



Model Number

NJ6-22-N-5M

Features

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

Technical Data

General specifications

Switching function		Normally closed (NC)
Output type		NAMUR
Rated operating distance	s_n	6 mm
Installation		flush
Assured operating distance	s_a	0 ... 4.86 mm
Reduction factor r_{AI}		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 V
Switching frequency	f	0 ... 2000 Hz
Hysteresis	H	typ. %
Current consumption		
Measuring plate not detected		≥ 3 mA
Measuring plate detected		≤ 1 mA

Functional safety related parameters

MTTF _d		4566 a
Mission Time (T_M)		20 a
Diagnostic Coverage (DC)		0 %

Ambient conditions

Ambient temperature		-25 ... 100 °C (-13 ... 212 °F)
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Mechanical specifications

Connection type		cable PVC , 5 m
Core cross-section		0.75 mm ²
Housing material		PBT
Sensing face		PBT
Degree of protection		IP68
Cable		
Bending radius		> 10 x cable diameter

General information

Use in the hazardous area		see instruction manuals
Category		2G; 3G

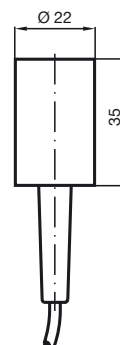
Compliance with standards and directives

Standard conformity		
NAMUR		EN 60947-5-6:2000 IEC 60947-5-6:1999
Standards		EN 60947-5-2:2007 IEC 60947-5-2:2007

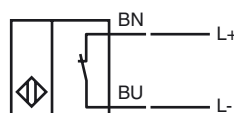
Approvals and certificates

FM approval		
Control drawing		116-0165
UL approval		cULus Listed, General Purpose
CSA approval		cCSAus Listed, General Purpose
CCC approval		CCC approval / marking not required for products rated ≤ 36 V

Dimensions



Electrical Connection



Equipment protection level GbCE marking **CE** 0102Effective internal inductivity C_i ≤ 130 nF ; a cable length of 10 m is considered.Effective internal inductance L_i ≤ 100 μ H ; a cable length of 10 m is considered.Maximum permissible ambient temperature T_{amb} Details of the correlation between the type of circuit connected, the maximum permissible ambient temperature, the temperature class, and the effective internal reactance values can be found on the EU-type examination certificate.**Equipment protection level Gc (ic)**CE marking **CE**Effective internal inductivity C_i ≤ 130 nF ; a cable length of 10 m is considered.Effective internal inductance L_i ≤ 100 μ H ; A cable length of 10 m is considered.**Special conditions**for $P_i=34$ mW, $I_i=25$ mA, T6 70 °C (158 °F)for $P_i=34$ mW, $I_i=25$ mA, T5 85 °C (185 °F)for $P_i=34$ mW, $I_i=25$ mA, T4-T1 100 °C (212 °F)for $P_i=64$ mW, $I_i=25$ mA, T6 69 °C (156.2 °F)for $P_i=64$ mW, $I_i=25$ mA, T5 84 °C (183.2 °F)for $P_i=64$ mW, $I_i=25$ mA, T4-T1 100 °C (212 °F)for $P_i=169$ mW, $I_i=52$ mA, T6 51 °C (123.8 °F)for $P_i=169$ mW, $I_i=52$ mA, T5 66 °C (150.8 °F)for $P_i=169$ mW, $I_i=52$ mA, T4-T1 80 °C (176 °F)for $P_i=242$ mW, $I_i=76$ mA, T6 39 °C (102.2 °F)for $P_i=242$ mW, $I_i=76$ mA, T5 54 °C (129.2 °F)for $P_i=242$ mW, $I_i=76$ mA, T4-T1 61 °C (141.8 °F)**Equipment protection level Da**CE marking **CE** 0102Effective internal inductivity C_i ≤ 130 μ F
A cable length of 10 m is considered.Effective internal inductance L_i ≤ 100 μ H
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