

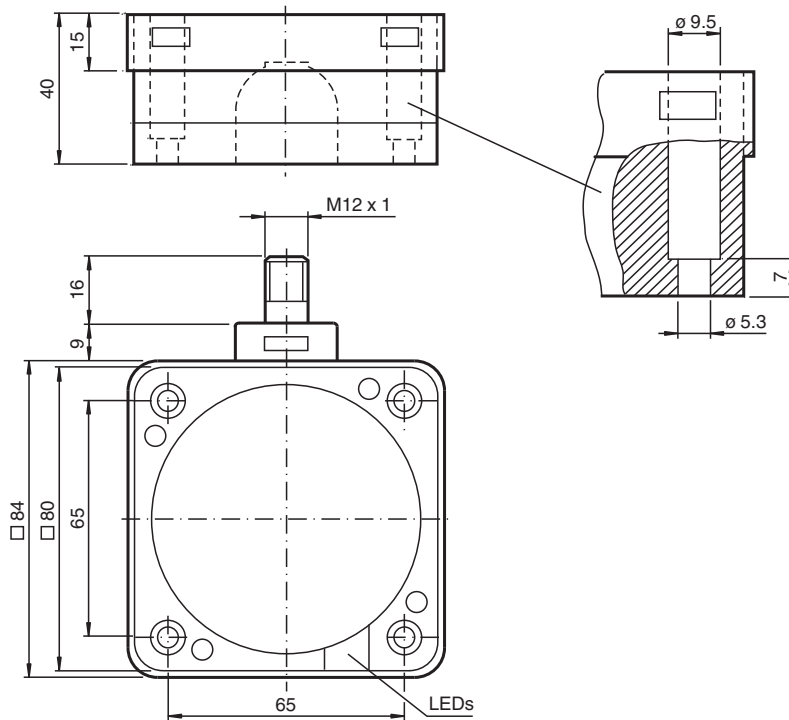
Inductive sensor

NCB50-FP-Z5-V1

- 50 mm flush
- 2-wire DC



Dimensions



Technical Data

General specifications

Switching function		Normally closed (NC)
Output type		Two-wire
Rated operating distance	s_n	50 mm
Installation		flush
Output polarity		DC
Assured operating distance	s_a	0 ... 40.5 mm
Reduction factor r_{Al}		0.4
Reduction factor r_{Cu}		0.35
Reduction factor r_{304}		0.8

Nominal ratings

Operating voltage	U_B	10 ... 60 V DC
Switching frequency	f	0 ... 80 Hz
Hysteresis	H	0 ... 20 typ. 5 %
Reverse polarity protection		reverse polarity protected
Short-circuit protection		pulsing

Release date: 2020-09-02 Date of issue: 2020-09-03 Filename: 182469_eng.pdf

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

PEPPERL+FUCHS

Technical Data

Voltage drop	U_d	$\leq 3.8 \text{ V}$
Voltage drop at I_L		
Voltage drop $I_L = 20 \text{ mA}$, switching element on	U_d	$2.7 \dots 4.9 \text{ V}$
Operating current	I_L	$2 \dots 200 \text{ mA}$
Lowest operating current	I_m	2 mA
Off-state current	I_r	$\leq 0.6 \text{ mA}$
Time delay before availability	t_v	$\leq 300 \text{ ms}$
Switching state indicator		LED, yellow

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
CSA approval		cCSAus Listed, General Purpose

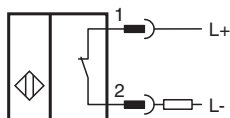
Ambient conditions

Ambient temperature		$-25 \dots 70 \text{ }^\circ\text{C}$ ($-13 \dots 158 \text{ }^\circ\text{F}$)
Storage temperature		$-25 \dots 85 \text{ }^\circ\text{C}$ ($-13 \dots 185 \text{ }^\circ\text{F}$)

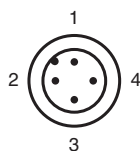
Mechanical specifications

Connection type		Connector M12 x 1, 4-pin
Housing material		PBT
Sensing face		PBT
Housing base		PBT
Degree of protection		IP68

Connection



Connection Assignment



Wire colors in accordance with EN 60947-5-2

1	BN	(brown)
2	WH	(white)
3	BU	(blue)
4	BK	(black)

Accessories

	V1-G-2M-PUR	Female cordset, M12, 4-pin, PUR cable
	V1-W-2M-PUR	Female cordset, M12, 4-pin, PUR cable

Release date: 2020-09-02 Date of issue: 2020-09-03 Filename: 182469_eng.pdf