



eog resources

600 Seventeenth Street

Suite 1000N

Denver, CO 80202

(303) 572-9000

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

Well Name: Critter Creek 16-20H

Location: Hereford Ranch Prospect

License Number: API: 05-123-31431

Spud Date: July 9, 2010

Surface Coordinates:

Region: D J Basin
Drilling Completed: August 3, 2010
NW/NW (601' FNL & 501' FWL) Section 20, T11N R63W, Weld County, Colorado
Lat 40° 54' 48.38" N Long 104° 27' 50.63" W

Bottom Hole Coordinates

SE/SE (600' FSL & 600' FEL) Section 20, T11N R63W, Weld County, Colorado
Lat 40° 54' 08.13" N Long 104° 26' 56.65" W

Ground Elevation (ft): 5337'

K.B. Elevation (ft): 5359'

Logged Interval (ft): 1550'

Total Depth (ft): 13,049' MD, 7427.9' TVD

Formation: Niobrara 'B' Chalk

Type of Drilling Fluid: Water

Printed by WellSight Log Viewer from WellSight Systems 1-800-447-1534 www.WellSight.com

OPERATOR

Company: EOG RESOURCES INC.

Address: 600 Seventeenth Street, Suite 1000N
Denver, Colorado, 80202

GEOLOGIST

Name: John W. Husk/Mike Dodge Larry Goessman

Company: Husk Inc. / Goolsby Brothers & Assoc. Inc.

Address: John Husk, Husk Inc. Larry Goessman

8229 E. Briarwood Avenue 7756 E. Tennessee Drive

Centennial, CO 80112-1306 Aurora, CO 80017







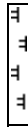
Comments

- 1) Drilling Contractor: DHS Drilling Co., Rig #8
Tool Pusher: Scott Putnam, Robert Roman
Pumps: #1 & #2 PZ-9 5.5" x 9" (.0628 bbl/stk)
- 2) Company Men: Bill Hutto, Neil Magee.
- 3) Directional Services / MWD GR: Nevis Energy Services - Daniel Gilbert, Dusty Moyer, Jack Miller
- 4) Mud Company : Baker Hughes Drilling Fluids
Mud Engineer: Greg Wiggins, Blake Mihalic.
- 5) Contained/Under Balanced Drilling System: Weatherford.
- 6) Gas Detection Equipment: Mudlogging Systems Inc.
by Terra Services
Redbox TGC #ML-417 (Total Gas/Chromatograph) & Ratcliff Agitator

Casing

- 9 5/8" 36# J55 STC set @ 1458'.
- 7" 23# HC-P110 LTC set @ 7769'.
- 4.5" 11.6# P110 LTC from KOP to TD.

ROCK TYPES

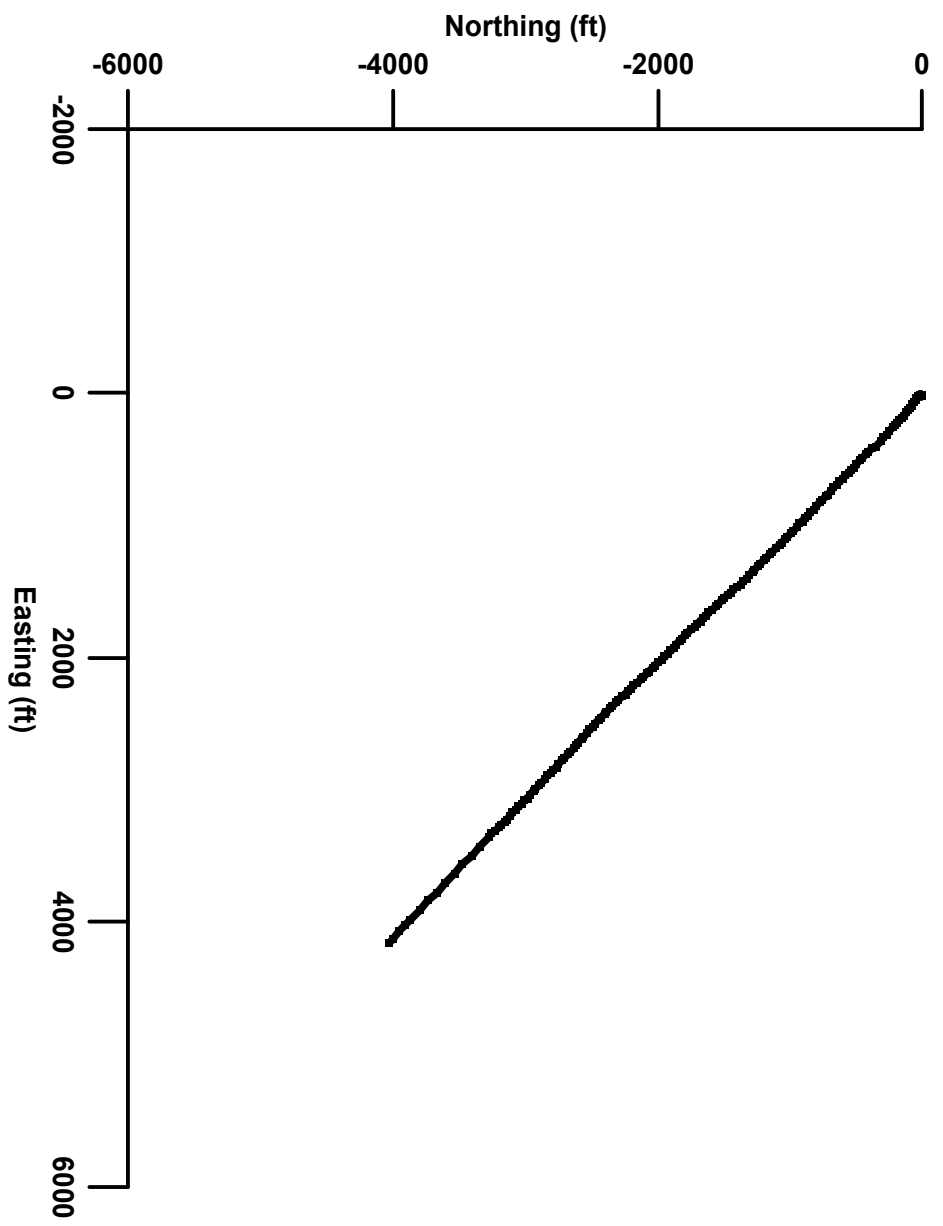
	Siltst2		Brec		Gyp		Shale
	Carb sh		Cht		Igne		Shcol
	Carb chalk		Clyst		Lmst		Shgy
	Arg_ss		Coal		Meta		Siltst
	Anhy		Congl		Mrist		Ss
	Bent		Dol		Salt		Till

ACCESSORIES

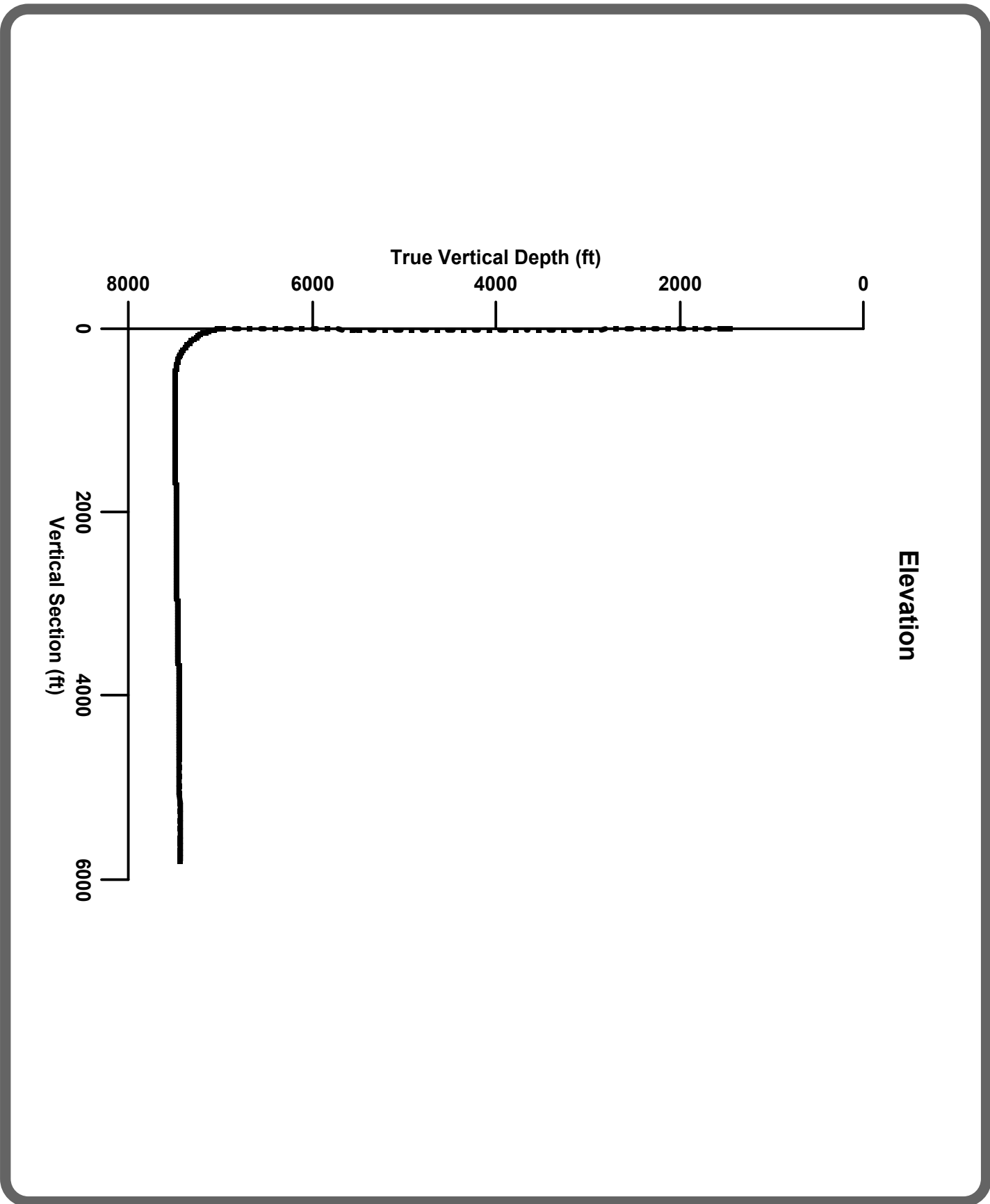
	MINERAL		MINXL		Crin		Dol
	Anhy		Nodule		Echin		Gyp
	Arggrn		Phos		Fish		Ls
	Arg		Pyr		Foram		Mrst
	Bent		Salt		Fossil		Stlstrng
	Bit		Sandy		Gastro		Ssstrng
	Breclfrag		Silt		Oolite		
	Calc		Sill		Ostra		
	Carb		Sulphur		Pelec		
	Chtdk		Tuff		Pellet		
	Chttit				Pisolite		
	Dol				Plant		
	Feldspar		FOSSIL		Strom		
	Ferrpel		Algae				
	Ferr		Amph				
	Glau		Belm				
	Gyp		Bioclst		STRINGER		Stlstrng1
	Hvymn		Brach				Anhy
	Kaol		Bryozoa				Arg
	Marl		Cephal				Bent
			Coral				Coal

OTHER SYMBOLS

	POROSITY		SORTING		OIL SHOW		EVENT
	Earthy		Well		Even		Rft
	Fenest		Moderate		Spotted		Sidewall
	Fracture		Poor		Patchy		Cn_hzl
	Inter				Ques		Off bottom
	Moldic				Dead		Bit
	Organic		ROUNDING		INTERVAL		Casing
	Pinpoint		Rounded		Core		
	Vuggy		Subrnd		Dst		
			Subang				
			Angular				



Plan



Elevation

True Vertical Depth (ft)

Vertical Section (ft)

