



SUPERIOR
Hays,
Kansas

**SONIC
LOG**

Company MULL DRILLING COMPANY, INC.
Well THORNBURG "C" #1-4
Field WILDCAT
County NESS State KANSAS

Company MULL DRILLING CO., INC.
Well THORNBURG "C" #1-4
Field WILDCAT
County NESS
State KANSAS

Location: API #: 15-135-25121
694' FNL & 1421' FEL
SEC 4 TWP 16S RGE 26W
Permanent Datum GROUND LEVEL Elevation 2575
Log Measured From KELLY BUSHING 9' A.G.L.
Drilling Measured From KELLY BUSHING
Other Services
CDL/CNL/PE
DIL/MEL
Elevation
K.B. 2584
D.F.
G.L. 2575

Date	8-25-10
Run Number	TW0
Depth Driller	4600
Depth Logger	4600
Bottom Logged Interval	4593
Top Log Interval	210
Casing Driller	222
Casing Logger	222
Bit Size	7.875
Type Fluid in Hole	CHEMICAL MUD
Density / Viscosity	9.3 / 53
pH / Fluid Loss	10.5 / 8.8
Source of Sample	FLOWLINE
Rm @ Meas. Temp	1.00 @ 96F
Rmf @ Meas. Temp	0.75 @ 96F
Rmc @ Meas. Temp	1.20 @ 96F
Source of Rmf / Rmc	MEASURED
Rm @ BHT	.790 @ 121F
Time Circulation Stopped	3 HOURS
Time Logger on Bottom	1:30 P.M.
Maximum Recorded Temperature	121F
Equipment Number	860
Location	HAYS, KS.
Recorded By	RUPP
Witnessed By	KEVIN KESSLER

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All interpretations are opinions based on inferences from electrical or other measurements and we cannot and do not guarantee the accuracy or correctness of any interpretation, and we shall not, except in the case of gross or willful negligence on our part, 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. These interpretations are also subject to our general terms and conditions set out in our current Price Schedule.

Comments

SUPERIOR WELL SERVICES
785-628-6395
THANK YOU FOR YOUR BUSINESS
DIRECTIONS: UTICA, S EDGE AT RD."D", 4N TO THE T IN THE RD., 2W, S INTO.

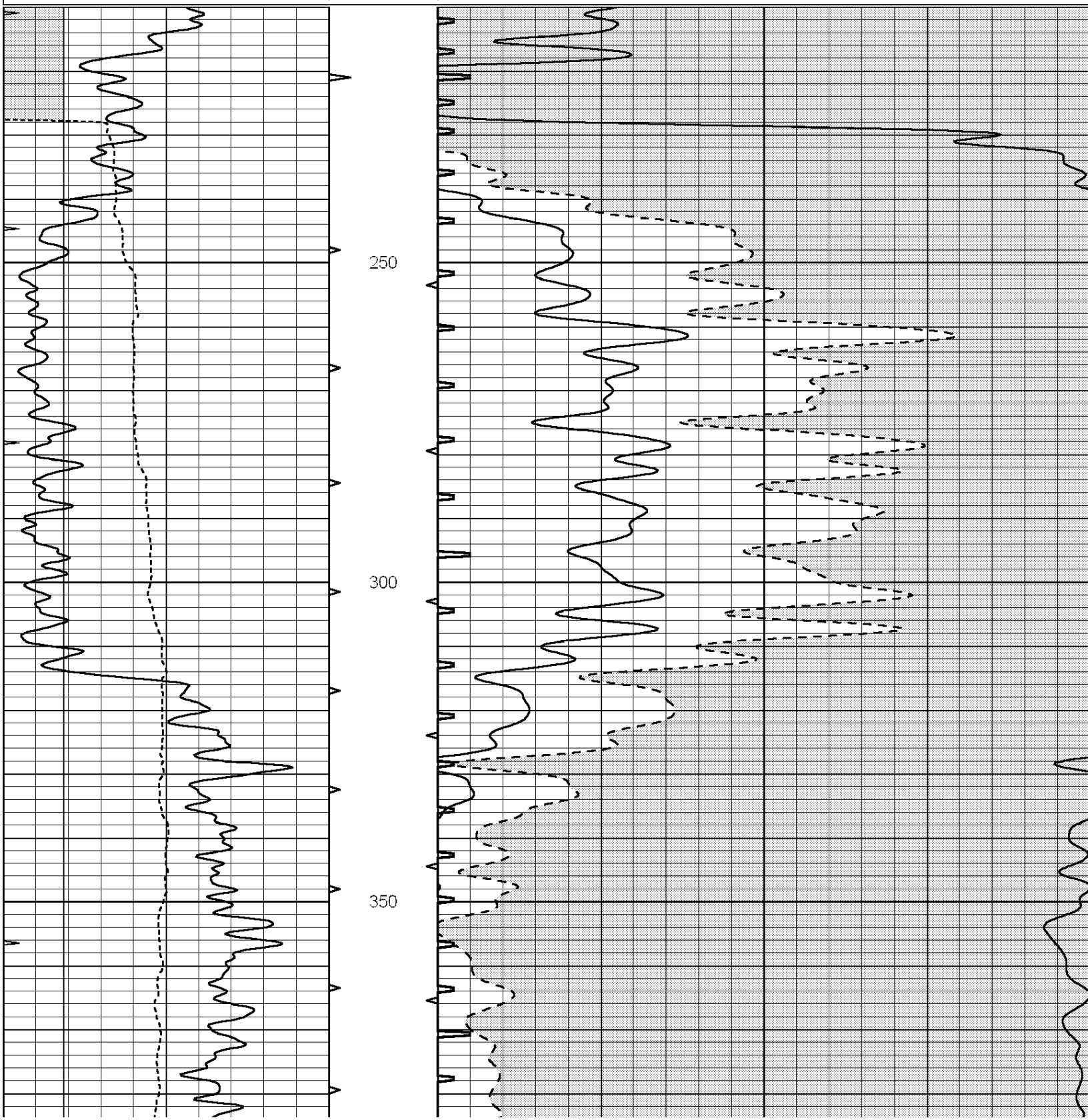


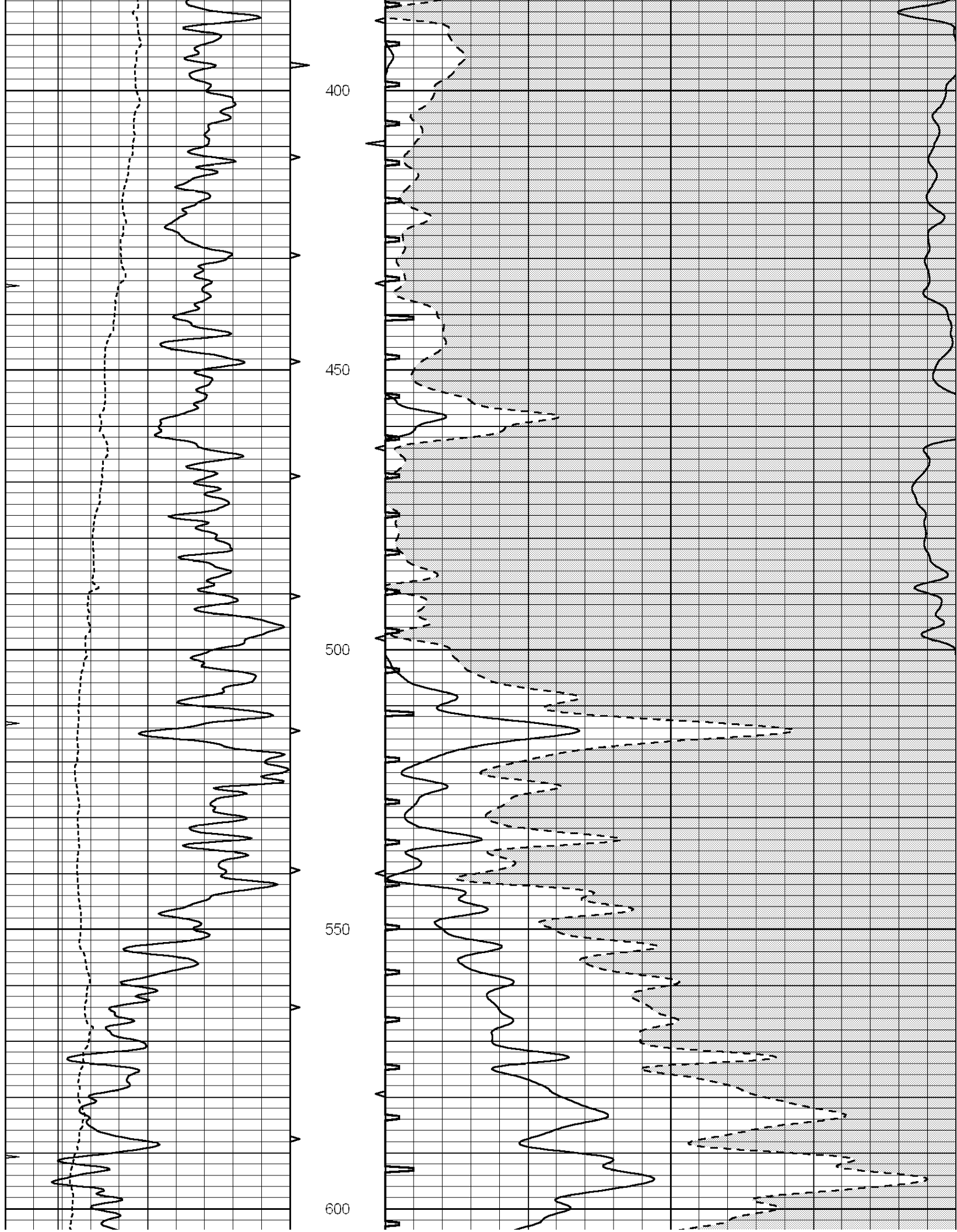
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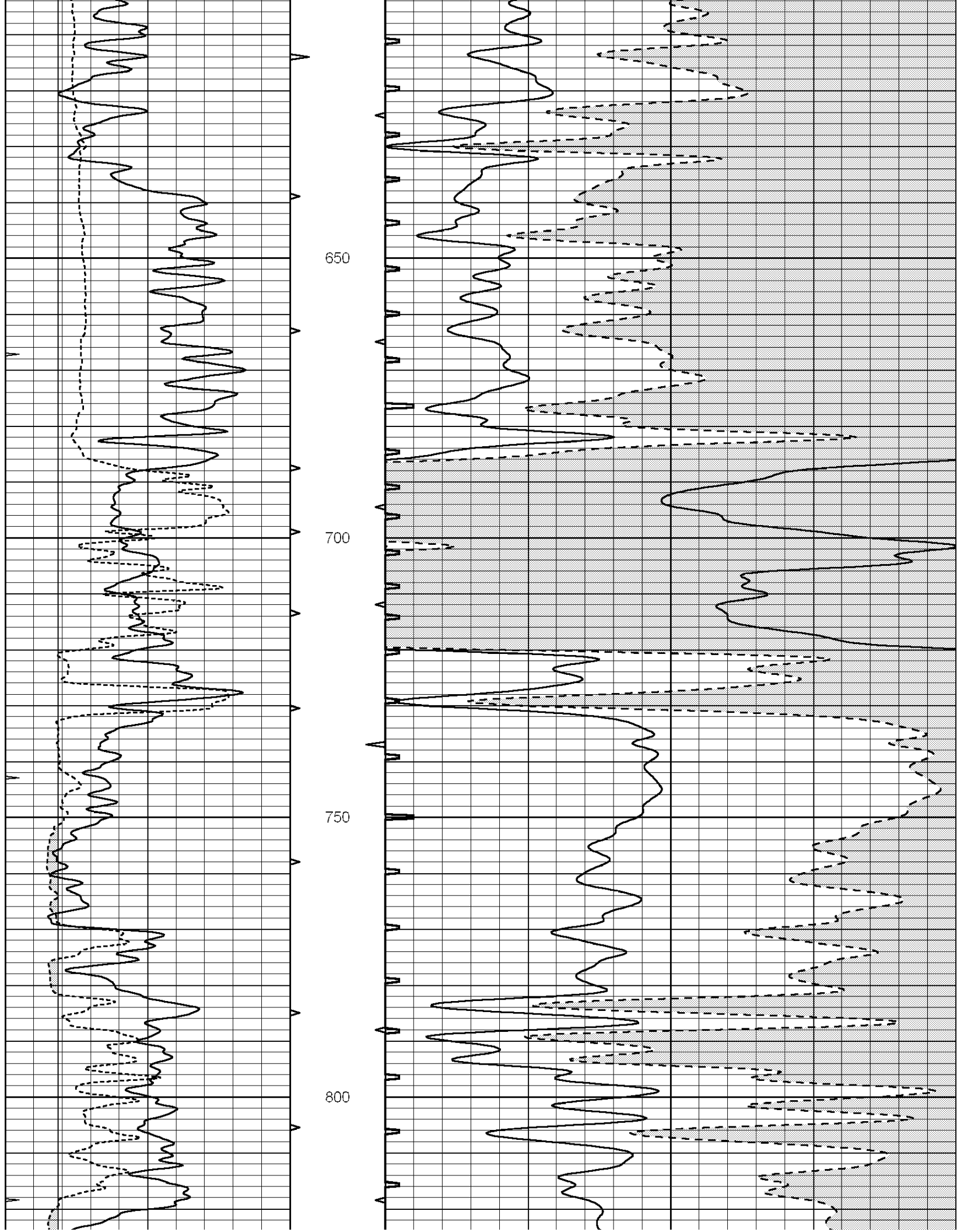
MAIN SECTION

