



PIONEER
Pioneer Energy Services

**BOREHOLE COMPENSATED
SONIC LOG**

Company LANDMARK RESOURCES, INC.
Well GERSTBERGER UNIT #1-20
Field WILDCAT
County WICHITA
State KANSAS

Company LANDMARK RESOURCES, INC.
Well GERSTBERGER UNIT #1-20
Field WILDCAT
County WICHITA State KANSAS

Location: API #: 15-203-20355-00-00

Other Services

SEC 20 TWP 17S RGE 36W
246' FNL & 215' FEL

CNL/CDL
DIL/MEL

Permanent Datum GROUND LEVEL Elevation 3220'
Log Measured From KELLY BUSHING
Drilling Measured From KELLY BUSHING

Elevation
K.B. 3231'
D.F. N/A
G.L. 3220'

Date 3/29/2019

Run Number TWO

Type Log BHCS

Depth Driller 4795'

Depth Logger 4800'

Bottom Logged Interval 4788'

Top Logged Interval 280'

Type Fluid In Hole CHEMICAL

Salinity, PPM CL 7500

Density 9.1

Level FULL

Max. Rec. Temp. F 124

Operating Rig Time 5 HOURS

Equipment -- Location P-24 HAYS

Recorded By IAN MABB

Witnessed By TERRY MCLEOD

Borehole Record

Casing Record

Run No.	Bit	From	To	Size	Wgt.	From	To
ONE	12.25"	0'	296'	8.625"	23#	0'	296'
TWO	7.875"	296'	TD				

<<< Fold Here >>>

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.

LEOTI, KS.
2 MILES EAST TO RD 15,
NORTH 6 1/2 MILES,
WEST INTO

Log Measured From: KELLY BUSHING 11 Ft. Above Permanent Datum

THANK YOU FOR USING PIONEER ENERGY SERVICES
www.pioneerenergy.com 785-625-3858

Your Pioneer Energy Services Crew

Engineer: IAN MABB
Operator:
Operator:
Operator:

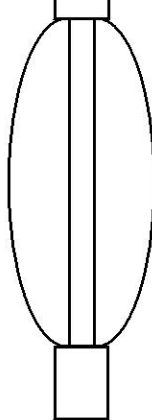
This Log Record Was Witnessed By

Primary Witness: TERRY MCLEOD
Secondary Witness:
Secondary Witness:
Secondary Witness:

Top - Bottom

A 1	BOREID in 7.875	BOTTEMP degF 100	CASEOD in 5.5	CASETHCK in 0	COMPACT 1	FLUIDDEN g/cc 1	M 2
MATRXDEN g/cc 2.71	NPORSEL Limestone	PERFS 0	SNDERR mmho/m 0	SNDERRM mmho/m 0	SPSHIFT mV 0	SRFTEMP degF 0	SVFLUID usec/ft 189
SVMATRIX usec/ft 47.6	SZCOR Off	TDEPTH ft 0					

Sensor	Offset (ft)	Schematic	Description	Length (ft)	O.D. (in)	Weight (lb)
WVF4 WVF1	13.50 13.50		SLT-PENGO (0001)	16.00	3.50	300.00
WVF3 WVF2	11.50 11.50					

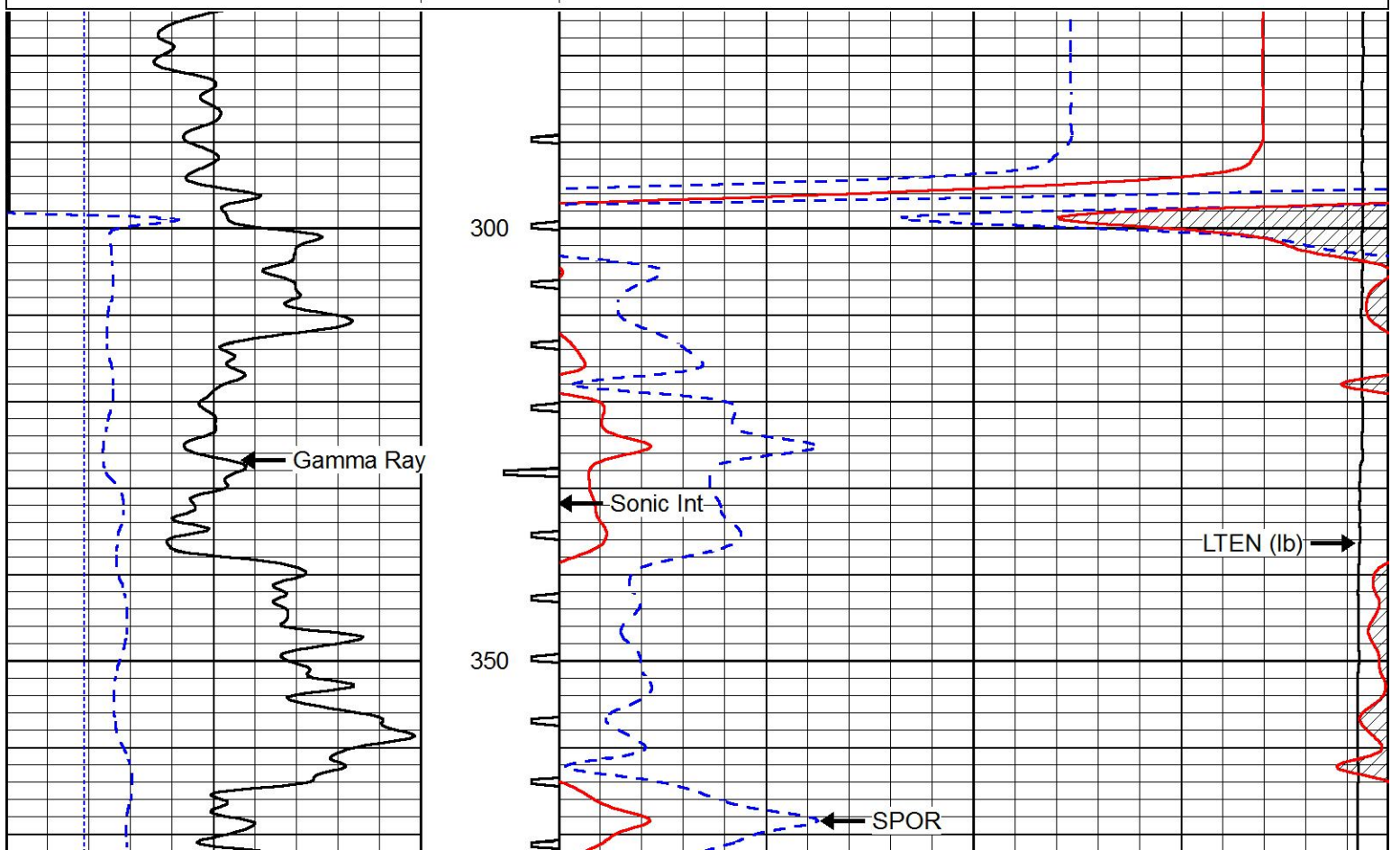
									
					CENT-PENGO (4-PENGO)		5.50	3.00	70.00
Dataset:		landmark_gerstberger_unit_1_20.db: field/well/SON/pass1							
Total length:		21.50 ft							
Total weight:		370.00 lb							
O.D.:		3.50 in							

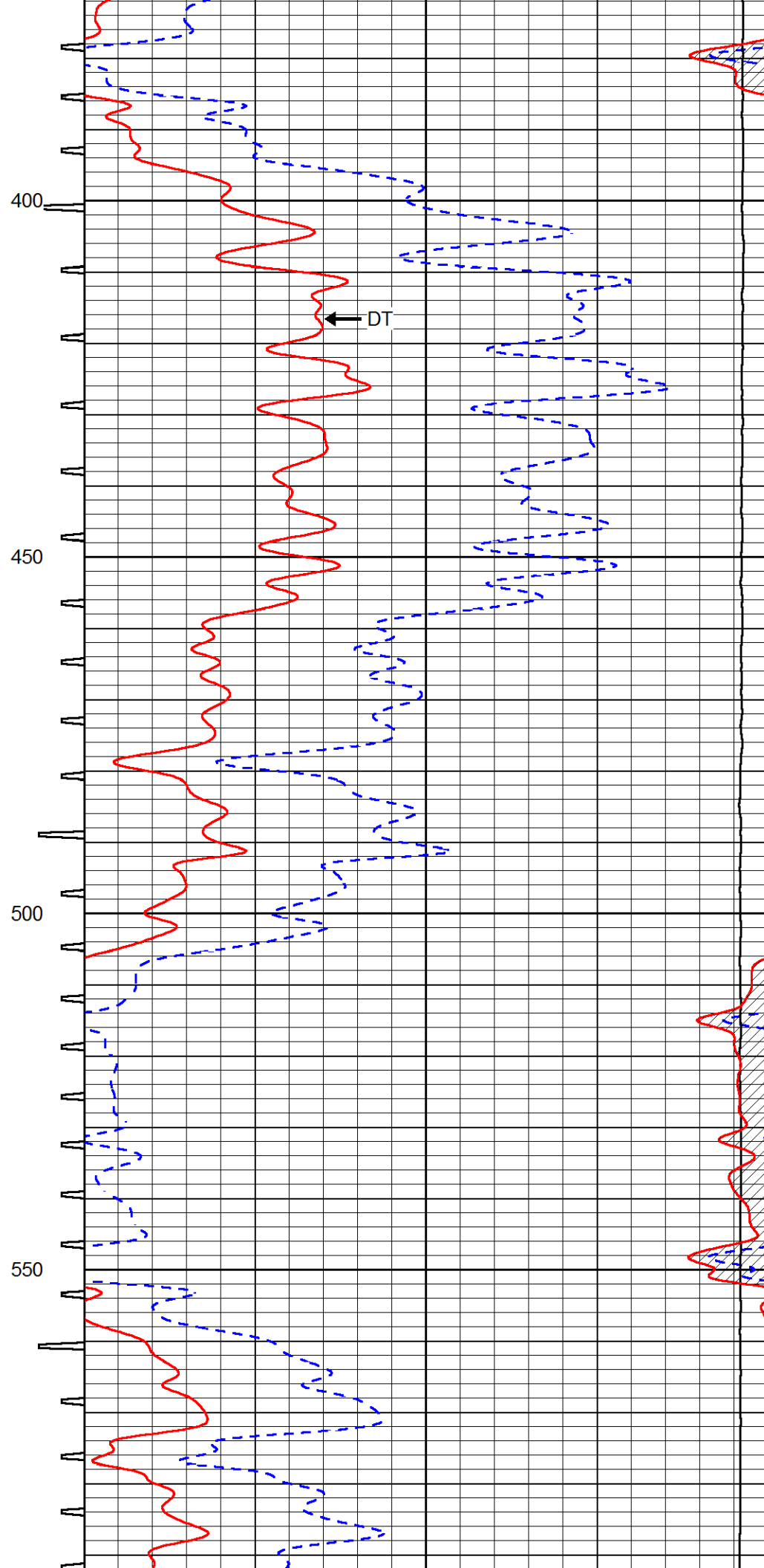
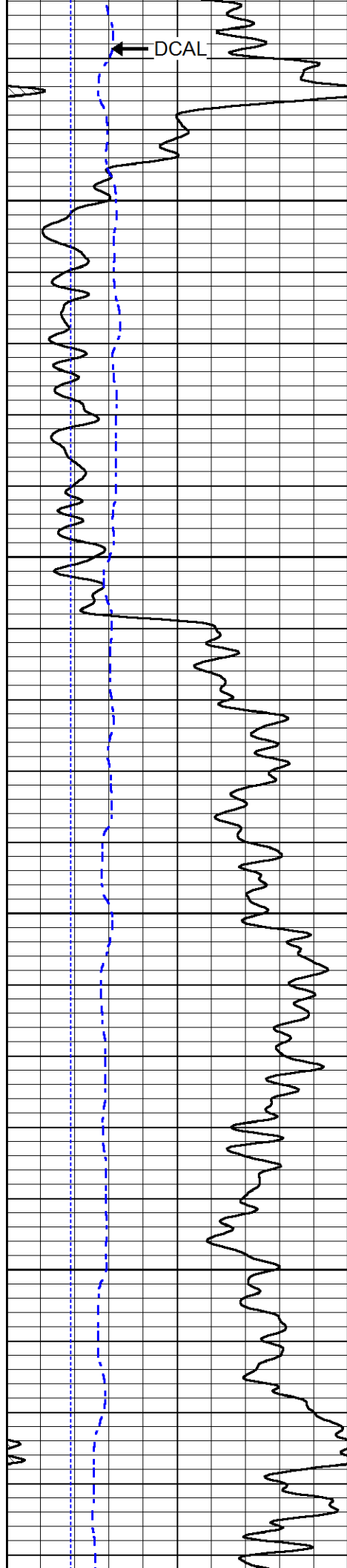


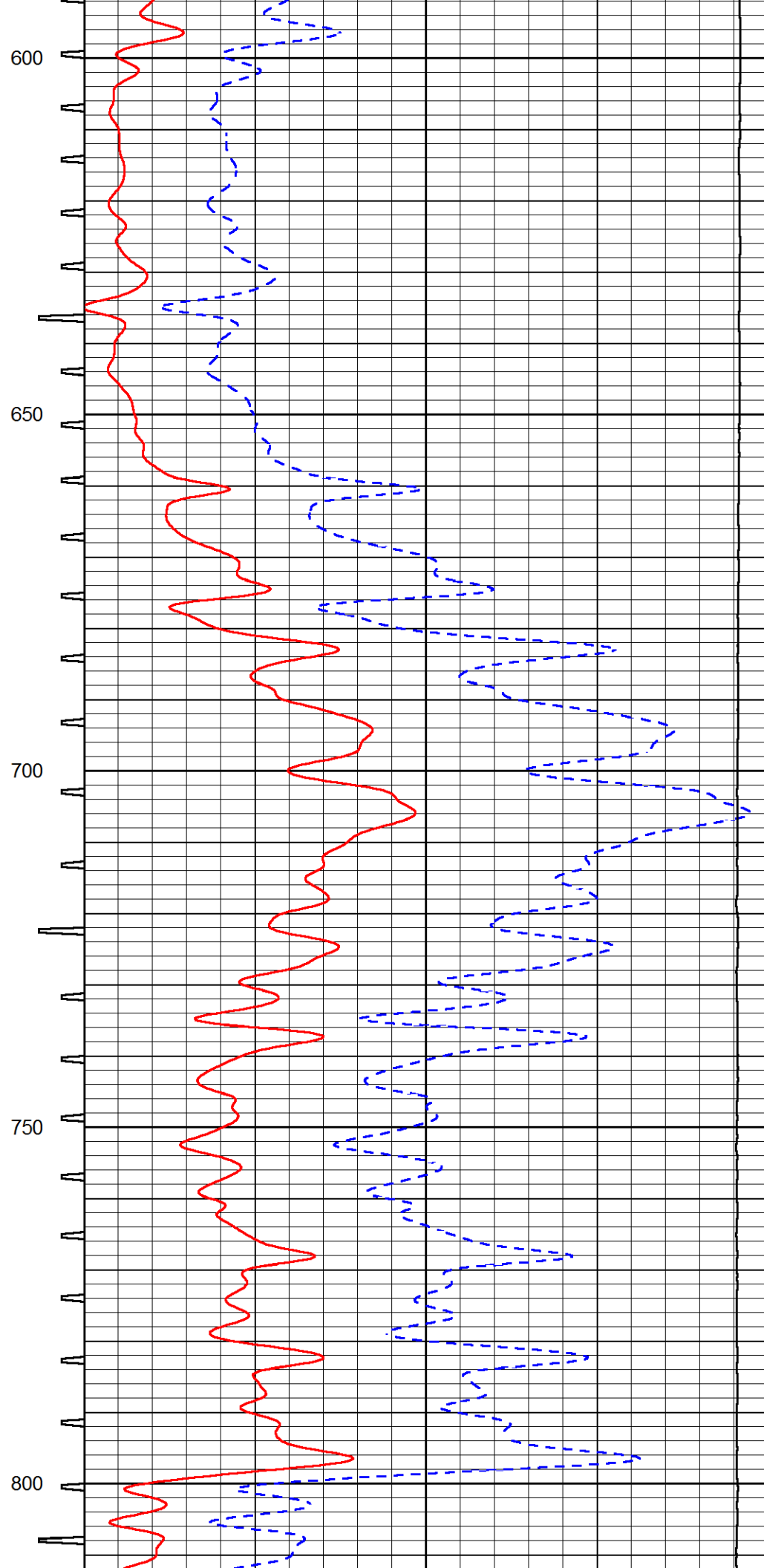
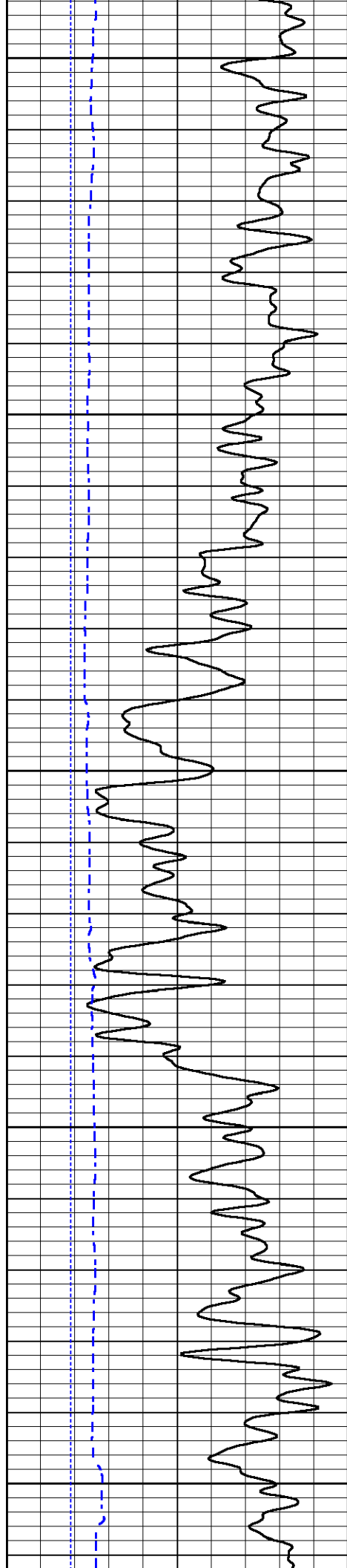
MAIN PASS

