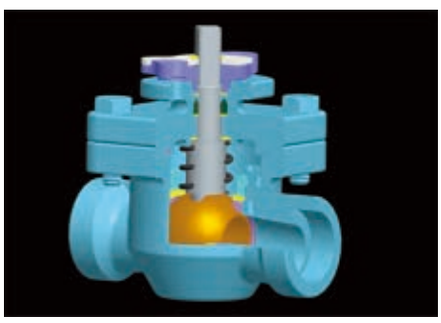
TOP ENTRY FULL PORT BALL VALVES

DESIGN FEATURES

- Top Entry, Floating Ball
- Body-cover Bolted Joint Not Affected by Pipe Stressed
- Blow-out Proof and Anti-static Stem
- Tight Shut-off and Long Cycle Life
- Permits In-line Access for Seat Replacement
- Welding into Line Possible Without Disassembly

SERIES KV - T41 KV - T21

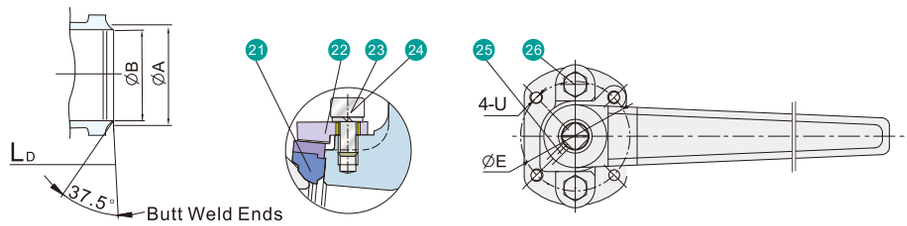


ASME Class 150/300
Top Entry, Full Port

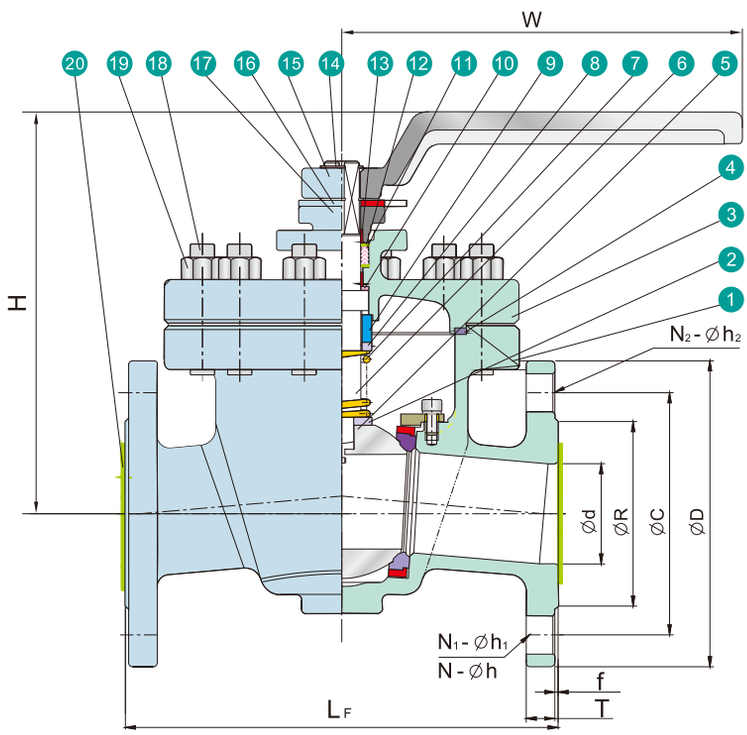
KV-T41, KV-T11
KV-T42, KV-T12

APPLICABLE STANDARDS:

- Design : ASME B16.34
- Wall Thickness : ASME B16.34
- Flanged Ends : ASME B16.5
- Extended Butt Weld : ASME B16.25
- Inspection & Testing : API 598
- KV-T41, KV-T42: Flanged, Class 150/300
  KV-T11, KV-T12: Butt Welded, Class 150/300



NO.	PART NAME	MATERIALS		
1	Body	CF8M	CF8	WCB
2	Handle Gland	316	304	
3	Cap	CF8M	CF8	WCB
4	Body Gasket	PTFE / GRAPHITE		
5	Ball	CF8M	CF8	
6	Stem	316	304/A182-F6a	
7	Spring	316	304	
8	Adjusting Gasket	316	304	
9	Guiding Bushing	316	304	
10	Thrust Washer	PTFE		
11	Stem Packing	PTFE / GRAPHITE		
12	Stem Gasket	316	304	
13	Stem Bushing	PTFE		
14	Snap Ring	304		
15	Handle	WCB		
16	Stop-Lock-Plate	304		
17	Gland Packing	304		
18	Bolting	A193-B8	A193-B7	
19	Nut	A194-8	A194-2H	
20	Protection Cover	PVC		
21	Ball Seat	TFM1600+316 Outer Ring		
22	Gland	316	304	
23	Hex. Bolting	A193 - B8M	A193 - B8	
24	Spring Washer	316	304	
25	Screw	A193 - B8		
26	Bolt	A193-B8	A193-B7	



