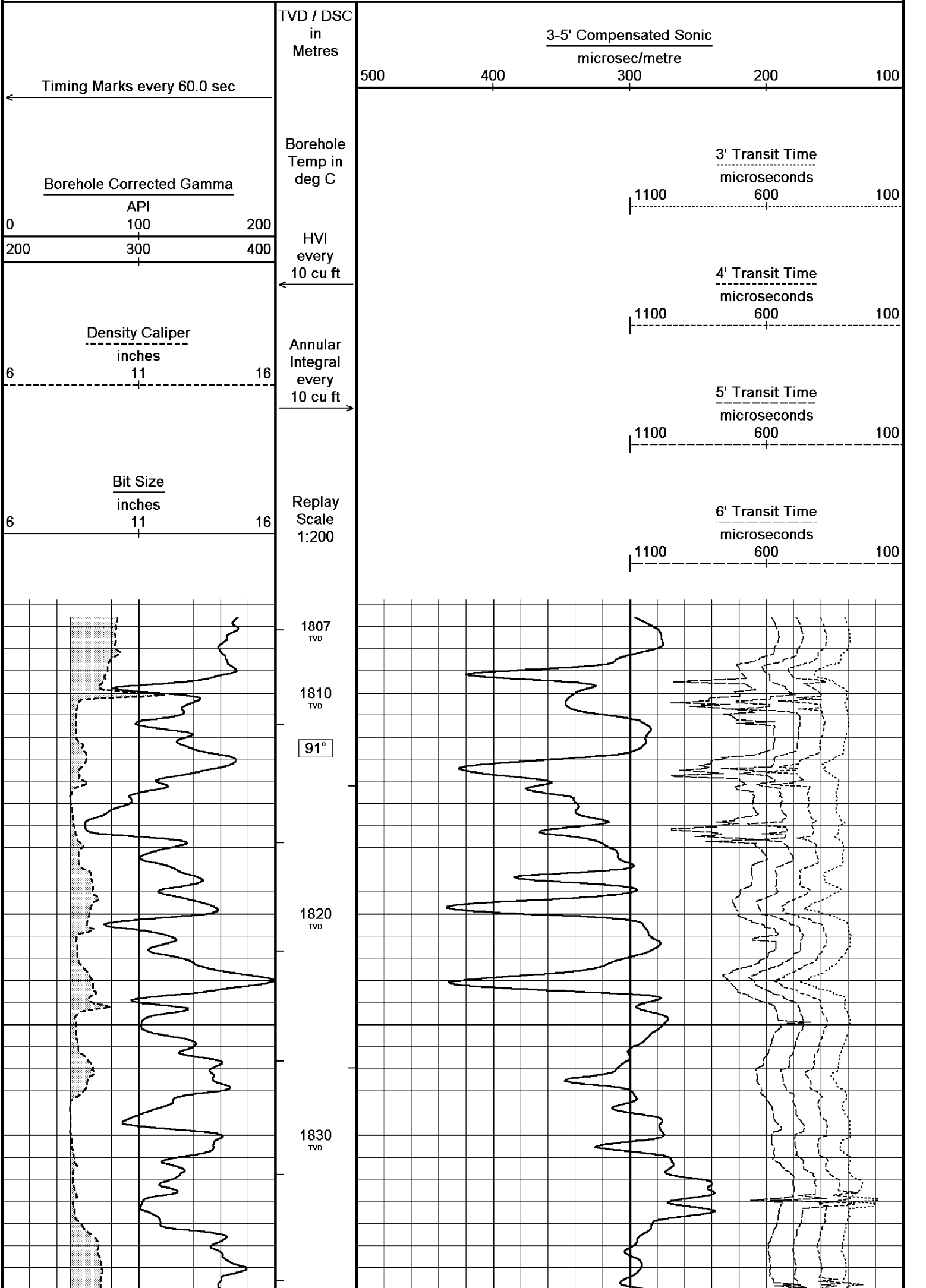
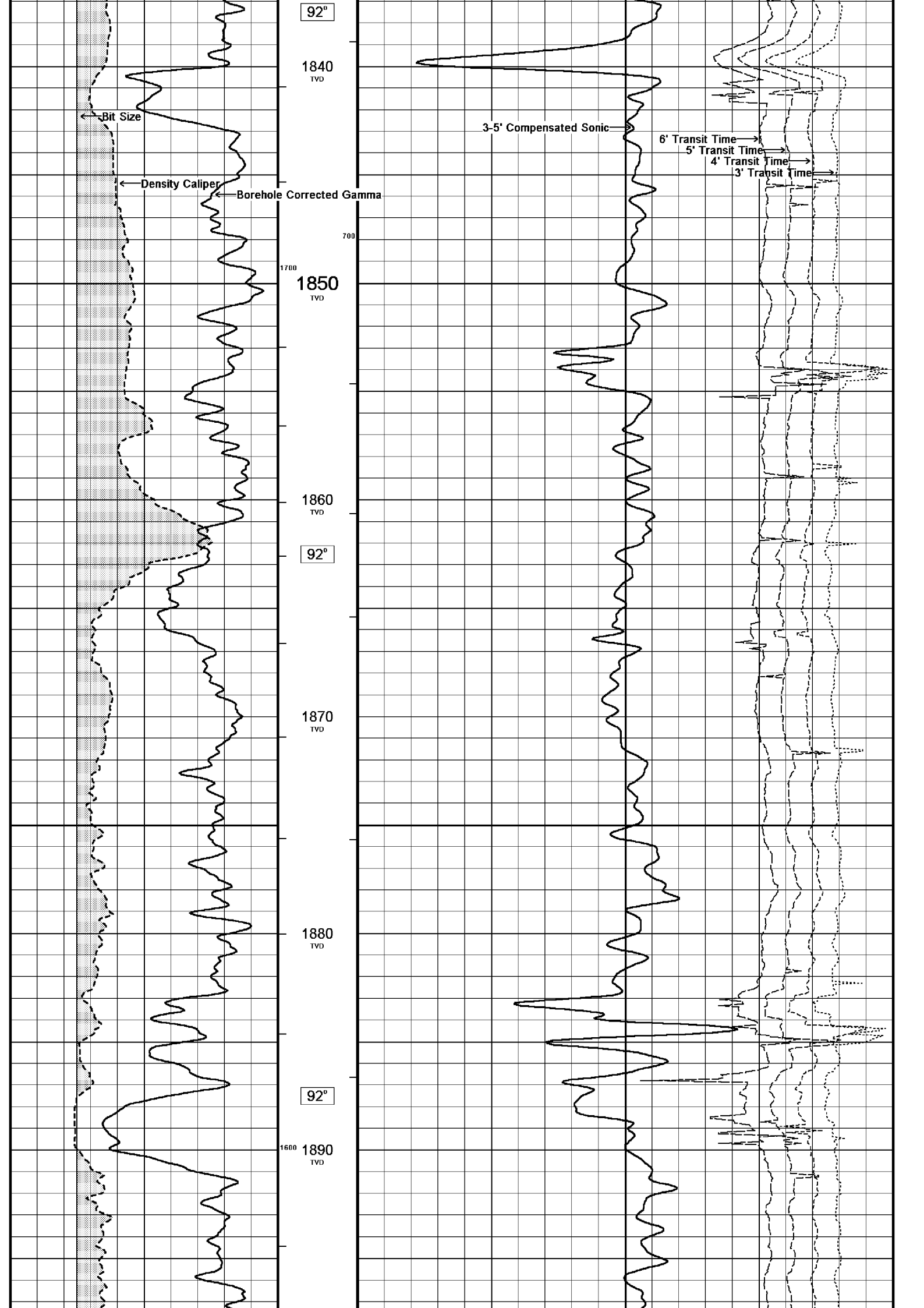


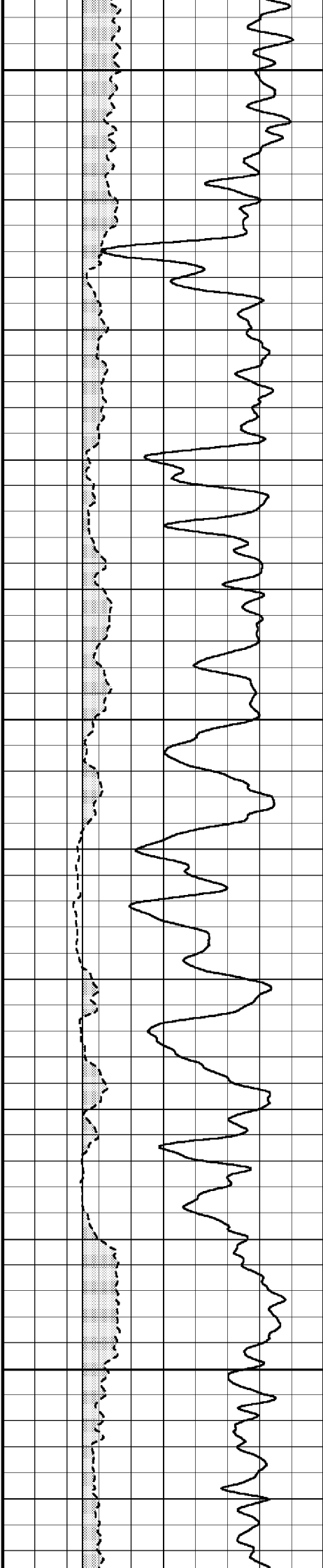
<div>Reeves</div> <div>Compact</div>			COMPENSATED SONIC			1:200 TVD			
COMPANY			Esso Australia Pty Ltd						
WELL			Marlin A10a ST						
FIELD			Turrum						
PROVINCE/COUNTY			Bass Strait						
COUNTRY/STATE			Australia						
LOCATION			38 13 49.320E , 148 13 15.712S						
			N 5767920.060 m , E 606868.950 m						
			[FINAL PRINT]						
LSD	SEC	TWP	RGE	Other Services			DUAL LATEROLOG		
API Number			VIC L3/L4			PHOTO DENSITY			
Permit Number			COMPENSATED NEUTRON						
Permanent Datum M.S.L.			, Elevation 0.00 metres			Elevations:			
Log Measured From R.T.			@ 27.91m above Permanent Datum			KB DF GL 27.91 metres metres metres			
Drilling Measured From R.T.									
Date	15-SEP-2004								
Run Number	One								
Depth Driller	2713.46		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 inches		Depth From metres		Depth To metres
8.500		642.000		3491.000
CASING RECORD				
Type	Size inches	Depth From metres	Shoe Depth metres	Weight 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.