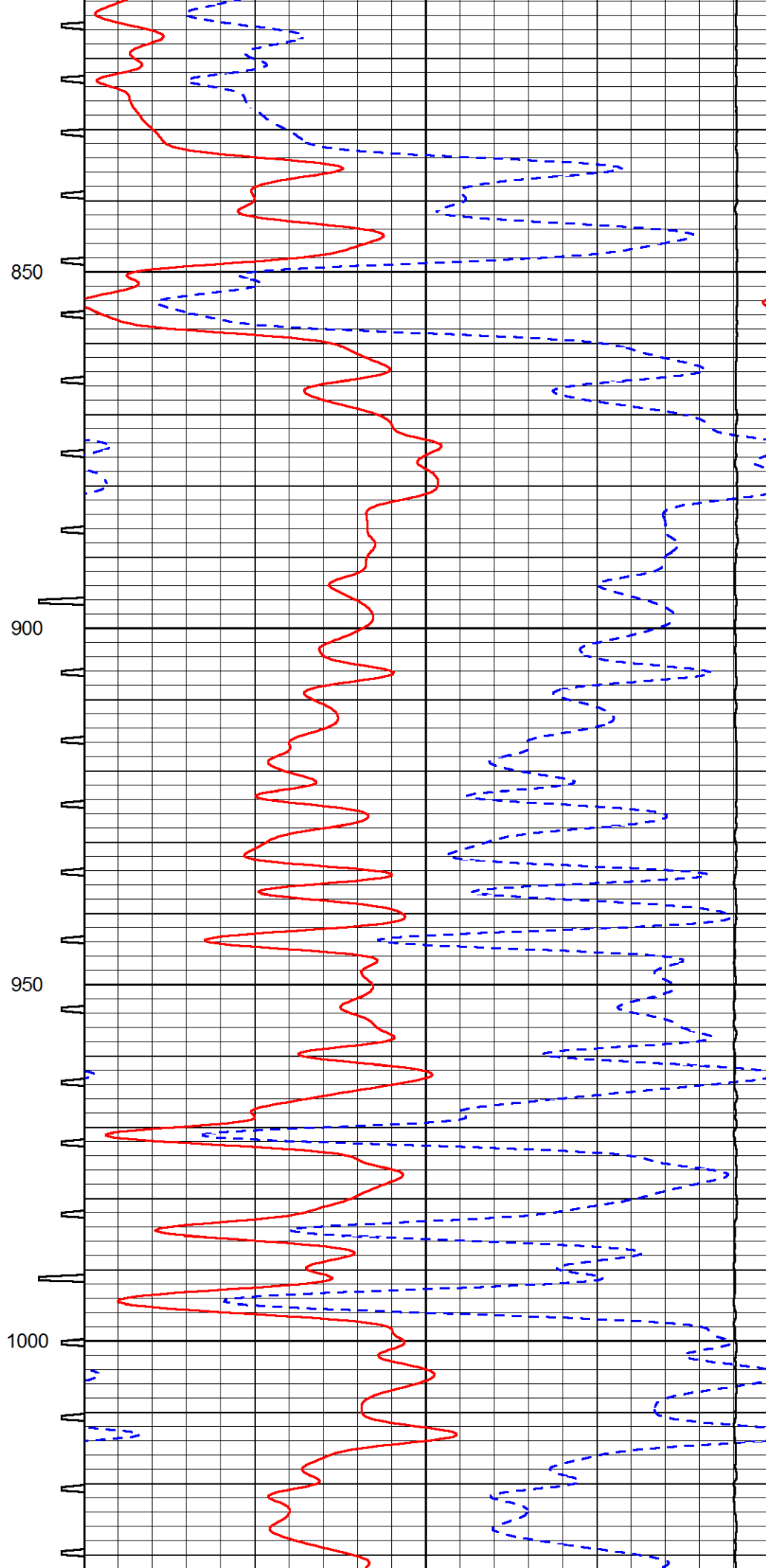
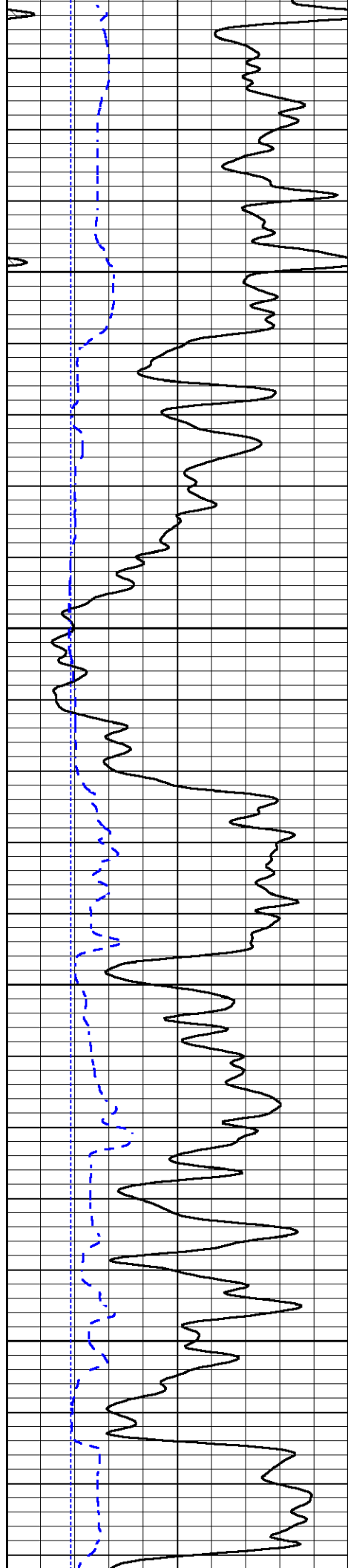
Database File	landmark_gerstberger_unit_1_20.db
Dataset Pathname	stackmel/pass5.1
Presentation Format	_sonic
Dataset Creation	Fri Mar 29 05:36:01 2019
Charted by	Depth in Feet scaled 1:240

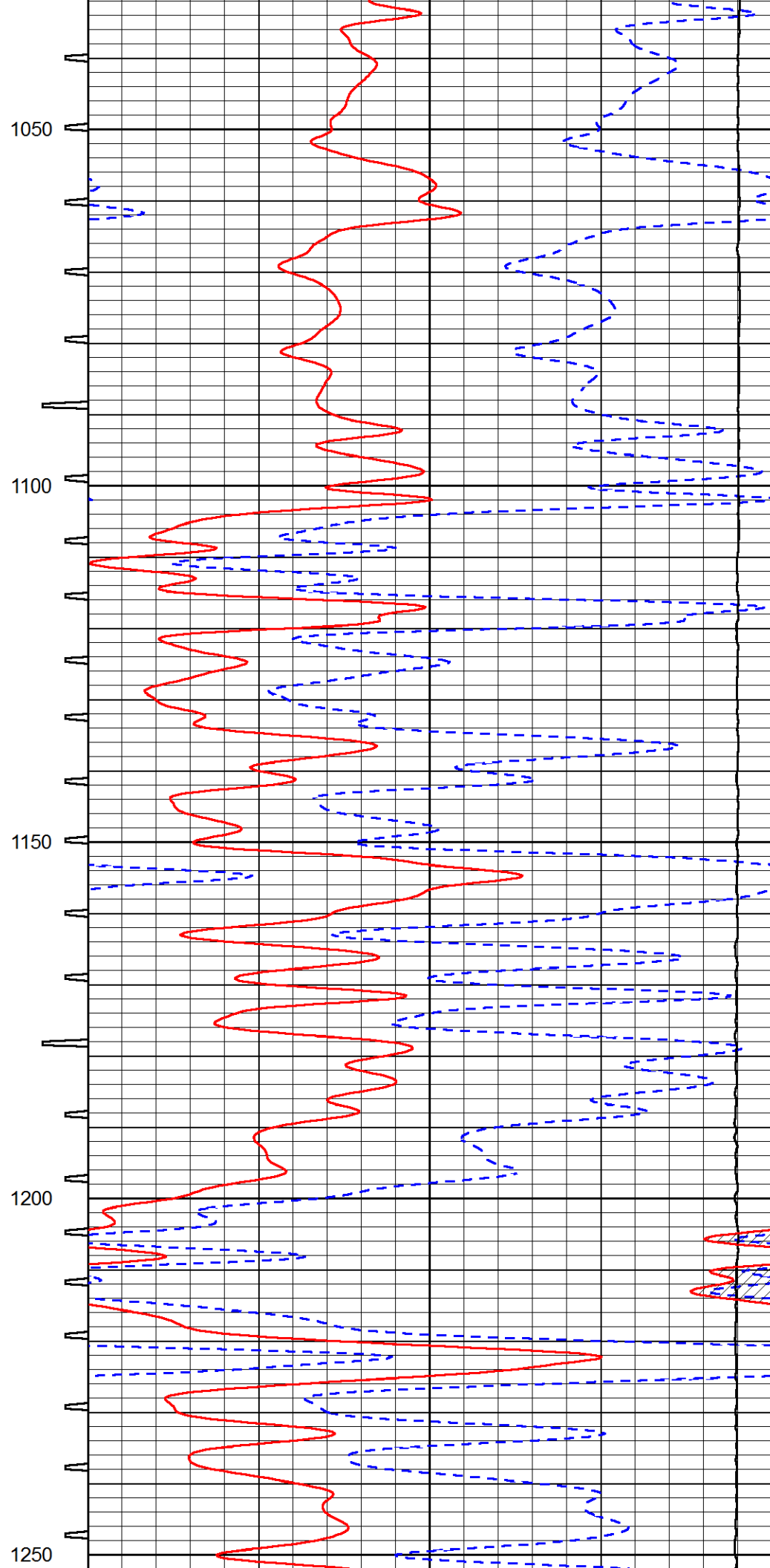
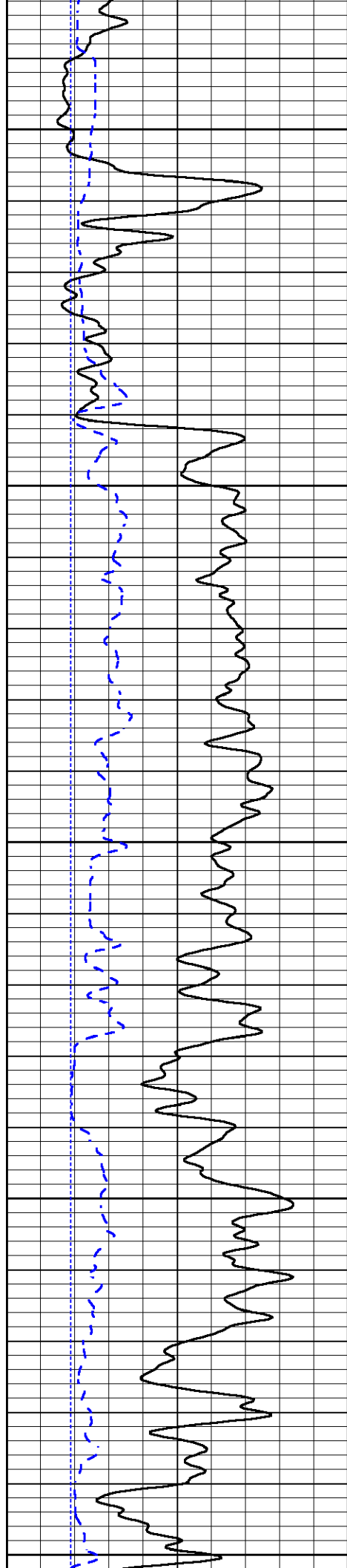
0	Gamma Ray (GAPI)	150	Sonic Int	140	Delta Time (usec/ft) (usec/ft)	40
150	GR (GAPI)	300	5 (msec) 0	30	Sonic Porosity (pu)	-10
6	DCAL (in)	16		15000	LTEN (lb) (lb)	0