8000

6000

4000

2000

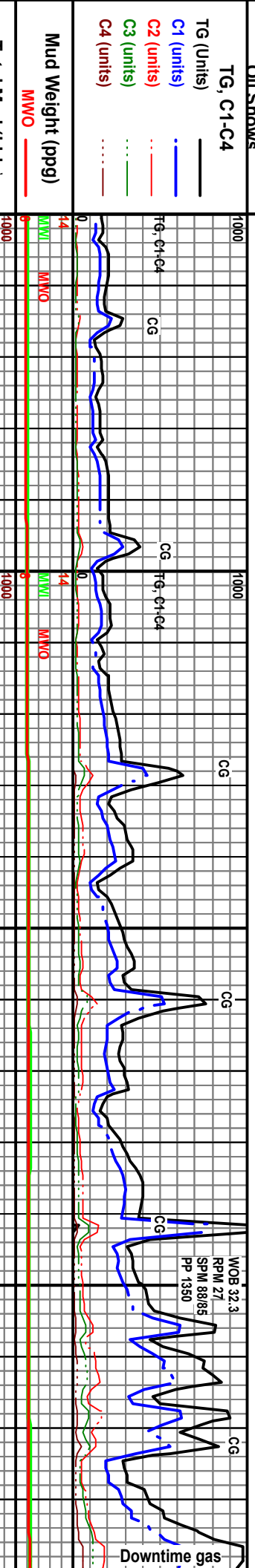
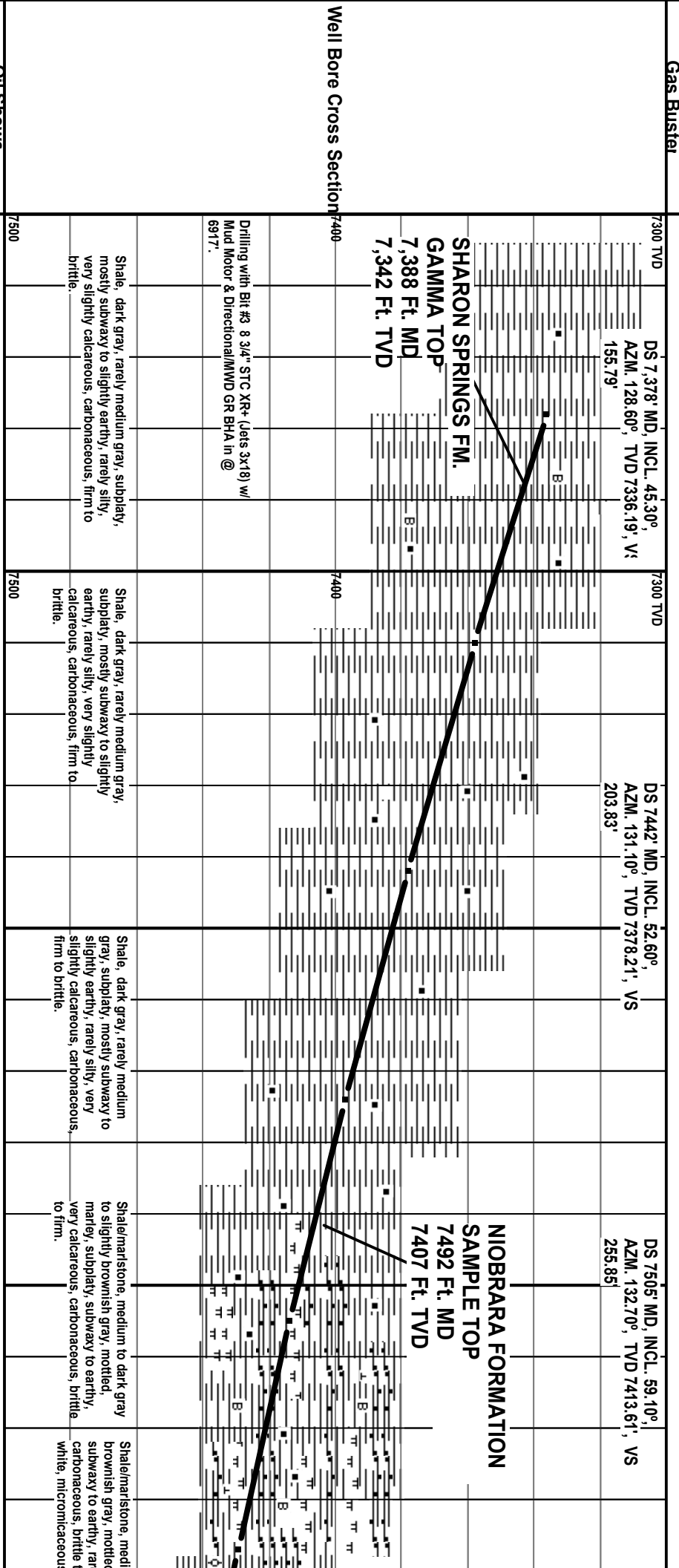
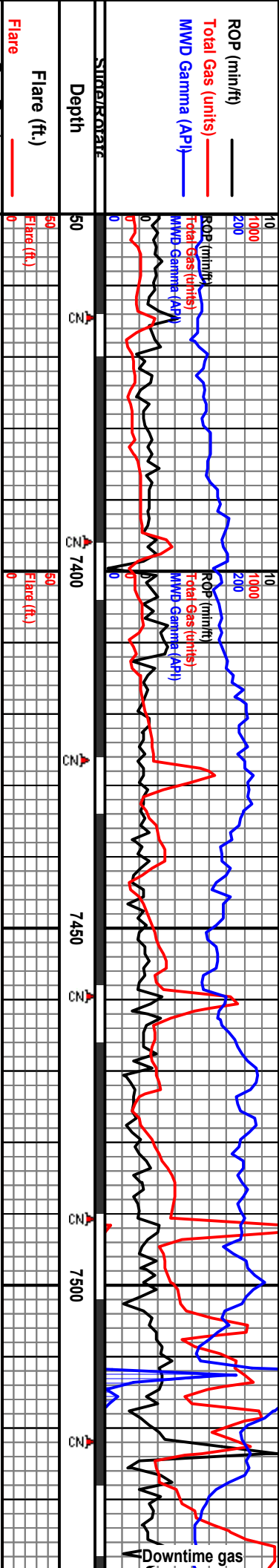
0

0

2000

4000

6000



DS 7,378' MD, INCL. 45.30°, AZM. 128.60°, TVD 7336.19', VS 155.79'

DS 7442' MD, INCL. 52.60°, AZM. 131.10°, TVD 7378.21', VS 203.83'

DS 7505' MD, INCL. 59.10°, AZM. 132.70°, TVD 7413.61', VS 255.85'

SHARON SPRINGS FM.
GAMMA TOP
7,388 Ft. MD
7,342 Ft. TVD

NIOBRARA FORMATION
SAMPLE TOP
7492 Ft. MD
7407 Ft. TVD

Drilling with Bit #3 8 3/4" STC XR+ (Jets 3x18) w/
Mud Motor & Directional/MWD GR BHA in @
6917'.

Shale, dark gray, rarely medium gray, subplaty, mostly subwaxy to slightly earthy, rarely silty, very slightly calcareous, carbonaceous, firm to brittle.

Shale, dark gray, rarely medium gray, subplaty, mostly subwaxy to slightly earthy, rarely silty, very slightly calcareous, carbonaceous, firm to brittle.

Shale, dark gray, rarely medium gray, subplaty, mostly subwaxy to slightly earthy, rarely silty, very slightly calcareous, carbonaceous, firm to brittle.

Shale/marlstone, medium to dark gray to slightly brownish gray, mottled, marley, subplaty subwaxy to earthy, very calcareous, carbonaceous, brittle to firm.

Shale/marlstone, medi brownish gray, mottled subwaxy to earthy, rare carbonaceous, brittle white, micromicaceous

CG
TG, C1-C4

CG
TG, C1-C4

CG

CG

CG
WOB 32.3
RPM 27
SPM 88/85
PP 1350

CG

Downtime gas

MWD
MWO

MWD
MWO

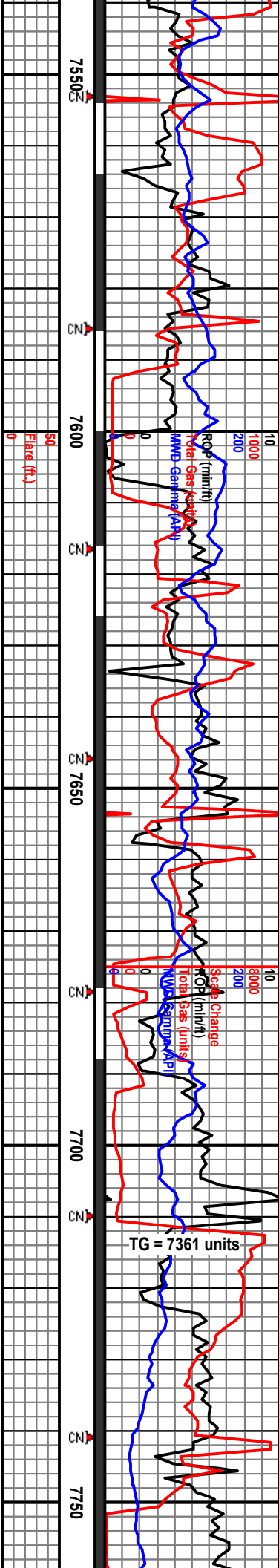
MWD
MWO

MWD
MWO

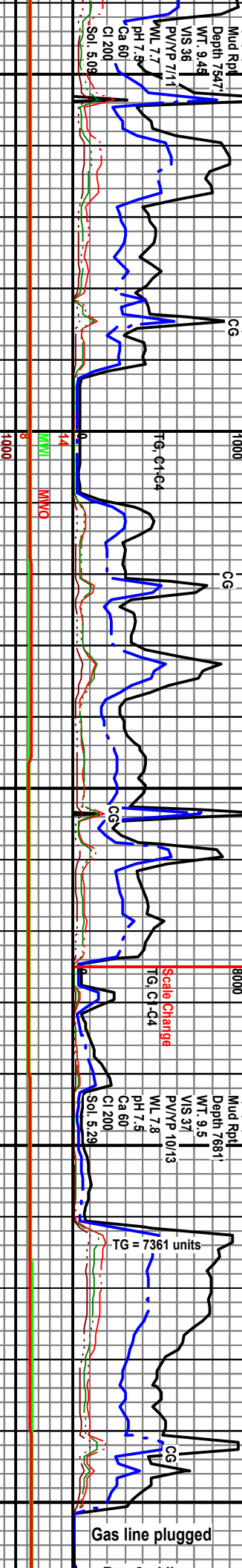
MWD
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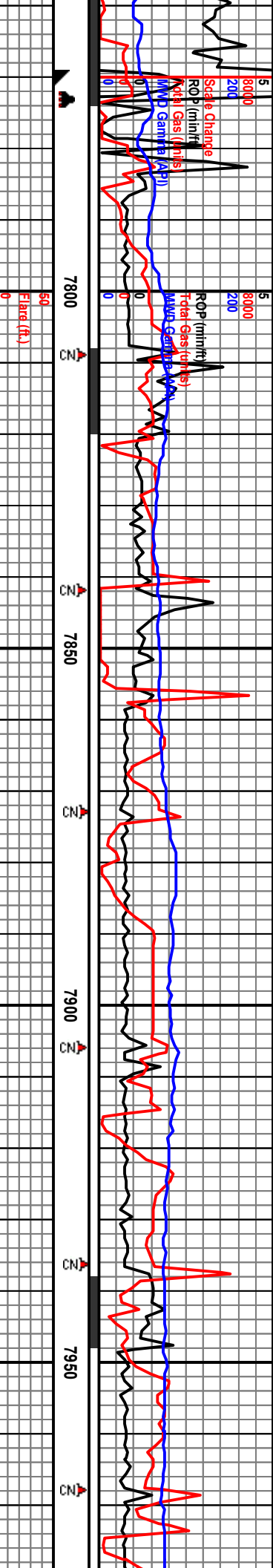
MWD
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MWD
MWO



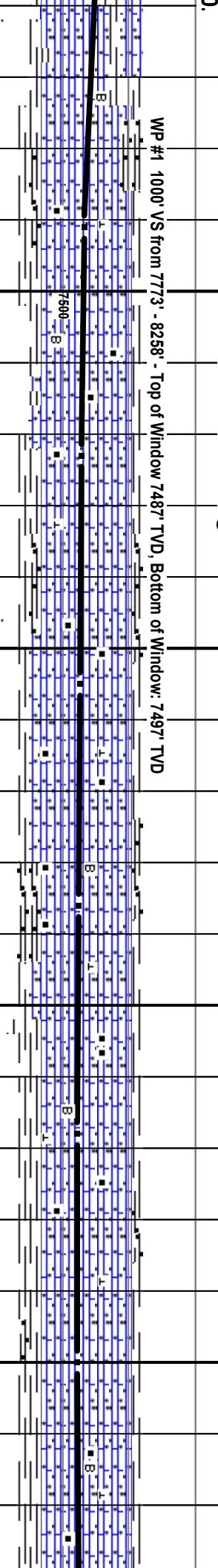
Well ID	MD (ft)	Inclination	VS	Depth (ft)	Description
DS 7567'	MD, INCL. 65.60°	AZM. 132.10°	TVD 7442.48'	VS 310.63'	Shale/marstone, medium to dark gray to slightly brownish gray, mottled, marley, subplaty, subswaxy to earthy, very calcareous, carbonaceous, brittle to firm. Bentonite, gray white, micromicaceous, amorphous to platy, soft.
DS 7630'	MD, INCL. 71.20°	AZM. 132.40°	TVD 7465.85'	VS 369.06'	Shale/marstone, medium to dark gray to slightly brownish gray, mottled, marley, subplaty, subswaxy to earthy, very calcareous, carbonaceous, brittle to firm. Bentonite, gray white, micromicaceous, amorphous to platy, soft. Possible traces of carbonaceous chalk with calcite filled microfractures, no cut.
DS 7693'	MD, INCL. 78.90°	AZM. 133.30°	TVD 7481.88'	VS 429.91'	Carbonaceous Chalk, light to medium gray, mottled, limy-very calcareous, marly in part, rare oolites, subplaty, rarely splintery, rare white calcite filled microfractures, firm to brittle to soft, very faint yellow fluorescence, immediate cut, cut and fluorescence may be from drilling mud chemicals. Bentonite off white, amorphous, trace Bentonite, gray white, amorphous.
DS 7725'	MD, INCL. 82.0°	AZM. 133.5°	TVD 7487.19'	VS 461.45'	Carbonaceous Chalk, light to medium gray, mottled, limy-very calcareous, very slightly marly in part, subplaty to occasionally subblocky, rarely splintery, rare oolites, rare white calcite filled microfractures, firm to brittle to soft. Pale yellow fluorescence, in both washed and unwashed samples, slow to moderate blooming cut, thick film and ring when dried. Droplets of oil/rainbow in possess belly.
Landir 87.50°	was re 7/18/14				Carbonaceous gray, mottled slightly marly occasionally rare white firm to brittle fluorescent unwashed blooming dried. Droplets belly.



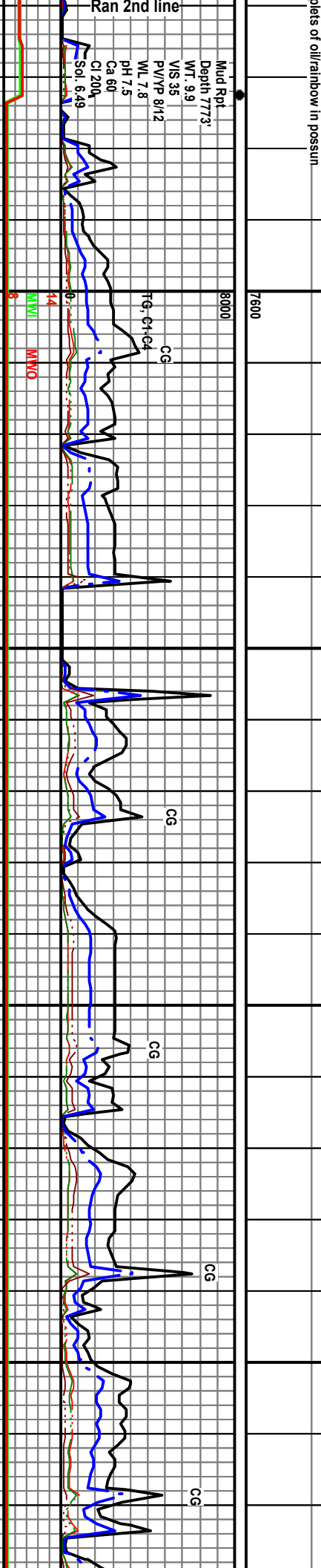


DS 7791' MD, INCL. 87.30°, AZM. 136.6°, TVD 7493.34', VS 527.11'	DS 7823' MD, INCL. 88.50°, AZM. 136.10°, TVD 7493.52', VS 559.07'	DS 7855' MD, INCL. 89.80°, AZM. 135.80°, TVD 7494.99', VS 591.06'	DS 7918' MD, INCL. 89.10°, AZM. 135.30°, TVD 7495.63', VS 654.05'	DS 7981' MD, INCL. 89.10°, AZM. 135.10°, TVD 7496.33', VS 717.04'
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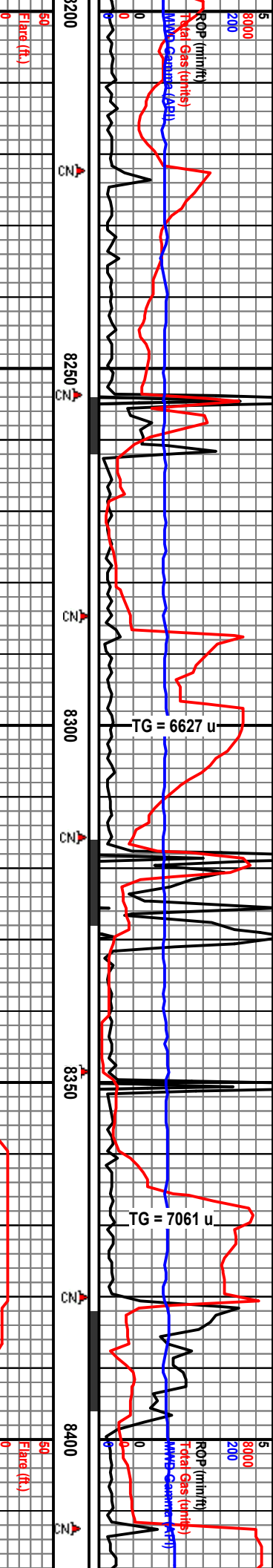
7" 23# HC-P110 LTC Casing set @ 7769'. Drill Out @ 19:30 7/22/10. NB #4 6" Nevis PDC (Jets 5x9) w/ Mud Motor & Directional MWD GR BHA In @ 7778'.
 WP #1 1000' VS from 7773' - 8258' - Top of Window 7487' TVD, Bottom of Window: 7497' TVD
 7/23/10



