

36HLF Series

Model PRH-LF High Capacity Pressure Reducing Valve

LEAD FREE



Job Name:	
Job Location:	
Engineer:	
Contractor:	
Tag:	
PO#:	
Rep:	
Wholesale Dist.:	

DESCRIPTION

The Apollo® PRH-LF Lead Free® Pressure Reducing Valve (36HLF Series) is designed for commercial, industrial, and institutional applications to reduce incoming water pressure for protection of plumbing system components and to reduce water consumption. The valve is made with proven ASTM grade Lead Free® bronze and stainless steel materials. The PRH-LF provides high capacity flow with low pressure drop. It is designed with an integral by-pass relief to protect against thermal expansion downstream. The bottom access enables easy in-line cleaning or seat replacement.

FEATURES

- Dezincification Resistant Lead Free® Bronze
- Sealed Spring Cage for Vault Installations
- Ultra-High Flow Capacity
- Internal Thermal Expansion Bypass
- Standard Factory Setting: 50 psi
- Three Spring Ranges Cover 10 - 125 psi
- Stainless Steel Bolts and Spring
- 150# ANSI B16.24 Flange Connection Option
- In-line Strainer Option
- **100% MADE IN THE USA**

PERFORMANCE RATING

- Maximum Inlet Supply Pressure: up to 400 psig
- Temperature Range: 33 °F - 180 °F

APPROVALS

- NSF/ANSI 372 Lead Free
- ASSE 1003
- CSA B356

OPTIONS

- (02) - 10-35 psi
- (03) - 75-125 psi
- (36H) - w/ Standard Materials for Non-Potable Applications

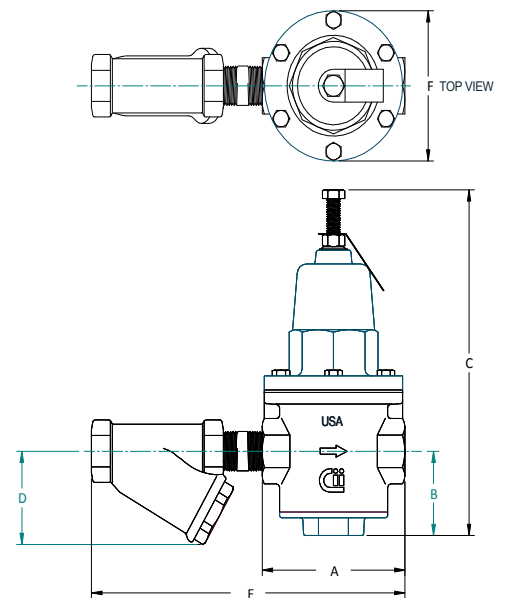
STANDARD MATERIALS LIST

BODY	Bronze, C89836 Lead Free*
BONNET/CAP	Bronze, ASTM B584
DIAPHRAGM	FDA approved Buna-N w/ Nylon
SEAT DISC	FDA approved EPDM
YOKE	Bronze, C89836 Lead Free*
SPRINGS	Stainless Steel
O-RINGS	FDA approved Nitrile

DIMENSIONS

MODEL NUMBER	PART NUMBER	SIZE (IN.)	DIMENSIONS (IN.)						WT. (LB.) W/ STRAINER	WT. (LB.) W/O STRAINER
			A	B	C	D	E	F		
PRH-LF	36HLF-203	1/2	4.12	2.25	9.25	1.87	8.37	4.00	7.00	6.0
PRH-LF	36HLF-204	3/4	4.12	2.25	9.25	2.44	9.00	4.00	8.00	6.0
PRH-LF	36HLF-205	1	4.82	2.31	9.81	4.00	10.25	4.70	12.00	8.0
PRH-LF	36HLF-206	1-1/4	6.19	3.19	13.20	3.37	12.50	6.50	29.00	24.0
PRH-LF	36HLF-207	1-1/2	6.75	3.19	13.20	3.87	13.13	6.50	29.00	23.0
PRH-LF	36HLF-208	2	8.12	3.50	16.00	4.63	16.00	7.63	47.00	38.0
PRH-LF	36HLF-209	2-1/2	8.12	3.50	16.00	6.00	17.70	7.63	49.00	37.0
PRH-LF	36HLF-200	3	10.37	4.00	19.12	7.00	20.50	9.75	87.00	70.0
FLANGED										
PRH-LF	36HLF-709	2-1/2	10.37	3.50	16.00	7.12	21.70	7.63	105.00	55.0
PRH-LF	36HLF-700	3	12.50	4.00	19.12	8.12	24.50	9.75	132.00	104.0

* Nominal dimensions are shown. Allowances must be made for manufacturers' tolerances.



