

**Premier Directional Drilling**

12941 North Freeway
400
Houston, TX 77060
281-673-4000

Bat 29N2-9HZ**Scale 5":100' - MD****6/20/2015 11:11 AM****Oper. Company:** Anadarko Petroleum Corporation**State:** Colorado**Well:** Bat 29N2-9HZ**County:** Weld**Field:** Wattenberg/Codell**Country:** USA**Rig:** H & P 311**Location:** 1N 65W Sect. 9**Well ID:** 05123412880000**Start Date:** 06/17/2015 17:45:15**Job Number:** R15239**End Date:** 06/18/2015 23:56:00**Notes:** LWD Real Time Log
Gamma Correction Determined by Pipe Id & OD, Mud Weight & Bit Size**Latitude:** 40° 3' 37.598 N**Elev KB:** 4956'**Longitude:** 104° 40' 9.836 W**Elev DF:** 4956'**Elev GL:** 4931'**Notes:** NAD: 1983Map Zone: 13N (108 W to 102 W)Total Correction: 8.12° (Mean MagVar)Grid Convergence: 0.00° (True North)**Operator 1:** Robert Grossman**Operator 2:** Joe Hammond**Notes:** Smoothing: 7Gap Fill: 10Survey Tool Type: Mud PulseCalculation Method: Minimum Curvature

Tool Run Data	Run #1	Run #2	Run #3	Run #4	Run #5
Tool S/N	286				
Bit Size	7.875				
Cal Factor	5.39308				
Gamma Offset	46.00				
Resistivity Offset	0.00				
Start Depth	1570.00				
StartDate	6/17/2015				
StartTime	1:00 AM				
EndDepth	11735.00				
EndDate	6/19/2015				
EndTime	8:00 AM				
Mud Type	OBM				
Mud Weight	9.5				
Funnel Viscosity	55				
Plastic Viscosity	18				
Yield Point	12				
Gel Strength	NA				
Solids Content	7.16				
Sand Content	NA				
Mud Alkalinity	3.6				
Filtrate Alkalinity	NA				
Chlorides	48000				
Mud RM	NA				
Mud RMF	NA				
Mud RMC	NA				
Mud RM at BHT	NA				
Temperature	NA				
Hole Data			Casing Data		
Size	From	To	Size	From	To
13.5	0.00	1570.00	9.65	0.00	1562.00
7.875	1570.00	11735.00	5.5	0.00	11710.00

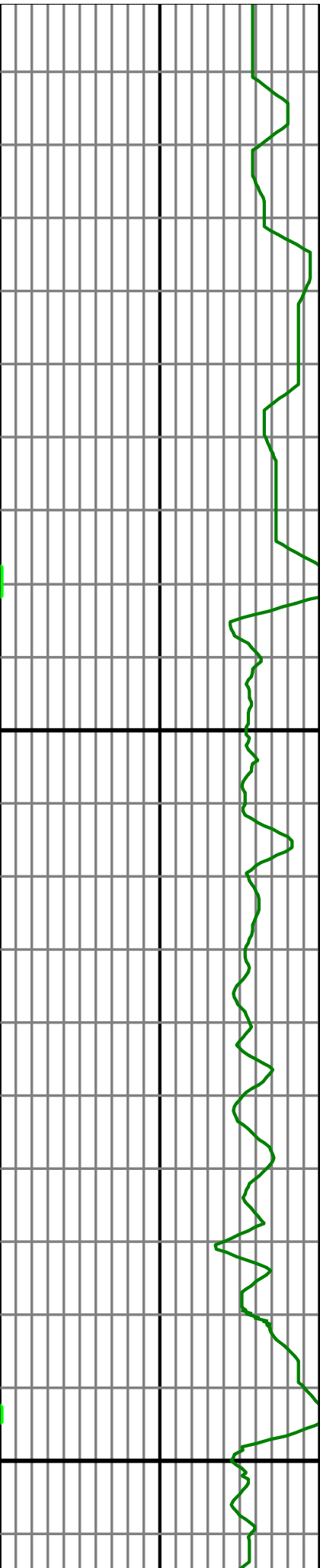
All interpretations are opinions based on inferences from electrical or other measurements and we cannot and do not guarantee the accuracy or correctness of any interpretation, and we shall not except in the case of gross or willful negligence on our part, be liable or responsible for any loss, cost damages or expenses incurred or sustained by anyone resulting from an interpretation made by any of our officers, agents, or employees.

0.00 150.00 300.00
GR RT(API) on TVD
2

MD
FT

0.00 150.00 300.00
GR RT(API) on MD
2

Surveys (MD/INC/AZ/TVD/VS)



6,310

6,320

6,330

6,340

6,350

6,360

6,370

6,380

6,390

6,400

6,410

6,420

6,430

6,440

6,450

6,460

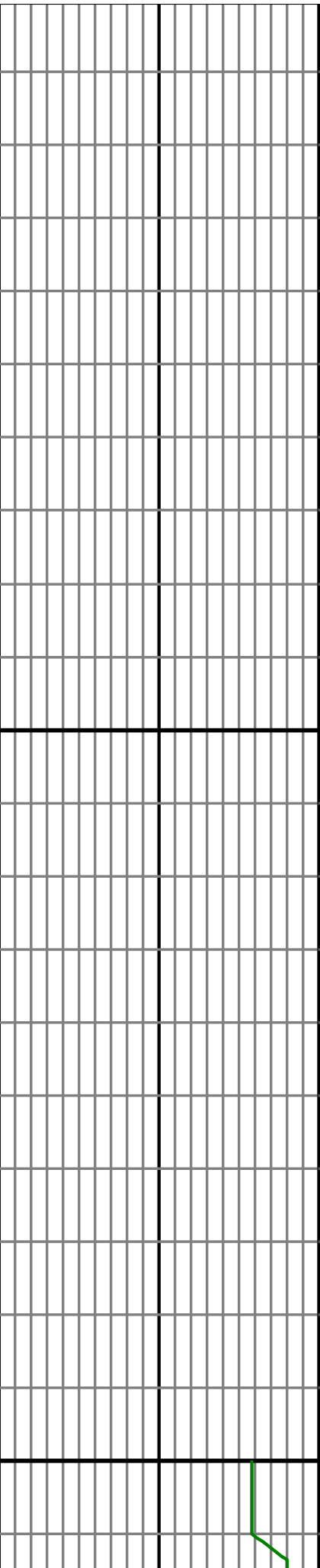
6,470

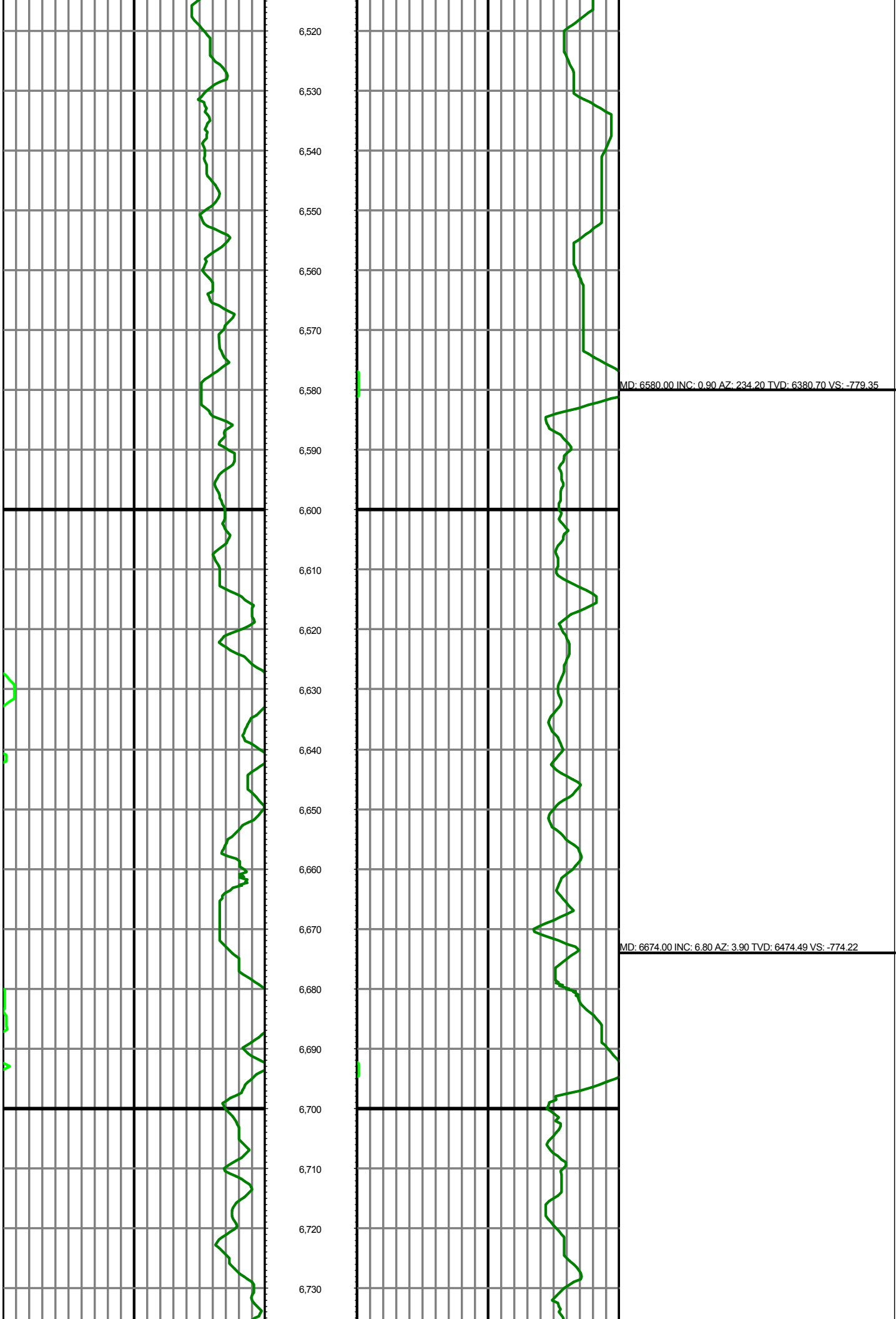
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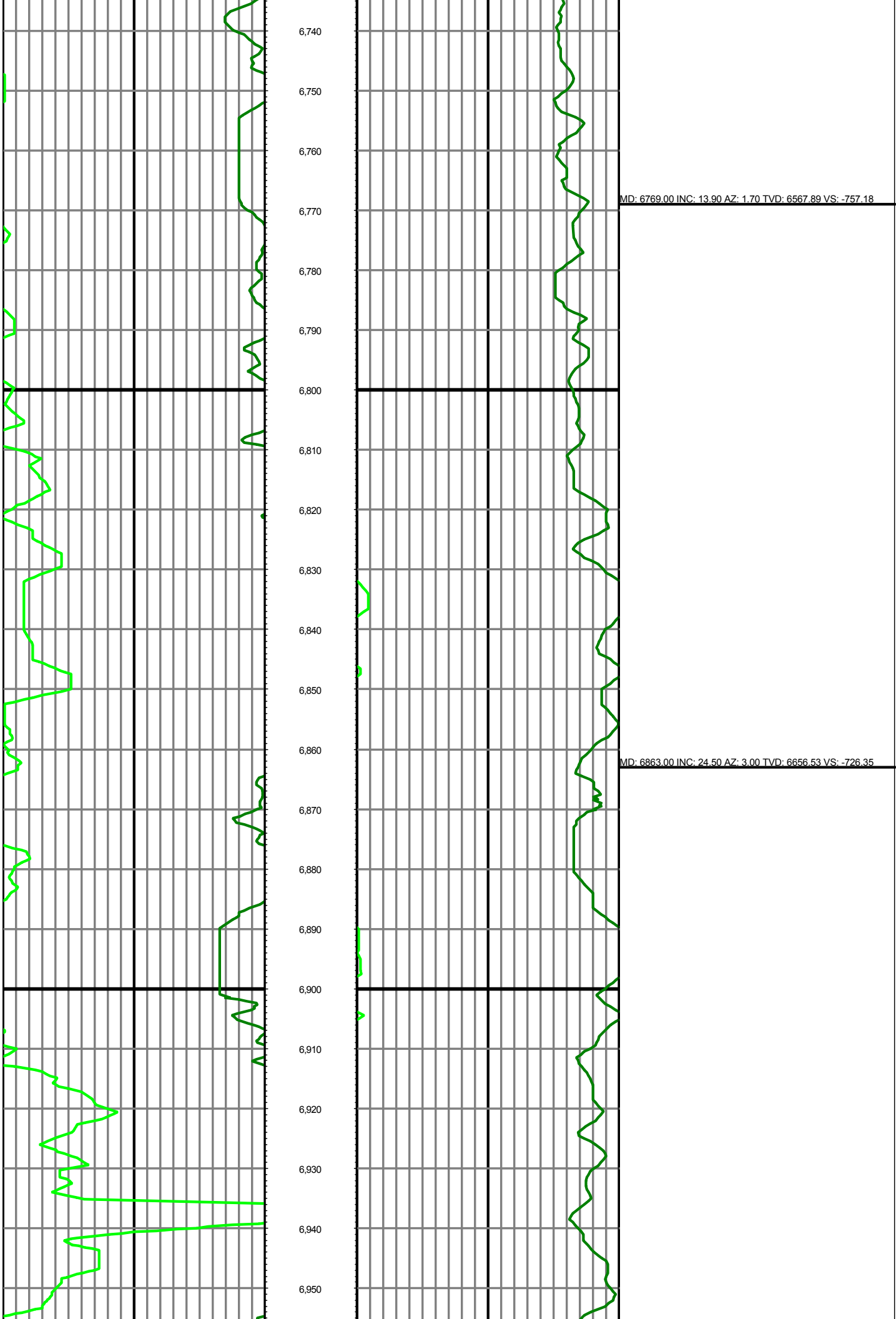
6,490