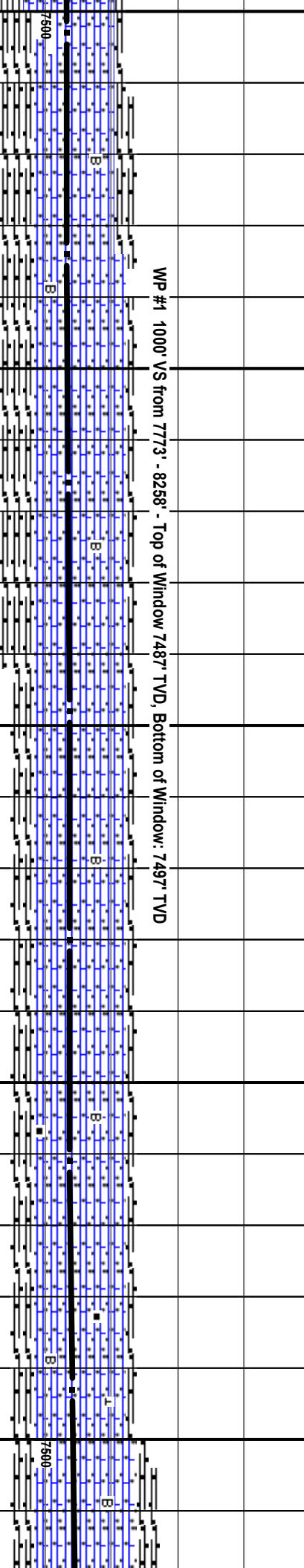
Carbonaceous Chalk, light to medium gray, mottled, limy-very calcareous, very slightly marly in part, subplaty to occasionally subblocky, rarely splintery, rare white calcite filled microfractures, firm to brittle to soft. Trace Bentonite, gray white, amorphous.
 Carbonaceous Chalk, light to medium gray, mottled, limy-very calcareous, very slightly marly in part, subplaty to occasionally subblocky, rarely splintery, rare white calcite filled microfractures, firm to brittle to soft. Trace Bentonite, gray white, amorphous.
 Carbonaceous Chalk, light to medium gray, mottled, limy-very calcareous, very slightly marly in part, subplaty to occasionally subblocky, rarely splintery, rare white calcite filled microfractures, firm to brittle to soft. Trace Bentonite, gray white, amorphous.
 Carbonaceous Chalk, light to medium gray, mottled, limy-very calcareous, very slightly marly in part, subplaty to occasionally subblocky, rarely splintery, rare white calcite filled microfractures, firm to brittle to soft. Trace Bentonite, gray white, amorphous.



Ran 2nd line
 Mud Rpt Depth 7773' WT. 9.9' VIS 35 P/VYP 8/12 WL 7.8 pH 7.5 Ca 60 Cl 2004 Sol. 6.49
 CG
 TG, CH-G4
 MWD
 MWD

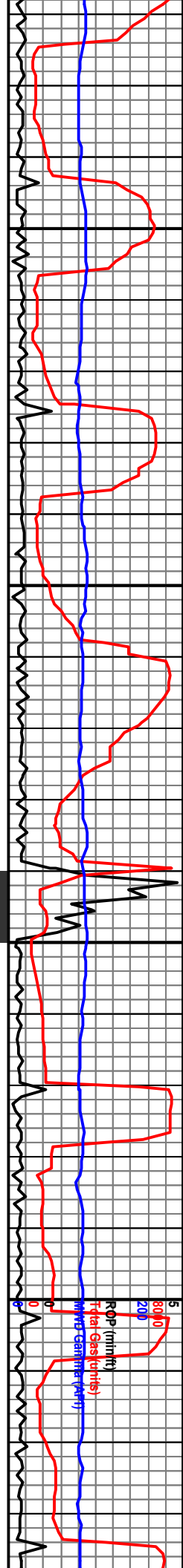


Well ID	Depth (ft)	Depth (m)	Orientation
DS 8234'	MD, INCL. 90.5°		
	AZM. 133.40°	TVD 7493.37'	VS
			970.2'
DS 8298'	MD, INCL. 90.5°		
	AZM. 132.10°	TVD 7492.81'	VS
			1033.97.2'
DS 8361'	MD, INCL. 90.4°		
	AZM. 133.30°	TVD 7492.51'	VS
			1096.91.2'
DS 842			
	AZM. 1		
			1160.89'



Well ID	Depth (ft)	Depth (m)	Orientation
WP #1	1000' VS from 7773' - 8258'		
			Top of Window 7487' TVD, Bottom of Window: 7497' TVD
WP #2	2000' VS from 8258' - 9258'		
			Top of Window 7473' TVD, Bottom of Window: 7483' TVD

Depth (ft)	Depth (m)	ROP (min/hr)	Total Gas (units)	MWOC (ppm)	Notes
8000	2438				Mud Rpt. Depth 8222', WT. 8.4, V/S 28, P/V/P 1/1, Fg-C1-G4, Ca 800, CI 200, Sol. 0, CG
7600	2313				Carbonaceous Chalk, medium to dark gray, black in part, mottled, limy-very calcareous, rarely marly, subplaty to occasionally subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Pale yellow fluorescence, in both washed and unwashed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.
8000	2438				Carbonaceous Chalk, medium to dark gray, black in part, mottled, limy-very calcareous, rarely marly, subplaty to occasionally subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Pale yellow fluorescence, in both washed and unwashed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.
7600	2313				Carbonaceous Chalk, medium to dark gray, black in part, mottled, limy-very calcareous, rarely marly, subplaty to occasionally subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Pale yellow fluorescence, in both washed and unwashed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.
8000	2438				Carbonaceous Chalk, medium to dark gray, black in part, mottled, limy-very calcareous, rarely marly, subplaty to occasionally subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Pale yellow fluorescence, in both washed and unwashed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.
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7600	2313				Carbonaceous Chalk, medium to dark gray, black in part, mottled, limy-very calcareous, rarely marly, subplaty to occasionally subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Pale yellow fluorescence, in both washed and unwashed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.



8600' 8550' 8500' 8450' 8400'

DS 8615' MD, INCL. 89.8°, AZM. 133.40°, TVD 7490.34', VS 1350.88'

DS 8552' MD, INCL. 90.6°, AZM. 134.00°, TVD 7490.67', VS 1287.8'

DS 8488' MD, INCL. 89.9°, AZM. 134.50°, TVD 7490.36', VS 1223.88'

5' MD, INCL. 91.6°, AZM. 135.00°, TVD 7491.06', VS 2'

chalk, medium to dark, gray, black, mottled, limy in part-very calcareous, rare white calcite filler

firm to brittle to soft. Pale yellow both washed and unwashed late flashing white cut, in washed film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

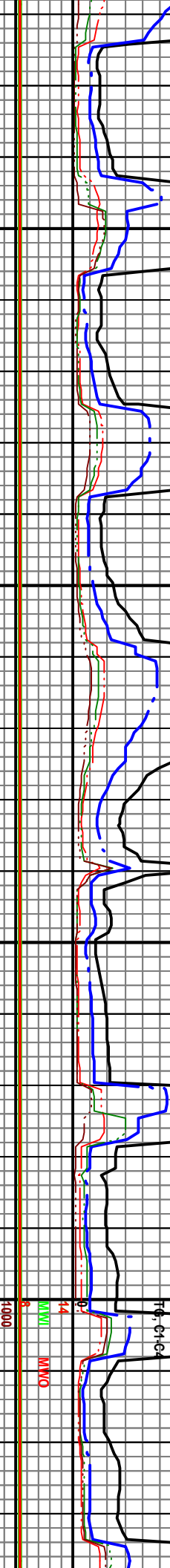
Carbonaceous Chalk, medium to mostly dark gray to black, mottled, limy in part-very calcareous, subblocky to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

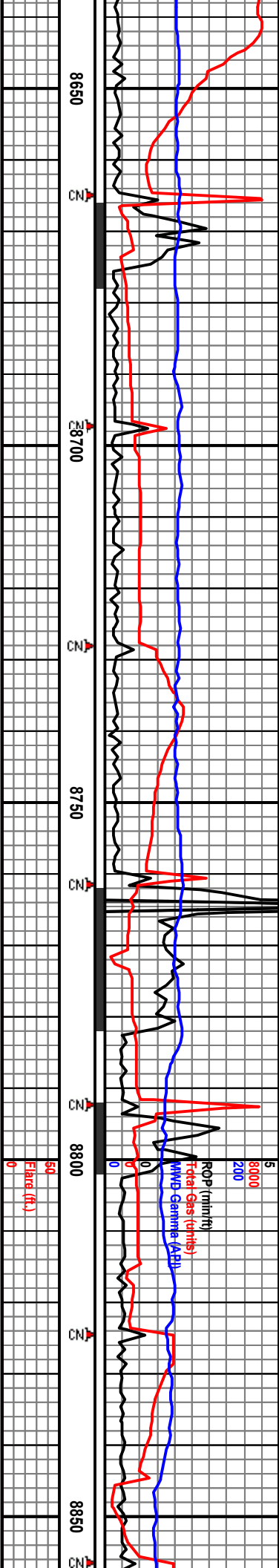
Carbonaceous Chalk, medium to mostly dark gray to black, mottled, limy in part-very calcareous, subblocky to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

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WOB 11.9
RPM 581
SPM 0/104
PP 1927

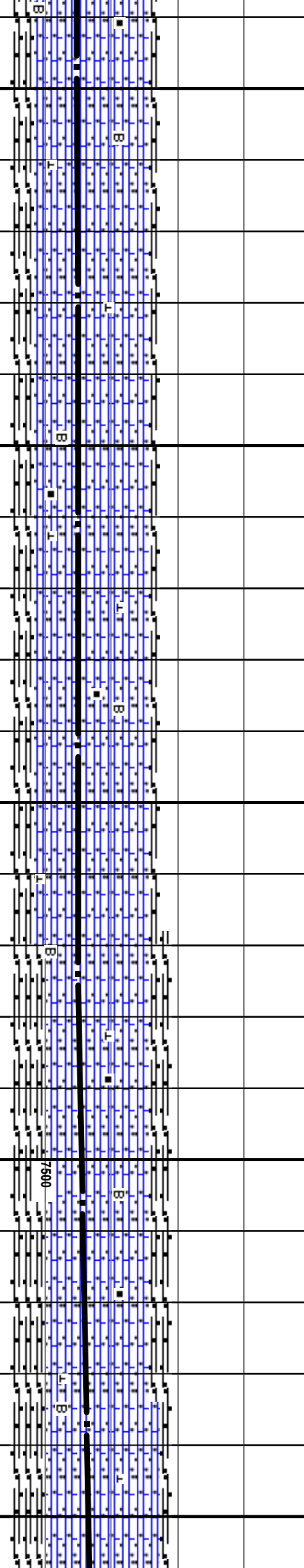




DS 8679' MD, INCL. 90.8°
 AZM. 134.50°, TVD 7490.23', VS
 1414.87'

DS 8742' MD, INCL. 89.5°
 AZM. 133.2°, TVD 7490.21',
 VS 1477.86'

7400 TVD
 DS 8806' MD, INCL. 92.4°
 AZM. 134.7°, TVD 7488.73', VS
 1541.82'

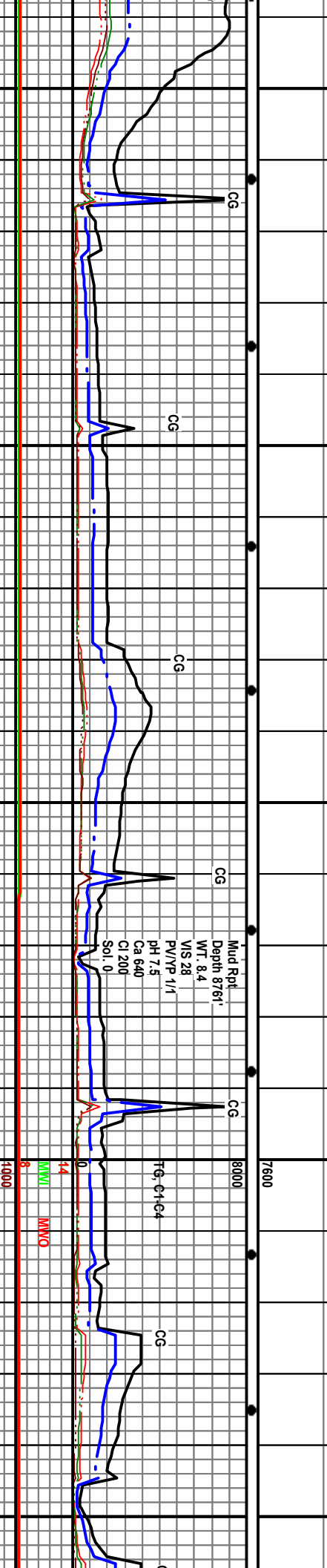


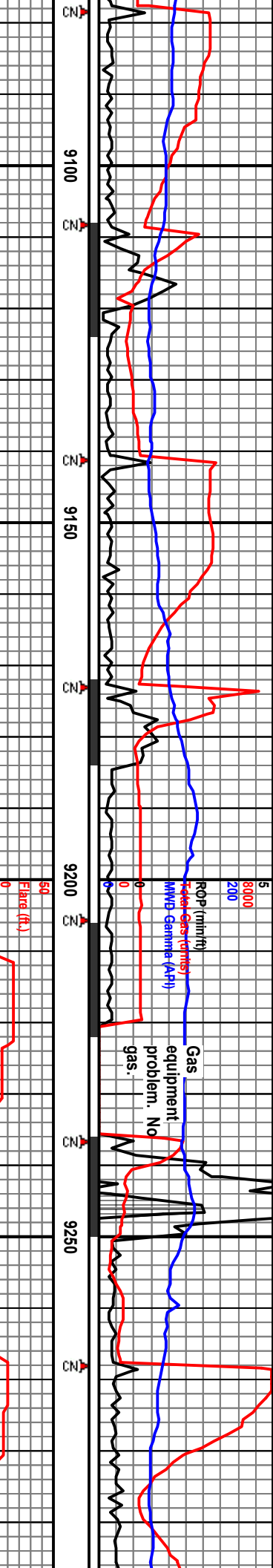
Carbonaceous Chalk, medium to mostly dark gray to black, mottled, limy in part-very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, medium to mostly dark gray to black, mottled, limy in part-very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Abundant yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

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Carbonaceous Chalk, medium to mostly dark gray to black, mottled, limy in part-very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.





