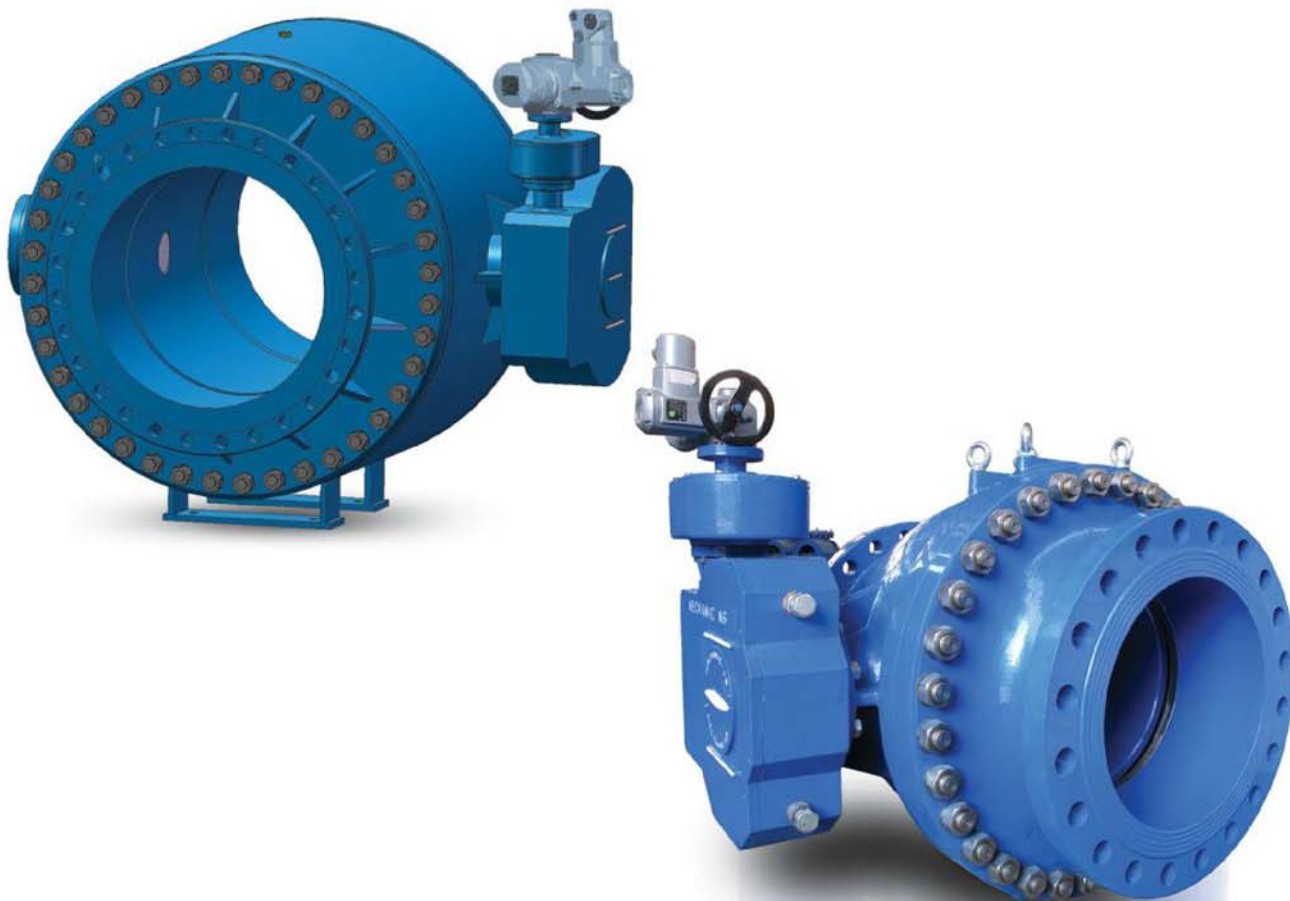
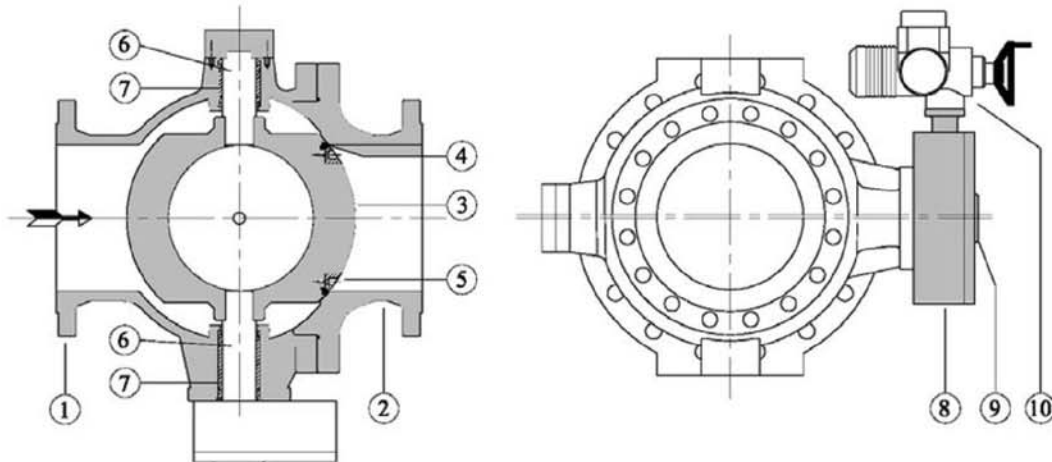


