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SENTRON

3VA Molded Case Circuit Breakers with UL and IEC Certification

Edition
10/2017

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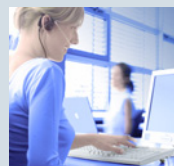


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Technical Support



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

www.siemens.com/lowvoltage/technical-support

3VA Molded Case Circuit Breakers with UL and IEC Certification

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3VA Molded Case Circuit Breakers with UL and IEC Certification · 10/2017

Supersedes:
3VA Molded Case Circuit Breakers with UL Certification
10/2016

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

Please contact your local Siemens branch.

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Introduction

1

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

2

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

3

Accessories and Spare Parts

4

Appendix

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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.



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".

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.

Planning Efficiency

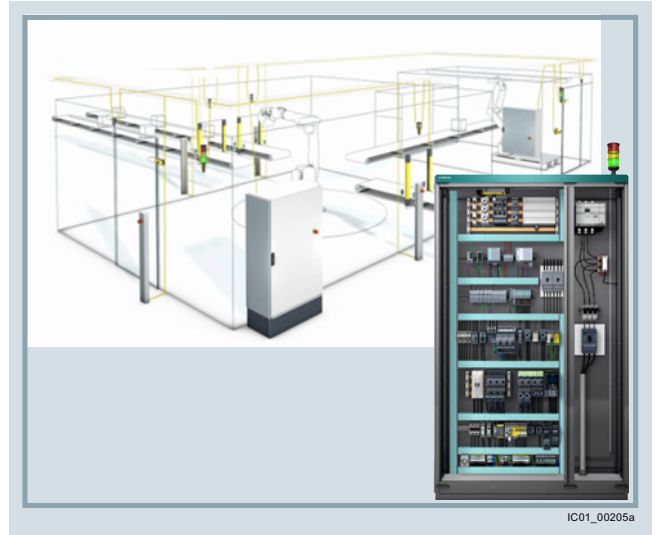
Overview

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.



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



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

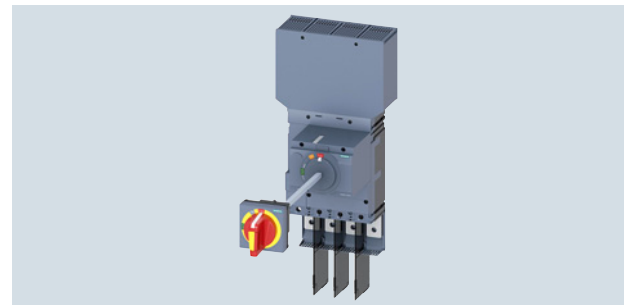
Using the EPLAN Electric P8 Macro in .edz exchange format (EPLAN Data Archived Zipped) the overall time required for data integration can be further reduced. With just a few clicks, the data types for any number of article numbers can be imported and combined. In this way, it is possible for the installed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

At a glance

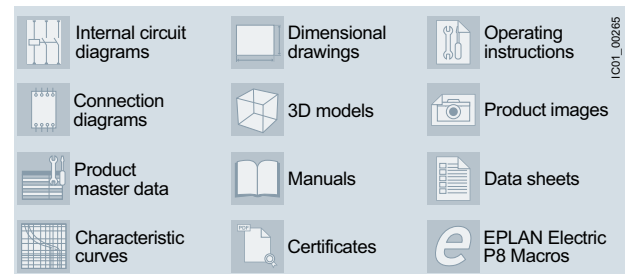
Without Planning Efficiency a lot of time would often be lost due to manual data transmission. Now you are able to concentrate on the essentials. All necessary information and product data is provided by Siemens for easy retrieval.

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

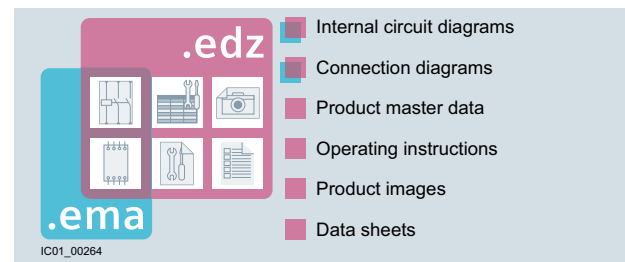
For more information, see www.siemens.com/planning-efficiency.



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

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.

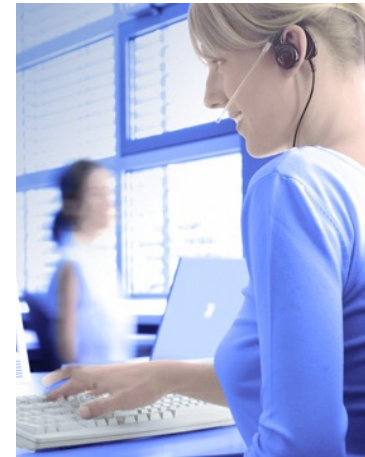
Still have questions?

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



1201_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.

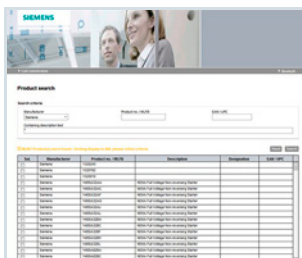
www.siemens.com/lowvoltage/product-support



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

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 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-SENER

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

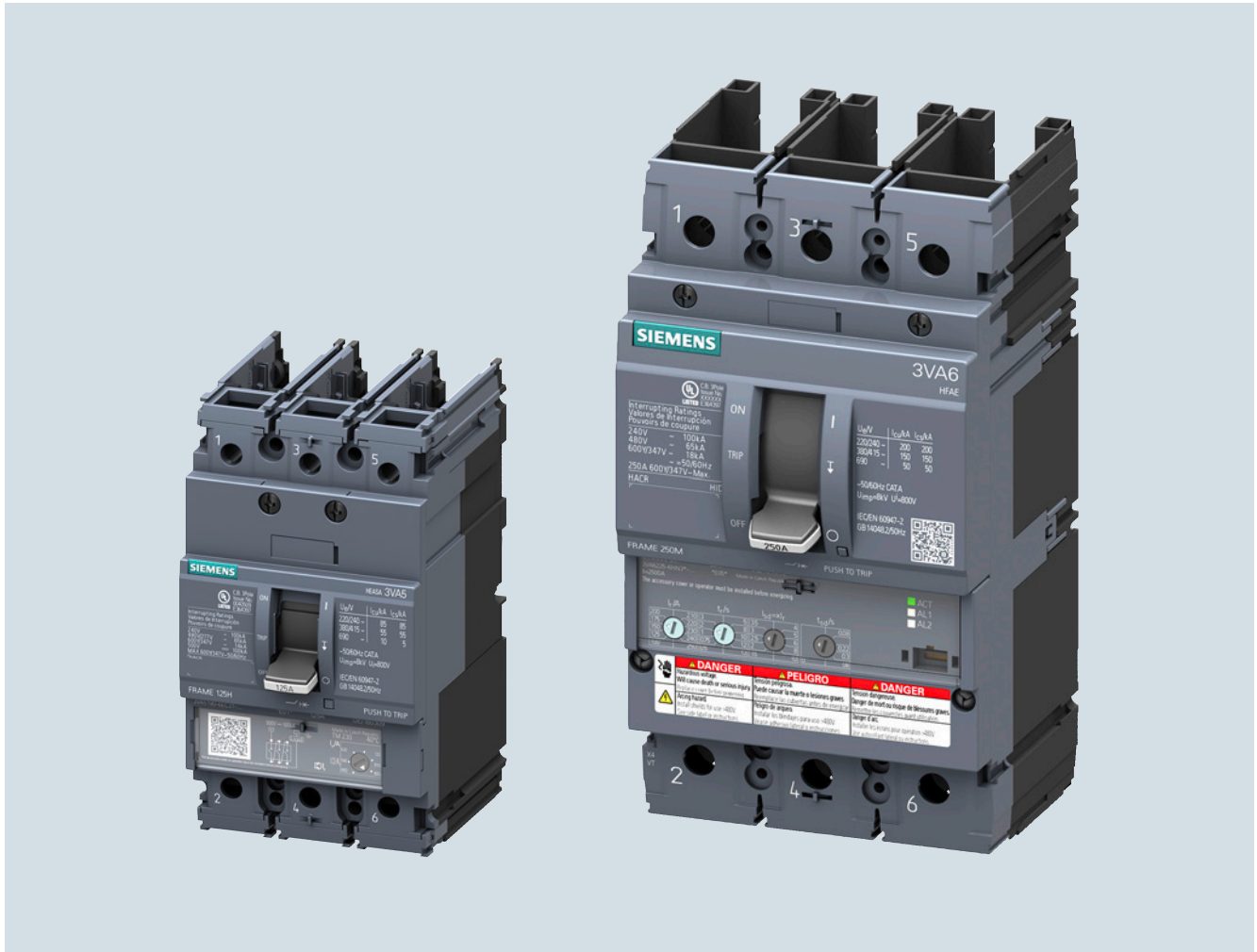
LV-ALPHATA

ALPHA 3200
Technology and software: 1 day

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

A complete system designed with you in mind

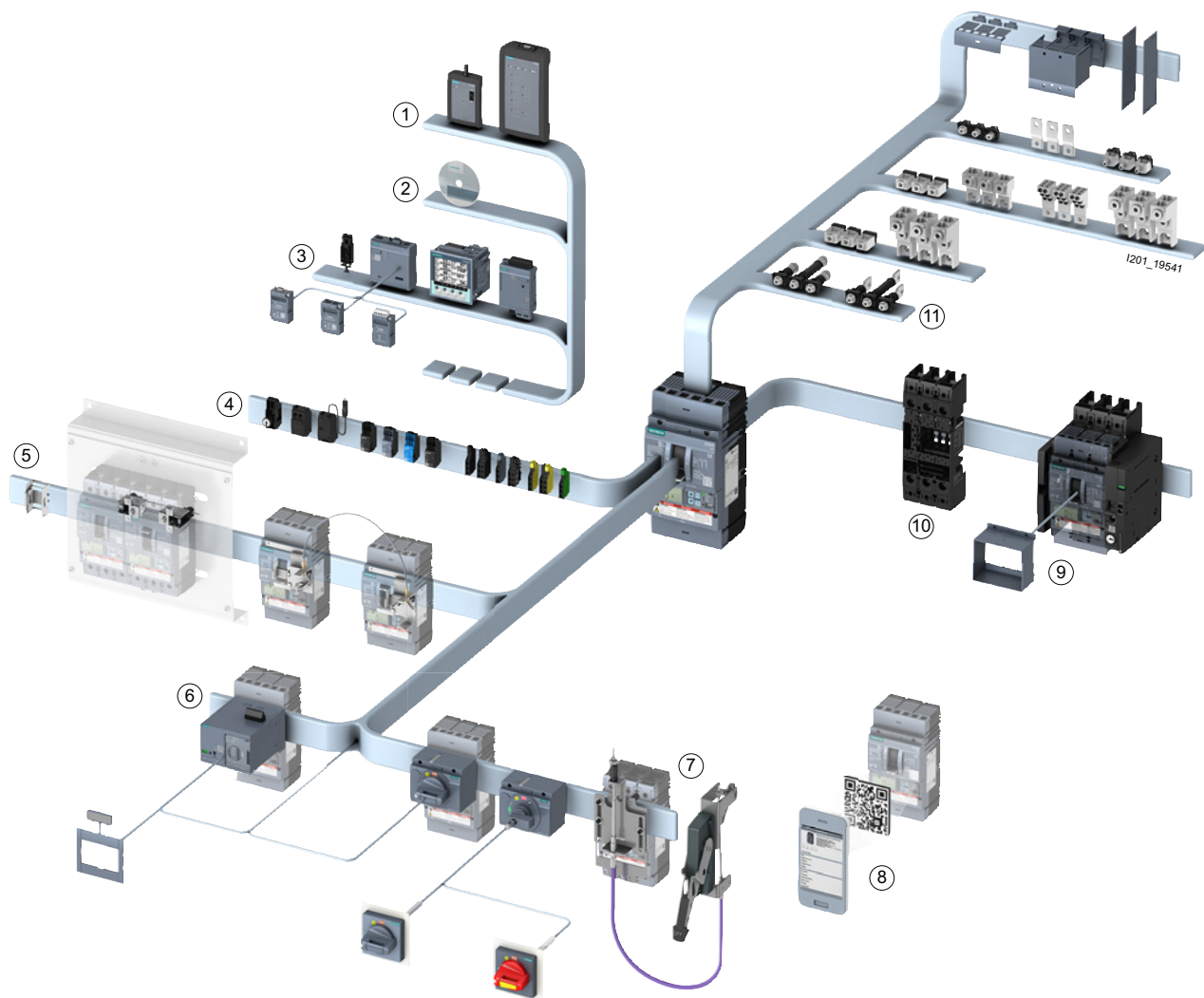


The 3VA molded case circuit breaker with certification in accordance with the American standard UL489 (3VA UL) is a well thought-out, modular and highly variable system that is consistently designed to provide optimum support in every process step – from engineering to daily operation of the electrical power distribution system.

The 3VA UL 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

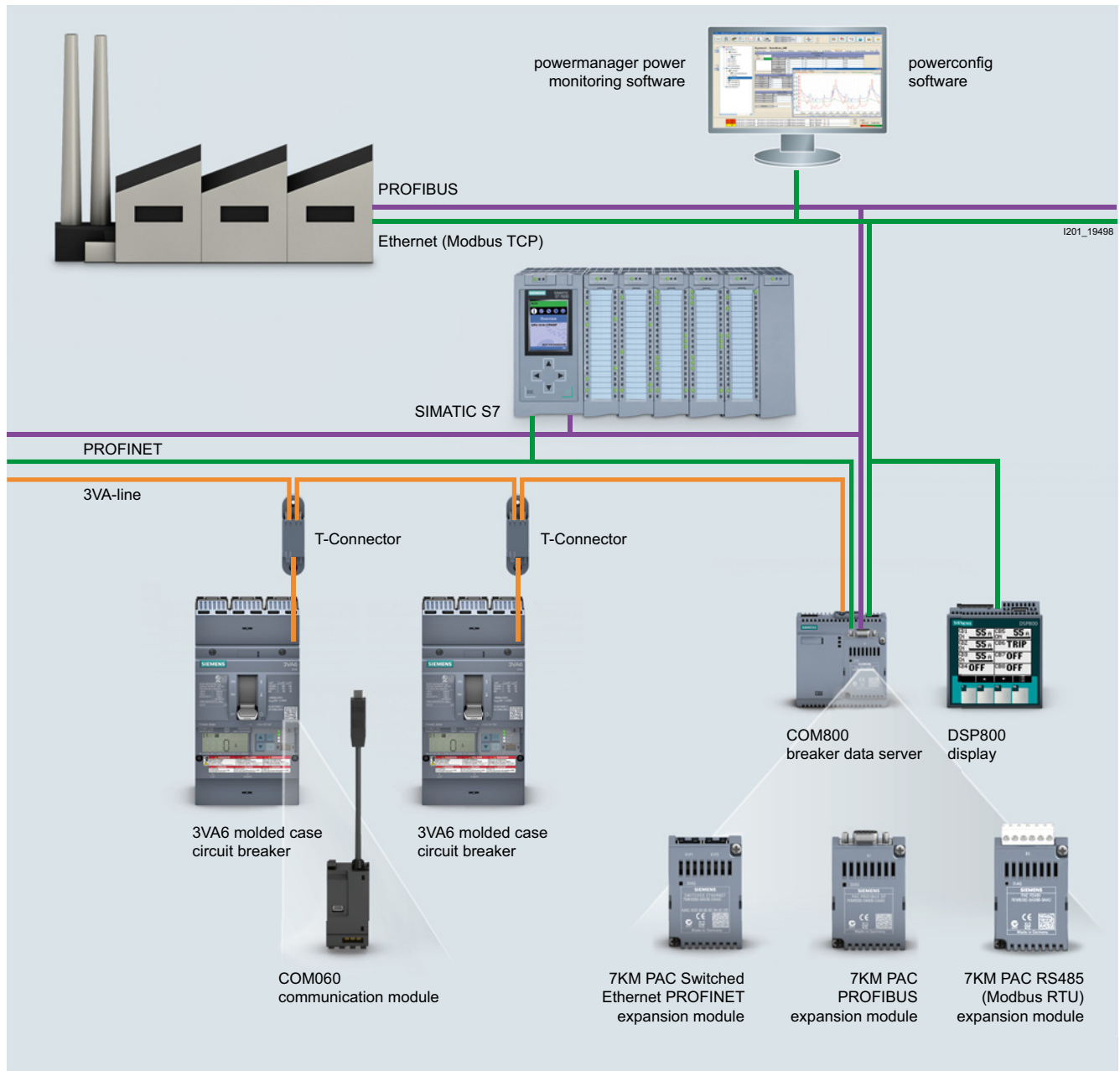
Wide range of accessories for flexible use



- | | | |
|------------------------|--|-------------------------|
| ① Test devices | ⑤ Accessories for locking, blocking and interlocking | ⑨ Draw-out technology |
| ② powerconfig software | ⑥ Motor operators | ⑩ Plug-in technology |
| ③ Communication | ⑦ Manual operators | ⑪ Connection technology |
| ④ Internal accessories | ⑧ Knowledge Manager | |

The 3VA UL molded case circuit breakers from the portfolio of SENTRON protection, switching, measuring and monitoring devices ensure the reliable protection of people and property as integral components of efficient power distribution systems. With a wide range of accessories they can be adapted flexibly, quickly and easily to individual requirements.

High transparency thanks to flexible communication options



The communication-capable 3VA UL molded case circuit breakers can be connected to higher-level management systems by means of various bus systems.

Similarly, the communication of status, error and alarm messages is possible via internal auxiliary switches – for efficient operation and optimum system monitoring.

In addition, the Electronic Trip Unit (ETU) of the 8-series can measure current, voltage and also power and energy values and can forward the values by means of communication modules according to requirements.

Highlights



Integrated data collection

The ETUs of the 8-series collect and transmit energy data – similar to the 7KM PAC measuring devices.



Modern design

The elegant appearance and intuitive handling are immediately convincing.



More functionality through variable internal accessories

An extensive range of internal accessories is available for the 3VA UL molded case circuit breakers: many different functions are possible with the numerous auxiliary switches and alarm switches.



Elegant and safe

As an option, the manual rotary operators can be equipped with an illumination kit – for clear indication of the switching position in all visibility conditions.



Clear indication

The circuit breaker position in the draw-out unit is colored and immediately recognizable.



Knowledge Manager

Technical information about installation, parameterization or maintenance can be called up directly from the system by QR code on a smartphone.

Notes

Introduction



1/2

General data

Overview

For further technical product information:

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

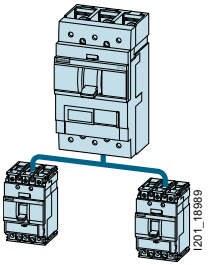
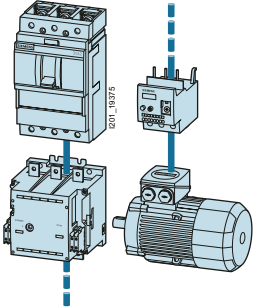
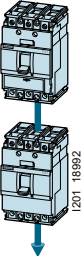
→ Entry type:
Application example
Certificate
Characteristic
Download
FAQ
Manual
Product note
Software archive
Technical data

Introduction

3VA UL Molded Case Circuit Breakers

General data

Overview

Application	3VA5	3VA6	Description	Standards
Line protection 	✓	✓	The trip units for line protection are designed to provide overload and short-circuit protection in AC and DC systems (DC only 3VA5): • Cables and conductors • Non motorized loads	UL 489 IEC/EN 60947-1, IEC/EN 60947-2
Motor circuit protectors 	✓	✓	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 to operationally switch the feeder. The overload relay handles overload protection, which 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.	UL 489 IEC/EN 60947-1, IEC/EN 60947-2, Appendix O ICB
Molded case switches 	✓	✓	3VA Molded Case Switches in accordance with UL 489 possess an integrated instantaneous short-circuit release. They are used: • As main disconnecting means • For on/off switching • For disconnection of loads	UL 489 IEC/EN 60947-1, IEC/EN 60947-2, Appendix L CBI-X

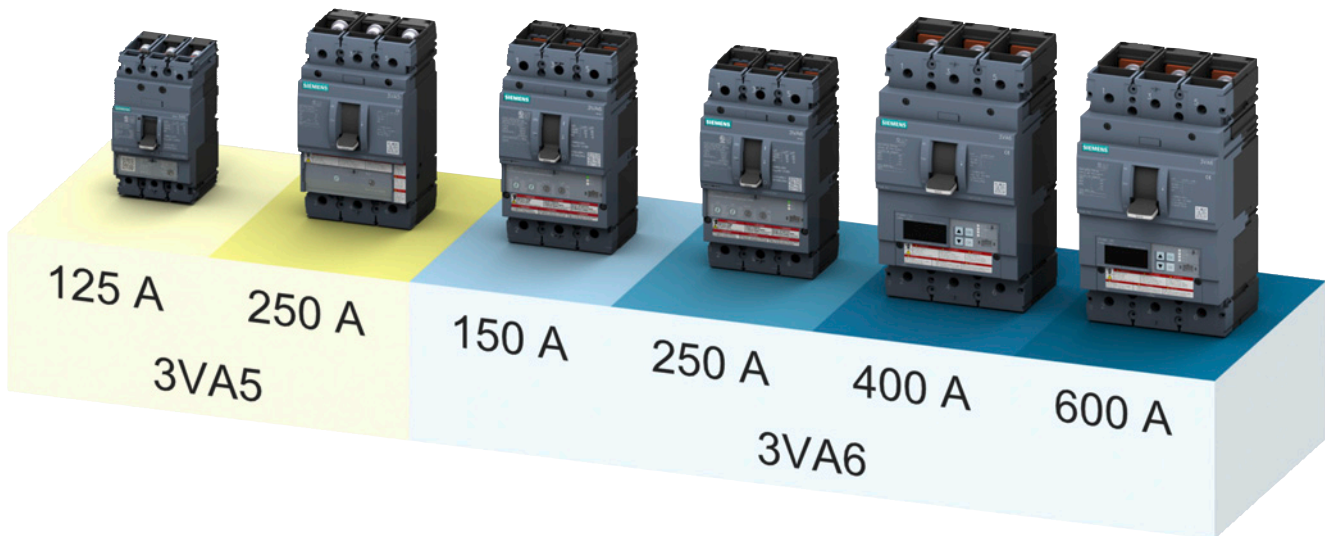
Sizes

The integrated 3VA UL portfolio consists of two different ranges of molded case circuit breakers in six frame sizes with different rated operational current.

The new 3VA UL 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 UL ranges help to cut costs and save time.

The new 3VA5 molded case circuit breakers are available in 1 and 3-pole versions (3VA5 125 A) or in 2-pole versions in a 3-pole enclosure and in a 3-pole version (3VA5 250 A). The new 3VA6 molded case circuit breakers are available in 3 and 4-pole versions.

The circuit breakers are available with rated operational currents ranging from 15 A to 600 A and rated voltages up to 600 V AC, depending on the range and frame size.



Integrated system

When it comes to operation, functionality and installation, the new 3VA UL 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 are:

- uniform methods of operation
- uniform scope of functions
- uniform installation procedures
- uniform accessories from 15 A ... 600 A (e.g. auxiliary switches, auxiliary releases, etc.)

3VA5 molded case circuit breakers

The new 3VA5 molded case circuit breakers reliably perform all the tasks required for line protection.

Features

The key features of the 3VA5 range are:

- Compact design
- Depending on size: 1-pole, 2(3) and 3-pole versions
- Depending on size:
 - Breaking capacity of 25 kA to 100 kA at 480 V and 18 kA to 35 kA at 600 V, 2(3) and 3-pole breakers
 - Breaking capacity of 25 kA to 50 kA at 277 V and 14 kA at 347 V, 1-pole breakers
- Thermal-magnetic trip units
- AC/DC applications
- Modular and easy-to-fit internal accessories with diverse functions
- Uniform accessories platform across all 3VA5/3VA6 molded case circuit breakers

Note:

All basic circuit breakers are supplied without connection technology.

Compact dimensions

Thanks to their compact dimensions, the 3VA5 molded case circuit breakers with frame sizes of 125 A and 250 A are predestined for protecting cables and conductors in plants.

Thermal-magnetic trip unit

A thermal-magnetic 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.

Introduction

3VA UL Molded Case Circuit Breakers

1

General data

3VA6 molded case circuit breakers

The new 3VA6 molded case circuit breakers reliably perform all the tasks required for line protection and protection of starter combinations.

This range is designed for applications with increased requirements:

- Increased breaking capacity
- Integrated metering function
- Connection to a communication system

Features

The most important features of the 3VA6 range are:

- Compact dimensions
- 3 and 4-pole versions
- Four breaking capacity classes of 35 kA ... 150 kA at 480 V and 18 kA ... 50 kA at 600 V
- Fixed-mounting, plug-in technology, draw-out technology
- Electronic Trip Units
- Retrofittable communication for ETU 5-series and 8-series
- Depending on the ETU: Integrated metering function
- AC applications
- No derating up to +50 °C
- Modular and easy-to-fit internal accessories with diverse functions
- Uniform accessories platform across all 3VA5/3VA6 molded case circuit breakers

Note:

All basic circuit breakers are supplied without connection technology.

Compact dimensions with function expansions

In addition to its expanded functionality, the 3VA6 molded case circuit breaker also comes with compact dimensions for fixed mounting, as a plug-in version and a draw-out version.

A cover size of 70 mm (up to 600 A) for the door cut-out and a complete selection of breaking capacity classes from 35 kA to 150 kA at 480 V provide the necessary flexibility for planning.

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

- Very high short-circuit breaking capacity
- Electronic trip unit, versions with and without integrated metering function and optional communication interface

Electronic Trip Units (ETUs)

The current sensor of the 3VA6 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 3VA6 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)
- Ground fault detection (G alarm = ground fault alarm) does not trip the circuit breaker, but an indication is shown on the display and/or is communicated to higher-level systems via the communication path or EFB/MMB.

Energy management and communication

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

- Metering function for current, voltage, power rating and energy
- Transfer of measurements and breaker status information
- Remote parameter assignment of tripping thresholds and miscellaneous parameters
- Flexible use of digital inputs and outputs of the optionally available EFB300 external function box
- Commissioning/setting the plant topology and also individual breaker parameters with the "powerconfig" software package
- Testing and archiving with the TD300 and TD500 test devices (with powerconfig)

SIMATIC Energy SuiteEnergy transparency - simple and integrated!

As an integrated option for the TIA Portal, SIMATIC Energy Suite efficiently links energy management with automation, thus introducing energy transparency to production.

Moreover, configuration effort is clearly reduced thanks to simplified configuration of energy-measuring components such as 7KM PAC or 3VA.

Thanks to consistent interfacing to higher-level energy management systems or to cloud-based services, recorded energy data can be expanded seamlessly into a cross-location energy management system.

The advantages at a glance:

- Automatic generation of energy management data
- Integration into TIA Portal and the automation system
- Easy configuration

For more information on SIMATIC Energy Suite:

www.siemens.com/energysuite

Introduction

3VA UL Molded Case Circuit Breakers

General data

1



Type	3VA51	3VA51	3VA52
Number of poles	1	3	2 in 3-pole, 3

3VA5 molded case circuit breakers for line protection

Frame size	125 A	125 A	250 A
Rated current I_n at 40 °C ambient temperature ⁴⁾	A 15 ... 125	15 ... 125	100 ... 250
Frequency	Hz 0 ... 400	0 ... 400	0 ... 400

Electrical characteristics according to UL 489

Rated operational voltage U_e 50/60 Hz AC	V 347	600 Y/347	600
Rated operational voltage U_e DC	V 125	500	600

Electrical characteristics according to IEC 60947-2

Rated operational voltage U_e 50/60 Hz AC	V 415	690	690
Rated insulation voltage U_i	V 500	800	800
Rated impulse withstand voltage U_{imp}	kV 8	8	8

Short-circuit breaking capacity according to UL 489				S	M	H	S	M	H	M	H	C
120 V AC / 50/60 Hz	kA	65	85	100	--	--	--	--	--	--	--	--
240 V AC / 50/60 Hz	kA	--	--	--	65	85	100	85	100	200	--	--
277 V AC / 50/60 Hz	kA	25	35	50	--	--	--	--	--	--	--	--
347 V AC / 50/60 Hz	kA	14	14	14	--	--	--	--	--	--	--	--
480 Y/277 V AC / 50/60 Hz	kA	--	--	--	25	35	65	35	65	100	--	--
480 V AC / 50/60 Hz	kA	--	--	--	25 ¹⁾	35 ¹⁾	65 ¹⁾	35	65	100	--	--
600 Y/347 V AC / 50/60 Hz	kA	--	--	--	14	18 ²⁾	25 ³⁾	18	25	35	--	--
600 V AC / 50/60 Hz	kA	--	--	--	--	--	--	18	25	35	--	--
125 V DC	kA	14	25	30	--	--	--	--	--	--	--	--
250 V DC	kA	--	--	--	50	85	100	50	85	100	--	--
500 V DC	kA	--	--	--	50	85	100	50	85	100	--	--
600 V DC (3-pole only)	kA	--	--	--	--	--	--	50	85	100	--	--

Short-circuit breaking capacity according to IEC 60947-2				S	M	H	S	M	H	M	H	C
Rated ultimate short-circuit breaking capacity I_{CU}, Rated service short-circuit breaking capacity I_{CS} rms value, according to IEC 60947-2												
240 V AC / 50/60 Hz	kA	25/25	36/36	55/55	55/55	85/85	150/150	85/85	100/100	200/200	--	--
415 V AC / 50/60 Hz	kA	5/5	5/5	5/5	36/36	55/55	70/70	55/55	70/70	110/110	--	--
690 V AC / 50/60 Hz	kA	--	--	--	5/5	7/5	10/5	7/7	10/10	10/10	--	--
125 V DC	kA	14	25	30	--	--	--	--	--	--	--	--
250 V DC	kA	--	--	--	50	85	100	50	85	100	--	--
500 V DC	kA	--	--	--	50	85	100	50	85	100	--	--
750 V DC (3-pole only)	kA	--	--	--	--	--	--	50	85	100	--	--

-- Not available

¹⁾ Applies to:
 - I_n 15 A to 90 A
 - I_n 100 A to 125 A from product version E02, available from the 1st quarter of 2018 onwards

²⁾ I_n 100 A to 125 A 14 kA

³⁾ I_n 40 A to 90 A 18 kA; 100 A to 125 A 14 kA

⁴⁾ 80% rated current applications according to UL 489, 100% rated current applications according to IEC 60947

Introduction

3VA UL Molded Case Circuit Breakers

General data

1



3VA61

3VA62

3VA63

3VA64

3, 4

3, 4

3, 4

3, 4

3VA6 molded case circuit breakers for line protection

150 A

250 A

400 A

600 A

40 ... 150

100, 250

250, 400

400, 600

50 ... 60

50 ... 60

50 ... 60

50 ... 60

600

600 Y/347

600

600

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690

690

690

690

800

800

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800

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110/110

150/150

55/55

85/85

110/110

150/150

55/55

85/85

110/110

150/150

2.5/2.5

2.5/2.5

2.5/2.5

2.5/2.5

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3VA UL Molded Case Circuit Breakers

General data



- 1) Integrated instantaneous short-circuit release for self-protection
- 2) Switching capacity (SCCR rating) is the maximum permissible short-circuit current at the installation location of the MCS in combination with an appropriate overload protection element
- 3) G alarm, no G protection
- 4) Breaking capacities in combination with contactors (SCCR ratings) may differ

Introduction

3VA UL Molded Case Circuit Breakers

General data

1



3VA61

3VA62

3VA63

3VA64

3, 4

3, 4

3, 4

3, 4

3VA5 molded case circuit breakers for line protection, standard applications

40 ... 150

100, 250

250, 400

400, 600

20000

20000

15000

15000

9000

6000

6000

4000

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3VA6 Motor Circuit Protectors

25 ... 100

110 ... 200

200, 250

400, 500

100

100

100

100

✓

✓

✓

✓

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✓

✓

✓

✓

3VA6 Molded Case Switches

--

--

--

--

--

--

400

600

--

--

✓

✓

--

--

✓

✓

Dimensions

105 (3p)/140 (4p)

105 (3p)/140 (4p)

138 (3p)/184 (4p)

138 (3p)/184 (4p)

198

198

248

248

86

86

110

110

107

107

137

137

General information

UL 489/CSA22.2/
IEC 60947-2UL 489/CSA22.2/
IEC 60947-2UL 489/CSA22.2/
IEC 60947-2UL 489/CSA22.2/
IEC 60947-2

Top and bottom

Top and bottom

Top and bottom

Top and bottom

Without connection technology

Without connection technology

Without connection technology

Without connection technology

Introduction

3VA UL Molded Case Circuit Breakers

General data

Molded case circuit breakers and accessories in the system

The new 3VA UL 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 UL up to 600 A					
	3VA5	3VA5	3VA6			
	125	250	150	250	400	600
Auxiliary switches and alarm switches						
Auxiliary releases						
Connection technology						
Plug-in technology						
Draw-out technology						
Front mounted rotary operator						
Door mounted rotary operator						
Operating unit with Bowden cable						
Motor operator MO320 (mounted on the front)						
Accessories for locking, blocking and interlocking						
Communications interface						
EFB300						
TD300 and TD500						
Masking frame						
Max Flex operator						

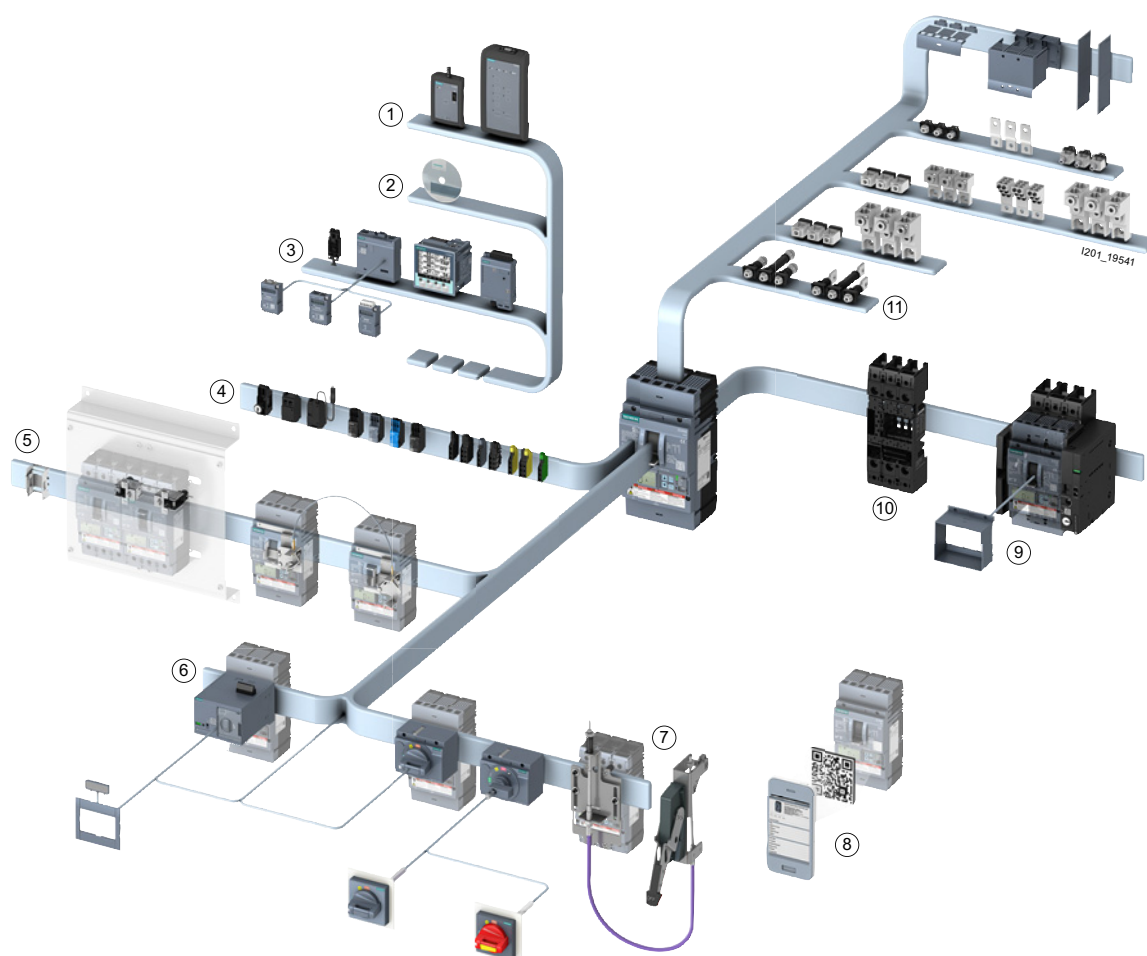
Front terminals

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

As standard, all 3VA UL molded case circuit breakers are supplied without connection technology.

