

# MZZ1-03VNS-AC0

MZZ1

**TIE ROD CYLINDER**

**SICK**  
Sensor Intelligence.

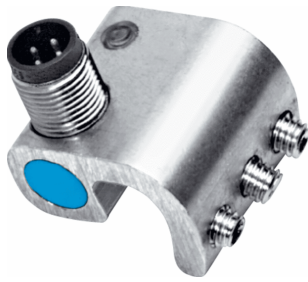


Illustration may differ



### Ordering information

Type	Part no.
MZZ1-03VNS-ACO	7900609

Other models and accessories → [www.sick.com/MZZ1](http://www.sick.com/MZZ1)

### Detailed technical data

#### Features

<b>Cylinder type</b>	Tie rod cylinder
<b>Switching output</b>	NPN
<b>Switching frequency</b>	5,000 Hz
<b>Output function</b>	NO
<b>Electrical wiring</b>	DC 3-wire
<b>Enclosure rating</b>	IP67 <sup>1)</sup>
<b>Sensing face</b>	Front

<sup>1)</sup> According to EN 60529.

#### Mechanics/electronics

<b>Supply voltage</b>	10 V DC ... 30 V DC
<b>Power consumption</b>	10 mA <sup>1)</sup>
<b>Voltage drop</b>	≤ 1.5 V <sup>2)</sup>
<b>Continuous current I<sub>a</sub></b>	≤ 300 mA
<b>Time delay before availability</b>	≤ 2 ms
<b>Dimensions (W x H x D)</b>	30 mm
<b>Response sensitivity, typ.</b>	3 mT
<b>Reproducibility</b>	≤ 0.1 mm <sup>3)</sup>
<b>Reverse polarity protection</b>	✓
<b>Short-circuit protection</b>	✓
<b>Power-up pulse protection</b>	✓
<b>Ambient operating temperature</b>	-25 °C ... +75 °C
<b>Shock and vibration resistance</b>	30 g, 11 ms / 10 ... 55 Hz, 1 mm
<b>EMC</b>	According to EN 60947-5-2
<b>Housing material</b>	Metal, Aluminum

<sup>1)</sup> Without load.

<sup>2)</sup> At I<sub>a</sub> max.

<sup>3)</sup> U<sub>b</sub> and T<sub>a</sub> constant.

<b>Sensing face material</b>	Plastic, Plastic
<b>Connection type</b>	Male connector M12, 4-pin

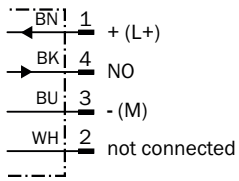
- 1) Without load.
- 2) At  $I_a$  max.
- 3)  $U_b$  and  $T_a$  constant.

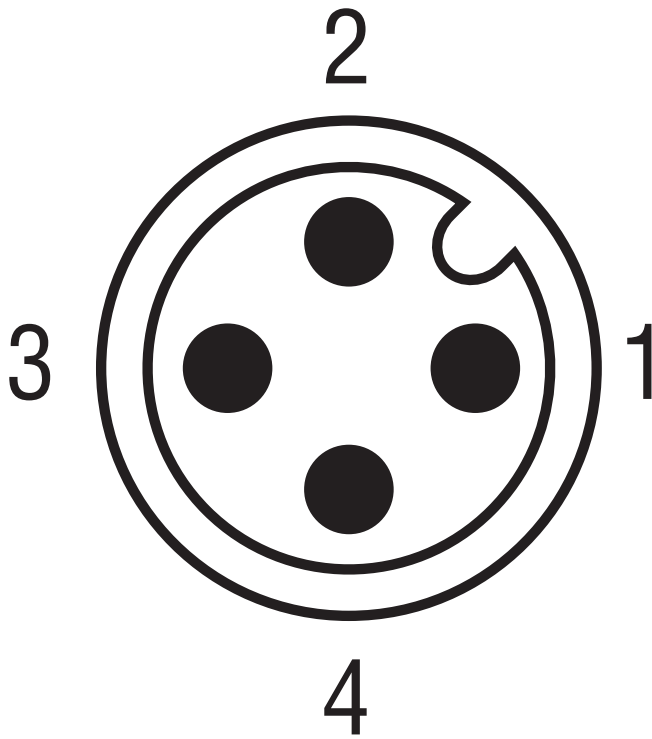
### Classifications

<b>ECl@ss 5.0</b>	27270104
<b>ECl@ss 5.1.4</b>	27270104
<b>ECl@ss 6.0</b>	27270104
<b>ECl@ss 6.2</b>	27270104
<b>ECl@ss 7.0</b>	27270104
<b>ECl@ss 8.0</b>	27270104
<b>ECl@ss 8.1</b>	27270104
<b>ECl@ss 9.0</b>	27270104
<b>ETIM 5.0</b>	EC002544
<b>ETIM 6.0</b>	EC002544
<b>UNSPSC 16.0901</b>	39122230

### Connection diagram

Cd-011

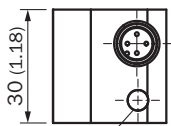
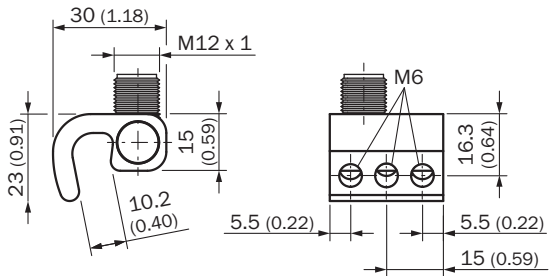




Functional principle



Dimensional drawing (Dimensions in mm (inch))



① Indication LED

### Recommended accessories

Other models and accessories → [www.sick.com/MZZ1](http://www.sick.com/MZZ1)

	Brief description	Type	Part no.
Plug connectors and cables			
	Head A: female connector, M12, 4-pin, straight, A-coded Head B: Flying leads Cable: Sensor/actuator cable, PVC, unshielded, 2 m	YF2A14-020VB3XLEAX	2096234
	Head A: female connector, M12, 4-pin, straight, A-coded Head B: Flying leads Cable: Sensor/actuator cable, PVC, unshielded, 5 m	YF2A14-050VB3XLEAX	2096235
	Head A: female connector, M12, 4-pin, angled, A-coded Head B: Flying leads Cable: Sensor/actuator cable, PVC, unshielded, 2 m	YG2A14-020VB3XLEAX	2095895
	Head A: female connector, M12, 4-pin, angled, A-coded Head B: Flying leads Cable: Sensor/actuator cable, PVC, unshielded, 5 m	YG2A14-050VB3XLEAX	2095897
	Head A: male connector, M12, 4-pin, straight Head B: - Cable: unshielded	STE-1204-G	6009932
	Head A: male connector, M12, 4-pin, angled Head B: - Cable: unshielded	STE-1204-W	6022084

## 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](http://www.sick.com)