Ball (Spherical) Valves (DN: 100...1200mm, PN: 10...63bar):

- Face to face dimension according to DIN EN 558, Series 26 (DIN 3202-F7)
- Flange drilling for fabricated steel valves according to DIN EN 1092-1 (DIN 2501) similar with ISO 7005-1 (The flange of valve can also be manufactured according to ANSI standard in both classes of 150&300 according to customer's order.)
- Flange drilling for ductile cast iron valves according to DIN EN 1092-2 (DIN 2501) similar with ISO 7005-2
- Multi turn actuator attachment according to ISO 5210
- Part turn actuator attachment according to ISO 5211
- Final test according to DIN EN 12266 or ISO 5208
- Coating paint: epoxy powder paint with electrostatic process



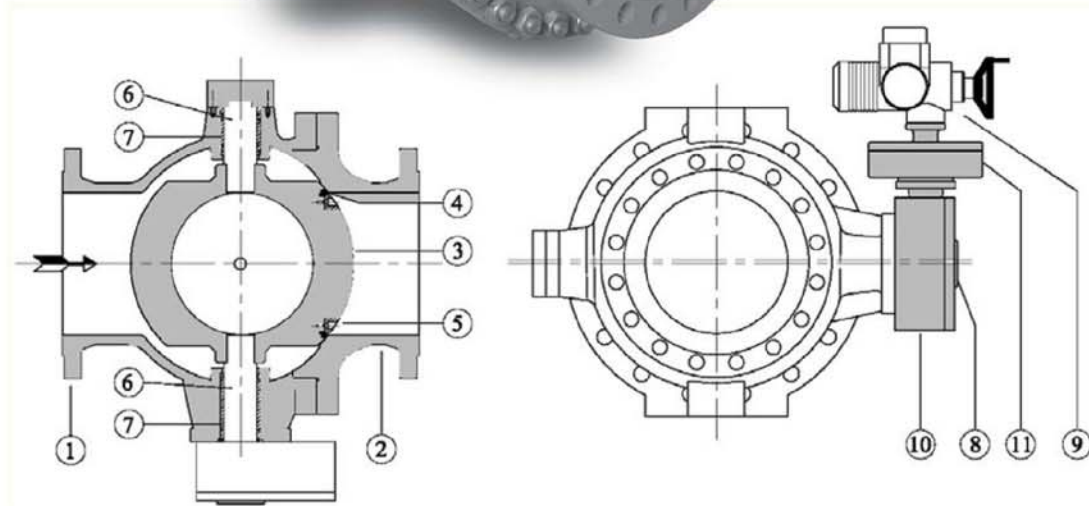
Part List and Materials of Ball Valves with Single Gearbox:



No.	Part Name	Material	No.	Part Name	Material	
1	Body – Inlet part	GGG50 or Cast Steel	8	Gearbox	Worm Gear	GGG 50
2	Body – Outlet part	GGG50 or Cast Steel			Worm	CK 45
3	Ball	GGG50 or Cast Steel			Body/Cover	GGG 40
4	Sealing Ring	NBR or EPDM			Bushing	Bronze
5	Sealing Ring Retainer	GGG50 or Cast Steel	9	Pointer	GGG 40	
6	Shaft	X20Cr13	10	Actuator	–	
7	Bushing	Bronze	–	O- Ring	NBR	

- Manual or electrical actuators are available.
- GGG50 according to DIN EN 1693 is similar with EN-GJS-500-7 according to DIN EN 1563
- GGG40 according to DIN EN 1693 is similar with EN-GJS-400-15 according to DIN EN 1563

Part List and Materials of Ball Valves with Double Gearbox:

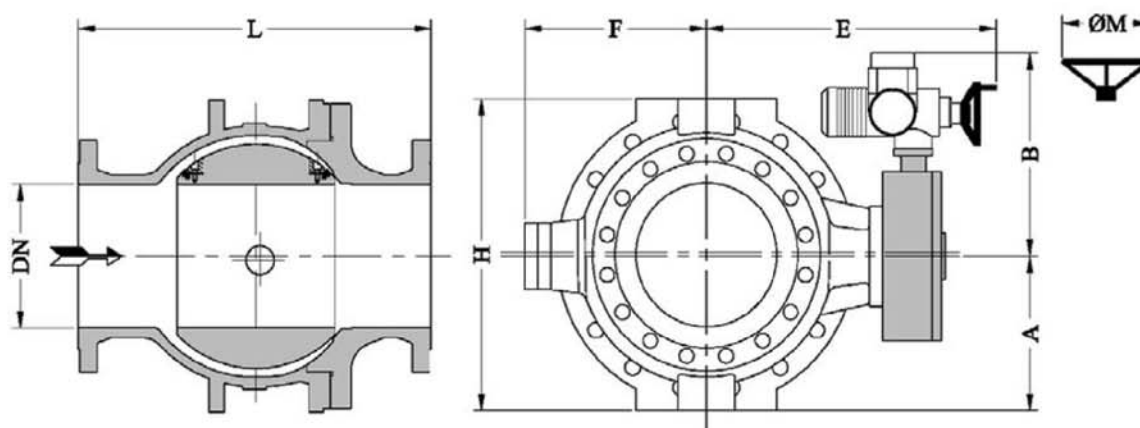


No.	Part Name	Material	No.	Part Name	Material	
1	Body – Inlet part	GGG50 or Cast Steel	10	Main Gearbox	Worm Gear	GGG 50
2	Body – Outlet part	GGG50 or Cast Steel			Worm	CK 45
3	Ball	GGG50 or Cast Steel			Body/Cover	GGG 40
4	Sealing Ring	NBR or EPDM			Bushing	Bronze
5	Sealing Ring Retainer	GGG50 or Cast Steel	11	Reducing Gearbox(II) (Type : Spur Gear)	Gear	GGG 50
6	Shaft	X20Cr13			Pinion	X20 Cr 13
7	Bushing	Bronze			Body/Cover	GGG 40
8	Pointer	GGG 40			Bushing	Bronze
9	Actuator	–	–	O- Ring	NBR	

- Manual or electrical actuators are available.
- GGG50 according to DIN EN 1693 is similar with EN-GJS-500-7 according to DIN EN 1563
- GGG40 according to DIN EN 1693 is similar with EN-GJS-400-15 according to DIN EN 1563

Ball Valves (DN100...600, PN10)

DN [mm]	PN [bar]	Hydrostatic test pressure in bars for:	
		Body (water)	Seat (water)
100-600	10	15	11

