



Woolsey Operating Company, LLC

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

Measured Depth Log

Well Name: Circle GU A-2
Location: Section 5 - Township 34 South - Township 10 West
License Number: 15-007-24043-00-00 Region: Barber County, KS
Spud Date: July 31, 2013 Drilling Completed: August 8, 2013
Surface Coordinates: 330' FNL & 900' FWL
Apx. W 1/2 NE NW NW
Bottom Hole
Coordinates:
Ground Elevation (ft): 1430' K.B. Elevation (ft): 1438'
Logged Interval (ft): 4000' To: 5140' Total Depth (ft): 5140'
Formation: Kansas City ----> Simpson Group
Type of Drilling Fluid: Chemical Mud
Printed by WellSight Log Viewer from WellSight Systems 1-800-447-1534 www.WellSight.com

OPERATOR

Company: Woolsey Operating Company, LLC
Address: 125 N. Market, Suite 1000
Wichita, KS 67202

GEOLOGIST

Name: Bill Klaver
Company: Woolsey Operating Co. LLC
Address: 125 N. Market, Wichita Kansas, 67202

COMMENTS

Surface Casing: Spud at 6:30 Wednesday evening on July 31, 2013. Ran 5 joints of new 13 3/8" X 48#/ft casing to 222' KB (tally 210.85') with 200 sx Class A, 2% gel, 3% cc. Cement did circulate.

Production Casing:

Deviation Surveys: 1/2 at 104', 1 at 222', 3/4 at 749', 3/4 at 1253', 1/4 at 2760', 1 at 3200', 1/2 at 3701', 3/4 at 3952', 1/4 at 4483', 3/4 at 4658', 7/8 at 5140'

Pipe Strap @ 4658', Strap: 4665.95', Board: 4673.71. Strap 7.76' short. No correction was made to the board.

Fossil Drilling Co. Rig 2 Bit Record"

- 1) 17" RT RR in at 0' out at 222'. 5.75 hours
- 2) 7 7/8" Security HE-21 in at 222' out at 4658', 4436'/77.5 hours
- 3) 7 7/8" Security HE-29 RR in at 4658' out at 5140' 482'/22 hours

Gas Detector: Woolsey Operating Co. Gas Trailer #2

Mud System: Mud-Co. Brad Bortz, Engineer







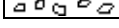


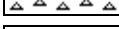
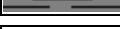
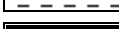
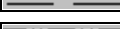

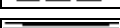




DSTs: Trilobite Testing, Gary Pevoteaux, Tester

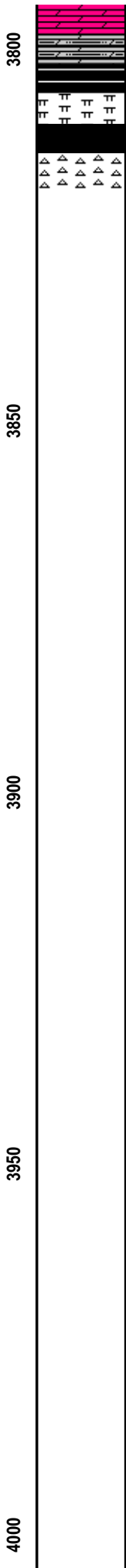
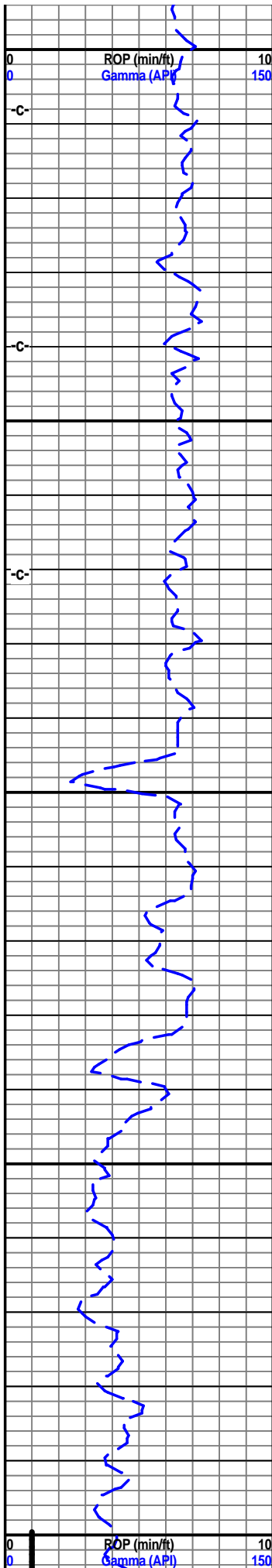
COMMENTS

CREWS

Fossil Drilling Co. Rig 2
 Glen Holmes, Tool Pusher
 Kerry Clark, Days
 Larry Hunt, Evening
 Kevin Clifft, Morning

