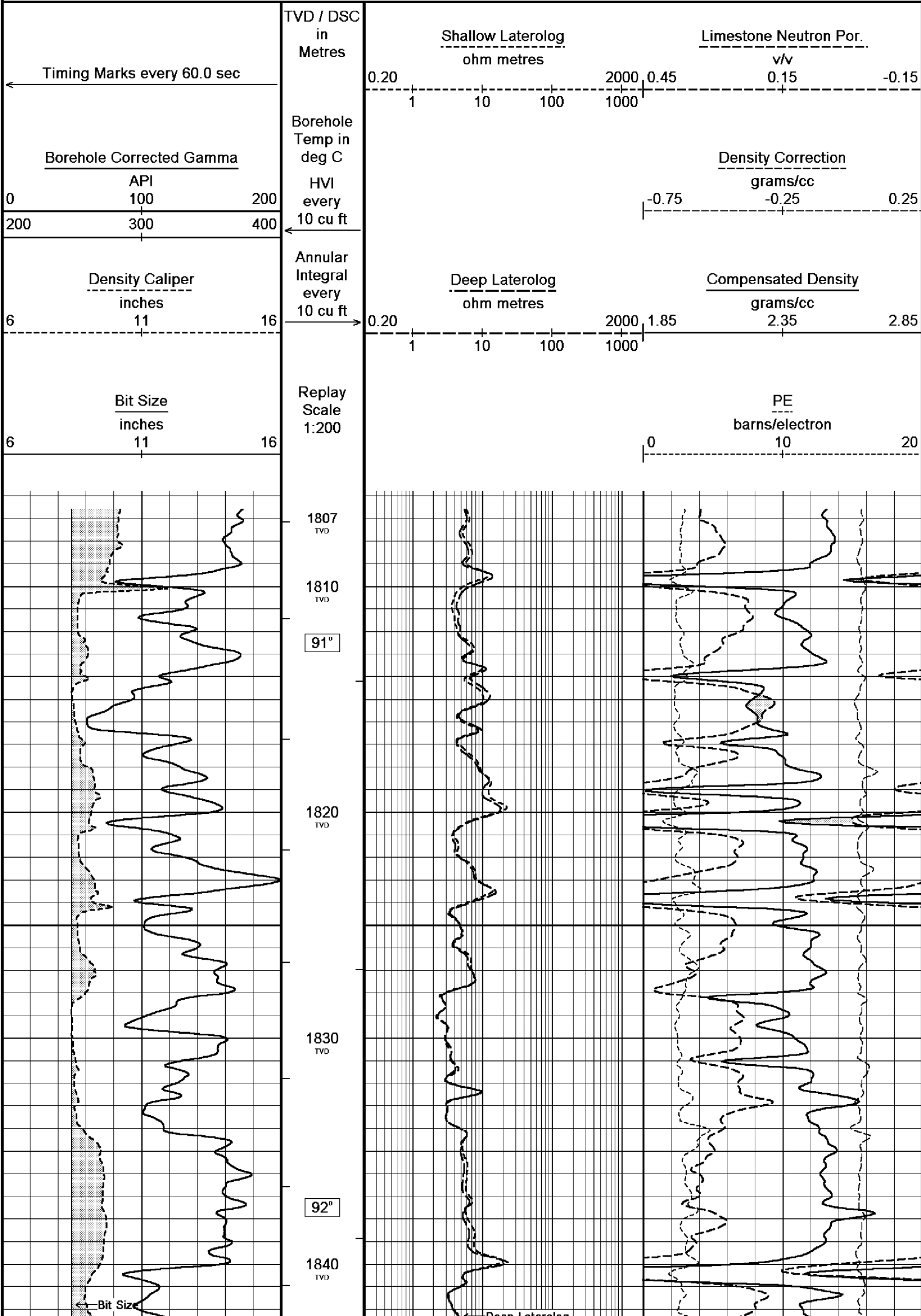
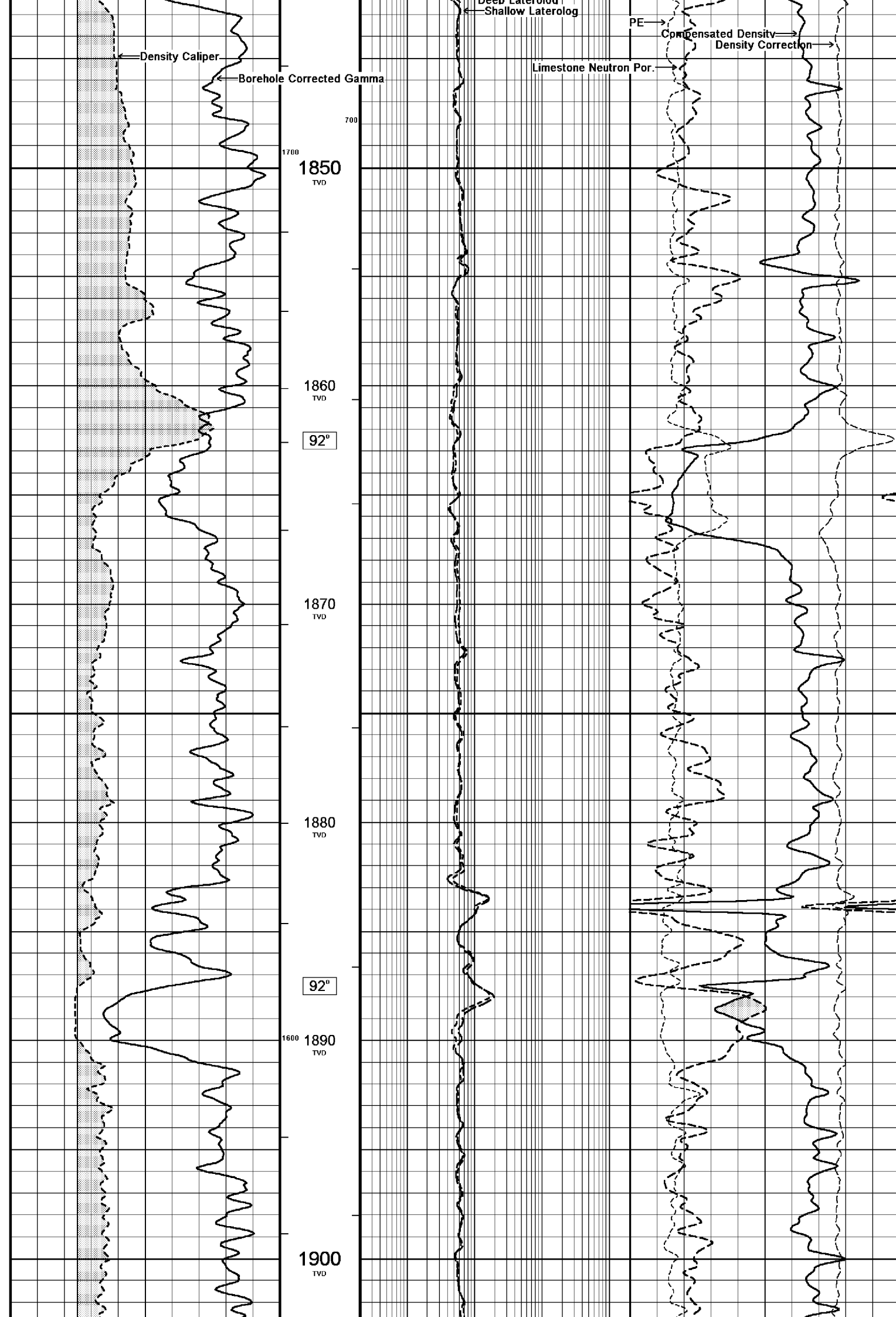


