KOLAR Document ID: 1600226

Confidentiality Requested:
☑ Yes ☐ No

KANSAS CORPORATION COMMISSION
OIL & GAS CONSERVATION DIVISION

Form ACO-1
January 2018
Form must be Typed
Form must be Signed
All blanks must be Filled

WELL COMPLETION FORM
WELL HISTORY - DESCRIPTION OF WELL & LEASE

OPERATOR: License # 31725
Name: Shelby Resources LLC
Address 1: 3700 Quebec Street
Address 2: Suite 100 PMB 376
City: DENVER State: CO Zip: 80207 + 1639
Contact Person: Chris Gottschalk
Phone: (785) 623-1524
CONTRACTOR: License # 31548
Name: Discovery Drilling
Wellsite Geologist: Jeremy Schwartz
Purchaser:

Designate Type of Completion:
☑ New Well ☐ Re-Entry ☐ Workover
☐ Oil ☐ WSW ☐ SWD
☐ Gas ☑ DH ☐ EOR
☐ OG ☐ GSW
☐ CM *(Coal Bed Methane)*
☐ Cathodic ☐ Other *(Core, Expl., etc.)*:

If Workover/Re-entry: Old Well Info as follows:
Operator:
Well Name:
Original Comp. Date: Original Total Depth:
☐ Deepening ☐ Re-perf. ☐ Conv. to EOR ☐ Conv. to SWD
☐ Plug Back ☐ Liner ☐ Conv. to GSW ☐ Conv. to Producer

☐ Commingled Permit #:
☐ Dual Completion Permit #:
☐ SWD Permit #:
☐ EOR Permit #:
☐ GSW Permit #:

11/6/2021 Spud Date or Recompletion Date
11/16/2021 Date Reached TD
11/17/2021 Completion Date or Recompletion Date

API No.: 15-185-24095-00-00
Spot Description:
SW - NE - SW - NW Sec. 31 Twp. 24 S. R. 14 ☐ East ☑ West
1914 Feet from ☑ North / ☐ South Line of Section
927 Feet from ☐ East / ☑ West Line of Section
Footages Calculated from Nearest Outside Section Corner:
☐ NE ☑ NW ☐ SE ☐ SW
GPS Location: Lat: *(e.g. xx.xxxxx)* , Long: *(e.g. -xxx.xxxxx)*
Datum: ☐ NAD27 ☐ NAD83 ☐ WGS84
County: Stafford
Lease Name: SEWING Well #: 1-31
Field Name:
Producing Formation: N/A
Elevation: Ground: 1998 Kelly Bushing: 2006
Total Vertical Depth: 4437 Plug Back Total Depth:
Amount of Surface Pipe Set and Cemented at: 963 Feet
Multiple Stage Cementing Collar Used? ☐ Yes ☑ No
If yes, show depth set: Feet
If Alternate II completion, cement circulated from:
feet depth to: w/ sx cmt.

Drilling Fluid Management Plan
(Data must be collected from the Reserve Pit)
Chloride content: 53000 ppm Fluid volume: 125 bbls
Dewatering method used: Hauled to Disposal
Location of fluid disposal if hauled offsite:
Operator Name: Shelby Resources
Lease Name: Viola #1-36 License #: 31725
Quarter SE Sec. 35 Twp. 21 S. R. 16 ☐ East ☑ West
County: Pawnee Permit #: D32249.0

AFFIDAVIT
I am the affiant and I hereby certify that all requirements of the statutes, rules and regulations promulgated to regulate the oil and gas industry have been fully complied with and the statements herein are complete and correct to the best of my knowledge.

Submitted Electronically

KCC Office Use ONLY
☐ **Confidentiality Requested**
Date: 11/23/2021
☐ **Confidential Release Date:** 11/23/2023
☑ **Wireline Log Received** ☑ **Drill Stem Tests Received**
☑ **Geologist Report / Mud Logs Received**
☐ **UIC Distribution**
ALT ☑ **I** ☐ **II** ☐ **III** **Approved by:** Deanna Garrison **Date:** 11/29/2021

Operator Name: Shelby Resources LLC Lease Name: SEWING Well #: 1-31

Sec. 31 Twp. 24 S. R. 14 ☐ East ☑ West County: Stafford

INSTRUCTIONS: Show important tops of formations penetrated. Detail all cores. Report all final copies of drill stems tests giving interval tested, time tool open and closed, flowing and shut-in pressures, whether shut-in pressure reached static level, hydrostatic pressures, bottom hole temperature, fluid recovery, and flow rates if gas to surface test, along with final chart(s). Attach extra sheet if more space is needed.

Final Radioactivity Log, Final Logs run to obtain Geophysical Data and Final Electric Logs must be emailed to kcc-well-logs@kcc.ks.gov. Digital electronic log files must be submitted in LAS version 2.0 or newer AND an image file (TIFF or PDF).

Drill Stem Tests Taken *(Attach Additional Sheets)*	☑ Yes	☐ No
Samples Sent to Geological Survey	☑ Yes	☐ No
Cores Taken	☐ Yes	☑ No
Electric Log Run	☑ Yes	☐ No
Geologist Report / Mud Logs	☑ Yes	☐ No

List All E. Logs Run:
Attached

☑ Log Formation (Top), Depth and Datum ☐ Sample

Name	Top	Datum
Attached	Attached	Attached

CASING RECORD ☑ New ☐ Used
Report all strings set-conductor, surface, intermediate, production, etc.

Purpose of String	Size Hole Drilled	Size Casing Set (In O.D.)	Weight Lbs. / Ft.	Setting Depth	Type of Cement	# Sacks Used	Type and Percent Additives
Surface	12.25	8.625	23	963	60/40 Poz	550	2% gel/ 4% cc

ADDITIONAL CEMENTING / SQUEEZE RECORD

Purpose:	Depth Top Bottom	Type of Cement	# Sacks Used	Type and Percent Additives
☐ Perforate ☐ Protect Casing ☐ Plug Back TD ☐ Plug Off Zone	-			
	-			

1. Did you perform a hydraulic fracturing treatment on this well? ☐ Yes ☑ No *(If No, skip questions 2 and 3)*
2. Does the volume of the total base fluid of the hydraulic fracturing treatment exceed 350,000 gallons? ☐ Yes ☐ No *(If No, skip question 3)*
3. Was the hydraulic fracturing treatment information submitted to the chemical disclosure registry? ☐ Yes ☐ No *(If No, fill out Page Three of the ACO-1)*

Date of first Production/Injection or Resumed Production/ Injection:	Producing Method: ☐ Flowing ☐ Pumping ☐ Gas Lift ☐ Other *(Explain)*

Estimated Production Per 24 Hours	Oil Bbls.	Gas Mcf	Water Bbls.	Gas-Oil Ratio	Gravity

DISPOSITION OF GAS:	METHOD OF COMPLETION:	PRODUCTION INTERVAL:
☐ Vented ☐ Sold ☐ Used on Lease *(If vented, Submit ACO-18.)*	☐ Open Hole ☐ Perf. ☐ Dually Comp. *(Submit ACO-5)* ☐ Commingled *(Submit ACO-4)*	Top / Bottom

Shots Per Foot	Perforation Top	Perforation Bottom	Bridge Plug Type	Bridge Plug Set At	Acid, Fracture, Shot, Cementing Squeeze Record *(Amount and Kind of Material Used)*

TUBING RECORD: Size: Set At: Packer At:

Mail to: KCC - Conservation Division, 266 N. Main, Suite 220, Wichita, Kansas 67202

Form	ACO1 - Well Completion
Operator	Shelby Resources LLC
Well Name	SEWING 1-31
Doc ID	1600226

All Electric Logs Run

Compensated Nuetron
Dual Induction
Micro
Sonic

Form	ACO1 - Well Completion
Operator	Shelby Resources LLC
Well Name	SEWING 1-31
Doc ID	1600226

Tops

Name	Top	Datum
HEEBNER SHALE	3584	-1578
BROWN LIME	3730	-1724
LANSING	3748	-1742
BKC	3994	-1988
MISSISSIPPIAN	4157	-2151
KINDERHOOK	4197	-2191
VIOLA	4240	-2234
SIMPSON SHALE	4370	-2364
ARBUCKLE	4422	-2416
LTD	4436	-2430

Form	ACO1 - Well Completion
Operator	Shelby Resources LLC
Well Name	SEWING 1-31
Doc ID	1600226

Casing

Purpose Of String	Size Hole Drilled	Size Casing Set	Weight	Setting Depth	Type Of Cement	Number of Sacks Used	Type and Percent Additives
Surface	12.25	8.625	23	963	60/40 Poz	550	2% gel/ 4% cc

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67645 **DST#: 1**

Test Start: 2021.11.10 @ 00:13:00

GENERAL INFORMATION:

Formation: **Lansing B**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 03:06:32
Time Test Ended: 08:57:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3763.00 ft (KB) To 3807.00 ft (KB) (TVD)
Total Depth: 3807.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

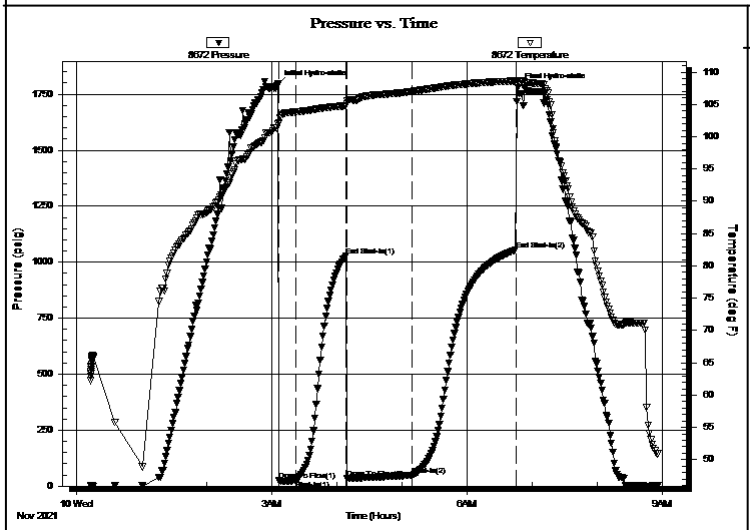
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 48.36 psig @ 3765.00 ft (KB)
Start Date: 2021.11.10 End Date: 2021.11.10
Start Time: 00:13:01 End Time: 08:57:02

Capacity: psig
Last Calib.: 2021.11.10
Time On Btm: 2021.11.10 @ 03:06:02
Time Off Btm: 2021.11.10 @ 06:47:17

TEST COMMENT: IF: 15 min., Strong building blow , 10.5 inches
ISI: 45 min., No blow back
FF: 60 min., Strong building blow , 10 inches
FSI: 90 min., No blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1794.95	102.05	Initial Hydro-static
1	24.41	102.18	Open To Flow (1)
17	25.74	103.84	Shut-In(1)
63	1028.62	104.80	End Shut-In(1)
64	35.46	105.09	Open To Flow (2)
124	48.36	107.02	Shut-In(2)
219	1054.79	108.67	End Shut-In(2)
222	1778.63	108.68	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
62.00	gassy oily mud 95%M,3%O,2%G	0.87
0.00	500' GIP	0.00

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67645 **DST#: 1**

Test Start: 2021.11.10 @ 00:13:00

GENERAL INFORMATION:

Formation: **Lansing B**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 03:06:32
Time Test Ended: 08:57:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3763.00 ft (KB) To 3807.00 ft (KB) (TVD)
Total Depth: 3807.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

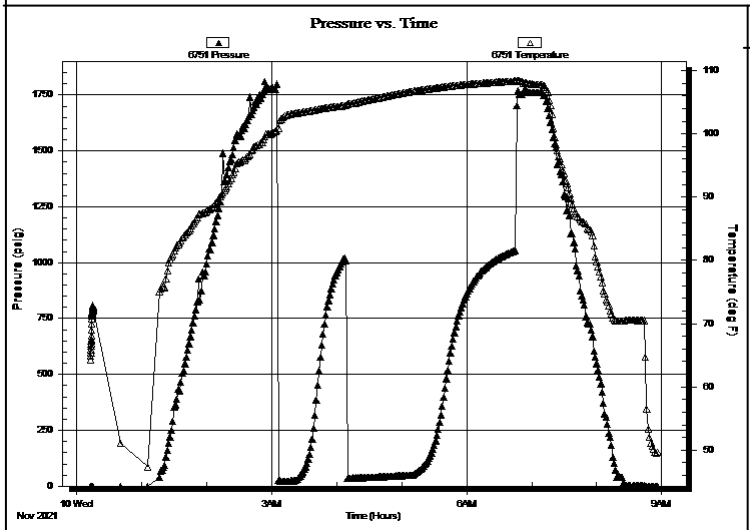
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 6751

Press@RunDepth: psig @ ft (KB)
Start Date: 2021.11.10 End Date: 2021.11.10
Start Time: 00:13:01 End Time: 08:57:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm:
Time Off Btm:

TEST COMMENT: IF: 15 min., Strong building blow , 10.5 inches
ISI: 45 min., No blow back
FF: 60 min., Strong building blow , 10 inches
FSI: 90 min., No blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation

Recovery

Length (ft)	Description	Volume (bbl)
62.00	gassy oily mud 95%M,3%O,2%G	0.87
0.00	500' GIP	0.00

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

FLUID SUMMARY

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67645 **DST#: 1**

Test Start: 2021.11.10 @ 00:13:00

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	9.00 lb/gal	Cushion Length:	ft	Water Salinity:	ppm
Viscosity:	55.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	6.00 in³	Gas Cushion Type:			
Resistivity:	ohm.m	Gas Cushion Pressure:	psig		
Salinity:	5700.00 ppm				
Filter Cake:	inches				

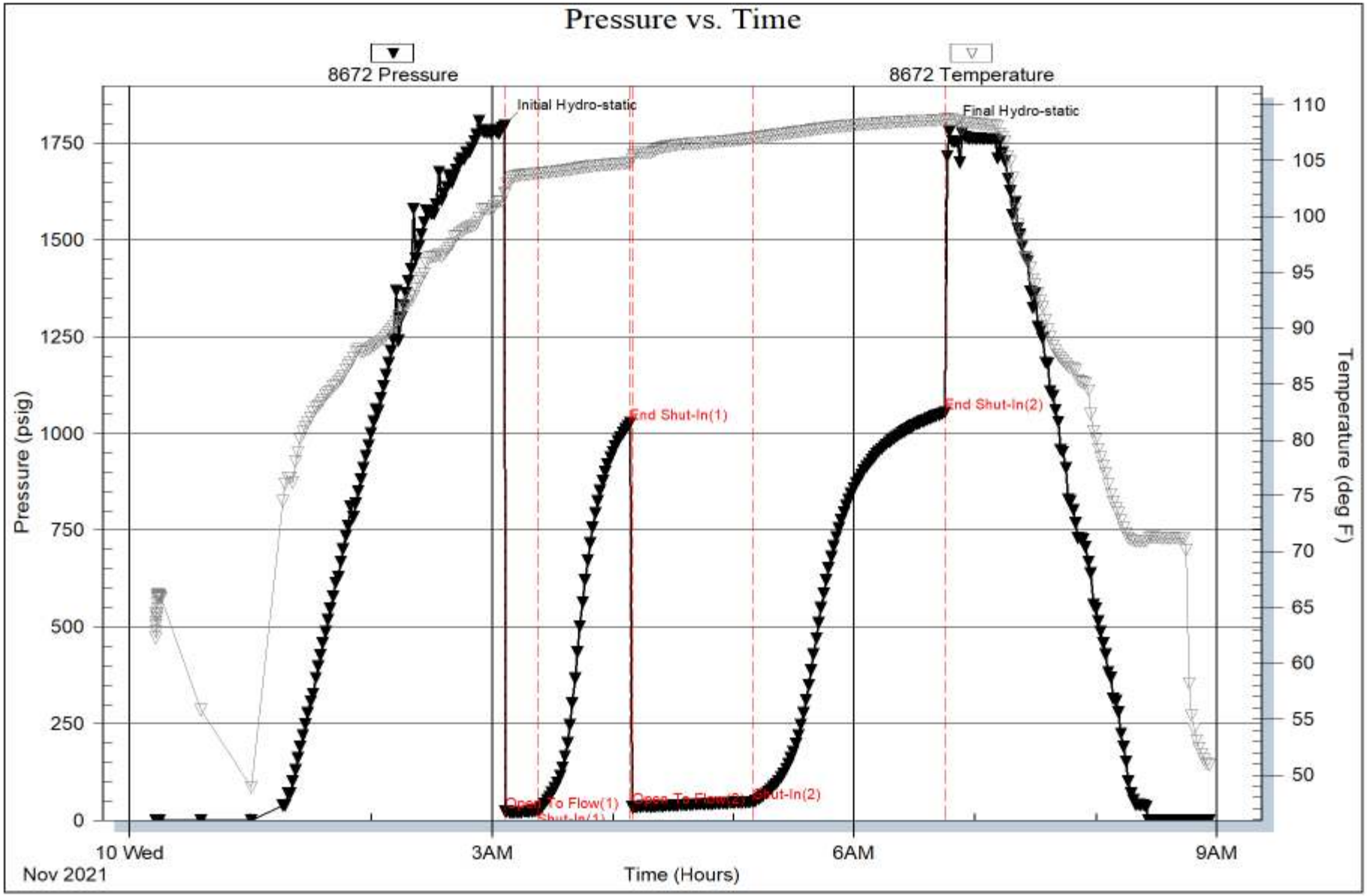
Recovery Information

Recovery Table

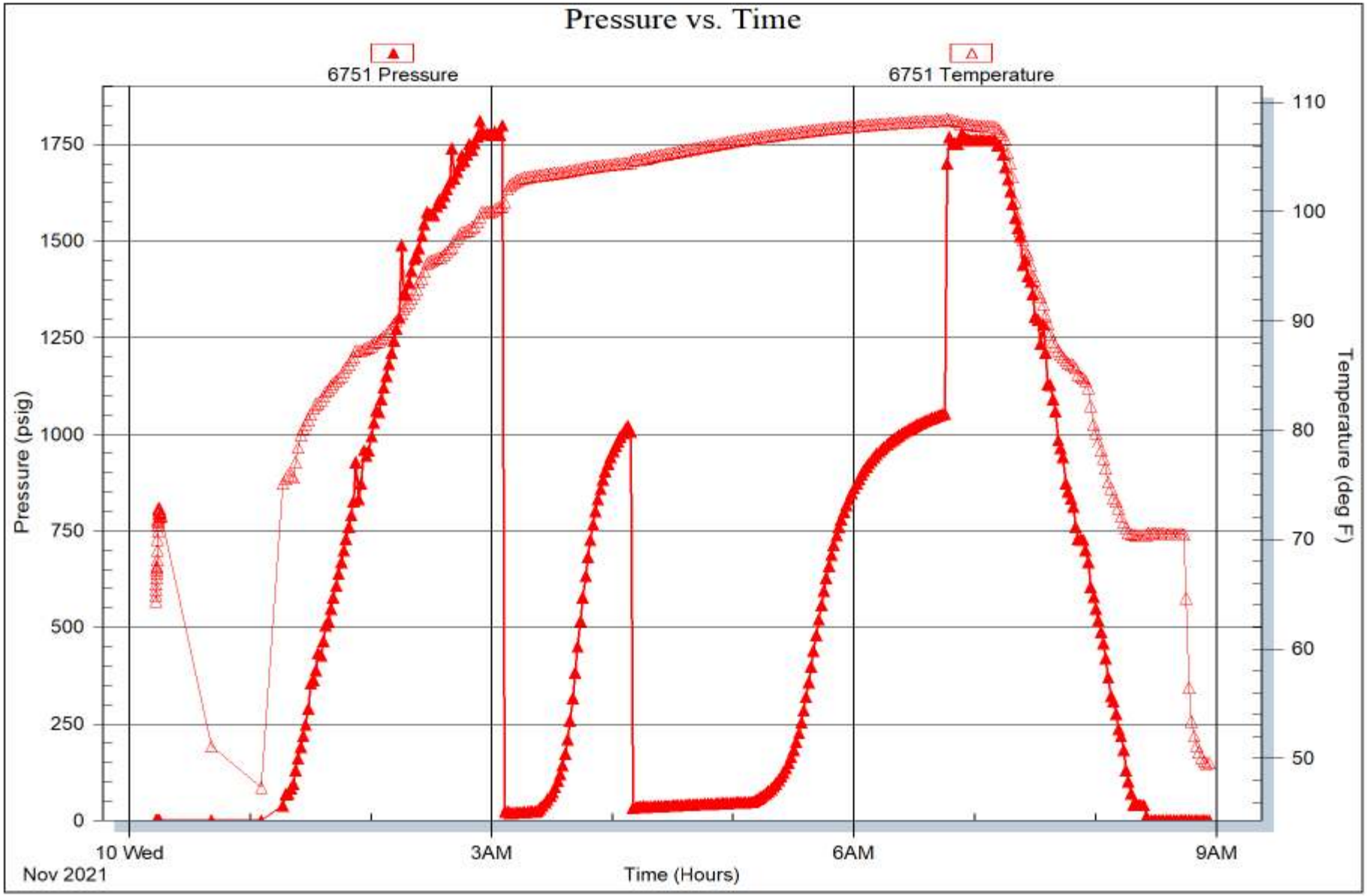
Length ft	Description	Volume bbl
62.00	gassy oily mud 95%M,3%O,2%G	0.870
0.00	500' GIP	0.000

