to be shifted forward by 55 mm • Note: Necessary whenever standard mounting rails are mounted directly on the stays		**8GK9910-0KK38**		1	20 units	1BP
 8GK9910-0KK32	**Connecting kits for longitudinal stays** • Connecting plate for stays • 1 set = 4 units		**8GK9910-0KK32**		1	1 unit	1BP
 8GK9911-0KK00	**Screws** • Self-tapping • M5 x 10 • Large pack: 500 units		**8GK9911-0KK00**		1	500 units	1BP

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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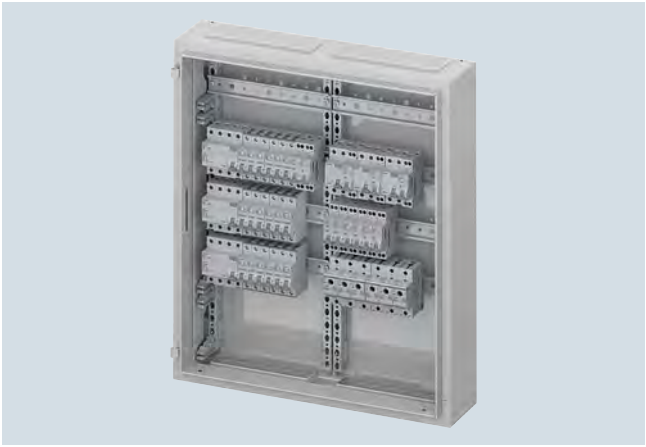
Overview



System

The system's portfolio comprises unequipped distribution boards, partially equipped distribution boards with cabinet-high quick-assembly kits, cabinet-high quick-assembly kits for modular installation devices for fast equipping and wiring, assembly kits for project-related and individual assembly, as well as an extensive range of accessories.

Quick-assembly kits and assembly kits

The assembly kits are made of sendzimir-galvanized sheet steel and are equipped with molded-plastic covers for a wide range of equipping options, e.g. with switching devices and modular installation devices.

Benefits

- Plan and configure quickly, simply and conveniently with the software SIMARIS configuration.
- Easy planning thanks to modular design
- Ample wiring space behind the standard mounting rail
- Comprehensive range of cabinet-high and frequently used quick-assembly kits and standard assembly kits for individual and project-related assembly
- Easy assembly thanks to keyhole-fastened components and modules with quick-acting locks
- Fast mounting times thanks to quick-assembly kits
- System concept according to DIN, EN and VDE standards
- Solid sheet-steel enclosure
- Degree of protection:
  - Surface mounting, IP43/IP44 with additional sealing of the rotary handle
  - Flush mounting: IP31 with door and integrated masking frame
- Safety class 2 (total insulation)
- High-quality surface finish: distribution boards made of electrogalvanized and powder-coated sheet steel, system components made of sendzimir-galvanized sheet steel, galvanized and transparently chromated small components and screws
- Doors can be hinged on the right or left
- Door opening angle of 170°
- Replaceable locking systems (accessories)
- Front cover with sealable 90° quick-acting locks
- Environmentally-friendly, recyclable plastics.

Application

The ALPHA 160 DIN technology distribution board range comprises wall-mounted distribution boards with up to 7 modular installation devices, each with 12 MW per mounting width (250 mm). The standard mounting rail tier spacing is 125 mm or 150 mm. A total of 4 cabinet mounting widths are available, each with an internal dimension of 250 mm.

The distribution boards can be supplied in safety class 2 (total insulation). The standard degree of protection for surface-mounting distribution boards is IP43 and IP31 for flush-mounting distribution boards. The rated current is 160 A.

Cabinet-high quick-assembly kits or assembly kits that only require a one-size screwdriver for assembly are available for all mountable switching devices and modular installation devices.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Technical specifications

Overvoltage category	III
Rated impulse withstand voltage U_{imp} in kV	6
Clearance and creepage distances	EN 60664-1
Rated insulation voltage U_i in V	690
Rated operational voltage U_e in V AC/DC	690
Rated voltage U_n (40 Hz to 60 Hz AC) in V	690 for built-in devices
Rated current in A	Up to 160
Protective measures	Safety class 2 (total insulation)
Degree of protection acc. to EN 60529	Surface mounting: IP43 / IP44 with additional seal set with door Flush mounting: IP31 with door and integrated masking frame
Standard mounting rail tier spacing per standard mounting rail tier in mm	125/150
Modular width (MW)	18 mm, 12 MW + 1 mountable MW
Pollution degree	3
Ambient temperature in °C	35 (24-h mean value)
Relative air humidity in %	50 at 40 °C
Test specifications	EN 61439-1/-3 (VDE 0660-600-1/-3)
Enclosure	Sheet steel
Mounting dimensions	DIN 43870
Surface	Electrogalvanized and powder-coated
Color • Enclosure[1)] • Covers	 RAL 9016 (traffic white) RAL 7035 (light gray)
Lock	Rotary handle – can be replaced by other locking systems if required
Packing material	Shock-proof, environmentally-friendly

[1)] Further RAL colors are available on request. For special colors, see page 19/7.

Cabinet dimensions

Surface-mounting distribution boards (external dimensions)		**Flush-mounting distribution boards with integrated masking frame (external dimensions)**	
Depth 140 mm		**Depth 140 mm**	
Height	**Width**	**Height**	**Width**
mm	mm	mm	mm
500	300 550	558	358 608
650	300 550	708	358 608
800	300 550	858	358 608
950	300 550	1008	358 608
1100	300 550	1158	358 608

Enclosure

Material:
Electrogalvanized and powder-coated sheet steel.

Sheet thickness:
Body 0.75 mm, door 1 mm

Color:
RAL 9016 (traffic white).
Further RAL colors are available on request.
For special colors, see page 19/7.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

- Cabinet depth 140 mm
- Safety class 2 (total insulation)
- Color RAL 9016 (traffic white)
- **For special colors, see page 19/7**
- Enclosure complete with door. Distribution boards with a width of 750/800 mm or more will be supplied with a double door. The integral rotary handle can be replaced with a different type of locking system, if preferred.
- Flanges: per panel width, one 2-component flange each at the top and bottom
- For distribution boards with built-in distribution board panels: tier spacing of 125 mm with N/PE bar per panel width
- Flush-mounting distribution board with integrated masking frame.

Note: Wall anchors are included in delivery with flush-mounting distribution boards.

Selection and ordering data

Internal/external dimensions		Panel width	Tiers/ MW	SD	Surface-mounting distribution boards, IP43	PU (UNIT, SET, M)	PS	PG	SD	Flush-mounting distribution boards, IP31	PU (UNIT, SET, M)	PS	PG
Height	Width				Article No. www.siemens.com/product?Article No. / Price per PU					Article No. www.siemens.com/product?Article No. / Price per PU			
mm	mm			d					d				
Unequipped distribution boards													
450/500	250/300	□	--		**8GK1032-1KK11**	1	1 unit	1BP		**8GK1031-1KK11**	1	1 unit	1BP
	500/550	□□			**8GK1032-1KK21**	1	1 unit	1BP		**8GK1031-1KK21**	1	1 unit	1BP
	750/800	□□□			**8GK1032-1KK31**	1	1 unit	1BP		--			
600/650	250/300	□	--		**8GK1032-2KK11**	1	1 unit	1BP		**8GK1031-2KK11**	1	1 unit	1BP
	500/550	□□			**8GK1032-2KK21**	1	1 unit	1BP		**8GK1031-2KK21**	1	1 unit	1BP
	750/800	□□□			**8GK1032-2KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□			**8GK1032-2KK41**	1	1 unit	1BP		--			
750/800	250/300	□	--		**8GK1032-3KK11**	1	1 unit	1BP		**8GK1031-3KK11**	1	1 unit	1BP
	500/550	□□			**8GK1032-3KK21**	1	1 unit	1BP		**8GK1031-3KK21**	1	1 unit	1BP
	750/800	□□□			**8GK1032-3KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□			**8GK1032-3KK41**	1	1 unit	1BP		--			
900/950	250/300	□	--		**8GK1032-4KK11**	1	1 unit	1BP		**8GK1031-4KK11**	1	1 unit	1BP
	500/550	□□			**8GK1032-4KK21**	1	1 unit	1BP		**8GK1031-4KK21**	1	1 unit	1BP
	750/800	□□□			**8GK1032-4KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□			**8GK1032-4KK41**	1	1 unit	1BP		--			
1050/1100	250/300	□	--		**8GK1032-5KK11**	1	1 unit	1BP		**8GK1031-5KK11**	1	1 unit	1BP
	500/550	□□			**8GK1032-5KK21**	1	1 unit	1BP		**8GK1031-5KK21**	1	1 unit	1BP
	750/800	□□□			**8GK1032-5KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□			**8GK1032-5KK41**	1	1 unit	1BP		--			
Distribution boards with built-in distribution board panels													
450/500	250/300	□	3/36		**8GK1052-1KK11**	1	1 unit	1BP		--			
	500/550	□□	6/72		**8GK1052-1KK21**	1	1 unit	1BP		--			
	750/800	□□□	9/108		**8GK1052-1KK31**	1	1 unit	1BP		--			
600/650	250/300	□	4/48		**8GK1052-2KK11**	1	1 unit	1BP		--			
	500/550	□□	8/96		**8GK1052-2KK21**	1	1 unit	1BP		--			
	750/800	□□□	12/144		**8GK1052-2KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□	16/192		**8GK1052-2KK41**	1	1 unit	1BP		--			
750/800	250/300	□	5/60		**8GK1052-3KK11**	1	1 unit	1BP		--			
	500/550	□□	10/120		**8GK1052-3KK21**	1	1 unit	1BP		--			
	750/800	□□□	15/180		**8GK1052-3KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□	20/240		**8GK1052-3KK41**	1	1 unit	1BP		--			
900/950	250/300	□	6/72		**8GK1052-4KK11**	1	1 unit	1BP		--			
	500/550	□□	12/144		**8GK1052-4KK21**	1	1 unit	1BP		--			
	750/800	□□□	18/216		**8GK1052-4KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□	24/288		**8GK1052-4KK41**	1	1 unit	1BP		--			
1050/1100	250/300	□	7/84		**8GK1052-5KK11**	1	1 unit	1BP		--			
	500/550	□□	14/168		**8GK1052-5KK21**	1	1 unit	1BP		--			
	750/800	□□□	21/252		**8GK1052-5KK31**	1	1 unit	1BP		--			
	1000/1050	□□□□	28/336		**8GK1052-5KK41**	1	1 unit	1BP		--			

Quick-assembly kits and assembly kits: 19/64. Accessories: 19/68.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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8GK4 quick-assembly kits for modular installation devices

Overview

Quick-assembly kits are pre-assembled cabinet-high system components for the most common applications. Such kits already include the longitudinal stays and can be simply snapped into the unequipped distribution boards of the respective mounting height, thanks to the time-saving quick-locking technology.

Selection and ordering data

	External dimensions		Tiers/ MW	SD	Quick-assembly kits, for modular installation devices							
					Tier spacing of 125 mm, with N/PE bar				**Tier spacing of 150 mm, without N/PE bar**			
	Height	Width			Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm		d						d					
 8GK4051-3KK11	450	250	3/36		**8GK4001-3KK11**		1	1 unit	1BP		**8GK4051-3KK11**		1	1 unit	1BP
 8GK4051-4KK11	600	250	4/48		**8GK4001-4KK11**		1	1 unit	1BP		**8GK4051-4KK11**		1	1 unit	1BP
 8GK4051-5KK11	750	250	5/60		**8GK4001-5KK11**		1	1 unit	1BP		**8GK4051-5KK11**		1	1 unit	1BP
 8GK4051-6KK11	900	250	6/72		**8GK4001-6KK11**		1	1 unit	1BP		**8GK4051-6KK11**		1	1 unit	1BP
 8GK4051-7KK11	1050	250	7/84		**8GK4001-7KK11**		1	1 unit	1BP		**8GK4051-7KK11**		1	1 unit	1BP

The quick-assembly kits with a width of 250 mm are equipped with 7.5 mm standard mounting rails.

Accessories: 19/68.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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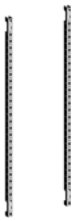
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GK4851-3KK00	**Longitudinal stays** • To mount the assembly kits in unequipped distribution boards, 2 longitudinal stays are required for each assembly kit width • 1 set = 2 stays						
	Height in mm						
	• 450		**8GK4851-3KK00**		1	1 set	1BP
	• 600		**8GK4851-4KK00**		1	1 set	1BP
	• 750		**8GK4851-5KK00**		1	1 set	1BP
	• 900		**8GK4851-6KK00**		1	1 set	1BP
	• 1050		**8GK4851-7KK00**		1	1 set	1BP

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Assembly kits for modular installation devices

Overview

- Assembly kits for individual and project-related assembly, comprising: device racks, front cover including supports, screws and mounting accessories
- The front cover is sealable as standard and the quick-acting locking connections facilitate fast and reliable attachment to the supports.

