



Pioneer Energy Services

Dual Induction Log

API No.

15-101-22399-00-00

Company Larson Engineering, Inc.

Well SS #2-10

Field Unnamed

County Lane State

Kansas

Location 1658' FSL & 2284' FEL

Sec: 10

Twp: 19S

Rge: 29W

Elevation

Permanent Datum Ground Level Elevation 2819

Log Measured From Kelly Bushing 7 Ft. Above Perm. Datum

Drilling Measured From Kelly Bushing

Other Services
CNL/CDL
MEL

K.B. 2826
D.F. 2819
G.L. 2819

Date 9/12/2012

Run Number One

Depth Driller 4646

Depth Logger 4647

Bottom Logged Interval 4646

Top Log Interval 250

Casing Driller 8.625 @ 261

Casing Logger 259

Bit Size 7.875

Type Fluid in Hole Chemical

Salinity, ppm CL 3600

Density / Viscosity 9.2 58

pH / Fluid Loss 10.5 7.2

Source of Sample Flowline

Rm @ Meas. Temp 0.85 @ 60

Rmf @ Meas. Temp 0.64 @ 60

Rmc @ Meas. Temp 1.15 @ 60

Source of Rmf / Rmc Charts

Rm @ BHT 0.41 @ 124

Operating Rig Time 4 Hours

Max Rec. Temp. F 124

Equipment Number 91

Location Hays

Recorded By D. Schmidt

Witnessed By Vern Schrag

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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

Thank you for using Log-Tech, Inc.
(785) 625-3858

Dighton,
2 South to Rd 130, 2 West to Jagger Rd, 2 1/2 South,
West into

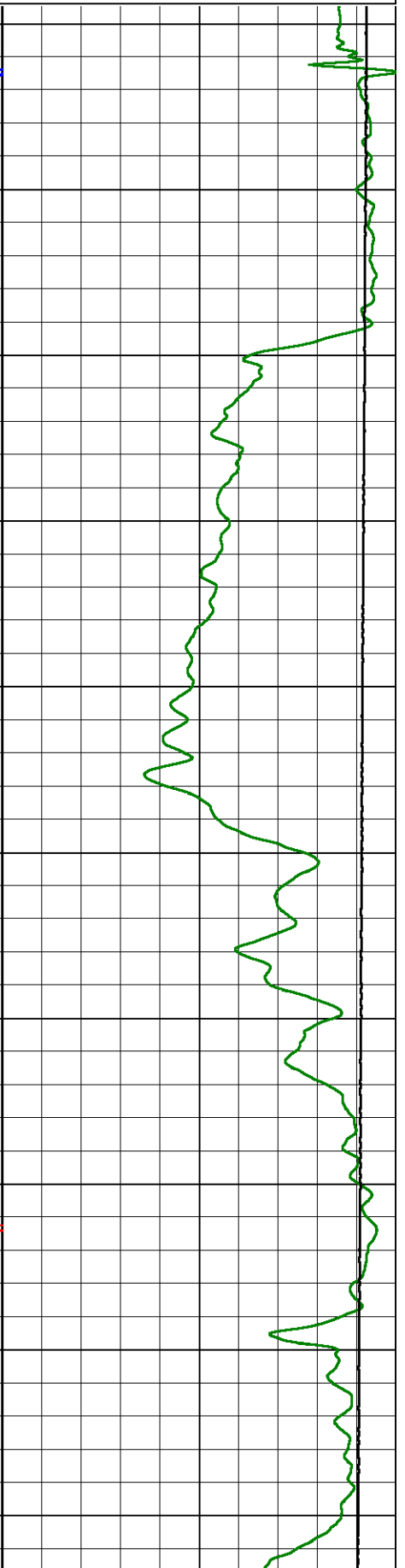
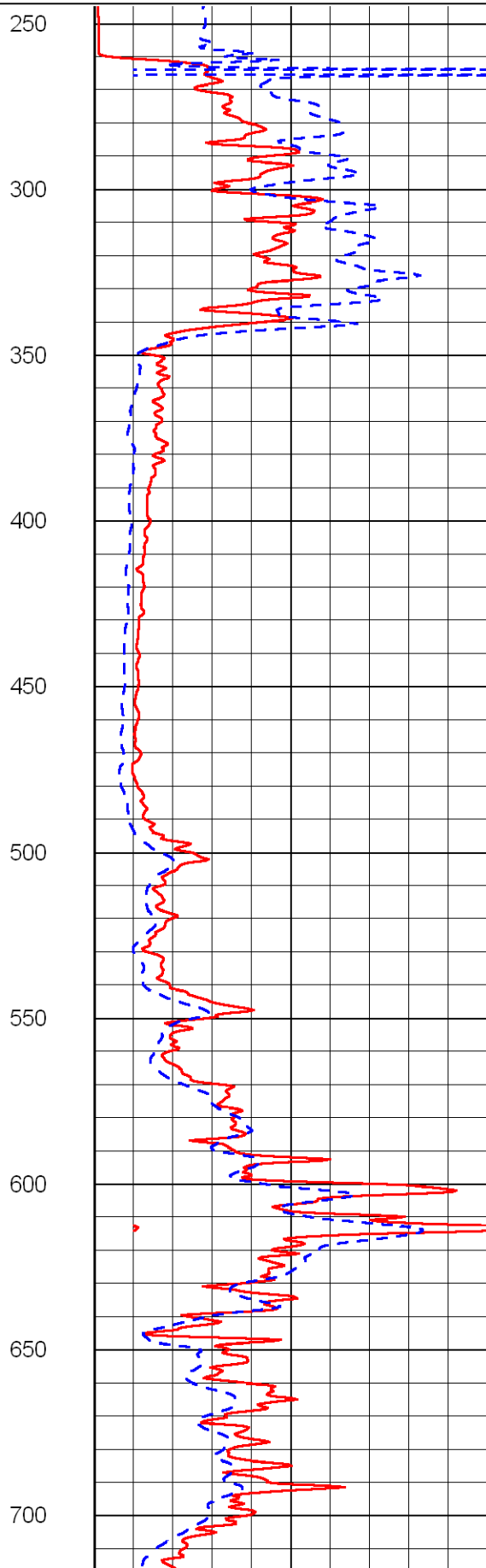
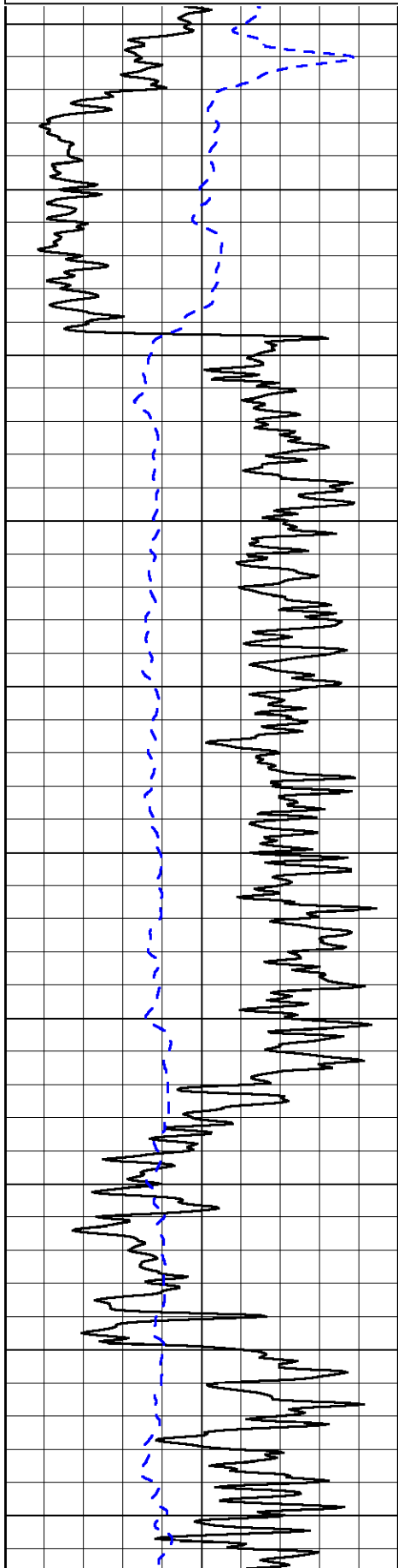
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Dataset Creation: Wed Sep 12 22:11:32 2012
Charted by: Depth in Feet scaled 1:600

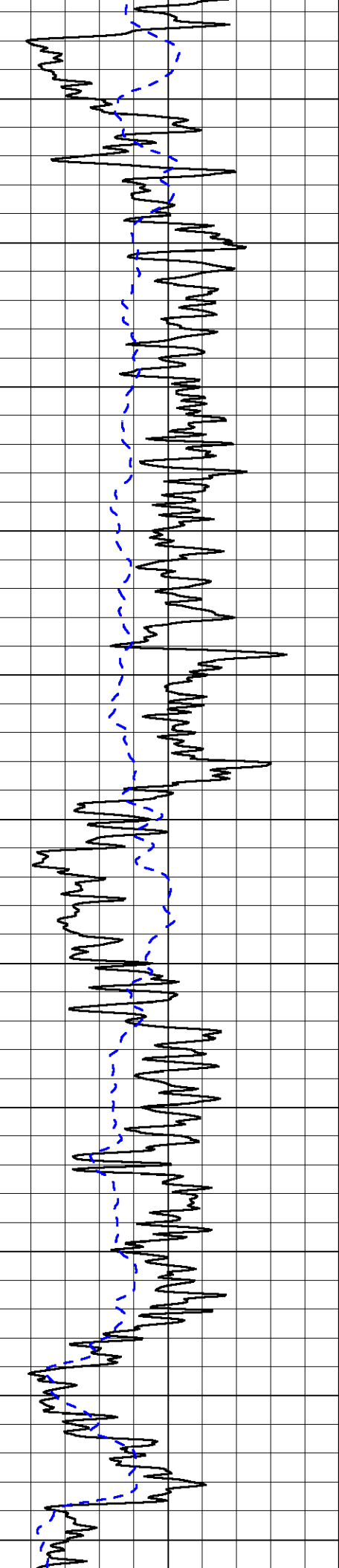
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-200	SP	0