ROCK TYPES

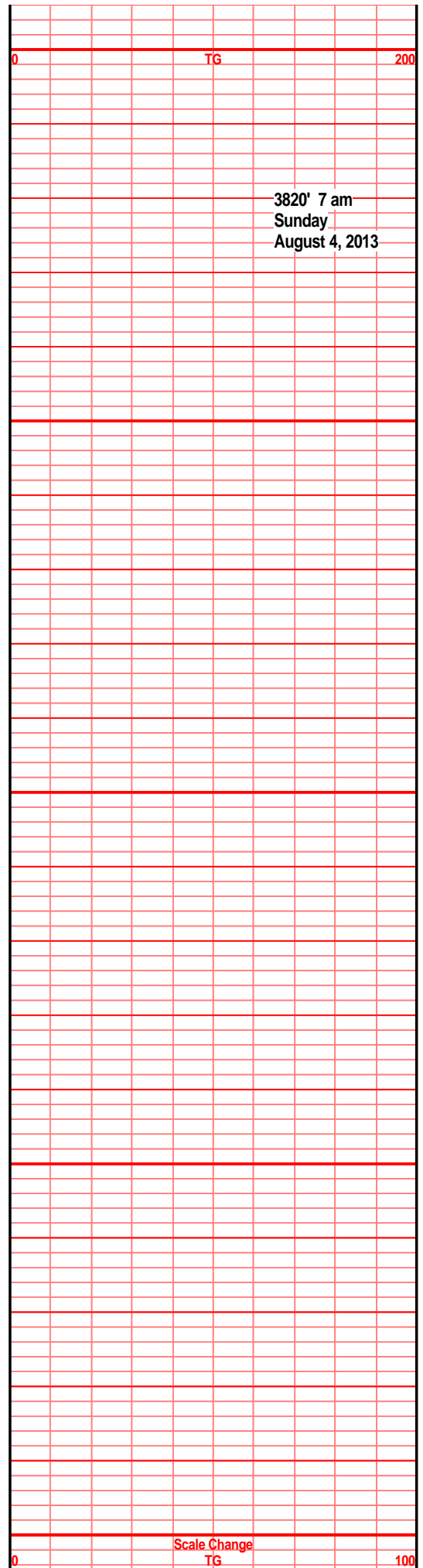
	Anhy		Shy dolo		Sltst		Lmst
	Bent		Dol		Ss		Calc dol
	Brec		Gyp		Black sh		Dol lmst
	Cht		Sdy lmst		Gry sh		Silty dol
	Clyst		Lmst		Shale		Ss 2
	Coal		Mrlst		Shysltst		Shale 3
	Congl		Salt		Sltysht		Shale 3
	Sdy dolo		Shale		Dol 2		



7 am Progress:
 July 30, 2013 MIRT/SPUD
 August 1, 2013 WOC at 222'
 August 2, 2013 Drilling at 1719'
 August 3, 2013 Drilling at 2885'
 August 4, 2013 Drilling at 3820'
 August 5, 2013 Drilling at 4428'
 August 6, 2013 DST #1 at 4658'
 August 7, 2013 Drilling at 4818'
 August 8, 2013 TOOH for logs at 5140'

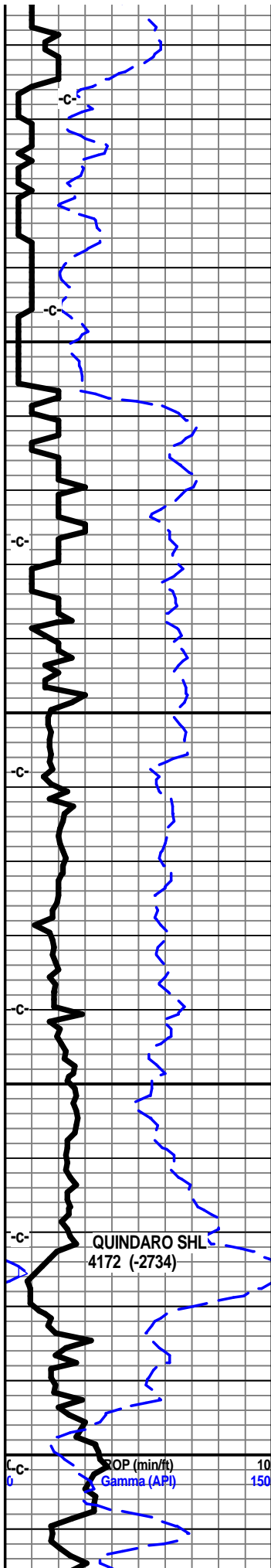
Oil Gas Show Legend
 Gas
 ● Even Stain/Saturation
 ○ Spotted Stain/Saturation
 ○ Questionable Show
 □ Dead/Gilsonitic

E-Log Tops:
 Herington 1790 (-352)
 Onaga 2612 (-1174)
 Wabaunsee 2675 (-1237)
 LeComton 3427 (-1989)
 Kanwaka 3440 (-2002)
 Elgin Sand 3515 (-2077)
 Heebner 3642 (-2204)
 Toronto 3653 (-2215)
 Douglas 3698 (-2260)
 Haskell 3890 (-2452)
 Stalnaker 3927(-2489)
 Quindaro 4166 (-2728)
 KC 'F' 4187 (-2749)
 lola 4207 (-2769)
 KC 'Dennis' 4283 (-2845)
 Stark 4329 (-2891)
 KC 'Swope' 4343 (-2905)
 Hushpuckney 4362 (-2924)
 KC 'Hertha' 4370 (-2932)
 B/Kansas City 4417 (-2979)
 Pawnee 4513 (-3075)
 Cherokee Grp 4561 (-3123)
 Mississippi Unc. 4598 (-3160)
 C3 4609 (-3170)
 C2A 4619 (-3181)
 C2 4641 (-3203)
 C1 N/A
 Compton 4805 (-3367)
 Kinderhook 4810 (-3372)
 Woodford 4886 (-3448)
 Viola 4932 (-3494)
 Simpson Group 5019 (-3581)
 Wilcox 5054 (-3616)
 McLish Shale 5094 (-3656)



