



Lab Specialty Product
Lab Specialty Products

Lab Specialty Products



PRODUCT

Contact Spears® for any Information not found.

Lab Specialty Product
Lab Ball Valves & Needle Valves



Lab Ball Valves



Socket/Threaded Valve Only

Pressure Rating @ 73°F (23°C),
 Water

1/4" - 3/8" 150 psi

Maximum Service Temperature

PVC = 140°F (60°C)

CPVC = 200°F (93°C)

Temperature/Pressure De-ratings

Apply

Rated for Vacuum Service



Valve & Adapters

Valve & Adapters includes:

- 1 - Threaded 1/4" Valve
- 2 - O-ring Sealed 1/4" MPT x Mipt Adapters
- 2 - EPDM or FKM O-rings (AS568-013 size)
- 1 - End Connector Wrench
- 2 - O-ring Sealed 1/4" MPT x 3/8" I.D. Tubing Barb Adapters - OR -
- 2 - O-ring Sealed 1/4" MPT x 1/4" I.D. Tubing Barb Adapters

All Valves Assembled with Silicone-Free, Water Soluble Lubricant

PVC Lab Valve

Size	EPDM	FKM	Std Pk	Mstr Pk	Prod Code
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Valve & Adapters Threaded Ends

1/4X1/4T	1529-002A 27.11	1539-002A 28.34	1	25	218
1/4X3/8T	1529-002 27.11	1539-002 28.34	1	25	218

Valve only Threaded Ends

1/4	1521-002 21.66	1531-002 24.12	50	200	218
3/8	1521-003 30.45	1531-003 33.76	50	200	218

Valve only Socket Ends

1/4	1522-002 21.66	1532-002 24.51	50	200	218
3/8	1522-003 30.45	1532-003 33.76	50	200	218

CPVC Lab Valve

Size	EPDM	FKM	Std Pk	Mstr Pk	Prod Code
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Valve & Adapters Threaded Ends

1/4X1/4T	1529-002CA 32.54	1539-002CA 33.17	1	25	219
1/4X3/8T	1529-002C 32.54	1539-002C 33.17	1	25	219

Valve only Threaded Ends

1/4	1521-002C 26.05	1531-002C 28.64	50	200	219
3/8	1521-003C 36.54	1531-003C 34.24	50	200	219

Valve only Socket Ends

1/4	1522-002C 26.05	1532-002C 31.00	50	200	219
3/8	1522-003C 36.54	1532-003C 40.56	50	200	219

Needle Valves



Pressure Rating @ 73°F
 (23°C), Water

PVC or CPVC 235 psi
 PP 150 psi

Maximum Service Temperature

PVC = 140°F (60°C)

CPVC = 200°F (93°C)

PP = 180°F (82°C)

Solid PTFE Stem Seals

No Elastomer or Lubricants used
 Valves include Panel Mounting Nut

PVC Needle Valve

Size	Threaded	Socket	SR Threaded	Std Pk	Mstr Pk	Prod Code
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Globe Pattern

1/4	5591-002 75.02	5592-002 75.02	---	1	18	218
3/8	5591-003 75.02	5592-003 75.02	5591-003SR 68.43	1	18	218
1/2	5591-005 83.27	5592-005 83.27	5591-005SR 85.51	1	18	218

Angle Pattern

1/4	5691-002 75.02	5692-002 75.02	---	1	18	218
3/8	5691-003 75.02	5692-003 75.02	---	1	18	218
1/2	5691-005 83.27	5692-005 83.27	5691-005SR 85.51	1	18	218

CPVC Needle Valve

Size	Threaded	Socket	SR Threaded	Std Pk	Mstr Pk	Prod Code
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Globe Pattern

1/4	5591-002C 88.36	5592-002C 88.36	---	1	18	219
3/8	5591-003C 88.36	5592-003C 88.36	5591-003CSR 88.16	1	18	219
1/2	5591-005C 93.44	5592-005C 93.44	5591-005CSR 95.83	1	18	219



