# Schlumberger

Company: **ESSO Australia Pty. Ltd.**

**12.25 in. Section**

Well: **West Moonfish−1**

Field: **Moonfish**

Rig: **ENSCO 102** State: **Victoria**

Rig: ENSCO 102
Field: Moonfish
Location: Bass Strait
Well: West Moonfish−1
Company: ESSO Australia Pty. Ltd.

PowerPulse* Gamma Ray
1:200 Measured Depth
Real Time Log

Location

| | |
|---|---|
| Total depth: | 2532.0 m |
| Spud date: | 05−Jan−05 |
| Runs: | 2 To 4 |

Elevation

| | |
|---|---|
| K.B. | Top Drive |
| G.L. | −52.12 m |
| D.F. | 39.24 m |

Permanent datum: Mean Sea Level Elev.: 0.0 m
Log measured from: Drill Floor 39.24 m above Perm. datum
Depth reference: Driller's Depth

| Service Order no. | x = 585687.25m (East) | Longitude | Latitude |
|---|---|---|---|
| ASQ−04−12 | y = 5777075.49m (North) | E 147° 58' 40.63" | S 38° 09' 0.48" |

Depth logged: 755.4 m To 2518.8 m
Date logged: 11−Jan−05 To 19−Jan−05
Mag decl: 13.04 deg.
Mag dip: −68.70 deg.
Other services: Directional Drilling, D&I Survey

Bore hole record

| Hole size | from | to |
|---|---|---|
| 26.0 in. | Surface | 160.0 m |
| 17.5 in. | 160.0 m | 761.0 m |
| 12.25 in. | 761.0 m | 2532.0 m |

Casing record

| Size | Density | from | to |
|---|---|---|---|
| 20 in. | 94.0 lb/ft | Surface | 155.3 m |
| 13.375 in. | 68.0 lb/ft | Surface | 755.4 m |

Mud record

| Type | from | to |
|---|---|---|
| S−W/Bentonite | 160.0 m | 761.0 m |
| KCL/PHPA/Glycol | 761.0 m | 2532.0 m |

Borehole deviation record

| Min | Max | from | to |
|---|---|---|---|
| 0.18 deg. | 0.47 deg. | 160.0 m | 761.0 m |
| 0.35 deg. | 33.78 deg. | 761.0 m | 2532.0 m |

Surface equipment

| | |
|---|---|
| Unit | OLU−JA−9602 |
| Depth system | PDA − DES−DA |

Software record

| | | | |
|---|---|---|---|
| IDEAL Wis | ID9_1C_01 | | |
| SPM | hspm9_2c_08 | | |
| LWD | N/A | | |
| MWD | V7.0c00 | | |

# Bit Run Summary

| Run number | | 2 | 3 | 4 | | | |
|---|---|---|---|---|---|---|---|
| Bit size | in. | 12.25 | 12.25 | 12.25 | | | |
| Bit start depth | m | 761.0 | 1737.0 | 2073.0 | | | |
| Bit end depth | m | 1737.0 | 2073.0 | 2532.0 | | | |
| Top interval logged | m | 755.4 | 1717.2 | 2053.2 | | | |
| Bottom interval logged | m | 1717.2 | 2053.2 | 2518.8 | | | |
| Begin log: time | | 11:34 | 22:10 | 23:00 | | | |
| Begin log: date | | 12−Jan−05 | 14−Jan−05 | 17−Jan−05 | | | |
| End log: time | | 11:51 | 08:25 | 09:22 | | | |
| End log: date | | 14−Jan−05 | 17−Jan−05 | 19−Jan−05 | | | |
| **Mud data** | | | | | | | |
| Depth | m | 1538.0 | 2037.0 | 2442.0 | | | |
| Type | | KCL/PHPA/Glycol | KCL/PHPA/Glycol | KCL/PHPA/Glycol | | | |
| Mud weight | ppg | 9.5 | 9.65 | 9.75 | | | |
| Solids | % | 4.0 | 6.0 | 6.7 | | | |
| Chlorides | mg/L | 36500 | 42000 | 42000 | | | |
| Rm | Ohm.m | N/A | N/A | N/A | | | |
| Rmf | Ohm.m | N/A | N/A | N/A | | | |
| Rmc | Ohm.m | N/A | N/A | N/A | | | |

| | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Potassium | % | 7.0 | 7.0 | 7.0 | | | | | | | |
| **Environmental data** | | | | | | | | | | | |
| **GR** | | | | | | | | | | | |
| Mud weight | ppg | 9.5 | 9.65 | 9.75 | | | | | | | |
| Bit size | in. | 12.25 | 12.25 | 12.25 | | | | | | | |
| **Resistivity** | | | | | | | | | | | |
| **Neutron porosity** | | | | | | | | | | | |
| Hole Size | in. | N/A | N/A | N/A | | | | | | | |
| Mud weight | ppg | N/A | N/A | N/A | | | | | | | |
| Temperature | ºC | N/A | N/A | N/A | | | | | | | |
| Mud salinity | ppk | N/A | N/A | N/A | | | | | | | |
| Formation salinity | | | | | | | | | | | |
| Recording rate 1 | SEC | 8 sec. | 8 sec. | 8 sec. | | | | | | | |
| Recording rate 2 | SEC | N/A | N/A | N/A | | | | | | | |
| Filtering GR | | 3 pt. | 3 pt. | 3 pt. | | | | | | | |
| Filtering density | | N/A | N/A | N/A | | | | | | | |
| Filtering Neutron | | N/A | N/A | N/A | | | | | | | |
| Company representative | | R. Morris | G. Sharkey | | | | | | | | |
| Anadrill personnel | | J. Dolan | M. Y. Tan | C. Soper | D. Hay | | | | | | |



| OTHER SERVICES FOR RUN2 | OTHER SERVICES FOR RUN3 | OTHER SERVICES FOR RUN4 |
|---|---|---|
| Directional Drilling<br>D&I Survey<br>Gamma Ray | Directional Drilling<br>D&I Survey<br>Gamma Ray | Directional Drilling<br>D&I Survey<br>Gamma Ray |
| REMARKS: RUN NUMBER 2 | REMARKS: RUN NUMBER 3 | REMARKS: RUN NUMBER 4 |
| 12 1/4 in. hole section was drilled from 761.0 m to 1737.0 m.<br><br>Depth is referenced to Driller's Depth.<br><br>All data presented was acquired in Real Time.<br><br>GR corrected for Mud Weight, Tool and Bit Size.<br><br>Mud type is KCL/PHPA/Glycol.<br>Barite was present in the mud system.<br><br>POOH at 1737.0 m to change bit.<br><br>Intermittent loss of GR data caused by tool problems with flow rates.<br><br>Thank you for choosing Schlumberger. | 12 1/4 in. hole section was drilled from 1737.0 m to 2073.0 m.<br><br>Depth is referenced to Driller's Depth.<br><br>All data presented was acquired in Real Time.<br><br>GR corrected for Mud Weight, Tool and Bit Size.<br><br>Mud type is KCL/PHPA/Glycol.<br>Barite was present in the mud system.<br><br>POOH at 2073.0 m to change bit.<br><br>Thank you for choosing Schlumberger. | 12 1/4 in. hole section was drilled from 2073.0 m to 2532.0 m.<br><br>Depth is referenced to Driller's Depth.<br><br>All data presented was acquired in Real Time.<br><br>GR corrected for Mud Weight, Tool and Bit Size.<br><br>Mud type is KCL/PHPA/Glycol.<br>Barite was present in the mud system.<br><br>POOH at 2532.0 m due to section TD.<br><br>Thank you for choosing Schlumberger. |

# EQUIPMENT DESCRIPTION

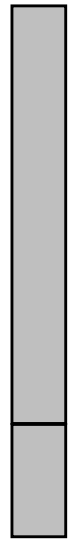
| RUN2 | RUN3 | RUN4 |
|---|---|---|
| DOWNHOLE EQUIPMENT | DOWNHOLE EQUIPMENT | DOWNHOLE EQUIPMENT |

DOWNHOLE EQUIPMENT

8−1/4 in. PowerPulse* — 24.75

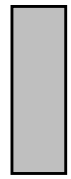
MDC 23326
MEC 612BB
MDI 626BC
MGR 295AA
Software: V7.0C00

D&I — 20.44
GR — 19.80



8−1/4 in. NM Pony Collar — 16.30

S/N: 6893C



11−7/8 in. Stabilizer — 13.63

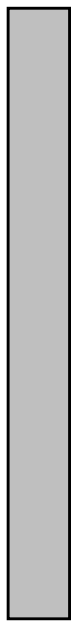
S/N: 6403

8 in. Float Sub — 11.14

S/N: ASQ990301

PowerPak* Mud Motor — 10.04

A962XP S/N: N7225
1.15 deg Bend
12−1/8 in. Motor Sleeve



Reed−Hycalog PDC Bit — 0.00 — 0.33

RHX192 S/N: 206985
OD 12−1/4 in.

Maximum string diameter 12.25 in.

All lengths in Meters

DOWNHOLE EQUIPMENT

8 1/4 in. PowerPulse* — 24.70

MDC 883
MEC 212BA
MDI 1096BC
MGR 503AA
Software: V7.0C00

D&I — 20.41
GR — 19.77

8−1/4 in. NM Pony Collar — 16.30

S/N: 6893C

11−7/8 in. Stabilizer — 13.63

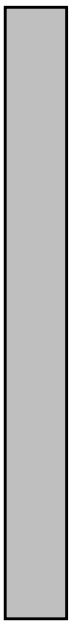
S/N: 6403

8 in. Float Sub — 11.14

S/N: ASQ990301

PowerPak* Mud Motor — 10.04

A962XP S/N: N7225
1.15 deg Bend
12−1/8 in. Motor Sleeve



Hughes Insert Bit — 0.00 — 0.33

MX20DX S/N: 6017688
OD 12−1/4 in.

Maximum string diameter 12.25 in.

All lengths in Meters

DOWNHOLE EQUIPMENT

8−1/4 in. PowerPulse* — 19.17

MDC 883
MEC 212BA
MDI 1096BC
MGR 503AA
Software: V7.0C00

D&I — 14.88
GR — 14.23

8−1/4 in. NM Pony Collar — 10.77

S/N: 6893C

AnderGauge Stabilizer — 8.10

OD 11−1/2 − 12−1/4 in
S/N: S13−056

8−1/4 in. NM Pony Collar — 4.76

S/N: 7505

12−3/16 in. Near Bit Stabilizer — 2.08

S/N: DOTS3214

Reed−Hycalog PDC Bit — 0.00 — 0.25

RSX162 S/N: 206982
OD 12−1/4 in.

Maximum string diameter 12.25 in.

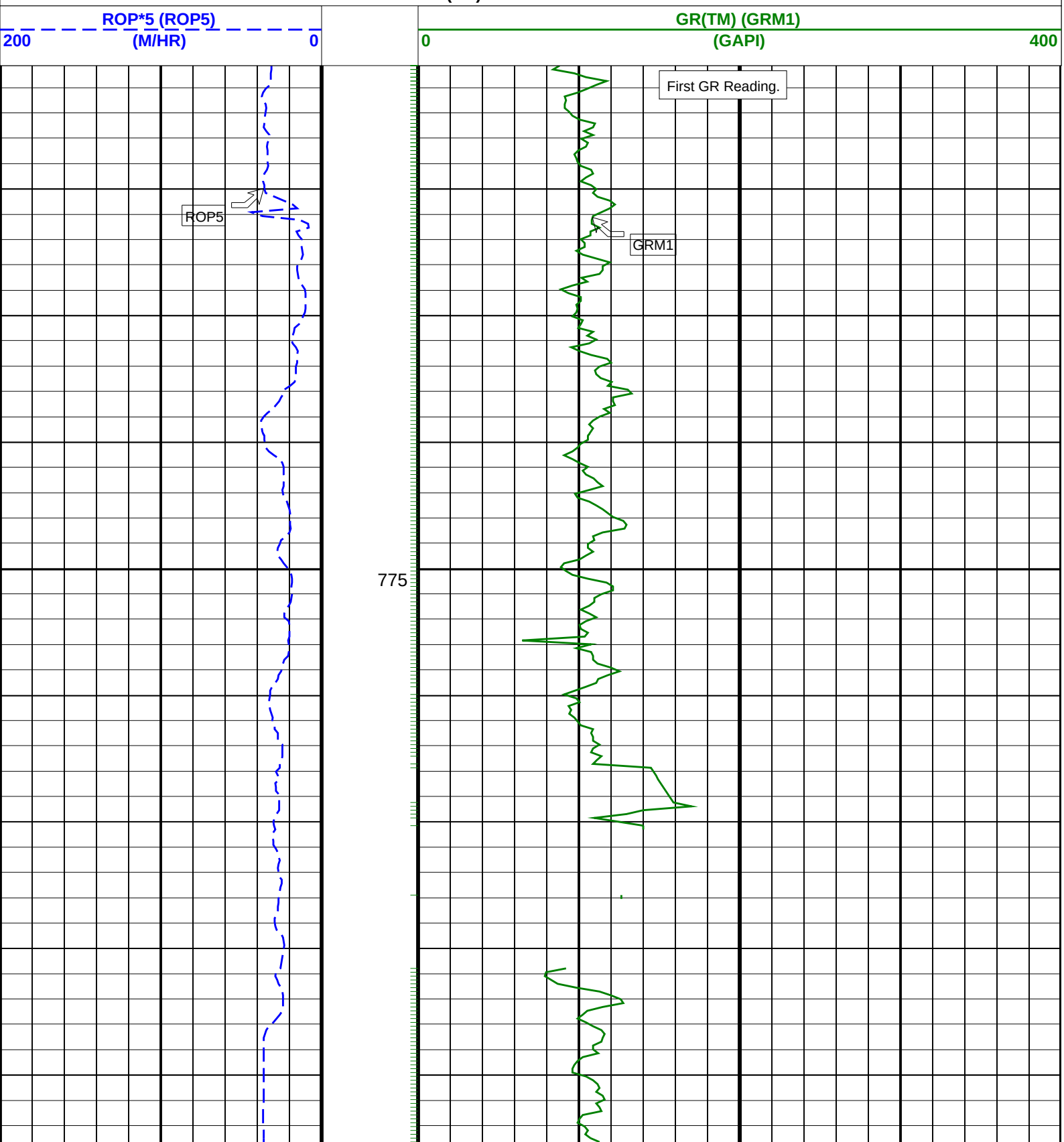
All lengths in Meters

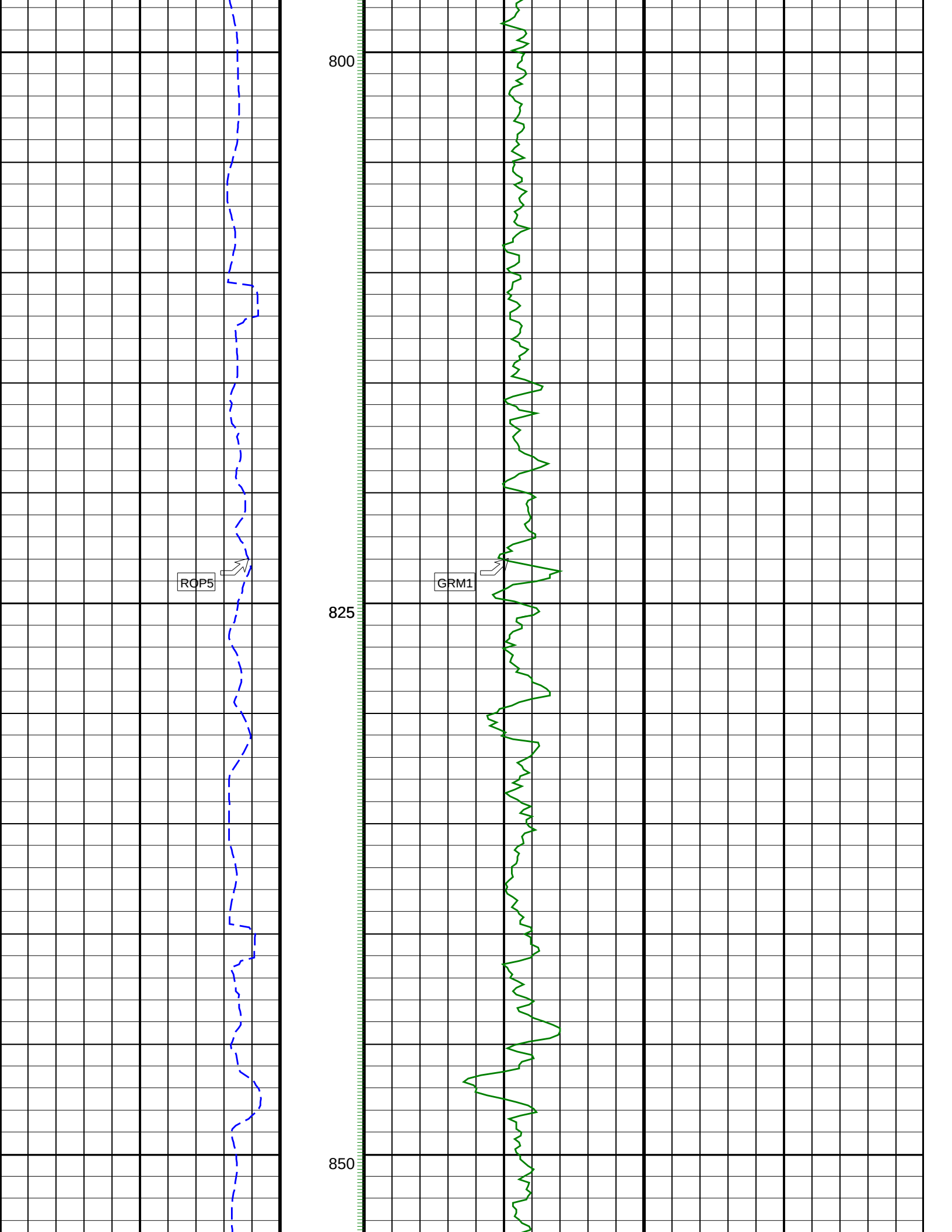
# West Moonfish−1 RT 1:200MD

IDEAL Version: ID9_1C_01 <MD > Vertical Scale: 1:200 Graphics File Created: 21−Jan−2005 03:32