3820' 7 am
 Sunday
 August 4, 2013

Scale Change
 TG

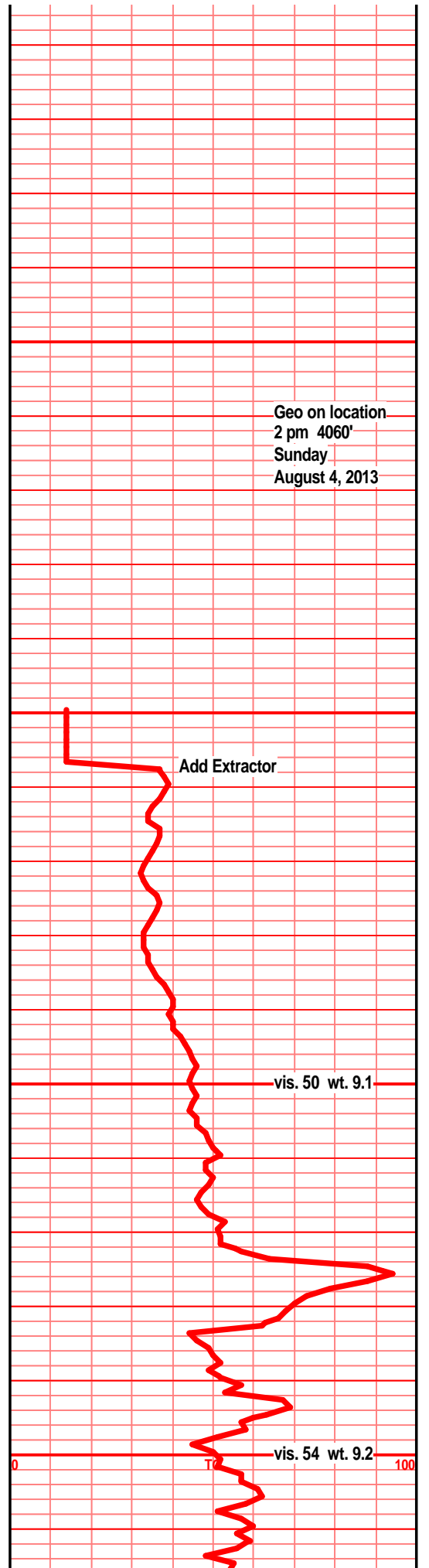
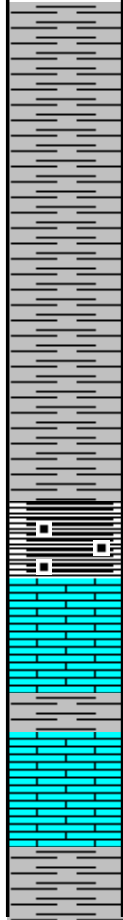


4050

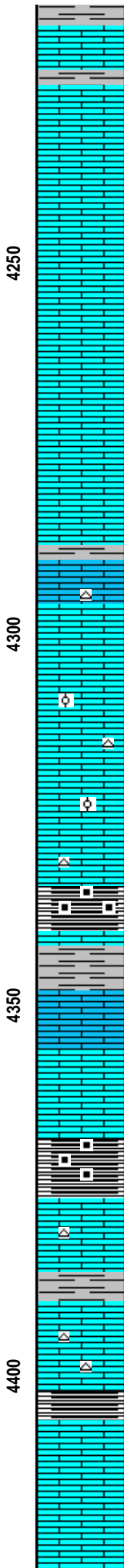
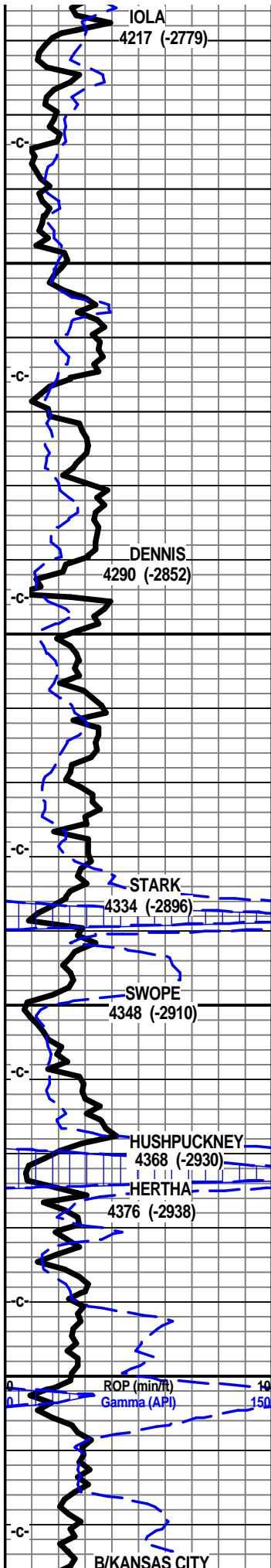
4100

4150

4200



Geo on location
2 pm 4060'
Sunday
August 4, 2013



Ist off wht crm f sli med xln sub chlky tr gran, foss frags, tr foss ool, chrt lt gry shrp frsh

Ist off wht crm f xln blk ang gran sub chlky foss frags, calc xln fill, foss ool, chrt dull gry drk gry shrp frsh foss

