

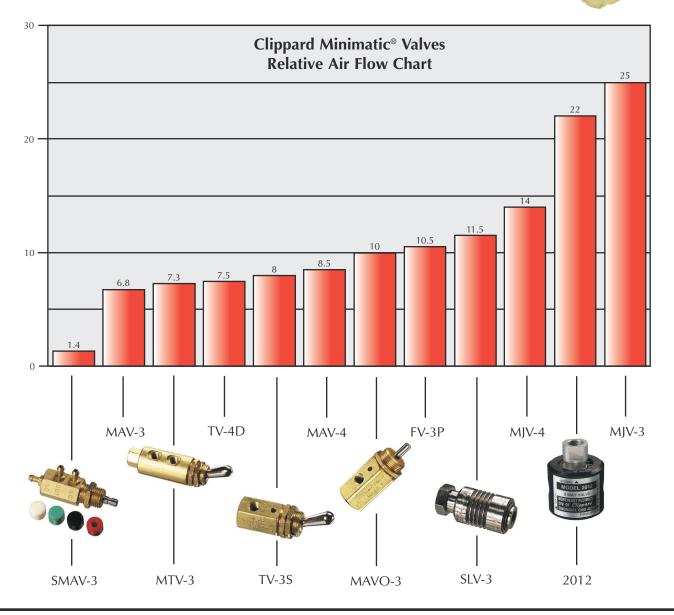
CONTROL VALVES



Every air system is unique... and Clippard has the air valve you need. Clippard control valves are available in poppet or spool design; 2, 3, or 4-way functions, in sizes from #3-56 and #10-32 through 1/8 NPT ports; and for pressures to 300 PSIG. They are available with solenoid, air pilot, manual and mechanical actuators. Mounting styles include inline, panel mount, manifold mount or clearance holes for mounting screws.

When designing a pneumatic system, choose the proper size for each component. A valve of insufficient capacity may cause an entire system to operate slower than expected. Conversely, utilizing a valve which possesses greater capacity than is actually required results in needless size and often leads to excessive speed, impact, wear, and air consumption.

The chart below shows the variety of valve flows available from Clippard. It can be used as a guide to determine the proper valve for an actual application.





Clippard Minimatic[®] miniature valves and associated products have evolved into a widely used system of fluid power control devices, known for quality, value and performance.

Over the past five decades, a diverse range of industries in the U.S. and throughout the world have come to rely on Minimatics[®] to control machines, systems, and processes through an unlimited list of applications. Clippard quality in design, engineering, manufacturing, as well as an expansive product offering, make Minimatics[®] the preferred choice for miniature and subminiature pneumatic applications.



Recognized as the original and most complete line of miniature fluid power components, Clippard's Minimatic[®] line is available across the globe through a network of fully-trained, stocking distributors. Clippard and our distributors stand ready to provide expert application assistance, support, and technical answers, to help you achieve the highest level of performance in your system.

Options

-NP Nickel Plating

This option provides a bright finish on brass parts for decorative purposes that also protects the surface from corrosion and tarnishing. It has a nominal thickness of .0015", and does not affect the fit or function of the part.

-ENP Electroless Nickel Plating

This option provides a low luster finish on brass parts for decorative purposes that also protects the surface from corrosion and tarnishing. It has a nominal thickness of .0002", and does not affect the fit or function of the part.

-V Viton

This option replaces the standard Buna-N seals with Viton seals either for high temperature (up to + 400°F) applications or those that require Viton for chemical

compatibility.