PIP SUMMARY

GR(TM) PIP

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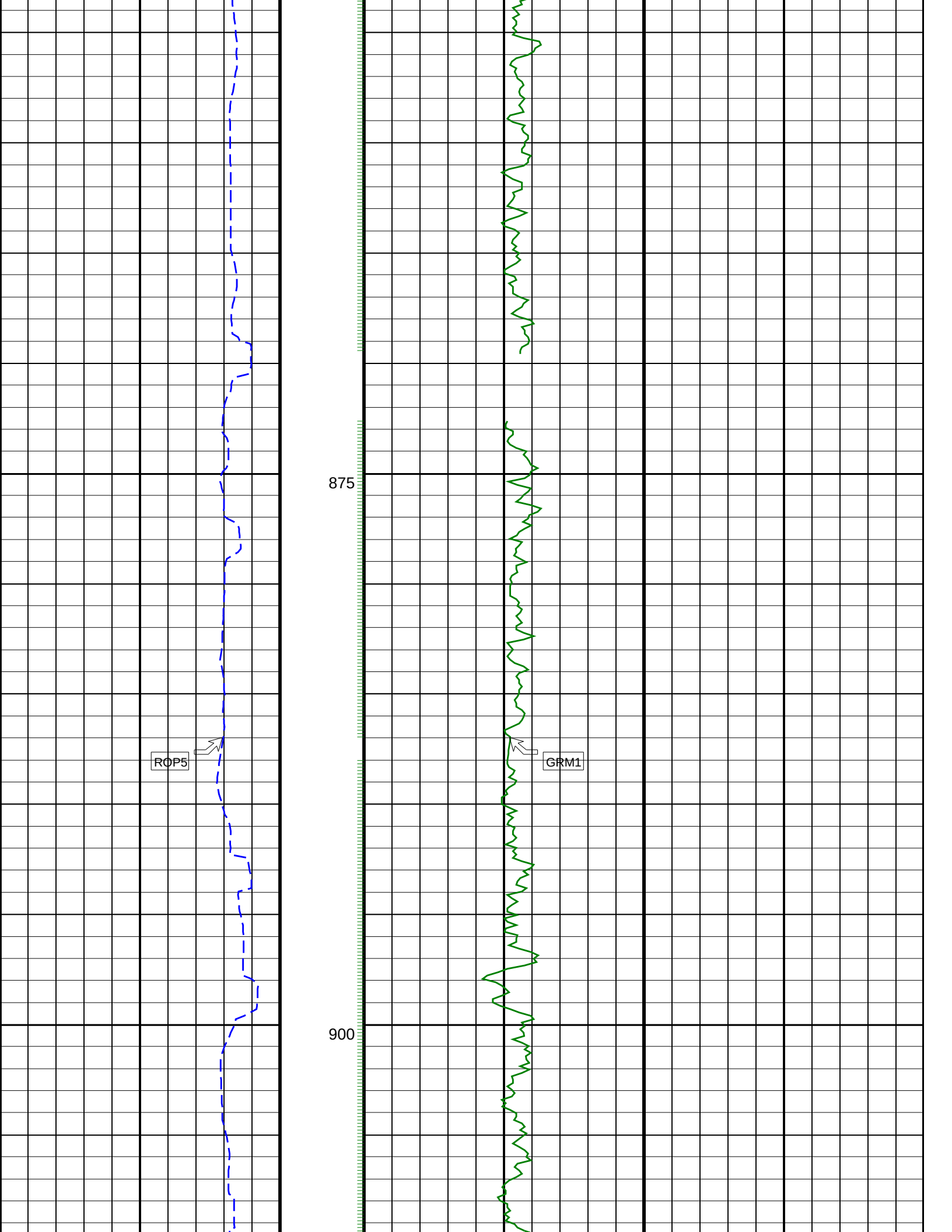
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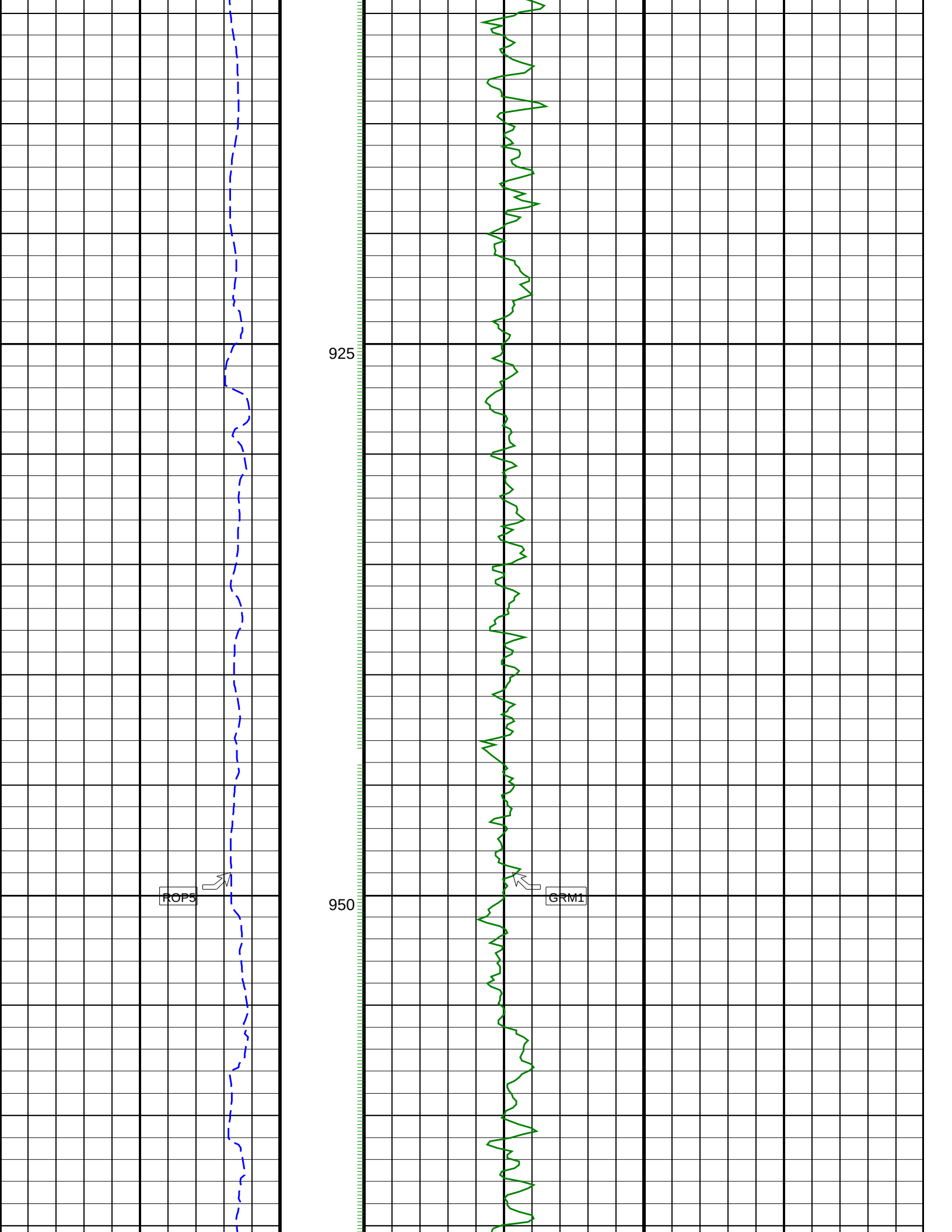
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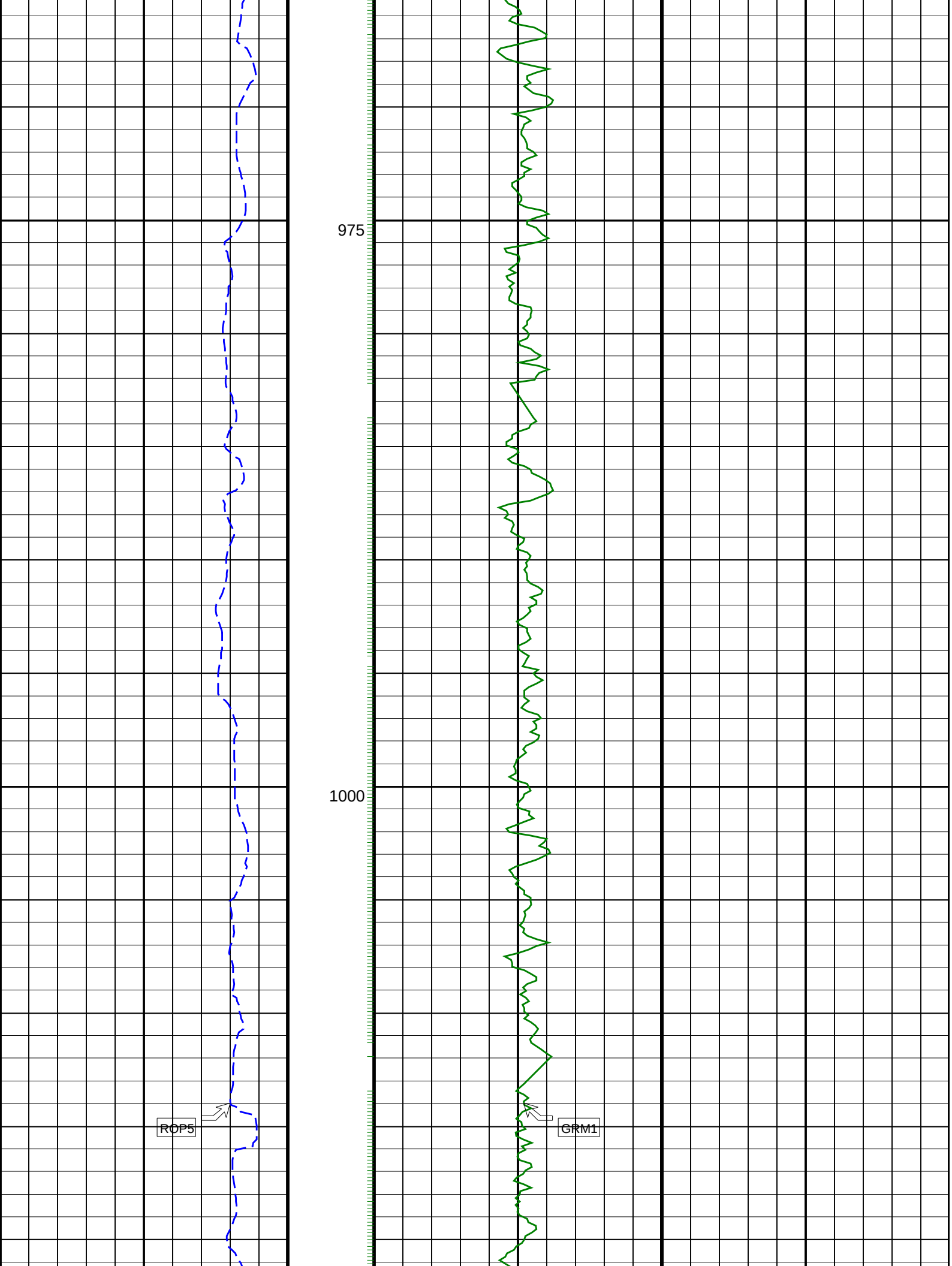
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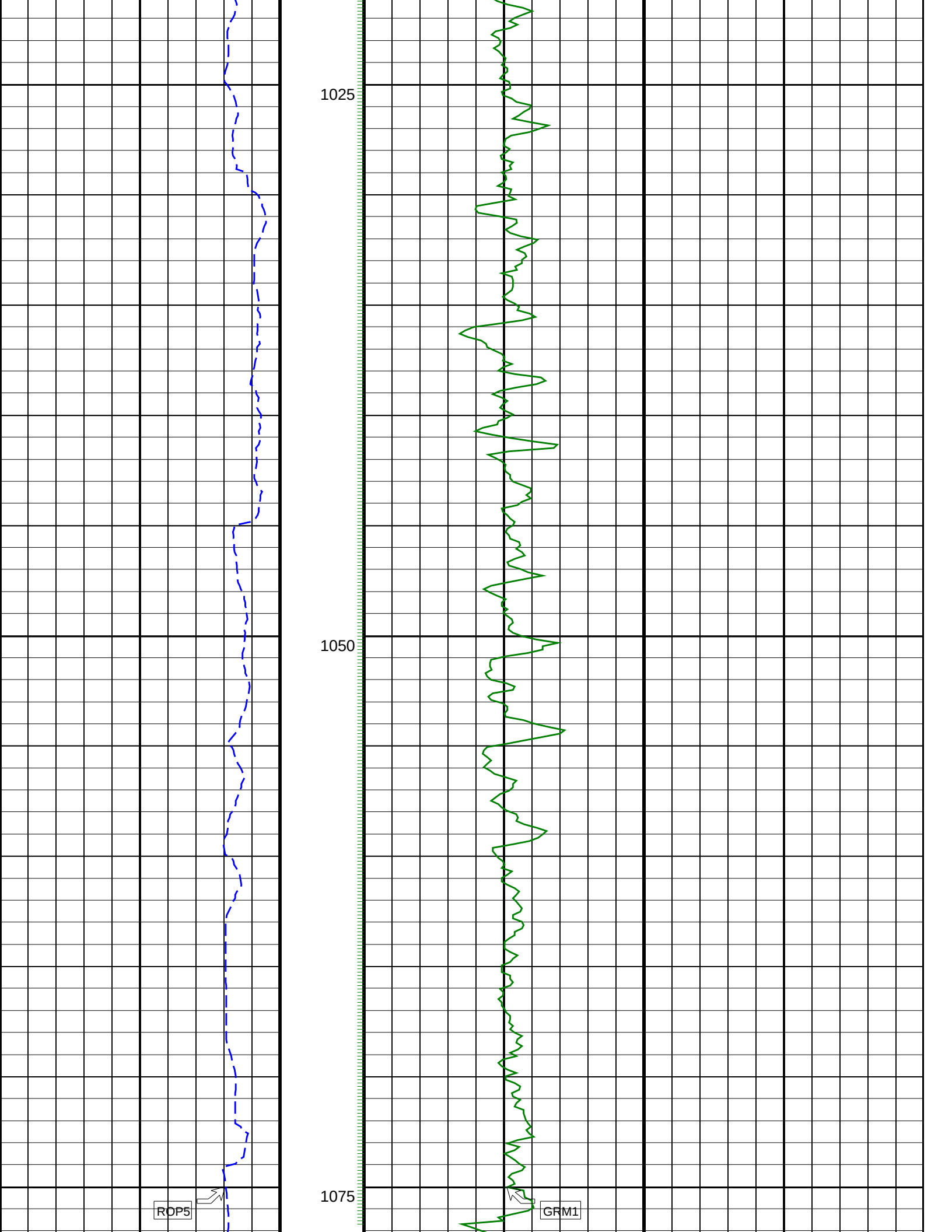
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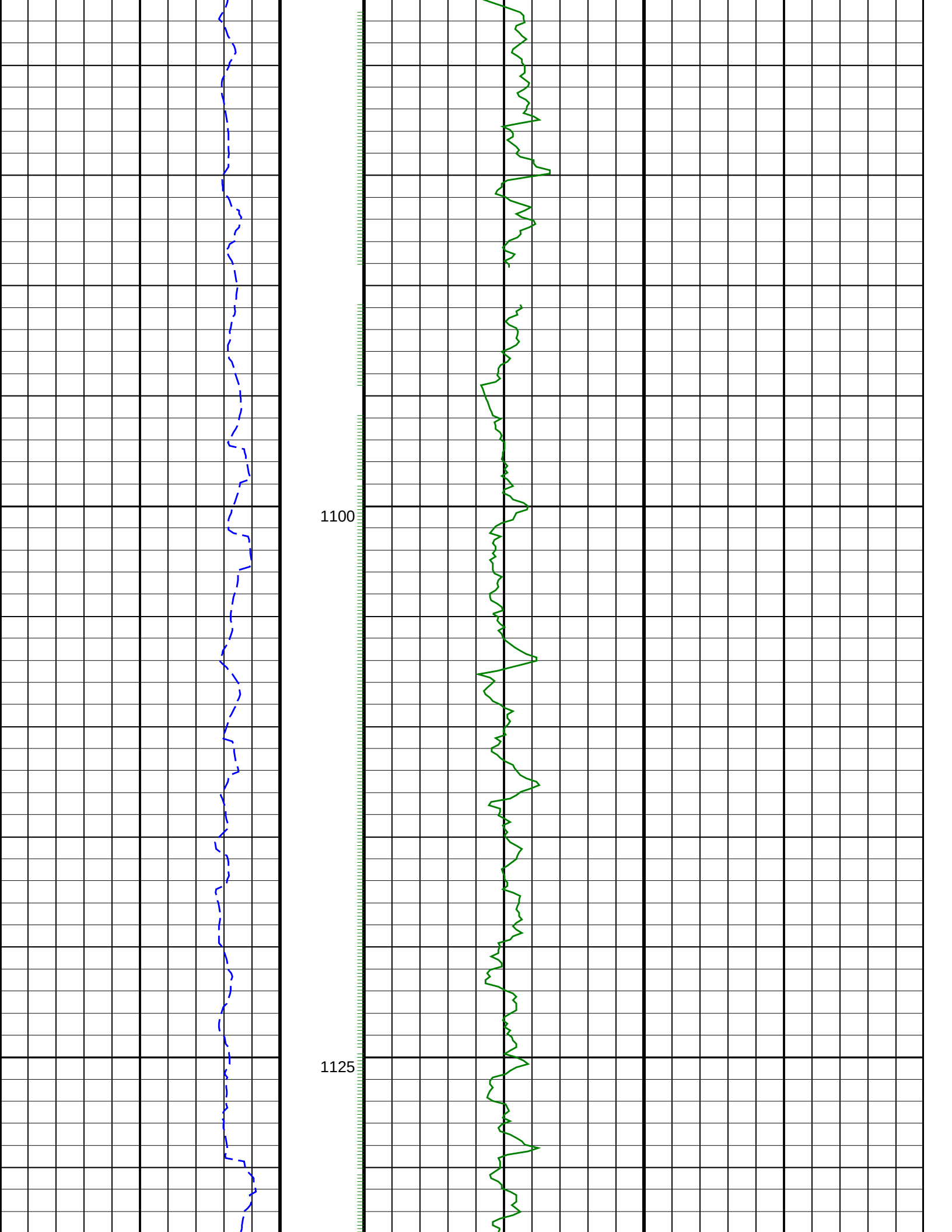
1050
1075
ROP5
GRM1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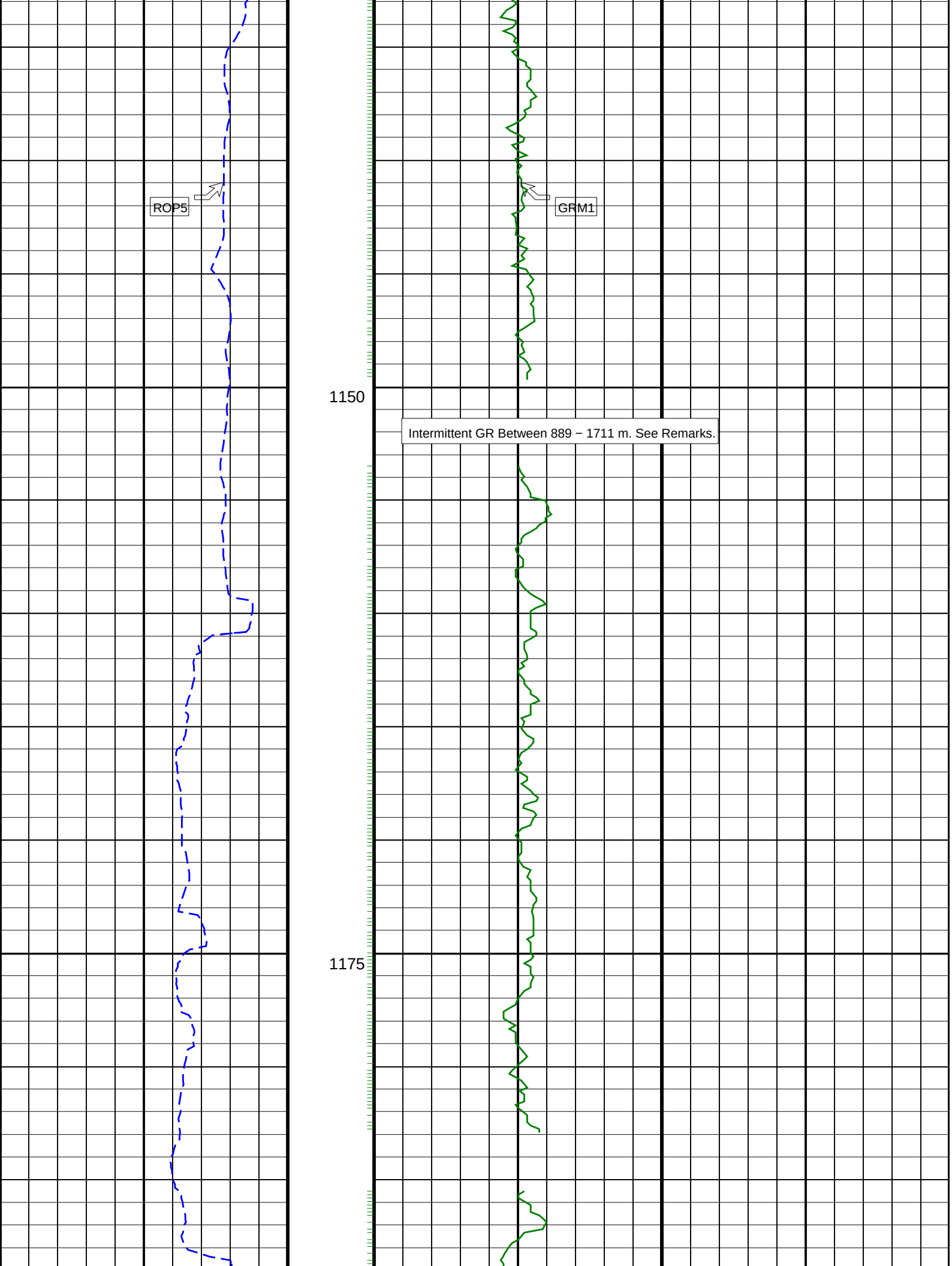
1125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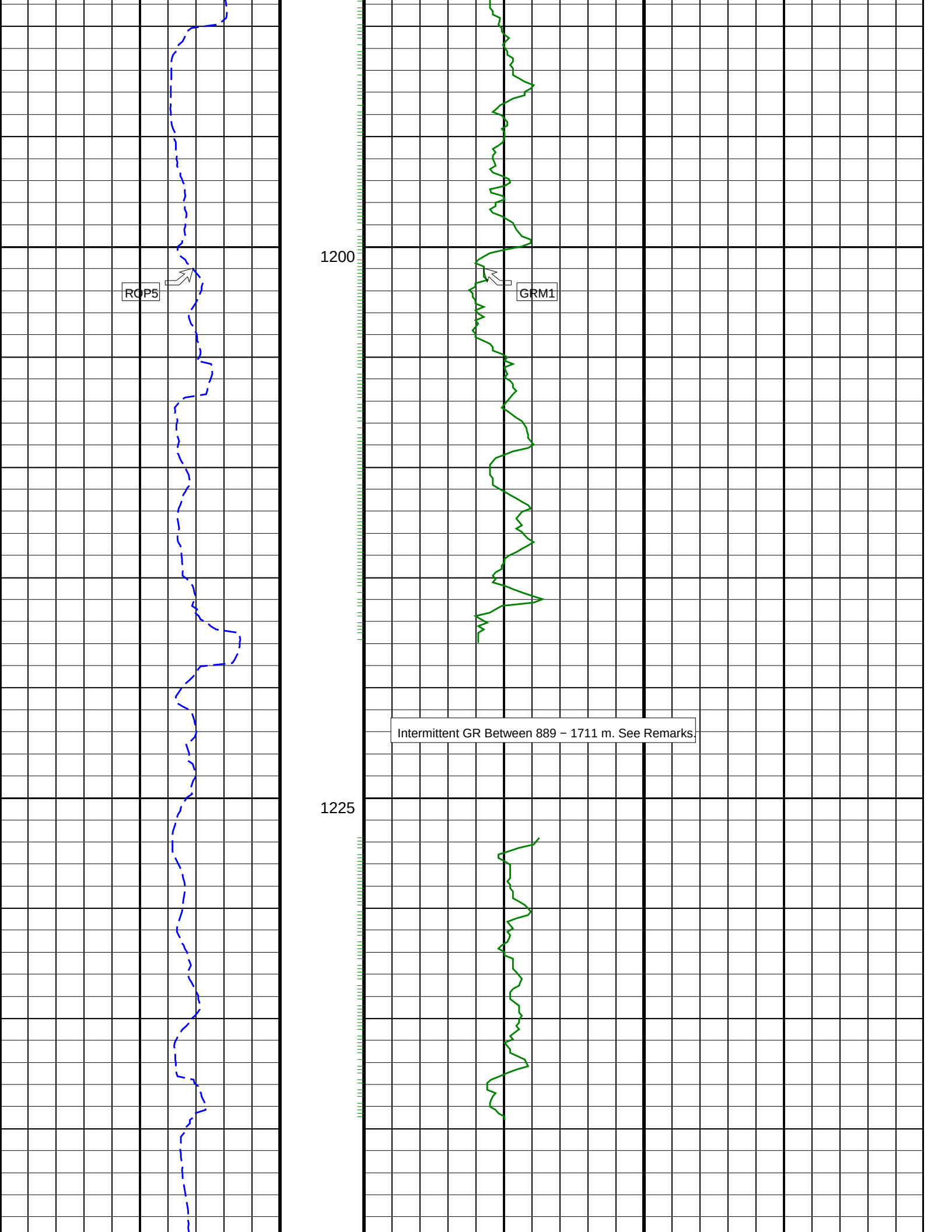
GRM1
1150
Intermittent GR Between 889 − 1711 m. See Remarks.
1175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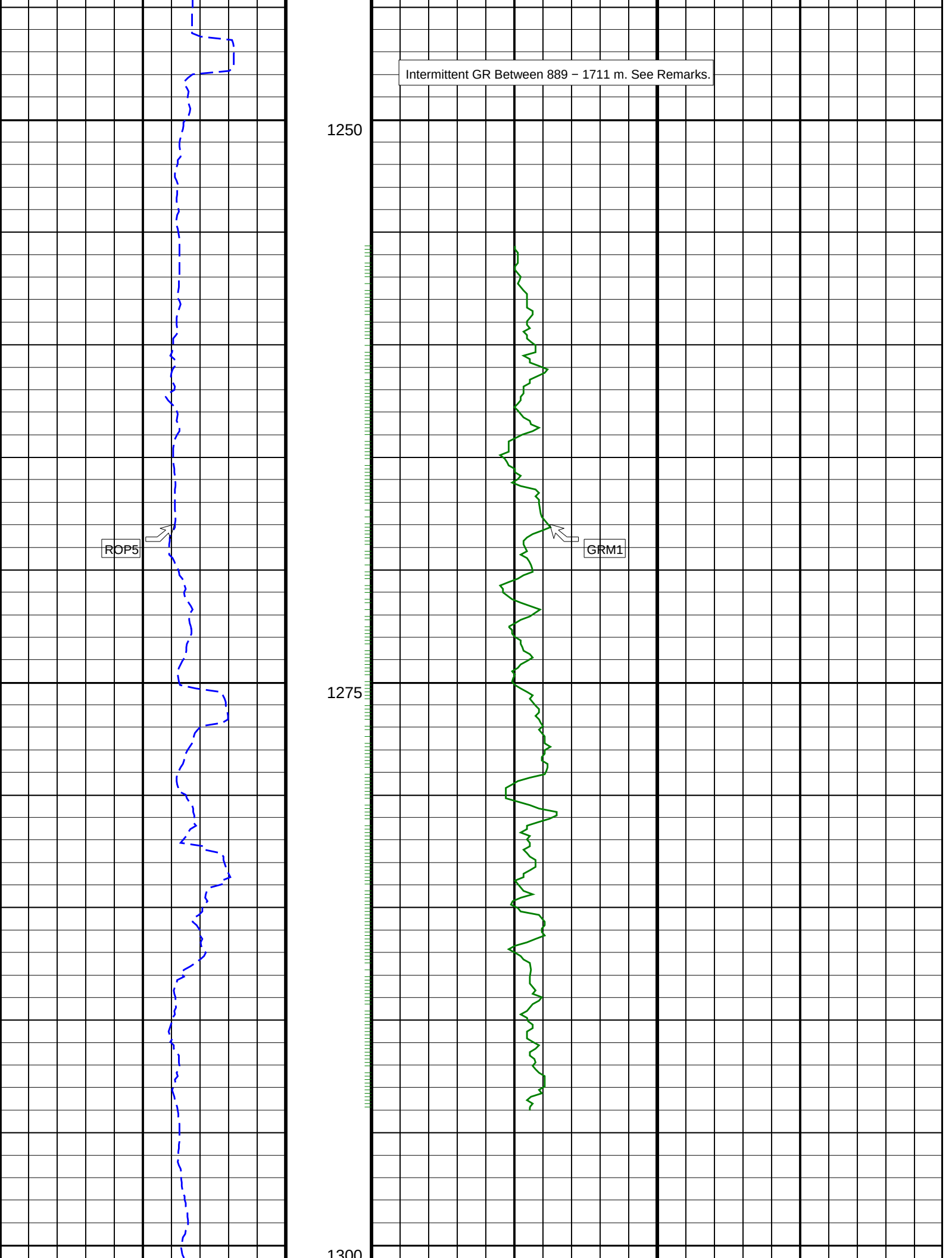
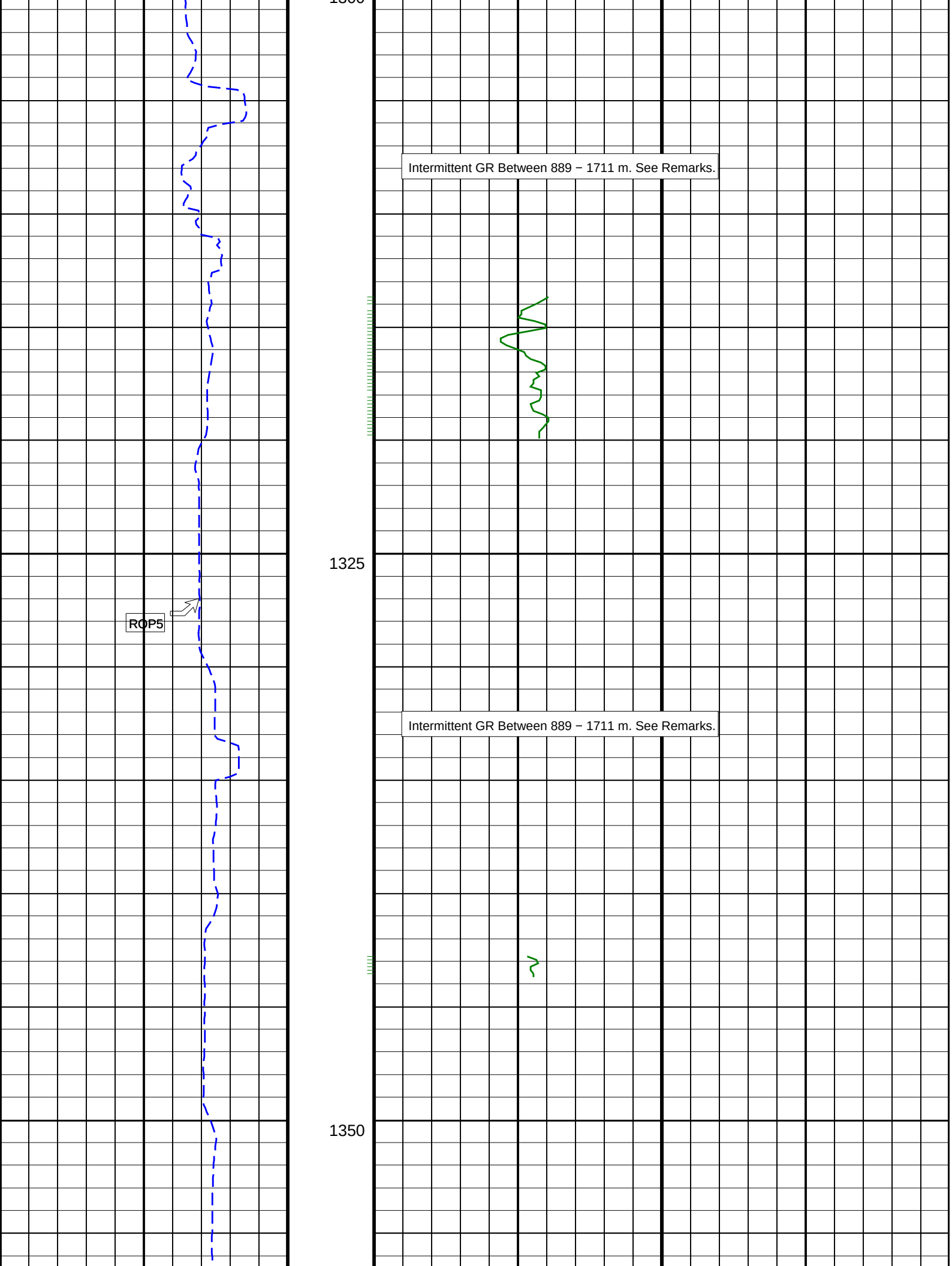
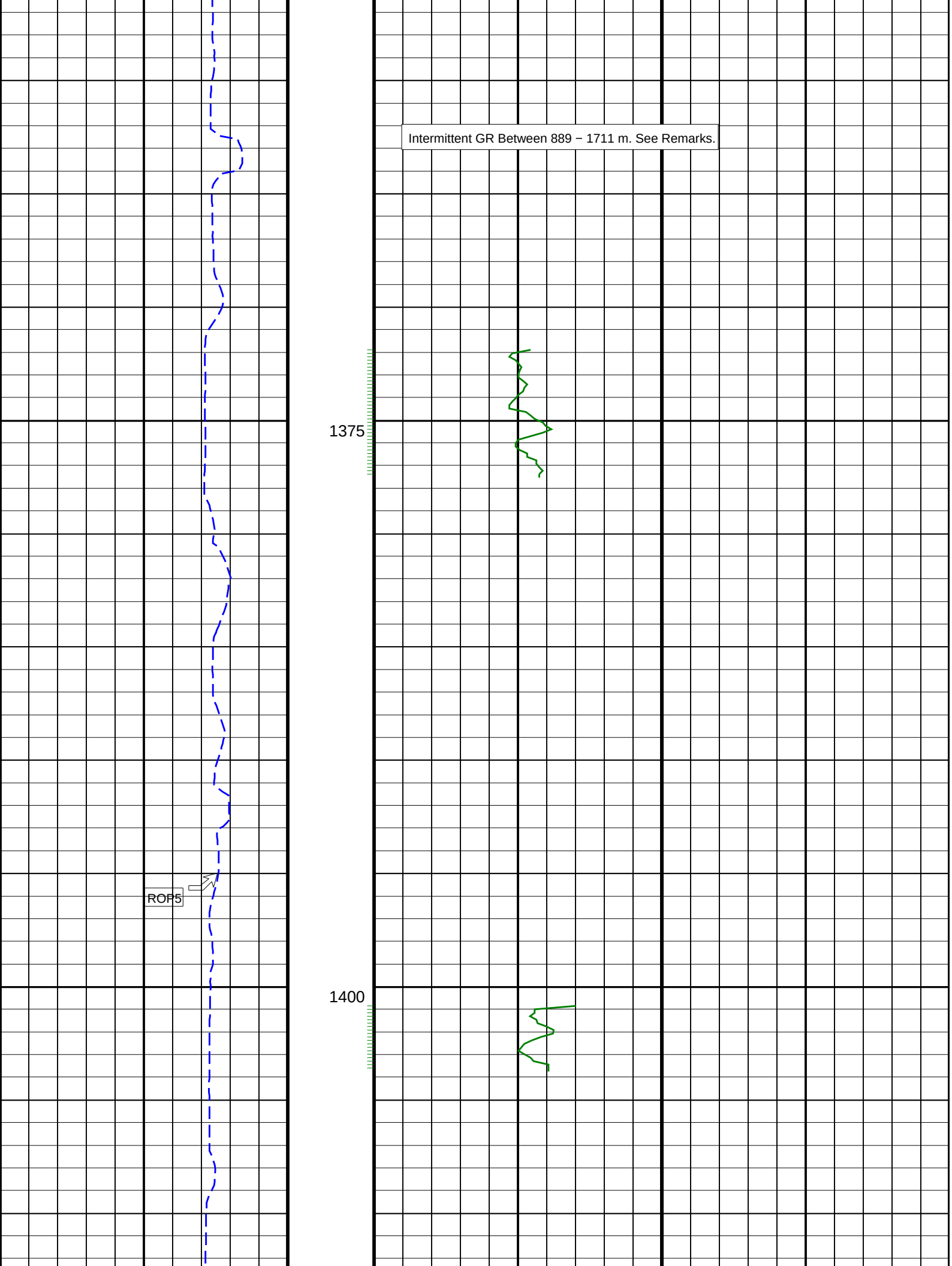