Ist off wht crm tan f xln gran blk ang dns hrd sub chlky foss frags, foss ool pelletal, calc fill, chrt gry shrp frsh opaq

Ist crm tan off wht f xln bky ang gran sub chlky, foss frags/ool, chrt off wht lt gry shrp frsh

Ist crm tan off wht f xln gran sub chlky foss frags, calc fill chrt lt gry shrp frsh

shl dkdr gry blk, blk carb, wxy grsy text, tr gas bubs,

shl gry blk, silty gritty calc, Ist tan gry f xln blk ang gran arg

Ist crm tan off wht f xln gran sub chlky foss frags/ool, calc fill pp foss mold por

Ist off wht crm f xln blk ang gran soft, calc fill, foss frags/ool, tr chrt tan gry shrp frsh

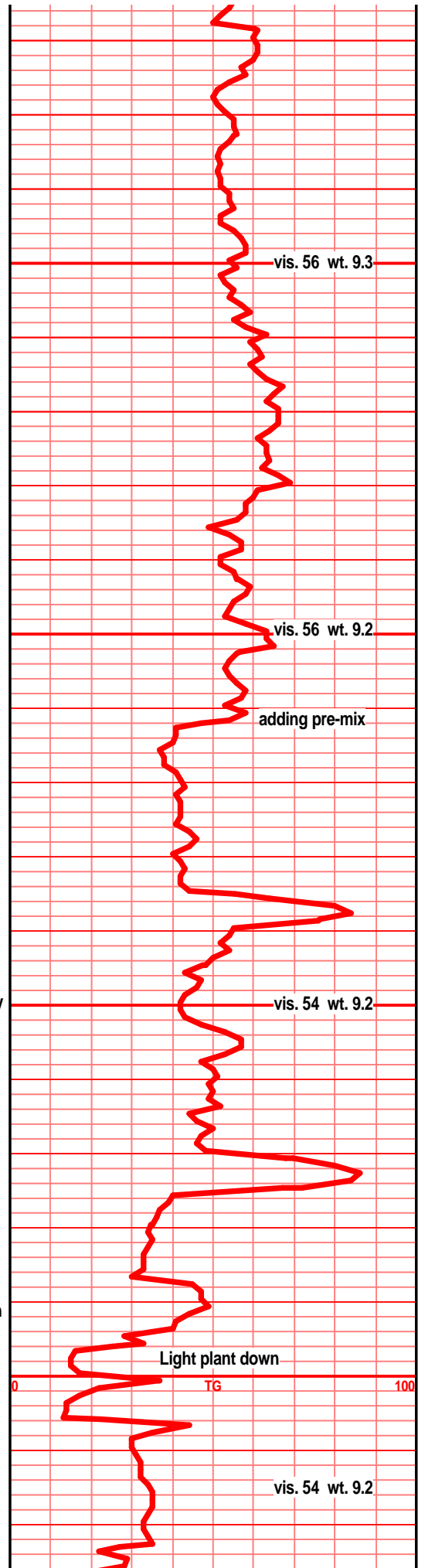
Ist aa, much blk wxy grsy tr gassy carb shl, blk ang pcs

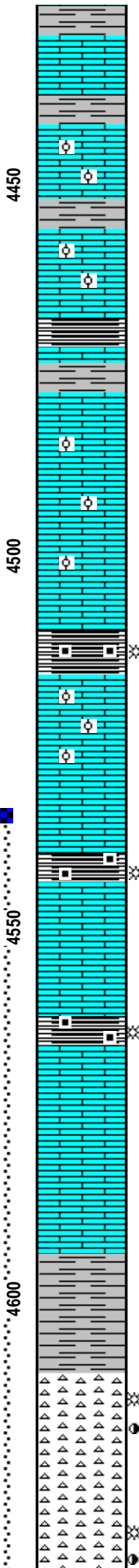
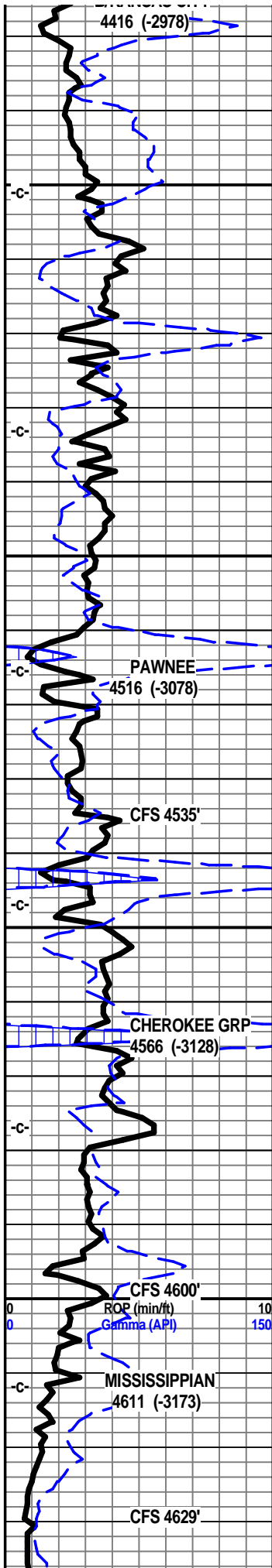
Ist off wht crm tan f xln blk ang gran calc xln fill, sub chlky, tr foss frags, chrt lt gry shrp frsh opaq

shl gry drk gry blk, tr carb text, tr gas bubs, Ist tan off wht lt gry f xln dns hrd blk ang

