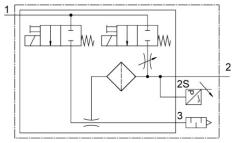
Vacuum generator
OVEH-10-H-Q6-G18-UA-C-PNLK-SR12-HRC

Part number: 8205190





General operating condition

Data sheet

Feature	Value
Nominal size, Laval nozzle	0.95 mm
Silencer design	Open
Mounting position	optional
Ejector characteristic	High vacuum Standard
Grade of filtration	40 µm
Manual override	None
Integrated function	Electric ejector pulse Pressure sensor Electric on-off valve Filter Silencer closed
Design	Human-robot collaboration (HRC)
Short circuit current rating	yes
Measured variable	Pressure
Measuring principle	Piezoresistive
Switching element function	N/C or N/O contact, switchable
Switching function	Freely programmable
Symbol	00995804
Valve function	Closed
Reverse polarity protection	yes
Measurement method	Piezoresistive pressure sensor with display
Display type	LED indicator 2-digit
Setting options	IO-Link® Teach-in Via display and keys
Switching status indication	Yellow LED
Operating pressure for max. suction flow rate	0.4 MPa
Operating pressure for max. suction flow rate	4 bar
Operating pressure for max. suction flow rate	58 psi
Operating pressure	0.2 MPa ... 0.7 MPa
Operating pressure	2 bar ... 7 bar
Operating pressure	29 psi ... 101.5 psi
Operating pressure for max. vacuum	0.41 MPa
Operating pressure for max. vacuum	4.1 bar
Operating pressure for max. vacuum	59.45 psi
Max. vacuum	92 %

Feature	Value
Nominal operating pressure	0.4 MPa
Nominal operating pressure	4 bar
Nominal operating pressure	58 psi
Max. suction flow rate against atmosphere	18 l/min
Air supply time at nominal operating pressure with ejector pulse	1 s
Operational voltage range DC	21.6 V ... 26.4 V
Duty cycle	100%
Max. output current	100 mA
Switching output	PNP/NPN, switchable
Characteristic coil data	24 V DC: 1.0 W
CE mark (see declaration of conformity)	To EU EMC Directive
UKCA marking (see declaration of conformity)	To UK instructions for EMC
Operating medium	Compressed air to ISO 8573-1:2010 [7:4:4]
Note on operating and pilot medium	Lubricated operation not possible
Vibration resistance	Transport application test with severity level 2 to FN 942017-4 and EN 60068-2-6
Shock resistance	Shock test with severity level 2 to FN 942017-5 and EN 60068-2-27
Corrosion resistance class CRC	2 - Moderate corrosion stress
LABS (PWIS) conformity	VDMA24364-B1/B2-L
Media temperature	0 °C ... 50 °C
Recommended cleaning/purification	Soapy water
Relative air humidity	Max. 93% at 40 °C
Sound pressure level at nominal operating pressure	55 dB(A)
Sound level at nominal operating pressure	66 dB(A)
Degree of protection	IP40
Ambient temperature	0 °C ... 50 °C
Product weight	415 g
Pressure measuring range	-0.1 MPa ... 0 MPa
Pressure measuring range	-1 bar ... 0 bar
Pressure measuring range	-14.5 psi ... 0 psi
Accuracy in ± % FS	1.5 %FS
Reproducibility of switching values FS	0.3 %
Protocol	IO-Link®
IO-Link, Protocol version	Device V 1.1
IO-Link, Profile	Smart sensor profile
IO-Link, Function classes	Binary data channel (BDC) Process data variable (PDV) Identification Diagnostics Teach channel
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	14 bit PDV (pressure measurement value) 2 bit BDC (pressure monitoring)
IO-Link, Min. cycle time	3 ms
IO-Link, Data storage required	0.5 Byte
Electrical connection 1, connection type	Cable with socket
Electrical connection 1, cable outlet	Angled
Electrical connection 1, design	Round
Electrical connection 1, connector system	M8x1, A-coded, to EN 61076-2-104
Electrical connection 1, number of connections/cores	8

Feature	Value
Electrical connection 1, used connections/cores	5
Electrical connection 1, connection pattern	00997559
Electrical connection 1, tightening torque	0.2 Nm
Electrical connection input, function	Ejector pulse Power supply Vacuum generation
Electrical connection output, function	Digital output
Cable characteristic	Suitable for robot applications
Cable diameter	5 mm
Cable diameter tolerance	± 1 mm
Cable length	0.3 m
Protection against tampering	PIN code
Type of mounting	Via mounting kit To ISO 9409
Pneumatic connection, port 1	For tubing outside diameter of 6 mm
Pneumatic connection, port 3	Open silencer
Vacuum connection	G1/8
Note on vacuum connection	Additional accessories possible
Cable sheath colour	Black
Material connecting thread	Anodised wrought aluminium alloy
Note on materials	RoHS-compliant
Material seals	NBR
Material receiver nozzle	POM
Material filter	POM
Material housing	PA-reinforced
Material hollow bolt	Wrought aluminium alloy
Material cable sheath	PVC
Material adjusting screw	Steel
Material silencer	PA-reinforced PE
Material screws	Steel
Material transmitter nozzle	Wrought aluminium alloy