

**TRILOBITE  
TESTING, INC**

## DRILL STEM TEST REPORT

Mai Oil Operations, Inc  
8411 Preston RD, STE 800  
Dallas, TX 75225 + 5520  
ATTN: Steve Murphy

**Lichter-Lindsay Unit #1**  
**25-17s-15w Barton,KS**  
Job Ticket: 45198      DST#: 1  
Test Start: 2011.08.10 @ 07:01:00

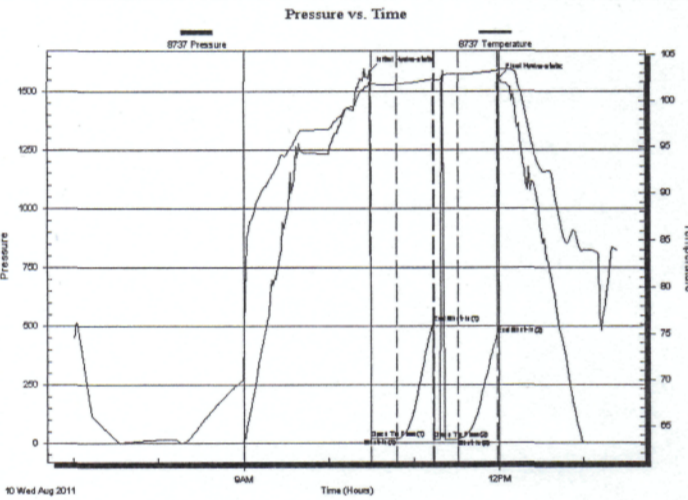
### GENERAL INFORMATION:

Formation: **LKC "A-C"**  
Deviated: No      Whipstock:      ft (KB)  
Time Tool Opened: 10:29:30  
Time Test Ended: 13:25:00  
Interval: **3286.00 ft (KB) To 3320.00 ft (KB) (TVD)**  
Total Depth: 3320.00 ft (KB) (TVD)  
Hole Diameter: 7.88 inches      Hole Condition: Good  
Test Type: Conventional Bottom Hole  
Tester: Cody Bloedorn  
Unit No: 44  
Reference Elevations: 2005.00 ft (KB)  
1995.00 ft (CF)  
KB to GR/CF: 10.00 ft

### Serial #: 8737      Inside

Press@RunDepth: 17.98 psig @ 3292.00 ft (KB)      Capacity: 8000.00 psig  
Start Date: 2011.08.10      End Date: 2011.08.10      Last Calib.: 2011.08.10  
Start Time: 07:01:01      End Time: 13:25:00      Time On Btrm: 2011.08.10 @ 10:29:00  
Time Off Btrm: 2011.08.10 @ 12:00:00

TEST COMMENT: 15 - IF- 1/4" blow, died in 11 Min.  
30 - IS- No blow back.  
15 - FF- No blow back, flushed tool, no blow back  
30 - FS- No blow back.



### PRESSURE SUMMARY

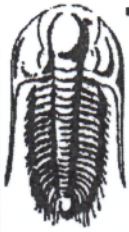
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1584.98	102.08	Initial Hydro-static
1	21.18	101.86	Open To Flow (1)
19	21.58	101.79	Shut-In(1)
45	513.94	102.32	End Shut-In(1)
45	16.31	101.99	Open To Flow(2)
63	17.98	102.84	Shut-In(2)
90	464.73	103.21	End Shut-In(2)
91	1557.56	103.41	Final Hydro-static

### Recovery

Length (ft)	Description	Volume (bbl)
2.00	VM, 98%M, 2%W	0.03

### Gas Rates

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



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 ATTN: Steve Murphy

**Lichter-Lindsay Unit #1**  
**25-17s-15w Barton,KS**  
 Job Ticket: 45199      DST#: 2  
 Test Start: 2011.08.10 @ 20:13:00

