



EU Type Examination Certificate CML 20ATEX3118U Issue 2

1 Components intended for use in Potentially Explosive Atmospheres Directive 2014/34/EU

Component SR Ex e Enclosures
 Manufacturer Pepperl+Fuchs SE

4 Address Lilienthalstrasse 200

68307 Mannheim Germany

German

- 5 The component is specified in the description of this certificate and the documents to which it refers.
- 6 CML B.V., Chamber of Commerce No 67386717, Koopvaardijweg 32, 4906CV Oosterhout, The Netherlands, Notified Body Number 2776, in accordance with Article 17 of Directive 2014/34/EU of the European Parliament and of the Council, dated 26 February 2014, certifies that this component has been found to comply with the Essential Health and Safety Requirements relating to the design and construction of equipment intended for use in potentially explosive atmospheres given in Annex II to the Directive.

The examination and test results are recorded in the confidential reports listed in Section 12.

- 7 The 'U' suffix after the certificate number indicates that the component is subject to conditions of safe use (affecting correct installation or safe use). These are specified in Section 14.
- This EU Type Examination certificate relates only to the design and construction of the specified equipment or component. Further requirements of Directive 2014/34/EU Article 13 apply to the manufacture of the equipment or component and are separately certified.
- 9 Compliance with the Essential Health and Safety Requirements, with the exception of those listed in the confidential report, has been demonstrated through compliance with the following documents:

EN IEC 60079-0:2018 EN IE

EN IEC 60079-7:2015+A1:2018

IEC 60079-31:2022

10 The equipment shall be marked with the following:



Ex eb IIC Gb

Ex tb IIIC Db

Ts= -60°C to +120°C



L A Brisk Assistant Certification Manager





11 Description

The SR Ex e enclosures are square or rectangular fabricated steel increased safety enclosures with covers secured by either M6 hexagon head screws or quarter turn locks. The cover fasteners along one edge may be replaced by hinges, and quarter turn locks are always used in conjunction with hinges. Optionally the cover may be in two pieces for a double door arrangement, or flat without an edge return for special mounting applications. Sealing to IP66 between the body and cover is achieved using a silicone gasket.

Cable entries to the enclosures may be made with suitably certified cable entry devices, direct to the enclosure in the case of the smaller SRS types, or via gland plates fitted to the sidewalls in the case of the larger SRM/L/X types.

All SR types may be fitted with an internal/external earth stud to accommodate earthing or equipotential bonding connections.

The SR Ex e enclosures may be joined using a connecting flange, or to an Ex d enclosure that provides a suitable sealing surface for the connecting flange.

The service temperature range of the SR Ex e enclosures is -60°C to +120°C Where the EMI-01-255SAB adhesive and EMI-401-255FR gasket, or RAKU SIL 37-1210-1 Lichtgrau with adhesive RTV108 are used.

Variation 1

This issue introduced the following changes:

- i. To assess the SR Ex e enclosure in a larger range of sizes
- ii. To assess the alternative flange sealing arrangements
- iii. To update to the latest version of the standard: IEC 60079-31:2022 Ed 3.0
- iv. Update to schedule drawings
- v. To assess double door and flat door cover options

Variation 2

This issue introduced the following changes:

- i. Introduction of alternate window sealing arrangements
- ii. Assessment of alternate flange sealing arrangement
- iii. Assessment of alternate gasket material
- iv. Update to label drawing

12 Certificate history and evaluation reports

| Issue | Date | Associated report | Notes |
|-------|-------------|-------------------|----------------------------|
| 0 | 16 Oct 2020 | R13108A/00 | Issue of prime certificate |
| 1 | 11 Aug 2023 | R15823A/00 | Issue of variation 1 |
| 2 | 28 Feb 2024 | R17005A/00 | Issue of variation 2 |

Note: Drawings that describe the equipment or component are listed in the Annex.