Intermittent GR Between 889 − 1711 m. See Remarks.
1250
1275
1300
ROP5
GRM1


Intermittent GR Between 889 − 1711 m. See Remarks.
1325
ROP5
Intermittent GR Between 889 − 1711 m. See Remarks.
1350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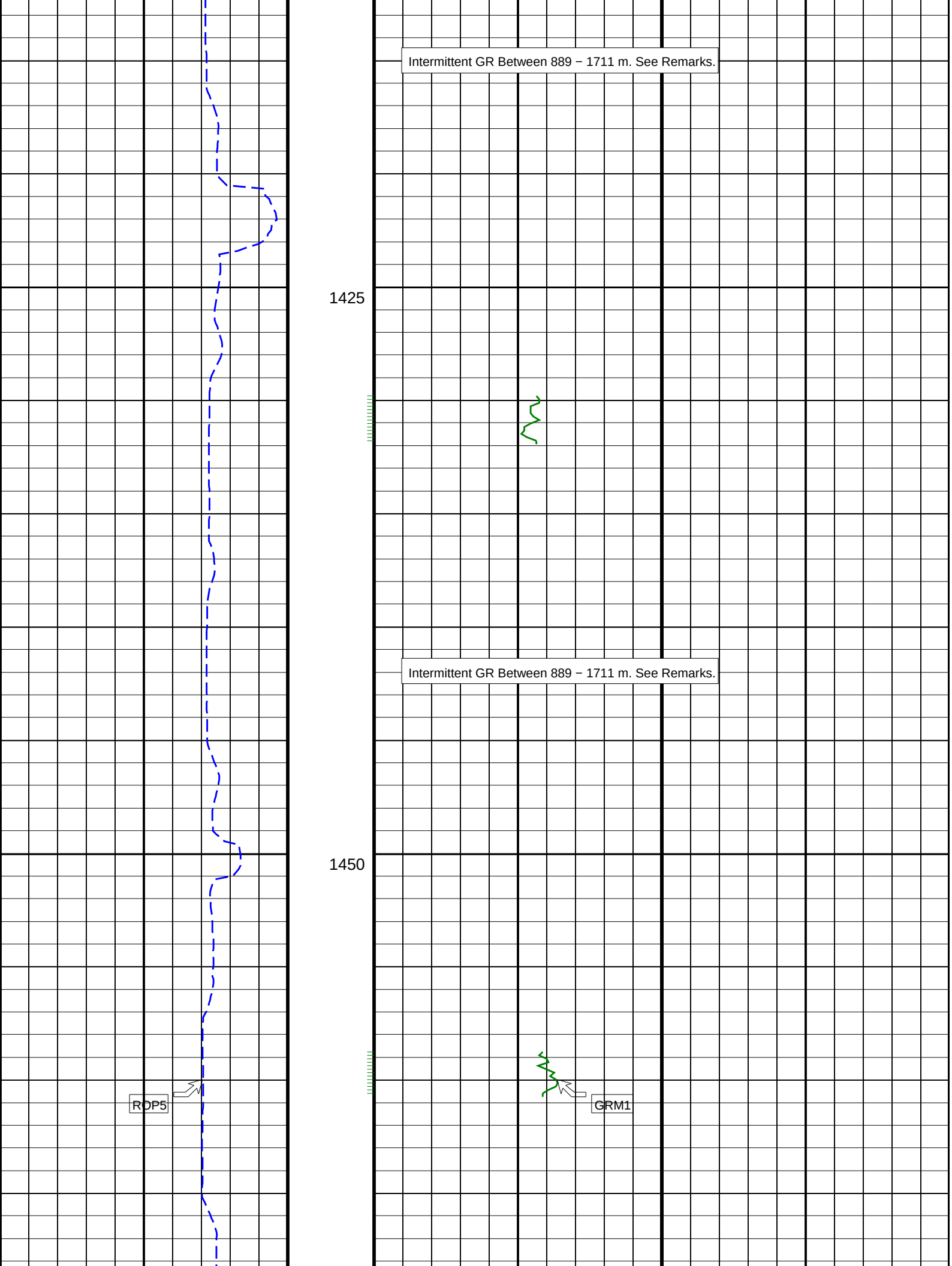
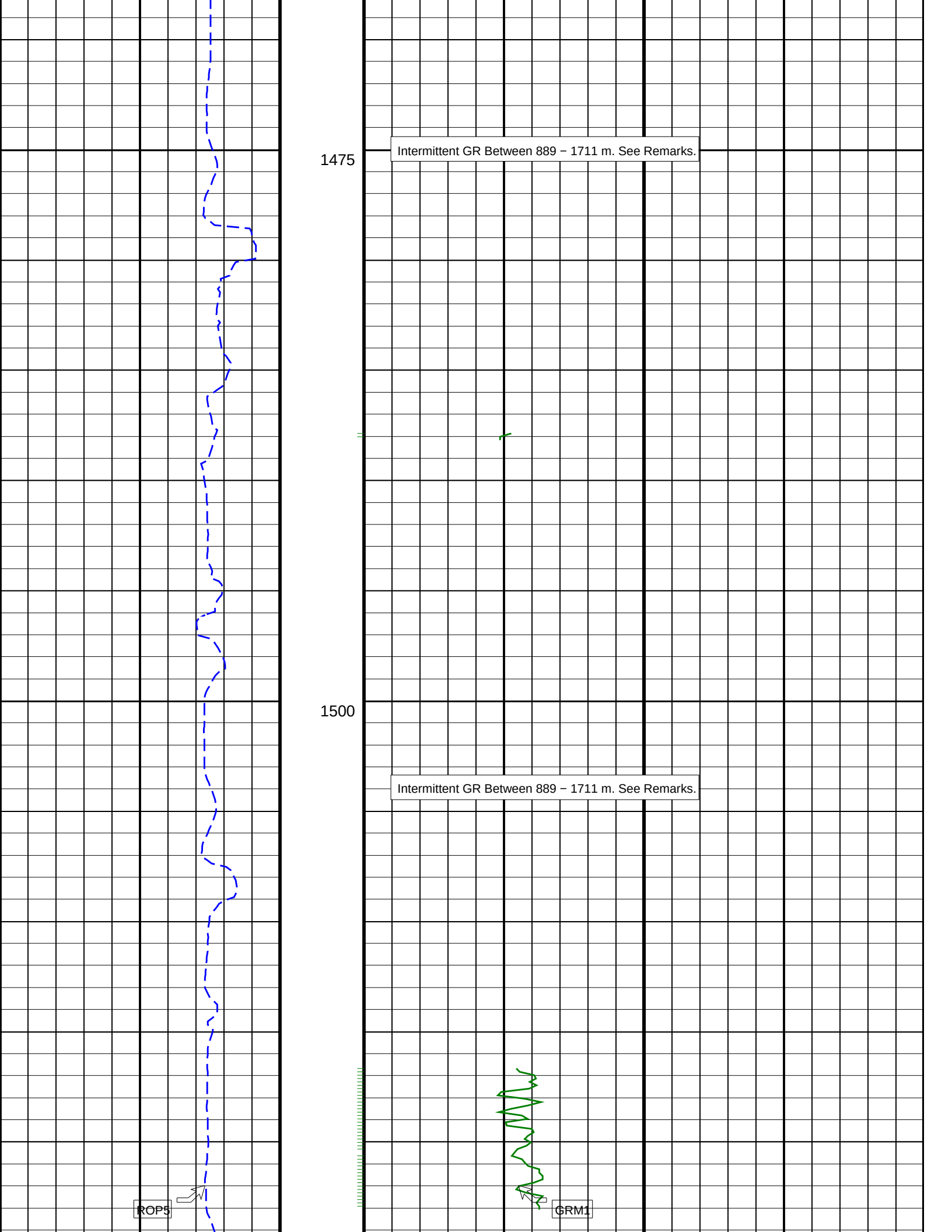