DS 9123' MD, INCL. 92.2°
AZM. 135.20°, TVD 7475.55', VS
1858.53'

7/24/10

DS 9186' MD, INCL. 91.7°
AZM. 135.9°, TVD 7473.38', VS
1921.48'

DS 9281' MD, INCL. 88.6°
AZM. 137.6°, TVD 7473.00', VS
2016.37'

WP #2 2000' VS from 8258' - 9258' - Top of Window 7473' TVD, Bottom of Window 7470' TVD

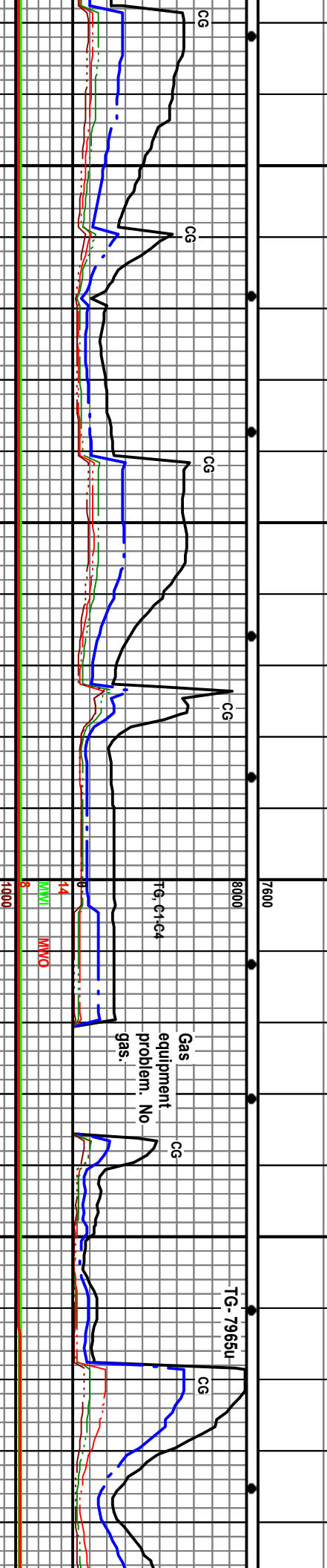
WP #3 2500' VS from 9258' - 9758' - Top of Window 7470' TVD, Bottom of Window 7470' TVD

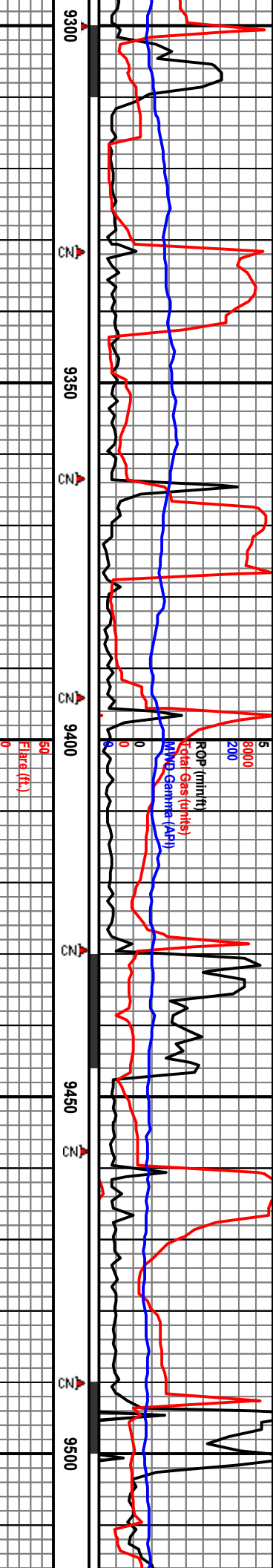
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Carbonaceous Chalk, medium to mostly dark gray to black, mottled, limy in part-very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, dark gray to black, rarely medium, mottled in part, rarely limy, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

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DS 9313' MD, INCL. 88.9°, AZM. 138.1°, TVD 7474.47', VS 2048.31'

DS 9376' MD, INCL. 88.9°, AZM. 137.6°, TVD 7476.57', VS 2111.19'

DS 9440' MD, INCL. 89.9°, AZM. 137.6°, TVD 7476.74', VS 2175.1'

DS 9503' MD, INCL. 91.3°, AZM. 137.6°, TVD 7476.2238.03'



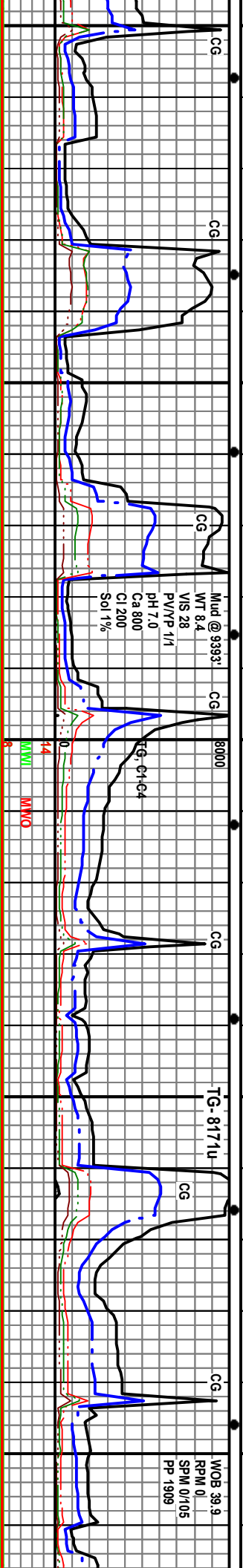
Carbonaceous Chalk, dark gray to black, rarely medium, mottled in part, rarely limy, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, dark gray to black, rarely medium, mottled in part, rarely limy, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, dark gray to black, rarely medium, mottled in part, rarely limy, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in both washed and unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

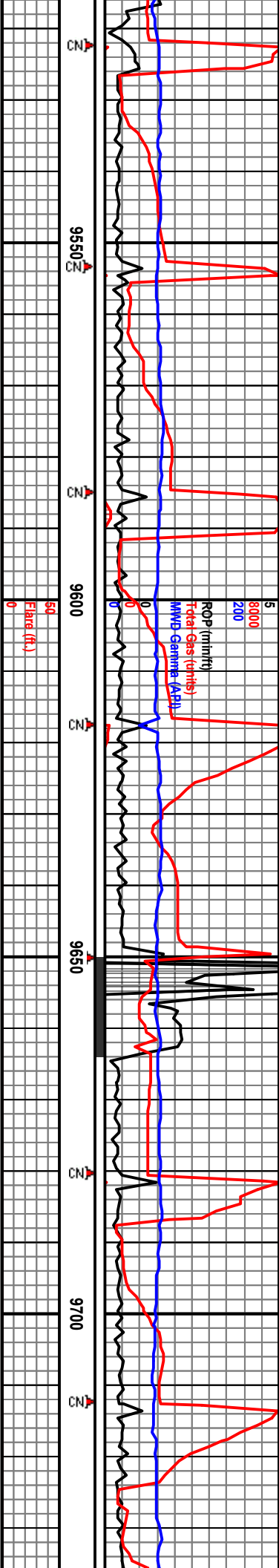
Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence, in washed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous black, occasional in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence, in washed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.



Mud @ 9393:
WT 8.4
V/S 38
PV/PP 1/1
pH 7.0
Ca 800
Cl 200
Sol 1%

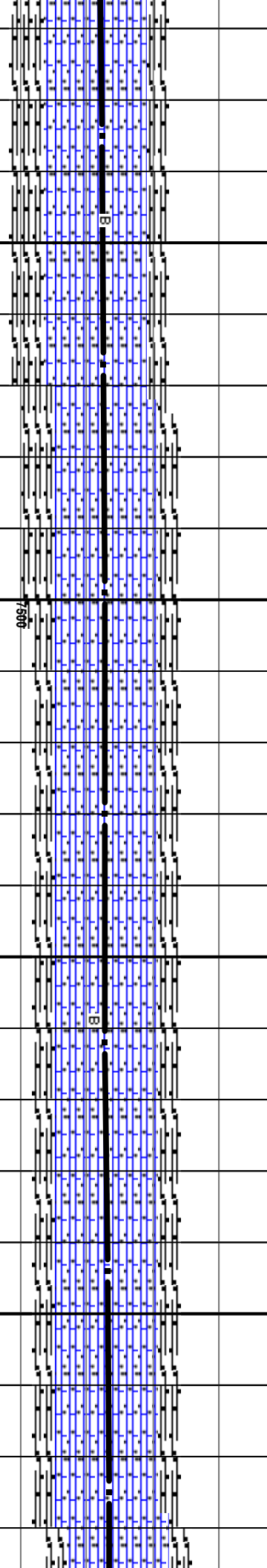
WOB 39.9
RPM 0
SPM 0/105
PP 1909



DS 9567' MD, INCL. 90.9°, VS
 AZM, 136.5°, TVD 7475.02', VS
 2301.95'

DS 9630' MD, INCL. 90.2°, VS
 AZM, 136.3°, TVD 7474.66', VS
 2364.9'

DS 9694' MD, INCL. 90.9°, VS
 AZM, 136.0°, TVD 7473.91', VS
 2428.87'

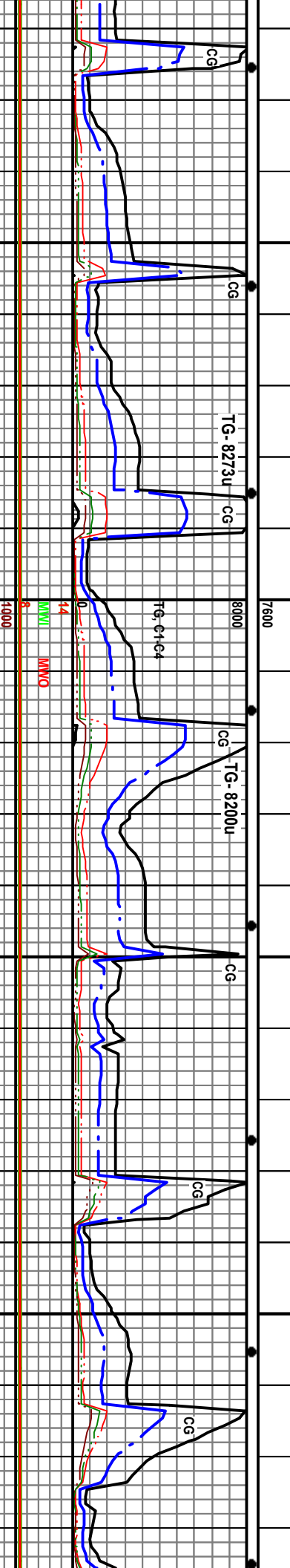


Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples. Immediate flashing white cut, in washed sample: thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples. Immediate flashing white cut, in washed sample: thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples. Immediate flashing white cut, in washed sample: thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

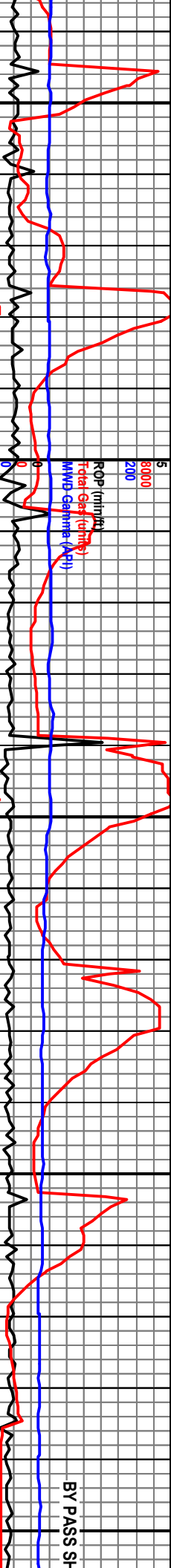
Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples. Immediate flashing white cut, in washed sample: thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.



