

POWEROIL SAFEFUID SG 46 FIRE RESISTANT HYDRAULIC FLUID (HFC TYPE)

POWEROIL SAFEFUID SG 46 is an HFC type Water Glycol Fire resistant Hydraulic oil, designed to provide excellent protection against rust and wear. It is biodegradable and free from Nitrite.

PERFORMANCE STANDARDS:

IS: 10532 (Part III) – 1983 (Reaffirmed 2014)

IS: 7895- 1975 (Reaffirmed 2013)

| CHARACTERISTICS | POWEROIL SAFEFUID SG 46 |
|----------------------------------|-------------------------|
| Appearance/color | Clear Red Fluid |
| Density @ 29.5C, gm/cc | 1.071 |
| Pour point,C | -42 |
| Kin, Viscosity @ 40 °C, cSt | 45 |
| Kin. Viscosity @ 100 °C, cSt | 8.1 |
| Viscosity Index | 155 |
| Cu Corrosion at 100°C | 1a |
| pH | 9.5 |
| Rust Test 24hrs, Distilled water | Pass |
| Foam Tendency | |
| Seq I | 20/nil |
| Seq I | 10/nil |
| Seq I | 20/nil |

The above properties are typical values and do not constitute specification of the product

APPLICATION:

- Used in both Mobile and stationary Hydraulic systems in Steel Industry of hot rolling application.
- Recommended for use in Die casting machines and in Mining equipments
- Used in Vane, Gear or Piston type pumps operating at pressure less than 3000psi

Since Poweroil SafeFluid SG 46 is water based, care should be taken to ensure that the hydraulic system is also designed for using Water Glycol based products. Operating temperature also should be below 60 °C Water content should be checked at regular intervals to maintain the correct viscosity of the oil in use.

Generally glycol based products may react with the paints, Vinyl or epoxy resin-based types are suitable for this fluid. Thorough draining and flushing procedure should be followed while converting from other fluids to water glycol-based solutions. Care also needs to be taken to ensure compatibility with filter. Generally, paper filters may not be compatible for water glycol products.

Poweroil SafeFluid SG 46 is compatible with Nitrile, Butyl, silicone and other synthetic seal materials

PERFORMANCE BENEFITS:

- Good Wear Protection to moving parts
- Low Temperature Fluidity
- Excellent fire resistance
- Good Corrosion Protection
- Extended Pump durability
- Free of Nitrite and biodegradable - Environment and operator friendly

CERTIFICATION:

From Indian Institute of Petroleum (IIP) Deharadhun (Rept. No TCD/378/2018 dtd May 2019) - "Power Safe fluid SG 46" passed all the fire resistant tests as prescribed in IS:7895 – 1975 and is suitable for use as a fire resistant Hydraulic fluid".

MAINTENANCE PRACTICES :

During service, water can be lost by evaporation and this must be periodically replaced to maintain the correct viscosity and optimum fire resistance. Water content can be determined directly by Laboratory analysis. Only condensate, distilled or de-ionised water should be used for top-up. The required quantity of water should be slowly added to the reservoir with the system running to ensure thorough mixing.