Tucker WIRELINE SERVICES

COMPENSATED NEUTRON

PEL DENSITY MICRO LOG

Company RUNNING FOXES PETROLEUM
Well RUYLE #11-31-1
Field TATE
County SUMNAR
State KANSAS
Country USA
API No. 15-191-22594-00-00

File No : TUL-56051
Company : RUNNING FOXES PETROLEUM
Well : RUYLE #11-31-1
Field : TATE
County : SUMNAR
State : KANSAS
Country : USA
API No : 15-191-22594

Location :
2310' FSL & 2126' FWL
W/2 NE NE SW

LSD : **Sect :** 31 **Twp :** 32S **Rge :** 2E

Permanent Datum:	GL	**Elevations:**		**Services:**	
Drilling Measured From:	KB	**KB**	1164.00 Ft	CNT	CST
Log Measured From:	KB	**DF**	1163.00 Ft	LDT	PIT
Above Permanent Datum:	10.00 Ft	**GL**	1154.00 Ft	MLT	

Date	2011-05-03			
Run Number	1			
Depth--Driller	3712.0 Ft			
Depth--Logger	3717.0 Ft			
First Reading	3684.0 Ft			
Last Reading	1950.0 Ft			
Casing--Driller	263.0 Ft			
Casing--Logger	264.0 Ft			
Bit Size	7.875 In			
Casing Size	8.625 In			
Hole Fluid Type	WBM			
Density	9.2 LBS/GAL			
Fluid Loss	8.4 CC			
PH/Viscosity	9.5	41.0 SEC		
Sample Source	MEASURED			
RM@Measured Temp.	2.000 @ 70 F			
RMF@Measured Temp	1.600 @ 70 F			
RMC@Measured Temp.	2.400 @ 70 F			
Source RMF/RMC	CALCULATED	CALCULATED		
RM@BHT	1.259 @ 118 F			
Time Circulation Stopped	2011-05-03 19:34			
Max Recorded Temp.	118 F			
Equipment/Base	TRK 127	TULSA		
Recorded By	B.BAILEY			
Witnessed By	G.BRATTON, J.ABBOTT			

Bitsize Intervals

Size (In)	Bottom (Ft)
7.875	3712.00

Casing Strings

Size (In)	Weight (Lbs)	Bottom (Ft)
8.625	32.00	263.00

Run Number	1	
Date	2011-05-03	
Date/Time On Bottom	2011-05-03 15:46	
Depth to Fluid	0.0 Ft	
Salinity	0.000 PPM	
RMF@BHT	1.132 @ 118 F	
RMC@BHT	1.510 @ 118 F	

Run Number 1

Comments

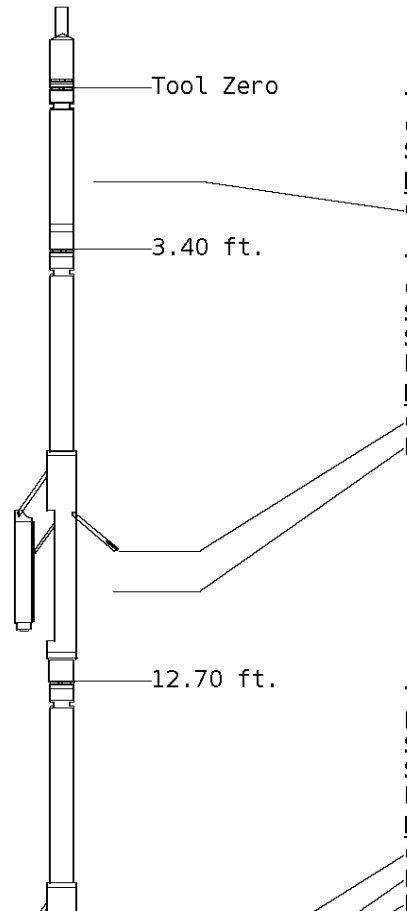
ALL PRESENTATIONS AS PER CUSTOMER REQUEST
GRT, CNT, LDT, MLT, CST AND PIT RUN IN COMBINATION.
CALIPERS ORIENTED ON X-Y AXIS.
2.71 G/CC USED TO CALCULATED POROSITY.
ANNULAR HOLE VOLUME CALCULATED UISING 5.500" PRODUCTION CASING.

GRT: GRP.
CNT: PHIN, CLCNIN
LDT: PORL, LCORN, PECLN, LDENN, PORLLS, CLLDIN.
MLT: NOR_R, INV_R, MSCLPIN.
CST: PORS, DDCDTF, TT1PF, TT3PF, ITT.
PIT: ILD, ILM, SPU, SFLAEC

OPERATORS:
M.BURKE
J.THOMAS

Tool String Schematic

Total Tool Length - 66.95 **ft.**
Maximum Outside diameter - 6.00 **in.**
Net Weight in Air - 1171.00 **lbs.**



Tool: GRT-B **Length:** 3.40 **ft.** **O.D.** 3.60 **in.**
Gamma Ray Controller
Sonde ID :GRT-BA-14

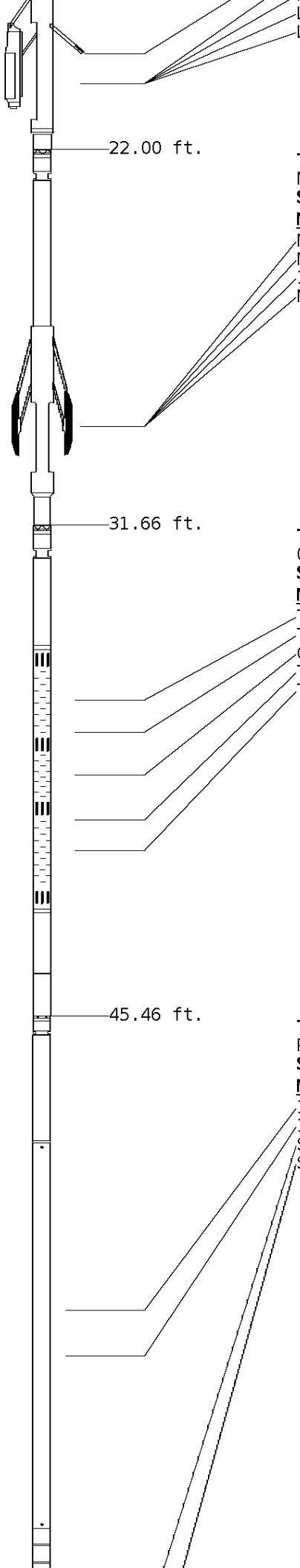
Measure Point	Tool Offset	Stack Offset	Bottom Offset
GRP	2.00	2.00	64.95

Tool: CNT-AA **Length:** 9.30 **ft.** **O.D.** 4.36 **in.**
Compensated Neutron A Pad on NDT-A
Sonde ID :NDT-AB-400
Source ID :N-1044
Pad ID :CNP-AA-116

Measure Point	Tool Offset	Stack Offset	Bottom Offset
CLCN	6.00	9.40	57.55
PHIN	6.80	10.20	56.75

Tool: LDT-DA **Length:** 9.30 **ft.** **O.D.** 4.80 **in.**
Litho Density D Pad on NDT-A
Sonde ID :PDT-GA-466
Source ID :CSV-587
Pad ID :LDP-DA-02

Measure Point	Tool Offset	Stack Offset	Bottom Offset
CLLD	6.00	18.70	48.25
PEL	7.00	19.70	47.25
PES	7.40	20.10	46.85



LDEN	7.20	19.90	47.05
LCOR	7.20	19.90	47.05

22.00 ft.

Tool: MST-DA **Length:** 9.66 **ft.** **O.D.** 6.00 **in.**
Micro Spherically Focused (IC)
Sonde ID :MST-DA-36

Measure Point	Tool Offset	Stack Offset	Bottom Offset
MSFL	7.60	29.60	37.35
MSCLP	7.60	29.60	37.35
INV	7.60	29.60	37.35
NOR	7.60	29.60	37.35

31.66 ft.

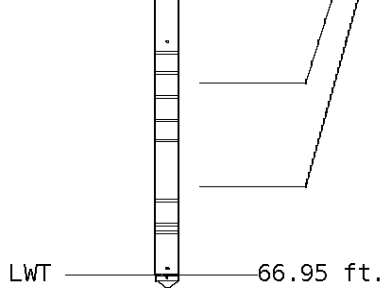
Tool: CST-AD **Length:** 13.80 **ft.** **O.D.** 3.60 **in.**
Open Hole Sonic
Sonde ID :CST-AD-38

Measure Point	Tool Offset	Stack Offset	Bottom Offset
TT1	4.80	36.46	30.49
TT3	5.80	37.46	29.49
CDT	7.30	38.96	27.99
TT4	8.80	40.46	26.49
TT2	9.80	41.46	25.49

45.46 ft.

Tool: PIT-CA **Length:** 21.49 **ft.** **O.D.** 3.62 **in.**
Phased Dual Induction w/ RM & D
Sonde ID :PIT-CA-075

Measure Point	Tool Offset	Stack Offset	Bottom Offset
ILD	8.92	54.38	12.56
ILM	10.10	55.56	11.39
SFLU	17.49	62.95	4.00
SP	20.60	66.06	0.88



Well File: Running_Foxes_Petroleum_Ruyle_11-31-1_may3-qst
Segment: V1.D1.S6 RE MAIN
Reference: 0

Scale: 1:240
Acquired: 2011-05/03 20:44 3.2.0-9901
Processed: 2011-05/03 22:07 3.2.0-9901

CALIPER MICRO
INCHES (IN)
16 — 26
6 — 16

TENSION
LBS
10000 — 0

BIT SIZE
INCHES (IN)
6 — 16

Volume
Dolo/Shale

DENSITY (X) CALIPER
INCHES (IN)
16 — 26
6 — 16

Volume
Quartz

NEUTRON (Y) CALIPER
INCHES (IN)
16 — 26
6 — 16

Volume
Calcite

GAMMA RAY
API UNITS
150 — 300
0 — 150

-BHV AHV-
CU.FT

PE CROSS-SECTION
BARNS/ELECTRON
0 — 10

DENSITY CORRECTION
G/CC
-0.25 — 0.25

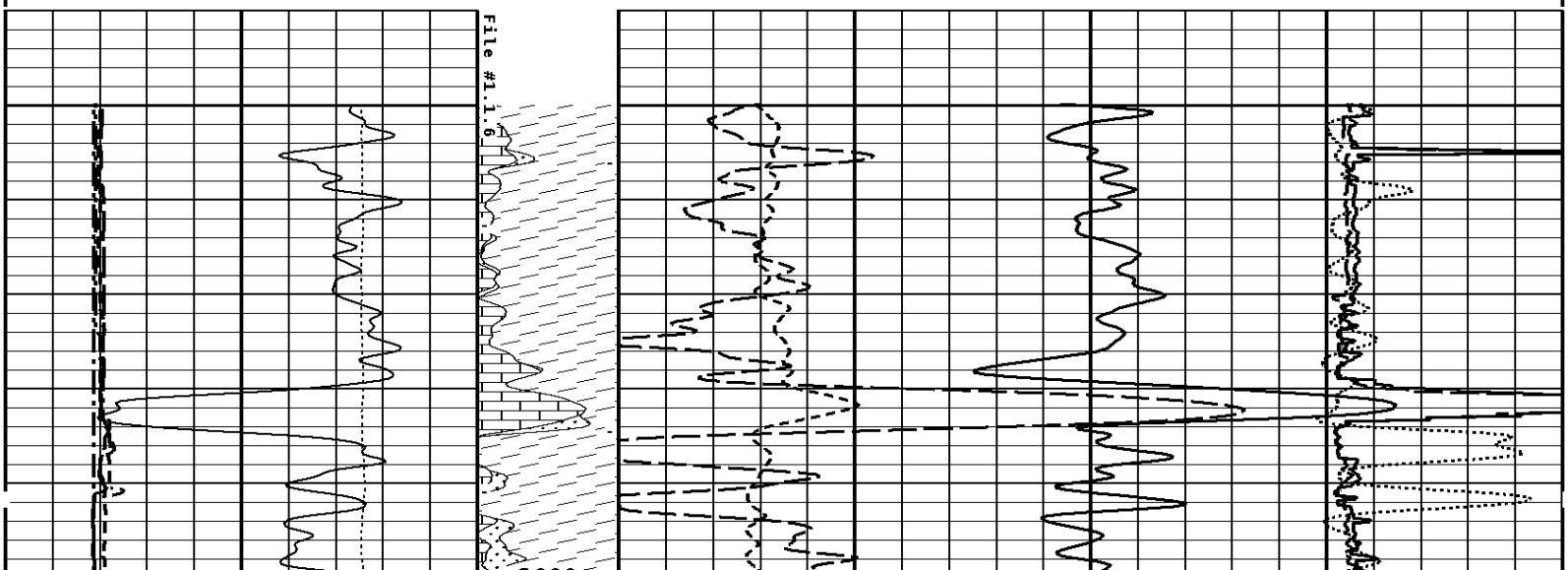
NEUTRON POROSITY
PERCENT (LIMESTONE MATRIX)
30 — -10

