



DRILLING FLUIDS EQUIPMENT

For over 30 years OFI Testing Equipment (OFITE) has provided instruments and reagents for testing drilling fluids, well cements, completion fluids, and wastewater. In addition to these product lines we also offer a range of instruments for core analysis. From our manufacturing facility in Houston, TX we provide customers all over the world with quality products and exceptional service.

Our drilling fluids product line includes innovative designs such as the Model 900 Viscometer, which showcases our ability to develop new technology to meet customer and industry demands. We also offer Retorts, Aging Cells, Roller Ovens, Mud Balances, Filter Presses, and all other instruments required to evaluate drilling fluid properties according to API Recommended Practice 13B-1 and 13B-2.

As an independent manufacturer and supplier, OFITE has one priority, our customers.

MudChecker ES

The MudChecker provides an innovative method for determining the oil, water, and solids content and salinity of any oil-based drilling fluid. This battery-powered solid state meter provides accurate, repeatable results in minutes without the safety concerns associated with traditional measurement methods. This enables more testing in less time with consistent and traceable digitally-recorded measurements.



Features

- Instant results, no internet connection required
- Accurate, repeatable results of oil, water, and solid content in drilling mud, as well as salinity, are provided in minutes
- Efficient process allows more frequent drilling mud analysis than with retort and titration testing: particularly useful when drilling through complex formations
- Safer measuring process than traditional retort and titration test methods
- Robust handheld enclosure
- Rechargeable battery operated
- Simple and clear display





Technical Specifications and Requirements

- #365-21-ES MudChecker ES v1.5

Specifications

- Dimensions: 9.8" × 3.4" × 1.3" (250 × 86 × 34 mm)
- Weight: 1 lb 1 oz (480 g)
- Voltage: 5 V Nominal
- Nominal Current: 500 mA
- Operating Temp: 41° - 104°F (5° - 40°C)

Accessories

- #365-20-1 Mounting Apparatus
- #365-20-2 Probe
- #365-20-4 DSX7 Dilution Solution

Data Acquisition Features

- Records a date and time stamp against each recorded mud measurement providing operators and users with traceable mud logs in the event of an audit

The screenshot displays the OFITE MudChecker software interface. At the top, it says "Welcome to OFITE MudChecker Solids Analysis" and "OFITE MudChecker". Below this are buttons for "New Measurement" and "Print Report". The interface is divided into several sections:

- Tests:** A table with columns for Serial #, Mud ID, Test Date, Density (lb/gal), HGS (SG), LGS (SG), Oil, Base Density (SG), Oil Cal?, KS?, Salinity, and Unit. A row for "011_031 (41 records)" is highlighted.
- Test Parameters:** Fields for Mud ID (Gen_1128), Mud Density (15.53), HGS Density (4.1), LGS Density (2.6), Base Fluid (Oil), Base Density (0.827), Oil Calibrated (checkbox), Date (7/19/2023), Known Salinity (checkbox), Value (20,000.00), and mg Cl- ions per liter of mud.
- Composition (corrected for Salt):** Fields for Oil % (53.08), Brine % (13.17), Solids % (33.75), Oil / Brine Ratio (80.1/19.9).
- Solids Analysis:** Fields for Mud Density (15.530), Avg SG Solids (3.7579), HGS (%) / (lb/bbl) (26.05 / 373.9), and LGS (%) / (lb/bbl) (7.70 / 70.0).
- Report Equivalent Results:** Fields for Oil % (53.08), Water % (12.40), Solids % (34.52), and Oil / Water Ratio (81.1/18.9).
- Water Phase Salinity:** Fields for WPS (Cl- ions mg / lt) (151,900), WPS (CaCl2 mg / lt) (237,754), WPS (CaCl2 ppm) (201,629), and WPS (CaCl2 wt %) (20.16).

At the bottom, it shows "Ready, connected to: 011_031" and "Current Device Time: 7/19/2023 2:13:30 PM".