

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 # _____

Name: _____

Address 1: _____

Address 2: _____

City: _____ State: _____ Zip: _____ + _____

Contact Person: _____

Phone: (_____) _____

CONTRACTOR: License # _____

Name: _____

Wellsite Geologist: _____

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 #: _____

Spud Date or Date Reached TD Completion Date or Recompletion Date

API No.: _____

Spot Description: _____

_____ - _____ - _____ Sec. _____ Twp. _____ S. R. _____ East West

_____ Feet from North / South Line of Section

_____ Feet from East / West Line of Section

Footages Calculated from Nearest Outside Section Corner:

NE NW SE SW

GPS Location: Lat: _____, Long: _____
(e.g. xx.xxxxx) (e.g. -xxx.xxxxx)

Datum: NAD27 NAD83 WGS84

County: _____

Lease Name: _____ Well #: _____

Field Name: _____

Producing Formation: _____

Elevation: Ground: _____ Kelly Bushing: _____

Total Vertical Depth: _____ Plug Back Total Depth: _____

Amount of Surface Pipe Set and Cemented at: _____ 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: _____ ppm Fluid volume: _____ bbls

Dewatering method used: _____

Location of fluid disposal if hauled offsite:

Operator Name: _____

Lease Name: _____ License #: _____

Quarter _____ Sec. _____ Twp. _____ S. R. _____ East West

County: _____ Permit #: _____

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: _____

Confidential Release Date: _____

Wireline Log Received Drill Stem Tests Received

Geologist Report / Mud Logs Received

UIC Distribution

ALT I II III Approved by: _____ Date: _____

Operator Name: _____ Lease Name: _____ Well #: _____

Sec. _____ Twp. _____ S. R. _____ East West County: _____

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 <input type="checkbox"/> Yes <input type="checkbox"/> No <i>(Attach Additional Sheets)</i> Samples Sent to Geological Survey <input type="checkbox"/> Yes <input type="checkbox"/> No Cores Taken <input type="checkbox"/> Yes <input type="checkbox"/> No Electric Log Run <input type="checkbox"/> Yes <input type="checkbox"/> No Geologist Report / Mud Logs <input type="checkbox"/> Yes <input type="checkbox"/> No List All E. Logs Run:	<input type="checkbox"/> Log Formation (Top), Depth and Datum <input type="checkbox"/> Sample Name Top Datum
--	---

CASING RECORD <input type="checkbox"/> New <input type="checkbox"/> 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

ADDITIONAL CEMENTING / SQUEEZE RECORD				
Purpose:	Depth Top Bottom	Type of Cement	# Sacks Used	Type and Percent Additives
<input type="checkbox"/> Perforate <input type="checkbox"/> Protect Casing <input type="checkbox"/> Plug Back TD <input type="checkbox"/> 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: <input type="checkbox"/> Flowing <input type="checkbox"/> Pumping <input type="checkbox"/> Gas Lift <input type="checkbox"/> Other <i>(Explain)</i> _____			
Estimated Production Per 24 Hours	Oil Bbls.	Gas Mcf	Water Bbls.	Gas-Oil Ratio Gravity

DISPOSITION OF GAS: <input type="checkbox"/> Vented <input type="checkbox"/> Sold <input type="checkbox"/> Used on Lease <i>(If vented, Submit ACO-18.)</i>	METHOD OF COMPLETION: <input type="checkbox"/> Open Hole <input type="checkbox"/> Perf. <input type="checkbox"/> Dually Comp. <input type="checkbox"/> Commingled <i>(Submit ACO-5)</i> <i>(Submit ACO-4)</i>	PRODUCTION INTERVAL: Top Bottom
---	---	------------------------------------

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

TUBING RECORD:	Size:	Set At:	Packer At:	
----------------	-------	---------	------------	--

Form	ACO1 - Well Completion
Operator	Darrah Oil Company, LLC
Well Name	A.A. REDETZKE 10
Doc ID	1658539

All Electric Logs Run

dual induction
micro
sonic
density porosity

ROGER L. MARTIN

INDEPENDENT PETROLEUM GEOLOGIST 316-250-6970

GEOLOGIST'S REPORT

DRILLING TIME AND SAMPLE LOG

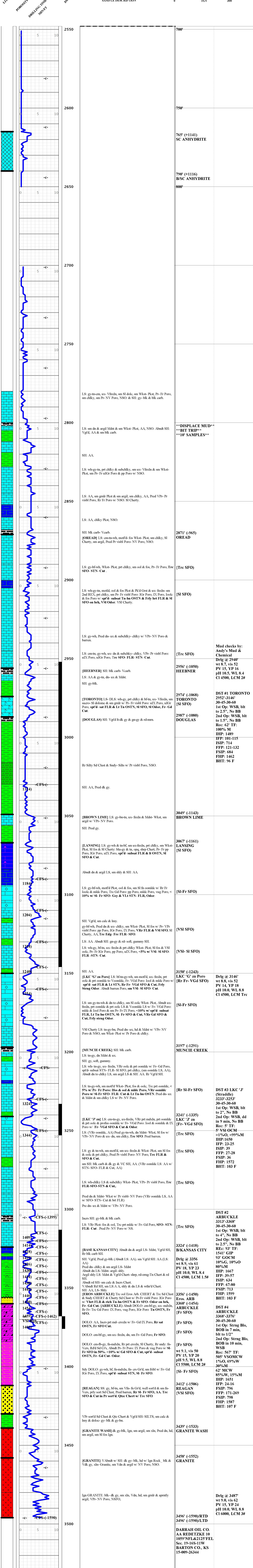
COMPANY DARRAH OIL COMPANY, LLC	ELEVATIONS
LEASE AA REDETZKE #10	KB 1906' GL 1901'
FIELD KRAFT- PRUSA	Measurements Are All From KB
LOCATION 1059' FNL & 2135' FEL	API # 15-009-26344
SECTION 19 TOWNSHIP 16S RANGE 11W	
COUNTY BARTON STATE KANSAS	
CONTRACTOR MURFIN DRILLING, Rig #104	CASING
SPUD 04/13/2022 COMP 04/20/2022	SURFACE 8.58" set @ 476'w/
RTD 3496' LTD 3496'	325 sls Common, 4% cc
ELECTRICAL SURVEYS ELI: DIL, CNL/CDL/PE, MEL/SO	PRODUCTION N/A- P&A

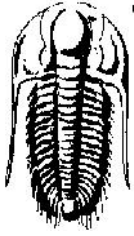
FORMATION TOPS	LOG	SAMPLES	CHRONOLOGY
STONE CORRAL/ANHYDRITE	761' (+1145)	765' (+1141)	
BASE SC/ANHYDRITE	786' (+1120)	790' (+1116)	04/13/2022- MURFU Murfin Drilling, Rig #104. DTD 476' & run 8.58" surface casing w/ 325 sx Common, 4% CC.
OREAD	2870' (-964)	2871' (-965)	
HEEBNER	2954' (-1048)	2956' (-1050)	04/14/2022- WOC @ 476' @ 8 AM.
TORONTO	2973' (-1067)	2974' (-1068)	04/15/2022- Drilling @ 2070' @ 8 AM. Displace mud system & bit trip @ 2800'.
BROWN LIME	3048' (-1142)	3049' (-1143)	
LANSING	3068' (-1162)	3067' (-1161)	04/16/2022- Drilling @ 2900' @ 8 AM. Run DST #1.
LKC 'G' zn Porosity	3150' (-1243)	3150' (-1243)	
MUNCIE CREEK	3197' (-1291)	3197' (-1291)	04/17/2022- Drilling @ 3146' @ 8 AM.
LKC 'J' zn	3360' (-1454)	3341' (-1435)	
BASE KANSAS CITY	3324' (-1418)	3324' (01418)	04/18/2022- Drilling @ 3344' @ 8 AM. Run DST #2. Run DST #3.
Eros. ARBUCKLE	3356' (-1450)	3356' (-1450)	
ARBUCKLE	3389' (-1453)	3360' (-1454)	04/19/2022- DTD 3368' @ 8 AM. Run DST #4.
REAGAN	3414' (-1508)	3412' (-1506)	04/20/2022- Drilling @ 3440' @ 8 AM. DTD 3496'. LDDP & run open hole E-logs. P&A.
BASE REAGAN SD	3429' (-1523)	3430' (-1524)	
GRANITE WASH	3439' (-1533)	3439' (-1533)	
GRANITE	3487' (-1551)	3488' (-1552)	
RTD/LTD	3496' (-1590)	3496' (-1590)	

REMARKS:

The decision was made to P&A the Darrah Oil Company AA Redetzke #10 test well as follows:
 50 sx @ 3340', 50 sx @ 780', 100 sx @ 530', 10 sx @ 40'.
 Plug down @ 3:30 AM 04/21/2022

Respectfully submitted,
 Roger L. Martin, Geologist





TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

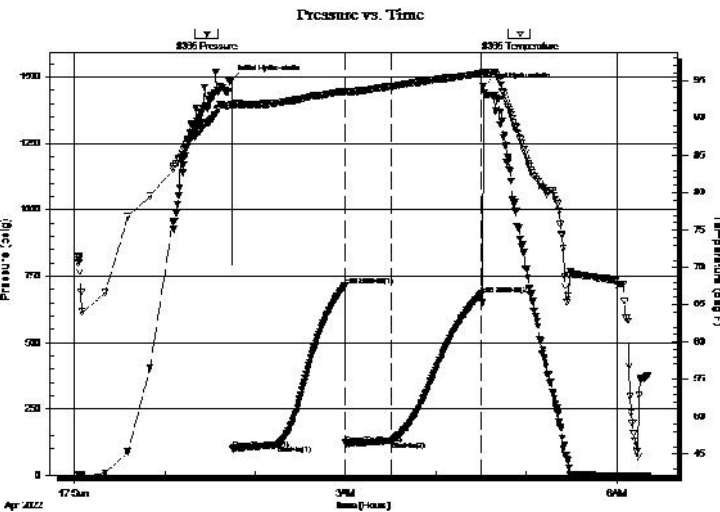
19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68247 **DST#: 1**
 Test Start: 2022.04.17 @ 00:03:00

GENERAL INFORMATION:

Formation: **Toronto, Lansing A-F**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 01:45:02
 Time Test Ended: 06:21:02
 Interval: **2952.00 ft (KB) To 3146.00 ft (KB) (TVD)**
 Total Depth: 3146.00 ft (KB) (TVD)
 Hole Diameter: 7.78 inches Hole Condition: Poor
 Test Type: Conventional Bottom Hole (Initial)
 Tester: Kevin Webster
 Unit No: 72
 Reference Elevations: 1906.00 ft (KB)
 1901.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8365 Outside
 Press@RunDepth: 131.51 psig @ 3143.00 ft (KB) Capacity: psig
 Start Date: 2022.04.17 End Date: 2022.04.17 Last Calib.: 2022.04.17
 Start Time: 00:03:01 End Time: 06:21:02 Time On Btm: 2022.04.17 @ 01:44:47
 Time Off Btm: 2022.04.17 @ 04:31:02

TEST COMMENT: 30 min IF- WSB built to 2.5"
 45 min IS- No returns
 30 min FF- WSB built to 1.5"
 60 min FSI- No returns



PRESSURE SUMMARY

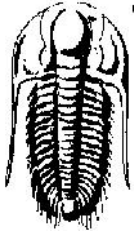
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1488.81	91.74	Initial Hydro-static
1	101.04	91.48	Open To Flow (1)
31	115.44	92.02	Shut-In(1)
75	714.04	93.50	End Shut-In(1)
76	121.09	93.36	Open To Flow (2)
106	131.51	94.23	Shut-In(2)
166	683.69	95.92	End Shut-In(2)
167	1461.92	96.03	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
62.00	100% Mud	0.30

Gas Rates

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



**TRILOBITE
TESTING, INC.**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68247 **DST#: 1**
Test Start: 2022.04.17 @ 00:03:00

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: 52.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.39 in ³	Gas Cushion Type:		
Resistivity: ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
62.00	100% Mud	0.305

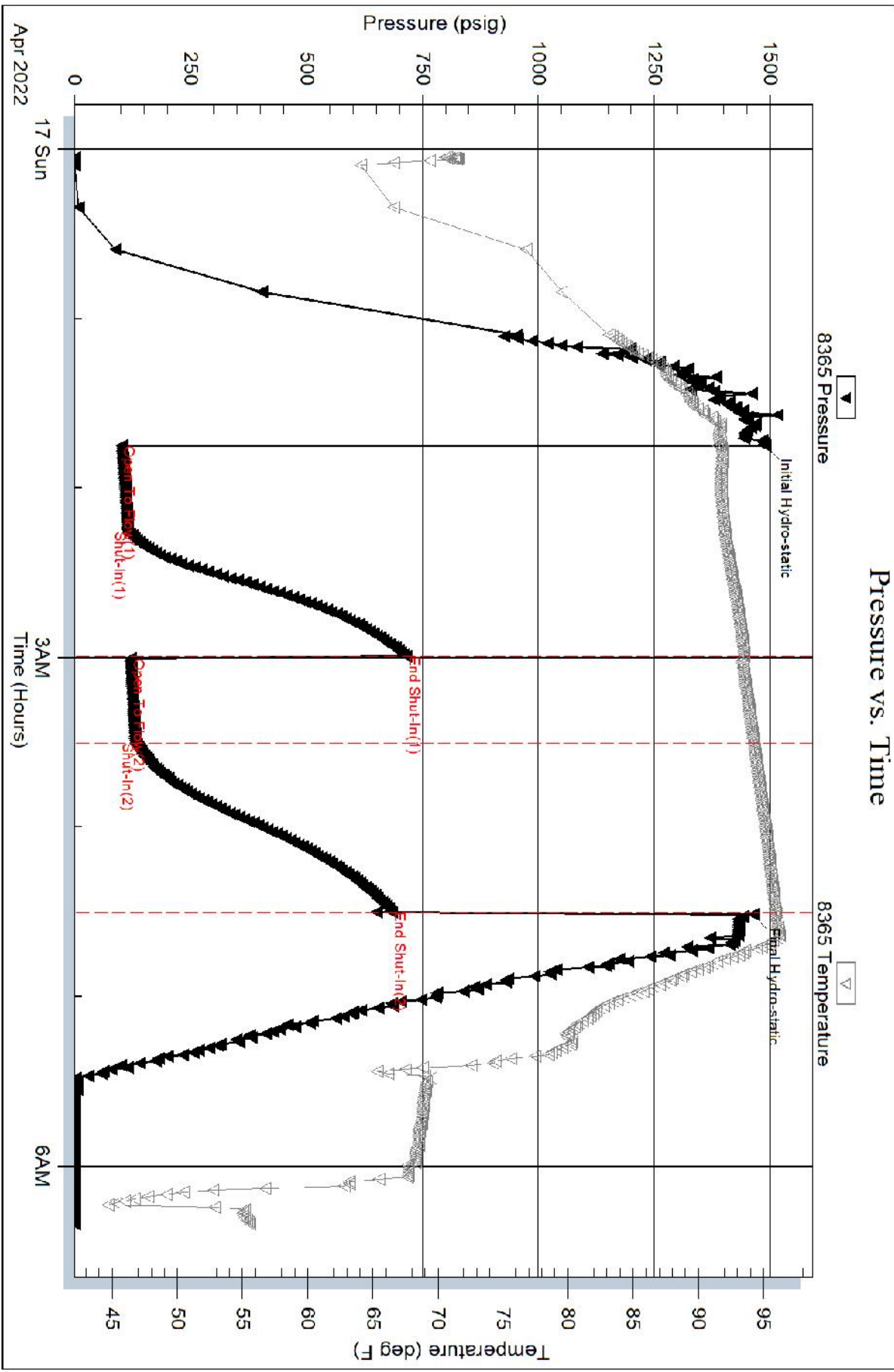
Total Length: 62.00 ft Total Volume: 0.305 bbl
 Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
 Laboratory Name: Laboratory Location:
 Recovery Comments: 2# LCM

