



**Natural Gas • Crude Oil  
Exploration & Production**

**McCOY PETROLEUM CORPORATION**

**Wichita, Kansas**

Scale 1:240 (5"=100') Imperial  
Measured Depth Log

Well Name: MTPRC 'A' #1-27  
Location: Sec. 27 - T30S - R8W, Kiowa County, KS  
License Number: API #: 15-097-21773  
Spud Date: November 7, 2013  
Surface Coordinates: NE NE NE  
330' FNL & 330' FEL  
Bottom Hole Coordinates:  
Ground Elevation (ft): 2213' K.B. Elevation (ft): 2224'  
Logged Interval (ft): 3900' To: 5200' Total Depth (ft): 5200' RTD 5198' LTD  
Formation: Mississippian  
Type of Drilling Fluid: Chemical/Polymer/Gel

Region: Alford South  
Drilling Completed: November 18, 2013

Printed by MUD.LOG from WellSight Systems 1-800-447-1534 www.WellSight.com

#### OPERATOR

Company: McCoy Petroleum Corporation, KCC License #5003  
Address: 8080 E. Central Ave., Suite 300  
Wichita, KS 67206

#### GEOLOGIST

Name: Evan Stone  
Company: McCoy Petroleum Corporation  
Address: 8080 E. Central Ave., Suite 300  
Wichita, KS 67206

#### CASING & DEVIATION

Spud at 7:00 pm on 11/7/2013.

1st SURFACE CASING STRING: Reamed out 17-1/2" hole to 347'. Ran 5 joints of new 54.5# 13-3/8" surface casing. Tallied 224.39'. Landed at 238' KB. Strapped guide shoe and bottom 3 joints, then tacked collar on top joint. Cemented with 325 sks Common; 2% CC; 1/4# CF. Cement did circulate 3 bbl. Plug down at 1:15 pm on 11/11/13. Basic Energies ticket #9529.

2nd SURFACE CASING STRING: Reamed back down to 606' with 12-1/4" bit. Ran 14 joints of new 24# 8-5/8" surface casing. Tallied 587.75'. Landed at 601' KB. Strapped guide shoe and bottom 3 joints, tacked collars on all, then welded collar on top 2 joints. Cemented bottom with 150 sks 60/40 POZ; 3% CC, 1/4# CF. Plug down at 7:00 AM. Basic Energies ticket #9531. Did not try to circulate. Cemented the top through 1" tubing in annulus with 170 sks with 150 sks A-Con; 3% CC, 1/4# CF. Cement held. Basket (2) at 558' and 84'.

Deviation Surveys Taken: @ 246' = 3/4 degree; @ 5103' = 3/4 degree; @ 5200' = 3/4 degree



**TRILOBITE  
TESTING, INC**

## DRILL STEM TEST REPORT

McCoy Petroleum Corp.

S27-30s-19w Kiowa, KS

8080 E. Central  
STE 300  
Wichita, KS 67208  
ATTN: Evan Stone

MTPRC 'A' #1-27

Job Ticket: 55555

DST# 1

Test Start: 2013.11.17 @ 09:53:00

### GENERAL INFORMATION:

Formation: **Mississippian**

Deviated: No Whipstock: ft (KB)

Time Tool Opened: 11:57:50

Time Test Ended: 18:39:30

Test Type: Conventional Bottom Hole (Initial)

Tester: Chuck Smith

Unit No: 62

Interval: 5050.00 ft (KB) To 5103.00 ft (KB) (TVD)

Total Depth: 5103.00 ft (KB) (TVD)

Hole Diameter: 7.88 inches Hole Condition: Good

Reference Elevations: 2224.00 ft (KB)

2213.00 ft (CF)

KB to GR/CF: 11.00 ft

Serial #: 6741 Inside

Press@RunDepth: 149.00 psig @ 5051.00 ft (KB)

Start Date: 2013.11.17

Start Time: 09:53:02

2013.11.17

End Date:

End Time:

18:39:30

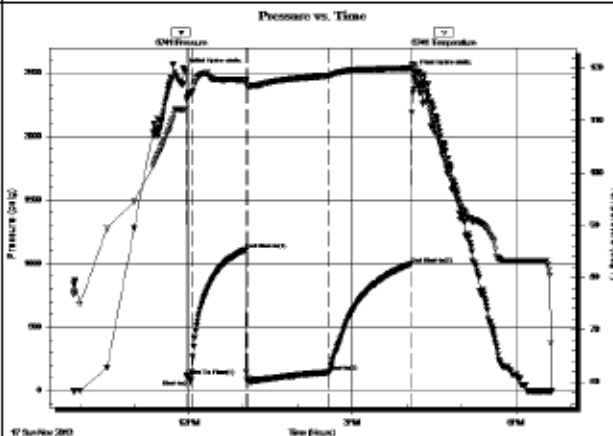
Capacity: 8000.00 psig

Last Calib.: 2013.11.17

Time On Btmr: 2013.11.17 @ 11:54:30

Time Off Btmr: 2013.11.17 @ 16:08:00

TEST COMMENT: B.O.B. @ 20 seconds  
No return.  
B.O.B. @ 10 seconds  
No return.



