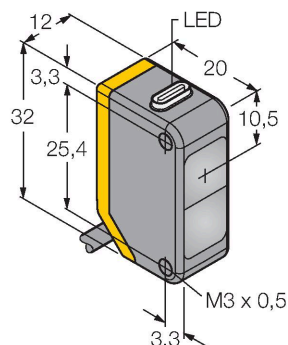


# RO20M-Q18-VP6X2

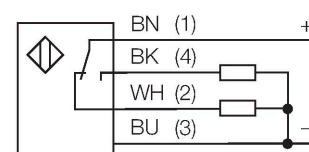
## Photoelectric Sensor – Opposed Mode Sensor (Receiver)



### Features

- Cable, PVC, 2 m
- Protection class IP67
- LED, all-round visible
- Operating voltage: 10...30 VDC
- PNP switching output, changeover

### Wiring diagram

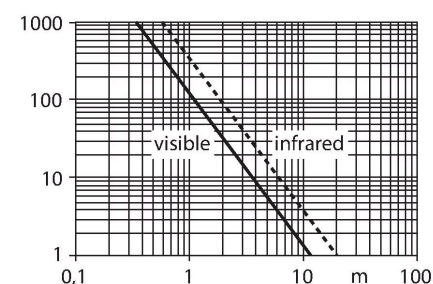


### Technical data

Type	RO20M-Q18-VP6X2
ID	7700120
Function	Opposed mode sensor (receiver)
Range	0...20000 mm
Operating voltage	10...30 VDC
Residual ripple	< 10 % U <sub>ss</sub>
DC rated operational current	≤ 100 mA
No-load current	≤ 18 mA
Reverse polarity protection	yes
Output function	Complementary contact, PNP
Switching frequency	≤ 600 Hz
Readiness delay	≤ 100 ms
Design	Rectangular, Q20
Dimensions	20 x 12 x 32 mm
Housing material	Plastic, ABS
Lens	plastic, Acryl
Electrical connection	Cable, 2 m, PVC
Number of cores	4
Core cross-section	0.35 mm <sup>2</sup>
Ambient temperature	-20...+60 °C
Protection class	IP67
Power-on indication	LED, Green
Switching state	LED, Yellow
Error indication	LED, green, flashing
Excess gain indication	LED, yellow, flashing

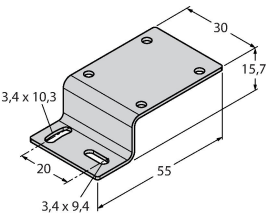
### Functional principle

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.

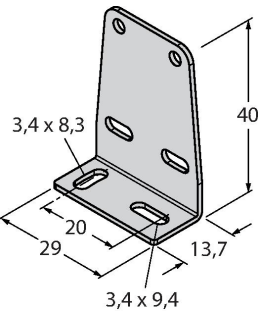


Accessories

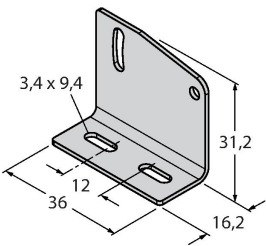
**TMBQ18H** 7700420  
Mounting bracket, stainless steel, for Q18



**TMBQ18L** 7700421  
Mounting bracket, stainless steel, for Q18



**TMBQ18LV** 7700422  
Mounting bracket, stainless steel, for Q18



**TMBQ18U** 7700423  
Protective housing, stainless steel, for Q18