-M5

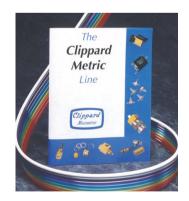
M5 metric ports

-MG

G 1/8 metric ports



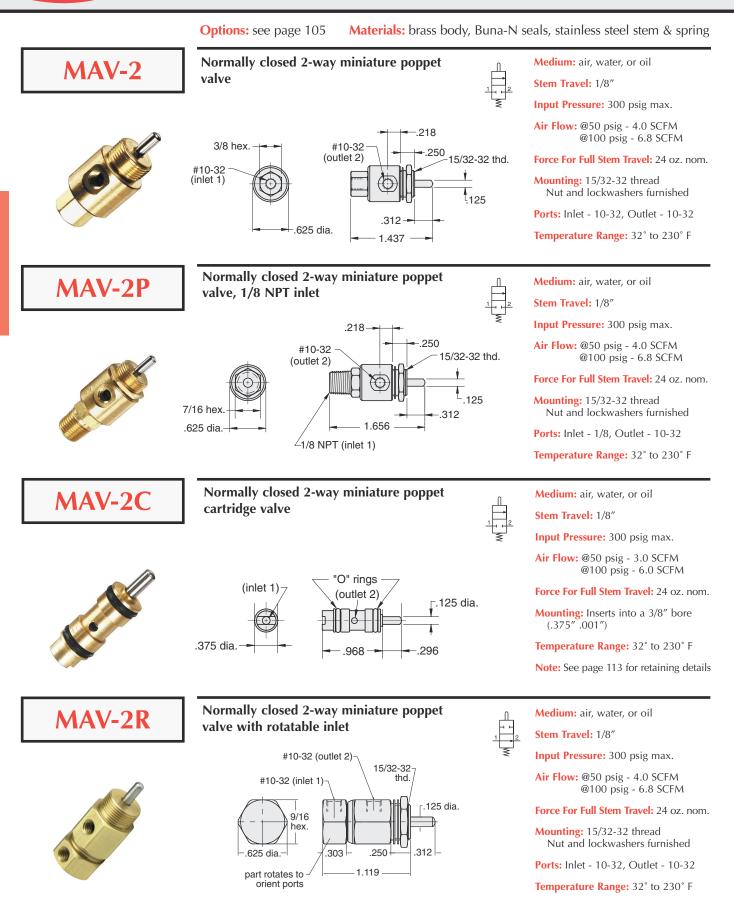
Metric Catalog



Many of the most popular Clippard valves and fittings are available with metric ports. The Minimetric[®] catalog is a 90 page color catalog that has been drilled to fit in the standard Clippard three ring binder, as well as the four ring European binder. Divided into five sections, the Minimetric[®] catalog details the complete line of Clippard Metric products and is available from your local distributor.

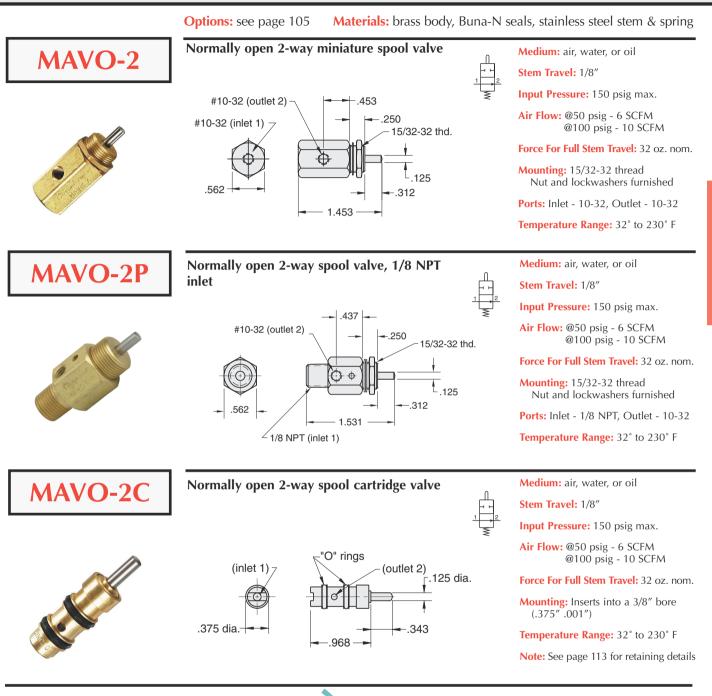


2-WAY NORMALLY CLOSED VALVES



2-WAY NORMALLY OPEN VALVES





CAPTIVATED PUSH BUTTONS



The small compact size make the push buttons adaptable to panel mounting. Unlike set screw retained buttons, the screw-on design will not allow the button to fall off. Designed to work with Clippard MAV, MJV, and FV series valves, these buttons also help protect the valve by preventing over-traveling of the stem and the potential for side-load on the valve. See page 137 for more information.



