

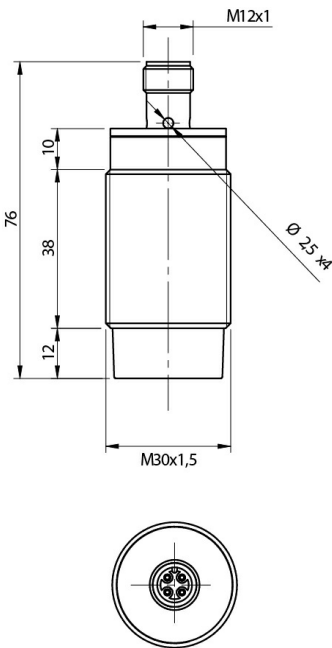


Indicative image



**M30 CYLINDRICAL INDUCTIVE SENSORS**

- Wide range of models: standard, long distance
- Output: cable, M12 and plug cable exit
- Models with 2, 3, and 4 wires
- ATEX models, cat. 3, available on request
- Models with complementary output (NO + NC)
- Complete protection against electrical damages



**Detection properties**

|                          |                                                                      |
|--------------------------|----------------------------------------------------------------------|
| Nominal sensing distance | 15mm                                                                 |
| Operanting distance      | 0...12,1mm                                                           |
| Standard target          | 45x45mm FE360                                                        |
| Correction Factor        | copper: 0,45 / aluminium: 0,50 / brass: 0,55 / stainless steel: 0,80 |
| Thermal drift of Sr      | < 10 %                                                               |
| Repeat Accuracy          | 5% (UB 24V Ta=23°C ±5°C)                                             |
| Hysteresis               | 1 ... 20%                                                            |

**Outputs**

|                     |         |
|---------------------|---------|
| Output type         | PNP     |
| Output Function     | NO + NC |
| Switching frequency | 200Hz   |

**Electrical data**

|                        |            |
|------------------------|------------|
| Operating Voltage      | 10...30Vdc |
| No-Load supply current | ≤ 20mA     |

|                                    |                         |
|------------------------------------|-------------------------|
| Load current                       | ≤ 400mA                 |
| Leakage current                    | ≤ 10μA                  |
| Output voltage drop                | ≤ 1V @400mA             |
| Max ripple content                 | ≤10%                    |
| LED indicators                     | Yellow LED output state |
| Time delay before availability     | ≤100ms                  |
| Short-circuit protection           | Yes                     |
| Reverse Polarity Protection        | Yes                     |
| Protection against inductive loads | Yes                     |

#### Mechanical data

|                       |                      |
|-----------------------|----------------------|
| Mounting              | Unshielded           |
| Dimensions            | M30 x 1,5 / L = 76mm |
| Weight                | 150g                 |
| Housing Material      | Nickel-plated brass  |
| Connections           | M12 Plug             |
| Active Head Material  | PBT                  |
| Tightening torque     | 50Nm                 |
| Operating temperature | -25°C...+70°C        |
| Diameter/Dimension    | M30                  |

#### Test/Approvals

|                       |                                                |
|-----------------------|------------------------------------------------|
| Approvals             | CE UR                                          |
| EMC compatibility     | IEC 60947-5-2                                  |
| Shocks and vibrations | Vibration IEC 60068-2-6 / Shock IEC 60068-2-27 |
| Degree of protection  | IP67                                           |

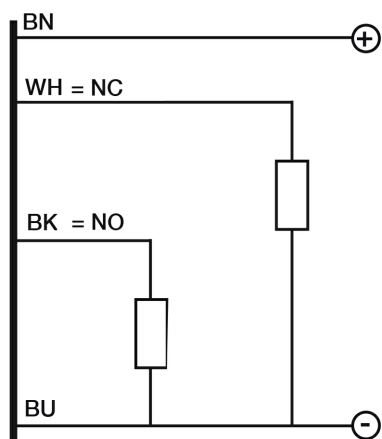
#### Accessories

|                      |                |
|----------------------|----------------|
| Supplied Accessories | 2 nuts M30x1,5 |
|----------------------|----------------|

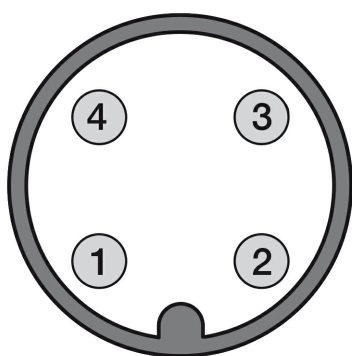
#### Generical Data

|                       |                      |
|-----------------------|----------------------|
| Dimensions            | M30 x 1,5 / L = 76mm |
| Operating Temperature | -25°C...+70°C        |
| Mechanical Protection | IP67                 |

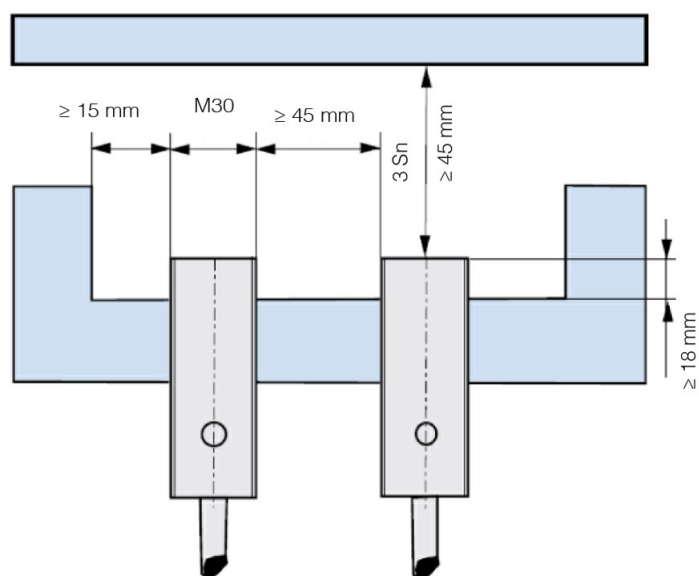
## ELECTRICAL DIAGRAMS OF THE CONNECTIONS



## CONNECTOR



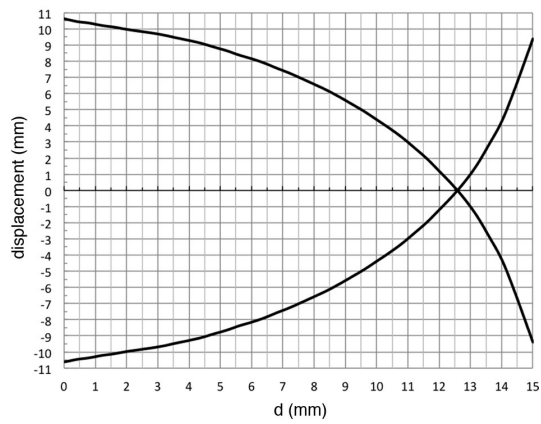
## INSTALLATION



<sup>(1)</sup>  $\geq 9 \text{ mm}$  for non magnetic materials

# RESPONSE CURVES

## Parallel offset



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