

Class: 150lbs / 300lbs
Design acc. : API 602 .
Face to face : ASME B16.10 .
Flange ends : ASME B16.5 (RF) .
Test and inspection acc. : API 598 .
Body : A105N / F316
TA-Luft packing
TA-Luft gasket

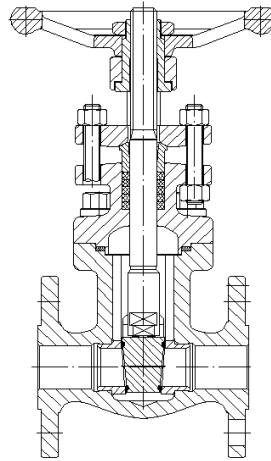


FIG : 080

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Class: 600lbs
Design acc. : API 602 .
Face to face : ASME B16.10 .
Flange ends : ASME B16.5 (RF) .
Test and inspection acc. : API 598 .
Body : A105N / F316
TA-Luft packing
TA-Luft gasket

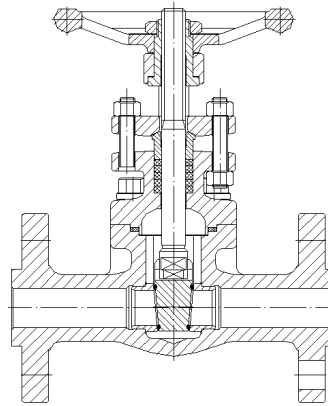


FIG : 080

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Class: 800lbs
Design acc. : API 602 .
Socket-welding ends : ASME B16.11 .
NPT ends: ASME B1.20.1
Test and inspection acc. : API 598 .
Body : A105N / F316
TA-Luft packing
TA-Luft gasket

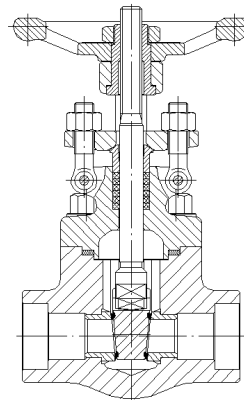


FIG : 081

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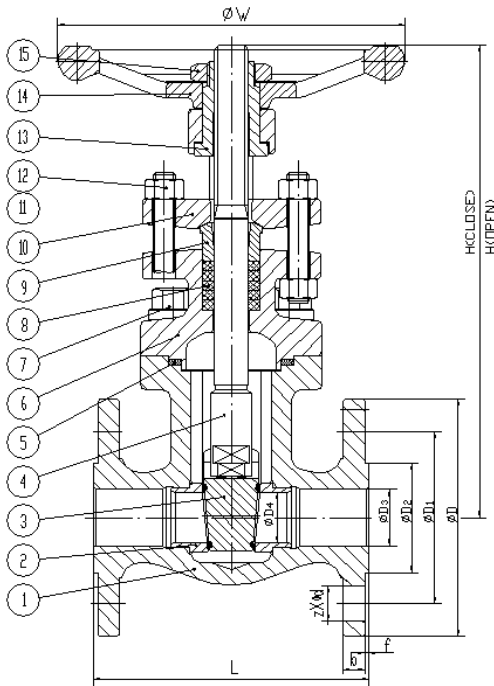


FIG.	Class	Material	Range
141.080	150	A105N	1/2"-2"
142.080	300	A105N	1/2"-2"
231.080	150	F316	1/2"-2"
232.080	300	F316	1/2"-2"

Design acc. : API 602 .
Face to face : ASME B16.10 .
Flange ends : ASME B16.5 (RF) .
Test and inspection acc. : API 598 .
TA-Luft packing
TA-Luft gasket

Material list

NO.	Part	Material	
		FIG. 141.080 / 142.080	FIG.231.080 / 232.080
1	Body	ASTM A105N	ASTM A182 F316
2	Seat ring	ASTM A276 410+STL	ASTM A276 316+STL
3	Wedge	ASTM A182 F6a	ASTM A182 F316
4	Stem	ASTM A276 410	ASTM A276 316
5	Bonnet gasket	SS304+Graphite	SS316+Graphite
6	Bonnet	ASTM A105N	ASTM A182 F316
7	Body bolt	ASTM A193 B7	ASTM A193 B8M
8	Packing	Graphite	Graphite
10	Gland flange	ASTM A105N	ASTM A276 316
11	Bolt	ASTM A193 B7	ASTM A193 B8M
12	Nut	ASTM A194 2H	ASTM A194 8M
13	Stem nut	ASTM A276 410	ASTM A276 410
15	Hand wheel	A276 A47 32510	A276 A47 32510
16	Lock nut	ASTM A108 1020	ASTM A108 1020