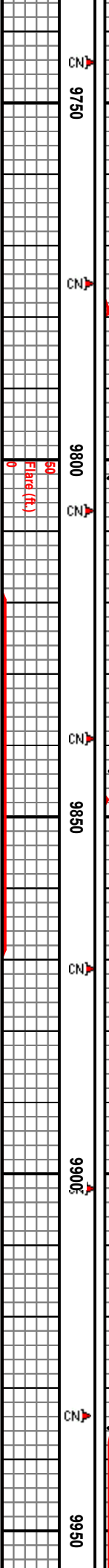
DS 9567' MD, INCL. 90.9°, VS
 AZM, 136.5°, TVD 7475.02', VS
 2301.95'

DS 9630' MD, INCL. 90.2°, VS
 AZM, 136.3°, TVD 7474.66', VS
 2364.9'

DS 9694' MD, INCL. 90.9°, VS
 AZM, 136.0°, TVD 7473.91', VS
 2428.87'



BY PASS SH



DS 9757' MD, INCL. 90.4°, AZM. 135.3°, TVD 7473.11', VS 2491.85'

DS 9821' MD, INCL. 90.3°, AZM. 135.6°, TVD 7472.11', VS 2855.85'

DS 9884' MD, INCL. 90.2°, AZM. 135.2°, TVD 7472.39', VS 2618.84'

DS 9947' MD, INCL. 90.7°, AZM. 135.7°, TVD 7471.82', VS 2691.83'

WP #3 2500' VS from 9258' - 9758' - Top of Window 7470' TVD, Bottom of Window: 7480' TVD

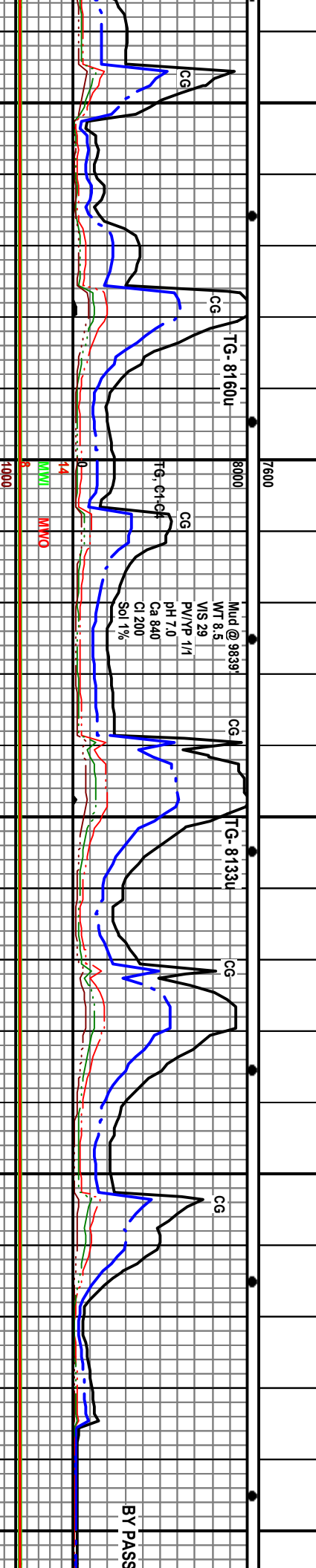
WP #4 3000' VS from 9758' - 10258' - Top of Window 7465' TVD, Bottom of Window: 7475' TVD

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples. Immediate flashing white cut, in washed sample: thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

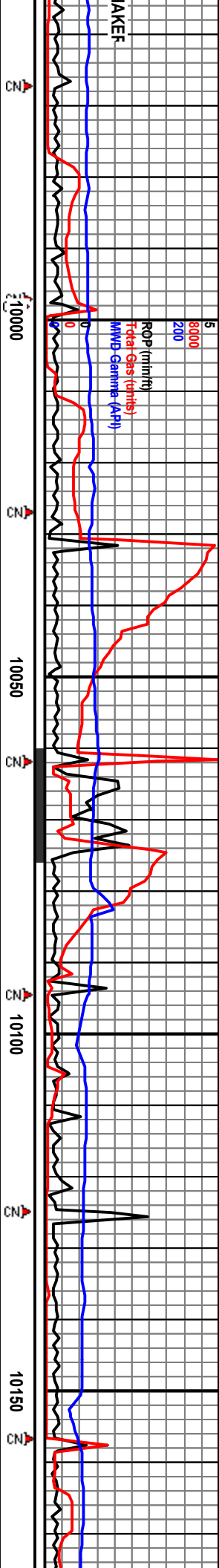
Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples. Immediate flashing white cut, in washed sample: thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, limy in part, very calcareous, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples. Immediate flashing white cut, in washed sample: thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white amorphous.



BY PASSSS



LAKEF

ROP (min/ft)
Fickel Gas (units)
MWG Gamma (API)

5d
EIRad (ft)

DS 9979 MD, INCL. 90.9°,
AZM. 135.6°, TVD 7471.37', VS
2713.82'

Start Going through Weatherford
Separator

DS 10043 MD, INCL. 91.1°
AZM. 135.5°, TVD 7470.2', VS
2777.80'

DS 10074 MD, INCL. 90.1°
AZM. 135.9°, TVD 7469.87', VS
2808.79'

DS 10106 MD, INCL. 90.3°
AZM. 136.1°, TVD 7469.76', VS
2840.78'

DS 10170 MD,
AZM. 135.3°, T
2904.76'

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, earthy to grainy to subwaxy, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

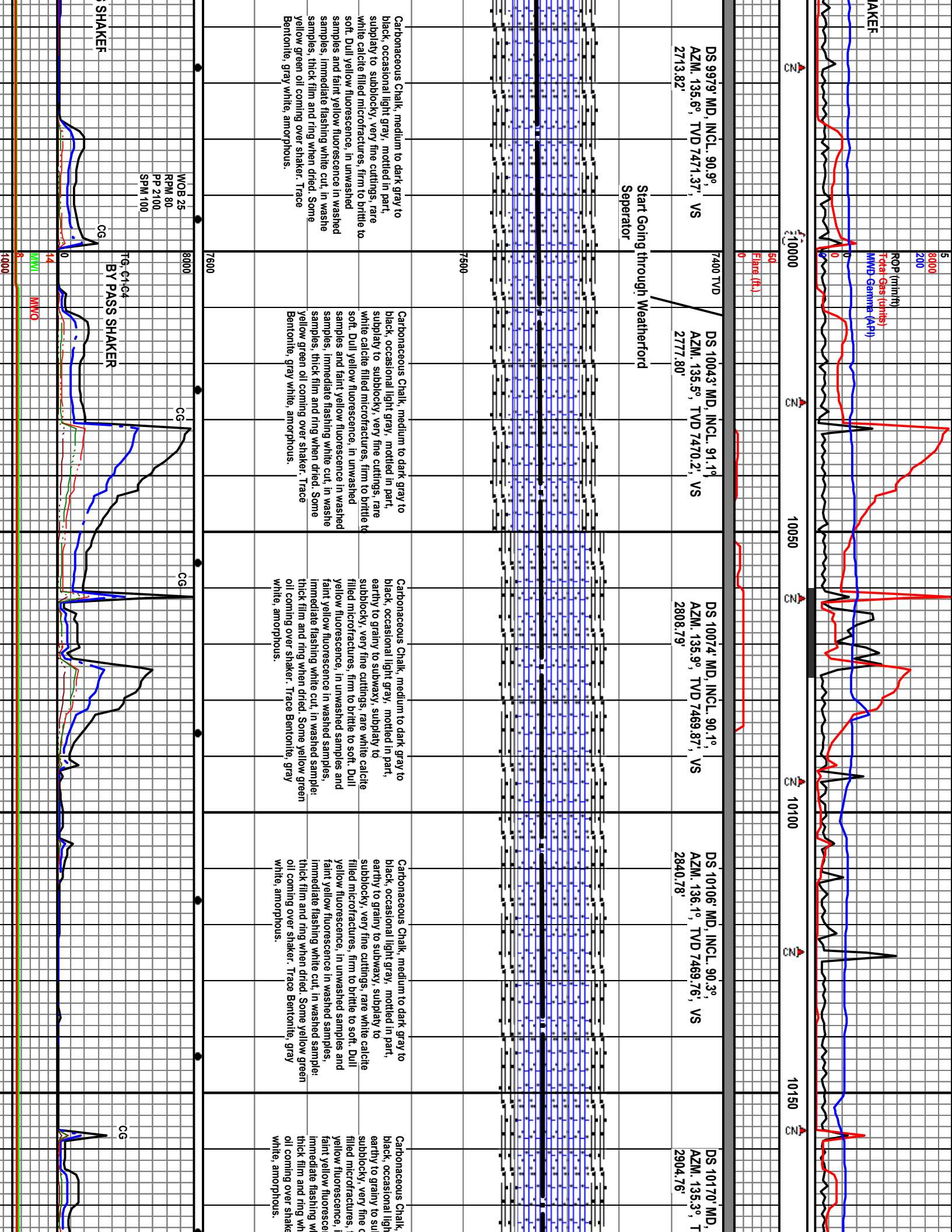
Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, earthy to grainy to subwaxy, subplaty to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

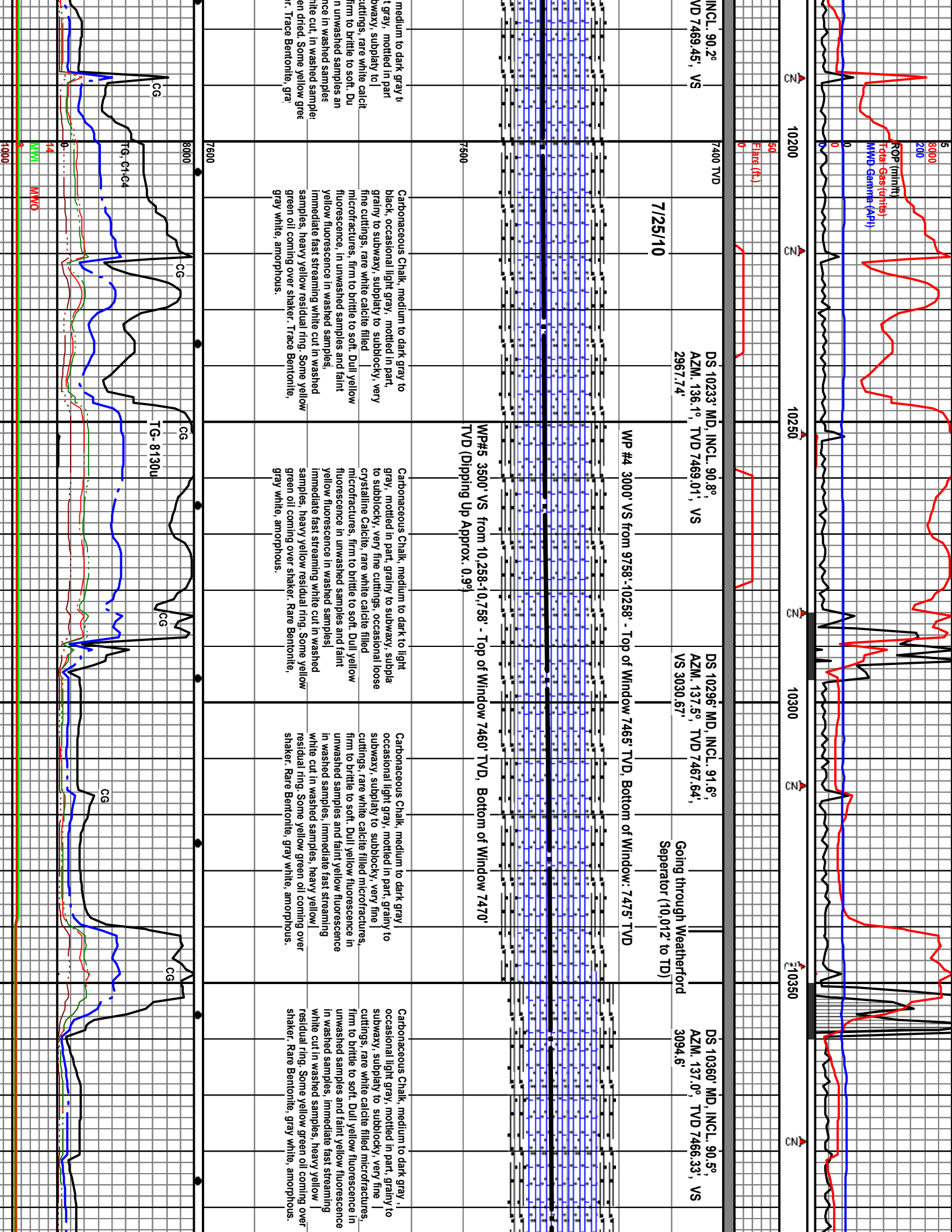
Carbonaceous Chalk, medium to dark gray to black, occasional light gray, mottled in part, earthy to grainy to subblocky, very fine cuttings, rare white calcite filled microfractures, firm to brittle to soft. Dull yellow fluorescence, in unwashed samples and faint yellow fluorescence in washed samples, immediate flashing white cut, in washed samples, thick film and ring when dried. Some yellow green oil coming over shaker. Trace Bentonite, gray white, amorphous.

