



MZZ1-03V-N-AC0

CYLINDER SENSORS

SICK
Sensor Intelligence.



Illustration may differ

Ordering information

Type	part no.
MZZ1-03V-N-ACO	1102548

Other models and accessories → www.sick.com/

Detailed technical data

Features

Cylinder type	Tie rod cylinder
Switching output	NAMUR
Switching output detail	NAMUR
Switching frequency	5,000 Hz
Electrical wiring	DC 2-wire
Enclosure rating	IP67 ¹⁾
Sensing face	Front

¹⁾ According to EN 60529.

Mechanics/electronics

Ex area category	2G, 1D
Time delay before availability	≤ 2 ms
Dimensions (W x H x D)	30 mm
Response sensitivity, typ.	3 mT
Reproducibility	≤ 0.1 mm ¹⁾
Reverse polarity protection	Yes
Short-circuit protection	Yes
Status indicator LED	Yes
Ambient operating temperature	-25 °C ... +70 °C
Shock and vibration resistance	30 g, 11 ms / 10 ... 55 Hz, 1 mm
EMC	According to EN 60947-5-6
Connection type	Male connector M12, 4-pin
Material	
Housing	Metal, Aluminum
Sensing face	Plastic, plastic
EC-Type examination certificate	TÜV 19 ATEX 241335
ATEX marking	EX II 2G Ex ia IIC T6 GbEX II 1D Ex ia IIIC T85 °C DaTa: -25 °C ... +70 °C

¹⁾ Supply voltage U_B and constant ambient temperature T_a .

²⁾ For connection to a separately certified intrinsically safe circuit only.

Input voltage U_i max.	16 V ²⁾
Input power P_i max.	100 mW ²⁾
Input current I_i max.	30 mA ²⁾
Internal capacitance C_i max.	130 nF ²⁾
Internal inductance L_i max.	10 μ H ²⁾
Nominal voltage	8.2 V DC

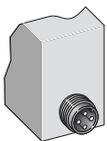
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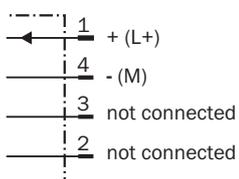
Classifications

ECLASS 5.0	27270104
ECLASS 5.1.4	27270104
ECLASS 6.0	27270104
ECLASS 6.2	27270104
ECLASS 7.0	27270104
ECLASS 8.0	27270104
ECLASS 8.1	27270104
ECLASS 9.0	27270104
ECLASS 10.0	27270104
ECLASS 11.0	27270104
ECLASS 12.0	27274301
ETIM 5.0	EC002544
ETIM 6.0	EC002544
ETIM 7.0	EC002544
ETIM 8.0	EC002544
UNSPSC 16.0901	39122230

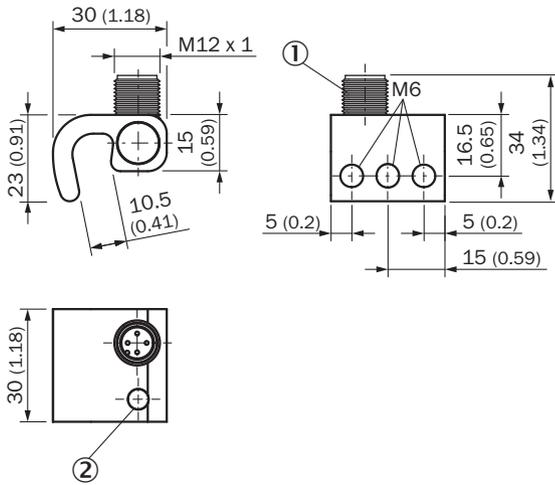
Connection type



Connection diagram Cd-015



Dimensional drawing



Dimensions in mm (inch)

- ① Connection
- ② Display LED

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