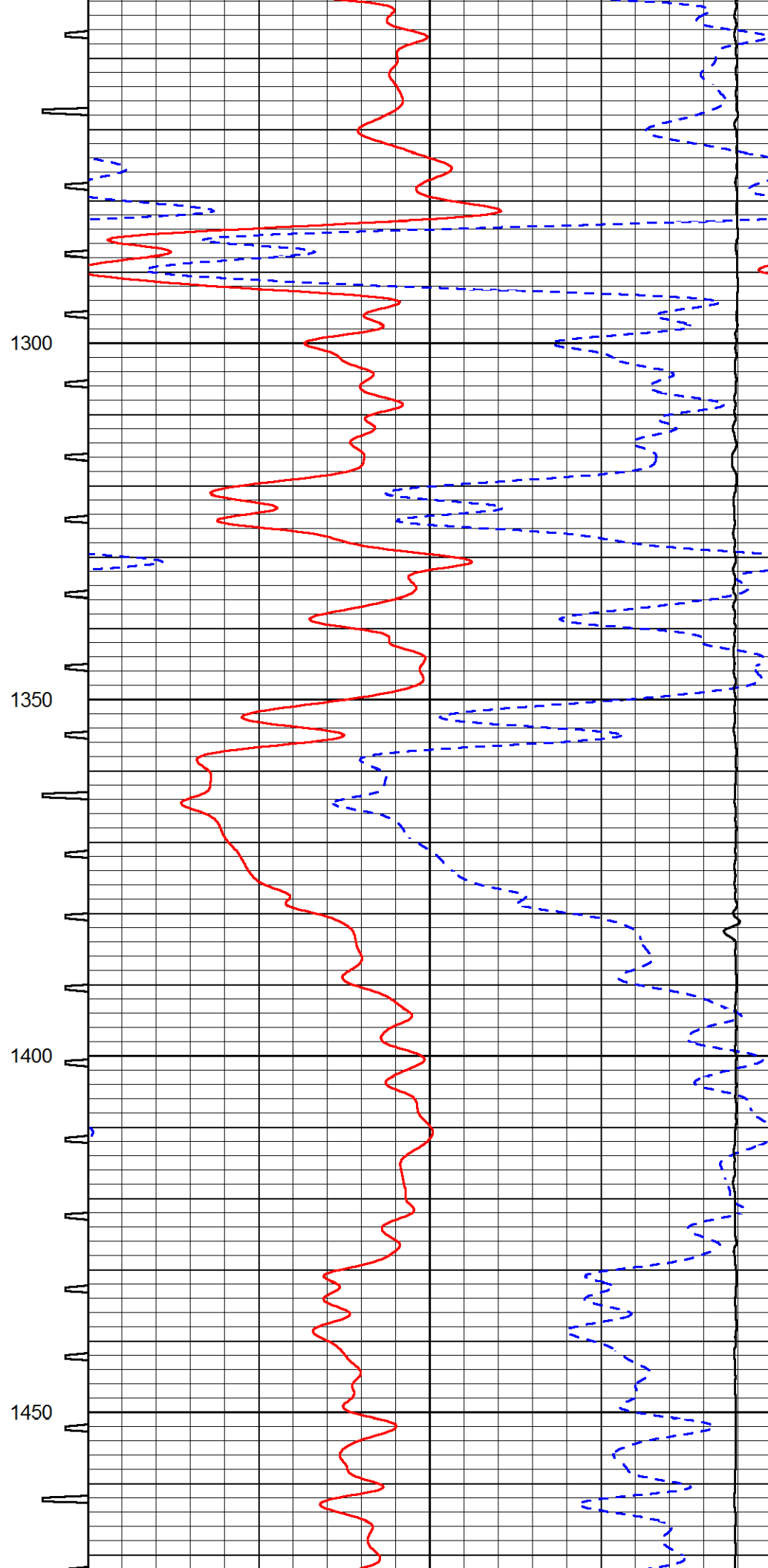
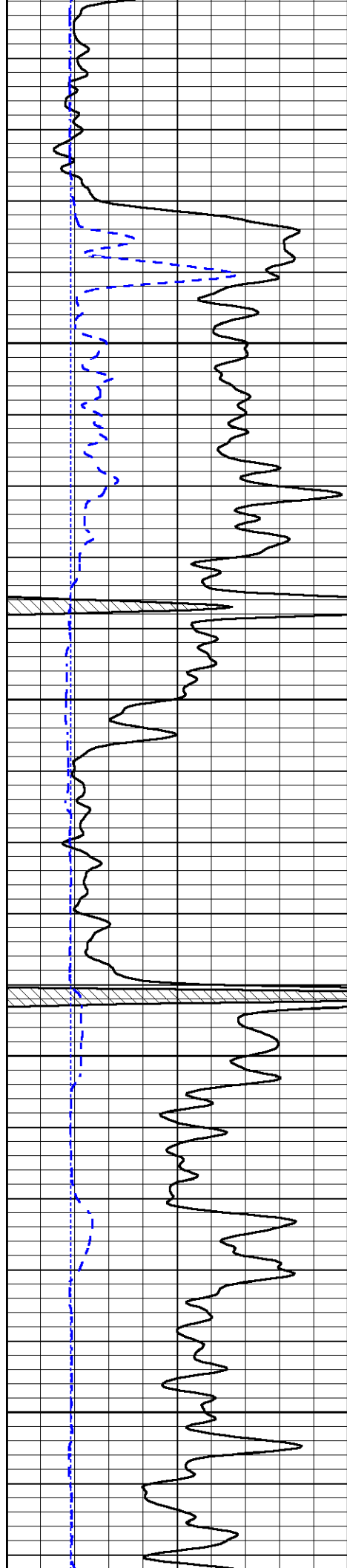


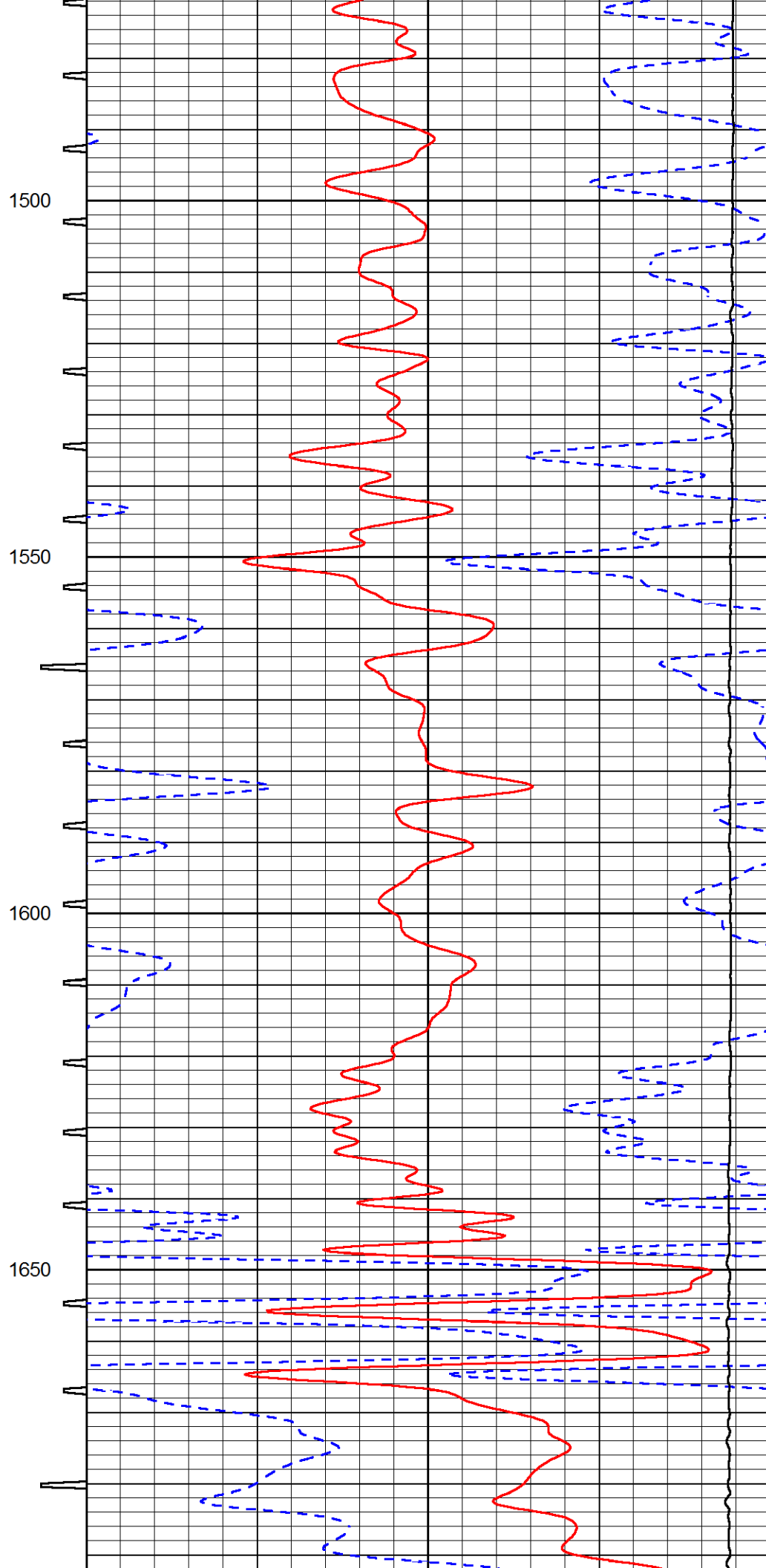
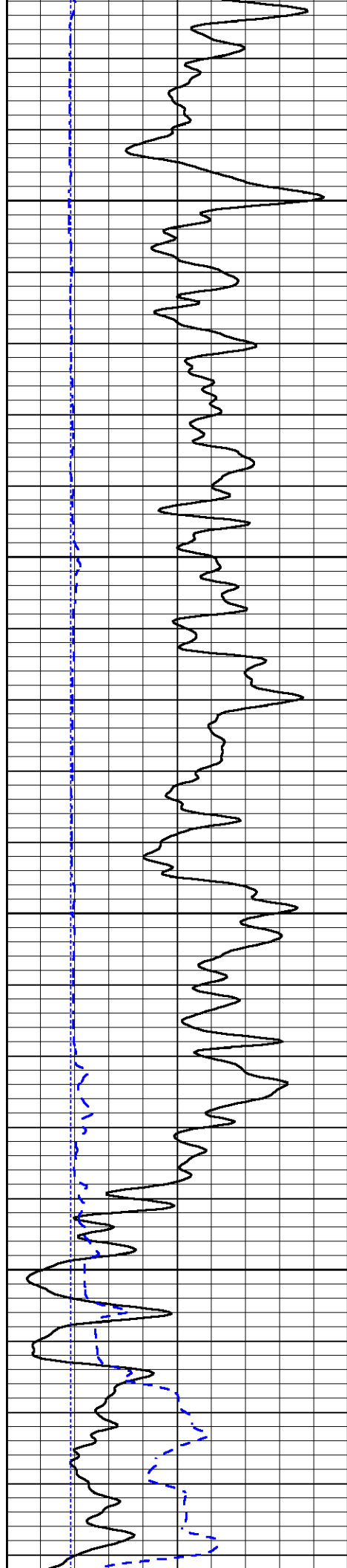


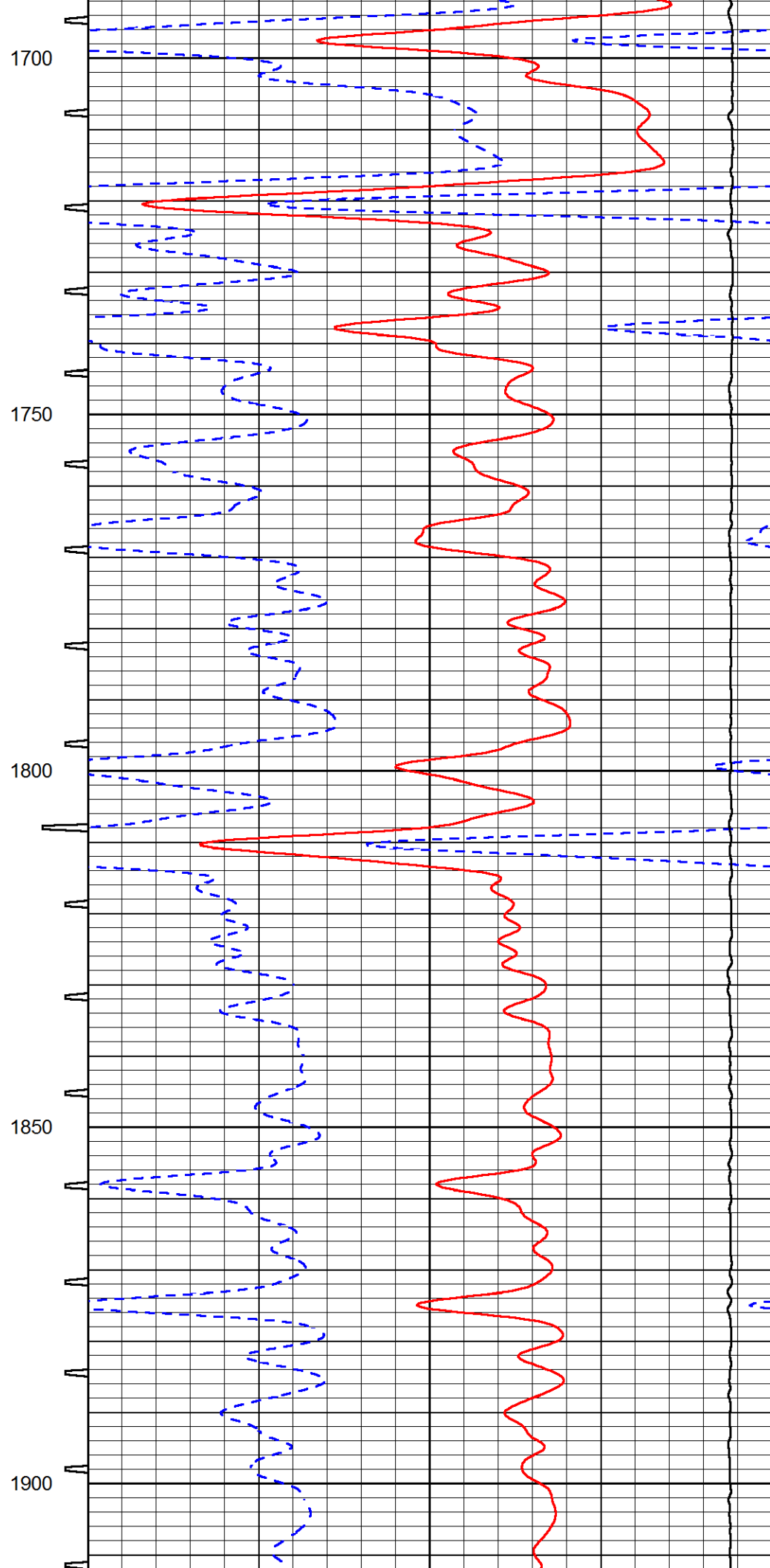
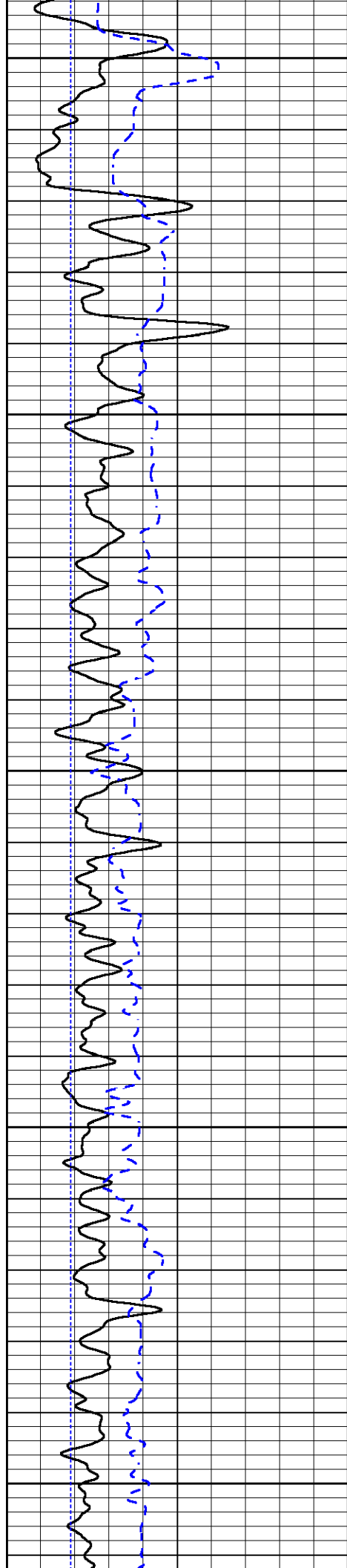