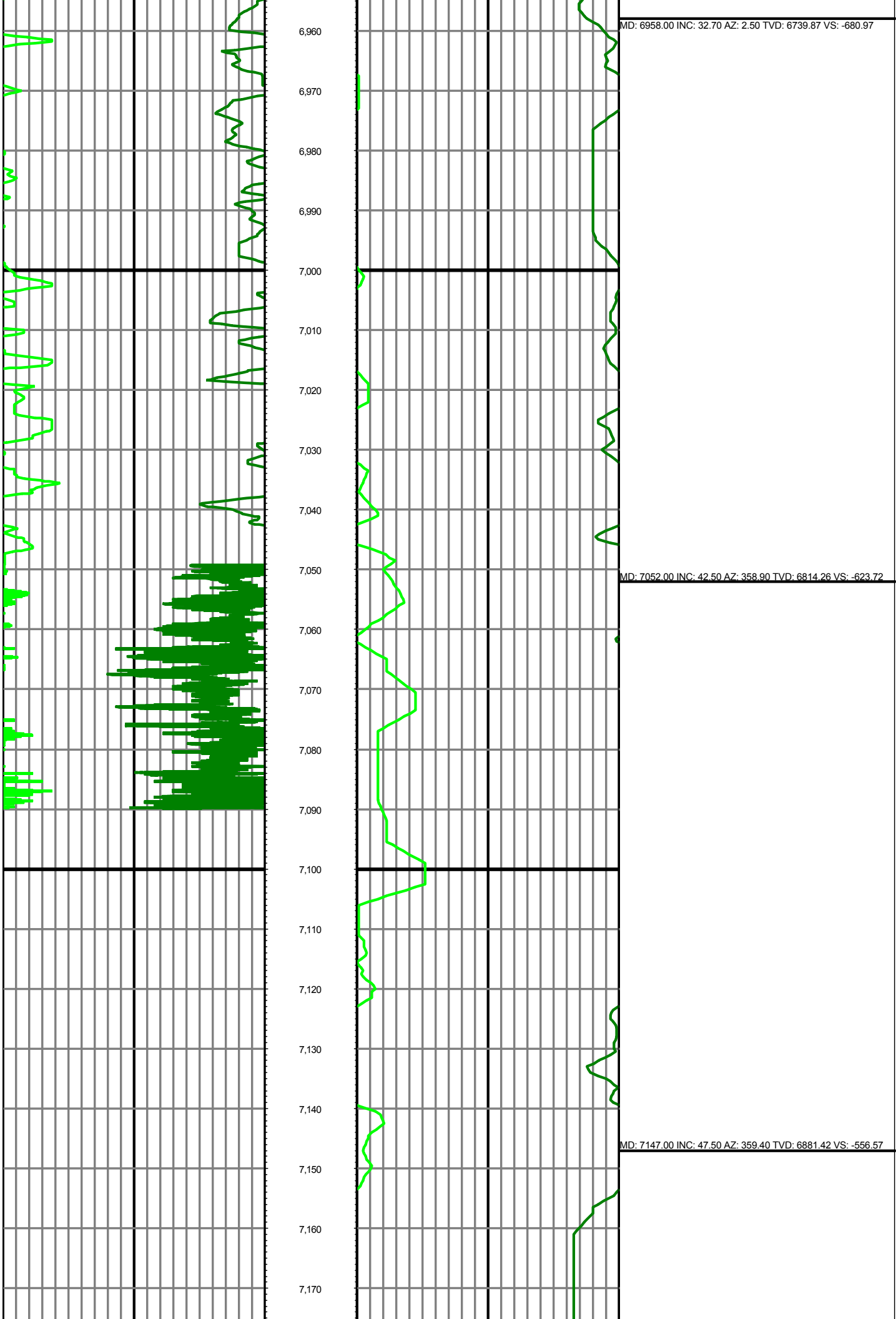
6,500

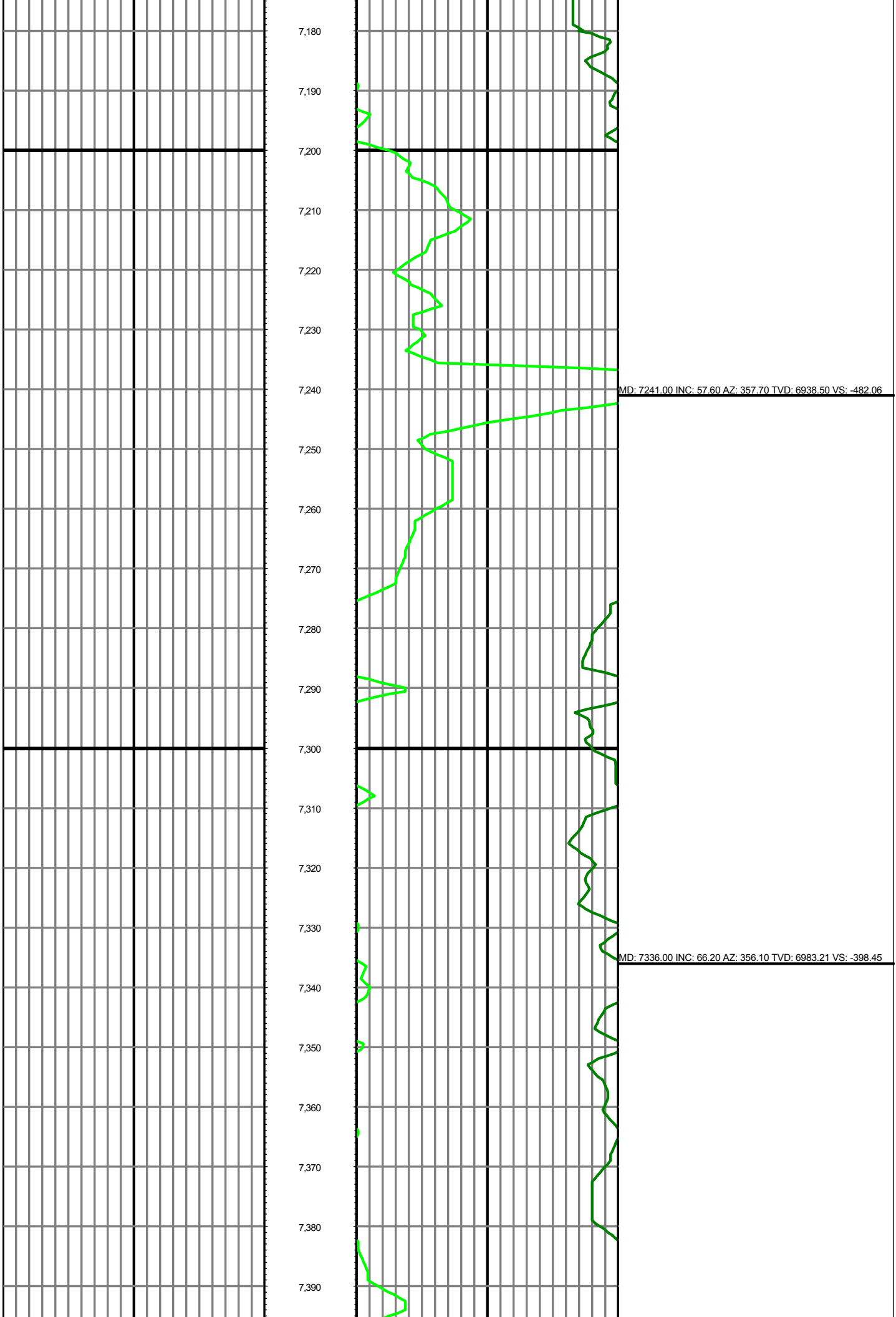
6,510

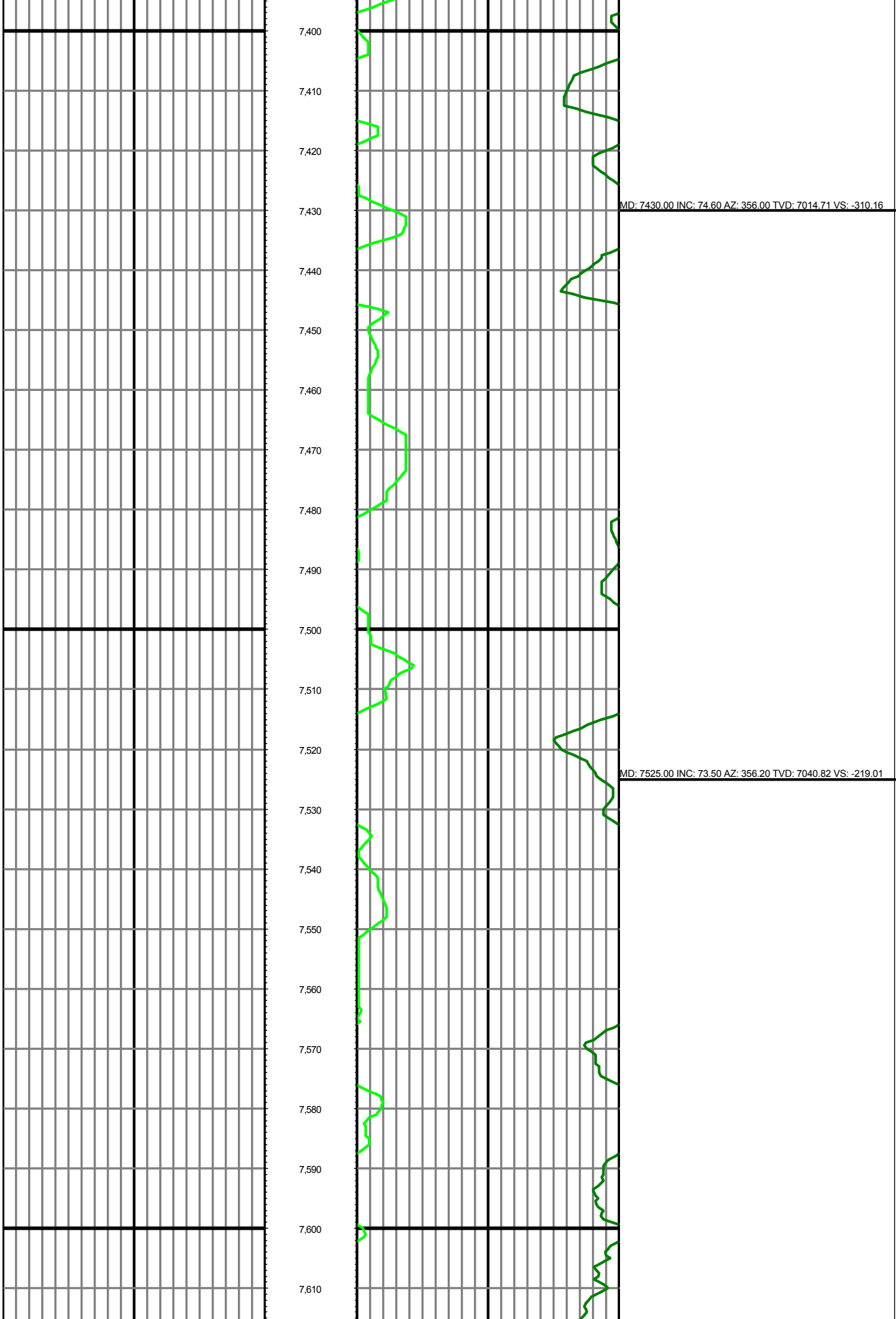


