

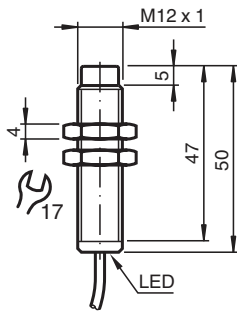
# Inductive sensor NBN4-12GM50-E2



■ 4 mm non-flush



## Dimensions



## Technical Data

### General specifications

Switching function		Normally open (NO)
Output type		PNP
Rated operating distance	$s_n$	4 mm
Installation		non-flush
Output polarity		DC
Assured operating distance	$s_a$	0 ... 3.24 mm
Reduction factor $r_{Al}$		0.5
Reduction factor $r_{Cu}$		0.4
Reduction factor $r_{304}$		0.8
Output type		3-wire
Hysteresis	H	typ. 5%

### Nominal ratings

Operating voltage	$U_B$	10 ... 30 V
Switching frequency	f	0 ... 1200 Hz
Reverse polarity protection		reverse polarity protected

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Refer to "General Notes Relating to Pepperl+Fuchs Product Information".

Pepperl+Fuchs Group  
www.pepperl-fuchs.com

USA: +1 330 486 0001  
fa-info@us.pepperl-fuchs.com

Germany: +49 621 776 1111  
fa-info@de.pepperl-fuchs.com

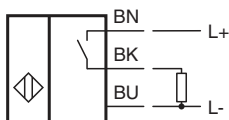
Singapore: +65 6779 9091  
fa-info@sg.pepperl-fuchs.com

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## Technical Data

Short-circuit protection		pulsing
Voltage drop	$U_d$	$\leq 3$ V
Repeat accuracy	R	$\leq 0.01$ mm
Operating current	$I_L$	0 ... 200 mA
Off-state current	$I_r$	0 ... 0.5 mA typ. 0.1 $\mu$ A at 25 °C
No-load supply current	$I_0$	$\leq 17$ mA
Time delay before availability	$t_v$	$\leq 8$ ms
Switching state indicator		LED, yellow
<b>Functional safety related parameters</b>		
MTTF <sub>d</sub>		990 a
Mission Time (T <sub>M</sub> )		20 a
Diagnostic Coverage (DC)		0 %
<b>Compliance with standards and directives</b>		
Standard conformity		
Standards		EN 60947-5-2:2007 EN 60947-5-2/A1:2012 IEC 60947-5-2:2007 IEC 60947-5-2 AMD 1:2012
<b>Approvals and certificates</b>		
EAC conformity		TR CU 020/2011
UL approval		cULus Listed, General Purpose
CSA approval		cCSAus Listed, General Purpose
CCC approval		CCC approval / marking not required for products rated $\leq 36$ V
<b>Ambient conditions</b>		
Ambient temperature		-25 ... 70 °C (-13 ... 158 °F)
<b>Mechanical specifications</b>		
Connection type		cable PVC , 2 m
Core cross-section		0.14 mm <sup>2</sup>
Housing material		brass, nickel-plated
Sensing face		PBT
Degree of protection		IP67
Cable		
Cable diameter		3 mm + 0.3 mm
Bending radius		> 10 x cable diameter
<b>General information</b>		
Scope of delivery		2 self locking nuts in scope of delivery

## Connection



## Accessories

	<b>BF 12</b>	Mounting flange, 12 mm
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