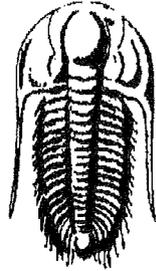


15-197-23490

30-11s-15w



**TRILOBITE
TESTING, INC.**

x(6)

DRILL STEM TEST REPORT

Prepared For: **IA Operating**

9915 W 21St. Ste B
Wichita, KS67205

ATTN: Randy K.

~~30-11-15~~ Russell KS 30-11s-15w

Schmitt 30-1

Start Date: 2008.09.22 @ 00:30:53

End Date: 2008.09.22 @ 06:45:53

Job Ticket #: 32769 DST #: 1

NE SWING
1740 FNL 1780
FEL

15-167-23490-00-00

Trilobite Testing, Inc

PO Box 1733 Hays, KS 67601

ph: 785-625-4778 fax: 785-625-5620

IA Operating

Schmitt 30-1

30 11 15 Russell KS

DST # 1

LKC "C"

2008.09.22



TRILOBITE TESTING, INC

DRILL STEM TEST REPORT

IA Operating
 9915 W 21st. Ste B
 Wichita, KS67205
 ATTN: Randy K.

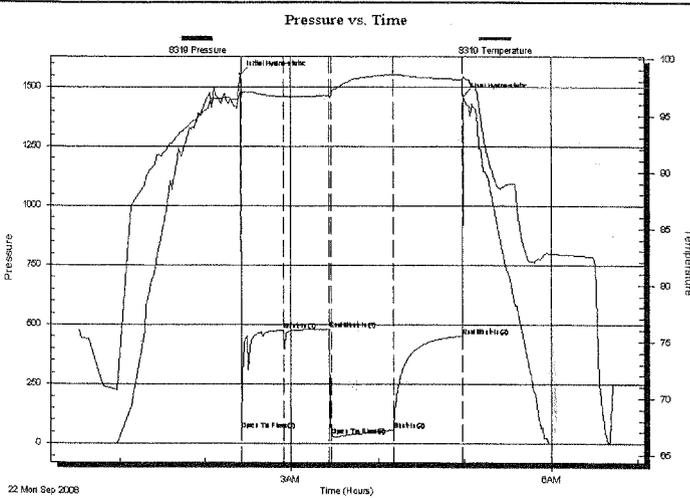
Schmitt 30-1
30 11 15 Russell KS
 Job Ticket: 32769 **DST#: 1**
 Test Start: 2008.09.22 @ 00:30:53

GENERAL INFORMATION:

Formation: **LKC "C"**
 Deviated: No Whipstock: ft (KB)
 Time Tool Opened: 02:25:53
 Time Test Ended: 06:45:53
 Interval: **2993.00 ft (KB) To 3015.00 ft (KB) (TVD)**
 Total Depth: 3015.00 ft (KB) (TVD)
 Hole Diameter: 7.88 inches Hole Condition: Good
 Test Type: Conventional Bottom Hole
 Tester: Kyle Kinderknecht
 Unit No: 31
 Reference Elevations: 1747.00 ft (KB)
 1742.00 ft (CF)
 KB to GR/CF: 5.00 ft

Serial #: 8319 Inside
 Press@RunDepth: 56.35 psig @ 2997.00 ft (KB) Capacity: 7000.00 psig
 Start Date: 2008.09.22 End Date: 2008.09.22 Last Calib.: 2008.09.22
 Start Time: 00:30:58 End Time: 06:45:52 Time On Btm: 2008.09.22 @ 02:25:23
 Time Off Btm: 2008.09.22 @ 04:59:23

TEST COMMENT: IF Surface blow died 7 min
 FF 1/2"



PRESSURE SUMMARY			
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1552.97	97.11	Initial Hydro-static
1	55.66	96.56	Open To Flow (1)
30	476.85	96.67	Shut-In(1)
61	481.13	96.71	End Shut-In(1)
62	33.67	96.73	Open To Flow (2)
105	56.35	98.59	Shut-In(2)
153	453.55	98.18	End Shut-In(2)
154	1461.32	98.44	Final Hydro-static

Recovery		
Length (ft)	Description	Volume (bbl)
80.00	MCW 70%W 30%M	0.86
2.00	Heavy Oil	0.03

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



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

TOOL DIAGRAM

IA Operating
9915 W 21St. Ste B
Wichita, KS67205
ATTN: Randy K.