Intermittent GR Between 889 − 1711 m. See Remarks.
1425
Intermittent GR Between 889 − 1711 m. See Remarks.
1450
ROP5
GRM1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Intermittent GR Between 889 − 1711 m. See Remarks.
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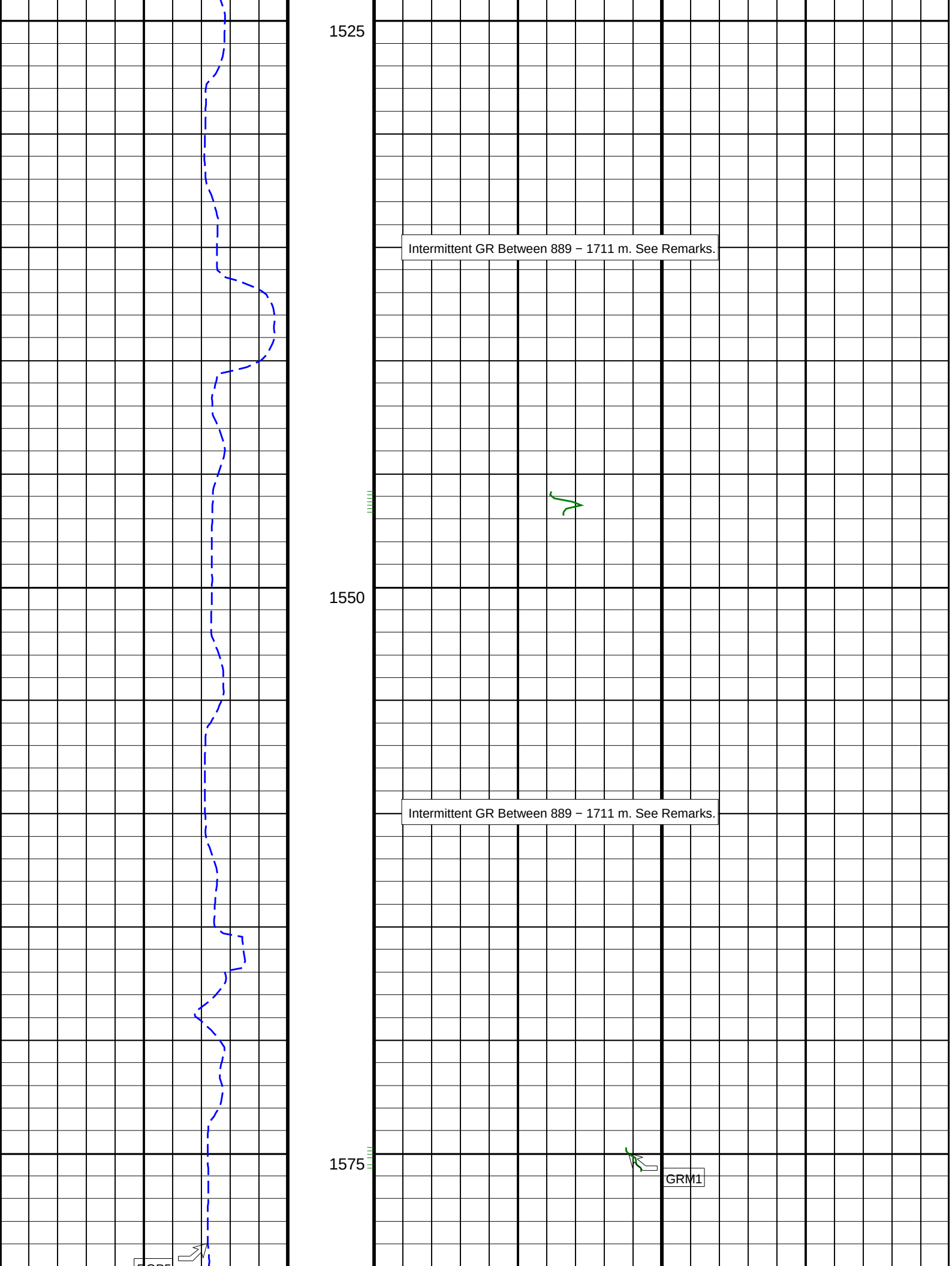
GRM1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Intermittent GR Between 889 − 1711 m. See Remarks.
1550
Intermittent GR Between 889 − 1711 m. See Remarks.
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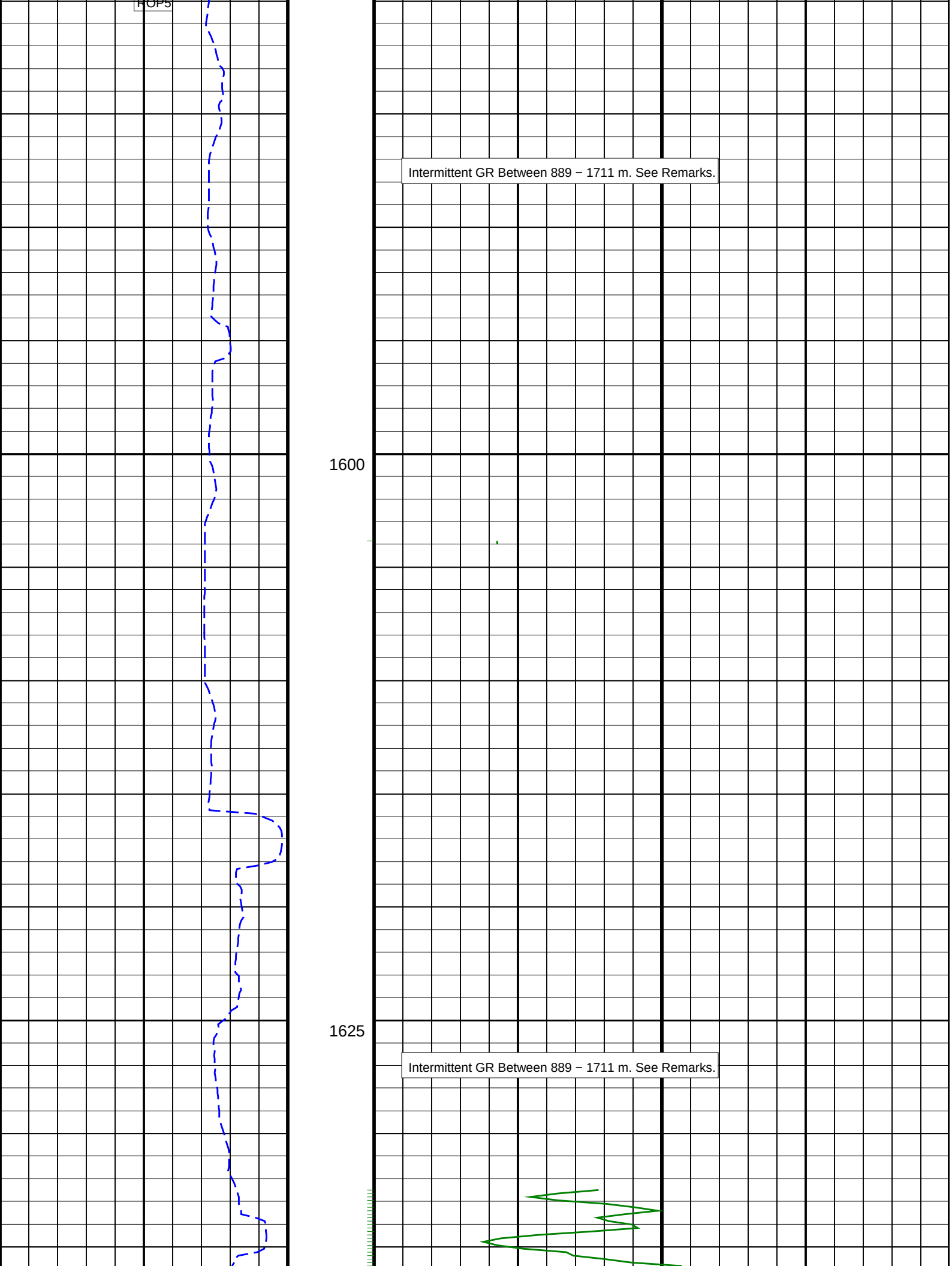
GRM1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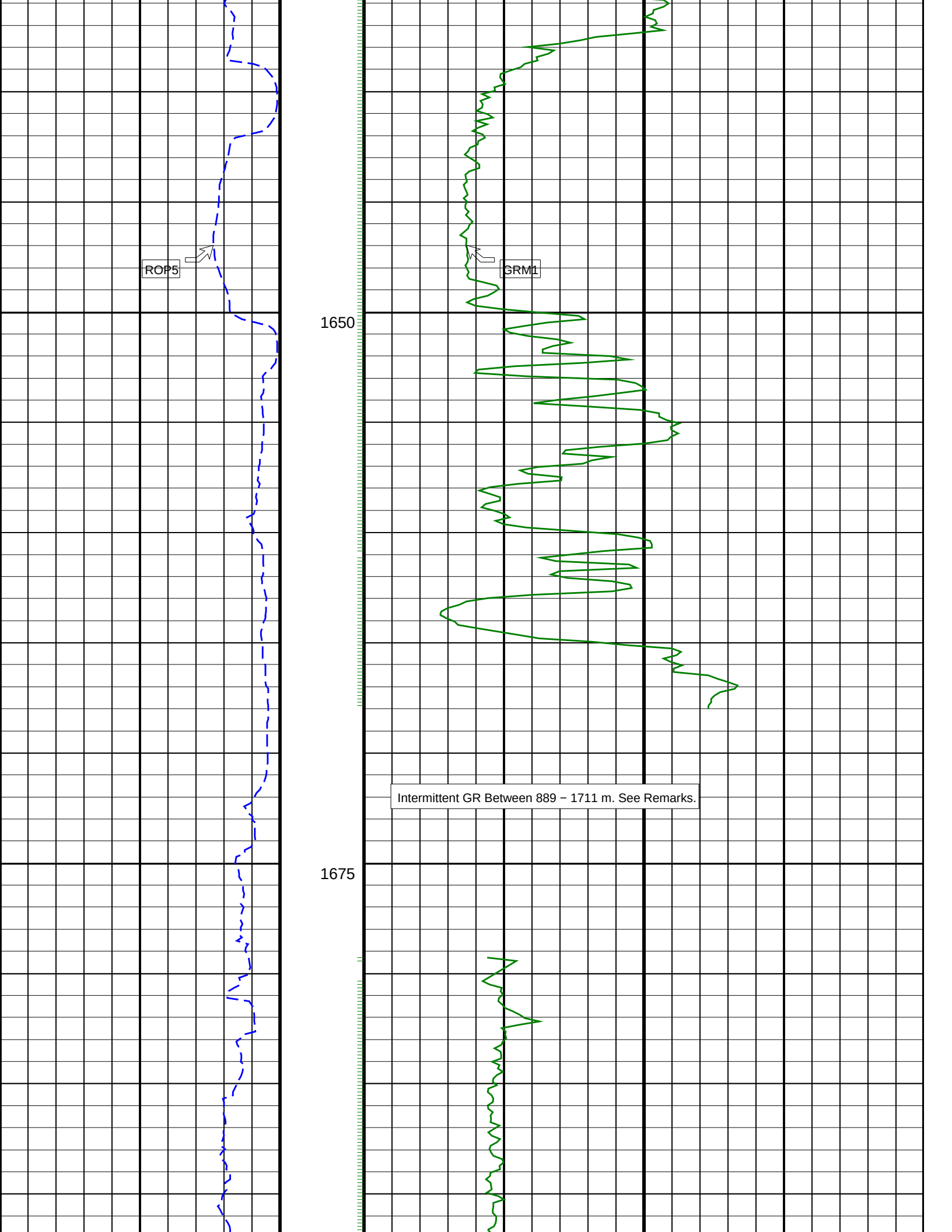
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GRM1