Serial #: 8365

Outside Darrah Oil

AARedetzke #10

DST Test Number: 1



Trilobite Testing, Inc

Ref. No: 68247

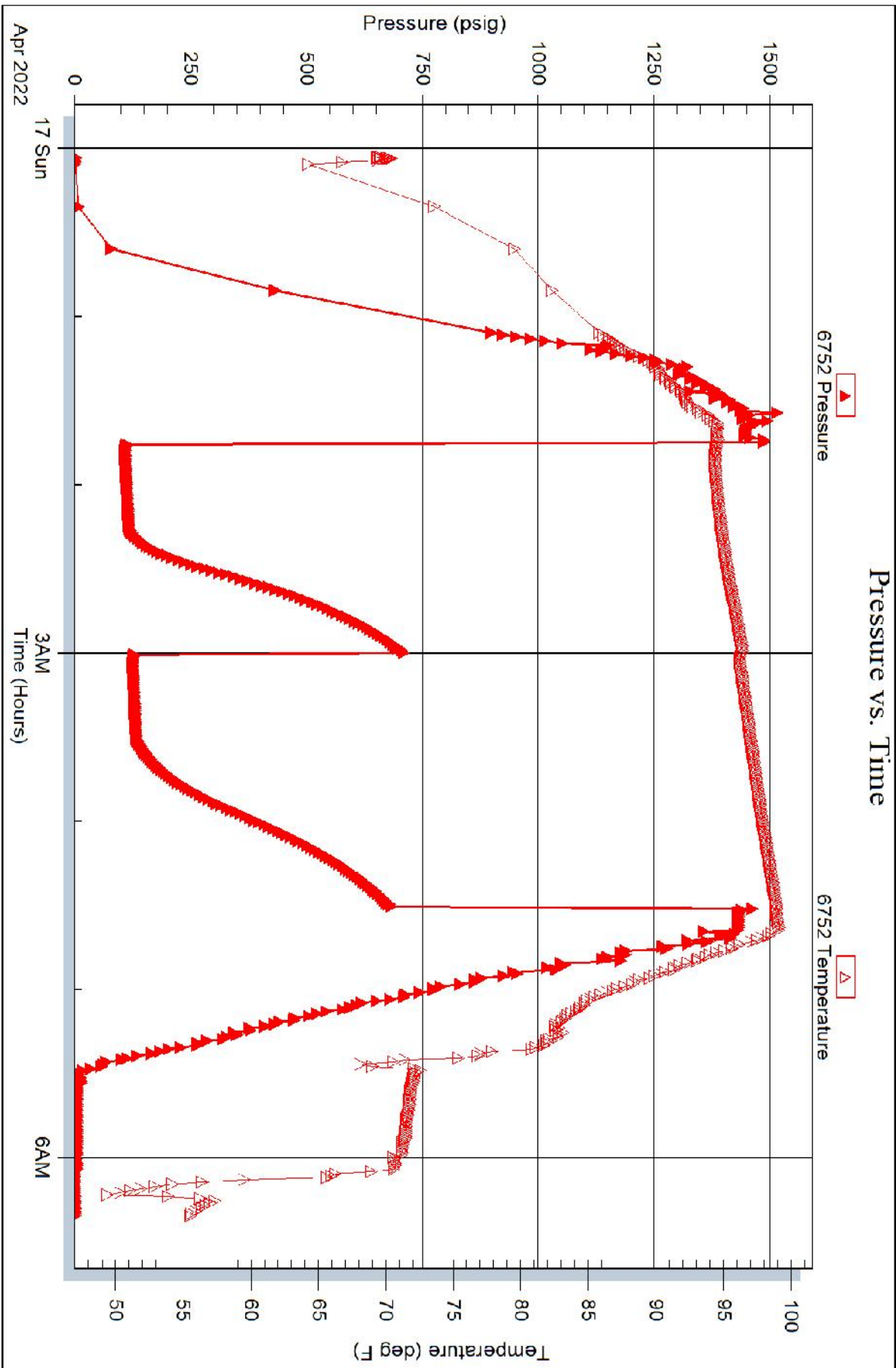
Printed: 2022.04.17 @ 07:49:07

Serial #: 6752

Outside Darrah Oil

AARedetzke #10

DST Test Number: 1





TRILOBITE TESTING, INC

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

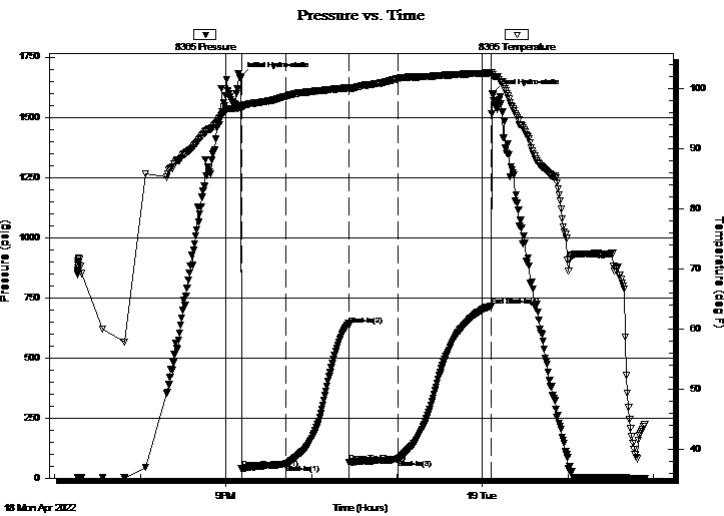
19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68248 **DST#: 2**
 Test Start: 2022.04.18 @ 19:16:00

GENERAL INFORMATION:

Formation: **Arbuckle**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 21:10:47
 Time Test Ended: 01:54:02
 Interval: **3313.00 ft (KB) To 3368.00 ft (KB) (TVD)**
 Total Depth: 3368.00 ft (KB) (TVD)
 Hole Diameter: 7.78 inches Hole Condition: Poor
 Test Type: Conventional Bottom Hole (Reset)
 Tester: Kevin Webster
 Unit No: 72
 Reference Elevations: 1906.00 ft (KB)
 1901.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8365 Outside
 Press@RunDepth: 57.45 psig @ 3365.00 ft (KB) Capacity: psig
 Start Date: 2022.04.18 End Date: 2022.04.19 Last Calib.: 2022.04.19
 Start Time: 19:16:01 End Time: 01:54:02 Time On Btm: 2022.04.18 @ 21:10:32
 Time Off Btm: 2022.04.19 @ 00:07:02

TEST COMMENT: 30 min IF- WSB built to 4"
 45 min IS- No returns
 30 min FF-WSB built to 2.5"
 60 min FSI- No returns



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1667.34	97.20	Initial Hydro-static
1	39.31	96.78	Open To Flow (1)
32	57.45	98.69	Shut-In(1)
76	634.38	100.10	Shut-In(2)
76	66.51	99.96	Open To Flow (2)
111	80.18	101.70	Shut-In(3)
176	713.89	102.61	End Shut-In(1)
177	1599.34	102.24	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
0.00	1541 GIP	0.00
93.00	GOM 10% G 10% O 80% M	0.46

* Recovery from multiple tests

Gas Rates

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



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68248 **DST#: 2**
Test Start: 2022.04.18 @ 19:16:00

Mud and Cushion Information

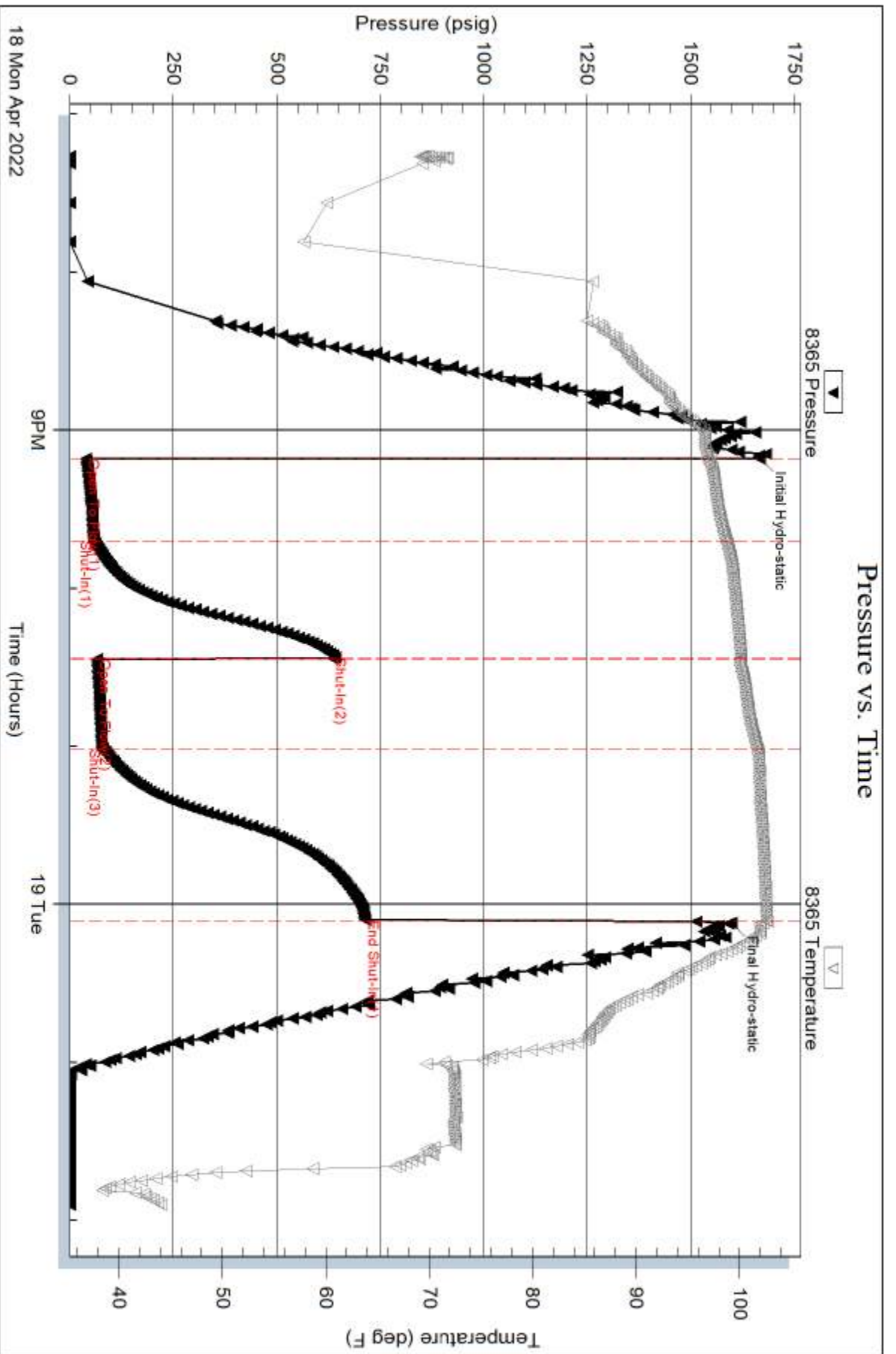
Mud Type: Gel Chem	Cushion Type:	Oil API:	deg API
Mud Weight: 9.00 lb/gal	Cushion Length: ft	Water Salinity:	ppm
Viscosity: 61.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.39 in ³	Gas Cushion Type:		
Resistivity: 1.50 ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

