153845

BEREXCO, INC.
SHEARER # 7
50'S OF SENESW SECTION 23 T17S-R25W
NESS COUNTY, KANSAS

GEOLOGIST
WILLIAM B. BYNOG

RESUME

OPERATOR:	BEREXCO, INC.
WELL NAME & NUMBER:	SHEARER# 7
LOCATION:	50' S SENESW SECTION 23 T17S-R25W
COUNTY:	NESS
STATE:	KANSAS
SPUD DATE: 4-1-2008	COMPLETION DATE: 4-10-2008
ELEVATIONS:	GL: 2483' KB: 2494'
CONTRACTOR:	BEREDCO RIG 10
LOGS: LOG TECH	TYPES: DIL, RAG & MICROLOG ENGINEER: MIKE GARRISON
WELLSITE ENGINEER:	NONE
MUD COMPANY:	ANDY'S MUD
MUD TYPE & ENGINEER:	FRESH CHEMICAL: KURT WERTH
GEOLOGIST:	WILLIAM B.BYNOG
HOLE SIZE:	7 7/8
MUD LOGGING BY:	NONE
DRILL STEM TEST COMPANY:	TRILOBITE TESTING
DRILL STEM TEST:	DST#1 4270-4340, DST#2 4354-4412, DST#3 4410-16
WELL STATUS:	RAN PRODUCTION PIPE

SUMMARY AND CONCLUSION

Shearer # 7 was a Mississippian Test drilled a total depth of 4450 feet testing the Lansing Kansas City, Pawnee, Fort Scott and Mississippi Formations. Our primary objectives were the Fort Scott and Mississippian, secondary the Lansing Kansas City.

There were no sample shows in the upper Lansing Kansas City and Pawnee Formations.

The first sample shows were in the Fort Scott at 4308 feet. Samples through this interval were fossiliferous microcrystalline limestone with poor to fair vuggy porosity, spotty stain and good cuts. Drill stem test # 1 yielded 530 feet of gas in pipe and 90 feet of gassy mud with a scum of oil.

The Mississippi Formation at 4404 feet was a microsucrosic dolomite with fair porosity, even stain and good cuts. Drill stem test # 2 tested the top eight feet recovering 120 feet of gas in pipe, 240 feet of gas and oil cut mud and 240 feet of gas, water and oil cut mud. Drill stem test # 3 tested 14 feet from top and recovered 180 feet of gas in pipe, 60 feet of gas, mud and water cut oil (70% oil) and 360 feet of mud cut water with a scum of oil.

Logs agreed with sample evaluation recording tight Lansing Kansas City zones, fair porosity development in the Fort Scott and good porosity development in the Mississippian with high resistivity in the first sixteen feet. There is a possible additional zone in the Mississippian at 4428-30 feet with good sample shows.

A decision was made to run production pipe on the fair Mississippian drill stem test results.

FORMATION TOPS

FORMATION	DEPTH (LOGS)
STONE CORRAL	1730(+764)
TOPEKA	
35' ZONE	
PLATTSMOUTH	
HEEBNER	3768(-1274)
TORONTO	3790(-1296)
LANSING A	3808(-1314)
B ZONE	
C ZONE	
D ZONE	
E ZONE	
F ZONE	
G ZONE	
H ZONE	
I ZONE	
J ZONE	
K ZONE	
L ZONE	
BKC	4104(-1610)
MARMATON	4140(-1646)
PAWNEE	4230(-1736)
FORT SCOTT	
CHEROKEE	
MISSISSIPPI	4404(-1910)
CONGLOMERATE	
ARBUCKLE	

31854

TRILOBITE TESTING INC.

