



Direct-acting 2/2 way plunger valve

- Push-over solenoid system
- Compact design, up to DN 6
- Housing made of brass or stainless steel with threaded connection



Product variants described in the data sheet may differ from the product presentation and description.

Can be combined with



Type 2518 ▶
Cable plug, form A according to DIN EN 175301-803



Type 1087 ▶
Timer, form A according to DIN EN 175301 - 803

Type description

The direct-acting plunger solenoid valve Type 0255 is also suitable for high pressures and high temperatures.

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1. General technical data

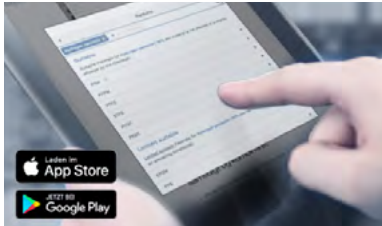
Product properties	
Dimensions	Detailed information can be found in chapter “4. Dimensions” on page 5.
Material	
Seal	FKM, PTFE (others on request)
Body	Brass with stainless steel seat 1.4305 or stainless steel body 1.4581
Coil	Epoxy
Weight	0.6 (brass version)
Orifice	DN 1.0...DN 6.0
Circuit function	Detailed information can be found in chapter “2. Circuit functions” on page 4.
Thermal insulation class of solenoid coil	H
Electrical data	
Duty cycle	100 % continuous operation
Voltage tolerance	± 10 %
Medium data	
Operating medium	
With FKM	Hot air, hot oils, oils with additives, per-solutions
With PTFE	Water, steam, fuels, hydraulic materials, alcohol, organic solvents, waste gas
Medium temperature	
With FKM	- 10 °C...+ 130 °C
With PTFE	- 40 °C...+ 180 °C
With stainless steel	Up to + 210 °C (on request)
Viscosity (max.)	21 mm ² /s
Process/Port connection & communication	
Electrical connection	Cable plug for Ø 7 mm cable, acc. to DIN EN 175 301 - 803 form A (supplied as standard)
Approvals and certificates	
Degree of protection	IP65 with cable plug for standard devices IP50 without cable plug for high temperature devices
Environment and installation	
Installation position	As required, preferably with actuator upright
Ambient temperature	Max. + 55 °C (+ 210 °C on request, see “6.3. Ordering chart” on page 10)

2. Circuit functions

Circuit functions	Description
	Type: A, solenoid valve 2/2 way Direct-acting Normally closed

3. Materials

3.1. Chemical Resistance Chart – Bürkert resistApp

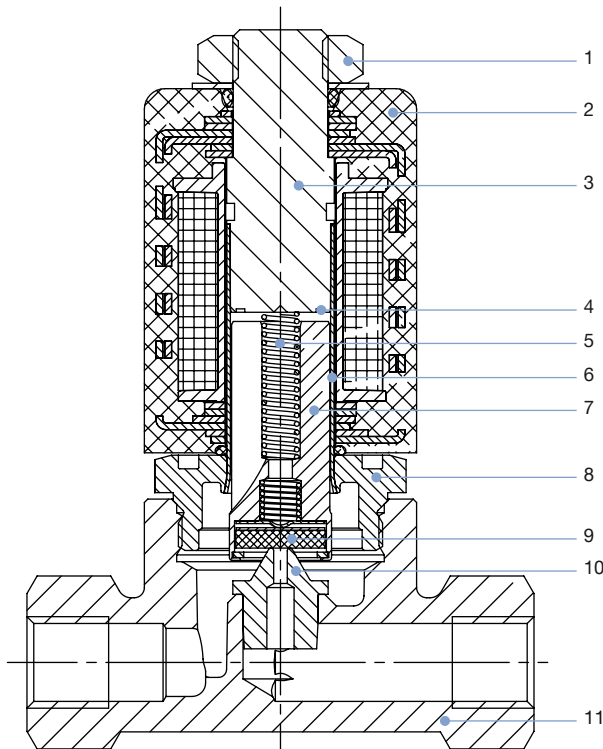


Bürkert resistApp – Chemical Resistance Chart

You want to ensure the reliability and durability of the materials in your individual application case? Verify your combination of media and materials on our website or in our resistApp.

