



Company: **BILL BARRETT CORPORATION**

Well: **BBC 42B-23-692**

Field: **MAMM CREEK**

County: **GARFIELD** State: **COLORADO**

| | | | | | |
|-----------------------------------|-------------|--|--|---------------------|-----------|
| County: GARFIELD | | CEMENT BOND LOG CBL - VDL GAMMA RAY - CCL | | | |
| Field: MAMM CREEK | | | | | |
| Location: 2294' FNL & 331' FEL | | | | | |
| Well: BBC 42B-23-692 | | | | | |
| Company: BILL BARRETT CORPORATION | | | | | |
| LOCATION | | 2294' FNL & 331' FEL | Elev.: K.B. 5862.00 ft G.L. 5840.00 ft D.F. 5861.00 ft | | |
| Perm arent Datum: _____ | | | | GROUND LEVEL _____ | |
| Log Measured From: _____ | | | | KELLY BUSHING _____ | |
| Drilling Measured From: _____ | | | | KELLY BUSHING _____ | |
| Logging Date | 15-Jul-2009 | API Serial No. 05-045-176890000 | Section 23 | Township 6S | Range 92W |

| | | | | | |
|-------------------------------|---------------------|----------|--------------------|--|--|
| Run Number | 1 | | | | |
| Depth Driller | 8373 ft | | | | |
| Schlumberger Depth | 8282 ft | | | | |
| Bottom Log Interval | 8267.3 ft | | | | |
| Top Log Interval | 690 ft | | | | |
| Casing Fluid Type | FRESH WATER | | | | |
| Salinity | | | | | |
| Density | 8.35 lbm/gal | | | | |
| Fluid Level | 22 ft | | | | |
| BIT/CASING/TUBING STRING | | | | | |
| Bit Size | 7.875 in | | | | |
| From | 22 ft | | | | |
| To | 8373 ft | | | | |
| Casing/Tubing Size | 4.500 in | | | | |
| Weight | 11.6 lbm/ft | | | | |
| Grade | | | | | |
| From | 22 ft | | | | |
| To | 8373 ft | | | | |
| Maximum Recorded Temperatures | 222 degF | | | | |
| Logger On Bottom | 15-Jul-2009 | Time | 9:00 | | |
| Unit Number | 411 | Location | GRAND JUNCTION, CO | | |
| Recorded By | M. ARNETT/ S. CROSS | | | | |
| Witnessed By | UNATTENDED | | | | |

| PVT DATA | | | | | | Run 1 | Run 2 | Run |
|-------------------------------|--|--|--|--|---------|-------|-------|-----|
| Oil Density | | | | | | | | |
| Water Salinity | | | | | | | | |
| Gas Gravity | | | | | | | | |
| Bo | | | | | | | | |
| Bw | | | | | | | | |
| 1/Bg | | | | | | | | |
| Bubble Point Pressure | | | | | | | | |
| Bubble Point Temperature | | | | | | | | |
| Solution GOR | | | | | | | | |
| Maximum Deviation | | | | | | | | |
| CEMENTING DATA | | | | | | | | |
| Primary/Squeeze | | | | | Primary | | | |
| Casing String No | | | | | | | | |
| Lead Cement Type | | | | | | | | |
| Volume | | | | | | | | |
| Density | | | | | | | | |
| Water Loss | | | | | | | | |
| Additives | | | | | | | | |
| Tail Cement Type | | | | | | | | |
| Volume | | | | | | | | |
| Density | | | | | | | | |
| Water Loss | | | | | | | | |
| Additives | | | | | | | | |
| Expected Cement Top | | | | | | | | |
| Logging Date | | | | | | | | |
| Run Number | | | | | | | | |
| Depth Driller | | | | | | | | |
| Schlumberger Depth | | | | | | | | |
| Bottom Log Interval | | | | | | | | |
| Top Log Interval | | | | | | | | |
| Casing Fluid Type | | | | | | | | |
| Salinity | | | | | | | | |
| Density | | | | | | | | |
| Fluid Level | | | | | | | | |
| BIT/CASING/TUBING STRING | | | | | | | | |
| Bit Size | | | | | | | | |
| From | | | | | | | | |
| To | | | | | | | | |
| Casing/Tubing Size | | | | | | | | |
| Weight | | | | | | | | |
| Grade | | | | | | | | |
| From | | | | | | | | |
| To | | | | | | | | |
| Maximum Recorded Temperatures | | | | | | | | |
| Logger On Bottom | | | | | | | | |
| Unit Number | | | | | | | | |
| Recorded By | | | | | | | | |
| Witnessed By | | | | | | | | |

DEPTH SUMMARY LISTING

Date Created: 15-JUL-2009 19:12:51

Depth System Equipment

| Depth Measuring Device | | Tension Device | | Logging Cable | |
|---------------------------|-------------|-------------------------------|-------------|---|----------|
| Type: | IDW-B | Type: | CMTD-C | Type: | 1-25ZT |
| Serial Number: | 3775 | Serial Number: | 5032 | Serial Number: | |
| Calibration Date: | 20-JAN-2009 | Calibration Date: | 18-JUN-2009 | Length: | 13130 FT |
| Calibrator Serial Number: | 33 | Calibrator Serial Number: | 1159 | Conveyance Method: Wireline Rig Type: LAND | |
| Calibration Cable Type: | 1-25ZT | Number of Calibration Points: | 10 | | |
| Wheel Correction 1: | -5 | Calibration RMS: | 8 | | |
| Wheel Correction 2: | -3 | Calibration Peak Error: | 15 | | |

Depth Control Parameters

Log Sequence: Subsequent Trip To the Well
Reference Log Name: MULTI-EXPRESS
Reference Log Run Number: ONE
Reference Log Date: 30-JUNE-2009
Subsequent Trip Down Log Correction: 0.00 FT

Depth Control Remarks

1. ALL SCHLUMBERGER DEPTH CONTROL POLICIES APPLIED
2. IDW USED AS PRIMARY DEPTH REFERENCE, Z-CHART USED AS SECONDARY
- 3.
- 4.
- 5.
- 6.

DISCLAIMER

THE USE OF AND RELIANCE UPON THIS RECORDED-DATA BY THE HEREIN NAMED COMPANY (AND ANY OF ITS AFFILIATES, PARTNERS, REPRESENTATIVES, AGENTS, CONSULTANTS AND EMPLOYEES) IS SUBJECT TO THE TERMS AND CONDITIONS AGREED UPON BETWEEN SCHLUMBERGER AND THE COMPANY, INCLUDING: (a) RESTRICTIONS ON USE OF THE RECORDED-DATA; (b) DISCLAIMERS AND WAIVERS OF WARRANTIES AND REPRESENTATIONS REGARDING COMPANY'S USE OF AND RELIANCE UPON THE RECORDED-DATA; AND (c) CUSTOMER'S FULL AND SOLE RESPONSIBILITY FOR ANY INFERENCE DRAWN OR DECISION MADE IN CONNECTION WITH THE USE OF THIS RECORDED-DATA.

OTHER SERVICES1

OS1: NONE
OS2:
OS3:
OS4:
OS5:

OTHER SERVICES2

OS1:
OS2:
OS3:
OS4:
OS5:

REMARKS: RUN NUMBER 1

THIS IS A SUBSEQUENT RUN IN WELL

LOG CORRELATED TO: MULTI-EXPRESS, RAN 6-JUL-2009

TOOLSTRING RUN AS PER TOOLSKETCH

JUNK BASKET RAN AS PER CLIENT REQUEST

SCMT RAN WITH TWO CENTRALIZING GEMCOS

WELL BUBBLING AT SURFACE, CBL NOT AFFECTED

EXPECTED FREE PIPE CBL VALUE: 81 mV

REMARKS: RUN NUMBER 2

| | | | | | |
|--|-------|------------|------------------|-------|------|
| EXPECTED TRANSIT TIME 251 uS | | | | | |
| MAXIMUM RECORDED TEMPERATURE: 222 DEGF | | | | | |
| SHORT JOINTS LOCATED AT: 7907' - 7936' & 6117' - 6145' | | | | | |
| | | | | | |
| CRANE: 5048 | | | | | |
| | | | | | |
| YOUR CREW: JESSE & WALEED | | | | | |
| | | | | | |
| THANK YOU FOR CHOOSING SCHLUMBERGER! | | | | | |
| RUN 1 | | | RUN 2 | | |
| SERVICE ORDER #: | | AN27-00139 | SERVICE ORDER #: | | |
| PROGRAM VERSION: | | 17C0-154 | PROGRAM VERSION: | | |
| FLUID LEVEL: | | 22 ft | FLUID LEVEL: | | |
| LOGGED INTERVAL | START | STOP | LOGGED INTERVAL | START | STOP |
| | | | | | |
| | | | | | |
| | | | | | |
| | | | | | |

EQUIPMENT DESCRIPTION

RUN 1

RUN 2

| | | | | | |
|---------------------|--|--|--|--|--|
| SURFACE EQUIPMENT | | | | | |
| WITM-A PSC_16MHZ | | | | | |

| | | | | | |
|--------------------|-----------|------|--|--|------|
| DOWNHOLE EQUIPMENT | | | | | |
| MH-22 | | | | | 37.9 |
| MH-22 | | | | | |
| AH-38 | Detail MT | | | | 36.3 |
| | TelStatus | | | | |
| | CTEM | 36.0 | | | 36.0 |
| PSPT-A/B | | | | | |
| PSC-A | | | | | |
| PSPT-A 3779 | | | | | |
| PSTC | | | | | |
| PBMS-A 3779 | | | | | |
| 10k Sapphire Mano | | | | | |
| RTD Thermometer | GR | 32.3 | | | |
| GR | | | | | |
| CCL | | | | | |
| PBMS | | | | | |
| | Well Temp | 29.2 | | | |
| | Manometer | 29.1 | | | |
| | CCL | 28.5 | | | |
| | PBMS PSTC | 27.8 | | | |
| SCMT-CB | | | | | 27.8 |
| SCMC-CA | | | | | |
| SECH-CA 8139 | | | | | |
| CMIR-AG | | | | | |
| SCMS-CB 8171 | | | | | |
| SCMX-CA | | | | | |
| | | | | | |
| | DT | 18.7 | | | |
| | CBL5 DTSC | 17.2 | | | |
| | CBL3 | 16.2 | | | |
| | MAP | 15.7 | | | |
| | AUX | 14.7 | | | |

AH-JB
AH-JB

7.7

HV
Tension SCMT
TOOL ZERO 0.0

MAXIMUM STRING DIAMETER 3.50 IN
MEASUREMENTS RELATIVE TO TOOL ZERO
ALL LENGTHS IN FEET

Schlumberger

MAIN PASS

MAXIS Field Log

Company: BILL BARRETT CORPORATION

Well: BBC 42B-23-692

Input DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|----------|
| DEFAULT | SCMT_PSP_078LUP | FN:75 | PRODUCER | 15-Jul-2009 11:32 | 8300.0 FT | 644.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|----------|

Output DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|----------|
| DEFAULT | SCMT_PSP_095PUP | FN:92 | PRODUCER | 15-Jul-2009 19:22 | 8305.0 FT | 649.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|----------|

OP System Version: 17C0-154

eWAFE Version: 1.139

| | | | |
|---------|------------------------|----------|------------------------|
| SCMT-CB | SRPC-3821-Q2_2009_OP17 | PSPT-A/B | SRPC-3821-Q2_2009_OP17 |
|---------|------------------------|----------|------------------------|