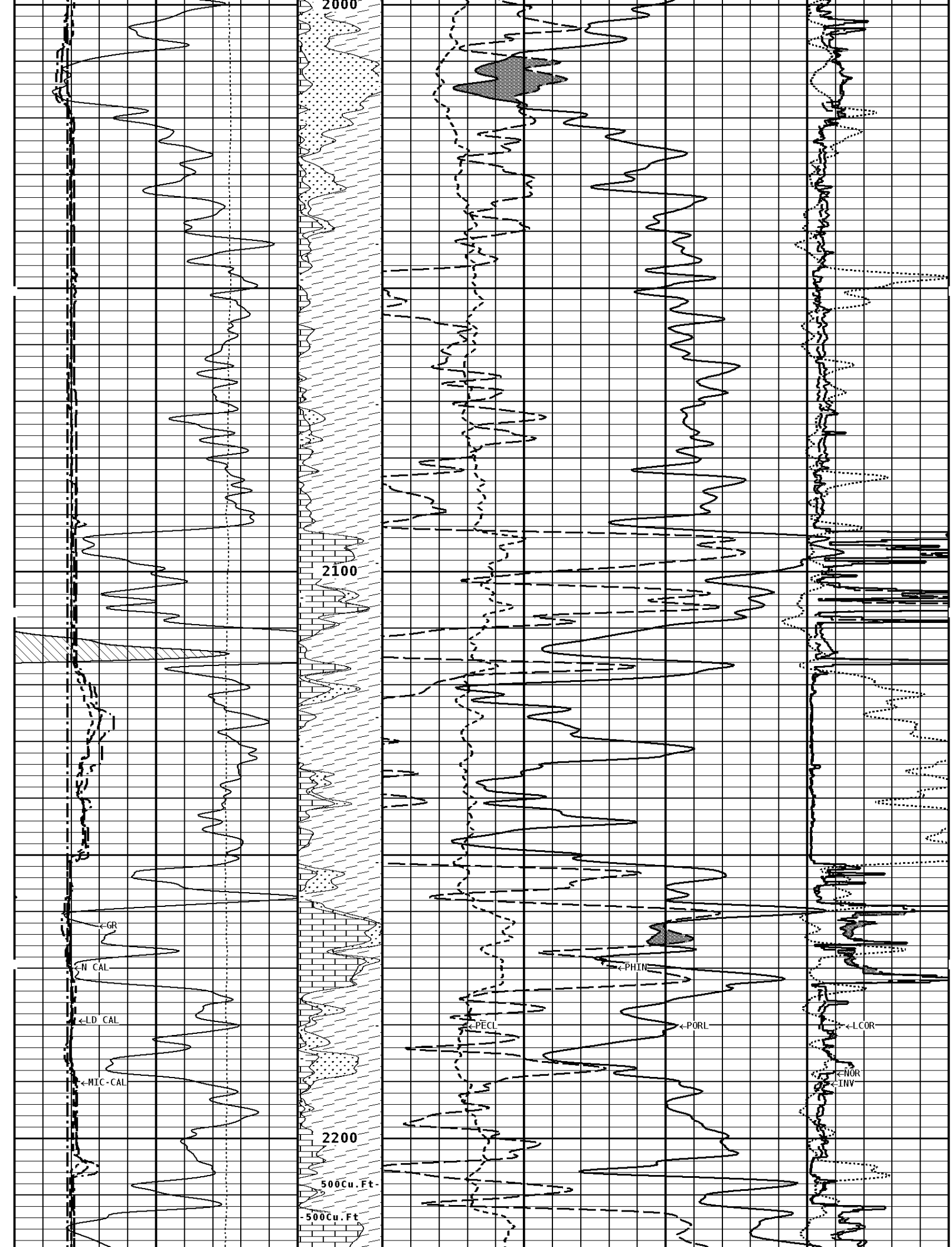
DENSITY POROSITY
PERCENT (2.71 g/cc)
70 — 30
30 — -10
-10 — -50

MICRO-INVERSE
OHMM
0 — 40

MICRO-NORMAL
OHMM
0 — 40

1:240 MAIN SECTION

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←LD CAL
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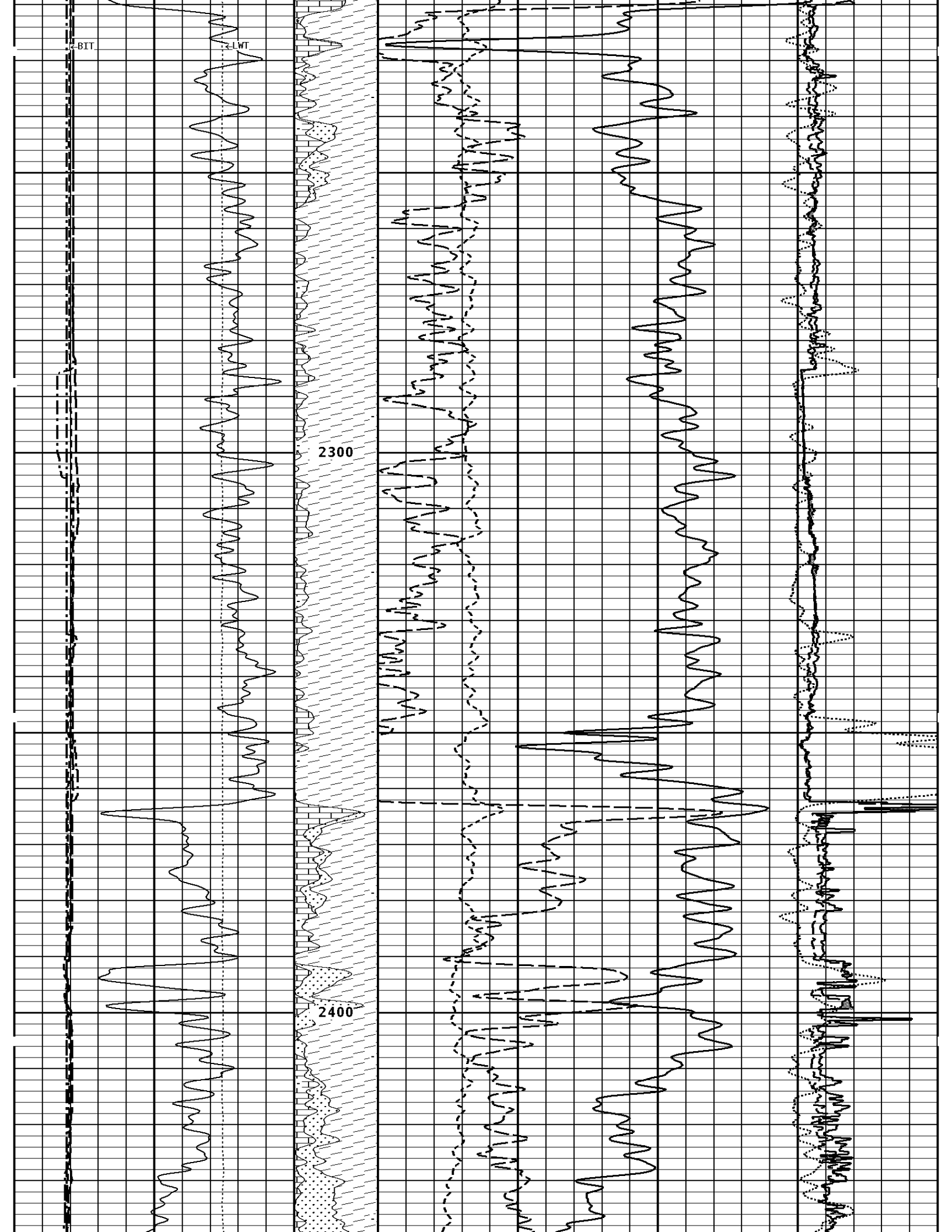
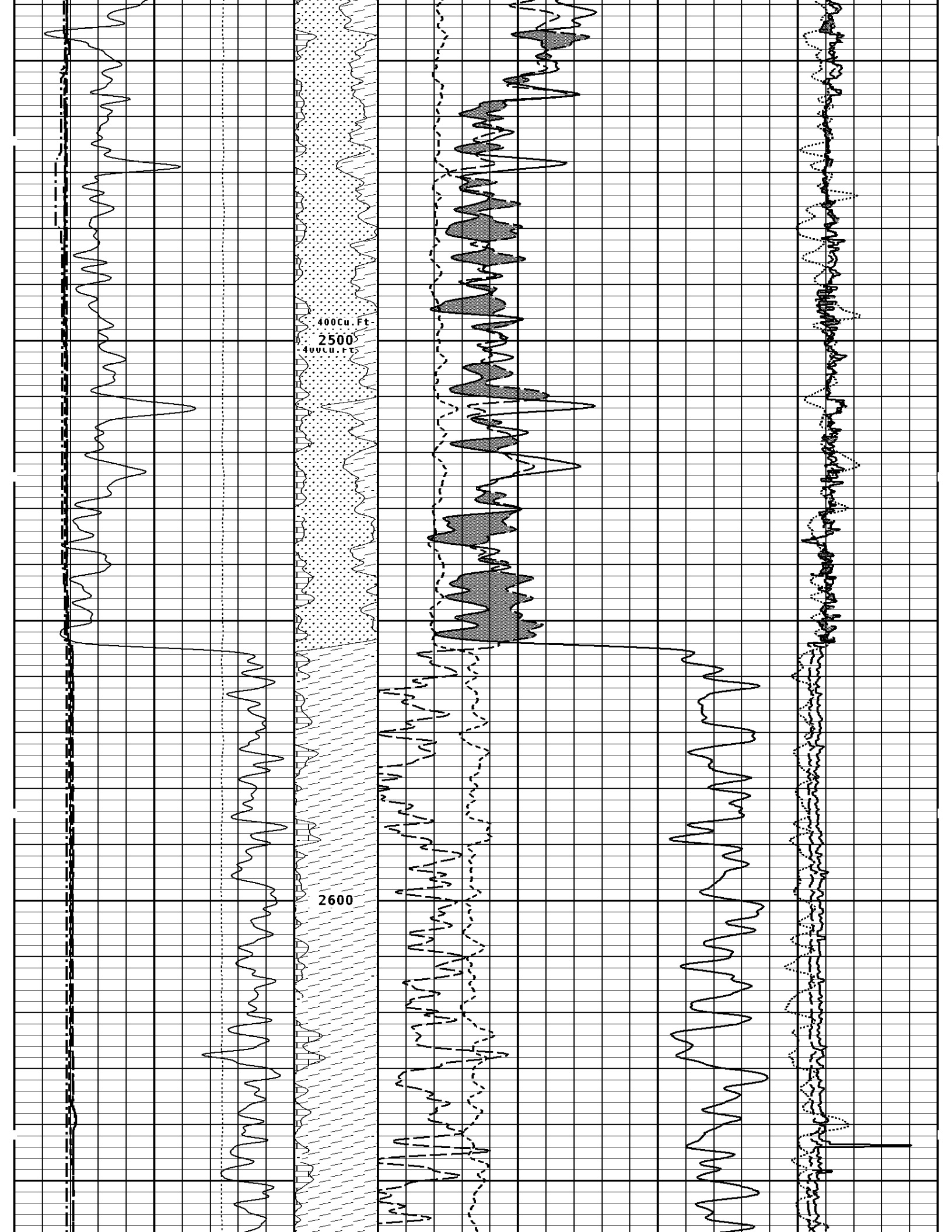
←PECL
←PORL
←LCOR
←NOR
←INV