Button Colors Available in: Yellow Black Red White Green

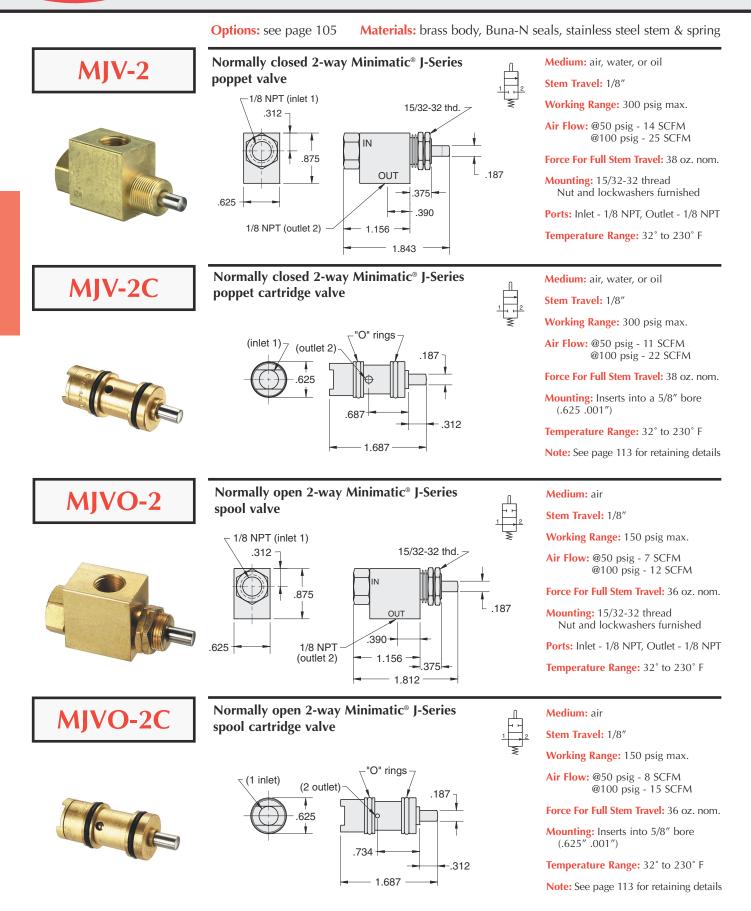
Brass

Button Housing Available in: Black Chrome Nickel Plated





2-WAY J-SERIES VALVES





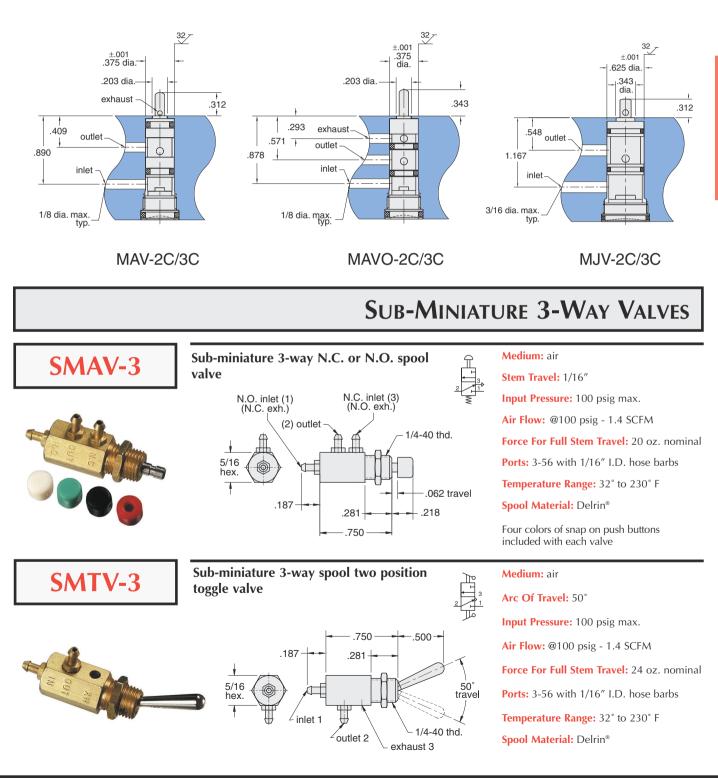
Options: see page 105

Materials: brass body, Buna-N seals, stainless steel stem & spring

CARTRIDGE VALVE MOUNTING

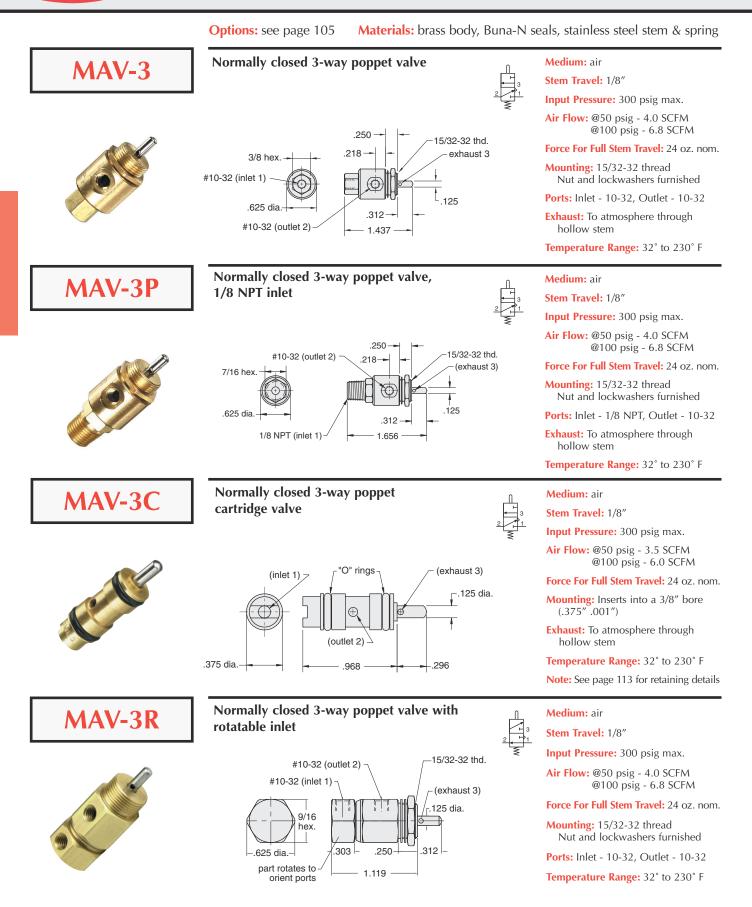
Clippard miniature cartridge valves offer the user flexibility in the application of 2-way and 3-way normally open or normally closed valves. Two sizes are provided: to fit either