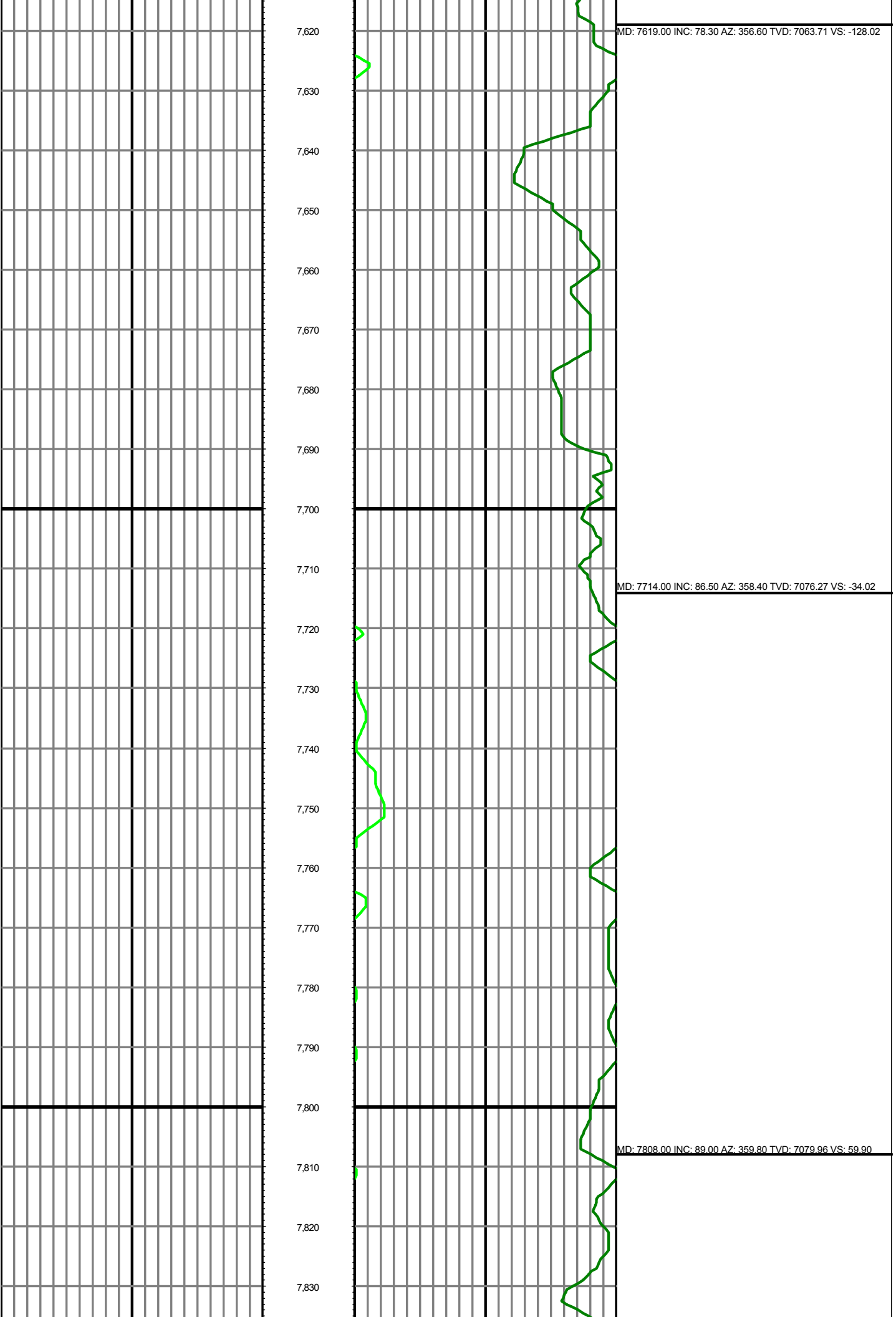


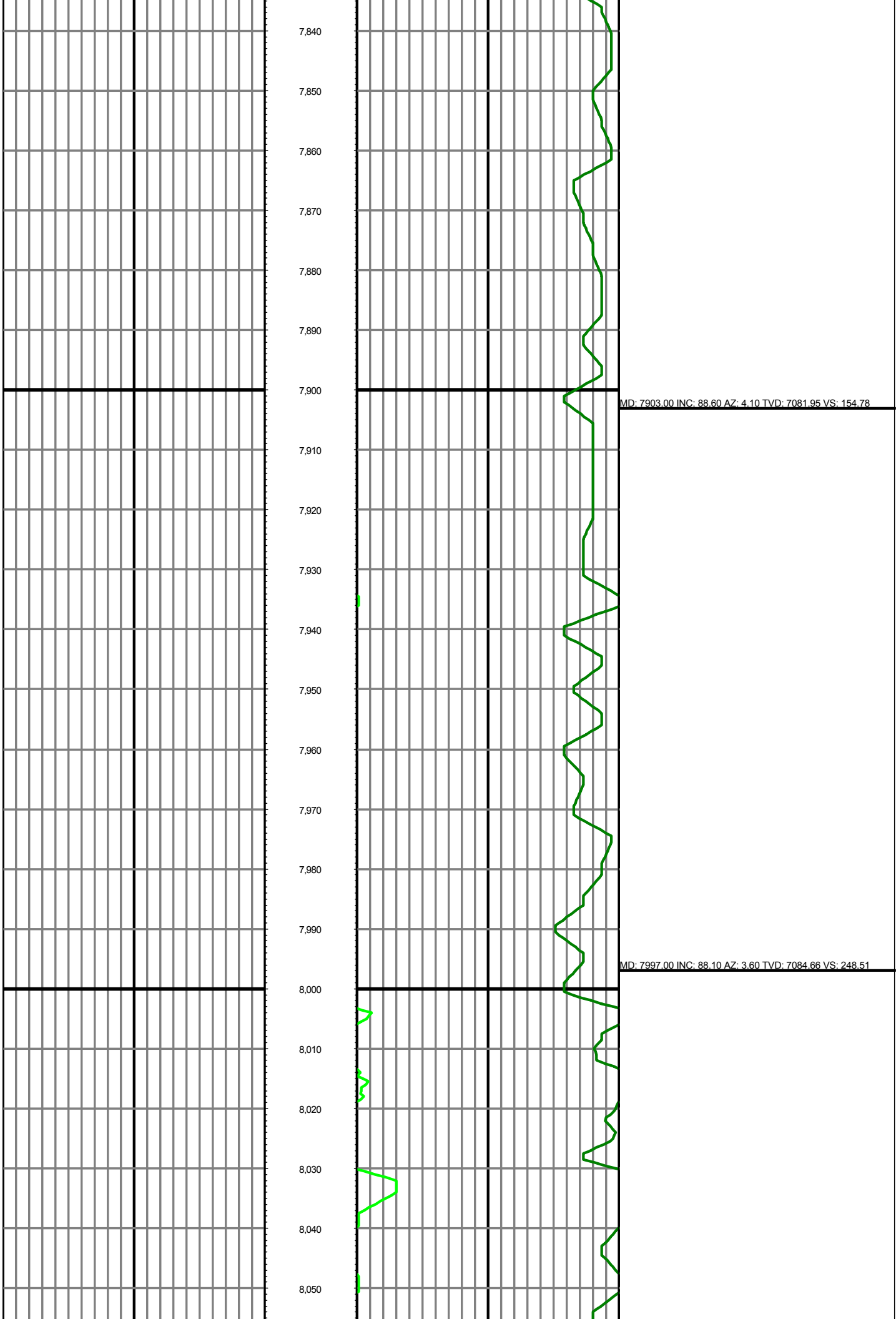


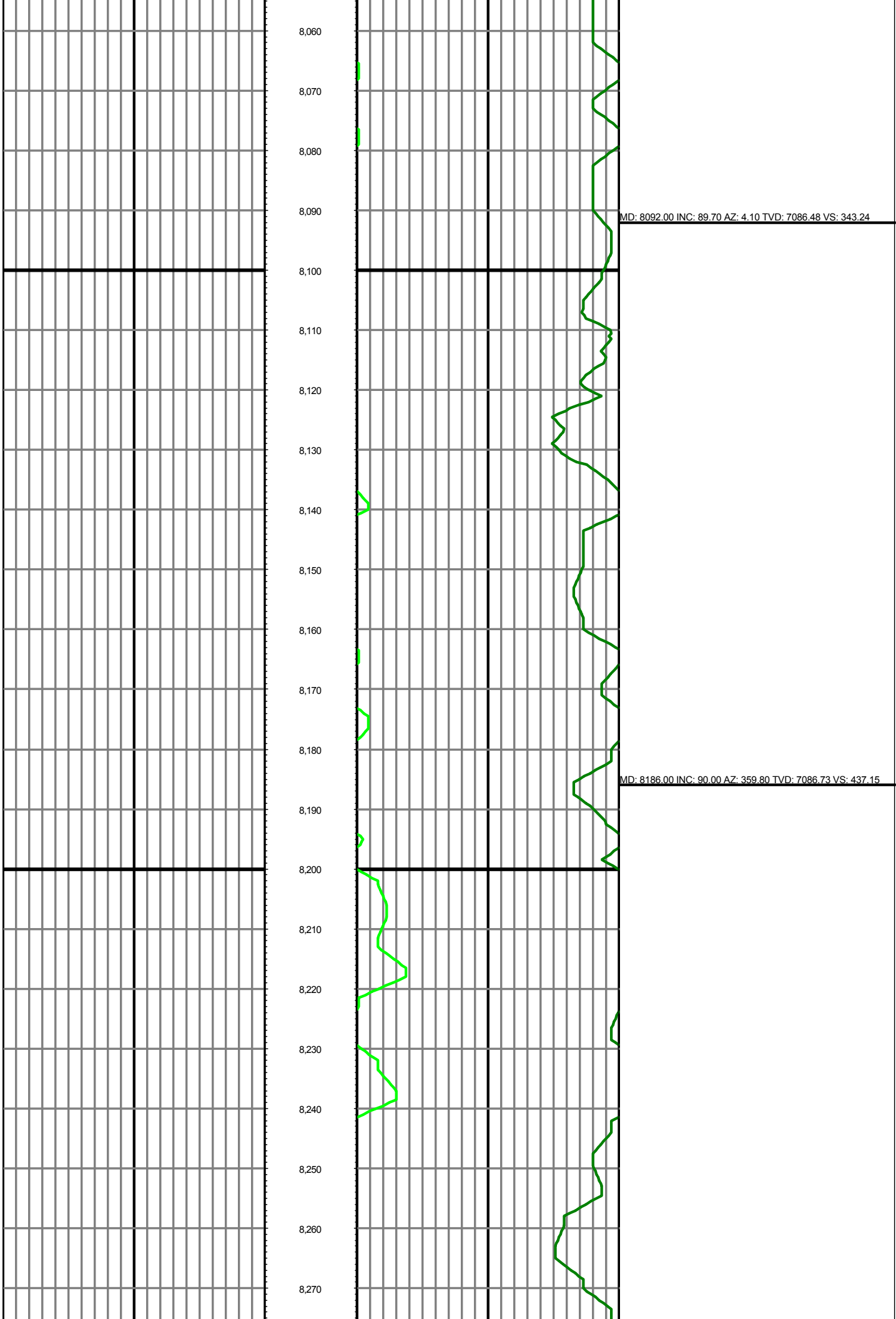


