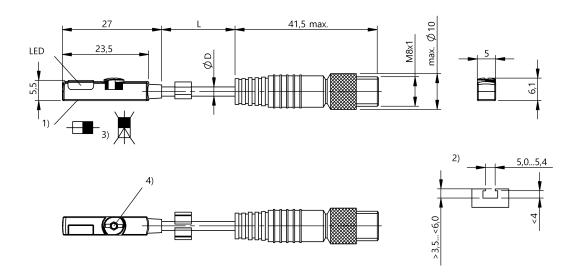
## Magnetic Sensors BMF 235K-PS-C-2A-SA2-S49-00,5 Order Code: BMF00CF

# BALLUFF



1) Sensing surface, 2) see remarks, 3) see remarks, 4) see remarks



#### **Basic features**

Approval/Conformity

Basic standard Principle of operation Scope of delivery Trademark

Application

Pneumatic cylinder with T-slot. For dimensions, see sketch in product view. cULus CE UKCA WEEE IEC 60947-5-2 Magnetic field sensor
120 000 17 0 2
Cable clip for T-slot Global

yes

### Display/Operation

Function indicator

#### **Electrical connection**

Cable	PUR, 0.5 m
Cable diameter D	2.50 mm
Connection	M8x1-Male, 3-pin
Polarity reversal protected	no
Protection against device mix-ups	no
Short-circuit protection	yes

#### Electrical data

Assured switching field strength Ha	2 kA/m
Hysteresis H max. (% of Hn)	45 %
Load capacitance max. at Ue	1 µF
No-load current lo max., undamped	3 mA
Operating voltage Ub	1030 VDC
Output resistance Ra	Open drain
Rated insulation voltage Ui	75 V DC
Rated operating current le	200 mA
Rated operating voltage Ue DC	24 V
Rated short circuit current	100 A
Rated switch field strength Hn	1.2 kA/m
Residual current Ir max.	80 µA
Ripple max. (% of Ue)	15 %
Switching frequency	3000 Hz
Turn-off delay toff max.	0.1 ms
Turn-on delay ton max.	0.1 ms
Utilization category	DC -13
Voltage drop static max.	2.5 V

## Environmental conditions

Ambient temperature	-2585 °C
Contamination scale	3
EN 60068-2-27, Shock	Half-sinus, 30 g <sub>n</sub> , 11 ms
EN 60068-2-6, Vibration	55 Hz, amplitude 1 mm, 3x30 min
ESD	3A(8KV)
Emission	Group 1, Class B
IP rating	IP67

## Magnetic Sensors BMF 235K-PS-C-2A-SA2-S49-00,5 Order Code: BMF00CF



Functional safety		Mechanical data	
MTTF (40 °C)	355 a	Dimension	23.5 x 5 x 5.5 mm
		Mounting part	can be installed in T-slot from
Interface			above
Switching output	PNP normally open (NO)	Tightening torque	0.4 Nm
Material		Range/Distance	
		Temp. drift max. (% of Hn)	0.3 %
Housing material	PA 12		
Material jacket	PUR		
	PU		

#### Remarks

Damping magnet axially magnetized

Effective operating current le with thermally coupled installation in metal.

2) Application area: pneumatic cylinder with t-slot. For dimensions, see sketch in product view.

4) Allen wrench 2.0 mm: max. tightening torque 0.4 Nm. Screw driver 4x0.8 mm: max. tightening torque 1 Nm

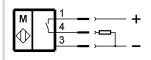
UL-MARKINGS: - For use in NFPA 79 Applications only - Adapters providing field wiring means are available from the manufacturer. Refer to manufacturers information.

For more information about MTTF and B10d see MTTF / B10d Certificate

Indication of the MTTF- / B10d value does not represent a binding composition and/or life expectancy assurance; these are simply experiential values with no warranty implications. These declared values also do not extend the expiration period for defect claims or affect it in any way.

### **Connector Drawings**

## Wiring Diagrams (Schematic)



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Help Views

