



RADIAL ANALYSIS BOND LOG

Baker Atlas

File No: 1549	Company Well Field County	MARATHON OIL COMPANY 596-29C-12 GRAND VALLEY GARFIELD	State COLORADO
API No: 05-045-18090-00	Location SHL: 1781 'FSL & 1388' FWL		Other Services 3.781 GAUGE
SEC 29 TWP 55 RGE 96W			
Permanent Datum Log Measured From Drill Measured From	G.L. _____ Elevation 8180 ft K.B. _____ 24 ft Above P. D. KELLY BUSHING _____	Elevations KB 8204 ft DF 8203 ft GL 8180 ft	

Date	06/JAN/10	
Run	ONE	
Service Order	576629	
Depth Driller	9756 ft	
Depth Logger	9685 ft	
Bottom Logged Interval	9685 ft	
Top Logged Interval	SURFACE	
Time Started	03:30	
Time Finished	7:00	
Operator Rig Time	3.5 HRS	
Type of Fluid in Hole	WATER	
Fluid Density	N/A	
Salinity	N/A	
Fluid Level	FULL	
Logged Cement Top	N/A	
Wellhead Pressure	1000 psi	
Maximum Hole Deviation	N/A	
Nominal Logging Speed	45 fpm	
Maximum Recorded Temperature	N/A	
Reference Log	N/A	
Reference Log Date	N/A	
Equipment No.	4214	VERNAL, UT
Recorded By	WIESER/SOENEN	
Witnessed By	MR. JESS PENNELL	

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In making interpretations of logs, our employees will give the customer the benefit of their best judgement. But since all interpretations are opinions based on inferences from electrical or other measurements, we cannot, and we do not guarantee the accuracy or correctness of any interpretation. We shall not be liable or responsible for any loss, cost, damages, or expenses whatsoever incurred or sustained by the customer resulting from any interpretation made by any of our employees.

Borehole Record		
Bit Size	From	To
8.75 in	SURFACE	9826 ft

Casing Record				
Size	Weight	Grade	From	To
4.5 in	11.6 lbm/ft	P-110	SURFACE	9826 ft

Remarks
THIS IS THE FIRST LOG OF THE WELL. WELL WAS LOGGED WITH 1000 psi.

Equipment Data					
Run	Trip	Tool	Series Number	Serial Number	Position
1	1	VDL	1426XA	495	CENTRALIZED
1	1	GR/CCI /TEI	2459XA	503	CENTRALIZED

*MAIN SECTION
PRIMARY PRESENTATION
1000 psi*

MEASUREMENT TYPE	PARAMETER	VALUE	UNITS	TOP	BOTTOM
RAL	Amp Gate Start Far	316.900	usec	16.374	9697.000
RAL	Amp Gate Start Near	200.391	usec	16.374	9697.000
RAL	Amp Gate Start Radial	200.391	usec	16.374	9697.000
RAL	Amp Gate Width Far	30.000	usec	16.374	9697.000
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RAL	FB Thresh Radial	4.000	mv	16.374	9697.000
RAL	Fluid Travel Time	200.000	usec/ft	16.374	9697.000

DEPTH OFFSETS
(for Acquired Curves)

SERIES	DEPTH OFFSET	ACQUIRED CURVES					
1426XA	-15.360	ACAL	ANR	AR1	AR2	AR3	AR4
		AR5	AR6	AR7	AR8	CHV	FPR2
		FPR3	FPR5	TT3	TTR1	TTR2	TTR3
		TTR4	TTR5	TTR6	TTR7	TTR8	XAMP
1426XA	-14.360	AFAR	SIG	TT5			
2459XA	-7.250	CCL					
2459XA	-5.390	GR					

Created by : MIXED

Plotted by : PlotMgr, v5.4.504

Company : MARATHON OIL COMPANY

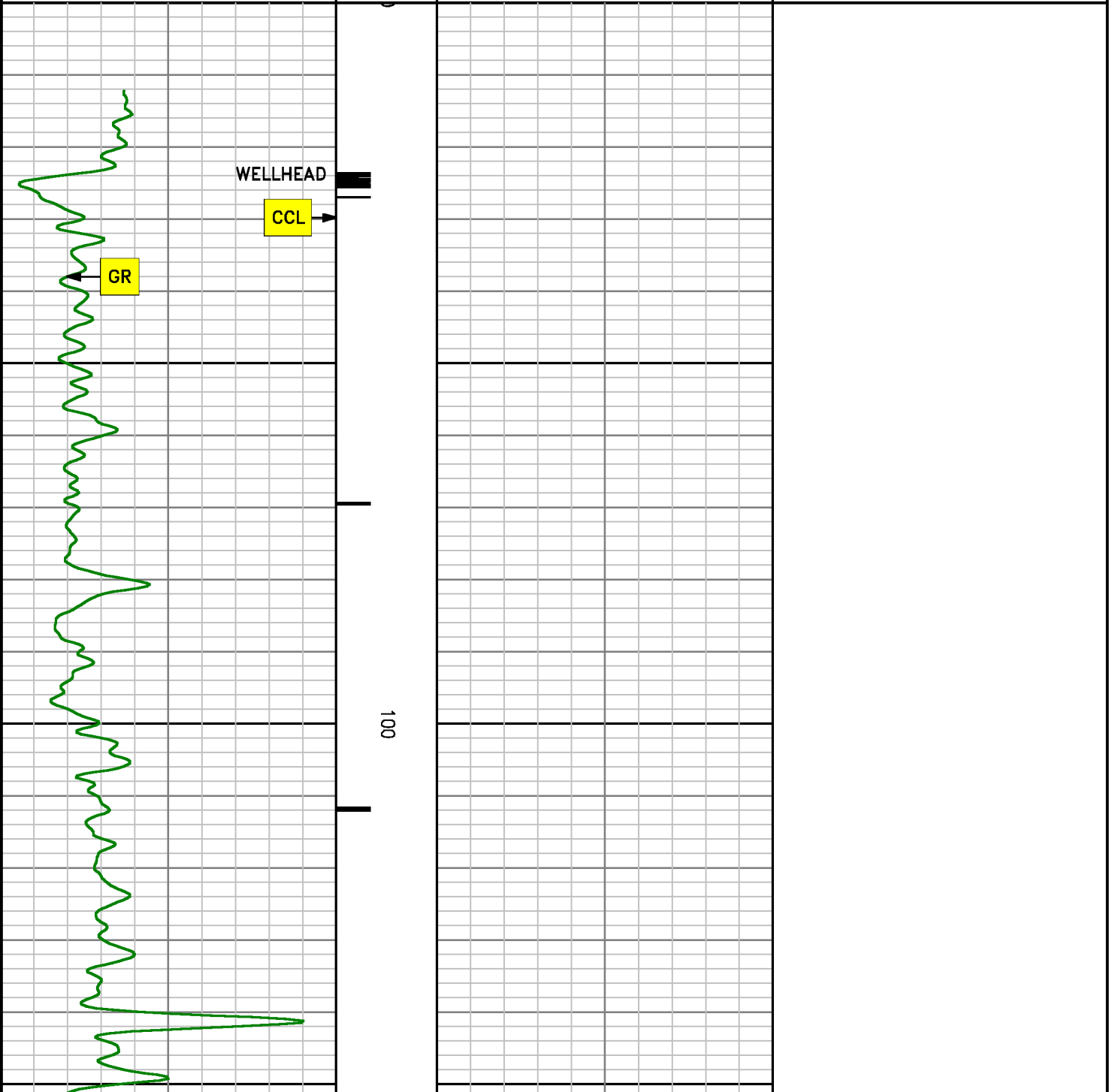
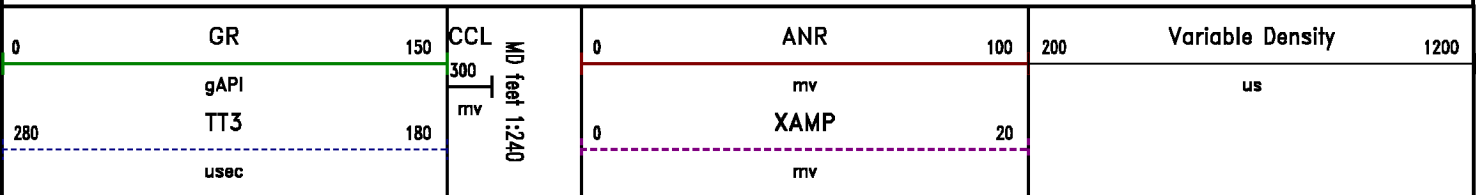
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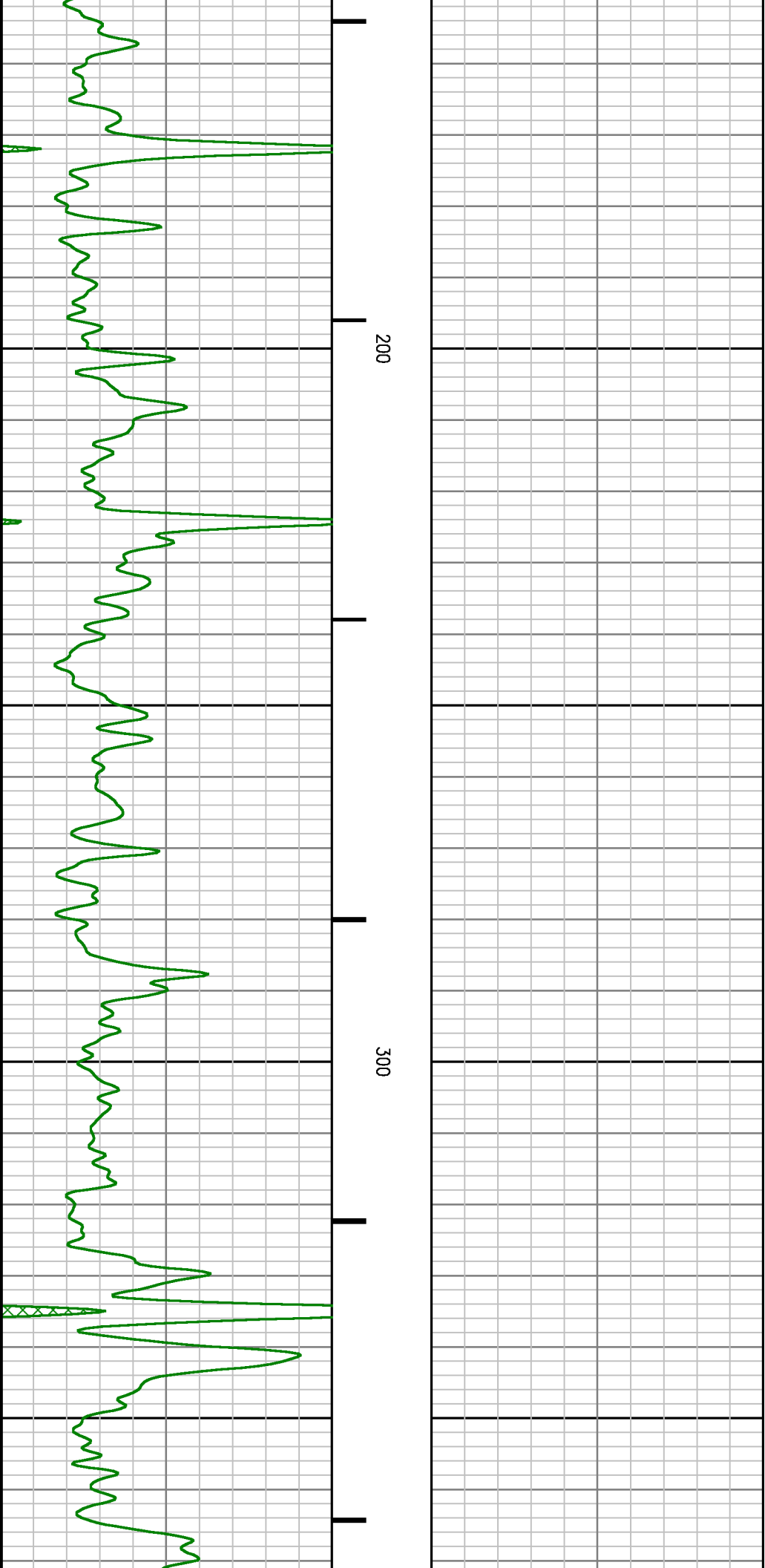
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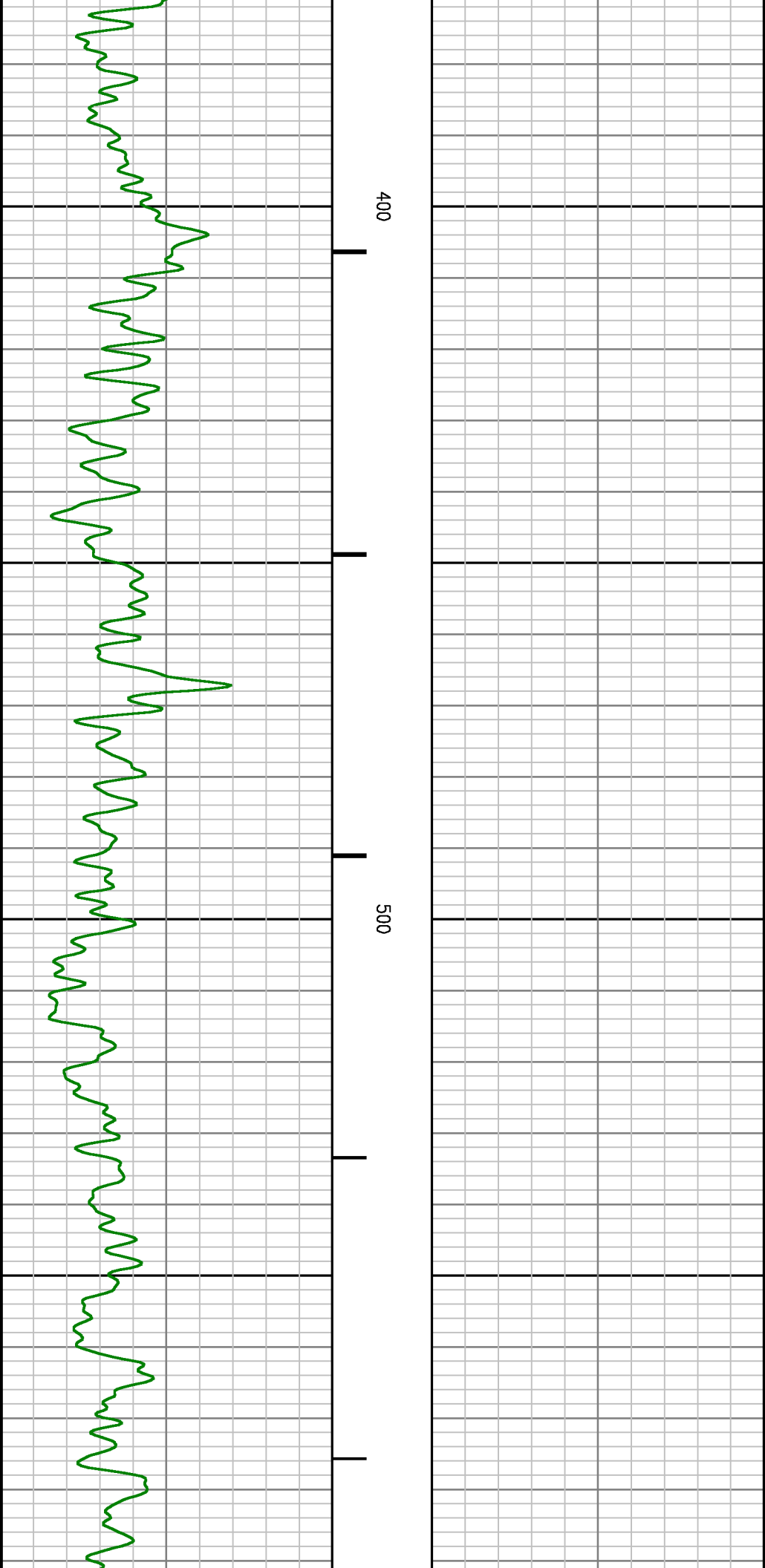
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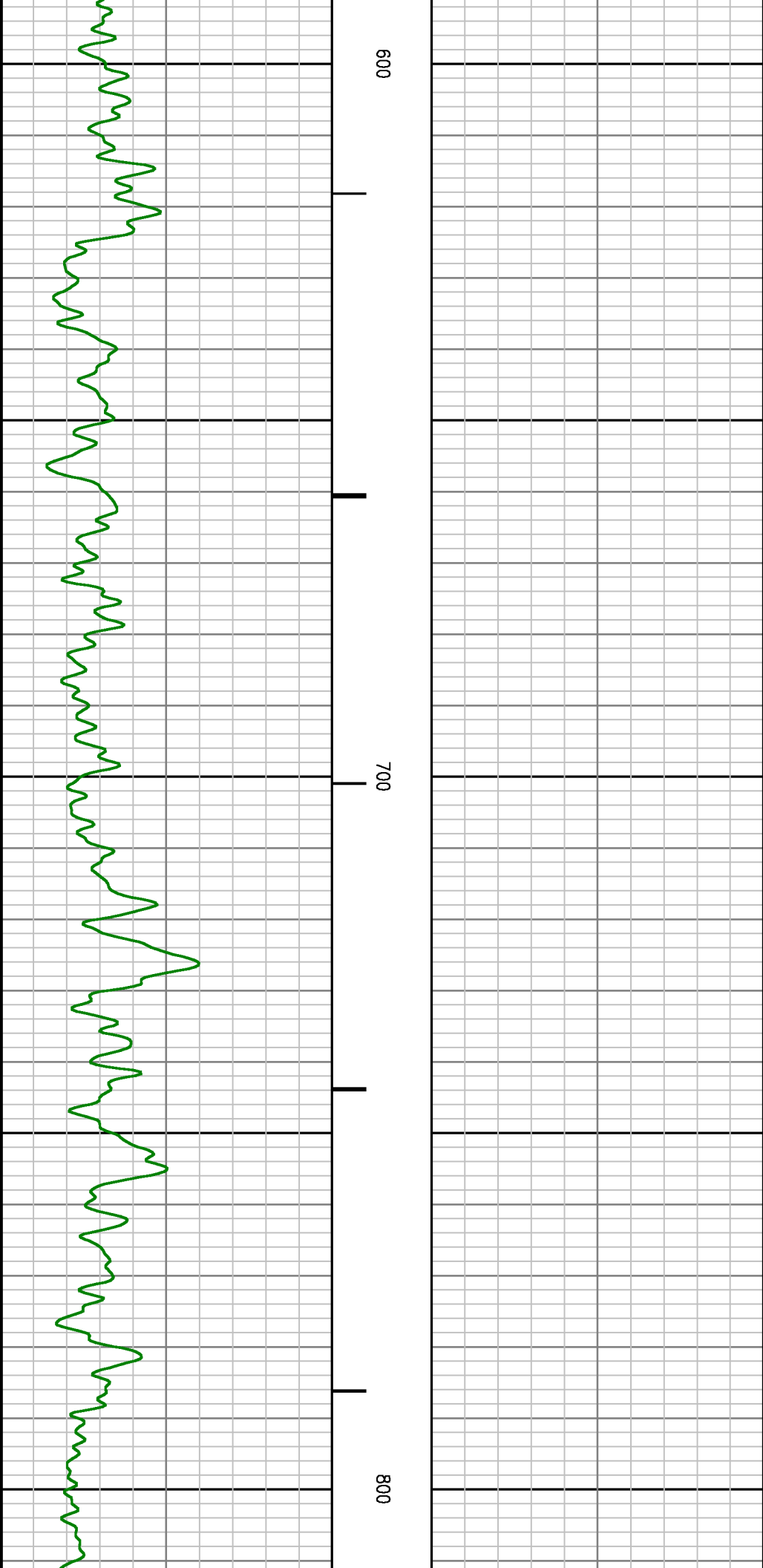
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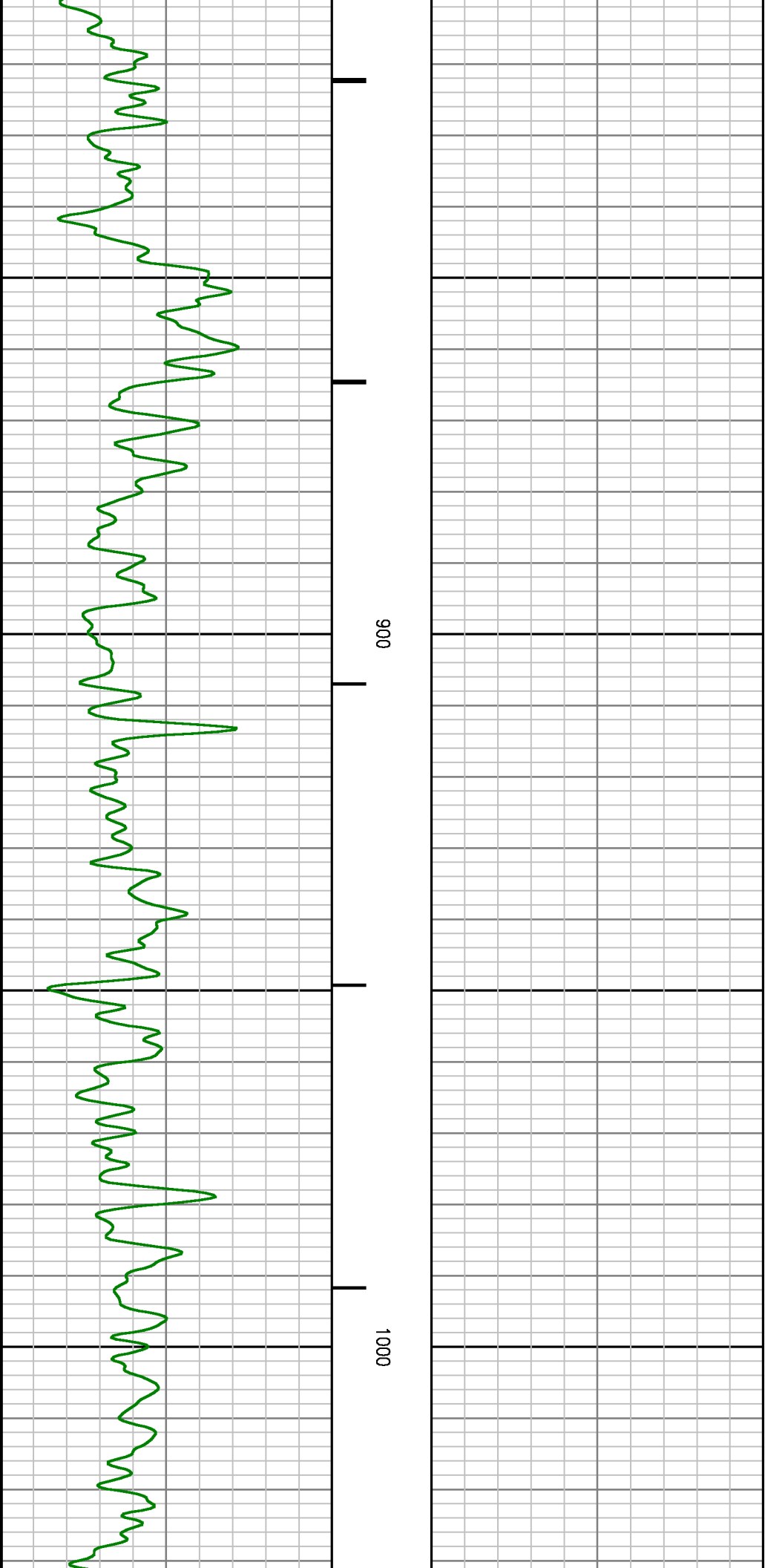
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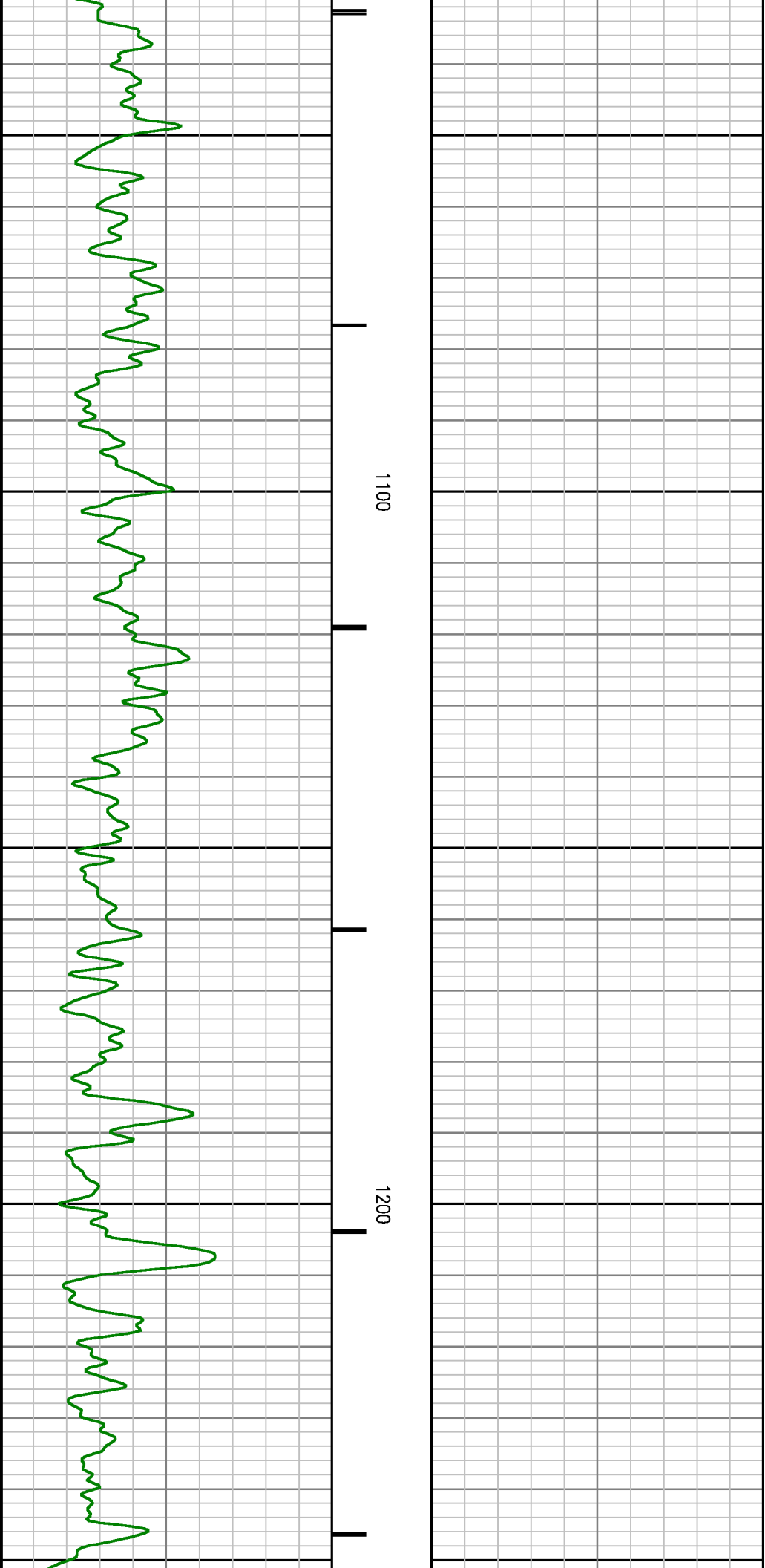