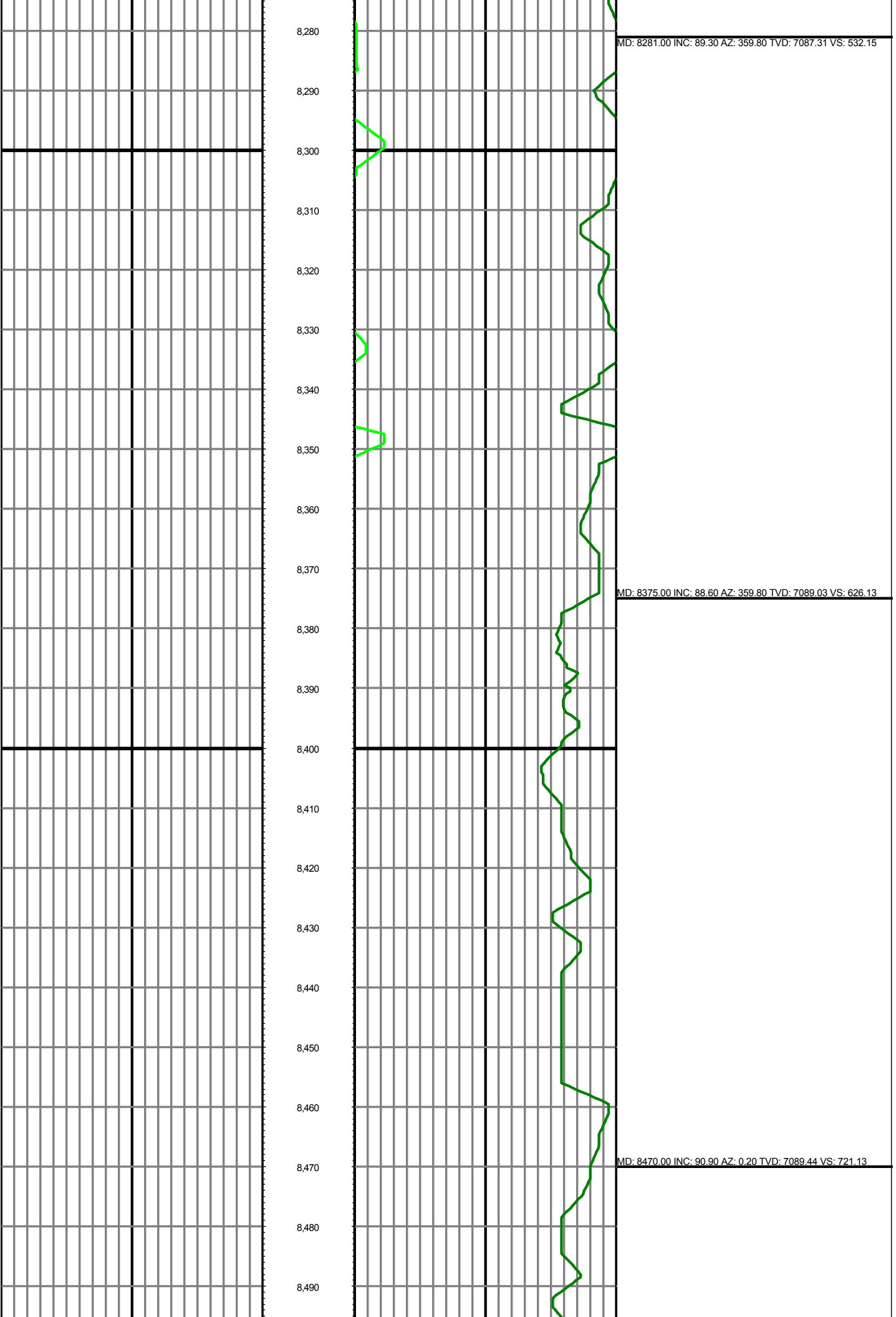


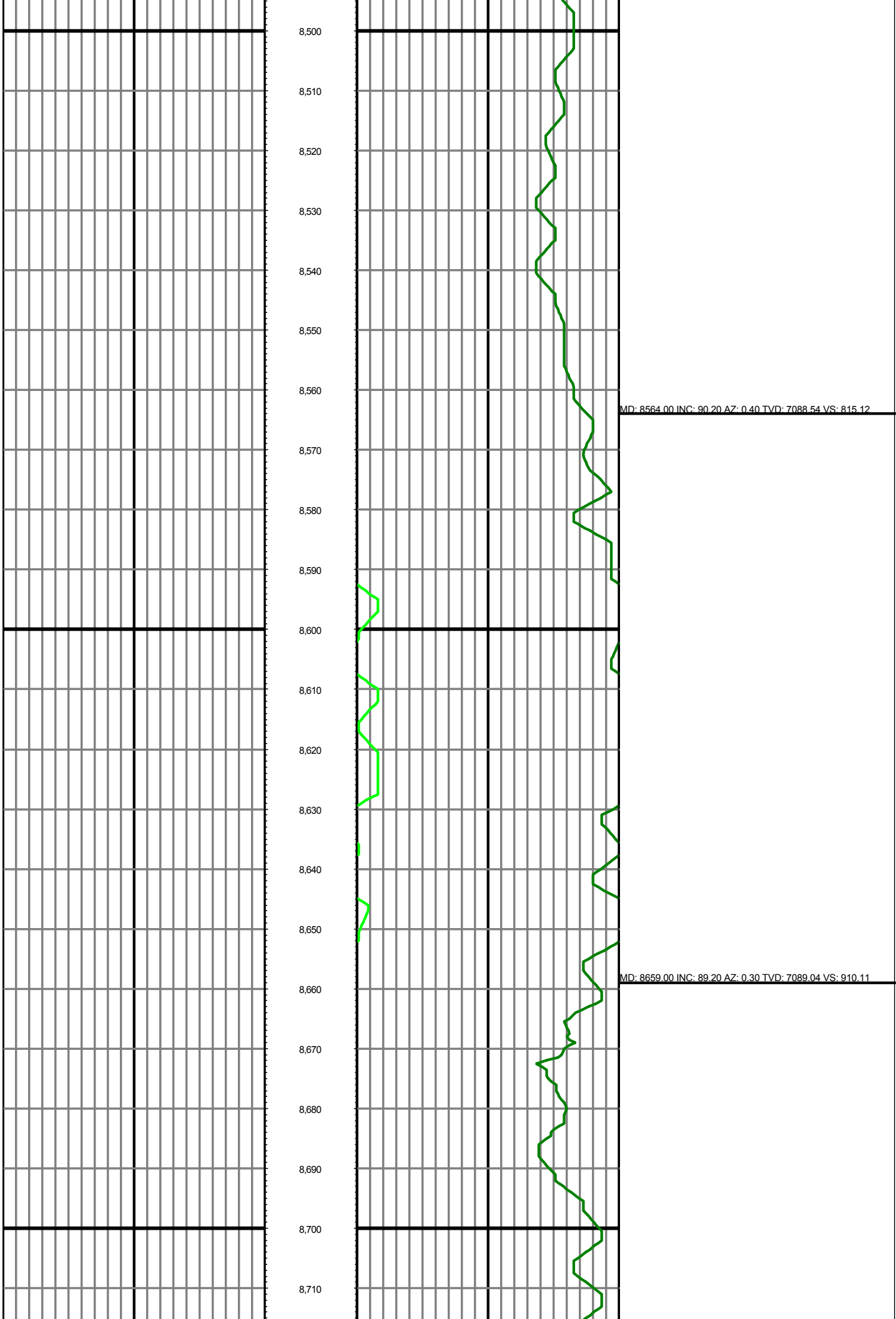


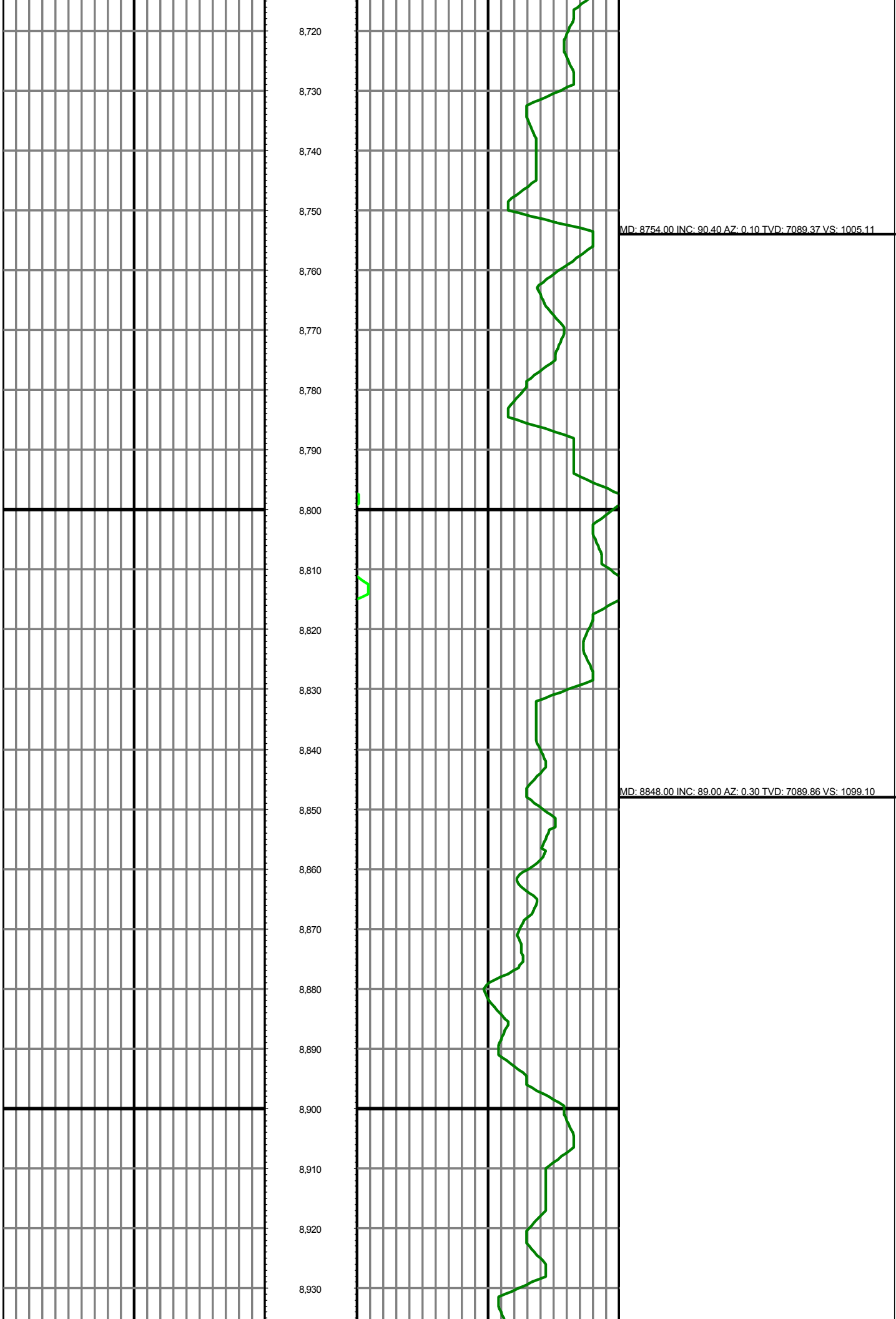