### PRESSURE SUMMARY

| Time (Min.) | Pressure (psig) | Temp (deg F) | Annotation           |
|-------------|-----------------|--------------|----------------------|
| 0           | 2523.06         | 112.06       | Initial Hydro-static |
| 4           | 112.01          | 114.29       | Open To Flow (1)     |
| 9           | 86.14           | 115.13       | Shut-In(1)           |
| 69          | 1108.96         | 117.68       | End Shut-In(1)       |
| 71          | 77.04           | 116.48       | Open To Flow (2)     |
| 181         | 149.00          | 118.54       | Shut-In(2)           |
| 251         | 998.35          | 119.97       | End Shut-In(2)       |
| 254         | 2506.93         | 120.08       | Final Hydro-static   |

### Recovery

| Length (ft) | Description                         | Volume (bbl) |
|-------------|-------------------------------------|--------------|
| 0.00        | RW: .225 @ 50 Degrees F = 47000 PPM | 0.00         |
| 62.00       | GMVCOE 20g 5m 10w 20o 40 emulsion   | 0.30         |
| 188.00      | GMVCO 25g 5m 5w 85o                 | 0.98         |
| 63.00       | GWOCME 45g 5w 10o 30m 10 emulsion   | 0.88         |
| 63.00       | OSM 100m                            | 0.88         |
| 0.00        | 4432' GIP                           | 0.00         |

### Gas Rates

|  | Choke (Inches) | Pressure (psig) | Gas Rate (Mcf/d) |
|--|----------------|-----------------|------------------|
|  |                |                 |                  |

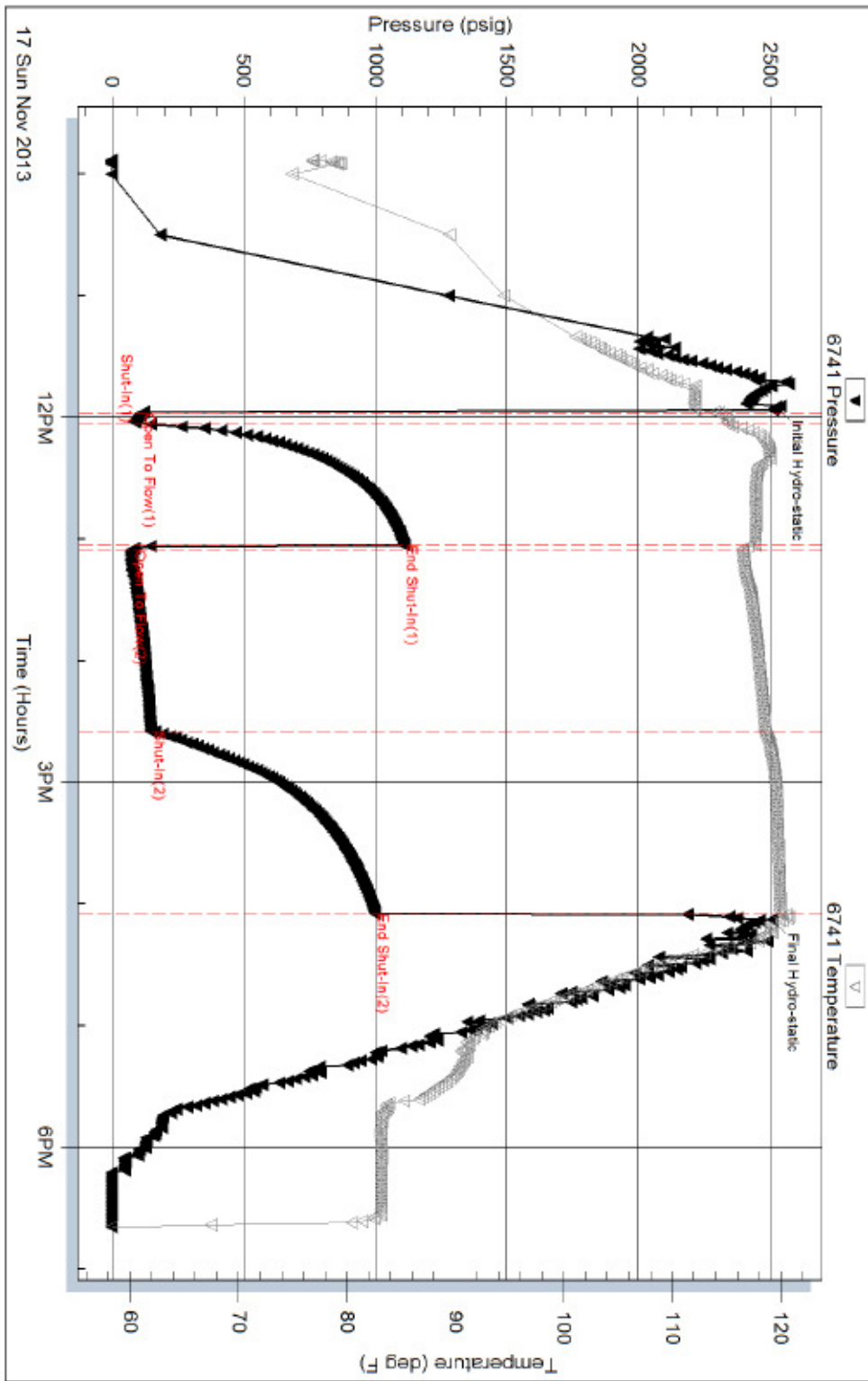
Serial #: 6741

Inside McCoy Petroleum Corp.

MTRRC A#1-27

DST Test Number: 1

### Pressure vs. Time



**LEGEND**

**LITHOLOGY**

- Chert
- Dolomite
- Cherty dol
- Gypsum
- Limestone
- Cherty ls
- Sandy ls
- Salt
- Shale
- Shale green