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 delivery of the relevant component).



- | | |
|---|--|
| ① Test devices (page 4/46) | ⑦ Manual operators (pages 4/12 to 4/20) |
| ② powerconfig software (page 4/47) | ⑧ Knowledge Manager (page 1/12) |
| ③ Communication (pages 4/39 to 4/46) | ⑨ Draw-out technology (pages 4/34 to 4/38) |
| ④ Internal accessories (pages 4/2 to 4/11) | ⑩ Plug-in technology (pages 4/34 to 4/38) |
| ⑤ Accessories for locking, blocking and interlocking (pages 4/48 to 4/51) | ⑪ Connection technology (pages 4/22 to 4/33) |
| ⑥ Motor operators (page 4/21) | |

Introduction

3VA UL Molded Case Circuit Breakers

1

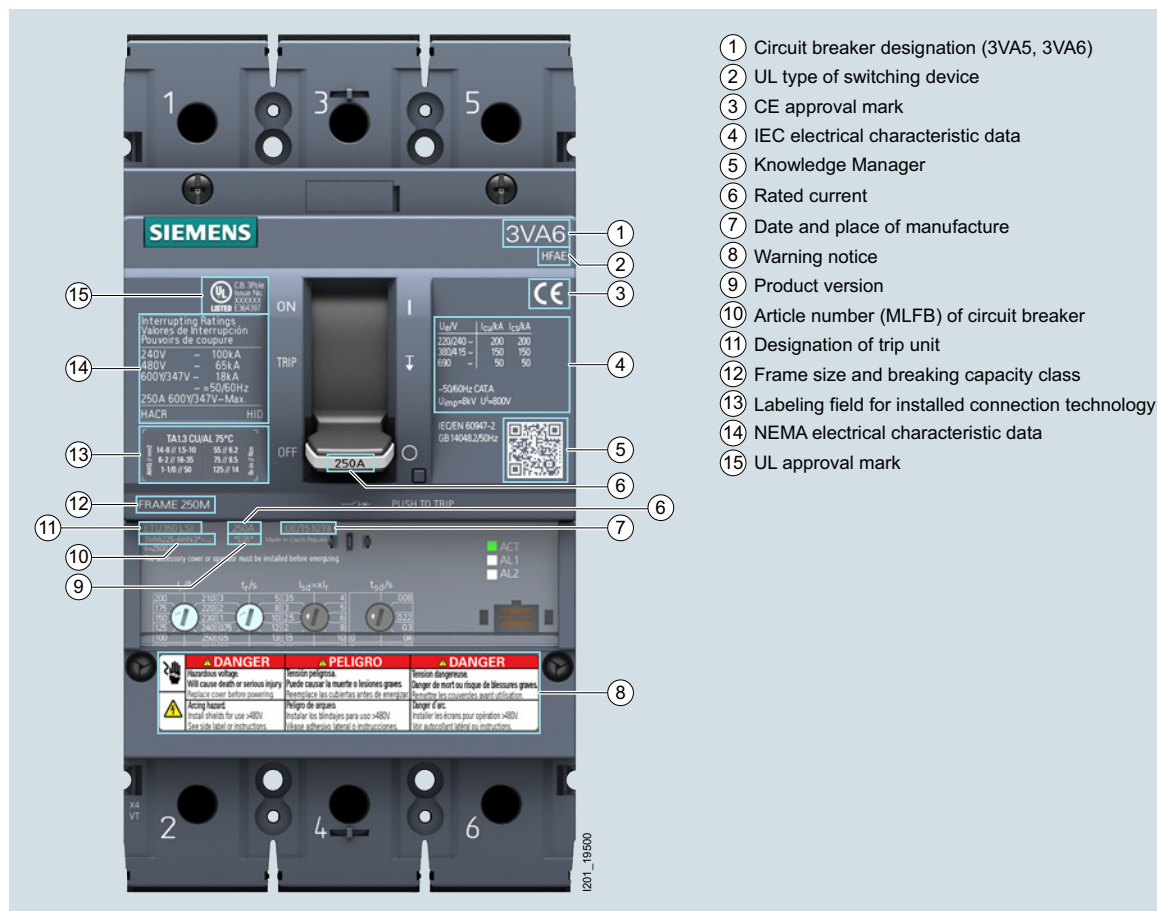
General data

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.

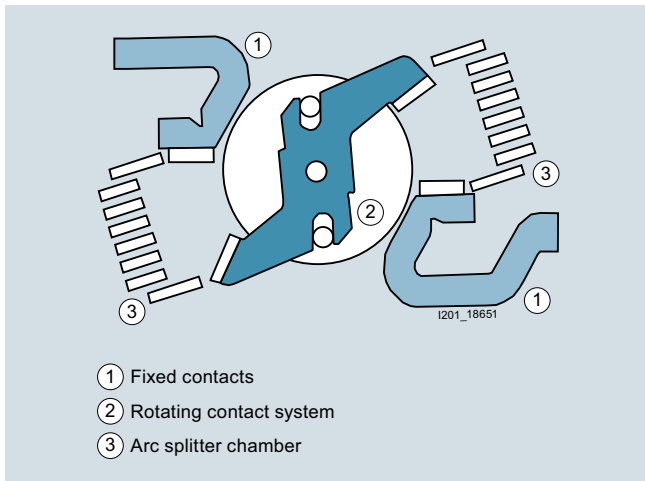
Siemens provides the app free of charge.

Technical information about installation, parameterization or maintenance can be called up directly from the system by QR code on a smartphone.



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} .

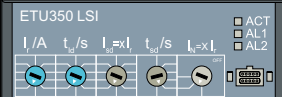
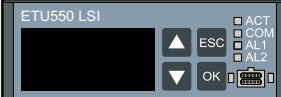
Introduction

3VA UL Molded Case Circuit Breakers

General data

Protection functions

Description of functions

	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	 Line protection: TM210, TM230 Motor Circuit Protector: TM120M	 Line protection: ETU320, ETU330, ETU350 Motor Circuit Protector: ETU310M	 Line protection: ETU550, ETU556, ETU560	 Line protection: ETU820, ETU830, ETU850, ETU856, ETU860
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	 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	 TD300/TD500 test device

Application cases and trip unit types

The table below illustrates the broad range of applications for which different types of thermal-magnetic trip units can be used:

	TM120M AM	TM210 FTFM	TM230 FTAM
Protection			
Motor circuit protector	✓	--	--
Line protection	--	✓	✓
Version available with			
1-pole breaker	--	✓	--
2-pole breaker in 3-pole enclosure	--	✓	✓
3-pole breaker	✓	✓	✓
Available protection parameters			
I_r adjustable	--	--	--
I_l adjustable	✓	--	✓
I_r fixed	--	✓	✓
I_l fixed	--	✓	--

Introduction

3VA UL Molded Case Circuit Breakers

General data

Protection functions

	ETU310M I	ETU320 LI	ETU330 LIG	ETU350 LSI	ETU550 LSI	ETU556 LSI (G alarm)	ETU560 LSIG	ETU820 LI	ETU830 LIG	ETU850 LSI	ETU856 LSI (G alarm)	ETU860 LSIG
Protection												
Motor circuit protector	✓	--	--	--	--	--	--	--	--	--	--	--
Line protection	--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Version available with												
3-pole without external neutral current transformer	✓	✓	✓	✓	--	--	--	--	--	--	--	--
3-pole with external neutral current transformer	--	--	--	--	✓	✓	✓	✓	✓	✓	✓	✓
4-pole with protected neutral conductor transformer	--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Available protection parameters												
Characteristic in L range	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t	I^2t
I_r	--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
t_{td} at $6 \times I_r$	--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Thermal memory	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Thermal memory can be switched on/off	--	--	--	--	✓	✓	✓	--	--	✓	✓	✓
I_{sd}	--	--	--	✓	✓	✓	✓	--	--	✓	✓	✓
t_{sd} at $8 \times I_r$	--	--	--	✓	✓	✓	✓	--	--	✓	✓	✓
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 $2 \times I_g$	--	--	✓	--	--	--	✓	--	✓	--	--	✓
Characteristic in G range: I^2t_g	--	--	✓	--	--	--	✓	--	✓	--	--	✓
Characteristic in G range: selectable I^2t_g / t_g	--	--	✓	--	--	--	✓	--	✓	--	--	✓
Ground-fault alarm function	--	--	--	--	--	✓	--	--	--	--	✓	--
ZSI	--	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
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

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA



2/2	Line protection
2/8	Motor circuit protectors
2/9	Molded case switches
2/10	Dimensional drawings

Note:

All basic circuit breakers are supplied without connection technology. The available connection technology can be found in [Chapter "Accessories and Spare Parts"](#).

The scope of delivery of all basic circuit breakers includes the insulation measures required as minimum for 600 V insofar as these are not included in the scope of delivery of the connection technology.

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

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Line protection

Selection and ordering data

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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 S,
up to 25 kA at 277 V**

See "Overview", p. 1/6 and 1/7

Article No.
[www.siemens.com/
product?ArticleNo.](http://www.siemens.com/product?ArticleNo.)

Basic price
per PU

A

A

A

d

S

1-pole, fixed-mounted, suitable for DIN rail mounting, 3VA51, up to 125 A
Thermal-magnetic trip unit



1201_19027

Line protection, 1-pole, TM210 FTFM

With fixed overload protection I_r and fixed short-circuit protection I_i

3VA51

15
20
25
30

15
20
25
30

300
300
300
300

3VA5195-4ED11-0AA0
3VA5120-4ED11-0AA0
3VA5125-4ED11-0AA0
3VA5130-4ED11-0AA0

35
40
45
50

35
40
45
50

350
400
450
500

3VA5135-4ED11-0AA0
3VA5140-4ED11-0AA0
3VA5145-4ED11-0AA0
3VA5150-4ED11-0AA0

60
70
80
90

60
70
80
90

600
700
800
900

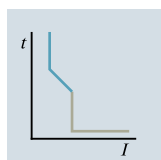
3VA5160-4ED11-0AA0
3VA5170-4ED11-0AA0
3VA5180-4ED11-0AA0
3VA5190-4ED11-0AA0

100
110
125

100
110
125

1000
1100
1250

3VA5110-4ED11-0AA0
3VA5111-4ED11-0AA0
3VA5112-4ED11-0AA0



3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	Medium breaking capacity M, up to 35 kA at 277 V See "Overview", p. 1/6 and 1/7 (M)	SD	High breaking capacity H, up to 50 kA at 277 V See "Overview", p. 1/6 and 1/7 (H)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU
A	d		d	

Line protection, 1-pole, TM210 FTFMWith fixed overload protection I_r and fixed short-circuit protection I_i

15	3VA5195-5ED11-0AA0	3VA5195-6ED11-0AA0
20	3VA5120-5ED11-0AA0	3VA5120-6ED11-0AA0
25	3VA5125-5ED11-0AA0	3VA5125-6ED11-0AA0
30	3VA5130-5ED11-0AA0	3VA5130-6ED11-0AA0
35	3VA5135-5ED11-0AA0	3VA5135-6ED11-0AA0
40	3VA5140-5ED11-0AA0	3VA5140-6ED11-0AA0
45	3VA5145-5ED11-0AA0	3VA5145-6ED11-0AA0
50	3VA5150-5ED11-0AA0	3VA5150-6ED11-0AA0
60	3VA5160-5ED11-0AA0	3VA5160-6ED11-0AA0
70	3VA5170-5ED11-0AA0	3VA5170-6ED11-0AA0
80	3VA5180-5ED11-0AA0	3VA5180-6ED11-0AA0
90	3VA5190-5ED11-0AA0	3VA5190-6ED11-0AA0
100	3VA5110-5ED11-0AA0	3VA5110-6ED11-0AA0
110	3VA5111-5ED11-0AA0	3VA5111-6ED11-0AA0
125	3VA5112-5ED11-0AA0	3VA5112-6ED11-0AA0

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



Type	Rated current I_n	Current setting of the inverse-time delayed overload protection " I_r "	Operating current of the instantaneous short-circuit protection " I_i " I_i	SD
	A	A	A	d

**Standard breaking capacity S,
up to 25 kA at 480 V**
See "Overview", p. 1/6 and 1/7

Article No.
[www.siemens.com/
product?ArticleNo.](http://www.siemens.com/product?ArticleNo.)

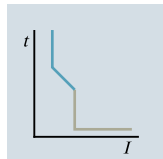
Basic price
per PU

3-pole, fixed-mounted, suitable for DIN rail mounting, **3VA51/3VA52, up to 125 A**
Thermal-magnetic trip unit



Line protection, TM210 FTFM

With fixed overload protection I_r and fixed short-circuit protection I_i

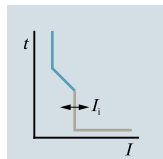


3VA51	15	15	300	3VA5195-4ED31-0AA0
	20	20	300	3VA5120-4ED31-0AA0
	25	25	300	3VA5125-4ED31-0AA0
	30	30	300	3VA5130-4ED31-0AA0
	35	35	350	3VA5135-4ED31-0AA0
	40	40	400	3VA5140-4ED31-0AA0
	45	45	450	3VA5145-4ED31-0AA0
	50	50	500	3VA5150-4ED31-0AA0
	60	60	600	3VA5160-4ED31-0AA0
	70	70	700	3VA5170-4ED31-0AA0
	80	80	800	3VA5180-4ED31-0AA0
	90	90	900	3VA5190-4ED31-0AA0
	100 ¹⁾	100	1000	3VA5110-4ED31-0AA0
	110 ¹⁾	110	1100	3VA5111-4ED31-0AA0
	125 ¹⁾	125	1250	3VA5112-4ED31-0AA0
3VA52	100	100	1000	--
	110	110	1100	--
	125	125	1250	--
	150	150	1500	--
	175	175	1750	--
	200	200	2000	--
	225	225	2250	--
	250	250	2500	--



Line protection, TM230 FTAM

With fixed overload protection I_r and adjustable short-circuit protection I_i



3VA51	15	15	150 ... 300	3VA5195-4EC31-0AA0
	20	20	150 ... 300	3VA5120-4EC31-0AA0
	25	25	150 ... 300	3VA5125-4EC31-0AA0
	30	30	150 ... 300	3VA5130-4EC31-0AA0
	35	35	175 ... 350	3VA5135-4EC31-0AA0
	40	40	200 ... 400	3VA5140-4EC31-0AA0
	45	45	225 ... 450	3VA5145-4EC31-0AA0
	50	50	250 ... 500	3VA5150-4EC31-0AA0
	60	60	300 ... 600	3VA5160-4EC31-0AA0
	70	70	350 ... 700	3VA5170-4EC31-0AA0
	80	80	400 ... 800	3VA5180-4EC31-0AA0
	90	90	450 ... 900	3VA5190-4EC31-0AA0
	100 ¹⁾	100	500 ... 1000	3VA5110-4EC31-0AA0
	110 ¹⁾	110	550 ... 1100	3VA5111-4EC31-0AA0
	125 ¹⁾	125	625 ... 1250	3VA5112-4EC31-0AA0
3VA52	100	100	500 ... 1000	--
	110	110	550 ... 1100	--
	125	125	625 ... 1250	--
	150	150	750 ... 1500	--
	175	175	875 ... 1750	--
	200	200	1000 ... 2000	--
	225	225	1125 ... 2250	--
	250	250	1250 ... 2500	--

¹⁾ 480 Y/277 V

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, TM210 FTFMWith fixed overload protection I_r and fixed short-circuit protection I_s

15	3VA5195-5ED31-0AA0	3VA5195-6ED31-0AA0	--
20	3VA5120-5ED31-0AA0	3VA5120-6ED31-0AA0	--
25	3VA5125-5ED31-0AA0	3VA5125-6ED31-0AA0	--
30	3VA5130-5ED31-0AA0	3VA5130-6ED31-0AA0	--
35	3VA5135-5ED31-0AA0	3VA5135-6ED31-0AA0	--
40	3VA5140-5ED31-0AA0	3VA5140-6ED31-0AA0	--
45	3VA5145-5ED31-0AA0	3VA5145-6ED31-0AA0	--
50	3VA5150-5ED31-0AA0	3VA5150-6ED31-0AA0	--
60	3VA5160-5ED31-0AA0	3VA5160-6ED31-0AA0	--
70	3VA5170-5ED31-0AA0	3VA5170-6ED31-0AA0	--
80	3VA5180-5ED31-0AA0	3VA5180-6ED31-0AA0	--
90	3VA5190-5ED31-0AA0	3VA5190-6ED31-0AA0	--
100	3VA5110-5ED31-0AA0	3VA5110-6ED31-0AA0	--
110	3VA5111-5ED31-0AA0	3VA5111-6ED31-0AA0	--
125	3VA5112-5ED31-0AA0	3VA5112-6ED31-0AA0	--
100	3VA5210-5ED31-0AA0	3VA5210-6ED31-0AA0	3VA5210-7ED31-0AA0
110	3VA5211-5ED31-0AA0	3VA5211-6ED31-0AA0	3VA5211-7ED31-0AA0
125	3VA5212-5ED31-0AA0	3VA5212-6ED31-0AA0	3VA5212-7ED31-0AA0
150	3VA5215-5ED31-0AA0	3VA5215-6ED31-0AA0	3VA5215-7ED31-0AA0
175	3VA5217-5ED31-0AA0	3VA5217-6ED31-0AA0	3VA5217-7ED31-0AA0
200	3VA5220-5ED31-0AA0	3VA5220-6ED31-0AA0	3VA5220-7ED31-0AA0
225	3VA5222-5ED31-0AA0	3VA5222-6ED31-0AA0	3VA5222-7ED31-0AA0
250	3VA5225-5ED31-0AA0	3VA5225-6ED31-0AA0	3VA5225-7ED31-0AA0

Line protection, TM230 FTAMWith fixed overload protection I_r and adjustable short-circuit protection I_s

15	3VA5195-5EC31-0AA0	3VA5195-6EC31-0AA0	--
20	3VA5120-5EC31-0AA0	3VA5120-6EC31-0AA0	--
25	3VA5125-5EC31-0AA0	3VA5125-6EC31-0AA0	--
30	3VA5130-5EC31-0AA0	3VA5130-6EC31-0AA0	--
35	3VA5135-5EC31-0AA0	3VA5135-6EC31-0AA0	--
40	3VA5140-5EC31-0AA0	3VA5140-6EC31-0AA0	--
45	3VA5145-5EC31-0AA0	3VA5145-6EC31-0AA0	--
50	3VA5150-5EC31-0AA0	3VA5150-6EC31-0AA0	--
60	3VA5160-5EC31-0AA0	3VA5160-6EC31-0AA0	--
70	3VA5170-5EC31-0AA0	3VA5170-6EC31-0AA0	--
80	3VA5180-5EC31-0AA0	3VA5180-6EC31-0AA0	--
90	3VA5190-5EC31-0AA0	3VA5190-6EC31-0AA0	--
100	3VA5110-5EC31-0AA0	3VA5110-6EC31-0AA0	--
110	3VA5111-5EC31-0AA0	3VA5111-6EC31-0AA0	--
125	3VA5112-5EC31-0AA0	3VA5112-6EC31-0AA0	--
100	3VA5210-5EC31-0AA0	3VA5210-6EC31-0AA0	3VA5210-7EC31-0AA0
110	3VA5211-5EC31-0AA0	3VA5211-6EC31-0AA0	3VA5211-7EC31-0AA0
125	3VA5212-5EC31-0AA0	3VA5212-6EC31-0AA0	3VA5212-7EC31-0AA0
150	3VA5215-5EC31-0AA0	3VA5215-6EC31-0AA0	3VA5215-7EC31-0AA0
175	3VA5217-5EC31-0AA0	3VA5217-6EC31-0AA0	3VA5217-7EC31-0AA0
200	3VA5220-5EC31-0AA0	3VA5220-6EC31-0AA0	3VA5220-7EC31-0AA0
225	3VA5222-5EC31-0AA0	3VA5222-6EC31-0AA0	3VA5222-7EC31-0AA0
250	3VA5225-5EC31-0AA0	3VA5225-6EC31-0AA0	3VA5225-7EC31-0AA0

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7
	A	A	A	d	Article No. www.siemens.com/ product?Article No. Basic price per PU

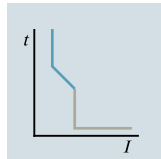
2-pole breaker in 3-pole enclosure, fixed-mounted, 3VA52, up to 250 A Thermal-magnetic trip unit



Line protection, TM210 FTFM

With fixed overload protection I_r and fixed short-circuit protection I_i

3VA52	100	100	1000	3VA5210-5ED61-0AA0
	110	110	1100	3VA5211-5ED61-0AA0
	125	125	1250	3VA5212-5ED61-0AA0
	150	150	1500	3VA5215-5ED61-0AA0
	175	175	1750	3VA5217-5ED61-0AA0
	200	200	2000	3VA5220-5ED61-0AA0
	225	225	2250	3VA5222-5ED61-0AA0
	250	250	2500	3VA5225-5ED61-0AA0



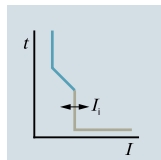
2-pole breaker in 3-pole enclosure, fixed-mounted, 3VA52, up to 250 A Thermal-magnetic trip unit



Line protection, TM230 FTAM

With fixed overload protection I_r and adjustable short-circuit protection I_i

3VA52	100	100	500 ... 1000	3VA5210-5EC61-0AA0
	110	110	550 ... 1100	3VA5211-5EC61-0AA0
	125	125	625 ... 1250	3VA5212-5EC61-0AA0
	150	150	750 ... 1500	3VA5215-5EC61-0AA0
	175	175	875 ... 1750	3VA5217-5EC61-0AA0
	200	200	1000 ... 2000	3VA5220-5EC61-0AA0
	225	225	1125 ... 2250	3VA5222-5EC61-0AA0
	250	250	1250 ... 2500	3VA5225-5EC61-0AA0



3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7
		Article No. www.siemens.com/ product?Article No.	Article No. www.siemens.com/ product?Article No.
		Basic price per PU	Basic price per PU
A	d		

Line protection, TM210 FTFMWith fixed overload protection I_r and fixed short-circuit protection I_s

100	3VA5210-6ED61-0AA0	3VA5210-7ED61-0AA0
110	3VA5211-6ED61-0AA0	3VA5211-7ED61-0AA0
125	3VA5212-6ED61-0AA0	3VA5212-7ED61-0AA0
150	3VA5215-6ED61-0AA0	3VA5215-7ED61-0AA0
175	3VA5217-6ED61-0AA0	3VA5217-7ED61-0AA0
200	3VA5220-6ED61-0AA0	3VA5220-7ED61-0AA0
225	3VA5222-6ED61-0AA0	3VA5222-7ED61-0AA0
250	3VA5225-6ED61-0AA0	3VA5225-7ED61-0AA0

Line protection, TM230 FTAMWith fixed overload protection I_r and adjustable short-circuit protection I_s

100	3VA5210-6EC61-0AA0	3VA5210-7EC61-0AA0
110	3VA5211-6EC61-0AA0	3VA5211-7EC61-0AA0
125	3VA5212-6EC61-0AA0	3VA5212-7EC61-0AA0
150	3VA5215-6EC61-0AA0	3VA5215-7EC61-0AA0
175	3VA5217-6EC61-0AA0	3VA5217-7EC61-0AA0
200	3VA5220-6EC61-0AA0	3VA5220-7EC61-0AA0
225	3VA5222-6EC61-0AA0	3VA5222-7EC61-0AA0
250	3VA5225-6EC61-0AA0	3VA5225-7EC61-0AA0

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Motor circuit protectors

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

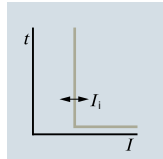


Type	Rated current I_n	Operating current of the instantaneous short-circuit protection " I_i " I_i	SD	SCCR without contactor, 65 kA ¹⁾ at 480 V See "Overview", p. 1/6 and 1/7 Article No. www.siemens.com/product?Article No. Basic price per PU	SD	SCCR without contactor, 100 kA ¹⁾ at 480 V See "Overview", p. 1/6 and 1/7 Article No. www.siemens.com/product?Article No. Basic price per PU
	A	A	d		d	

3-pole, fixed-mounted, 3VA51/3VA52, up to 200 A Magnetic trip unit



Motor circuit protector, TM120M AM With adjustable short-circuit protection I_i



3VA51	15	45 ... 105 75 ... 180	3VA5195-1MU31-0AA0 3VA5195-1MH31-0AA0	--
Fixed-mounted, attachment to DIN rail	25	75 ... 175 125 ... 300	3VA5125-1MU31-0AA0 3VA5125-1MH31-0AA0	--
	30	90 ... 210 150 ... 360	3VA5130-1MU31-0AA0 3VA5130-1MH31-0AA0	--
	40	120 ... 280 200 ... 480	3VA5140-1MU31-0AA0 3VA5140-1MH31-0AA0	--
	50	150 ... 350 250 ... 600	3VA5150-1MU31-0AA0 3VA5150-1MH31-0AA0	--
	70	210 ... 490 350 ... 840	3VA5170-1MU31-0AA0 3VA5170-1MH31-0AA0	--
	80	240 ... 560 400 ... 960	3VA5180-1MU31-0AA0 3VA5180-1MH31-0AA0	--
	90	270 ... 630 450 ... 1080	3VA5190-1MU31-0AA0 3VA5190-1MH31-0AA0	--
	100	300 ... 700 500 ... 1200	3VA5110-1MU31-0AA0 3VA5110-1MH31-0AA0	--
	110	330 ... 770 550 ... 1320	3VA5111-1MU31-0AA0 3VA5111-1MH31-0AA0	--
	125	375 ... 875 625 ... 1500	3VA5112-1MU31-0AA0 3VA5112-1MH31-0AA0	--
3VA52	150	450 ... 900 900 ... 1800	3VA5215-0MU31-0AA0 3VA5215-0MH31-0AA0	3VA5215-1MU31-0AA0 3VA5215-1MH31-0AA0
Fixed-mounted	200	600 ... 1200 1200 ... 2400	3VA5220-0MU31-0AA0 3VA5220-0MH31-0AA0	3VA5220-1MU31-0AA0 3VA5220-1MH31-0AA0

¹⁾ Breaking capacities in combination with contactors (SCCR ratings) may differ

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Molded case switches**Selection and ordering data**

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



Type

Rated
uninter-
rupted
current
 I_u Operating
current of the
instantaneous
short-circuit
protection "I"
 I_i

SD

SCCR 65 kA¹⁾ at 480 V
See "Overview", p. 1/6 and 1/7Article No.
[www.siemens.com/
product?Article No.](http://www.siemens.com/product?Article No.)Basic
price
per PU

SD

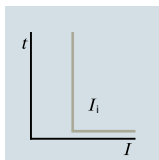
SCCR 100 kA¹⁾ at 480 V
See "Overview", p. 1/6 and 1/7Article No.
[www.siemens.com/
product?Article No.](http://www.siemens.com/product?Article No.)Basic
price
per PU

A

A

d

d

3-pole, fixed-mounted, 3VA51/3VA52, up to 250 A
Without Electronic Trip Unit**Molded case switches**With fixed short-circuit protection I_i , for self-protection

3VA51 100 1600

Fixed-mounted,
attachment to
DIN rail**3VA5110-1BB31-0AA0**

--

3VA52 100 2500

Fixed-mounted 150 2400
250 2500--
3VA5215-0BB31-0AA0
3VA5225-0BB31-0AA0**3VA5210-1BB31-0AA0**
3VA5215-1BB31-0AA0
3VA5225-1BB31-0AA0**2-pole breaker in 3-pole enclosure, fixed-mounted,**
3VA52, up to 250 A**Molded case switches**With fixed short-circuit protection I_i , for self-protection

3VA52 100 2500

150 2400

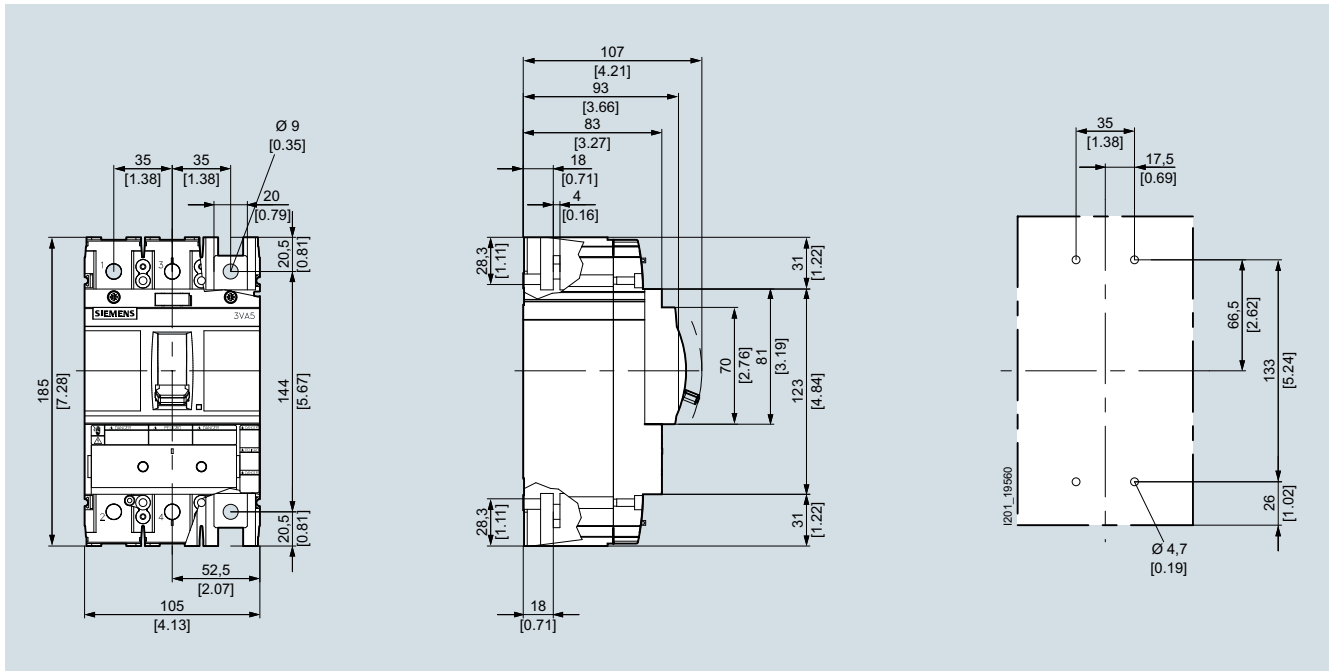
250 2500

--
3VA5215-0BB61-0AA0
3VA5225-0BB61-0AA0**3VA5210-1BB61-0AA0**
3VA5215-1BB61-0AA0
3VA5225-1BB61-0AA0

¹⁾ Breaking capacity (the SCCR rating) is the maximum permissible short-circuit current at the installation location of the MCS in combination with an appropriate overload protection device.

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Dimensional drawings

3VA52, 3-pole

3VA UL Molded Case Circuit Breakers

3VA5 Molded Case Circuit Breakers up to 250 A, TM, 600 V, up to 100 kA

Notes

3VA6 molded case circuit breakers up to 600 A, ETU, 600 V, up to 150 kA



3/2	Line protection
3/18	Line protection, 100% rated breakers
3/34	Motor circuit protectors
3/34	Molded case switches
3/35	Dimensional drawings

Note:

All basic circuit breakers are supplied without connection technology. The available connection technology can be found in [Chapter "Accessories and Spare Parts"](#).

The scope of delivery of all basic circuit breakers includes the insulation measures required as minimum for 600 V insofar as these are not included in the scope of delivery of the connection technology.

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

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

Selection and ordering data

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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
	A	A	A	A	d

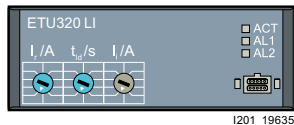
Medium breaking capacity M, up to 35 kA at 480 V

See "Overview", p. 1/6 and 1/7

Article No.
www.siemens.com/product?ArticleNo.

Basic price per PU

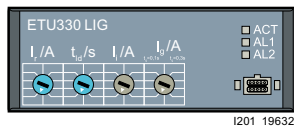
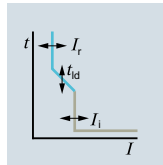
3-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Line protection, ETU320 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

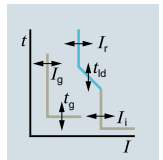
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	--	3VA6140-5HL31-0AA0 3VA6110-5HL31-0AA0 3VA6115-5HL31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	--	3VA6210-5HL31-0AA0 3VA6225-5HL31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	--	3VA6325-5HL31-0AA0 3VA6340-5HL31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	--	3VA6440-5HL31-0AA0 3VA6460-5HL31-0AA0



Line protection, ETU330 LIG

With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	8 ... 40 20 ... 100 30 ... 150	3VA6140-5HM31-0AA0 3VA6110-5HM31-0AA0 3VA6115-5HM31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	20 ... 100 50 ... 250	3VA6210-5HM31-0AA0 3VA6225-5HM31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	50 ... 250 80 ... 400	3VA6325-5HM31-0AA0 3VA6340-5HM31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	80 ... 400 120 ... 600	3VA6440-5HM31-0AA0 3VA6460-5HM31-0AA0



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
	A	A	A	A	d

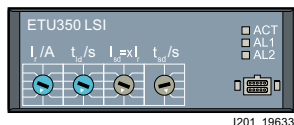
Medium breaking capacity M, up to 35 kA at 480 V

See "Overview", p. 1/6 and 1/7

Article No.
www.siemens.com/product?ArticleNo.