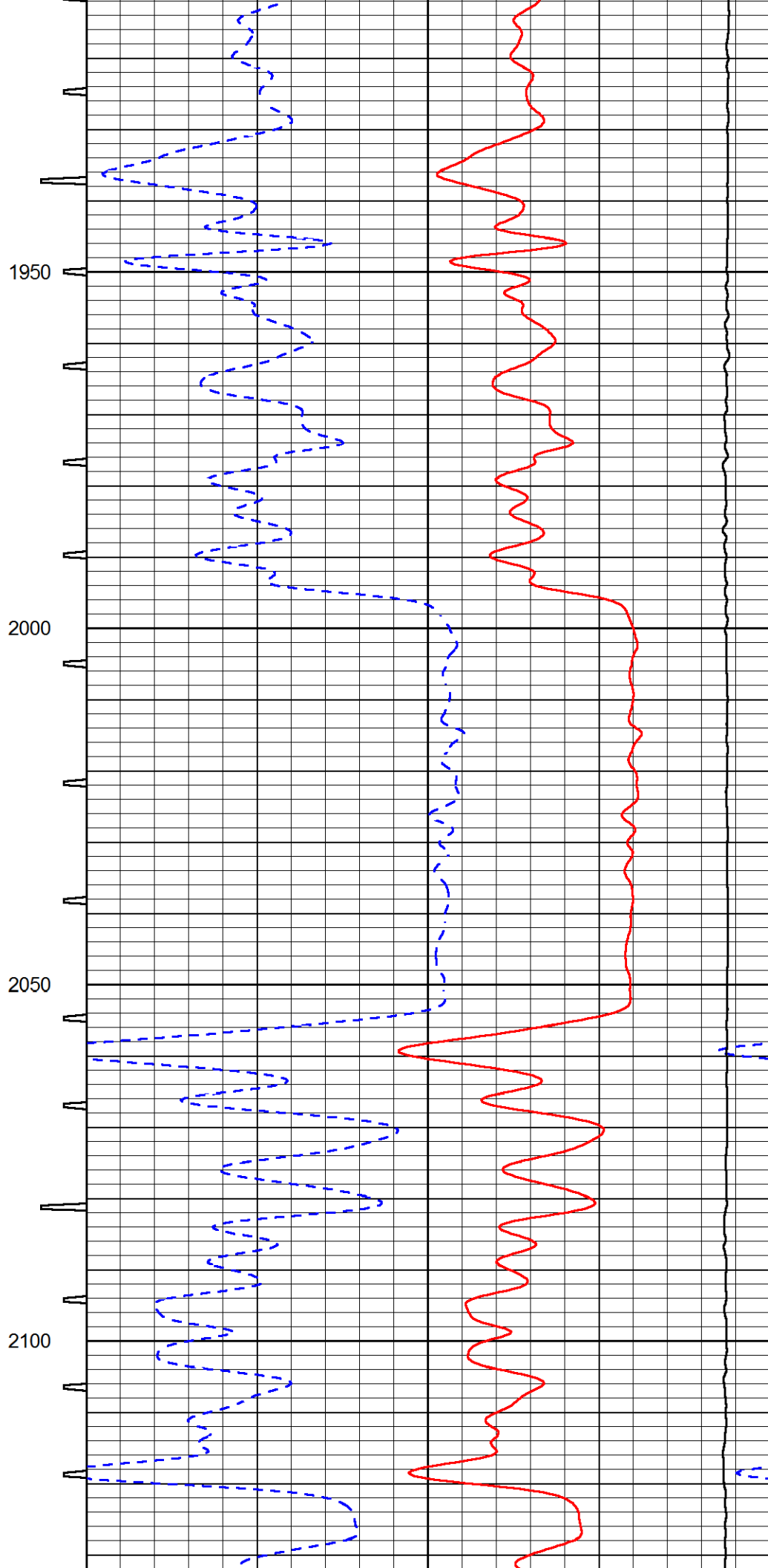
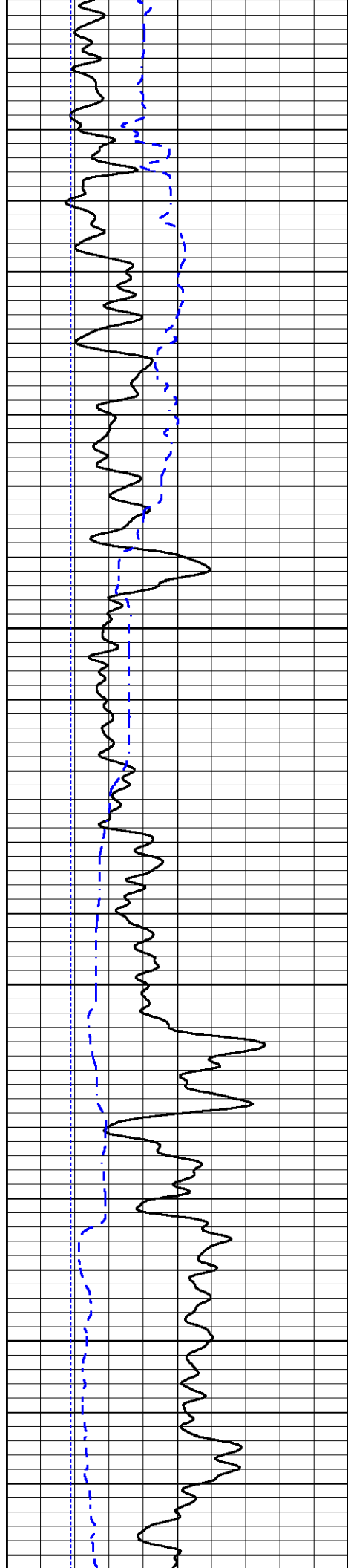


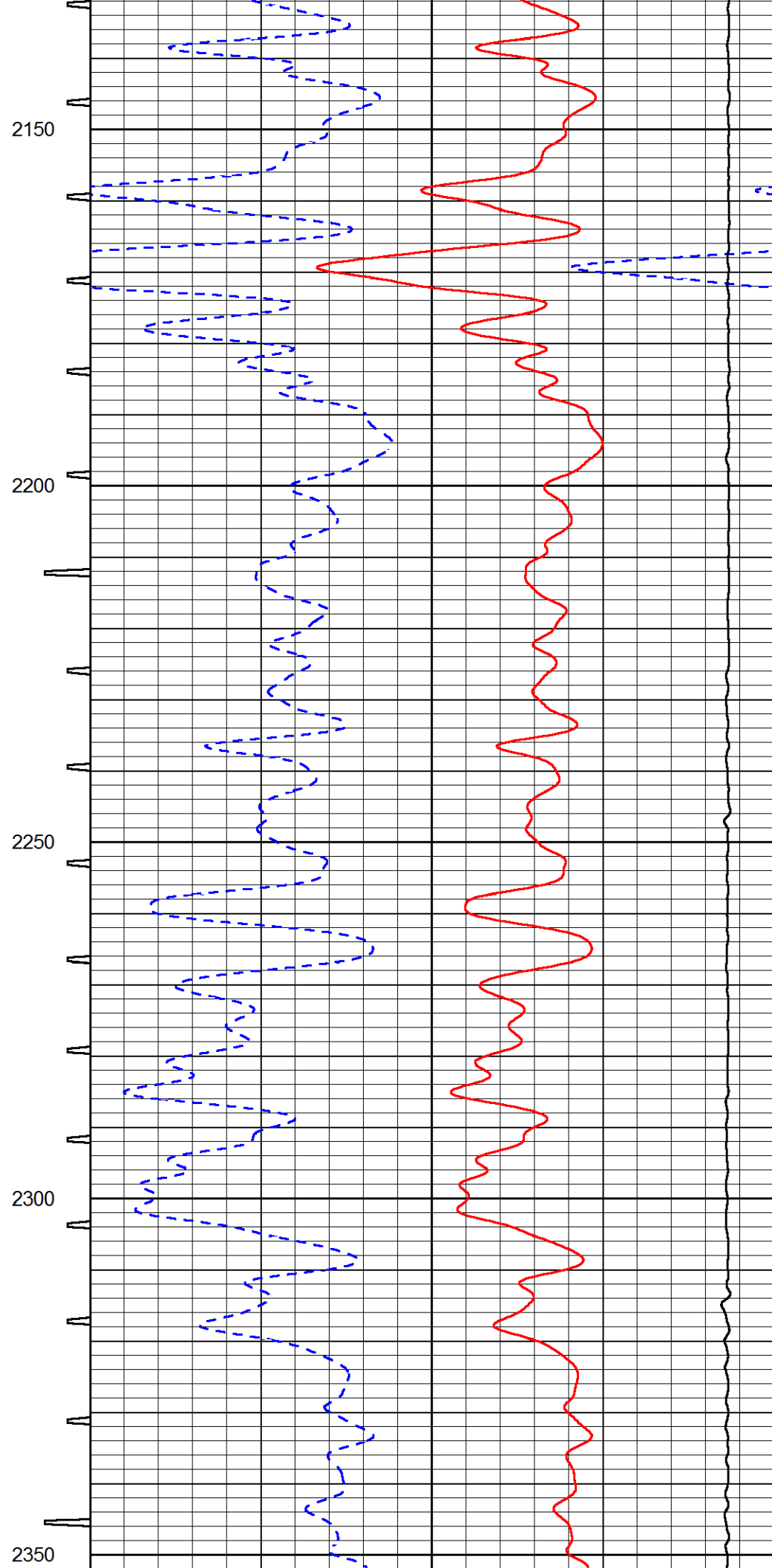
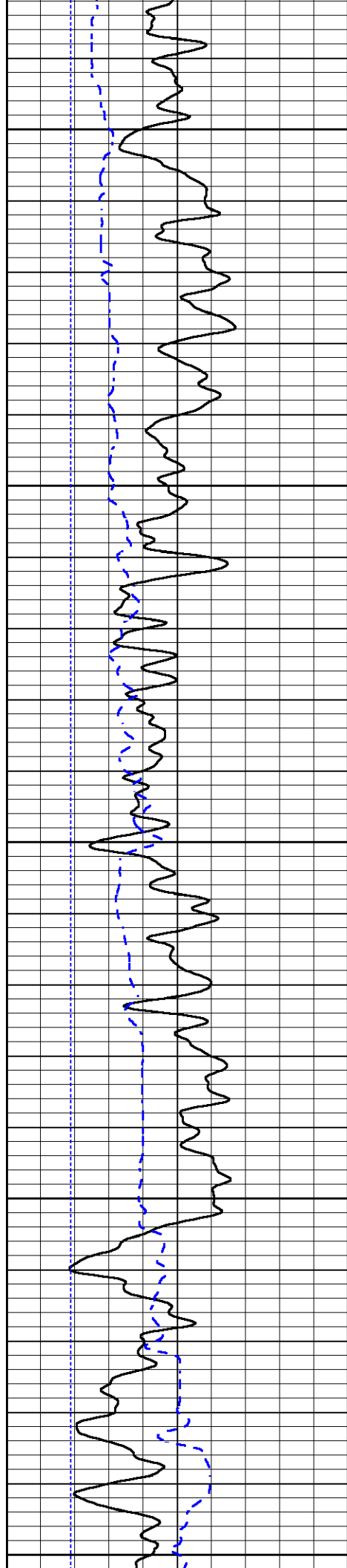


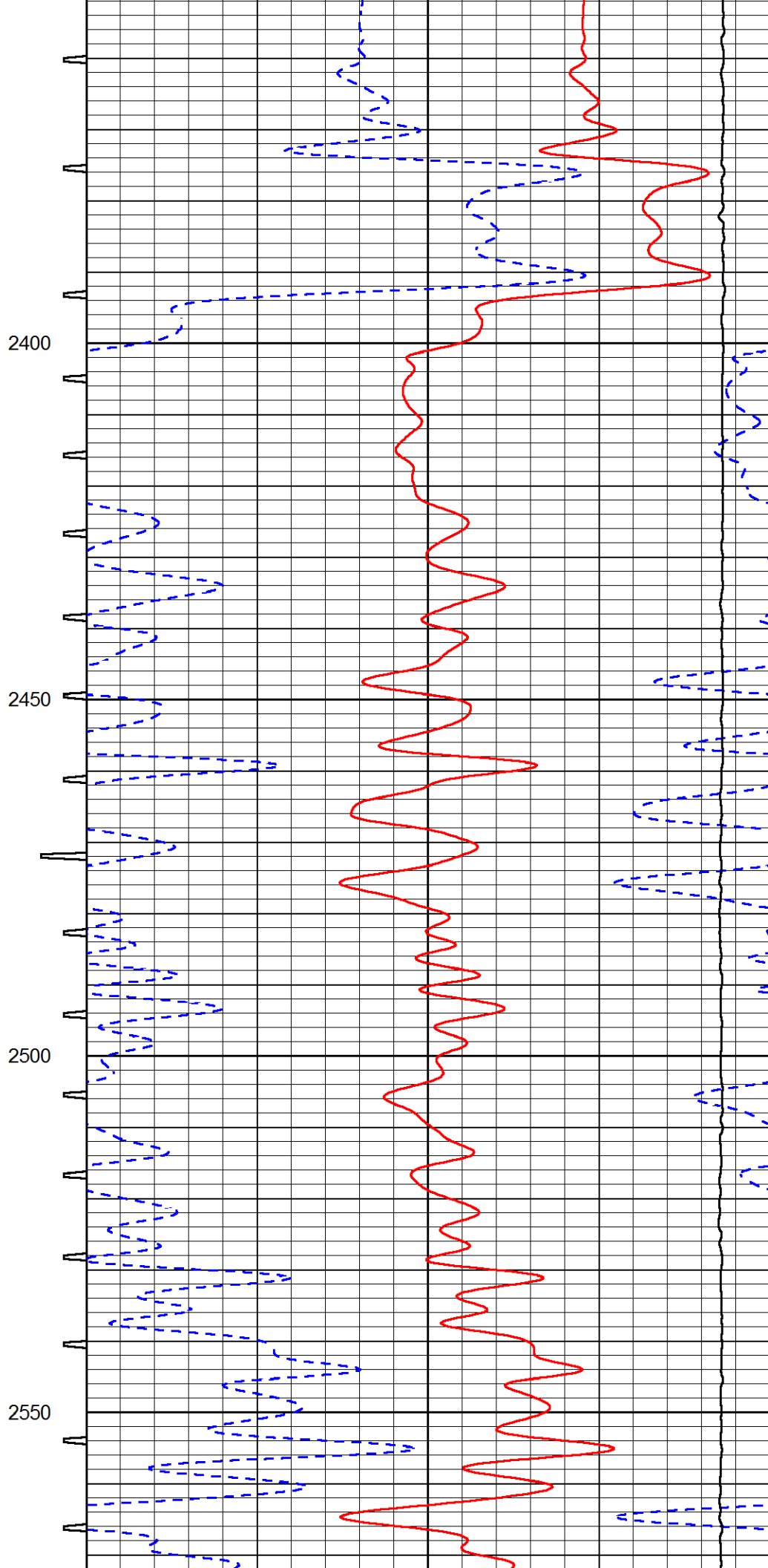
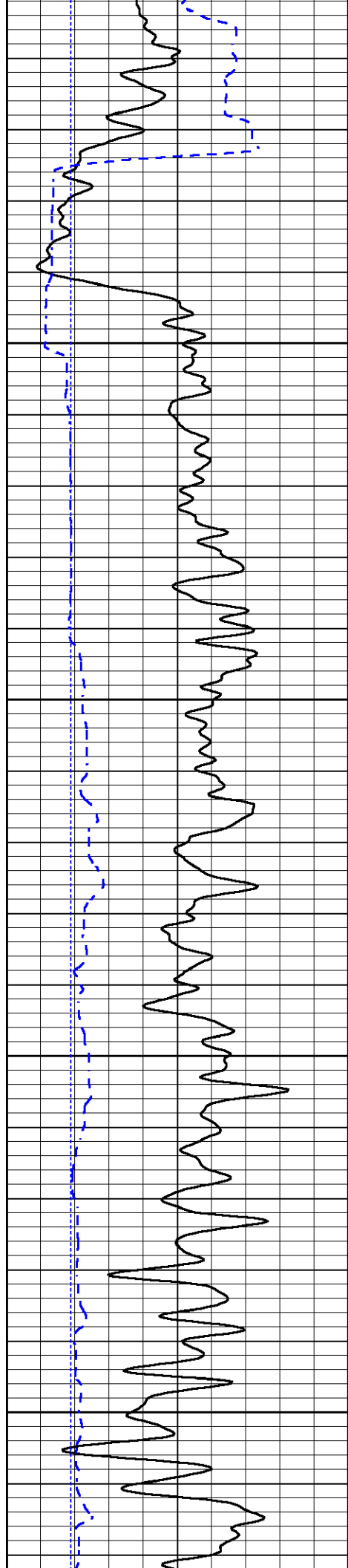