0	Shallow Resistivity	50
0	Deep Resistivity	50

1000	Conductivity	0
15000	Line Tension	0

50	Shallow Resistivity	500
50	Deep Resistivity	500





750

800

850

900

950

1000

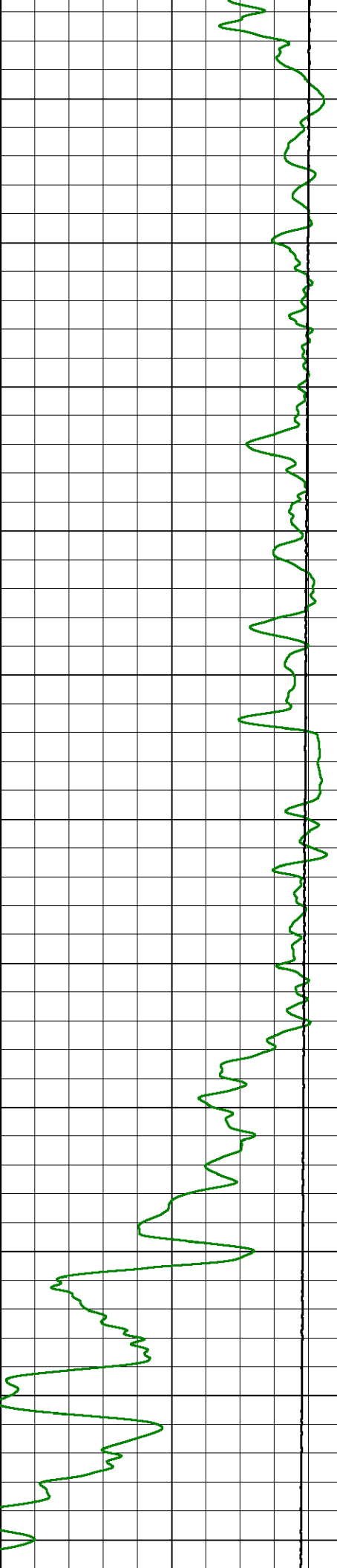
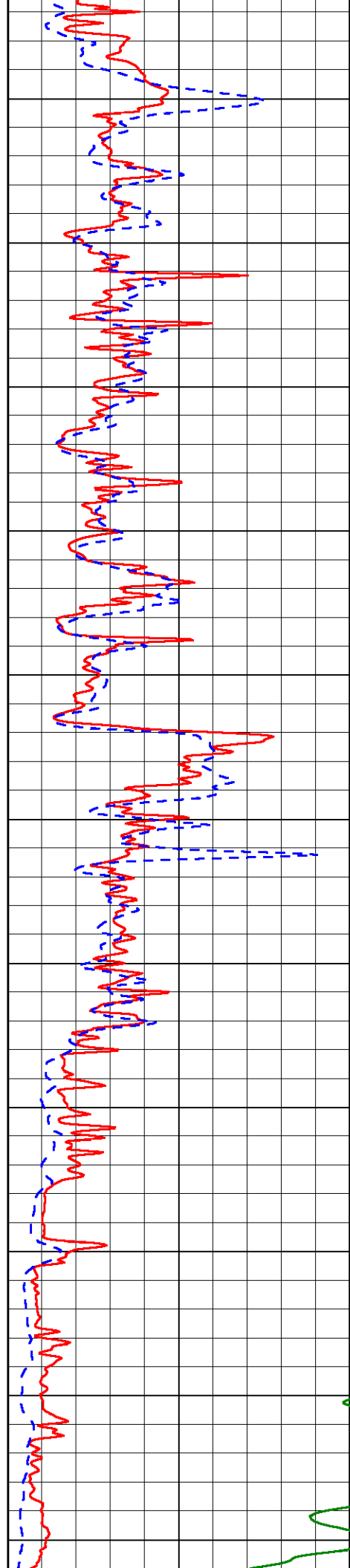
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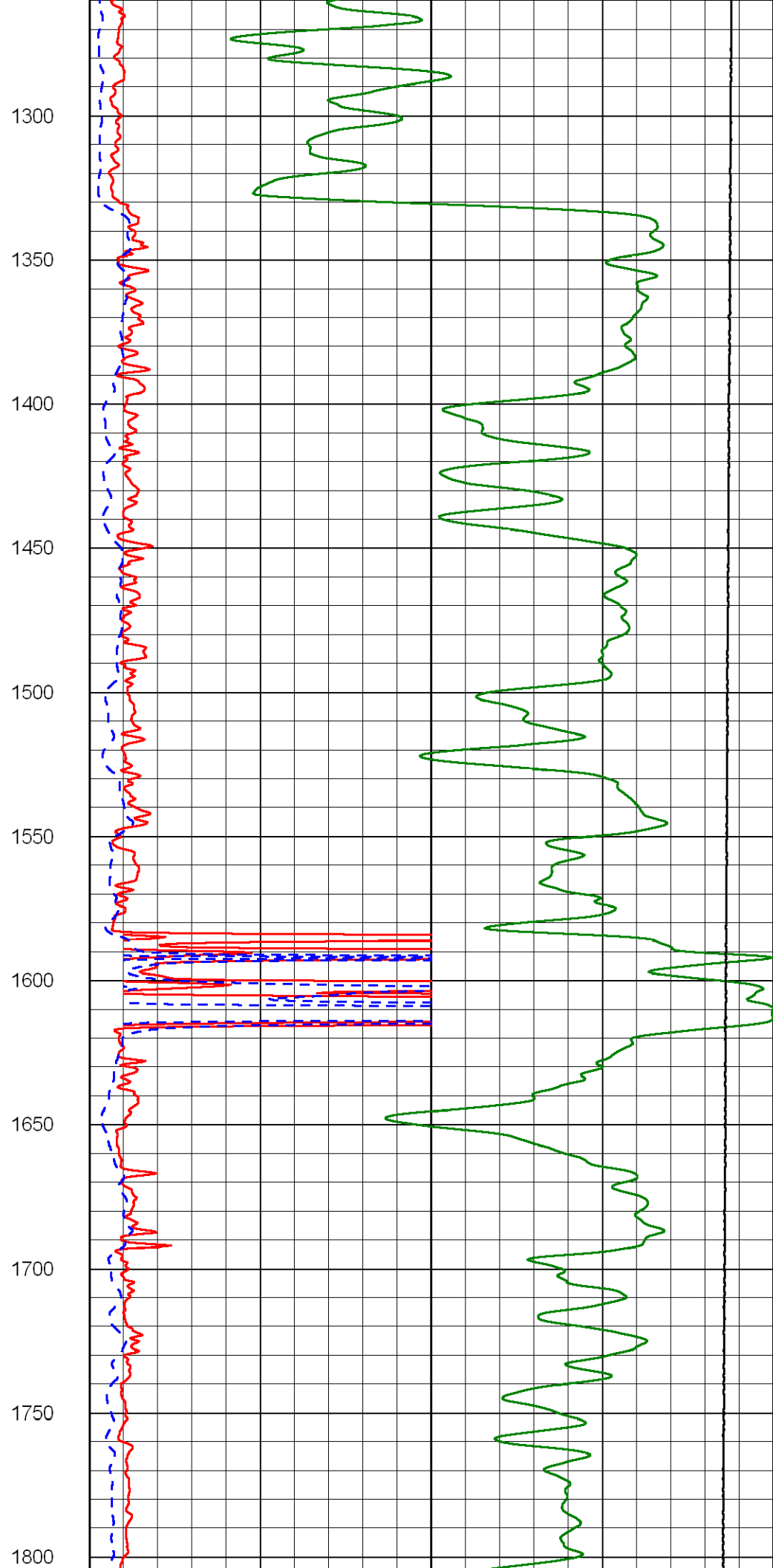
