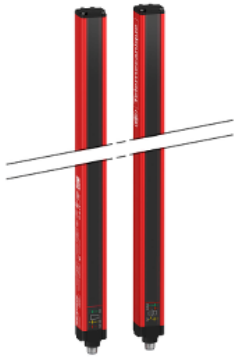


# Product data sheet

Specifications



Safety light curtain type 4,  
Telemecanique Safety light curtains  
XUSL, XUSL Finger protection, Std  
sensing range, Hp = 610 mm, R=14  
mm

XUSL4E14F061N

## Main

|                                  |   |
|----------------------------------|---|
| Range of product                 | Telemecanique Safety light curtains XUSL                |
| Product or component type        | Safety light curtain type 4                             |
| Device short name                | XUSL4E  |
| Output type                      | 2 safety outputs OSSD solid-state PNP (arc suppression) |
| Product specific application     | For finger protection                                   |
| [R] Resolution                   | 14 mm   |
| [Sn] nominal sensing distance    | 1...6 m by cabling<br>0...3 m by cabling                |
| [Hp] Height protected            | 610 mm  |
| Number of beams                  | 60  |
| Type of start / restart          | Manual<br>Automatic                                     |
| External Device Monitoring (EDM) | Selected by wiring                                      |

## Complementary

|                                |  |
|--------------------------------|--|
| Detection system               | Transmitter-receiver system  |
| Response time                  | 9 ms   |
| Kit composition                | adjustable mounting bracket(s)<br>1 receiver(s)<br>1 transmitter(s)<br>1 user guide with certificate of conformity on CD-ROM |
| [EAA] effective aperture angle | 2.5 ° at 3 m   |
| Emission                       | IR LED 950 nm  |
| [Us] rated supply voltage      | 24 V DC +/- 20 %   |
| Supply                         | Power supply conforming to IEC 61496-1<br>Power supply conforming to IEC 60204-1   |
| [Ie] rated operational current | 2 A  |
| Current consumption            | 42 mA no-load transmitter<br>83 mA no-load receiver<br>42 mA transmitter<br>900 mA with maximum load receiver                |
| Output current limits          | 0.4 A for safety outputs OSSD  |
| Output voltage                 | 24 V   |

|                       |   |
|-----------------------|---|
| Output circuit type   | DC  |
| Maximum voltage drop  | <0.5 V  |
| Local signalling      | 1 multi-colour LED transmitter<br>2 dual colour LEDs receiver   |
| Electrical connection | 1 male connector M12 5 pins transmitter<br>1 male connector M12 8 pins receiver                         |
| Function available    | Test<br>Muting through external safety module XPSLCMUT1160<br>LED display of operating modes and faults |
| Marking               | CE  |
| Material              | Aluminium: casing<br>Polycarbonate: front panel<br>Polypropylene: end caps                              |
| Housing colour        | Red RAL 3000  |
| Fixing mode           | By fixing brackets  |
| Net weight            | 1.2 kg  |
| Offer type            | Standard distance   |

## Environment

|                                       |  |
|---------------------------------------|--|
| Directives                            | 89/336/EEC - electromagnetic compatibility<br>89/655/EEC - work equipment<br>98/37/EEC - machinery   |
| Product certifications                | CE<br>TÜV<br>cULus   |
| Safety level (correctly wired)        | Type 4 conforming to IEC 61496-1<br>SIL 3 conforming to IEC 61508<br>SILCL 3 conforming to IEC 62061<br>Category 4 conforming to EN/ISO 13849-1<br>PL = e conforming to EN/ISO 13849-1 |
| Optical characteristic                | Resistance to light disturbance conforming to EN/IEC 61496-2   |
| Mission time                          | 20 year(s)   |
| Safety reliability data               | PFHd = 1.75E-8 1/h conforming to IEC 61508   |
| Ambient air temperature for operation | -10...55 °C<br>-20...55 °C   |
| Ambient air temperature for storage   | -35...70 °C<br>-25...70 °C   |
| Relative humidity                     | 0...95 % without condensation  |
| IP degree of protection               | IP65<br>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   |

## Packing Units

|                              |          |
|------------------------------|----------|
| Unit Type of Package 1       | PCE      |
| Number of Units in Package 1 | 1        |
| Package 1 Height             | 70.0 cm  |
| Package 1 Width              | 20.0 cm  |
| Package 1 Length             | 14.2 cm  |
| Package 1 Weight             | 2.446 kg |
| Unit Type of Package 2       | P06      |
| Number of Units in Package 2 | 6        |
| Package 2 Height             | 75.0 cm  |

|                  |           |
|------------------|-----------|
| Package 2 Width  | 60.0 cm   |
| Package 2 Length | 80.0 cm   |
| Package 2 Weight | 22.834 kg |

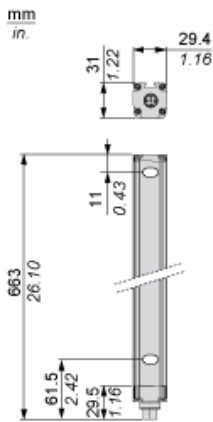
### Offer Sustainability

|                            |   |
|----------------------------|---|
| Sustainable offer status   | Green Premium product   |
| REACH Regulation           | <a href="#">REACH Declaration</a>   |
| REACH free of SVHC         | Yes   |
| EU RoHS Directive          | Pro-active compliance (Product out of EU RoHS legal scope)<br><a href="#">EU RoHS Declaration</a>   |
| Toxic heavy metal free     | Yes   |
| Mercury free               | Yes   |
| RoHS exemption information | <a href="#">Yes</a>   |
| Environmental Disclosure   | <a href="#">Product Environmental Profile</a>   |
| Circularity Profile        | <a href="#">End of Life Information</a>   |
| California proposition 65  | WARNING: This product can expose you to chemicals including: Diisononyl phthalate (DINP), which is known to the State of California to cause cancer, and Di-isodecyl phthalate (DIDP), which is known to the State of California to cause birth defects or other reproductive harm. For more information go to <a href="http://www.P65Warnings.ca.gov">www.P65Warnings.ca.gov</a> |

