



# Low Pressure Valves & Fittings

## LP Series "Speed Bite" Needle Valves and Fittings

(Up to 11,500 PSI / 793 BAR)

### Specifications

Pressure rating	: Up to 11,500 psi
Temp. Rating	: -100°F to 600°F
Body Material	: SS316 cold worked
Stem	: 15-5 PH
Packing	: Glass filled Teflon

### Typical Applications

- Hydraulic applications
- Pneumatic applications
- General plant service
- Isolating or venting

### Optional

- Grafoil Packing for temperature up to 800°F
- Extended Stuffing Box for temperature up to 1200°F
- Air Actuator for remote control operation is available
- Can be manufactured to meet NACE MR0175 standard
- Quick Open Needle Valve
  - o Fully open in 1-3/4 turn
  - o Reduces throttling and therefore increase seat life

Our valves are complemented by a complete line of low pressure fittings, tubing, check valves, relief valves, and line filters.

### Features & Benefits

The Low Pressure (11,500 psi maximum), otherwise known as "SpeedBite" Needle Valves are designed for applications between traditional compression fittings and the Medium Pressure Cone and Thread products that are designed for high flow and high pressure. SpeedBite Valves are engineered for use with annealed ASTM A269 316 (and similar) Stainless Steel tubing. When correctly installed, connection strength far exceeds the burst pressure of the tubing utilized.

- Two pieces heavy duty non-rotating stem for a reliable assembly.
- Bi-directional flow capability.
- Panel mounting option available.
- 4-sided tapered stem for maximum handle contact.
- Complete material traceability.

# Low Pressure Valves & Fittings

## LP Series "Speed Bite" Check Valves and Fittings (Up to 11,500 PSI / 793 BAR)

### Specifications

Pressure rating	: Up to 11,500 psi
Ball Seat Poppet	: -420°F to 1200°F
Soft Seat Poppet	: -65°F to 250°F
Body Material	: SS316 cold worked
Cracking Press.	: 15 PSI

### Typical Applications

- Hydraulic applications
- Pneumatic applications
- General plant service

### Features & Benefits

- Prevents reverse flow where leak-tight shutoff is required.
- Ball Seat Poppet offers metal to metal seat for rapid cycling or severe environments.
- Soft Seat Poppet offers O-ring seat for fast shutoff and reliable seal.
- Nitrile is standard material of Soft Seat Poppet Check Valve.
- Complete material traceability.



## Low Pressure Connection Fittings (Up to 11,500 PSI / 793 BAR)

### Specifications

Pressure rating	: Up to 11,500 psi
Body Material	: SS316 cold worked

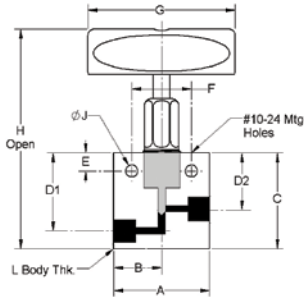
### Features & Benefits

- A complete range of elbows, tees, crosses and adaptors are available for all of the tubing connection sizes.
- Can be manufactured to meet NACE MR0175 standard.
- Other materials available on request.



# Low Pressure Valves (Up to 11,500 PSI / 793 BAR)

## LP 2-Way Straight Valves

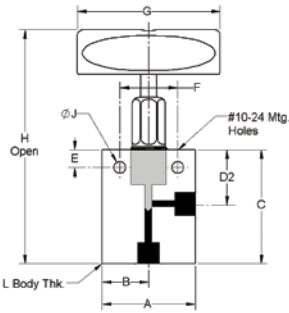


Pressure (PSI)	Connection Type	End Connection Size in.	Part Number	Orifice in. (mm)
11,500	L/P Single Ferrule	1/4" LP.F	<b>11.5NVS4LF</b>	0.188 (4.78)
7,500		3/8" LP.F	<b>7.5NVS6LF</b>	0.219 (5.56)

### Dimensions, in. (mm)

A	B	C	D1	D2	E	F	G	H	J	L
2.00 (50.8)	1.00 (25.4)	2.00 (50.8)	1.63 (41.3)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	4.80 (121.9)	0.25 (6.4)	1.00 (25.4)
2.00 (50.8)	1.00 (25.4)	2.00 (50.8)	1.63 (41.3)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	4.80 (121.9)	0.25 (6.4)	1.00 (25.4)

## LP 2-Way Angle Valves

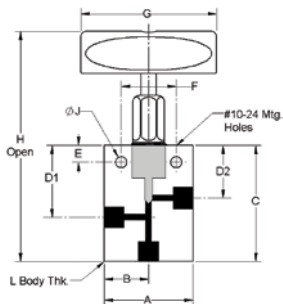


Pressure (PSI)	Connection Type	End Connection Size in.	Part Number	Orifice in. (mm)
11,500	L/P Single Ferrule	1/4" LP.F	<b>11.5NVA4LF</b>	0.188 (4.78)
7,500		3/8" LP.F	<b>7.5NVA6LF</b>	0.219 (5.56)