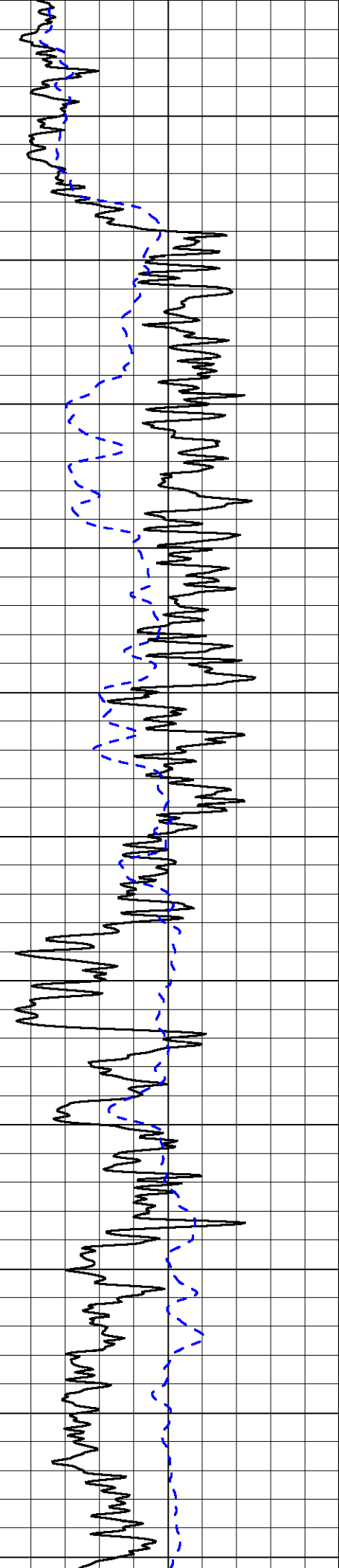
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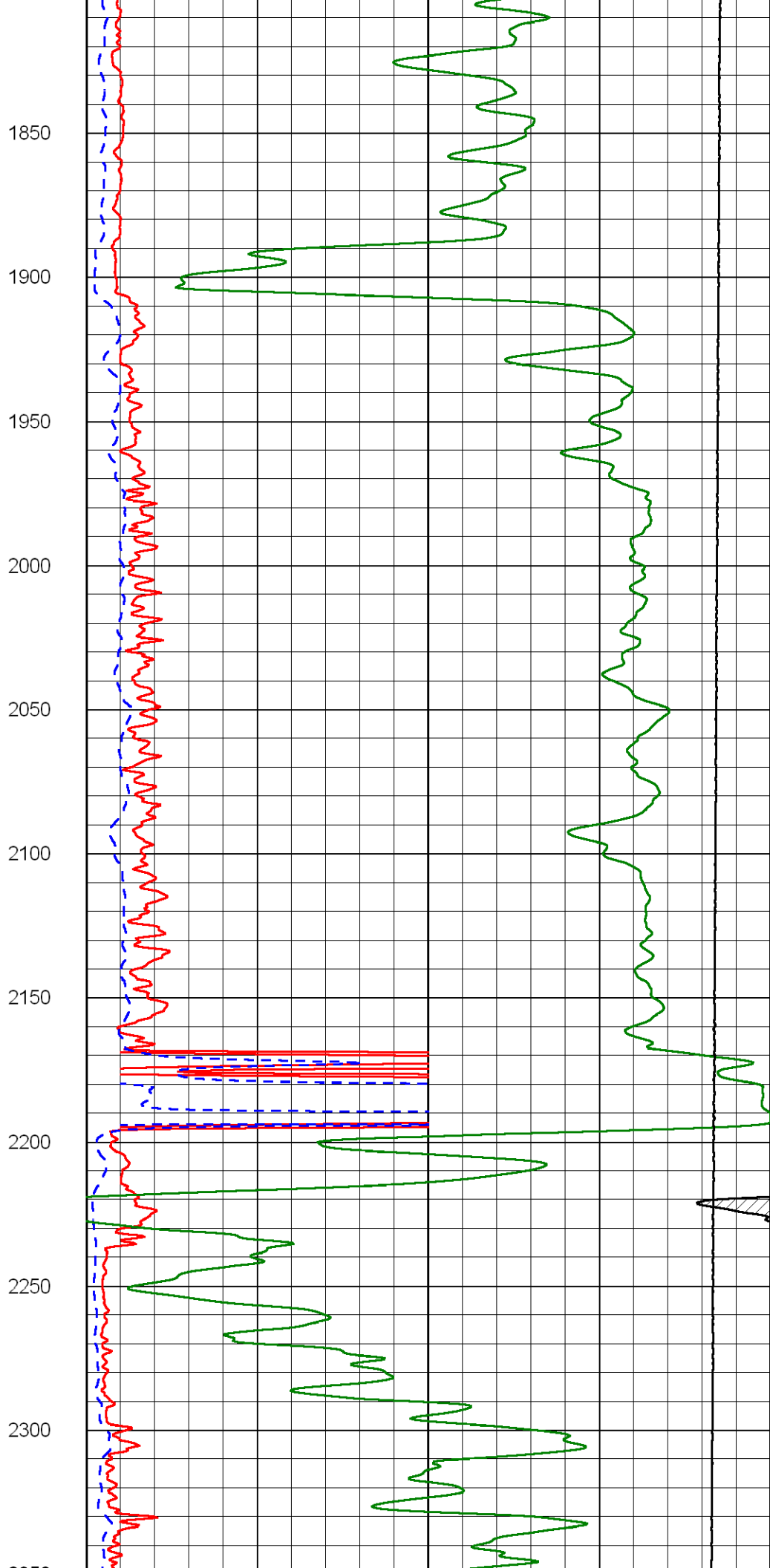
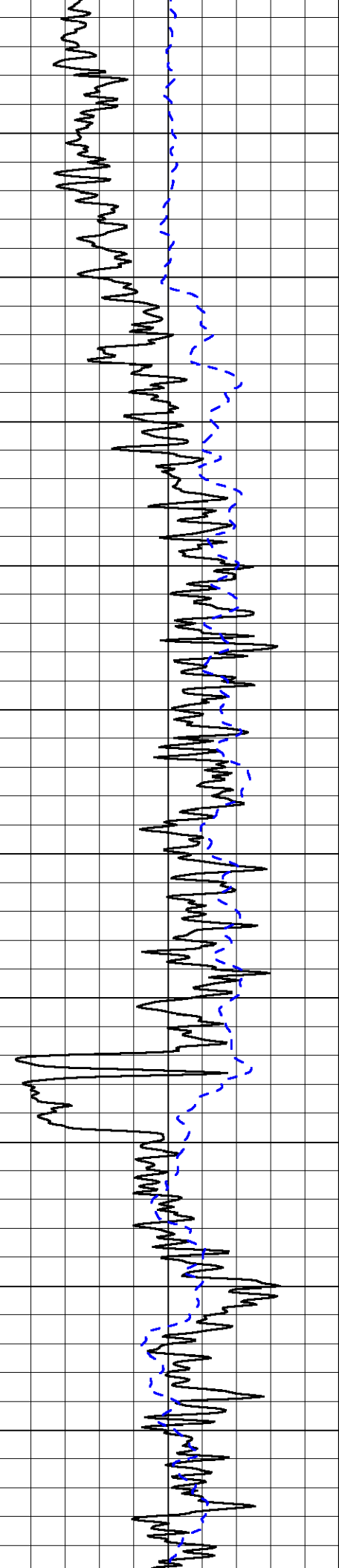
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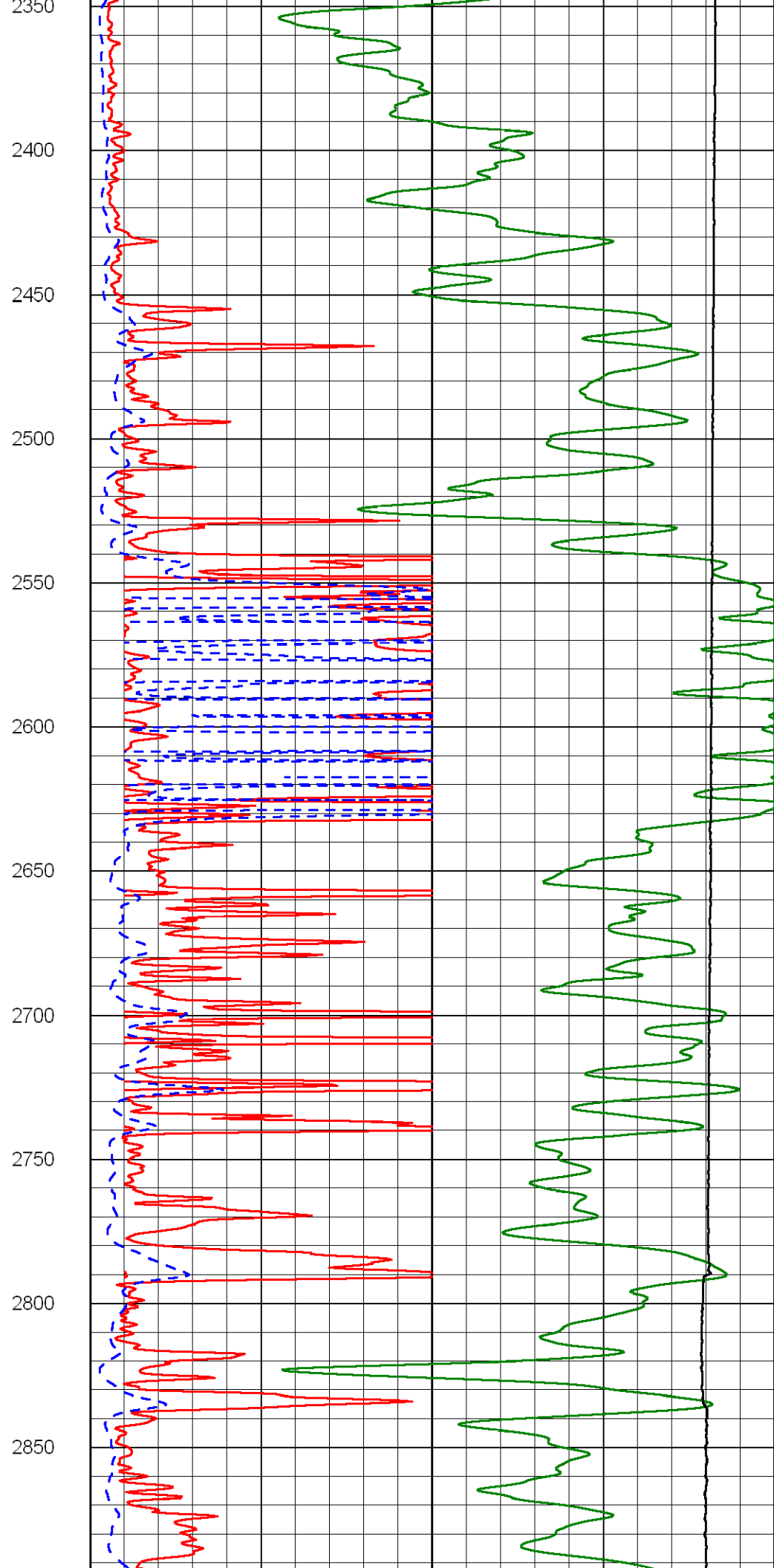
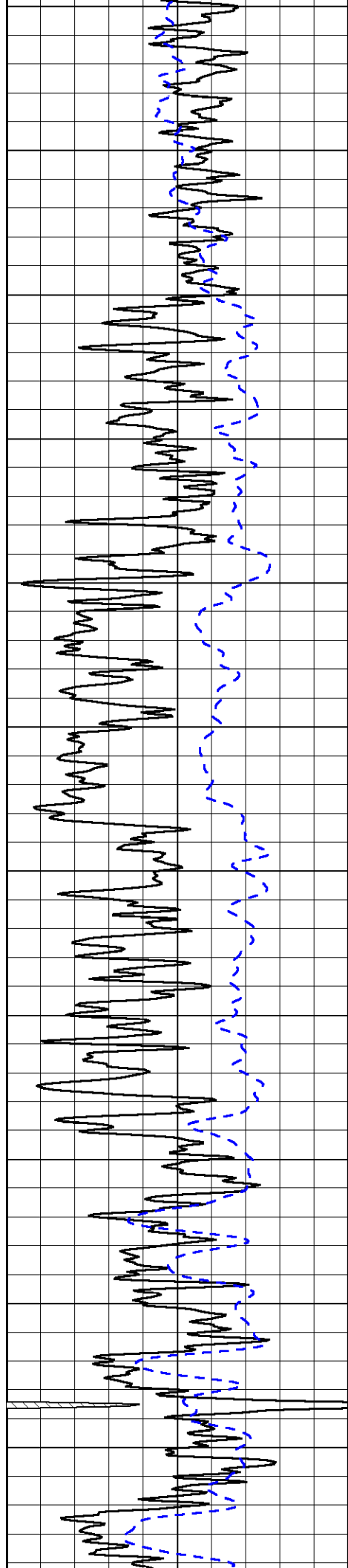