1900  
TVD

1910  
TVD

93°

1920  
TVD

1930  
TVD

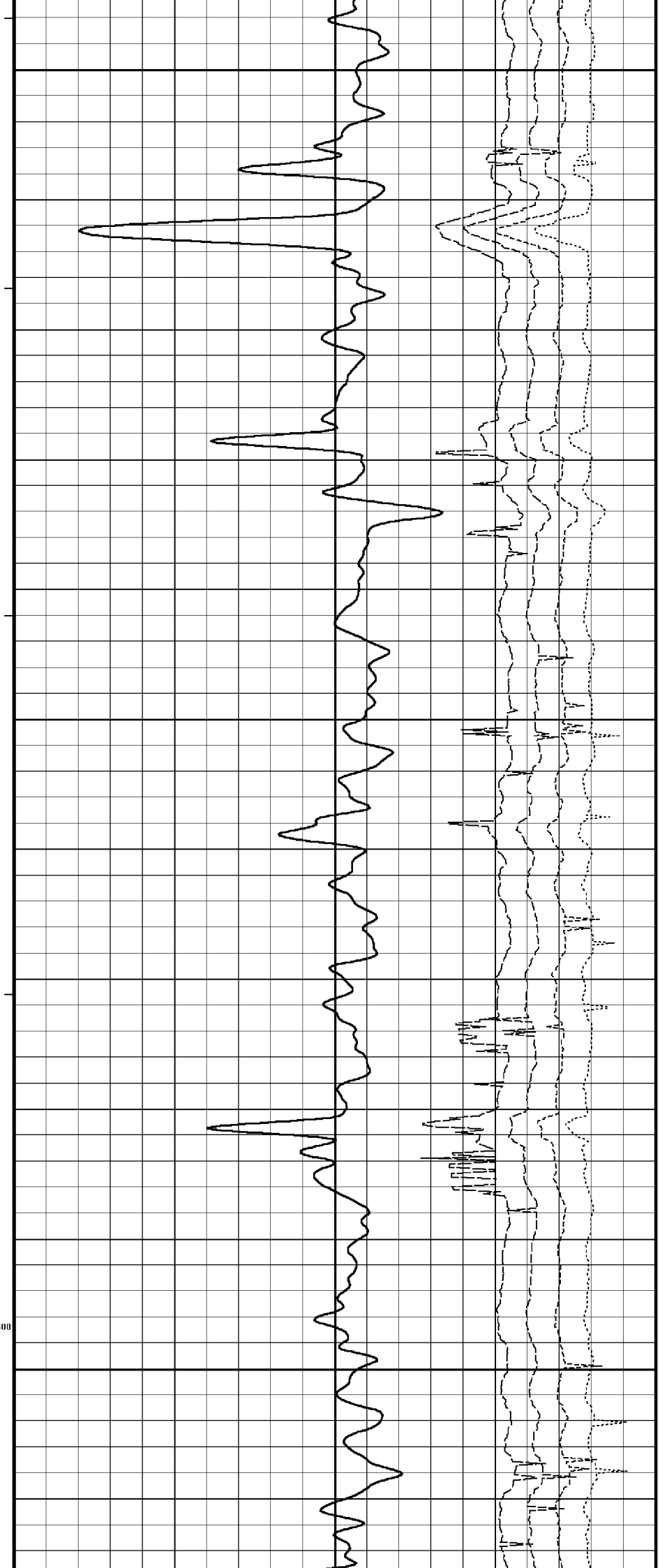
93°

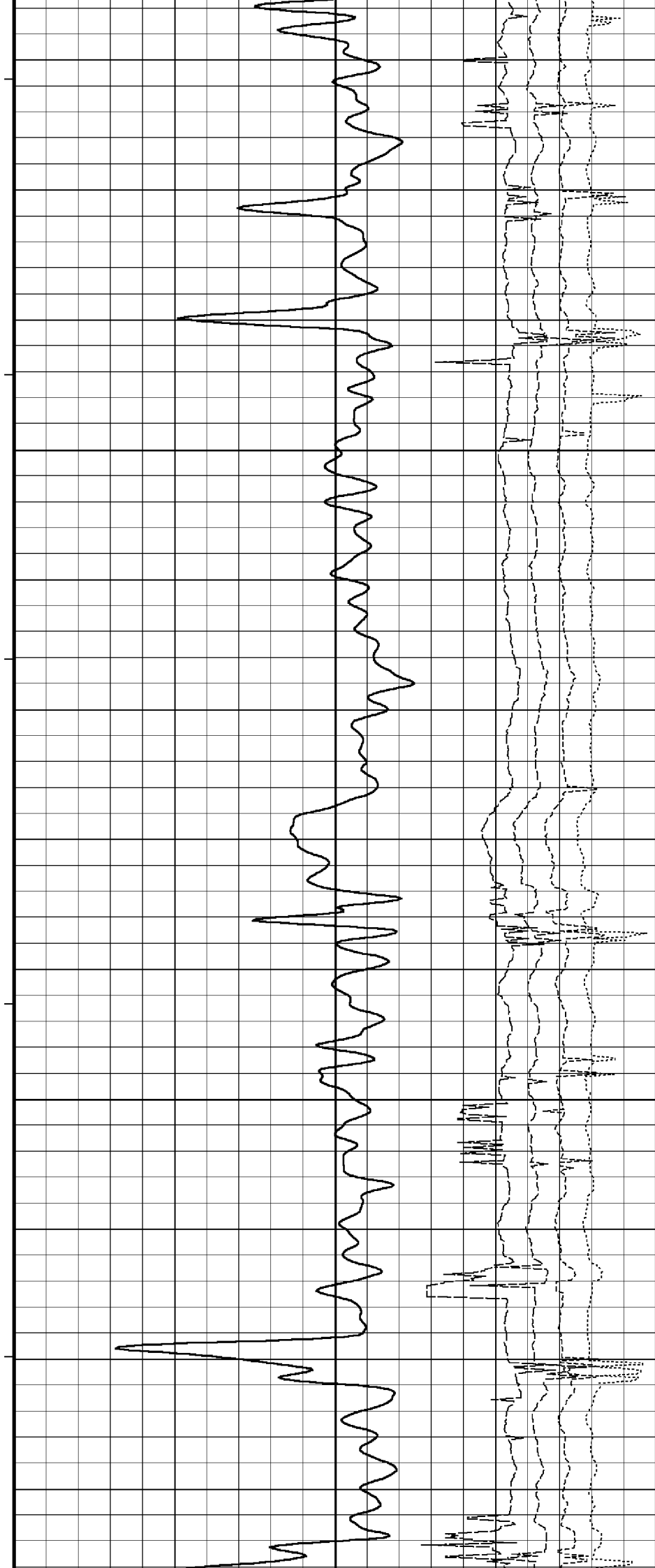
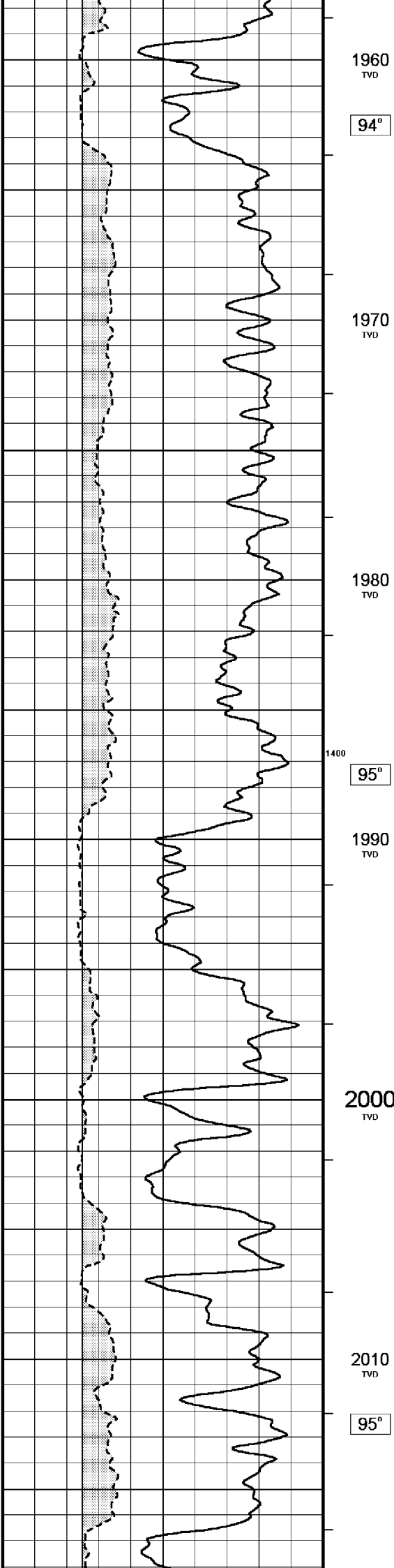
1500