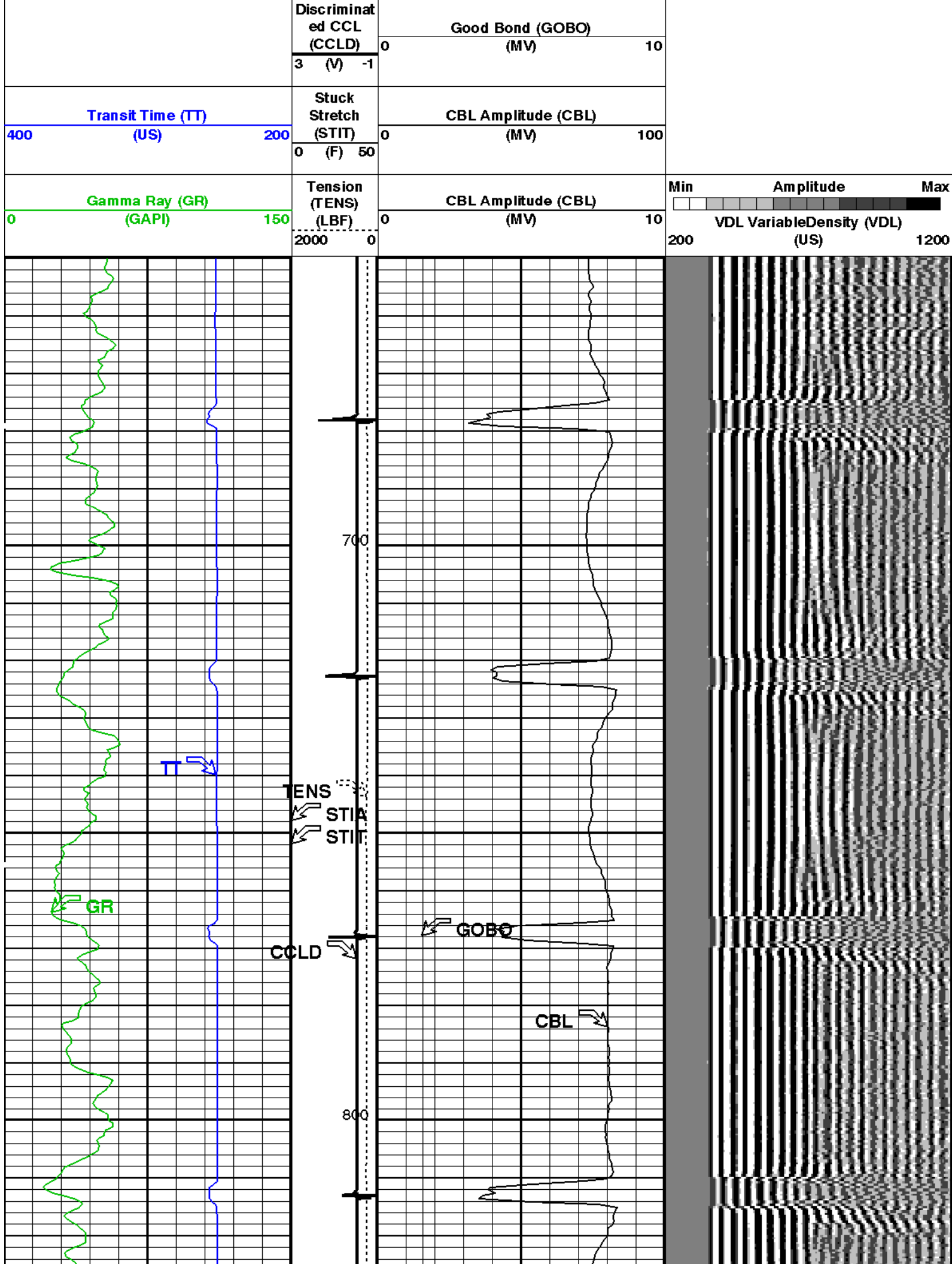
PIP SUMMARY

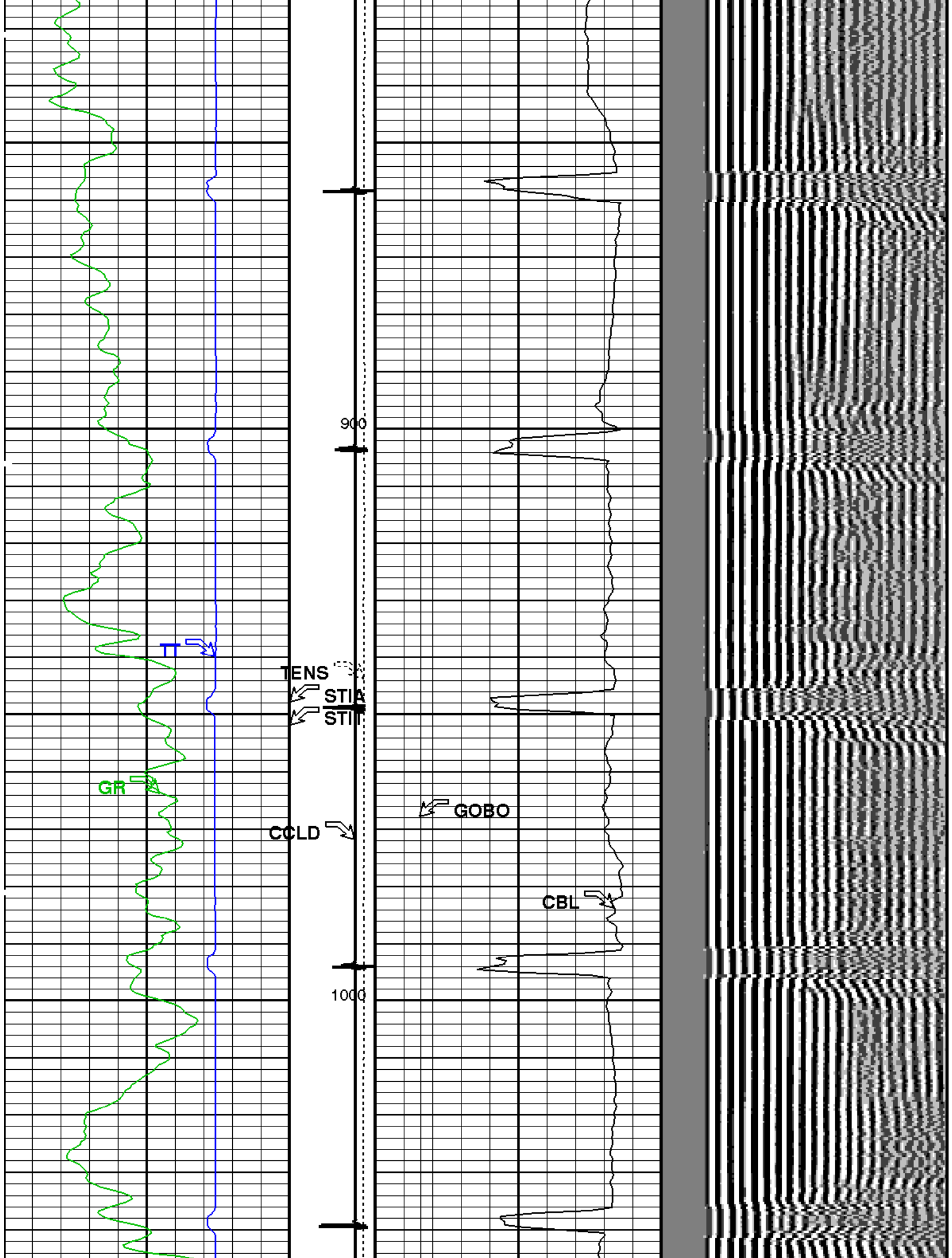
 Time Mark Every 60 S

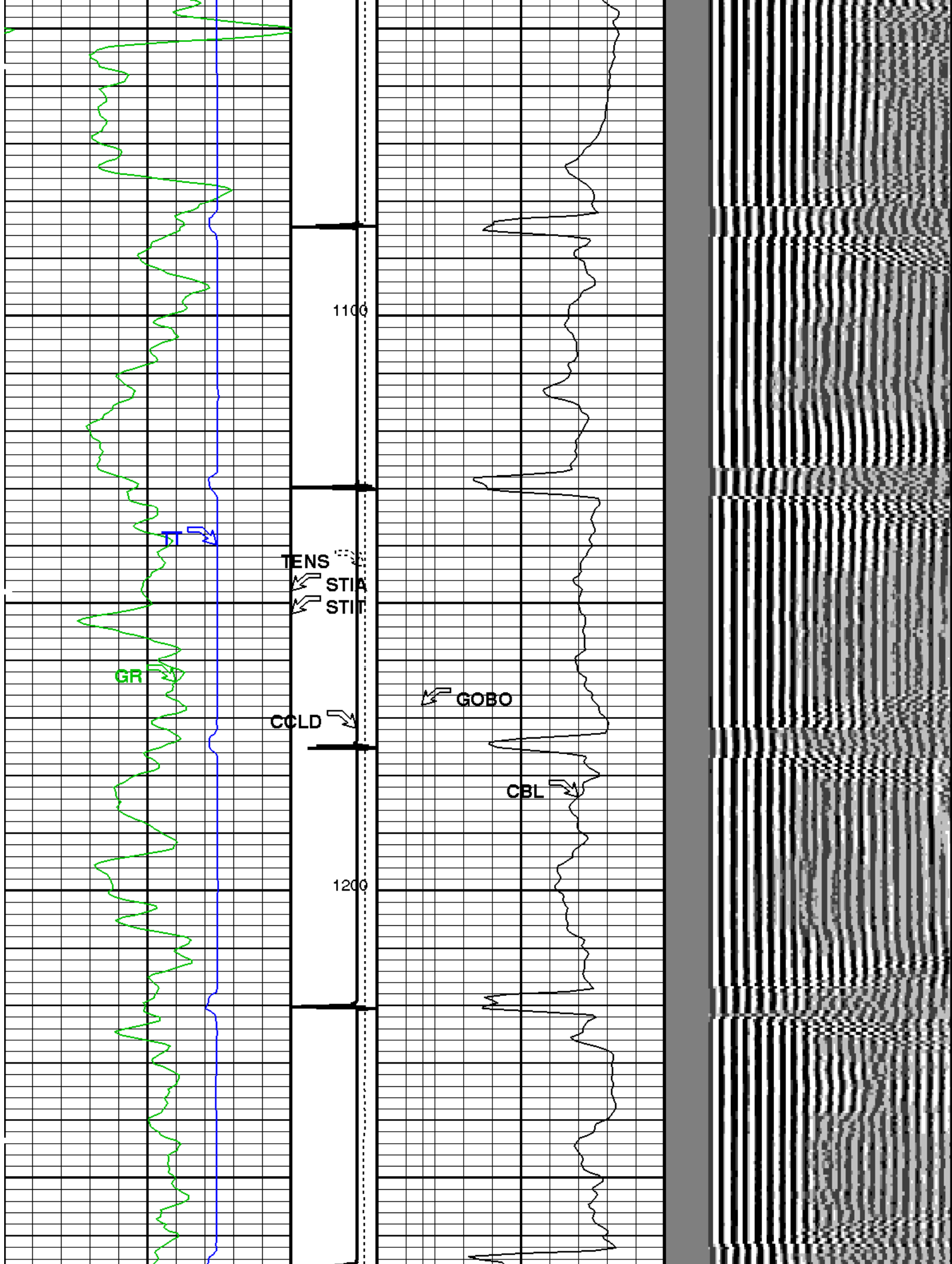
Tool/Tot.
Drag
From D3T
to STIA

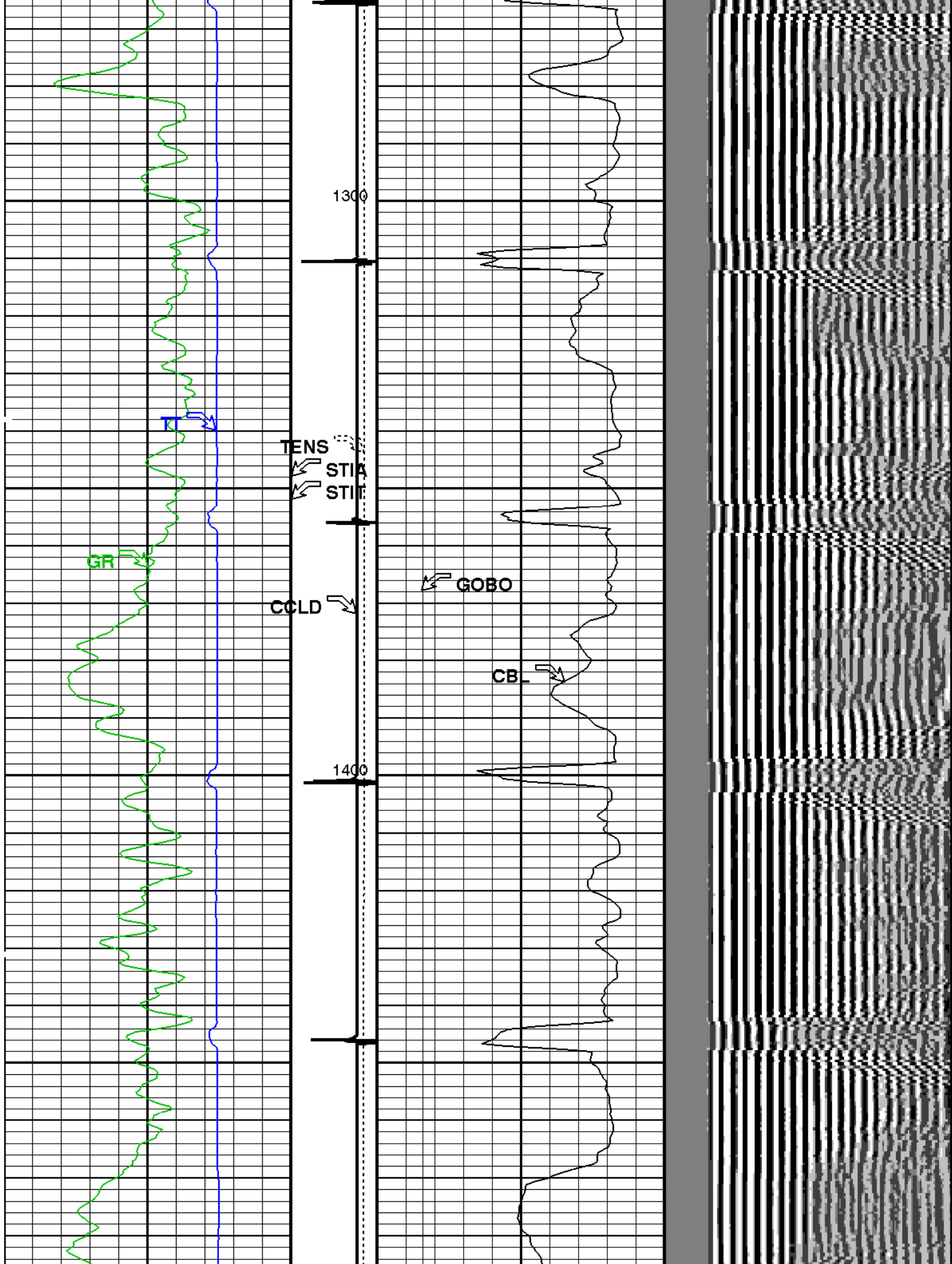
Cable
Drag
From STIA
to STIT

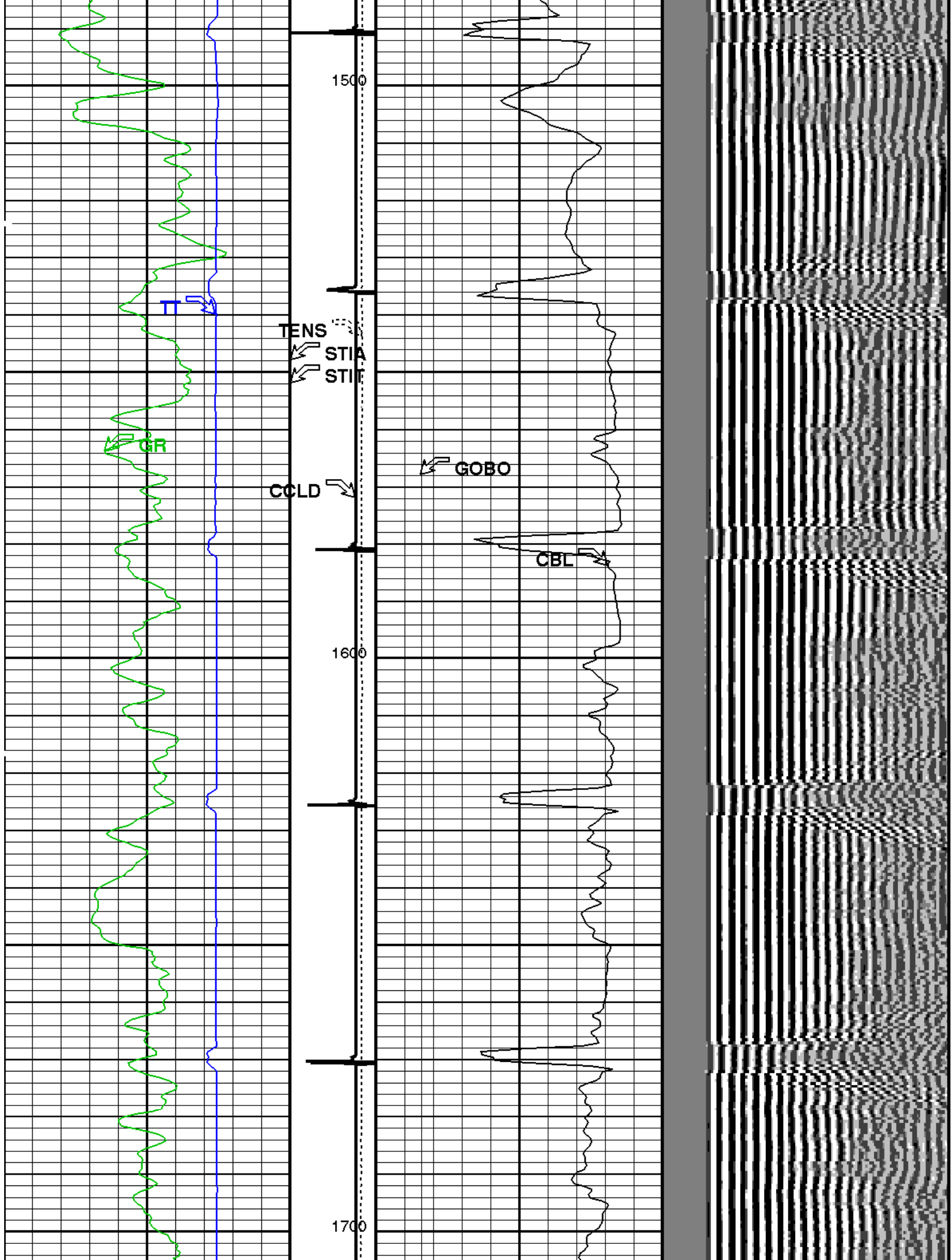
GoodBond
From ACBL to GOBO

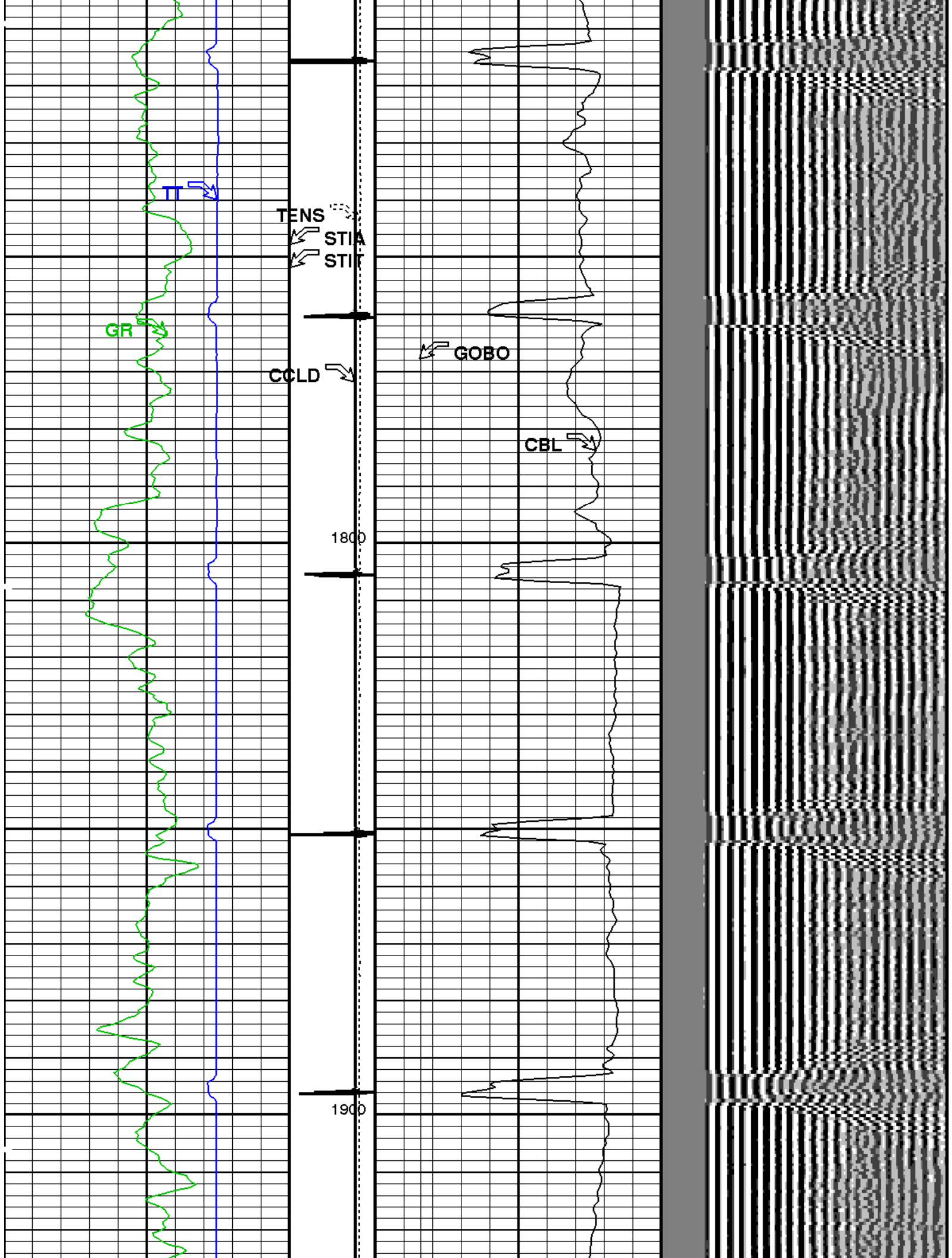


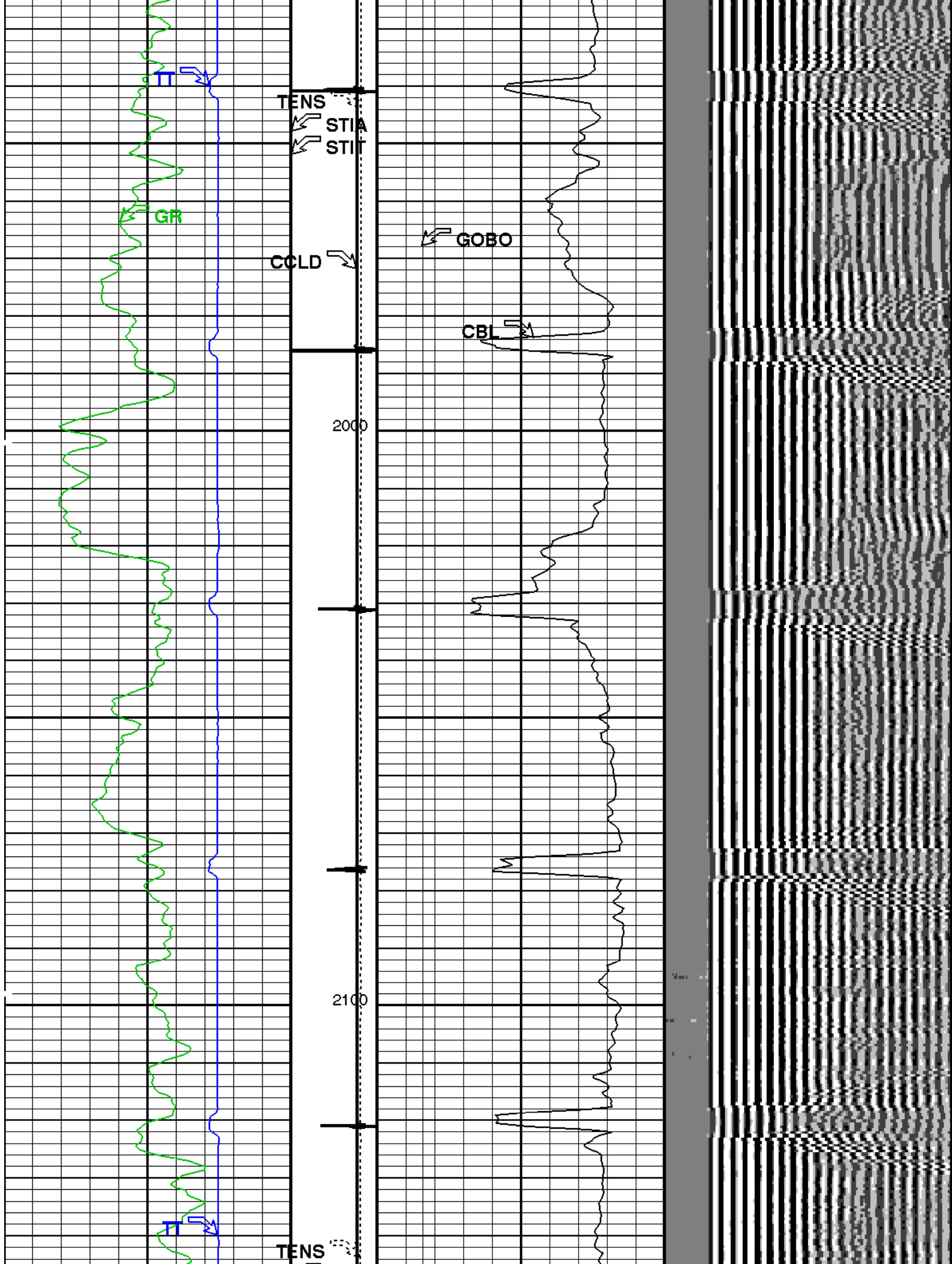


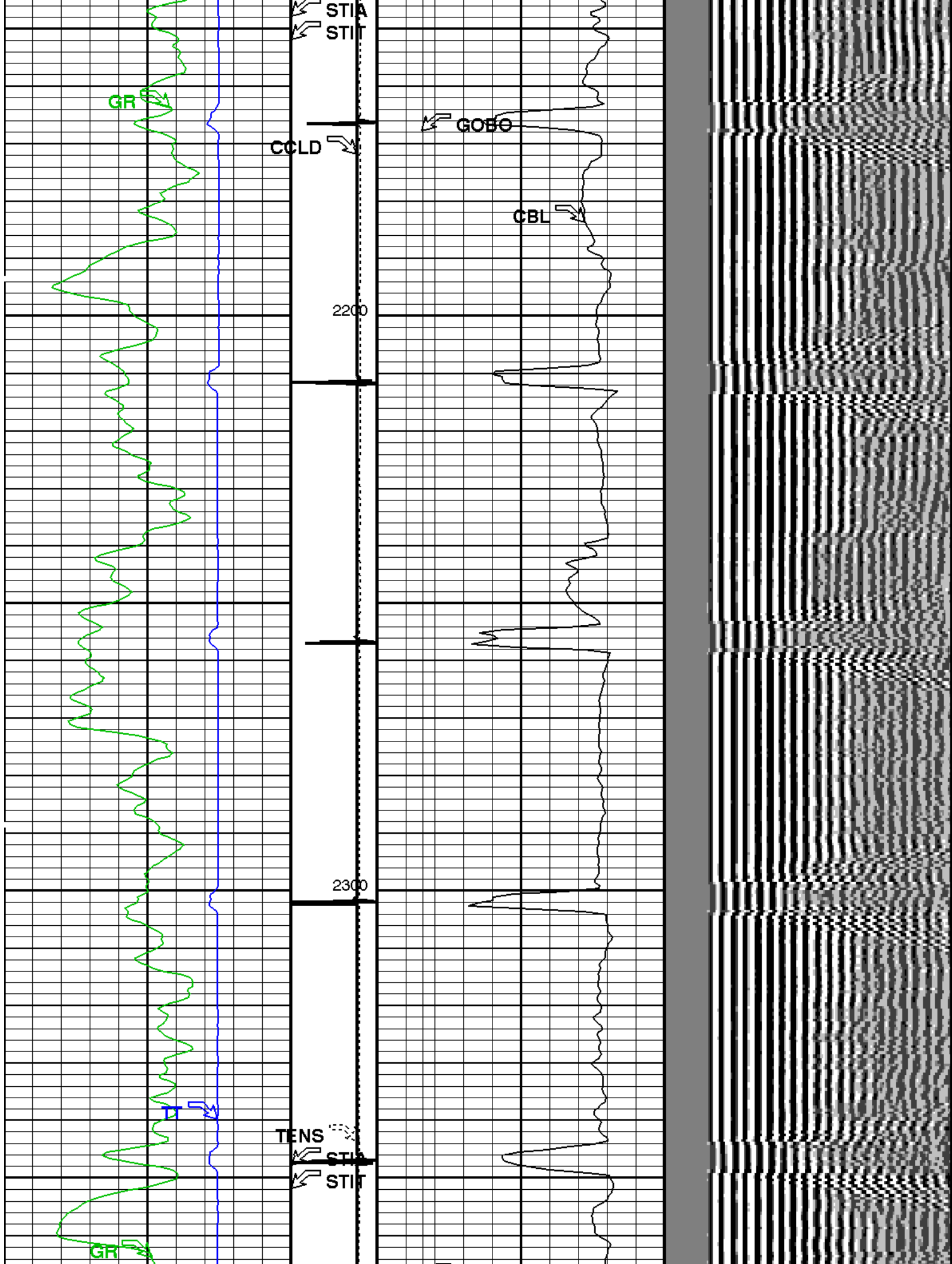


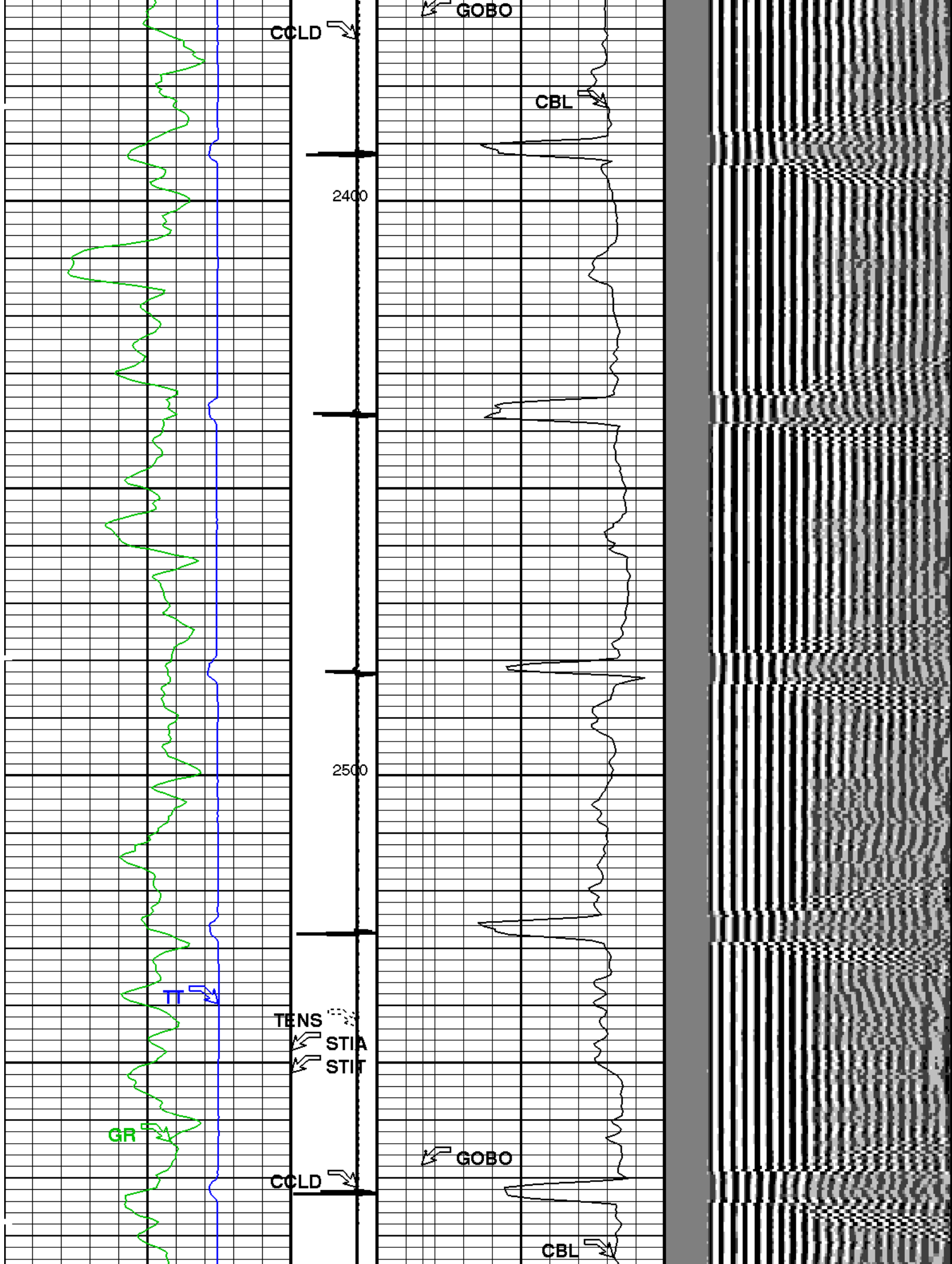


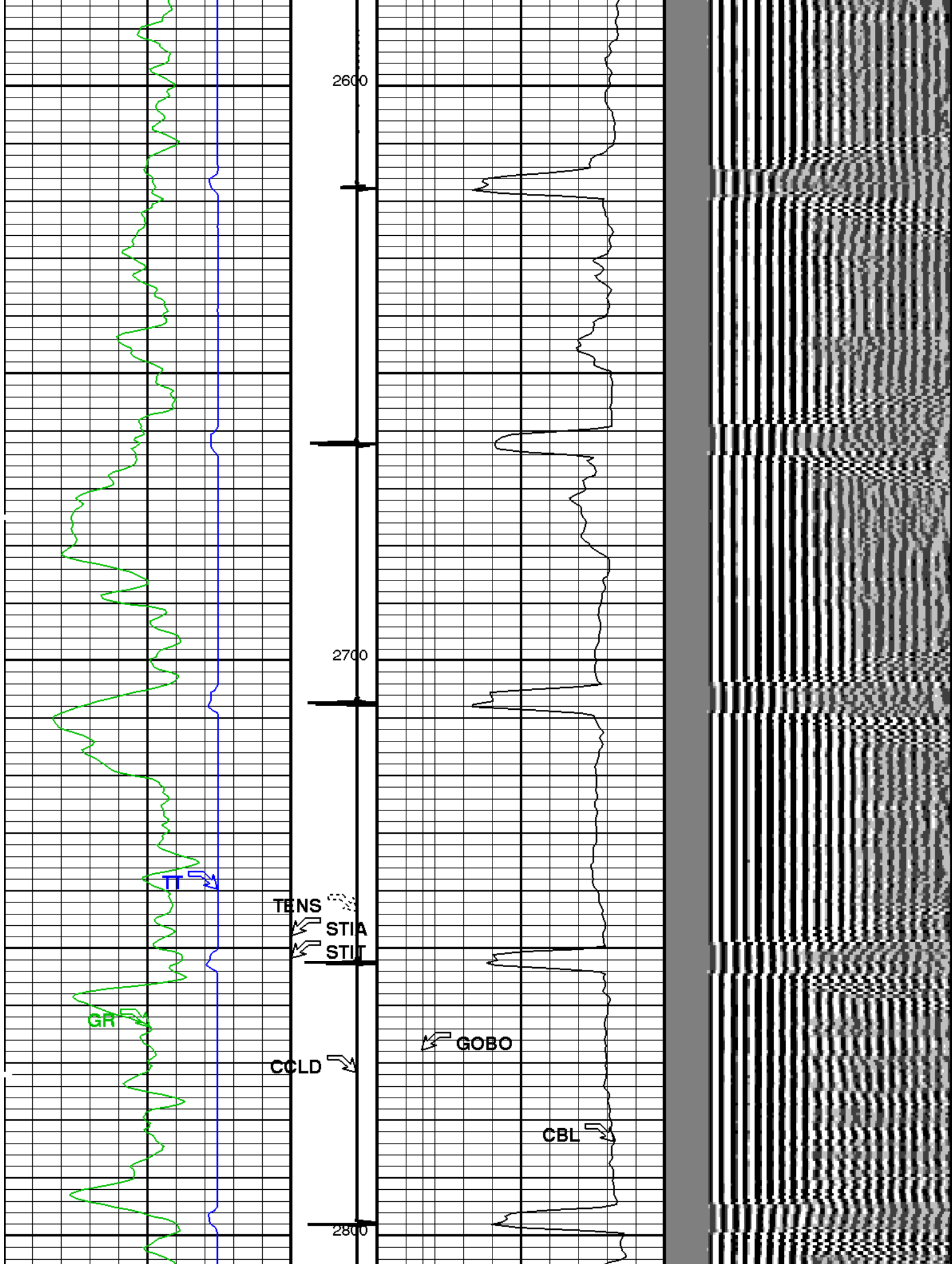