13 Conditions of Manufacture

None

14 Schedule of Limitations

The following conditions relate to safe installation and/or use of the equipment.

i. The SR range of enclosures have the following service temperature ranges. When assessed as part of equipment, these temperatures shall not be exceeded:

Where the BR099 gasket is used, Ts = -40°C to +120°C

Where the BR962 gasket is used, $Ts = -40^{\circ}C$ to $+120^{\circ}C$

Where the EMI-01-255SAB is used, Ts = -60°C to +120°C

Where the EMI-401-255FR is used, Ts = -60°C to +120°C

Where the Fermasil gasket is used, Ts = -60°C to +120°C

- ii. The torque applied to the flange fixing fasteners shall be at least 2.0 Nm.
- iii. Cable entry point temperature shall not exceed 120 °C
- Where no intermediate structural framework is used and only one enclosure is mounted, the flange may also serve as the mounting for another enclosure. In this case the flange shall be appropriately dimensioned such that the weight of the hanging enclosure does not affect the sealing properties of the flange.

Certificate Annex

Certificate Number CML 20ATEX3118U
Equipment SR Ex e Enclosures
Manufacturer Pepperl+Fuchs SE



The following documents describe the equipment or component defined in this certificate:

Issue 0

| Drawing No. | Sheets | Rev. | Approved date | Title |
|--------------|----------|------|---------------|---|
| 16-1513CM-04 | 1 of 11 | 0 | 16 Oct 2020 | SRM/L/X enclosure general assembly and sizes |
| 16-1513CM-04 | 2 of 11 | 0 | 16 Oct 2020 | SRS enclosure general assembly and sizes |
| 16-1513CM-04 | 3 of 11 | 0 | 16 Oct 2020 | SRS / SRM/L/X cover sealing arrangement |
| 16-1513CM-04 | 4 of 11 | 0 | 16 Oct 2020 | SRS / SRM/L/X cable entry and gland plate |
| 16-1513CM-04 | 5 of 11 | 0 | 16 Oct 2020 | SRS / SRM/L/X internal/external earth arrangement |
| 16-1513CM-04 | 6 of 11 | 0 | 16 Oct 2020 | SRM/L/X hinge arrangement |
| 16-1513CM-04 | 7 of 11 | 0 | 16 Oct 2020 | SRM/L/X enclosure fitted with double bit lock |
| 16-1513CM-04 | 8 of 11 | 0 | 16 Oct 2020 | SRM/L/X enclosure flanged to Ex d/e enclosure |
| 16-1513CM-04 | 9 of 11 | 0 | 16 Oct 2020 | Type A connecting Flange |
| 16-1513CM-04 | 10 of 11 | 0 | 16 Oct 2020 | Type B connecting Flange |
| 16-1513CM-04 | 11 of 11 | 0 | 16 Oct 2020 | Label/paint exceeding ESD limitations |
| 16-1513CM-10 | 1 of 1 | 0 | 16 Oct 2020 | SR* enclosure certification label |

Issue 1

| Drawing No. | Sheets | Rev | Approved date | Title |
|--------------|----------|-----|---------------|---|
| 16-1513CM-04 | 1 of 18 | Α | 08 Aug 2023 | SRM/L/X enclosure general assembly & sizes |
| 16-1513CM-04 | 2 of 18 | Α | 08 Aug 2023 | SRS enclosure general assembly & sizes |
| 16-1513CM-04 | 3 of 18 | Α | 08 Aug 2023 | SR cover sealing arrangement |
| 16-1513CM-04 | 4 of 18 | Α | 08 Aug 2023 | SR cable entries & gland plate |
| 16-1513CM-04 | 5 of 18 | Α | 08 Aug 2023 | SR internal / external earth arrangement |
| 16-1513CM-04 | 6 of 18 | Α | 08 Aug 2023 | SRM/L/X hinge arrangement |
| 16-1513CM-04 | 7 of 18 | Α | 08 Aug 2023 | SRM/L/X enclosure fitted with double bit lock |
| 16-1513CM-04 | 8 of 18 | Α | 08 Aug 2023 | SR enclosure flanged to Ex d/e enclosure |
| 16-1513CM-04 | 9 of 18 | Α | 08 Aug 2023 | Type A connecting flange |
| 16-1513CM-04 | 10 of 18 | Α | 08 Aug 2023 | Type B connecting flange |
| 16-1513CM-04 | 11 of 18 | Α | 08 Aug 2023 | Label/paint exceeding ESD limitations |
| 16-1513CM-04 | 12 of 18 | А | 08 Aug 2023 | Flexible Flanges Exd-Exe and Exe for SR certificate |
| 16-1513CM-04 | 13 of 18 | А | 08 Aug 2023 | Flexible Flanges Exd-Exe and Exe for SR certificate |