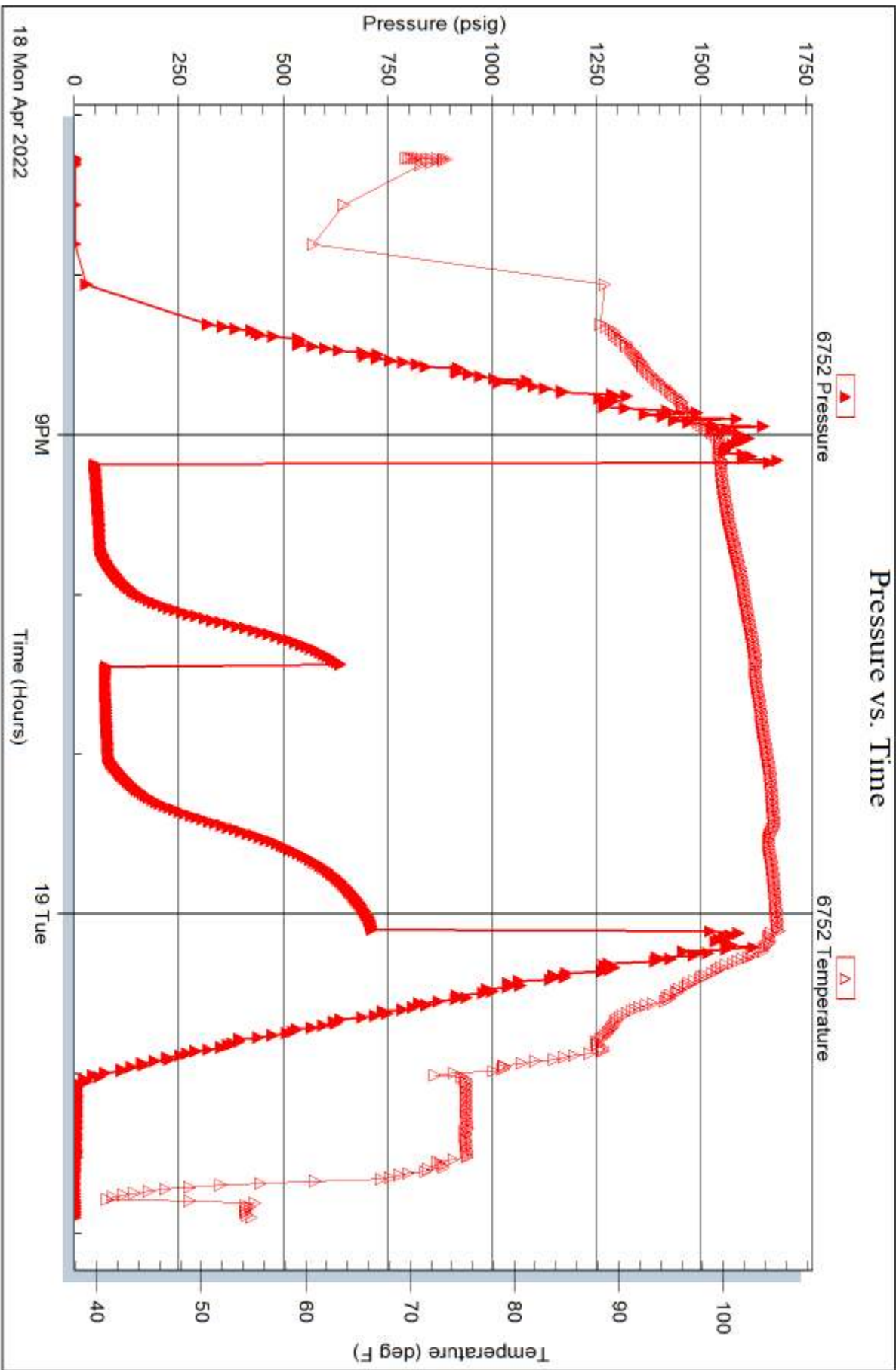
Recovery Information

Recovery Table

Length ft	Description	Volume bbl
0.00	1541 GIP	0.000
93.00	GOM 10% G 10% O 80% M	0.457

Total Length: 93.00 ft Total Volume: 0.457 bbl
 Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
 Laboratory Name: Laboratory Location:
 Recovery Comments: 1.5# LCM







TRILOBITE TESTING, INC

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

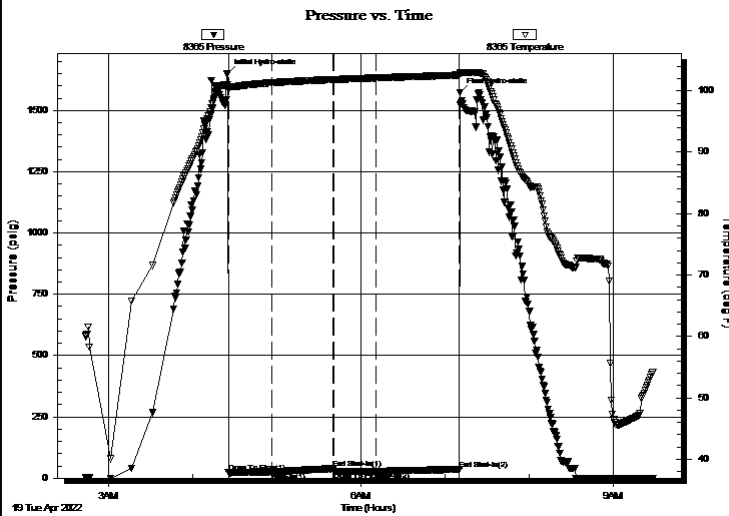
19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68249 **DST#: 3**
 Test Start: 2022.04.19 @ 02:44:00

GENERAL INFORMATION:

Formation: **KC "J"**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 04:25:32
 Time Test Ended: 09:28:02
 Interval: **3233.00 ft (KB) To 3253.00 ft (KB) (TVD)**
 Total Depth: 3368.00 ft (KB) (TVD)
 Hole Diameter: 7.78 inches Hole Condition: Poor
 Test Type: Conventional Straddle (Reset)
 Tester: Kevin Webster
 Unit No: 72
 Reference Elevations: 1906.00 ft (KB)
 1901.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8365 Outside
 Press@RunDepth: 27.74 psig @ 3253.00 ft (KB) Capacity: psig
 Start Date: 2022.04.19 End Date: 2022.04.19 Last Calib.: 2022.04.19
 Start Time: 02:44:01 End Time: 09:28:02 Time On Btm: 2022.04.19 @ 04:25:17
 Time Off Btm: 2022.04.19 @ 07:10:47

TEST COMMENT: 30 min IF- WSB built to 2"
 45 min IS- No returns
 30 min FF- WSB died in 9 min
 60 min FSI- No returns



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1649.93	100.97	Initial Hydro-static
1	23.15	100.25	Open To Flow (1)
32	25.65	101.31	Shut-In(1)
75	38.91	101.82	End Shut-In(1)
76	27.08	101.82	Open To Flow (2)
106	27.74	102.09	Shut-In(2)
165	36.32	102.59	End Shut-In(2)
166	1571.69	102.85	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
5.00	VSOCM >1%O <99% M	0.02

Gas Rates

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

* Recovery from multiple tests



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68249 **DST#: 3**
Test Start: 2022.04.19 @ 02:44:00

Mud and Cushion Information

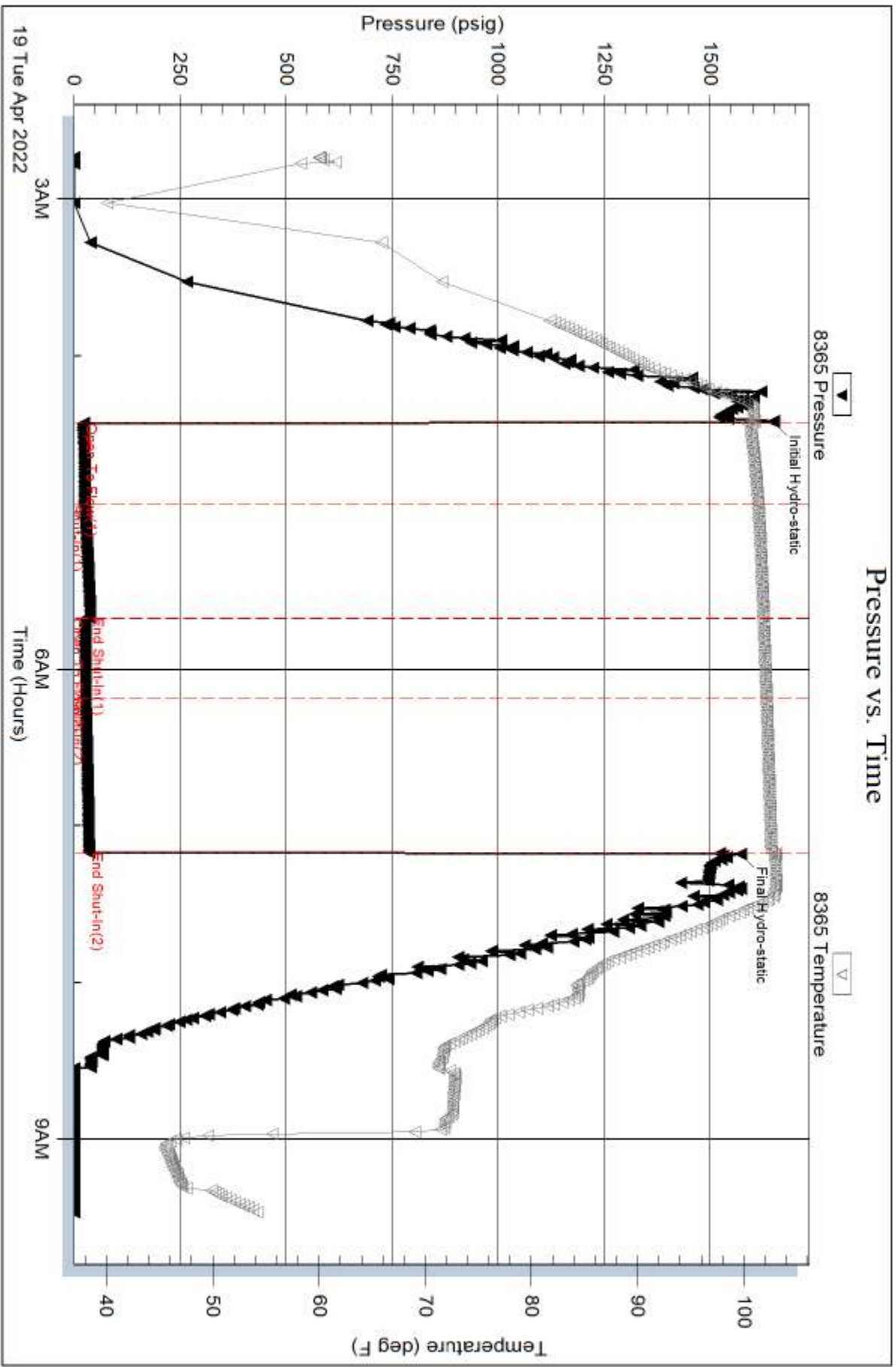
Mud Type: Gel Chem	Cushion Type:	Oil API:	deg API
Mud Weight: 9.00 lb/gal	Cushion Length: ft	Water Salinity:	ppm
Viscosity: 52.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.37 in ³	Gas Cushion Type:		
Resistivity: ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
5.00	VSOCM >1%O <99% M	0.025

Total Length: 5.00 ft Total Volume: 0.025 bbl
Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments:

