# Product data sheet
## Characteristics

# XCKP2121M12
## limit switch XCKP - th.plastic roller lever plung. Hor - 1NC+1NO - snap - M12


### Main

| | |
|---|---|
| Range of product | OsiSense XC |
| Series name | Standard format |
| Product or component type | Limit switch |
| Device short name | XCKP |
| Sensor design | Compact form E conforming to CENELEC EN 50047 |
| Body type | Fixed |
| Head type | Plunger head |
| Material | Plastic |
| Body material | Plastic |
| Head material | Zamak |
| Fixing mode | By the body |
| Movement of operating head | Linear |
| Type of operator | Spring return roller lever plunger thermoplastic |
| Type of approach | Lateral approach 1 direction |
| Number of poles | 2 |
| Contacts type and com-position | 1 NC + 1 NO |
| Contact operation | Snap action |

### Complementary

| | |
|---|---|
| Switch actuation | By 30° cam |
| Electrical connection | Male connector M12, 4 pins |
| Contacts insulation form | Zb |
| Positive opening | With |
| Positive opening minimum force | 18 N |
| Minimum force for tripping | 6 N |
| Maximum actuation speed | 1 m/s |
| Repeat accuracy | 0.1 mm on the tripping points with 1 million operating cycles |
| [Ie] rated operational current | 0.27 A at 250 V, DC-13 conforming to EN/IEC 60947-5-1 appendix A<br>3 A at 240 V, AC-15 conforming to EN/IEC 60947-5-1 appendix A |
| [Ithe] conventional enclosed thermal current | 3 A |
| [Ui] rated insulation voltage | 300 V conforming to CSA C22.2 No 14<br>250 V degree of pollution 3 conforming to IEC 60947-1<br>300 V conforming to UL 508 |
| Resistance across terminals | <= 25 MOhm conforming to IEC 60255-7 category 3 |
| [Uimp] rated impulse withstand voltage | 2.5 kV conforming to IEC 60664<br>2.5 kV conforming to IEC 60947-1 |
| Short-circuit protection | 4 A by gG cartridge fuse |
| Electrical durability | 5000000 cycles, DC-13, 120 V, 4 W, operating rate: <= 60 cyc/mn, load factor: 0.5 conforming to IEC 60947-5-1 appendix C<br>5000000 cycles, DC-13, 24 V, 10 W, operating rate: <= 60 cyc/mn, load factor: 0.5 conforming to IEC 60947-5-1 appendix C<br>5000000 cycles, DC-13, 48 V, 7 W, operating rate: <= 60 cyc/mn, load factor: 0.5 conforming to IEC 60947-5-1 appendix C |
| Mechanical durability | 15000000 cycles |
| Width | 31 mm |
| Height | 65 mm |
| Depth | 30 mm |

| | |
|---|---|
| Product weight | 0.11 kg |
| Terminals description ISO n°1 | (13-14)NO<br>(21-22)NC |

## Environment

| | |
|---|---|
| Shock resistance | 50 gn (duration = 11 ms) conforming to IEC 60068-2-27 |
| Vibration resistance | 25 gn (f = 10...500 Hz) conforming to IEC 60068-2-6 |
| IP degree of protection | IP66 conforming to IEC 60529<br>IP67 conforming to IEC 60529 |
| IK degree of protection | IK04 conforming to EN 50102 |
| Electrical shock protection class | Class II conforming to IEC 61140<br>Class II conforming to NF C 20-030 |
| Ambient air temperature for operation | -25...70 °C |
| Ambient air temperature for storage | -40...70 °C |
| Protective treatment | TC |
| Product certifications | CCC<br>CSA<br>UL |
| Standards | EN 60204-1<br>EN 60947-5-1<br>IEC 60204-1<br>IEC 60947-5-1<br>UL 508<br>CSA C22.2 No 14 |

