

MODEL 106-PG

Stainless Steel, Single Chamber, Hydraulically Operated Valve

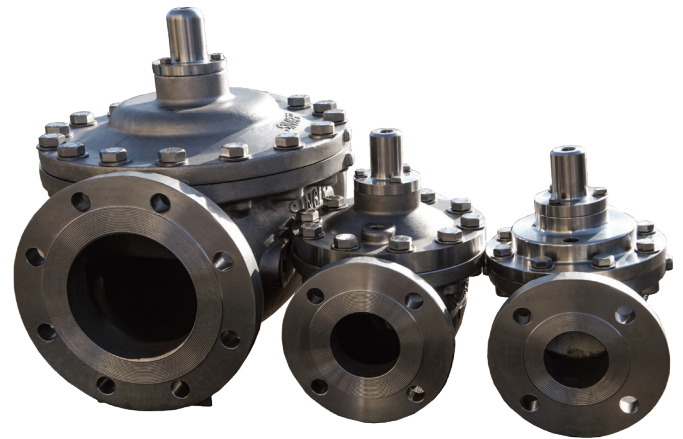
KEY FEATURES

- Anti-cavitation option is ideal for high pressure drop situations
- Available in globe style

PRODUCT OVERVIEW

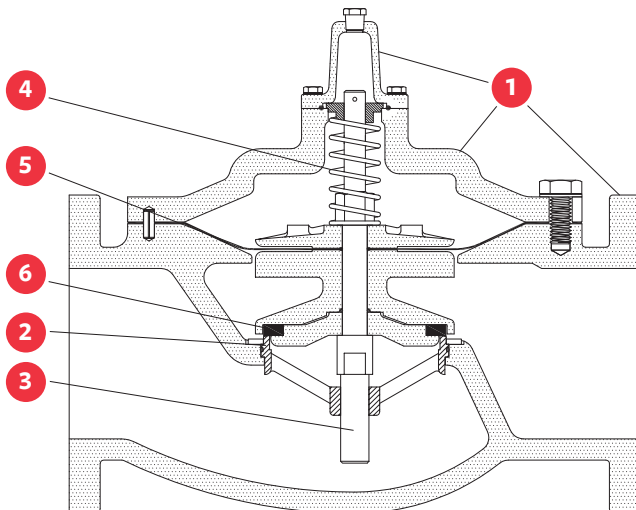
The 106-PG series control valve is designed to suit a large variety of applications such as pressure, flow or level control. This hydraulically operated valve introduces or releases water from the control chamber above the diaphragm to effectively maintain accurate water control.

Refer to Main Valve Options and Pilots & Accessories in the Singer Full Product Catalogue to further customize the valve to suit specific applications.



PRODUCT LINE DRAWING

ID	PART NAME
1	AISI 316 Stainless Steel Construction Valve Body, Cover
2	316 Stainless Steel Seat Ring
3	316 Stainless Steel Stem
4	316 Stainless Steel Spring
5	Diaphragm Buna-N or EPDM
6	Buna-N or EPDM Resilient Disc



MODEL 106-PG

Stainless Steel, Single Chamber, Hydraulically Operated Valve

VALVE SIZES & MATERIALS

VALVE MATERIALS

Available Sizes	Standard		Optional
	Threaded	Flanged	
Globe	1/2" to 1 1/2" (15-40 mm)	1 1/2" to 6" (40 - 150 mm)	-

VALVE COMPONENTS

1. Valve Body, Cover	316 Stainless Steel	-
2. Seat Ring	316 Stainless Steel	-
3. Disc Retainer	316 Stainless Steel	-
4. Stem	316 Stainless Steel	-
5. Stem Nut	316 Stainless Steel	-
6. Spring	316 Stainless Steel	-
7. Guide Bushings	316 Stainless Steel	-
8. Diaphragm	EPDM	Buna-N / Viton (limited sizes)
9. Resilient Disc	EPDM	Buna-N / Viton (limited sizes)
10. Fasteners	18-8 Stainless Steel	316 Stainless Steel