Lab Specialty Product
Needle Valves & Gauge Guards

Needle Valves

CPVC Needle Valve

Size	Threaded	Socket	SR Threaded	Std Pk	Mstr Pk	Prod Code
Angle Pattern						
1/4	5691-002C 88.36	5692-002C 88.36	---	1	18	219
3/8	5691-003C 88.36	5692-003C 88.36	---	1	18	219
1/2	5691-005C 93.44	5692-005C 93.44	5691-005CSR 95.83	1	18	219

PP Needle Valve

Size	Threaded	SR Threaded	Std Pk	Mstr Pk	Prod Code
Globe Pattern					
1/4	5591-002P 82.67	---	1	18	219
3/8	5591-003P 82.67	---	1	18	219
1/2	---	5591-005PSR 91.42	1	18	219

Angle Pattern

1/4	5691-002P 82.67	---	1	18	219
3/8	5691-003P 82.67	---	1	18	219
1/2	---	5691-005PSR 91.42	1	18	219

Gauge Guards



Connections use Spears® Patented Special Reinforced (SR) Female Threads on Pressure Inlet (1/4" or 1/2")

Pressure Rating
235 psi @ 73°F
16 BAR @ 22°C

Maximum Service Temperature
PVC = 140°F (60°C)
CPVC = 200°F (93°C)
PP = 180°F (82°C)

Temperature/Pressure De-ratings Apply
Rated for Full Vacuum Service

Gauge Guards are pre-filled with glycerin-water on units with Factory Installed Gauges. "No Gauge" units are to be filled by end user.

PVC GAUGE GUARDS

Size	1/4" Inlet Connection	1/2" Inlet Connection	Std Pk	Mstr Pk	Prod Code
PTFE Diaphragm					
No Gauge	G0004-002 109.29	G0004-005 109.29	1	18	624
0-30 in-Hg	G30V4-002 184.51	G30V4-005 184.51	1	18	624
0-15 psi	G0154-002 174.41	G0154-005 174.41	1	18	624
0-30 psi	G0304-002 174.41	G0304-005 174.41	1	18	624
0-60 psi	G0604-002 174.41	G0604-005 174.41	1	18	624
0-100 psi	G1004-002 174.41	G1004-005 174.41	1	18	624
0-160 psi	G1604-002 174.41	G1604-005 174.41	1	18	624
0-200 psi	G2004-002 174.41	G2004-005 174.41	1	18	624
0-300 psi	G3004-002 174.41	G3004-005 174.41	1	18	624

FKM Diaphragm

No Gauge	G0003-002 109.29	G0003-005 109.29	1	18	624
0-30 in-Hg	G30V3-002 184.51	G30V3-005 184.51	1	18	624
0-15 psi	G0153-002 174.41	G0153-005 174.41	1	18	624
0-30 psi	G0303-002 174.41	G0303-005 174.41	1	18	624
0-60 psi	G0603-002 174.41	G0603-005 174.41	1	18	624

Lab Specialty Product
Gauge Guards



Gauge Guards

PVC GAUGE GUARDS (continued)

Size	1/4" Inlet Connection	1/2" Inlet Connection	Std Pk	Mstr Pk	Prod Code
FKM Diaphragm					
0-100 psi	G1003-002 174.41	G1003-005 174.41	1	18	624
0-160 psi	G1603-002 174.41	G1603-005 174.41	1	18	624
0-200 psi	G2003-002 174.41	G2003-005 174.41	1	18	624
0-300 psi	G3003-002 174.41	G3003-005 174.41	1	18	624

EPDM Diaphragm

No Gauge	G0002-002 104.87	G0002-005 104.87	1	18	624
0-30 in-Hg	G30V2-002 177.09	G30V2-005 177.09	1	18	624
0-15 psi	G0152-002 167.49	G0152-005 167.49	1	18	624
0-30 psi	G0302-002 167.49	G0302-005 167.49	1	18	624
0-60 psi	G0602-002 167.49	G0602-005 167.49	1	18	624
0-100 psi	G1002-002 167.49	G1002-005 167.49	1	18	624
0-160 psi	G1602-002 167.49	G1602-005 167.49	1	18	624
0-200 psi	G2002-002 167.49	G2002-005 167.49	1	18	624
0-300 psi	G3002-002 167.49	G3002-005 167.49	1	18	624