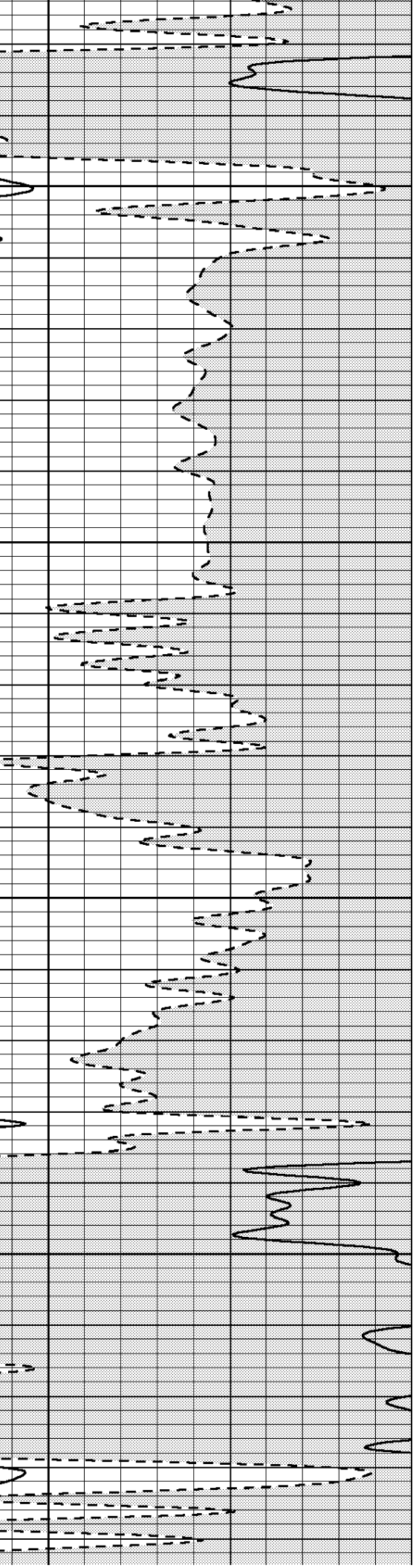
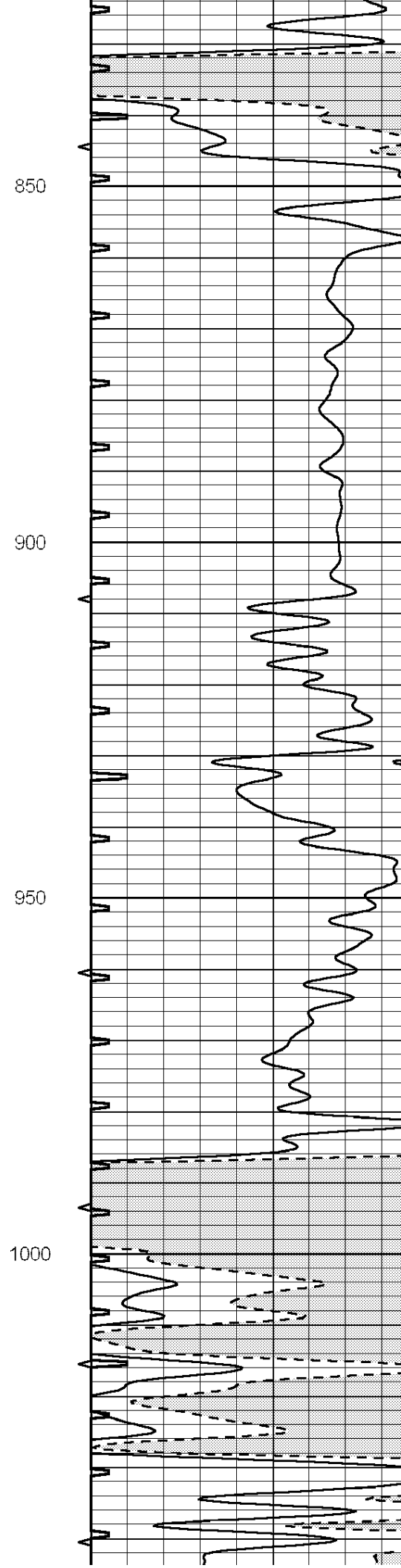
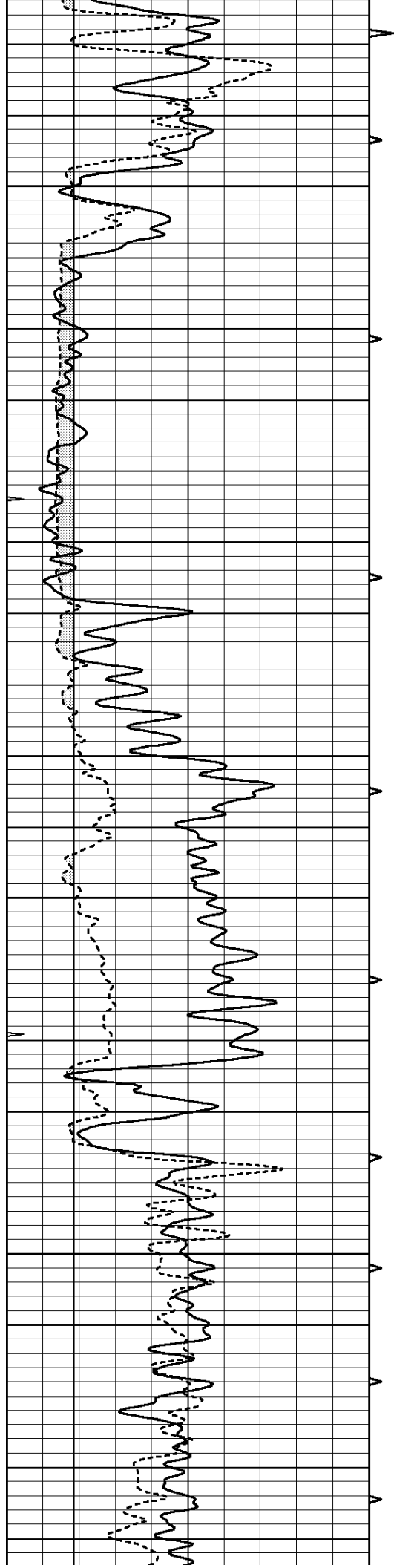
Database File: 005649pdn.db
 Dataset Pathname: pass6.1
 Presentation Format: slt
 Dataset Creation: Wed Aug 25 17:51:00 2010
 Charted by: Depth in Feet scaled 1:240

0	GAMMA RAY (GAPI)	150	ABHV	140	DELTA TIME (usec/ft)	40
6	CALIPER (in)	16	10 (ft3)	0 30	SONIC POROSITY (pu)	-10
0	MINMK	20	TBHV	0	ITT (msec)	20
			0 (ft3)	10		







