



Microresistivity Log

Pioneer Energy Services

API No.

15-185-23823-00-00

Company Vamco Operations

Well MGT A-1 #1

Field Dell East

County Stafford State

Kansas

Location 1590' FNL & 770' FEL

Sec: 8 Twp: 21S Rge: 13W

Other Services
CNL/CDL
DIL/BHCS

Permanent Datum Ground Level Elevation 1893

Log Measured From Kelly Bushing 9 Ft. Above Perm. Datum

Drilling Measured From Kelly Bushing Elevation
K.B. 1902
D.F. 1893
G.L. 1893

Date 8/28/2013

Run Number Two

Depth Driller 3650

Depth Logger 3650

Bottom Logged Interval 3649

Top Log Interval 3000

Casing Driller 8.625 @ 263

Casing Logger 264

Bit Size 7.875

Type Fluid in Hole Chemical

Salinity,ppm CL 12000

Density / Viscosity 9.3 56

pH / Fluid Loss 9.0 14.2

Source of Sample Flowline

Rm @ Meas. Temp 0.32 @ 88

Rmf @ Meas. Temp 0.24 @ 88

Rmc @ Meas. Temp 0.43 @ 88

Source of Rmf / Rmc Charts

Rm @ BHT 0.25 @ 115

Operating Rig Time 5 Hours

Max Rec. Temp. F 115

Equipment Number 91

Location Hays

Recorded By D. Schmidt

Witnessed By Jeff Burk

Eli Felts

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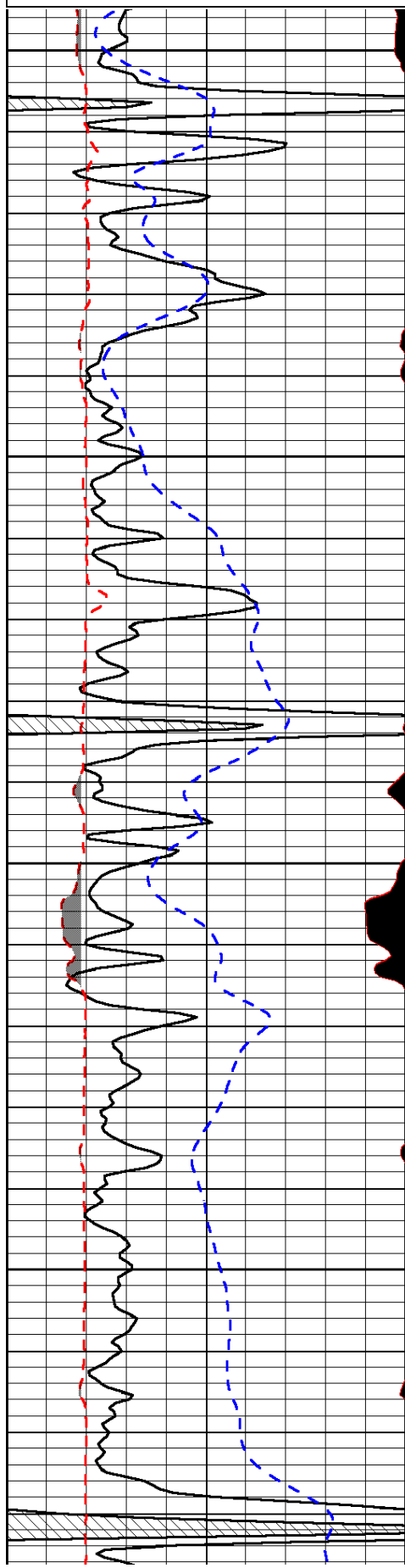
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Comments