a .375" diameter bore or .625" diameter bore. They are used in Clippard heavy duty limit switches and are suitable for pneumatic tools and manifolds or for any use where a valve needs to be built in.



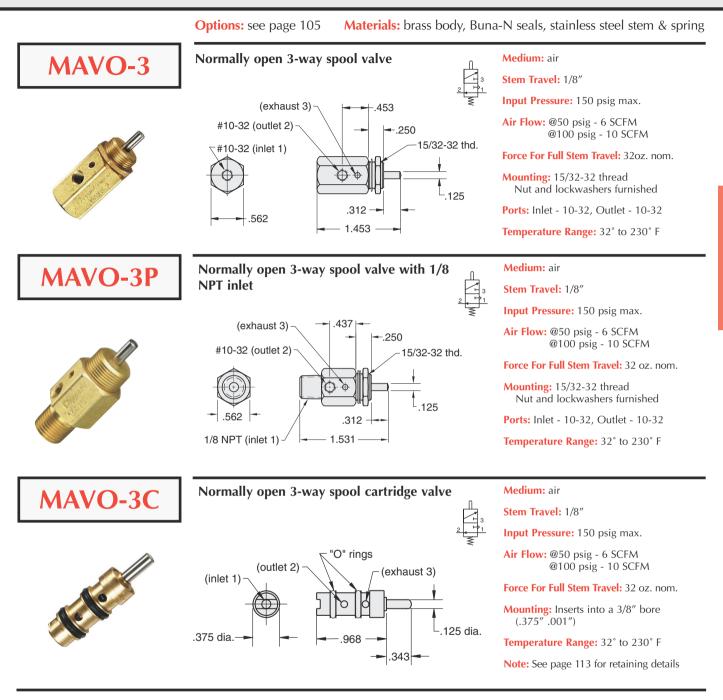


3-WAY NORMALLY CLOSED



3-WAY NORMALLY OPEN





Additional Valve Specifications



Materials: brass body, Buna-N seals, stainless steel stem & spring



Options: Consult the factory concerning the price and availability of the following standard options:

NP - Nickel Plating

Temperature range: 32° to 230° F

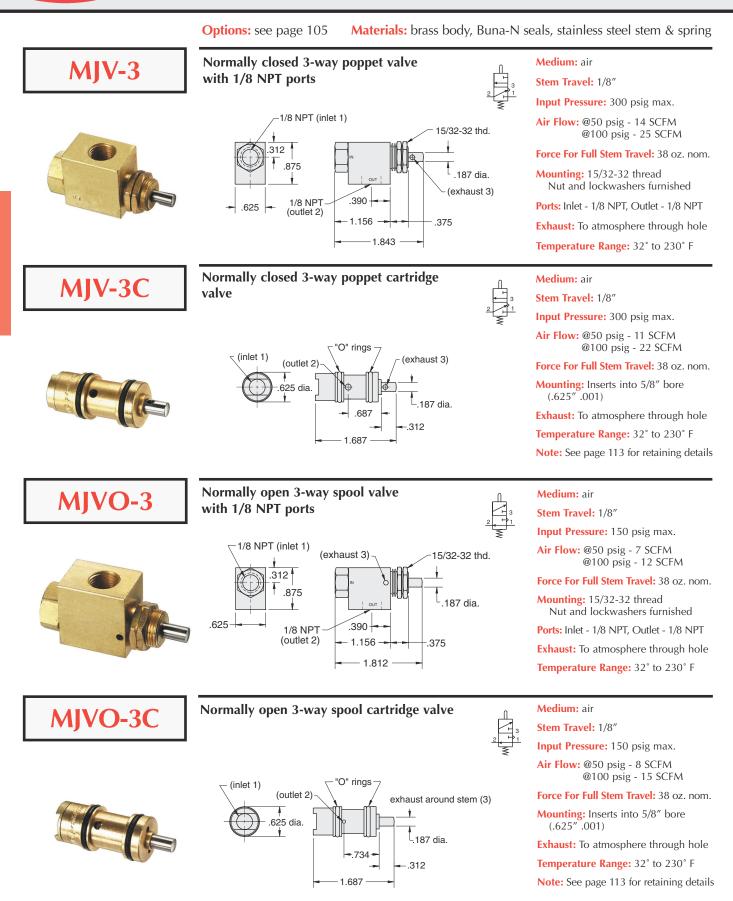
- **ENP** Electroless Nickel Plating
- M5 M5 x 0.8 threaded ports

V - Viton SealsE - EPDM Seals

MG - G1/8 ports



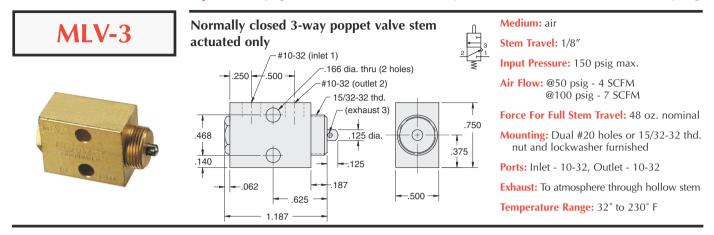
3-WAY J-SERIES VALVES



3-WAY MINIATURE LIMIT VALVE



Options: see page 105 Materials: brass body, Buna-N seals, stainless steel stem & spring

