APCO FULL FLOW RUBBER FLAPPER FOOT VALVES (FRF) SUGGESTED SPECIFICATION



APPLICATION DATA 100.01-8

December 16, 2015 Supersedes Specification in Bulletin 1400; July, 2011

Full Flow Rubber Flapper Foot Valves shall be APCO model FRF as manufactured by DeZURIK, Inc.

Rubber Flapper Foot Valve shall be heavily constructed with integral flanges.

<u>Body</u> to be ASTM A536 ductile iron for sizes 3" to 12" and ASTM A126 Class B cast iron for sizes 14" and larger.

<u>Body Seat</u> shall be on a 45 degree angle to the centerline of the pipe, permitting vertical (flow up) installation.

<u>Rubber Flapper</u> shall have a steel disc encapsulated with rubber. The flapper shall be captured between the body and valve cover to permit the disc to flex open and closed. An integral "O-ring" shall be molded onto the face of the rubber flapper for positive sealing.

Hinge Section of the rubber flapper shall be designed to accelerate closing due to an elastic spring effect. Nylon shall be integrally molded in the rubber to form a flexible joint giving the flapper a high cycle life.

Dual Durometer design shall be used on the rubber flapper for sizes 3"- 12". The face of the rubber flapper shall have softer durometer rubber to assure tight closing at lower pressures. The back side and the hinge portions of the flapper are to have higher durometer rubber to accelerate closing.

Valve to be tested by the manufacturer as a complete assembly per AWWA C508.

<u>Valve seating surface</u> shall be on a 45° angle requiring the flapper to travel only 35° from closed to full open position for minimum head loss and non-slam closure.

Two Year Warranty shall be provided for all valves.