GAUGE GUARDS, CPVC

Size	1/4" Inlet Connection	1/2" Inlet Connection	Std Pk	Mstr Pk	Prod Code
PTFE Diaphragm					
No Gauge	G0004-002C 142.08	G0004-005C 142.08	1	18	625
0-30 in-Hg	G30V4-002C 239.87	G30V4-005C 239.87	1	18	625
0-15 psi	G0154-002C 226.77	G0154-005C 226.77	1	18	625
0-30 psi	G0304-002C 226.77	G0304-005C 226.77	1	18	625
0-60 psi	G0604-002C 226.77	G0604-005C 226.77	1	18	625
0-100 psi	G1004-002C 226.77	G1004-005C 226.77	1	18	625
0-160 psi	G1604-002C 226.77	G1604-005C 226.77	1	18	625
0-200 psi	G2004-002C 226.77	G2004-005C 226.77	1	18	625
0-300 psi	G3004-002C 226.77	G3004-005C 226.77	1	18	625

FKM Diaphragm

No Gauge	G0003-002C 142.08	G0003-005C 142.08	1	18	625
0-30 in-Hg	G30V3-002C 239.87	G30V3-005C 239.87	1	18	625

GAUGE GUARDS, CPVC (continued)

Size	1/4" Inlet Connection	1/2" Inlet Connection	Std Pk	Mstr Pk	Prod Code
FKM Diaphragm					
0-15 psi	G0153-002C 226.77	G0153-005C 226.77	1	18	625
0-30 psi	G0303-002C 226.77	G0303-005C 226.77	1	18	625
0-60 psi	G0603-002C 226.77	G0603-005C 226.77	1	18	625
0-100 psi	G1003-002C 226.77	G1003-005C 226.77	1	18	625
0-160 psi	G1603-002C 226.77	G1603-005C 226.77	1	18	625
0-200 psi	G2003-002C 226.77	G2003-005C 226.77	1	18	625
0-300 psi	G3003-002C 226.77	G3003-005C 226.77	1	18	625

EPDM Diaphragm

No Gauge	G0002-002C 136.42	G0002-005C 136.42	1	18	625
0-30 in-Hg	G30V2-002C 230.25	G30V2-005C 230.25	1	18	625
0-15 psi	G0152-002C 217.80	G0152-005C 217.80	1	18	625
0-30 psi	G0302-002C 217.80	G0302-005C 217.80	1	18	625
0-60 psi	G0602-002C 217.80	G0602-005C 217.80	1	18	625
0-100 psi	G1002-002C 217.80	G1002-005C 217.80	1	18	625
0-160 psi	G1602-002C 217.80	G1602-005C 217.80	1	18	625
0-200 psi	G2002-002C 217.80	G2002-005C 217.80	1	18	625
0-300 psi	G3002-002C 217.80	G3002-005C 217.80	1	18	625

GAUGE GUARDS, PP

Size	1/4" Inlet Connection	1/2" Inlet Connection	Std Pk	Mstr Pk	Prod Code
PTFE Diaphragm					
No Gauge	G0004-002P 127.91	G0004-005P 127.91	1	18	626
0-30 in-Hg	G30V4-002P 196.49	G30V4-005P 196.49	1	18	626
0-15 psi	G0154-002P 186.88	G0154-005P 186.88	1	18	626
0-30 psi	G0304-002P 186.88	G0304-005P 186.88	1	18	626
0-60 psi	G0604-002P 186.88	G0604-005P 186.88	1	18	626
0-100 psi	G1004-002P 186.88	G1004-005P 186.88	1	18	626
0-160 psi	G1604-002P 186.88	G1604-005P 186.88	1	18	626
0-200 psi	G2004-002P 186.88	G2004-005P 186.88	1	18	626
0-300 psi	G3004-002P 186.88	G3004-005P 186.88	1	18	626