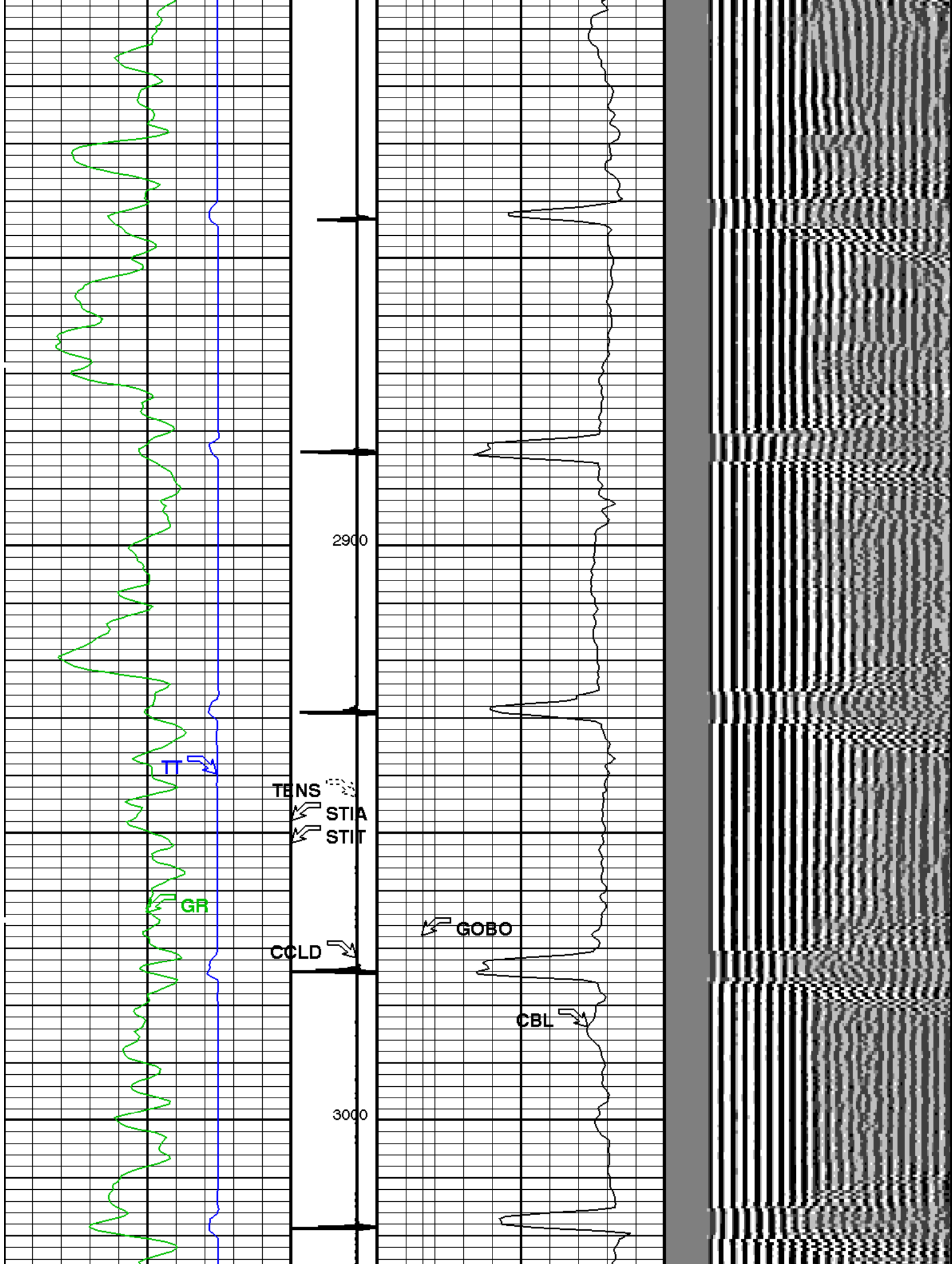


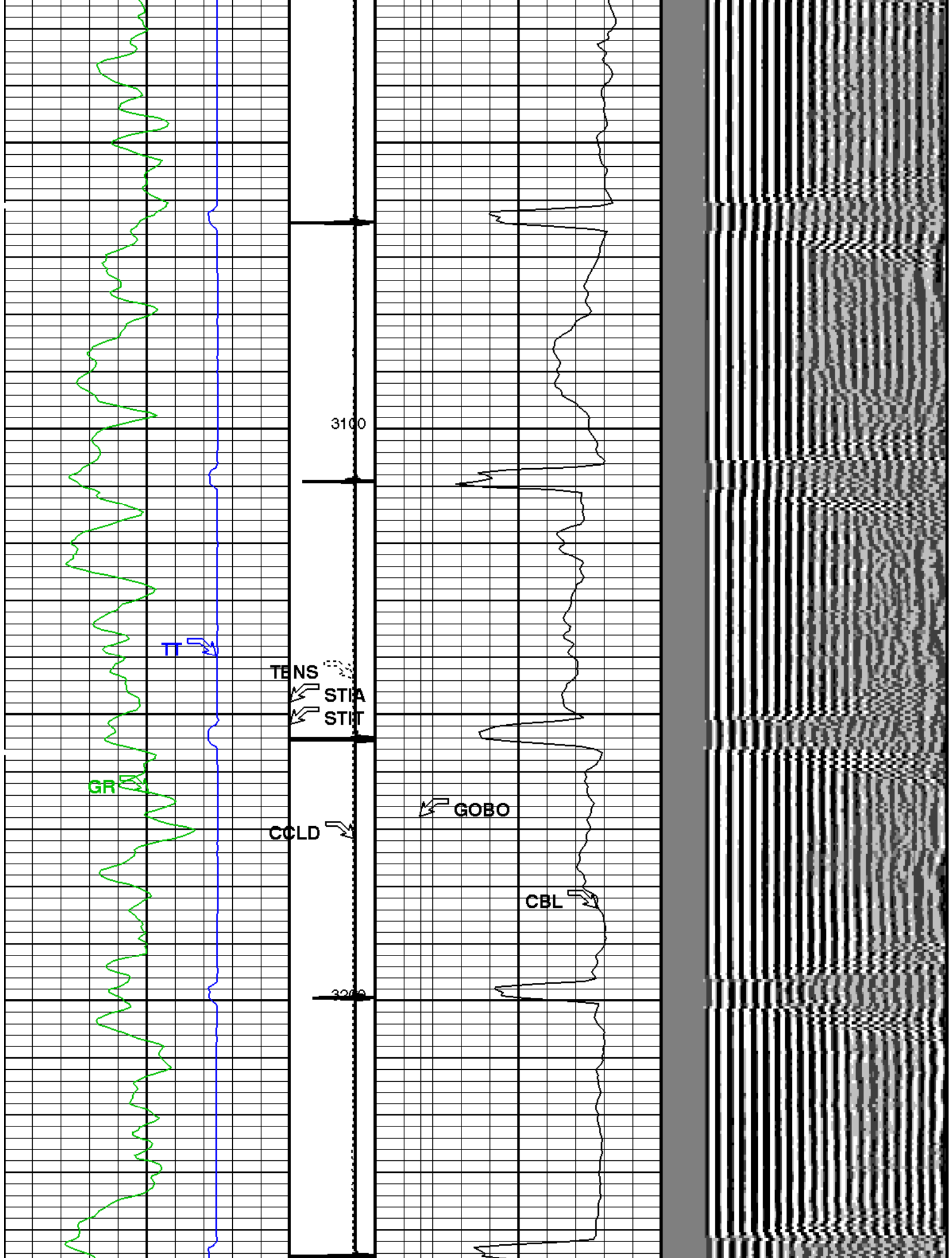


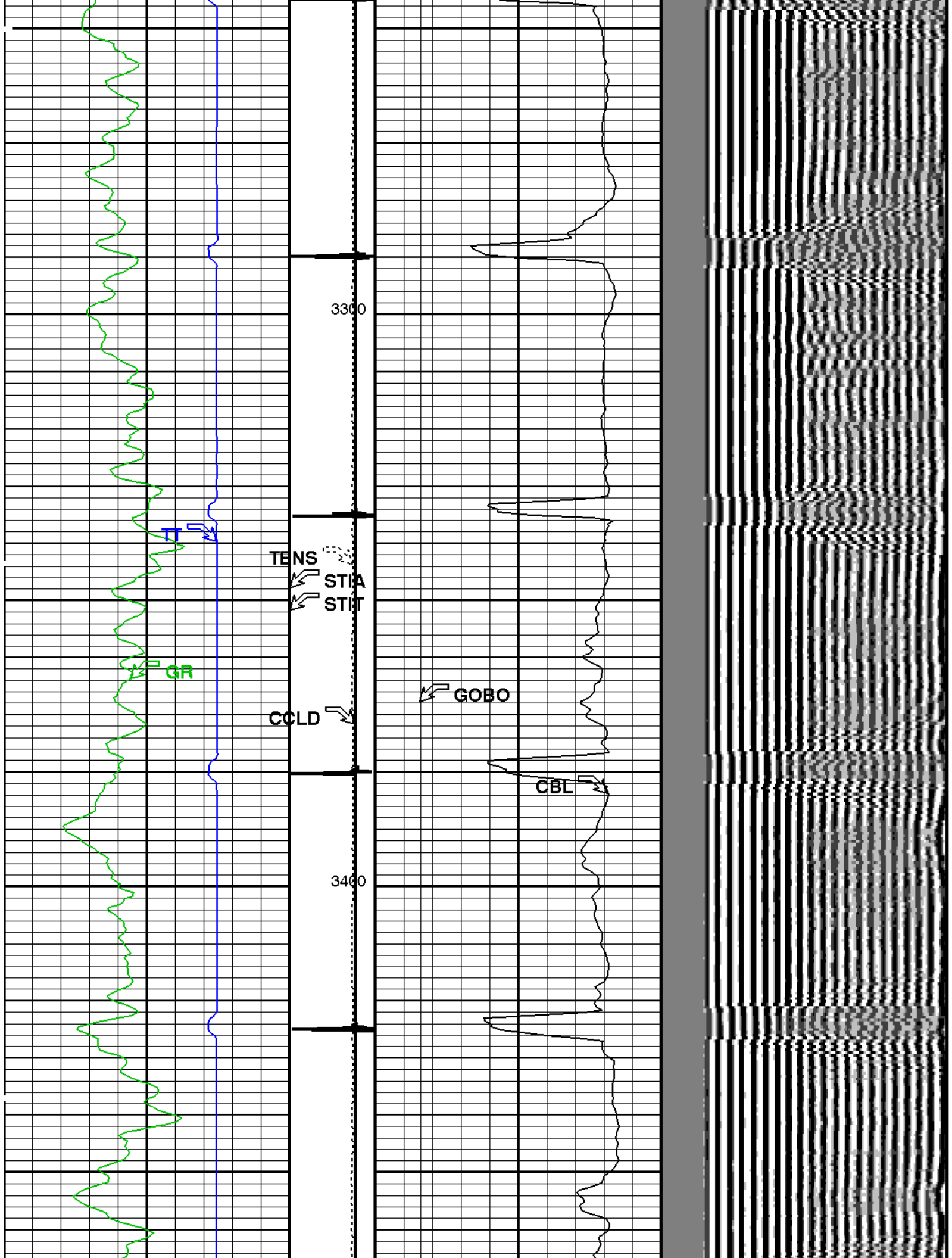


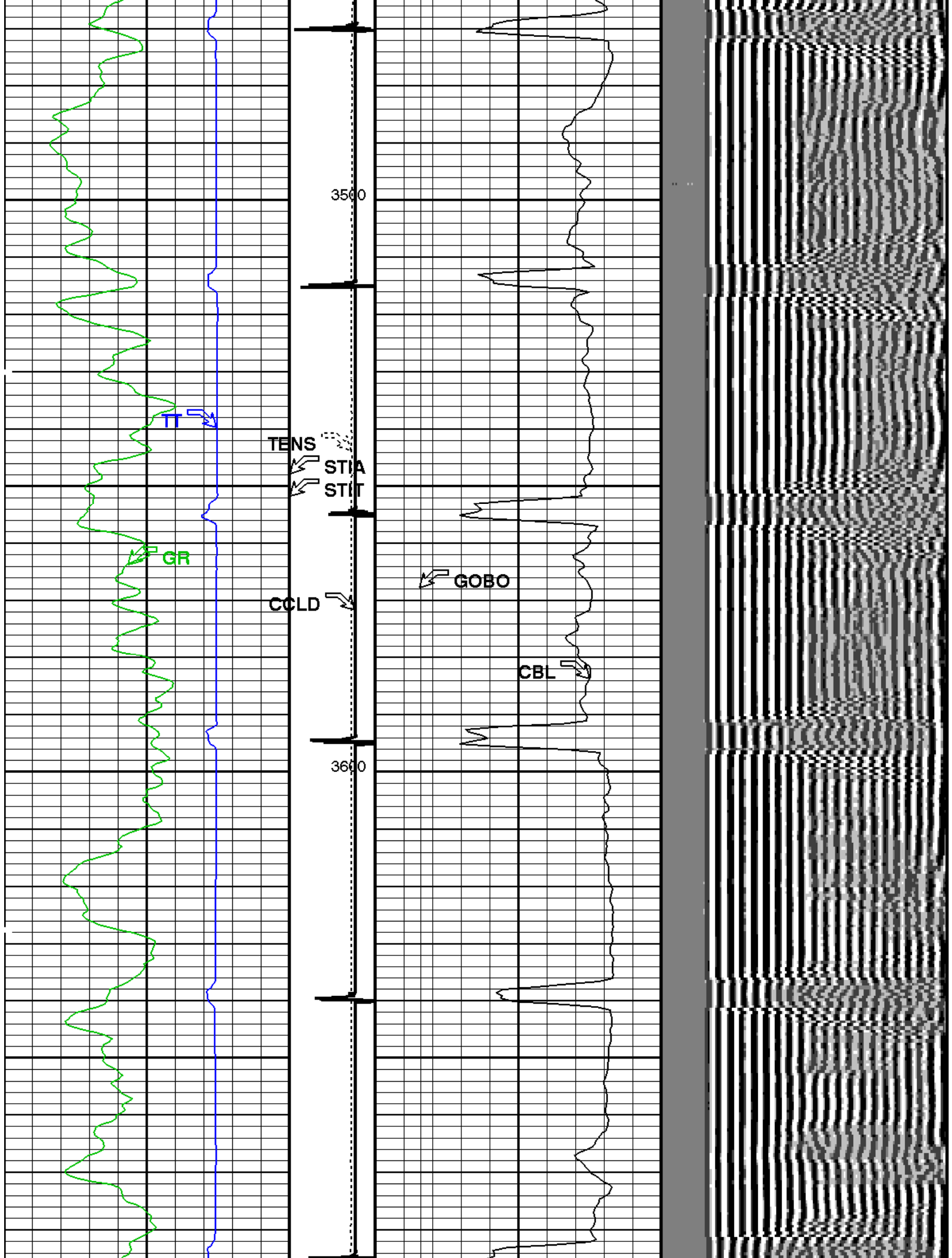


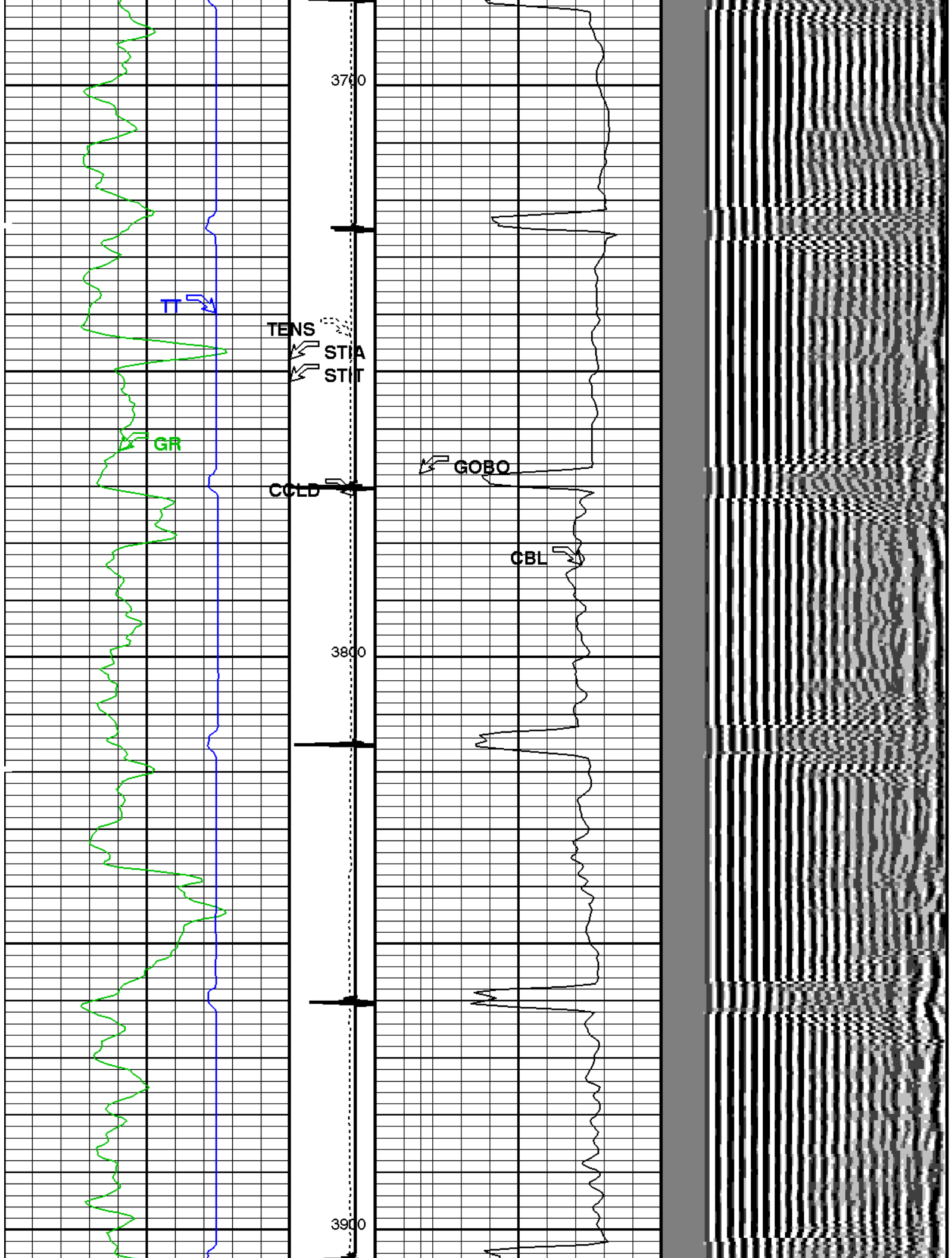


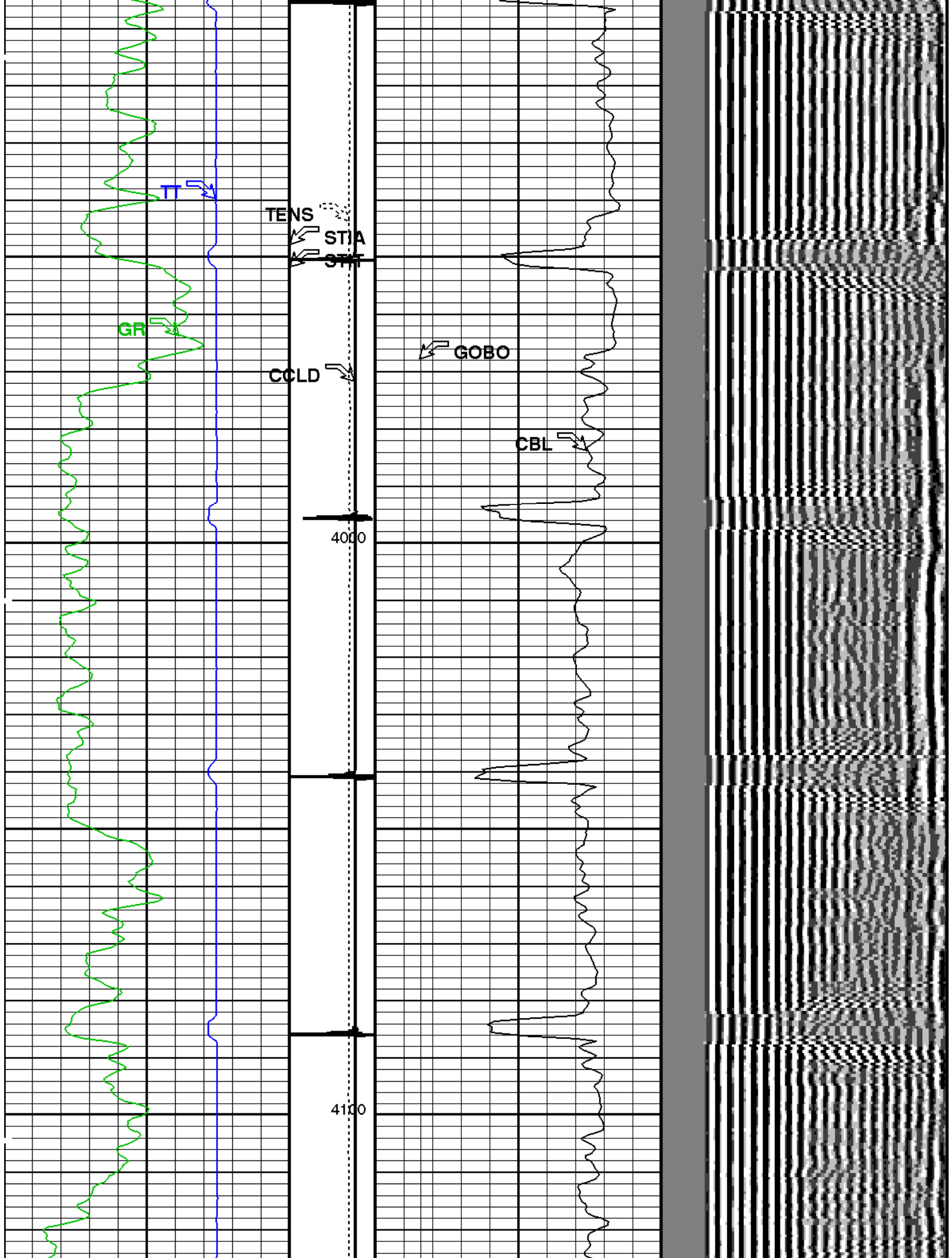


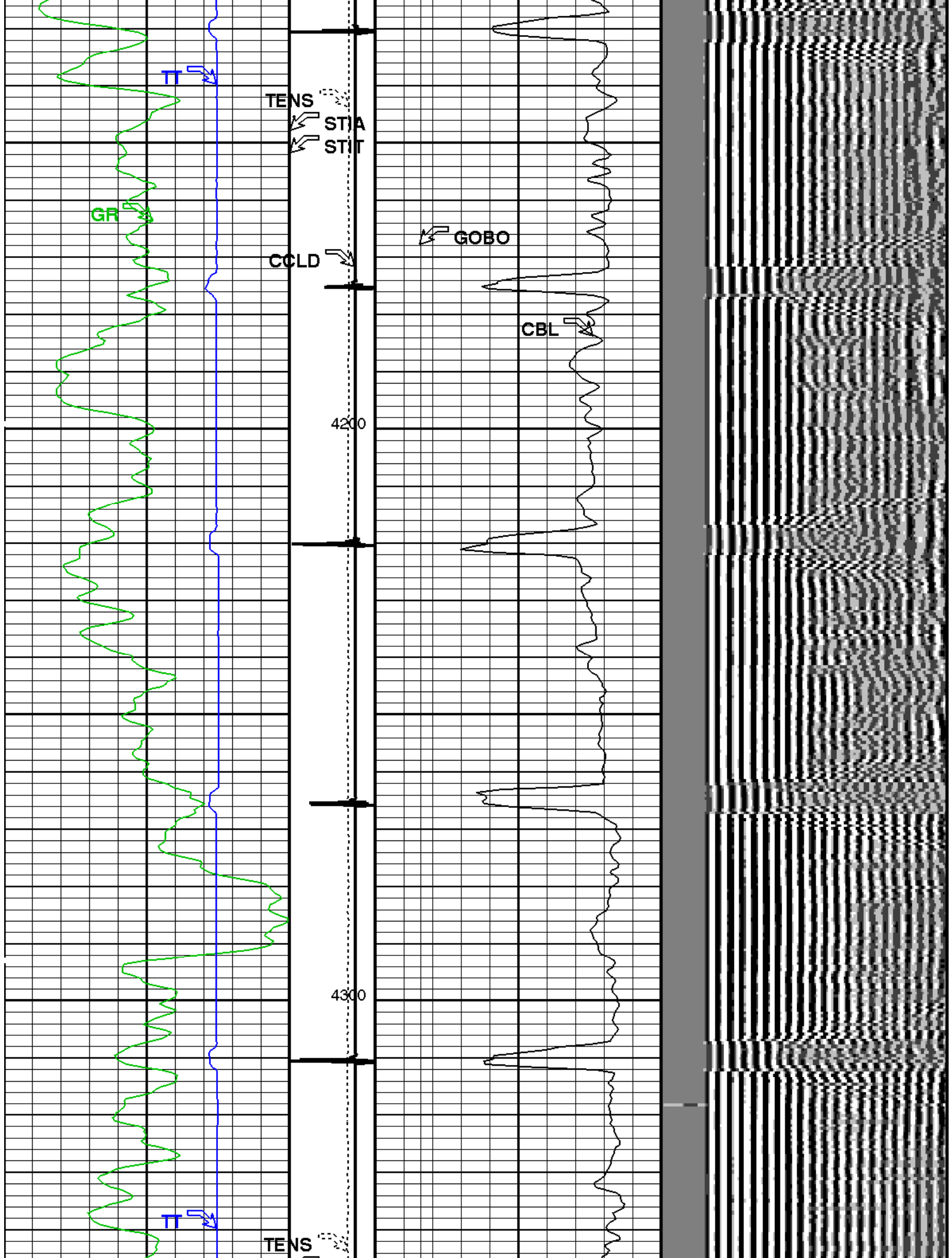


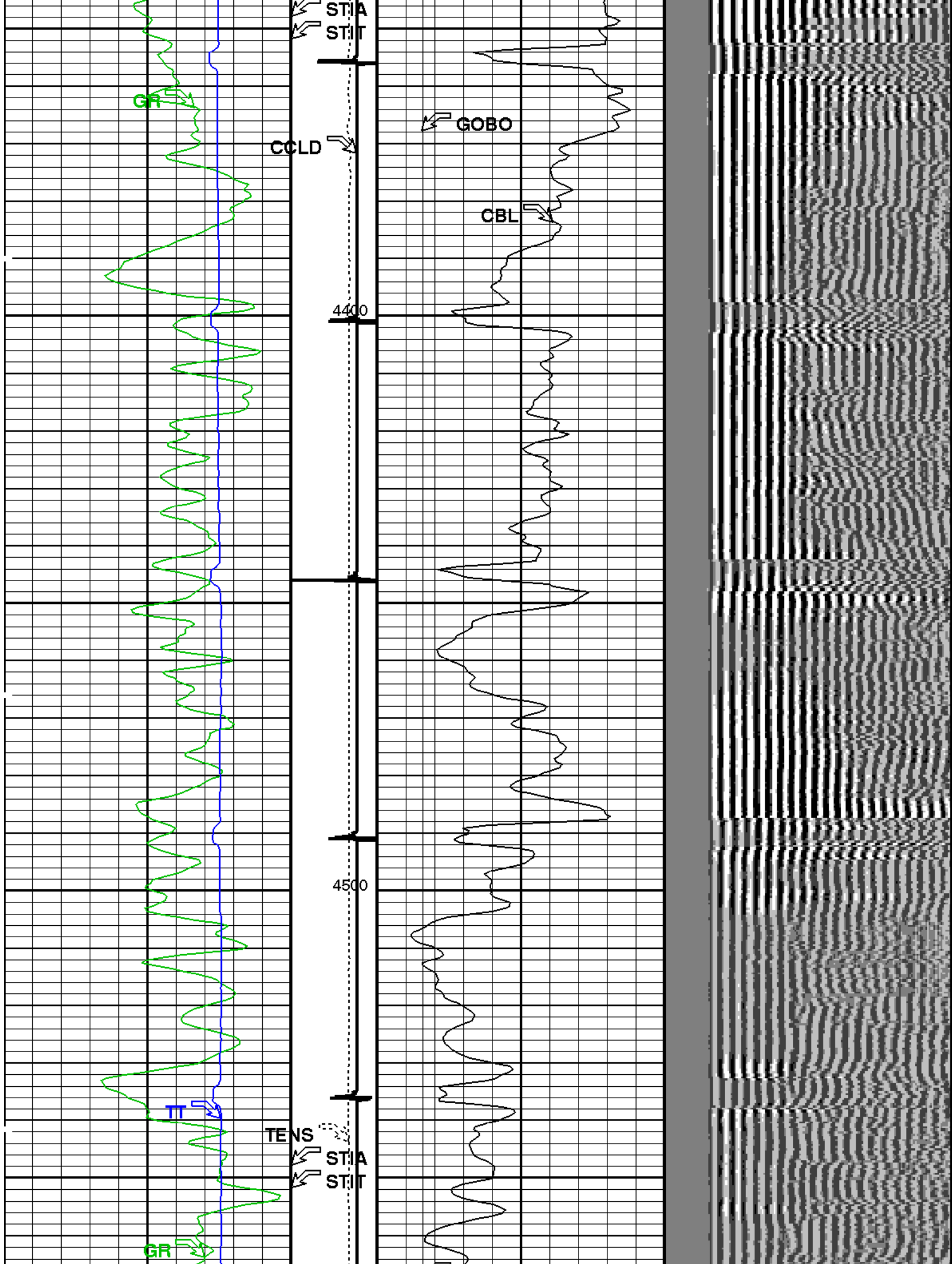


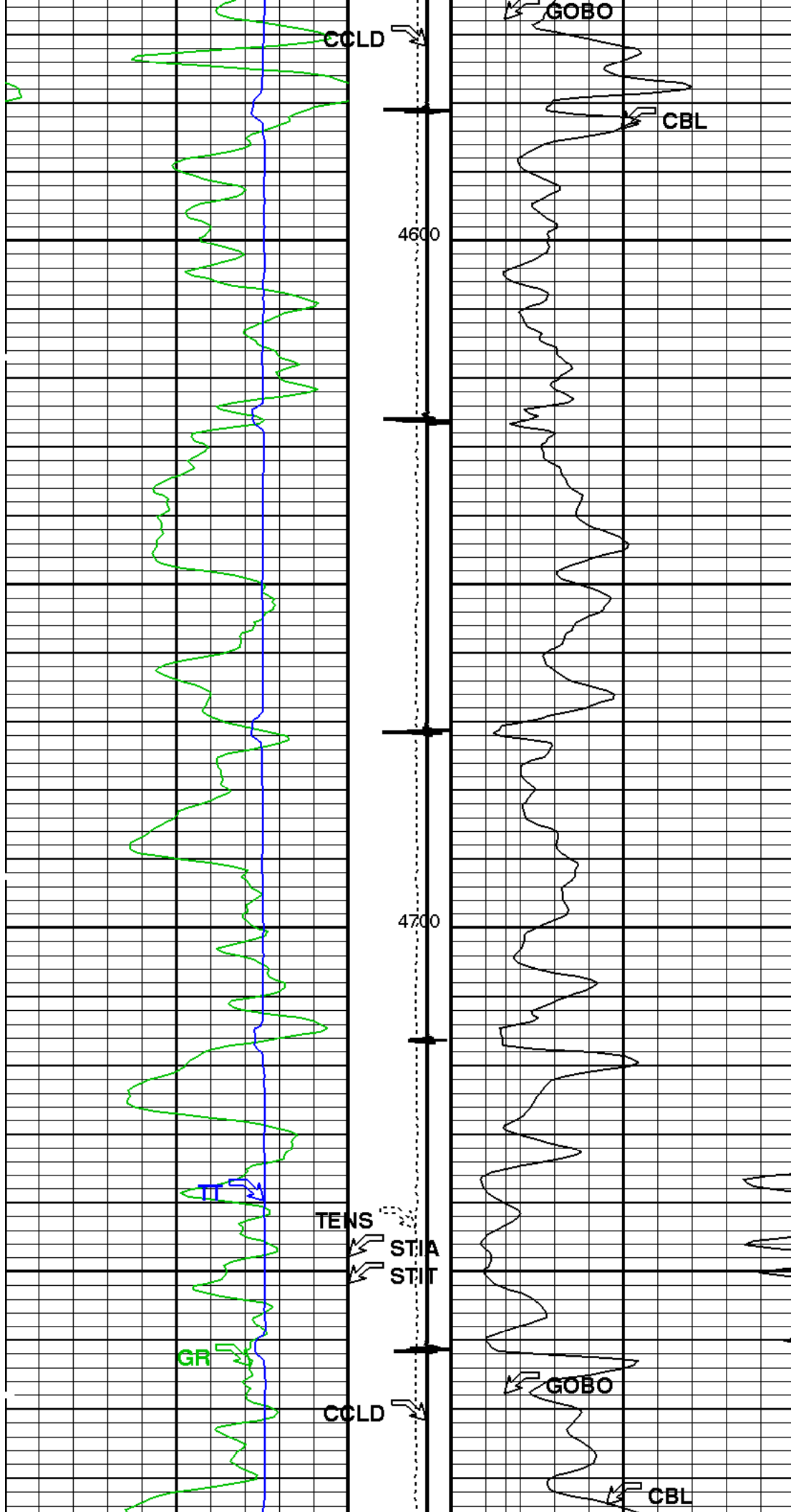


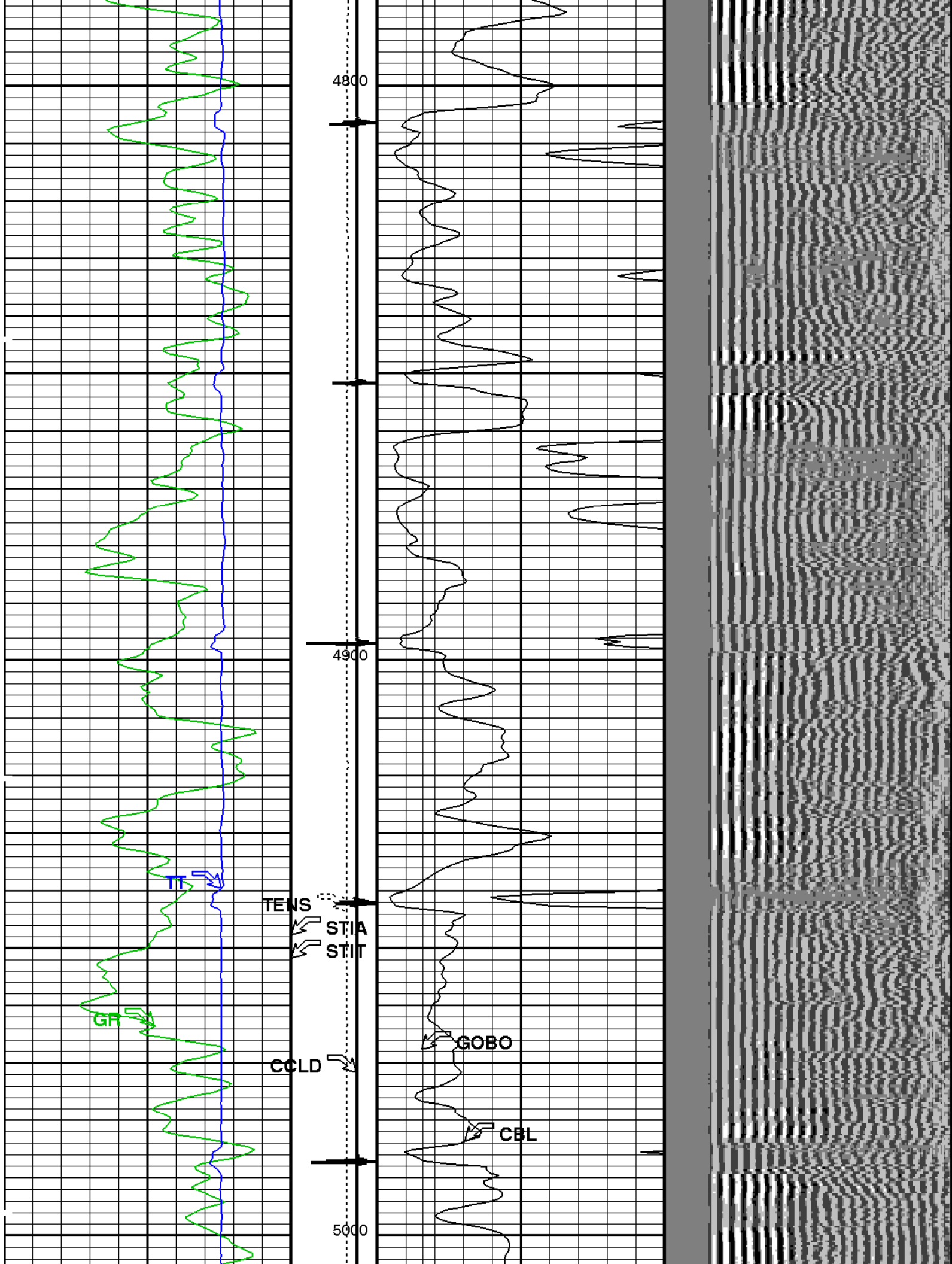


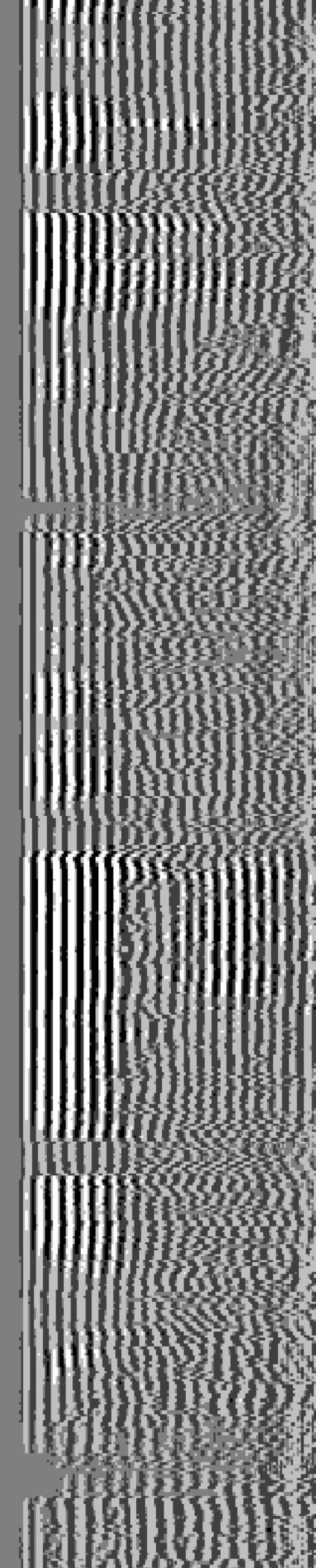
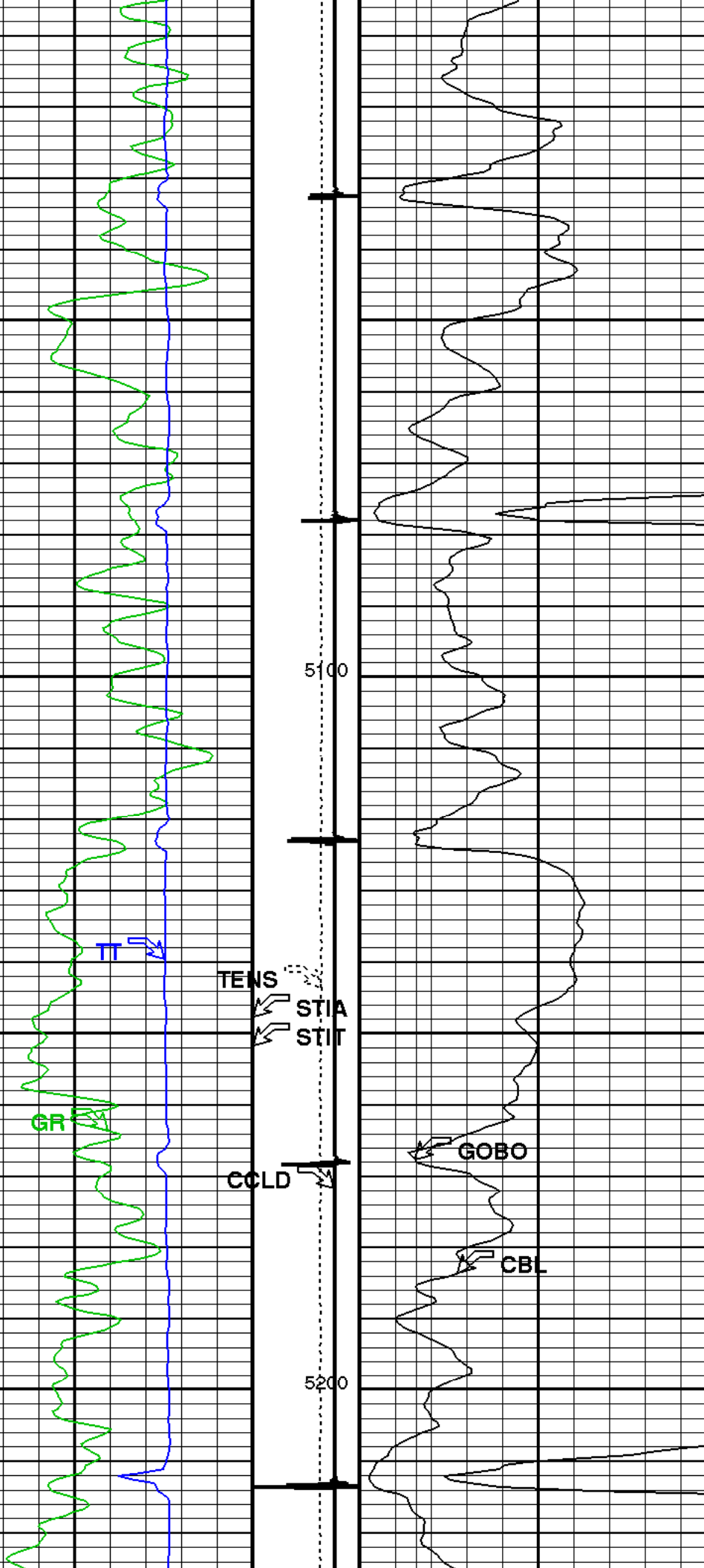


