

## SAE Sight Glass Windows

- SAE J514 Straight Thread O-Ring Boss (ORB)- threaded sight glasses
- Exhibits no outgassing or contamination of most systems\*
- Long working life
- No maintenance required
- Tested to high safety factor to insure safety & reliability
- Exceeds all industry and MIL standards
- Engineered, Manufactured and tested at the Rayotek U.S. facility

SAE J514 sight windows are designed for use with a soft copper O-Ring (no flare). Rayotek SAE J514 fittings are used for hydraulics, machine vision systems and live observation in a variety of industries including: aviation, marine, power generation and deep-sea applications. The window material is fused or bonded to a corrosion resistant metal housing, forming a hermetically sealed single-piece sight glass. The advantage of this construction is a simple, clean, easy to install system that works excellent in high-pressure applications.

Rayotek SAE Sight Windows are exceptionally robust in extreme thermal, chemical, mechanical and pressure environments. They also perform exceptionally in ultra-high vacuum, high purity, cleanroom rated systems. Applications:

- High pressure tanks liquid level view ports
- Hydraulic sight windows for aviation, nautical, submarine and vehicles
- Shallow to full ocean depth seawater applications
- Geothermal wells
- Biofuel plants
- Oil & gas exploration & production
- Viewports for inspection and observation

Rayotek sight windows can transmit a broad range of wavelengths and are capable of operating under extreme temperature, pressure, chemical and mechanical conditions. The selection of window and housing materials will determine capabilities.

## Footnotes:

† Alternative materials are available upon request including, but not limited to:

Housing: duplex, aluminum, Monel, Inconel, plastics and alumina Window: borosilicate (Pyrex®), diamond, Zinc Selenide, fused silica, germanium, MgF2, silicon and YAG

\* For systems where purity & cleanliness are critical, Rayotek recommends testing the Sight Window for specific chemical compatibility.

Call for information.



\*\* Typical leak rate is 10-8 bar-CC/sec. for air at 22C. Actual leak rate TBD based on window size and maximum operating temperature. Call for information.