[Start Chemical Resistance Check](#)

3.2. Material specifications



No.	Element	Material
1	Locknut	Steel (thick-film passivated acc. to Rohs)
2	Coil	Epoxy, steel (High temperature version)
3	Stopper	Stainless steel 1.4105
4	Shading ring	Copper (brass version), only AC Silver (stainless steel version), only AC
5	Spring	Stainless steel 1.4310
6	Guide tube	Stainless steel 1.4571
7	Plunger	Stainless steel 1.4105
8	Hexagon nut	Stainless steel 1.4401 or stainless steel 1.4571
9	Seal	FKM, PTFE
10	Valve Seat	Stainless steel 1.4305 or stainless steel 1.4112 (only brass body)
11	Body	Brass or stainless steel 1.4581

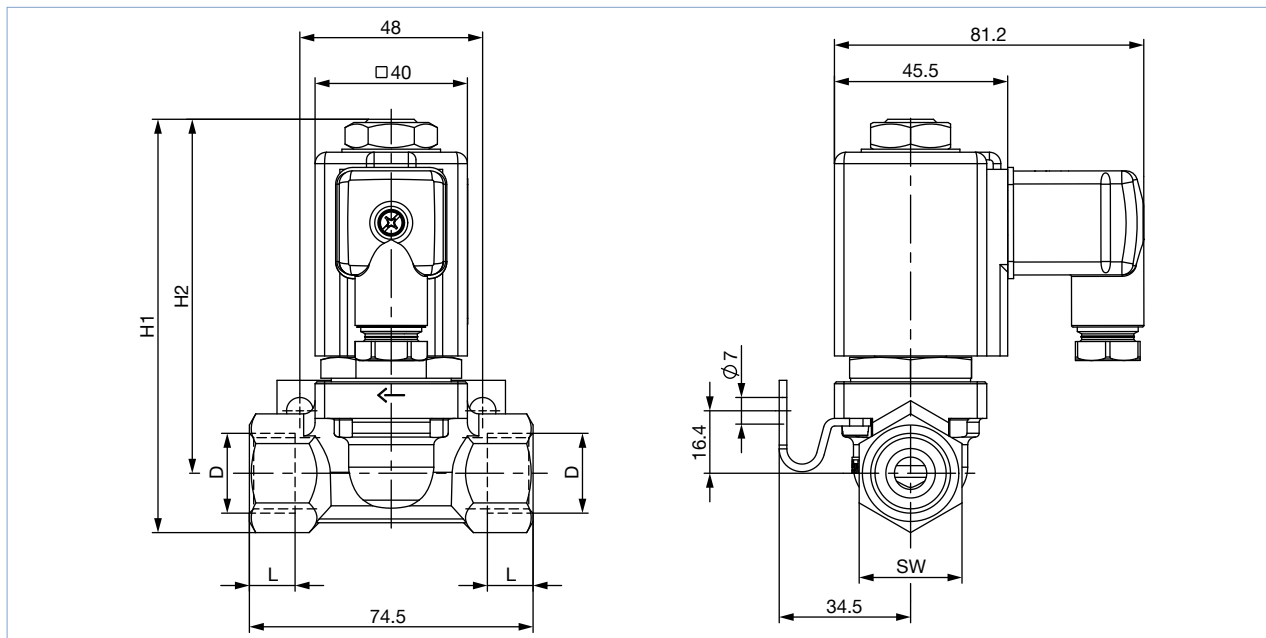
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4. Dimensions

4.1. Stainless steel version

Note:

Dimensions in mm

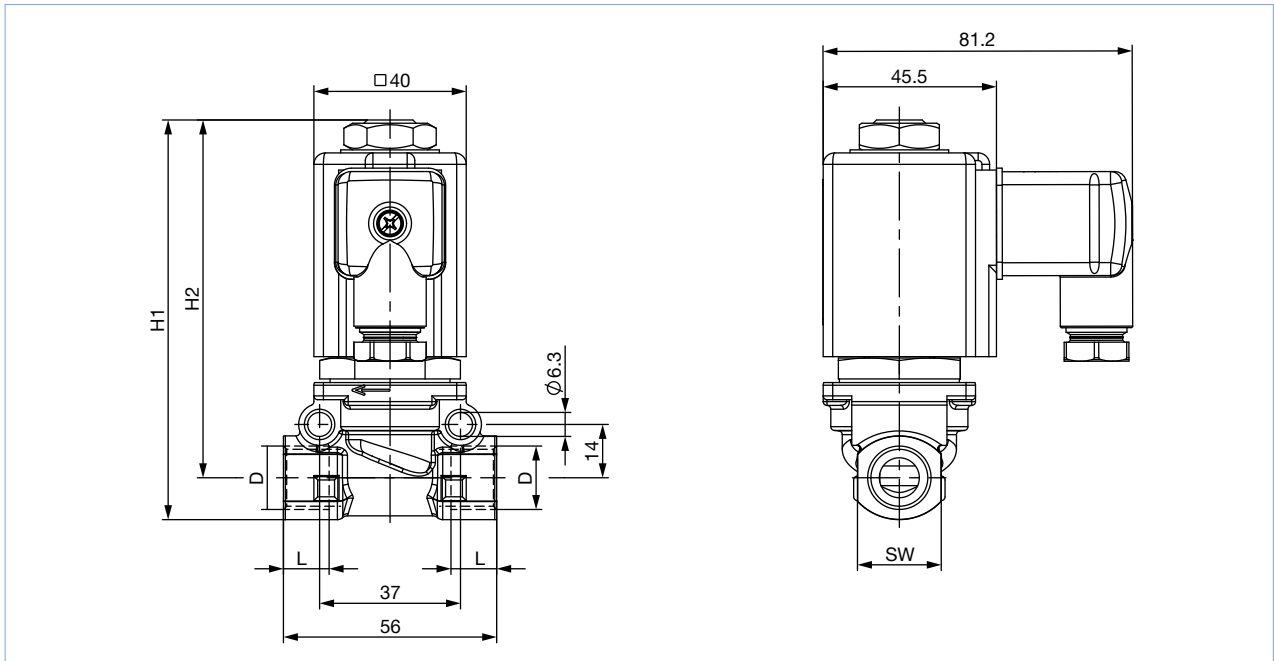


D	L	H1	H2	SW
G ½	14	108.5	93	27
G ¼	12	106		22
NPT ½	13.5	108.5		27
NPT ¼	10	106		22

4.2. Brass version

Note:

Dimensions in mm

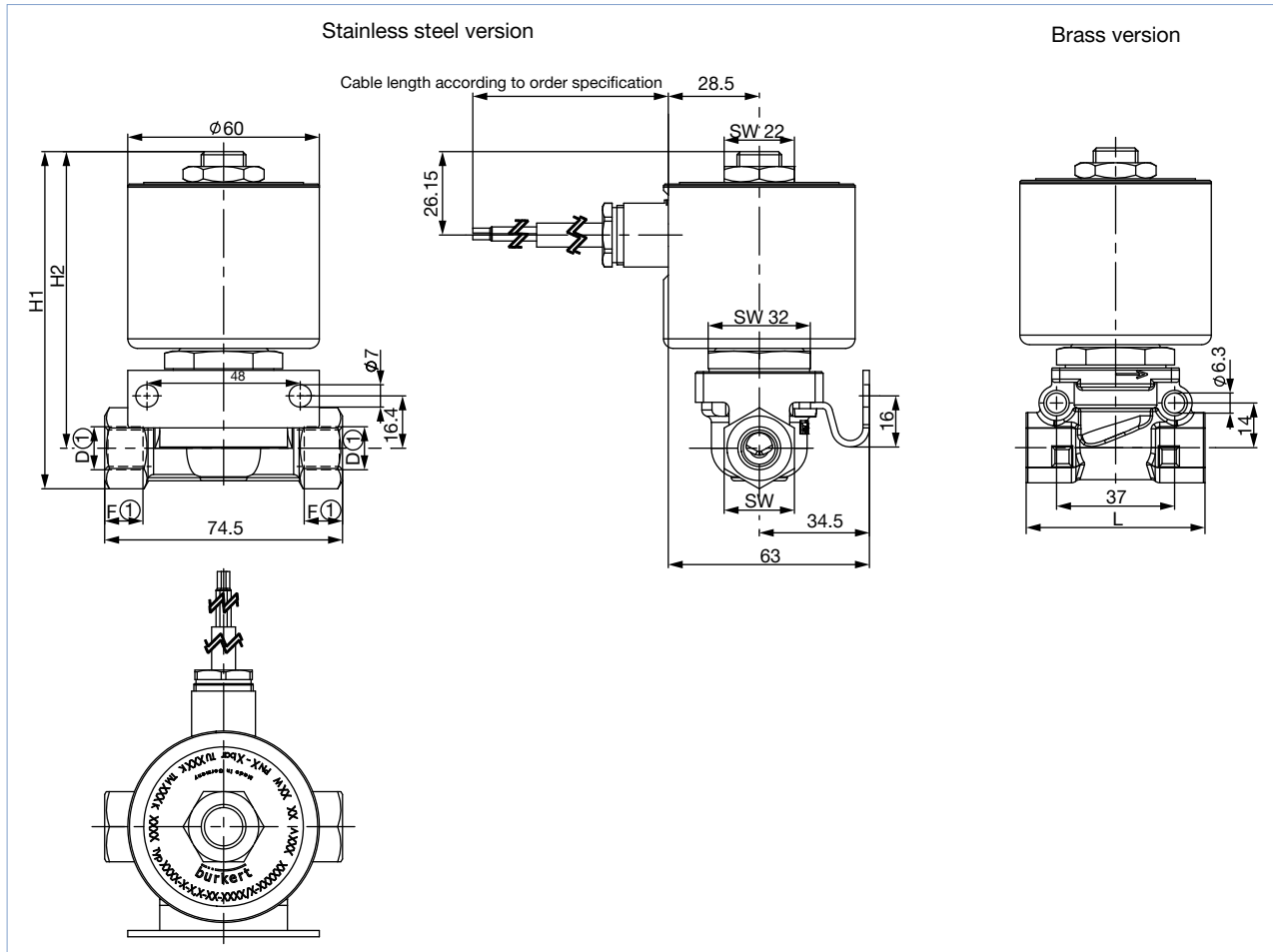


D	L	H1	H2	SW
G ½	14	107	93	27
G ¼	12	105	94	22
G ⅜				
NPT ½	13,5	107	93	27
NPT ¼	10	105	94	22
NPT ⅜	10,3			

4.3. High temperature version

Note:

Dimensions in mm



Version	D1	F1	D2	F2	L	H1	H2	SW
Brass version	G 3/8	12	NPT 3/8	10.3	56	105	94	22
	G 1/4	12	NPT 1/4	10	56	105	94	22
	G 1/2	14	NPT 1/2	13.5	74.5	107	93	27
Stainless steel version	G 1/4	12	NPT 1/4	10	74.5	106	93	22
	G 1/2	14	NPT 1/2	13.5	74.5	108.5	93	27

5. Performance specifications

5.1. Power consumption

Standard version

DN	Electrical power consumption			Switching times			
	Inrush	Hold (hot coil) ^{1.)}		Opening		Closing	
	AC	AC	DC	AC	DC	AC	DC
[mm]	[VA]	[VA/W]	[W]	[ms]	[ms]	[ms]	[ms]
1.0...6.0	35...40	16/10	approx. 12 (13)	10...20	20...80	20...30	20...30