- Shale red
- Carb shale
- Siltstone
- Sandstone

**MINERAL**

- Calcite
- Chert
- Glauconite
- Pyrite
- Sand

- Silt

**STRINGER**

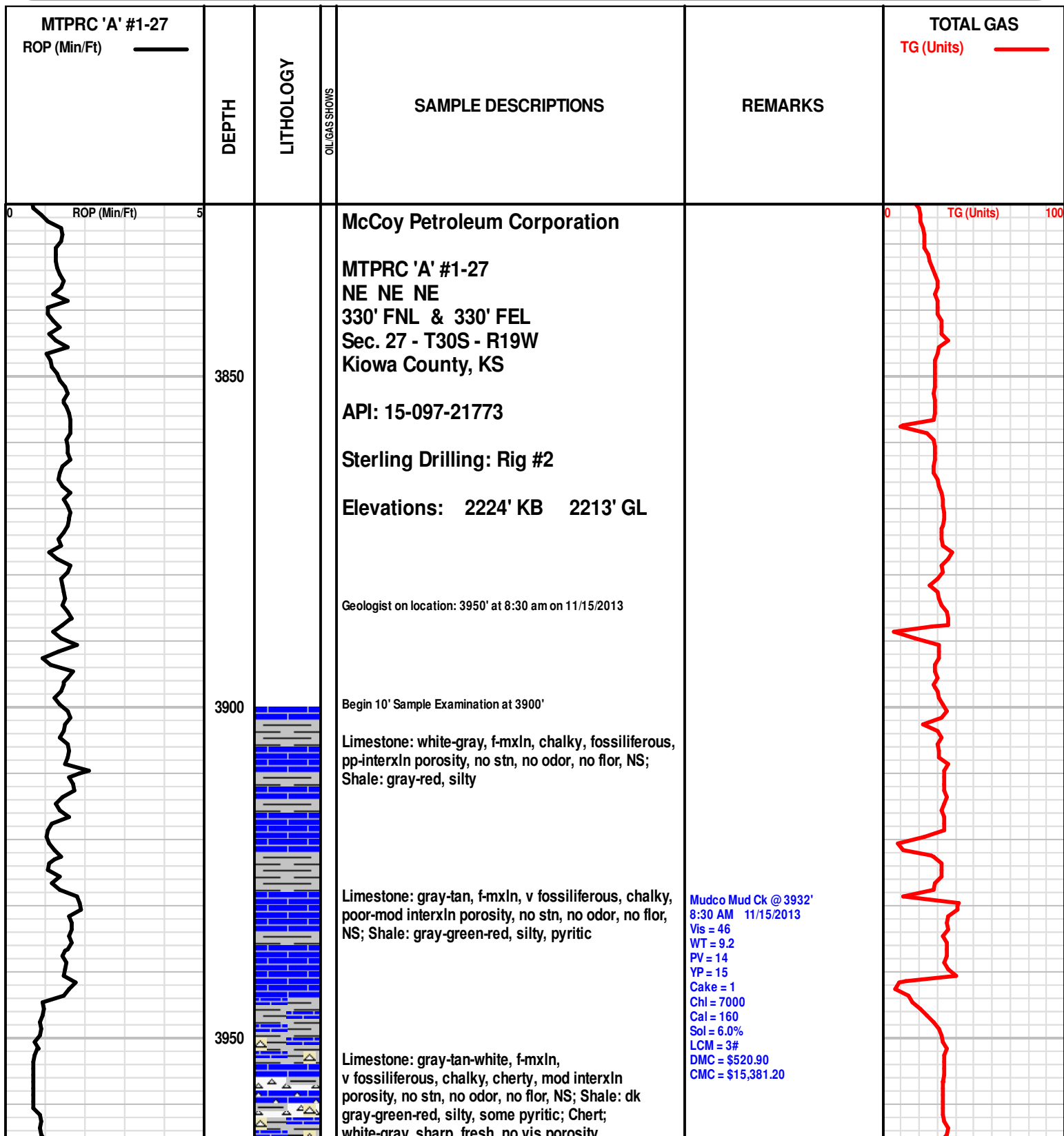
- Dolomite
- Gypsum
- Limestone
- Shale
- Siltstone
- Sandstone

