Engineering Specification

Job Name	Contractor
Job Location	Approval
Engineer	Contractor's P.O. No.
Approval	Representative

Carbon Steel or Stainless Steel SURE CHECK[™] Valves

Models: 76, Class 600

Sizes: 2"- 12" (50 - 300mm)

Typical Service

 Designed for liquids and gases where flow reversal can cause surge and water hammer.

Features

- Compact design with short face-to-face dimensions for minimum space requirements.
- Dual shaft design allows interchangeability of shafts.
- Torsion springs close the valve prior to flow reversal.
- Torsion springs exert a lifting motion on the discs, enabling the center "heel" to open first. This prevents excessive wear of the seat in this area, and provides a consistent wear pattern and long sealing capability.
- Downstream stop shaft stabilizes the discs at high flow rates and prevents them from striking each other, which can cause premature wear, stress on the shaft, and chattering.

Construction

- Robust cast body is wafer style, featuring compact face-to-face dimensions.
- Designed to fit within ANSI bolt circles.
- Variety of trim and seat materials are available.
- High pressure elastomer seats are available for sizes 4" and up.

Installation

- Can be installed horizontally or vertically.
 - Consult factory for downward vertical flow applications.
 - In horizontal applications, shaft should be in vertical orientation.
- Good piping practice recommends installing a distance of 5



Model 76

Pressure/Temperature-Non-Shock						
Mode	Material	Rating				
76D Carbon Steel		1480psi @ 20°F to 100°F, 102.04 bar @ 37.78°C 640psi @ 850°F, 44.13 bar @ 454.44°C				
76H	Stainless Steel	1440psi @ 20°F to 100°F, 99.28 bar @ 37.78°C 835psi @ 850°F, 57.57 bar @ 454.44°C				

*Seat and/or Spring Materials may limit temperature.

to 10 pipe diameters from elbows, pumps, or others turbulence-creating devices.

- Mueller Steam Specialty strongly recommends the installation of a strainer ahead of the pump to ensure protection of both the pump and the valve from foreign particles.
- Consult factory for applications such as pump suction and volatile liquids.

Special Coatings or Treatments

 For Stainless Steel, pickling and passivation available on request, consult factory

Approvals/Specifications

• Applicable ASTM, ANSI, and API standards

Testing

• API 598

NOTICE

The information contained herein is not intended to replace the full product installation and safety information available or the experience of a trained product installer. You are required to thoroughly read all installation instructions and product safety information before beginning the installation of this product.

Mueller Steam Specialty product specifications in U.S. customary units and metric are approximate and are provided for reference only. For precise measurements, please contact Mueller Steam Specialty Technical Service. Mueller Steam Specialty reserves the right to change or modify product design, construction, specifications, or materials without prior notice and without incurring any obligation to make such changes and modifications on Mueller Steam Specialty products previously or subsequently sold.

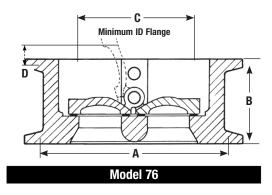


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Materials

	76D	76D
Body	Carbon Steel ASTM A216 Gr. WCB	Stainless Steel ASTM A351 Gr. CF8M
Disc	Carbon Steel ASTM A216 Gr. WCB	Stainless Steel ASTM A351 Gr. CF8M
Shaft/spring	316 SS	316 SS
Seat	Metal to Metal	Metal to Metal

See SURE CHECK[™] Valves section of the Mueller Steam Specialty Engineering binder for alternate materials and How to Order options.



Dimensions and Weights

SIZE DIMENSIONS								WE	IGHT			
		SIZE		Δ	1	B	1310143	0		D	VVL	lanı
				Α		-		C		D		
	in.	mm	ın.	mm	in.	mm	in.	mm	in.	mm	lbs.	kgs.
	2	50	41/8	104.7	23/8	60.3	1 ¹⁵ ⁄16	49.2	—	_	8	3.6
	2 ¹ / ₂	65	51/8	130.1	25/8	66.6	2 ⁵ /16	58.7	—	_	11	4.9
	3	80	51/8	149.2	27/8	73	2 ²⁹ / ₃₂	73.8	¹⁵ / ₃₂	11.9	15	6.8
	4	100	75/8	193.6	31/8	79.3	3 ¹³ /16	96.8	²³ / ₃₂	18.2	27	12.2
	6	150	101/2	266.7	5¾	136.5	5¾	146	²⁹ / ₃₂	23	66	29.9
	8	200	125/8	320.6	61/2	165.1	75/8	193.6	1 ¹⁹ / ₃₂	40.4	115	52.1
	10	250	15¾	400	83/8	212.7	9 % ₁₆	242.8	11/2	38.1	230	104.3
	12	300	18	457.2	9	228.6	11¾	288.9	2 ²¹ / ₃₂	67.4	330	149.6
-	14	350										
	16	400	Larger Sizes On Application									
-	18	450										
	20	500										
	24	600										
	30	750										

Dimensions and weights approximate. Apply for Certified Drawings

Limited Warranty: Mueller Steam Specialty warrants each product to be free from defects in material and workmanship under normal usage for a period of one year from the date of original shipment. In the event of such defects within the warranty period, the Company will, at its option, replace or recondition the product without charge. This shall constitute the sole and exclusive remedy for breach of warranty, and the Company shall not be responsible for any incidental, special or consequential damages, including without limitation, lost profits or the cost of repairing or replacing other property which is damaged if this product does not work properly, other costs resulting from labor charges, delays, vandalism, negligence, fouling caused by foreign material, damage form adverse water conditions, chemical, or any other circumstances over which the Company has no control. This warranty shall be invalidated by any abuse, misuse, misapplication or improper installation of the product. THIS WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING ANY IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. Any implied warranties that are imposed by law are limited in duration to one year.

Some States do not allow limitations on how long an implied warranty lasts, and some States do not allow the exclusion or limitation of incidental or consequential damages. Therefore the above limitations may not apply to you. This Limited Warranty gives you specific legal rights, and you may have other rights that vary from State to State. You should consult applicable state laws to determine your rights.



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