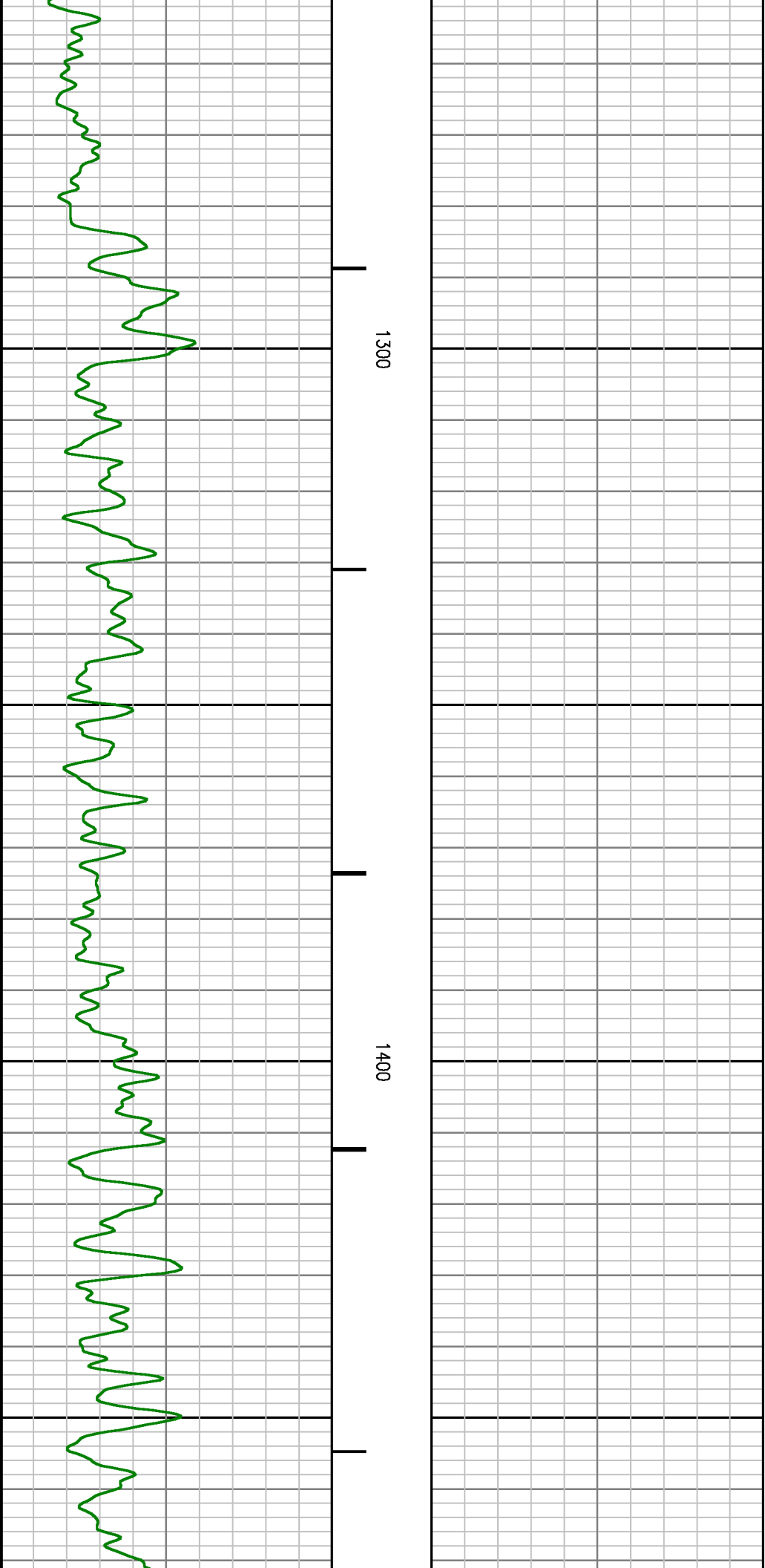


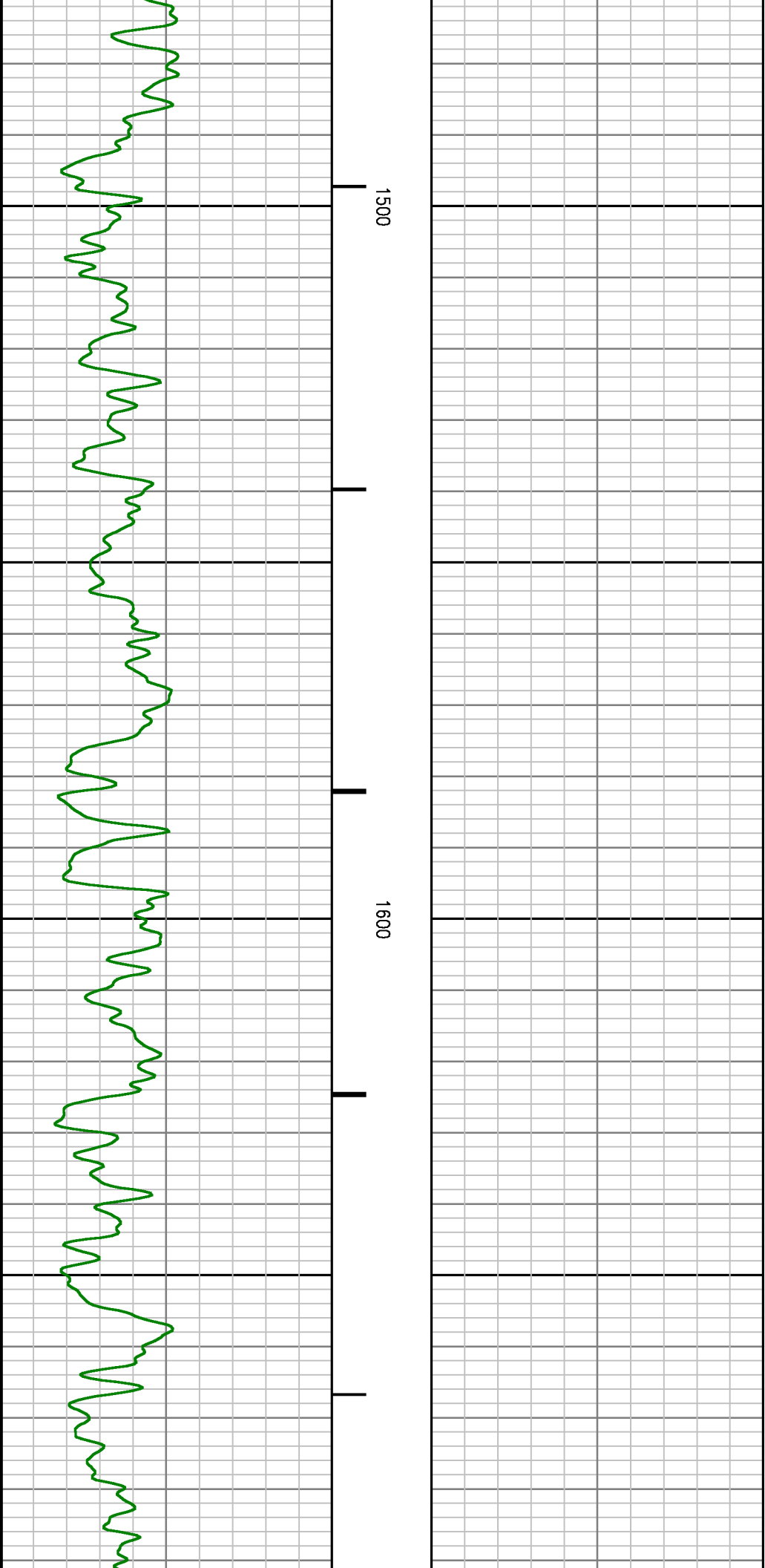


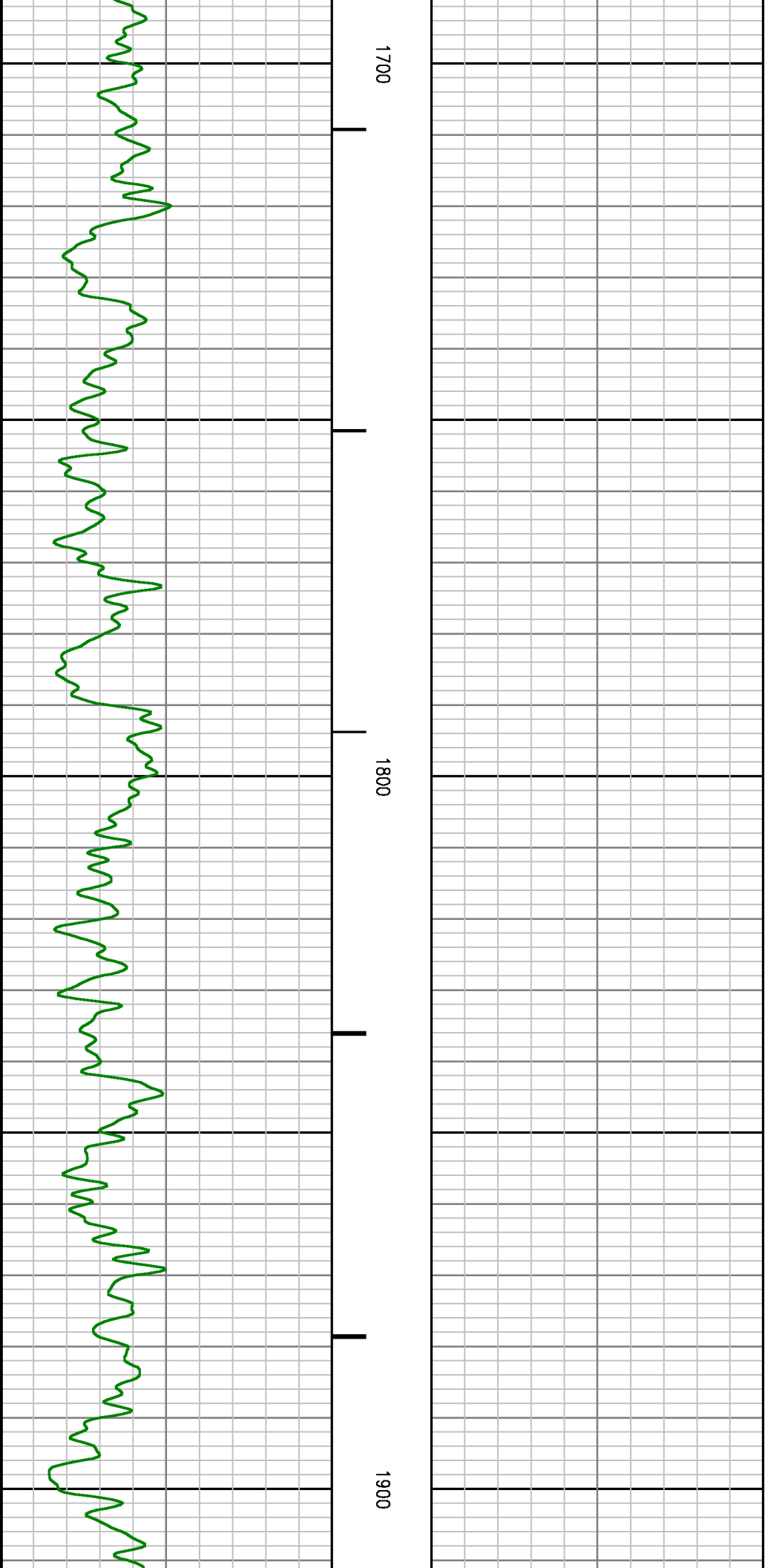


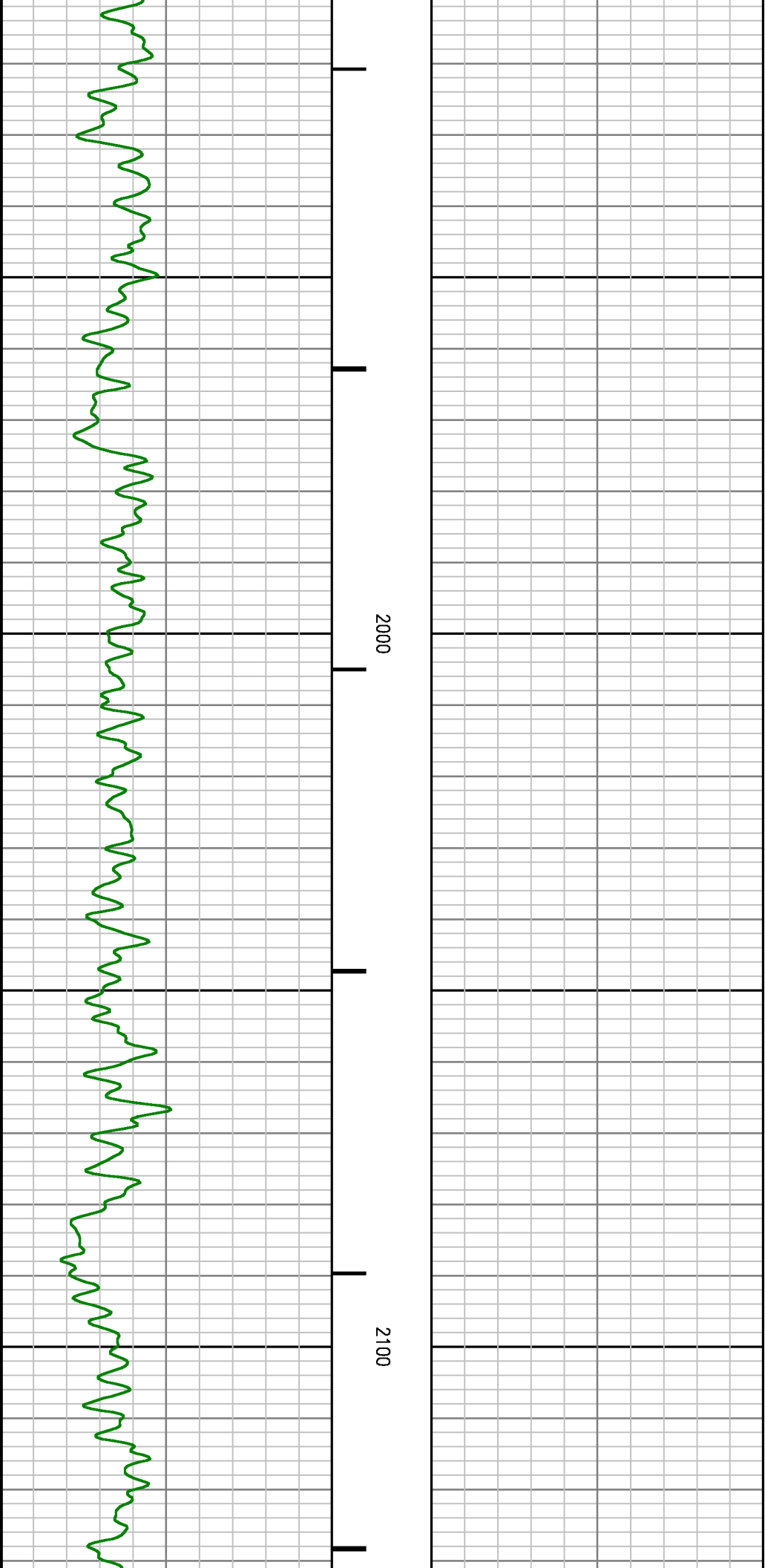


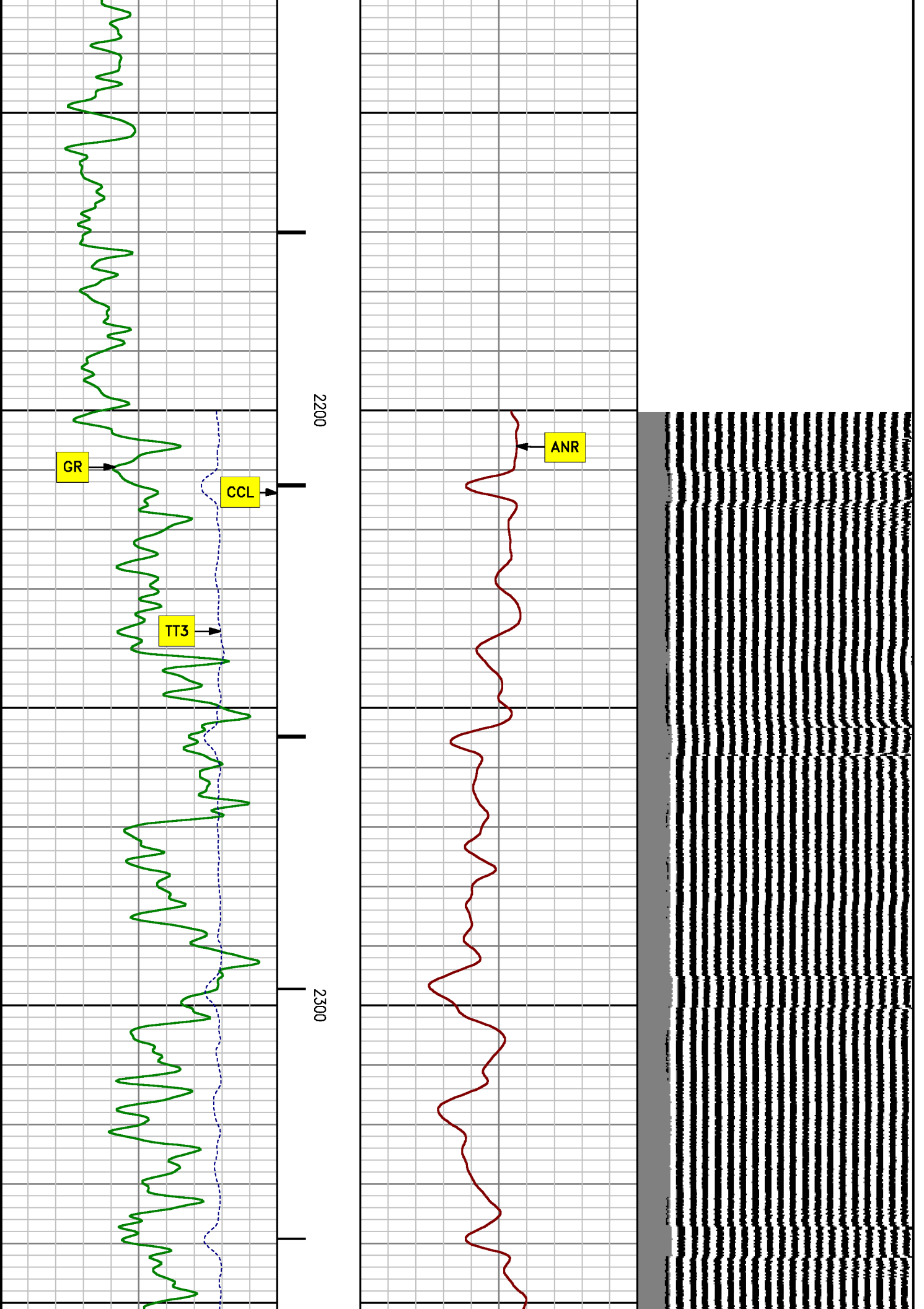


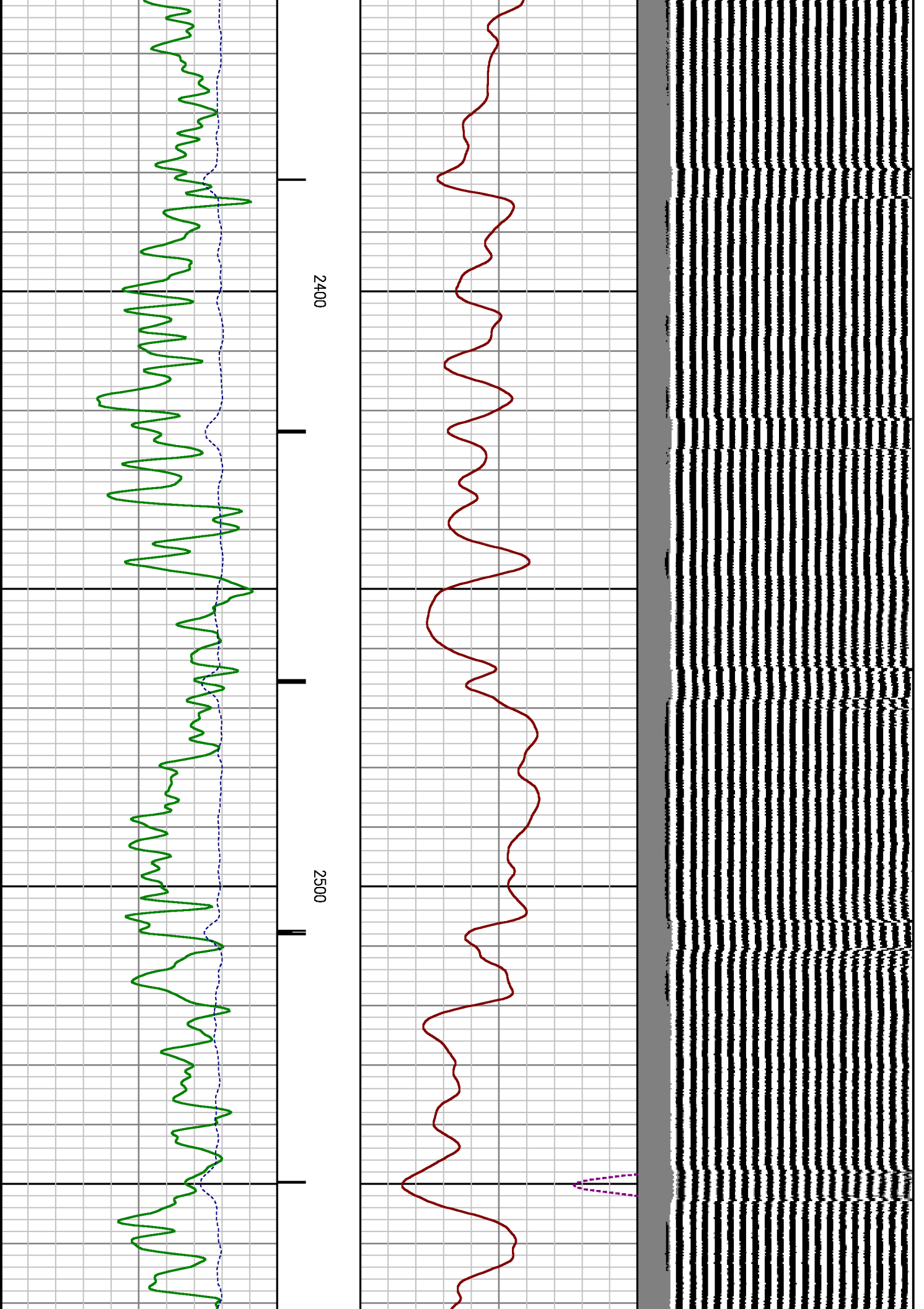


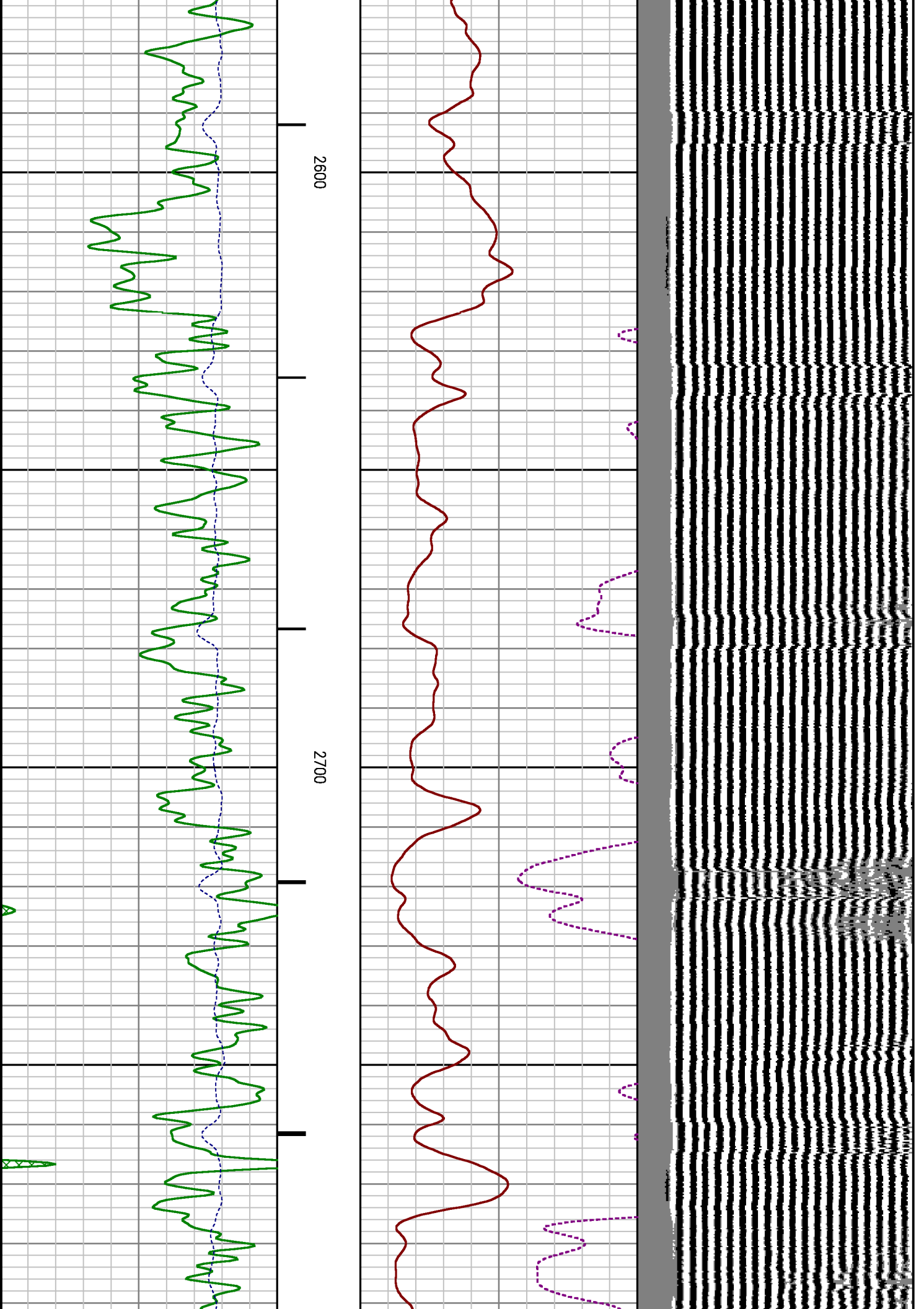


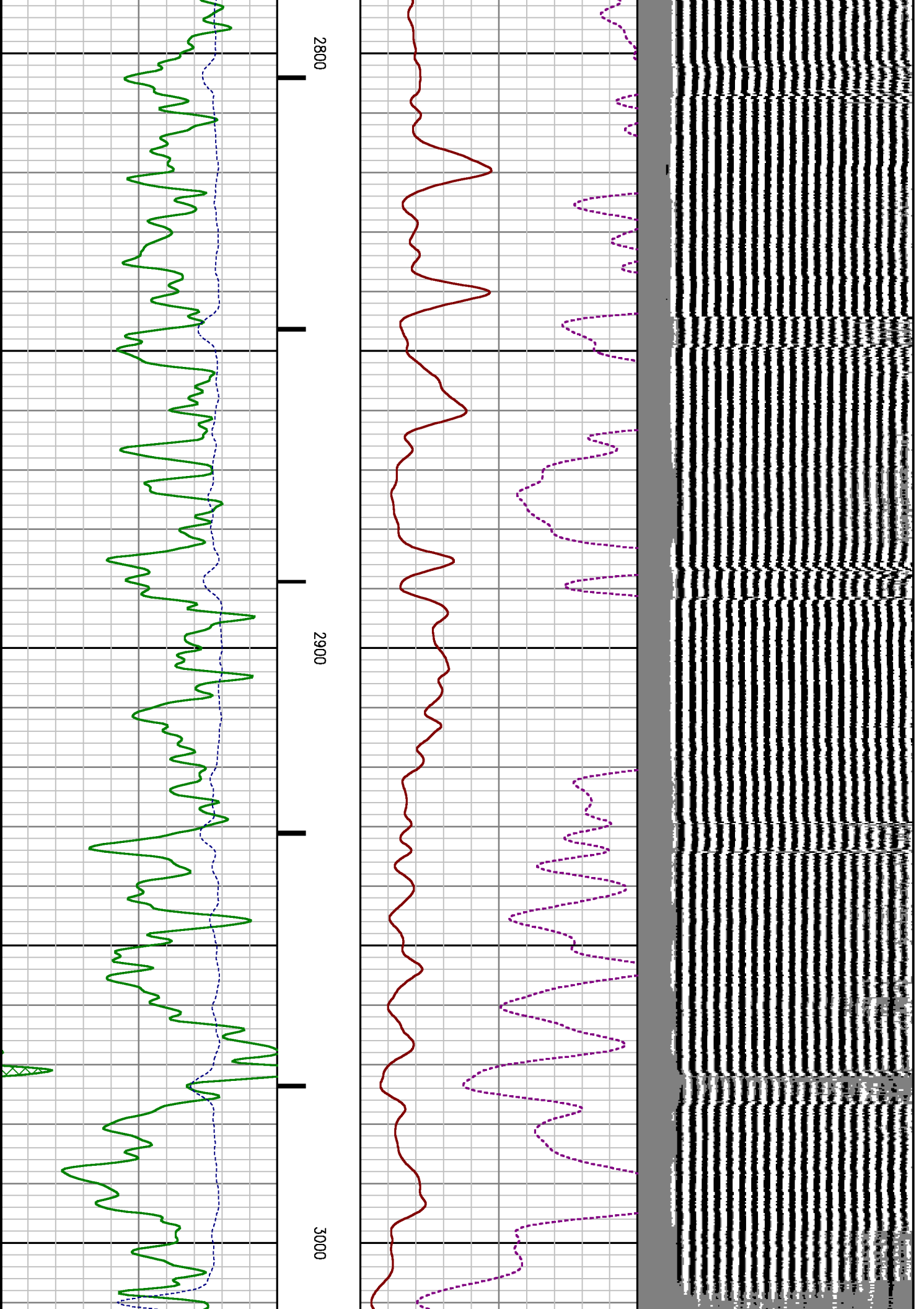


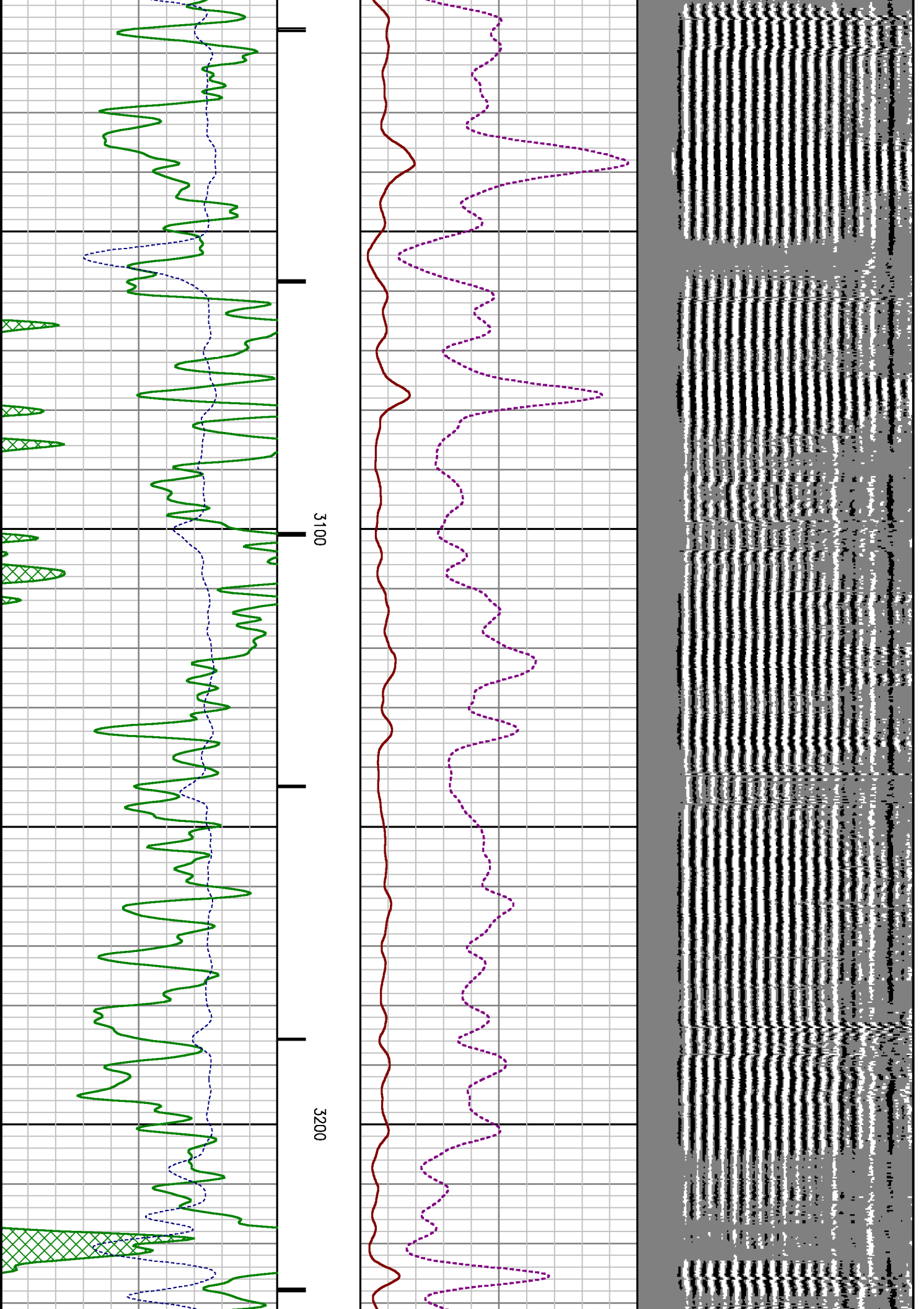


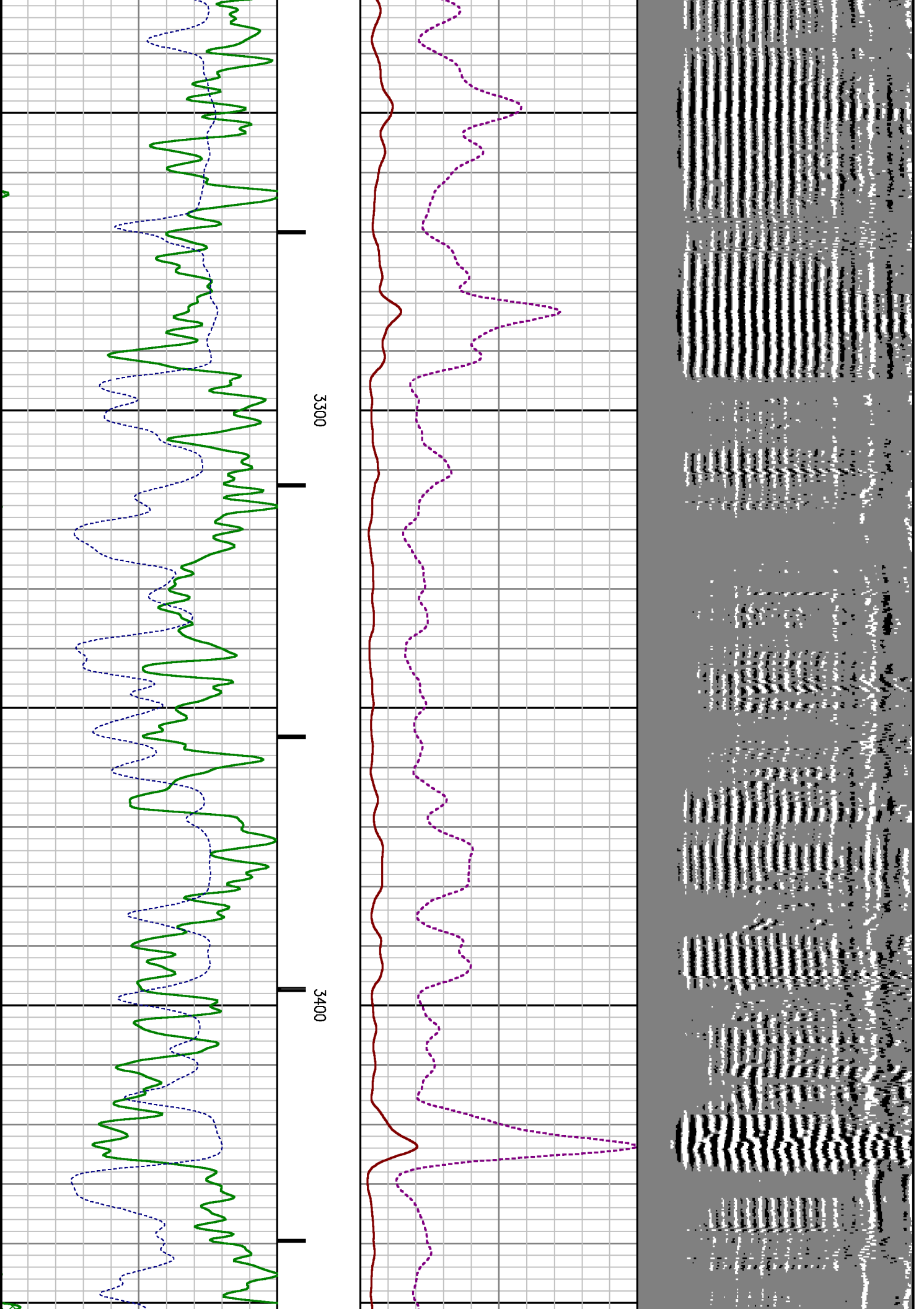


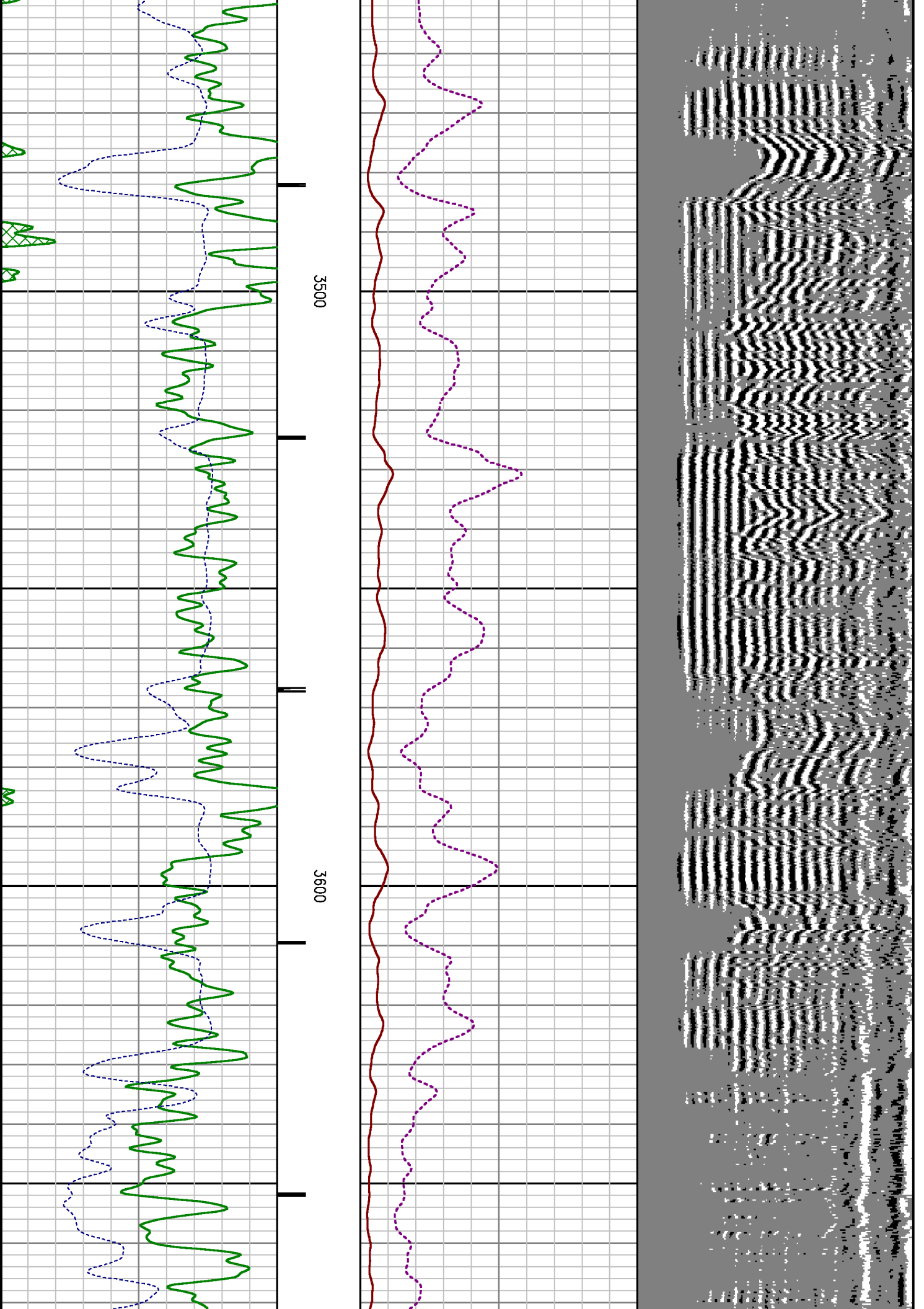


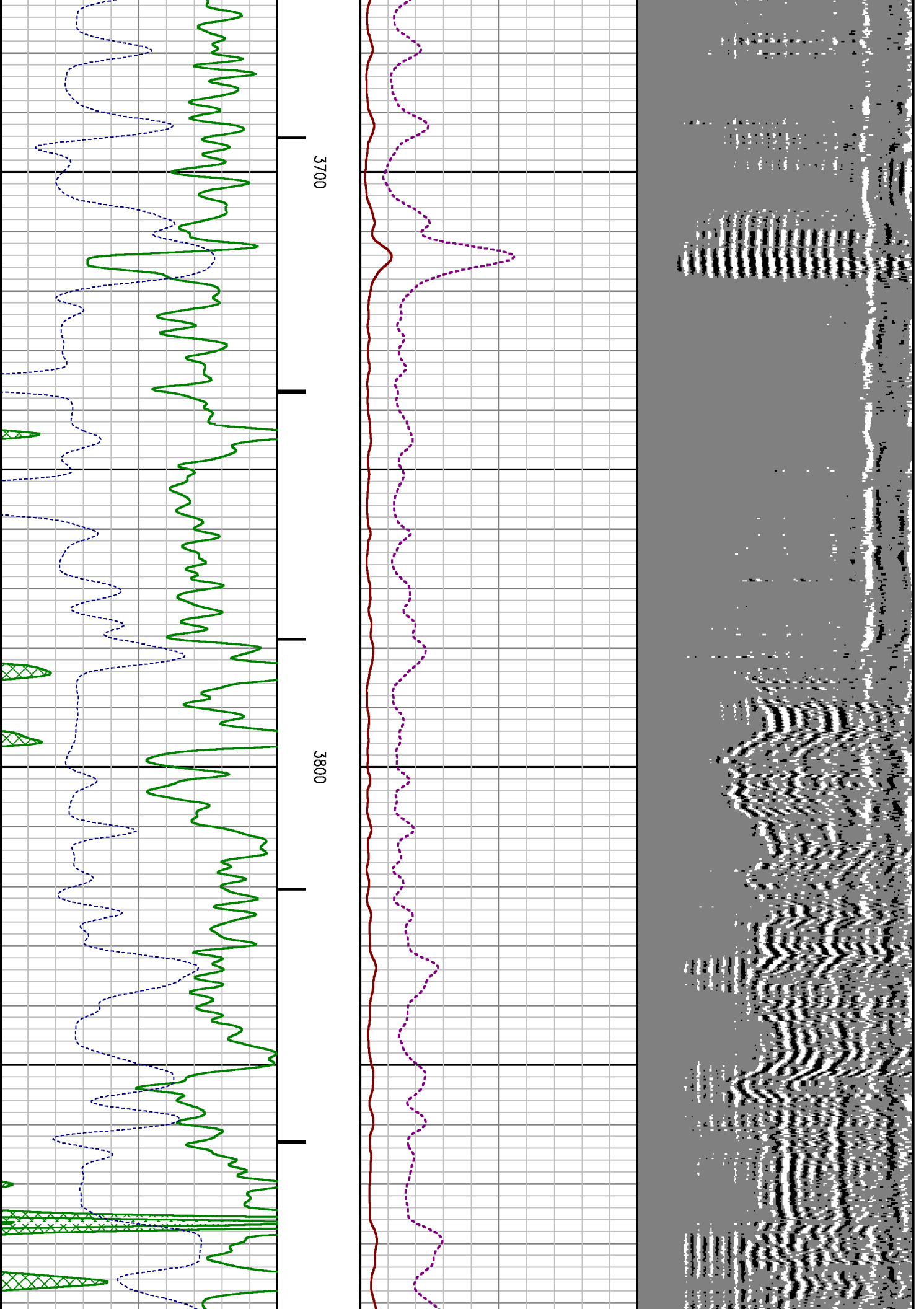


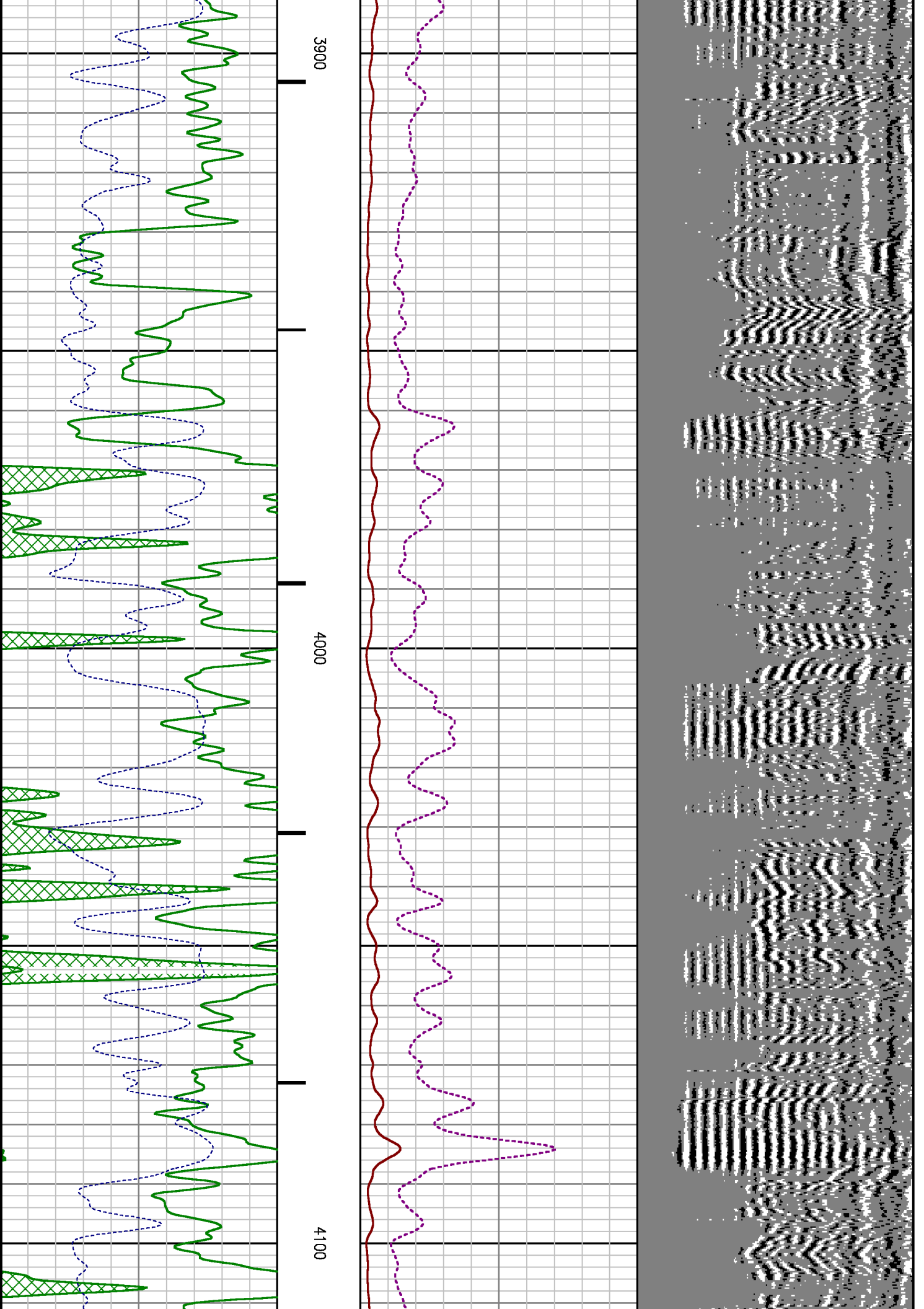


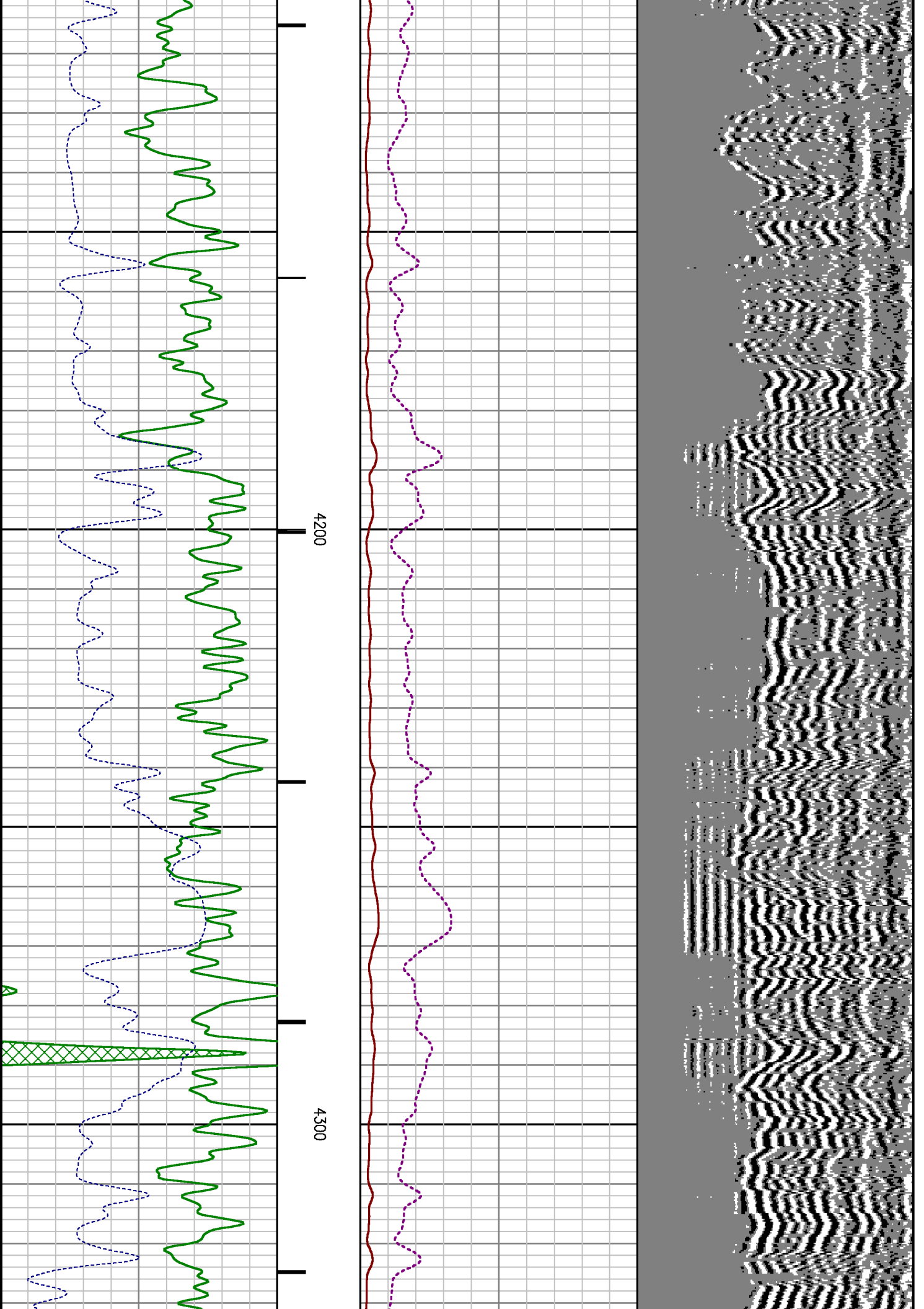


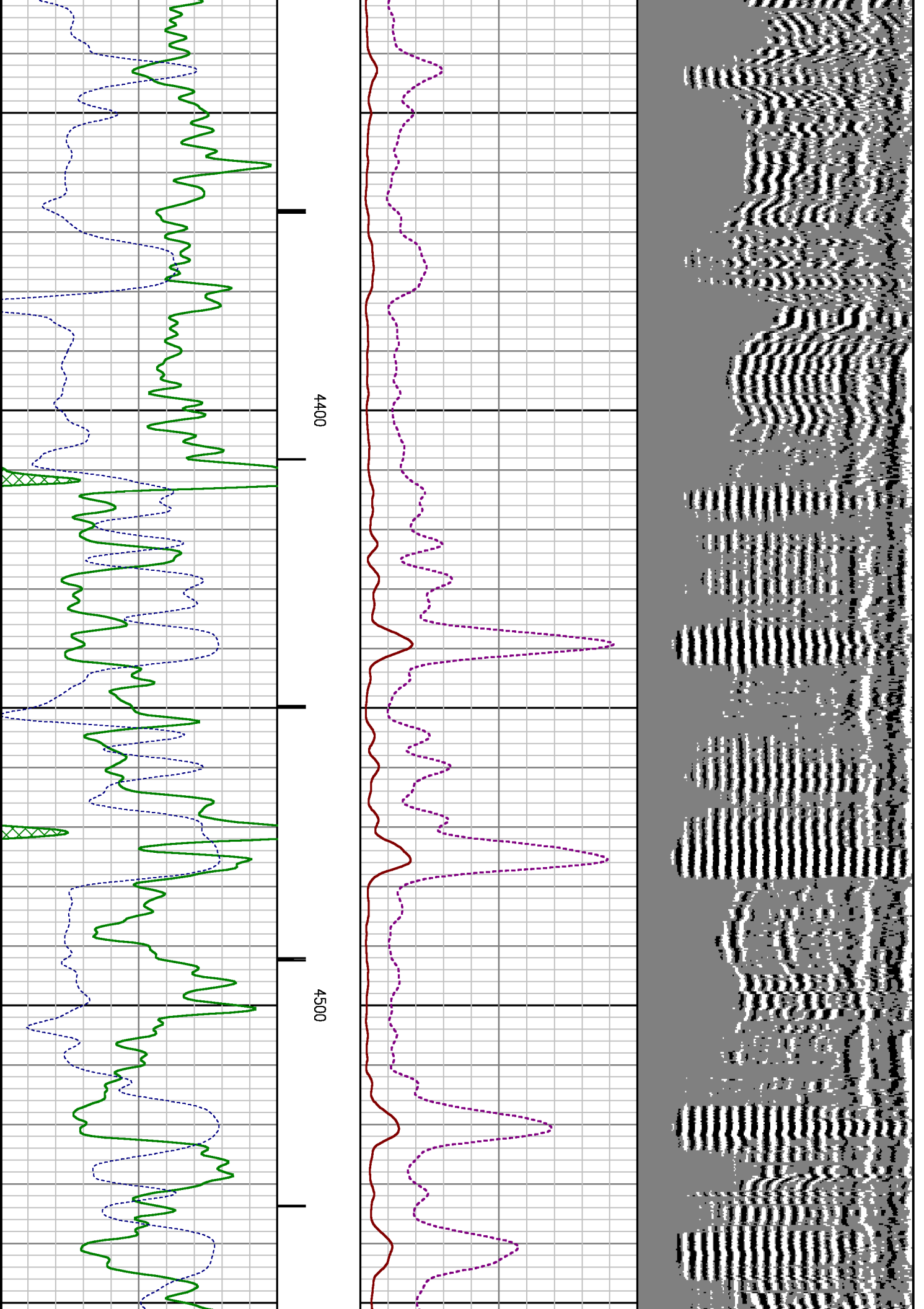


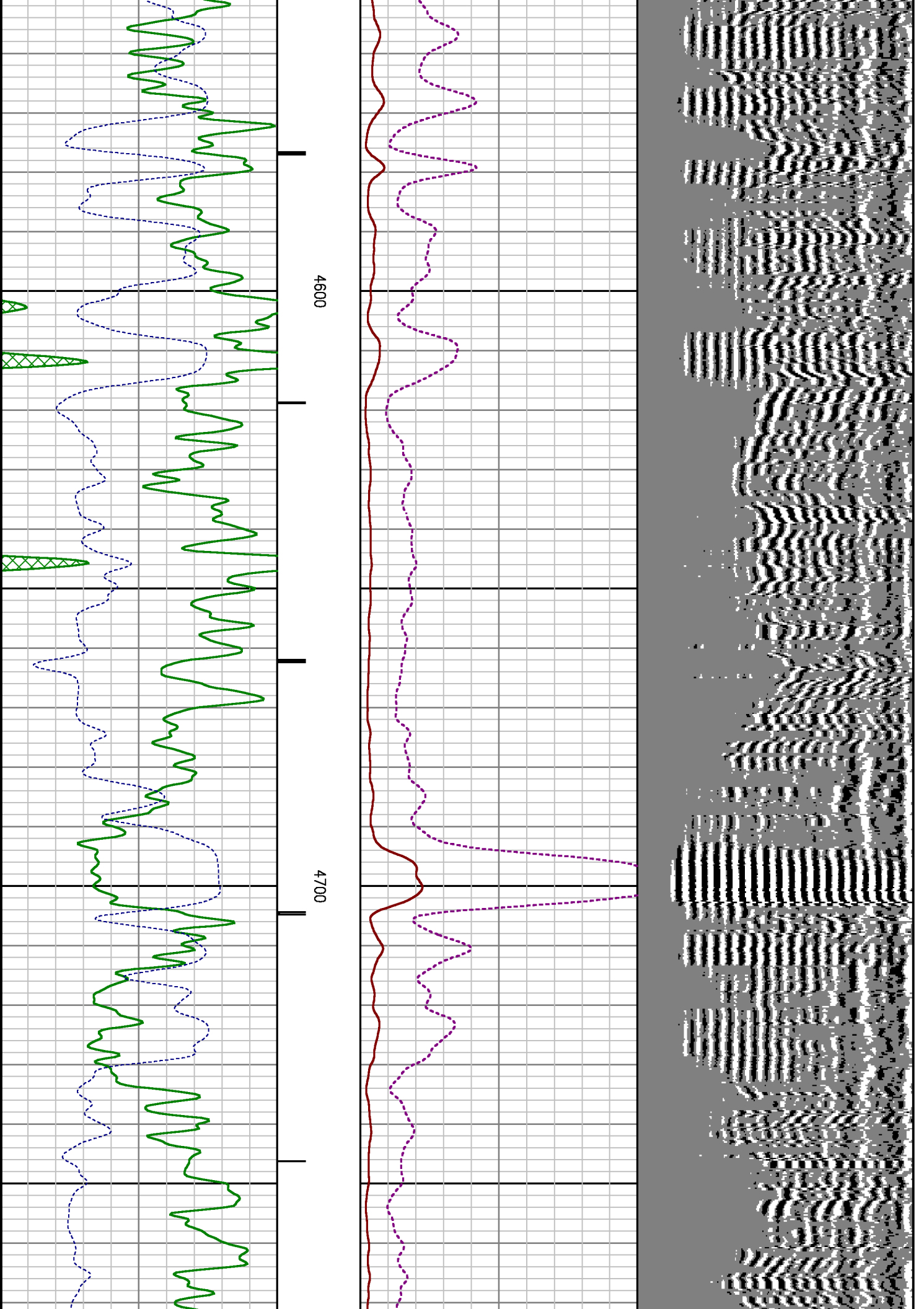


