Engineering Specification

Job Name _____ Contractor _____

Job Location _____ Approval _____

Engineer _____ Contractor's P.O. No. _____

Approval _____ Representative _____

LEAD FREE*

Series LF007

Double Check Valve Assemblies

Sizes: ½" – 3"

Series LF007 Double Check Valve Assemblies shall be installed at referenced cross-connections to prevent the backflow of polluted water into the potable water supply. Only those cross-connections identified by local inspection authorities as non-health hazard shall be allowed the use of an approved double check valve assembly. The coating on this backflow assembly uses ArmorTek™ technology to resist corrosion due to microbial induced corrosion (MIC) or exposed metal substrate.* The LF007 features Lead Free* construction to comply with Lead Free* installation requirements.

Check with local authority having jurisdiction regarding vertical orientation, frequency of testing or other installation requirements.

The valve shall meet the requirements of ASSE Std. 1015 and AWWA Std. C510. Approved by the Foundation for Cross-Connection Control and Hydraulic Research at the University of Southern California.

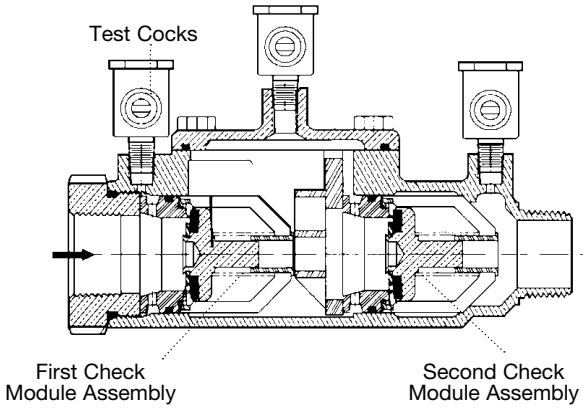
Features

- Ease of maintenance — only one cover
- Top entry
- Replaceable seats and seat discs
- Modular construction
- Compact design
- Utilizes advanced ArmorTek™ coating technology to resist corrosion of internals*
- Lead Free* cast copper silicon alloy body construction — ½" – 2"
- Fused epoxy coated cast iron body — 2½" – 3"
- Top mounted Lead Free* ball valve test cocks
- Low pressure drop
- No special tools required for servicing
- ½" – 1" have tee handles

Specifications

A Double Check Valve Assembly shall be installed at each noted location. The assembly shall consist of two positive seating check modules with captured springs and rubber seat discs. The check module seats and seat discs shall be replaceable. Service of all internal components shall be through a single access cover secured with stainless steel bolts. The Double Check Valve Assemblies shall be constructed using Lead Free* cast copper silicon alloy. Lead Free* Double Check Valve Assemblies shall comply with state codes and standards, where applicable, requiring reduced lead content. The assembly shall also include two resilient seated isolation valves; four top mounted, resilient seated test cocks. The assembly shall meet the requirements of ASSE Std. 1015 and AWWA Std. C510. The valve body shall utilize a coating system with built in electrochemical corrosion inhibitor and microbial inhibitor.* Approved by the Foundation for Cross-Connection Control and Hydraulic Research at the University of Southern California. Assembly shall be a Watts Series LF007.

¾" LF007M3QT



The LF007 Series features a modular design concept which facilitates complete maintenance and assembly by retaining the spring load.

Now Available
WattsBox Insulated Enclosures.
For more information, send for literature ES-WB.

NOTICE

Inquire with governing authorities for local installation requirements

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.

***The wetted surface of this product contacted by consumable water contains less than 0.25% of lead by weight.**

* Armortek coating applies to the 2½" and 3" models only.

WATTS®

Pressure — Temperature

½" – 2"

Temperature Range: 33°F – 180°F (0.5°C – 82°C).

Maximum Working Pressure: 175psi (12.1 bar).

2½" – 3"

Temperature Range: 33°F – 110°F (0.5°C – 43°C) continuous, 140°F (60°C) intermittent.