Note:
For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/65).

Selection and ordering data

	External dimensions		Tiers/ MW	SD	Assembly kits for modular installation devices									
					Tier spacing 125 mm						Tier spacing 150 mm			
	Height	Width			Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	mm	mm		d						d					
 8GK4351-1KK21	150	250 500	1/12 1/24		-- --						**8GK4351-1KK11** **8GK4351-1KK21**		1 1	1 unit 1 unit	1BP 1BP
 8GK4351-2KK21	300	250 500	2/24 2/48		**8GK4301-2KK11** **8GK4301-2KK21**		1 1	1 unit 1 unit	1BP 1BP		**8GK4351-2KK11** **8GK4351-2KK21**		1 1	1 unit 1 unit	1BP 1BP
 8GK4351-3KK21	450	250 500	3/36 3/72		**8GK4301-3KK11** **8GK4301-3KK21**		1 1	1 unit 1 unit	1BP 1BP		**8GK4351-3KK11** **8GK4351-3KK21**		1 1	1 unit 1 unit	1BP 1BP
 8GK4351-4KK21	600	250 500	4/48 4/96		**8GK4301-4KK11** **8GK4301-4KK21**		1 1	1 unit 1 unit	1BP 1BP		**8GK4351-4KK11** **8GK4351-4KK21**		1 1	1 unit 1 unit	1BP 1BP

The assembly kits with a width of 250 mm and 500 mm are equipped with 7.5 mm standard mounting rails.

For accessories, see page 19/68.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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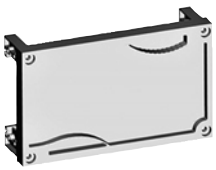
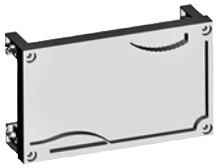
Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GK4401-1KK11	**Assembly kits for horizontal terminal blocks** • Terminal blocks with graded insulation design • Closed • Assembly kits for individual and project-related assembly, comprising: device racks, front cover including supports, screws and mounting accessories • With a front cover (for unequipped panels is sealable as standard and the quick-acting locking connections facilitate fast and reliable fixation to the supports)						
	Height in mm (external dimensions) / Width in mm (external dimensions)						
	150 / 250		**8GK4401-1KK11**		1	1 unit	1BP
	150 / 500		**8GK4401-1KK21**		1	1 unit	1BP
	300 / 250		**8GK4401-2KK11**		1	1 unit	1BP
	300 / 500		**8GK4401-2KK21**		1	1 unit	1BP
	Note: • For assembly kits with a width of 500 mm it is recommended to install a vertical profile bar. • For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/65).						
 8GK4451-2KK11	**Assembly kits with mounting plates** • Closed • Assembly kits for individual and project-related assembly, comprising: mounting plate, front cover including supports, screws and mounting accessories • With a front cover (for unequipped panels is sealable as standard and the quick-acting locking connections facilitate fast and reliable fixation to the supports)						
	External dimensions (mm): Assembly kit: Height / Width; Mounting plate dimensions in mm: Height / Width						
	300 / 250 / 245 / 207.5		**8GK4451-2KK11**		1	1 unit	1BP
	450 / 250 / 395 / 207.5		**8GK4451-3KK11**		1	1 unit	1BP
	600 / 250 / 545 / 207.5		**8GK4451-4KK11**		1	1 unit	1BP
	Note: For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/65).						
 8GK4501-1KK11	**Assembly kits for unequipped panels** • Assembly kits for individual and project-related assembly, comprising: front cover including supports, screws and mounting accessories • With a front cover (for unequipped panels is sealable as standard and the quick-acting locking connections facilitate fast and reliable fixation to the supports)						
	Height in mm (external dimensions) / Width in mm (external dimensions)						
	150 / 250		**8GK4501-1KK11**		1	1 unit	1BP
	150 / 500		**8GK4501-1KK21**		1	1 unit	1BP
	300 / 250		**8GK4501-2KK11**		1	1 unit	1BP
	300 / 500		**8GK4501-2KK21**		1	1 unit	1BP
	450 / 250		**8GK4501-3KK11**		1	1 unit	1BP
	450 / 500		**8GK4501-3KK21**		1	1 unit	1BP
	600 / 250		**8GK4501-4KK11**		1	1 unit	1BP
	600 / 500		**8GK4501-4KK21**		1	1 unit	1BP
	Note: For mounting the assembly kits in the unequipped distribution boards, 2 longitudinal stays are required per assembly kit. These must be ordered separately (see page 19/65).						
 8GK9910-0KK20	**Supports for front cover** • Short version • Material: plastic • 1 set = 4 supports		**8GK9910-0KK20**		1	5 sets	1BP

For accessories, see page 19/68 onwards.

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Accessories

Selection and ordering data

	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Unequipped distribution boards and partially equipped distribution boards							
 8GK9912-0KK10	**Wall mounting rails** • For all wall-mounted distribution boards • The distribution board can be quickly and precisely mounted by a single person						
	Length in mm						
	• 250		**8GK9912-0KK10**		1	1 unit	1BP
	• 500		**8GK9912-0KK20**		1	1 unit	1BP
	• 750		**8GK9912-0KK30**		1	1 unit	1BP
	• 1000		**8GK9912-0KK40**		1	1 unit	1BP
	• 1250		**8GK9912-0KK50**		1	1 unit	1BP
	Cabinet mounting lugs, flat						
	Versions						
	• For mounting and fixing the cabinet directly against the wall without spacing - 1 set = 4 lugs including screws		**8GK9910-0KK36**		1	5 sets	1BP
	• For linking two cabinets and for mounting and fixing directly against the wall without spacing - 8GK9910-0KK36 also required for the ends of a row of cabinets - 1 set = 2 lugs including screws		**8GK9910-0KK37**		1	1 set	1BP
	Hollow wall sets For fixing flush-mounting distribution boards in hollow walls		**8GK9910-0KK28**		1	1 set	1BP
	Locking systems						
	Versions						
 8GK9560-0KK04	• Standard locking devices - Made of plastic - Color: black - With rotary handle for wall-mounted distribution board, degree of protection IP43 - Cannot be retrofitted to other locking devices		**8GK9560-0KK04**		1	1 unit	1BP
 8GK9560-0KK06	• Rotary handle locking devices for profile cylinders - For wall-mounted distribution boards with degree of protection IP43/IP55, with mounting option for a profile semicylinder (length 40 mm) - Suitable for E012 or Senat tumbler - Color: black		**8GK9560-0KK06**		1	1 unit	1BP
	• Lockable rotary handles - Including E012 lock and two keys		**8GK9560-0KK13**		1	1 unit	1BP
	Accessories						
	Spare key for E012 lock		**8GF9390-2**		1	1 unit	1BP
	Profile semicylinders						
	Versions						
 8GK9560-0KK07	• With E012 lock and two keys		**8GK9560-0KK07**		1	1 unit	1BP
 8GK9560-0KK08	• With Senat tumbler and two keys		**8GK9560-0KK08**		1	1 unit	1BP
 8GK9560-0KK10	• With 3-mm pin as double-bit lock		**8GK9560-0KK10**		1	1 unit	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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	Version	SD d	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8GK9000-0KK02	**2-component flanges** • For fast and correct wiring • With 44 possible knockouts • Comprising 2 elastic components		**8GK9000-0KK02**		1	1 unit	1BP
 8GD9084	**Siemens nameplate** • Made of aluminum • Self-adhesive • Color: petrol		**8GD9084**		1	1 unit	1BP
 8GK9560-0KK05	**Retrofit kits** • For standard locking device to IP44 degree of protection		**8GK9560-0KK05**		1	1 set	1BP
	Partitions • For the visual and spatial separation of different potentials • Material: plastic						
 8GK9001-3KK01	Versions • Vertical - Height 450 mm - Height 600 mm - Height 750 mm - Height 900 mm - Height 1050 mm		 **8GK9001-3KK01** **8GK9001-4KK01** **8GK9001-5KK01** **8GK9001-6KK01** **8GK9001-7KK01**		 1 1 1 1 1	 1 unit 1 unit 1 unit 1 unit 1 unit	 1BP 1BP 1BP 1BP 1BP
 8GK9002-0KK10	• Horizontal - Width 250 mm		**8GK9002-0KK10**		1	1 unit	1BP
 8GK9910-0KK11	**N/PE bars as plug-in terminals** Versions • Each with six screw terminals from 2.5 to 16 mm² and 21 plug-in connections from 1.5 to 4 mm² for mounting on longitudinal stays at a 30° inclination • With six screw terminals from 2.5 to 16 mm² and 21 plug-in connections from 1.5 to 4 mm², for PE bar and one N bar each with two screw terminals from 2.5 to 16 mm² and 10 plug-in connections from 1.5 to 4 mm², for mounting on longitudinal stays at a 30° inclination		 **8GK9910-0KK11** **8GK9910-0KK12**		 1 1	 1 unit 1 unit	 1BP 1BP
 8GS4034-1	**N terminals** ▶ • For snap-on mounting onto the standard mounting rail • For distributing the neutral conductor when using several RCBBs • 2 × screw terminal, conductor cross-section max. 16 mm² • 14 × plug-in terminal, conductor cross-section max. 4 mm²		**8GS4034-1**		1	1 unit	1BP
 8GS4034-2	**PE terminals** ▶ • For snap-on mounting onto the standard mounting rail • 2 × screw terminal, conductor cross-section max. 16 mm² • 14 × plug-in terminal, conductor cross-section max. 4 mm²		**8GS4034-2**		1	1 unit	1BP
 8GS4034-3	**N/PE terminals** ▶ • For snap-on mounting onto the standard mounting rail • For distributing the neutral conductor when using several RCBBs • 1 × screw terminal, conductor cross-section max. 16 mm² [1] • 7 × plug-in terminal, conductor cross-section max. 4 mm² [1] Footnote [1] Per PE or N potential.		**8GS4034-3**		1	1 unit	1BP

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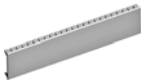
Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
 8GS4034-4	**N/N terminals** • For snap-on mounting onto the standard mounting rail • For distributing the neutral conductor when using several RCBBs • 1 × screw terminal, conductor cross-section max. 16 mm^2 1) • 7 × plug-in terminal, conductor cross-section max. 4 mm^2 1) Footnote 1) Per PE or N potential.	▶ d	**8GS4034-4**		1	1 unit	1BP
 8GK9910-0KK00	**Blanking strips** Color RAL 7035 (light gray) Versions						
	• For 12 MW (1 MW = 18 mm)		**8GK9910-0KK00**		1	10 units	1BP
	• Length 1 m, w/o pressure-relief joint, to cut to length		**8GK9910-0KK01**		1	1 unit	1BP
 8GK9910-0KK27	**ALPHA assembly tool** • For supports • Short and long version • With ergonomic handle for supports		**8GK9910-0KK27**		1	1 unit	1BP
 8GK9910-0KK35	**Standard mounting rails, lowered** Width						
	• 250 mm		**8GK9910-0KK35**		1	1 unit	1BP
	• 500 mm		**8GK9910-0KK40**		1	1 set	1BP
	• 750 mm		**8GK9910-0KK41**		1	1 set	1BP

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The ALPHA SIMBOX XL small distribution boards are designed for maximum utilization of space, even in extremely confined conditions. They are available as surface-mounting, flush-mounting and hollow-wall distribution boards.

Raised front covers, enlarged terminal compartments and integrated cable routing aids enable easy wiring. With a compact mounting depth of just 88 mm these distribution boards fit in the narrowest of hollow walls.

To round off the package there is a comprehensive offering of accessories which are compatible for all versions (terminals, covering strips, door locks).



Benefits

- Ample wiring space
- Raised front cover
- Sealable front cover
- Integrated water-level
- Marking aid on the wall-recessed box
- Small mounting depth of just 88 mm
- Each tier can be expanded by 2 MW
- Hollow-wall distribution board also suitable for flush-mounting

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Introduction

Application

Small distribution boards are suitable as sub-distribution boards or floor panel boards for all applications in electrical building installations. Thanks to their compact mounting depth, they can be installed close to the respective load center in residential and non-residential buildings, as well as in schools, commercial buildings and shops.

