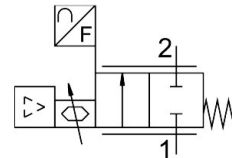


Mass flow controller (MFC)

VEMD-L-6-60-50-D9-G14-5YMPM1-VA

Part number: 8163823

FESTO



Data sheet

Feature	Value
Size	100
Degree of protection	IP40
Normal nominal flow rate (normalized to DIN 1343)	50 l/min
Flow rate control range	1 l/min...50 l/min
Flow direction	Non-reversible
Nominal operating pressure	0.3 MPa 3 bar 43.5 psi
Operating pressure	0.1 MPa...0.6 MPa 1 bar...6 bar
Information on operating pressure	For inlet pressures above 0,4 MPa (4 bar, 58 psi) and low flow rates: Avoid components in the pneumatic laminar flow inlet that reflect pressure waves. The reflection of pressure waves can lead to vibrations in the system and to accuracy deviations in the product.
Overload pressure	0.8 MPa 8 bar 116 psi
Burst pressure	1.8 MPa 18 bar 261 psi
Accuracy of flow rate	± (1.3 % o.m.v. + 0.7 %FS)
Repetition accuracy of flow rate value	± (0.25 % o.m.v. + 0.25 %FS)
Valve function	2-way proportional flow control valve
Nominal width	6 mm
Actuation type	Electrical
Pneumatic connection 1	Internal thread G1/4
Pneumatic connection 2	Internal thread G1/4
Ambient conditions	Not suitable for use in environments enriched with oxygen according to IEC 60601-1 Cleanest possible ambient air Dry
Nominal altitude of use above sea level	<= 2000 m ASL (> 79.5 kPa)
Max. installation height	2000 m

Feature	Value
Operating medium	Argon Compressed air to ISO 8573-1:2010 [6:4:1] Carbon dioxide Oxygen Nitrogen
Information on operating and pilot media	Operation with oil lubrication not possible Maximum particle size 5 µm
Relative air humidity	0 - 90 % Non-condensing
Pressure dew point	-20 °C
Duty cycle	100%
Temperature of medium	5 °C...40 °C
Ambient temperature	5 °C...40 °C
Storage temperature	-20 °C...70 °C
Nominal operating voltage DC	24 V
DC operating voltage range	12 V...24 V
Max. electrical power consumption	8.5 W
Electrical connection 1, function	Communication
Reference value	4 - 20 mA 0 - 10 V 1 - 5 V Modbus®
Diagnostic function	Indication via LED
Display type	LED
Analog input signal range	0 - 10 V 4 - 20 mA 1 - 5 V
Analog output signal range	0 - 10 V 1 - 5 V 4 - 20 mA
Reverse polarity protection	for operating voltage connections
Product weight	630 g
Materials in contact with the media	Wrought aluminum alloy, anodized EPDM Epoxy FPM PA-reinforced Silicon Silicon nitride High-alloy stainless steel
Seals material	EPDM FPM
Housing material	Aluminum, anodized PA-reinforced PC
Note on materials	RoHS-compliant
Dimensions W x L x H	116 mm x 38 mm x 124 mm
Type of mounting	Direct mounting via through-hole Mounting plate, screwed on On H-rail with accessories Screwed tightly With through-hole for M4 screw
Mounting position	Any
Certification	C-Tick RCM compliance mark c UL us - Listed (OL)
Conforms to standard	IEC 61010-1 ISO 15001
KC characters	KC EMC
CE marking (see declaration of conformity)	As per EU EMC directive As per EU RoHS directive

Feature	Value
UKCA marking (see declaration of conformity)	To UK instructions for EMC To UK RoHS instructions
LABS (PWIS) conformity	VDMA24364 zone III
Oxygen suitability according to standard	ASTM G 63 ASTM G 93 ASTM G 94 CGA G 4.1 EIGA IGC 33/06/E ISO 15001