Maximum Working Pressure: 175psi (12.1 bar).

Standards

ASSE Std. 1015, AWWA Std. C510

IAPMO PS31, CSA B64.5

Approvals

USC-FCCCHR

† ASSE, AWWA, IAPMO, CSA, UPC

▲ Approved by the Foundation for Cross-Connection Control and Hydraulic Research at the University of Southern California.

• Models with suffix LF and S are not listed.

◆ UL Classified (without shutoff valves only) ¾" – 2" (except 007M3LF)

◆ UL Classified with OSY gate valves (2½" and 3" horizontal only.)

▼ ½" - 2" models Lead Free* with strainer

Horizontal and vertical "flow up" approval on all sizes

Models

Sizes:

½" – 2"

Suffix:

S – copper silicon alloy strainer
LF – without shutoff valves
W/Press** – press inlet x press outlet (½" - 2" only)

Prefix:

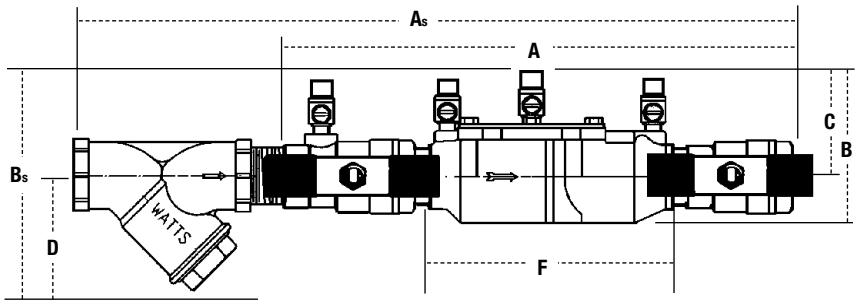
U – Union connections

2½" – 3"

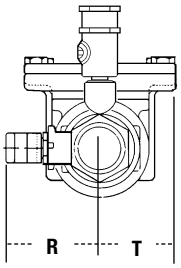
Suffix:

NRS – non-rising stem resilient seated gate valves
OSY – UL/FM outside stem and yoke resilient seated gate valves
LF – without shutoff valves

**** Viega ProPress® connections are optional factory-installed fitting on each end of the approved/certified assembly.**