Total Length: 62.00 ft Total Volume: 0.870 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments:


Pressure vs. Time
8672 Pressure
8672 Temperature
Initial Hydro-static
Final Hydro-static
End Shut-In(1)
End Shut-In(2)
Open To Flow(1)
Shut-In(2)
Pressure (psig)
Temperature (deg F)
1750
1500
1250
1000
750
500
250
0
110
105
100
95
90
85
80
75
70
65
60
55
50
10 Wed
Nov 2021
3AM
6AM
9AM
Time (Hours)

Serial #: 6751 | Shelby Resources LLC | Sew ing 1-31 | DST Test Number: 1



Trilobite Testing, Inc | Ref. No: 67645 | Printed: 2021.11.10 @ 12:13:35

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67646 **DST#: 2**

Test Start: 2021.11.10 @ 17:24:00

GENERAL INFORMATION:

Formation: **Lansing F**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 19:29:02
Time Test Ended: 01:10:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3811.00 ft (KB) To 3830.00 ft (KB) (TVD)
Total Depth: 3830.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

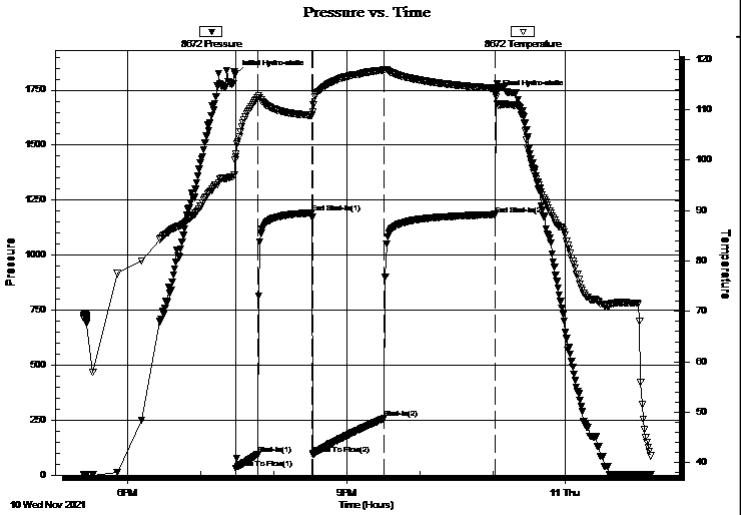
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 257.71 psig @ 3813.00 ft (KB)
Start Date: 2021.11.10 End Date: 2021.11.11
Start Time: 17:24:01 End Time: 01:10:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.10 @ 19:28:32
Time Off Btm: 2021.11.10 @ 23:03:02

TEST COMMENT: IF: 15 min., BOB 12 min., strong building blow , 15.5 inches
ISI: 45 min., no blow back
FF: 60 min., BOB 20 min., strong building blow , 35 inches
FSI: 90 min., no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1822.46	100.14	Initial Hydro-static
1	30.79	100.64	Open To Flow (1)
19	93.89	112.40	Shut-In(1)
63	1191.91	108.88	End Shut-In(1)
64	95.71	109.51	Open To Flow (2)
123	257.71	117.88	Shut-In(2)
214	1184.78	114.22	End Shut-In(2)
215	1731.30	112.47	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
465.00	gassy water 5%G,95%W	6.52

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67646 **DST#: 2**

Test Start: 2021.11.10 @ 17:24:00

GENERAL INFORMATION:

Formation: **Lansing F**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 19:29:02
Time Test Ended: 01:10:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3811.00 ft (KB) To 3830.00 ft (KB) (TVD)
Total Depth: 3830.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

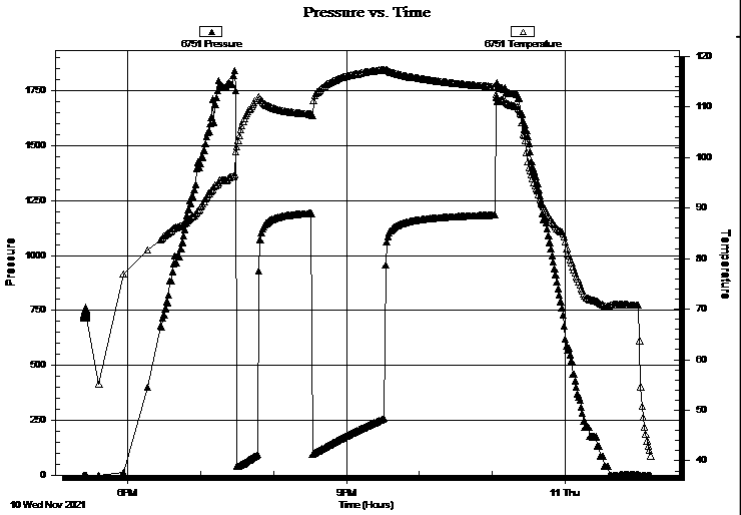
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 6751

Press@RunDepth: psig @ ft (KB)
Start Date: 2021.11.10 End Date: 2021.11.11
Start Time: 17:24:01 End Time: 01:10:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm:
Time Off Btm:

TEST COMMENT: IF: 15 min., BOB 12 min., strong building blow , 15.5 inches
ISI: 45 min., no blow back
FF: 60 min., BOB 20 min., strong building blow , 35 inches
FSI: 90 min., no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation

Recovery

Length (ft)	Description	Volume (bbl)
465.00	gassy water 5%G,95%W	6.52

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

FLUID SUMMARY

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67646 **DST#: 2**

Test Start: 2021.11.10 @ 17:24:00

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	8.00 lb/gal	Cushion Length:	ft	Water Salinity:	38000 ppm
Viscosity:	59.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	10.49 in³	Gas Cushion Type:			
Resistivity:	ohm.m	Gas Cushion Pressure:	psig		
Salinity:	6500.00 ppm				
Filter Cake:	inches				

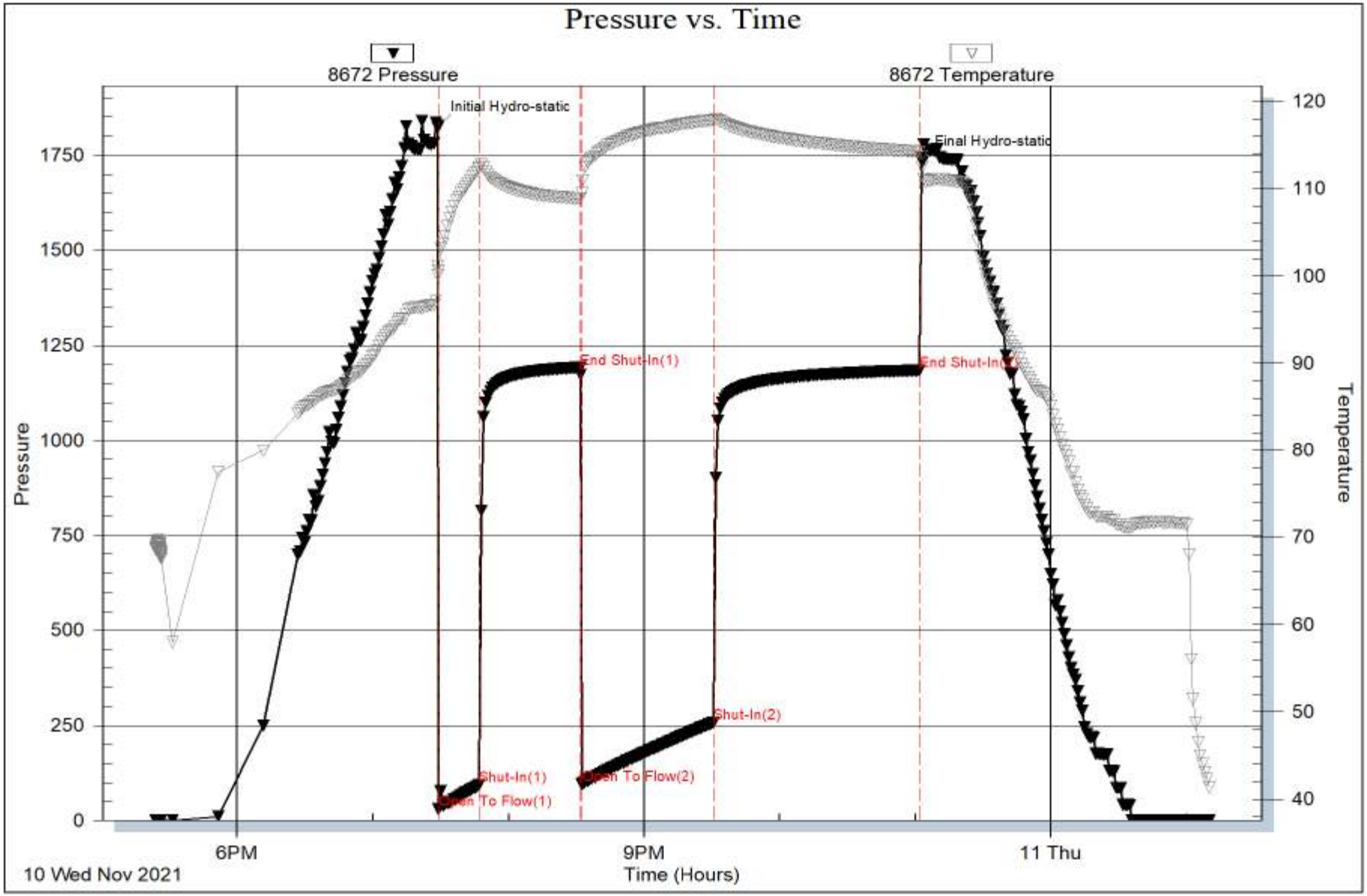
Recovery Information

Recovery Table

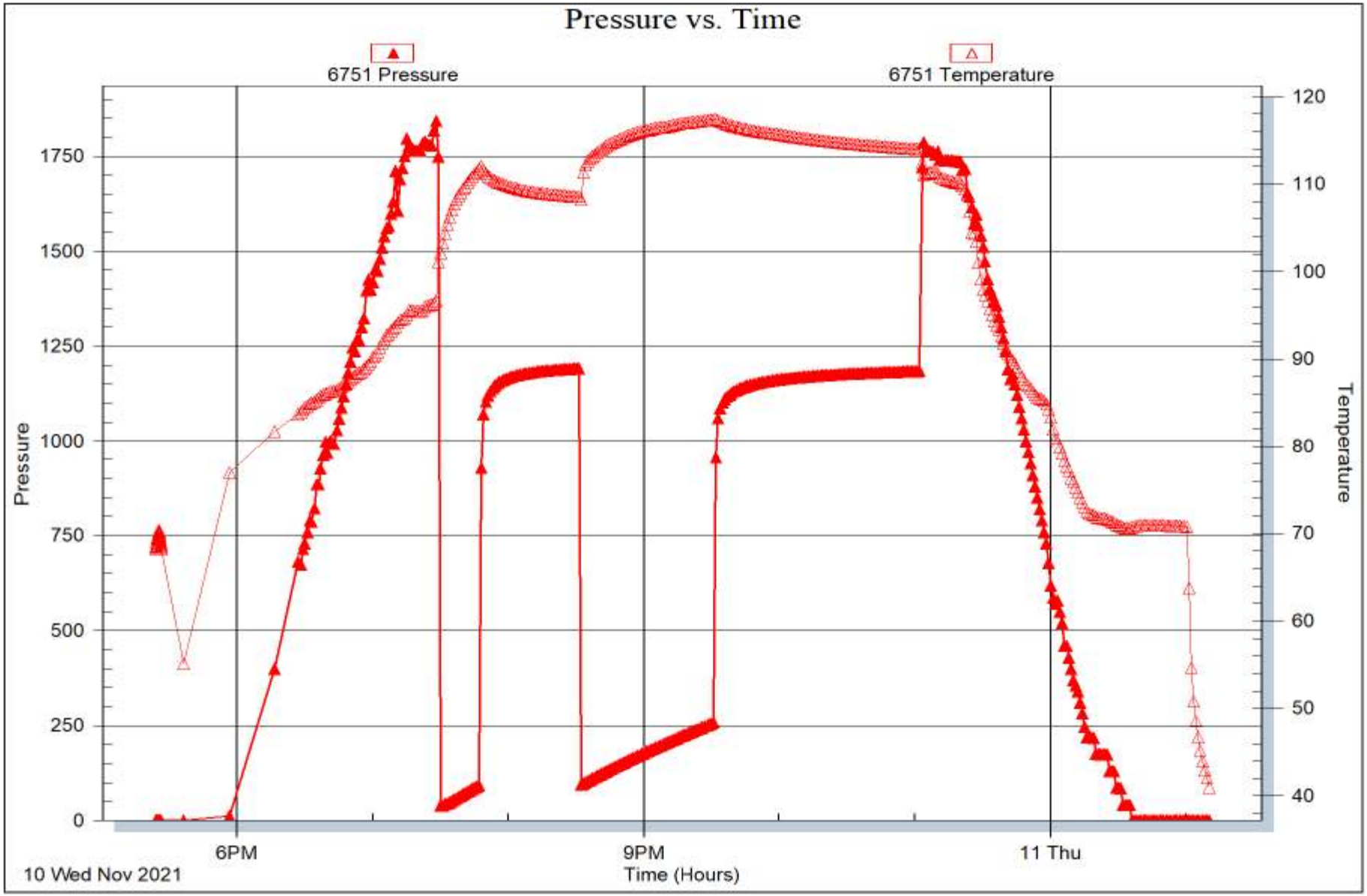
Length ft	Description	Volume bbl
465.00	gassy water 5%G,95%W	6.523

Total Length: 465.00 ft Total Volume: 6.523 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments: RW=.264@50F=38000


Pressure vs. Time
8672 Pressure
8672 Temperature
Initial Hydro-static
Final Hydro-static
End Shut-In(1)
End Shut-In(2)
Shut-In(1)
Open To Flow(1)
Open To Flow(2)
Shut-In(2)
Pressure
Temperature
1750
1500
1250
1000
750
500
250
0
120
110
100
90
80
70
60
50
40
6PM
9PM
11 Thu
10 Wed Nov 2021
Time (Hours)

Serial #: 6751 | Shelby Resources LLC | Sew ing 1-31 | DST Test Number: 2



Trilobite Testing, Inc | Ref. No: 67646 | Printed: 2021.11.11 @ 07:27:09

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67647 **DST#: 3**

Test Start: 2021.11.11 @ 15:17:00

GENERAL INFORMATION:

Formation: **Lansing(k)**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 17:30:17
Time Test Ended: 21:55:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3951.00 ft (KB) To 3972.00 ft (KB) (TVD)
Total Depth: 3972.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

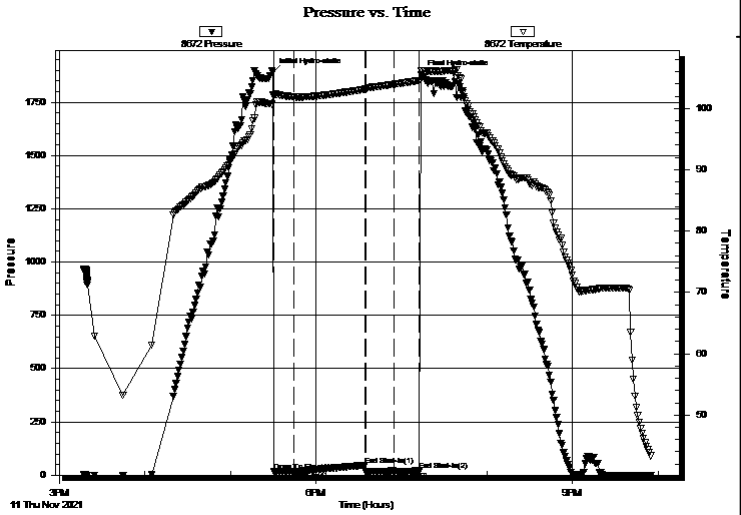
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 17.20 psig @ 3953.00 ft (KB)
Start Date: 2021.11.11 End Date: 2021.11.11
Start Time: 15:17:01 End Time: 21:55:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.11 @ 17:29:47
Time Off Btm: 2021.11.11 @ 19:13:47