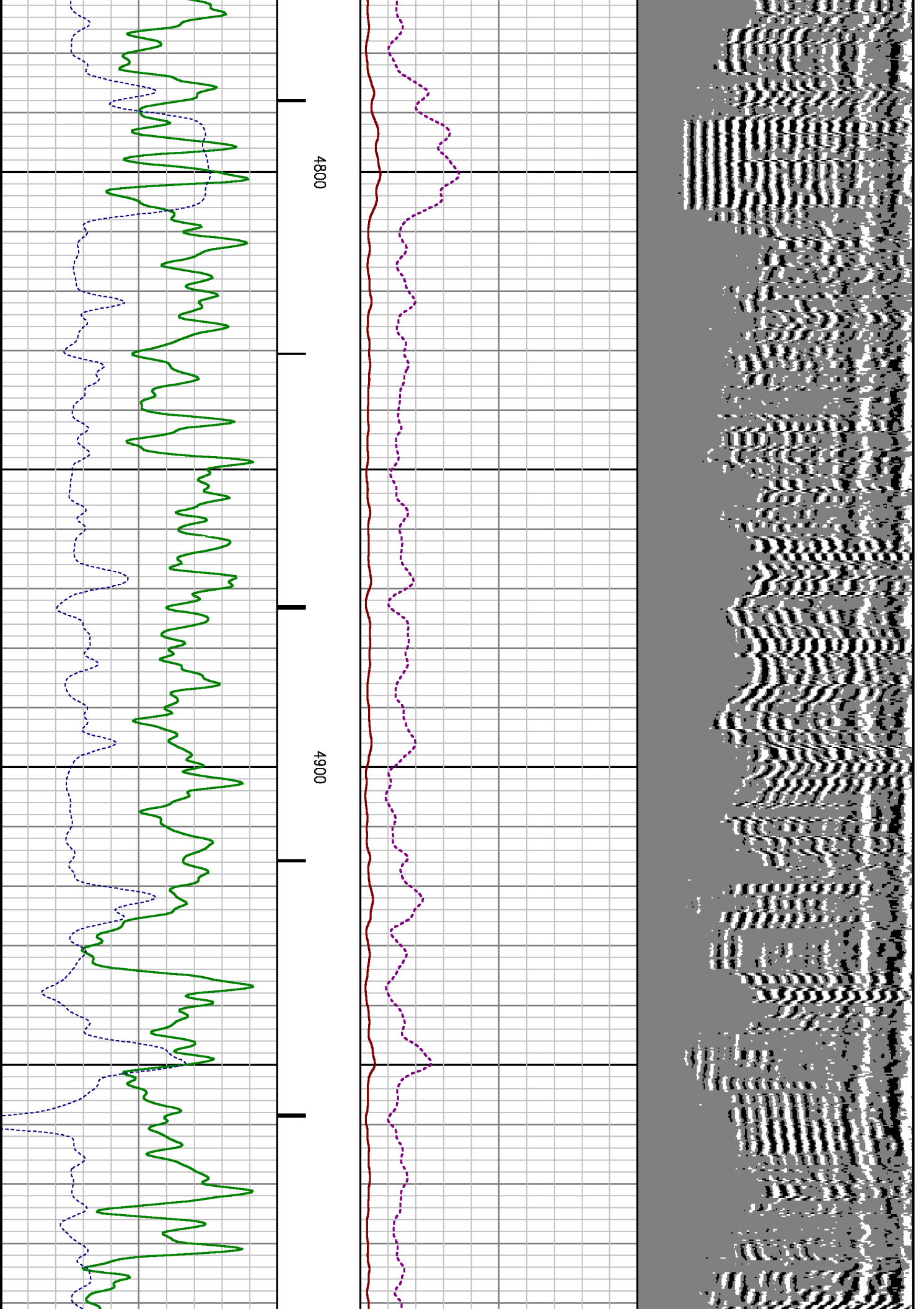


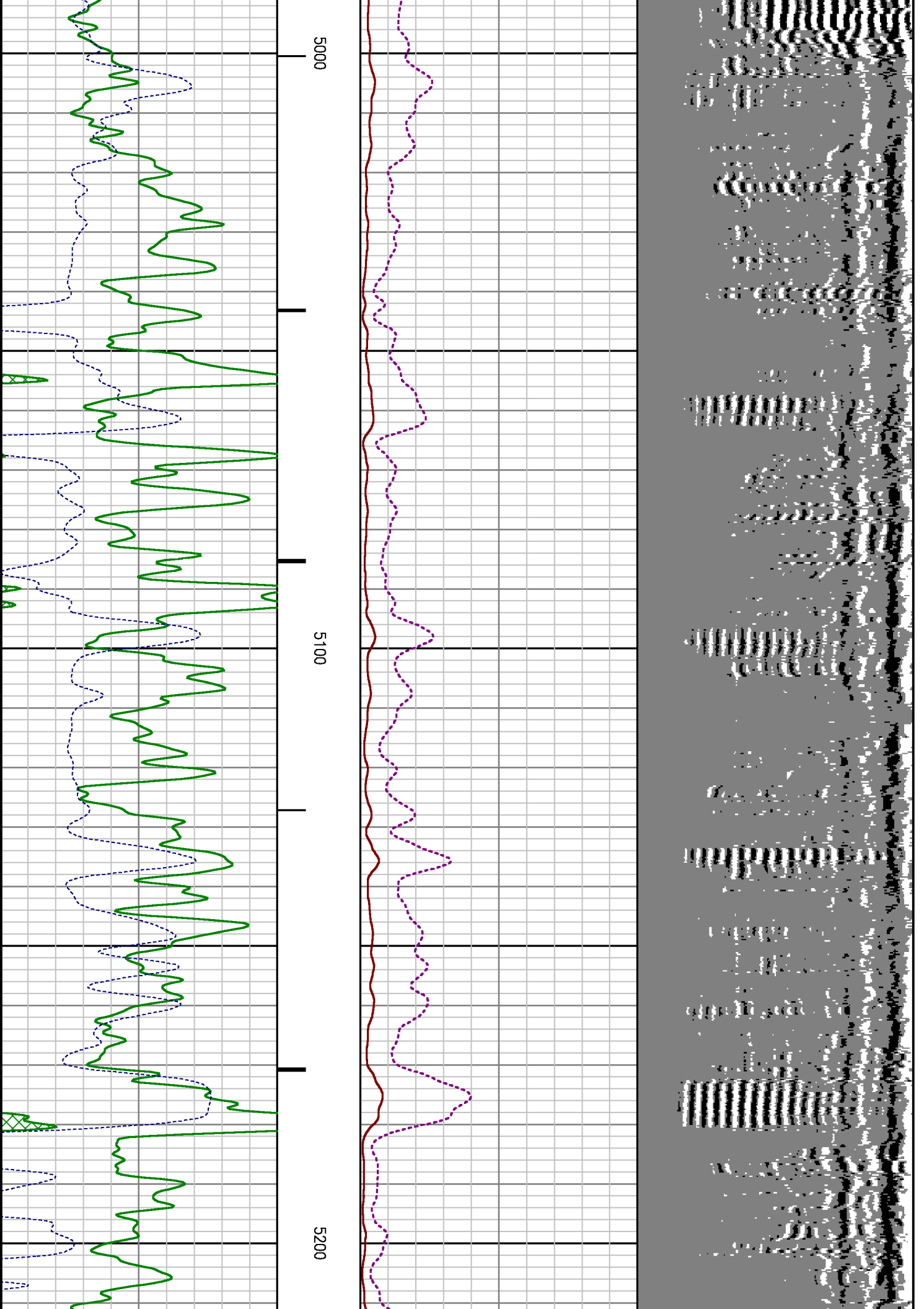


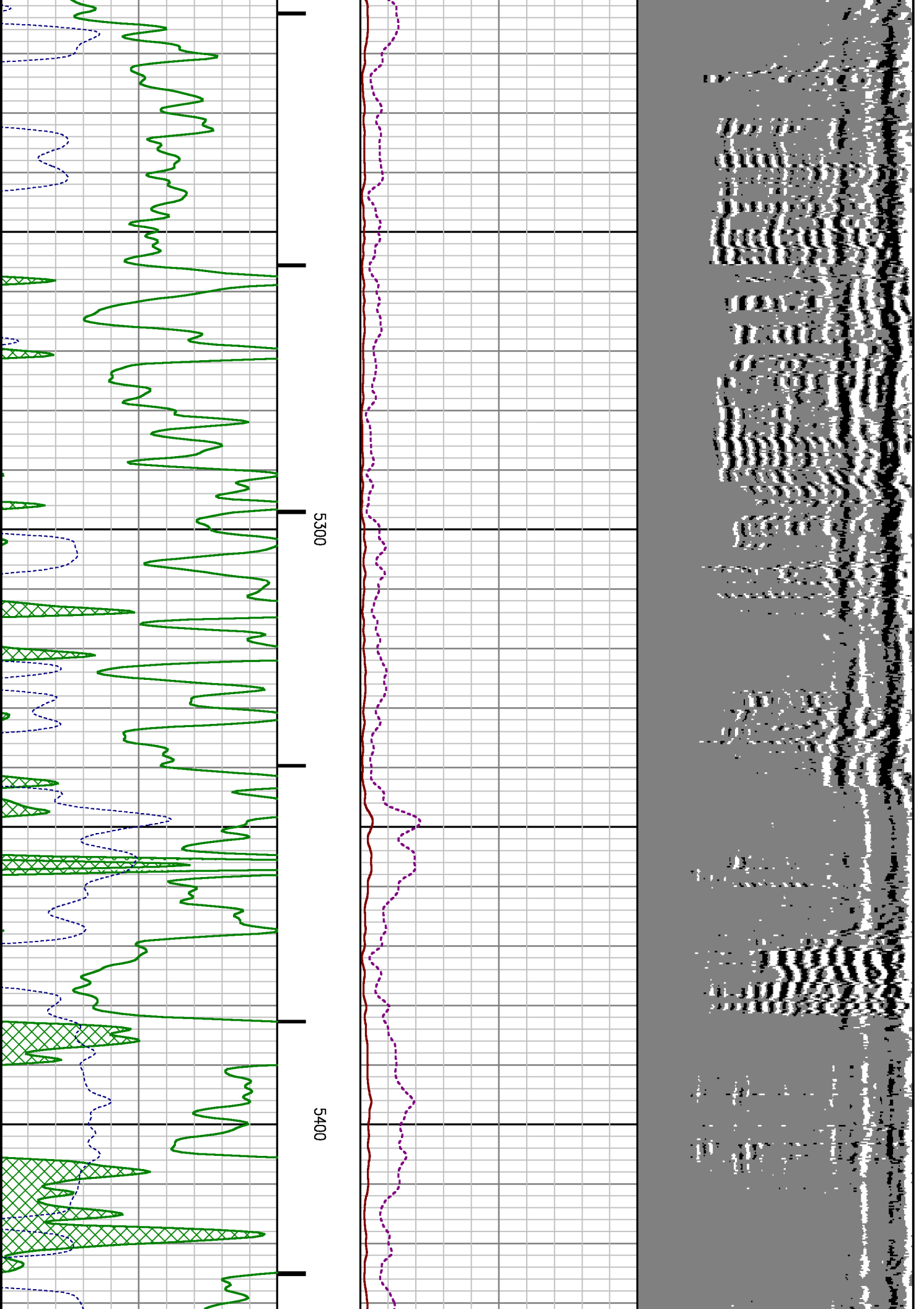


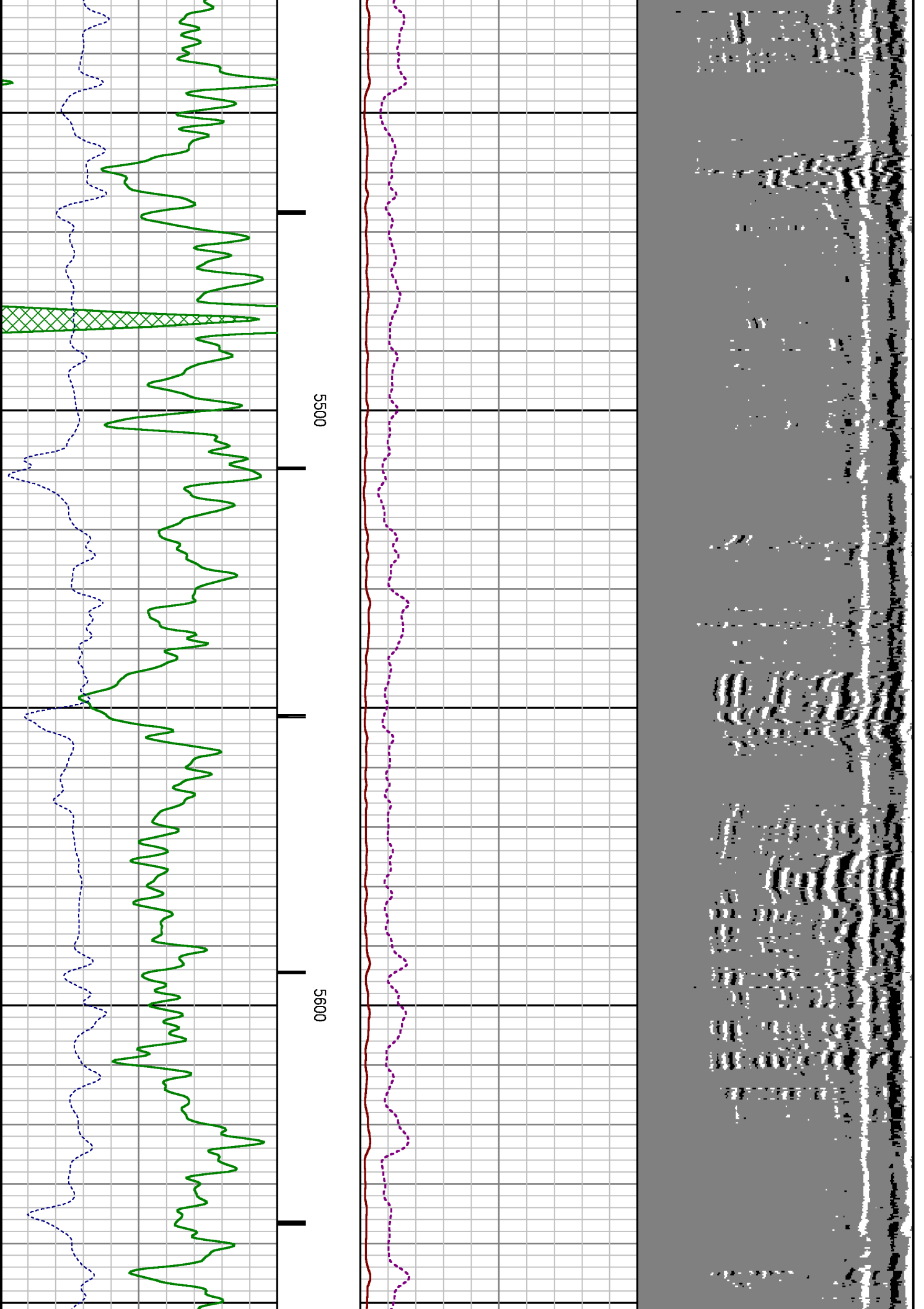


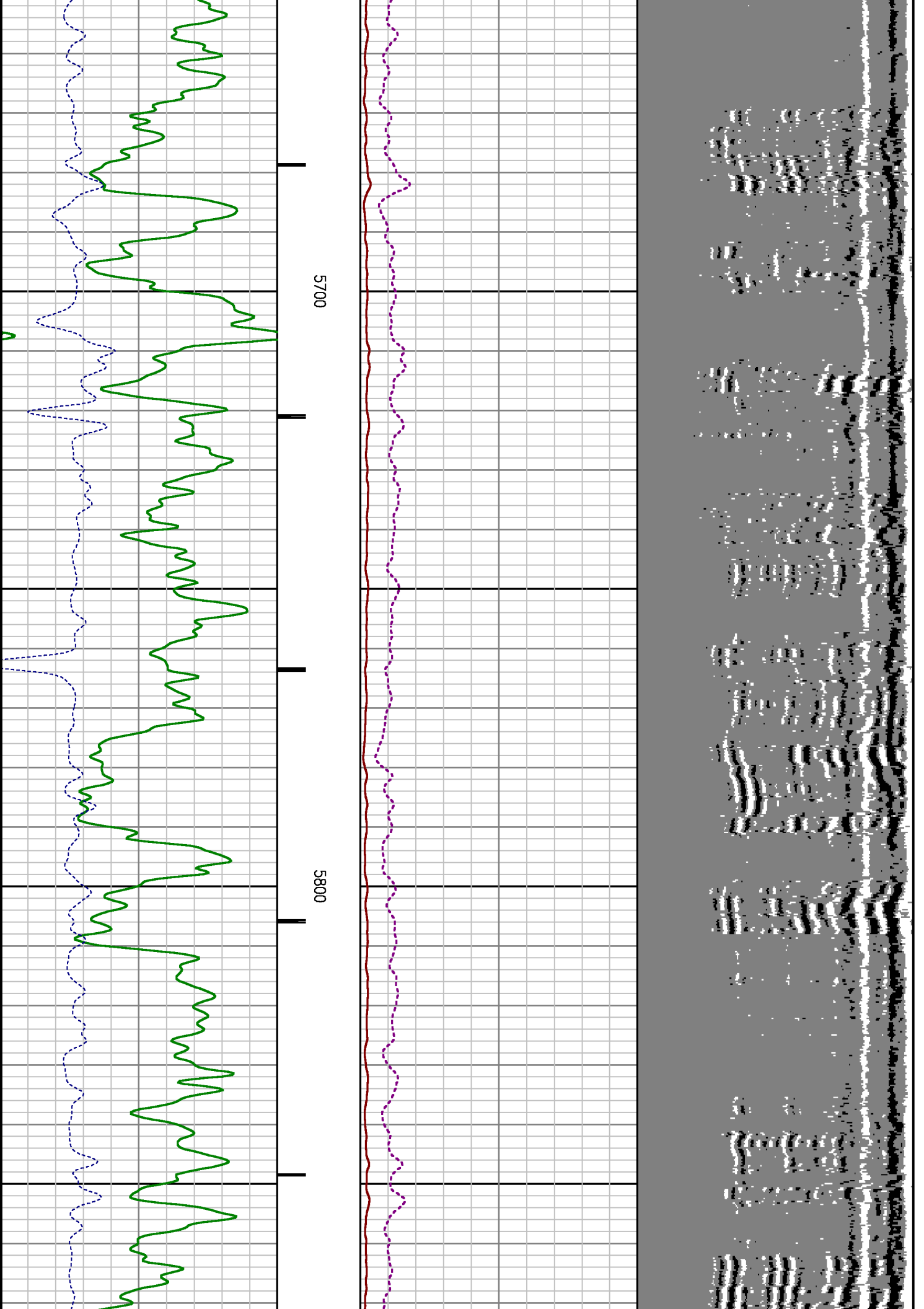


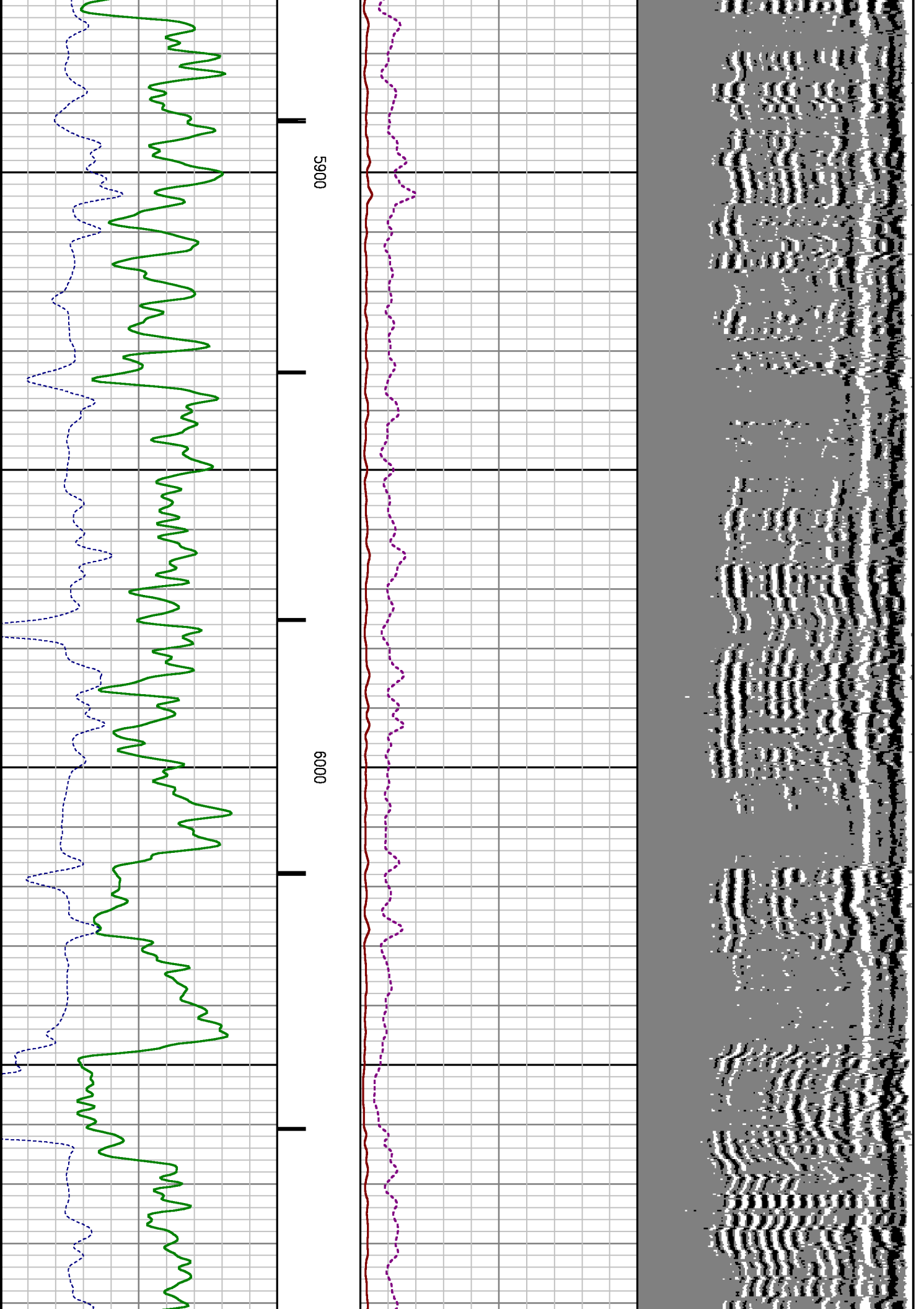


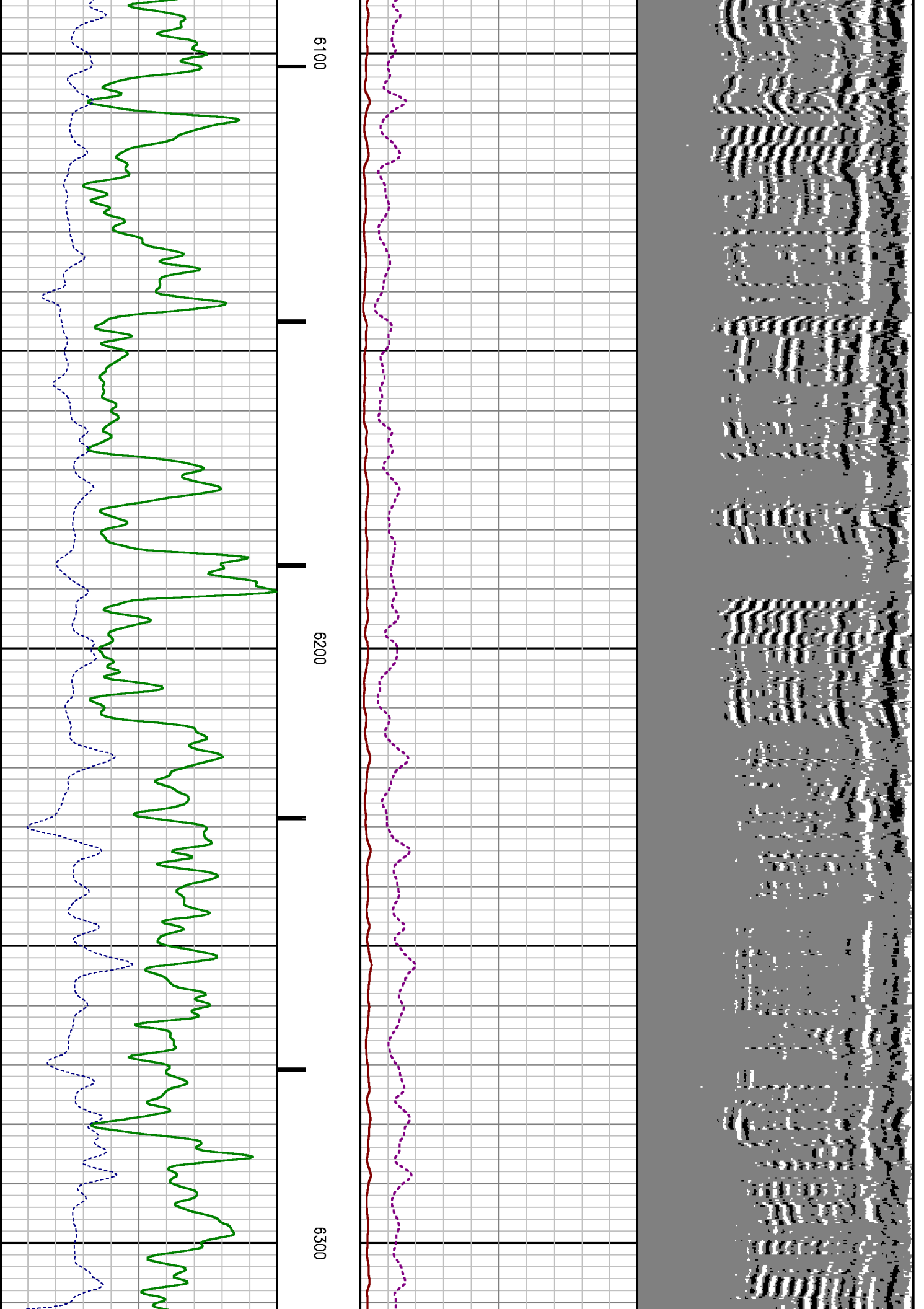


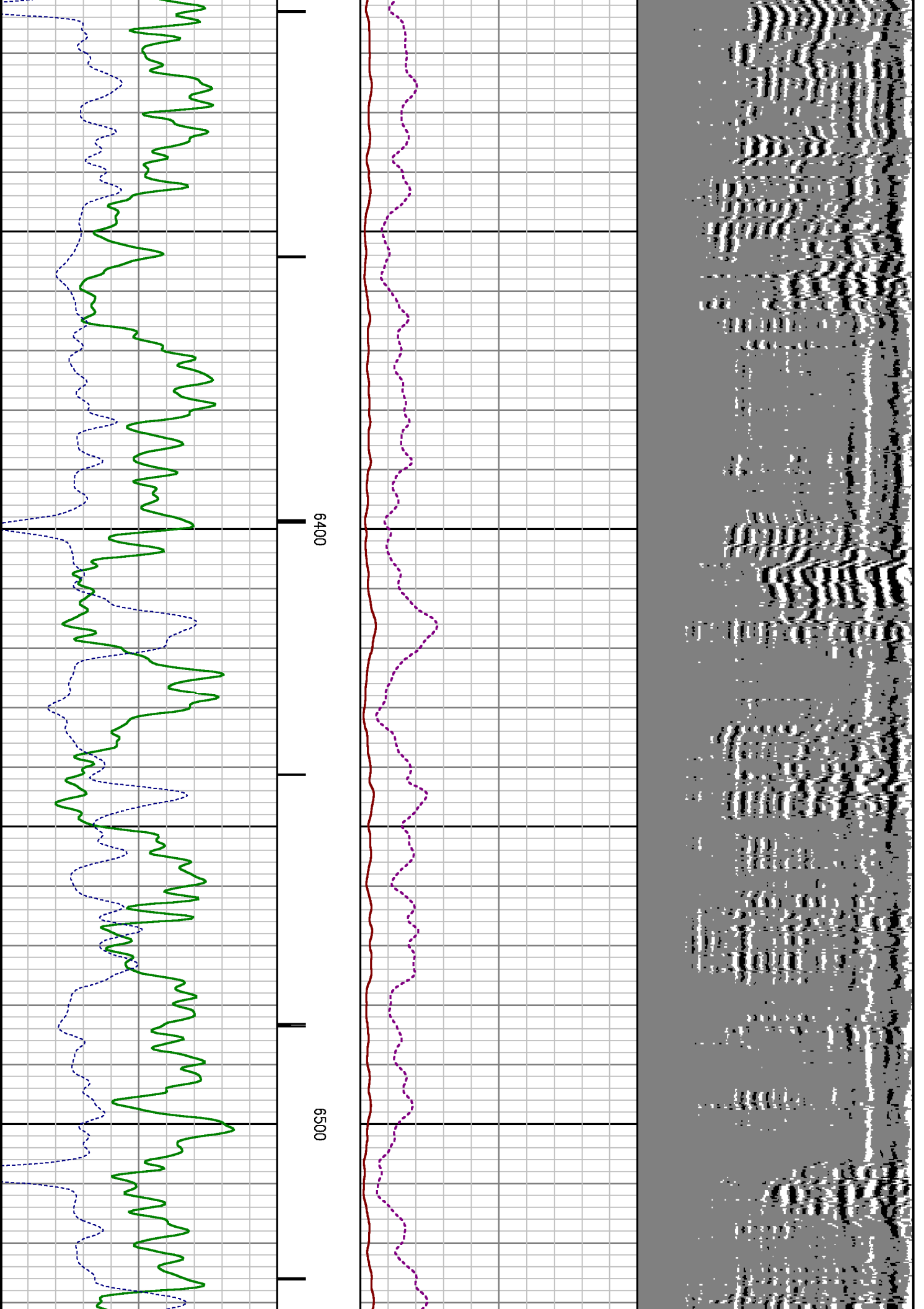


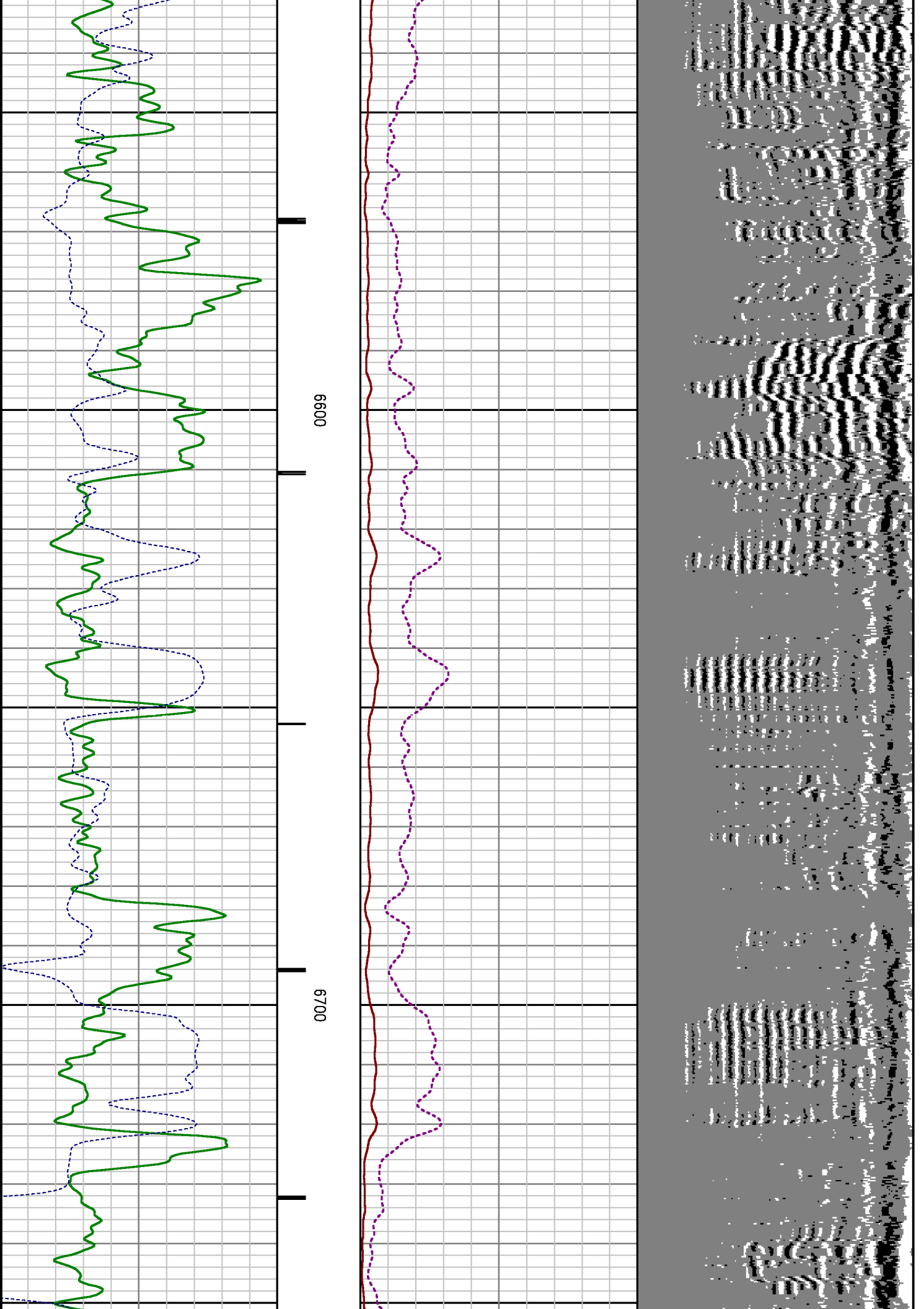


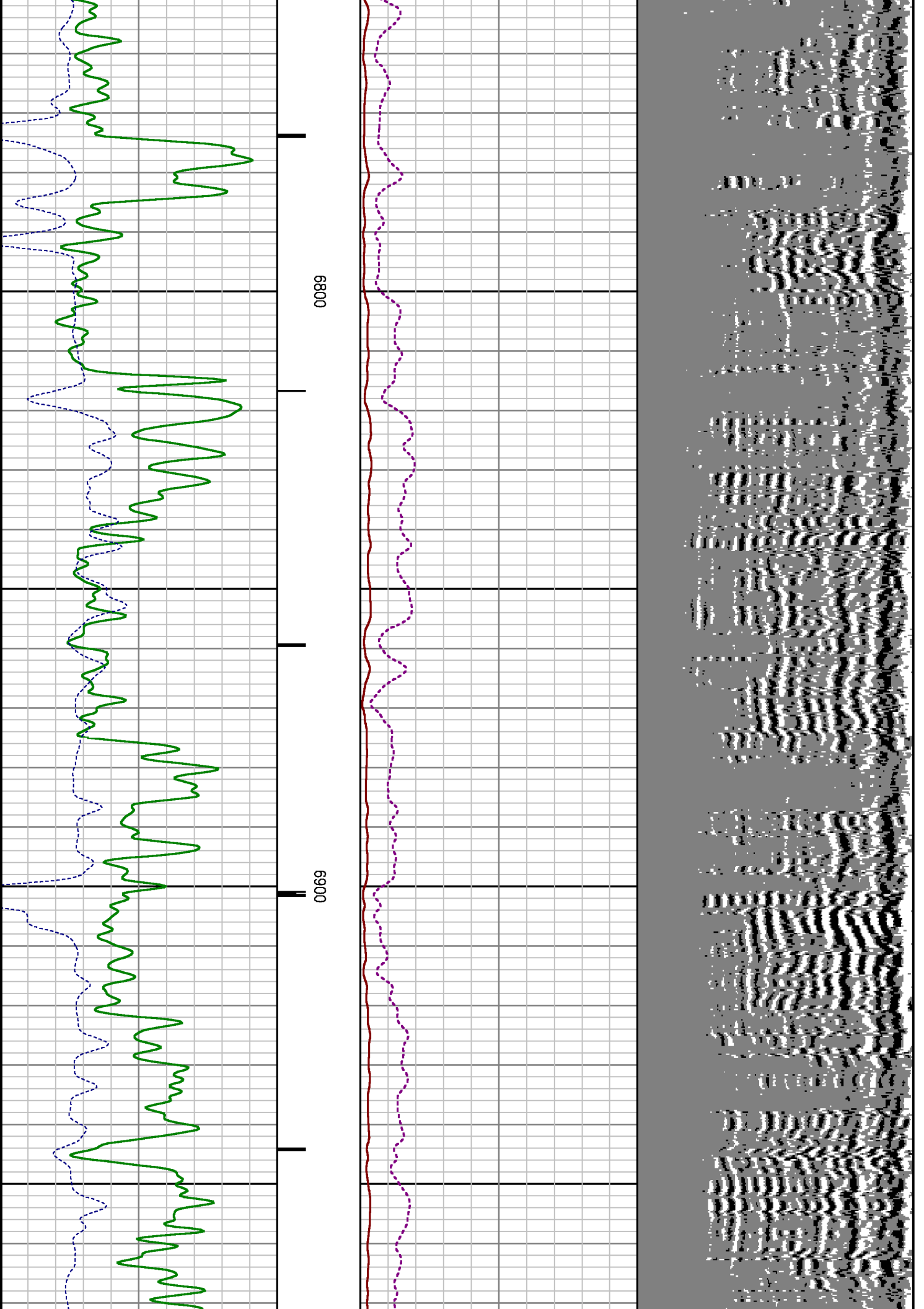


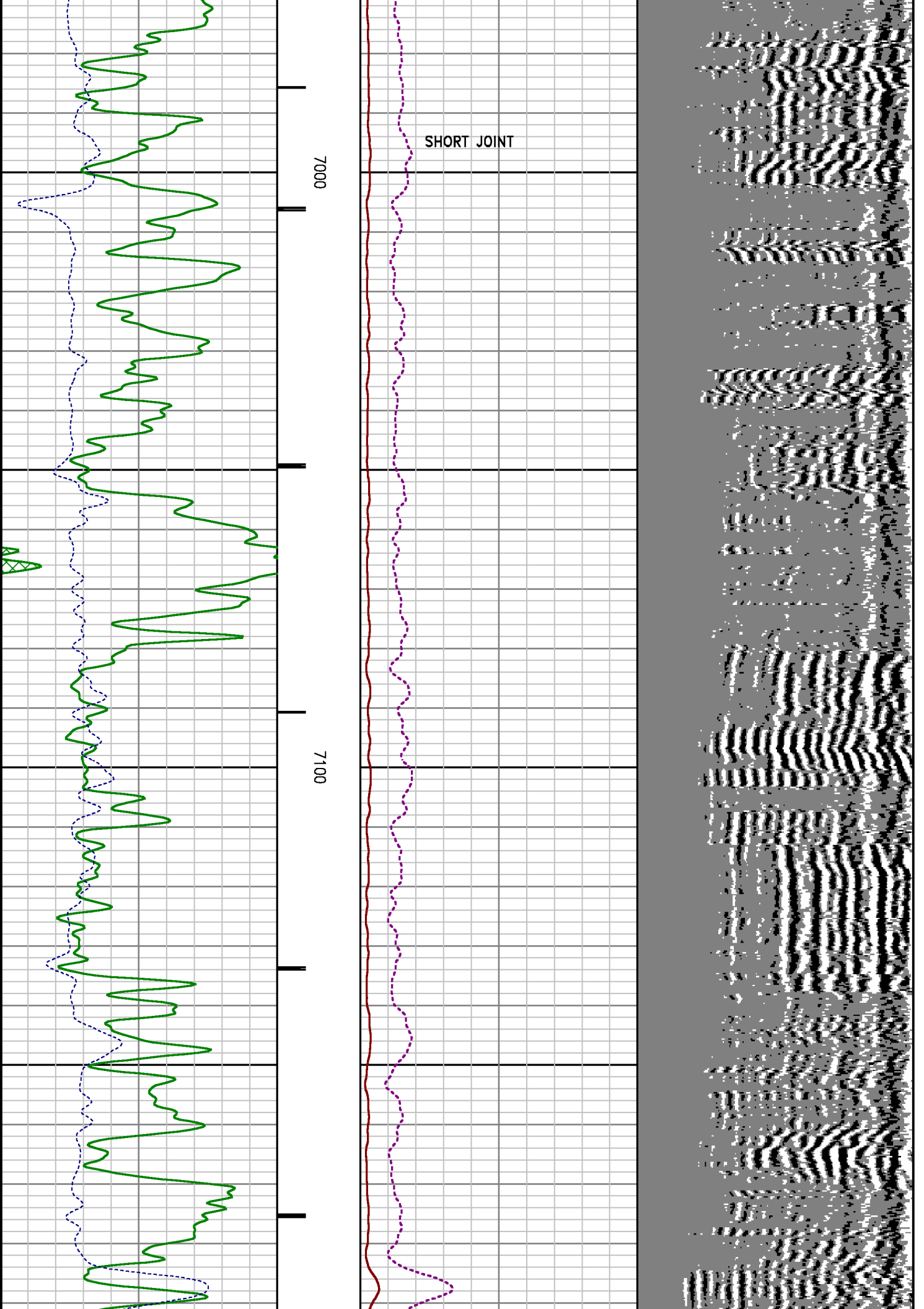


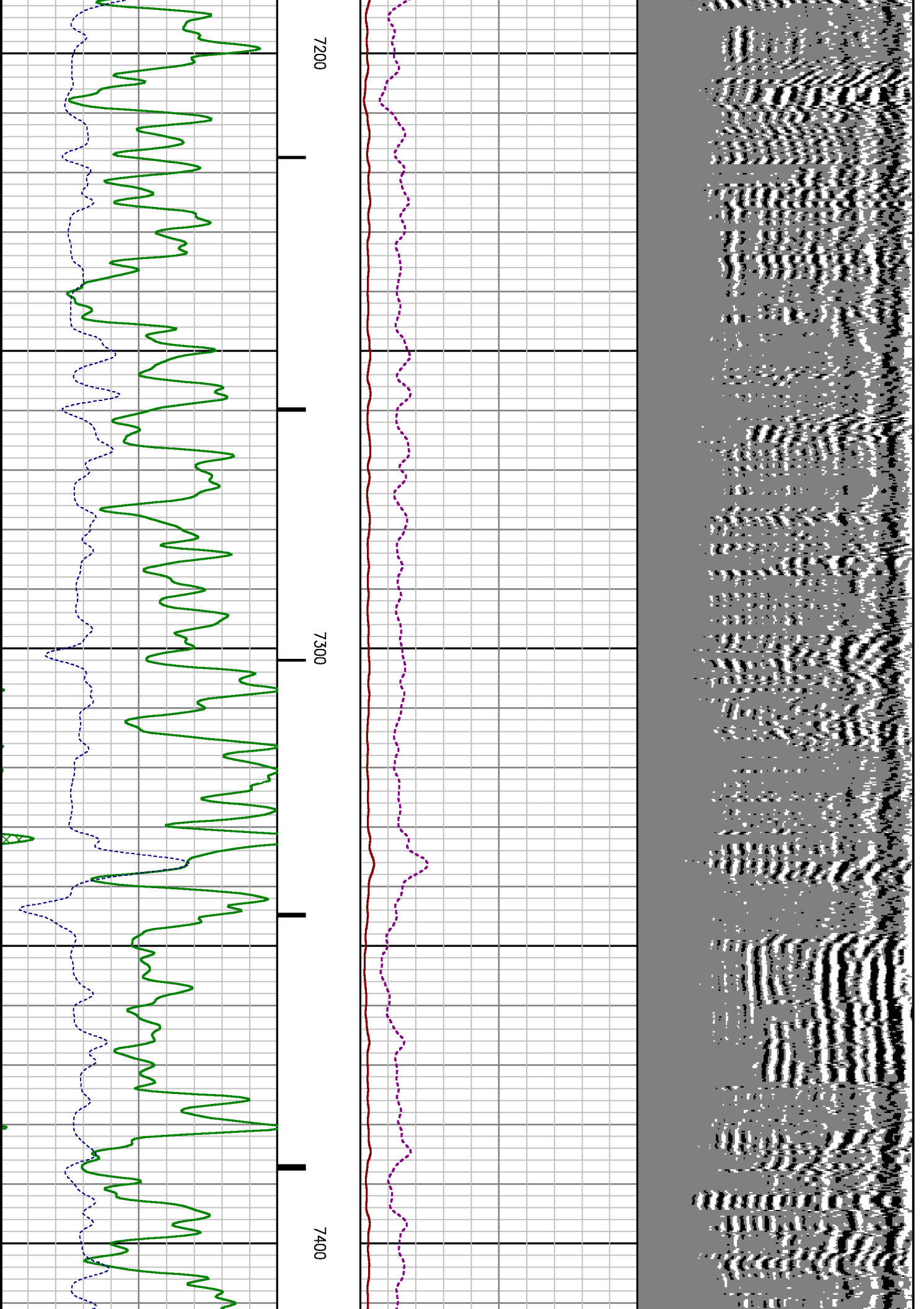


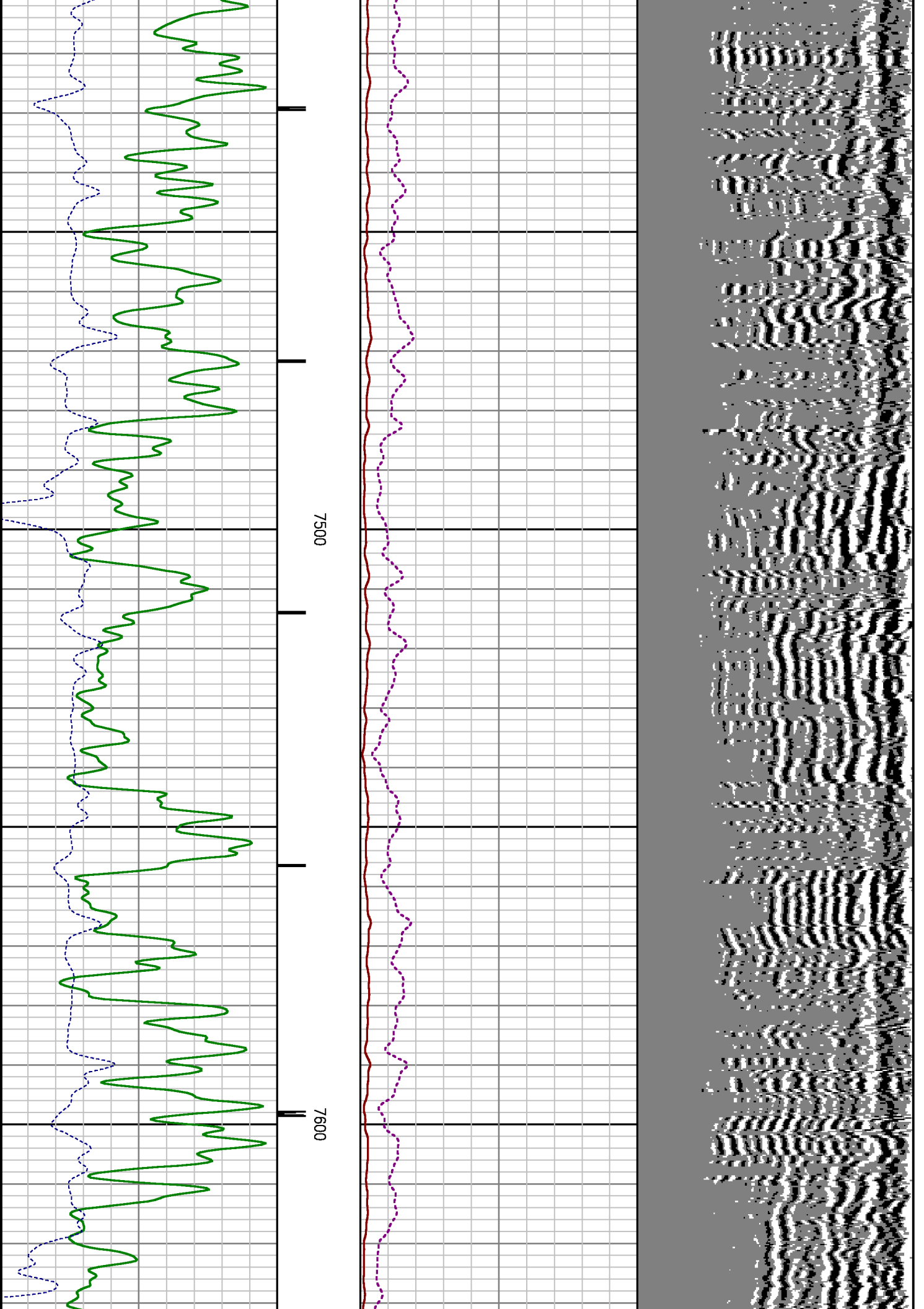


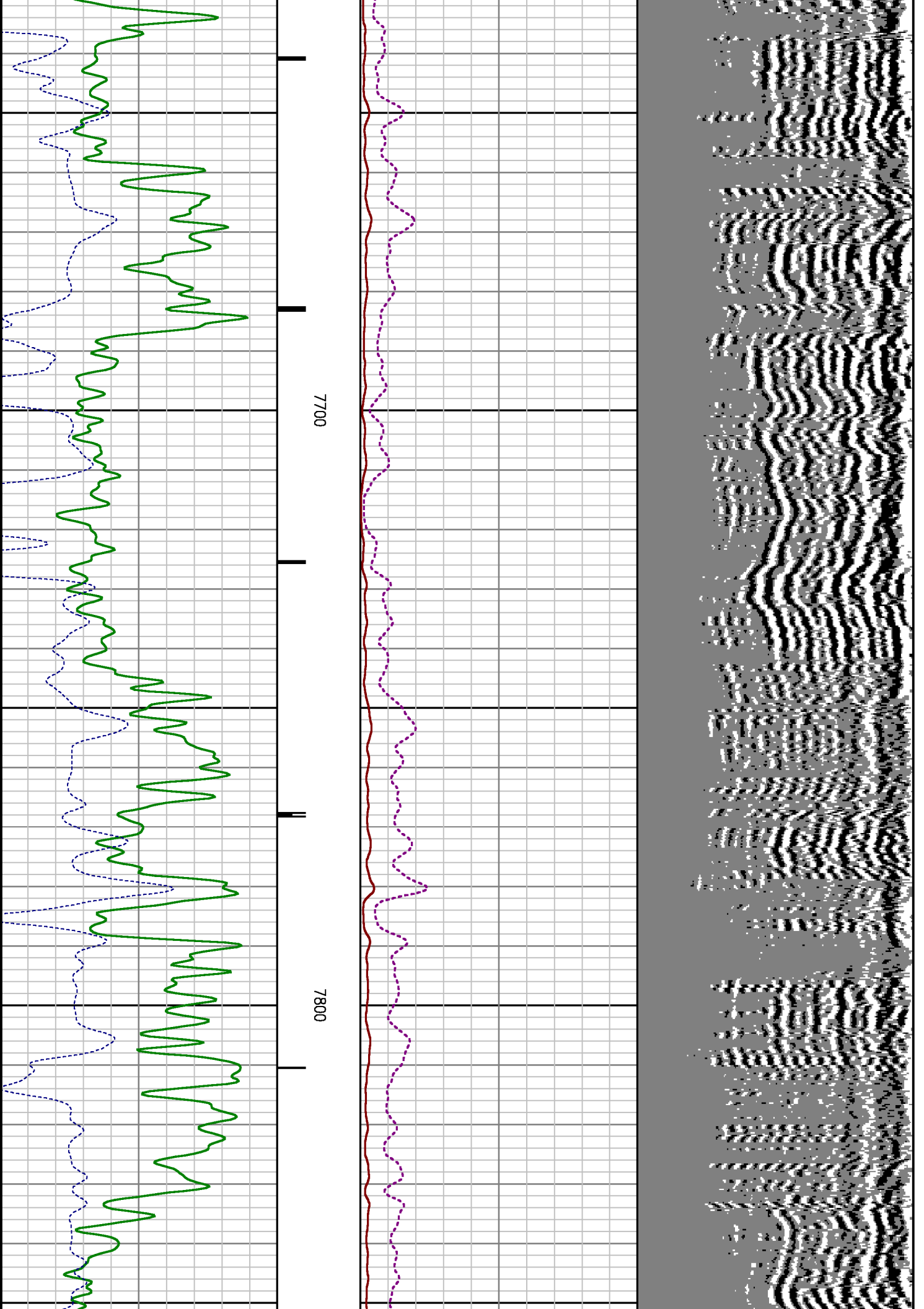


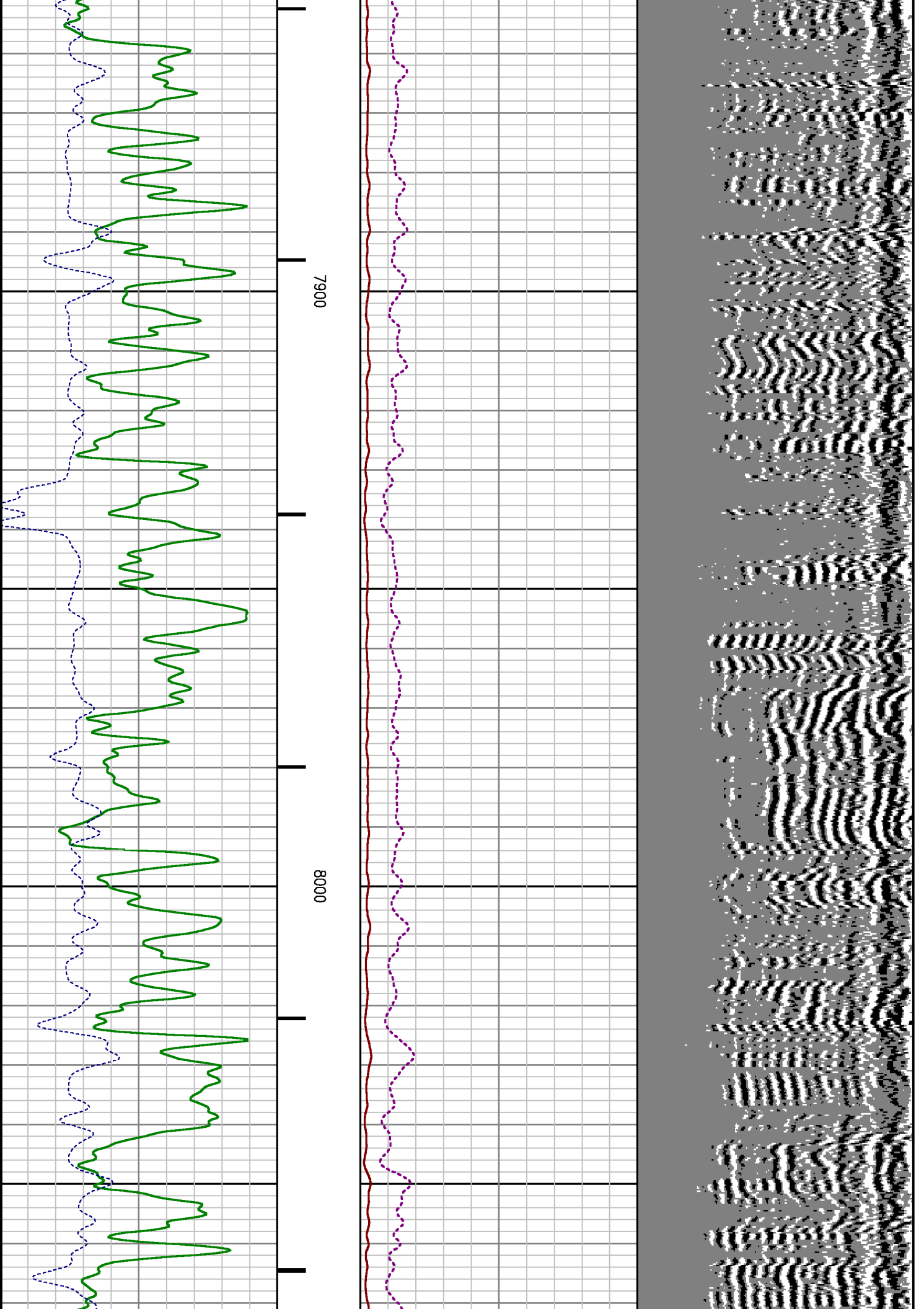