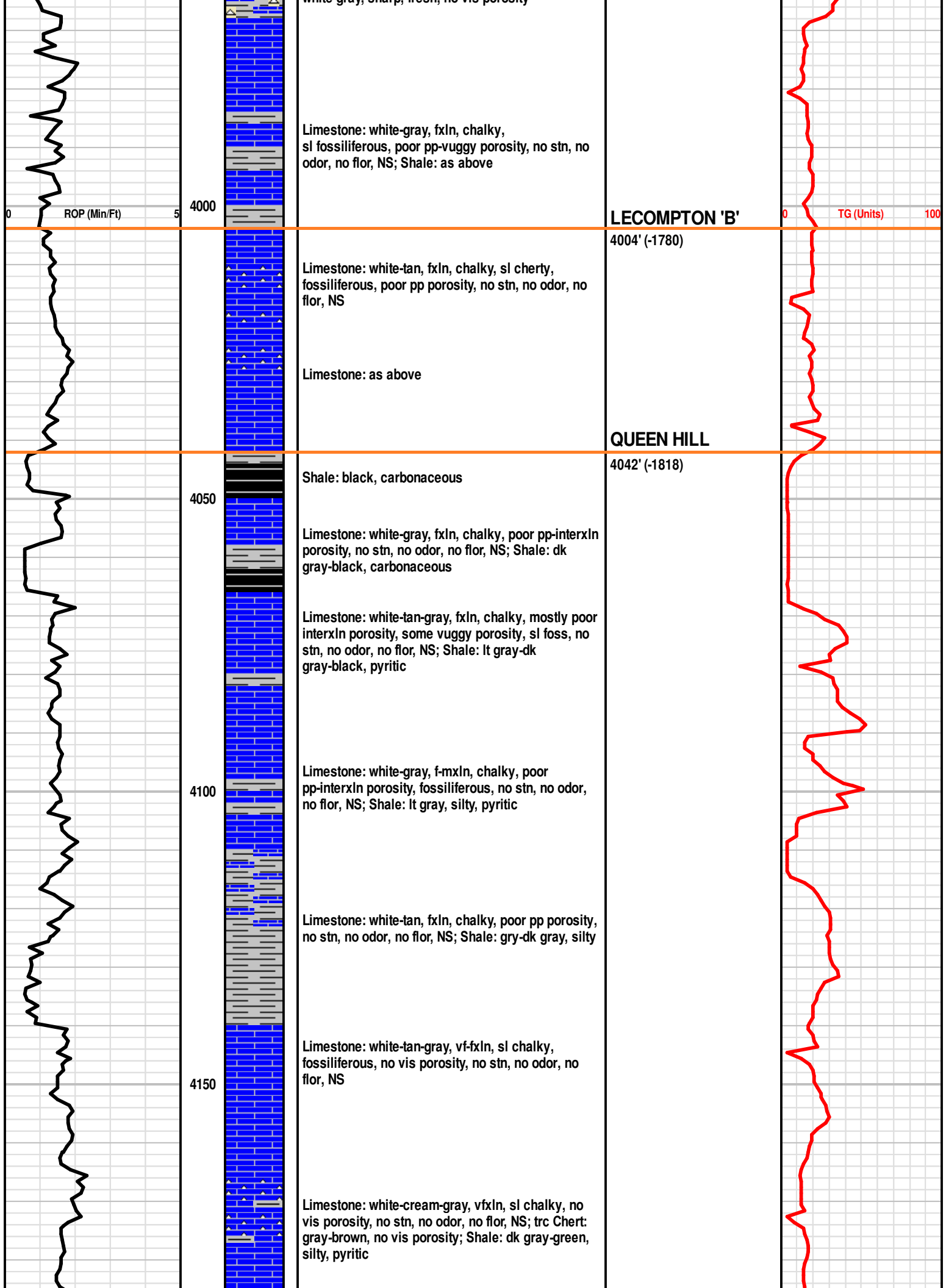
**OIL/GAS SHOW**

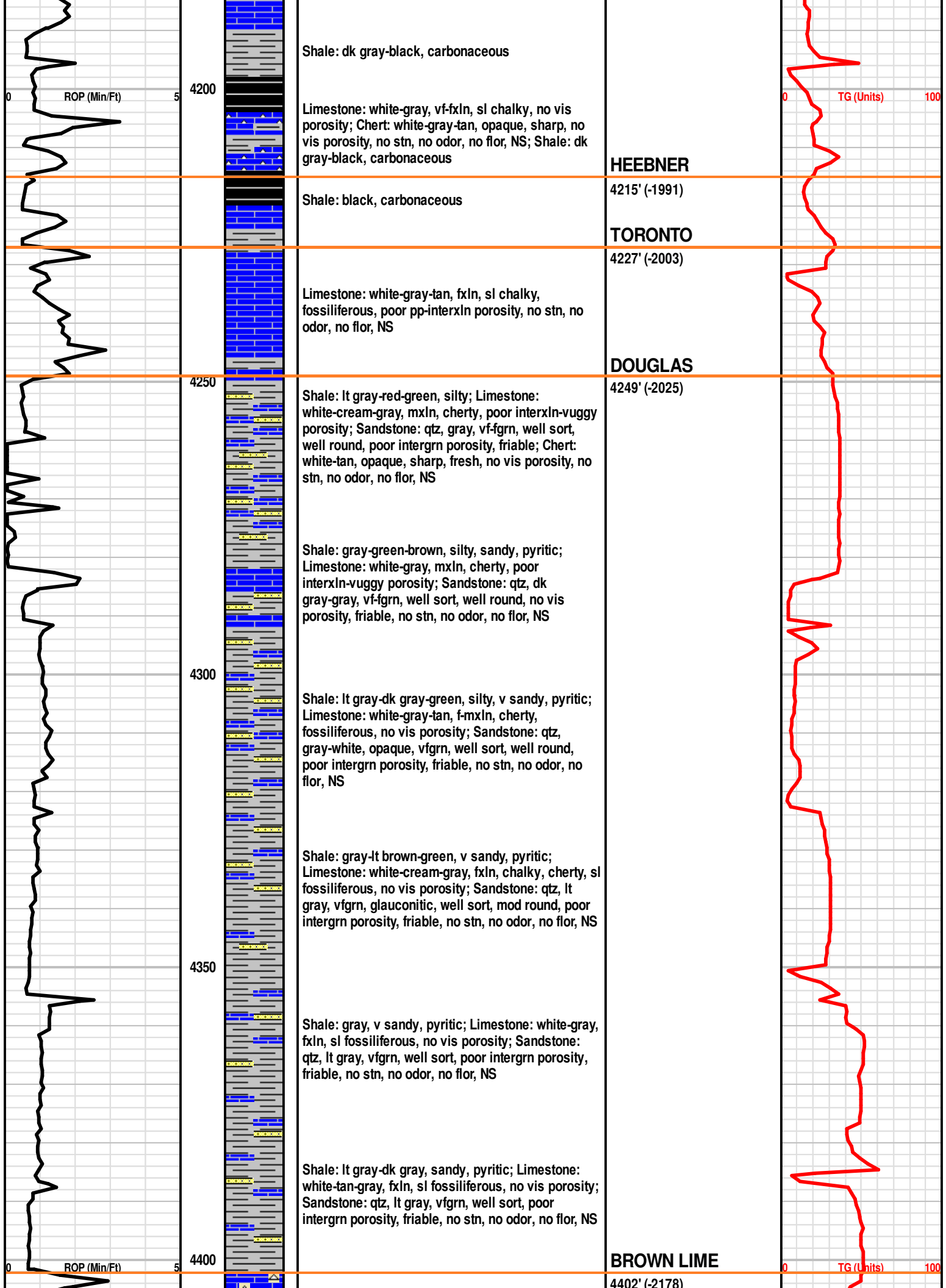
- Gas show
- Good
- Fair
- Poor
- Dead

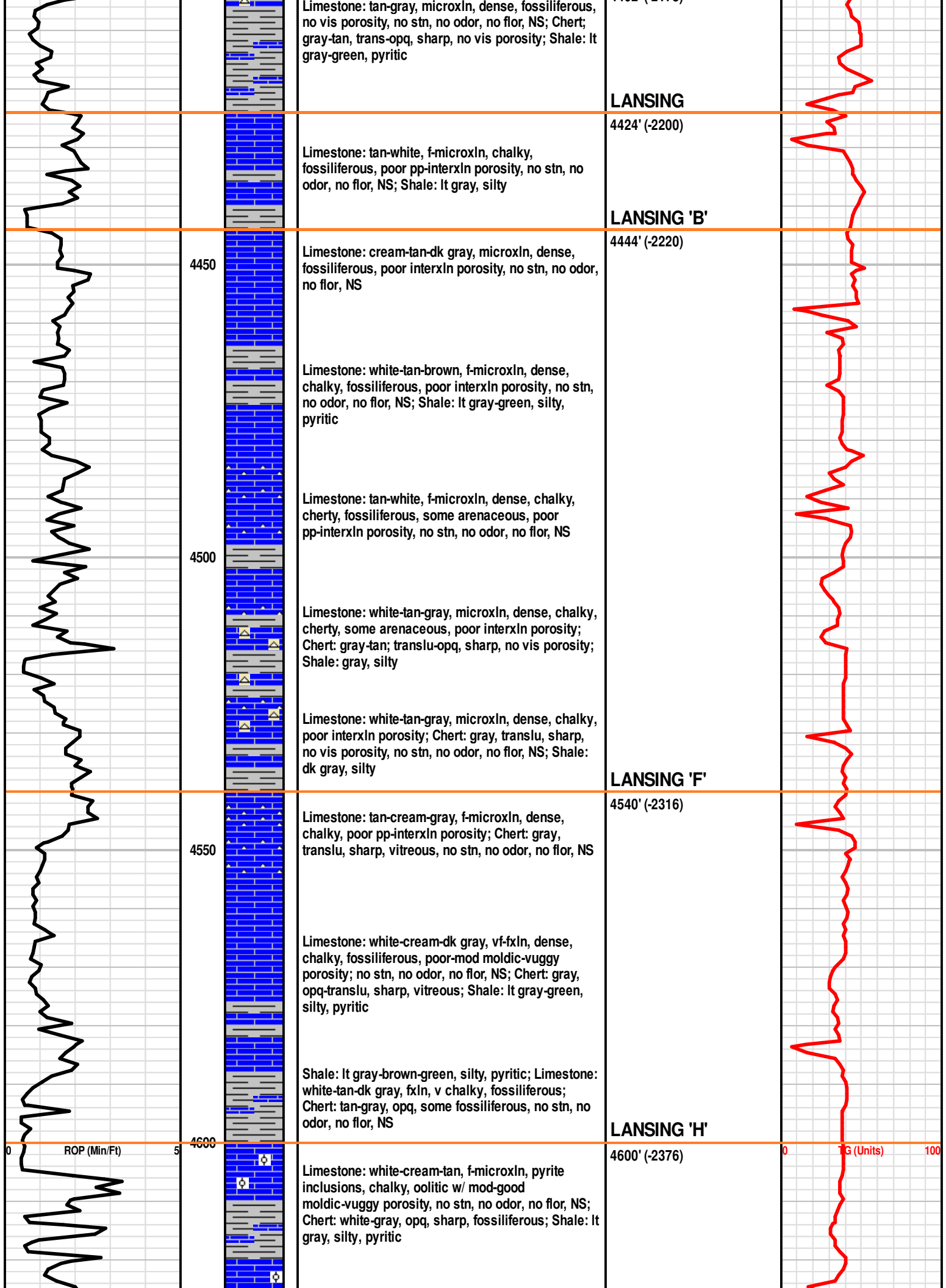
**INTERVAL**

- Porosity

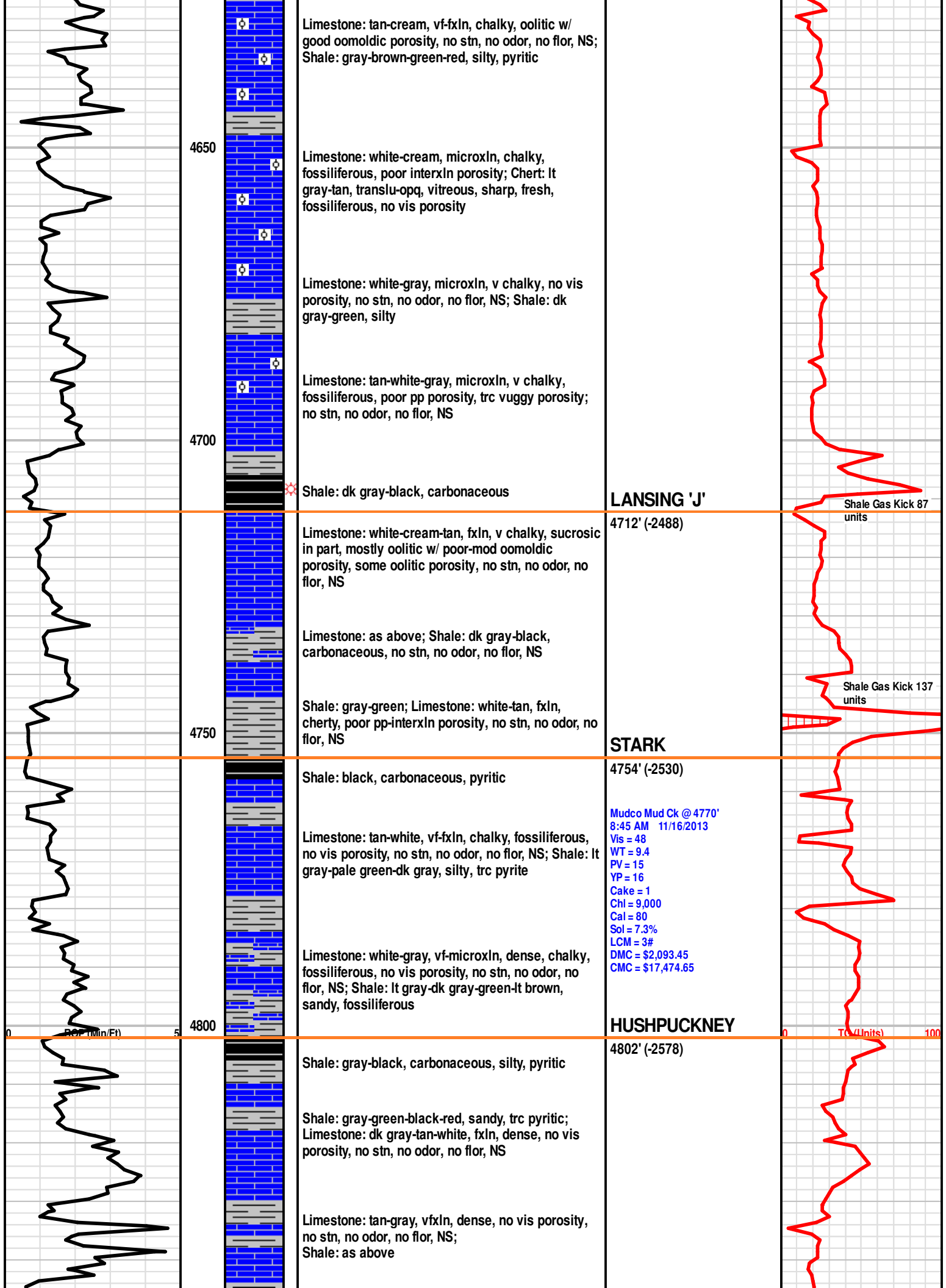












Limestone: tan-cream, vf-fxln, chalky, oolitic w/ good oomoldic porosity, no stn, no odor, no flor, NS; Shale: gray-brown-green-red, silty, pyritic

4650

Limestone: white-cream, microxln, chalky, fossiliferous, poor interxln porosity; Chert: lt gray-tan, translu-opq, vitreous, sharp, fresh, fossiliferous, no vis porosity

Limestone: white-gray, microxln, v chalky, no vis porosity, no stn, no odor, no flor, NS; Shale: dk gray-green, silty

