

## 3/2 way Seat Valve, for media up to +180 °C, DN15-50

For process valves with decentralized automation see ELEMENT Type 2106 (Start Q1 2016)



- Ultra compact version
- Long service life
- Valve body in gunmetal
- Various fluidic circuit and actuator control functions

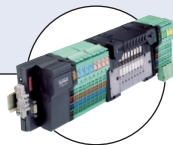
Type 2002 can be combined with...



**Type 8697**  
Electrical position feedback



**Type 6012/6014 P**  
Pilot valve



**Type 8640/8644**  
Valve block



**Type 5470**  
Solenoid valve



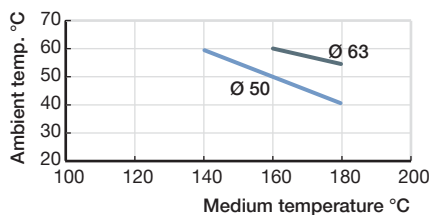
**Type 6519 NAMUR**

The pneumatically operated 3/2 way valve is operated with a piston actuator. The standard actuator material is PA. For high ambient temperatures (e.g. external sterilization) PPS is available on request for temperatures up to 140°. High flow rates are attained with the gunmetal 3-way body. The reliable self-adjusting packing gland provides high sealing integrity.

Various fluidic circuit functions can be obtained by a simple exchange of the pressure and service ports.

These maintenance-free and robust valves can be retro-fitted with a comprehensive range of accessories for position indication or manual override.

■ **Note:** For PA actuators in the sizes 50 and 63, the combination of max. media temperature and max. ambient temperature is as shown in the following chart:



Technical data	
<b>Orifice</b>	DN15 ... 50
<b>Body materials</b>	Gunmetal
<b>Actuator material</b>	PA (PPS on request)
<b>Seal material</b>	PTFE
<b>Media</b>	Water, alcohol, oils, fuels, hydraulic fluid, alkaline solutions, salt solution, organic solutions, hot water, steam
<b>Viscosity</b>	Max. 600 mm <sup>2</sup> /s
<b>Packing gland</b> (with silicone grease)	PTFE V-rings with spring compensation
<b>Media temperature ■</b>	-10 ... +180 °C
<b>Ambient temperature</b>	
<b>PA actuator ■</b>	-10 ... +60 °C
<b>PPS actuator</b>	+5 ... +140 °C
Actuator sizes Ø 50 ... 80	+5 ... +90 °C, (up to 140 °C for a short period)
Actuator sizes Ø 100 ... 125	
<b>Installation</b>	As required, preferably with actuator in upright position
<b>Control medium</b>	Neutral gases, air
<b>Max. pilot pressure</b>	10 bar 7 bar with actuator Ø 125
<b>Port connections</b>	Threaded port ISO228

Ordering chart for valves with port 1 closed by spring action (other versions on request)

Control function	Port connection	Orifice [mm]	Actuator size Ø [mm]	K <sub>v</sub> value water [m <sup>3</sup> /h]		Min. pilot pressure [bar]	Max. operating pressure to 180 °C [bar]		Weight	Item no. PA actuator
				1 → 2	2 → 3		1 → 2	2 → 3 2 → 1		
A 3/2 way, normally closed (NC) (port 1)	G ½	15	50	7	4.5	4.4	11	16	1.3	002131
			63	9	5.5	4.7	16	16	1.6	002300
	G ¾	20	50	8.9	6.3	4.4	11	16	1.3	002132
			63	10.5	6.5	4.7	16	16	1.6	002301
	G 1	25	63	17	11	4.9	10	16	2.1	002133
			125	38	24	3.4	14	16	8.1	002302
	G 1 ¼	32	80	32	22	6.0	9	16	4.3	002134
			125	38	24	3.4	14	16	8.1	002303
	G 1 ½	40	80	34	24	6.0	9	16	4.3	002135
			125	40	26	3.4	14	16	8.1	002303
G 2	50	125	55	37	4.3	10	16	9.5	002136	

