



Scale: 5" / 100'  
Measured Depth Log

Well Name ROHN STATE LD03-62-1HN

Location SESE SEC 4 T9N R58W

State COLORADO

County WELD

Country USA

Rig Number H&P 273

API Number 05-123-37452

Field WILDCAT

Region DJ BASIN

Drilling Completed 9/26/2014

Spud Date 9/22/2014

Surface Coordinates 699' FSL; 330' FEL

Bottom Hole Coordinates 330' FFSSL; 660' FFELL

Ground Elevation 4706'

K.B. Elevation 4730'

Logged Interval 4980' To 10188'

Total Depth 10188'

Formation NIOBRARA

Type of Drilling Fluid LSND

## Operator

Company NOBLE ENERGY INC.

Address 1625 Broadway Suite 2200  
Denver, CO 80202

## Geologist

Name RENEE CLACKER

Company NOBLE ENERGY INC.

Address 1625 Broadway Suite 2200  
Denver, CO 80202

## Other

Wellsite Geologist #1 Laura Kellogg

Wellsite Geologist #2 Garrett Luallen

Wellsite Geological Services Provided By Columbine Logging








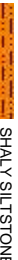




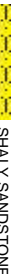













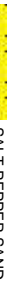






## Zone Color Coding

Oil  
Note  
Error






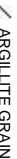
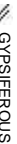


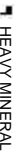




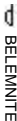
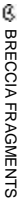








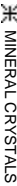







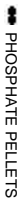

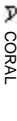
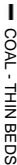


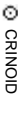

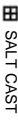





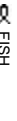


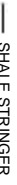
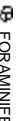
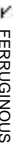


Condensate  
Core  
Water

Gas  
Pres  
Sea

Rock Types

	CHALK		CEMENT		IGNEOUS		SHALE GRAY
	MARLSTONE		CHERT		SIDERITE or LIMONITE		SHALY SILTSTONE
	SANDSTONE		CLAY CHOQE SANC		LIMESTONE		SILTSTONE
	SHALY SANDSTONE		CLAYSTONE		METAMORPHIC		TILL
	SILTY SHALE		COAL		NO SAMPLE		TUFF
	UNKNOWN		CONGLOMERATE		SALT		WELDED TUFF
	ANHYDRITE		DOLOMITE		SALT-PEPPER SAND		
	BENTONITE		GRANITE		SHALE		
	BRECCIA		GYPSUM		SHALE COLORED		









Accessories

	F FOSSIL		ARGILLACEOUS		GLAUCONITE		TUFFACEOUS
	GASTROPOD		ARGILLITE GRAIN		GYPSIFEROUS		
	OOLITE		B BENTONITE		HEAVY MINERAL		
	AMPHIPORA		BITUMENOUS SUBSTANCE		INOCERAMUS		ANHYDRITE STRINGER
	BELEMNITE		BRECCIA FRAGMENTS		K KAOLIN		BENTONITE STRINGER
	BIOCLASTIC		CALCAREOUS		TR MARLSTONE		COAL STRINGER
	BRACHIOPOD		CARBONACEOUS FLAKES		TR MINERAL CRYSTALS		DOLOMITE STRINGER
	BRYOZOA		CHTDK		TR NODULES		GYPSUM STRINGER
	CEPHALOPOD		CHITL		TR PHOSPHATE PELLETS		LIMESTONE STRINGER
	CORAL		COAL - THIN BEDS		P PYRITE		MARLSTONE (CALC) STRG
	CRINOID		DOLOMITIC		B SALT CAST		MARLSTONE (DOL) STRG
	ECHINOID		FELDSPAR		TR SANDY		SANDSTONE STRINGER
	FISH		FERRUGINOUS PELLET		TR SILICEOUS		SHALE STRINGER
	FORAMINIFERA		FERRUGINOUS		TR SILTY		SILTSTONE STRINGER



Minerals

Engineering

Oil Show

	MOLDIC		ORGANIC
	DEAD		P PINPOINT
	EVEN		V VUGGY
	QUESTIONABLE		
	SPOTTED STAINING		

Porosity

	CONNECTION (LEFT)		CONNECTION (RIGHT)
	E EARTHY		F FENESTRAL
	F FRACTURE		CORE - LOST
	INTERCRYSTALLINE		CORE - RECOVERED
	INTEROOLITIC		DST INTERVAL


Stringer

Fossils

## Other Symbols

 FAULT       WIRELINE TESTED - LEFT    **E** EARTHY

 FORMATION TOP       WIRELINE TESTED - RT    **FX** FINELYXLN

 GAS SHOW

**GS** GRAINSTONE


### Rounding

 MINDEPTH    MN DEPTH

**L** LITHOGRAPHIC

 NORMAL FAULT      **A** ANGULAR

**MX** MICROXLN

 OIL SHOW

**R** ROUNDED

**MS** MUDSTONE

 OVERTURNED STRATA

**B** SUBANG

**PS** PACKSTONE

 REVERSE FAULT


**F** SUBRND

**WS** WACKSTONE

 SIDEWALL CORE (LEFT)

### Textures


### Sorting

 SIDEWALL CORE (RIGHT)

