

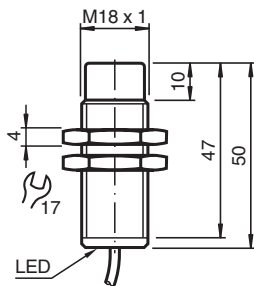
# Inductive sensor NJ8-18GM50-A2-10M



■ 8 mm non-flush



## Dimensions



## Technical Data

### General specifications

|                            |       |               |
|----------------------------|-------|---------------|
| Switching function         |       | complementary |
| Output type                |       | PNP           |
| Rated operating distance   | $s_n$ | 8 mm          |
| Installation               |       | non-flush     |
| Output polarity            |       | DC            |
| Assured operating distance | $s_a$ | 0 ... 6.48 mm |
| Reduction factor $r_{AI}$  |       | 0.45          |
| Reduction factor $r_{Cu}$  |       | 0.4           |
| Reduction factor $r_{304}$ |       | 0.7           |
| Output type                |       | 4-wire        |

### Nominal ratings

|                             |       |                            |
|-----------------------------|-------|----------------------------|
| Operating voltage           | $U_B$ | 10 ... 60 V                |
| Switching frequency         | $f$   | 0 ... 500 Hz               |
| Hysteresis                  | $H$   | typ. 8 %                   |
| Reverse polarity protection |       | reverse polarity protected |
| Short-circuit protection    |       | pulsing                    |

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Refer to "General Notes Relating to Pepperl+Fuchs Product Information".

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**PEPPERL+FUCHS**

# Technical Data

|                                          |                           |                                                   |
|------------------------------------------|---------------------------|---------------------------------------------------|
| Voltage drop                             | U <sub>d</sub>            | ≤ 3 V                                             |
| Operating current                        | I <sub>L</sub>            | 0 ... 400 mA                                      |
| Off-state current                        | I <sub>r</sub>            | 0 ... 0.5 mA                                      |
| No-load supply current                   | I <sub>0</sub>            | ≤ 15 mA                                           |
| Switching state indicator                | all direction LED, yellow |                                                   |
| Functional safety related parameters     |                           |                                                   |
| MTTF <sub>d</sub>                        |                           | 1150 a                                            |
| Mission Time (T <sub>M</sub> )           |                           | 20 a                                              |
| Diagnostic Coverage (DC)                 |                           | 0 %                                               |
| Compliance with standards and directives |                           |                                                   |
| Standard conformity                      |                           |                                                   |
| Standards                                |                           | EN IEC 60947-5-2                                  |
| Approvals and certificates               |                           |                                                   |
| UL approval                              |                           | cULus Listed, General Purpose                     |
| CCC approval                             |                           | Certified by China Compulsory Certification (CCC) |
| Ambient conditions                       |                           |                                                   |
| Ambient temperature                      |                           | -25 ... 70 °C (-13 ... 158 °F)                    |
| Storage temperature                      |                           | -40 ... 85 °C (-40 ... 185 °F)                    |
| Mechanical specifications                |                           |                                                   |
| Connection type                          |                           | cable                                             |
| Housing material                         |                           | Stainless steel 1.4305 / AISI 303                 |
| Sensing face                             |                           | PBT                                               |
| Degree of protection                     |                           | IP67                                              |
| Cable                                    |                           |                                                   |
| Wire end ferrules                        |                           | yes                                               |
| Cable diameter                           |                           | 6.2 mm ± 0.2 mm                                   |
| Bending radius                           |                           | > 10 x cable diameter                             |
| Material                                 |                           | PVC                                               |
| Color                                    |                           | black                                             |
| Number of cores                          |                           | 4                                                 |
| Core cross section                       |                           | 0.5 mm <sup>2</sup>                               |
| Length                                   | L                         | 10 m                                              |
| Dimensions                               |                           |                                                   |
| Length                                   |                           | 50 mm                                             |
| Diameter                                 |                           | 18 mm                                             |

# Connection