1.) Value in brackets corresponds to a coil temperature of 20 °C

2.) Switching times for standard and high temperature devices

High temperature version

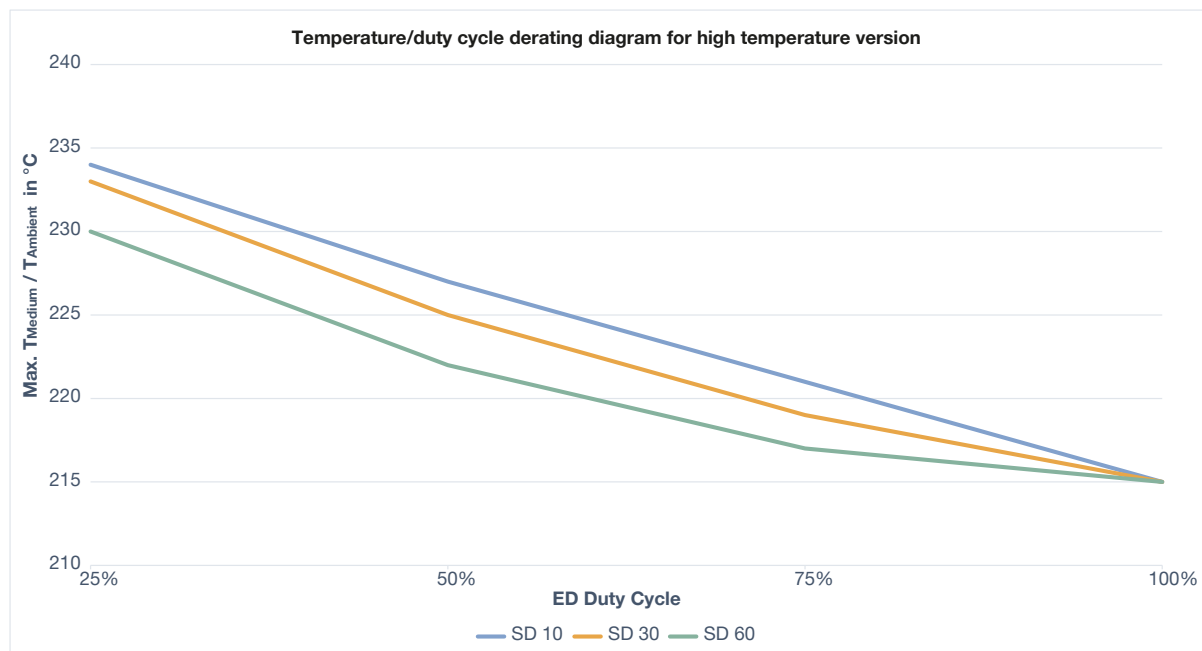
DN	Electrical power consumption			
	CF42 up to 210 °C ambient temperature		CF09 up to 180 °C ambient temperature	
	Cold performance ^{1.)}	Warm performance ^{2.)}	Cold performance ^{1.)}	Warm performance ^{2.)}
[mm]	[W]	[W]	[W]	[W]
1.0...6.0	10	6	13	7

1.) Cold performance refers to a coil temperature of 20 °C

2.) Warm performance at max. ambient temperature and 100% duty cycle

5.2. Temperature/duty cycle derating diagram for high temperature version

Depending on the duty cycle (ED) and the cycle time (SD), the medium and ambient temperature can be increased for the CF42 version with steel sealing.



ED [%]

SD [min]

T_{Medium} = Medium temperature

T_{Ambient} = Ambient temperature

6. Ordering information

6.1. Bürkert eShop – Easy ordering and quick delivery



Bürkert eShop – Easy ordering and quick delivery

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6.2. Bürkert product filter



Bürkert product filter – Get quickly to the right product

You want to select products comfortably based on your technical requirements? Use the Bürkert product filter and find suitable articles for your application quickly and easily.

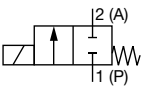
[Try out our product filter](#)

6.3. Ordering chart

Standard version

Note:

- All valves with stainless steel seat
- A cable plug is included in delivery.
- Other versions on request