**GENERAL INFORMATION:**

Formation: **LKC "E-F"**  
 Deviated: No Whipstock: ft (KB)  
 Time Tool Opened: 22:19:30  
 Time Test Ended: 02:23:30  
 Interval: **3340.00 ft (KB) To 3370.00 ft (KB) (TVD)**  
 Total Depth: 3370.00 ft (KB) (TVD)  
 Hole Diameter: 7.88 inches Hole Condition: Good

Test Type: Conventional Bottom Hole  
 Tester: Cody Bloedorn  
 Unit No: 44  
 Reference Elevations: 2005.00 ft (KB)  
 1995.00 ft (CF)  
 KB to GR/CF: 10.00 ft

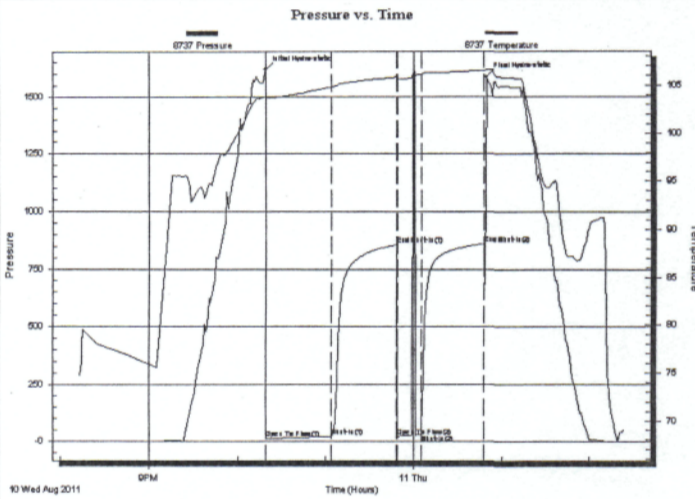
**Serial #: 8737**

**Inside**

Press@RunDepth: 29.48 psig @ 3342.00 ft (KB)  
 Start Date: 2011.08.10 End Date: 2011.08.11  
 Start Time: 20:13:01 End Time: 02:23:30

Capacity: 8000.00 psig  
 Last Calib.: 2011.08.11  
 Time On Btrm: 2011.08.10 @ 22:19:00  
 Time Off Btrm: 2011.08.11 @ 00:49:30

**TEST COMMENT:** 45 - IF- 1/4" blow  
 45 - IS- No blow back  
 15 - FF- No blow , w aited 10 Min, flushed tool, No blow back  
 FSI- No blow back



**PRESSURE SUMMARY**

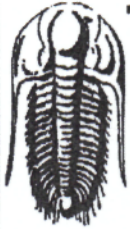
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1617.48	103.90	Initial Hydro-static
1	12.63	103.64	Open To Flow (1)
45	22.51	104.88	Shut-In(1)
90	858.11	105.90	End Shut-In(1)
90	23.69	105.62	Open To Flow (2)
106	29.48	106.13	Shut-In(2)
149	862.82	106.57	End Shut-In(2)
151	1586.05	106.65	Final Hydro-static

**Recovery**

Length (ft)	Description	Volume (bbl)
33.00	VM, 5%W, 98%M	0.46

**Gas Rates**

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



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Mai Oil Operations, Inc  
8411 Preston RD, STE 800  
Dallas, TX 75225 + 5520  
ATTN: Steve Murphy

**Lichter-Lindsay Unit #1**  
**25-17s-15w Barton,KS**  
Job Ticket: 45200      DST#: 3  
Test Start: 2011.08.11 @ 21:47:00