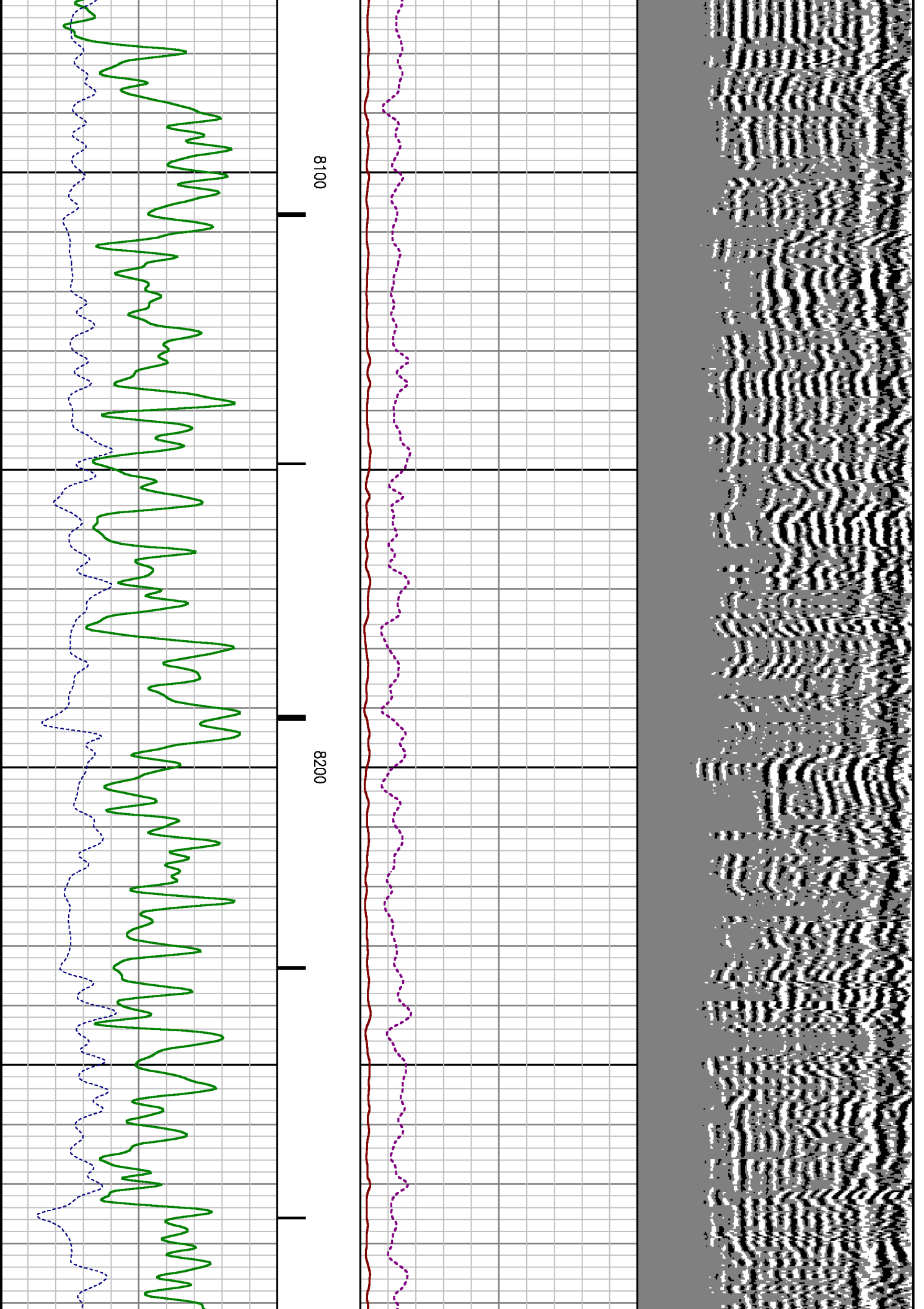


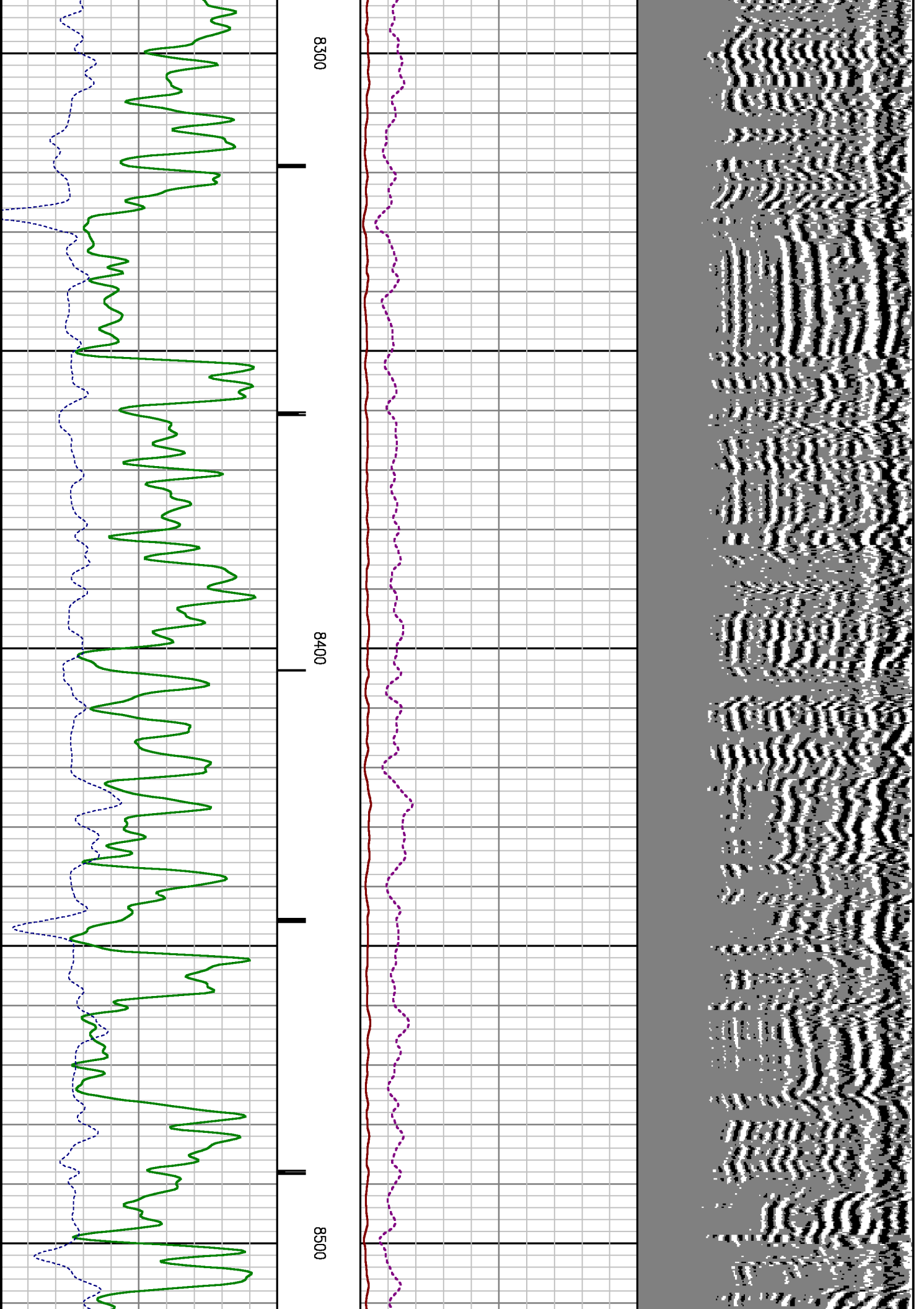


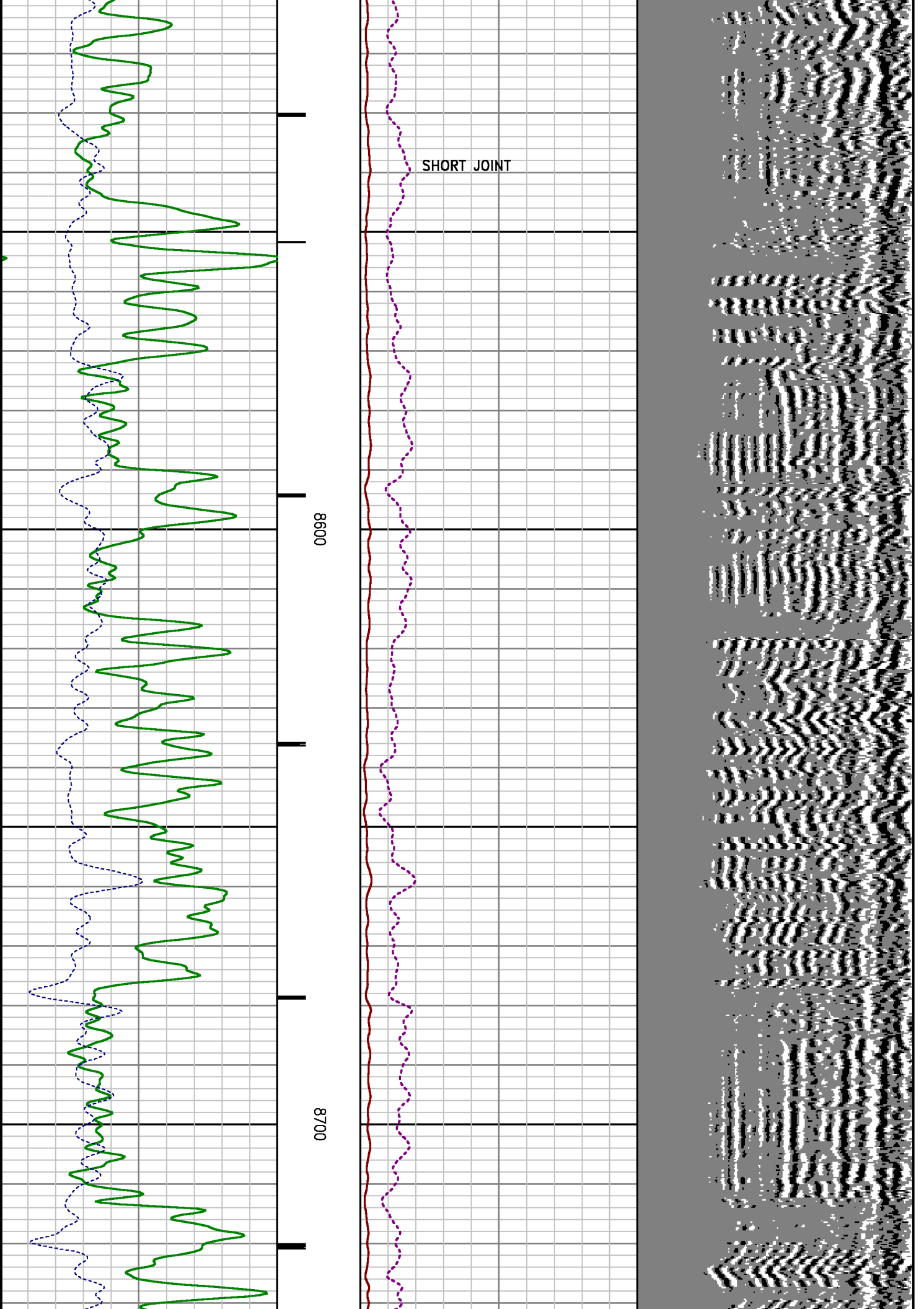


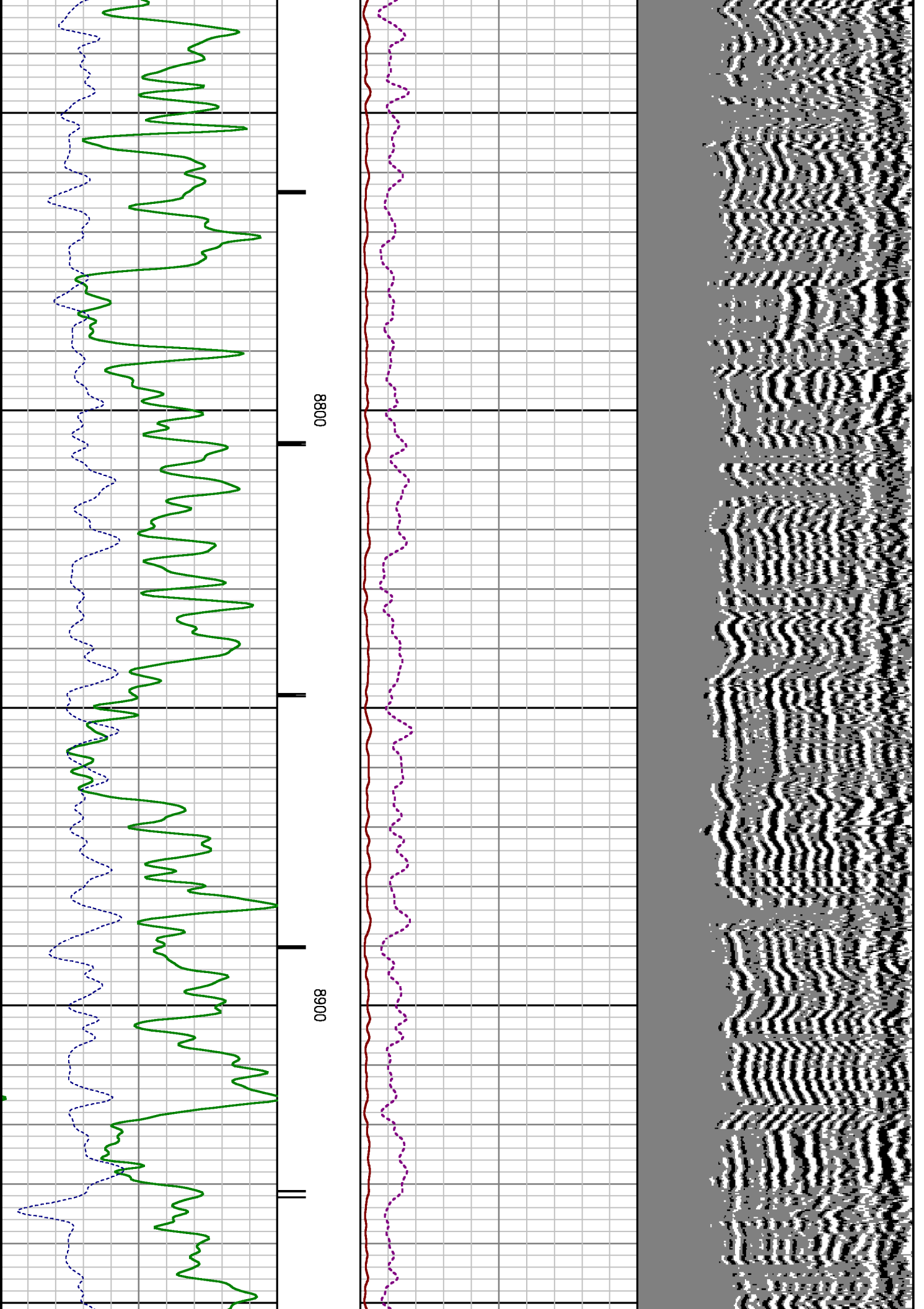


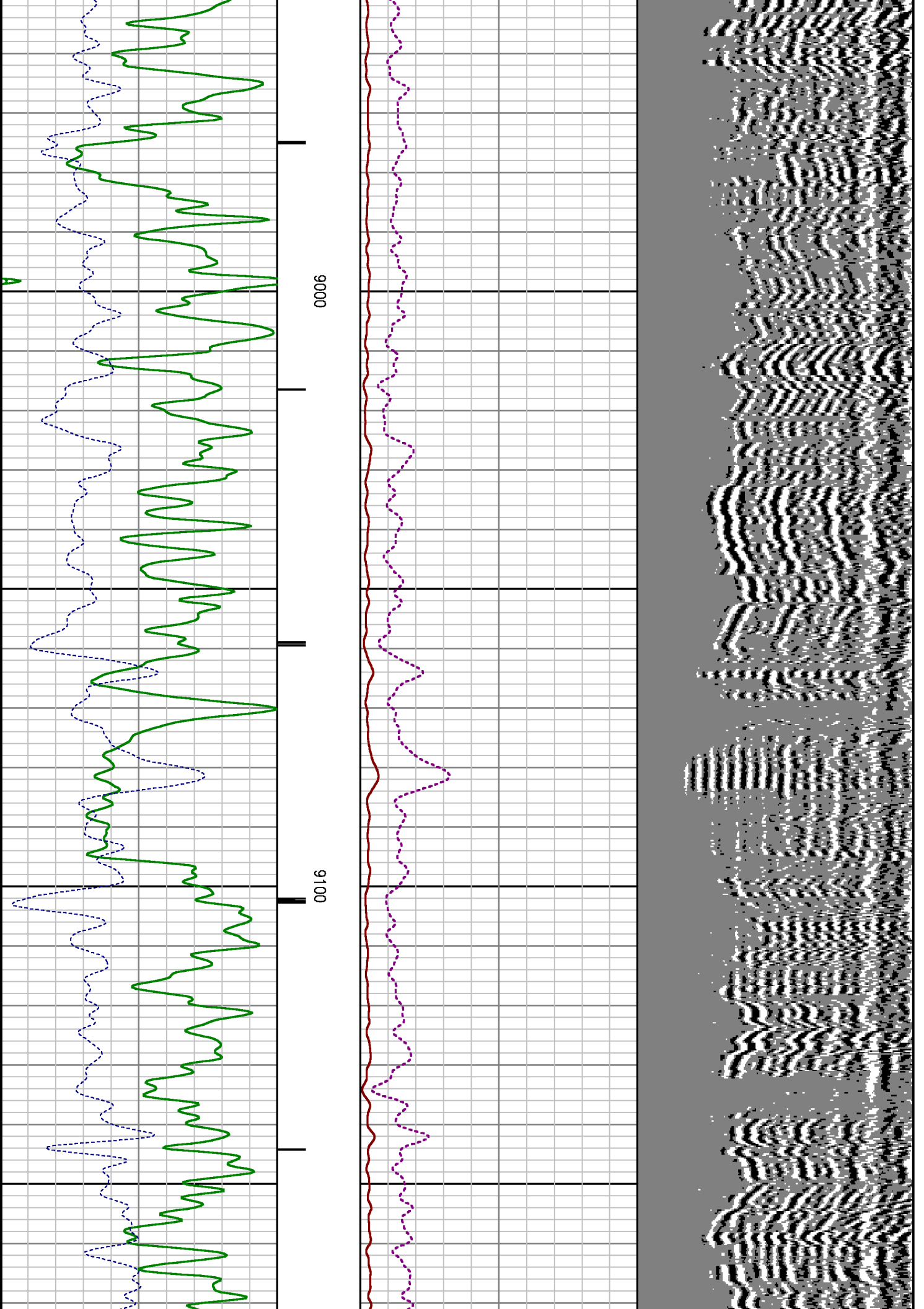


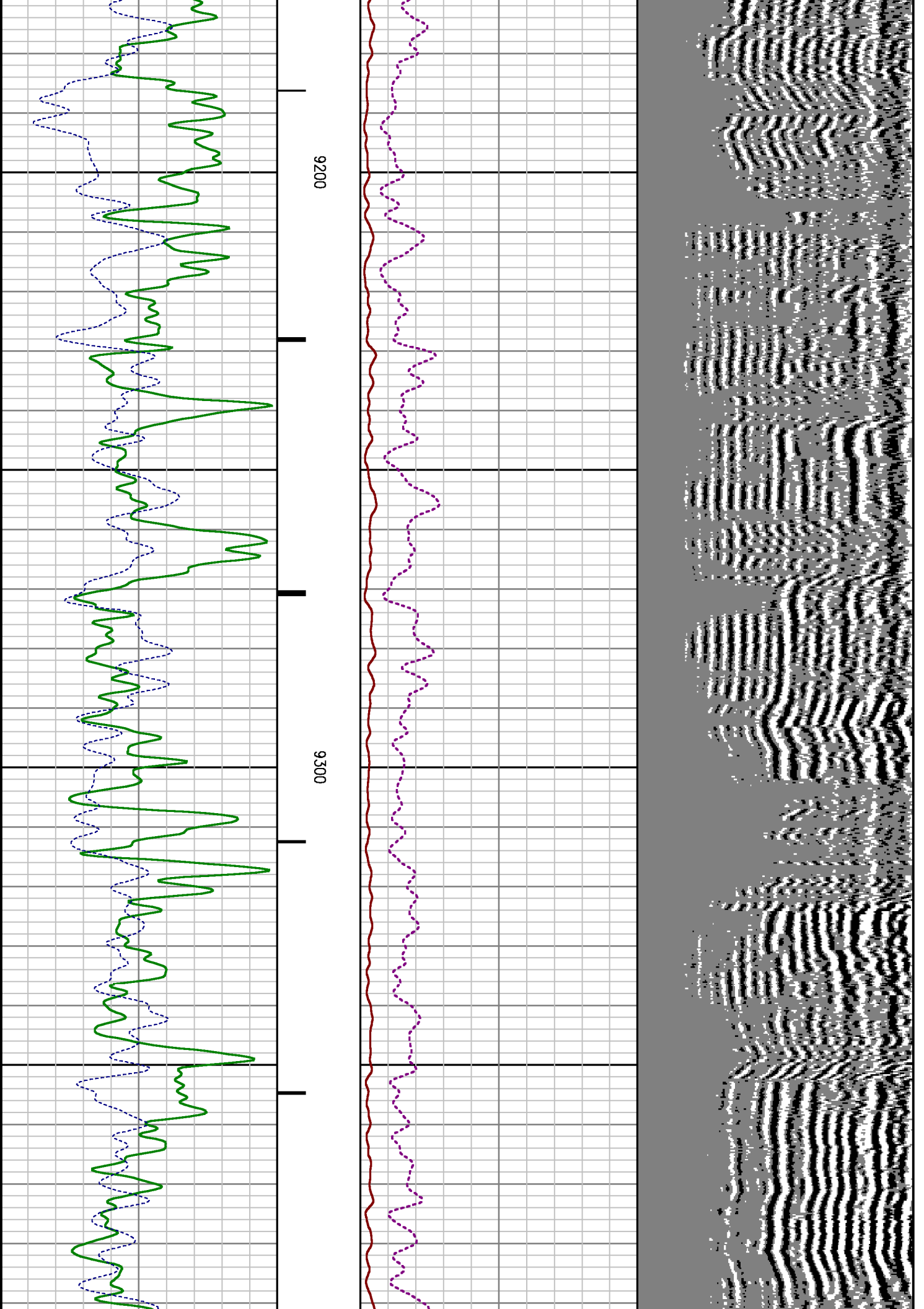


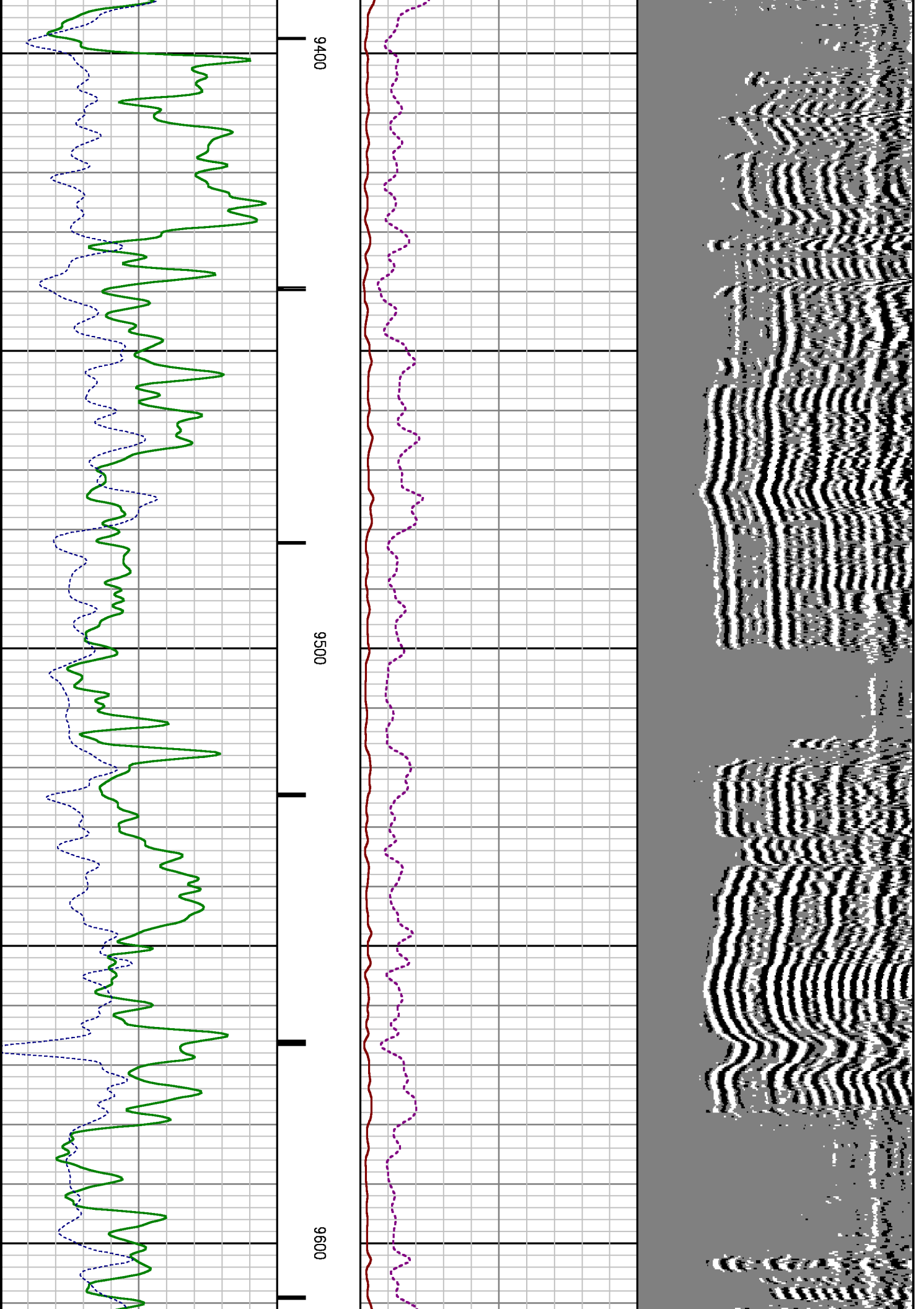


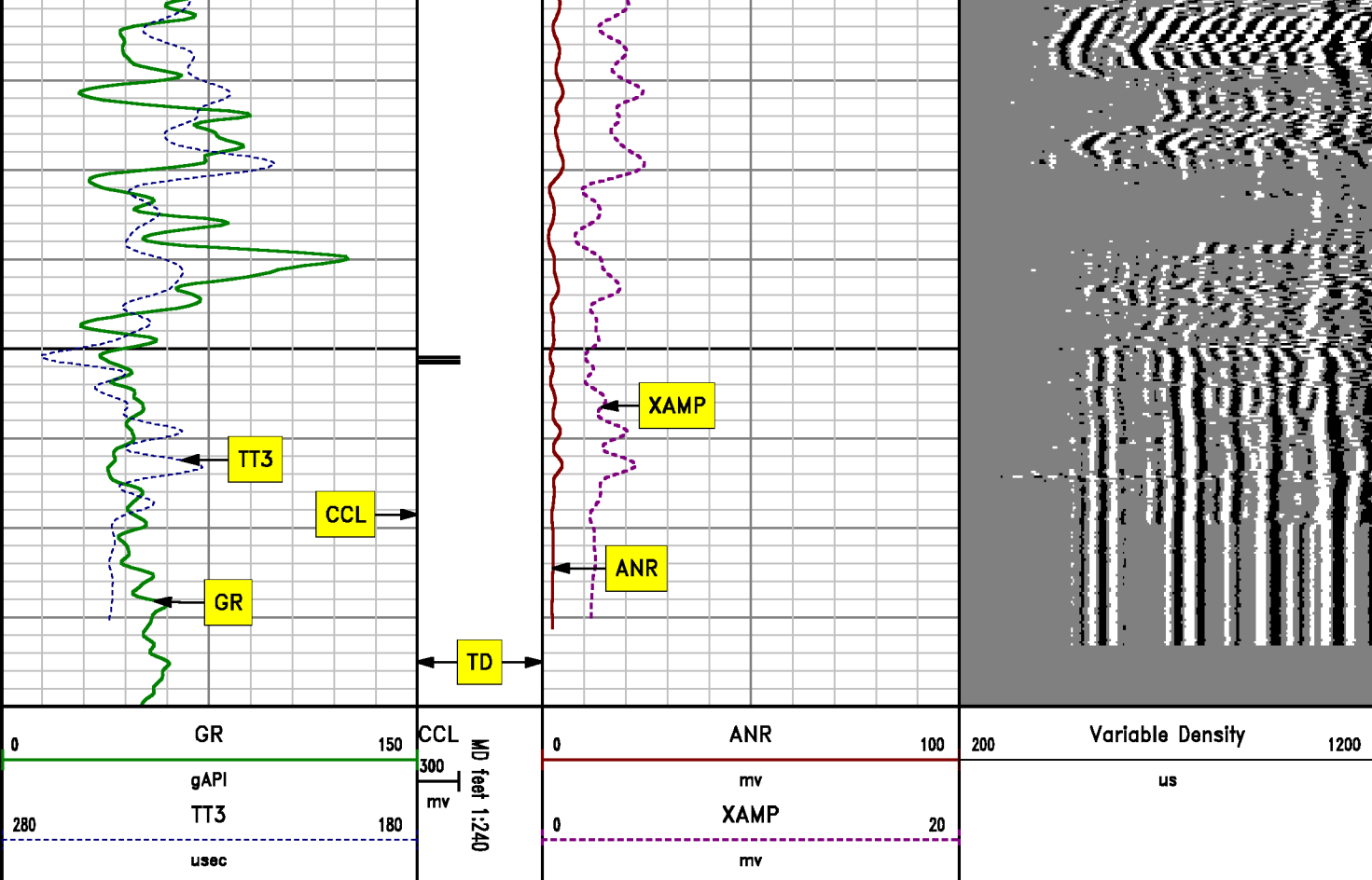












*MAIN SECTION
SECONDARY PRESENTATION
1000 psi*

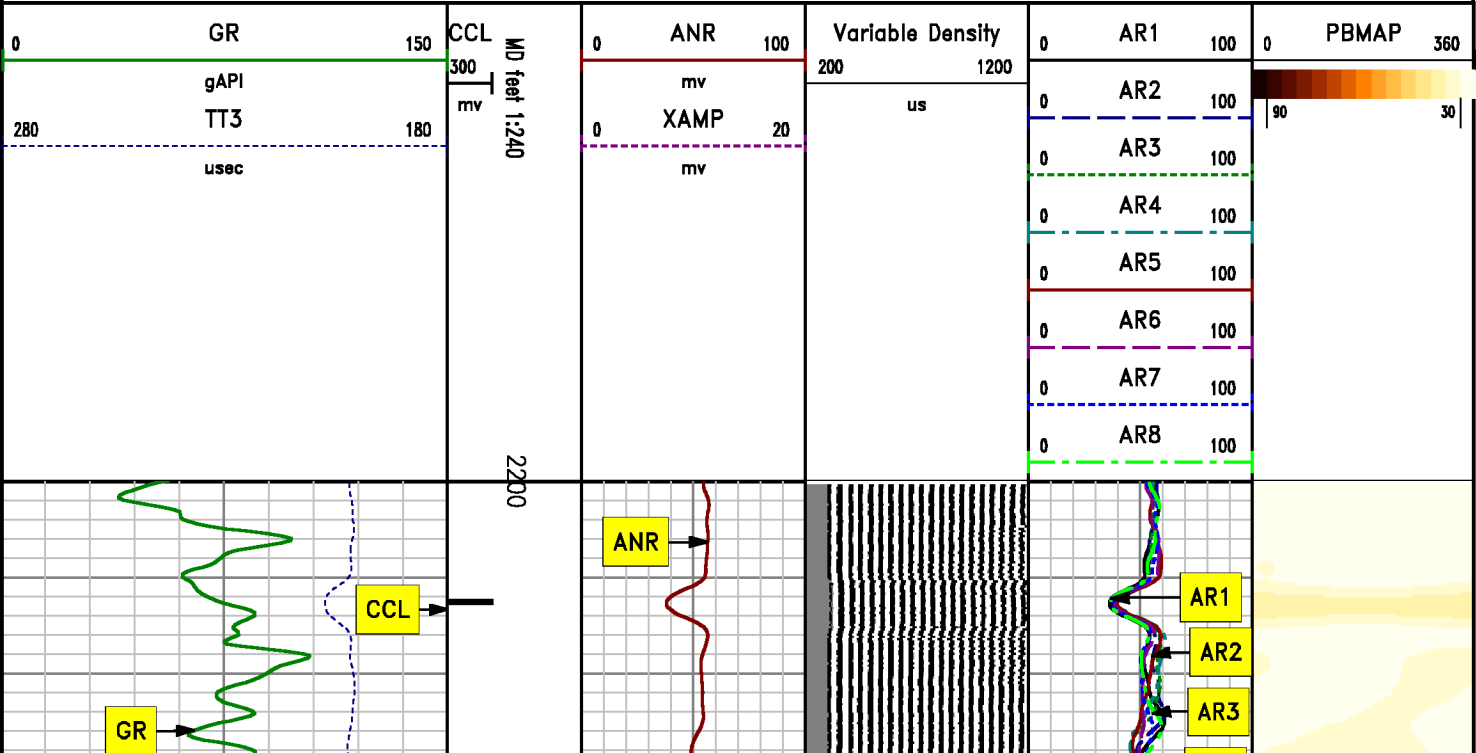
MEASUREMENT TYPE	PARAMETER	VALUE	UNITS	TOP	BOTTOM
RAL	Amp Gate Start Far	316.900	usec	16.374	9697.000
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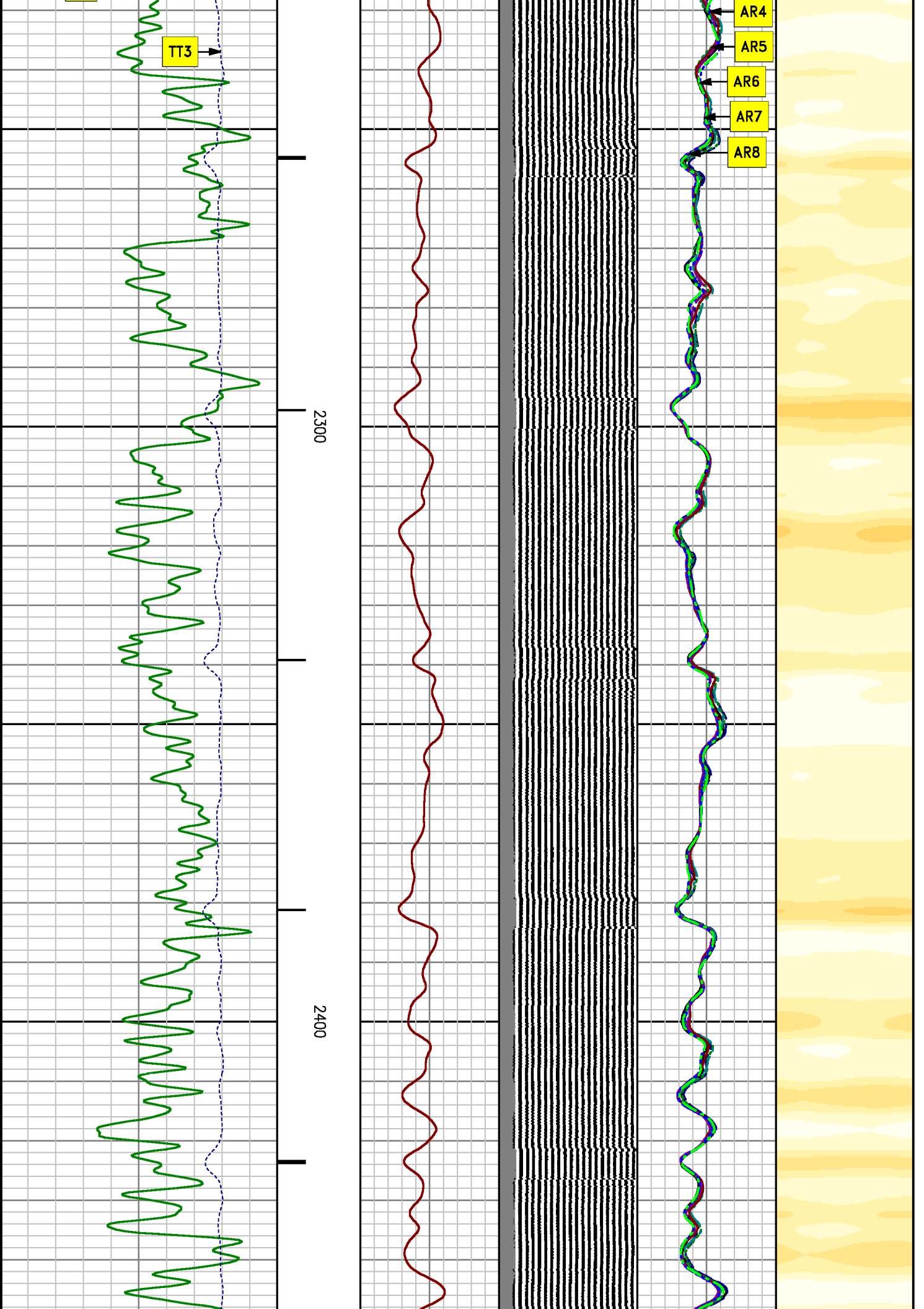