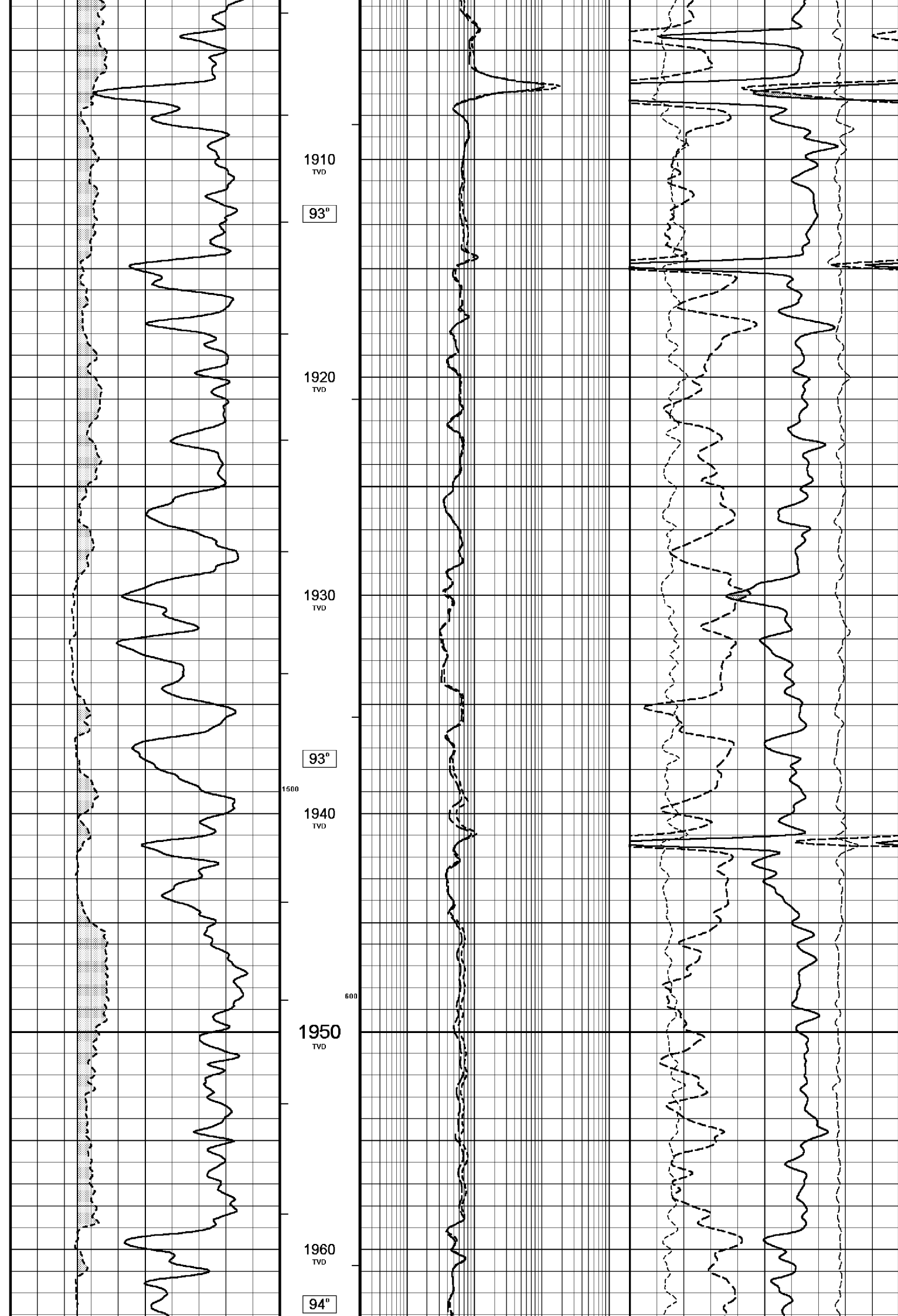
<div>Reeves</div> <div>Compact</div>			DUAL LATEROLOG - GR		
COMPANY			Esso Australia Pty Ltd		
WELL			Marlin A10a ST		
FIELD			Turrum		
PROVINCE/COUNTRY			Bass Strait		
COUNTRY/STATE			Australia		
LOCATION			38 13 49.320E , 148 13 15.712S		
			N 5767920.060 m , E 606868.950 m		
			[FINAL PRINT]		
LSD	SEC	TWP	RGE	Other Services	
				COMPENSATED SONIC	
API Number			Permit Number VIC L3/L4		
Permanent Datum M.S.L.			, Elevation 0.00 metres		
Log Measured From R.T.			@ 27.91m above Permanent Datum		
Drilling Measured From R.T.					
Date	15-SEP-2004		Elevations:		
Run Number	One		KB	DF	metres
Depth Driller	2713.46		27.91		metres
Depth Logger	2707.83				metres
First Reading	2703.46				metres
Last Reading	1806.66				metres
Casing Driller	616.41				metres
Casing Logger					
Bit Size	8.50				inches
Hole Fluid Type	KC/PPH/PA/GLY				
Density / Viscosity	9.90 lb/USg		77.00 CP		
PH / Fluid Loss	9.10		2.80 ml/30Min		
Sample Source	Flow Line				
Rm @ Measured Temp	0.135 @ 25.0		ohm-m		
Rmf @ Measured Temp	0.098 @ 25.0		ohm-m		
Rmc @ Measured Temp	0.168 @ 25.0		ohm-m		
Source Rmf / Rmc	Press		Press		
Rm @ BHT	0.047 @114.0		ohm-m		
Time Since Circulation	23.5 Hrs				
Max Recorded Temp	114.00		deg C		
Equipment Name	CWS/CML				
Equipment / Base	1		Sale		
Recorded By	G. McManus, R. Tench				
Witnessed By	C. MENHENITT				
Circ. Stopped	2200 14-Sep				

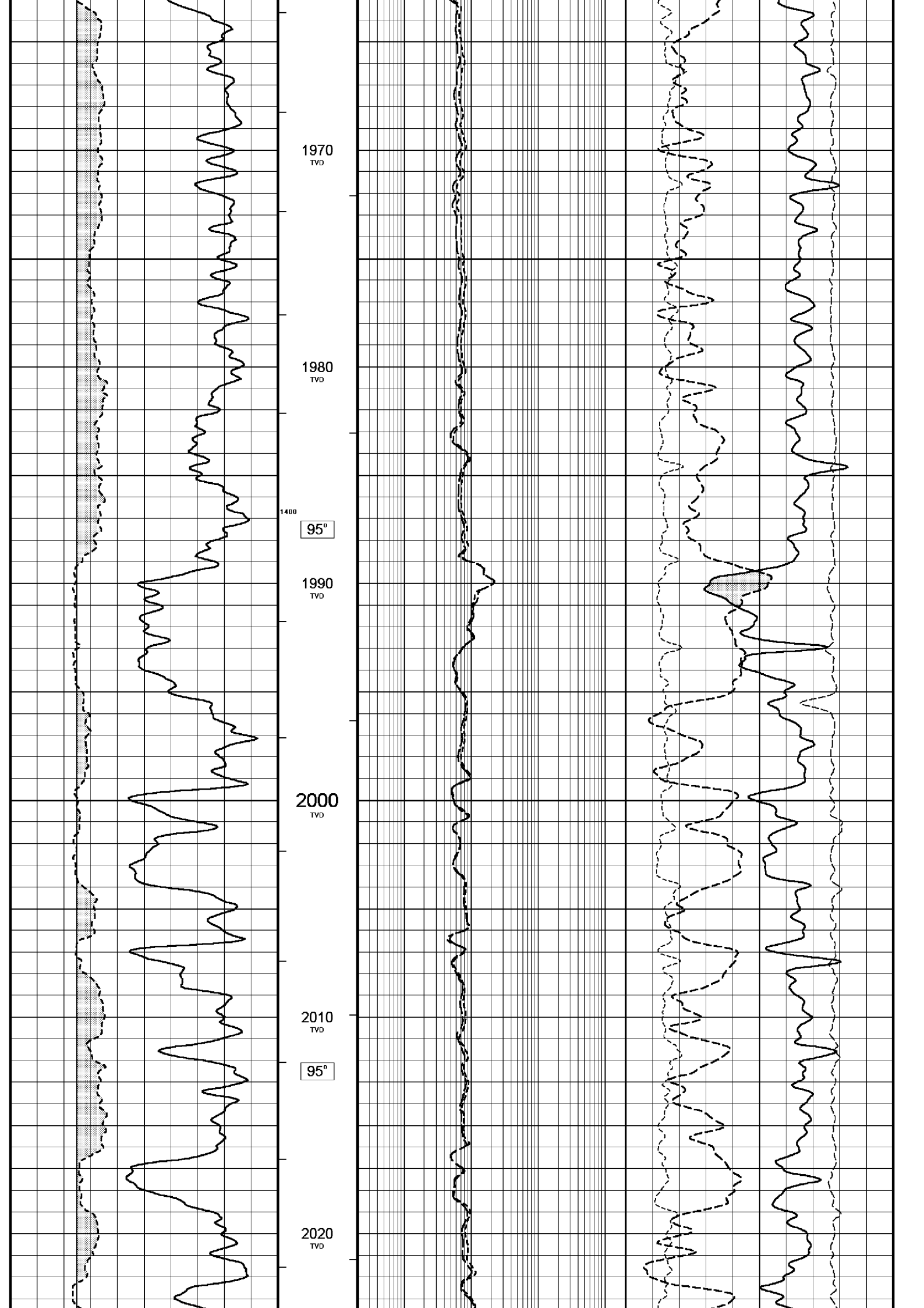
BOREHOLE RECORD				
Bit Size	Depth From		Depth To	
inches	metres		metres	
8.500	642.000		3491.000	
CASING RECORD				
Type	Size	Depth From	Shoe Depth	Weight
	inches	metres	metres	pounds/ft
J-55	13.375	0.000	642.000	54.40
REMARKS				
Drilling Rig: Nabors 453				
Crew: G McManus; R Tench; B Goodwin; M Susa				
Open hole well logged using Reeves COMPACT logging tools and 5" Shuttle conveyed Memory logging techniques.				
Logs depth corrected and quality controlled with Anadrill gamma log.				
Caliper reading inside casing: 12.688 In.				
Inside diameter of casing: 12.615 In.				
Max Inclination: 45.1 deg at 2884.87mMDRT				
Max Dogleg Severity: 4.32 deg at 3229.06mMDRT				
Max Temperature: 114.0 deg C at 3429.90mMDRT				
Hole Volume to Last Read: 1790 ft^3				
Annular Volume to Last Read: 735 ft^3				

