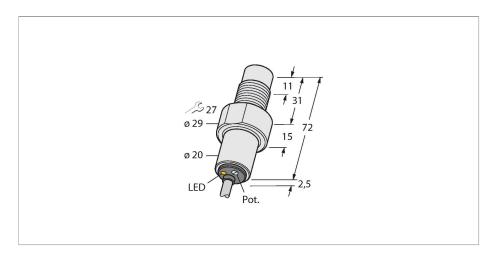
BC5-S185-AP4X Capacitive Sensor



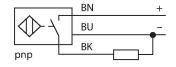
Technical data

Time	BC5-S185-AP4X
Type	
ID	25035
Rated switching distance (flush)	5 mm
Rated switching distance (non-flush)	7.5 mm
Secured operating distance	≤ (0.72 × Sn)
Hysteresis	120 %
Temperature drift	Typical 20 %
Repeat accuracy	≤ 2 % of full scale
Ambient temperature	-25+70 °C
Electrical data	
Operating voltage	65 VDC
Residual ripple	≤ 10 % U _{ss}
DC rated operational current	≤ 200 mA
No-load current	≤ 15 mA
Residual current	≤ 0.1 mA
Switching frequency	0.1 kHz
Oscillation frequency	According to EN 60947-5-2, 8.2.6.2 Table 9: 0.12.0 MHz
Isolation test voltage	≤ 0.5 kV
Output function	3-wire, NO contact, PNP
Short-circuit protection	yes / Cyclic
Voltage drop at I _e	≤ 1.8 V
Wire breakage/Reverse polarity protection	yes / Complete
Tests/approvals	
Mechanical data	
Design	Threaded barrel, M18 x 1

Features

- ■M18 × 1 threaded barrel
- ■Plastic, PVDF
- Fine adjustment via potentiometer
- ■DC 3-wire, 10...65 VDC
- ■NO contact, PNP output
- Cable connection

Wiring diagram



Functional principle

Capacitive proximity switches are designed for non-contact and wear-free detection of electrically conductive as well as non-conductive metal objects.

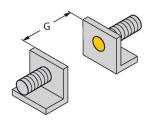


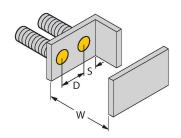
Technical data

Dimensions	74.5 mm
Housing material	Plastic, PVDF
Active area material	PVDF, ecru
Max. tightening torque of housing nut	2 Nm
Electrical connection	Cable
Cable quality	Ø 5.2 mm, LifYY, PVC, 2 m
Core cross-section	3 x 0.34 mm²
Vibration resistance	55 Hz (1 mm)
Shock resistance	30 g (11 ms)
Protection class	IP67
MTTF	1080 years acc. to SN 29500 (Ed. 99) 40 °C
Power-on indication	Green
Switching state	LED, Yellow

Mounting instructions

Product features





Distance D	36 mm
Distance W	15 mm
Distance S	27 mm
Distance G	30 mm
Diameter active area B	Ø 18 mm

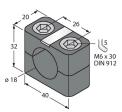
The given minimum distances have been checked against the standard switching distance.

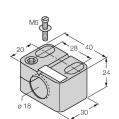
Should the sensitivity of the sensors be changed via potentiometer, the data sheet specifications no longer apply.

Accessories

BSN 18 69472 BST-18B

Mounting clamp for threaded barrel sensors; material: PA66-GF





Mounting clamp for threaded barrel sensors, with dead-stop; material: PA6

6947214