

## Short Description

Characterization & Formulation of drilling oils (including OBM, WBM & SBM) following the API methodology.

## Deliverable

Technical report including technical data, recommendations and conclusion.

## Benefits

In our Lab, the following equipment are using to carry out the characterization of the fluids:

- Viscosity and rheology
- Filtration LPLT & HPHT.
- Aging of drilling oil
- Density
- Emulsión stability
- Lubricity
- Retort analysis
- Sand content
- PH, methylene blue
- Chemical analysis



Viscosimeter

## Differential Features

Technology Lab has extensive equipment that allows comprehensive and accurate drilling oil characterization.

- Complex rheological studies on mud.
- Physicochemical characterization of fillers.
- Characterization of the drilling base oils used.
- Desing and formulation of specific drilling fluids.



Drilling Oil Lab



## Requirements

- Detailed definition of the tests and products to be studied.

## Limitations

- The tests will be carried out under the HSE norms of the different equipment.

## The Product in Depth

To carry out drilling fluids tests, our laboratory has the following equipments:

- Viscometer and rheometer
- LPLT & HPHT Filtration.
- Densimetre.
- Emulsion stability.
- Lubricity
- Sand content.
- Garrett gas-train.
- Retort analysis
- PH, methylene blue
- Chemical analysis

## Some Use Cases

- Comparison of the performance of different drilling fluids.
- Adjustment of properties in drilling fluids.

