

BOREHOLE COMPENSATED

Company	Well	Field	County	State	Country	API No.	MERIT ENERGY COMPANY GOERING JACOB #M-4 EUBANK HASKELL KANSAS USA 15-081-22200-0000					
File No	Company	Well	Field	County	State	Country	API No	Location	LSD	Sect	Twp	Rge
: HAYS-70397	: MERIT ENERGY COMPANY	: GOERING JACOB #M-4	: EUBANK	: HASKELL	: KANSAS	: USA	: 15-081-22200-0000	: 1340' FWL & 1184' FNL SW SW NE NW		: 16	: 28S	: 34W

The customer is hereby warned that by providing the log data herein, STEP Energy Services does not agree to provide any interpretation of log data, conversion of log data to physical rock parameters or recommendations. STEP Energy Services does not guarantee or warrant either expressly or impliedly, the accuracy of any interpretation of log data, conversion of log data to physical rock parameters or recommendations which may be given by STEP Energy Services personnel. Any interpretation, conversion or recommendation is not part of the consideration for the agreement between the parties and is not part of any part of the charge by STEP Energy Services for its services. Any user of the log data is warned that said user is not entitled to rely on interpretations, conversions or recommendations as aforesaid.

Bitsize Intervals		Casing Strings			
Size (In)	Bottom (Ft)	Size (In)	Weight (Lbs)	Bottom (Ft)	Top (Ft)
7.785	5693.00	8.625	17.00	1786.00	0.00

Run Number	1		
Date	01-27-2020		
Date/Time On Bottom	01-27-2020 12:31		
Depth to Fluid	0.0 Ft		
Salinity	1600.000		
RMF@BHT	1.460 @ 129 F		
RMC@BHT	1.980 @ 129 F		

Run Number 1

Comments

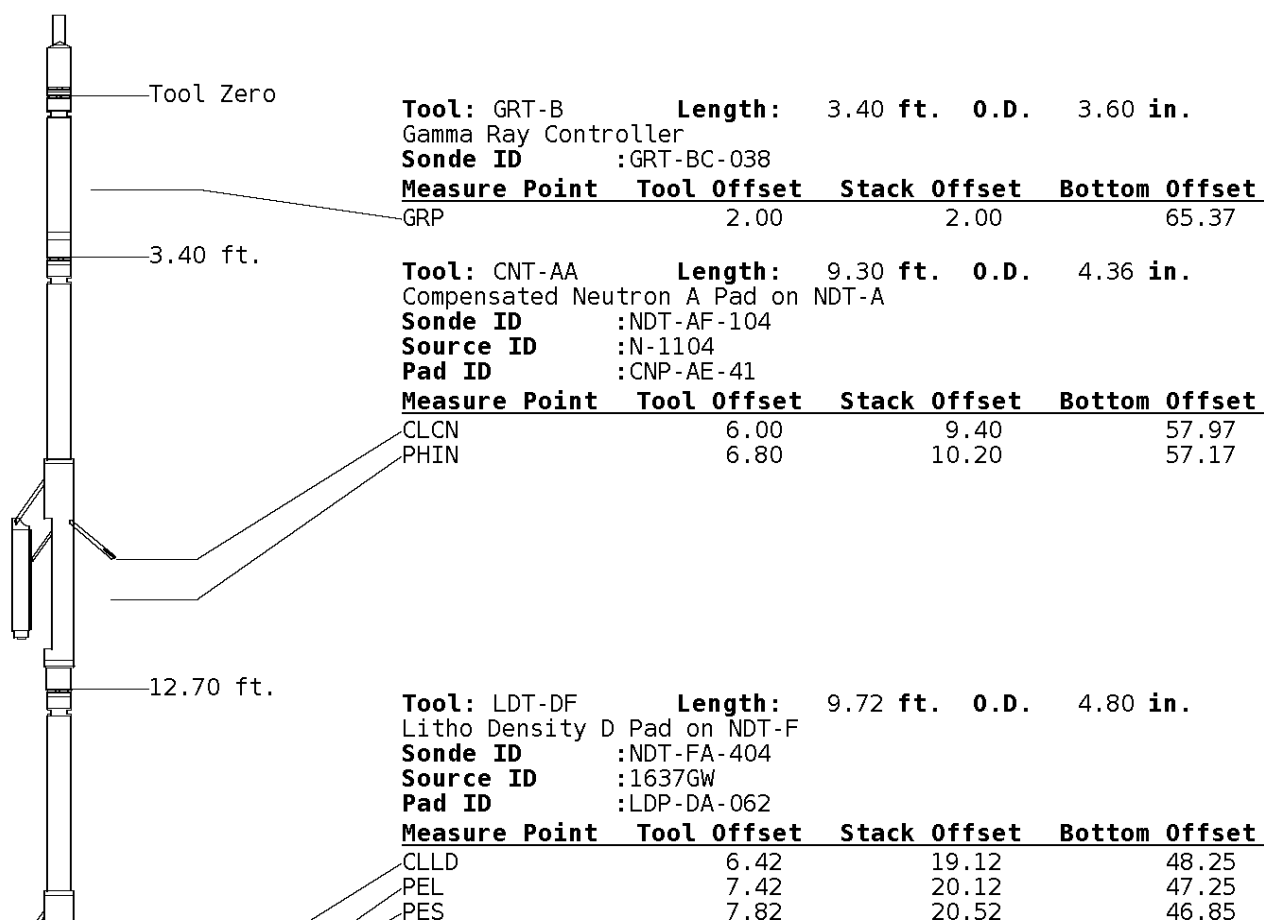
ALL PRESENTATIONS AS PER CUSTOMER REQUEST
 GRT, CNT, LDT, CST, MLT AND PIT RUN IN COMBINATION
 CALIPERS ORIENTED ON X-Y AXIS
 2.71 G/CC USED TO CALCULATE POROSITY
 ANNULAR HOLE VOLUME CALCULATED USING 5.5" PRODUCTION CASING
 PHIN IS CALIPER CORRECTED

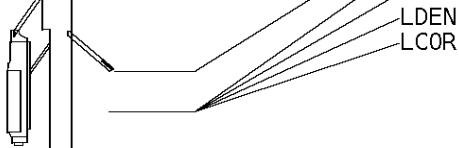
GRT: GRP
 CNT: PHIN, CLCNIN,
 LDT: PORL, LCORN, PECLN, LDENN, PORLLS, CLLDIN
 CST: PORS, CDTF, TTIPF, TT2PF, TT3PF, TT4PF, ITT
 MLT: NOR_RF, INV_RF, MSLCNIN
 PIT: ILD, ILM, SPU, SFLAEC, CIRD

OPERATORS:
 D. RAGSDALE
 J. VAUGHN

Tool String Schematic

Total Tool Length - 67.37 ft.
Maximum Outside diameter - 6.00 in.
Net Weight in Air - 1171.00 lbs.



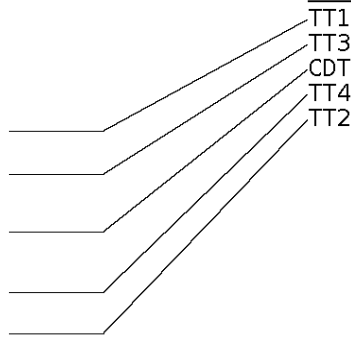


LDEN	7.62	20.32	47.05
LCOR	7.62	20.32	47.05

22.42 ft.

Tool: CST-AD **Length:** 13.80 ft. **O.D.** 3.60 in.
Open Hole Sonic
Sonde ID : CST-AB-24

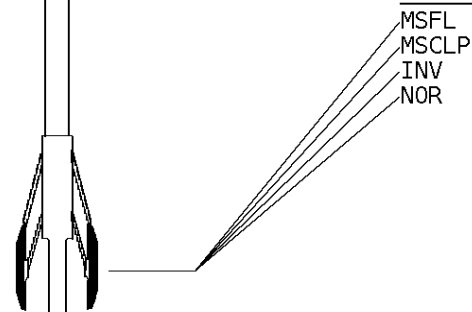
Measure Point	Tool Offset	Stack Offset	Bottom Offset
TT1	4.80	27.22	40.15
TT3	5.80	28.22	39.15
CDT	7.30	29.72	37.65
TT4	8.80	31.22	36.15
TT2	9.80	32.22	35.15



36.22 ft.

Tool: MST-DA **Length:** 9.66 ft. **O.D.** 6.00 in.
Micro Spherically Focused (IC)
Sonde ID : MST-DA-13

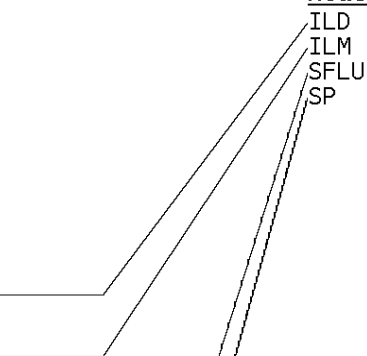
Measure Point	Tool Offset	Stack Offset	Bottom Offset
MSFL	7.60	43.82	23.55
MSCLP	7.60	43.82	23.55
INV	7.60	43.82	23.55
NOR	7.60	43.82	23.55



45.88 ft.

Tool: PIT-CA **Length:** 21.49 ft. **O.D.** 3.62 in.
Phased Dual Induction w/ RM & D
Sonde ID : PIT-AC-043

Measure Point	Tool Offset	Stack Offset	Bottom Offset
ILD	8.92	54.80	12.56
ILM	10.10	55.98	11.39
SFLU	17.49	63.37	4.00
SP	20.60	66.48	0.88



LWT 67.37 ft.

Well File: MERIT_GOERING_JACOB_M-4_JAN27_QUINT

Scale: 1:240

Format: CST-240

Segment: V1.D1.S7 MAIN

Acquired: 2020-01/27 13:30 3.4.1-13972

Reference: 0

Processed: 2020-01/27 14:53 3.4.1-13972

NEUTRON (Y) CALIPER
INCHES (IN)

16 26
6 16

DENSITY (X) CALIPER
INCHES (IN)

16 26
6 16

BIT SIZE
INCHES (IN)

6 16

TENSION
LBS

10000 0

GAMMA RAY
API UNITS

150 300
0 150

COMPENSATED SONIC TRAVEL TIME
uSEC/FT

240 140 140 40

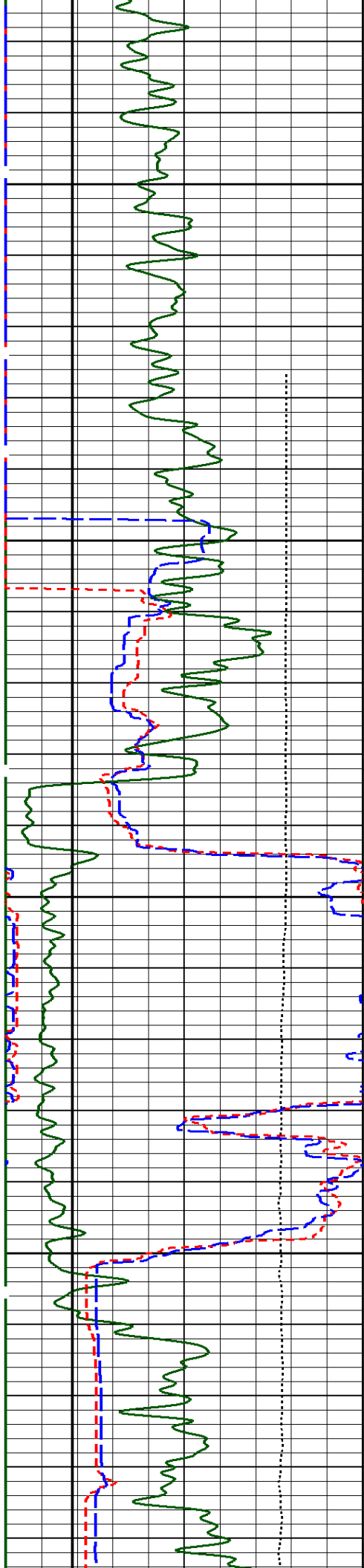
SONIC POROSITY
PERCENT

30 -10

1:240 MAIN SECTION

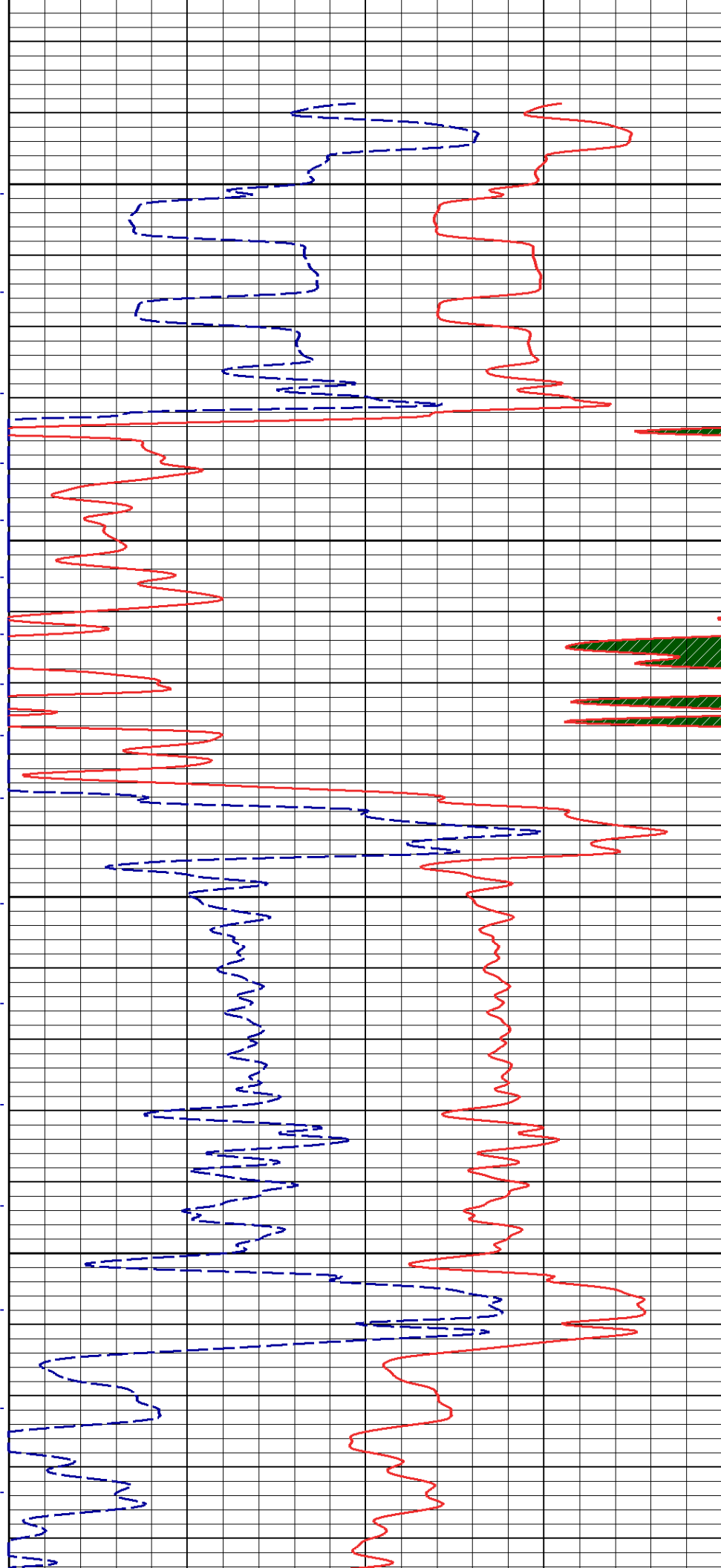
File #1.1.7

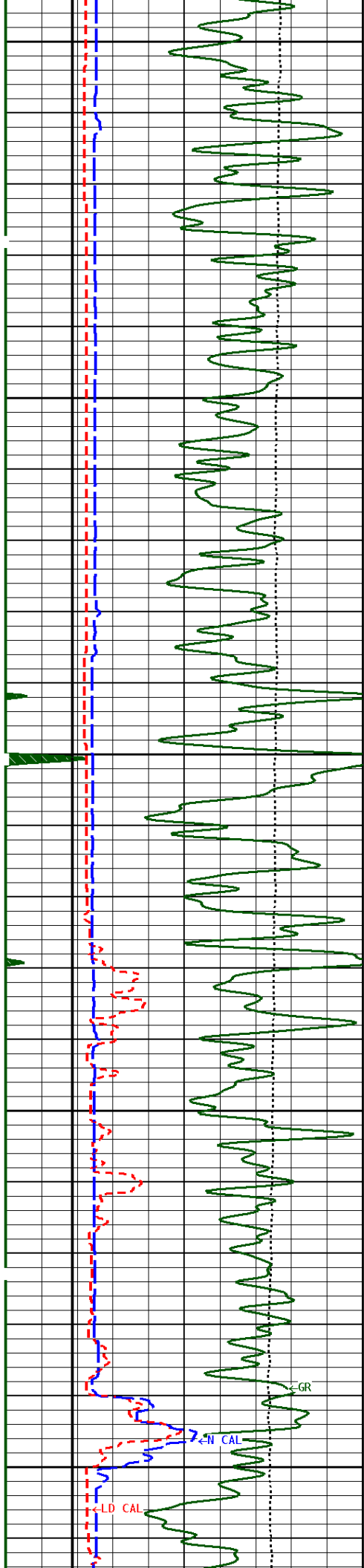
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1800