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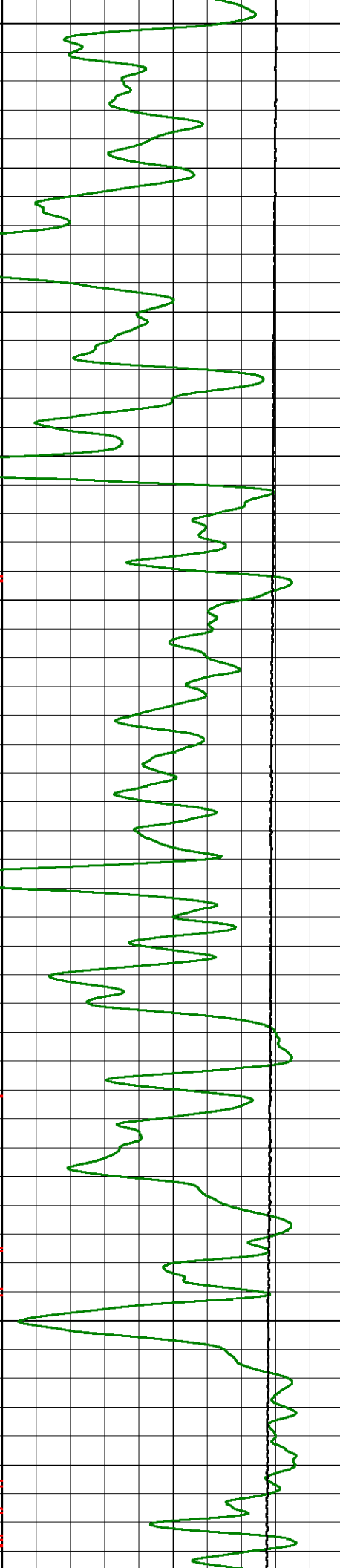
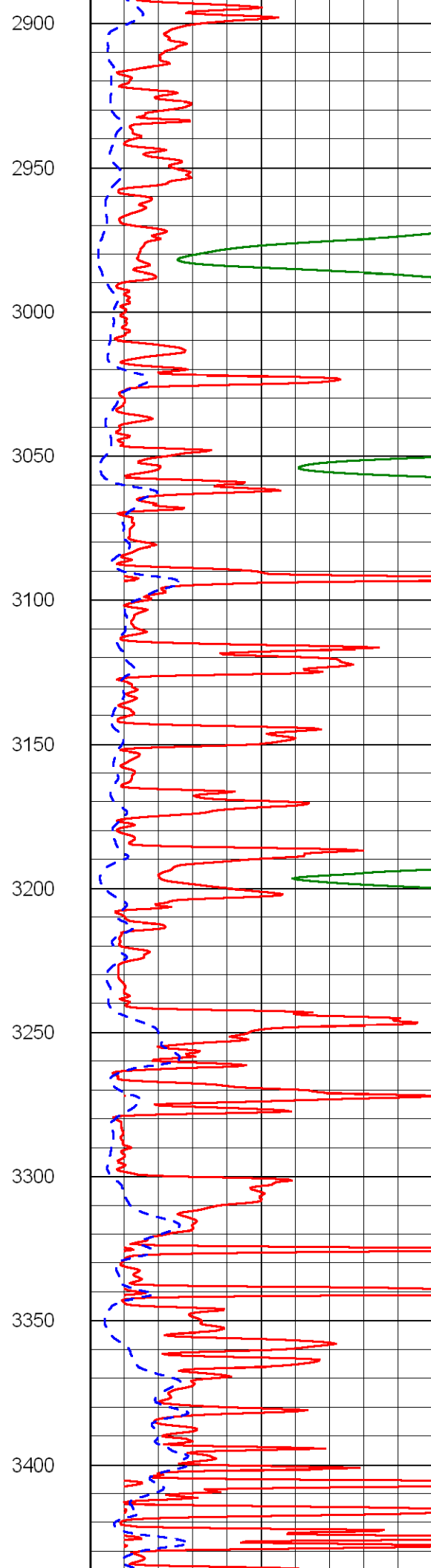
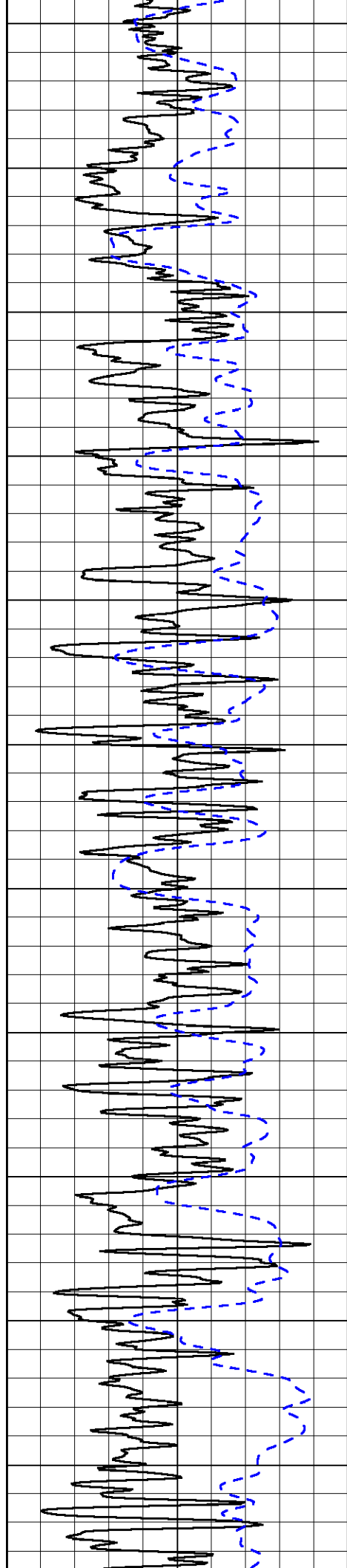
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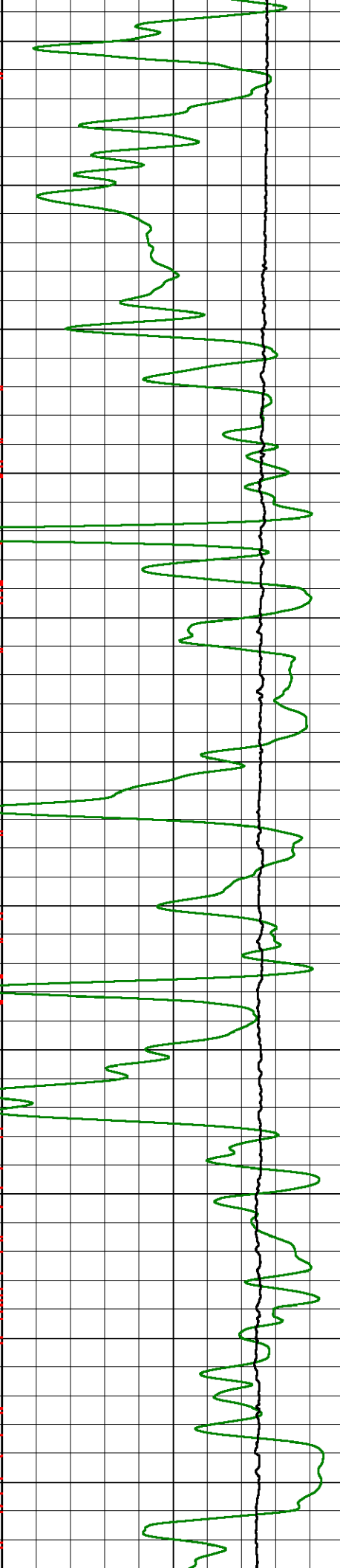
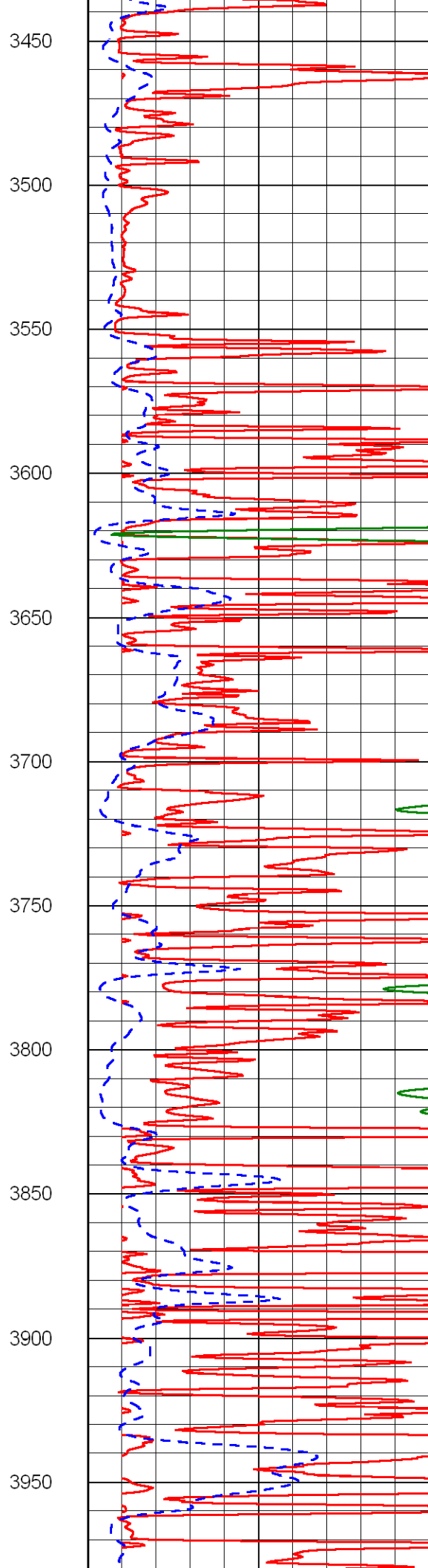
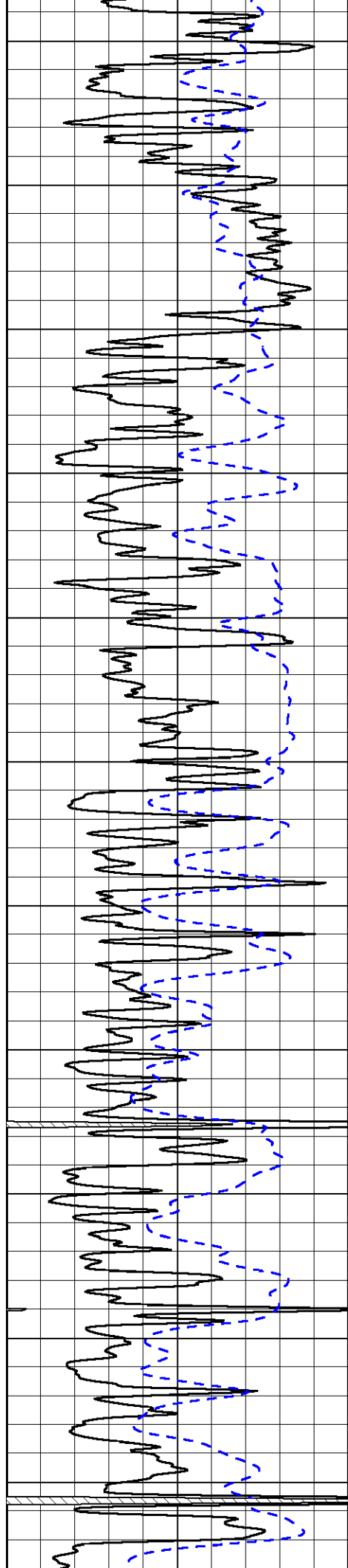


