

# XUB0SNSNM12

photo-electric sensor - XUB - multi - Sn 0..20m - 12..24VDC - M12



## Main

Range of product	OsiSense XU
Series name	Application food and beverage multimode
Electronic sensor type	Photo-electric sensor
Sensor name	XUB
Sensor design	Cylindrical M18
Detection system	Multimode
Material	Stainless steel
Line of sight type	Axial
Type of output signal	Discrete
Supply circuit type	DC
Wiring technique	3-wire
Discrete output type	NPN
Discrete output function	1 NO or 1 NC programmable
Electrical connection	1 male connector M12, 4 pins
Product specific application	-
Emission	Infrared diffuse Infrared diffuse with background suppression Infrared thru beam Red polarised reflex
[Sn] nominal sensing distance	0.12 m diffuse with background suppression 0.3 m diffuse 3 m polarised reflex need reflector XUZC50 20 m thru beam need a transmitter XUB0SKSNM12T

## Complementary

Enclosure material	Stainless steel : 304 CU
Lens material	PMMA
Maximum sensing distance	0.12 m diffuse with background suppression 0.4 m diffuse 30 m thru beam 4.5 m polarised reflex
Output type	Solid state
Status LED	1 LED (green) for output state 1 LED (red) for supply on 1 LED (yellow) for stability
[Us] rated supply voltage	12...24 V DC with reverse polarity protection
Supply voltage limits	10...36 V DC
Switching capacity in mA	<= 100 mA (overload and short-circuit protection)
Switching frequency	<= 250 Hz
Voltage drop	1.5 V (closed state)
Current consumption	35 mA (no-load)
Delay first up	< 200 ms
Delay response	< 2 ms
Delay recovery	< 2 ms
Setting-up	Self-training
Diameter	18 mm
Length	78 mm
Product weight	0.055 kg

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## Environment

product certifications	CE CSA UL
ambient air temperature for operation	-25...55 °C
ambient air temperature for storage	-40...70 °C
vibration resistance	7 gn, amplitude = +/- 1.5 mm (f = 10...55 Hz) conforming to IEC 60068-2-6
shock resistance	30 gn (duration = 11 ms) conforming to IEC 60068-2-27
IP degree of protection	IP65 double insulation conforming to IEC 60529 IP67 double insulation conforming to IEC 60529 IP69K double insulation conforming to DIN 40050

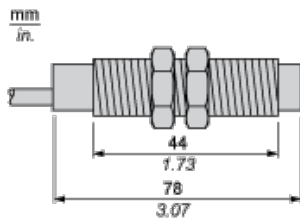
## Offer Sustainability

Sustainable offer status	Not Green Premium product
RoHS (date code: YYWW)	Compliant - since 0821 - Schneider Electric declaration of conformity
REACH	Reference not containing SVHC above the threshold

## Contractual warranty

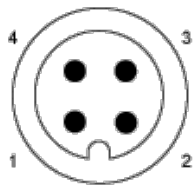
Warranty period	18 months
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## Dimensions



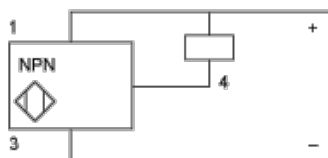
## Wiring Schemes

### M12 Connector



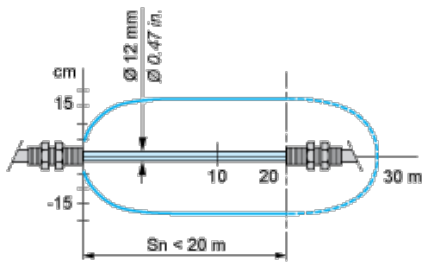
- 3 : (-)
- 1 : (+)
- 4 : OUT/Output
- 2 : Not connected

### NPN

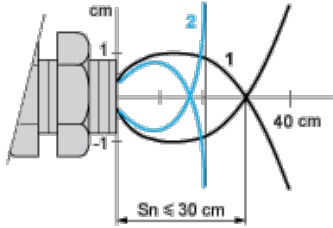


## Detection Curves

### With Thru-beam Accessory (Thru-beam)

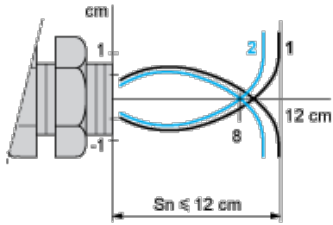


**Without Accessory (Diffuse)**



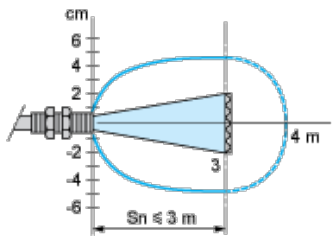
- 1 : White 90%
- 2 : Grey 18%
- Object: 10 x 10 cm

**Without Accessory (Diffuse with Background. Suppression)**



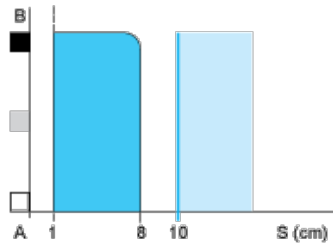
- 1 : White 90%
- 2 : Grey 18%
- Object: 10 x 10 cm

**With Reflector XUZC50 (Polarised Reflex)**

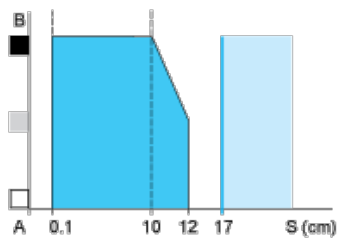


**Variation of Usable Sensing Distance Su (Without Accessory, with Adjustable Background Suppression)**

Teach mode at minimum



Teach mode at maximum



- (1) Black
- (2) Grey
- (3) White
- (4) Sensing range
- (5) Non sensing zone (matt surfaces)

A-B :Object reflection coefficient

- (1) Black 6%
- (2) Grey 18%
- (3) White 90%
- (4) Sensing range
- (5) Non sensing zone (matt surfaces)