■ ASME Class 150

KV-T41, KV-T11

Unit : mm

DN	NPS	W	L_F	L_D	d	R	D	C	f	T	H	N_1	h_1	N_2	h_2	E	U	B	A
15	½	130	108	140	15	35.0	90	60.3	2	8	120	4	16.0	—	—	42	M5	—	—
20	¾	130	117	152	20	43.0	100	69.9	2	8.9	120	4	16.0	—	—	42	M5	—	—
25	1	160	127	165	25	51.0	110	79.4	2	9.6	130	2	16.0	2	1/2-13UNC	50	M6	—	—
32	1¼	160	140	178	32	63.5	115	88.9	2	11.2	134	2	16.0	2	1/2-13UNC	50	M6	—	—
40	1½	200	190	190	38	73.2	130	98.4	2	12.7	175	4	16.0	—	—	70	M8	—	—
50	2	200	216	216	50	92.0	150	120.7	2	14.3	200	4	19.0	—	—	70	M8	—	—
80	3	265	282	356	76	127.0	190	152.4	2	17.5	214	4	19.0	—	—	102	M10	78	88.9
100	4	325	432	432	100	157.2	230	190.5	2	22.3	250	8	19.0	—	—	102	M10	102	114.3
150	6	800	457	457	150	216.0	280	241.3	2	23.9	350	8	22.3	—	—	125	M12	154	168.3

■ ASME Class 300

KV-T42, KV-T12

Unit : mm

DN	NPS	W	L_F	L_D	d	R	D	C	f	T	H	N	h	E	U	B	A
15	½	130	140	140	15	35.0	95	66.7	2	12.7	120	4	16.0	42	M5	—	—
20	¾	130	152	152	20	43.0	115	82.6	2	14.3	120	4	19.0	42	M5	—	—
25	1	160	165	165	25	51.0	125	88.9	2	15.9	130	4	19.0	50	M6	—	—
32	1¼	160	178	178	32	63.5	135	98.4	2	17.5	137	4	19.0	50	M6	—	—
40	1½	200	190	190	38	73.2	155	114.3	2	19.1	175	4	22.3	70	M8	—	—
50	2	200	216	216	50	92.0	165	127.0	2	20.7	200	8	19.0	70	M8	—	—
80	3	265	282	356	76	127.0	210	168.3	2	27.0	214	8	22.3	102	M10	78	88.9
100	4	325	432	432	100	157.2	225	200.0	2	30.2	250	8	22.3	102	M10	102	114.3
150	6	800	457	457	150	216.0	320	269.9	2	35.0	350	12	22.3	125	M12	154	168.3

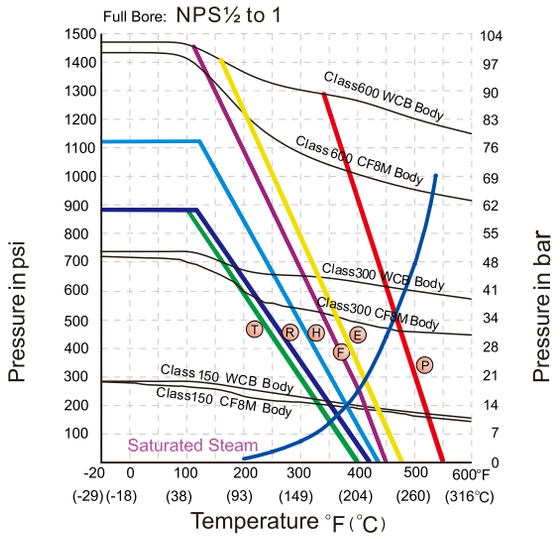
Pressure-Temperature Data

Floating Ball Valves, Class 150/300/600
1000psi, 2000psi

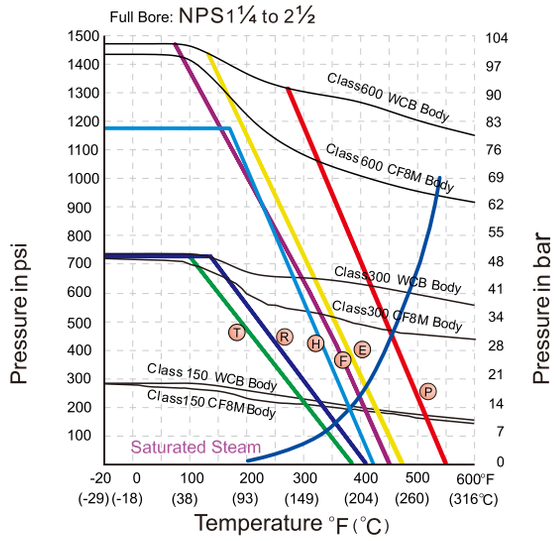
The pressure-temperature data of ball valves is determined not only by valve shell materials but also by sealing materials used for ball seats, gland packings and flange gaskets.

