

Series PN directly operated solenoid valves

3/2-way - Normally Closed (NC)

2

CONTROL



- » Can be mounted on a single base (M5 connections) or on manifold (M5 connections or cartridge \varnothing 3 and 4)
- » Compact design suitable for use in reduced mounting space

Please note that all Series PN solenoid valves are supplied with direct current (DC). To operate in alternating current (AC), it is necessary to use the connector with bridge rectifier Mod. 125-900.

Series PN directly operated solenoid valves are available as 3/2-way NC. They are equipped with a manual override which makes the plants setting easier and they can be mounted on single bases or on manifolds.

GENERAL DATA

TECHNICAL FEATURES

| | |
|-----------------------------|---|
| Function | 3/2 NC |
| Operation | direct acting poppet type |
| Pneumatic connections | on subbase with ISO 12238 interface by means of screws |
| Nominal diameter | 0.8 mm |
| Nominal flow | 12 NI/min (air @ 6 bar Δ P 1 bar) |
| Flow coefficient kv (l/min) | 0.19 |
| Operating pressure | 0 ÷ 10 bar |
| Operating temperature | 0°C + 50°C |
| Media | filtered air, class 5.4.4 according to ISO 8573-1 (max oil viscosity 32 cSt), inert gas |
| Response time (ISO 12238) | ON <10 msec - OFF <15 msec |
| Installation | in any position |

MATERIALS IN CONTACT WITH THE MEDIUM

| | |
|----------------|--------------------------|
| Body | PBT technopolymer |
| Seals | PU, NBR, (FKM on demand) |
| Internal parts | stainless steel |

ELECTRICAL FEATURES

| | |
|-----------------------|---|
| Voltage | 24 ... 205 V DC |
| Voltage tolerance | \pm 10% |
| Power consumption | 2 W - 1 W (24 V DC only) |
| Duty cycle | ED 100% |
| Electrical connection | with industrial standard connector (9.4 mm) |
| Protection class | IP65 with connector |

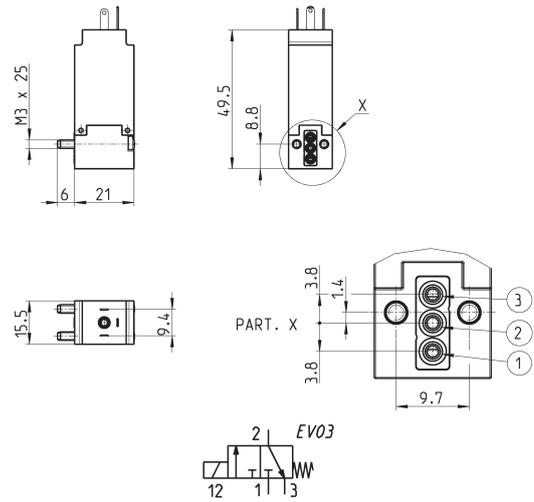
Special versions available on demand

CODING EXAMPLE

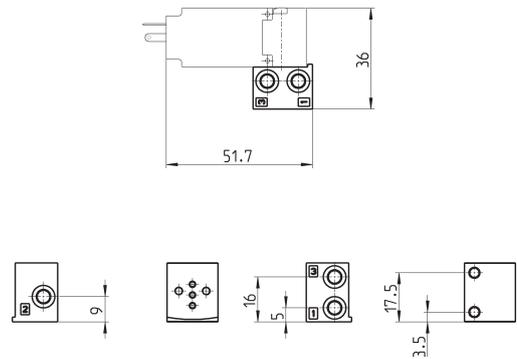
| | | | | | | | | | | | |
|-----------|----------|-----------|----------|----------|----------|----------|----------|----------|----------|----------|--|
| PN | 0 | 00 | - | 3 | 0 | 1 | - | P | 5 | 3 | |
|-----------|----------|-----------|----------|----------|----------|----------|----------|----------|----------|----------|--|