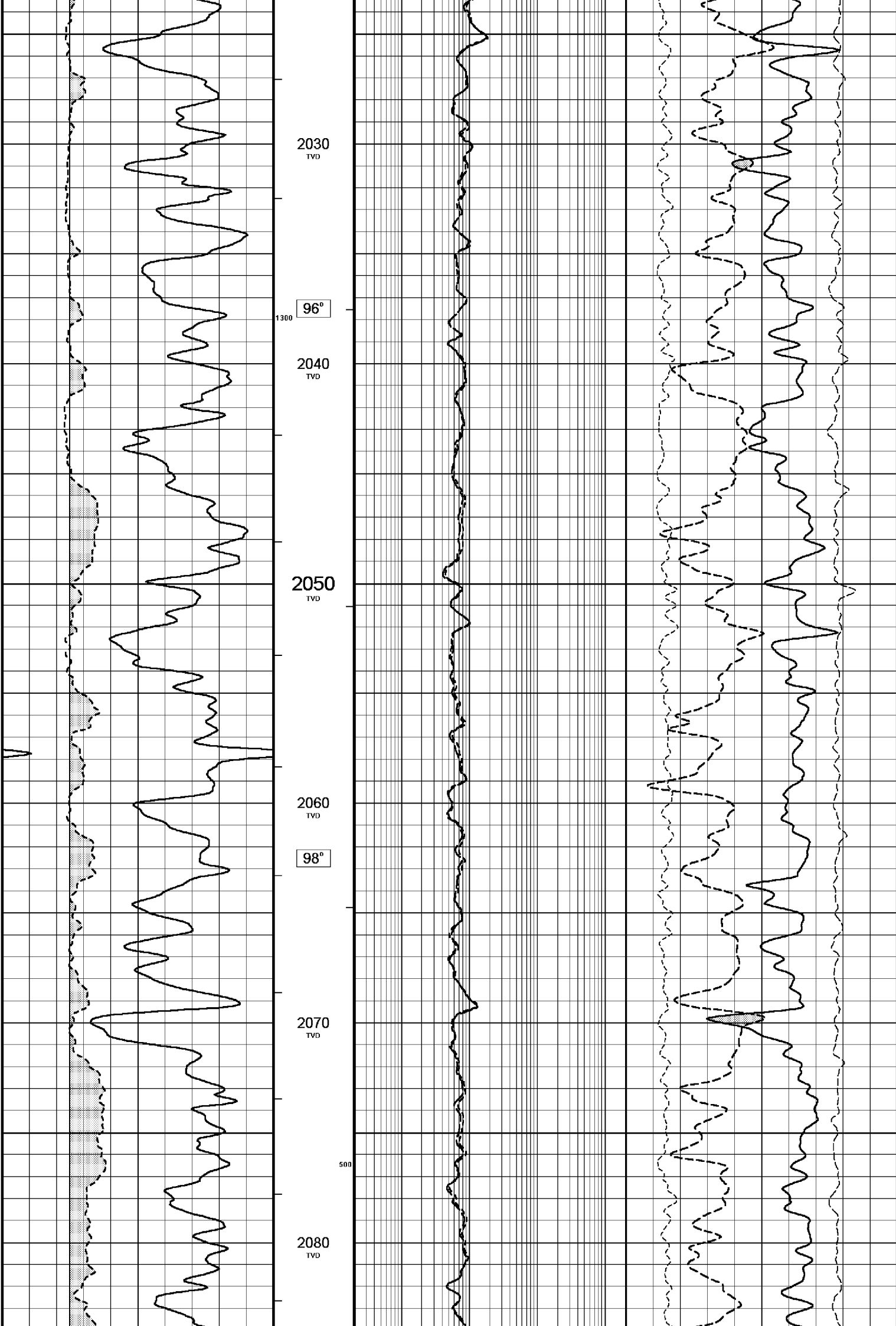
All interpretations are opinions based on inferences from electrical or other measurements and we cannot, and do not, guarantee the accuracy or correctness of any interpretations, and we shall not, except in the case of gross or wilful negligence on our part, be liable or responsible for any loss, costs, 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 in our price schedule.