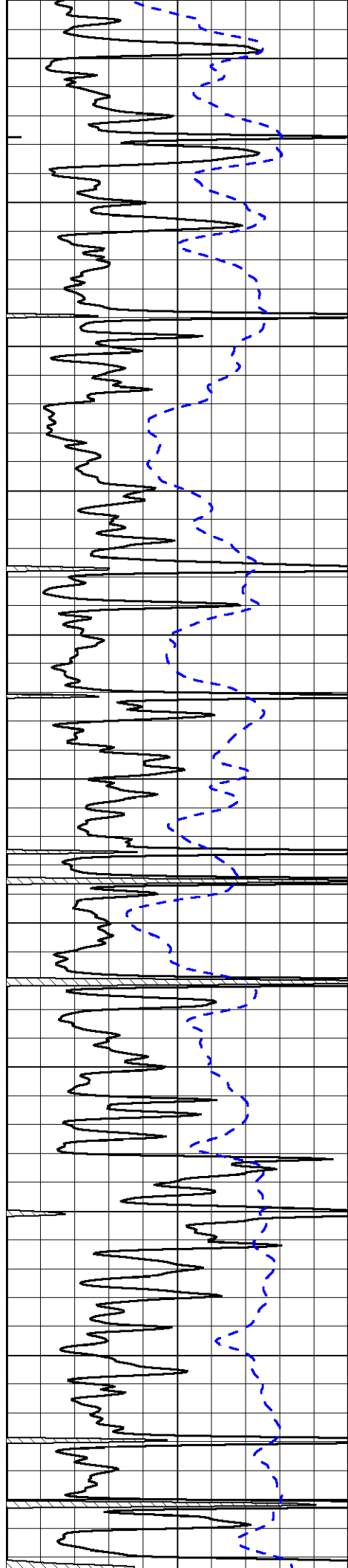












4000

4050

4100

4150

4200

4250

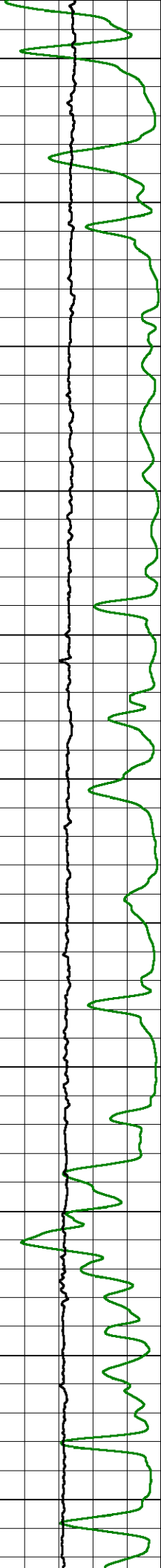
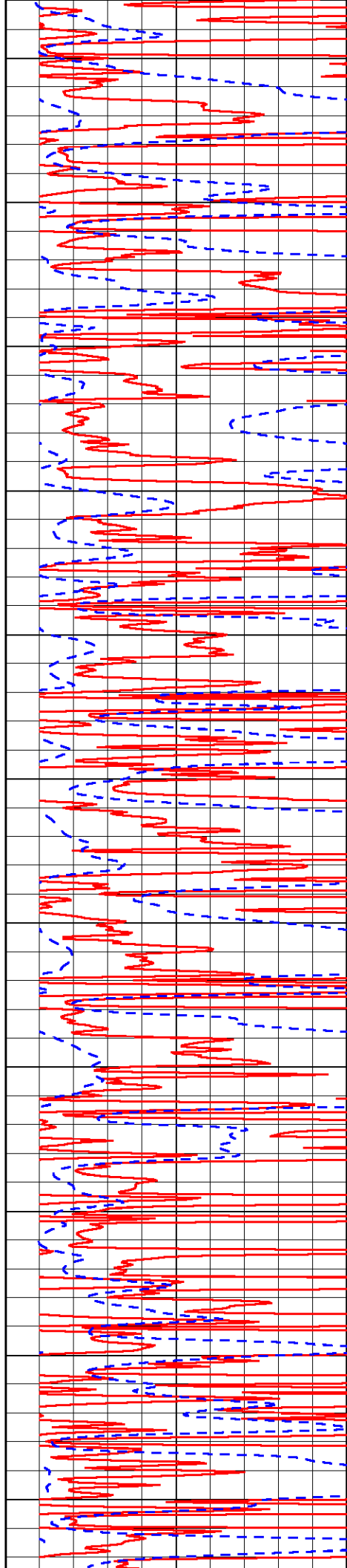
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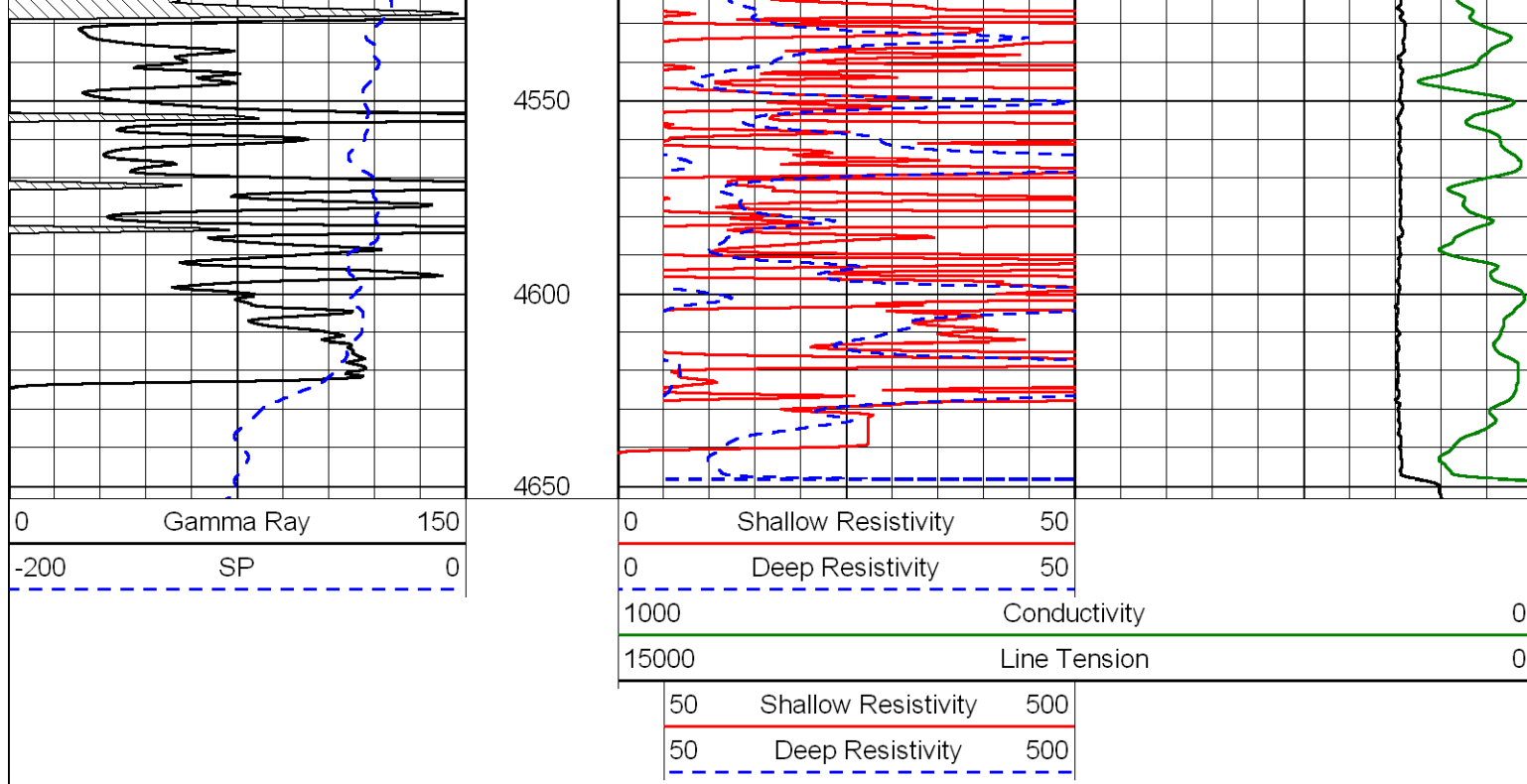
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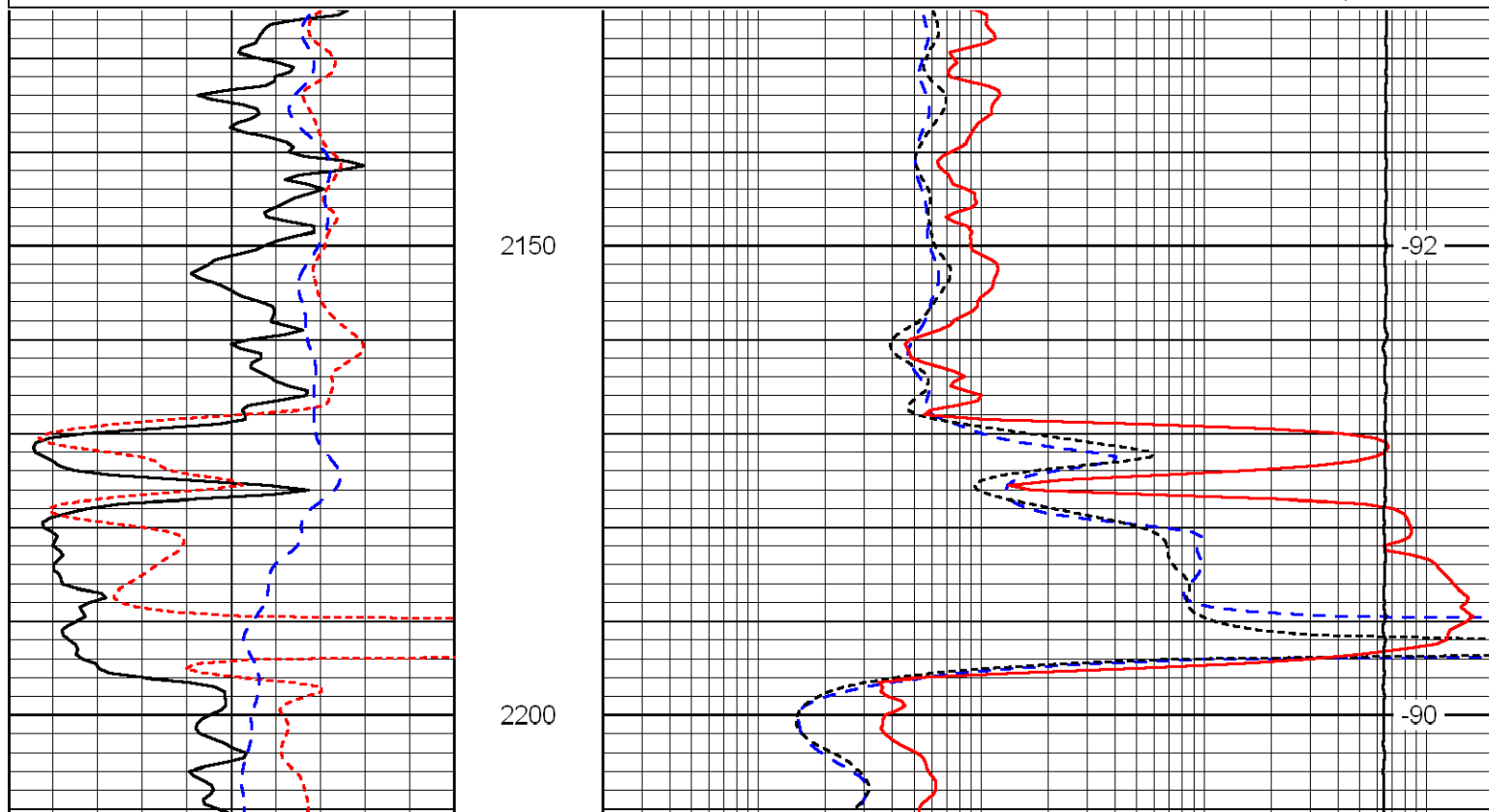
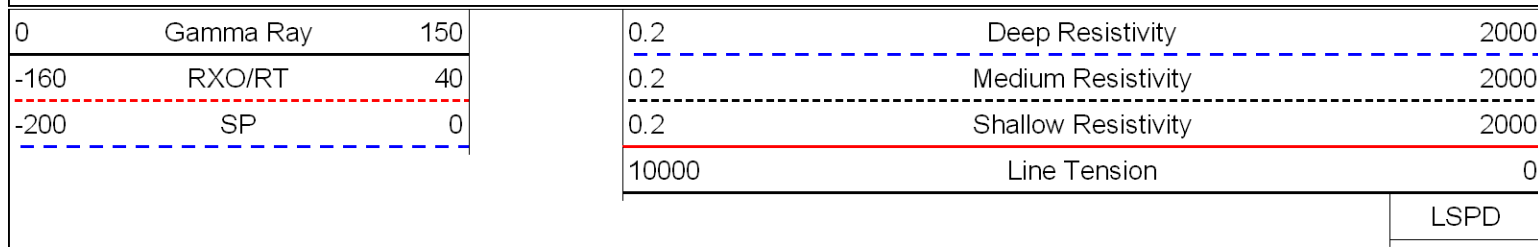
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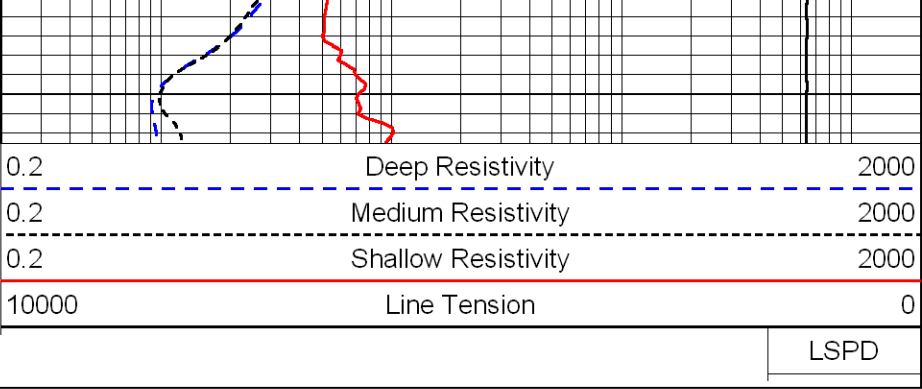
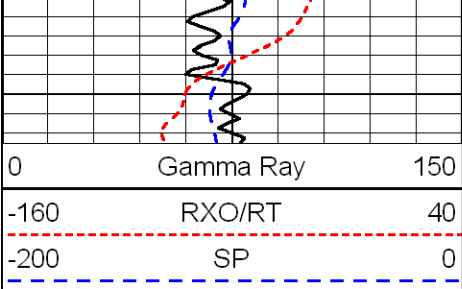
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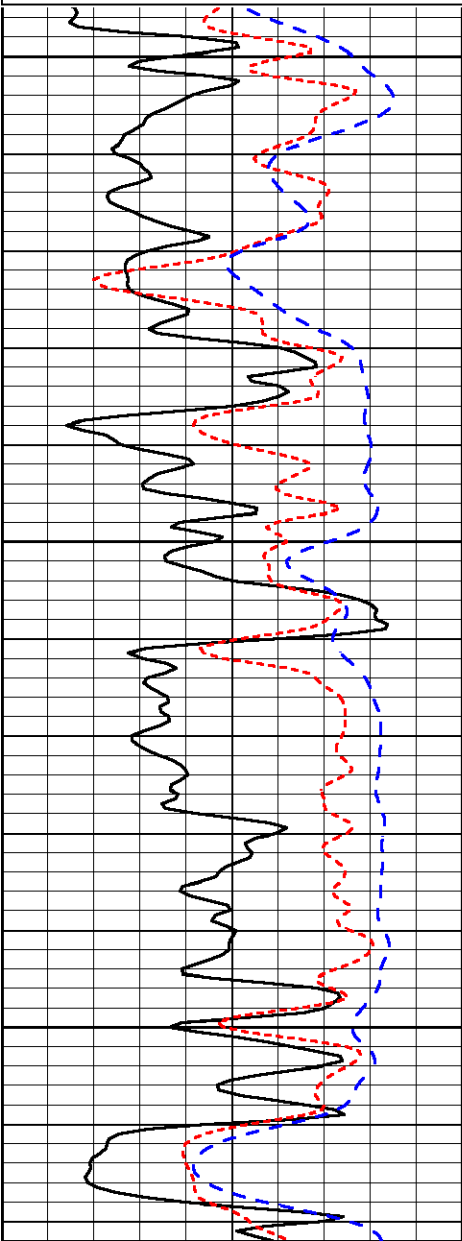
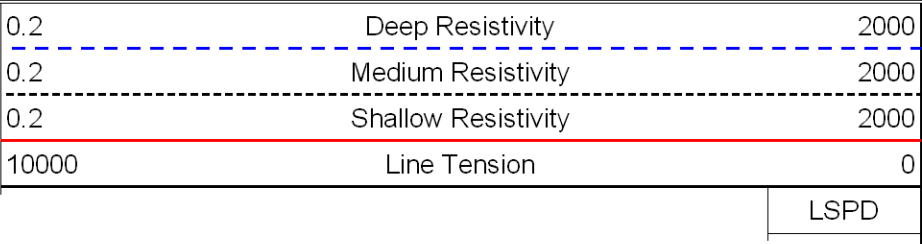
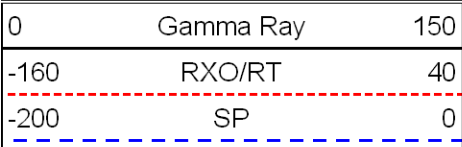