### Dimensions, in. (mm)

A	B	C	D1	D2	E	F	G	H	J	L
2.00 (50.8)	1.00 (25.4)	2.44 (61.98)	-	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	5.235 (132.9)	0.25 (6.4)	1.00 (25.4)
2.00 (50.8)	1.00 (25.4)	2.44 (61.98)	-	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	4.80 (121.9)	0.25 (6.4)	1.00 (25.4)

## LP 3-Way Valves with 2 Inlets



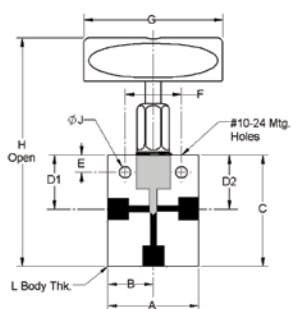
Pressure (PSI)	Connection Type	End Connection Size in.	Part Number	Orifice in. (mm)
11,500	L/P Single Ferrule	1/4" LP.F	<b>11.5NVT2-4LF</b>	0.188 (4.78)
7,500		3/8" LP.F	<b>7.5NVT2-6LF</b>	0.219 (5.56)

### Dimensions, in. (mm)

A	B	C	D1	D2	E	F	G	H	J	L
2.00 (50.8)	1.00 (25.4)	2.62 (66.5)	1.63 (41.3)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	5.37 (136.4)	0.25 (6.4)	1.00 (25.4)
2.00 (50.8)	1.00 (25.4)	2.62 (66.5)	1.63 (41.3)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	5.37 (136.4)	0.25 (6.4)	1.00 (25.4)

# Low Pressure Valves (Up to 11,500 PSI / 793 BAR)

## LP 3-Way Valves with 1 Inlet

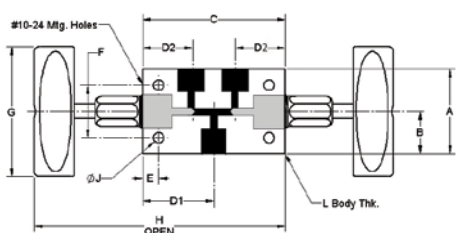


Pressure (PSI)	Connection Type	End Connection Size in.	Part Number	Orifice in. (mm)
11,500	L/P Single Ferrule	1/4" LP.F	<b>11.5NVT1-4LF</b>	0.188 (4.78)
7,500		3/8" LP.F	<b>7.5NVT1-6LF</b>	0.219 (5.56)

### Dimensions, in. (mm)

A	B	C	D1	D2	E	F	G	H	J	L
2.00 (50.8)	1.00 (25.4)	2.44 (62.0)	1.19 (30.2)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	5.19 (131.8)	0.25 (6.4)	1.00 (25.4)
2.00 (50.8)	1.00 (25.4)	2.44 (62.0)	1.19 (30.2)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	5.19 (131.8)	0.25 (6.4)	1.00 (25.4)

## LP 3-Way, 2 Stem Valves

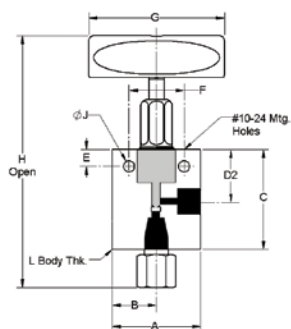


Pressure (PSI)	Connection Type	End Connection Size in.	Part Number	Orifice in. (mm)
11,500	L/P Single Ferrule	1/4" LP.F	<b>11.5NVT3-4LF</b>	0.188 (4.78)
7,500		3/8" LP.F	<b>7.5NVT3-6LF</b>	0.219 (5.56)

### Dimensions, in. (mm)

A	B	C	D1	D2	E	F	G	H	J	L
2.00 (50.8)	1.00 (25.4)	3.38 (85.9)	1.68 (42.7)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	8.88 (225.5)	0.25 (6.4)	1.00 (25.4)
2.00 (50.8)	1.00 (25.4)	3.38 (85.9)	1.68 (42.7)	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	8.88 (225.5)	0.25 (6.4)	1.00 (25.4)

