



**CEMENT BOND LOG
WITH GAMMA RAY**

Comp. ENTRANSCO ENERGY, LLC
Well T. WIEBE NO.30-2
Field HAZLETT
Co. BUTLER
State KANSAS

Company **ENTRANSCO ENERGY, LLC**
Well **T. WIEBE NO.30-2**
Field **HAZLETT**
County **BUTLER** State **KANSAS**

Location: API #: 15-015-24102-00-00
1650' FSL & 825' FEL
E2 SW NE SE
SEC 30 TWP 23S RGE 5E
Permanent Datum GROUND LEVEL Elevation 1470'
Log Measured From KB 6' Above Perm. Datum
Drilling Measured From KELLY BUSHING
GRN PERFORATE
Elevation
K.B. 1476'
D.F. 1475'
G.L. 1470'

Date of Service	9/27/2018		
Run Number	ONE		
Depth Driller or PBTD	2600'		
Depth Logger	2578'		
Bottom Log Interval	2573'		
Top Log Interval	1000'		
Open Hole Size	7.875"		
Type Fluid	WATER		
Fluid Level	FULL		
Fluid Density	N/A		
Max. Recorded Temperature	110 DEG. F.		
Max. Wellhead Pressure	00 PSI		
Wellhead Connection	N/A		
Estimated Cement Top	1270'		
Unit Number	P-106		
Wireline Size	.288"		
Location	HAYS, KS		
Recorded By	M. HISS		
Witnessed By	RAY GILBERT		
	Size	WFt	Top
Tubing Record			Bottom
Surface Casing	8.625"	23#	00'
Production Casing	4.5"	11.5#	00'
Liner Record			TD

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All interpretations are opinions based on inferences from electrical or other measurements and Pioneer Wireline Services, LLC cannot and does not guarantee the accuracy or correctness of any interpretation, and Pioneer Wireline Services, LLC will not be liable or responsible for any loss, costs, damages, or expenses incurred or sustained by anyone resulting from any interpretation made by any of our officers, agents or employees.

Comments

N/A DENOTES NOT AVAILABLE OR NON-APPLICABLE.
NEWTON KANSAS
EAST ON FIRST ST. (150TH) TO NW PURITY SPRING RD,
2 SOUTH TO 130TH RD,
NORTH AND WEST INTO.

THANK YOU FOR USING PIONEER ENERGY SERVICES!

Your Pioneer Energy Services Crew Engineer: M. HISS Operator: K. PFANNENSTIEL Operator: Operator:	Tool Data - Services Serial Number
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Log Variables

DatabaseC:\ProgramData\Warrior\Data\transco_t_wiebe#30-2_cbl_grn.db
Dataset field/well/run1/pass4/_vars_

Top - Bottom


BOREID in 7.875	BOTTEMP degF 110	CASEOD in 4.5	CASETHCK in 0.25	CASEWGHT lb/ft 11.5	MAXAMPL mV 0	MINAMPL mV 1	MINATTN db/ft 0.08
NPORSEL Limestone	NPORSHIFT 0	PERFS 0	PPT usec 0	SRFTEMP degF 70	TDEPTH ft 2580		

Variable Description

BOREID : Borehole I.D.
BOTTEMP : Bottom Hole Temperature
CASEOD : Casing O.D.
CASETHCK : Casing Thickness
CASEWGHT : Casing Weight
MAXAMPL : Maximum Amplitude
MINAMPL : Minimum Amplitude

MINATTN : Minimum Attenuation
NPORSEL : Neutron Porosity Curve Select
NPORSHIFT : NPORSHIFT
PERFS : Perforation Flag
PPT : Predicted Pipe Time
SRFTEMP : Surface Temperature
TDEPTH : Total Depth

Sensor	Offset (ft)	Schematic	Description	Length (ft)	O.D. (in)	Weight (lb)	
			Cable Head-Titan_144 1 7/16" Titan Cable Head	1.03	1.44	2.00	
			Centralizer-275 Probe 2 3/4" Probe Adjustable Spring Centralizer	2.88	2.75	15.00	
			PROBE-RBT-DIGITAL-RBL-D (080554) Probe 2 3/4" Radii Bond-Digital	8.75	2.75	100.00	
WVFS8	16.35						
WVFS7	16.35						
WVFS6	16.35						
WVFS5	16.35						
WVFS4	16.35						
WVFS3	16.35						
WVFS2	16.35						
WVFS1	16.35						
WVFCAL	16.35						
WV3FT	16.35						
WV5FT	15.35						
HEADVOLT	12.17		Centralizer-275 Probe 2 3/4" Probe Adjustable Spring Centralizer	2.88	2.75	15.00	
CCL	8.39						

GR	7.08		PROBE-GR/CCL-DIGITAL-275 Probe GR-4.54 (11102.75 Probe 2 3/4" Gamma Ray / CCL DIGITAL			60.00
			NEU-PRNEU (ProbeNEU1)	4.75	1.88	
NEU	1.08					

Dataset: entransco_t_wiebe#30-2_cbl_grn.db: field/well/run1/pass4
 Total length: 24.83 ft
 Total weight: 192.00 lb
 O.D.: 2.75 in