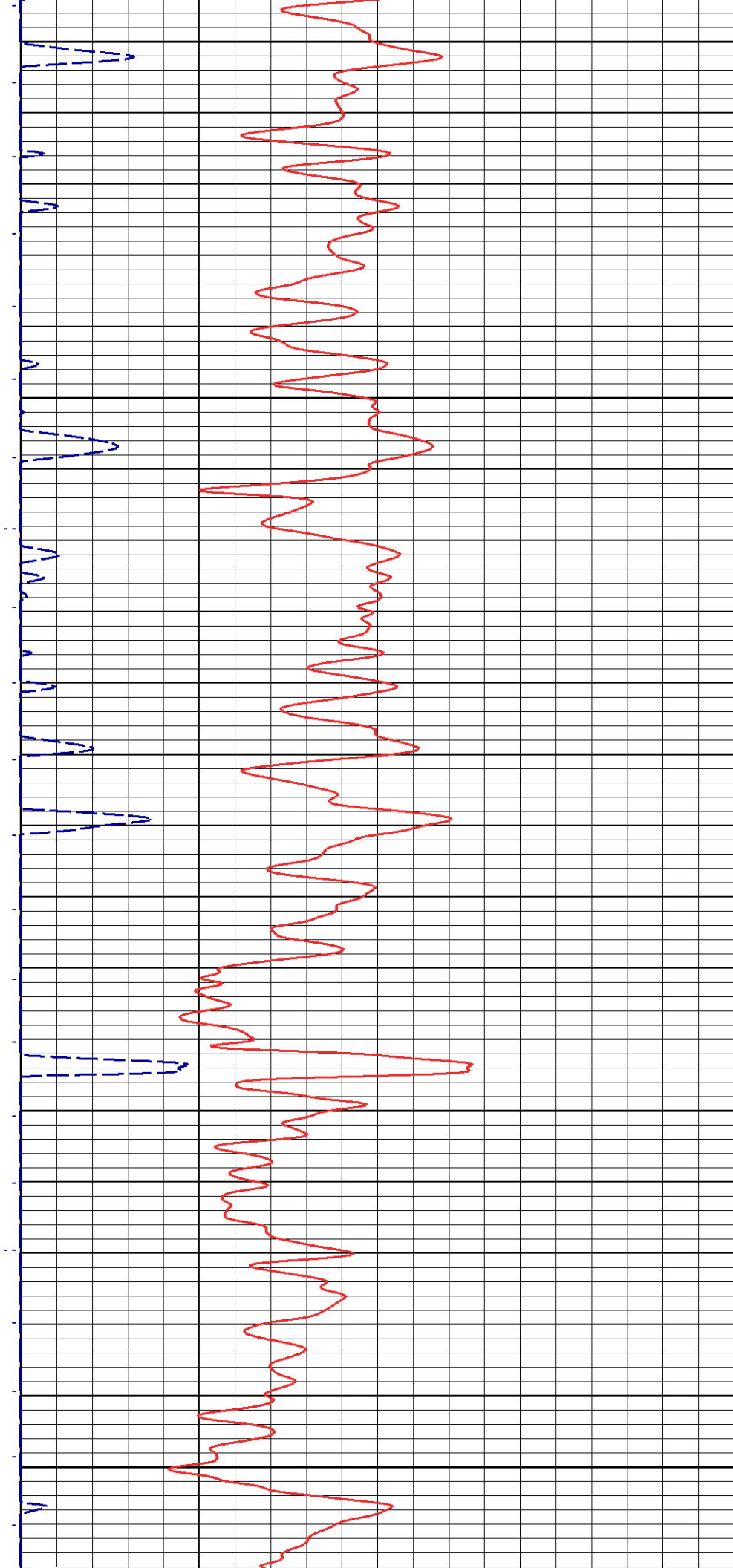
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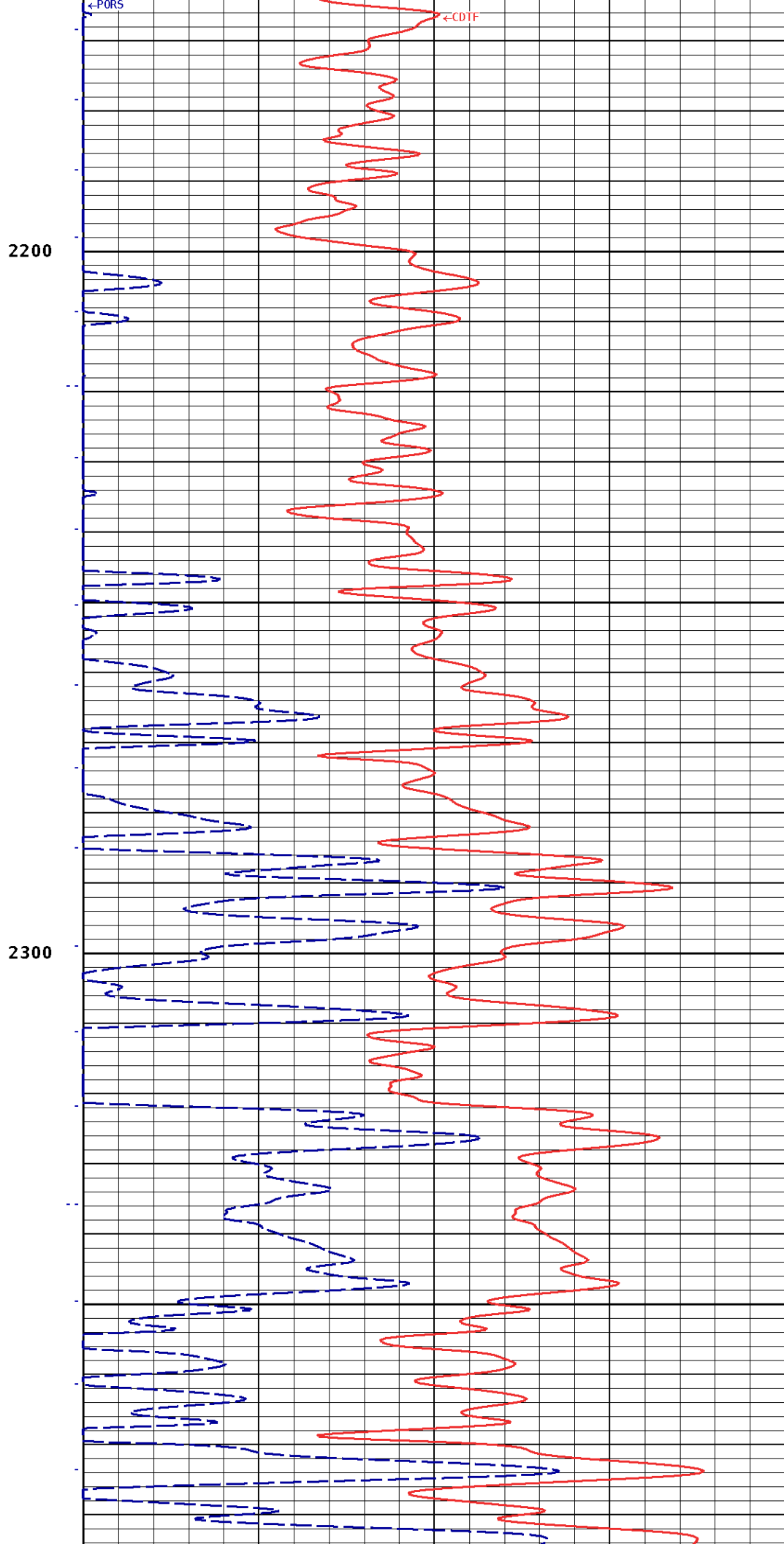
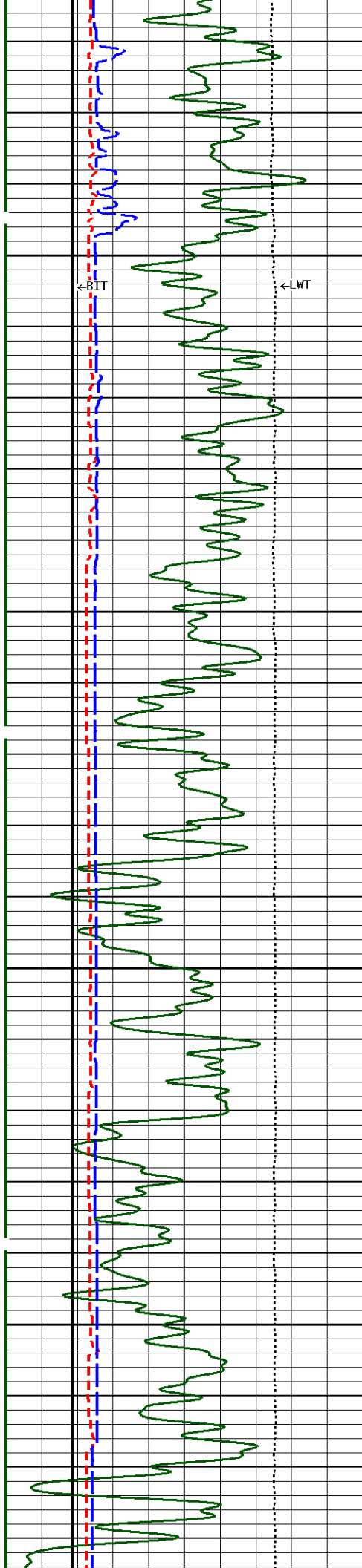
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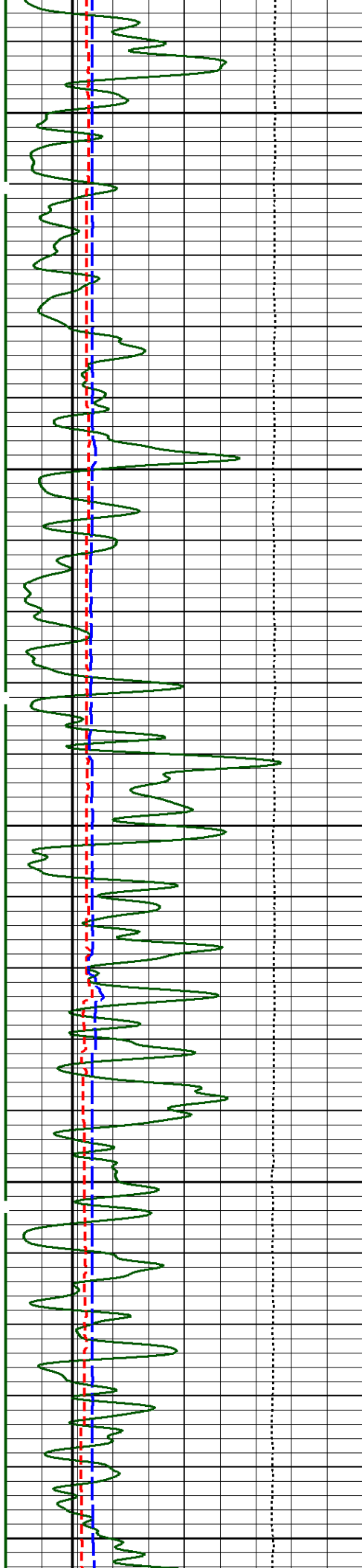


