

Ceramic Ball

The Cam-Tite ceramic ball is an advanced engineering oxide ceramic, magnesia-partially stabilized zirconia (Mg-PSZ) which has extremely high strength and fracture toughness.

Features:

- Corrosion resistant*
- Impervious to gases
- Impact resistant
- Withstands high temperature
- High thermal shock resistance
- Impervious to build-up on the ball
- Excellent choice where ferric chloride build-up is a problem



The ceramic ball can be used with any combination of the available stem and body materials for the Cam-Tite Ball Valve.

Caged Bonnet Option

The patented “Caged Bonnet” was specifically designed to meet the needs of those hazardous applications where a quick and easy turnaround during scheduled maintenance is required. The uniquely designed caged bonnet assembly allows the repair and replacement of all internal components simply by removing the bonnet bolts and lifting off the bonnet assembly.

The caged device is available on all bonnet configurations (standard, extended, severe service and bellows) in both nuclear and commercial configurations. The device utilizes a captured (caged) metal saddle that holds the ball, seat rings, seats, grounding springs and cover gasket (nuclear model only) in place. This device allows the removal and replacement of all components utilizing one subassembly.



*Caged bonnet shown on a standard bonnet
U.S. Patent 5, 152,502*

*Consult factory for specific applications.

Bonnet Options



Extended Bonnet

Cam-Tite Ball Valves can be furnished with extended bonnets for higher temperature or semi-cryogenic services. The extended bonnet allows the valve to be wrapped with insulation without interference from the hand lever and is interchangeable with the standard bonnet. This arrangement raises the stem seal further away from the flowing fluid, thereby reducing the effects of the temperature extremes. The stem is supported to minimize the possibility of galling or stem leakage. The extended bonnet permits the packing nut to extend beyond the valve insulation, thereby permitting stem seal adjustment without disturbing the insulation.



Severe Service Bonnet

The severe service bonnet option was specifically designed to meet the needs of those difficult applications where a true stuffing box is preferred. This design utilizes the extended bonnet as the primary component maintaining the conventional bottom stem seal, augmented by stacked Chevron V-ring packing at the top. The addition of an optional lantern ring and bonnet tap provides for the insertion of compatible lubricants into the packing, inert gas padding, or leak detection. Available in ANSI Class 150 through 600, the severe service bonnet option brings a modular approach to the stem sealing system of the Cam-Tite Ball Valve.



Bellows Stem Seal

Cam-Tite Ball Valves are also available with a bellows stem seal. This stem seal device, manufactured by Kerotest Manufacturing Corp., provides a hermetic stem seal via a unique quarter-turn bellows design.

The interface design for the bellows stem seal to the Cam-Tite Ball Valve was a joint effort between Engineered Valves and Kerotest in which the bellows assembly becomes integral to the bonnet of the valve. This allows for disassembly should replacement of internal components be required. The device can also be easily actuated. Bellows stem seals are available in ANSI Class 150 and 300 in a variety of materials.