

ACCESSIBLE CARTRIDGE



SPECIFICATIONS

PSI / Temperature Rating: 1/2"-1-1/2": 600 WOG 400 PSI / 250°F
 1-1/2"L-3": 400 WOG 275 PSI / 250 °F

Cartridge: AISI Type 304 stainless steel
 AISI Type 17-7 PH stainless steel spring

Body Material: Forged brass (Certified No Lead¹ DZR Brass Available) (1/2" to 1-1/2")
 Cast brass (1-1/2"L to 3")

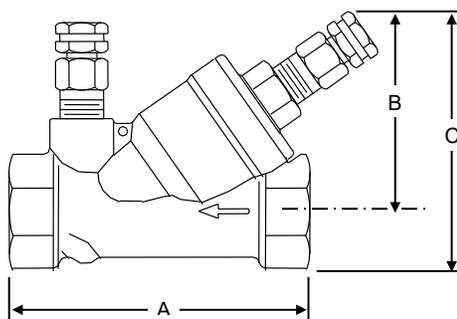
End Connections: Female NPT (Sweat Available on 1/2" to 3/4" Housing)

Seals: EPDM O-Rings

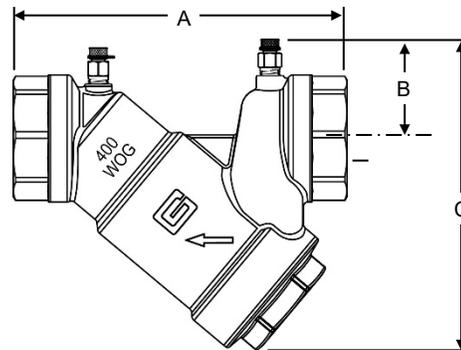
Body Tappings²: Two P/T Test Valve (CPTA)

Optional Strainer³: 20 mesh stainless steel

1/2" – 1-1/2" Housing



1-1/2"L – 3" Housing



DIMENSIONS & WEIGHTS (NOMINAL)

All dimensions are for planning purposes only and may change without notice.

SIZE	MODEL NO.	A	B	C	WEIGHT (LBS.)
1/2"	3K0_	2.6	2.2	2.9	0.6
1/2"L	380_	3.5	2.4	3.0	2
3/4"		3.8	2.5	3.0	2
1"		4.1	2.6	3.4	2
1"L	381_	5.9	3.4	3.7	3
1-1/4"		6.1	3.5	4.2	3
1-1/2"		6.1	3.5	4.2	3
1-1/2"L	383_	9.1	2.7	8.5	10
2"		8.9	2.7	8.5	10
2-1/2"		9.8	2.7	8.5	10
3"		10.2	2.7	8.5	10

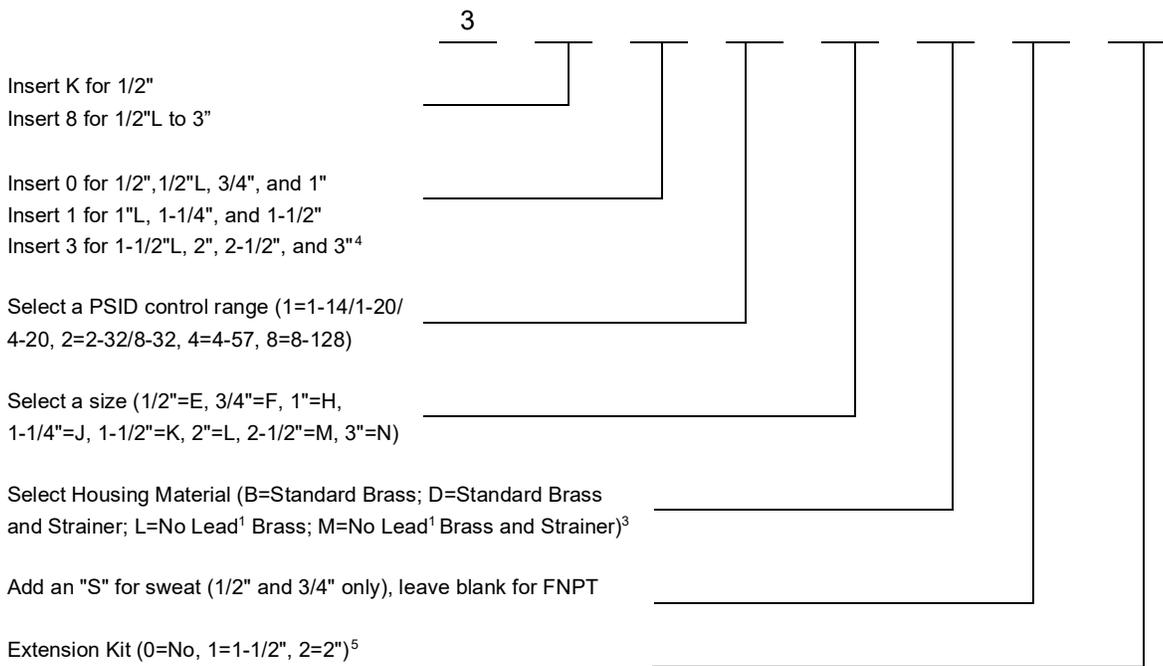
NOTES

¹ No Lead brass contains less than 0.25% lead content by weight on wetted surfaces. 3rd party certification for CA AB1953 and NSF-61 Annex G was performed by ALS Labs. Certificate available on website. Certification label is applied to valve surface.