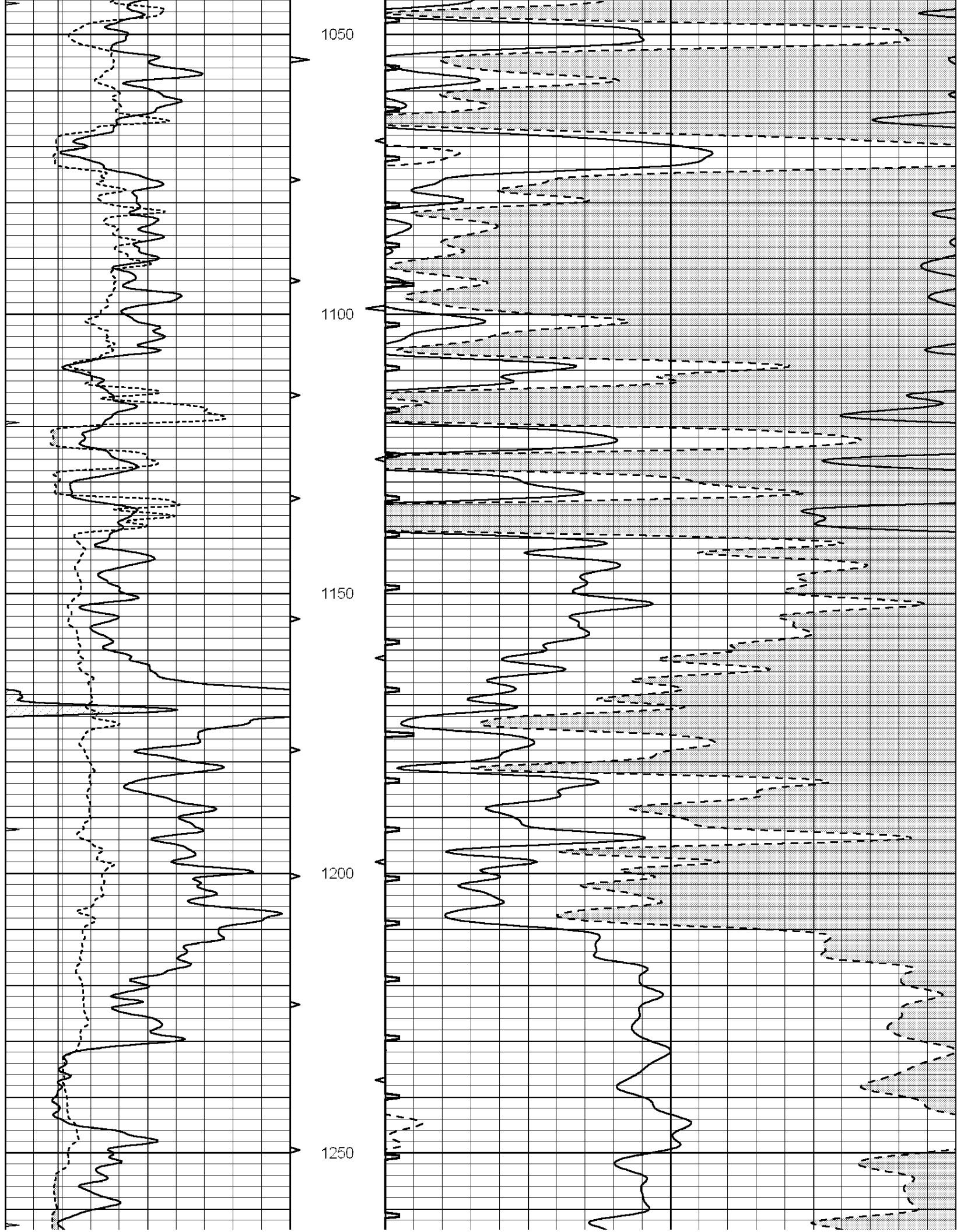


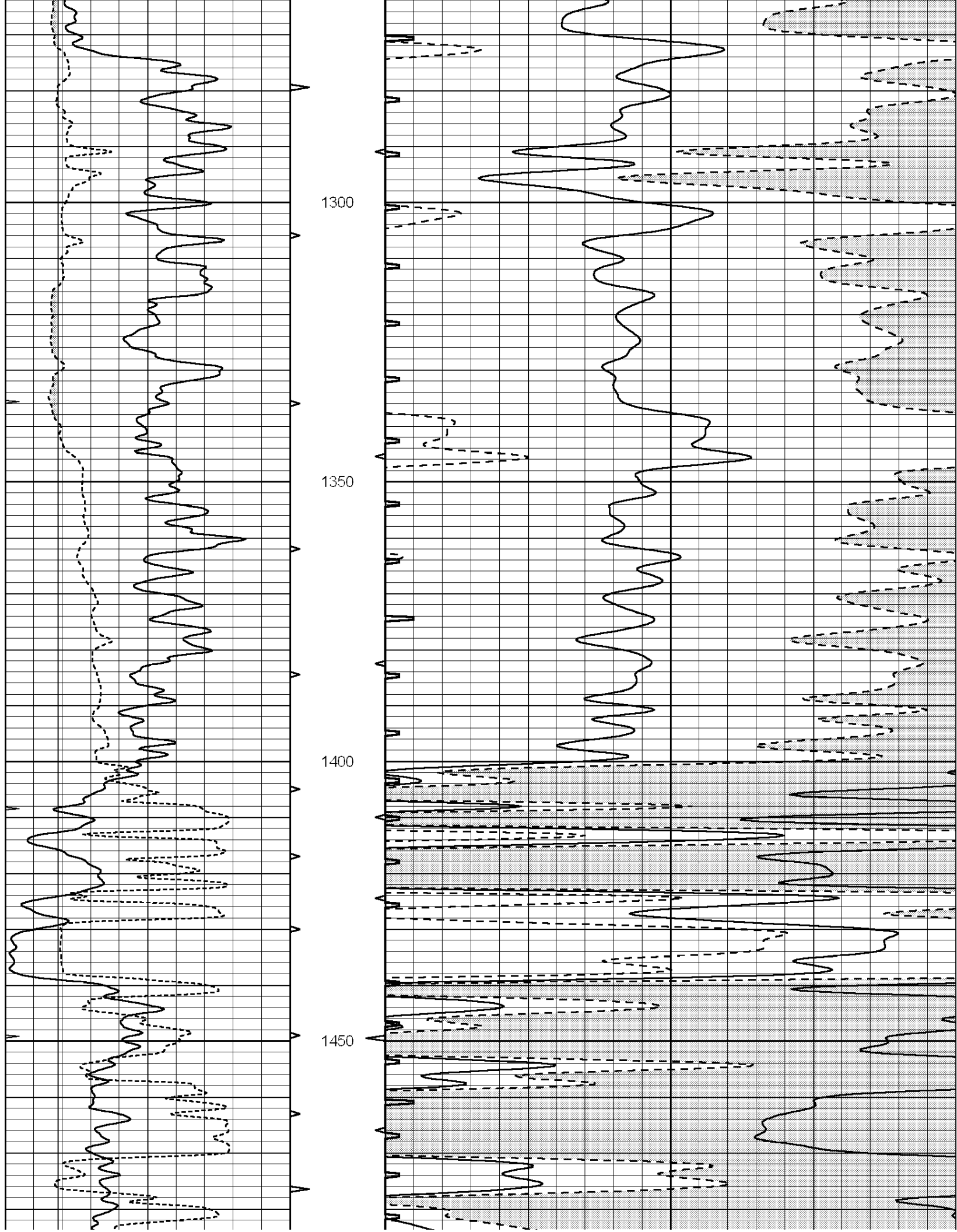
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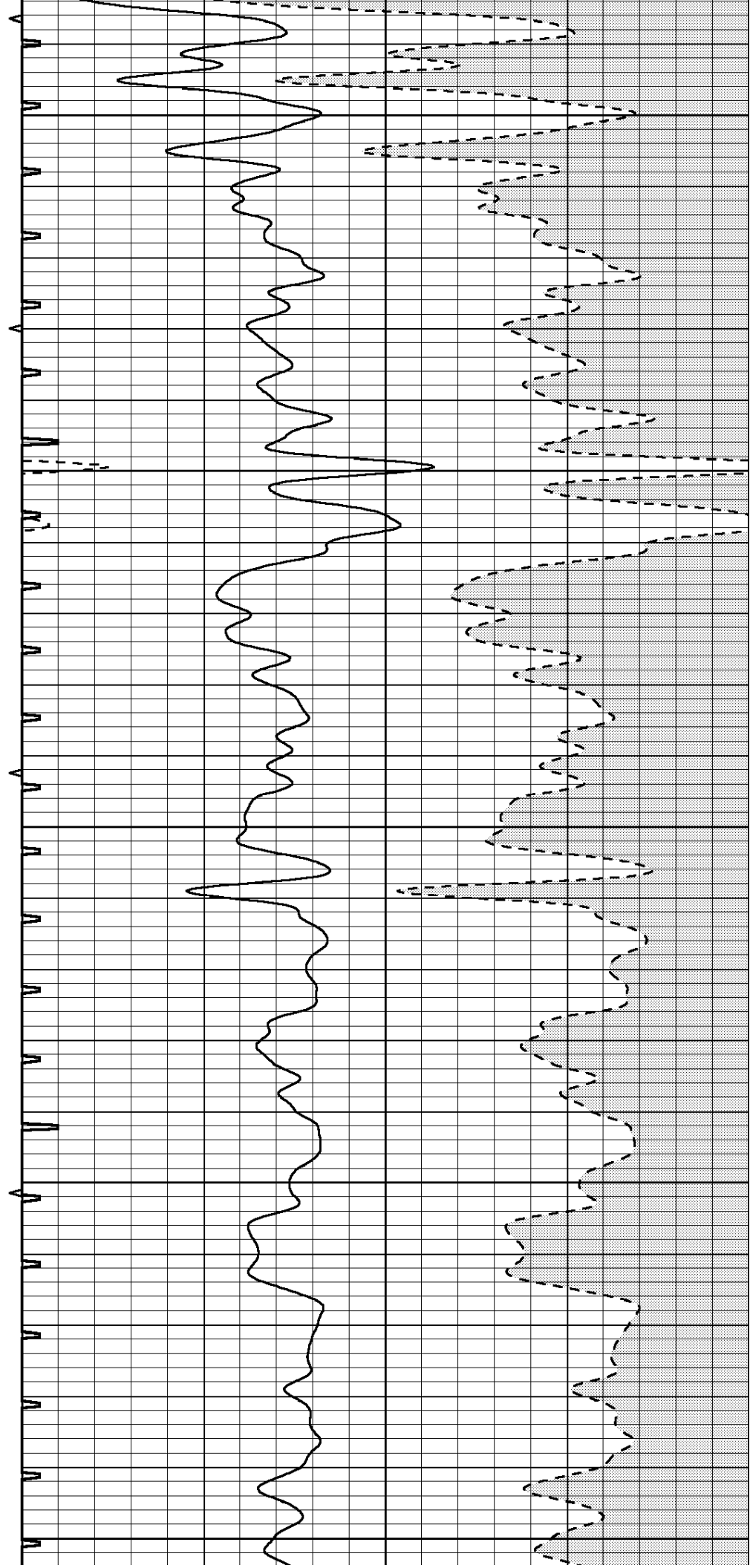
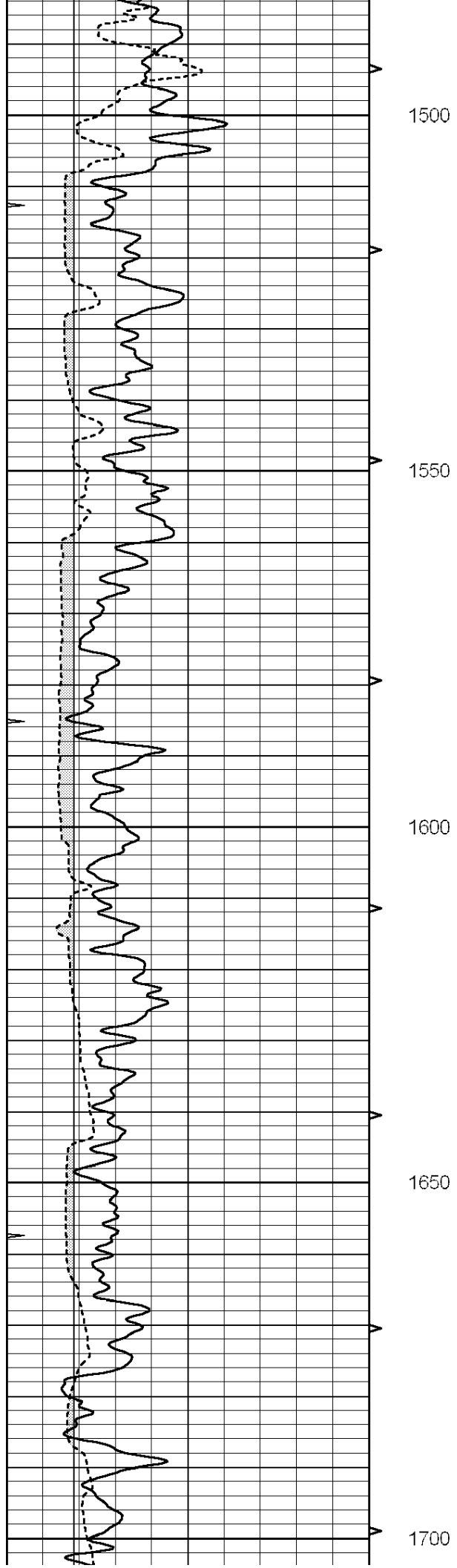
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