KOLAR Document ID: 1513730

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 # 5004
Name: Vincent Oil Corporation
Address 1: 200 W DOUGLAS AVE #725
Address 2:
City: WICHITA State: KS Zip: 67202 + 3023
Contact Person: M.L. Korphage
Phone: (316) 262-3573
CONTRACTOR: License # 5929
Name: Duke Drilling Co., Inc.
Wellsite Geologist: Tom Dudgeon
Purchaser: MV Purchasing

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 #:

12/30/2019 Spud Date or Recompletion Date
1/8/2020 Date Reached TD
4/21/2020 Completion Date or Recompletion Date

API No.: 15-095-22333-00-00
Spot Description:
SW- NW- NW- NE Sec. 22 Twp. 28 S. R. 8 ☐ East ☑ West
350 Feet from ☑ North / ☐ South Line of Section
2565 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: Kingman
Lease Name: FAIRCHILD Well #: 1-22
Field Name:
Producing Formation: Hertha
Elevation: Ground: 1599 Kelly Bushing: 1611
Total Vertical Depth: 4500 Plug Back Total Depth: 4495
Amount of Surface Pipe Set and Cemented at: 309 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: 44000 ppm Fluid volume: 1800 bbls
Dewatering method used: Hauled to Disposal
Location of fluid disposal if hauled offsite:
Operator Name: Wildcat Oil & Gas
Lease Name: Adelhardt SWD #1-7 License #: 31337
Quarter SW Sec. 7 Twp. 30 S. R. 8 ☐ East ☑ West
County: Kingman Permit #: D30389

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: 04/22/2020
☐ **Confidential Release Date:** 04/22/2022
☑ **Wireline Log Received** ☑ **Drill Stem Tests Received**
☑ **Geologist Report / Mud Logs Received**
☐ **UIC Distribution**
ALT ☑ **I** ☐ **II** ☐ **III** **Approved by:** Rene Stucky **Date:** 04/27/2020

Page Two

Operator Name: Vincent Oil Corporation Lease Name: FAIRCHILD Well #: 1-22

Sec. 22 Twp. 28 S. R. 8 ☐ East ☑ West County: Kingman

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	309	60/40 POZ	275	2% Gel, 3% CC & 1/4# Cel-flake /sx
Production	7.875	4.5	11.6	4495	Pro-C	200	2% Gel, 10 % Salt & 5# Kolseal/sx

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: 4/21/2020	Producing Method: ☐ Flowing ☑ Pumping ☐ Gas Lift ☐ Other *(Explain)*					
Estimated Production Per 24 Hours	Oil Bbls.	Gas Mcf	Water Bbls.	Gas-Oil Ratio	Gravity	
	30					

DISPOSITION OF GAS:	METHOD OF COMPLETION:	PRODUCTION INTERVAL:	
		Top	Bottom
☐ Vented ☐ Sold ☐ Used on Lease *(If vented, Submit ACO-18.)*	☐ Open Hole ☑ Perf. ☐ Dually Comp. *(Submit ACO-5)* ☐ Commingled *(Submit ACO-4)*	3761	3766

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)*
4	3761	3766			Perforated 3762' to 3766', ran 2.3750" tubing to 3895', SDFN
					FL at 50', rigged up to swab, swabbed 3 hrs , all water FL at 3700', SDFN
					FL at 3150', swabbed down, with trace of oil. , Aciidized with 500 gal 15% MCA
					Swabbed 4 hrs , last hour rec 18.37 bbl (50% Oil). Ran downhole pump and rods.
					Set surface equipment and tanks. turned to prod 4/21/2020.
TUBING RECORD: Size: 2.3750		Set At: 3895		Packer At:	

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

Form	ACO1 - Well Completion
Operator	Vincent Oil Corporation
Well Name	FAIRCHILD 1-22
Doc ID	1513730

All Electric Logs Run

Dual Induction
Density - Neutron
Micro-log
Sonic

Form	ACO1 - Well Completion
Operator	Vincent Oil Corporation
Well Name	FAIRCHILD 1-22
Doc ID	1513730

Tops

Name	Top	Datum
Chase	1410	(+201)
Onaga Shale	2200	(-589)
Wabaunsee	2242	(-631)
Topeka	2770	(-1159)
Heebner Shale	3152	(-1541)
Brown Limestone	3361	(-1750)
Lansing	3374	(-1763)
Stark Shale	3715	(-2104)
Hushpuckney Shale	3756	(-2145)
Cherokee Shale	3955	(-2354)
Mississippian	4042	(-2431)
Mississippian Limestone	4134	(-2523)
Kinderhook Shale	4235	(-2624)
Viola	4394	(-2783)
Simpson Sand	4438	(-2827)
RTD	4500	(-2889)

Form	ACO1 - Well Completion
Operator	Vincent Oil Corporation
Well Name	FAIRCHILD 1-22
Doc ID	1513730

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	309	60/40 POZ	275	2% Gel, 3% CC & 1/4# Cel-flake /sx
Production	7.875	4.5	11.6	4495	Pro-C	200	2% Gel, 10 % Salt & 5# Kolseal/sx

QUALITY WELL SERVICE, INC.

7309

Federal Tax I.D. # 481187368
Home Office 30060 N. Hwy 281, Pratt, KS 67124
Mailing Address P.O. Box 468

Office 620-727-3410
Fax 620-672-3663

Rich's Cell 620-727-3409
Brady's Cell 620-727-6964

Date 12-30-19	Sec. 22	Twp. 28S	Range 9W	County Kingman	State KS	On Location	Finish

Lease Fairchild Well No. 1-22 Location Kingman, KS W on 54 to Bluebell Rd

Contractor Duke Drlg Rig #1 Owner 3S 1 1/2E S into

Type Job Surface

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

Hole Size 12 1/4	T.D. 310	Charge To	Vincent Oil Corp
Csg. 8 5/8 23#	Depth 309	Street	
Tbg. Size	Depth	City	State
Tool	Depth	The above was done to satisfaction and supervision of owner agent or contractor.	
Cement Left in Csg.	Shoe Joint 25	Cement Amount Ordered	275 sx 60/40
Meas Line	Displace 18.13		2% Gel 3% CC 1/4# PS

EQUIPMENT

Pumptrk 8	No.	Common	165 sx
Bulktrk 11	No.	Poz. Mix	110 sx
Bulktrk	No.	Gel.	473#
Pickup	No.	Calcium	710#

JOB SERVICES & REMARKS

Rat Hole		Hulls	
Mouse Hole		Salt	
Centralizers		Flowseal	68.75
Baskets		Kol-Seal	
D/V or Port Collar		Mud CLR 48	
Run 7 Jts 8 5/8 23# CSG SET @ 309'		CFL-117 or CD110 CAF 38	
START CSG CSG ON Bottom		Sand	
Hook up to CSG & Break Circ W/Rig		Handling	289
START Pumping 10 Bbls H2O		Mileage	30/3500
START MIX & Pump 275 sx 60/40		8 5/8	**FLOAT EQUIPMENT**
2% Gel 3% CC 1/4# PS @ 14.7#/GAL		Guide Shoe	
SHUT DOWN RELEASE 8 5/8 W PLUG		Centralizer	
START DISP		Baskets	
PLUG DOWN 150# 18.18 Bbls		AFU Inserts	
Close Valve on CSG		Float Shoe	
Good Circ thru JOB		Latch-Down	Wooden Plug 1 EA
Circ CMT TO Pit		SERVICE Sup	1 EA
		LMV	30
Thank You		Pumptrk Charge	SURFACE
PLEASE CALL AGAIN		Mileage	60
TOM TO JAKE		Tax	
X Signature Mike Kipfer		Discount	
		Total Charge	

Taylor Printing, Inc.

QUALITY WELL SERVICE, INC. 7319

Federal Tax I.D. # 481187368
Home Office 30060 N. Hwy 281, Pratt, KS 67124
Mailing Address P.O. Box 468
Office 620-727-3410
Fax 620-672-3663
Rich's Cell 620-727-3409
Brady's Cell 620-727-6964

	Sec.	Twp.	Range	County	State	On Location	Finish
Date 1- -20	22	28S	8W	KINGMAN	KS		

Lease Fairchild Well No. 1-22 Location KINGMAN KS. W on HWY 54 to BLUEBELL Rd

Contractor DUKE DRLG RIG #1 Owner 3S 2½E S into

Type Job LONGSTRING

Hole Size 7 7/8 T.D. 4500'

Csg. 4½ Depth 4495'

Tbg. Size Depth

Tool Depth

Cement Left in Csg. Shoe Joint 44.15

Meas Line Displace 68.99

To Quality Well Service, 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 VINCENT OIL CORP.

Street

City State

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

Cement Amount Ordered 250sx PROC 2% FEL 10% SALT 5#/sx KOLSEAL .6% C16A .25% C41P ¼# PS

EQUIPMENT

Pumptrk 3	No.		
Bulktrk 10	No.		
Bulktrk	No.		
Pickup	No.		

JOB SERVICES & REMARKS

Rat Hole 30sx

Mouse Hole 20 sx

Centralizers 7-9-11-13-15-17

Baskets

D/V or Port Collar

RUN 102 JTS 4½ 11.6# CSG SET @

START CSG CSG ON BOTTOM TAG

HOOK UP TO CSG BREAK CIRC W/RIG

DROP BALL & CIRC W/RIG

START PUMPING TO BACK 13 BBLS RAT & MOUSE 10 BBL H2O

START PUMP R-M HOLES 50sx

START MIX 200sx PROC @ 14.8#/GAL @ CSG

SHUT DOWN RELEASE 4½ TOP PLUG WASH UP TO

START DISP W/ 2% KCL

LIFT PSI 55 AT 600#

PLUG DOWN 69 AT 1100#

PSI UP 1600#

RELEASE & HELD ½ BBL BACK

GOOD CIRC THRU JOB

THANK YOU TOM TJ JOHN MIKE

PLEASE COME AGAIN

Common	250 sx	
Poz. Mix		
Gel.	470#	
Calcium		
Hulls		
Salt	1377#	
Flowseal	63.5#	
Kol-Seal	1250#	
Mud CLR 48	500 Gal	
CFL-117 or CD110 CAF 38	C16A 141#	
Sand	58.75 C41P	
Handling	307	
Mileage	30 / 9210	
4½	**FLOAT EQUIPMENT**	
Guide Shoe	1 EA	
Centralizer	6 EA	
Baskets		
AFU Inserts	1 EA	
Float Shoe	TOP RUBBER PLUG 1 EA	
Latch Down	HEAD & MANIFOLD 1 EA	
SERVICE SUP	1 EA	
LMV	30	
Pumptrk Charge	LONGSTRING	
Mileage	60	
	Tax	
	Discount	
	Total Charge	

X Signature

DRILL STEM TEST REPORT

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65463 **DST#: 1**

Test Start: 2020.01.01 @ 00:35:42

GENERAL INFORMATION:

Formation: **Chase**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 03:51:57
Time Test Ended: 08:13:27

Test Type: Conventional Bottom Hole (Initial)
Tester: Matt Smith
Unit No: 68

Interval: 1375.00 ft (KB) To 1450.00 ft (KB) (TVD)
Total Depth: 1475.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

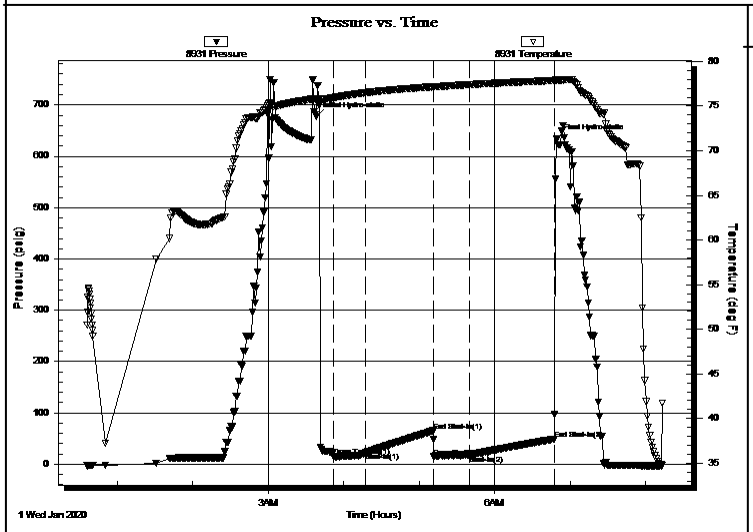
Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8931 **Inside**

Press@RunDepth: 18.18 psig @ 1376.00 ft (KB)
Start Date: 2020.01.01 End Date: 2020.01.01
Start Time: 00:35:47 End Time: 08:13:26

Capacity: 8000.00 psig
Last Calib.: 2020.01.01
Time On Btm: 2020.01.01 @ 03:38:27
Time Off Btm: 2020.01.01 @ 06:49:27

TEST COMMENT: IF: Weak - Fair Blow . Built to 6".
ISI: No Blow .
FF: Weak Blow . Built to 5".
FSI: No Blow .



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	677.58	75.81	Initial Hydro-static
14	14.91	75.94	Open To Flow (1)
40	22.46	76.50	Shut-In(1)
93	65.26	77.16	End Shut-In(1)
94	14.53	77.14	Open To Flow (2)
122	18.18	77.41	Shut-In(2)
189	48.94	77.85	End Shut-In(2)
191	633.38	77.90	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
6.00	DRG Mud 100%m	0.05

Gas Rates

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

DRILL STEM TEST REPORT

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65463 **DST#: 1**

Test Start: 2020.01.01 @ 00:35:42

GENERAL INFORMATION:

Formation: **Chase**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 03:51:57
Time Test Ended: 08:13:27

Test Type: Conventional Bottom Hole (Initial)
Tester: Matt Smith
Unit No: 68

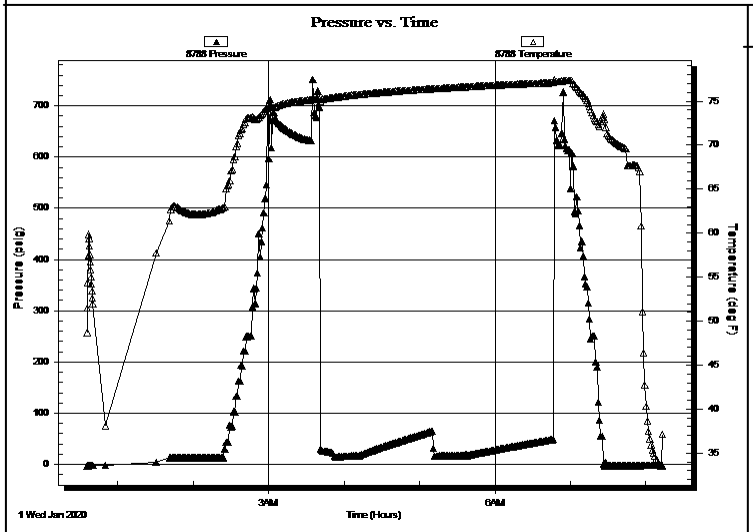
Interval: 1375.00 ft (KB) To 1450.00 ft (KB) (TVD)
Total Depth: 1475.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8788 **Outside**
Press@RunDepth: psig @ 1376.00 ft (KB)
Start Date: 2020.01.01 End Date: 2020.01.01
Start Time: 00:35:25 End Time: 08:13:19

Capacity: 8000.00 psig
Last Calib.: 2020.01.01
Time On Btm:
Time Off Btm:

TEST COMMENT: IF: Weak - Fair Blow . Built to 6".
ISI: No Blow .
FF: Weak Blow . Built to 5".
FSI: No Blow .