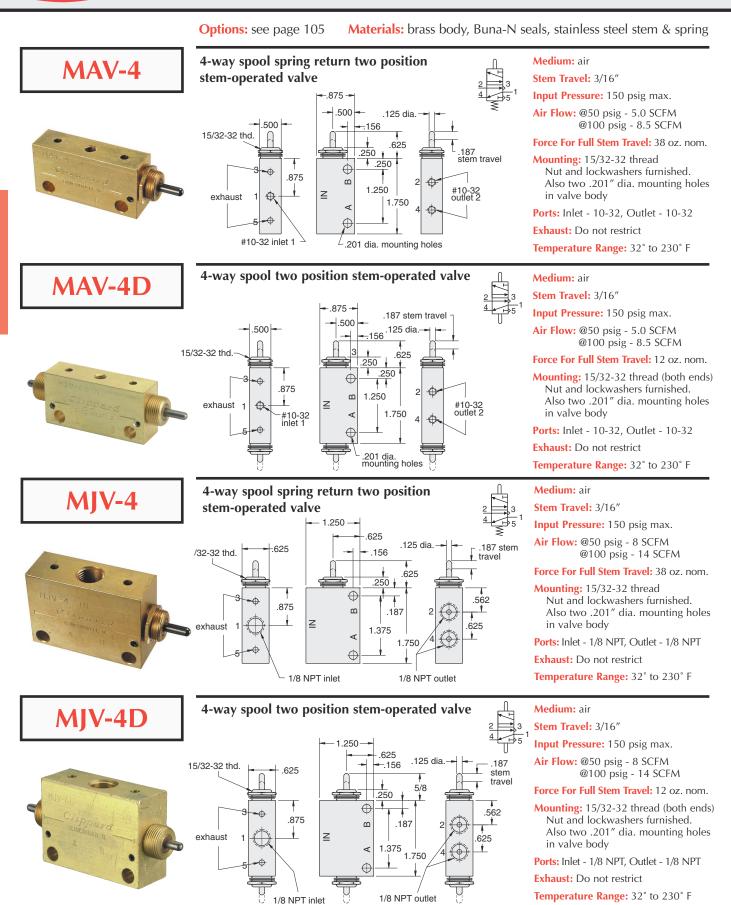




Clippard's reputation of building jigs, fixtures and machines as well as modifying existing machines to improve productivity is carried on in its well equipped machine shop. New product prototypes are crafted by experienced engineers and machinists.

