

Materials

Body and bonnet



- Body and bonnet of GJS-500-7 (GGG-50).
- V-shaped sealing ring.
- Epoxy coating according to DIN 30677-2 approved internally and externally with a minimum thickness of 250 microns.

Wedge and nylon sliding guide

- Wedge of ductile iron fully vulcanized with EPDM rubber and with fixed brass wedge nut.
- The wedge includes two anti-friction nylon bushings that reduce operating torque and prevent wear on both the elastomer and the ductile iron components.



- The inclusion of the nylon guide shoe eliminates friction between the wedge and the valve guide, reducing wear and preventing calcareous deposits from building up on the stem. This protects the vulcanized rubber on the wedge and avoids friction with iron parts, thereby increasing the service life of the system.

Stem and Gland



- The brass gland nut, screwed into the valve bonnet, includes a pin to prevent accidental unscrewing.
- A specially profiled EPDM gasket is used between the body and bonnet.
- The bolts connecting the bonnet and body can be either stainless steel or carbon steel, and are externally sealed.



Design and Standards

- Resilient-seated gate valve for potable water and wastewater applications, with a maximum operating temperature of 70°C.
- Designed in accordance with EN 1074 parts 1 & 2.
- Face-to-face dimensions according to EN 558.
- Flange drilling as per EN 1092-2 (ISO 7005-2).
- 10-year warranty.
- Hydraulic testing according to EN 1074-1 & 2 and EN 12266.

Stem

- Stem sealing is achieved with three O-rings inserted in the brass gland.
- A dust ring provides protection against external contamination.
- Cold-rolled stem for improved strength and surface finish.



Body/bonnet connection

The unique body-to-bonnet assembly guarantees long-lasting tightness:

- A round rubber bonnet gasket fits securely into a groove in the bonnet, preventing blowout under pressure surges.
- 8.8-grade galvanized bolts are recessed into the bonnet, fully surrounded by the gasket and sealed with hot melt. This prevents exposure to both media and soil, eliminating the risk of corrosion.

Wedge nut

- The fixed wedge nut reduces the number of movable valve parts thus minimizing the risk of corrosion, malfunction.
- The wedge nut is made of dezincification resistant brass with lubricating abilities providing compatibility with the stainless steel stem.

Vulcanized wedge

- The ductile iron core is fully vulcanized with drinking water approved EPDM rubber internally and externally.
- No iron parts are exposed to the medium and the excellent rubber vulcanization prevents creeping corrosion underneath the rubber.
- Guides in the wedge and on the valve body ensure a uniform closure regardless of high pressure.
- Safe operation is ensured, as the guides prevent overloading of the stem.
- The wedge has a large through bore and as there are no hollows in the core, stagnant water or impurities cannot collect and cause contamination.

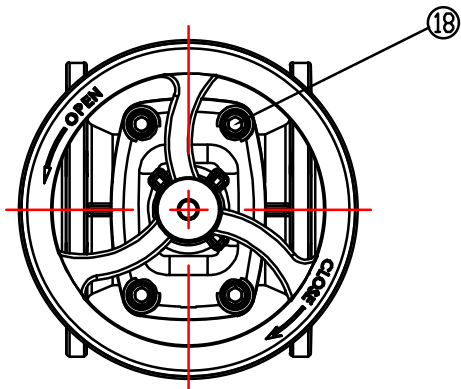
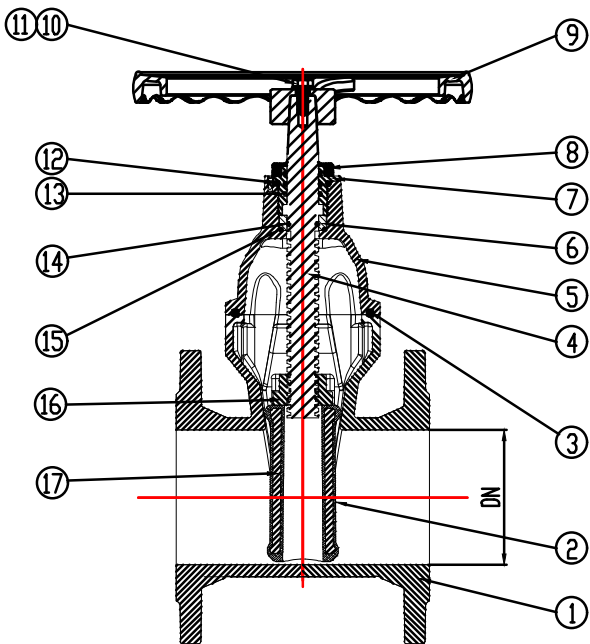
Operation