PRESSURE SUMMARY

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

Recovery

Length (ft)	Description	Volume (bbl)
6.00	DRG Mud 100%m	0.05

Gas Rates

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

DRILL STEM TEST REPORT

FLUID SUMMARY

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65463 **DST#: 1**

Test Start: 2020.01.01 @ 00:35:42

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	10.00 lb/gal	Cushion Length:	ft	Water Salinity:	109000 ppm
Viscosity:	31.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	in³	Gas Cushion Type:			
Resistivity:	109000.00 ohm.m	Gas Cushion Pressure:	psig		
Salinity:	ppm				
Filter Cake:	0.20 inches				

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
6.00	DRG Mud 100%m	0.046

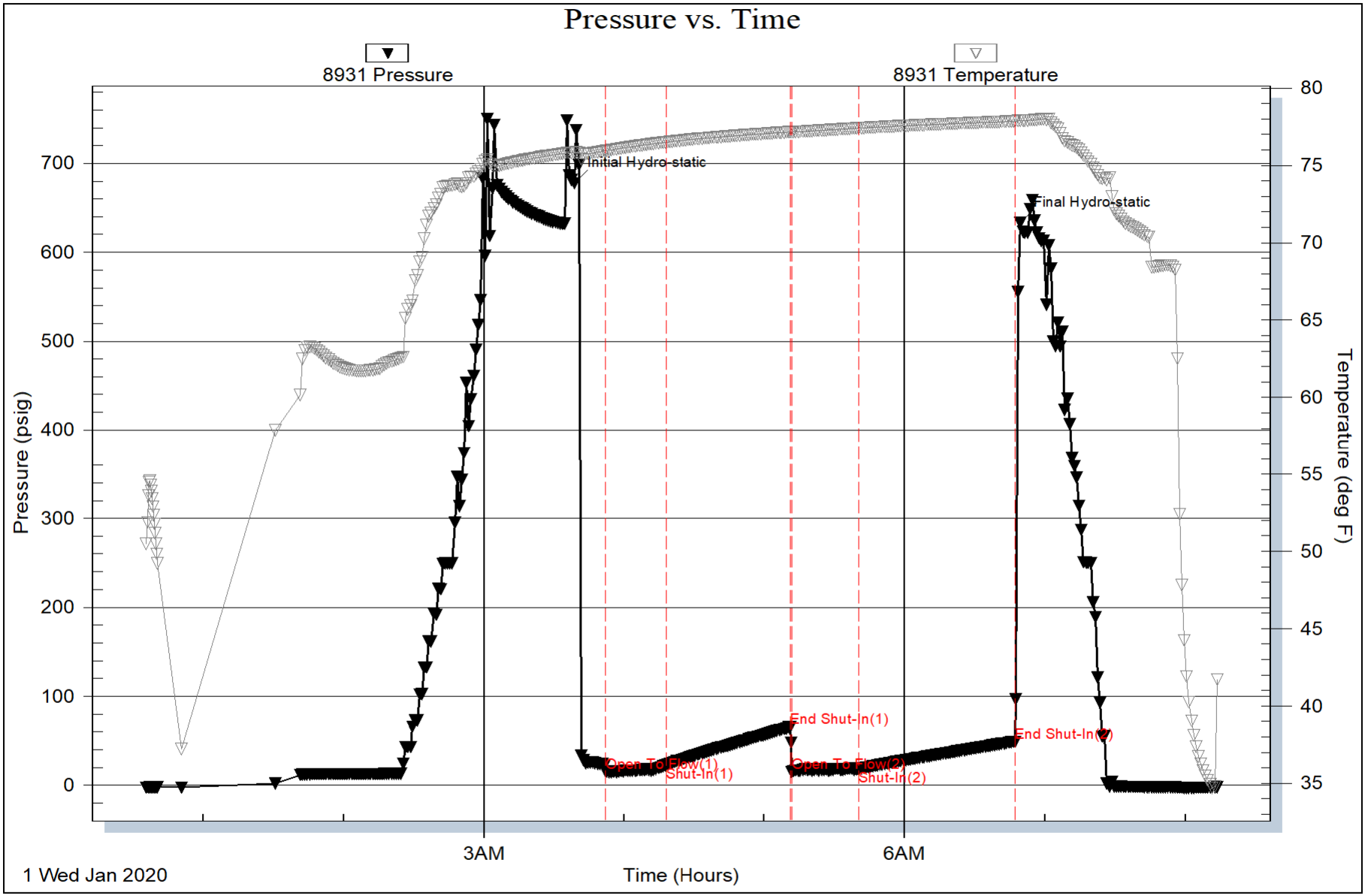
Total Length: 6.00 ft Total Volume: 0.046 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #: None

Laboratory Name: Laboratory Location:

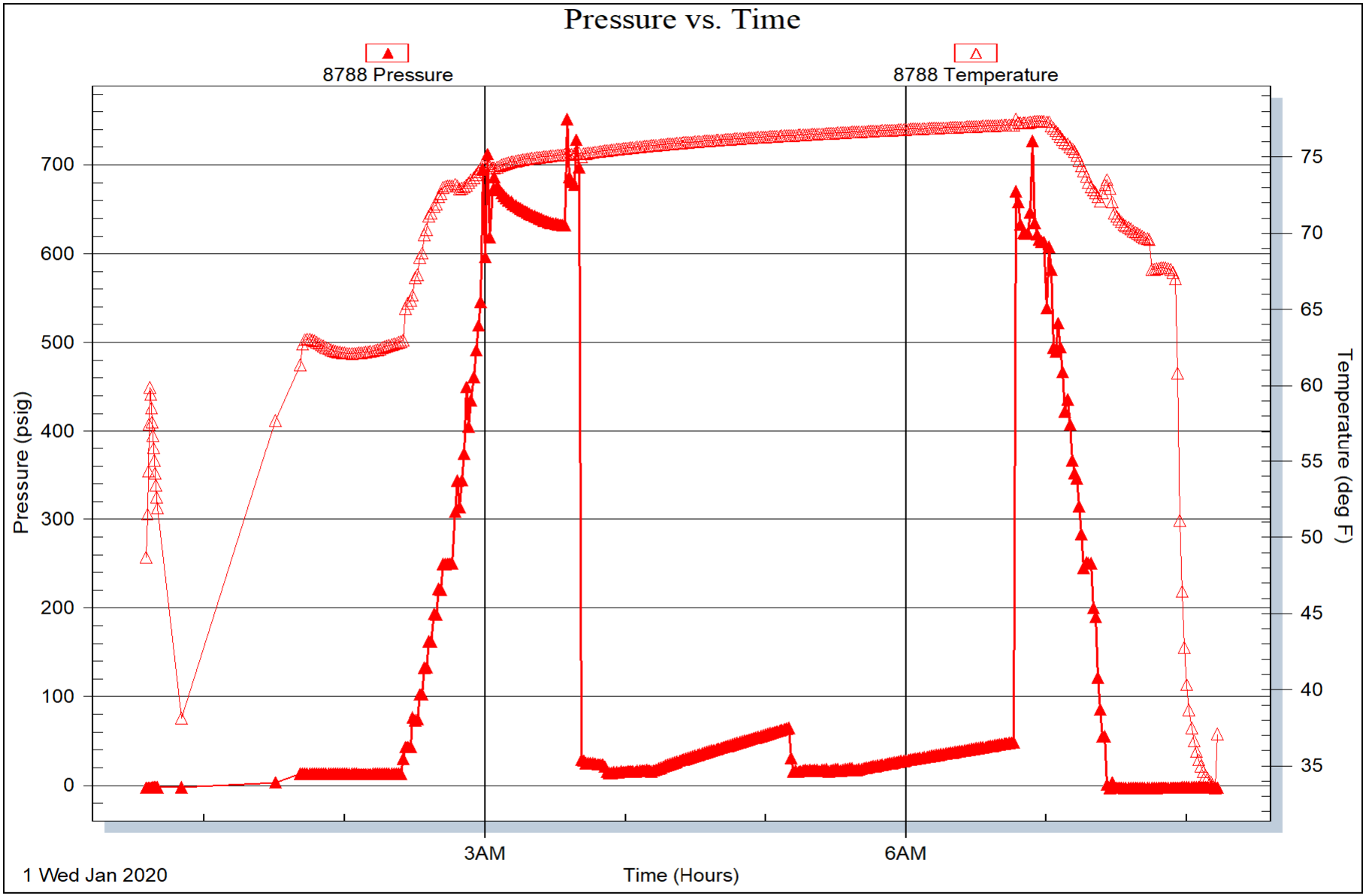
Recovery Comments:

Serial #: 8931 **Inside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 1



Trilobite Testing, Inc Ref. No: 65463 Printed: 2020.01.01 @ 09:54:14

Serial #: 8788 **Outside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 1



Trilobite Testing, Inc Ref. No: 65463 Printed: 2020.01.01 @ 09:54:15

DRILL STEM TEST REPORT

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65464 **DST#: 2**

Test Start: 2020.01.02 @ 16:29:19

GENERAL INFORMATION:

Formation: **Stolter**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 18:48:49
Time Test Ended: 01:38:19

Test Type: Conventional Bottom Hole (Reset)
Tester: Matt Smith
Unit No: 68

Interval: 2333.00 ft (KB) To 2475.00 ft (KB) (TVD)
Total Depth: 2475.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

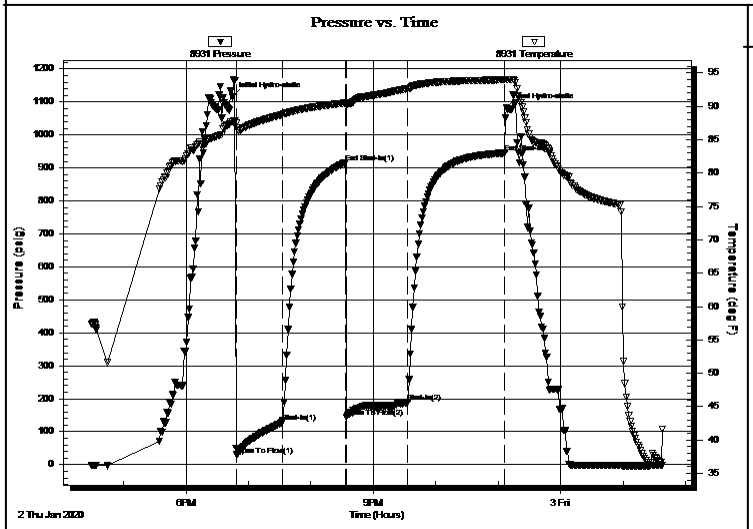
Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8931 **Inside**

Press@RunDepth: 189.01 psig @ 2334.00 ft (KB)
Start Date: 2020.01.02 End Date: 2020.01.03
Start Time: 16:29:24 End Time: 01:38:19

Capacity: 8000.00 psig
Last Calib.: 2020.01.03
Time On Btm: 2020.01.02 @ 18:44:19
Time Off Btm: 2020.01.02 @ 23:08:04

TEST COMMENT: IF: Strong Blow . B.O.B. in 6 mins. Built to 62".
ISI: No Blow .
FF: Strong Blow . B.O.B. in 3 mins. Built to 132".
FF: No Blow .



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1114.99	87.70	Initial Hydro-static
5	29.82	86.78	Open To Flow (1)
49	128.60	88.79	Shut-In(1)
109	915.89	90.50	End Shut-In(1)
110	143.91	90.34	Open To Flow (2)
169	189.01	92.66	Shut-In(2)
262	945.45	94.00	End Shut-In(2)
264	1081.41	94.04	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
61.00	GMCW 20%g 30%m 50%w	0.46
61.00	GWCM 5%g 30%w 65%m	0.46
60.00	GWCM 5%g 10%w 85%m	0.46
60.00	GWCM 1%g 5%w 94%m	0.46
211.00	GM 5%g 95%m	1.61

* Recovery from multiple tests

Gas Rates

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

DRILL STEM TEST REPORT

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65464 **DST#: 2**

Test Start: 2020.01.02 @ 16:29:19

GENERAL INFORMATION:

Formation: **Stolter**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 18:48:49
Time Test Ended: 01:38:19

Test Type: Conventional Bottom Hole (Reset)
Tester: Matt Smith
Unit No: 68

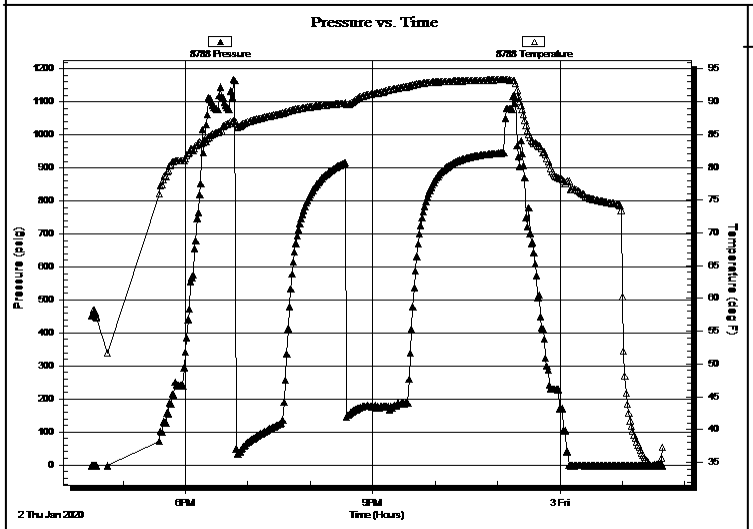
Interval: 2333.00 ft (KB) To 2475.00 ft (KB) (TVD)
Total Depth: 2475.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8788 **Outside**
Press@RunDepth: psig @ 2334.00 ft (KB)
Start Date: 2020.01.02 End Date: 2020.01.03
Start Time: 16:30:02 End Time: 01:38:57

Capacity: 8000.00 psig
Last Calib.: 2020.01.03
Time On Btm:
Time Off Btm:

TEST COMMENT: IF: Strong Blow . B.O.B. in 6 mins. Built to 62".
ISI: No Blow .
FF: Strong Blow . B.O.B. in 3 mins. Built to 132".
FF: No Blow .



PRESSURE SUMMARY

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

Recovery

Length (ft)	Description	Volume (bbl)
61.00	GMCW 20%g 30%m 50%w	0.46
61.00	GWCM 5%g 30%w 65%m	0.46
60.00	GWCM 5%g 10%w 85%m	0.46
60.00	GWCM 1%g 5%w 94%m	0.46
211.00	GM 5%g 95%m	1.61

* Recovery from multiple tests

Gas Rates

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

DRILL STEM TEST REPORT

FLUID SUMMARY

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65464 **DST#: 2**

Test Start: 2020.01.02 @ 16:29:19

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:	60000 ppm
Viscosity:	31.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	in³	Gas Cushion Type:			
Resistivity:	34000.00 ohm.m	Gas Cushion Pressure:	psig		
Salinity:	ppm				
Filter Cake:	0.20 inches				

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
61.00	GMCW 20%g 30%m 50%w	0.465
61.00	GWCM 5%g 30%w 65%m	0.465
60.00	GWCM 5%g 10%w 85%m	0.457
60.00	GWCM 1%g 5%w 94%m	0.457
211.00	GM 5%g 95%m	1.607

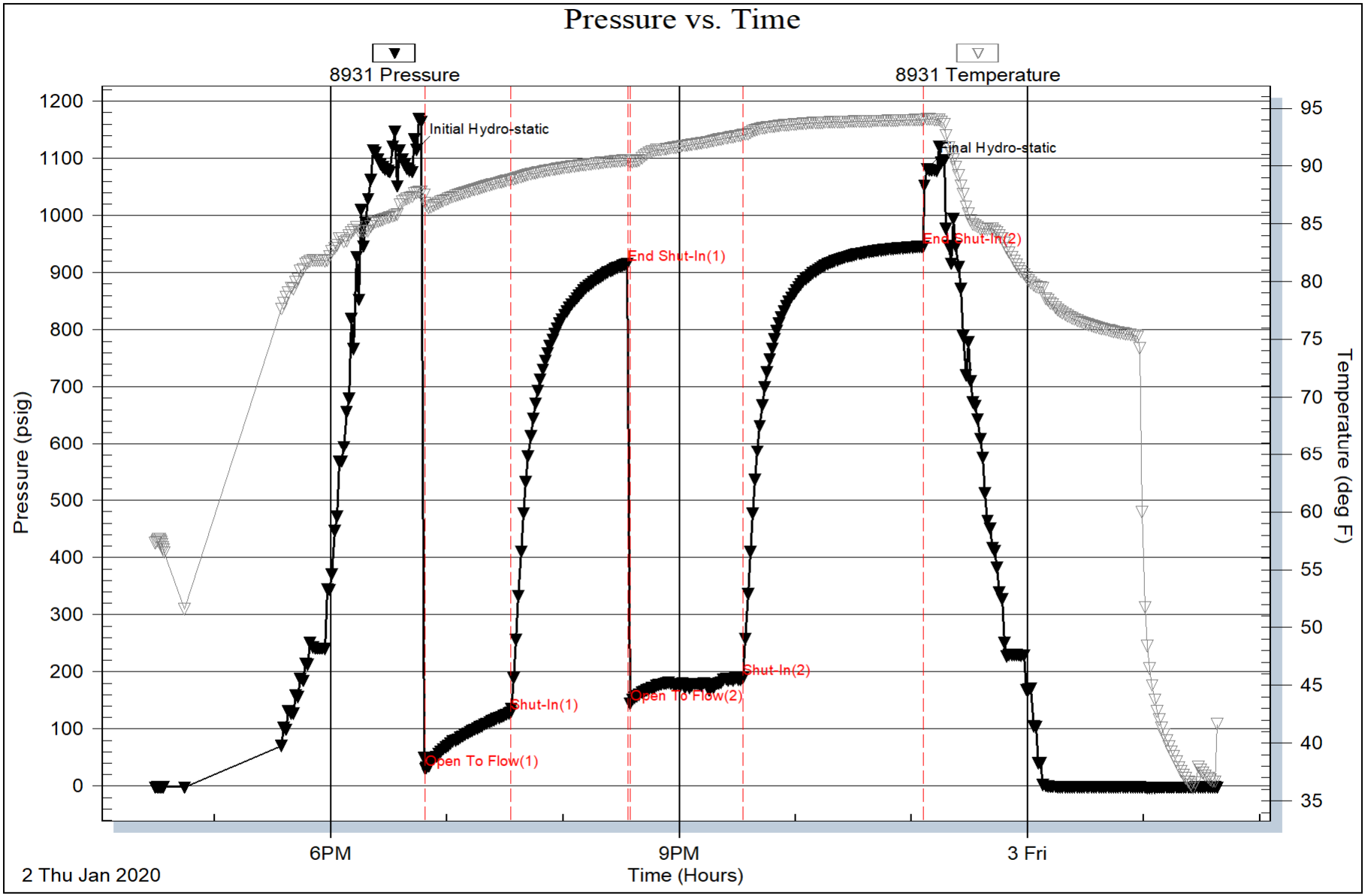
Total Length: 453.00 ft Total Volume: 3.451 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #: none

Laboratory Name: Laboratory Location:

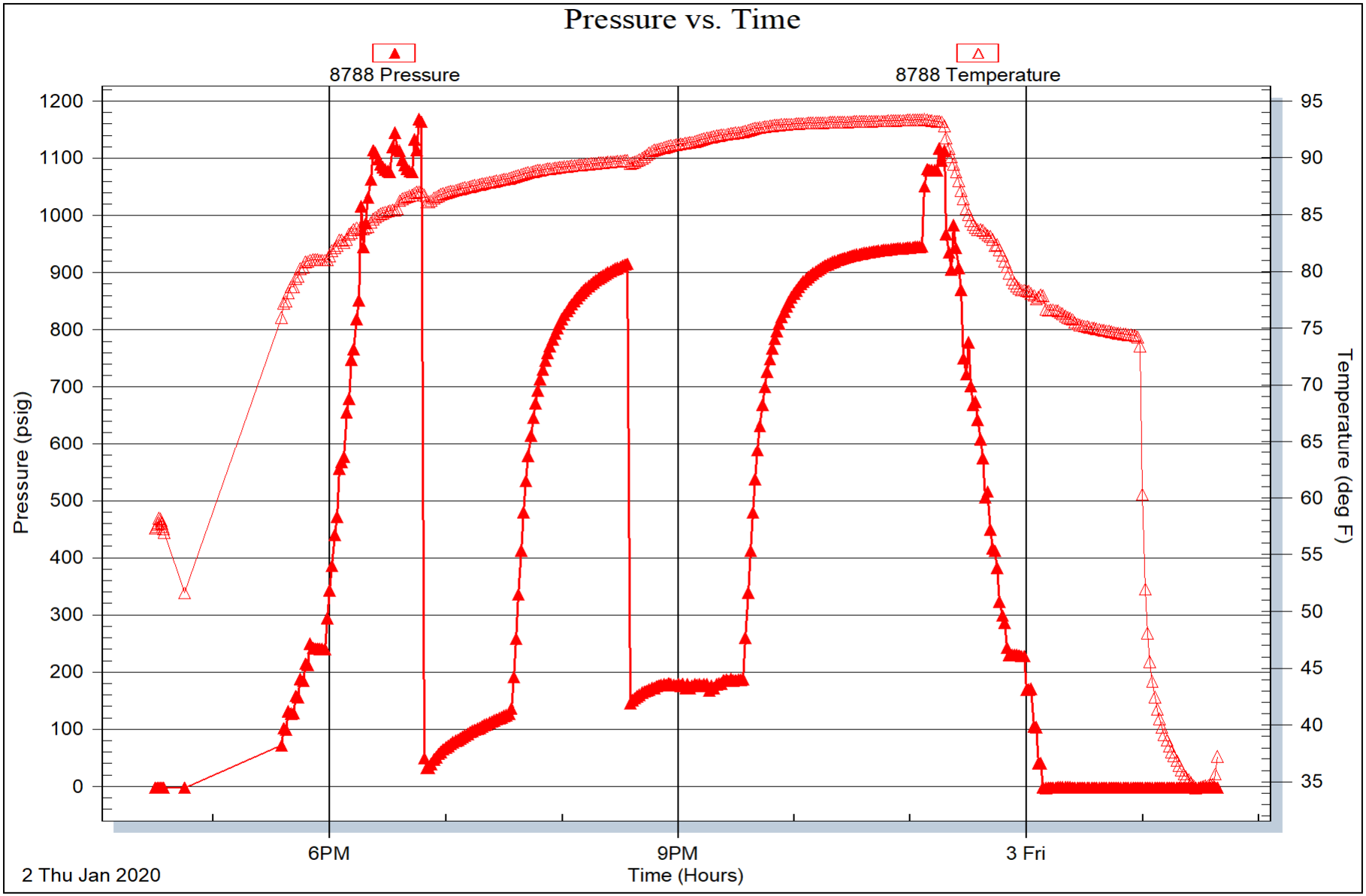
Recovery Comments: RW .25 @ 37.5 Degrees = 60,000 Chlorides.

Serial #: 8931 **Inside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 2



Trilobite Testing, Inc Ref. No: 65464 Printed: 2020.01.03 @ 07:17:24

Serial #: 8788 **Outside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 2



Trilobite Testing, Inc Ref. No: 65464 Printed: 2020.01.03 @ 07:17:24

DRILL STEM TEST REPORT

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65465 **DST#: 3**

Test Start: 2020.01.05 @ 00:08:06

GENERAL INFORMATION:

Formation: **Hertha**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 03:34:21
Time Test Ended: 10:42:06

Test Type: Conventional Bottom Hole (Reset)
Tester: Matt Smith
Unit No: 68

Interval: 3748.00 ft (KB) To 3772.00 ft (KB) (TVD)
Total Depth: 3772.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

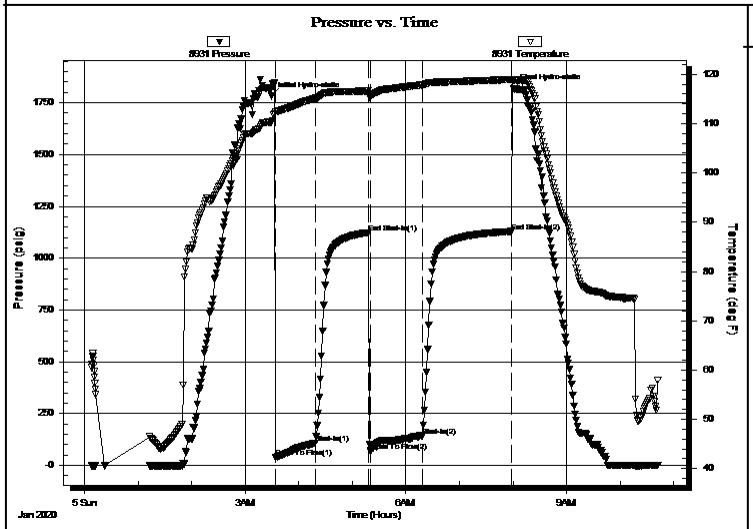
Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8931 **Inside**

Press@RunDepth: 139.26 psig @ 3749.00 ft (KB)
Start Date: 2020.01.05 End Date: 2020.01.05
Start Time: 00:08:11 End Time: 10:42:06

Capacity: 8000.00 psig
Last Calib.: 2020.01.05
Time On Btm: 2020.01.05 @ 03:29:21
Time Off Btm: 2020.01.05 @ 08:00:36

TEST COMMENT: IF: Strong Blow . B.O.B. in 2 mins. Built to 191.80".
ISI: Weak Blow . Built to 2.75".
FF: Strong Blow . B.O.B. in 1 min. Built to 205.35".
FSI: Weak Blow . Built to 3.14".



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1782.07	110.30	Initial Hydro-static
5	38.76	112.47	Open To Flow (1)
50	107.51	115.15	Shut-In(1)
109	1123.41	116.63	End Shut-In(1)
111	68.48	115.40	Open To Flow (2)
169	139.26	117.87	Shut-In(2)
269	1129.05	118.96	End Shut-In(2)
272	1818.70	118.79	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
60.00	GOWCM 25%g 40%o 30%w 5%m	0.46
60.00	GCOWCM 30%g 52%o 10%w 8%m	0.46
60.00	CO 100%o	0.46
120.00	GOCM 35%g 18%o 47%m	0.95
33.00	GOCM 5%g 10%o 85%m	0.46
0.00	2871' G.I.P. 100%g	0.00

* Recovery from multiple tests

Gas Rates

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

DRILL STEM TEST REPORT

TRILOBITE TESTING, INC.

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65465 **DST#: 3**

Test Start: 2020.01.05 @ 00:08:06

GENERAL INFORMATION:

Formation: **Hertha**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 03:34:21
Time Test Ended: 10:42:06

Test Type: Conventional Bottom Hole (Reset)
Tester: Matt Smith
Unit No: 68

Interval: 3748.00 ft (KB) To 3772.00 ft (KB) (TVD)
Total Depth: 3772.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

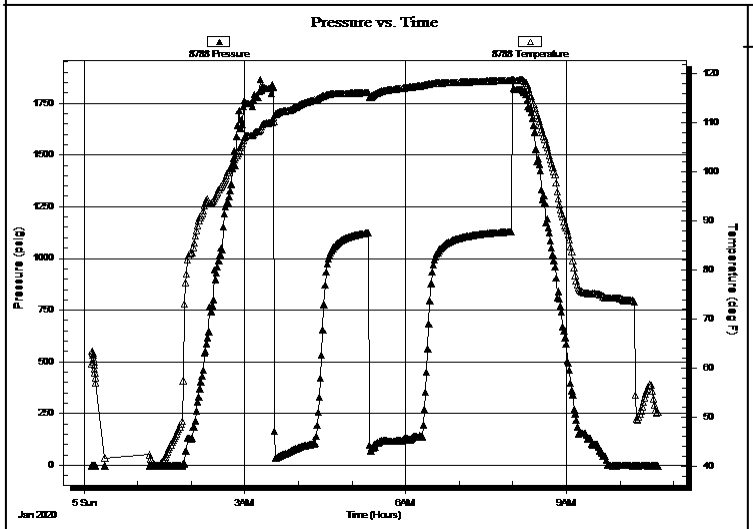
Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8788 **Outside**

Press@RunDepth: psig @ 3749.00 ft (KB)
Start Date: 2020.01.05 End Date: 2020.01.05
Start Time: 00:08:28 End Time: 10:42:23

Capacity: 8000.00 psig
Last Calib.: 2020.01.05
Time On Btm:
Time Off Btm:

TEST COMMENT: IF: Strong Blow . B.O.B. in 2 mins. Built to 191.80".
ISI: Weak Blow . Built to 2.75".
FF: Strong Blow . B.O.B. in 1 min. Built to 205.35".
FSI: Weak Blow . Built to 3.14".



PRESSURE SUMMARY

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

Recovery

Length (ft)	Description	Volume (bbl)
60.00	GOWCM 25%g 40%o 30%w 5%m	0.46
60.00	GCOWCM 30%g 52%o 10%w 8%m	0.46
60.00	CO 100%o	0.46
120.00	GOCM 35%g 18%o 47%m	0.95
33.00	GOCM 5%g 10%o 85%m	0.46
0.00	2871' G.I.P. 100%g	0.00

* Recovery from multiple tests

Gas Rates

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

DRILL STEM TEST REPORT

FLUID SUMMARY

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65465 **DST#: 3**

Test Start: 2020.01.05 @ 00:08:06

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:	4000 ppm
Viscosity:	43.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	in³	Gas Cushion Type:			
Resistivity:	4000.00 ohm.m	Gas Cushion Pressure:	psig		
Salinity:	ppm				
Filter Cake:	0.20 inches				

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
60.00	GOWCM 25%g 40%o 30%w 5%m	0.457
60.00	GCOWCM 30%g 52%o 10%w 8%m	0.457
60.00	CO 100%o	0.457
120.00	GOCM 35%g 18%o 47%m	0.952
33.00	GOCM 5%g 10%o 85%m	0.463
0.00	2871' G.I.P. 100%g	0.000

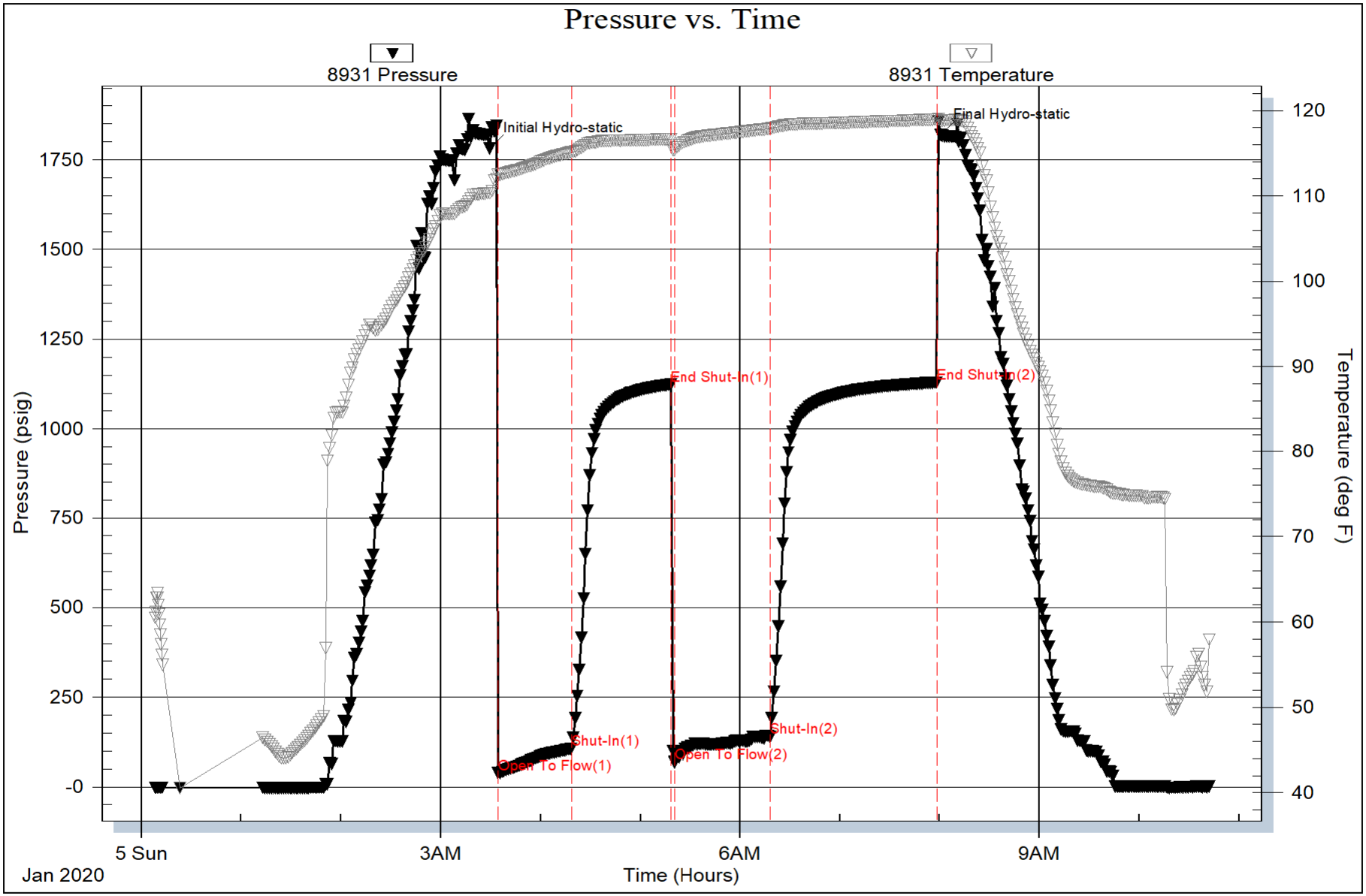
Total Length: 333.00 ft Total Volume: 2.786 bbl

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

Laboratory Name: Laboratory Location:

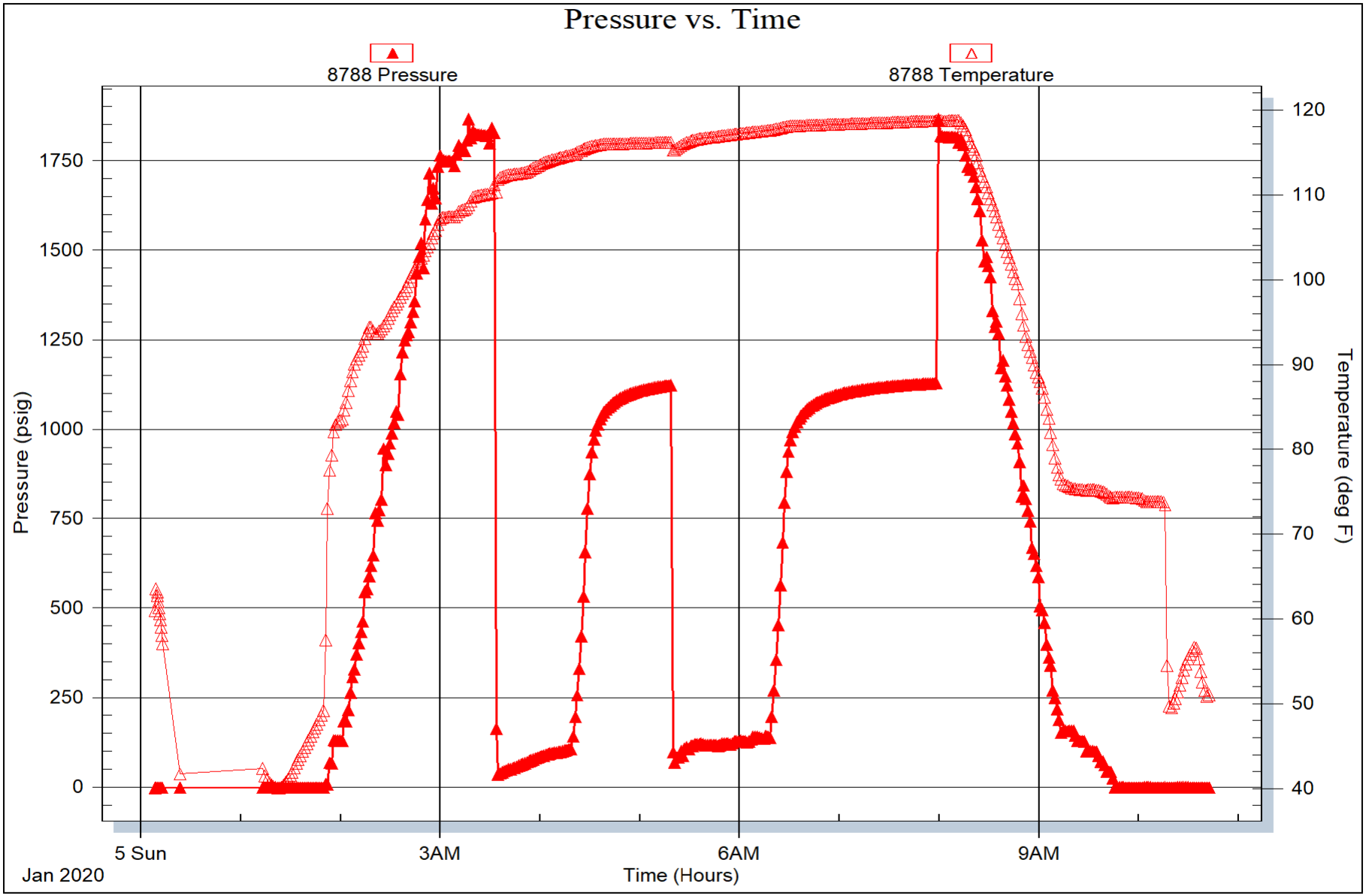
Recovery Comments: 37 @ 56 Degrees = 37.4 Gravity Corrected.