### GENERAL INFORMATION:

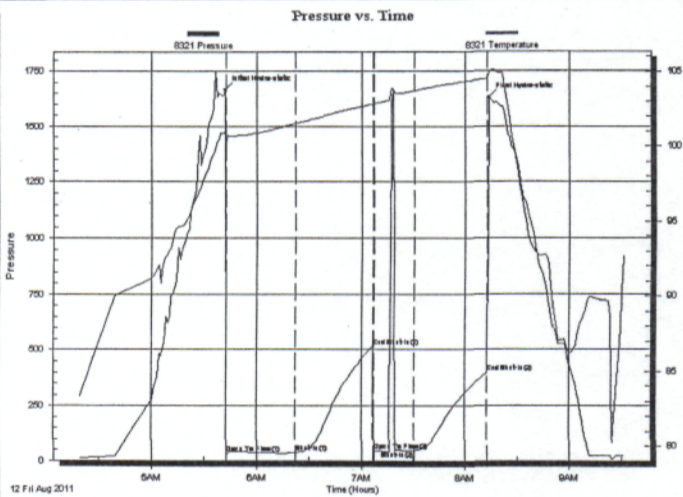
Formation: **LKC "H-I"**  
Deviated: **No Whipstock**      ft (KB)  
Time Tool Opened: 05:42:22  
Time Test Ended: 09:31:51  
Test Type: Conventional Bottom Hole  
Tester: Cody Bloedorn  
Unit No: 44  
Interval: **3412.00 ft (KB) To 3450.00 ft (KB) (TVD)**  
Reference Elevations: 2005.00 ft (KB)  
Total Depth: 3450.00 ft (KB) (TVD)      1995.00 ft (CF)  
Hole Diameter: 7.88 inches      Hole Condition: Good      KB to GR/CF: 10.00 ft

### Serial #: 8321

**Outside**

Press@RunDepth: 47.02 psig @ 3422.00 ft (KB)      Capacity: 8000.00 psig  
Start Date: 2011.08.12      End Date: 2011.08.12      Last Calib.: 2011.08.11  
Start Time: 04:19:22      End Time: 09:31:52      Time On Btm: 2011.08.12 @ 05:41:52  
Time Off Btm: 2011.08.12 @ 08:13:21

TEST COMMENT: 30 - IF- 1/4" blow , died in 28 Min.  
45 - IS- No blow back  
20 - FF- No blow back, waited 10 Min, flushed tool, weak surface blow , Died in 10 Min.  
45 - FSI- No blow back.



### PRESSURE SUMMARY

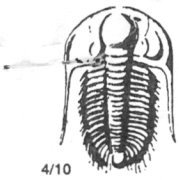
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1666.15	101.02	Initial Hydro-static
1	34.40	100.13	Open To Flow (1)
41	38.58	101.51	Shut-In(1)
85	514.47	102.83	End Shut-In(1)
86	48.11	102.77	Open To Flow (2)
109	47.02	103.74	Shut-In(2)
151	396.00	104.58	End Shut-In(2)
152	1631.95	105.01	Final Hydro-static

### Recovery

Length (ft)	Description	Volume (bbl)
20.00	M, oil scum	0.28

### Gas Rates

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



# TRILOBITE TESTING INC.

P.O. Box 1733 • Hays, Kansas 67601

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BY: \_\_\_\_\_

## Test Ticket

NO. 45198 16146

Well Name & No. Lichter-Lindsay unit #1 Test No. 1 Date 8-10-11  
 Company Mai Oil Operations, INC. Elevation 1995 KB 2005 GL  
 Address 8411 Preston RD, STE 800 Dallas TX, 75225 + 5520  
 Co. Rep / Geo. Steve Murphy Rig South Wind 3  
 Location: Sec. 25 Twp. 17s Rge. 15w Co. Barton State KS

Interval Tested 3286-3320 Zone Tested LKC "A-c"  
 Anchor Length 34' Drill Pipe Run 3286 Mud Wt. 8.8  
 Top Packer Depth 3281 Drill Collars Run — Vis 50  
 Bottom Packer Depth 3286 Wt. Pipe Run — WL 8.8  
 Total Depth 3320 Chlorides 4000 ppm System LCM  
 Blow Description IF - 1/4" blow, died in 11 Min.  
ISI - No blow back  
FF - No blow back, flushed tool, No blow back  
FSI - No blow back,

