

Inductive sensor

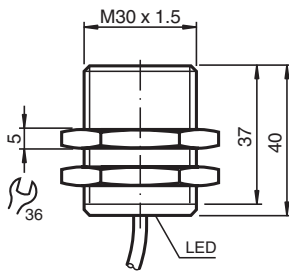
NCB10-30GM40-N0-5M-OG



- 10 mm flush
- NAMUR output
- Polarity reversal protected
- Stainless steel housing
- Shielded PUR cable for oil and gas sector



Dimensions



Technical Data

General specifications

Switching function		Normally closed (NC)
Output type		NAMUR
Rated operating distance	s_n	10 mm
Installation		flush
Assured operating distance	s_a	0 ... 8.1 mm
Actual operating distance	s_r	9 ... 11 mm typ.
Reduction factor r_{Al}		0.32
Reduction factor r_{Cu}		0.32
Reduction factor r_{304}		0.72
Output type		3-wire

Nominal ratings

Nominal voltage	U_o	8.2 V (R_i approx. 1 k Ω)
Switching frequency	f	0 ... 650 Hz
Hysteresis	H	1 ... 10 % typ. 5 %
Reverse polarity protection		reverse polarity protected
Short-circuit protection		yes

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Technical Data

Suitable for 2:1 technology	yes , Reverse polarity protection diode not required	
Current consumption		
Measuring plate not detected	min. 3 mA	
Measuring plate detected	≤ 1 mA	
Switching state indicator	LED, yellow	
Functional safety related parameters		
MTTF _d	1870 a	
Mission Time (T _M)	20 a	
Diagnostic Coverage (DC)	0 %	
Compliance with standards and directives		
Standard conformity		
NAMUR	EN 60947-5-6:2000 IEC 60947-5-6:1999	
Standards	EN IEC 60947-5-2	
Approvals and certificates		
IECEX approval		
Equipment protection level Ga	IECEX PTB 11.0037X	
Equipment protection level Gb	IECEX PTB 11.0037X	
Equipment protection level Da	IECEX PTB 11.0037X	
Equipment protection level Mb	IECEX PTB 11.0037X	
ATEX approval		
Equipment protection level Ga	PTB 00 ATEX 2048 X	
Equipment protection level Gb	PTB 00 ATEX 2048 X	
Equipment protection level Da	PTB 00 ATEX 2048 X	
UL approval		
Ordinary Location	E87056	
Hazardous Location	E501628	
Control drawing	116-0452	
ANZEx	18.3018X	
Ambient conditions		
Ambient temperature	-25 ... 80 °C (-13 ... 176 °F)	
Storage temperature	-40 ... 80 °C (-40 ... 176 °F)	
Mechanical specifications		
Connection type	cable	
Housing material	Stainless steel 1.4305 / AISI 303	
Sensing face	PBT	
Degree of protection	IP66 / IP67	
Cable		
Wire end ferrules	yes	
Cable diameter	6.7 mm ± 0.3 mm	
Bending radius	> 7.5 x cable diameter	
Material	PUR	
Color	blue	
Number of cores	2	
Core cross section	0.5 mm ²	
Length	L	5 m
Dimensions		
Length	40 mm	
Diameter	30 mm	
Note	The shield is not connected to the sensor.	
General information		
Scope of delivery	2 self locking nuts in scope of delivery	
Use in the hazardous area	see instruction manuals	

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Connection