Serial #: 8931 **Inside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 3



Trilobite Testing, Inc Ref. No: 65465 Printed: 2020.01.05 @ 21:59:34

Serial #: 8788 **Outside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 3



Trilobite Testing, Inc Ref. No: 65465 Printed: 2020.01.05 @ 21:59:34

DRILL STEM TEST REPORT

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65465 **DST#: 4**

Test Start: 2020.01.06 @ 08:29:17

GENERAL INFORMATION:

Formation: **Mississippi**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 10:51:02
Time Test Ended: 17:28:17

Test Type: Conventional Bottom Hole (Reset)
Tester: Matt Smith
Unit No: 68

Interval: 3982.00 ft (KB) To 4055.00 ft (KB) (TVD)
Total Depth: 4055.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

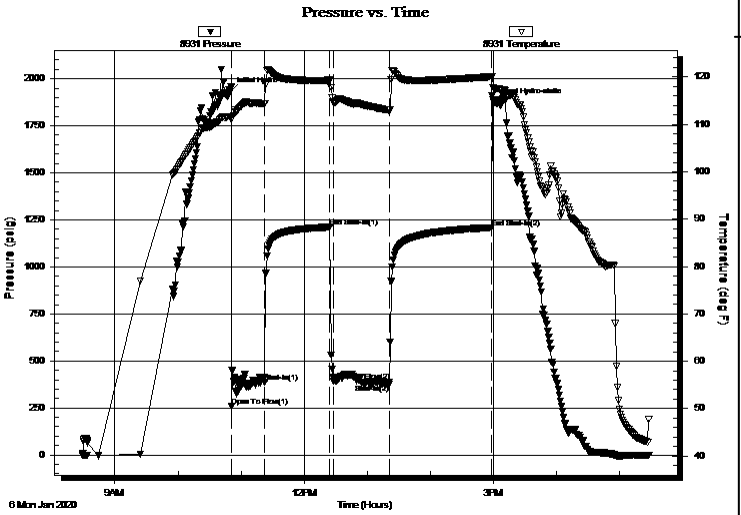
Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8931 **Inside**

Press@RunDepth: 376.20 psig @ 3983.00 ft (KB)
Start Date: 2020.01.06 End Date: 2020.01.06
Start Time: 08:29:22 End Time: 17:28:17

Capacity: 8000.00 psig
Last Calib.: 2020.01.06
Time On Btm: 2020.01.06 @ 10:49:32
Time Off Btm: 2020.01.06 @ 15:00:32

TEST COMMENT: IF: Strong Blow . B.O.B. in 30 secs. G.T.S. in 6 mins. Gauged Gas.
ISI: Weak Blow . Built to 3.44".
FF: Strong Blow . B.O.B. immediaely. G.T.S. Gauged Gas.
FSI: No Blow .



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1932.46	111.59	Initial Hydro-static
2	257.02	110.96	Open To Flow (1)
33	388.75	114.35	Shut-In(1)
95	1211.75	119.32	End Shut-In(1)
99	394.13	114.61	Open To Flow (2)
152	376.20	112.98	Shut-In(2)
248	1208.66	120.05	End Shut-In(2)
251	1872.47	117.47	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
64.00	GOspecM 15%g 85%m	0.90
63.00	GOspecM 10%g (0%m	0.88
63.00	GOspecM 5%g 95%m	0.88
31.00	DM 1005m	0.43

* Recovery from multiple tests

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (Mcf/d)
First Gas Rate	0.50	157.04	1156.48
Last Gas Rate	0.63	129.94	1544.55
Max. Gas Rate	0.50	217.81	1566.42

DRILL STEM TEST REPORT

TRILOBITE TESTING, INC.

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65465 **DST#: 4**

Test Start: 2020.01.06 @ 08:29:17

GENERAL INFORMATION:

Formation: **Mississippi**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 10:51:02
Time Test Ended: 17:28:17

Test Type: Conventional Bottom Hole (Reset)
Tester: Matt Smith
Unit No: 68

Interval: 3982.00 ft (KB) To 4055.00 ft (KB) (TVD)
Total Depth: 4055.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Fair

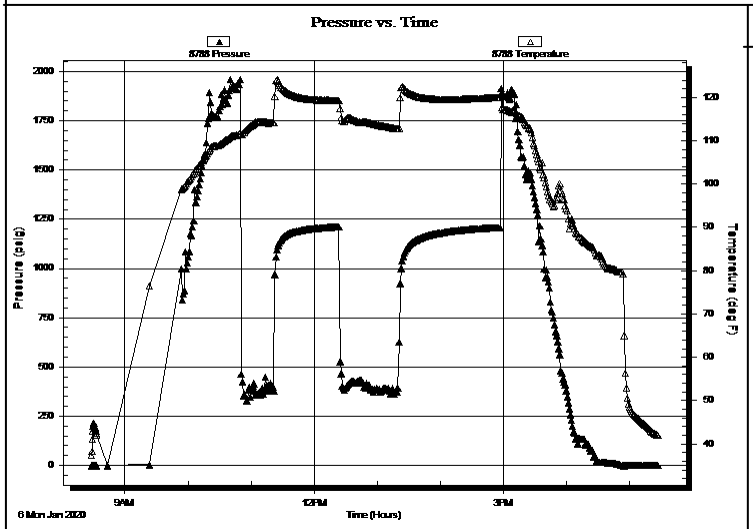
Reference Elevations: 1623.00 ft (KB)
1611.00 ft (CF)
KB to GR/CF: 12.00 ft

Serial #: 8788 **Outside**

Press@RunDepth: psig @ 3983.00 ft (KB)
Start Date: 2020.01.06 End Date: 2020.01.06
Start Time: 08:28:24 End Time: 17:27:19

Capacity: 8000.00 psig
Last Calib.: 2020.01.06
Time On Btm:
Time Off Btm:

TEST COMMENT: IF: Strong Blow . B.O.B. in 30 secs. G.T.S. in 6 mins. Gauged Gas.
ISI: Weak Blow . Built to 3.44".
FF: Strong Blow . B.O.B. immediaely. G.T.S. Gauged Gas.
FSI: No Blow .



PRESSURE SUMMARY

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

Recovery

Length (ft)	Description	Volume (bbl)
64.00	GOspecM 15%g 85%m	0.90
63.00	GOspecM 10%g (0%m	0.88
63.00	GOspecM 5%g 95%m	0.88
31.00	DM 1005m	0.43

* Recovery from multiple tests

Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (Mcf/d)
First Gas Rate	0.50	157.04	1156.48
Last Gas Rate	0.63	129.94	1544.55
Max. Gas Rate	0.50	217.81	1566.42

DRILL STEM TEST REPORT

FLUID SUMMARY

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65465 **DST#: 4**

Test Start: 2020.01.06 @ 08:29:17

Mud and Cushion Information

Mud Type:	Gel Chem	Cushion Type:		Oil API:	deg API
Mud Weight:	10.00 lb/gal	Cushion Length:	ft	Water Salinity:	3000 ppm
Viscosity:	31.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	in³	Gas Cushion Type:			
Resistivity:	109000.00 ohm.m	Gas Cushion Pressure:	psig		
Salinity:	ppm				
Filter Cake:	0.20 inches				

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
64.00	GOspecM 15%g 85%m	0.898
63.00	GOspecM 10%g (0%m	0.884
63.00	GOspecM 5%g 95%m	0.884
31.00	DM 1005m	0.435

Total Length: 221.00 ft Total Volume: 3.101 bbl

Num Fluid Samples: 1 Num Gas Bombs: 1 Serial #: P5 Pratt
Laboratory Name: Laboratory Location:
Recovery Comments:

DRILL STEM TEST REPORT

GAS RATES

Vincent Oil Corporation

200 W. Douglas Ave *725
Wichita, Ks. 67202

ATTN: Tom Dudgeon

22-28s-8w Kingman, Co. Ks.

Fairchild 1-22

Job Ticket: 65465 **DST#: 4**

Test Start: 2020.01.06 @ 08:29:17

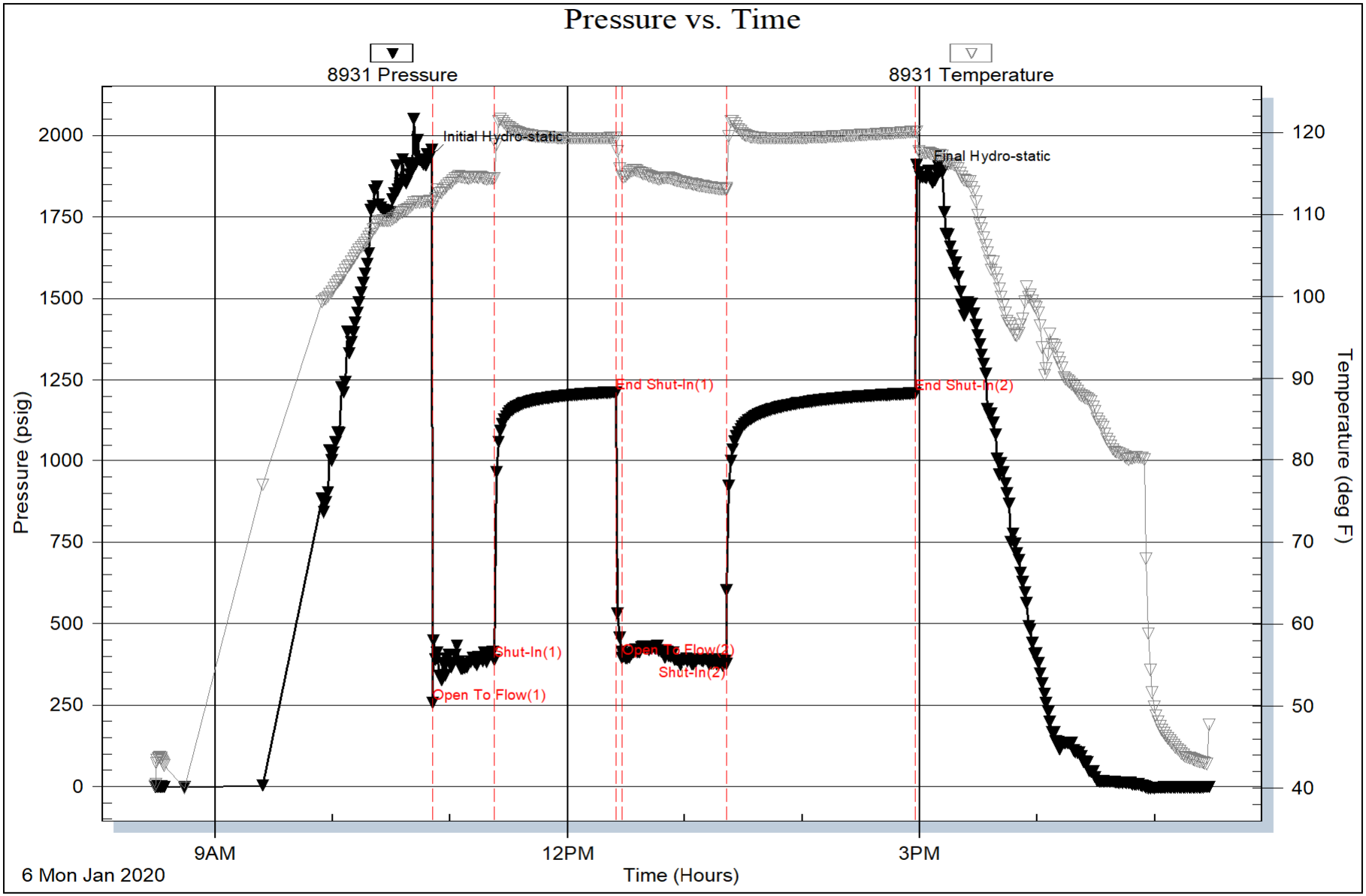
Gas Rates Information

Temperature: 59 (deg F)
Relative Density: 0.65
Z Factor: 0.8

Gas Rates Table

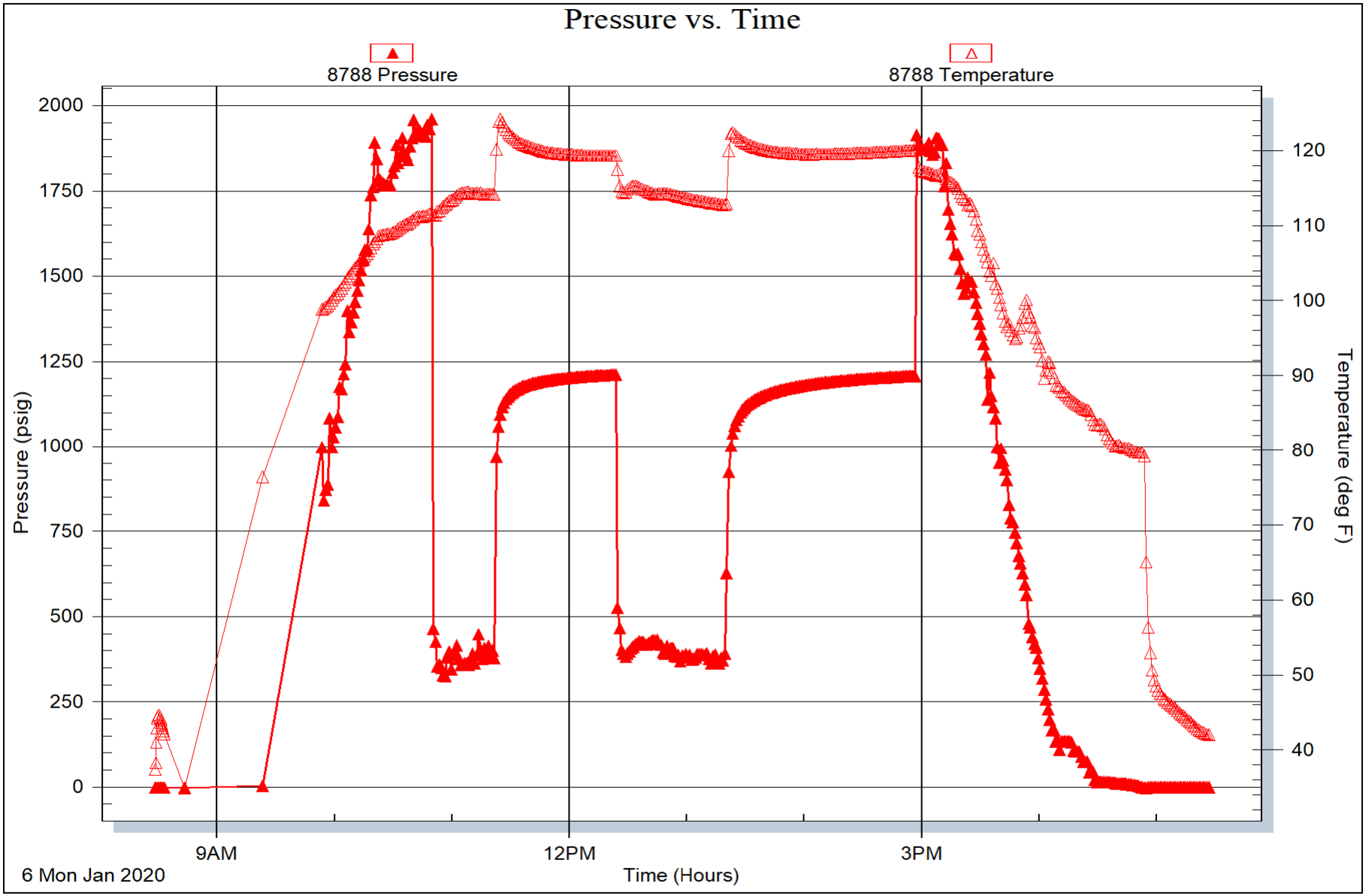
Flow Period	Elapsed Time	Choke (inches)	Pressure (psig)	Gas Rate (Mcf/d)
1	10	0.50	157.04	1156.48
1	20	0.50	184.97	1344.89
1	30	0.50	186.85	1357.57
2	10	0.50	193.31	1401.15
2	20	0.50	217.81	1566.42
2	40	0.63	133.79	1585.74
2	50	0.63	130.85	1554.28
2	60	0.63	129.94	1544.55

Serial #: 8931 **Inside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 4



Trilobite Testing, Inc Ref. No: 65465 Printed: 2020.01.06 @ 18:37:49

Serial #: 8788 **Outside** Vincent Oil Corporation Fairchild 1-22 DST Test Number: 4



Trilobite Testing, Inc Ref. No: 65465 Printed: 2020.01.06 @ 18:37:50

Scale 1:240 Imperial

Well Name:	FAIRCHILD 1-22		
Surface Location:	350' FNL 2565' FEL 22-28S-8W		
Bottom Location:			
API:	15-095-22333-00-00		
License Number:	5004		
Spud Date:	12/27/2019	Time:	8:52 AM
Region:	MID CON		
Drilling Completed:	1/8/2020	Time:	12:08 AM
Surface Coordinates:			
Bottom Hole Coordinates:			
Ground Elevation:	1599.00ft		
K.B. Elevation:	1611.00ft		
Logged Interval:	1300.00ft	To:	4500.00ft
Total Depth:	4500.00ft		
Formation:	HERTHA		
Drilling Fluid Type:			

OPERATOR

Company:	VINCENT OIL CORPORATION		
Address:	200 W DOUGLAS AVE STE 725 WICHITA, KS 67202		
Contact Geologist:	DICK JORDAN		
Contact Phone Nbr:	316.262.3573		
Well Name:	FAIRCHILD 1-22		
Location:	350' FNL 2565' FEL 22-28S-8W		
API:	15-095-22333-00-00		
Pool:	DEVELOPMENT	Field:	GARLISCH SW
State:	KS	Country:	USA

CONTRACTOR

Contractor:	DUKE DRILLING CO., INC.		
Rig #:	1		
Rig Type:	MUD ROTARY		
Spud Date:	12/27/2019	Time:	8:52 AM
TD Date:	1/8/2020	Time:	12:08 AM
Rig Release:	1/8/2020	Time:	11:15 PM

