



Main

Range of product	Telemecanique Photoelectric sensors XU
Series name	Application packaging
Electronic sensor type	Photo-electric sensor
Product specific application	Colour
Sensor name	XUK
Sensor design	Compact 50 x 50
Detection system	Diffuse
Emission	White LED
[Sn] nominal sensing distance	20 mm spot Ø 4 mm
Material	Plastic
Supply circuit type	DC
Type of output signal	Discrete
Wiring technique	3-wire
Discrete output type	PNP
Discrete output function	1 NO
Electrical connection	1 male connector M12 adjustable through 90°, 8 pins

Complementary

Enclosure material	ABS
Lens material	Glass
Type of colour processing	RGB
Output type	Solid state
Output function governance	Light on
Add on input	Synchro + locking
Signalling function	4-digit display
Status LED	Output state OUT: 1 LED (yellow) Output active: 3 LEDs (green)
[Us] rated supply voltage	12...24 V DC
Supply voltage limits	10...30 V DC
Switching capacity in mA	<= 100 mA (reverse polarity, overload and short-circuit protection)
Switching frequency	<= 1500 Hz
Maximum voltage drop	<2 V (closed state)
Current consumption	<= 60 mA no-load
Time delay range	10 ms 20 ms 30 ms 40 ms 5 ms
Maximum delay response	0.335 ms
Maximum delay recovery	0.335 ms
Setting-up	Tolerance level Operating mode Sensitivity adjustment with teach mode
Depth	50 mm
Height	50 mm
Width	25 mm
Net weight	0.085 kg

Environment

Product certifications	CE CULus
Ambient air temperature for operation	-10...55 °C
Ambient air temperature for storage	-20...70 °C
Vibration resistance	7 gn, amplitude = +/- 0.5 mm (f = 10...55 Hz) on the 3 axes conforming to IEC 60068-2-6
Shock resistance	30 gn (duration = 11 ms) for 6 shocks on each axis conforming to IEC 60068-2-27
IP degree of protection	IP65 conforming to IEC 60529

Packing Units

Unit Type of Package 1	PCE
Number of Units in Package 1	1
Package 1 Weight	92 g
Package 1 Height	4.5 cm
Package 1 width	8 cm
Package 1 Length	12.2 cm
Unit Type of Package 2	S02
Number of Units in Package 2	21
Package 2 Weight	2.361 kg
Package 2 Height	15 cm
Package 2 width	30 cm
Package 2 Length	40 cm

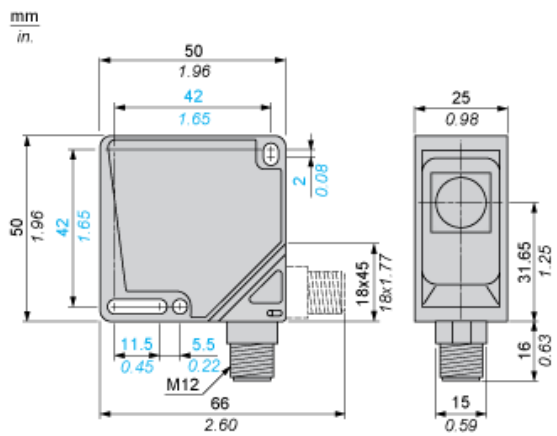
Offer Sustainability

Sustainable offer status	Green Premium product
REACH Regulation	 REACH Declaration
REACH free of SVHC	Yes
EU RoHS Directive	Pro-active compliance (Product out of EU RoHS legal scope)  EU RoHS Declaration
Toxic heavy metal free	Yes
Mercury free	Yes
RoHS exemption information	 Yes
Environmental Disclosure	 Product Environmental Profile
Circularity Profile	 End Of Life Information

Contractual warranty

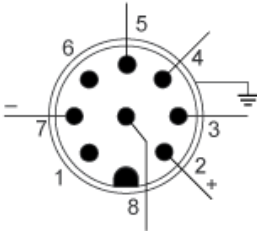
Warranty	18 months
----------	-----------

Dimensions



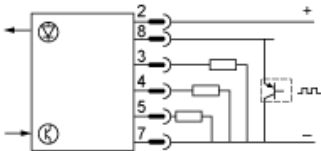
Wiring Schemes

Sensor Connector Pin View



Pin N°	Type	Colour (2)
1	-	WH (white)
2	10...30 VDC	BN (brown)
3	Output 1	TAN (tan)
4	Output 2	YE (yellow)
5	Output 3	GY (grey)
6	-	PK (pink)
7	0 V	VT (violet)
8	Synchro	RD (red)
-	Screening	TR (transparent)

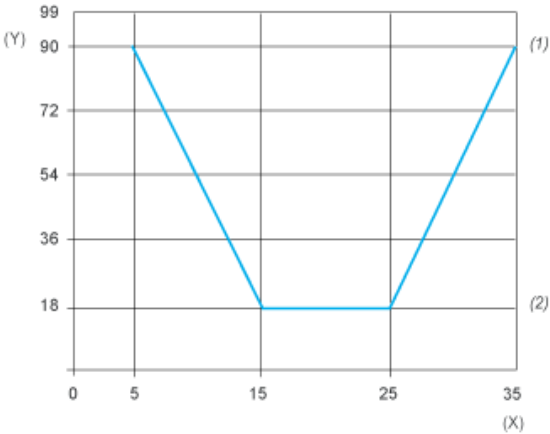
PNP Output + Synchro Input



Curves

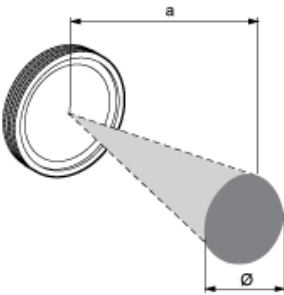
Detection Curve

Detection distance related to object's degree of reflection



- (y) Object reflection
- (x) Detection distance (mm)
- (1) White Yellow light
- (2) Dark blue Black

Detection Zone and Spot Size



a (mm)	Ø (mm)
20	4