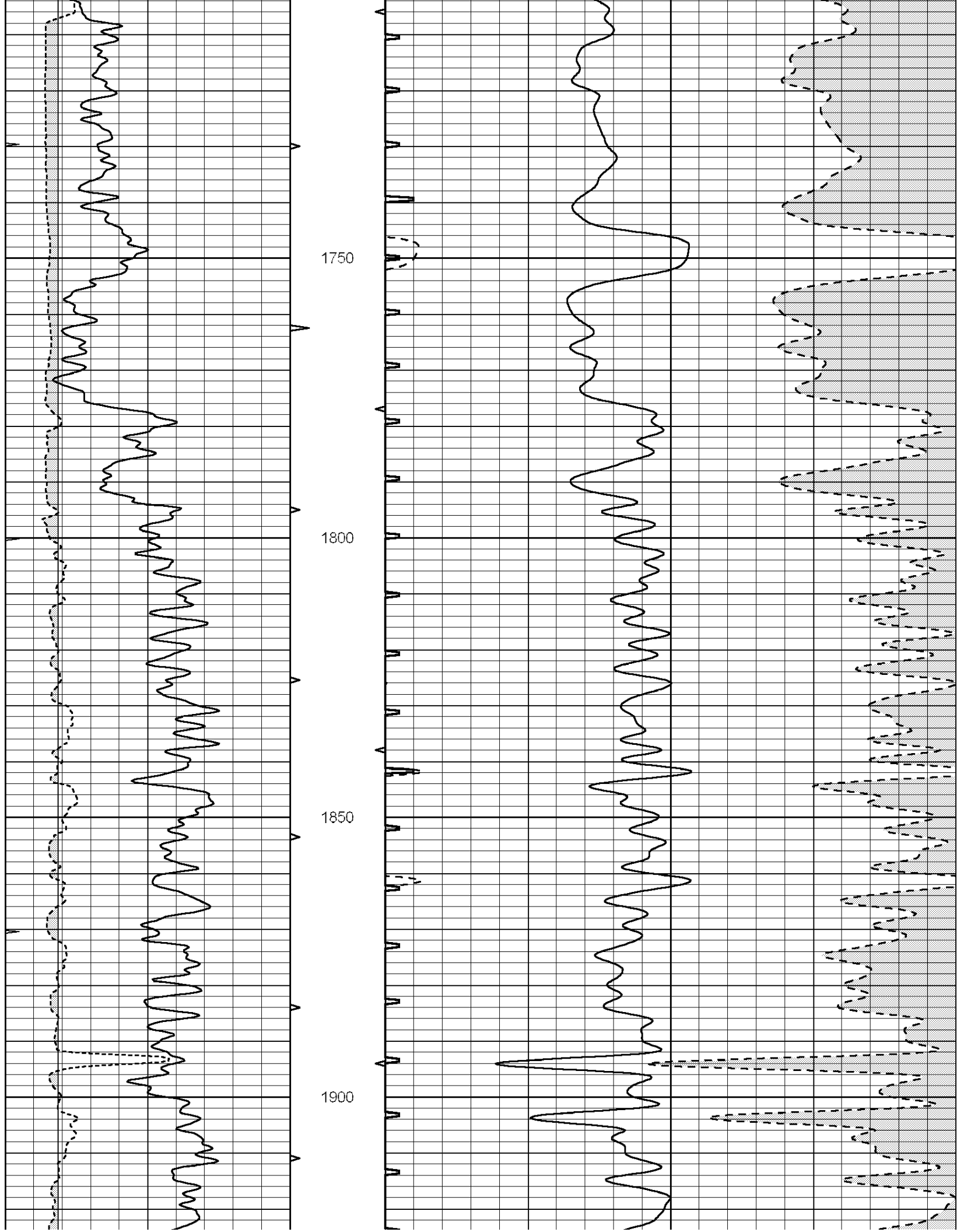
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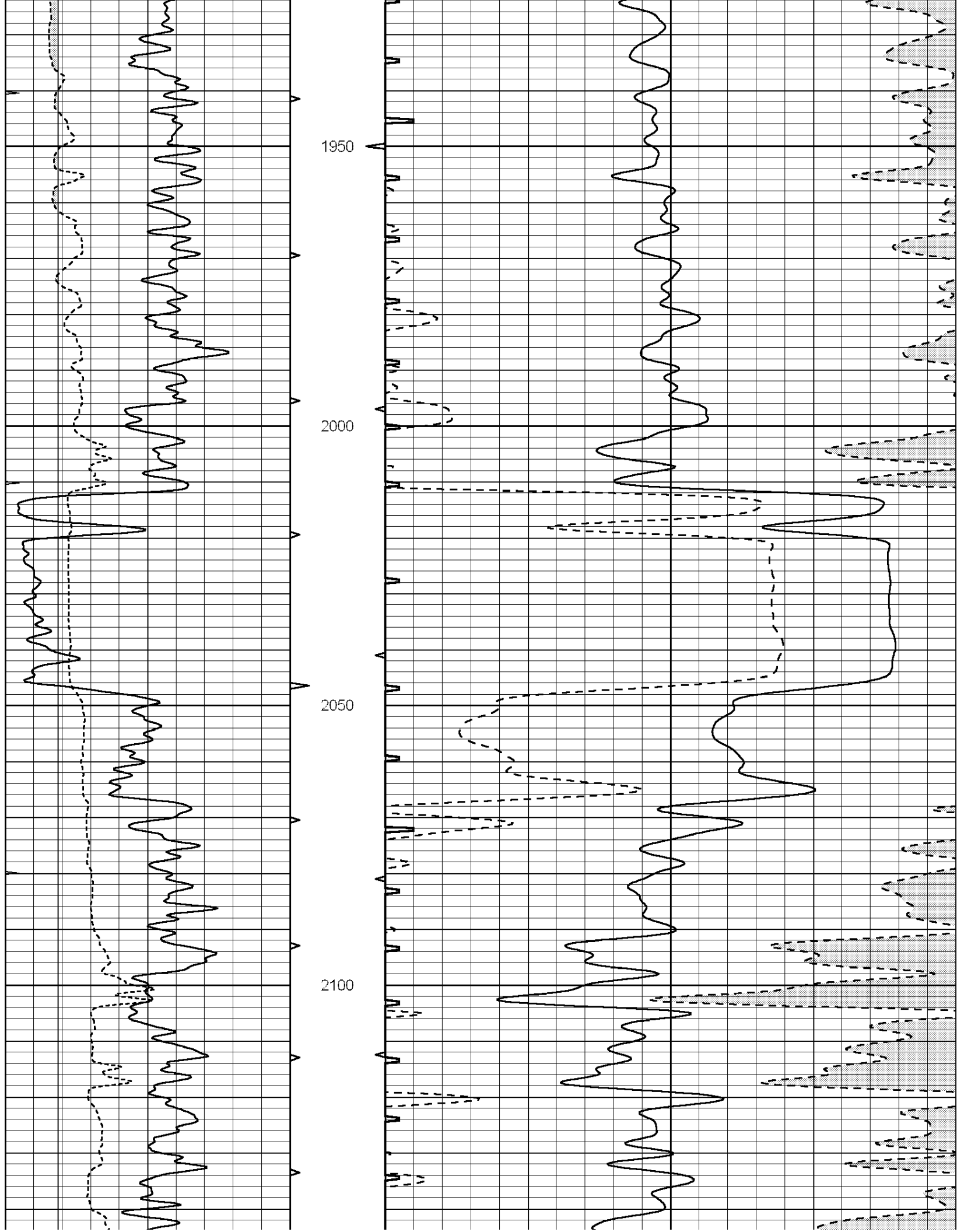
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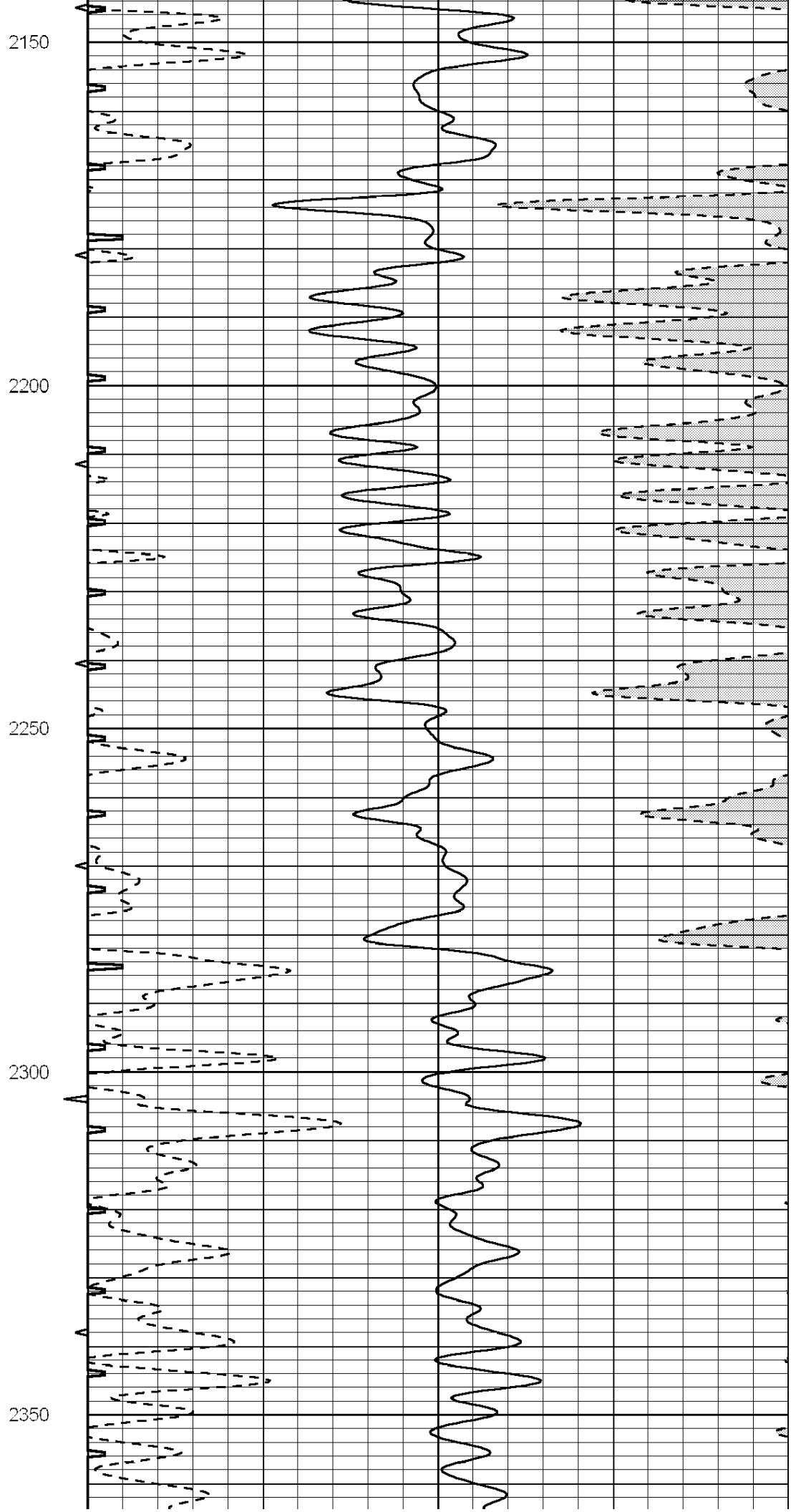
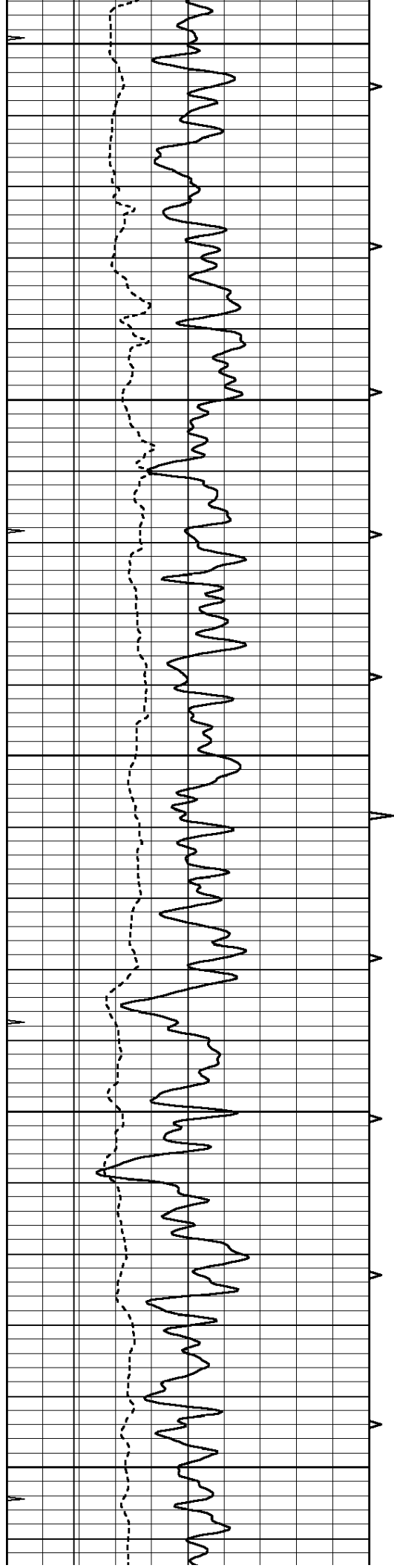


