Lube 776*

Lube 776* lubricant effectively reduces torque, drag and the potential for differential sticking by reducing the coefficient of friction in low-solids, non-dispersed, water-base drilling fluids and non-aqueous based fluids.

In one field application, after an initial addition of Lube 776 lubricant at 2% v/v rotary torque readings were reduced significantly by as much as 33%. Lube 776 lubricant also shows low foaming, greasing and/or emulsion-forming potential.

Typical Physical Properties

Physical appearance .............................................................................................................................................................................Light, yellowish liquid

Specific gravity .....................................................................................................................................................................................0.95 – 1.00 (20° C/68° F)

Flash point ........................................................................................................................................................................................................>100° C (>212° F)

pH .............................................................................................................................................................................................................5.0 – 7.0 (50 g/L water)

Primary subhead

Lube 776 lubricant is designed for situations where torque, drag and/or the potential for differential sticking are likely to occur, such as when drilling highly deviated or high-differential-pressure wells. Lube 776 additive is an effective lubricant in water-base drilling and reservoir drill-in fluids.

Normal concentrations of Lube 776 lubricant range from 1 to 3 % by volume, or 10 to 30 kg/m³ (3.5 to 10.5 lb/bbl), depending on the fluid density, desired reduction in coefficient of friction, and the mud system.

After the initial treatment, periodic treatments should be made to maintain the desired concentration. Higher concentrations may be needed for pills and special applications. Treatment levels and product usage will depend on the rate of penetration, solids-control equipment and dilution rates.

Pilot testing is recommended to all additions especially applications in excess of 149° C (300° F).
Advantages

• Highly effective downhole lubricant for reducing torque and drag
• Reduces the potential for, and the severity of differential sticking
• Compatible with low-solids, non-dispersed fluids and reservoir drill-in fluids
• Low greasing and/or emulsion-forming potential
• Non-foaming tendency

Limitations

• May “grease” in mud systems with soluble hardness greater than 600 mg/L and higher pH levels.
• Use in non aqueous-based fluids designed for discharge may cause the fluid to fail bioassay testing.

Toxicity and Handling

Bioassay information is available upon request.

Handle as an industrial chemical, wearing protective equipment and observing the precautions as described in the Material Safety Data Sheet (MSDS).

Packaging and Storage

Lube 776 lubricant is packaged in standard pack unit: 200 L (52.8 gal) drums or in bulk; other pack units on request.

Store in a dry, well ventilated area. Keep container closed. Keep away from heat, sparks and flames, and store away from incompatibles. Follow safe warehousing practices regarding palletizing, banding, shrink-wrapping and/or stacking.