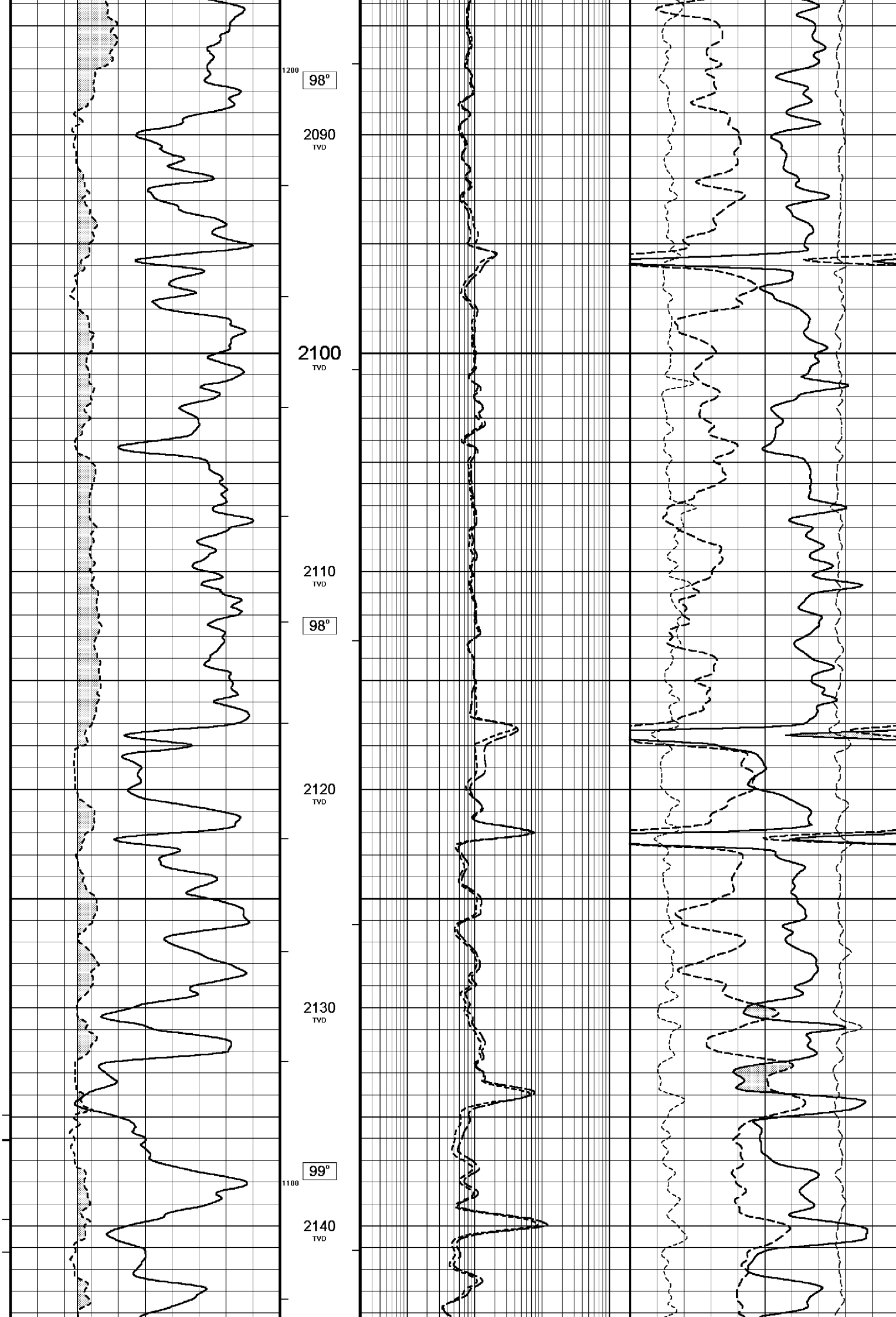


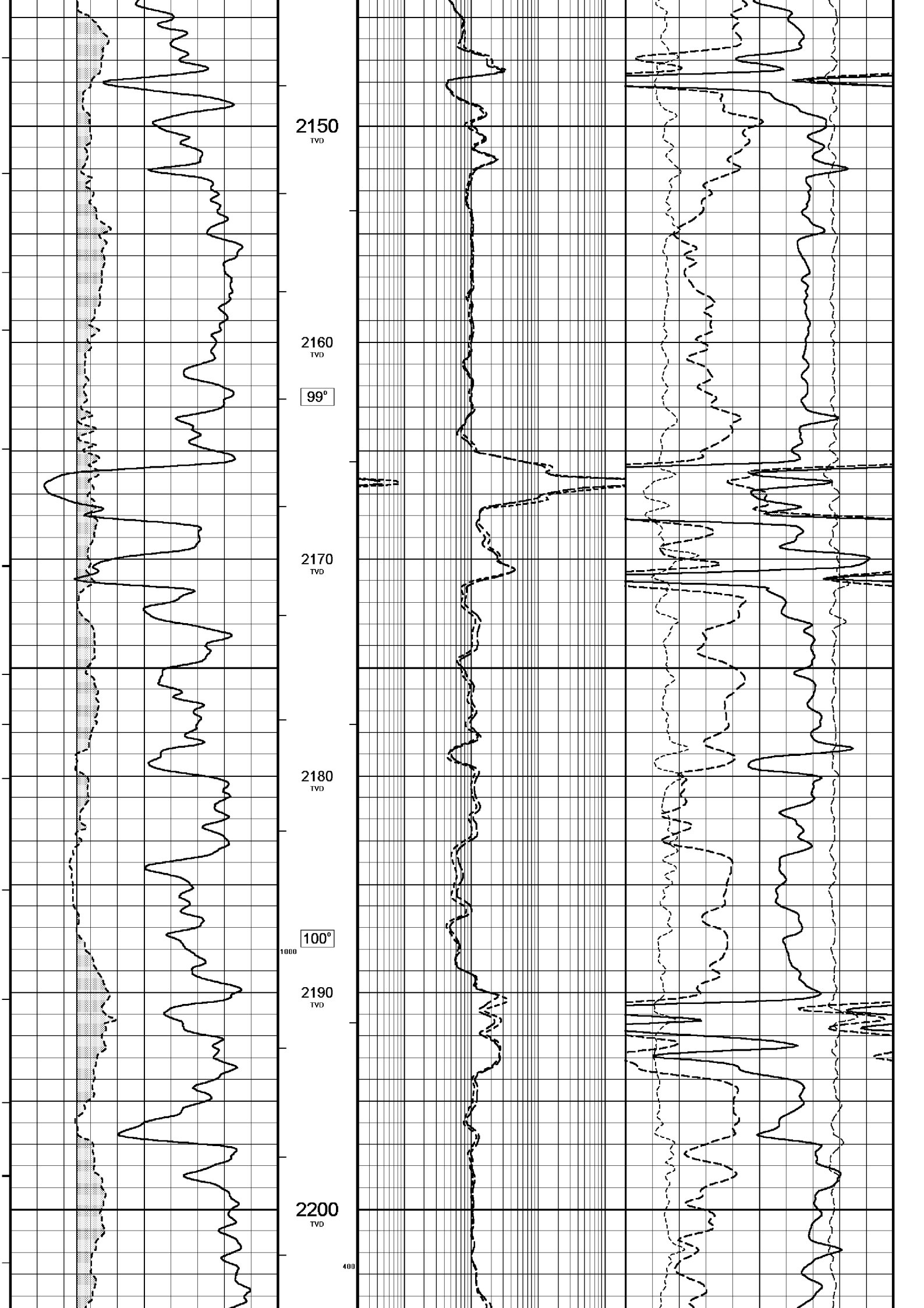


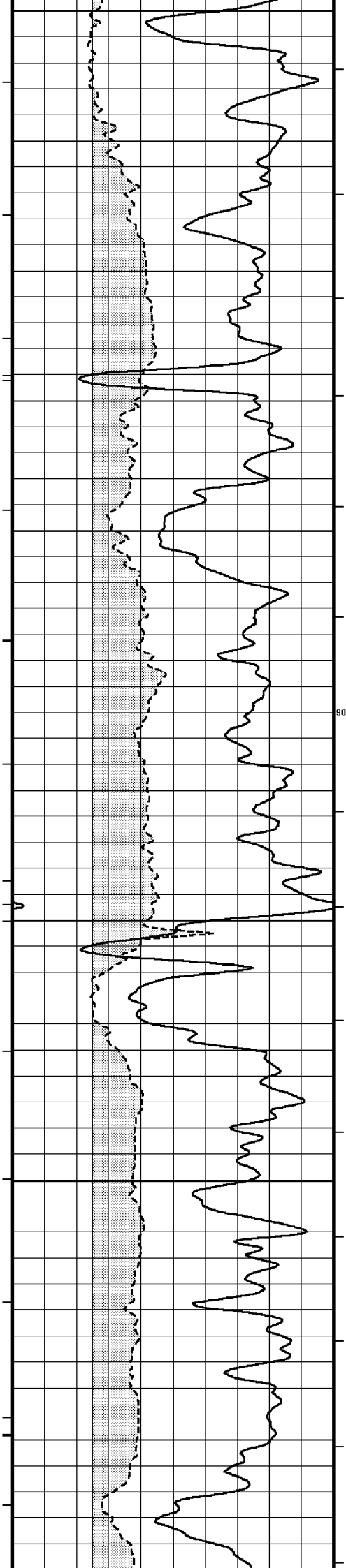












2210
TVD

100°

2220
TVD

2230
TVD

800

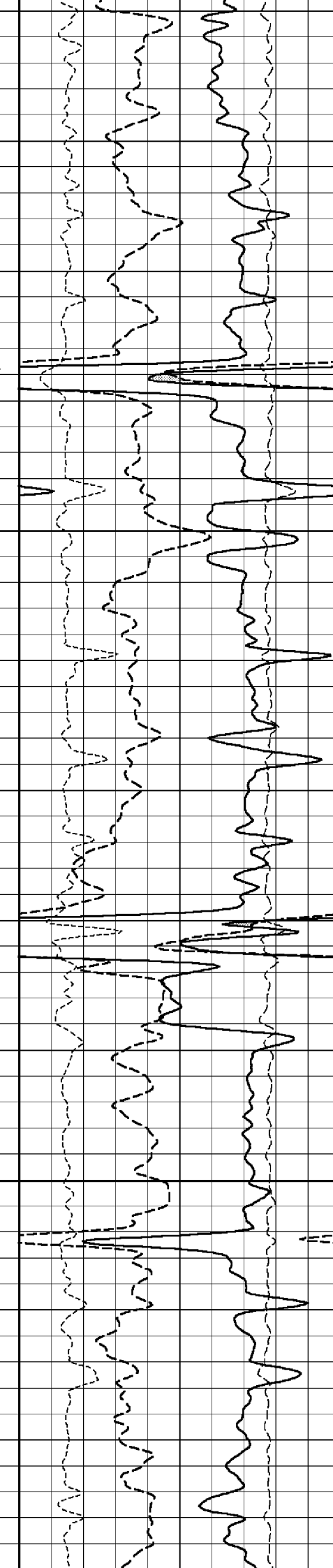
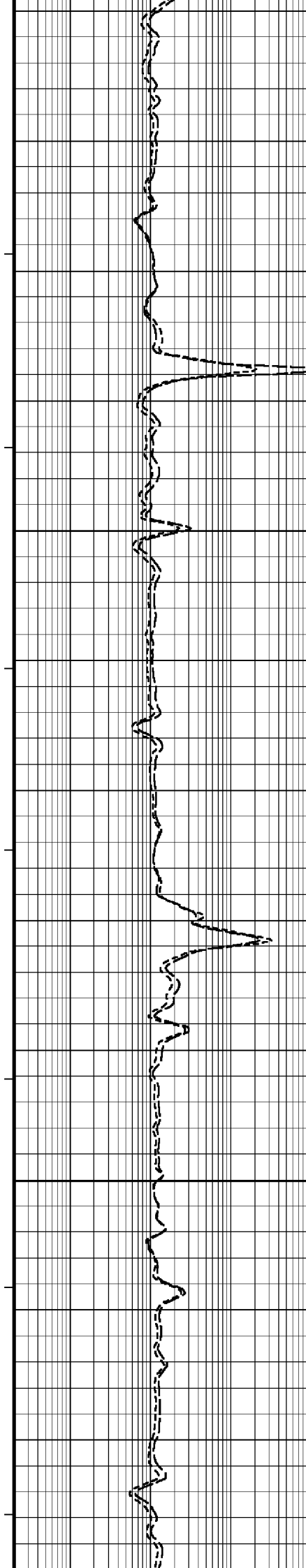
100°

