

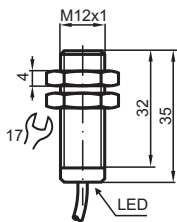


Inductive sensor NCB2-12GM35-N0

- 2 mm flush
- Usable up to SIL 2 acc. to IEC 61508



Dimensions



Technical Data

General specifications

Switching function		Normally closed (NC)
Output type		NAMUR
Rated operating distance	s_n	2 mm
Installation		flush
Assured operating distance	s_a	0 ... 1.62 mm
Actual operating distance	s_r	1.8 ... 2.2 mm typ.
Reduction factor r_{AI}		0.23
Reduction factor r_{Cu}		0.21
Reduction factor r_{304}		0.7
Output type		2-wire

Nominal ratings

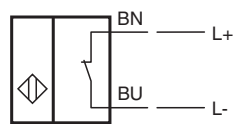
Nominal voltage	U_o	8.2 V (R_i approx. 1 k Ω)
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Technical Data

Switching frequency	f	0 ... 1000 Hz
Hysteresis	H	1 ... 10 typ. 3 %
Reverse polarity protection		reverse polarity protected
Short-circuit protection		yes
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		all direction LED, yellow
Functional safety related parameters		
MTTF _d		2099 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
Electromagnetic compatibility		NE 21:2007
Standards		EN 60947-5-2:2007 EN 60947-5-2/A1:2012 IEC 60947-5-2:2007 IEC 60947-5-2 AMD 1:2012
Approvals and certificates		
EAC conformity		TR CU 012/2011
FM approval		
Control drawing		116-0165
UL approval		
Ordinary Location		E87056
Hazardous Location		E501628
Control drawing		116-0452
CSA approval		cCSAus Listed, General Purpose
CCC approval		CCC approval / marking not required for products rated ≤36 V
Ambient conditions		
Ambient temperature		-25 ... 100 °C (-13 ... 212 °F)
Storage temperature		-40 ... 100 °C (-40 ... 212 °F)
Mechanical specifications		
Connection type		cable PVC , 2 m
Core cross-section		0.34 mm ²
Housing material		Stainless steel 1.4305 / AISI 303
Sensing face		PBT
Degree of protection		IP66 / IP67
Cable		
Cable diameter		4.6 mm ± 0.2 mm
Bending radius		> 12 x cable diameter
Equipment protection level Dc (tc)		
Special conditions		
Maximum permissible ambient temperature T _{Umax}		Values can be obtained from the following list, depending on the max. operating voltage U _{Bmax} and the minimum series resistance R _v .
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



Accessories

	EXG-12	Quick mounting bracket with dead stop
	BF 12	Mounting flange, 12 mm

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