Design

- Available in sizes with 1-4 tiers
- Door and frame are made of elegant metal components
- Small mounting depth of 88 mm is ideal for hollow-wall installations
- Strain relief possibilities are provided at the top and bottom of the distribution board
- Knockouts enable cable entry from all four sides of the distribution board
- Integrated cable routing aids in the wall-recessed box
- Space-saving slots for RCCB terminals are available in addition to terminal strips

Technical specifications

Rated current in A	Up to 63
Rated voltage in V AC	400
Degree of protection	IP30
Safety class	2 (total insulation)
Color	Pure white RAL 9010
Mounting rail spacing in mm	125
Standards	EN 61439-1/3 DIN VDE 0603-1 DIN 43871
Mounting depth in mm	88
Impact strength	IK 05

Minimum order quantity (PS) or a multiple thereof can be ordered.

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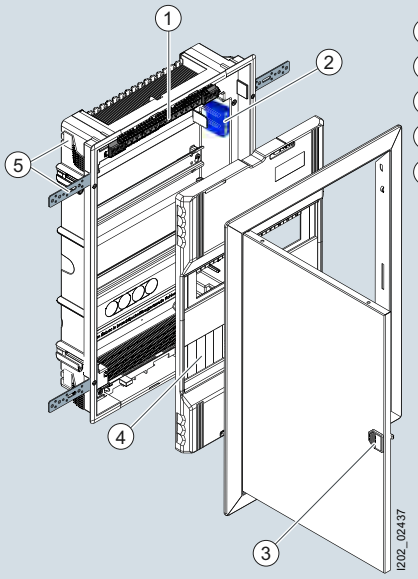
Overview

Features

- Color: pure white RAL 9010
- Each tier can be expanded by 2 MW to a maximum of 14 MW
- Small mounting depth of 88 mm
- All distribution boards are pre-configured with terminal strips featuring user-friendly plug-in terminals

Mounting

- Distribution boards of size 2 and larger are pre-configured for the installation of two RCCB circuits
- Upgrading of the distribution boards with space-saving RCCB terminals is also possible
- Hollow-wall distribution boards can also be used as flush-mounting distribution boards



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Selection and ordering data

Flush-mounting distribution boards
• Pre-equipped with terminal strips

Type	Recess dimensions L × W × D in mm	Tiers × MW	Equipping options terminal strips Number × type	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
1-tier	393 × 359 × 88	1 × 12	1 × 8GB5016-5KM --		**8GB5012-1KM**		1	1 unit	1BO
2-tier	518 × 359 × 88	2 × 12	1 × 8GB5016-5KM 1 × 8GB5005-5KM		**8GB5024-1KM**		1	1 unit	1BO
3-tier	643 × 359 × 88	3 × 12	1 × 8GB5017-5KM 1 × 8GB5021-5KM		**8GB5036-1KM**		1	1 unit	1BO
4-tier	768 × 359 × 88	4 × 12	1 × 8GB5017-5KM 1 × 8GB5021-5KM		**8GB5048-1KM**		1	1 unit	1BO


8GB5012-1KM

Hollow-wall distribution boards
Including accessories for hollow-wall mounting
• Pre-equipped with terminal strips
• Accessories for hollow-wall mounting included
• 850 °C lamp wire resistance

Type	Cutout dimensions L × W × D in mm	Tiers × MW	Equipping options terminal strips Number × type	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
				d					
1-tier	355 × 323 × 88	1 × 12	1 × 8GB5016-5KM --		**8GB5012-4KM**		1	1 unit	1BO
2-tier	480 × 323 × 88	2 × 12	1 × 8GB5016-5KM 1 × 8GB5005-5KM		**8GB5024-4KM**		1	1 unit	1BO
3-tier	605 × 323 × 88	3 × 12	1 × 8GB5017-5KM 1 × 8GB5021-5KM		**8GB5036-4KM**		1	1 unit	1BO
4-tier	730 × 323 × 88	4 × 12	1 × 8GB5017-5KM 1 × 8GB5021-5KM		**8GB5048-4KM**		1	1 unit	1BO


8GB5024-4KM

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

Features of flush-mounting and hollow-wall distribution boards:

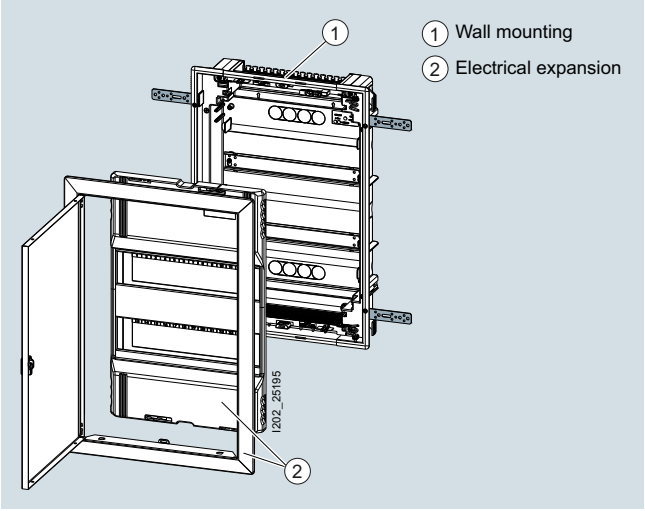
- Color: pure white RAL 9010
- Each tier can be expanded by 2 MW to a maximum of 14 MW
- Small mounting depth of 88 mm
- Upgrading of the distribution boards with space-saving RCCB terminals is also possible

Project supply: distribution boards are supplied in two design versions

① Wall-recessed box (wall mounting):
- Flush-mounting version with cover
- Hollow-wall box with mounting set

② Expansion package (electrical expansion)
- Flush-mounting cover including standard mounting rail and door kit
- Hollow-wall cover including standard mounting rail and door kit

Order individually according to project progress, starting with the enclosure bases and then the device protection covers and the door kit.



Technical specifications

Rated current in A	Up to 63
Rated voltage in V AC	400
Degree of protection	IP30
Safety class	2 (total insulation)
Color	Pure white RAL 9010
Mounting rail spacing in mm	125
Standards	IEC 61439-1/-3 DIN VDE 0603-1 DIN 43871
Mounting depth in mm	88
Impact strength	IK 05

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Selection and ordering data



8GB5212-1KM01

Flush-mounting distribution boards

Type/MW	Recess dimensions L × W × D in mm	Versions	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
1-tier/ 1 × 12	393 × 359 × 88	① Wall-recessed box		**8GB5212-1KM01**		1	12 units	1BO
		② Expansion package[1)]		**8GB5212-3KM01**		1	12 units	1BO
2-tier/ 2 × 12	518 × 359 × 88	① Wall-recessed box		**8GB5224-1KM01**		1	12 units	1BO
		② Expansion package[1)]		**8GB5224-3KM01**		1	12 units	1BO
3-tier/ 3 × 12	643 × 359 × 88	① Wall-recessed box		**8GB5236-1KM01**		1	12 units	1BO
		② Expansion package[1)]		**8GB5236-3KM01**		1	12 units	1BO
4-tier/ 4 × 12	768 × 359 × 88	① Wall-recessed box		**8GB5248-1KM01**		1	12 units	1BO
		② Expansion package[1)]		**8GB5248-3KM01**		1	12 units	1BO

Note

Prices apply to each unit. One package contains 12 units.



8GB5212-2KM01

Hollow-wall distribution boards
Including accessories for hollow-wall mounting
- Accessories for hollow-wall mounting included
- 850 °C lamp wire resistance

Type/MW	Recess dimensions L × W × D in mm	Versions	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
1-tier/ 1 × 12	355 × 323 × 88	① Wall-recessed box	**8GB5212-2KM01**		1	12 units	1BO
		② Expansion package[1)]	**8GB5212-4KM01**		1	12 units	1BO
2-tier/ 2 × 12	480 × 323 × 88	① Wall-recessed box	**8GB5224-2KM01**		1	12 units	1BO
		② Expansion package[1)]	**8GB5224-4KM01**		1	12 units	1BO
3-tier/ 3 × 12	605 × 323 × 88	① Wall-recessed box	**8GB5236-2KM01**		1	12 units	1BO
		② Expansion package[1)]	**8GB5236-4KM01**		1	12 units	1BO
4-tier/ 4 × 12	730 × 323 × 88	① Wall-recessed box	**8GB5248-2KM01**		1	12 units	1BO
		② Expansion package[1)]	**8GB5248-4KM01**		1	12 units	1BO

Note

Prices apply to each unit. One package contains 12 units.

[1)] Consisting of standard mounting rail, door and frame.

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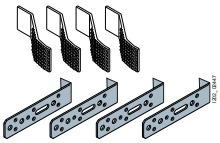
Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GB5016-5KM	① **Terminal strips with plug-in terminals** Number of slots per distribution board: •1 to 2-tier: 2 units •3 to 4-tier: 3 units						
	Type: N/PE; Potential 1: N = 3×25 + 14×4 mm²; Potential 2: PE = 3×25 + 14×14 mm²		**8GB5016-5KM**		1	1 unit	1BO
	Type: N/N; Potential 1: N_1 = 3×25 + 14×4 mm²; Potential 2: N_2 = 3×25 + 14×14 mm²		**8GB5017-5KM**		1	1 unit	1BO
	Type: N; Potential 1: N = 6×25 + 28×4 mm²		**8GB5020-5KM**		1	1 unit	1BO
	Type: PU; Potential 1: PE = 6×16 + 28×4 mm²		**8GB5021-5KM**		1	1 unit	1BO
 8GB5015-5KM	① **Terminal strips with screw terminals** Number of slots per distribution board: •1 to 2-tier: 2 units •3 to 4-tier: 3 units						
	Type: N/PE; Potential 1: N = 3×16 + 14×10 mm²; Potential 2: PE = 3×16 + 14×10 mm²		**8GB5008-5KM**		1	1 unit	1BO
	Type: N/N; Potential 1: N_1 = 3×16 + 14×10 mm²; Potential 2: N_2 = 3×16 + 14×10 mm²		**8GB5015-5KM**		1	1 unit	1BO
	Type: N; Potential 1: N = 6×16 + 28×10 mm²		**8GB5010-5KM**		1	1 unit	1BO
	Type: PU; Potential 1: PE = 6×16 + 28×10 mm²		**8GB5011-5KM**		1	1 unit	1BO
 8GB5005-5KM	② **RCCB terminals** For distributing the neutral conductor to two RCCBs N = 3×16 + 2×10 mm²		**8GB5005-5KM**		1	1 unit	1BO
 8GB5006-5KM	③ **Door locking kits** •For snapping into door handle •With two keys		**8GB5006-5KM**		1	1 unit	1BO
 8GB4683	④ **Blanking strips** •12 MW wide •Color: white •With increased flame protection up to 850 °C, hence suitable for hollow-wall distribution boards		**8GB4683**		1	10 units	1BO
 8GB5013-5KM	⑤ **Mounting aid for flush mounting** •Comprising four wall anchors and locking aids •Can also be used in hollow-wall distribution boards		**8GB5013-5KM**		1	1 set	1BO

Minimum order quantity (PS) or a multiple thereof can be ordered.

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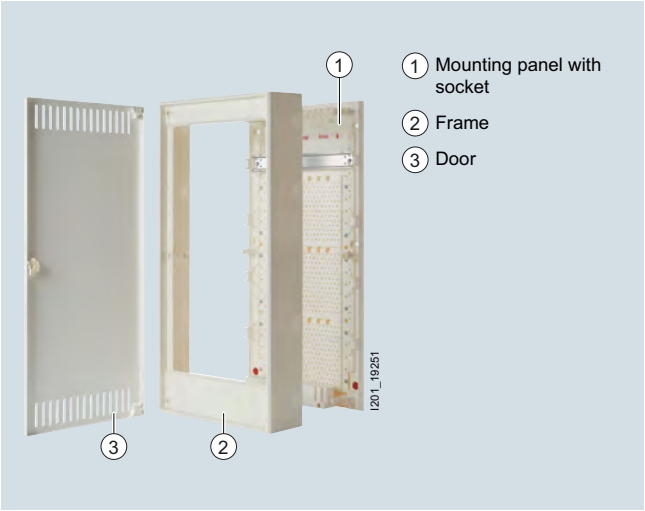
Overview

Features of the multimedia distribution boards:

- Specially designed for multimedia applications such as a telephone and router
- Featuring a special mounting panel, on which all hardware components can be fastened flexibly and in a floating manner
- Compliant with
  - EN 61439-1 / VDE 0660-600-1
  - EN 61439-3 / VDE 0660-600-3
- Available for surface, flush and hollow-wall mounting

Note:

The multimedia distribution board is only permissible for installation of safety class II devices.