TEST COMMENT: IF:15 min,weak surface blow
ISI:45 min, no blow back
FF: 25 min,weak surface blow , died in 5 min
FSI: 5 min, no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1888.62	102.21	Initial Hydro-static
1	17.49	102.03	Open To Flow (1)
15	18.05	101.88	Shut-In(1)
65	46.62	103.14	End Shut-In(1)
65	15.29	103.16	Open To Flow (2)
86	17.20	103.94	Shut-In(2)
103	20.32	104.58	End Shut-In(2)
104	1879.00	106.09	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
5.00	oil spotted mud 100%M	0.07

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67647 **DST#: 3**

Test Start: 2021.11.11 @ 15:17:00

GENERAL INFORMATION:

Formation: **Lansing(k)**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 17:30:17
Time Test Ended: 21:55:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3951.00 ft (KB) To 3972.00 ft (KB) (TVD)
Total Depth: 3972.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

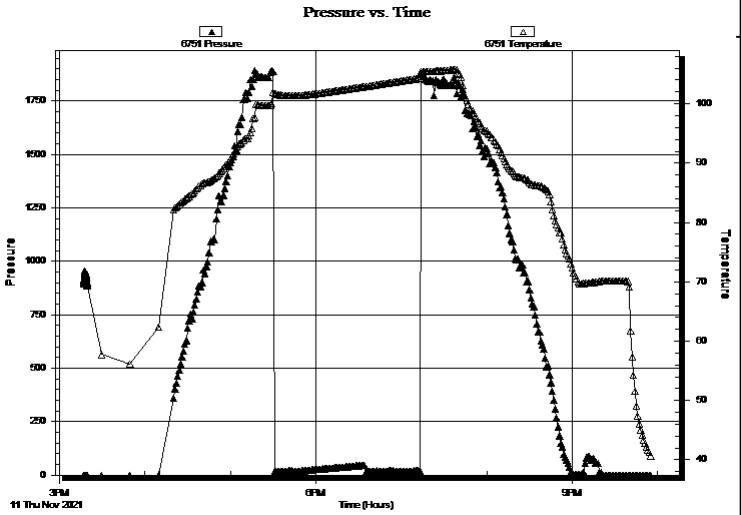
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 6751

Press@RunDepth: psig @ ft (KB)
Start Date: 2021.11.11 End Date: 2021.11.11
Start Time: 15:17:01 End Time: 21:55:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm:
Time Off Btm:

TEST COMMENT: IF:15 min,weak surface blow
ISI:45 min, no blow back
FF: 25 min,weak surface blow , died in 5 min
FSI: 5 min, no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation

Recovery

Length (ft)	Description	Volume (bbl)
5.00	oil spotted mud 100%M	0.07

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

FLUID SUMMARY

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67647 **DST#: 3**

Test Start: 2021.11.11 @ 15:17:00

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	9.00 lb/gal	Cushion Length:	ft	Water Salinity:	ppm
Viscosity:	41.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	9.99 in³	Gas Cushion Type:			
Resistivity:	ohm.m	Gas Cushion Pressure:	psig		
Salinity:	7500.00 ppm				
Filter Cake:	inches				

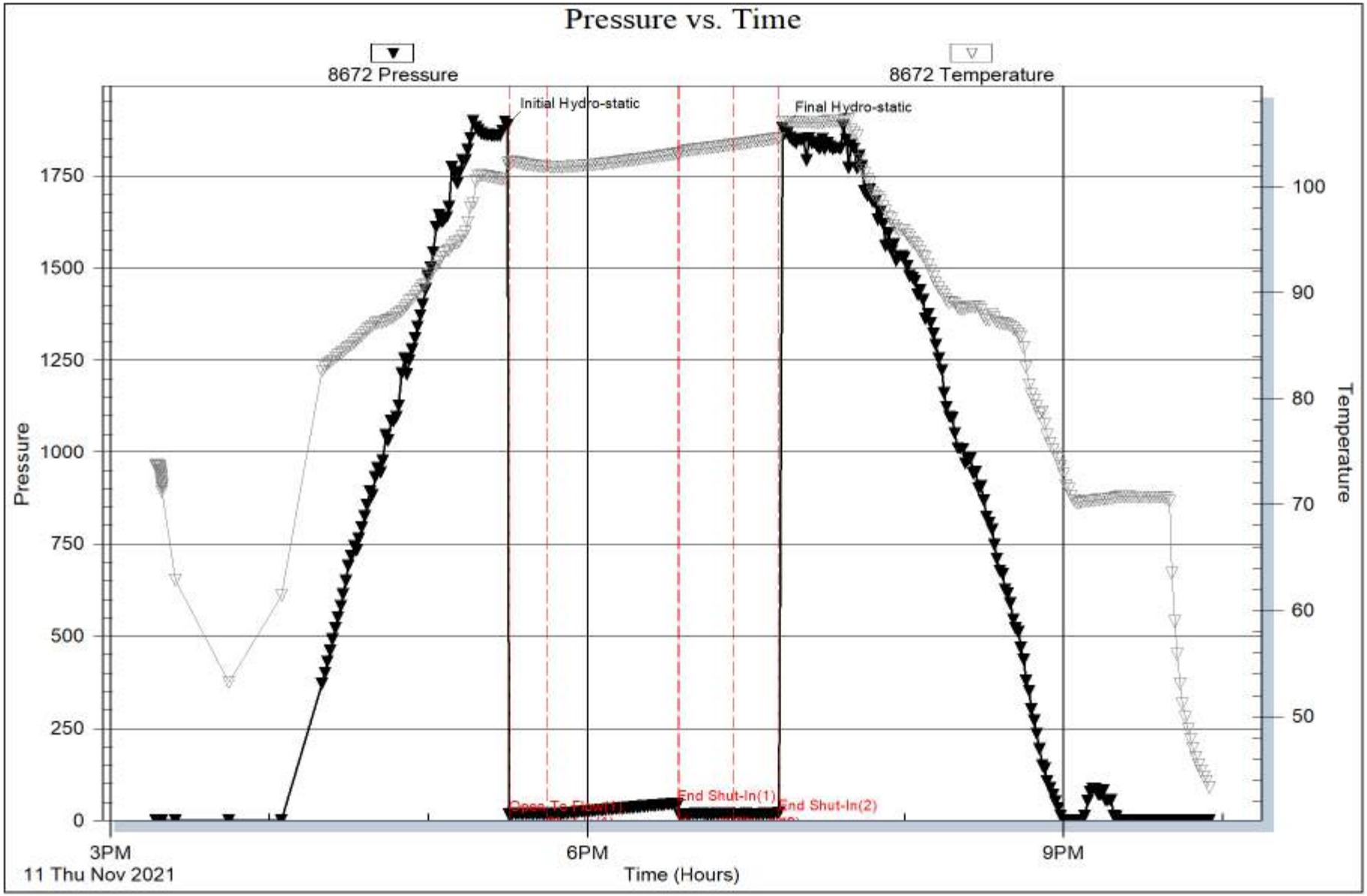
Recovery Information

Recovery Table

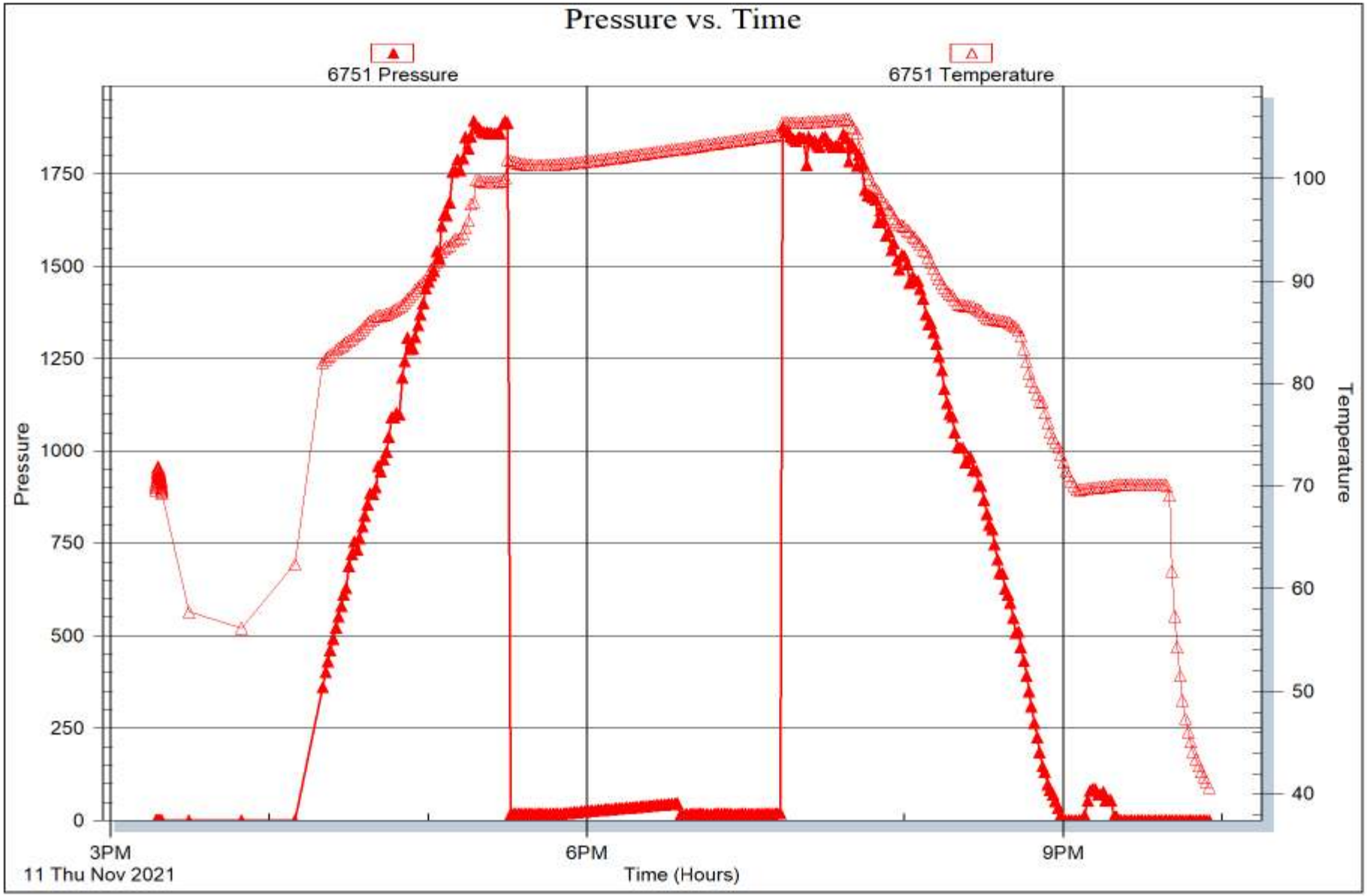
Length ft	Description	Volume bbl
5.00	oil spotted mud 100%M	0.070

Total Length: 5.00 ft Total Volume: 0.070 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments:


Pressure vs. Time
8672 Pressure
8672 Temperature
Initial Hydro-static
Final Hydro-static
End Shut-In(1)
End Shut-In(2)
Pressure
Temperature
1750
1500
1250
1000
750
500
250
0
100
90
80
70
60
50
3PM
11 Thu Nov 2021
6PM
9PM
Time (Hours)

Serial #: 6751 | Shelby Resources LLC | Sew ing 1-31 | DST Test Number: 3



DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67648 **DST#: 4**

Test Start: 2021.11.12 @ 21:55:00

GENERAL INFORMATION:

Formation: **Miss**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 00:38:47
Time Test Ended: 06:25:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4131.00 ft (KB) To 4175.00 ft (KB) (TVD)
Total Depth: 4175.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

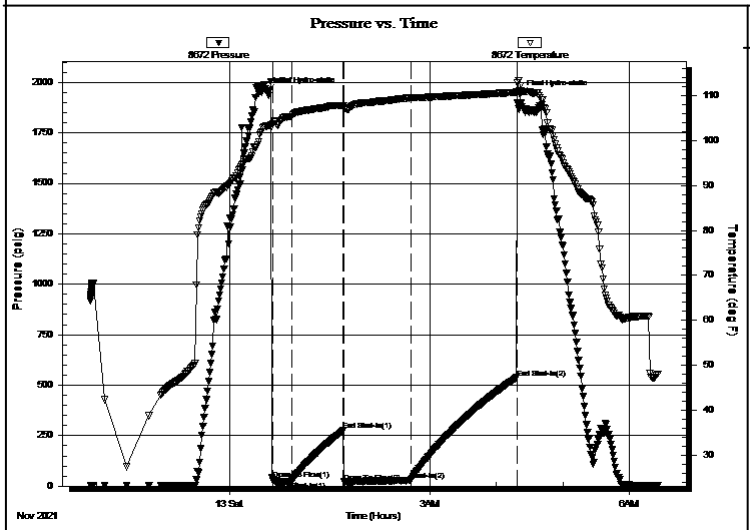
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 29.07 psig @ 4133.00 ft (KB)
Start Date: 2021.11.12 End Date: 2021.11.13
Start Time: 21:55:01 End Time: 06:25:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.13 @ 00:33:17
Time Off Btm: 2021.11.13 @ 04:21:02

TEST COMMENT: IF:15 min,BOB 1 min, strong building blow , 39 inches
ISI: 45 min, no blow back
FF: 60 min, BOB ASAO strong dieing blow
FSI: No blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1952.94	103.25	Initial Hydro-static
6	31.64	103.53	Open To Flow (1)
23	22.29	105.32	Shut-In(1)
69	275.24	107.79	End Shut-In(1)
70	20.41	107.83	Open To Flow (2)
130	29.07	109.50	Shut-In(2)
225	537.20	110.75	End Shut-In(2)
228	1940.92	112.11	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
0.00	GIP	0.00

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67648 **DST#: 4**

Test Start: 2021.11.12 @ 21:55:00

GENERAL INFORMATION:

Formation: **Miss**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 00:38:47
Time Test Ended: 06:25:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4131.00 ft (KB) To 4175.00 ft (KB) (TVD)
Total Depth: 4175.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

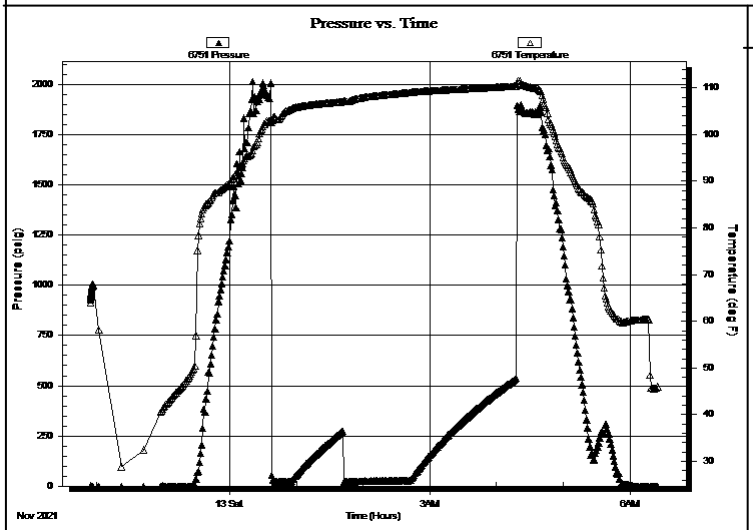
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 6751

Press@RunDepth: psig @ ft (KB)
Start Date: 2021.11.12 End Date: 2021.11.13
Start Time: 21:55:01 End Time: 06:25:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm:
Time Off Btm:

TEST COMMENT: IF:15 min,BOB 1 min, strong building blow , 39 inches
ISI: 45 min, no blow back
FF: 60 min, BOB ASAO strong dieing blow
FSI: No blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation

Recovery

Length (ft)	Description	Volume (bbl)
0.00	GIP	0.00

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

FLUID SUMMARY

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67648 **DST#: 4**

Test Start: 2021.11.12 @ 21:55:00

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	9.00 lb/gal	Cushion Length:	ft	Water Salinity:	ppm
Viscosity:	66.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	10.99 in³	Gas Cushion Type:			
Resistivity:	ohm.m	Gas Cushion Pressure:	psig		
Salinity:	10000.00 ppm				
Filter Cake:	inches				