Dimension List

Class	Size	L	H(OPEN)	H(CLOSE)	D	D1	D2	D3	D4	b	f	ZxΦd	W
150LB	1/2"	108	177	161	90	60.3	34.9	16	13	8	2	4x16	100
	3/4"	117	207	187	100	69.9	42.9	20	17	8.9	2	4x16	120
	1"	127	245	218	110	79.4	50.8	26	23	9.6	2	4x16	160
	1 1/2"	165	281	241	125	98.4	73	40	36	12.7	2	4x16	180
	2"	178	317	269	150	120.7	92.1	52	44	14.3	2	4x19	200
300LB	1/2"	140	159	143	95	66.7	34.9	16	13	12.7	2	4x16	100
	3/4"	152	188	168	115	82.6	42.9	20	17	14.3	2	4x19	120
	1"	165	225	198	125	88.9	50.8	26	23	15.9	2	4x19	160
	1 1/2"	190	281	241	155	114.3	73	40	36	19.1	2	4x22	180
	2"	216	317	269	165	127	92.1	52	44	20.7	2	8x19	200

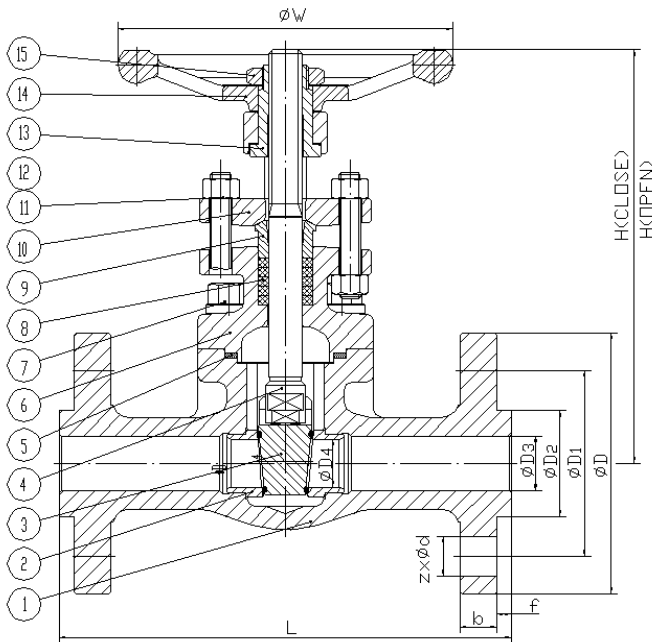


FIG.	Class	Material	Range
144.080	600	A105N	1/2"-2"
234.080	600	F316	1/2"-2"

Design acc. : API 602 .
Face to face : ASME B16.10 .
Flange ends : ASME B16.5 (RF) .
Test and inspection acc. : API 598 .
TA-Luft packing
TA-Luft gasket

Material list

NO.	Part	Material	
		FIG. 144.080	FIG.234.080
1	Body	ASTM A105N	ASTM A182 F316
2	Seat ring	ASTM A276 410+STL	ASTM A276 316+STL
3	Wedge	ASTM A182 F6a	ASTM A182 F316
4	Stem	ASTM A276 410	ASTM A276 316
5	Bonnet gasket	SS304+Graphite	SS316+Graphite
6	Bonnet	ASTM A105N	ASTM A182 F316
7	Body bolt	ASTM A193 B7	ASTM A193 B8M
8	Packing	Graphite	Graphite
9	Gland	ASTM A276 410	ASTM A276 316
10	Gland flange	ASTM A105N	ASTM A182 F304
11	Bolt	ASTM A193 B7	ASTM A193 B8M
12	Nut	ASTM A194 2H	ASTM A194 8M
13	Stem nut	ASTM A276 410	ASTM A276 410
14	Hand wheel	A276 A47 32510	A276 A47 32510
15	Lock nut	ASTM A108 1020	ASTM A108 1020

