



### ANSI LITE SEAL SUPPORT SYSTEMS

Liquid-lubricated dual mechanical seals require an external source of clean, cool lubricating fluid. The ANSI Lite buffer/barrier fluid reservoir systems provide this ideal sealing environment, enabling longer operational life for dual seals.

### STANDARD CONSTRUCTION

[API 682 Piping Plan 52 / ANSI 7352 Unpressurized Buffer Fluid](#)

[API 682 Piping Plan 53A / ANSI 7353A Pressurized Barrier Fluid](#)

- Closed loop system allows monitoring of inboard seal
- Tank with aluminum tubular level gauge
- 1/2" NPT bronze vent & drain ball valves
- 2 1/2" dial 316L stainless steel pressure gauge (0-200 psig)
- 304L stainless steel orifice union ([Plan 52 arrangements](#))



*Pictured: WCS*

### THE WCS2 (WATER CONSERVATION SYSTEM)

Flex-A-Seal WCS2 (Water Conservation System) arrangement utilizes the pressure available from the plant water line to pressurize the barrier fluid inside the reservoir. A bronze sight flow indicator provides a visual indication when either inboard or outboard seal leakage has occurred. The brass water supply pressure regulator with pressure gauge (0-160 psig) and brass check valve control and maintain pressure during normal operation and in the event of water line interruption while protecting the plant's water supply from process contamination. Also supplied with a brass air vent with a float and check valve and a brass 3-way ball valve.

### SPECIFICATIONS

- Capacity: 3 / 4 gallons (11.4 /15.1 liters)
- Tank material: 304L stainless steel ([ANSI Lite](#)),
- Tank material: 304L stainless steel with brass and bronze fittings ([WCS](#))
- Maximum working pressure: 219 psig at -20° to 100°F (15.4 kg/cm<sup>2</sup> at -29° to 38°C)



### ANSI PLUS SEAL SUPPORT SYSTEMS

The ANSI Plus system is designed for operation with API 682 Piping Plans 52 & 53A (ANSI 7352 & 7353A). The buffer/barrier fluid can be circulated between seal and reservoir with a seal internal circulating device (i.e. a pumping ring), or by relying on the thermosiphon effect. Seal leakage can be monitored with the armored weld-pad sight level gauge, indicating whether the closed-loop system is losing or gaining fluid. The reservoirs come standard with 304L stainless steel construction, vent, and drain valves. The ANSI Plus range of reservoirs have a MAWP 350 psig at -20 to 200 °F and are hydrostatically tested at 525 psig for maximum system safety in a broad range of ANSI/ASME B73.1 sealing applications.



### STANDARD CONSTRUCTION

- API Plan 52 or Plan 53A arrangements
- Stainless steel orifice union on API Plan 52 arrangements
- Reservoirs supplied with vent and drain valves
- Multi-port block and bleed valve for easy instrumentation maintenance

### SPECIFICATIONS

- Capacity: 3 / 5 gallons (11.4 / 18.9 liters)
- Tank material: 304L stainless steel
- Maximum working pressure: 350 psig at -20° to 200°F (24.6 kg/cm<sup>2</sup> at -29° to 93°C)

### ADDITIONAL OPTIONS

- 4<sup>1</sup>/<sub>2</sub>" 0-400 psig pressure gauge
- Pressure switch
- Transducers
- Level switch
- 1/2" cooling coils
- Powder-coated stand
- 316L and Carbon Steel tank construction also available