Schmitt 30-1
30 11 15 Russell KS
Job Ticket: 32769 **DST#: 1**
Test Start: 2008.09.22 @ 00:30:53

Tool Information

Drill Pipe:	Length: 2956.00 ft	Diameter: 3.82 inches	Volume: 41.90 bbl	Tool Weight: 1500.00 lb
Heavy Wt. Pipe:	Length: ft	Diameter: 0.00 inches	Volume: 0.00 bbl	Weight set on Packer: 25000.00 lb
Drill Collar:	Length: 30.00 ft	Diameter: 2.25 inches	Volume: 0.15 bbl	Weight to Pull Loose: 42000.00 lb
			<u>Total Volume: 42.05 bbl</u>	Tool Chased 0.00 ft
Drill Pipe Above KB:	13.00 ft			String Weight: Initial 36000.00 lb
Depth to Top Packer:	2993.00 ft			Final 37000.00 lb
Depth to Bottom Packer:	ft			
Interval between Packers:	22.00 ft			
Tool Length:	42.00 ft			
Number of Packers:	2	Diameter: 6.75 inches		

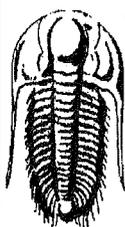
Tool Comments:

Tool Description

Length (ft) Serial No. Position Depth (ft) Accum. Lengths

Change Over Sub	1.00			2974.00	
Shut In Tool	5.00			2979.00	
Hydraulic tool	5.00			2984.00	
Packer	4.00			2988.00	20.00 Bottom Of Top Packer
Packer	5.00			2993.00	
Stubb	1.00			2994.00	
Perforations	3.00			2997.00	
Recorder	0.00	8319	Inside	2997.00	
Recorder	0.00	8369	Inside	2997.00	
Perforations	15.00			3012.00	
Bullnose	3.00			3015.00	22.00 Bottom Packers & Anchor

Total Tool Length: 42.00



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

FLUID SUMMARY

IA Operating
9915 W 21St. Ste B
Wichita, KS67205
ATTN: Randy K.

Schmitt 30-1
30 11 15 Russell KS
Job Ticket: 32769 **DST#: 1**
Test Start: 2008.09.22 @ 00:30:53

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:	28000 ppm
Viscosity:	54.00 sec/qt	Cushion Volume:	bbl		
Water Loss:	8.78 in ³	Gas Cushion Type:			
Resistivity:	ohm.m	Gas Cushion Pressure:	psig		
Salinity:	3800.00 ppm				
Filter Cake:	inches				