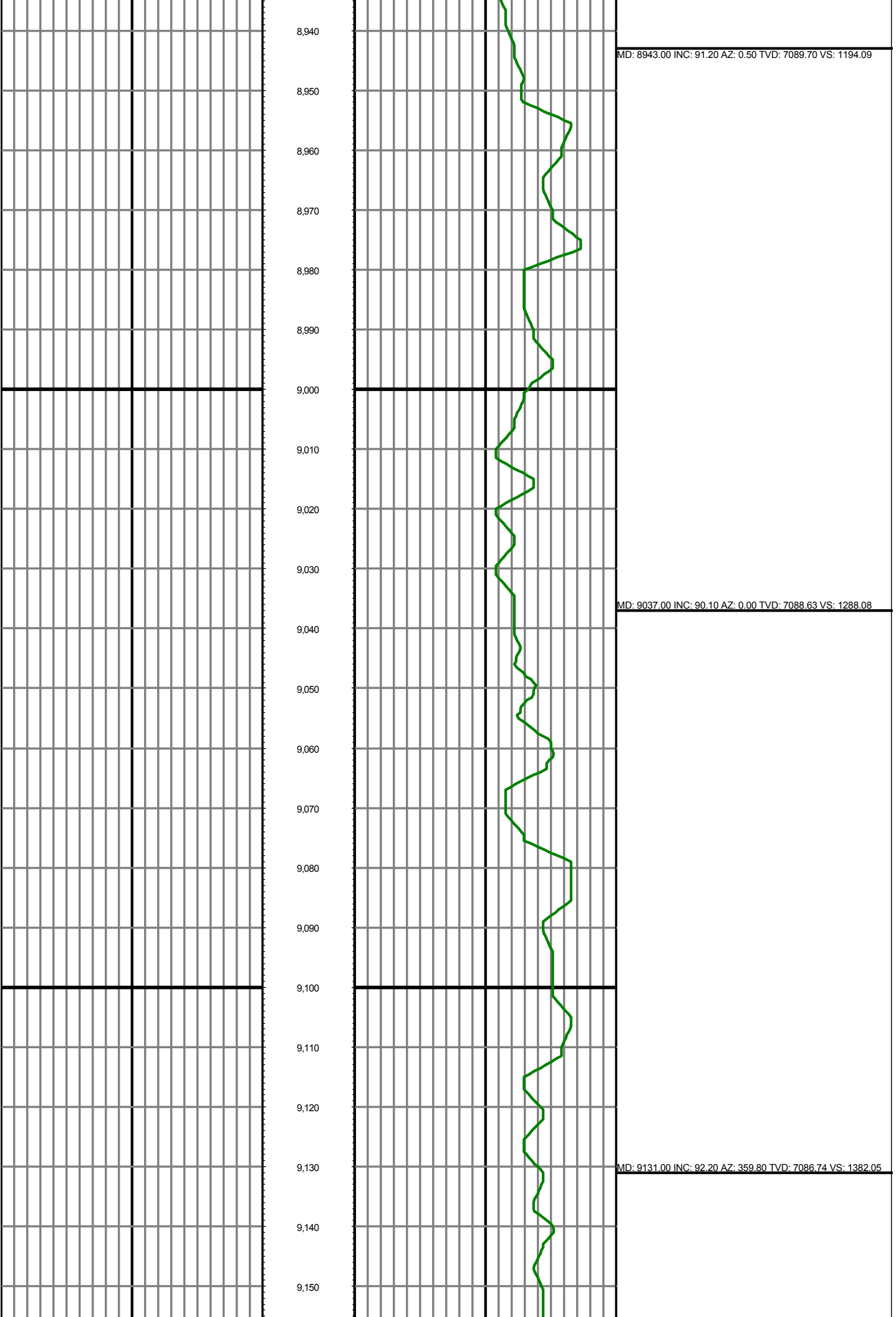


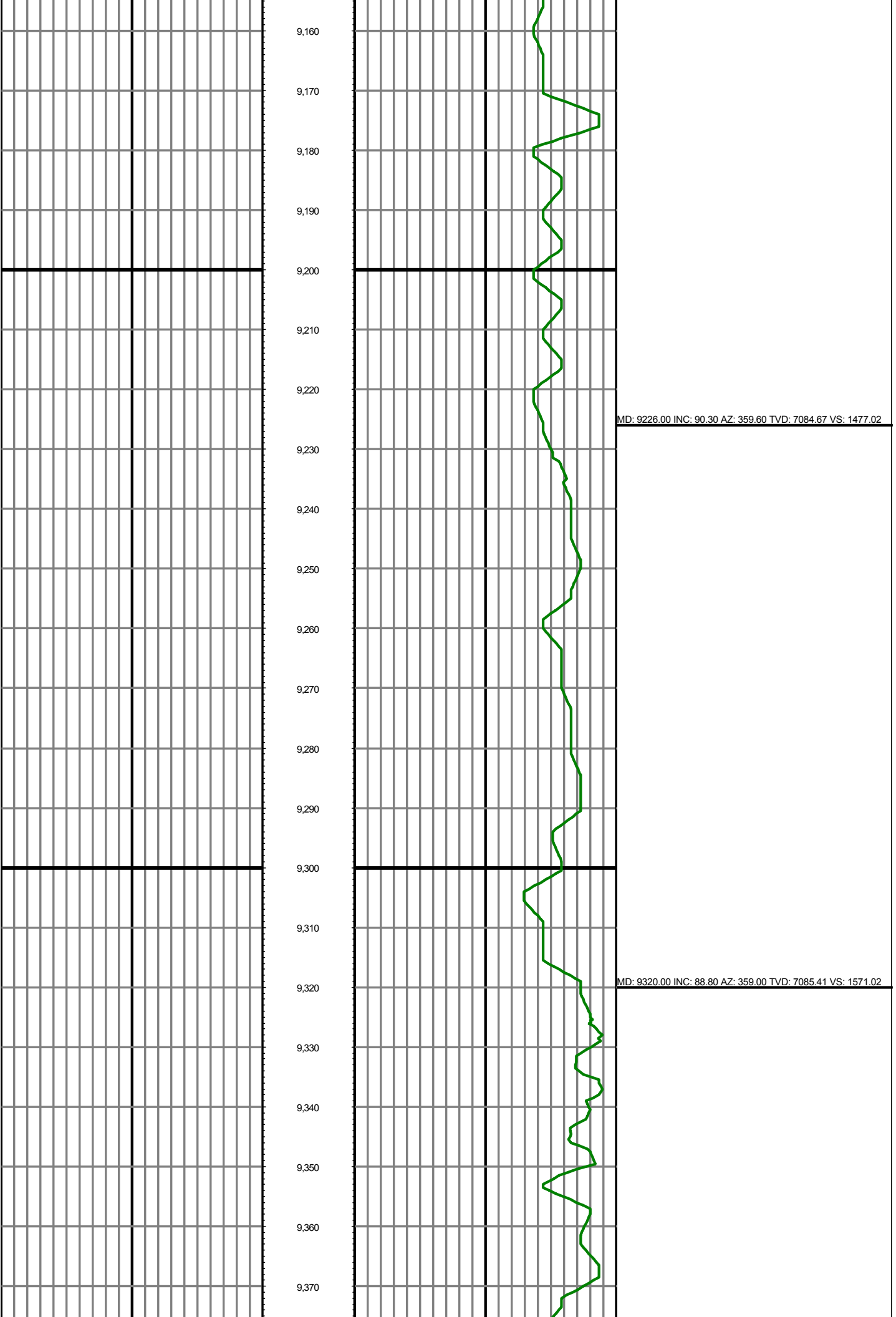


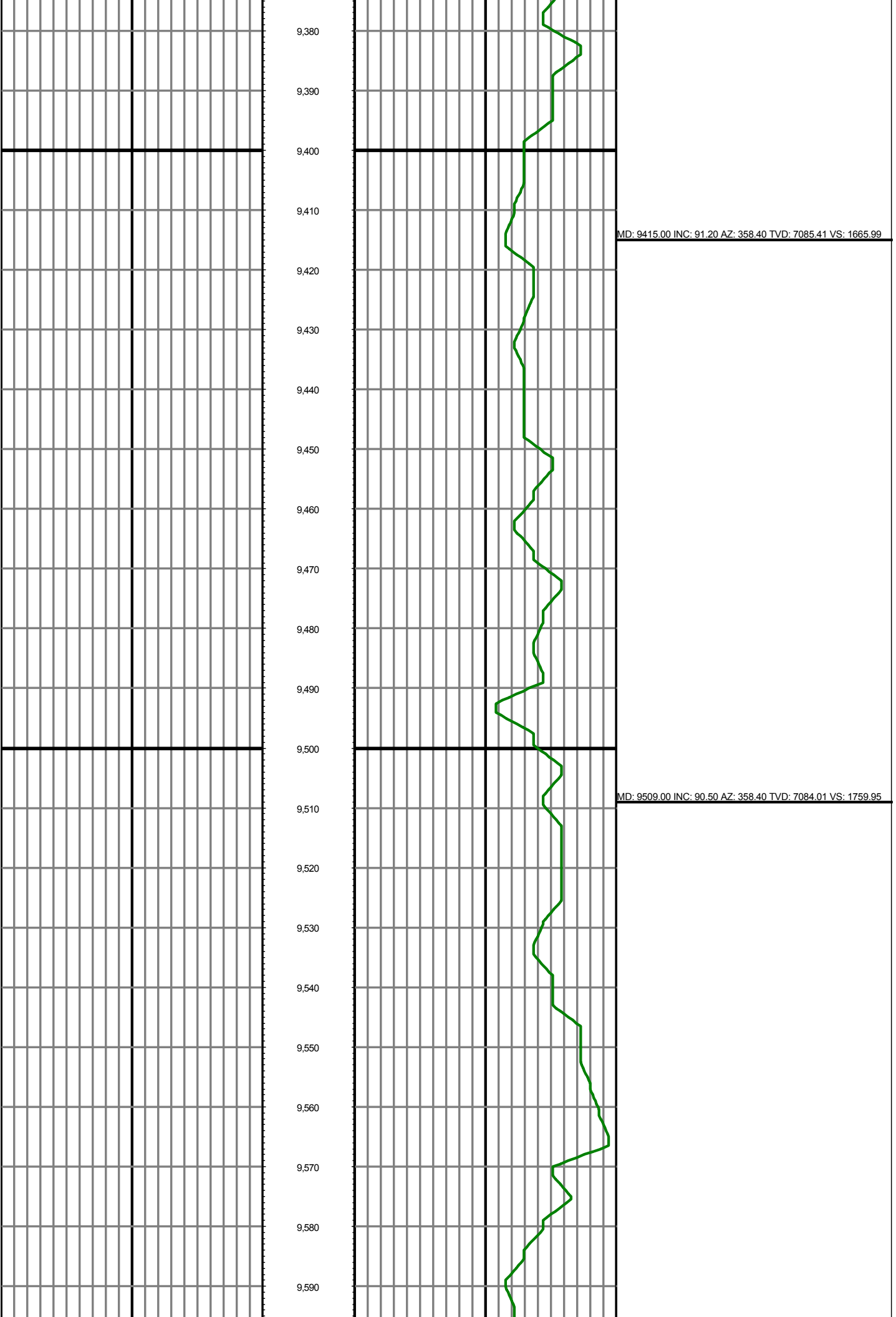


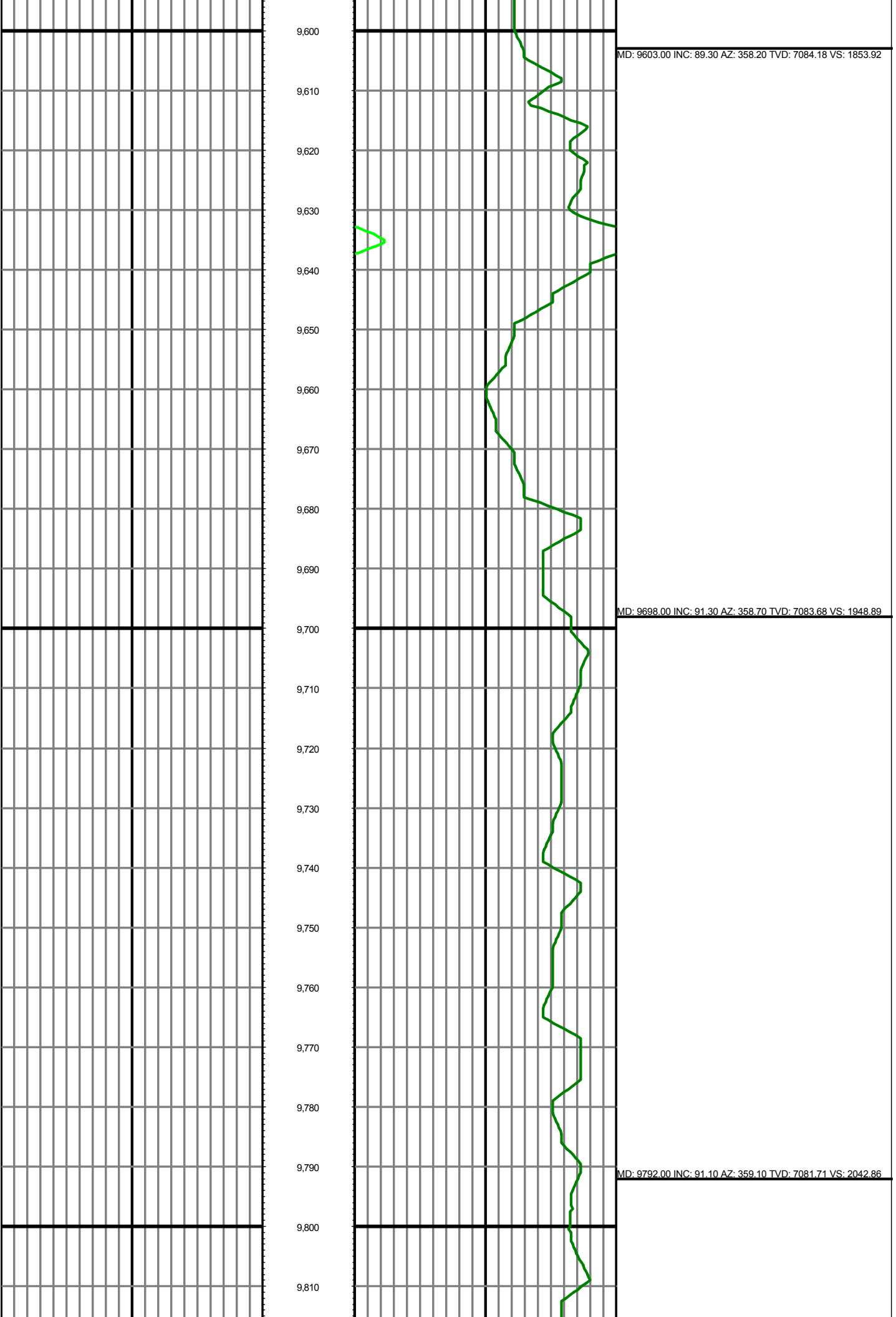