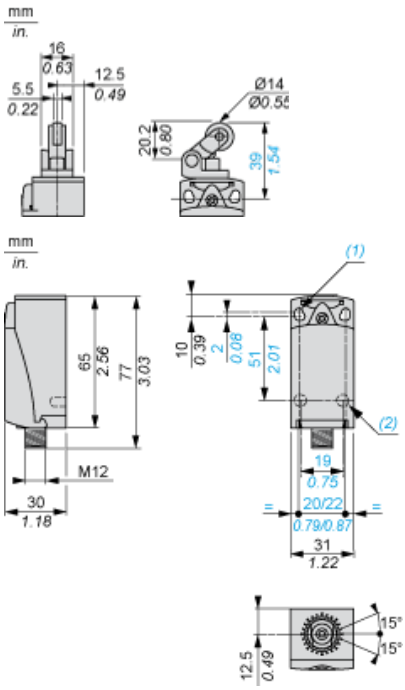
## Offer Sustainability

| | |
|---|---|
| Sustainable offer status | Green Premium product |
| RoHS (date code: YYWW) | Compliant - since 1002 - Schneider Electric declaration of conformity<br>Schneider Electric declaration of conformity |
| REACh | Reference not containing SVHC above the threshold |

## Contractual warranty

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

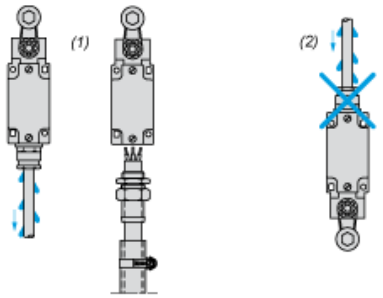
## Dimensions




(1) 2 elongated holes Ø 4.3 x 6.3 mm on 22 mm centres, 2 holes Ø 4.3 on 20 mm centres.
(2) 2 x Ø 3 holes for support studs, depth 4 mm.

## Mounting with Cable Entry

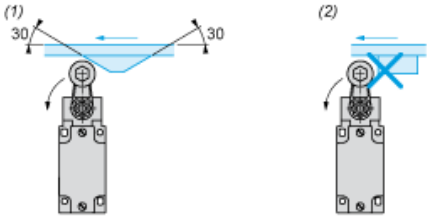
### Position of Cable Gland




(1) Recommended
(2) To be avoided

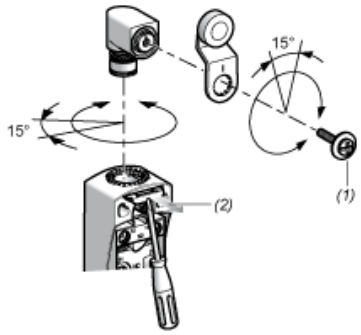
## Mounting with Rotary Heads and Levers

### Type of Cam




(1) Recommended
(2) To be avoided

## Setting-up with Head ZCE01 and ZCE09



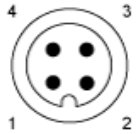

(1) Tightening torque (Min : 1) (Max : 1.5)
(2) Tightening torque (Min : 0.8) (Max : 1.2)

## Wiring Diagram

### 2-pole NC + NO Snap Action


## Connections

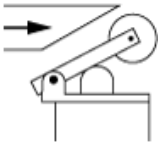
### M12 Connector



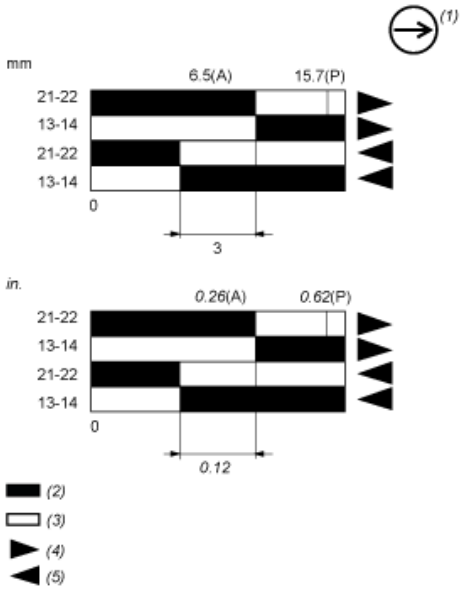

1-2 : NC
3-4 : NO

## Characteristics of Actuation

### Switch Actuation by 30° Cam



## Functionnal Diagram




(P) Positive opening point
(A) Cam displacement
(1) NC contact with positive opening operation
(2) Closed
(3) Open
(4) Tripping
(5) Resetting