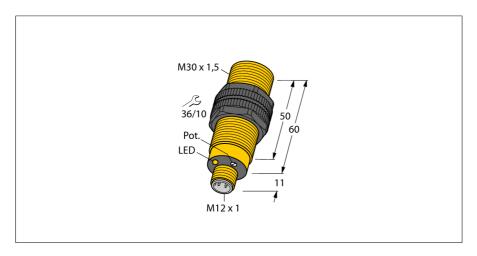
Capacitive sensor for the detection of dry pellets BCC10-S30-VP4X-H1141





Type designation	BCC10-S30-VP4X-H1141	
Ident-No.	2503043	
Rated switching distance (flush)	10 mm	
Rated switching distance (non-flush)	10 mm	
Secured operating distance	≤ (0.72 x Sn) mm	
Hysteresis	220 %	
Temperature drift	type 20 %	
Repeat accuracy	≤ 2 % of full scale	
Ambient temperature	-25+70 °C	

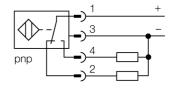
Ambient temperature	-25+70 °C	
Operating voltage	1065 VDC	
Residual ripple	≤ 10 % U _{ss}	
DC rated operational current	≤ 200 mA	
No-load current I₀	≤ 15 mA	
Residual current	≤ 0.1 mA	
Switching frequency	0.1 kHz	
Isolation test voltage	≤ 0.5 kV	
Output function	4-wire, Complementary contact, PNP	
Short-circuit protection	yes/ Cyclic	
Voltage drop at I _e	≤ 1.8 V	

Output function 4-wire, Complementary contact, PNP			
Short-circuit protection	yes/ Cyclic		
Voltage drop at I _e	≤ 1.8 V		
Wire breakage/Reverse polarity protection	yes/ Complete		
Design	Threaded barrel,M30 × 1.5		
Dimensions	60 mm		
Housing material	Plastic, PA12-GF30, PEI		
Active area material	Plastic, PA12-GF30, yellow		
Admissible pressure on front cap	≤ 3 bar		
Max. tightening torque housing nut	5 Nm		
Electrical connection	Connector, M12 × 1		
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		
Packaging unit	1		

LED,Yellow

- M30 × 1.5 threaded barrel
- Plastic, PA12-GF30
- Fine adjustment via potentiometer
- Especially for dry pellets and the plastics industry
- **EMC and ESD resistant**
- DC 4-wire, 10...65 VDC
- Complementary contact, PNP output
- M12 x 1 male connector

Wiring Diagram

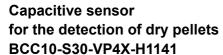


Functional principle

Level monitoring of pellets is usually done with sensors mounted in pipes, silos or on inspection windows. The new TURCK sensor series features excellent EMC and ESD properties. Mounting in metal flanges induces lateral predamping which disturbs normal sensor. This effect is neutralized with a laterally mounted shield and an integrated processing unit. A constant switching distance is thus achieved.

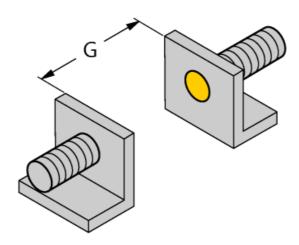


Switching state

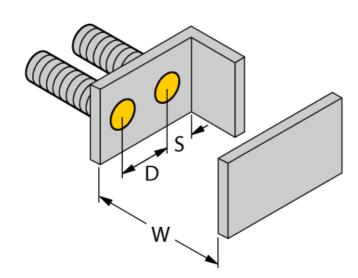




Mounting instructions/Description	minimum distances
Distance D	60 mm
Distance W	30 mm
Distance S	45 mm
Distance G	60 mm
Diameter active area B	Ø 30 mm



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.



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Accessories

Type code	Ident-No.	Description	
MAP-M30	6950013	Mounting adapter; material: Polypropylene; sensor replacement with filled container possible (adapter remains in container during sensor replacement)	0.52 3.46 R 1 1/4 M30 x 1.5 0.31 23 32 47
BST-30B	6947216	Fixing clamp for threaded barrel devices, with dead-stop; material: PA6	M5 64 20 54 42 36 36 30 30

Wiring accessories

Type code	Ident-No.	Description	
RKC4.4T-2/TXL	6625503	Connection cable, female M12, straight, 4-pin, cable length: 2 m, sheath material: PUR, black; cULus approval; other cable lengths and qualities available, see www.turck.com	M12x1 e 15 1/2 14
WKC4.4T-2/TXL	6625515	Connection cable, female M12, angled, 4-pin, cable length: 2 m, sheath material: PUR, black; cULus approval; other cable lengths and qualities available, see www.turck.com	0 15 M12x 1 26.5 32 32
WKC4.4T-2/TEL	6625025	Connection cable, female M12, angled, 4-pin, cable length: 2 m, sheath material: PVC, black; cULus approval; other cable lengths and qualities available, see www.turck.com	8 15 M12 x 1 26.5 14 32

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Wiring accessories

Type code	Ident-No.	Description	
RKC4.4T-P7X2-10/TXL	6626184	Connection cable, female M12, angled, 4-pin, cable length: 10m, sheath material: PUR, black; cULus approval; other cable lengths and qualities available, see www.turck.com	M12 x 1 14 o 16.2 48.5 48.5