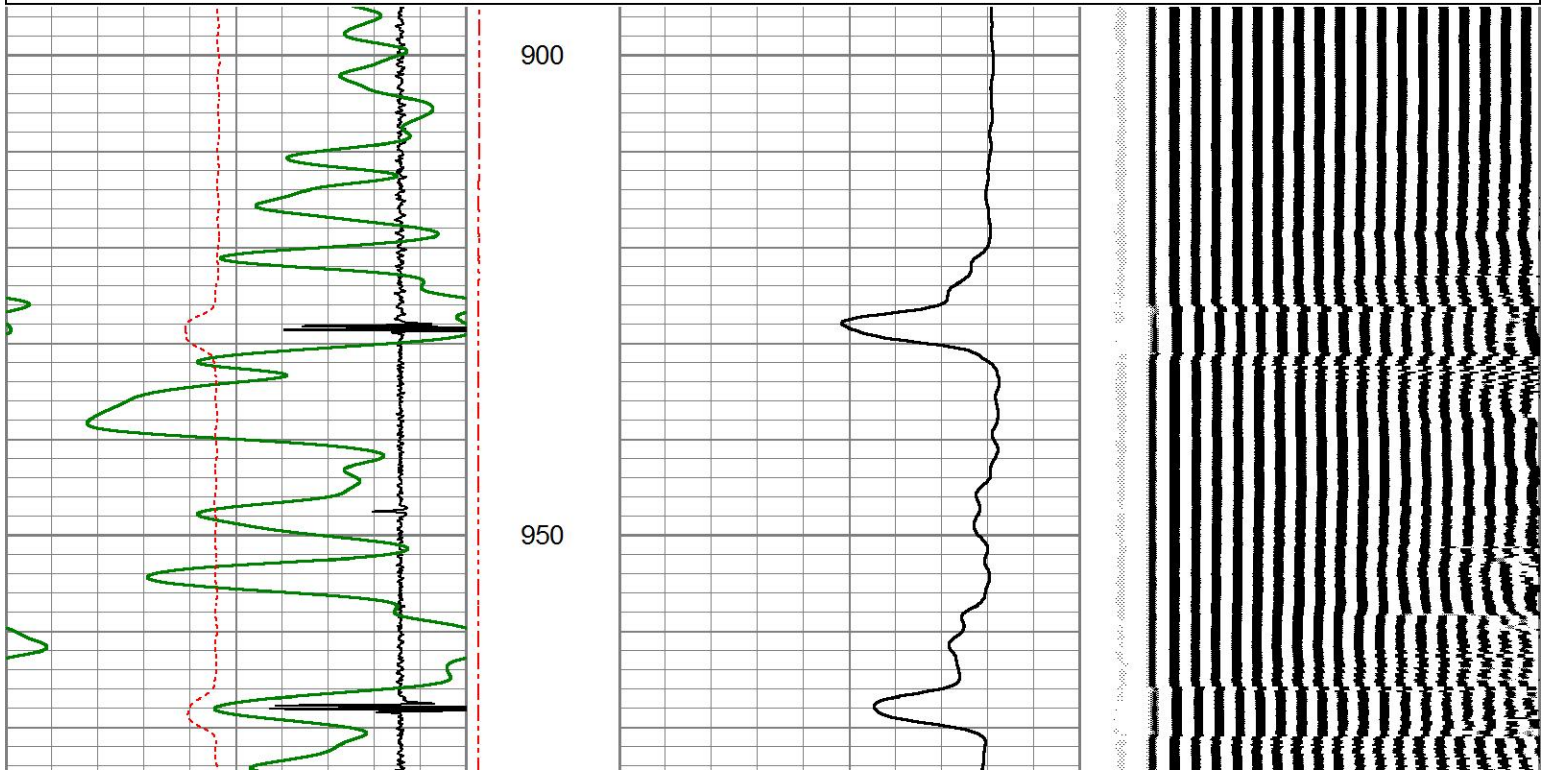


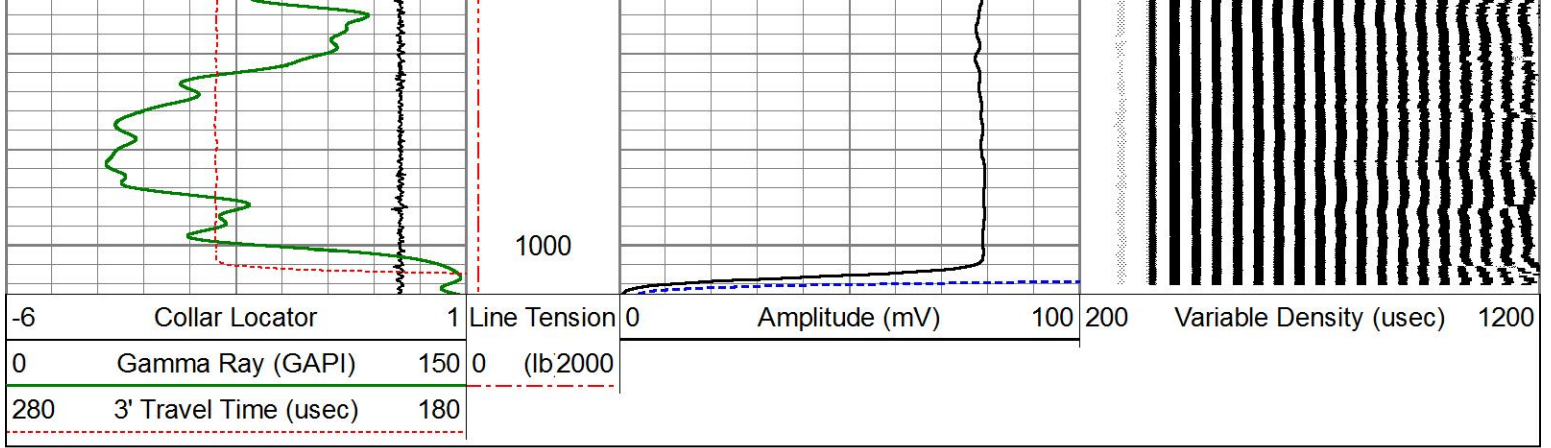
FREE PIPE SECTION


ZERO PSI APPLIED AT SURFACE

Database File entransco_t_wiebe#30-2_cbl_grn.db
 Dataset Pathname pass1.3
 Presentation Format pinr_cbl
 Dataset Creation Thu Sep 27 08:56:15 2018
 Charted by Depth in Feet scaled 1:240

-6	Collar Locator	1	Line Tension	0	Amplitude (mV)	100	200	Variable Density (usec)	1200
0	Gamma Ray (GAPI)	150	0 (lb2000)						
280	3' Travel Time (usec)	180							



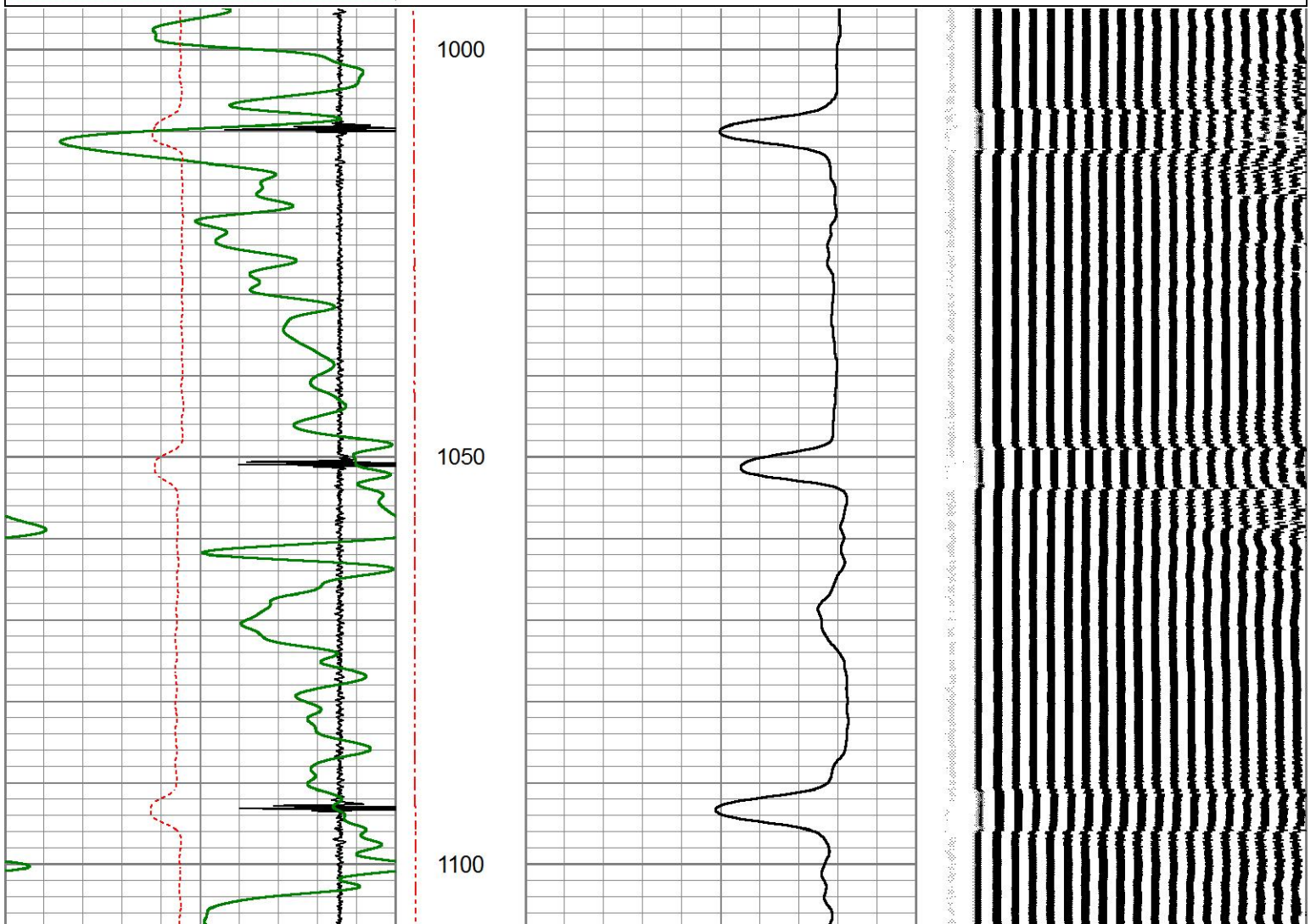
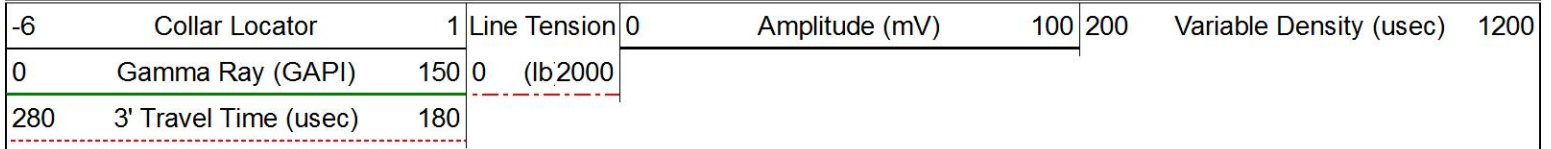