Recovery Information

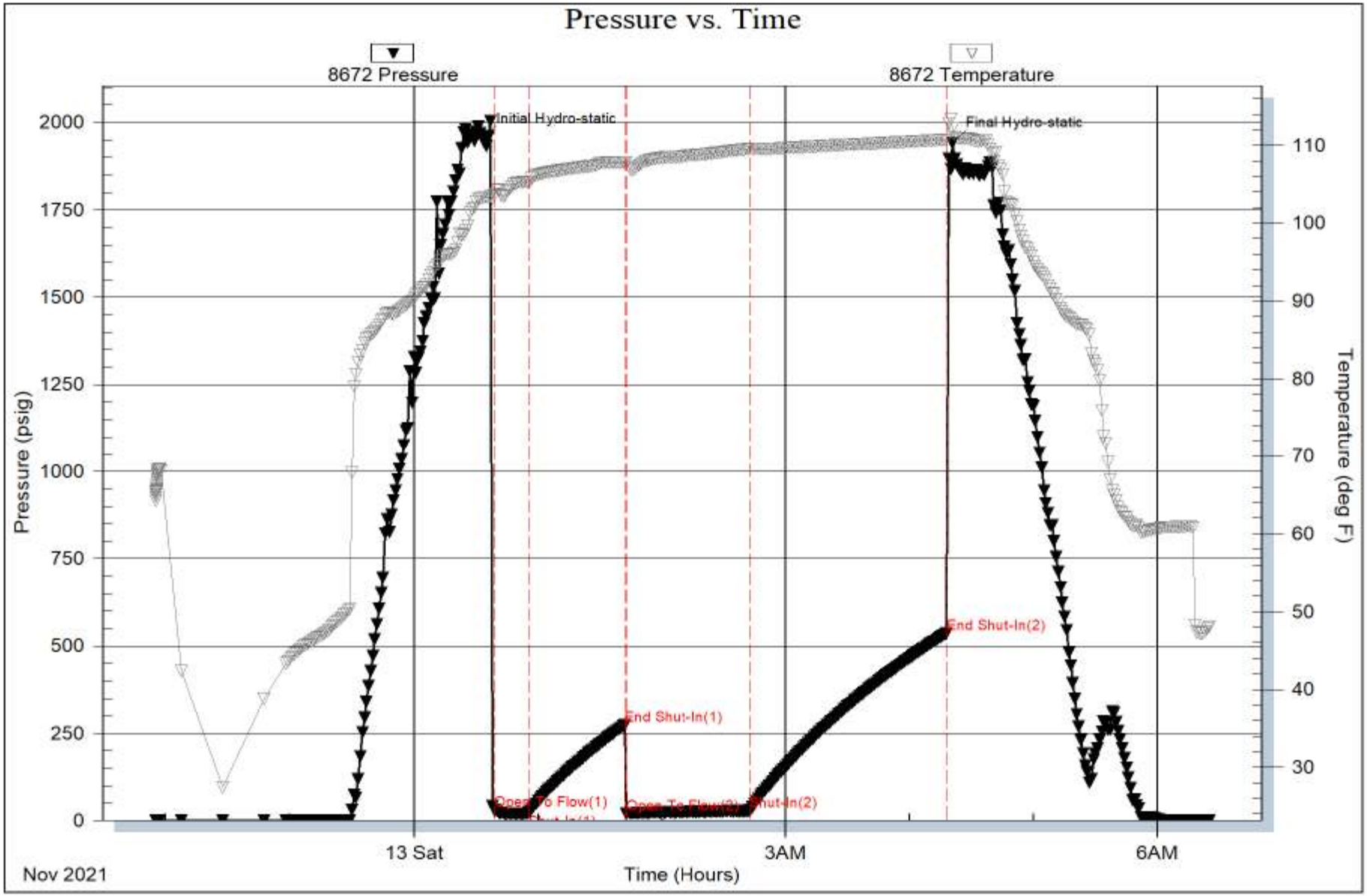
Recovery Table

Length ft	Description	Volume bbl
0.00	GIP	0.000

Total Length: ft Total Volume: 0.421 bbl

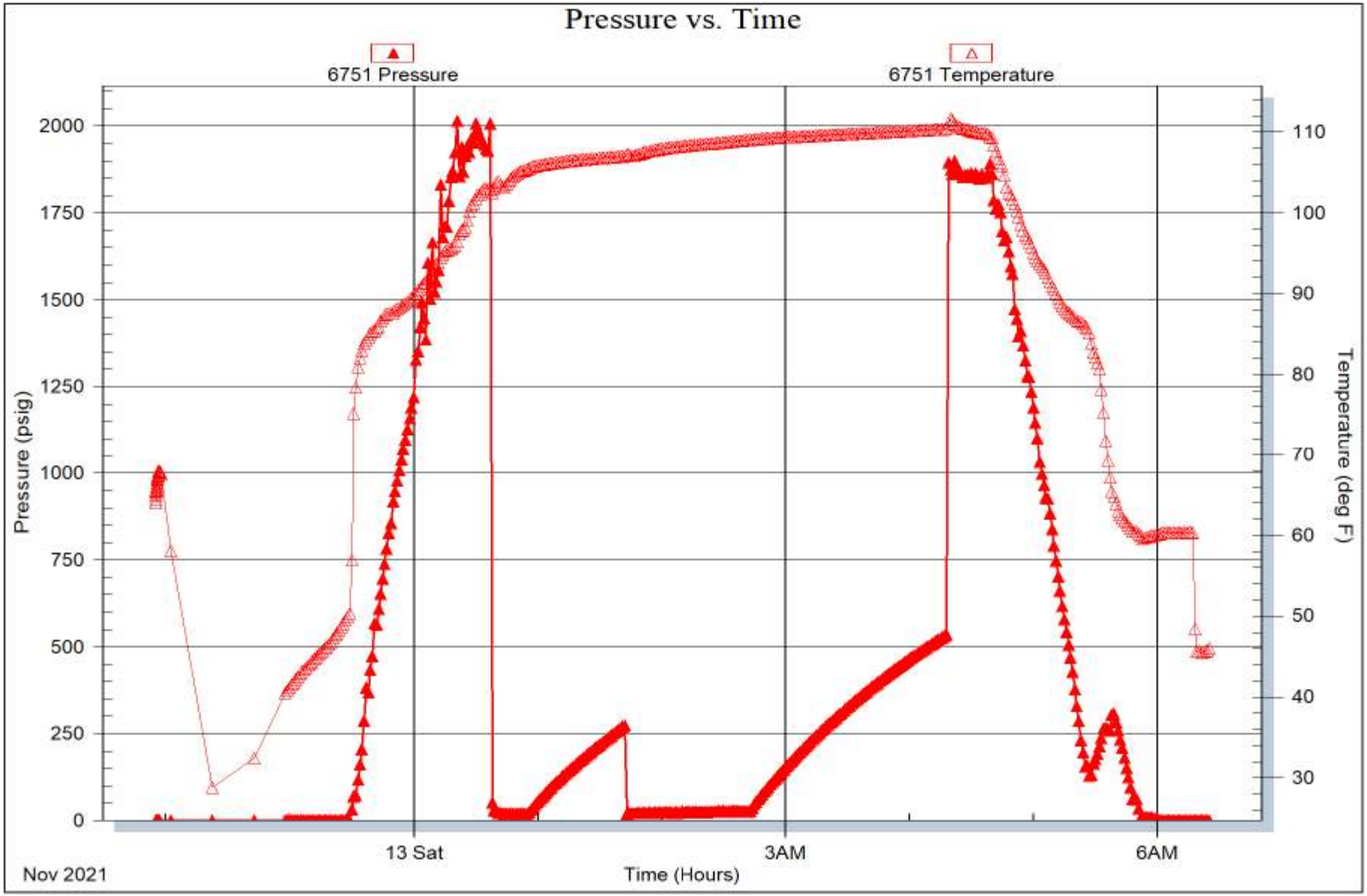
Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments:

Serial #: 8672 **Inside** Shelby Resources LLC Sew ing 1-31 DST Test Number: 4



Trilobite Testing, Inc Ref. No: 67648 Printed: 2021.11.13 @ 07:35:33

Serial #: 6751 | Shelby Resources LLC | Sew ing 1-31 | DST Test Number: 4



Trilobite Testing, Inc | Ref. No: 67648 | Printed: 2021.11.13 @ 07:35:33

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67649 **DST#: 5**

Test Start: 2021.11.13 @ 15:09:00

GENERAL INFORMATION:

Formation: **MISS**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 17:00:47
Time Test Ended: 23:11:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4163.00 ft (KB) To 4205.00 ft (KB) (TVD)
Total Depth: 4205.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

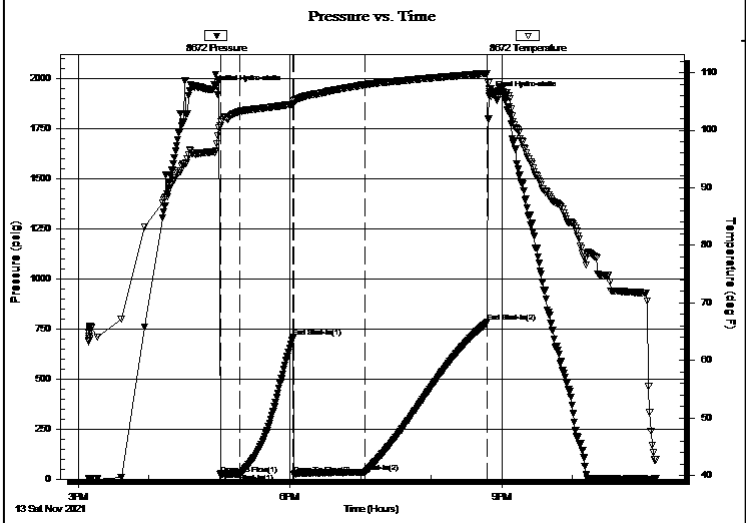
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 34.55 psig @ 4164.00 ft (KB)
Start Date: 2021.11.13 End Date: 2021.11.13
Start Time: 15:09:01 End Time: 23:11:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.13 @ 16:54:17
Time Off Btm: 2021.11.13 @ 20:49:32

TEST COMMENT: IF 15 blow built to 5.8"
ISI 45 no blow
FF 60 blow built to 14.7"
FSI 90 no blow



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1943.74	96.23	Initial Hydro-static
7	22.04	100.74	Open To Flow (1)
24	27.10	103.25	Shut-In(1)
69	709.77	104.54	End Shut-In(1)
70	24.59	105.11	Open To Flow (2)
130	34.55	107.90	Shut-In(2)
234	782.78	109.85	End Shut-In(2)
236	1915.14	107.23	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
45.00	oil spotted mud	0.63

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67649 **DST#: 5**

Test Start: 2021.11.13 @ 15:09:00

GENERAL INFORMATION:

Formation: **MISS**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 17:00:47
Time Test Ended: 23:11:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4163.00 ft (KB) To 4205.00 ft (KB) (TVD)
Total Depth: 4205.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

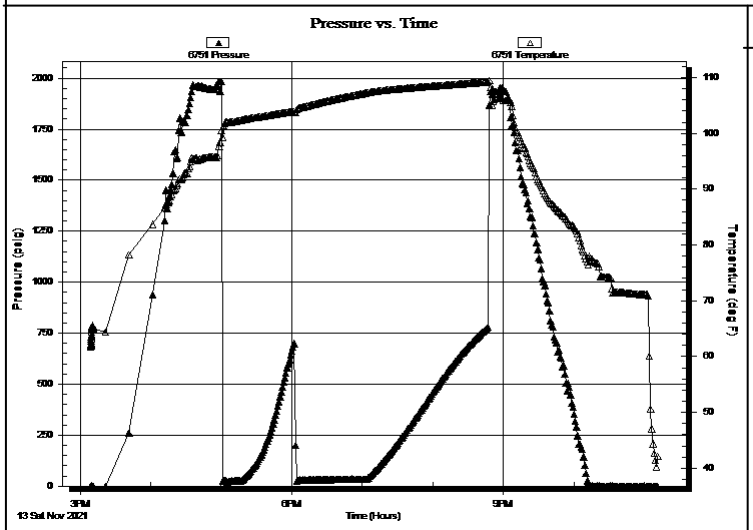
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 6751

Press@RunDepth: psig @ ft (KB)
Start Date: 2021.11.13 End Date: 2021.11.13
Start Time: 15:09:01 End Time: 23:11:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm:
Time Off Btm:

TEST COMMENT: IF 15 blow built to 5.8"
ISI 45 no blow
FF 60 blow built to 14.7"
FSI 90 no blow



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation

Recovery

Length (ft)	Description	Volume (bbl)
45.00	oil spotted mud	0.63

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

FLUID SUMMARY

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67649 **DST#: 5**

Test Start: 2021.11.13 @ 15:09:00

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	9.00 lb/gal	Cushion Length:	ft	Water Salinity:	ppm
Viscosity:	65.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	12.79 in³	Gas Cushion Type:			
Resistivity:	ohm.m	Gas Cushion Pressure:	psig		
Salinity:	10400.00 ppm				
Filter Cake:	inches				

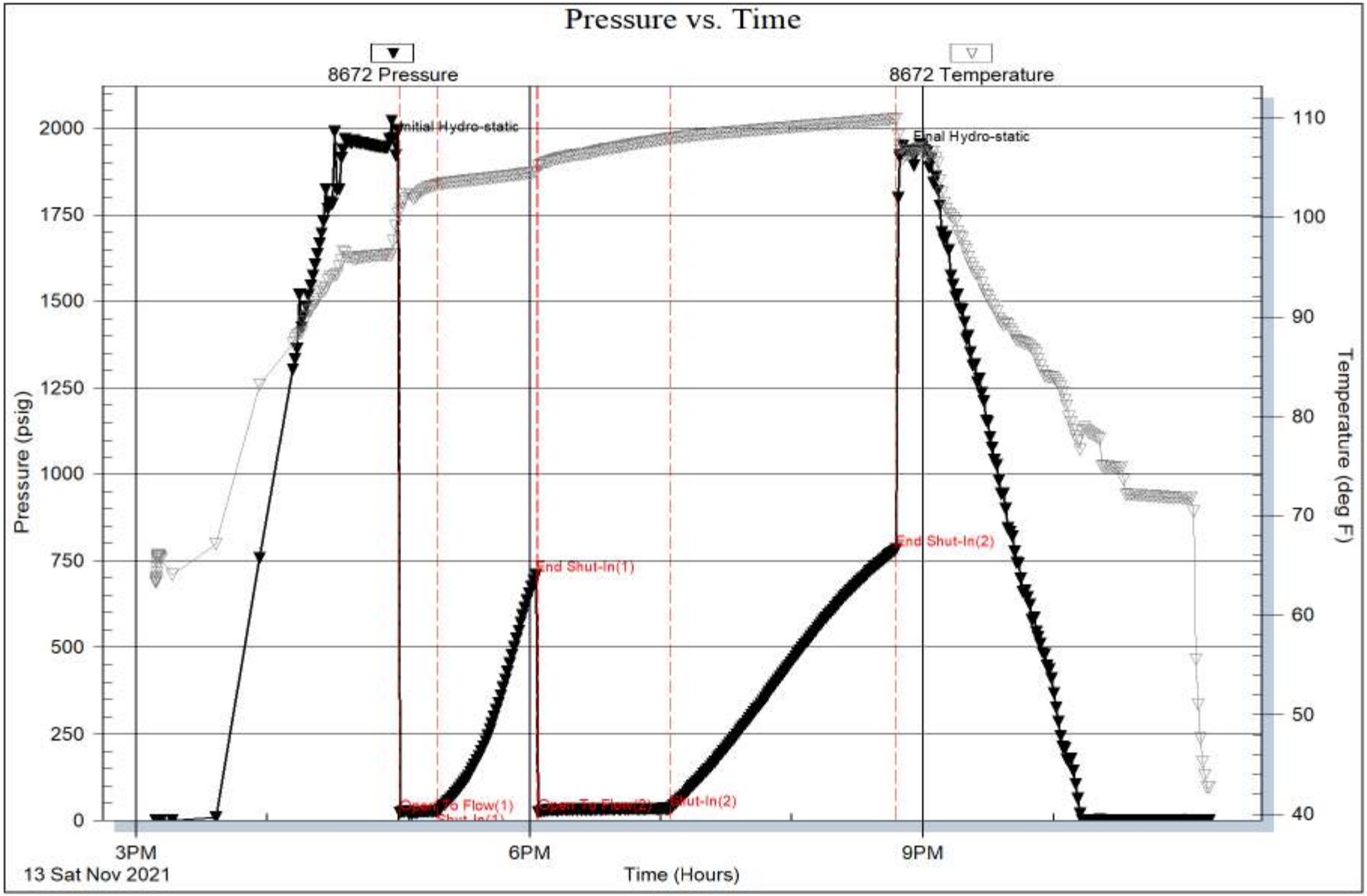
Recovery Information

Recovery Table

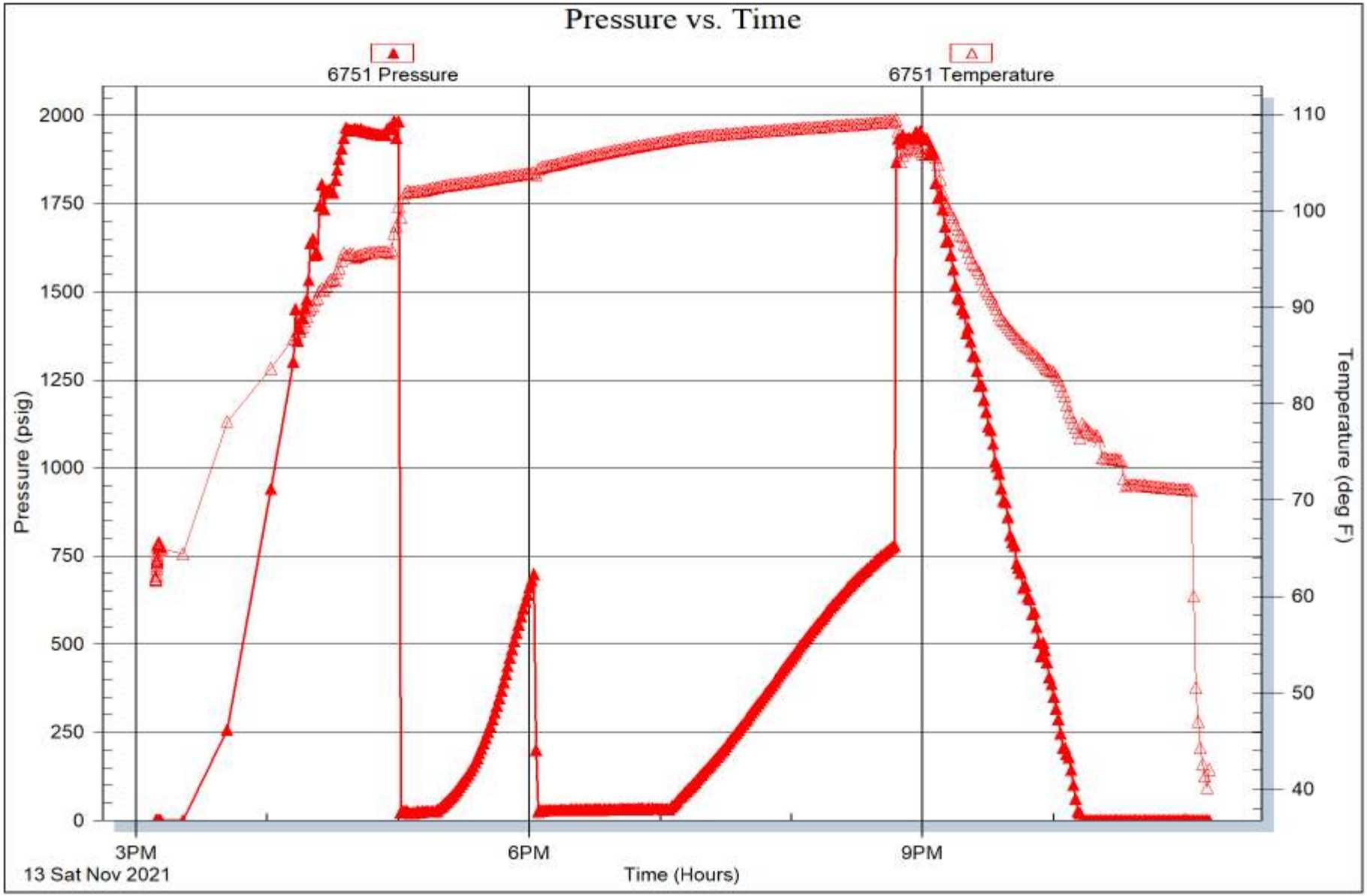
Length ft	Description	Volume bbl
45.00	oil spotted mud	0.631

Total Length: 45.00 ft Total Volume: 0.631 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments: 252' GIP


