



# RZC1-04ZRS-KU0

RZC1

CYLINDER SENSORS

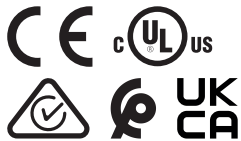
**SICK**  
Sensor Intelligence.



### Ordering information

Type	part no.
RZC1-04ZRS-KU0	1059746

Other models and accessories → [www.sick.com/RZC1](http://www.sick.com/RZC1)



### Detailed technical data

#### Features

<b>Cylinder type</b>	C-slot
<b>Cylinder types with adapter</b>	SMC rail CDQ2 SMC rail ECDQ2
<b>Housing length</b>	26.3 mm
<b>Switching output</b>	Reed
<b>Switching frequency</b>	500 Hz
<b>Output function</b>	NO
<b>Electrical wiring</b>	AC/DC 3-wire
<b>Enclosure rating</b>	IP68 <sup>1)</sup> IP69K <sup>2)</sup>

<sup>1)</sup> According to EN 60529 (IP 67 / IP 68).

<sup>2)</sup> According to DIN 40050 (IP 69K).

#### Mechanics/electronics

<b>Supply voltage</b>	5 V AC/DC ... 30 V AC/DC
<b>Power consumption</b>	5 mA, without load
<b>Voltage drop</b>	< 0.5 V
<b>Continuous current I<sub>a</sub></b>	≤ 500 mA
<b>Switching capacity</b>	≤ 10 W
<b>Protection class</b>	III
<b>Overrun distance, typ.</b>	7 mm
<b>Reproducibility</b>	≤ 0.1 mT <sup>1)</sup>
<b>Status indicator LED</b>	Yes
<b>Teach-in</b>	No
<b>Ambient operating temperature</b>	-30 °C ... +80 °C
<b>Shock and vibration resistance</b>	30 g, 11 ms / 10 ... 55 Hz, 1 mm

<sup>1)</sup> Supply voltage U<sub>B</sub> and constant ambient temperature T<sub>a</sub>.

<b>EMC</b>	According to EN 60947-5-2
<b>Connection type</b>	Cable, 3-wire, stripped, 2 m
<b>Connection type Detail</b>	
Conductor cross section	0.09 mm <sup>2</sup>
Cable diameter	Ø 2.2 mm
Bending radius	With fixed installation > 2 x cable diameter
	For flexible use > 5 x cable diameter
Cable outlet	Axial
<b>Material</b>	
Housing	Plastic, PA, strengthened
Cable	PUR
<b>UL File No.</b>	NRKH.E181493 & NRKH7.E181493

<sup>1)</sup> Supply voltage  $U_B$  and constant ambient temperature  $T_a$ .

### Safety-related parameters

<b>MTTF<sub>D</sub></b>	41,230 years
<b>DC<sub>avg</sub></b>	0 %
<b>T<sub>M</sub> (mission time)</b>	20 years
<b>B<sub>10D</sub></b>	5,000,000 Switching cycles <sup>1)</sup>

<sup>1)</sup> Only for devices containing electro-mechanical components. In this case, the MTTF<sub>D</sub> value of the entire device must be calculated from the given B<sub>10D</sub> value, the number of switching cycles and the given MTTF<sub>D</sub> value.

### Certificates

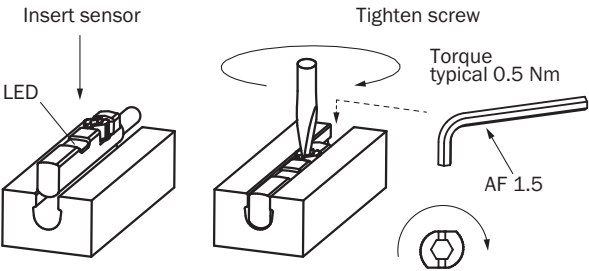
<b>EU declaration of conformity</b>	✓
<b>UK declaration of conformity</b>	✓
<b>ACMA declaration of conformity</b>	✓
<b>Moroccan declaration of conformity</b>	✓
<b>China-RoHS</b>	✓
<b>cULus certificate</b>	✓