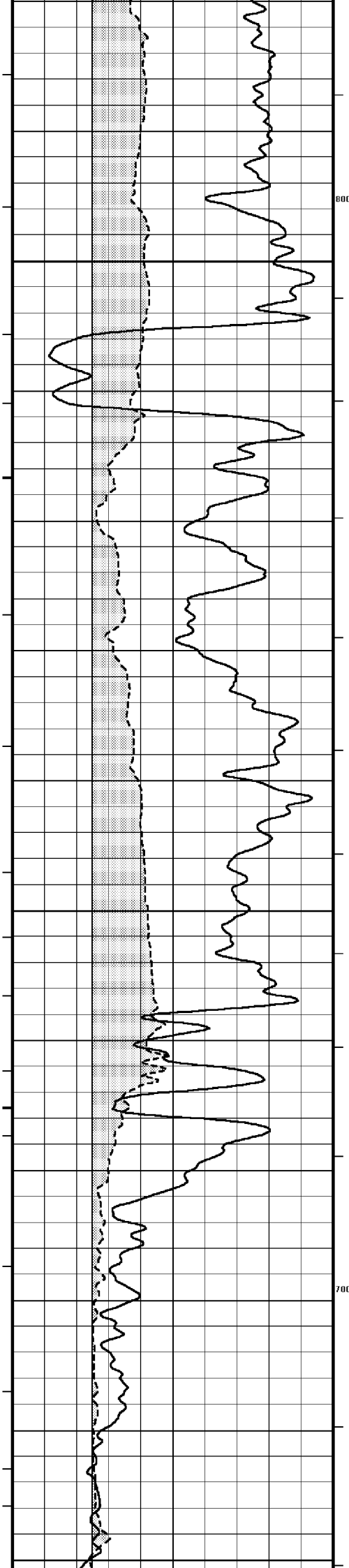
2240
TVD

2250
TVD

2260
TVD

100°





2270
TVD

2280
TVD

101°

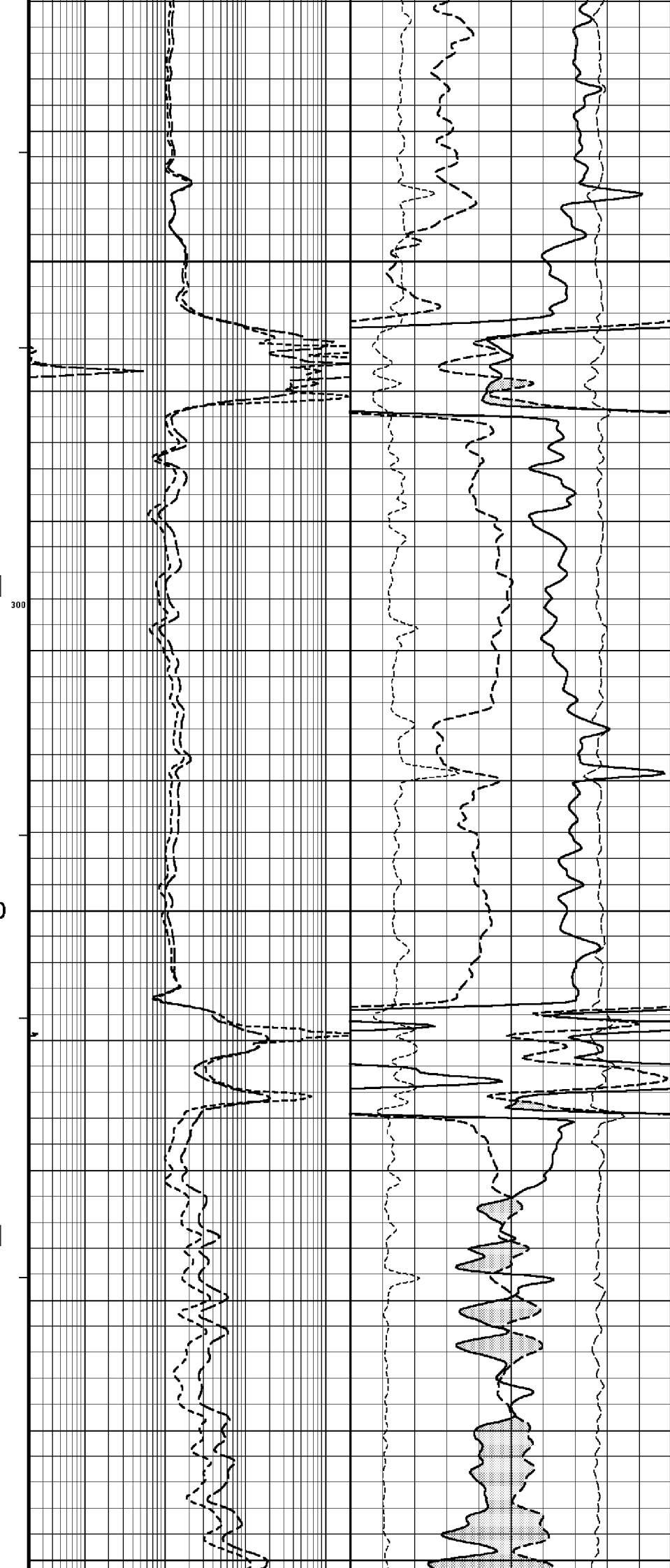
2290
TVD

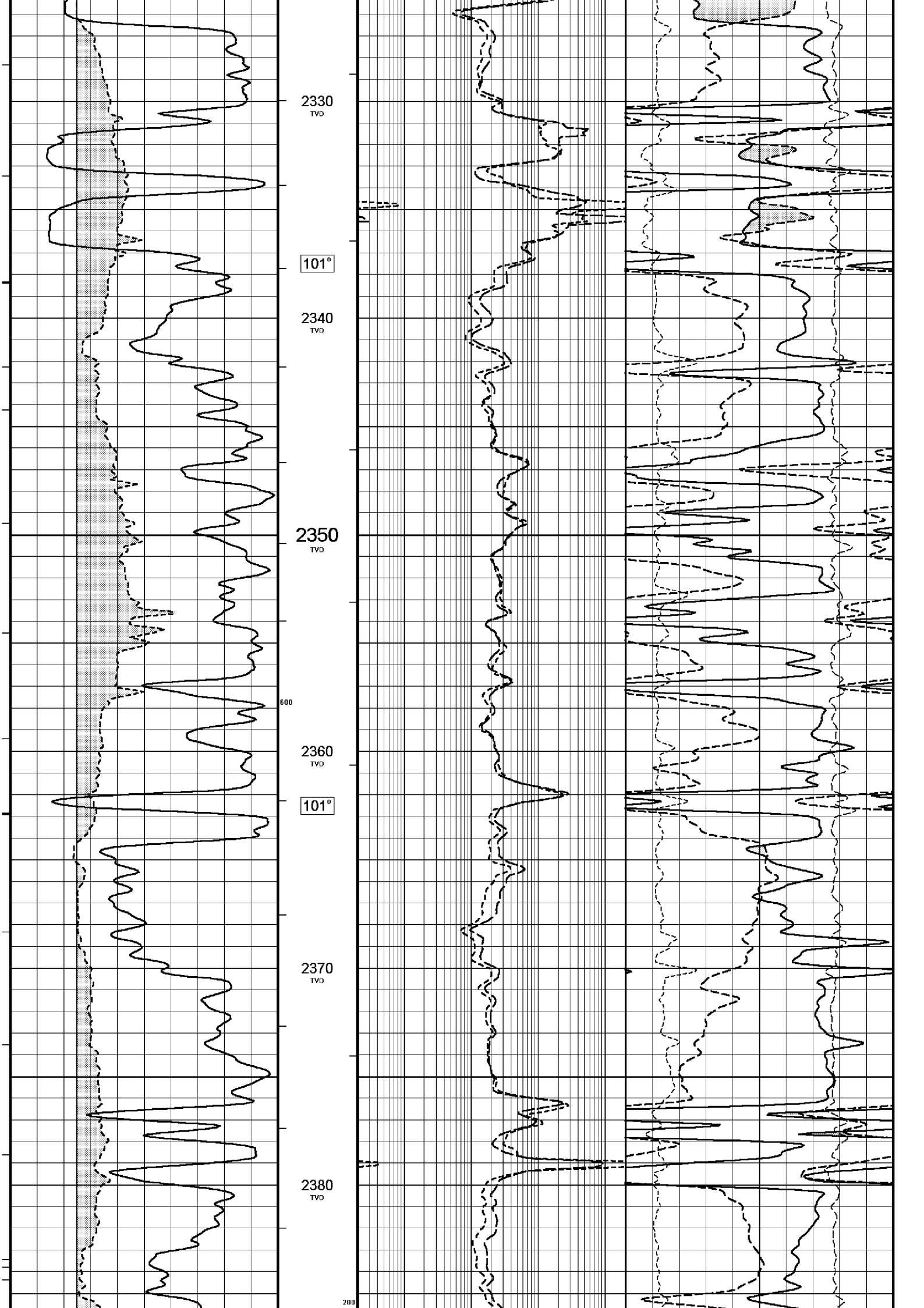
2300
TVD

