## TECHNICAL DATA SHEET



# **No-Tox BioFR Hydraulic 46**

No-Tox BioFR Hydraulic 46 is an HFD-U type fire resistant hydraulic fluid. It utilizes synthetic polyol ester type fire resistant hydraulic fluid designed for severe operating conditions in hydraulic applications where petroleum and other synthetic hydraulic fluids create a potentially unsafe environment and where a fire hazard exists. No-Tox BioFR Hydraulic 46 maintains its fire-resistant characteristics, providing extended safe service economically. No-Tox BioFR Hydraulic 46 is an NSF H1 registered and ISO 21469 certified food grade lubricant, and also readily biodegradable. Formulated to work in high pressure hydraulic systems up to 7500 psi. The fluids have naturally high viscosity index and are shear stable, a significant advantage in modern sensitive equipment. It is designed for superior system reliability, reducing varnish and sludge formation in valves, pipes and reservoirs. No-Tox BioFR Hydraulic 46 falls into the HFD-U Symbol (Fire resistant fluid other than phosphate ester) under ISO 6743-4 Standard. No-Tox BioFR Hydraulic 46 is FM Approved fire-resistant fluid. The FM approval identification is 0003062285.



Nonfood Compounds H1 Registered, ISO 21469 Certified

### **APPLICATIONS**

Recommended for sensitive hydraulic systems:

- · Where a food grade hydraulic fluid is required
- Where a fire-resistant hydraulic fluid is required
- Where a biodegradable hydraulic fluid is required





## **PRODUCT FEATURES**

- NSF H1 registered and ISO 21469 certified
- FM approved fire-resistant fluid. The FM approval identification is 0003062285
- · Halal, Kosher and Pareve
- · High Viscosity Index
- Biodegradable
- Compatibility
- Oxidation stability

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### **BENEFITS**

- Use where incidental food contact may occur
- · Protects life and property against fires, resisting the hazards of accidental ignition
- Use where Halal or Kosher certified lubricants are required
- · Maintains optimal viscosity through a wide range of temperatures for easy start up and maximum protection during normal operating temperatures

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## **BENEFITS** (continued)

- · Reduces environmental impact of leakage and spills
- A selection of balanced fluids and additives assures the highest degree of compatibility to component materials used in hydraulic systems minimizing failures
- · Resistant to the formation of deposits extending safe service life of fire-resistant properties

Typical Physical Properties		
Property	Test Method	
ISO Viscosity Grade	ISO 3448	46
Density@15°C, g/cm3	ASTM D4052	0.9206
Viscosity @ 40°C, cSt	ASTM D445	49
Viscosity @ 100°C, cSt	ASTM D445	9.6
Viscosity Index	ASTM D2270	188
Flash Point, °C (°F)	ASTM D92	288 (550)
Fire Point, °C (°F)	ASTM D92	362 (684)
Auto-Ignition Point, °C (°F)	ASTM E659	430 (806)
Pour Point, °C (°F)	ASTM D97	-51 (-60)
Biodegradability in 28 days	ASTM D5864	>70
4-Ball Wear Scar Diameter, mm	ASTM D4172	0.4
Copper Strip Corrosion	ASTM D130	1A