



Confidentiality Requested:

Yes  No

KANSAS CORPORATION COMMISSION 1310858  
OIL & GAS CONSERVATION DIVISION

Form ACO-1  
August 2013

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       SIOW
- Gas       D&A       ENHR       SIGW
- OG       GSW       Temp. Abd.
- 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 ENHR       Conv. to SWD
- Plug Back       Conv. to GSW       Conv. to Producer
- Commingled      Permit #: \_\_\_\_\_
- Dual Completion      Permit #: \_\_\_\_\_
- SWD      Permit #: \_\_\_\_\_
- ENHR      Permit #: \_\_\_\_\_
- GSW      Permit #: \_\_\_\_\_

Spud Date or Recompletion Date	Date Reached TD	Completion Date or Recompletion Date
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API No. 15 - \_\_\_\_\_

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
- Geologist Report Received
- UIC Distribution
- ALT  I  II  III Approved by: \_\_\_\_\_ Date: \_\_\_\_\_

1310858



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

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				

Did you perform a hydraulic fracturing treatment on this well?  Yes  No *(If No, skip questions 2 and 3)*

Does the volume of the total base fluid of the hydraulic fracturing treatment exceed 350,000 gallons?  Yes  No *(If No, skip question 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)*

Shots Per Foot	PERFORATION RECORD - Bridge Plugs Set/Type Specify Footage of Each Interval Perforated	Acid, Fracture, Shot, Cement Squeeze Record <i>(Amount and Kind of Material Used)</i>	Depth

TUBING RECORD:      Size: \_\_\_\_\_ Set At: \_\_\_\_\_ Packer At: \_\_\_\_\_ Liner Run:  Yes  No

Date of First, Resumed Production, SWD or ENHR.	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> <input type="checkbox"/> Other <i>(Specify)</i> _____	PRODUCTION INTERVAL: _____ _____
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Form	ACO1 - Well Completion
Operator	American Warrior, Inc.
Well Name	Pfannenstiel Unit 1-30
Doc ID	1310858

Tops

Name	Top	Datum
Anhy	1503'	+1020
B/Anhy	1551	+646
Topeka	3217	-1020
Heebner	3458	-1261
Toronto	3479	-1282
Lansing	3500	-1303
B/KC	3753	-1556
Marmaton	3789	-1592
Arbuckle	3859	-1662





CHARGE TO: American Warrior Inc  
 ADDRESS  
 CITY, STATE, ZIP CODE

TICKET 29535

PAGE 1 OF 1

SERVICE LOCATIONS/  
 1. Hays Ks  
 2. Ness City Ks  
 3.  
 4.

WELL/PROJECT NO. 1-30  
 LEASE Pfannenstiel Unit  
 COUNTY/PARISH Ellis  
 STATE Ks  
 CITY  
 DATE 6-9-16  
 OWNER

TICKET TYPE  
 SERVICE  
 SALES  
 CONTRACTOR Discovery Drilling  
 RIG NAME/NO. Rig # 2  
 SHIPPED VIA  
 DELIVERED TO location  
 ORDER NO.

WELL TYPE Oil  
 WELL CATEGORY Development  
 JOB PURPOSE Shallow Surface  
 WELL PERMIT NO.  
 WELL LOCATION

REFERRAL LOCATION  
 INVOICE INSTRUCTIONS

PRICE REFERENCE	SECONDARY REFERENCE/ PART NUMBER	ACCOUNTING			DESCRIPTION	QTY.	UM	QTY.	UM	UNIT PRICE	AMOUNT
		LOC	ACCT	DF							
575		1			MILEAGE TRK # 113	15	Mi			5.00	75.00
5765		1			Pump Charge - Shallow Surface	1	EA			800.00	800.00
290		1			D-Air	3	Gal			42.00	126.00
325		2			STANDARD CMT	150	SKS			12.25	1837.50
278		2			Calcium Chloride	4	SKS			40.00	160.00
279		2			Bentonite Gel	3	SKS			25.00	75.00
581		2			Service Charge Cmt	150	SKS			1.50	225.00
582		2			Drainage Minimum Charge	1	EA			250.00	250.00

**LEGAL TERMS:** Customer hereby acknowledges and agrees to the terms and conditions on the reverse side hereof which include, but are not limited to, PAYMENT, RELEASE, INDEMNITY, and LIMITED WARRANTY provisions.