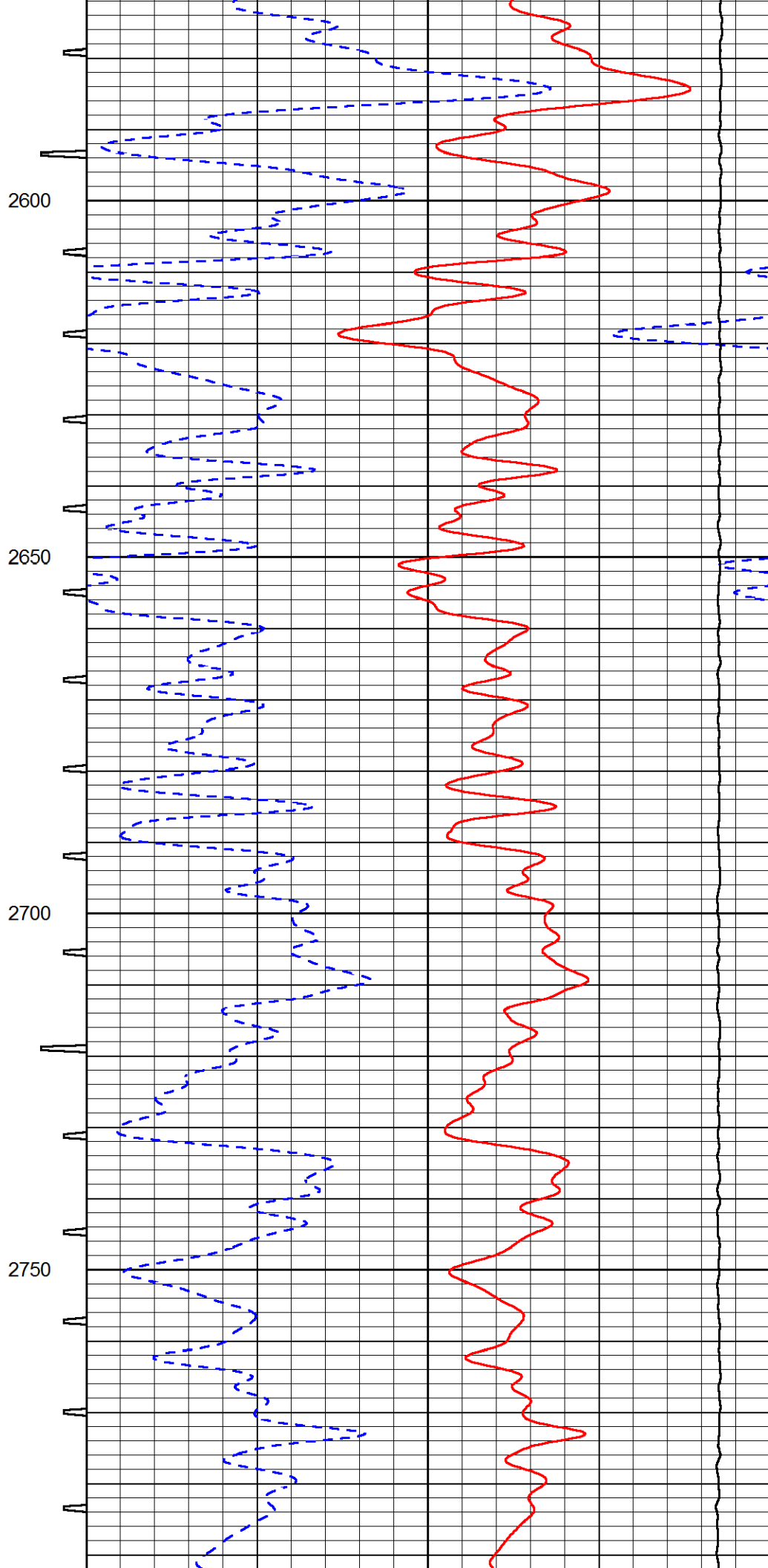
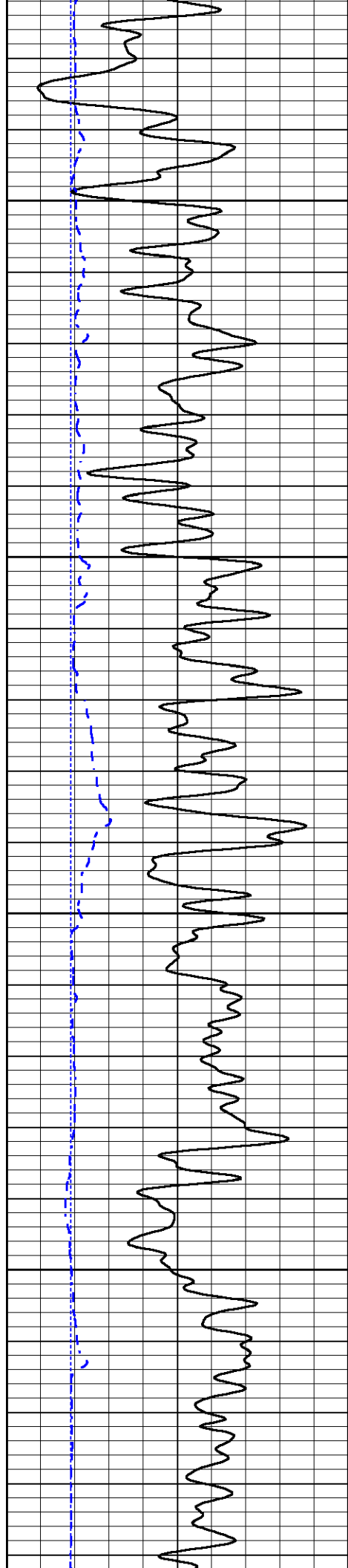


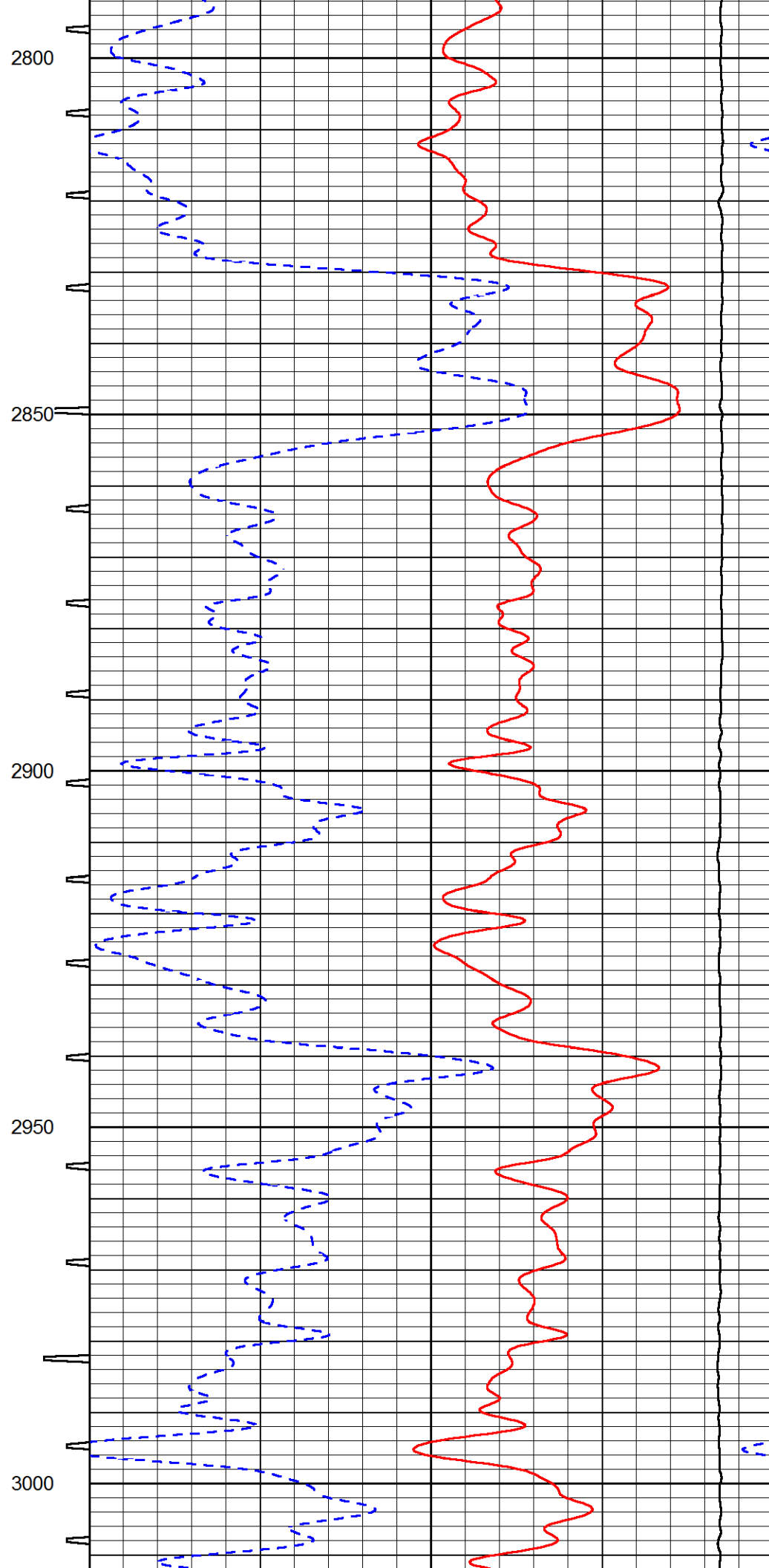
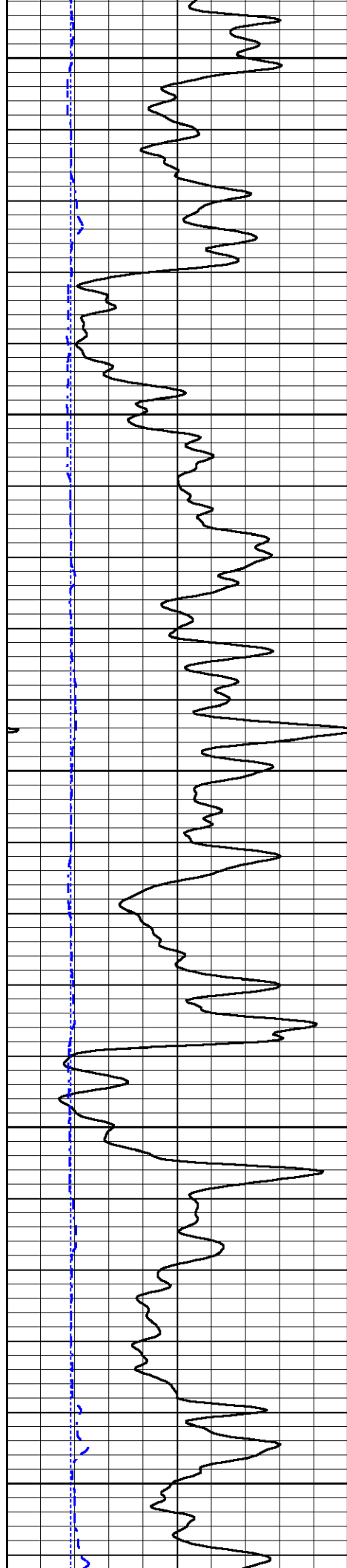


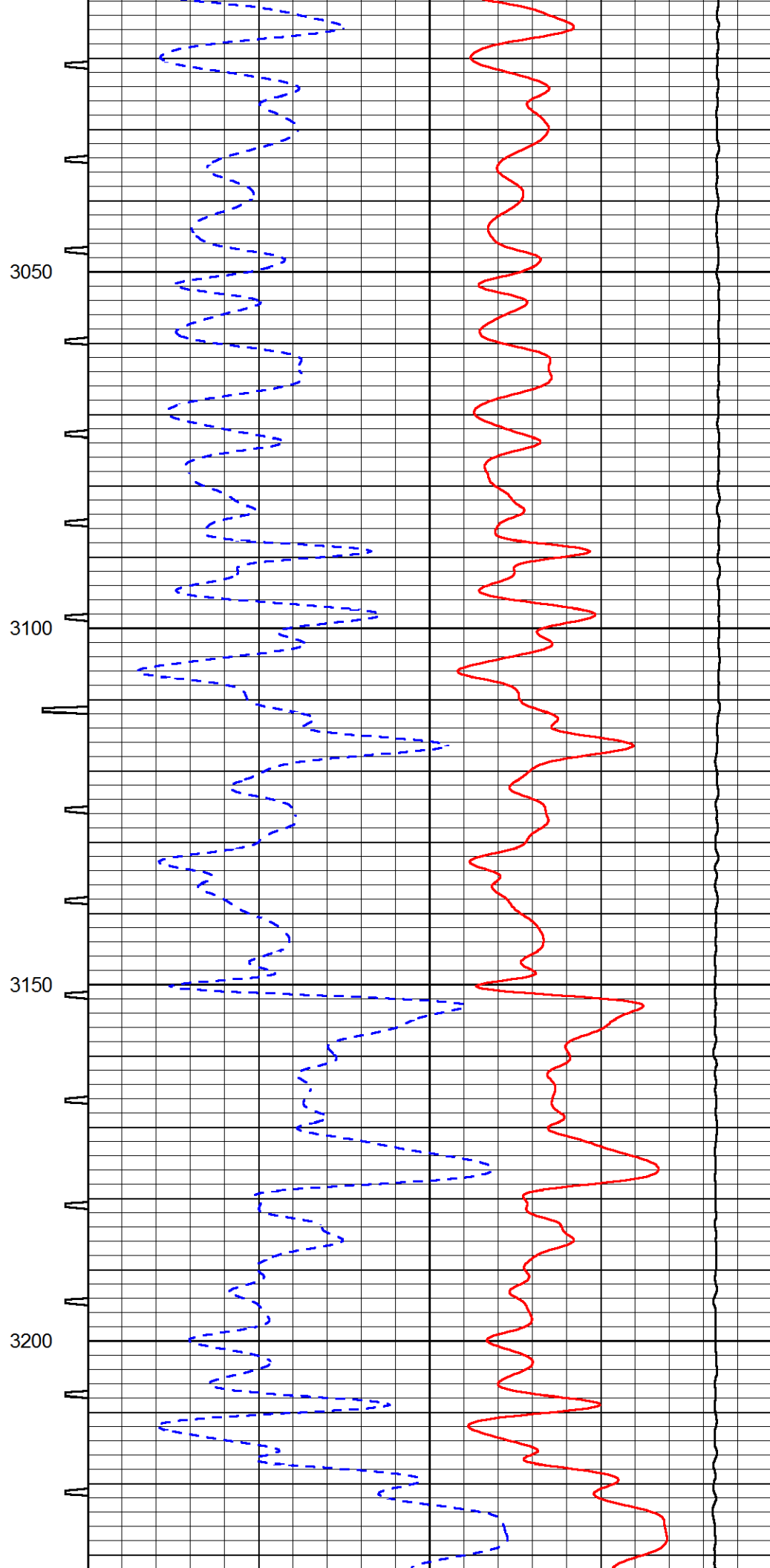
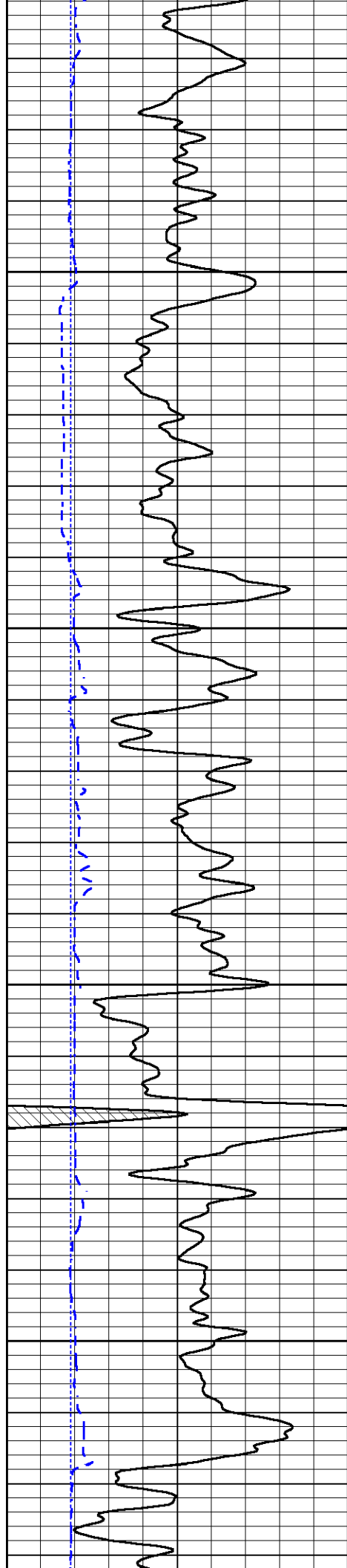