LOGGED BY

Company:	VINCENT OIL CORPORATION		
Address:			
Phone Nbr:	316.262.3573		
Logged By:	Geologist	Name:	TOM DUDGEON

ELEVATIONS

K.B. Elevation:	1611.00ft	Ground Elevation:	1599.00ft

K.B. Elevation:	1611.00ft	Ground Elevation:	1599.00ft
K.B. to Ground:	12.00ft		

SURFACE CO-ORDINATES

Well Type:	Vertical	
Longitude:	-98.1807579	NAD27
Latitude:	37.6025873	NAD27
N/S Co-ord:		
E/W Co-ord:		

TOTAL DEPTH

Measurement Type:	Measurement Depth:	TVD:
RTD	4500.00	4504.00
LTD	4504.00	4504.00

DRILLING FLUID SUMMARY

Type	Date	From Depth	To Depth
	12/27/2019	0.00ft	0.00ft

CASING SUMMARY

	Surface	Intermediate	Main
Bit Size	12.25 in		7.88 in
Hole Size	12.25 in		7.88 in

	Size	Set At	Type	# of Joints	Drilled Out At
Surf Casing	8.625 in	309' ft	23#	7	12/30/2019 2:45 AM
Int Casing					
Prod Casing	4.5 in	4495 ft	11.6	102	1/8/2020 11:15 PM

CASING SEQUENCE

Type	Hole Size	Casing Size	At
SURFACE	12.25 in	8.63	309.00 ft
PRODUCTION	7.88 in	4.50	4495.00 ft

OPEN HOLE LOGS

Logging Company:	ELI WIRELINE		
Logging Engineer:	JEFF LUEBBERS		
Truck #:	922339		
Logging Date:	1/8/2020	Time Spent:	6
# Logs Run:	4	# Logs Run Successful:	4

LOGS RUN

Tool	Logged Interval	Logged Interval	Hours	Remarks	Run #
DUAL INDUCTI(	0.00ft	4504.00ft	3.00		1
NDE/NEU/PE	1300.00ft	4504.00ft	3.00		1
MICRO	1300.00ft	4504.00ft	3.00		2
SONIC	0.00ft	4504.00ft	3.00		2

LOGGING OPERATION SUMMARY

Date	From	To	Description Of Operation
12/27/2019	0.00ft	4504.00ft	LOGS RUN SUCCESSFULLY

NOTES

REFERENCE WELLS:

A	B
Vincent Oil Corp.	Vincent Oil Corp. . 1° 3772'
Maloney #1-15	Simons #3-22
1050' FSL & 1275' FWL	150' E of E/2-NE-NE
15-28S-8W	22-28S-8W

Top		Depth	Datum	Struct/ A	Struct/ B
Chase		1424	187	-13	-19
Winf		1483	129	-9	-19

Winf		1482	129	-9	-19
Tow		1546	65	-2	-9
B/Flor		1669	-58	2	-6
Cottnwd		1871	-260	4	-4
Red Eagle		2051	-440	4	-3
Onaga		2201	-590	-3	-10
Ind. Cave		2211	-600	1	-15
Wabun.		2241	-630	3	-8
Stotler		2389	-778	2	-10
Howard		2639	-1028	4	-5
Topkea		2769	-1158	1	-4
Heebner		3150	-1539	2	-7
BL		3360	-1749	2	-7
Lans		3373	-1762	1	-2
Stark		3715	-2104	-2	FLT
Hush		3754	-2143	FLT	-1
Cher		3955	-2344	-2	1
Miss		4033	-2422	-3	28
Miss Lm		4131	-2520	6	6
Kind		4216	-2605	FLT	16
Viola		4389	-2778	-11	5
Simp Sd		4442	-2831	-10	-16

STRAIGHT HOLE SURVEY

Degree	Depth
1°	823'
3/4°	1450'
3/4°	2017'
3/4°	2475'
1°	2975
1°	3772'

12/30/2019 Completed rig up and mixed mud. Spud well in at 10:30 Am 12/30/2019. Drilled 12.25" surface hole to 310', CTCH. Ran wiper trip. CTCH, TOOH. Ran 7 joints of new 8 5/8", 23# surface casing, set at 309' and cemented with 275 sx 60 / 40 POZ (2% Gel, 3% CC & 1/4# Cel-flake/sx). Plug down at 6:15 PM 12/30/2019. WOC, drilled out from under surface casing plug at 2:45 AM 12/31/2019

12/31/2019 At 573', Drilling ahead, drilled to 1450', CFS, Ran short trip, CTCH. Spotted 40 bbls Mud to condition wellbore for test. TOOH for DST #1 1375' to 1450' (Chase)

1/1/2020 At 1450', Preparing to trip in hole following DST #1 1375' to 1450'.

1/2/2020 At 2270', Drilling ahead, drilled to 2475', preparing for DST #2 2333' to 2475' (Stotler)

1/3/2020 At 2616', Drilling ahead following DST #2 2333' to 2475' (Stotler)

Displaced mud system at 2995'

1/4/2020 At 3475', Drilling ahead, drilled ahead to 3772,circulated for samples, TOOH with bit, preparing for DST #3 3748' to 3772' (Hertha Limestone)

1/5/2020 At 3773', DST #3 3748' to 3772' (Hertha Limestone), in progress. TOOH with test tool.

1/6/2020 At 4055', Preparing for DST #4 3983' to 4055' (Mississippian)

1/7/2020 At 4258', Drilling ahead, drilled to 4500', RTD, CTCH, TOOH for logs

1/8/2020 At 4500', RTD, ran electric logs (DIL, Density-Neutron, Micro-log, & Sonic), LTD at 4504',

Following completion of logging operations tripped back in hole with drill pipe & drill collars, and CTCH. Rigged up casing crew and TOOH laying down drill pipe and drill collars. Nippled down BOP. Ran 102 joints of new 4.5", 11.6# production casing. Set casing at 4495' and CTCH. Rigged up cementers and plugged the rathole with 30 sx and plugged the mousehole with 20 sx. Pumped 200 sx Pro C cement, released plug and displaced with 60 bbls of 2% KCL water. Plug landed at 1100# and pressured up to 1600 #. Plug held. Plug was down at 11:15 PM 1/8/2020. Cleared pits and released rig.

ROCK TYPES

Cht, Coal, Dolprim, Dolsec, Gyp, Lmst fw<7, Lmst fw7>, Ss, Shgy, Shblck, Shcol

ACCESSORIES

MINERAL
Dolomitic

STRINGER
Sandstone

OTHER SYMBOLS

POROSITY TYPE
Intercrystalline
Interoolitic
Vuggy
Pinpoint
Moldic
Organic
Fracture
Earthy
Fenestral

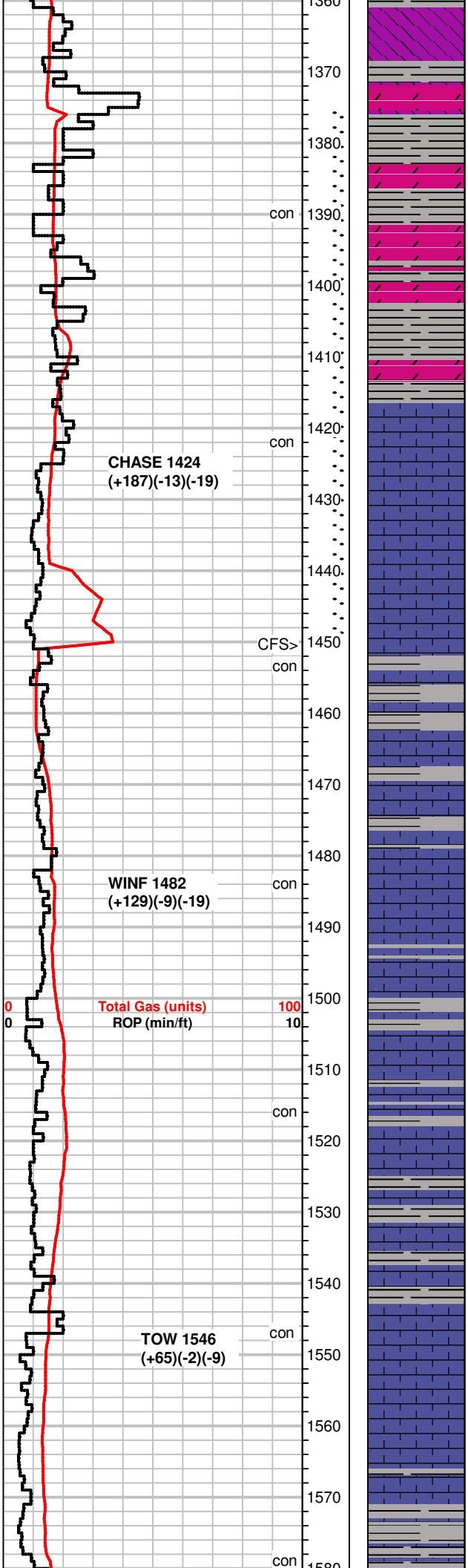
OIL SHOWS
Even Stn
Spotted Stn 50 - 75 %
Spotted Stn 25 - 50 %
Spotted Stn 1 - 25 %
Questionable Stn
Dead Oil Stn
Fluorescence

INTERVALS
Core
DST

Printed by GEOstrip VC Striplog version 4.0.8.15 (www.grsi.ca)

Curve Track #01
Total Gas (units)
ROP (min/ft)
1:240 Imperial

Depth | Intervals	Cored Interval	DST Interval	Porosity Types	Interpreted Lithology	Oil Shows	Geological Descriptions	Comment
0 Total Gas (units) 100 0 ROP (min/ft) 10							
1260						**Geo on location @ 3:00 PM 12/31/2019**	
1270							
1280							
1290							
1300							
1310							
1320							
con 1330						SH, grays, silty to sandy, mostly Gypsum	
1340						SH, gray to blk, silty, rare green pcs, mostly Gypsum	
1350						Gypsum A.A., SH, grays	
con 1360							



SH, blk to grays, silty, Gypsum

rare Dolo, brn to tan, gray, vf-xln, dense, fossils, moldic por., hard
SH, gray to brn, Gypsum

+6 UGK

Dolo, gray, fossils, mic-xln, hard, , still carrying mostly SH, A.A., and Gypsum

Dolo, brn to grayn, A.A., lesser
SH, grays to blk, silty to sandy in pt.

SH, blk to gray, green pcs scatt, silty, Gypsum

Dolo, gray to crm, hard, mic-xln, dense, SH, blk to grays, silty, striated pcs, still carrying Gypsum

SH, gray to green, silty to sandy pcs.

MS, gray to crm, f-xln

MS, grays to crm, vf-xln, dense,

MS, crm to grays, hard, vf-xln, gritty, some pcs chalky, very poor sample quality

+19 UGK

+22 UGK

Mostly SH, blk to grays, sandy to gritty, MS-WS, crm to brn, scatt fossils, pyrite

DST #1 1375-1450
30-60-30-60
WB blt to 6 in.
NBB
WB blt to 5 in.
NBB
Rec: 6' Mud
IH 678#
IF 15-22#
ISIP 65#
FF 15-18#
FSIP 49#
FH 633#
Temp 76*F
Cl 109,000 ppm

SH, gray to green, silty, pyrite

MS, crm to lt. gray, f-xln, hard, gritty to shaly pcs, NS

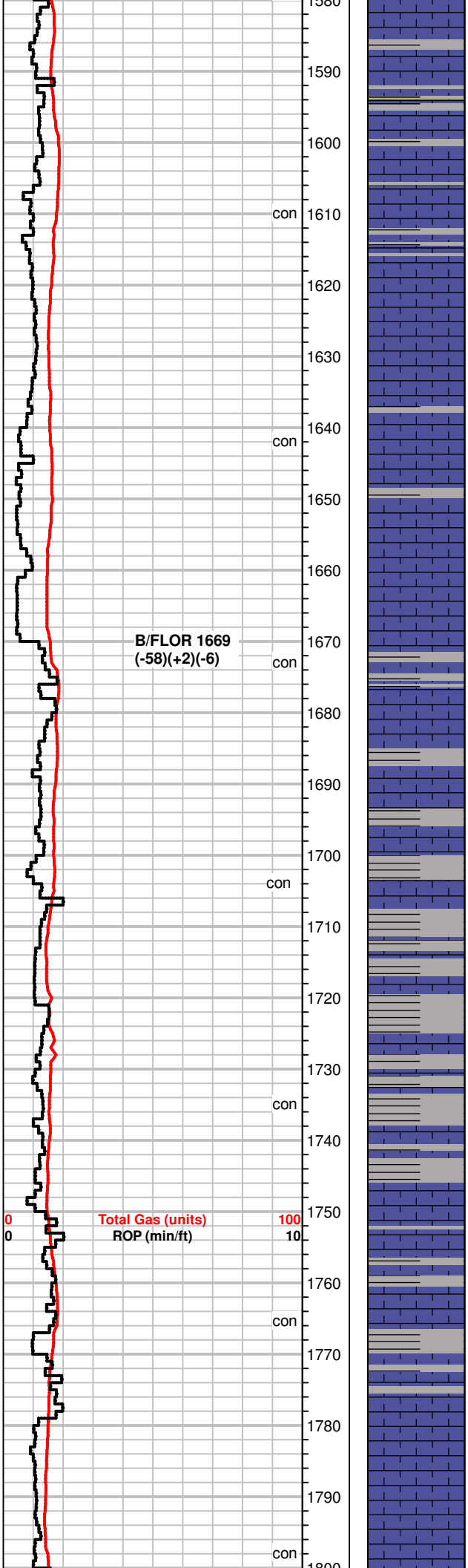
MS, crm to tan, f-xln, hard, fossil frgmts
SH, gray to green, maroon, limey pcs

MS-WS,crm to tan, grays, f-xln to m-xln, fossilif., oolitic pcs, Chert, brn
SH, lesser pcs, gray, silty

SH, gray to green, gritty pcs, some limey in pt., MS, gray to crm, f-xln, chalky, samples washed red, very poor quality

WS-MS, crm to lt. gray, sandy, m-xln, fossilif, friable pcs, dull fluor, NS
SH, grays, sandy

MS-WS, lt. gray to crm, f-xln, hard to friable pcs, sandy A.A., fossils scatt, most pcs gritty, NS
SH, grays, rare green



MS-WS, crm to tan, lt. grays pcs scatt, f-xln, mostly SH in sample tray (>90%)

MS, crm, vf-xln, earthy to dense pcs, scatt fossils, still carrying 90% or more SH, grays

Mostly SH, grays, some MS< crm, tan, f-xln to chalky, dense, hard, NS

sample tray is mostly SH, grays, rare MS, crm, chalky to earthy pcs, scatt dense, hard pcs, scatt fossils, NS

MS, crm to tan, off wht, gritty to earthy, firm to hard, fossils, NS SH, grays gritty

MS-WS, crm to tan, lt. gray, earhty pcs, some f-xln, hard, scatt fossils, gritty pcs, SH, grays, gypsum

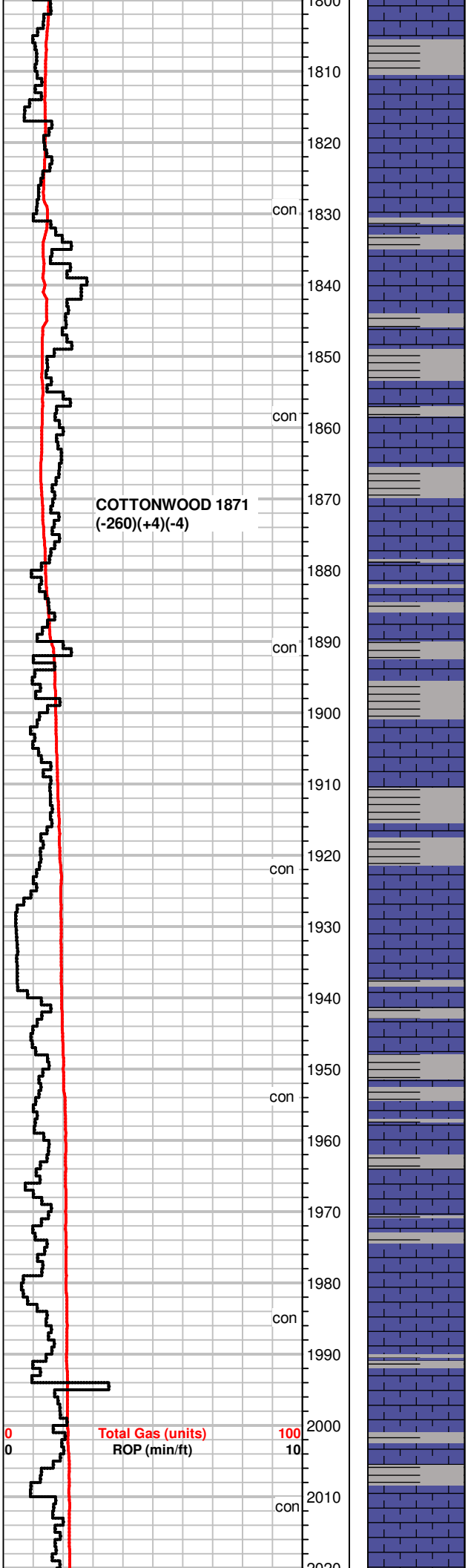
MS, crm to brn, tan, hard, dense, some gritty pcs, fossilif., sample tray washed red

Sample tray mostly SH, grays, very poor sample quality

MS, crm to off wht, hard, f-xln, sub oolitic to fossilif pcs, dense, dull fluor, NS, Chert, wht to gray, fossils, scatt SH, grays

mostly SH in sample tray, scatt MS, brn to crm, vf-xln to massive, dense, scatt fossils, NS

MS-WS, crm to brn, lt. gray, gritty to f-xln, firm to friable pcs, some sandy looking, fossils scatt, dull fluor rare, some pcs dense, NS SH, grays



MS, crm to tan, f-xln to partly chalky, firm, scatt fossils, some pcs. lt. gray, hard, dense, SH, gray to red, samples washed red

SH, grays, MS, tan, f-xln, dense sub oolitic pcs, NS

MS, crm to tan, firm to hard, scatt fossils, some pcs dense, partly chalky, Chert, brn

SH, red, gray, brn
MS, crm to lt. gray, brn, f-xln, hard, dense, NS

MS, lt. grayto crm, f-xln, dense, some pcs chalky, sub oolitic
SH, grays

MS, lt. gray to crm, f-xln to chalky, shaly in pt., dense to brittle, NS
SH, grays

POOR SAMPLE
Mostly SH, grays, some MS, A.A.