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Dataset Creation: Wed Sep 12 22:11:32 2012
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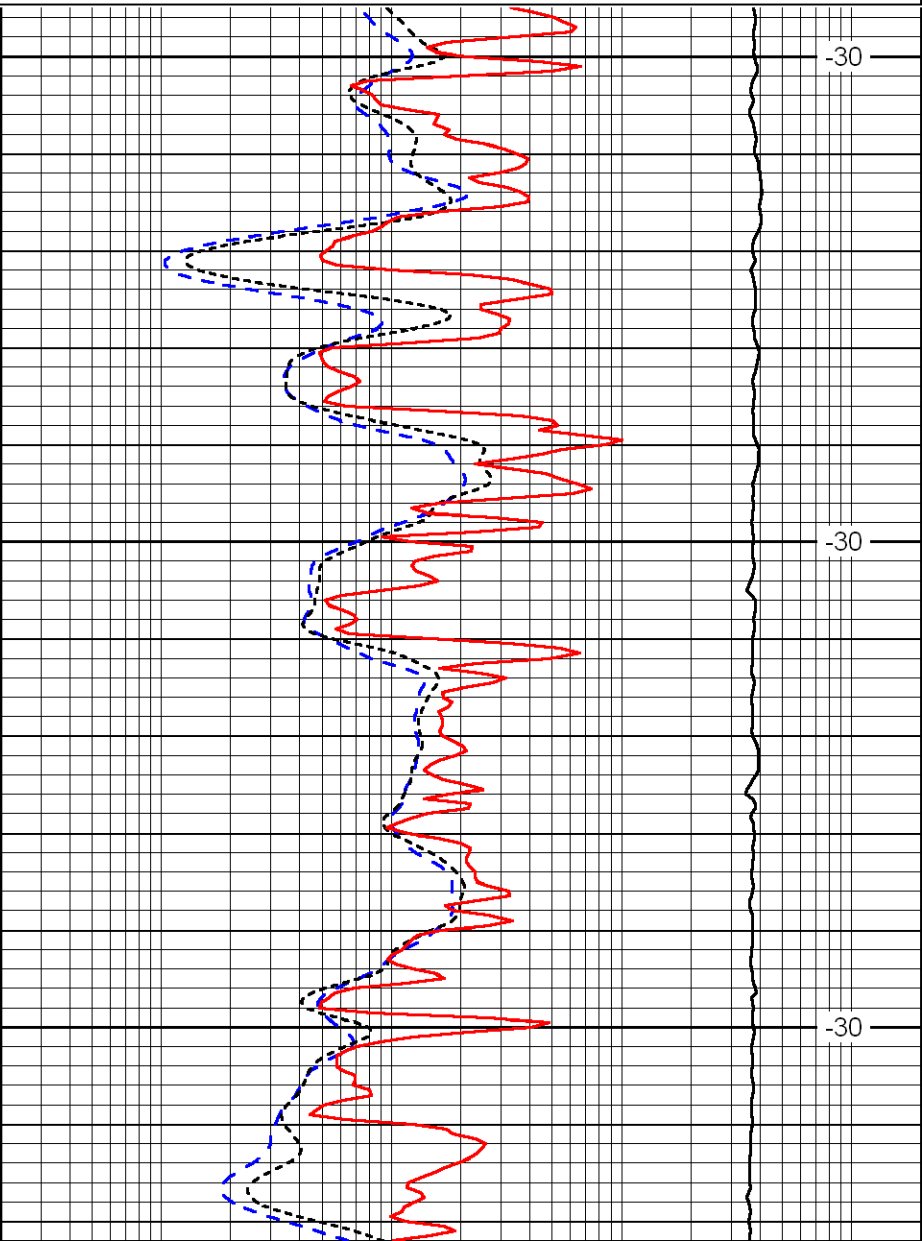
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3600

3650

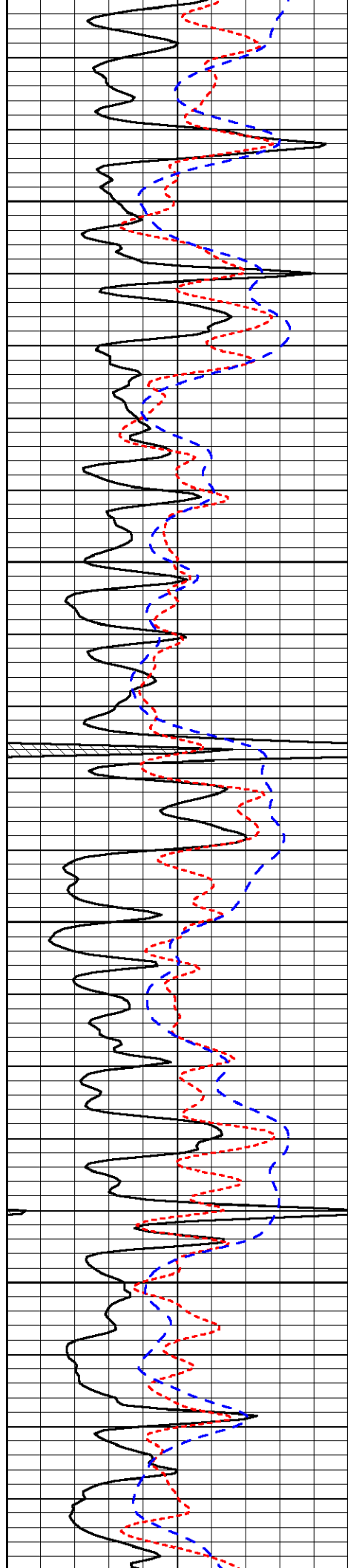
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-30