Technical specifications

Rated current in A	Up to 63
Rated voltage in V AC	400
Degree of protection	IP30
Safety class	2 (total insulation)
Color	Pure white RAL 9010
Mounting rail spacing in mm	125
Standards	IEC 61439-1/-3 DIN VDE 0603-1 DIN 43871
Mounting depth in mm	88
Impact strength	IK 05

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Multimedia distribution boards

Selection and ordering data

ALPHA SIMBOX XL multimedia distribution boards
Included in delivery:
- Mounting plate made of plastic
- Socket outlets
- Door and frame


8GB5036-3KM00

Type	Cutout dimensions L × W × D in mm	Versions	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
			d					
3-tier	605 × 323 × 88	Surface mounting		**8GB5036-3KM00**		1	1 unit	1BO
		Hollow wall/flush mounting		**8GB5036-3KM01**		1	1 unit	1BO
4-tier	730 × 323 × 88	Surface mounting		**8GB5048-3KM00**		1	1 unit	1BO
		Hollow wall/flush mounting		**8GB5048-3KM01**		1	1 unit	1BO

Accessories

Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					
Connecting lugs The connecting lug serves to install several distribution boards in a row, vertically or horizontally.		**8GB5025-5KM**		1	2 units	1BO

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Minimum order quantity (PS) or a multiple thereof can be ordered.

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Overview

The ALPHA SIMBOX XL small distribution board is designed for maximum utilization of space, even in extremely confined conditions.

The ALPHA SIMBOX XL offers ample wiring space.

To round off the package there is a comprehensive offering of accessories which are compatible with the flush-mounting/ hollow-wall distribution board (terminals, covering strips, door locks).



Benefits

- Knockouts enable cable entry from all four sides and the rear of the distribution board
- A comprehensive range of plastic doors is available in addition to robust sheet-steel doors
- Each tier can be expanded by 2 MW
- The accessories pack can also be used for flush-mounting and hollow-wall distribution boards

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Surface-mounting distribution boards

Application

Small distribution boards are suitable as sub-distribution boards or floor panel boards for all applications in electrical building installations.

Thanks to their small dimensions, they can be installed close to the respective load center in residential and non-residential buildings, as well as in schools, commercial buildings and shops.

Design

- Available in sizes with 1-4 tiers
- Strain relief possibilities are provided at the top and bottom of the distribution board
- Knockouts enable cable entry from all four sides of the distribution board
- Space-saving slots for RCCB terminals are available in addition to terminal strips
- When the gray transparent plastic doors are used, indicator lights are also visible when the door is closed
- Raised mounting rails permit user-friendly cable bushing

Technical specifications

Rated current in A	Up to 63
Rated voltage in V AC	400
Degree of protection	IP30
Safety class	2 (total insulation)
Color	Pure white RAL 9010
Mounting rail spacing in mm	125
Standards	IEC 61439 DIN VDE 0603-1 DIN 43871

Minimum order quantity (PS) or a multiple thereof can be ordered.

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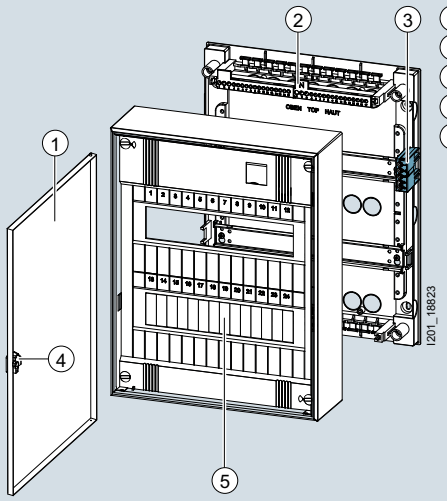
Overview

Features

- Color: pure white RAL 9010
- Each tier can be expanded by 2 MW to a maximum of 14 MW
- All distribution boards are pre-configured with terminal strips featuring service-proven screw terminals
- Comprehensive range of doors

Mounting

- Distribution boards of size 2 and larger are pre-configured for the installation of two RCCB circuits
- Upgrading of the distribution boards with RCCB terminals ③ is also possible



1 Door
2 Terminal strips
3 RCCB terminal
4 Door locking kit
5 Blanking strips

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Selection and ordering data

	Version				SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
					d					
	Surface-mounting distribution boards without door									
 8GB5012-0KM	Type	External dimensions L × W × D in mm	Tiers × MW	Equipping options terminal strips Number × type						
	1-tier	250 × 305 × 99	1 × 12	1 × 8GB5008-5KM --		**8GB5012-0KM**		1	1 unit	1BO
	2-tier	375 × 305 × 99	2 × 12	1 × 8GB5008-5KM 1 × 8GB5005-5KM		**8GB5024-0KM**		1	1 unit	1BO
	3-tier	515 × 305 × 99	3 × 12	1 × 8GB5015-5KM 1 × 8GB5011-5KM		**8GB5036-0KM**		1	1 unit	1BO
	4-tier	640 × 305 × 99	4 × 12	1 × 8GB5015-5KM 1 × 8GB5011-5KM		**8GB5048-0KM**		1	1 unit	1BO
 8GB5001-5KM	① **Doors** • Metal door, white									
	1-tier					**8GB5001-5KM**		1	1 unit	1BO
	2-tier					**8GB5002-5KM**		1	1 unit	1BO
	3-tier					**8GB5003-5KM**		1	1 unit	1BO
	4-tier					**8GB5004-5KM**		1	1 unit	1BO
 8GB5001-5KM01	• Plastic door, white									
	1-tier					**8GB5001-5KM01**		1	1 unit	1BO
	2-tier					**8GB5002-5KM01**		1	1 unit	1BO
	3-tier					**8GB5003-5KM01**		1	1 unit	1BO
	4-tier					**8GB5004-5KM01**		1	1 unit	1BO

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Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GB5016-5KM	② **Terminal strips with plug-in terminals** Number of slots per distribution board: • 1 to 2-tier: 2 units • 3 to 4-tier: 3 units						
	Type: N/PE — Potential 1: N = 3×25 + 14×4 mm² — Potential 2: PE = 3×25 + 14×14 mm²		**8GB5016-5KM**		1	1 unit	1BO
	Type: N/N — Potential 1: N_1 = 3×25 + 14×4 mm² — Potential 2: N_2 = 3×25 + 14×14 mm²		**8GB5017-5KM**		1	1 unit	1BO
	Type: N — Potential 1: N = 6×25 + 28×4 mm²		**8GB5020-5KM**		1	1 unit	1BO
	Type: PU — Potential 1: PE = 6×16 + 28×4 mm²		**8GB5021-5KM**		1	1 unit	1BO
 8GB5015-5KM	② **Terminal strips with screw terminals** Number of slots per distribution board: • 1 to 2-tier: 2 units • 3 to 4-tier: 3 units						
	Type: N/PE — Potential 1: N = 3×16 + 14×10 mm² — Potential 2: PE = 3×16 + 14×10 mm²		**8GB5008-5KM**		1	1 unit	1BO
	Type: N/N — Potential 1: N_1 = 3×16 + 14×10 mm² — Potential 2: N_2 = 3×16 + 14×10 mm²		**8GB5015-5KM**		1	1 unit	1BO
	Type: N — Potential 1: N = 6×16 + 28×10 mm²		**8GB5010-5KM**		1	1 unit	1BO
	Type: PU — Potential 1: PE = 6×16 + 28×10 mm²		**8GB5011-5KM**		1	1 unit	1BO
 8GB5005-5KM	③ **RCCB terminals** For distributing the neutral conductor to two RCCBs N = 3×16 + 2×10 mm²		**8GB5005-5KM**		1	1 unit	1BO
 8GB5006-5KM	④ **Door locking kits** • For snapping into door handle • With two keys		**8GB5006-5KM**		1	1 unit	1BO
 8GB4683	⑤ **Blanking strips** • 12 MW wide • Color: white • With increased flame protection up to 850 °C, hence suitable for hollow-wall distribution boards		**8GB4683**		1	10 units	1BO

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Benefits

- The wiring space behind the standard mounting rail is between 15 mm and 48 mm, ensuring fast and easy wiring
- The door can be hinged on the right or left without tools
- Door opening angle of 180°
- The withdrawable device rack ensures easy and fast assembly. The generous wiring space and clearly arranged modular design reduce assembly times by approx. 20%
- All plastic materials used can be recycled

Application

Due to the high degree of protection IP65, these small distribution boards can withstand harsh ambient conditions in both indoor and outdoor areas. Their resistance to dust and splashing water makes them ideal for use in a range of different application areas, such as car washes, farms, joiners' workshops, etc.

Special applications

Due to their large temperature operating range (-25 °C to +60 °C), UV radiation resistance and resistance to dust and splashing water, this small distribution board range is especially suitable for harsh ambient conditions.

Technical specifications

Rated current in A	Up to 63
Rated voltage in V AC	400
Rated insulation voltage acc. to IEC/EN 62208 (test values from IEC 61439-1) in V AC / DC	1000
Degree of protection	IP65
Safety class	2 (total insulation)
Color	Light gray RAL 7035
Temperature range	-20 °C to + 60 °C
Impact strength	IK07
Mounting rail spacing	150 mm
Standard mounting rail	35 × 7.5 mm (EN 60715)
Device mounting depth	70 mm
Standards	EN 61439-3, IEC 61439-3

Minimum order quantity (PS) or a multiple thereof can be ordered.

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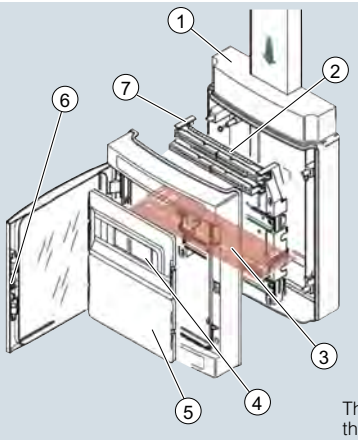
Surface-mounting distribution boards

Overview

Features
- In accordance with IEC 60439-3 and EN 61439-1/3
- Degree of protection IP65
- Can be used in outdoor areas (-20 °C to +60 °C)
- Safety class 2 (total insulation)
- UV-resistant
- Transparent doors
- Color: light gray RAL 7035

Mounting instructions
- N/PE terminal strips must be ordered separately
- 1 blanking strip is provided for each tier
- For device mounting depths up to 70 mm



1 Cover
2 Terminal strips
3 Partition
4 Blanking strip
5 Front cover
6 Door locking kit
7 Device holder

This illustration does not show the scope of delivery

Selection and ordering data

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
	Surface-mounting distribution boards						
	Type / External dimensions H × W × D in mm / Tiers × MW / (2) Slots N/PE terminal strips[1] No. x type						
 8GB1371-2	• 1-tier 210 × 143 × 100 210 × 215 × 100 260 × 298 × 140 285 × 410 × 140		1 × 4 / -- 1 × 8 / 1 × 8GB2052-0 1 × 12 / 1 × 8GB2052-1 1 × 18 / 1 × 8GB2052-2		**8GB1371-0** **8GB1371-1** **8GB1371-2** **8GB1371-3**	1 1 unit 1BO 1 1 unit 1BO 1 1 unit 1BO 1 1 unit 1BO	
 8GB1372-2	• 2-tier 420 × 298 × 140 463 × 410 × 140		2 × 12 / 2 × 8GB2052-1 2 × 18 / 2 × 8GB2052-2		**8GB1372-2** **8GB1372-3**	1 1 unit 1BO 1 1 unit 1BO	
 8GB1373-3	• 3-tier 655 × 410 × 140		3 × 18 / 2 × 8GB2052-2		**8GB1373-3**	1 1 unit 1BO	
 8GB1374-3	• 4-tier 878 × 410 × 160		4 × 18 / 4 × 8GB2052-2		**8GB1374-3**	1 1 unit 1BO	

[1] Not included in the scope of delivery of the device.

Minimum order quantity (PS) or a multiple thereof can be ordered.