Ist off wht lt gry f xln blk ang dns, some calc fill, arg in prt tr foss frags

Ist off wht lt gry f xln gran dns hrd, blk some foss arg in prt





shl gry med gry, silty gritty, calc in prt, 1st tan tan/brn f vf xln dns hrd blkly arg

1st crm buff drk tan f vf xln dns hrd blkly ang, tr sub chlky calc fill, some foss frags/ool, shl gry gry brn silty gritty calc

1st buff tan f vf xln dns hrd blkly ang, tr sub chlky, tr calc fill, tr foss frags/ool

1st crm buff tan f vf xln dns hrd blkly ang tr sub chlky tr foss frags, tr ool,

shl drk gry blk, silty gritty, some tr carb text, 1st tan buff f vf xln dns blkly ang, calc fill, tr foss frags, tr foss micro ool

shl gry green calc, 1st tan buff crm f vf xln blkly ang dns, tr sub chlky, foss frags, micro ool, calc fill

1st crm buff tan off wht f xln blkly ang hrd dns, foss frags, micor ool, pelletal, calc fill

1st crm lt gry buff vf xln dns hrd blkly ang micro foss ool, tr calc xln fill, pelletal, massive

shl drk gry blk, blk carb in prt, tr wxy grsy text, gritty, some blkly ang pcs, tr gas bubs

1st gry/tan buff f vf xln dns hrd blkly ang pcs, foss frags, micro foss frags, hvy calc fill, sli sub chlky, NVP, tr gas bubs, scat rare UV, mineral?

1st crm buff tan f vf xln dns hrd blkly ang pcs, micro foss/ool, pelletal, calc xln fill, some sli sub chlky

1st crm tan/gry buff vf xln dns hrd blkly ang tr sub chlky, msly massive dns, micro xln/foss ool aa

1st crm buff tan/gry f vf xln dns hrd blkly, micro foss frags, ool, calc xln fill, massive

shl drk gry, gry blk, semi carb text, wxy grsy text, blkly ang pcs, 1st aa in spl

1st tan/gry, buff f vf xln blkly ang hrd dns, calc fill, micro foss frags/ool, abun drk gry blk shls

1st aa, shl gry drk green banded, tr maroon/red silty gritty calc

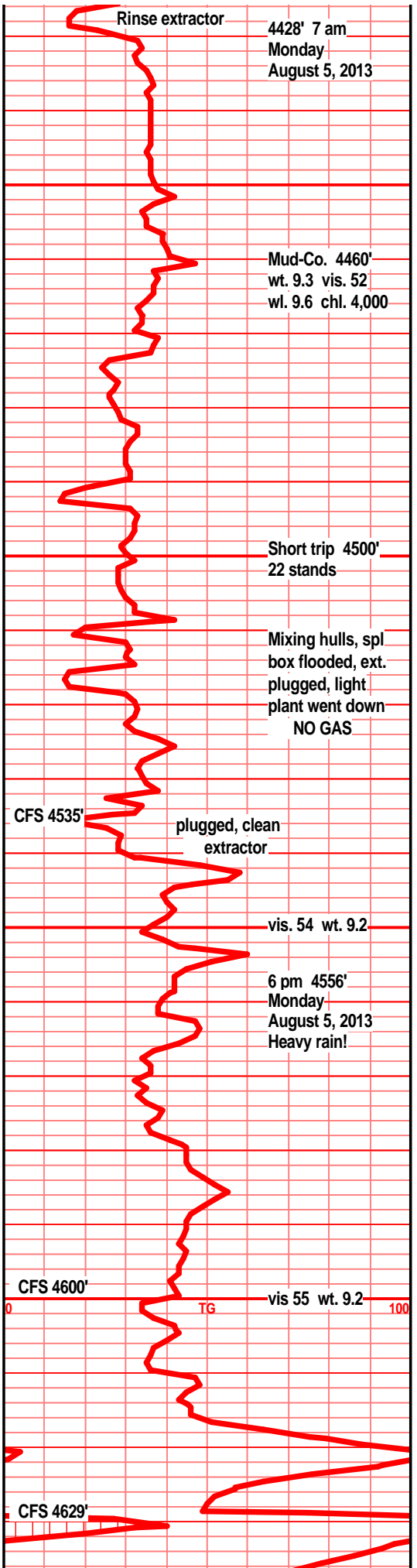
shl gry tan gry gritty silty sndy in prt, tr drk gry/brn/blk gritty pyritic shl, gas bubs, 1st buff gry/tan f vf xln dns blkly ang gran sndy in prt