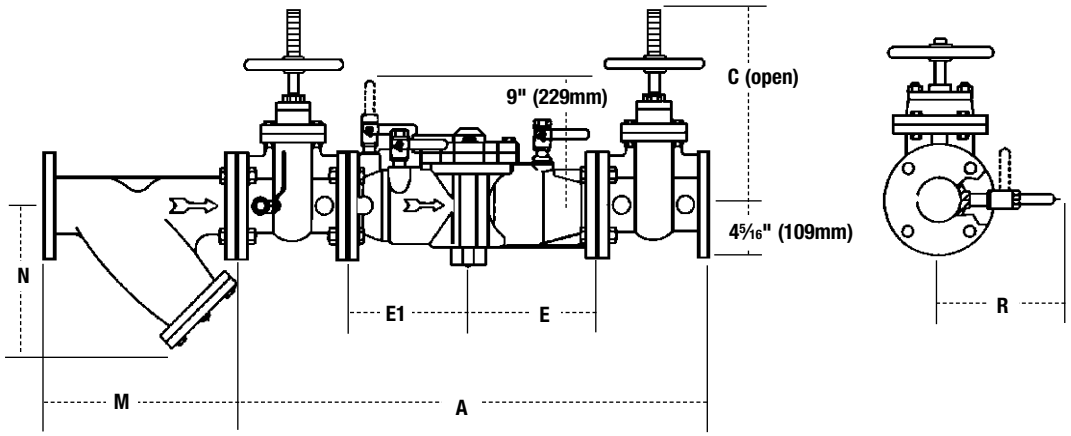
Subscript 'S' = strainer model



Dimensions – Weights

MODEL	SIZE	DIMENSIONS																WEIGHT	
		A		B		C		D		F		G		R		T			
	in.	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*lbs.*	*kgs.*
†▲▼ LF007QT	½	10	254	4 5/8	117	2 7/16	62	—	—	5	127	3 3/8	85	2 5/16	59	2 1/16	52	4.5	2
†▲▼ LF007M3QT	¾	11 1/8	282	4	102	3 1/8	79	—	—	6 3/16	157	3 7/16	87	2 1/8	54	15/16	33	5	2.3
†▲▼ LF007M1QT	1	13 1/4	337	5 1/8	130	4	102	—	—	7 1/2	191	3 3/8	85	1 11/16	43	1 11/16	43	12	5.4
†▲▼ LF007M2QT	1 1/4	16 3/8	416	5	127	3 5/16	84	—	—	9 1/2	241	5	127	3	76	2	50	15	6.8
†▲▼ LF007M2QT	1 1/2	16 3/4	425	4 7/8	124	3 1/2	89	—	—	9 3/4	248	5 13/16	148	3 1/8	79	2 11/16	68	15.9	7.2
†▲▼ LF007M1QT	2	19 1/2	495	6 1/4	159	4	102	—	—	13 3/8	340	6 1/8	156	3 7/16	87	2 11/16	68	25.7	11.7
•▼ LF007QT-S	½	13	330	6	152	2 7/16	62	3	76	5	127	3 3/8	85	2 5/16	59	2 1/16	52	5.5	2.5
•▼ LF007M3QT-S	¾	14 1/2	368	6 1/8	156	3 1/8	79	3	76	6 3/16	157	3 7/16	87	2 1/8	54	15/16	33	6.7	3.1
•▼ LF007M1QT-S	1	17 15/16	456	7 3/4	197	4	102	3 1/4	83	7 1/2	191	3 3/8	85	1 11/16	43	1 11/16	43	14	6.4
•▼ LF007M2QT-S	1 1/4	21 1/2	546	7 1/16	179	3 5/16	84	3 1/2	83	9 1/2	241	5	127	3	76	2	50	19	8.6
•▼ LF007M2QT-S	1 1/2	21 3/4	552	7 1/16	179	3 1/2	89	3 3/4	95	9 3/4	248	5 13/16	148	3 1/8	79	2 11/16	68	19.6	8.9
•▼ LF007M1QT-S	2	25 3/4	654	8 3/4	222	4	102	4	102	13 3/8	340	6 1/8	156	3 7/16	87	2 11/16	68	33.5	15.2

Dimensions – Weights Sizes: 2½" – 3"