4700

Limestone: tan-white-gray, microxln, v chalky, fossiliferous, poor pp porosity, trc vuggy porosity; no stn, no odor, no flor, NS

Shale: dk gray-black, carbonaceous

**LANSING 'J'**

4712' (-2488)

Shale Gas Kick 87 units

Limestone: white-cream-tan, fxln, v chalky, sucrosic in part, mostly oolitic w/ poor-mod oomoldic porosity, some oolitic porosity, no stn, no odor, no flor, NS

Limestone: as above; Shale: dk gray-black, carbonaceous, no stn, no odor, no flor, NS

4750

Shale: gray-green; Limestone: white-tan, fxln, cherty, poor pp-interxln porosity, no stn, no odor, no flor, NS

Shale Gas Kick 137 units

**STARK**

4754' (-2530)

Shale: black, carbonaceous, pyritic

Limestone: tan-white, vf-fxln, chalky, fossiliferous, no vis porosity, no stn, no odor, no flor, NS; Shale: lt gray-pale green-dk gray, silty, trc pyrite

Mudco Mud Ck @ 4770'  
 8:45 AM 11/16/2013  
 Vis = 48  
 WT = 9.4  
 PV = 15  
 YP = 16  
 Cake = 1  
 ChI = 9,000  
 Cal = 80  
 Sol = 7.3%  
 LCM = 3#  
 DMC = \$2,093.45  
 CMC = \$17,474.65

4800

Limestone: white-gray, vf-microxln, dense, chalky, fossiliferous, no vis porosity, no stn, no odor, no flor, NS; Shale: lt gray-dk gray-green-lt brown, sandy, fossiliferous

**HUSHPUCKNEY**

4802' (-2578)