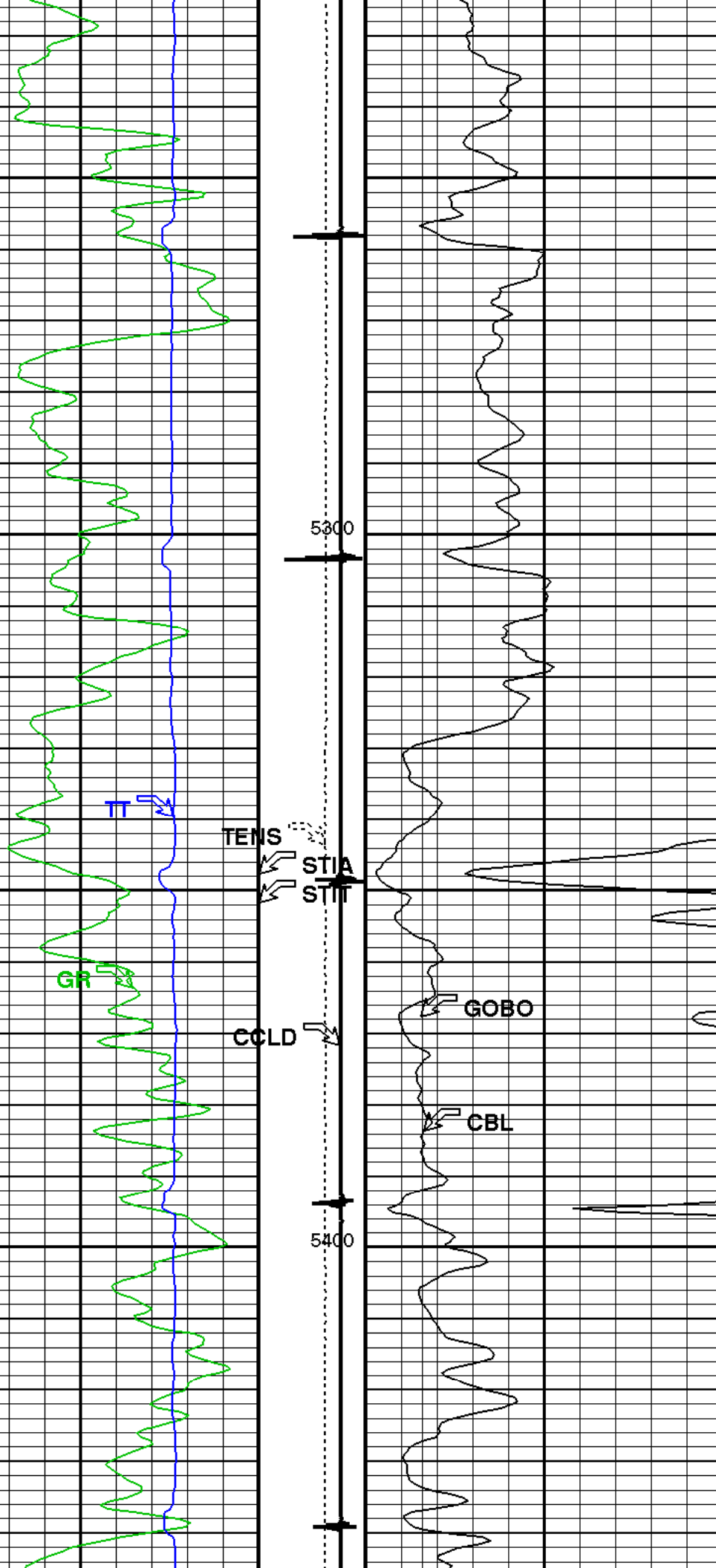


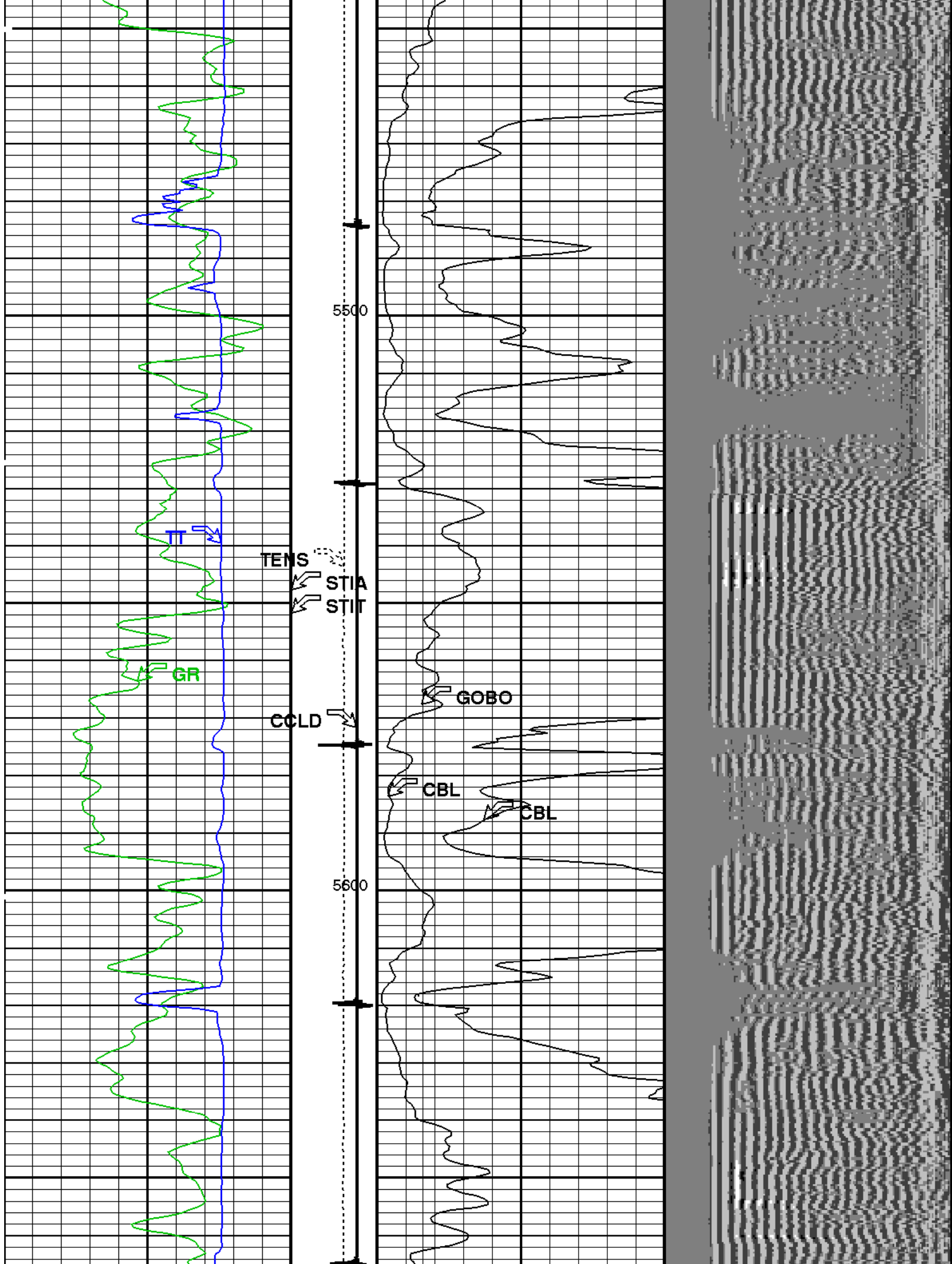


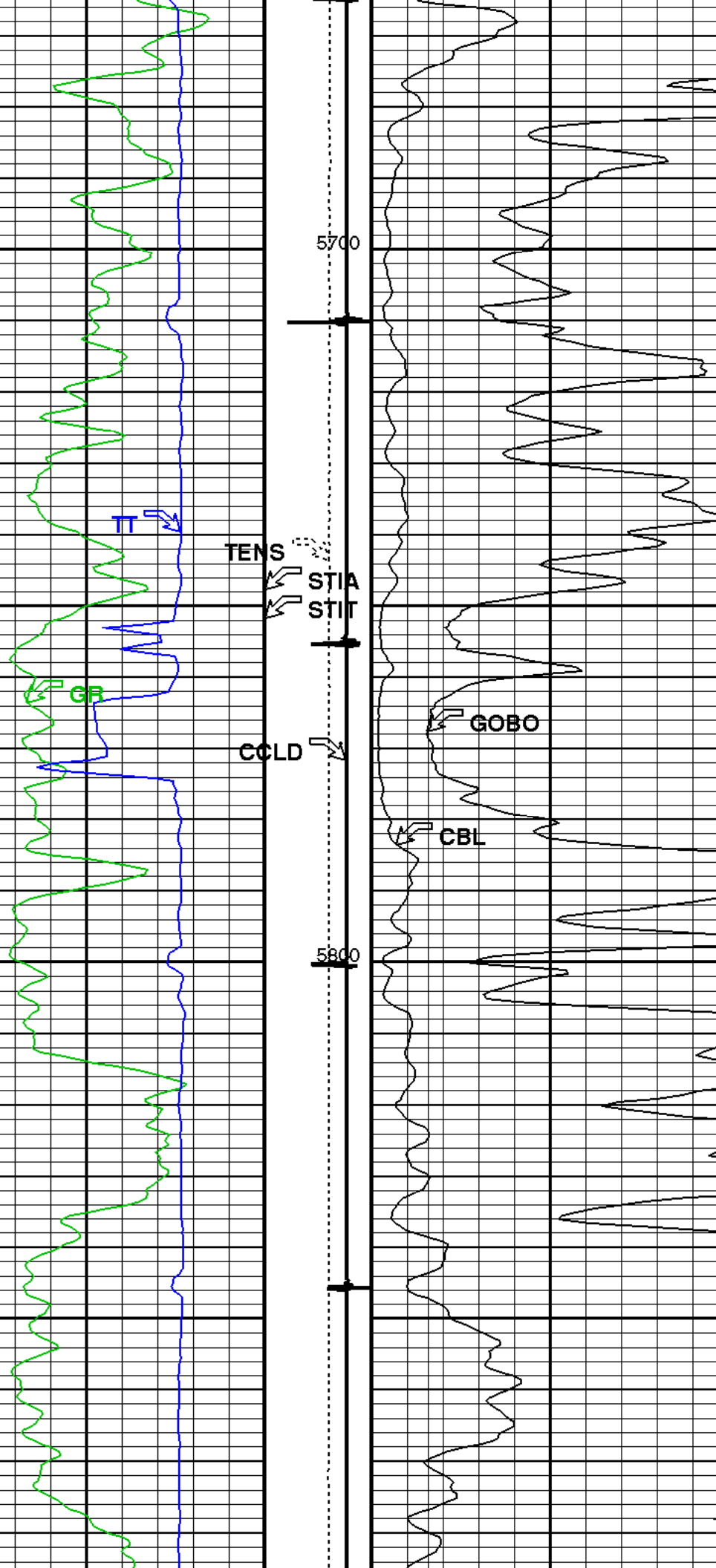


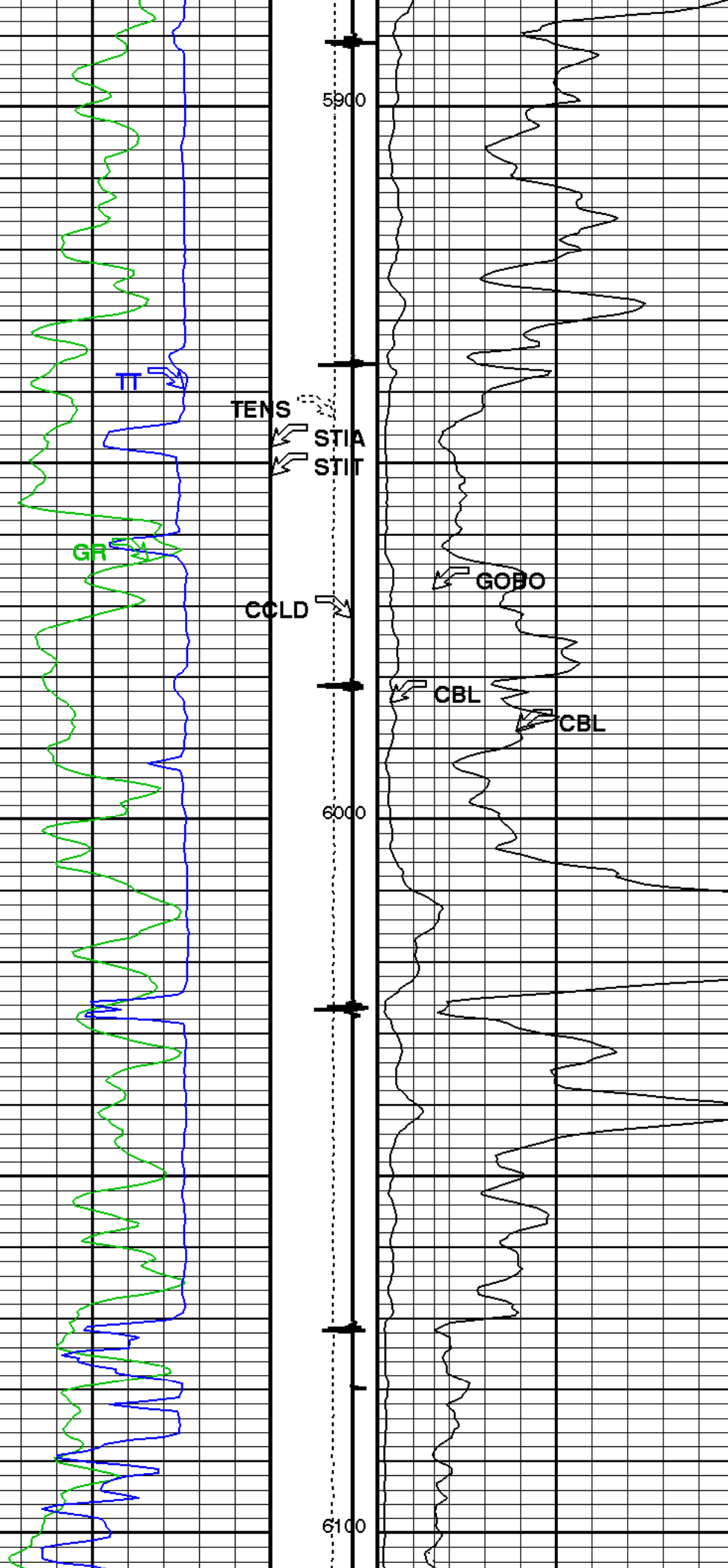


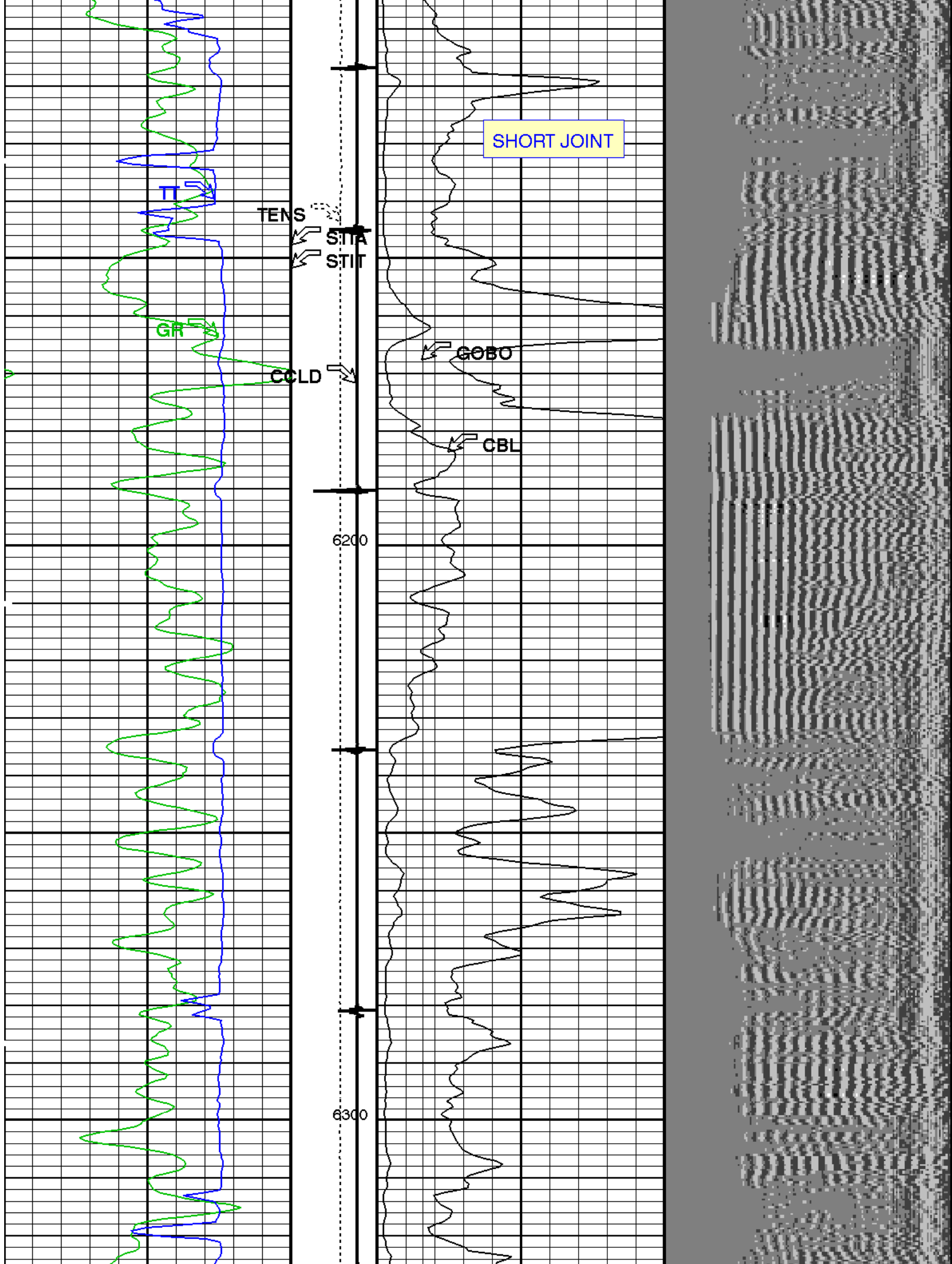


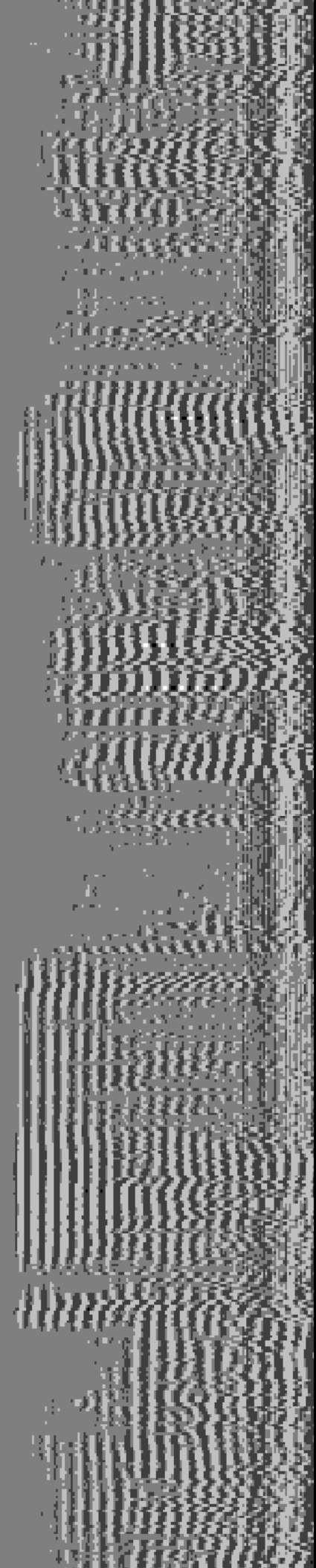
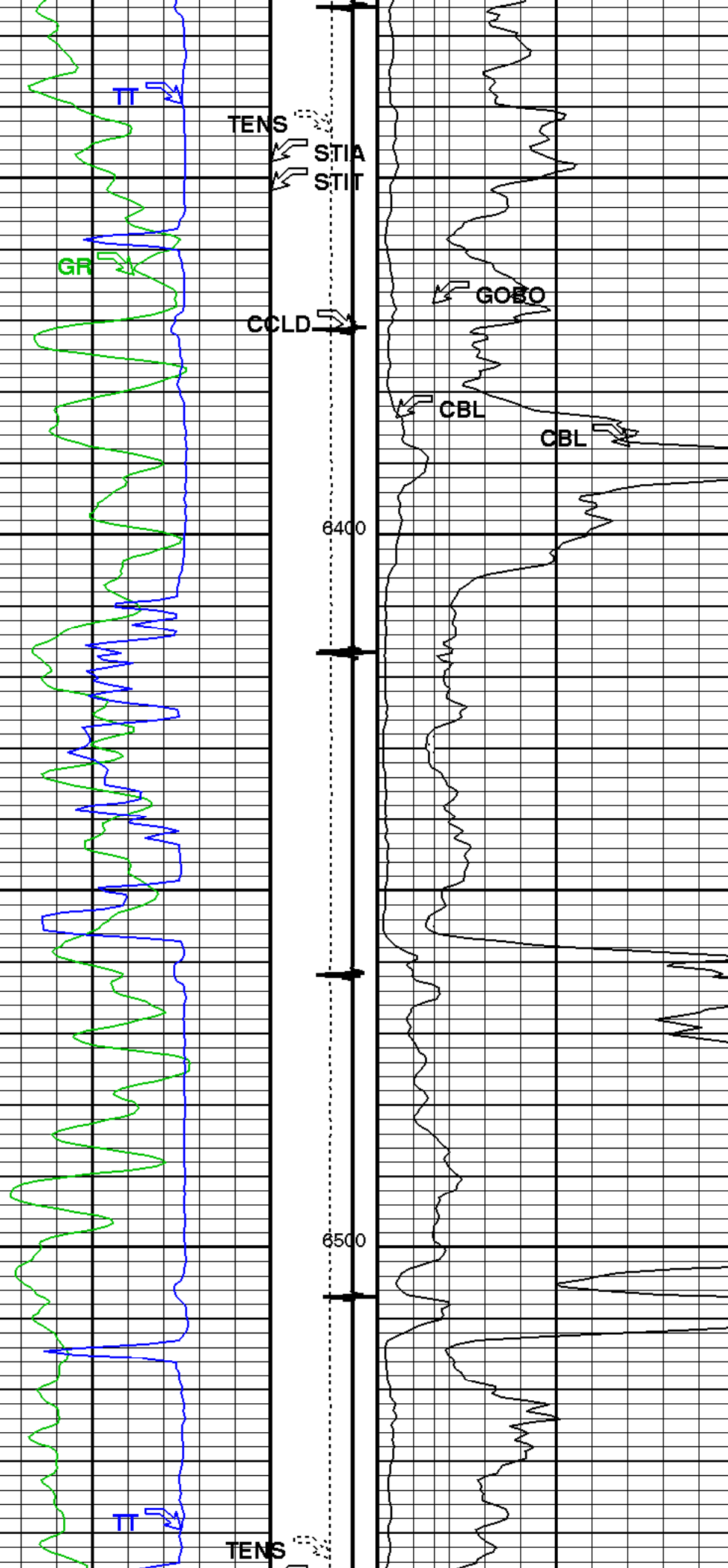