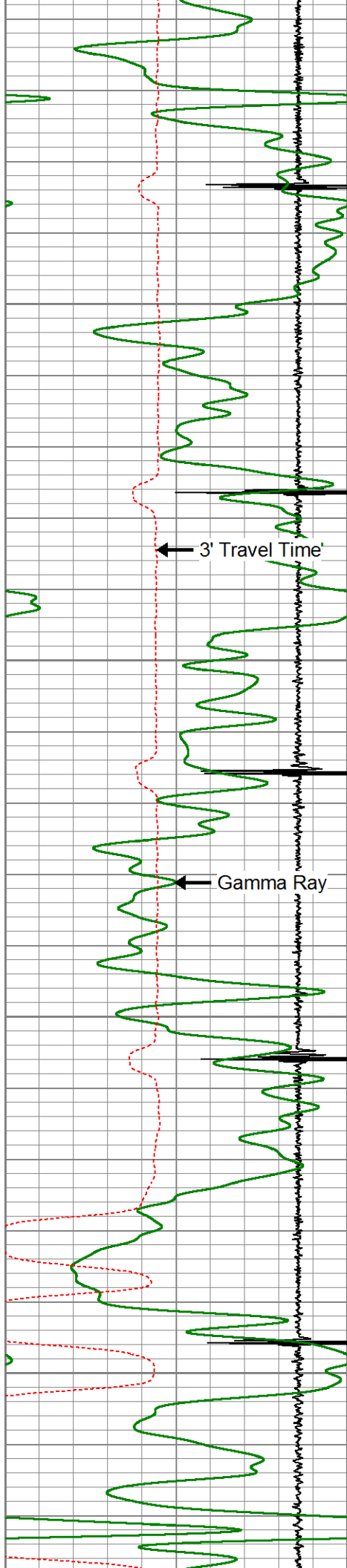


MAIN LOG

ZERO PSI APPLIED AT SURFACE

Database File entransco_t_wiebe#30-2_cbl_grn.db
 Dataset Pathname pass4
 Presentation Format pinr_cbl
 Dataset Creation Thu Sep 27 09:17:52 2018
 Charted by Depth in Feet scaled 1:240