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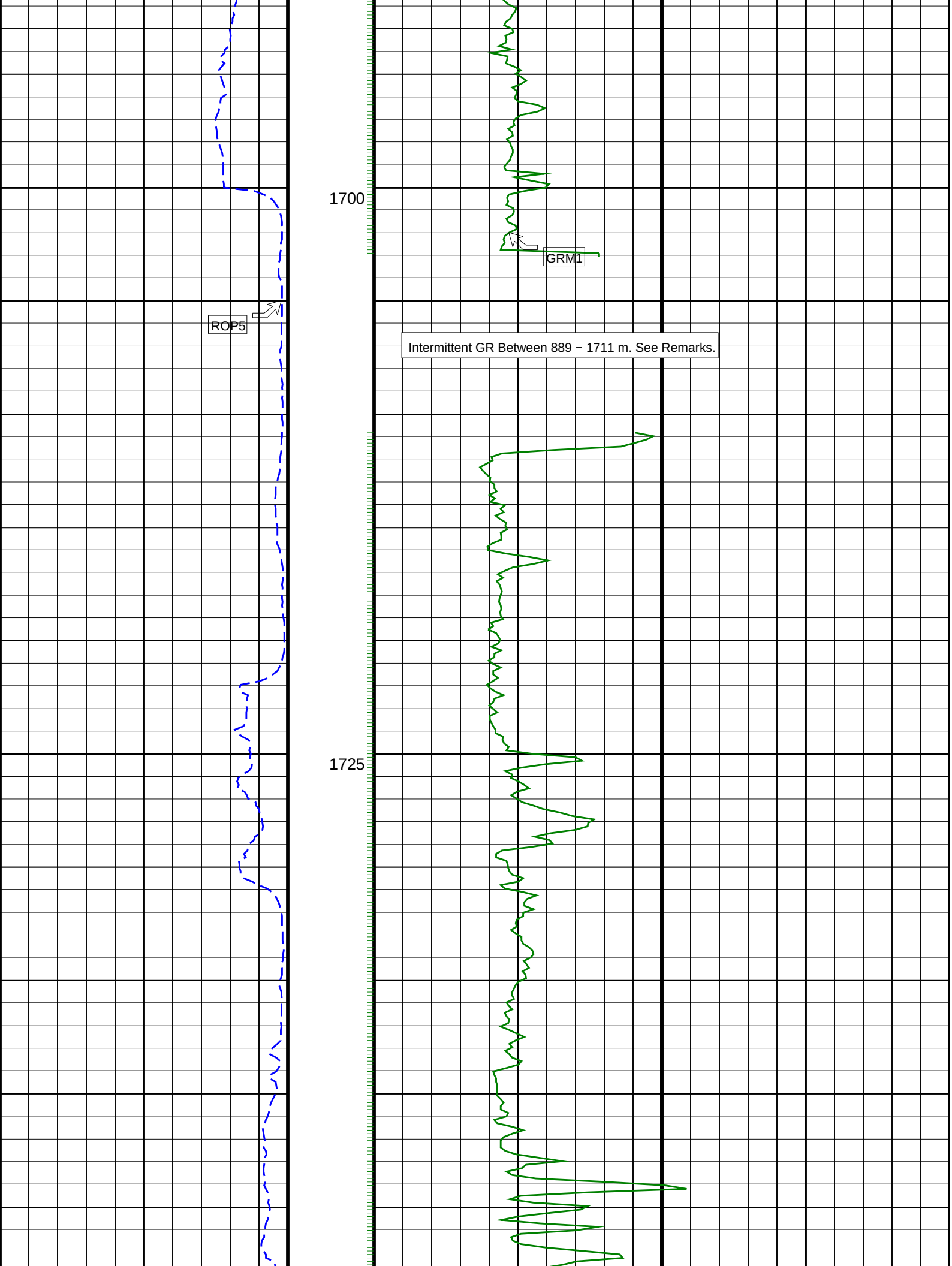
Intermittent GR Between 889 − 1711 m. See Remarks.
1675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GRM1
ROP5
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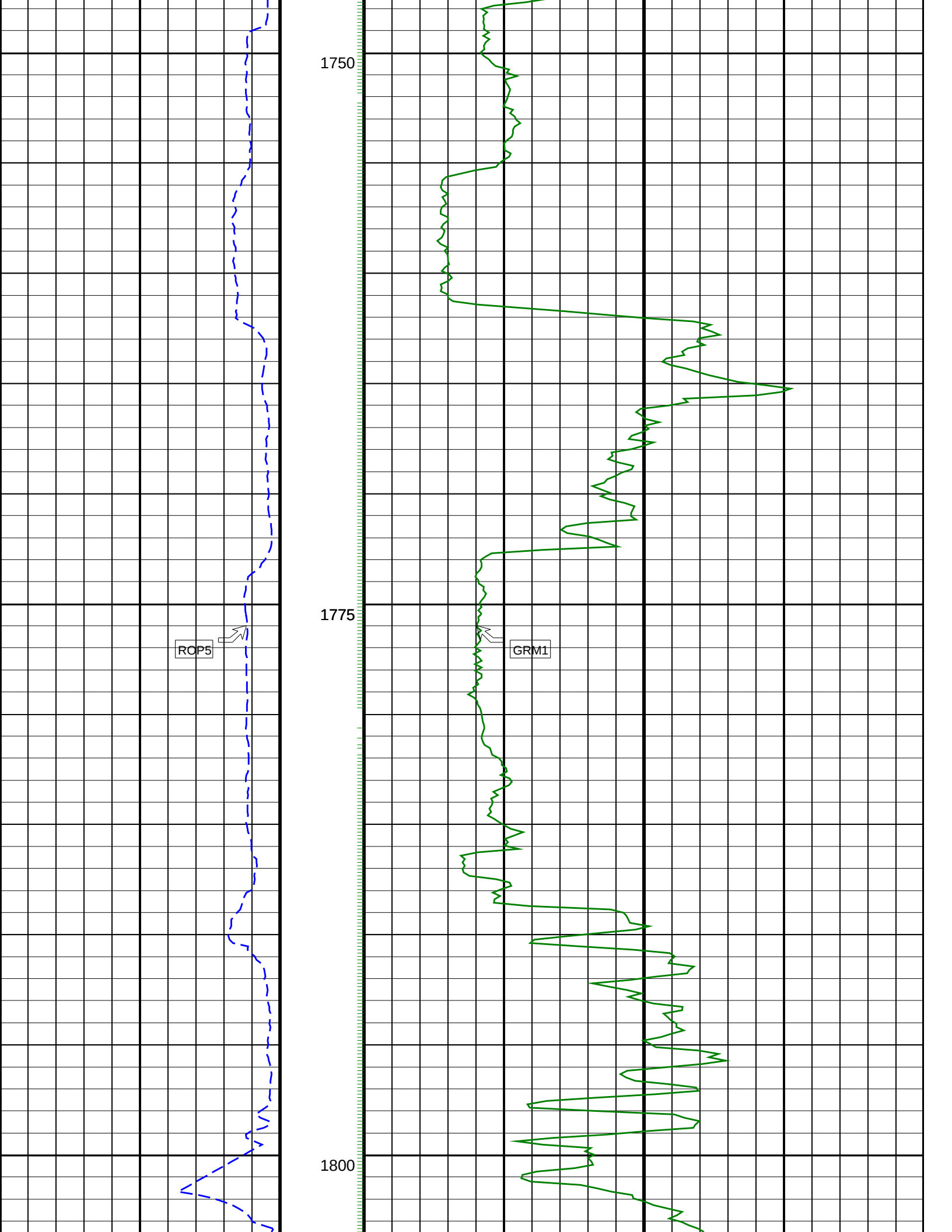
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1775
1800
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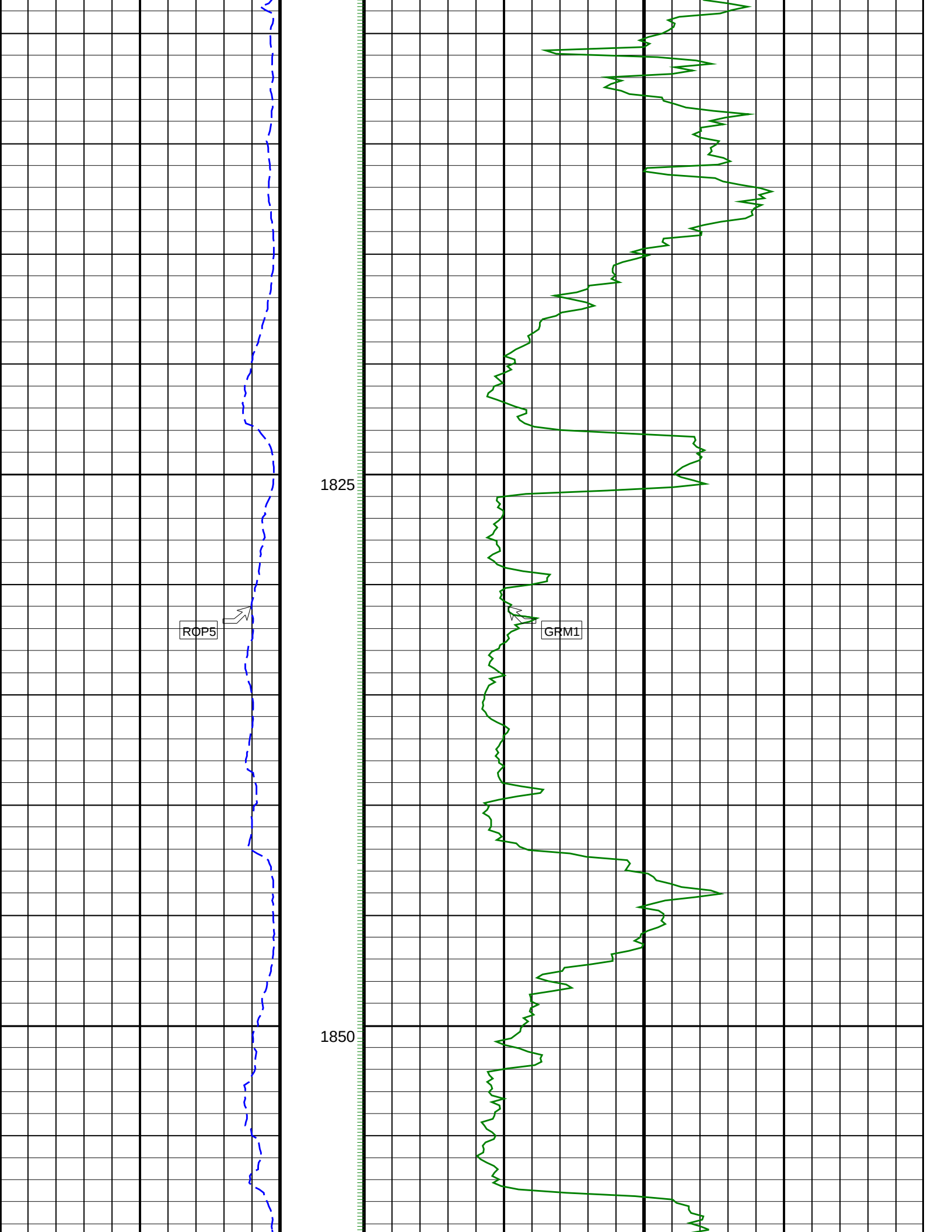
GRM1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1850
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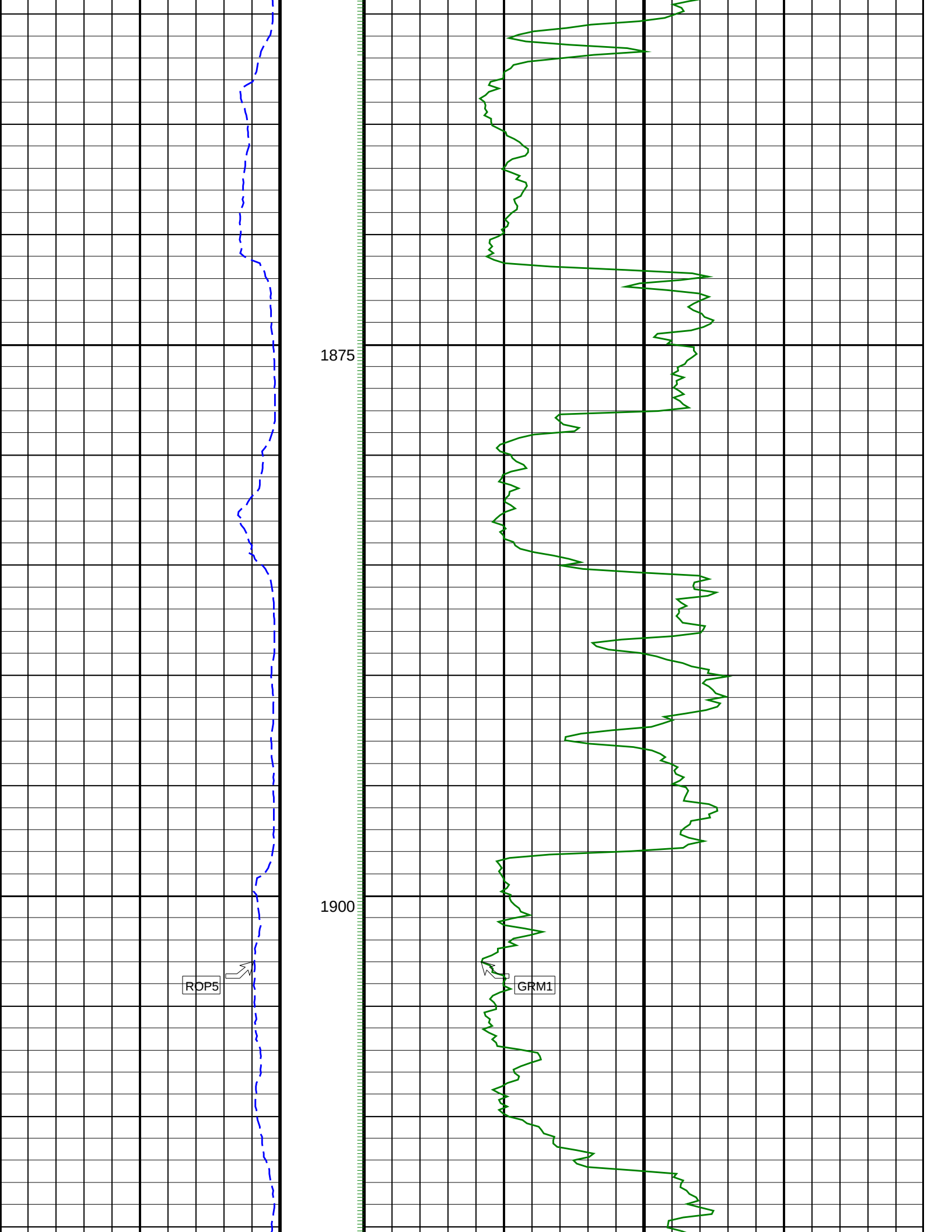
GRM1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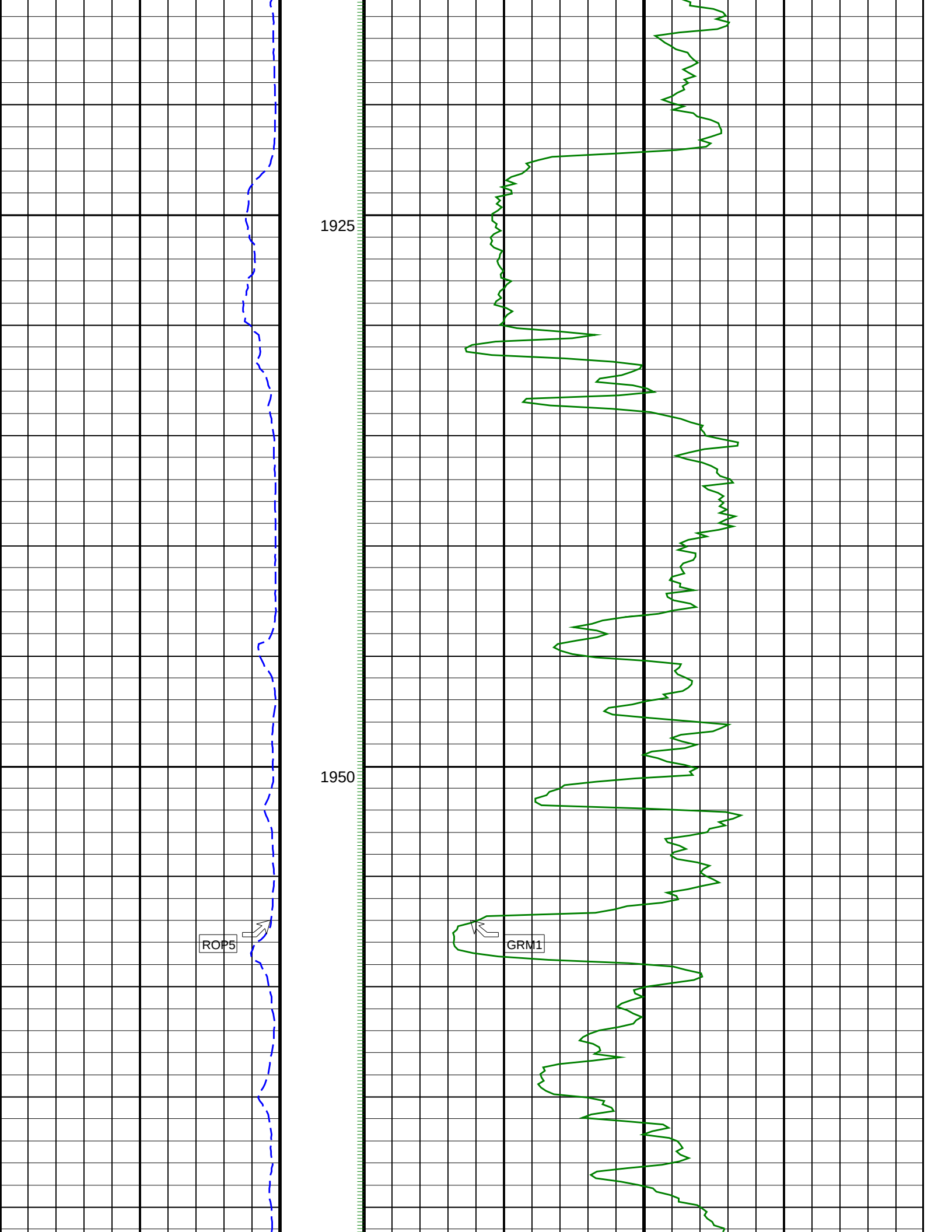