Basic price per PU

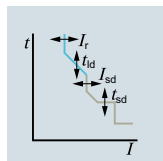
3-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Line protection, ETU350 LSI

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} and fixed instantaneous short-circuit protection I_i

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	$I_r \times \dots$ 1.5 ... 10 1.5 ... 10 1.5 ... 10	480 1200 1500	3VA6140-5HN31-0AA0 3VA6110-5HN31-0AA0 3VA6115-5HN31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	1.5 ... 10 1.5 ... 10	1200 2500	3VA6210-5HN31-0AA0 3VA6225-5HN31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	1.5 ... 10 1.5 ... 10	3000 4000	3VA6325-5HN31-0AA0 3VA6340-5HN31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	1.5 ... 10 1.5 ... 9	4800 5400	3VA6440-5HN31-0AA0 3VA6460-5HN31-0AA0



3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		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, ETU320 LIWith adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6HL31-0AA0	3VA6140-7HL31-0AA0	3VA6140-8HL31-0AA0
100	3VA6110-6HL31-0AA0	3VA6110-7HL31-0AA0	3VA6110-8HL31-0AA0
150	3VA6115-6HL31-0AA0	3VA6115-7HL31-0AA0	3VA6115-8HL31-0AA0
100	3VA6210-6HL31-0AA0	3VA6210-7HL31-0AA0	3VA6210-8HL31-0AA0
250	3VA6225-6HL31-0AA0	3VA6225-7HL31-0AA0	3VA6225-8HL31-0AA0
250	3VA6325-6HL31-0AA0	3VA6325-7HL31-0AA0	3VA6325-8HL31-0AA0
400	3VA6340-6HL31-0AA0	3VA6340-7HL31-0AA0	3VA6340-8HL31-0AA0
400	3VA6440-6HL31-0AA0	3VA6440-7HL31-0AA0	3VA6440-8HL31-0AA0
600	3VA6460-6HL31-0AA0	3VA6460-7HL31-0AA0	3VA6460-8HL31-0AA0

Line protection, ETU330 LIGWith adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6HM31-0AA0	3VA6140-7HM31-0AA0	3VA6140-8HM31-0AA0
100	3VA6110-6HM31-0AA0	3VA6110-7HM31-0AA0	3VA6110-8HM31-0AA0
150	3VA6115-6HM31-0AA0	3VA6115-7HM31-0AA0	3VA6115-8HM31-0AA0
100	3VA6210-6HM31-0AA0	3VA6210-7HM31-0AA0	3VA6210-8HM31-0AA0
250	3VA6225-6HM31-0AA0	3VA6225-7HM31-0AA0	3VA6225-8HM31-0AA0
250	3VA6325-6HM31-0AA0	3VA6325-7HM31-0AA0	3VA6325-8HM31-0AA0
400	3VA6340-6HM31-0AA0	3VA6340-7HM31-0AA0	3VA6340-8HM31-0AA0
400	3VA6440-6HM31-0AA0	3VA6440-7HM31-0AA0	3VA6440-8HM31-0AA0
600	3VA6460-6HM31-0AA0	3VA6460-7HM31-0AA0	3VA6460-8HM31-0AA0

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		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, ETU350 LSIWith adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} and fixed instantaneous short-circuit protection I_i

40	3VA6140-6HN31-0AA0	3VA6140-7HN31-0AA0	3VA6140-8HN31-0AA0
100	3VA6110-6HN31-0AA0	3VA6110-7HN31-0AA0	3VA6110-8HN31-0AA0
150	3VA6115-6HN31-0AA0	3VA6115-7HN31-0AA0	3VA6115-8HN31-0AA0
100	3VA6210-6HN31-0AA0	3VA6210-7HN31-0AA0	3VA6210-8HN31-0AA0
250	3VA6225-6HN31-0AA0	3VA6225-7HN31-0AA0	3VA6225-8HN31-0AA0
250	3VA6325-6HN31-0AA0	3VA6325-7HN31-0AA0	3VA6325-8HN31-0AA0
400	3VA6340-6HN31-0AA0	3VA6340-7HN31-0AA0	3VA6340-8HN31-0AA0
400	3VA6440-6HN31-0AA0	3VA6440-7HN31-0AA0	3VA6440-8HN31-0AA0
600	3VA6460-6HN31-0AA0	3VA6460-7HN31-0AA0	3VA6460-8HN31-0AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7
	A	A	A	A	d	



Article No.
[www.siemens.com/
product?Article No.](http://www.siemens.com/product?Article No.)

Basic price
per PU

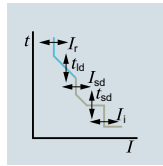
3-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Line 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

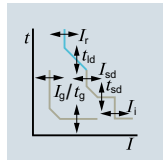
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JP31-0AA0 3VA6110-5JP31-0AA0 3VA6115-5JP31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JP31-0AA0 3VA6225-5JP31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5JP31-0AA0 3VA6340-5JP31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5JP31-0AA0 3VA6460-5JP31-0AA0



Line protection, with display, ETU556 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

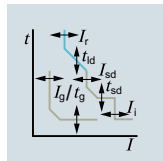
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JT31-0AA0 3VA6110-5JT31-0AA0 3VA6115-5JT31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JT31-0AA0 3VA6225-5JT31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5JT31-0AA0 3VA6340-5JT31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5JT31-0AA0 3VA6460-5JT31-0AA0



Line protection, with display, ETU560 LSI(G)

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

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JQ31-0AA0 3VA6110-5JQ31-0AA0 3VA6115-5JQ31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JQ31-0AA0 3VA6225-5JQ31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5JQ31-0AA0 3VA6340-5JQ31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5JQ31-0AA0 3VA6460-5JQ31-0AA0



3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, ETU550 LSIWith adjustable overload protection I_p , adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6JP31-0AA0	3VA6140-7JP31-0AA0	3VA6140-8JP31-0AA0
100	3VA6110-6JP31-0AA0	3VA6110-7JP31-0AA0	3VA6110-8JP31-0AA0
150	3VA6115-6JP31-0AA0	3VA6115-7JP31-0AA0	3VA6115-8JP31-0AA0
100	3VA6210-6JP31-0AA0	3VA6210-7JP31-0AA0	3VA6210-8JP31-0AA0
250	3VA6225-6JP31-0AA0	3VA6225-7JP31-0AA0	3VA6225-8JP31-0AA0
250	3VA6325-6JP31-0AA0	3VA6325-7JP31-0AA0	3VA6325-8JP31-0AA0
400	3VA6340-6JP31-0AA0	3VA6340-7JP31-0AA0	3VA6340-8JP31-0AA0
400	3VA6440-6JP31-0AA0	3VA6440-7JP31-0AA0	3VA6440-8JP31-0AA0
600	3VA6460-6JP31-0AA0	3VA6460-7JP31-0AA0	3VA6460-8JP31-0AA0

Line protection, with display, ETU556 LSI(G)With adjustable overload protection I_p , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

40	3VA6140-6JT31-0AA0	3VA6140-7JT31-0AA0	3VA6140-8JT31-0AA0
100	3VA6110-6JT31-0AA0	3VA6110-7JT31-0AA0	3VA6110-8JT31-0AA0
150	3VA6115-6JT31-0AA0	3VA6115-7JT31-0AA0	3VA6115-8JT31-0AA0
100	3VA6210-6JT31-0AA0	3VA6210-7JT31-0AA0	3VA6210-8JT31-0AA0
250	3VA6225-6JT31-0AA0	3VA6225-7JT31-0AA0	3VA6225-8JT31-0AA0
250	3VA6325-6JT31-0AA0	3VA6325-7JT31-0AA0	3VA6325-8JT31-0AA0
400	3VA6340-6JT31-0AA0	3VA6340-7JT31-0AA0	3VA6340-8JT31-0AA0
400	3VA6440-6JT31-0AA0	3VA6440-7JT31-0AA0	3VA6440-8JT31-0AA0
600	3VA6460-6JT31-0AA0	3VA6460-7JT31-0AA0	3VA6460-8JT31-0AA0

Line protection, with display, ETU560 LSI(G)With adjustable overload protection I_p , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6JQ31-0AA0	3VA6140-7JQ31-0AA0	3VA6140-8JQ31-0AA0
100	3VA6110-6JQ31-0AA0	3VA6110-7JQ31-0AA0	3VA6110-8JQ31-0AA0
150	3VA6115-6JQ31-0AA0	3VA6115-7JQ31-0AA0	3VA6115-8JQ31-0AA0
100	3VA6210-6JQ31-0AA0	3VA6210-7JQ31-0AA0	3VA6210-8JQ31-0AA0
250	3VA6225-6JQ31-0AA0	3VA6225-7JQ31-0AA0	3VA6225-8JQ31-0AA0
250	3VA6325-6JQ31-0AA0	3VA6325-7JQ31-0AA0	3VA6325-8JQ31-0AA0
400	3VA6340-6JQ31-0AA0	3VA6340-7JQ31-0AA0	3VA6340-8JQ31-0AA0
400	3VA6440-6JQ31-0AA0	3VA6440-7JQ31-0AA0	3VA6440-8JQ31-0AA0
600	3VA6460-6JQ31-0AA0	3VA6460-7JQ31-0AA0	3VA6460-8JQ31-0AA0

3

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d		

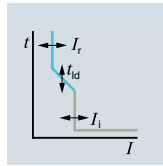
3-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Line protection, with display, with metering function, ETU820 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

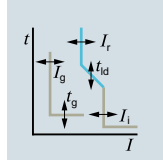
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	-- -- --	3VA6140-5KL31-0AA0 3VA6110-5KL31-0AA0 3VA6115-5KL31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	-- --	3VA6210-5KL31-0AA0 3VA6225-5KL31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	-- --	3VA6325-5KL31-0AA0 3VA6340-5KL31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	-- --	3VA6440-5KL31-0AA0 3VA6460-5KL31-0AA0



Line protection, with display, with metering function, ETU830 LIG

With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	15 ... 40 20 ... 100 30 ... 150	3VA6140-5KM31-0AA0 3VA6110-5KM31-0AA0 3VA6115-5KM31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	20 ... 100 50 ... 250	3VA6210-5KM31-0AA0 3VA6225-5KM31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	50 ... 250 80 ... 400	3VA6325-5KM31-0AA0 3VA6340-5KM31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	80 ... 400 120 ... 600	3VA6440-5KM31-0AA0 3VA6460-5KM31-0AA0



3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, with metering function, ETU820 LIWith adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6KL31-0AA0	3VA6140-7KL31-0AA0	3VA6140-8KL31-0AA0
100	3VA6110-6KL31-0AA0	3VA6110-7KL31-0AA0	3VA6110-8KL31-0AA0
150	3VA6115-6KL31-0AA0	3VA6115-7KL31-0AA0	3VA6115-8KL31-0AA0
100	3VA6210-6KL31-0AA0	3VA6210-7KL31-0AA0	3VA6210-8KL31-0AA0
250	3VA6225-6KL31-0AA0	3VA6225-7KL31-0AA0	3VA6225-8KL31-0AA0
250	3VA6325-6KL31-0AA0	3VA6325-7KL31-0AA0	3VA6325-8KL31-0AA0
400	3VA6340-6KL31-0AA0	3VA6340-7KL31-0AA0	3VA6340-8KL31-0AA0
400	3VA6440-6KL31-0AA0	3VA6440-7KL31-0AA0	3VA6440-8KL31-0AA0
600	3VA6460-6KL31-0AA0	3VA6460-7KL31-0AA0	3VA6460-8KL31-0AA0

Line protection, with display, with metering function, ETU830 LIGWith adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6KM31-0AA0	3VA6140-7KM31-0AA0	3VA6140-8KM31-0AA0
100	3VA6110-6KM31-0AA0	3VA6110-7KM31-0AA0	3VA6110-8KM31-0AA0
150	3VA6115-6KM31-0AA0	3VA6115-7KM31-0AA0	3VA6115-8KM31-0AA0
100	3VA6210-6KM31-0AA0	3VA6210-7KM31-0AA0	3VA6210-8KM31-0AA0
250	3VA6225-6KM31-0AA0	3VA6225-7KM31-0AA0	3VA6225-8KM31-0AA0
250	3VA6325-6KM31-0AA0	3VA6325-7KM31-0AA0	3VA6325-8KM31-0AA0
400	3VA6340-6KM31-0AA0	3VA6340-7KM31-0AA0	3VA6340-8KM31-0AA0
400	3VA6440-6KM31-0AA0	3VA6440-7KM31-0AA0	3VA6440-8KM31-0AA0
600	3VA6460-6KM31-0AA0	3VA6460-7KM31-0AA0	3VA6460-8KM31-0AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d		

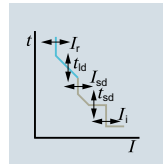
3-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Line 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

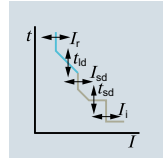
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KP31-0AA0 3VA6110-5KP31-0AA0 3VA6115-5KP31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KP31-0AA0 3VA6225-5KP31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5KP31-0AA0 3VA6340-5KP31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5KP31-0AA0 3VA6460-5KP31-0AA0



Line protection, with display, with metering function, ETU856 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

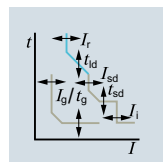
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KT31-0AA0 3VA6110-5KT31-0AA0 3VA6115-5KT31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KT31-0AA0 3VA6225-5KT31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5KT31-0AA0 3VA6340-5KT31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5KT31-0AA0 3VA6460-5KT31-0AA0



Line protection, with display, with metering function, ETU860 LSI(G)

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

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KQ31-0AA0 3VA6110-5KQ31-0AA0 3VA6115-5KQ31-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KQ31-0AA0 3VA6225-5KQ31-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5KQ31-0AA0 3VA6340-5KQ31-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5KQ31-0AA0 3VA6460-5KQ31-0AA0



3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, with metering function, ETU850 LSIWith adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6KP31-0AA0	3VA6140-7KP31-0AA0	3VA6140-8KP31-0AA0
100	3VA6110-6KP31-0AA0	3VA6110-7KP31-0AA0	3VA6110-8KP31-0AA0
150	3VA6115-6KP31-0AA0	3VA6115-7KP31-0AA0	3VA6115-8KP31-0AA0
100	3VA6210-6KP31-0AA0	3VA6210-7KP31-0AA0	3VA6210-8KP31-0AA0
250	3VA6225-6KP31-0AA0	3VA6225-7KP31-0AA0	3VA6225-8KP31-0AA0
250	3VA6325-6KP31-0AA0	3VA6325-7KP31-0AA0	3VA6325-8KP31-0AA0
400	3VA6340-6KP31-0AA0	3VA6340-7KP31-0AA0	3VA6340-8KP31-0AA0
400	3VA6440-6KP31-0AA0	3VA6440-7KP31-0AA0	3VA6440-8KP31-0AA0
600	3VA6460-6KP31-0AA0	3VA6460-7KP31-0AA0	3VA6460-8KP31-0AA0

Line protection, with display, with metering function, ETU856 LSI(G)With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

40	3VA6140-6KT31-0AA0	3VA6140-7KT31-0AA0	3VA6140-8KT31-0AA0
100	3VA6110-6KT31-0AA0	3VA6110-7KT31-0AA0	3VA6110-8KT31-0AA0
150	3VA6115-6KT31-0AA0	3VA6115-7KT31-0AA0	3VA6115-8KT31-0AA0
100	3VA6210-6KT31-0AA0	3VA6210-7KT31-0AA0	3VA6210-8KT31-0AA0
250	3VA6225-6KT31-0AA0	3VA6225-7KT31-0AA0	3VA6225-8KT31-0AA0
250	3VA6325-6KT31-0AA0	3VA6325-7KT31-0AA0	3VA6325-8KT31-0AA0
400	3VA6340-6KT31-0AA0	3VA6340-7KT31-0AA0	3VA6340-8KT31-0AA0
400	3VA6440-6KT31-0AA0	3VA6440-7KT31-0AA0	3VA6440-8KT31-0AA0
600	3VA6460-6KT31-0AA0	3VA6460-7KT31-0AA0	3VA6460-8KT31-0AA0

Line protection, with display, with metering function, ETU860 LSIGWith 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

40	3VA6140-6KQ31-0AA0	3VA6140-7KQ31-0AA0	3VA6140-8KQ31-0AA0
100	3VA6110-6KQ31-0AA0	3VA6110-7KQ31-0AA0	3VA6110-8KQ31-0AA0
150	3VA6115-6KQ31-0AA0	3VA6115-7KQ31-0AA0	3VA6115-8KQ31-0AA0
100	3VA6210-6KQ31-0AA0	3VA6210-7KQ31-0AA0	3VA6210-8KQ31-0AA0
250	3VA6225-6KQ31-0AA0	3VA6225-7KQ31-0AA0	3VA6225-8KQ31-0AA0
250	3VA6325-6KQ31-0AA0	3VA6325-7KQ31-0AA0	3VA6325-8KQ31-0AA0
400	3VA6340-6KQ31-0AA0	3VA6340-7KQ31-0AA0	3VA6340-8KQ31-0AA0
400	3VA6440-6KQ31-0AA0	3VA6440-7KQ31-0AA0	3VA6440-8KQ31-0AA0
600	3VA6460-6KQ31-0AA0	3VA6460-7KQ31-0AA0	3VA6460-8KQ31-0AA0

3

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

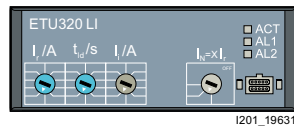
PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d	Article No. www.siemens.com/product?Article No.	

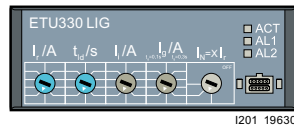
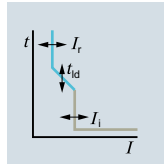
4-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



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%

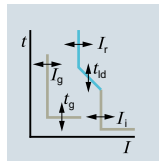
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	-- -- --	3VA6140-5HL41-0AA0 3VA6110-5HL41-0AA0 3VA6115-5HL41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	-- --	3VA6210-5HL41-0AA0 3VA6225-5HL41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	-- --	3VA6325-5HL41-0AA0 3VA6340-5HL41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	-- --	3VA6440-5HL41-0AA0 3VA6460-5HL41-0AA0



Line protection, ETU330 LIG

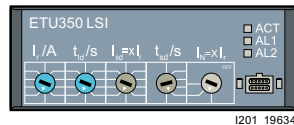
With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i , with neutral protection against overload and short circuit 0%, 50% or 100% and adjustable ground-fault protection I_g

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	8 ... 40 20 ... 100 30 ... 150	3VA6140-5HM41-0AA0 3VA6110-5HM41-0AA0 3VA6115-5HM41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	20 ... 100 50 ... 250	3VA6210-5HM41-0AA0 3VA6225-5HM41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	50 ... 250 80 ... 400	3VA6325-5HM41-0AA0 3VA6340-5HM41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	80 ... 400 120 ... 600	3VA6440-5HM41-0AA0 3VA6460-5HM41-0AA0



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d	Article No. www.siemens.com/product?Article No.	

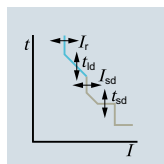
4-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Line protection, ETU350 LSI

With adjustable overload protection I_r , adjustable instantaneous 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%

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	$I_r \times \dots$ 1.5 ... 10 1.5 ... 10 1.5 ... 10	480 1200 1500	3VA6140-5HN41-0AA0 3VA6110-5HN41-0AA0 3VA6115-5HN41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	1.5 ... 10 1.5 ... 10	1200 2500	3VA6210-5HN41-0AA0 3VA6225-5HN41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	1.5 ... 10 1.5 ... 10	3000 4000	3VA6325-5HN41-0AA0 3VA6340-5HN41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	1.5 ... 10 1.5 ... 9	4800 5400	3VA6440-5HN41-0AA0 3VA6460-5HN41-0AA0



3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, ETU320 LIWith 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%

40	3VA6140-6HL41-0AA0	3VA6140-7HL41-0AA0	3VA6140-8HL41-0AA0
100	3VA6110-6HL41-0AA0	3VA6110-7HL41-0AA0	3VA6110-8HL41-0AA0
150	3VA6115-6HL41-0AA0	3VA6115-7HL41-0AA0	3VA6115-8HL41-0AA0
100	3VA6210-6HL41-0AA0	3VA6210-7HL41-0AA0	3VA6210-8HL41-0AA0
250	3VA6225-6HL41-0AA0	3VA6225-7HL41-0AA0	3VA6225-8HL41-0AA0
250	3VA6325-6HL41-0AA0	3VA6325-7HL41-0AA0	3VA6325-8HL41-0AA0
400	3VA6340-6HL41-0AA0	3VA6340-7HL41-0AA0	3VA6340-8HL41-0AA0
400	3VA6440-6HL41-0AA0	3VA6440-7HL41-0AA0	3VA6440-8HL41-0AA0
600	3VA6460-6HL41-0AA0	3VA6460-7HL41-0AA0	3VA6460-8HL41-0AA0

Line protection, ETU330 LIGWith adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i , with neutral protection against overload and short circuit 0%, 50% or 100% and adjustable ground-fault protection I_g

40	3VA6140-6HM41-0AA0	3VA6140-7HM41-0AA0	3VA6140-8HM41-0AA0
100	3VA6110-6HM41-0AA0	3VA6110-7HM41-0AA0	3VA6110-8HM41-0AA0
150	3VA6115-6HM41-0AA0	3VA6115-7HM41-0AA0	3VA6115-8HM41-0AA0
100	3VA6210-6HM41-0AA0	3VA6210-7HM41-0AA0	3VA6210-8HM41-0AA0
250	3VA6225-6HM41-0AA0	3VA6225-7HM41-0AA0	3VA6225-8HM41-0AA0
250	3VA6325-6HM41-0AA0	3VA6325-7HM41-0AA0	3VA6325-8HM41-0AA0
400	3VA6340-6HM41-0AA0	3VA6340-7HM41-0AA0	3VA6340-8HM41-0AA0
400	3VA6440-6HM41-0AA0	3VA6440-7HM41-0AA0	3VA6440-8HM41-0AA0
600	3VA6460-6HM41-0AA0	3VA6460-7HM41-0AA0	3VA6460-8HM41-0AA0

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, ETU350 LSIWith adjustable overload protection I_r , adjustable instantaneous 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%

40	3VA6140-6HN41-0AA0	3VA6140-7HN41-0AA0	3VA6140-8HN41-0AA0
100	3VA6110-6HN41-0AA0	3VA6110-7HN41-0AA0	3VA6110-8HN41-0AA0
150	3VA6115-6HN41-0AA0	3VA6115-7HN41-0AA0	3VA6115-8HN41-0AA0
100	3VA6210-6HN41-0AA0	3VA6210-7HN41-0AA0	3VA6210-8HN41-0AA0
250	3VA6225-6HN41-0AA0	3VA6225-7HN41-0AA0	3VA6225-8HN41-0AA0
250	3VA6325-6HN41-0AA0	3VA6325-7HN41-0AA0	3VA6325-8HN41-0AA0
400	3VA6340-6HN41-0AA0	3VA6340-7HN41-0AA0	3VA6340-8HN41-0AA0
400	3VA6440-6HN41-0AA0	3VA6440-7HN41-0AA0	3VA6440-8HN41-0AA0
600	3VA6460-6HN41-0AA0	3VA6460-7HN41-0AA0	3VA6460-8HN41-0AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7
	A	A	A	A	d	Article No. www.siemens.com/ product?Article No.

(M)

Basic price per PU

4-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit

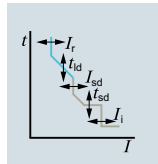


I201_18480

Line 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%

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JP41-0AA0 3VA6110-5JP41-0AA0 3VA6115-5JP41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JP41-0AA0 3VA6225-5JP41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5JP41-0AA0 3VA6340-5JP41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5JP41-0AA0 3VA6460-5JP41-0AA0

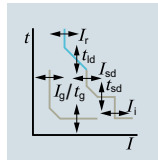


I201_19550

Line protection, with display, ETU556 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JT41-0AA0 3VA6110-5JT41-0AA0 3VA6115-5JT41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JT41-0AA0 3VA6225-5JT41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5JT41-0AA0 3VA6340-5JT41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5JT41-0AA0 3VA6460-5JT41-0AA0

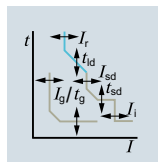


I201_18481

Line protection, with display, ETU560 LSI(G)

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

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JQ41-0AA0 3VA6110-5JQ41-0AA0 3VA6115-5JQ41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JQ41-0AA0 3VA6225-5JQ41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5JQ41-0AA0 3VA6340-5JQ41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5JQ41-0AA0 3VA6460-5JQ41-0AA0



3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line 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%

40	3VA6140-6JP41-0AA0	3VA6140-7JP41-0AA0	3VA6140-8JP41-0AA0
100	3VA6110-6JP41-0AA0	3VA6110-7JP41-0AA0	3VA6110-8JP41-0AA0
150	3VA6115-6JP41-0AA0	3VA6115-7JP41-0AA0	3VA6115-8JP41-0AA0
100	3VA6210-6JP41-0AA0	3VA6210-7JP41-0AA0	3VA6210-8JP41-0AA0
250	3VA6225-6JP41-0AA0	3VA6225-7JP41-0AA0	3VA6225-8JP41-0AA0
250	3VA6325-6JP41-0AA0	3VA6325-7JP41-0AA0	3VA6325-8JP41-0AA0
400	3VA6340-6JP41-0AA0	3VA6340-7JP41-0AA0	3VA6340-8JP41-0AA0
400	3VA6440-6JP41-0AA0	3VA6440-7JP41-0AA0	3VA6440-8JP41-0AA0
600	3VA6460-6JP41-0AA0	3VA6460-7JP41-0AA0	3VA6460-8JP41-0AA0

Line protection, with display, ETU556 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} ,
adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

40	3VA6140-6JT41-0AA0	3VA6140-7JT41-0AA0	3VA6140-8JT41-0AA0
100	3VA6110-6JT41-0AA0	3VA6110-7JT41-0AA0	3VA6110-8JT41-0AA0
150	3VA6115-6JT41-0AA0	3VA6115-7JT41-0AA0	3VA6115-8JT41-0AA0
100	3VA6210-6JT41-0AA0	3VA6210-7JT41-0AA0	3VA6210-8JT41-0AA0
250	3VA6225-6JT41-0AA0	3VA6225-7JT41-0AA0	3VA6225-8JT41-0AA0
250	3VA6325-6JT41-0AA0	3VA6325-7JT41-0AA0	3VA6325-8JT41-0AA0
400	3VA6340-6JT41-0AA0	3VA6340-7JT41-0AA0	3VA6340-8JT41-0AA0
400	3VA6440-6JT41-0AA0	3VA6440-7JT41-0AA0	3VA6440-8JT41-0AA0
600	3VA6460-6JT41-0AA0	3VA6460-7JT41-0AA0	3VA6460-8JT41-0AA0

Line protection, with display, ETU560 LSI(G)

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

40	3VA6140-6JQ41-0AA0	3VA6140-7JQ41-0AA0	3VA6140-8JQ41-0AA0
100	3VA6110-6JQ41-0AA0	3VA6110-7JQ41-0AA0	3VA6110-8JQ41-0AA0
150	3VA6115-6JQ41-0AA0	3VA6115-7JQ41-0AA0	3VA6115-8JQ41-0AA0
100	3VA6210-6JQ41-0AA0	3VA6210-7JQ41-0AA0	3VA6210-8JQ41-0AA0
250	3VA6225-6JQ41-0AA0	3VA6225-7JQ41-0AA0	3VA6225-8JQ41-0AA0
250	3VA6325-6JQ41-0AA0	3VA6325-7JQ41-0AA0	3VA6325-8JQ41-0AA0
400	3VA6340-6JQ41-0AA0	3VA6340-7JQ41-0AA0	3VA6340-8JQ41-0AA0
400	3VA6440-6JQ41-0AA0	3VA6440-7JQ41-0AA0	3VA6440-8JQ41-0AA0
600	3VA6460-6JQ41-0AA0	3VA6460-7JQ41-0AA0	3VA6460-8JQ41-0AA0

3

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d	Article No. www.siemens.com/product?Article No.	

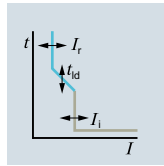
4-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Line protection, with display, with metering function, ETU820 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

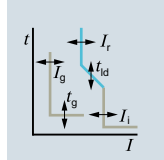
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	-- -- --	3VA6140-5KL41-0AA0 3VA6110-5KL41-0AA0 3VA6115-5KL41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	-- --	3VA6210-5KL41-0AA0 3VA6225-5KL41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	-- --	3VA6325-5KL41-0AA0 3VA6340-5KL41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	-- --	3VA6440-5KL41-0AA0 3VA6460-5KL41-0AA0



Line protection, with display, with metering function, ETU830 LIG

With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	60 ... 480 150 ... 1200 225 ... 1500	15 ... 40 20 ... 100 30 ... 150	3VA6140-5KM41-0AA0 3VA6110-5KM41-0AA0 3VA6115-5KM41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	150 ... 1200 375 ... 2500	20 ... 100 50 ... 250	3VA6210-5KM41-0AA0 3VA6225-5KM41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	375 ... 3000 600 ... 4000	50 ... 250 80 ... 400	3VA6325-5KM41-0AA0 3VA6340-5KM41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	600 ... 4800 900 ... 5400	80 ... 400 120 ... 600	3VA6440-5KM41-0AA0 3VA6460-5KM41-0AA0



3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)		SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)		SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)	
		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, with display, with metering function, ETU820 LIWith adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6KL41-0AA0	3VA6140-7KL41-0AA0	3VA6140-8KL41-0AA0
100	3VA6110-6KL41-0AA0	3VA6110-7KL41-0AA0	3VA6110-8KL41-0AA0
150	3VA6115-6KL41-0AA0	3VA6115-7KL41-0AA0	3VA6115-8KL41-0AA0
100	3VA6210-6KL41-0AA0	3VA6210-7KL41-0AA0	3VA6210-8KL41-0AA0
250	3VA6225-6KL41-0AA0	3VA6225-7KL41-0AA0	3VA6225-8KL41-0AA0
250	3VA6325-6KL41-0AA0	3VA6325-7KL41-0AA0	3VA6325-8KL41-0AA0
400	3VA6340-6KL41-0AA0	3VA6340-7KL41-0AA0	3VA6340-8KL41-0AA0
400	3VA6440-6KL41-0AA0	3VA6440-7KL41-0AA0	3VA6440-8KL41-0AA0
600	3VA6460-6KL41-0AA0	3VA6460-7KL41-0AA0	3VA6460-8KL41-0AA0

Line protection, with display, with metering function, ETU830 LIGWith adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6KM41-0AA0	3VA6140-7KM41-0AA0	3VA6140-8KM41-0AA0
100	3VA6110-6KM41-0AA0	3VA6110-7KM41-0AA0	3VA6110-8KM41-0AA0
150	3VA6115-6KM41-0AA0	3VA6115-7KM41-0AA0	3VA6115-8KM41-0AA0
100	3VA6210-6KM41-0AA0	3VA6210-7KM41-0AA0	3VA6210-8KM41-0AA0
250	3VA6225-6KM41-0AA0	3VA6225-7KM41-0AA0	3VA6225-8KM41-0AA0
250	3VA6325-6KM41-0AA0	3VA6325-7KM41-0AA0	3VA6325-8KM41-0AA0
400	3VA6340-6KM41-0AA0	3VA6340-7KM41-0AA0	3VA6340-8KM41-0AA0
400	3VA6440-6KM41-0AA0	3VA6440-7KM41-0AA0	3VA6440-8KM41-0AA0
600	3VA6460-6KM41-0AA0	3VA6460-7KM41-0AA0	3VA6460-8KM41-0AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

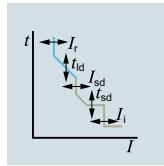


Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d		

4-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



I201_18482



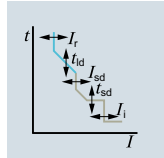
Line protection, with display, with metering function, ETU850 LSI

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%

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KP41-0AA0 3VA6110-5KP41-0AA0 3VA6115-5KP41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KP41-0AA0 3VA6225-5KP41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5KP41-0AA0 3VA6340-5KP41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5KP41-0AA0 3VA6460-5KP41-0AA0



I201_19549



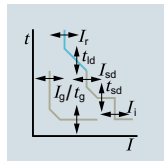
Line protection, with display, with metering function, ETU856 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i , and adjustable ground-fault alarm I_g , with neutral protection against overload and short circuit from 20%/40% to 100%/160%

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KT41-0AA0 3VA6110-5KT41-0AA0 3VA6115-5KT41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KT41-0AA0 3VA6225-5KT41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5KT41-0AA0 3VA6340-5KT41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5KT41-0AA0 3VA6460-5KT41-0AA0



I201_18483



Line protection, with display, with metering function, ETU860 LSI(G)

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

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KQ41-0AA0 3VA6110-5KQ41-0AA0 3VA6115-5KQ41-0AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KQ41-0AA0 3VA6225-5KQ41-0AA0
3VA63	250 400	100 ... 250 160 ... 400	150 ... 2500 240 ... 4000	375 ... 3000 600 ... 4000	3VA6325-5KQ41-0AA0 3VA6340-5KQ41-0AA0
3VA64	400 600	160 ... 400 240 ... 600	240 ... 4000 360 ... 5400	600 ... 4800 900 ... 5400	3VA6440-5KQ41-0AA0 3VA6460-5KQ41-0AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, with metering function, ETU850 LSI

With adjustable overload protection I_n , 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%

40	3VA6140-6KP41-0AA0	3VA6140-7KP41-0AA0	3VA6140-8KP41-0AA0
100	3VA6110-6KP41-0AA0	3VA6110-7KP41-0AA0	3VA6110-8KP41-0AA0
150	3VA6115-6KP41-0AA0	3VA6115-7KP41-0AA0	3VA6115-8KP41-0AA0
100	3VA6210-6KP41-0AA0	3VA6210-7KP41-0AA0	3VA6210-8KP41-0AA0
250	3VA6225-6KP41-0AA0	3VA6225-7KP41-0AA0	3VA6225-8KP41-0AA0
250	3VA6325-6KP41-0AA0	3VA6325-7KP41-0AA0	3VA6325-8KP41-0AA0
400	3VA6340-6KP41-0AA0	3VA6340-7KP41-0AA0	3VA6340-8KP41-0AA0
400	3VA6440-6KP41-0AA0	3VA6440-7KP41-0AA0	3VA6440-8KP41-0AA0
600	3VA6460-6KP41-0AA0	3VA6460-7KP41-0AA0	3VA6460-8KP41-0AA0

Line protection, with display, with metering function, ETU856 LSI(G)

With adjustable overload protection I_n , adjustable delayed short-circuit protection I_{sd} ,
adjustable instantaneous short-circuit protection I_i , and adjustable ground-fault alarm I_g ,
with neutral protection against overload and short circuit from 20%/40% to 100%/160%

