

## Hand Expansion Valves

“Built Stronger to Last Longer”  
 Sizes: 6mm (1/4”) to 51mm (2”)

**Suitable For: Ammonia, Fluorocarbons, Nitrogen, and Carbon Dioxide**

### Features

- ASTM 352 LCB Cast Steel Body (1/4” thru 2”)
- Maximum Safe Working Pressure 400 PSIG
- Fluid Temperature Range: -50°F to +300°F
- 300 Series Stainless Steel Stem
- 300 Series Stainless Packing Nut
- Optional Stainless Steel Bonnet Bolts
- Reliable Back Seating
- Bolted Bonnets
- 25% Carbon Filled PTFE Seat (1/4” thru 2”)
- Available Connections:
  - 1/4” thru 1-1/2”, Screwed End
  - 1/4” thru 2”, Socket Weld
  - 1-1/4” thru 2”, Butt Weld
- Globe Body - Tee and Angle Styles
- Extended Bonnets For Thicker Insulation Optional

### Description

This complete line of all steel bodied valves with bolt-on bonnets are designed and built to maintain reliability both in their seating and back seating functions. This entire line is supplied with stainless steel stems and backseating capability. Corrosion resistant, high-grade stainless steel trim is available upon request. A unique carbon filled PTFE seat is standard throughout the line, lending durability to the seating surface. In addition, a dual O-Ring stem packing design in combination with a stem packing seal is standard on all valves from 1/4” thru 2”. This innovative design seals both the valve stem and bonnet bore with independent O-Rings, which are captured in a carbon PTFE carrier. The addition of the packing provides for backup sealing capability.

A packing nut design with either 1/4” or 5/16” flats provide a generous wrench engagement area, with little likelihood of “rounding” the flat. With the O-Ring cartridge used in all valve bonnets, there will typically be no need to loosen the packing nut when opening or closing a valve.

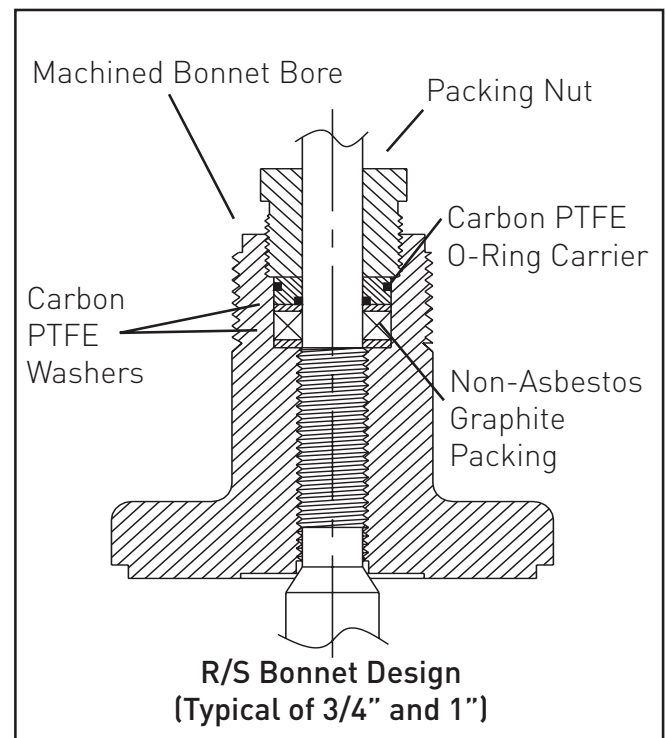
Bulletin No. 82-00B



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Installation, Service and Parts Information

**Note: The New Hand Expansion Valve plugs and Bonnet Assemblies will not retrofit to either a prior design hand expansion valve body or to a prior design stop valve.**



In most cases, stem resistance will be negligible, allowing the valve to be easily repositioned.

The extended bonnet is available for globe style valves in the Tee body configuration and in angle style bodies. Bonnet bolts, extension boss clamp, packing nut, and stem are all of 300 series corrosion resistant stainless steels.