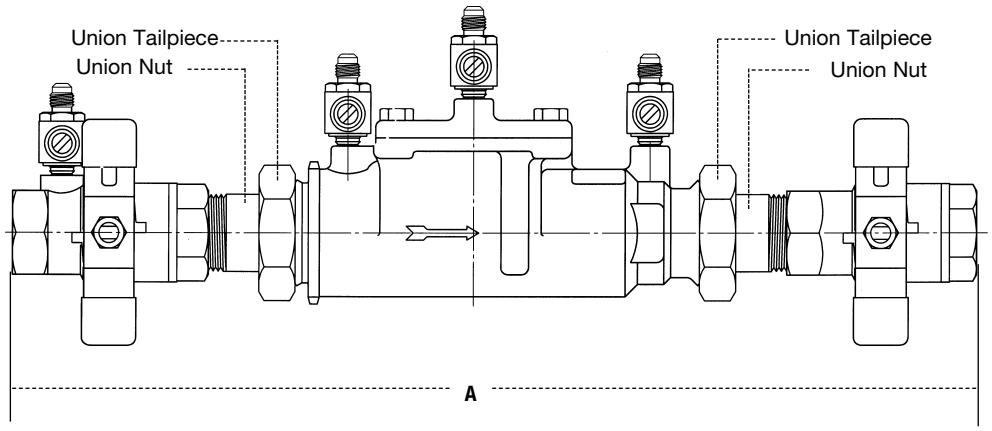


MODEL	SIZE	DIMENSIONS								WEIGHT	
		A		B		E, E1		R			
	in.	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*	*lbs.*	*kgs.*
▲ LF007-NRS	2½	33⅛	841	9⅜	238	9¹⁄₁₆	230	8¾	222	155	70
▲◆ LF007-OSY	2½	33⅛	841	16⅜	416	9¹⁄₁₆	230	8¾	222	158	72
▲ LF007-NRS	3	34¼	870	10¼	260	9¹⁄₁₆	230	8¾	222	185	84
▲◆ LF007-OSY	3	34¼	870	18⅞	479	9¹⁄₁₆	230	8¾	222	185	84

Strainer Dimensions

SIZE					WEIGHT	
	M		N			
in.	*in.*	*mm*	*in.*	*mm*	*lbs.*	*kgs.*
2½	10	254	6½	165	28	13
3	10⅛	267	7	178	34	15

1" LFU007M1QT



Sizes: ½" – 2"

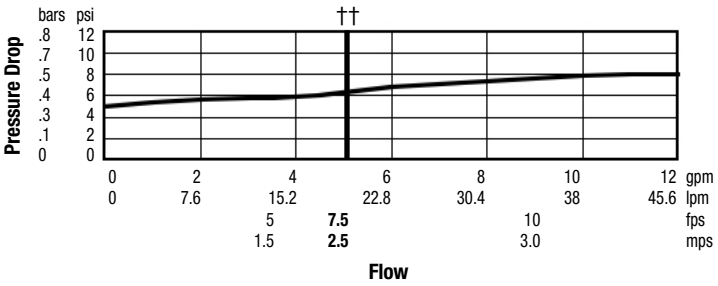
MODEL	SIZE	DIMENSIONS	
		A	
	in.	*in.*	*mm*
LFU007QT	½	12¹³⁄₁₆	326
LFU007M2QT	¾	13¹³⁄₁₆	350
LFU007M2QT	1	16⅝	422
LFU007M2QT	1¼	20¾	527
LFU007M2QT	1½	21½	546
LFU007M1QT	2	24½	622

Capacity

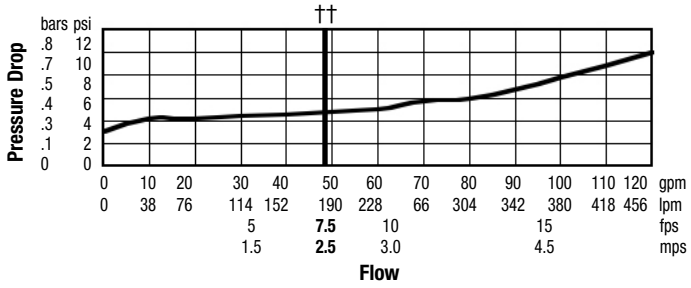
As compiled from documented Foundation for Cross-Connection Control and Hydraulic Research at the University of Southern California lab tests.

†† Typical maximum system flow rate (7.5 feet/sec., 2.3 meters/sec.)
** UL rated flow

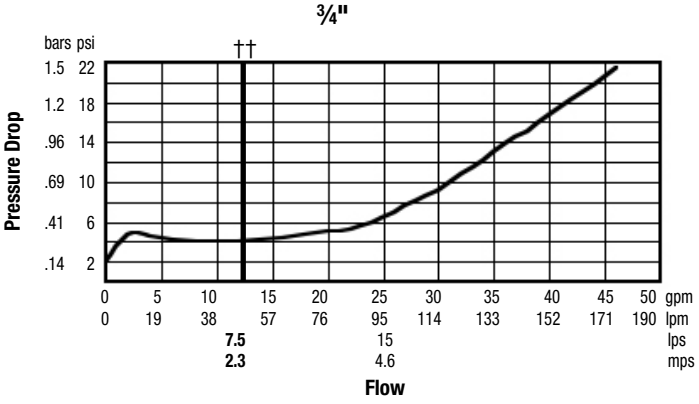
½"



