

XUSL4E14F016N

XUSL type 4 - Finger protection - Std sensing range - Hp = 160 mm, R=14mm



Main

| | |
|----------------------------------|--|
| Range of product | Preventa Safety detection |
| Product or component type | Safety light curtain type 4 |
| Device short name | XUSL4E |
| Output type | 2 safety outputs OSSD solid-state PNP (integrated arc suppression) |
| Product specific application | For finger protection |
| [R] Resolution | 14 mm |
| [Sn] nominal sensing distance | 1...6 m by cabling 0...3 m by cabling |
| [Hp] Height protected | 160 mm |
| Number of beams | 15 |
| Type of start / restart | Automatic Manual |
| External Device Monitoring (EDM) | Selected by wiring |

Complementary

| | |
|--------------------------------|--|
| Detection system | Transmitter-receiver system |
| Response time | 4 ms |
| Kit composition | Adjustable mounting bracket(s) 1 receiver(s) 1 transmitter(s) 1 user guide with certificate of conformity on CD-ROM |
| [EAA] effective aperture angle | +/- 2.5 ° at 3 m |
| Emission | IR LED ($\lambda = 950 \text{ nm}$) |
| [Us] rated supply voltage | 24 V DC (+/- 20 %) |
| Supply | Power supply must meet requirements of IEC 61496-1 Power supply must meet requirements of IEC 60204-1 |
| [Ie] rated operational current | 2 A |
| Current consumption | 42 mA no-load (transmitter) 83 mA no-load (receiver) 42 mA (transmitter) 900 mA with maximum load (receiver) |
| Output current limits | 0.4 A for safety outputs OSSD |
| Output voltage | 24 V |
| Output circuit type | DC |
| Voltage drop | $\leq 0.5 \text{ V}$ |
| Local signalling | 1 multi-colour LED (transmitter) 2 dual colour LEDs (receiver) |
| Electrical connection | 1 male connector M12 5 pins (transmitter) 1 male connector M12 8 pins (receiver) |
| Function available | Test Muting through external safety module XPSLCMUT1160 LED display of operating modes and faults |
| Marking | CE |
| Material | Casing : aluminium Front panel : polycarbonate End caps : polypropylene |
| Housing colour | RAL 3000 : red |

The information provided in this documentation contains general descriptions and/or technical characteristics of the performance of the products contained herein. This documentation is not intended as a substitute for and is not to be used for determining suitability or reliability of these products for specific user applications. It is the duty of any such user or integrator to perform the appropriate and complete risk analysis, evaluation and testing of the products with respect to the relevant specific application or use thereof. Neither Schneider Electric Industries SAS nor any of its affiliates or subsidiaries shall be responsible or liable for misuse of the information contained herein.

| | |
|----------------|--------------------|
| Fixing mode | By fixing brackets |
| Product weight | 0.4 kg |
| Offer type | Standard distance |

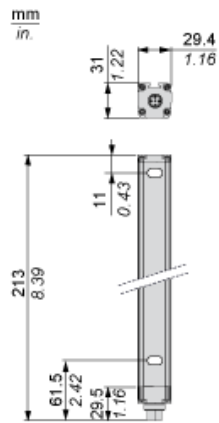
Environment

| | |
|---------------------------------------|--|
| Directives | 89/336/EEC - electromagnetic compatibility 2002/96/EC - WEEE directive 2002/95/EC - RoHS directive 98/37/EEC - machinery 89/655/EEC - work equipment |
| Product certifications | CE CULus TÜV |
| Safety level (correctly wired) | Type 4 conforming to IEC 61496-1 SIL 3 conforming to IEC 61508 SILCL 3 conforming to IEC 62061 Category 4 conforming to EN/ISO 13849-1 PL = e conforming to EN/ISO 13849-1 |
| Optical characteristic | Resistance to light disturbance conforming to EN/IEC 61496-2 |
| Mission time | 20 yr |
| Safety reliability data | PFHd = 1.03E-8 1/h conforming to IEC 61508 |
| Ambient air temperature for operation | -20...55 °C 14...131 °F |
| Ambient air temperature for storage | -35...70 °C -13...158 °F |
| Relative humidity | <= 95 % without condensation |
| IP degree of protection | IP65 IP67 |
| Shock resistance | 10 gn for 16 ms conforming to IEC 61496-1 |
| Vibration resistance | 0.35 +/- 0.05 mm (f = 10...55 Hz) conforming to IEC 61496-1 |