LD CAL

EN CAL

GR

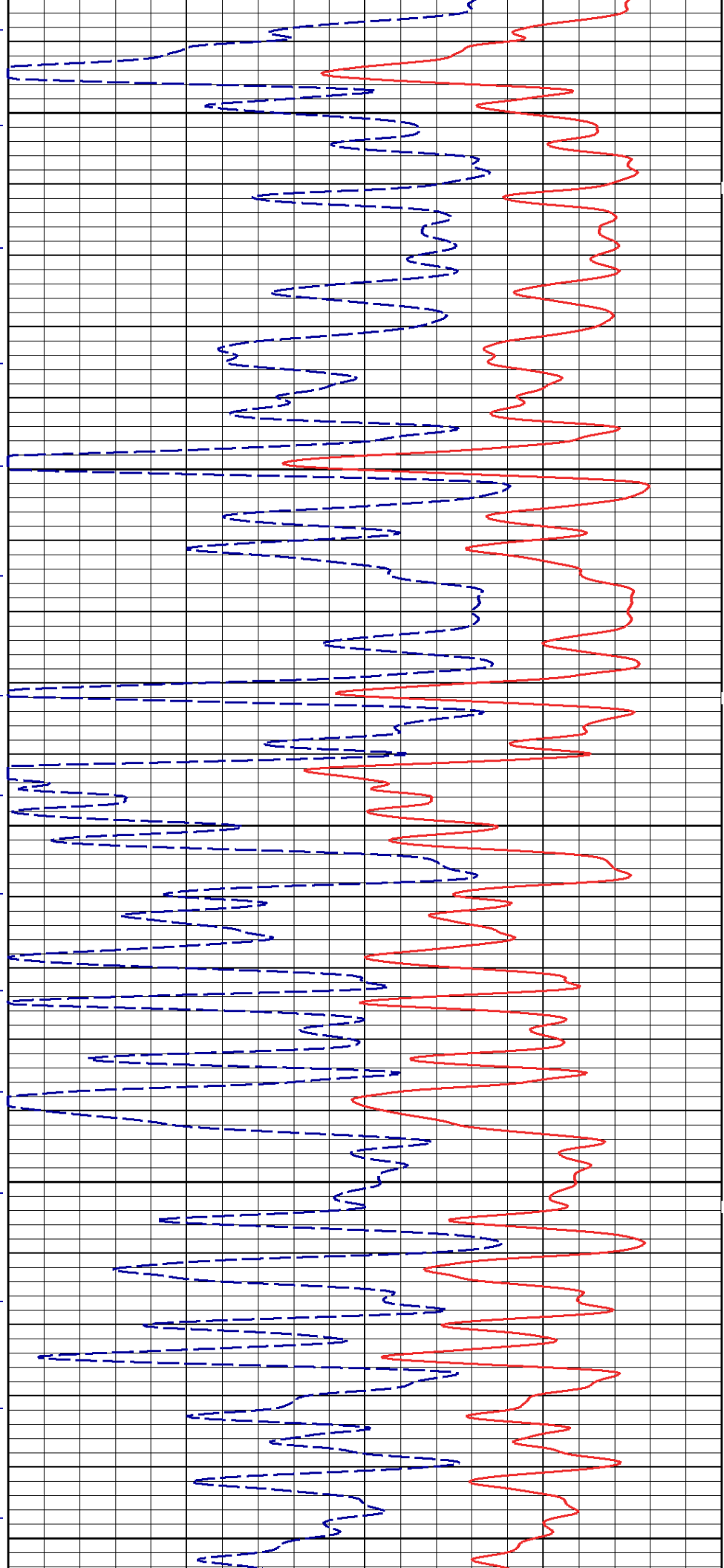


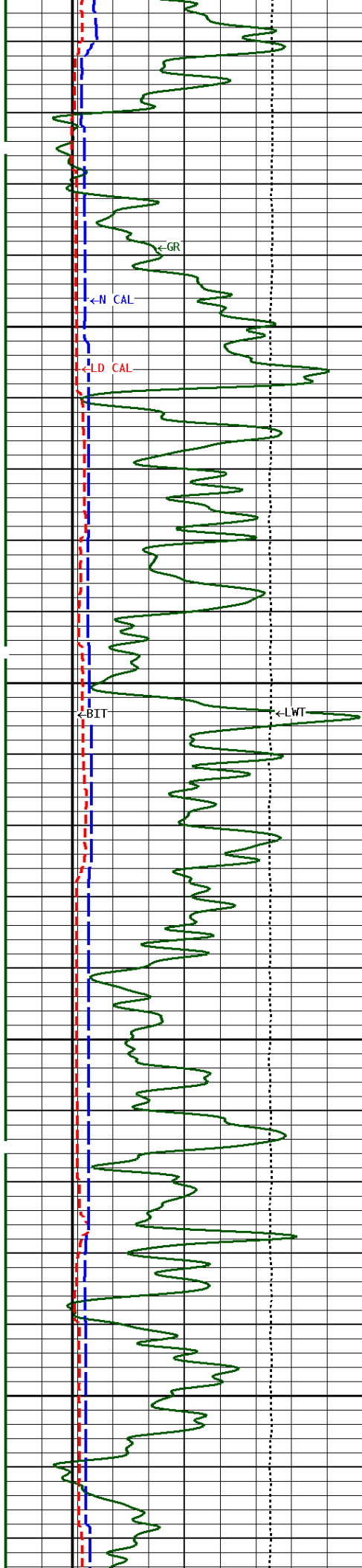


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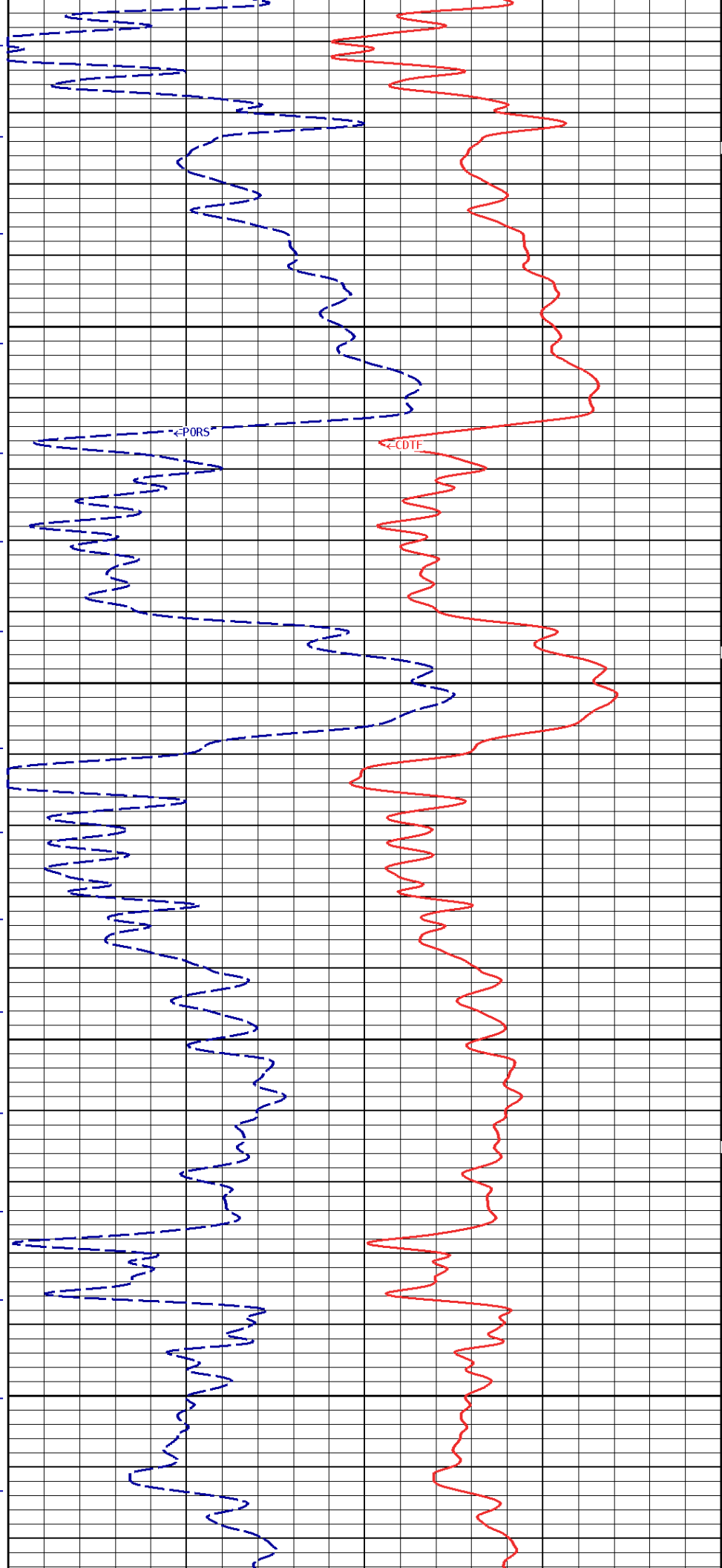
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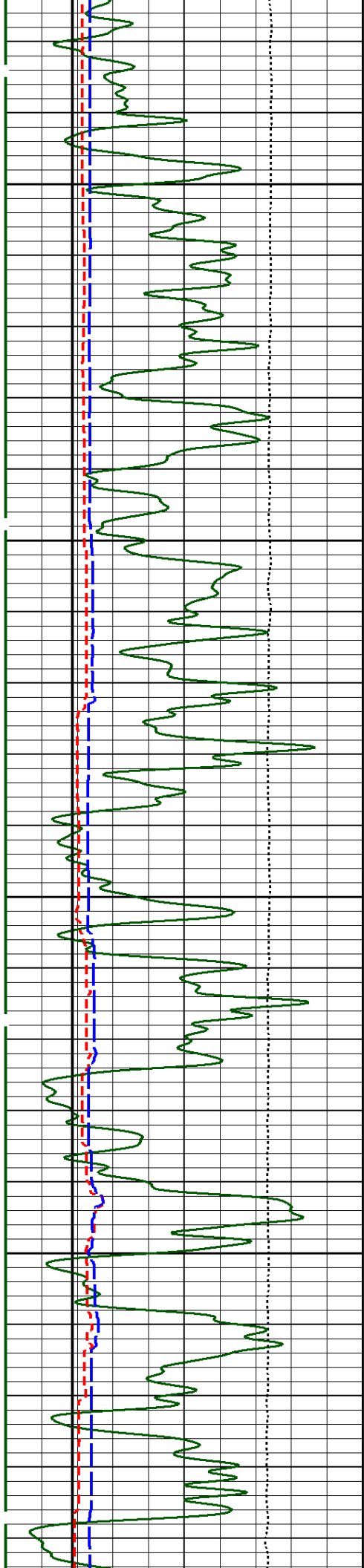




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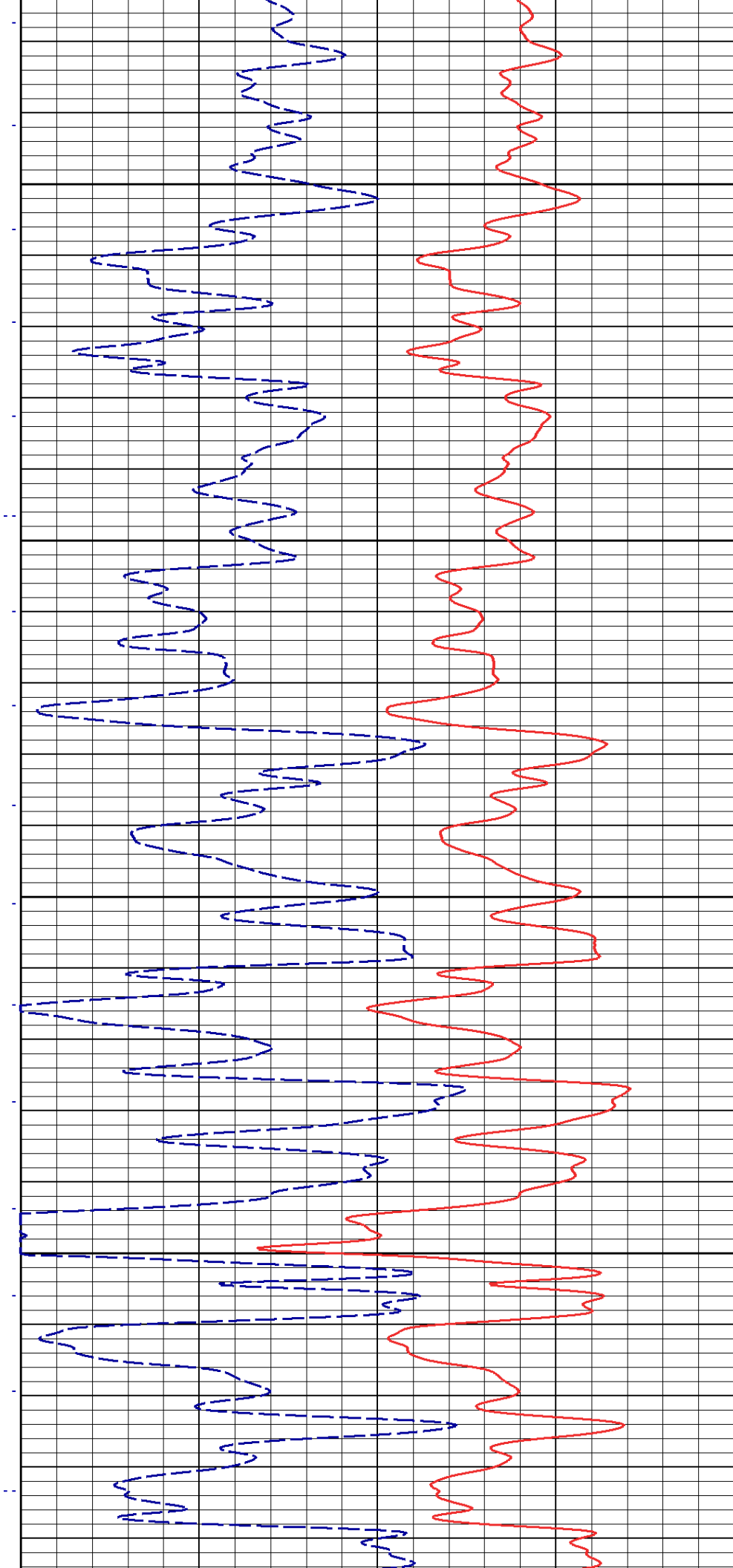
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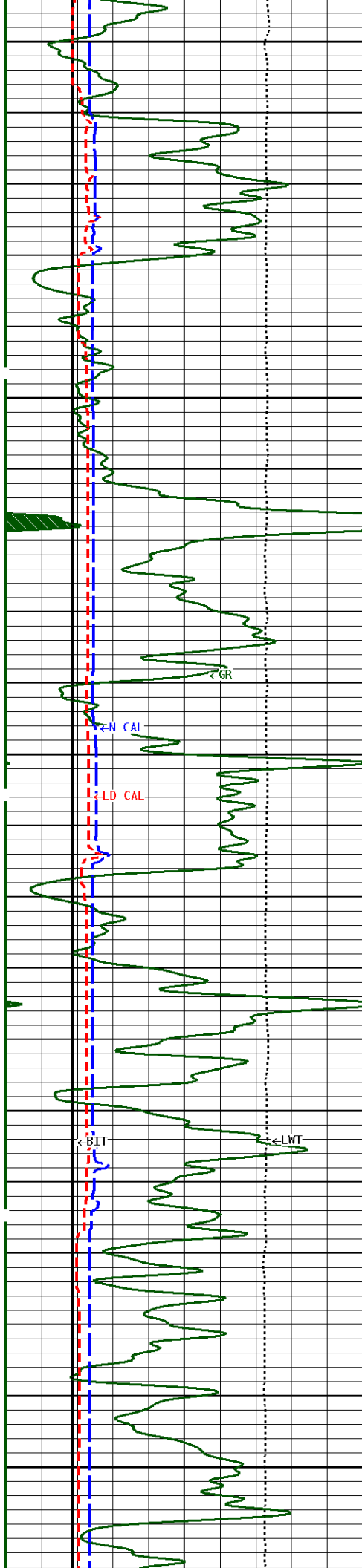




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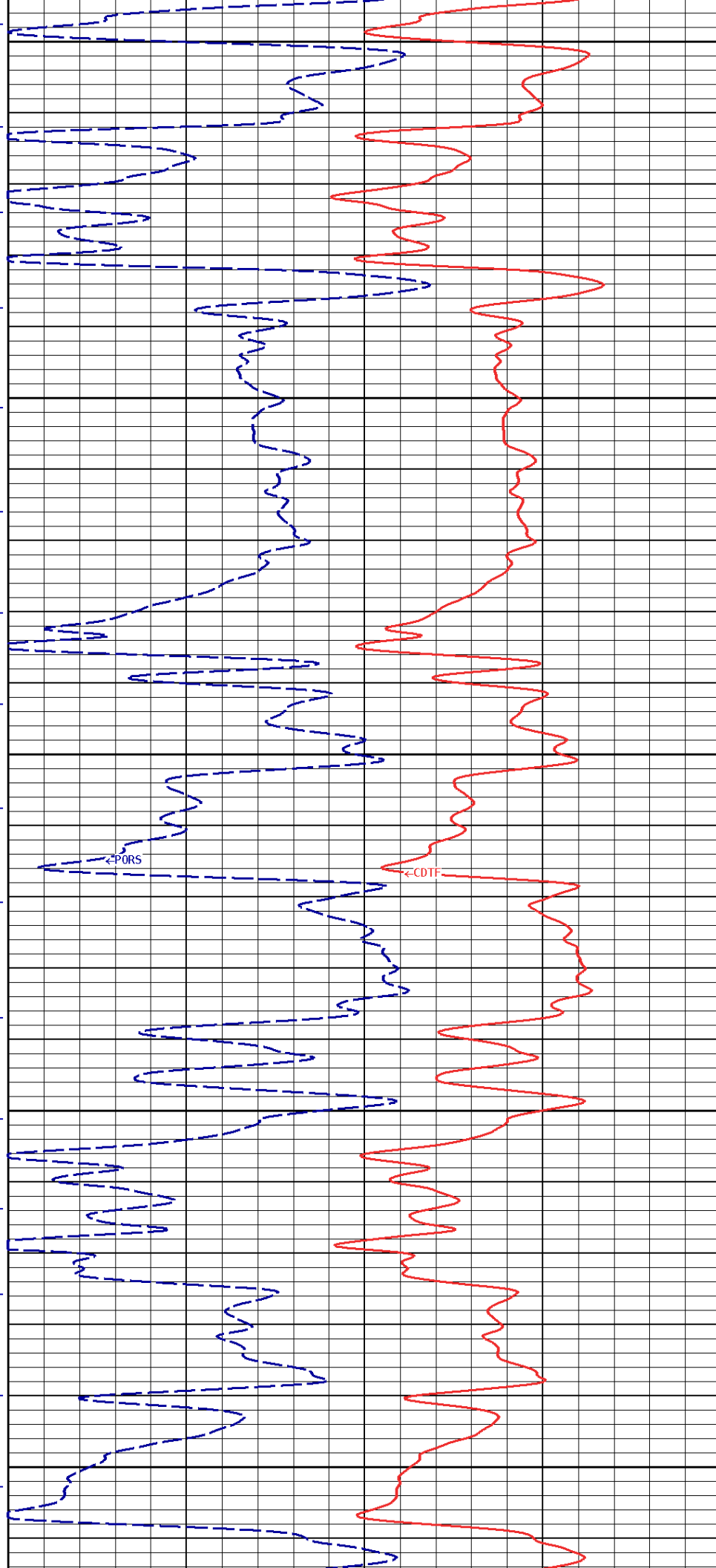
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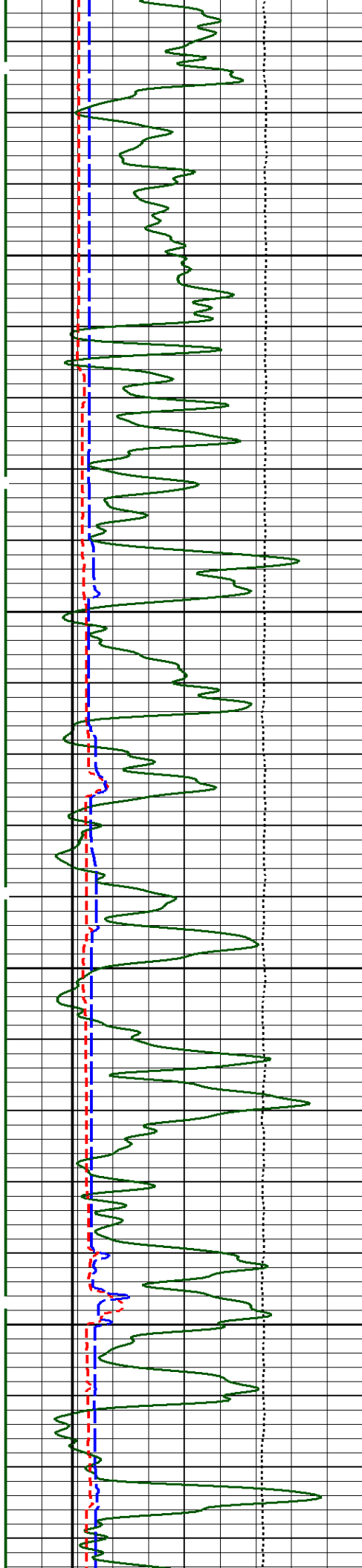




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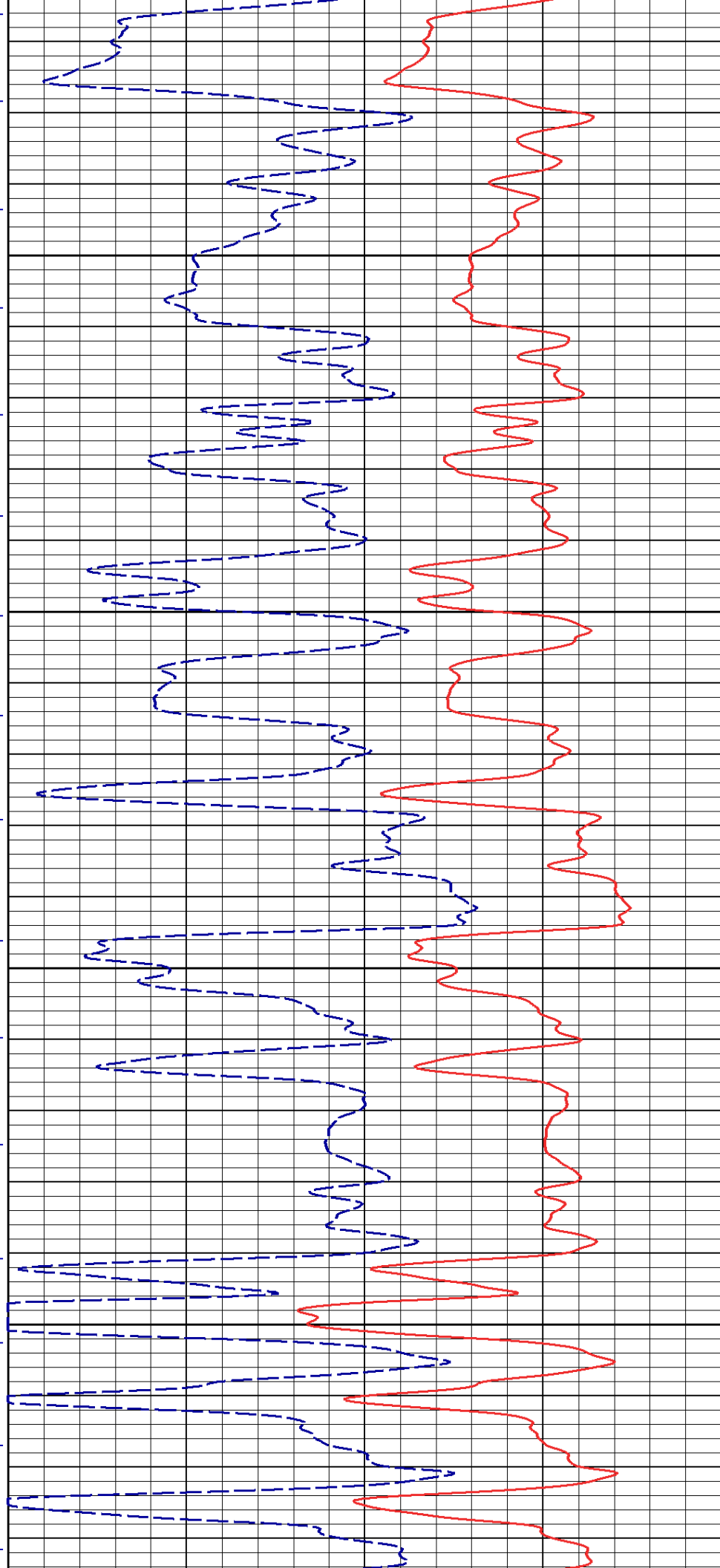
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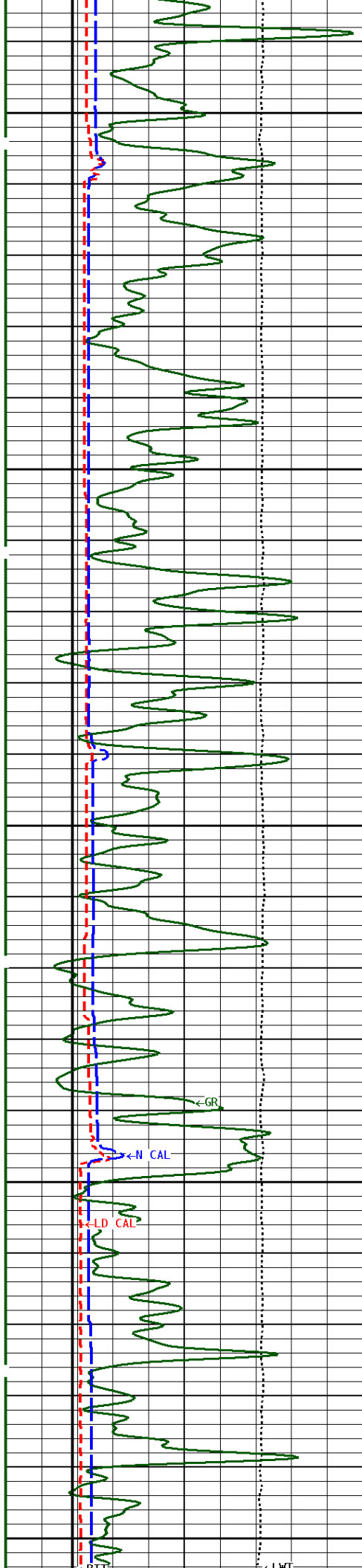