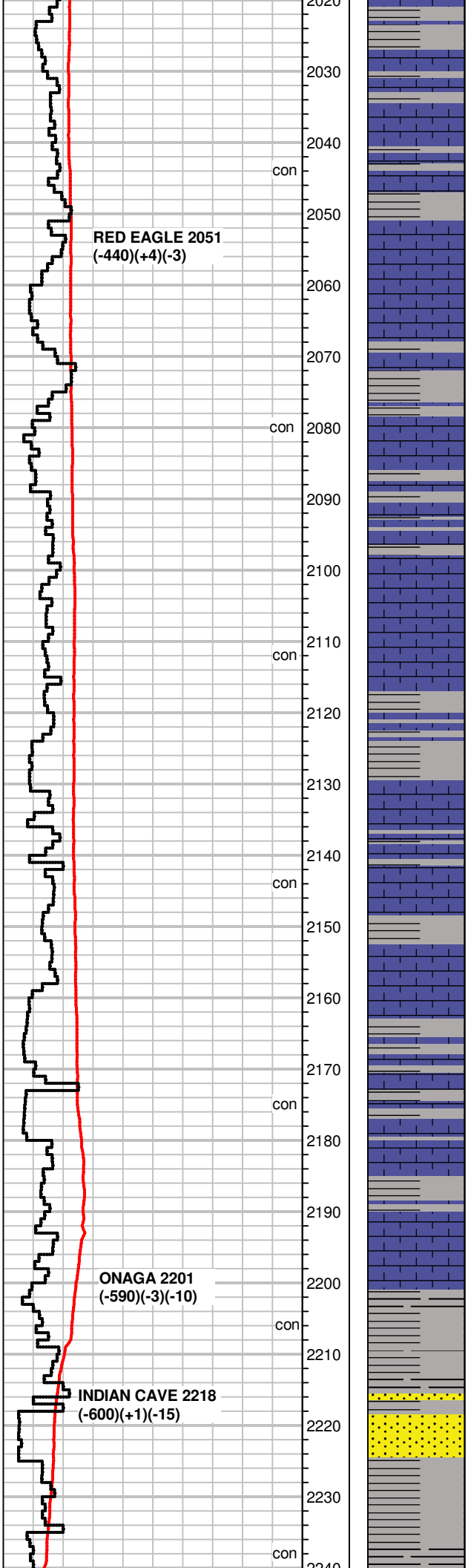
MS, crm to gray, brn, f-xln, massive to earthy, some sandy, dense, hard, NS
SH, grays, sandy

washed red, POOR SAMPLE, MS, gray to crm, dense, massive, f-xln, hard, fossils, NS, Chert, gray, fossils

MS-WS, crm to tan, f-xln, suboolitic/fossilif, dense, mineral fluor, NS
some SH, red, grays

WORK ON PUMP

SH, gray to dk. gray, gritty pcs scatt
MS, crm to gray, massive, dense, fossils, calcite, Chert, wht



SH, dk. grays
MS, crm to brn, gray, f-xln, hard, chaly pcs scatt, fossilif.

MS, crm to off wht, gray, chalky to esarthy, fossils, firm to hard, NS
some SH, gray

MS-WS, crm to lt. gray, f-xln to chalky, massive/dense, m-gr oolitic, hard, NS, some SH, grays

MS-WS, crm to lt. gray, f-xln, m-gr oolitic, A.A., NS< hard, scatt SH, grays, brn, silty, calcite

Fresh SH, dk. grays, MS-WS, crm to off wht, tan, sandy inpt., most f-xln/massive, hard, m-gr oolitic in titce calc mtrx, NS

MS, lt. gray to tan, f-xln, m-gr oolitic, hard, NS
SH, grays, silty to limey in pt.

MS, gray to crm, f-xln to dense, scatt fossils, m-gr oolitic, gray ringed ooids
some SH, grays

MS, crm to brn, scatt grays, f-xln massive to earthy, dense, hard, scatt fossils, some pcs chalky, crinoids, SH, grays, silty,

MS, brn to crm, tan, dense to firm, some fossilif. pcs, crinoids, pyrite, SH, grays, some sea green, sandy in pt.

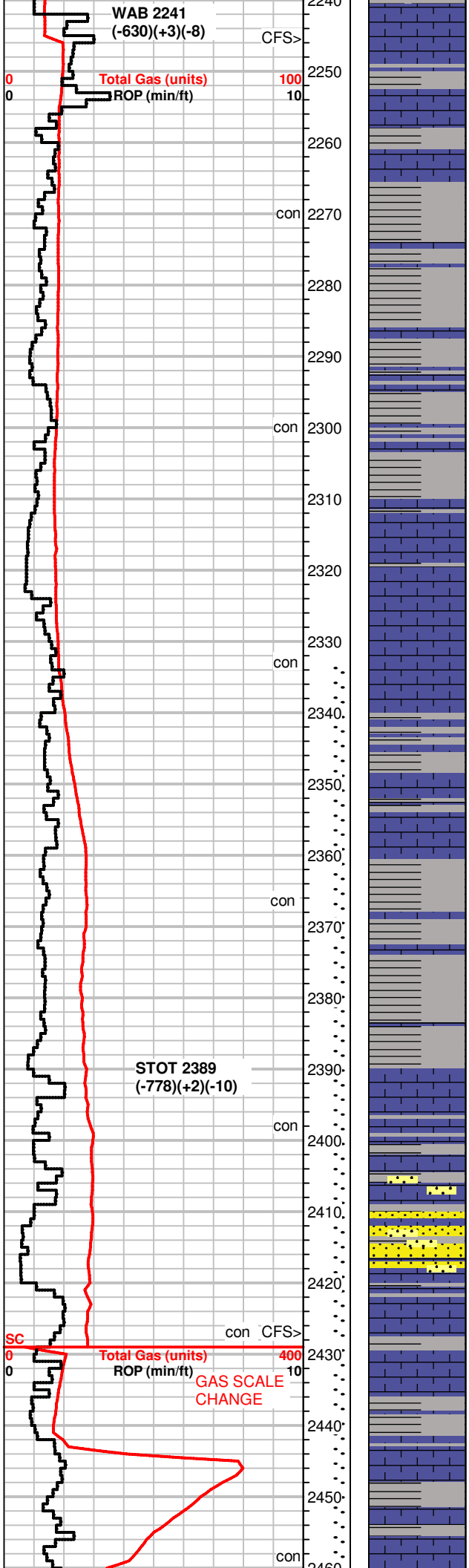
MS, crm to brn, gray, f-xln some chalky, fossils scatt.
SH, grays, dk. gray, some silty

SH, grays, sandy to silty

SS, gray to opaque, f to m-gr, well sorted to fair sorted, sub rounded, mineral specs, NS

mostly SH, grays to dk. gray, sandy in pt.

SH, dk gray to gray, silty to sandy, lesser SS clusters, gray to opaque, shaly



MS, brn to gray, shaly, hard, f-xln to earthy, NS

SH, lt. gray to gray, sandy to silty
MS, crm to tan, f-xln to m-xln, hard, some massive, dense, NS

MS, crm to tan, massive to chalky, hard/dense, scatt fossils, Chert, gray dull fluor, NS
most of smaple tray is SH, grays

SH, gray to green
some MS, crm to tan, lt. gray, f-xln, dense, some pcs massive, fossils, dull mineral fluor, NS

SH, grays, blk, pyrite
MS, crm to gray, f-xln to chalky, dense to brittle, scatt fossils, NS

some MS, crm to tan, f-xln, massive to chalky some pcs oolitic, gritty to shaly
SH, dk. gray to gray, silty, green

MS-WS, crm to off wht, f-xln, hard, micro oolitic
SH, grays, sandy to silty

sample tray mostly SH, gray, A.A., sandy
MS, lt. gray to crm, scatt dense/massive pcs, some chalky, f-xln, girtty in pt., SS clusters, gray, f-gr, well srtd, NS

SH grays. A.A.
MS, crm to off wht, f-xln, chalky, firm, fossilif., some soft, dull fluor,

SS clusters, opaque to gray, f-gr, friable, pyrite, MS, crm to tan, gray, f-xln, dense, fossils, dull fluor, no cut, no odor
SH, grays, sandy

SH, gray to brn, green, pyrite
SS clusters, f-gr, well srtd, MS, crm to gray, brn, f-xln, massive pcs, fossils, dull fluor, NS

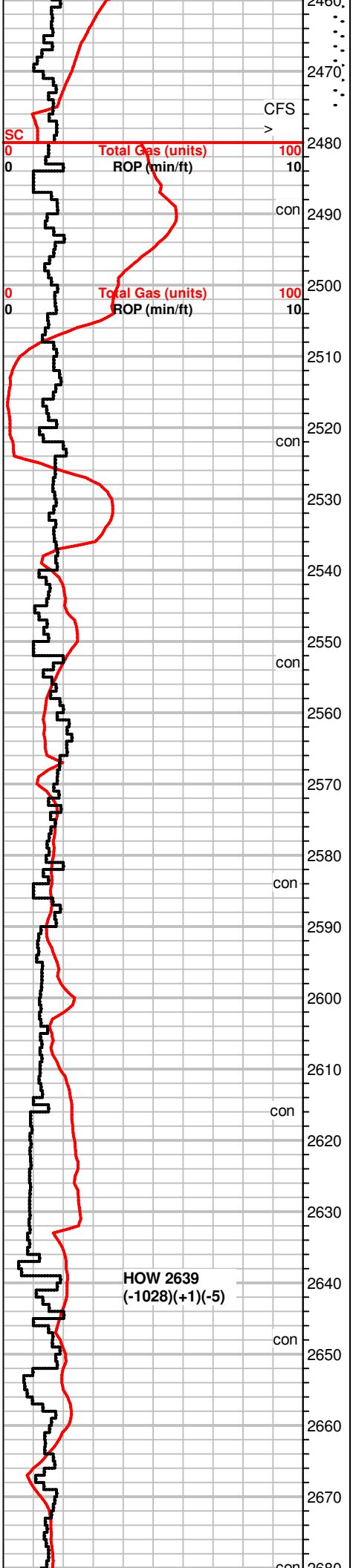
MS, crm to tan, brn, f-xln to earthy, dense, fossils scatt
SH, green, gray, maroon, pyrite, scatt SS clusters, f-gr, well srted, mineral specs, NS

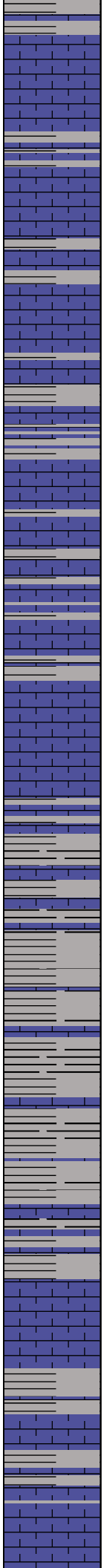
SH, gray, platy, pyrite
MS, brn to gray, f-xln, fossils, hard, dense, NS

MS-WS, crm to brn, f-xln, hard, sub oolitic/fossils, shaly in pt.

Gas test
Unit 5278 replaced w/ 5279 due to burnt up sample pump

DST #2 2333-2475
45-60-60-90
SB BOB 6min blt to 62"
NBB





SH, gray, silty to sandy, pyrite, glauc

MS, crm to off wht, tan, chalky to earthy, dense pcs scatt, most soft to firm, fossilif., Chert, gray, fossils, lesser SH, grays, pyrite

SH, grays, silty, pyrite
MS-WS, off wht to tan, vf- to mic-xln, dense to firm, fossils

influx SH, gray to dk. gray, silty to vf sandy pcs, blocky
WS-MS, crm to tan, fossilif., chalky in pt., NS

SH, dk. grays, A.A., MS, tan to brn, f-xln, dense, fossils, NS

SH, grays, platy
MS, crm to gray, f-xln to earthy, chalky, soft, NS

MS, lt. gray to crm, off wht, mic-xln to massive txt, tite mtrx w/ fossils, hard, NS, SH, grays

Infulx SH, grays, sandy to silty, soft
MS, crm to gray, f-xln, dense, scatt fossils, dull fluor, NS

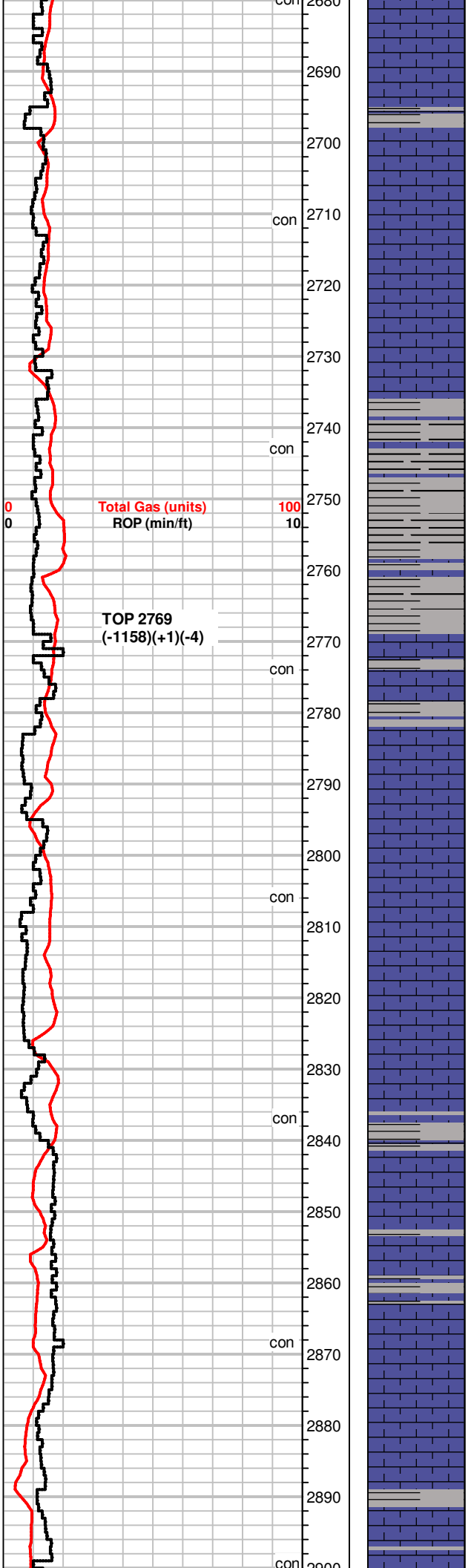
Scatt MS. crm to grays, f-xln dense A.A., some pcs w/ fossils, mostly SH, gray, silty soft

SH, grays, sandy, vf-gr, silty, hard
some MS, crm to grays, f-xlnm to gritty, some pcs hard, silty/soft pcs, dull fluor, NS

No Sample

MS, off wht to lt. gray, scatt crm pcs, f-xln to m-xln, hard, shaly in pc, fossil frgmts.
SH, grays, scatt sandy pcs

NBB
SB BOB 3 min, blt to 132"
NBB
Rec: 453' Fluid Total 211' GCM(5g,95m)
60' GWCM (1g,94m,5w)
60' GWCM (5g,85m,10w)
60' GWCM (5g,65m,30w)
60' GMCW (20g,30m,50w)
IH 1115#
IF 30-129#
ISIP 916#
FF 144-189#
FSIP 945#
FH 1081#
Temp 87*F
Rw .25 @ 37.5*F
Cl 60,000ppm



MS-WS, tan to crm, m-xln earthy/gritty pcs, firm, fossils scatt., some pcs mottled, rare chalky pcs, NS

MS-WS, crm to lt. gray, f-xln, gritty, brittle, sandy in pt., scatt fossils, oolitic, some SH, grays

MS-WS, crm to gray, f-xln to m-xln, sandy in pt. fossilif., m-gr ooliticm moldic pcs, some brn, dense, NS

lesser MS, crm to lt. gray, f-xln hard, some fossils, NS
SH, gray, to dk gray

influx SH, grays, gritty to limey, scatt MS, crm to gray, f-xln, hard to brittle, fossils.