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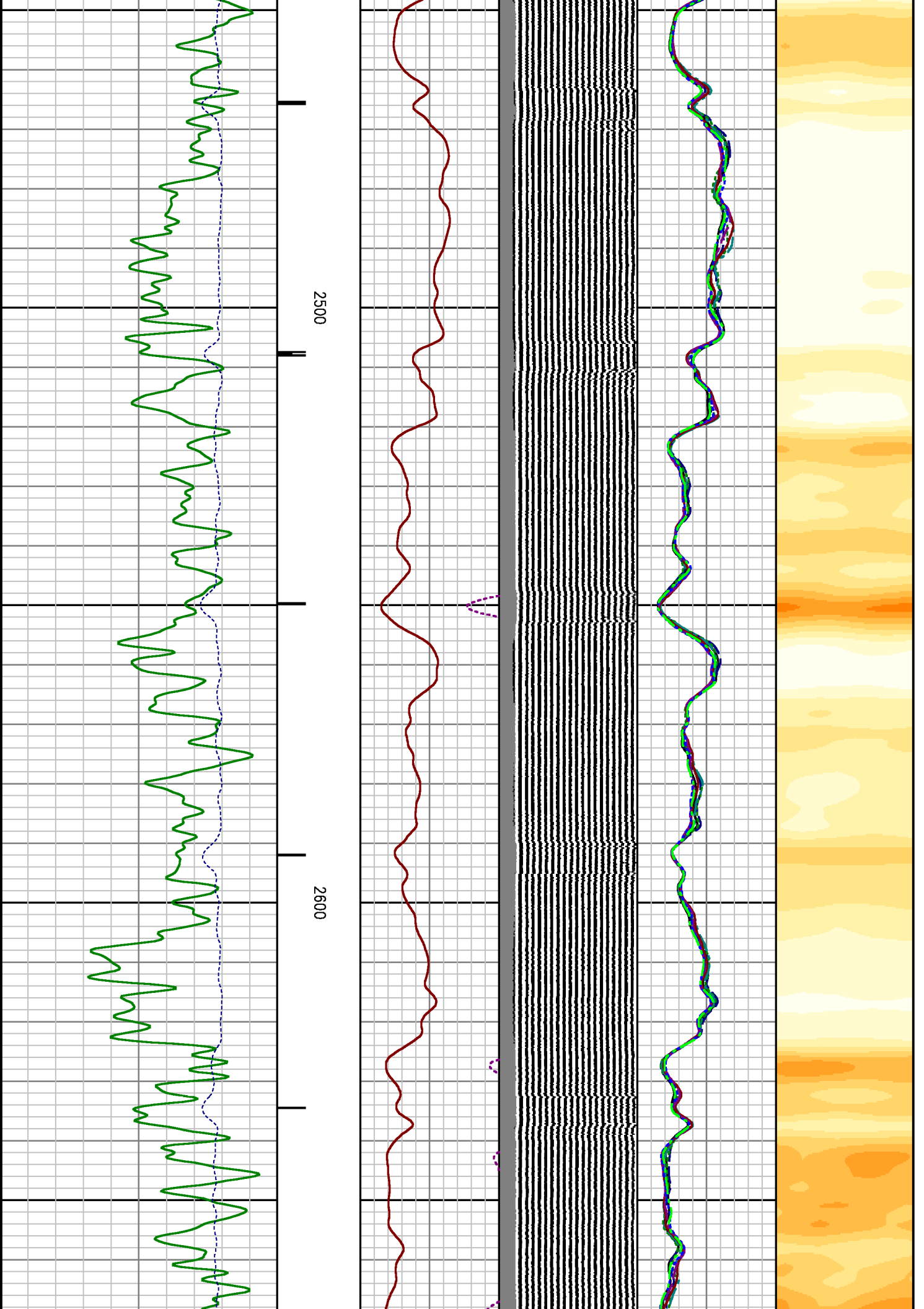
DEPTH OFFSETS
(for Acquired Curves)

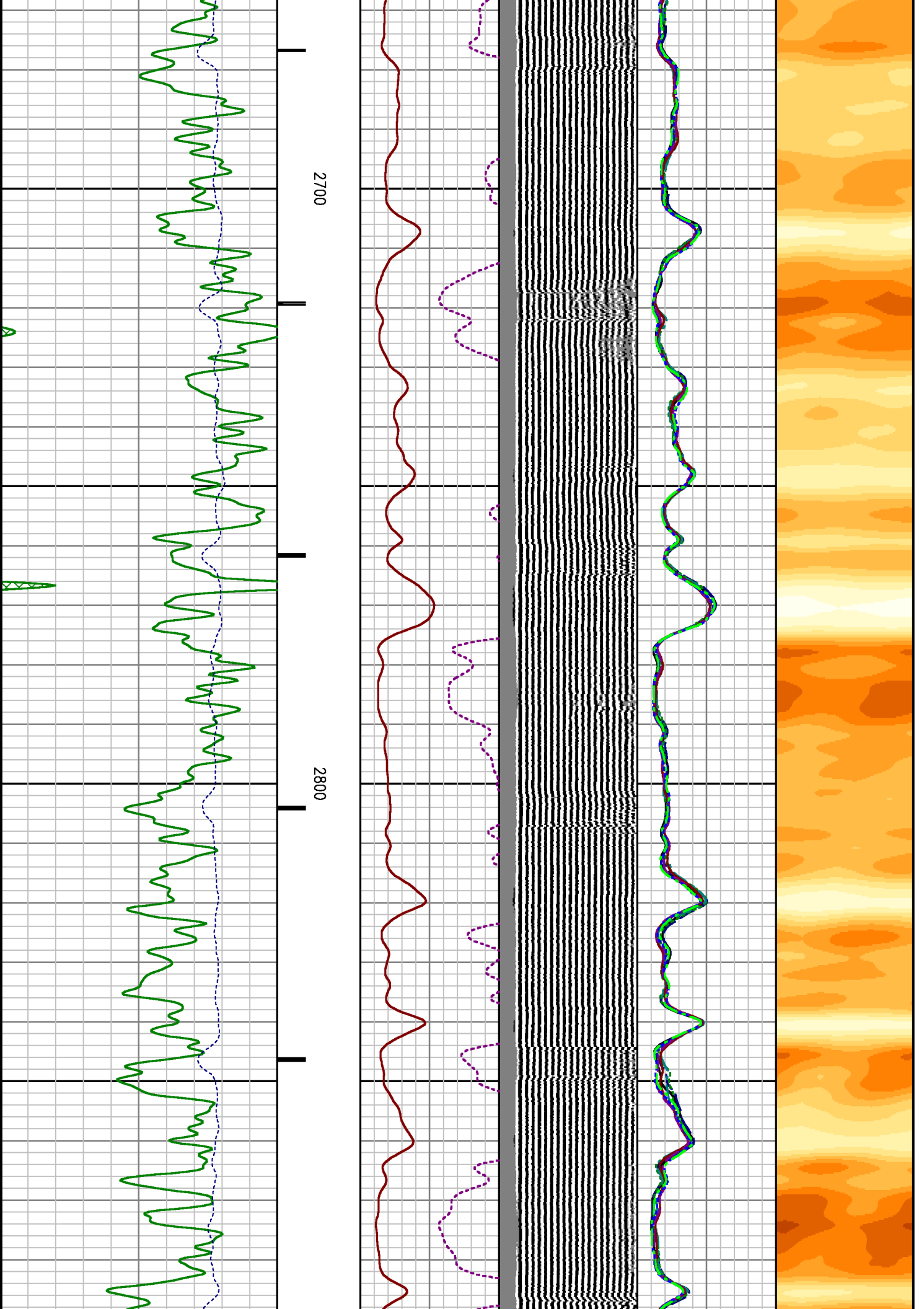
SERIES	DEPTH OFFSET	ACQUIRED CURVES					
1426XA	-15.360	ACAL	ANR	AR1	AR2	AR3	AR4
		AR5	AR6	AR7	AR8	CHV	FPR2
		FPR3	FPR5	TT3	TTR1	TTR2	TTR3
		TTR4	TTR5	TTR6	TTR7	TTR8	XAMP
1426XA	-14.360	AFAR	SIG	TT5			
2459XA	-7.250	CCL					
2459XA	-5.390	GR					
2459XA	0.000	NEU					

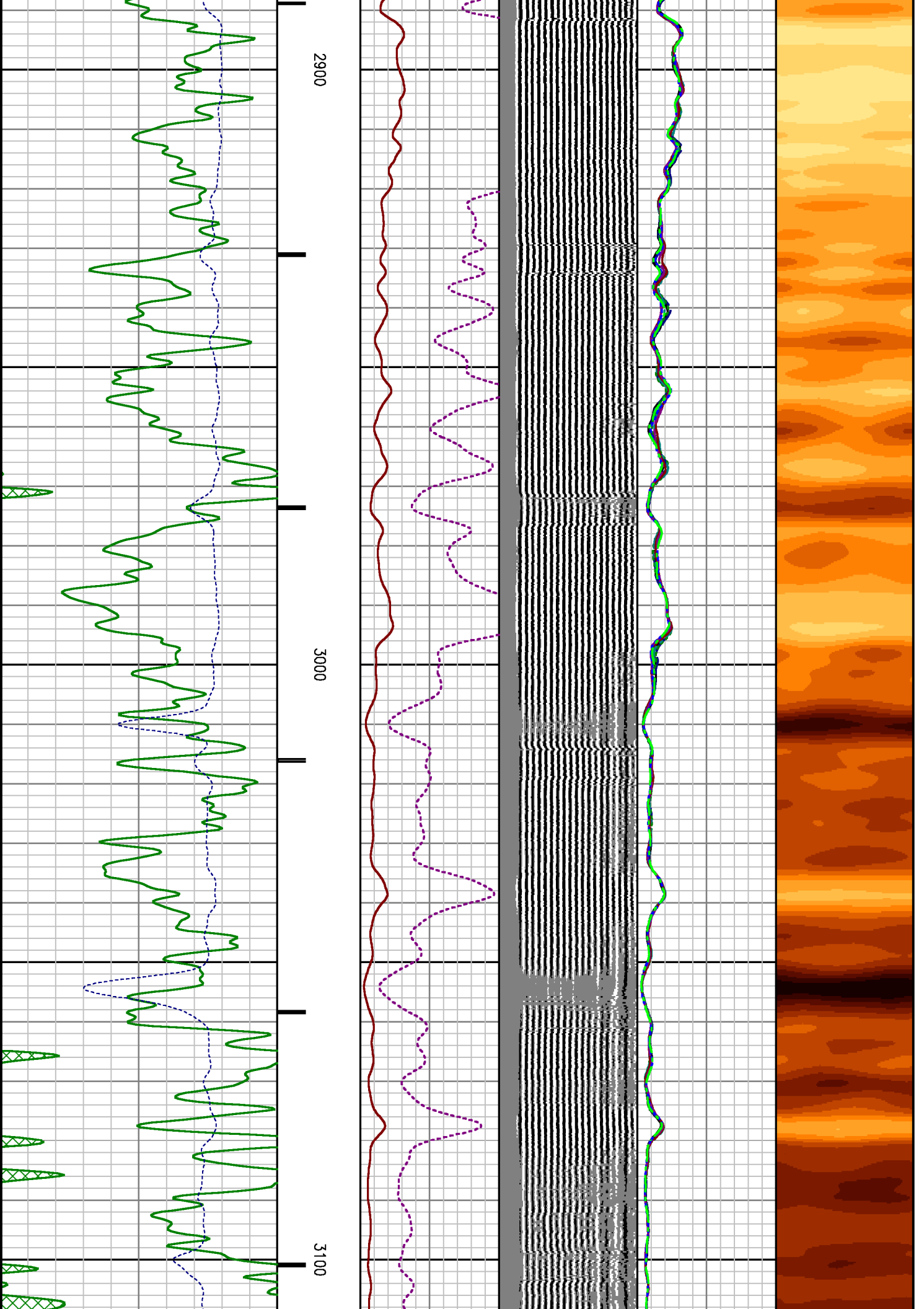
Created by : MIXED
Plotted by : PlotMgr, v5.4.504
Company : MARATHON OIL COMPANY
Well : 596-29C-12
File Name : D:\WELLDATA\RADC12\MAIN.XTF
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Created : 1/6/2010 6:58:25 AM