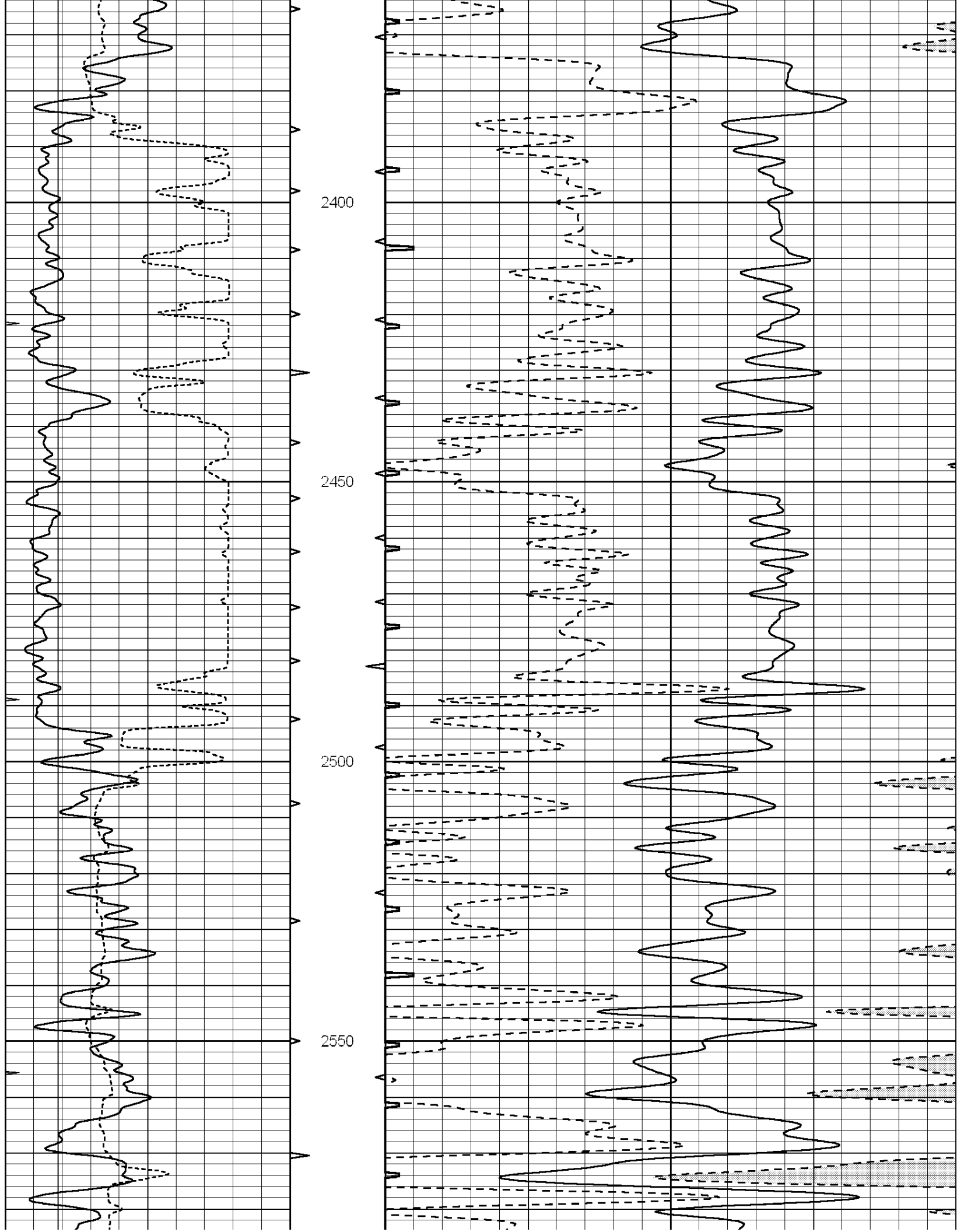


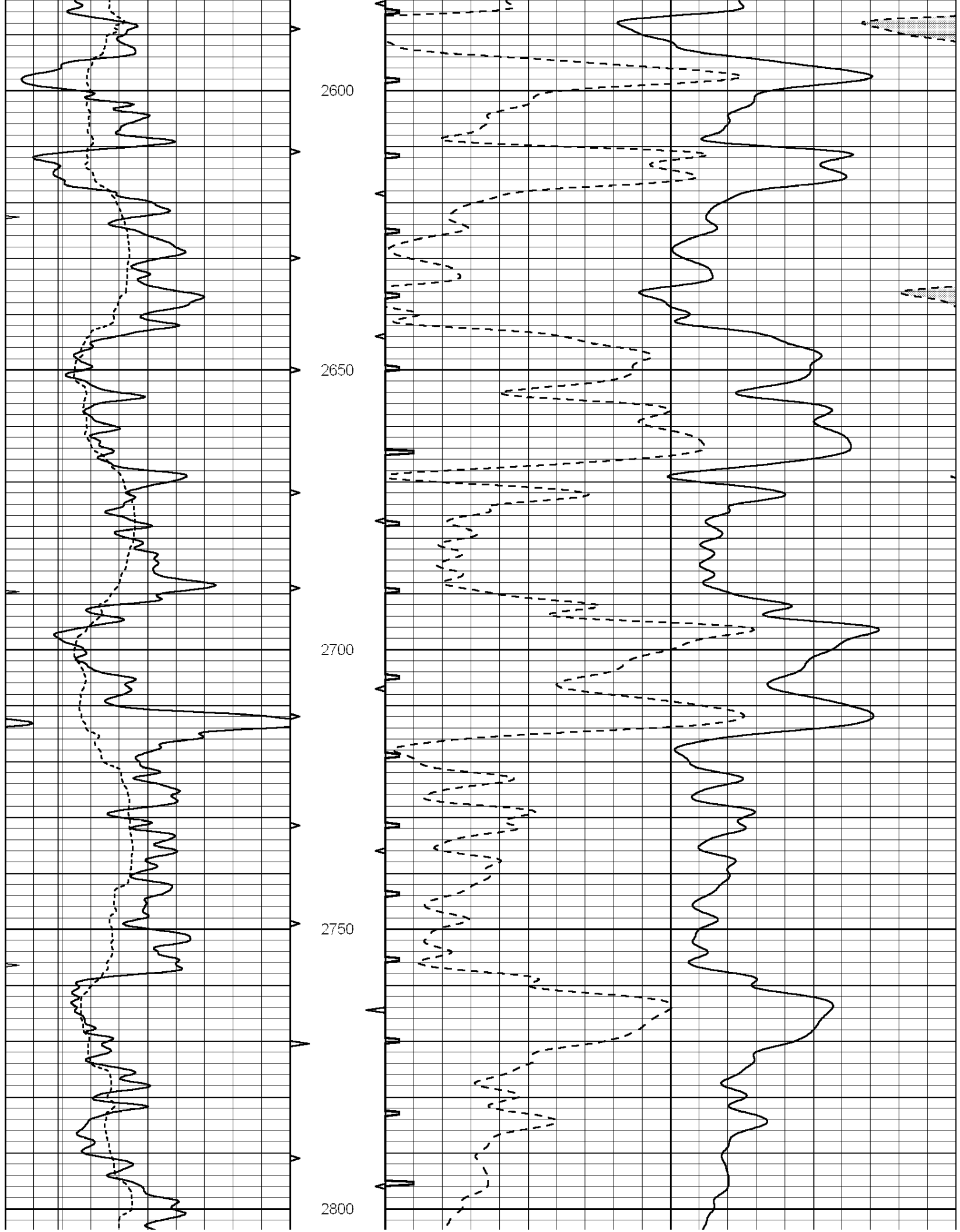


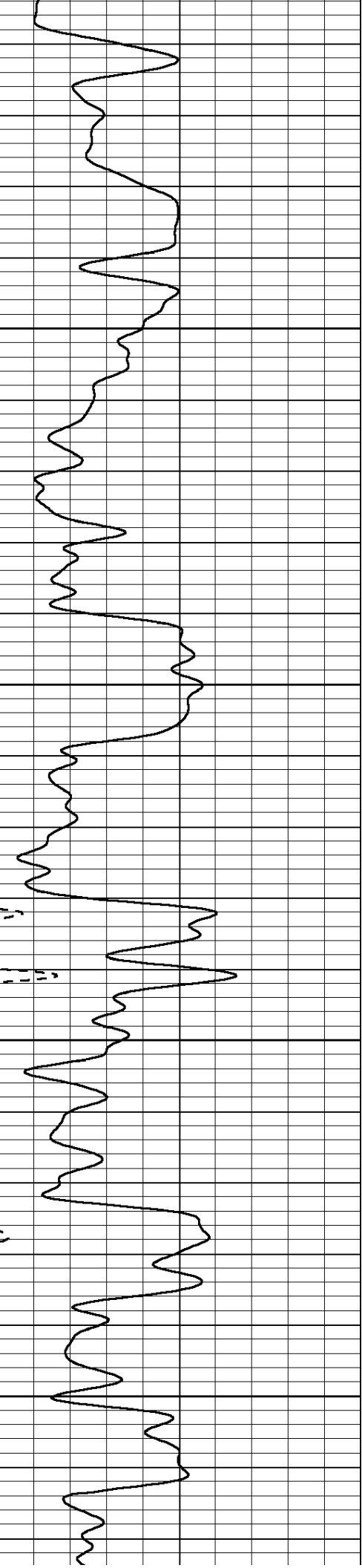
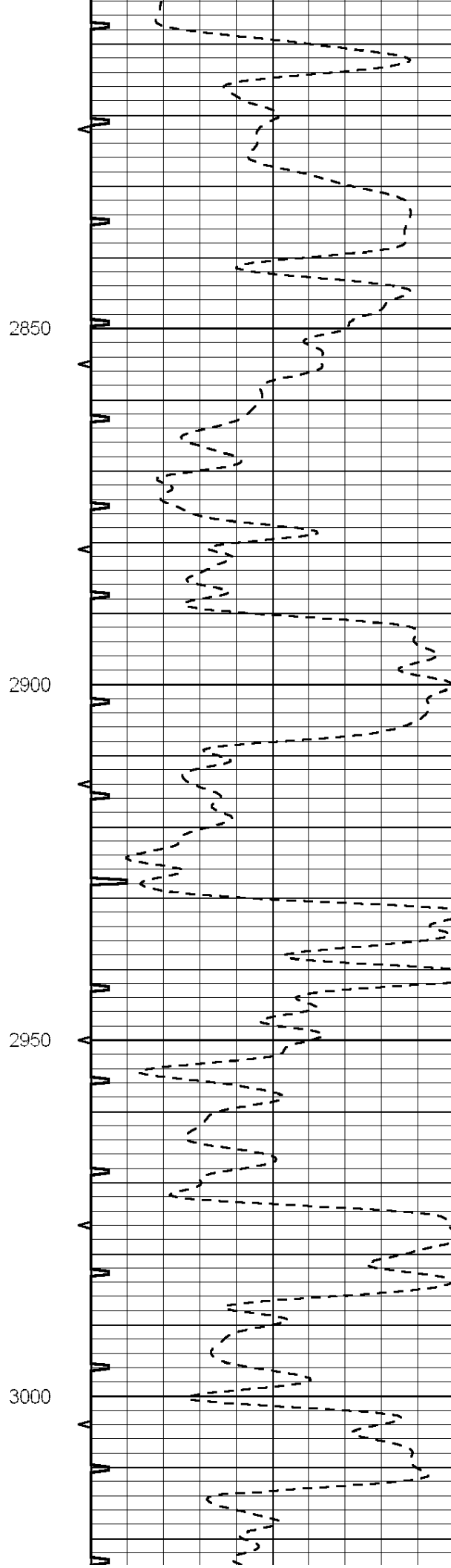
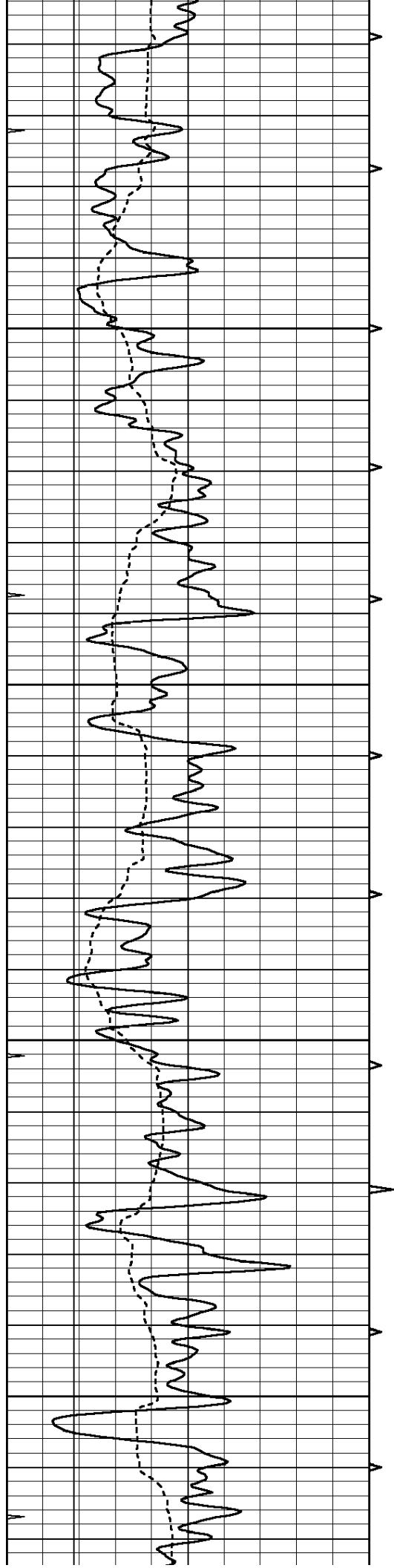