Lab Specialty Product Gauge Guards & Lab Fixtures

Gauge Guards

GAUGE GUARDS, PP

Size	1/4" Inlet Connection	1/2" Inlet Connection	Std Pk	Mstr Pk	Prod Code
FKM Diaphragm					
No Gauge	G0003-002P 127.91	G0003-005P 127.91	1	18	626
0-30 in-Hg	G30V3-002P 196.49	G30V3-005P 196.49	1	18	626
0-15 psi	G0153-002P 186.88	G0153-005P 186.88	1	18	626
0-30 psi	G0303-002P 186.88	G0303-005P 186.88	1	18	626
0-60 psi	G0603-002P 186.88	G0603-005P 186.88	1	18	626
0-100 psi	G1003-002P 186.88	G1003-005P 186.88	1	18	626
0-160 psi	G1603-002P 186.88	G1603-005P 186.88	1	18	626
0-200 psi	G2003-002P 186.88	G2003-005P 186.88	1	18	626
0-300 psi	G3003-002P 186.88	G3003-005P 186.88	1	18	626

EPDM Diaphragm

No Gauge	G0002-002P 122.85	G0002-005P 122.85	1	18	626
0-30 in-Hg	G30V2-002P 188.61	G30V2-005P 188.61	1	18	626
0-15 psi	G0152-002P 179.48	G0152-005P 179.48	1	18	626
0-30 psi	G0302-002P 179.48	G0302-005P 179.48	1	18	626
0-60 psi	G0602-002P 179.48	G0602-005P 179.48	1	18	626
0-100 psi	G1002-002P 179.48	G1002-005P 179.48	1	18	626
0-160 psi	G1602-002P 179.48	G1602-005P 179.48	1	18	626
0-200 psi	G2002-002P 179.48	G2002-005P 179.48	1	18	626
0-300 psi	G3002-002P 179.48	G3002-005P 179.48	1	18	626

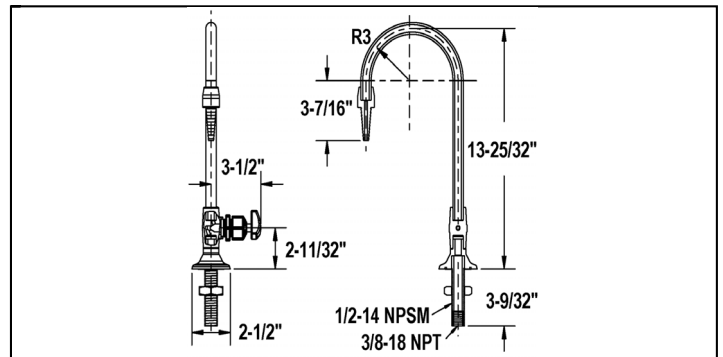
Lab Fixtures

100% Corrosion Resistance - No Metal Parts

Spears® Lab Fixtures have no metal parts; this provides full resistance to internal or environmental corrosion. These fixtures are compatible with all laboratory service lines. Lab Fixtures are produced from PVC (gray) and CPVC (for hot water), or special Low-Extractable PVC for high purity applications, and are available in a variety of types and configurations.

- Deck Mount – base configuration for horizontal surface mounting.
- Panel Mount – base configuration for vertical surface mounting.
- Standard Gooseneck Units – select all-plastic needle valve unit (no elastomer seals) for metered flow or ball valve unit (choice of EPDM or FKM seals) for direct flow. Unit includes valve, gooseneck with serrated tip, and base with nut for mounting. Select Deck or Panel Mount style.
- Standard Turret Units – direct flow ball valve (choice of EPDM or FKM seals) with serrated tip and base with connecting nipple and nut for mounting. Select Deck or Panel Mount style.
- Remote Valve Units (No Valve) – same as standard units less valve for use with remotely located valve.
- Recirculating Units – Special design provides continuous water motion without dead-leg areas of contamination and potential bacteria build-up. Internal supply tube fully circulates water through the entire fixture when connected to circulating water supply. Unit features gooseneck with terminally mounted all-plastic needle valve and serrated tip (no elastomer seals) for metered flow. Base is Deck Mount only with inlet and outlet connecting nipples with mounting nuts.

