

# Butterfly valve series BSV

The butterfly valves of the series BSV are DVGW approved to the Norm EN 161 with **CE** product identification number.

They are suitable to be used on residential and industrial combustion systems. They are particularly suitable for both manual and automatic control of gases belonging to the first, second and third family and of air.

Installation with two threaded flanges from Rp 3/4 to Rp 2.



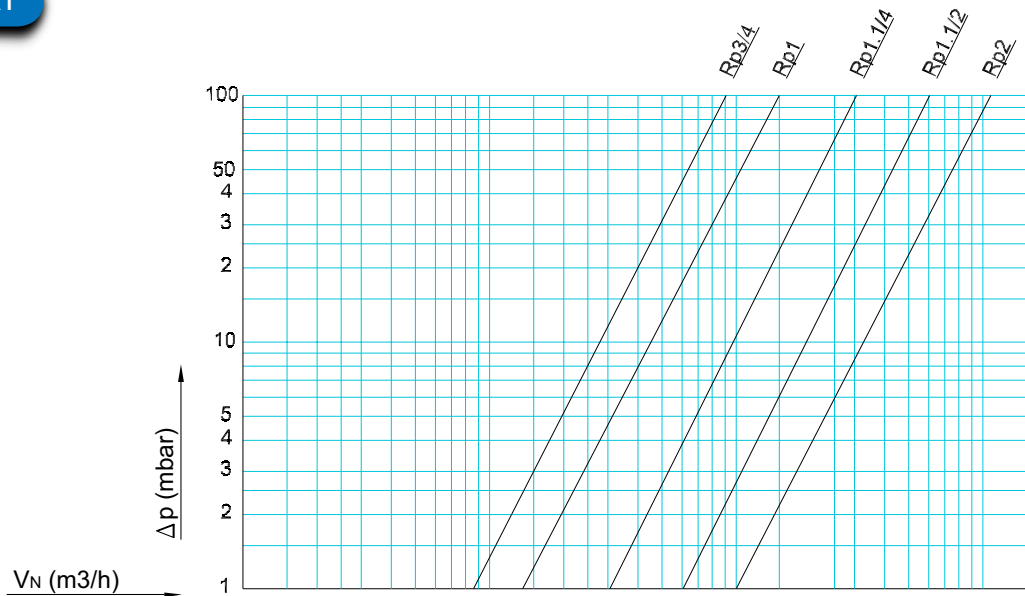
## TECHNICAL FEATURES

<b>Body and flanges</b>	Aluminium
<b>Stem</b>	Stainless steel AISI 303
<b>Butterfly disc</b>	Aluminium or AISI 304
<b>Threaded flanges</b>	From Rp 3/4 to Rp 2 according to norms EN 10226
<b>Max. pressure</b>	500 mbar
<b>Temperature</b>	-10 ÷ +60°C for gas -10 ÷ +80°C for air
<b>Temperature on request</b>	-10 ÷ +110°C or +200°C for air
<b>Control ratio</b>	10:1
<b>Valves flow</b>	Bidirectional

## FEATURES

- Sturdy, compact construction, especially suitable for industrial applications
- Installation in any position
- Mechanical position indicator
- Lockable rotation angle from 0° to 90°
- Low leakage at valve in closed position 1% of max. kv
- Wide range of accessories on request:
  - manual control lever
  - 1 o 2 internal reductions with respect to the nominal diameter of the valve
  - butterfly disc AISI 304 for air temperature up to 200 °C