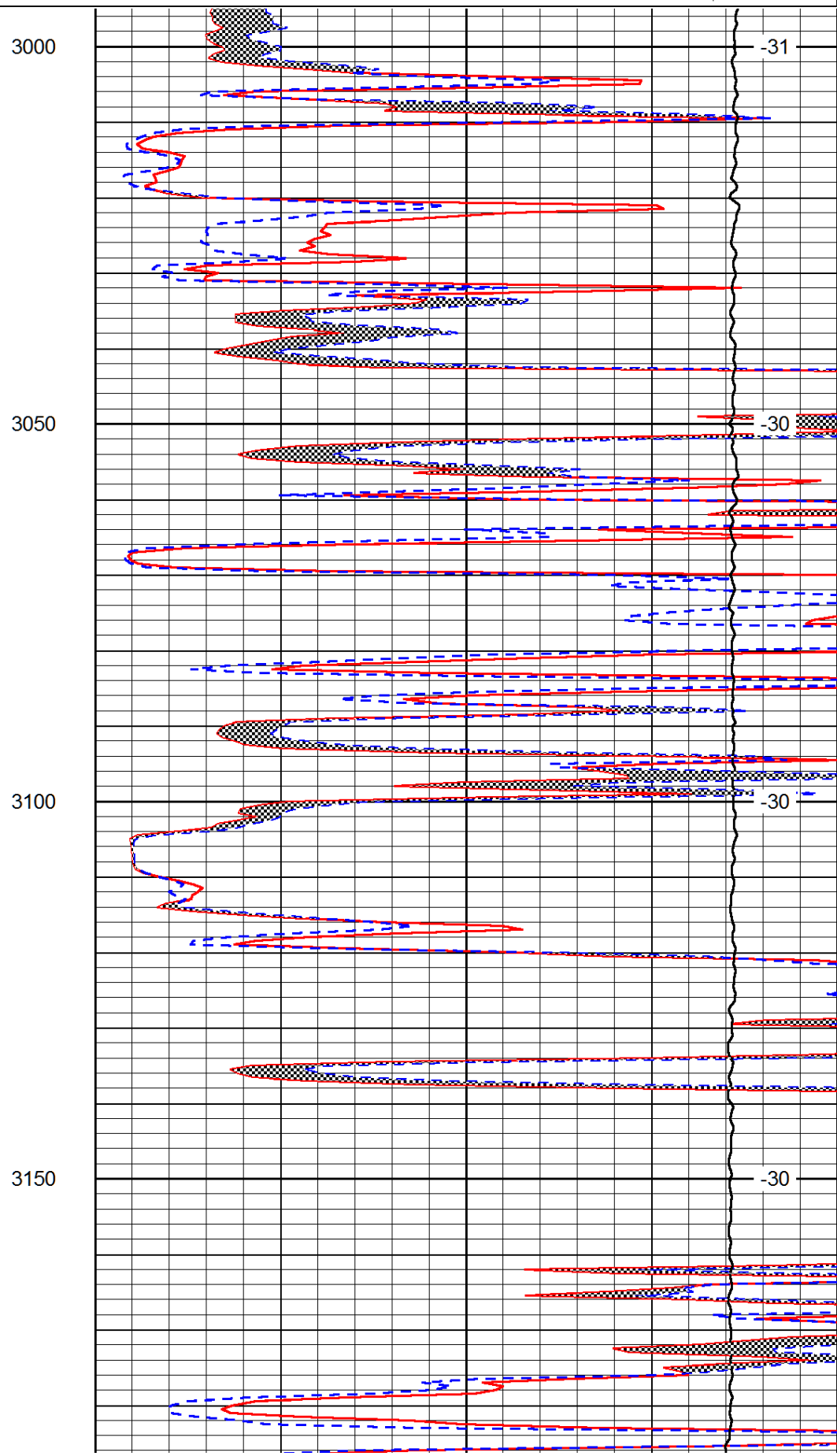
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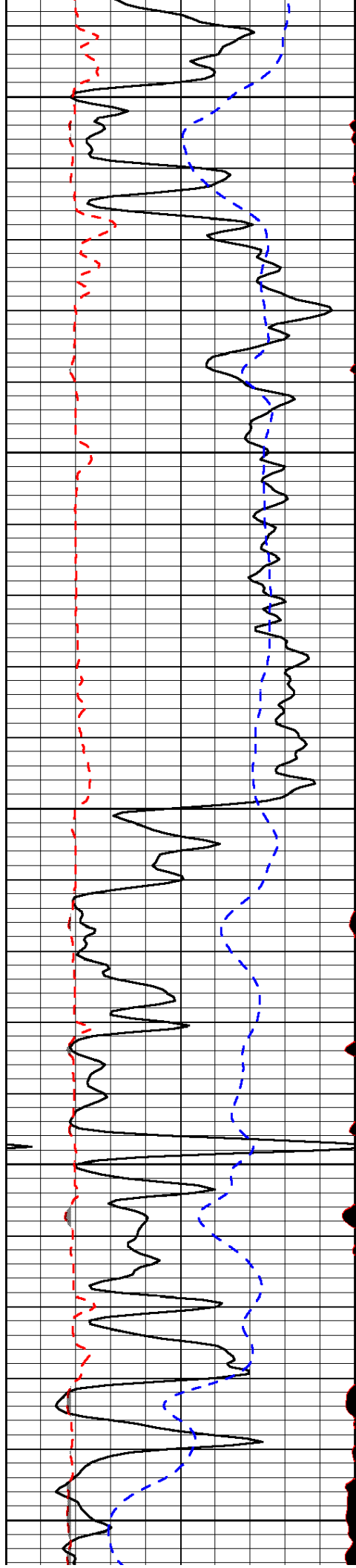
Great Bend,
South on 281 to county line, 1 South, 1 West, 1/8 South,
West into