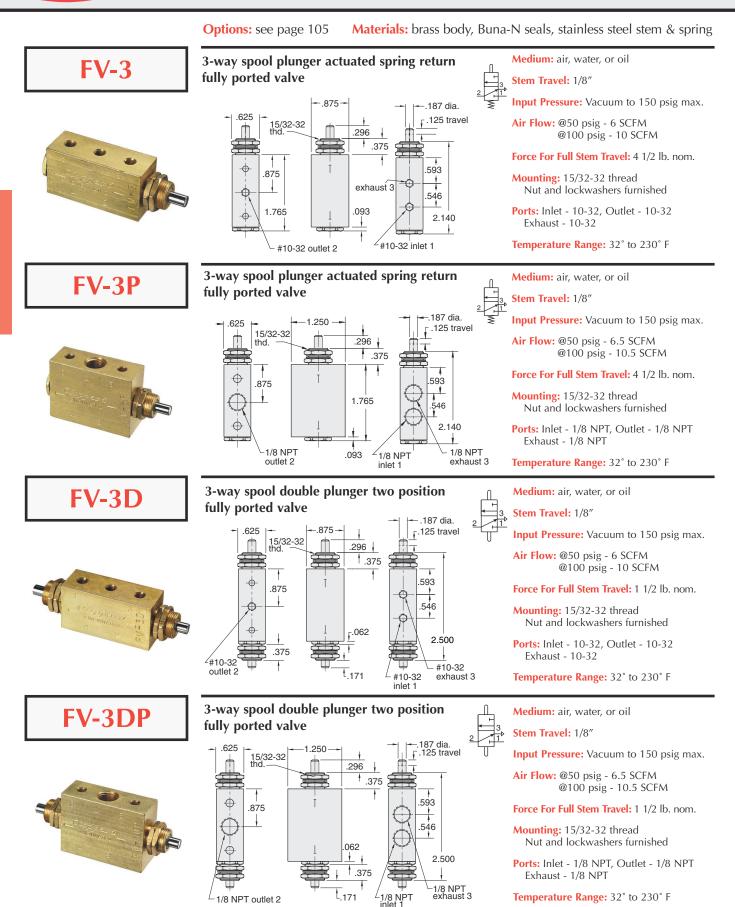


4-WAY STEM VALVES





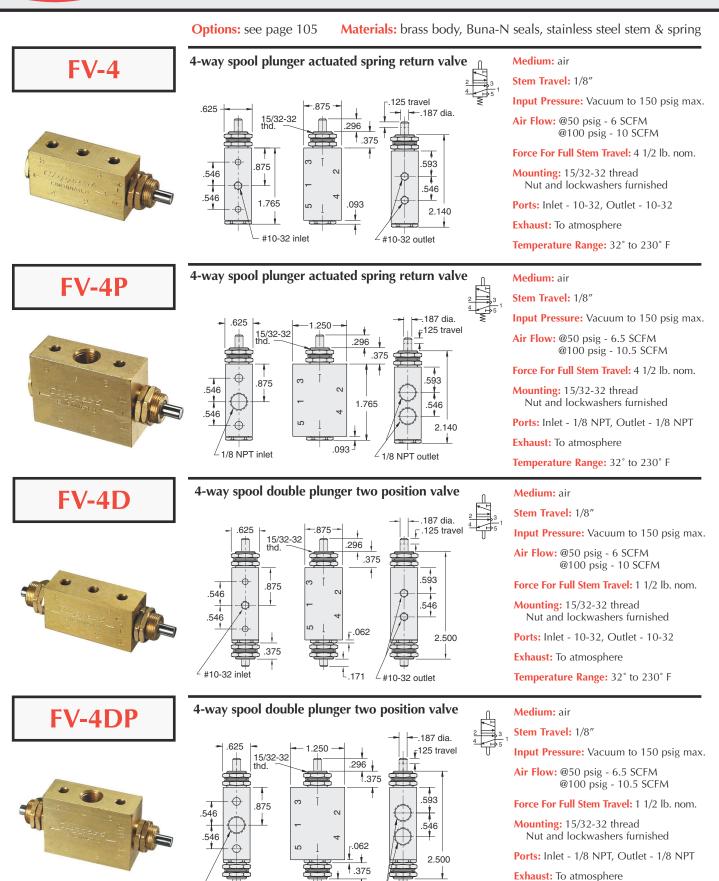
FV SERIES 3-WAY VALVE





FV SERIES 4-WAY VALVE

1/8 NPT inlet



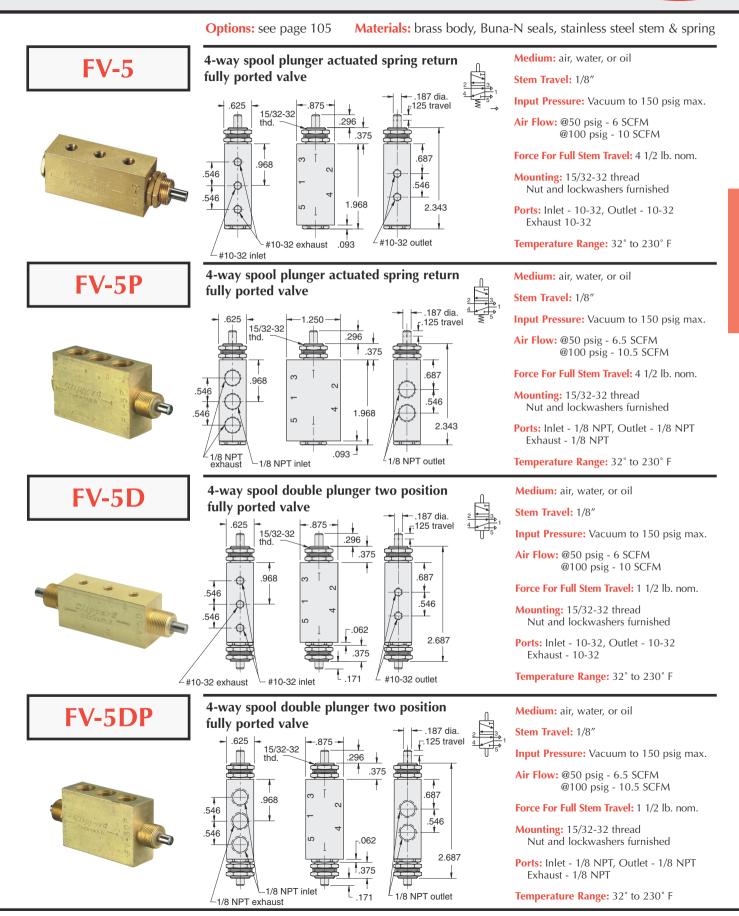
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1/8 NPT outlet

Temperature Range: 32° to 230° F

FV SERIES 4-WAY FULLY PORTED VALVE





Clippard Instrument Laboratory, Inc. (513) 521-4261 www.clippard.com