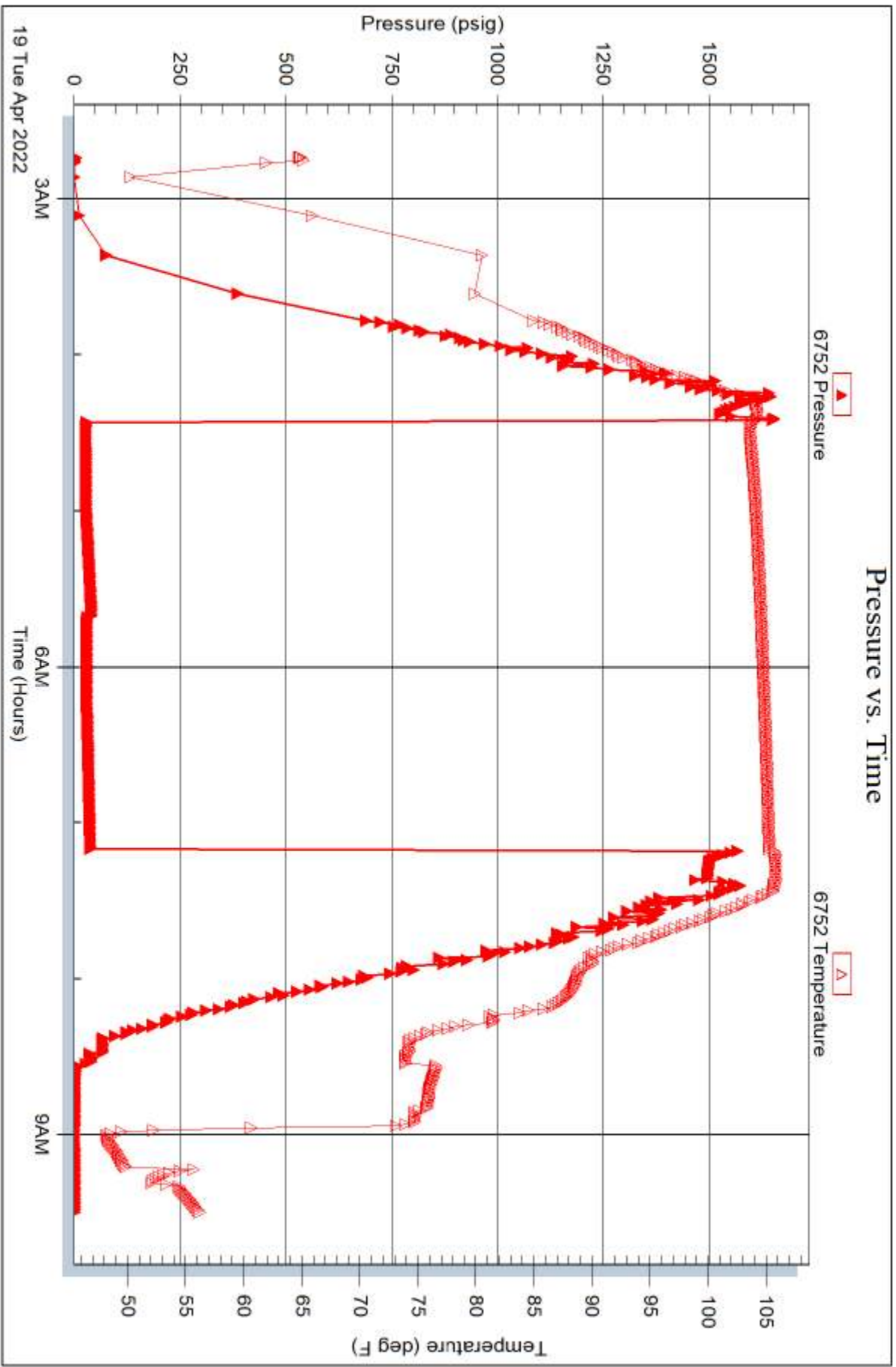


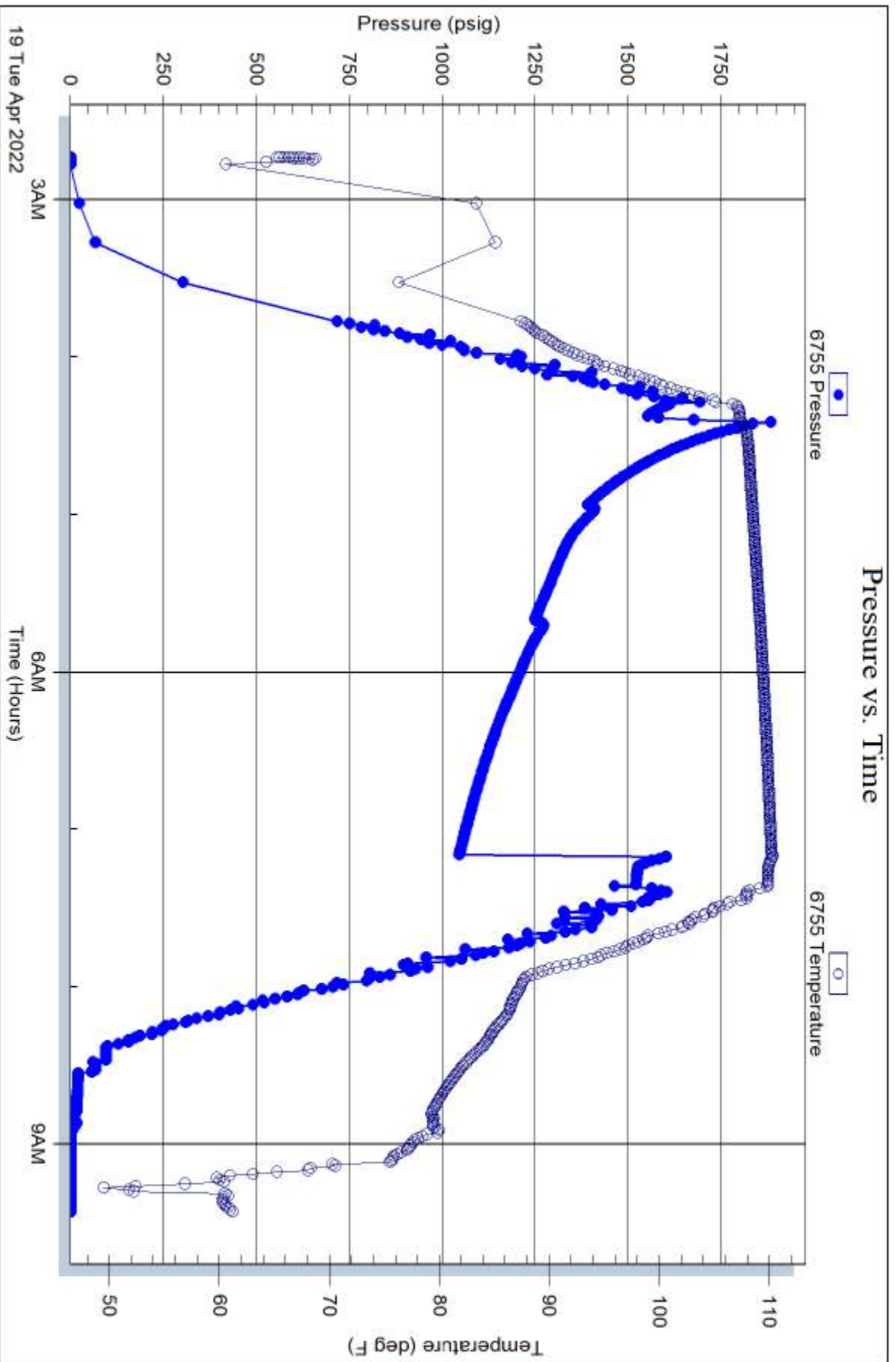
Serial #: 6752

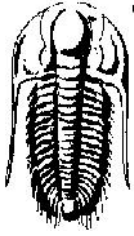
Outside Darrah Oil

AARedetzke #10

DST Test Number: 3







TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

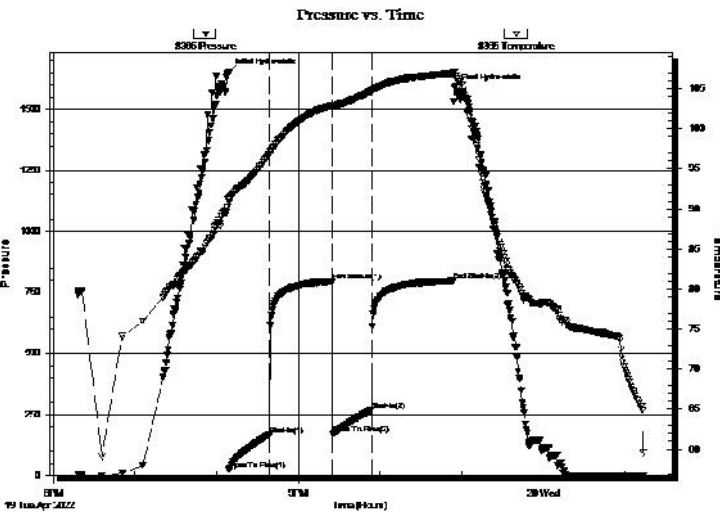
19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68250 **DST#: 4**
 Test Start: 2022.04.19 @ 18:18:00

GENERAL INFORMATION:

Formation: **Arbuckle**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 20:09:02
 Time Test Ended: 01:14:02
 Interval: **3368.00 ft (KB) To 3376.00 ft (KB) (TVD)**
 Total Depth: 3376.00 ft (KB) (TVD)
 Hole Diameter: 7.78 inches Hole Condition: Poor
 Test Type: Conventional Bottom Hole (Reset)
 Tester: Kevin Webster
 Unit No: 72
 Reference Elevations: 1906.00 ft (KB)
 1901.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8365 Outside
 Press@RunDepth: 269.46 psig @ 3373.00 ft (KB) Capacity: psig
 Start Date: 2022.04.19 End Date: 2022.04.20 Last Calib.: 1899.12.30
 Start Time: 18:18:01 End Time: 01:14:02 Time On Btm: 2022.04.19 @ 20:08:47
 Time Off Btm: 2022.04.19 @ 22:55:02

TEST COMMENT: 30 min IF- Strong blow , BOB 7 min
 45 min ISI- Returnns built to 1/2"
 30 min FF- Strong blow , BOB 10 min
 60 min FSI- WSB



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1651.46	91.32	Initial Hydro-static
1	24.11	90.93	Open To Flow (1)
30	168.39	96.82	Shut-In(1)
76	795.74	102.93	End Shut-In(1)
77	170.93	102.72	Open To Flow (2)
105	269.46	104.72	Shut-In(2)
166	798.46	106.89	End Shut-In(2)
167	1586.94	106.99	Final Hydro-static

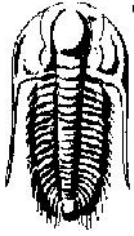
Recovery

Length (ft)	Description	Volume (bbl)
505.00	V SOMCW 1% O 69% W 30% M	5.99
62.00	MCW 85% W 15% M	0.87

* Recovery from multiple tests

Gas Rates

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



**TRILOBITE
TESTING, INC.**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68250 **DST#: 4**
Test Start: 2022.04.19 @ 18:18:00

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:	32000 ppm
Viscosity: 52.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.38 in ³	Gas Cushion Type:		
Resistivity: ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

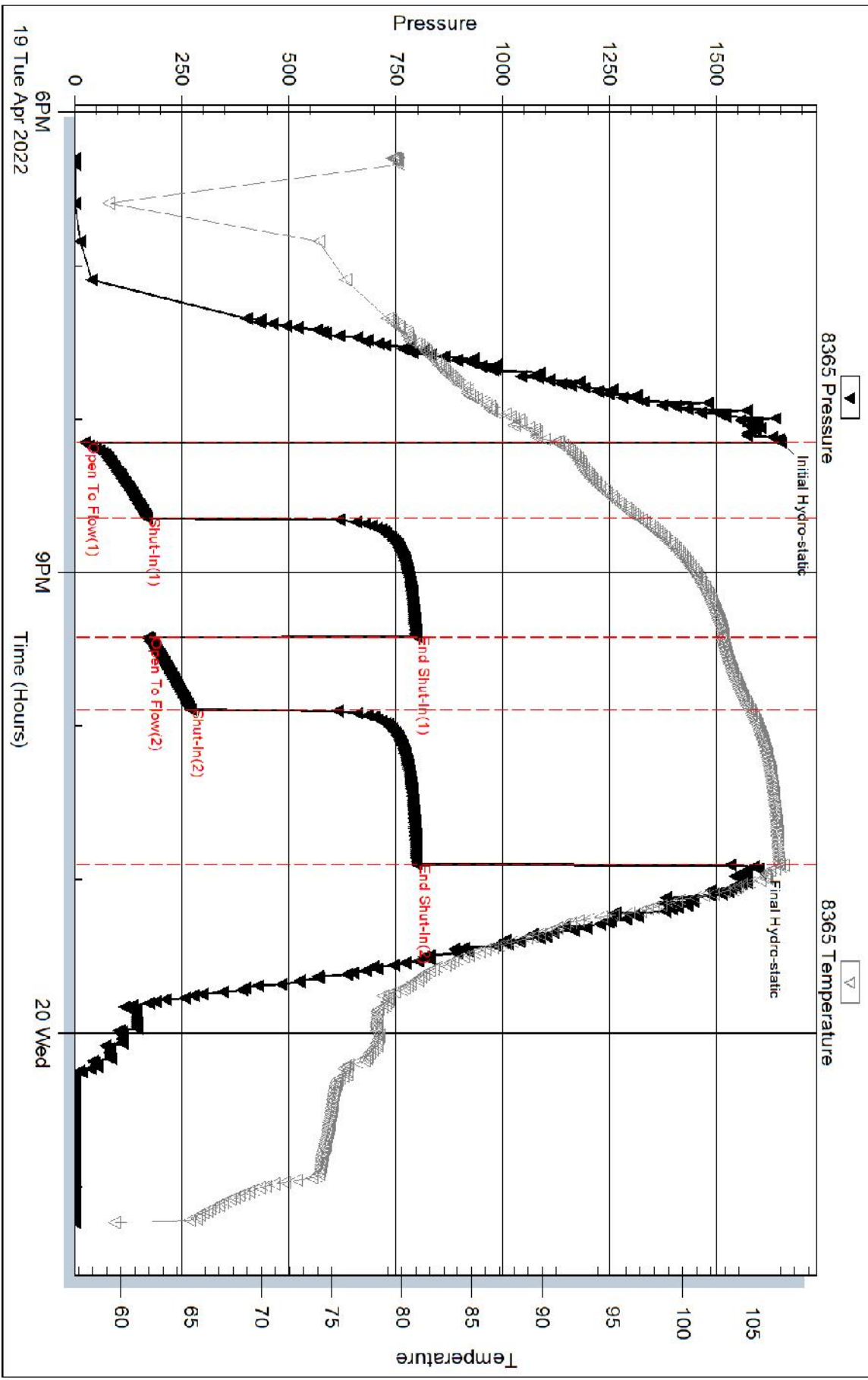
Recovery Information

Recovery Table

Length ft	Description	Volume bbl
505.00	VSOMCW 1% O 69% W 30% M	5.991
62.00	MCW 85% W 15% M	0.870

Total Length: 567.00 ft Total Volume: 6.861 bbl
 Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
 Laboratory Name: Laboratory Location:
 Recovery Comments:

