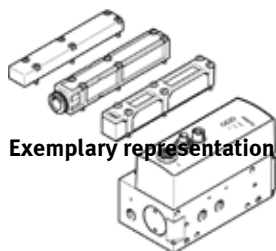


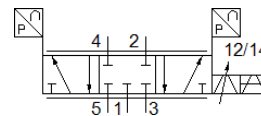
proportional directional control valve VPWP-6-

Part number: 550171

FESTO



Exemplary representation



Data sheet

Overall data sheet – Individual values depend upon your configuration.

Feature	Value
Nominal size	6 mm
Type of actuation	electrical
Sealing principle	Hard
Assembly position	Any Preferably horizontal (display components upwards) If the valve is moved, it must be mounted at a right angle to the direction of movement
Design structure	Piston slide With built-in pressure sensors
Type of reset	Magnetic spring
Safety instructions	Safety position VPWP
Type of piloting	direct
Flow direction	non reversible
Valve function	5/3 proportional directional control valve, closed
Status displays	LED yellow = PL (power load) LED green = power LED red = error
Operating pressure MPa	0 ... 1 MPa
Operating pressure	0 ... 10 bar
Operating pressure, positioning / soft stop	4 ... 8 bar
Nominal operating pressure	0.6 MPa 6 bar
Nominal operating pressure (psi)	87 psi
Standard nominal flow rate	700 l/min
Nominal operating voltage DC	24 V
Operating voltage range DC	18 ... 30 V
Load voltage range DC	18 ... 30 V
Max. load current of the voltage output	500 mA
Max. load current of the digital output	500 mA
Max. current consumption of valve drive	1.2 A
Max. current consumption, logic	0.15 A
Nominal voltage DC	24 V
Supply voltage of the digital output	24 V load voltage
Supply voltage of the voltage output	24 V load voltage
Authorisation	RCM Mark
CE mark (see declaration of conformity)	to EU directive for EMC to EU directive explosion protection (ATEX) in accordance with EU RoHS directive
UKCA marking (see declaration of conformity)	To UK instructions for EMC To UK EX instructions To UK RoHS instructions
ATEX category Gas	II 3G
Explosion ignition protection type Gas	Ex nA IIC T5 X Gc
Explosion-proof ambient temperature	0°C ≤ Ta ≤ +50°C
Operating medium	Compressed air in accordance with ISO8573-1:2010 [6:4:4]

Feature	Value
Note on operating and pilot medium	Lubricated operation not possible
Corrosion resistance classification CRC	1 - Low corrosion stress
PWIS conformity	VDMA24364-B1/B2-L
Medium temperature	0 ... 50 °C
Protection class	IP65 in assembled condition
Ambient temperature	0 ... 50 °C
Product weight	776 g
Resolution pressure	0.01 bar
Linearity error, FS	< 1.5 %
FS repetition accuracy	< 1 %
Design of the 24 V voltage output	Positive logic (PNP) No electrical isolation Protected against short circuits Return supply without damage
Design of the digital output	Per IEC 61131-2 Positive logic (PNP) No electrical isolation Protected against short circuits Return supply without damage
Control interface	Digital CAN bus with Festo protocol Terminating resistor, integrated
Electrical connection, fieldbus interface IN	Plug M9 5-pin
Electrical connection, fieldbus interface OUT	Plug socket M9 5-pin
Fieldbus interface electrical connection	Plug socket M8 4-pin
Mounting type	with through hole with accessories
Colour of connections	Connection 2: Blue Connection 4: Black
Pneumatic connection, port 1	G1/8
Pneumatic connection, port 2	G1/8
Pneumatic connection, port 3	G1/8
Pneumatic connection, port 4	G1/8
Pneumatic connection, port 5	G1/8
Materials note	Conforms to RoHS
Material cover	PA-reinforced
Material housing	Wrought Aluminium alloy Anodised