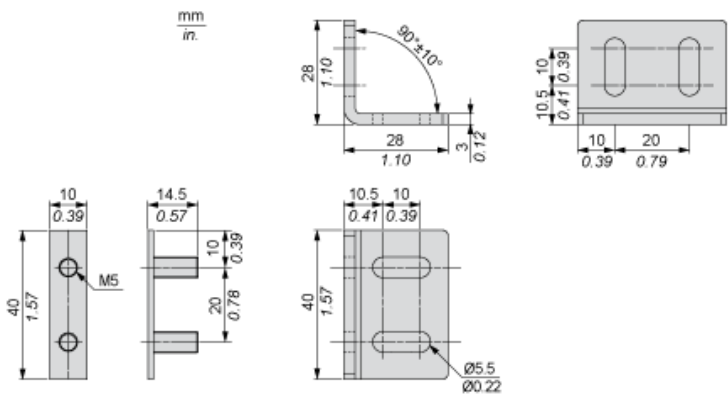
### Contractual warranty

|          |           |
|----------|-----------|
| Warranty | 18 months |
|----------|-----------|

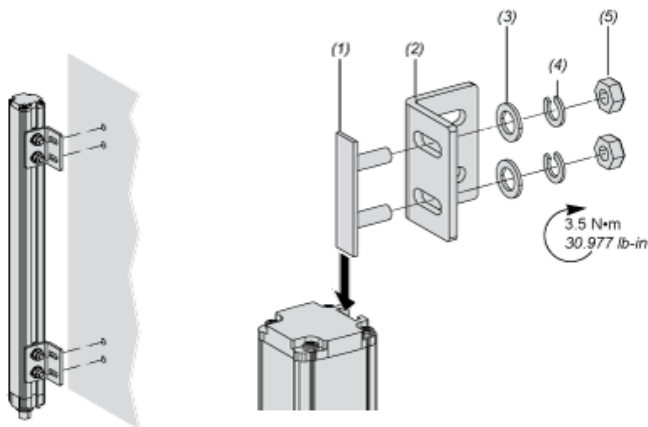
Dimensions



Brackets Dimensions



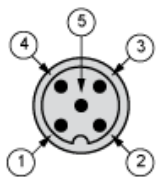
Mounting and Clearance



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

Wiring Diagrams

Transmitter Connections

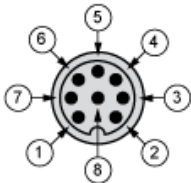


- (1) +24 Vdc
- (2) Configuration\_0
- (3) 0 Vdc
- (4) Configuration\_1
- (5) FE

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

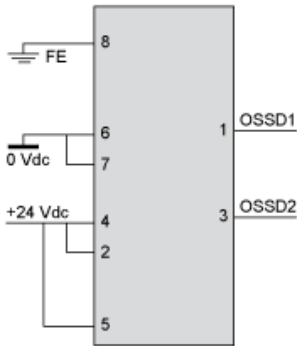


- (1) OSSD1
- (2) + 24 V
- (3) OSSD2
- (4) Configuration\_A
- (5) K1\_K2 Feedback/Restart
- (6) Configuration\_B
- (7) 0 Vdc
- (8) FE

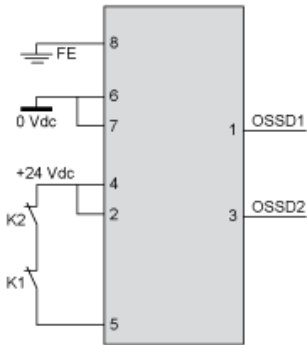
Receiver Configurations and Operating Modes

Automatic Start/Restart

Without External Device Monitoring (EDM) feedback loop

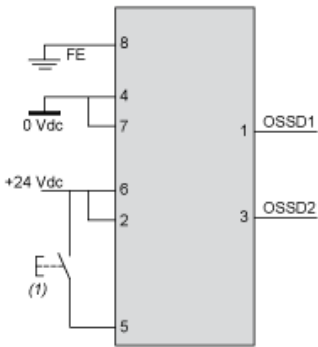


With External Device Monitoring (EDM) feedback loop



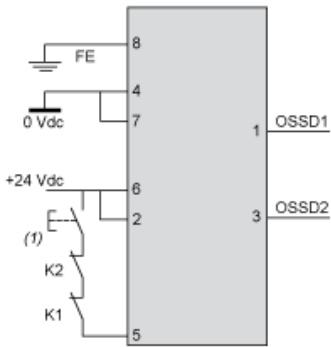
Manual Start/Restart

Without External Device Monitoring (EDM) feedback loop



(1) Restart

With External Device Monitoring (EDM) feedback loop



(1) Restart



Connecting to a Safety Interface



- 1 : Click on Download & Documents
- 2 : Click on Application solutions
- To have all connection schematics concerning our safety module, select "download and document" and download the file "Safety light curtains association with safety interfaces"

Recommended replacement(s)