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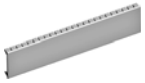
Accessories

	Version	SD	Article No. www.siemens.com/product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
 8GB2051-0	① **Covers** • For connection of conduit and cable duct entries • Convenient snap-on mounting on the distribution board						
	MW						
	• 12		**8GB2051-0**		1	20 units	1BO
	• 18		**8GB2051-1**		1	20 units	1BO
 8GB2052-0	② **N/PE terminal strips** For snapping onto device rack						
	MW / N / ⏚						
	• 8 / 1 × 25 mm² + 7 × 10 mm² / 1 × 25 mm² + 7 × 10 mm²		**8GB2052-0**		1	10 units	1BO
	• 12 / 3 × 25 mm² + 10 × 10 mm² / 3 × 25 mm² + 10 × 10 mm²		**8GB2052-1**		1	10 units	1BO
	• 18 / 5 × 25 mm² + 14× 10 mm² / 5 × 25 mm² + 14 × 10 mm²		**8GB2052-2**		1	10 units	1BO
 8GB2053-0	③ **Inner partitions** Horizontal						
	MW						
	• 12		**8GB2053-0**		1	10 units	1BO
	• 18		**8GB2053-1**		1	10 units	1BO
	⑤ **Front covers**						
	MW						
	• 12		**8GB2054-0**		1	20 units	1BO
	• 18		**8GB2054-1**		1	20 units	1BO
 8GB2055-0	⑥ **Safety cylinder locks** • With key • Made of metal		**8GB2055-0**		1	10 units	1BO
 8GK9910-0KK00	**Blanking strips** Color RAL 7035 (light gray)						
	Versions						
	• For 12 MW (1 MW = 18 mm)		**8GK9910-0KK00**		1	10 units	1BP

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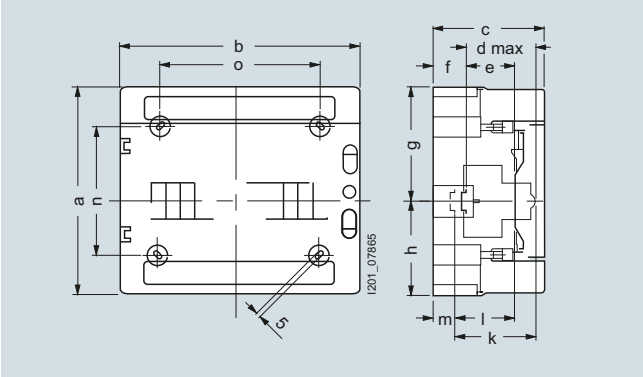
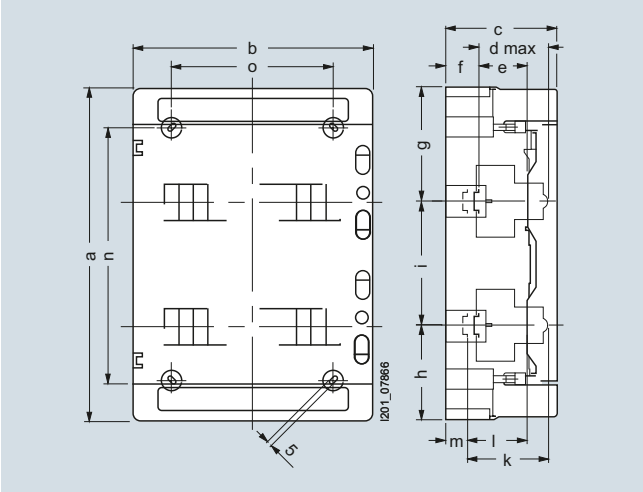
Surface-mounting distribution boards

Dimensional drawings



1-tier 8GB1371-0, 8GB1371-1, 8GB1371-2, 8GB1371-3



2-tier 8GB1372-2, 8GB1372-3
(3 and 4-tier versions not shown)

MW	Type	Dimensions													
		a	b	c	d_{max}	e	f	g	h	i	k	l	m	n	o
1 × 4	8GB1371-0	210	148	100	75	48	15	105	105	--	--	--	--	156	87
1 × 8	8GB1371-1	210	215	100	75	48	15	105	105	--	--	--	--	110	115
1 × 12	8GB1371-2	260	298	140	75	48	48	117.5	142.5	--	102	75	21	161	200
1 × 18	8GB1371-3	285	410	140	75	48	48	117.5	142.5	--	102	75	21	185	310
2 × 12	8GB1372-2	420	298	140	75	48	48	147.5	122.5	150	102	75	21	320	200
2 × 18	8GB1372-3	463	410	140	75	48	48	155.5	131.5	150	102	75	21	210	293
3 × 18	8GB1373-3	655	410	140	75	48	48	162.5	142.5	175	102	75	21	363	319
4 × 18	8GB1374-3	878	410	160	75	48	48	175	155.5	175	102	75	21	394	319

a = Distribution board height
b = Distribution board width
c = Distribution board depth
g = Device mounting depth
h = Wiring space behind the standard mounting rail

Minimum order quantity (PS) or a multiple thereof can be ordered.

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Appendix



20/2	**Catalog notes**
20/3	**Ordering notes**
20/5	**Further documentation**
20/9	**Quality management**
20/10	**Standards and approvals**
20/12	**Siemens contacts**
20/13	**Service & Support**
20/14	**Comprehensive support from A to Z**
20/15	**Software licenses**
20/17	**Conditions of sale and delivery**

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Overview

Trademarks

All product designations may be registered trademarks or product names of Siemens AG or supplier companies whose use by third parties for their own purposes may violate the rights of the owner.

Amendments

Unless stated otherwise on the individual pages of this catalog, we reserve the right to make changes, in particular to the specified values, measurements and weights.

Dimensions

All dimensions are given in mm.

Illustrations

The illustrations are not binding.

Technical specifications

The technical specifications are for general information purposes only. Always heed the operating instructions and notices on individual products during assembly, operation and maintenance.

Further technical information is available at
www.siemens.com/lowvoltage/product-support

- under "Entry type":
  - Application example
  - Certificate
  - Characteristic
  - Download
  - FAQ
  - Manual
  - Product note
  - Software archive
  - Technical data

Configurators can be found at
www.siemens.com/lowvoltage/configurators

Assembly, operation and maintenance

Always heed the operating instructions and notices on individual products during assembly, operation and maintenance.

Symbols

In the table below, you will find all symbols concerning connections that can occur in this catalog. In combination with orange highlighting, these identify special selection criteria.

Connections	
	Screw connection
	Ring cable lug connection
	Spring-loaded terminals

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Logistics

General

With regard to delivery service, communications and environmental protection, our logistics service ensures "quality from the moment of ordering right through to delivery". By designing our infrastructure according to customer requirements and implementing electronic order processing, we have successfully optimized our logistics processes.

We are proud of our personal consulting service, on-time deliveries and one-day transport within Germany.

To this end, we supply preferred types marked with ► ex works.

We regard the ISO 9001 certification and consistent quality checks as an integral part of our services.

Electronic order processing is fast, cost-efficient and error-free. Please contact us if you want to benefit from these advantages.

Packaging, packing units

The packaging in which our equipment is dispatched provides protection against dust and mechanical damage during transport, thus ensuring that all our products arrive in perfect condition.

We select our packaging for maximum environmental compatibility and reusability (e.g. crumpled paper for protection during transport in packages up to 32 kg) and, in particular, with a view to reducing waste.

With our multi-unit and reusable packaging, we offer you specific types of packaging that are both kind to the environment and tailored to your requirements:

Your advantages at a glance:

- Lower ordering costs.
- Cost savings through same-material type packaging: Low/no disposal costs.
- Reduced time and cost thanks to short unpacking times.
- "Just-in-time" delivery directly to the production line helps reduce stock: Cost savings through reduction of storage areas.
- Fast assembly thanks to supply in sets.
- Standard Euro boxes - corresponding to the Euro pallet modular system - suitable for most conveyor systems.
- Active contribution to environmental protection.

Unless stated otherwise in the "Selection and ordering data" of this catalog, our products are supplied individually packed.

For small parts/accessories, we offer you cost-effective packaging units as standard packs containing more than one item, e.g. 5, 10, 50 or 100 units. It is essential that whole number multiples of these quantities be ordered to ensure satisfactory quality of the products and problem-free order processing.

The products are delivered in a neutral carton. The label includes warning notices, the CE marking, and device descriptions in English and German.

In addition to the Article No. (MLFB) and the number of items in the packaging, the operating instructions article number (Instr.-Order-No.) is also specified. It can be obtained from your local Siemens representative (for a list of your Siemens contacts, see www.siemens.com/lowvoltage/contact).

Most device Article No.'s can be obtained by means of the EAN barcode to simplify ordering and storage logistics.

The associated master data, too, is available from your local Siemens representative.

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Ordering notes

Overview

Ordering special versions

When ordering products that differ from the standard versions listed in the catalog, **"–Z"** must be added to the Article No. indicated and the required features must be specified using alphanumeric order codes or plain text.

Ordering very small quantities

When very small orders are placed, the costs associated with order processing are greater than the order value. We therefore recommend that you combine several small orders. Where this is not possible, we regret that we are obliged to make a small processing charge: for orders with a net goods value of less than € 250 we charge an € 20 supplement to cover our order processing and invoicing costs.

Explanations of Selection and Ordering Data

Standard delivery time (SD)

SD in days (d)	The standard delivery times (SD) are valid ex works from Siemens AG (products ready for dispatch). Shipping times depend on the destination and the method of shipping. The standard shipping time for Germany is one day.	The specified standard delivery times are correct at the time of going to print and are subject to constant optimization. Up-to-date information can be found at www.siemens.com/industrymall.
► Preferred type	Preferred types are device types that can be delivered immediately ex works, i.e. they are dispatched within 24 hours. If ordered in normal quantities, the products are usually delivered within the specified delivery times, calculated from the date we receive your order. In exceptional cases, delivery times may vary from those specified.	
X On request	In such cases, the delivery time can be queried.	

Price units (PU)

The price unit defines the number of units, sets or meters to which the specified price applies.

Packaging size (PS)

The packaging size defines the number of units, sets or meters, for example, for outer packaging.

Only the quantity defined by the packaging size or a multiple thereof can be ordered.

Price group (PG)

Each product is allocated to a price group.

Example

5TT3400

SD: Preferred type
PG: 1BK
Ordering quantity 1 unit or a multiple thereof

8US1923-5CA02

PG: 1CU
Ordering quantity 10 units or a multiple thereof

8WH9000-1GA00

PG: 1BT
Ordering quantity 50 units or a multiple thereof

SD d	Article No.	Price per PU	PU (UNIT, SET, M)	PS*	PG
►	**5TT3400**		1	1 unit	1BK
	8US1923-5CA02		1	10 units	1CU
	8WH9000-1GA00		100	50 units	1BT

Note:

The article numbers shown here and the specifications regarding selection and ordering data are examples only. When ordering, always use the selection and ordering data in the product chapters.

Metal surcharges/export markings

To compensate fluctuating prices of raw materials (for example silver, copper, aluminum, lead, gold, dysprosium and neodymium), surcharges are calculated on a daily basis for products containing these raw materials using the metal factor.
A surcharge for the particular raw material is added to the price of a product if the basic quotations for this raw material are exceeded.

Each product's metal factor dictates for which raw materials the metal surcharges are calculated, from which quotation and with which calculation method (weight or percentage method).

An exact explanation of the metal factor can be found at www.siemens.com/automation/salesmaterial-as/catalog/en/terms_of_trade_en.pdf

A product's export markings/metal surcharges are updated daily at www.siemens.com/industrymall.