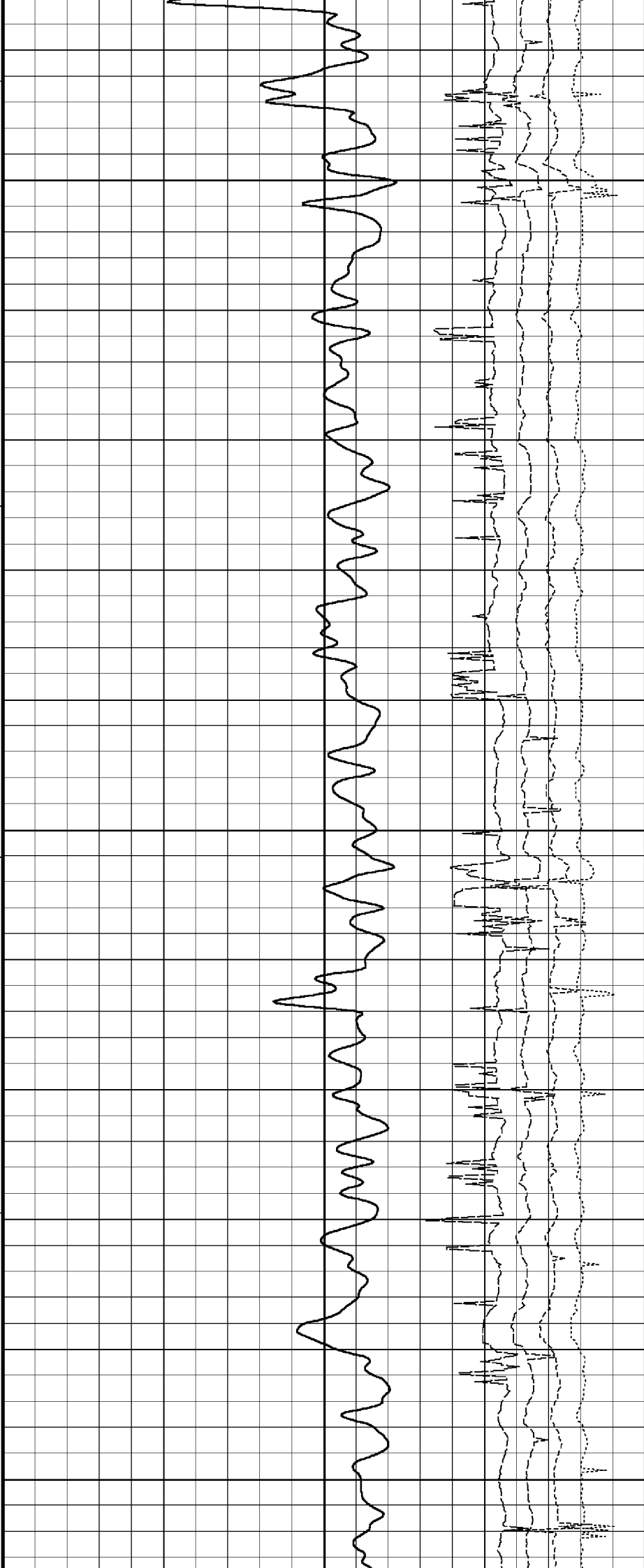
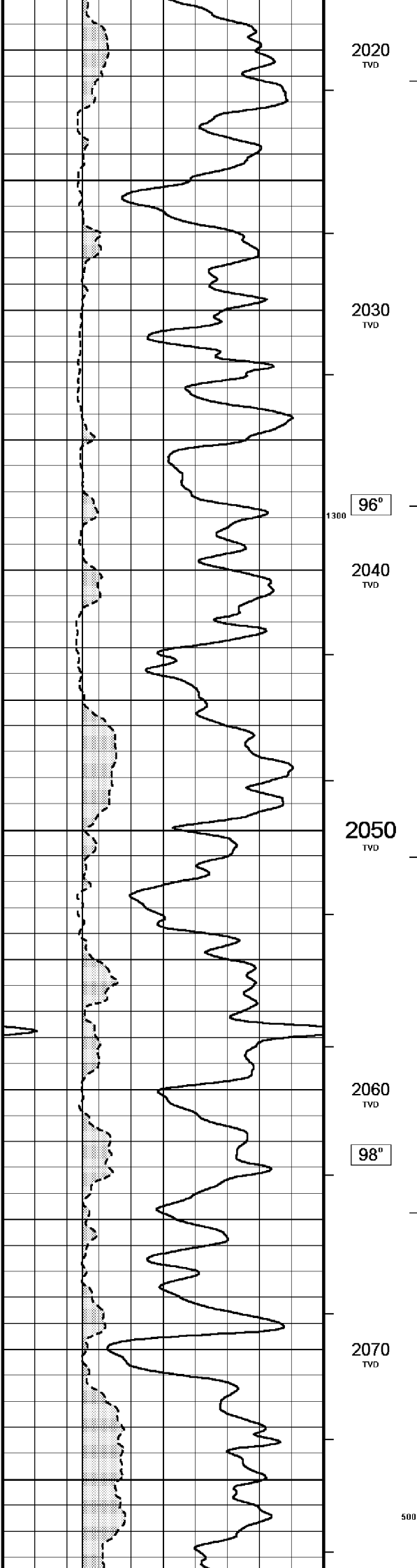
1940  
TVD

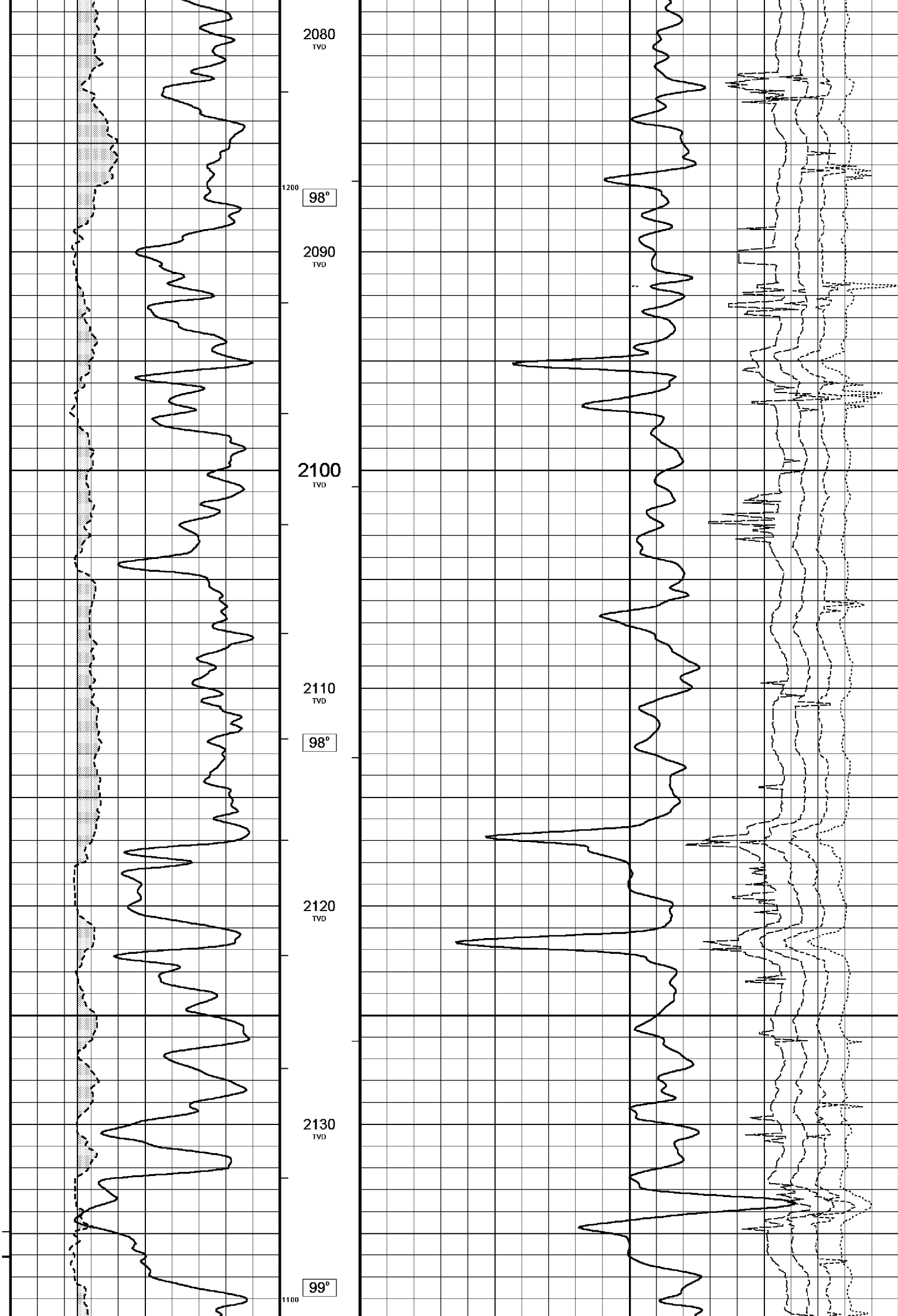
600

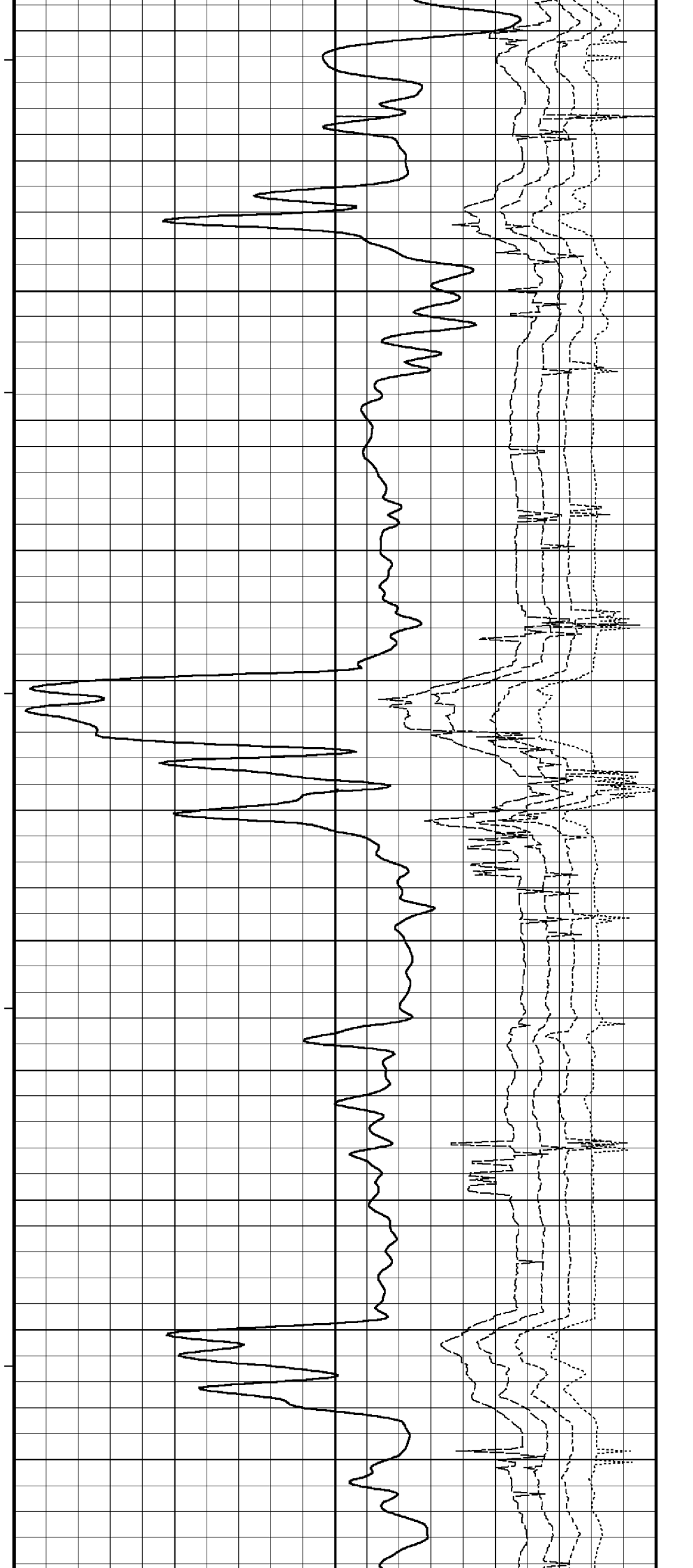
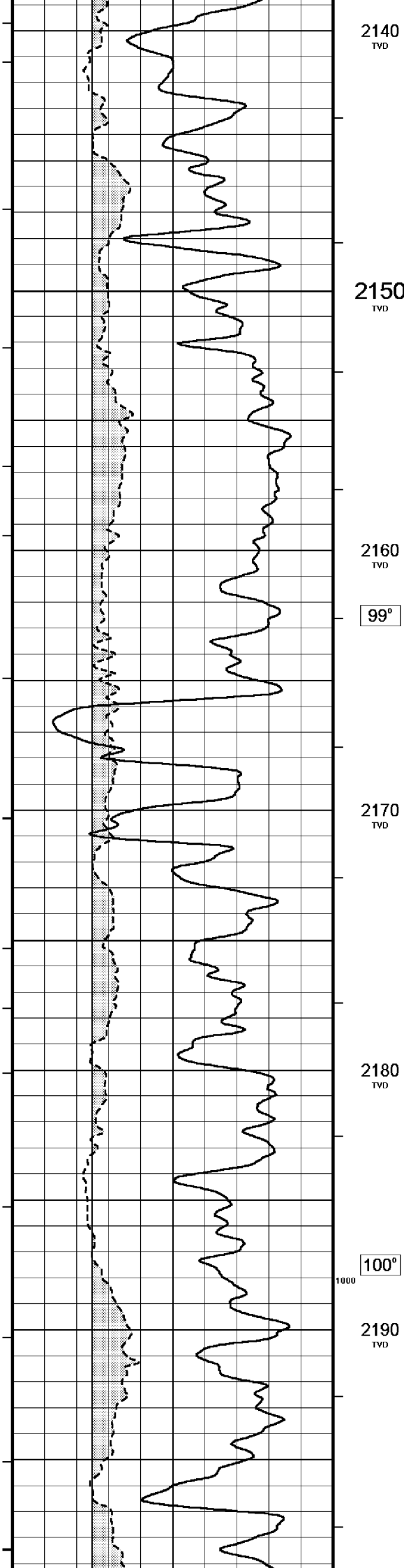
1950  
TVD