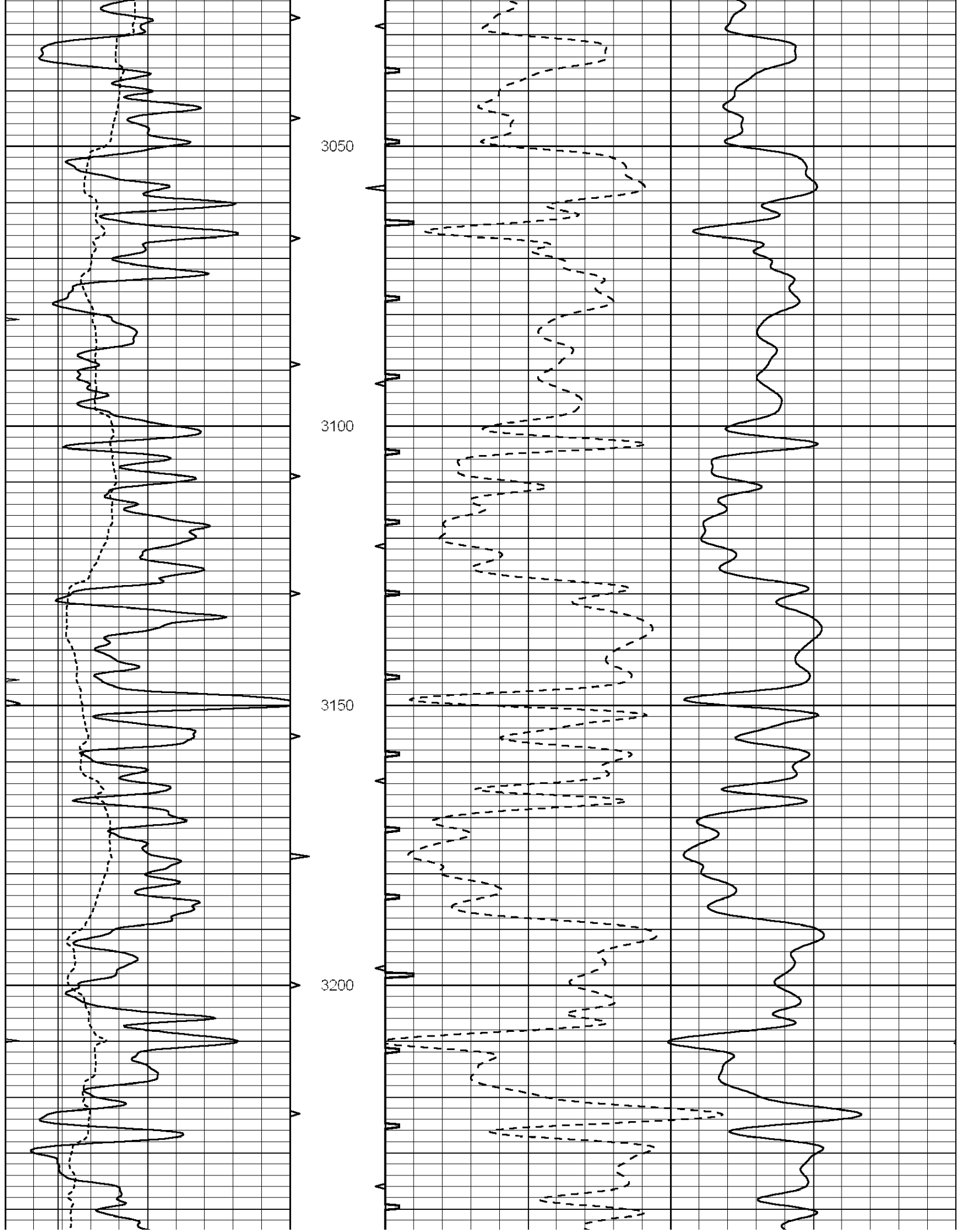


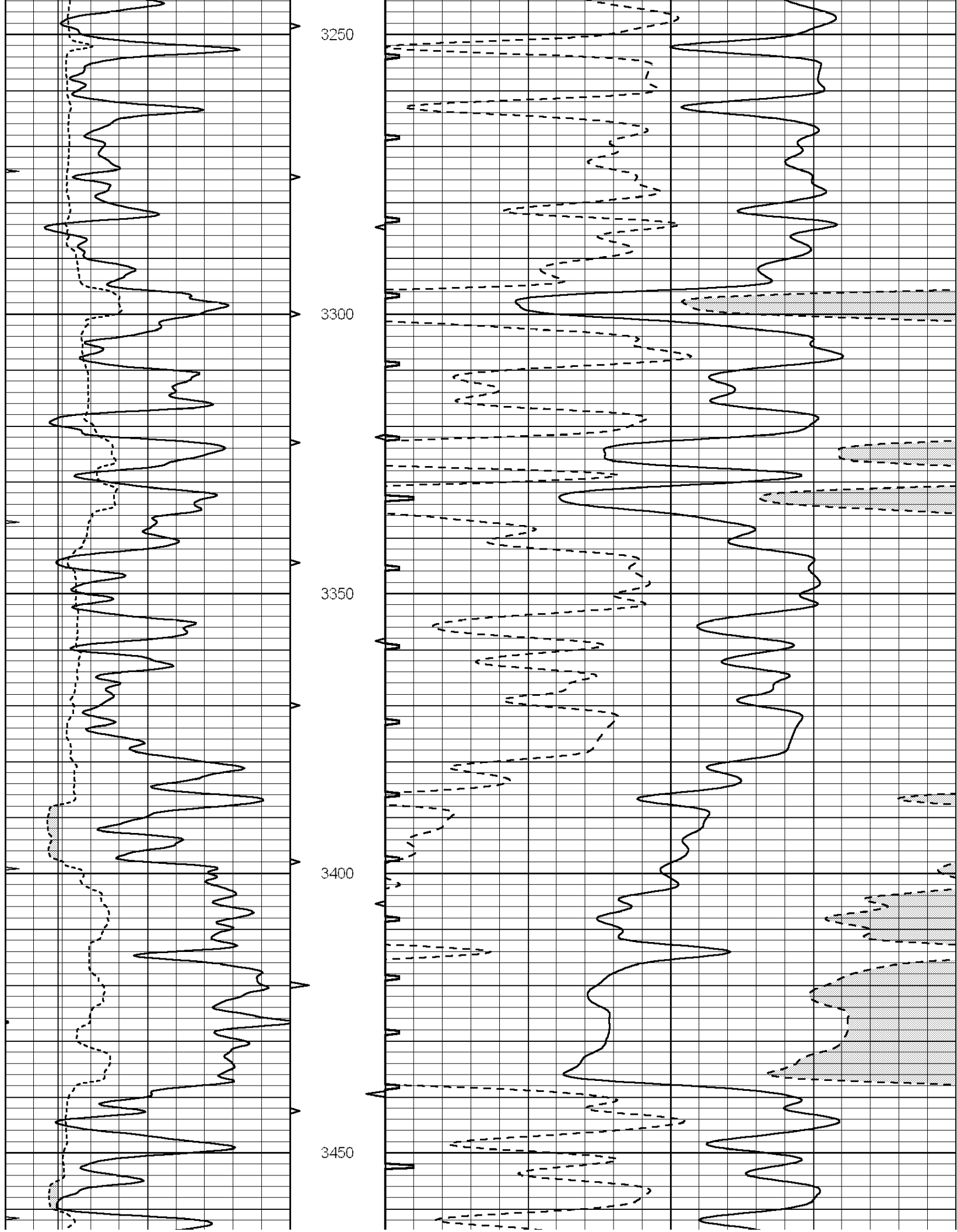


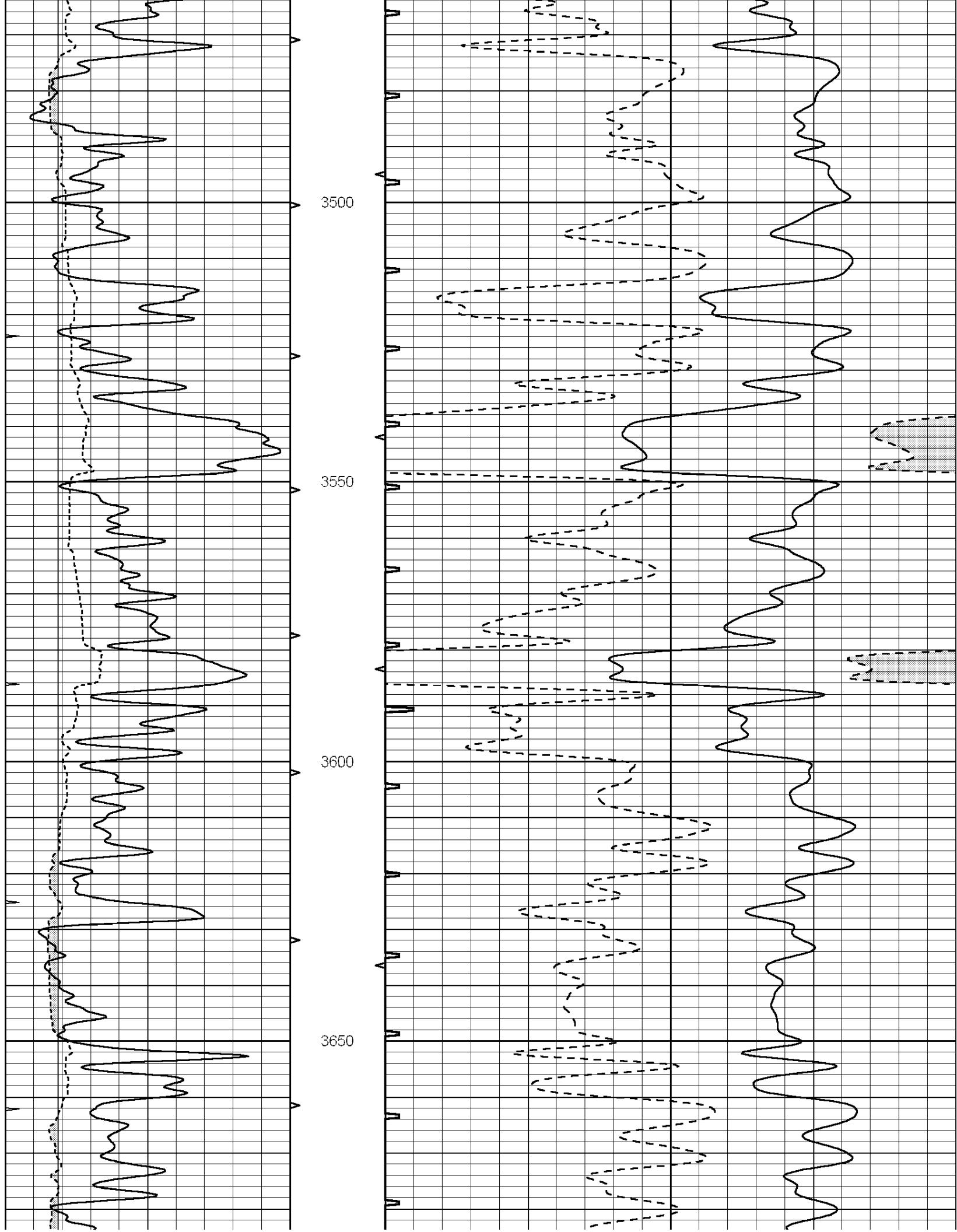


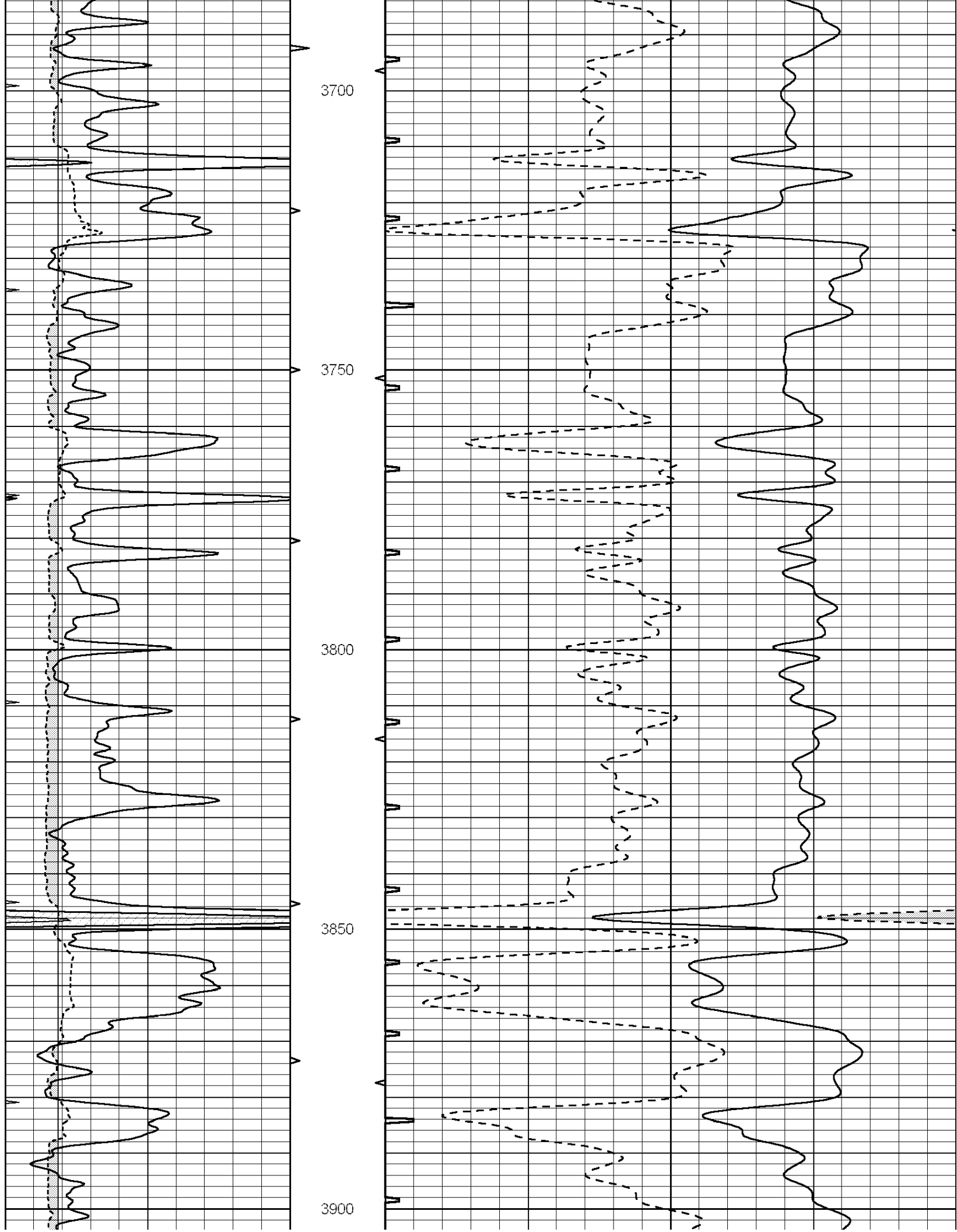


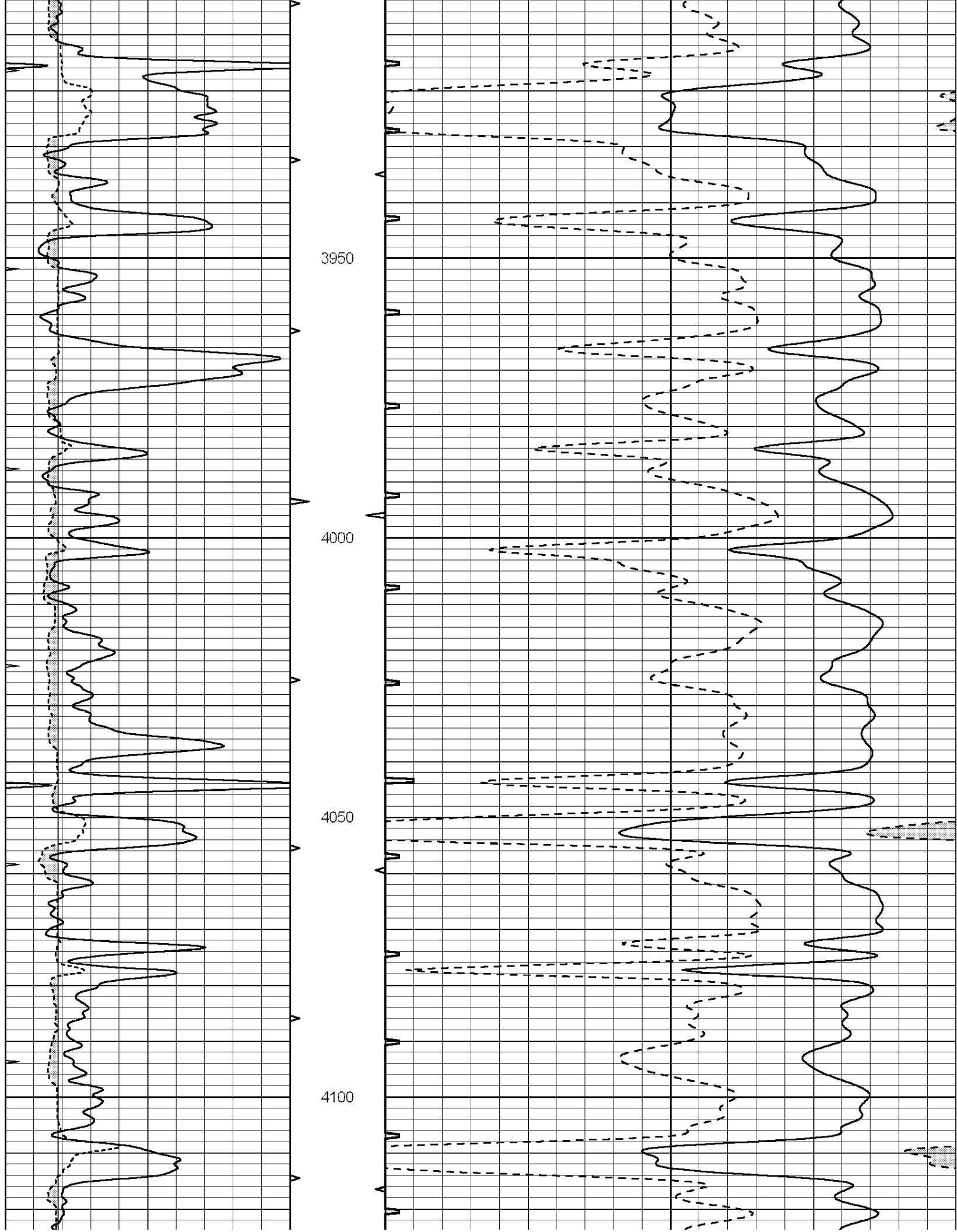


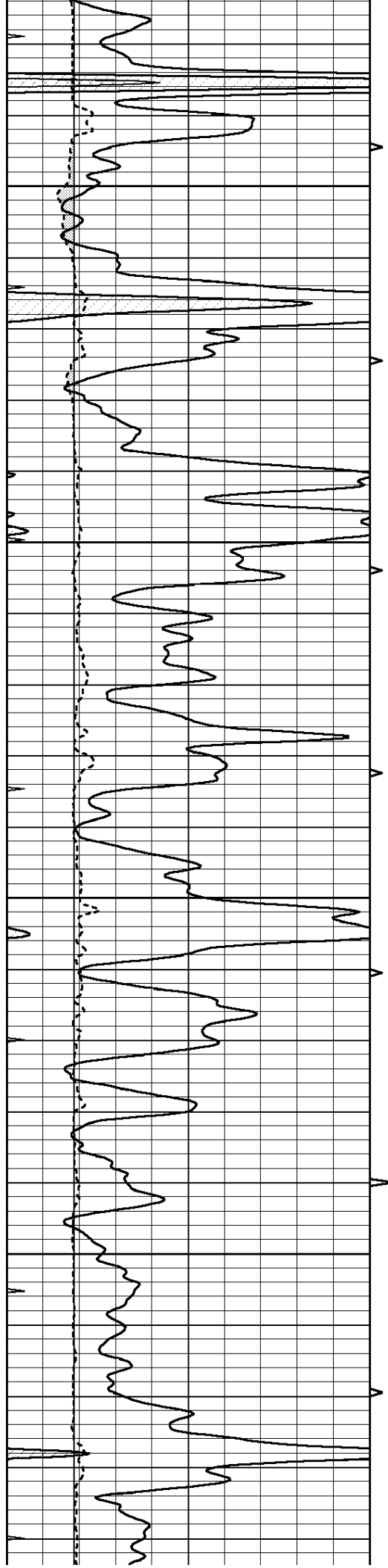










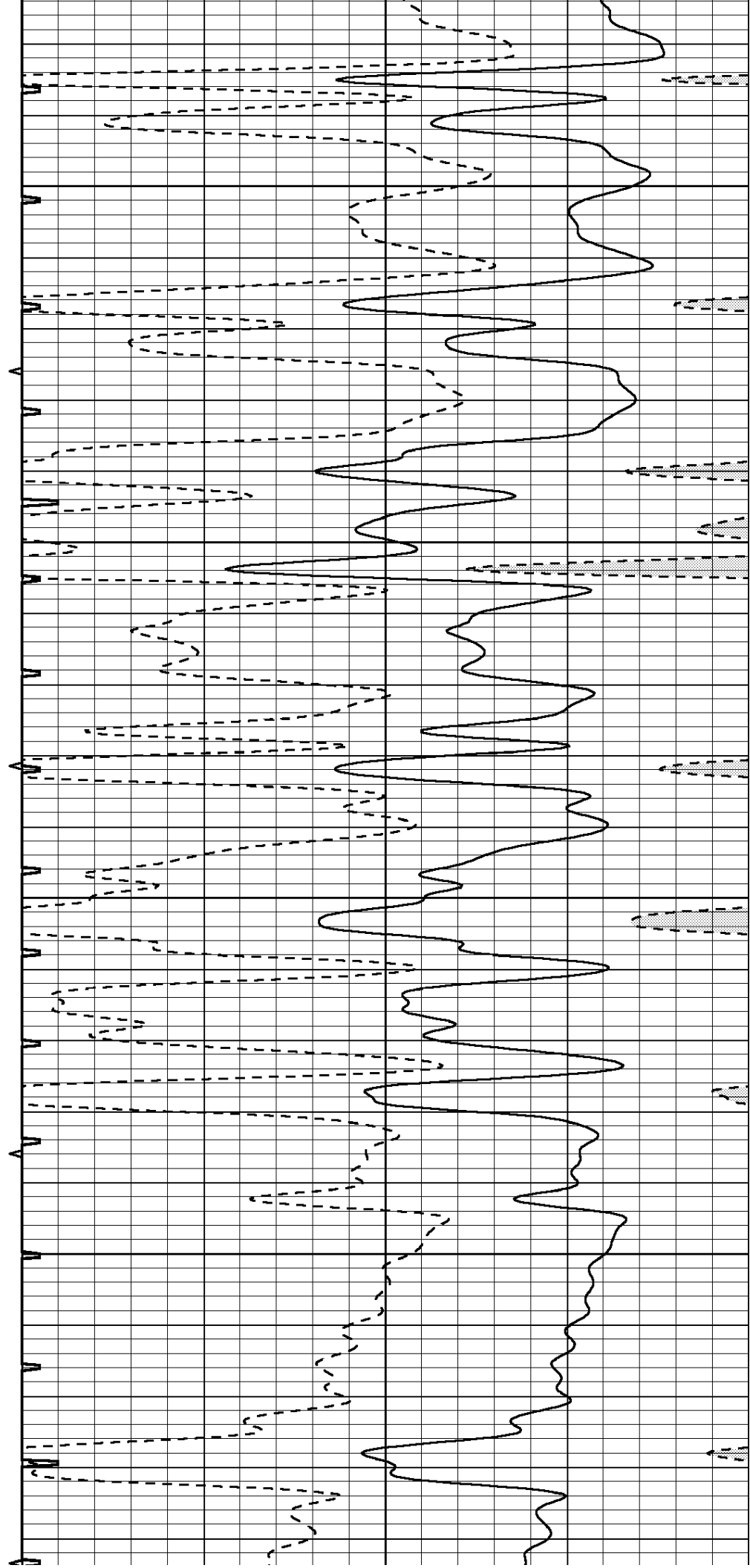


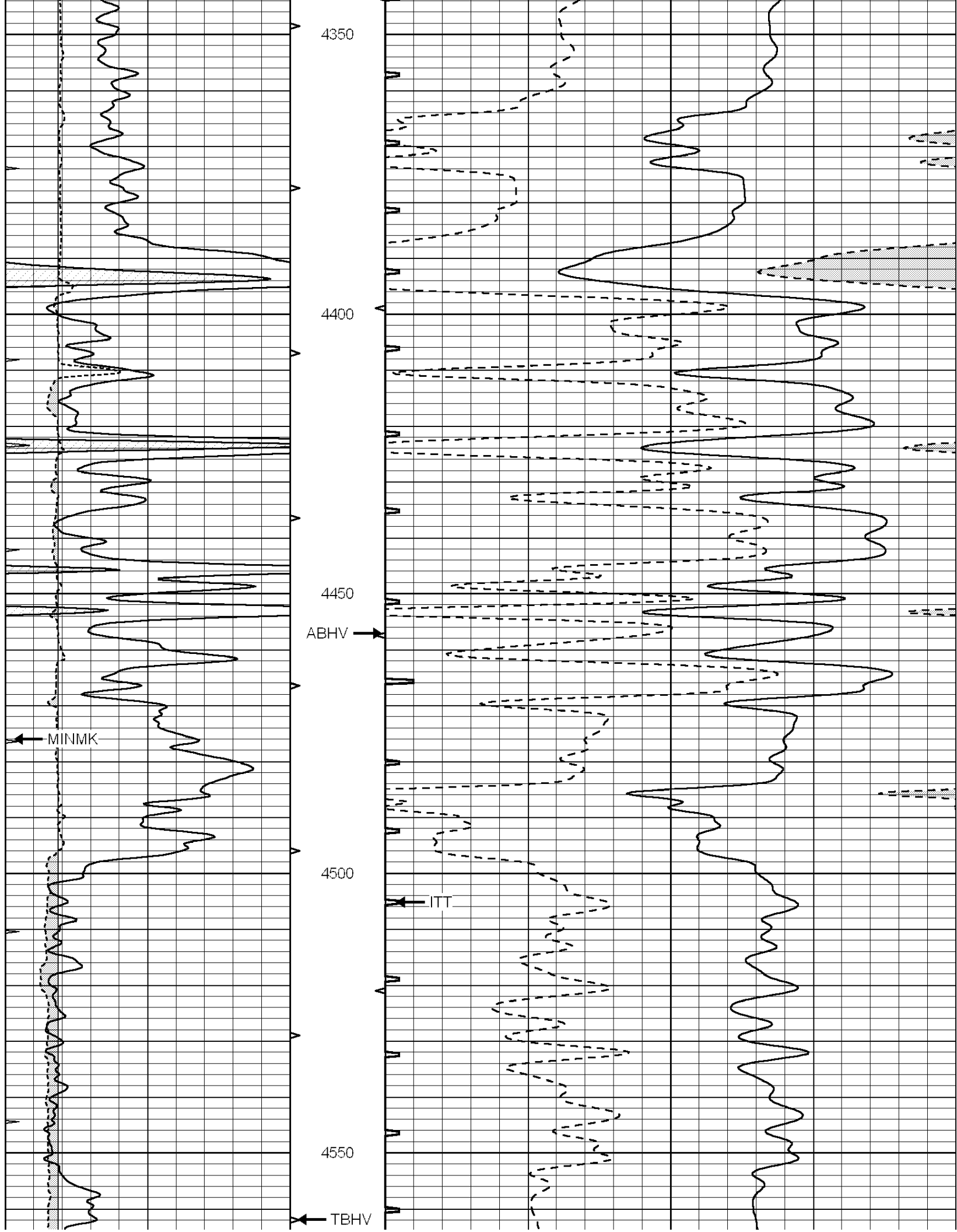
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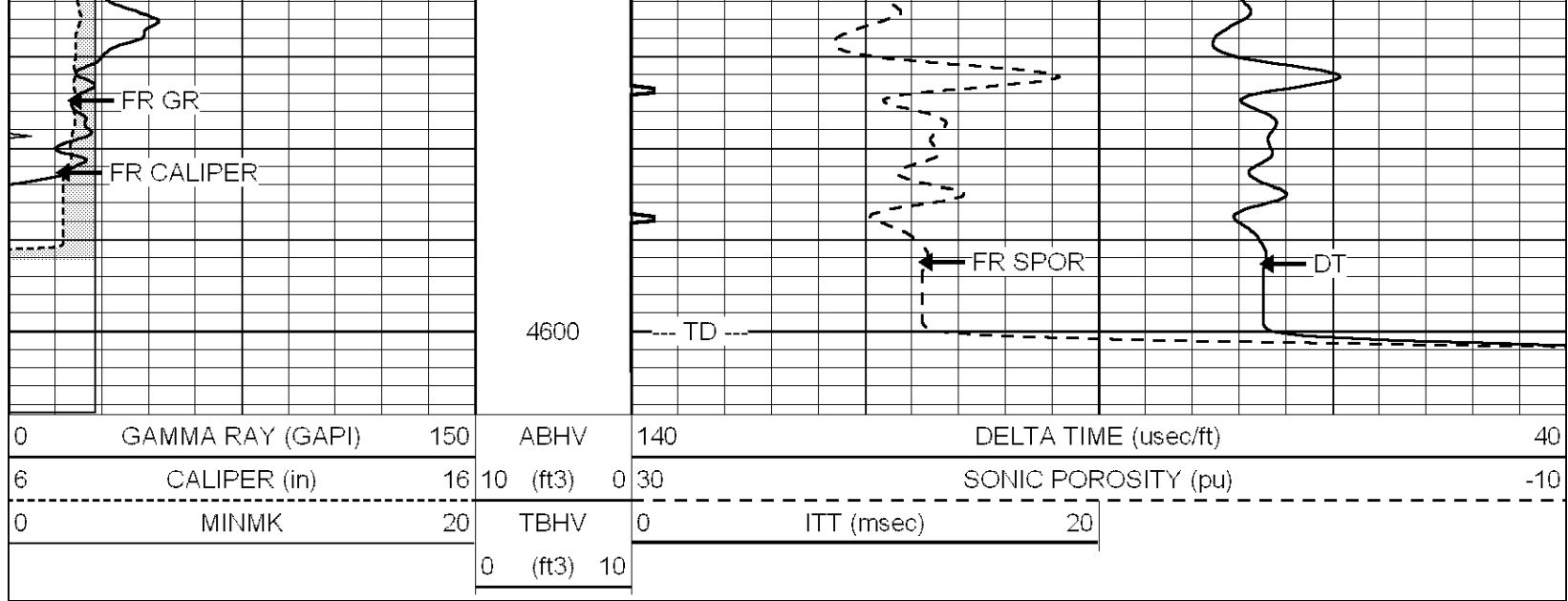
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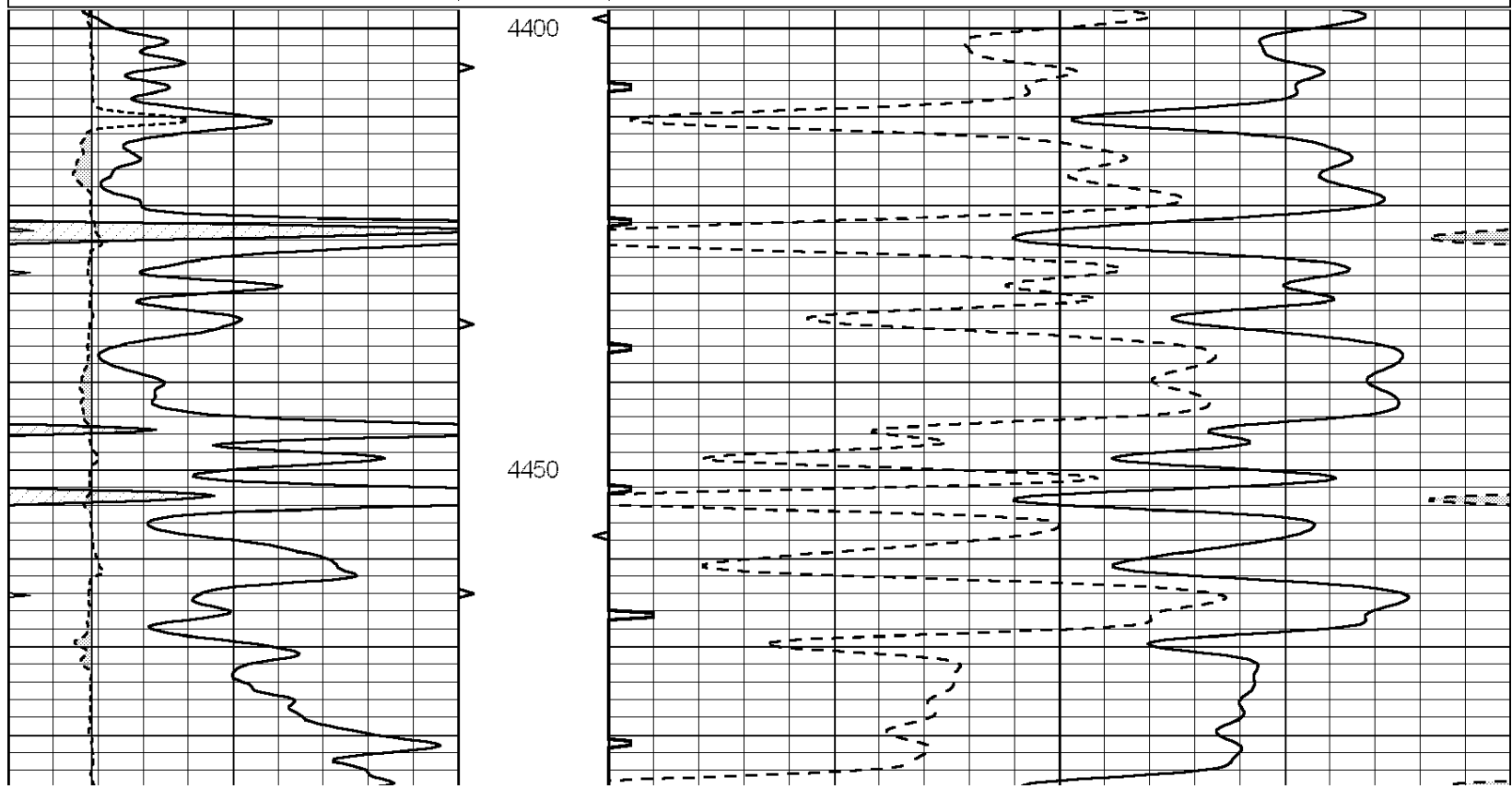


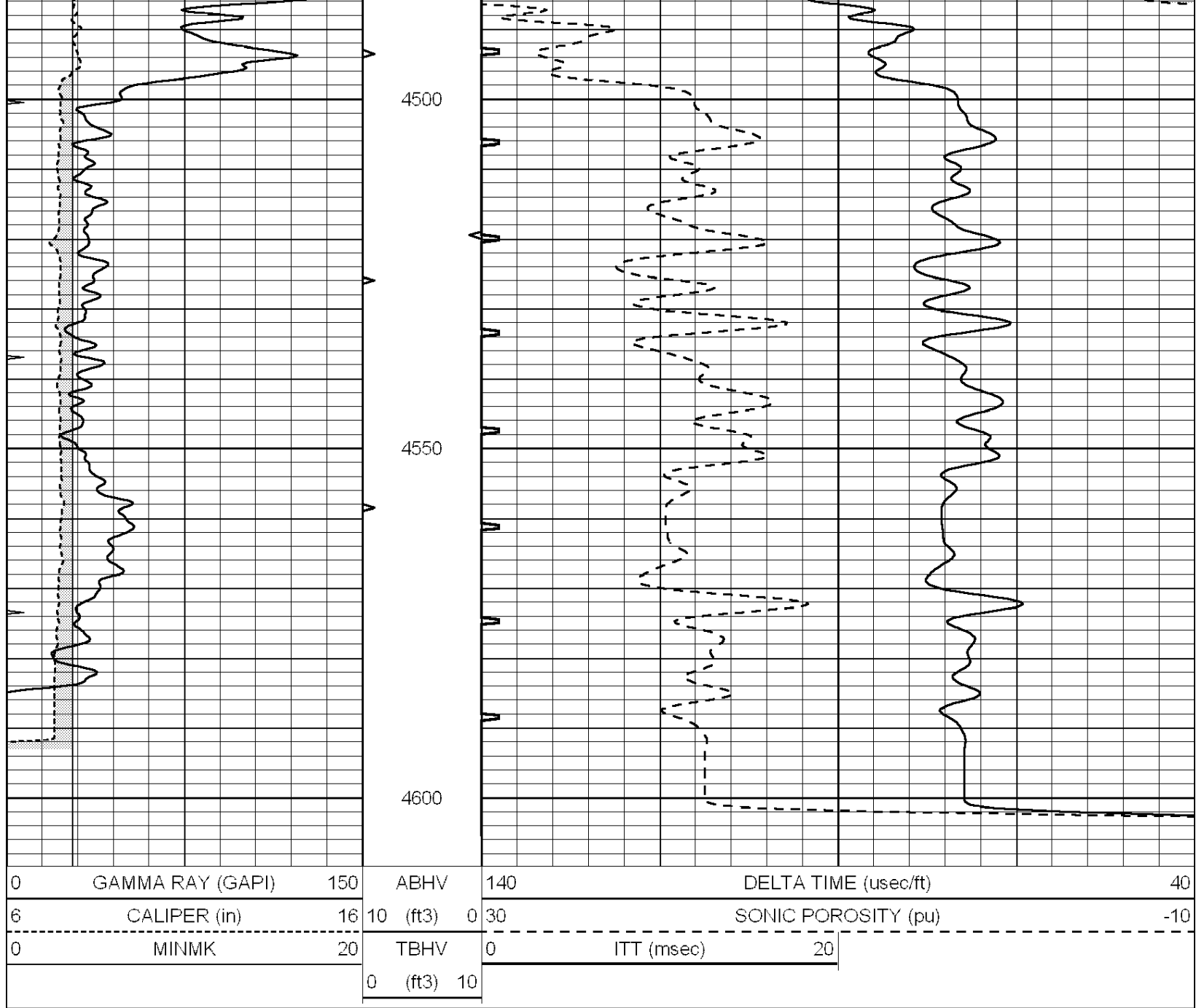