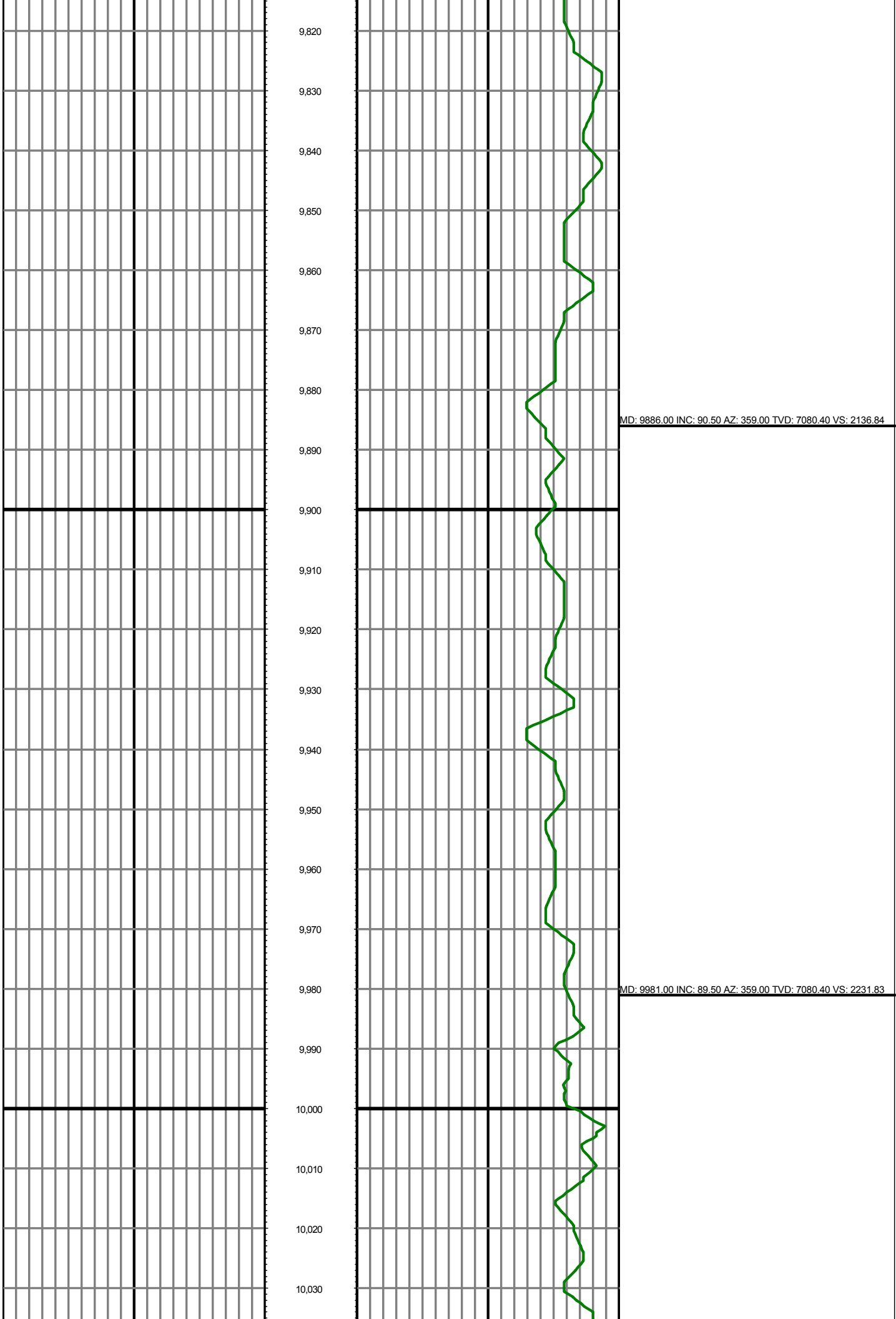


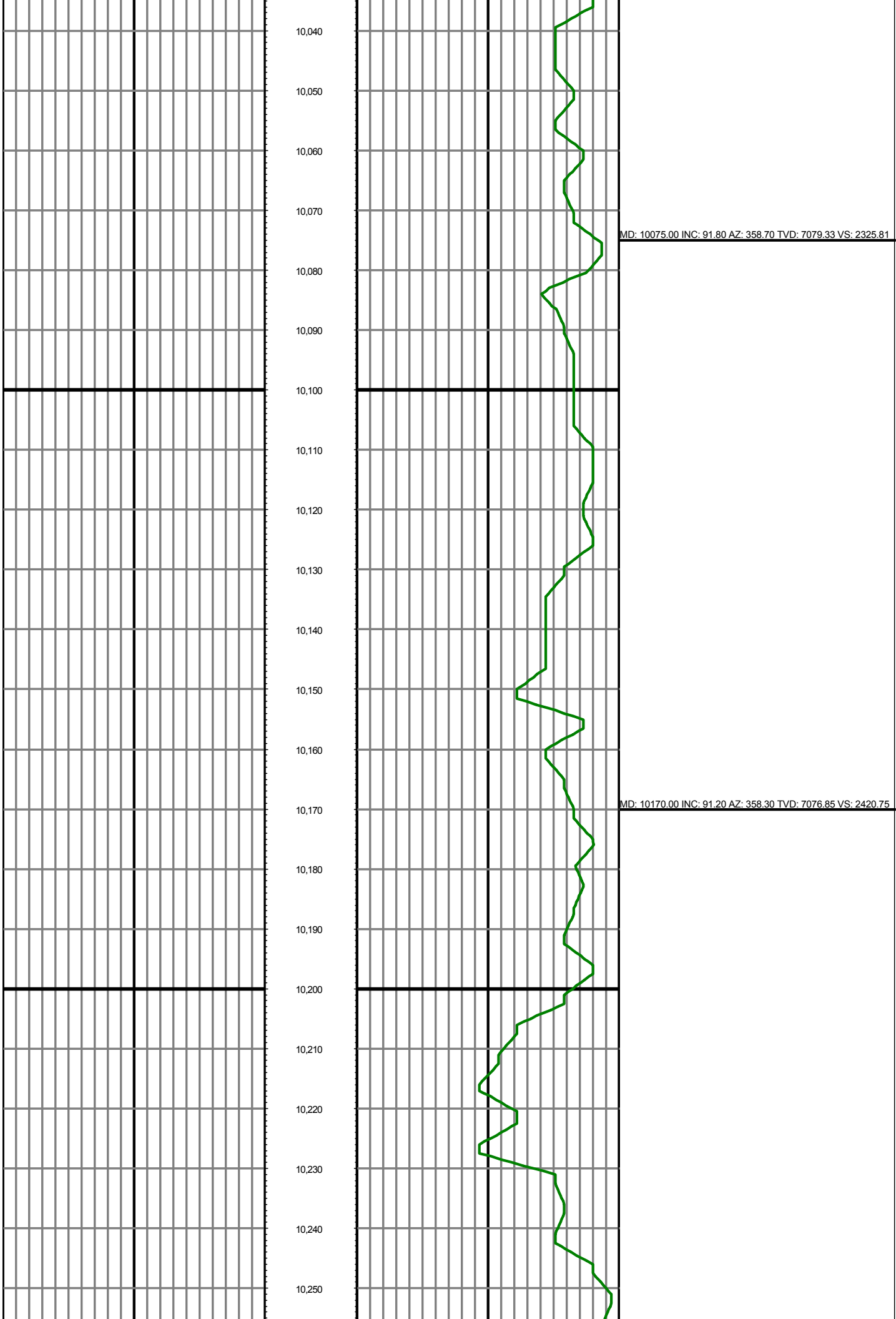


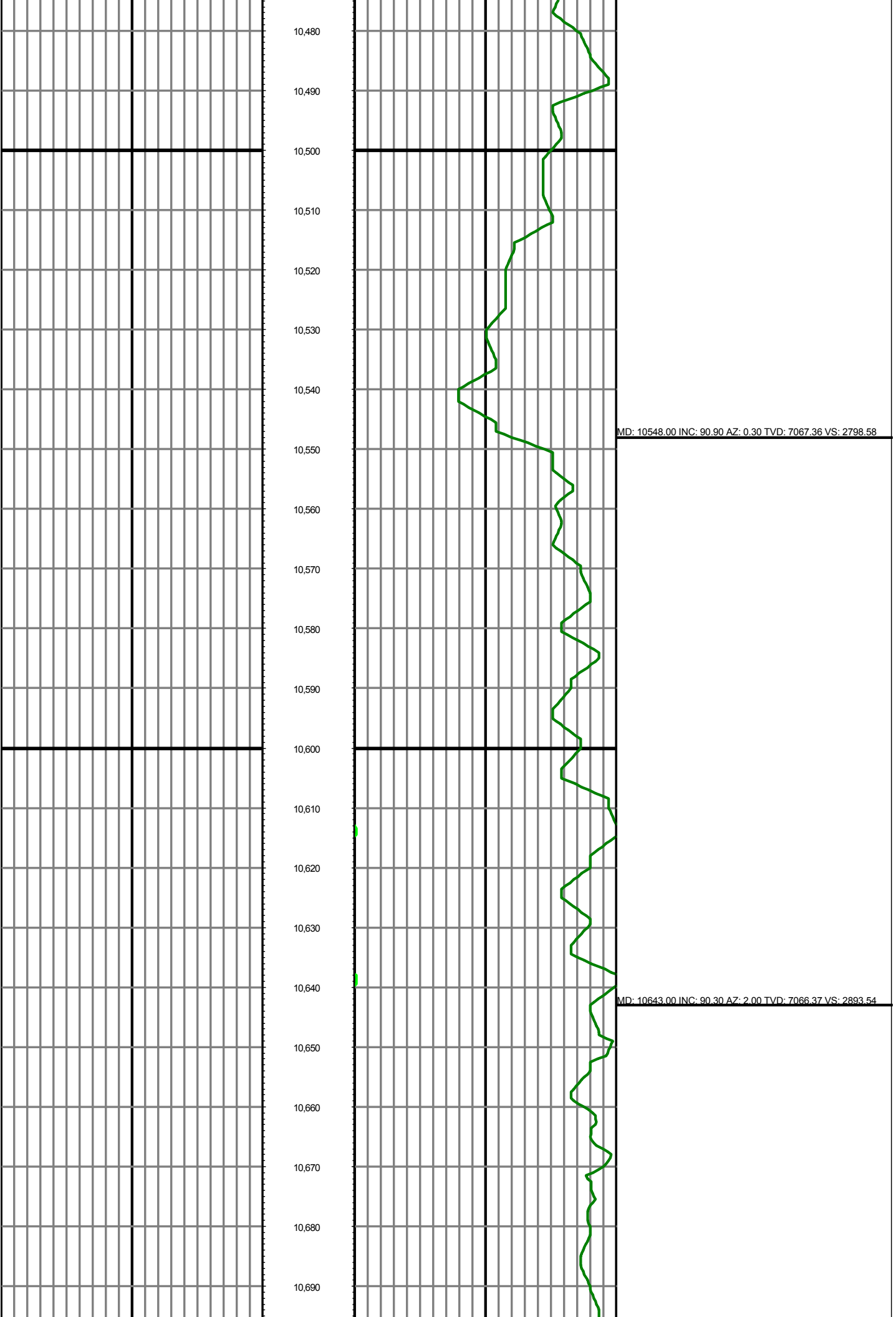


