







Size: DN 15 to DN 200 Ends: Flanges R.F. PN40

Min Temperature: - 20°C Max Temperature: +400°C Max Pressure: 40 Bars

**Specifications:** Rising stem and handwheel

Bolted bonnet and gland pack Stainless steel stem and seat

Materials: Carbon steel



### **SPECIFICATIONS:**

- . Respect the flow direction indicated by the arrow
- · Rising stem and handwheel
- · Bolted bonnet and gland pack
- Stainless steel stem and seat
- · Pressed seat in the body
- · Conical disc
- Flanges R.F. PN40
- RAL 5002 blue painting, 15µ thickness

### USE:

- Common fluids of 2<sup>nd</sup> group
- Min and max Temperature Ts : 20°C to + 400°C
- Max Presure Ps : 40 bars ( see graph under )
- · Keep greased the stem
- · Not for thermic fluids
- · Tighten the gland packing during setting

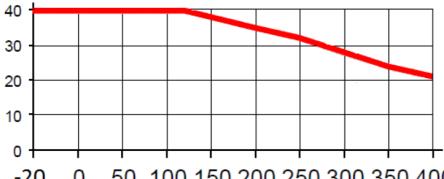
### FLOW COEFFICIENT Kvs (M3/h):

| DN           | 15 | 20 | 25 | 32 | 40 | 50 | 65 | 80  | 100 | 125 | 150 | 200 |
|--------------|----|----|----|----|----|----|----|-----|-----|-----|-----|-----|
| Kvs ( m3/h ) | 4  | 7  | 11 | 19 | 30 | 46 | 70 | 115 | 150 | 220 | 310 | 675 |

### PRESSURE / TEMPERATURE GRAPH:

### Pression





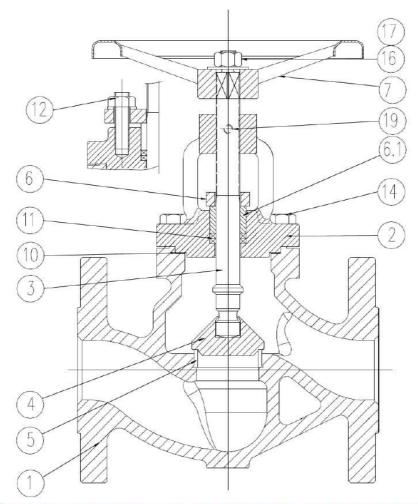
50 100 150 200 250 300 350 400 Temperature (°C) -20

### **RANGE:**

Carbon steel globe valve flanges R.F. PN40 from DN 15 to DN 200 Ref. 471



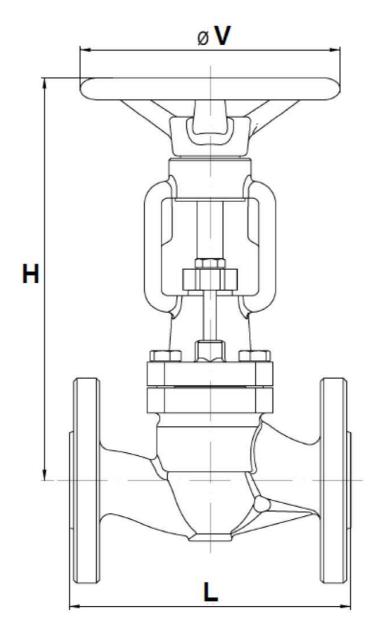
## MATERIALS:



| item | Designation   | Materials DN15-100 Materials DN125- |                 |  |  |  |  |  |
|------|---------------|-------------------------------------|-----------------|--|--|--|--|--|
| 1    | Body          | ASTM A216 WCB ( 1.0619 )            |                 |  |  |  |  |  |
| 2    | Bonnet        | ASTM A216 WCB ( 1.0619 )            |                 |  |  |  |  |  |
| 3    | Stem          | X12 CrNi S 18 8                     |                 |  |  |  |  |  |
| 4    | Disc          | AISI 420 ( 1.4021 )                 | A105 + Stellite |  |  |  |  |  |
| 5    | Seat          | CA6NM                               | AISI 304        |  |  |  |  |  |
| 6    | Gland         | EN f                                | 10025           |  |  |  |  |  |
| 6.1  | Gland ring    | EN 10087                            |                 |  |  |  |  |  |
| 7    | Handwheel     | EN GJS-400                          |                 |  |  |  |  |  |
| 10   | Gasket        | Graphite                            |                 |  |  |  |  |  |
| 11   | Packing       | Graphite                            |                 |  |  |  |  |  |
| 12   | Gland bolts   | Steel 5.6                           |                 |  |  |  |  |  |
| 14   | Bonnet bolts  | Steel C35E                          |                 |  |  |  |  |  |
| 16   | Handwheel nut | Steel 5.6                           |                 |  |  |  |  |  |
| 17   | Washer Steel  |                                     |                 |  |  |  |  |  |
| 19   | Lubricator    | Brass                               |                 |  |  |  |  |  |