² Body Tappings for accessories are a leak proof metal to metal seal and do not require pipe dope or tape. Tape or dope should not be used.

³ The optional strainer is internal and does not affect the dimensions. Strainer is available only on 1/2"L to 1-1/2" models.

MODEL NUMBER SELECTION



Insert K for 1/2"

Insert 8 for 1/2"L to 3"

Insert 0 for 1/2", 1/2"L, 3/4", and 1"

Insert 1 for 1"L, 1-1/4", and 1-1/2"

Insert 3 for 1-1/2"L, 2", 2-1/2", and 3"⁴

Select a PSID control range (1=1-14/1-20/
4-20, 2=2-32/8-32, 4=4-57, 8=8-128)

Select a size (1/2"=E, 3/4"=F, 1"=H,
1-1/4"=J, 1-1/2"=K, 2"=L, 2-1/2"=M, 3"=N)

Select Housing Material (B=Standard Brass; D=Standard Brass
and Strainer; L=No Lead¹ Brass; M=No Lead¹ Brass and Strainer)³

Add an "S" for sweat (1/2" and 3/4" only), leave blank for FNPT

Extension Kit (0=No, 1=1-1/2", 2=2")⁵

FLOW RATES (+/-5%)

SIZE	MODEL NO.	HEAD LOSS IN FEET ⁶	PSID RANGE ⁷	GPM									
1/2"	3K02	7.4	2-32	0.25, 0.33, 0.50, 0.60, 0.75, 0.85, 1.00, 1.25, 1.50, 2.00, 2.50, 3.00									
	3K04	13.4	4-57	0.50, 1.00, 1.50, 2.00, 2.50, 3.00									
1/2"L, 3/4"L, 1"	3801	3.5	1-14	0.33, 0.50, 0.67, 1.00, 1.33, 1.67, 2.00, 2.33, 2.67, 3.33, 4.00, 4.67, 5.00									
	3802	7.4	2-32	0.55, 0.75, 1.00, 1.25, 1.50, 1.75, 2.00, 2.25, 2.50, 2.75, 3.00, 3.50, 4.00, 5.00, 6.00, 7.00, 8.00									
	3804	13.4	4-57	0.75, 1.00, 1.33, 2.00, 2.67, 3.33, 4.00, 4.67, 5.33, 6.67, 8.00, 9.33, 10.00, 11.00									
	3808	30.0	8-128	1.10, 1.50, 2.00, 3.00, 4.00, 5.00, 6.00, 7.00, 8.00, 10.0, 12.0, 14.0, 16.0									
1"L, 1- 1/4", 1-1/2"	3811	3.5	1-14	5.33, 6.00, 6.67, 7.33, 8.00, 8.67, 9.33, 10.00, 10.67, 11.33, 12.00, 12.67, 13.33, 14.00, 14.67									
	3812	7.4	2-32	8.0, 9.0, 10.0, 11.0, 12.0, 13.0, 14.0, 15.0, 16.0, 17.0, 18.0, 19.0, 20.0, 21.0, 22.0									
	3814	13.4	4-57	10.67, 12.00, 13.33, 14.67, 16.00, 17.33, 18.67, 20.00, 21.33, 22.67, 24.00, 25.33, 26.67, 28.00, 29.33									
	3818	30.0	8-128	16.0, 18.0, 20.0, 22.0, 24.0, 26.0, 28.0, 30.0, 32.0, 34.0, 36.0, 38.0, 40.0, 42.0, 44.0									

SIZE	MODEL NO.	HEAD LOSS IN FEET ⁶	PSID RANGE	GPM			HEAD LOSS IN FEET ⁶	PSID RANGE	HIGHER FLOW RATES/ NO INCREMENTS
				MIN.	INCREMENT	MAX			
1-1/2"L, 2", 2-1/2", 3"	3831	3.5	1-20	14.0	2.0	60	9.2	4-20	90, 110, 130
	3832	7.4	2-32	17.5	2.5	75	18.4	8-32	110, 135, 160
	3834	13.4	4-57	23.33	3.33	100	NONE		
	3838	30.0	8-128	35.0	5.0	150			

NOTES

⁴ Large Housing "3" (1-1/2"L-3") is not available in Certified No Lead Brass. Only 1/2" to 1-1/2" is available in No Lead Brass.

⁵ Extension Kit is available for standard brass models only.

⁶ Head Loss in Feet is provided for pump head calculations. (1 PSI = 2.307 Feet of Water)

⁷ While valve will control the flow through the high end of PSID range, there is a limit to the maximum PSID across the cartridge before cavitation occurs. A conservative guide is: Maximum Allowable Pressure Drop = 0.5 (Inlet Pressure - Water Vapor Pressure). Cavitation is an effect that occurs when the fluid vaporizes as it goes through a port opening. As the fluid exits the port the vapor bubbles collapse back into a liquid state. The vapor bubbles imploding cause noise and vibration in the valve and can eventually destroy valves. This phenomenon is amplified when entrained air is in the system. If cavitation is a concern, then selecting a stiffer spring like 4-57 or 8-128 can help reduce risk.