P.O. Box 362 • Hays, Kansas 67601

10/05

Test Ticket

Well Name & No. Shearer #7 Test No. 1 Date 4-8-08

Company Berexco Zone Tested Ft. Scott

Address POB 20380 Wichita, KS 67208 Elevation 2494 KB 2483 GL

Co. Rep / Geo. Bryan Bynog Rig Bredco #10

Location: Sec. 23 Twp. 17s Rge. 25w Co. Ness State KS

Comment: Release date / time:

Interval Tested 4270 to 4340 Initial Str Wt./Lbs. 42,000 Unseated Str Wt/Lbs. 43,000

Anchor Length 70 Wt. Set Lbs. 28,000 Wt. Pulled Loose/Lbs. 62,000

Top Packer Depth 4266 Tool Weight 2,500

Bottom Packer Depth 4270 Hole Size 7 7/8" X Rubber Size 6 3/4" X

Total Depth 4340 Wt. Pipe Run — Drill Collar Run 200

Mud Wt. 9.3 LCM / Vis. 53 WL 10.2 Drill Pipe Size 4 Ft. Run 4,055

Blow Description IF: 9½" blow

ISI: No return.

FF: B.O.B. @ 13 min.

FSI: Weak surface return died @ 10 min.

Recovery - Total Feet 90 GIP 530 Ft. in DC 90 Ft. in DP 0

Rec. 90 Feet of GM w/sum of oil 5 %gas %oil %water 95 %mud

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

BHT 115 °F Gravity — °API D @ — °F Corrected Gravity — °API

RW — @ — °F Chlorides — ppm Recovery — Chlorides 5,000 ppm System

	AK-1 Alpine				
(A) Initial Hydrostatic Mud	2176 PSI	Recorder No.	8017	Test X	1,200
(B) First Initial Flow Pressure	22 PSI	(depth)	4273	Jars X	250
(C) First Final Flow Pressure	38 PSI	Recorder No.	8351	Safety Jt. X	75
(D) Initial Shut-In Pressure	234 PSI	(depth)	4273	Circ Sub X	
(E) Second Initial Flow Pressure	39 PSI	Recorder No.		Sampler	
(F) Second Final Flow Pressure	66 PSI	(depth)		Straddle	
(G) Final Shut-In Pressure	348 PSI	**Initial Opening**	15	Ext. Packer	
(Q) Final Hydrostatic Mud	2,110 PSI	Initial Shut-In	30	Shale Packer	
		Final Flow	60	Ruined Packer	
		Final Shut-In	90	Mileage	115 RT 143.75
		T-On Location	8:50	Sub Total:	
		T-Started	10:17	Std. By	
		T-Open	12:35	Acc. Chg:	
		T-Pulled	15:51	Other:	
		T-Out	17:38	Total:	

Approved By

Our Representative Chuck Smith

DRILL STEM TEST REPORT

TRILOBITE TESTING, INC

Berexco

POB 20380
Wichita, KS 67208

ATTN: Bryan Bynog

Shearer #7

Sec.23 17s-25w Ness

Job Ticket: 31854 DST#: 1

Test Start: 2008.04.08 @ 10:17:00

GENERAL INFORMATION:

Formation: Ft. Scott
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 12:35:20
Time Test Ended: 17:37:50

Test Type: Conventional Bottom Hole
Tester: Chuck Smith
Unit No: 37

Interval: 4270.00 ft (KB) To 4340.00 ft (KB) (TVD)
Total Depth: 4340.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

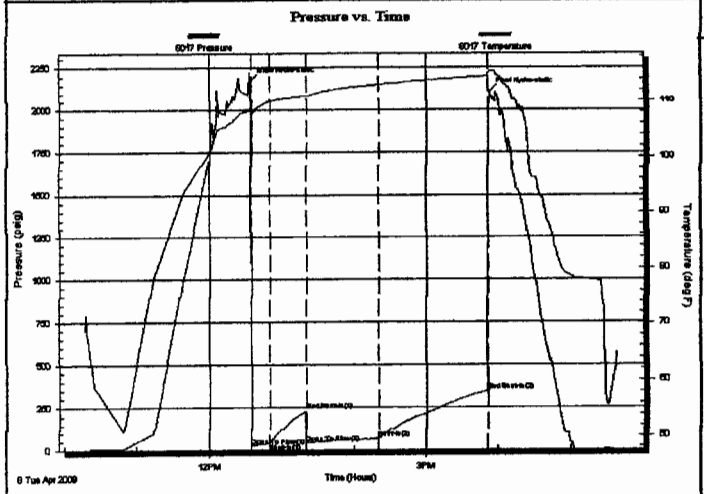
Reference Elevations: 2494.00 ft (KB)
2483.00 ft (CF)
KB to GR/CF: 11.00 ft