NPT - American National Standard Tapered Pipe Thread • NPSM - American National Standard Straight Thread For Free Fitting Mechanical Joints



Gooseneck Units - Deck Mount Lab Fixture w/Needle Valve

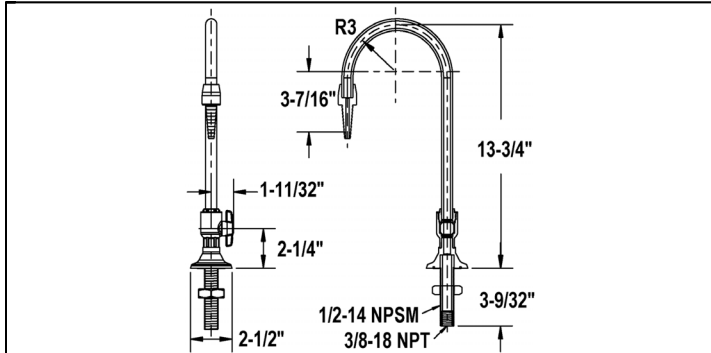
Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Base, Gooseneck & Serrated Tip with Needle Valve-Metered Flow

LF1000-N	PVC, PTFE Seal	1	0	218	199.21
LF1000-CN	CPVC, PTFE Seal	1	0	219	248.72
LF1000-BLN	LE, PTFE Seal	1	0	066	396.18



Lab Fixtures

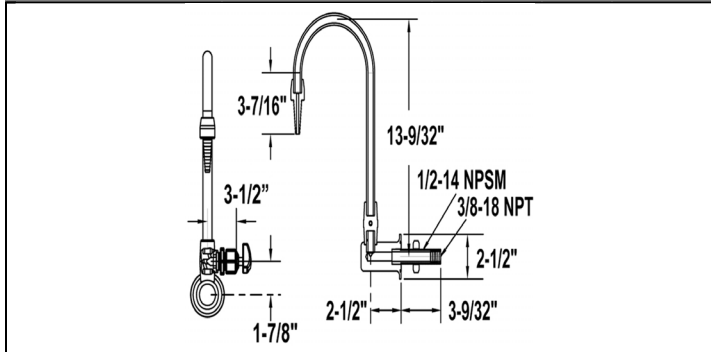


Gooseneck Units - Deck Mount Lab Fixture w/Ball Valve

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Base, Gooseneck & Serrated Tip with Ball Valve-Direct Flow

LF1002	PVC, EPDM Seal	1	0	218	166.40
LF1003	PVC, FKM Seal	1	0	218	184.88
LF1002-C	CPVC, EPDM Seal	1	0	219	208.00
LF1003-C	CPVC, FKM Seal	1	0	219	231.11
LF1002-BL	LE, EPDM Seal	1	0	066	331.31
LF1003-BL	LE, FKM Seal	1	0	066	368.13

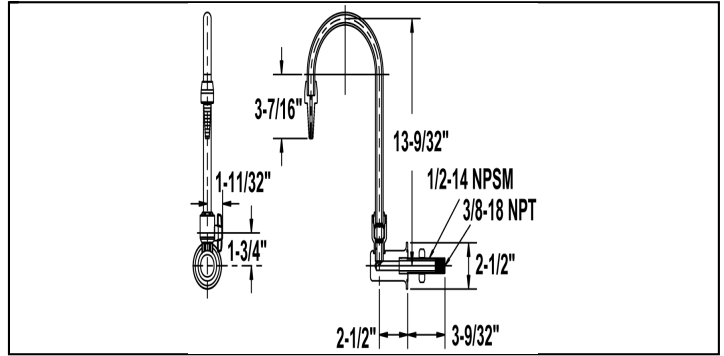


Gooseneck Units - Panel Mount Lab Fixture w/Needle Valve

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Base, Gooseneck & Serrated Tip with Needle Valve-Metered Flow

