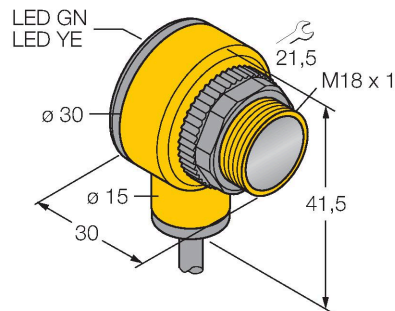


# T18AW3L W/30

## Photoelectric Sensor – Retroreflective Sensor



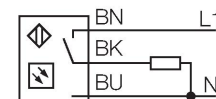
### Technical data

Type	T18AW3L W/30
ID no.	3035864
<b>Optical data</b>	
Function	Retroreflective Sensor
Operating mode	Unpolarized
Reflector included in delivery	no
Light type	IR
Wavelength	950 nm
Range	50...2000 mm
<b>Electrical data</b>	
Operating voltage	20...250 VAC
AC rated operational current	≤ 200 mA
Output function	Light operation, Relay output
Switching frequency	≤ 40 Hz
Readiness delay	≤ 100 ms
Response time typical	< 16 ms
Setting option	Potentiometer
<b>Mechanical data</b>	
Design	Rectangular with thread, T18
Dimensions	Ø 18 x 30 x 30 x 41.5 mm
Housing material	Plastic, Thermoplastic material
Lens	plastic, Acrylic
Electrical connection	Cable, 9 m, PVC
Number of cores	3
Core cross-section	0.5 mm <sup>2</sup>
Ambient temperature	-40...+70 °C
Protection class	IP67

### Features

- Cable, 9 m
- Protection class IP67
- Ambient temperature: -40...+70 °C
- Connecting cable, 9 m
- Protection class IP68 - IP69K

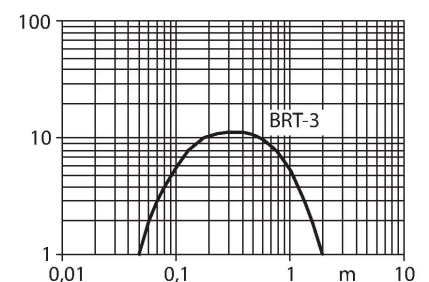
### Wiring diagram



### Functional principle

Retro-reflective sensors incorporate emitter and receiver in a single compact housing. The light beam of the emitter is directed towards a reflector which returns the light back to the receiver. An object is detected when it interrupts this beam. Retro-reflective sensors have a high function gain and good contrast performance. Further it is merely required to install and wire a single device.

Excess gain curve  
Excess gain in relation to the distance

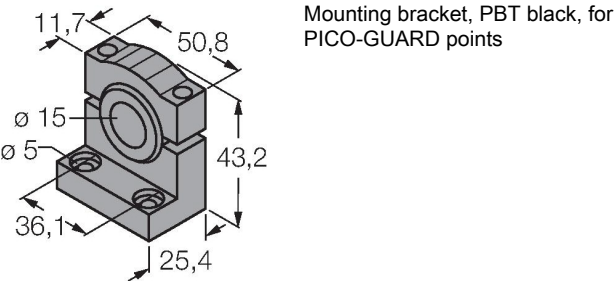


Technical data

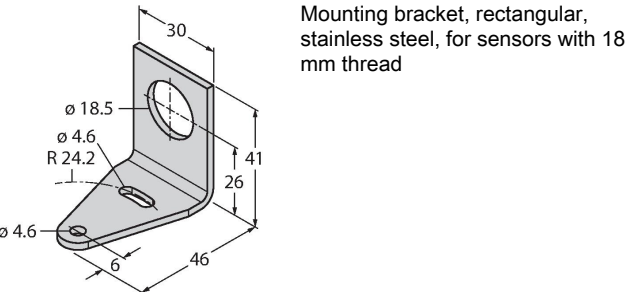
	IP69
Special features	Chemical-resistant Encapsulated Wash down
Power-on indication	LED, Green
Switching state	LED, Yellow
Excess gain indication	LED
Tests/approvals	
Approvals	CE, UL, CSA

Accessories

SMB1815SF 3053279



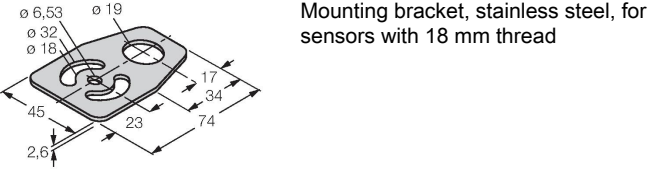
SMB18A 3033200



SMB18FM 3079421

mounting bracket, black, M22 x1.5 mm, male thread, female thread M18 x 1, for sensors with 18 mm thread

SMBAMS18P 3073134



Accessories

Dimension drawing	Type	ID no.	
<p>Technical drawing of the BRT-3 round reflector. Dimensions: 5.2 [0.21] (central hole diameter), 7 [0.28] (height), 81 [3.19] (outer diameter).</p>	BRT-3	3016164	Round reflector, reflection coefficient 1.0, material acrylic, ambient temperature -20...+60 °C