Serial #: 8017 **Inside**

Press@RunDepth: 65.62 psig @ 4273.00 ft (KB)
Start Date: 2008.04.08 End Date: 2008.04.08
Start Time: 10:17:01 End Time: 17:37:50

Capacity: 7000.00 psig
Last Calib.: 2008.04.08
Time On Btm: 2008.04.08 @ 12:34:40
Time Off Btm: 2008.04.08 @ 15:53:00

TEST COMMENT: IF: 9 1/2" blow
ISI: No return.
FF: B.O.B. @ 13 min.
FSI: Weak surface return died @ 10 min.



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	2176.09	108.68	Initial Hydro-static
1	21.58	107.64	Open To Flow (1)
16	37.53	110.02	Shut-In(1)
46	233.93	111.05	End Shut-In(1)
46	38.66	111.01	Open To Flow (2)
106	65.62	113.00	Shut-In(2)
197	347.96	114.51	End Shut-In(2)
199	2109.66	115.40	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
90.00	GM 5%G 95%M With scum of oil.	0.44
0.00	530 Feet of G.I.P.	0.00

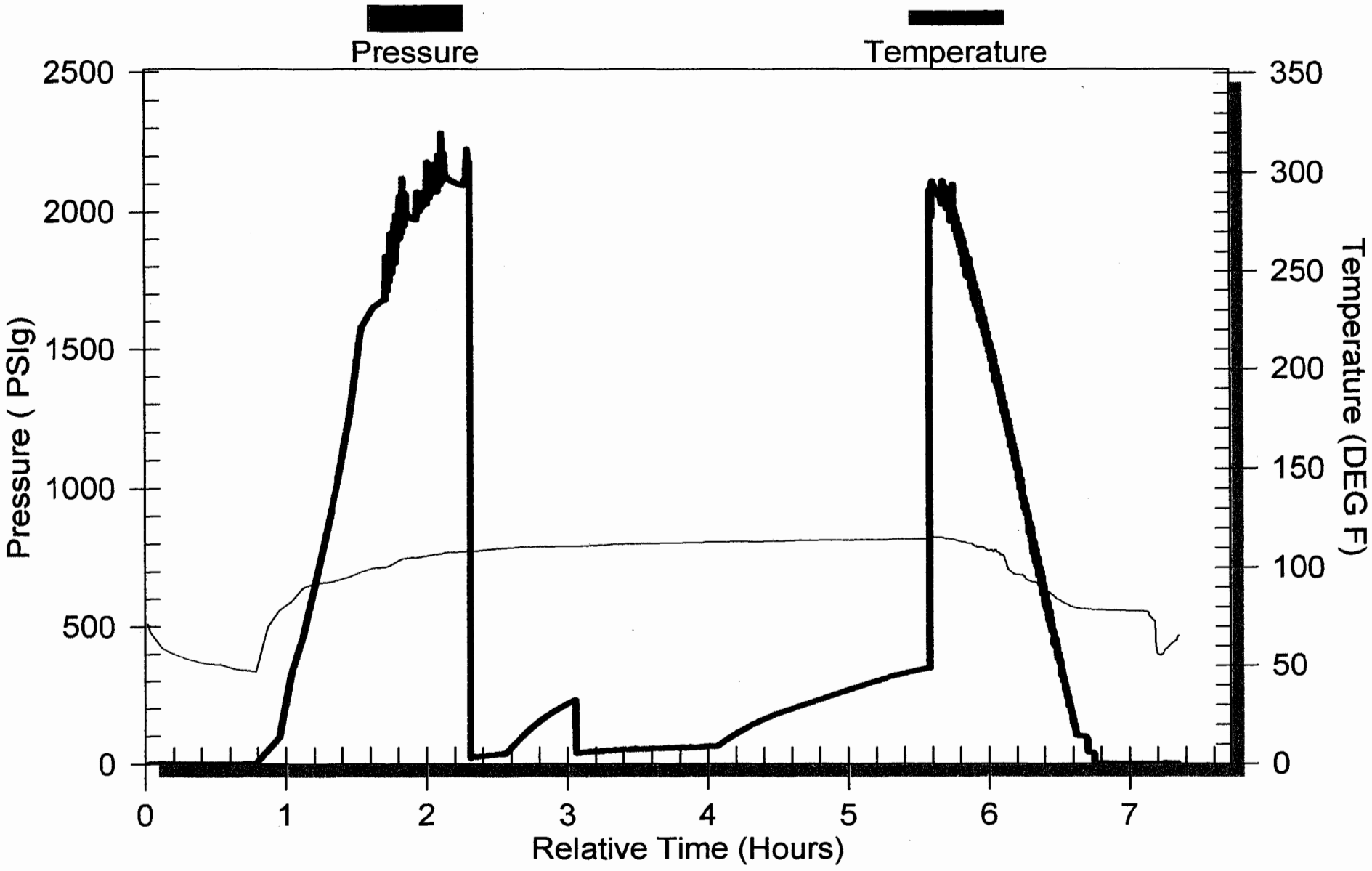
Gas Rates

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

Pressure & Temperature: Recorder# 8017

Every 1 Points are Plotted.