-30

-30

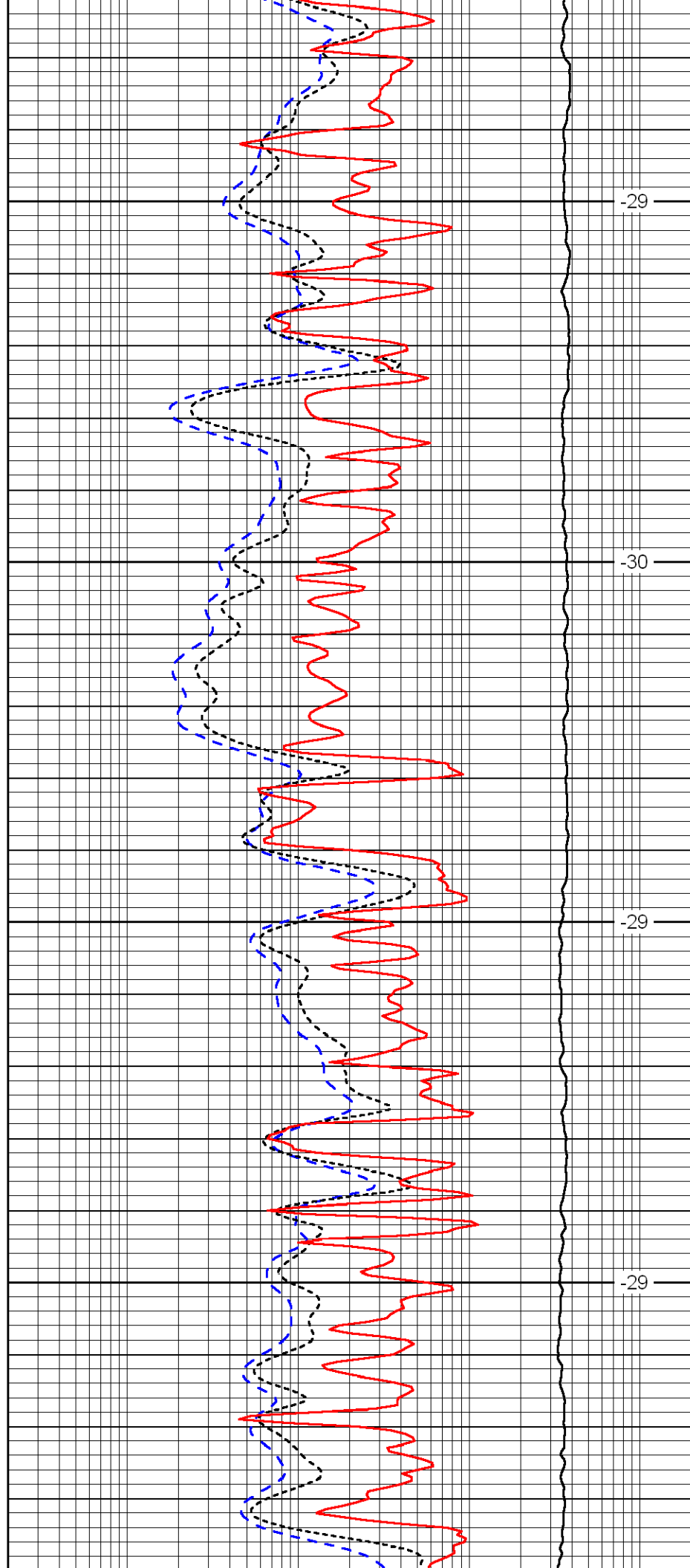


3750

3800

3850

3900

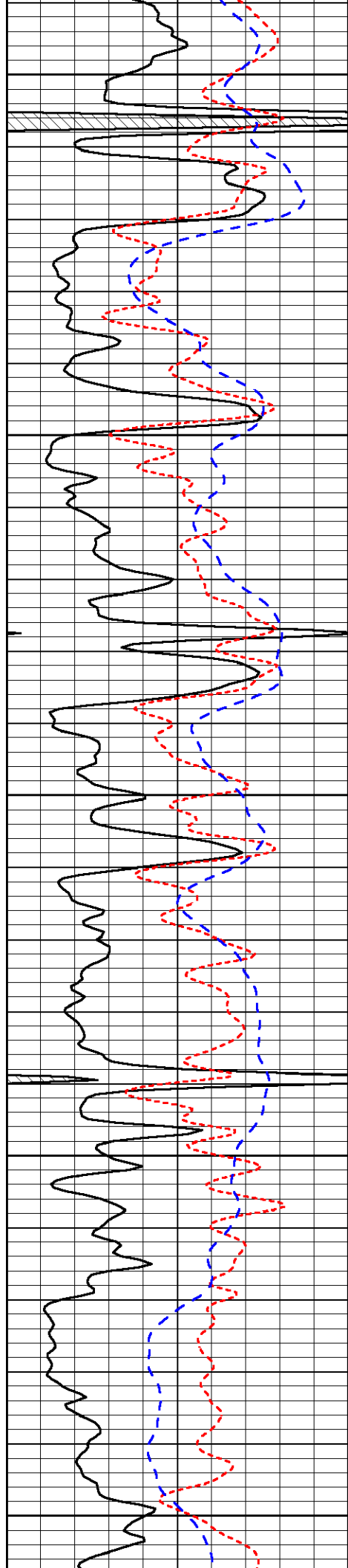


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-30

-29

-29



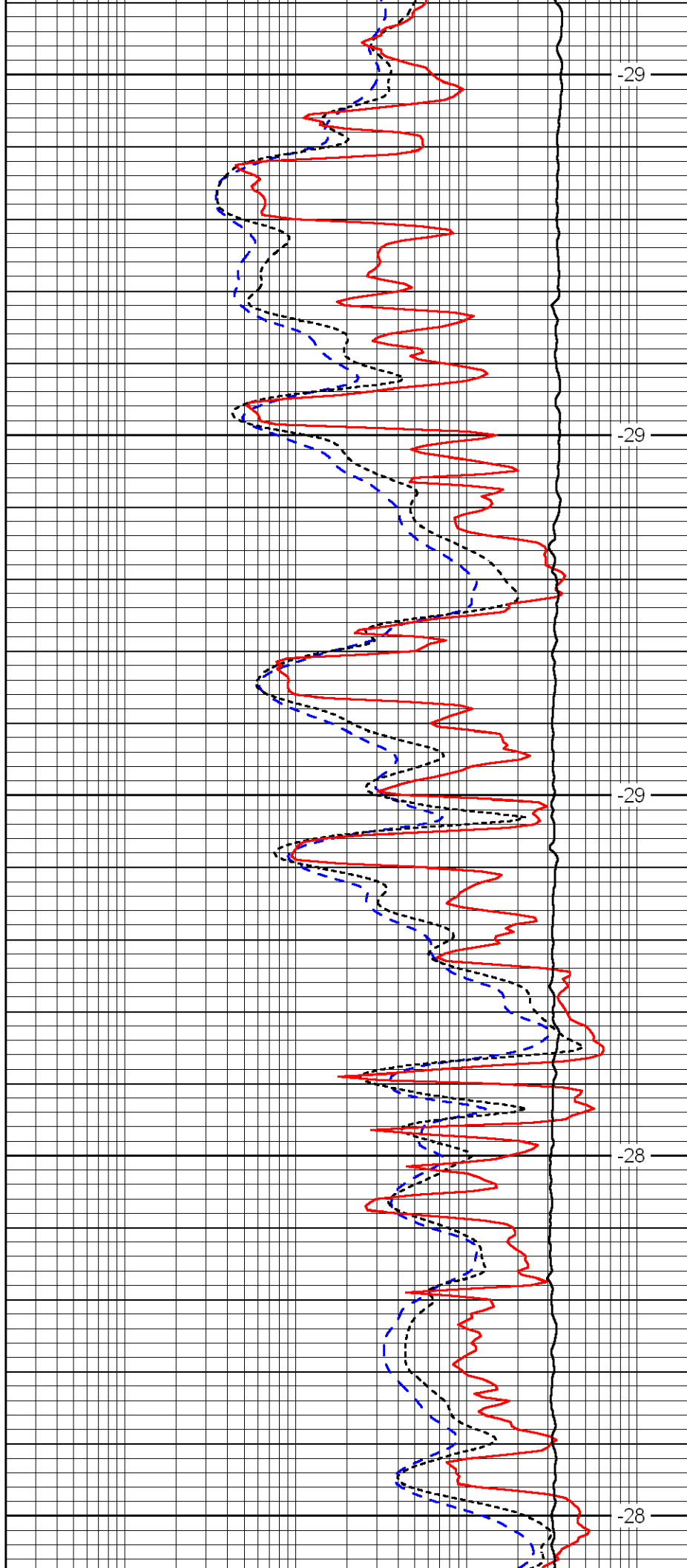
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4000

4050

4100

4150



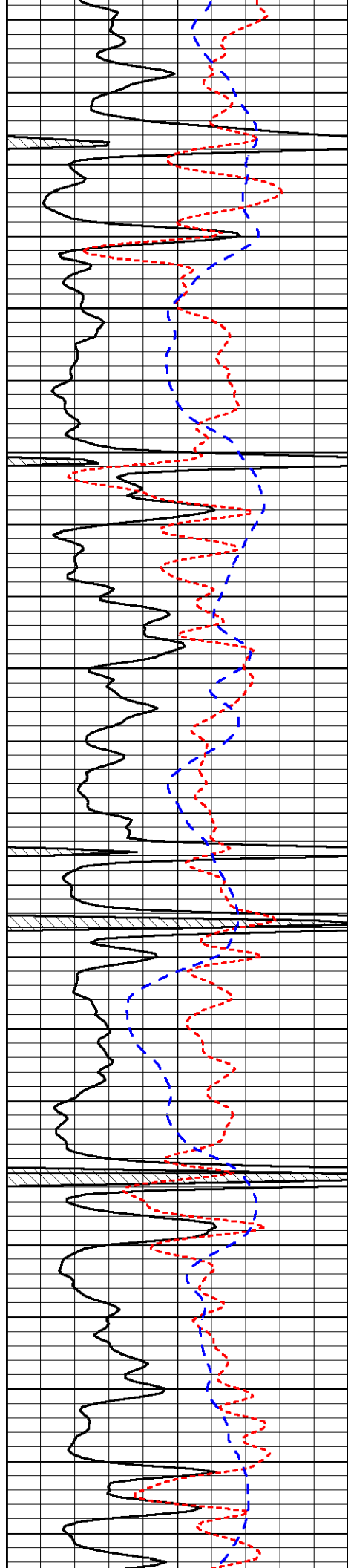
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-29