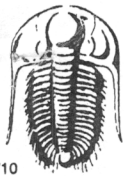
Rec	Feet of	%gas	%oil	%water	%mud
<u>2</u>	<u>WM</u>		<u>2</u>	<u>98</u>	
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud

Rec Total 2 BHT 103° Gravity \_\_\_\_\_ API RW \_\_\_\_\_ @ \_\_\_\_\_ °F Chlorides \_\_\_\_\_ ppm

(A) Initial Hydrostatic 1584  Test 1125 T-On Location 5:43am  
 (B) First Initial Flow 21  Jars \_\_\_\_\_ T-Started 7:01am  
 (C) First Final Flow 21  Safety Joint \_\_\_\_\_ T-Open 10:29am  
 (D) Initial Shut-In 22  Circ Sub \_\_\_\_\_ T-Pulled 11:59am  
 (E) Second Initial Flow 513  Hourly Standby \_\_\_\_\_ T-Out 1:25pm  
 (F) Second Final Flow 16  Mileage 48 x 2 96RT 134.40  
 (G) Final Shut-In 464  Sampler \_\_\_\_\_  
 (H) Final Hydrostatic 1557  Straddle \_\_\_\_\_  Ruined Shale Packer \_\_\_\_\_  
 Shale Packer \_\_\_\_\_  Ruined Packer \_\_\_\_\_  
 Extra Packer \_\_\_\_\_  Extra Copies \_\_\_\_\_  
 Initial Open 15  Extra Recorder \_\_\_\_\_ Sub Total 0  
 Initial Shut-In 30  Day Standby \_\_\_\_\_ Total 1259.40  
 Final Flow 15  Accessibility \_\_\_\_\_ MP/DST Disc't \_\_\_\_\_  
 Final Shut-In 30 Sub Total 1259.40

Approved By \_\_\_\_\_ Our Representative Cody Black

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.



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P.O. Box 1733 • Hays, Kansas 67601

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## Test Ticket

NO. 45199

4/10

Well Name & No. Lichter-Lindsay unit #1 Test No. 2 Date 8-10-11  
 Company Mai Oil Elevation 1995 KB 2005 GL  
 Address 8411 Preston R.D, STE 800 Dallas TX 75225 + 5520  
 Co. Rep / Geo. Steve Murphy Rig Southwind #3  
 Location: Sec. 25 Twp. 17S Rge. 15W Co. Barton State KS

Interval Tested 3340 - 3370 Zone Tested LKC "E-F"  
 Anchor Length 30' Drill Pipe Run 3343 Mud Wt. 9.0  
 Top Packer Depth 3335 Drill Collars Run — Vis 50  
 Bottom Packer Depth 3340 Wt. Pipe Run — WL 9.2  
 Total Depth 3370 Chlorides 5500 ppm System LCM  
 Blow Description IF - 1/4" blow  
ISI - ~~100~~ No blow back  
FF - No blow, waited 10 Min, flushed tool, no blow back  
FSI - No blow back

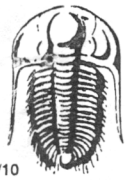
Rec	Feet of	%gas	%oil	%water	%mud
<u>33</u>	<u>WM</u>			<u>5</u>	<u>95</u>
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud

Rec Total 33 BHT 106° Gravity \_\_\_\_\_ API RW \_\_\_\_\_ @ \_\_\_\_\_ °F Chlorides \_\_\_\_\_ ppm