Pressure vs. Time
8672 Pressure
8672 Temperature
Initial Hydro-static
Final Hydro-static
End Shut-In(1)
End Shut-In(2)
Open To Flow(1)
Shut-In(2)
Pressure (psig)
Temperature (deg F)
2000
1750
1500
1250
1000
750
500
250
0
110
100
90
80
70
60
50
40
3PM
13 Sat Nov 2021
6PM
9PM
Time (Hours)

Serial #: 6751 | Shelby Resources LLC | Sew ing 1-31 | DST Test Number: 5



Trilobite Testing, Inc | Ref. No: 67649 | Printed: 2021.11.14 @ 07:47:32

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67650 **DST#: 6**

Test Start: 2021.11.14 @ 11:36:00

GENERAL INFORMATION:

Formation: **Viola**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 13:23:02
Time Test Ended: 19:24:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4246.00 ft (KB) To 4278.00 ft (KB) (TVD)
Total Depth: 4278.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

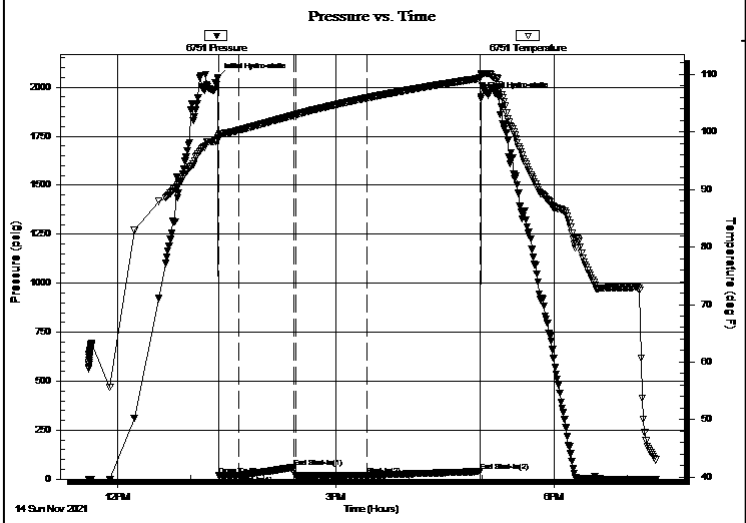
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 6751 **Outside**

Press@RunDepth: 20.21 psig @ 4248.00 ft (KB)
Start Date: 2021.11.14 End Date: 2021.11.14
Start Time: 11:36:01 End Time: 19:24:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.14 @ 13:22:32
Time Off Btm: 2021.11.14 @ 16:59:32

TEST COMMENT: IF:15 min.,weak surface blow , .4 inches
ISI:45 min., no blow back
FF:60 min., weak surface blow , .4 inches
FSI:90 min., no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	2047.78	99.04	Initial Hydro-static
1	18.12	98.95	Open To Flow (1)
18	19.44	100.31	Shut-In(1)
63	60.30	102.93	End Shut-In(1)
64	18.13	102.97	Open To Flow (2)
123	20.21	105.94	Shut-In(2)
216	39.16	109.37	End Shut-In(2)
217	1951.78	110.07	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
5.00	100%mud	0.07

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67650 **DST#: 6**

Test Start: 2021.11.14 @ 11:36:00

GENERAL INFORMATION:

Formation: **Viola**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 13:23:02
Time Test Ended: 19:24:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4246.00 ft (KB) To 4278.00 ft (KB) (TVD)
Total Depth: 4278.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

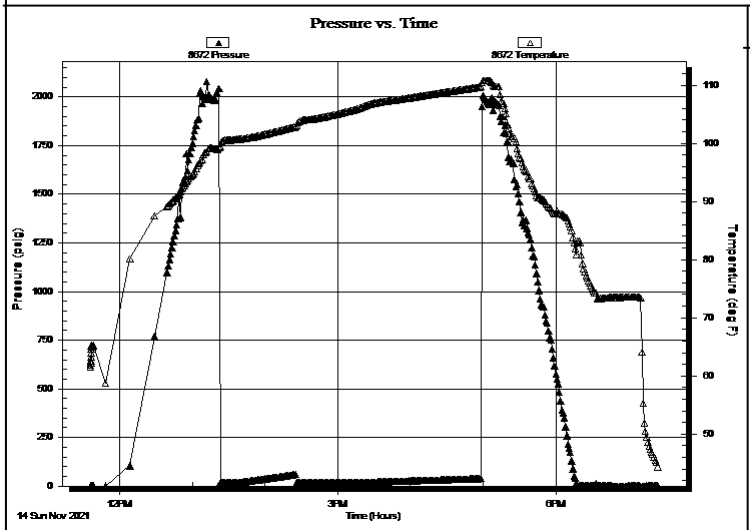
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672

Press@RunDepth: psig @ ft (KB)
Start Date: 2021.11.14 End Date: 2021.11.14
Start Time: 11:36:01 End Time: 19:24:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm:
Time Off Btm:

TEST COMMENT: IF:15 min.,weak surface blow , .4 inches
ISI:45 min., no blow back
FF:60 min., weak surface blow , .4 inches
FSI:90 min., no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation

Recovery

Length (ft)	Description	Volume (bbl)
5.00	100%mud	0.07

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

DRILL STEM TEST REPORT

FLUID SUMMARY

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67650 **DST#: 6**

Test Start: 2021.11.14 @ 11:36:00

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	9.00 lb/gal	Cushion Length:	ft	Water Salinity:	ppm
Viscosity:	65.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	12.79 in³	Gas Cushion Type:			
Resistivity:	ohm.m	Gas Cushion Pressure:	psig		
Salinity:	10400.00 ppm				
Filter Cake:	inches				

Recovery Information

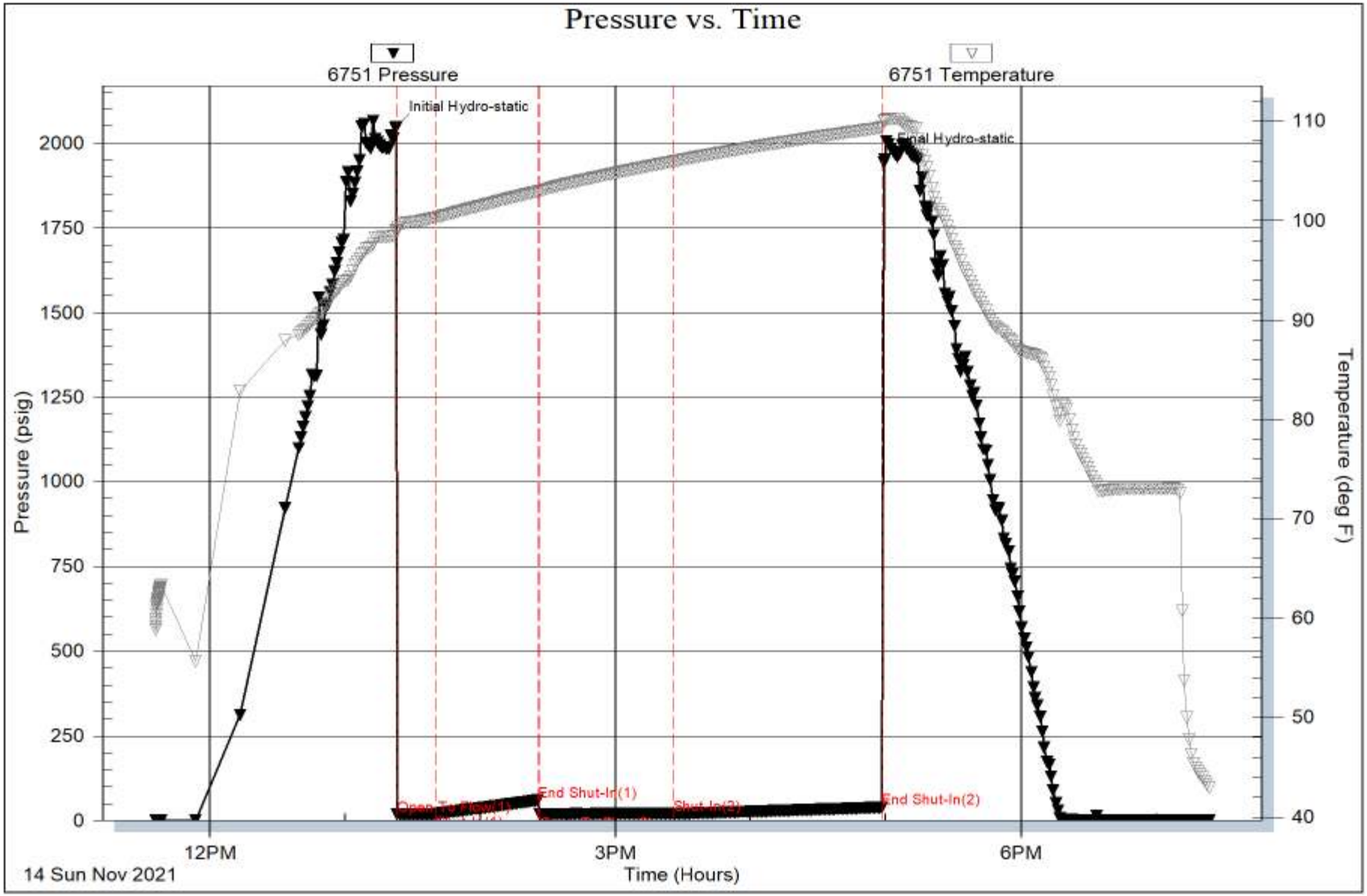
Recovery Table

Length ft	Description	Volume bbl
5.00	100%mud	0.070

Total Length: 5.00 ft Total Volume: 0.070 bbl

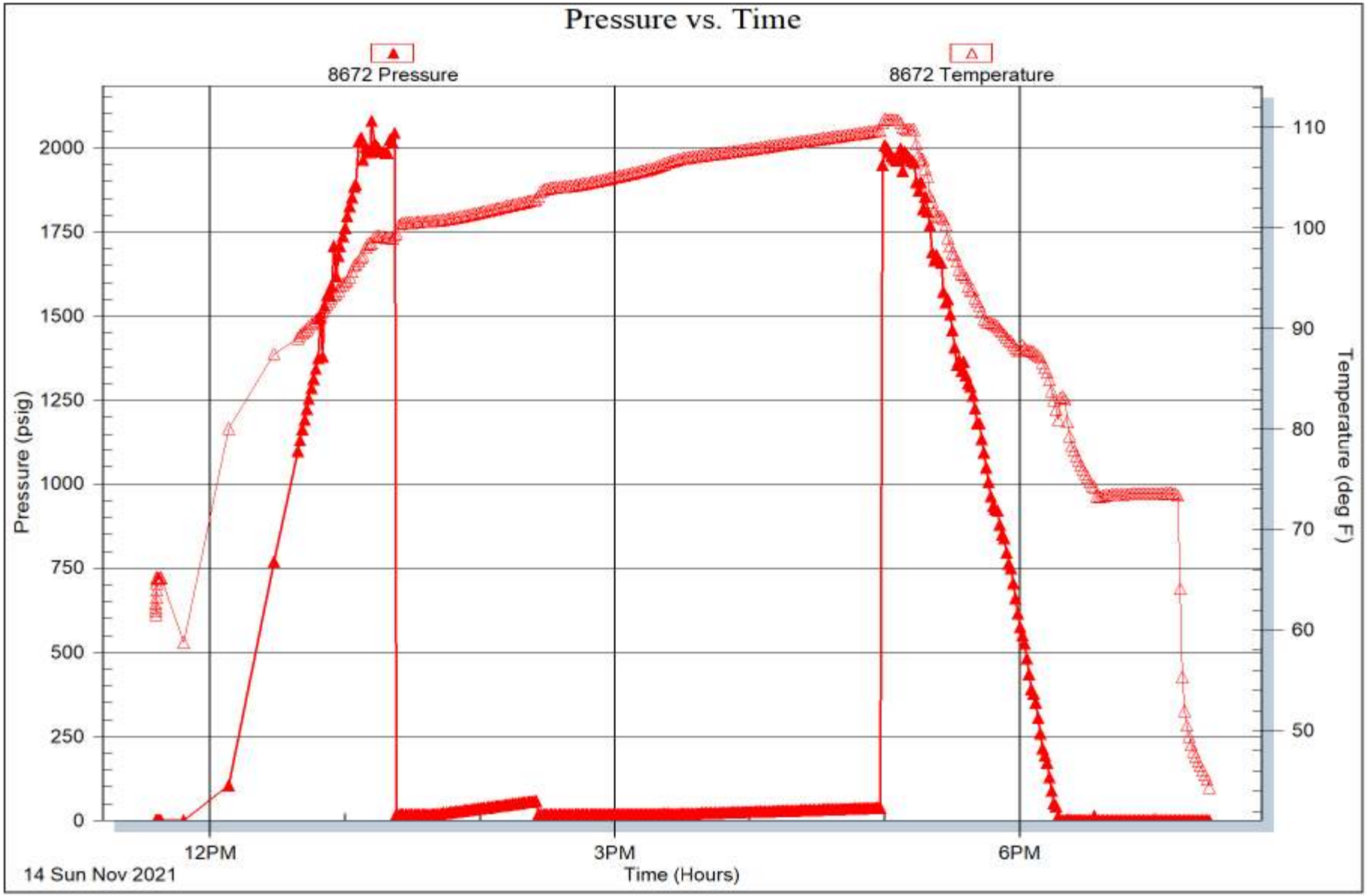
Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments:

Serial #: 6751 **Outside** Shelby Resources LLC Sew ing 1-31 DST Test Number: 6



Trilobite Testing, Inc Ref. No: 67650 Printed: 2021.11.14 @ 20:53:04

Serial #: 8672 | Shelby Resources LLC | Sew ing 1-31 | DST Test Number: 6



Trilobite Testing, Inc | Ref. No: 67650 | Printed: 2021.11.14 @ 20:53:04

QUALITY OILWELL CEMENTING, INC.

Federal Tax I.D.# 20-2886107

Phone 785-483-1071 Home Office P.O. Box 32 Russell, KS 67665 No. 2587

Cell 785-324-1041

Date	Sec.	Twp.	Range	County	State	On Location	Finish
11-6-21	31	24	14	Stafford	KS		7:30pm

Location 281 & 50 Jts 9W 2 1/2 S

Lease Sewing Well No. 1-31

Contractor Discovery

Type Job Surface

Hole Size 12 1/4 T.D. 963

Csg. 8 5/8 Depth

Tbg. Size Depth

Tool Depth

Cement Left in Csg. 35.98 Shoe Joint 35.98

Meas Line Displace 59

EQUIPMENT

Pumptrk 16 No. Cementer Helper Bill

Bulktrk No. Driver Driver CRAIG

Bulktrk 21 No. Driver Driver Doug

JOB SERVICES & REMARKS

Remarks:

Rat Hole

Mouse Hole

Centralizers

Baskets

D/V or Port Collar

Surface set @ 963 Baffle @ 922

Cemt w/ 450sx

Pump Plug w/ 59 bbls

Cemt did not circ.

Run 1" @ 40' w/ 100sx 74/30 4% CC

Used

450 60/40 4-2

100 sks 74/30 4% CC

X Signature

Owner

To Quality Oilwell Cementing, Inc.
You are hereby requested to rent cementing equipment and furnish cementer and helper to assist owner or contractor to do work as listed.

Charge To Shelby Res

Street

City State

The above was done to satisfaction and supervision of owner agent or contractor.

Cement Amount Ordered 450sx 60/40 4-2 1/2# Flo

250 74/30 4% CC 1/2# Flo Seal

Common 340

Poz. Mix 211

Gel. 13

Calcium 25

Hulls

Salt

Flowseal 350 #

Kol-Seal

Mud CLR 48

CFL-117 or CD110 CAF 38

Sand

Handling 700

Mileage

FLOAT EQUIPMENT

Guide Shoe

Centralizer

Baskets

AFU Inserts

Float Shoe

Latch Down

Baffle Plate 1

Rubber Plug - 1

Pumptrk Charge Long Surface

Mileage 34

Tax

Discount

Total Charge

Thanks

QUALITY OILWELL CEMENTING, INC.

Federal Tax I.D.# 20-2886107

Phone 785-483-1071 Home Office P.O. Box 32 Russell, KS 67665 No. 2594

Cell 785-324-1041

Date	Sec.	Twp.	Range	County	State	On Location	Finish
11-16-21	31	24	14	Stafford	KS		2:30PM

Location Macksville 3E 1½S

Lease Sewing Well No. 1-31

Contractor Discovery

Type Job PTA

Hole Size 7⅞ T.D.

Csg. Depth

Tbg. Size 4½ Depth

Tool Depth

Cement Left in Csg. Shoe Joint

Meas Line Displace

EQUIPMENT

Pumptrk 16 No. Cementer Helper — Bill / DAVID

Bulktrk No. Driver Driver

Bulktrk 14 No. Driver Driver — DAVE

JOB SERVICES & REMARKS

Remarks:

Rat Hole 30sks

Mouse Hole 20sks

Centralizers

Baskets

D/V or Port Collar

4402 - 50sks

990 - 50sks

350 - 50sks

60' - 20sks

30 RH

20 MH

X Signature

Owner

To Quality Oilwell Cementing, Inc.
You are hereby requested to rent cementing equipment and furnish cementer and helper to assist owner or contractor to do work as listed.

Charge To Shelby Res

Street

City State

The above was done to satisfaction and supervision of owner agent or contractor.

Cement Amount Ordered 250sks 60/40 4%Gel ¼# Flo Seal

Common 132

Poz. Mix 86

Gel. 8

Calcium

Hulls

Salt

Flowseal 50#

Kol-Seal

Mud CLR 48

CFL-117 or CD110 CAF 38

Sand

Handling 228

Mileage

FLOAT EQUIPMENT

Guide Shoe

Centralizer

Baskets

AFU Inserts

Float Shoe

Latch Down

~~8⅝ plug~~

Pumptrk Charge plug

Mileage 34

Tax

Discount

Total Charge

Scale 1:240 Imperial

Well Name:	Sewing #1-31		
Surface Location:	1914' FNL _927' FWL, Sec. 31-T24s-R14w		
Bottom Location:			
API:	15-185-24095-00-00		
License Number:	31725		
Spud Date:	11/5/2021	Time:	3:15 PM
Region:	Stafford		
Drilling Completed:	11/15/2021	Time:	12:50 PM
Surface Coordinates:			
Bottom Hole Coordinates:			
Ground Elevation:	1998.00ft		
K.B. Elevation:	2006.00ft		
Logged Interval:	3400.00ft	To:	4437.00ft
Total Depth:	4437.00ft		
Formation:	Mississippian		
Drilling Fluid Type:	Chemical/Fresh Water Gel		

OPERATOR

Company:	Shelby Resources, LLC		
Address:	3700 Quebec St. Unit 100 PMB 376 Denver, CO 80207		
Contact Geologist:	Jeff Zoller / Jeremy Schwartz		
Contact Phone Nbr:	620-786-0807 / 203-671-6034		
Well Name:	Sewing #1-31		
Location:	1914' FNL _927' FWL, Sec. 31-T24s-R14w		
API:	15-185-24095-00-00		
Pool:		Field:	Satterlee
State:	Kansas	Country:	USA

LOGGED BY

Company:	Mile High Exploration, LLC		
Address:	14645 Sterling Road Colorado Springs, CO 80921		
Phone Nbr:	203-671-6034		
Logged By:	Geologist	Name:	Jeremy Schwartz

NOTES

The Shelby Resources, LLC Sewing #1-31 was drilled to a total depth of 4437', bottoming in the Arbuckle. An iBall Instruments Bloodhound gas detector was employed in the drilling of said well.