Run ID: dst#1
Start Time: Tue Apr 08 10:17:00 2008
File: C:\testdata\40881017.017



31855

TRILOBITE TESTING INC.

P.O. Box 362 • Hays, Kansas 67601

10/05

Test Ticket

Well Name & No. Shearer #7 Test No. 2 Date 4-9-08

Company Berexco Zone Tested Mississippian

Address POB 20380 Wichita, KS 67208 Elevation 2494 KB 2483 GL

Co. Rep / Geo. Bryan Bynog Rig Beredco #10

Location: Sec. 23 Twp. 17s Rge. 25w Co. Ness State KS

Comment: Release date / time:

Interval Tested 4354 to 4412 Initial Str Wt./Lbs. 43,000 Unseated Str Wt/Lbs. 45,000

Anchor Length 58 Wt. Set Lbs. 28,000 Wt. Pulled Loose/Lbs. 55,000

Top Packer Depth 4350 Tool Weight 2,000

Bottom Packer Depth 4354 Hole Size 7 7/8" X Rubber Size 6 3/4" X

Total Depth 4412 Wt. Pipe Run - Drill Collar Run 200

Mud Wt. 9.4 LCM 1½ Vis. 51 WL 8.8 Drill Pipe Size 4 Ft. Run 4152

Blow Description IF: B.O.B.@ 5 min.

ISI: Weak surface return.

FF: B.O.B.@ 30 min

FSI: Surface return died @ 18 min.

