Product datasheet

Specifications



photo-electric sensor - XUK - BGS - Sn 0.7m - 24..240VAC/DC - cable 2m

XUK8ARCTL2

Main

Range of product	Telemecanique Photoelectric sensors XU
Series name	General purpose single mode
Electronic sensor type	Photo-electric sensor
Sensor name	XUK
Sensor design	Compact 50 x 50
Detection system	Diffuse with background suppression
Material	Plastic
Type of output signal	Discrete
Supply circuit type	AC/DC
Wiring technique	5-wire
Discrete output function	1 C/O
Electrical connection	Cable
Cable length	2 m
Product specific application	-
Emission	Infrared diffuse with background suppression
[Sn] nominal sensing distance	0.75 m diffuse with background suppression

Complementary

Enclosure material	PBT
Lens material	PMMA
Maximum sensing distance	0.75 m diffuse with background suppression
Output type	Relay
Cable composition	5 x 0.34 mm²
Wire insulation material	PVC
Cable outer diameter	6 mm
Status LED	1 LED (green) for supply on 1 LED (yellow) for output state
[Us] rated supply voltage	24...240 V AC/DC
Supply voltage limits	20…264 V AC 20…264 V DC

Disclaimer: 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

Switching capacity in mA	3 A (cos φ = 1 for 0.5 million cycles at 1 operating cycle per second at 250 V)
Switching frequency	<= 20 Hz
Maximum voltage drop	<1.5 V (closed state)
Current consumption	<= 35 mA no-load
Maximum power consumption in W	2 W AC
Maximum delay first up	60 ms
Maximum delay response	25 ms
Maximum delay recovery	25 ms
Setting-up	Self teaching
Electrical durability	500000 cycles, cos f = 1, operating rate <60 cyc/mn at 250 V
Depth	50 mm
Height	50 mm
Width	18 mm
Net weight	0.15 kg

Environment

Product certifications	CE Ecolab
Ambient air temperature for operation	-20…60 °C
Ambient air temperature for storage	-30…70 °C
Vibration resistance	7 gn (f = 10…55 Hz) conforming to IEC 60068-2-6
Shock resistance	30 gn (duration = 11 ms) conforming to IEC 60947-5-2
IP degree of protection	IP65 double insulation conforming to IEC 60529

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Weight	181.0 g
Package 1 Height	4 cm
Package 1 width	9.5 cm
Package 1 Length	13.2 cm
Unit Type of Package 2	S02
Number of Units in Package 2	22
Package 2 Weight	4.46 kg
Package 2 Height	15 cm
Package 2 width	30 cm
Package 2 Length	40 cm

Offer Sustainability

REACh Regulation	REACh Declaration
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope) EU RoHS Declaration
Mercury free	Yes

RoHS exemption information	Yes

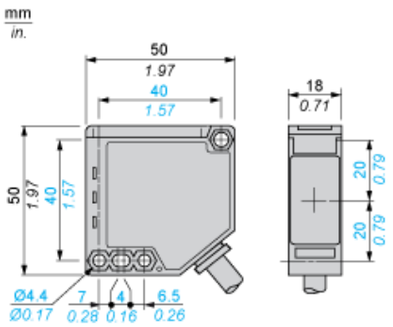
Contractual warranty

Warranty	18 months

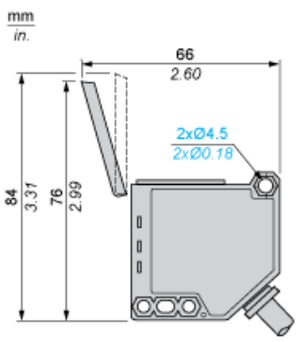
Product datasheet XUK8ARCTL2

Dimensions Drawings

Dimensions

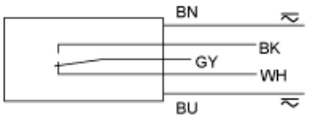


With cover open



Connections and Schemes

Cable Connection, Relay Output



AC/DC : BN (Blue)
AC/DC : BN (Brown)
Relay common : GY (Grey)
NO : BK (Black), detection of object
NC : WH (White), detection of object absence

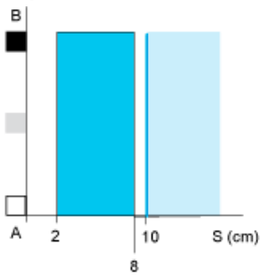
Product datasheet XUK8ARCTL2

Performance Curves

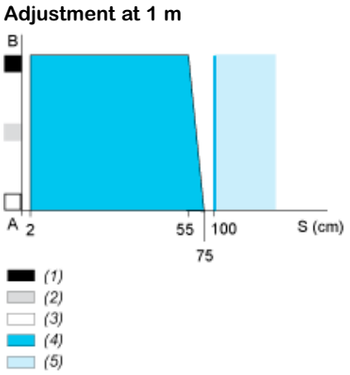
Detection Curves

Variation of Usable Sensing Distance Su

Adjustment at 10 cm

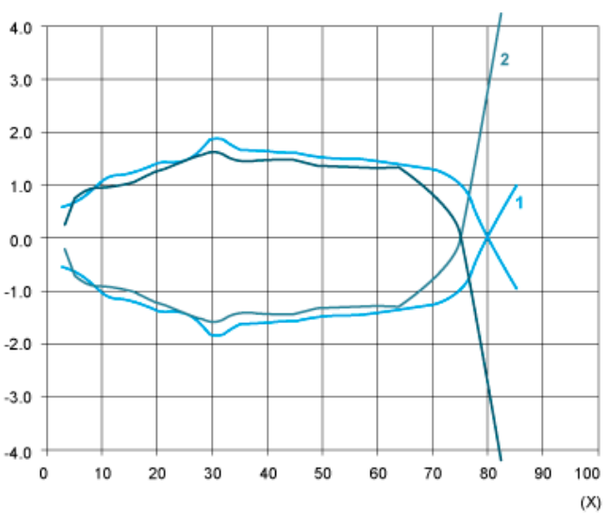


Adjustment at 1 m



A-B : Object reflection coefficient
(1) Black 6%
(2) Grey 18%
(3) White 90%
(4) Sensing range
(5) Non sensing zone (matt surfaces)

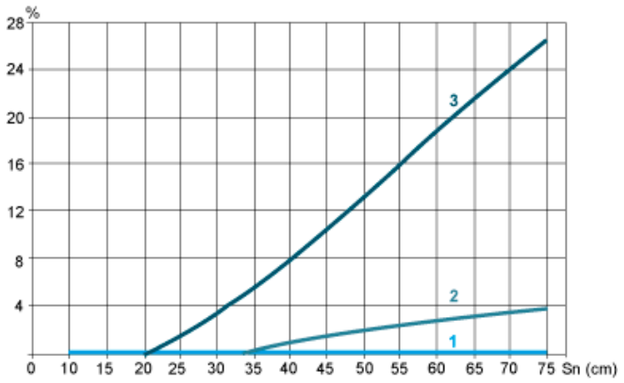
Detection Curves



1 : White 90%
2 : Grey 18%

Screen: 20 x 20 cm

Relative Difference in Sensing Distances According to Object Colour



1 : White 90%
2 : Grey 18%
3 : Black 6%