 SLIDE

**BS** BOUNDSTONE

**M** MODERATE

 SURVEY

**C** CHALKY

**P** POOR

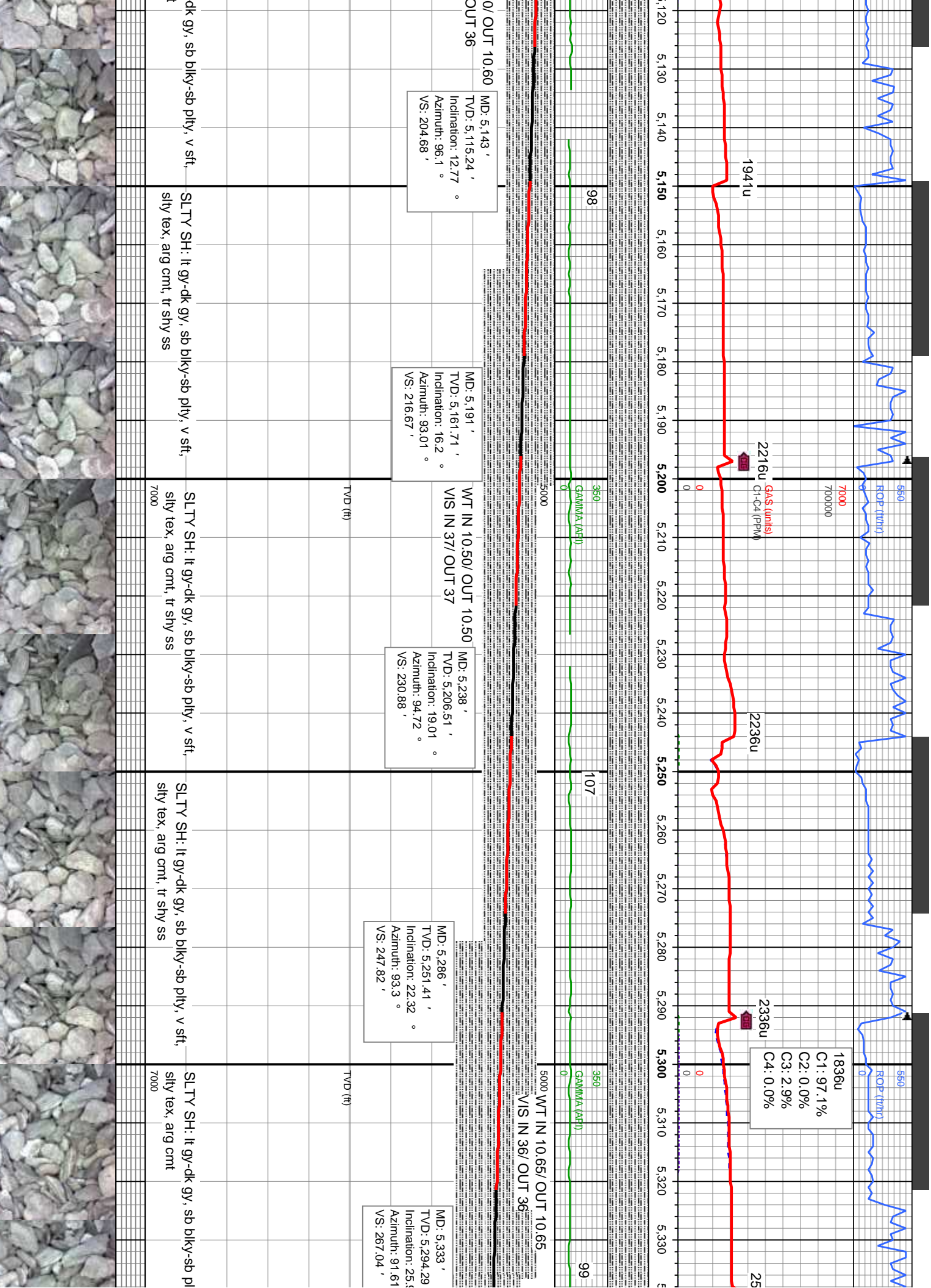
 TRIP GAS

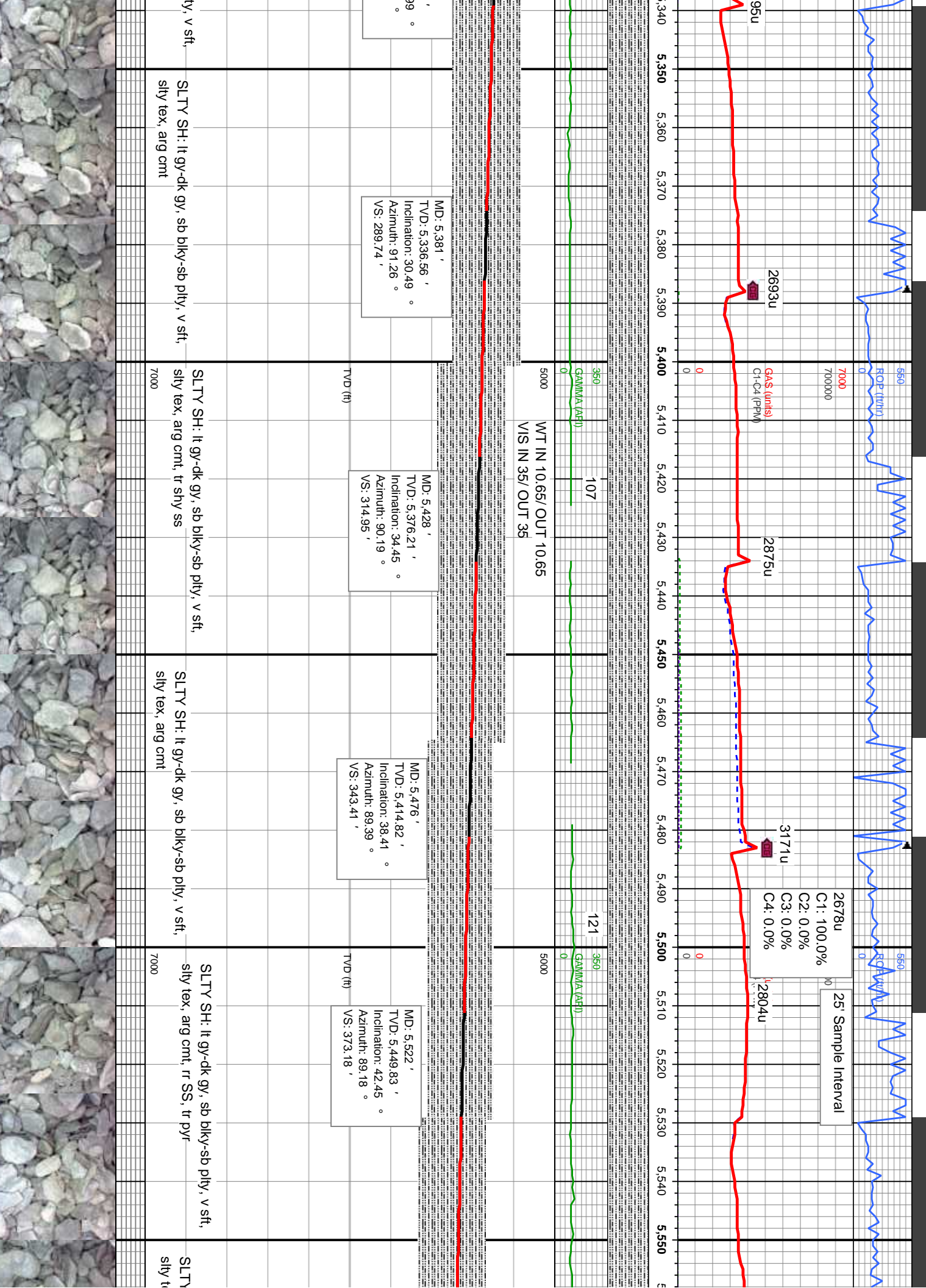
**CX** CRYPTOXLN

**W** WELL

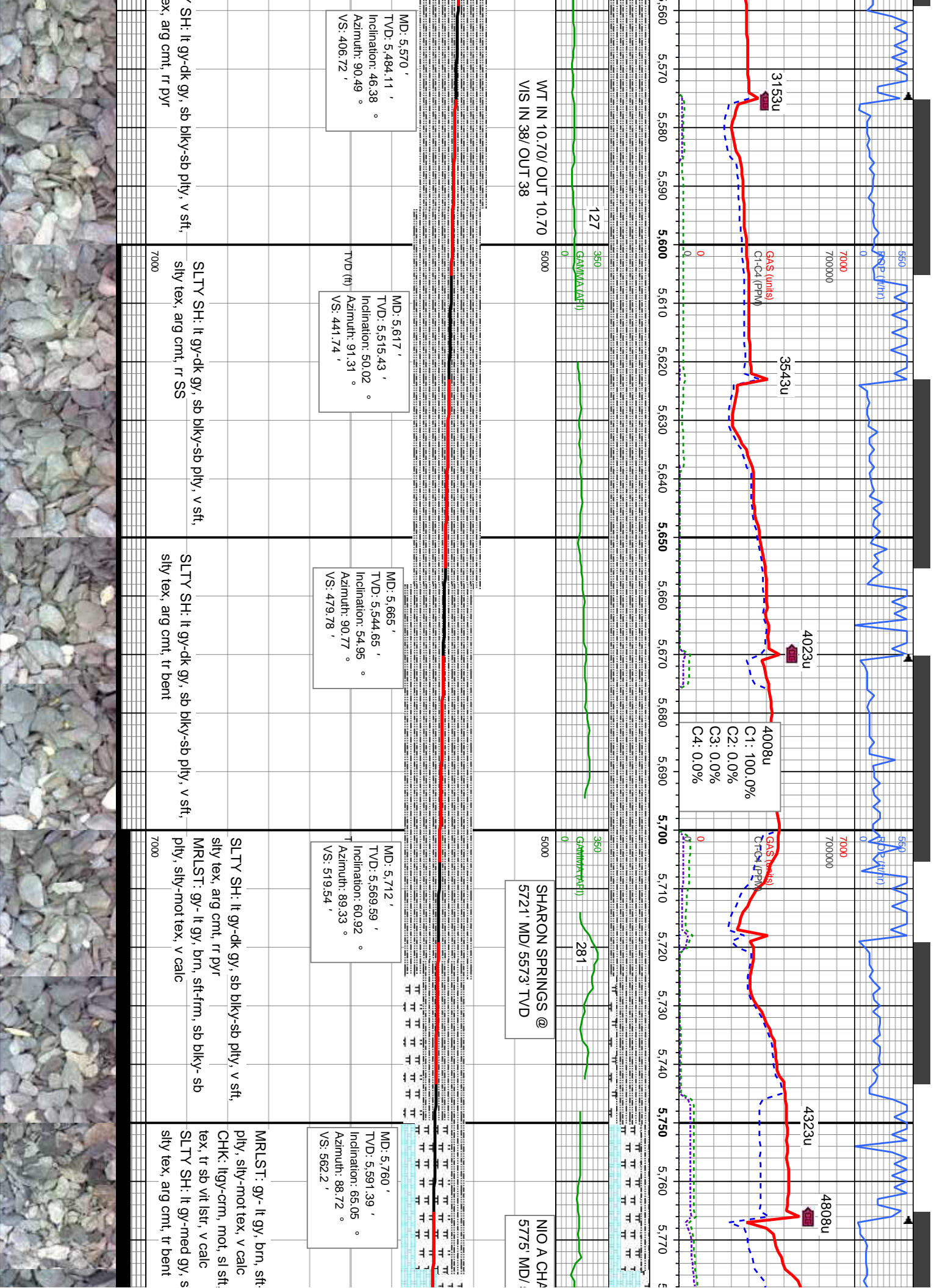