Recovery - Total Feet 480 GIP 120 Ft. in DC 200 Ft. in DP 280

Rec. 120	Feet of GOCM	12 %gas	8 %oil	%water	80 %mud
Rec. 120	Feet of GOCM	30 %gas	15 %oil	%water	55 %mud
Rec. 180	Feet of GWOCM	32 %gas	15 %oil	8 %water	45 %mud
Rec. 60	Feet of GWOCM	15 %gas	12 %oil	3 %water	70 %mud
Rec.	Feet of	%gas	%oil	%water	%mud

BHT 117 °F Gravity — °API D @ — °F Corrected Gravity — °API

RW .286 @ 70 °F Chlorides 23,000 ppm Recovery 23,000 Chlorides 4,000 ppm System

	AK-1	Alpine				
(A) Initial Hydrostatic Mud		2187 PSI	Recorder No.	8017	Test X	1,200
(B) First Initial Flow Pressure		117 PSI	(depth)	4356	Jars	
(C) First Final Flow Pressure		172 PSI	Recorder No.	8351	Safety Jt.	
(D) Initial Shut-In Pressure		420 PSI	(depth)	4356	Circ Sub X	N/C
(E) Second Initial Flow Pressure		176 PSI	Recorder No.		Sampler	
(F) Second Final Flow Pressure		216 PSI	(depth)		Straddle	
(G) Final Shut-In Pressure		490 PSI	**Initial Opening**	15	Ext. Packer	
(Q) Final Hydrostatic Mud		2129 PSI	Initial Shut-In	30	Shale Packer	
			Final Flow	45	Ruined Packer	
			Final Shut-In	96	Mileage 115RT 143.75	
			T-On Location	6:03	Sub Total:	
			T-Started	6:39	Std. By	
			T-Open	8:59	Acc. Chg:	
			T-Pulled	12:07	Other:	
			T-Out	15:10	Total:	

Approved By

Our Representative Chuck Smith

DRILL STEM TEST REPORT

Berexco

POB 20380
Wichita, KS 67208

ATTN: Bryan Bynog

Shearer #7

Sec.23 17s-25w Ness

Job Ticket: 31855 **DST#: 2**

Test Start: 2008.04.09 @ 06:39:00

GENERAL INFORMATION:

Formation: **Mississippian**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 08:59:30
Time Test Ended: 15:09:30

Test Type: Conventional Bottom Hole
Tester: Chuck Smith
Unit No: 37

Interval: 4354.00 ft (KB) To 4412.00 ft (KB) (TVD)
Total Depth: 4412.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

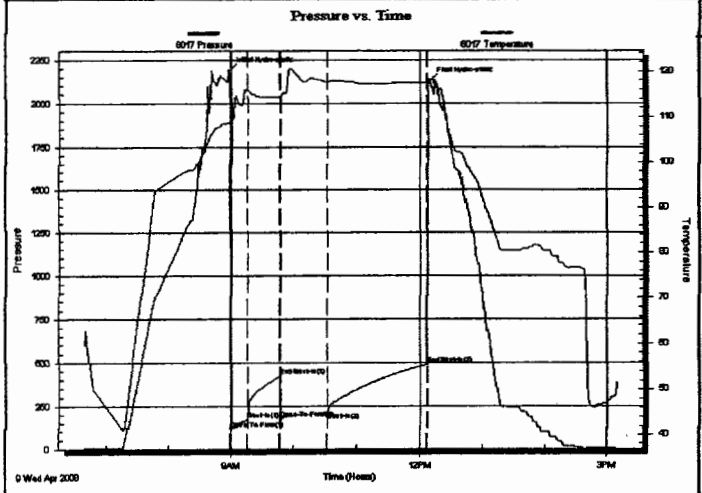
Reference Elevations: 2494.00 ft (KB)
2483.00 ft (CF)
KB to GR/CF: 11.00 ft

Serial #: 8017 **Inside**

Press@RunDepth: 215.57 psig @ 4356.00 ft (KB)
Start Date: 2008.04.09 End Date: 2008.04.09
Start Time: 06:39:00 End Time: 15:09:30

Capacity: 7000.00 psig
Last Calib.: 2008.04.09
Time On Btm: 2008.04.09 @ 08:58:20
Time Off Btm: 2008.04.09 @ 12:09:09

TEST COMMENT: IF: B.O.B. @ 5 min.
ISI: Weak surface return.
FF: B.O.B. @ 30 min.
FSI: Surface return died @ 18 min.