1150

← 3' Travel Time

1200

← Line Tension

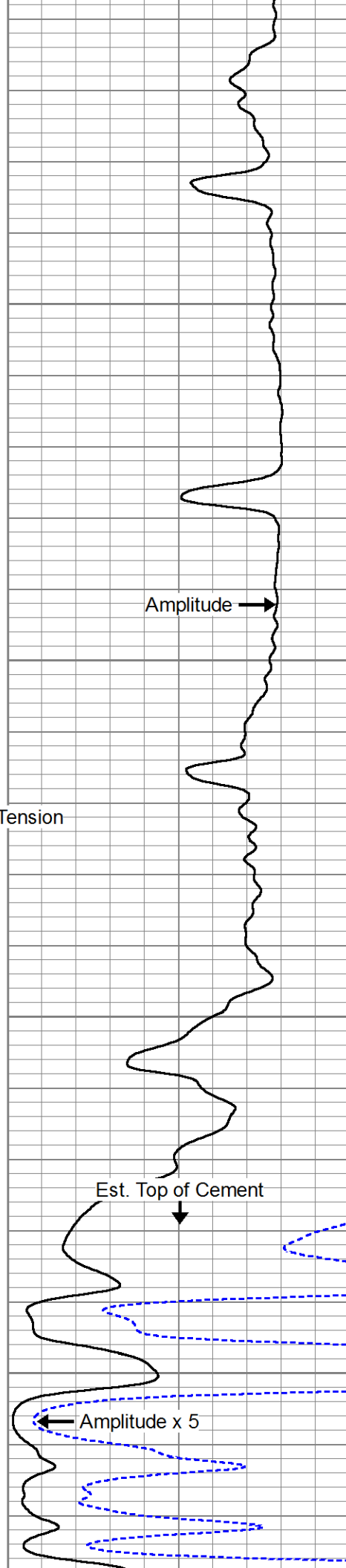
← Gamma Ray

1250

Est. Top of Cement

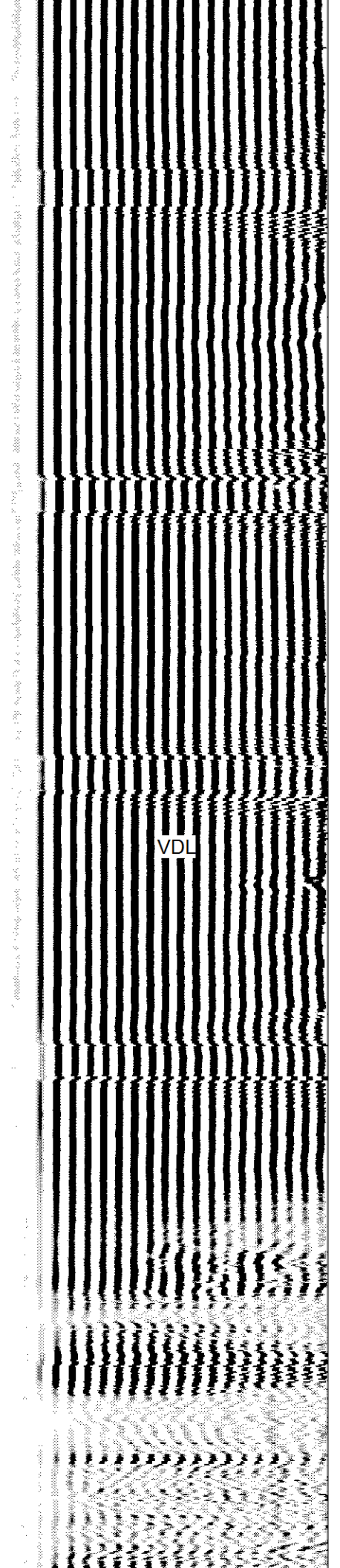
1300

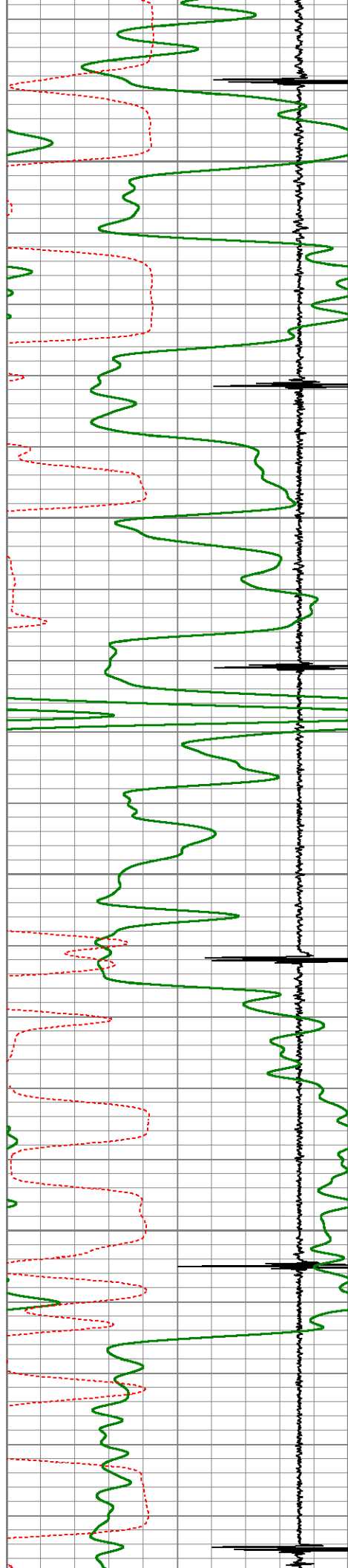
← Amplitude x 5



Amplitude →

VDL



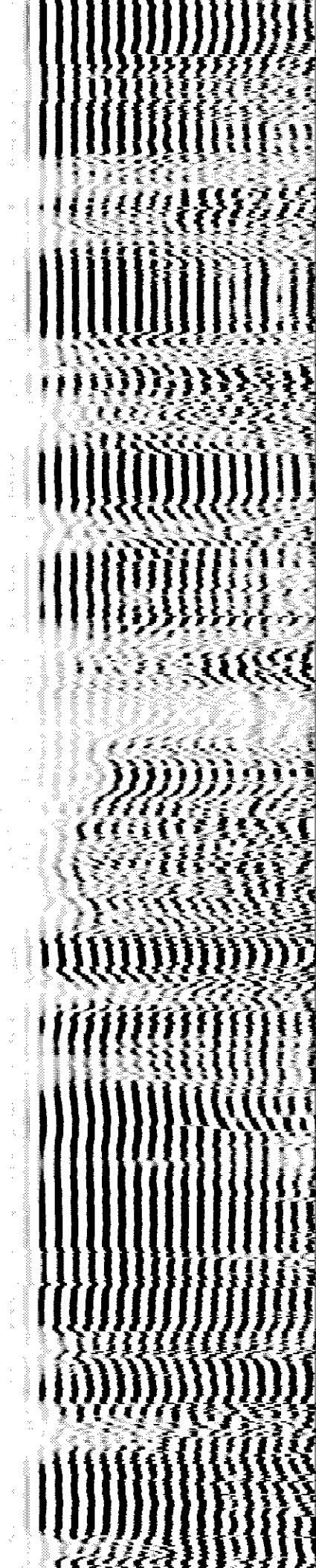
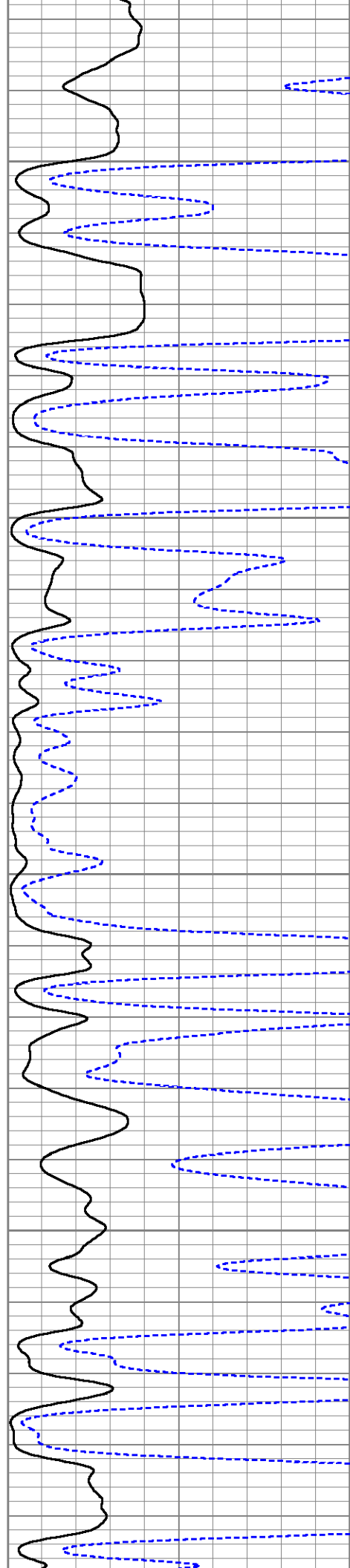


