

Inductive sensor

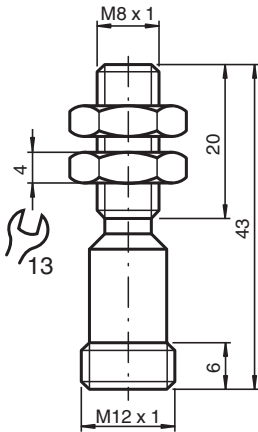
NJ1,5-8GM-N-V1



- 1.5 mm flush
- Usable up to SIL 2 acc. to IEC 61508
- NAMUR output
- Stainless steel housing



Dimensions



Technical Data

General specifications

Switching function		Normally closed (NC)
Output type		NAMUR
Rated operating distance	s_n	1.5 mm
Installation		flush
Assured operating distance	s_a	0 ... 1.215 mm
Actual operating distance	s_r	1.35 ... 1.65 mm typ.
Reduction factor r_{Al}		0.4
Reduction factor r_{Cu}		0.3
Reduction factor r_{304}		0.85
Output type		2-wire

Nominal ratings

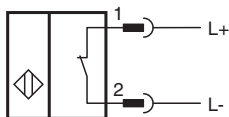
Nominal voltage	U_o	8.2 V (R_f approx. 1 k Ω)
Switching frequency	f	0 ... 5000 Hz
Hysteresis	H	1 ... 10 % typ. 5 %
Suitable for 2:1 technology		yes , Reverse polarity protection diode not required
Current consumption		
Measuring plate not detected		min. 3 mA

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Technical Data

Measuring plate detected	≤ 1 mA
Functional safety related parameters	
Safety Integrity Level (SIL)	SIL 2
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 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 Gb	PTB 00 ATEX 2048 X
Equipment protection level Da	PTB 00 ATEX 2048 X
UL approval	
cULus Listed, General Purpose	
CCC approval	
Hazardous Location	2020322315002256
CML approval	
on request	
ANZEx	
18.3018X	
Marine approval	
DNVGL TAA00001A5	
Ambient conditions	
Ambient temperature	-25 ... 100 °C (-13 ... 212 °F)
Mechanical specifications	
Connection type	Connector plug
Housing material	Stainless steel 1.4305 / AISI 303
Sensing face	PBT
Degree of protection	IP67
Connector	
Threading	M12 x 1
Number of pins	4
Dimensions	
Length	20 mm
Diameter	8 mm
General information	
Scope of delivery	2 self locking nuts in scope of delivery
Use in the hazardous area	see instruction manuals

Connection



Connection Assignment



Wire colors in accordance with EN 60947-5-6

1		BN	(brown)
2		BU	(blue)