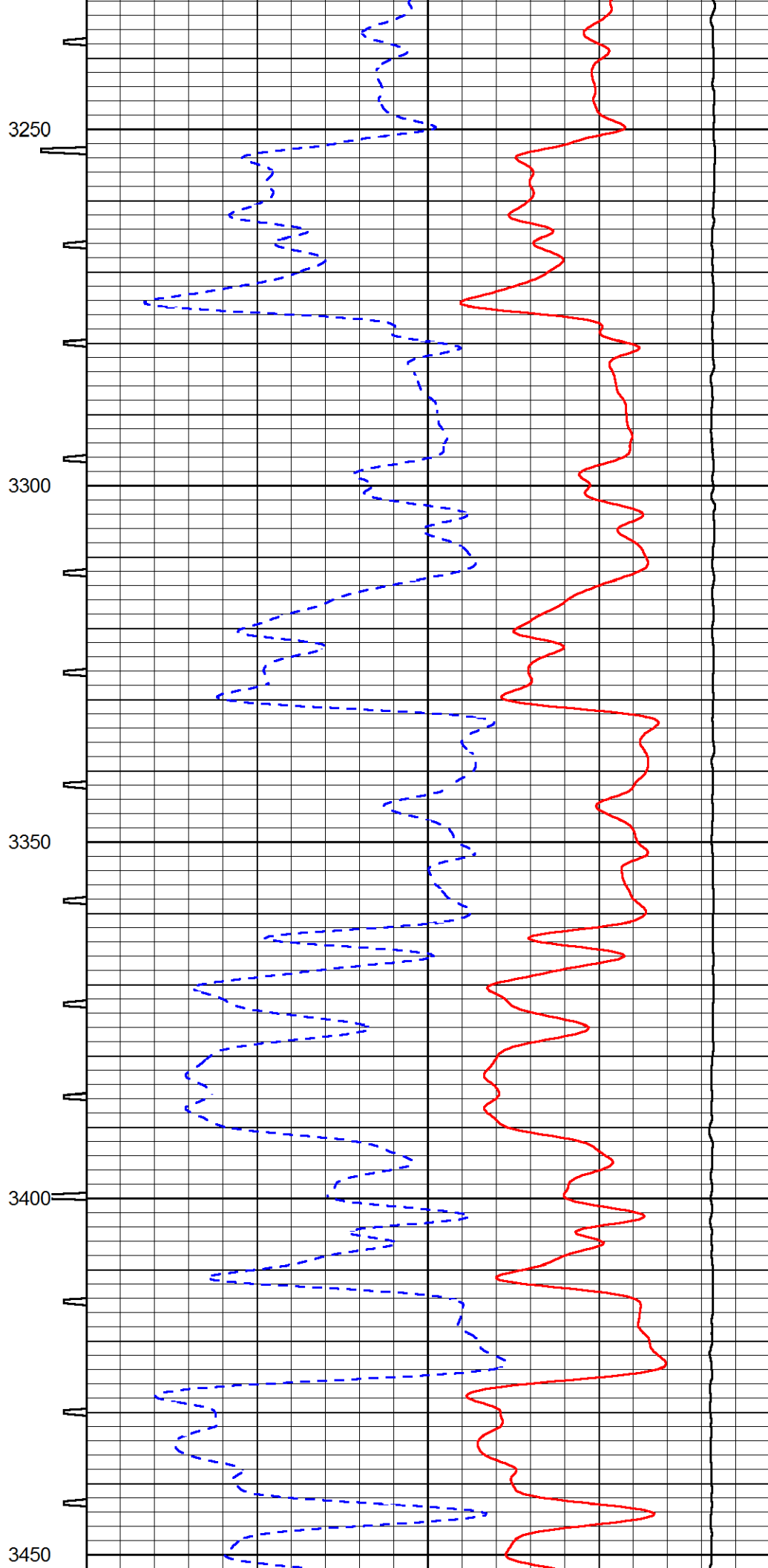
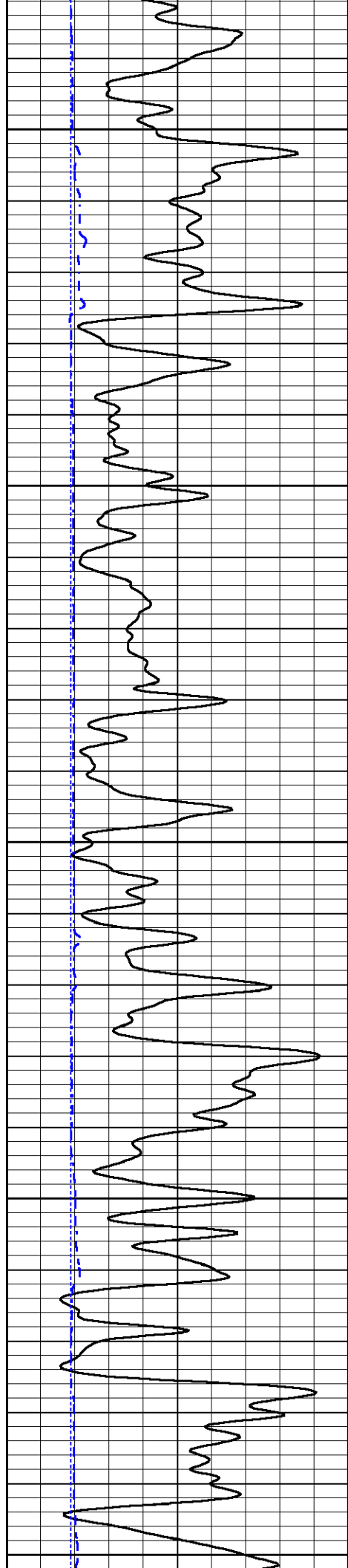


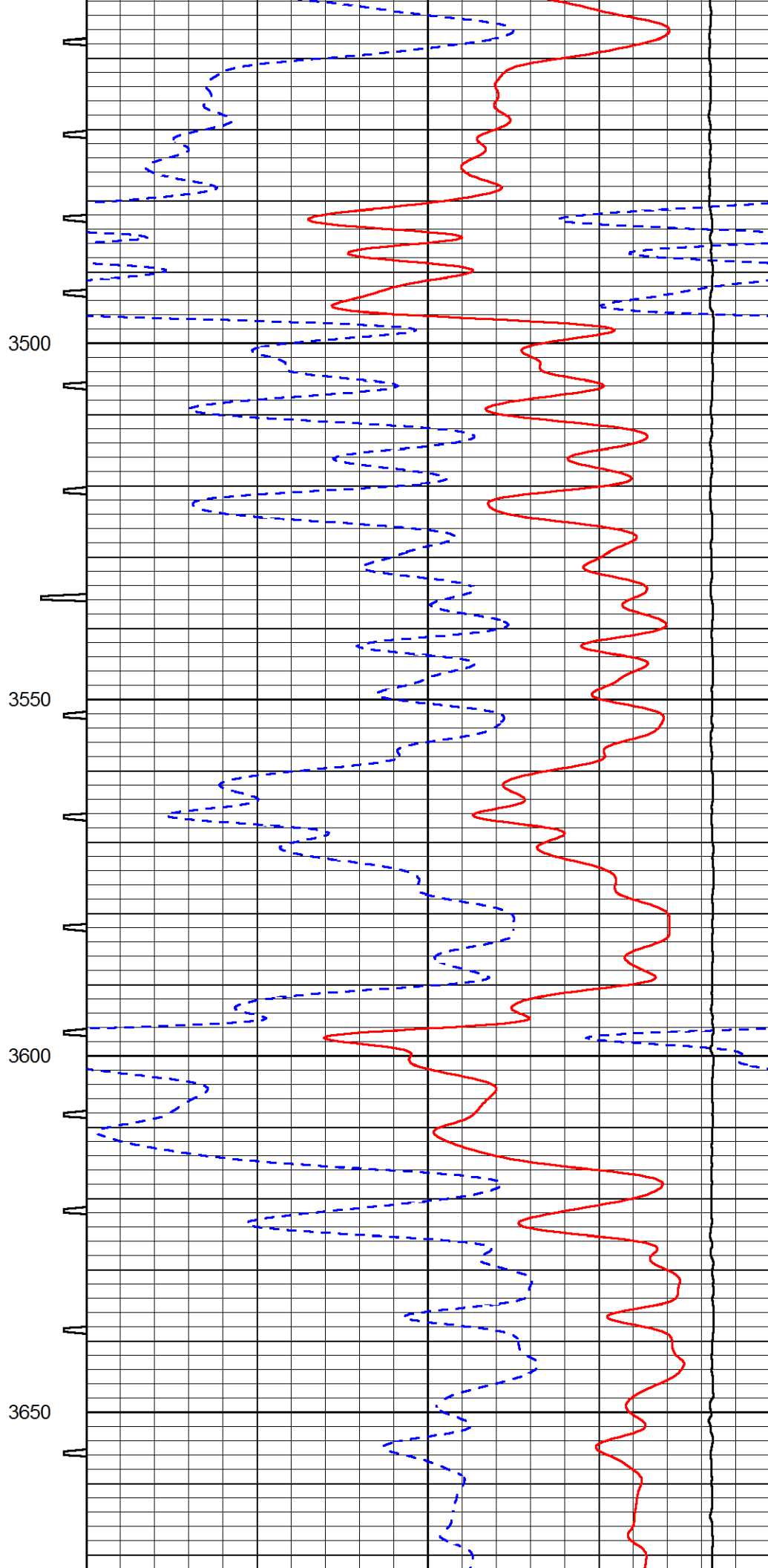
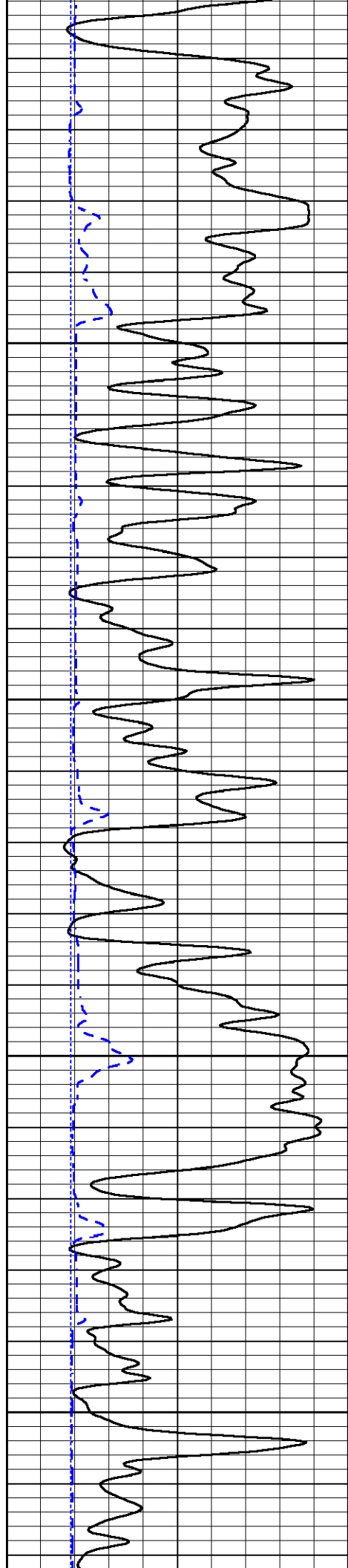


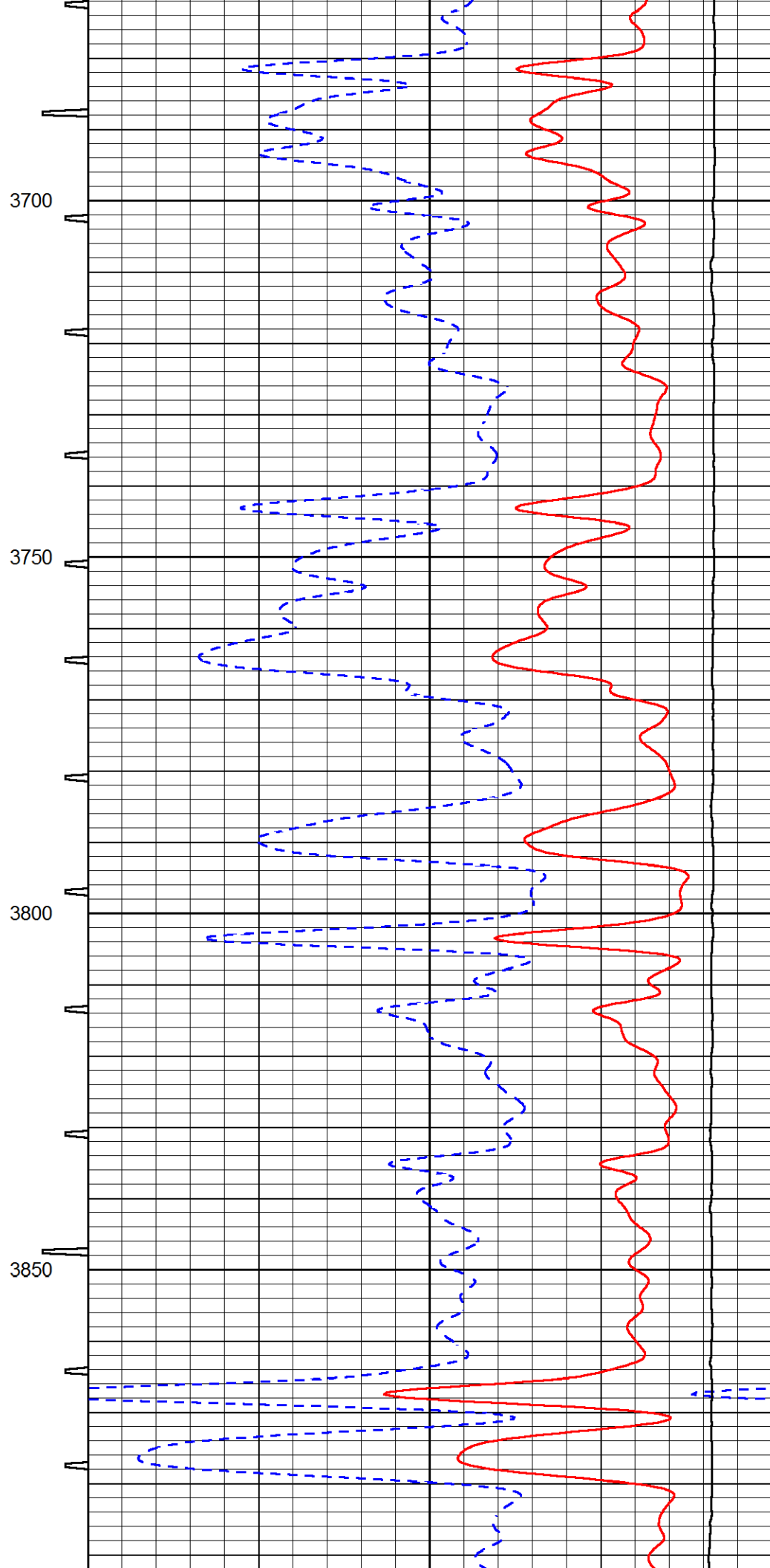
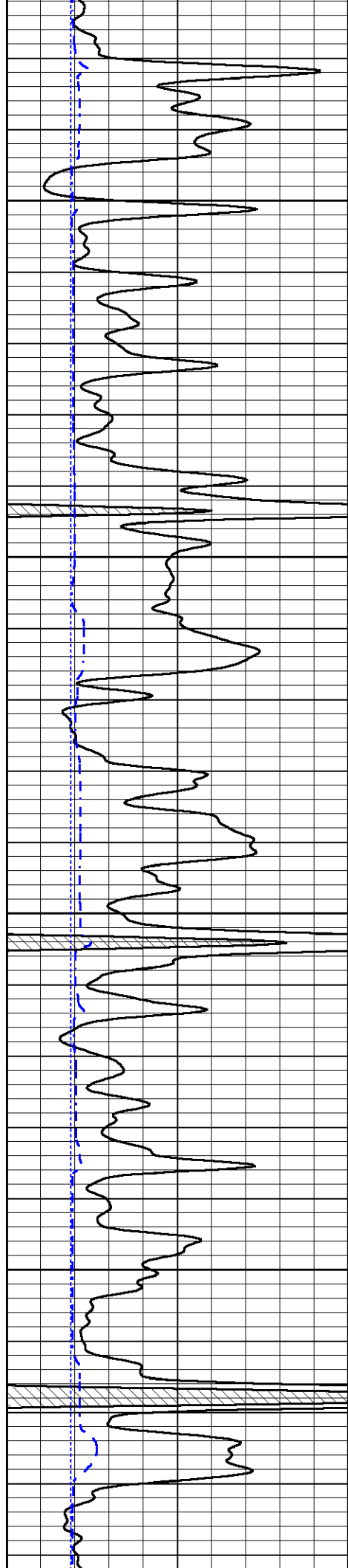