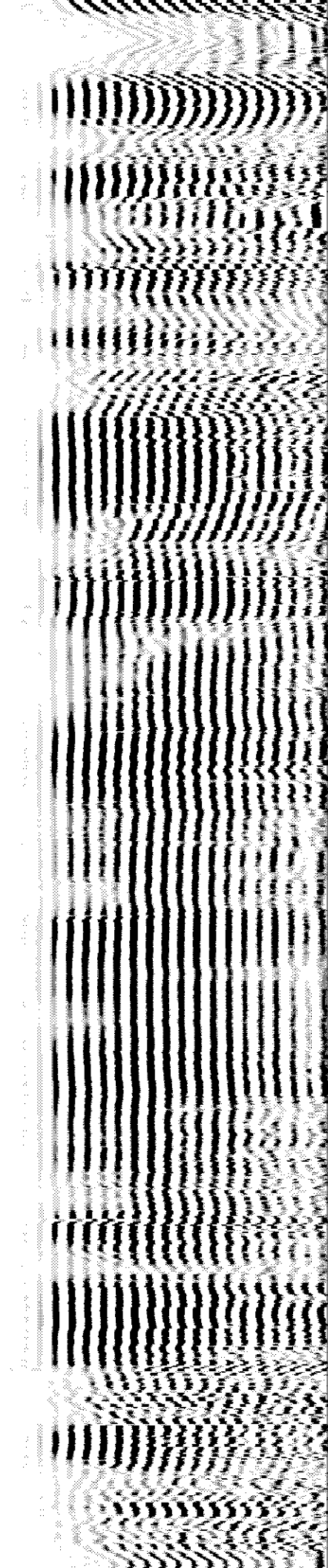
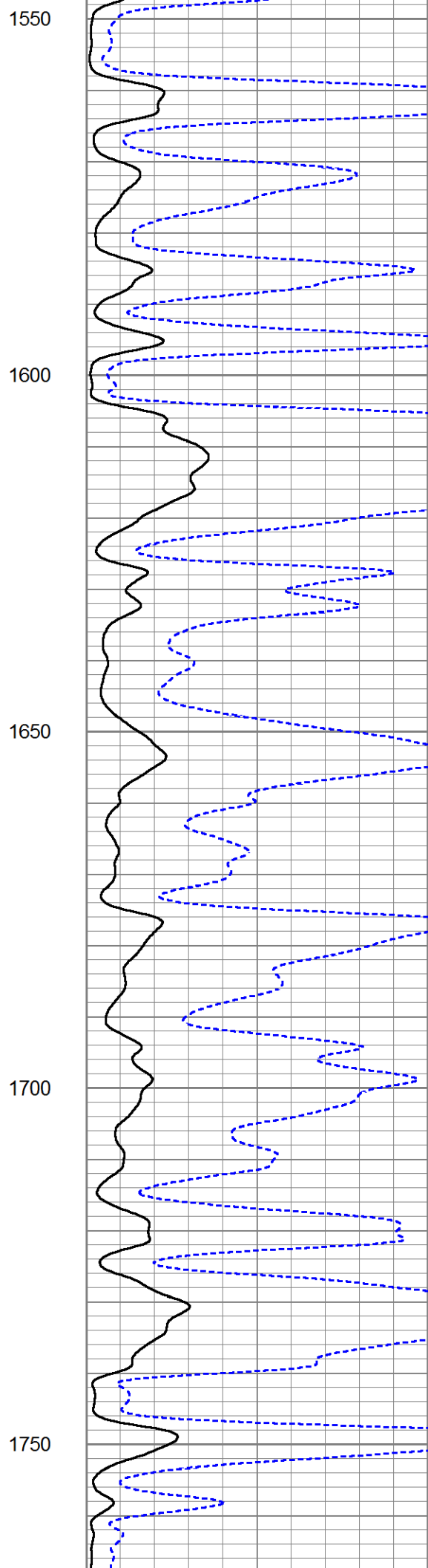
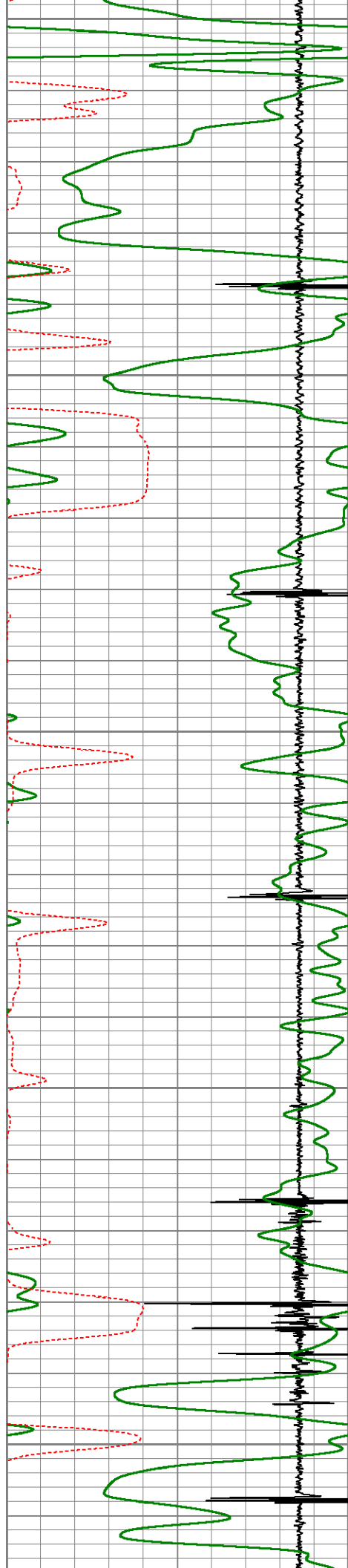
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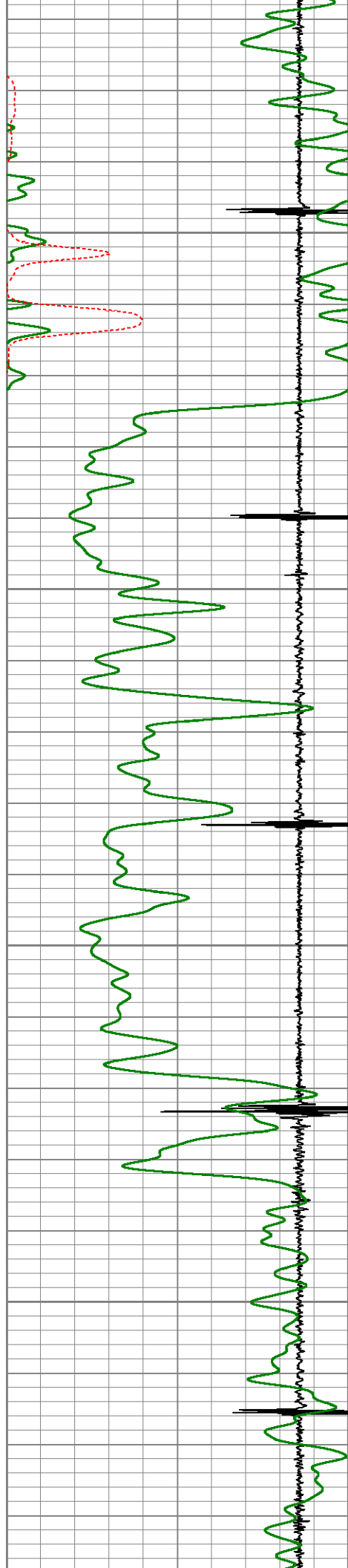
1400

1450

1500





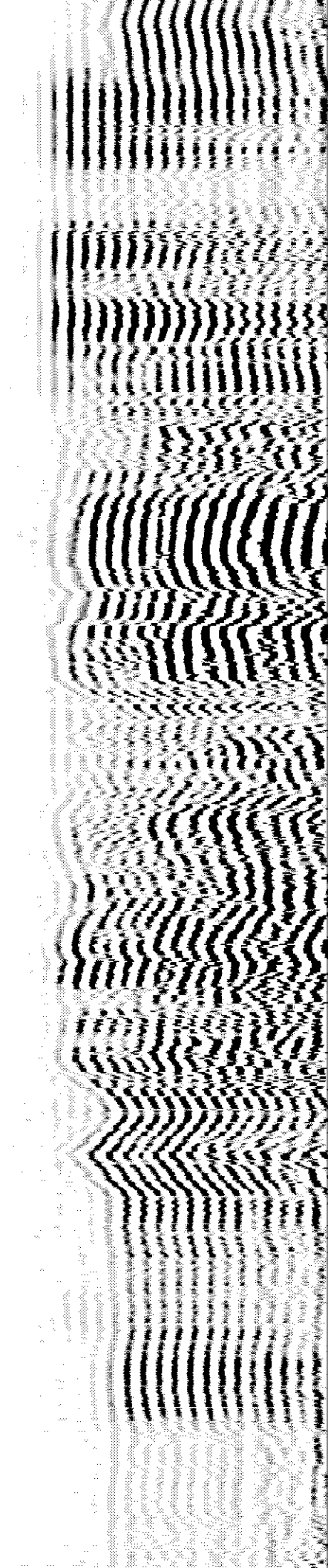
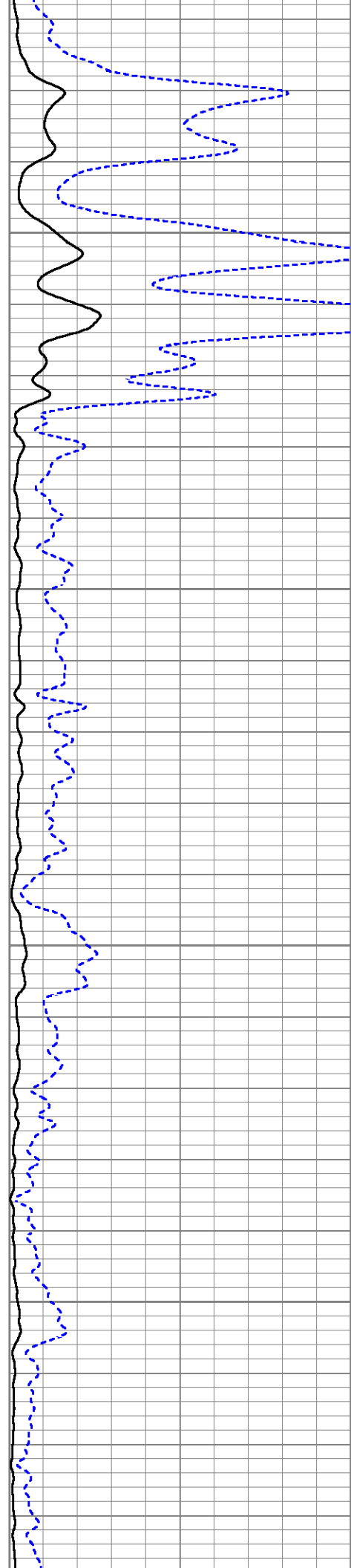