## LP Replaceable Seat Valves



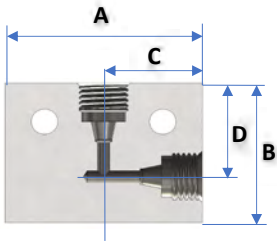
Pressure (PSI)	Connection Type	End Connection Size in.	Part Number	Orifice in. (mm)
11,500	L/P Single Ferrule	1/4" LP.F	<b>11.5NVR4LF</b>	0.188 (4.78)
7,500		3/8" LP.F	<b>7.5NVR6LF</b>	0.219 (5.56)

### Dimensions, in. (mm)

A	B	C	D1	D2	E	F	G	H	J	L
2.00 (50.8)	1.00 (25.4)	2.25 (57.2)	-	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	5.63 (143.0)	0.25 (6.4)	1.00 (25.4)
2.00 (50.8)	1.00 (25.4)	2.25 (57.2)	-	1.19 (30.2)	0.38 (9.7)	1.24 (31.5)	3.06 (77.7)	5.63 (143.0)	0.25 (6.4)	1.00 (25.4)

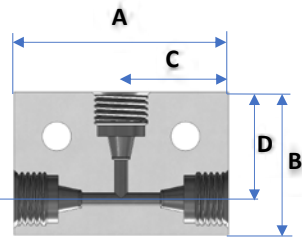
# Low Pressure Fittings (Up to 11,500 PSI / 793 BAR)

## LP Elbows



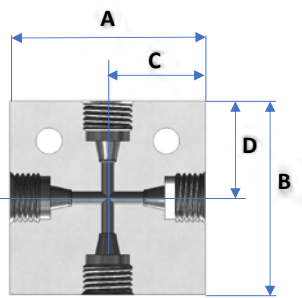
Part Number	MAWP (PSI)	Connections	A (in.)	B (in.)	C (in.)	D (in.)	Thickness (in.)
<b>11.5L4LF</b>	11,500	1/4" LP.F	1.19	1.19	0.88	0.88	0.62
<b>7.5L6LF</b>	7,500	3/8" LP.F	1.38	1.38	1.00	1.00	0.75

## LP Tees



Part Number	MAWP (PSI)	Connections	A (in.)	B (in.)	C (in.)	D (in.)	Thickness (in.)
<b>11.5T4LF</b>	11,500	1/4" LP.F	1.75	1.19	0.88	0.88	0.62
<b>7.5T6LF</b>	7,500	3/8" LP.F	2.00	1.38	1.00	1.00	0.75

## LP Crosses



Part Number	MAWP (PSI)	Connections	A (in.)	B (in.)	C (in.)	D (in.)	Thickness (in.)
<b>11.5X4LF</b>	11,500	1/4" LP.F	1.75	1.75	0.88	0.88	0.62
<b>7.5X6LF</b>	7,500	3/8" LP.F	2.00	2.00	1.00	1.00	0.75

## LP Ferrules



Part Number	Pressure (PSI)	Tube Size
<b>11.5F4L</b>	11,500	1/4" OD
<b>7.5F6L</b>	7,500	3/8" OD

## LP Glands



Part Number	Pressure (PSI)	Tube Size
<b>11.5GL4L</b>	11,500	1/4" OD
<b>7.5GL6L</b>	7,500	3/8" OD

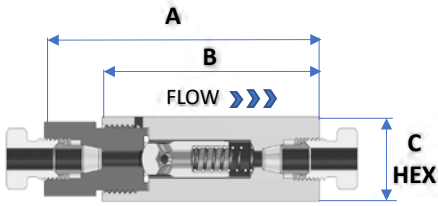
## LP Plugs



Part Number	Pressure (PSI)	Tube Size
<b>11.5PL4L</b>	11,500	1/4" OD
<b>7.5PL6L</b>	7,500	3/8" OD

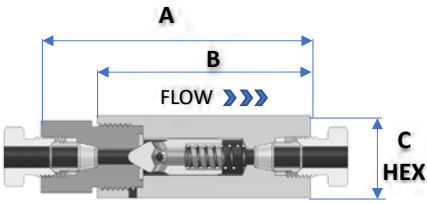
## Low Pressure Check Valves (Up to 11,500 PSI / 793 BAR)

### LP Ball Check Valves



Part Number	Pressure (PSI)	Orifice (in.)	Connections	A (in.)	B (in.)	C (in.)
<b>11.5BCV4LF</b>	11,500	0.188	1/4" LP.F	3.24	2.62	0.81
<b>7.5BCV6LF</b>	7,500	0.219	3/8" LP.F	4.44	3.50	1.38

### LP Ball Check Valves



Part Number	Pressure (PSI)	Orifice (in.)	Connections	A (in.)	B (in.)	C (in.)
<b>11.5SCV4LF</b>	11,500	0.188	1/4" LP.F	3.24	2.62	0.81
<b>7.5SCV6LF</b>	7,500	0.219	3/8" LP.F	4.44	3.50	1.38