

Engineering Specification

Job Name _____

Contractor _____

Job Location _____

Approval _____

Engineer _____

Contractor's P.O. No. _____

Approval _____

Representative _____

Carbon Steel Unibody CHEXTER™ Check Valves

Models: 1607, Class 1500
Sizes: 2" – 12" (50 – 300mm)

Typical Services

- Recommended for use in higher temperature or pressure applications.

Features

- Compact design with short face-to-face dimensions for minimum space requirements.
- Unibody style provides full wall thickness throughout.
- Single moving part insures long, trouble-free service life.
- Seal-ring is one piece, easily replaceable in the field.
- Interchangeable parts for ease of maintenance.
- Operates fully at low pressure differential.
- Spring returns disc to fully closed position prior to reverse flow, minimizing water hammer.
- Disc is counter-weighted, utilizing gravity to additionally insure closure.
- Soft seal is located out of the flow path to reduce erosion effects.
- High C_v values due to aerodynamic disc shape and near full port opening.
 - Superior to other check valve designs, similar to Butterfly valves.

Construction

- Robust unibody valve is wafer style, featuring compact face-to-face dimensions to fit in small spaces.
- Designed to fit within ANSI bolt circles.
- Metal-to-metal seats only.
- Disc rotates on the hinge pin, creating very low pivot friction, so little wear in operation.
- Can be supplied in Stainless Steel or Alloy Steel materials, consult factory.



Model 1607
Front



Model 1607
Open

Pressure/Temperature - Non-Shock

Model	Material	Rating
1607-A	Carbon Steel	3705psi @ 100°F 255 bar @ 38°
1607-A	Carbon Steel	2685psi @ 400°F 185 bar @ 204°C

Installation

- Can be installed horizontally or vertically.
 - Consult factory for downward vertical flow applications.
 - In horizontal applications, valve should be installed top up, with shaft aligned horizontally with the top up (hinge pin plugs are above the pipe centerline).
- Good piping practice recommends installing a distance of 5 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.

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.

Materials

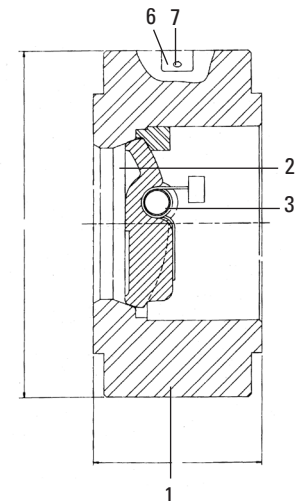
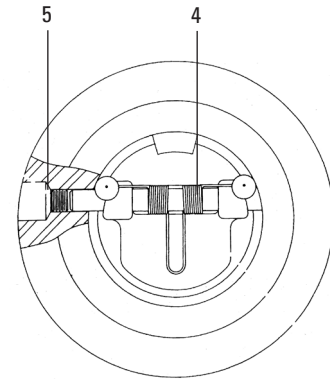
- See Information section of the CHEXTER™ Check section of the Mueller Steam Specialty Engineering binder for standard materials.
- See Information section of the CHEXTER™ Check section of the Mueller Steam Specialty Engineering binder for How to Order instructions.

Dimensions

Raised Face and Ring Type Joint Styles

1500 Class RF & RTJ Valve Dimensions

LINE SIZE		DIMENSIONS				
		OVERALL FACE TO FACE D		C DIAMETER & RING NO.		
in.	mm	in.	mm	600/900 CLASS		RING NO.
				in.	mm	in.
2	50	2¾	69.9	5	127.0	R-24
2½	65	3¼	82.6	6	152.4	R-27
3	80	3¼	82.6	6¾	171.5	R-35
4	100	4	101.6	8	203.2	R-39
6	150	6¼	158.8	10	254.0	R-46
8	200	8½	206.4	12½	317.5	R-50
10	250	9¾	241.3	15¾	400.0	R-54
12	300	12	304.8	18½	469.9	R-58



Parts List

PART NO.	DESCRIPTION	NO.REQ'D
1	Body	1
2	Disc	1
3	Hinge Pin	1
4	Spring	1
5	Hex Socket Pipe Plug	2
6	Nameplate	1
7	Drive Screw	2

Denotes recommended spare parts for one year operation.

ISO 9001-2008
CERTIFIED

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 from 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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