| | |
|-----------|---|
| PN | SERIES |
| 0 | <p>BODY DESIGN: 0 = single sub-base 1 = single manifold 2 = double sided manifold</p> |
| 00 | <p>NUMBER OF POSITIONS: 00 = interface 01 = single base (M5 only) 02 + 99 = manifold number of positions</p> |
| 3 | <p>NUMBER OF WAYS - FUNCTIONS: 0 = manifold or single base 3 = 3-way NC</p> |
| 0 | <p>VALVE PORTS: 0 = interface (for single valve only)</p> <p>MANIFOLD PORTS (for Series W, P and PN): 2 = M5 side port 3 = ø 3 tube side port 4 = ø 4 tube side port 6 = M5 rear ports 7 = ø 3 tube rear ports 8 = ø 4 tube rear ports</p> |
| 1 | <p>NOMINAL DIAMETER - MAX PRESSURE 1 = ø 0.8 (1W) 10 bar (NC) 24V only</p> |
| P | <p>MATERIALS: P = PBT body, PU poppet seal</p> |
| 5 | <p>ELECTRICAL CONNECTION: 5 = industrial standard connection (9.4 mm)</p> |
| 3 | <p>SOLENOID VOLTAGE: 3 = 24V DC 4 = 48V DC 6 = 110V DC 7 = 205V DC</p> |
| | <p>FIXING: = standard for the mounting on plastic interfaces M = with screws for the mounting on metal interface (on demand)</p> |

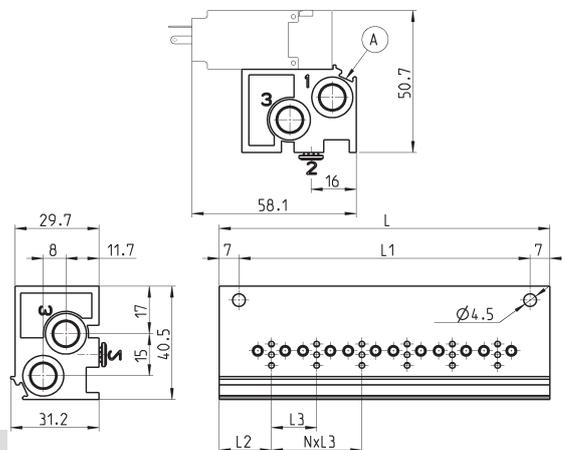

3/2-way NC solenoid valve

 Supplied with:
 1x interface seal
 2x screws


| Mod. | Orifice Ø (mm) | kv (l/min) | Qn (NI/min) | Pressure min-max (bar) |
|----------------------|----------------|------------|-------------|------------------------|
| PN000-301-P53 | 0.8 | 0.18 | 12 | 0 + 10 |

Single sub-base


| | |
|------|----------------|
| Mod. | P001-02 |
|------|----------------|

Single manifold with rear outlets


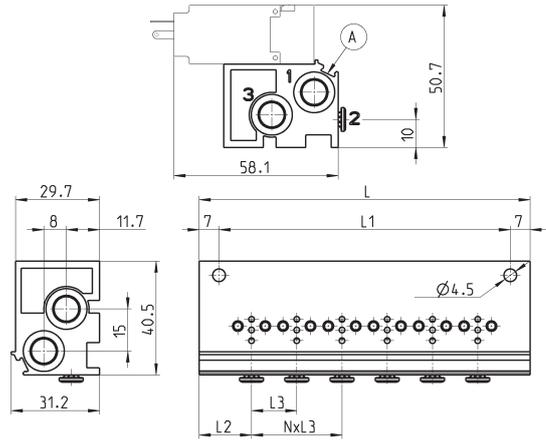
| Mod. | Nr valves | L | L1 | L2 | L3 | 1 (P) | 3 (R) |
|----------------|-----------|-----|-----|------|----|-------|-------|
| P102-0* | 2 | 53 | 39 | 18,5 | 16 | G1/8 | G1/8 |
| P103-0* | 3 | 69 | 55 | 18,5 | 16 | G1/8 | G1/8 |
| P104-0* | 4 | 85 | 71 | 18,5 | 16 | G1/8 | G1/8 |
| P105-0* | 5 | 101 | 87 | 18,5 | 16 | G1/8 | G1/8 |
| P106-0* | 6 | 117 | 103 | 18,5 | 16 | G1/8 | G1/8 |

* = see the type of PORTS in the CODING EXAMPLE TABLE.

A = groove for electric connection identification

Single manifold with front outlets

This manifold is arranged to be fixed through DIN 46277/3 guide together with the accessory PCF-E520.