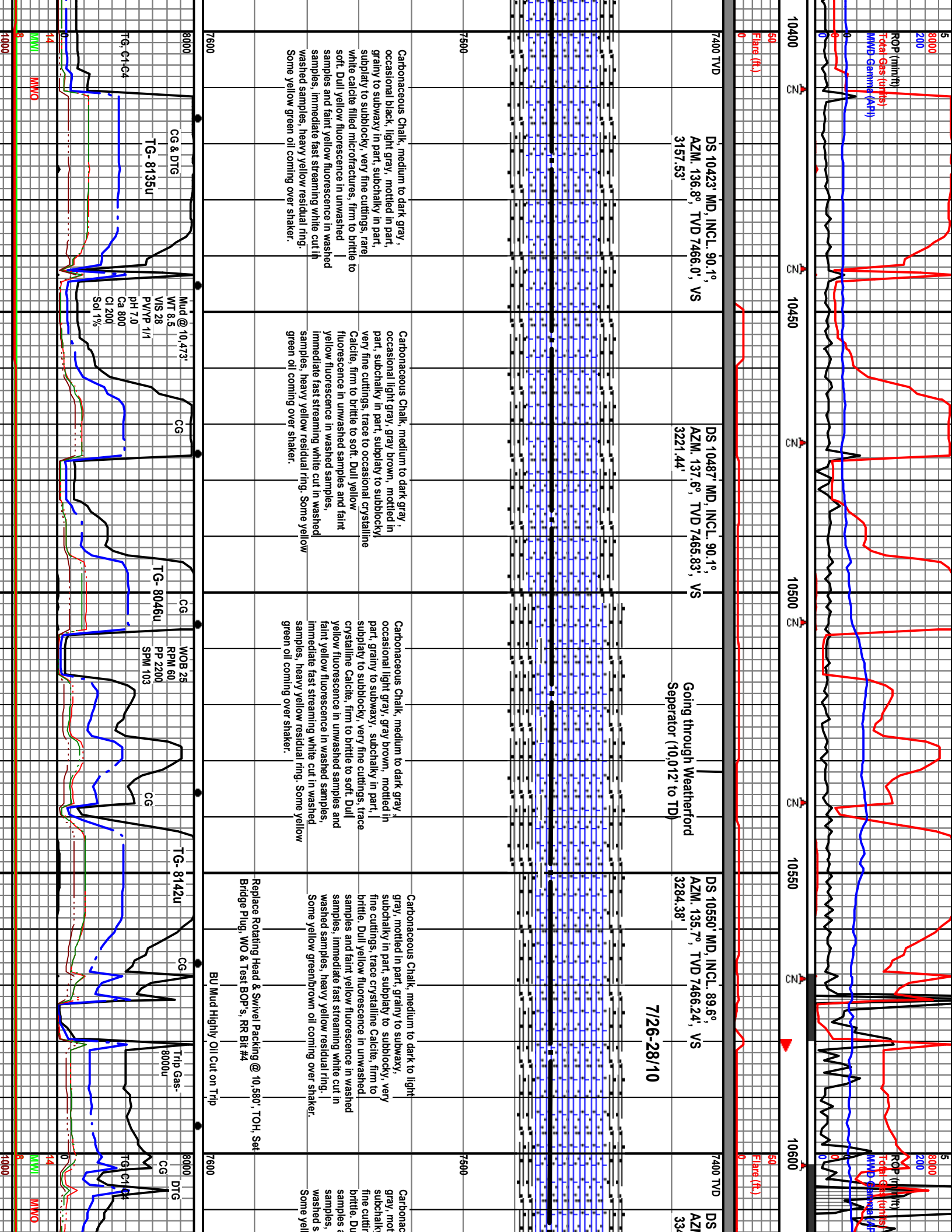
WOB 25
RPM 80
PP 2100
SPM 100

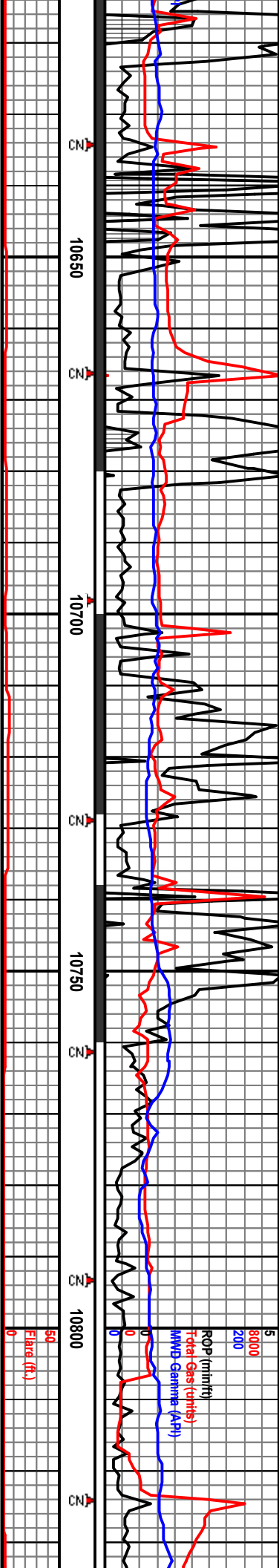
CG
BY PASS SHAKER
FG-6164
MWI
MWO

CG









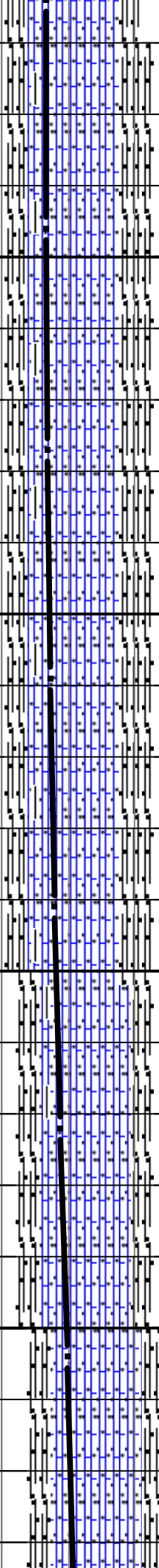
10614' MD, INCL. 89.8°
 AZM. 135.4°, TVD 7466.63', VS
 38.36'

DS 10677' MD, INCL. 91.2°
 AZM. 133.6°, TVD 7466.31',
 VS 3411.35'

DS 10741' MD, INCL. 92.6°
 AZM. 132.1°, TVD 7464.36', VS
 3475.29'

DS 10804' MD, INCL. 93.3°
 AZM. 132.1°, TVD 7460.3538-.12'

July 29, 2010



WP#6 4000' VS ~10,750-11,250' MD - Top of Window 7440' TVD, Bottom of Window 7450' TVD (Dipping Up Approx. 0.9°)
 Sample Quality Becoming Poor.

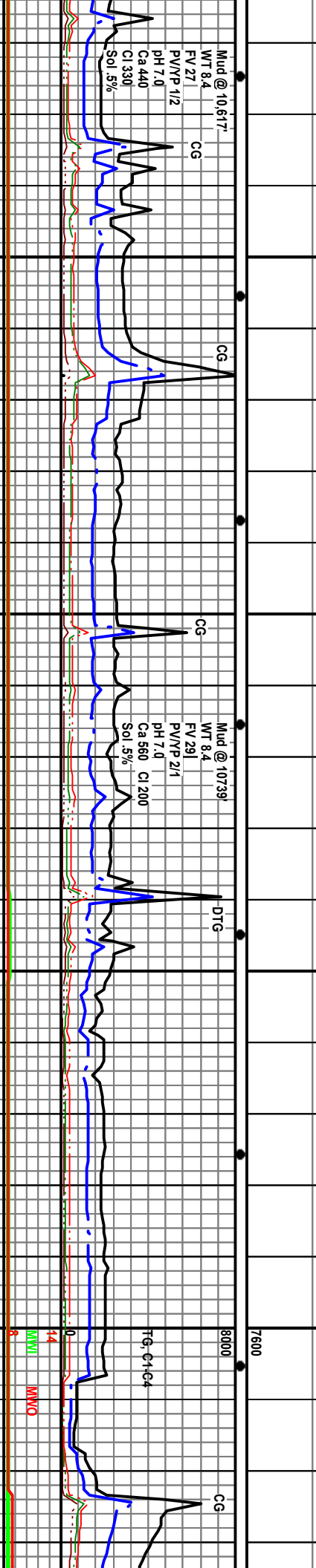
aceous Chalk, medium to dark to light
 In part, grainy to subwaxy
 In part, subplaty to subblocky, ver
 tically, trace crystalline Calcite, firm to
 brittle, yellow fluorescence in unwashed
 and faint yellow fluorescence in washed
 samples, heavy yellow residual ring
 low greenbrown oil coming over shaker

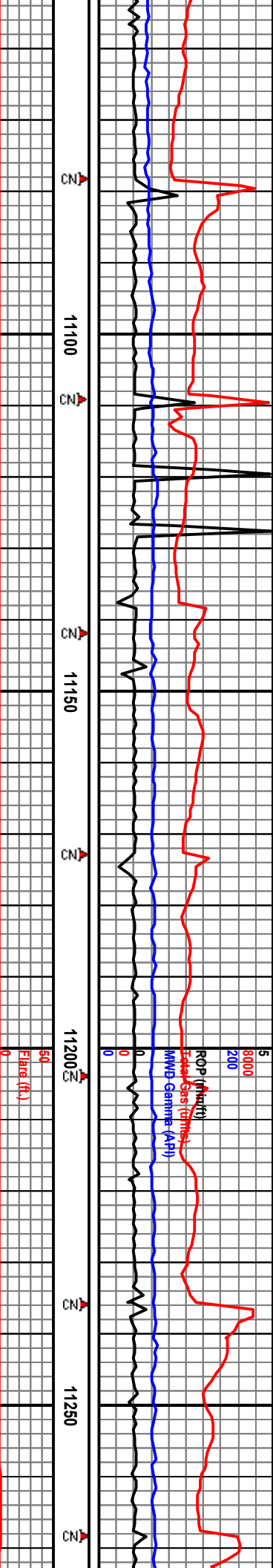
Carbonaceous Chalk, medium to dark gray, slightly
 mottled in part, earthy to subwaxy, subcherty in part,
 subplaty to subblocky, becoming argillaceous in part
 cuttings becoming slightly coarser, trace crystalline
 Calcite & Indistinct Fossil frags, firm to brittle. Show
 as before.
 With Shale dark gray,
 subplaty, earthy, calcareous, slightly to moderately
 carbonaceous, marly in part.

Carbonaceous Chalk, dark to medium gray,
 graybrown, light gray, earthy to subwaxy to
 slightly gritty, subblocky to subplaty, argillaceous
 in part with Shale partings, trace-occasional
 crystalline Calcite and Fossil fragments, trace
 micro Pyrite, firm to brittle. Dull yellow
 fluorescence in unwashed samples and faint
 yellow fluorescence in washed samples,
 immediate fast streaming white cut in washed
 samples, heavy yellow residual ring. Some yellow
 greenbrown oil coming over shaker.

Carbonaceous Chalk, dark gray, black, medium
 gray-graybrown, earthy to subwaxy, slightly
 grainy in part, subblocky to subplaty,
 occasionally slightly argillaceous,
 trace-occasional crystalline Calcite, firm to brittle.
 Heavy dark gray to black oil stain. Dull to
 moderate yellow fluorescence in unwashed and
 washed samples, immediate flash white cut,
 heavy yellow residual ring. Some yellow
 greenbrown oil coming over shaker.

Carbonaceous Chalk, medium to dark to
 gray, graybrown, brown, earthy to grainy, slightly
 to subplaty, occasionally slightly argillaceous,
 trace-occasional crystalline Calcite filled
 fractures, trace micro Pyrite, firm to brittle.
 Occasional heavy oil stain and residue, faint
 yellow fluorescence in unwashed and washed
 samples, immediate streaming to flash white
 moderate to heavy yellow residual ring. S
 yellow greenbrown oil coming over shaker





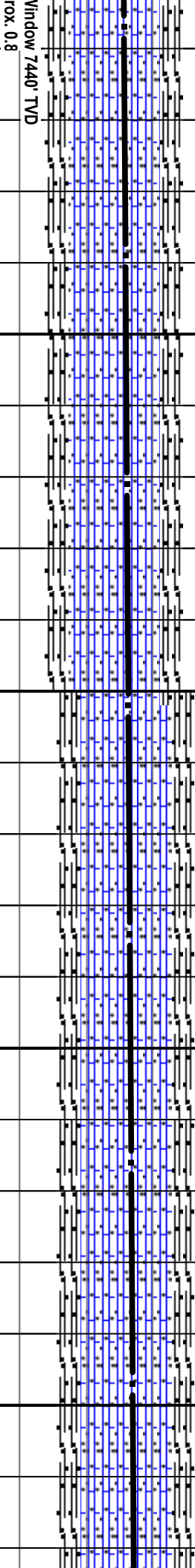
DS 11057' MD, INCL. 90.9°,
 AZM. 133.4°, TVD 7449.30, VS
 3790.54'

DS 11121' MD, INCL. 90.9°,
 AZM. 133.1°, TVD 7448.30, VS
 3854.52'

DS 11184' MD, INCL. 90.7°,
 AZM. 133.3°, TVD 7447.36, VS
 3917.48'

DS 11247' MD, INCL. 90.8°,
 AZM. 132.9°, TVD 7446.18, VS
 3980.46'

Going through Weather
 Separator (10,012" to 1



Window 7440' TVD
 rox 0.8

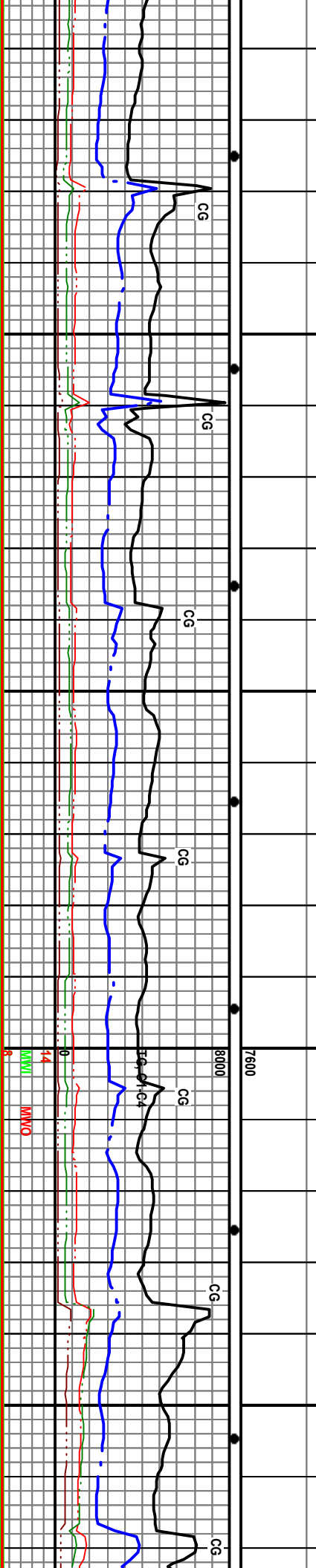
Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Occasion brown darkgray oil stain and residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Occasion brown darkgray oil stain and residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Very Fine Cuttings. Occasional brown darkgray oil stain ar residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Occasional brown darkgray oil stain ar residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous s gray, gray/brown, grainy to earthy, trace micro sucrosic, sub b argillaceous in t crystalline Calc occasional micr Cuttings. Occas residue, faint to moderate yellow fluorescence, immediate stream to heavy yellow green/brown oil



Window 7440' TVD
 rox 0.8

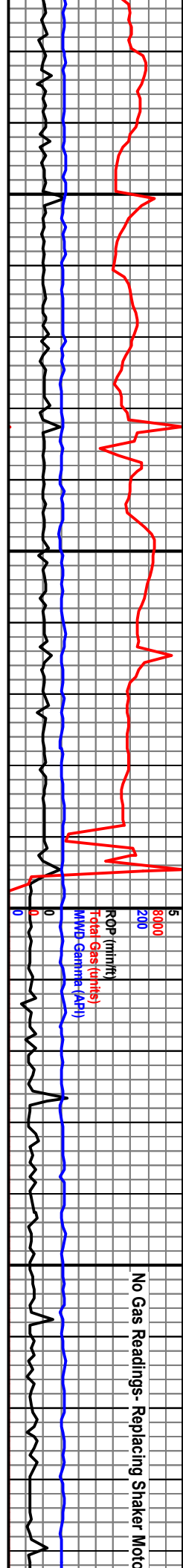
Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Occasion brown darkgray oil stain and residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Occasion brown darkgray oil stain and residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Very Fine Cuttings. Occasional brown darkgray oil stain ar residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous Chalk, medium to dark to light gray, gray/brown, grainy to earthy, trace micro sucrosic, sub blocky to subplaty, slightly argillaceous in part, trace to occasional crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle. Occasional brown darkgray oil stain ar residue, faint to moderate yellow fluorescence, immediate streaming to flash white cut, moderate to heavy yellow residual ring. Some yellow green/brown oil coming over shaker.

Carbonaceous s gray, gray/brown, grainy to earthy, trace micro sucrosic, sub b argillaceous in t crystalline Calc occasional micr Cuttings. Occas residue, faint to moderate yellow fluorescence, immediate stream to heavy yellow green/brown oil



11300
11350
11400
11450

ROP (min/ft)
Total Gas (units)
MWD Gamma (API)
Filter (ft)

DS 11311' MD, INCL. 90.8°, VS
AZM, 133.3°, TVD 7445.23, VS
4044.43'

DS 11374' MD, INCL. 90.9°, VS
AZM, 133.2°, TVD 7444.33,
VS 4107.4'

DS 11438' MD, INCL. 90.9°, VS
AZM, 132.8°, TVD 7443.32, VS
4171.38'

DS 115
AZM, 1
4235.35'

WP#7 5000' VS - ~11,250'-12,250' MD - Top of Window 7440' TVD,
Bottom of Window 7450' TVD (Dipping Up Approx. 0.8°)

Chalk, medium to dark to light brown, mottled in part, sub blocky to subplaty, earthy to smooth, grainy to argillaceous in part with carbonaceous shale stringers and partings, scattered crystalline Calcite filled micro fractures, trace micro Pyrite, firm to brittle, Very Fine Cuttings. Abundant brown oil residue, faint to moderate yellow fluorescence, immediate flash to streaming white cut, heavy yellow residual ring. Good oil return on Shaker.