MUST BE SIGNED BY CUSTOMER OR CUSTOMER'S AGENT PRIOR TO START OF WORK OR DELIVERY OF GOODS

X  
 DATE SIGNED TIME SIGNED  
 A.M.  
 P.M.

REMIT PAYMENT TO:  
 SWIFT SERVICES, INC.  
 P.O. BOX 466  
 NESS CITY, KS 67560  
 785-798-2300

SURVEY	AGREE	UN-DECIDED	DIS-AGREE	PAGE TOTAL
OUR EQUIPMENT PERFORMED WITHOUT BREAKDOWN?				3548.50
WE UNDERSTOOD AND MET YOUR NEEDS?				
OUR SERVICE WAS PERFORMED WITHOUT DELAY?				
WE OPERATED THE EQUIPMENT AND PERFORMED JOB CALCULATIONS SATISFACTORILY?				
ARE YOU SATISFIED WITH OUR SERVICE?	<input type="checkbox"/> YES <input type="checkbox"/> NO			
<input type="checkbox"/> CUSTOMER DID NOT WISH TO RESPOND				TOTAL

Ellis County TAX 7.5% 164.89

3713.39





CHARGE TO: American Warrior Inc  
 ADDRESS  
 CITY, STATE, ZIP CODE

TICKET 29537

PAGE 1 OF 1

SERVICE LOCATIONS  
 1. Hays Ks  
 2. Ness City Ks  
 3.  
 4.

WELL PROJECT NO. # 1-30  
 LEASE Phunnenstiel Unit  
 COUNTY/PARISH Ellis  
 STATE Ks  
 CITY  
 DATE 6-16-16  
 OWNER

TICKET TYPE  
 SERVICE  
 SALES  
 CONTRACTOR Discovery Drilling  
 RIG NAME/NO. Rig # 2  
 SHIPPED VIA  
 DELIVERED TO Location  
 ORDER NO.

WELL TYPE Oil  
 WELL CATEGORY Development  
 JOB PURPOSE Rotary Aug  
 WELL PERMIT NO.  
 WELL LOCATION

REFERRAL LOCATION  
 INVOICE INSTRUCTIONS

PRICE REFERENCE	SECONDARY REFERENCE/ PART NUMBER	ACCOUNTING			DESCRIPTION	QTY.		UM		UNIT PRICE		AMOUNT	
		LOC	ACCT	DF									
575		1			MILEAGE TRK # 111	20		Mi		5	00	100	00
576P		1			Pump Change - PTA	1		EA		800	00	800	00
290		1			D-Air	5		GA		42	00	210	00
410					Top Plug 8 5/8	1		EA		120	00	120	00
328-4		2			60/40 pozmix 4% GEL	305		SKS		10	25	3126	25
276		2			Floater	62		lbs		2	25	139	50
281		2			Service Charge CMT	305		SKS		1	50	457	50
283		2			Drayage	492		TM		75		369	00

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MUST BE SIGNED BY CUSTOMER OR CUSTOMER'S AGENT PRIOR TO START OF WORK OR DELIVERY OF GOODS

X  
 DATE SIGNED TIME SIGNED  A.M.  P.M.

REMIT PAYMENT TO:  
 SWIFT SERVICES, INC.  
 P.O. BOX 466  
 NESS CITY, KS 67560  
 785-798-2300

SURVEY	AGREE	UN-DECIDED	DIS-AGREE	PAGE TOTAL
OUR EQUIPMENT PERFORMED WITHOUT BREAKDOWN?				5322 25
WE UNDERSTOOD AND MET YOUR NEEDS?				
OUR SERVICE WAS PERFORMED WITHOUT DELAY?				
WE OPERATED THE EQUIPMENT AND PERFORMED JOB CALCULATIONS SATISFACTORILY?				
ARE YOU SATISFIED WITH OUR SERVICE? <input type="checkbox"/> YES <input type="checkbox"/> NO				251 70
<input type="checkbox"/> CUSTOMER DID NOT WISH TO RESPOND				TOTAL