### Classifications

<b>ECLASS 5.0</b>	27270104
<b>ECLASS 5.1.4</b>	27270104
<b>ECLASS 6.0</b>	27270104
<b>ECLASS 6.2</b>	27270104
<b>ECLASS 7.0</b>	27270104
<b>ECLASS 8.0</b>	27270104
<b>ECLASS 8.1</b>	27270104
<b>ECLASS 9.0</b>	27270104
<b>ECLASS 10.0</b>	27270104
<b>ECLASS 11.0</b>	27270104
<b>ECLASS 12.0</b>	27274301
<b>ETIM 5.0</b>	EC002544

ETIM 6.0	EC002544
ETIM 7.0	EC002544
ETIM 8.0	EC002544
UNSPSC 16.0901	39122230

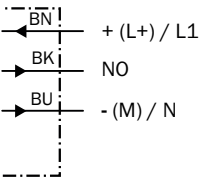
Installation note



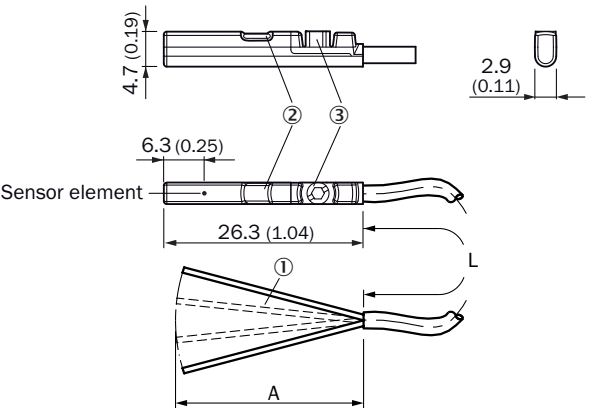
Connection type



Connection diagram Cd-035



Dimensional drawing Cable




Dimensions in mm (inch)

- ① Connection
- ② Display LED
- ③ Fixing screw SW 1.5

		<b>L</b>	<b>A</b>	
1059746	RZC1-04ZRS-KU0	2 m	31.5	3
1059750	RZC1-04ZUS-KU0	2 m	31.5	2
1065397	RZC1-04ZUS-KU0S01	2 m	31.5	2
1070035	RZC1-04ZUS-KUAS02	3 m	31.5	2
1059749	RZC1-04ZRS-KUB	5 m	31.5	3
1073286	RZC1-04ZUS-KUBS03	5 m	31.5	2

## Recommended accessories

Other models and accessories → [www.sick.com/RZC1](http://www.sick.com/RZC1)

	<b>Brief description</b>	<b>Type</b>	<b>part no.</b>
connectors and cables			
	<ul style="list-style-type: none"> <li>• <b>Connection type head A:</b> Male connector, M8, 3-pin, straight, A-coded</li> <li>• <b>Signal type:</b> Sensor/actuator cable</li> <li>• <b>Description:</b> Sensor/actuator cable</li> <li>• <b>Connection systems:</b> IDC quick connection</li> <li>• <b>Permitted cross-section:</b> 0.08 mm² ... 0.25 mm²</li> </ul>	YM08U13-0002K1823A	2122277

	Brief description	Type	part no.
Mounting systems			
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 1 mm ... 130 mm, ambient temperature min -30 °C max 80 °C</li> <li>• <b>Material:</b> Stainless steel, Aluminum</li> <li>• <b>Details:</b> Stainless steel, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC1-130	2077686
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 12 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-12	2077673
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 1 mm ... 25 mm, ambient temperature min -30 °C max 80 °C</li> <li>• <b>Material:</b> Stainless steel, Aluminum</li> <li>• <b>Details:</b> Stainless steel, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC1-25	2077685
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 16 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-16	2077672
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 20 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-20	2077671
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 25 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-25	2077670
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 32 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-32	2077669
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 40 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-40	2077668
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 50 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-50	2077667
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket on round body cylinder with piston diameter of 63 mm, ambient temperature min 0 °C max 50 °C</li> <li>• <b>Material:</b> Plastic, Aluminum</li> <li>• <b>Details:</b> Plastic, Aluminum</li> <li>• <b>Packing unit:</b> 1 piece</li> <li>• <b>Suitable for:</b> C-slot</li> </ul>	BEF-KHZ-RC-63	2077666
	<ul style="list-style-type: none"> <li>• <b>Description:</b> Mounting bracket for integrated profile cylinder/tie-rod cylinder</li> <li>• <b>Material:</b> Zinc diecast</li> <li>• <b>Details:</b> Zinc diecast</li> <li>• <b>Items supplied:</b> Mounting hardware included</li> </ul>	BEF-KHZ-PC1	2076170



## 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.”

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