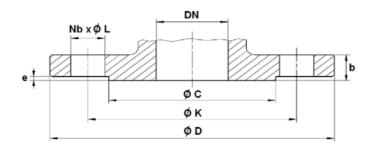
## SIZE (in mm):



| Ref. | DN          | 15  | 20  | 25  | 32  | 40   | 50  | 65   | 80   | 100 | 125 | 150 | 200 |
|------|-------------|-----|-----|-----|-----|------|-----|------|------|-----|-----|-----|-----|
| 471  | l <b>L</b>  | 130 | 150 | 160 | 180 | 200  | 230 | 290  | 310  | 350 | 400 | 480 | 600 |
|      | н           | 190 | 195 | 220 | 219 | 254  | 265 | 328  | 341  | 376 | 488 | 531 | 663 |
|      | øv          | 140 | 140 | 140 | 140 | 180  | 180 | 200  | 200  | 250 | 330 | 330 | 400 |
|      | Weight (Kg) | 3.5 | 4.3 | 6.3 | 7.3 | 12.5 | 15  | 22.5 | 27.5 | 42  | 67  | 99  | 200 |



### FLANGES SIZE (in mm):



| DN       | 15     | 20     | 25     | 32     | 40     | 50     | 65     | 80     | 100    | 125    | 150    | 200     |
|----------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|---------|
| øс       | 45     | 58     | 68     | 78     | 88     | 102    | 122    | 138    | 162    | 188    | 218    | 285     |
| ØD       | 95     | 105    | 115    | 140    | 150    | 165    | 185    | 200    | 235    | 270    | 300    | 375     |
| øκ       | 65     | 75     | 85     | 100    | 110    | 125    | 145    | 160    | 190    | 220    | 250    | 320     |
| Nb x Ø L | 4 x 14 | 4 x 14 | 4 x 14 | 4 x 18 | 4 x 18 | 4 x 18 | 8 x 18 | 8 x 18 | 8 x 22 | 8 x 26 | 8 x 26 | 12 x 30 |
| b        | 16     | 18     | 18     | 18     | 18     | 20     | 22     | 24     | 24     | 26     | 28     | 34      |
| е        | 2      | 2      | 2      | 2      | 3      | 3      | 3      | 3      | 3      | 3      | 3      | 3       |

### **STANDARDS:**

- Fabrication according to ISO 9001:2008
- Designing according to DIN 3840
- Marking according to EN 19
- DIRECTIVE 97/23/CE : CE N° 0035 Risk category III Module H
- Pressure Tests according to EN 12266-1, range A
- Length according to EN 558 series 1 (DIN 3202 F1)
- Flanges R.F. according to EN 1092-1 PN40

### INSTALLATION INSTRUCTIONS

### **GENERAL GUIDELINES:**

- Ensure that the valves to be used are appropriate for the conditions of the installation (type of fluid, pressure and temperature).
- Be sure to have enough valves to be able to isolate the sections of piping as well as the appropriate equipment for maintenance and repair.
- Ensure that the valves to be installed are of correct strength to be able to support the capacity of their
- Installation of all circuits should ensure that their function can be automatically tested on a regular basis (at least two times a year).

### **INSTALLATION INSTRUCTIONS:**

- Before installing the valves, clean and remove any objects from the pipes (in particular bits of sealing and metal) which could obstruct and block the valves.
- Ensure that both connecting pipes either side of the valve (upstream and downstream) are aligned (if they're not, the valves may not work correctly).
- Make sure that the two sections of the pipe (upstream and downstream) match, the valve unit will not absorb any gaps. Any distortions in the pipes may affect the thightness of the connection, the working of the valve and can even cause a rupture. To be sure, place the kit in position to ensure the assembling will work.
- If sections of piping do not have their final support in place, they should be temporarily fixed. This is to avoid unnecessary strain on the valve.
- Tighten the bolts in cross.
- It's recommended to operate the valve (open and close) 1 to 2 times per year
- Tighten the gland packing at the first start of the installation ( with a moderate torque ) so that there's no leakage and the handwheel is easy to operate.
- Do not use tools to operate the handwheel
- Respect the flow direction indicated by the arrow