## DRILL STEM TEST REPORT

Prepared For: **American Warrior , Inc**

PO Box 399  
Garden City, Ks 67846

ATTN: Cecil O'Brate Jason

### **PfannenstielUnit1-30**

#### **Pfannenstiel Unit #1-30**

Start Date: 2016.06.15 @ 22:30:34

End Date: 2016.06.16 @ 04:46:13

Job Ticket #: 65468                      DST #: 1

Trilobite Testing, Inc  
PO Box 362 Hays, KS 67601  
ph: 785-625-4778 fax: 785-625-5620

Printed: 2016.06.16 @ 08:49:36

American Warrior , Inc

Pfannenstiel Unit #1-30

PfannenstielUnit1-30

DST # 1

Arbuckle

2016.06.15



**TRILOBITE  
TESTING, INC**

# DRILL STEM TEST REPORT

American Warrior, Inc

**Pfannenstiel Unit #1-30**

PO Box 399  
Garden City, Ks 67846

**Pfannenstiel Unit 1-30**

Job Ticket: 65468

**DST#: 1**

ATTN: Cecil O'Brate Jason

Test Start: 2016.06.15 @ 22:30:34

## GENERAL INFORMATION:

Formation: **Arbuckle**

Deviated: No Whipstock: ft (KB)

Time Tool Opened: 00:39:14

Time Test Ended: 04:46:13

Test Type: Conventional Bottom Hole (Reset)

Tester: Ray Schwager

Unit No: 77

**Interval: 3805.00 ft (KB) To 3867.00 ft (KB) (TVD)**

Reference Elevations: 2197.00 ft (KB)

Total Depth: 3867.00 ft (KB) (TVD)

2189.00 ft (CF)

Hole Diameter: 7.85 inches Hole Condition: Fair

KB to GR/CF: 8.00 ft

## Serial #: 8018

Inside

Press@RunDepth: 432.09 psig @ 3811.00 ft (KB)

Capacity: 8000.00 psig

Start Date: 2016.06.15

End Date:

2016.06.16

Last Calib.:

2016.06.16

Start Time: 22:30:34

End Time:

04:46:13

Time On Btm:

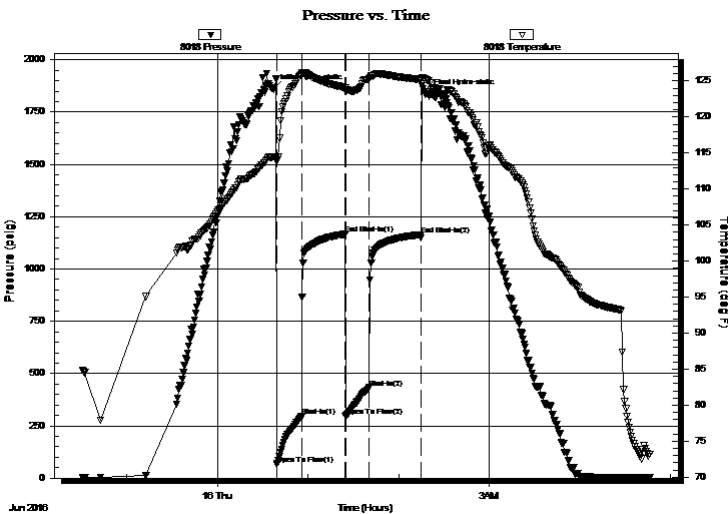
2016.06.16 @ 00:36:59

Time Off Btm:

2016.06.16 @ 02:18:29

TEST COMMENT: 15-IFP-w k to strg in 3 min  
30-ISIP-no bl  
15-FFP-w k to strg in 7 min  
30-FSIP-no bl

## PRESSURE SUMMARY



Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1860.61	114.45	Initial Hydro-static
3	66.75	113.75	Open To Flow (1)
19	293.69	125.84	Shut-In(1)
48	1166.80	124.10	End Shut-In(1)
48	296.00	123.54	Open To Flow (2)
64	432.09	125.26	Shut-In(2)
98	1163.96	125.20	End Shut-In(2)
102	1838.25	125.12	Final Hydro-static