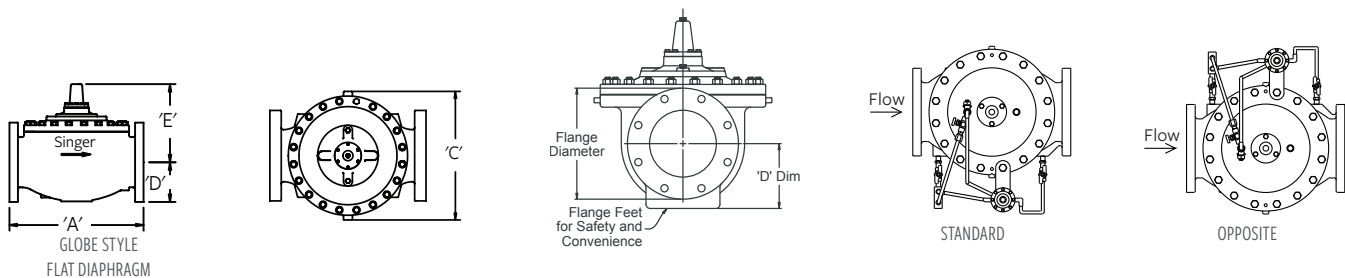
MODEL 106-PG

Stainless Steel, Single Chamber, Hydraulically Operated Valve

ANSI VALVE DATA (US UNITS)

SIZE	DWG	STANDARD	FLAT DIAPHRAGM SYSTEM										
			INCHES	REF	ANSI	1/2"	3/4"	1"	1 1/4"	1 1/2"	2"	2 1/2"	3"
GLOBE DIMENSIONS			ALL FIGURES SHOWN IN INCHES UNLESS OTHERWISE STATED										
Lay Length	A	FNPT	4.25	4.25	6.75	6.75	6.75	-	-	-	-	-	-
Centerline to Bottom	D	FNPT	0.83	0.83	2.50	2.50	2.50	-	-	-	-	-	-
Lay Length	A	150F	-	-	-	-	8.50	9.38	11.00	12.00	15.00	20.00	
Centerline to Bottom	D	150F	-	-	-	-	2.75	3.00	3.50	3.75	4.60	5.60	
Lay Length	A	300F	-	-	-	-	9.00	10.00	11.63	13.25	15.63	21.00	
Centerline to Bottom	D	300F	-	-	-	-	3.25	3.25	3.75	4.13	5.09	6.34	
COMMON DIMENSIONS (GLOBE & ANGLE)													
Width	C		3.00	3.00	4.88	4.88	6.13	6.50	8.19	9.25	10.88	16.75	
Height (To Stem Cap) Globe	E		3.06	3.06	4.38	4.38	4.38	4.75	7.50	8.00	9.15	11.75	
Height (To Stem Cap) Angle	E		-	-	4.38	4.38	4.38	4.75	7.50	8.00	9.15	11.75	
Body Port Tapping		FNPT	1/4	1/4	3/8	3/8	3/8	3/8	3/8	3/8	3/8	3/8	
Stem Cap Plug		MNPT	1/4	1/4	3/8	3/8	3/8	3/8	3/8	3/8	3/8	3/8	
Cover Port Tapping		FNPT	-	-	3/8	3/8	3/8	3/8	3/8	3/8	3/8	1/2	
Valve Stroke			1/4	1/4	1/2	1/2	1/2	9/16	15/16	1 1/8	1 7/16	1 11/16	
Displaced Bonnet Volume (Gallons)			0.002	0.002	0.007	0.007	0.007	0.018	0.066	0.090	0.20	0.56	
Approximate Shipping Weight (Lbs)			10	10	20	20	20	40	65	100	175	400	
CAPACITIES (USPGM) GLOBE & ANGLE													
C _v - Globe			6.4	6.4	28	30	32	55	80	110	200	460	
C _v - Angle			-	-	24	24	26	63	90	135	230	535	
Continuous (Globe)			12	19	49	93	125	210	300	460	800	1800	
Intermittent (Globe)			15	20	61	120	160	260	375	575	1000	2250	
Momentary (Globe)			28	43	110	170	250	470	670	1030	1800	4000	
MAXIMUM PRESSURE RATINGS (DUCTILE ONLY)													
psi ¹		FNPT	400	400	400	400	400	400	400	400	-	-	
psi		150F	-	-	-	-	250	250	250	250	250	250	
psi ¹		300F	-	-	-	-	400	400	400	400	400	400	
MAXIMUM TEMPERATURE													
Fahrenheit			180°	180°	180°	180°	180°	180°	180°	180°	180°	180°	

¹Valves rated and stamped 400 psi as standard. Valves rated and stamped 600 psi on request.



