

Inductive sensor

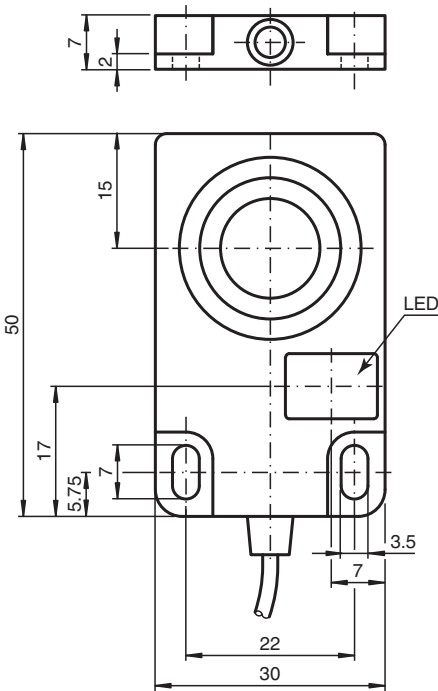
NBB10-F17-E3



- 10 mm flush
- 3-wire DC



Dimensions



Technical Data

General specifications

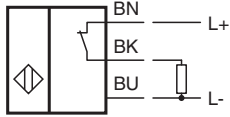
Switching function		Normally closed (NC)
Output type		PNP
Rated operating distance	s_n	10 mm
Installation		flush
Output polarity		DC
Assured operating distance	s_a	0 ... 8.1 mm
Actual operating distance	s_r	9 ... 11 mm typ. 10 mm
Reduction factor r_{AI}		0.36
Reduction factor r_{Cu}		0.31

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Technical Data

Reduction factor r_{304}		0.67
Output type		3-wire
Nominal ratings		
Operating voltage	U_B	10 ... 30 V DC
Switching frequency	f	0 ... 1000 Hz
Hysteresis	H	1 ... 10 % typ. 6 %
Reverse polarity protection		reverse polarity protected
Short-circuit protection		pulsing
Voltage drop	U_d	≤ 2.8 V
Operating current	I_L	0 ... 100 mA
No-load supply current	I_0	10 mA
Time delay before availability	t_v	≤ 1 ms
Switching state indicator		LED, yellow
Functional safety related parameters		
MTTF _d		1935 a
Mission Time (T_M)		20 a
Diagnostic Coverage (DC)		0 %
Compliance with standards and directives		
Standard conformity		
Standards		EN IEC 60947-5-2
Approvals and certificates		
UL approval		cULus Listed, General Purpose
CCC approval		CCC approval / marking not required for products rated ≤ 36 V
Ambient conditions		
Ambient temperature		-25 ... 70 °C (-13 ... 158 °F)
Storage temperature		-40 ... 85 °C (-40 ... 185 °F)
Mechanical specifications		
Connection type		cable
Housing material		PMMA
Sensing face		PMMA
Degree of protection		IP67
Cable		
Wire end ferrules		yes
Cable diameter		3 mm - 0.2 mm
Bending radius		$> 12 \times$ cable diameter
Material		PUR
Color		black
Number of cores		3
Core cross section		0.14 mm ²
Length	L	2 m
Dimensions		
Height		30 mm
Width		50 mm
Length		7 mm
Tightening torque		0.5 Nm ... 0.6 Nm

Connection Assignment



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