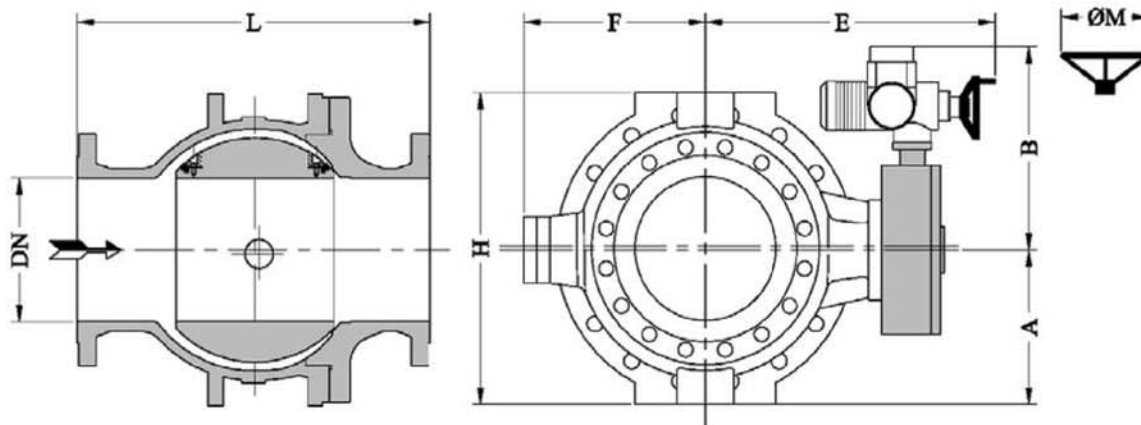


DN [mm]	L [mm]	A [mm]	B [mm]	H [mm]	ØM [mm]	E [mm]	F [mm]	Weight [Kg]
100	350	150	290	310	250	450	190	80
150	450	200	290	400	250	515	230	180
200	550	230	461	460	250	580	265	220
250	650	290	461	575	300	630	330	375
300	750	335	600	650	300	690	400	530
350	850	390	645	770	400	750	460	1145
400	950	440	645	880	400	830	505	1530
450	1050	490	645	960	400	850	570	1920
500	1150	530	720	1050	400	900	620	2440
600	1350	600	935	1200	400	1040	690	3780

- Manual or electrical actuators are available.
- In the case of manual valves the value of B is reduced 100mm.
- Valves with nominal diameter larger than 300mm are equipped with double gearbox.
- To get more information about the inlet torque needed for the electric actuator contact MECHANIC AB.

Ball Valves (DN100...600, PN16)

DN [mm]	PN [bar]	Hydrostatic test pressure in bars for:	
		Body (water)	Seat (water)
100-600	16	24	17.6

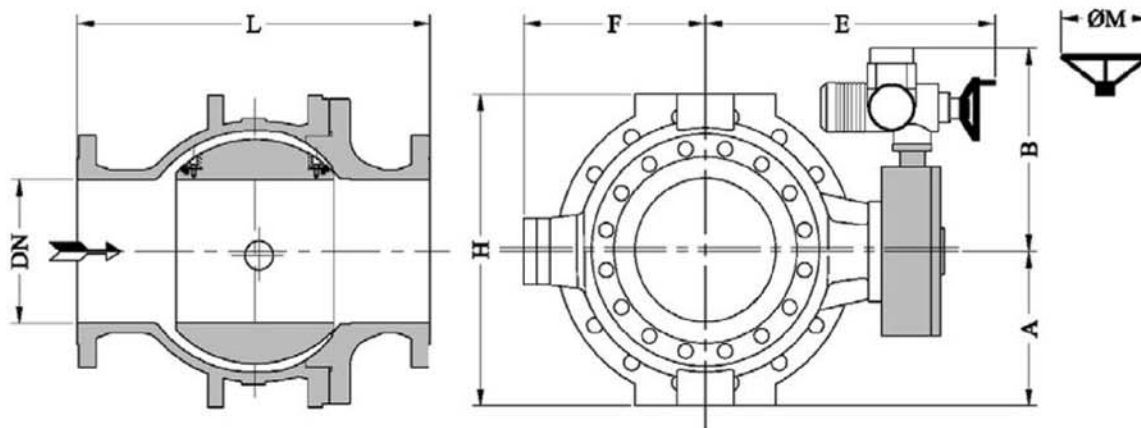


DN [mm]	L [mm]	A [mm]	B [mm]	H [mm]	ØM [mm]	E [mm]	F [mm]	Weight [Kg]
100	350	150	290	310	250	450	190	80
150	450	200	290	400	250	515	230	180
200	550	230	461	460	250	580	265	225
250	650	290	461	575	300	630	330	390
300	750	335	600	650	300	690	400	560
350	850	390	645	770	400	750	460	1160
400	950	440	645	880	400	830	505	1545
450	1050	490	645	960	400	850	570	1960
500	1150	530	720	1050	400	900	620	2480
600	1350	600	935	1200	400	1040	690	3820

- Manual or electrical actuators are available.
- In the case of manual valves the value of B is reduced 100mm.
- Valves with nominal diameter larger than 300mm are equipped with double gearbox.
- To get more information about the inlet torque needed for the electric actuator contact MECHANIC AB.