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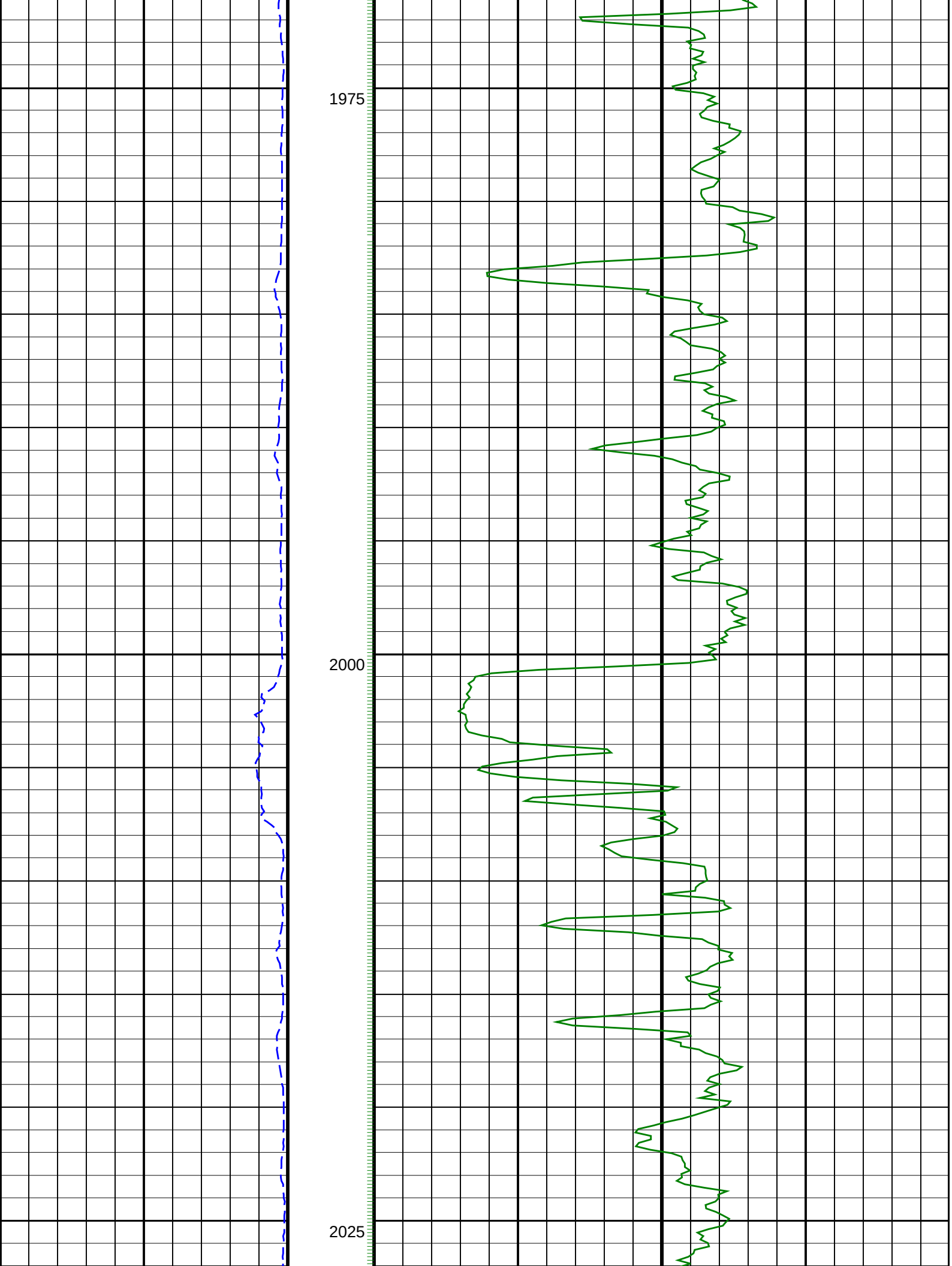
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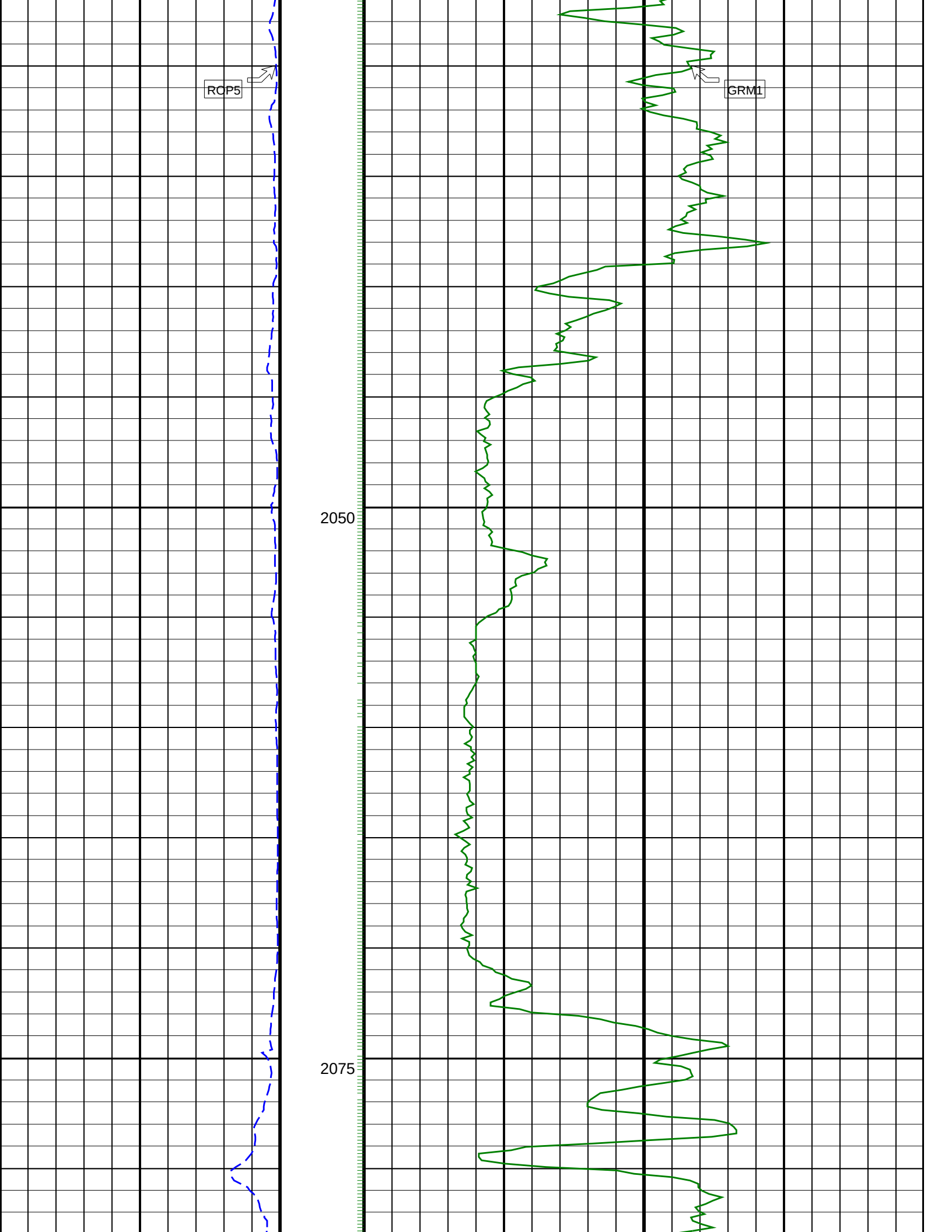
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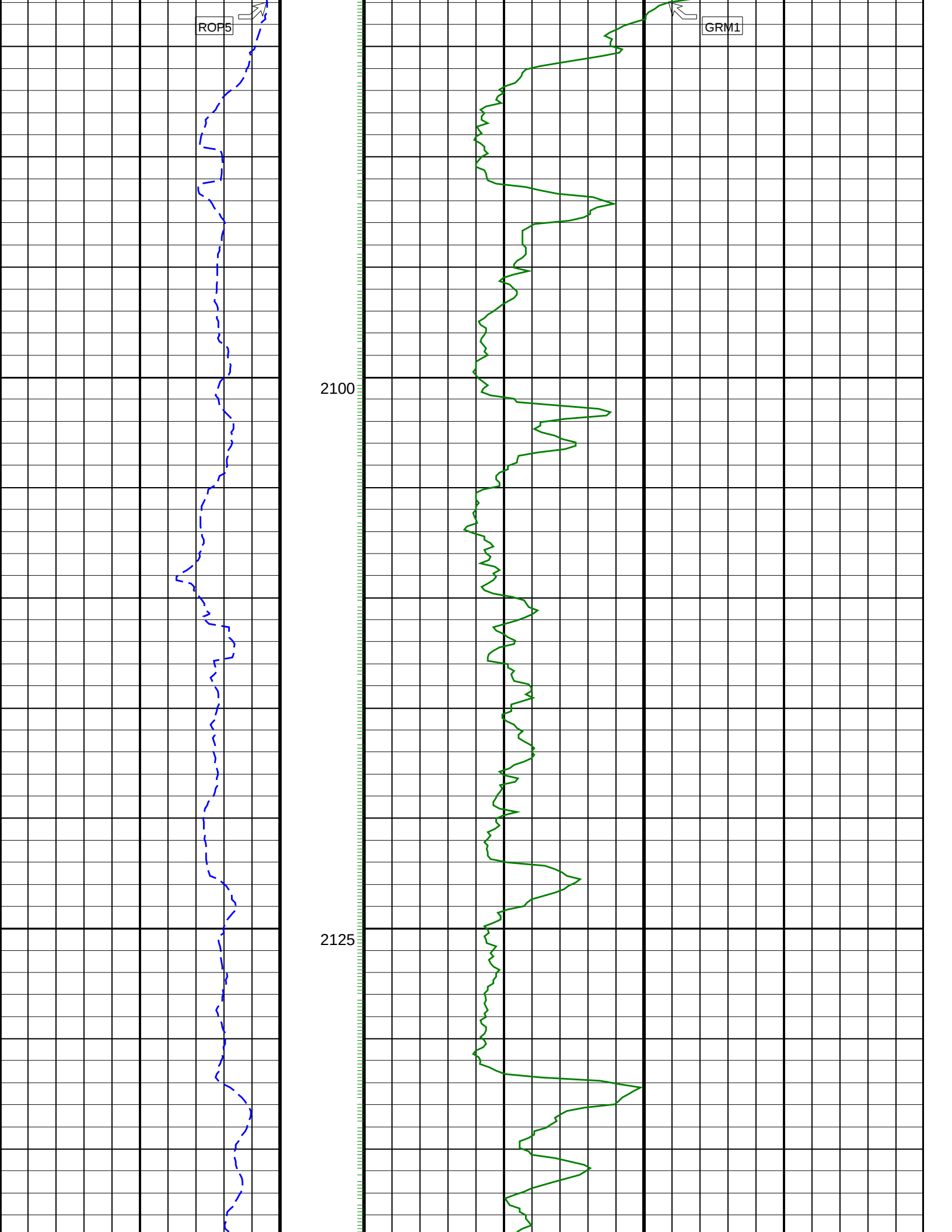
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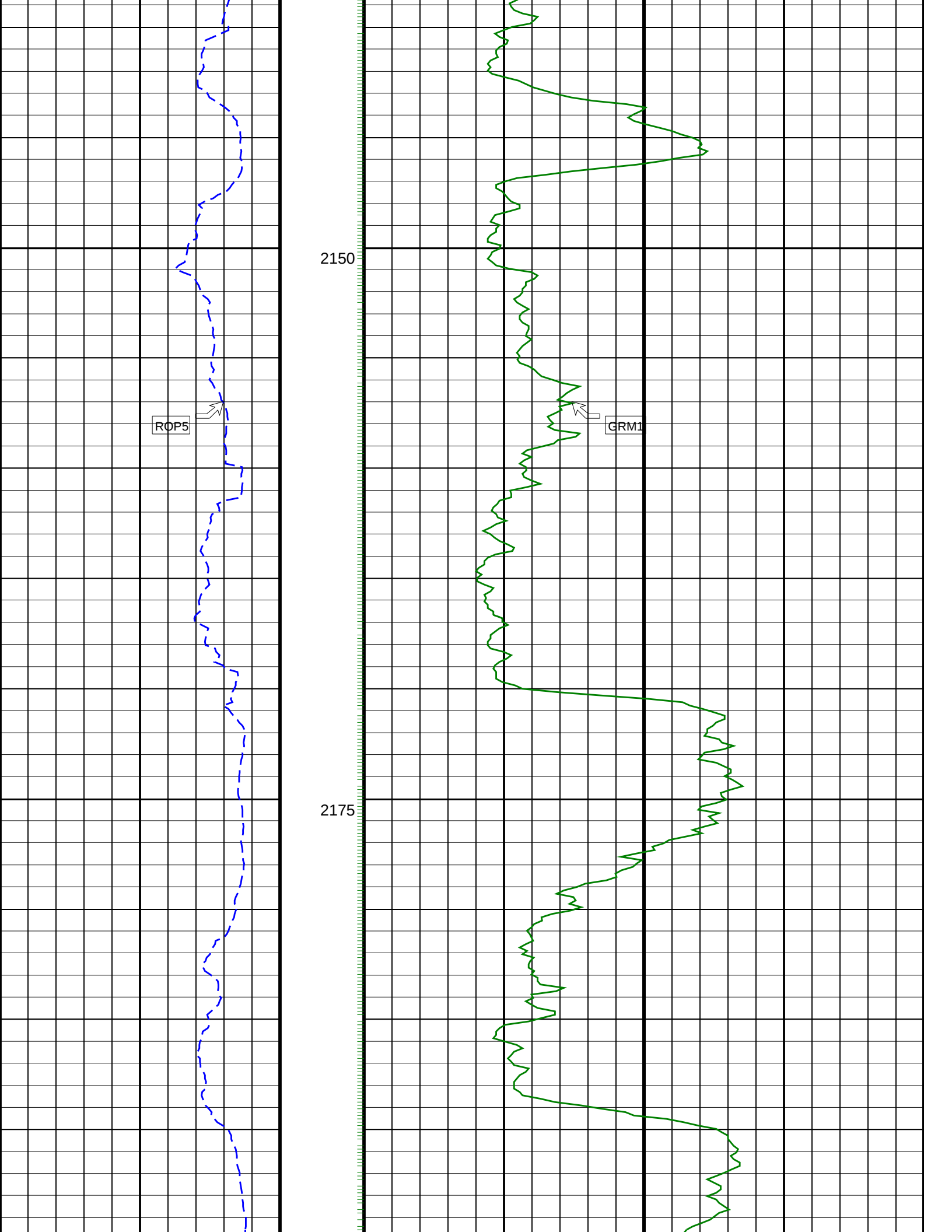
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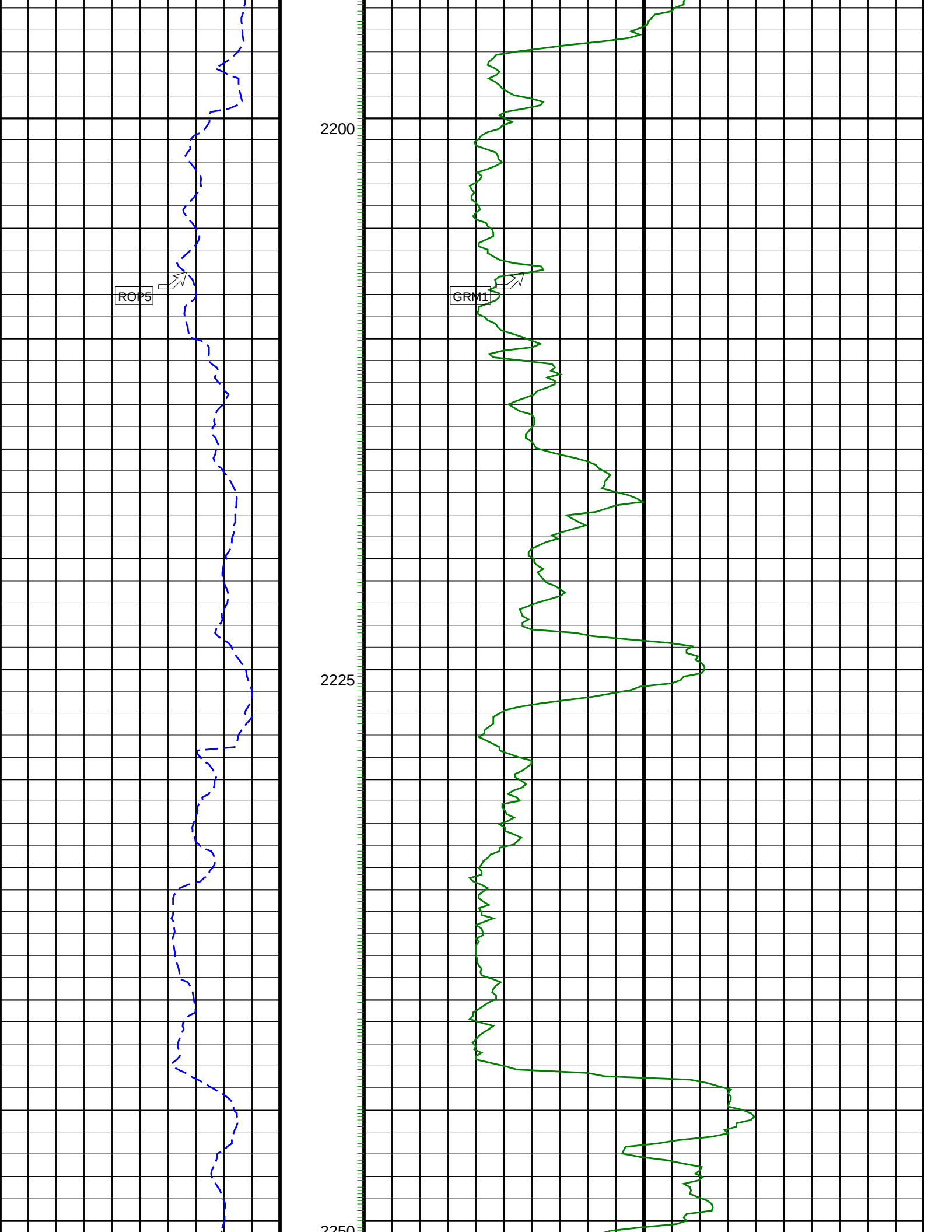
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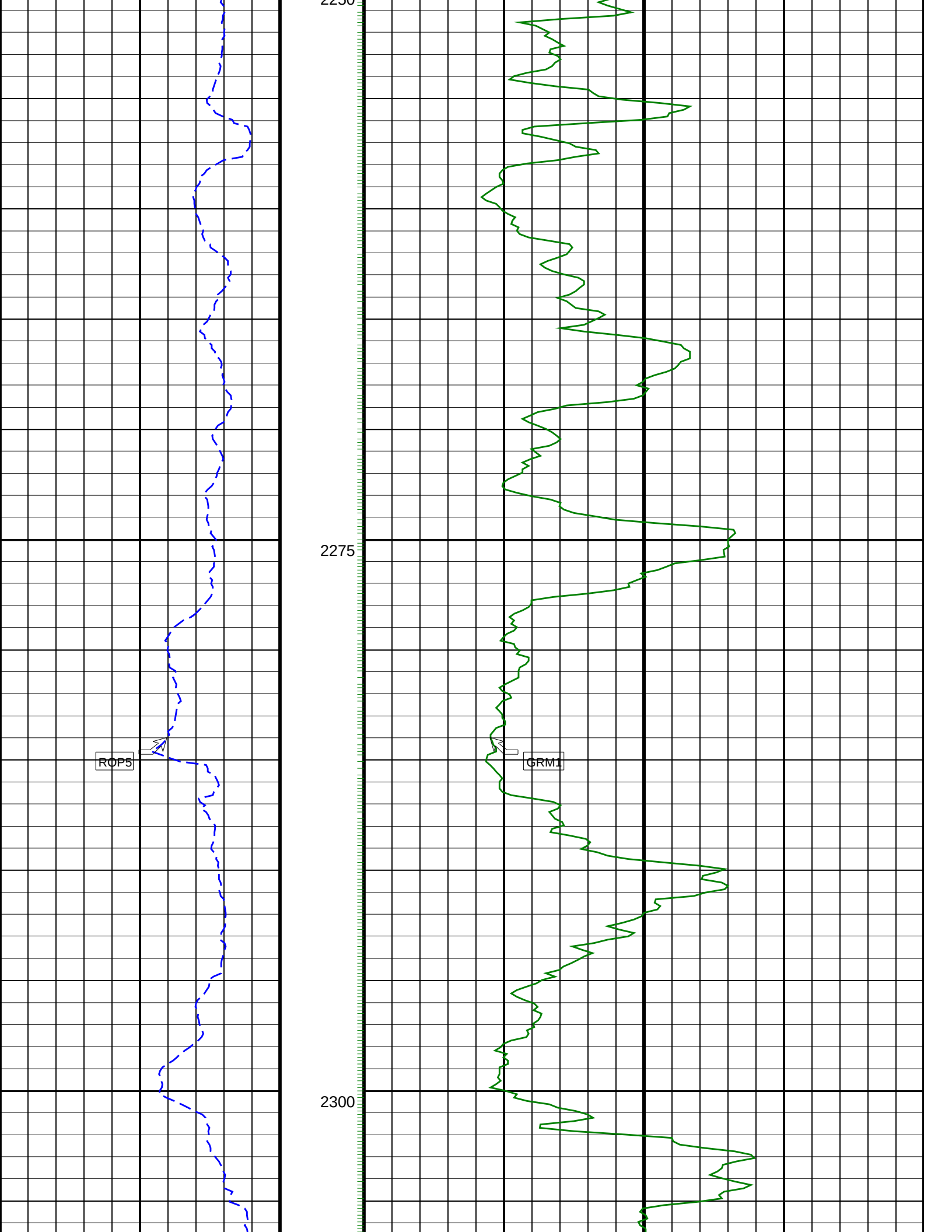
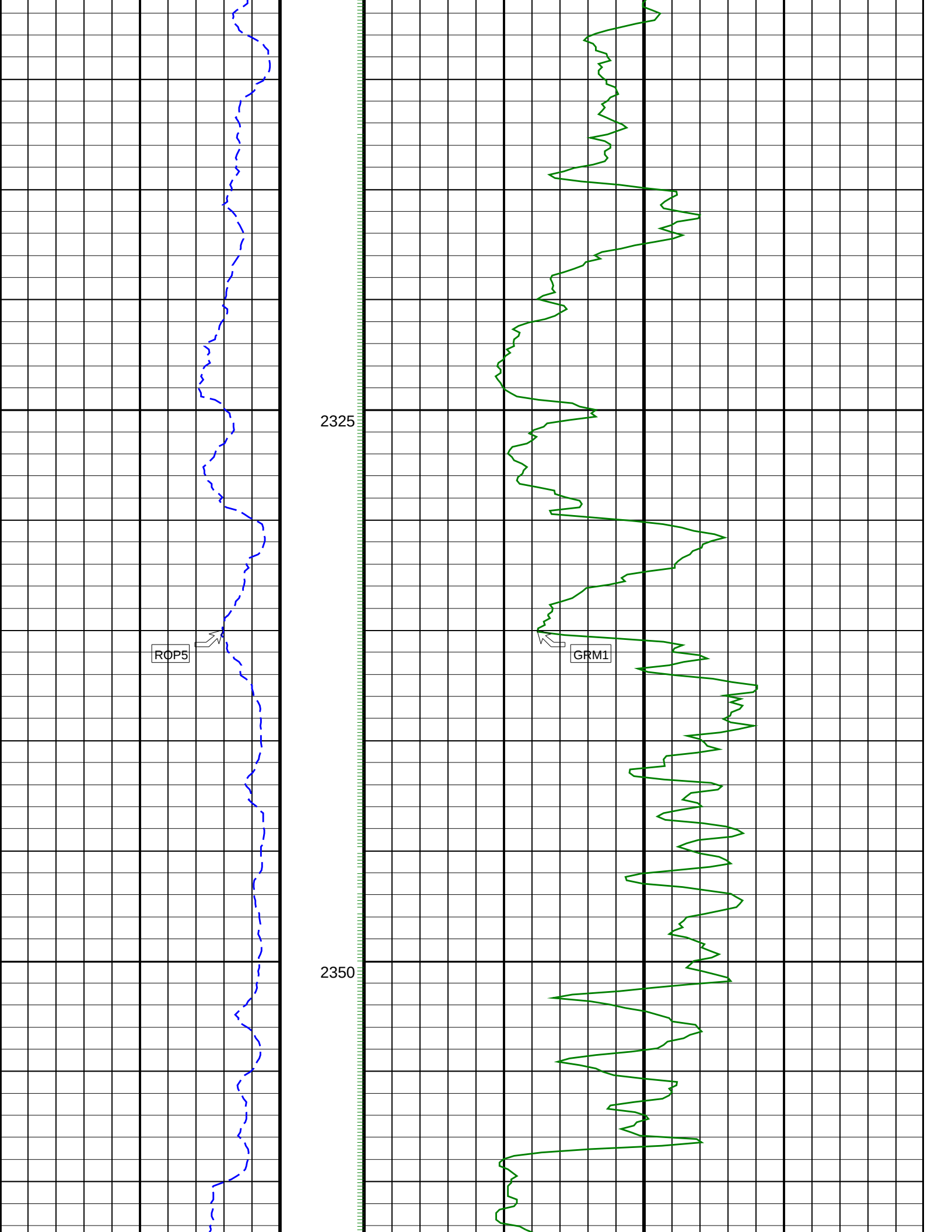
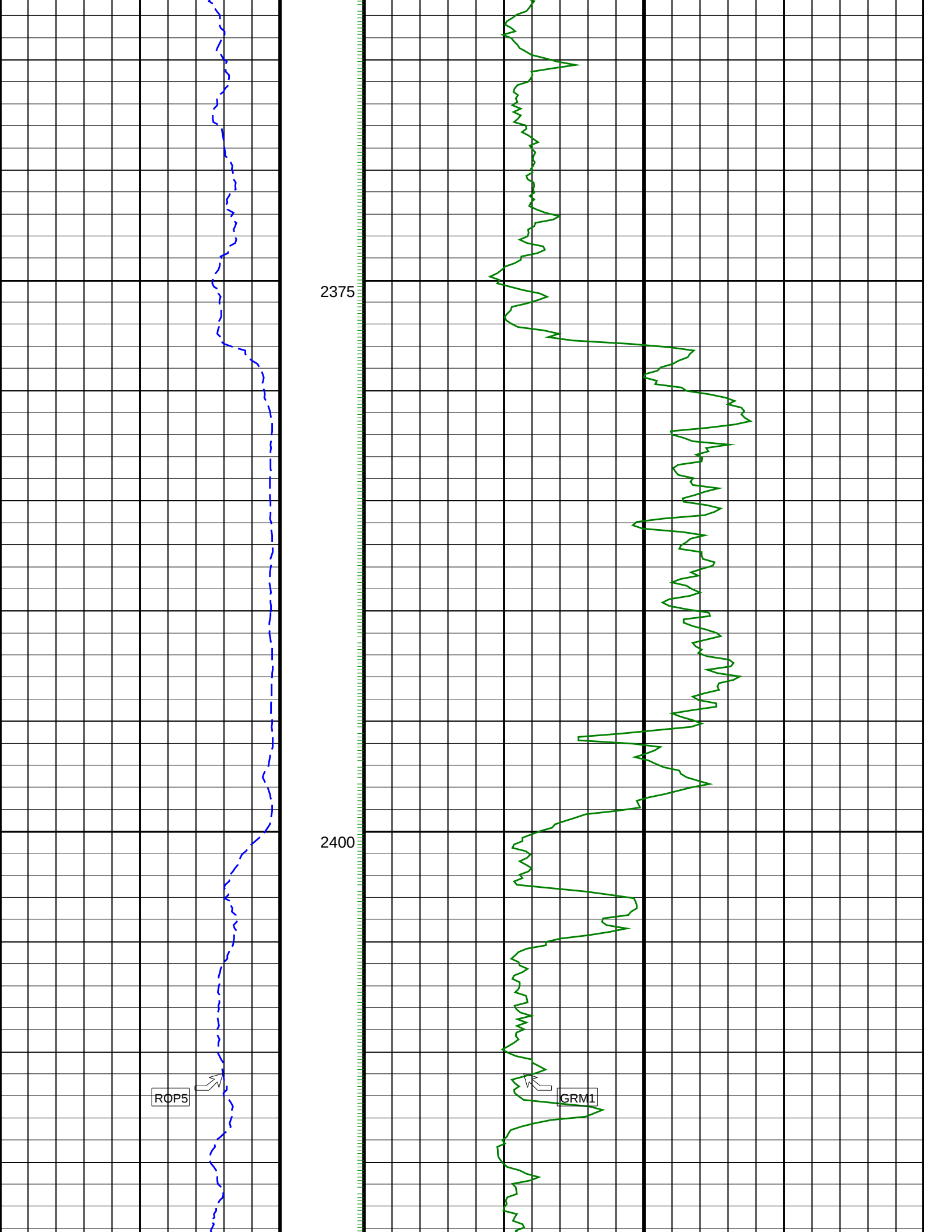
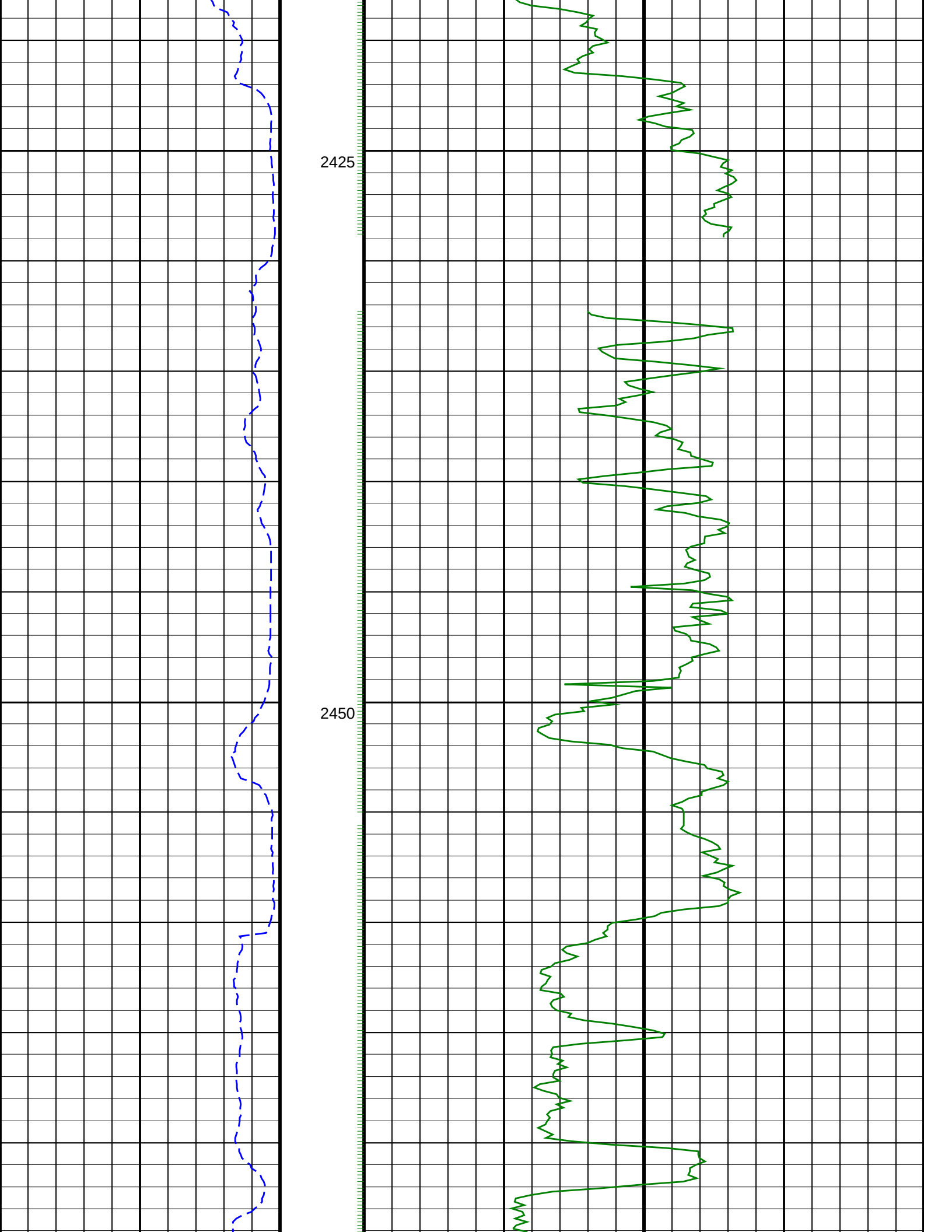
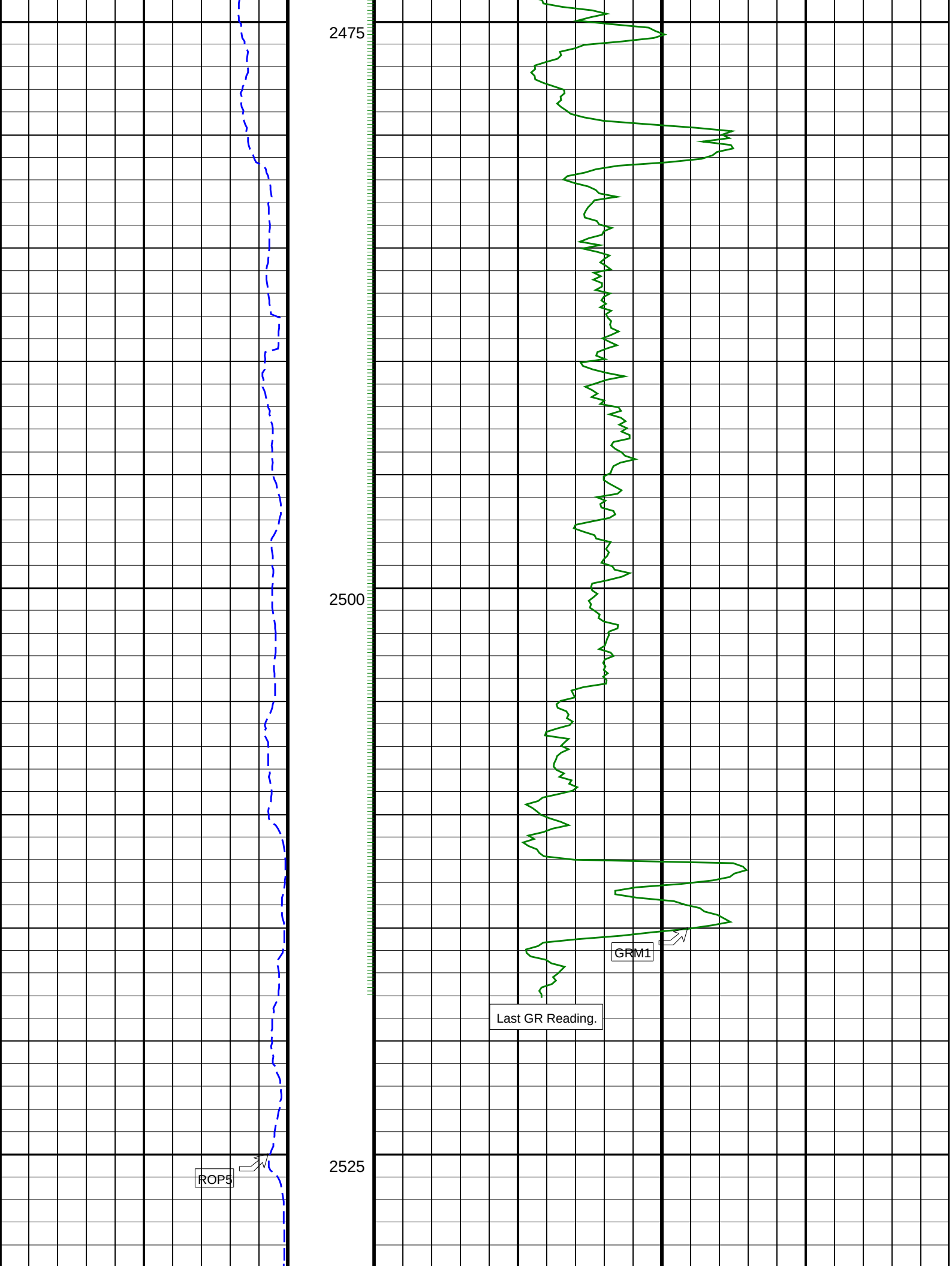
2225
2250

