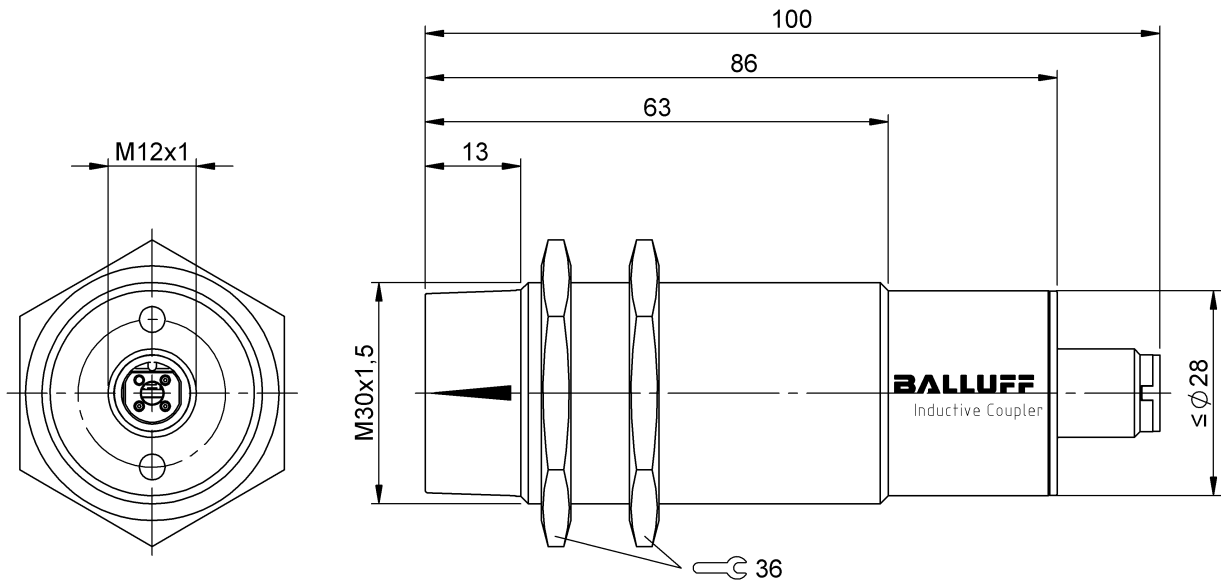


Inductive Couplers  
**BIC 1I0-IAA50-M30MI3-SM4A4A**  
 Order Code: BIC0053

**BALLUFF**



**Basic features**

|                            |  |
|----------------------------|--|
| <b>Approval/Conformity</b> | CE<br>UKCA<br>WEEE   |
| <b>Component</b>           | Base   |
| <b>Function</b>            | Uni IO-Link  |
| <b>Use</b>                 | for inductive coupler remote<br>BIC0054<br>for inductive coupler remote<br>BIC005H |

**Display/Operation**

|                                      |     |
|--------------------------------------|-----|
| <b>Active transmission indicator</b> | yes |
| <b>Function indicator</b>            | yes |
| <b>InZone indicator</b>              | yes |
| <b>Power indicator</b>               | yes |

**Electrical connection**

|                                 |                   |
|---------------------------------|-------------------|
| <b>Connection</b>               | M12x1-Male, 4-pin |
| <b>Short-circuit protection</b> | yes               |

**Electrical data**

|   |         |
|---|---------|
| <b>Rated operating current I<sub>e</sub></b>    | 1000 mA |
| <b>Rated operating voltage U<sub>e</sub> DC</b> | 24 V    |
| <b>Ripple max. (% of U<sub>e</sub>)</b>         | 5 %     |
| <b>Transmission power</b>                       | 12 W    |
| <b>Type of master port</b>                      | A       |

**Environmental conditions**

|                              |                      |
|------------------------------|----------------------|
| <b>Ambient temperature</b>   | -5...55 °C           |
| <b>IP rating</b>             | IP67                 |
| <b>Interference immunity</b> | EN 61000-4-2/3/4/5/6 |
| <b>Storage temperature</b>   | -25...75 °C          |

**Functional safety**

|                     |      |
|---------------------|------|
| <b>MTTF (40 °C)</b> | 87 a |
|---------------------|------|

**IO-Link**

|                           |     |
|---------------------------|-----|
| <b>IO-Link Profil IDs</b> | N/A |
|---------------------------|-----|

**Interface**

|                                |                   |
|--------------------------------|-------------------|
| <b>Frame type</b>              | 1                 |
| <b>IO-Link version</b>         | 1                 |
| <b>Interface</b>               | IO-Link 1.0       |
| <b>Process data IN</b>         | 11 bytes          |
| <b>Process data OUT</b>        | 0 bytes           |
| <b>Process data cycle min.</b> | 36 ms             |
| <b>SIO mode</b>                | no                |
| <b>Transfer rate</b>           | COM2 (38.4 kBaud) |

**Material**

|   |                             |
|---|-----------------------------|
| <b>Housing material</b>                     | Nickel-plated brass, coated |
| <b>Housing material, surface protection</b> | coated                      |
| <b>Material sensing surface</b>             | PC                          |

Inductive Couplers  
**BIC 1I0-IAA50-M30MI3-SM4A4A**  
Order Code: BIC0053

**BALLUFF**

**Mechanical data**

|                        |               |
|------------------------|---------------|
| Dimension              | Ø 30 x 100 mm |
| Installation           | non-flush     |
| Offset                 | ±4 mm         |
| Size                   | M30x1.5       |
| Tightening torque max. | 70 Nm         |

|                           |        |
|---------------------------|--------|
| Tightening torque pigtail | 0.6 Nm |
| Weight                    | 160 g  |

**Range/Distance**

|                       |          |
|-----------------------|----------|
| Range                 | 0...5 mm |
| Transmission distance | 0...5 mm |

**Remarks**

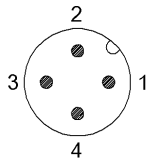
For additional information, refer to user's guide.

Order accessories separately.

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**



IO-Link

PIN 1: +24V

PIN 2: not used

PIN 3: GND, reference potential

PIN 4: IO-Link