40	3VA6140-6KT41-0AA0	3VA6140-7KT41-0AA0	3VA6140-8KT41-0AA0
100	3VA6110-6KT41-0AA0	3VA6110-7KT41-0AA0	3VA6110-8KT41-0AA0
150	3VA6115-6KT41-0AA0	3VA6115-7KT41-0AA0	3VA6115-8KT41-0AA0
100	3VA6210-6KT41-0AA0	3VA6210-7KT41-0AA0	3VA6210-8KT41-0AA0
250	3VA6225-6KT41-0AA0	3VA6225-7KT41-0AA0	3VA6225-8KT41-0AA0
250	3VA6325-6KT41-0AA0	3VA6325-7KT41-0AA0	3VA6325-8KT41-0AA0
400	3VA6340-6KT41-0AA0	3VA6340-7KT41-0AA0	3VA6340-8KT41-0AA0
400	3VA6440-6KT41-0AA0	3VA6440-7KT41-0AA0	3VA6440-8KT41-0AA0
600	3VA6460-6KT41-0AA0	3VA6460-7KT41-0AA0	3VA6460-8KT41-0AA0

Line protection, with display, with metering function, ETU860 LSI(G)

With adjustable overload protection I_n , 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

40	3VA6140-6KQ41-0AA0	3VA6140-7KQ41-0AA0	3VA6140-8KQ41-0AA0
100	3VA6110-6KQ41-0AA0	3VA6110-7KQ41-0AA0	3VA6110-8KQ41-0AA0
150	3VA6115-6KQ41-0AA0	3VA6115-7KQ41-0AA0	3VA6115-8KQ41-0AA0
100	3VA6210-6KQ41-0AA0	3VA6210-7KQ41-0AA0	3VA6210-8KQ41-0AA0
250	3VA6225-6KQ41-0AA0	3VA6225-7KQ41-0AA0	3VA6225-8KQ41-0AA0
250	3VA6325-6KQ41-0AA0	3VA6325-7KQ41-0AA0	3VA6325-8KQ41-0AA0
400	3VA6340-6KQ41-0AA0	3VA6340-7KQ41-0AA0	3VA6340-8KQ41-0AA0
400	3VA6440-6KQ41-0AA0	3VA6440-7KQ41-0AA0	3VA6440-8KQ41-0AA0
600	3VA6460-6KQ41-0AA0	3VA6460-7KQ41-0AA0	3VA6460-8KQ41-0AA0

3

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

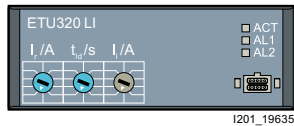
PG = 1CB



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
	A	A	A	A	d

Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	
Article No. www.siemens.com/product?Article No.	Basic price per PU

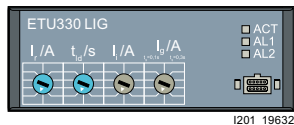
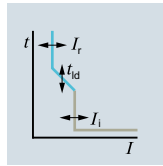
3-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



Line protection, ETU320 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

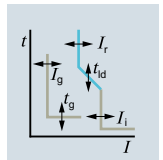
3VA61	40	16 ... 40	60 ... 480	--	3VA6140-5HL31-2AA0
	100	40 ... 100	150 ... 1200	--	3VA6110-5HL31-2AA0
	150	60 ... 150	225 ... 1500	--	3VA6115-5HL31-2AA0
3VA62	100	40 ... 100	150 ... 1200	--	3VA6210-5HL31-2AA0
	250	100 ... 250	375 ... 2500	--	3VA6225-5HL31-2AA0
3VA63	250	100 ... 250	375 ... 3000	--	3VA6325-5HL31-2AA0
3VA64	400	160 ... 400	600 ... 4800	--	3VA6440-5HL31-2AA0



Line protection, ETU330 LIG

With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

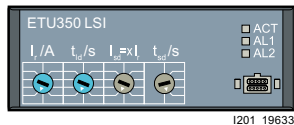
3VA61	40	16 ... 40	60 ... 480	8 ... 40	3VA6140-5HM31-2AA0
	100	40 ... 100	150 ... 1200	20 ... 100	3VA6110-5HM31-2AA0
	150	60 ... 150	225 ... 1500	30 ... 150	3VA6115-5HM31-2AA0
3VA62	100	40 ... 100	150 ... 1200	20 ... 100	3VA6210-5HM31-2AA0
	250	100 ... 250	375 ... 2500	50 ... 250	3VA6225-5HM31-2AA0
3VA63	250	100 ... 250	375 ... 3000	50 ... 250	3VA6325-5HM31-2AA0
3VA64	400	160 ... 400	600 ... 4800	80 ... 400	3VA6440-5HM31-2AA0



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
	A	A	A	A	d

Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	
Article No. www.siemens.com/product?Article No.	Basic price per PU

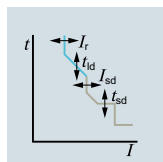
3-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



Line protection, ETU350 LSI

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} and fixed instantaneous short-circuit protection I_i

3VA61	40	16 ... 40	1.5 ... 10	480	3VA6140-5HN31-2AA0
	100	40 ... 100	1.5 ... 10	1200	3VA6110-5HN31-2AA0
	150	60 ... 150	1.5 ... 10	1500	3VA6115-5HN31-2AA0
3VA62	100	40 ... 100	1.5 ... 10	1200	3VA6210-5HN31-2AA0
	250	100 ... 250	1.5 ... 10	2500	3VA6225-5HN31-2AA0
3VA63	250	100 ... 250	1.5 ... 10	3000	3VA6325-5HN31-2AA0
3VA64	400	160 ... 400	1.5 ... 10	4800	3VA6440-5HN31-2AA0



¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to [page 4/22](#) when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		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, ETU320 LIWith adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6HL31-2AA0	3VA6140-7HL31-2AA0	3VA6140-8HL31-2AA0
100	3VA6110-6HL31-2AA0	3VA6110-7HL31-2AA0	3VA6110-8HL31-2AA0
150	3VA6115-6HL31-2AA0	3VA6115-7HL31-2AA0	3VA6115-8HL31-2AA0
100	3VA6210-6HL31-2AA0	3VA6210-7HL31-2AA0	3VA6210-8HL31-2AA0
250	3VA6225-6HL31-2AA0	3VA6225-7HL31-2AA0	3VA6225-8HL31-2AA0
250	3VA6325-6HL31-2AA0	3VA6325-7HL31-2AA0	3VA6325-8HL31-2AA0
400	3VA6440-6HL31-2AA0	3VA6440-7HL31-2AA0	3VA6440-8HL31-2AA0

Line protection, ETU330 LIGWith adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6HM31-2AA0	3VA6140-7HM31-2AA0	3VA6140-8HM31-2AA0
100	3VA6110-6HM31-2AA0	3VA6110-7HM31-2AA0	3VA6110-8HM31-2AA0
150	3VA6115-6HM31-2AA0	3VA6115-7HM31-2AA0	3VA6115-8HM31-2AA0
100	3VA6210-6HM31-2AA0	3VA6210-7HM31-2AA0	3VA6210-8HM31-2AA0
250	3VA6225-6HM31-2AA0	3VA6225-7HM31-2AA0	3VA6225-8HM31-2AA0
250	3VA6325-6HM31-2AA0	3VA6325-7HM31-2AA0	3VA6325-8HM31-2AA0
400	3VA6440-6HM31-2AA0	3VA6440-7HM31-2AA0	3VA6440-8HM31-2AA0

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		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, ETU350 LSIWith adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} and fixed instantaneous short-circuit protection I_i

40	3VA6140-6HN31-2AA0	3VA6140-7HN31-2AA0	3VA6140-8HN31-2AA0
100	3VA6110-6HN31-2AA0	3VA6110-7HN31-2AA0	3VA6110-8HN31-2AA0
150	3VA6115-6HN31-2AA0	3VA6115-7HN31-2AA0	3VA6115-8HN31-2AA0
100	3VA6210-6HN31-2AA0	3VA6210-7HN31-2AA0	3VA6210-8HN31-2AA0
250	3VA6225-6HN31-2AA0	3VA6225-7HN31-2AA0	3VA6225-8HN31-2AA0
250	3VA6325-6HN31-2AA0	3VA6325-7HN31-2AA0	3VA6325-8HN31-2AA0
400	3VA6440-6HN31-2AA0	3VA6440-7HN31-2AA0	3VA6440-8HN31-2AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7
	A	A	A	A	d	Basic price per PU

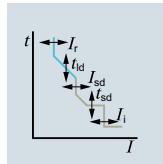
3-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



Line 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

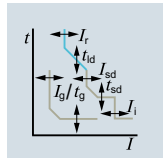
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JP31-2AA0 3VA6110-5JP31-2AA0 3VA6115-5JP31-2AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JP31-2AA0 3VA6225-5JP31-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5JP31-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5JP31-2AA0



Line protection, with display, ETU556 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

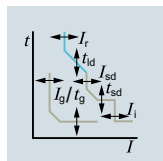
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JT31-2AA0 3VA6110-5JT31-2AA0 3VA6115-5JT31-2AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JT31-2AA0 3VA6225-5JT31-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5JT31-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5JT31-2AA0



Line 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

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5JQ31-2AA0 3VA6110-5JQ31-2AA0 3VA6115-5JQ31-2AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5JQ31-2AA0 3VA6225-5JQ31-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5JQ31-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5JQ31-2AA0



¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to page 4/22 when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, ETU550 LSIWith adjustable overload protection I_p , adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6JP31-2AA0	3VA6140-7JP31-2AA0	3VA6140-8JP31-2AA0
100	3VA6110-6JP31-2AA0	3VA6110-7JP31-2AA0	3VA6110-8JP31-2AA0
150	3VA6115-6JP31-2AA0	3VA6115-7JP31-2AA0	3VA6115-8JP31-2AA0
100	3VA6210-6JP31-2AA0	3VA6210-7JP31-2AA0	3VA6210-8JP31-2AA0
250	3VA6225-6JP31-2AA0	3VA6225-7JP31-2AA0	3VA6225-8JP31-2AA0
250	3VA6325-6JP31-2AA0	3VA6325-7JP31-2AA0	3VA6325-8JP31-2AA0
400	3VA6440-6JP31-2AA0	3VA6440-7JP31-2AA0	3VA6440-8JP31-2AA0

Line protection, with display, ETU556 LSI(G)With adjustable overload protection I_p , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

40	3VA6140-6JT31-2AA0	3VA6140-7JT31-2AA0	3VA6140-8JT31-2AA0
100	3VA6110-6JT31-2AA0	3VA6110-7JT31-2AA0	3VA6110-8JT31-2AA0
150	3VA6115-6JT31-2AA0	3VA6115-7JT31-2AA0	3VA6115-8JT31-2AA0
100	3VA6210-6JT31-2AA0	3VA6210-7JT31-2AA0	3VA6210-8JT31-2AA0
250	3VA6225-6JT31-2AA0	3VA6225-7JT31-2AA0	3VA6225-8JT31-2AA0
250	3VA6325-6JT31-2AA0	3VA6325-7JT31-2AA0	3VA6325-8JT31-2AA0
400	3VA6440-6JT31-2AA0	3VA6440-7JT31-2AA0	3VA6440-8JT31-2AA0

Line protection, with display, ETU560 LSiGWith adjustable overload protection I_p , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6JQ31-2AA0	3VA6140-7JQ31-2AA0	3VA6140-8JQ31-2AA0
100	3VA6110-6JQ31-2AA0	3VA6110-7JQ31-2AA0	3VA6110-8JQ31-2AA0
150	3VA6115-6JQ31-2AA0	3VA6115-7JQ31-2AA0	3VA6115-8JQ31-2AA0
100	3VA6210-6JQ31-2AA0	3VA6210-7JQ31-2AA0	3VA6210-8JQ31-2AA0
250	3VA6225-6JQ31-2AA0	3VA6225-7JQ31-2AA0	3VA6225-8JQ31-2AA0
250	3VA6325-6JQ31-2AA0	3VA6325-7JQ31-2AA0	3VA6325-8JQ31-2AA0
400	3VA6440-6JQ31-2AA0	3VA6440-7JQ31-2AA0	3VA6440-8JQ31-2AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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
	A	A	A	A	d

Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	
Article No. www.siemens.com/product?Article No.	Basic price per PU

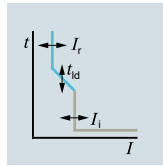
3-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



Line protection, with display, with metering function, ETU820 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

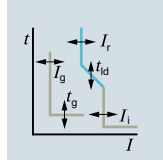
3VA61	40	16 ... 40	60 ... 480	--	3VA6140-5KL31-2AA0
	100	40 ... 100	150 ... 1200	--	3VA6110-5KL31-2AA0
	150	60 ... 150	225 ... 1500	--	3VA6115-5KL31-2AA0
3VA62	100	40 ... 100	150 ... 1200	--	3VA6210-5KL31-2AA0
	250	100 ... 250	375 ... 2500	--	3VA6225-5KL31-2AA0
3VA63	250	100 ... 250	375 ... 3000	--	3VA6325-5KL31-2AA0
3VA64	400	160 ... 400	600 ... 4800	--	3VA6440-5KL31-2AA0



Line protection, with display, with metering function, ETU830 LIG

With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

3VA61	40	16 ... 40	60 ... 480	15 ... 40	3VA6140-5KM31-2AA0
	100	40 ... 100	150 ... 1200	20 ... 100	3VA6110-5KM31-2AA0
	150	60 ... 150	225 ... 1500	30 ... 150	3VA6115-5KM31-2AA0
3VA62	100	40 ... 100	150 ... 1200	20 ... 100	3VA6210-5KM31-2AA0
	250	100 ... 250	375 ... 2500	50 ... 250	3VA6225-5KM31-2AA0
3VA63	250	100 ... 250	375 ... 3000	50 ... 250	3VA6325-5KM31-2AA0
3VA64	400	160 ... 400	600 ... 4800	80 ... 400	3VA6440-5KM31-2AA0



¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to [page 4/22](#) when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, with metering function, ETU820 LIWith adjustable overload protection I_n and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6KL31-2AA0	3VA6140-7KL31-2AA0	3VA6140-8KL31-2AA0
100	3VA6110-6KL31-2AA0	3VA6110-7KL31-2AA0	3VA6110-8KL31-2AA0
150	3VA6115-6KL31-2AA0	3VA6115-7KL31-2AA0	3VA6115-8KL31-2AA0
100	3VA6210-6KL31-2AA0	3VA6210-7KL31-2AA0	3VA6210-8KL31-2AA0
250	3VA6225-6KL31-2AA0	3VA6225-7KL31-2AA0	3VA6225-8KL31-2AA0
250	3VA6325-6KL31-2AA0	3VA6325-7KL31-2AA0	3VA6325-8KL31-2AA0
400	3VA6440-6KL31-2AA0	3VA6440-7KL31-2AA0	3VA6440-8KL31-2AA0

Line protection, with display, with metering function, ETU830 LIGWith adjustable overload protection I_n , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6KM31-2AA0	3VA6140-7KM31-2AA0	3VA6140-8KM31-2AA0
100	3VA6110-6KM31-2AA0	3VA6110-7KM31-2AA0	3VA6110-8KM31-2AA0
150	3VA6115-6KM31-2AA0	3VA6115-7KM31-2AA0	3VA6115-8KM31-2AA0
100	3VA6210-6KM31-2AA0	3VA6210-7KM31-2AA0	3VA6210-8KM31-2AA0
250	3VA6225-6KM31-2AA0	3VA6225-7KM31-2AA0	3VA6225-8KM31-2AA0
250	3VA6325-6KM31-2AA0	3VA6325-7KM31-2AA0	3VA6325-8KM31-2AA0
400	3VA6440-6KM31-2AA0	3VA6440-7KM31-2AA0	3VA6440-8KM31-2AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d		

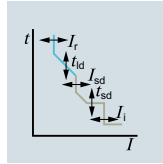
3-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



Line protection, with display, with metering function, ETU850 LSI

With adjustable overload protection I_n , adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i

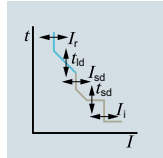
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KP31-2AA0 3VA6110-5KP31-2AA0 3VA6115-5KP31-2AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KP31-2AA0 3VA6225-5KP31-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5KP31-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5KP31-2AA0



Line protection, with display, with metering function, ETU856 LSI(G)

With adjustable overload protection I_n , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

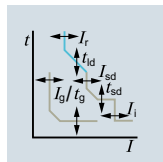
3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KT31-2AA0 3VA6110-5KT31-2AA0 3VA6115-5KT31-2AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KT31-2AA0 3VA6225-5KT31-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5KT31-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5KT31-2AA0



Line protection, with display, with metering function, ETU860 LSI(G)

With adjustable overload protection I_n , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

3VA61	40 100 150	16 ... 40 40 ... 100 60 ... 150	24 ... 400 60 ... 1000 90 ... 1500	60 ... 480 150 ... 1200 225 ... 1500	3VA6140-5KQ31-2AA0 3VA6110-5KQ31-2AA0 3VA6115-5KQ31-2AA0
3VA62	100 250	40 ... 100 100 ... 250	60 ... 1000 150 ... 2500	150 ... 1200 375 ... 2500	3VA6210-5KQ31-2AA0 3VA6225-5KQ31-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5KQ31-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5KQ31-2AA0



¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to [page 4/22](#) when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, with metering function, ETU850 LSIWith adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6KP31-2AA0	3VA6140-7KP31-2AA0	3VA6140-8KP31-2AA0
100	3VA6110-6KP31-2AA0	3VA6110-7KP31-2AA0	3VA6110-8KP31-2AA0
150	3VA6115-6KP31-2AA0	3VA6115-7KP31-2AA0	3VA6115-8KP31-2AA0
100	3VA6210-6KP31-2AA0	3VA6210-7KP31-2AA0	3VA6210-8KP31-2AA0
250	3VA6225-6KP31-2AA0	3VA6225-7KP31-2AA0	3VA6225-8KP31-2AA0
250	3VA6325-6KP31-2AA0	3VA6325-7KP31-2AA0	3VA6325-8KP31-2AA0
400	3VA6440-6KP31-2AA0	3VA6440-7KP31-2AA0	3VA6440-8KP31-2AA0

Line protection, with display, with metering function, ETU856 LSI(G)With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

40	3VA6140-6KT31-2AA0	3VA6140-7KT31-2AA0	3VA6140-8KT31-2AA0
100	3VA6110-6KT31-2AA0	3VA6110-7KT31-2AA0	3VA6110-8KT31-2AA0
150	3VA6115-6KT31-2AA0	3VA6115-7KT31-2AA0	3VA6115-8KT31-2AA0
100	3VA6210-6KT31-2AA0	3VA6210-7KT31-2AA0	3VA6210-8KT31-2AA0
250	3VA6225-6KT31-2AA0	3VA6225-7KT31-2AA0	3VA6225-8KT31-2AA0
250	3VA6325-6KT31-2AA0	3VA6325-7KT31-2AA0	3VA6325-8KT31-2AA0
400	3VA6440-6KT31-2AA0	3VA6440-7KT31-2AA0	3VA6440-8KT31-2AA0

Line protection, with display, with metering function, ETU860 LSI GWith 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

40	3VA6140-6KQ31-2AA0	3VA6140-7KQ31-2AA0	3VA6140-8KQ31-2AA0
100	3VA6110-6KQ31-2AA0	3VA6110-7KQ31-2AA0	3VA6110-8KQ31-2AA0
150	3VA6115-6KQ31-2AA0	3VA6115-7KQ31-2AA0	3VA6115-8KQ31-2AA0
100	3VA6210-6KQ31-2AA0	3VA6210-7KQ31-2AA0	3VA6210-8KQ31-2AA0
250	3VA6225-6KQ31-2AA0	3VA6225-7KQ31-2AA0	3VA6225-8KQ31-2AA0
250	3VA6325-6KQ31-2AA0	3VA6325-7KQ31-2AA0	3VA6325-8KQ31-2AA0
400	3VA6440-6KQ31-2AA0	3VA6440-7KQ31-2AA0	3VA6440-8KQ31-2AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

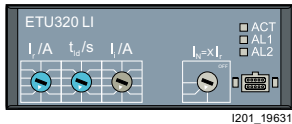
PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d	Article No. www.siemens.com/product?Article No.	

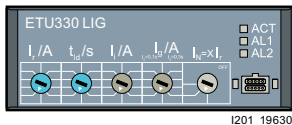
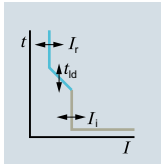
4-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



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%

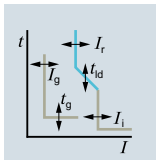
3VA61	40	16 ... 40	60 ... 480	--	3VA6140-5HL41-2AA0
	100	40 ... 100	150 ... 1200	--	3VA6110-5HL41-2AA0
	150	60 ... 150	225 ... 1500	--	3VA6115-5HL41-2AA0
3VA62	100	40 ... 100	150 ... 1200	--	3VA6210-5HL41-2AA0
	250	100 ... 250	375 ... 2500	--	3VA6225-5HL41-2AA0
3VA63	250	100 ... 250	375 ... 3000	--	3VA6325-5HL41-2AA0
3VA64	400	160 ... 400	600 ... 4800	--	3VA6440-5HL41-2AA0



Line protection, ETU330 LIG

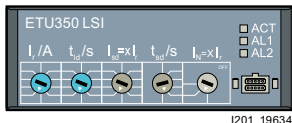
With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i , with neutral protection against overload and short circuit 0%, 50% or 100% and adjustable ground-fault protection I_g

3VA61	40	16 ... 40	60 ... 480	8 ... 40	3VA6140-5HM41-2AA0
	100	40 ... 100	150 ... 1200	20 ... 100	3VA6110-5HM41-2AA0
	150	60 ... 150	225 ... 1500	30 ... 150	3VA6115-5HM41-2AA0
3VA62	100	40 ... 100	150 ... 1200	20 ... 100	3VA6210-5HM41-2AA0
	250	100 ... 250	375 ... 2500	50 ... 250	3VA6225-5HM41-2AA0
3VA63	250	100 ... 250	375 ... 3000	50 ... 250	3VA6325-5HM41-2AA0
3VA64	400	160 ... 400	600 ... 4800	80 ... 400	3VA6440-5HM41-2AA0



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d	Article No. www.siemens.com/product?Article No.	

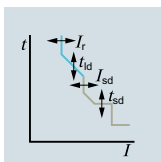
4-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



Line protection, ETU350 LSI

With adjustable overload protection I_r , adjustable instantaneous 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%

3VA61	40	16 ... 40	1.5 ... 10	480	3VA6140-5HN41-2AA0
	100	40 ... 100	1.5 ... 10	1200	3VA6110-5HN41-2AA0
	150	60 ... 150	1.5 ... 10	1500	3VA6115-5HN41-2AA0
3VA62	100	40 ... 100	1.5 ... 10	1200	3VA6210-5HN41-2AA0
	250	100 ... 250	1.5 ... 10	2500	3VA6225-5HN41-2AA0
3VA63	250	100 ... 250	1.5 ... 10	3000	3VA6325-5HN41-2AA0
3VA64	400	160 ... 400	1.5 ... 10	4800	3VA6440-5HN41-2AA0



¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to [page 4/22](#) when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, ETU320 LIWith 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%

40	3VA6140-6HL41-2AA0	3VA6140-7HL41-2AA0	3VA6140-8HL41-2AA0
100	3VA6110-6HL41-2AA0	3VA6110-7HL41-2AA0	3VA6110-8HL41-2AA0
150	3VA6115-6HL41-2AA0	3VA6115-7HL41-2AA0	3VA6115-8HL41-2AA0
100	3VA6210-6HL41-2AA0	3VA6210-7HL41-2AA0	3VA6210-8HL41-2AA0
250	3VA6225-6HL41-2AA0	3VA6225-7HL41-2AA0	3VA6225-8HL41-2AA0
250	3VA6325-6HL41-2AA0	3VA6325-7HL41-2AA0	3VA6325-8HL41-2AA0
400	3VA6440-6HL41-2AA0	3VA6440-7HL41-2AA0	3VA6440-8HL41-2AA0

Line protection, ETU330 LIGWith adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i , with neutral protection against overload and short circuit 0%, 50% or 100% and adjustable ground-fault protection I_g

40	3VA6140-6HM41-2AA0	3VA6140-7HM41-2AA0	3VA6140-8HM41-2AA0
100	3VA6110-6HM41-2AA0	3VA6110-7HM41-2AA0	3VA6110-8HM41-2AA0
150	3VA6115-6HM41-2AA0	3VA6115-7HM41-2AA0	3VA6115-8HM41-2AA0
100	3VA6210-6HM41-2AA0	3VA6210-7HM41-2AA0	3VA6210-8HM41-2AA0
250	3VA6225-6HM41-2AA0	3VA6225-7HM41-2AA0	3VA6225-8HM41-2AA0
250	3VA6325-6HM41-2AA0	3VA6325-7HM41-2AA0	3VA6325-8HM41-2AA0
400	3VA6440-6HM41-2AA0	3VA6440-7HM41-2AA0	3VA6440-8HM41-2AA0

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, ETU350 LSIWith adjustable overload protection I_r , adjustable instantaneous 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%

40	3VA6140-6HN41-2AA0	3VA6140-7HN41-2AA0	3VA6140-8HN41-2AA0
100	3VA6110-6HN41-2AA0	3VA6110-7HN41-2AA0	3VA6110-8HN41-2AA0
150	3VA6115-6HN41-2AA0	3VA6115-7HN41-2AA0	3VA6115-8HN41-2AA0
100	3VA6210-6HN41-2AA0	3VA6210-7HN41-2AA0	3VA6210-8HN41-2AA0
250	3VA6225-6HN41-2AA0	3VA6225-7HN41-2AA0	3VA6225-8HN41-2AA0
250	3VA6325-6HN41-2AA0	3VA6325-7HN41-2AA0	3VA6325-8HN41-2AA0
400	3VA6440-6HN41-2AA0	3VA6440-7HN41-2AA0	3VA6440-8HN41-2AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



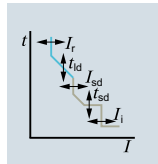
Type	Rated current I_n	Current setting of the inverse- time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD
	A	A	A	A	d

Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	
Article No. www.siemens.com/product?Article No.	Basic price per PU

4-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



I201_18480



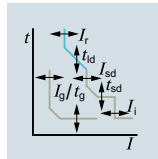
Line protection, with display, ETU550 LSI

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%

3VA61	40	16 ... 40	24 ... 400	60 ... 480	3VA6140-5JP41-2AA0 3VA6110-5JP41-2AA0 3VA6115-5JP41-2AA0
	100	40 ... 100	60 ... 1000	150 ... 1200	
	150	60 ... 150	90 ... 1500	225 ... 1500	
3VA62	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6210-5JP41-2AA0 3VA6225-5JP41-2AA0
	250	100 ... 250	150 ... 2500	375 ... 2500	
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5JP41-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5JP41-2AA0



I201_19550



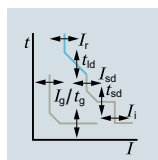
Line protection, with display, ETU556 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

3VA61	40	16 ... 40	24 ... 400	60 ... 480	3VA6140-5JT41-2AA0 3VA6110-5JT41-2AA0 3VA6115-5JT41-2AA0
	100	40 ... 100	60 ... 1000	150 ... 1200	
	150	60 ... 150	90 ... 1500	225 ... 1500	
3VA62	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6210-5JT41-2AA0 3VA6225-5JT41-2AA0
	250	100 ... 250	150 ... 2500	375 ... 2500	
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5JT41-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5JT41-2AA0



I201_18481



Line protection, with display, ETU560 LSI(G)

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

3VA61	40	16 ... 40	24 ... 400	60 ... 480	3VA6140-5JQ41-2AA0 3VA6110-5JQ41-2AA0 3VA6115-5JQ41-2AA0
	100	40 ... 100	60 ... 1000	150 ... 1200	
	150	60 ... 150	90 ... 1500	225 ... 1500	
3VA62	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6210-5JQ41-2AA0 3VA6225-5JQ41-2AA0
	250	100 ... 250	150 ... 2500	375 ... 2500	
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5JQ41-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5JQ41-2AA0

¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to [page 4/22](#) when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, ETU550 LSI

With adjustable overload protection I_n , 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%

40	3VA6140-6JP41-2AA0	3VA6140-7JP41-2AA0	3VA6140-8JP41-2AA0
100	3VA6110-6JP41-2AA0	3VA6110-7JP41-2AA0	3VA6110-8JP41-2AA0
150	3VA6115-6JP41-2AA0	3VA6115-7JP41-2AA0	3VA6115-8JP41-2AA0
100	3VA6210-6JP41-2AA0	3VA6210-7JP41-2AA0	3VA6210-8JP41-2AA0
250	3VA6225-6JP41-2AA0	3VA6225-7JP41-2AA0	3VA6225-8JP41-2AA0
250	3VA6325-6JP41-2AA0	3VA6325-7JP41-2AA0	3VA6325-8JP41-2AA0
400	3VA6440-6JP41-2AA0	3VA6440-7JP41-2AA0	3VA6440-8JP41-2AA0

Line protection, with display, ETU556 LSI(G)

With adjustable overload protection I_n , adjustable delayed short-circuit protection I_{sd} ,
adjustable instantaneous short-circuit protection I_i and adjustable ground-fault alarm I_g

40	3VA6140-6JT41-2AA0	3VA6140-7JT41-2AA0	3VA6140-8JT41-2AA0
100	3VA6110-6JT41-2AA0	3VA6110-7JT41-2AA0	3VA6110-8JT41-2AA0
150	3VA6115-6JT41-2AA0	3VA6115-7JT41-2AA0	3VA6115-8JT41-2AA0
100	3VA6210-6JT41-2AA0	3VA6210-7JT41-2AA0	3VA6210-8JT41-2AA0
250	3VA6225-6JT41-2AA0	3VA6225-7JT41-2AA0	3VA6225-8JT41-2AA0
250	3VA6325-6JT41-2AA0	3VA6325-7JT41-2AA0	3VA6325-8JT41-2AA0
400	3VA6440-6JT41-2AA0	3VA6440-7JT41-2AA0	3VA6440-8JT41-2AA0

Line protection, with display, ETU560 LSI(G)

With adjustable overload protection I_n , 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

40	3VA6140-6JQ41-2AA0	3VA6140-7JQ41-2AA0	3VA6140-8JQ41-2AA0
100	3VA6110-6JQ41-2AA0	3VA6110-7JQ41-2AA0	3VA6110-8JQ41-2AA0
150	3VA6115-6JQ41-2AA0	3VA6115-7JQ41-2AA0	3VA6115-8JQ41-2AA0
100	3VA6210-6JQ41-2AA0	3VA6210-7JQ41-2AA0	3VA6210-8JQ41-2AA0
250	3VA6225-6JQ41-2AA0	3VA6225-7JQ41-2AA0	3VA6225-8JQ41-2AA0
250	3VA6325-6JQ41-2AA0	3VA6325-7JQ41-2AA0	3VA6325-8JQ41-2AA0
400	3VA6440-6JQ41-2AA0	3VA6440-7JQ41-2AA0	3VA6440-8JQ41-2AA0

3

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB



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	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d		

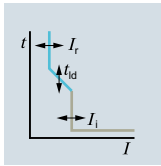
4-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



Line protection, with display, with metering function, ETU820 LI

With adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

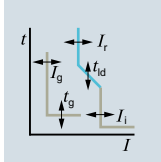
3VA61	40	16 ... 40	60 ... 480	--	3VA6140-5KL41-2AA0
	100	40 ... 100	150 ... 1200	--	3VA6110-5KL41-2AA0
	150	60 ... 150	225 ... 1500	--	3VA6115-5KL41-2AA0
3VA62	100	40 ... 100	150 ... 1200	--	3VA6210-5KL41-2AA0
	250	100 ... 250	375 ... 2500	--	3VA6225-5KL41-2AA0
3VA63	250	100 ... 250	375 ... 3000	--	3VA6325-5KL41-2AA0
3VA64	400	160 ... 400	600 ... 4800	--	3VA6440-5KL41-2AA0



Line protection, with display, with metering function, ETU830 LIG

With adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

3VA61	40	16 ... 40	60 ... 480	15 ... 40	3VA6140-5KM41-2AA0
	100	40 ... 100	150 ... 1200	20 ... 100	3VA6110-5KM41-2AA0
	150	60 ... 150	225 ... 1500	30 ... 150	3VA6115-5KM41-2AA0
3VA62	100	40 ... 100	150 ... 1200	20 ... 100	3VA6210-5KM41-2AA0
	250	100 ... 250	375 ... 2500	50 ... 250	3VA6225-5KM41-2AA0
3VA63	250	100 ... 250	375 ... 3000	50 ... 250	3VA6325-5KM41-2AA0
3VA64	400	160 ... 400	600 ... 4800	80 ... 400	3VA6440-5KM41-2AA0



¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to [page 4/22](#) when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line protection, with display, with metering function, ETU820 LIWith adjustable overload protection I_r and adjustable instantaneous short-circuit protection I_i

40	3VA6140-6KL41-2AA0	3VA6140-7KL41-2AA0	3VA6140-8KL41-2AA0
100	3VA6110-6KL41-2AA0	3VA6110-7KL41-2AA0	3VA6110-8KL41-2AA0
150	3VA6115-6KL41-2AA0	3VA6115-7KL41-2AA0	3VA6115-8KL41-2AA0
100	3VA6210-6KL41-2AA0	3VA6210-7KL41-2AA0	3VA6210-8KL41-2AA0
250	3VA6225-6KL41-2AA0	3VA6225-7KL41-2AA0	3VA6225-8KL41-2AA0
250	3VA6325-6KL41-2AA0	3VA6325-7KL41-2AA0	3VA6325-8KL41-2AA0
400	3VA6440-6KL41-2AA0	3VA6440-7KL41-2AA0	3VA6440-8KL41-2AA0

Line protection, with display, with metering function, ETU830 LIGWith adjustable overload protection I_r , adjustable instantaneous short-circuit protection I_i and adjustable ground-fault protection I_g

40	3VA6140-6KM41-2AA0	3VA6140-7KM41-2AA0	3VA6140-8KM41-2AA0
100	3VA6110-6KM41-2AA0	3VA6110-7KM41-2AA0	3VA6110-8KM41-2AA0
150	3VA6115-6KM41-2AA0	3VA6115-7KM41-2AA0	3VA6115-8KM41-2AA0
100	3VA6210-6KM41-2AA0	3VA6210-7KM41-2AA0	3VA6210-8KM41-2AA0
250	3VA6225-6KM41-2AA0	3VA6225-7KM41-2AA0	3VA6225-8KM41-2AA0
250	3VA6325-6KM41-2AA0	3VA6325-7KM41-2AA0	3VA6325-8KM41-2AA0
400	3VA6440-6KM41-2AA0	3VA6440-7KM41-2AA0	3VA6440-8KM41-2AA0

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

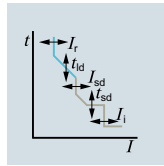


Type	Rated current I_n	Current setting of the inverse-time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	Medium breaking capacity M, up to 35 kA at 480 V See "Overview", p. 1/6 and 1/7	Basic price per PU
	A	A	A	A	d		