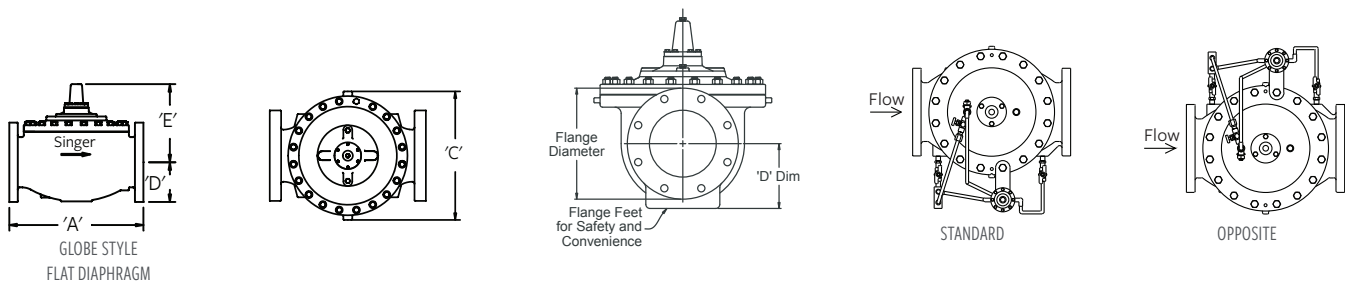
MODEL 106-PG

Stainless Steel, Single Chamber, Hydraulically Operated Valve

ANSI VALVE DATA (METRIC UNITS)

SIZE	DWG	STND	FLAT DIAPHRAGM SYSTEM										
			MM	REF	ANSI	15 MM	20 MM	25 MM	32 MM	40 MM	50 MM	65 MM	80 MM
GLOBE DIMENSIONS			ALL FIGURES SHOW IN MM UNLESS OTHERWISE STATED										
Lay Length	A	FNPT	108	108	171	171	171	-	-	-	-	-	-
Centerline to Bottom	D	FNPT	31	31	64	64	64	-	-	-	-	-	-
Lay Length	A	150F	-	-	-	-	216	238	279	305	381	508	
Centerline to Bottom	D	150F	-	-	-	-	70	76	89	95	117	142	
Lay Length	A	300F	-	-	-	-	229	254	295	337	397	533	
Centerline to Bottom	D	300F	-	-	-	-	83	83	95	105	129	161	
COMMON DIMENSIONS (GLOBE & ANGLE)													
Width	C		76	76	124	124	156	165	208	235	276	425	
Height (to stem cap) Globe	E		78	78	111	111	111	121	191	203	232	298	
Height (to stem cap) Angle	E		-	-	111	111	111	121	191	203	232	298	
Body Port Tapping	FNPT	Inches	¼	¼	⅜	⅜	⅜	⅜	⅜	⅜	⅜	⅜	
Stem Cap Plug	MNPT	Inches	¼	¼	⅜	⅜	⅜	⅜	⅜	⅜	⅜	⅜	
Cover Port Tapping	FNPT	Inches	-	-	⅜	⅜	⅜	⅜	⅜	⅜	⅜	½	
Valve Stroke		mm	6.4	6.4	13	13	13	14	25	29	37	43	
Displaced Bonnet Volume (Litres)			0.01	0.01	0.03	0.03	0.03	0.07	0.25	0.34	0.76	2.12	
Approximate Shipping Weight (Kilograms)			5.00	5.00	9.00	9.00	9.00	18.00	29.00	45.00	79.00	181.00	
CAPACITIES (L/S) GLOBE & ANGLE													
K _v - Globe (m ³ /h @ 1 bar)			5.5	5.5	24	26	28	48	69	95	173	398	
K _v - Angle (m ³ /h @ 1 bar)			-	-	21	21	22	54	78	117	199	463	
Continuous (Globe)			0.76	1.20	3.09	5.87	7.89	13.25	18.93	29.02	50.47	113.56	
Intermittent (Globe)			0.95	1.26	3.85	7.57	10.09	16.40	23.66	36.28	63.09	141.95	
Momentary (Globe)			1.77	2.71	6.94	10.73	15.77	29.65	42.27	64.98	113.56	252.36	
MAXIMUM PRESSURE RATINGS (DUCTILE ONLY)													
Bar ¹		FNPT	27.6	27.6	27.6	27.6	27.6	27.6	27.6	27.6	-	-	
Bar		150F	-	-	-	-	17	17	17	17	17	17	
Bar ¹		300F	-	-	-	-	27.6	27.6	27.6	27.6	27.6	27.6	
MAXIMUM TEMPERATURE													
Celcius			82°	82°	82°	82°	82°	82°	82°	82°	82°	82°	

¹Valves rated and stamped 27.6 bar as standard. Valves rated and stamped 41 bar on request.