Certificate Annex

Certificate Number CML 20ATEX3118U
Equipment SR Ex e Enclosures
Manufacturer Pepperl+Fuchs SE



| Drawing No. | Sheets | Rev | Approved date | Title |
|--------------|----------|-----|---------------|---|
| 16-1513CM-04 | 14 of 18 | Α | 08 Aug 2023 | Flexible Flanges Exd-Exe and Exe for SR certificate |
| 16-1513CM-04 | 15 of 18 | Α | 08 Aug 2023 | SRS/M/L/X screen & earth terminals & bars |
| 16-1513CM-04 | 16 of 18 | Α | 08 Aug 2023 | SR enclosure with alternative flat cover |
| 16-1513CM-04 | 17 of 18 | Α | 08 Aug 2023 | SRM/L/X enclosure with double cover/doors |
| 16-1513CM-04 | 18 of 18 | Α | 08 Aug 2023 | SR enclosure mounted accessory details |

Issue 2

| Drawing No. | Sheets | Rev | Approved date | Title |
|---------------|----------|-----|---------------|---|
| 16-1513CM-04 | 1 of 19 | В | 28 Feb 2024 | SRM/L/X enclosure general assembly & sizes |
| 16-1513CM-04 | 2 of 19 | В | 28 Feb 2024 | SRS enclosure general assembly & sizes |
| 16-1513CM-04 | 3 of 19 | В | 28 Feb 2024 | SR cover sealing arrangement |
| 16-1513CM-04 | 4 of 19 | В | 28 Feb 2024 | SR cable entries & gland plate |
| 16-1513CM-04 | 5 of 19 | В | 28 Feb 2024 | SR internal / external earth arrangement |
| 16-1513CM-04 | 6 of 19 | В | 28 Feb 2024 | SRM/L/X hinge arrangement |
| 16-1513CM-04 | 7 of 19 | В | 28 Feb 2024 | SRM/L/X enclosure fitted with double bit lock |
| 16-1513CM-04 | 8 of 19 | В | 28 Feb 2024 | SR enclosure flanged to Ex d/e enclosure |
| 16-1513CM-04 | 9 of 19 | В | 28 Feb 2024 | Type A connecting flange |
| 16-1513CM-04 | 10 of 19 | В | 28 Feb 2024 | Type B connecting flange |
| 16-1513CM-04 | 11 of 19 | В | 28 Feb 2024 | Label/paint exceeding ESD limitations |
| 16-1513CM-04 | 12 of 19 | В | 28 Feb 2024 | Flexible Flanges Exd-Exe and Exe for SR certificate |
| 16-1513CM-04 | 13 of 19 | В | 28 Feb 2024 | Flexible Flanges Exd-Exe and Exe for SR certificate |
| 16-1513CM-04 | 14 of 19 | В | 28 Feb 2024 | Flexible Flanges Exd-Exe and Exe for SR certificate |
| 16-1513CM-04 | 15 of 19 | В | 28 Feb 2024 | SRS/M/L/X screen & earth terminals & bars |
| 16-1513CM-04 | 16 of 19 | В | 28 Feb 2024 | SR enclosure with alternative flat cover |
| 16-1513CM-04 | 17 of 19 | В | 28 Feb 2024 | SRM/L/X enclosure with double cover/doors |
| 16-1513CM-04 | 18 of 19 | В | 28 Feb 2024 | SR enclosure mounted accessory details |
| 161513CM-04B | 19 of 19 | В | 28 Feb 2024 | SRS/M/L/X Window Fitment Details |
| 16-1513CM-10B | 1 of 1 | В | 28 Feb 2024 | SR* enclosure certification label |