

## KB300104

### Capacitive sensors • Norm switching distance

sensor capacitive, M30x1.5 40long, Flush, Sn: 0.5-25, 12-30V DC, PNP NO, Cable 3pin  
2m PUR (Polyurethane), IP67, Brass Nickel-plated, LED, Manual adjustment

including 2x Nut, 1x Screwdriver



Capacitive proximity switches are contact-free sensors. They detect metallic and non-metallic objects, regardless of whether they move or not. The achievable sensing range of the devices depends on the object material, its dimensions and the response sensitivity, which is set via a potentiometer. The vibration-resistant sensors can be approached laterally or frontally. Capacitive proximity switches are used for presence detection (e.g. sealing detection), positioning (e.g. PET bottles), counting (e.g. plastic caps), level detection (e.g. lubricant) or distance measurements (e.g. thickness measurement) of solid and liquid materials.

#### Electrical features

Display	LED display
Type of switching function	Normally open contact (NO)
Type of electrical connection	Cable
Type of switching output	PNP
Rated switching current	200mA
Setting procedure	Potentiometer
Correction factor (glass)	0.6
Correction factor (wood)	0.6
Correction factor (PVC)	0.5
Correction factor (oil)	0.5
Short-circuit protection	Yes
No-load current	15mA
Number of pins	3
Residual ripple	5%
Switching distance	0,5 - 25mm
Switching frequency	200Hz
Voltage drop	2V
Reverse polarity protection	Yes
Operating voltage (DC)	12 - 30V
Output functions	Switching point

**Mechanical features**

Number of cores	3
Conductor cross-section	0.14mm <sup>2</sup>
Design	Cylinder, screw-thread
Diameter	30mm
Thread length	40mm
Thread pitch	1.5mm
Cable length	2m
Length	40mm
Mechanical mounting condition for sensor	flush
Surface	nickel-plated
Degree of protection (IP)	IP67
Active area material of sensor	Plastic (PTFE)
Housing material	Brass
Material of cable sheath	Plastic (PUR)
Thread dimension	M30
Ambient temperature	-25 - 70°C

**Other features**

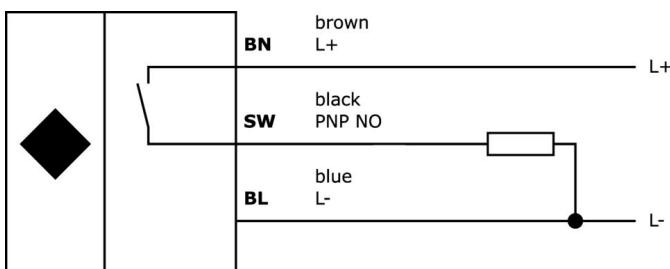
Level detection	Yes
Reference medium / object	Material with permittivity $\epsilon_r=81$
Ambient temperature	-25 - 70°C

**Classification**

ETIM 8	EC002715 Capacitive proximity switch
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**More**

IPF Product Group	
packaging dimensions	125 x 70 x 40 mm
gross weight	160 g
Customs tariff number	85365019
WEEE number	40951076
Reach-compliant	Yes
RoHS-compliant	Yes

**Connection**

**Installation**

Mounting / installation may only be carried out by a qualified electrician!

**Disposal****Safety warnings**

Before initial operation, please make sure to follow all safety instructions that may be provided in the product information.

Never use these devices in applications where the safety of a person depends on their functionality.

For suitable connection and mounting accessories, please refer to our website [www.ipf-electronic.com](http://www.ipf-electronic.com).

**Dimensional drawing**