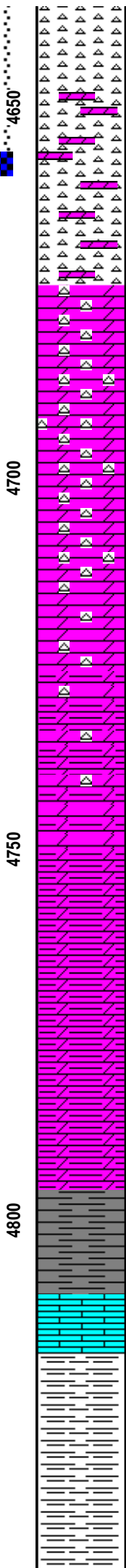
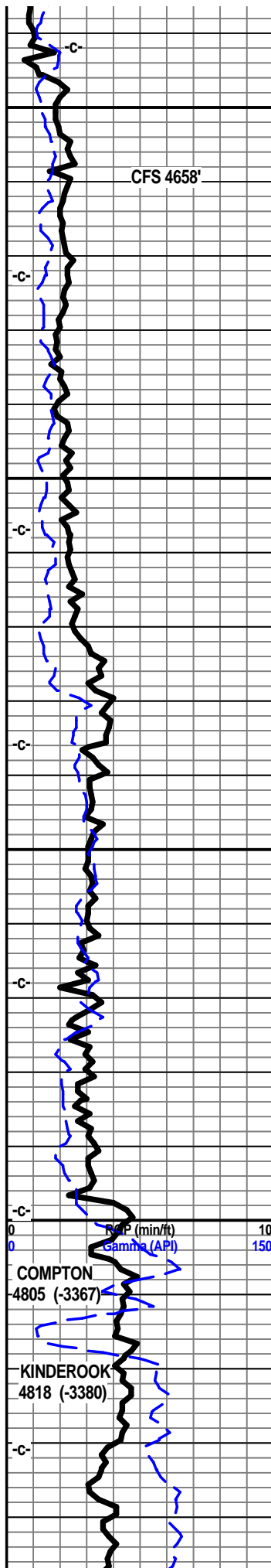
shl gry green, blue green silty gritty sndy, bedded, banded

chrt off wht crm tan dull tan, shrp frsh opa, blkly ang pcs, tr weath edge text, tr pp moldic por, drk brn blk stain, sli odor,

chrt wht off wht tan shrp frsh opa, sub transl, blkly ang pcs with sli chlky gran spongy trip edges in prt, pp moldic por, sli odor, stain, ssfo, odor bleeding oil/gas

chrt wht off wht crm, gran spongy trip text, sli chlky text, crush wht, chrt lt gry crm tan shrp





cherty text, crush with, chrt lt gry chrt tan shrp
 frsh sli opaqa with gran spongy trip text, gd vis
 pp moldic por, gd vug por, inter gran por, fair
 to gd odor, abun gas bubs, drk tan brn stain,
 SFO, bleeding oil/gas in spl cup

chrt wht off wht shrp frsh blk ang opaqa pcs,
 with tan lt gry vf xln gran tr gritty tr sndy dolo

chrt off wht lt gry shrp frsh blk ang, opaqa, tr
 weath edge text, tr drk stain, tr gas bubs, dolo
 edge, dolo tan crm vf xln gran sndy text

dolo, chrt dolo, tan crm f vf xln dns hrd blk
 ang pcs, sndy gritty text, tr glau, tr lt stain, chrt
 off wht lt gry shrp frsh opaqa, tr scatt edge
 stain, tr gas bubs, odor?

dolo, chrt dolo, tan buff crm f vf lxn, blk ang
 dns hrd pcs, sndy text, tr glau, tr lt tan stain,
 chrt off wht lt gry tan shrp frsh opaqa, tr weath
 text edge, tr edge stain, tr gas

chrt dolo, tan buff crm f vf lxn dns hrd blk
 ang chrt pcs, sndy gritty text, tr glau, tr lt
 stain, chrt with dolo edge, lt gry off wht shrp
 frsh opaqa, tr drk edge stain, nodor, NSFO

chrt dolo tan off wht crm f vf xln dns hrd blk
 ang pcs, sndy gritty text, some sub chlky, tr
 glau with off wht lt gry chrt inclu, & chrt off wht
 lt gry shrp frsh opaqa semi transl, blk ang
 pcs, with rare drk edge stain, nodor NSFO

chrt dolo, tan off wht lt gry/buff f vf xln dns
 hrd blk ang pcs, sndy gritty text in prt, tr glau,
 with off wht lt gry shrp frsh chrt inclu, chrt off
 wht lt gry shrp frsh opaqa blk sli transl pcs,
 increase gry blk /brn dolo shls

shls gry med drk gry, semi gry green brn blk,
 silty calc, some dolo drk tan gry brn vf xln dns
 hrd blk ang arg

shl gry med drk gry brn blk, silty gritty gran
 calc, plated, some dolo drk gry brn f vf xln dns
 hrd arg silty gritty

shl drk med gry green, msly lt blue green, silty
 gritty in prt, some soft mushy

lst wht off wht lt crm, f vf xln blk ang hrd
 pcs, tr sub chlky in prt, tr micro foss frags,
 micro ool, crush/wash white

shl dull drk to med gry, micro silty, gritty,
 bedded some banded, tr pyritic

shl gry, med to drk dull gry, silty, some gritty,
 bedded, tr banded, tr pyritic, tr gas bubs on



CFS 4658'

DST #1
 4536'-4659'
 30"=60"-60"-120"
 SB BOB in 3 min
 Rec: 2685' GIP
 150' SGCM
 75' SO&GCM
 IHP 2164
 IFP 38-59
 ISIP 751
 FFP 68-118
 FSIP 791
 FHP 2167
 BHT 124

