Apollo Valves

94A / 95A SERIES

FORGED BRASS BALL VALVES

INSTALLATION, OPERATION, & MAINTENANCE GUIDE

INSTALLATION

The Apollo International Ball valves are bi-directional. They may be installed in vertical or horizontal pipe runs without regard to flow direction and without regard to stem orientation.

Note: Valves must be installed in piping systems that comply with the applicable portions the ASME B31 standards. Special considerations must be taken with respect to pipe line expansions and contractions and the media expansion and contractions within the piping system.

Threaded End Valves

Mating pipe connections should be accurately threaded, clean and free of foreign material or metal shavings. Two to four wraps of PTFE pipe tape (or pipe dope, but not both) should be applied to the male threads. Two wrenches must be used when mating up pipe joints to these valves. Apply one flat-faced wrench on the valve hex closest to the pipe joint being tightened and use a pipe wrench on the pipe to prevent transmitting torque through the valve body joint. Typical wrench make-up is 1-1/2 turns after installing the pipe hand-tight. Do not overtighten the valve onto the pipe, as this can damage or distort the valve. Do not reverse-rotate after tightening as this can damage the body/retainer seal.

Solder End (Sweat In) Valves

Caution: Use only solders with melt points below 500°F.
Caution: Valves should only be soldered in the fully open position.

An Apollo soldering video with helpful suggestions can be viewed here: https://www.youtube.com/watch?v=91P3WouFLnY

During soldering, the mid-portion of the valve body should not exceed 300°F. This can be monitored using Tempilstik® or an infra-red temperature sensor. Depending on the fuel selected and the orientation of the installation it may be necessary to wrap the valve body with wet rags or employ other heat absorbing techniques. Select a torch tip size appropriate for the tube size being soldered. The flame must be directed away from the valve body, concentrated on the solder cup. The cup should be heated evenly. Allow heated joints to cool naturally. Quenching with water will cause unnecessary stress on the joint. After soldering, it may be necessary to adjust the stem packing due to temperatures involved. See Regular Maintenance instructions.

Fuel	Flame temperature in Air	
Propane	3596°F	1980°C
Natural Gas	3560°F	1960°C
MAPP Gas	3670°F	2021°C
Acetylene	4622°F	2550°C
Acetylene w/ O2	5612°F	3100°C

Warning!: *Excessive heat input will damage the body seal resulting in leaks at the valve body joint. In extreme cases, seats and stem packing may also be damaged.*

OPERATION

The valve handle is marked showing proper rotation direction for “ON” and “OFF” positions. Rotation is clockwise for “OFF” (closed) and counterclockwise for “ON” (open).

MAINTENANCE

Regular Maintenance

Under normal conditions, scheduled maintenance should not be required. In the event of a stem packing leak, normal stem packing wear can be compensated for by tightening the packing gland nut. There are two nuts on the stem. The top nut retains the lever. The packing nut is the lower nut on the stem. (Wrench part number H380700 is available to ease this operation.) The top nut and the lever may need to be removed for easy access to the packing nut. Tighten the packing nut clockwise in 1/8 turn increments until observed leakage stops. Reinstall the handle and handle nut or retighten the handle nut as appropriate.

Major Repair

Aside from replacement levers, parts are not available for these series of valves. In the case of valve through-leakage, body joint leaks, or stem leaks that cannot be adjusted out, the valve must be replaced. For more information, visit our website: www.apolloflowcontrols.com.

FOR NON-LEAD FREE VALVES: It is illegal to use this product in the United States for potable water services (water intended for human consumption).

FOR LEAD FREE VALVES: This product complies with U.S. Safe Drinking Water Act (SDWA). Suitable for potable water applications intended for human consumption.