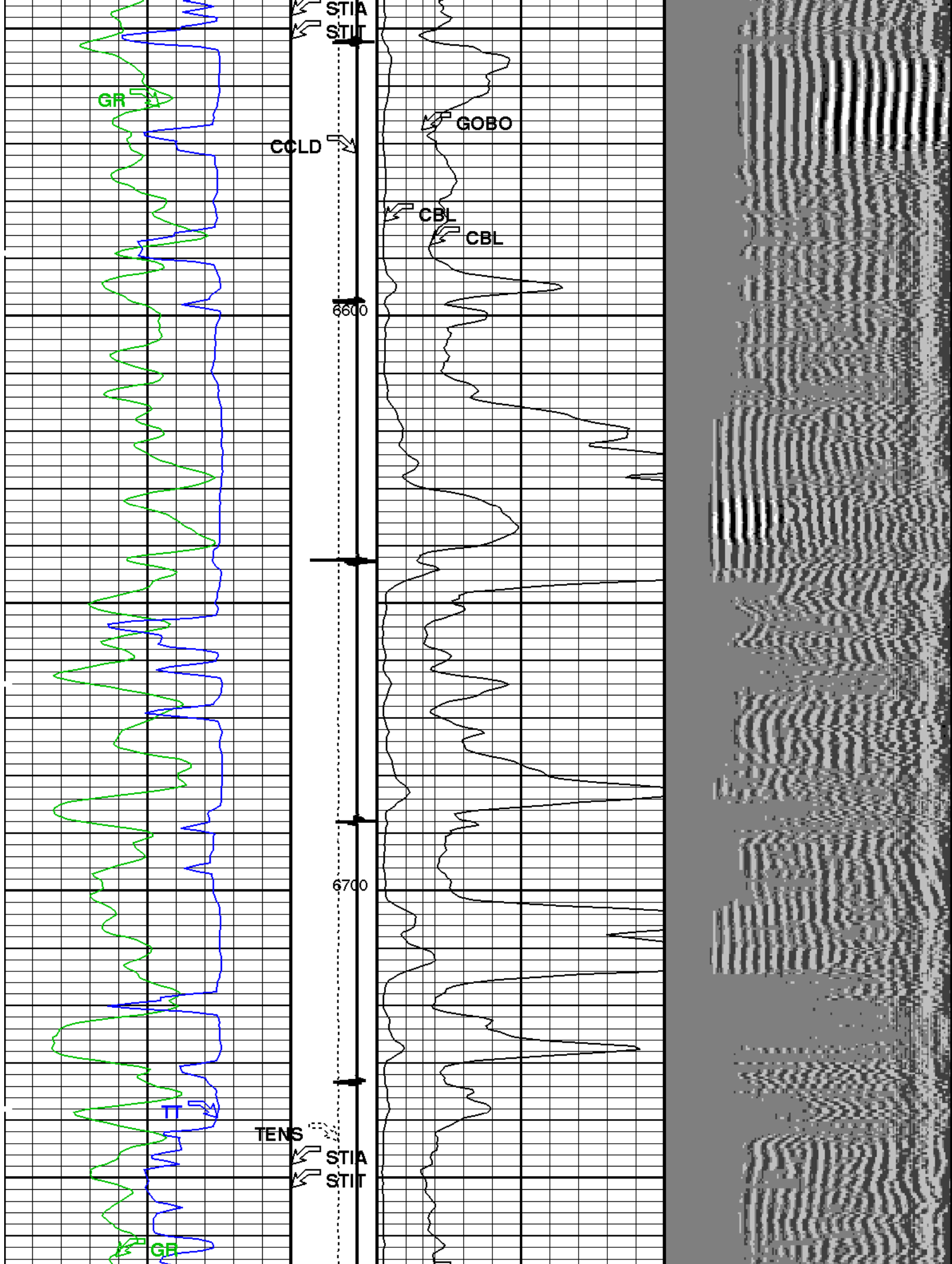


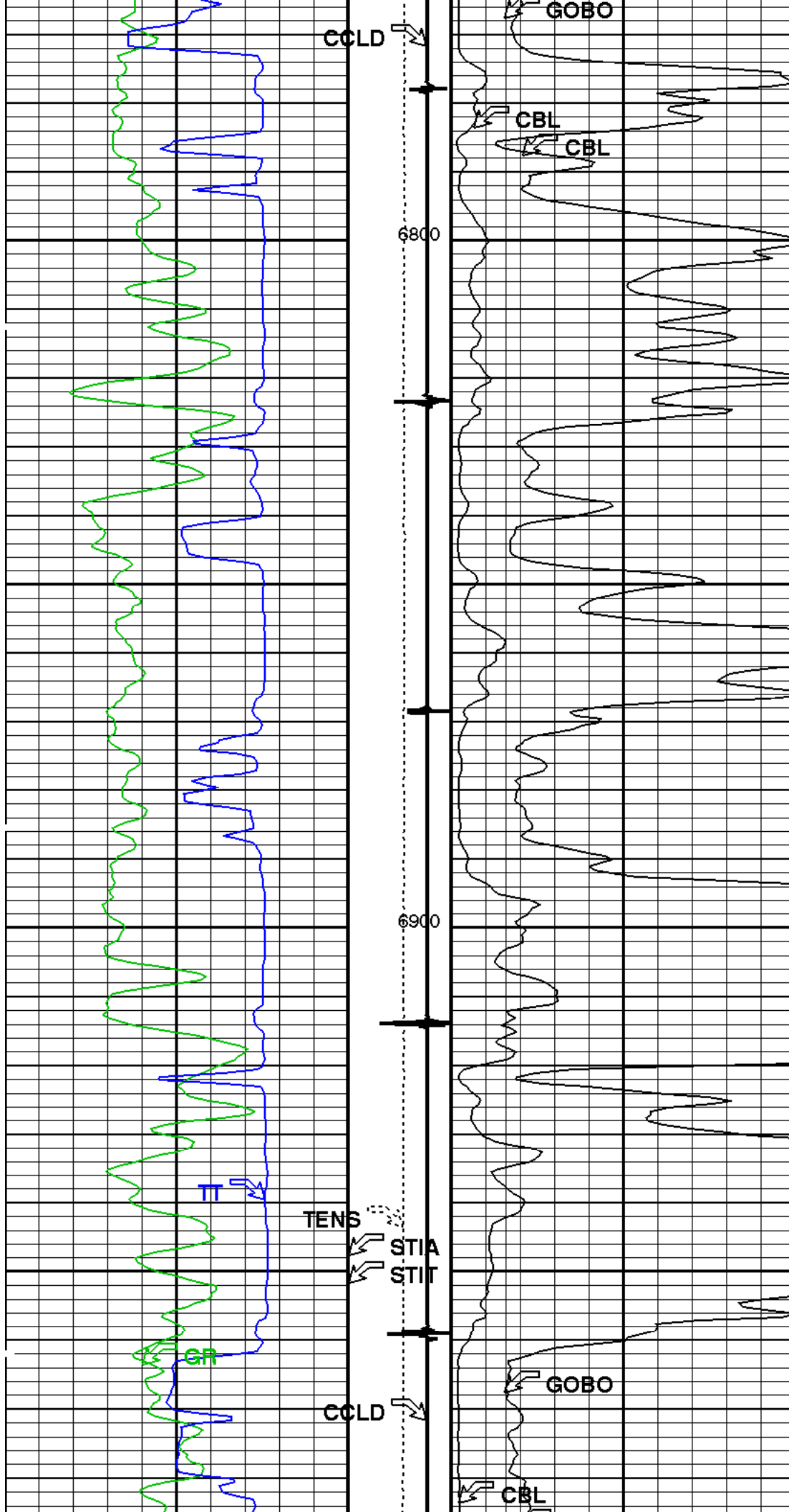


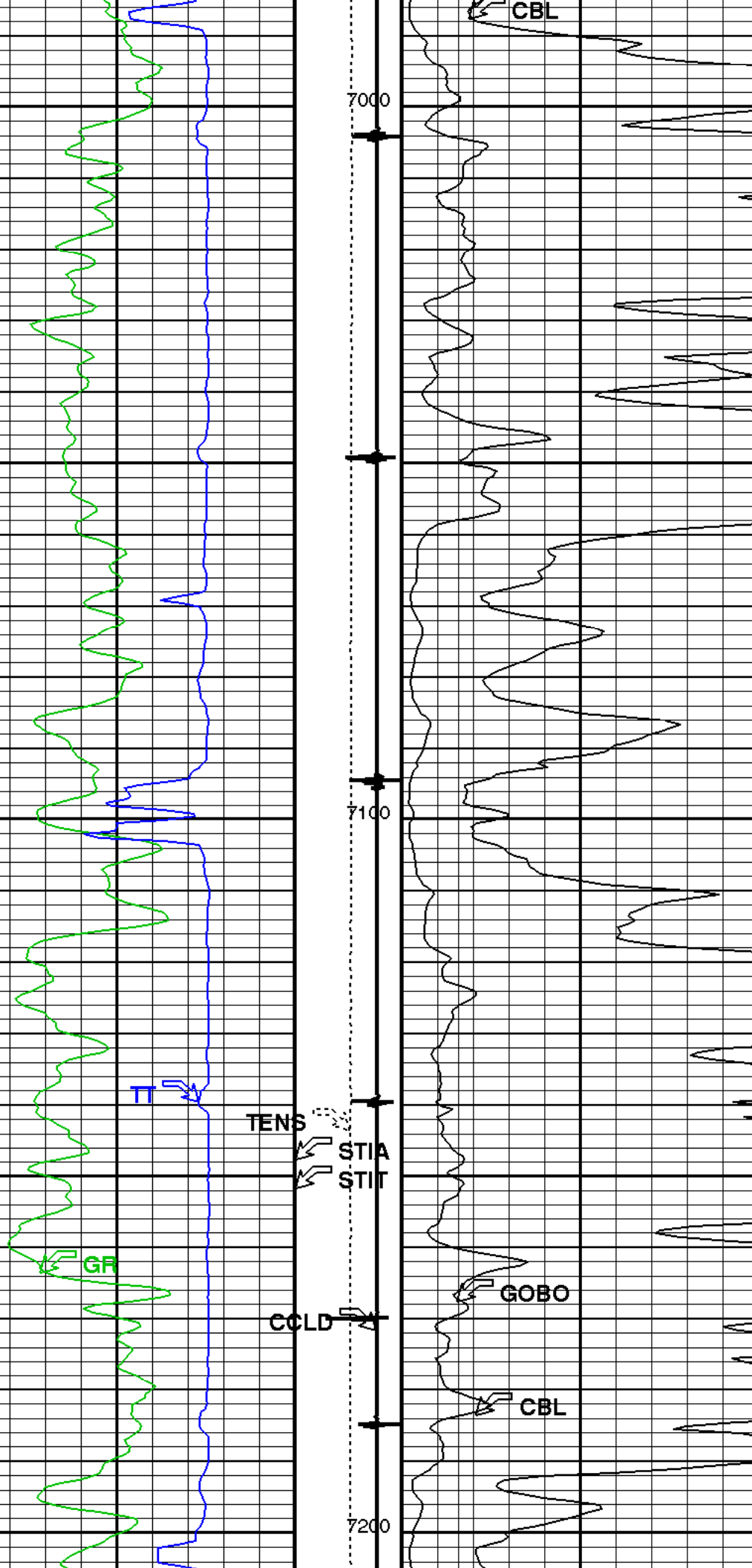


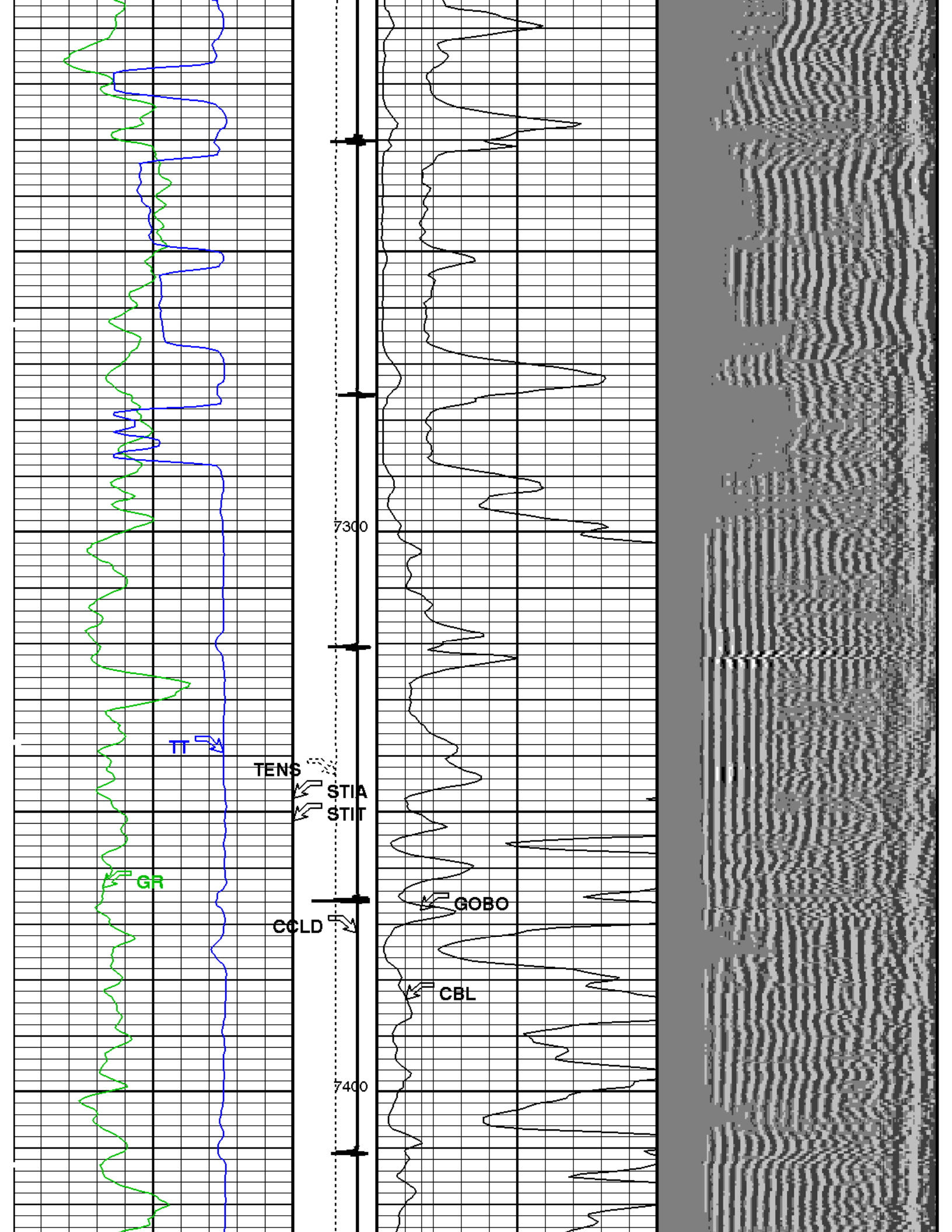


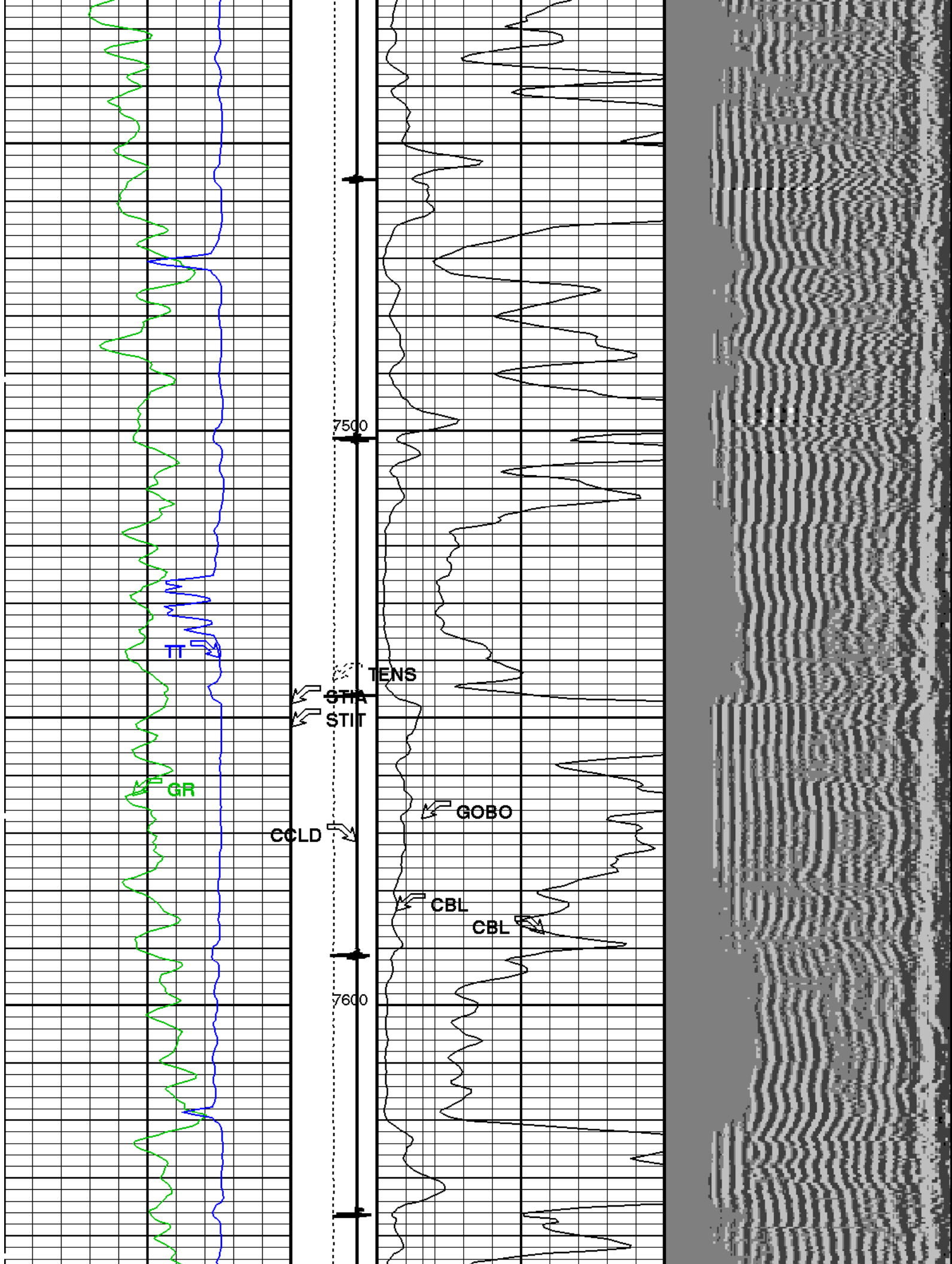


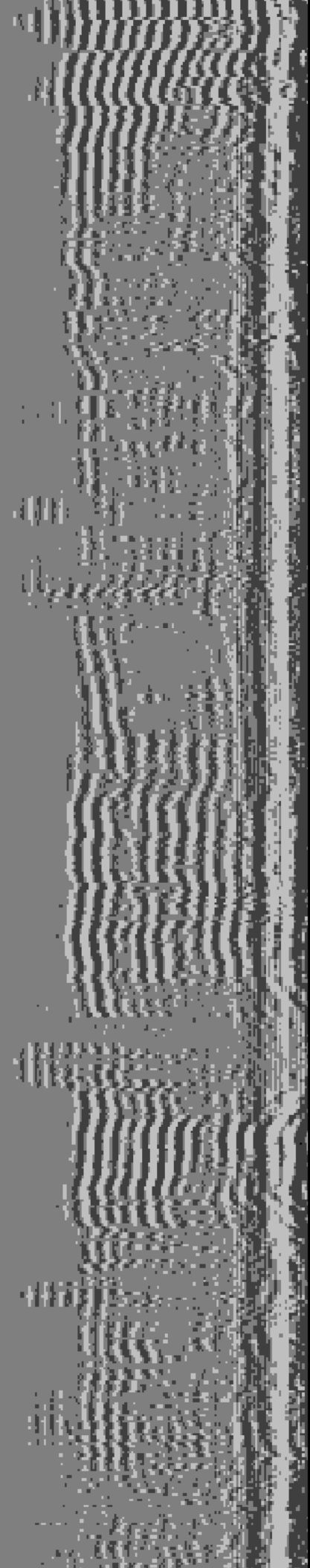
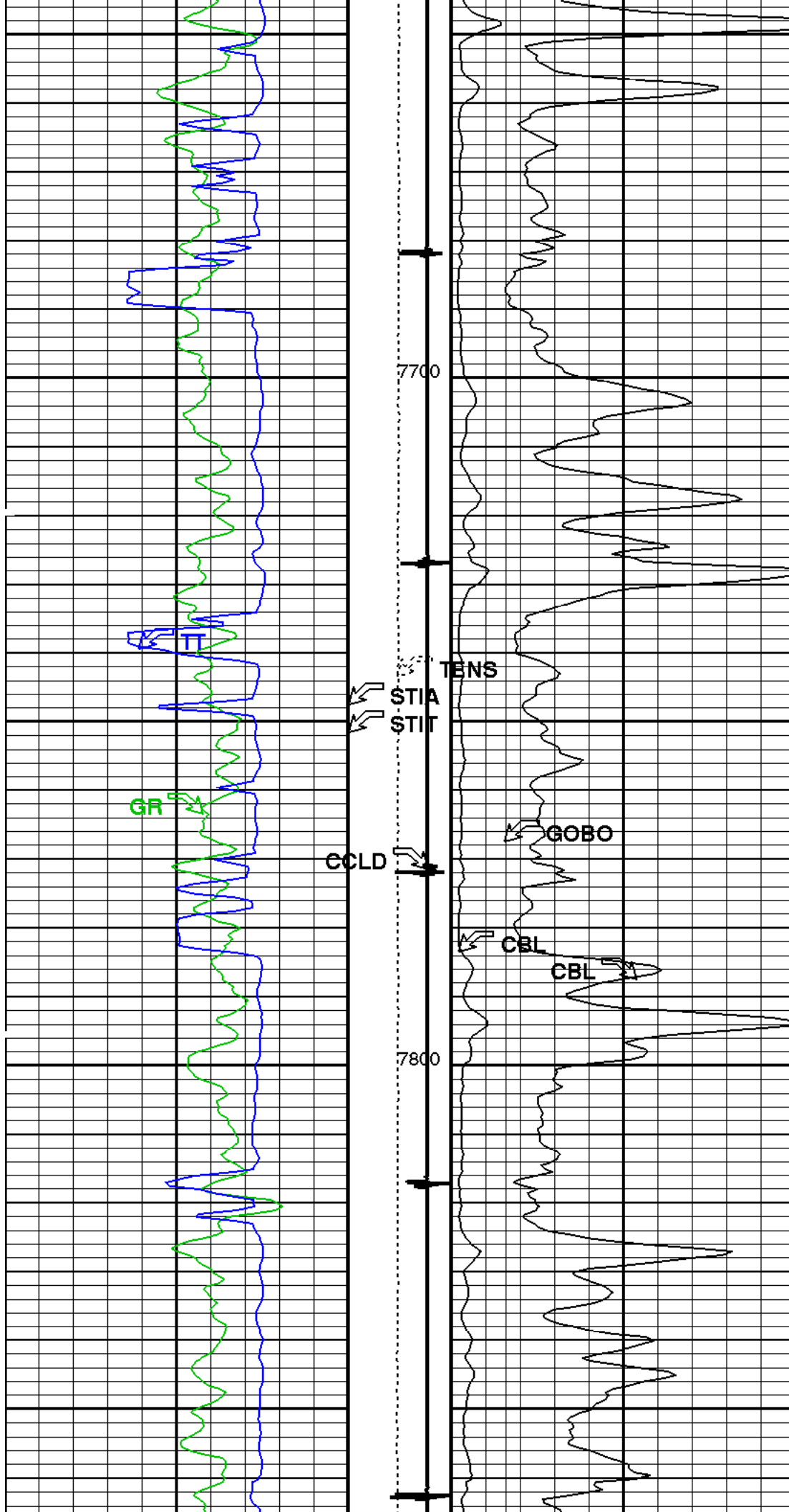


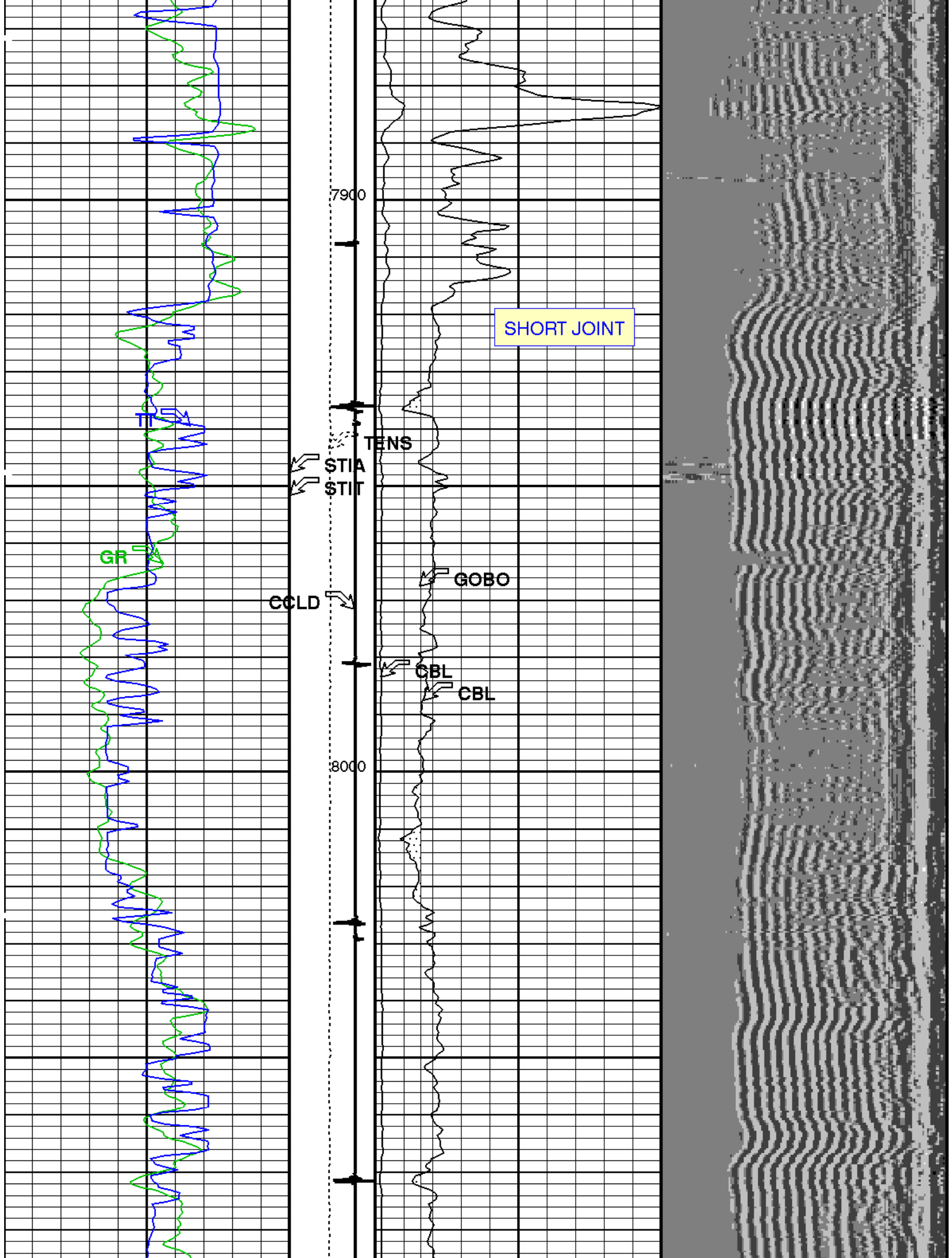


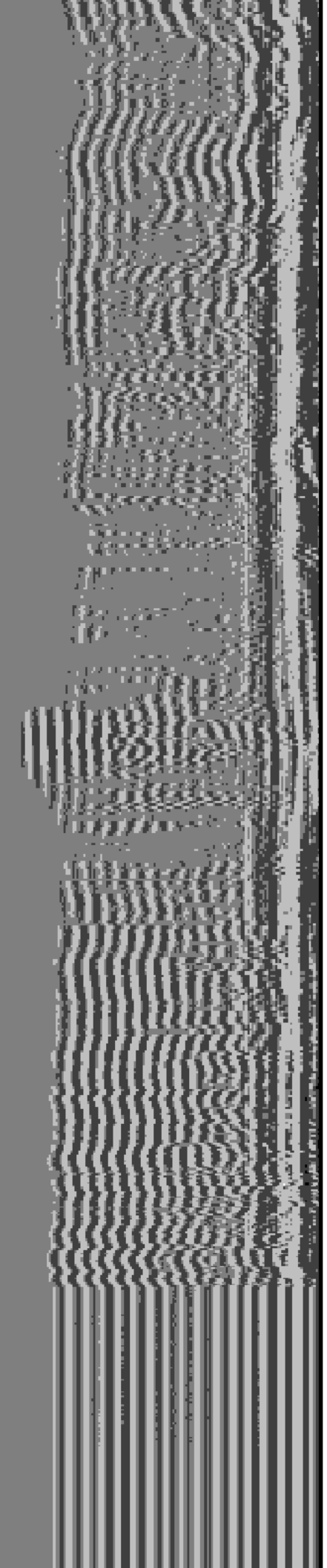
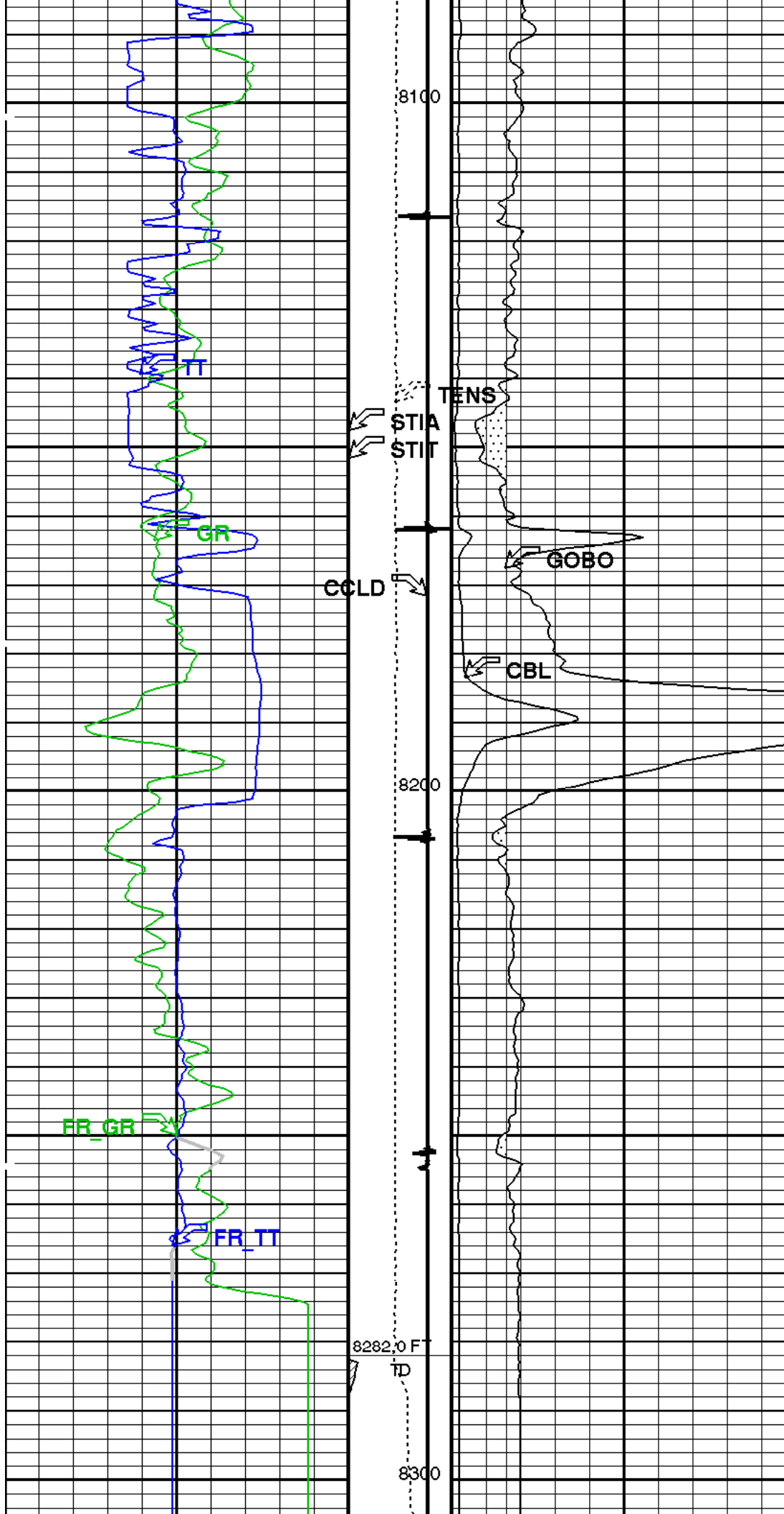













| | | | | |
|--|--|--|--|--|
| Gamma Ray (GR) 0 (GAPI) 150 | | Tension (TENS) (LBF) 2000 0 | CBL Amplitude (CBL) 0 (MV) 10 | Min  Max 200 VDL VariableDensity (VDL) (US) 1200 |
| Transit Time (TT) 400 (US) 200 | | Stuck Stretch (STIT) 0 (F) 50 | CBL Amplitude (CBL) 0 (MV) 100 | |
| | | Discriminat ed CCL (CCLD) 3 (V) -1 | Good Bond (GOBO) 0 (MV) 10 | |
| | | Cable Drag From STIA to STIT | GoodBond From ACBL to GOBO | |
| | | Tool/Tot. Drag From D3T to STIA | | |

| | | | |
|---------------------------|--|-----------|------|
| CB3T | SCMT CBL 3 ft Fixed Threshold Level | 20 | MV |
| CB5D | SCMT CBL 5 ft Peak Detection Mode | PEAK | |
| CB5G | SCMT CBL 5 ft Peak Detection T0_Delay and Noise Gate | 342.424 | US |
| CB5T | SCMT CBL 5 ft Fixed Threshold Level | 20 | MV |
| CBLG | CBL Gate Width | 40 | US |
| CBRA | CBL LQC Reference Amplitude in Free Pipe | 80 | MV |
| CMCF | CBL Cement Type Compensation Factor | 1 | |
| CMTG | SCMT Slow Channel Multiplexer Mode | SCAN | |
| CMTM | SCMT Operating Mode | LOG | |
| CSCS | SCMT Slow Channel Index | VCC | |
| CTHI | Casing Thickness | 0.255617 | IN |
| DTF | Delta-T Fluid | 204.5 | US/F |
| FATT | Acoustic Attenuation due to Fluid | 0 | DB/F |
| FCF | CBL Fluid Compensation Factor | 1 | |
| GOBO | Good Bond | 1.53811 | MV |
| MAPD | SCMT MAP Peak Detection Mode | PEAK | |
| MAPG | SCMT MAP Peak Detection T0_Delay and Noise Gate | 171.424 | US |
| MAPT | SCMT MAP Fixed Threshold Level | 30 | MV |
| MATT | Maximum Attenuation | 16.5449 | DB/F |
| MCCF | MAP Cement Type Compensation Factor | 1 | |
| MCI | Minimum Cemented Interval for Isolation | 1.25 | FT |
| MMSA | MAP Minimum Sonic Amplitude | 4.27504 | MV |
| MSA | Minimum Sonic Amplitude | 0.572744 | MV |
| PEDE | Peak Detection On/Off Switch in Playback | OFF | |
| VDLG | VDL Manual Gain | 5 | |
| ZCMT | Acoustic Impedance of Cement | 6.8 | MRAY |
| STI: Stuck Tool Indicator | | | |
| LBFR | Trigger for MAXIS First Reading Label | TDL | |
| STKT | STI Stuck Threshold | 25 | FT |
| TDD | Total Depth - Driller | 8373.00 | FT |
| TDL | Total Depth - Logger | 8282.00 | FT |
| System and Miscellaneous | | | |
| CSIZ | Current Casing Size | 4.500 | IN |
| CWEI | Casing Weight | 11.60 | LB/F |
| DFD | Drilling Fluid Density | 8.35 | LB/G |
| DO | Depth Offset for Playback | 5.0 | FT |
| PP | Playback Processing | RECOMPUTE | |
| TD | Total Depth | 8282 | FT |