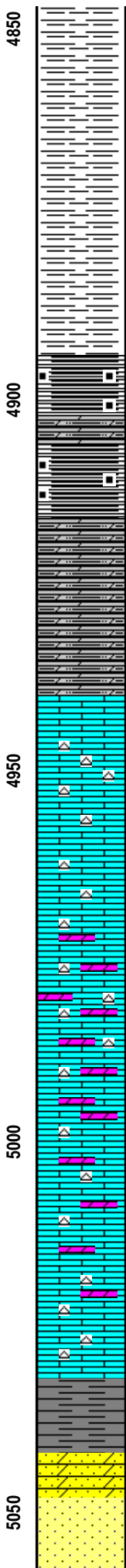
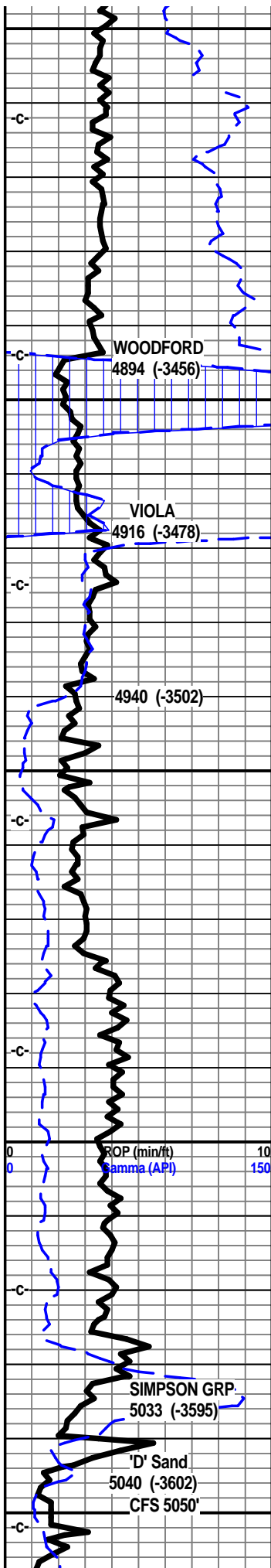
High volume
 flooding spl box
 and extractor

4658' 7 am
 Tuesday
 August 6, 2013

light plant down

vis. 52 wt. 9.1
 lcm. 6# bbl

4818' 7am
 Wednesday
 August 7, 2013



break

shl drk gry, drk gry/brn, silty gritty blk ang splinters, tr pyritic

shl drk gry, tr blk/brn with reddish tint, silty, tr gritty, tr pyritic, some bedded/banded

shl drk gry blk, scratch reddish, blk ang hrd pcs, tr gas bubs

shl gry dkr gry blk, reddish scratch, blk ang hrd pcs, tr gas

shl fny dolo shls, drk gry, reddish brn blk, silty tr gritty, tr pyritic, blk ang pcs, abun gas bubs on break

shl drk gry mstly blk, reddish blk, blk ang pcs, drk brn reddish pyritic silty dolo shl, gritty gran in prt, abun gas bubs, tr filmy cond on brk/smash

silty dolotan lt gry brn f grnd, silty soft, mushy in prt, tr pyritic, silty dolo, drk red brn silty hrd blk ang pcs.

silty shly dolostn/siltstone, f grnd, gritty mstly soft gran, mushy, spls wsh lt gry, tr pyritic scatt brn red brn silts, pyritic in prt, tr gritty sndy text.

lst off wht lt gry f sli med xln, blk ang calc pcs, int xln por, pyritic fill, lst/ dolo wht gry mott, f sli med xln blk ang calc pcs, much pyritic, tr wht frsh semi opa chrt, tr filmy RBSFO, filmy stain, tr gas bubs, nodor

lst, dolo in prt, wht tan drk tan f xln dna hrd blk, chrt in prt, sndy gritty in prt, chrt inclu, dull tan gry shrp frsh opa

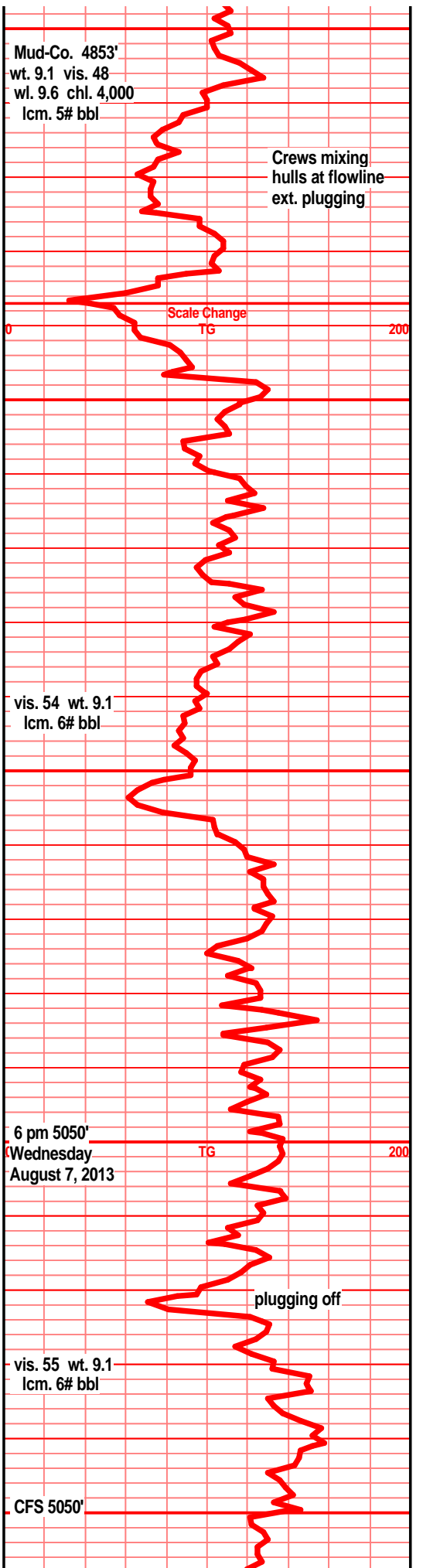
lst, dolo in prt, tan drk tan lt brn, f vf xln dns hrd blk ang pcs, sndy text, tr pyritic, chrt with chrt inclu tan dull gry/tan shrp frsh opa,