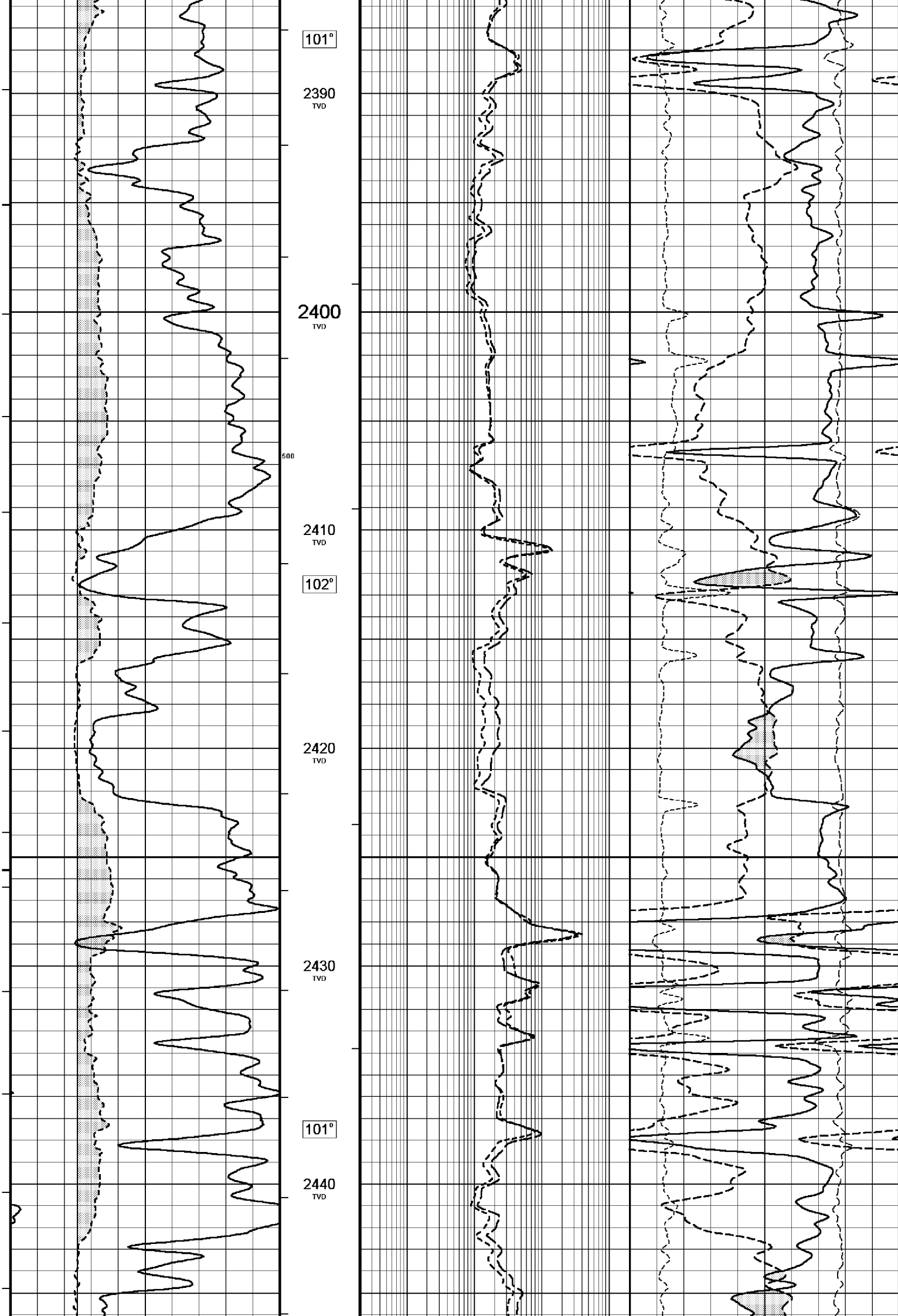
2310
TVD

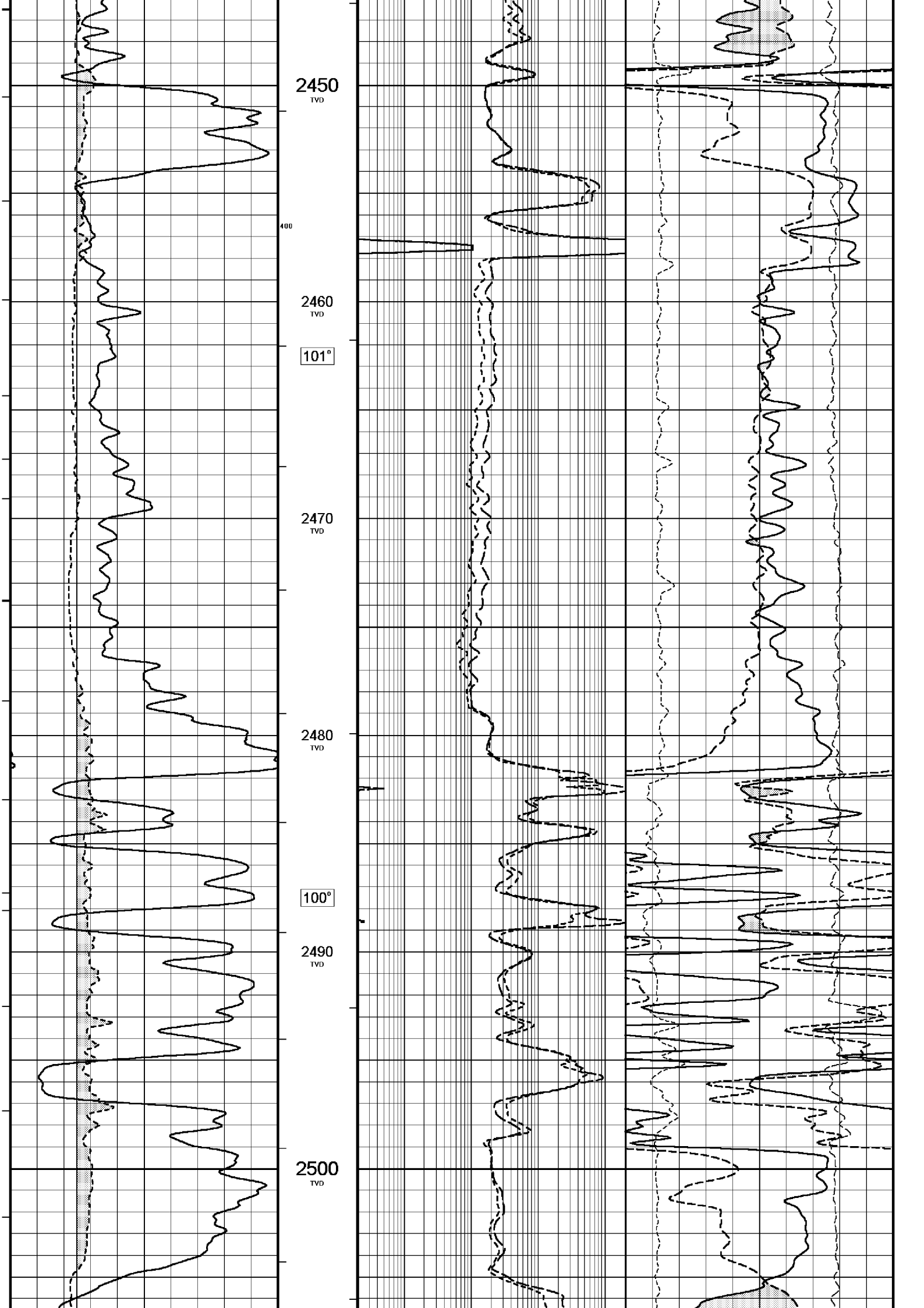
100°

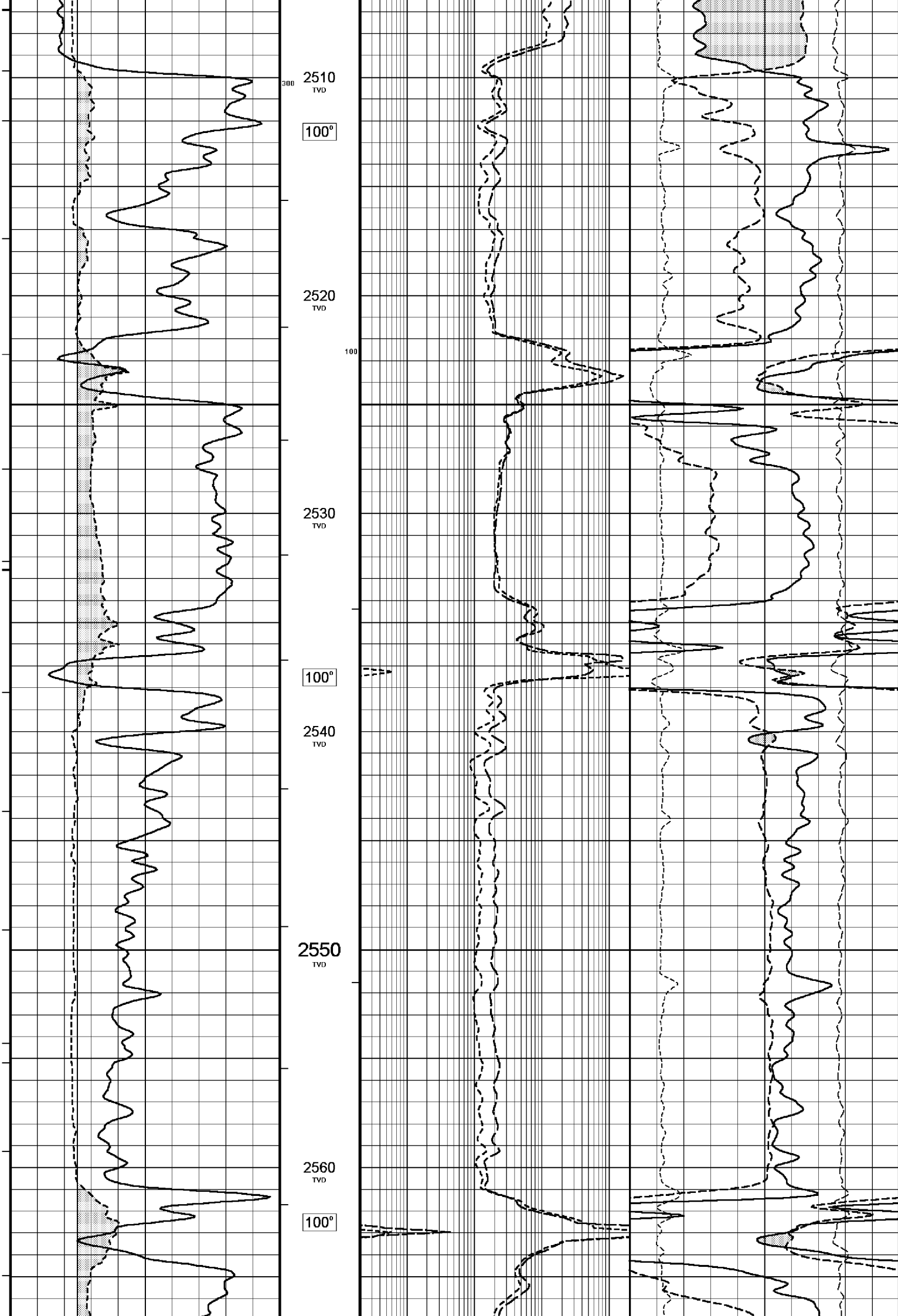
2320
TVD

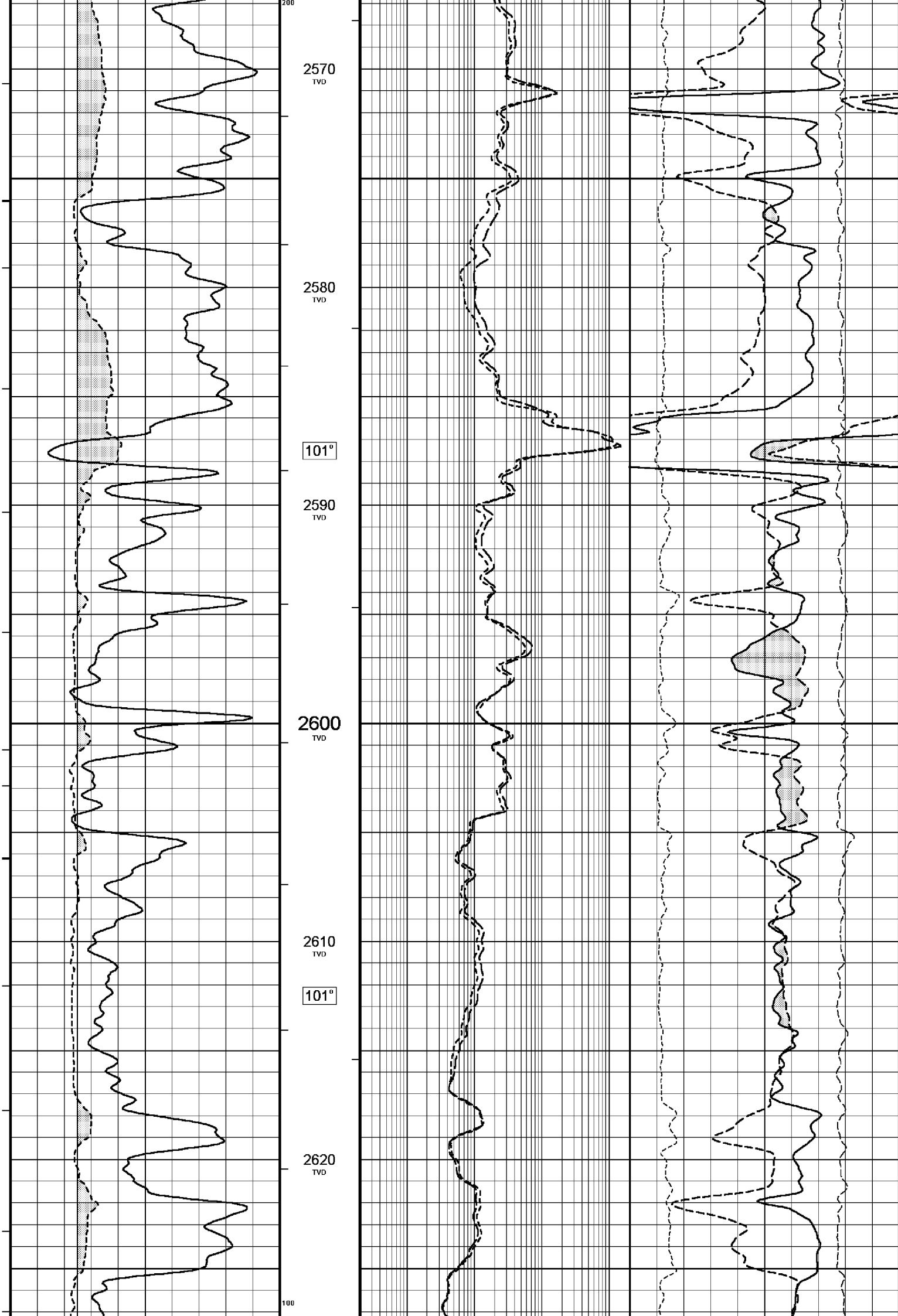












2630
TVD

104°

2640
TVD

2650
TVD

2660
TVD