Input DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|----------|
| DEFAULT | SCMT_PSP_078LUP | FN:75 | PRODUCER | 15-Jul-2009 11:32 | 8300.0 FT | 644.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|----------|

Output DLIS Files

| | | | | |
|---------|-----------------|-------|----------|-------------------|
| DEFAULT | SCMT_PSP_095PUP | FN:92 | PRODUCER | 15-Jul-2009 19:22 |
|---------|-----------------|-------|----------|-------------------|

Schlumberger

REPEAT PASS

MAXIS Field Log

Company: BILL BARRETT CORPORATION

Well: BBC 42B-23-692

Input DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|-----------|
| DEFAULT | SCMT_PSP_077LUP | FN:74 | PRODUCER | 15-Jul-2009 11:22 | 8291.5 FT | 7850.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|-----------|

Output DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|-----------|
| DEFAULT | SCMT_PSP_093PUP | FN:90 | PRODUCER | 15-Jul-2009 19:19 | 8296.5 FT | 7855.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|-----------|

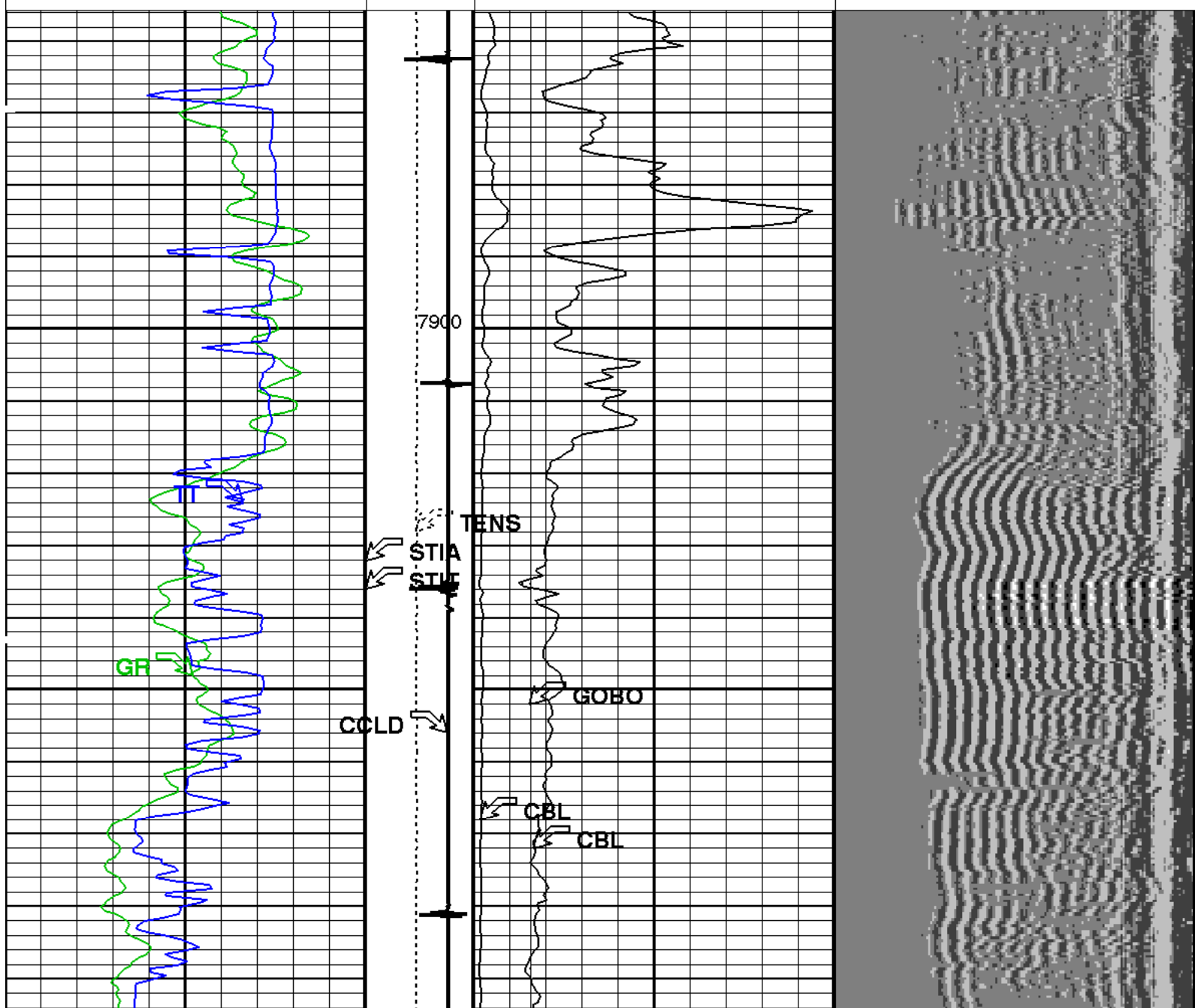
OP System Version: 17C0-154

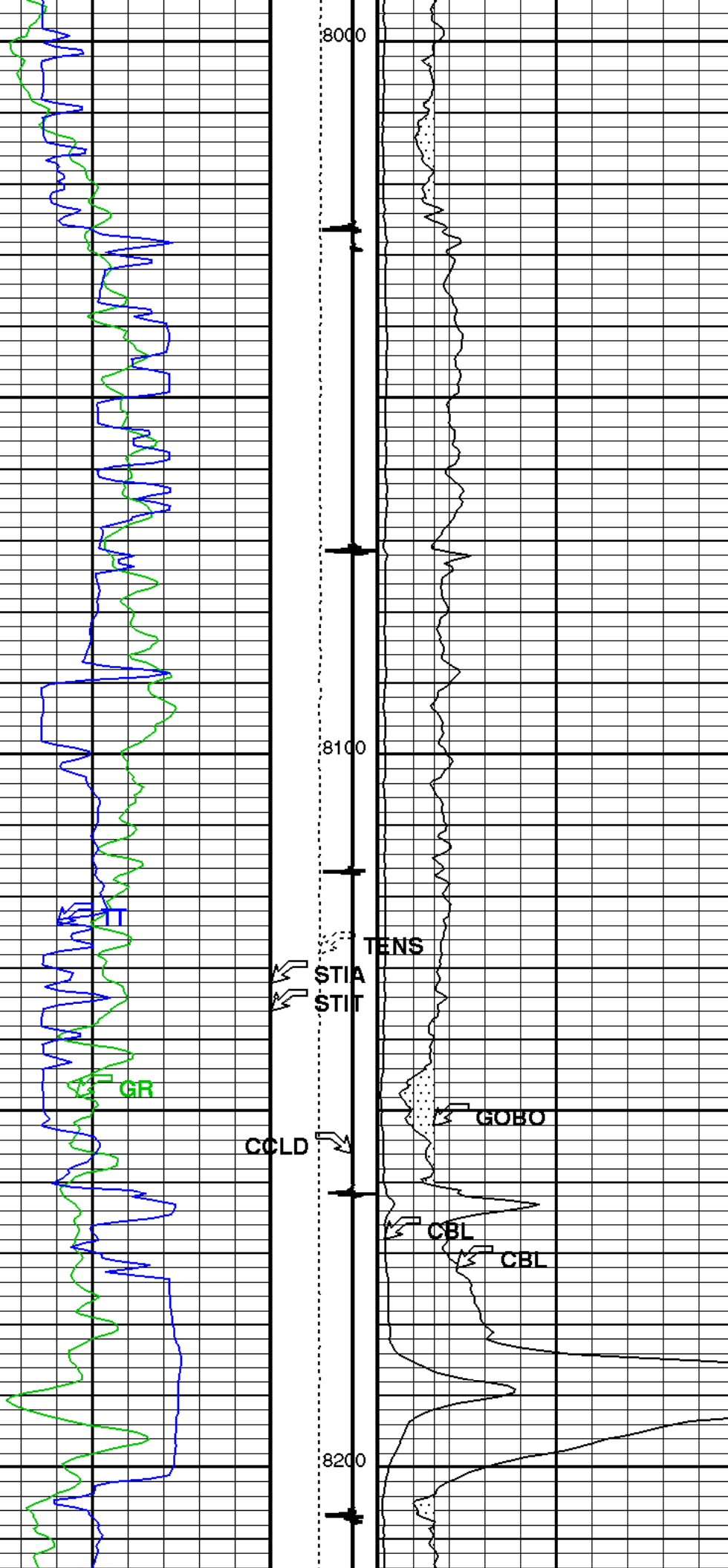
eWAFE Version: 1.139

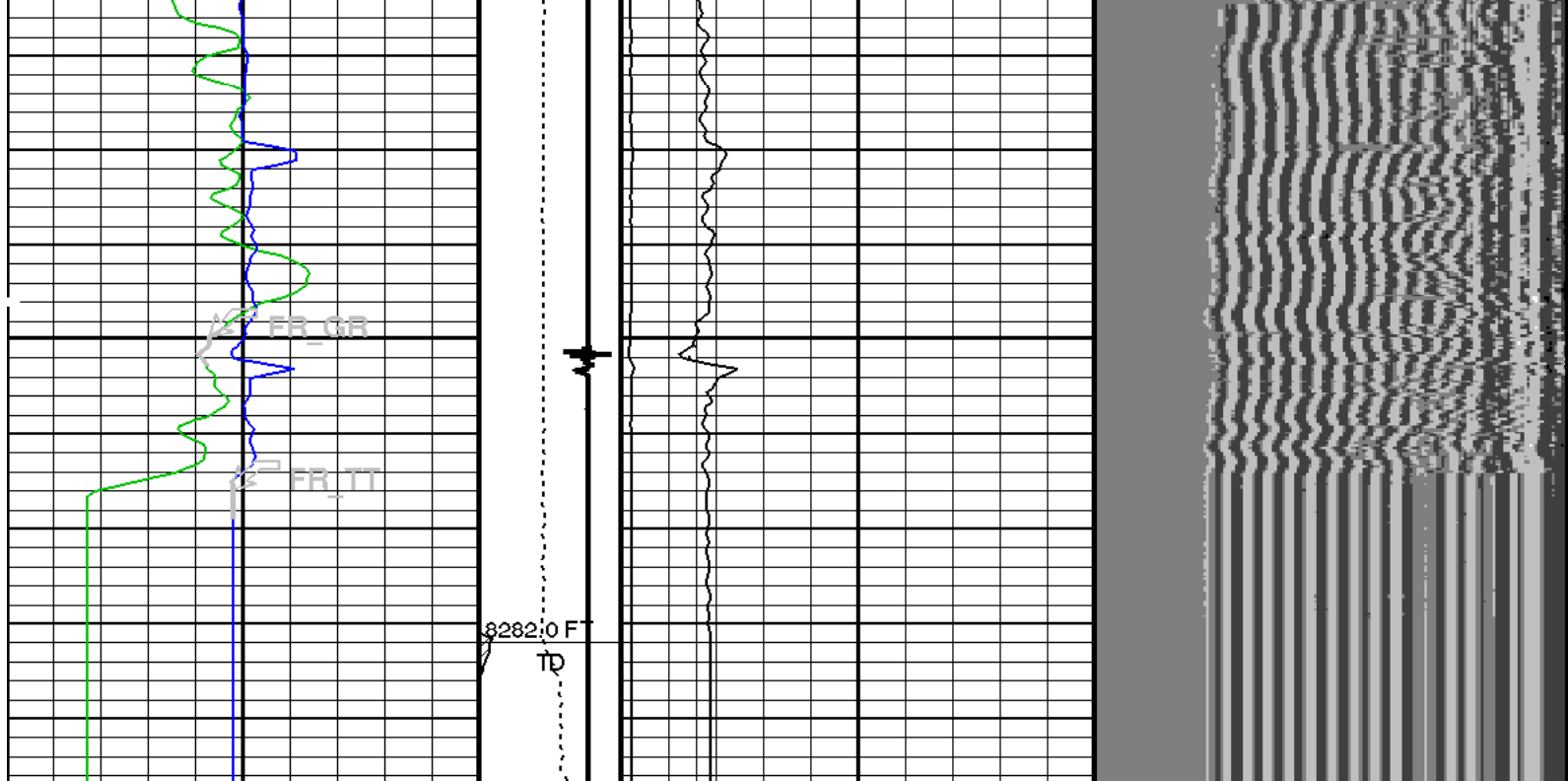
| | | | |
|---------|------------------------|----------|------------------------|
| SCMT-CB | SRPC-3821-Q2_2009_OP17 | PSPT-A/B | SRPC-3821-Q2_2009_OP17 |
|---------|------------------------|----------|------------------------|

PIP SUMMARY

| | | | |
|-------------------|---------------------------------|----------------------------|---------------|
| | Tool/Tot. Drag From D3T to STIA | | |
| | Cable Drag From STIA to STIT | GoodBond From ACBL to GOBO | |
| | Discriminated CCL (CCLD) | Good Bond (GOBO) (MV) | |
| | 3 (V) -1 | 0 | 10 |
| Transit Time (TT) | Stuck Stretch (STIT) | CBL Amplitude (CBL) | |
| 400 (US) 200 | 0 (F) 50 | 0 | 100 |
| Gamma Ray (GR) | Tension (TENS) (LBF) | CBL Amplitude (CBL) | |
| 0 (GAPI) 150 | 2000 0 | 0 | 10 |
| | | Min | Amplitude Max |
| | | VDL VariableDensity (VDL) | |
| | | 200 | 1200 |







| | | | |
|----------------------------------|--|------------------------------------|--|
| Gamma Ray (GR) (GAPI) | Tension (TENS) (LBF) | CBL Amplitude (CBL) (MV) | Min Amplitude Max 200 VDL Variable Density (VDL) 1200 (US) |
| Transit Time (TT) (US) | Stuck Stretch (STIT) (F) | CBL Amplitude (CBL) (MV) | |
| | Discriminated CCL (CCLD) (V) | Good Bond (GOBO) (MV) | |
| | Cable Drag From STIA to STIT | Good Bond From ACBL to GOBO | |
| | Tool/Tot. Drag From D3T to STIA | | |

PIP SUMMARY

☐ Time Mark Every 60 S

Format: CBL_VDL Vertical Scale: 5" per 100' Graphics File Created: 15-Jul-2009 19:19

OP System Version: 17C0-154
 eWAFE Version: 1.139

SCMT-CB SRPC-3821-Q2_2009_OP17 PSPT-A/B SRPC-3821-Q2_2009_OP17

<<<SCMT Cement Evaluation Information Summary>>>

| | | | |
|--|--------------|--------------------------------|---------------------------|
| Sonde Serial Number | SCMS-CB 8171 | | |
| Current Casing Size | 4.50000 IN | | |
| Casing Weight | 11.6000 LB/F | | |
| Expected CBL Amplitude in Free Pipe Section | 80 MV | Minimum Sonic Amplitude | 0.572744 MV (100% Cement) |
| | | | 1.53811 MV (80% Cement) |

MAP Minimum Sonic Amplitude 4.27504 MV (100% Cement)
8.03067 MV (80% Cement)

Master Calibration (Normalization)

Before Calibration (Adjustment)

Date of Master Calibration 8-APR-2009

| | | | |
|-------------------------|-----------|------------------------------|---------|
| CBL Correction Factor | 0.0688642 | CBL Adjustment Factor (CBAF) | 1.14000 |
| MAP 1 Correction Factor | 0.123641 | MAP Adjustment Factor (MPAF) | 1.0 |
| MAP 2 Correction Factor | 0.130486 | | |
| MAP 3 Correction Factor | 0.122676 | | |
| MAP 4 Correction Factor | 0.120390 | | |
| MAP 5 Correction Factor | 0.123982 | | |
| MAP 6 Correction Factor | 0.117917 | | |
| MAP 7 Correction Factor | 0.129580 | | |
| MAP 8 Correction Factor | 0.138907 | | |

Parameters

| DLIS Name | Description | Value |
|---|--|--------------|
| SCMT-CB: Slim Cement Mapping Tool, 1-11/16 OD | | |
| BILI | Bond Index Level for Zone Isolation | 0.8 |
| CB3D | SCMT CBL 3 ft Peak Detection Mode | PEAK |
| CB3G | SCMT CBL 3 ft Peak Detection T0_Delay and Noise Gate | 228.424 US |
| CB3T | SCMT CBL 3 ft Fixed Threshold Level | 20 MV |
| CB5D | SCMT CBL 5 ft Peak Detection Mode | PEAK |
| CB5G | SCMT CBL 5 ft Peak Detection T0_Delay and Noise Gate | 342.424 US |
| CB5T | SCMT CBL 5 ft Fixed Threshold Level | 20 MV |
| CBLG | CBL Gate Width | 40 US |
| CBRA | CBL LQC Reference Amplitude in Free Pipe | 80 MV |
| CMCF | CBL Cement Type Compensation Factor | 1 |
| CMTC | SCMT Slow Channel Multiplexer Mode | SCAN |
| CMTM | SCMT Operating Mode | LOG |
| CSCS | SCMT Slow Channel Index | VCC |
| CTHI | Casing Thickness | 0.255617 IN |
| DTF | Delta-T Fluid | 204.5 US/F |
| FATT | Acoustic Attenuation due to Fluid | 0 DB/F |
| FCF | CBL Fluid Compensation Factor | 1 |
| GOBO | Good Bond | 1.53811 MV |
| MAPD | SCMT MAP Peak Detection Mode | PEAK |
| MAPG | SCMT MAP Peak Detection T0_Delay and Noise Gate | 171.424 US |
| MAPT | SCMT MAP Fixed Threshold Level | 30 MV |
| MATT | Maximum Attenuation | 16.5449 DB/F |
| MCCF | MAP Cement Type Compensation Factor | 1 |
| MCI | Minimum Cemented Interval for Isolation | 1.25 FT |
| MMSA | MAP Minimum Sonic Amplitude | 4.27504 MV |
| MSA | Minimum Sonic Amplitude | 0.572744 MV |
| PEDE | Peak Detection On/Off Switch in Playback | OFF |
| VDLG | VDL Manual Gain | 5 |
| ZCMT | Acoustic Impedance of Cement | 6.8 MRAY |
| STI: Stuck Tool Indicator | | |
| LBFR | Trigger for MAXIS First Reading Label | TDL |
| STKT | STI Stuck Threshold | 2.5 FT |
| TDD | Total Depth - Driller | 8373.00 FT |
| TDL | Total Depth - Logger | 8282.00 FT |
| System and Miscellaneous | | |
| CSIZ | Current Casing Size | 4.500 IN |
| CWEI | Casing Weight | 11.60 LB/F |
| DFD | Drilling Fluid Density | 8.35 LB/G |
| DO | Depth Offset for Playback | 5.0 FT |
| PP | Playback Processing | RECOMPUTE |
| TD | Total Depth | 8282 FT |

Input DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|-----------|
| DEFAULT | SCMT_PSP_077LUP | FN:74 | PRODUCER | 15-Jul-2009 11:22 | 8291.5 FT | 7850.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|-----------|

Output DLIS Files

| | | | | |
|---------|-----------------|-------|----------|-------------------|
| DEFAULT | SCMT_PSP_093PUP | FN:90 | PRODUCER | 15-Jul-2009 19:19 |
|---------|-----------------|-------|----------|-------------------|

MAXIS Field Log

Input DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|----------|
| DEFAULT | SCMT_PSP_078LUP | FN:75 | PRODUCER | 15-Jul-2009 11:32 | 8300.0 FT | 644.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|----------|

Output DLIS Files

| | | | | | | |
|---------|-----------------|-------|----------|-------------------|-----------|----------|
| DEFAULT | SCMT_PSP_095PUP | FN:92 | PRODUCER | 15-Jul-2009 19:22 | 8305.0 FT | 649.5 FT |
|---------|-----------------|-------|----------|-------------------|-----------|----------|

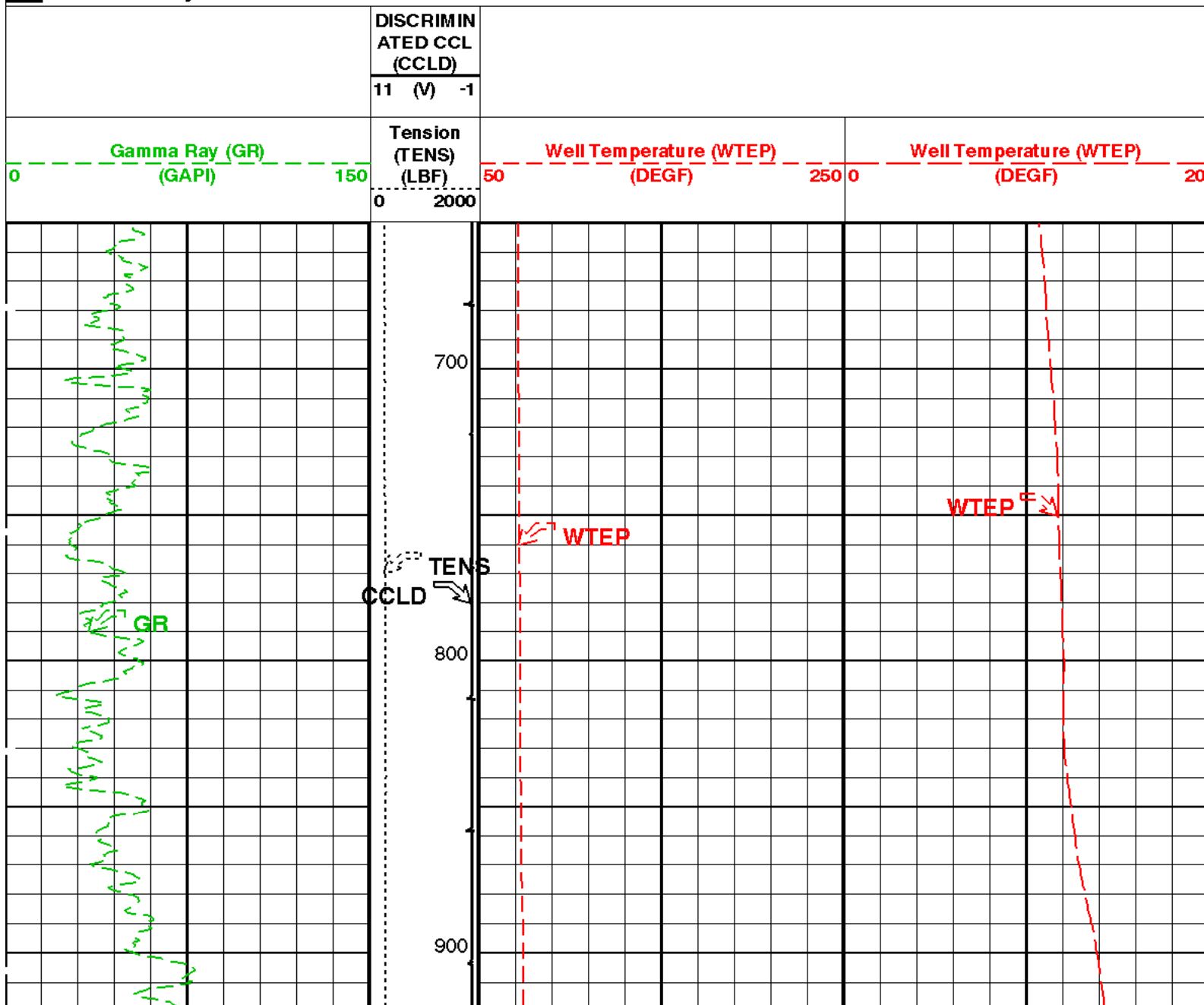
OP System Version: 17C0-154

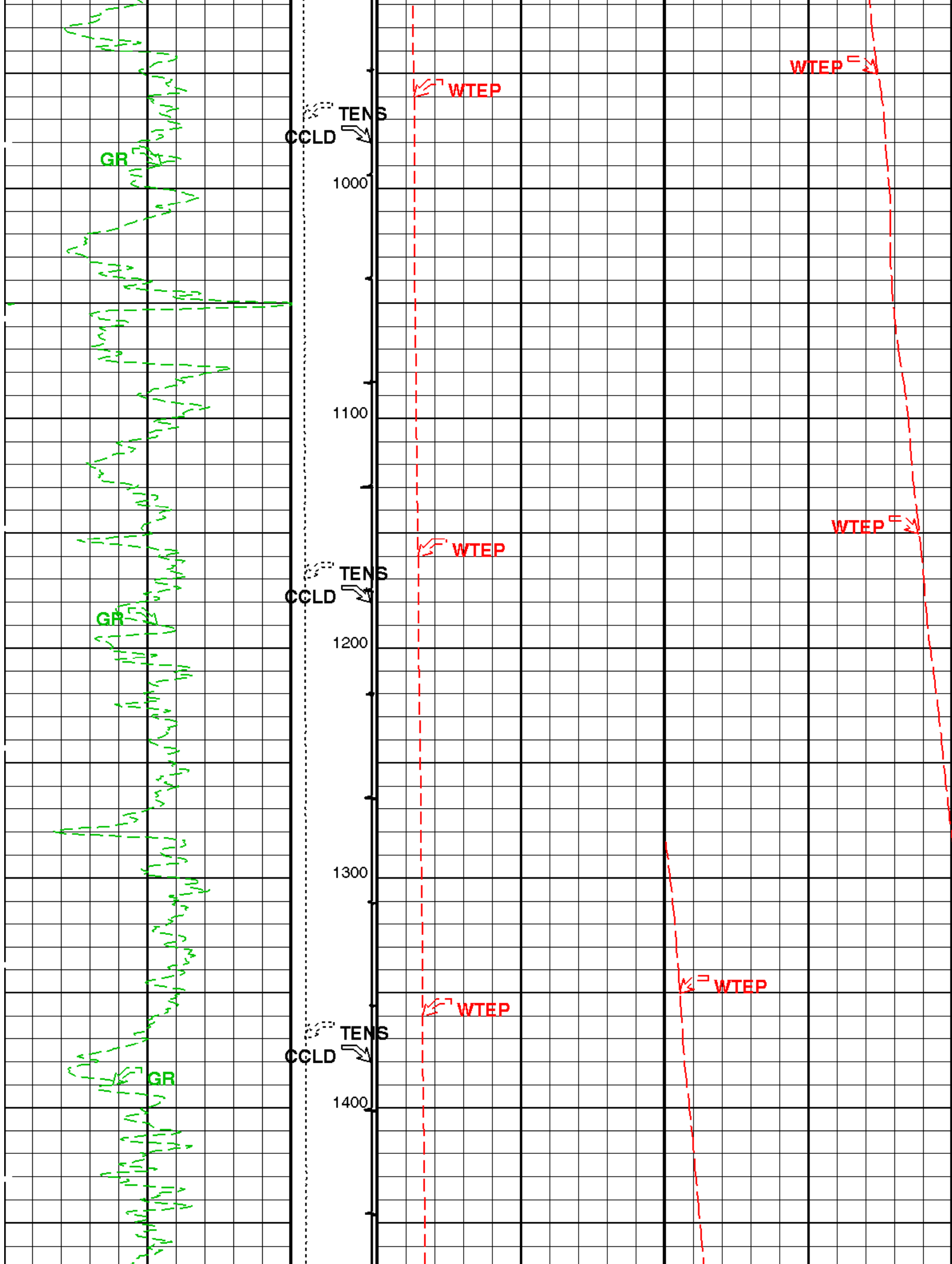
eWAFE Version: 1.139

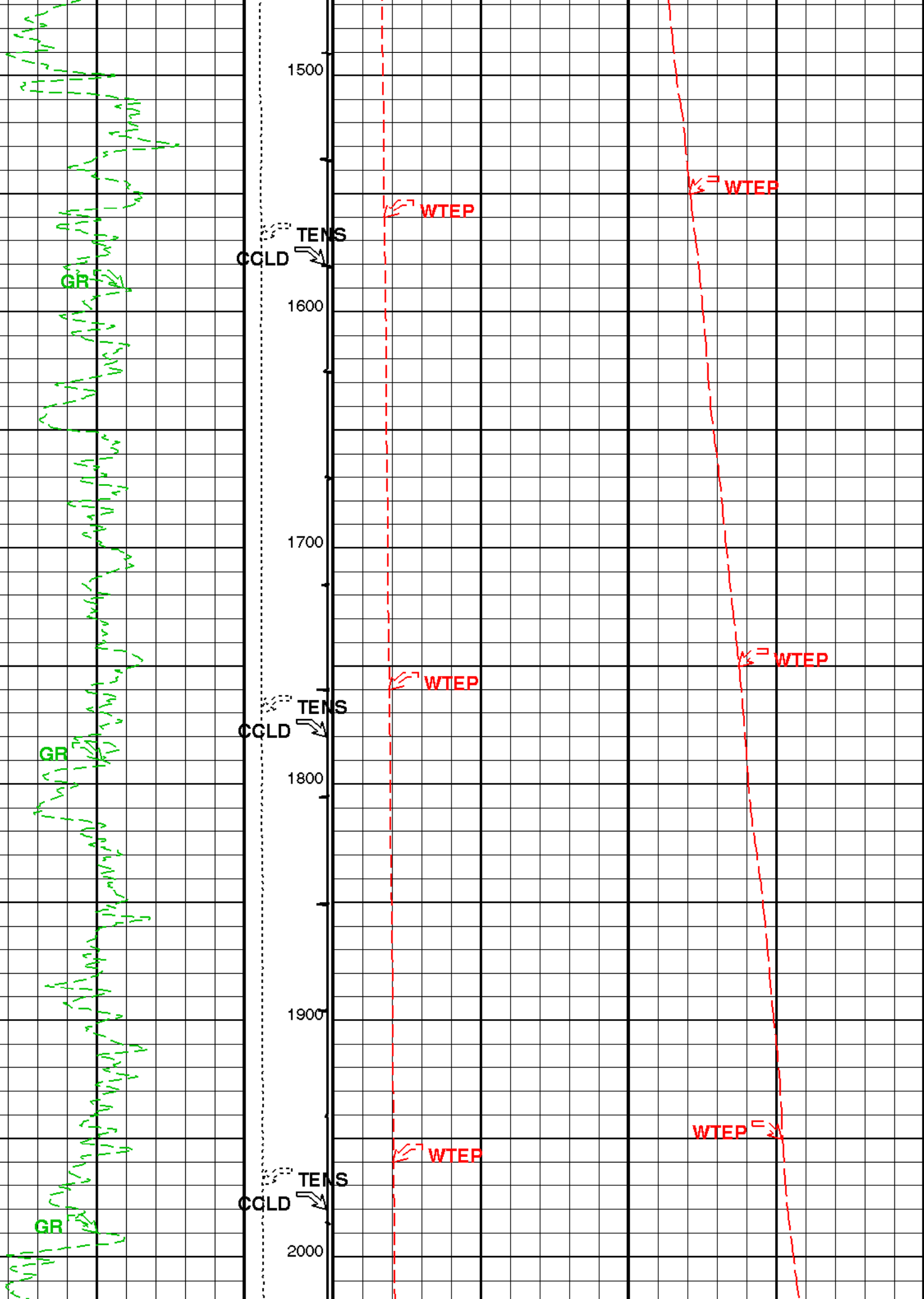
| | | | |
|---------|------------------------|----------|------------------------|
| SCMT-CB | SRPC-3821-Q2_2009_OP17 | PSPT-A/B | SRPC-3821-Q2_2009_OP17 |
|---------|------------------------|----------|------------------------|