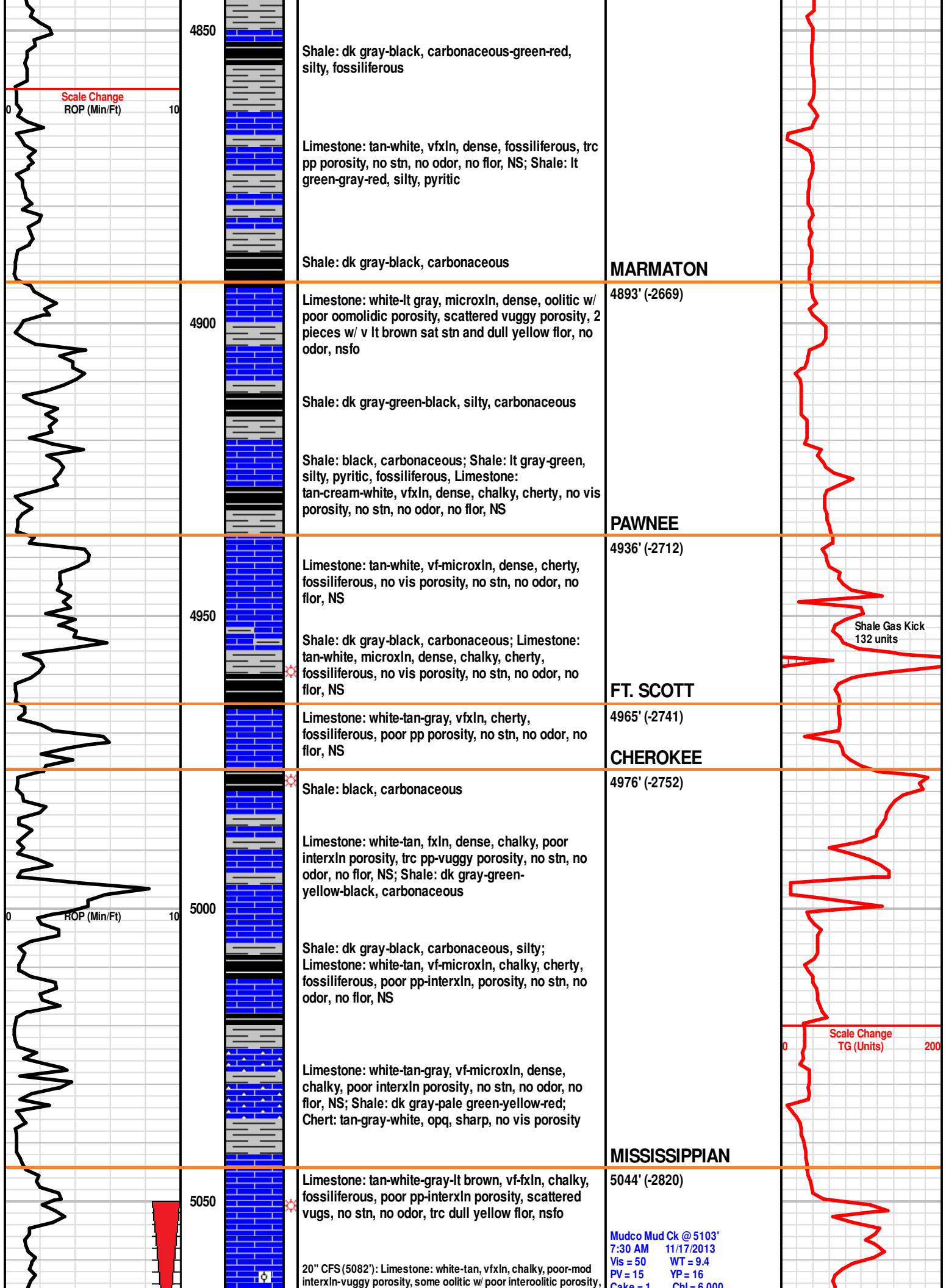
Shale: gray-black, carbonaceous, silty, pyritic

Shale: gray-green-black-red, sandy, trc pyritic; Limestone: dk gray-tan-white, fxln, dense, no vis porosity, no stn, no odor, no flor, NS

Limestone: tan-gray, vfxln, dense, no vis porosity, no stn, no odor, no flor, NS; Shale: as above

TG (Units) 100





4850

Scale Change  
ROP (Min/Ft)

Shale: dk gray-black, carbonaceous-green-red, silty, fossiliferous

Limestone: tan-white, vfxln, dense, fossiliferous, trc pp porosity, no stn, no odor, no flor, NS; Shale: lt green-gray-red, silty, pyritic

Shale: dk gray-black, carbonaceous

**MARMATON**

4900

Limestone: white-lt gray, microxln, dense, oolitic w/ poor oomoldic porosity, scattered vuggy porosity, 2 pieces w/ v lt brown sat stn and dull yellow flor, no odor, nsfo

Shale: dk gray-green-black, silty, carbonaceous

Shale: black, carbonaceous; Shale: lt gray-green, silty, pyritic, fossiliferous, Limestone: tan-cream-white, vfxln, dense, chalky, cherty, no vis porosity, no stn, no odor, no flor, NS

4893' (-2669)

**PAWNEE**

4950

Limestone: tan-white, vf-microxln, dense, cherty, fossiliferous, no vis porosity, no stn, no odor, no flor, NS

Shale: dk gray-black, carbonaceous; Limestone: tan-white, microxln, dense, chalky, cherty, fossiliferous, no vis porosity, no stn, no odor, no flor, NS

4936' (-2712)

**FT. SCOTT**

Limestone: white-tan-gray, vfxln, cherty, fossiliferous, poor pp porosity, no stn, no odor, no flor, NS

4965' (-2741)

**CHEROKEE**

Shale: black, carbonaceous

4976' (-2752)

Limestone: white-tan, fxln, dense, chalky, poor interxln porosity, trc pp-vuggy porosity, no stn, no odor, no flor, NS; Shale: dk gray-green-yellow-black, carbonaceous

Shale: dk gray-black, carbonaceous, silty; Limestone: white-tan, vf-microxln, chalky, cherty, fossiliferous, poor pp-interxln, porosity, no stn, no odor, no flor, NS

5000

ROP (Min/Ft)

Limestone: white-tan-gray, vf-microxln, dense, chalky, poor interxln porosity, no stn, no odor, no flor, NS; Shale: dk gray-pale green-yellow-red; Chert: tan-gray-white, opq, sharp, no vis porosity

**MISSISSIPPIAN**

5050

Limestone: tan-white-gray-lt brown, vf-fxln, chalky, fossiliferous, poor pp-interxln porosity, scattered vugs, no stn, no odor, trc dull yellow flor, nsfo