4-pole, fixed-mounted, 100 % rated, 3VA61 to 3VA64, up to 400 A¹⁾ Electronic Trip Unit



1201_18482



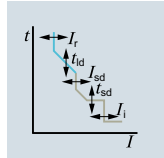
Line protection, with display, with metering function, ETU850 LSI

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%

3VA61	40	16 ... 40	24 ... 400	60 ... 480	3VA6140-5KP41-2AA0
	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6110-5KP41-2AA0
	150	60 ... 150	90 ... 1500	225 ... 1500	3VA6115-5KP41-2AA0
3VA62	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6210-5KP41-2AA0
	250	100 ... 250	150 ... 2500	375 ... 2500	3VA6225-5KP41-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5KP41-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5KP41-2AA0



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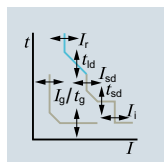
Line protection, with display, with metering function, ETU856 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} , adjustable instantaneous short-circuit protection I_i , and adjustable ground-fault alarm I_g , with neutral protection against overload and short circuit from 20%/40% to 100%/160%

3VA61	40	16 ... 40	24 ... 400	60 ... 480	3VA6140-5KT41-2AA0
	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6110-5KT41-2AA0
	150	60 ... 150	90 ... 1500	225 ... 1500	3VA6115-5KT41-2AA0
3VA62	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6210-5KT41-2AA0
	250	100 ... 250	150 ... 2500	375 ... 2500	3VA6225-5KT41-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5KT41-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5KT41-2AA0



1201_18483



Line protection, with display, with metering function, ETU860 LSI(G)

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

3VA61	40	16 ... 40	24 ... 400	60 ... 480	3VA6140-5KQ41-2AA0
	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6110-5KQ41-2AA0
	150	60 ... 150	90 ... 1500	225 ... 1500	3VA6115-5KQ41-2AA0
3VA62	100	40 ... 100	60 ... 1000	150 ... 1200	3VA6210-5KQ41-2AA0
	250	100 ... 250	150 ... 2500	375 ... 2500	3VA6225-5KQ41-2AA0
3VA63	250	100 ... 250	150 ... 2500	375 ... 3000	3VA6325-5KQ41-2AA0
3VA64	400	160 ... 400	240 ... 4000	600 ... 4800	3VA6440-5KQ41-2AA0

¹⁾ 3VA6 molded case circuit breakers are supplied without connection technology. Pay attention to page 4/22 when selecting suitable connection technology.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Line protection, 100 % rated breakers

PU (UNIT, SET, M) = 1

PS = 1 unit

PG = 1CB

Rated current I_n	SD	High breaking capacity H, up to 65 kA at 480 V See "Overview", p. 1/6 and 1/7 (H)	SD	Very high breaking capacity C, up to 100 kA at 480 V See "Overview", p. 1/6 and 1/7 (C)	SD	Extremely high breaking capacity L, up to 150 kA at 480 V See "Overview", p. 1/6 and 1/7 (L)
		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.		Article No. www.siemens.com/ product?Article No.
		Basic price per PU		Basic price per PU		Basic price per PU
A	d		d		d	

Line 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%

40	3VA6140-6KP41-2AA0	3VA6140-7KP41-2AA0	3VA6140-8KP41-2AA0
100	3VA6110-6KP41-2AA0	3VA6110-7KP41-2AA0	3VA6110-8KP41-2AA0
150	3VA6115-6KP41-2AA0	3VA6115-7KP41-2AA0	3VA6115-8KP41-2AA0
100	3VA6210-6KP41-2AA0	3VA6210-7KP41-2AA0	3VA6210-8KP41-2AA0
250	3VA6225-6KP41-2AA0	3VA6225-7KP41-2AA0	3VA6225-8KP41-2AA0
250	3VA6325-6KP41-2AA0	3VA6325-7KP41-2AA0	3VA6325-8KP41-2AA0
400	3VA6440-6KP41-2AA0	3VA6440-7KP41-2AA0	3VA6440-8KP41-2AA0

Line protection, with display, with metering function, ETU856 LSI(G)

With adjustable overload protection I_r , adjustable delayed short-circuit protection I_{sd} ,
adjustable instantaneous short-circuit protection I_i , and adjustable ground-fault alarm I_g ,
with neutral protection against overload and short circuit from 20%/40% to 100%/160%

40	3VA6140-6KT41-2AA0	3VA6140-7KT41-2AA0	3VA6140-8KT41-2AA0
100	3VA6110-6KT41-2AA0	3VA6110-7KT41-2AA0	3VA6110-8KT41-2AA0
150	3VA6115-6KT41-2AA0	3VA6115-7KT41-2AA0	3VA6115-8KT41-2AA0
100	3VA6210-6KT41-2AA0	3VA6210-7KT41-2AA0	3VA6210-8KT41-2AA0
250	3VA6225-6KT41-2AA0	3VA6225-7KT41-2AA0	3VA6225-8KT41-2AA0
250	3VA6325-6KT41-2AA0	3VA6325-7KT41-2AA0	3VA6325-8KT41-2AA0
400	3VA6440-6KT41-2AA0	3VA6440-7KT41-2AA0	3VA6440-8KT41-2AA0

Line protection, with display, with metering function, ETU860 LSI(G)

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

40	3VA6140-6KQ41-2AA0	3VA6140-7KQ41-2AA0	3VA6140-8KQ41-2AA0
100	3VA6110-6KQ41-2AA0	3VA6110-7KQ41-2AA0	3VA6110-8KQ41-2AA0
150	3VA6115-6KQ41-2AA0	3VA6115-7KQ41-2AA0	3VA6115-8KQ41-2AA0
100	3VA6210-6KQ41-2AA0	3VA6210-7KQ41-2AA0	3VA6210-8KQ41-2AA0
250	3VA6225-6KQ41-2AA0	3VA6225-7KQ41-2AA0	3VA6225-8KQ41-2AA0
250	3VA6325-6KQ41-2AA0	3VA6325-7KQ41-2AA0	3VA6325-8KQ41-2AA0
400	3VA6440-6KQ41-2AA0	3VA6440-7KQ41-2AA0	3VA6440-8KQ41-2AA0

3

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

Motor circuit protectors and molded case switches

PU (UNIT, SET, M) = 1

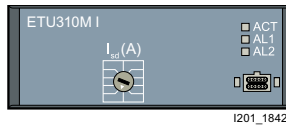
PS = 1 unit

PG = 1CB



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	SCCR without contactor, 100 kA ¹⁾ at 480 V See "Overview", p. 1/6 and 1/7
	A	A	A	A	d	Article No. www.siemens.com/ product?Article No. Basic price per PU

3-pole, fixed-mounted, 3VA61 to 3VA64, up to 600 A Electronic Trip Unit



Motor circuit protector, ETU310M

With adjustable short-circuit protection I_i

3VA61	25	--	--	75 ... 375	3VA6125-1MS31-0AA0
	30	--	--	90 ... 450	3VA6130-1MS31-0AA0
	40	--	--	120 ... 600	3VA6140-1MS31-0AA0
	50	--	--	150 ... 750	3VA6150-1MS31-0AA0
	70	--	--	210 ... 1050	3VA6170-1MS31-0AA0
	80	--	--	240 ... 1200	3VA6180-1MS31-0AA0
	90	--	--	270 ... 1350	3VA6190-1MS31-0AA0
	100	--	--	300 ... 1500	3VA6110-1MS31-0AA0
3VA62	110	--	--	330 ... 1650	3VA6211-1MS31-0AA0
	125	--	--	375 ... 1875	3VA6212-1MS31-0AA0
	150	--	--	450 ... 2250	3VA6215-1MS31-0AA0
	200	--	--	600 ... 2400	3VA6220-1MS31-0AA0
3VA63	200	--	--	600 ... 3000	3VA6320-1MS31-0AA0
	250	--	--	750 ... 3750	3VA6325-1MS31-0AA0
3VA64	400	--	--	1200 ... 5200	3VA6440-1MS31-0AA0
	500	--	--	1500 ... 6000	3VA6450-1MS31-0AA0

¹⁾ Breaking capacity (the SCCR rating) is the maximum permissible short-circuit current at the installation location of the MCS in combination with an appropriate overload protection element.

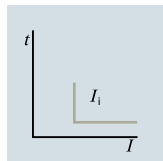
Type	Rated current I_n	Current setting of the inverse- time delayed overload protection "L" I_r	S function (short-time delayed short-circuit protection "S") I_{sd}	Operating current of the instantaneous short-circuit protection "I" I_i	SD	SCCR 100 kA ¹⁾ at 480 V
	A	A	A	A	d	Article No. www.siemens.com/ product?Article No. Basic price per PU

3-pole, fixed-mounted, 3VA63/3VA64, up to 600 A

Molded case switches

With fixed short-circuit protection I_i , for self-protection

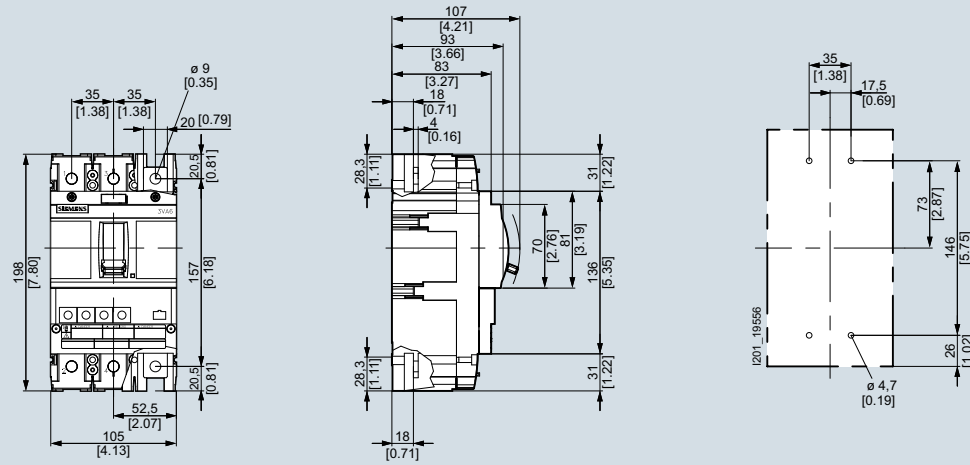
3VA63	400	--	--	5600	3VA6340-1BB31-0AA0
3VA64	600	--	--	5400	3VA6460-1BB31-0AA0



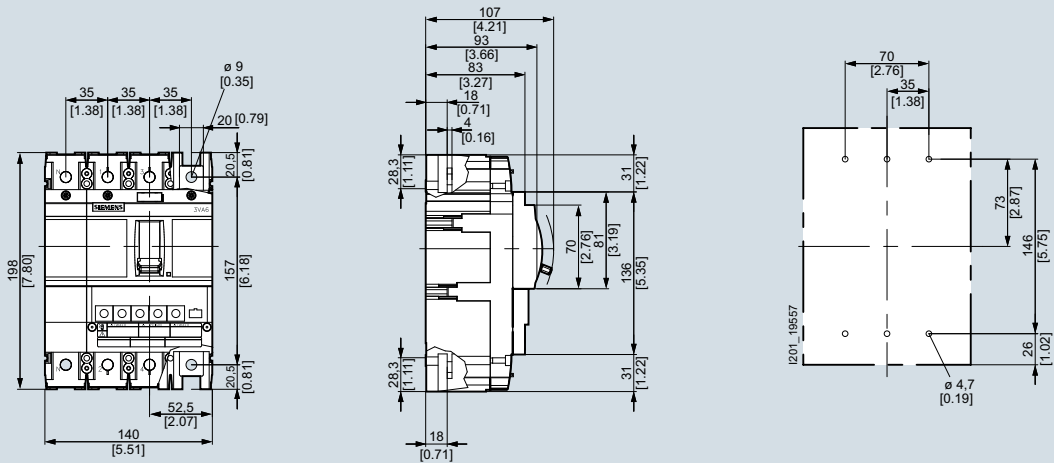
¹⁾ Breaking capacity (the SCCR rating) is the maximum permissible short-circuit current at the installation location of the MCS in combination with an appropriate overload protection element.

3VA UL Molded Case Circuit Breakers

3VA6 Molded Case Circuit Breakers up to 600 A, ETU, 600 V, up to 150 kA

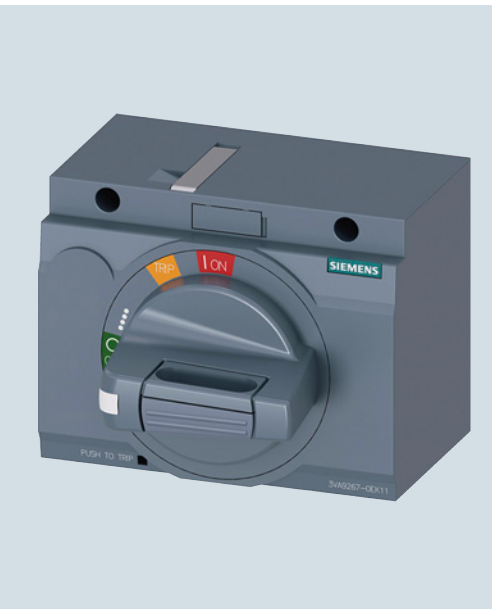
Dimensional drawings**Overview**

3VA61 and 3VA62, 3-pole



3VA61 and 3VA62, 4-pole

Accessories and Spare Parts



4/2	Internal accessories
4/12	Manual operators
4/21	Motor operators
4/22	Connection technology
4/34	Plug-in and draw-out technology
4/39	Communication and testing/ commissioning devices
4/48	Accessories for locking, blocking and interlocking
4/52	Other

**For further technical
product information:**

Siemens Industry Online Support:
[www.siemens.com/lowvoltage/
product-support](http://www.siemens.com/lowvoltage/product-support)

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

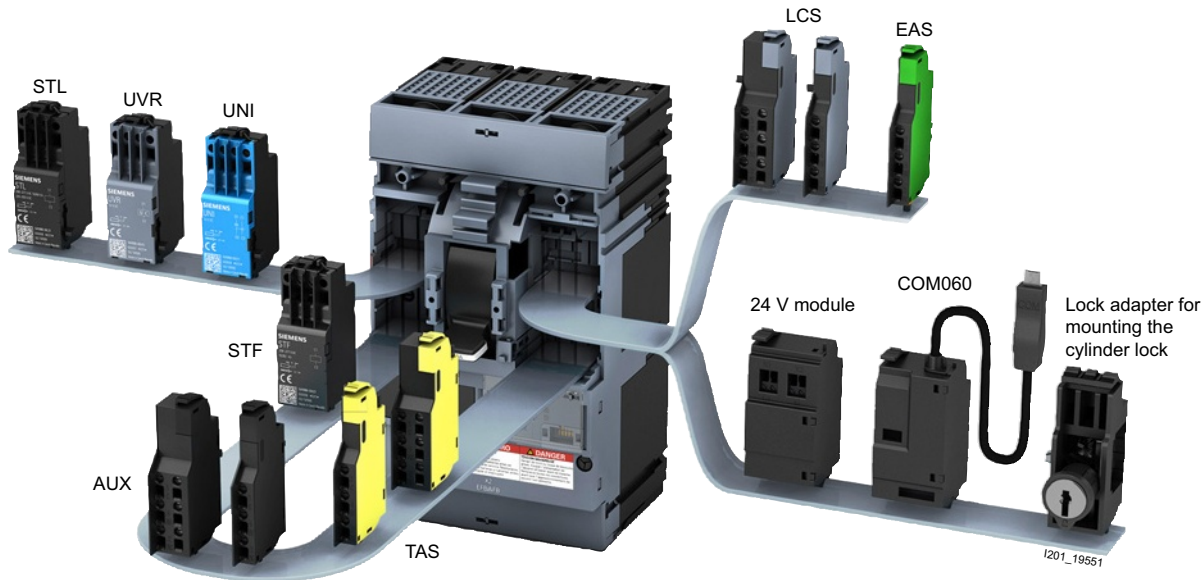
3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

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	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 switch TAS	--
Green	Electrical alarm switch EAS	--
Blue	--	Universal release UNI

Auxiliary switches

All auxiliary and alarm switches for the 3VA UL molded case circuit breakers belong to an integrated range of accessories. 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 can, for example, be used to set a frequency converter to a safe state.

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 that 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 UL 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 UL molded case circuit breaker remotely. The STF variant can be mounted in either the left-hand or the right-hand accessories compartment (for 3VA6 only). The STL type is specifically designed for mounting in the left-hand compartment and is a very low-consumption device.

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.

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

Design

Internal accessories		3VA51 3-pole	3VA52 2(3)-pole & 3-pole
Optional equipment			
Slot No.:		23 22 21 11 12 13	24 23 22 21 11 12 13 14
Auxiliary switch	Type		
	AUX_HQ	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
	AUX_HP	x x x	x x x x
Leading changeover switch	LCS_HQ	x x	x x
	LCS_HQ_el	x x	x x
	LCS_HP	x x	x x
Alarm switch			
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
Auxiliary release			
Shunt trip flexible	STF	x	x
Shunt trip left	STL	x	x
Undervoltage release	UVR	x	x
Universal release	UNI	x	x
Other			
Cylinder lock (type Ronis)		x	x

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3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

Internal accessories		3VA61/3VA62 3-pole														3VA61/3VA62 4-pole													
Optional equipment		3VA61/3VA62 3-pole														3VA61/3VA62 4-pole													
		24 23 22 21 11 12 13 14														34 33 32 31 24 23 22 21 11 12 13 14													
		250 A														250 A													
		Slot No.:														Slot No.:													
Auxiliary switch		Type														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					
Leading changeover switch	LCS_HQ							x														x							
	LCS_HQ_el							x														x							
	LCS_HP							x														x							
Alarm switch		Type														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														Type													
Shunt trip flexible	STF			x						x												x				x			
Shunt trip left	STL			x																		x							
Undervoltage release	UVR			x																		x							
Universal release	UNI			x																		x							
ETU/communication		Type														Type													
Communication module	COM060												x												x				
Breaker data server													x												x				
24 V module																													
Other																													
Cylinder lock (type Ronis)													x												x				

I201_19495

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

Internal accessories		3VA63/3VA64 3-pole															3VA63/3VA64 4-pole																		
Optional equipment																																			
		Slot No.:																																	
Auxiliary switch		Type																	Type																
Auxiliary switch	AUX_HQ	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								
	AUX_HP				x		x							x		x									x		x								
Leading changeover switch	LCS_HQ	x			x							x																							
	LCS_HQ_el											x												x											
	LCS_HP												x											x											
Alarm switch		Type																	Type																
Trip alarm switch	TAS_HQ				x		x					x		x									x		x										
	TAS_HQ_el				x		x					x		x									x		x										
	TAS_HP						x							x											x										
Electrical alarm switch	EAS_HQ																										x								
	EAS_HQ_el																										x								
Auxiliary release		Type																	Type																
Shunt trip flexible	STF					x								x											x										
Shunt trip left	STL						x																												
Undervoltage release	UVR						x																		x										
Universal release	UNI						x																		x										
ETU/communication		Type																	Type																
Communication module Breaker data server	COM060													x											x										
24 V module														x											x										
Other																																			
Cylinder lock (type Ronis)														x											x										

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3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

Technical specifications

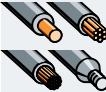
				Auxiliary switches and alarm switches HQ				Auxiliary switches and alarm switches HQ_electronic				Auxiliary switches and alarm switches HP			
				AUX	LCS	TAS	EAS	AUX	LCS	TAS	EAS	AUX	LCS	TAS	
Mounting width				mm				7				14			
Conductor cross-sections	Solid/ stranded/ finely stranded with end sleeve	Screw connection (per contact)		1 x (0.5 - 1.5)				1 x (0.5 - 1.5)				2 x (0.75 - 2.5)			
				1 x (AWG20 - AWG16)				1 x (AWG20 - AWG16)				2 x (AWG18 - AWG14)			
	Finely stranded with insulated end sleeve	Screw connection (per contact)		1 x (0.5 - 1.0)				1 x (0.5 - 1.0)				2 x (0.75 - 1.0)			
				1 x (AWG20 - AWG16)				1 x (AWG20 - AWG16)				2 x (AWG18 - AWG16)			
	Tightening torque (connecting cables)		Nm	0.4 ^{+0.1}				0.4 ^{+0.1}				0.4 ^{+0.1}			
	Stripped length		mm	15				15				15			
Rated operational voltage	U_e	V AC	50 Hz	240				24				600			
		V DC		250				24				250			
Conventional free-air thermal current		$I_{th} = I_e$	A	6				0.3				10			
Rated operational current	AC-12	12 V	A	6				0.3				10			
		24 V	A	6				0.3				10			
		48 V	A	6				--				10			
		125 V	A	6				--				10			
		220/240 V	A	6				--				10			
		380/440 V	A	--				--				6			
		600 V	A	--				--				2			
	AC-15	12 V	A	3				0.3				6			
		24 V	A	3				0.3				6			
		48 V	A	3				--				6			
		125 V	A	3				--				6			
		220/240 V	A	3				--				6			
		380/440 V	A	--				--				2			
		600 V	A	--				--				0.6			
	DC-12	12 V	A	6				0.1				6			
		24 V	A	4				0.1				6			
		48 V	A	2				--				2			
		110 V	A	0.5				--				0.6			
		250 V	A	0.25				--				0.3			
	DC-13	12 V	A	1				0.07				3			
		24 V	A	0.8				0.07				3			
		48 V	A	0.4				--				0.8			
		110 V	A	0.2				--				0.2			
		250 V	A	0.1				--				0.1			

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

				Auxiliary switches and alarm switches HQ				Auxiliary switches and alarm switches HQ_electronic				Auxiliary switches and alarm switches HP		
				AUX	LCS	TAS	EAS	AUX	LCS	TAS	EAS	AUX	LCS	TAS
Max. rated current (UL/CSA)	Inductive load (0.75 - 0.8 AC)	24	A	3				0.3				6		
		300	A	3				--				6		
		600	A	--				--				6		
	Max. rated current (AC)	24	A	3				--				6		
		127	A	3				--				6		
		240	A	3				--				3		
		480	A	--				--				1.5		
		600	A	--				--				1.2		
	Ohmic load (DC)	24	A	0.25				0.1				0.3		
		250	A	0.25				--				0.3		
	Ohmic load - max. rated current (DC)	125	A	0.6				--				0.9		
		250	A	0.3				--				0.55		
Minimum load		At 24 V DC	mA	70				0.5				70		
		At 5 V DC	mA	--				1				--		

				Shunt trip left STL	Shunt trip flexible STF	Undervoltage releases UVR	Universal release UNI
							
Mounting width			mm	21			
Conductor cross-sections	Solid/stranded/ finely stranded with end sleeve 	Screw connection (per contact)	Number x mm ²	1 x (0.5 - 1.5)			
			Number x AWG	1 x (AWG20 - AWG16)			
	Finely stranded with insulated end sleeve 	Screw connection (per contact)	Number x mm ²	1 x (0.5 - 1.0)			
			Number x AWG	1 x (AWG20 - AWG16)			
	Tightening torque (connecting cables)		Nm	0.4 ^{+0.1}			
	Stripped length 		mm	10			
Power consumption U_e	12	V DC	W	50	--	--	--
	24	V AC 50/60 Hz	VA	50	--	--	--
	24 ... 30	V DC	W	7 ... 50	--	--	--
	48 ... 60	V AC 50/60 Hz	VA	15 ... 20	--	--	--
	48 ... 60	V DC	W	20 ... 30	--	--	--
	110 ... 127	V AC 50/60 Hz	VA	30 ... 40	--	--	--
	110 ... 127	V DC	W	30 ... 40	--	--	--
	208 ... 277	V AC 50/60 Hz	VA	16 ... 35	--	--	--
	220 ... 250	V DC	W	28 ... 35	--	--	--
	380 ... 600	V AC 50/60 Hz	VA	10 ... 30	--	--	--

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

				Shunt trip left STL	Shunt trip flexible STF	Undervoltage releases UVR	Universal release UNI
							
Power consumption U_e	24	V AC 50/60 Hz	VA	--	300	--	--
	48 ... 60	V AC 50/60 Hz	VA	--	340 ... 600	--	--
	110 ... 127	V AC 50/60 Hz	VA	--	500 ... 650	--	--
	208 ... 277	V AC 50/60 Hz	VA	--	360 ... 650	--	--
	380 ... 500	V AC 50/60 Hz	VA	--	330 ... 600	--	--
	600	V AC 50/60 Hz	VA	--	300	--	--
	12	V DC	W	--	--	< 2.5	--
	24	V DC	W	--	--	< 2.5	--
	48	V DC	W	--	--	< 2.5	--
	60	V DC	W	--	--	< 2.5	--
	125 ... 127	V DC	W	--	--	< 2.5	--
	220 ... 230	V DC	W	--	--	< 2.5	--
	250	V DC	W	--	--	< 2.5	--
	24	V AC 50/60 Hz	VA	--	--	< 2	--
	48	V AC 50/60 Hz	VA	--	--	< 2	--
	60	V AC 50/60 Hz	VA	--	--	< 2	--
	110	V AC 50/60 Hz	VA	--	--	< 2	--
	120 ... 127	V AC 50/60 Hz	VA	--	--	< 2	--
	208 ... 230	V AC 50/60 Hz	VA	--	--	< 2	--
	380 ... 400	V AC 50/60 Hz	VA	--	--	< 2.5	--
	440 ... 480	V AC 50/60 Hz	VA	--	--	< 2.5	--
	12	V DC (Cat II; PELV/SELV)	W	--	--	--	UVR: < 2.5 SHT: 20
	24	V DC (Cat II; PELV/SELV)	W	--	--	--	UVR: < 2.5 SHT: 20
	48	V DC (Cat II; PELV/SELV)	W	--	--	--	UVR: < 2.5 SHT: 20
Rated impulse withstand voltage		U_{imp}	kV	6		4	0.5
Making current		I_{max}	at V	1.5 A/24 V AC	18 A/24 V AC	5 mA/480 V	1.5 A/24 V
Maximum tripping time			ms	< 10			
Service life	Electrical trips			8500			
	Mechanical switching cycles of the circuit breaker			25000			
Priority over other control signals				Given			
Degree of protection	Cover of the accessories compartment closed			IP40			
	Cover of the accessories compartment open			IP 20			
Minimum signal duration			ms	40	40	--	40
Response voltage shunt trip	Pick-up (circuit breaker trips)	U_s/V	%	70 ... 110		--	70 ... 110
Undervoltage release response voltage	Pick-up (circuit breaker can be switched on)	U_s/V	%	--	--	85 ... 110	
	Pick-up (circuit breaker trips)	U_s/V	%	--	--	35 ... 70	
Tripping frequency	Trips per hour			Unlimited	120	Unlimited	
Can be used for electrical interlocking of molded case circuit breakers				No	No	Yes	

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

Selection and ordering data

	Version	SD	Article No. www.siemens.com/ product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Auxiliary switches and alarm switches							
 3VA9978-0AA11 3VA9978-0AA12	Auxiliary switch AUX						
	Type/switching capacity/size	Electronic-compatible					
	HP/high switching capacity/2 slots	--					
	HQ/compact size/1 slot	--					
	HQ_el/compact size/1 slot	✓					
Leading changeover switch LCS							
 3VA9978-0AA21 3VA9978-0AA22	Leading changeover switch LCS						
	Type/switching capacity/size	Electronic-compatible					
	HP/high switching capacity/2 slots	--					
	HQ/compact size/1 slot	--					
	HQ_el/compact size/1 slot	✓					
Trip alarm switch TAS							
 3VA9978-0AB11 3VA9978-0AB12	Trip alarm switch TAS						
	Type/switching capacity/size	Electronic-compatible					
	HP/high switching capacity/2 slots	--					
	HQ/compact size/1 slot	--					
	HQ_el/compact size/1 slot	✓					
Electrical alarm switch EAS (3VA6 only)							
 3VA9978-0AB22	Electrical alarm switch EAS (3VA6 only)						
	Type/switching capacity/size	Electronic-compatible					
	HQ/compact size/1 slot	--					
	HQ_el/compact size/1 slot	✓					
Undervoltage releases							
 3VA9978-0BB16	Undervoltage release UVR						
	V AC 50/60 Hz	V DC					
	--	12					
	--	24					
	--	48					
	--	125 ... 127					
	--	250					
	24	--					
	120 ... 127	--					
	208 ... 230	--					
	440 ... 480	--					
		--					

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Internal accessories

	Version	SD	Article No. www.siemens.com/ product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
Shunt trip left							
	Shunt trip left STL						
	50/60 Hz V AC	V DC					
	380 ... 600	--					
	--	12					
	24	24 ... 30					
	48 ... 60	--					
	110 ... 127	110 ... 127					
	208 ... 277	220 ... 250					
3VA9978-0BL33							
Shunt trip flexible STF							
	Shunt trip flexible						
	50/60 Hz V AC	V DC					
	24	--					
	48 ... 60	--					
	110 ... 127	--					
	208 ... 277	--					
	380 ... 500	--					
	600	--					
3VA9978-0BA23							
Universal release UNI							
	Universal release						
	50/60 Hz V AC	V DC					
	--	12					
	--	24					
	--	48					
3VA9978-0BD13							
Time-delay device for undervoltage releases							
	Time-delay device						
	V AC	V DC	Delay time				
	230	230	Fixed				
	--	24	Fixed				
	3VA9978-0BF22						

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Manual operators

Overview

Manual operators are provided to facilitate manual operation of the 3VA UL molded case circuit breakers, either directly at the circuit breaker or through the cubicle door.

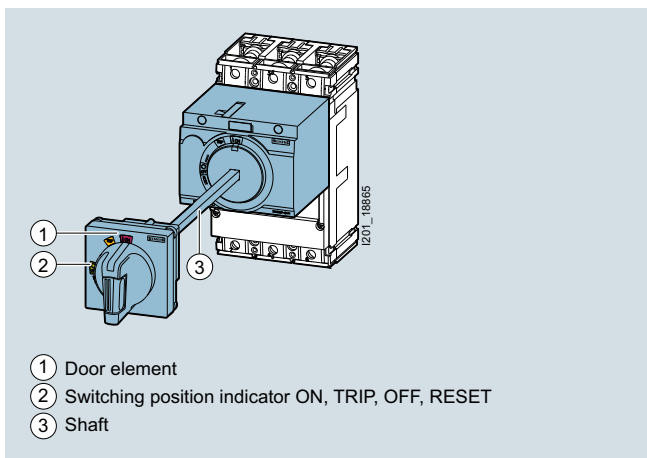
Front mounted rotary operator

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 optional door interlock locks the cubicle door when the molded case circuit breaker is closed, but can be deliberately overridden if necessary.



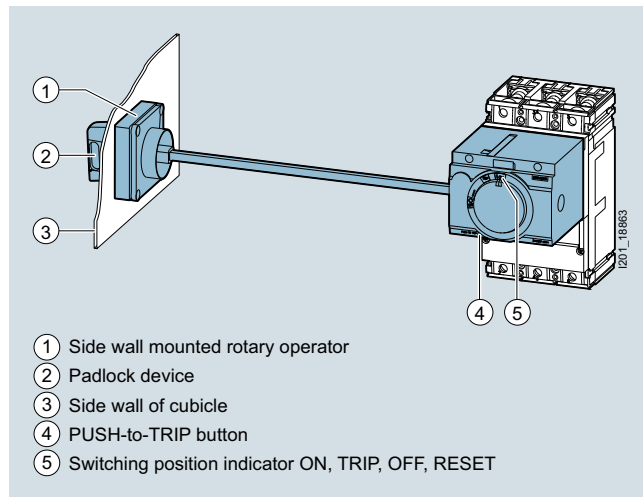
Door mounted rotary operator

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).



Side wall mounted rotary operators **NEW**

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

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 rotary 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 status of the breaker (on, off, trip) can be immediately identified, even when lighting conditions are poor. This option can also be retrofitted.

Operating unit with Bowden cable (Max Flex operator)

The Max Flex operator is a hand lever operator for operating the breaker from the outer side of the cabinet. The handle is connected to the switching mechanism via a Bowden cable.

The Max Flex operator can be ordered as a complete set, but is also available as single parts and offers considerable variety in terms of handles and lengths of Bowden cables. It can also be equipped with auxiliary switches.

Note:

The Max Flex operator is approved for the UL market only.

Variable depth flange mounted operator kit

Contrary to the Max Flex operator, this operating mechanism links the handle and the switching mechanism by means of a rigid switching shaft of variable length.

Note:

The operating mechanism with flange connection is approved for the UL market only.

