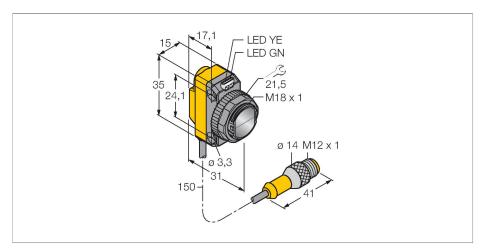


QS186LE2Q5 Photoelectric Sensor – Laser Emitter



Technical data

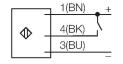
Туре	QS186LE2Q5	
ID no.	3075954	
Optical data		
Function	Opposed mode sensor	
Operating mode	Laser Emitter	
Light type	IR	
Wavelength	650 nm	
Laser class	<u>^</u> 2	
Range	015000 mm	
Electrical data		
Operating voltage	1030 VDC	
Residual ripple	< 10 % U _{ss}	
DC rated operational current	≤ 100 mA	
Short-circuit protection	yes	
Reverse polarity protection	yes	
Readiness delay	≤ 0.01 s	
Readiness delay	≤ 10 ms	
Mechanical data		
Design	Rectangular with thread, QS18	
Dimensions	Ø 18 x 31 x 15 x 35 mm	
Housing material	Plastic, ABS	
Lens	plastic, PMMA	
Electrical connection	Cable with connector, M12 × 1, 0.15 m, PVC	
Number of cores	4	
Ambient temperature	-10+50 °C	

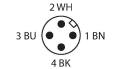


Features

- Cable with male end, M12 × 1, 4-pin, PVC, 150 mm
- ■Protection class IP67
- ■LED all-round visible
- Cable with male end M12 × 1
- Laser class 2

Wiring diagram





Functional principle

Opposed mode sensors consist of an emitter and a receiver. They are installed opposite to each other whereby the emitted light aims directly at the receiver. When an object interrupts or weakens the light beam, the sensor switches. Opposed mode sensors are the most reliable photoelectric sensors for detection of opaque objects. The high light/dark contrast and the very high excess gain are typical for this function mode and enable operation over large distances and under difficult conditions.

Activation

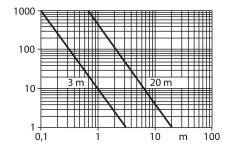
By connecting the control input (PIN 2 WH) to ground (-) the laser beam is turned on. The laser beam is turned off again by feeding



Technical data

Special features	Laser	
Power-on indication	LED, Green	
Excess gain indication	LED	
Tests/approvals		
MTTF	530 years acc. to SN 29500 (Ed. 99) 40 °C	
Approvals	CE	

10 ... 30 VDC to the control input or by nonconnecting the wire. Excess gain curve Excess gain in relation to the distance (type 6EB/RB)



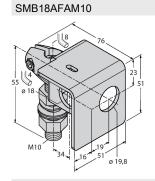
Accessories

SMB18A ø 18.5

Mounting bracket, rectangular, stainless steel, for sensors with 18

3033200

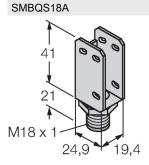
mm thread



Mounting bracket, material VA 1.4401, for M10 x 1.5 thread, thread length 18 mm

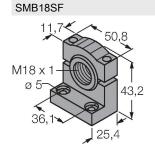
3012558

3052519



Mounting bracket, stainless steel, for 18 mm thread

3069721



Mounting bracket, PBT black, for sensors with 18 mm thread, rotatable



Accessories

Dimension drawing	Type	ID no.	
M12x1 ø15 1/2 14 + 11.5 - 42 - 50 - 50 - 50	RKC4.4T-2/TEL	6625013	Connection cable, female M12, straight, 4-pin, cable length: 2 m, sheath material: PVC, black; cULus approval; other cable lengths and qualities available, see www.turck.com
0 15 M12 x 1 26.5 32 	WKC4.4T-2/TEL	6625025	Connection cable, female M12, angled, 4-pin, cable length: 2 m, sheath material: PVC, black; cULus approval; other cable lengths and qualities available, see www.turck.com