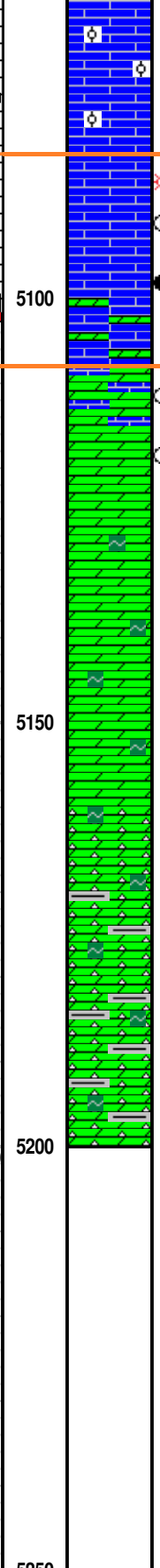
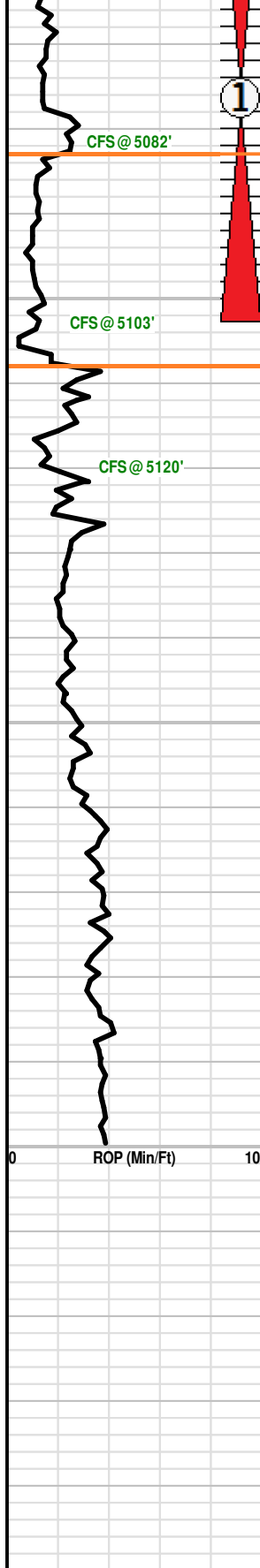
5044' (-2820)

Scale Change  
TG (Units)

Shale Gas Kick  
132 units

20" CFS (5082'): Limestone: white-tan, vfxln, chalky, poor-mod interxln-vuggy porosity, some oolitic w/ poor interoolitic porosity,

Mudco Mud Ck @ 5103'  
7:30 AM 11/17/2013  
Vis = 50 WT = 9.4  
PV = 15 YP = 16  
Coke = 1 Cbl = 6.000



lt brn sat stn, sl odor, dull yellow flor, nsfo

60" CFS (5082'): Limestone: white, vfxln, chalky, poor-mod pp-interxln porosity, scattered vugs, some oolitic w/ poor-mod interoolitic porosity, scattered lt brn sat stn, sl odor, spotty dull flor, nsfo

Limestone: white-tan, micro-vfxln, chalky, sl fossiliferous, mod-good vuggy-interxln porosity, lt brn sat stn, good odor, mod flor, fso&g

40" CFS (5103'): Limestone: white, fxln, chalky, dolomitic, good interxln porosity, lt brn sat stn, strong odor, mod flor, gso

60" CFS (5103'): Limestone: white, fxln, chalky, dolomitic, good pp-interxln porosity, lt brn sat stn, strong odor, mod flor, gso; Dolomite: tan-white, fxln, poor pp-interxln porosity, scattered lt brn stn

40" CFS (5120'): Dolomite: tan-white, fxln, dense, poor-mod interxln-pp porosity, trc lt brn stn, sl odor, no flor, nsfo

60" CFS (5120'): Dolomite: tan-white, fxln, dense, chalky, poor-mod interxln porosity, trc lt brn stn, sl odor, no flor, nsfo

Dolomite: tan-white, f-mxln, chalky, sucrosic, poor-mod interxln porosity, trc vugs, trc glauconite, no stn, sl-mod odor, v faint flor, nsfo

Dolomite: tan, fxln, chalky, sucrosic, mod pp-interxln porosity, glauconitic, no stn, sl-mod odor, v faint flor, nsfo

Dolomite: dk gray-tan-cream, fxln, v chalky, sucrosic, glauconitic, poor-mod pp-interxln porosity, no stn, no odor, no flor, NS

Dolomite: dk gray-lt gray-tan, f-mxln, cherty, glauconitic, no vis porosity, no stn, no odor, no flor, NS; Chert: white-gray, sharp, fresh, opq-translu, vitreous, fossiliferous, no vis porosity; Shale: lt gray-green-yellow, silty

Dolomite: gray-white-tan, f-mxln, cherty, glauconitic, no vis porosity, no stn, no odor, no flor, NS; Shale: gray-green-maroon, silty; trc Chert: as above

**RTD @ 5200' (-2976)**  
**LTD @ 5198' (-2974)**

Electric Logs Run: By Weatherford Logging:  
Dual Induction; Compensated Density-Neutron;  
Microresistivity.

Geologist left location at 4:00 PM on 11/18/2013

Cake = 1 Cal = 80 Sol = 6.7%  
LCM = 3#  
DMC = \$2,938.95  
CMC = \$20,413.60

**SPERGEN Ø**

5083' (-2859)

**WARSAW**

5108' (-2884)

**DST #1**  
5050' - 5103'  
IF = BOB 20 sec  
FF = BOB 10 sec. GTS 5 min  
REC: 4432' GIP  
63' OSptM  
63' GWOCME (45% G, 5% W, 10% O, 30% M, 10% E)  
188' GMWCO (25% G, 5% M, 5% W, 65% O)  
62' GMWCOE (20% G, 5% M, 10% W, 20% O, 40% E)

**PRESSURES:**  
IH = 2523#  
FH = 2507#  
IF = 112-86#  
FF = 77-149#  
ISIP = 1109#  
FSIP = 998#  
Temp = 120° F

**GAS GAUGE FF:**  
10" = 5.8 Mcf  
15" = 6.1 Mcf  
20" = 6.5 Mcf  
25" = 6.5 Mcf  
30" = 6.8 Mcf  
40" = 7.2 Mcf  
50" = 7.2 Mcf  
60" = 7.2 Mcf  
70" = 7.2 Mcf  
80" = 7.2 Mcf  
90" = 6.8 Mcf

Mudco Mud Ck @ 5200'  
8:30 AM 11/18/2013  
Vis = 61  
WT = 9.3  
PV = 15  
YP = 17  
Cake = 1  
Chl = 5,000  
Cal = 80  
Sol = 6.8%  
LCM = 3#  
DMC = \$1,618.85  
CMC = \$22,032.45