LF2000-N	PVC, PTFE Seal	1	0	218	290.33
LF2000-CN	CPVC, PTFE Seal	1	0	219	362.89

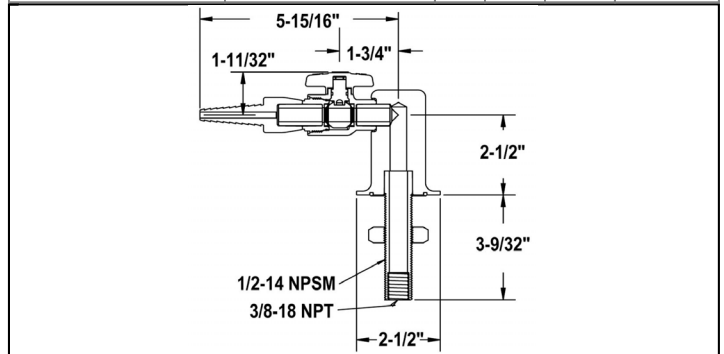


Standard Gooseneck Units - Panel Mount Lab Fixture -

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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with Ball Valve-Direct Flow

LF2002	PVC, EPDM Seal	3	0	218	250.28
LF2003	PVC, FKM Seal	3	0	218	278.11
LF2002-C	CPVC, EPDM Seal	1	0	219	312.87
LF2003-C	CPVC, FKM Seal	1	0	219	347.61



Turret Units - Deck Mount Turret Lab Fixtures Base w/Ball Valve

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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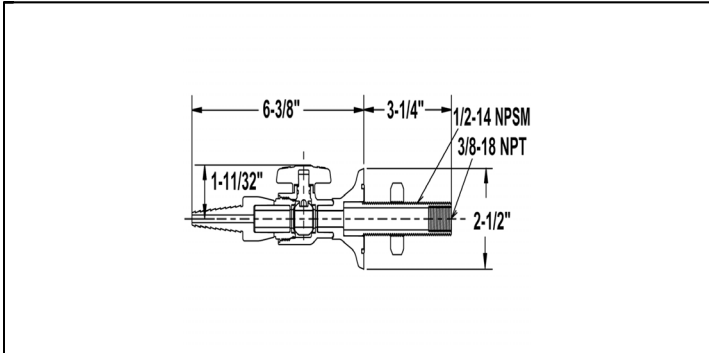
Turret Base & Serrated Tip with Ball Valve-Direct Flow

LF4002	PVC, EPDM Seal	1	0	218	211.18
LF4003	PVC, FKM Seal	1	0	218	234.64
LF4002-C	CPVC, EPDM Seal	1	0	219	263.97
LF4003-C	CPVC, FKM Seal	1	0	219	293.31



Lab Specialty Product
Lab Fixtures

Lab Fixtures

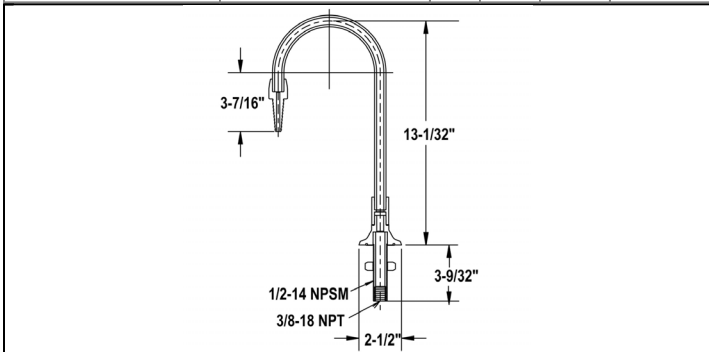


Turret Units - Panel Mount Turret Lab Fixture Base w/Ball Valve

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Turret Base, Serrated Tip with Ball Valve-Direct Flow

LF3002	PVC, EPDM Seal	1	0	218	163.67
LF3003	PVC, FKM Seal	1	0	218	181.88
LF3002-C	CPVC, EPDM Seal	1	0	219	204.62
LF3003-C	CPVC, FKM Seal	1	0	219	227.36
LF3002-BL	LE, EPDM Seal	1	0	066	325.89
LF3003-BL	LE, FKM Seal	1	0	066	362.15