Benefits

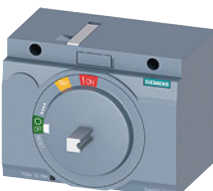
- Convenient circuit breaker operation inside and outside the cubicle
- Locking and interlocking for all manual operators prevents unauthorized breaker operation
- Conspicuously colored variant for EMERGENCY-OFF circuits
- Illumination for clear indication of the breaker status (on, off, trip) even when lighting conditions are poor
- All manual operators meet the standards for isolating characteristics defined by IEC / EN 60947-1

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Manual operators

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		
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d							
Front mounted rotary operators													
 3VA9277-0EK11	Front mounted rotary operator												
	• Rotary operator • Handle • Degree of protection IP30												
	Type	Color											
	• Standard, without illumination kit	Gray	✓	--	--	--		3VA9137-0EK11		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK11		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK11		1	1 unit	1CB	
	• Standard, with illumination kit	Gray	✓	--	--	--		3VA9137-0EK13		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK13		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK13		1	1 unit	1CB	
	• EMERGENCY-OFF, without illumination kit	Yellow-red	✓	--	--	--		3VA9137-0EK15		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK15		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK15		1	1 unit	1CB	
	• EMERGENCY-OFF, with illumination kit	Yellow-red	✓	--	--	--		3VA9137-0EK17		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK17		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK17		1	1 unit	1CB	
• Standard, with door interlock	Gray	✓	--	--	--		3VA9137-0EK21		1	1 unit	1CB		
		--	✓	✓	--		3VA9277-0EK21		1	1 unit	1CB		
		--	--	--	✓		3VA9447-0EK21		1	1 unit	1CB		
• Standard, with door interlock, with illumination kit	Gray	✓	--	--	--		3VA9137-0EK23		1	1 unit	1CB		
		--	✓	✓	--		3VA9277-0EK23		1	1 unit	1CB		
		--	--	--	✓		3VA9447-0EK23		1	1 unit	1CB		
• EMERGENCY-OFF, with door interlock	Yellow-red	✓	--	--	--		3VA9137-0EK25		1	1 unit	1CB		
		--	✓	✓	--		3VA9277-0EK25		1	1 unit	1CB		
		--	--	--	✓		3VA9447-0EK25		1	1 unit	1CB		
• EMERGENCY-OFF, with door interlock, with illumination kit	Yellow-red	✓	--	--	--		3VA9137-0EK27		1	1 unit	1CB		
		--	✓	✓	--		3VA9277-0EK27		1	1 unit	1CB		
		--	--	--	✓		3VA9447-0EK27		1	1 unit	1CB		
 3VA9277-0EK31	• Standard, with door interlock, with door open function	Gray	✓	--	--	--		3VA9137-0EK31		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK31		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK31		1	1 unit	1CB	
	• Standard, with door interlock, with door open function, with illumination kit	Gray	✓	--	--	--		3VA9137-0EK33		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK33		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK33		1	1 unit	1CB	
	• EMERGENCY-OFF, with door interlock, with door open function	Yellow-red	✓	--	--	--		3VA9137-0EK35		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK35		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK35		1	1 unit	1CB	
	• EMERGENCY-OFF, with door interlock, with door open function, with illumination kit	Yellow-red	✓	--	--	--		3VA9137-0EK37		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0EK37		1	1 unit	1CB	
			--	--	--	✓		3VA9447-0EK37		1	1 unit	1CB	
	 3VA9277-0GK00	• Without handle, with shaft stub, without door interlock	Gray	✓	--	--	--		3VA9137-0GK00		1	1 unit	1CB
				--	✓	✓	--		3VA9277-0GK00		1	1 unit	1CB
				--	--	--	✓		3VA9447-0GK00		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Manual 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	
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d						
Door mounted rotary operators												
 3VA9277-OFK21	Door mounted rotary operator											
	• Rotary operator with door interlock											
	• Shaft 300 mm											
	• Mounting tolerance compensation											
	• Handle with masking plate 75 x 75 mm											
	• Degree of protection IP65											
	Type	Color										
	• Standard	Gray	✓	--	--	--		3VA9137-OFK21		1	1 unit	1CB
			--	✓	✓	--		3VA9277-OFK21		1	1 unit	1CB
			--	--	--	✓		3VA9447-OFK21		1	1 unit	1CB
• Standard, with illumination kit	Gray	✓	--	--	--		3VA9137-OFK23		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK23		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK23		1	1 unit	1CB	
• EMERGENCY-OFF	Yellow- red	✓	--	--	--		3VA9137-OFK25		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK25		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK25		1	1 unit	1CB	
• EMERGENCY-OFF, with illumination kit	Yellow- red	✓	--	--	--		3VA9137-OFK27		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK27		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK27		1	1 unit	1CB	
• Standard NEMA 1, 3R 12, with door open function	Gray	✓	--	--	--		3VA9137-OFK31		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK31		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK31		1	1 unit	1CB	
• Standard NEMA 1, 3R, 12, with door open function, with illumination kit	Gray	✓	--	--	--		3VA9137-OFK33		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK33		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK33		1	1 unit	1CB	
• EMERGENCY-OFF NEMA 1, 3R, 12, with door open function	Yellow- red	✓	--	--	--		3VA9137-OFK35		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK35		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK35		1	1 unit	1CB	
• EMERGENCY-OFF NEMA 1, 3R, 12, with door open function, with illumination kit	Yellow- red	✓	--	--	--		3VA9137-OFK37		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK37		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK37		1	1 unit	1CB	
• Standard NEMA 4/4X, with door open function	Gray	✓	--	--	--		3VA9137-OFK41		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK41		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK41		1	1 unit	1CB	
• Standard NEMA 4/4X, with door open function, with il- lumination kit	Gray	✓	--	--	--		3VA9137-OFK43		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK43		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK43		1	1 unit	1CB	
• EMERGENCY-OFF NEMA 4/4X, with door open function	Yellow- red	✓	--	--	--		3VA9137-OFK45		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK45		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK45		1	1 unit	1CB	
• EMERGENCY-OFF NEMA 4/4X, with door open function, with illumination kit	Yellow- red	✓	--	--	--		3VA9137-OFK47		1	1 unit	1CB	
		--	✓	✓	--		3VA9277-OFK47		1	1 unit	1CB	
		--	--	--	✓		3VA9447-OFK47		1	1 unit	1CB	
 3VA9477-0GC01	Supplementary handle for door mounted rotary operator (NFPA79)											
	Mandatory in compliance with NFPA79											
	Type	Color										
	• Standard	Gray	✓	--	--	--		3VA9137-0GC01		1	1 unit	1CB
			--	✓	✓	--		3VA9477-0GC01		1	1 unit	1CB
			--	--	--	✓		3VA9477-0GC11		1	1 unit	1CB
	• EMERGENCY-OFF	Yellow- red	✓	--	--	--		3VA9137-0GC05		1	1 unit	1CB
			--	✓	✓	--		3VA9477-0GC05		1	1 unit	1CB
			--	--	--	✓		3VA9477-0GC15		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

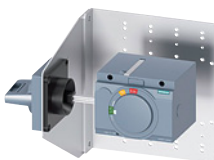
Manual operators

	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
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64						
 8UD1900-2WB00	Shaft 8 mm										
	Versions										
	• 300 mm long						8UD1900-2WA00		1	1 unit	1CB
	• 600 mm long						8UD1900-2WB00		1	1 unit	1CB
 8UD1900-2DA00	Adapter for shaft 8 mm x 8 mm For door mounted rotary operator						8UD1900-2DA00		1	1 unit	1CB
 8UD1900-2HA00	Door coupling 8 x 8 mm						8UD1900-2HA00		1	1 unit	1CB
 3VA9477-0GA80	Fixing bracket for shaft	✓	---	---	---		3VA9137-0GA80		1	1 unit	1CB
		---	✓	✓	✓		3VA9477-0GA80		1	1 unit	1CB
 3VA9487-0GB10	Variable depth adapter 8 x 8 mm						3VA9487-0GB10		1	1 unit	1CB
 8UD1900-2GA00	Mounting tolerance compensation 8 x 8 mm						8UD1900-2GA00		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

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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	
			3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d						
Side wall mounted rotary operators NEW													
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													
 3VA9277-0PK11	Type	Color											
	• Standard	Gray	✓	--	--	--		3VA9137-0PK11		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK11		1	1 unit	1CB	
	• Standard, with illumination kit	Gray	✓	--	--	--		3VA9137-0PK13		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK13		1	1 unit	1CB	
	• EMERGENCY-OFF	Yellow-red	✓	--	--	--		3VA9137-0PK15		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK15		1	1 unit	1CB	
	• EMERGENCY-OFF, with illumination kit	Yellow-red	✓	--	--	--		3VA9137-0PK17		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK17		1	1 unit	1CB	
	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												
 3VA9277-0PK51	Type	Color											
	• Standard	Gray	✓	--	--	--		3VA9137-0PK51		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK51		1	1 unit	1CB	
	• Standard, with illumination kit	Gray	✓	--	--	--		3VA9137-0PK53		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK53		1	1 unit	1CB	
	• EMERGENCY-OFF	Yellow-red	✓	--	--	--		3VA9137-0PK55		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK55		1	1 unit	1CB	
	• EMERGENCY-OFF, with illumination kit	Yellow-red	✓	--	--	--		3VA9137-0PK57		1	1 unit	1CB	
			--	✓	✓	--		3VA9277-0PK57		1	1 unit	1CB	
	Extended DIN rail for N/PE terminal - For mounting plate - Up to 250 A												
 3VA9987-0GL30									3VA9987-0GL30		1	1 unit	1CB
Handles													
Handles With masking plate													
 8UD1731-0AB11	Type	Color	Tolerance compensation	Door open function									
	• Standard	Gray	Without	Without	✓	✓	✓	--	8UD1721-0AB11		1	1 unit	1CB
			With	Without	✓	✓	✓	--	8UD1721-0AB21		1	1 unit	1CB
			Without	Without	--	--	--	✓	8UD1731-0AB11		1	1 unit	1CB
			With	Without	--	--	--	✓	8UD1731-0AB21		1	1 unit	1CB
			Without	With	✓	✓	✓	--	8UD1721-0AC11		1	1 unit	1CB
			With	With	✓	✓	✓	--	8UD1721-0AC21		1	1 unit	1CB
			Without	With	--	--	--	✓	8UD1731-0AC11		1	1 unit	1CB
			With	With	--	--	--	✓	8UD1731-0AC21		1	1 unit	1CB
	• EMERGENCY-OFF	Yellow-red	Without	Without	✓	✓	✓	--	8UD1721-0AB15		1	1 unit	1CB
			With	Without	✓	✓	✓	--	8UD1721-0AB25		1	1 unit	1CB
			Without	Without	--	--	--	✓	8UD1731-0AB15		1	1 unit	1CB
			With	Without	--	--	--	✓	8UD1731-0AB25		1	1 unit	1CB
			Without	With	✓	✓	✓	--	8UD1721-0AC15		1	1 unit	1CB
			With	With	✓	✓	✓	--	8UD1721-0AC25		1	1 unit	1CB
			Without	With	--	--	--	✓	8UD1731-0AC15		1	1 unit	1CB
With			With	--	--	--	✓	8UD1731-0AC25		1	1 unit	1CB	

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Manual operators

Version	SD	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				
		3VA5, 125 ... 250 A Front mounted rotary operators		1	1 unit	1CB
		3VA6, 150 ... 600 A Front mounted rotary operators		1	1 unit	1CB
		3VA5, 3VA6, 125 ... 600 A Door mounted rotary operators		1	1 unit	1CB
		8UD1900-0KA10				
		8UD1900-0KA20				
		8UD1900-0KA20				
 8UD1900-0MB01		Cylinder lock (type Kaba) • For door mounted rotary operator (in the masking plate) • Standard masking plate				
		Key 1		1	1 unit	1CB
		Key 2		1	1 unit	1CB
		Key 3		1	1 unit	1CB
		Key 4		1	1 unit	1CB
		• For door mounted rotary operator (in the masking plate) • With door opening function • Standard masking plate				
		Key 1		1	1 unit	1CB
		Key 2		1	1 unit	1CB
		Key 3		1	1 unit	1CB
		Key 4		1	1 unit	1CB
 8UD1900-0MB05		Cylinder lock (type Kaba) • For door mounted rotary operator (in the masking plate) • EMERGENCY-OFF masking plate				
		Key 1		1	1 unit	1CB
		Key 2		1	1 unit	1CB
		Key 3		1	1 unit	1CB
		Key 4		1	1 unit	1CB
		• For door mounted rotary operator (in the masking plate) • With door opening function • EMERGENCY-OFF masking plate				
		Key 1		1	1 unit	1CB
		Key 2		1	1 unit	1CB
		Key 3		1	1 unit	1CB
		Key 4		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 with shaft stub • For mounting in the adapter kit for the accessories compartment				
		Key 1		1	1 unit	1CB
		Key 2		1	1 unit	1CB
		Key 3		1	1 unit	1CB
		Key 4		1	1 unit	1CB
		3VA9980-0VL10				
		3VA9980-0VL20				
		3VA9980-0VL30				
		3VA9980-0VL40				
		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)				
		3VA9980-0LF20		1	1 unit	1CB

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	3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d									
Operating unit with Bowden cable														
	Operating unit with Bowden cable (Max Flex operator) Complete kit comprising: • Switching mechanism • Handle steel, epoxy coated NEMA 1/3R/12, black = OFF, red = ON • Bowden cable, 36 inches (0.9 m) long						3VA9138-0CK12	1	1 unit	1CB				
		✓	✓	✓			3VA9278-0CK12	1	1 unit	1CB				
					✓		3VA9448-0CK12	1	1 unit	1CB				
Individual parts or spare parts for operating unit with Bowden cable														
	Switching mechanism						3VA9138-0CB10	1	1 unit	1CB				
		✓	✓	✓			3VA9278-0CB10	1	1 unit	1CB				
					✓		3VA9448-0CB10	1	1 unit	1CB				
3VA9278-0CB10														
	Handle													
	Versions													
	• Steel, epoxy coated NEMA 1/3R/12, black = OFF, red = ON						3VA9978-0CH72	1	1 unit	1CB				
• Steel, epoxy coated black NEMA 1/3R/12, gray = OFF, gray = ON						3VA9978-0CH74	1	1 unit	1CB					
• Stainless steel, chrome-plated NEMA4/4X, black = OFF, red = ON						3VA9978-0CH82	1	1 unit	1CB					
3VA9978-0CH82														
	Bowden cable													
	Versions													
	• Bowden cable, 36 inches (0.9 m)					✓	✓	✓	✓		3VA9278-0CC10	1	1 unit	1CB
	• Bowden cable, 48 inches (1.2 m)					✓	✓	✓	✓		3VA9278-0CC20	1	1 unit	1CB
	• Bowden cable, 60 inches (1.5 m)					✓	✓	✓	✓		3VA9278-0CC30	1	1 unit	1CB
	• Bowden cable, 72 inches (1.8 m)					✓	✓	✓	✓		3VA9278-0CC40	1	1 unit	1CB
	• Bowden cable, 84 inches (2.1 m)					✓	✓	✓	✓		3VA9278-0CC50	1	1 unit	1CB
	• Bowden cable, 96 inches (2.4 m)					✓	✓	✓	✓		3VA9278-0CC60	1	1 unit	1CB
	• Bowden cable, 120 inches (3.0 m)					✓	✓	✓	✓		3VA9278-0CC70	1	1 unit	1CB
	• Bowden cable, 144 inches (3.6 m)					✓	✓	✓	✓		3VA9278-0CC80	1	1 unit	1CB
	• Bowden cable, 36 inches (0.9 m)					✓	✓	✓	✓		3VA9578-0CC10	1	1 unit	1CB
	• Bowden cable, 48 inches (1.2 m)					✓	✓	✓	✓		3VA9578-0CC20	1	1 unit	1CB
	• Bowden cable, 60 inches (1.5 m)					✓	✓	✓	✓		3VA9578-0CC30	1	1 unit	1CB
	• Bowden cable, 72 inches (1.8 m)					✓	✓	✓	✓		3VA9578-0CC40	1	1 unit	1CB
	• Bowden cable, 84 inches (2.1 m)					✓	✓	✓	✓		3VA9578-0CC50	1	1 unit	1CB
	• Bowden cable, 96 inches (2.4 m)					✓	✓	✓	✓		3VA9578-0CC60	1	1 unit	1CB
	• Bowden cable, 120 inches (3.0 m)					✓	✓	✓	✓		3VA9578-0CC70	1	1 unit	1CB
	• Bowden cable, 144 inches (3.6 m)					✓	✓	✓	✓		3VA9578-0CC80	1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Manual 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
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64						
 3VA9478-0CX10	Auxiliary switches										
	Leading from On to Off										
	Versions										
	• 1 CO										
	• 2 CO										
		✓	✓	✓	✓		3VA9478-0CX10		1	1 unit	1CB
		✓	✓	✓	✓		3VA9478-0CX20		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Motor operators

Overview

MO320 motor operator

The MO320 motor operator is mounted on the front of the 3VA UL 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 MCCB position indicator which indicates ON and OFF and, via LED, whether the circuit breaker has tripped (TRIP). 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
- Even with a mounted MO320 the 3VA still meets the standards for isolating characteristics defined by IEC / EN 60947-1

Design

- The MO320 motor operator is simply snapped into position on a mounting frame that is installed instead of the accessories cover of the molded case circuit breaker.

Technical specifications

MO320 motor operator	3VA5 125 A	3VA5 250 A	3VA6 150 A/ 250 A	3VA6 400 A/ 600 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)			
Rating	250 W, max. 500 W (60 ms)			
Make time, typically	< 800 ms	< 1000 ms	< 1700 ms	
Break time, typically	< 800 ms	< 1000 ms	< 1400 ms	

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
	3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d					

Motor operators



3VA9277-0HA10

Motor operators without stored energy feature (MO320)

Versions

• 24 ... 60 V DC	✓	--	--	--		3VA9137-0HA10		1	1 unit	1CB
	--	✓	✓	--		3VA9277-0HA10		1	1 unit	1CB
	--	--	--	✓		3VA9447-0HA10		1	1 unit	1CB
• 110 ... 230 V AC, 110 ... 250 V DC	✓	--	--	--		3VA9137-0HA20		1	1 unit	1CB
	--	✓	✓	--		3VA9277-0HA20		1	1 unit	1CB
	--	--	--	✓		3VA9447-0HA20		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection technology

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 UL molded case circuit breakers:

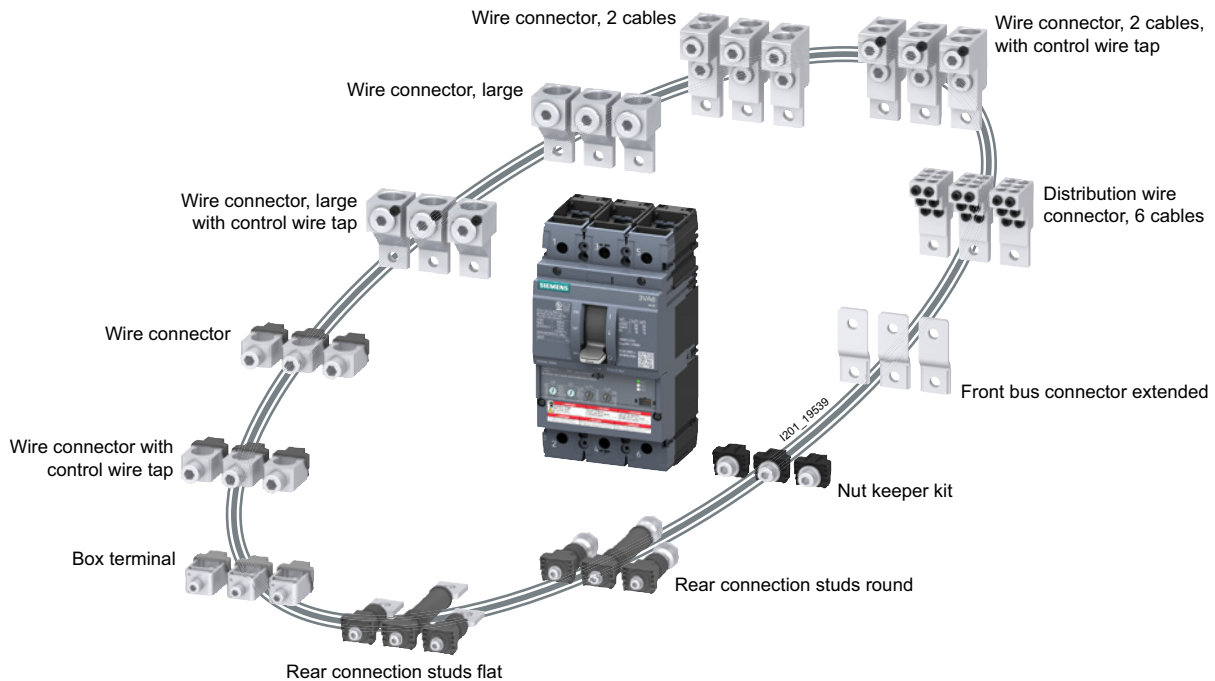
- Installation, e.g. connection to cables or busbars
- Dimensioning of the cables and busbars
- Installation medium, e.g. rigid or flexible

The following catalog pages provide all the information needed to ensure that a 3VA UL molded case circuit breaker is safely connected.

Connection technology for the 3VA UL molded case circuit breaker

The connection technology of the 3VA UL molded case circuit breakers is designed to support uncomplicated and convenient commissioning of the 3VA UL molded case circuit breakers and to meet all installation requirements.

To meet this objective, an extensive portfolio of connection components is available.



Note:

The following connection technologies are permissible for single-pole 3VA51 devices:

- Nut keeper
- Box terminal
- Aluminum/copper wire connector
- Front bus connector extended

Optionally, the versions with 3 or 4 single terminals/connection extensions can be ordered.

Note on 3VA6 100 % rated breakers:

All connection terminals except steel box terminals are permissible.

For molded case circuit breakers with 400 A rated current in the 600 A size and 250 A rated current in the 250 A size, only copper wire connectors are permissible.

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection technology

UL conductor cross-sections

Connection technology	Cable medium	Cables and busbars	3VA5		3VA6		
			125 A	250 A	250 A	400 A	600 A
	Solid	Cu cable	AWG 14 - AWG 10	AWG 10	AWG 10	--	--
	Stranded class B		AWG 14 - 3/0	AWG 10 - 3/0 AWG 4 - 350 kcmil	AWG 10 - 3/0 AWG 4 - 350 kcmil	1/0 - 500 kcmil	1/0 - 500 kcmil
	Stranded class C		AWG 14 - 3/0	AWG 10 - 3/0 AWG 4 - 350 kcmil	AWG 10 - 3/0 AWG 4 - 350 kcmil	1/0 - 500 kcmil	1/0 - 500 kcmil
	Solid	Al and Cu cable	AWG 14 - AWG 10	AWG 14 - AWG 10	AWG 14 - AWG 10	--	--
	Stranded class B		AWG 14 - 3/0	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 1 - 600 kcmil	--
	Stranded class C		AWG 14 - 3/0	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 1 - 600 kcmil	--
	Solid	Al and Cu cable	--	--	--	--	--
	Stranded class B		AWG 4 - 300 kcmil	AWG 2 - 350 kcmil	AWG 2 - 350 kcmil	--	--
	Stranded class C		AWG 4 - 300 kcmil	AWG 2 - 350 kcmil	AWG 2 - 350 kcmil	--	--
	Solid	Al and Cu cable	--	--	--	--	--
	Stranded class B		--	AWG 4 - 300 kcmil	AWG 4 - 300 kcmil	2/0 - 600 kcmil	2/0 - 600 kcmil
	Stranded class C		--	AWG 4 - 300 kcmil	AWG 4 - 300 kcmil	2/0 - 600 kcmil	2/0 - 600 kcmil
	Solid	Al and Cu cable	AWG 14 - AWG 10	AWG 14 - AWG 10	AWG 14 - AWG 10	AWG 14 - AWG 10	AWG 14 - AWG 10
	Stranded class B		AWG 14 - AWG 2	AWG 14 - AWG 2	AWG 14 - AWG 2	AWG 14 - AWG 2	AWG 14 - AWG 2
	Stranded class C		AWG 14 - AWG 2	AWG 14 - AWG 2	AWG 14 - AWG 2	AWG 14 - AWG 2	AWG 14 - AWG 2
	Solid	Cu cable	AWG 14 - AWG 10	AWG 14 - AWG 10	AWG 14 - AWG 10	--	--
	Stranded class B		AWG 14 - 2/0	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 1 - 600 kcmil	--
	Stranded class C		AWG 14 - 2/0	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 14 - 1/0 AWG 6 - 350 kcmil	AWG 1 - 600 kcmil	--
	Solid	Cu cable	--	--	--	--	--
	Stranded class B		--	--	--	2/0 - 600 kcmil	2/0 - 600 kcmil
	Stranded class C		--	--	--	2/0 - 600 kcmil	2/0 - 600 kcmil
Front busbar connector	Nut keeper kit (width x height)	Busbar	0.7 x 0.25 inch	1 x 0.3 inch		1.4 x 0.4 inch	
	Front bus connectors extended		0.9 x 0.3 inch	1.3 x 0.4 inch		1.6 x 0.5 inch	
	Front bus connectors offset		--		--	2.4 x 0.5 inch	

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection technology

IEC conductor cross-sections

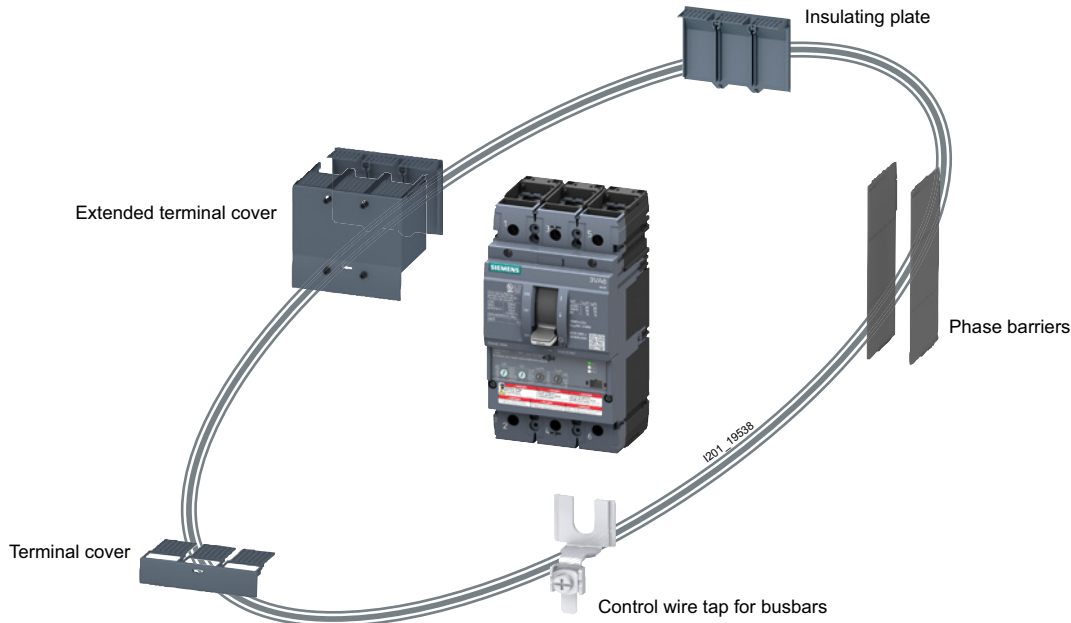
Connection technology	Cable medium	Cables and busbars	Dimensions	3VA5		3VA6		
				125 A	250 A	250 A	400 A	600 A
	Solid cable	Cu cable	mm ²	1.5 ... 16	6 ... 16	6 ... 16	--	--
	Stranded cable	Cu cable	mm ²	1.5 ... 70	6 ... 120 50 ... 185	6 ... 120 25 ... 185	35 ... 300	35 ... 300
	Finely stranded cable	Cu cable	mm ²	1.5 ... 50	10 ... 95 95 ... 150	10 ... 95 35 ... 150	25 ... 240	25 ... 240
	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
	Flexible copper busbar	Flexible connecting bar	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]
	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	--
	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	--	--
	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
	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
	Nut keeper kit (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

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 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 that 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 that do not exceed the geometric dimensions of the molded case circuit breaker (the termination area) (e.g. box terminal, lug terminal, etc.).
- Extended terminal covers are required when bar extensions or external terminals (i.e. terminals that 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.
- Offset terminal covers are required when offset bus connectors are installed. The extended terminal cover consists of two parts, an offset 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.

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 front bus connectors, 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 taps (see page 1/10, [Front terminals](#)). The following accessories are available to allow the implementation of a control wire tap in combination with a busbar connection:

- Control wire taps for busbars: This tap is attached by screws directly to the busbar.

All control wire taps are rated for a maximum load of 15 A. Cables of up to 2.5 mm² / AWG 14 can be connected.

Benefits

- High degree of flexibility
- Cables and busbars can be connected quickly and easily to the 3VA UL molded case circuit breaker
- Extensive selection of connection accessories

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

Selection and ordering data

	Version	Minimum cable cross-section (stranded) Class B	Maximum cable cross-section (stranded) Class B	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
				3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d					
Box terminals													
 3VA9233-0JA12	Box terminal • Connection of Cu cable • Included in scope of supply: 3 single terminals	AWG 14	3/0	✓	--	--	--		3VA9133-0JA11		1	1 unit	1CB
		AWG 4	350 kcmil	--	✓	--	--		3VA9233-0JA12		1	1 unit	1CB
		AWG 10	3/0	--	--	✓	--		3VA9143-0JA12		1	1 unit	1CB
		AWG 4	350 kcmil	--	--	✓	--		3VA9243-0JA12		1	1 unit	1CB
		1/0	500 kcmil	--	--	--	✓		3VA9473-0JA13		1	1 unit	1CB
 3VA9244-0JA12	Box terminal • Connection of Cu cable • Included in scope of supply: 4 single terminals	AWG 10	3/0	--	--	✓	--		3VA9144-0JA12		1	1 unit	1CB
		AWG 4	350 kcmil	--	--	✓	--		3VA9244-0JA12		1	1 unit	1CB
		1/0	500 kcmil	--	--	--	✓		3VA9474-0JA13		1	1 unit	1CB
Aluminum wire connectors													
 3VA9243-0JB12	Wire connector • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals	AWG 14	3/0	✓	--	--	--		3VA9133-0JB11		1	1 unit	1CB
		AWG 6	350 kcmil	--	✓	--	--		3VA9233-0JB12		1	1 unit	1CB
		AWG 14	1/0	--	--	✓	--		3VA9143-0JB11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9243-0JB12		1	1 unit	1CB
		AWG 1	600 kcmil	--	--	--	✓		3VA9373-0JB13		1	1 unit	1CB
 3VA9244-0JB12	Wire connector • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals	AWG 14	1/0	--	--	✓	--		3VA9144-0JB11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9244-0JB12		1	1 unit	1CB
		AWG 1	600 kcmil	--	--	--	✓		3VA9374-0JB13		1	1 unit	1CB
 3VA9243-0JG12	Wire connector with control wire tap • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals	AWG 14	3/0	✓	--	--	--		3VA9133-0JG11		1	1 unit	1CB
		AWG 6	350 kcmil	--	✓	--	--		3VA9233-0JG12		1	1 unit	1CB
		AWG 14	1/0	--	--	✓	--		3VA9143-0JG11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9243-0JG12		1	1 unit	1CB
		AWG 1	600 kcmil	--	--	--	✓		3VA9373-0JG13		1	1 unit	1CB
 3VA9244-0JG12	Wire connector with control wire tap • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals	AWG 14	1/0	--	--	✓	--		3VA9144-0JG11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9244-0JG12		1	1 unit	1CB
		AWG 1	600 kcmil	--	--	--	✓		3VA9374-0JG13		1	1 unit	1CB
 3VA9243-0JJ13	Wire connector, large • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals and 1 extended terminal cover	AWG 4	300 kcmil	✓	--	--	--		3VA9133-0JJ12		1	1 unit	1CB
		AWG 2	350 kcmil	--	✓	--	--		3VA9233-0JJ13		1	1 unit	1CB
		AWG 2	350 kcmil	--	--	✓	--		3VA9243-0JJ13		1	1 unit	1CB
 3VA9244-0JJ13	Wire connector, large • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals and 1 extended terminal cover	AWG 2	350 kcmil	--	--	✓	--		3VA9244-0JJ13		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

	Version	Minimum cable cross-section (stranded) Class B	Maximum cable cross-section (stranded) Class B	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
				3VA51	3VA52	3VA61 3VA62	3VA63 3VA64						
 3VA9243-0JC13	Wire connector, large, with control wire tap • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals and 1 extended terminal cover	AWG 4	300 kcmil	✓	--	--	--		3VA9133-0JC12		1	1 unit	1CB
		AWG 2	350 kcmil	--	✓	--	--		3VA9233-0JC13		1	1 unit	1CB
		AWG 2	350 kcmil	--	--	✓	--		3VA9243-0JC13		1	1 unit	1CB
 3VA9244-0JC13	Wire connector, large, with control wire tap • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals and 1 extended terminal cover	AWG 2	350 kcmil	--	--	✓	--		3VA9244-0JC13		1	1 unit	1CB
 3VA9243-0JJ22	Wire connector, 2 cables • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals and 1 extended terminal cover	AWG 4	300 kcmil	--	✓	--	--		3VA9233-0JJ22		1	1 unit	1CB
		AWG 4	300 kcmil	--	--	✓	--		3VA9243-0JJ22		1	1 unit	1CB
		2/0	600 kcmil	--	--	--	✓		3VA9473-0JJ23		1	1 unit	1CB
 3VA9244-0JJ22	Wire connector, 2 cables • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals and 1 extended terminal cover	AWG 4	300 kcmil	--	--	✓	--		3VA9244-0JJ22		1	1 unit	1CB
		2/0	600 kcmil	--	--	--	✓		3VA9474-0JJ23		1	1 unit	1CB
 3VA9243-0JC22	Wire connector, 2 cables, with control wire tap • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals and 1 extended terminal cover	AWG 4	300 kcmil	--	✓	--	--		3VA9233-0JC22		1	1 unit	1CB
		AWG 4	300 kcmil	--	--	✓	--		3VA9243-0JC22		1	1 unit	1CB
		2/0	600 kcmil	--	--	--	✓		3VA9473-0JC23		1	1 unit	1CB
 3VA9244-0JC22	Wire connector, 2 cables, with control wire tap • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals and 1 extended terminal cover	AWG 4	300 kcmil	--	--	✓	--		3VA9244-0JC22		1	1 unit	1CB
		2/0	600 kcmil	--	--	--	✓		3VA9474-0JC23		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

	Version	Minimum cable cross-section (stranded) Class B	Maximum cable cross-section (stranded) Class B	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
				3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d					
 3VA9243-0JF60	Distribution wire connector, 6 cables • Connection of Cu/Al cable • Included in scope of supply: 3 single terminals and 1 extended terminal cover	AWG 14	AWG 2	✓	--	--	--		3VA9133-0JF60		1	1 unit	1CB
			AWG 2	--	✓	--	--		3VA9233-0JF60		1	1 unit	1CB
			AWG 2	--	--	✓	--		3VA9243-0JF60		1	1 unit	1CB
			AWG 2	--	--	--	✓		3VA9373-0JF60		1	1 unit	1CB
 3VA9244-0JF60	Distribution wire connector, 6 cables • Connection of Cu/Al cable • Included in scope of supply: 4 single terminals and 1 extended terminal cover	AWG 14	AWG 2	--	--	✓	--		3VA9244-0JF60		1	1 unit	1CB
			AWG 2	--	--	--	✓		3VA9374-0JF60		1	1 unit	1CB
Copper wire connectors													
 3VA9243-0JD12	Copper wire connector • Connection of Cu cable • Included in scope of supply: 3 single terminals	AWG 14	2/0	✓	--	--	--		3VA9133-0JD11		1	1 unit	1CB
		AWG 6	350 kcmil	--	✓	--	--		3VA9233-0JD12		1	1 unit	1CB
		AWG 14	1/0	--	--	✓	--		3VA9143-0JD11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9243-0JD12		1	1 unit	1CB
 3VA9244-0JD12	Copper wire connector • Connection of Cu cable • Included in scope of supply: 4 single terminals	AWG 1	600 kcmil	--	--	--	✓		3VA9373-0JD13		1	1 unit	1CB
		AWG 14	1/0	--	--	✓	--		3VA9144-0JD11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9244-0JD12		1	1 unit	1CB
		AWG 1	600 kcmil	--	--	--	✓		3VA9374-0JD13		1	1 unit	1CB
 3VA9243-0JK12	Copper wire connector, with control wire tap • Connection of Cu cable • Included in scope of supply: 3 single terminals	AWG 14	2/0	✓	--	--	--		3VA9133-0JK11		1	1 unit	1CB
		AWG 6	350 kcmil	--	✓	--	--		3VA9233-0JK12		1	1 unit	1CB
		AWG 14	1/0	--	--	✓	--		3VA9143-0JK11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9243-0JK12		1	1 unit	1CB
		AWG 1	600 kcmil	--	--	--	✓		3VA9373-0JK13		1	1 unit	1CB
 3VA9244-0JK12	Copper wire connector, with control wire tap • Connection of Cu cable • Included in scope of supply: 4 single terminals	AWG 14	1/0	--	--	✓	--		3VA9144-0JK11		1	1 unit	1CB
		AWG 6	350 kcmil	--	--	✓	--		3VA9244-0JK12		1	1 unit	1CB
		AWG 1	600 kcmil	--	--	--	✓		3VA9374-0JK13		1	1 unit	1CB
 3VA9473-0JE23	Copper wire connector, 2 cables • Connection of Cu cable • Included in scope of supply: 3 single terminals and 1 extended terminal cover	2/0	600 kcmil	--	--	--	✓		3VA9473-0JE23		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

	Version	Minimum cable cross-section (stranded) Class B	Maximum cable cross-section (stranded) Class B	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
				3VA51	3VA52	3VA61 3VA62	3VA63 3VA64						
	Copper wire connector, 2 cables • Connection of Cu cable • Included in scope of supply: 4 single terminals and 1 extended terminal cover	2/0	600 kcmil	--	--	--	✓		3VA9474-0JE23		1	1 unit	1CB
	Copper wire connector, 2 cables, with control wire tap • Connection of Cu cable • Included in scope of supply: 3 single terminals and 1 extended terminal cover	2/0	600 kcmil	--	--	--	✓		3VA9473-0JL23		1	1 unit	1CB
	Copper wire connector, 2 cables, with control wire tap • Connection of Cu cable • Included in scope of supply: 4 single terminals and 1 extended terminal cover	2/0	600 kcmil	--	--	--	✓		3VA9474-0JL23		1	1 unit	1CB

	Version	Minimum terminal width	Maximum terminal width	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
				3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d					
Nut keeper kits													
 3VA9243-0QA00	Nut keeper kit Included in delivery: • 3 single terminals	17 mm / 0.7 inch	6.5 mm / 0.25 inch	✓	--	--	--		3VA9133-0QA00		1	1 unit	1CB
		25 mm / 1 inch	8 mm / 0.3 inch	--	✓	--	--		3VA9233-0QA00		1	1 unit	1CB
		25 mm / 1 inch	8 mm / 0.3 inch	--	--	✓	--		3VA9243-0QA00		1	1 unit	1CB
		35 mm / 1.4 inch	10 mm / 0.4 inch	--	--	--	✓		3VA9473-0QA00		1	1 unit	1CB
 3VA9244-0QA00	Nut keeper kit Included in delivery: • 4 single terminals	25 mm / 1 inch	8 mm / 0.3 inch	--	--	✓	--		3VA9244-0QA00		1	1 unit	1CB
		35 mm / 1.4 inch	10 mm / 0.4 inch	--	--	--	✓		3VA9474-0QA00		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

	Version	Minimum terminal width	Maximum terminal width	For molded case circuit breakers/Article No. stem				SD	Article No. www.siemens.com/product?ArticleNo.	Price per PU	PU (UNIT, SET, M)	PS	PG
				3VA51	3VA52	3VA61	3VA63						
						3VA62	3VA64	d					
Bus connector extensions													
	Front bus connectors extended Included in scope of supply: • 1 single connection	22 mm / 0.9 inch	8 mm / 0.3 inch	✓	--	--	--		3VA9131-QB00		1	1 unit	1CB
	Front bus connectors extended Included in scope of supply: • 3 single terminals • 2 phase barriers • 1 insulating plate	22 mm / 0.9 inch	8 mm / 0.3 inch	✓	--	--	--		3VA9133-QB00		1	1 unit	1CB
	Front bus connectors extended Included in scope of supply: • 3 single terminals • 1 insulating plate	32 mm / 1.3 inch	10 mm / 0.4 inch	--	✓	✓	--		3VA9273-QB00		1	1 unit	1CB
		40 mm / 1.6 inch	12.5 mm / 0.5 inch	--	--	--	✓		3VA9473-QB00		1	1 unit	1CB
	Note Only permitted in conjunction with phase barriers! Phase barriers are included in the circuit breaker scope of supply or can be ordered as a spare part (3VA9...-WA00).												
	Front bus connectors extended Included in scope of supply: • 4 single terminals • 1 insulating plate	32 mm / 1.3 inch	10 mm / 0.4 inch	--	--	✓	--		3VA9274-QB00		1	1 unit	1CB
		40 mm / 1.6 inch	12.5 mm / 0.5 inch	--	--	--	✓		3VA9474-QB00		1	1 unit	1CB
	Note Only permitted in conjunction with phase barriers! Phase barriers are included in the circuit breaker scope of supply or can be ordered as a spare part (3VA9...-WA00).												
	Front bus connectors offset Included in scope of supply: • 3 single terminals • 1 insulating plate Distance between pole centers: 400/600 A = 70 mm / 2.76 inches	60 mm / 2.4 inches	12.5 mm / 0.5 inch	--	--	--	✓		3VA9473-QC00		1	1 unit	1CB
	Note Only permitted in conjunction with phase barriers! Phase barriers are included in the circuit breaker scope of supply or can be ordered as a spare part (3VA9...-WA00).												
	Front bus connectors offset Included in scope of supply: • 4 single terminals • 1 insulating plate Distance between pole centers: 400/600 A = 70 mm / 2.76 inches	60 mm / 2.4 inches	12.5 mm / 0.5 inch	--	--	--	✓		3VA9474-QC00		1	1 unit	1CB
	Note Only permitted in conjunction with phase barriers! Phase barriers are included in the circuit breaker scope of supply or can be ordered as a spare part (3VA9...-WA00).												