Pressure vs. Time

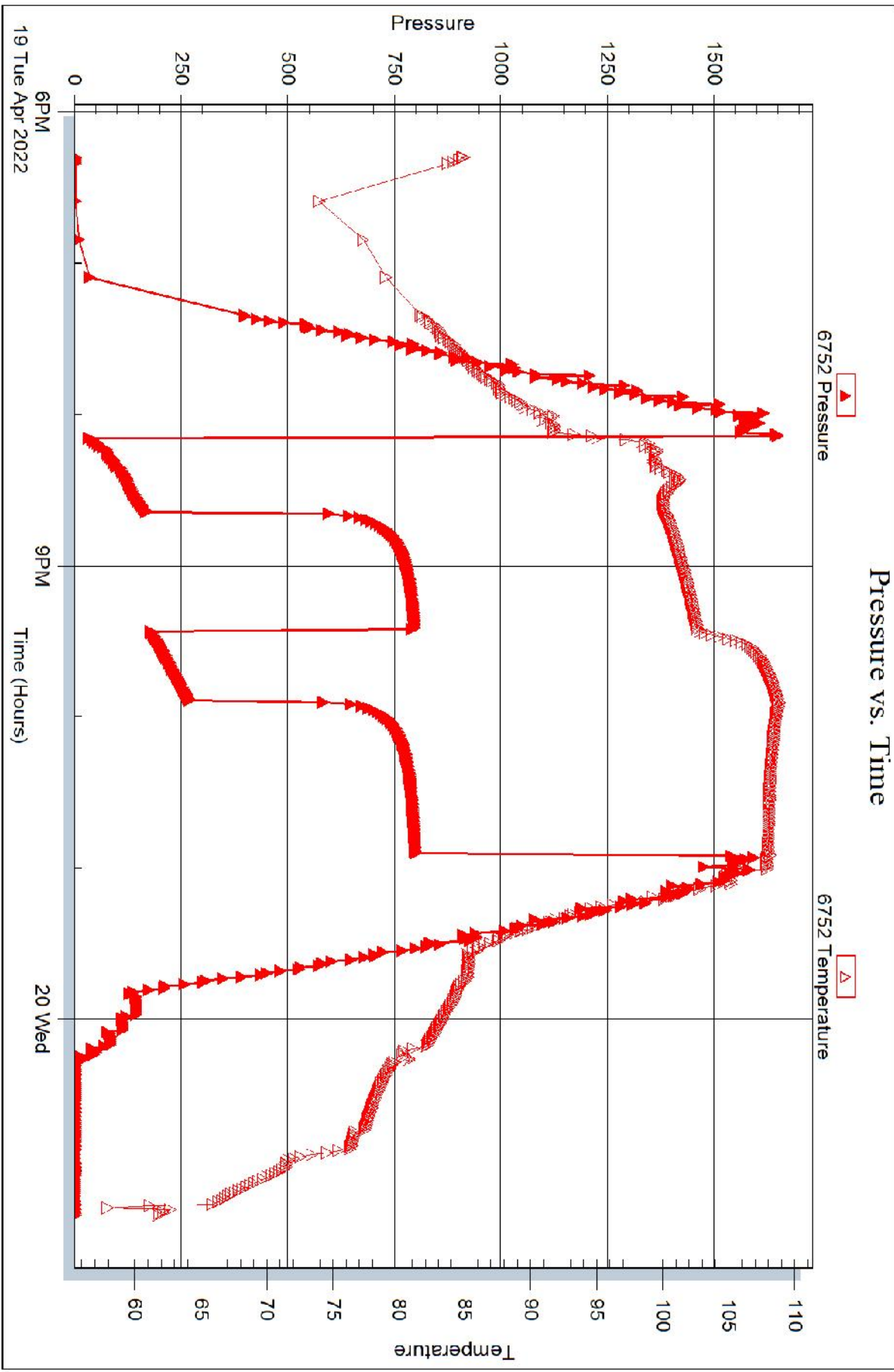


Serial #: 6752

Outside Darrah Oil

AARedetzke #10

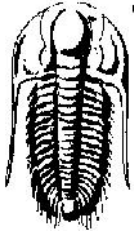
DST Test Number: 4



Trilobite Testing, Inc

Ref. No: 68250

Printed: 2022.04.20 @ 07:37:01



TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68247 **DST#: 1**
 Test Start: 2022.04.17 @ 00:03:00

GENERAL INFORMATION:

Formation: **Toronto, Lansing A-F**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 01:45:02
 Time Test Ended: 06:21:02
 Test Type: Conventional Bottom Hole (Initial)
 Tester: Kevin Webster
 Unit No: 72
 Interval: **2952.00 ft (KB) To 3146.00 ft (KB) (TVD)**
 Reference Elevations: 1906.00 ft (KB)
 Total Depth: 3146.00 ft (KB) (TVD) 1901.00 ft (CF)
 Hole Diameter: 7.78 inches Hole Condition: Poor KB to GR/CF: 5.00 ft

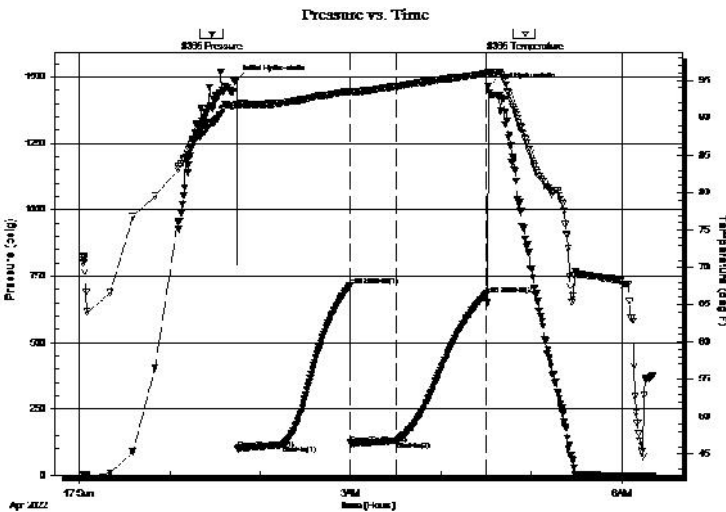
Serial #: 8365

Outside

Press@RunDepth: 131.51 psig @ 3143.00 ft (KB) Capacity: psig
 Start Date: 2022.04.17 End Date: 2022.04.17 Last Calib.: 2022.04.17
 Start Time: 00:03:01 End Time: 06:21:02 Time On Btm: 2022.04.17 @ 01:44:47
 Time Off Btm: 2022.04.17 @ 04:31:02

TEST COMMENT: 30 min IF- WSB built to 2.5"
 45 min IS- No returns
 30 min FF- WSB built to 1.5"
 60 min FSI- No returns

PRESSURE SUMMARY



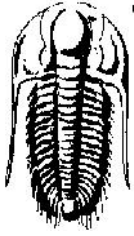
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1488.81	91.74	Initial Hydro-static
1	101.04	91.48	Open To Flow (1)
31	115.44	92.02	Shut-In(1)
75	714.04	93.50	End Shut-In(1)
76	121.09	93.36	Open To Flow (2)
106	131.51	94.23	Shut-In(2)
166	683.69	95.92	End Shut-In(2)
167	1461.92	96.03	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
62.00	100% Mud	0.30

Gas Rates

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



**TRILOBITE
TESTING, INC.**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68247 **DST#: 1**
Test Start: 2022.04.17 @ 00:03:00

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: 52.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.39 in ³	Gas Cushion Type:		
Resistivity: ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
62.00	100% Mud	0.305

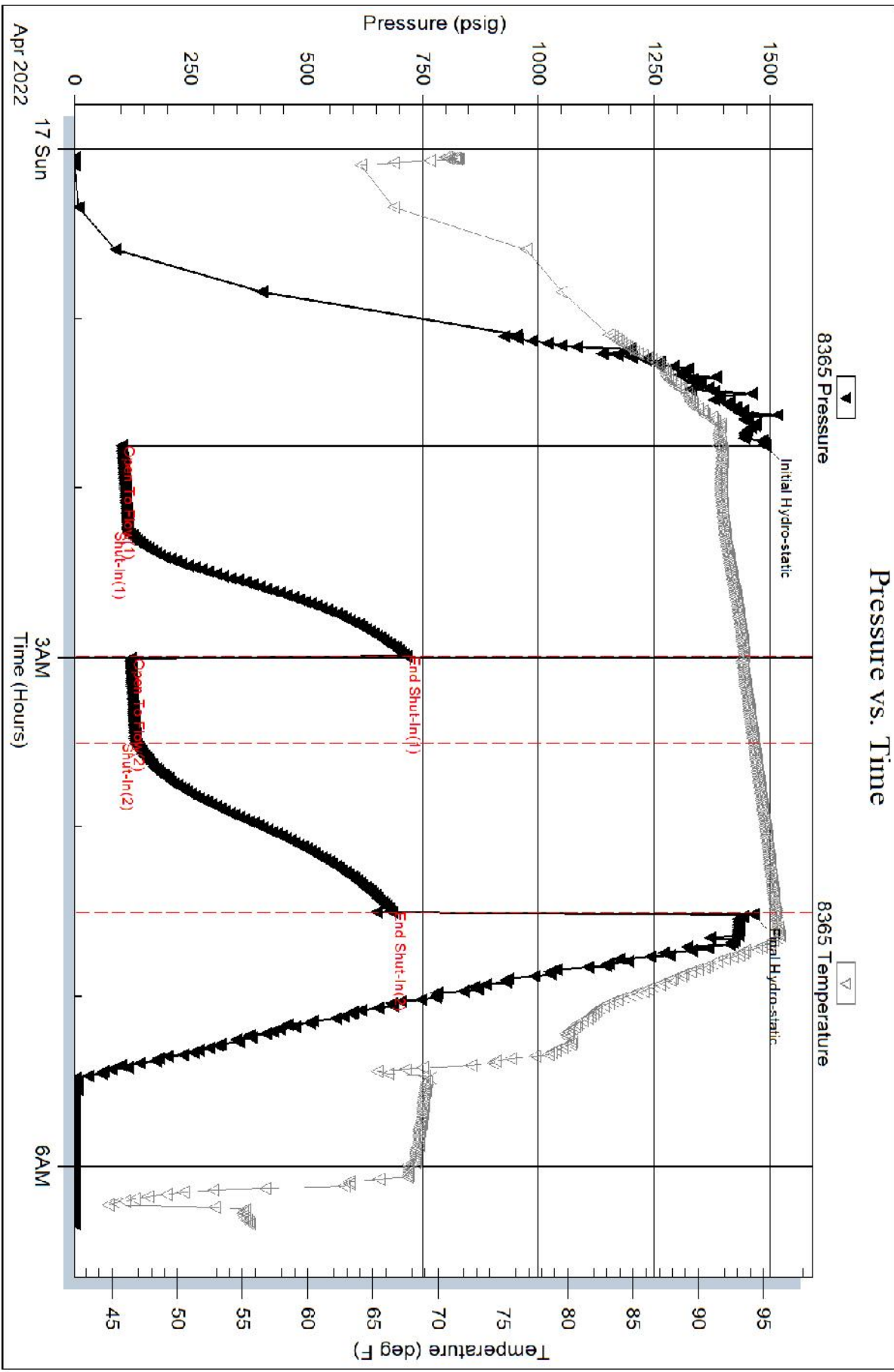
Total Length: 62.00 ft Total Volume: 0.305 bbl
Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments: 2# LCM

Serial #: 8365

Outside Darrah Oil

AARedetzke #10

DST Test Number: 1

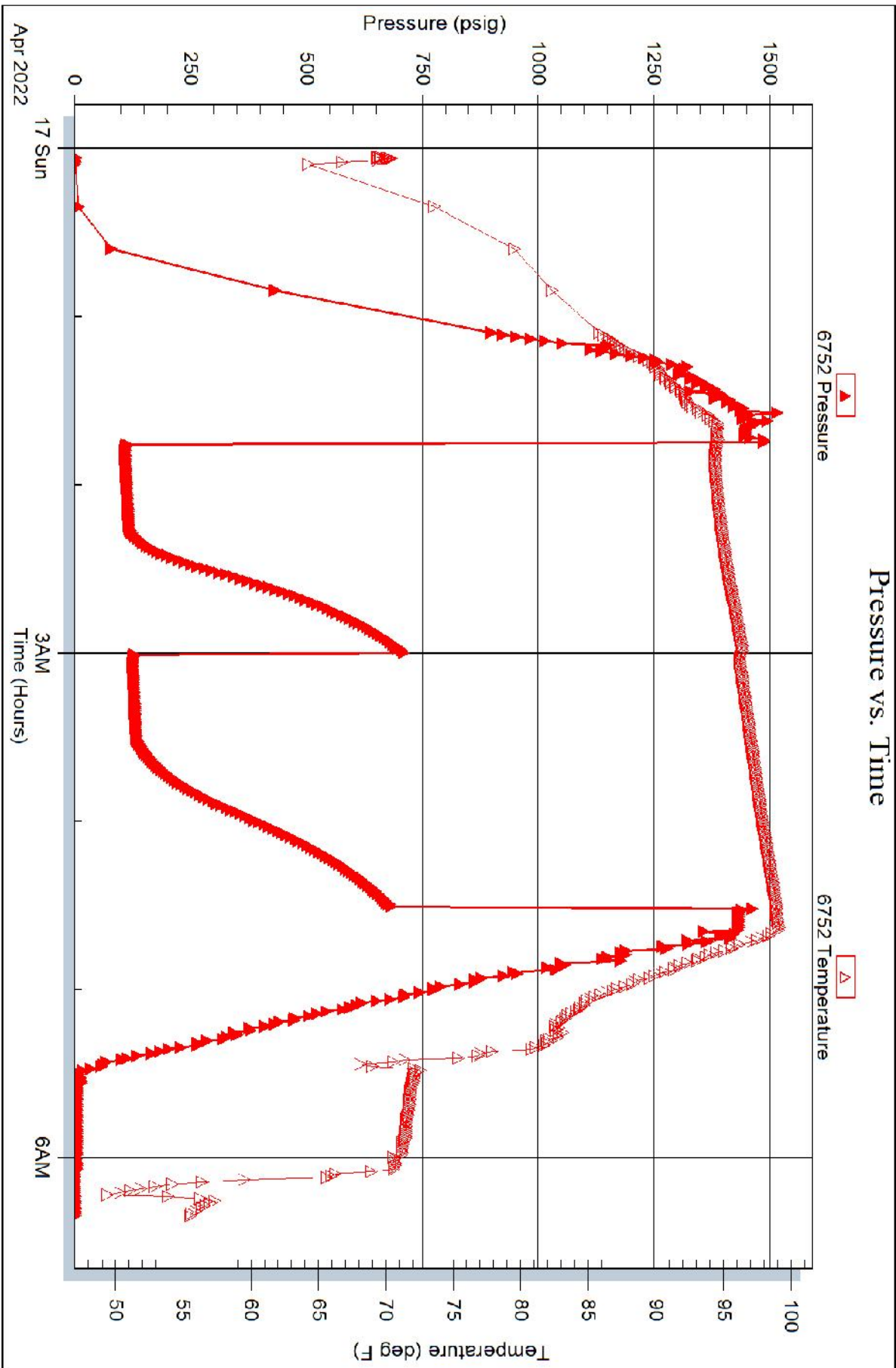


Serial #: 6752

Outside Darrah Oil

AARedetzke #10

DST Test Number: 1





TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

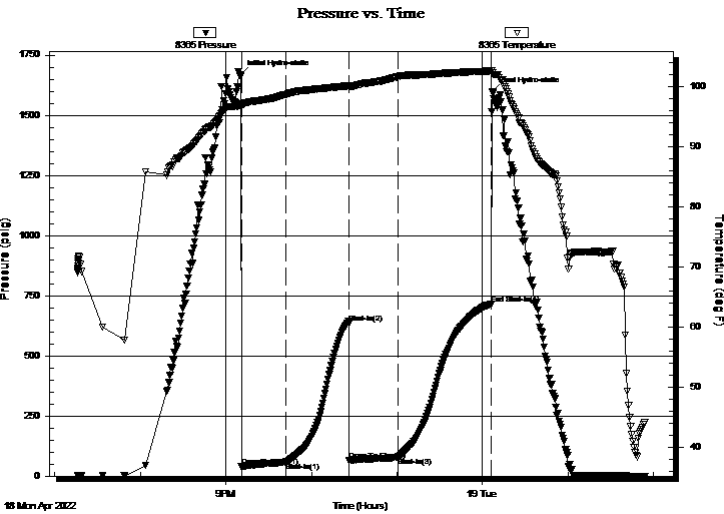
19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68248 **DST#: 2**
 Test Start: 2022.04.18 @ 19:16:00