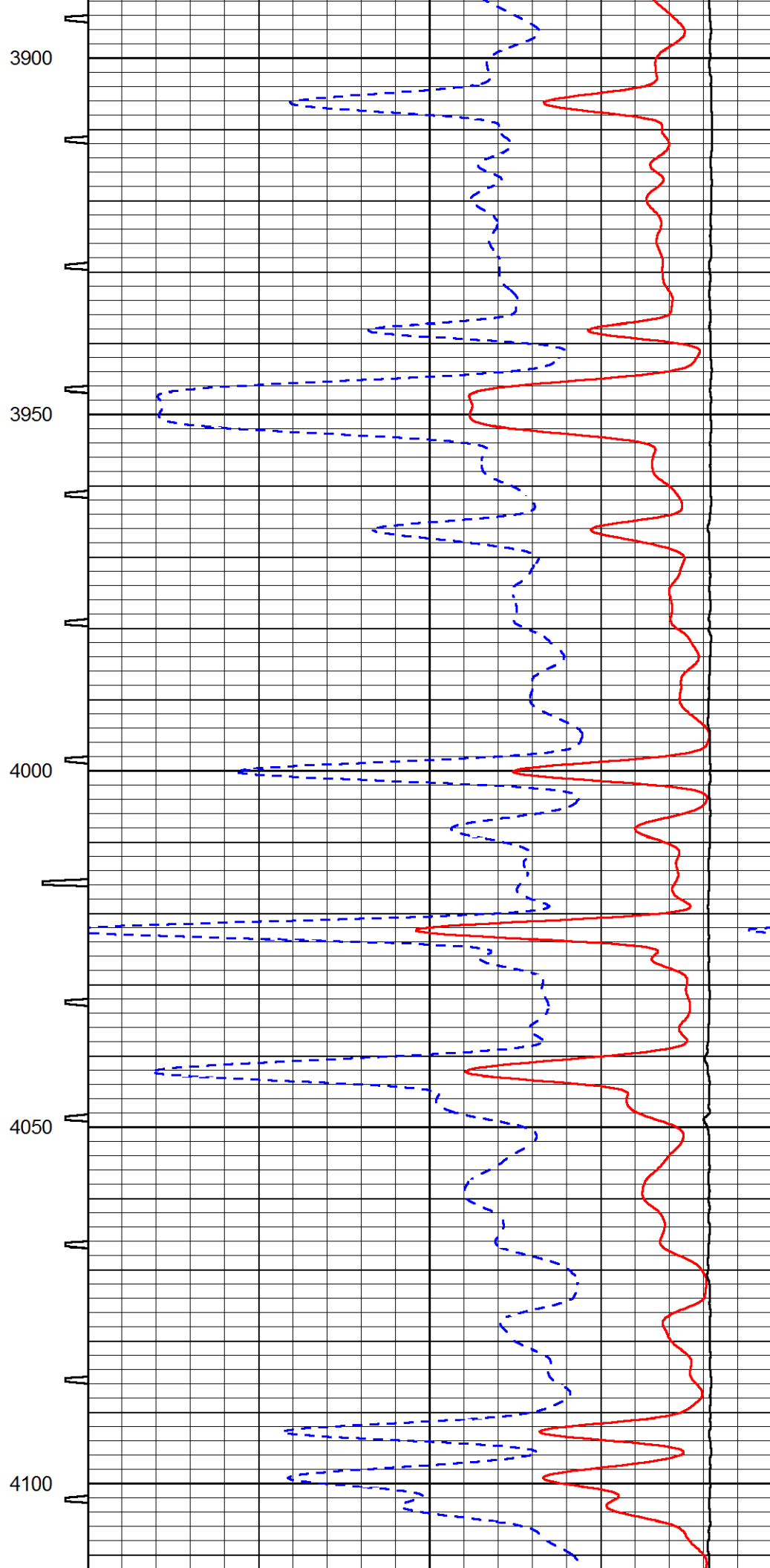
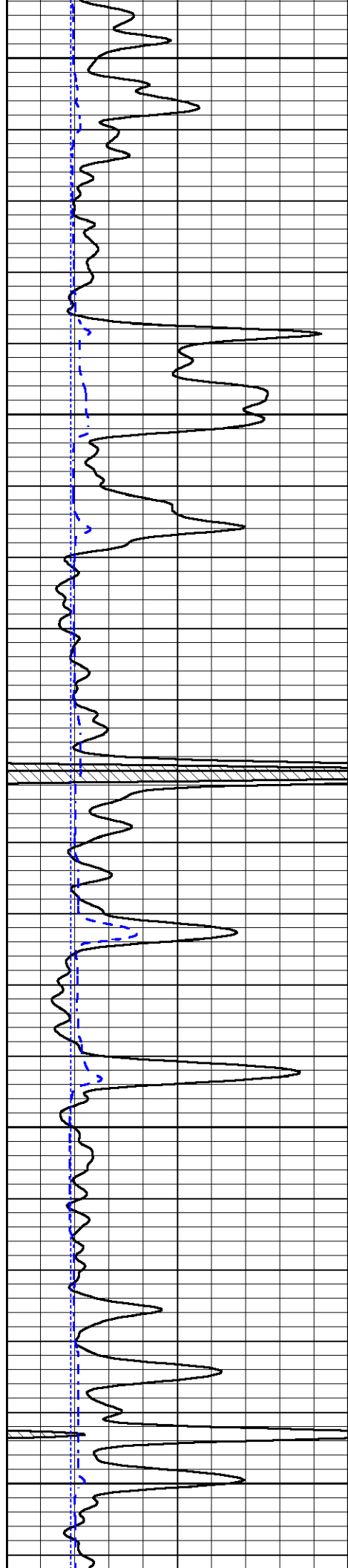


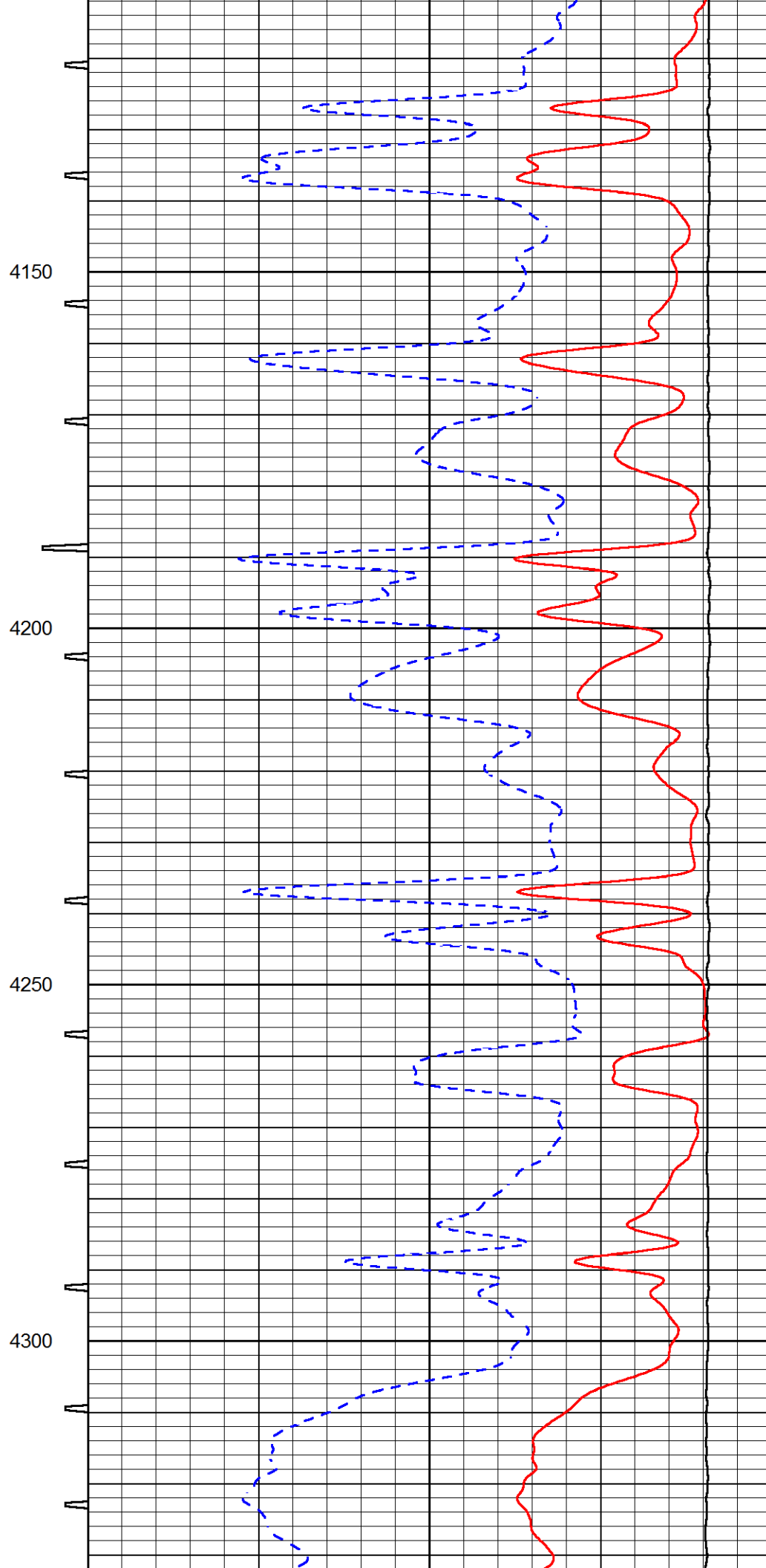
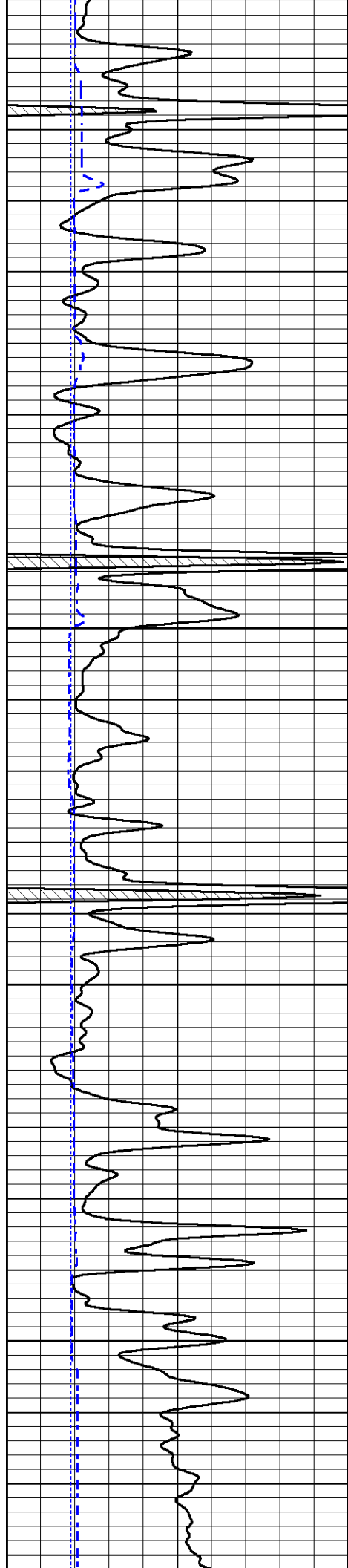


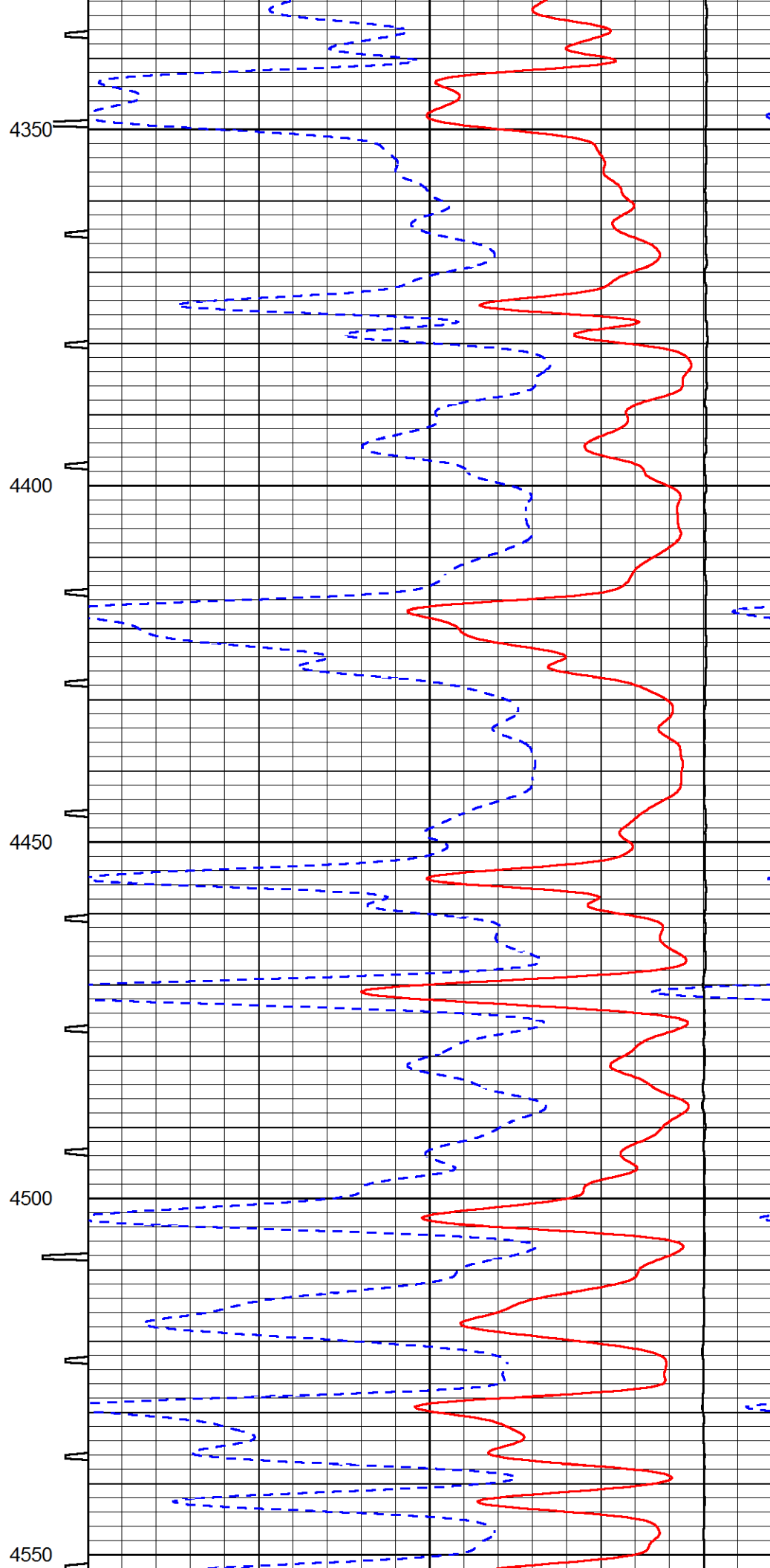
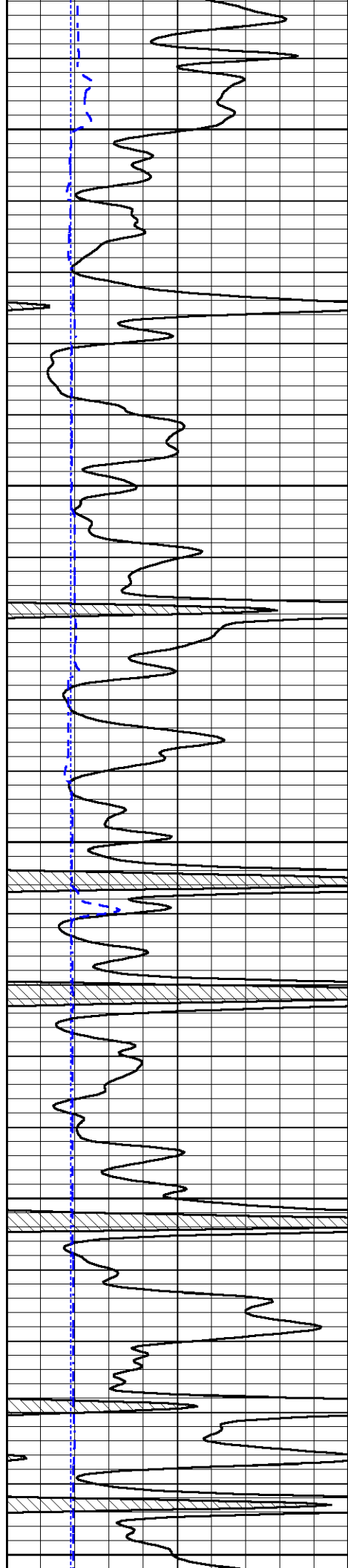