0	Gamma Ray (GAPI)	150
6	MCAL (in)	16
2.875	Mud Cake (in)	7.875
-200	SP (mV)	0



0	Micro Inverse 1 X 1 (Ohm-m)	40
0	Micro Normal 2" (Ohm-m)	40
10000	Line Weight (lb)	0
		LSPD (ft/min)





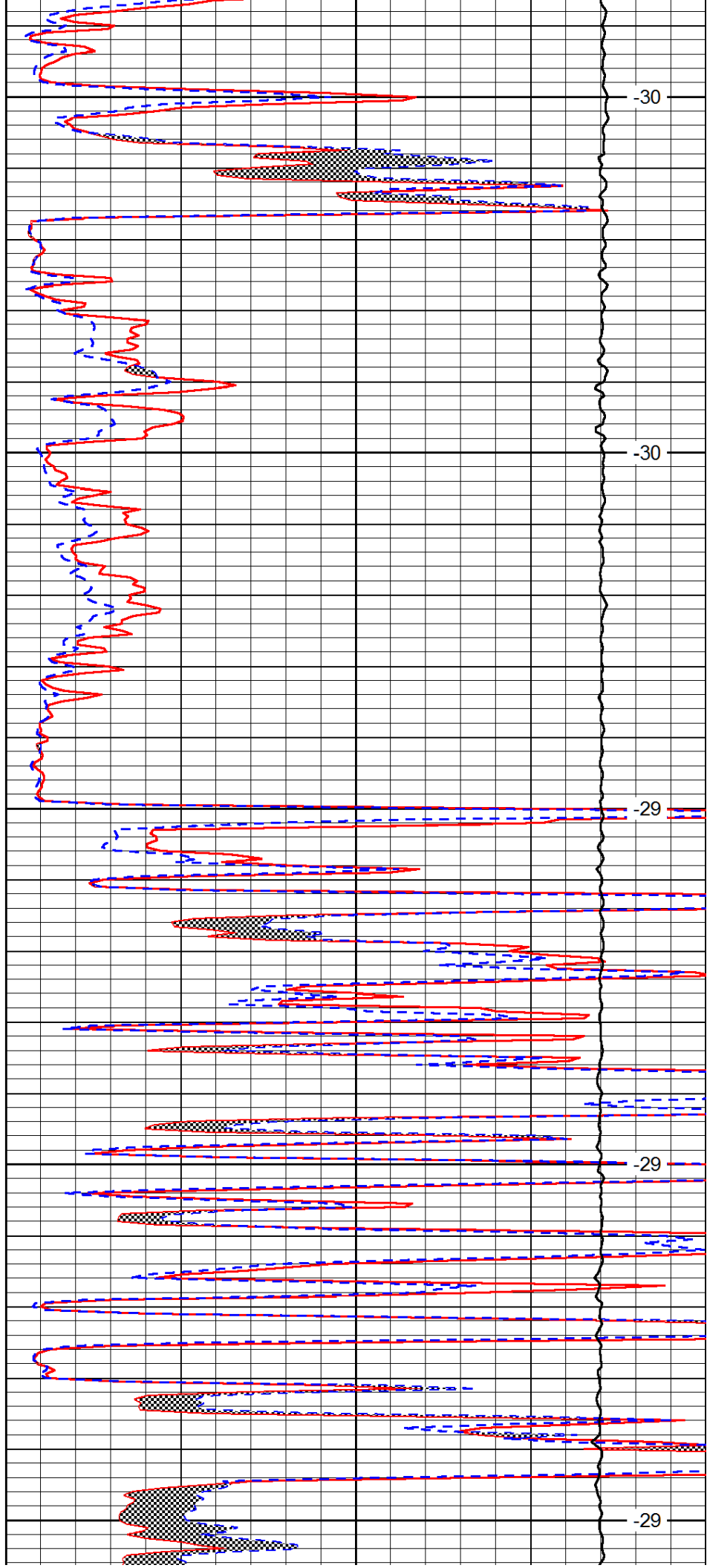
3200

3250

3300