PART NUMBER MATRIX

36HLF 36H - X	X	X	-	OX
END CONNECTIONS	OPTIONS	SIZE		PRESSURE RANGE
2 - FNPT X FNPT (STANDARD)	0 - STANDARD	3 - 1/2"		01 - 25-75 PSIG (STANDARD)
7 - FLANGED (2-1/2" - 3" ONLY)	1 - WITH Y-STRAINER	4 - 3/4"		02 - 10-35 PSIG
		5 - 1"		03 - 75-125 PSIG
		6 - 1-1/4"		
		7 - 1-1/2"		
		8 - 2"		
		9 - 2-1/2"		
		0 - 3"		

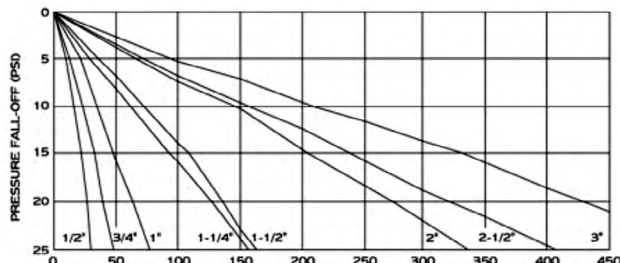
MODEL NUMBER MATRIX

PRH - X	X	X	X	LF
END CONNECTIONS	ACCESSORIES	PRESSURE ADJ. RANGE	SIZE	
T - THREADED	Y - WITH Y-STRAINER	STANDARD - 25-75 PSIG (SET AT 50)	12 - 1/2"	LF - LEAD FREE
F - ANSI 150# FLANGES (2-1/2" - 3" ONLY)		H - 75-125 PSIG (SET AT 100)	34 - 3/4"	BLANK - STANDARD MATERIAL
		L - 10-35 PSIG (SET AT 25)	1 - 1"	
			114 - 1-1/4"	
			112 - 1-1/2"	
			2 - 2"	
			212 - 2-1/2"	
			3 - 3"	

FLOW CAPACITY (GPM)

PIPE SIZE	FALL-OFF* (PSI)	PRESSURE DIFFERENTIAL (PSI)			PIPE SIZE	FALL-OFF* (PSI)	PRESSURE DIFFERENTIAL (PSI)		
		25	50	75			25	50	75
1/2"	5	8.5	10	11.5	1-1/2"	5	29.8	35.0	40.3
	10	13.6	16	18.4		10	61.5	72.3	83.1
	15	17.9	21	24.2		15	90.1	106.0	121.9
	20	21.3	25	28.8		20	113.1	133.0	153.0
3/4"	5	10.6	12.5	14.4	2"	5	55.3	65.0	74.8
	10	20.4	24.0	27.6		10	126.7	149.0	171.4
	15	28.1	33.0	38.0		15	174.3	205.0	235.8
	20	34.0	40.0	46.0		20	231.2	272.0	312.8
1"	5	17.0	20.0	23.0	2-1/2"	5	58.7	69.0	79.4
	10	29.8	35.0	40.3		10	132.6	156.0	179.4
	15	40.8	48.0	55.2		15	200.6	236.0	271.4
	20	51.0	60.0	69.0		20	271.2	319.0	366.9
1-1/4"	5	21.3	25.0	28.8	3"	5	80.8	95.0	109.3
	10	51.9	61.0	70.2		10	176.0	207.0	238.1
	15	80.8	95.0	109.3		15	282.5	332.4	382.3
	20	106.3	125.0	143.8		20	365.5	430.0	494.5

PRH SERIES PRV FLOW RATE VS. PRESSURE FALL-OFF



Note: Flow curves are based on static conditions of 100psi inlet pressure and 50 psi outlet pressure.

Pressure differential is the difference between the supply pressure and adjusted outlet pressure measured in the static (closed) condition.

Pressure fall-off is the decrease in downstream regulated pressure as the flow increases.

*LEAD FREE: The wetted surfaces of the product shall contain no more than 0.25% lead by weighted average. Complies with Federal Public Law 111-380. ANSI 3rd party approved and listed.