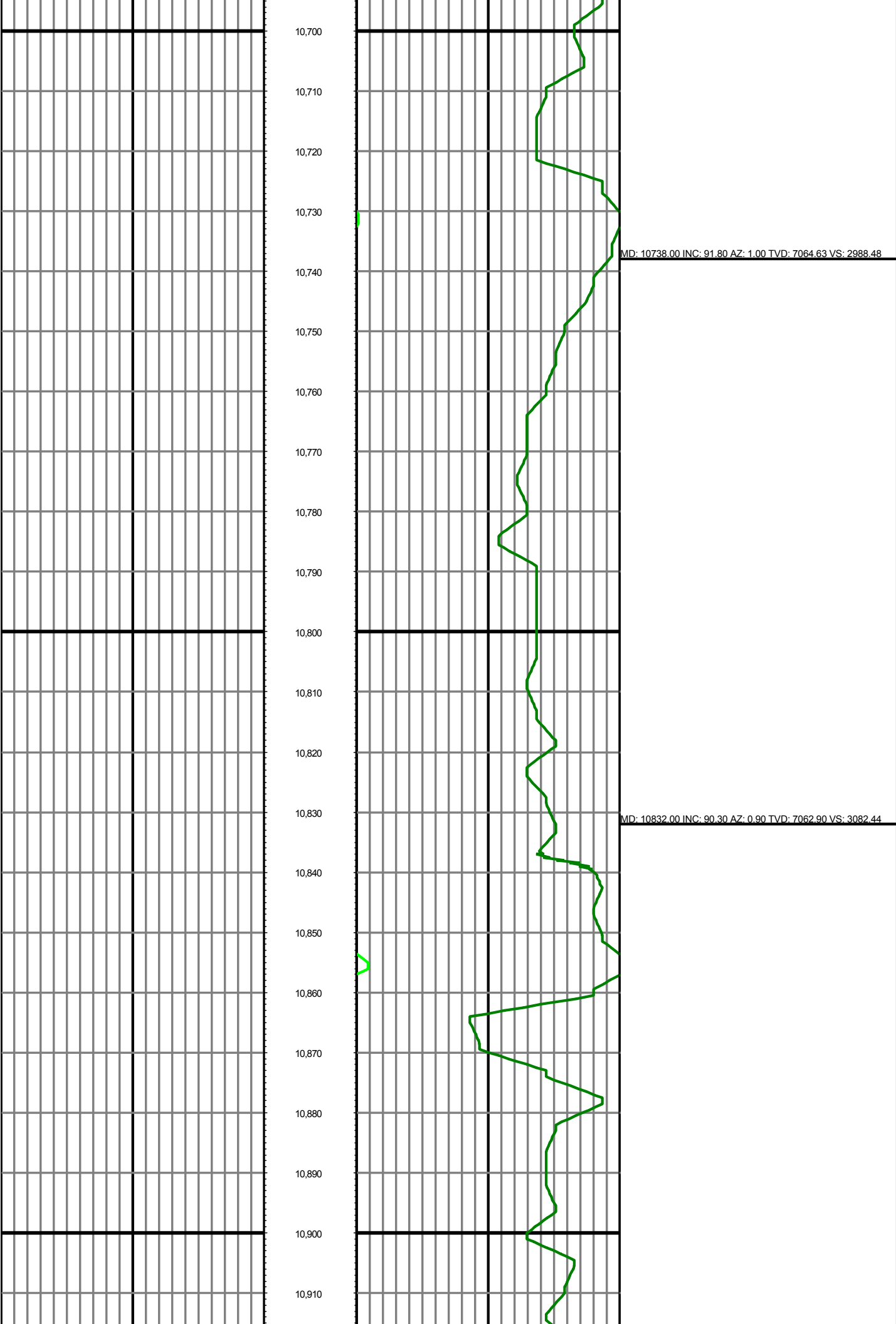


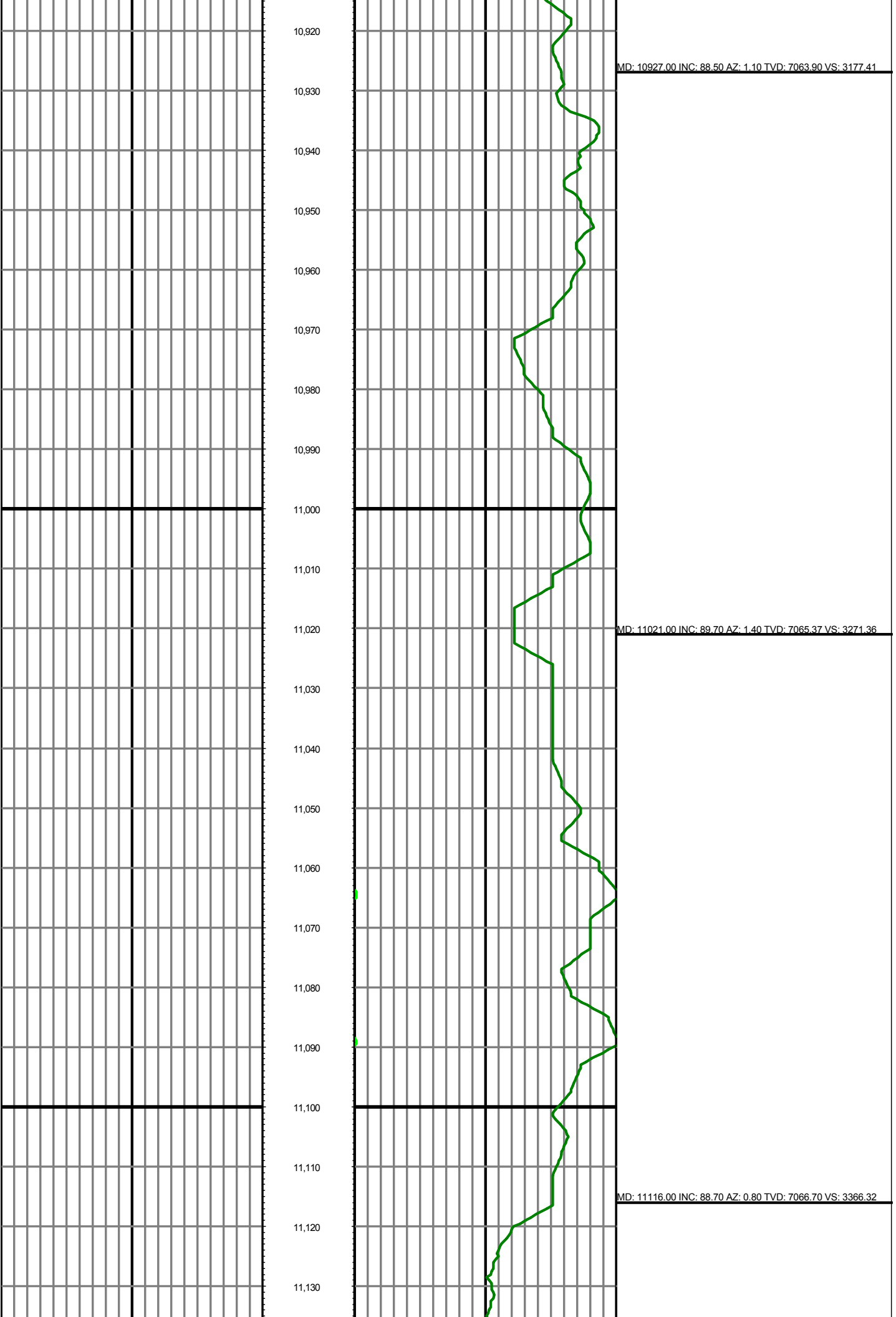












MD: 10927.00 INC: 88.50 AZ: 1.10 TVD: 7063.90 VS: 3177.41

MD: 11021.00 INC: 89.70 AZ: 1.40 TVD: 7065.37 VS: 3271.36

MD: 11116.00 INC: 88.70 AZ: 0.80 TVD: 7066.70 VS: 3366.32