GENERAL INFORMATION:

Formation: **Arbuckle**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 21:10:47
 Time Test Ended: 01:54:02
 Interval: **3313.00 ft (KB) To 3368.00 ft (KB) (TVD)**
 Total Depth: 3368.00 ft (KB) (TVD)
 Hole Diameter: 7.78 inches Hole Condition: Poor
 Test Type: Conventional Bottom Hole (Reset)
 Tester: Kevin Webster
 Unit No: 72
 Reference Elevations: 1906.00 ft (KB)
 1901.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8365 Outside
 Press@RunDepth: 57.45 psig @ 3365.00 ft (KB) Capacity: psig
 Start Date: 2022.04.18 End Date: 2022.04.19 Last Calib.: 2022.04.19
 Start Time: 19:16:01 End Time: 01:54:02 Time On Btm: 2022.04.18 @ 21:10:32
 Time Off Btm: 2022.04.19 @ 00:07:02

TEST COMMENT: 30 min IF- WSB built to 4"
 45 min IS- No returns
 30 min FF-WSB built to 2.5"
 60 min FSI- No returns



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1667.34	97.20	Initial Hydro-static
1	39.31	96.78	Open To Flow (1)
32	57.45	98.69	Shut-In(1)
76	634.38	100.10	Shut-In(2)
76	66.51	99.96	Open To Flow (2)
111	80.18	101.70	Shut-In(3)
176	713.89	102.61	End Shut-In(1)
177	1599.34	102.24	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
0.00	1541 GIP	0.00
93.00	GOM 10% G 10% O 80% M	0.46

* Recovery from multiple tests

Gas Rates

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



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68248 **DST#: 2**
Test Start: 2022.04.18 @ 19:16:00

Mud and Cushion Information

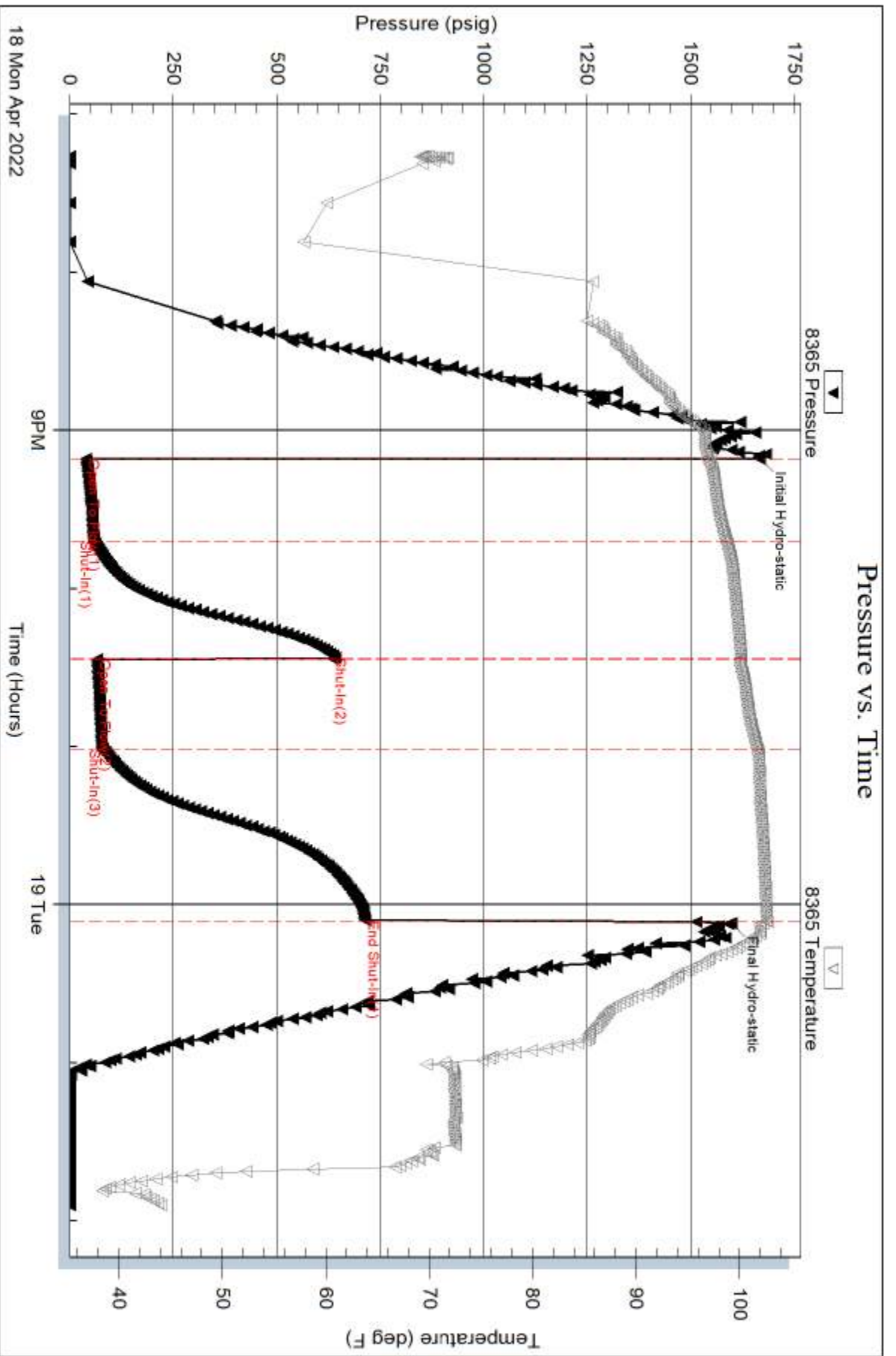
Mud Type: Gel Chem	Cushion Type:	Oil API:	deg API
Mud Weight: 9.00 lb/gal	Cushion Length: ft	Water Salinity:	ppm
Viscosity: 61.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.39 in ³	Gas Cushion Type:		
Resistivity: 1.50 ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
0.00	1541 GIP	0.000
93.00	GOM 10% G 10% O 80% M	0.457

Total Length: 93.00 ft Total Volume: 0.457 bbl
 Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
 Laboratory Name: Laboratory Location:
 Recovery Comments: 1.5# LCM

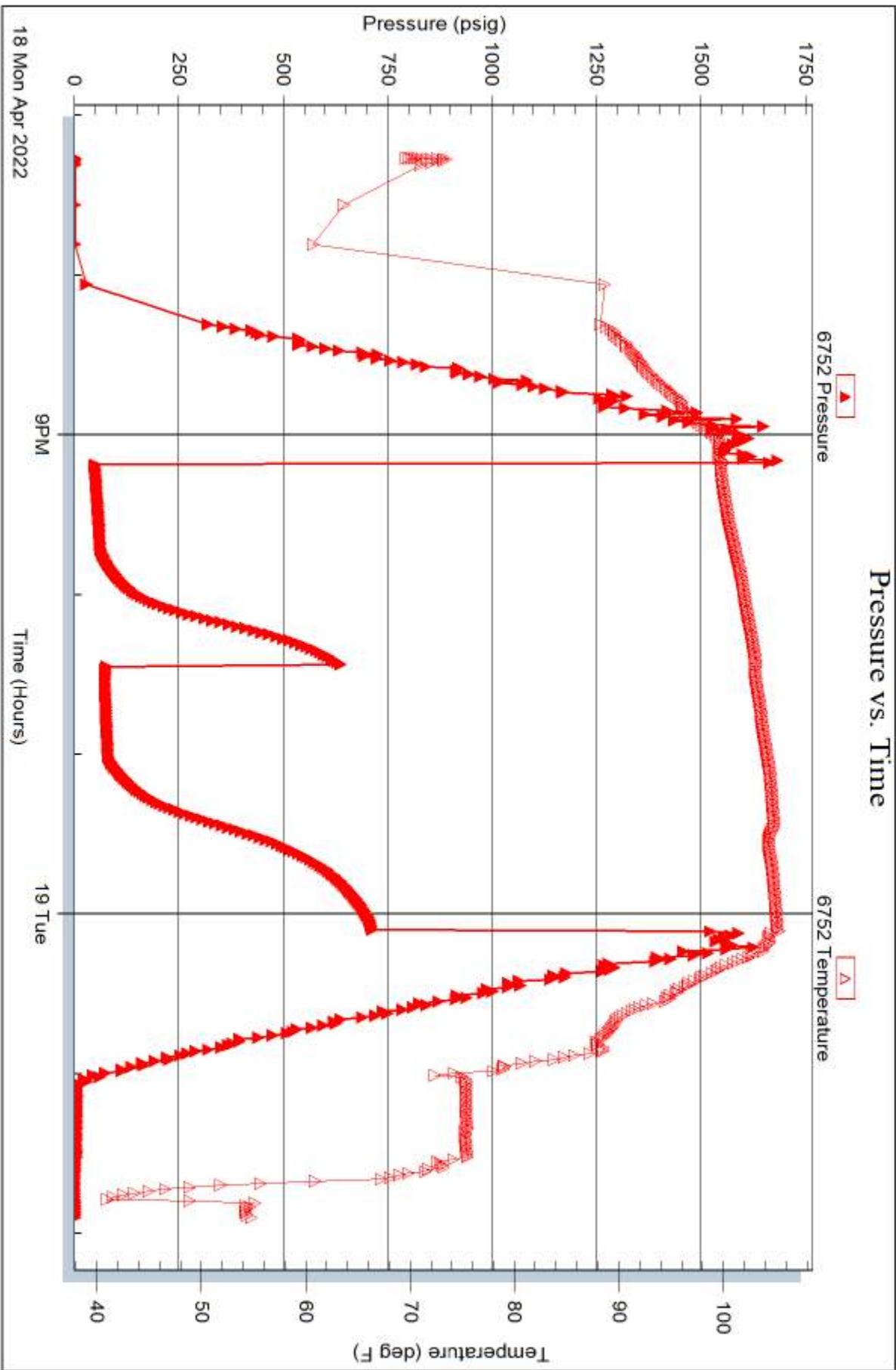


Serial #: 6752

Outside Darrah Oil

AARedetzke #10

DST Test Number: 2





TRILOBITE TESTING, INC

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

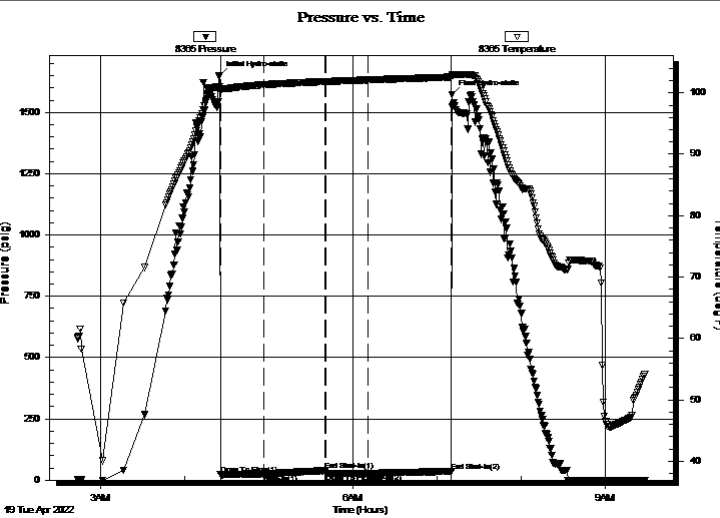
19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68249 **DST#: 3**
 Test Start: 2022.04.19 @ 02:44:00

GENERAL INFORMATION:

Formation: **KC "J"**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 04:25:32
 Time Test Ended: 09:28:02
 Interval: **3233.00 ft (KB) To 3253.00 ft (KB) (TVD)**
 Total Depth: 3368.00 ft (KB) (TVD)
 Hole Diameter: 7.78 inches Hole Condition: Poor
 Test Type: Conventional Straddle (Reset)
 Tester: Kevin Webster
 Unit No: 72
 Reference Elevations: 1906.00 ft (KB)
 1901.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8365 Outside
 Press@RunDepth: 27.74 psig @ 3253.00 ft (KB) Capacity: psig
 Start Date: 2022.04.19 End Date: 2022.04.19 Last Calib.: 2022.04.19
 Start Time: 02:44:01 End Time: 09:28:02 Time On Btm: 2022.04.19 @ 04:25:17
 Time Off Btm: 2022.04.19 @ 07:10:47

TEST COMMENT: 30 min IF- WSB built to 2"
 45 min IS- No returns
 30 min FF- WSB died in 9 min
 60 min FSI- No returns



PRESSURE SUMMARY			
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1649.93	100.97	Initial Hydro-static
1	23.15	100.25	Open To Flow (1)
32	25.65	101.31	Shut-In(1)
75	38.91	101.82	End Shut-In(1)
76	27.08	101.82	Open To Flow (2)
106	27.74	102.09	Shut-In(2)
165	36.32	102.59	End Shut-In(2)
166	1571.69	102.85	Final Hydro-static

Recovery		
Length (ft)	Description	Volume (bbl)
5.00	VSOCM >1%O <99% M	0.02

* Recovery from multiple tests

Gas Rates			
	Choke (inches)	Pressure (psig)	Gas Rate (Mcf/d)



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68249 **DST#: 3**
Test Start: 2022.04.19 @ 02:44:00

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: 52.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.37 in ³	Gas Cushion Type:		
Resistivity: ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