BIT
LWT
2300
2400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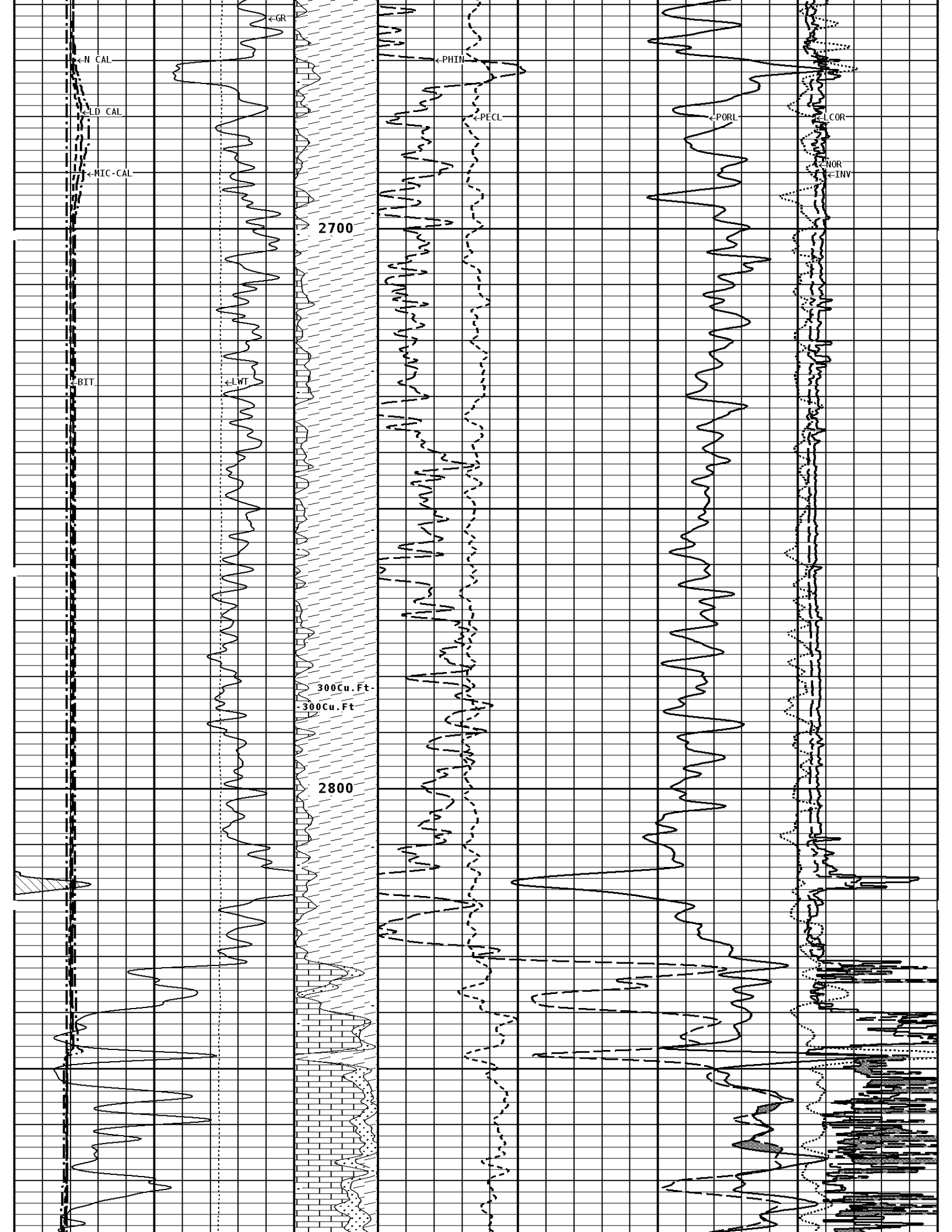
2500
4000Cu.Ft.
2600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INV
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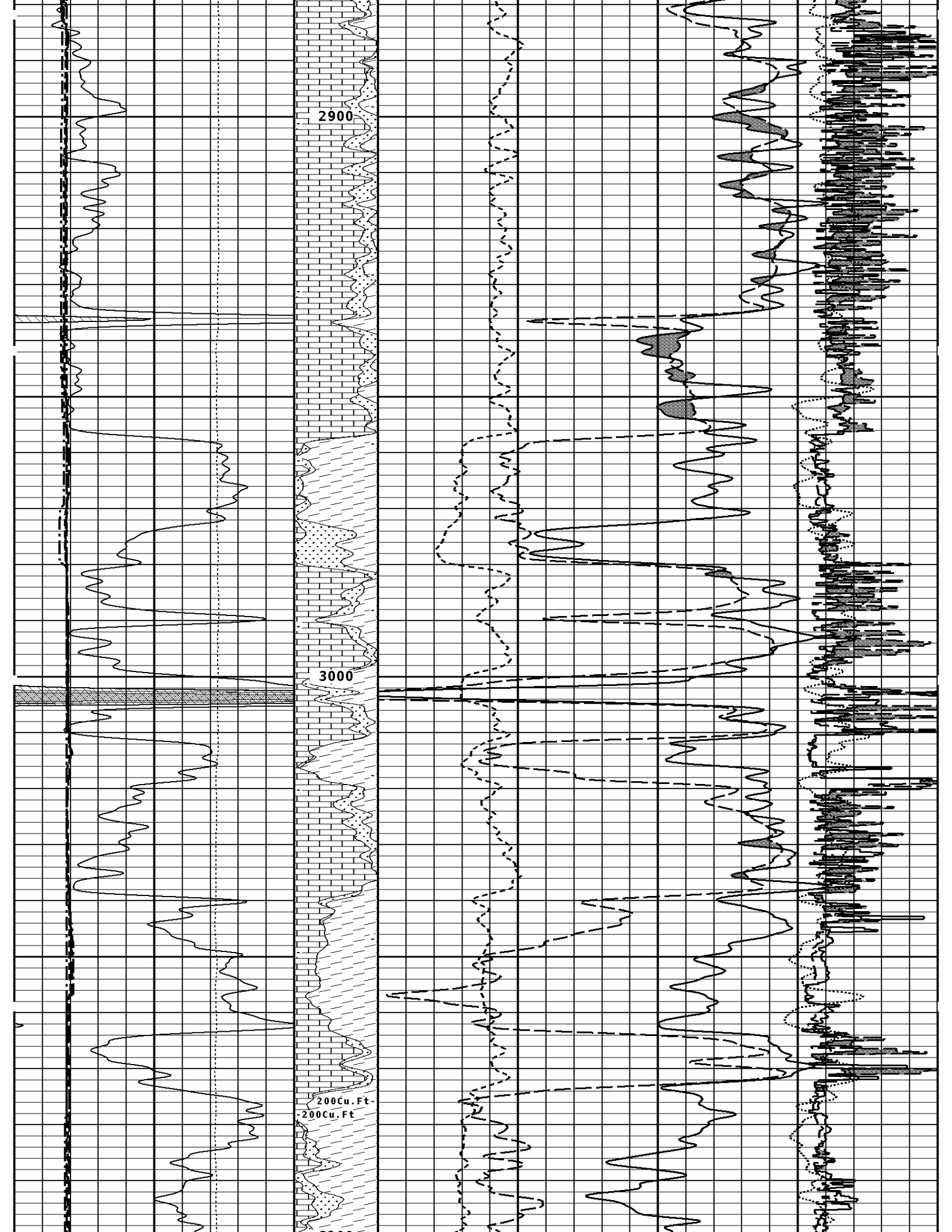
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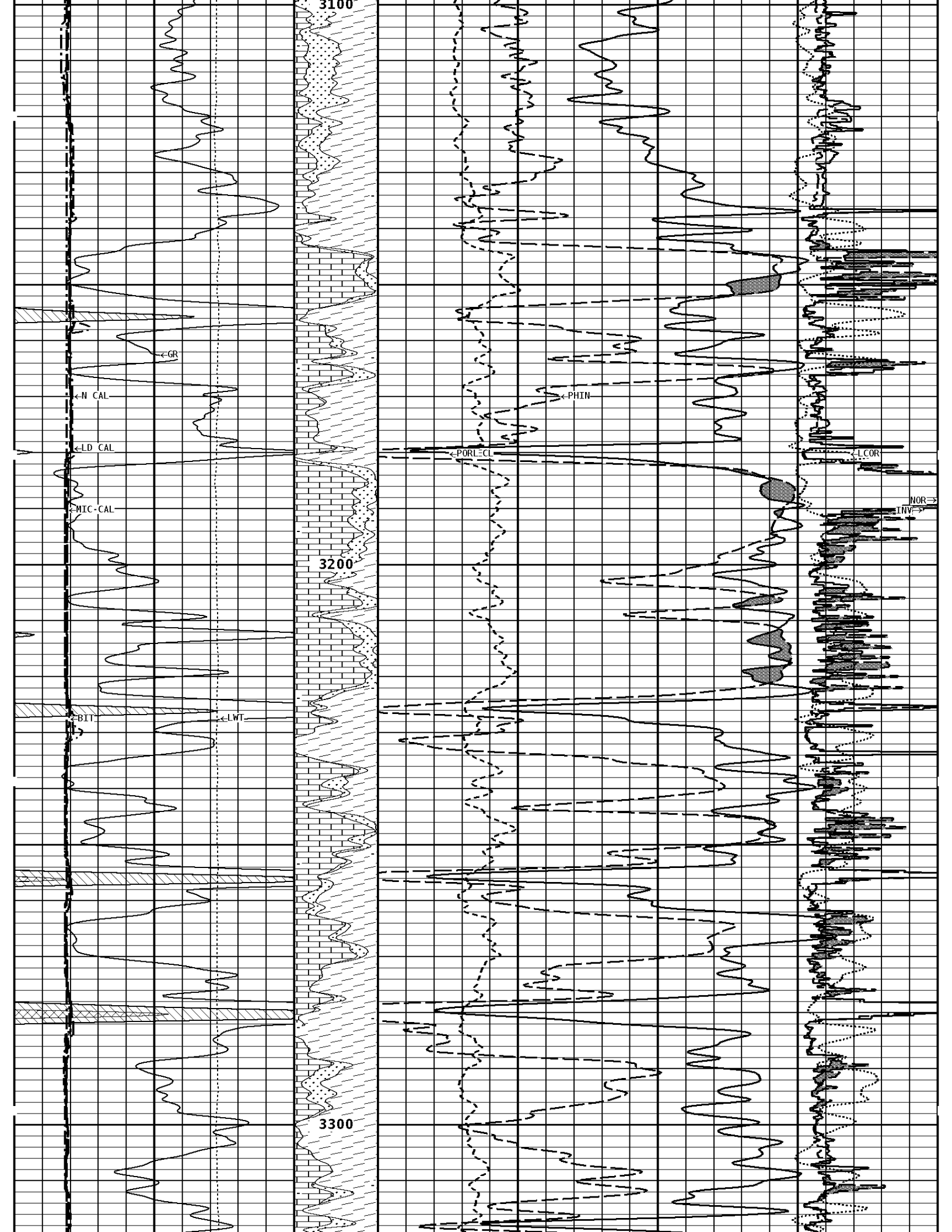
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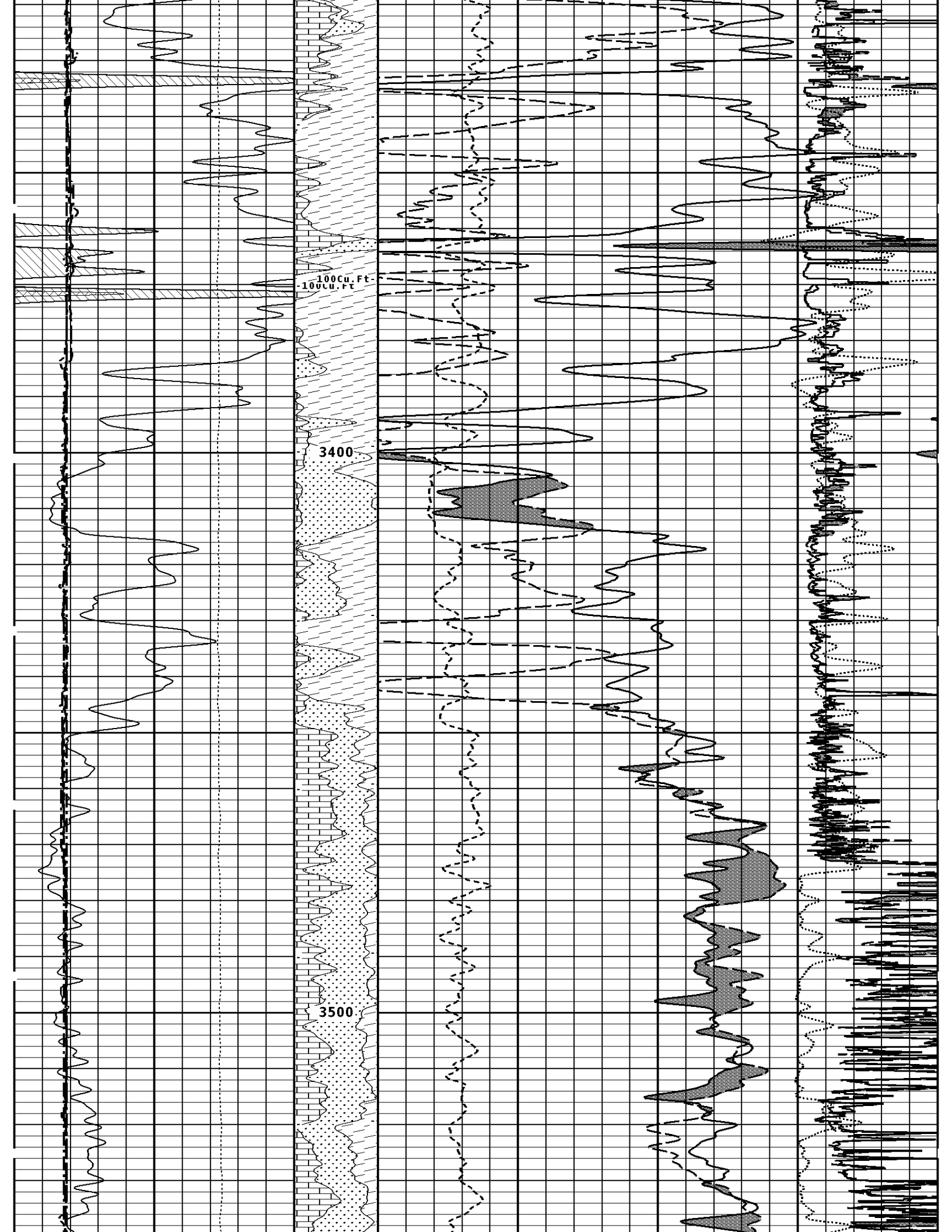
PORL-CL
LCOR
NOR
INV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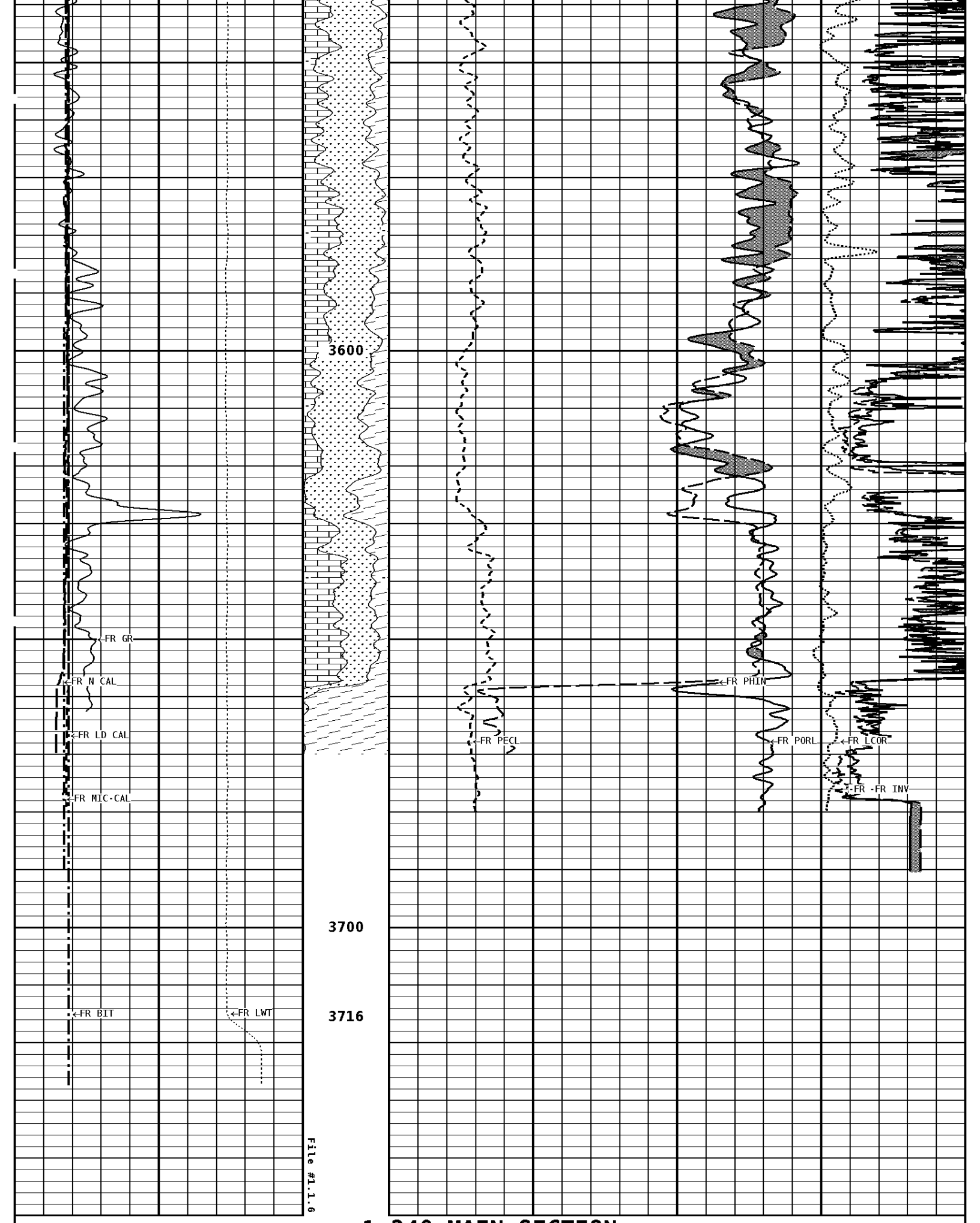
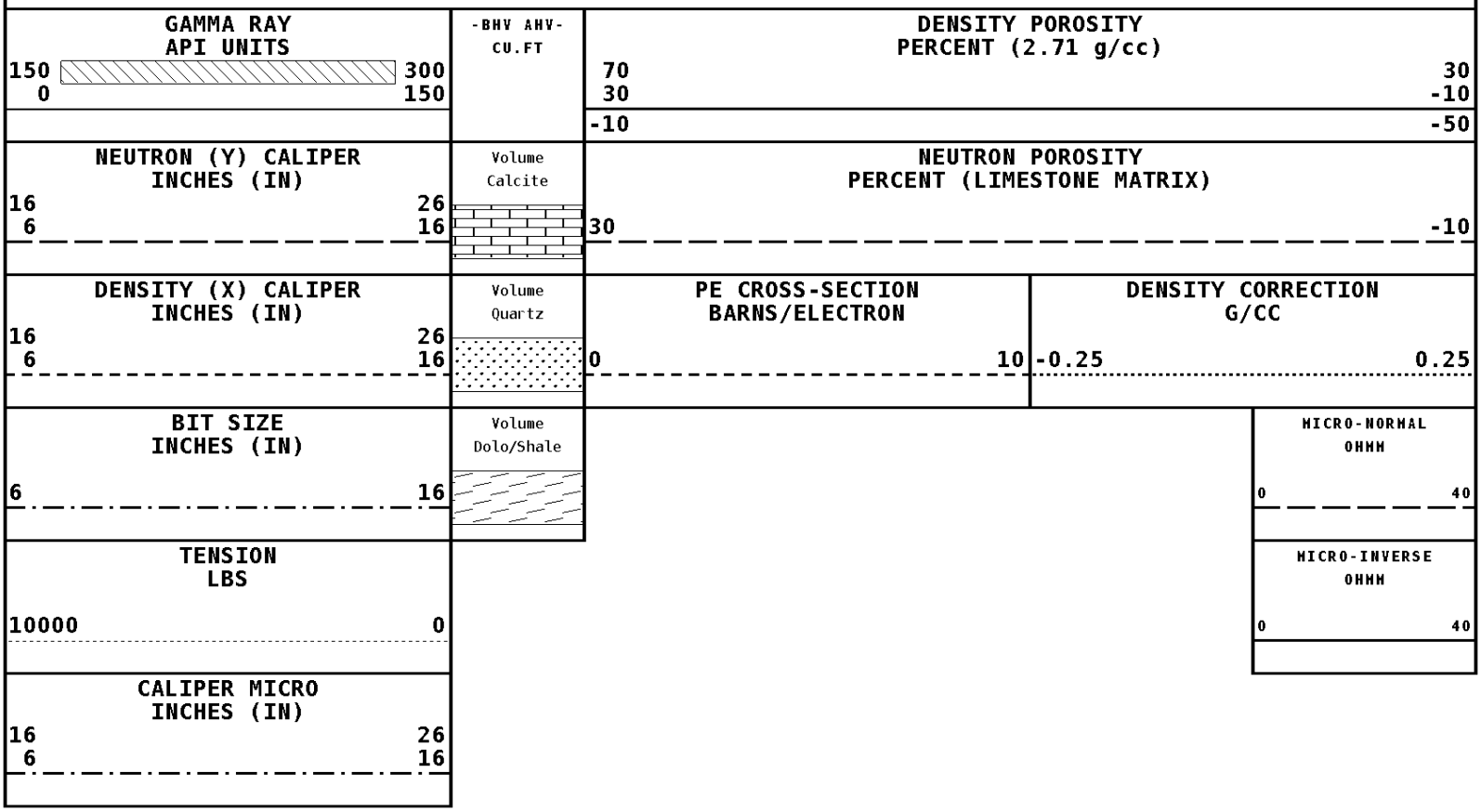
3400
3500



