

Proportional pressure control valve VPPI-

Part number: 8074287

FESTO



Data sheet

Feature	Value
Nominal width pressurization	1.8 mm...5 mm
Exhaust nominal width	1.8 mm...5 mm
Actuation type	Electrical
Sealing principle	Soft
Total leakage	5 l/h
Flow direction	Non-reversible
Mounting position	Any
Structural design	Poppet valve with spring return
Short-circuit protection	For all electrical connections
Max. cable length	30 m
Setpoint input	0 - 10 V 4 - 20 mA PWM digital
Input resistance	0.3 kOhm...100 kOhm
Safety instructions	Safety position VPPI, normally closed Safety position VPPI, normally open
Reverse polarity protection	for all electrical connections
Reset method	Mechanical spring
Dimensions W x L x H	42.2 mm x 95.3 mm x 94.3 mm
Type of control	directly
Valve function	3-way proportional pressure control valve
Display type	LED Color TFT
Display size	1.77"
Display resolution	128x160 pixels
Operating pressure	0 bar...13 bar
Pressure regulation range MPa	-0.1 MPa...1.2 MPa
Pressure regulation range	-1 bar...12 bar
Inlet pressure 1	0 bar...13 bar
Inlet pressure 1 MPa	0 MPa...1.3 MPa
Inlet pressure 3	-0.1 MPa...0 MPa -1 bar...0 bar

Feature	Value
Burst pressure	40 bar 725 psi
Normal nominal flow rate (normalized to DIN 1343)	150 l/min...1630 l/min
Standard nominal flow rate 2-3	20 l/min...850 l/min
DC operating voltage range	21.6 V...27.6 V
Nominal operating voltage DC	24 V
Switching output	Push-pull
Max. output current	25 mA
Analog output signal range	0 - 10 V 4 - 20 mA
Max. load resistance of current output	500 Ohm
Min. load resistance of voltage output	2000 Ohm
Precision analog output in ± %FS	1 %FS
Operating medium	Compressed air as per ISO 8573-1:2010 [7:4:4] Inert gases
Information on operating and pilot media	Operation with oil lubrication not possible
Certification	FCC MIC RCM compliance mark c UL us - Listed (OL)
KC characters	KC-EMV
CE marking (see declaration of conformity)	As per EU EMC directive According to EU radio equipment directive (RED) As per EU RoHS directive
UKCA marking (see declaration of conformity)	To UK instructions for EMC To UK RoHS instructions
Vibration resistance	Transport application test with severity level 2 as per FN 942017-4 and EN 60068-2-6
Shock resistance	Shock test with severity level 2 as per FN 942017-5 and EN 60068-2-27
Corrosion resistance class (CRC)	2 - Moderate corrosion stress
LABS (PWIS) conformity	VDMA24364-B1/B2-L
Cleanroom suitability, measured according to ISO 14644-14	Class 4 according to ISO 14644-1
For use in the food industry	See supplementary material information
Temperature of medium	0 °C...50 °C
Degree of protection	IP65
Ambient temperature	0 °C...50 °C
Storage temperature	-20 °C...70 °C
Climatic category	3K3 according to EN 60721
Relative air humidity	0 - 85% Non-condensating
Nominal altitude of use above sea level	< 3000 m NHN
Application note	The product is suitable for industrial purposes only. Radio interference suppression measures may be required in residential areas.
Sound power level	62.5 dB(A)
Sound power level at a distance of 1 m	51.9 dB(A)
Product weight	365 g...370 g
Linearity	0.9 %FS
Hysteresis	0.4 %FS
Reproducibility	0.4 %FS
Electrical connection 1, function	Actual value output Setpoint input Power supply
Electrical connection 1, connection type	Plug
Electrical connection 1, connection technology	M12x1 A-coded as per EN 61076-2-101
Electrical connection 1, number of pins/wires	5
Electrical connection 1, tightening torque	1.5 Nm
Type of mounting	With through-hole for M4 screw

Feature	Value
	With DIN rail
Pneumatic connection 1	G1/8
Pneumatic connection 2	G1/8
Pneumatic connection 3	G1/8
Max. tightening torque of pneumatic fitting	8.5 Nm
Note on materials	RoHS compliant
Housing material	PA-reinforced
Seals material	HNBR PTFE