

Inductive sensor

NJ6-22-SN-G-10M

- 6 mm flush
- Usable up to SIL 3 acc. to IEC 61508
- ATEX approval Ex-i and Ex-nA/tc for zone 0-2 and zone 20-22
- Degree of protection IP68



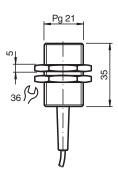








Dimensions



Technical Data

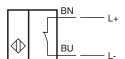
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General specifications		
Switching function		Normally closed (NC)
Output type		NAMUR with safety function
Rated operating distance	s _n	6 mm
Installation		flush
Assured operating distance	Sa	0 4.86 mm
Reduction factor r _{Al}		0.4
Reduction factor r _{Cu}		0.3
Reduction factor r ₃₀₄		0.85
Safety Integrity Level (SIL)		up to SIL3 acc. to IEC 61508 Danger! In safety-related applications the sensor must be operated with a qualified fail safe interface from Pepperl+Fuchs, such as KFD2-SH-EX1. Consider the "exida Functional Safety Assessment" document which is available on www.pepperl-fuchs.com as an integral part of this product's documentation.
Output type		2-wire
Nominal ratings		
Nominal voltage	Uo	8.2 V (R _i approx. 1 kΩ)
Switching frequency	f	0 2000 Hz
Suitable for 2:1 technology		yes , with reverse polarity protection diode



Technical Data Current consumption Measuring plate not detected ≥ 3 mA Measuring plate detected ≤ 1 mA Functional safety related parameters Safety Integrity Level (SIL) SIL 3 11850 a MTTF_d 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 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 IECEx approval IECEx PTB 11.0092X Equipment protection level Ga IECEx PTB 11.0092X Equipment protection level Gb Equipment protection level Da IECEx PTB 11.0092X IECEx PTB 11.0092X Equipment protection level Mb ATEX approval Equipment protection level Ga PTB 00 ATEX 2049 X Equipment protection level Gb PTB 00 ATEX 2049 X PF15CFRT3754X Equipment protection level Gc (nA) Equipment protection level Da PTB 00 ATEX 2049 X Equipment protection level Dc (tc) PF15CERT3774X **UL** approval cULus Listed, General Purpose E87056 **Ordinary Location** Hazardous Location E501628 Control drawing 116-0454 CCC approval 2020322315002308 Hazardous Location NEPSI approval **NEPSI** certificate GYJ16.1392X **Ambient conditions** Ambient temperature -40 ... 100 °C (-40 ... 212 °F) Mechanical specifications Connection type cable silicone, 10 m 0.75 mm² Core cross-section Housing material stainless steel (303/1.4305) Sensing face Valox (PBT), green IP68 Degree of protection Cable Cable diameter 6 mm ± 0.2 mm Bending radius > 10 x cable diameter **General information** Use in the hazardous area see instruction manuals





Application

Danger!

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