**i** Further versions on request



**Materials**  
Actuator in PPS

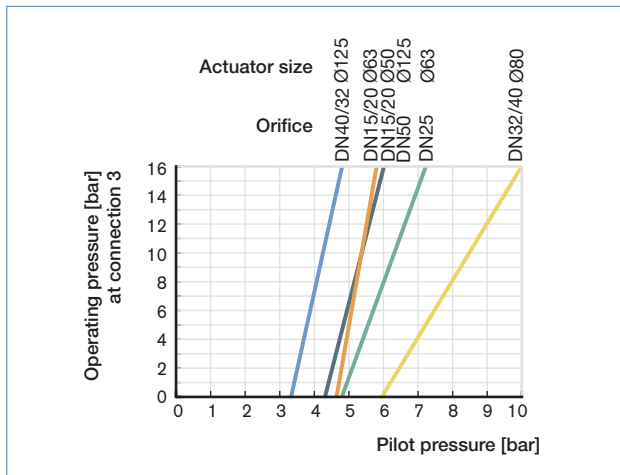


**Control functions**  
Normally open (B), Double-acting (I)



**Approvals**  
GL

Pilot pressure chart (CFA, flow direction 3 → 2)



Ordering chart for accessories

3/2 way pilot valves with banjo bolts

Seal material valve FKM, seal material banjo bolt NBR

Valve for actuator size [Ø mm]	Type	Pressure inlet P (valve body)	Service port A (banjo bolt)	Orifice [mm]	Q <sub>Nn</sub> value air [l/min]	Pressure range [bar]	Electrical coil connection Ind. Std.	Power consumption [W]	Item no. Voltage/frequency [V/Hz]	
									024/DC	230/50
50 ... 63	6012P	Tube fitting Ø 6 mm	G ¼	1.2	48	0 ... 10	Form B	4	552283	552286
50 ... 125	6014P	G ¼	G ¼	2	120	0 ... 10	Form A	8	424103	424107

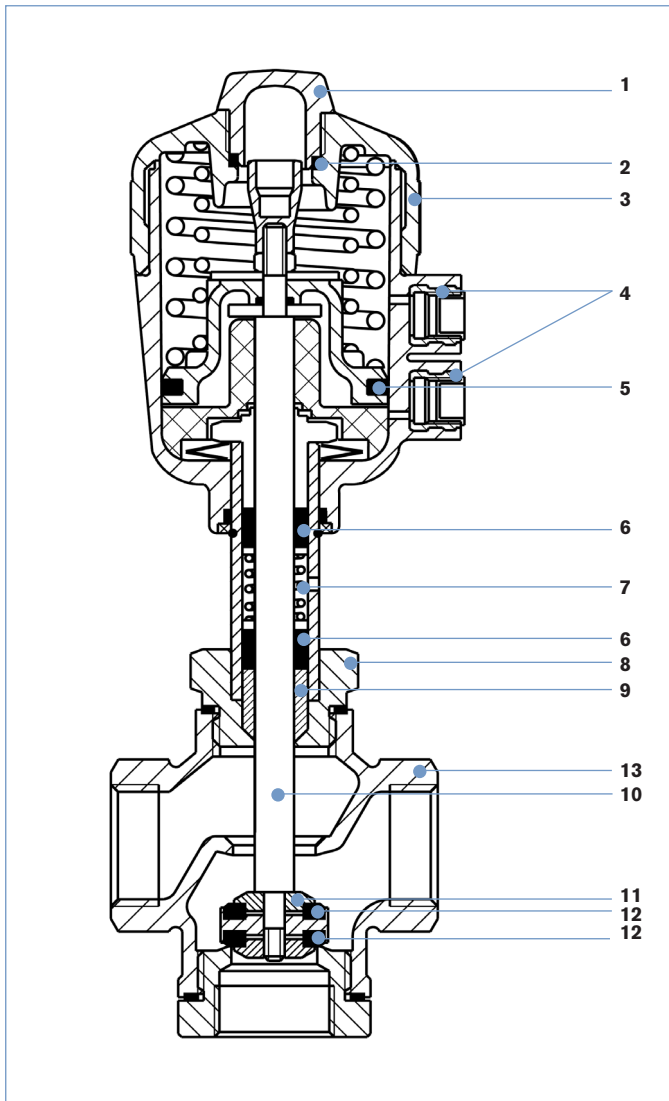
Cable plug Type 2507, Form B or Type 2508, Form A