Dimension List

Class	Size	L	H(OPEN)	H(CLOSE)	D	D1	D2	D3	D4	b	f	ZxΦd	W
600LB	1/2"	165	159	143	95	66.7	34.9	16	13	14.3	7	4x16	100
	3/4"	190	188	168	115	82.6	42.9	20	17	15.9	7	4x19	120
	1"	216	225	198	125	88.9	50.8	26	23	17.5	7	4x19	160
	1 1/2"	241	281	241	155	114.3	73	40	36	22.3	7	4x22	180
	2"	292	317	269	165	127	92.1	52	44	25.4	7	8x19	200

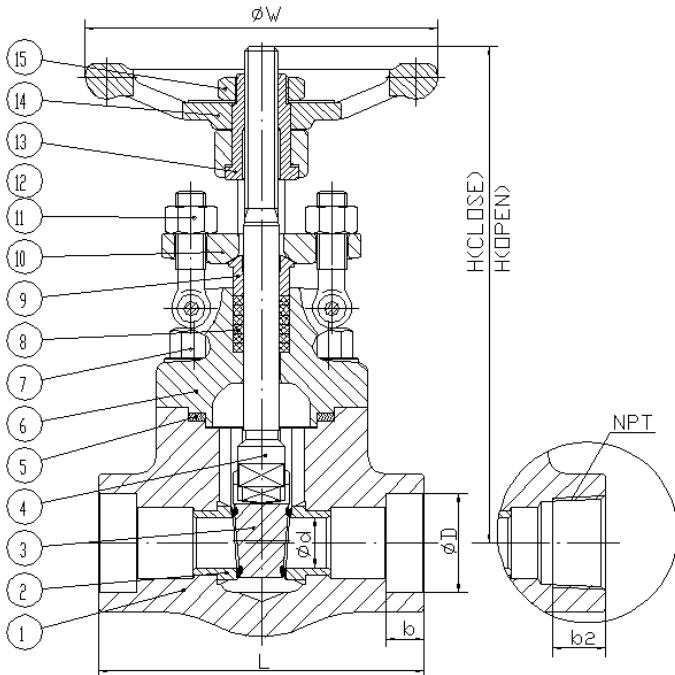


FIG.	Class	Material	Range
145.081-SW	800	A105N	1/2"-2"
145.081-T	800	A105N	1/2"-2"
235.081-SW	800	F316	1/2"-2"
235.081-T	800	F316	1/2"-2"

Design acc. : API 602 .
SW ends : ASME B16.11
NPT ends: ASME B1.20.1
Test and inspection acc. : API 598 .
TA-Luft packing
TA-Luft gasket

Material list

NO.	Part	Material	
		FIG. 145.081	FIG.235.081
1	Body	ASTM A105N	ASTM A182 F316
2	Seat ring	ASTM A276 410+STL	ASTM A276 316+STL
3	Wedge	ASTM A182 F6a	ASTM A182 F316
4	Stem	ASTM A276 410	ASTM A276 316
5	Bonnet gasket	SS304+Graphite	SS316+Graphite
6	Bonnet	ASTM A105N	ASTM A182 F316
7	Body bolt	ASTM A193 B7	ASTM A193 B8M
8	Packing	Graphite	Graphite
9	Gland	ASTM A276 410	ASTM A276 316
10	Gland flange	ASTM A105N	ASTM A182 F304
11	Bolt	ASTM A193 B7	ASTM A193 B8M
12	Nut	ASTM A194 2H	ASTM A194 8M
13	Stem nut	ASTM A276 410	ASTM A276 410
14	Hand wheel	A276 A47 32510	A276 A47 32510
15	Lock nut	ASTM A108 1020	ASTM A108 1020

Dimension List

Class	Size	L	H(OPEN)	H(CLOSE)	D	NPT	b	b2	W
800LB	1/2"	79	156	142	21.8	1/2	10	13.2	100
	3/4"	92	159	143	27.1	3/4	13	14.5	120
	1"	111	189	169	33.9	1	13	18	160
	1 1/2"	120	241	209	48.8	1 1/2	13	19	180
	2"	140	281	241	61.2	2	16	20	200