1:240 MAIN SECTION

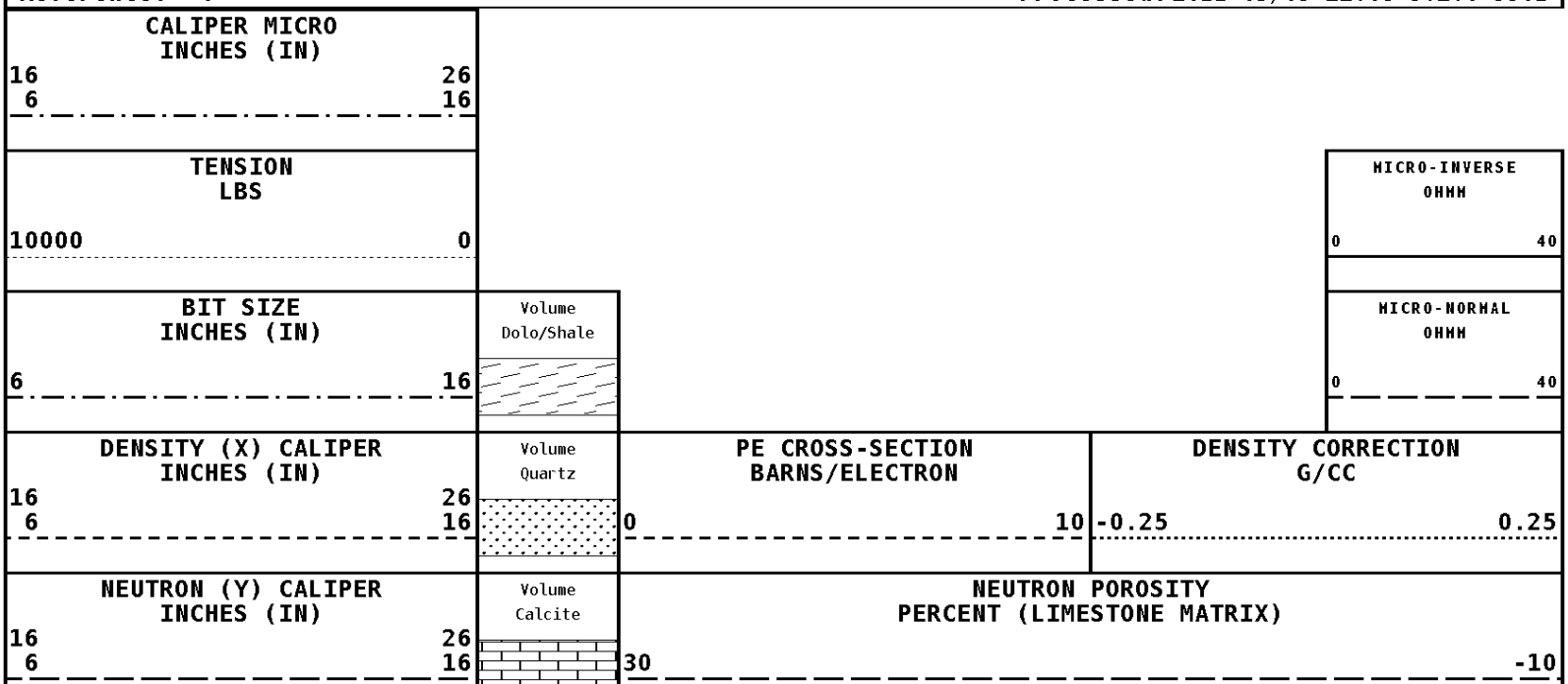


*** Borehole Zone Factors ***

Zone 1 99999.0 to 0.0 Feet

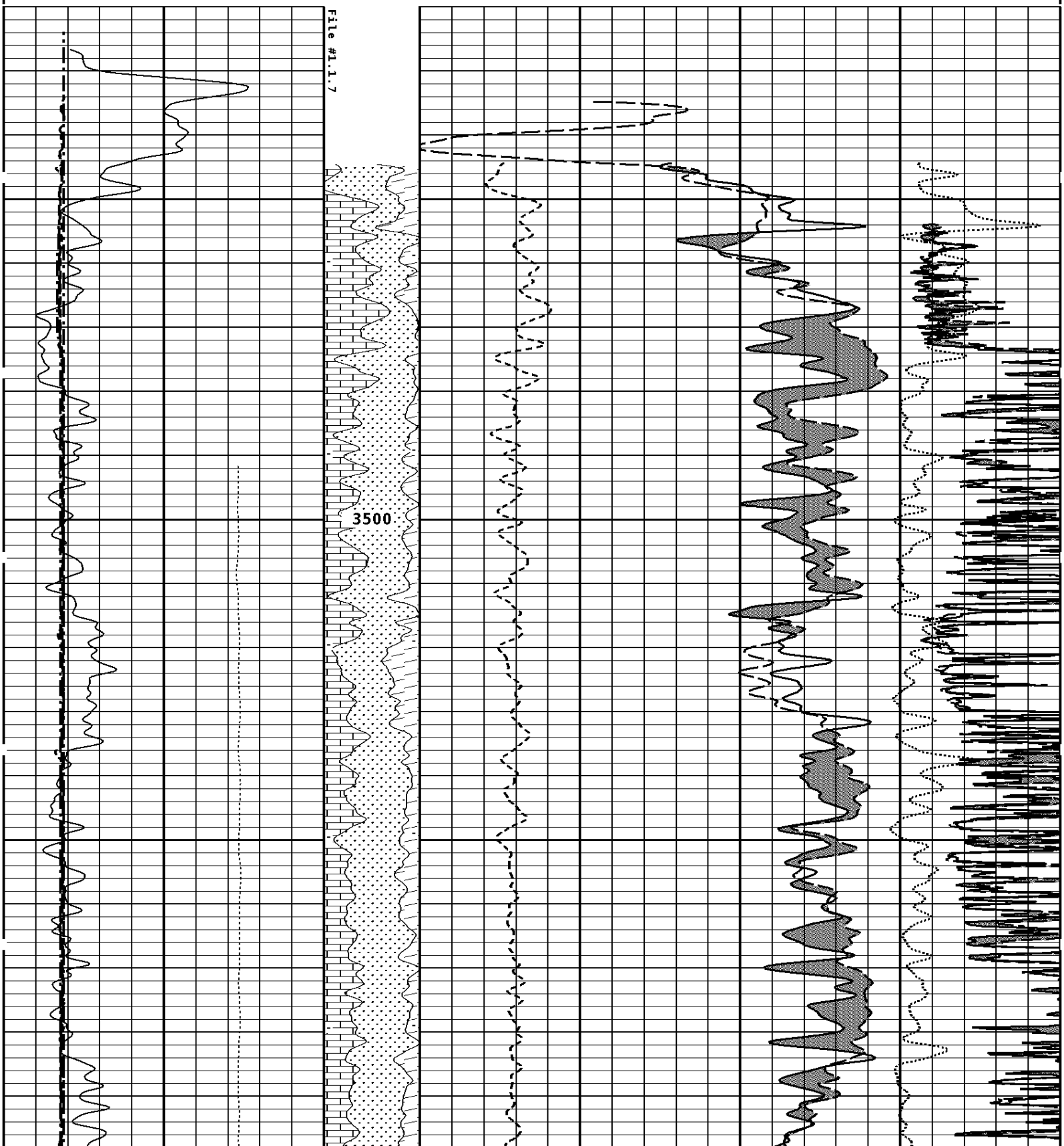
Matrix Density	2.71	g/cc
Fluid Density	1.00	g/cc
Formation Matrix	Limestone	
Drill Bit Size	7.875	in
Casing Diameter	0.500	in
Casing Correction (PHI N)	Disable	

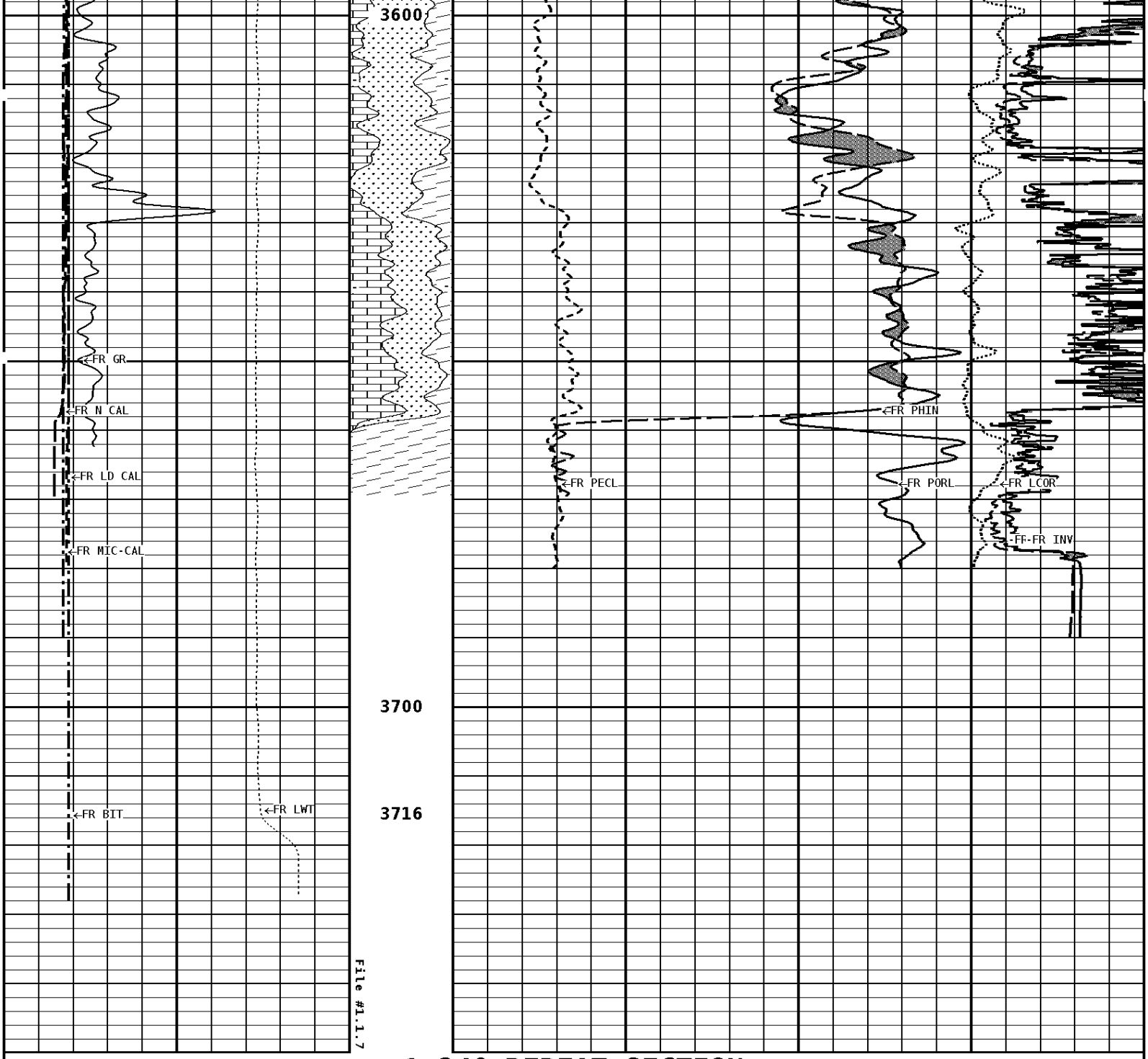
Well File: Running_Foxes_Petroleum_Ruyle_11-31-1_may3-qst **Scale:** 1:240
Segment: V1.D1.S7 RE REPEAT **Acquired:** 2011-05/03 20:29 3.2.0-9901
Reference: 0 **Processed:** 2011-05/03 22:08 3.2.0-9901



GAMMA RAY API UNITS	-BHV AHV- CU.FT	DENSITY POROSITY PERCENT (2.71 g/cc)
150 300 0 150		70 30 30 -10 -10 -50

1:240 REPEAT SECTION





1:240 REPEAT SECTION

GAMMA RAY API UNITS 150 — 300 0 — 150	-BHV AHV- CU.FT	DENSITY POROSITY PERCENT (2.71 g/cc) 70 — 30 30 — -10 -10 — -50
NEUTRON (Y) CALIPER INCHES (IN) 16 — 26 6 — 16	Volume Calcite	NEUTRON POROSITY PERCENT (LIMESTONE MATRIX) 30 — -10
DENSITY (X) CALIPER INCHES (IN) 16 — 26 6 — 16	Volume Quartz	PE CROSS-SECTION BARNS/ELECTRON 0 — 10
		DENSITY CORRECTION G/CC -0.25 — 0.25

BIT SIZE INCHES (IN)	Volume Dolo/Shale	MICRO-NORMAL OHMM
6 — 16		0 — 40

TENSION LBS	MICRO-INVERSE OHMM
10000 — 0	0 — 40

CALIPER MICRO INCHES (IN)
16 — 26
6 — 16

*** Borehole Zone Factors ***

Zone 1 99999.0 to 0.0 Feet

Matrix Density	2.71	g/cc
Fluid Density	1.00	g/cc
Formation Matrix	Limestone	
Drill Bit Size	7.875	in
Casing Diameter	0.500	in
Casing Correction (PHI N)	Disable	

Well File: Running_Foxes_Petroleum_Ruyle_11-31-1_may3-qst **Scale:** 1:240
Segment: V1.D1.S6 RE MAIN **Acquired:** 2011-05-03 20:44 3.2.0-9901
Reference: 0 **Processed:** 2011-05-03 22:07 3.2.0-9901