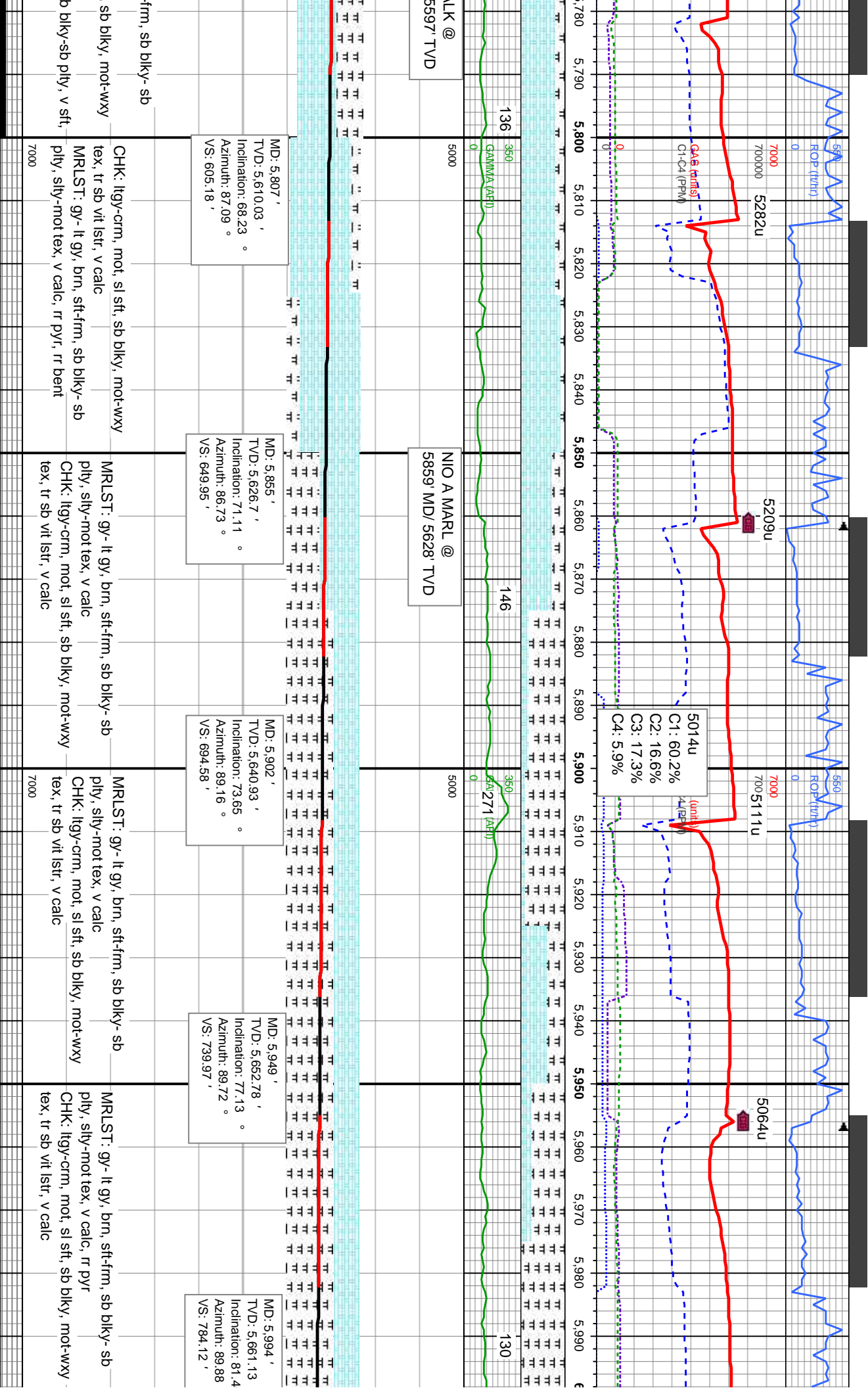




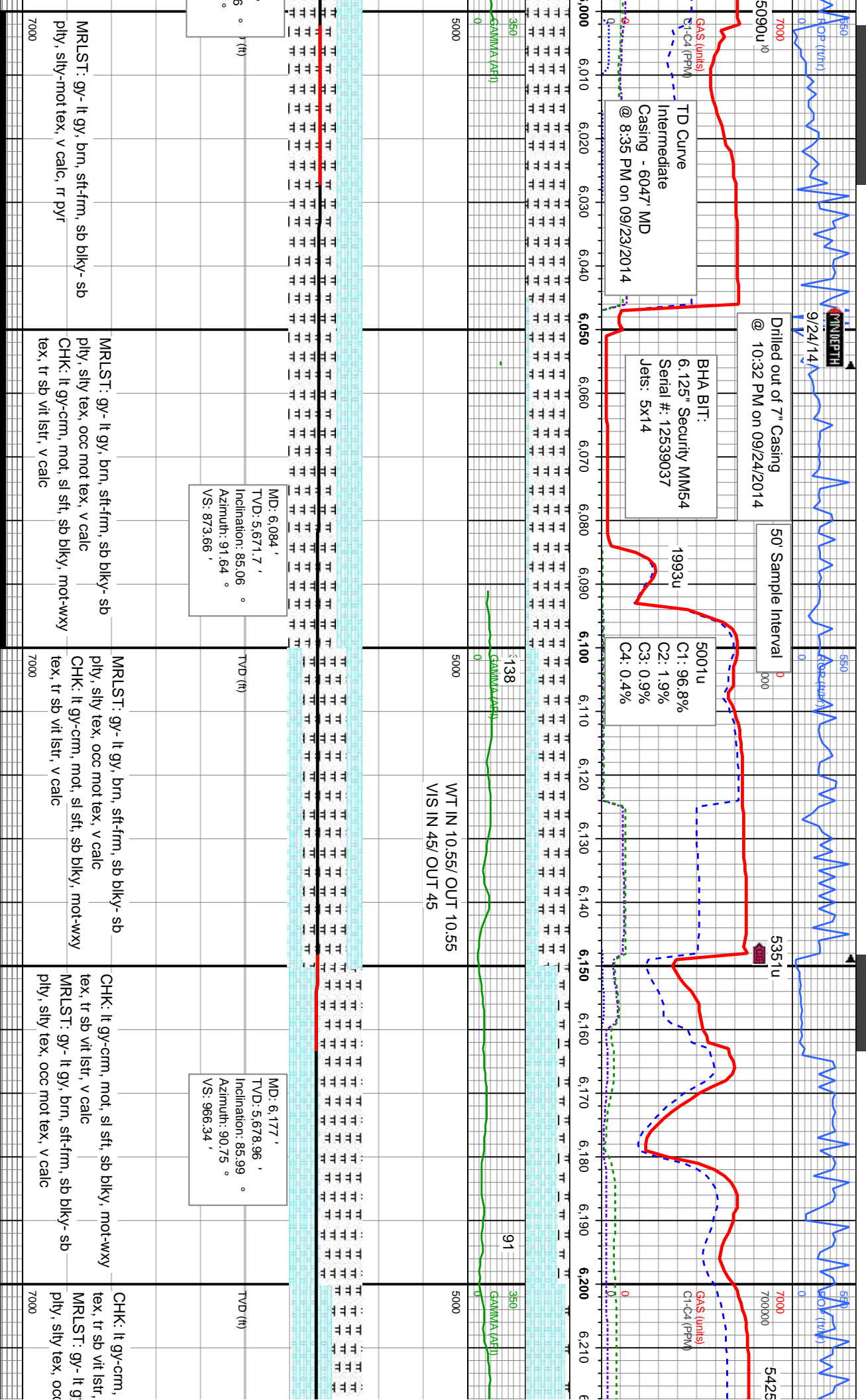


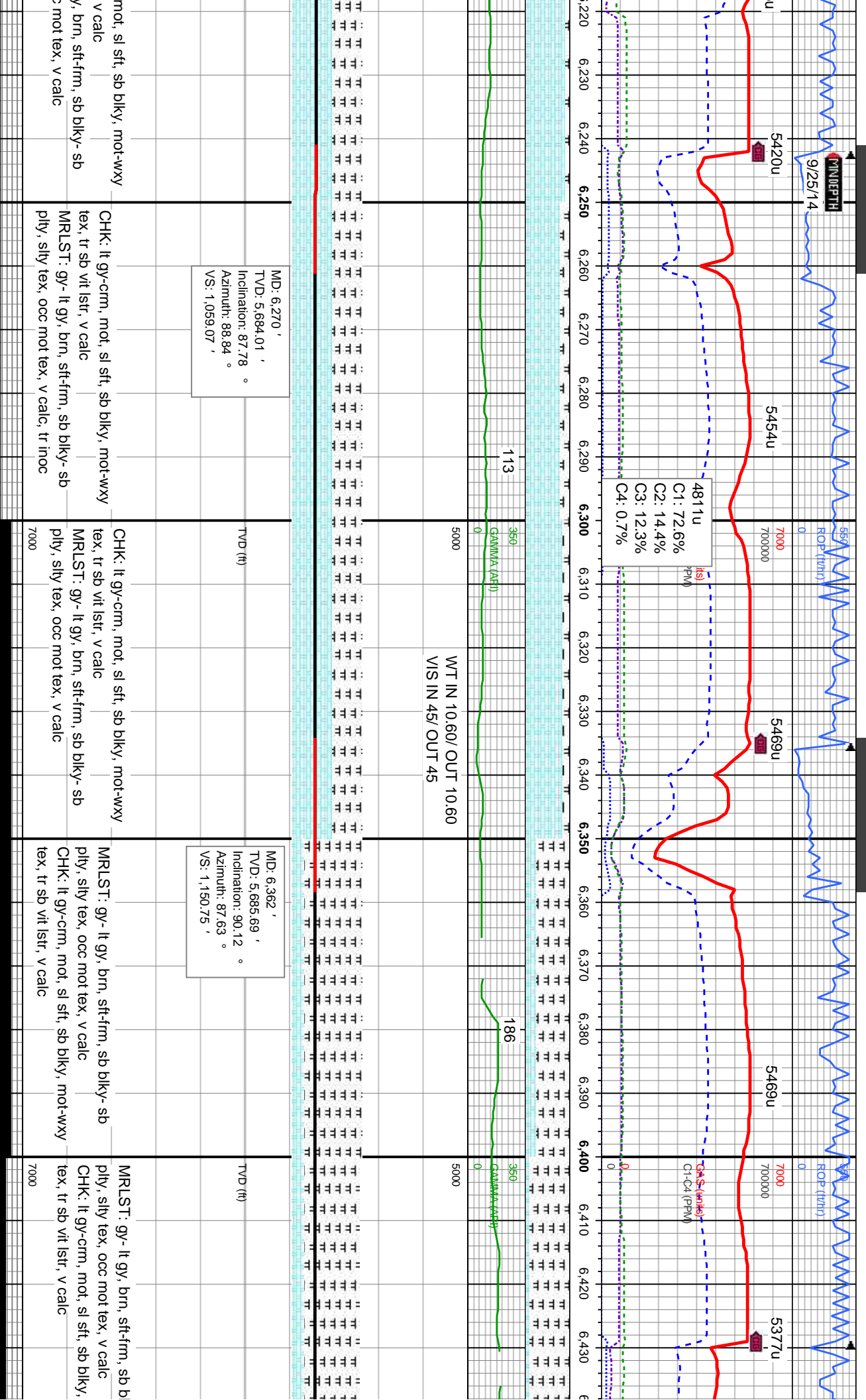




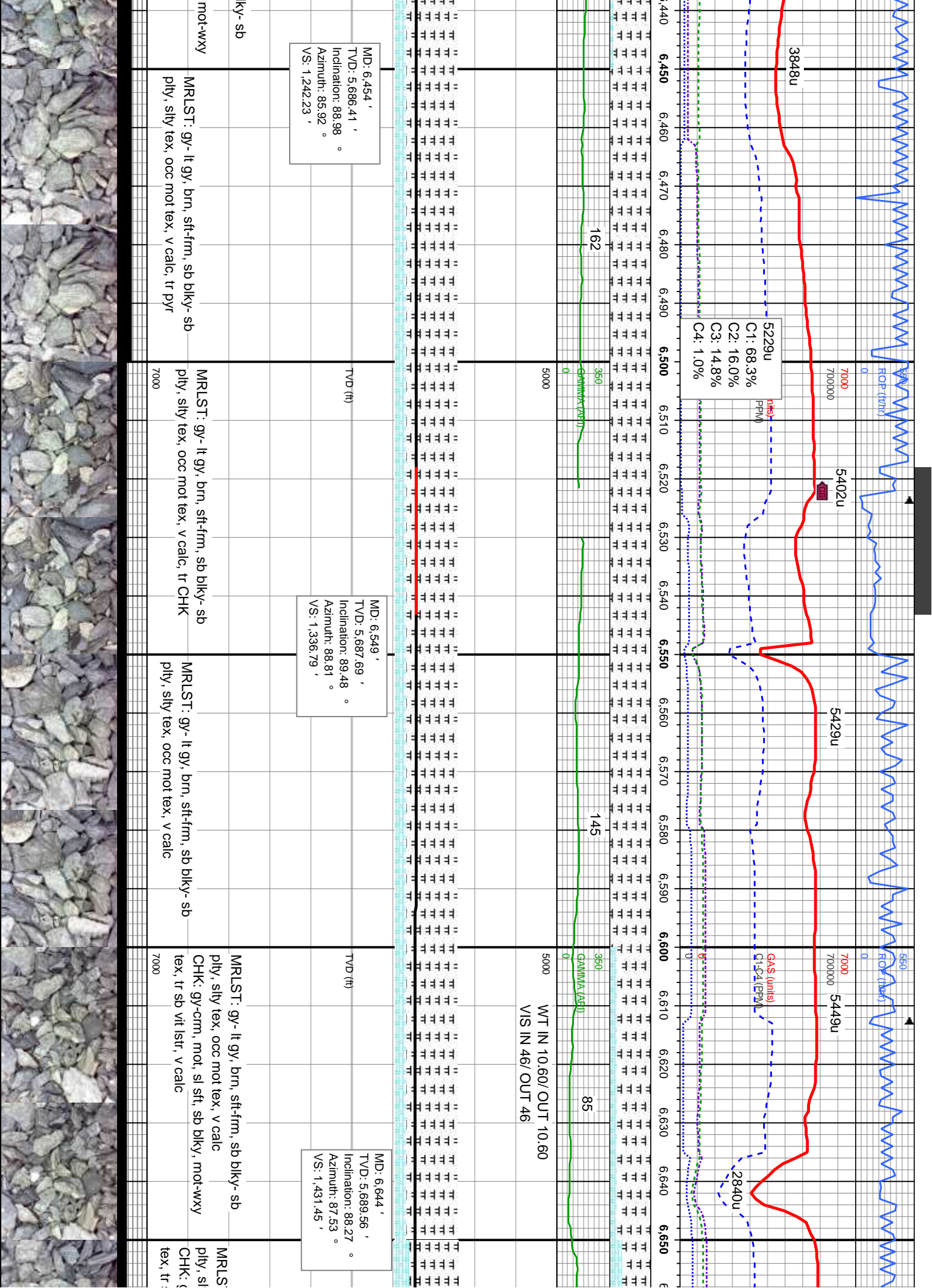