WS-MS, tan to brn, firm, m-xln to earhty, fossil/gritty pcs, NS some SH, grays, silty in pt.

rare SH, blk to green
mostly MS-WS, crm to tan, fossilif., firm to hard, rare mottled pcs, NS

MS-WS, crm to tan, f- xln, gritty, fossils, scatt mottled pcs, NS

MS-WS, crm to tan, brittle, m-xln, scatt fossilif. pcs, gritty , ND

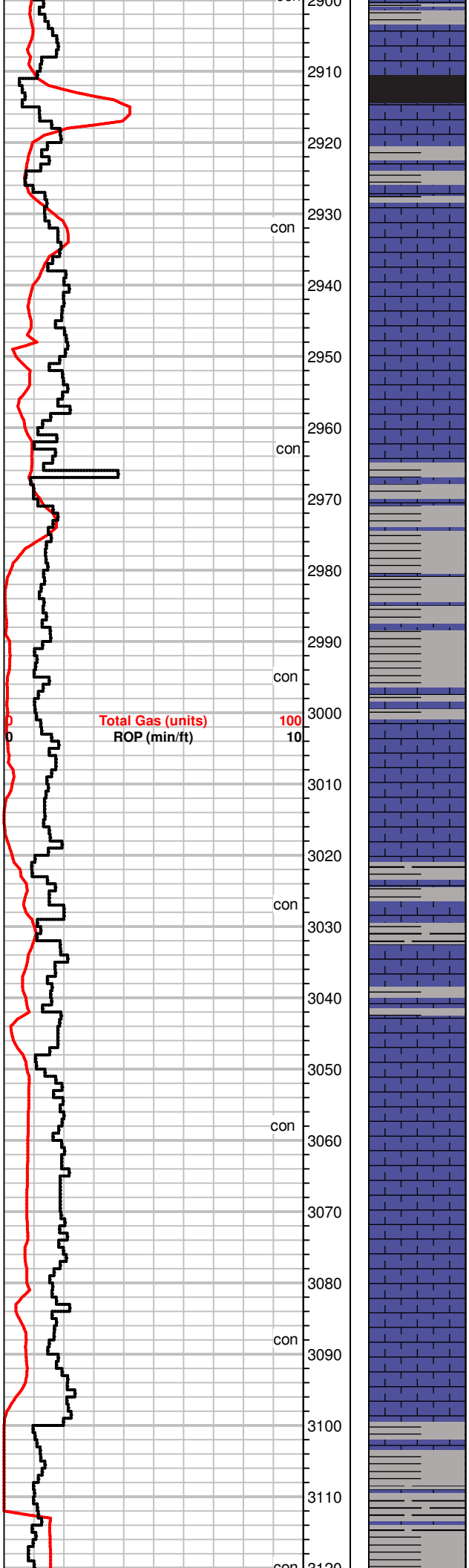
some SH, grays, silty

MS, gray, f-xln to earthy, lesser crm pcs A.A., NS

SH, grays, limey in pt.,

MS, gray, f-xln to earhty, hard, shaly in pt., some tan to brn pcs, hard, gritty to earthy, NS
SH, gray

MS, crm to tan, mic-xln to f-xln, dense to brittle, fossils, some chalky



MS, crm to tan, mic-xln to f-xln, dense to brittle, fossils, some chalky pcs, Chert, wht, fossils, scatt SH, grays

Shale Gas

SH, blk to grays

SH, gray to dk. gray, green
MS, crm to brn, f-xln to mic-xln, dense, some mineral specs, dense, gritty in pt., NS

MS, crm to off wht, f-xln, firm, fossils scatt, some Chert, wht, brn

MS, crm to off wht, f-xln to chalky, scatt fossils, hard to firm, some dense, gritty in pt., NS
SH, gray, to blk, blocky, greens

SH, blk to gray, green
lesser MS, crm to tan, f-xln, earthy, hard, fossils scatt, calcite, NS

DISPLACE MUD SYSTEM @ 2995'

SH, blk to grays
MS-WS, crm to off wht, f-xln soft/friable, scatt fossils, NS

MS, crm to off wht, f-xln, firm to brittle, chalky in pt. NS
SH, green to red, mostly grays

SH, blk to dk gray

MS, crm to lt. tan, m-xln gritty, chalky to earthy, some fossils, Chert, wht

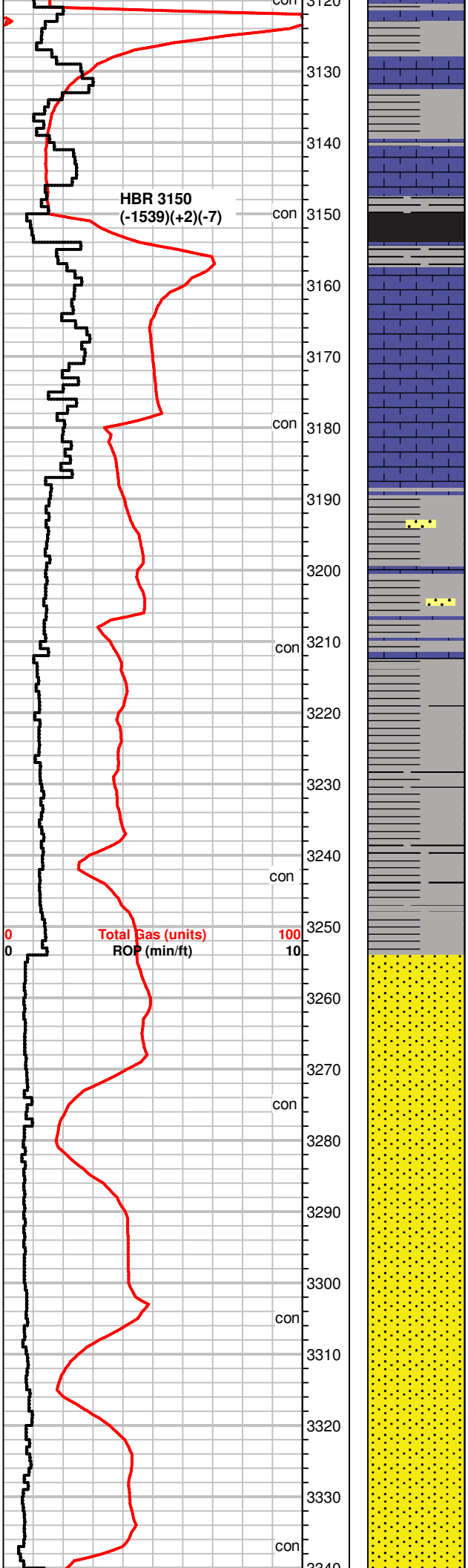
MS-WS, off wht to crm, f-xln to chalky, soft/friable, fossils, calcite
SH, gray to blk pcs rare

rare SH, blk to gray
MS, crm to off wht, firm to friable, chalky pcs throughout, scatt gritty, NS

MS, crm to tan, f-xln, fossilif, friable, NS

Influx SH, blk to gray, carb.

SH, blk to grays, carb.



rare MS, tan to brn, f-xln, hard, fossils, NS

Gas system test

SH, blk to gray
MS, crm to gray, f-xln, mottled pcs scatt, fossils, NS

SH, blk to gray, carb

+35 UGK, shale gas

MS, brn to tan, f-xln dense, scatt fossils, calcite, hard, NS

MS-WS, crm to off wht, m-xln to chalky pcs, firm to friable, fossils, calcite, dull fluor, NS some pcs shaly
lesser SH's, gray to blk,

WS-MS, crm to brn, tan, f-xln to m-xln, chalky to firm, some dense, fossilif/mottled pcs, some oolitic m-gr, in tite mtrx, NS

SH, gray to blk, green, gassy

SH, blk to gray, red, brn, green, maroon, pyrite, some pcs sandy

SH, grays, sandy, mineral inclusions

SH, gray to lt. gray, silty, minearl specs

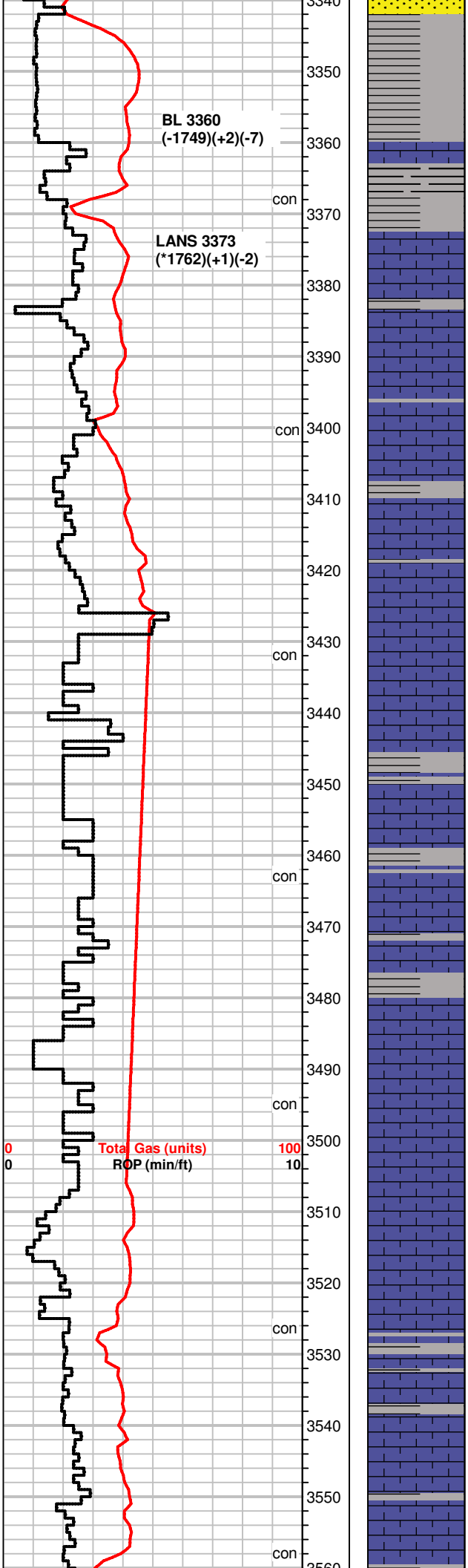
Influx SS clusters, gray to lt. gray, silty, mineral specs, micas, sub rounded, well to fair sorted, friable to hard pcs, NS

SS clusters, grays, micaceous, minerals, hard, NS

SS clusters, lt gray to gray, silty to shaly pcs rare, most A.A., NS

SS clusters, gray to lt. gray, micaceous, hard to friable pcs, fiar sorting, sub rounded to sub angular,

SS clusters, micaceous, lt. gray, hard to partially friable, mineral specs



SH, grays, some silty to sandy in pt.

MS, brn to some crm, hard, dense, fossils, some pcs chalky,

SH, gray to blk, brn

MS, crm to brn, hard, dense, scatt fossils,

MS-WS, crm to lt. tan, f-xln to chalky, dense, some pcs oolitic, m-gr, friable to firm, some SH, grays

MS, some WS, crm to lt gray, chalky in pt., fossils., mottled pcs scatt, NS, rare SH, gray

MS-WS, crm to off wht, f-xln, friable, sub oolitic

Scatt SH, blk to grays, MS, crm to off wht, A.A., hard, dense, NS

MS, crm to tan, lt. gray, f-xln to m-xln, dense, fossils
scatt SH, gray to green

MS, lt. gray to crm, chalky to f-xln, some fossils, dense to friable, NS,
SH, blk to gray, green

influx SH?, gray, silt, green, pyrite
MS, vf-xln to massive, some A.A., most dense, hard to friable, NS

SH, gray to dk. gray
MS, brn to crm, f-xln to chalky, scatt fossils, Chert, gray

carrying SH, gray to dk. gray, green, silty
MS, crm to tan, massive, chalky, dense, sub oolitic, NS

MS-WS, brn to crm, f-xln to m-xln, suboolitic to chalky, some pcs dense, massive, dull fluor, NS some SH, grays

MS-WS, brn to tan, f-xln, firm/friable, soem chalky, silty in pt., calcite rare, scatt HS, grays

influx SH, gray to dk. gray, brn, red(caving?)
MS-WS, crm to brn, A.A.

MS, crm to brn, f-xln to chalky, dense to massive, scatt fossils, NS
some SH, green to grays

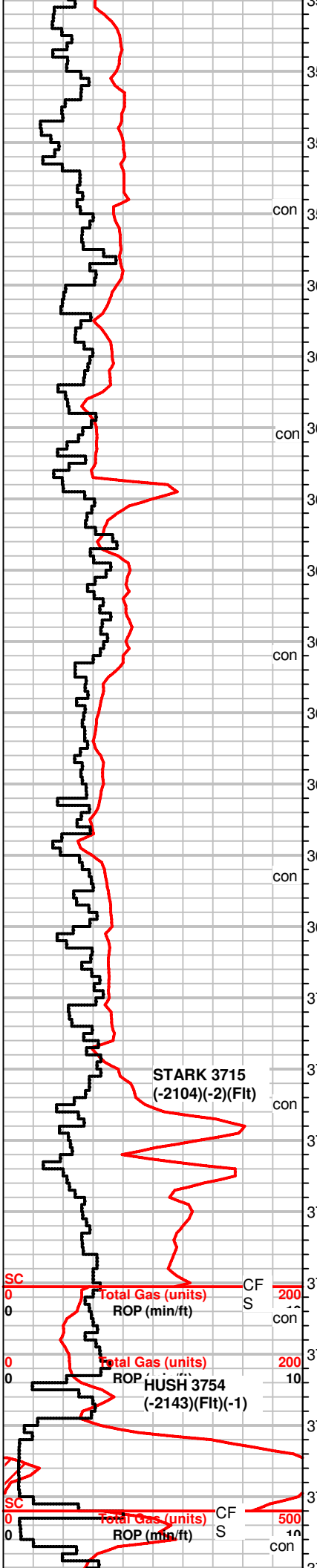
MS-WS, brn to crm, f-xln, dense to chalky, scatt fossils, dull fluor, NS

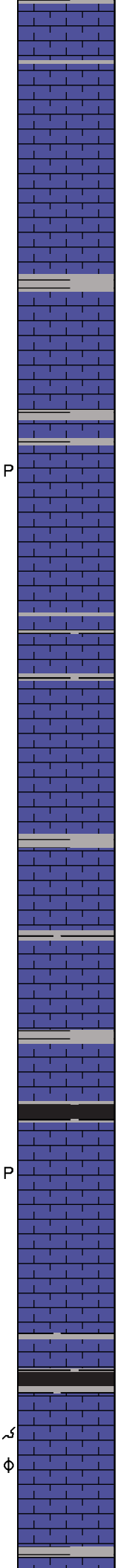
WS-MS, tan to bnr, f-xln, firm to hard, dense pcs scatt, mottled in pt,
some fossils, SH, gray to blk

MS, crm to lt. gray, earthy to f-xln, friable, scatt fossils, gritty pcs, SH,
gray to green(cavings?, over 80% of tray)

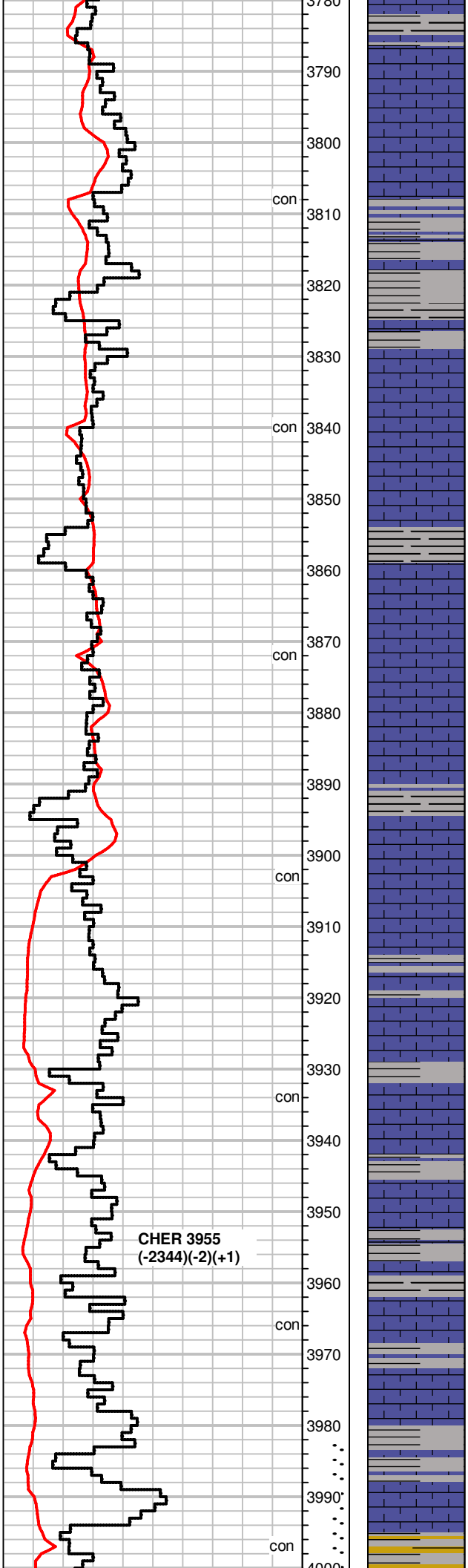
MS, crm to lt. gray, A.A., NS
still carrying 80%+ shale in tray

Gas detector not getting geolograph footage clicks, so gas didn't lag- ran approx. 40 units background from 3429-3506





