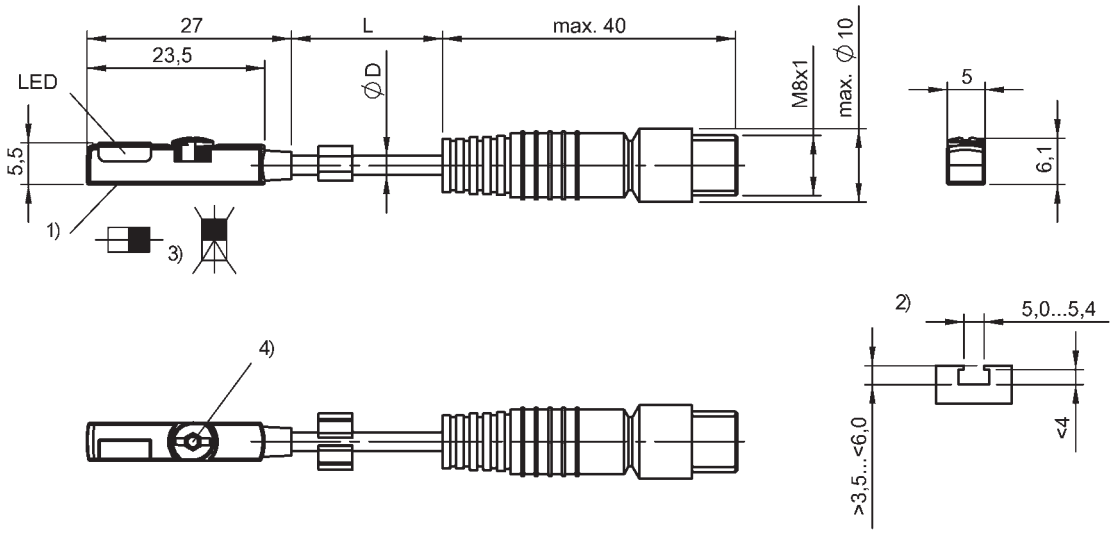
Magnetic field sensor

BMF 235K-PS-C-2A-SA2-S49-00,3
BMF00C4

BALLUFF
sensors worldwide



1) Active surface 2) See remarks 3) See remarks 4) See remarks

- **Magnetic field sensor**
- **Normally open (NO)**
- **miniature**

LISTED IND. CONT. EQ. 81U2 for use in the secondary of a class 2 source of supply

General attributes

Approvals / Conformity	cULus CE
Basic standard	IEC 60947-5-2
Enclosure Type per IEC 60529	IP67
Function indicator	yes
Polarity reversal protected	yes
Scope of delivery	Cable clip for T-slot
Short circuit protected	yes
Trademark	GLOBAL

Electrical attributes

Assured switching field streng	2.0 kA/m
Connection type	Cable with connector
Eff. operating current Ie	200 mA
Eff. operating voltage Ue DC	24.0 V
Electrical version	DC, direct current
Hysteresis H max. (in % of Hn)	45 %
Load capacitance max. (at Ue)	1.00 µF
Max. no-load cur. Io undamped	3.0 mA
No-load current Io damped max.	6.0 mA
Operating voltage UB max. DC [V]	30.0 V
Operating voltage UB min. DC [V]	10.0 V
Rated insulation voltage Ui	75 DC
Rated short circuit current	100 A
Rated switching field strength	1.2 kA/m
Ripple max. (% of Ue)	15 %
Switching freq. f max. (at Ue)	3000 Hz
Switching function	Normally open (NO)
Switching output	PNP
Turn on time ton max.	0.10 ms
Voltage drop static max.	2.5 V

Mechanical attributes

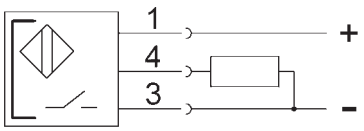
Ambient temperature Ta max.	85 °C
Ambient temperature Ta min.	-25 °C
Cable diameter D max.	2.5 mm
Cable jacket material	PUR
Cable length	0.30 m
Connector type	M08x1-S49
Depth	5.50 mm
Height (small side)	5.00 mm
Housing material	PA 12
Sensing face material	PU
Temperature drift max. % of Hn	0.3 %
Tightening torque	0.4 Nm
Width (long side)	23.5 mm

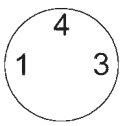
Additional text

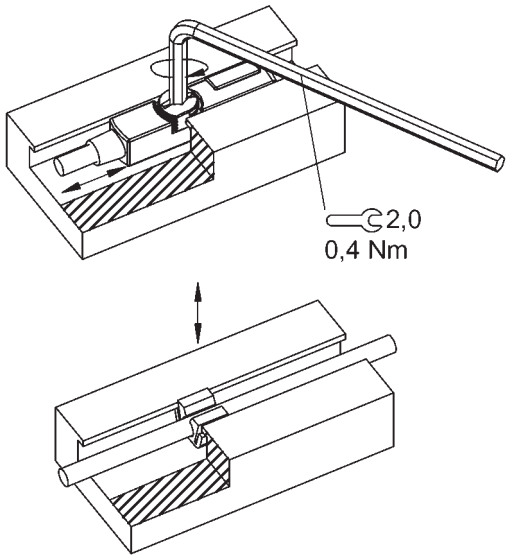
3) Damping magnet, axially magnetized
- Rated operating current Ie for thermally coupled installation in metal.
2) Application area: pneumatic cylinder with t-slot. For dimensions, see

sketch in product view.
4) Hex key size 2.0 mm: Max. tightening torque 0.4 Nm.

Screwdriver 4x0.8 mm: Max. tightening torque 1 Nm






2,0
0,4 Nm