

SPECIAL DRILLING EQUIPMENT
TO BE IN OPERATION BEFORE DRILLING WOLFCAMP AT 11800'

Martin-Decker Drilling Recorder

Record depth and drilling rate, weight (hook load), rotary RPM, rotary torque (or AMPS), stand pipe pressure, and pump SPM. Unit installed at driller's position.

Flow Sensor and Pump Stroke Counter

Dial indicator and control unit at driller's position. High and low volume alarms and recorder for percent flow installed in dog house.

Pit Volume Totalizer

Dial indicator at driller's position. Recorder with alarms for volume increase or decrease installed in dog house.

Degasser

Temperature Recorder

Swaco (Cameron) Adjustable Choke

Manifold along with a manually adjustable choke so that each choke can be isolated from flow stream. Turns in choke lines to be kept to a minimum. Lines to be tied down to prevent excessive movement under flow conditions. Control console to be in view of driller.

Double Deck Shaker

Installed for use from 11800' to 14700' to help reduce drill solids in the mud.

Drilling Head

To allow for drilling ahead while encountering a pressure kick.