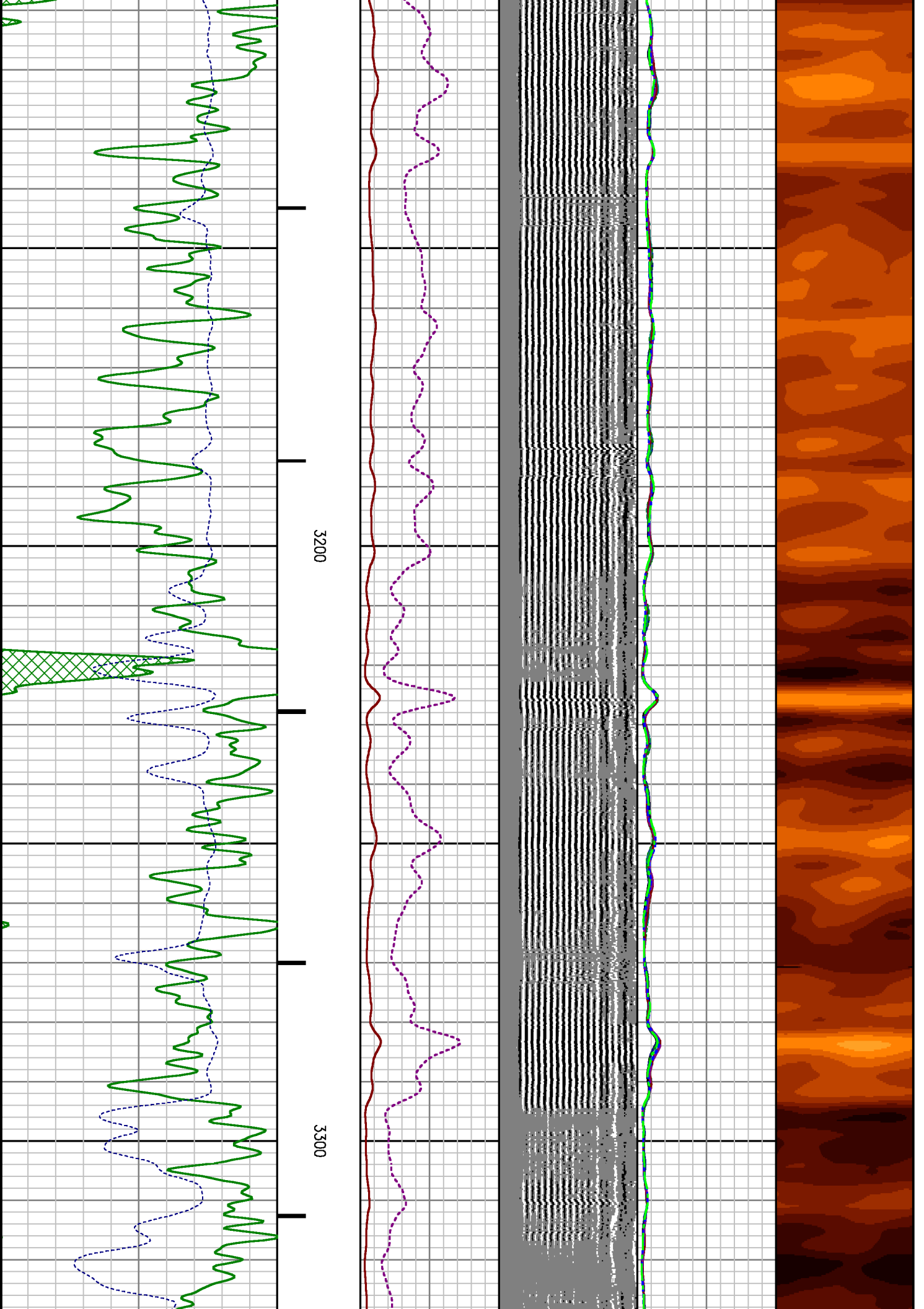


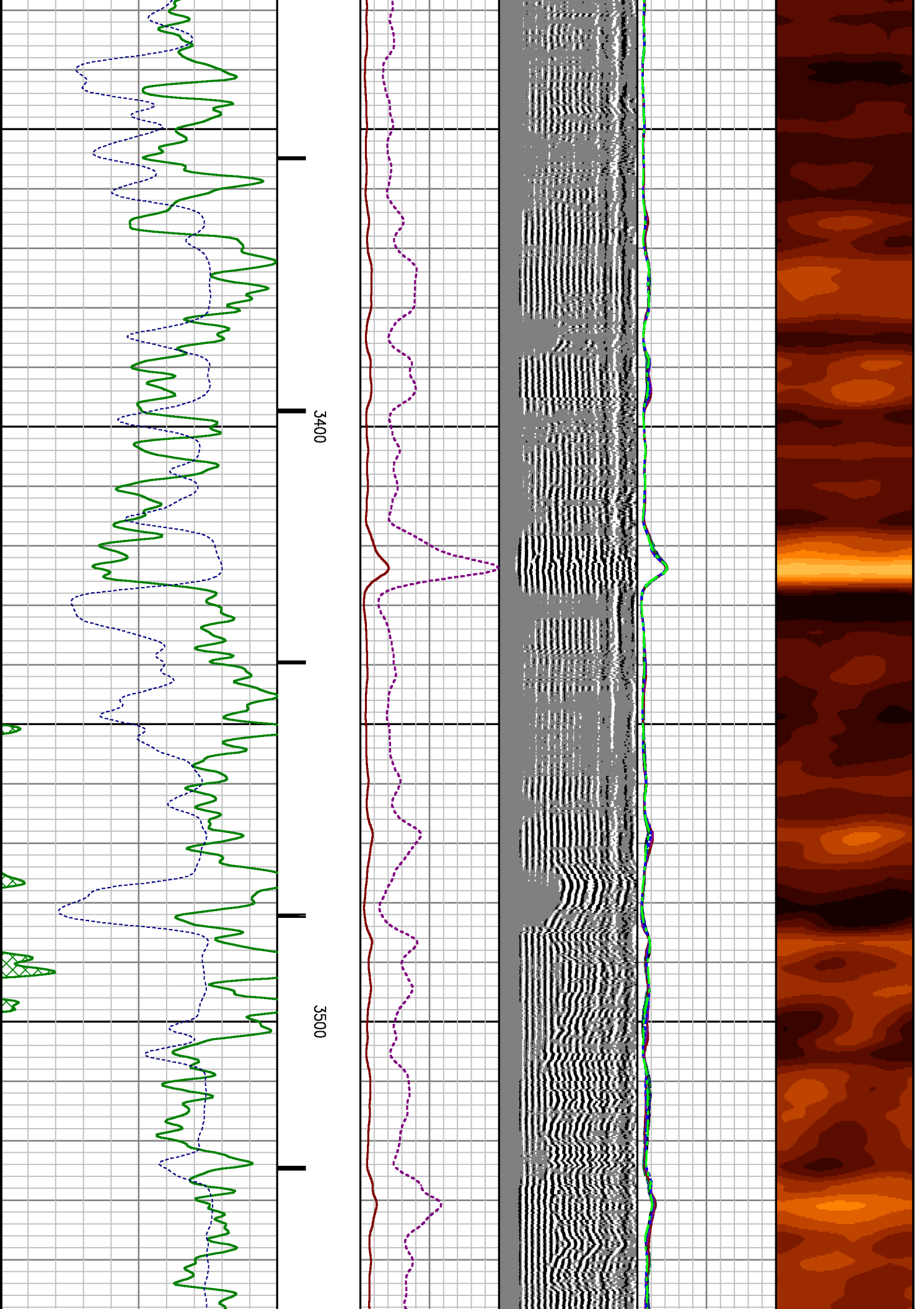


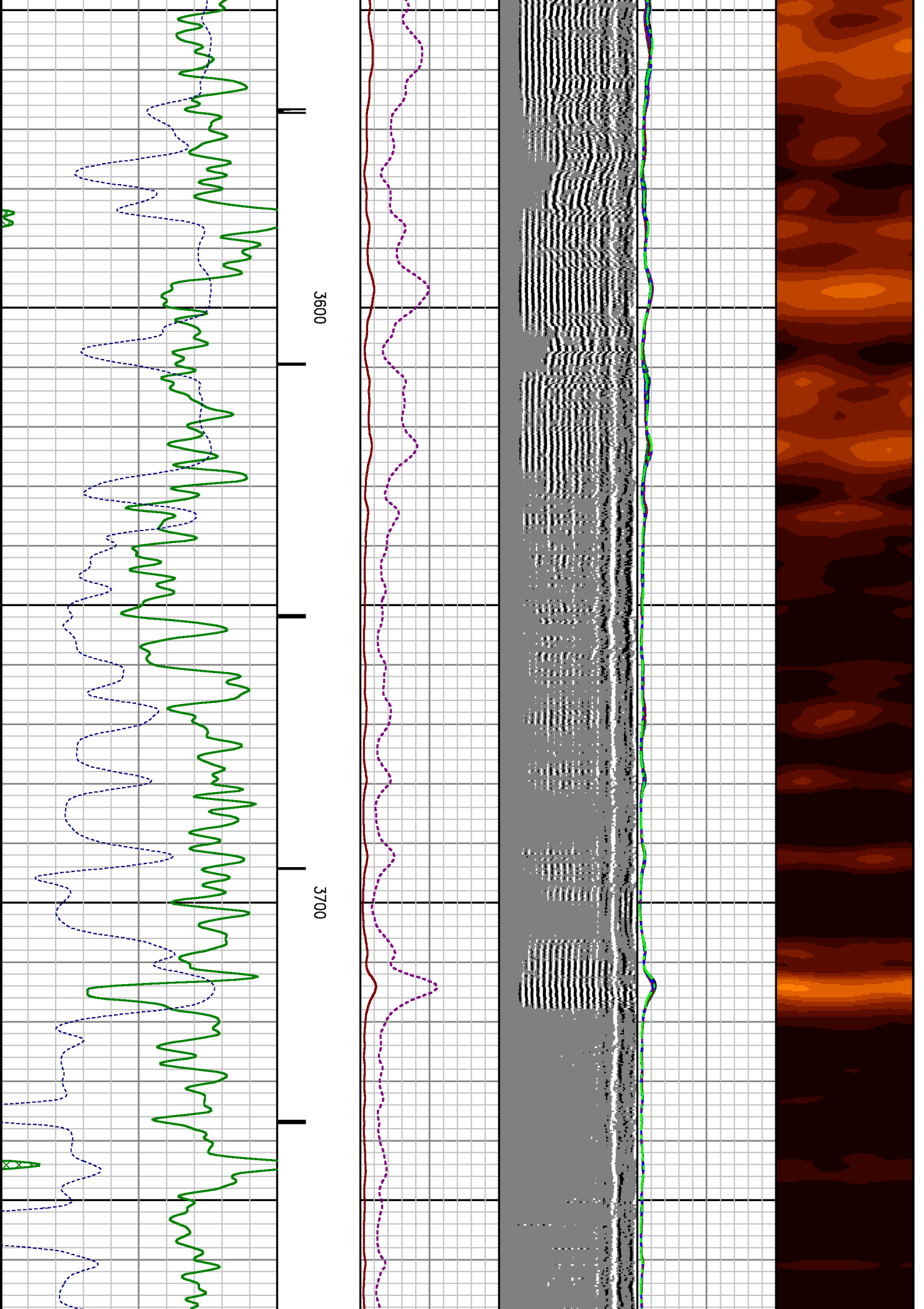


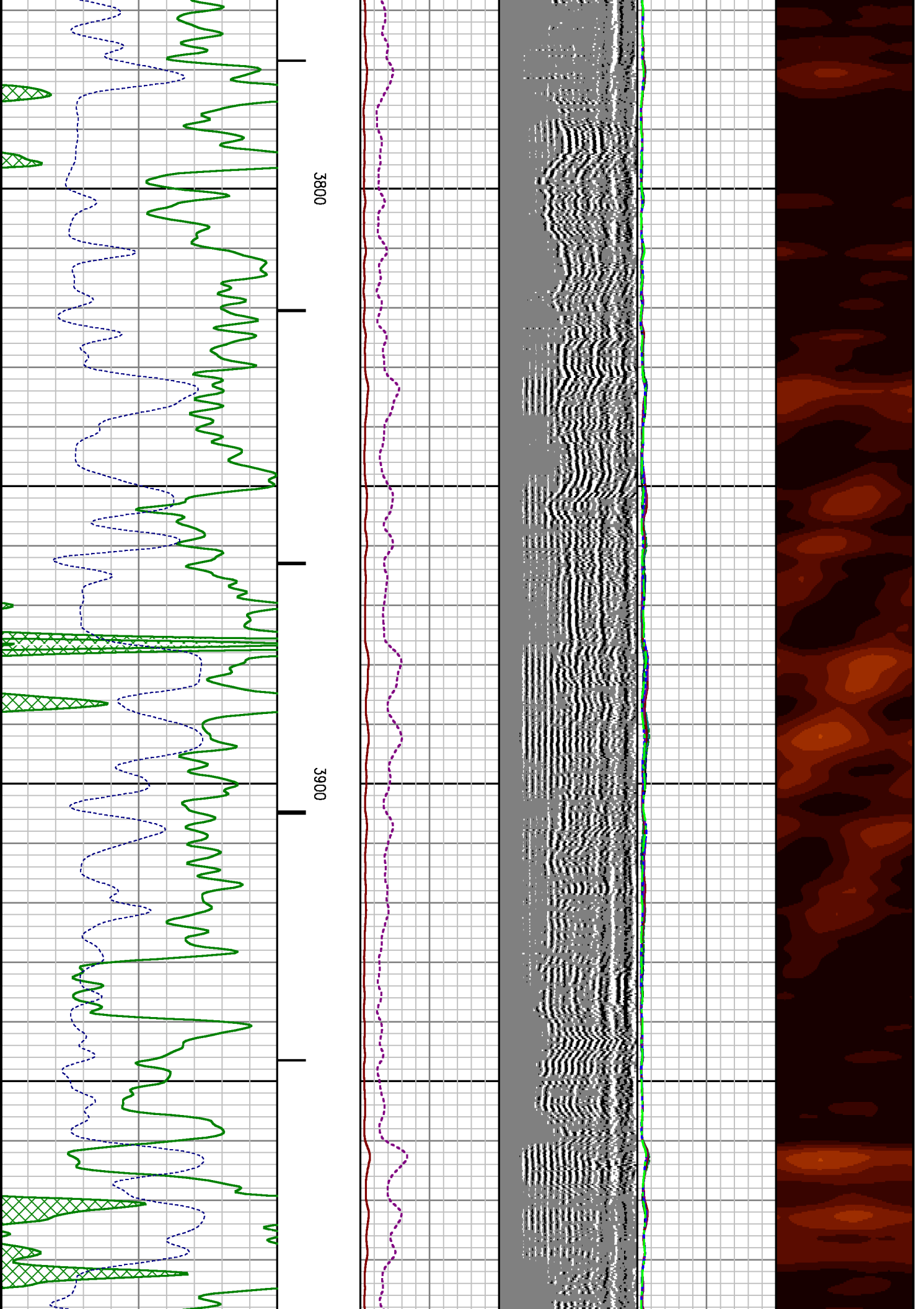


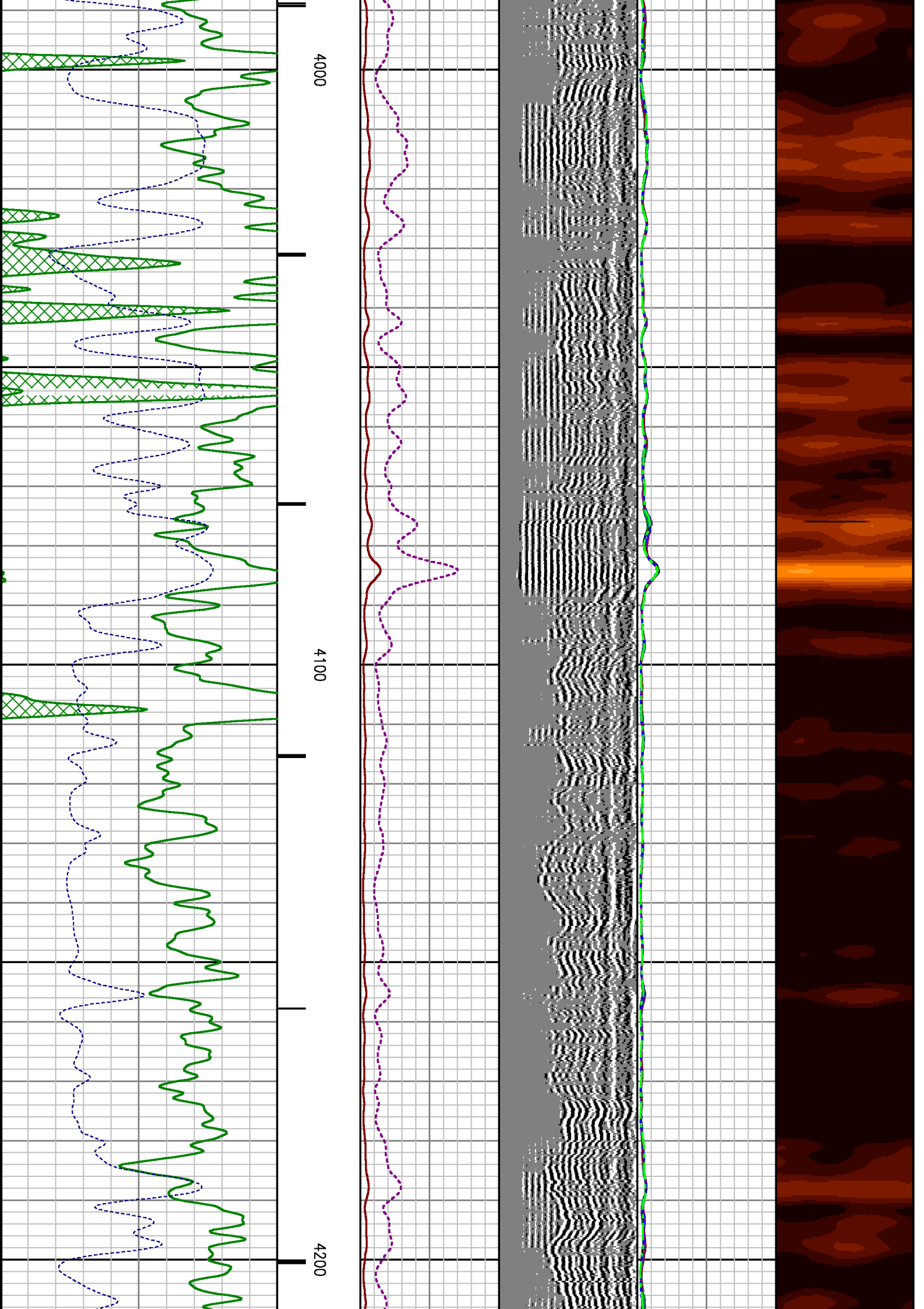


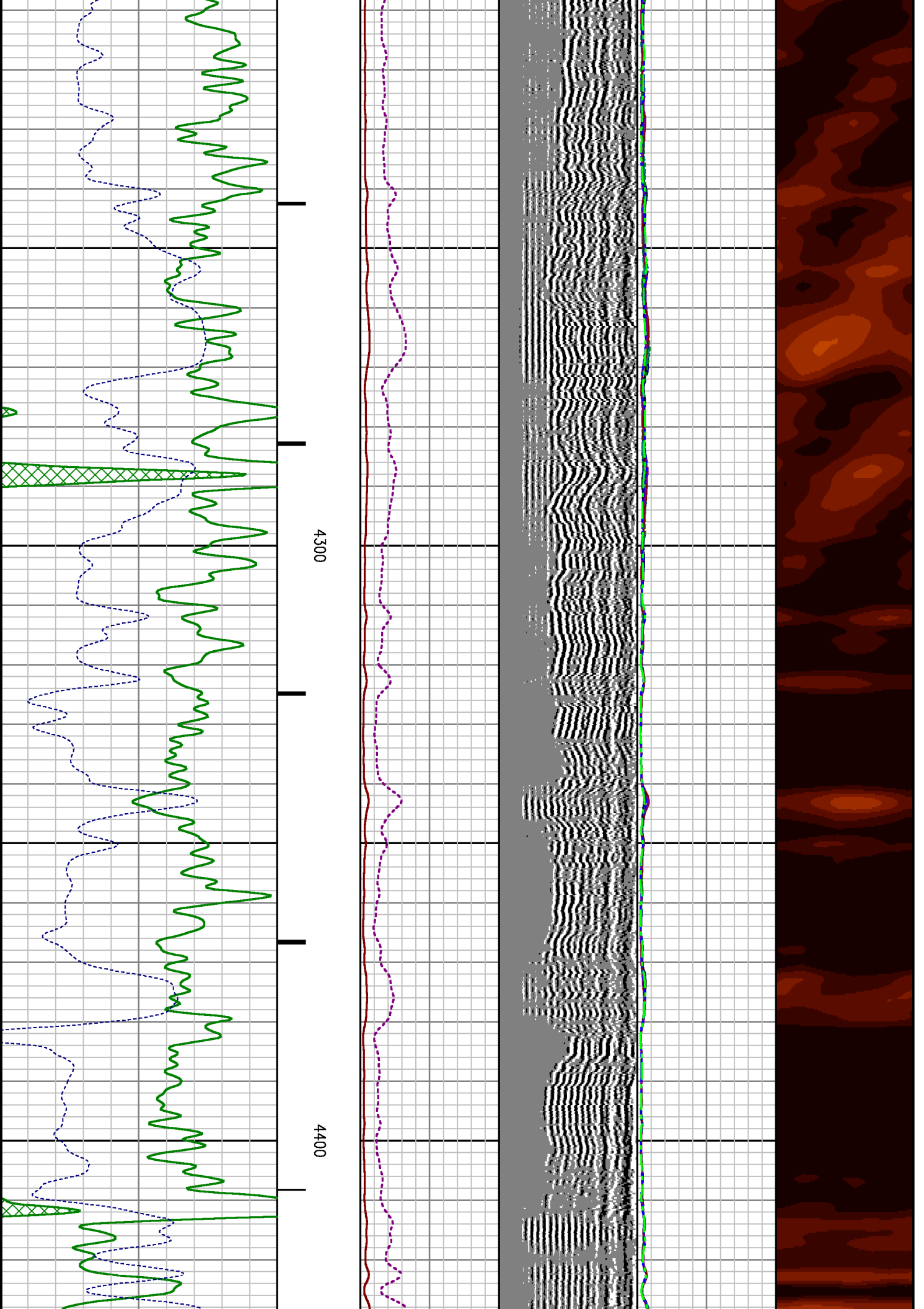


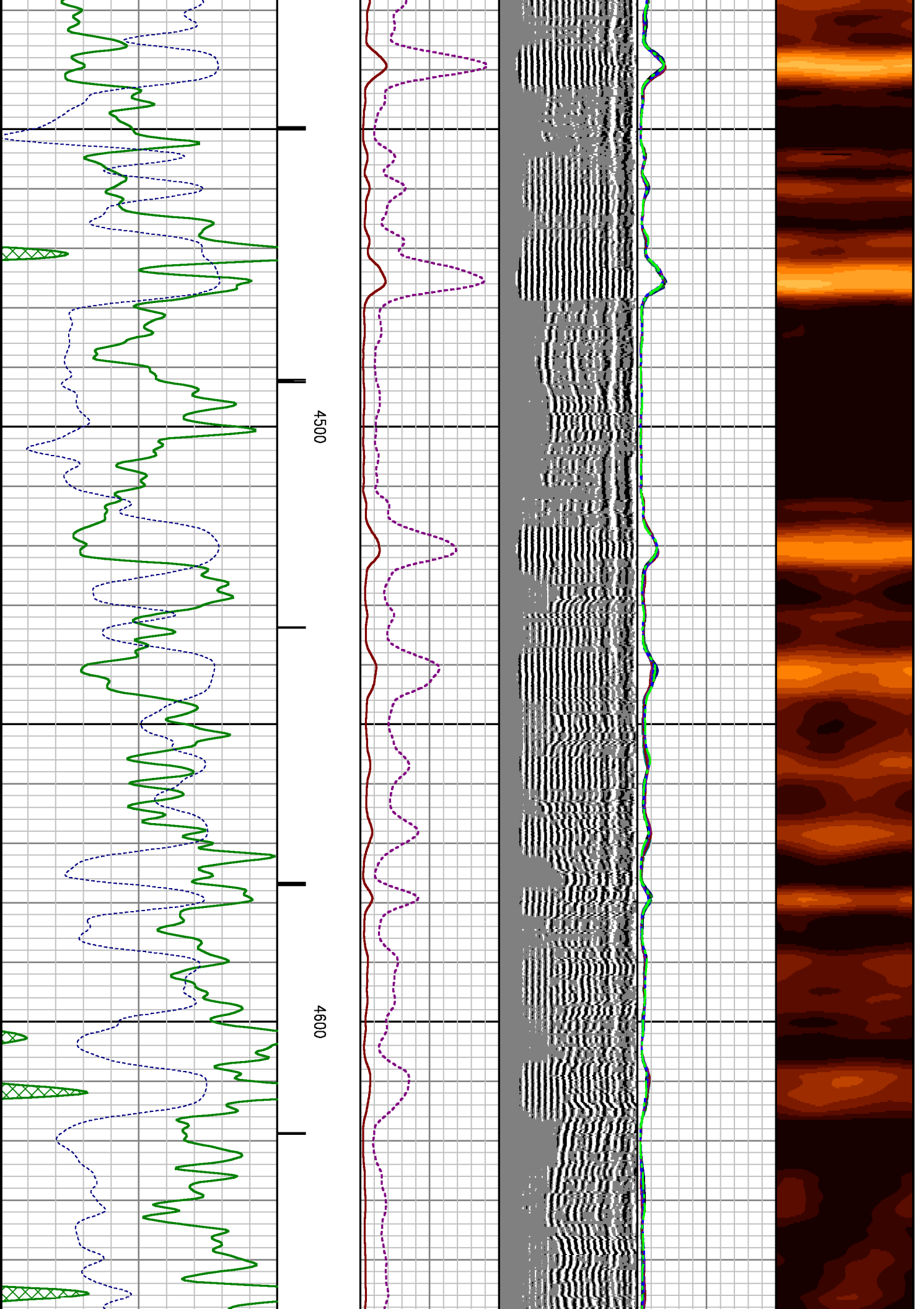


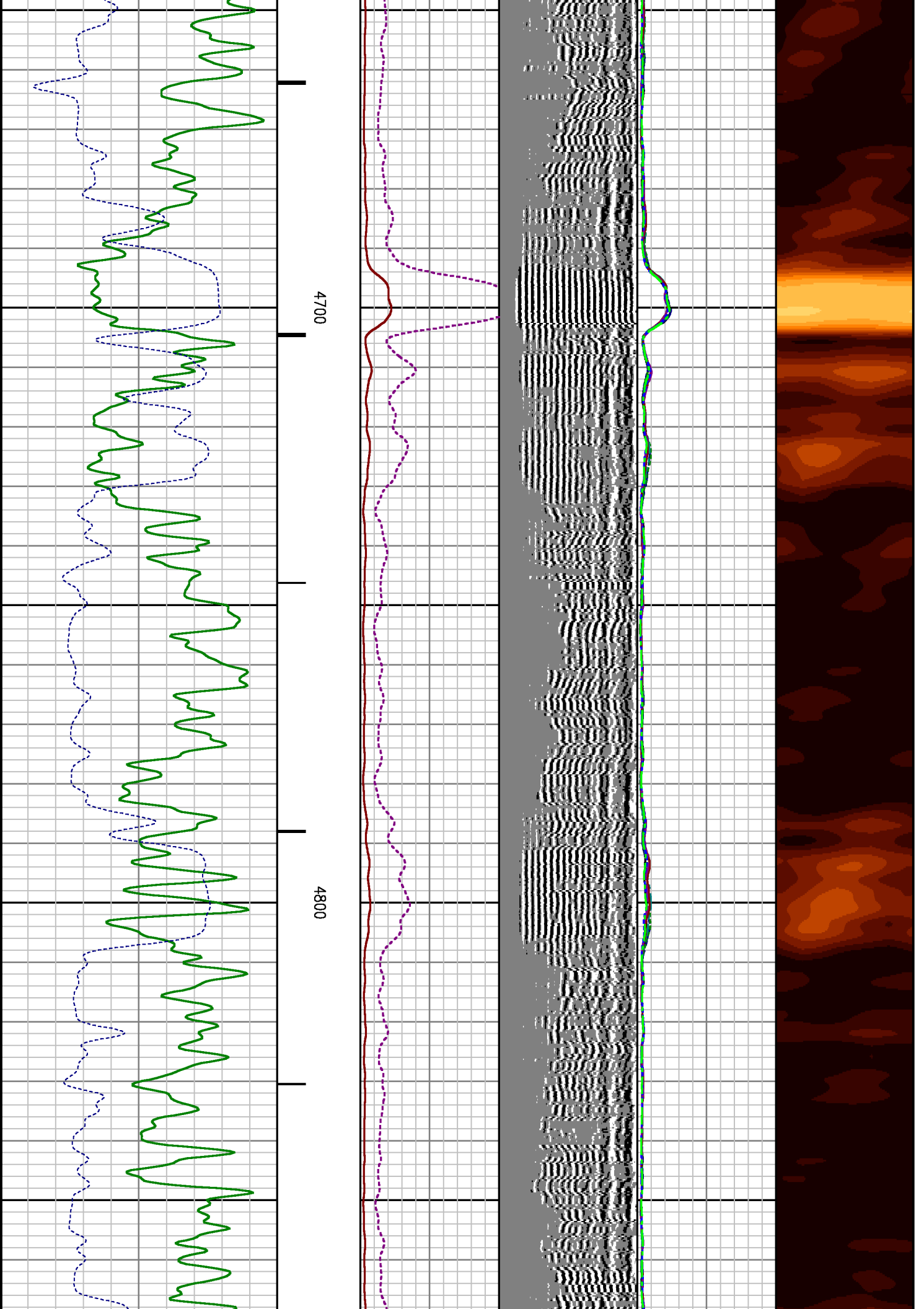


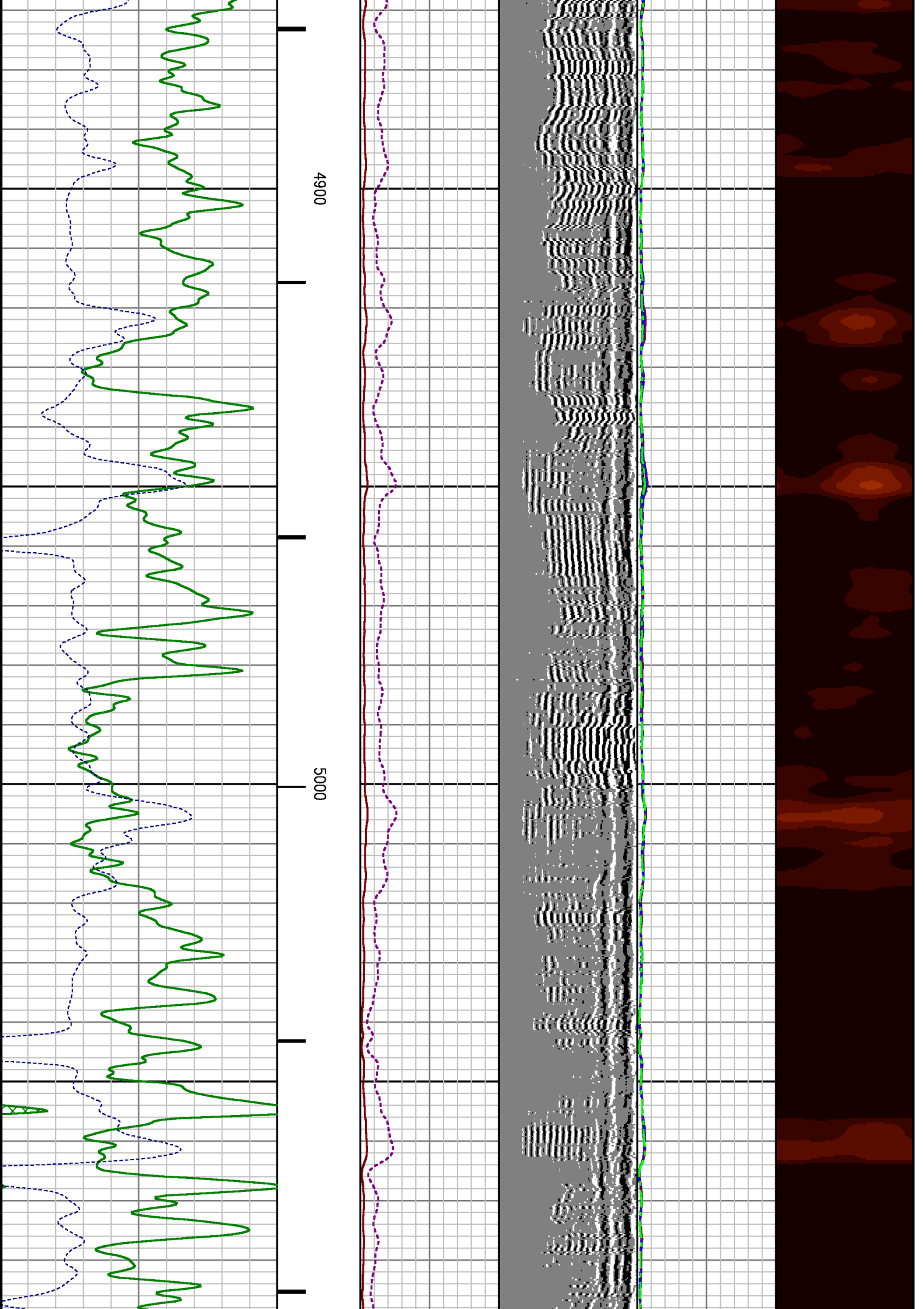


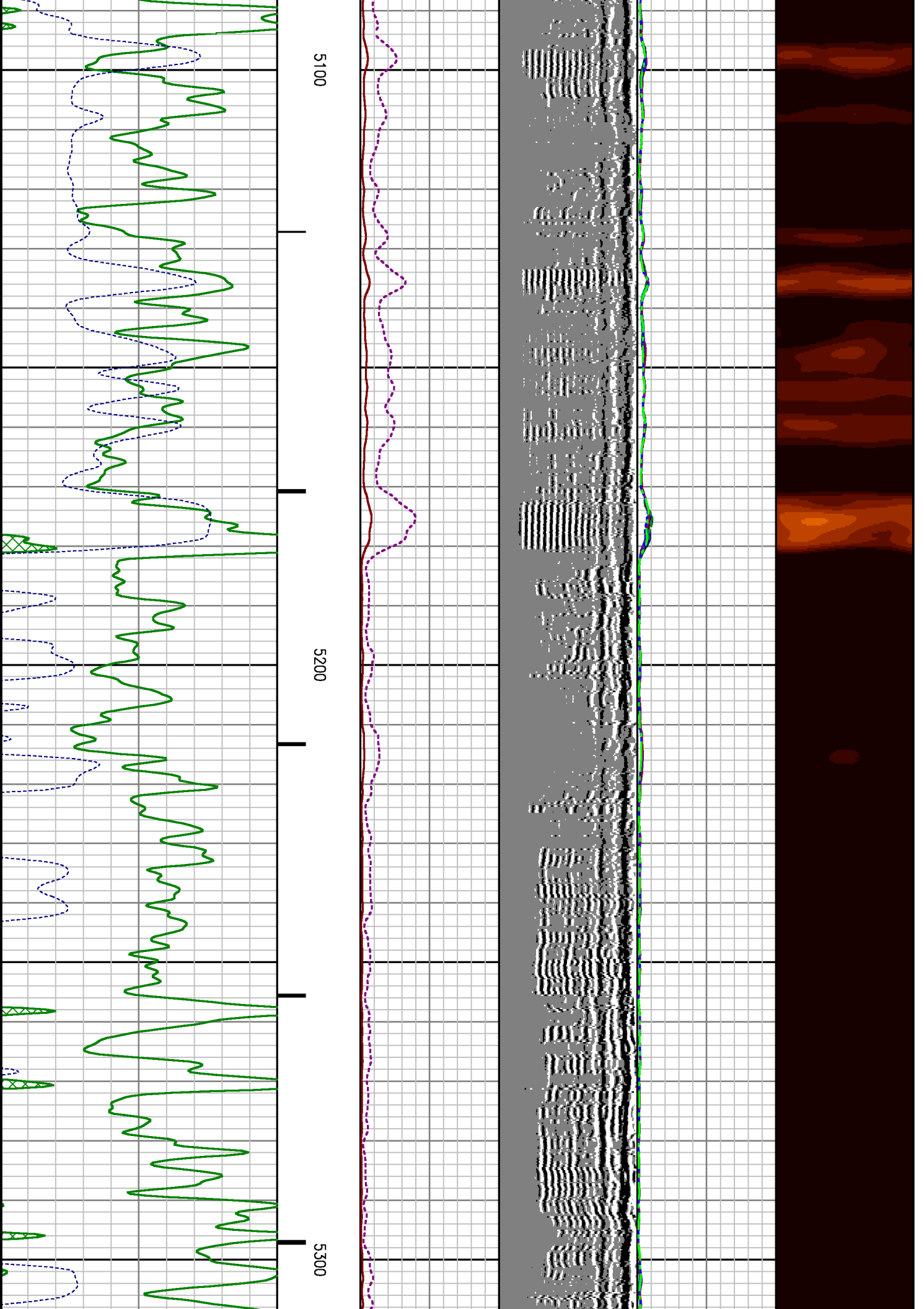


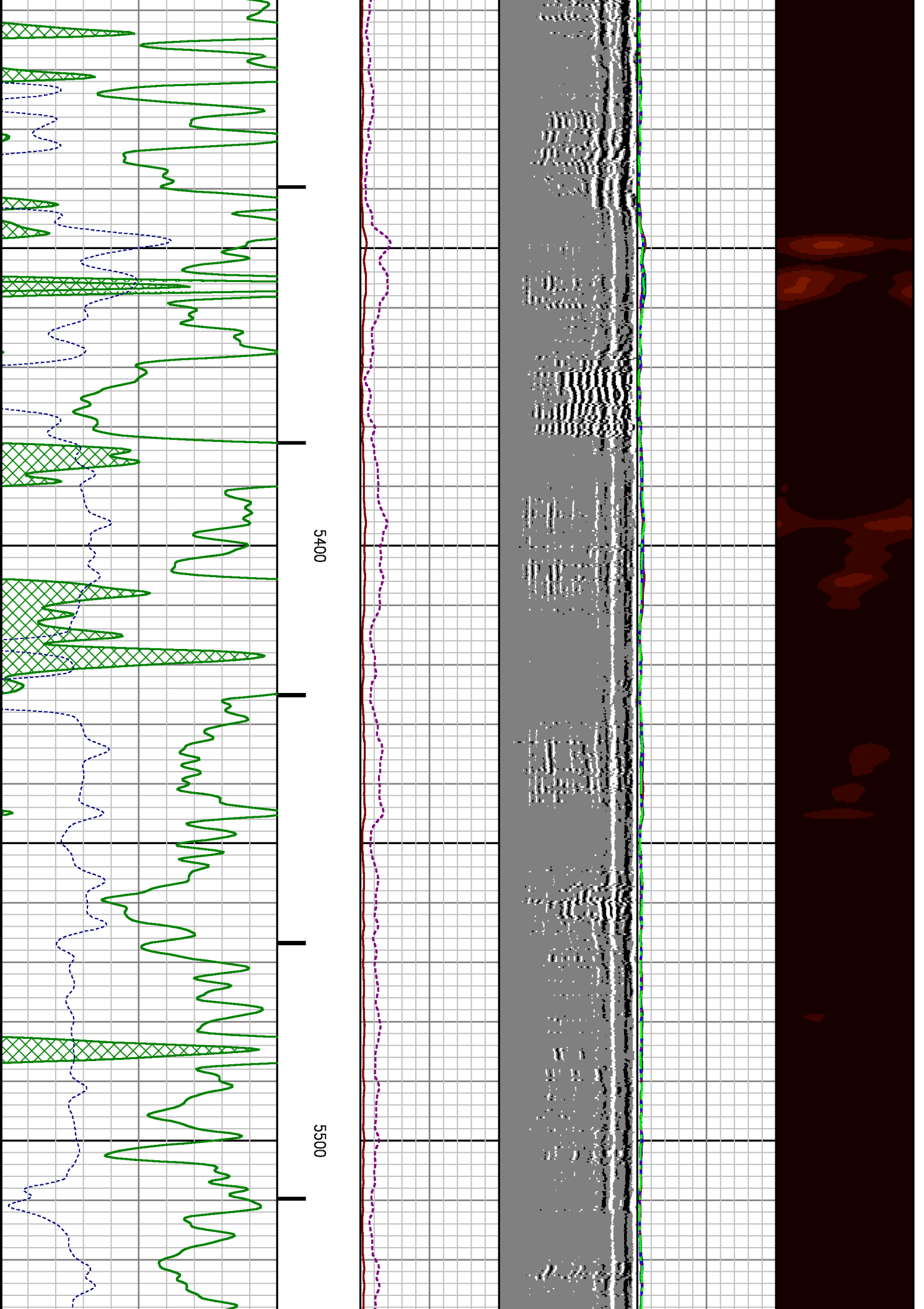


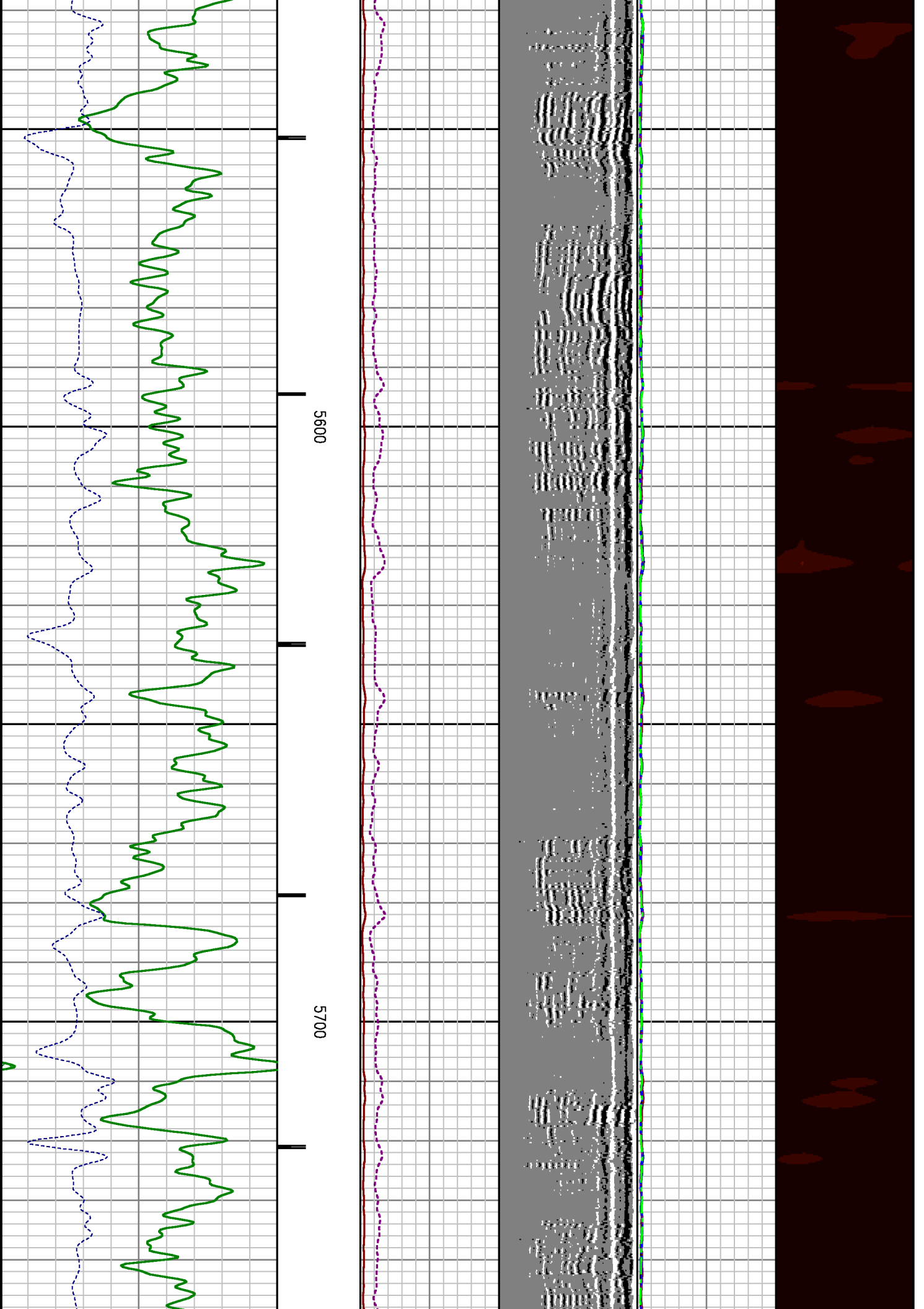


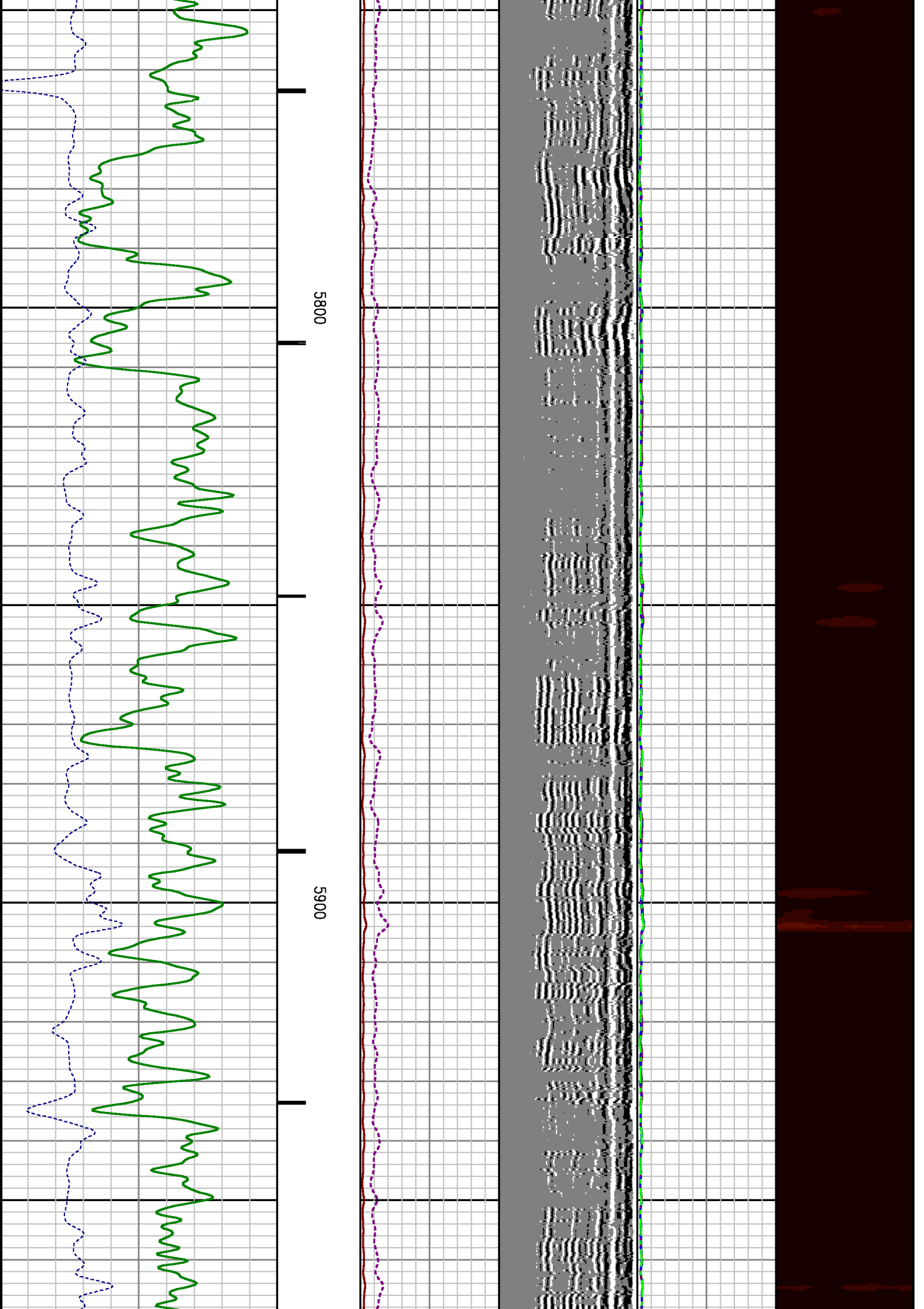


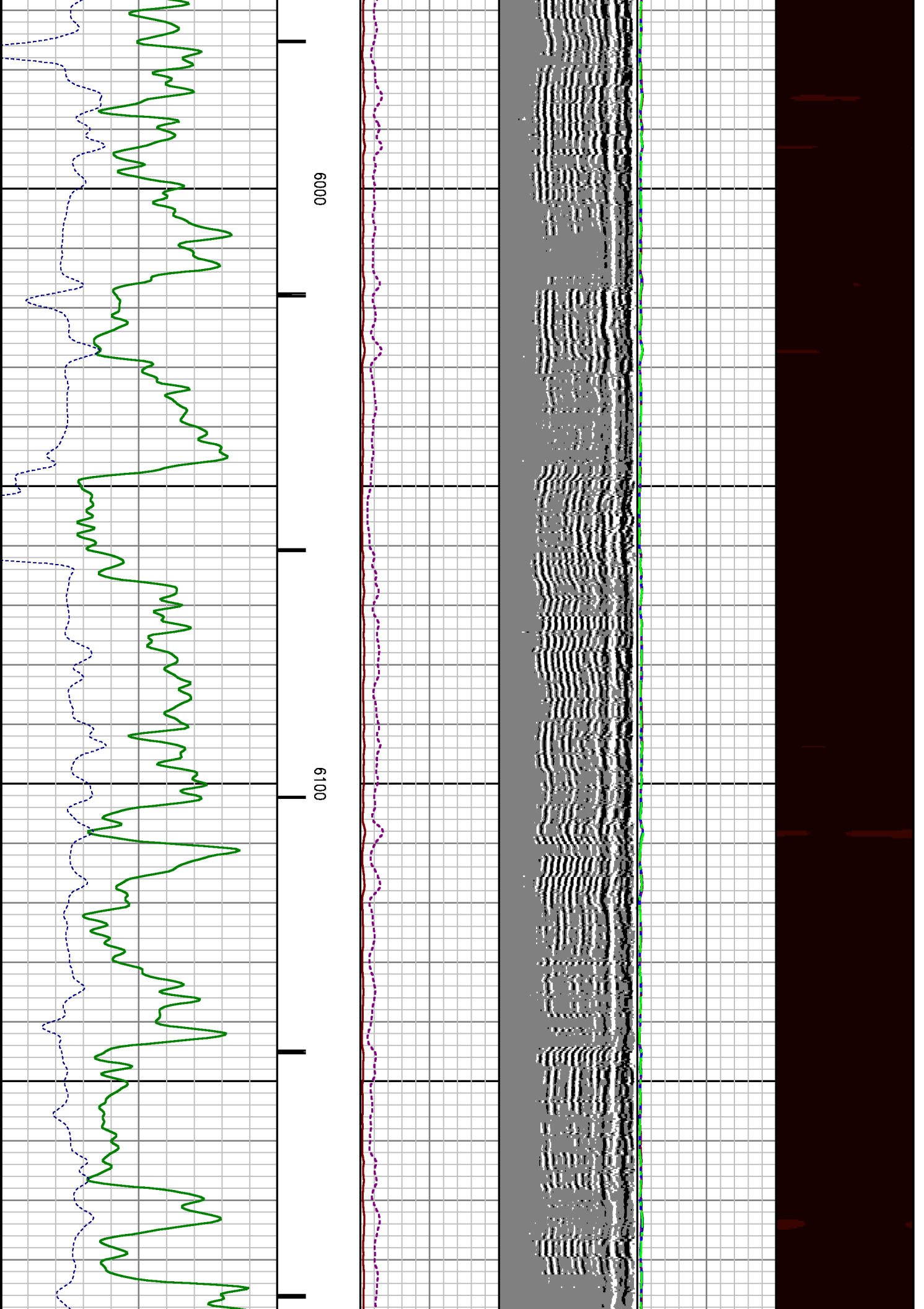


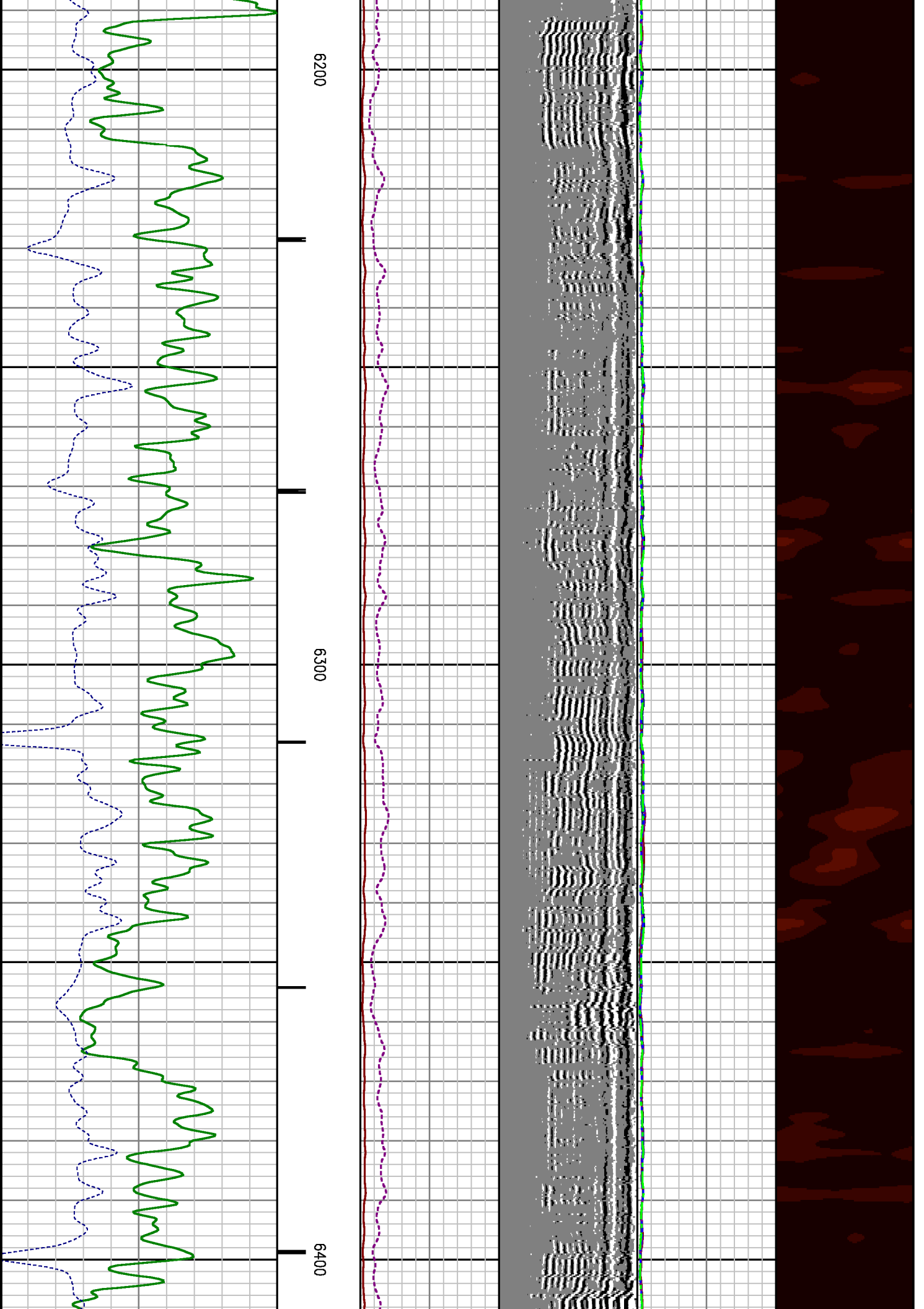


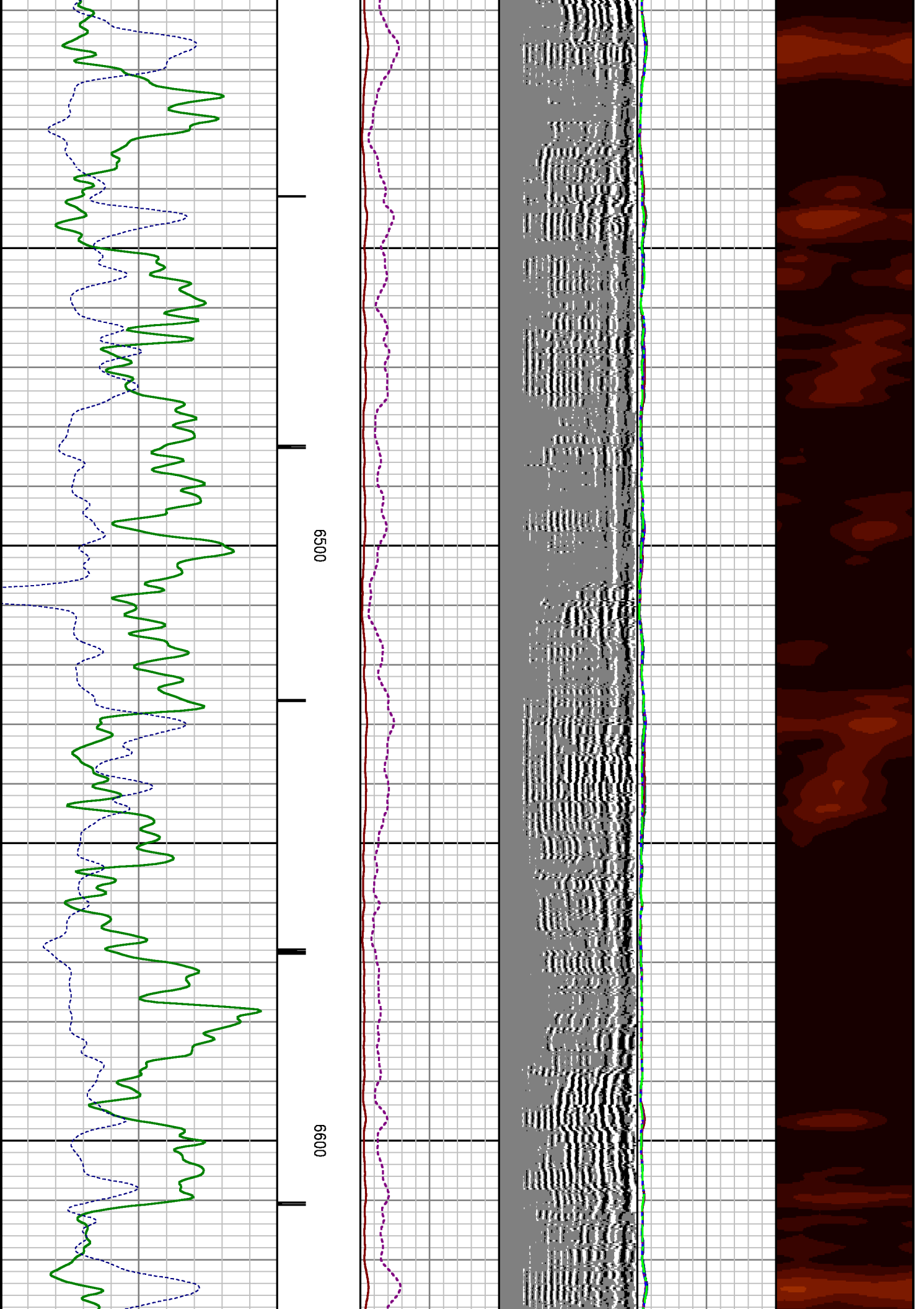


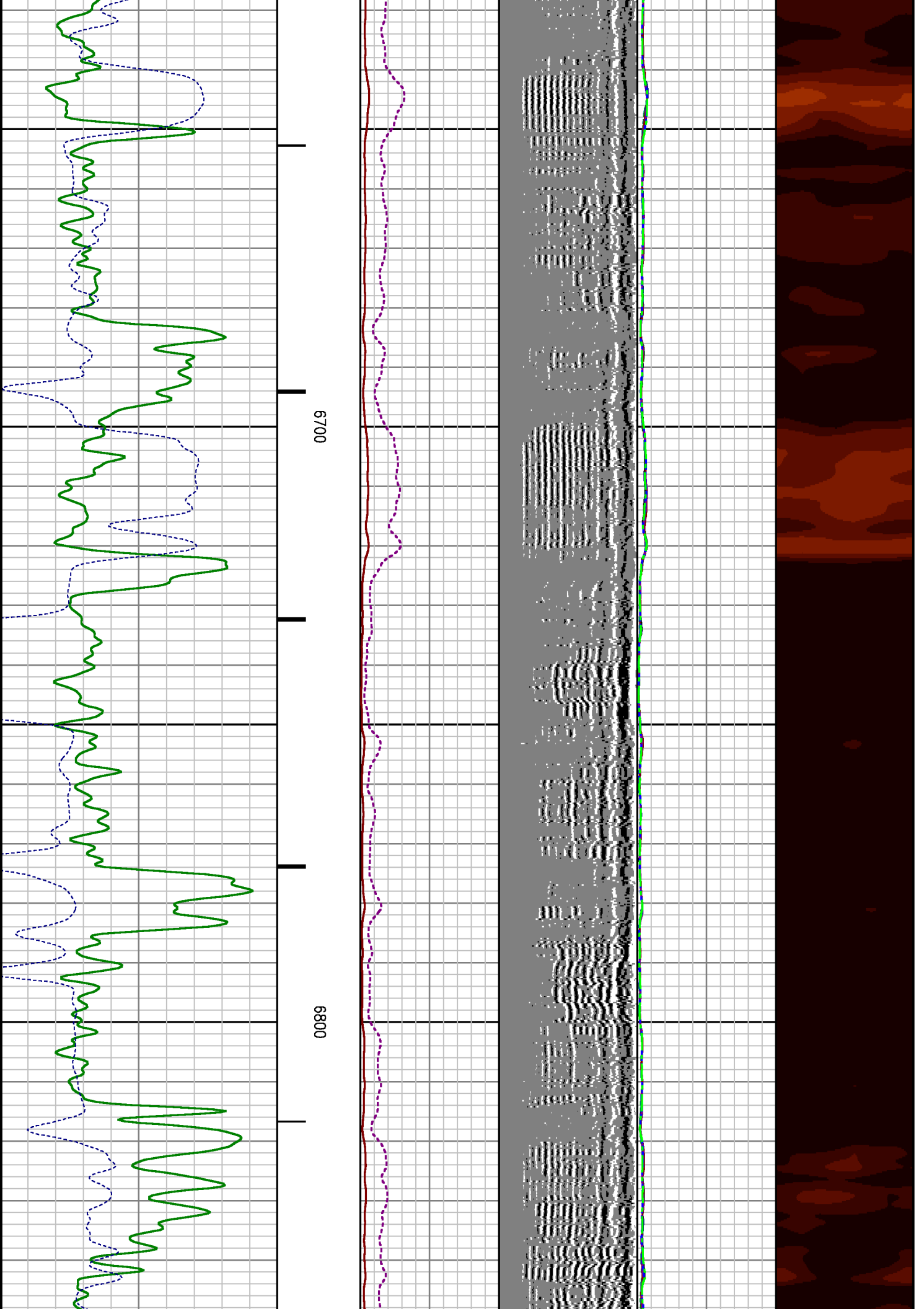


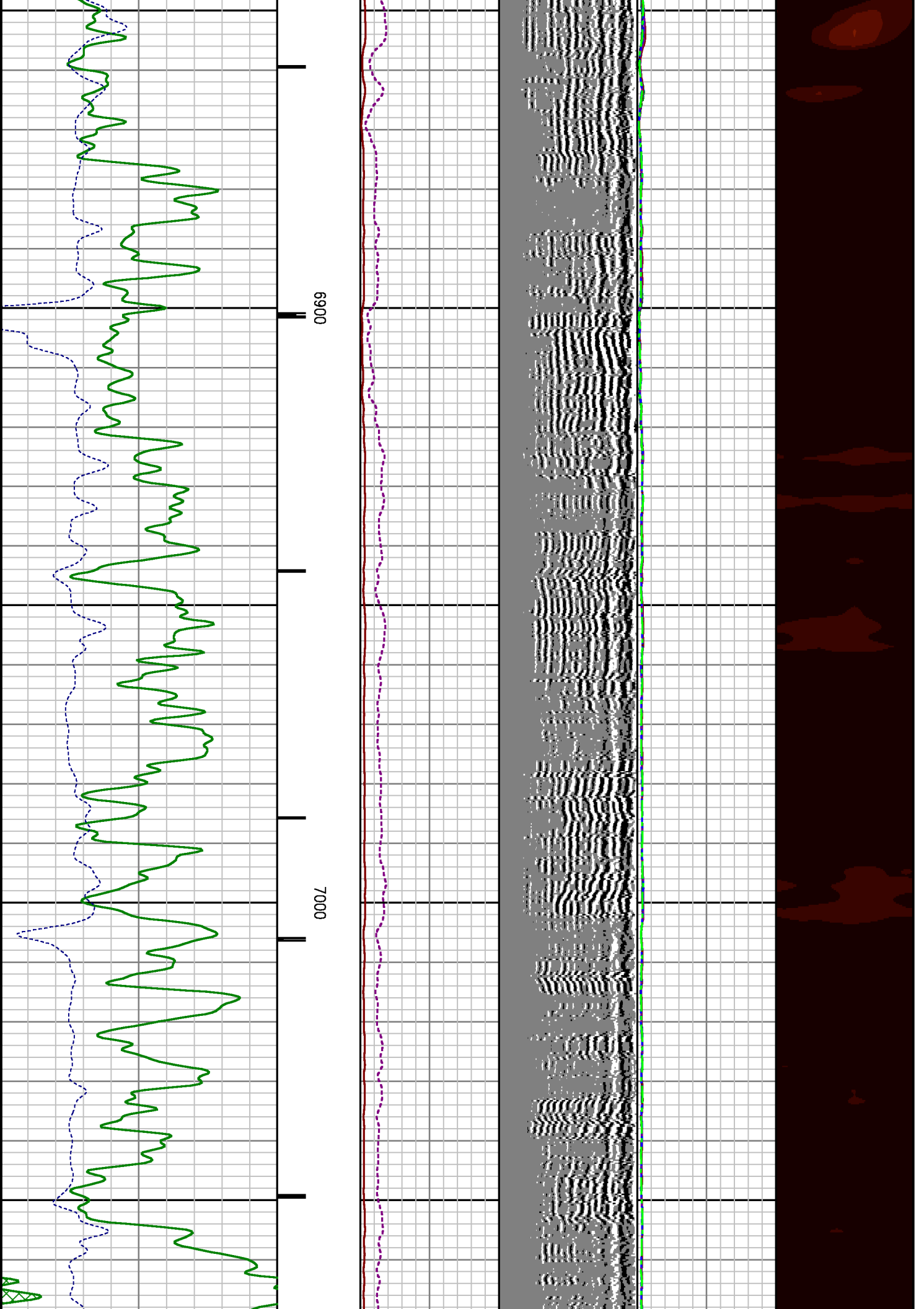


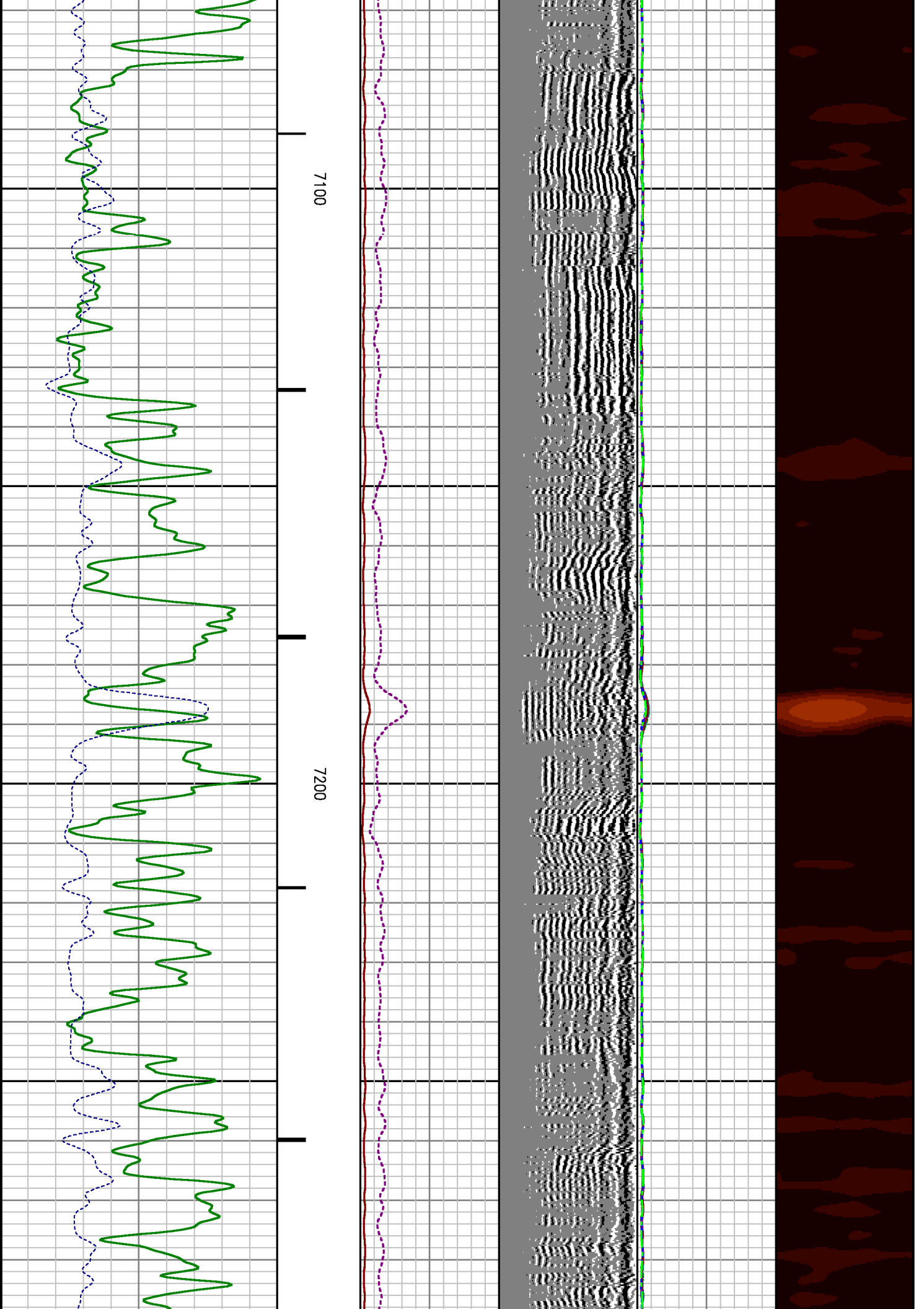


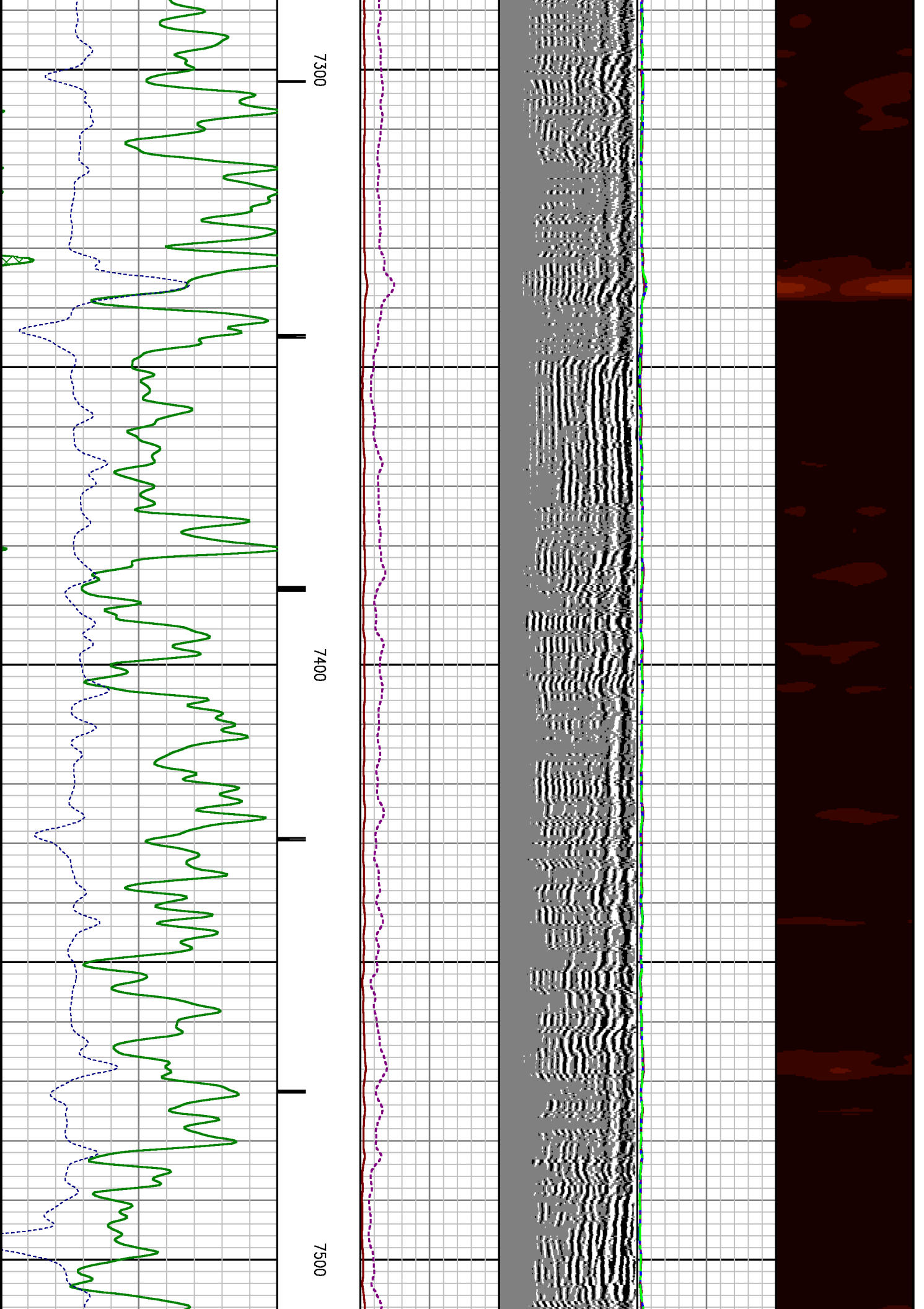


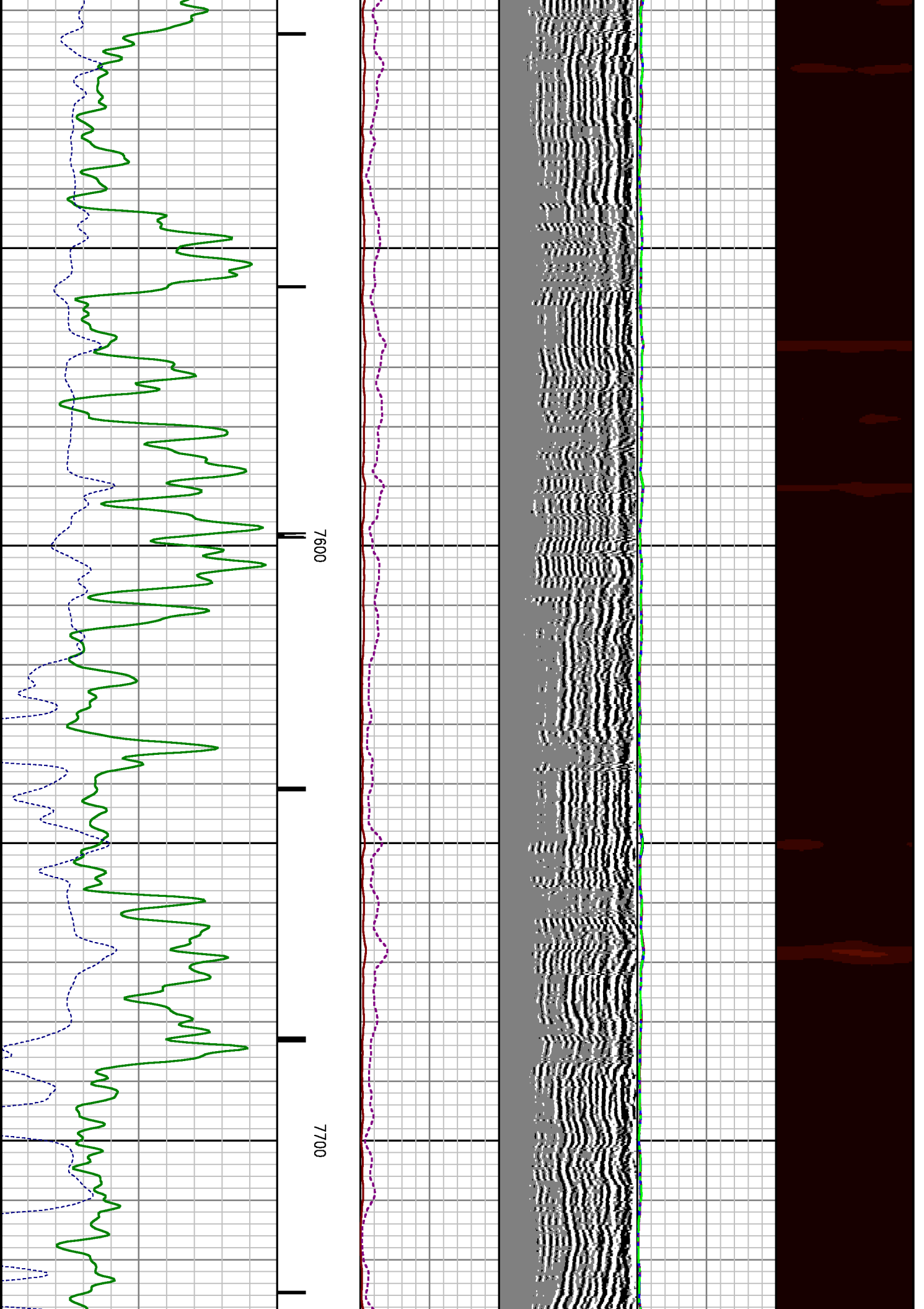


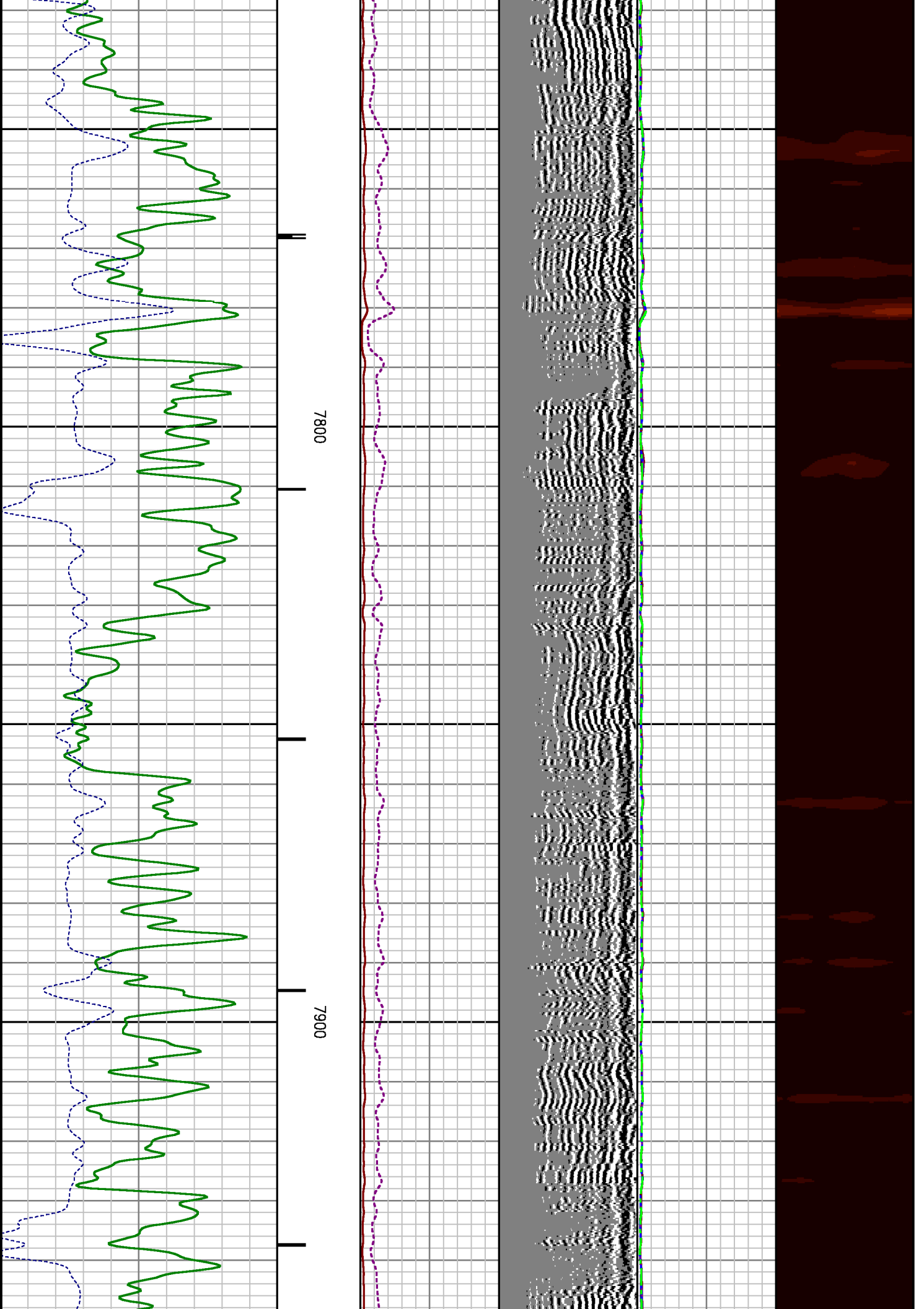


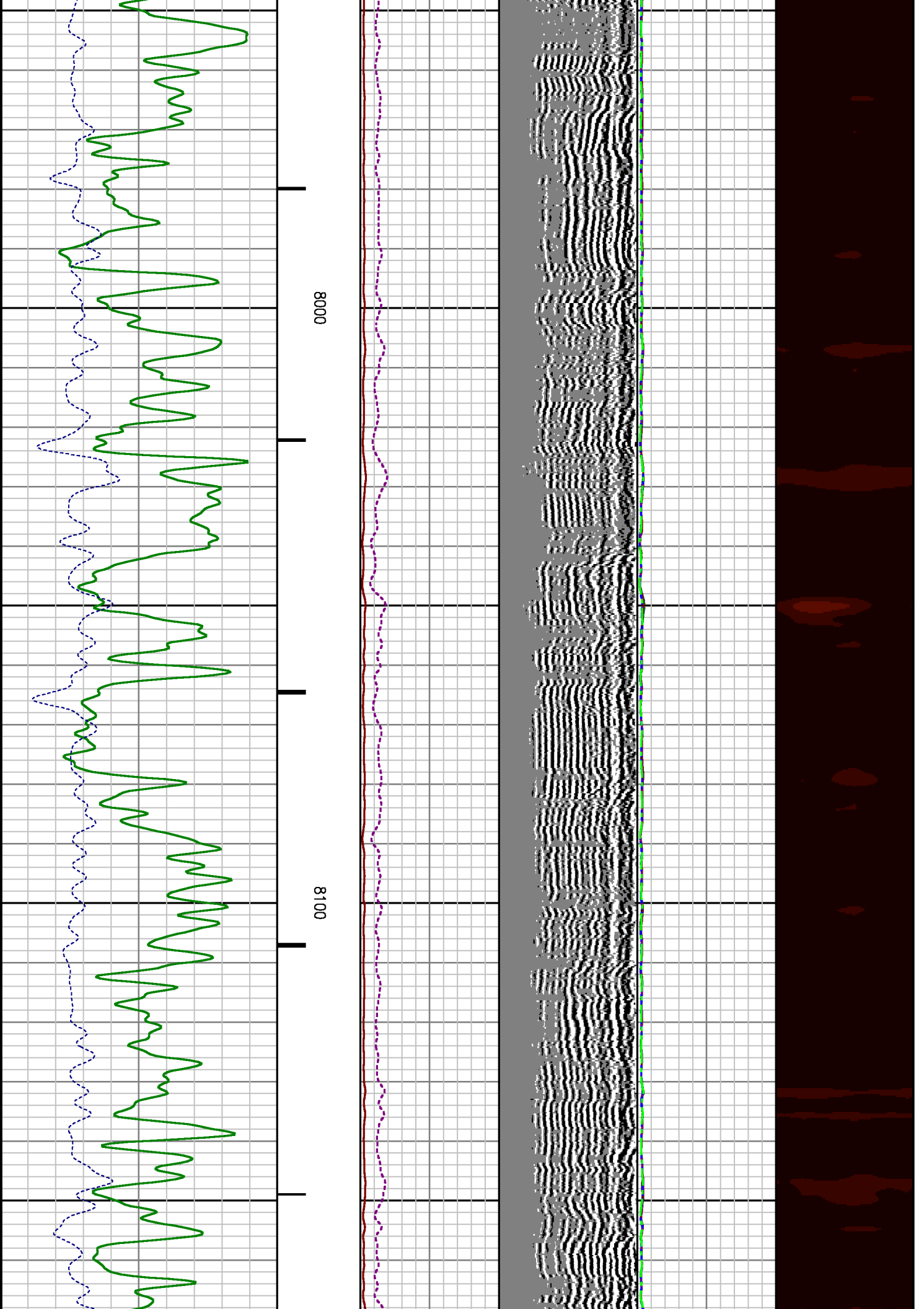


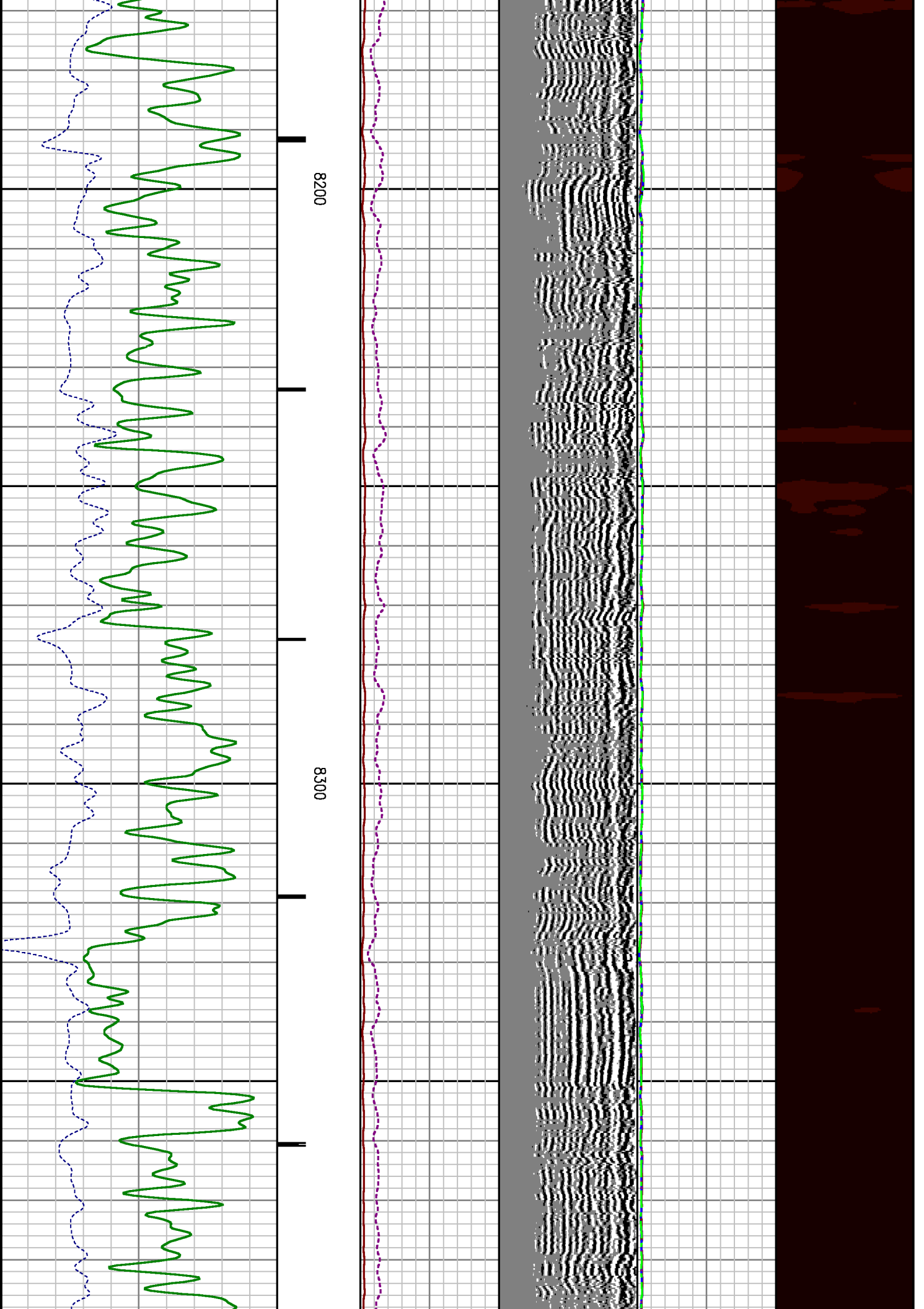


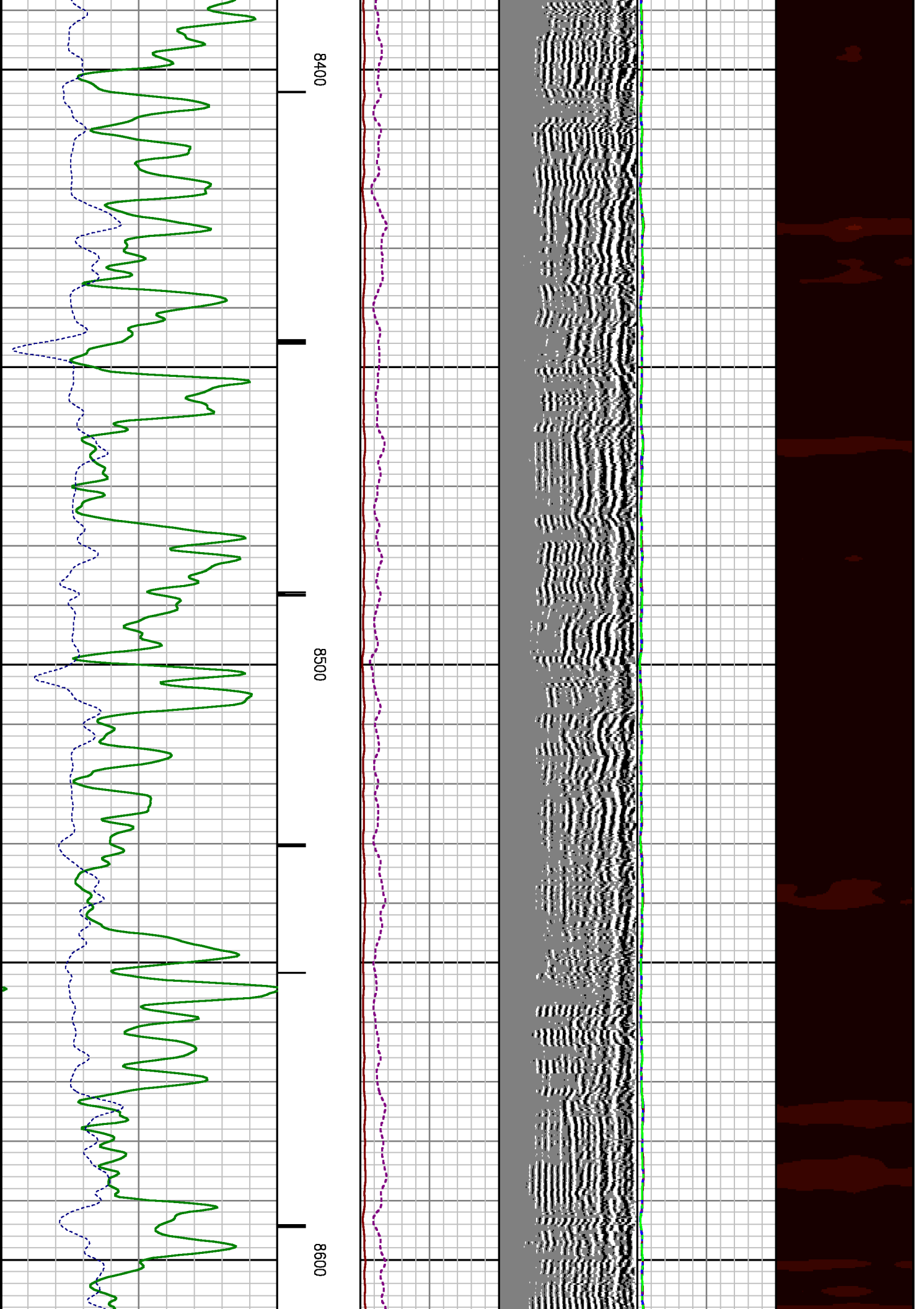


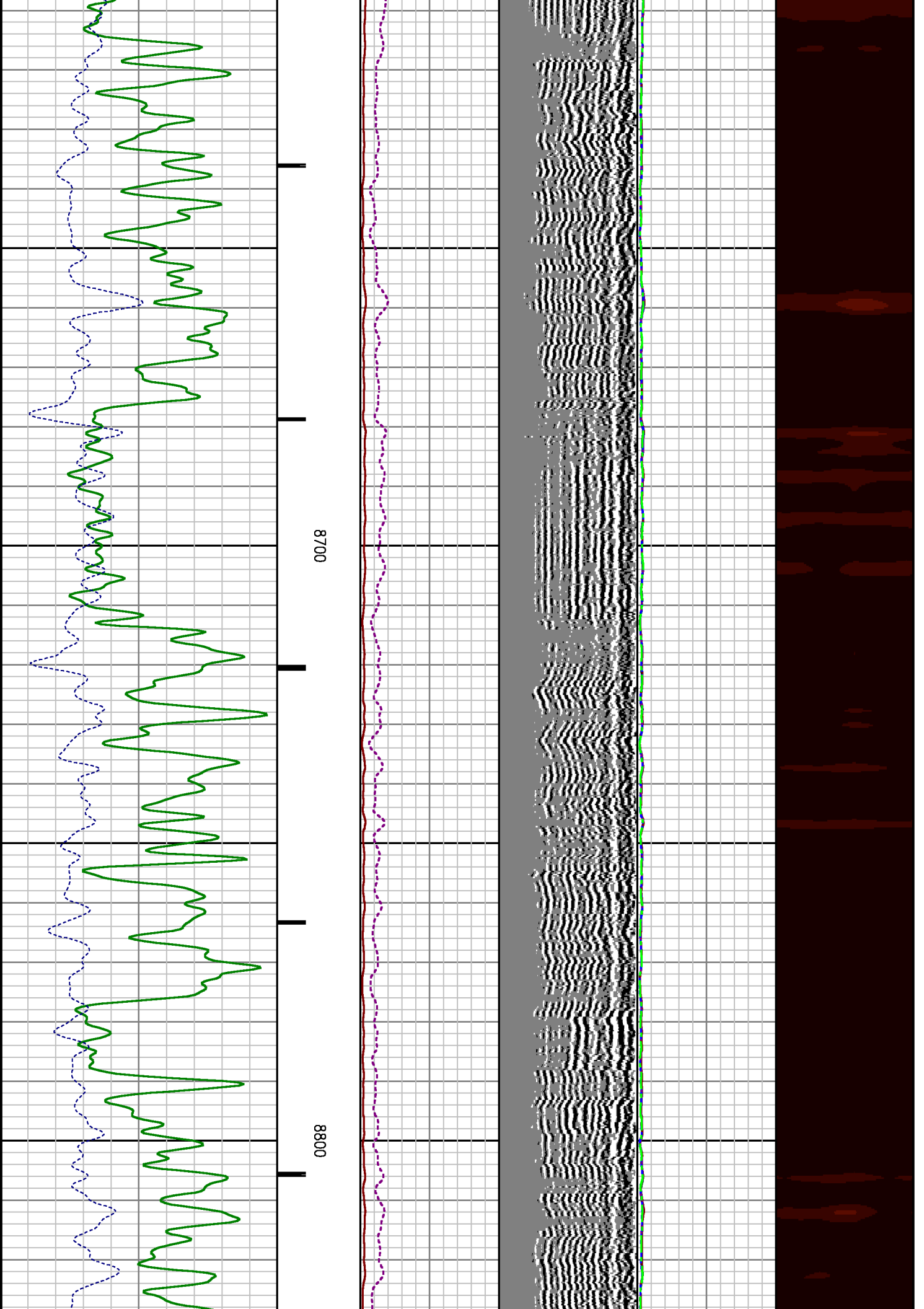


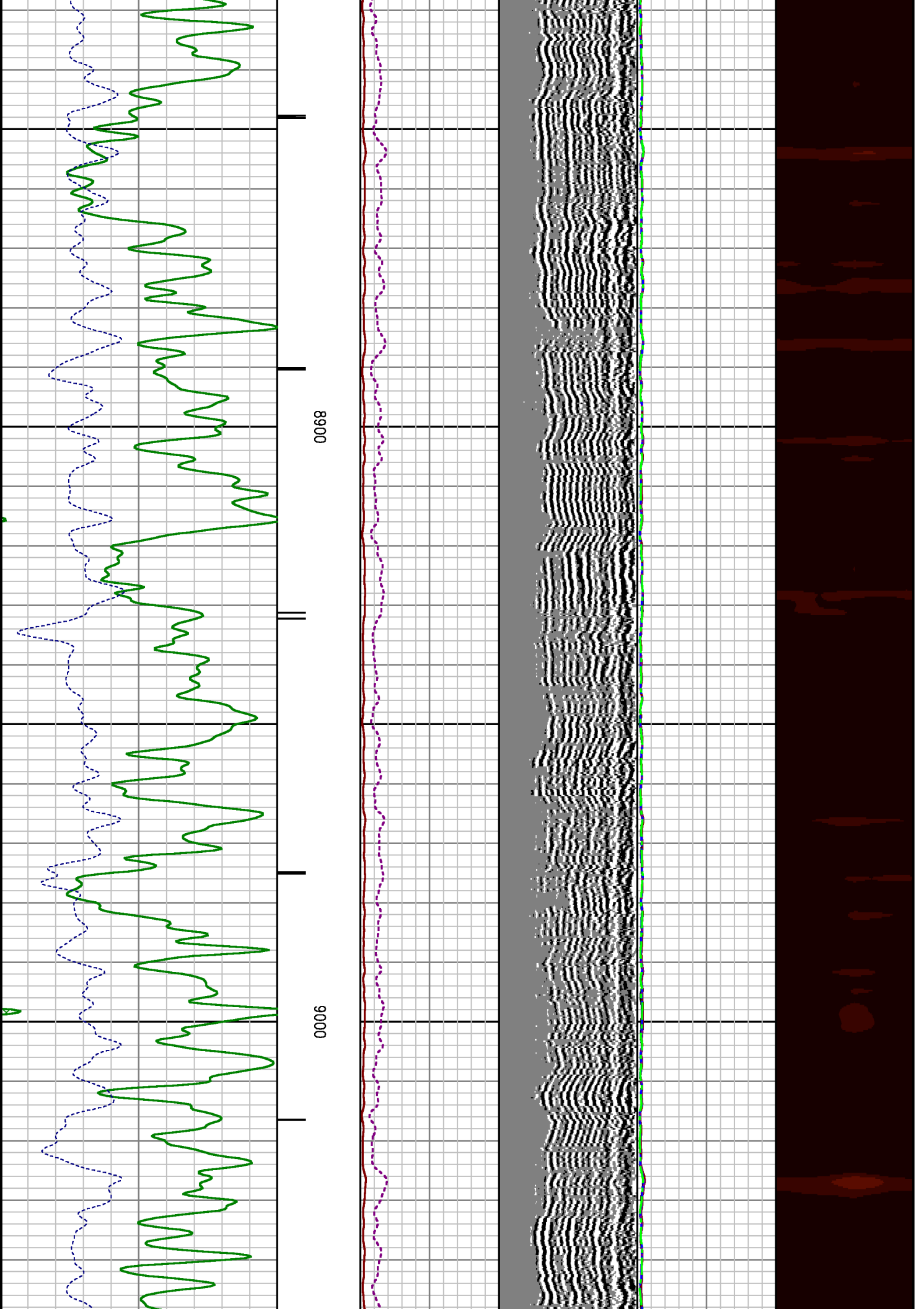


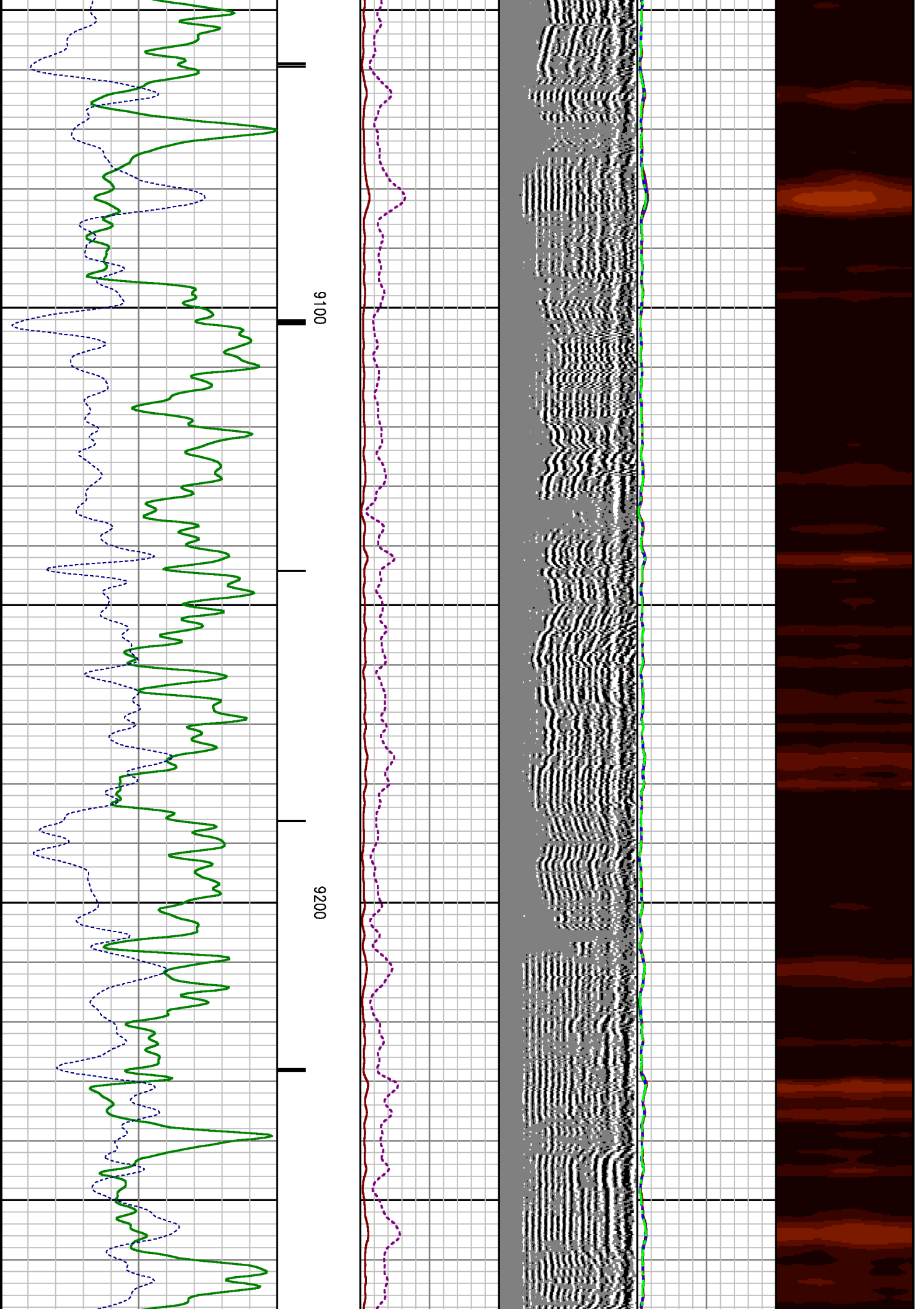


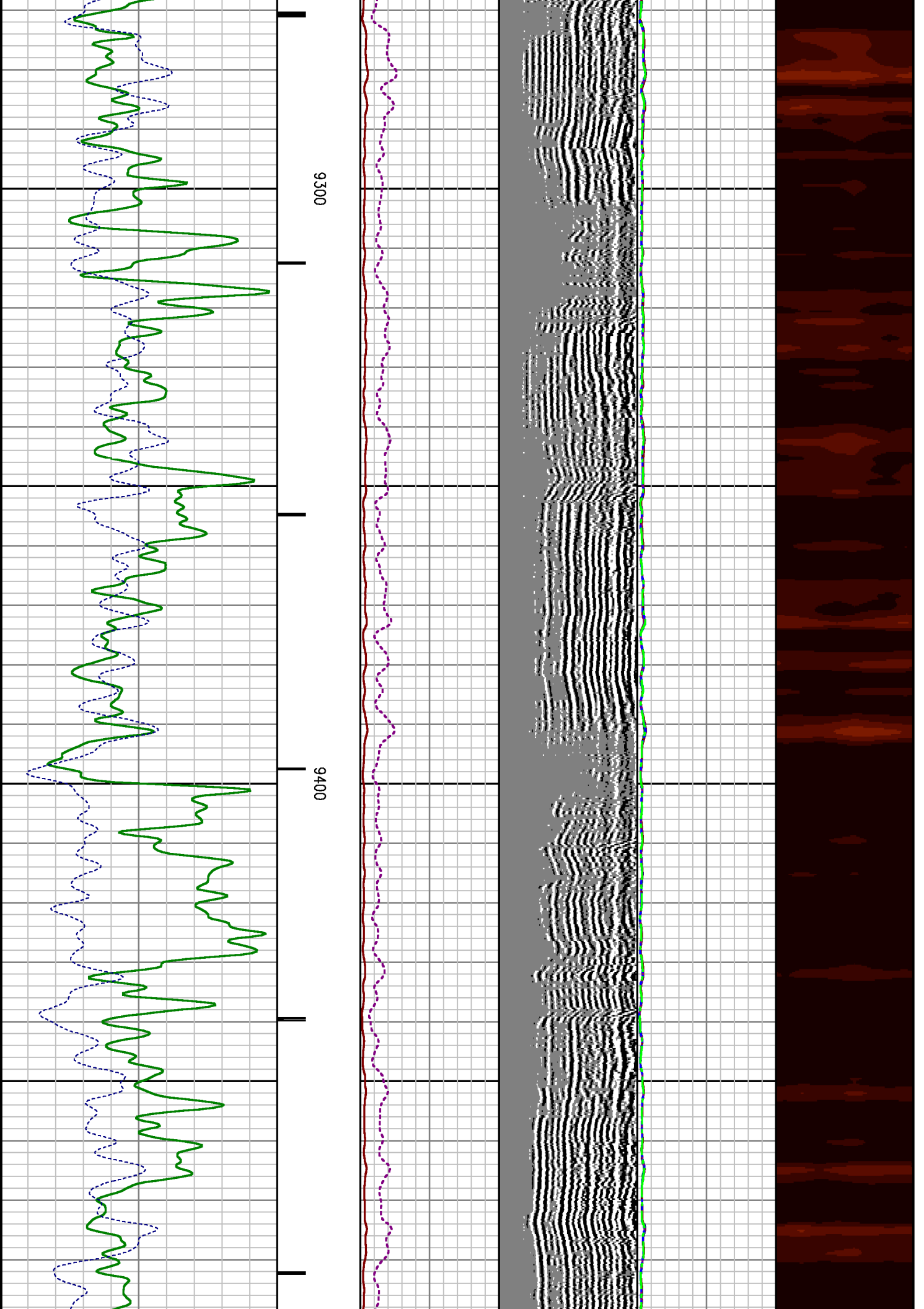


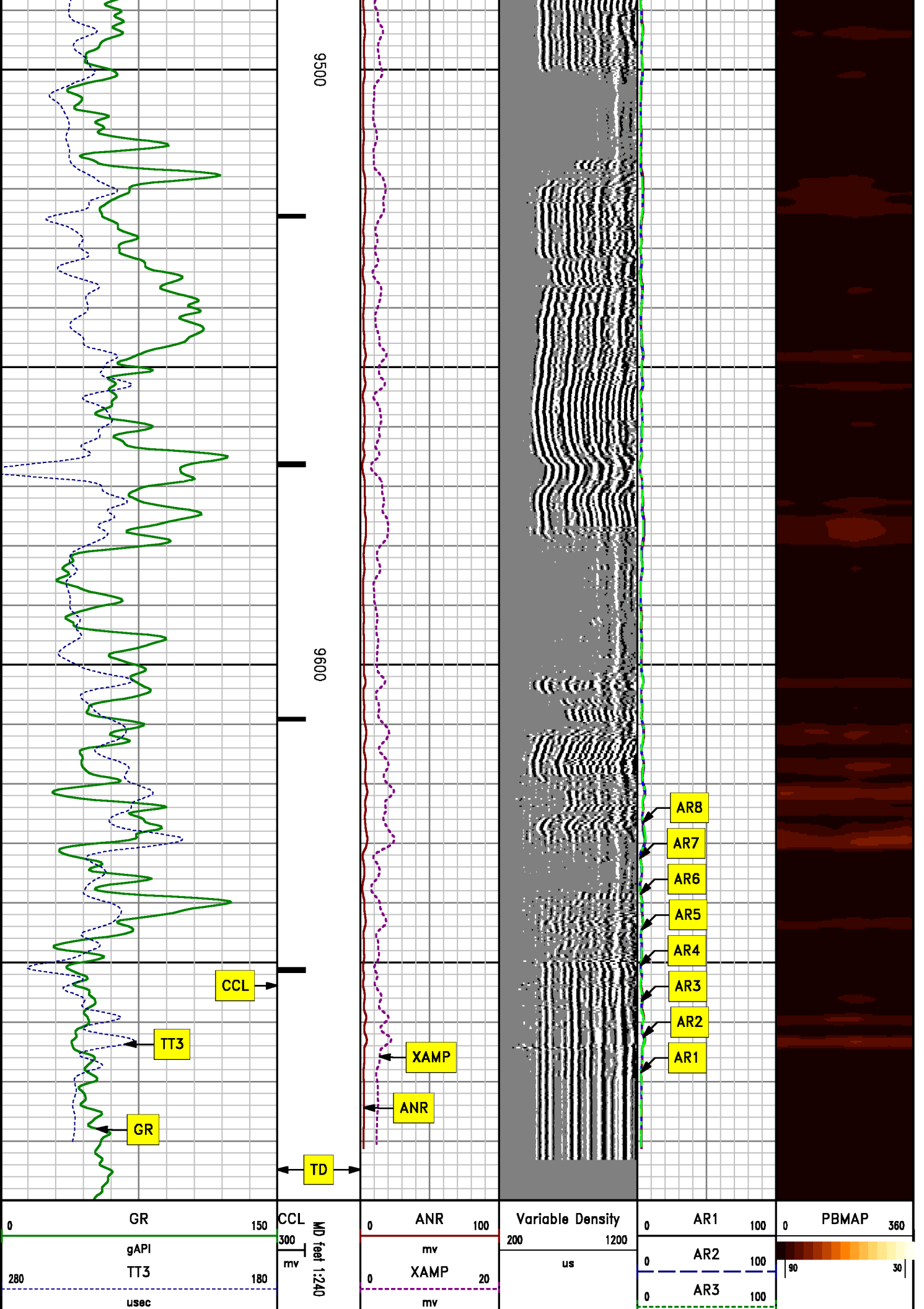












0	AR4	100
0	AR5	100
0	AR6	100
0	AR7	100
0	AR8	100

REPEAT SECTION
0 psi

MEASUREMENT TYPE	PARAMETER	VALUE	UNITS	TOP	BOTTOM
RAL	Amp Gate Start Far	316.900	usec	9477.750	9701.000
RAL	Amp Gate Start Near	200.391	usec	9477.750	9701.000
RAL	Amp Gate Start Radial	200.391	usec	9477.750	9701.000
RAL	Amp Gate Width Far	30.000	usec	9477.750	9701.000
RAL	Amp Gate Width Near	30.000	usec	9477.750	9701.000
RAL	Amp Gate Width Radial	30.000	usec	9477.750	9701.000
RAL	casing od	4.500	inches	9477.750	9701.000
RAL	casing wt	11.600	lbm/ft	9477.750	9701.000
RAL	FB Start Far	291.900	usec	9477.750	9701.000
RAL	FB Start Near	175.391	usec	9477.750	9701.000
RAL	FB Start Radial	175.391	usec	9477.750	9701.000
RAL	FB Thresh Far	10.000	mv	9477.750	9701.000
RAL	FB Thresh Near	4.000	mv	9477.750	9701.000
RAL	FB Thresh Radial	4.000	mv	9477.750	9701.000