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-28

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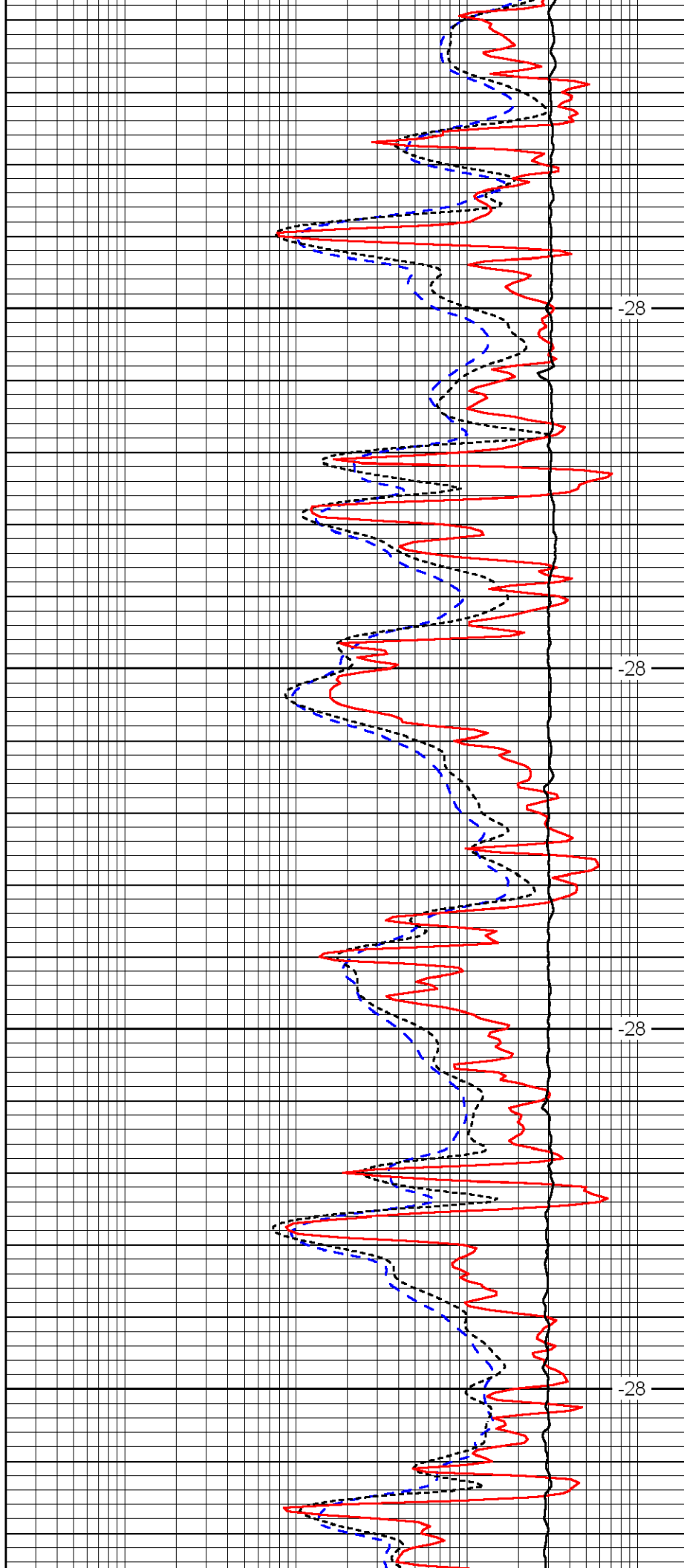


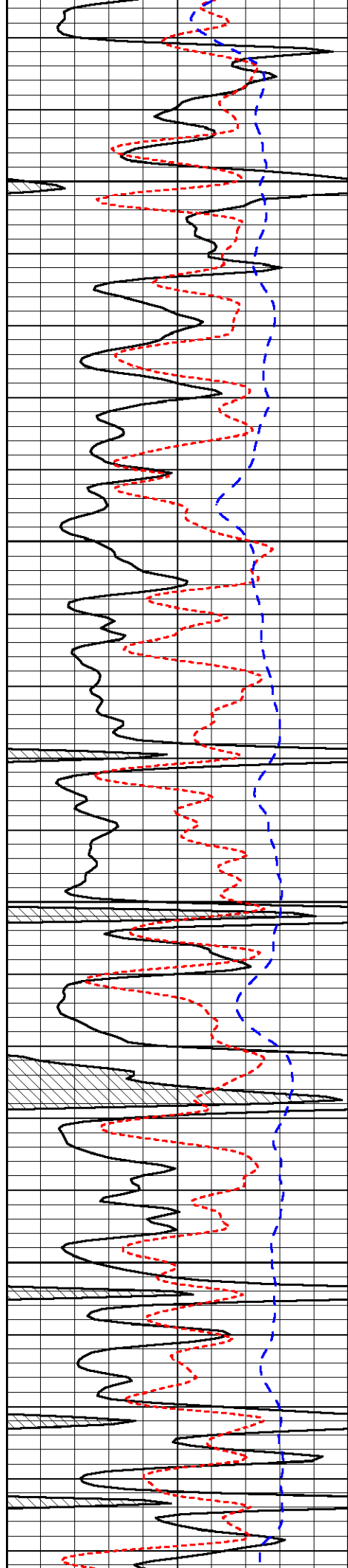
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4250

4300

4350



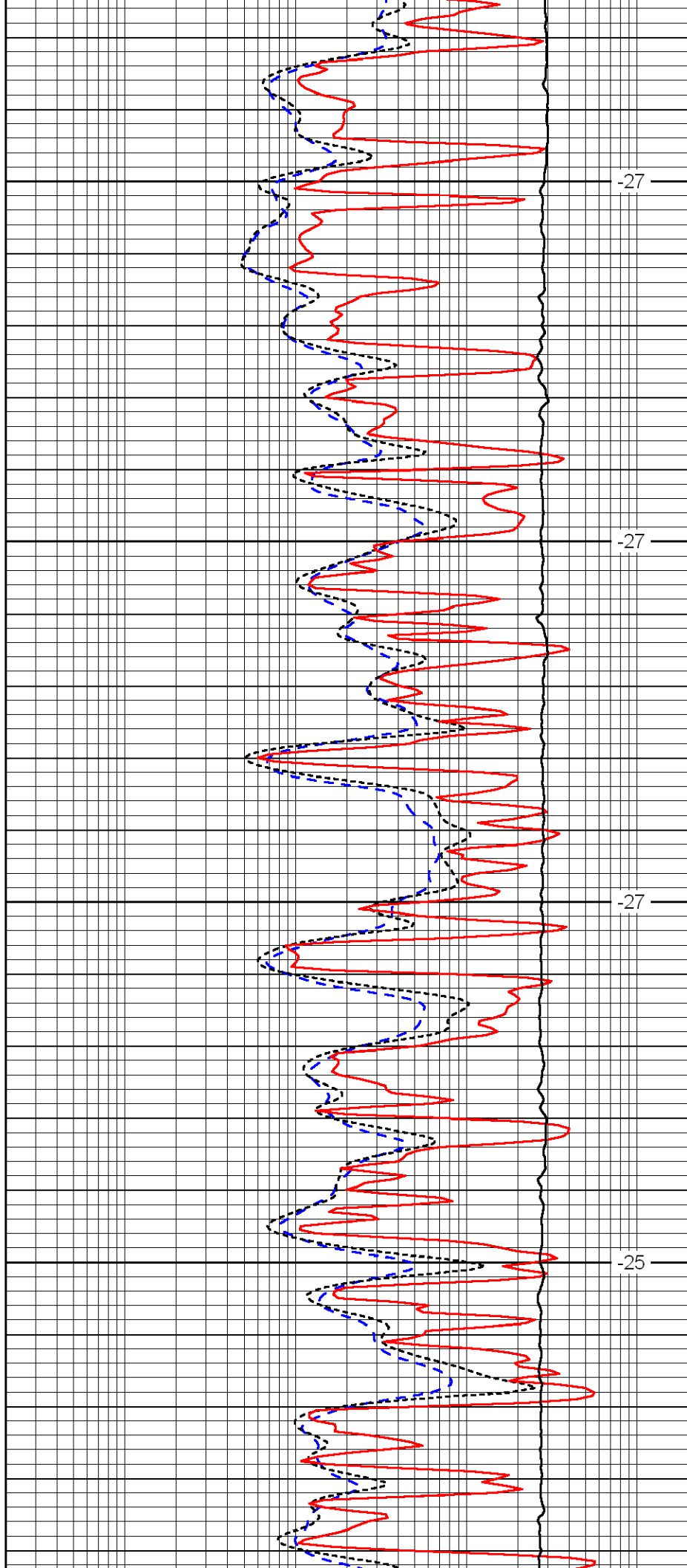


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4450

4500

4550

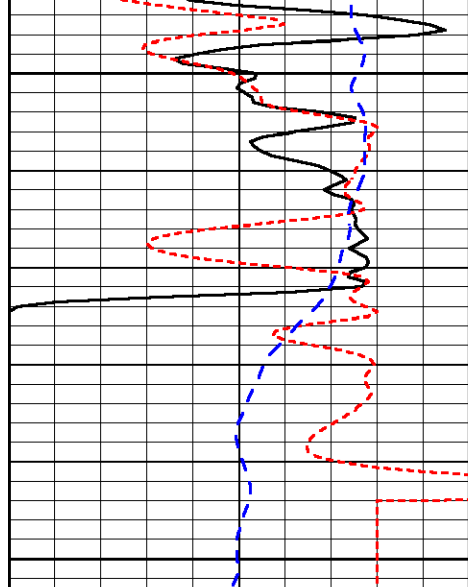


-27

-27

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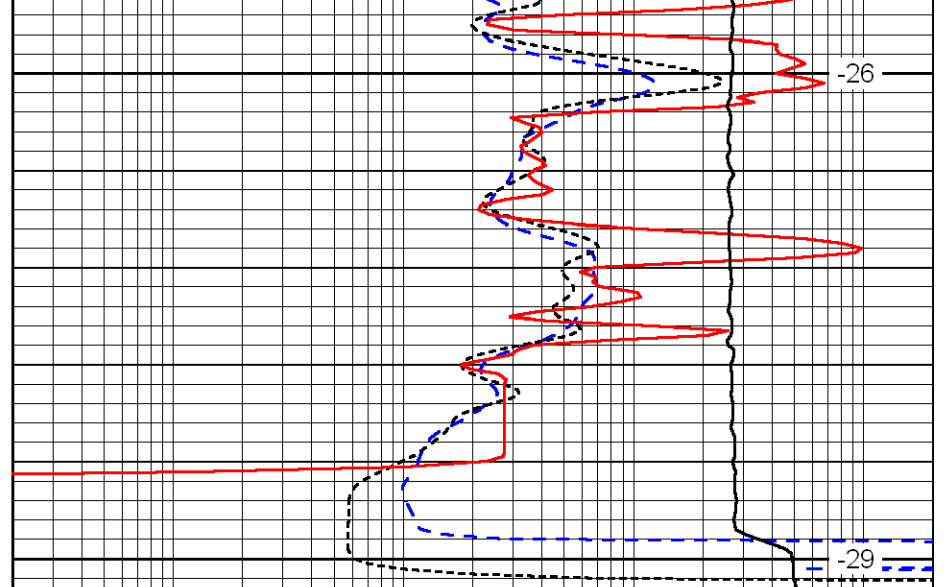
-25



0	Gamma Ray	150
-160	RXO/RT	40
-200	SP	0

4600

4650



0.2	Deep Resistivity	2000
0.2	Medium Resistivity	2000
0.2	Shallow Resistivity	2000
10000	Line Tension	0

LSPD