# IECEx Certificate of Conformity

## INTERNATIONAL ELECTROTECHNICAL COMMISSION
## IEC Certification System for Explosive Atmospheres

for rules and details of the IECEx Scheme visit www.iecex.com

| | | | |
|---|---|---|---|
| Certificate No.: | **IECEx DEK 18.0018X** | Page 1 of 4 | Certificate history: |
| Status: | **Current** | Issue No: 3 | Issue 2 (2020-06-30)<br>Issue 1 (2019-12-04)<br>Issue 0 (2019-07-15) |
| Date of Issue: | 2020-08-07 | | |

Applicant: **SIEMENS AG**
Östliche Rheinbrückenstraße 50
76187 Karlsruhe
**Germany**

Equipment: **Programmable Logic Controller Systems SIMATIC NET Scalance-W-M-WLAN Type RAP.-W ..., LAP.-W ..., 6GK. ..., ELN-..., MSN-..., EAPN ..., WS-..., RAPAC-..., W7..**

Optional accessory:

Type of Protection: **Ex ec**

Marking: Ex ec IIC T4 Gc

Approved for issue on behalf of the IECEx Certification Body: **R. Schuller**

Position: **Certification Manager**

Signature:
(for printed version)

Date: 2020-08-07

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2. This certificate is not transferable and remains the property of the issuing body.
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Certificate issued by:

**DEKRA Certification B.V.**
**Meander 1051**
**6825 MJ Arnhem**
**Netherlands**

# IECEx Certificate of Conformity



Certificate No.: **IECEx DEK 18.0018X**

Date of issue: 2020-08-07

Issue No: 3

Manufacturer: **SIEMENS AG**
Östliche Rheinbrückenstraße 50
76187 Karlsruhe
**Germany**

Additional manufacturing locations:

This certificate is issued as verification that a sample(s), representative of production, was assessed and tested and found to comply with the IEC Standard list below and that the manufacturer's quality system, relating to the Ex products covered by this certificate, was assessed and found to comply with the IECEx Quality system requirements.This certificate is granted subject to the conditions as set out in IECEx Scheme Rules, IECEx 02 and Operational Documents as amended

**STANDARDS** :
The equipment and any acceptable variations to it specified in the schedule of this certificate and the identified documents, was found to comply with the following standards

**IEC 60079-0:2017** Explosive atmospheres - Part 0: Equipment - General requirements
Edition:7.0

**IEC 60079-7:2017** Explosive atmospheres - Part 7: Equipment protection by increased safety "e"
Edition:5.1

This Certificate **does not** indicate compliance with safety and performance requirements other than those expressly included in the Standards listed above.

**TEST & ASSESSMENT REPORTS:**
A sample(s) of the equipment listed has successfully met the examination and test requirements as recorded in:

Test Report:

NL/DEK/ExTR19.0048/03

Quality Assessment Report:

NL/DEK/QAR12.0079/04

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**EQUIPMENT:**
Equipment and systems covered by this Certificate are as follows:

SIMATIC NET Scalance-W-M-WLAN Type RAP.-W ..., LAP.-W ..., 6GK. ..., ELN-..., MSN-..., EAPN ..., WS-..., RAPAC-..., W7..

Modules which contain optical radiation sources complies with Class 1 limits in accordance with IEC 60825-1 and therefore allowed to lead either into or through hazardous areas requiring equipment of EPL Gb, Gc, Db or Dc.

The type code, the ambient temperature range and the temperature class of the modules shall be taken from Table 1, see Annex.

**Electrical data**

The electrical data of the supply and the input and output circuits shall be taken from Table 1, see Annex.

**SPECIFIC CONDITIONS OF USE: YES as shown below:**
The equipment shall only be used in an area of not more than pollution degree 2, as defined in IEC 60664-1.

The equipment shall be installed in a suitable enclosure that provides a degree of protection not less than IP54 in accordance with IEC 60079-7.

Provisions shall be made to prevent the rated voltage from being exceeded by transient disturbances of more than 119 V.