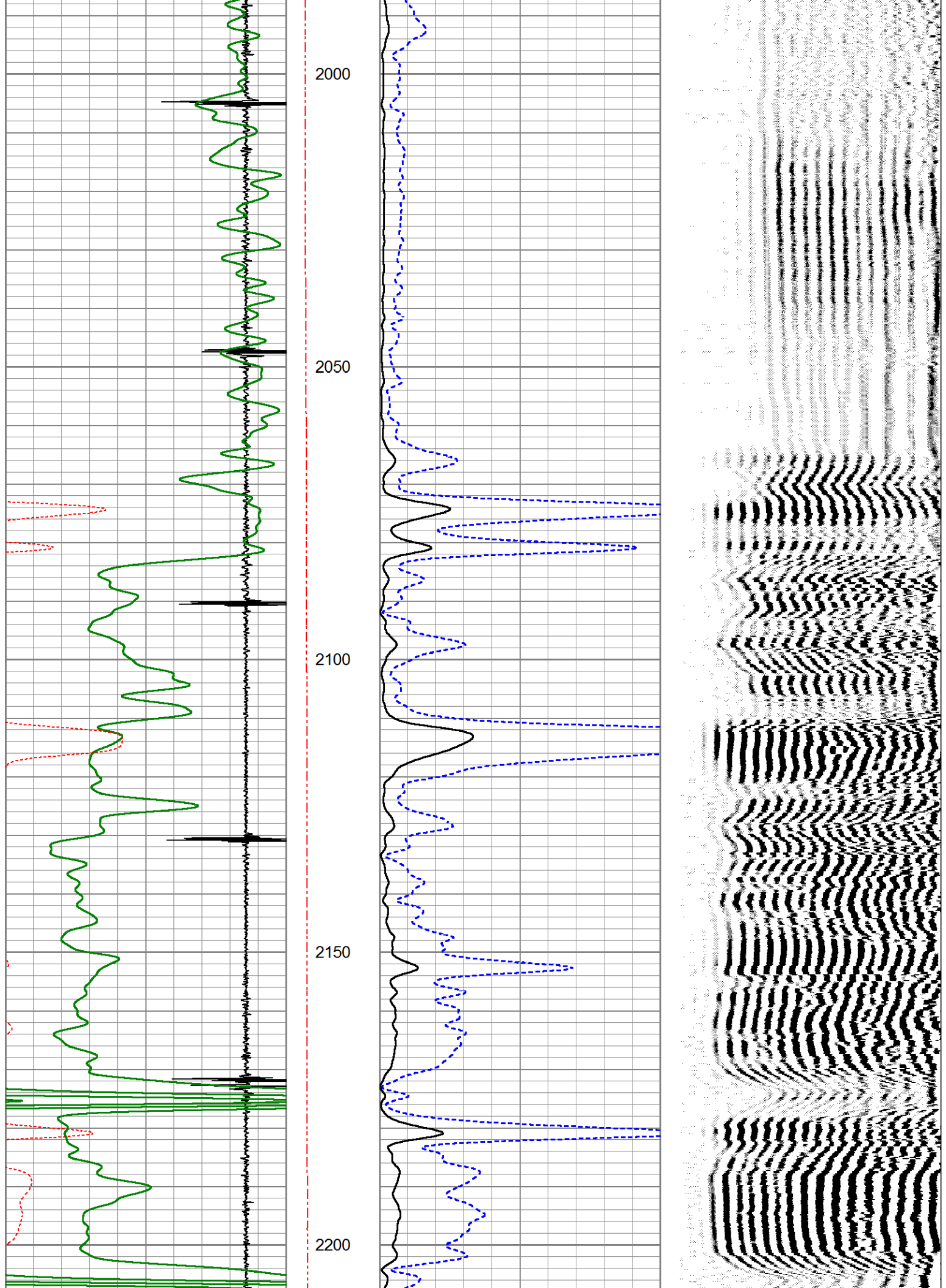
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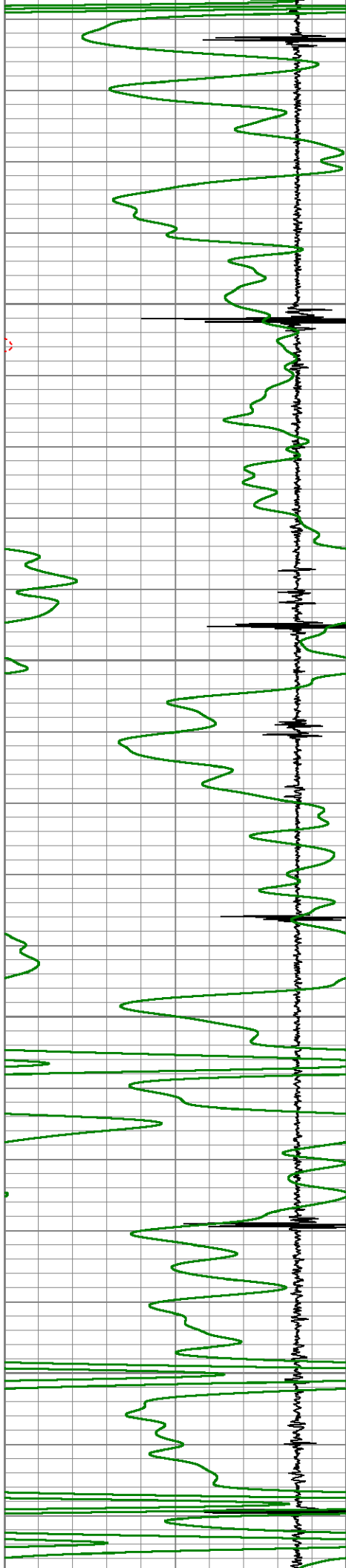
1850