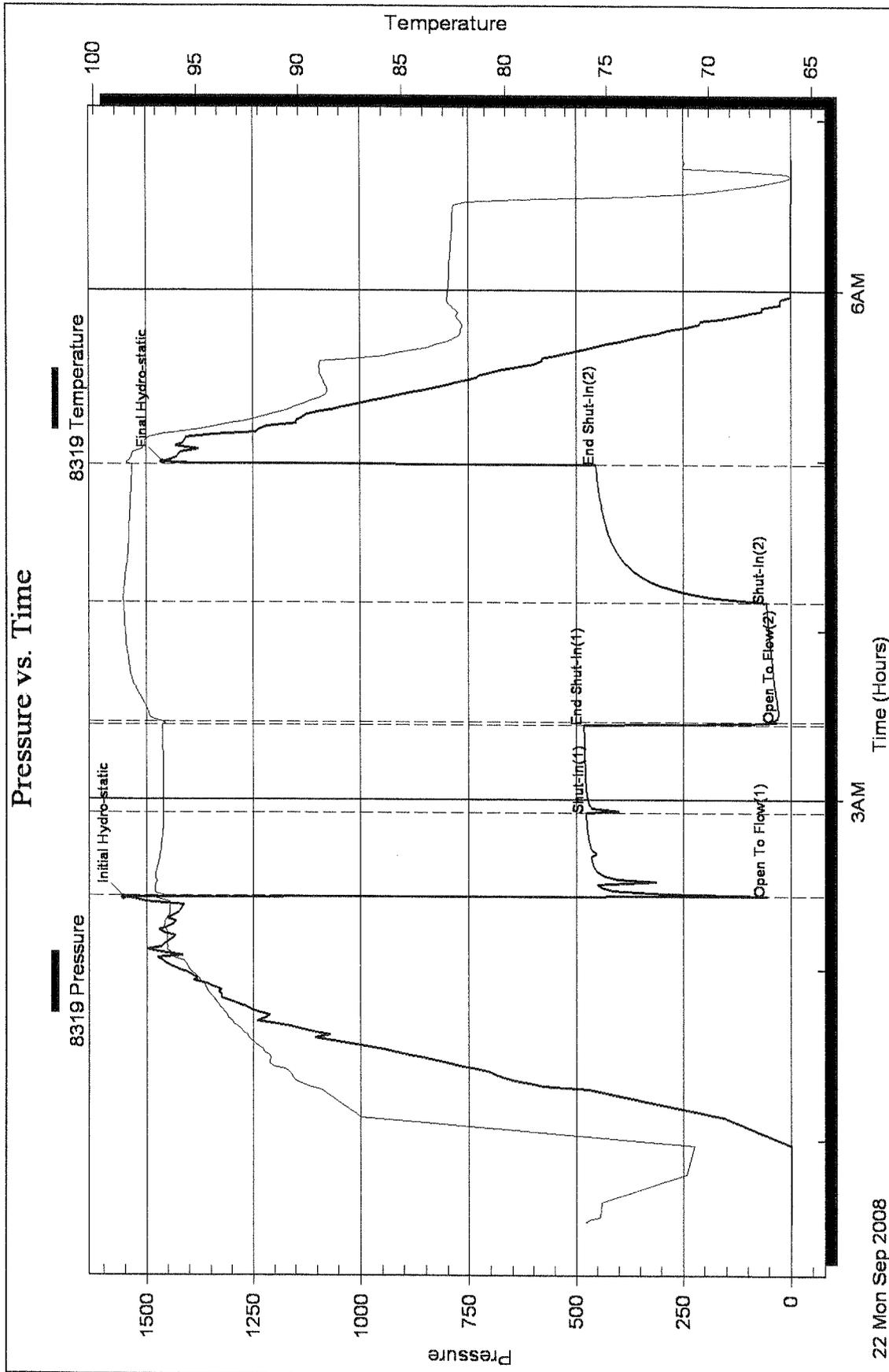
Recovery Information

Recovery Table

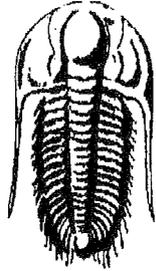
Length ft	Description	Volume bbl
80.00	MCW 70%W 30%M	0.856
2.00	Heavy Oil	0.028

Total Length: 82.00 ft Total Volume: 0.884 bbl
Num Fluid Samples: 0 Num Gas Bombs: 0 Serial #:
Laboratory Name: Laboratory Location:
Recovery Comments: rw .26 @ 69 deg.

Pressure vs. Time



22 Mon Sep 2008



**TRILOBITE
TESTING, INC.**

DRILL STEM TEST REPORT

Prepared For: **IA Operating**

9915 W 21St. Ste B
Wichita, KS67205

ATTN: Randy K.

30 11 15 Russell KS

Schmitt 30-1

Start Date: 2008.09.22 @ 22:35:34

End Date: 2008.09.23 @ 05:40:34

Job Ticket #: 32770 DST #: 2

Trilobite Testing, Inc

PO Box 1733 Hays, KS 67601

ph: 785-625-4778 fax: 785-625-5620

IA Operating

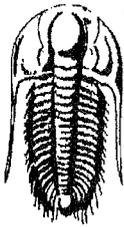
Schmitt 30-1

30 11 15 Russell KS

DST # 2

LKC "H+K"

2008.09.22



TRILOBITE TESTING, INC

DRILL STEM TEST REPORT

IA Operating
 9915 W 21st. Ste B
 Wichita, KS67205
 ATTN: Randy K.

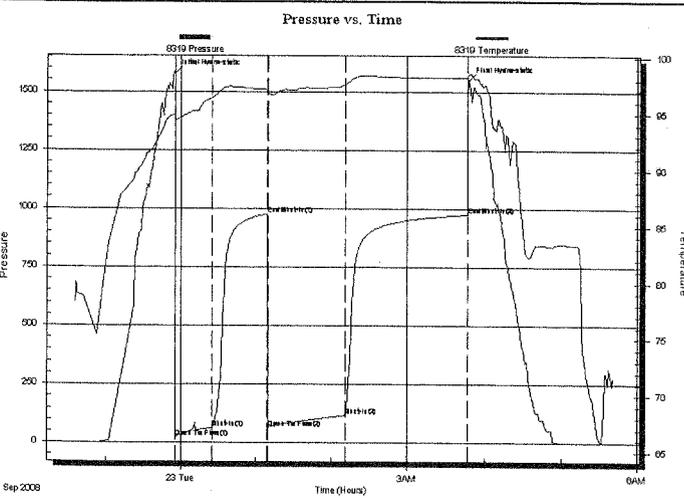
Schmitt 30-1
30 11 15 Russell KS
 Job Ticket: 32770 DST#: 2
 Test Start: 2008.09.22 @ 22:35:34

GENERAL INFORMATION:

Formation: **LKC "H-K"**
 Deviated: No Whipstock: ft (KB)
 Time Tool Opened: 23:56:04
 Time Test Ended: 05:40:34
 Test Type: Conventional Bottom Hole
 Tester: Kyle Kinderknecht
 Unit No: 31
 Interval: **3103.00 ft (KB) To 3220.00 ft (KB) (TVD)**
 Total Depth: 3220.00 ft (KB) (TVD)
 Reference Elevations: 1747.00 ft (KB)
 1742.00 ft (CF)
 Hole Diameter: 7.88 inches Hole Condition: Good
 KB to GR/CF: 5.00 ft