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**DETAILS OF CERTIFICATE CHANGES (for issues 1 and above)**
Some modules deleted/added

**Annex:**

224814300 - Annex 1.pdf

**Annex 1 to** **Certificate of Conformity IECEx DEK 18.0018X/ Testreport NL/DEK/ExTR19.0048/03**

## Table 1

| Description | Type/MLFB No. | Temp. code | Ambient Range | Technical Data | Supply Volt. | Fiber outputs Laser Class 1 |
|---|---|---|---|---|---|---|
| **Scalance Modules** | | | | | | |
| Scalance W7xx-1 | RAP-W1-RJ-E1 | T4 | -20... +60°C | 24V / max.300mA<br>48V / max.150mA | 24V<br>48V | |
| Scalance W7xx-1 | LAP-W1-RJ-E1 | T4 | -20... +60°C | 24V / max.250mA<br>48V / max.130mA | 24V<br>48V | |
| Scalance W7x8-1 | RAPN-W1-RJ-E3 | T4 | -20 ... +60°C | 24V / max. 650 mA<br>48V / max. 320 mA | 24 V<br>48V | |
| Scalance W7x8-2 | RAPN-W2-RJ-E3 | T4 | -20 ... +60°C | 24V / max. 650 mA<br>48V / max. 320 mA | 24V<br>48V | |
| Scalance W7x8-1 | RAPN-W1-M12-E3 | T4 | -20 ... +60°C | 24V / max. 650 mA<br>48V / max. 320 mA | 24 V<br>48V | |
| Scalance W7x8-2 | RAPN-W2-M12-E3 | T4 | -20 ... +60°C | 24V / max. 650 mA<br>48V / max. 320 mA | 24V<br>48V | |
| Scalance W7xx-1 RJ | ELN-W1-RJ-E1 | T4 | 0 ... +60°C | 24V / max. 150 mA | 24 V | |
| Scalance W7x4-1 | MSN-W1-RJ-E2 | T4 | -30 ... +70°C | 24V / max. 250 mA<br>48V / max. 125 mA | 24 V<br>48V | |
| Scalance W774-1 | MSN-W1-M12-E2 | T4 | -30 ... +70°C | 24V / max. 250 mA<br>48V / max. 125 mA | 24 V<br>48V | |
| Scalance W786-1 | EAPN-W1-RJ-E3 | T4 | -40 ... +60°C | 24V / max. 650 mA<br>48V / max. 320 mA<br>12-24V / max. 1400 mA<br>100-240V / max. 264 mA | 24 V<br>48V<br>24V<br>240V | |
| Scalance W786-2 | EAPN-W2-RJ-E3 | T4 | -40 ... +60°C | 24V / max. 650 mA<br>48V / max. 320 mA<br>12-24V / max. 1400 mA<br>100-240V / max. 264 mA | 24 V<br>48V<br>24V<br>240V | |
| Scalance W786-2 | EAPN-W2-RJ-I3 | T4 | -40 ... +60°C | 24V / max. 650 mA<br>48V / max. 320 mA<br>12-24V / max. 1400 mA<br>100-240V / max. 264 mA | 24 V<br>48V<br>24V<br>240V | |
| Scalance W786-2 | EAPN-W2-SFP-E3 | T4 | -40 ... +60°C | 24V / max. 650 mA<br>12-24V / max. 1400 mA<br>100-240V / max. 264 mA | 24 V<br>24V<br>240V | |
| Scalance W1748-1 M12 | RAPAC-W1-M12-E4 | T4 | -20 ... +70°C | 24V / max.700mA<br>48V / max.385mA | 24V<br>48V | |
| Scalance W1788-1 M12 | RAPAC-W1-M12-E4 | T4 | -20 ... +70°C | 24V / max.700mA<br>48V / max.385mA | 24V<br>48V | |
| Scalance W1788-2 M12 | RAPAC-W2-M12-E4 | T4 | -20 ... +70°C | 24V / max.700mA<br>48V / max.385mA | 24V<br>48V | |
| Scalance W1788-2 M12 EEC | RAPAC-W2-M12-E4 | T4 | -40 ... +75°C | 24V / max.700mA<br>48V / max.385mA | 24V<br>48V | |
| Scalance W1788-2IA M12 | RAPAC-W2-M12-I4 | T4 | -20 ... +70°C | 24V / max.700mA<br>48V / max.385mA | 24V<br>48V | |
| MSN65-W1-M12-E2 | W738-1 M12 | T4 | -20 ... +60°C | 24V / max.250mA<br>48V / max.125mA | 24V<br>48V | |
| MSN65-W1-M12-E2 | W778-1 M12 | T4 | -20 ... +60°C | 24V / max.250mA<br>48V / max.125mA | 24V<br>48V | |
| MSN65-W1-M12-E2 | W778-1 M12 EEC | T4 | -30 ... +75°C | 24V / max.250mA<br>48V / max.125mA | 24V<br>48V | |
| Scalance M874-2 | 6GK5874-2AA00-2AA2 | T4 | -20 ... +60°C | 12-24V / max. 670mA | 24V | |
| Scalance M874-3 | 6GK5874-3AA00-2AA2 | T4 | -20 ... +60°C | 12-24V / max. 670mA | 24V | |
| Scalance M876-3 | 6GK5876-3AA02-2BA2 | T4 | -20 ... +60°C | 12-24V / max. 670mA | 24V | |
| Scalance M876-3 ROK | 6GK5876-3AA02-2EA2 | T4 | -20 ... +60°C | 12-24V / max. 670mA | 24V | |
| Scalance M876-4 | 6GK5876-4AA00-2BA2 | T4 | -20 ... +70°C | 12-24V / max. 670mA | 24V | |

