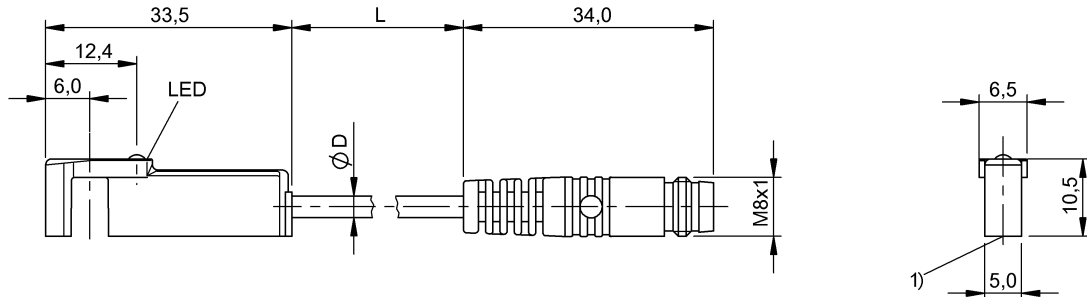


BMF 305K-PS-C-2-S49-00,5 BMF005J



1) Sensing surface



Display/Operation

Function indicator yes

Electrical connection

Cable diameter D 2.90 mm
 Cable length 0.5 m
 Connection M8x1-Connector, 3-pole
 Connection type Cable with connector, 0.50 m, PUR
 Polarity reversal protected yes
 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
 MTTf (40 °C) 330 a
 No-load current I_o max., undamped 10 mA
 Operating voltage U_b 10...30 VDC
 Output resistance R_a Open drain
 Pollution degree 3
 Protected against miswiring yes
 Rated insulation voltage U_i 75 V DC
 Rated operating current I_e DC 200 mA
 Rated operating voltage U_e DC 24 V
 Rated short circuit current 100 A
 Rated switch field strength H_n 1.2 kA/m
 Residual current I_r max. 80 µA
 Switching frequency 10000 Hz
 Turn-off delay t_{off} max. 0.05 ms
 Turn-on delay t_{on} max. 0.05 ms

Utilization category DC -13
 Voltage drop static max. 3.1 V

Environmental conditions

Ambient temperature -25...85 °C
 Protection type IEC 60529 IP67

Functional safety

Diagnostic coverage 0 %
 Functional safety no
 Mission Time 20 a

General data

Approval/Conformity CE
cULus
 Basic standard IEC 60947-5-2
 Not incl. in scope of delivery Mounting bracket, e.g. BMF 305-HW-17

Material

Housing material LCP
 Material jacket PUR
 Material sensing surface PU

Mechanical data

Dimension 33.5 x 5 x 10.5 mm

Output/Interface

Switching output PNP Normally open (NO)

BMF 305K-PS-C-2-S49-00,5 BMF005J

Range/Distance

Ripple max. (% of Ue)	15 %
Temp. drift max. (% of Hn)	0.3 %

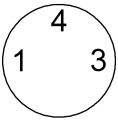
Remarks

The sensor is functional again after the overload has been eliminated.

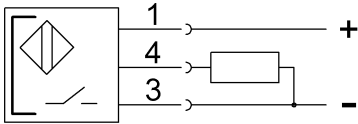
For further information on MTTF/B10d, please refer to the MTTF / B10d Certificate.

Specification of the MTTF value and the B10d value do not represent any binding quality and/or life expectancy guarantees.

Connector view



Wiring Diagram



Diagram