Carbonaceous Chalk, medium to dark gray, brown, light gray, sub blocky to subplaty, earthy to smooth to grainy, trace micro sucrosic, argillaceous in part with occasional carbonaceous shale partings, scattered crystalline Calcite filled micro fractures, occasional micro Pyrite, firm to brittle, Very Fine Cuttings. Brown oil residue and stain, faint yellow fluorescence, immediate flash to streaming white cut, heavy yellow residual ring. Good oil return on Shaker.

Carbonaceous Chalk, medium to light to dark gray, brown, mottled in part, sub blocky to subplaty, grainy to earthy to micro sucrosic, abundant crystalline Calcite filled micro fractures, occasional micro Pyrite, trace to occasional shale partings, firm to brittle, Very Fine Cuttings. Brown oil stain common, faint to moderate yellow fluorescence, immediate flash to streaming white cut, heavy yellow residual ring. Good oil return in Mud.

Carbonaceous Chalk, medium to light gray, brown, mottled in part, sub blocky to subplaty, grainy to earthy to micro sucrosic, abundant crystalline Calcite with occasional Calcite filled micro fractures, occasional micro Pyrite, trace to occasional shale partings, firm to brittle, Very Fine Cuttings. Brown oil stain common, faint to moderate yellow fluorescence, immediate flash to streaming white cut, heavy yellow residual ring. Good oil return in Mud.

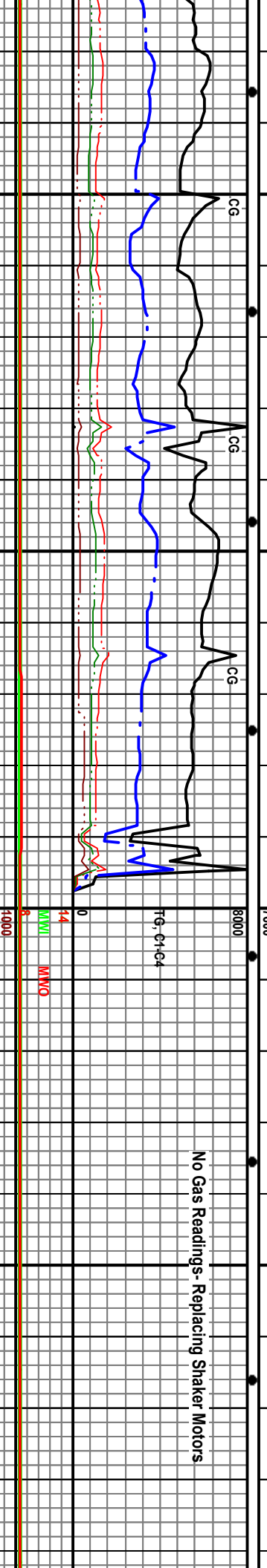
CG
CG
CG
CG

8000
7600
7400 TVD
7500

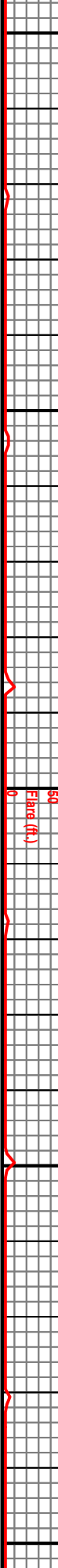
FTG, G1-G4
MWI
MWD

Poor Samples, High Oil Content in Mud, Poor Cuttings Return.

No Gas Readings- Replacing Shaker Motors



11500 11550 11600 11650 11700



202' MD, INCL. 90.9°
 333.5°, TVD 7442.32, VS
 Going through Weatherford
 Separator (10,012' to TD)

DS 11565' MD, INCL. 90.3°
 AZM. 133.2°, TVD 7441.38, VS
 4298.33'

7400 TVD
 DS 11629' MD, INCL. 89.4°
 AZM. 133.8°, TVD 7441.74, VS
 4362.32'

DS 11692' MD, INCL. 88.5°
 AZM. 133.9°, TVD 7442.98, VS
 4425.3'

WP#7 50
 of Windo

Carbonaceous Chalk, brown, medium to light gray, mottled in part, sub blocky to subplaty, grayly to earthy, trace micro sucrosic, occasional crystalline Calcite filled micro fractures and micro Pyrite, trace Shale partings, firm to brittle, Very Fine Cuttings. Brown oil stain common, faint yellowgold fluorescence, immediate flash to streaming white cut, heavy yellow residual ring. Good oil return on Shaker.

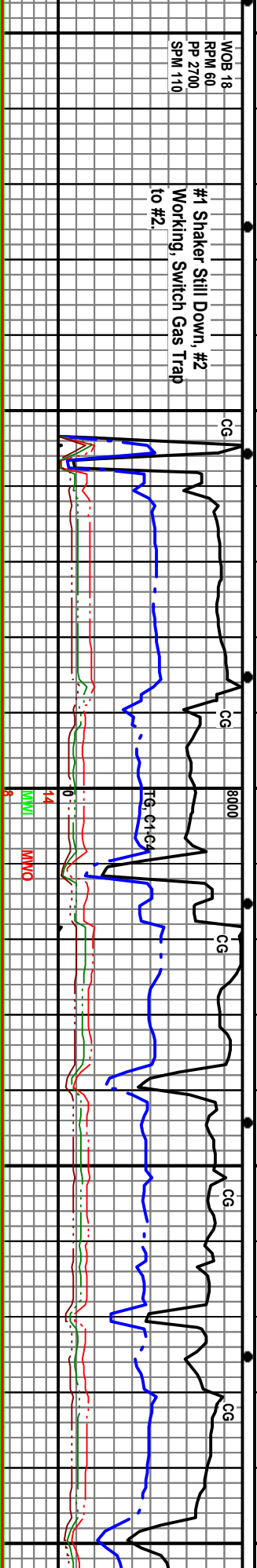
Carbonaceous Chalk, medium to dark to light gray, gray/brown, mottled in part, sub blocky to subplaty, earthy to grayly to micro sucrosic, occasional crystalline Calcite filled micro fractures and micro Pyrite, argillaceous in part with occasional Shale partings, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint to moderate yellowgold fluorescence, immediate flash to streaming white cut, heavy yellow residual ring. Good oil return on Shaker.

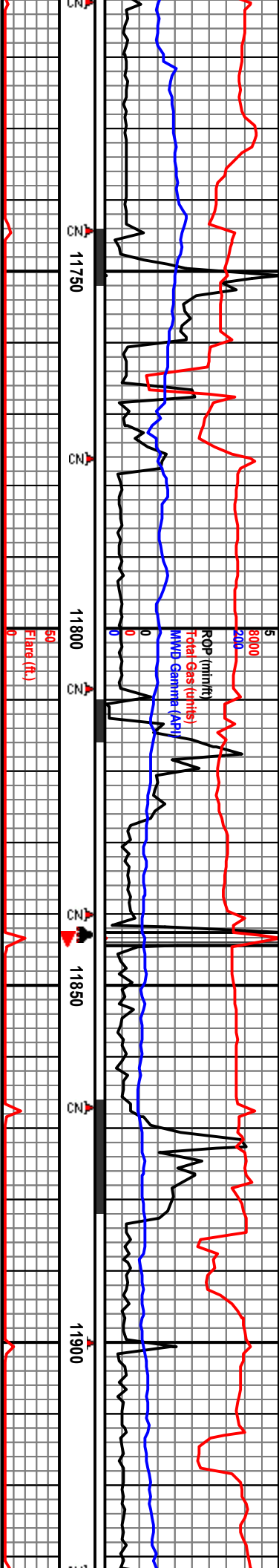
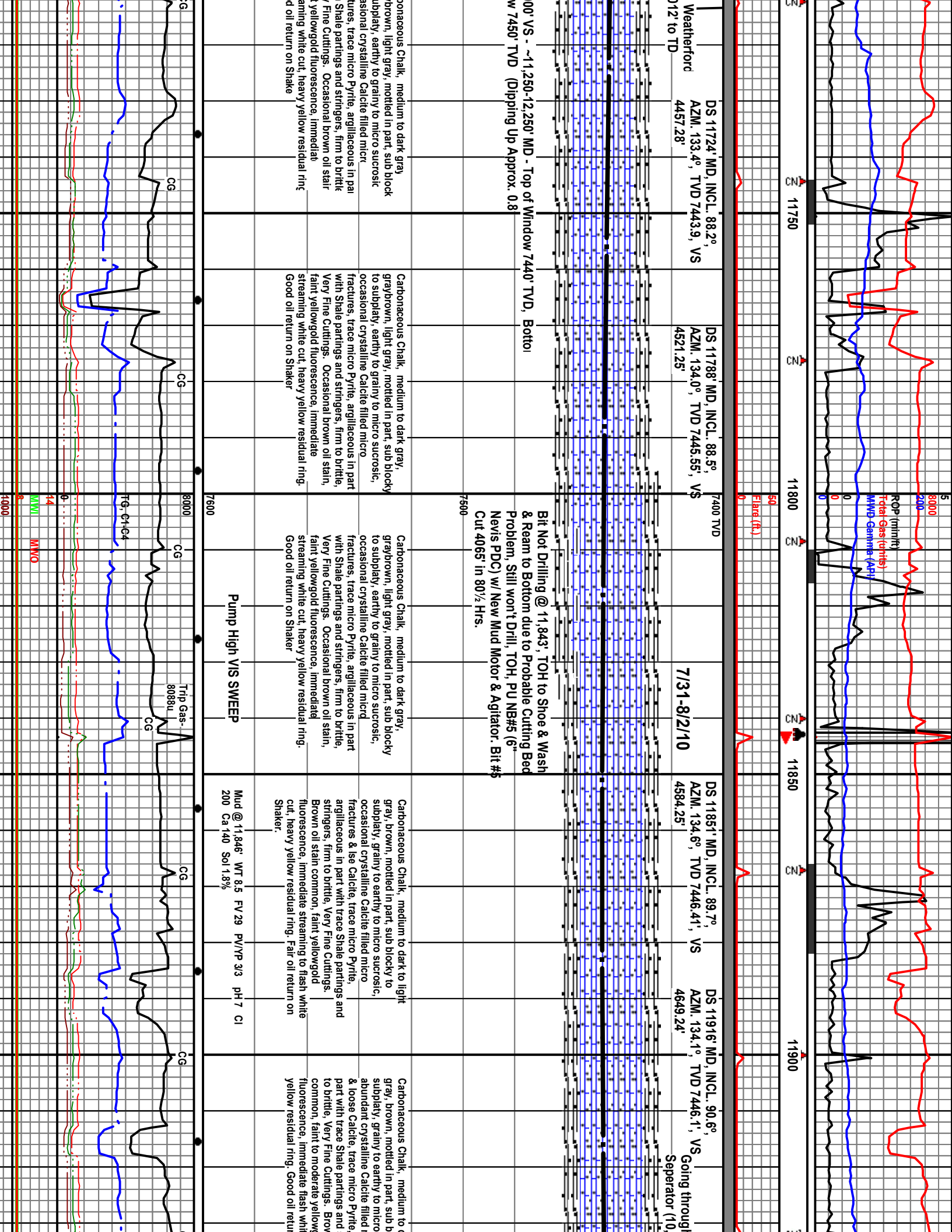
Carbonaceous Chalk, medium to dark gray, gray/brown, light gray, mottled in part, sub blocky to subplaty, earthy to grayly to micro sucrosic, occasional crystalline Calcite filled micro fractures, trace micro Pyrite, argillaceous in part with Shale partings and stringers, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate streaming white cut, heavy yellow residual ring. Good oil return on Shaker.

Carbonaceous Chalk, medium to dark gray, gray/brown, light gray, mottled in part, sub blocky to subplaty, earthy to grayly to micro sucrosic, occasional crystalline Calcite filled micro fractures, trace micro Pyrite, argillaceous in part with Shale partings and stringers, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate streaming white cut, heavy yellow residual ring. Good oil return on Shaker.

WOB 18
 RPM 60
 PP 2700
 SPM 110

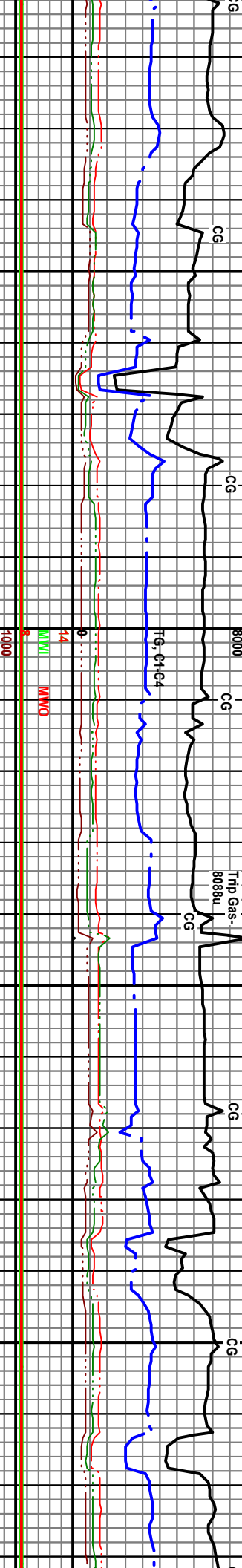
#1 Shaker Still Down, #2 Working, Switch Gas Trap to #2.