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	2187.37	108.88	Initial Hydro-static
2	116.77	108.70	Open To Flow (1)
18	172.32	115.82	Shut-In(1)
49	420.44	114.30	End Shut-In(1)
49	175.69	114.10	Open To Flow (2)
95	215.57	117.68	Shut-In(2)
189	489.66	117.43	End Shut-In(2)
191	2129.32	118.11	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
60.00	GWOCM 15%G 3%W 12%O 70%M	0.30
180.00	GWOCM 32%G 8%W 15%O 45%M	1.04
120.00	GOCM 30%G 15%O 55%M	1.05
120.00	GOCM 12%G 8%O 80%M	1.05
0.00	120 Feet of G.I.P.	0.00

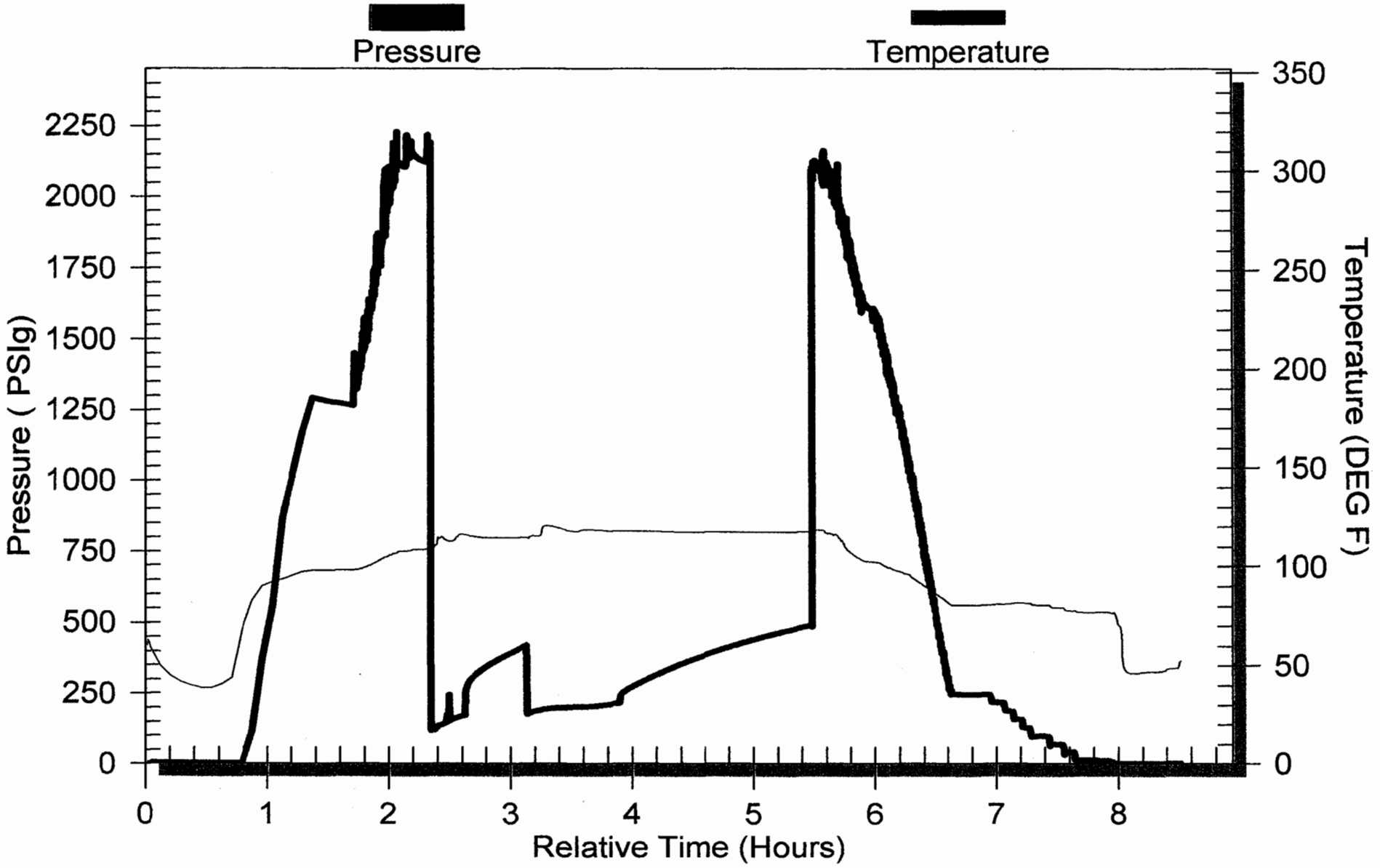
Gas Rates

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

Pressure & Temperature: Recorder# 8017

Every 1 Points are Plotted.

Run ID: dst#2
Start Time: Wed Apr 09 06:39:00 2008
File: C:\testdata\40980639.017



31856

TRILOBITE TESTING INC.

P.O. Box 362 • Hays, Kansas 67601

10/05

Test Ticket

Well Name & No. Shearer #7 Test No. 3 Date 4-10-08

Company Berexco Zone Tested Mississippian

Address POB 20380 Wichita, KS 67208 Elevation 2494 KB 2483 GL

Co. Rep / Geo. Bryan Bynog Rig Beredco 10

Location: Sec. 23 Twp. 17s Rge. 25w Co. Ness State KS

Comment: Release date / time:

Interval Tested 4410 to 4416 Initial Str Wt./Lbs. 46000 Unseated Str Wt/Lbs. 47,000

Anchor Length 6 Wt. Set Lbs. 29,000 Wt. Pulled Loose/Lbs. 55,000