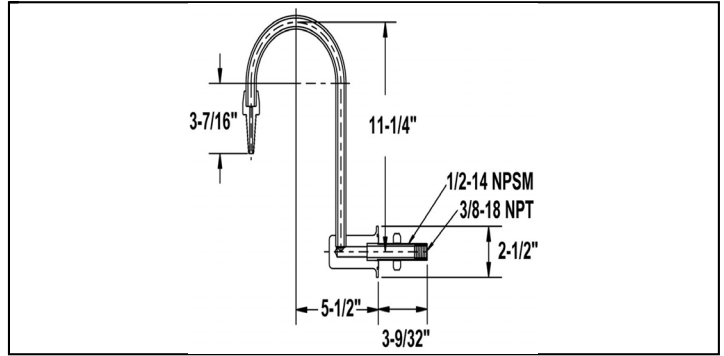


Remote Valve Units (No Valve) - Deck Mount Gooseneck -

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Base, Gooseneck & Serrated Tip

LF100	PVC	1	0	218	136.56
LF100-C	CPVC	1	0	219	170.71
LF100-BL	LE	1	0	066	271.87

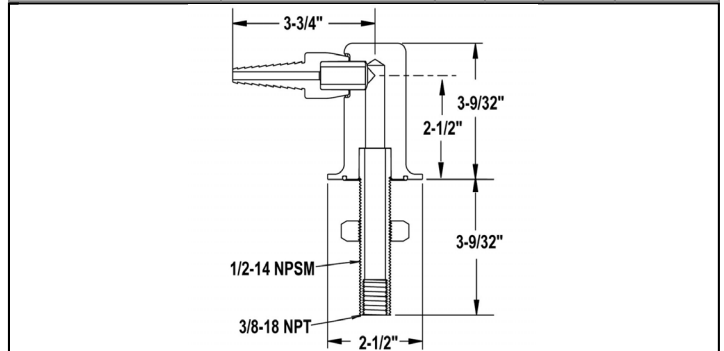


Remote Valve Units (No Valve) - Panel Mount Gooseneck -

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Base, Gooseneck & Serrated Tip