Valves could be operated by hand wheel/head cap/worm gear/electric actuator etc. according to the customer's requirements.



Generic data

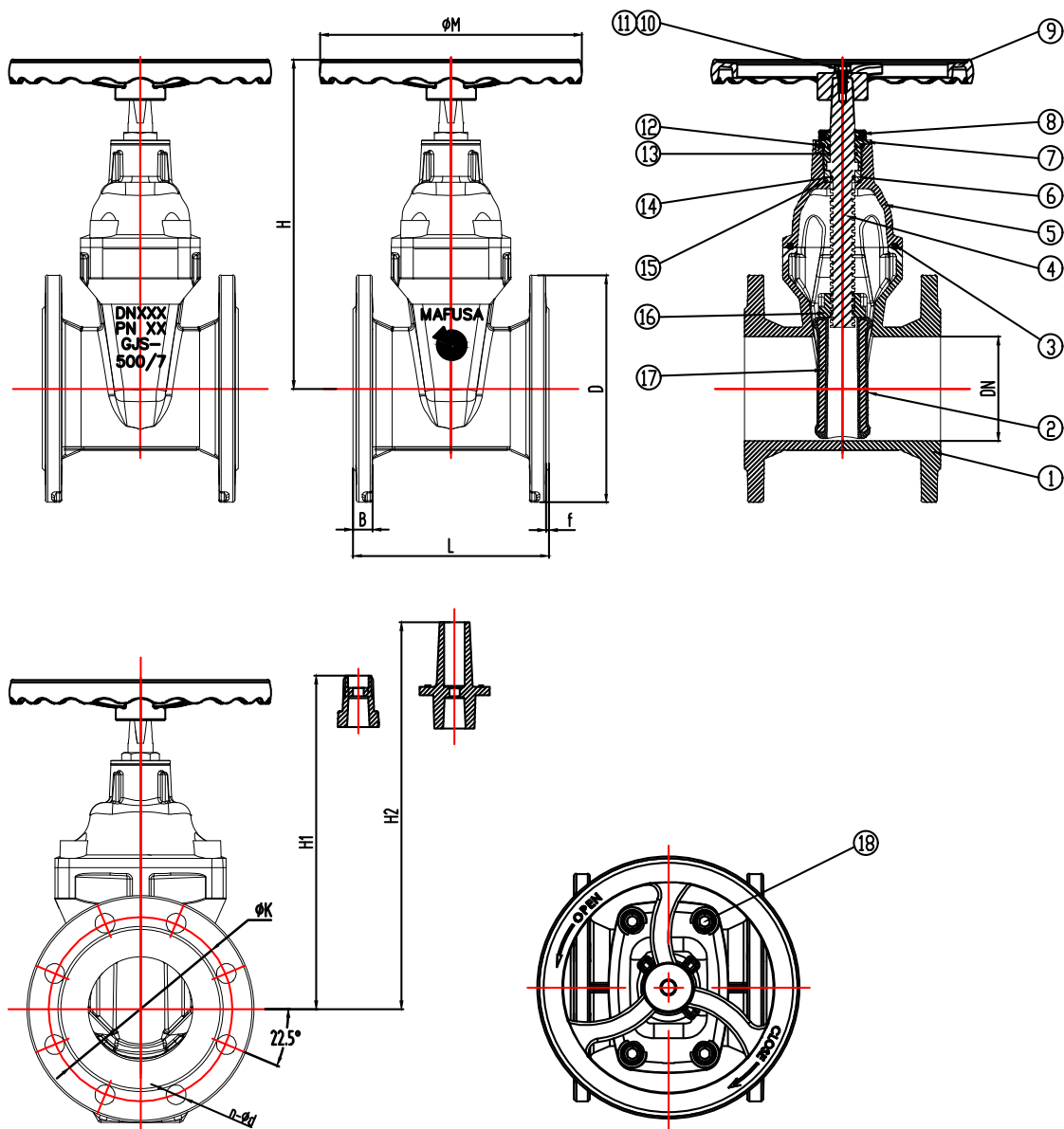
- **Diameter:** DN40 to DN300
- **Nominal pressure:** 1.6 MPa
- **Class:** PN10, PN16
- **Pressure test:**
 - Body:** 2.4 MPa
 - Sealing:** 1.8 MPa
- **Applicable medium:** Potable/waste water
- **Operation:** Handwheel/square cap
- **Maximum flow velocity:** 4 m/s
- **Minimum coating thickness (internal and external):** 250 µm
- **Design standards:** EN 1171, EN 1074-2
- **Face-to-face:** EN 558-1
- **Flange drilling:** EN 1092-2
- **Testing standards:** EN 12266