# FLOW CHART



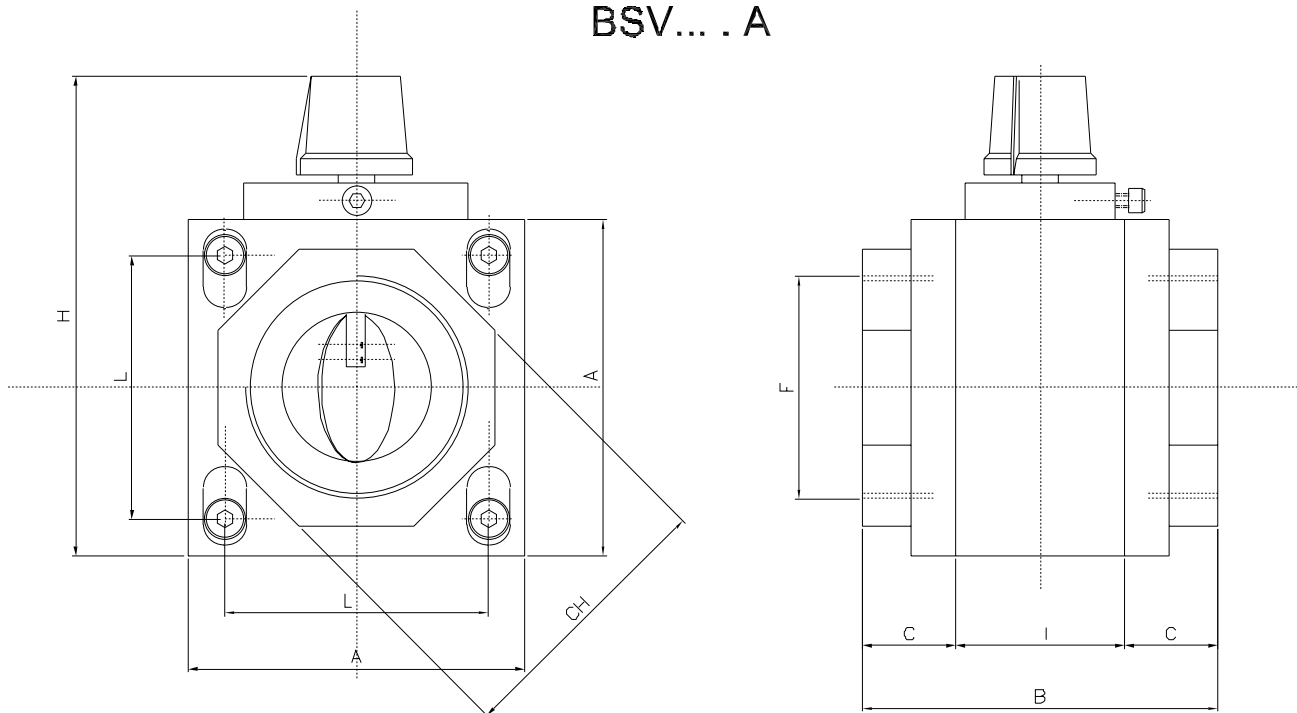
Aria Air	dv=1	1 2 3 4 5 6 8 10 2 3 4 5 6 8 100 2 3 4 5 6 8 1000
Metano Methane	dv=0,64	1 2 3 4 5 6 8 10 2 3 4 5 6 8 100 2 3 4 5 6 8 1000
Gas di città Town gas	dv=0,45	1 2 3 4 5 6 8 10 2 3 4 5 6 8 100 2 3 4 5 6 8 1000 2
Propano Propane	dv=1,56	1 2 3 4 5 6 8 10 2 3 4 5 6 8 100 2 3 4 5 6 8 1000
Butano Butane	dv=2,09	1 2 3 4 5 6 8 10 2 3 4 5 6 8 100 2 3 4 5 6 8
G.P.L. L.G.P.	dv=1,70	1 2 3 4 5 6 8 10 2 3 4 5 6 8 100 2 3 4 5 6 8 1000

