



## Magnetic Cylinder Sensors Sensors for T-slot cylinders

MZT1-03VNS-KU0



**Model Name** > [MZT1-03VNS-KU0](#)  
**Part No.** > [1023009](#)



**At a glance**

- Compact housing design
- Complete range with PNP / NPN, PUR and PVC cable , M8 and M12 connector
- LED function indicator
- For all commonly used cylinders with T-slots, e.g., Festo or SMC and it can be applied to multiple cylinders types such as round, tie-rod, integrated profile or dove-tail cylinders with mounting brackets

**Your benefits**

- Economic solution providing reliable switching performance
- Convenient installation and sensor replacement due to drop-in installation - installer does not need to disassemble the cylinder from the machine for sensor replacement.
- Resistant to shock, vibration and liquids, enlarging sensor life time



**Features**

Switching frequency typ.:	5,000 Hz
Output type:	NPN
Output function:	NO
Electrical wiring:	DC 3-wire
Cylinder type:	T-slot
Cylinder types with adapter:	Profile cylinder Roundbody cylinder SMC rail cylinder CDQ2 SMC rail cylinder ECDQ2 Tie rod cylinder Cylinders with dovetail slots
Housing length:	30.5 mm
Enclosure rating:	IP 67 <sup>1)</sup>

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

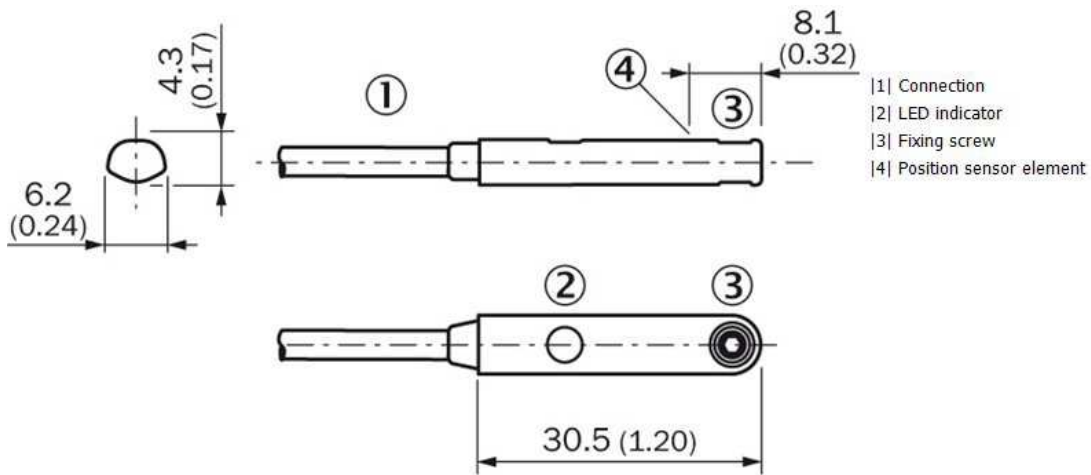
**Mechanics/electronics**

Connection type:	Cable, 3-wire, 2 m
Supply voltage:	10 V DC ... 30 V DC
Current consumption:	≤ 10 mA <sup>1)</sup>
Voltage drop:	≤ 2 V <sup>2)</sup>
Output current I <sub>a</sub> :	≤ 100 mA
EMC:	According to EN 60947-5-2

Cable material:	PUR
Conductor cross-section:	0.14 mm <sup>2</sup>
Reverse polarity protection:	✓
Short-circuit protection:	✓
Housing material:	Plastic
Power-up pulse protection:	✓
Output indicator:	✓
Repeatability:	≤ 0.1 mT <sup>3)</sup>
Overrun distance typ.:	9 mm
Shock and vibration resistance:	30 g, 11 ms/10 ... 55 Hz, 1 mm
Ambient operating temperature:	-25 °C ... +75 °C
Protection class:	III
Hysteresis typ.:	≤ 0.5 mT
Magnetic field sensitivity, typ.:	≤ 2.8 mT

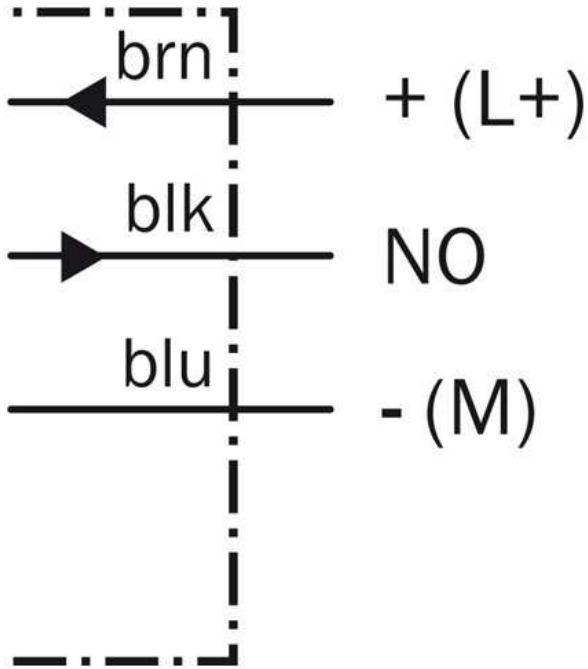
1) Without load    2) At I<sub>a</sub> max    3) U<sub>b</sub> and T<sub>a</sub> constant

### Dimensional drawing



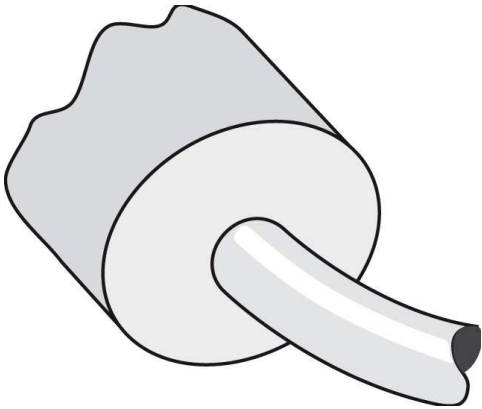
Connection diagram

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Connection type

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