3300

3400

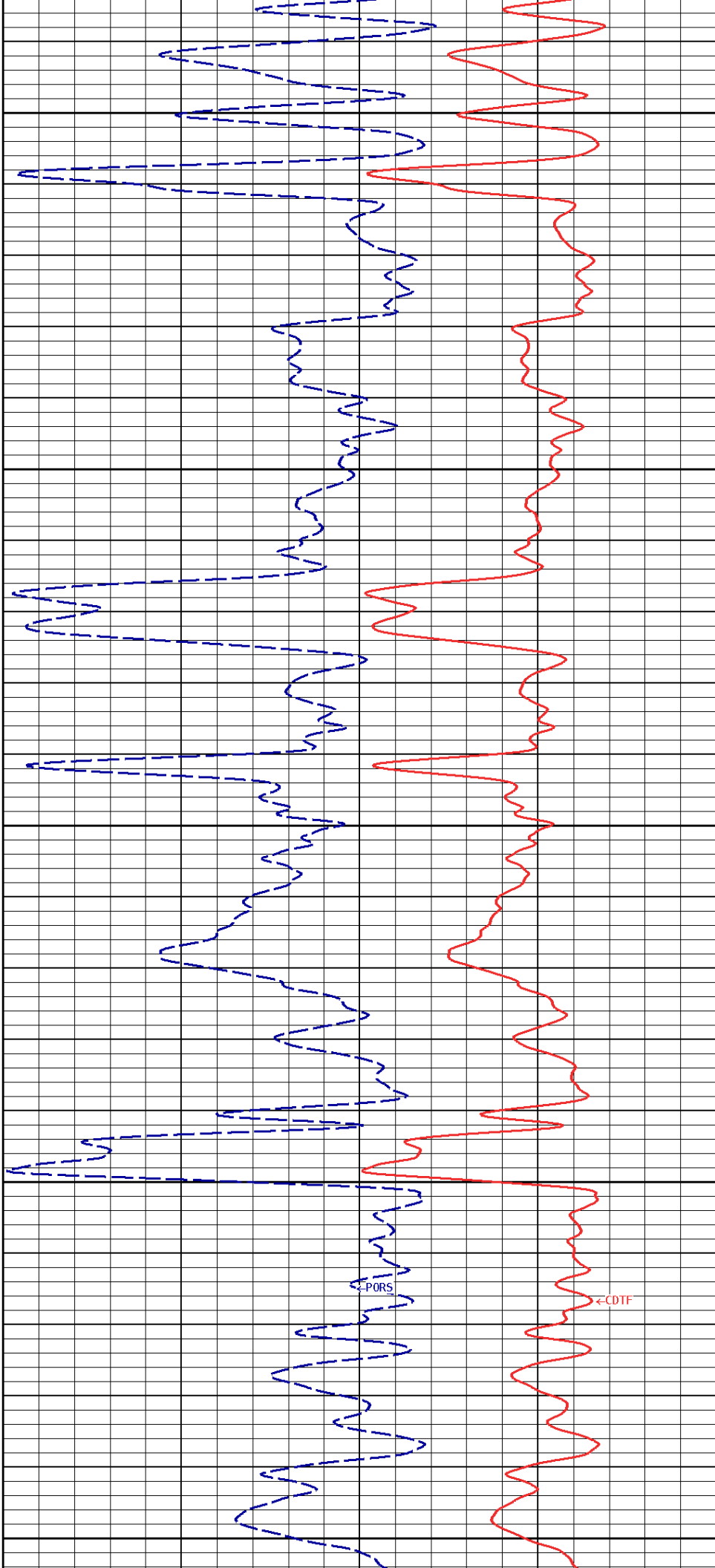




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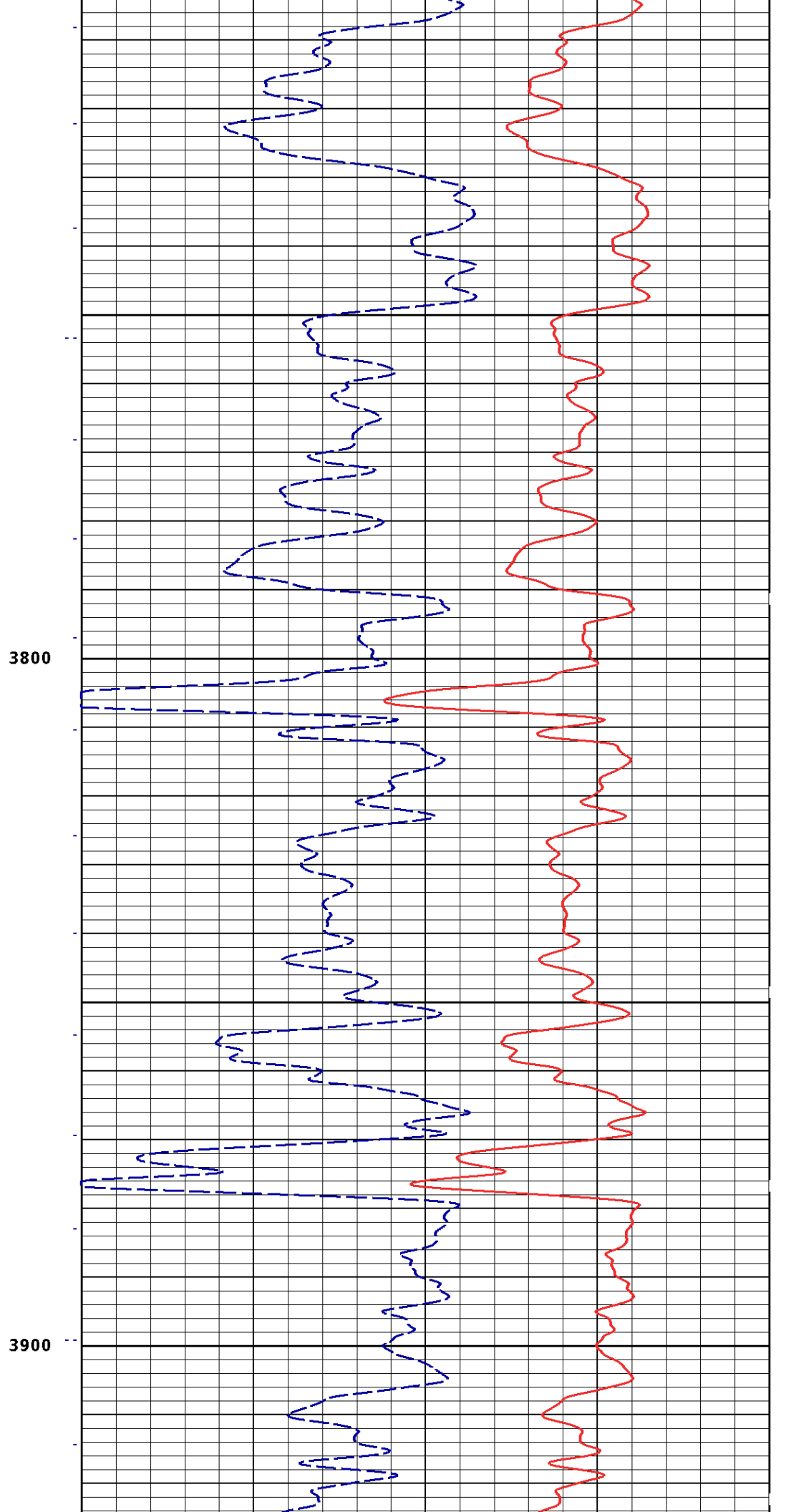
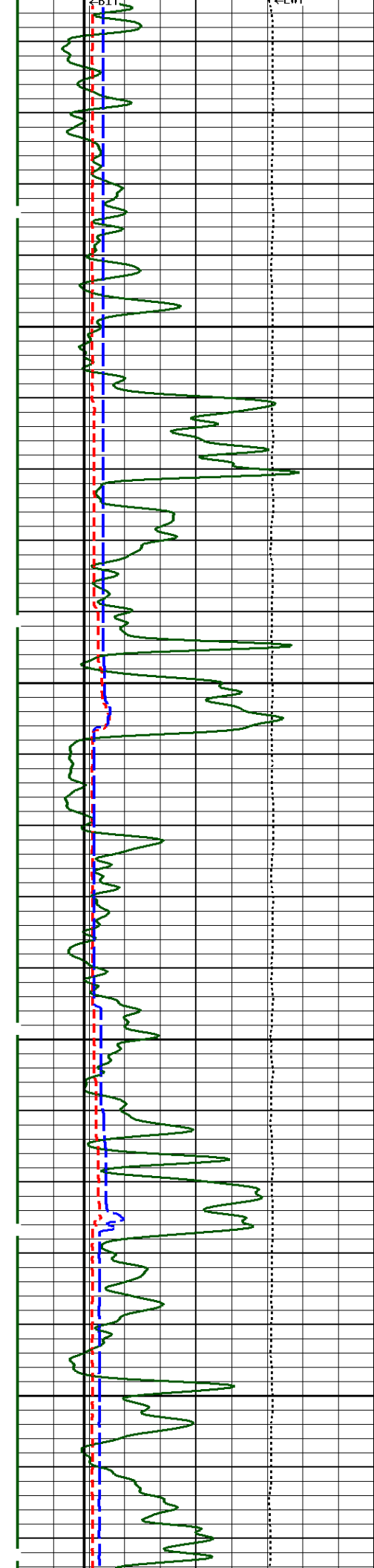
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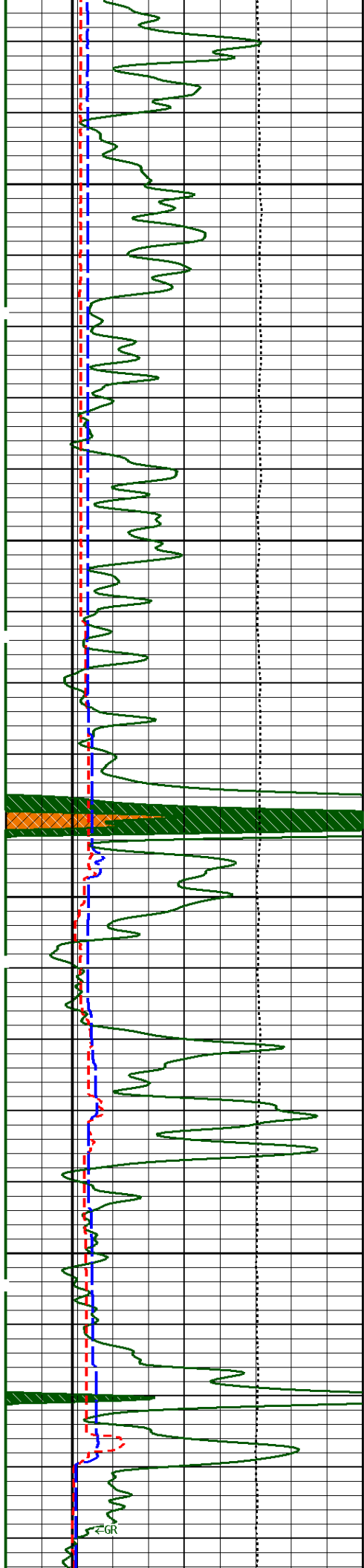
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PORS