Six DST's were conducted during the drilling of this well.

Due to negative drill stem tests and log anlysis it was determined by all parties involved to plug and abandon the well. The dry samples were saved and will be available for furthur review at the Kansas Geological Society Well Sample Library, located in Wichita, KS.

Respectfully Submitted,
Jeremy Schwartz
Geologist

CONTRACTOR

Contractor:	Discovery Drilling		
Rig #:	2		
Rig Type:	mud rotary		
Spud Date:	11/5/2021	Time:	3:15 PM
TD Date:	11/15/2021	Time:	12:50 PM
Rig Release:		Time:	

ELEVATIONS

K.B. Elevation:	2006.00ft	Ground Elevation:	1998.00ft
K.B. to Ground:	8.00ft		

					OIL - P&A						D&A						OIL					
					D.R LAUCK						Big J Prod.						WHITE HAWK OIL					
					WATERS #1						Sewing #1						ELMORE #1					
	Sewing #1-31				NW-NW-SW Sec. 31-24S-14W						S2-NW-NW Sec. 31-24S-14W						SE-SE-SE Sec. 25-24S-15W					
	KB	2006			KB	2006					KB	2002					KB	2005				
	LOG TOPS		SAMPLE TOPS		COMP. CARD		LOG		SMPL.		COMP. CARD		LOG		SMPL.		COMP. CARD		LOG		SMPL.	
FORMATION	DEPTH	DATUM	DEPTH	DATUM	DEPTH	DATUM	CORR.		CORR.		DEPTH	DATUM	CORR.		CORR.		DEPTH	DATUM	CORR.		CORR.	
ANHYDRITE	958	1048	950	1056	945	1061	-	13	-	5	952	1050	-	2	+	6	955	1050	-	2	+	6
HEEBNER SHALE	3584	-1578	3580	-1574	3600	-1594	+	16	+	20	3570	-1568	-	10	-	6	3596	-1591	+	13	+	17
DOUGLAS	3622	-1616	3620	-1614	3643	-1637	+	21	+	23	3610	-1608	-	8	-	6	3634	-1629	+	13	+	15
BROWN LIME	3730	-1724	3732	-1726	3747	-1741	+	17	+	15	3723	-1721	-	3	-	5	3743	-1738	+	14	+	12
LANSING	3748	-1742	3747	-1741	3766	-1760	+	18	+	19	3736	-1734	-	8	-	7	3762	-1757	+	15	+	16
MUNCIE CREEK	3878	-1872	3885	-1879	3899	-1893	+	21	+	14	3864	-1862	-	10	-	17	3886	-1881	+	9	+	2
STARK	3958	-1952	3963	-1957	3978	-1972	+	20	+	15	3940	-1938	-	14	-	19	3962	-1957	+	5	+	0
BKC	3994	-1988	3998	-1992	4010	-2004	+	16	+	12	3978	-1976	-	12	-	16	3998	-1993	+	5	+	1
MISSISSIPPIAN	4157	-2151	4159	-2153	4189	-2183	+	32	+	30							4172	-2167	+	16	+	14
KINDERHOOK	4197	-2191	4196	-2190	4216	-2210	+	19	+	20							4198	-2193	+	2	+	3
VIOLA	4240	-2234	4246	-2240	4269	-2263	+	29	+	23	4182	-2180	-	54	-	60	4250	-2245	+	11	+	5
SIMPSON SHALE	4370	-2364	4372	-2366	4358	-2352	-	12	-	14							4344	-2339	-	25	-	27
ARBUCKLE	4422	-2416	4422	-2416	4408	-2402	-	14	-	14	4446	-2444	+	28	+	28	4396	-2391	-	25	-	25
RTD			4437	-2431	4450	-2444			+	13	4477	-2475			+	44	4440	-2435			+	4
LTD	4436	-2430			4443	-2437	+	7			4477	-2475	+	45								

ROCK TYPES

Cht
Congl
Dolprim
Lmst fw<7
shale, grn
shale, gry
Carbon Sh
shale, red

ACCESSORIES

MINERAL
P Pyrite

FOSSIL
Bioclastic or Fragmental
F Fossils < 20%
Oolites
Oomoldic

STRINGER
Chert
Dolomite
Limestone
Sandstone
Siltstone
Shale

TEXTURE
C Chalky

OTHER SYMBOLS

MISC
Daily Report
Digital Photo
Document
Folder
Link
Vertical Log File
Horizontal Log File
Core Log File
Drill Cuttings Rpt

DST
DST Int
DST alt

Curve Track #1
ROP (min/ft)
Gamma (API)
Cal (in)
1:240 Imperial

Depth | Intervals
Cored Interval
DST Interval

DST

Lithology

Oil Show

Geological Descriptions

TG, C1 - C5
Total Gas (units)
C1 (units)
C2 (units)
C3 (units)
C4 (units)
1:240 Imperial

0 ROP (min/ft) 4
0 Gamma (API) 150
6 Cal (in) 16

0 Total Gas (units) 200
0 C1 (units) 200
0 C2 (units) 200
0 C3 (units) 200
0 C4 (units) 200

Logged By Jeremy Schwartz

Shelby Sewing 1-31 dst 1.jpg

Shelby Sewing 1-31 dst 2.jpg

Shelby Sewing 1-31 DST 3.jpg

Shelby Sewing 1-31 dst 4.jpg

Shelby Sewing 1-31 dst 5.jpg

Shelby Sewing 1-31 dst 6.jpg

3380

3390

3400

3410 — Mostly red and gray shale, with some scattered LS, cream, micro-xln, dense with no vis porosity, slightly chalky, no show or odor

3420

3430 — As above, with slight inlfux cream to gray LS, micro-xln, some slightly fossiliferous, some chalky, most dense with no vis porosity, no show or odor

3440

3450 — LS as above, shale mostly dropped out, fairly chalky, no show or odor

3460

3470 — LS as above, fairly chalky, no show or odor

3480

3490 — LS, cream to white with some scattered gray, micro-xln, chalky to slightly fossiliferous and dense with no vis porosity, chalky sample, no show or odor

3500

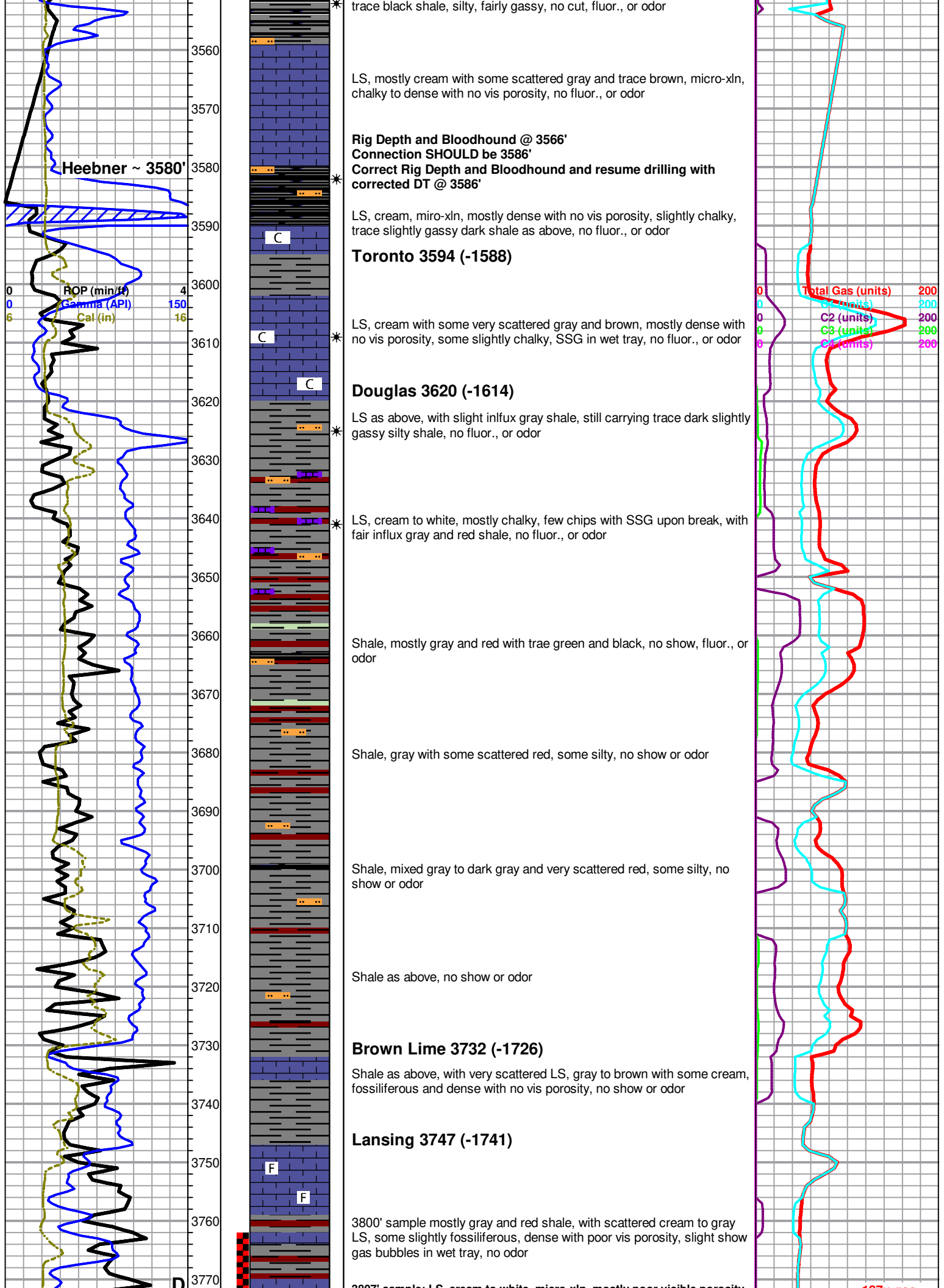
3510 — As above, slightly less chalky, slight influx gray, dense with no vis porosity, no show or odor

3520

3530 — LS as above, trace gray to black shale, fairly chalky, no show or odor

3540

3550 — LS, mostly cream with some gray, chalky to dense with no vis porosity,



trace black shale, silty, fairly gassy, no cut, fluor., or odor

LS, mostly cream with some scattered gray and trace brown, micro-xln, chalky to dense with no vis porosity, no fluor., or odor

Rig Depth and Bloodhound @ 3566'
Connection SHOULD be 3586'
Correct Rig Depth and Bloodhound and resume drilling with corrected DT @ 3586'

LS, cream, miro-xln, mostly dense with no vis porosity, slightly chalky, trace slightly gassy dark shale as above, no fluor., or odor

Toronto 3594 (-1588)

LS, cream with some very scattered gray and brown, mostly dense with no vis porosity, some slightly chalky, SSG in wet tray, no fluor., or odor

Douglas 3620 (-1614)

LS as above, with slight inlfux gray shale, still carrying trace dark slightly gassy silty shale, no fluor., or odor

LS, cream to white, mostly chalky, few chips with SSG upon break, with fair influx gray and red shale, no fluor., or odor

Shale, mostly gray and red with trae green and black, no show, fluor., or odor

Shale, gray with some scattered red, some silty, no show or odor

Shale, mixed gray to dark gray and very scattered red, some silty, no show or odor

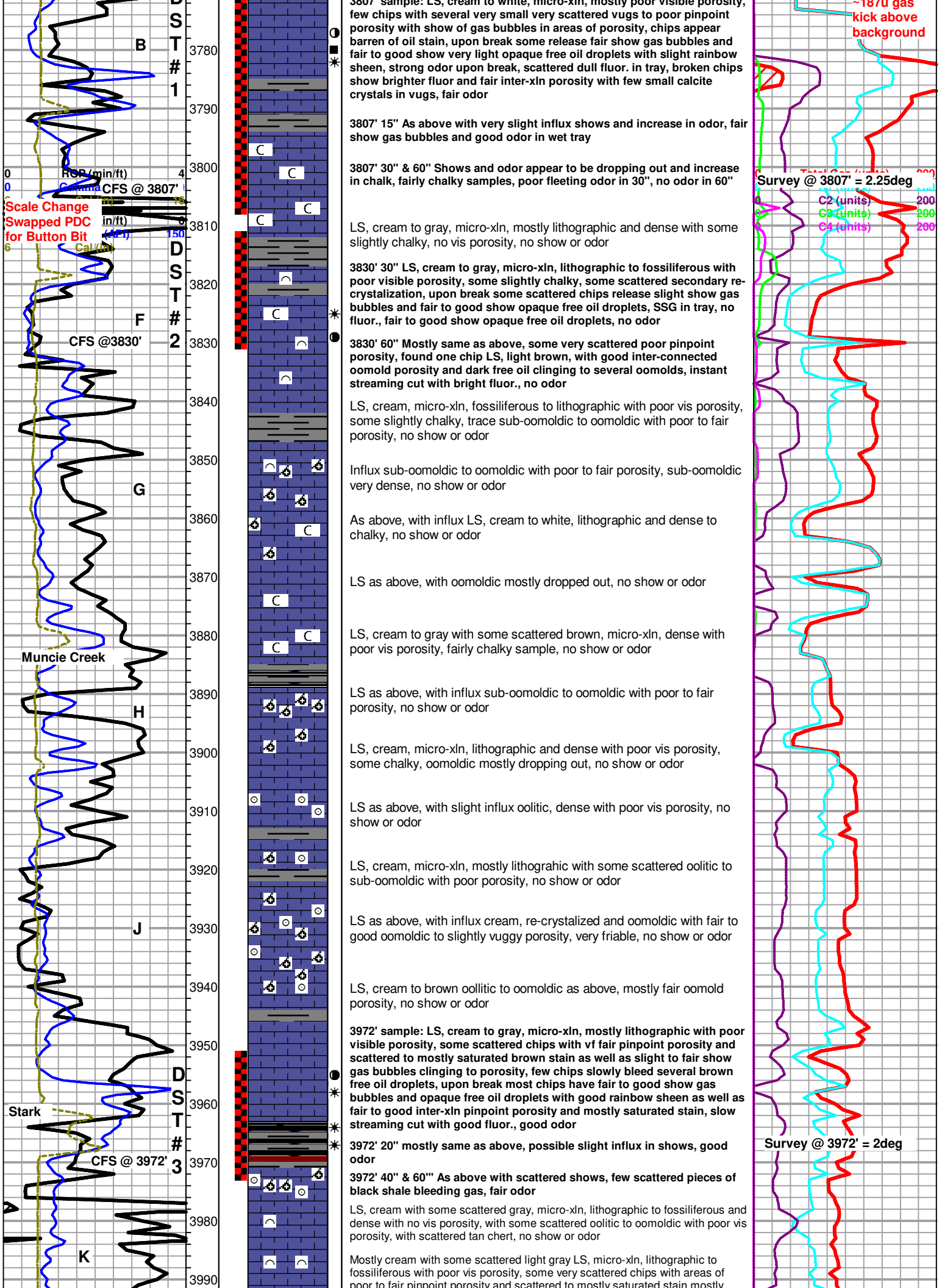
Shale as above, no show or odor

Brown Lime 3732 (-1726)

Shale as above, with very scattered LS, gray to brown with some cream, fossiliferous and dense with no vis porosity, no show or odor

Lansing 3747 (-1741)

3800' sample mostly gray and red shale, with scattered cream to gray LS, some slightly fossiliferous, dense with poor vis porosity, slight show gas bubbles in wet tray, no odor



3807' sample: LS, cream to white, micro-xln, mostly poor visible porosity, few chips with several very small very scattered vugs to poor pinpoint porosity with show of gas bubbles in areas of porosity, chips appear barren of oil stain, upon break some release fair show gas bubbles and fair to good show very light opaque free oil droplets with slight rainbow sheen, strong odor upon break, scattered dull fluor. in tray, broken chips show brighter fluor and fair inter-xln porosity with few small calcite crystals in vugs, fair odor

3807' 15" As above with very slight influx shows and increase in odor, fair show gas bubbles and good odor in wet tray

3807' 30" & 60" Shows and odor appear to be dropping out and increase in chalk, fairly chalky samples, poor fleeting odor in 30", no odor in 60"

LS, cream to gray, micro-xln, mostly lithographic and dense with some slightly chalky, no vis porosity, no show or odor

3830' 30" LS, cream to gray, micro-xln, lithographic to fossiliferous with poor visible porosity, some slightly chalky, some scattered secondary re-crystalization, upon break some scattered chips release slight show gas bubbles and fair to good show opaque free oil droplets, SSG in tray, no fluor., fair to good show opaque free oil droplets, no odor

3830' 60" Mostly same as above, some very scattered poor pinpoint porosity, found one chip LS, light brown, with good inter-connected oomold porosity and dark free oil clinging to several oomolds, instant streaming cut with bright fluor., no odor

LS, cream, micro-xln, fossiliferous to lithographic with poor vis porosity, some slightly chalky, trace sub-oomoldic to oomoldic with poor to fair porosity, no show or odor

Influx sub-oomoldic to oomoldic with poor to fair porosity, sub-oomoldic very dense, no show or odor

As above, with influx LS, cream to white, lithographic and dense to chalky, no show or odor

LS as above, with oomoldic mostly dropped out, no show or odor

LS, cream to gray with some scattered brown, micro-xln, dense with poor vis porosity, fairly chalky sample, no show or odor

LS as above, with influx sub-oomoldic to oomoldic with poor to fair porosity, no show or odor

LS, cream, micro-xln, lithographic and dense with poor vis porosity, some chalky, oomoldic mostly dropping out, no show or odor

LS as above, with slight influx oolitic, dense with poor vis porosity, no show or odor

LS, cream, micro-xln, mostly lithograhic with some scattered oolitic to sub-oomoldic with poor porosity, no show or odor

LS as above, with influx cream, re-crystalized and oomoldic with fair to good oomoldic to slightly vuggy porosity, very friable, no show or odor

LS, cream to brown oollitic to oomoldic as above, mostly fair oomold porosity, no show or odor