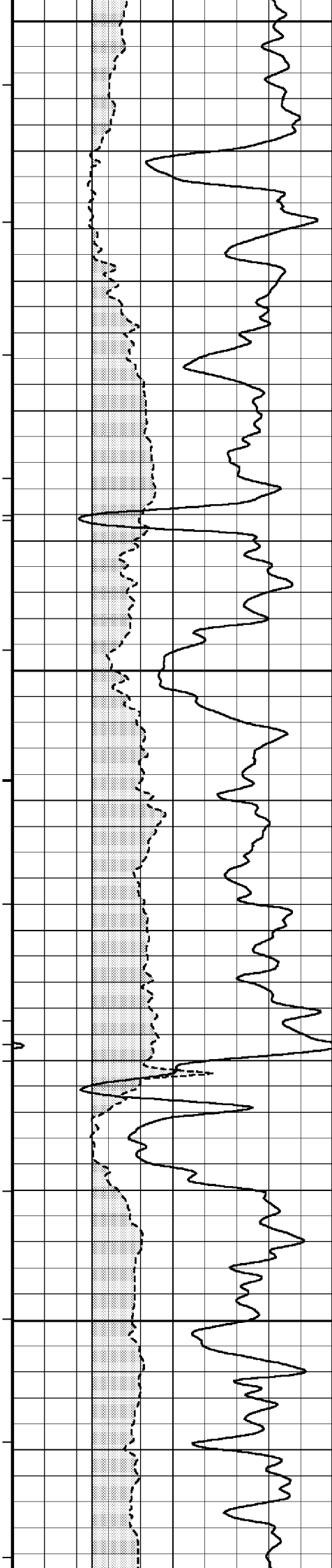












2200  
TVD

400

2210  
TVD

100°

2220  
TVD

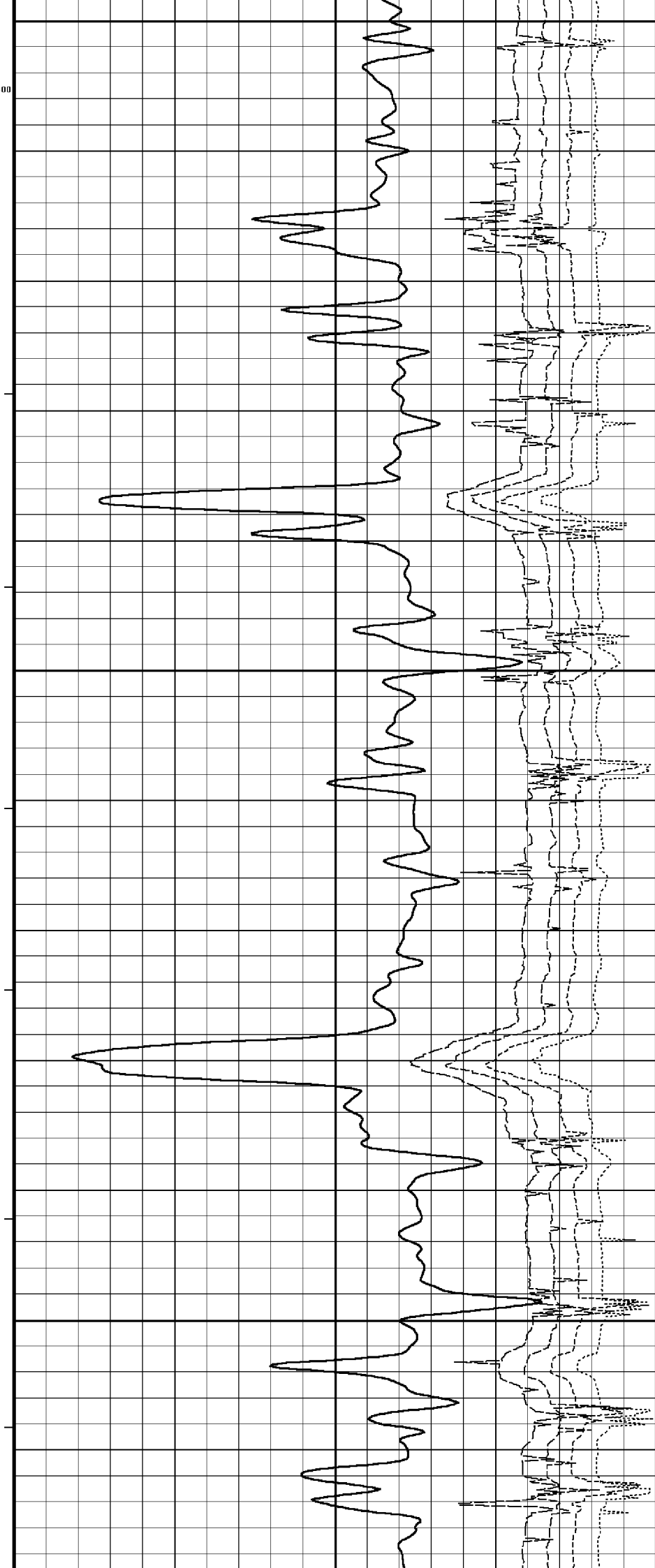
2230  
TVD

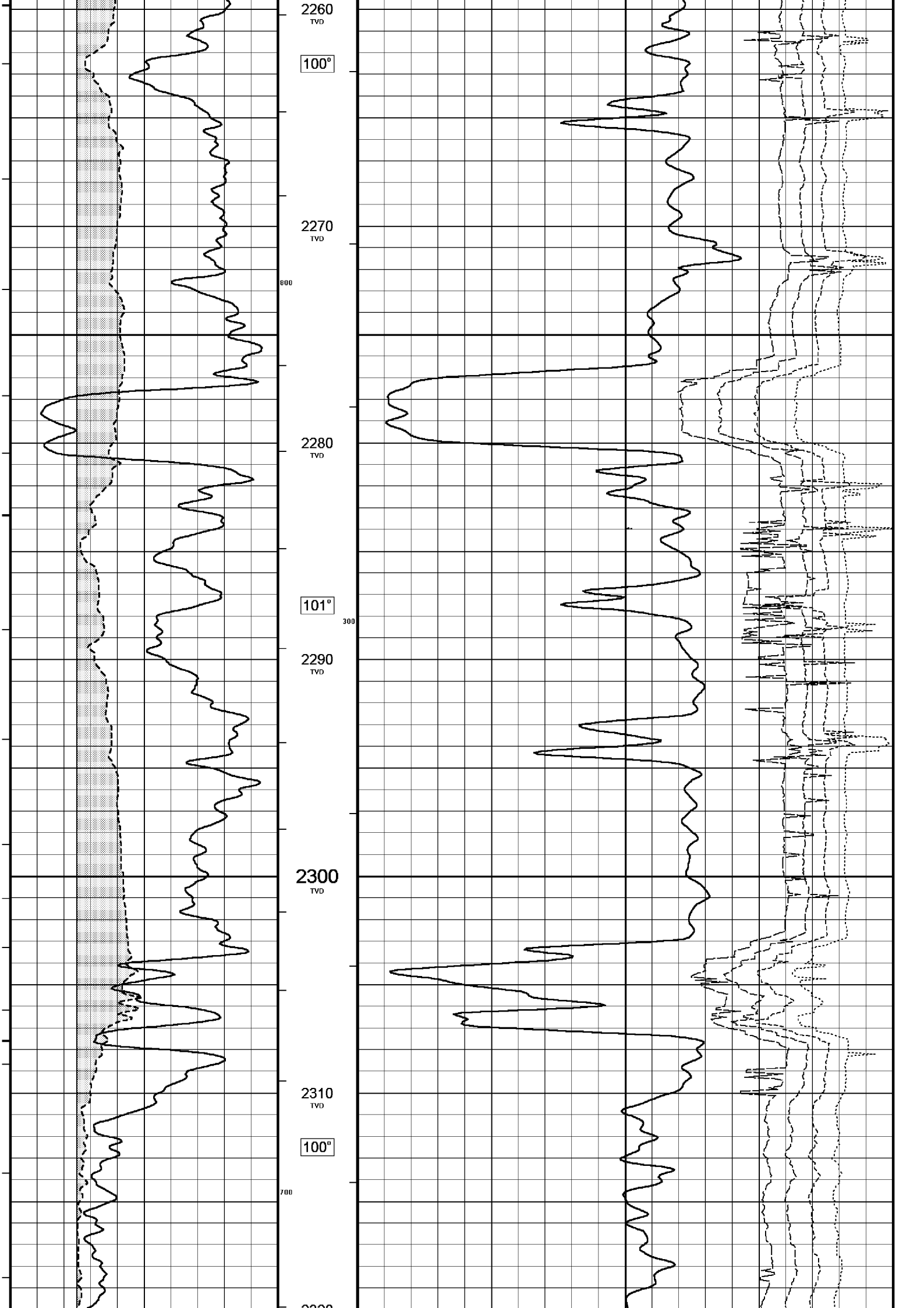
800

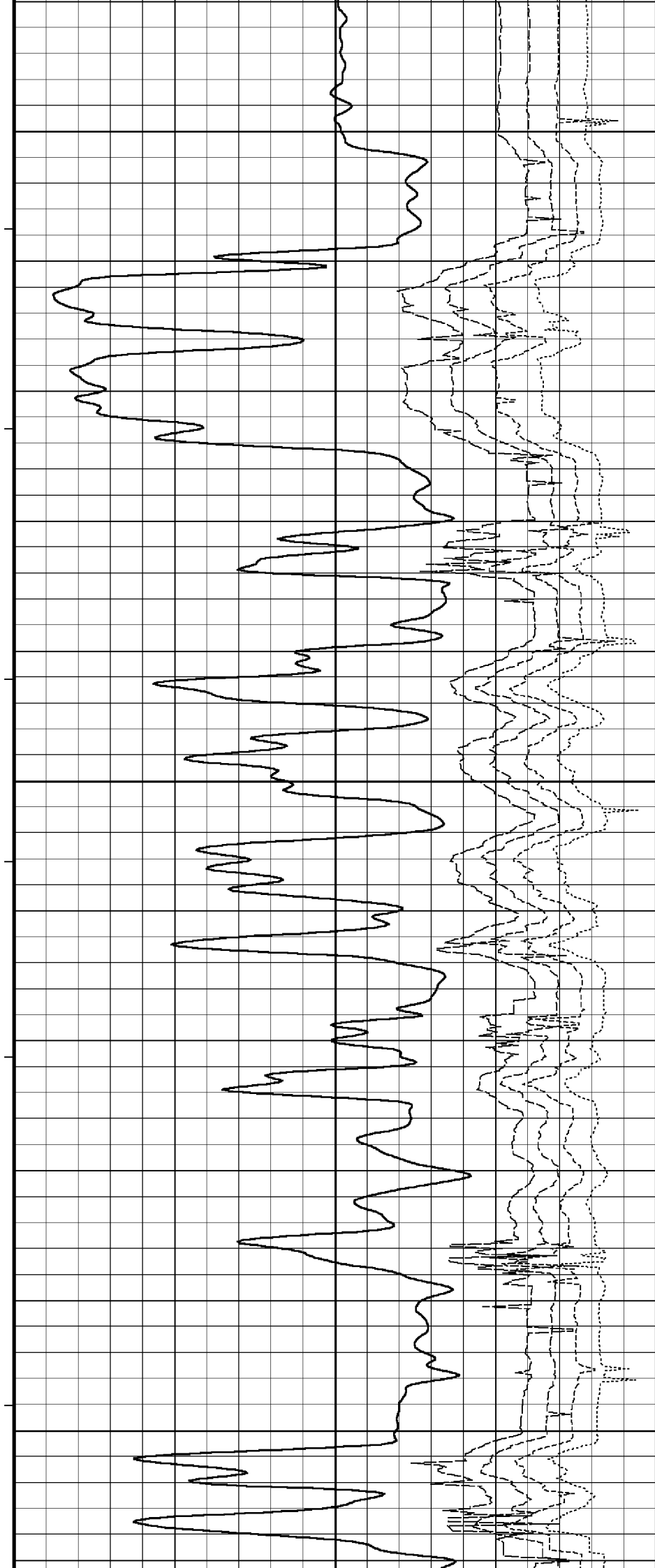
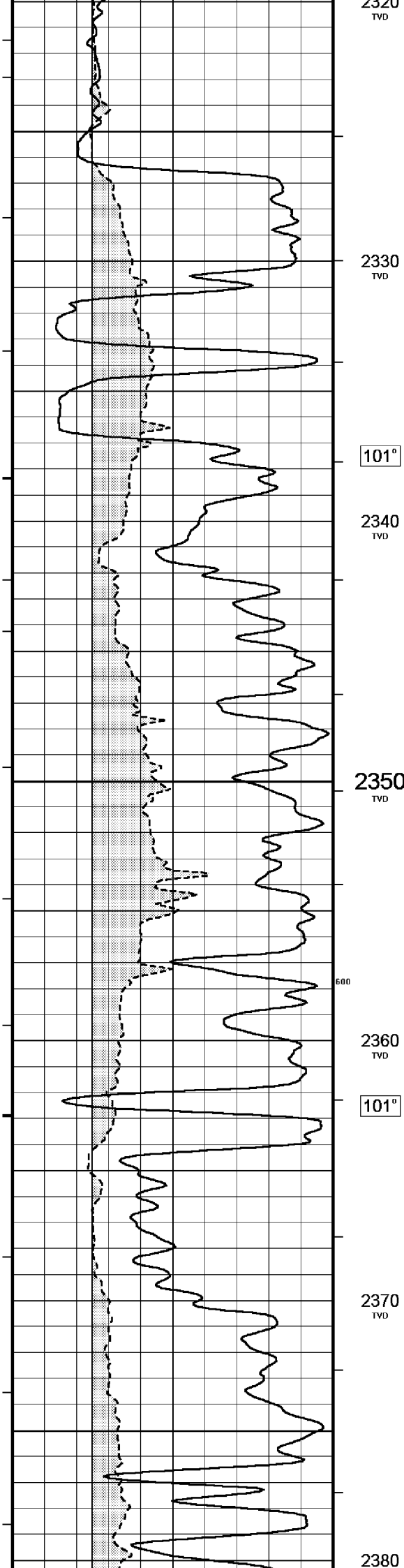
100°