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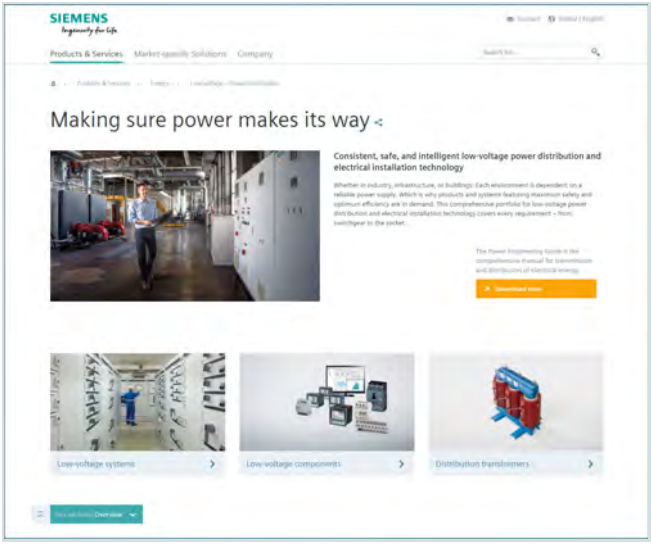
Low-Voltage Power Distribution and Electrical Installation Technology on the WWW



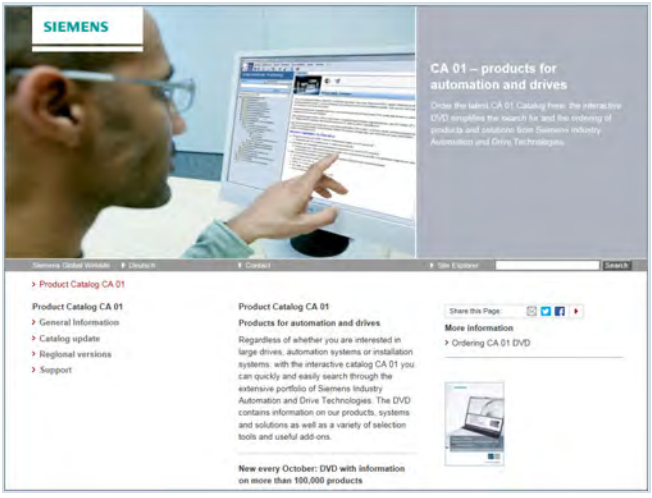
On the Internet you will find a host of information all about low-voltage power distribution and electrical installation technology products, such as:

- Overview of our product portfolio
- Background information, news and dates
- Videos, podcasts and newsletters
- Links to blogs and Twitter
- Brochures, catalogs, operating instructions and manuals for direct download

Visit us online and get to know our product range!

www.siemens.com/lowvoltage

Product selection using the interactive catalog CA 01



Detailed information together with user-friendly interactive functions

The interactive catalog CA 01 covers more than 100 000 products, thus providing a comprehensive overview of the product range provided by Siemens.

You can find everything you need here for solving automation, switching, installation and drive technology tasks. All information is provided over a user interface that is both user-friendly and intuitive.

Information about the interactive catalog CA 01 can be found on the Internet at:

www.siemens.com/automation/ca01

or on DVD.

Industry Mall



The Industry Mall – for online information, product selection and ordering

- Detailed information including product data, illustrations, certificates and CAx data
- Simple configuring of systems
- Possible to request individualized quotations
- Availability check
- Online ordering facility
- Order tracking/order overview
- Fast access to relevant training offers and services

You can find the Industry Mall on the Internet at

www.siemens.com/industrymall

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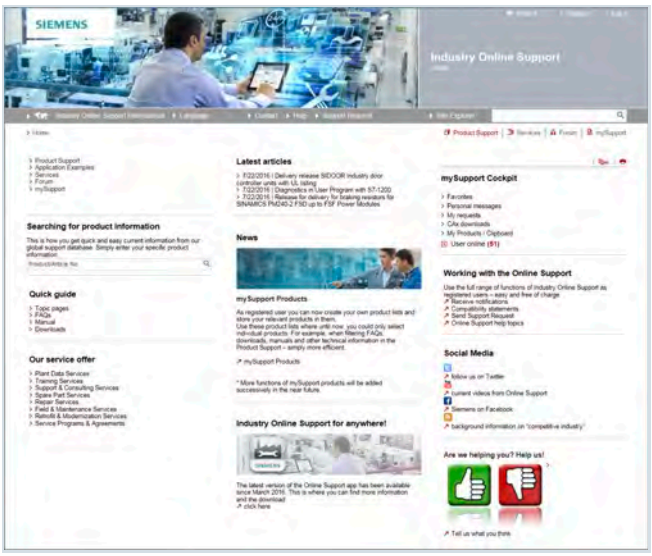
Further documentation

Industry Online Support

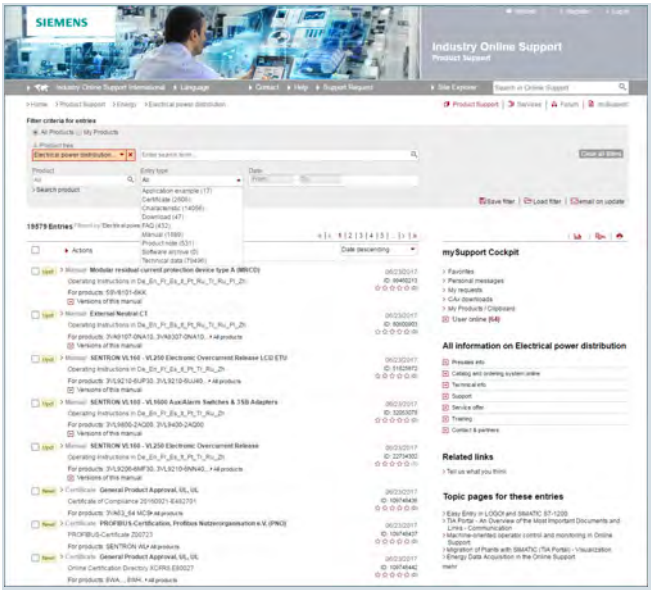


Comprehensive support – at any time, whatever your location

- FAQs, sample applications, information about successor products and product news
- Prompt assistance with technical queries
- Discussions and best practice sharing with other users in the forum
- Provision of high-quality product data for your planning programs
- Faster access to information – with helpful filter and folder functions in mySupport
- Automatic notification service to keep you up to date with the latest information about topics of interest to you

You can find Siemens Industry Online Support on the Internet at:

www.siemens.com/online-support



In the "Entry type" selection box in Product Support, you will find the following:

- Application example
- Certificate
- Characteristic
- Download
- FAQ
- Manual
- Product note
- Software archive
- Technical data

www.siemens.com/lowvoltage/product-support

In addition, the Low-Voltage Power Distribution and Electrical Installation Technology catalogs are also available there.

www.siemens.com/lowvoltage/catalogs

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Industry Online Support App



Main functions at a glance

- Scanning of product codes (EAN/QR and data matrix codes) with direct display of all technical information on the product, including graphic data (CAx data).
- Delivery of product information or entries by email, so that the information can immediately be processed at the workplace.
- Submission of queries to Technical Support (Support Requests). With photo function for transmitting detailed information.
- Contents and interfaces available in 6 languages (German, English, French, Italian, Spanish and Chinese) – including option of temporary switchover to English.
- Offline cache function for all favorites stored in "mySupport". These entries can also be retrieved without network reception.
- Import of PDF documents into a library (e.g. iBooks or similar).

You can find information on the Industry Online Support App on the Internet at

www.siemens.com/industry/onlinesupportapp

SIEMENS

Android:

GET IT ON Google Play

Industry Online Support App ANDROID

Apple iOS:

Download on the App Store

Industry Online Support App iOS

Windows:

Get it from Microsoft

Industry Online Support App WINDOWS

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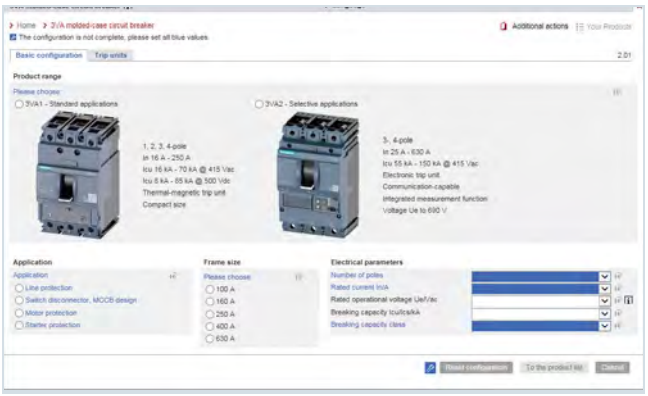
Further documentation

Product configurator



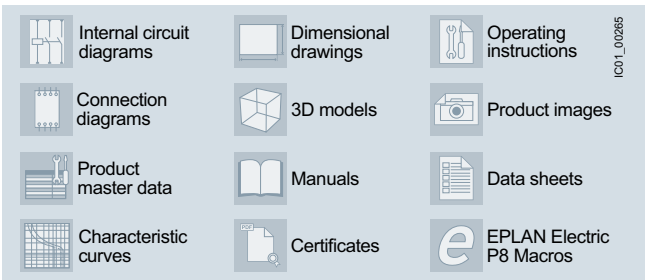
Finding the right product faster

- Complete selection of products and systems based on technical characteristics or application requirements
- Simple, intuitive operation
- Option to save the configuration and order lists in a file format of your choice (txt, pdf, xls, csv)
- Direct transfer of the order list into the shopping cart of the Siemens Industry Mall
- Fast access to product data, diagrams, certificates and CAx data for the selected product and system configuration
- Available in multiple languages for use by customers anywhere in the world

The configurators are available online in the Siemens Industry Mall and offline in Catalog CA 01.
You can find our configurators at the following website:

www.siemens.com/lowvoltage/configurators

CAx Download Manager



You can find the CAx Download Manager on the Internet at

www.siemens.com/lowvoltage/cax

Time savings of up to 80% with universal product data for your CAE and CAD systems

The CAx Download Manager can supply you with all the necessary CAx file types for the products of your choice for use in all common CAE and CAD systems. The data contained in the files is continuously updated. The whole process involves only four selection steps and is free of charge. All your selected files are packed into a zip file which you can download for further use.

Siemens makes available up to 12 file types to support your mechanical (CAD) and electrical (CAE) planning processes for you to download at any time of the day.

- No manual data collection necessary
- Universal manufacturer data for all common CAE and CAD systems
- Standardized documentation is simple to generate
- Choice of different languages for system commissioning anywhere in the world

My Documentation Manager



In "mySupport" you can compile individual documentation for your project by dragging and dropping

* e.g. Low Voltage Directive 2006/95/EC and EC Machinery Directive 2006/42/EC

You can find My Documentation Manager on the Internet at

www.siemens.com/lowvoltage/mdm

User-friendly compilation of project-specific documentation

In accordance with directives*, the documentation is part of the plant and requires certification, thus giving the purchaser the right to full plant documentation.

To support you in this, a manual configurator has been developed with which you can put together individual and standard-compliant documentation – fully in accordance with the relevant project-specific requirements.

You can thus select the chapters relevant to the respective project from the available manuals of the installed Siemens components. FAQs, certificates, data sheets and your own content can also be incorporated.

- Compile and structure manuals, data sheets, FAQs and certificates simply by dragging and dropping
- Insert personalized content via the Notes function
- Further processing possible thanks to selectable export formats (pdf, xml, rtf)
- After generating the documentation, automatic translation into the desired language is possible
- Always up-to-the minute thanks to the Update function

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Overview

The quality management system of our "Low Voltage & Products" Business Unit in the "Energy Management" Division complies with the international EN ISO 9001 standard.

The products and systems listed in this catalog are developed and manufactured using a certified quality management system in accordance with EN ISO 9001:2008.

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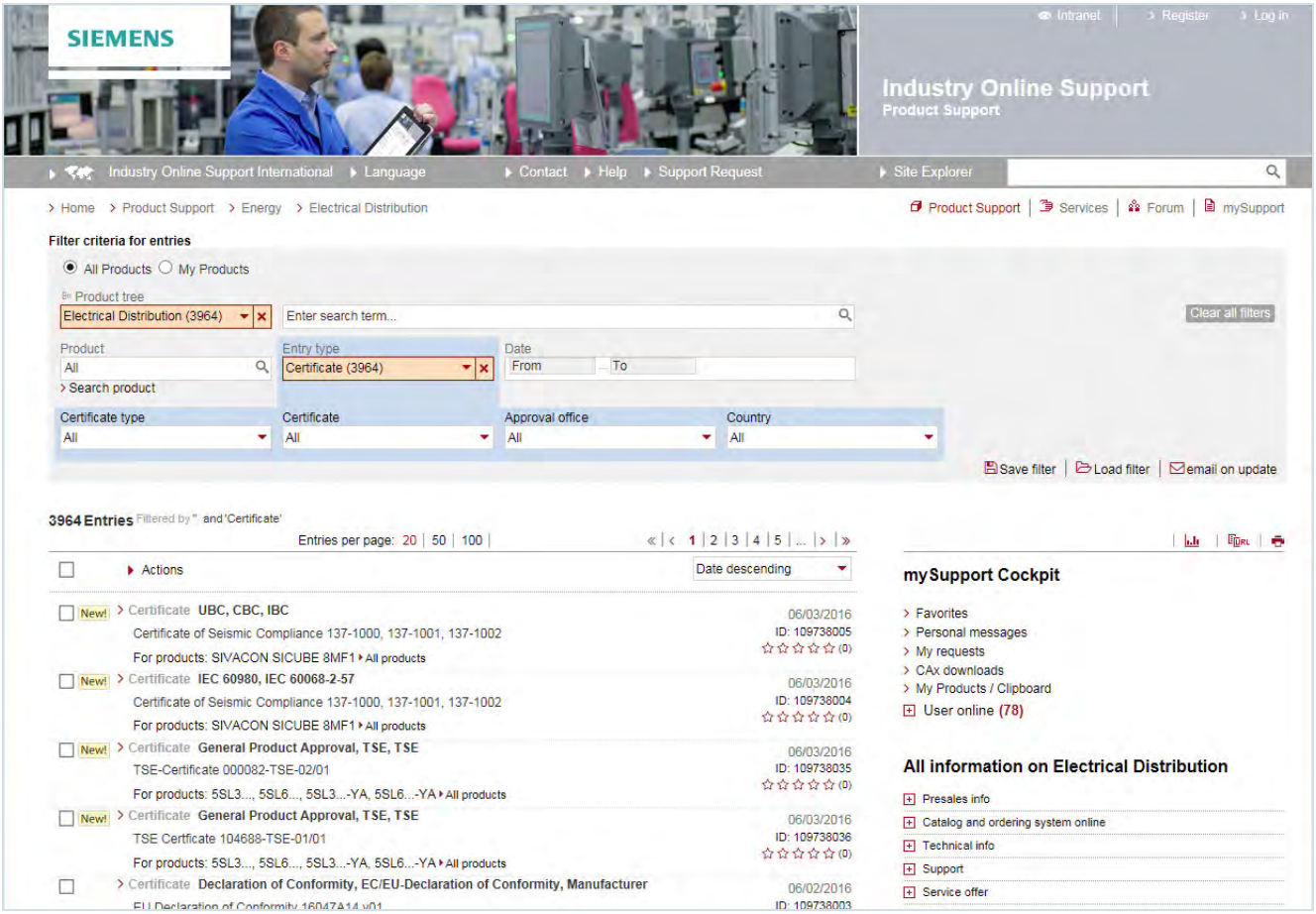
Overview