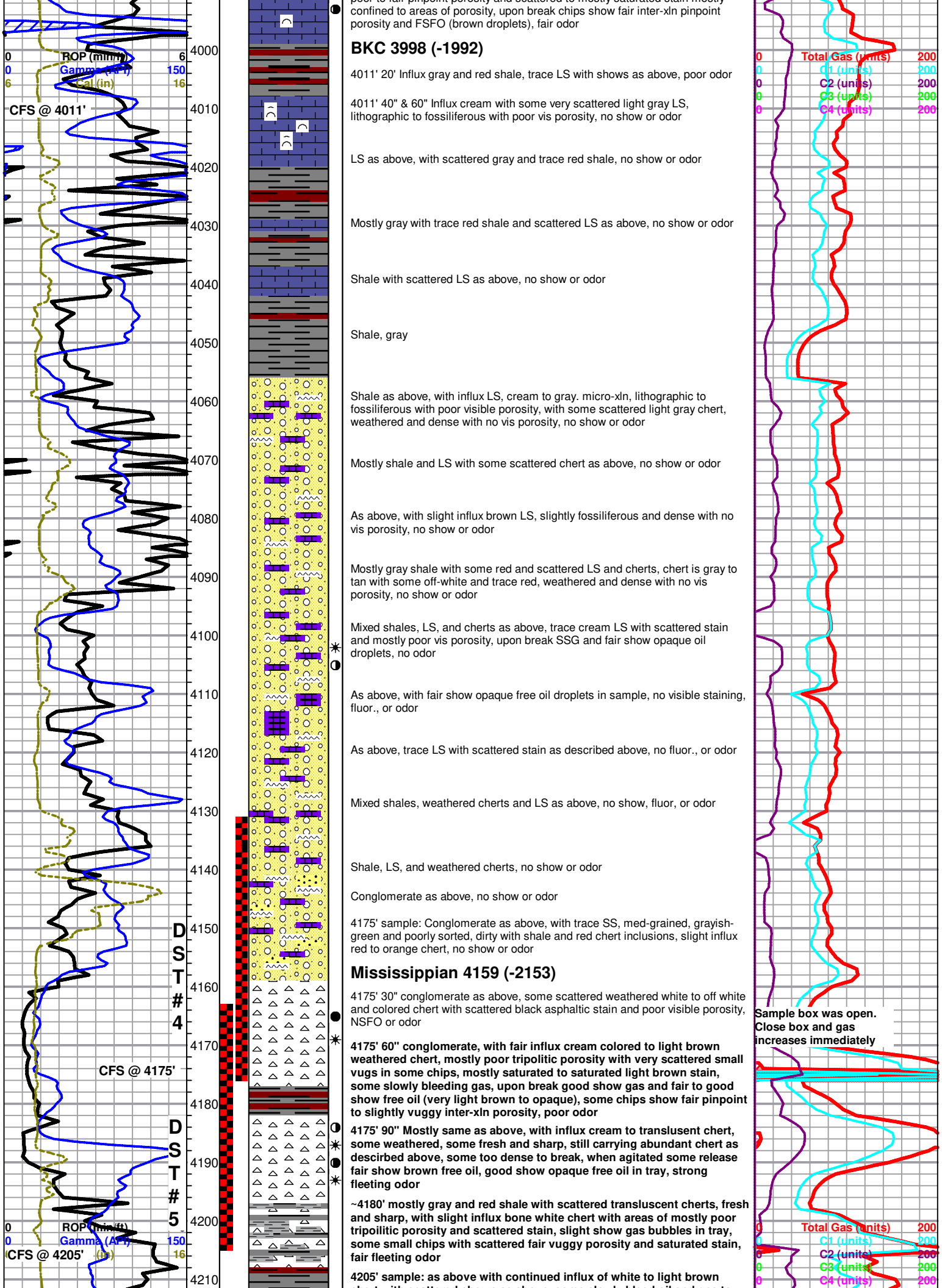
3972' sample: LS, cream to gray, micro-xln, mostly lithographic with poor visible porosity, some scattered chips with vf fair pinpoint porosity and scattered to mostly saturated brown stain as well as slight to fair show gas bubbles clinging to porosity, few chips slowly bleed several brown free oil droplets, upon break most chips have fair to good show gas bubbles and opaque free oil droplets with good rainbow sheen as well as fair to good inter-xln pinpoint porosity and mostly saturated stain, slow streaming cut with good fluor., good odor

3972' 20" mostly same as above, possible slight influx in shows, good odor

3972' 40" & 60"' As above with scattered shows, few scattered pieces of black shale bleeding gas, fair odor

LS, cream with some scattered gray, micro-xln, lithographic to fossiliferous and dense with no vis porosity, with some scattered oolitic to oomoldic with poor vis porosity, with scattered tan chert, no show or odor

Mostly cream with some scattered light gray LS, micro-xln, lithographic to fossiliferous with poor vis porosity, some very scattered chips with areas of poor to fair pinpoint porosity and scattered to mostly saturated stain mostly



poor to fair pinpoint porosity and scattered to mostly saturated stain mostly confined to areas of porosity, upon break chips show fair inter-xln pinpoint porosity and FSFO (brown droplets), fair odor

BKC 3998 (-1992)

4011' 20' Influx gray and red shale, trace LS with shows as above, poor odor

4011' 40" & 60" Influx cream with some very scattered light gray LS, lithographic to fossiliferous with poor vis porosity, no show or odor

LS as above, with scattered gray and trace red shale, no show or odor

Mostly gray with trace red shale and scattered LS as above, no show or odor

Shale with scattered LS as above, no show or odor

Shale, gray

Shale as above, with influx LS, cream to gray. micro-xln, lithographic to fossiliferous with poor visible porosity, with some scattered light gray chert, weathered and dense with no vis porosity, no show or odor

Mostly shale and LS with some scattered chert as above, no show or odor

As above, with slight influx brown LS, slightly fossiliferous and dense with no vis porosity, no show or odor

Mostly gray shale with some red and scattered LS and cherts, chert is gray to tan with some off-white and trace red, weathered and dense with no vis porosity, no show or odor

Mixed shales, LS, and cherts as above, trace cream LS with scattered stain and mostly poor vis porosity, upon break SSG and fair show opaque oil droplets, no odor

As above, with fair show opaque free oil droplets in sample, no visible staining, fluor., or odor

As above, trace LS with scattered stain as described above, no fluor., or odor

Mixed shales, weathered cherts and LS as above, no show, fluor, or odor

Shale, LS, and weathered cherts, no show or odor

Conglomerate as above, no show or odor

4175' sample: Conglomerate as above, with trace SS, med-grained, grayish-green and poorly sorted, dirty with shale and red chert inclusions, slight influx red to orange chert, no show or odor

Mississippian 4159 (-2153)

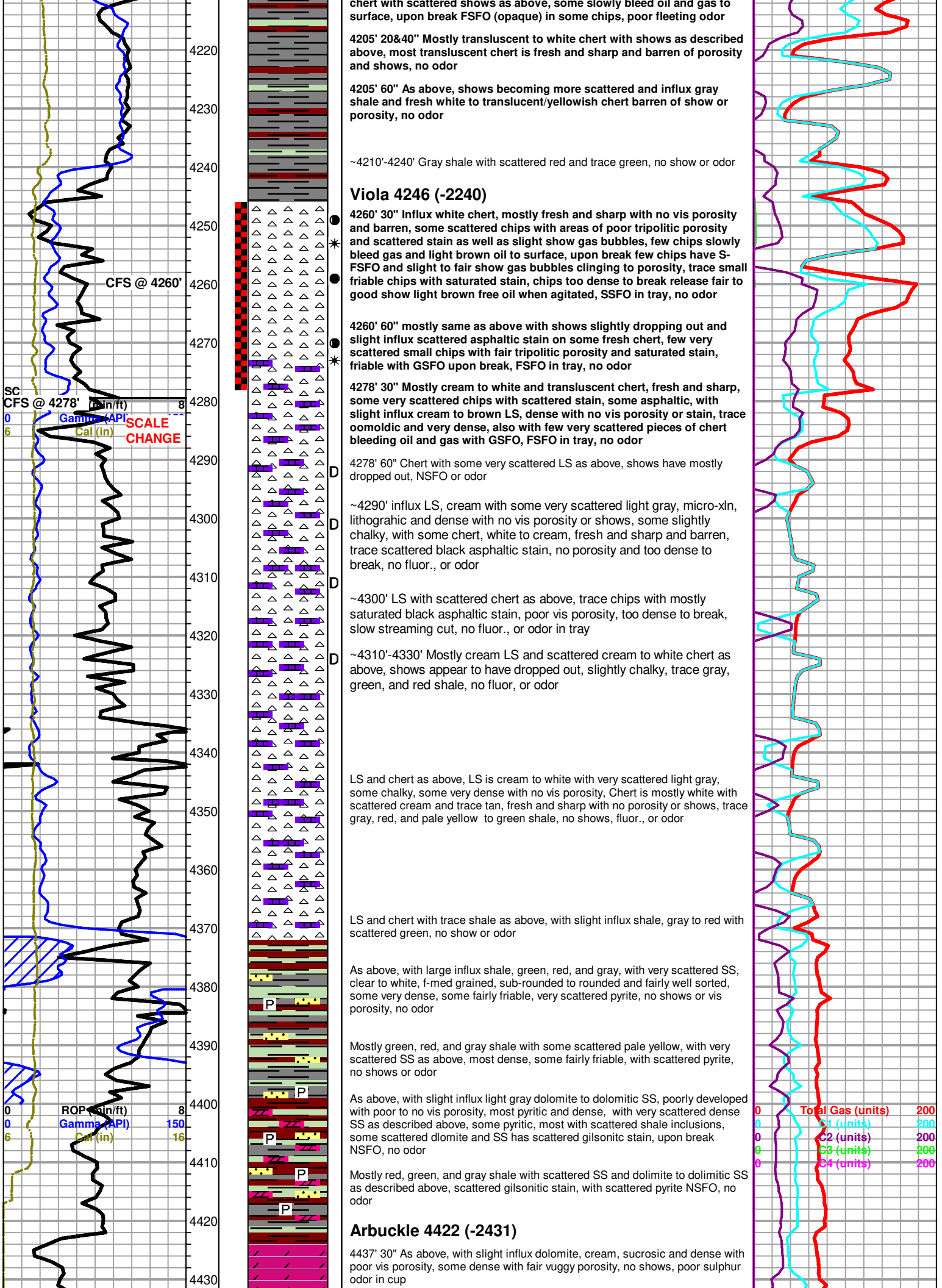
4175' 30" conglomerate as above, some scattered weathered white to off white and colored chert with scattered black asphaltic stain and poor visible porosity, NSFO or odor

4175' 60" conglomerate, with fair influx cream colored to light brown weathered chert, mostly poor tripolitic porosity with very scattered small vugs in some chips, mostly saturated to saturated light brown stain, some slowly bleeding gas, upon break good show gas and fair to good show free oil (very light brown to opaque), some chips show fair pinpoint to slightly vuggy inter-xln porosity, poor odor

4175' 90" Mostly same as above, with influx cream to translusent chert, some weathered, some fresh and sharp, still carrying abundant chert as described above, some too dense to break, when agitated some release fair show brown free oil, good show opaque free oil in tray, strong fleeting odor

~4180' mostly gray and red shale with scattered transluscent cherts, fresh and sharp, with slight influx bone white chert with areas of mostly poor tripoilitic porosity and scattered stain, slight show gas bubbles in tray, some small chips with scattered fair vuggy porosity and saturated stain, fair fleeting odor

4205' sample: as above with continued influx of white to light brown



chert with scattered shows as above, some slowly bleed oil and gas to surface, upon break FSFO (opaque) in some chips, poor fleeting odor

4205' 20&40" Mostly transluscent to white chert with shows as described above, most transluscent chert is fresh and sharp and barren of porosity and shows, no odor

4205' 60" As above, shows becoming more scattered and influx gray shale and fresh white to translucent/yellowish chert barren of show or porosity, no odor

~4210'-4240' Gray shale with scattered red and trace green, no show or odor

Viola 4246 (-2240)

4260' 30" Influx white chert, mostly fresh and sharp with no vis porosity and barren, some scattered chips with areas of poor tripolitic porosity and scattered stain as well as slight show gas bubbles, few chips slowly bleed gas and light brown oil to surface, upon break few chips have S-FSFO and slight to fair show gas bubbles clinging to porosity, trace small friable chips with saturated stain, chips too dense to break release fair to good show light brown free oil when agitated, SSFO in tray, no odor

4260' 60" mostly same as above with shows slightly dropping out and slight influx scattered asphaltic stain on some fresh chert, few very scattered small chips with fair tripolitic porosity and saturated stain, friable with GSFO upon break, FSFO in tray, no odor

4278' 30" Mostly cream to white and transluscent chert, fresh and sharp, some very scattered chips with scattered stain, some asphaltic, with slight influx cream to brown LS, dense with no vis porosity or stain, trace oomoldic and very dense, also with few very scattered pieces of chert bleeding oil and gas with GSFO, FSFO in tray, no odor

4278' 60" Chert with some very scattered LS as above, shows have mostly dropped out, NSFO or odor

~4290' influx LS, cream with some very scattered light gray, micro-xln, lithograhic and dense with no vis porosity or shows, some slightly chalky, with some chert, white to cream, fresh and sharp and barren, trace scattered black asphaltic stain, no porosity and too dense to break, no fluor., or odor

~4300' LS with scattered chert as above, trace chips with mostly saturated black asphaltic stain, poor vis porosity, too dense to break, slow streaming cut, no fluor., or odor in tray

~4310'-4330' Mostly cream LS and scattered cream to white chert as above, shows appear to have dropped out, slightly chalky, trace gray, green, and red shale, no fluor, or odor

LS and chert as above, LS is cream to white with very scattered light gray, some chalky, some very dense with no vis porosity, Chert is mostly white with scattered cream and trace tan, fresh and sharp with no porosity or shows, trace gray, red, and pale yellow to green shale, no shows, fluor., or odor

LS and chert with trace shale as above, with slight influx shale, gray to red with scattered green, no show or odor

As above, with large influx shale, green, red, and gray, with very scattered SS, clear to white, f-med grained, sub-rounded to rounded and fairly well sorted, some very dense, some fairly friable, very scattered pyrite, no shows or vis porosity, no odor

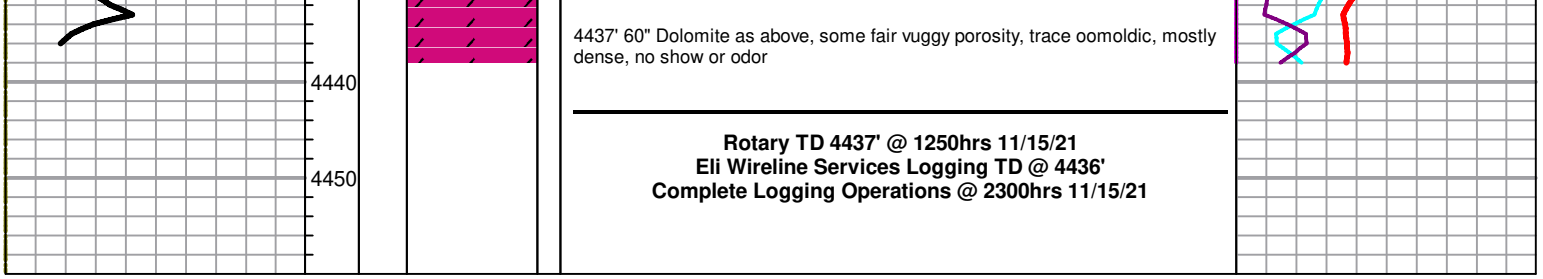
Mostly green, red, and gray shale with some scattered pale yellow, with very scattered SS as above, most dense, some fairly friable, with scattered pyrite, no shows or odor

As above, with slight influx light gray dolomite to dolomitic SS, poorly developed with poor to no vis porosity, most pyritic and dense, with very scattered dense SS as described above, some pyritic, most with scattered shale inclusions, some scattered dlomite and SS has scattered gilsonitc stain, upon break NSFO, no odor

Mostly red, green, and gray shale with scattered SS and dolimite to dolimitic SS as described above, scattered gilsonitic stain, with scattered pyrite NSFO, no odor

Arbuckle 4422 (-2431)

4437' 30" As above, with slight influx dolomite, cream, sucrosic and dense with poor vis porosity, some dense with fair vuggy porosity, no shows, poor sulphur odor in cup



4437' 60" Dolomite as above, some fair vuggy porosity, trace oomoldic, mostly dense, no show or odor

Rotary TD 4437' @ 1250hrs 11/15/21
Eli Wireline Services Logging TD @ 4436'
Complete Logging Operations @ 2300hrs 11/15/21

Shelby Sewing 1-31 dst 1.jpg

TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67645 **DST#: 1**

Test Start: 2021.11.10 @ 00:13:00

GENERAL INFORMATION:

Formation: **Lansing B**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 03:06:32
Time Test Ended: 08:57:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3763.00 ft (KB) To 3807.00 ft (KB) (TVD)
Total Depth: 3807.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

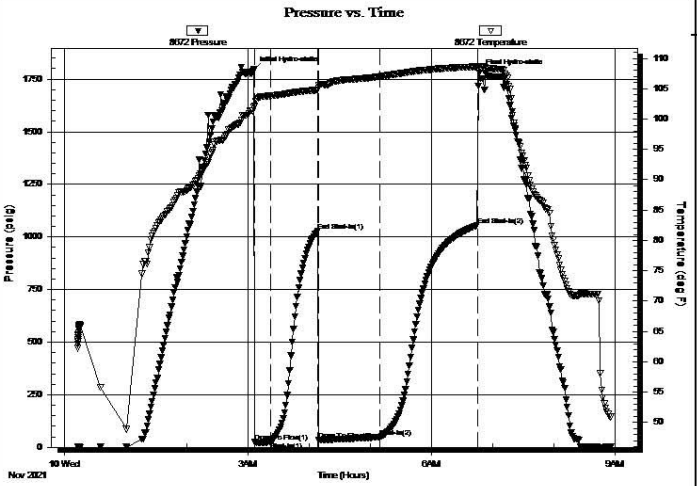
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 48.36 psig @ 3765.00 ft (KB)
Start Date: 2021.11.10 End Date: 2021.11.10
Start Time: 00:13:01 End Time: 08:57:02

Capacity: psig
Last Calib.: 2021.11.10
Time On Btm: 2021.11.10 @ 03:06:02
Time Off Btm: 2021.11.10 @ 06:47:17