115°

2670
TVD

2680
TVD

Bit Size

Density Caliper

Borehole Corrected Gamma

FR

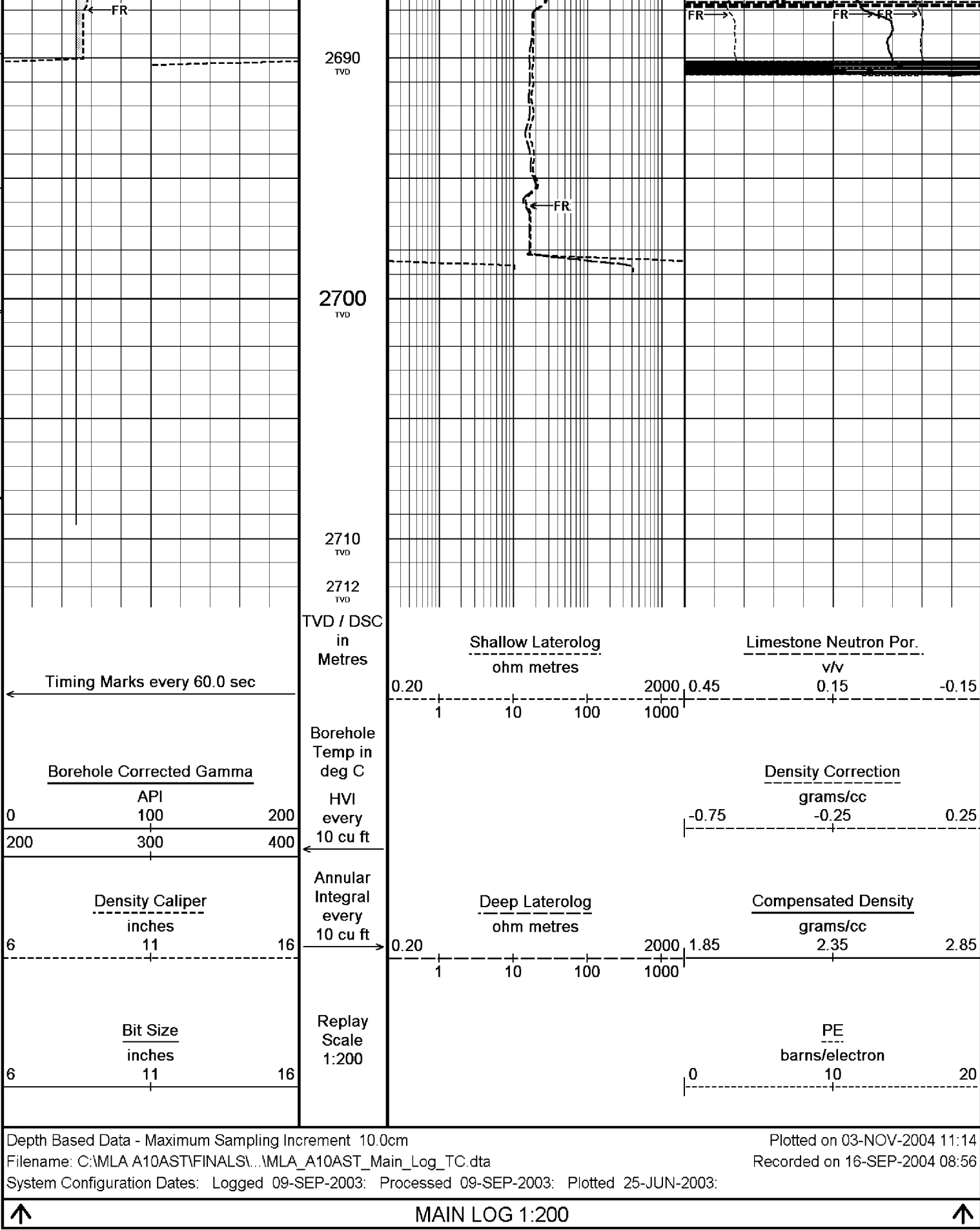
Deep Laterolog
Shallow Laterolog

PE

Compensated Density
Density Correction

Limestone Neutron Por.