3350

3400



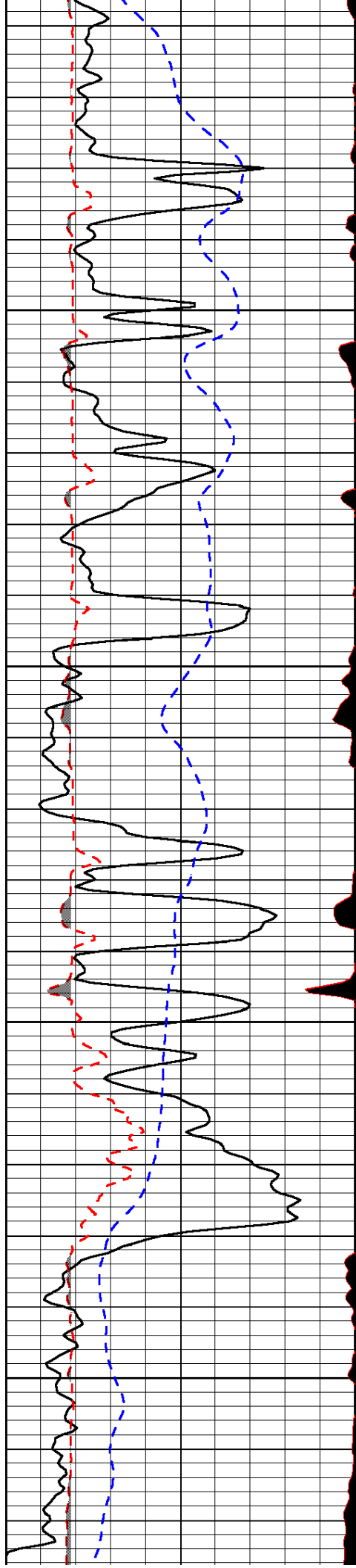
-30

-30

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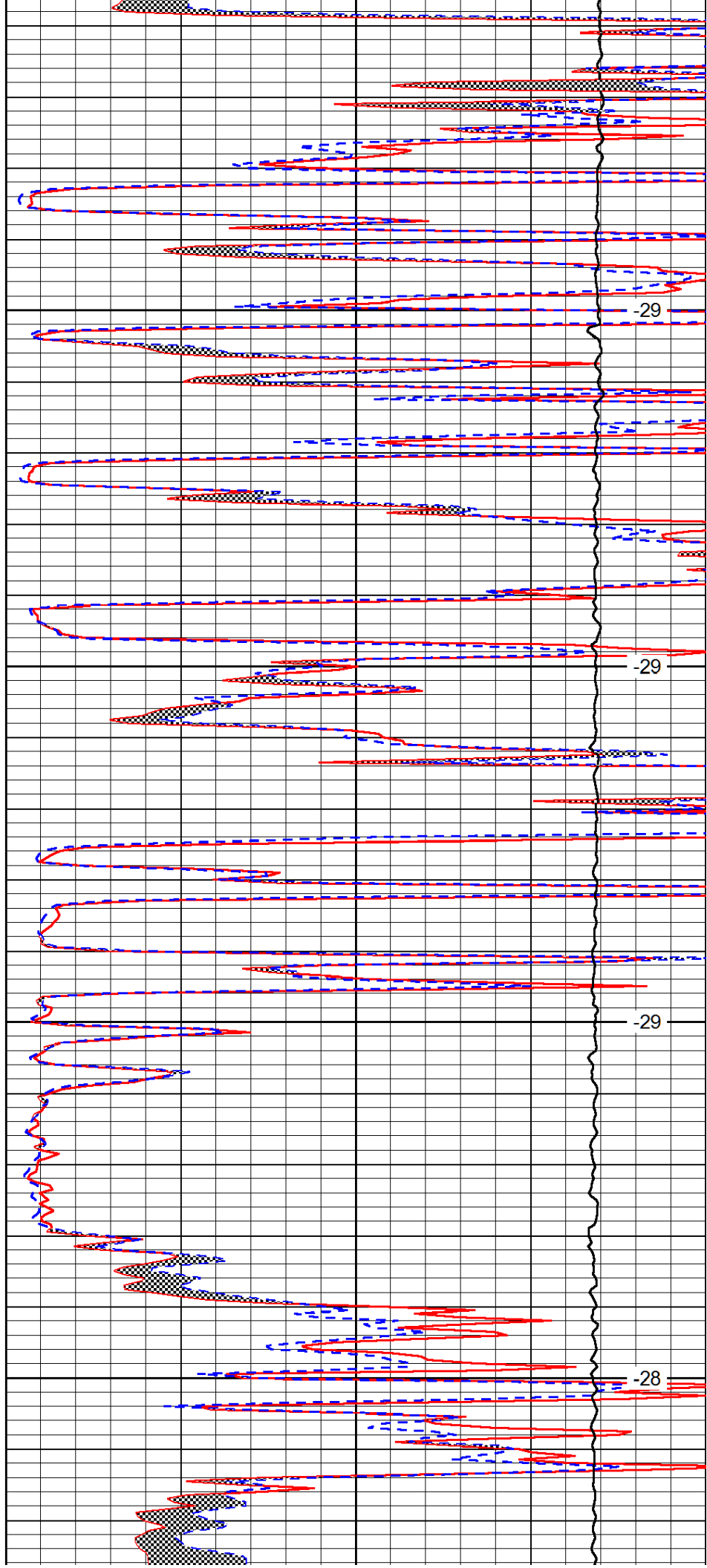


3450

3500

3550

3600



-29

-29

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-28