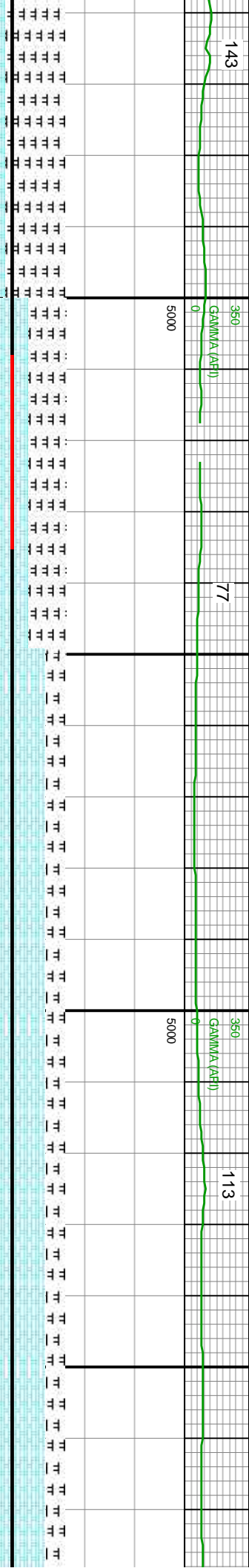
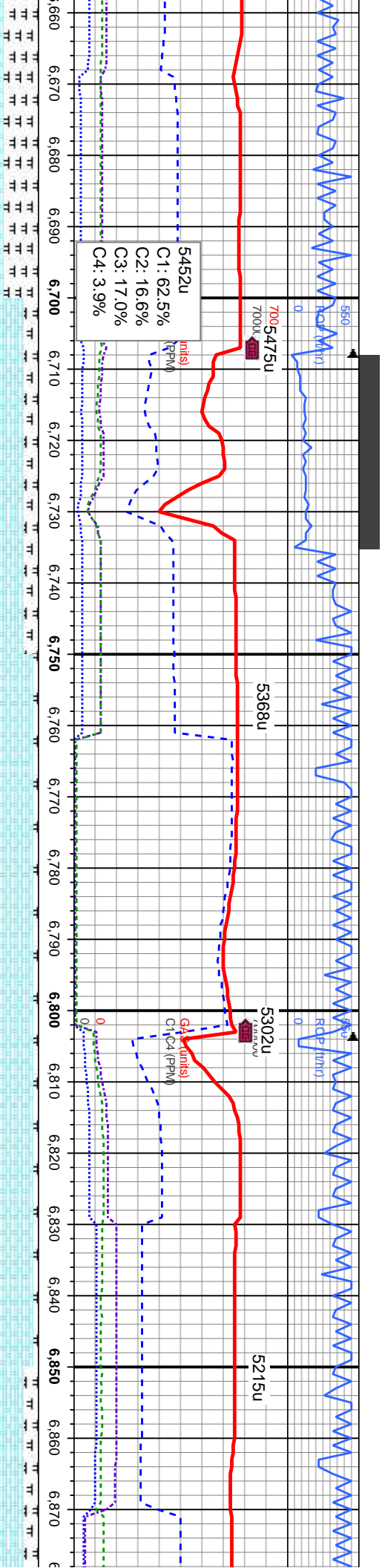












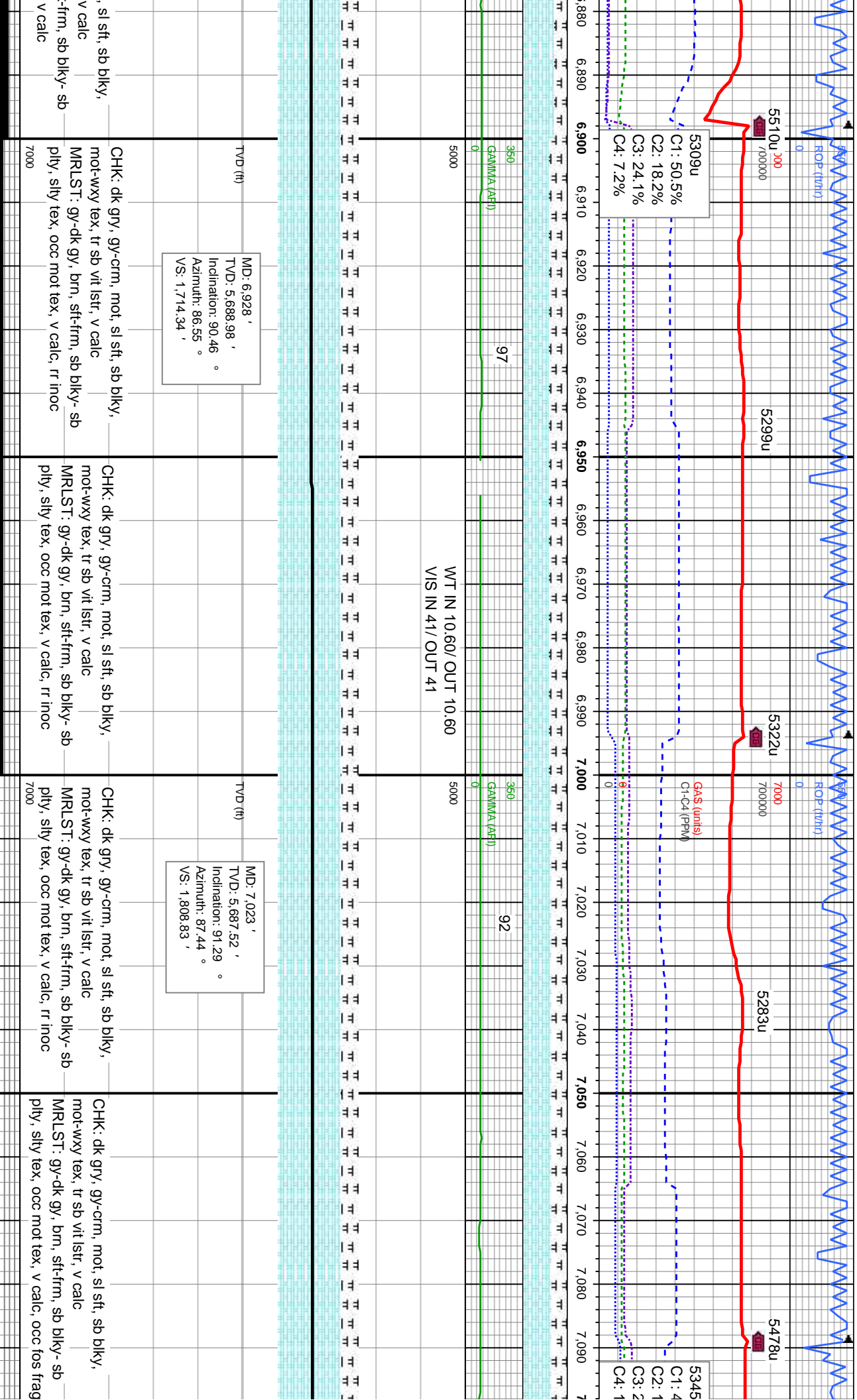
MD: 6.739 '  
TVD: 5.690.63 '  
Inclination: 90.43 °  
Azimuth: 87.88 °  
VS: 1.526.06 '