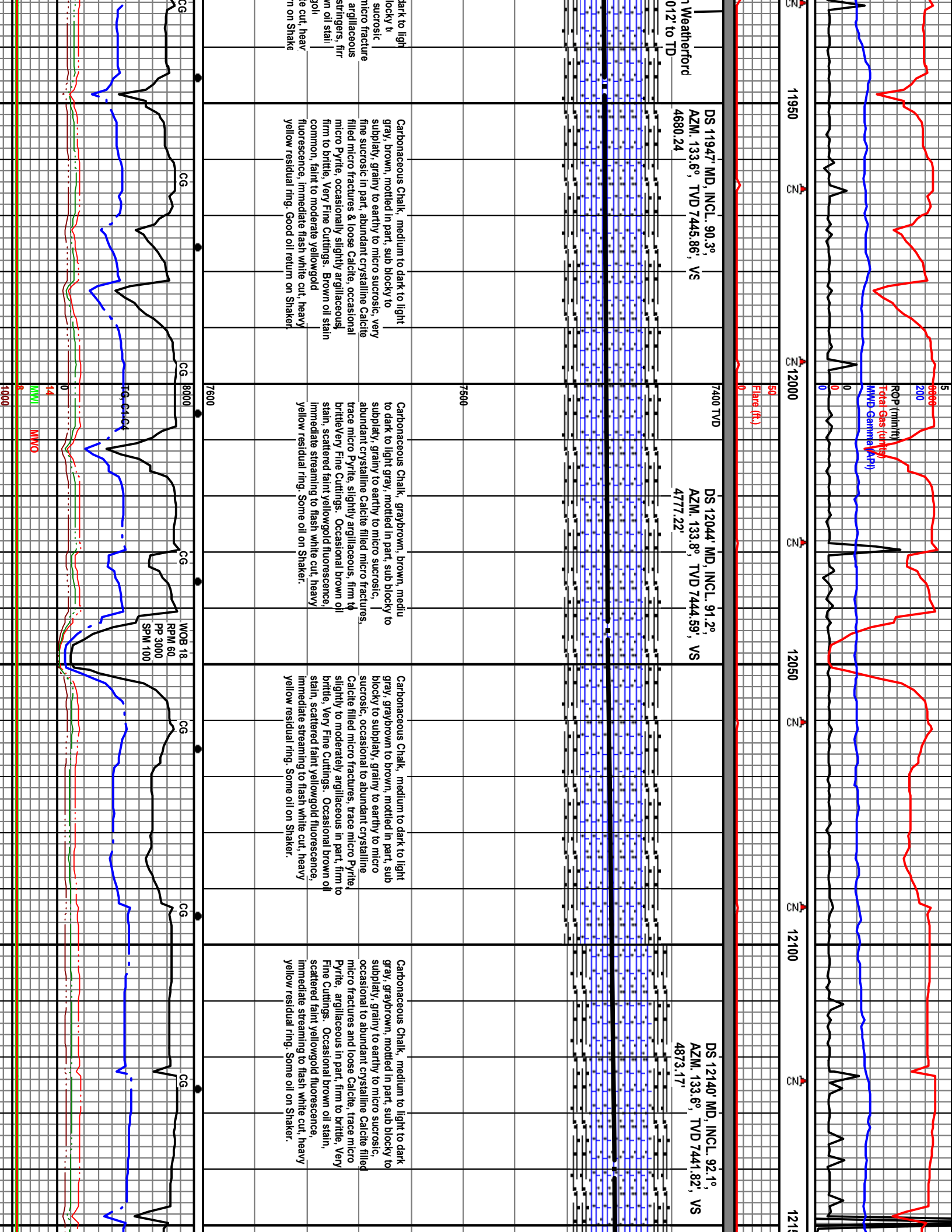


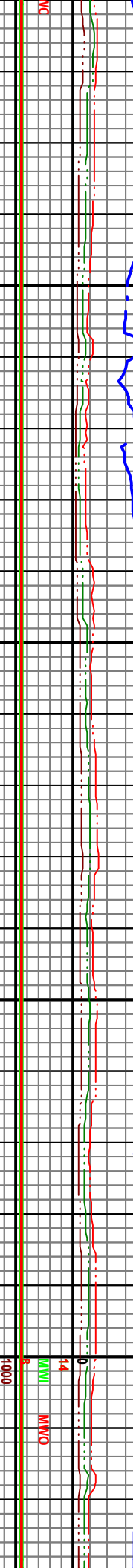
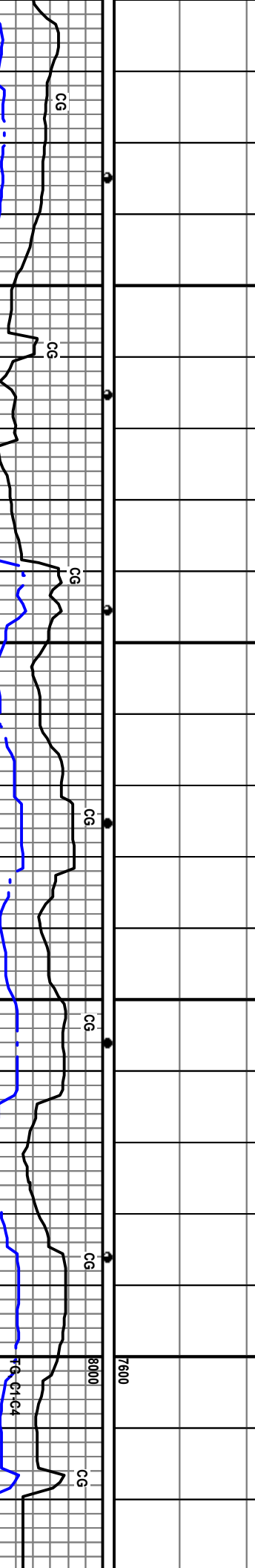
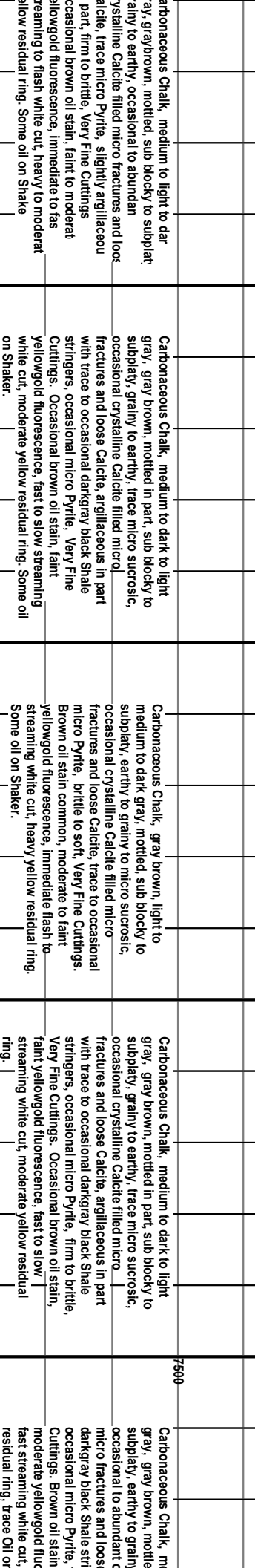
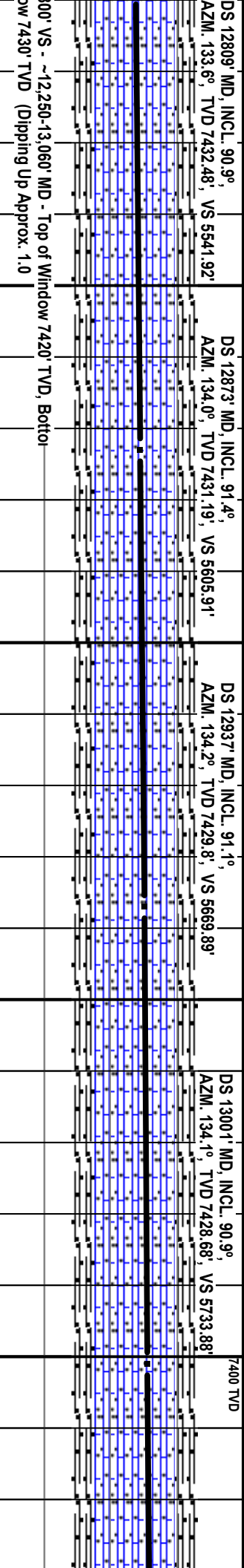
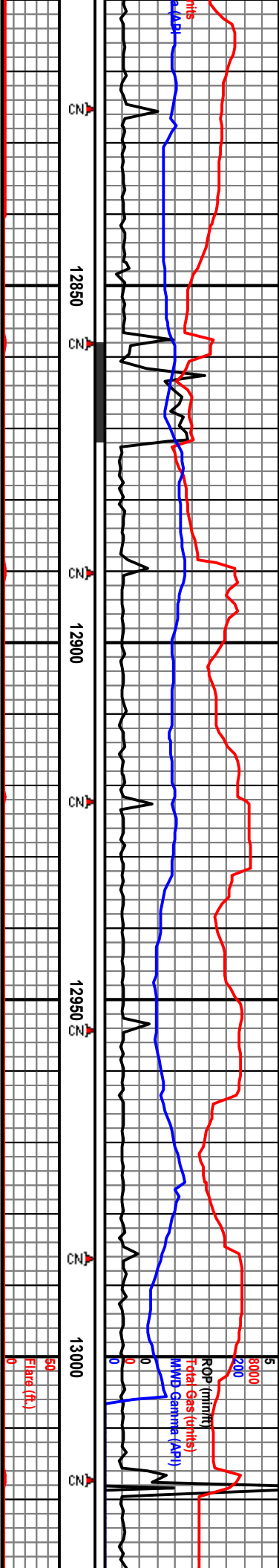


<p>DS 11724' MD, INCL. 88.2°, VS AZM. 133.4°, TVD 7443.9, VS 4457.28'</p> <p>Weatherford 12 to TD</p>	<p>DS 11788' MD, INCL. 88.5°, VS AZM. 134.0°, TVD 7445.55', VS 4521.25'</p>	<p>7400 TVD 7/31-8/2/10</p>	<p>DS 11851' MD, INCL. 89.7°, VS AZM. 134.6°, TVD 7446.41', VS 4584.25'</p>	<p>DS 11916' MD, INCL. 90.6°, VS AZM. 134.1°, TVD 7446.1', VS 4649.24'</p> <p>Going through Separator (10)</p>
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<p>000' VS. - ~1,250-12,250' MD - Top of Window 7440' TVD, Bottom w 7450' TVD (Dipping Up Approx. 0.8</p>	<p>Carbonaceous Chalk, medium to dark gray, gray/brown, light gray, mottled in part, sub blocky to subplaty, earthy to grainy to micro sucrosic, occasional crystalline Calcite filled micro fractures, trace micro Pyrite, argillaceous in part with Shale partings and stringers, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate streaming white cut, heavy yellow residual ring. Good oil return on Shaker</p>	<p>Carbonaceous Chalk, medium to dark gray, gray/brown, light gray, mottled in part, sub blocky to subplaty, earthy to grainy to micro sucrosic, occasional crystalline Calcite filled micro fractures, trace micro Pyrite, argillaceous in part with Shale partings and stringers, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate streaming white cut, heavy yellow residual ring. Good oil return on Shaker</p>	<p>Carbonaceous Chalk, medium to dark gray, gray/brown, light gray, mottled in part, sub blocky to subplaty, earthy to grainy to micro sucrosic, occasional crystalline Calcite filled micro fractures, trace micro Pyrite, argillaceous in part with Shale partings and stringers, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate streaming white cut, heavy yellow residual ring. Good oil return on Shaker</p>	<p>Carbonaceous Chalk, medium to dark to light gray, brown, mottled in part, sub blocky to subplaty, grainy to earthy to micro sucrosic, occasional crystalline Calcite filled micro fractures & Isc Calcite, trace micro Pyrite, argillaceous in part with trace Shale partings and stringers, firm to brittle, Very Fine Cuttings. Brown oil stain common, faint yellowgold fluorescence, immediate streaming to flash white cut, heavy yellow residual ring. Fair oil return on Shaker.</p>	<p>Carbonaceous Chalk, medium to gray, brown, mottled in part, sub blocky to subplaty, grainy to earthy to micro sucrosic, abundant crystalline Calcite filled & loose Calcite, trace micro Pyrite & loose Calcite, trace micro Pyrite part with trace Shale partings and to brittle, Very Fine Cuttings. Brown common, faint to moderate yellow fluorescence, immediate flash white yellow residual ring. Good oil return</p>
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DS 12809' MD, INCL. 90.9°, AZM. 133.6°, TVD 7432.48', VS 5541.92'

DS 12873' MD, INCL. 91.4°, AZM. 134.0°, TVD 7431.19', VS 5605.91'

DS 12937' MD, INCL. 91.1°, AZM. 134.2°, TVD 7429.8', VS 5669.89'

DS 13001' MD, INCL. 90.9°, AZM. 134.1°, TVD 7428.68', VS 5733.88'

100' VS - ~12,250-13,060' MD - Top of Window 7420' TVD, Bottom Window 7430' TVD (Dipping Up Approx. 1.0)

Carbonaceous Chalk, medium to light to dark gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose Calcite, argillaceous in part with trace to occasional darkgray black Shale stringers, occasional micro Pyrite, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate to fast streaming white cut, heavy to moderate residual ring. Some oil on Shaker.

Carbonaceous Chalk, medium to light gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose darkgray black Shale stringers, occasional micro Pyrite, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, fast to slow streaming white cut, moderate yellow residual ring, trace Oil or

Carbonaceous Chalk, medium to light to dark gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose Calcite, argillaceous in part with trace to occasional darkgray black Shale stringers, occasional micro Pyrite, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate to fast streaming white cut, heavy to moderate residual ring. Some oil on Shaker.

Carbonaceous Chalk, medium to light gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose darkgray black Shale stringers, occasional micro Pyrite, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, fast to slow streaming white cut, moderate yellow residual ring, trace Oil or

Carbonaceous Chalk, medium to light to dark gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose Calcite, argillaceous in part with trace to occasional darkgray black Shale stringers, occasional micro Pyrite, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate to fast streaming white cut, heavy to moderate residual ring. Some oil on Shaker.

Carbonaceous Chalk, medium to light gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose darkgray black Shale stringers, occasional micro Pyrite, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, fast to slow streaming white cut, moderate yellow residual ring, trace Oil or

Carbonaceous Chalk, medium to light to dark gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose Calcite, argillaceous in part with trace to occasional darkgray black Shale stringers, occasional micro Pyrite, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate to fast streaming white cut, heavy to moderate residual ring. Some oil on Shaker.

Carbonaceous Chalk, medium to light gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose darkgray black Shale stringers, occasional micro Pyrite, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, fast to slow streaming white cut, moderate yellow residual ring, trace Oil or

Carbonaceous Chalk, medium to light to dark gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose Calcite, argillaceous in part with trace to occasional darkgray black Shale stringers, occasional micro Pyrite, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, immediate to fast streaming white cut, heavy to moderate residual ring. Some oil on Shaker.

Carbonaceous Chalk, medium to light gray, gray brown, mottled, sub blocky to subplaty, gray to earthy, trace micro sucrosic, occasional crystalline Calcite filled microfractures and loose darkgray black Shale stringers, occasional micro Pyrite, firm to brittle, Very Fine Cuttings. Occasional brown oil stain, faint yellowgold fluorescence, fast to slow streaming white cut, moderate yellow residual ring, trace Oil or

