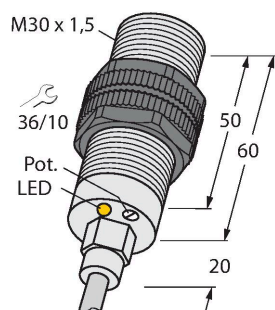


# BC10-PT30-VP4X2

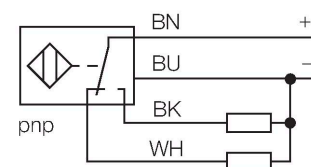
## Capacitive Sensor



### Features

- M30 × 1.5 threaded barrel
- Plastic, PVDF
- Fine adjustment via potentiometer
- DC 4-wire, 10...65 VDC
- Complementary 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

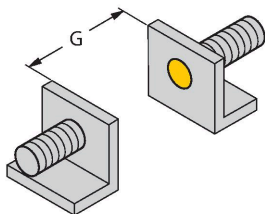
Type	BC10-PT30-VP4X2
Ident. no.	2507010
Rated switching distance (flush)	10 mm
Rated switching distance (non-flush)	15 mm
Secured operating distance	$\leq (0.72 \times S_n)$
Hysteresis	2...20 %
Temperature drift	type 20 %
Repeat accuracy	$\leq 2 \%$ of full scale
Ambient temperature	-25...+70 °C
<b>Electrical data</b>	
Operating voltage	10...65 VDC
Residual ripple	$\leq 10 \%$ $U_{ss}$
DC rated operational current	$\leq 200$ mA
No-load current	$\leq 15$ mA
Residual current	$\leq 0.1$ mA
Switching frequency	0.1 kHz
Isolation test voltage	$\leq 0.5$ kV
Output function	4-wire, Complementary contact, PNP
Short-circuit protection	yes / Cyclic
Voltage drop at $I_o$	$\leq 1.8$ V
Wire breakage/Reverse polarity protection	yes / Complete
Approvals	UL

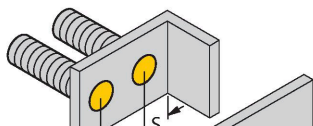
Technical data

Mechanical data	
Design	Threaded barrel, M30 × 1.5
Housing material	Plastic, PVDF
Active area material	PVDF
Max. tightening torque of housing nut	2 Nm
Electrical connection	Cable
Cable quality	Ø 5.7 mm, PVC, 2 m
Core cross-section	4 x 0.34 mm <sup>2</sup>
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
Switching state	LED, Yellow

Mounting instructions

## Product features

An isometric view of a sensor component. It consists of a rectangular base with a circular hole in the center. A threaded rod is inserted through the hole. A dimension line labeled 'G' indicates the distance from the front face of the base to the center of the hole. Another dimension line labeled 'D' indicates the distance from the top face of the base to the center of the hole.

An isometric view of a sensor component. It consists of a rectangular base with two circular holes. A dimension line labeled 'S' indicates the distance from the front face of the base to the center of the first hole. Another dimension line labeled 'W' indicates the distance from the front face of the base to the center of the second hole.

Distance D	60 mm
Distance W	30 mm
Distance S	45 mm
Distance G	60 mm
Diameter active area B	Ø 30 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.