

Air solenoid valve MFH-5/3E-D-1-S-C-EX

Part number: 535978

FESTO



[General operating condition](#)

Data sheet

Feature	Value
Valve function	5/3, exhausted
Actuation type	Electrical
Width	42 mm
Normal nominal flow rate (normalized to DIN 1343)	1200 l/min
Pneumatic working port	Sub-base, size 1 according to ISO 5599-1 G1/4
Operating voltage	Via solenoid coil, to be ordered separately
Operating pressure	-0.09 MPa ... 1.6 MPa
Operating pressure	-0.9 bar ... 16 bar
Structural design	Piston gate valve
Reset method	Mechanical spring
CE marking (see declaration of conformity)	as per EU explosion protection directive (ATEX)
UKCA marking (see declaration of conformity)	acc. to UK EX instructions
ATEX category gas	II 2G
ATEX category for dust	II 2D
Type of ignition protection for gas	Ex h IIC T4 Gb
Type of (ignition) protection for dust	Ex h IIIC T105°C Db
Explosive ambient temperature	-5°C ≤ Ta ≤ +40°C
Explosion protection certification outside the EU	EPL Db (GB) EPL Gb (GB)
Degree of protection	IP65
Nominal width	8 mm
Width dimension	43 mm
Exhaust air function	With flow control option
Sealing principle	Soft
Mounting position	Any
Conforms to standard	ISO 5599-1
Manual override	Detenting via accessory Non-detenting
ISO code	169
Type of control	Pilot-controlled
Pilot air supply port	External
Flow direction	Reversible
Symbol	00991077
Lap	Overlap
Pilot pressure MPa	0.3 MPa ... 1 MPa

Feature	Value
Pilot pressure	3 bar ... 10 bar
Suitability for vacuum	yes
Switching time off	36 ms
On switching time	18 ms
Max. positive test pulse with 0 signal	2200 µs
Max. negative test pulse on 1 signal	3700 µs
Explosion prevention and protection	Zone 1 (ATEX) Zone 1 (UKEX) Zone 2 (ATEX) Zone 21 (ATEX) Zone 21 (UKEX) Zone 22 (ATEX)
Operating medium	Compressed air as per ISO 8573-1:2010 [7:4:4]
Information on operating and pilot media	Operation with oil lubrication possible (required for further use)
Vibration resistance	Transport application test with severity level 1 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
LABS (PWIS) conformity	VDMA24364-B1/B2-L
Temperature of medium	-5 °C ... 40 °C
Noise level	85 dB(A)
Pilot medium	Compressed air as per ISO 8573-1:2010 [7:4:4]
Ambient temperature	-5 °C ... 40 °C
Product weight	520 g
Electrical connection	Via F coil, to be ordered separately
Type of mounting	On sub-base With through-hole
Pilot exhaust air port 82	M5
Pilot exhaust air port 84	M5
Pilot air port 12	Sub-base, size 1 as per ISO 5599-1
Pilot air port 14	Sub-base, size 1 as per ISO 5599-1
Pneumatic connection 1	Sub-base, size 1 as per ISO 5599-1
Pneumatic connection 2	Sub-base, size 1 as per ISO 5599-1
Pneumatic connection 3	Sub-base, size 1 as per ISO 5599-1
Pneumatic connection 4	Sub-base, size 1 as per ISO 5599-1
Pneumatic connection 5	Sub-base, size 1 as per ISO 5599-1
Note on materials	RoHS-compliant
Seals material	HNBR NBR
Housing material	Die-cast aluminum