T: gy- lt gy, brn, sft-fm, sb blk- sb y tex, occ mot tex, v calc	CHK: gy-crm, mot, sl sft, sb blk, mot-wxy tex, tr sb vit lstr, v calc MRLST: gy- lt gy, brn, sft-fm, sb blk- sb ply, silty tex, occ mot tex, v calc
gy-crm, mot, sl sft, sb blk, mot-wxy sb vit lstr, v calc, tr inoc	CHK: gy-crm, mot, sl sft, sb blk, mot-wxy tex, tr sb vit lstr, v calc MRLST: gy- lt gy, brn, sft-fm, sb blk- sb ply, silty tex, occ mot tex, v calc

MD: 6.833 '  
TVD: 5.689.82 '  
Inclination: 90.55 °  
Azimuth: 88.45 °  
VS: 1.619.75 '

CHK: dk gy, gy-crm, mot, sl sft, sb blk, mot-wxy tex, tr sb vit lstr, v calc MRLST: gy-dk gy, brn, sft-fm, sb blk- sb ply, silty tex, occ mot tex, v calc	CHK: dk gy, gy-crm, mot mot-wxy tex, tr sb vit lstr, MRLST: gy-dk gy, brn, sft ply, silty tex, occ mot tex,
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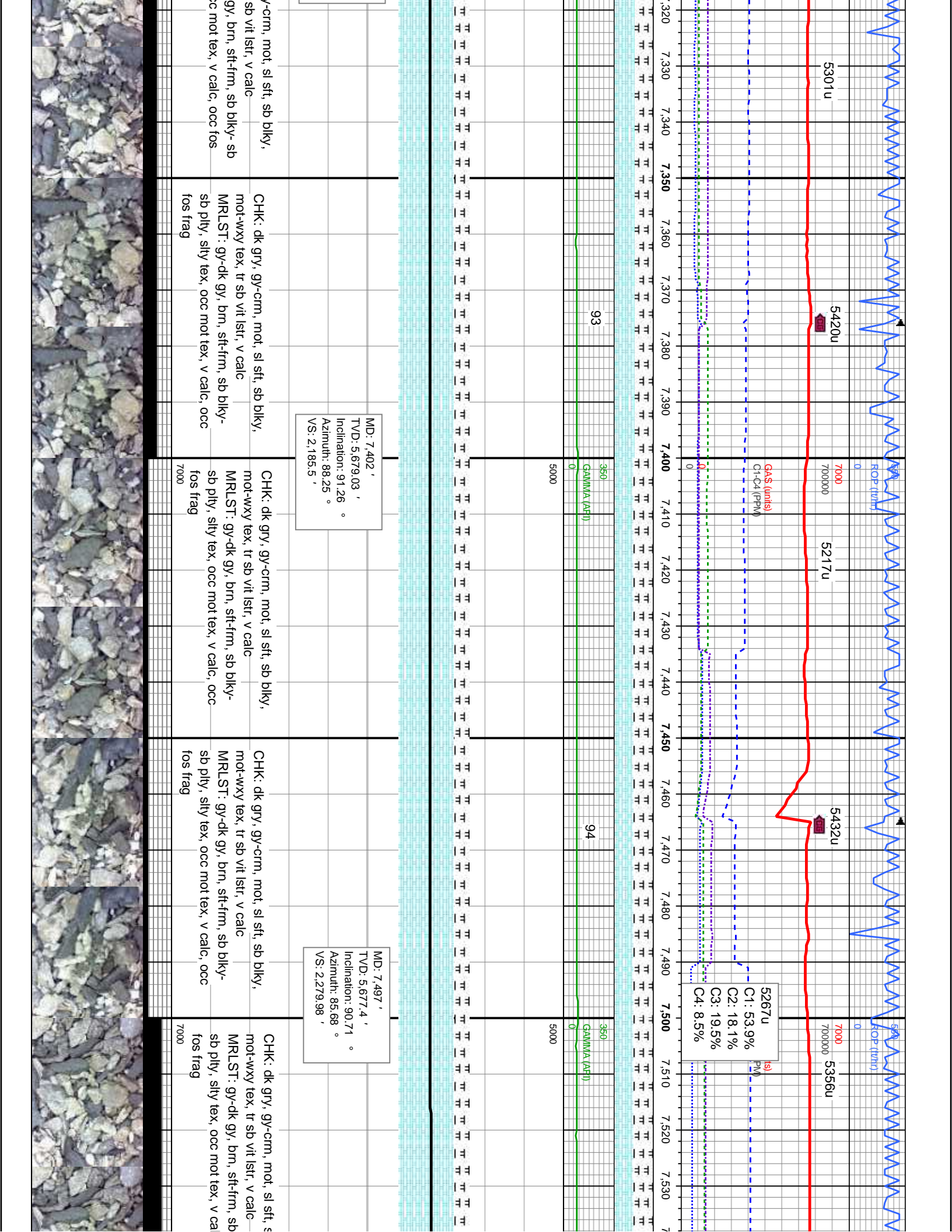