## Recovery

Length (ft)	Description	Volume (bbl)
186.00	Water	1.32
624.00	SOCW 1%O99%W	7.89
90.00	SOCMW 2%O40%M58%W	1.26

\* Recovery from multiple tests

## Gas Rates

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





**TRILOBITE  
TESTING, INC**

# DRILL STEM TEST REPORT

**TOOL DIAGRAM**

American Warrior, Inc

**Pfannenstiel Unit #1-30**

PO Box 399  
Garden City, Ks 67846

**Pfannenstiel Unit 1-30**

Job Ticket: 65468 **DST#: 1**

ATTN: Cecil O'Brate Jason

Test Start: 2016.06.15 @ 22:30:34

## Tool Information

Drill Pipe:	Length: 3504.00 ft	Diameter: 3.80 inches	Volume: 49.15 bbl	Tool Weight: 2200.00 lb
Heavy Wt. Pipe:	Length: 310.00 ft	Diameter: 2.70 inches	Volume: 2.20 bbl	Weight set on Packer: 25000.00 lb
Drill Collar:	Length: 0.00 ft	Diameter: 0.00 inches	Volume: 0.00 bbl	Weight to Pull Loose: 65000.00 lb
			<u>Total Volume: 51.35 bbl</u>	Tool Chased 0.00 ft
Drill Pipe Above KB:	30.00 ft			String Weight: Initial 48000.00 lb
Depth to Top Packer:	3805.00 ft			Final 52000.00 lb
Depth to Bottom Packer:	ft			
Interval between Packers:	62.00 ft			
Tool Length:	83.00 ft			
Number of Packers:	2	Diameter: 6.75 inches		

Tool Comments:

## Tool Description

Tool Description	Length (ft)	Serial No.	Position	Depth (ft)	Accum. Lengths
Change Over Sub	1.00			3785.00	
Shut In Tool	5.00			3790.00	
Hydraulic tool	5.00			3795.00	
Packer	5.00			3800.00	21.00 Bottom Of Top Packer
Packer	5.00			3805.00	
Stubb	1.00			3806.00	
Perforations	5.00			3811.00	
Recorder	0.00	8018	Inside	3811.00	
Recorder	0.00	8700	Outside	3811.00	
Blank Spacing	33.00			3844.00	
Perforations	20.00			3864.00	
Bullnose	3.00			3867.00	62.00 Bottom Packers & Anchor

**Total Tool Length: 83.00**



**TRILOBITE  
TESTING, INC**

# DRILL STEM TEST REPORT

**FLUID SUMMARY**

American Warrior, Inc

**Pfannenstiel Unit #1-30**

PO Box 399  
Garden City, Ks 67846

**Pfannenstiel Unit 1-30**

Job Ticket: 65468      **DST#: 1**

ATTN: Cecil O'Brate Jason

Test Start: 2016.06.15 @ 22:30:34

## 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:	24000 ppm
Viscosity: 47.00 sec/qt	Cushion Volume: bbl		
Water Loss: 8.36 in <sup>3</sup>	Gas Cushion Type:		
Resistivity: ohm.m	Gas Cushion Pressure: psig		
Salinity: 2800.00 ppm			
Filter Cake: 1.00 inches			

## Recovery Information

Recovery Table

Length ft	Description	Volume bbl
186.00	Water	1.317
624.00	SOCW 1%O99%W	7.892
90.00	SOCMW 2%O40%M58%W	1.262