lst/dolo tan dull tan lt gry f xln dns hrd blk ang pcs, sndy gritty text in prt, chrt with chrt inclu, tan gry shrp frsh opa,

lst tan drk dull tan lt brn f vf xln dns hrd blk ang, dolo text, sndy gritty in prt, chrt, chrt dull gry opa shrp blk pcs

lst, dolo in prt, drk tan brn, dull tan brn f vf xln dns hrd blk ang, dolo in prt, sndy gritty, chrt, chrt tan dull tan brn shrp frsh opa

lst dolo in prt, drk crm/buff dull tan gry, f vf xln gran soft to hrd dns sndy gritty text, dolo in prt, chrt in prt, much gry tan shrp frsh opa chrt, pyritic in prt,
shl blue gry green, teal green, slick wxy grsy, tr pyrite, tr snd grn inclu, sst gry green tint, f grnd, sub rded, prly srted, w/cem, dolo/silic cem, gry green clay fill, blk ang clstrs & sst crm wht clstrs, f grnd, sub rded grns, w/srted, w/cem, silic cem, tite blk clstrs, tr gilson dead stain, nsfo, no gas, nodor



Crews mixing hulls at flowline ext. plugging

Scale Change TG

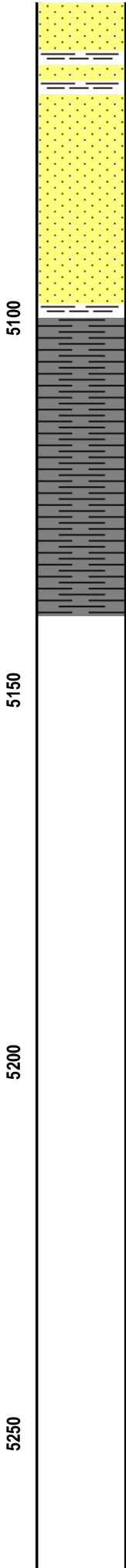
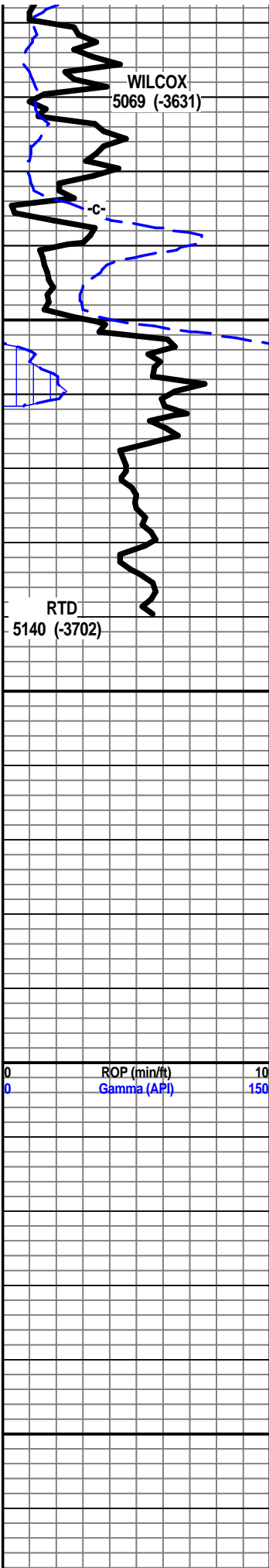
vis. 54 wt. 9.1 lcm. 6# bbl

6 pm 5050' (Wednesday August 7, 2013) TG

plugging off

vis. 55 wt. 9.1 lcm. 6# bbl

CFS 5050'



sst off wht tan & gry f grnd, sub rded, prly tr fair srted, w/cem, silic cem, tr gilsonitic flky dead stain. blkly ang hrd clstrs, tr clr frsted f grnd w/rded, prly cem clstrs, semi fria, inter gran por NS, rare loose grains in spl tray

sst off wht lt tan clstrs f grnd, sub rded to rded, w/srted, fair cem, silic cem, fria to tite, inter grain por, mstly blkly ang clstrs, tr gilsonitic dead flky stain, nsfo, nodor. sst tan lt gry/brn f grnd, sub ang grains, prly srted, fair to w/cem silic cem, silic cem tr w/clay fill, sub fria, gran text, dead gilsonitic stain, nsfo, nodor, rare loose snd grains in sample tray

shl gry drk gry green teal green, snd grn inclu, clr tr frosted, rded to w/rded, mstly prly srted

shl gry green, teal green, slick wxy grsy, snd grain inclu aa, glau in prt

shl gry drk gry, gry mstly teal green, slick wxy grsy some with sndy grain inclu, glau, hvy in prt

Woolsey Operating Company
Circle GU A-2
330' FNL & 900' FWL
Apx. W 1/2 NE NW NW
Section 5-Twp 34S-Rge 10W
Barber County, Kansas
Keebie Field