**Annex 1 to Certificate of Conformity IECEx DEK 18.0018X/ Testreport NL/DEK/ExTR19.0048/03**

| | | | | | | |
|---|---|---|---|---|---|---|
| Scalance M876-4 | 6GK5876-4AA00-2DA2 | T4 | -20 ... +70°C | 12-24V / max. 670mA | 24V | |
| RUGGEDCOM RM1224 | 6GK6108-4AM00-2BA2 | T4 | -20 ... +70°C | 12-24V / max. 670mA | 24V | |
| RUGGEDCOM RM1224 | 6GK6108-4AM00-2DA2 | T4 | -20 ... +70°C | 12-24V / max. 670mA | 24V | |
| **SIMATIC LOGO!** | | | | | | |
| LOGO! CMR2020 | 6GK7142-7BX00-0AX0 | T4 | -20 ... +70°C | 12-24V / max. 850mA | 24V | |
| LOGO! CMR2040 | 6GK7142-7EX00-0AX0 | T4 | -20 ... +70°C | 12-24V / max. 850mA | 24V | |
| **S7-1200 Modules** | | | | | | |
| CP1242-7 GPRS V2 | 6GK7242-7KX31-0XE0 | T4 | -20... +70°C | 5V / max.150mA<br>24V / max.75mA | 5V<br>24V | |
| CP1243-7 LTE-EU | 6GK7243-7KX30-0XE0 | T4 | -20... +70°C | 5V / max.150mA<br>24V / max.120mA | 5V<br>24V | |
| CP1243-7 LTE-US | 6GK7243-7SX30-0XE0 | T4 | -20... +70°C | 5V / max.150mA<br>24V / max.120mA | 5V<br>24V | |

The Suffix –a denotes any letter or number referring to non-electrical properties as product associates, language, delivery packing, documentation etc.

Fiber Outputs: Laser Class 1 approved according IEC 60825-1. The optical cables may lead either into or through hazardous areas requiring equipment of EPL Gb, Gc, Db or Dc.

For models with Fiber outputs Laser Class 1, Optionally, an Optical Transceivers type 6GK599. …, certified per IECEx DEK 18.0050U can be installed.