OMNIFLOW invert emulsion drill-in fluid

Safely drill into reservoirs with highly reactive clays

OMNIFLOW™ invert emulsion drill-in fluid (DIF) from Baker Hughes is designed for drill-in applications in reservoirs that contain shale which may prove problematic if drilled with a water-based mud (WBM). Invert emulsions may also be required if the tortuosity and high friction factors are a problem as they produce fluids with the lowest coefficients of friction.

Formations sensitive to any fluid or particle invasion, such as depleted or low formation pressure reservoirs, should also be considered as good candidates for OMNIFLOW DIF.

OMNIFLOW DIF is designed to mitigate shale instability during the completion phase, reduce completion costs, and improve production life, especially in gravel-pack applications. This system is best used when massive or interbedded shale threatens a gravel-pack operation. The shales are stabilized during the drill-in phase and after displacement to brine, thus maintaining wellbore stability until the reservoir is gravel packed.

When drilling challenging, complex reservoirs with drilling conditions beyond the scope of WBM, the OMNIFLOW DIF system can minimize drilling problems and maximize well productivity in openhole completions.

Applications

- Reservoirs with reactive clays
- Wells with temperatures in excess of to 300°F (149°C)

Benefits

- Thin, non-invasive filter cake
  - Non-damaging formulation
  - Low lift off pressure
- Stable fluid system
  - Stable at temperatures exceeding 300°F (149°C)
  - Relatively unaffected by contaminants
  - Long term stability when stored
- Simple formulation
  - Can be customized using any approved external phase oil
- Effective bridging with acid soluble materials
  - Easy cleanup using the **MICROWASH™ invert emulsion drill-in fluid filter cake breaker**