



|    |                |
|----|----------------|
| 1  | Body           |
| 2  | Body Seal Ring |
| 3  | Disk           |
| 4  | Ball           |
| 5  | Stem           |
| 6  | Packing        |
| 7  | Gland          |
| 8  | Bonnet         |
| 9  | Bonnet Gasket  |
| 10 | Bolt           |
| 11 | Hand Wheel     |



### CAST IRON GLOBE VALVES

Globe valves are used for positive shut-off and for regulating purpose. They are designed to open and close efficiently, allowing frequent operation over long periods with a minimum of maintenance. Globe valves are ideal for throttling service. Their flow characteristics permit accurate and repeatable control SAM globe valves are available with metal disks. Metal disks are best suited for high temperatures. Designation of SAM's globe valves is in accordance with below standards:

**Material:** DIN 3356

**Face to Face dimensions:** DIN 3202-F1

**Flanges mating dimensions:** DIN 2501-Post1

**Pressure testing:** ISO 5208

| Materials of Parts (According to DIN 3356) |                |                   |                  |                                |                     |
|--------------------------------------------|----------------|-------------------|------------------|--------------------------------|---------------------|
| No.                                        | Part Name      | Material Number   | Material Number  | Code Number                    | Material Standards  |
| 1                                          | Body           | Gray Cast Iron    | 0.6025           | GG 25                          | DIN 1691 or ISO 185 |
| 2                                          | Body Seal Ring | Stainless Steel   | 1.4301 or 1.4401 | X5Cr Ni 18 10 or X2Cr Ni 18 10 | DIN 17440           |
| 3                                          | Disk           | Ductile Cast Iron | 07050            | GGG 50                         | DIN 1693            |
| 4                                          | Disk Seal Ring | Stainless Steel   | 1.4301 or 1.4401 | X5Cr Ni 18 10 or X2Cr Ni 18 10 | DIN 17440           |
| 5                                          | Stem           | Stainless Steel   | 1.4021           | X20 Cr 13                      | DIN 17440           |
| 6                                          | Packing        | Flexible Graphite | -                | -                              | -                   |
| 7                                          | Gland          | Gray Cast Iron    | 06025            | GG 25                          | DIN 1691 or ISO 185 |
| 8                                          | Bonnet         | Gray Cast Iron    | 0.6025           | GG 25                          | DIN 1691 or ISO 185 |
| 9                                          | Bonnet Gasket  | -                 | -                | -                              | DIN 3754            |
| 10                                         | Bolt           | -                 | -                | CK 15                          | DIN 933             |
| 11                                         | Hand wheel     | Graycast Iron     | 0.6025           | GG 25                          | DIN 1691 or ISO 185 |



| Face to face and space requirement dimensions |     |     |     |     |     |      |      |     |     |     |      |     |
|-----------------------------------------------|-----|-----|-----|-----|-----|------|------|-----|-----|-----|------|-----|
| DN                                            | 15  | 20  | 25  | 32  | 40  | 50   | 65   | 80  | 100 | 125 | 150  | 200 |
| L                                             | 130 | 150 | 160 | 180 | 200 | 230  | 290  | 310 | 350 | 400 | 480  | 600 |
| D                                             | 95  | 105 | 115 | 140 | 150 | 165  | 185  | 200 | 220 | 250 | 285  | 340 |
| K                                             | 65  | 75  | 85  | 100 | 110 | 125  | 145  | 160 | 180 | 210 | 240  | 295 |
| b1                                            | 14  | 16  | 16  | 18  | 18  | 20   | 20   | 22  | 24  | 26  | 26   | 30  |
| d1                                            | 100 | 100 | 120 | 120 | 140 | 140  | 160  | 180 | 200 | 200 | 225  | 280 |
| d2                                            | 14  | 14  | 14  | 18  | 18  | 18   | 18   | 18  | 18  | 18  | 22   | 22  |
| h1                                            | 170 | 204 | 210 | 250 | 255 | 277  | 318  | 370 | 421 | 478 | 551  | 672 |
| Number of holes                               | 4   | 4   | 4   | 4   | 4   | 4    | 4    | 8   | 8   | 8   | 8    | 12  |
| Weight (kg)                                   | 3.2 | 4.8 | 5.3 | 9   | 9.8 | 12.5 | 19.5 | 26  | 38  | 59  | 80.5 | 145 |
| d4                                            | 45  | 58  | 68  | 78  | 88  | 102  | 122  | 138 | 158 | 188 | 212  | 268 |

Face to Face dimensions (Series F1 as specified in DIN 3202) and space requirement dimensions for PN 16 globe valves with PN 16 flange ends (as specified in DIN 2501-post1)

**Working pressure:** PN 16

**Body test pressure:** 25 bar

**Seal test pressure:** 16 bar

**Temperature:** up to 280°C (536°F)