TENSION LBS
10000 — 0

BIT SIZE INCHES (IN)
6 — 16

DENSITY (X) CALIPER INCHES (IN)
16 — 26
6 — 16

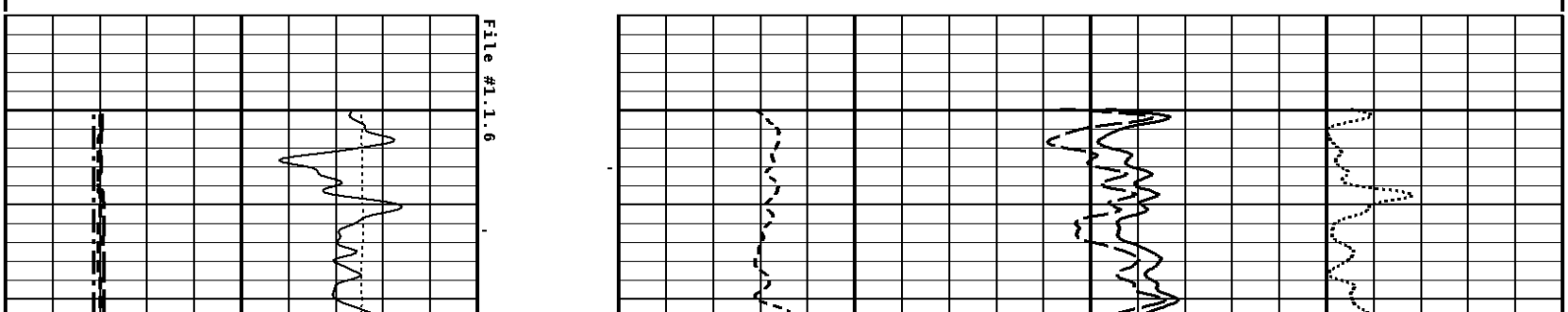
PE CROSS-SECTION BARNS/ELECTRON	DENSITY CORRECTION G/CC
0 — 10	-0.25 — 0.25

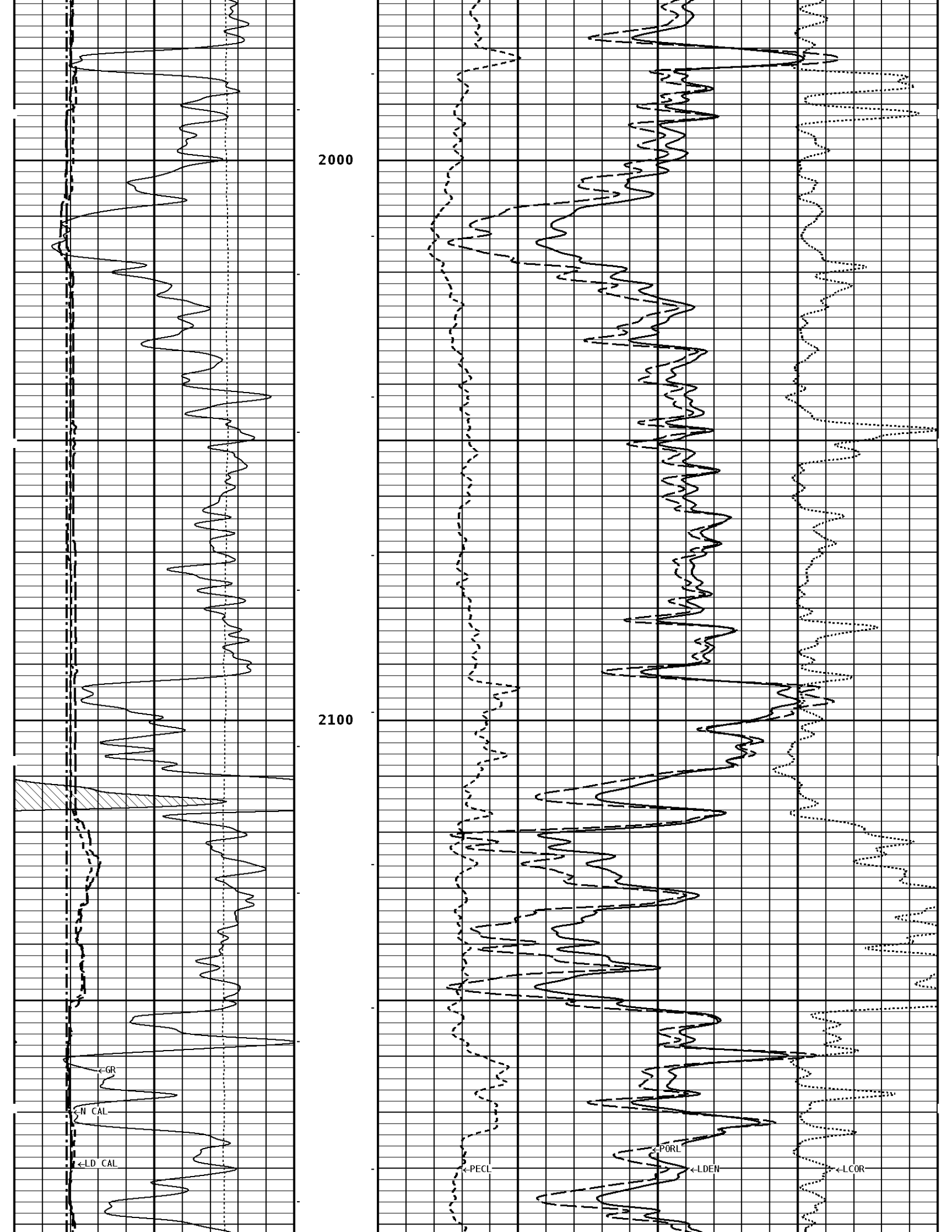
NEUTRON (Y) CALIPER INCHES (IN)
16 — 26
6 — 16