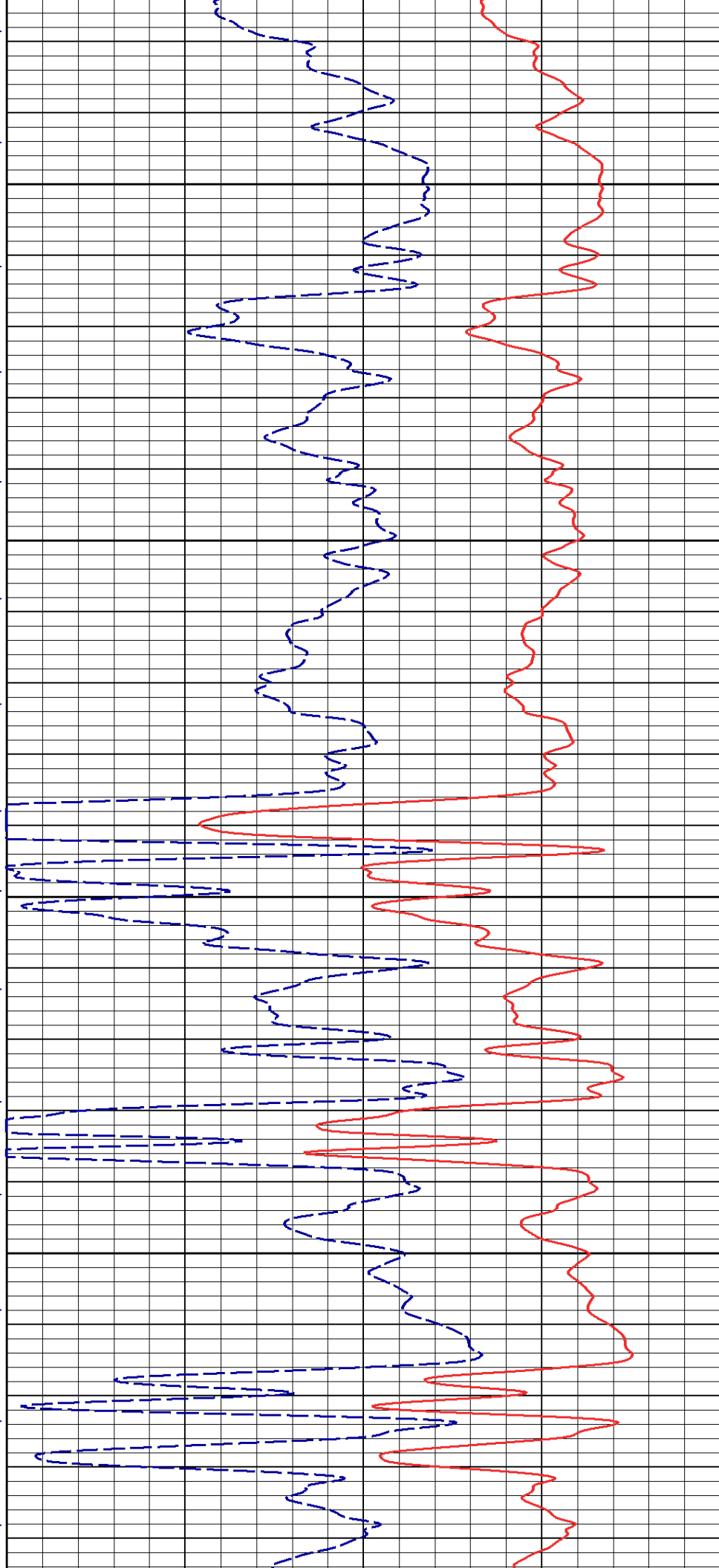
CDTF

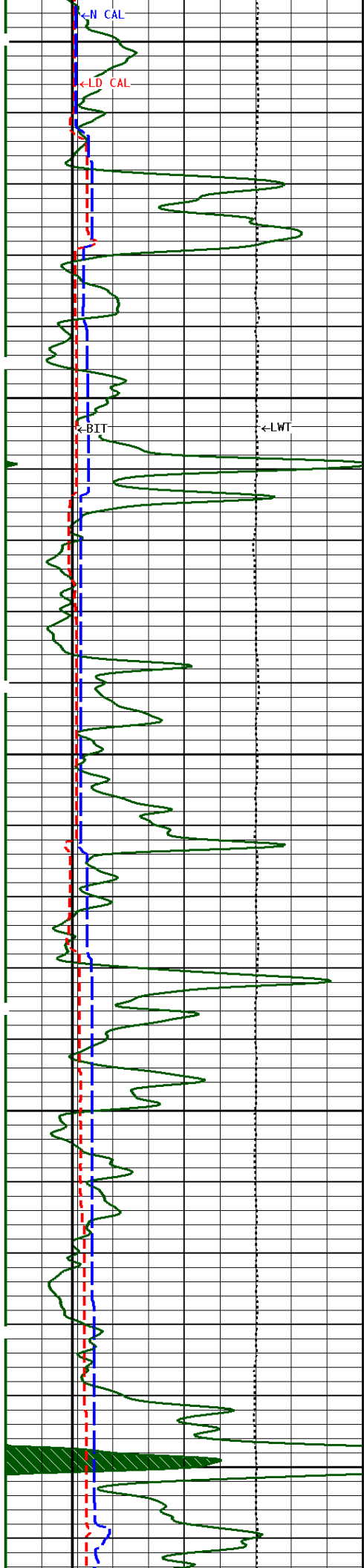




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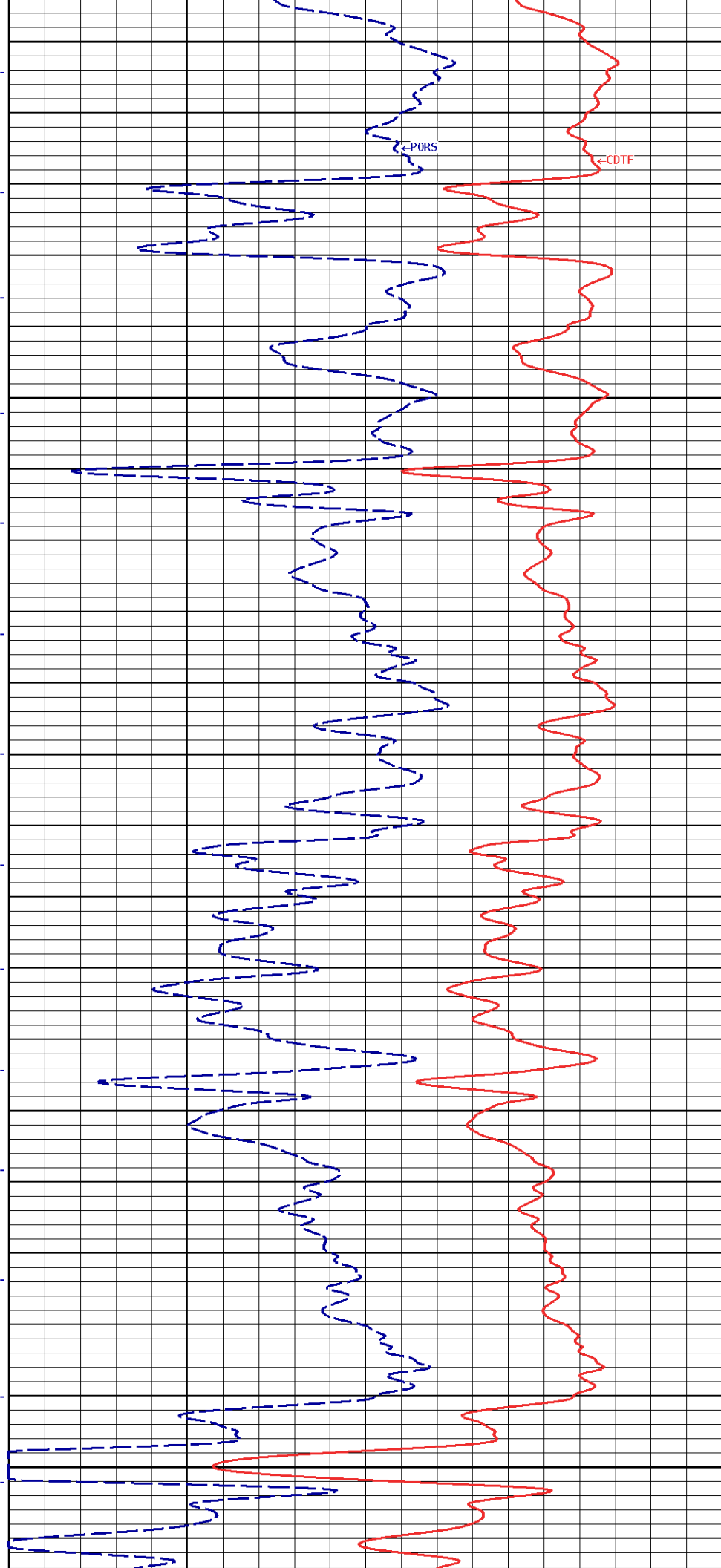
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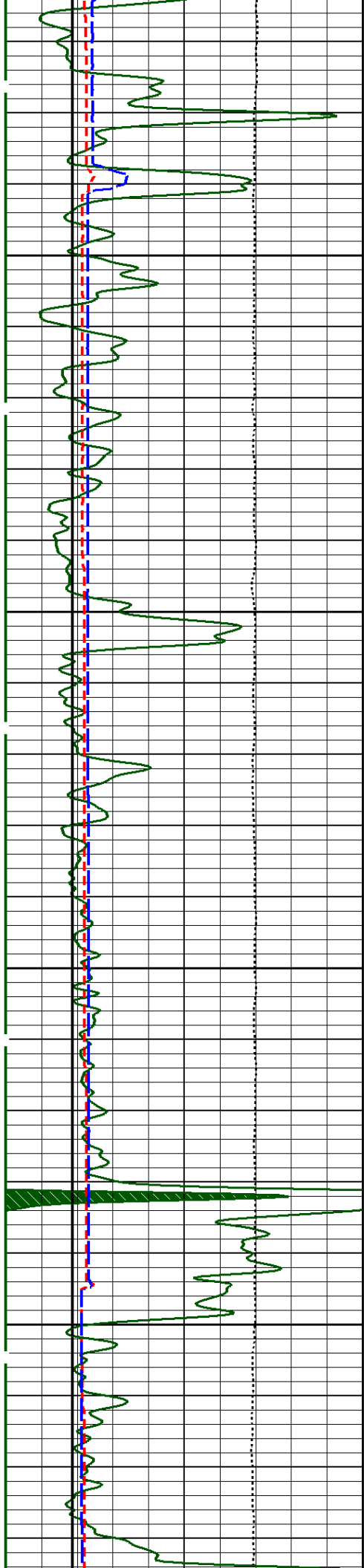




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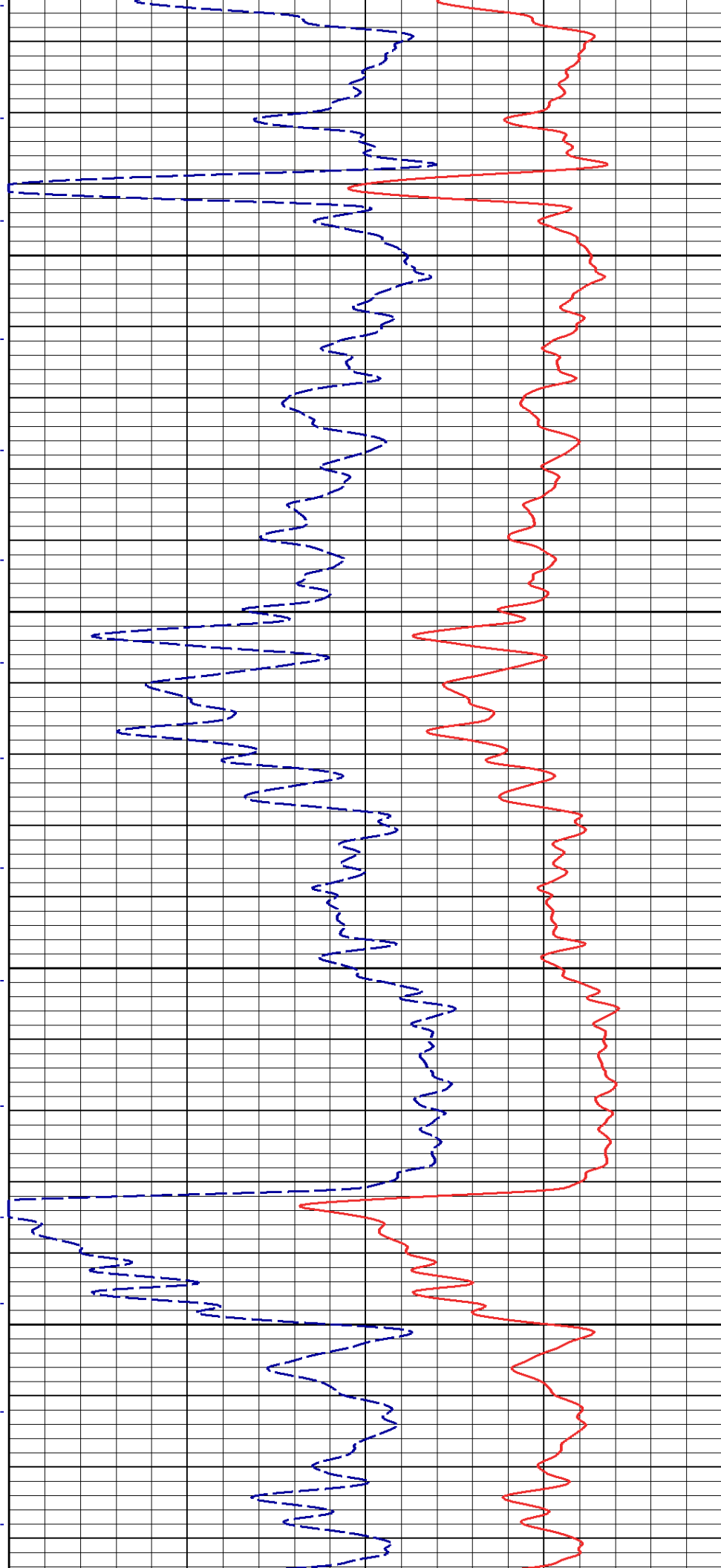
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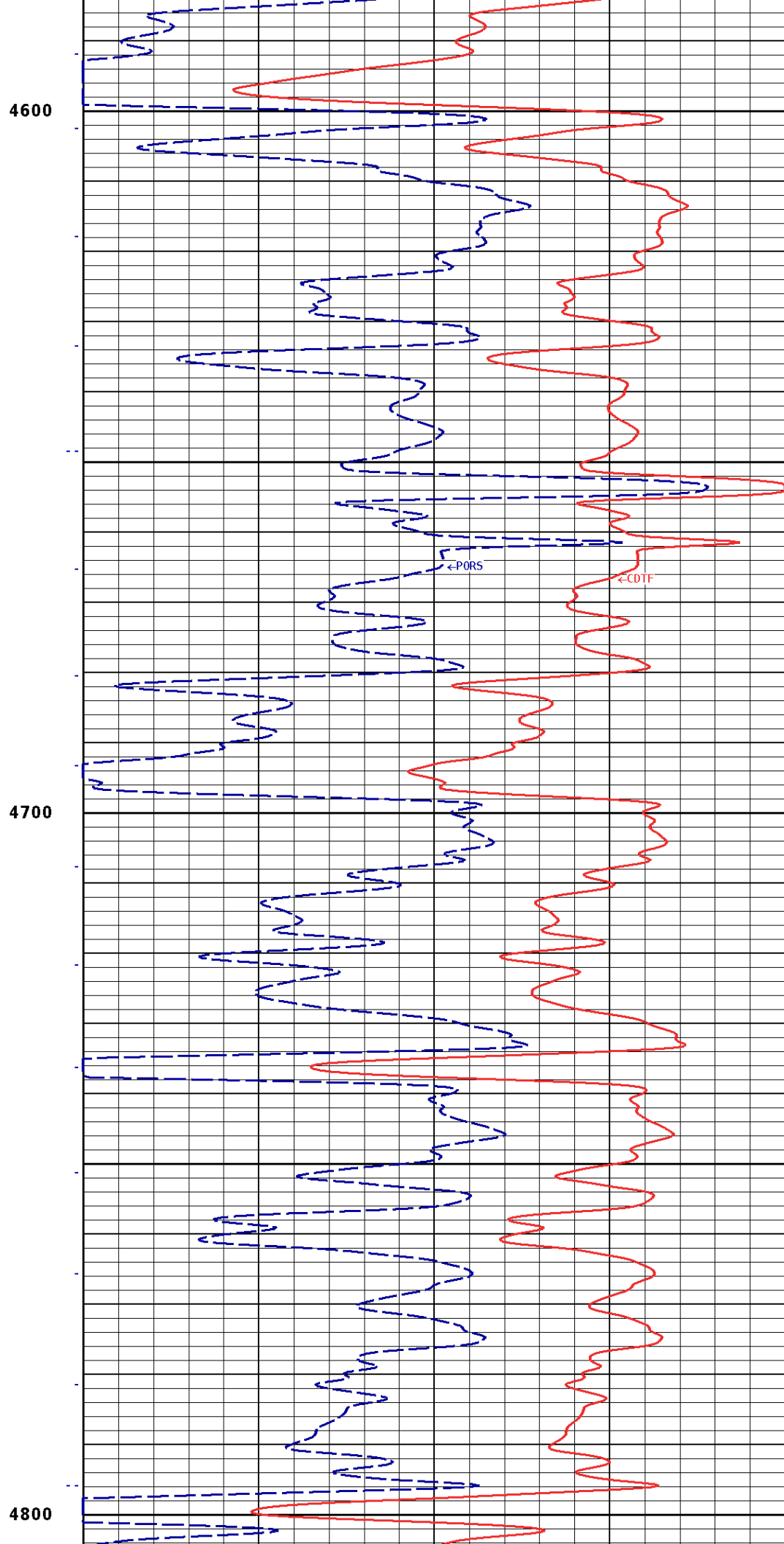
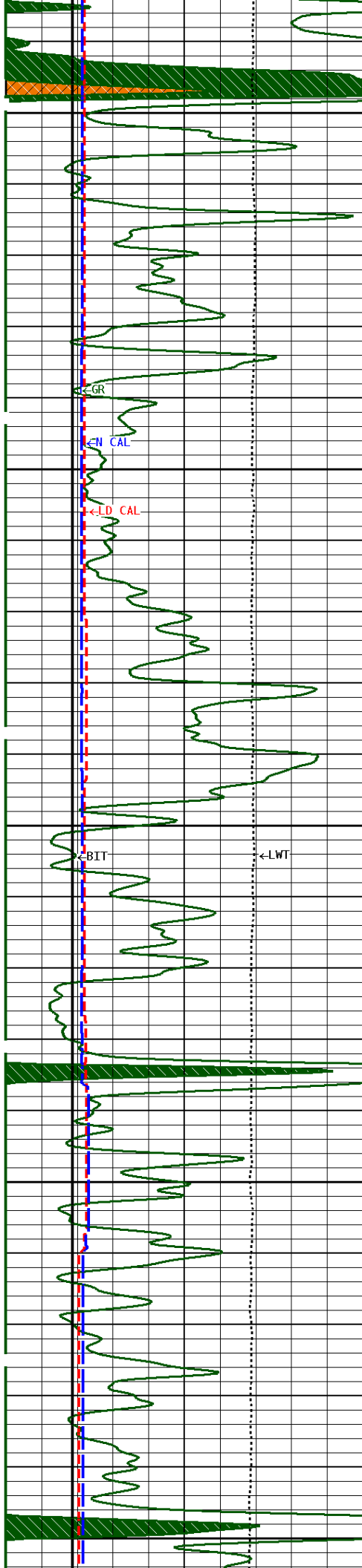


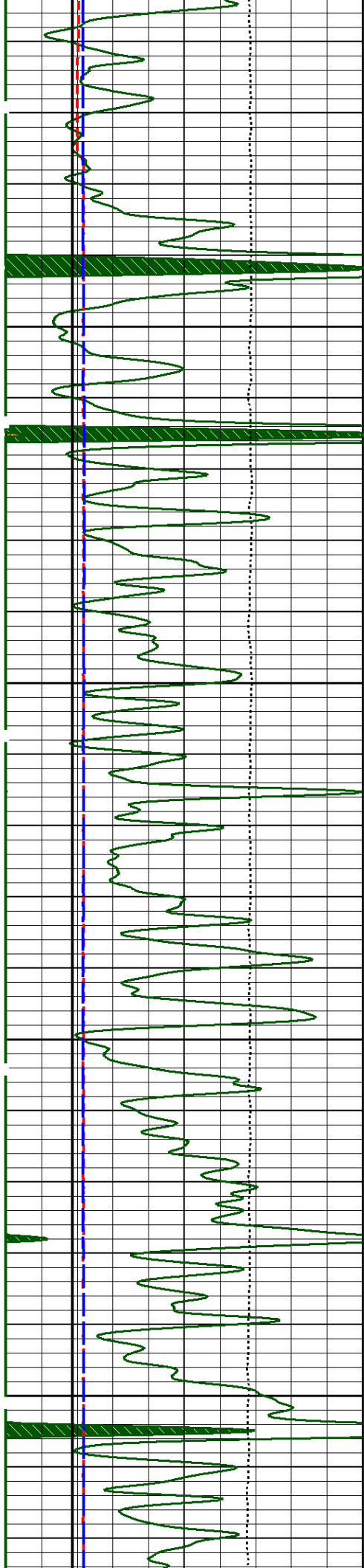


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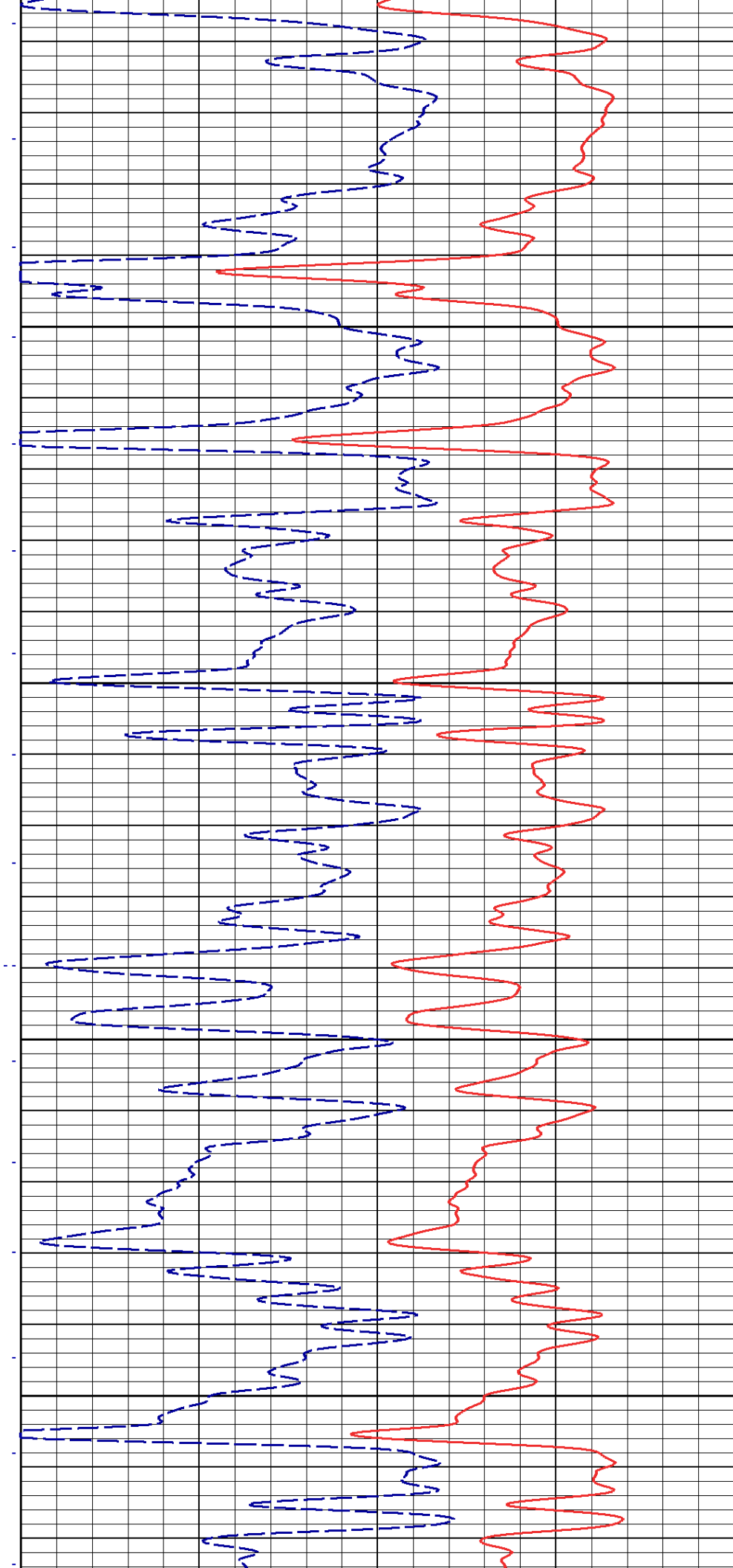


