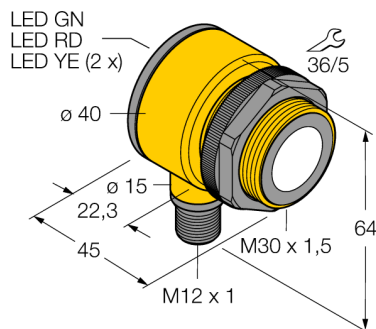


Ultrasonic Sensor

diffuse mode sensor

With Analog Output

T30UINBQ-CRFV



Type	T30UINBQ-CRFV
ID	3074839

Ultrasonic data	
Function	Proximity switch
Range	300...1000 mm
Ultrasound frequency	128 kHz
Repeatability	≤ ± 0.75 mm

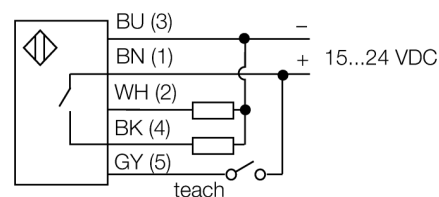
Electrical data	
Operating voltage U_s	15...24 VDC
Response time typical	< 96 ms
Output function	NO contact, PNP/Analog output
Current output	4...20 mA
Switching frequency	≤ 10 Hz
Hysteresis	≤ 2.5 mm

Mechanical data	
Design	Tube, T30U
Radiation direction	straight
Dimensions	Ø 40 x 45 mm
Housing material	Plastic, PBT
Transducer material	Plastic, Epoxyd resin and PU foam
Electrical connection	Connector, M12 × 1, PVC
Ambient temperature	-20...+70 °C
Protection class	IP67
Power-on indication	LED
Switching state	LED, Yellow
Object detected	LED, Red

Tests/approvals	
MTTF	246 years acc. to SN 29500 (Ed. 99) 40 °C
Approvals	CE

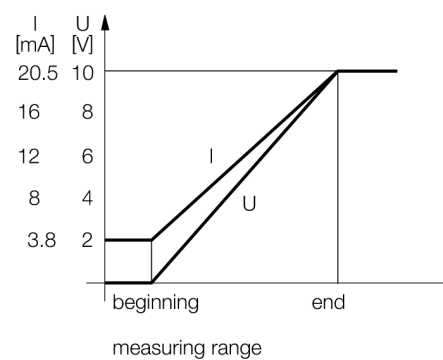
- Compact design
- Connection via male M12 x 1
- Operating voltage 15...24 VDC
- PNP transistor output and analog output for current
- Measuring range adjustable via teach-in
- Blind zone: 30 cm
- Range: 200 cm

Wiring Diagram

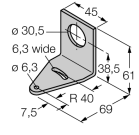
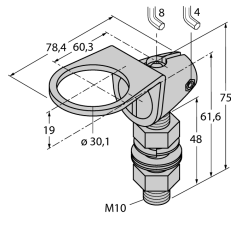
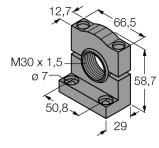


Functional principle

Ultrasonic sensors detect a multitude of objects contactless and wear-free with ultrasonic waves. Regardless of whether the object is transparent or opaque, metallic or non-metallic, liquid, solid or powdery. Even environmental conditions such as spray, dust or rain hardly affect their function.



Accessories

Type code	Ident no.		Dimension drawing
SMB30A	3032723	Mounting bracket, rectangular, stainless steel, for sensors with 30mm thread	 Technical drawing of the SMB30A mounting bracket. It is a rectangular stainless steel bracket for sensors with a 30mm thread. Dimensions include: top width 45, top hole diameter $\varnothing 30,5$, top hole offset 6,3 wide, bottom hole diameter $\varnothing 6,3$, bottom hole offset 38,5, bottom hole offset 6,1, bottom width 69, bottom hole diameter $\varnothing 7,5$, and a radius R 40.
SMB30FAM10	3011185	Mounting bracket, stainless steel, for M10 x 1.5 thread, thread length 30 mm	 Technical drawing of the SMB30FAM10 mounting bracket. It is a stainless steel bracket for M10 x 1.5 thread, with a thread length of 30 mm. Dimensions include: top width 78,4, top hole diameter $\varnothing 60,3$, top hole offset 1, top hole offset 19, top hole diameter $\varnothing 30,1$, top hole offset 48, top hole offset 61,6, top hole offset 75, top hole diameter $\varnothing 8$, top hole offset 4, and a bottom hole diameter $\varnothing 10$.
SMB30SC	3052521	Mounting bracket, PBT black, for sensors with 30 mm thread, rotatable	 Technical drawing of the SMB30SC mounting bracket. It is a PBT black, rotatable bracket for sensors with a 30 mm thread. Dimensions include: top width 12,7, top hole diameter $\varnothing 66,5$, top hole offset 58,7, top hole diameter $\varnothing 7$, top hole offset 50,8, top hole offset 29, and a bottom hole diameter $\varnothing 10$.