RAL	Fluid Travel Time	200.000	usec/ft	9477.750	9700.843

DEPTH OFFSETS

SERIES	DEPTH OFFSET	ACQUIRED CURVES					
1426XA	-15.360	ACAL	ANR	AR1	AR2	AR3	AR4
		AR5	AR6	AR7	AR8	CHV	FPR2
		FPR3	FPR5	TT3	TTR1	TTR2	TTR3

			TTR4	TTR5	TTR6	TTR7	TTR8	XAMP
1426XA	-14.360	AFAR	SIG	TT5				
2459XA	-7.250	CCL						
2459XA	-5.390	GR						
2459XA	0.000	NEU						

Created by : RAL, v4.8.008

Plotted by : PlotMgr, v5.4.504

Company : MARATHON OIL COMPANY

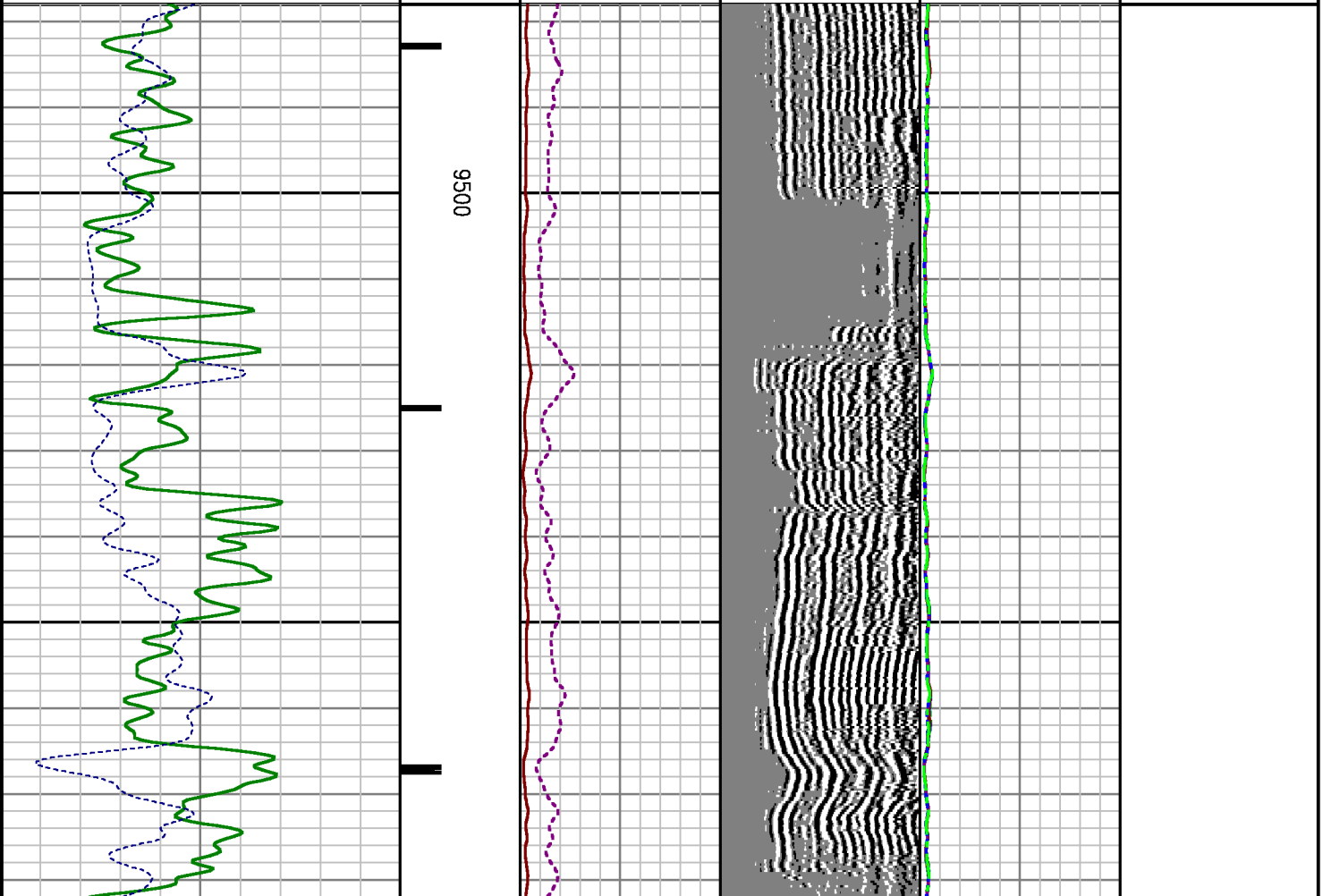
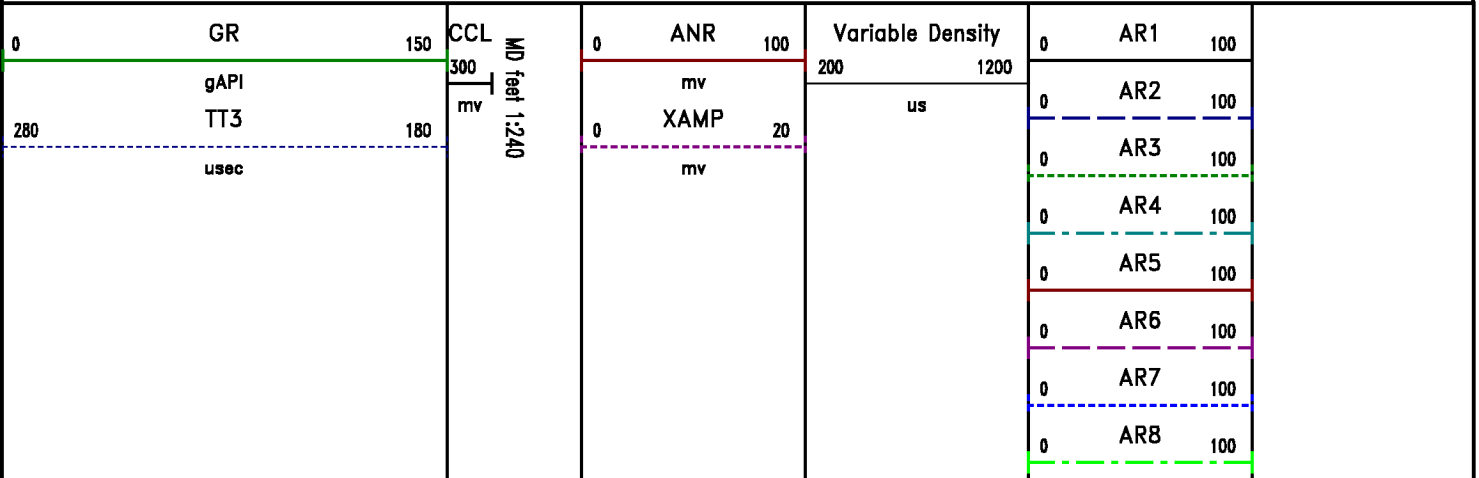
Well : 596-29C-12

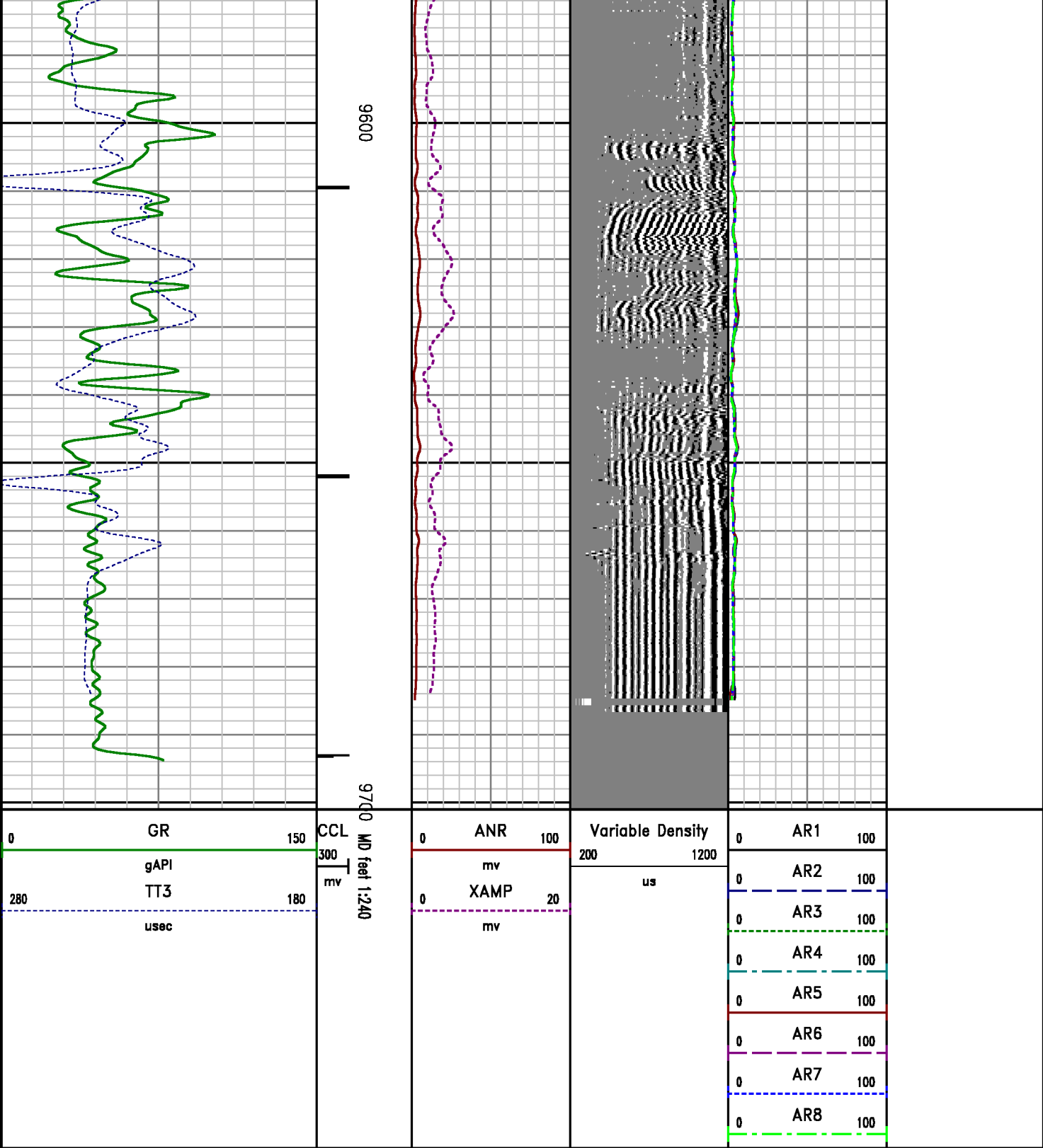
File Name : d:\welldata\radc12\repeat.xtf

Mode : PlotMgr 5.4.504

Interval : 9478.00 - 9701.00 feet UP

Created : 1/6/2010 7:00:21 AM





CALIBRATION SUMMARY

RALSHP

Shop Calibration: C:\case\calver\RALSHP\495JA5_shp.cal

SHOP CALIBRATION SUMMARY

DATE/TIME PERFORMED: Wed Jan 06 00:57:37 2010 TOOL SERIES: 1426XA ASSET: 495 SEQ: JA5

Tool Delay [usec]	-56.00	Tank OD In	5.50	Tank Wt lbm/ft	15.50	Tank ID In	4.95	
RECEIVER	Travel Time [usec]	Amp. Gate Start [usec]	Amp. Gate Width [usec]	Zero Gate Start [usec]	Zero Gate Width [usec]	Zero Amp. [mV]	Amp Ref. [mV]	Shop Factor
CAL Pulse	218	216	30	149	25	-0.313	100.00	0.13
3 Ft. Receiver	218	216	30	153	25	-0.192	100.00	0.13
5 Ft. Receiver	328	326	30	242	25	0.620	150.00	0.14
Radial #1	219	216	30	157	25	0.521	100.00	0.13
Radial #2	219	216	30	157	25	0.012	100.00	0.13
Radial #3	218	216	30	157	25	-0.278	100.00	0.13
Radial #4	218	216	30	157	25	-0.303	100.00	0.13
Radial #5	218	216	30	157	25	-0.351	100.00	0.13
Radial #6	218	216	30	157	25	-0.440	100.00	0.13
Radial #7	218	216	30	157	25	-0.418	100.00	0.13
Radial #8	219	216	30	157	25	-0.349	100.00	0.13

RALFLD

Wellsite Calibration: C:\case\calver\RALFLD\495JA5 fld.cal

WELLSITE CALIBRATION SUMMARY

DATE/TIME PERFORMED: Wed Jan 06 00:58:47 2010 TOOL SERIES: 1426XA ASSET: 495 SEQ: JA5

Tool Delay [usec]	-56.00	Casing OD In	4.50	Casing Wt lbm/ft	11.60	Casing ID In	4.00	
RECEIVER	Zero Gate Start [usec]	Zero Gate Width [usec]	Zero Amp. [mV]	Full Amp. [mV]	Wellsite Factor	Amp. Ref [mV]		
CAL Pulse	149	25	0.025	0.000	1.00	100.000		