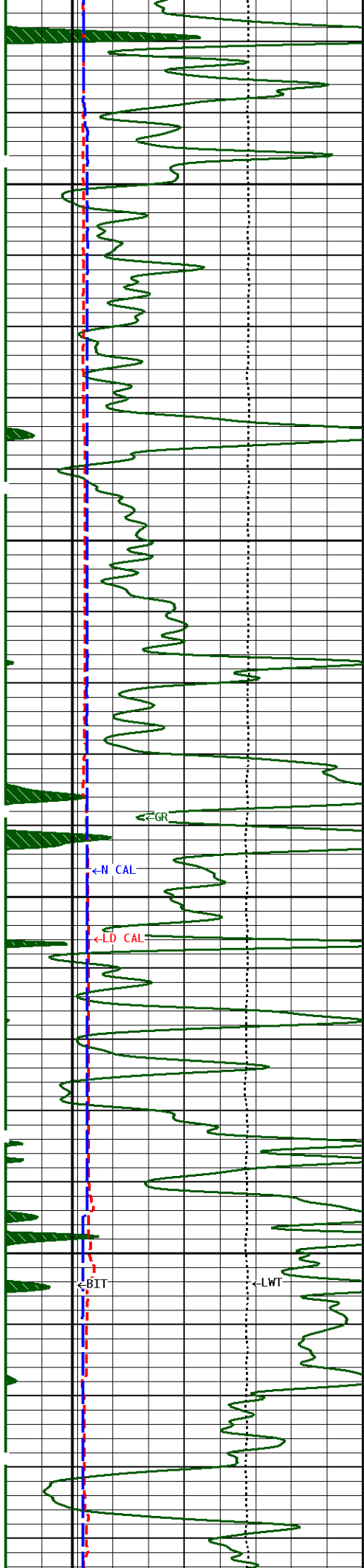




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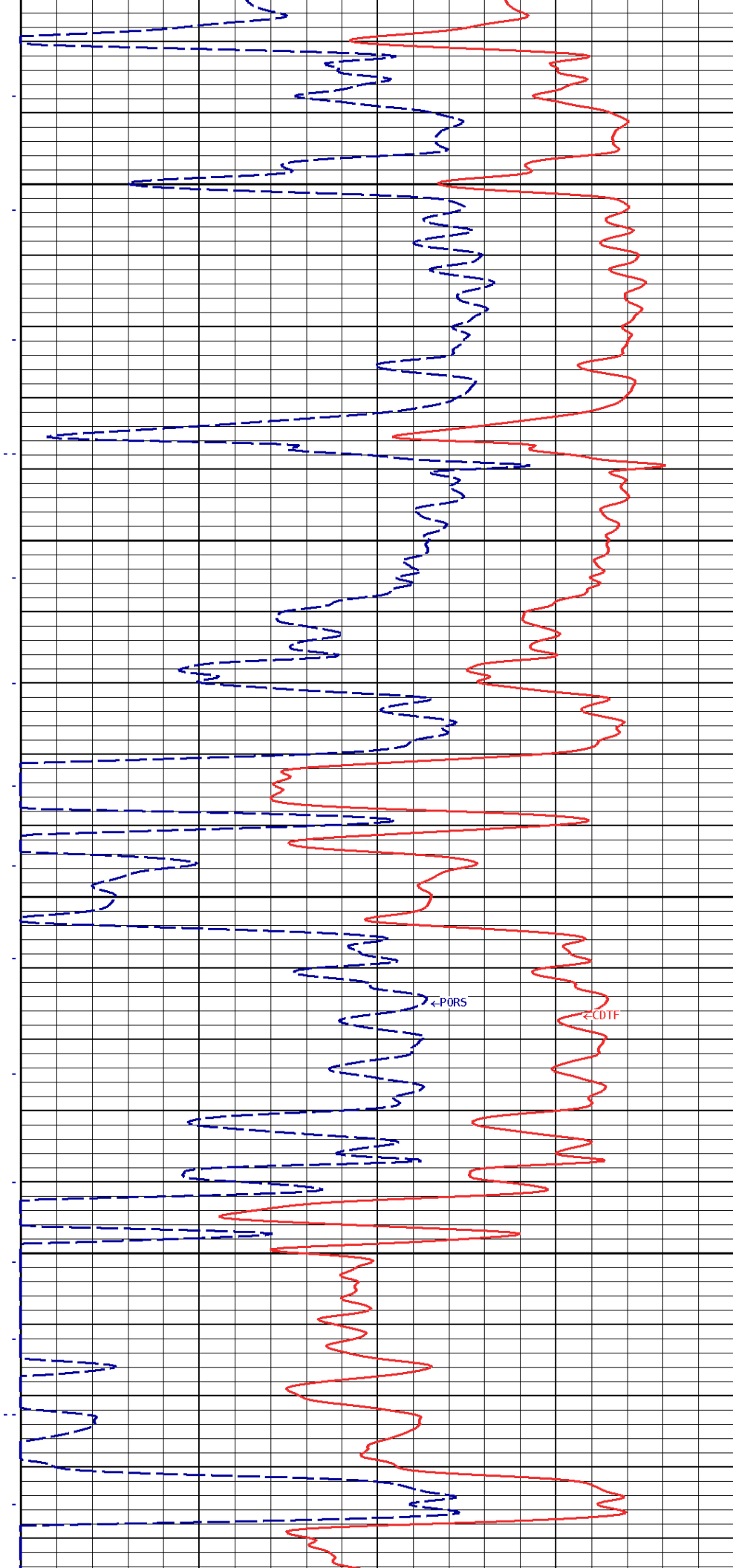
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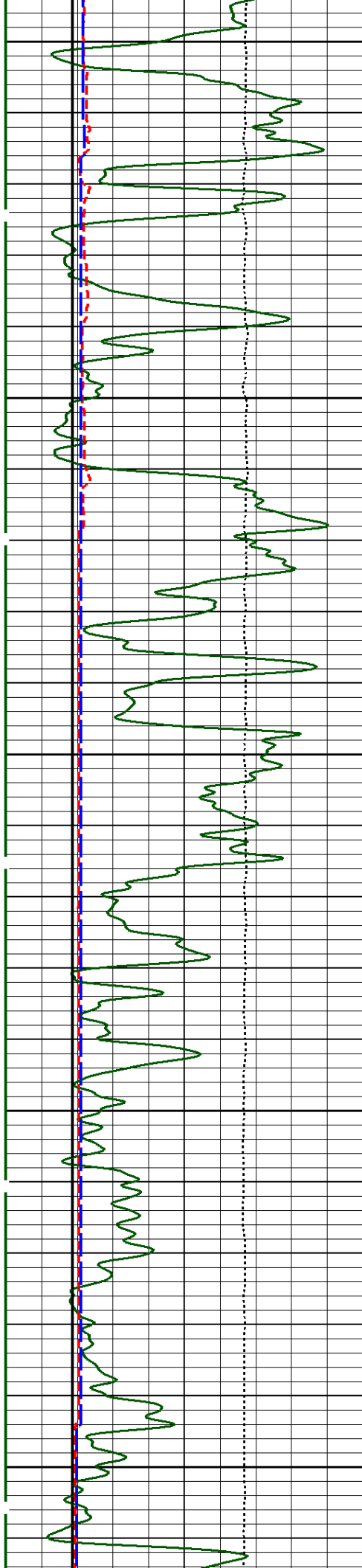




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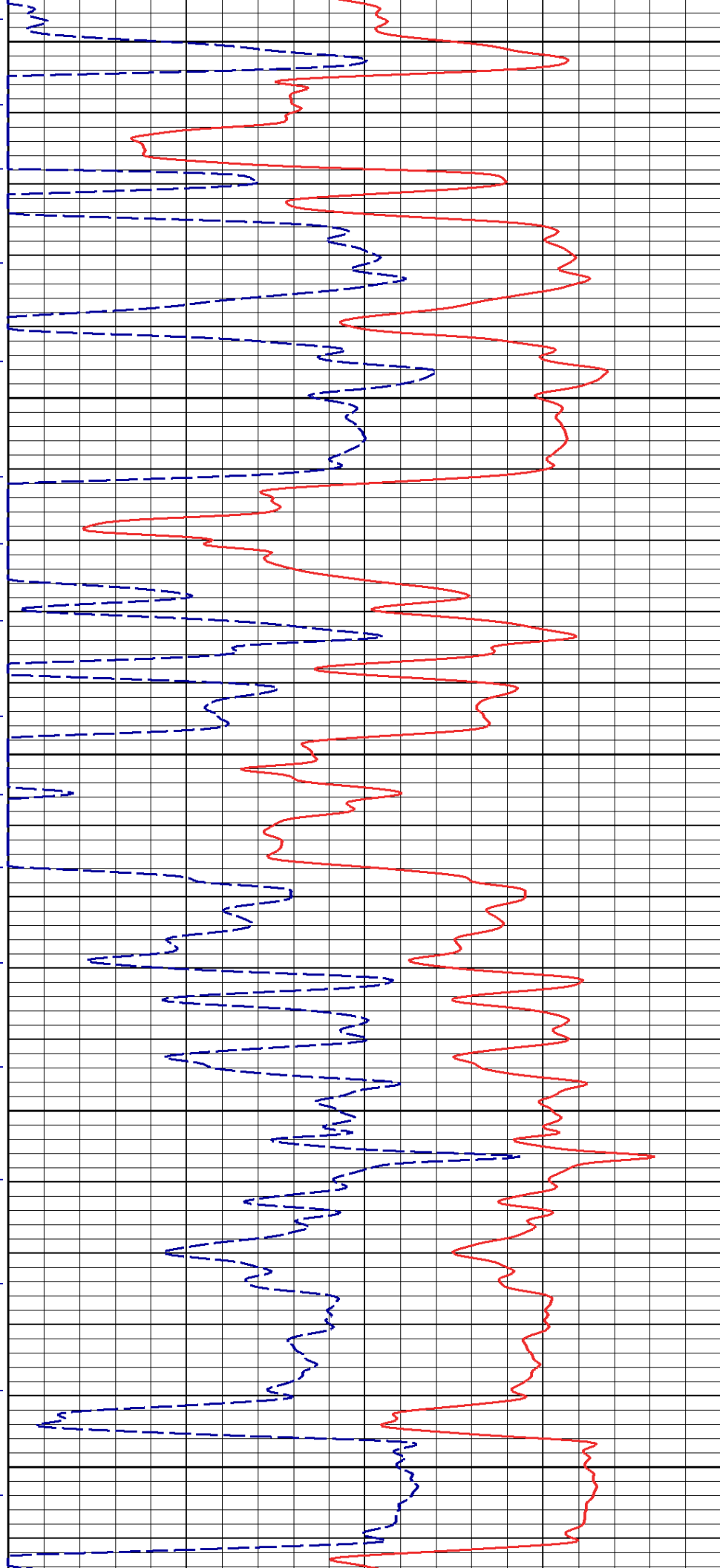
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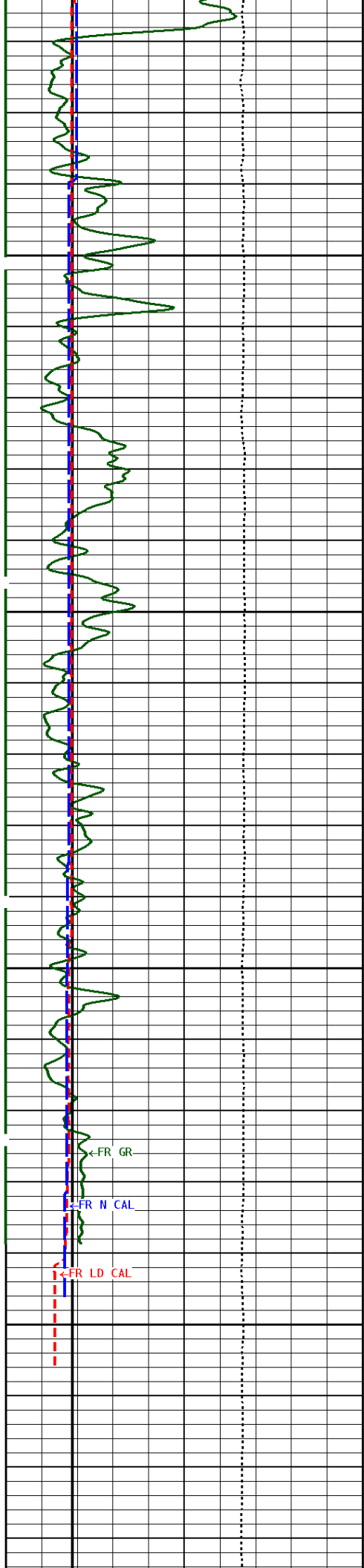




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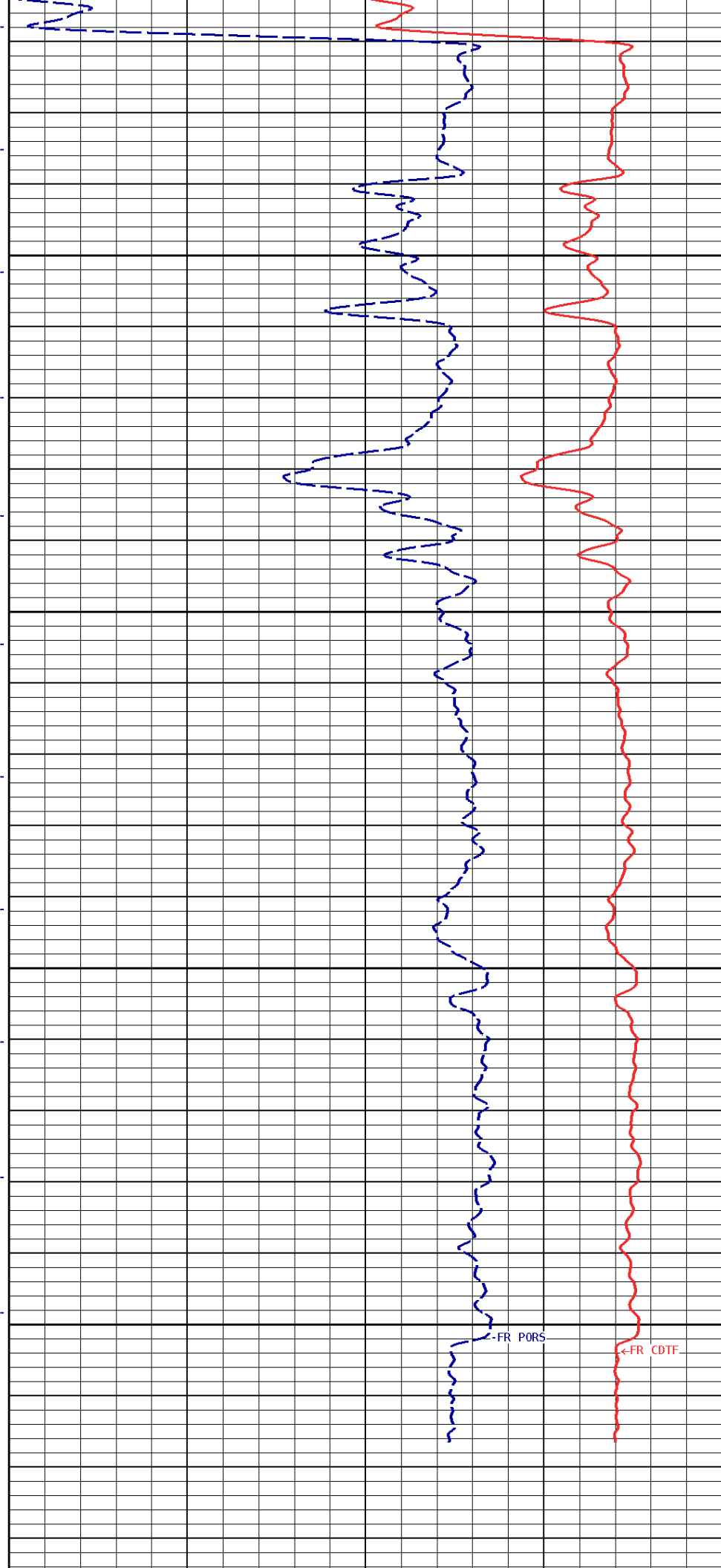
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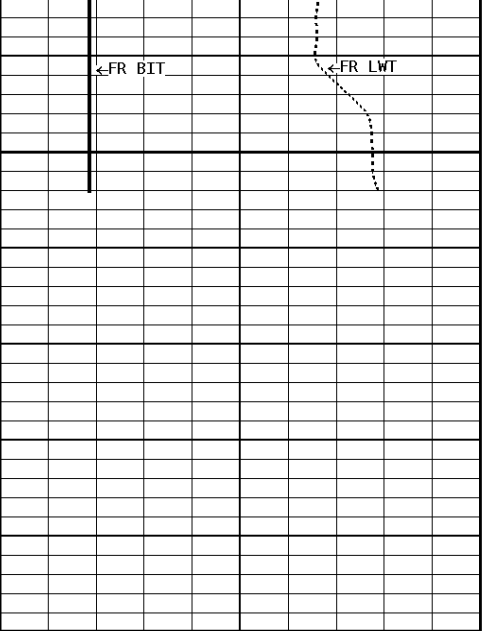
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5600



