

# Robert D. Hendrix

## Petroleum Geologist

### GEOLOGIST'S REPORT

#### DRILLING TIME AND SAMPLE LOG

COMPANY: **Murfin Drilling Company, Inc.**

LEASE: **Hatrup #1-3**

FIELD: **Widcut**

LOCATION: **2310TSL & 1000FWL**

SEC: **3** TWP: **24 S** RGE: **20 W**

COUNTY: **Harrison** STATE: **Kentucky**

CONTRACTOR: **Murfin Drilling Rig #21**

SPUD: **6/23/2012** COMP: **17/29/2012**

RTD: **4/9/10** LTD: **4/9/10**

MUD: **3200** TYPE: **MUD** CHEMICAL: **Chemical**

SAMPLES SAVED FROM: **3200 TO RTD**

DRILLING TIME KEPT FROM: **3200 TO RTD**

SAMPLES EXAMINED FROM: **3200 TO RTD**

GEOLOGICAL SUPERVISION FROM: **3200 TO RTD**

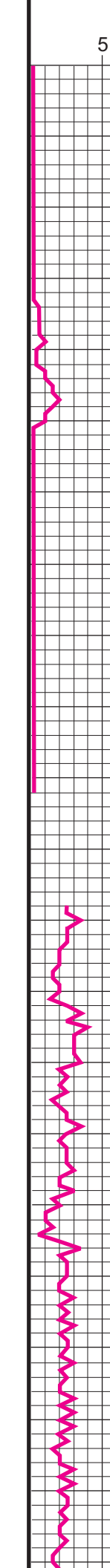
GEOLOGIST ON WELL: **Robert D. Hendrix**

FORMATION TOPS: **ELECTRIC LOG**

TOPEKA SH. **3509 (1398)** **3611 (1396)**

HENRIBER SH. **4066 (1287)** **3972 (1687)**

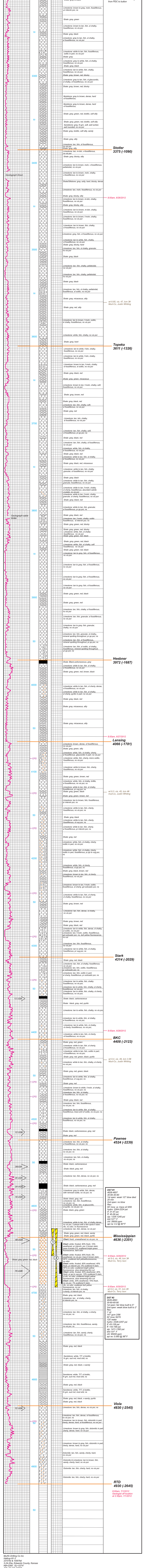
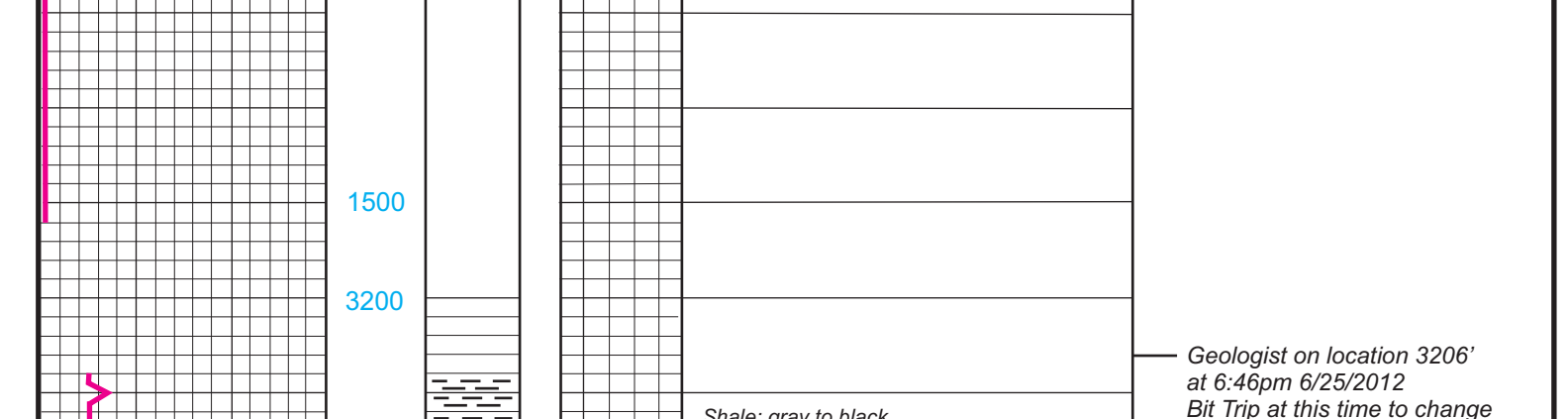
LANING SH. **4310 (2025)** **4314 (2029)**



REMARKS:

All sample shows were tested in this well, electric logs confirm no commercial zones of interest. This well was plugged and abandoned as a dry hole on 7/1/2012.

### LEGEND



**DST #1**  
4626-4657  
30-60-60-90  
1st open: weak 1/2" blow died 20 min  
2nd open: no blow  
Roc:  
60' mcw w- traces oil 595  
hydro: 2264-2224 psi  
If: 31-47 psi  
sp: 1411-1383 psi  
bht: 127' F  
chl: 2600 ppm  
api rw: 0.2 @ 90°F

**DST #2**  
4626-4693  
30-60-60-90  
1st open: fair blow built to 5"  
2nd open: weak blow built to 2"  
Roc:  
1' of  
147 gcm 2/98  
62' mcw 30/70  
120' water  
hydro: 2228-2255 psi  
If: 43-128 psi  
sp: 1433-1393 psi  
bht: 131' F  
chl: 95000 ppm  
api rw: 0.065 @ 98°F