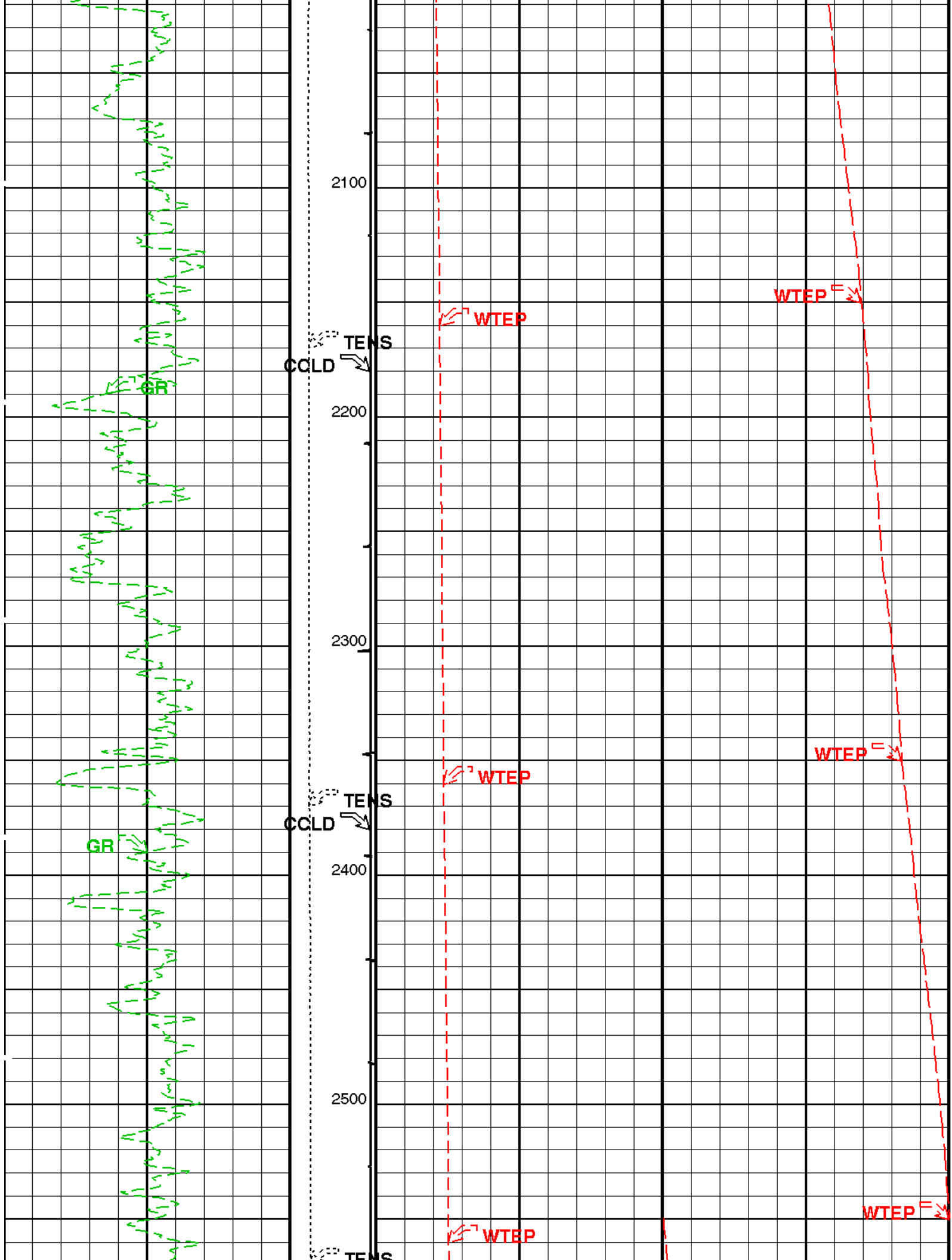
PIP SUMMARY

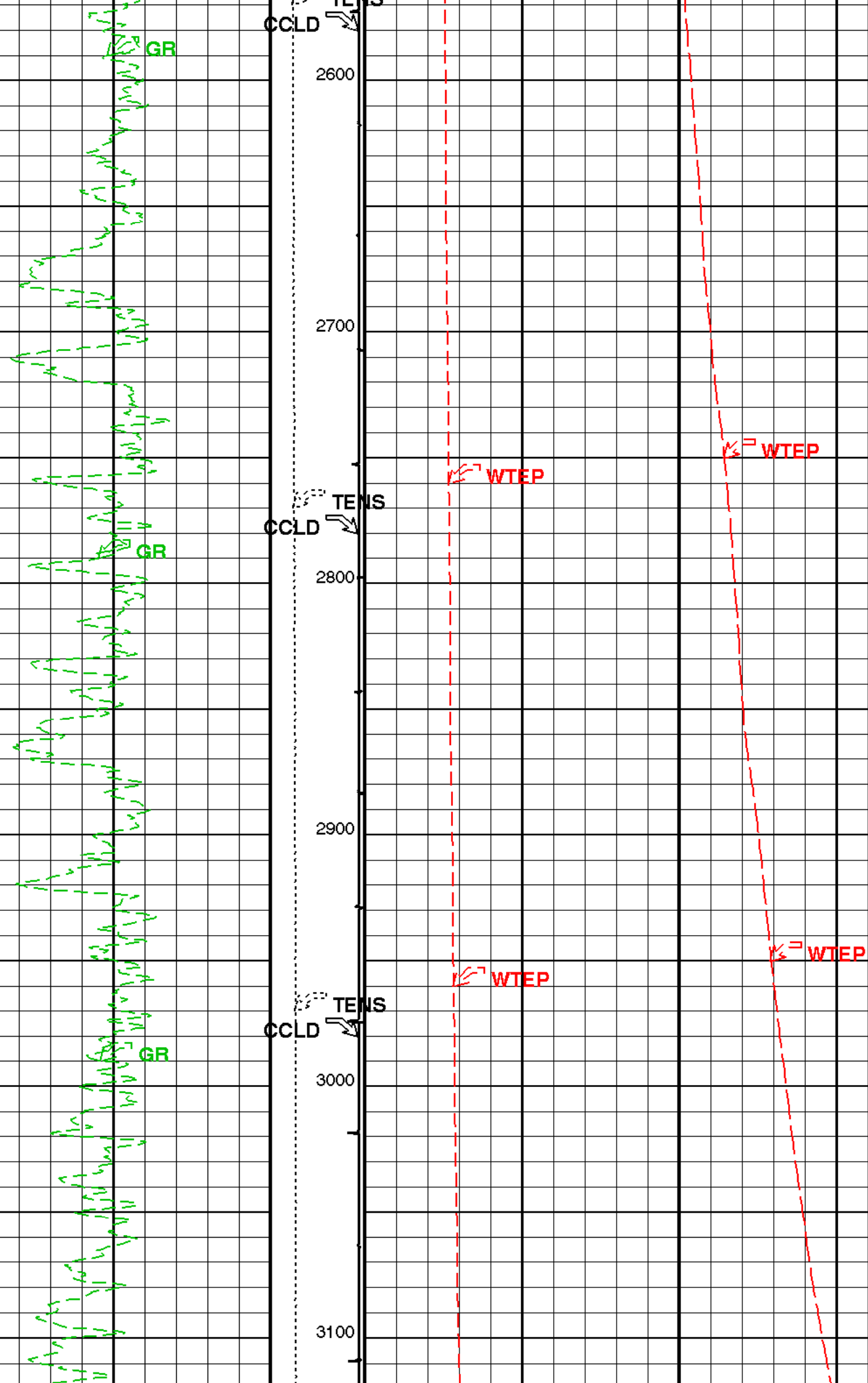
Time Mark Every 60 S

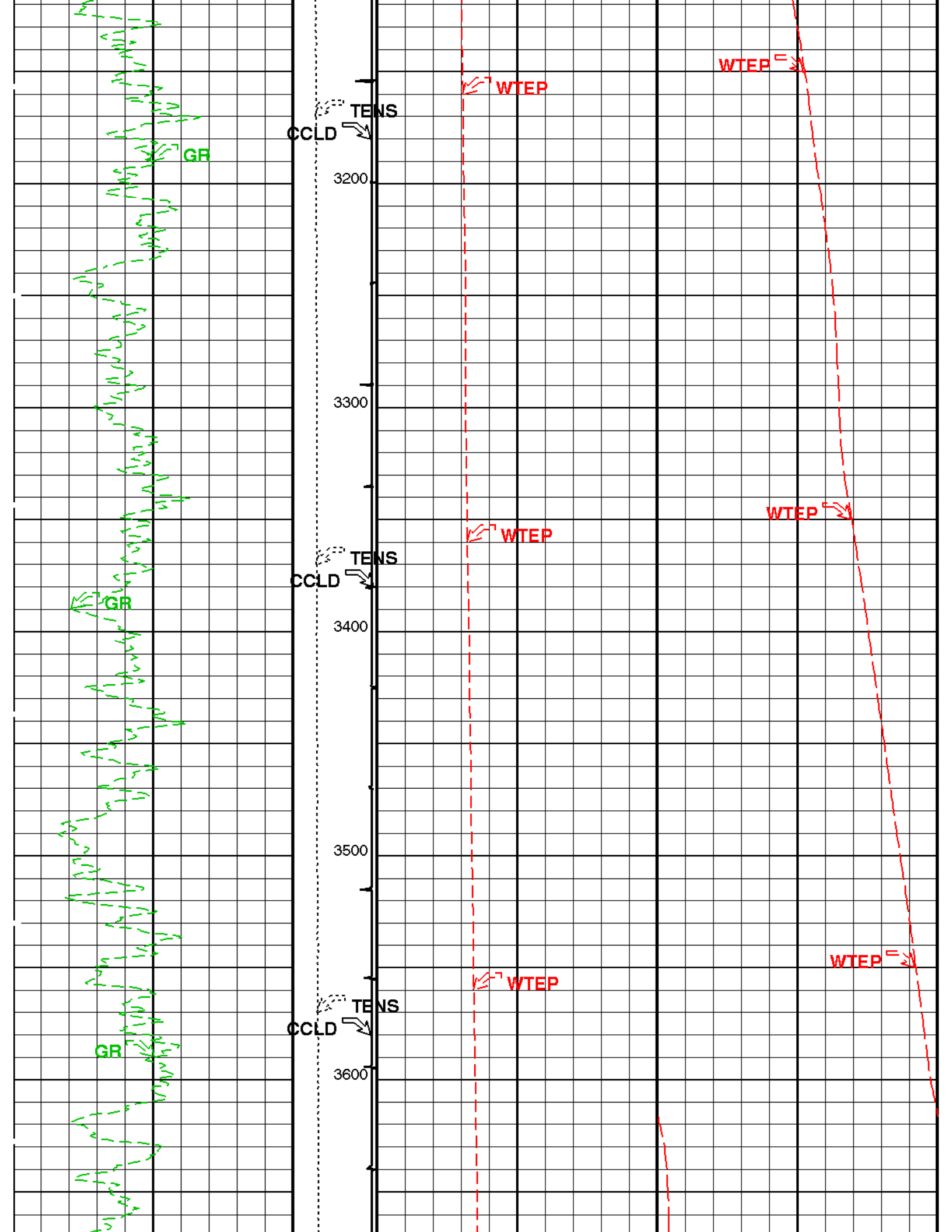


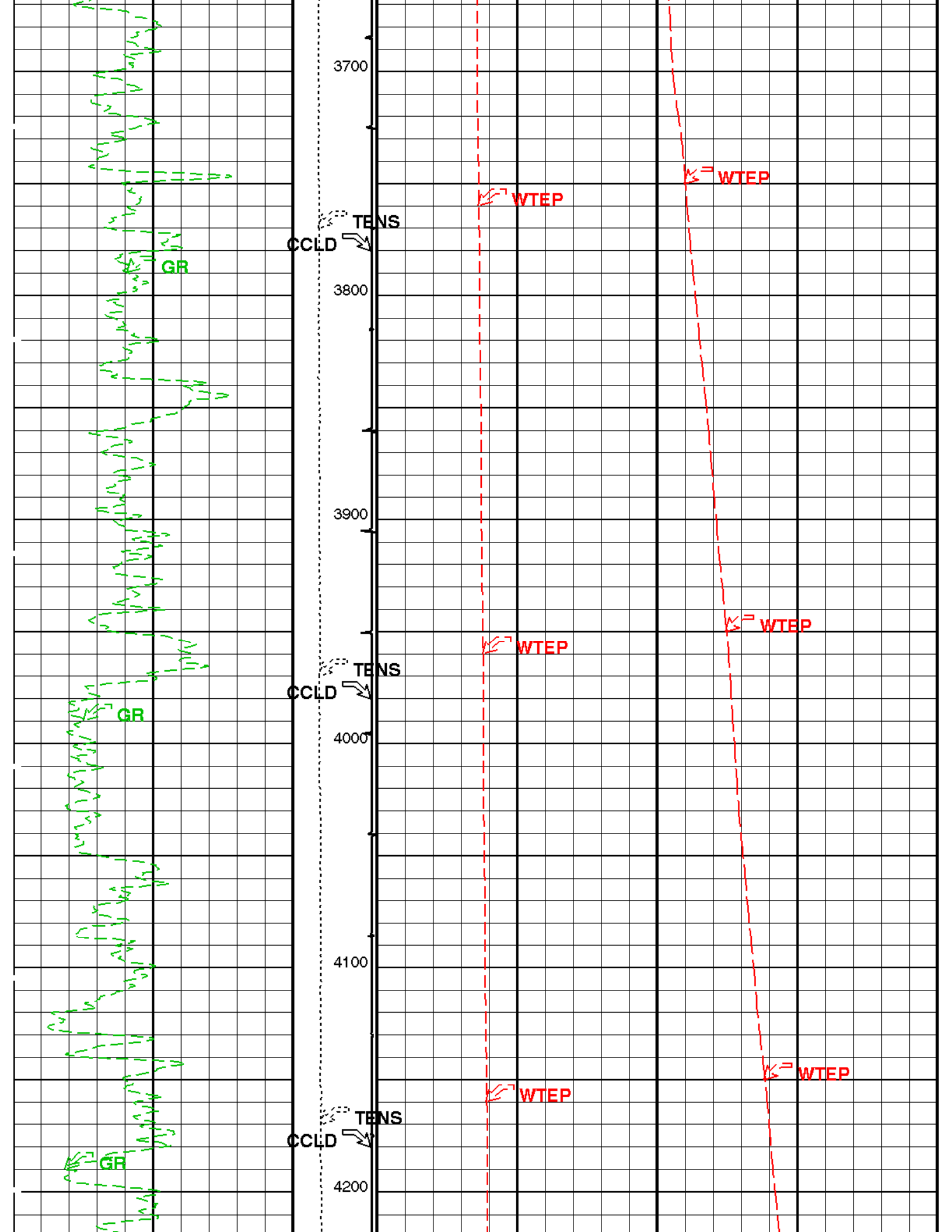


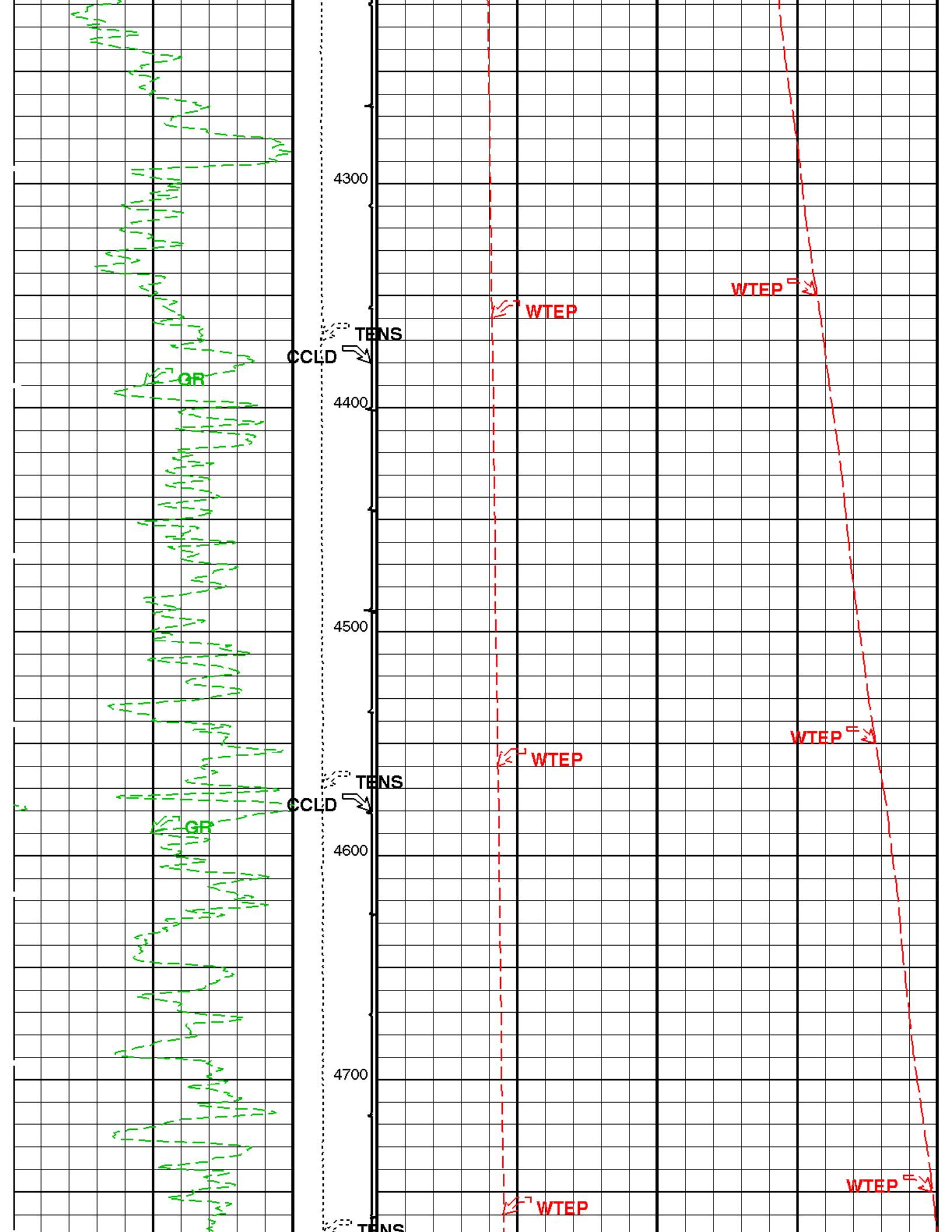


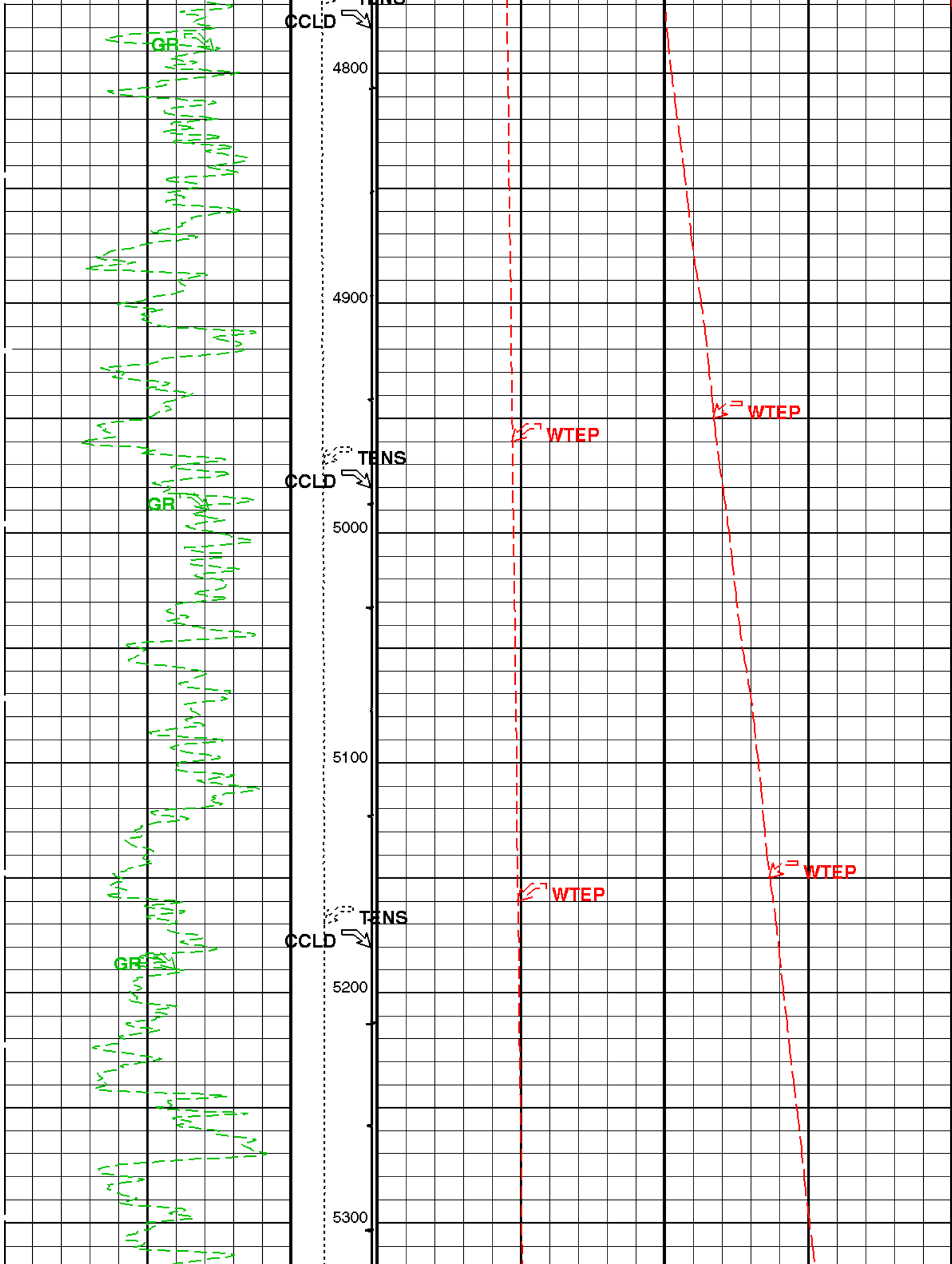


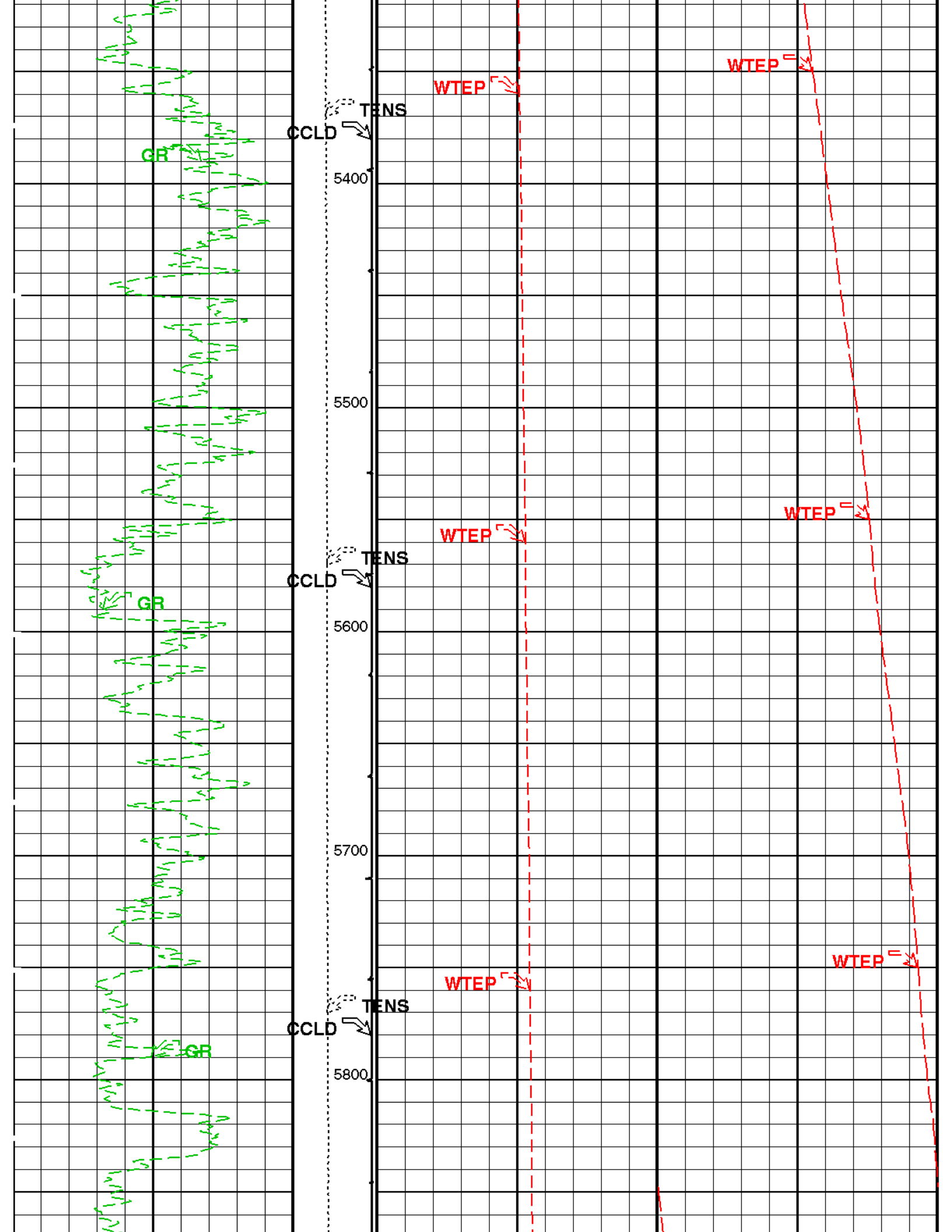


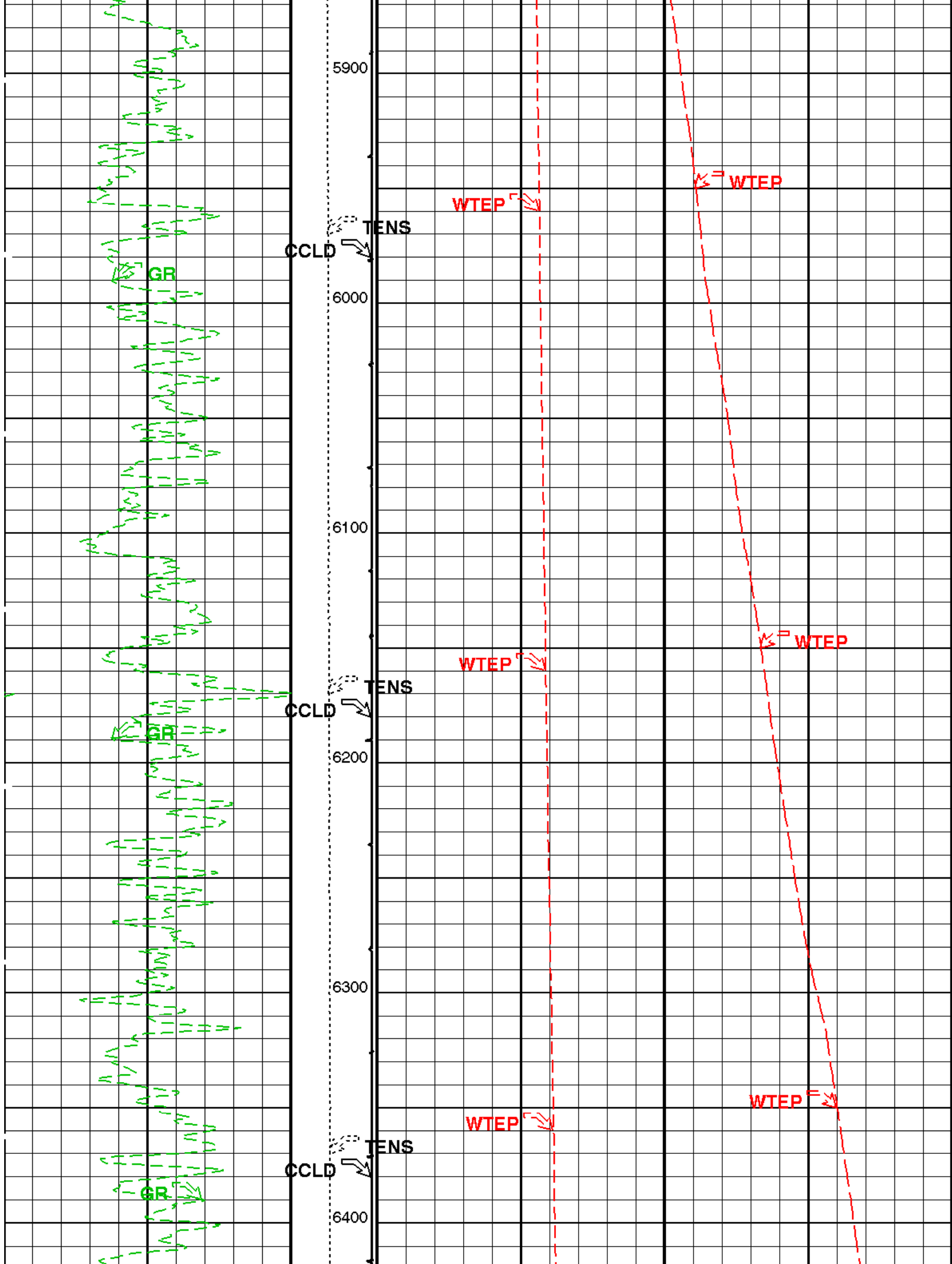


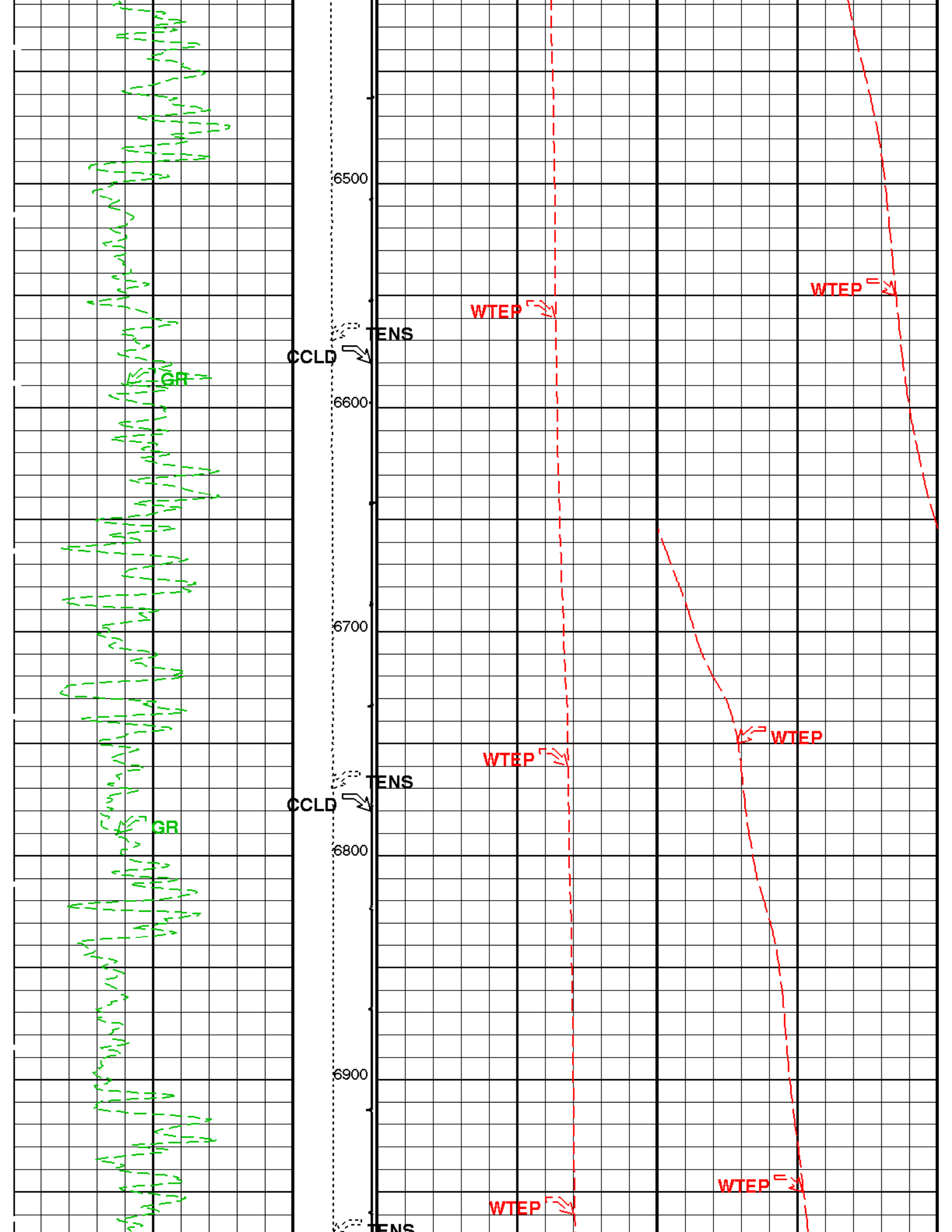


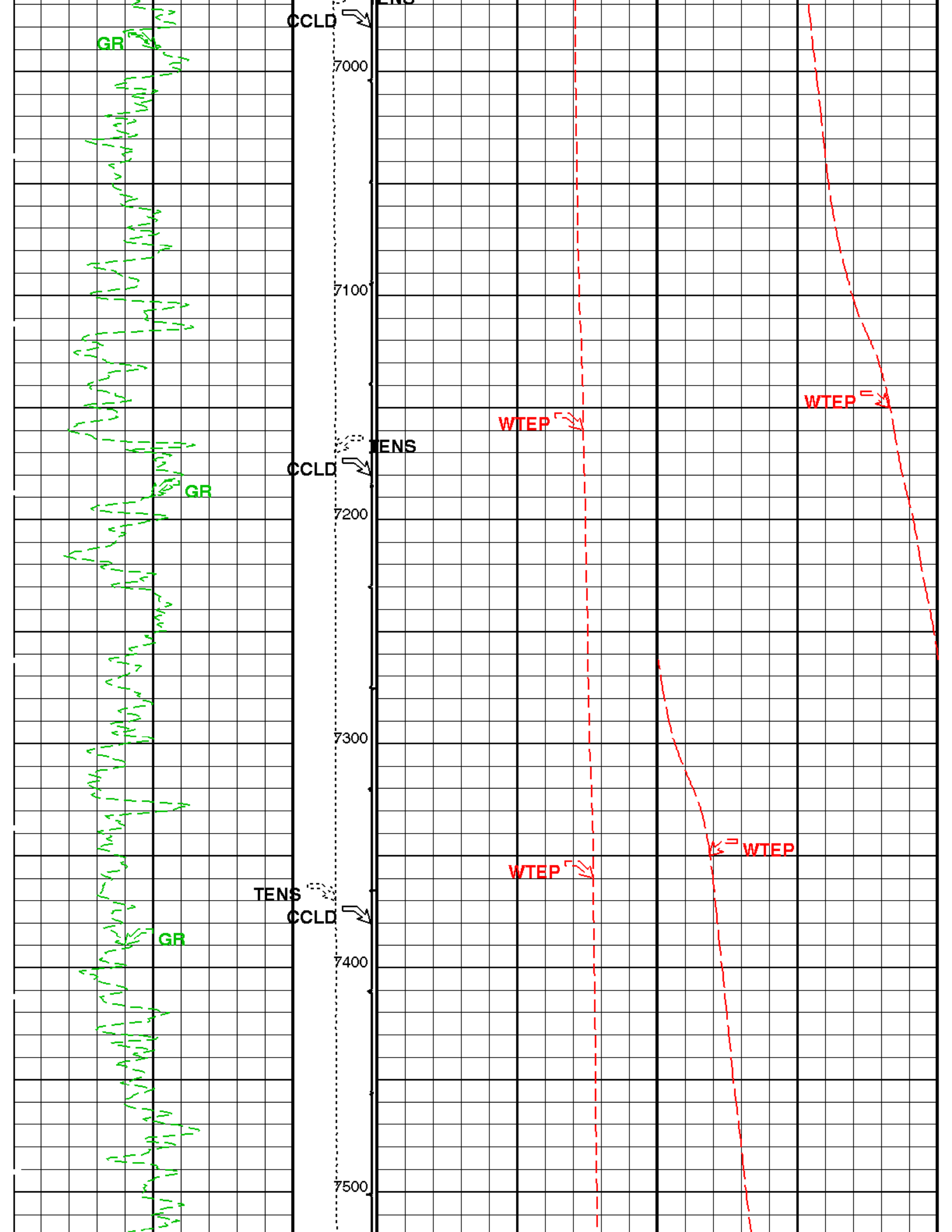


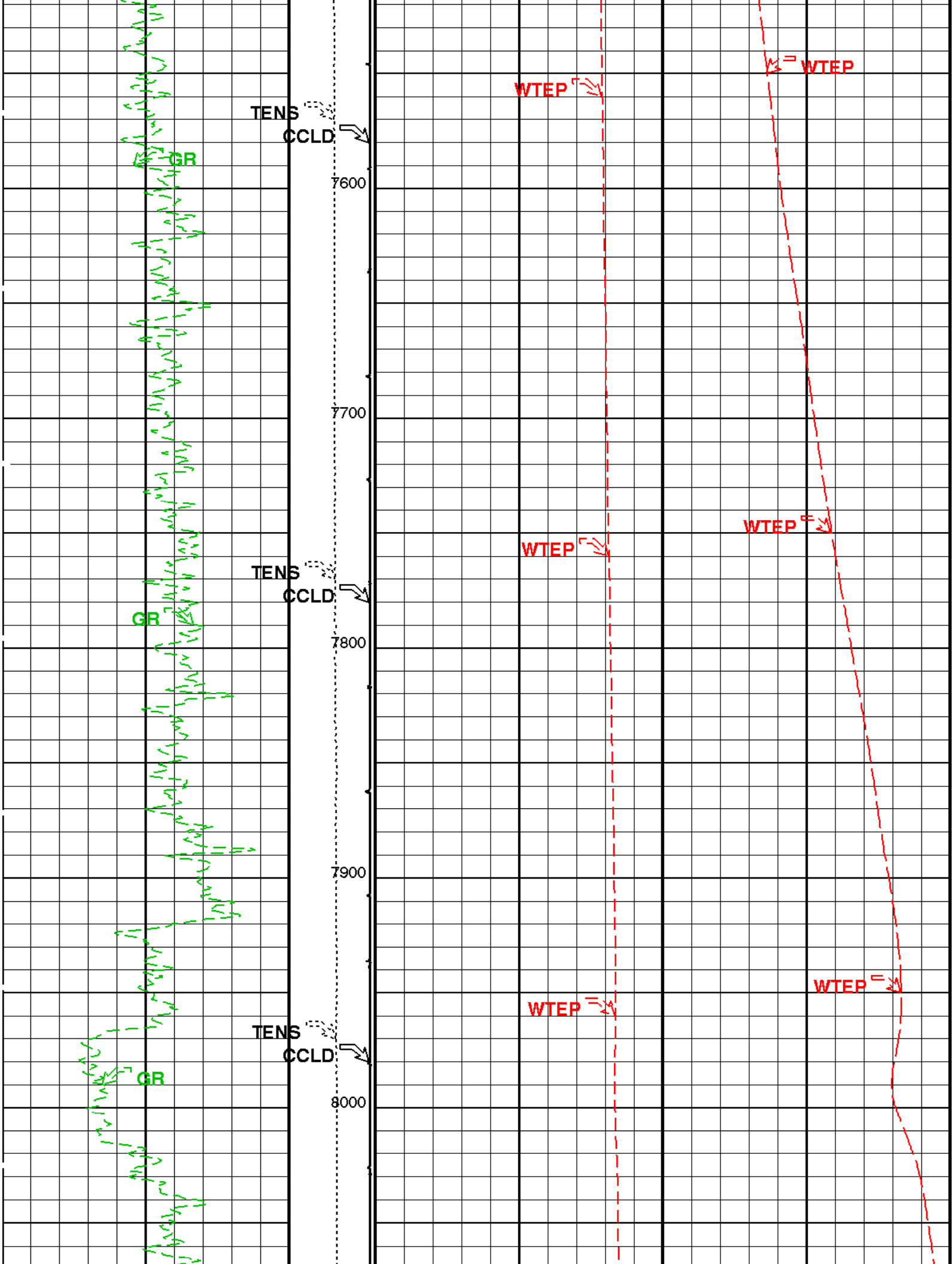


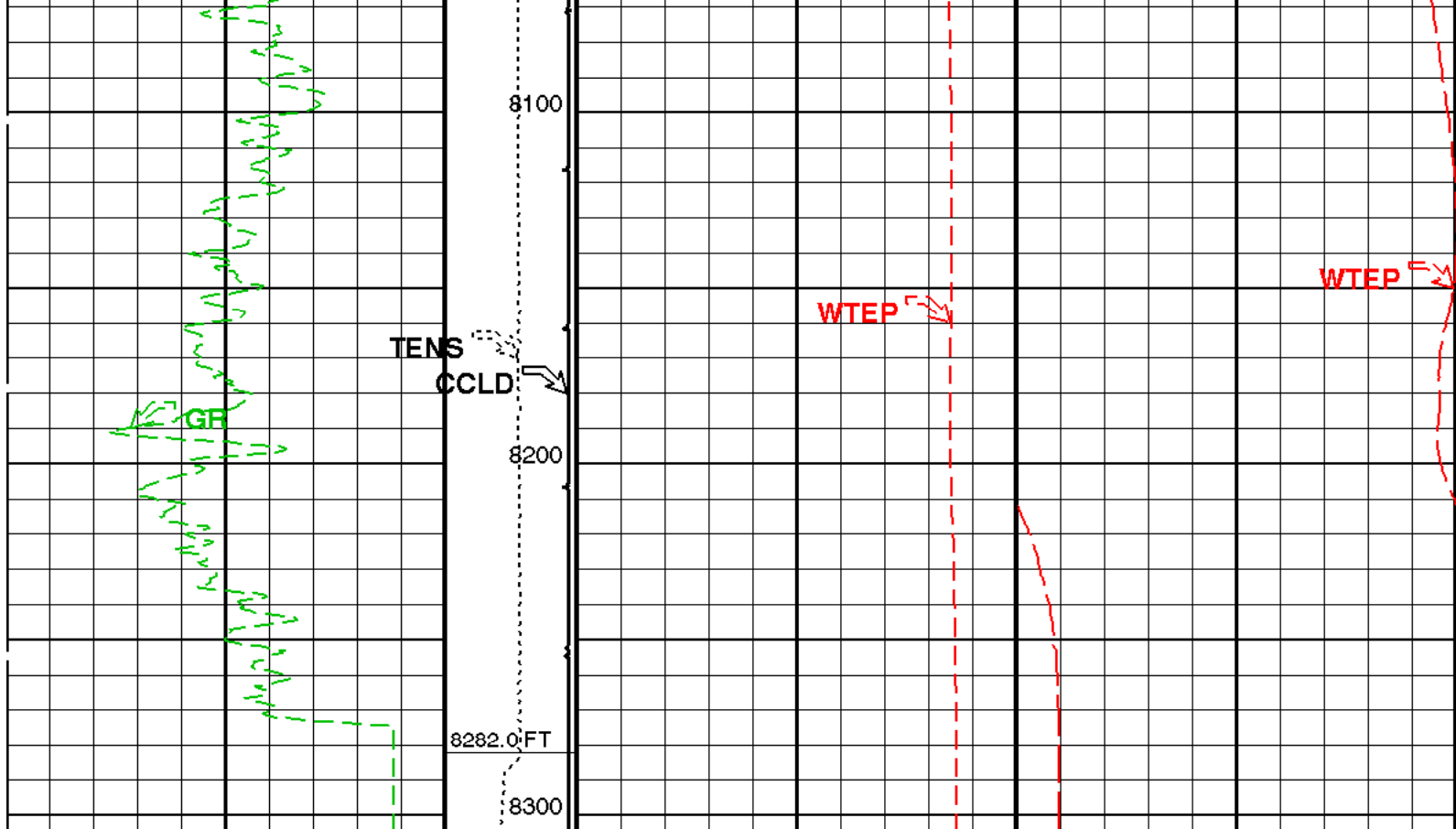












| | | | |
|--------------------------|---------------------------------|-----------------------------------|-----------------------------------|
| Gamma Ray (GR) (GAPI) | Tension (TENS) (LBF) | Well Temperature (WTEP) (DEGF) | Well Temperature (WTEP) (DEGF) |
| 0 150 | 0 2000 | 50 250 0 | 0 20 |
| | DISCRIMIN ATED CCL (CCLD) | | |
| | 11 (V) -1 | | |

PIP SUMMARY

Time Mark Every 60 S

Format: PSP_S2 Vertical Scale: 2' per 100'

Graphics File Created: 15-Jul-2009 19:22

OP System Version: 17C0-154

eWAFE Version: 1.139

SCMT-CB

SRPC-3821-Q2_2009_OP17

PSPT-A/B

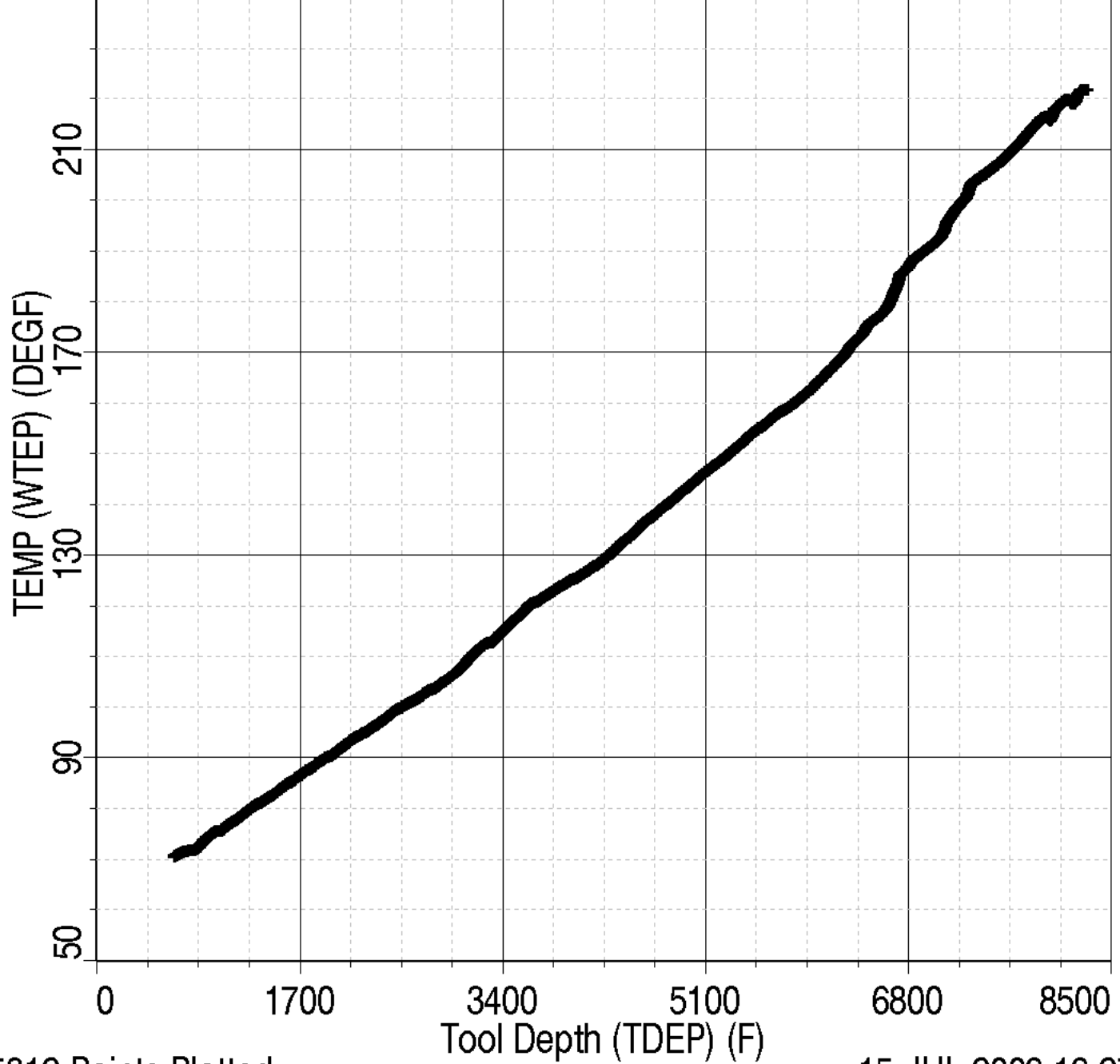
SRPC-3821-Q2_2009_OP17

Parameters

| DLIS Name | Description | Value |
|---|--|-------------|
| SCMT-CB: Slim Cement Mapping Tool, 1-11/16 OD | | |
| BILI | Bond Index Level for Zone Isolation | 0.8 |
| BISS | Bond Index Source Selection for BIQL | BI |
| CB3D | SCMT CBL 3 ft Peak Detection Mode | PEAK |
| CB3G | SCMT CBL 3 ft Peak Detection T0_Delay and Noise Gate | 228.424 US |
| CB3T | SCMT CBL 3 ft Fixed Threshold Level | 20 MV |
| CB5D | SCMT CBL 5 ft Peak Detection Mode | PEAK |
| CB5G | SCMT CBL 5 ft Peak Detection T0_Delay and Noise Gate | 342.424 US |
| CB5T | SCMT CBL 5 ft Fixed Threshold Level | 20 MV |
| CBLG | CBL Gate Width | 40 US |
| CBRA | CBL LQC Reference Amplitude in Free Pipe | 80 MV |
| CMCF | CBL Cement Type Compensation Factor | 1 |
| CMTC | SCMT Slow Channel Multiplexer Mode | SCAN |
| CMTM | SCMT Operating Mode | LOG |
| CMTF | SCMT Tool position on CAN | 3 |
| CSCS | SCMT Slow Channel Index | VCC |
| CTHI | Casing Thickness | 0.255617 IN |
| DTF | Delta-T Fluid | 204.5 US/F |
| FATT | Acoustic Attenuation due to Fluid | 0 DB/F |
| FCF | CBL Fluid Compensation Factor | 1 |

| | | | | | | |
|--------------------------|-----------------|-------|----------|-------------------|-----------|----------|
| Input DLIS Files | | | | | | |
| DEFAULT | SCMT_PSP_078LUP | FN:75 | PRODUCER | 15-Jul-2009 11:32 | 8300.0 FT | 644.5 FT |
| Output DLIS Files | | | | | | |
| DEFAULT | SCMT_PSP_095PUP | FN:92 | PRODUCER | 15-Jul-2009 19:22 | | |

Index: 8305.0 - 649.5 FT



15312 Points Plotted

15-JUL-2009 19:27

Schlumberger

COEFFICIENTS

MAXIS Field Log

Client: BILL BARRETT CORPORATION
Field: MAMM CREEK
Well: BBC 12C-24-692
Run date: 14-Jul-2009

Tool: PSP
Sub Type: PBMS
Sensor: Clock Model

Sonde Serial NB
Sensor Serial NB 3779
Calib Date ddmmyy 090107
Matrix Size 16
Coeff CRC D285

Clock Coeff

| | Temp**0 | Temp**1 | Temp**2 |
|---------|--------------------|--------------------|--------------------|
| Temp**0 | -.210501098404E+03 | -.537713340627E+01 | -.752421519422E-01 |
| | Temp**3 | Temp**4 | Temp**5 |