FR



BEFORE SURVEY CALIBRATION		
C:\MLA A10AST\FINALS\BLACK AND WHITE PRESENTATIONS\MLA_A10AST_Main_Log_TC.dta		
General Constants All 000		
General Parameters		
Mud Resistivity	0.135	ohm-metres
Mud Resistivity Temperature	25.000	degrees C
Water Level	0.000	metres
Density/Neutron Processing	Wet Hole	

Density/Neutron Processing				Wet Hole	
Hole/Annular Volume and Differential Caliper Parameters					
HVOL Caliper 1		Density Caliper			
HVOL Caliper 2		Density Caliper			
Annular Volume Diameter		7.000		inches	
Caliper for Differential Caliper		Density Caliper			
Rwa Parameters					
Porosity used		Base Density Porosity			
Resistivity used		Deep Induction			
RWA Constant A		0.610			
RWA Constant M		2.150			
High Resolution Temperature Calibration MCG 043					
		Measured		Calibrated(Deg C)	
Lower		0.00		0.00	
Upper		100.00		100.00	
Field Calibration on 10-FEB-2004,09:37					
High Resolution Temperature Constants MCG 043					
Pre-filter Length		11			
Gamma Calibration MCG 043					
		Measured		Calibrated (API)	
Background		7		4	
Calibrator (Gross)		1404		913	
Calibrator (Net)		1397		909	
Field Calibration on 13-SEP-2004 17:13					
Gamma Constants MCG 043					
Gamma Calibrator Number		60			
Mud Density		1.18		gm/cc	
Caliper Source for Processing		Density Caliper			
Tool Position		Eccentred			
Concentration of KCl		0.00		kppm	
Neutron Calibration MDN 085					
Base Calibration		Base Calibration on 1-SEP-2004 13:09			
		Field Check on 13-SEP-2004 18:47			
		Measured		Calibrated (cps)	
		Near	Far	Near	Far
		3144	98	3714	110
Ratio		32.224		33.764	
Field Calibrator at Base		Calibrated (cps)			
		1597 2306			
Ratio		0.692			
Field Check		Calibrated (cps)			
		1571 2298			
Ratio		0.684			
Neutron Constants MDN 085					
Neutron Source Id		NSN-E-739			
Neutron Jig Number		NEC-C-052			
Epithermal Neutron		No			
Caliper Source for Processing		Density Caliper			
Stand-off		0.00		inches	
Mud Density		1.18		gm/cc	
Limestone Sigma		7.10		cu	
Sandstone Sigma		4.26		cu	
Dolomite Sigma		4.70		cu	
Formation Pressure Source		None			
Formation Pressure		N/A			
Temperature Source		MCG External Temperature			
Temperature		20.00		degrees C	
Mud Salinity		48.30		kppm	
Formation Fluid Salinity Source		None			
Formation Fluid Salinity		N/A			
Barite Mud Correction		Not Applied			
Caliper Calibration MPD 083					
Base Calibration		Base Calibration on 1-SEP-2004 10:37			
		Field Calibration on 13-SEP-2004 18:41			
Reading No		Measured		Calibrator Size (in)	
1		10070		1.04	

1	13072	4.01
2	21358	5.99
3	29792	7.98
4	38288	9.94
5	47695	12.01
6	N/A	N/A

Field Calibration

Measured Caliper (in)	Actual Caliper (in)
7.95	7.98

Photo Density Calibration MPD 083

Base Calibration on 1-SEP-2004 10:28
Field Check on 13-SEP-2004 18:40

Density Calibration

Base Calibration

	Measured		Calibrated (sdu)	
	Near	Far	Near	Far
Reference 1	54422	18790	53111	19310
Reference 2	25713	2533	24951	2530

Field Check at Base

981.2 1133.8

Field Check

980.1 1130.8

PE Calibration

Base Calibration

	WS	Measured WH	Ratio	Calibrated Ratio
Background	186	847		
Reference 1	16823	54230	0.312	0.320
Reference 2	6734	25569	0.265	0.273

Field Check at Base

185.5 846.9

Field Check

186.9 844.2

Density Constants MPD 083

Density Source Id	242
Nylon Calibrator Number	DNC-D-536
Aluminium/Fe Calibrator Number	DAC-D-536
Density Shoe Profile	4 inch
Caliper Source for Processing	Density Caliper
PE Correction to Density	Not Applied
Mud Density	1.18 gm/cc
Mud Density Z/A Correction	1.11
Mud Filtrate Density	1.00 gm/cc
Dry Hole Mud Filtrate Density	1.00 gm/cc
DNCT	0.00 gm/cc
CRCT	0.00 gm/cc

Matrix Density (gm/cc)	Depth (m)
2.71	
0.00	0.00
0.00	0.00
0.00	0.00
0.00	0.00
0.00	0.00
0.00	0.00
0.00	0.00

Laterolog Calibration MLE 017

Base Calibration on 2-SEP-2004,17:05
Field Check on 13-SEP-2004,17:07

Base Calibration

Channel	Measured		Calibrated (ohm-m)	
	Resistor 1	Resistor 2	Resistor 1	Resistor 2
Shallow	9.7	969.2	13.2	1321.0
Deep	9.7	933.4	7.5	755.0
Groningen	9.7	933.7	8.5	854.0

Channel	Base Check (ohm-m)	Field Check (ohm-m)
Shallow	49.0	49.0
Deep	28.8	28.8
Groningen	262.9	262.9

Laterolog Constants MLE 017

Squasher Start	40000	ohm-m
Shallow Laterolog K Factor	1.3210	
Deep Laterolog K Factor	0.7550	
Groningem Laterolog K Factor	0.8540	
Interference Rejection	50 Hz	
SP Connection	SP Bridle Electrode	
Groningen Connection	Groningen Electrode	

DOWNHOLE EQUIPMENT

C:\MLA A10AST\FINALS\BLACK AND WHITE PRESENTATIONS\MLA_A10AST_Main_Log_TC.dta

Compact Swivel Head Adaptor SHA 64 Length: 0.83 m Weight: 26.5 lb	
Compact Knuckle Joint SKJ 111 Length: 0.66 m Weight: 24.3 lb	
Compact Battery Sub. MBS 99 Length: 4.34 m Weight: 88.2 lb	
Compact Inline Standoff B MIS 144 Length: 0.65 m Weight: 15.4 lb	
Compact Stiff Bridle Electrode Sub. MBE 18 Length: 3.76 m Weight: 94.8 lb	
Compact Inline Standoff B MIS 142 Length: 0.65 m Weight: 15.4 lb	
Compact Stiff Bridle Electrode Sub. MBE 19 Length: 3.76 m Weight: 94.8 lb	
Compact Inline Standoff B MIS 141 Length: 0.65 m Weight: 15.4 lb	
Thrid Bridle MBE 20 MLK 111 Length: 3.76 m Weight: 94.8 lb	
Compact Inline Standoff B MIS 140 Length: 0.65 m Weight: 15.4 lb	
Compact Knuckle Joint SKJ 110 Length: 0.66 m Weight: 24.3 lb	

31.38 m GGCE - Borehole Corrected Gamma

30.50 m CGXT - MCG External Temperature

25.33 m NPRL - Limestone Neutron Por.

22.65 m AVOL - Annular Volume

22.65 m HVOL - Hole Volume

22.65 m CLDC - Density Caliper

22.44 m DEN - Compensated Density

22.44 m DCOR - Density Correction

22.42 m PDPE - PE

13.35 m DSLL - Shallow Laterolog

13.35 m DDLL - Deep Laterolog

Compact Inline Standoff B
MIS 133 Length: 0.65 m Weight: 15.4 lb

Compact Lower Guard Sub.
MLG 7 Length: 2.44 m Weight: 55.1 lb

Compact Inline Standoff B
MIS 130 Length: 0.65 m Weight: 15.4 lb

Compact Sonic
MSS 47 Length: 3.82 m Weight: 72.8 lb

Compact Inline Standoff B
MIS 132 Length: 0.65 m Weight: 15.4 lb

Compact Induction
MAI 39 Length: 3.29 m Weight: 48.5 lb

Pressure Bung + Hole Finder
HFS 3 Length: 0.40 m Weight: 6.6 lb

Total Length: 53.77 m Weight: 1298.5 lb



Tool Zero (0.44m from bottom)

All measurements relative to tool zero.

COMPANY	Esso Australia Pty Ltd
WELL	Marlin A10a ST
FIELD	Turrum
PROVINCE/COUNTY	Bass Strait
COUNTRY/STATE	Australia

Elevation Kelly Bushing	metres	First Reading	2703.46	metres
Elevation Drill Floor	27.91 metres	Depth Driller	2713.46	metres
Elevation Ground Level	-59.00 metres	Depth Logger	2707.83	metres

Reeves
Compact

DUAL LATEROLOG - GR
DENSITY - NEUTRON
1:200 TVD