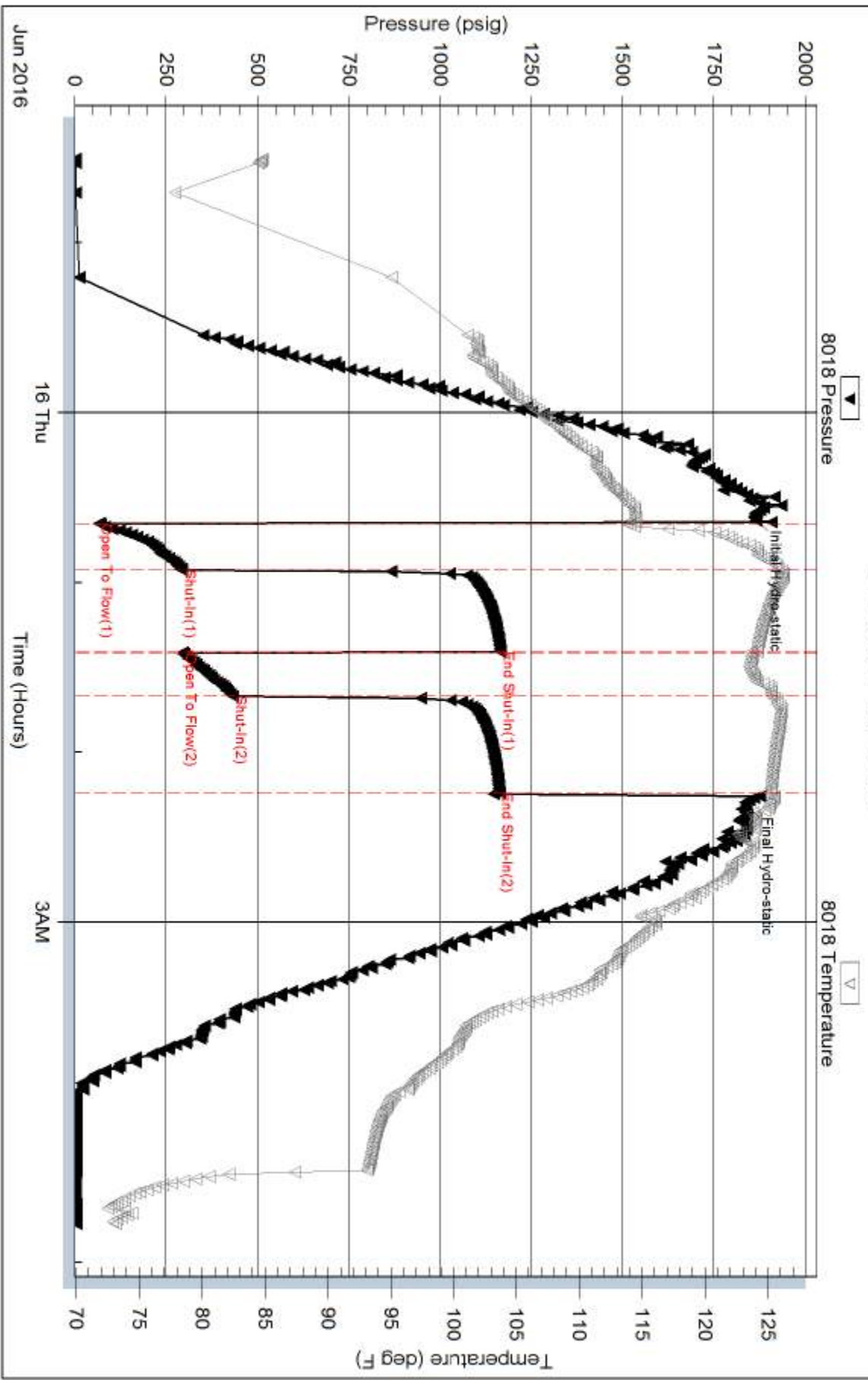
Total Length: 900.00 ft      Total Volume: 10.471 bbl

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

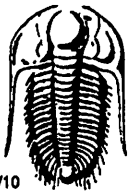
Laboratory Name:      Laboratory Location:

Recovery Comments: RW .24@71F

### Pressure vs. Time







# TRILOBITE TESTING INC.

1515 Commerce Parkway • Hays, Kansas 67601

## Test Ticket

NO. 65468

Well Name & No. Pfannenstiel Unit #1-30 Test No. 1 Date 6-15-2016  
 Company AMERICAN WARRIOR Inc Elevation 2197 KB 2189 GL  
 Address PO Box 399 Garden City, Mo 67846  
 Co. Rep / Geo. JASON ALM Rig DISCOVERY rig 2  
 Location: Sec. 30 Twp. 13<sup>s</sup> Rge. 19<sup>w</sup> Co. ELLIS State Mo