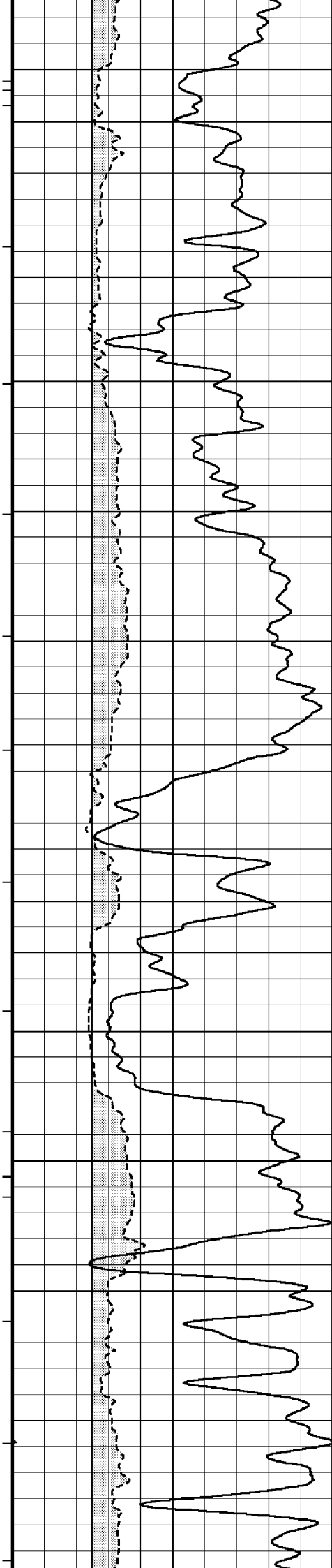
2240  
TVD

2250  
TVD

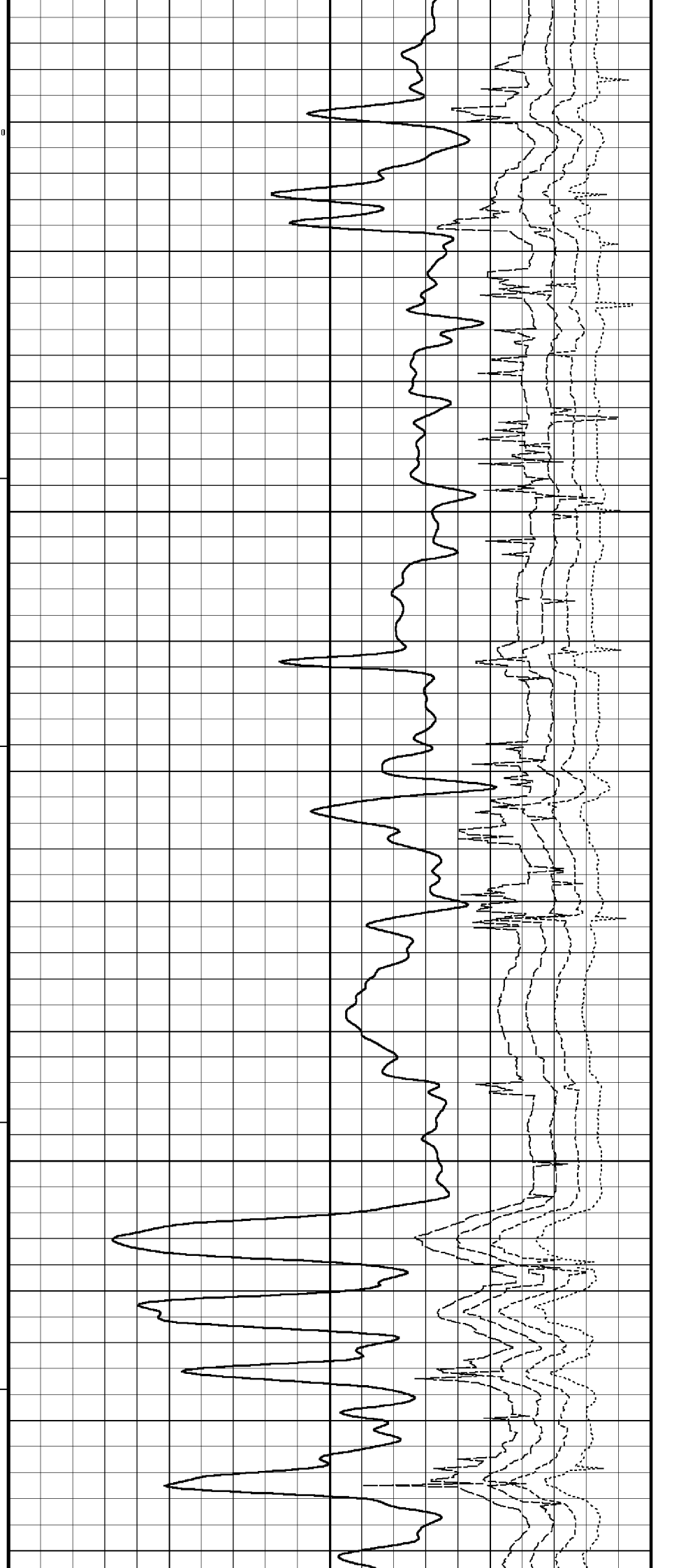


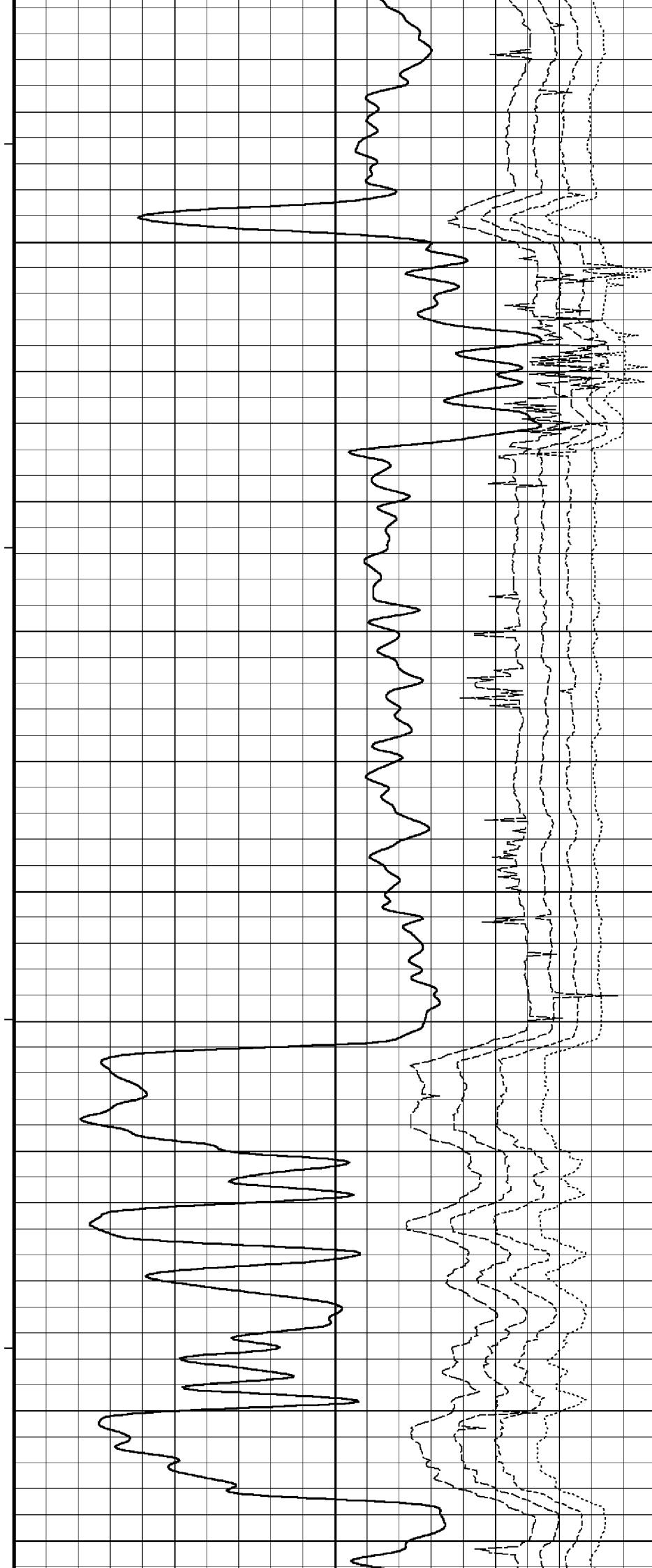