←FR PORS

←FR CDTF

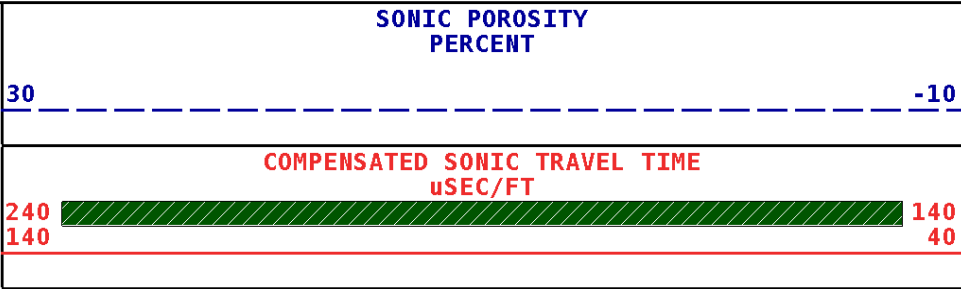
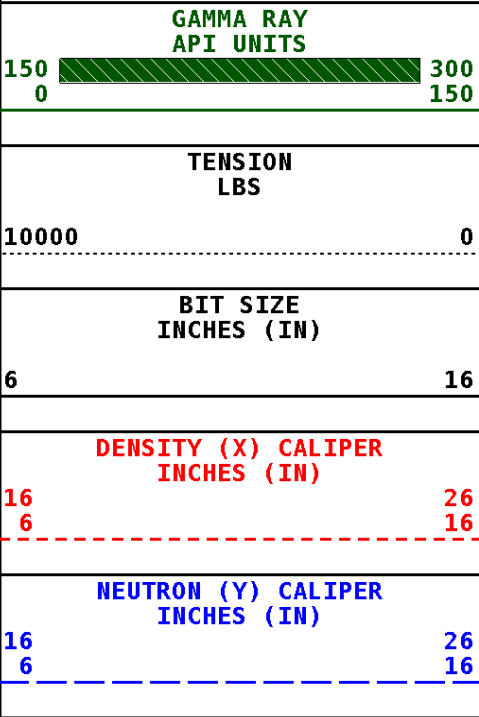


File #1.1.7

5691

5700

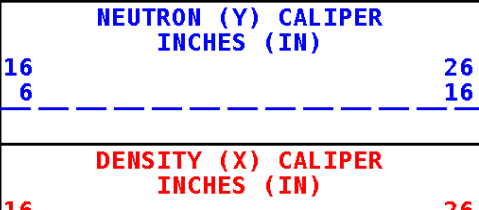
1:240 MAIN SECTION



* Borehole Zone Factors *

Zone 1	99999.0	to	0.0	Feet
Matrix Transit Time			47.5	us/ft
Fluid Transit Time			189.0	us/ft

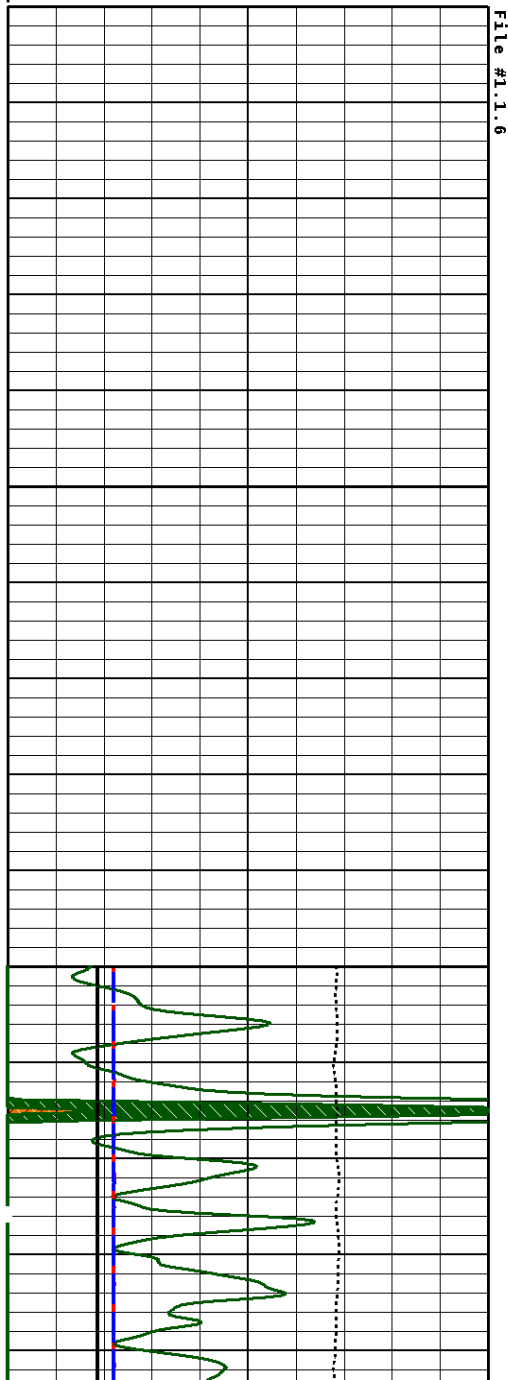
Well File: MERIT_GOERING_JACOB_M-4_JAN27_QUINT	Scale: 1:240	Format: CST-240
Segment: V1.D1.S6 Repeat	Acquired: Not Available	
Reference: 0	Processed: Not Available	



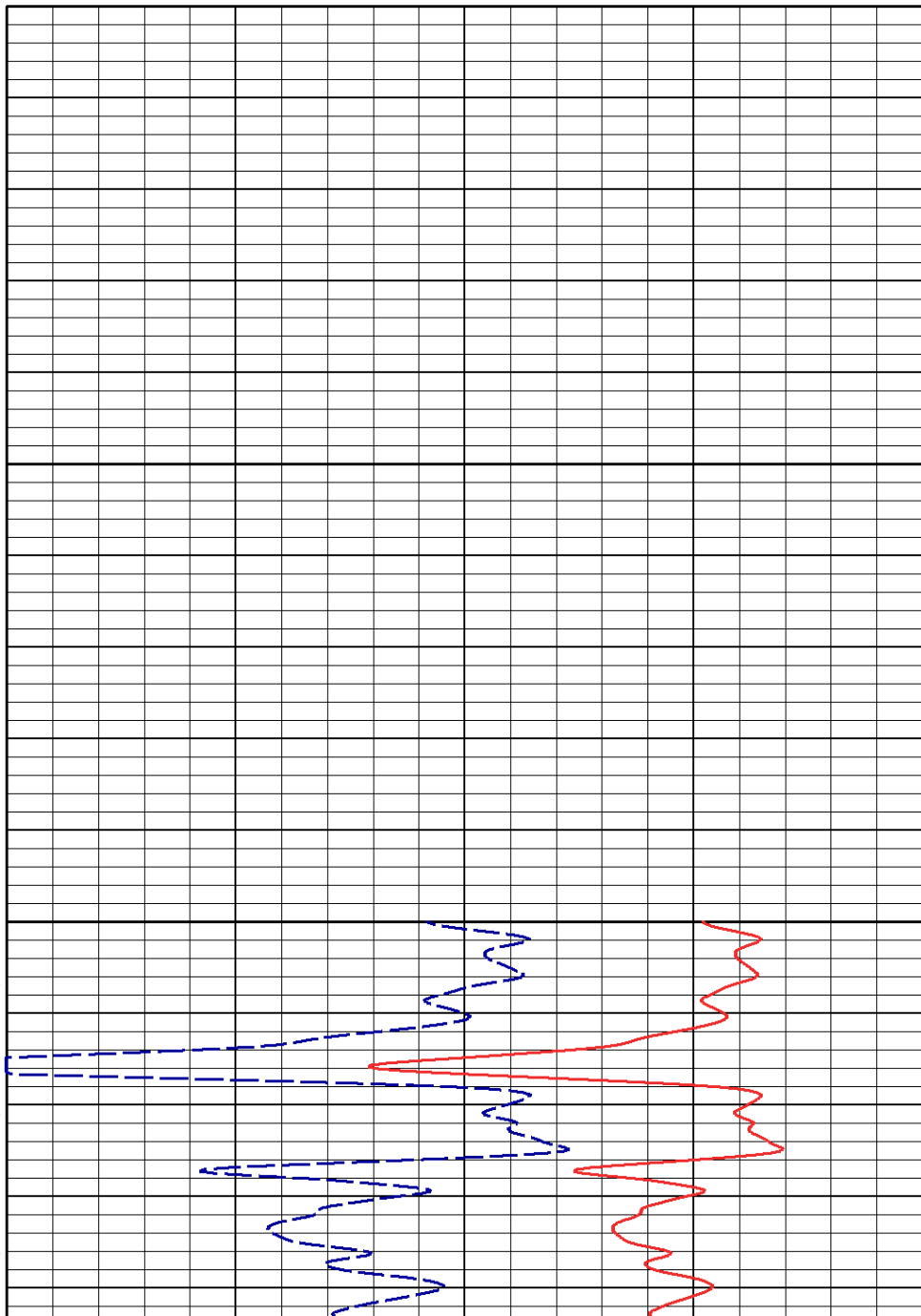
10 6	20 16
BIT SIZE INCHES (IN)	
6	16
TENSION LBS	
10000	0
GAMMA RAY API UNITS	
150 0	300 150

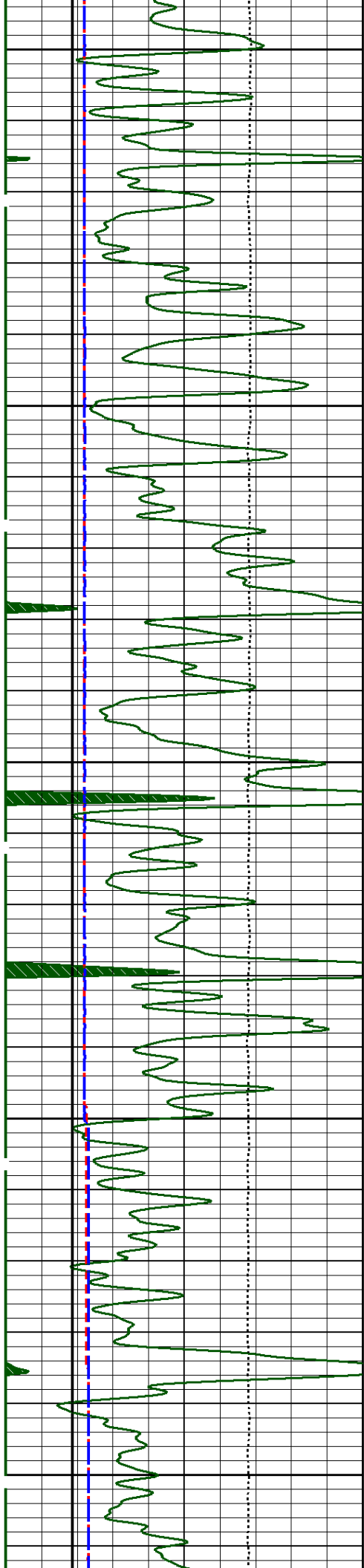
COMPENSATED SONIC TRAVEL TIME uSEC/FT	
240 140	140 40
SONIC POROSITY PERCENT	
30	-10

