

IME18-08BPOZCOS

IME

INDUCTIVE PROXIMITY SENSORS





Ordering information

| Туре | part no. |
|-----------------|----------|
| IME18-08BPOZCOS | 1040970 |

Included in delivery: BEF-MU-M18 (1)

Other models and accessories → www.sick.com/IME



Detailed technical data

Features

| Housing | Metric |
|-----------------------------------|---|
| Housing | Standard design |
| Thread size | M18 x 1 |
| Diameter | Ø 18 mm |
| Sensing range S _n | 8 mm |
| Safe sensing range S _a | 6.48 mm |
| Installation type | Flush |
| Switching frequency | 1,000 Hz |
| Connection type | Male connector M12, 4-pin |
| Switching output | PNP |
| Switching output detail | PNP |
| Output function | NC |
| Electrical wiring | DC 3-wire |
| Enclosure rating | IP67 ¹⁾ |
| Items supplied | Mounting nut, brass, nickel-plated (2x) |

¹⁾ According to EN 60529.

Mechanics/electronics

| Supply voltage | 10 V DC 30 V DC |
|----------------|--------------------|
| Ripple | ≤ 10 % |
| Voltage drop | \leq 2 V $^{1)}$ |

¹⁾ At L may

 $^{^{\}rm 2)}$ Supply voltage U_{B} and constant ambient temperature Ta.

³⁾ Of Sr.

| Time delay before availability | ≤ 100 ms |
|--|-------------------------------|
| Hysteresis | 5 % 15 % |
| Reproducibility | ≤ 2 % ²⁾ 3) |
| Temperature drift (of S _r) | ± 10 % |
| EMC | According to EN 60947-5-2 |
| Continuous current I _a | ≤ 200 mA |
| No load current | ≤ 10 mA |
| Short-circuit protection | ✓ |
| Power-up pulse protection | ✓ |
| Shock and vibration resistance | 30 g, 11 ms/10 Hz 55 Hz, 1 mm |
| Ambient operating temperature | -25 °C +75 °C |
| Housing material | Brass, nickel-plated |
| Sensing face material | Plastic, PA 66 |
| Housing length | 69 mm |
| Thread length | 52 mm |
| Tightening torque, max. | ≤ 40 Nm |
| UL File No. | NRKH.E181493 |

¹⁾ At I_a max.

Safety-related parameters

| MTTF _D | 1,735 years |
|--------------------------|-------------|
| DC _{avg} | 0 % |

Reduction factors

| Note | The values are reference values which may vary |
|----------------------------|--|
| St37 steel (Fe) | 1 |
| Stainless steel (V2A, 304) | Approx. 0.8 |
| Aluminum (AI) | Approx. 0.45 |
| Copper (Cu) | Approx. 0.4 |
| Brass (Br) | Approx. 0.4 |

Installation note

| Remark | Associated graphic see "Installation" |
|--------|---------------------------------------|
| В | 36 mm |
| C | 18 mm |
| D | 24 mm |
| F | 64 mm |

Certificates

| EU declaration of conformity | ✓ |
|--------------------------------|---|
| UK declaration of conformity | ✓ |
| ACMA declaration of conformity | ✓ |

 $^{^{\}rm 2)}$ Supply voltage $\rm U_B$ and constant ambient temperature Ta.

³⁾ Of Sr.

IME18-08BP0ZC0S | IME

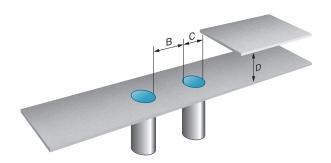
INDUCTIVE PROXIMITY SENSORS

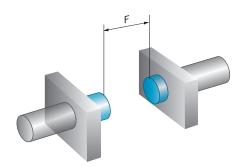
| Moroccan declaration of conformity | ✓ |
|------------------------------------|---|
| China-RoHS | ✓ |
| cULus certificate | ✓ |

Classifications

| ECLASS 5.0 | 27270101 |
|----------------|----------|
| ECLASS 5.1.4 | 27270101 |
| ECLASS 6.0 | 27270101 |
| ECLASS 6.2 | 27270101 |
| ECLASS 7.0 | 27270101 |
| ECLASS 8.0 | 27270101 |
| ECLASS 8.1 | 27270101 |
| ECLASS 9.0 | 27270101 |
| ECLASS 10.0 | 27270101 |
| ECLASS 11.0 | 27270101 |
| ECLASS 12.0 | 27274001 |
| ETIM 5.0 | EC002714 |
| ETIM 6.0 | EC002714 |
| ETIM 7.0 | EC002714 |
| ETIM 8.0 | EC002714 |
| UNSPSC 16.0901 | 39122230 |
| | |

Installation note Flush installation

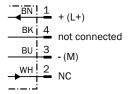




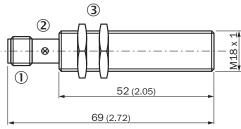
Connection type



Connection diagram Cd-008



Dimensional drawing IME18 Standard, connector, flush



Dimensions in mm (inch)