3 Ft. Receiver	200	30	0.571					
5 Ft. Receiver	317	30	0.831					
Radial #1	200	30	0.264					
Radial #2	200	30	0.166					
Radial #3	200	30	0.304					
Radial #4	200	30	0.345					
Radial #5	200	30	-0.040					
Radial #6	200	30	-0.046					
Radial #7	200	30	0.164					
Radial #8	200	30	0.115					

GAMMA RAY

Calibration File: C:\case\calver\GR\503JA.cal

CALIBRATION SUMMARY

DATE/TIME PERFORMED:	Sat Jan 02 22:10:46 2010	TOOL SERIES:	2459XA	ASSET:	503	SEQ:	JA
Calibrator #	Background [cps]	Calibrator On [cps]	Multiplicative	Background [api]	Calibrator On [api]	Differential [api]	
BA 856	42.27	210.49	1.100	46.48	231.48	185.00	

Verification File: C:\case\calver\GR\503JA.VP

PRIMARY LOG VERIFICATION

DATE/TIME PERFORMED:	Sat Jan 02 22:12:58 2010	TOOL SERIES:	2459XA	ASSET:	503	SEQ:	JA
Calibrator #	Background [cps]	Calibrator On [cps]	Multiplicative	Background [api]	Calibrator On [api]	Differential [api]	
BA 856	42.27	215.11	1.100	46.48	236.57	190.08	

TOOL DIAGRAM

OTA SHORT CABLE HEAD

CENTRALIZER

Series	RALCENT
Mnemonic	CENT
Diameter	3.12"
Weight	20.00 lb

PROBE 2 3/4 DUAL RECEIVER RADII

Series	1426XA
Mnemonic	PROB
Diameter	2.75"
Length	11.17'
Measure Point	0.75' FAR RCVR
Measure Point	2.67' NEAR RCVR
Measure Point	5.75' XMIT
Temp Rating	350.00 °F
Press Rating	18000.00 PSI

CENTRALIZER

Series	RALCENT
Mnemonic	CENT
Diameter	3.12"
Weight	20.00 lb



30.09'

XMIT 21.02'

NEAR RCVR 17.94'

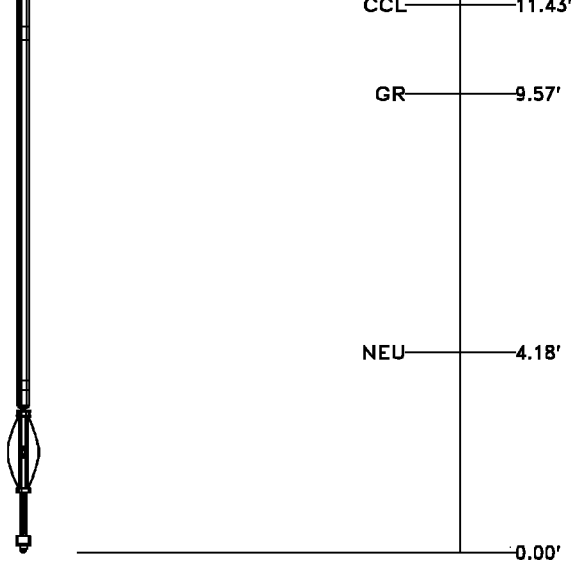
FAR RCVR 16.02'



11.17'

<i>Probe GR/CCL/NEU</i>	
Series	2459XA
Mnemonic	PROB
Diameter	2.75"
Length	9.42'
Measure Point	1.21' NEU
Measure Point	6.60' GR
Measure Point	8.46' CCL

<i>CENTRALIZER</i>	
Series	RALCENT
Mnemonic	CENT
Diameter	3.12"
Weight	20.00 lb

Total Length: 30.09'
 Total Weight: Not Available
 Max Diameter: 0' 3.12"



 Baker Atlas 	Company <u>MARATHON OIL COMPANY</u>		File No: <u>1549</u>	
	Well <u>596-29C-12</u>		API No: <u>05-045-18090-00</u>	
	Field <u>GRAND VALLEY</u>			
	County <u>GARFIELD</u>	State <u>COLORADO</u>		
Location SHL: 1761' FSL & 1388' FWL		Elevations KB 8204 ft DF 8203 ft GL 8180 ft		
SEC 29 TWP 5S RGE 96W				