DENSITY POROSITY PERCENT (2.71 g/cc)
70 — 30
30 — -10
-10 — -50

GAMMA RAY API UNITS	-BHV AHV- CU.FT	COMPENSATED BULK DENSITY G/CC
150 — 300		3.0 — 4.0
0 — 150		2.0 — 3.0
		1.0 — 2.0

1:240 MAIN SECTION
BULK DENSITY

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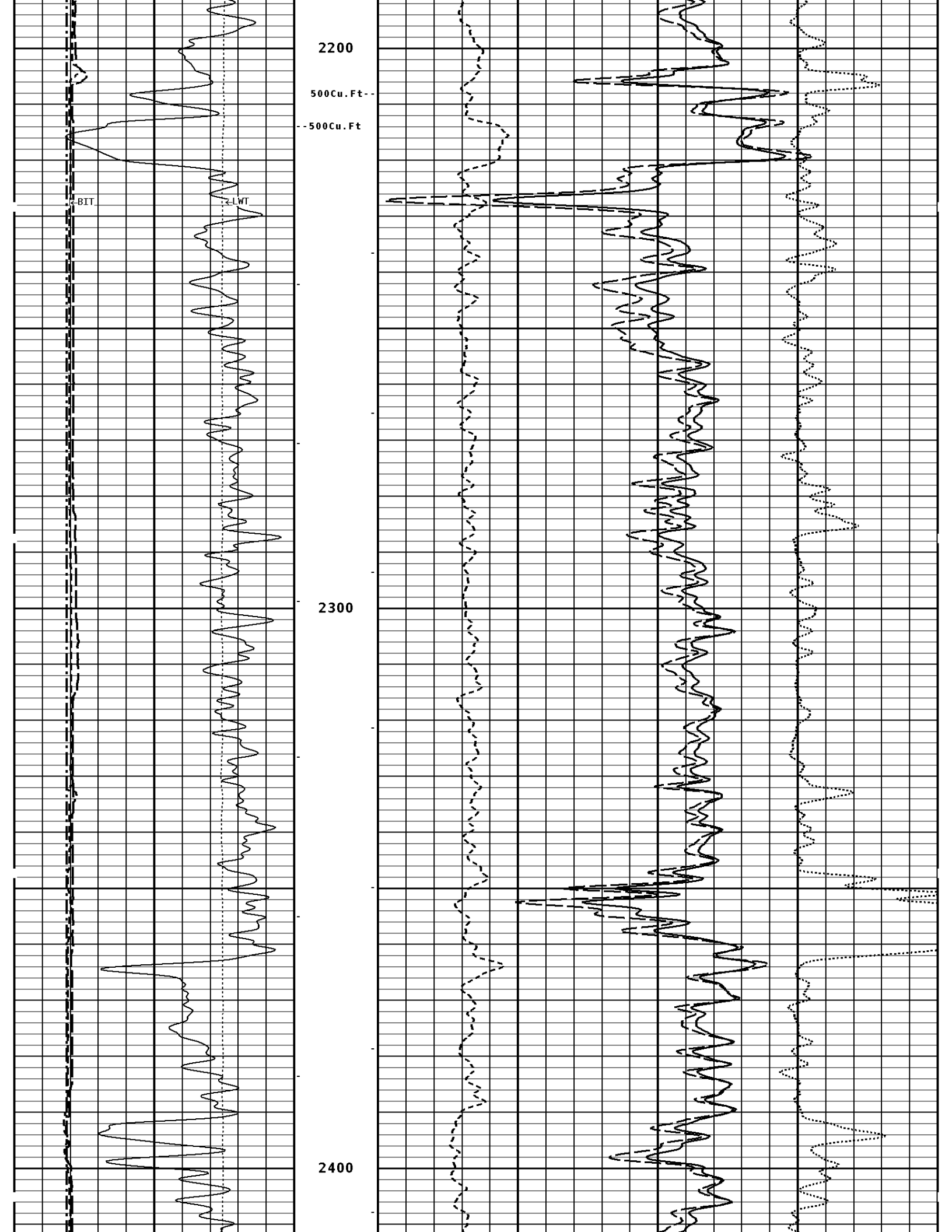
LD CAL
PECL
PORL
LDEN
LCOR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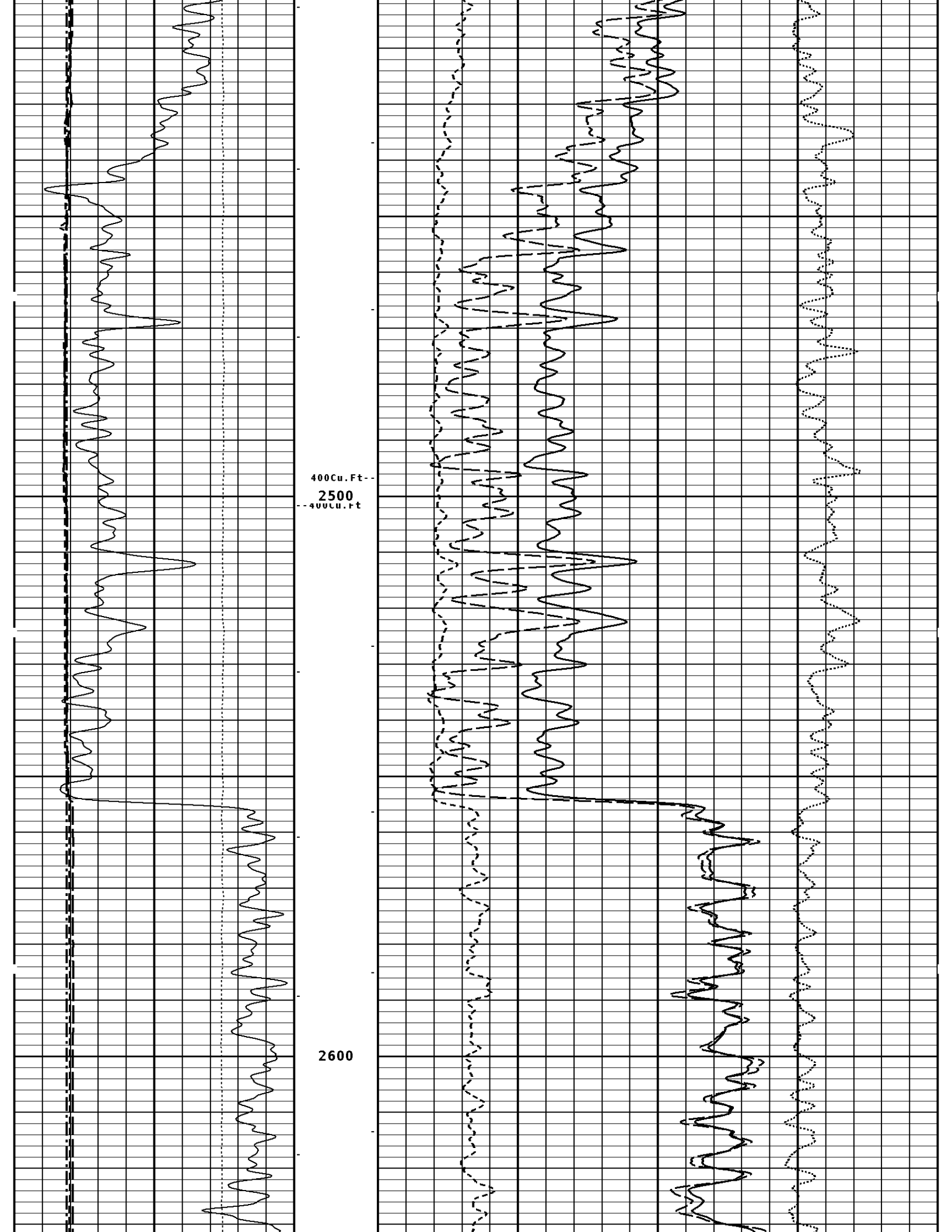
BIT
LWT
2300
2400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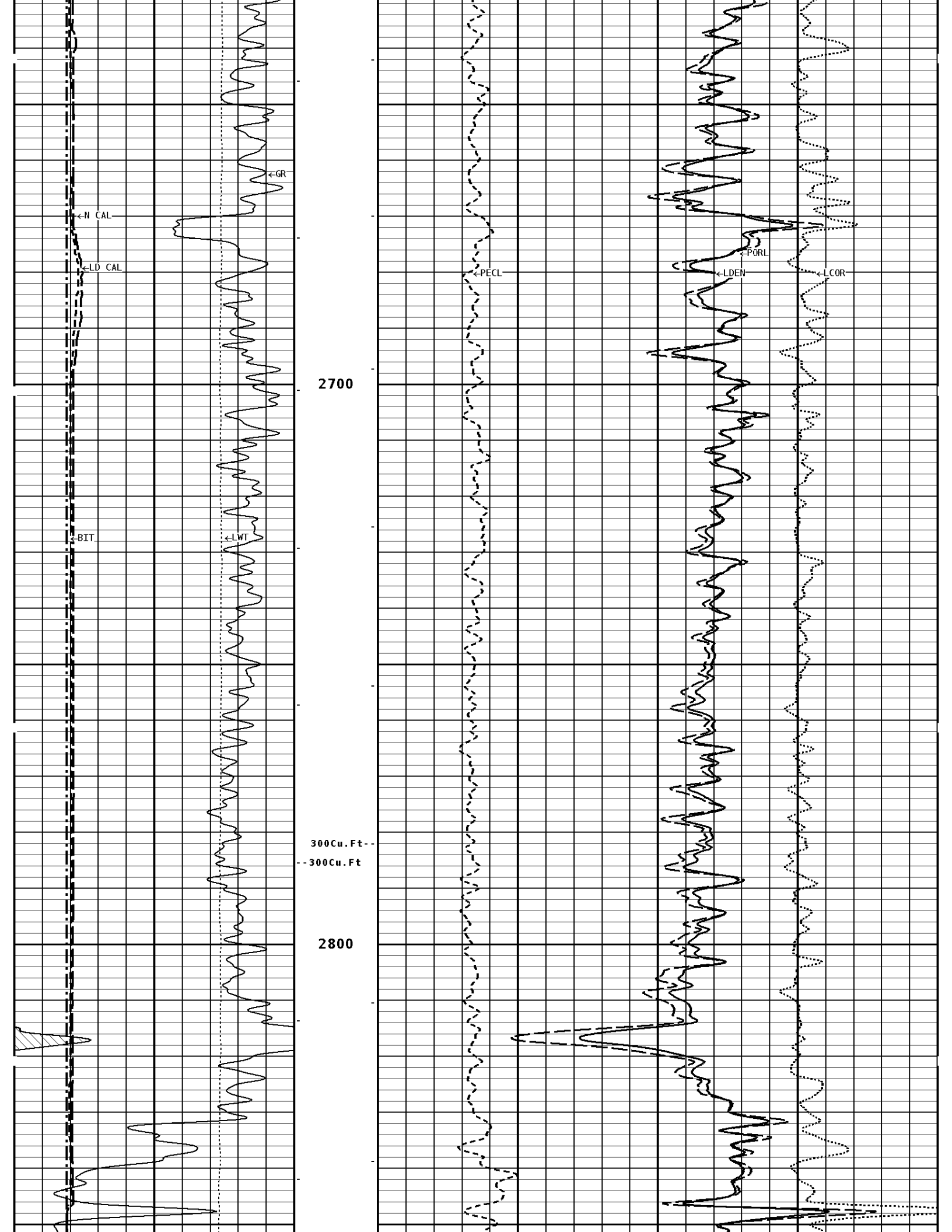