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

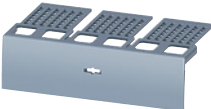
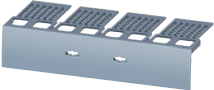
Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

	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
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d					
Rear connecting studs flat											
	Rear connecting studs flat Included in scope of supply: • 2 short studs with flat terminal • 1 long stud with flat terminal	✓	--	--	--		3VA9133-0QE00		1	1 unit	1CB
		--	✓	--	--		3VA9233-0QE00		1	1 unit	1CB
		--	--	✓	--		3VA9243-0QE00		1	1 unit	1CB
		--	--	--	✓		3VA9473-0QE00		1	1 unit	1CB
3VA9243-0QE00											
	Rear connecting studs flat Included in scope of supply: • 2 short studs with flat terminal • 2 long studs with flat terminal	--	--	✓	--		3VA9244-0QE00		1	1 unit	1CB
		--	--	--	✓		3VA9474-0QE00		1	1 unit	1CB
3VA9244-0QE00											
	Rear connecting stud flat Included in scope of supply: • 1 short stud with flat terminal	✓	--	--	--		3VA9131-0QE10		1	1 unit	1CB
		--	✓	--	--		3VA9231-0QE10		1	1 unit	1CB
		--	--	✓	--		3VA9241-0QE10		1	1 unit	1CB
		--	--	--	✓		3VA9471-0QE10		1	1 unit	1CB
3VA9241-0QE10											
	Rear connecting stud flat Included in scope of supply: • 1 long stud with flat terminal	✓	--	--	--		3VA9131-0QE20		1	1 unit	1CB
		--	✓	--	--		3VA9231-0QE20		1	1 unit	1CB
		--	--	✓	--		3VA9241-0QE20		1	1 unit	1CB
		--	--	--	✓		3VA9471-0QE20		1	1 unit	1CB
3VA9241-0QE20											
Rear connecting studs round											
	Rear connecting studs round Included in scope of supply: • 1 long stud with round terminal • 2 short studs with round terminal	✓	--	--	--		3VA9133-0QF00		1	1 unit	1CB
		--	✓	--	--		3VA9233-0QF00		1	1 unit	1CB
		--	--	✓	--		3VA9243-0QF00		1	1 unit	1CB
		--	--	--	✓		3VA9473-0QF00		1	1 unit	1CB
3VA9243-0QF00											
	Rear connecting studs round Included in scope of supply: • 2 long studs with round terminal • 2 short studs with round terminal	--	--	✓	--		3VA9244-0QF00		1	1 unit	1CB
		--	--	--	✓		3VA9474-0QF00		1	1 unit	1CB
3VA9244-0QF00											
	Rear connecting stud round Included in scope of supply: • 1 short stud with round terminal	✓	--	--	--		3VA9131-0QF10		1	1 unit	1CB
		--	✓	--	--		3VA9231-0QF10		1	1 unit	1CB
		--	--	✓	--		3VA9241-0QF10		1	1 unit	1CB
		--	--	--	✓		3VA9471-0QF10		1	1 unit	1CB
3VA9241-0QF10											
	Rear connecting stud round Included in scope of supply: • 1 long stud with round terminal	✓	--	--	--		3VA9131-0QF20		1	1 unit	1CB
		--	✓	--	--		3VA9231-0QF20		1	1 unit	1CB
		--	--	✓	--		3VA9241-0QF20		1	1 unit	1CB
		--	--	--	✓		3VA9471-0QF20		1	1 unit	1CB
3VA9241-0QF20											
Phase barriers											
	Phase barriers Included in scope of supply: • 2 phase barriers	✓	--	--	--		3VA9132-0WA00		1	1 unit	1CB
		--	✓	✓	--		3VA9272-0WA00		1	1 unit	1CB
		--	--	--	✓		3VA9472-0WA00		1	1 unit	1CB
3VA9272-0WA00											

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

	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
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64 d						
Terminal covers											
	Terminal cover for 1-pole breakers	✓	--	--	--		3VA9131-0WD10		1	1 unit	1CB
	Terminal cover for 3-pole breakers	✓	--	--	--		3VA9131-0WD30		1	1 unit	1CB
		--	✓	✓	--		3VA9271-0WD30		1	1 unit	1CB
		--	--	--	✓		3VA9471-0WD30		1	1 unit	1CB
	Terminal cover for 4-pole breakers	--	--	✓	--		3VA9271-0WD40		1	1 unit	1CB
		--	--	--	✓		3VA9471-0WD40		1	1 unit	1CB
	Terminal cover extended for 3-pole breakers	✓	--	--	--		3VA9131-0WF30		1	1 unit	1CB
		--	✓	✓	--		3VA9271-0WF30		1	1 unit	1CB
		--	--	--	✓		3VA9471-0WF30		1	1 unit	1CB
	Terminal cover extended for 4-pole breakers	--	--	✓	--		3VA9271-0WF40		1	1 unit	1CB
		--	--	--	✓		3VA9471-0WF40		1	1 unit	1CB
	Terminal cover offset for 3-pole breakers	--	--	--	✓		3VA9471-0WG30		1	1 unit	1CB
	Terminal cover offset for 4-pole breakers	--	--	--	✓		3VA9471-0WG40		1	1 unit	1CB
Insulating plates specially for fixed mounting											
	Rear insulating plate extended, 3-pole	✓	--	--	--		3VA9131-0WJ30		1	1 unit	1CB
		--	✓	✓	--		3VA9271-0WJ30		1	1 unit	1CB
		--	--	--	✓		3VA9471-0WJ30		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Connection parts – suitable for all installation types (fixed mounting, plug-in and draw-out versions)

	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
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64 d						
	Rear insulating plate extended, 4-pole	--	--	✓	--		3VA9271-0WJ40		1	1 unit	1CB
		--	--	--	✓		3VA9471-0WJ40		1	1 unit	1CB
3VA9271-0WJ40											
	Rear insulating plate offset, 3-pole	--	--	--	✓		3VA9471-0WK30		1	1 unit	1CB
3VA9471-0WK30											
	Rear insulating plate offset, 4-pole	--	--	--	✓		3VA9471-0WK40		1	1 unit	1CB
3VA9471-0WK40											
Control wire taps specially for fixed mounting											
	Control wire tap for busbar	--	✓	✓	--		3VA9270-0WC00		1	1 unit	1CB
		--	--	--	✓		3VA9470-0WC00		1	1 unit	1CB
3VA9270-0WC00											

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Plug-in and draw-out technology

Overview

Using plug-in and draw-out technology the 3VA UL 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 connectors of the plug-in socket or the draw-out socket.

The incoming and outgoing feeder ends of the socket unit termination area are designed to match the relevant 3VA UL molded case circuit breaker. The major benefit of this design feature is that all terminal and connection variants of the molded case circuit breaker are fully compatible with the corresponding plug-in or draw-out unit.

A 3VA UL 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 UL breaker that make a friction-locked and keyed connection with the corresponding 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 crank 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 wires. 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.

Note:

Plug-in and draw-out technologies are only available for the 3VA6 molded case circuit breakers with electronic trip units. The plug-in or draw-out sockets of the breaker sizes 250 A to 400 A (3VA61, 3VA62 and 3VA63) can be equipped with all available connecting terminals.

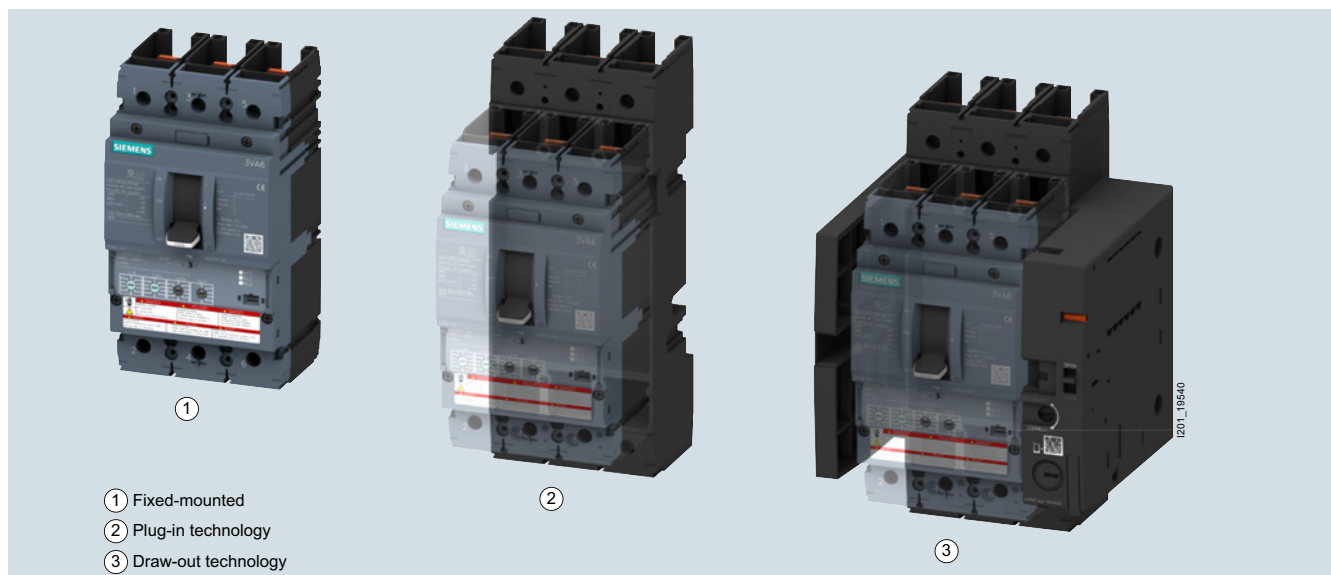
Special plug-in and draw-out sockets are available for the breaker size 600 A (3VA64). Offset bus connectors are also supplied in this case. For temperature reasons, only this connection technology is possible with this breaker size. For temperature reasons, 100 % rated breakers cannot be used with plug-in or draw-out technology.

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 UL 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

3VA6 molded case circuit breakers are available in the following installation variants:



3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Plug-in and draw-out technology

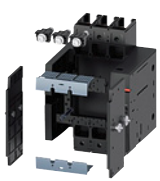
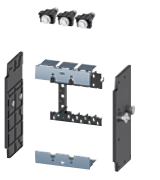
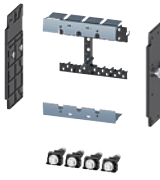
Selection and ordering data

	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
		3VA61 3VA62	3VA63	3VA64	d					
Plug-in socket										
  3VA9143-0KP00   3VA9144-0KP00	Plug-in unit, complete kit Comprising: • Plug-in socket • Plug-in unit, conversion kit • Mounting screw kit									
	Versions									
	• 3-pole	✓	--	--		3VA9143-0KP00	1	1 unit	1CB	
		--	✓ NEW	--		3VA9343-0KP00	1	1 unit	1CB	
		--	--	✓ NEW		3VA9443-0KP00	1	1 unit	1CB	
	• 4-pole	✓	--	--		3VA9144-0KP00	1	1 unit	1CB	
		--	✓ NEW	--		3VA9344-0KP00	1	1 unit	1CB	
		--	--	✓ NEW		3VA9444-0KP00	1	1 unit	1CB	
	Plug-in unit, conversion kit Comprising: • Screw-fastened terminal covers for molded case circuit breakers • Plug-in contacts • Cable cage • Autotrip plunger									
	Versions									
  3VA9143-0KP10   3VA9144-0KP10	• 3-pole	✓	--	--		3VA9143-0KP10	1	1 unit	1CB	
		--	✓ NEW	✓ NEW		3VA9343-0KP10	1	1 unit	1CB	
	• 4-pole	✓	--	--		3VA9144-0KP10	1	1 unit	1CB	
		--	✓ NEW	✓ NEW		3VA9344-0KP10	1	1 unit	1CB	

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

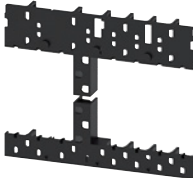
Plug-in and draw-out technology

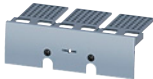
Version		For molded case circuit breakers/Article No. stem			SD	Article No. www.siemens.com/ product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
3VA61	3VA62	3VA63	3VA64		d					
Draw-out units										
Draw-out unit, complete kit Comprising: • Draw-out socket • Draw-out unit, conversion kit • Mounting screw kit										
 3VA9143-0KD00										
Versions										
• 3-pole		✓	--	--		3VA9143-0KD00		1	1 unit	1CB
		--	✓ NEW	--		3VA9343-0KD00		1	1 unit	1CB
		--	--	✓ NEW		3VA9443-0KD00		1	1 unit	1CB
• 4-pole		✓	--	--		3VA9144-0KD00		1	1 unit	1CB
		--	✓ NEW	--		3VA9344-0KD00		1	1 unit	1CB
		--	--	✓ NEW		3VA9444-0KD00		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 wall • Plug-in contacts • Cable cage • Autotrip plunger										
 3VA9143-0KD10										
Versions										
• 3-pole		✓	--	--		3VA9143-0KD10		1	1 unit	1CB
		--	✓ NEW	✓ NEW		3VA9343-0KD10		1	1 unit	1CB
• 4-pole		✓	--	--		3VA9144-0KD10		1	1 unit	1CB
		--	✓ NEW	✓ NEW		3VA9344-0KD10		1	1 unit	1CB
 3VA9144-0KD10										

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Plug-in and draw-out technology

	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
		3VA61 3VA62	3VA63 d					
Cable cage								
	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	✓	--	3VA9167-0KB02		1	1 unit	1CB
3VA9167-0KB02								
Door feedthrough								
	Door feedthrough	✓	--	3VA9147-0KT00		1	1 unit	1CB
3VA9147-0KT00								
Spare part: Autotrip plunger								
	Autotrip plunger	✓	--	3VA9267-0KP81		1	1 unit	1CB
	- Accessories for plug-in unit - Accessories for draw-out unit	✓	--	3VA9267-0KD81		1	1 unit	1CB
3VA9267-0KP81								

	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
		3VA61 3VA62	3VA63 3VA64	d					
Terminal covers									
	Terminal cover for plug-in/draw-out unit (spare part) • To provide circuit breaker touch protection • For mounting on the molded case circuit breaker								
	Versions								
	• 3-pole	✓	--						
		--	✓ NEW						
 3VA9143-0KB01	• 4-pole	✓	--						
		--	✓ NEW						
 3VA9144-0KB01		✓	--						
		--	✓ NEW						

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Plug-in and draw-out technology

	Version	SD	Article No. www.siemens.com/ product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Other accessories							
	Communication link for draw-out unit Comprising: • Cable kit with 3 special position signaling switches • Connecting cable 3VA9987-0KC10		3VA9977-0KC00		1	1 unit	1CB
	Position signaling switches • For draw-out unit • For plug-in unit		3VA9977-0KB00		1	1 unit	1CB
	Spare connecting cable To connect the position signaling switches for communication with the COM060		3VA9987-0KC10		1	1 unit	1CB
	Crank handle for draw-out unit Insulated, incl. crank holder		3VA9987-0KD81		1	1 unit	1CB
	Auxiliary circuit connector Versions • For all draw-out units • For all plug-in units		3VA9977-0KD80		1	1 unit	1CB
			3VA9977-0KP80		1	1 unit	1CB
	Cylinder lock (type Ronis) • Includes a lock with 2 keys • For locking • For installation in all rotary operators with shaft stub • For mounting in the adapter kit for the accessories compartment		3VA9980-0VL10		1	1 unit	1CB
			3VA9980-0VL20		1	1 unit	1CB
			3VA9980-0VL30		1	1 unit	1CB
			3VA9980-0VL40		1	1 unit	1CB
	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		3VA9970-0LF40		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

Overview

Metering function

The Rogowski coils integrated in the 3VA6 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 3VA6 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 3VA6 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 3VA6 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 3VA6 molded case circuit breakers can be integrated into the relevant communication networks via the following optional expansion modules:

- Switched Ethernet PROFINET IO
- PROFIBUS DPV1
- RS 485 / Modbus RTU

3VA UL molded case circuit breakers are integrated in STEP 7 (TIA Portal), Version 14 or higher, and an additional engineering tool is not required. GSD and GSDML files are available for integration in third-party systems.

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 3VA6 molded case circuit breakers simultaneously.

EFB300 external function box

The EFB300 external function box is linked directly to the ETU of the 3VA6 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 3VA6 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

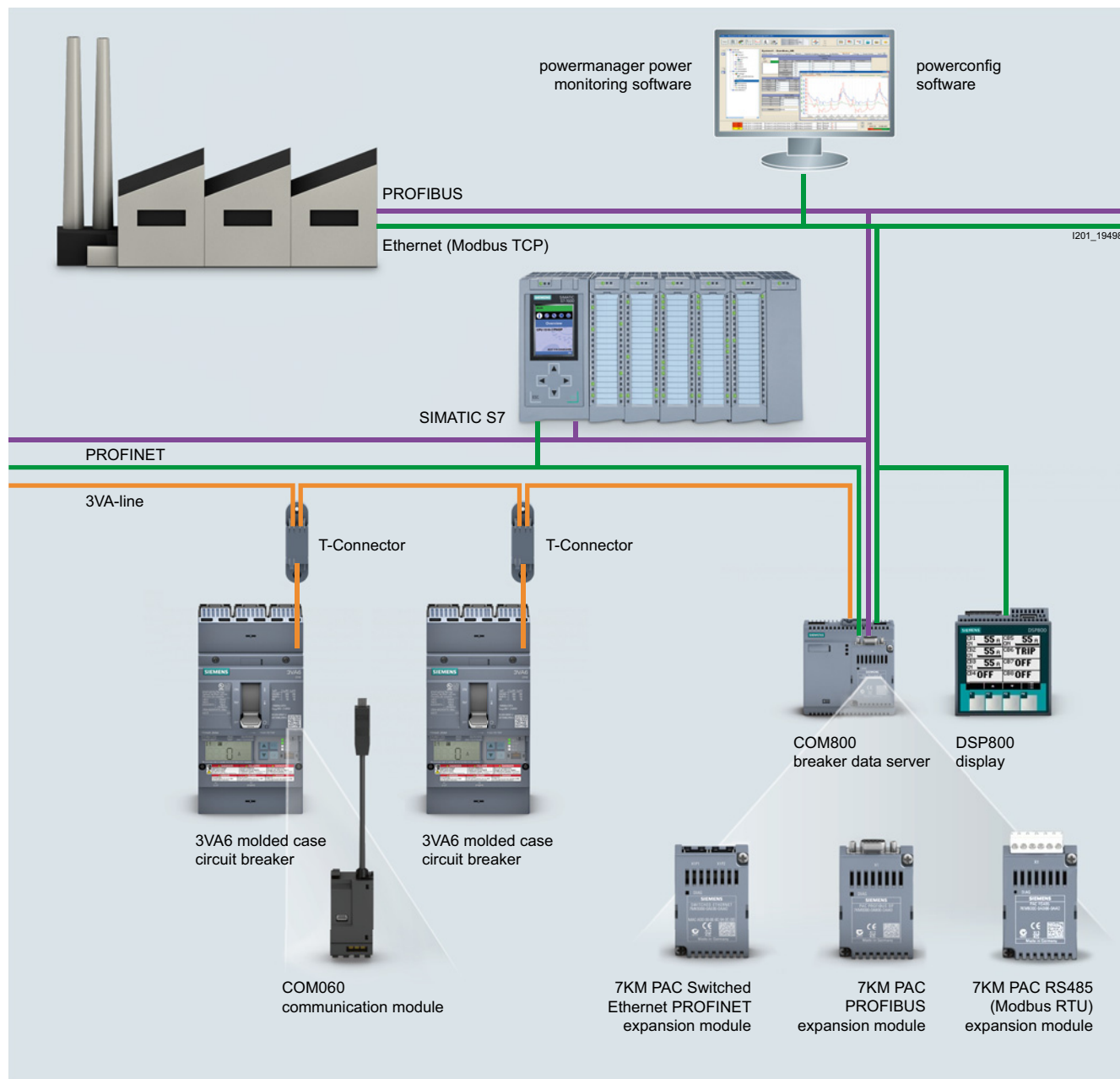
- The metering function integrated in 8-series ETUs can acquire energy data without requiring additional external transformers
- The COM800 breaker data server provides a cost-efficient communication interface for up to 8 3VA6 molded case circuit breakers
- Universal bus interfaces are available for the COM800/COM100 breaker data server
- Standardized engineering thanks to integration in STEP 7 (TIA Portal)
- 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

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

Design



3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

Overview of the metering functions

Metering function ¹⁾			ETUs of the		Display		Communication
			5-series	8-series	Display in ETU	DSP800	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	✓	✓	👁	👁	👁
Average value over the three phase currents	$I_{LAVG} = (I_1 + I_2 + I_3)/3$	A	--	✓	--	👁	👁
Unbalance of the phase currents	I_{nba}	%	--	✓	--	👁	👁
THD of the 3 phases	$THDI_1, THDI_2, THDI_3$	%	--	✓	--	👁	👁
Voltage							
Phase voltages incl. average value	$U_{12}, U_{23}, U_{31}, U_{phavg}$	V	--	✓	👁	👁	👁
Voltages to N conductor incl. average 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

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

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	$0.2 \times I_b \dots 1.2 \times I_b$	$\pm 1\%$
Voltage (L-N)	$80 \text{ V} < U < 480 \text{ V}$	$\pm 1\%$
THD current	Up to the 19th harmonic $0.2 \times I_b \dots 1.2 \times I_b$	$\pm 5\%$
THD voltage	Up to the 19th harmonic $80 \text{ V} < U < 480 \text{ V}$	$\pm 5\%$
Power factor PF	$0.2 \times I_b \dots 1.2 \times I_b$	$\pm 0.05\%$ 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	$0.2 \times I_b \dots 1.2 \times I_b$	$\pm 2\%$
Apparent power	PF ≥ 0.6 inductive PF ≥ 0.8 capacitive	
Reactive energy	$0.2 \times I_b \dots 1.2 \times I_b$	$\pm 2\%$
Apparent energy	PF ≥ 0.6 inductive PF ≥ 0.8 capacitive	
Frequency	$80 \text{ V} < U < 480 \text{ V}$	$\pm 0.1\%$

Legend:

I_b is the maximum current in the relevant size.

Example: 3VA21 $\rightarrow I_b = 160 \text{ A}$

U_n refers to the nominal voltage of the metering function;
between phase and neutral

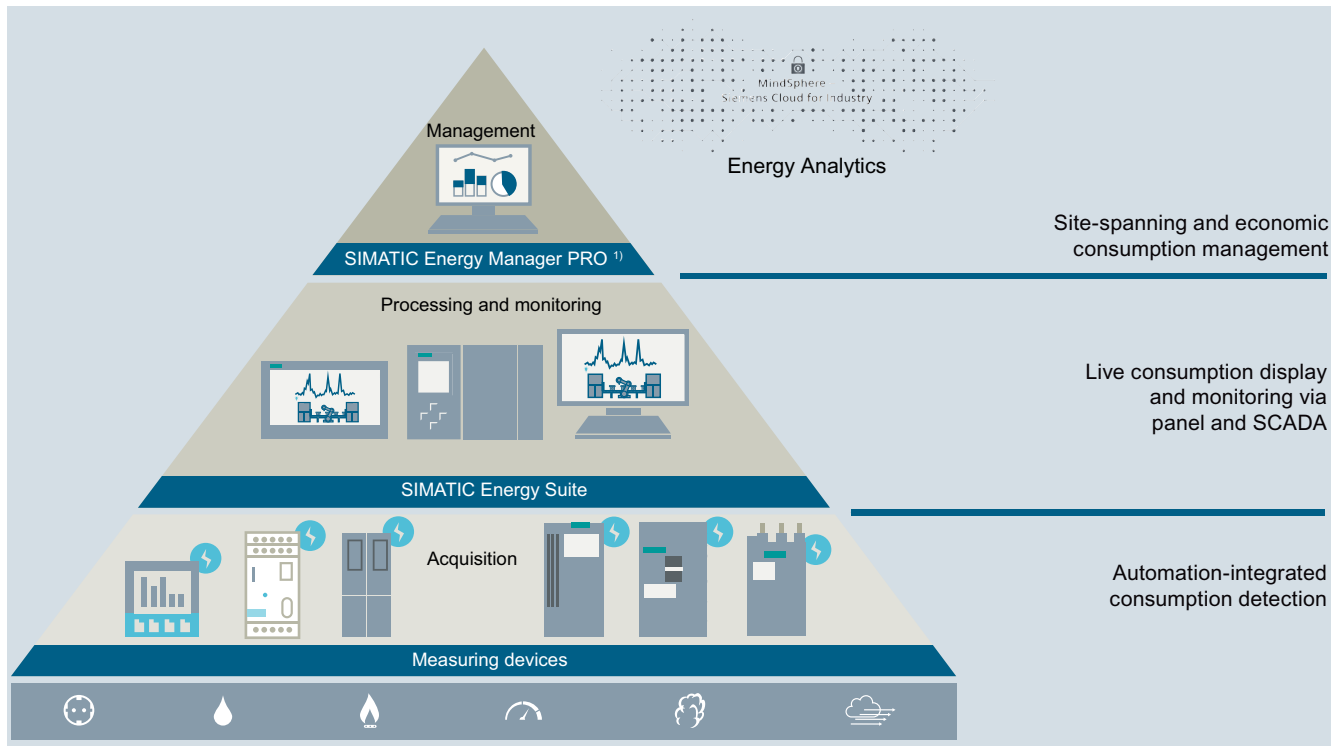
All specified accuracies refer to an ambient temperature of 23°C
 $\pm 2^\circ\text{C}$.

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

Integrated energy management



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 families²⁾ substantially reduces configuration effort. Thanks to consistent interfacing to SIMATIC Energy Manager PRO¹⁾ or to the cloud-based Energy Analytics service, recorded energy data can be expanded seamlessly into a cross-location energy management system.

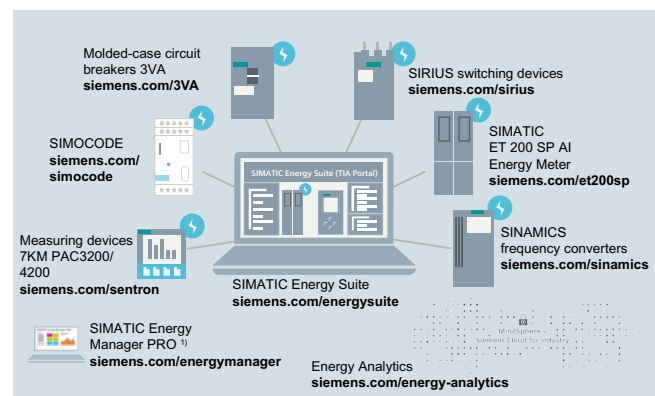
This way, businesses can also do justice to all other required economic and management energy aspects, from purchasing energy through planning to energy controlling.