MS-WS, crm to tan, lt. gray, f-xln, micro oolitic, chalky in pt., soft, brittle, no fluor, NS	
MS, crm to tan, f-xln, brn, massive pcs, dense to friable, scat fossils, chalky in pt., Chert, wht	
WS-MS, gray to brn/crm, vf-xln to massive txt, firm to dense, oolitic/fossilif., no fluor, NS, calcite	
MS, crm to tan, massive to earthy, firm to hard, chalky, soft to dense pcs, scatt fossils, NS	**WORK ON MUD PUMP 45 minutes**
MS, brn to tan, gray, f-xln to chalky, firm, sub oolitic pcs scatt, NS, SH, grays	
MS, crm to brn, f-xln, gritty txt to massive pcs, partly chalky, fossils scatt, NS some HS, dk. grays	
MS, crm to off wht, f-xln, earthy, firm to dense, NS SH, gray to green	
MS-WS, crm to tan, tlt. gray, f-xln, chalky friable to hard, scatt fosssil most pcs dnse, some w/ **v. spty birght fluor, few drops live oil, no ododr, ring cut to v. slow milky cut,** Chert, wht	
MS, crm to lt. tan, vf-xln to massive, dense, NS Chert, wht	
SH, grays, MS, crm to off wht, gray, massive to firm, dense, sub oolitic pcs, hard, some Chert, tan	
MS, gray to crm, f-xln, hard to dense, earhty in pt., soft, dull fluor, NS, Chert, wht, brn, tan	
MS, gray to crm, f-xln, some dense, becoming chalky, soft, dull fluor, NS, Chert, gray, brn	
MS, crm, scatt gray pcs, vf-xln to massive/chalky, firm to soft, rare brn mottled pcs, Chert, wht	
MS, brn to crm, m-xln, mottled, sub oolitic, dense, NS, some SH, gray to blk	
MS, gray to tan, f-xln, mottled pcs scatt, sub oolitic, dense	
MS, crm to tan, f-xln to chalky, firm to dense, scatt fossils, calcite, NS, some SH, blk to grays	
SH, blk to dk. gray, gassy, sli. carb.	**+45 UGK, shale gas**
WS-MS, crm to brn, off wht pcs scatt, f- to m-xln, chalky in part, dense/massive pcs, sub oolitic to micro oolitic, no odor, **scatt pcs w/ spty bri fluor, tr spty stn(2% of smpl), strmg to slow milky cut, rare pcs w/ partial stn in dry(2 pcs),** no free oil, rare pp por.	**+42 UGK, w/ 15 UGK recycle**
MS, crm to of wht, f-xln to earthy, chalky in pt. friable to dense, scatt fossils, NS	
MS, crm to tan, f-xln to massive, dense, hard, rare sub oolitic pcs, some brn, vf-xln, NS	
SH, blk, dk gray, carb. gas bubbles, pyrite	**+34 UGK, shale gas**
WS-PS, brn to tan, f-xln, friable, f to m-gr oolitic/moldic, **strong odor in bag, bright yellow to gold fluor(50% of tray), some pcs w/ partial stn, slow milky to fast cut, live oil when broken, partial to even sat. in dry, moldic por.**	**+183 UGK, w/ 103 UGK recycle**
WS-PS, brn to tan, f-xln, f to m-gr oolitic, some dense, partial stn, spty bri fluor, vuggy to moldic por.	**DST #3 3748-3772 45-60-60-90 SB BOB/2" blt to 192 in**



some SH, gray to blk, green

MS-WS, crm to tan, A.A., some pcs micro oolitic,

MS-WS, crm to gray, mottled in pt., f-xln, gritty, firm to hard, micro oolitic to sub oolitic, scatt fossil frgmts, Chert, wht, scatt SH, gray

MS, gray to crm, massive to vf-xln, dense, hard, NS, some SH, grays

MS, gray to dk. gray, f-xln, dense, some pcs shaly, hard, NS
SH, gray to blk

SH, gray to blk, greens, MS, gray to dk. gray, tan, f-xln dense, some pcs shaly, NS

MS-WS, crm to lt. gray, maroon, f-xln, waxy looking, dense, some chalky pcs, sub oolitic m-gr, glauc, argillaceous, SH, gray to maroon

MS, crm to lt. gray, massive, dense,
SH, gray to green, maroon

MS, crm to brn, vf-xln to massive, hard, dense, waxy looking, scatt fossils,

Influx MS, crm, massive to vf-xln, dense, scatt chalky pcs, brittle, some fossils, bri. mineral dull fluor, NS, SH, blk to gray

MS, A.A., lesser, crm to gray, vf-xln, dense, hard, sub oolitic pcs, gritty

MS, brn to gray, some crm, chalky/earthy to massive, hard to soft, scatt fossils, some SH, gray to green

MS, crm to tan, gray, f-xln to earthy, dense, scatt fossils/sub oolitic pcs rare
SH, blk to gray

MS, crm to brn, f- to m-xln, chalky in pt., dense looking, brittle, fossilif. to oolitic pcs, some SH, grays

MS, gray to crm, f-xln, some m-xln, dense, rare fossils, hard, Chert, gray

SH, gray, MS, brn to crm, grays, f-xln, gritty in pt. some chalky, friable, rare fossils, NS

SH, grays to green
MS, gray to crm, f-xln, dense, partly chalky

SH, blk to gray, green

MS, crm, f-xln to m-xln, firm to hard, most dense, sub oolitic in pcs

scatt SH, gray
MS, crm to gray, A.A., some pcs sandy to silty, NS

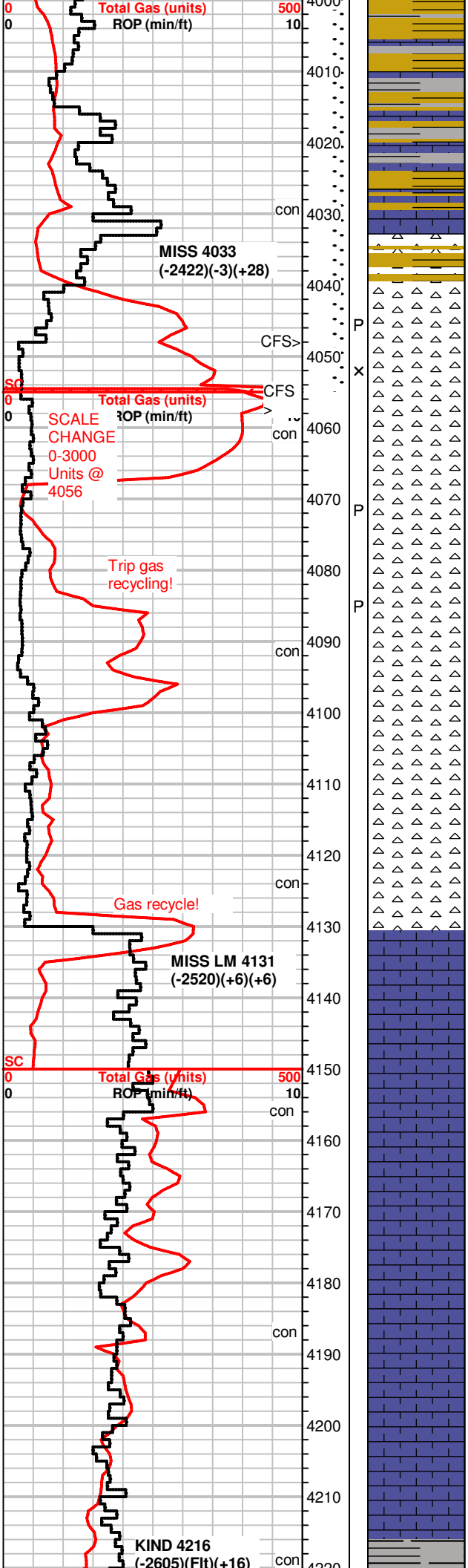
SH, blk, gray, greens, MS, crm to gray, f-xln, waxy, chalky, brittle some pcs massive/dense rare, some oolitic, NS

MS, crm, f-xln to m-xln, gritty, mineral specs, sub oolitic, chalky pcs, some dense

SH, gray to blk
MS, A.A., some chalky, brittle

MS, crm to gray, m-xln, chalky pcs, gritty, micro oolitic, brittle, Chert,

2.75 in BB
SB BOB/1" blt to 205 in
3.15 in BB
2871' GIP
Rec: 333' Fluid
60' CO
33' GOCM (5g,10o,85m)
120' GOCM
(35g,18o,47m)
60' GOWCM
(30g,52o,8m,10w)
60' GOWCM
(25g,40o,30w,5w)
IH 1782#
IF 39-108#
ISIP 1123#
FF 68-139#
FSIP 1129#
FH 1819#
Temp 112*F
Grav 37.4 API
Cl 4,000 ppm



tan, olive green, HS, gray to green

SH, blk, grya, green, yellow, pyrite
MS, crm to gray, f-xln, chalky to dense, A.A., NS

SH, green to gray, blk, MS, crm to gray, chalky, fossilif, gritty to shaly/shandy pcs

MS, crm to tan, green, dense to firm, chalky, fossilif., Chert, green SH, gray, green, maroon

MS, crm to tan, rare, A.A., mostly SH, varicolored, argillaceous, straited rare Chert, off wht, fossilif.

Chert, bone wht to vari colored, fresh to wthrd, **faint odor in bag, partial stn on wthrd surfaces, v/ spty bright fluor, rare pcs w/ slow milky cut, scatt free oil in tray**

+245 UGK, w/ +107 UGK recycle

Chert, wht, wthrd to fresh, chalky in pt., **partial to even stn, very spotty bright fluro, no cut, very faint odo**r, int-x

+250 UGK, w/ +108 UGK recycle

Chert, mostly weathered, some fresh(<5%), **faint odor, rare pcs bleeding gas, almost no fluor, rare milky cut, most wthrd pcs w/ spty to even stn, fiar to good odor**

DST #4 3982-4055
30-60-60-90
SB BOB/30sec
GTS/2min Ga 1/2in choke
1.156 MMCFG@ 10min
1.252 MMCFG@ 20min
1.258 MMCFG@ 30min
NBB
SB GTS Immed, 1/2 inch choke
1.401 MMCFG@ 10min
1.566 MMCFG@ 20min
5/8 inch choke
false reading MMCFG@ 30min
1.585 MMCFG@ 40min
1.554 MMCFG@ 50min
1.554 MMCFG@ 60min
NBB
3739' GIP
Rec: 221' FLUID
64' GOSM(15g,85m)
63' GOSM(10g,90m)
63' GOSM(5g,95m)
31' Mud
IH 1932#
IF 257-389#
ISIP 1212#
FF 394-376#
FSIP 1209#
FH 1872#
Temp 111*F
Cl 3,000ppm

Chert, weathered to fresh(<10% of sample), most pcs w/ spty stn, fresh pcs fossilif., **rare fluor, some pcs w/ bleeding oil and gas, good odor**

Chert, wht, wthrd to inc. in fresh pcs(20% of tray)**, most wthrd pcs w/ stn, frsh pcs barren, some pcs bleeding oil and gas, brown free oil droplets in tray, good odor, PP por.**

Chert, fresh to wthrd, A.A., **good odor, pcs w/ bleeding oil and gas, lesser stn, free oil droplets, milky cut**

Chert, wht, fresh to wthrd, some w/ stn A.A., lesser, inc in fresh pcs, some w/ dead stn on edge, faint odor

Chert, wht, opaque, some wthrd, most fresh fractured pcs scatt, dull fluor, no odor, no cut, no stn on fresh pcs, carrying Chert from above

MS, crm to wht, chalky, f-xln, soft/friable pcs, Chert, lt. blue, translucent

MS-WS, off wht to crm, f-xln to mic-xln, chalky, Chert, opaque to translucent, blueish, wht

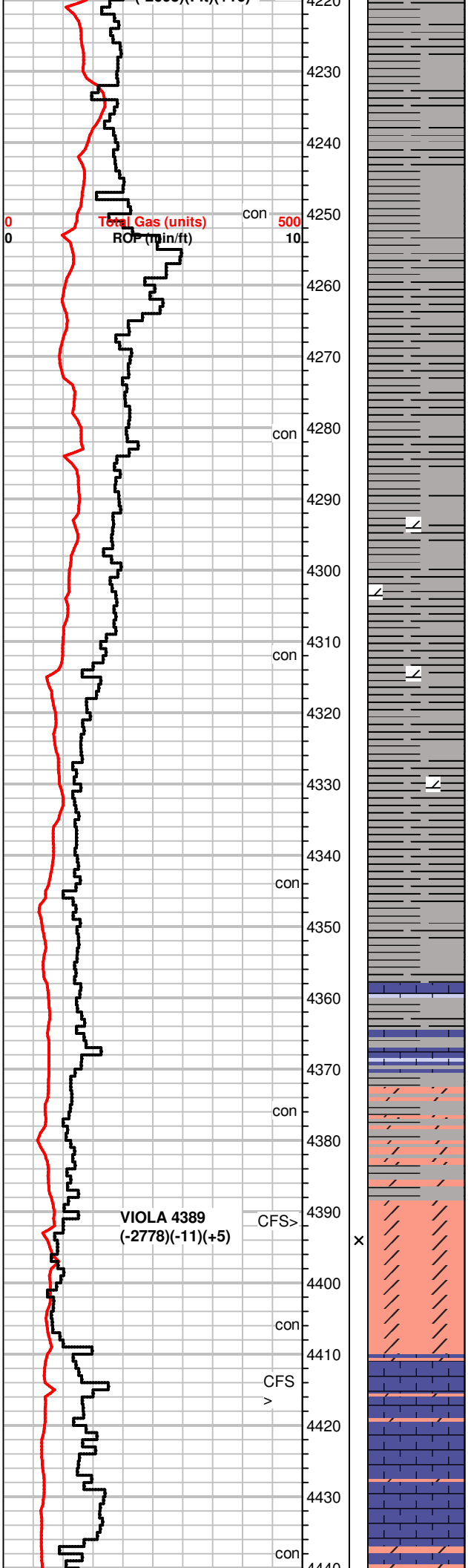
MS, crm to off wht, some lt. greenish, mic-xln, chalky in pt. to friable, glauc specs, micro oolitic pcs, Chert, wht to blueish wht

MS-WS, off wht to crm, f-xln to mic-xln, micro oolitic, dense, chalky pcs scatt, NS, Chert, blueish wht

MS-WS, off wht to crm, chalky to sub oolitic pcs, samples carrying 80%+ shales, vari colored

MS-WS, off wht to crm, tan, vf-xln to dense, suboolitic/micro oolitc, Chert, wht, blueish, fossilif., carrying SH's, varicolored

SH, varicolored, Fresh blk to grays, striated pcs, pyrite



SH, varicolored, more grays to dk. grays

SH, gray to dk gray, pyrite, carrying varicolored A.A.

SH, gray, dk. grays rare, soft to firm, some blocky, pcs hard,

SH, dk. grya to grays, platy, firm to soft

Sh, gray to dk .gray, platy, hard to fissil, blocky pcs scatt

SH, blk, dk. gray to grays

SH, dk. gray to gray, some green, pyrite rare

SH, grays, firm to hard, earhty pcs,

SH, grays, some pcs dolomitic

SH, dk. gray to gray, hard, some maroon, dolomitic in pt.,

SH, grays, hard, dolomitic, rare maroon pcs,

SH, gray to dk. gray, platy to fissile, maroon, dolomitic

SH, grays, dolomitic, firm to hard, brittle/fissile, some maroon to mustard yellow pcs scatt

SH, grays, some pcs brn, silty, hard to firm, maroon to green

SH, gray to brn, silty, green, maroon, dolomitic
rare MS, crm to brn, vf-xln/massive txt, dense, hard, some brittle

SH, brn to gray, silty, soft, some pcs blocky, hard to firm, green pcs scatt
rare MS, brn to crm, massive to f-xln, hard

SH, brn to grays, A.A., rare Dolo, gray, shaly looking, firm, no fluor

SH, blk to brn, grays, gritty, rare Dolo, gray, vf-xln, friable/brittle, firm, no fluor

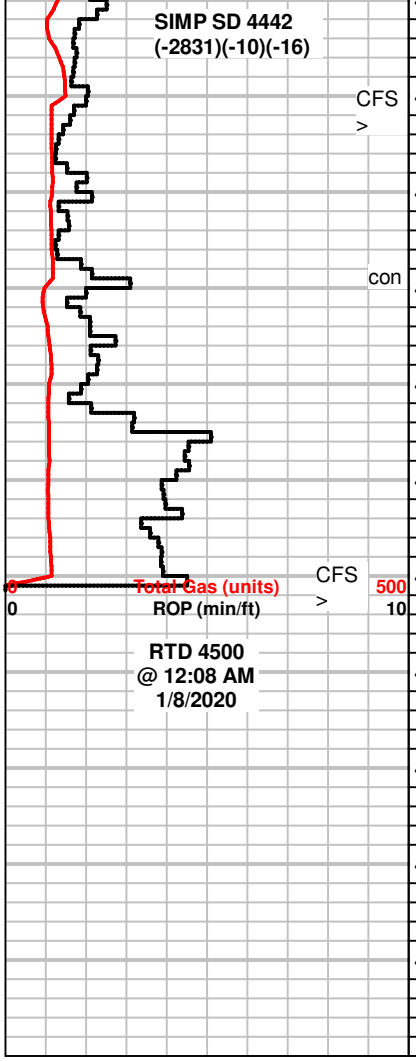
Dolo, lt. gray to brn, vf-xln, vf-sucrosic txt. firm to friable, very faint odor, some shaly, micro oolitic, very rare spty bri fluor, no cut, no vis por to int-xln por.

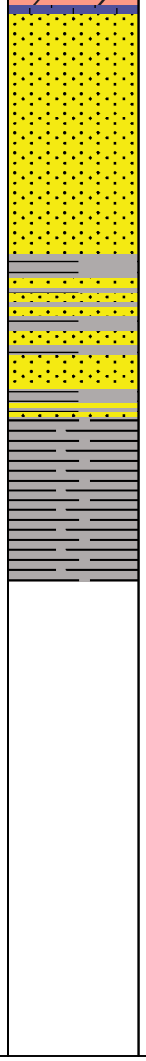
+30 UGK, w/ 10 UGK recycle,

Dolo, lt. gray to brn, f-xln, vf- sucrosic txt., frim, some pcs shaly, fair odor in bag, no fluor,

MS, tan to gray, f-xln, hard to friable, sandy in pt. scatt Dolo, brn, , vf-suc., firm

MS-gray to brn, f-xln, hard/brittle, sandy in pt., sli dolomitic, scatt minerals





SS clusters, wht to opaque, med. to co-gr, sub ang to rnded, well cemented/tite, no odor, NS

SS clusters, wht to brn, f- to co-gr, sub ang to sub rnd, poorly sorted, tite to firm, some glauc, most pcs A.A., NS

SS clusters, wht, some brn, f to co-gr, poorly sorted, friable to firm, some pcs dolomitic to shaly(argillaceous flakes)
SH, gray to green, silty to waxy, firm

SS clusters, A.A., lesser, SH, grays to green, fresh, platy, maroon to mustard yellow pcs.

SH, gray to green, mustard yellow, maroon, striated, firm to soft, platy, some blocky pcs, silty in pt.,