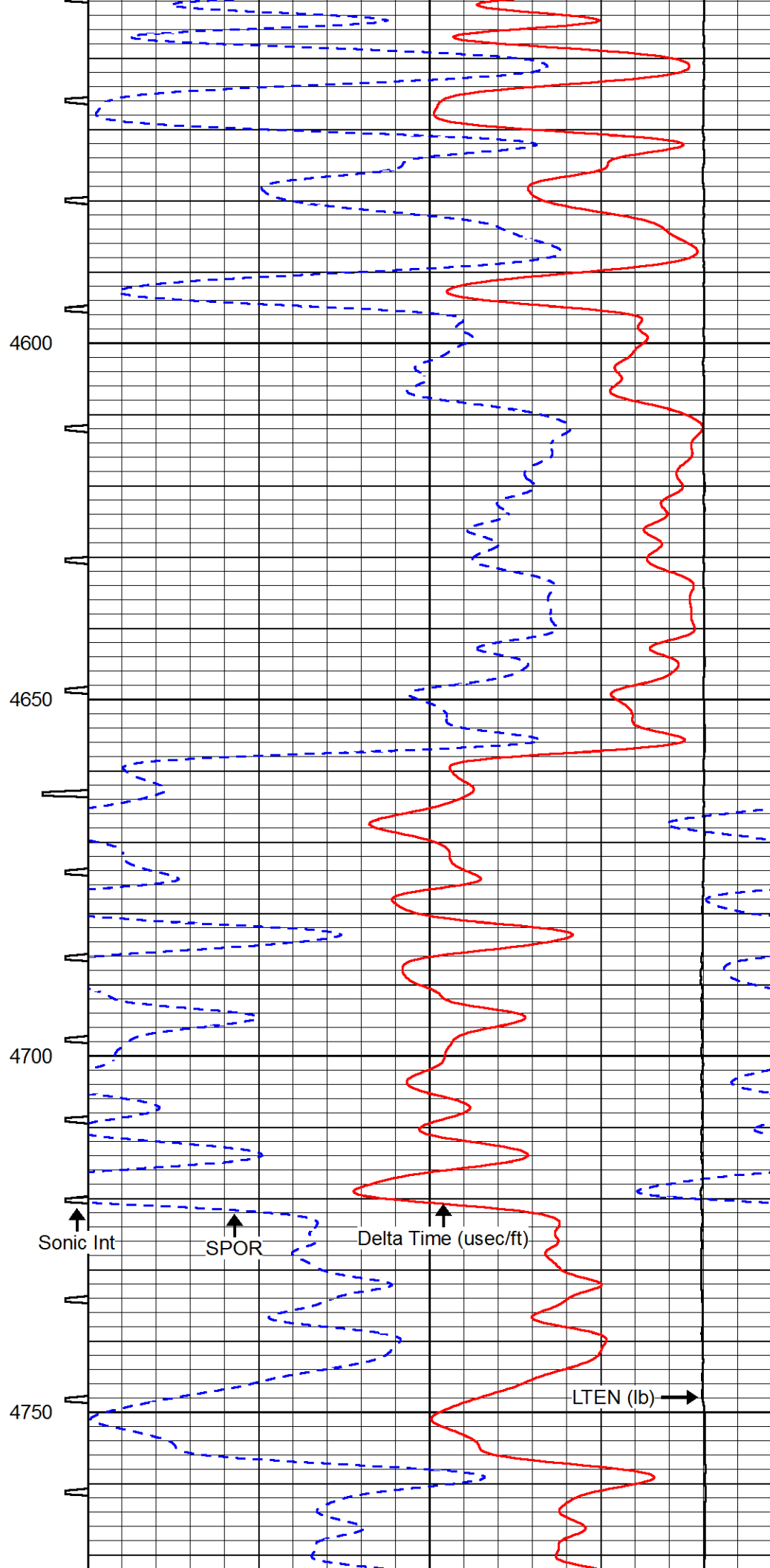
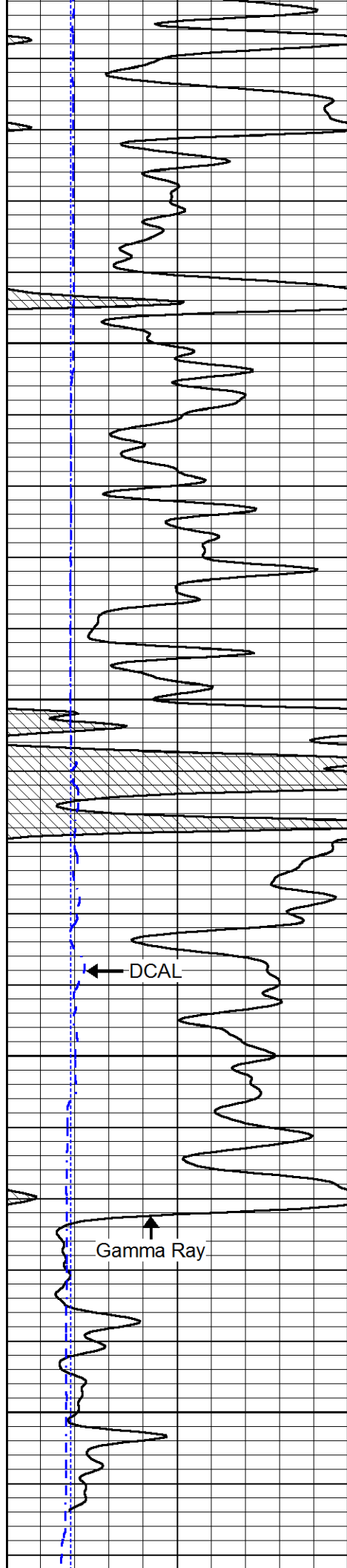


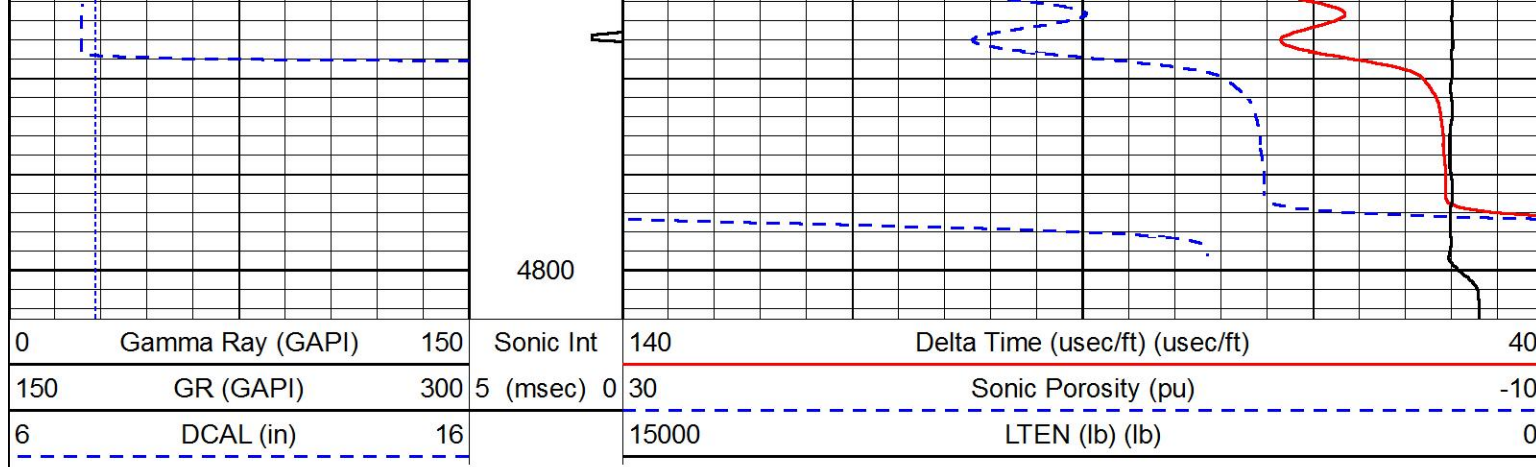






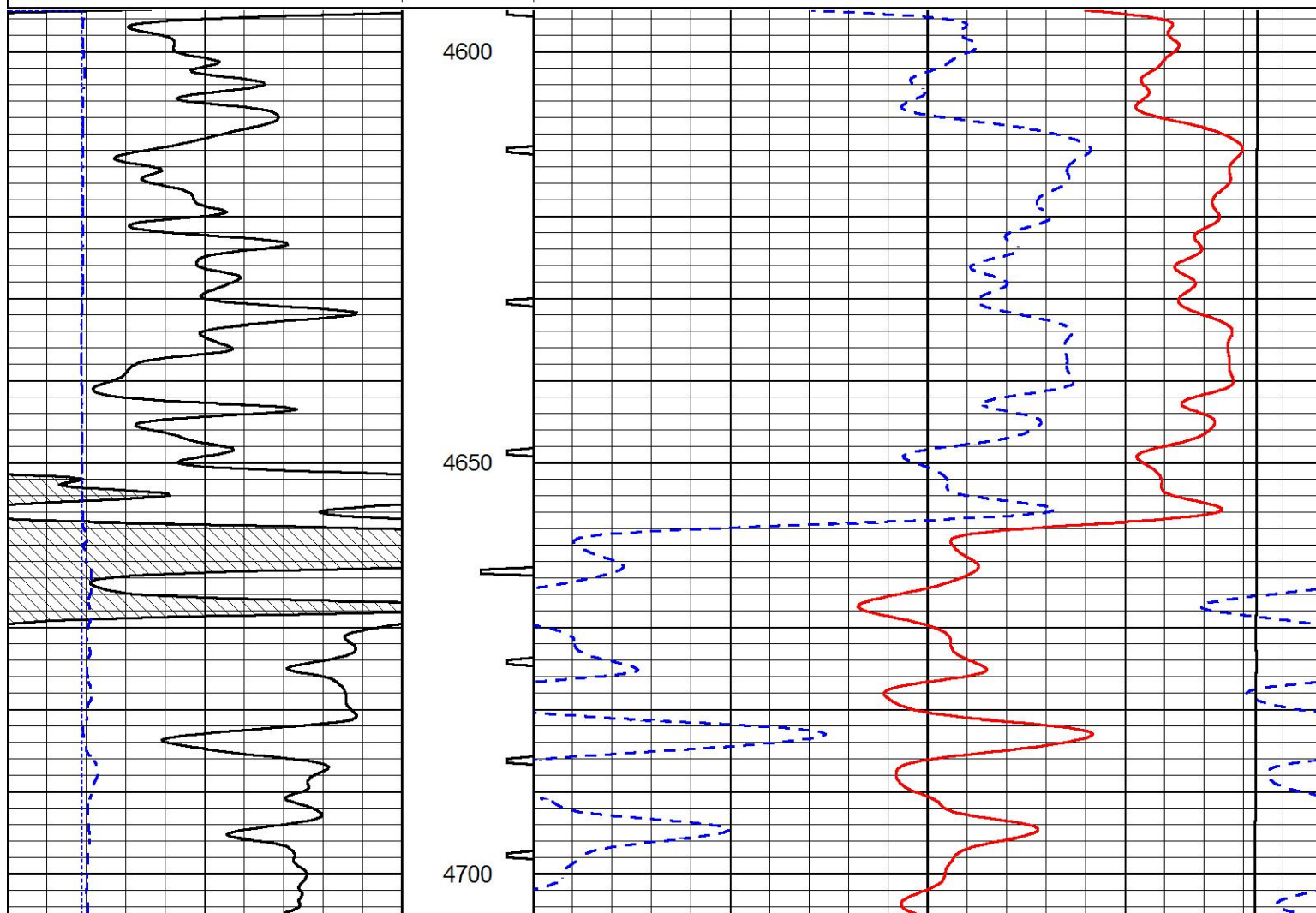


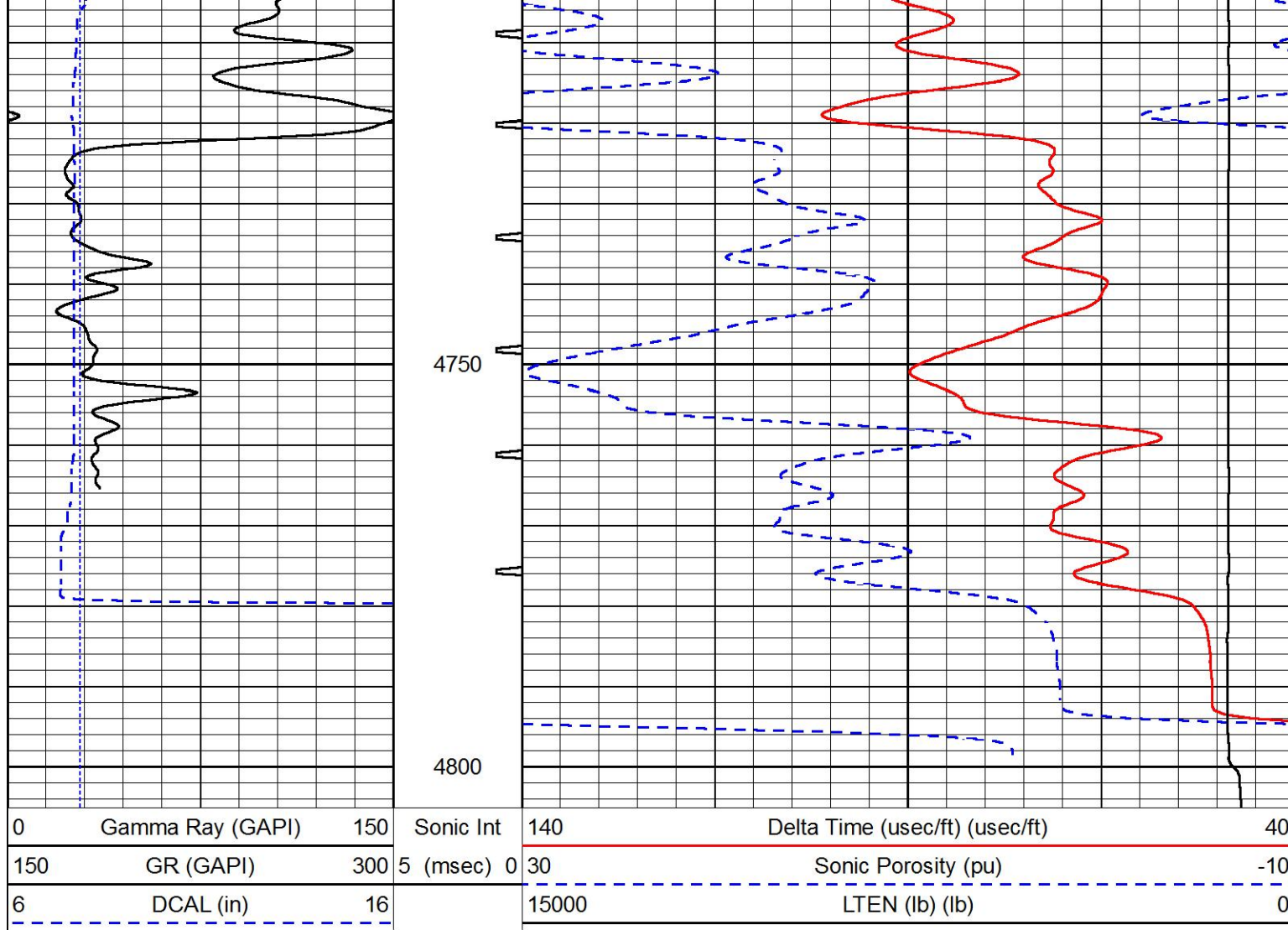




REPEAT SECTION

Database File landmark_gerstberger_unit_1_20.db
 Dataset Pathname stackmel/pass3.1
 Presentation Format _sonic
 Dataset Creation Fri Mar 29 04:23:37 2019
 Charted by Depth in Feet scaled 1:240





	Company	LANDMARK RESOURCES, INC.
	Well	GERSTBERGER UNIT #1-20
	Field	WILDCAT
	County	WICHITA
	State	KANSAS