MODEL 106-PG

Stainless Steel, Single Chamber, Hydraulically Operated Valve

ISO VALVE DATA (METRIC UNITS)

SIZE	DWG	STND	FLAT DIAPHRAGM SYSTEM									
MM	REF	ISO	15 MM	20 MM	25 MM	32 MM	40 MM	50 MM	65 MM	80 MM	100 MM	150 MM
GLOBE DIMENSIONS			ALL FIGURES SHOW IN MM UNLESS OTHERWISE STATED									
Lay Length	A	BSPT	108	108	171	171	171	-	-	-	-	-
Centerline to Bottom	D	BSPT	31	31	64	64	64	-	-	-	-	-
Lay Length	A	PN10 / PN16	-	-	-	-	229	238	279	318	381	508
Centerline to Bottom	D	PN10 / PN16	-	-	-	-	83	76	89	100	117	142
Lay Length	A	PN25 / PN40	-	-	-	-	229	238	279	318	397	533
Centerline to Bottom	D	PN25 / PN40	-	-	-	-	83	76	89	100	129	161
COMMON DIMENSIONS (GLOBE & ANGLE)												
Width	C		76	76	124	124	156	152	208	235	276	425
Height (To Stem Cap) Globe	E		78	78	111	111	111	121	191	203	232	298
Height (To Stem Cap) Angle	E		-	-	111	111	111	121	191	203	232	298
Body Port Tapping	FNPT	Inches	¼	¼	⅜	⅜	⅜	⅜	⅜	⅜	⅜	⅜
Stem Cap Plug	MNPT	Inches	¼	¼	⅜	⅜	⅜	⅜	⅜	⅜	⅜	⅜
Cover Port Tapping	FNPT	Inches	-	-	⅜	⅜	⅜	⅜	⅜	⅜	⅜	½
Valve Stroke		mm	6.4	6.4	13	13	13	14	25	29	37	43
Displaced Bonnet Volume (Litres)			0.01	0.01	0.03	0.03	0.03	0.07	0.25	0.34	0.76	2.12
Approximate Shipping Weight (Kilograms)			5	5	9	9	9	18	29	45	79	181
CAPACITIES (L/S) GLOBE & ANGLE												
K _v - Globe (m ³ /h @ 1 bar)			5.5	5.5	24	26	28	48	69	95	173	398
K _v - Angle (m ³ /h @ 1 bar)			-	-	21	21	22	54	78	117	199	463
Continuous (Globe)			0.76	1.20	3.09	5.87	7.89	13.25	18.93	29.02	50.47	113.56
Intermittent (Globe)			0.95	1.26	3.85	7.57	10.09	16.40	23.66	36.28	63.09	141.95
Momentary (Globe)			1.77	2.71	6.94	10.73	15.77	29.65	42.27	64.98	113.56	252.36
MAXIMUM PRESSURE RATINGS (DUCTILE ONLY)												
Bar ¹		BSPT	27.6	27.6	27.6	27.6	27.6	27.6	27.6	27.6	-	-
Bar		PN16	-	-	-	-	16	16	16	16	16	16
Bar ¹		PN25	-	-	-	-	25	25	25	25	25	25
MAXIMUM TEMPERATURE												
		Celcius	82°	82°	82°	82°	82°	82°	82°	82°	82°	82°

¹Valves rated and stamped 27.6 bar as standard. Valves rated and stamped 41 bar on request.

For more information about us or to view our full line of water products, please visit www.singervalue.com or call Singer® customer service at 833.367.6835.

Mueller refers to one or more of Mueller Water Products, Inc. a Delaware corporation ("MWP"), and its subsidiaries. MWP and each of its subsidiaries are legally separate and independent entities when providing products and services. MWP does not provide products or services to third parties. MWP and each of its subsidiaries are liable only for their own acts and omissions and not those of each other. MWP brands include Mueller®, Echologics®, Hydro Gate®, Hydro-Guard®, HYMAX®, Jones®, Krausz®, Mi.Net®, Milliken®, Pratt®, Pratt Industrial®, Singer®, and U.S. Pipe Valve & Hydrant. Please see muellervp.com/brands and krauszusa.com to learn more.

© 2021 Mueller SV, Ltd. All Rights Reserved. The trademarks, logos and service marks displayed in this document are the property of Mueller SV, Ltd., its affiliates or other third parties. Products above marked with a section symbol (§) are subject to patents or patent applications. For details, visit www.mwppat.com. These products are intended for use in potable water applications. Please contact your Mueller Sales or Customer Service Representative concerning any other application(s).

F14492 1/21