1900

1950





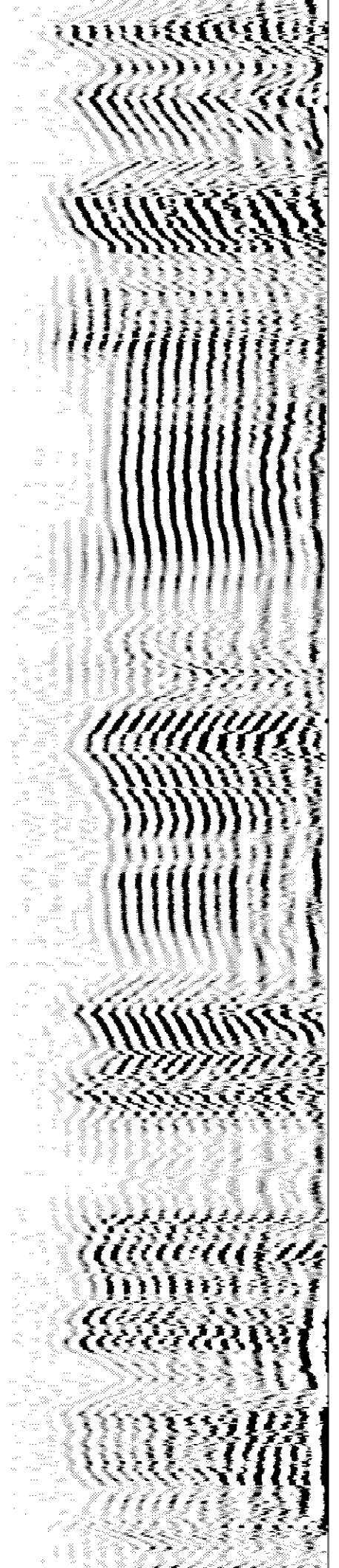
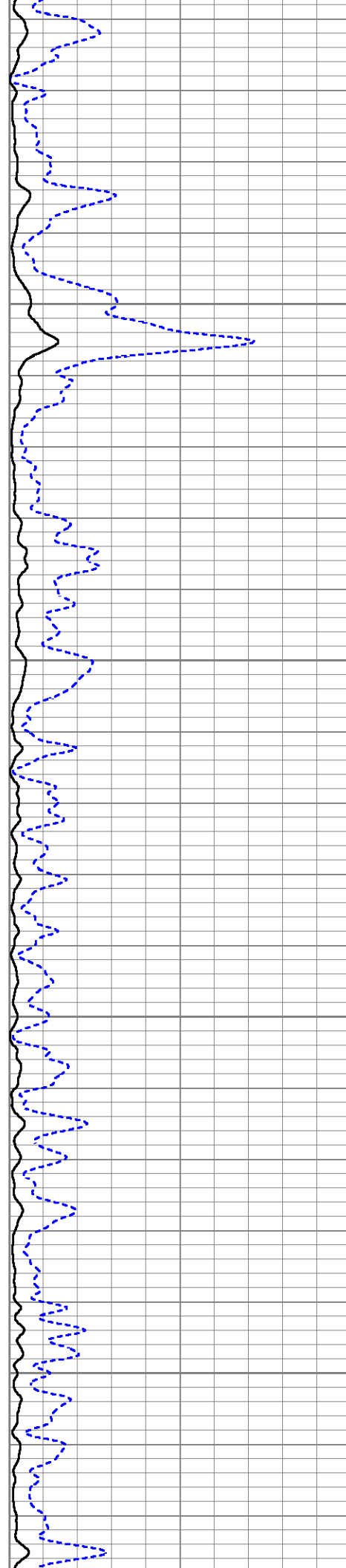


