

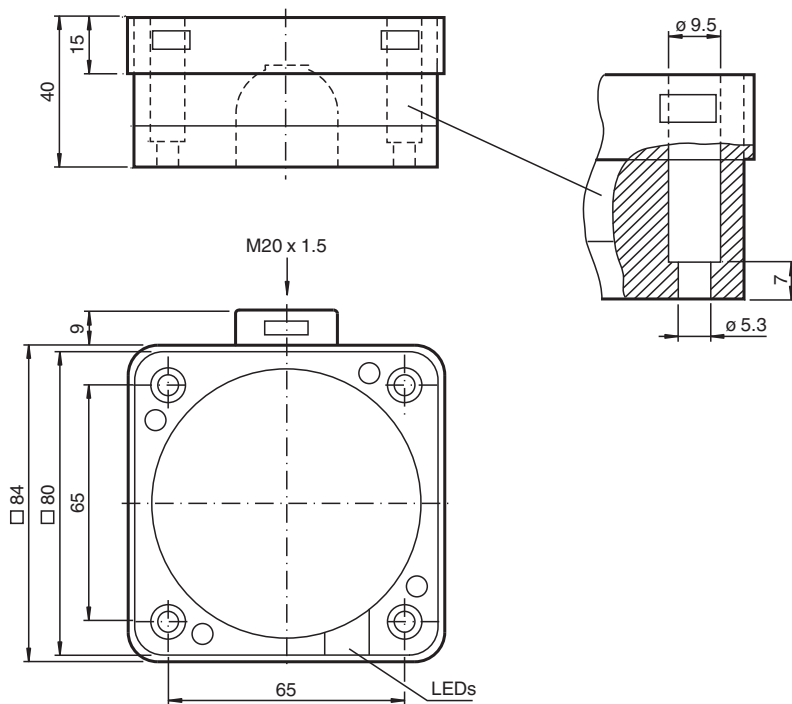


# Inductive sensor NCB40-FP-Z2-P1

■ Comfort series



## Dimensions



## Technical Data

### General specifications

|                            |       |                              |
|----------------------------|-------|------------------------------|
| Switching function         |       | Normally open/closed (NO/NC) |
| Output type                |       | Two-wire                     |
| Rated operating distance   | $s_n$ | 40 mm                        |
| Installation               |       | flush                        |
| Output polarity            |       | DC                           |
| Assured operating distance | $s_a$ | 0 ... 32.4 mm                |
| Actual operating distance  | $s_r$ | 36 ... 44 mm typ. 40 mm      |
| Reduction factor $r_{AI}$  |       | 0.35                         |
| Reduction factor $r_{Cu}$  |       | 0.35                         |

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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

|                                                 |       |                                                                                                                                            |
|-------------------------------------------------|-------|--------------------------------------------------------------------------------------------------------------------------------------------|
| Reduction factor $r_{304}$                      |       | 0.8                                                                                                                                        |
| Output type                                     |       | 2-wire                                                                                                                                     |
| <b>Nominal ratings</b>                          |       |                                                                                                                                            |
| Operating voltage                               | $U_B$ | 10 ... 60 V                                                                                                                                |
| Switching frequency                             | $f$   | 0 ... 50 Hz                                                                                                                                |
| Hysteresis                                      | $H$   | 0 ... 20 % typ. 5 %                                                                                                                        |
| Reverse polarity protection                     |       | reverse polarity tolerant                                                                                                                  |
| Short-circuit protection                        |       | pulsing                                                                                                                                    |
| Voltage drop                                    | $U_d$ | $\leq 6$ V                                                                                                                                 |
| Operating current                               | $I_L$ | 2 ... 200 mA                                                                                                                               |
| Off-state current                               | $I_r$ | 0.4 ... 1 mA typ. 0.6 mA                                                                                                                   |
| Time delay before availability                  | $t_v$ | $\leq 300$ ms                                                                                                                              |
| Switching state indicator                       |       | LED, yellow                                                                                                                                |
| <b>Compliance with standards and directives</b> |       |                                                                                                                                            |
| Standard conformity                             |       |                                                                                                                                            |
| Standards                                       |       | EN IEC 60947-5-2                                                                                                                           |
| <b>Approvals and certificates</b>               |       |                                                                                                                                            |
| UL approval                                     |       | cULus Listed, General Purpose                                                                                                              |
| CCC approval                                    |       | Certified by China Compulsory Certification (CCC)                                                                                          |
| <b>Ambient conditions</b>                       |       |                                                                                                                                            |
| Ambient temperature                             |       | -25 ... 70 °C (-13 ... 158 °F)                                                                                                             |
| Storage temperature                             |       | -25 ... 85 °C (-13 ... 185 °F)                                                                                                             |
| <b>Mechanical specifications</b>                |       |                                                                                                                                            |
| Connection type                                 |       | screw terminals                                                                                                                            |
| Information for connection                      |       | A maximum of two conductors with the same core cross section may be mounted on one terminal connection!<br>tightening torque 1.2 Nm + 10 % |
| Core cross section                              |       | up to 2.5 mm <sup>2</sup>                                                                                                                  |
| Minimum core cross-section                      |       | without wire end ferrules 0.5 mm <sup>2</sup> , with connector sleeves 0.34 mm <sup>2</sup>                                                |
| Maximum core cross-section                      |       | without wire end ferrules 2.5 mm <sup>2</sup> , with connector sleeves 1.5 mm <sup>2</sup>                                                 |
| Housing material                                |       | PBT                                                                                                                                        |
| Sensing face                                    |       | PBT                                                                                                                                        |
| Housing base                                    |       | PBT                                                                                                                                        |
| Degree of protection                            |       | IP67                                                                                                                                       |
| Dimensions                                      |       |                                                                                                                                            |
| Height                                          |       | 40 mm                                                                                                                                      |
| Width                                           |       | 84 mm                                                                                                                                      |
| Length                                          |       | 84 mm                                                                                                                                      |

## Connection

