



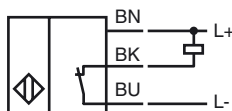
Model Number

NEB6-12GM50-E1

Features

- Increased operating distance
- 6 mm embeddable

Connection

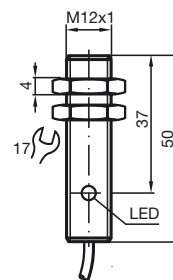


Accessories

BF 12

Mounting flange, 12 mm

Dimensions



Technical Data

General specifications

Switching element function	NPN	NC
Rated operating distance	s_n	6 mm
Installation	quasi embedd.	
Output polarity	DC	
Assured operating distance	s_a	0 ... 4.8 mm
Actuating element	structural steel, e. g. 1.0037, SR235JR (formerly St37-2) 18 mm x 18 mm x 1 mm	
Reduction factor r_{Al}	0.28	
Reduction factor r_{Cu}	0.2	
Reduction factor r_{304}	0.7	
Reduction factor r_{Brass}	0.35	

Nominal ratings

Installation conditions		
A	in steel 1.0037 (St37): 2.4 mm in other metal: 1.2 mm	
B	12 mm	
C	18 mm	
F	24 mm	
Operating voltage	U_B	10 ... 30 V DC
Switching frequency	f	0 ... 800 Hz
Hysteresis	H	0.06 ... 1.2 mm
Reverse polarity protected	yes	
Short-circuit protection	pulsing	
Overload resistance	yes	
Wire breakage protection	yes	
Surge suppression	yes	
Ripple	10 %	
Voltage drop	U_d	≤ 2 V
Repeat accuracy	0.3 mm	
Operating current	I_L	0 ... 200 mA, above 70 °C (158 °F) ≤ 150 mA
Off-state current	I_r	≤ 10 μ A
No-load supply current	I_0	≤ 15 mA
Indication of the switching state	LED, yellow	

Functional safety related parameters

MTTF _d	1740 a
Mission Time (T _M)	20 a
Diagnostic Coverage (DC)	0 %

Ambient conditions

Ambient temperature	-25 ... 85 °C (-13 ... 185 °F)
Storage temperature	-40 ... 85 °C (-40 ... 185 °F)

Mechanical specifications

Connection type	cable PUR, 2 m
Core cross-section	0.34 mm ²
Housing material	brass, nickel-plated
Sensing face	PBT
Protection degree	IP67
Mass	80 g

Compliance with standards and directives

Standard conformity	
Standards	EN 60947-5-2:2007 IEC 60947-5-2:2007

Approvals and certificates

UL approval	cULus Listed, General Purpose
CCC approval	Products with a maximum operating voltage of ≤ 36 V do not bear a CCC marking because they do not require approval.

Installation conditions