Serial #: 8319 Inside
 Press@RunDepth: 117.23 psig @ 3107.00 ft (KB) Capacity: 7000.00 psig
 Start Date: 2008.09.22 End Date: 2008.09.23 Last Calib.: 2008.09.23
 Start Time: 22:35:39 End Time: 05:40:33 Time On Btm: 2008.09.22 @ 23:55:34
 Time Off Btm: 2008.09.23 @ 03:47:04

TEST COMMENT: IF BOB 28 min
 ISI Surface died 10 min
 FF BOB 50 min
 FSI 1" died 60 min



PRESSURE SUMMARY

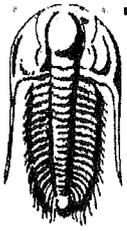
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1576.45	94.88	Initial Hydro-static
1	22.39	94.46	Open To Flow (1)
30	63.33	96.41	Shut-In(1)
73	976.36	97.15	End Shut-In(1)
74	63.22	96.84	Open To Flow (2)
135	117.23	97.58	Shut-In(2)
231	974.05	98.21	End Shut-In(2)
232	1546.34	98.49	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
190.00	GsyHOOCM 35%G 40%O 25%M	2.42
90.00	GsyOCM 10%G 10%O 80%M	1.28
0.00	120' GIP	0.00

Gas Rates

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



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

TOOL DIAGRAM

IA Operating
9915 W 21st. Ste B
Wichita, KS 67205
ATTN: Randy K.

Schmitt 30-1
30 11 15 Russell KS
Job Ticket: 32770 **DST#: 2**
Test Start: 2008.09.22 @ 22:35:34

Tool Information

Drill Pipe:	Length: 3076.00 ft	Diameter: 3.82 inches	Volume: 43.60 bbl	Tool Weight: 1500.00 lb
Heavy Wt. Pipe:	Length: ft	Diameter: 0.00 inches	Volume: 0.00 bbl	Weight set on Packer: 25000.00 lb
Drill Collar:	Length: 30.00 ft	Diameter: 2.25 inches	Volume: 0.15 bbl	Weight to Pull Loose: 40000.00 lb
		Total Volume:	43.75 bbl	Tool Chased 0.00 ft
Drill Pipe Above KB:	23.00 ft			String Weight: Initial 38000.00 lb
Depth to Top Packer:	3103.00 ft			Final 39000.00 lb
Depth to Bottom Packer:	ft			
Interval between Packers:	117.00 ft			
Tool Length:	137.00 ft			
Number of Packers:	2	Diameter: 6.75 inches		

Tool Comments:

Tool Description	Length (ft)	Serial No.	Position	Depth (ft)	Accum. Lengths
Change Over Sub	1.00			3084.00	
Shut In Tool	5.00			3089.00	
Hydraulic tool	5.00			3094.00	
Packer	4.00			3098.00	20.00 Bottom Of Top Packer
Packer	5.00			3103.00	
Stubb	1.00			3104.00	
Perforations	3.00			3107.00	
Recorder	0.00	8319	Inside	3107.00	
Recorder	0.00	8369	Inside	3107.00	
Change Over Sub	1.00			3108.00	
Blank Spacing	93.00			3201.00	
Change Over Sub	1.00			3202.00	
Perforations	15.00			3217.00	
Bullnose	3.00			3220.00	117.00 Bottom Packers & Anchor

Total Tool Length: 137.00



**TRILOBITE
TESTING, INC**

DRILL STEM TEST REPORT

FLUID SUMMARY

IA Operating

Schmitt 30-1

9915 W 21St. Ste B
Wichita, KS67205

30 11 15 Russell KS

Job Ticket: 32770

DST#: 2

ATTN: Randy K.

Test Start: 2008.09.22 @ 22:35:34

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:

ppm

Viscosity: 51.00 sec/qt

Cushion Volume:

bbl

Water Loss: 10.38 in³

Gas Cushion Type:

Resistivity: ohm.m

Gas Cushion Pressure:

psig

Salinity: 5000.00 ppm

Filter Cake: inches

Recovery Information

Recovery Table

Length ft	Description	Volume bbl
190.00	GsyHOCM 35%G 40%O 25%M	2.416
90.00	GsyOCM 10%G 10%O 80%M	1.276
0.00	120' GIP	0.000

Total Length: 280.00 ft

Total Volume: 3.692 bbl

Num Fluid Samples: 0

Num Gas Bombs: 0

Serial #:

Laboratory Name:

Laboratory Location:

Recovery Comments:

Serial #: 8319

Inside

IA Operating

30 11 15 Russell KS

DST Test Number: 2

Pressure vs. Time

