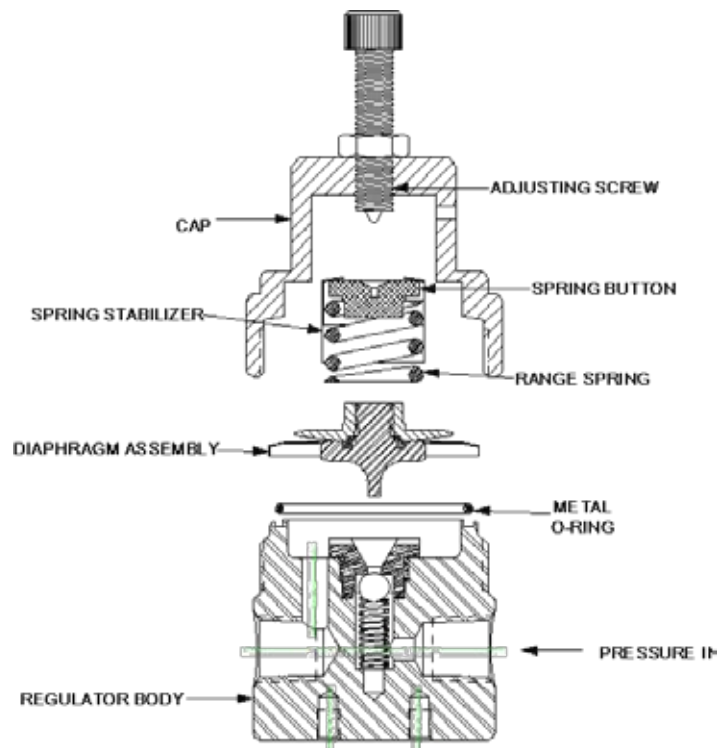


## PR-9 Series Pressure Regulator Diaphragm Replacement Instructions

**Make sure you thoroughly understand these directions before proceeding**  
**MAKE SURE THE REGULATOR IS DISCONNECTED FROM AIR SOURCE**  
**MAKE SURE ANY RESIDUAL PRESSURE IS BLED OFF FROM REGULATOR.**

### Instructions

1. Completely read these instructions before performing any of the operations.
2. Make sure the regulator is disconnected from pressure source; make sure any residual pressure is bled off from the regulator. **FAILURE TO DO THIS WILL RESULT IN SERIOUS PERSONAL INJURY. DO NOT PROCEED UNTIL PRESSURE HAS BEEN REMOVED AND/OR TERMINATED**
3. Securely clamp the regulator over the flats in a vise.
4. Loosen lock nut on adjusting screw.
5. Use a 1/4" Allen wrench and turn the adjustment knob counterclockwise, as looking from the top of the regulator, until it will turn no further.
6. Remove the cap and adjusting screw as a unit. The range spring will be securely held inside the cap if this unit is equipped with a spring stabilizer. Earlier models do not have a stabilizer, in which case the range spring will be sitting on top of the diaphragm.
7. Remove the diaphragm assembly.
8. Carefully remove the metal o-ring from the groove on the nose of the regulator.
9. Clean groove with compressed air.
10. Place new metal o-ring in the groove.
11. Place new diaphragm assembly onto regulator cavity.
12. Place range spring and spring button onto diaphragm assembly unless it was equipped with a stabilizer and is inside the cap.
13. Place a small amount of Krytox or other lubricant on the outer threads of the body if the regulator body is steel. Put the cap over the regulator and engage threads by hand. Tighten hand tight.
14. Finish tightening cap to 80 lbf·ft (81 N·m).
15. Attach a pressure gauge and quarter-turn valve to the outlet port. Leave the valve in the open position.
16. Use a 1/4" Allen wrench and slowly turn adjusting screw clockwise. When there is evidence of flow at the quarter-turn valve close it.
17. Squirt a leak detecting fluid around the base of the cap where it meets the body. Agitate the fluid to form foam and apply around the 0.125 (3.1mm) leak detection port in the bonnet of the cap.
18. Slowly continue turning the adjusting screw while watching and listening for any leaks. It may be necessary to re-apply the liquid. If leaks are noticed, immediately back off adjusting screw and repair unit as needed.
19. If no leaks are noticed, adjust control pressure to a value that is 110% of the maximum rating for this regulator. Reapply the leak detecting fluid as needed.



20. Note the pressure reading on the gauge. The PR-9 utilizes a metal to metal seat and therefore does not afford a bubble tight shut-off. However, the leak rate across the seat should not exceed 300 SCCM. Determine this by measuring the flow from the outlet that is required to stabilize the outlet pressure. Leak rates in excess of 300 SCCM indicate that the ball and seat should be removed and cleaned or replaced.
21. Relieve the outlet pressure while backing off on the adjusting screw. Continue backing off on adjustment screw until it is all the way out and will turn no further.
22. The regulator is now ready for service.

---

## ***GO Regulator***

405 Centura Court • PO Box 4866 • Spartanburg, SC 29303

Phone (864) 574-7966 • Fax (864) 574-5608

[www.goreg.com](http://www.goreg.com) • [sales@goreg.com](mailto:sales@goreg.com)