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REPEAT SECTION

Database File: 005649pdn.db
 Dataset Pathname: pass5.2A
 Presentation Format: slt
 Dataset Creation: Wed Aug 25 16:59:57 2010 by Calc Open-Cased 090629
 Charted by: Depth in Feet scaled 1:240

0	GAMMA RAY (GAPI)	150	ABHV	140	DELTA TIME (usec/ft)	40
6	CALIPER (in)	16	10 (ft3)	0 30	SONIC POROSITY (pu)	-10
0	MINMK	20	TBHV	0	ITT (msec)	20
			0 (ft3)	10		





Calibration Report

Database File: 005649pdm.db
 Dataset Pathname: pass6.1
 Dataset Creation: Wed Aug 25 17:51:00 2010

MICRO Calibration Report

Serial Number: MICRO4
 Tool Model: PROBE
 Performed: Wed Aug 25 16:58:10 2010

Caliper Calibration: Gain=1.664 Offset=-1.665

References	Low Cal	High Cal
Readings	7.400	12.000
	5.449	8.214

1.5" Calibration: Gain=42.000 Offset=-1.200

References	Low Cal	High Cal
Readings	0.000	20.000
	0.009	1.541

Readings	0.000	1.198
2" Calibration:	Gain=38.000	Offset=0.500
	Low Cal	High Cal
References	0.000	20.000
Readings	0.004	1.198

Gamma Ray Calibration Report

Serial Number:	GR5	
Tool Model:	OPEN	
Performed:	Wed Aug 25 13:52:53 2010	
Calibrator Value:	1.0	GAPI
Background Reading:	0.0	cps
Calibrator Reading:	1.0	cps
Sensitivity:	0.6500	GAPI/cps