1:240 REPEAT SECTION



4800

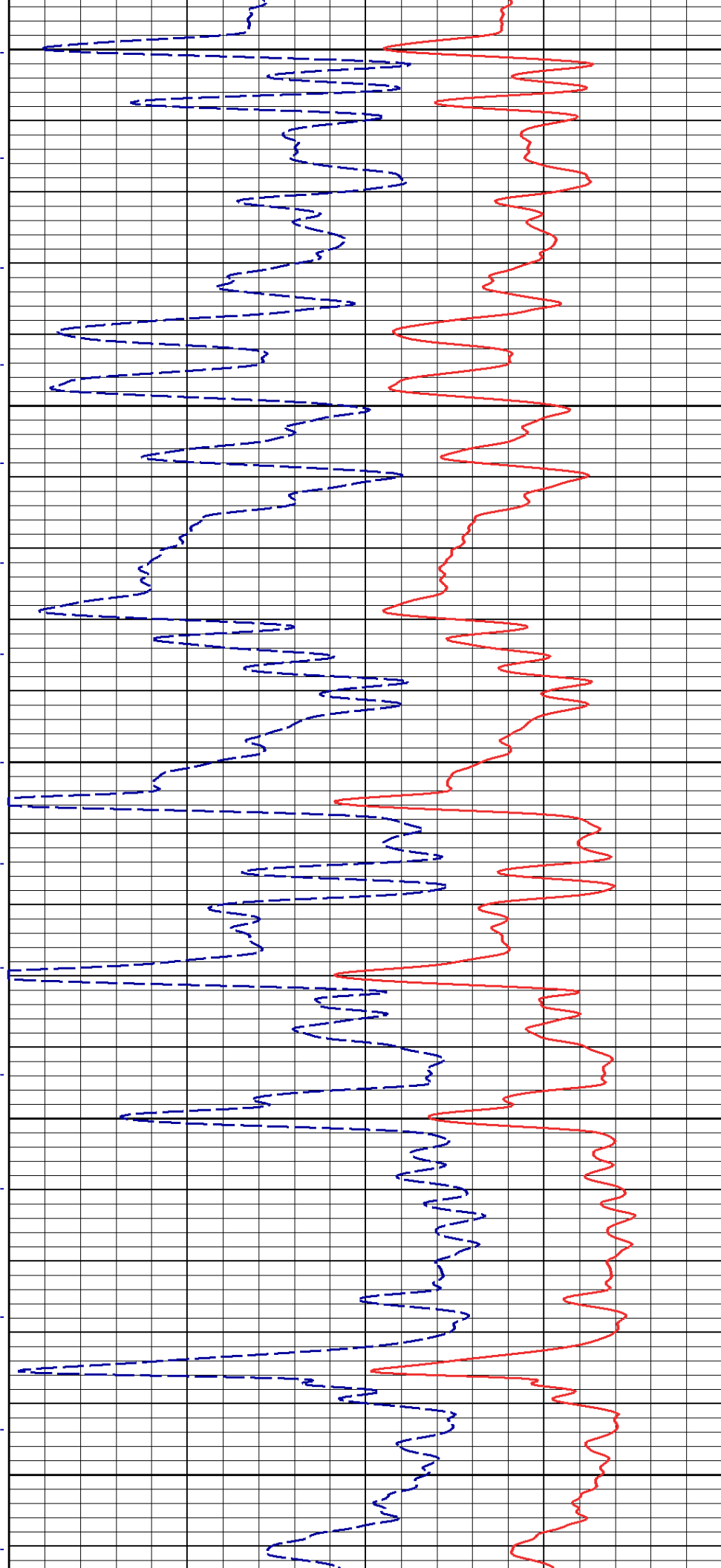


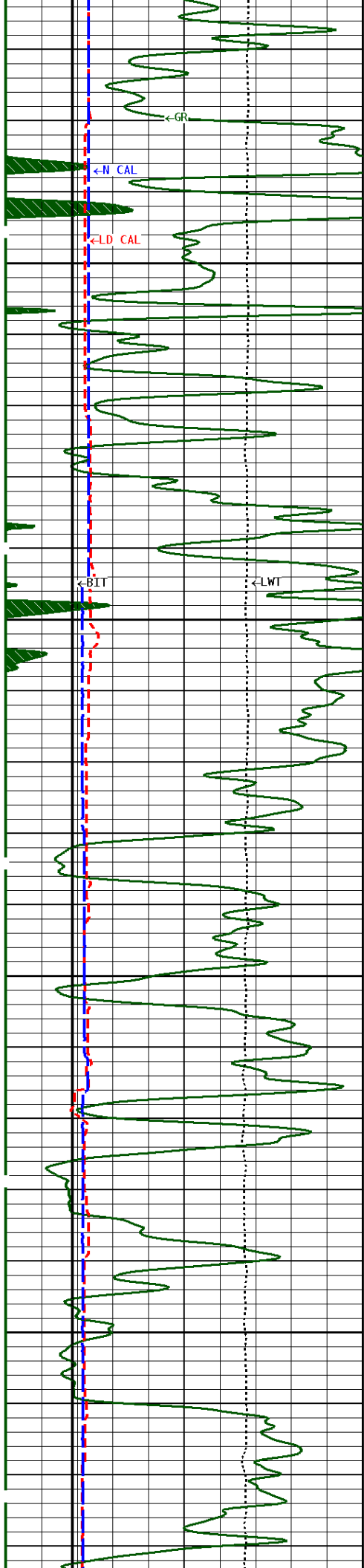


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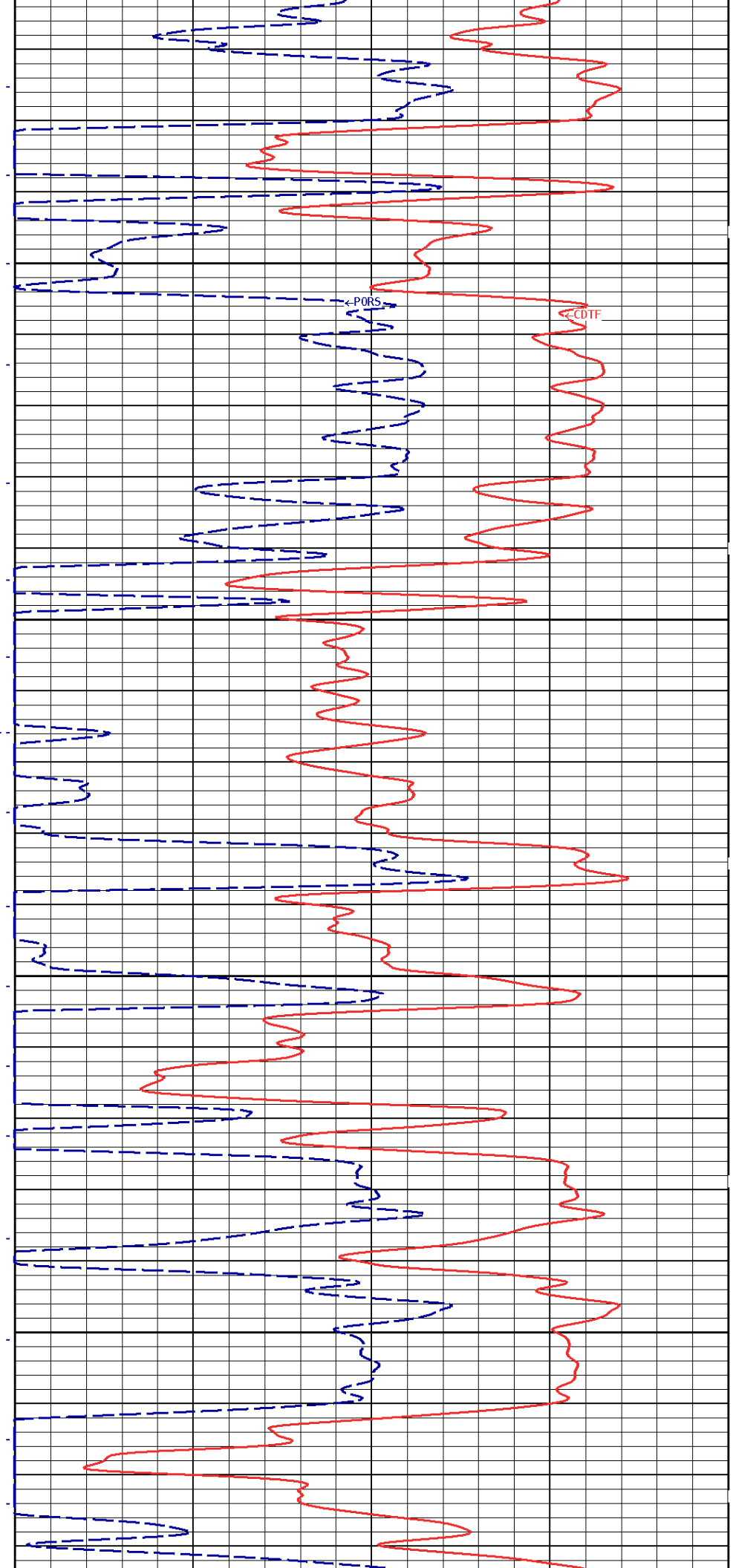
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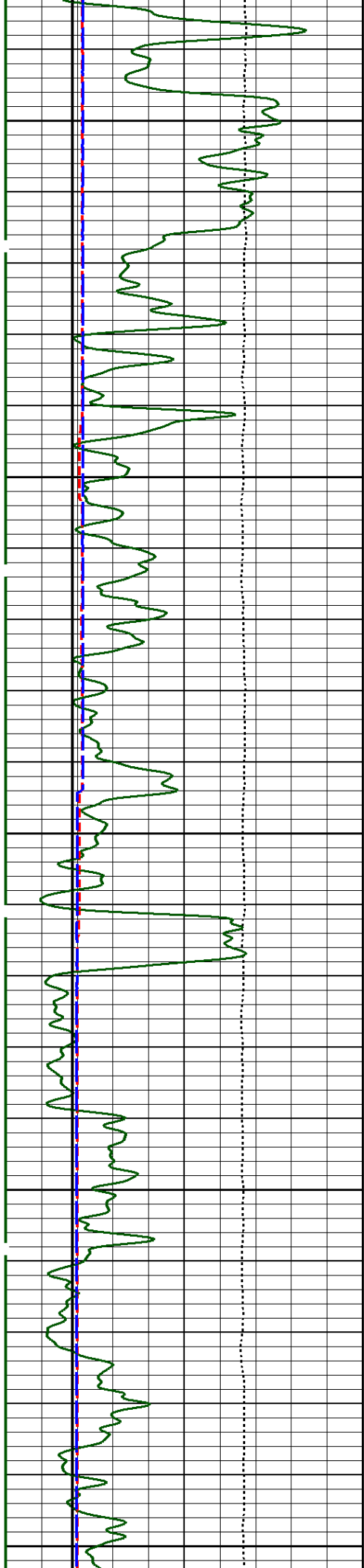




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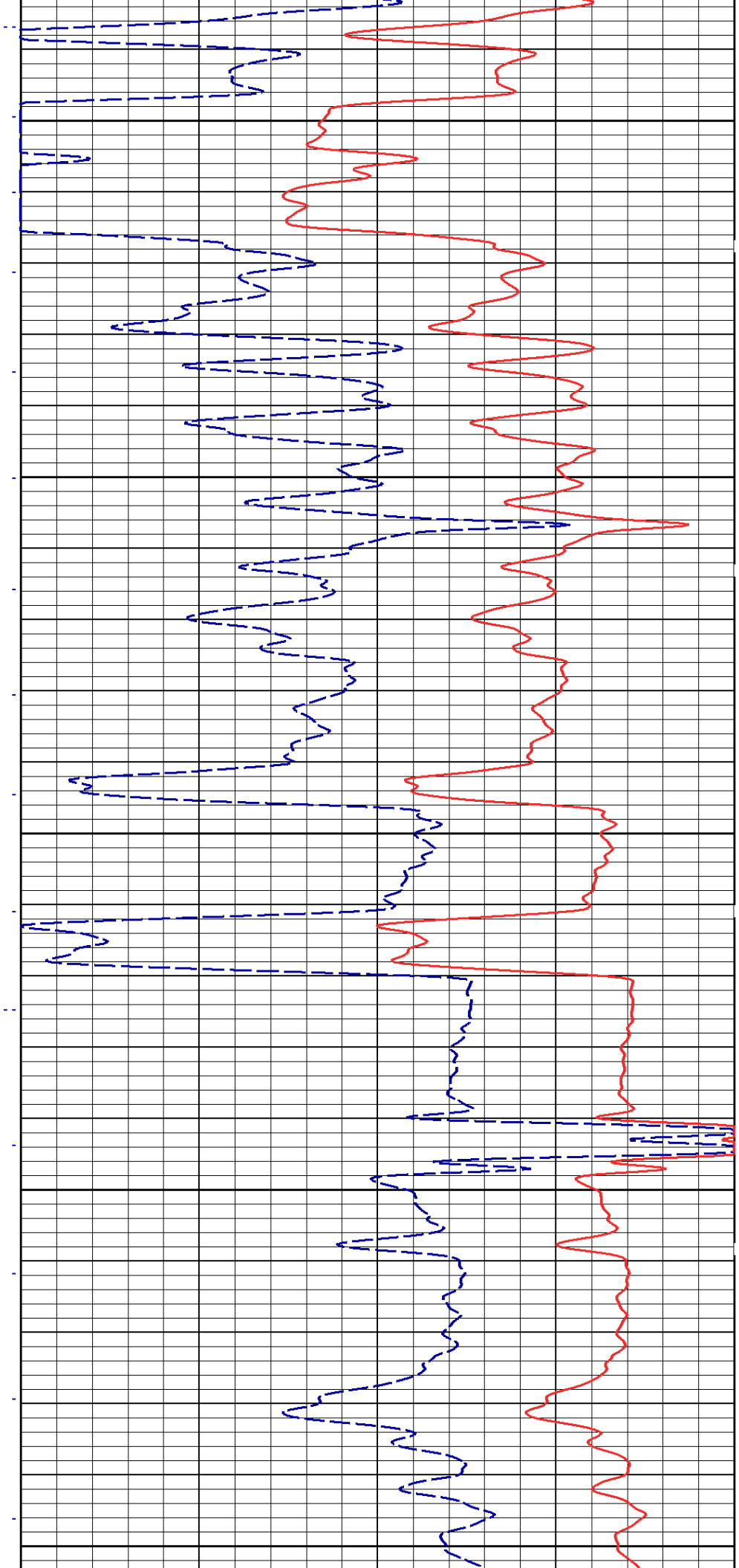
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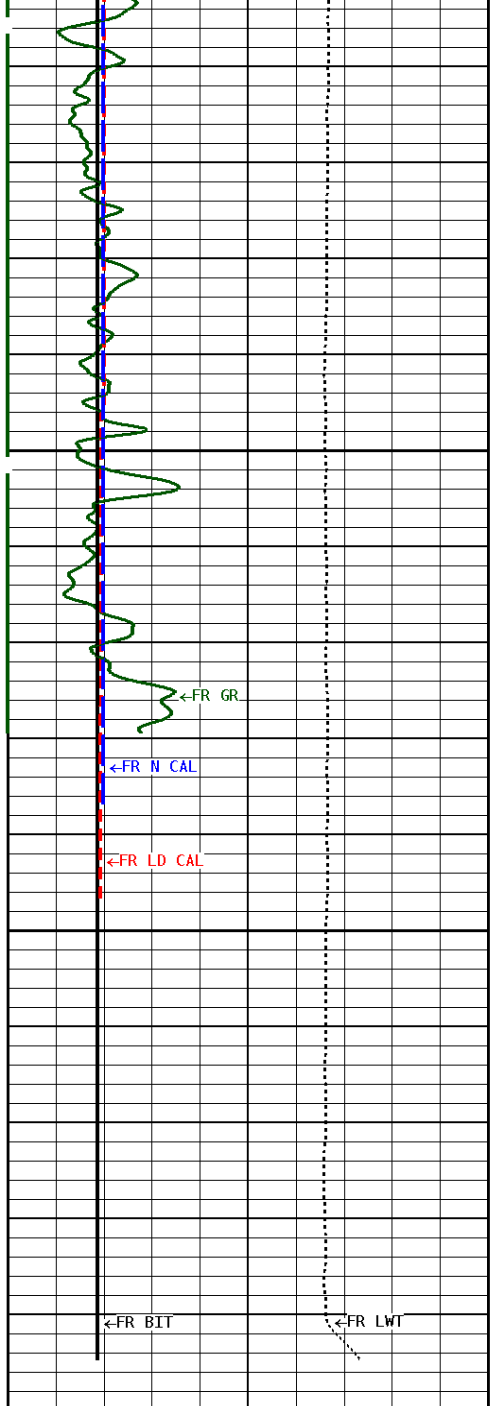




5400

5500



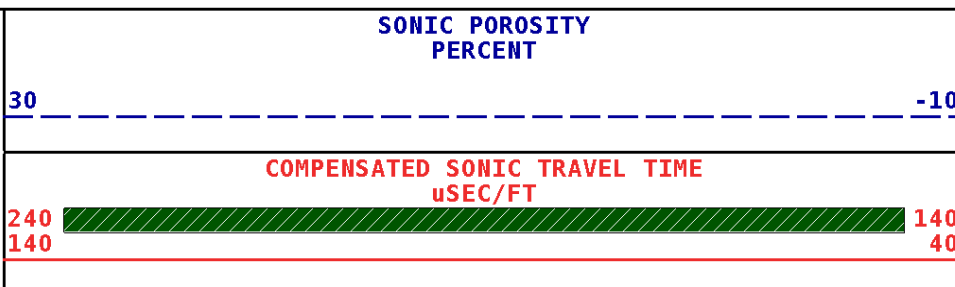
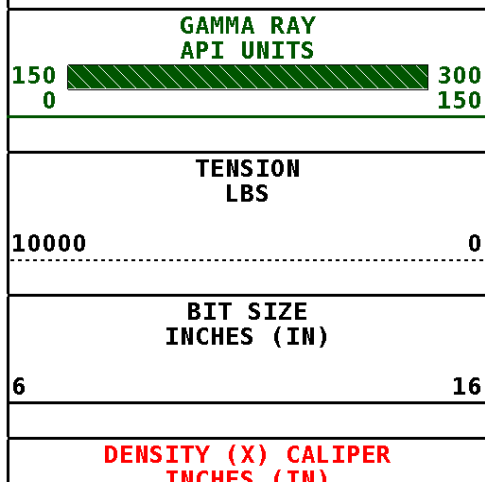
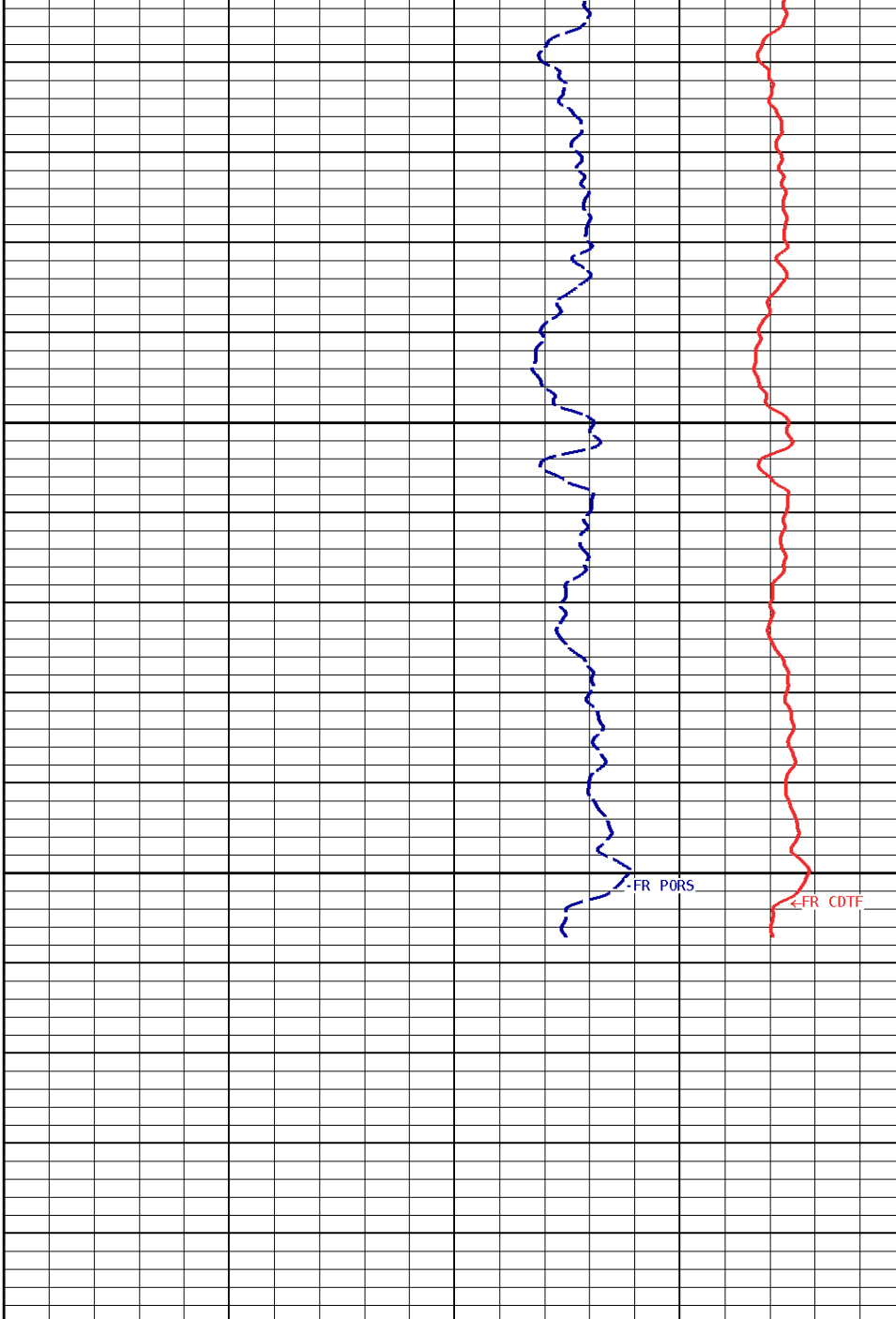


5600

5691

File #1.1.6

1:240 REPEAT SECTION



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

*** Borehole Zone Factors ***

Zone 1	99999.0	to	0.0	Feet
Matrix Transit Time			47.5	us/ft
Fluid Transit Time			189.0	us/ft

*** Calibration Summary ***

Shop Calibration					
GRT-B					
Performed : 24-JUN-2019			Time : 12:20		
Sensor Suite : GR-GR5			ID : GRT-BC-038		
	Measured	Units	Calibrated	Units	
	Background	Jig	Jig		
GR	36	266	160	GRAPI	
CPS					

Shop Calibration					
CST-AD					
Performed : 26-OCT-2019			Time : 16:03		
Sensor Suite : SON-ANA			ID : CST-AB-24		
Transit Time					
T/R Pair	Measured		Calibrated	Units	
T1R1	208.5		208.5	uS	
T2R2	208.5		208.5	uS	
T1R2	322.5		322.5	uS	
T2R1	322.5		322.5	uS	
Amplitude					
T/R Pair	Measured		Calibrated	Units	
T1R1	90.00		90.00	mV	
T2R2	90.00		90.00	mV	
T1R2	78.00		78.00	mV	
T2R1	78.00		78.00	mV	