- ① Connection
- ② Display LED
- ③ Fastening nuts (2x); width across 24, metal

Recommended accessories

Other models and accessories \rightarrow www.sick.com/IME

| | Brief description | Туре | part no. | | |
|---------------|---|-------------|----------|--|--|
| Mounting syst | Mounting systems | | | | |
| 5 | Description: Clamping block for round sensors M18, with fixed stop Material: Plastic Details: Plastic (PA12), glass-fiber reinforced Items supplied: Mounting hardware included Suitable for: GR18, MH15V, V180-2, V18 | BEF-KHF-M18 | 2051482 | | |
| 5 | Description: Clamping block for round sensors M18, without fixed stop Material: Plastic Details: Plastic (PA12), glass-fiber reinforced Items supplied: Mounting hardware included Suitable for: GR18, MH15V, V180-2, V18 | BEF-KH-M18 | 2051481 | | |
| | Description: Mounting plate for M18 sensors Material: Steel Details: Steel, zinc coated Items supplied: Without mounting hardware Suitable for: GR18, V180-2, V18, W15, Z1, Z2 | BEF-WG-M18 | 5321870 | | |
| 40 | Description: Mounting bracket for M18 sensors Material: Steel Details: Steel, zinc coated Items supplied: Without mounting hardware Suitable for: GR18, V180-2, V18, W15, Z1, Z2 | BEF-WN-M18 | 5308446 | | |

| | Brief description | Туре | part no. | |
|-----------------------|--|------------------------|----------|--|
| connectors and cables | | | | |
| | Connection type head A: Female connector, M12, 4-pin, straight, A-coded Description: Unshielded, Head A: female connector, M12, 4-pin, straight, unshielded, for power supply, for cable diameter 4 mm 6 mm Head B: - Connection systems: Screw-type terminals Permitted cross-section: ≤ 0.75 mm² | DOS-1204-G | 6007302 | |
| | Connection type head A: Female connector, M12, 4-pin, angled, A-coded Description: Unshielded, Head A: female connector, M12, 4-pin, angled, unshielded, for power supply, for cable diameter 3 mm 6.5 mm Head B: - Connection systems: Screw-type terminals Permitted cross-section: ≤ 0.75 mm² | DOS-1204-W | 6007303 | |
| | Connection type head A: Female connector, M12, 4-pin, straight, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 2 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YF2A14-020VB3XLEAX | 2096234 | |
| | Connection type head A: Female connector, M12, 4-pin, straight, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 5 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YF2A14-050VB3XLEAX | 2096235 | |
| | Connection type head A: Female connector, M12, 4-pin, straight, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 10 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YF2A14-100VB3XLEAX | 2096236 | |
| 3 | Connection type head A: Female connector, M12, 4-pin, angled, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 2 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YG2A14-020VB3XLEAX | 2095895 | |
| - | Connection type head A: Female connector, M12, 4-pin, angled, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 5 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YG2A14-050VB3XLEAX | 2095897 | |
| 1 | Connection type head A: Female connector, M12, 4-pin, angled, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 10 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YG2A14-100VB3XLEAX | 2095898 | |
| * | Connection type head A: Female connector, M12, 4-pin, angled, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 0.6 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YG2A14- C60VB3XLEAX | 2145709 | |
| | Connection type head A: Female connector, M12, 4-pin, angled, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 1 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YG2A14-010VB3XLEAX | 2145710 | |
| | Connection type head A: Female connector, M12, 4-pin, straight, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 0.6 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded | YF2A14- C60VB3XLEAX | 2145707 | |

IME18-08BPOZCOS | IME INDUCTIVE PROXIMITY SENSORS

| Brief description | Туре | part no. |
|---|--------------------|----------|
| Application: Zones with chemicals, Uncontaminated zones | | |
| Connection type head A: Female connector, M12, 4-pin, straight, A-coded Connection type head B: Flying leads Signal type: Sensor/actuator cable Cable: 1 m, 4-wire, PVC Description: Sensor/actuator cable, unshielded Application: Zones with chemicals, Uncontaminated zones | YF2A14-010VB3XLEAX | 2145708 |

SICK AT A GLANCE

SICK is one of the leading manufacturers of intelligent sensors and sensor solutions for industrial applications. A unique range of products and services creates the perfect basis for controlling processes securely and efficiently, protecting individuals from accidents and preventing damage to the environment.

We have extensive experience in a wide range of industries and understand their processes and requirements. With intelligent sensors, we can deliver exactly what our customers need. In application centers in Europe, Asia and North America, system solutions are tested and optimized in accordance with customer specifications. All this makes us a reliable supplier and development partner.

Comprehensive services complete our offering: SICK LifeTime Services provide support throughout the machine life cycle and ensure safety and productivity.

For us, that is "Sensor Intelligence."

WORLDWIDE PRESENCE:

Contacts and other locations -www.sick.com