| Temp**0 | +.630273975887E-03 | +.266728381738E-05 | 0.0 |

Client: BILL BARRETT CORPORATION
Field: MAMM CREEK
Well: BBC 12C-24-692
Run date: 14-Jul-2009

Tool: PSP
Sub Type: PBMS
Sensor: Sapphire

PBMS Sapphire 10kPsi Gauge

Sonde Serial NB COEFFICIENTS FOR SAPPHIRE PBMS-A.3779 S/N:
Sensor Serial NB 3779
Calib Date ddmmyy 090107
Matrix Size 66
Coeff CRC 4C82

Pres Coeff

| | Tt**0 | Tt**1 | Tt**2 |
|-------|--------------------|--------------------|--------------------|
| Tp**0 | -.611876617639E+04 | +.471061007964E+04 | -.216447354932E+04 |
| Tp**1 | +.371836126905E+04 | -.234756196935E+04 | +.129149325686E+04 |
| Tp**2 | +.193143980957E+02 | -.189348218853E+01 | -.341812471126E+01 |
| Tp**3 | -.568815065386E+01 | +.200079683569E+01 | 0.0 |
| Tp**4 | 0.0 | 0.0 | 0.0 |
| Tp**5 | 0.0 | 0.0 | 0.0 |
| | Tt**3 | Tt**4 | Tt**5 |
| Tp**0 | +.380249508124E+03 | -.247683004908E+02 | 0.0 |
| Tp**1 | -.227135245080E+03 | +.146352372057E+02 | 0.0 |
| Tp**2 | 0.0 | 0.0 | 0.0 |
| Tp**3 | 0.0 | 0.0 | 0.0 |
| Tp**4 | 0.0 | 0.0 | 0.0 |
| Tp**5 | 0.0 | 0.0 | 0.0 |

| | | | |
|-------|-----|-----|-----|
| TP**2 | 0.0 | 0.0 | 0.0 |
| TP**3 | 0.0 | 0.0 | 0.0 |
| TP**4 | 0.0 | 0.0 | 0.0 |
| TP**5 | 0.0 | 0.0 | 0.0 |

PBMS Sapphire 10kPsi Gauge

Sonde Serial NB :
 Sensor Serial NB 3779
 Calib Date ddmmyy 090107
 Matrix Size 66
 Coeff CRC C39E

Temp Coeff

| | TP**0 | TP**1 | TP**2 |
|-------|--------------------|--------------------|--------------------|
| Tt**0 | -.278275571347E+03 | +.251216271916E+01 | -.820715649824E+00 |
| Tt**1 | +.598349067015E+02 | -.107326373545E+01 | +.652890183203E-01 |
| Tt**2 | +.109160002120E+02 | +.262812193556E+00 | -.450134240377E-02 |
| Tt**3 | -.673302171285E+00 | -.213772918779E-01 | 0.0 |
| Tt**4 | 0.0 | 0.0 | 0.0 |
| Tt**5 | 0.0 | 0.0 | 0.0 |
| | TP**3 | TP**4 | TP**5 |
| Tt**0 | +.151507143209E+00 | -.592670012996E-02 | 0.0 |
| Tt**1 | +.127486538512E-01 | -.437897076104E-02 | 0.0 |
| Tt**2 | 0.0 | 0.0 | 0.0 |
| Tt**3 | 0.0 | 0.0 | 0.0 |
| Tt**4 | 0.0 | 0.0 | 0.0 |
| Tt**5 | 0.0 | 0.0 | 0.0 |

Client: BILL BARRETT CORPORATION
 Field: MAMM CREEK
 Well: BBC 12C-24-692
 Run date: 14-Jul-2009

Tool: PSP
 Sub Type: PBMS
 Sensor: GR

PBMS Gamma Ray

Sonde Serial NB RESISTORS FOR GR SENSOR N.34552, TOOL PBMS-AA3779. SENSOR S/N:
 Sensor Serial NB 34552
 Calib Date ddmmyy 030606

Matrix Size 12
Coeff CRC 3AE5

GR HV Rt

| | Rt**0 | Rt**1 |
|-------|--------------------|--------------------|
| Rt**0 | +.200000000000e+04 | +.214000000000e+04 |

Client: BILL BARRETT CORPORATION
Field: MAMM CREEK
Well: BBC 12C-24-692
Run date: 14-Jul-2009

Tool: PSP
Sub Type: PBMS
Sensor: WellTemp RTD

PBMS RTD Well Thermometer

Sonde Serial NB COEFFICIENTS FOR RTD THERMOMETER PBMS-A.3779 S/N:
Sensor Serial NB 3779
Calib Date ddmmyy 090107
Matrix Size 16
Coeff CRC 3846

WTemp Coeff

| | Tt**0 | Tt**1 | Tt**2 |
|-------|--------------------|--------------------|--------------------|
| Tt**0 | +.492135102627E+02 | -.278827553804E+03 | +.142867554561E+03 |
| | Tt**3 | Tt**4 | Tt**5 |
| Tt**0 | -.233378392336E+02 | +.145553494493E+01 | 0.0 |

Well: **BBC 42B-23-692**
Field: **MAMM CREEK**
County: **GARFIELD**
State: **COLORADO**

CEMENT BOND LOG
CBL - VDL
GAMMA RAY - CCL