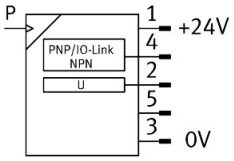
Air gap sensor
SOPA-CM2H-R1-HQ6-PNLK-VB-M12

Part number: 8093820



Data sheet

Feature	Value
Approval	RCM c UL us - Recognised (Oil)
CE mark (see declaration of conformity)	To EU EMC Directive In accordance with EU RoHS Directive
UKCA marking (see declaration of conformity)	To UK instructions for EMC To UK RoHS instructions
KC mark	KC-EMV
Note on materials	RoHS compliant
Detected variable	Distance
Measuring principle	Pneumatic
Sensing range	20 µm...200 µm
Operating pressure	4 bar...7 bar
Supply pressure	0.8 bar...1.6 bar
Operating medium	Compressed air to ISO 8573-1:2010 [7:4:4]
Note on operating and pilot medium	Lubricated operation possible (in which case lubricated operation will always be required)
Ambient temperature	0 °C...50 °C
Repetition accuracy in ± µm	2.5 µm
Switching output	PNP/NPN, switchable
Switching function	Window comparator Threshold value with variable hysteresis
Switching element function	NC or NO, switchable
Max. output current	100 mA
Analogue output	0 - 10 V
Starting value of distance characteristic	0 µm
End value of distance characteristic	300 µm
Rise time	22 ms
Min. load resistance voltage output	20 kOhm
Short circuit current rating	Yes
Protocol	IO-Link®
IO-Link, Protocol version	Device V 1.1
IO-Link, Profile	Smart sensor profile
IO-Link, Function classes	Process data variable (PDV)

Feature	Value
	Identification Diagnostics Teach channel Switching signal channel (SSC)
IO-Link, communication mode	COM2 (38.4 kBaud)
IO-Link, SIO-Mode support	Yes
IO-Link, Port class	A
IO-Link, Process data length OUT	0 bytes
IO-Link, Process data length IN	2 bytes
IO-Link, Process data content IN	1-bit SSC (supply pressure monitoring) 10-bit PDV (distance) 2-bit SSC (distance monitoring)
IO-Link, Service data IN	14-bit supply pressure
IO-Link, Min. cycle time	3 ms
IO-Link, Data storage required	0.5 KB
Operational voltage range DC	22.8 V...26.4 V
Max. current consumption	400 mA
Reverse polarity protection	For all electrical connections
Electrical connection 1, connection type	Plug
Electrical connection 1, connector system	M12x1, A-coded to EN 61076-2-101
Electrical connection 1, number of connections/cores	5
Electrical connection 1, type of mounting	Screw-type lock Not rotatable
Electrical connection 1, compatible type of mounting	Compatible with rotatable screw-type lock
Type of mounting	Either: With through-hole via DIN rail
Pneumatic connection	QS-6
Product weight	570 g
Material housing	Reinforced PA
Display type	Illuminated LCD, multi-colour
Setting options	IO-Link® Teach-in Via display and buttons
Protection against tampering	Electronic interlock
Degree of protection	IP65
Corrosion resistance class CRC	2 - Moderate corrosion stress
LABS (PWIS) conformity	VDMA24364-C1-L