



MZ2Q-C

Cylinder sensors with two individually adjustable switching points for grippers

SICK
Sensor Intelligence.



Technical data overview

Output function	2 x N/O contact / 2 x N/O contact / IO-Link (depends on variant)
IO-Link	- / ✓ (depends on variant)
Teach-in	Yes
Special features	Special hysteresis Software V303 Housing black Special software setting Configurable hysteresis (depends on variant)
Cylinder types with adapter	SMC rail ECDQ2 SMC rail CDQ2
Housing length	19.5 mm

Product description

On pneumatic cylinders, grippers, or carriages, the MZ2Q-C cylinder sensors from SICK are able to detect two end positions or intermediate positions with just one sensor. This is achieved by using two individually adjustable switching points in one sensor housing. This is much easier, quicker, and more cost-effective than conventional solutions, since only one slot is used. As a result, mounting and cabling overheads are halved and applications can be solved efficiently.

At a glance

- Can be used in all standard cylinders, linear slides, and grippers using the C-slot and – with the help of adapters – in round rod, tie-rod, and profile cylinders
- Drop-in mounting from above simplifies handling and assembly
- Easy adjustment of two switching points via teach-in pushbutton
- LEDs for indicating the two switching points
- Detection range up to 50 mm stroke

Your benefits

- One sensor, two switching points: Reduces commissioning time and costs
- Maximum flexibility thanks to a detection zone up to 50 mm
- Suitable for precise pneumatic applications due to intuitive and precise definition of two switching points
- Quick and easy installation and sensor replacement thanks to drop-in sensor mounting
- Flexible sensor settings, monitoring, advanced diagnostics and visualization through IO-Link (depending on type)

Fields of application

- End position detection in pneumatic miniature cylinders
- Position detection (open/close) in pneumatic grippers

Ordering information

Other models and accessories → www.sick.com/MZ2Q-C

• **Electrical wiring:** DC 4-wire

Preferred manufacturer slot	Connection type	Output function	Smart Sensor	Communication interface	Type	Part no.
Festo	Cable with M8 male connector, 4-pin, 0.3 m	2 x N/O contact	–	-	MZ2Q-CFSPSPK0	1042242
					MZ2Q-CFSPSPK0S04	1051025
	Cable with plug, M12, 4-pin, 0.3 m	2 x N/O contact	–	-	MZ2Q-CFSPSKQ0	1042244
					MZ2Q-CFLPSKQ0	1043697
	Cable with plug, M8, 4-pin, with knurled screws, 0.3 m	2 x N/O contact, IO-Link	Enhanced Sensing, efficient communication	IO-Link	MZ2Q-CFLPSKR0	1146368
	Cable with plug, M8, 4-pin, with knurled screws, 0.5 m	2 x N/O contact	–	-	MZ2Q-CFSPSKR0	1042243
	Cable, 4-wire, stripped, 2 m	2 x N/O contact	–	-	MZ2Q-CFSPSKU0	1042241
		2 x N/O contact, IO-Link	Enhanced Sensing, efficient communication	IO-Link	MZ2Q-CFLPSKU0	1115196
SMC Bimba	Cable with M8 male connector, 4-pin, 0.3 m	2 x N/O contact	–	-	MZ2Q-CSSPSKP0	1042238
					MZ2Q-CSSPSKP0S10	1061383
	Cable with plug, M12, 4-pin, 0.3 m	2 x N/O contact	–	-	MZ2Q-CSSPSKQ0	1042240
	Cable with plug, M8, 4-pin, with knurled screws, 0.5 m	2 x N/O contact	–	-	MZ2Q-CSSPSKR0	1042239
					MZ2Q-CSSPSKR0S01	1044557
					MZ2Q-CSSPSKR0S20	1095814
					MZ2Q-CSSPSKR0S22	1118101
					MZ2Q-CSSPSKR0S25	1147171
	Cable, 4-wire, stripped, 2 m	2 x N/O contact	–	-	MZ2Q-CSSPSKU0	1042237
	Cable, 4-wire, stripped, 3 m	2 x N/O contact	–	-	MZ2Q-CSSNSKUA	1046234
					MZ2Q-CSSPSKUAS05	1051588
SMC Bimba Schunk	Cable with plug, M12, 4-pin, 0.3 m	2 x N/O contact, IO-Link	Enhanced Sensing, efficient communication	IO-Link	MZ2Q-CSLPSKQ0	1043696
	Cable with plug, M8, 4-pin, with knurled screws, 0.3 m	2 x N/O contact, IO-Link		IO-Link	MZ2Q-CSLPSKR0	1146367

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