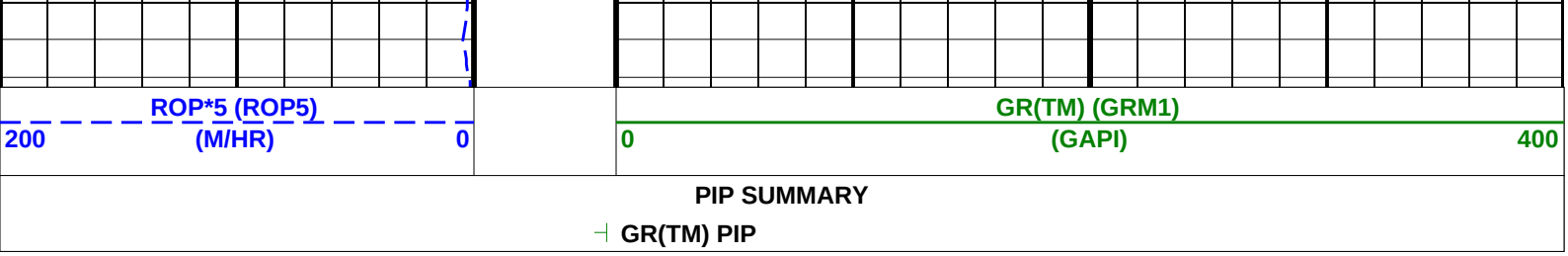

2250
2275
2300
ROP5
GRM1


2325
2350
ROP5
GRM1


2375
2400
ROP5
GRM1


2425
2450


2475
2500
2525
GRM1
Last GR Reading.
ROP5




**PIP SUMMARY**

GR(TM) PIP

SCHLUMBERGER

Survey report 19-Jan-2005 20:58:52 Page 1 of 4

Client.....: ESSO Australia Pty. Ltd.
Field.....: Moonfish

Well.....: West Moonfish-1
API number.....:
Engineer.....: J.Dolan / M.Y.Tan

Rig:.....: ENSCO 102
STATE:.....: Victoria

Spud date.....: 05-Jan-05
Last survey date.....: 19-Jan-05
Total accepted surveys...: 86
MD of first survey.....: 0.00 m
MD of last survey.....: 2532.00 m

----- Survey calculation methods-----
Method for positions.....: Minimum curvature
Method for DLS.....: Mason & Taylor

----- Depth reference -----
Permanent datum.....: Mean Sea Level
Depth reference.....: Driller's Depth
GL above permanent.....: -52.12 m
KB above permanent.....: Top Drive
DF above permanent.....: 39.24 m

----- Vertical section origin-----
Latitude (+N/S-).....: 0.00 m
Departure (+E/W-).....: 0.00 m