## MODELS

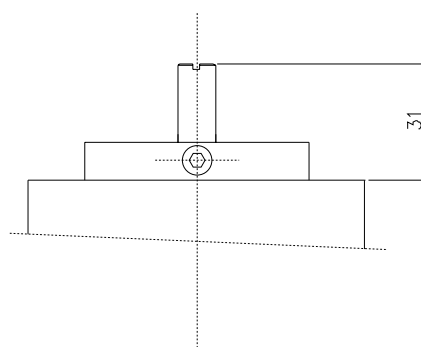
DN	Connection Rp	Orifice diameter (mm)	MODEL	
			Manual control	Free shaftft
20	3/4	20	BSV20.A	BSV20.B
25	1	20	BSV25/20.A	BSV25/20.B
		25	BSV25.A	BSV/25.B
32	1.1/4	20	BSV32/20.A	BSV32/20.B
		25	BSV32/25.A	BSV32/25.B
		32	BSV32.A	BSV32.B
40	1.1/2	25	BSV40/25.A	BSV40/25.B
		32	BSV40/32.A	BSV40/32.B
		40	BSV40.A	BSV40.B
50	2	32	BSV50/32.A	BSV50/32.B
		40	BSV50/40.A	BSV50/40.B
		50	BSV50.A	BSV50.B

**NOTE** For max. temperature of 110 °C add "1" to letters "A" or "B"  
For max. temperature of 200 °C add "2" to letters "A" or "B"

**BSV... . A**



**BSV... . B**



Dimensions in mm

DN	F	A	B	C	H	I	L	CH	Weight Kg
20	Rp 3/4	60	86	22	98,5	42	42,4	42	0,8
25	Rp 1	60	86	22	98,5	42	42,4	42	0,7
32	Rp 1.1/4	90	95	25	128,5	45	70,7	60	1,5
40	Rp 1.1/2	90	95	25	128,5	45	70,7	60	1,4
50	Rp 2	90	95	25	128,5	45	70,7	74	1,6

## 1. WARNING



Installation, adjustment and maintenance of the valve must be carried out exclusively by skilled and authorized service technicians. Non-proper installation, adjustment, changes, use and maintenance may cause damages to the personnel or to the equipment. Consequently, it is necessary to respect strictly the following instructions and local prescriptions for both the installation of electric devices, in case of motorized valves, and of gas systems.

## 2. INSTALLATION

- 2.1 Make sure that all operating data indicated on the valve label correspond to those of the system.
- 2.2 When installing the valve be sure that there is sufficient clearance above the gear cover and that it can be easily accessible in order to perform manual servicing, automatic servicing by means of a gear motor or servicing by means of levers.
- 2.3 For the valves of the BSV series proceed as follows:
  - remove the protection plugs from the threaded flanges,
  - screw the threaded flanges to the inlet and outlet pipes, using exclusively sealing materials suitable for gases,
  - insert the BSV valve between the two flanges with "O" rings,
  - tighten the flanges to the valve body by means of the respective bolts.
- 2.4 The installation of the BSV valves can be performed in any position.
- 2.5 The valve can be installed in any location except where acid fumes or other deteriorating vapour may attack its metal parts or where gas leaks or explosive vapours are present in the atmosphere.
- 2.6 Do not use the valve as a lever.

## 3. OPERATING

- 3.1 Before operating the following points must be checked carefully:
  - tightness of the external gas pipes;
  - that valve adjustment is performed within the requested angle range;
  - that mechanical locks or other retainers, which may damage the valve, have been removed.
- 3.2 Once these preliminary checks have been performed, the main gas tap can be opened and the operation test can be carried out.

## 4. MAINTENANCE AND CHECKS

- 4.1 The BSV valves do not require any particular current maintenance because they do not need lubrication.
- 4.2 It is recommendable to check at least once a year that the mechanical connections have not been modified, especially in case of systems, which do not function vibration-free.

## 5. REPLACEMENT

- In case replacement of the BFV valve is necessary, proceed as follows:
  - 5.1 Close the main gas tap.
  - 5.2 Remove the mechanical connections from the valve axis.
  - 5.3 Remove the valve body from the inlet and outlet flanges by loosening the fastening screws from the respective nuts.
  - 5.4 Install the new valve proceeding as per instructions reported in the foregoing chapters.