	Item no.
Type 2507, Form B Industrial standard, 0 ... 250 V without circuitry (Type 6012 P)	423845
Type 2508, Form A acc. DIN EN 175 301 - 803, 0 ... 250 V without circuitry (Type 6014 P, Type 0331P)	008376

For further accessories see Type 1062, page 238 or the accessories datasheet Type 2XXX for the full options programme.

**Note:** For design reasons, some of the accessories cannot be supplied for actuator size Ø 40 mm. Please request the accessories datasheet Type 2XXX.

## Materials



## Description

- 1 Transparent cap
- 2 O-Ring
- 3 Actuator
- 4 Pilot air ports G  $\frac{1}{4}$
- 5 Cylinder seal
- 6 V-seals
- 7 Tension spring
- 8 Nipple
- 9 Wiper
- 10 Spindle
- 11 Plug
- 12 Seals
- 13 Valve body

## Material

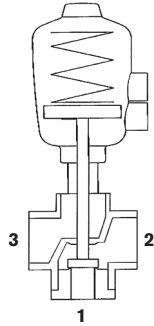
- Polycarbonate (PC)
- FKM
- Polyamide (PA)
- Brass
- NBR
- PTFE
- 1.4310
- Brass CuZn
- PTFE
- 1.4401
- CuZn36Pb1.5
- PTFE
- Gunmetal  
G-CuSn5ZnPb2%Ni

**Connections for fluidic circuit functions C, D, E and F**

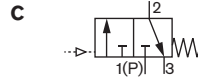
Actuator with control function A

When de-energised port connection 1 is closed with spring

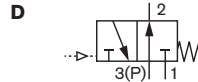
Fluidic circuit function	Connection - port		
	1	2	3
C	P	A	R
D	R	A	P
E	P1	A	P2
F	A	P	B



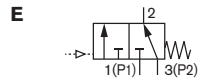
A, B service ports  
 P, P1, P2 pressure ports  
 R exhaust port



When de-energised, pressure port 1 closed, service port 2 exhausted

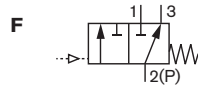


When de-energised, pressure port 3 connected to service port 2, exhaust port 1 closed



**Mixer valve**

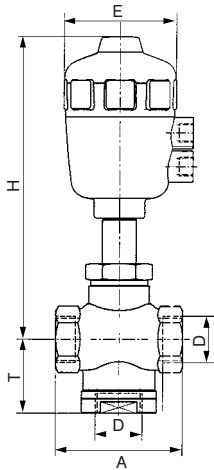
When de-energised, pressure port 3 connected to service port 2, pressure port 1 closed



**Distributor valve**

When de-energised, pressure port 2 connected to service port 3, service port 1 closed

**Dimensions [mm]**



Orifice	Actuator size Ø	Port connection D	A	E	H	T
15	50	G ½	75	64	179	49
	63	G ½	75	80	213	49
20	50	G ¾	75	64	179	49
25	63	G 1	90	80	216	52.5
32	80	G 1 ¼	120	101	237	66
	125	G 1 ¼	120	153	336	66
40	80	G 1 ½	120	101	237	66
	125	G 1 ½	120	153	336	66
50	125	G 2	160	153	350	85

To find your nearest Bürkert facility, click on the orange box →

[www.burkert.com](http://www.burkert.com)

In case of special application conditions, please consult for advice.

We reserve the right to make technical changes without notice.

1712/7\_EU-en\_00891664