Interval Tested 3805-3867 Zone Tested Arbuckle  
 Anchor Length 62 Drill Pipe Run 3504 Mud Wt. 9.3  
 Top Packer Depth 3800 Drill Collars Run - Vis 47  
 Bottom Packer Depth 3805 Wt. Pipe Run 310 WL 8.4  
 Total Depth 3867 Chlorides 2800 ppm System LCM 2 #  
 Blow Description IFP - WEAK TO STRONG IN 3 min  
ISIP - NO BLOW  
FFP - WEAK TO STRONG IN 7 min  
FSTP - NO BLOW

Rec	Feet of	%gas	%oil	%water	%mud
<u>90</u>	<u>50 CMW</u>	<u>2</u>	<u>58</u>	<u>40</u>	
<u>624</u>	<u>50 CW</u>	<u>1</u>	<u>99</u>		
<u>186</u>	<u>WATER</u>				

Rec Total 900 BHT 125 Gravity - API RW .29 @ 71 °F Chlorides 24000 ppm  
 (A) Initial Hydrostatic 1860  Test 1050 T-On Location 1930  
 (B) First Initial Flow 66  Jars \_\_\_\_\_ T-Started 2230  
 (C) First Final Flow 293  Safety Joint \_\_\_\_\_ T-Open 0035  
 (D) Initial Shut-In 1166  Circ Sub \_\_\_\_\_ T-Pulled 0205  
 (E) Second Initial Flow 296  Hourly Standby \_\_\_\_\_ T-Out 0446  
 (F) Second Final Flow 432  Mileage 31RT 23.25 Comments \_\_\_\_\_  
 (G) Final Shut-In 1163  Sampler \_\_\_\_\_  
 (H) Final Hydrostatic 1838  Straddle \_\_\_\_\_  
 Ruined Shale Packer \_\_\_\_\_  
 Ruined Packer \_\_\_\_\_  
 Extra Copies \_\_\_\_\_  
 Initial Open 15  Extra Packer \_\_\_\_\_  
 Initial Shut-In 30  Extra Recorder \_\_\_\_\_  
 Final Flow 15  Day Standby \_\_\_\_\_  
 Final Shut-In 30  Accessibility \_\_\_\_\_  
 Sub Total 1073.25 MP/DST Disc't \_\_\_\_\_

Approved By \_\_\_\_\_ Our Representative Ray Schwagn *thank you*  
 TriLOBITE TESTING Inc. shall not be liable for damaged of any kind of the property or personnel of the one for whom a test is made, or for any loss suffered or sustained, directly or indirectly, through the use of its equipment, or its statements or opinion concerning the results of any test, tools lost or damaged in the hole shall be paid for at cost by the party for whom the test is made.

# **Geological Report**

## **Pfannenstiel Unit #1-30**

2485' FNL & 750' FWL

Sec. 30 T13s R19w

Ellis County, Kansas



**American Warrior, Inc.**

## General Data

Well Data: American Warrior, Inc.  
Pfannenstiel Unit #1-30  
2485' FNL & 750' FWL  
Sec. 30 T13s R19w  
Ellis County, Kansas  
API # 15-051-26836-0000

Drilling Contractor: Discovery Drilling Co. Inc. Rig #2

Geologist: Jason T Alm

Spud Date: June 9, 2016

Completion Date: June 16, 2016

Elevation: 2189' Ground Level  
2197' Kelly Bushing

Directions: Yocemento KS, West 3.5 mi. on Hwy 40, South 2.5  
mi. East into location.