Materials

Nº	ITEM	MATERIAL
1	Body	EN GJS 500-7
2	Gate	EN GJS 500-7 EPDM coating
3	Bonnet gasket	NBR
4	Stem	X2CrNi18-9
5	Bonnet	EN GJS 500-7
6	Nut	CuZn39Pb2
7	Gland	CuZn39Pb2
8	Dust cover	NBR
9	Bolt / Screw	AISI304
10	Handwheel	EN GJS 500-7
11	Safety pin	X2CrNi18-9
12	O-ring	NBR
13	O-ring	NBR
14	O-ring	NBR
15	O-ring	NBR
16	Gate nut	CuZn39Pb2
17	Cast iron body	EN GJS 500-7
18	Bonnet screw	C45

Note: The marking on the cast parts includes:
product, model, size, pressure, material, and
temperature number.



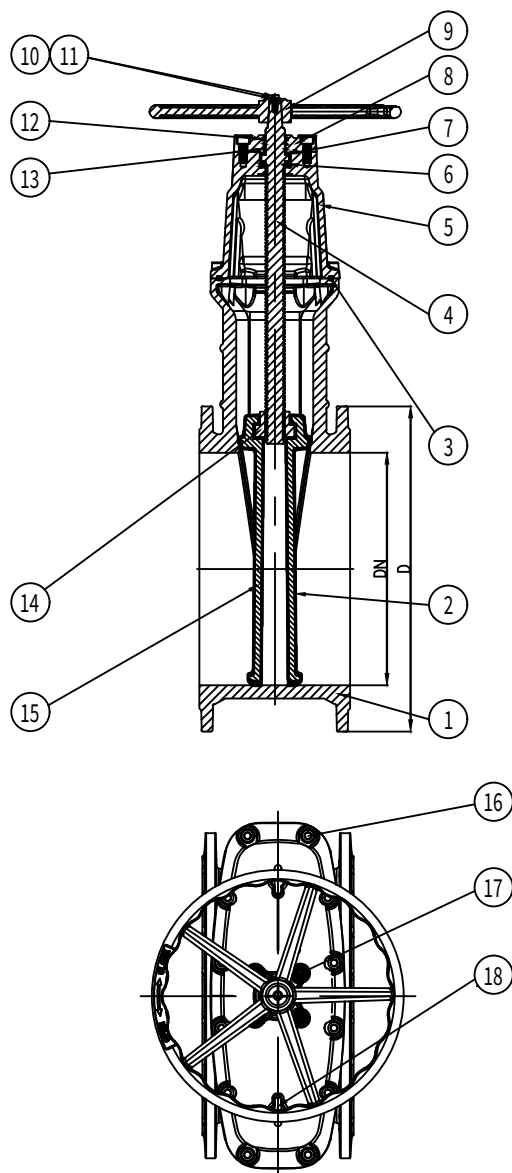
Dimensions (mm)

