



TECHNICAL DATA SHEET (TDS)

Basekim Organophilic Lignite for Drilling

Product: Organophilic Lignite

Type: Oil & Synthetic Drilling Fluid Additive

Brand: Basekim

1. Product Overview

Organophilic lignite is a **chemically modified lignite coal** designed to be **oil-dispersible** and used primarily in **oil-based and synthetic drilling fluids** for **filtration control, fluid loss reduction, stabilizing fluid systems, and emulsion support**.

2. Key Functions

- Controls high-temperature, high-pressure (HTHP) filtrate loss
- Stabilizes emulsions in drilling fluids
- Improves rheology and fluid performance
- Compatible with other OBM/SBM additives
- Alternative to asphaltic or gilsonite additives

3. Typical Specifications

Property	Typical Value
Appearance	Dark brown to black powder
Bulk Density	0.7–0.9 g/cm ³ (approx.)
Particle Size	Typical: 20–100 µm
Moisture Content	≤ 10%
Ash Content	≤ 15%
Solubility	Dispersible in oil; insoluble in water
Thermal Stability	Stable > 400 °F / 205 °C
Treatment	Amine-treated hydrophobic surface



4. Recommended Dosage

- **Filtration control:** 1–10 lb/bbl (2.85–28.5 kg/m³)
- **Emulsion stability:** 2–15 lb/bbl (5.7–42.75 kg/m³)

Final dosage depends on mud type, temperature, and drilling conditions.

5. Applications

- All oil-based drilling fluids
- Synthetic base mud systems
- High-temperature drilling environments
- Wells requiring enhanced fluid loss control

6. Compatibility

- Diesel, mineral oil, synthetic base fluids
- Works well with other LCMs, viscosifiers, and filtration control agents

7. Performance Benefits

- Robust filtration control at elevated temperatures
- Improves mud stability & rheological properties
- Enhances emulsion consistency
- Reduces drilling fluid loss into formation

8. Packaging

- 25 kg multi-wall bags (standard)
- 50 lb bags
- Palletized and container-ready for export



9. Storage & Handling

- Store in dry conditions
- Protect from moisture and direct humidity
- Shelf life: 18–24 months in proper storage

10. Quality Assurance

- Batch testing for particle size and filtrate control performance
- Consistent processing ensures reliable product quality