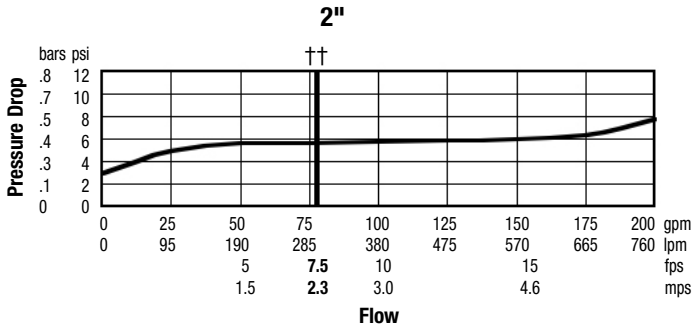
1½"



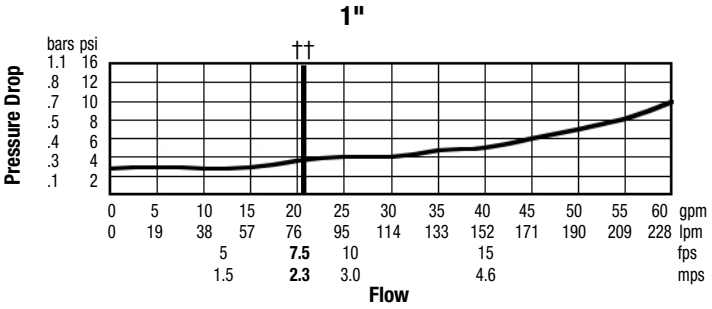
¾"



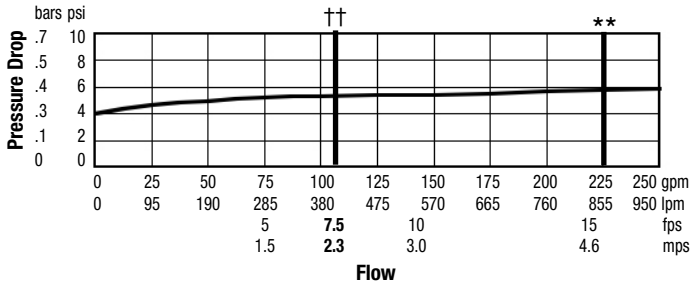
2"



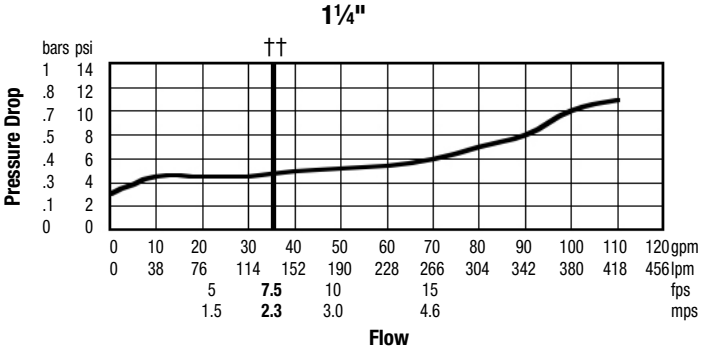
1"



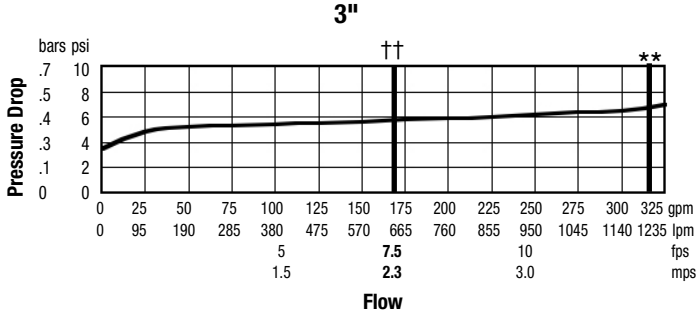
2½"



1¼"



3"



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