Recovery Information

Recovery Table

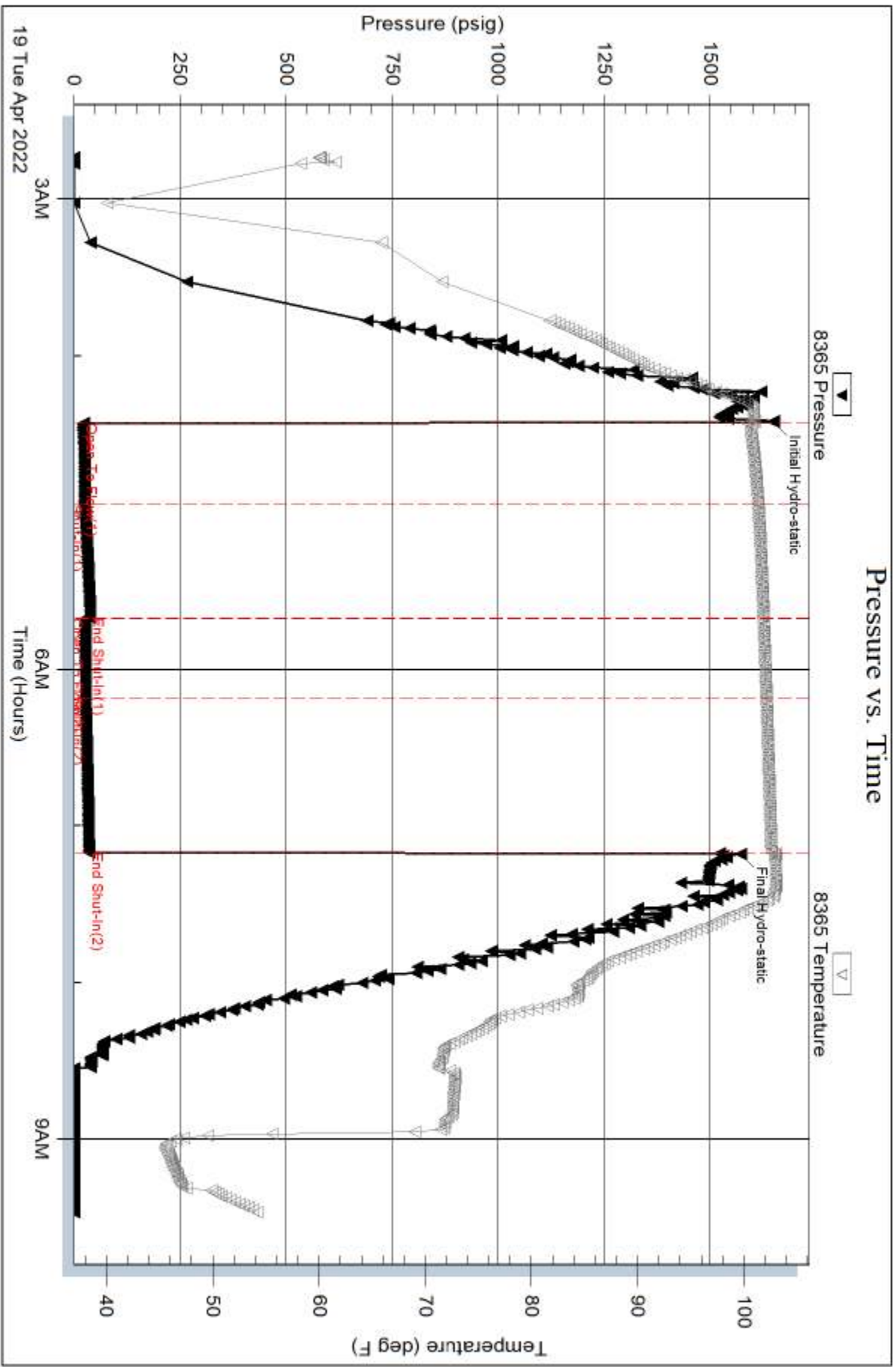
Length ft	Description	Volume bbl
5.00	VSOCM >1%O <99% M	0.025

Total Length: 5.00 ft Total Volume: 0.025 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:

Laboratory Name: Laboratory Location:

Recovery Comments:

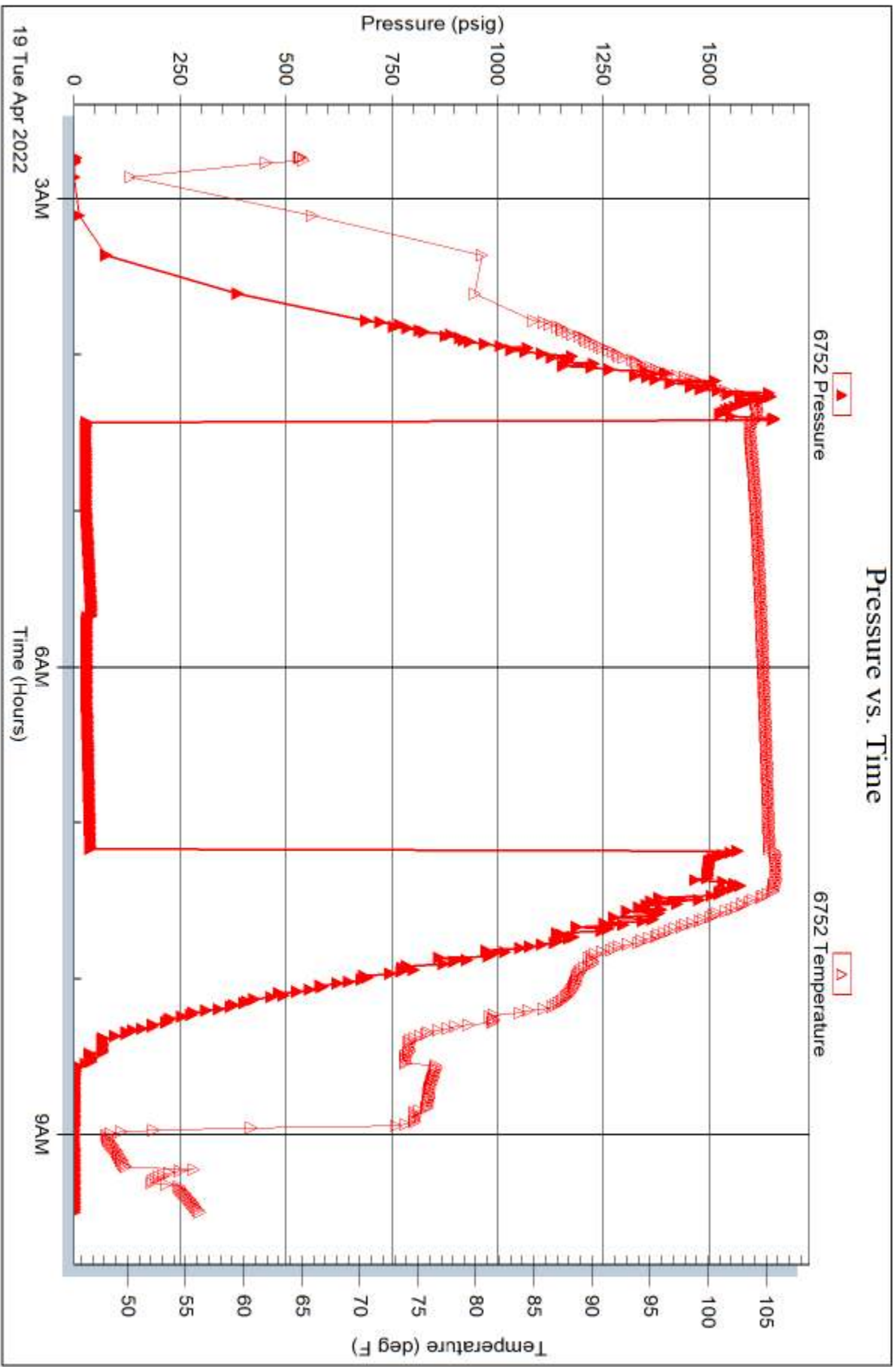


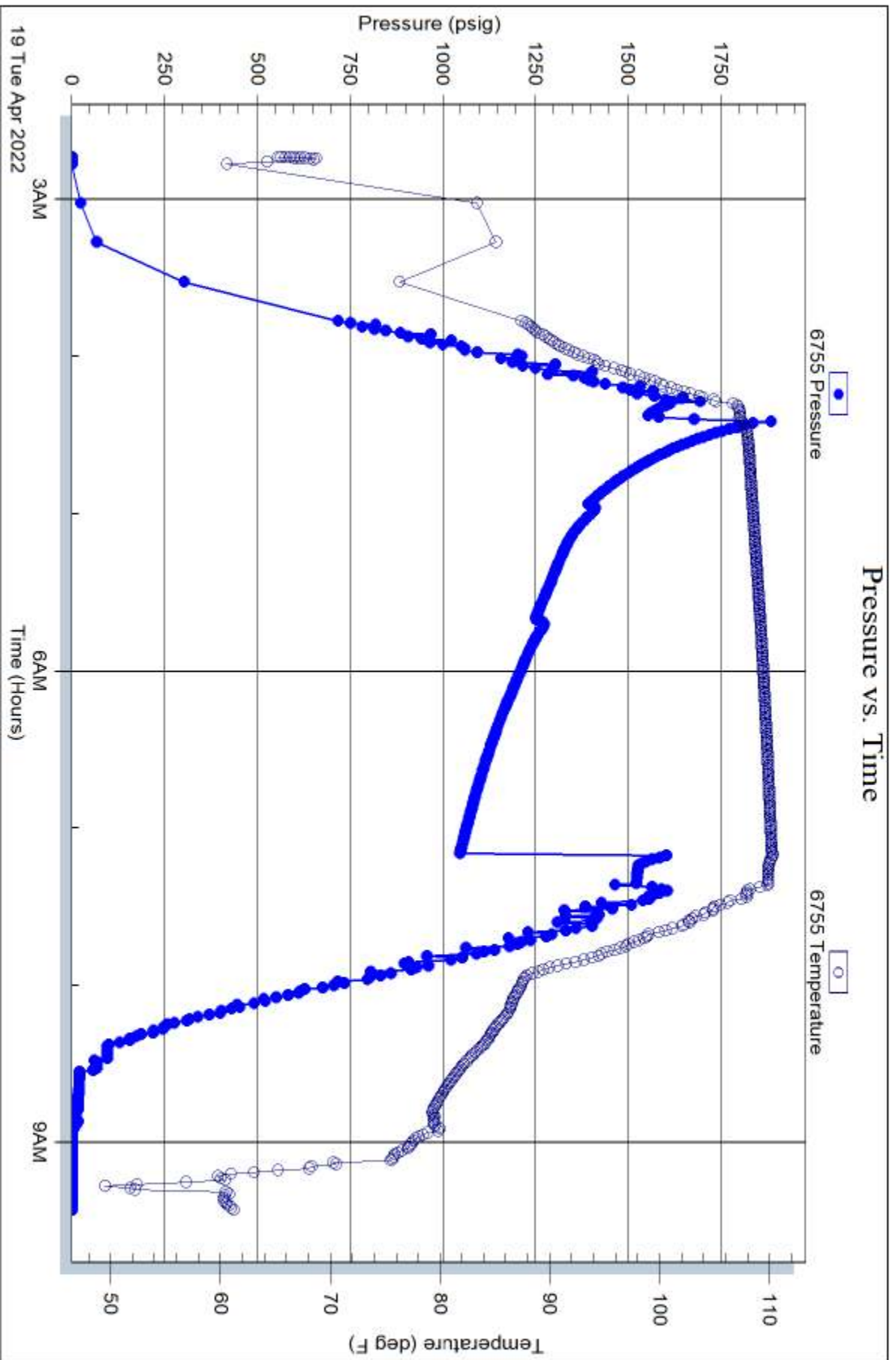
Serial #: 6752

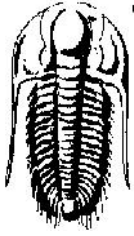
Outside Darrah Oil

AARedetzke #10

DST Test Number: 3







TRILOBITE TESTING, INC.

DRILL STEM TEST REPORT

Darrah Oil
 125 N Market Ste 1015
 Wichita, KS
 ATTN: Roger Martin

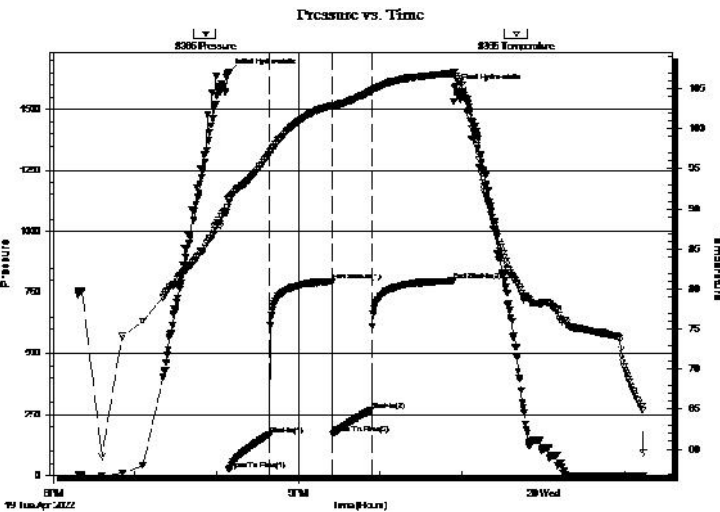
19-16s-11w Barton, KS
AARedetzke #10
 Job Ticket: 68250 **DST#: 4**
 Test Start: 2022.04.19 @ 18:18:00

GENERAL INFORMATION:

Formation: **Arbuckle**
 Deviated: No Whipstock: 1.00 ft (KB)
 Time Tool Opened: 20:09:02
 Time Test Ended: 01:14:02
 Interval: **3368.00 ft (KB) To 3376.00 ft (KB) (TVD)**
 Total Depth: 3376.00 ft (KB) (TVD)
 Hole Diameter: 7.78 inches Hole Condition: Poor
 Test Type: Conventional Bottom Hole (Reset)
 Tester: Kevin Webster
 Unit No: 72
 Reference Elevations: 1906.00 ft (KB)
 1901.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8365 Outside
 Press@RunDepth: 269.46 psig @ 3373.00 ft (KB) Capacity: psig
 Start Date: 2022.04.19 End Date: 2022.04.20 Last Calib.: 1899.12.30
 Start Time: 18:18:01 End Time: 01:14:02 Time On Btm: 2022.04.19 @ 20:08:47
 Time Off Btm: 2022.04.19 @ 22:55:02