Casing: 220' 8 5/8" surface casing

Samples: 10' wet and dry, 3200' to RTD

Drilling Time: 3100' to RTD

Electric Logs: None

Drillstem Tests: One, Trilobite Testing, Inc. "Ray Schwager"

Problems: None

Remarks: None

## Formation Tops

	<b>American Warrior, Inc.</b> <b>Pfannenstiel Unit #1-30</b> <b>Sec. 30 T13s R19w</b> <b>2485' FNL &amp; 750' FWL</b>
<b>Formation</b>	
Anhydrite	<b>1503', +964</b>
Base	<b>1551', +646</b>
Topeka	<b>3217', -1020</b>
Heebner	<b>3458', -1261</b>
Toronto	<b>3479', -1282</b>
Lansing	<b>3500', -1303</b>
BKC	<b>3753', -1556</b>
Marmaton	<b>3789', -1592</b>
Arbuckle	<b>3859', -1662</b>
RTD	<b>3867', -1670</b>

## Sample Zone Descriptions

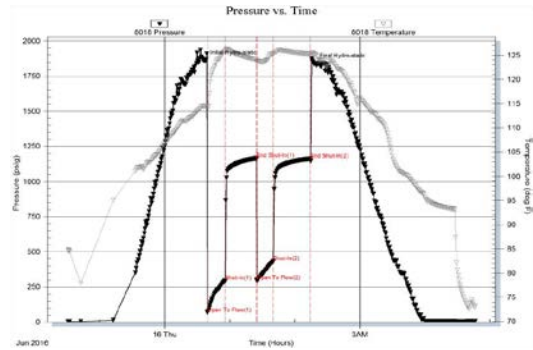
<b>Topeka 30' zone</b>	<b>(3246', -1049): Not Tested</b> Ls – Fine crystalline, oolitic with fair to good inter-crystalline and oolitic porosity, light spotted oil stain in porosity, slight show of free oil when broken, no odor, very dull fluorescents, mostly barren.
<b>Arbuckle</b>	<b>(3859', -1662): Covered in DST #1</b> Ls – Fine to medium rhombic crystalline with fair inter-crystalline and slightly vuggy porosity, light to fair spotted oil stain in porosity, slight show of free oil, fair odor, dull scattered fluorescents.

**Drill Stem Tests**  
Trilobite Testing, Inc.  
"Ray Schwager"

**DST #1      Arbuckle**

Interval (3805' – 3867') Anchor Length 62'

IHP	- 1861 #	66-294 #
IFP	- 15" – B.O.B. 3 min.	1167 #
ISI	- 30" – Dead	296-432 #
FFP	- 15" – B.O.B. 7 min.	1164 #
FSI	- 30" – Dead	
FHP	- 1838 #	
BHT	- 125°F	



Recovery:	90' SOCMW	2% Oil, 58% Water
	624' SOCW	1% Oil, 99% Water
	124' Water	

**Structural Comparison**

	American Warrior, Inc. Pfannenstiel Unit #1-30 Sec. 30 T13s R19w 2485' FNL & 750' FWL	American Warrior, Inc. Kaufman #1-30 Sec. 30 T13s R19w 2166' FSL & 2157' FWL		Kimbark Oil & Gas Orth #1 Sec. 30 T13s R19w 990' FSL & 330' FWL	
<b>Formation</b>					
Anhydrite	1503', +964	1474', +691	(+3)	NA	NA
Base	1551', +646	1523', +642	(+4)	NA	NA
Topeka	3217', -1020	3186', -1021	(+1)	NA	NA
Heebner	3458', -1261	3426', -1261	FL	3456', -1237	(-24)
Toronto	3479', -1282	3448', -1283	(+1)	3478', -1259	(-23)
Lansing	3500', -1303	3467', -1302	(-1)	3499', -1280	(-23)
BKC	3753', -1556	3721', -1556	FL	3756', -1537	(-19)
Marmaton	3789', -1592	3757', -1592	FL	NA	NA
Arbuckle	3859', -1662	3804', -1639	(-23)	3846', -1627	(-35)

## **Summary**

The location for the Pfannenstiel Unit #1-30 was found via 3-D seismic survey. The new well ran structurally as expected via the survey on all datums except the Arbuckle Formation. A thick Basil Pennsylvanian Conglomerate was encountered above the Arbuckle causing the top to be lower than expected. After all gathered data had been examined the decision was made to plug and abandon the Pfannenstiel Unit #1-30 well.

Respectfully Submitted,

Jason T Alm  
Hard Rock Consulting, Inc.