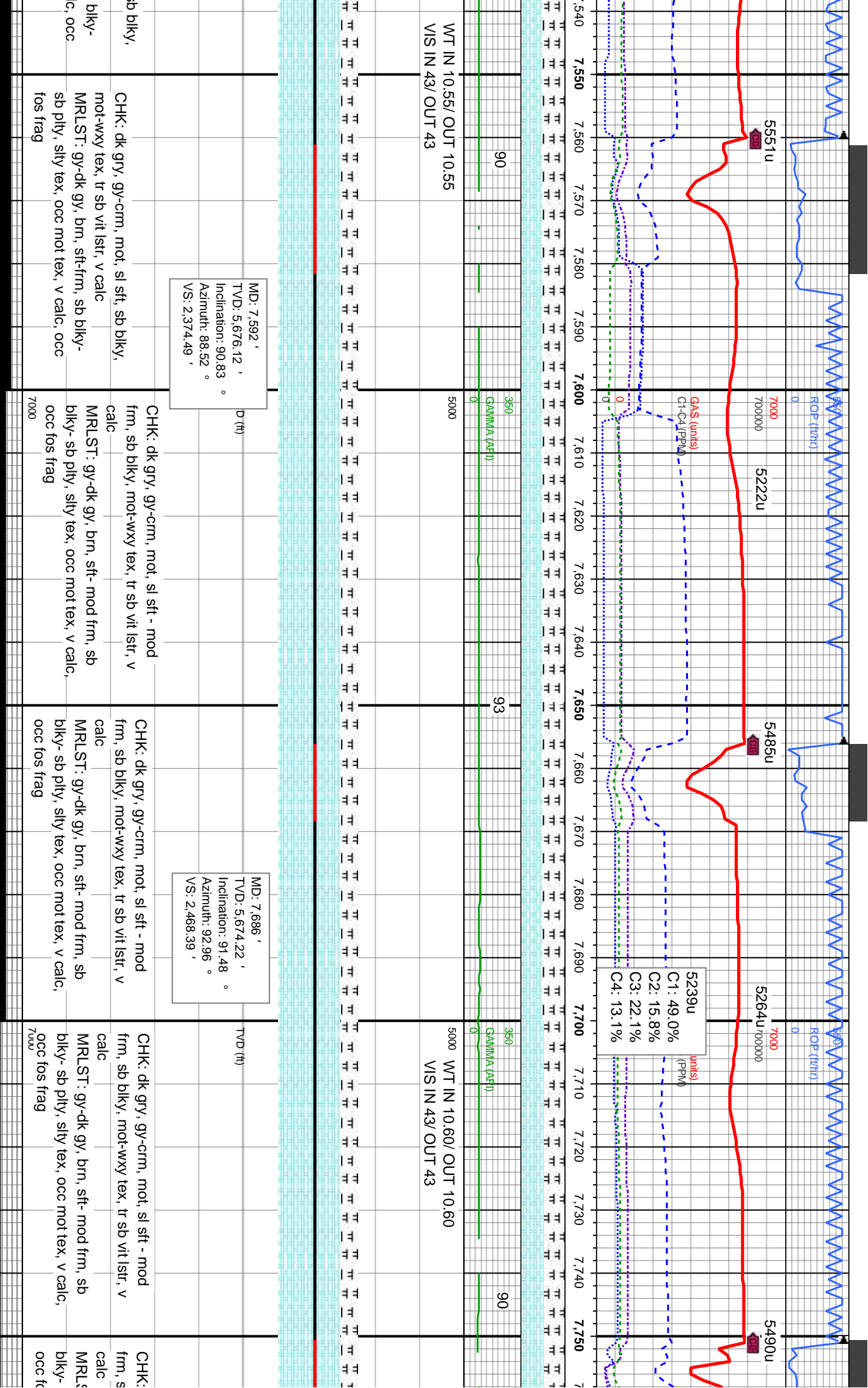




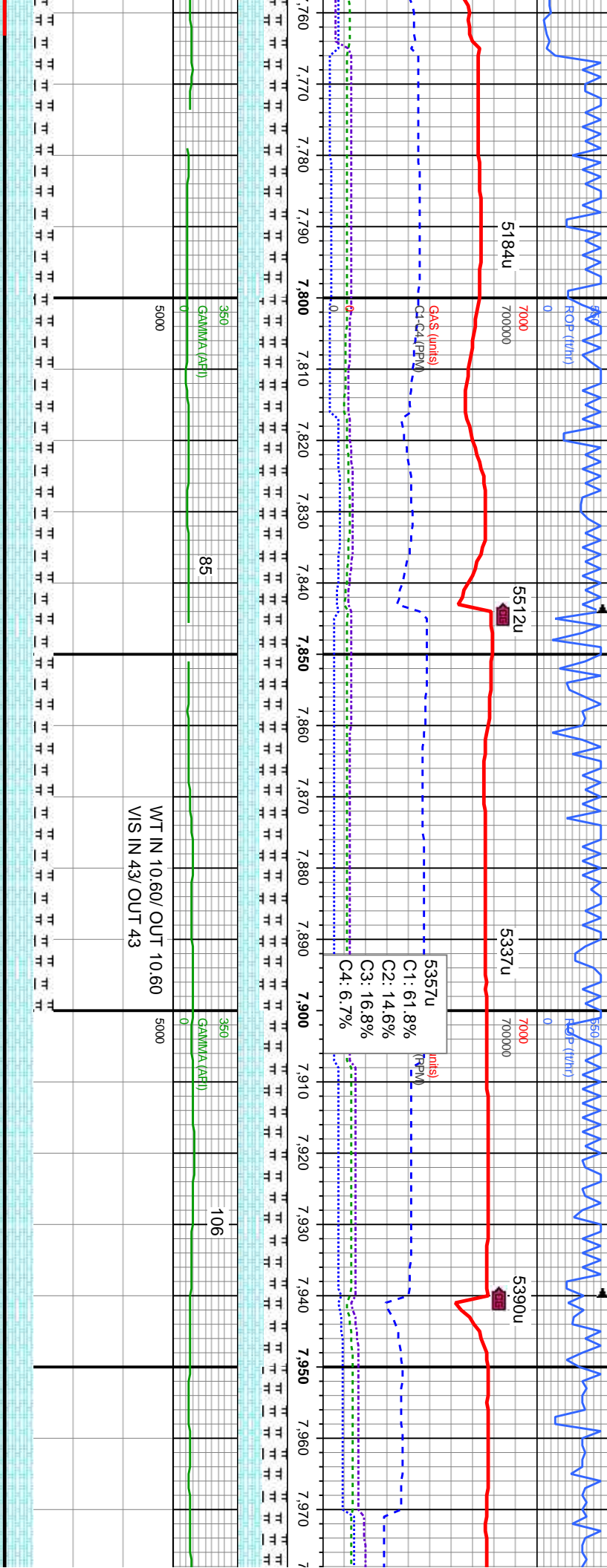












MD: 7.781 '  
TVD: 5,673.45 '  
Inclination: 89.44 °  
Azimuth: 90.66 °  
VS: 2,563.36 '

dk gry, gy-crm, mot, sl sft - mod  
b blkly, mot-wxy tex, tr sb vit lsir, v  
sft: gy-dk gy, brn, sft- mod frm, sb  
sb ply, silty tex, occ mot tex, v calc,

TVD (ft)

MRLST: gy-dk gy, brn, sft, sb blkly- sb ply,  
silty tex, occ mot tex, v calc, tr fos frag  
CHK: dk gry, gy-crm, mot, sl sft - mod frm,  
sb blkly, mot-wxy tex, tr sb vit lsir, v calc

MD: 7.876 '  
TVD: 5,674.6 '  
Inclination: 89.17 °  
Azimuth: 89.43 °  
VS: 2,658.24 '

WT IN 10.60/ OUT 10.60  
VIS IN 43/ OUT 43

TVD (ft)