----- Platform reference point-----
Latitude (+N/S-).....: 0.00 m
Departure (+E/W-).....: 0.00 m

Azimuth from Vsect Origin to target: 171.73 degrees

----- Geomagnetic data -----
Magnetic model.....: BGGM version 2004
Magnetic date.....: 08-Jan-2005
Magnetic field strength..: 1199.31 HCNT
Magnetic dec (+E/W-).....: 13.04 degrees
Magnetic dip.....: -68.70 degrees

----- MWD survey Reference Criteria ---
Reference G.....: 1000.02 mGal
Reference H.....: 1199.31 HCNT
Reference Dip.....: -68.70 degrees
Tolerance of G.....: (+/-) 2.50 mGal
Tolerance of H.....: (+/-) 6.00 HCNT
Tolerance of Dip.....: (+/-) 0.45 degrees

----- Corrections -----
Magnetic dec (+E/W-).....: 13.04 degrees
Grid convergence (+E/W-).: -0.60 degrees
Total az corr (+E/W-)....: 13.64 degrees
(Total az corr = magnetic dec - grid conv)
Survey Correction Type ...:
**I=Sag Corrected Inclination**
**M=Schlumberger Magnetic Correction**
S=Shell Magnetic Correction
F=Failed Axis Correction
R=Magnetic Resonance Tool Correction
D=Dmag Magnetic Correction




| Seq # - | Measured depth (m) | Incl angle (deg) | Azimuth angle (deg) | Course length (m) | TVD depth (m) | Vertical section (m) | Displ +N/S- (m) | Displ +E/W- (m) | Total displ (m) | At Azim (deg) | DLS (deg/ 10m) | Srvy tool type | Tool Corr (deg) |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | TIP | None |
| 2 | 91.00 | 0.00 | 0.00 | 91.00 | 91.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | MWD_M | None |
| 3 | 181.88 | 0.35 | 328.21 | 90.88 | 181.88 | -0.25 | 0.24 | -0.15 | 0.28 | 328.21 | 0.04 | MWD | None |
| 4 | 209.79 | 0.46 | 330.61 | 27.91 | 209.79 | -0.44 | 0.41 | -0.25 | 0.47 | 328.78 | 0.04 | MWD | None |
| 5 | 238.18 | 0.46 | 334.44 | 28.39 | 238.18 | -0.65 | 0.61 | -0.35 | 0.70 | 329.99 | 0.01 | MWD | None |
| 6 | 266.14 | 0.41 | 322.98 | 27.96 | 266.14 | -0.85 | 0.79 | -0.46 | 0.91 | 329.77 | 0.04 | MWD | None |
| 7 | 294.58 | 0.45 | 330.64 | 28.44 | 294.58 | -1.04 | 0.97 | -0.58 | 1.13 | 329.25 | 0.02 | MWD | None |
| 8 | 323.45 | 0.47 | 319.47 | 28.87 | 323.45 | -1.25 | 1.16 | -0.71 | 1.36 | 328.51 | 0.03 | MWD | None |
| 9 | 352.76 | 0.37 | 334.57 | 29.31 | 352.75 | -1.44 | 1.33 | -0.83 | 1.57 | 328.19 | 0.05 | MWD | None |
| 10 | 381.80 | 0.35 | 324.72 | 29.04 | 381.79 | -1.61 | 1.49 | -0.92 | 1.75 | 328.35 | 0.02 | MWD | None |
| 11 | 411.24 | 0.31 | 328.91 | 29.44 | 411.23 | -1.76 | 1.63 | -1.01 | 1.92 | 328.21 | 0.02 | MWD | None |
| 12 | 440.44 | 0.31 | 306.16 | 29.20 | 440.43 | -1.89 | 1.75 | -1.12 | 2.07 | 327.41 | 0.04 | MWD | None |
| 13 | 469.19 | 0.35 | 319.12 | 28.75 | 469.18 | -2.02 | 1.86 | -1.24 | 2.23 | 326.36 | 0.03 | MWD | None |
| 14 | 498.06 | 0.33 | 320.27 | 28.87 | 498.05 | -2.16 | 1.99 | -1.35 | 2.40 | 325.89 | 0.01 | MWD | None |
| 15 | 526.97 | 0.37 | 310.22 | 28.91 | 526.96 | -2.30 | 2.11 | -1.47 | 2.58 | 325.15 | 0.03 | MWD | None |
| 16 | 555.67 | 0.28 | 328.64 | 28.70 | 555.66 | -2.44 | 2.23 | -1.58 | 2.74 | 324.74 | 0.05 | MWD | None |
| 17 | 584.65 | 0.30 | 319.14 | 28.98 | 584.64 | -2.57 | 2.35 | -1.67 | 2.88 | 324.69 | 0.02 | MWD | None |
| 18 | 613.64 | 0.26 | 310.54 | 28.99 | 613.63 | -2.68 | 2.45 | -1.77 | 3.02 | 324.24 | 0.02 | MWD | None |
| 19 | 642.62 | 0.21 | 308.91 | 28.98 | 642.61 | -2.77 | 2.53 | -1.86 | 3.14 | 323.70 | 0.02 | MWD | None |
| 20 | 671.64 | 0.18 | 340.56 | 29.02 | 671.63 | -2.85 | 2.60 | -1.91 | 3.23 | 323.69 | 0.04 | MWD | None |
| 21 | 700.59 | 0.24 | 324.48 | 28.95 | 700.58 | -2.95 | 2.70 | -1.96 | 3.34 | 323.93 | 0.03 | MWD | None |
| 22 | 716.66 | 0.28 | 343.92 | 16.07 | 716.65 | -3.02 | 2.76 | -1.99 | 3.41 | 324.17 | 0.06 | MWD | None |
| 23 | 760.72 | 0.35 | 341.43 | 44.06 | 760.71 | -3.26 | 2.99 | -2.07 | 3.64 | 325.37 | 0.02 | MWD | None |
| 24 | 789.81 | 0.37 | 350.28 | 29.09 | 789.80 | -3.44 | 3.17 | -2.11 | 3.81 | 326.33 | 0.02 | MWD | None |
| 25 | 818.90 | 0.39 | 345.99 | 29.09 | 818.89 | -3.63 | 3.36 | -2.15 | 3.99 | 327.36 | 0.01 | MWD | None |
| 26 | 848.10 | 0.45 | 351.62 | 29.20 | 848.09 | -3.85 | 3.57 | -2.19 | 4.19 | 328.44 | 0.02 | MWD | None |
| 27 | 877.05 | 0.38 | 344.38 | 28.95 | 877.04 | -4.05 | 3.77 | -2.23 | 4.38 | 329.37 | 0.03 | MWD | None |
| 28 | 906.37 | 0.28 | 0.58 | 29.32 | 906.36 | -4.22 | 3.94 | -2.26 | 4.54 | 330.16 | 0.05 | MWD | None |
| 29 | 935.33 | 0.35 | 12.98 | 28.96 | 935.32 | -4.37 | 4.09 | -2.24 | 4.67 | 331.33 | 0.03 | MWD | None |
| 30 | 964.33 | 0.27 | 17.88 | 29.00 | 964.31 | -4.52 | 4.25 | -2.20 | 4.78 | 332.63 | 0.03 | MWD | None |

| Seq # | Measured depth (m) | Incl angle (deg) | Azimuth angle (deg) | Course length (m) | TVD depth (m) | Vertical section (m) | Displ +N/S- (m) | Displ +E/W- (m) | Total displ (m) | At Azim (deg) | DLS (deg/ 10m) | Srvy tool type | Tool Corr (deg) |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 31 | 992.58 | 0.29 | 13.91 | 28.25 | 992.56 | -4.64 | 4.38 | -2.16 | 4.88 | 333.74 | 0.01 | MWD | None |
| 32 | 1021.76 | 0.36 | 9.73 | 29.18 | 1021.74 | -4.80 | 4.54 | -2.13 | 5.01 | 334.90 | 0.03 | MWD | None |
| 33 | 1050.63 | 0.30 | 18.15 | 28.87 | 1050.61 | -4.95 | 4.70 | -2.09 | 5.14 | 336.06 | 0.03 | MWD | None |
| 34 | 1079.82 | 0.33 | 13.33 | 29.19 | 1079.80 | -5.10 | 4.86 | -2.04 | 5.27 | 337.17 | 0.01 | MWD | None |
| 35 | 1108.59 | 0.28 | 27.98 | 28.77 | 1108.57 | -5.23 | 5.00 | -1.99 | 5.38 | 338.27 | 0.03 | MWD | None |
| 36 | 1137.86 | 0.28 | 33.98 | 29.27 | 1137.84 | -5.34 | 5.12 | -1.92 | 5.47 | 339.46 | 0.01 | MWD | None |
| 37 | 1166.83 | 0.29 | 28.94 | 28.97 | 1166.81 | -5.46 | 5.24 | -1.84 | 5.56 | 340.63 | 0.01 | MWD | None |
| 38 | 1195.74 | 0.29 | 56.71 | 28.91 | 1195.72 | -5.54 | 5.35 | -1.75 | 5.63 | 341.91 | 0.05 | MWD | None |
| 39 | 1224.73 | 0.34 | 48.47 | 28.99 | 1224.71 | -5.62 | 5.45 | -1.62 | 5.68 | 343.42 | 0.02 | MWD | None |
| 40 | 1253.76 | 0.28 | 53.99 | 29.03 | 1253.74 | -5.70 | 5.54 | -1.50 | 5.74 | 344.86 | 0.02 | MWD | None |
| 41 | 1282.95 | 0.28 | 76.24 | 29.19 | 1282.93 | -5.74 | 5.60 | -1.37 | 5.77 | 346.23 | 0.04 | MWD | None |
| 42 | 1312.43 | 0.35 | 69.81 | 29.48 | 1312.41 | -5.77 | 5.65 | -1.22 | 5.78 | 347.83 | 0.03 | MWD | None |
| 43 | 1341.45 | 0.49 | 75.67 | 29.02 | 1341.43 | -5.80 | 5.71 | -1.02 | 5.80 | 349.92 | 0.05 | MWD | None |
| 44 | 1370.44 | 0.54 | 77.71 | 28.99 | 1370.42 | -5.82 | 5.77 | -0.76 | 5.82 | 352.48 | 0.02 | MWD | None |
| 45 | 1399.38 | 0.57 | 80.90 | 28.94 | 1399.36 | -5.83 | 5.82 | -0.49 | 5.84 | 355.23 | 0.01 | MWD | None |
| 46 | 1428.34 | 0.57 | 72.23 | 28.96 | 1428.31 | -5.86 | 5.89 | -0.21 | 5.90 | 357.99 | 0.03 | MWD | None |
| 47 | 1457.45 | 0.71 | 75.91 | 29.11 | 1457.42 | -5.90 | 5.98 | 0.11 | 5.98 | 1.02 | 0.05 | MWD | None |
| 48 | 1486.39 | 0.67 | 81.34 | 28.94 | 1486.36 | -5.92 | 6.05 | 0.45 | 6.07 | 4.23 | 0.03 | MWD | None |
| 49 | 1515.33 | 0.64 | 84.68 | 28.94 | 1515.30 | -5.91 | 6.09 | 0.78 | 6.14 | 7.26 | 0.02 | MWD | None |
| 50 | 1544.31 | 0.58 | 114.39 | 28.98 | 1544.28 | -5.83 | 6.04 | 1.07 | 6.14 | 10.04 | 0.11 | MWD | None |
| 51 | 1573.33 | 0.68 | 130.93 | 29.02 | 1573.30 | -5.62 | 5.87 | 1.33 | 6.02 | 12.80 | 0.07 | MWD | None |
| 52 | 1602.43 | 0.81 | 124.83 | 29.10 | 1602.39 | -5.35 | 5.64 | 1.63 | 5.87 | 16.15 | 0.05 | MWD | None |
| 53 | 1630.64 | 0.88 | 126.64 | 28.21 | 1630.60 | -5.06 | 5.40 | 1.97 | 5.74 | 20.06 | 0.03 | MWD | None |
| 54 | 1659.72 | 0.73 | 120.96 | 29.08 | 1659.68 | -4.78 | 5.17 | 2.31 | 5.66 | 24.07 | 0.06 | MWD | None |
| 55 | 1688.54 | 0.77 | 115.92 | 28.82 | 1688.49 | -4.56 | 4.99 | 2.64 | 5.64 | 27.89 | 0.03 | MWD | None |
| 56 | 1716.29 | 1.42 | 170.03 | 27.75 | 1716.24 | -4.11 | 4.57 | 2.87 | 5.39 | 32.12 | 0.42 | MWD | None |
| 57 | 1747.14 | 3.39 | 168.14 | 30.85 | 1747.06 | -2.82 | 3.30 | 3.12 | 4.54 | 43.41 | 0.64 | MWD | None |
| 58 | 1776.39 | 6.07 | 175.23 | 29.25 | 1776.21 | -0.41 | 0.91 | 3.43 | 3.55 | 75.11 | 0.94 | MWD | None |
| 59 | 1803.97 | 9.73 | 177.60 | 27.58 | 1803.52 | 3.37 | -2.87 | 3.65 | 4.64 | 128.22 | 1.33 | MWD | None |
| 60 | 1833.36 | 13.39 | 175.76 | 29.39 | 1832.31 | 9.23 | -8.75 | 4.00 | 9.62 | 155.42 | 1.25 | MWD | None |



| Seq # | Measured depth (m) | Incl angle (deg) | Azimuth angle (deg) | Course length (m) | TVD depth (m) | Vertical section (m) | Displ +N/S- (m) | Displ +E/W- (m) | Total displ (m) | At Azim (deg) | DLS (deg/ 10m) | Srvy tool type | Tool Corr (deg) |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **61** | **1863.43** | **16.85** | **168.96** | **30.07** | **1861.34** | **17.06** | **-16.50** | **5.09** | **17.27** | **162.84** | **1.29** | **MWD** | **None** |
| 62 | 1892.32 | 20.05 | 169.00 | 28.89 | 1888.74 | 26.19 | -25.47 | 6.84 | 26.38 | 164.97 | 1.11 | MWD | None |
| 63 | 1921.31 | 23.60 | 171.03 | 28.99 | 1915.65 | 36.96 | -36.09 | 8.70 | 37.12 | 166.45 | 1.25 | MWD | None |
| 64 | 1950.39 | 26.42 | 171.08 | 29.08 | 1942.00 | 49.26 | -48.23 | 10.61 | 49.38 | 167.60 | 0.97 | MWD | None |
| 65 | 1980.01 | 28.74 | 171.62 | 29.62 | 1968.25 | 62.97 | -61.79 | 12.67 | 63.07 | 168.42 | 0.79 | MWD | None |
| 66 | 2008.88 | 30.11 | 172.21 | 28.87 | 1993.40 | 77.15 | -75.83 | 14.66 | 77.24 | 169.06 | 0.49 | MWD | None |
| 67 | 2037.15 | 31.81 | 172.17 | 28.27 | 2017.64 | 91.69 | -90.24 | 16.64 | 91.76 | 169.55 | 0.60 | MWD | None |
| 68 | 2051.91 | 33.50 | 172.13 | 14.76 | 2030.06 | 99.66 | -98.13 | 17.72 | 99.72 | 169.76 | 1.15 | MWD | None |
| 69 | 2066.15 | 33.78 | 171.23 | 14.24 | 2041.92 | 107.55 | -105.93 | 18.87 | 107.60 | 169.90 | 0.40 | MWD | None |
| 70 | 2095.12 | 33.12 | 171.96 | 28.97 | 2066.09 | 123.51 | -121.73 | 21.20 | 123.56 | 170.12 | 0.27 | MWD | None |
| 71 | 2124.15 | 33.36 | 172.51 | 29.03 | 2090.37 | 139.43 | -137.50 | 23.35 | 139.47 | 170.36 | 0.13 | MWD | None |
| 72 | 2153.24 | 33.01 | 172.88 | 29.09 | 2114.72 | 155.35 | -153.29 | 25.38 | 155.38 | 170.60 | 0.14 | MWD | None |
| 73 | 2181.81 | 32.54 | 173.18 | 28.56 | 2138.73 | 170.80 | -168.64 | 27.25 | 170.82 | 170.82 | 0.17 | MWD | None |
| 74 | 2210.92 | 31.59 | 173.23 | 29.12 | 2163.41 | 186.26 | -183.99 | 29.08 | 186.27 | 171.02 | 0.33 | MWD | None |
| 75 | 2240.12 | 31.28 | 173.54 | 29.20 | 2188.32 | 201.48 | -199.11 | 30.84 | 201.49 | 171.20 | 0.12 | MWD | None |
| 76 | 2268.93 | 31.04 | 173.24 | 28.81 | 2212.98 | 216.38 | -213.92 | 32.55 | 216.38 | 171.35 | 0.10 | MWD | None |
| 77 | 2298.13 | 31.01 | 173.23 | 29.20 | 2238.00 | 231.42 | -228.87 | 34.32 | 231.43 | 171.47 | 0.01 | MWD | None |
| 78 | 2327.14 | 30.80 | 172.89 | 29.01 | 2262.89 | 246.32 | -243.66 | 36.12 | 246.32 | 171.57 | 0.09 | MWD | None |
| 79 | 2356.90 | 30.47 | 172.50 | 29.76 | 2288.50 | 261.48 | -258.70 | 38.05 | 261.48 | 171.63 | 0.13 | MWD | None |
| 80 | 2385.70 | 30.69 | 172.74 | 28.80 | 2313.29 | 276.13 | -273.23 | 39.93 | 276.13 | 171.68 | 0.09 | MWD | None |
| 81 | 2414.71 | 30.89 | 172.94 | 29.01 | 2338.21 | 290.98 | -287.96 | 41.78 | 290.98 | 171.74 | 0.08 | MWD | None |
| 82 | 2443.86 | 30.53 | 172.62 | 29.15 | 2363.27 | 305.86 | -302.73 | 43.66 | 305.86 | 171.79 | 0.14 | MWD | None |
| 83 | 2472.51 | 30.38 | 172.52 | 28.65 | 2387.97 | 320.38 | -317.13 | 45.53 | 320.38 | 171.83 | 0.06 | MWD | None |
| 84 | 2500.10 | 30.49 | 173.16 | 27.59 | 2411.76 | 334.36 | -331.00 | 47.28 | 334.36 | 171.87 | 0.12 | MWD | None |
| 85 | 2513.76 | 30.10 | 173.67 | 13.66 | 2423.55 | 341.24 | -337.84 | 48.07 | 341.25 | 171.90 | 0.34 | MWD | None |
| 86 | 2532.00 | 30.10 | 173.70 | 18.24 | 2439.33 | 350.39 | -346.94 | 49.07 | 350.39 | 171.95 | 0.01 | Projection To CSG Point | |



Company: **ESSO Australia Pty. Ltd.**

Schlumberger

Well: **West Moonfish-1**

Field: **Moonfish**

Rig: **ENSCO 102** **12.25 in. Section**

State: **Victoria**

State: Victoria

**PowerPulse* Gamma Ray**
**1:200 Measured Depth**
**Real Time Log**