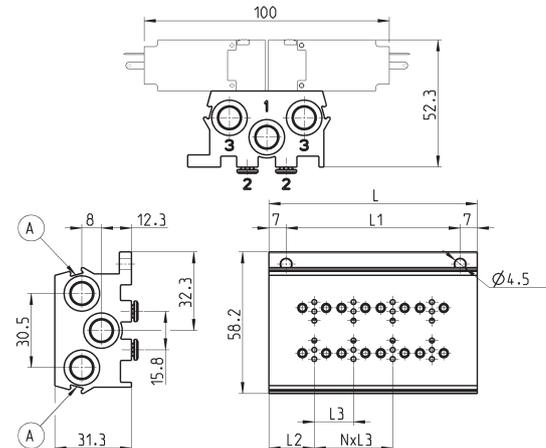


| Mod. | Nr valves | L | L1 | L2 | L3 | 1 (P) | 3 (R) |
|---------|-----------|-----|-----|------|----|-------|-------|
| P102-0* | 2 | 53 | 39 | 18,5 | 16 | G1/8 | G1/8 |
| P103-0* | 3 | 69 | 55 | 18,5 | 16 | G1/8 | G1/8 |
| P104-0* | 4 | 85 | 71 | 18,5 | 16 | G1/8 | G1/8 |
| P105-0* | 5 | 101 | 87 | 18,5 | 16 | G1/8 | G1/8 |
| P106-0* | 6 | 117 | 103 | 18,5 | 16 | G1/8 | G1/8 |

* = see the type of PORTS in the CODING EXAMPLE TABLE.

A = groove for electric connection identification

Double sided manifold with rear outlets



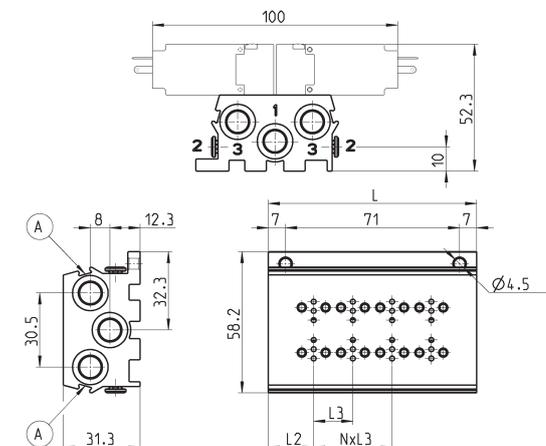
| Mod. | Nr valves | L | L1 | L2 | L3 | 1 (P) | 3 (R) |
|---------|-----------|-----|-----|------|----|-------|-------|
| P204-0* | 4 | 53 | 39 | 18,5 | 16 | G1/8 | G1/8 |
| P206-0* | 6 | 69 | 55 | 18,5 | 16 | G1/8 | G1/8 |
| P208-0* | 8 | 85 | 71 | 18,5 | 16 | G1/8 | G1/8 |
| P210-0* | 10 | 101 | 87 | 18,5 | 16 | G1/8 | G1/8 |
| P212-0* | 12 | 117 | 103 | 18,5 | 16 | G1/8 | G1/8 |

* = see the type of PORTS in the CODING EXAMPLE TABLE.

A = groove for electric connection identification

Double sided manifold with front outlets

This manifold is arranged to be fixed through DIN 46277/3 guide together with the accessory PCF-E520.



| Mod. | Nr valves | L | L1 | L2 | L3 | 1 (P) | 3 (R) |
|---------|-----------|-----|-----|------|----|-------|-------|
| P204-0* | 4 | 53 | 39 | 18,5 | 16 | G1/8 | G1/8 |
| P206-0* | 6 | 69 | 55 | 18,5 | 16 | G1/8 | G1/8 |
| P208-0* | 8 | 85 | 71 | 18,5 | 16 | G1/8 | G1/8 |
| P210-0* | 10 | 101 | 87 | 18,5 | 16 | G1/8 | G1/8 |
| P212-0* | 12 | 117 | 103 | 18,5 | 16 | G1/8 | G1/8 |

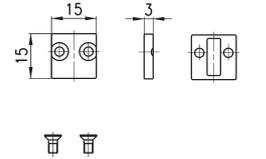
* = see the type of PORTS in the CODING EXAMPLE TABLE.

A = groove for electric connection identification

Excluder tap

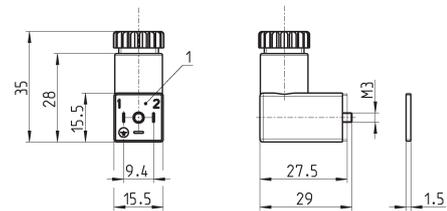


Supplied with:
 1x excluder tap
 1x interface seal
 2x screws



Mod.
P000-TP

Industrial standard (9.4 mm) connector Mod. 125-...