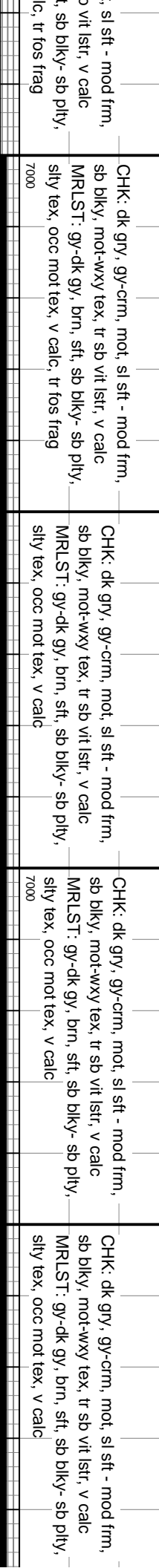
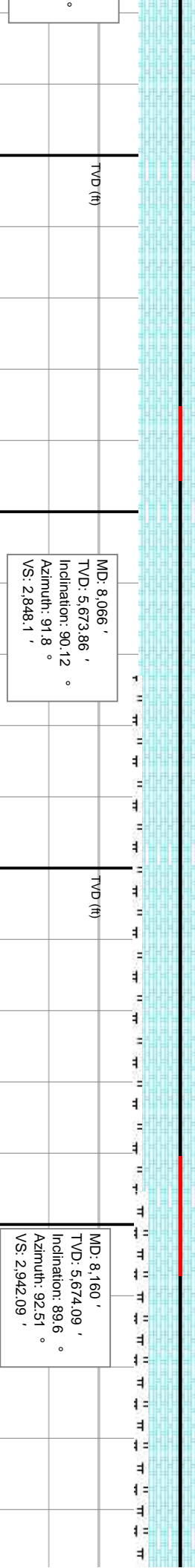
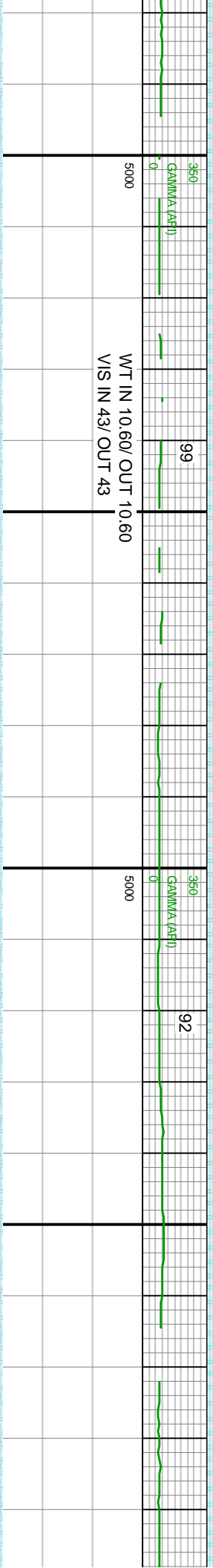
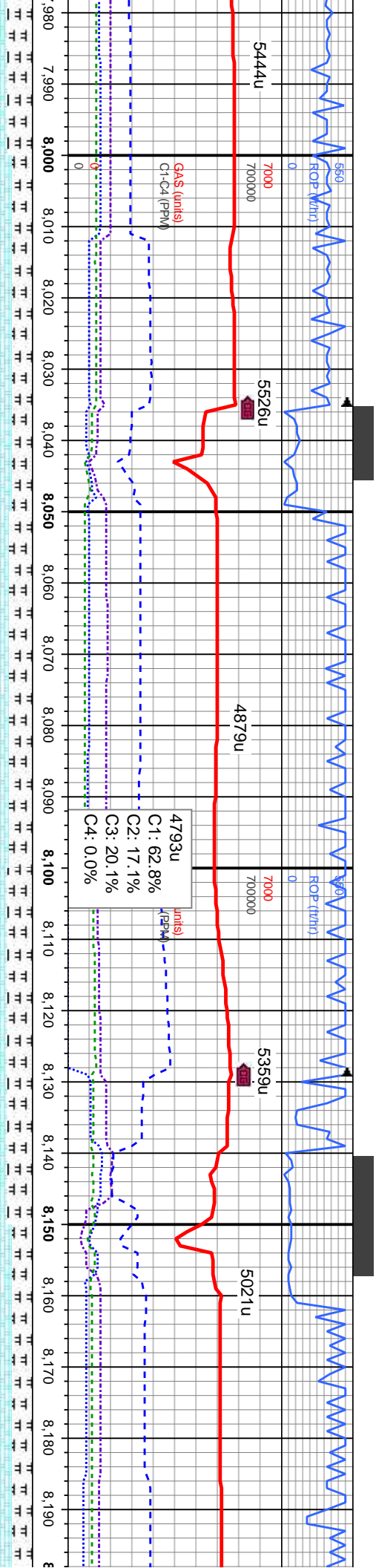
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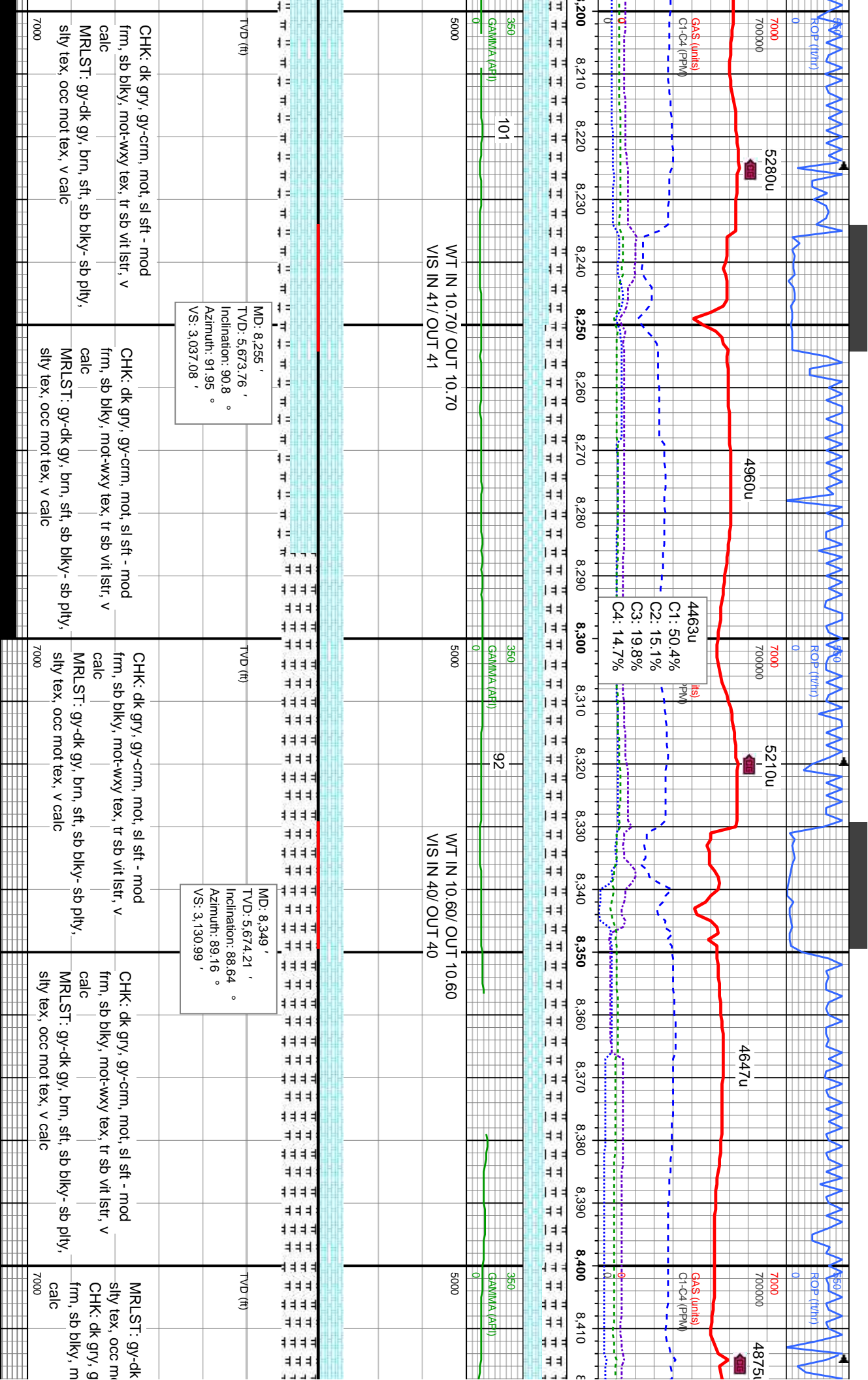
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sb blkly, mot-wxy tex, tr sb vit lsir, v calc  
MRLST: gy-dk gy, brn, sft, sb blkly- sb ply,  
silty tex, occ mot tex, v calc, tr fos frag

MD: 7.971 '  
TVD: 5,674.63 '  
Inclination: 90.8 °  
Azimuth: 90.91 °  
VS: 2,753.13 '

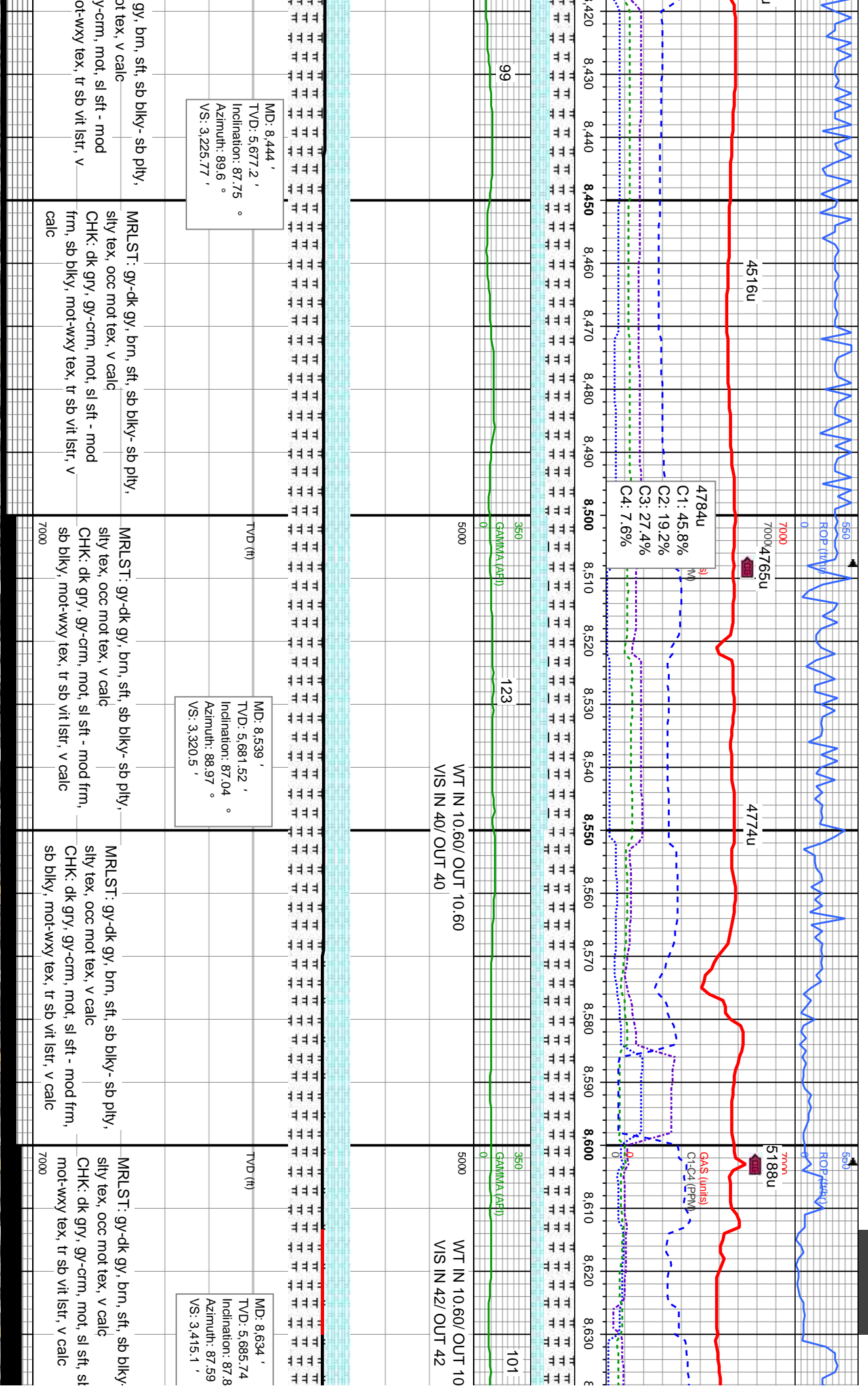
CHK: dk gry, gy-crm, mot  
sb blkly, mot-wxy tex, tr sl  
MRLST: gy-dk gy, brn, sf  
silty tex, occ mot tex, v ca











MD: 8,444 '  
TVD: 5,677.2 '  
Inclination: 87.75 °  
Azimuth: 89.6 °  
VS: 3,225.77 '

MD: 8,539 '  
TVD: 5,681.52 '  
Inclination: 87.04 °  
Azimuth: 88.97 °  
VS: 3,320.5 '