TEST COMMENT: IF: 15 min., Strong building blow , 10.5 inches
ISI: 45 min., No blow back
FF: 60 min., Strong building blow , 10 inches
FSI: 90 min., No blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1794.95	102.05	Initial Hydro-static
1	24.41	102.18	Open To Flow (1)
17	25.74	103.84	Shut-In(1)
63	1028.62	104.80	End Shut-In(1)
64	35.46	105.09	Open To Flow (2)
124	48.36	107.02	Shut-In(2)
219	1054.79	108.67	End Shut-In(2)
222	1778.63	108.68	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
62.00	gassy oily mud 95%M,3%O,2%G	0.87
0.00	500' GIP	0.00

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

Shelby Sewing 1-31 dst 2.jpg

TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67646 **DST#: 2**

Test Start: 2021.11.10 @ 17:24:00

GENERAL INFORMATION:

Formation: **Lansing F**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 19:29:02
Time Test Ended: 01:10:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3811.00 ft (KB) To 3830.00 ft (KB) (TVD)
Total Depth: 3830.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

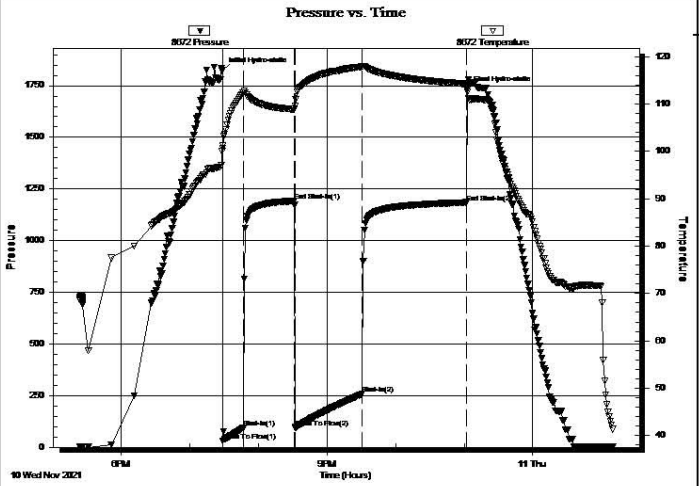
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 257.71 psig @ 3813.00 ft (KB)
Start Date: 2021.11.10 End Date: 2021.11.11
Start Time: 17:24:01 End Time: 01:10:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.10 @ 19:28:32
Time Off Btm: 2021.11.10 @ 23:03:02

TEST COMMENT: IF: 15 min., BOB 12 min., strong building blow , 15.5 inches
ISI: 45 min., no blow back
FF: 60 min., BOB 20 min., strong building blow , 35 inches
FSI: 90 min., no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1822.46	100.14	Initial Hydro-static
1	30.79	100.64	Open To Flow (1)
19	93.89	112.40	Shut-In(1)
63	1191.91	108.88	End Shut-In(1)
64	95.71	109.51	Open To Flow (2)
123	257.71	117.88	Shut-In(2)
214	1184.78	114.22	End Shut-In(2)
215	1731.30	112.47	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
465.00	gassy water 5%G,95%W	6.52

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

Shelby Sewing 1-31 DST 3.jpg

TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67647 **DST#: 3**

Test Start: 2021.11.11 @ 15:17:00

GENERAL INFORMATION:

Formation: **Lansing(J)**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 17:30:17
Time Test Ended: 21:55:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 3951.00 ft (KB) To 3972.00 ft (KB) (TVD)
Total Depth: 3972.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

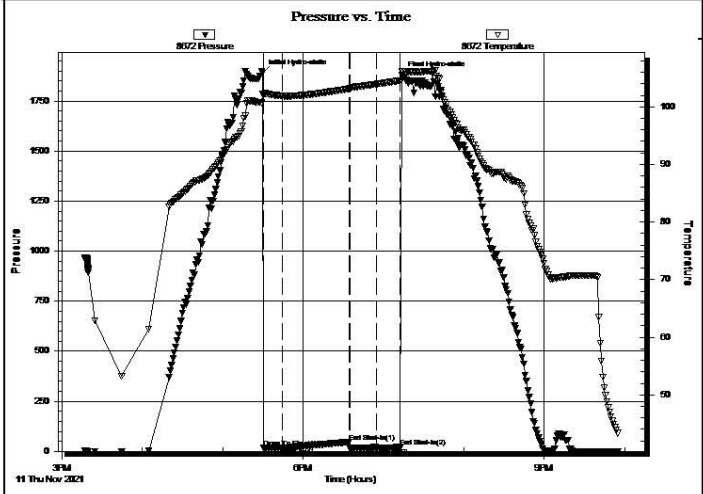
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 17.20 psig @ 3953.00 ft (KB)
Start Date: 2021.11.11 End Date: 2021.11.11
Start Time: 15:17:01 End Time: 21:55:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.11 @ 17:29:47
Time Off Btm: 2021.11.11 @ 19:13:47

TEST COMMENT: IF:15 min,weak surface blow
ISI:45 min, no blow back
FF: 25 min,weak surface blow , died in 5 min
FSI: 5 min, no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1888.62	102.21	Initial Hydro-static
1	17.49	102.03	Open To Flow (1)
15	18.05	101.88	Shut-In(1)
65	46.62	103.14	End Shut-In(1)
65	15.29	103.16	Open To Flow (2)
86	17.20	103.94	Shut-In(2)
103	20.32	104.58	End Shut-In(2)
104	1879.00	106.09	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
5.00	oil spotted mud 100%M	0.07

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

Shelby Sewing 1-31 dst 4.jpg

TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67648 **DST#: 4**

Test Start: 2021.11.12 @ 21:55:00

GENERAL INFORMATION:

Formation: **Miss**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 00:38:47
Time Test Ended: 06:25:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4131.00 ft (KB) To 4175.00 ft (KB) (TVD)
Total Depth: 4175.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

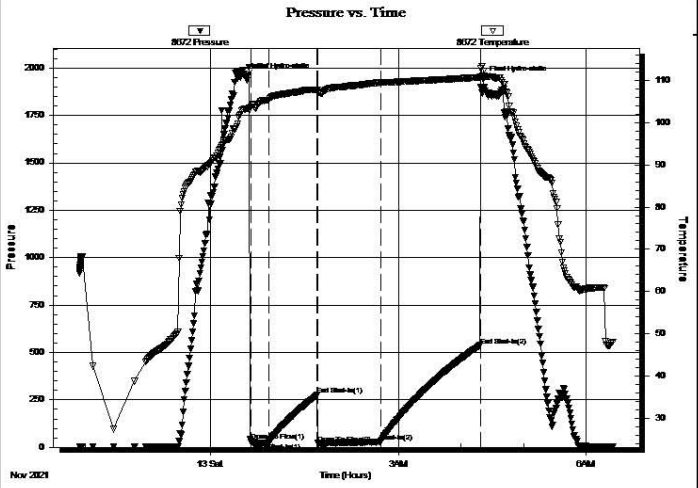
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 29.07 psig @ 4133.00 ft (KB)
Start Date: 2021.11.12 End Date: 2021.11.13
Start Time: 21:55:01 End Time: 06:25:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.13 @ 00:33:17
Time Off Btm: 2021.11.13 @ 04:21:02

TEST COMMENT: IF:15 min,BOB 1 min, strong building blow , 39 inches
ISI: 45 min, no blow back
FF: 60 min, BOB ASAO strong dieing blow
FSI: No blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1952.94	103.25	Initial Hydro-static
6	31.64	103.53	Open To Flow (1)
23	22.29	105.32	Shut-In(1)
69	275.24	107.79	End Shut-In(1)
70	20.41	107.83	Open To Flow (2)
130	29.07	109.50	Shut-In(2)
225	537.20	110.75	End Shut-In(2)
228	1940.92	112.11	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
30.00	oil spotted mudd	0.42
0.00	527' GIP	0.00

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

Shelby Sewing 1-31 dst 5.jpg

TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67649 **DST#: 5**

Test Start: 2021.11.13 @ 15:09:00

GENERAL INFORMATION:

Formation: **MISS**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 17:00:47
Time Test Ended: 23:11:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4163.00 ft (KB) To 4205.00 ft (KB) (TVD)
Total Depth: 4205.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

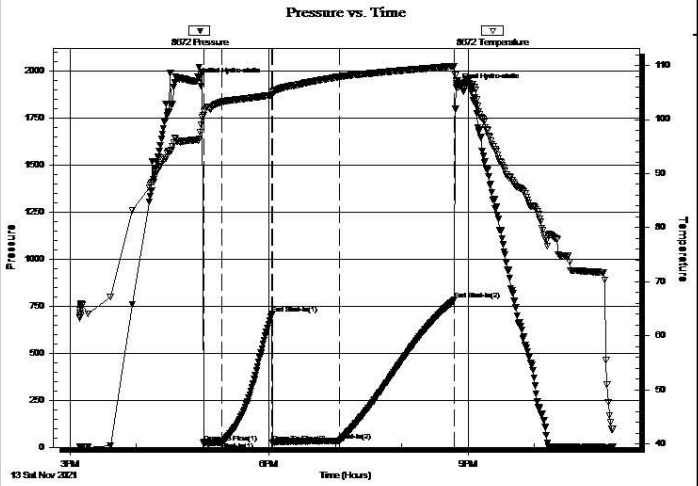
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 8672 **Inside**

Press@RunDepth: 34.55 psig @ 4164.00 ft (KB)
Start Date: 2021.11.13 End Date: 2021.11.13
Start Time: 15:09:01 End Time: 23:11:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.13 @ 16:54:17
Time Off Btm: 2021.11.13 @ 20:49:32

TEST COMMENT: IF 15 blow built to 5.8"
ISI 45 no blow
FF 60 blow built to 14.7"
FSI 90 no blow



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1943.74	96.23	Initial Hydro-static
7	22.04	100.74	Open To Flow (1)
24	27.10	103.25	Shut-In(1)
69	709.77	104.54	End Shut-In(1)
70	24.59	105.11	Open To Flow (2)
130	34.55	107.90	Shut-In(2)
234	782.78	109.85	End Shut-In(2)
236	1915.14	107.23	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
45.00	oil spotted mud	0.63
0.00	252' GIP	0.00

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

Shelby Sewing 1-31 dst 6.jpg

DRILL STEM TEST REPORT

Shelby Resources LLC

3700 Quebec St.
Suite 100 PMB 376
Denver, CO 80207
ATTN: Jeremy Schwartz

31/24S/14W

Sewing 1-31

Job Ticket: 67650 **DST#: 6**

Test Start: 2021.11.14 @ 11:36:00

GENERAL INFORMATION:

Formation: **Viola**
Deviated: No Whipstock: 2008.00 ft (KB)
Time Tool Opened: 13:23:02
Time Test Ended: 19:24:02

Test Type: Conventional Bottom Hole (Initial)
Tester: Chris Hagman
Unit No: 69

Interval: 4246.00 ft (KB) To 4278.00 ft (KB) (TVD)
Total Depth: 4278.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

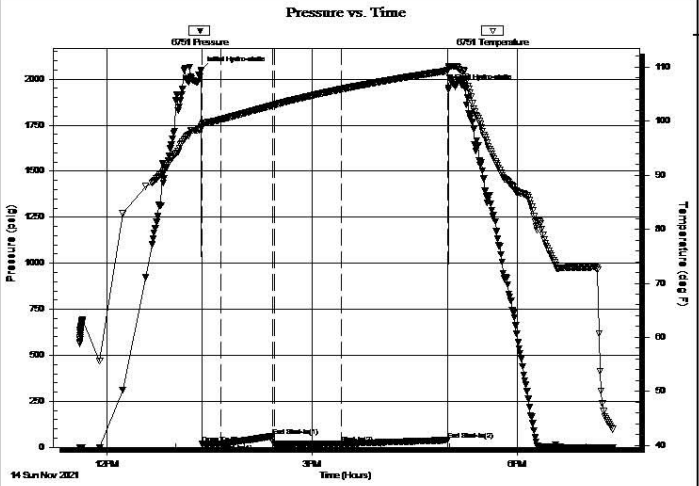
Reference Elevations: 2008.00 ft (KB)
1998.00 ft (CF)
KB to GR/CF: 10.00 ft

Serial #: 6751 **Outside**

Press@RunDepth: 20.21 psig @ 4248.00 ft (KB)
Start Date: 2021.11.14 End Date: 2021.11.14
Start Time: 11:36:01 End Time: 19:24:02

Capacity: psig
Last Calib.: 1899.12.30
Time On Btm: 2021.11.14 @ 13:22:32
Time Off Btm: 2021.11.14 @ 16:59:32

TEST COMMENT: IF:15 min.,weak surface blow , .4 inches
ISI:45 min., no blow back
FF:60 min., weak surface blow , .4 inches
FSI:90 min., no blow back



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	2047.78	99.04	Initial Hydro-static
1	18.12	98.95	Open To Flow (1)
18	19.44	100.31	Shut-In(1)
63	60.30	102.93	End Shut-In(1)
64	18.13	102.97	Open To Flow (2)
123	20.21	105.94	Shut-In(2)
216	39.16	109.37	End Shut-In(2)
217	1951.78	110.07	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
5.00	100%mud	0.07

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (MMcf/d)

CLIENT:	Shelby Resources, LLC
WELL NAME:	Sewing #1-31
LEGAL:	SW-NE-SW-NW Sec. 31-T24S-R14W
COUNTY:	Stafford
API :	15-185-24095-00-00
DRLG CONTRACTOR:	Discovery Drilling
RIG #:	2
DOGHOUSE #:	(785) 635-1412
TOOLPUSHER:	Terry Wickham
CELL #:	(785) 259-3263

	Sewing #1-31				OIL - P&A D.R LAUCK WATERS #1 NW-NW-SW Sec. 31-24S-14W						D&A Big J Prod. Sewing #1 S2-NW-NW Sec. 31-24S-14W						OIL WHITE HAWK OIL ELMORE #1 SE-SE-SE Sec. 25-24S-15W					
	KB	2006			KB	2006					KB	2002					KB	2005				
	LOG TOPS		SAMPLE TOPS		COMP. CARD		LOG CORR.		SMPL. CORR.		COMP. CARD		LOG CORR.		SMPL. CORR.		COMP. CARD		LOG CORR.		SMPL. CORR.	
FORMATION	DEPTH	DATUM	DEPTH	DATUM	DEPTH	DATUM					DEPTH	DATUM					DEPTH	DATUM				
ANHYDRITE	958	1048	950	1056	945	1061	-	13	-	5	952	1050	-	2	+	6	955	1050	-	2	+	6
HEEBNER SHALE	3584	-1578	3580	-1574	3600	-1594	+	16	+	20	3570	-1568	-	10	-	6	3596	-1591	+	13	+	17
DOUGLAS	3622	-1616	3620	-1614	3643	-1637	+	21	+	23	3610	-1608	-	8	-	6	3634	-1629	+	13	+	15
BROWN LIME	3730	-1724	3732	-1726	3747	-1741	+	17	+	15	3723	-1721	-	3	-	5	3743	-1738	+	14	+	12
LANSING	3748	-1742	3747	-1741	3766	-1760	+	18	+	19	3736	-1734	-	8	-	7	3762	-1757	+	15	+	16
MUNCIE CREEK	3878	-1872	3885	-1879	3899	-1893	+	21	+	14	3864	-1862	-	10	-	17	3886	-1881	+	9	+	2
STARK	3958	-1952	3963	-1957	3978	-1972	+	20	+	15	3940	-1938	-	14	-	19	3962	-1957	+	5	+	0
BKC	3994	-1988	3998	-1992	4010	-2004	+	16	+	12	3978	-1976	-	12	-	16	3998	-1993	+	5	+	1
MISSISSIPPIAN	4157	-2151	4159	-2153	4189	-2183	+	32	+	30							4172	-2167	+	16	+	14
KINDERHOOK	4197	-2191	4196	-2190	4216	-2210	+	19	+	20							4198	-2193	+	2	+	3
VIOLA	4240	-2234	4246	-2240	4269	-2263	+	29	+	23	4182	-2180	-	54	-	60	4250	-2245	+	11	+	5
SIMPSON SHALE	4370	-2364	4372	-2366	4358	-2352	-	12	-	14							4344	-2339	-	25	-	27
ARBUCKLE	4422	-2416	4422	-2416	4408	-2402	-	14	-	14	4446	-2444	+	28	+	28	4396	-2391	-	25	-	25
RTD			4437	-2431	4450	-2444			+	13	4477	-2475			+	44	4440	-2435			+	4
LTD	4436	-2430			4443	-2437	+	7			4477	-2475	+	45								
					TESTED						*TESTED*						*TESTED*					
					DST #1 4175-84 (Miss) Open 1hr - strong blow / GTS 4min **130' HOGCM** SIP: 1430 - 1230# **DST #2 4193-4219 (Miss)** Open 1hr - good blow **960' GIP, 130' VSOGCM** SIP: 1430 - 310# **DST #3 4402-10 (Arbuckle)** Open 1hr - weak to fair blow **540' GIP, 445' froggy oil, 60' OCW** SIP: 1480 - 1405# **DST #4 4423-44 (Arbuckle)** Open 1hr - strong blow **3120' WTR** SIP: 1447#						**DST #1 2127-2200 (Towanda)** 15-30-15-30 **65' GCM** SIP: 527 - 467# **DST #2 3866-3900 (LKC H-I)** 30-30-30-30 **210' MW** SIP: 1348 - 1263# **DST #3 3938-60 MISRUN** **DST #4 3938-60 (LKC K)** **15-45-45-45** **5' Mud** SIP: 710 - 476 **DST #5 INTV NA MISRUN** **DST #6 4118-70 (Miss)** 15-45-45-45 **120' Mud** SIP: 1985 - 1921 **DST #7 INTV NA MISRUN** **DST #8 4186-4240 (Viola)** 15-30-30-30 **10' Mud** SIP: 86 - 64#						**DST #1 4154-97 (Miss)** Open 35min / GTS 7min Flow Mud in 30min, oil in 35min **4197' GO / NW** SIP: 1360# **DST #2 4250-4310 (Viola)** Open 1hr - strong blow **60' MW w/tr Oil, 850' MW** SIP: 902# / 20min **DST #3 4396-4310 (Arbuckle)** Open 1hr - weak blow **10' Mud** SIP: 60# / 20min					
					Completion Info **Perf 4409-12 (Arbuckle) - WTR - Non Prod** **Perf 4196-4202 (Miss) Ac-Frac** **SWB 120 BO NW / 12hrs** **IP 115 BOPD** **No CUM Data** **Plugged <2yrs**						***Completion Info*** **D&A**						***Completion Info*** **Perf 4172-78 (Miss)** **Tst 25 GOPH / 3hrs / NW** **500 gal mud acid / Flow 93 BO in 9hrs** **IP 265 BOPD FLO POT** **CUM PROD: ~180,000 bbls** **(1964 - 6/21) Still Producing**					