DN	ø ext (mm)	M	H	H1	H2	End flange EN1092-2 PN10/16 mm					Switch turns	Closing torque (N.m)
	DIN-F4					D	K	n-d	B	f		
	L											
40	140	ø180	215	220	275	150	110	4-ø19	19	3	9	30
50	150	ø180	215	220	275	165	125	4-ø19	19	3	9	40
65	170	ø200	250	250	310	185	145	4-ø19	19	3	10	50
80	180	ø200	270	270	325	200	160	8-ø19	19	3	12	60
100	190	ø220	320	330	380	220	180	8-ø19	19	3	12	80
125	200	ø254	365	375	425	250	210	8-ø19	19	3	14,5	100
150	210	ø280	400	405	450	285	240	8-ø23	19	3	17	120
200	230	ø315	490	510	545	340	295	8-ø23/12-ø23	20	3	18,5	150
250	250	ø406	590	610	645	405	350/355	12-ø23/ 12-ø28	22	3	23	200
300	270	ø406	665	685	720	460	400/410	12-ø23/ 12-ø28	24,5	4	27	250



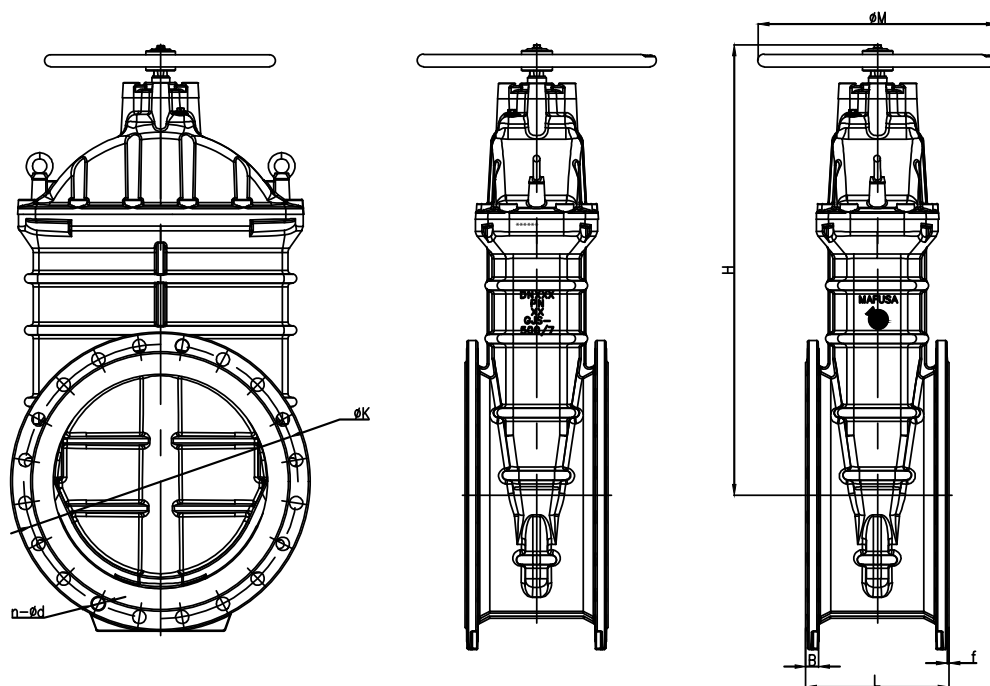
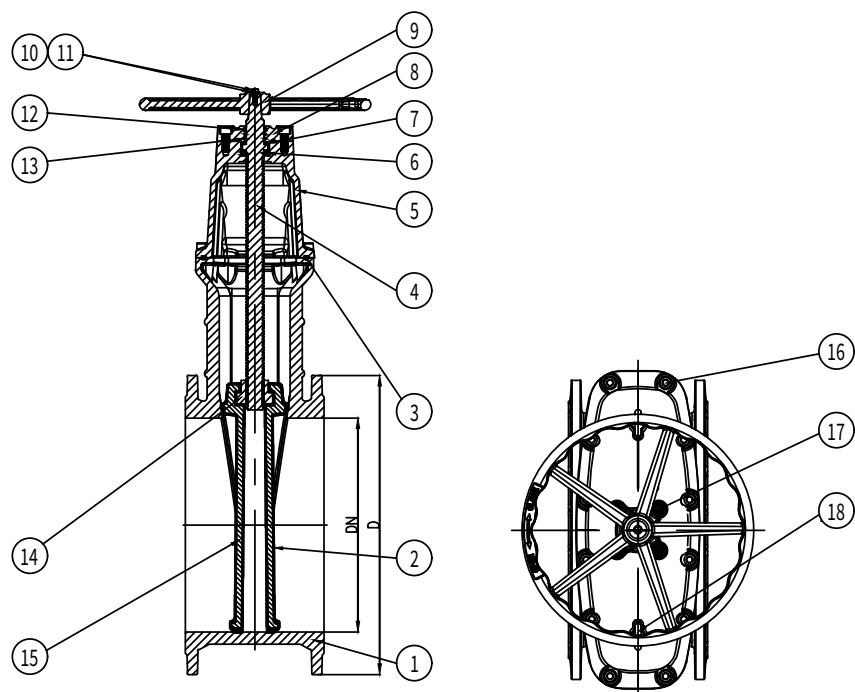
Generic data