Certificates

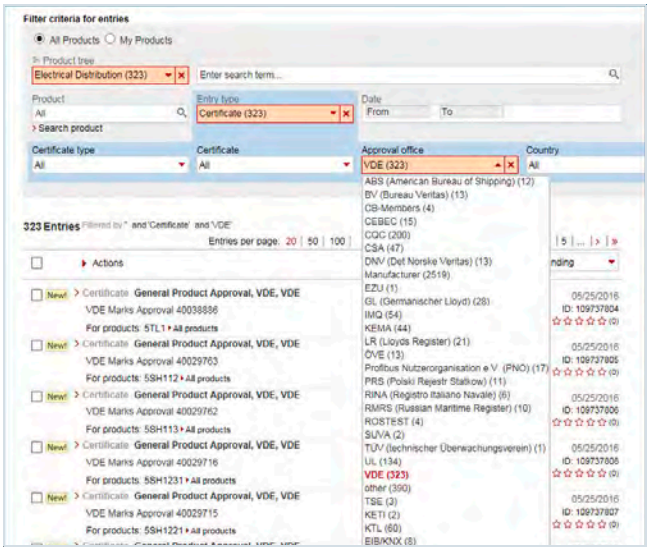
An overview, updated on a daily basis, of our products certified in accordance with CE, UL, CSA, FM, shipping authorizations etc. for low-voltage power distribution and electrical installation products can be found on the Internet at

www.siemens.com/lowvoltage/certificates



In the **Entry list**, you can **filter the view** in order to quickly find comprehensive information on the following subjects:

- Product or search term
- Date
- Type of certificate (general product approval, test certificates, shipping approval, ...)
- Certificate (confirmations, UL, VDE,...)
- Approval office (TÜV, VDE, UL, ...)
- Country



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Approval requirements valid in different countries

Siemens low-voltage switchgear and controlgear are designed, manufactured and tested according to the relevant German standards (DIN and VDE), IEC publications and European standards (EN) as well as CSA and UL standards. You will find the standards assigned to the single devices in the relevant certificates at

www.siemens.com/lowvoltage/certificates

In addition to the pertinent VDE, EN and IEC standards, the requirements of the various regulations valid in other countries have also been taken into account in the design of the equipment in some cases, in order that the devices can be deployed globally as far as possible.

In some countries an approval is required for certain low-voltage switchgear and controlgear components. Depending on the market requirements, these devices have been submitted for approval to the authorized testing institutes.

In some cases, CSA for Canada and UL for the USA only approve special versions. Such special versions are listed separately from the standard versions in the relevant parts of this catalog.

For this equipment, there are sometimes limits with regard to the maximum permissible voltages, currents and rated outputs or special approvals and, in some cases, special identification may be required.

For use on board ship, the specifications of the marine classification societies must be observed. In some cases, they require type tests of the components to be approved.

For more information on UL, visit

www.siemens.com/applicationconsulting/ul

If you have any questions concerning UL/CSA approvals, please contact Technical Support:
www.siemens.com/lowvoltage/contact

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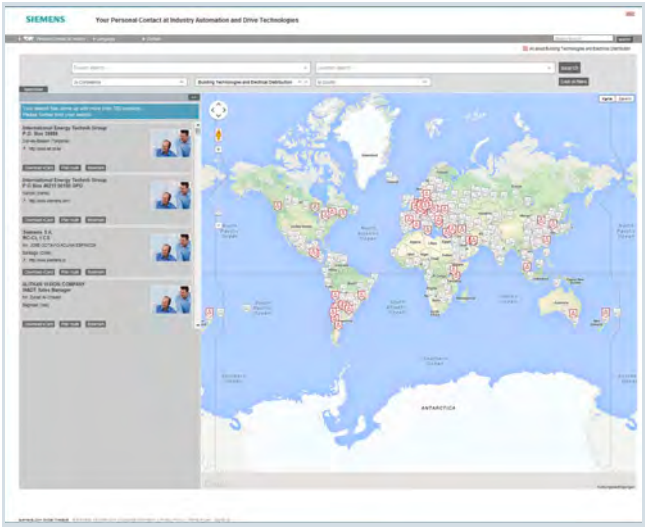
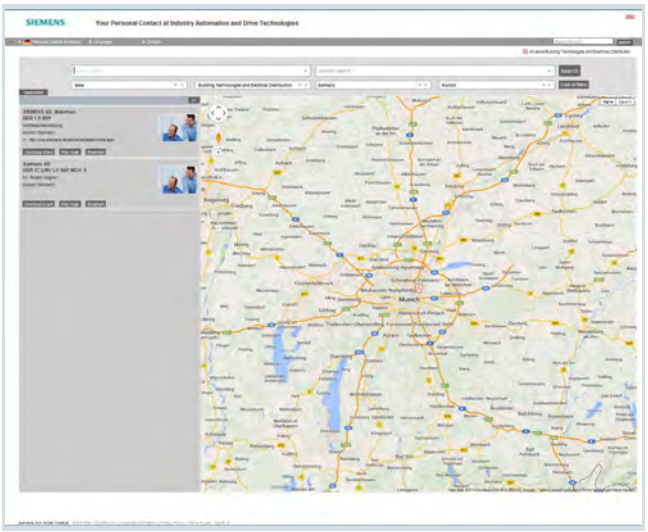
Siemens contacts

Contacts for low-voltage power distribution and electrical installation technology





With low-voltage power distribution and electrical installation technology we consistently pursue one goal:

long-term improvement of your competitive ability.

We are committed to this goal. Thanks to our dedication, we are continually setting new standards. In all industries – worldwide.

At your service, locally, around the globe: Partners for consulting, sales, training, service, support, spare parts ... on the entire range of low-voltage power distribution and electrical installation technology.

Your personal contact can be found in our Contact Database at

www.siemens.com/lowvoltage/contact

You start by selecting a

- Required competence
- Product or sector
- Country
- City

or by performing a

- search for a specific location or
- individual.

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Unrivaled complete range of services over the entire life cycle

Online Support



Our comprehensive online information platform covers every aspect of our Service & Support and is available whenever, wherever.

You will find further information at
www.siemens.com/online-support
www.siemens.com/lowvoltage/product-support

Field Service



Siemens Field Service offers support with all aspects of maintenance – so that the availability of your machines and plants is assured whatever the case.

You will find further information at
www.siemens.com/com/lowvoltage/contact

Technical Support



The competent consulting service for technical issues with a broad range of customer-oriented services for all our products and systems.

Assistance with technical queries is provided at
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You can find your local contacts at
www.siemens.com/lowvoltage/contact

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Plants and systems in all industries worldwide are expected to meet ever higher levels of availability.
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Specification texts

You can obtain qualified, free support to help you produce specifications for technically equipping non-residential and industrial buildings at
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Comprehensive support from A to Z

Overview

Product information	
Website	Fast and targeted information on low-voltage power distribution and electrical installation technology: www.siemens.com/lowvoltage
Newsletter	Always up to date about our trend-setting products and systems: www.siemens.com/lowvoltage/newsletter
Product information/product & system selection	
Siemens Industry Online Support	Low-Voltage Power Distribution and Electrical Installation Technology catalogs www.siemens.com/lowvoltage/catalogs
Industry Mall	Comprehensive information and order platform for the Siemens Industry Basket: www.siemens.com/lowvoltage/mall
CA 01	Every product for automation and drive technology, Interactive Catalog, DVD
Product and system engineering	
SIMARIS planning tools	Support in planning and configuring the electrical power distribution: www.siemens.com/simaris
SIMARIS configuration configuration software	Support throughout the entire configuration cycle from the configuration of SIVACON S8 switchboards, ALPHA distribution boards, cost calculations and quotation preparation, right through to the creation of plant documentation: www.siemens.com/simarisconfig
Software for power loss calculations - SIMARIS therm	Support in performing power loss calculations for the dimensioning of control cabinets: www.siemens.com/simaristherm
Product documentation	
Siemens Industry Online Support	Comprehensive technical information – from planning to configuration and operation: www.siemens.com/online-support www.siemens.com/lowvoltage/product-support
Product configurator	Complete selection of products and systems based on technical characteristics or application requirements: www.siemens.com/lowvoltage/configurators
CAx Download Manager	Collation of CAx data types for standard CAE and CAD systems: www.siemens.com/lowvoltage/cax
My Documentation Manager	Compilation of project-specific documentation: www.siemens.com/lowvoltage/mdm
Image database	Collection of product photographs and graphics, such as dimensional drawings and internal circuit diagrams: www.siemens.com/lowvoltage/picturedb
Product training	
SITRAIN Portal	Comprehensive training program for our products, systems and engineering tools: www.siemens.com/lowvoltage/training
Product hotline	
Technical Support	Support in all technical queries about our products: www.siemens.com/lowvoltage/contact www.siemens.com/lowvoltage/support-request

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Overview

Software types

Software requiring a license is categorized into types.
The following software types have been defined:

- Engineering software
- Runtime software

Engineering software

This includes all software products for creating (engineering) user software, e.g. for configuring, programming, parameterizing, testing, commissioning or servicing.

Data generated with engineering software and executable programs can be duplicated for your own use or for use by third-parties free-of-charge.

Runtime software

This includes all software products required for plant/machine operation, e.g. operating system, basic system, system expansions, drivers, etc.

The duplication of the runtime software and executable programs created with the runtime software for your own use or for use by third-parties is subject to a charge.

You can find information about license fees according to use in the ordering data (e.g. in the catalog). Examples of categories of use include per CPU, per installation, per channel, per instance, per axis, per control loop, per variable, etc.

Information about extended rights of use for parameterization/configuration tools supplied as integral components of the scope of delivery can be found in the readme file supplied with the relevant product(s).

License types

Siemens Industry Automation & Drive Technologies offers various types of software license:

- Floating license
- Single license
- Rental license
- Rental floating license
- Trial license
- Demo license
- Demo floating license

Floating license

The software may be installed for internal use on any number of devices by the licensee. Only the concurrent user is licensed. The concurrent user is the person using the program. Use begins when the software is started.
A license is required for each concurrent user.

Single license

Unlike the floating license, a single license permits only one installation of the software per license.

The type of use licensed is specified in the ordering data and in the Certificate of License (CoL). Types of use include for example per instance, per axis, per channel, etc.

One single license is required for each type of use defined.

Rental license

A rental license supports the "sporadic use" of engineering software. Once the license key has been installed, the software can be used for a specific period of time (the operating hours do not have to be consecutive).
One license is required for each installation of the software.

Rental floating license

The rental floating license corresponds to the rental license, except that a license is not required for each installation of the software. Rather, one license is required per object (for example, user or device).

Trial license

A trial license supports "short-term use" of the software in a non-productive context, e.g. for testing and evaluation purposes. It can be transferred to another license.