Floating Ball Valves, Class 150 / 300 / 600

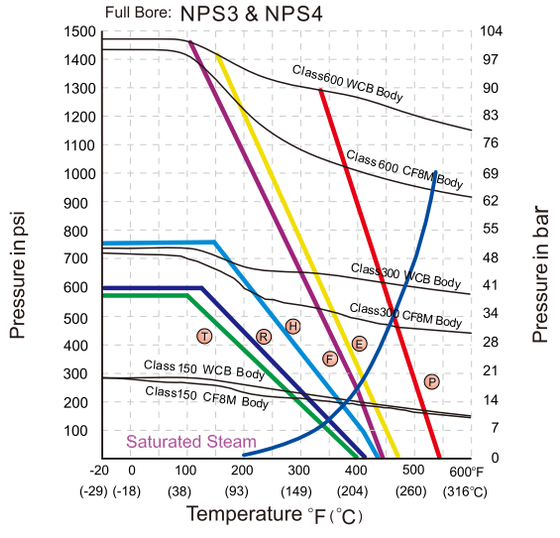
Full Bore: NPS½ to 1



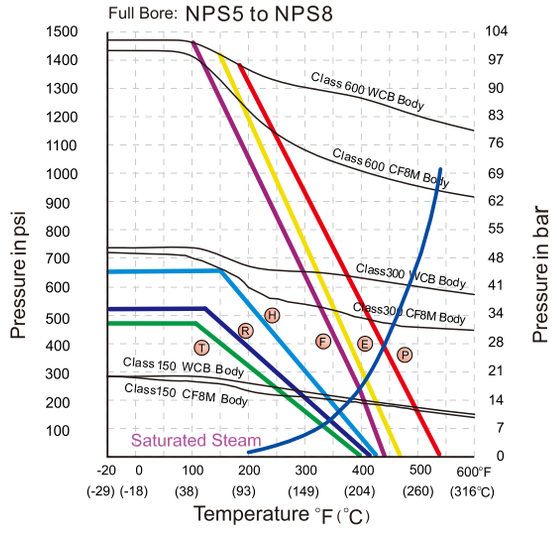
Full Bore: NPS1¼ to 2½



Full Bore: NPS3 & NPS4

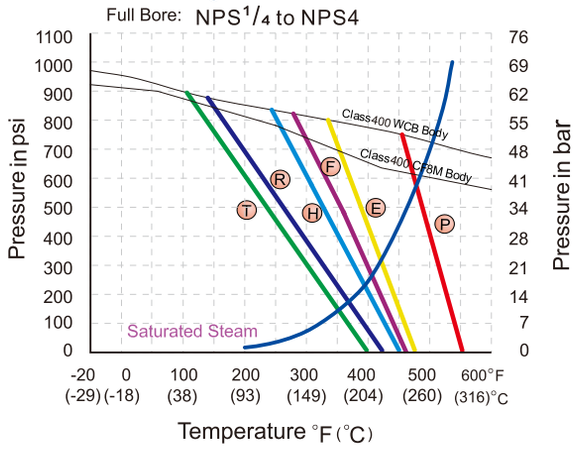


Full Bore: NPS5 to NPS8



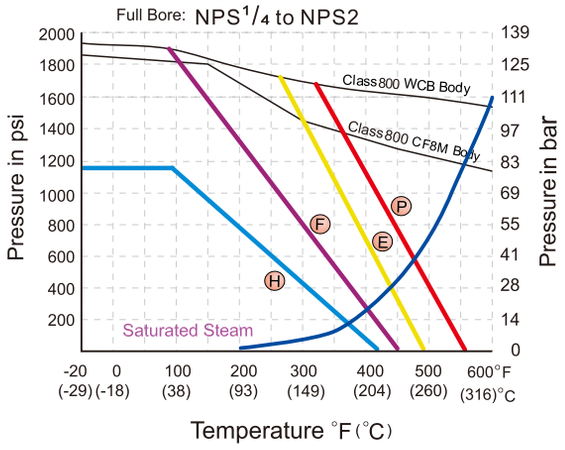
Floating Ball Valves, 1000 PSI

Full Bore: NPS1/4 to NPS4



Floating Ball Valves, 2000 PSI

Full Bore: NPS1/4 to NPS2



Seat Materials: T=PTFE R=RTFE H=TFM1600 E=EK+PTFE P=PEEK F=TFM4215
"H" is the standard seat material for KI ball valves, except KV-010, 020 & 030 series.
The seat material of these types is PTFE.

Body Ratings: Shown above are for ASTM A351 Gr.CF8M and A216 Gr.WCB
For ratings of other valve shell materials, please refer to the last edition of ASME B16.34.