

DeltaPValve[®] Series Sample Spec

Section 15000; Modulating Control Valves

- A. All modulating control valves shall be pressure independent and provided by the same manufacturer. The basis of design is the DeltaPValve[®] as manufactured by:
- Flow Control Industries, Inc. P: (866) 454-1288
PO Box 848 F: (425) 486-5672
Woodinville, WA 98072 www.flowcontrol.com
- B. All modulating control valves shall be industrial quality and must be fully field-rebuildable. Valves shall be designed to last 100,000+ on/off cycles.
- C. Each control valve shall be individually factory flow tested and calibrated to deviate by no more than $\pm 5\%$ through the entire operating differential pressure range without the use of additional electronics. All valves shall be tested on a test stand calibrated and verified with traceability to NIST standards.
- D. The control valve operating differential pressure range shall be 5 to 70 or 10-90 PSID [0.34 to 4.83 or 0.69- to 6.2 bar], and shall be equal to or greater than the associated pump's design head pressure.
- E. Each control valve shall have a calibrated performance tag listing the measured flow rate in rotation increments of 10 degrees through full stroke. Multi-turn actuators are not acceptable.
- F. Control valves shall be factory set not-to-exceed the coil design flow rate.
- G. Balancing labor, balancing valves and flow limiting devices are not required.
- H. Valve bodies 2" [50mm] and smaller shall be brass. Valve bodies 3" [80mm] and larger shall be ductile iron. Internal control surfaces and pressure regulator components shall be brass, stainless steel, carbon steel, EPDM or Teflon[®].
- I. All control valves shall have three (3) factory-installed Pressure/Temperature ports to allow factory and field verification of flow and proper operation. These ports shall be located at the inlet, intermediate, and outlet locations of the valve. The intermediate port must be located between the control surface and pressure regulator.
- J. Control valve flow characteristics shall be field-modifiable, and may be modified in-line.
- K. Control valves shall be warranted by the manufacturer for a full 10 years from the date of purchase. The warranty provided by the actuator manufacturer shall apply to actuators.
- L. The control valve manufacturer guarantees that the heating and cooling coils will meet or exceed design delta T performance at all load conditions as projected by an AHRI certified coil program at time of commissioning, or the valves are free.