MD: 8,634 '  
TVD: 5,685.74 '  
Inclination: 87.8 °  
Azimuth: 87.59 °  
VS: 3,415.1 '

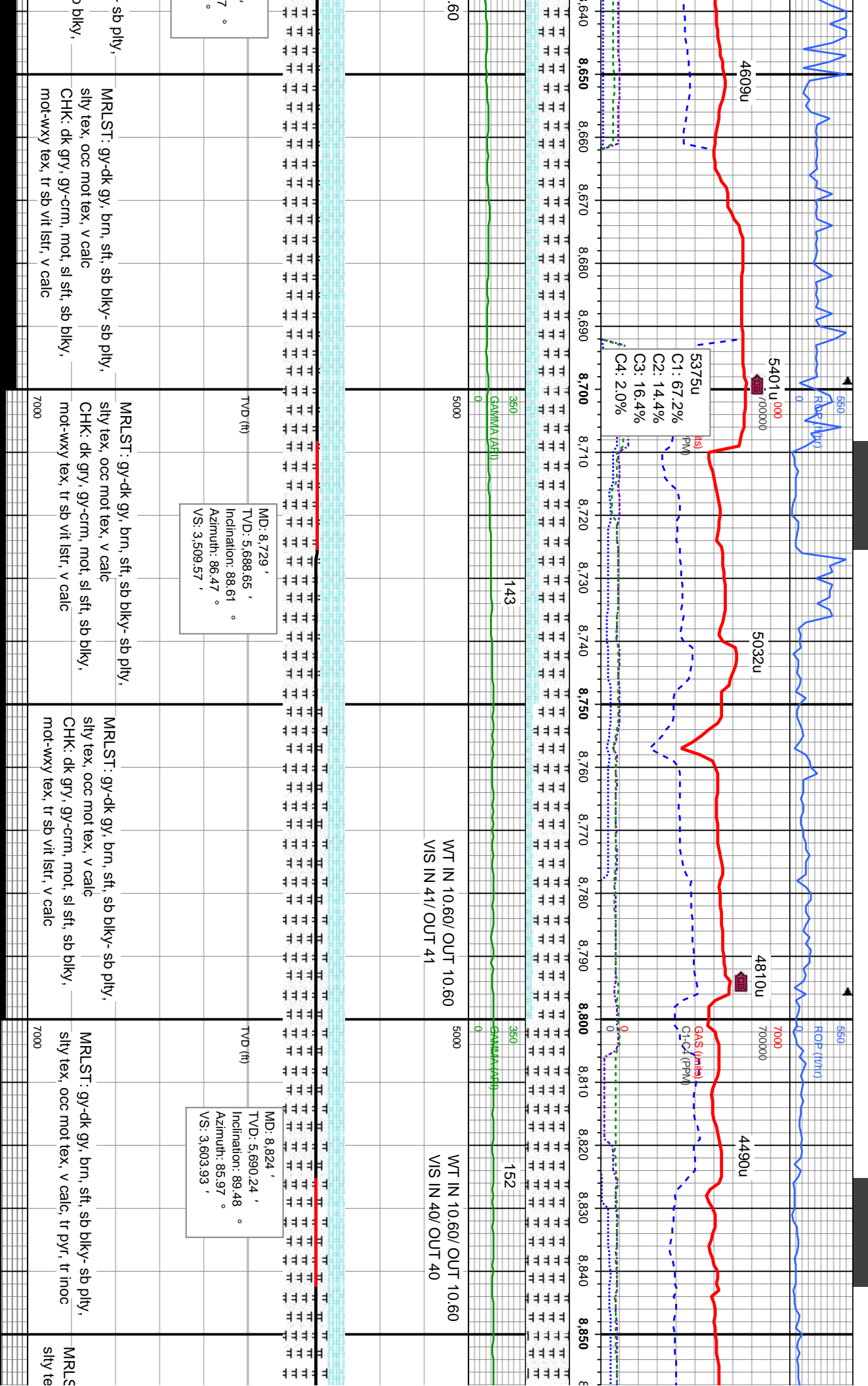
gy, brn, sft, sb blkly- sb plty,  
ot tex, v calc  
y-crm, mot, sl sft - mod  
ot-wxy tex, tr sb vit lstr, v

MRLST: gy-dk gy, brn, sft, sb blkly- sb plty,  
sily tex, occ mot tex, v calc  
CHK: dk gry, gy-crm, mot, sl sft - mod  
frm, sb blkly, mot-wxy tex, tr sb vit lstr, v  
calc

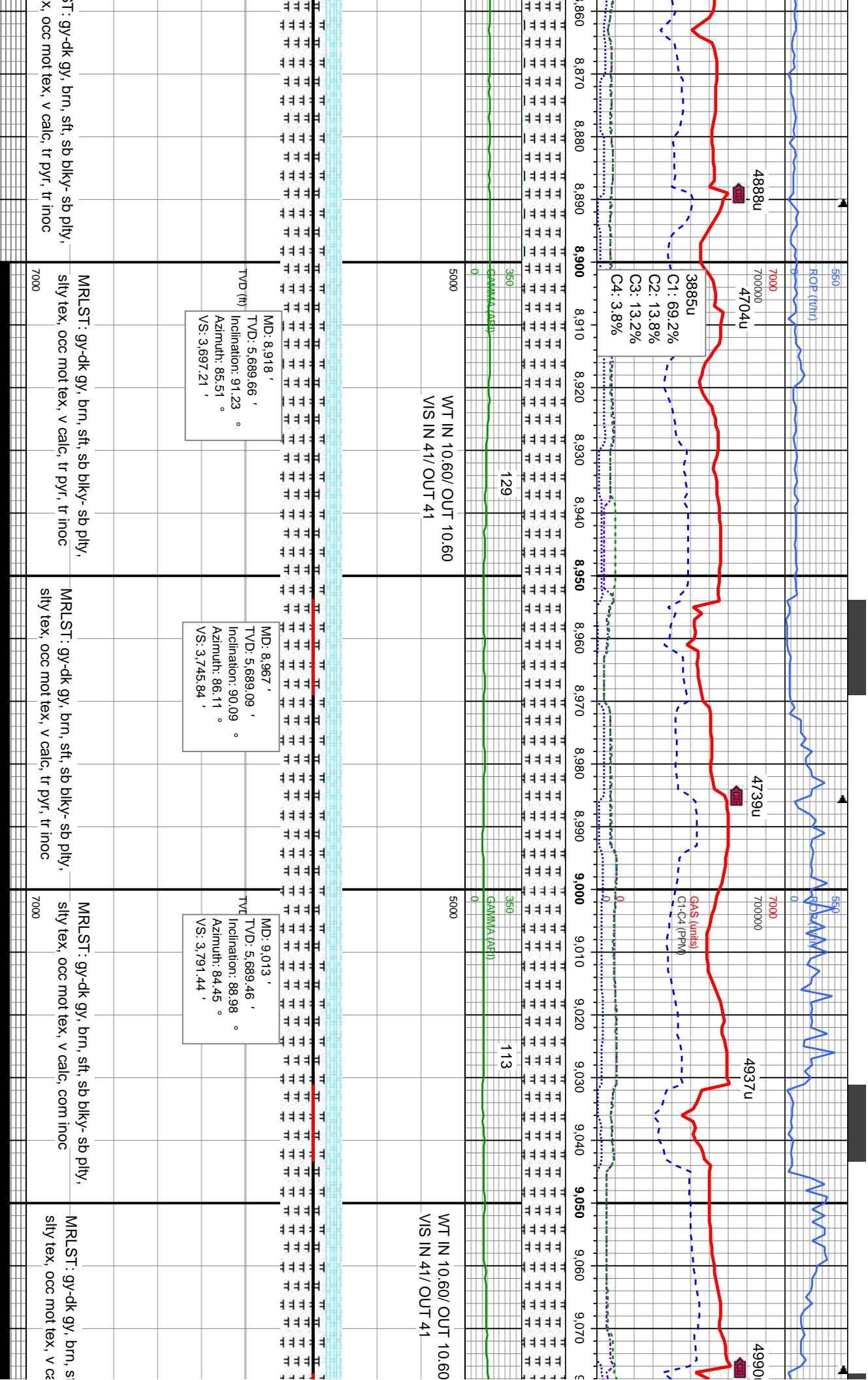
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CHK: dk gry, gy-crm, mot, sl sft - mod frm,  
sb blkly, mot-wxy tex, tr sb vit lstr, v calc

MRLST: gy-dk gy, brn, sft, sb blkly- sb plty,  
sily tex, occ mot tex, v calc  
CHK: dk gry, gy-crm, mot, sl sft - mod frm,  
sb blkly, mot-wxy tex, tr sb vit lstr, v calc









ST: gy-dk gy, brn, sft, sb blkly-sb plty, x, occ mot tex, v calc, tr pyr, tr inoc

MRLST: gy-dk gy, brn, sft, sb blkly-sb pily,  
silty tex, occ mot tex, v calc, tr pyr, tr inoc

MRLST: gy-dk gy, brn, sft, sb blk- sb plty, slty tex, occ mot tex, v calc, tr pyr, tr inoc

MRLST: gy-dk gy, brn, sft, sb blkyy-sb plty,  
silty tex, occ mot tex, v calc, com inoc  
7000

MRLST: gy-dk gy, brn, s  
silty tex, occ mot tex, v ca