LF104	PVC	1	0	218	168.67
LF104-C	CPVC	1	0	219	210.85

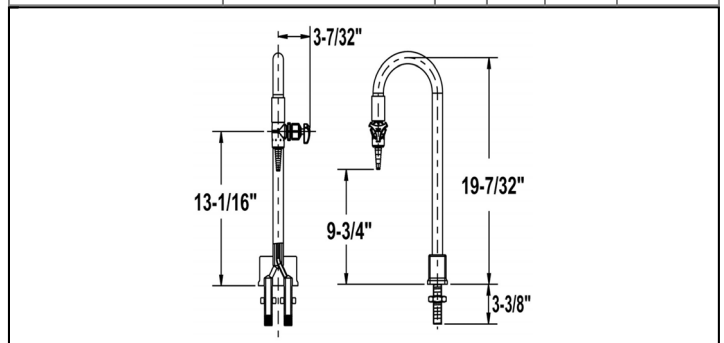


Remote Valve Units (No Valve) - Deck Mount Turret

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Turret Base & Serrated Tip

LF300	PVC	1	0	218	45.00
LF300-C	CPVC	1	0	219	56.25



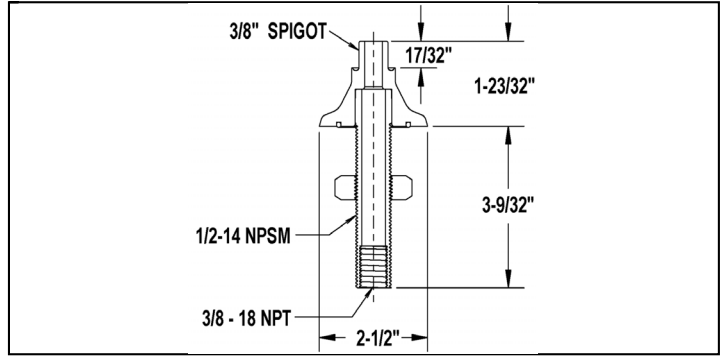
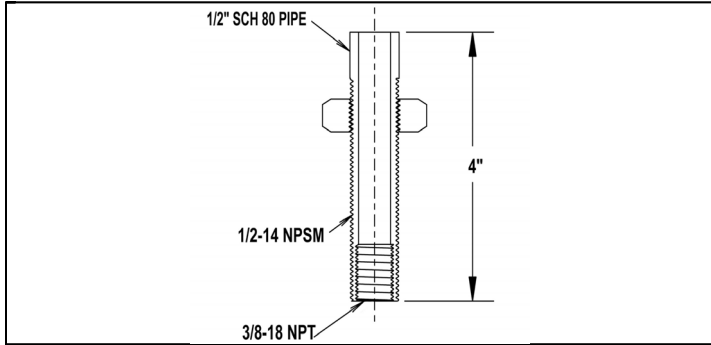
Gooseneck Recirculating Units -Deck Mount Lab Fixture w/Needle Valve

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
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Base, Gooseneck & Serrated Tip with Needle Valve-Metered Flow

LFR1000-N	PVC, PTFE Seal	1	0	218	346.69
LFR1000-CN	CPVC, PTFE Seal	1	0	219	518.15
LFR1000-BLN	LE, PTFE Seal	1	0	066	825.32

Lab Fixtures



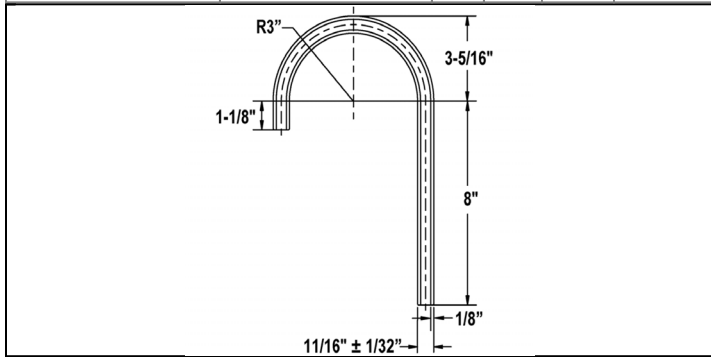
Accessory/ Replacement - Fixture Connection Nipple -

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
LF500	PVC	1	0	218	22.59
LF500-C	CPVC	1	0	219	28.25
LF500-BL	LE	1	0	066	45.03

(included on all fixtures above) with Locknut

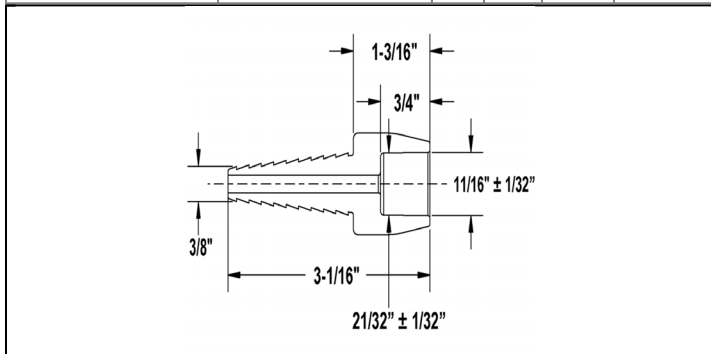
Accessory/ Replacement - Base

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
Deck Mount					
LFB	PVC	1	0	218	8.28
LFB-C	CPVC	1	0	219	9.89
LFB-BL	LE	1	0	066	5.66



Accessory/ Replacement - Gooseneck (3/8")

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
LFGN	PVC	1	0	218	19.20
LFGN-C	CPVC	1	0	219	24.03
LFGN-BL	LF	1	0	066	38.27



Accessory/ Replacement - Straight Serrated Tip

Part Number	Material	Std Pk	Mstr Ctn	Prod Code	MSRP
LF400	PVC	600	0	218	4.06
LF400-C	CPVC	600	0	219	5.11
LF400-BL	LE	600	0	066	8.09