- **Diameter:** DN350 to DN600
- **Nominal Pressure:** 1.6 MPa
- **Pressure Class:** PN10, PN16
- **Pressure Test:**
 - **Body:** 15/24 bar
 - **Seat/Sealing:** 11/18 bar
- **Applicable Medium:** Potable water/Wastewater
- **Temperature Range:** 0–80 °C
- **Operation:** Handwheel/Square cap
- **Design Standard:** EN 1171
- **Flange Standard:** EN 1092-2 PN10/PN16
- **Face-to-Face Dimension:** EN 558-1 Series 14
- **Testing Standard:** EN 12266-1
- **Options:** Motorized



Materials

Nº	ITEM	MATERIAL
1	Body	Ductile iron
2	Disc	Ductile iron + EPDM
3	Bonnet gasket	NBR
4	Stem / Shaft	Stainless steel SS420
5	Bonnet	Ductile iron
6	Thrust washer	Brass CuZn39Pb1
7	Thrust bushing	Brass CuZn39Pb1
8	Gland	Ductile iron
9	Handwheel	Ductile iron
10	Bolt	Stainless steel AISI 304
11	Flat washer	Stainless steel AISI 304
12	Dust cover	NBR
13	O-ring	NBR
14	Stem nut	Brass CuZn39Pb1
15	Vulcanized part	Ductile iron
16	Screw	Galvanized carbon steel
17	Screw	Galvanized carbon steel
18	Bolt / Lifting eye	Galvanized carbon steel