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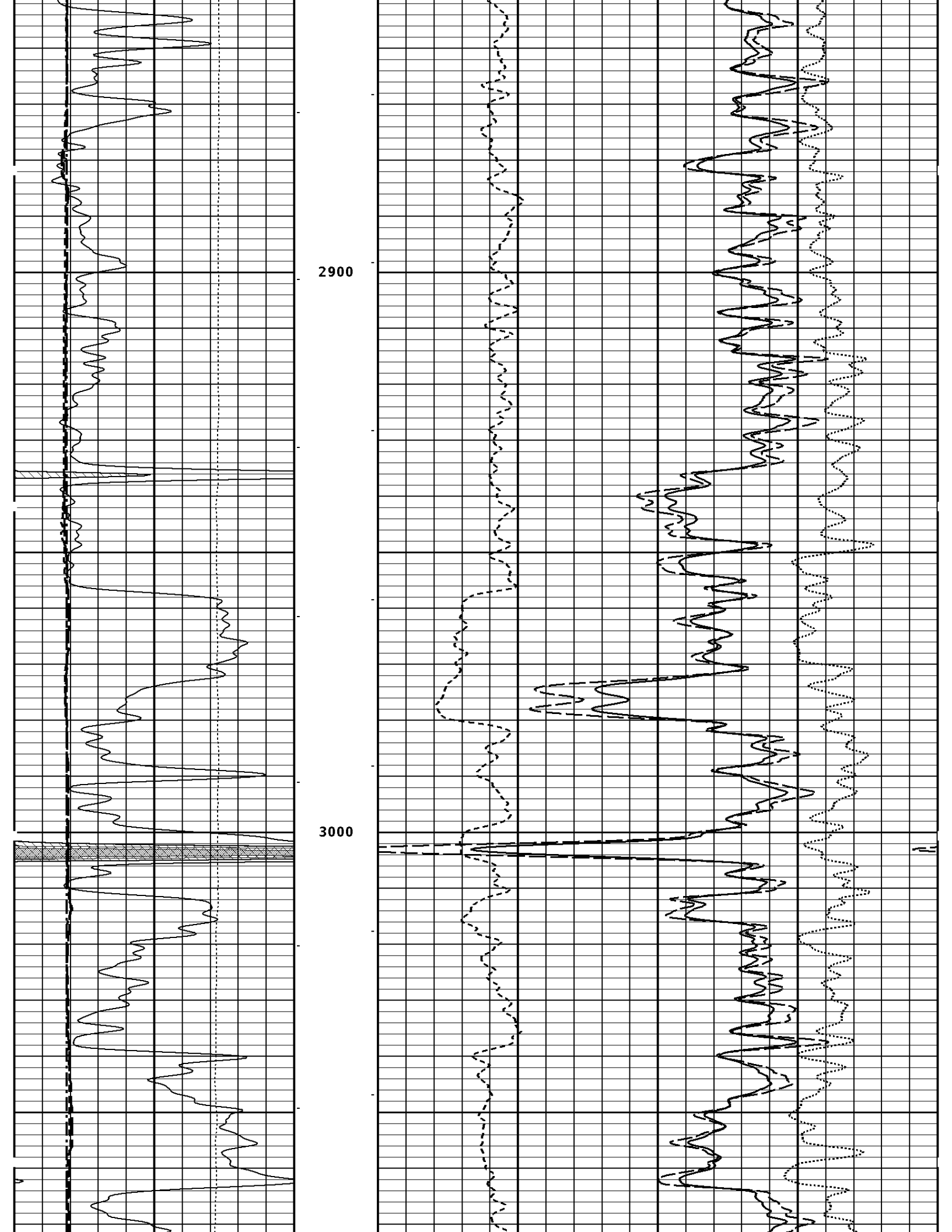
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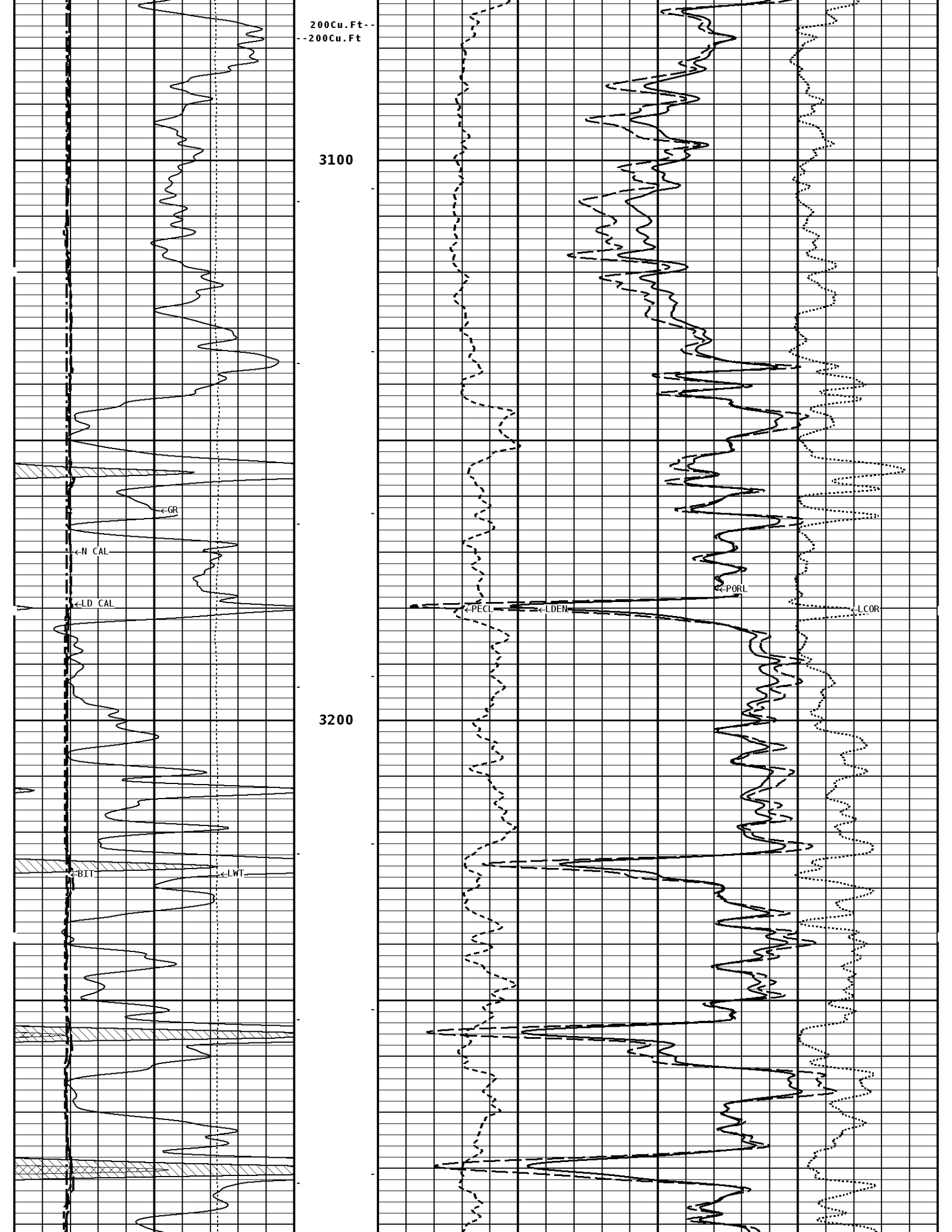
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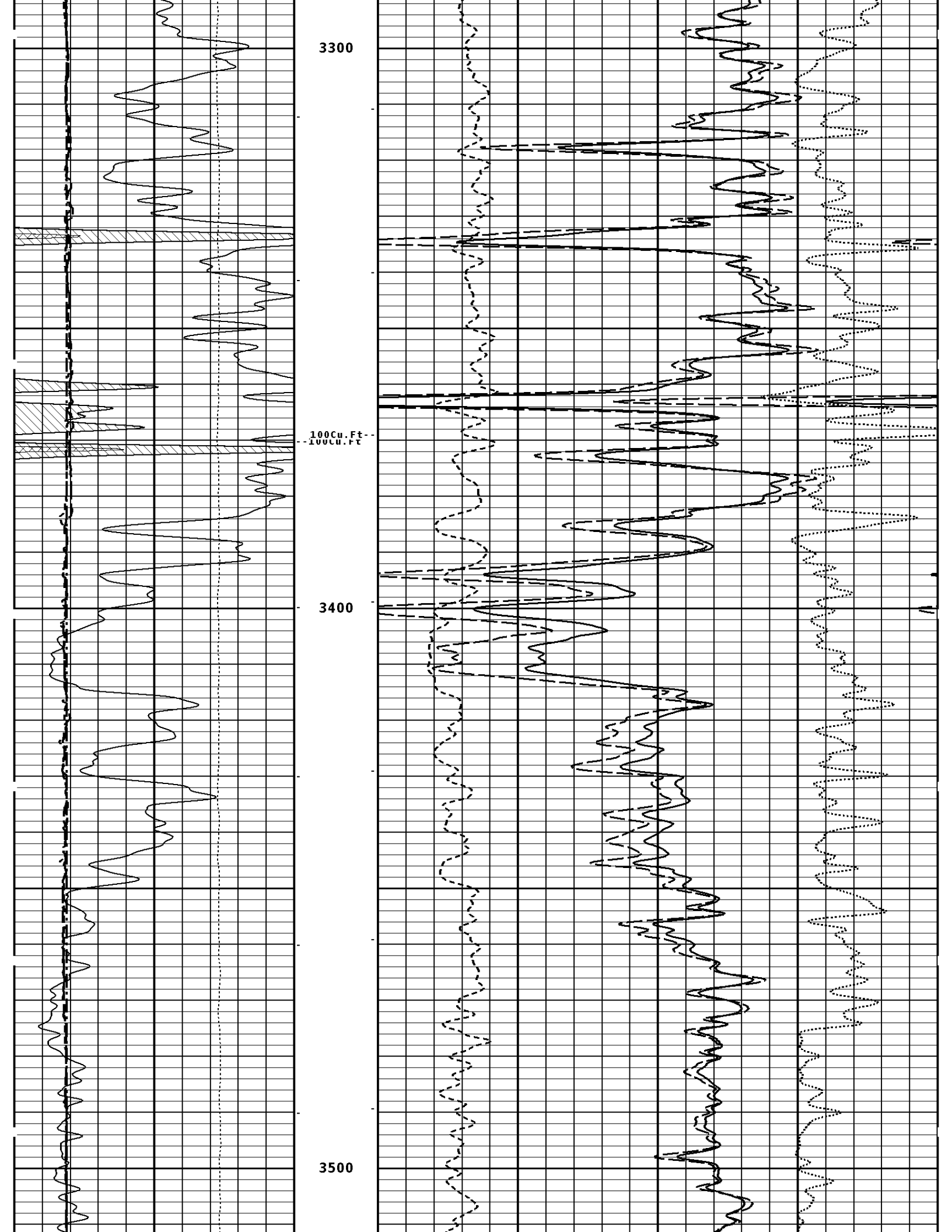
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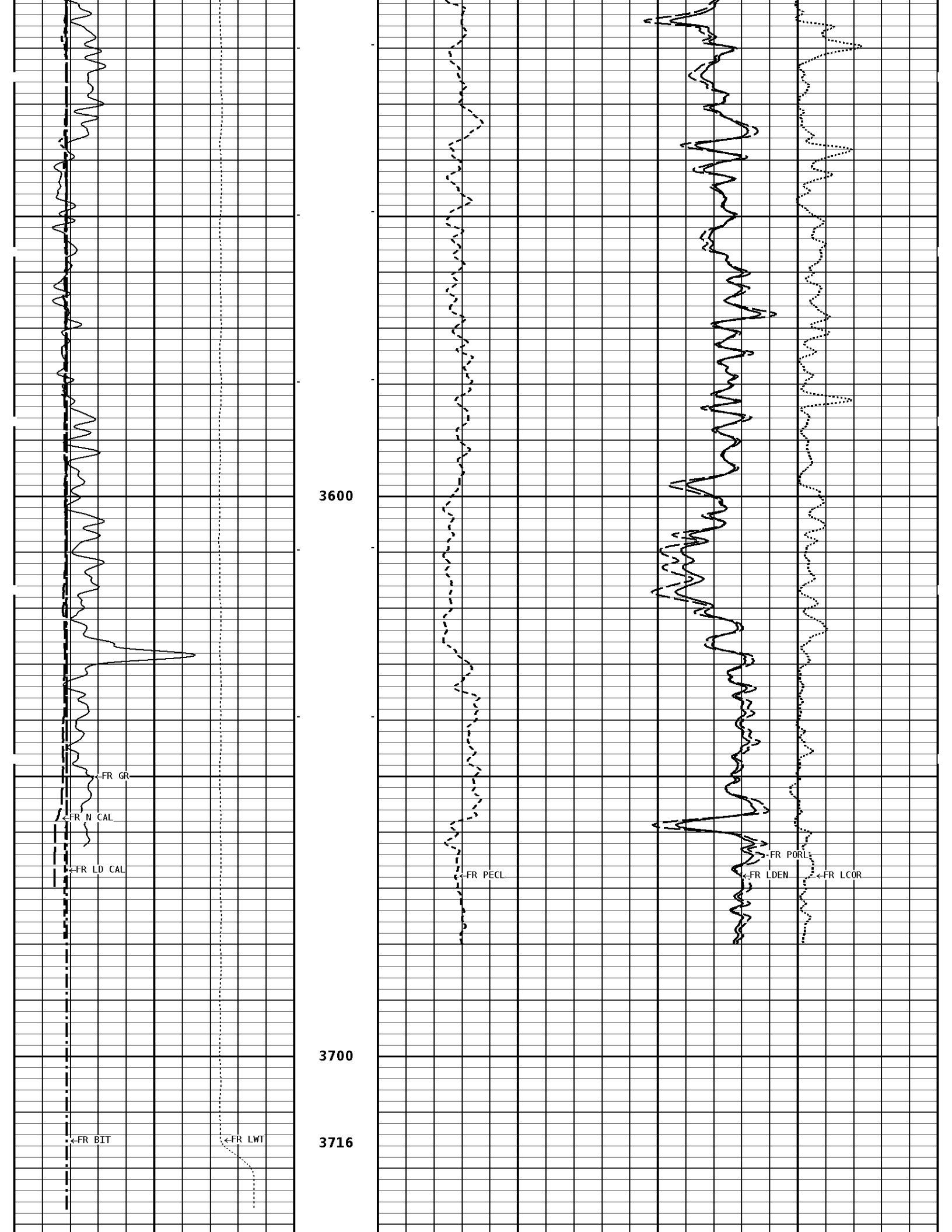
3600
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3716
FR GR
FR N CAL
FR LD CAL
FR BIT
FR LWT
FR PECL
FR PORL
FR LDEN
FR LCOR