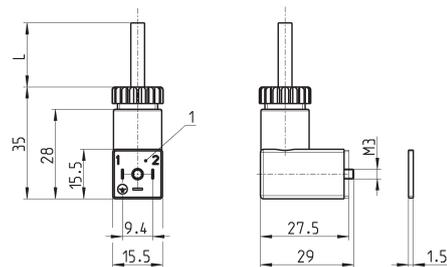
| Mod. | description | colour | working voltage | cable holding | tightening torque |
|----------------|--------------------------------|-------------|-----------------|---------------|-------------------|
| 125-601 | connector, diode + Led | transparent | 10/50 V DC | PG7 | 0.3 Nm |
| 125-701 | connector, varistor + Led | transparent | 24 V AC/DC | PG7 | 0.3 Nm |
| 125-800 | connector, without electronics | black | - | PG7 | 0.3 Nm |

1 = 90° adjustable connector

Industrial standard (9.4 mm) connector Mod. 125-... with cable



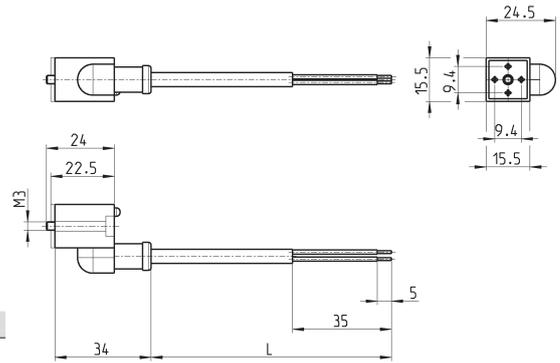
The internal rectifier circuit of the connector
 Mod. 125-900 allows to use solenoid valves with
 different AC voltage, even if the voltage indicated on
 the solenoid valve is DC.



| Mod. | description | colour | working voltage | cable length [L] | cable holding | tightening torque |
|------------------|--|-------------|-------------------|--------------------|---------------|-------------------|
| 125-501-2 | moulded cable with diode + Led | black | 10/50 V DC | 2000 mm | - | 0.3 Nm |
| 125-550-1 | moulded cable, without electronics | black | - | 1000 mm | - | 0.3 Nm |
| 125-601-2 | pre-wired cable, diode + Led | transparent | 10/50 V DC | 2000 mm | PG7 | 0.3 Nm |
| 125-571-3 | moulded cable, varistor + Led | black | 24 V AC/DC | 3000 mm | - | 0.3 Nm |
| 125-900 | pre-wired cable with voltage rectifier | black | 6 V - 110 V AC/DC | 2000 mm | PG7 | 0.3 Nm |

1 = 90° adjustable connector

Industrial standard (9.4 mm) in-line connectors with cable

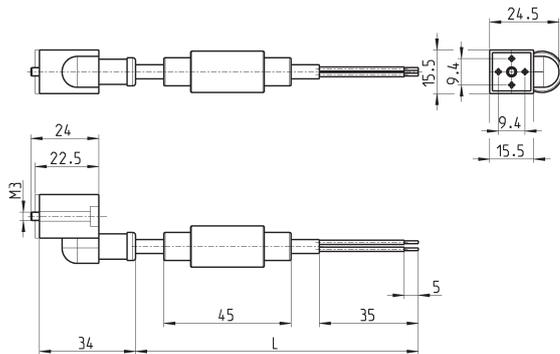


| Mod. | description | colour | working voltage | cable length [L] | cable holding | tightening torque |
|------------------|--|--------|-----------------|--------------------|---------------|-------------------|
| 125-503-2 | in-line moulded cable, with diode + Led | black | 24 V DC | 2000 mm | - | 0.3 Nm |
| 125-503-5 | in-line moulded cable, with diode + Led | black | 24 V DC | 5000 mm | - | 0.3 Nm |
| 125-553-2 | in-line moulded cable, without electronics | black | - | 2000 mm | - | 0.3 Nm |
| 125-553-5 | in-line moulded cable, without electronics | black | - | 5000 mm | - | 0.3 Nm |

2

CONTROL

Industrial standard (9.4 mm) in-line connectors with bridge rectifier



| Mod. | description | colour | working voltage | cable length [L] | cable holding | tightening torque |
|------------------|--|--------|-------------------|--------------------|---------------|-------------------|
| 125-903-2 | in-line moulded cable with voltage rectifier | black | 6 V - 230 V AC/DC | 2000 mm | - | 0.3 Nm |
| 125-903-5 | in-line moulded cable with voltage rectifier | black | 6 V - 230 V AC/DC | 5000 mm | - | 0.3 Nm |