(A) Initial Hydrostatic 1617  Test 1125 T-On Location 7:52 pm  
 (B) First Initial Flow 12  Jars \_\_\_\_\_ T-Started 8:13 pm  
 (C) First Final Flow 22  Safety Joint \_\_\_\_\_ T-Open 10:19 pm  
 (D) Initial Shut-In 858  Circ Sub \_\_\_\_\_ T-Pulled 12:49  
 (E) Second Initial Flow 23  Hourly Standby \_\_\_\_\_ T-Out 2:24 am  
 (F) Second Final Flow 29  Mileage 48x2 90 RT 134.40 Comments \_\_\_\_\_  
 (G) Final Shut-In 862  Sampler \_\_\_\_\_  
 (H) Final Hydrostatic 1586  Straddle \_\_\_\_\_  Ruined Shale Packer \_\_\_\_\_  
 Shale Packer \_\_\_\_\_  Ruined Packer \_\_\_\_\_  
 Extra Packer \_\_\_\_\_  Extra Copies \_\_\_\_\_  
 Initial Open 45  Extra Recorder \_\_\_\_\_ Sub Total 0  
 Initial Shut-In 45  Day Standby \_\_\_\_\_ Total 1259.40  
 Final Flow 15  Accessibility \_\_\_\_\_ MP/DST Disc't \_\_\_\_\_  
 Final Shut-In 45 Sub Total 1259.40

Approved By \_\_\_\_\_ Our Representative Cody Bloedorn

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AUG 12 2011

## Test Ticket

NO. 45200

BY: \_\_\_\_\_

Well Name & No. Lichter-Lindsay unit #1 Test No. 3 Date 8-11-11  
 Company Mai Oil Operations, INC, Elevation 1995 KB 2005 GL  
 Address 8411 Preston RD, STE 800 Dallas TX, 75225 + 5520  
 Co. Rep / Geo. Steve Murphy Rig Southwind #3  
 Location: Sec. 25 Twp. 17s Rge. 15w Co. Barton State KS

Interval Tested 3412-3450 Zone Tested KC "H&I"  
 Anchor Length 38' Drill Pipe Run 3405 Mud Wt. 9.0  
 Top Packer Depth 3407 Drill Collars Run — Vis 50  
 Bottom Packer Depth 3412 Wt. Pipe Run — WL 9.2  
 Total Depth 3450 Chlorides 5500 ppm System LCM \_\_\_\_\_  
 Blow Description IF - 1/4" blow, dried in 28 Min.  
ISI - No blow back  
FF - No blow, waited 10 Min. flushed tool, weak surface blow dried in 10  
FSI - No blow back

Rec	Feet of	%gas	%oil	%water	%mud
<u>20</u>	<u>M - oil scum</u>			<u>100</u>	
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud
Rec	Feet of	%gas	%oil	%water	%mud

Rec Total \_\_\_\_\_ BHT \_\_\_\_\_ Gravity \_\_\_\_\_ API RW \_\_\_\_\_ @ \_\_\_\_\_ °F Chlorides \_\_\_\_\_ ppm

(A) Initial Hydrostatic 1666  Test 1125 T-On Location 9:43am  
 (B) First Initial Flow 34  Jars \_\_\_\_\_ T-Started 9:47am  
 (C) First Final Flow 38  Safety Joint \_\_\_\_\_ T-Open 11:33am  
 (D) Initial Shut-In 514  Circ Sub \_\_\_\_\_ T-Pulled 2:03pm  
 (E) Second Initial Flow 48  Hourly Standby \_\_\_\_\_ T-Out 3:23pm  
 (F) Second Final Flow 47  Mileage 96 RT . 134.40 Comments 38k, 48x2 - Picked up tools.  
 (G) Final Shut-In 396  Sampler \_\_\_\_\_  
 (H) Final Hydrostatic 1631  Straddle \_\_\_\_\_  Ruined Shale Packer \_\_\_\_\_  
 Shale Packer \_\_\_\_\_  Ruined Packer \_\_\_\_\_  
 Extra Packer \_\_\_\_\_  Extra Copies \_\_\_\_\_  
 Extra Recorder \_\_\_\_\_  
 Day Standby \_\_\_\_\_  
 Accessibility \_\_\_\_\_  
 Sub Total 1259.40 Total 1259.40 MP/DST Disc't \_\_\_\_\_

Approved By \_\_\_\_\_ Our Representative Cody Bloedor

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