Demo license

The demo license support the "sporadic use" of engineering software in a non-productive context, for example, use for testing and evaluation purposes. It can be transferred to another license. After the installation of the license key, the software can be operated for a specific period of time, whereby usage can be interrupted as often as required.

One license is required per installation of the software.

Demo floating license

The demo floating license corresponds to the demo license, except that a license is not required for each installation of the software. Rather, one license is required per object (for example, user or device).

Certificate of License (CoL)

The CoL is the licensee's proof that the use of the software has been licensed by Siemens. A CoL is required for every type of use and must be kept in a safe place.

Downgrading

The licensee is permitted to use the software or an earlier version/release of the software, provided that the licensee owns such a version/release and its use is technically feasible.

Delivery versions

Software is constantly being updated.
The following delivery versions

- PowerPack
- Upgrade

can be used to access updates.

Existing bug fixes are supplied with the ServicePack version.

PowerPack

PowerPacks can be used to upgrade to more powerful software. The licensee receives a new license agreement and CoL (Certificate of License) with the PowerPack. This CoL, together with the CoL for the original product, proves that the new software is licensed.
A separate PowerPack must be purchased for each original license of the software to be replaced.

Upgrade

An upgrade permits the use of a new version of the software on the condition that a license for a previous version of the product is already held.
The licensee receives a new license agreement and CoL with the upgrade. This CoL, together with the CoL for the previous product, proves that the new version is licensed.
A separate upgrade must be purchased for each original license of the software to be upgraded.

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Software licenses

Overview

ServicePack

ServicePacks are used to debug existing products. ServicePacks may be duplicated for use as prescribed according to the number of existing original licenses.

License key

Siemens Industry Automation & Drive Technologies supplies software products with and without license keys.

The license key serves as an electronic license stamp and is also the "switch" for activating the software (floating license, rental license, etc.).

The complete installation of software products requiring license keys includes the program to be licensed (the software) and the license key (which represents the license).

Software Update Service (SUS)

As part of the SUS contract, all software updates for the respective product are made available to you free of charge for a period of one year from the invoice date. The contract will automatically be extended for one year if it is not canceled three months before it expires.

The possession of the current version of the respective software is a basic condition for entering into an SUS contract.

You can download explanations concerning license conditions from
www.siemens.com/automation/salesmaterial-as/catalog/en/terms_of_trade_en.pdf

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1. General standards

By using this catalog you can acquire hardware and software products described therein from Siemens AG subject to these conditions of sale and delivery (hereinafter: CSD). Please note: the scope, the quality and the conditions for supplies and services, including software products, by any Siemens group or Regional Company having a registered office outside of Germany, shall be subject exclusively to the General Terms and Conditions of the respective Siemens entity. These CSD apply exclusively for orders placed with Siemens AG, Germany.

1.1 For customers with a seat or registered office in Germany

For customers with a seat or registered office in Germany, the following shall be subordinate to these CSD

- the "General Terms of Payment"[1)] and
- for software products, the "General License Conditions for Software Products for Automation and Drives for Customers with a Seat or Registered Office in Germany"[1)] and
- the "General Conditions for the Supply of Products and Services of the Electrical and Electronics Industry"[1)] for other deliveries and services.

1.2 For customers with a seat or registered office outside of Germany

For customers with a seat or registered office outside of Germany, the following shall be subordinate to these CSD

- the "General Terms of Payment"[1)] and
- for software products, the "General License Conditions for Software Products for Automation and Drives for Customers with a Seat or Registered Office outside of Germany"[1)] and
- the "General Conditions for Supplies of Siemens Industry for Customers with a Seat or Registered Office outside of Germany"[1)] for other deliveries and services.

2. Prices

The prices are in € (Euro) ex works, excluding packaging.

The sales tax (value added tax) is not included in the prices. It shall be debited separately at the respective rate according to the applicable legal regulations.

Prices are subject to change without prior notice. We will debit the prices valid at the time of delivery.

To compensate fluctuating prices of raw materials (for example silver, copper, aluminum, lead, gold, dysprosium and neodymium), surcharges are calculated on a daily basis for products containing these raw materials using the metal factor. A surcharge for the particular raw material is added to the price of a product if the basic quotations for this raw material are exceeded.

Each product's metal factor dictates for which raw materials the metal surcharges are calculated, from which quotation and with which calculation method (weight or percentage method).

An exact explanation of the metal factor can be found at www.siemens.com/automation/salesmaterial-as/catalog/en/terms_of_trade_en.pdf

The surcharge will be calculated (except in the case of dysprosium and neodymium) on the basis of the official price on the day prior to receipt of the order or prior to the release order for calculation of the surcharge.

In the event of placement of an order, the relevant three-month average price from the quarter prior to order receipt or the release order shall be used with a one-month buffer to calculate the dysprosium and neodymium surcharge ("rare earths") (you will find details in the aforementioned explanation of the metal factor).

3. Additional terms and conditions

All dimensions are in mm. In Germany, according to the German law on units in metrology, data in inches only apply to devices for export.

Illustrations are not binding.

Insofar as there are no remarks on the corresponding pages of this catalog - especially with regard to data, dimensions and weights given - these are subject to change without prior notice.

4. Export regulations

We shall not be obligated to fulfill this agreement if such fulfillment is prevented by any impediments arising out of national or international foreign trade or customs requirements or any embargoes or other sanctions.

Export of the products listed in this catalog may be subject to authorization. In delivery information, we label authorization obligations according to German, European and US export lists. Goods labeled with an "AL" not equal to "N" are subject to European or German export authorization when being exported out of the EU. Goods labeled with "ECCN" not equal to "N" are subject to a US re-export authorization.

Please note that you can also preview the export designations in the respective product description via our "Industry Mall" online catalog system. The deciding factors, however, are the AL or ECCN export designations indicated on order confirmations, delivery notes and invoices.

Even if goods are not labeled, or labeled "AL:N" or "ECCN:N", they may still be subject to export authorization based on the final destination and end use of the goods.

If you transfer goods (hardware and/or software and/or technology as well as corresponding documentation, regardless of the mode of provision) delivered by us or works and services (including all kinds of technical support) performed by us to a third party worldwide, you shall comply with all applicable national and international (re-) export control regulations.

If required to conduct export control checks, you, at our request, shall promptly provide us with all information pertaining to particular end customers, destination and intended use of goods, works and services provided by us, as well as any relevant export control restrictions.

The products listed in this catalog may be subject to European/German and/or US export regulations. Therefore, any export requiring a license is subject to approval by the competent authorities.

Errors excepted and subject to change without prior notice.

1) You can download the text of the Siemens AG terms and conditions of trade at www.siemens.com/automation/salesmaterial-as/catalog/en/terms_of_trade_en.pdf

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Notes

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Catalogs

Digital Factory, Process Industries and Drives and Energy Management

Further information can be obtained from our branch offices listed at www.siemens.com/lowvoltage/contact

Interactive Catalog on DVD	*Catalog*
Products for Automation and Drives	**CA 01**
Building Control	
GAMMA Building Control	ET G1
Drive Systems	
SINAMICS G130 Drive Converter Chassis Units SINAMICS G150 Drive Converter Cabinet Units	D 11
SINAMICS GM150, SINAMICS SM150 Medium-Voltage Converters	D 12
Digital: SINAMICS PERFECT HARMONY GH180 Medium-Voltage Air-Cooled Drives (Germany	*D 15.1*
SINAMICS G180 Converters – Compact Units, Cabinet Systems, Cabinet Units Air-Cooled and Liquid-Cooled	D 18.1
SINAMICS S120 Chassis Format Units and Cabinet Modules SINAMICS S150 Converter Cabinet Units	D 21.3
SINAMICS S120 and SIMOTICS	D 21.4
SINAMICS DCM DC Converter, Control Module	D 23.1
SINAMICS Inverters for Single-Axis Drives · Built-In Units	D 31.1
SINAMICS Inverters for Single-Axis Drives · Distributed Inverters	D 31.2
SINAMICS G120P and SINAMICS G120P Cabinet pump, fan, compressor converters	D 35
LOHER VARIO High Voltage Motors Flameproof, Type Series 1PS4, 1PS5, 1MV4 and 1MV5 Frame Size 355 to 1000, Power Range 80 to 7100 kW	D 83.2
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High Voltage Three-phase Induction Motors SIMOTICS HV Series A-compact PLUS	D 84.9
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SIMOVERT PM Modular Converter Systems	DA 45
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MICROMASTER 411/COMBIMASTER 411	DA 51.3
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SIMOTOCS S-1FG1 Servo geared motors	D 41
SIMOTICS Low-Voltage Motors	D 81.1
SIMOTICS FD Low-Voltage Motors	D 81.8
LOHER Low-Voltage Motors	D 83.1
Digital: MOTOX Geared Motors	*D 87.1*
SIMOGEAR Geared Motors	MD 50.1
SIMOGEAR Electric-monorail geared motors Light-load and heavy-load applications	MD 50.8
SIMOGEAR Gearboxes with adapter	MD 50.11
Mechanical Driving Machines	
FLENDER Standard Couplings	MD 10.1
FLENDER High Performance Couplings	MD 10.2
FLENDER Backlash-free Couplings	MD 10.3
FLENDER SIP Standard industrial planetary gear units	MD 31.1

Process Instrumentation and Analytics	*Catalog*
Digital: Field Instruments for Process Automation	*FI 01*
Digital: Display Recorders SIREC D	*MP 20*
Digital: SIPART Controllers and Software	*MP 31*
Products for Weighing Technology	WT 10
Digital: Process Analytical Instruments	*AP 01*
Digital: Process Analytics, Components for Continu- ous Emission Monitoring	*AP 11*
Low-Voltage Power Distribution and Electrical Installation Technology	
SENTRON · SIVACON · ALPHA Protection, Switching, Measuring and Monitoring Devices, Switchboards and Distribution Systems	LV 10
Standards-Compliant Components for Photovoltaic Plants	LV 11
Electrical Components for the Railway Industry	LV 12
Power Monitoring Made Simple	LV 14
Components for Industrial Control Panels according to UL Standards	LV 16
3WT Air Circuit Breakers up to 4000 A	LV 35
3VT Molded Case Circuit Breakers up to 1600 A	LV 36
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Digital: ALPHA Distribution Systems	*LV 51*
ALPHA FIX Terminal Blocks	LV 52
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SIVACON 8PS Busbar Trunking Systems	LV 70
Digital: DELTA Switches and Socket Outlets	*ET D1*
Vacuum Switching Technology and Components for Medium Voltage	HG 11.01
Motion Control	
SINUMERIK 840 Equipment for Machine Tools	NC 62
SINUMERIK 808 Equipment for Machine Tools	NC 81.1
SINUMERIK 828 Equipment for Machine Tools	NC 82
SIMOTION Equipment for Production Machines	PM 21
Digital: Drive and Control Components for Cranes	*CR 1*
Power Supply	
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Safety Integrated	
Safety Technology for Factory Automation	SI 10
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Human Machine Interface Systems/ PC-based Automation	ST 80/ ST PC
SIMATIC Ident	
Industrial Identification Systems	ID 10
SIMATIC Industrial Automation Systems	
Products for Totally Integrated Automation	ST 70
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SIMATIC PCS 7 Process Control System Technology components	ST PCS 7 T
Add-ons for the SIMATIC PCS 7 Process Control System	ST PCS 7 AO
SIMATIC S7-400 advanced controller	ST 400
SIMATIC NET	
Industrial Communication	IK PI
SIRIUS Industrial Controls	
SIRIUS Industrial Controls	IC 10

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Token fee: 10.00 €

Security information

Siemens provides products and solutions with industrial security functions that support the secure operation of plants, systems, machines and networks.

In order to protect plants, systems, machines and networks against cyber threats, it is necessary to implement – and continuously maintain – a holistic, state-of-the-art industrial security concept. Siemens' products and solutions constitute one element of such a concept.

Customers are responsible for preventing unauthorized access to their plants, systems, machines and networks. Such systems, machines and components should only be connected to an enterprise network or the internet if and to the extent such a connection is necessary and only when appropriate security measures (e.g. firewalls and/or network segmentation) are in place.

For additional information on industrial security measures that may be implemented, please visit **http://www.siemens.com/industrialsecurity.**

Siemens' products and solutions undergo continuous development to make them more secure. Siemens strongly recommends that product updates are applied as soon as they are available and that the latest product versions are used. Use of product versions that are no longer supported, and failure to apply the latest updates may increase customer's exposure to cyber threats.

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