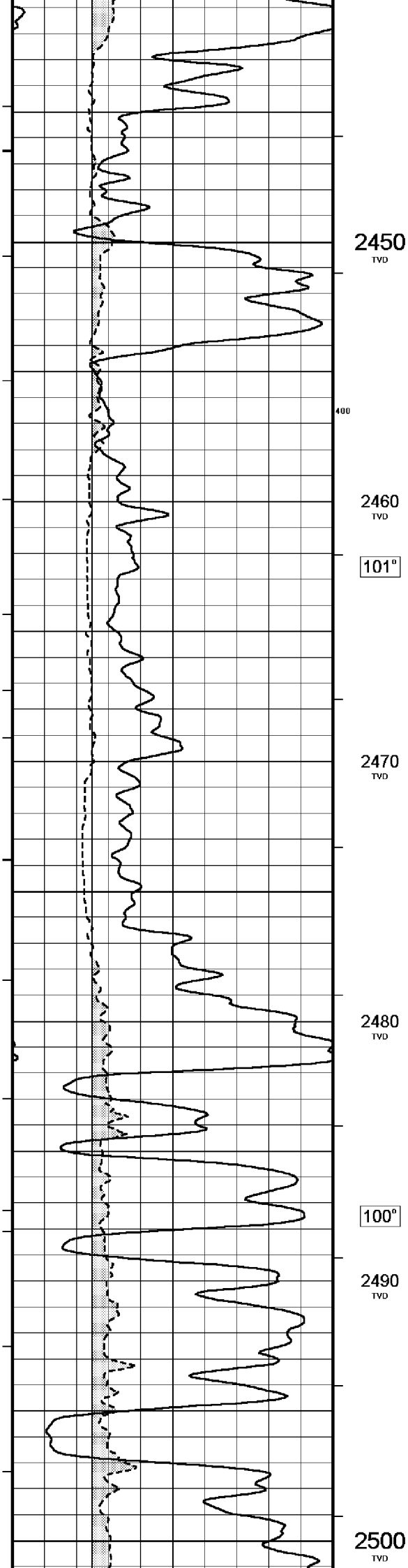


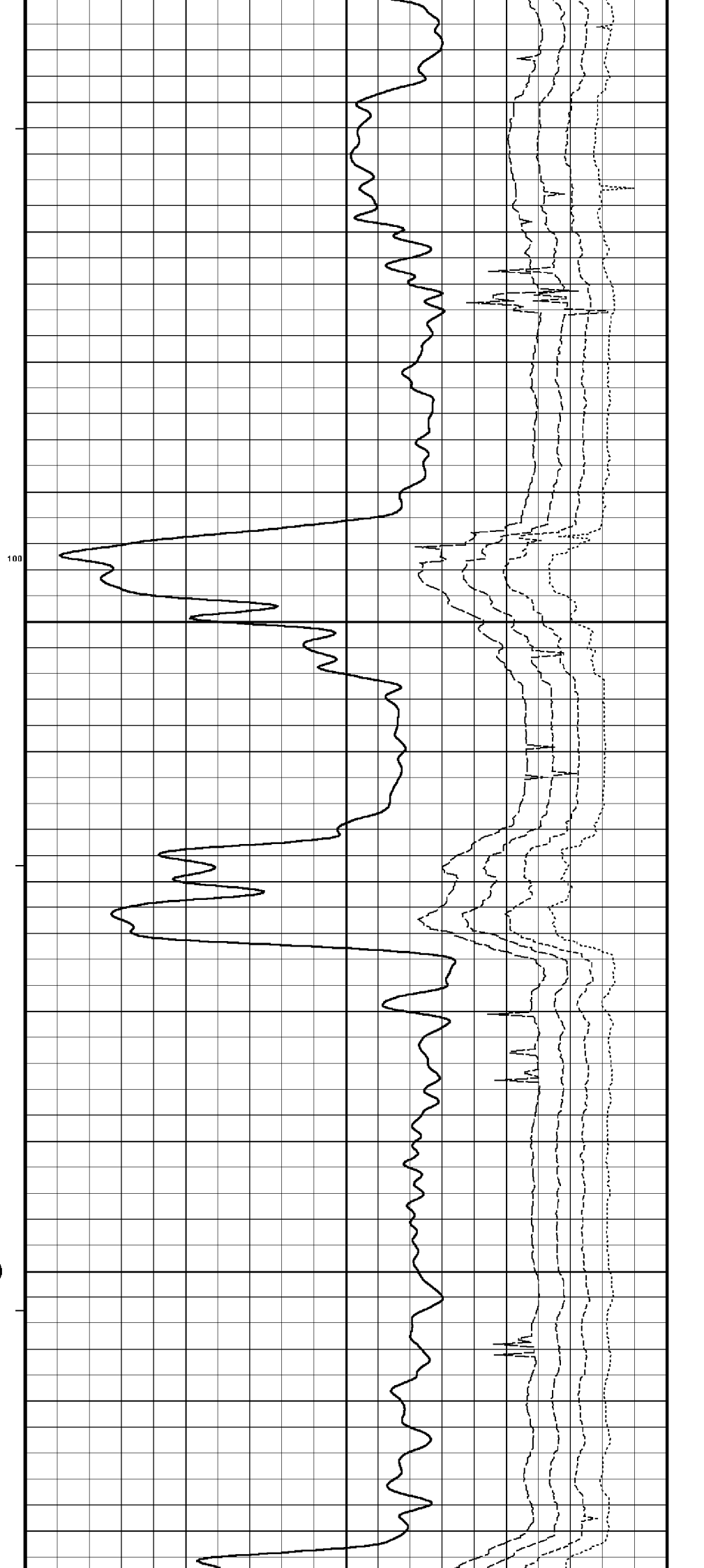
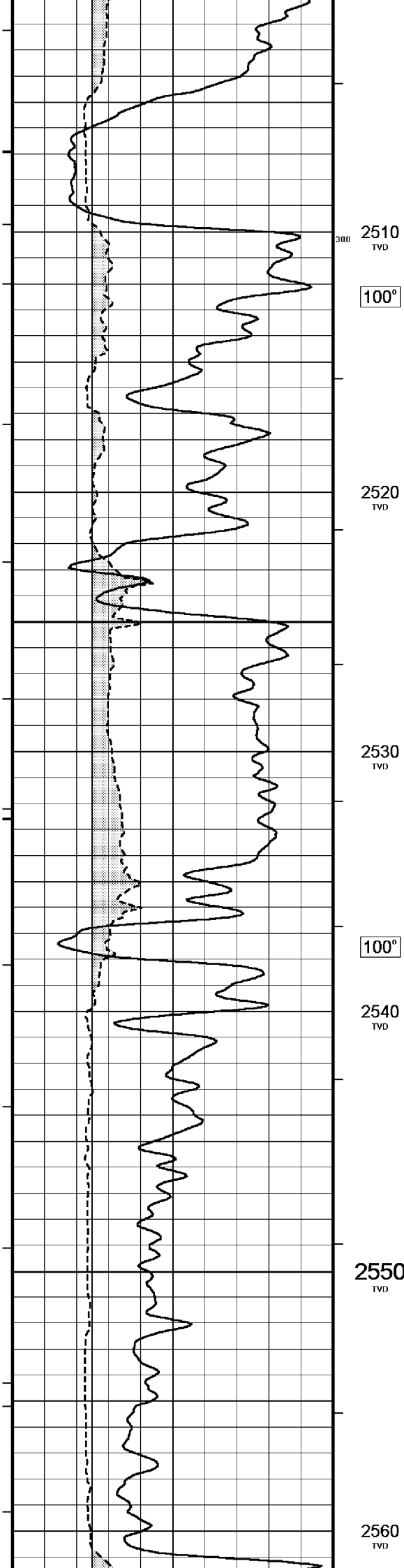