Ball Valves (DN100...600, PN25)

DN [mm]	PN [bar]	Hydrostatic test pressure in bars for:	
		Body (water)	Seat (water)
100-600	25	37.5	27.5

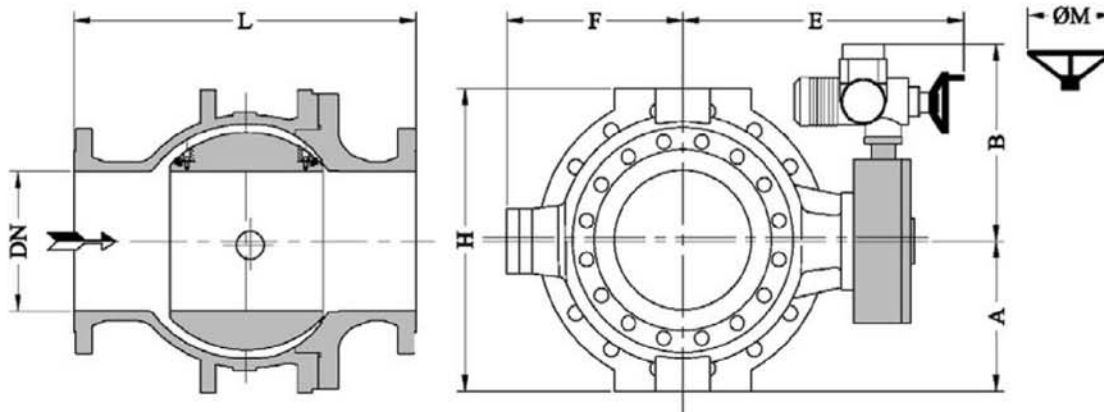


DN [mm]	L [mm]	A [mm]	B [mm]	H [mm]	ØM [mm]	E [mm]	F [mm]	Weight [Kg]
100	350	150	290	310	250	450	190	90
150	450	200	290	400	250	515	230	195
200	550	230	461	460	250	580	265	240
250	650	290	461	575	300	630	330	410
300	750	335	600	650	300	690	400	580
350	850	390	645	770	400	750	460	1190
400	950	440	645	880	400	830	505	1560
450	1050	490	645	960	400	850	570	2000
500	1150	530	720	1050	400	900	620	2510
600	1350	600	935	1200	400	1040	690	3850

- Manual or electrical actuators are available.
- In the case of manual valves the value of B is reduced 100mm.
- Valves with nominal diameter larger than 300mm are equipped with double gearbox.
- To get more information about the inlet torque needed for the electric actuator contact MECHANIC AB.

Ball Valves (DN100...600, PN40)

DN [mm]	PN [bar]	Hydrostatic test pressure in bars for:	
		Body (water)	Seat (water)
100-600	40	60	44



DN [mm]	L [mm]	A [mm]	B [mm]	H [mm]	ØM [mm]	E [mm]	F [mm]	Weight [Kg]
100	350	150	290	310	250	450	190	90
150	450	200	290	400	250	515	230	195
200	550	230	461	460	250	580	265	245
250	650	290	461	575	300	630	330	435
300	750	335	600	650	300	690	400	600
350	850	390	645	770	400	750	460	1210
400	950	440	645	880	400	830	505	1580
450	1050	490	645	960	400	850	570	2035
500	1150	530	720	1050	400	900	620	2550
600	1350	600	935	1200	400	1040	690	3900

- Manual or electrical actuators are available.
- In the case of manual valves the value of B is reduced 100mm.
- Valves with nominal diameter larger than 300mm are equipped with double gearbox.
- To get more information about the inlet torque needed for the electric actuator contact MECHANIC AB.
- Ball valves with PN63 can be manufactured according to customer's order.