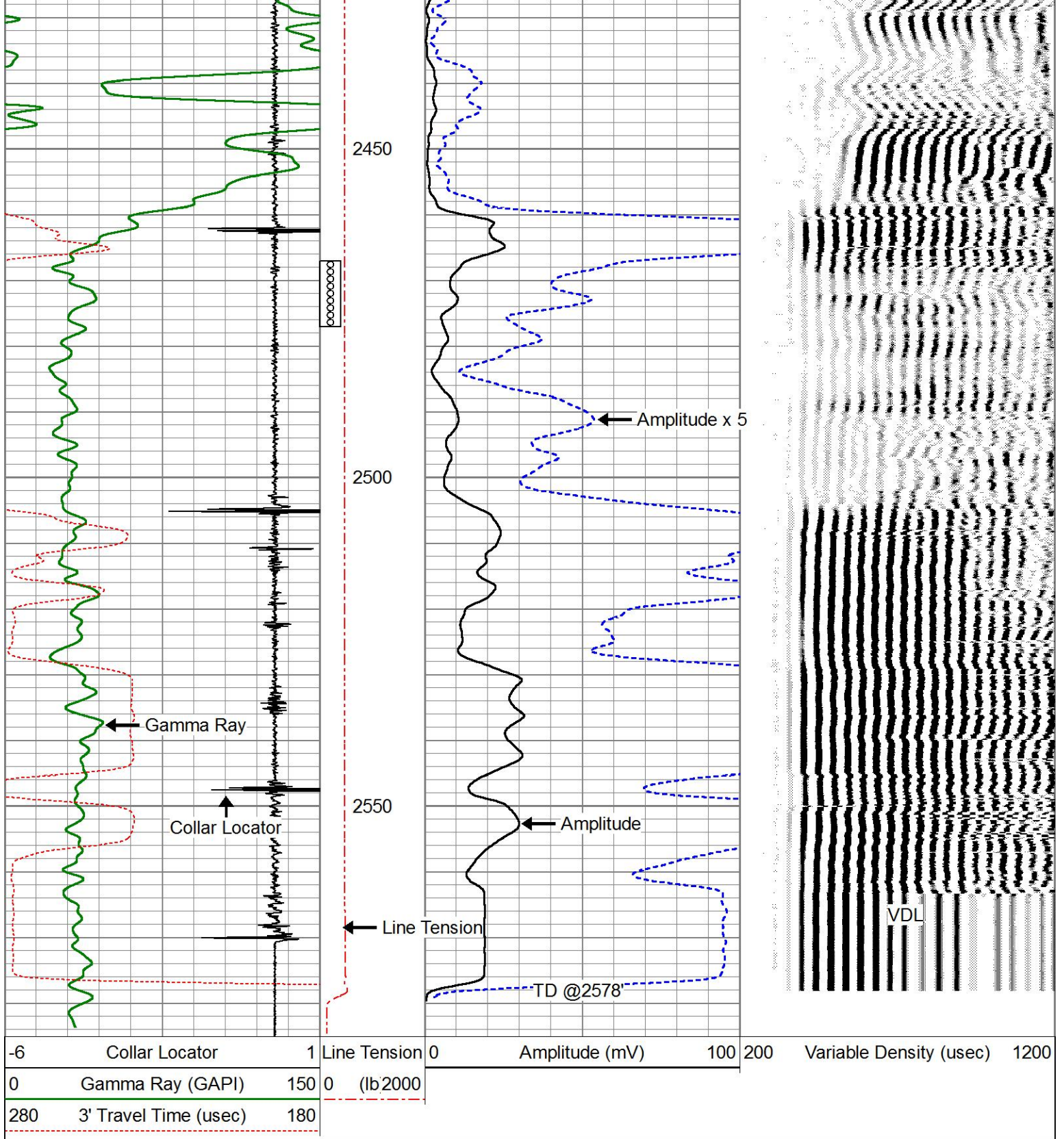
2250

2300

2350

2400



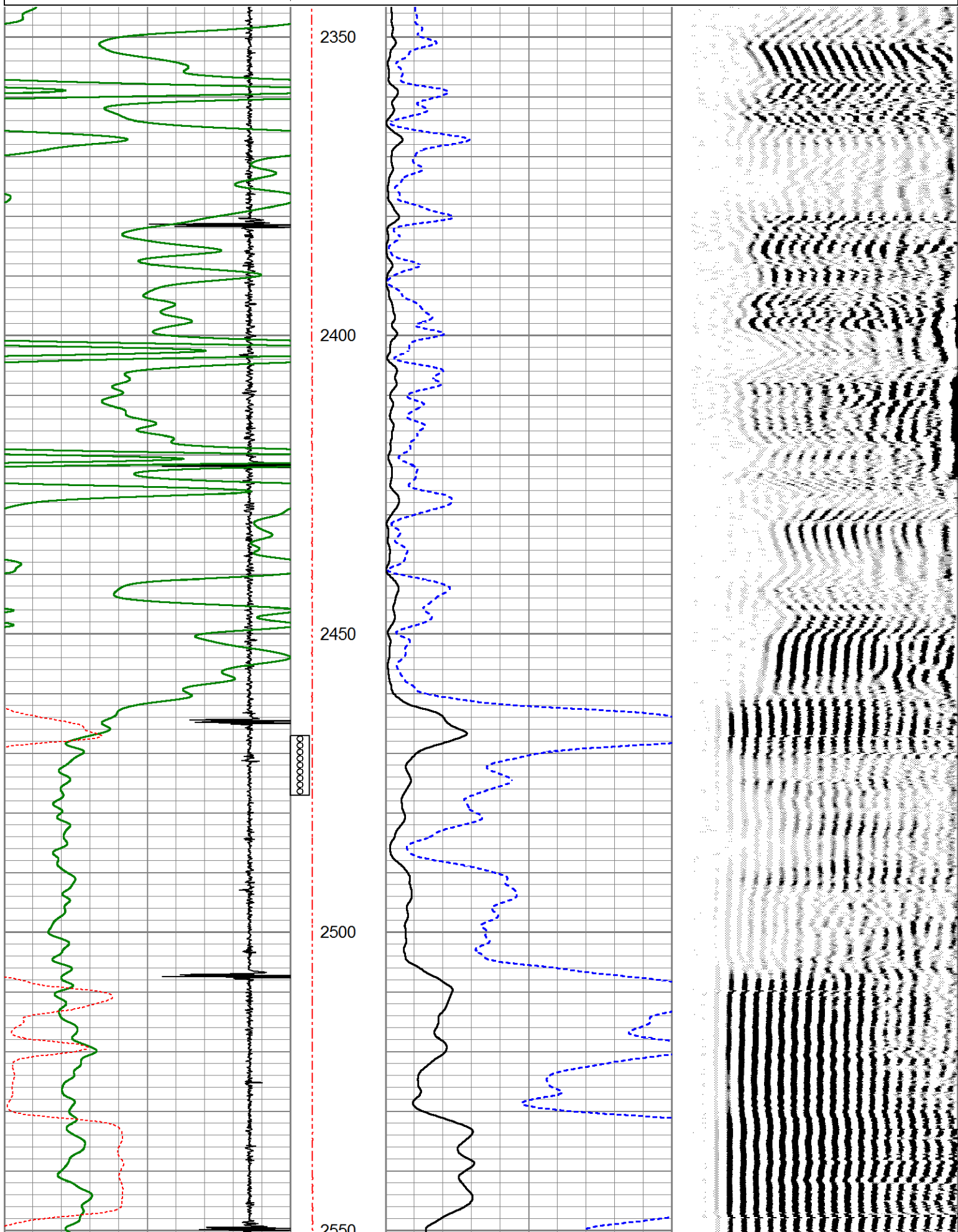


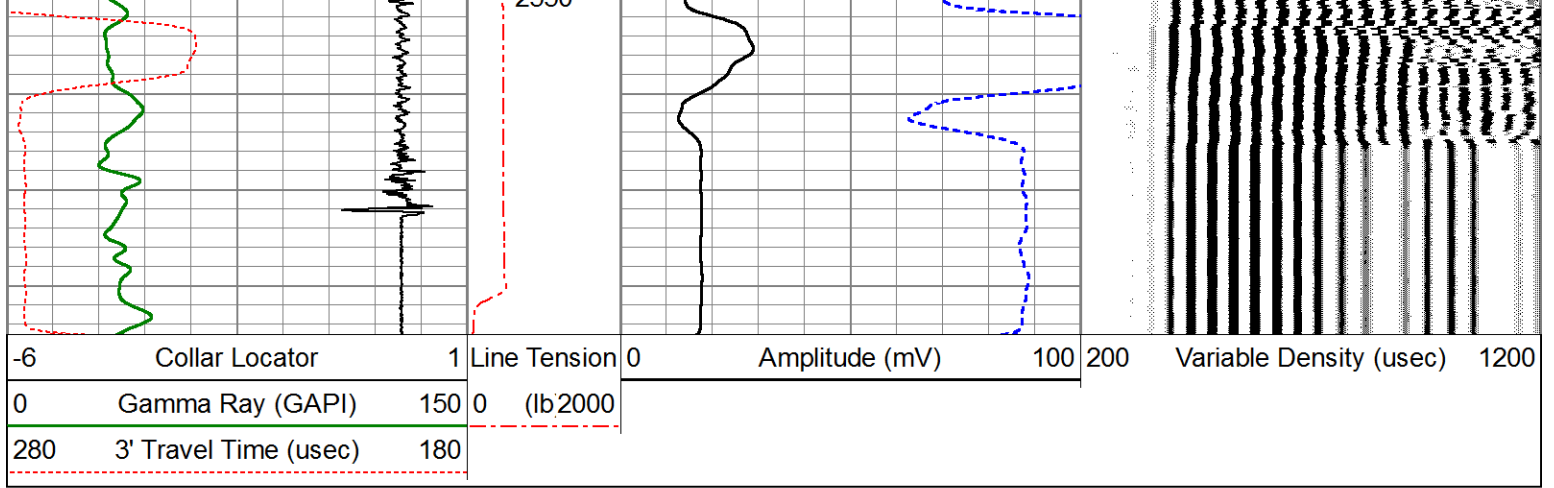
REPEAT SECTION

ZERO PSI APPLIED AT SURFACE

Database File	entransco_t_wiebe#30-2_cbl_grn.db
Dataset Pathname	pass3
Presentation Format	pinr_cbl
Dataset Creation	Thu Sep 27 09:07:18 2018
Charted by	Depth in Feet scaled 1:240

6	Collar Locator	1	Line Tension	0	Amplitude (mV)	100	200	Variable Density (usec)	1200
0	Gamma Ray (GAPI)	150	0	(lb2000)					
280	3' Travel Time (usec)	180							





Calibration Report

Database File entransco_t_wiebe#30-2_cbl_grn.db
 Dataset Pathname pass4
 Dataset Creation Thu Sep 27 09:17:52 2018

Neutron Calibration Report

Serial Number: ProbeNEU1
 Tool Model: PRNEU
 Performed: (Not Performed)

Calibrator Value: 1 NAPI
 Calibrator Reading: 1 cps
 Sensitivity: 1 NAPI/cps

Gamma Ray Calibration Report

Serial Number: 111032
 Tool Model: 275 Probe GR-CCL
 Performed: Wed Sep 26 09:20:51 2018

Calibrator Value: 1.0 GAPI
 Background Reading: 0.0 cps
 Calibrator Reading: 1.0 cps
 Sensitivity: 1.0000 GAPI/cps

Segmented Cement Bond Log Calibration Report

Serial Number: 080554
 Tool Model: RBL-D

Calibration Casing Diameter: 4.500 in
 Calibration Depth: 956.262 ft

Master Calibration, performed Thu Sep 27 08:55:42 2018:

	Raw (v)		Calibrated (mv)		Results	
	Zero	Cal	Zero	Cal	Gain	Offset
3'	0.002	1.510	0.700	81.196	53.376	0.577
CAL	0.003	1.720				
5'	0.003	1.404	0.700	81.196	57.452	0.556
SUM						
S1	0.018	1.439	0.000	100.000	70.410	-1.300
S2	0.008	1.417	0.000	100.000	71.006	0.586

S2	0.008	1.417	0.000	100.000	71.006	-0.586
S3	0.008	1.449	0.000	100.000	69.401	-0.546
S4	0.011	1.510	0.000	100.000	66.717	-0.748
S5	0.011	1.560	0.000	100.000	64.531	-0.696
S6	0.017	1.614	0.000	100.000	62.618	-1.042
S7	0.008	1.629	0.000	100.000	61.705	-0.520
S8	0.008	1.511	0.000	100.000	66.566	-0.560

Air Zero Calibration, performed Thu Sep 27 08:43:52 2018:

	Raw (v)	Calibrated (v)	Results
	<u>Zero</u>	<u>Zero</u>	<u>Offset</u>
3'	0.000	0.000	0.000
5'	0.000	0.000	0.000
SUM			
S1	0.000	0.000	0.000
S2	0.000	0.000	0.000
S3	0.000	0.000	0.000
S4	0.000	0.000	0.000
S5	0.000	0.000	0.000
S6	0.000	0.000	0.000
S7	0.000	0.000	0.000
S8	0.000	0.000	0.000



PIONEER
Pioneer Energy Services

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