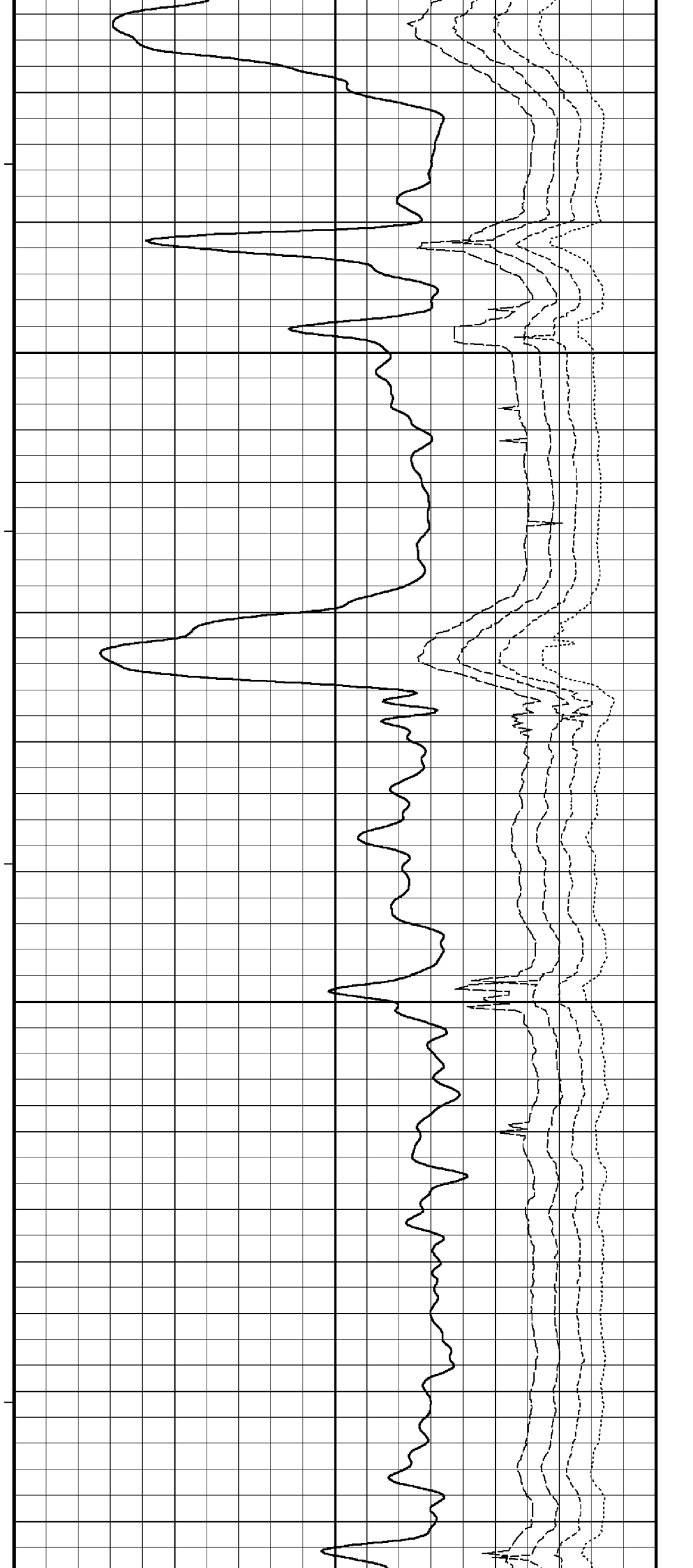
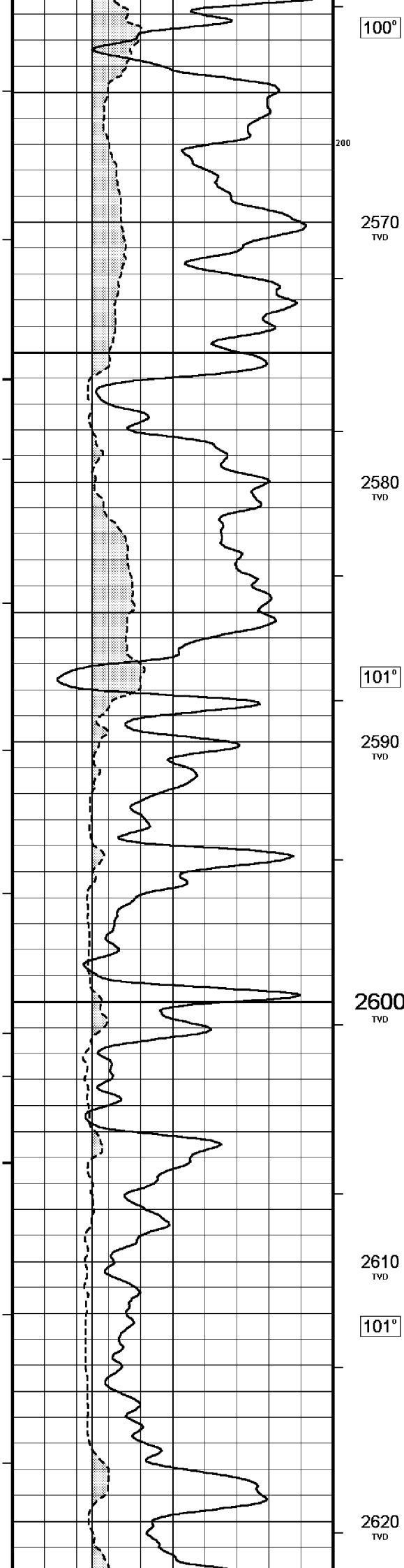


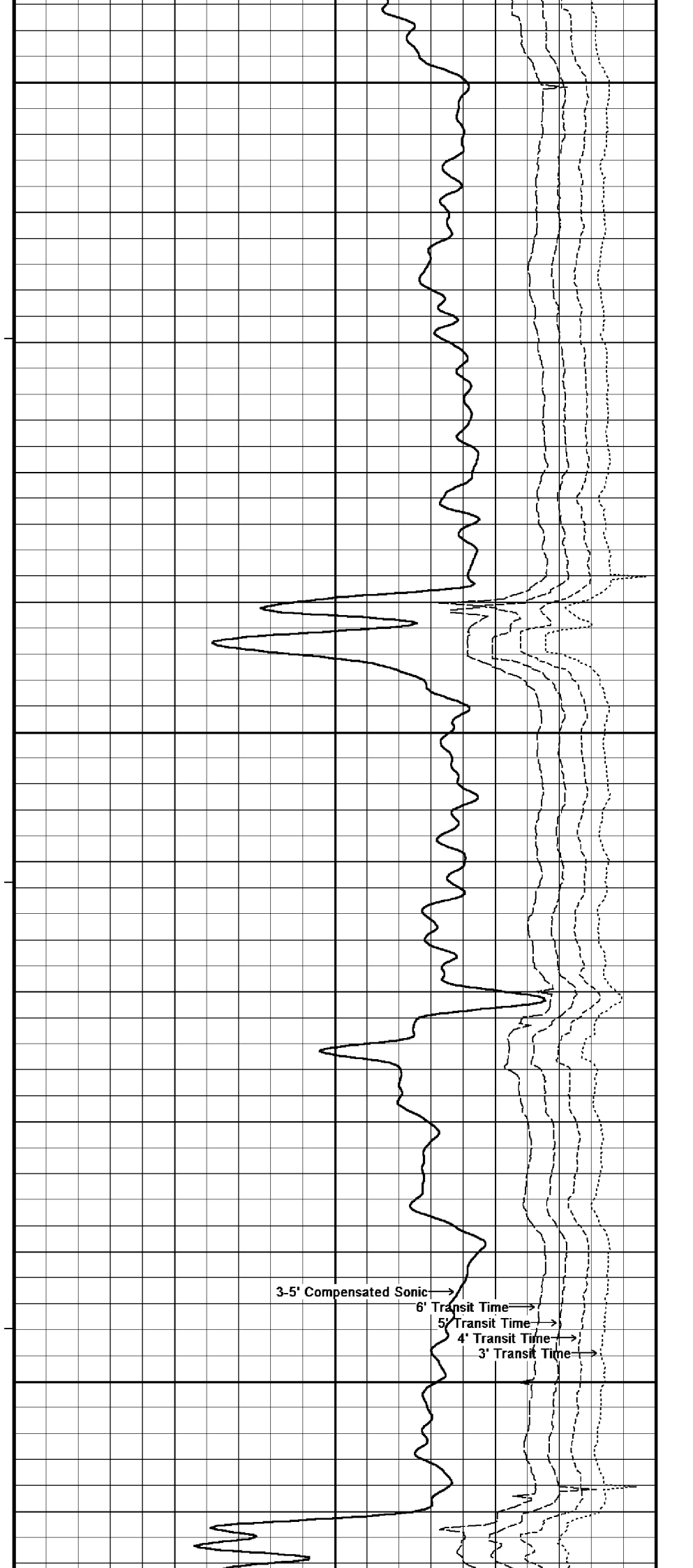
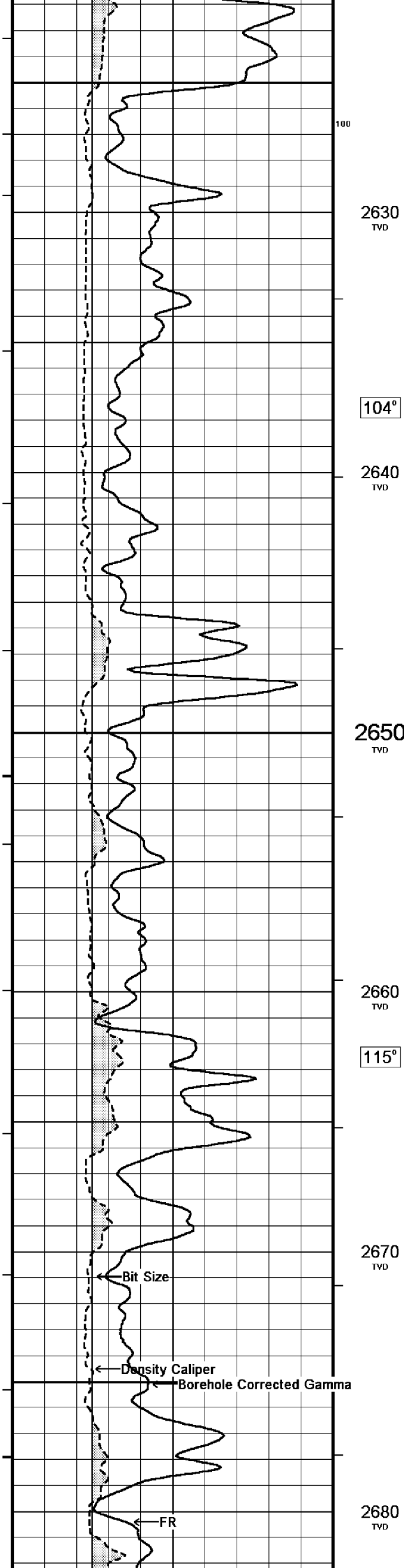
TVD  
200  
101°  
2390  
TVD  
2400  
TVD  
500  
2410  
TVD  
102°  
2420  
TVD  
2430  
TVD  
101°  
2440  
TVD