The advantages at a glance:

- Automatic generation of energy management data
- Integration into TIA Portal and the automation system
- Easy configuration

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



Ready for
SIMATIC
Energy Suite

For more information on SIMATIC Energy Suite:
www.siemens.com/energysuite

¹⁾ SIMATIC Energy Manager PRO is the innovative successor of SIMATIC B.Data

²⁾ Products from the SIMATIC, SENTRON, SINAMICS, SIRIUS and SIMOCODE product families. You will find details of currently supported devices here: www.siemens.com/energysuite-hardware

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

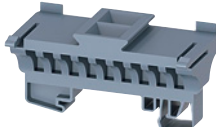
Selection and ordering data

	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
		3VA61 3VA62	3VA63 3VA64	d					
24 V module									
	24 V module • 24 V DC • For mounting in the right-hand accessories compartment of the 3VA6 • Optional energy supply for the ETU, also includes continuous operation of the ETU display and the metering function of the ETU 8-series	✓	--		3VA9177-0TB50		1	1 unit	1CB
		--	✓		3VA9377-0TB50		1	1 unit	1CB
Communication accessories in the molded case circuit breaker									
	COM060 communication module • For mounting in the right-hand accessories compartment of the 3VA6 molded case circuit breaker (including ETU power supply) • Communication with the COM800/COM100 breaker data server via the 3VA-line • Including a T-Connector	✓	--		3VA9177-0TB10		1	1 unit	1CB
		--	✓		3VA9377-0TB10		1	1 unit	1CB
Breaker data server									
	COM800 breaker data server • 2 terminating resistors • Central communication module for connecting up to eight 3VA6 molded case circuit breakers via the 3VA-line • Ethernet 10/100 Mbit/s interface • Module slot for plugging on an optional PROFIBUS DP, PROFINET or RS 485 module				3VA9977-0TA10		1	1 unit	1CB
	COM100 breaker data server • 2 terminating resistors • Optimized, central communication module for connecting a 3VA6 molded case circuit breaker via the 3VA-line • Ethernet 10/100 Mbit/s interface • Module slot for plugging on an optional PROFIBUS DP, PROFINET or RS 485 module				3VA9977-0TA20		1	1 unit	1CB
	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
	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 connected 3VA molded case circuit breaker, 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, PROFlenergy and Modbus TCP protocols.				7KM9300-0AE01-0AA0		1	1 unit	1DD
	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

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

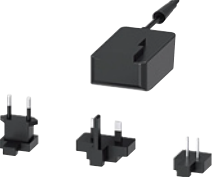
Communication and testing/commissioning devices

	Version	SD	Article No. www.siemens.com/ product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
Accessories for communication							
	T-Connector • Spare part • Provides spur line feeder to COM060 and loops through to the next circuit breaker. • Includes a connection adapter for mounting on the 3VA6 breaker enclosure		3VA9987-0TG10		1	1 unit	1CB
3VA9987-0TG10							
	DIN rail adapter For snapping the T-Connector onto a DIN rail.		3VA9987-0TG11		1	1 unit	1CB
3VA9987-0TG11							
	Preassembled T-Connector-to-T-Connector or T-Connector-to-COM800/COM100 connecting cable • 0.4 m long • 1 m long • 2 m long • 4 m long		3VA9987-0TC10		1	1 unit	1CB
3VA9987-0TC10							
			3VA9987-0TC20		1	1 unit	1CB
			3VA9987-0TC30		1	1 unit	1CB
			3VA9987-0TC40		1	1 unit	1CB
	Preassembled connecting cable for extending the COM060-to-T-Connector spur line connection • 0.4 m long • 0.8 m long		3VA9987-0TF20		1	1 unit	1CB
3VA9987-0TF20							
			3VA9987-0TF10		1	1 unit	1CB
	Additional bus terminating resistors		3VA9987-0TE10		1	5 units	1CB
3VA9987-0TE10							
	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
3VA9987-0UC10							
	External current transformer as straight-through transformer NEW Connection of an external current transformer for the N conductor for 3-pole 3VA6 molded case circuit breakers for 5-series and 8-series ETUs (ETU850, ETU856, ETU860), including connecting cable • $I_n = 25 \dots 150 \text{ A}$ • $I_n = 160 \dots 350 \text{ A}$ • $I_n = 400 \dots 630 \text{ A}$		3VA9077-0NA10		1	1 unit	1CB
3VA9077-0NA10			3VA9177-0NA10		1	1 unit	1CB
			3VA9377-0NA10		1	1 unit	1CB
Display							
	DSP800 display • For displaying the status, measured values and parameters of up to 8 3VA6 molded case circuit breakers • Connection to the COM800/COM100 via Ethernet for displaying information of the COM800/COM100 and the connected 3VA6 molded case circuit breaker		3VA9977-0TD10		1	1 unit	1CB
3VA9977-0TD10							

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

	Version	SD	Article No. www.siemens.com/ product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
		d					
External function box							
 3VA9977-0UA10	EFB300 - External function box for connection to the ETU of the 3VA6 molded case circuit breaker 4 digital outputs for information output 1 digital input - ZSI functionality - S0 interface - Including cable 1.5 m in length		3VA9977-0UA10		1	1 unit	1CB
	Connecting cable for EFB300 Spare part - Length 1.5 m - Length 3.0 m - Length 3.0 m for 3VA6 with EFB and RCD820		3VA9987-0UB10 3VA9987-0UB20 3VA9987-0UB30		1 1 1	1 unit 1 unit 1 unit	1CB 1CB 1CB
Test devices							
 3VA9977-0MA10	TD300 - Connection to the front interface of the ETU - Test device for activating the ETU and triggering a test trip		3VA9977-0MA10		1	1 unit	1CB
 3VA9977-0MB10	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 unit with adapter for Europe, UL and GB - Including connecting cable to the 3VA6 molded case circuit breaker		3VA9977-0MB10		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
 3VA9977-0MY10	Spare part: Cable for connecting the TD500 to the 3VA6 molded case circuit breaker		3VA9977-0MY10		1	1 unit	1CB

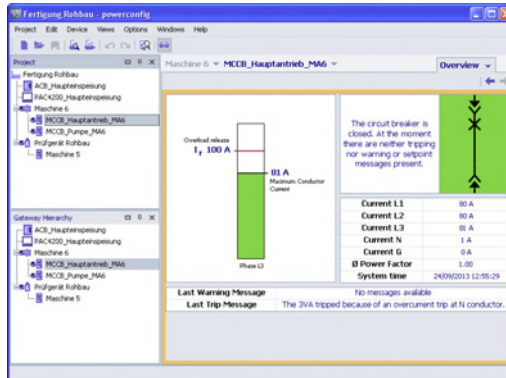
3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Communication and testing/commissioning devices

Version	SD	Article No. www.siemens.com/ product?Article No.	Price per PU	PU (UNIT, SET, M)	PS	PG
	d					

Commissioning and service software: powerconfig



- Commissioning and service software for 3VA6 molded case circuit breakers and further SENTRON components
- For Windows 7 and Windows 8
- Connection via TD500 or COM800/COM100
- Languages: English, German, Chinese, Spanish, Portuguese and Italian
- Enables complete use of the electronic components of the 3VA6 such as ETU, EFB300, DSP800, TD500
- Communication via PROFINET, PROFIBUS, Ethernet Modbus TCP and RS 485 with Modbus RTU
- See Catalog LV 10, "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/WWW/view/en/63452759>
- More information can be found on the Internet at: www.siemens.com/sentron

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Accessories for locking, blocking and interlocking

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

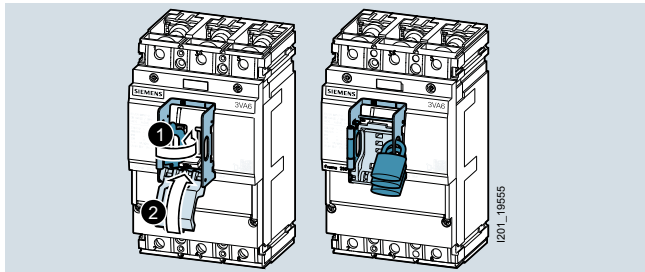
The padlock devices make it possible to lock the 3VA molded case circuit breaker in either the OFF or the ON operating position.

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

Blocking device for the handle

A blocking device mounted and latched on the handle allows the handle to be blocked and the molded case circuit breaker to be locked in the OFF or the ON position.



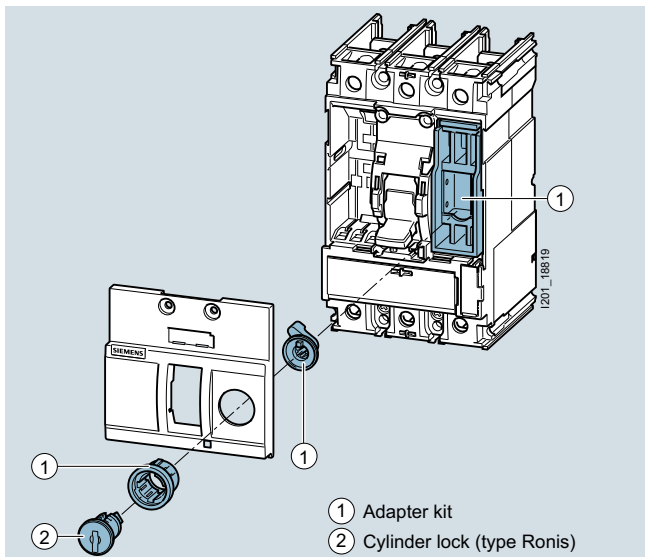
Locking technology

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

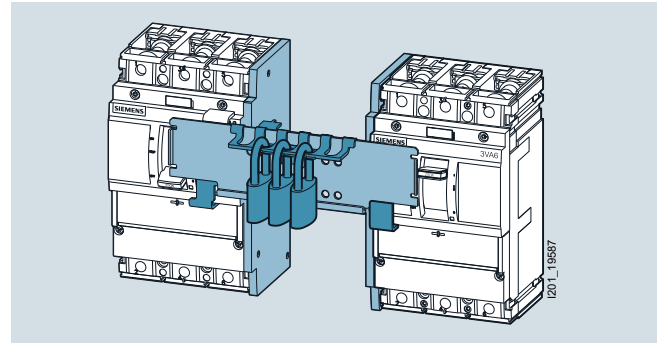


Interlocking technology

Interlocking by means of a sliding bar

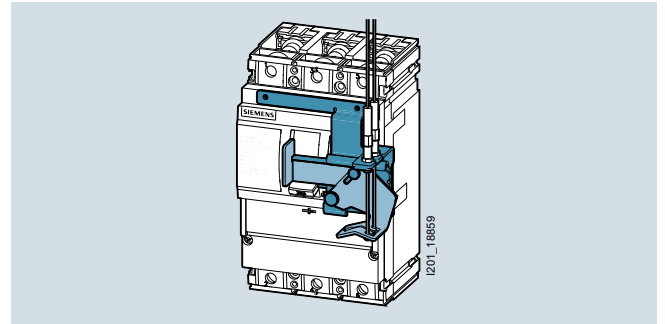
The sliding bar allows between two and three 3VA molded case circuit breakers of the same size to be mutually interlocked by means of a sliding bar.

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.

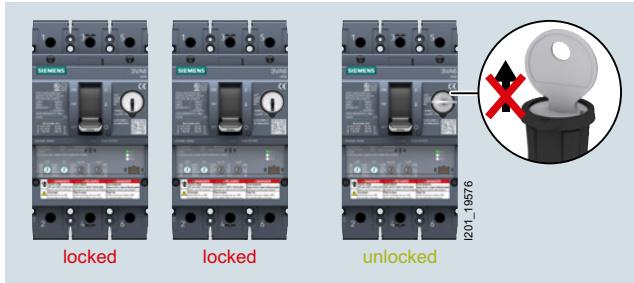
3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Accessories for locking, blocking and interlocking

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

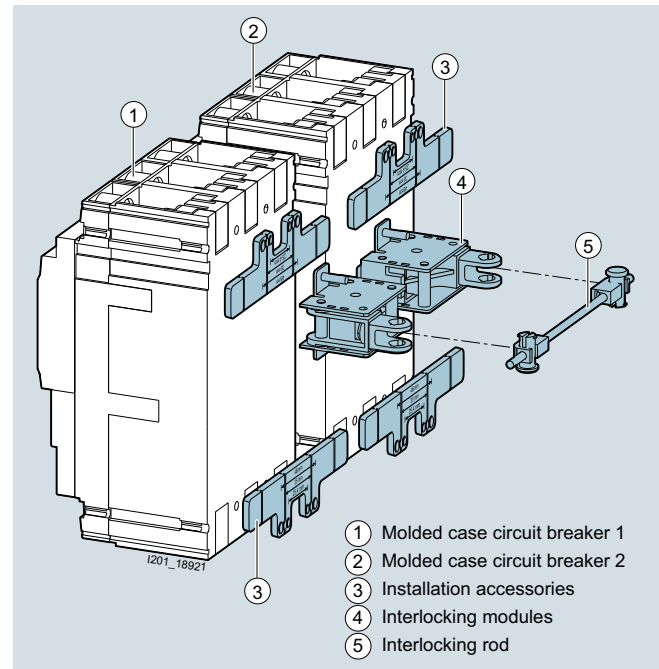
The rear interlock system allows implementation of an interlock without restricting the number of accessories which can be installed at the front of the 3VA molded case circuit breaker. Using the rear interlock, it is possible to create an interlock between two molded case circuit breakers of different sizes based on the blocking principle. When one molded case circuit breaker closes, the other circuit breaker is prevented from closing by a tappet 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

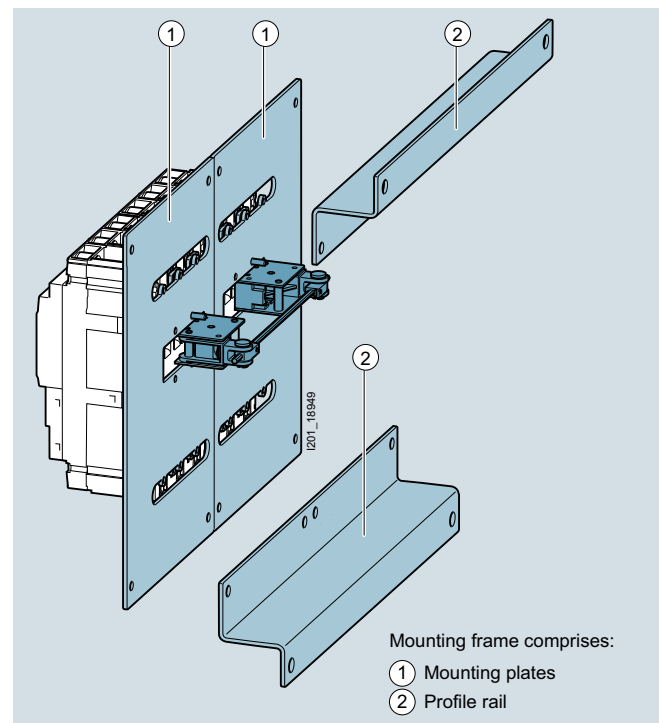
In order to install a rear interlock for plug-in or draw-out versions of the molded case circuit breakers, the tappet needs to be lengthened. The rear interlock for plug-in or draw-out versions is offered as a complete kit.



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.



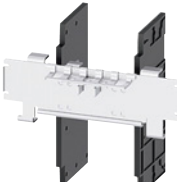
Rear interlock with mounting frame

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Accessories for locking, blocking and interlocking

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
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64 d						
Accessories for locking, blocking and interlocking											
	Blocking device for the handle	✓	--	--	--		3VA9038-0LB10		1	1 unit	1CB
		--	✓	✓	✓		3VA9378-0LB10		1	1 unit	1CB
3VA9378-0LB10											
	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	✓	--	--	--		3VA9137-0LF10		1	1 unit	1CB
	• To implement an interlock or a lock: select suitable cylinder lock(s)	--	✓	--	--		3VA9237-0LF10		1	1 unit	1CB
	• For an interlock: select the same cylinder lock number	--	--	✓	--		3VA9147-0LF10		1	1 unit	1CB
		--	--	--	✓		3VA9347-0LF10		1	1 unit	1CB
3VA9147-0LF10											
	Cylinder lock (type Ronis) • Includes a lock with 2 keys • For locking or interlocking • For installation in all rotary operators with shaft stub • 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
3VA9980-0VL10											
	Sliding bar Complete kit for interlocking 2 circuit breakers										
	Note	✓	--	--	--		3VA9138-0VF30		1	1 unit	1CB
	The article number must be ordered 2 x to implement an interlock between 3 breakers of the same size.	--	✓	--	--		3VA9238-0VF30		1	1 unit	1CB
		--	--	✓	--		3VA9148-0VF30		1	1 unit	1CB
		--	--	--	✓		3VA9348-0VF30		1	1 unit	1CB
3VA9148-0VF30											
	Module for handle interlock using a Bowden cable										
	Notes	✓	--	--	--		3VA9137-0VF10		1	1 unit	1CB
	• A separate handle interlock module is required for each switching device.	--	✓	--	--		3VA9237-0VF10		1	1 unit	1CB
	• A Bowden cable must be ordered sepa- rately.	--	--	✓	--		3VA9147-0VF10		1	1 unit	1CB
		--	--	--	✓		3VA9347-0VF10		1	1 unit	1CB
3VA9147-0VF10											
	Rear interlock with rod Complete kit for fixed mounting										
	Note						3VA9078-0VM10		1	1 unit	1CB
	Mounting frames are not included in scope of supply.										
3VA9078-0VM10											
	Rear interlock with rod Complete kit for plug-in/draw-out unit										
	Note	✓	✓	✓	✓		3VA9078-0VM30		1	1 unit	1CB
	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.										
3VA9078-0VM30											

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Accessories for locking, blocking and interlocking

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
	3VA51	3VA52	3VA61 3VA62	3VA63 3VA64						
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
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	✓	✓	✓	✓		3VA9078-0VK10		1	1 unit	1CB
• Mounting plate One plate per breaker, depending on size	✓	--	--	--		3VA9138-0VK20		1	1 unit	1CB
	--	✓	--	--		3VA9238-0VK20		1	1 unit	1CB
	--	--	✓	--		3VA9248-0VK20		1	1 unit	1CB
	--	--	--	✓		3VA9448-0VK20		1	1 unit	1CB
Notes										
• 2 mounting plates must be ordered. They are screwed onto the profile rail that can be ordered above. Different breakers can be mutually interlocked.										



3VA9980-0VC10



3VA9248-0VK20

3VA9980-0VC10



3VA9248-0VK20

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Other

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
		3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d					
Cover frames for door cut-out											
 3VA9143-0SB10	Cover frame for door cut-out for molded case circuit breaker										
	Versions										
	• 3-pole, door cut-out without trip unit	✓	--	--	--		3VA9033-0SB10		1	1 unit	1CB
		--	✓	✓	--		3VA9143-0SB10		1	1 unit	1CB
		--	--	--	✓		3VA9373-0SB10		1	1 unit	1CB
		--	--	--	--		3VA9033-0SB20		1	1 unit	1CB
	• 3-pole, door cut-out with trip unit	✓	--	--	--		3VA9033-0SB20		1	1 unit	1CB
		--	✓	--	--		3VA9233-0SB20		1	1 unit	1CB
		--	--	✓	--		3VA9143-0SB20		1	1 unit	1CB
		--	--	--	✓		3VA9343-0SB20		1	1 unit	1CB
	• 4-pole, door cut-out without trip unit	✓	--	--	--		3VA9034-0SB10		1	1 unit	1CB
		--	✓	✓	--		3VA9144-0SB10		1	1 unit	1CB
		--	--	--	✓		3VA9374-0SB10		1	1 unit	1CB
	• 4-pole, door cut-out with trip unit	✓	--	--	--		3VA9034-0SB20		1	1 unit	1CB
		--	✓	--	--		3VA9234-0SB20		1	1 unit	1CB
		--	--	✓	--		3VA9144-0SB20		1	1 unit	1CB
--		--	--	✓		3VA9344-0SB20		1	1 unit	1CB	
Cover frame for MO320 motor operators	✓	--	--	--		3VA9033-0SB10		1	1 unit	1CB	
	--	✓	✓	--		3VA9237-0SB30		1	1 unit	1CB	
	--	--	--	✓		3VA9377-0SB30		1	1 unit	1CB	
Cover frame for front mounted rotary operator	✓	--	--	--		3VA9033-0SB10		1	1 unit	1CB	
	--	✓	✓	--		3VA9143-0SB10		1	1 unit	1CB	
	--	--	--	✓		3VA9373-0SB10		1	1 unit	1CB	
Cover frame for front mounted rotary operator with door interlock	--	--	--	✓		3VA9377-0SB30		1	1 unit	1CB	
Cover frame for door feedthrough	--	✓	✓	--		3VA9233-0SB20		1	1 unit	1CB	
	--	--	--	✓		3VA9333-0SB20		1	1 unit	1CB	
Labeling plate for cover frame							3VA9087-0SX10		1	10 units	1CB


3VA9087-0SX10

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Other

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
	3VA51	3VA52	3VA61 3VA62	3VA63 3VA64	d					
Adapter for 60 mm busbar system (8US)										
 8US1213-4AP03	Busbar adapter system with 60 mm busbar center-to-center spacing. For further information, see Catalog LV 10, Busbar systems, 60 mm busbar system (8US) up to 1600 A, device adapters and device holders.									
	Note									
	Box terminals for the infeed side must be ordered separately for mounting on the busbar adapter. The connection technology for the outgoing side is freely selectable.									
	Versions									
	• 3-pole	✓	--	--	--	8US1211-4SS00		1	1 unit	1CU
Mounting screw kit										
 3VA9151-0SS10	Mounting screw kit									
	Versions									
	• For fixed-mounted molded case circuit breakers									
	- 1-pole	✓	--	--	--	3VA9151-0SS10		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 and draw-out units	--	--	✓	--	3VA9124-0SS10		1	1 unit	1CB

3VA UL Molded Case Circuit Breakers

Accessories and Spare Parts

Notes

Appendix



5/2	Catalog notes
5/3	Ordering notes
5/5	Further documentation
5/9	Quality management
5/10	Standards and approvals
5/12	Siemens contacts
5/13	Service & Support
5/14	Comprehensive support from A to Z
5/15	Software licenses
5/17	Conditions of sale and delivery

Appendix

Catalog notes

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

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.

Appendix

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/industrymail .
► 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	Article No.	Price per PU	PU (UNIT, SET, M)	PS*	PG
d					
►	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

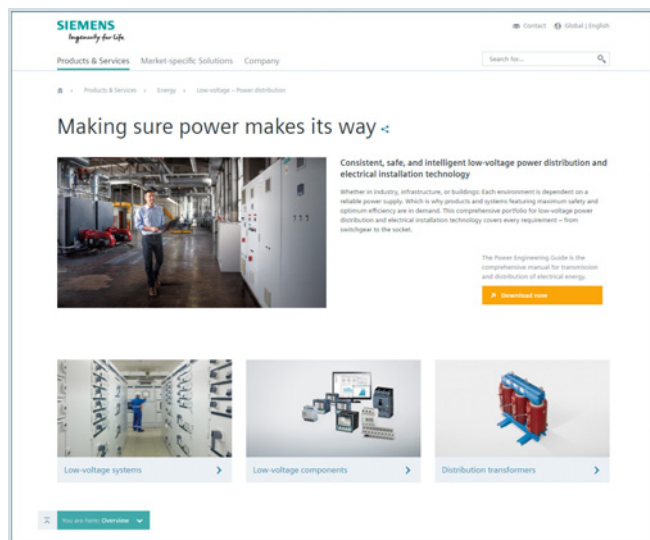
To compensate fluctuating prices of raw materials (for example silver, copper, aluminum, lead, gold, dysprosium and neodymium), surcharges are calculated on a daily basis for products containing these raw materials using the metal factor.
A surcharge for the particular raw material is added to the price 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/industrymail.

Low-Voltage Power Distribution and Electrical Installation Technology on the WWW



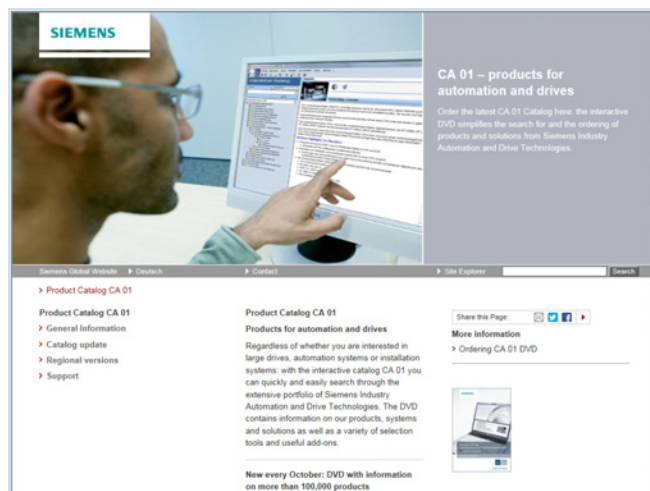
On the Internet you will find a host of information all about low-voltage power distribution and electrical installation technology products, such as:

- 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.

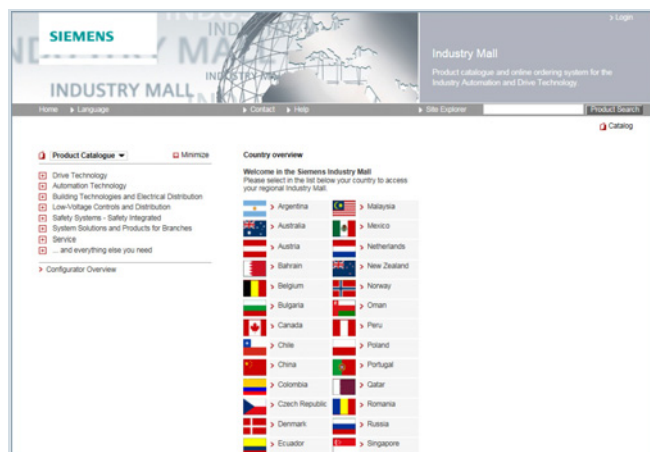
You can find everything you need here for solving automation, switching, installation and drive technology tasks. All information is provided over a user interface that is both user-friendly and intuitive.

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

Appendix

Further documentation

Industry Online Support

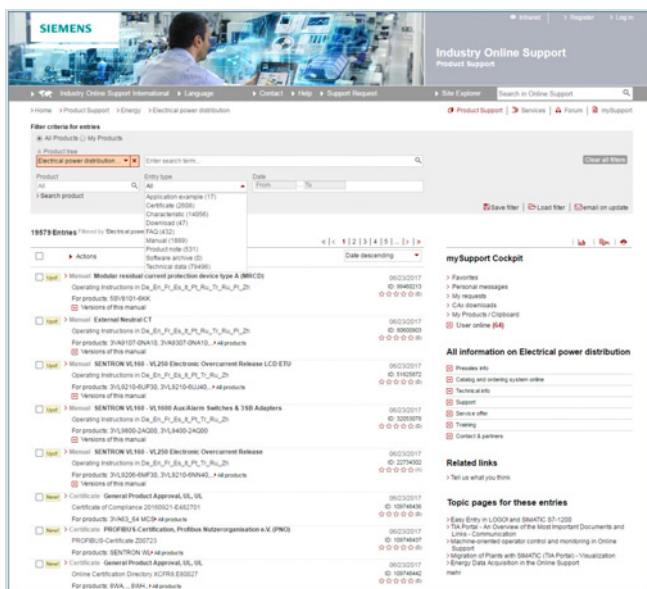


Comprehensive support – at any time, whatever your location

- 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

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/online-support-app

**Android:**

Industry Online
Support App
ANDROID

**Apple iOS:**

Industry Online
Support App
iOS

**Windows:**

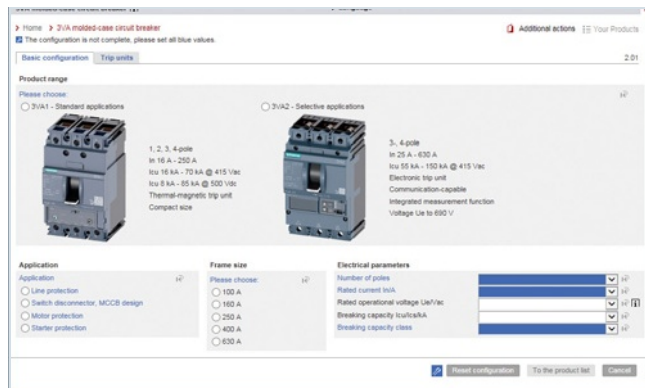
Industry Online
Support App
WINDOWS



Appendix

Further documentation

Product configurator



Finding the right product faster

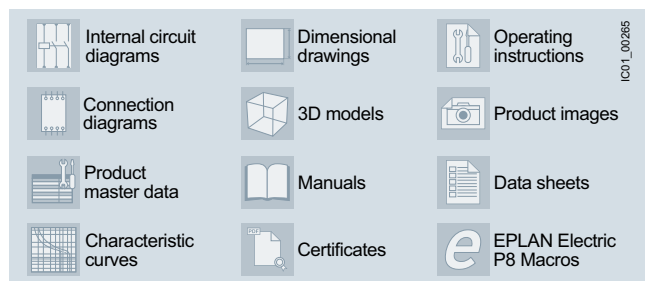
- Complete selection of products and systems based on technical characteristics or application requirements
- Simple, intuitive operation
- Option to save the configuration and order lists in a file format of your choice (txt, pdf, xls, csv)
- Direct transfer of the order list into the shopping cart 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

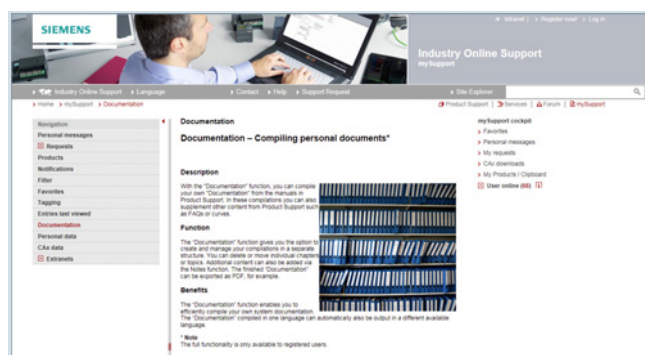
Time savings of up to 80% with universal product data for your CAE and CAD systems

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

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.

Appendix

Standards and approvals

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

The screenshot shows the Siemens Industry Online Support website. The main content area displays a list of 3964 entries filtered by "Electrical Distribution" and "Certificate". The list includes details such as certificate type, product, approval office, and country. A sidebar on the right shows the "mySupport Cockpit" with links to favorites, personal messages, and other resources.

5

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

The screenshot shows the Siemens Industry Online Support website with a different filter applied. The list now shows 323 entries filtered by "Electrical Distribution" and "VDE". The list includes details such as certificate type, product, approval office, and country. A sidebar on the right shows the "mySupport Cockpit" with links to favorites, personal messages, and other resources.

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

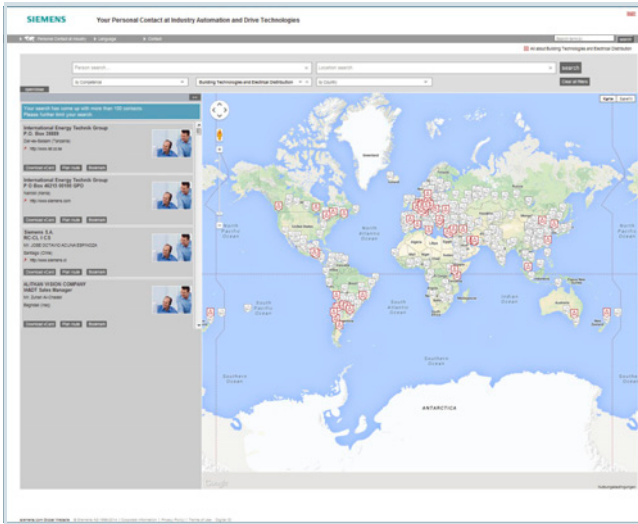
If you have any questions concerning UL/CSA approvals, please contact Technical Support:

www.siemens.com/lowvoltage/contact

Appendix

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

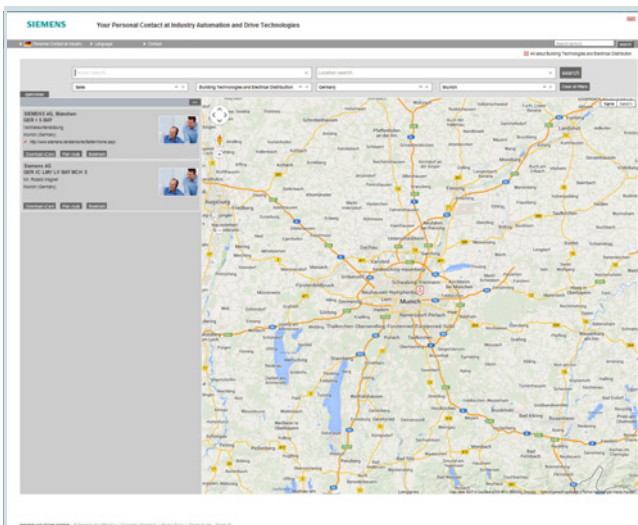
www.siemens.com/lowvoltage/contact

You start by selecting a

- Required competence
- Product or sector
- Country
- City

or by performing a

- search for a specific location or
- individual.



Unrivalled 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/online-support

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
www.siemens.com/lowvoltage/support-request
 You can find your local contacts at
www.siemens.com/lowvoltage/contact

Spare Parts



Plants and systems in all industries worldwide are expected to meet ever higher levels of availability. We can help you rule out unexpected stoppages: with a global network and optimum logistics chains.

You will find further information at
www.siemens.de/lowvoltage/retouren-center

Training



Extend your lead – with practice-related know-how straight from the manufacturer.

You will find further information at
www.siemens.com/lowvoltage/training

Specification texts

You can obtain qualified, free support to help you produce specifications for technically equipping non-residential and industrial buildings at
www.siemens.com/specifications

Appendix

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/support-request

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.

Appendix

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

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

Appendix

Notes

Further information can be obtained from our branch offices listed at www.siemens.com/lowvoltage/contact

Interactive Catalog on DVD		<i>Catalog</i>
Products for Automation and Drives	CA 01	
Building Control		
GAMMA Building Control	ET G1	
Drive Systems		
SINAMICS G130 Drive Converter Chassis Units	D 11	
SINAMICS G150 Drive Converter Cabinet Units		
SINAMICS GM150, SINAMICS SM150 Medium-Voltage Converters	D 12	
SINAMICS PERFECT HARMONY GH180 Medium-Voltage Air-Cooled Drives (Germany Edition)	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	D 21.3	
SINAMICS S150 Converter Cabinet Units		
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	
<i>Digital: SINAMICS G120P and SINAMICS G120P Cabinet pump, fan, compressor converters</i>	D 35	
LOHER VARIO High Voltage Motors	D 83.2	
Flameproof, Type Series 1PS4, 1PS5, 1MV4 and 1MV5 Frame Size 355 to 1000, Power Range 80 to 7100 kW		
Three-Phase Induction Motors	D 84.1	
SIMOTICS HV, SIMOTICS TN		
High Voltage Three-phase Induction Motors	D 84.9	
SIMOTICS HV Series A-compact PLUS		
<i>Digital: Modular Industrial Generators SIGENTICS M</i>	D 85.1	
Three-Phase Induction Motors SIMOTICS HV, Series H-compact	D 86.1	
Synchronous Motors with Permanent-Magnet Technology, HT-direct	D 86.2	
DC Motors	DA 12	
SIMOREG DC MASTER 6RA70 Digital Chassis Converters	DA 21.1	
SIMOREG K 6RA22 Analog Chassis Converters	DA 21.2	
<i>Digital: SIMOREG DC MASTER 6RM70 Digital Converter Cabinet Units</i>	DA 22	
SIMOVERT PM Modular Converter Systems	DA 45	
MICROMASTER 420/430/440 Inverters	DA 51.2	
MICROMASTER 411/COMBIMASTER 411	DA 51.3	
<u>Low-Voltage Three-Phase-Motors</u>		
SIMOTICS 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	
<i>Digital: MOTOX Geared Motors</i>	D 87.1	
SIMOGEAR Geared Motors	MD 50.1	
SIMOGEAR Electric-monorail geared motors	MD 50.8	
Light-load and heavy-load applications		
SIMOGEAR Gearboxes with adapter	MD 50.11	
<u>Mechanical Driving Machines</u>		
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		<i>Catalog</i>
<i>Digital: Field Instruments for Process Automation</i>	FI 01	
<i>Digital: Display Recorders SIREC D</i>	MP 20	
<i>Digital: SIPART Controllers and Software</i>	MP 31	
Products for Weighing Technology	WT 10	
Process Analytical Instruments	AP 01	
<i>Digital: Process Analytics, Components for Continuous Emission Monitoring</i>	AP 11	
Low-Voltage Power Distribution and Electrical Installation Technology		
SENTRON · SIVACON · ALPHA	LV 10	
Protection, Switching, Measuring and Monitoring Devices, Switchboards and Distribution Systems		
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	
<i>Digital: SIVACON System Cubicles, System Lighting and System Air-Conditioning</i>	LV 50	
<i>Digital: ALPHA Distribution Systems</i>	LV 51	
ALPHA FIX Terminal Blocks	LV 52	
SIVACON S4 Power Distribution Boards	LV 56	
SIVACON 8PS Busbar Trunking Systems	LV 70	
<i>Digital: DELTA Switches and Socket Outlets</i>	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	
<i>Digital: Drive and Control Components for Cranes</i>	CR 1	
Power Supply		
SITOP Power supply	KT 10.1	
Safety Integrated		
Safety Technology for Factory Automation	SI 10	
SIMATIC HMI / PC-based Automation		
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	
SIMATIC PCS 7 Process Control System	ST PCS 7	
System components		
SIMATIC PCS 7 Process Control System	ST PCS 7 T	
Technology components		
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	

*Digital: These catalogs are only available as a PDF.***Siemens Industry Online Support**Digital versions of the catalogs are available on the Internet at:
www.siemens.com/lowvoltage/catalogs

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siemens.com/lowvoltage

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All product designations may be trademarks or product names of Siemens AG or supplier companies whose use by third parties for their own purposes could violate the rights of the owners.

Token fee: 3.00 €

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.

To stay informed about product updates, subscribe to the Siemens Industrial Security RSS Feed under
<http://www.siemens.com/industrialsecurity>.