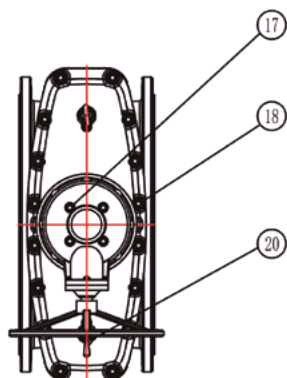
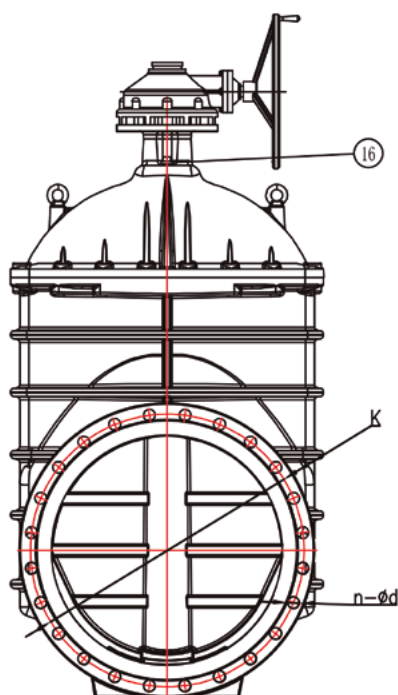
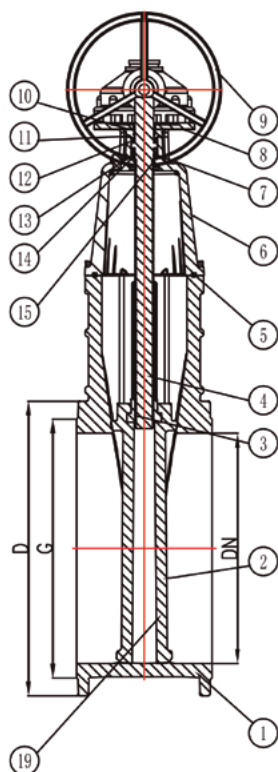
Dimensions (mm)

DN	ø ext (mm)	M	H	End flange EN1092-2 PN10/16 mm					Switch turns	Closing torque (N.m)
	DIN-F4			D	K	n-d	B	f		
	L									
350	290	ø500	760	520	460/470	16ø23/16-ø28	26,5	4	30,5	300
400	310	ø500	850	580	515/525	16ø28/16-ø31	28	4	34,5	350
450	330	ø650	980	640	565/585	20ø28/20-ø31	30	4	34	400
500	350	ø650	1050	670/715	620/650	20ø28/20-ø34	26,5/31,5	4	32,5	450
600	390	ø650	1265	780/840	725/770	20ø31/20-ø37	30/36	5	35	550