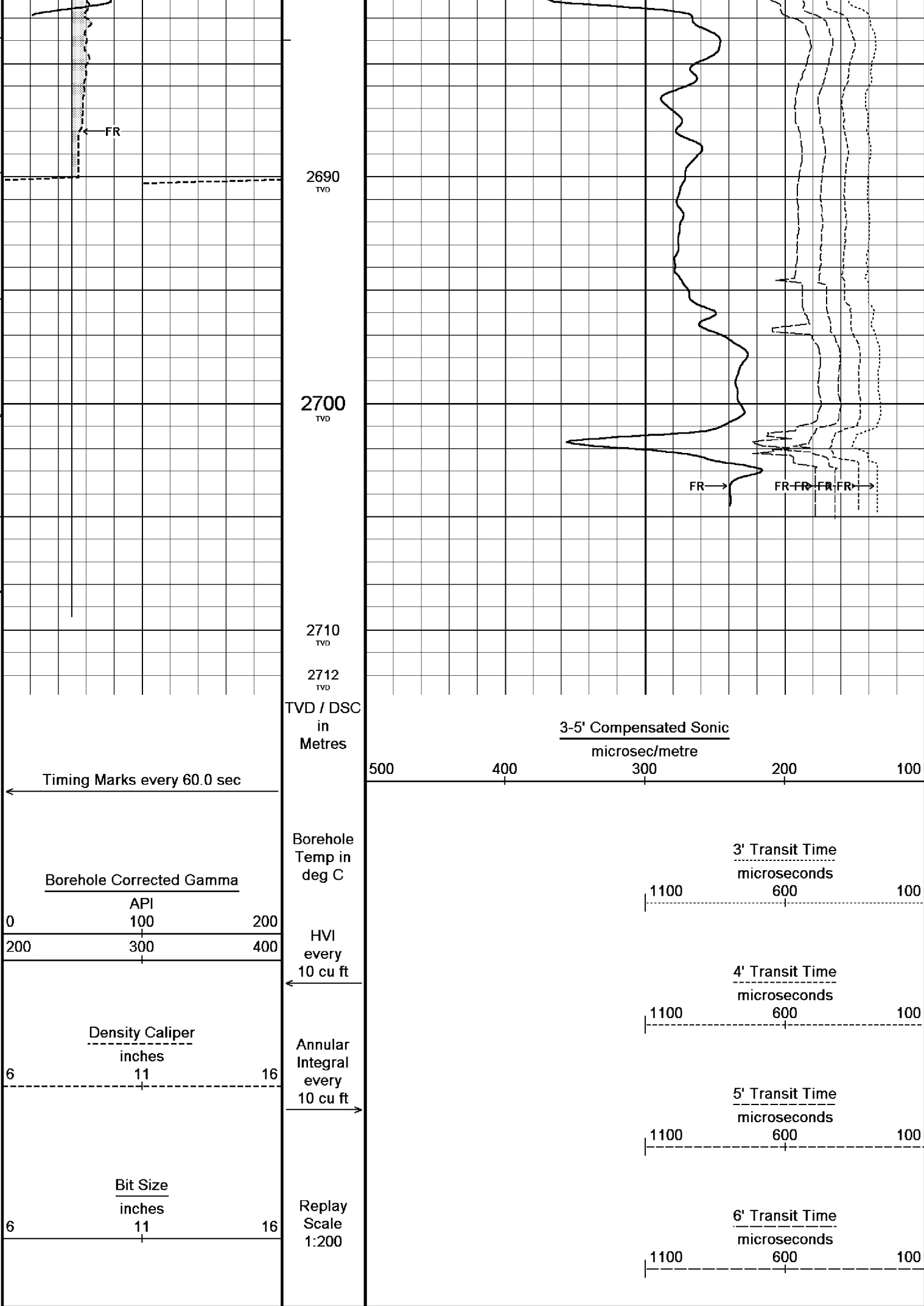














## BEFORE SURVEY CALIBRATION

C:\MLA A10AST\FINALS\BLACK AND WHITE PRESENTATIONS\MLA\_A10AST\_Main\_Log\_MSS.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	

## 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

Field Calibration on 10-FEB-2004,09:37

	Measured	Calibrated(Deg C)
Lower	0.00	0.00
Upper	100.00	100.00

## High Resolution Temperature Constants MCG 043

Pre-filter Length	11
-------------------	----

## Gamma Calibration MCG 043

Field Calibration on 13-SEP-2004 17:13

	Measured	Calibrated (API)
Background	7	4
Calibrator (Gross)	1404	913
Calibrator (Net)	1397	909

## 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

## Caliper Calibration MPD 083

Base Calibration on 1-SEP-2004 10:37

Field Calibration on 13-SEP-2004 18:41

## Base Calibration

Reading No	Measured	Calibrator Size (in)
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

## Sonic Constants MSS 047

Maximum Boundary Contrast	328.08	micro-sec/m
Fluid Transit Time	620.08	micro-sec/m
Limestone Transit Time	155.84	micro-sec/m
Sandstone Transit Time	182.09	micro-sec/m
Dolomite Transit Time	142.72	micro-sec/m
Sonic used for Porosities	3-5' Compensated Sonic	
Correction for Sonde Skew	Applied	
Cycle Stretch Algorithm	Applied	
MN3FT	N/A	micro-sec
MX2FT	N/A	micro-sec

MX3P1

N/A micro-sec

## Fixed Gate Parameters

Start Time (micro-sec)	End Time (micro-sec)	Discriminator (mV)	N/A
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A

## Down Hole Fixed Gate Parameters

Gate Start	N/A	micro-sec
Gate Width	N/A	micro-sec
Initial Discriminator Level	0.0000	mVolts

## Full Waveform Parameters

Use derived TR for 3' Waveform	N/A	
Use derived TR for 4' Waveform	N/A	
Use derived TR for 5' Waveform	N/A	
Use derived TR for 6' Waveform	N/A	
3' Waveform Discriminator Level	N/A	mV
4' Waveform Discriminator Level	N/A	mV
5' Waveform Discriminator Level	N/A	mV
6' Waveform Discriminator Level	N/A	mV
3' Waveform Filter	N/A	
4' Waveform Filter	N/A	
5' Waveform Filter	N/A	
6' Waveform Filter	N/A	
Semblance Level	N/A	
Semblance Window Width	N/A	micro-sec
Sonic 1 Despiker	N/A	N/A
Sonic 2 Despiker	N/A	N/A

## DOWNHOLE EQUIPMENT

C:\MLA A10AST\FINALS\BLACK AND WHITE PRESENTATIONS\MLA\_A10AST\_Main\_Log\_MSS.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

Compact Gamma  
MCG 43 Length: 2.65 m Weight: 63.9 lb

31.38 m GGCE - Borehole Corrected Gamma  
30.50 m CGXT - MCG External Temperature

Compact Memory Sub.  
MMS 24 Length: 0.95 m Weight: 22.0 lb

Compact Knuckle Joint  
SKJ 100 Length: 0.66 m Weight: 24.3 lb

Compact Swivel Head Adaptor  
SHA 71 Length: 0.83 m Weight: 26.5 lb

Compact Inline Bowspring A  
MIS 94 Length: 1.74 m Weight: 33.1 lb

Compact Neutron  
MDN 85 Length: 1.53 m Weight: 50.7 lb

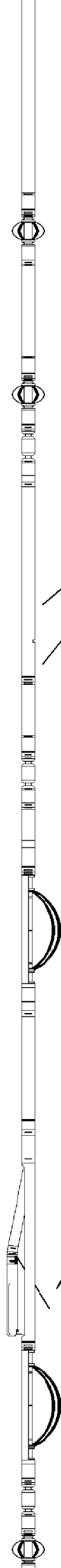
Compact Density/Caliper  
MPD 83 Length: 2.92 m Weight: 90.4 lb

22.65 m AVOL - Annular Volume  
22.65 m HVOL - Hole Volume  
22.65 m CLDC - Density Caliper

Compact Inline Bowspring A  
MIS 24 Length: 1.74 m Weight: 33.1 lb

Compact Knuckle Joint  
SKJ 102 Length: 0.66 m Weight: 24.3 lb

Compact Inline Standoff B



MIS 139 Length: 0.65 m Weight: 15.4 lb

Compact Upper Guard Sub.  
MUG 5 Length: 2.74 m Weight: 68.3 lb

Compact Inline Standoff B  
MIS 136 Length: 0.65 m Weight: 15.4 lb

Compact Laterolog Electrode Sub.  
MLE 17 Length: 3.76 m Weight: 92.6 lb

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



4.60 m TR21 - 3' Transit Time  
4.60 m TR12 - 6' Transit Time  
4.60 m TR22 - 5' Transit Time  
4.60 m TR11 - 4' Transit Time

4.60 m DT35 - 3-5' Compensated Sonic

Tool Zero (0.44m from bottom)

All measurements relative to tool zero.

WELL		Main AT0a 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
<div><div><div>Reeves</div><div>Compact</div></div><div>COMPENSATED SONIC 1:200 TVD</div></div>					