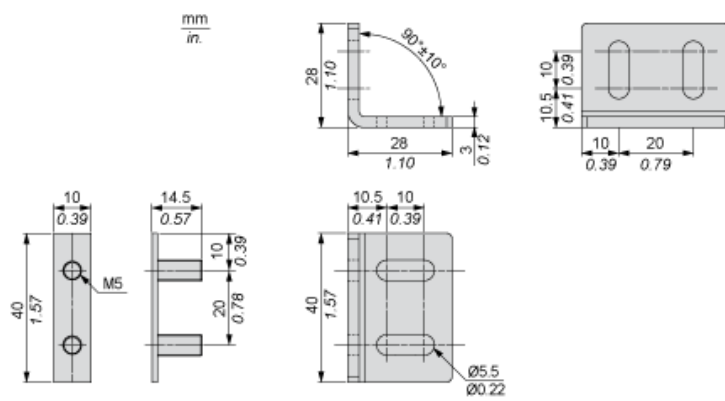
Offer Sustainability

| | |
|----------------------------------|---|
| Sustainable offer status | Green Premium product |
| RoHS (date code: YYWW) | Compliant - since 1425 - Schneider Electric declaration of conformity |
| REACH | Reference not containing SVHC above the threshold |
| Product environmental profile | Available Download Product Environmental |
| Product end of life instructions | Available Download End Of Life Manual |

Dimensions



Brackets Dimensions



Mounting and Clearance



- (1) Insert
- (2) Bracket
- (3) Washer
- (4) Spring washer
- (5) Nut

Wiring Diagrams

Transmitter Connections



- (1) +24 Vdc
- (2) Configuration_0
- (3) 0 Vdc
- (4) Configuration_1
- (5) FE

Transmitter configurations and operating modes

| | High range option | Low range option | Transmitter in Test state | Forbidden wiring |
|-------------------------|-------------------|------------------|---------------------------|------------------|
| Pin 4 : Configuration_1 | 24 V | 0 V | 0 V | 24 V |
| Pin 2 : Configuration_0 | 0 V | 24 V | 0 V | 24 V |

Receiver Connections



- (1) OSSD1
- (2) + 24 V
- (3) OSSD2
- (4) Configuration_A
- (5) K1_K2 Feedback/Restart
- (6) Configuration_B
- (7) 0 Vdc
- (8) FE

Receiver Configurations and Operating Modes

Automatic Start/Restart

Without External Device Monitoring (EDM) feedback loop

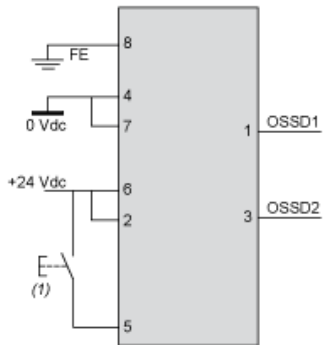


With External Device Monitoring (EDM) feedback loop



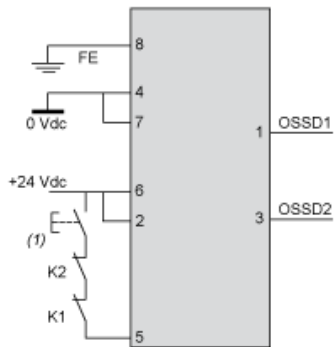
Manual Start/Restart

Without External Device Monitoring (EDM) feedback loop



(1) Restart

With External Device Monitoring (EDM) feedback loop



(1) Restart

Connecting to a Safety Interface

Discover XUSL4E14F016N by

- Characteristics
- Dimensions Drawings
- Mounting and Clearance
- Connections and Schema
- **Download & Documents**

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Download & Documents 1 to 8 of 8

Image of product

Generic image for XUSL standard sensing distance. SILENT 2014-12-11 (Se ▼)

Product environmental

XUSL4E..., XUSL2E... Safety Light Curtain, Product Environmental Profile English 2014-09-08 pdf ▼

End of life manual

XUSL4E..., XUSL2E... Safety Light Curtain, Product End-of-Life Instructions English 2014-09-08 pdf ▼

System user guide

Safety light curtains association with safety interfaces English 2015-06-25 pdf ▼

Catalog

Safety light curtains Preventa XUSL English 2015-05-18 pdf ▼

User guide

XUSL2E..., XUSL4E... Type 2 and Type 4 Safety Light Curtains, User Manual English 2015-06-25 pdf ▼

②

- 1 : Click on Download & Documents
- 2 : Click on System user guide

To have all connection schematics concerning our safety module, select "download and document" and download the file "Safety light curtains association with safety interfaces"