File #1.1.6

1:240 MAIN SECTION
BULK DENSITY

GAMMA RAY API UNITS	-BHV AHV-CU.FT	COMPENSATED BULK DENSITY G/CC
150 300		3.0 4.0
0 150		2.0 3.0
		1.0 2.0

NEUTRON (Y) CALIPER INCHES (IN)	DENSITY POROSITY PERCENT (2.71 g/cc)
16 26	70 30
6 16	30 -10
	-10 -50

DENSITY (X) CALIPER INCHES (IN)	PE CROSS-SECTION BARNS/ELECTRON	DENSITY CORRECTION G/CC
16 26		
6 16	0 10	-0.25 0.25

BIT SIZE INCHES (IN)
6 16

TENSION LBS
10000 0

*** Borehole Zone Factors ***

Zone 1 99999.0 to 0.0 Feet

Matrix Density	2.71	g/cc
Fluid Density	1.00	g/cc
Formation Matrix	Limestone	
Drill Bit Size	7.875	in
Casing Diameter	0.500	in
Casing Correction (PHI N)	Disable	

*** Calibration Summary ***

Shop Calibration
GRT-B

Performed : 24-APR-2011 Time : 15:04
Sensor Suite : GR-GR5 ID : GRT-BA-14

	Measured Background	Measured Jig	Units	Calibrated Jig	Units
GR	49	347	CPS	175	GRAPI

Shop Calibration
CNT-AA

Performed : 21-MAR-2011 Time : 11:09
Sensor Suite : CALI-BCN ID : NDT-AB-400

	Jig - Measured Ring#1	Jig - Measured Ring#2	Jig - Calibrated Ring#1	Jig - Calibrated Ring#2	Units
CL # 1	7.7	13.7	6.0	12.0	IN.

Performed : 15-Apr-2011 Time : 11:12
Sensor Suite : BHC NEUT ID : CNP-AA-116
Source ID : N-1044

	Tank	Verification	Units

	Measured	Calibrated	Jig	
N/F	3.8743	3.6893	3.7032	
Porosity	23.4	20.5	20.7	%

Shop Calibration
LDT-DA

Performed : 01-MAY-2011 Time : 00:59
Sensor Suite : CALI-LTH ID : PDT-GA-466

	Jig - Measured		Jig - Calibrated		Units
	Ring#1	Ring#2	Ring#1	Ring#2	
CL # 1	7.8	13.8	6.0	12.0	IN.

Performed : 15-Apr-2011 Time : 10:49
Sensor Suite : BHCPELNG ID : LDP-DA-02
Source ID : CSV-587

Short Space

	BKGD	Al	Mg	Al+Fe	Units
LSW1	71	455	730	309	CPS
LSW2	73	554	888	395	CPS
LSW3	281	1380	2162	1174	CPS
LSW4	359	1330	1841	1175	CPS
LSW5	34	44	45	43	CPS
LSW6	93	94	93	94	CPS
LSW7	59	60	59	60	CPS
LSW8	2	3	3	3	CPS
QS	0.220	0.219	0.220	0.222	
PES			2.778	5.967	
SSDN		2.600	1.680		G/CC

Long Space

	BKGD	Al	Mg	Al+Fe	Units
LLW1	108	603	2484	383	CPS
LLW2	119	1042	4311	757	CPS
LLW3	451	2022	7439	1750	CPS
LLW4	587	1184	3041	1100	CPS
LLW5	62	69	84	68	CPS
LLW6	191	188	178	190	CPS
LLW7	118	118	112	119	CPS
LLW8	4	5	10	5	CPS
QL	0.235	0.230	0.226	0.231	
PEL			2.697	5.458	
LSDN		2.600	1.680		G/CC

Shop Calibration
MST-DA

Performed : 19-SEP-2007 Time : 18:02
Sensor Suite : CALI-MSN ID : MST-DA-36

	Jig - Measured		Jig - Calibrated		Units
	Ring#1	Ring#2	Ring#1	Ring#2	
CL # 1	4.7	9.7	6.0	12.0	IN.

Performed : 19-SEP-2007 Time : 17:47
Sensor Suite : MSTDA-NI ID : MST-DA-36

Internal

	Measured			Calibrated		
	Zero	Reference	Units	Zero	Reference	Units
INV-V	220.8	20617.0		0.00	1946.00	MV
NOR-V	161.0	20472.8		0.00	1546.00	MV
IN-C	160.2	20698.7		0.00	15.46	UA
INV-R					32.34	OHMM
NOR-R					55.11	OHMM

Performed : 09-SEP-2007 Time : 14:53
Sensor Suite : MSTDAMSF ID : MST-DA-36

Internal

	Measured			Calibrated		
	Zero	Reference	Units	Zero	Reference	Units
MSFC	150.0	58600.0		0.00	1522.00	UA
MSFB	32800.0	62500.0		0.00	1522.00	MA
MOM1	150.0	5950.0		0.00	1522.00	MV
MSFRA					43.30	OHMM