Resilient seated flanged gate valve DN700 - DN800 PN10/PN16

mafusa

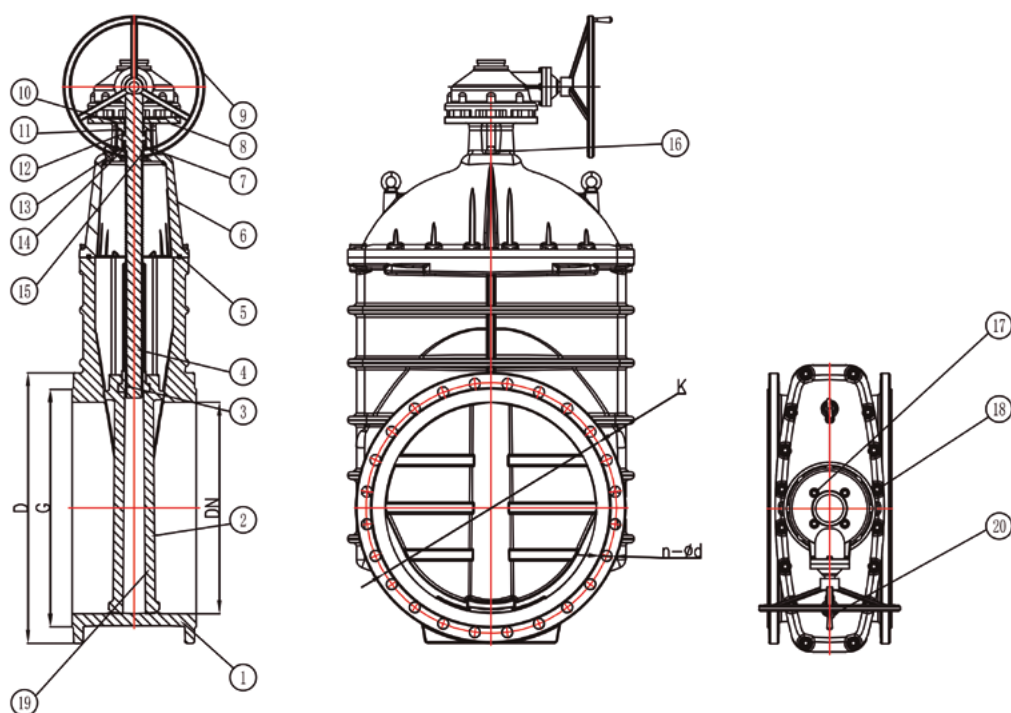
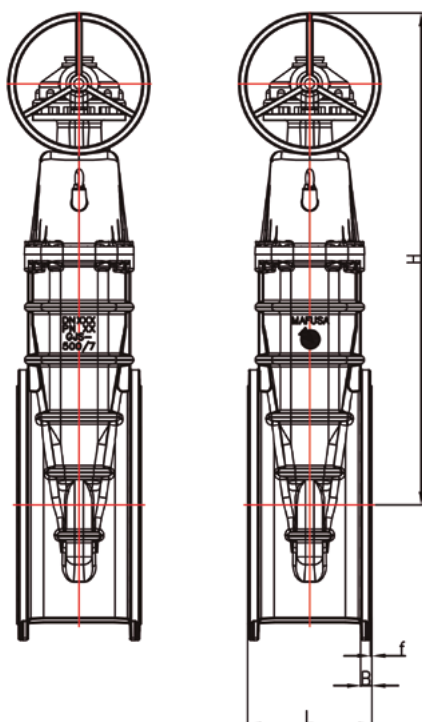


Generic data

- **Diameter:** DN700 to DN800
- **Nominal Pressure:** 1.6 MPa
- **Pressure Class:** PN10, PN16
- **Pressure Test:**
 - **Body:** 15/24 bar
 - **Seat:** 11/18 bar
- **Applicable Medium:** Potable water/Wastewater
- **Temperature Range:** 0–80 °C
- **Operation:** Handwheel/Square cap
- **Design Standard:** EN 1171
- **Flange Standard:** EN 1092-2 PN10/PN16
- **Face-to-Face Dimension:** EN 558-1 Series 14
- **Testing Standard:** EN 12266-1
- **Options:** Motorized

Materials

Nº	ITEM	MATERIAL
1	Valve body	Ductile iron
2	Disc	Ductile iron + EPDM
3	Stem nut	Brass CuZn39Pb1
4	Stem / Shaft	Stainless steel SS420
5	Bonnet gasket	NBR
6	Bonnet	Ductile iron
7	Thrust washer	Brass CuZn39Pb1
8	Gland	Ductile iron
9	Bevel gear	
10	O-ring	NBR
11	O-ring	NBR
12	Bearing	Stainless steel AISI 304
13	O-ring	NBR
14	O-ring	NBR
15	O-ring	NBR
16	Plug	NBR
17	Screw	Galvanized carbon steel
18	Screw	Galvanized carbon steel
19	Vulcanized part	Ductile iron
20	Bolt / Lifting eye	Galvanized carbon steel



Dimensiones (mm)

DN	End flange EN1092-2 PN10/16 mm						ø ext (mm) L		Switch turns	Closing torque (N.m)
	D	G	K	B	f	n-d	DINF4	H		
700	ø895/ø910	ø794	ø840	32,5/39,5	5	24-ø31/24-ø37	430	1330	39	700
800	ø1015/ø1025	ø901	ø950	35/43	5	24-ø34/24-ø41	470	1480	45	900