Circuit function	Port connection	Orifice [mm]	K _v value water ^{1.)} [m ³ /h]	Pressure range ^{2.)}			Seal material	Article no.						
				liquids and gases	liquids	gases		024/DC	024/50	110/50	230/50			
				DC	AC			[V/Hz]	[V/Hz]	[V/Hz]	[V/Hz]			
				[bar]	[bar]	[bar]								
A, solenoid valve 2/2 way Direct-acting Normally closed 	Brass body													
	G ¼	1.0	0.03	0...100	0...100	0...100	PTFE	058360	020755	–	067692			
		2.0	0.12	0...20	0...35	0...60	FKM	089888	020033	020101	064119			
		3.0	0.25	0...10	0...16	0...25	PTFE	052872	058421	058888	046865			
		4.0	0.5	0...4	0...10	0...12	PTFE	058796	065454	023897	053188			
		5.0	0.65	0...2	0...6	0...7	PTFE	020164	049194	049830	050879			
		5.0	0.65	0...2	0...6	0...7	FKM	–	–	–	052424			
	G ⅜	4.0	0.5	0...4	0...10	0...12	PTFE	065438	059100	046886	051143			
		5.0	0.65	–	0...6	0...16	FKM	–	022551	–	025885			
		5.0	0.65	0...2	0...6	0...7	PTFE	020664	057644	023581	050880			
		6.0	0.8	0...1	0...4	0...5	PTFE	053764	050389	066222	051324			
	G ½ ^{3.)}	4.0	0.5	0...4	0...10	0...12	PTFE	089404	–	089403	076551			
		6.0	0.8	0...1	0...4	0...5	FKM	135958	135959	135947	135950			
	Stainless steel body													
	G ¼ ^{3.)}	1.0	0.03	0...100	0...100	0...100	PTFE	018004	078420	–	019862			
		3.0	0.25	0...10	0...16	0...25	PTFE	021554	018593	–	061010			
		4.0	0.5	0...4	0...10	0...12	PTFE	021251	020468	–	023279			
		5.0	0.65	0...2	0...6	0...7	PTFE	125097	019991	086924	025250			
	G ½ ^{3.)}	3.0	0.25	0...10	0...16	0...25	PTFE	019204	059254	–	055506			
		4.0	0.5	0...4	0...10	0...12	PTFE	065684	066932	–	054473			
6.0		0.8	0...1	0...4	0...5	FKM	022504	052859	067990	054811				

1.) Measured at +20 °C, 1 bar pressure at valve inlet and free outlet

2.) Overpressure with respect to atmospheric pressure (the pressure rates for liquids are specified on the type plate)

3.) All versions with mounting bracket included

High temperature version

Circuit function	Port connection	Orifice [mm]	K _v value water ^{1.)} [m ³ /h]	Pressure range liquids and gases ^{2.)} [bar]	Seal material	Article no.
						024/DC
						[V/Hz]
A, solenoid valve 2/2 way Direct-acting Normally closed 	Stainless steel body with CF09 coil (medium temperature up to 180 °C)					
	G ¼	2.0	0.12	0...20	PTFE	85968
		3.0	0.25	0...10	PTFE	141961
		4.0	0.5	0...4	PTFE	20734
	Stainless steel body with CF42 coil (medium temperature up to 210 °C)					
	G ¼	3.0	0.25	0...10	Steel	20032425
		4.0	0.5	0...4	Steel	20032423
5.0		0.65	0...2	Steel	20043309	

1.) Measured at +20 °C, 1 bar pressure at valve inlet and free outlet

2.) Overpressure with respect to atmospheric pressure (the pressure rates for liquids are specified on the type plate)

Further versions on request	
Approval UL, UR, CSA, EEx, CGA/AGA	Analytical Silicon, oil and fat-free version for oxygen
Temperature High temperature version up to 210 °C	Pressure High performance version with high power electronic for higher pressures.
Material Seal material EPDM, NBR, steel	

6.4. Ordering chart accessories

Mounting set brass body

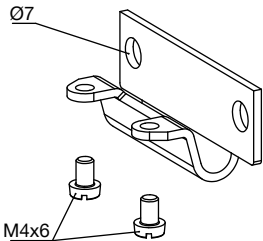

Note:

- Included in delivery are a mounting bracket and 2 cylinder screws M5 × 35.
- Only for brass body versions
- 37 mm separation between the M5 threaded holes
- 48 mm separation between the Ø 7 bores
- Valve mounting with mounting set see [“4.2. Brass version” on page 6](#)

Description	Article no.
	151287

Mounting set stainless steel body**Note:**

- Included in delivery are a mounting bracket and 2 cylinder screw M4 × 6.
- Only for stainless steel body
- 29 mm separation between the M4 threaded holes
- 48 mm separation between the Ø 7 bores
- Valve mounting with mounting set see [“4.1. Stainless steel version” on page 5](#)

Description	Article no.
	260250 

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