TEST COMMENT: 30 min IF- Strong blow , BOB 7 min
 45 min ISI- Returnns built to 1/2"
 30 min FF- Strong blow , BOB 10 min
 60 min FSI- WSB



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1651.46	91.32	Initial Hydro-static
1	24.11	90.93	Open To Flow (1)
30	168.39	96.82	Shut-In(1)
76	795.74	102.93	End Shut-In(1)
77	170.93	102.72	Open To Flow (2)
105	269.46	104.72	Shut-In(2)
166	798.46	106.89	End Shut-In(2)
167	1586.94	106.99	Final Hydro-static

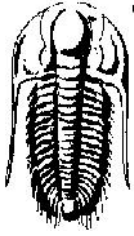
Recovery

Length (ft)	Description	Volume (bbl)
505.00	V SOMCW 1% O 69% W 30% M	5.99
62.00	MCW 85% W 15% M	0.87

Gas Rates

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

* Recovery from multiple tests



**TRILOBITE
TESTING, INC.**

DRILL STEM TEST REPORT

FLUID SUMMARY

Darrah Oil
125 N Market Ste 1015
Wichita, KS
ATTN: Roger Martin

19-16s-11w Barton, KS
AARedetzke #10
Job Ticket: 68250 **DST#: 4**
Test Start: 2022.04.19 @ 18:18:00

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:	32000 ppm
Viscosity: 52.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.38 in ³	Gas Cushion Type:		
Resistivity: ohm.m	Gas Cushion Pressure: psig		
Salinity: 4500.00 ppm			
Filter Cake: inches			

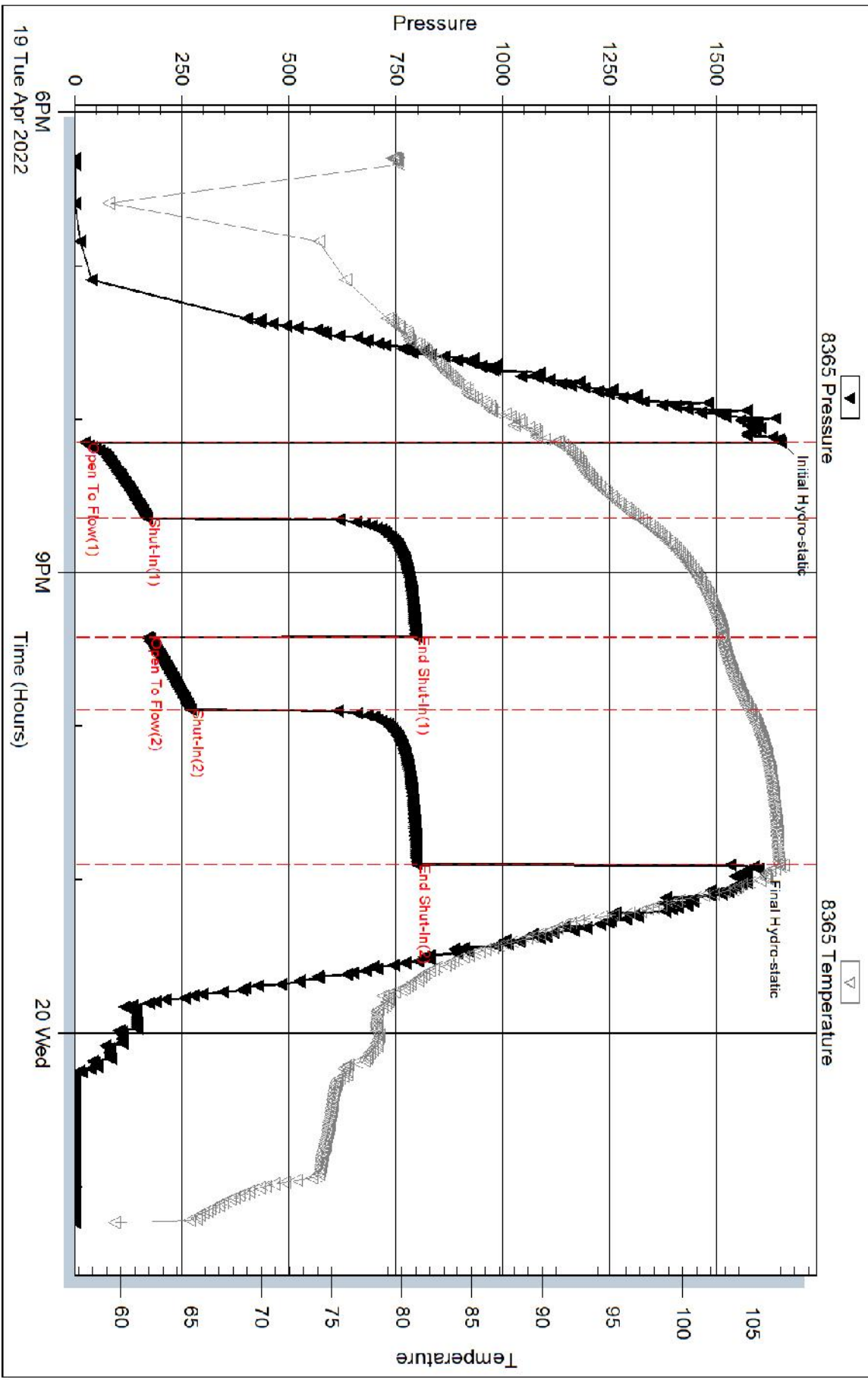
Recovery Information

Recovery Table

Length ft	Description	Volume bbl
505.00	VSOMCW 1% O 69% W 30% M	5.991
62.00	MCW 85% W 15% M	0.870

Total Length: 567.00 ft Total Volume: 6.861 bbl
 Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
 Laboratory Name: Laboratory Location:
 Recovery Comments:

Pressure vs. Time

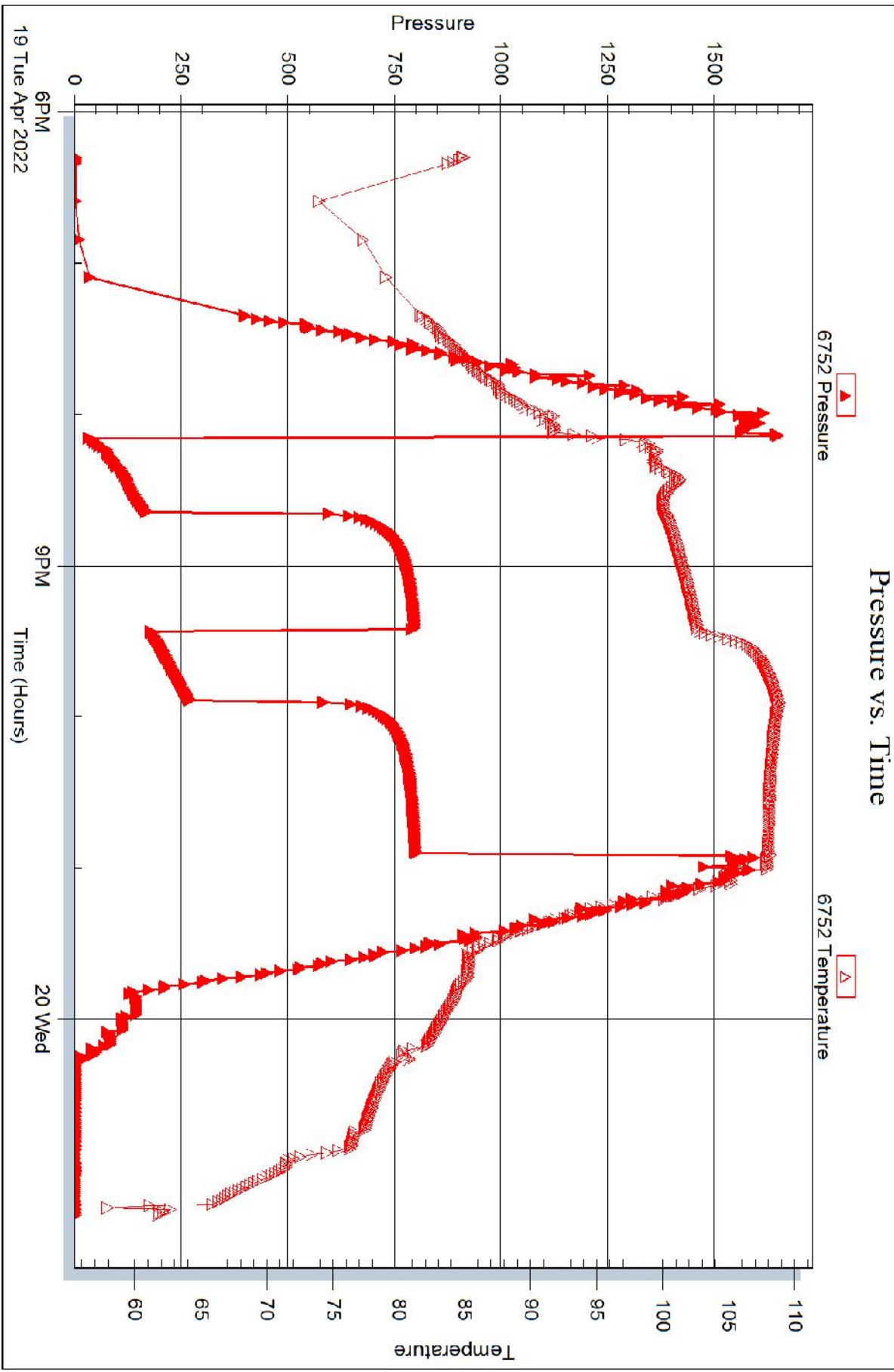


Serial #: 6752

Outside Darrah Oil

AARedetzke #10

DST Test Number: 4



Trilobite Testing, Inc

Ref. No: 68250

Printed: 2022.04.20 @ 07:37:01

COPELAND

Acid & Cement

BURRTON, KS GREAT BEND, KS
 (620) 463-5161 (620) 793-3366
 FAX (620) 463-2104 FAX (620) 793-3536

POST OFFICE BOX 438
 HAYSVILLE, KS 67060
 (316) 524-1225
 (316) 524-1027 FAX

Invoice

INVOICE NUMBER:
C60548-IN

BILL TO:
DARRAH OIL COMPANY LLC
PO BOX 2786
WICHITA, KS 67202-2786

LEASE: NEW WELL: AA REDETZKE 10

DATE	ORDER	SALESMAN	ORDER DATE	PURCHASE ORDER	SPECIAL INSTRUCTIONS	
04/21/2022	60548		04/14/2022	AA REDETZKE 10	NET 30	
QUANTITY	U/M	ITEM NO./DESCRIPTION		D/C	PRICE	EXTENSION
		NEW WELL				
30.00	MI	MILEAGE CEMENT PUMP TRUCK		0.00	6.00	180.00
1.00	EA	PUMP CHARGE SURFACE		0.00	1,150.00	1,150.00
325.00	SK	COMMON CEMENT		0.00	16.25	5,281.25
25.00	SK	CALCIUM CHLORIDE		0.00	42.00	1,050.00
350.00	EA	BULK CHARGE		0.00	1.25	437.50
493.50	MI	BULK TRUCK - TON MILES		0.00	1.85	912.98
REMIT TO: P.O. BOX 438 HAYSVILLE, KS 67060		COP		Net Invoice:		9,011.73
		FUEL SURCHARGE IS NOT TAXABLE AND IS ADDED TO MILEAGE, PUMP AND OR DELIVERY CHARGES ONLY.		BATCO Sales Tax:		474.84
RECEIVED BY		NET 30 DAYS		Invoice Total:		9,486.57

There will be a charge of 1.5% "per month" (18% annual rate) on all accounts over 30 days pas

Copeland Acid & Cement is a subsidiary of Gressel Oil Field Service

Gressel Oil Field Service reserves a security interest in the goods sold until the same are paid for in full and reserve all the rights of a secured party under the Uniform Commercial Code.



Remit To: Hurricane Services, Inc.
 250 N. Water, Suite 200
 Wichita, KS 67202
 316-303-9515

Customer:
 DARRAH OIL
 C/O JOHN JAY DARRAH JR
 PO BOX 2786
 WICHITA, KS 67201-2786

Invoice Date: 4/21/2022
 Invoice #: 0360171
 Lease Name: Redetzke, A. A.
 Well #: 10
 County: Barton, Ks
 Job Number: WP2709
 District: Oakley

Date/Description	HRS/QTY	Rate	Total
PTA	0.000	0.000	0.00
Depth Charge 3001'-4000'	1.000	2,070.000	2,070.00
Heavy Eq Mileage	145.000	4.000	580.00
Light Eq Mileage	145.000	2.000	290.00
Ton Mileage	1,548.600	1.500	2,322.90
H-Plug	240.000	12.880	3,091.20
Wooden plug 8 5/8"	1.000	156.400	156.40
Cement Blending & Mixing	240.000	1.288	309.12
Service Supervisor	1.000	253.000	253.00

Net Invoice 9,072.62
 Sales Tax: 568.40
Total 9,641.02

TERMS: Net 30 days. Interest may be charged on past due invoice at rate of 1 ½% per month or maximum allowed by applicable state or federal laws. HSI has right to revoke any discounts applied in arriving at net invoice price if invoice is past due. If revoked, full invoice price without discount plus additional sales tax, as applicable, is due immediately and subject to interest charges. Customer agrees to pay all collection costs directly or indirectly incurred by HSI in the event HSI engages a third party to pursue collection of past due invoice.

SALES TAX: Services performed on oil, gas and water wells in Kansas are subject to sales tax, with certain exceptions. HSI relies on the well information provided by the customer in identifying whether the services performed on wells qualify for exemption.

WE APPRECIATE YOUR BUSINESS!