Top Packer Depth 4404 Tool Weight 2,000

Bottom Packer Depth 4410 Hole Size 7 7/8" X Rubber Size 6 3/4" X

Total Depth 4416 Wt. Pipe Run — Drill Collar Run 260

Mud Wt. 9.3 LCM 1½ Vis. 51 WL 8.8 Drill Pipe Size 4 Ft. Run 4,207

Blow Description IF: BOB @ 5 min.

ISI: 1" return.

FF: B.O.B. @ 24 min.

FSI: ½" return.

Recovery - Total Feet 480 GIP 180 Ft. in DC 260 Ft. in DP 220

Rec. 60	Feet of GMWCO	10 %gas	70 %oil	10 %water	10 %mud
Rec. 60	Feet of GOMCW	10 %gas	10 %oil	60 %water	20 %mud
Rec. 360	Feet of MCW w/scum of oil	%gas	%oil	85 %water	15 %mud
Rec.	Feet of	%gas	%oil	%water	%mud
Rec.	Feet of	%gas	%oil	%water	%mud

BHT 124 °F Gravity 33 °API D @ 50 °F Corrected Gravity 34 °API

RW .380 @ 60 °F Chlorides 22000 ppm Recovery 22000 Chlorides 4,000 ppm System

	AK-1	Alpine					
(A) Initial Hydrostatic Mud		2320 PSI	Recorder No.	8017	Test X	1200	-
(B) First Initial Flow Pressure		84 PSI	(depth)	4411	Jars		
(C) First Final Flow Pressure		164 PSI	Recorder No.	8351	Safety Jt.		
(D) Initial Shut-In Pressure		409 PSI	(depth)	4411	Circ Sub X	N/C	
(E) Second Initial Flow Pressure		170 PSI	Recorder No.		Sampler		
(F) Second Final Flow Pressure		224 PSI	(depth)		Straddle		
(G) Final Shut-In Pressure		482 PSI	**Initial Opening**	15	Ext. Packer		
(Q) Final Hydrostatic Mud		2205 PSI	Initial Shut-In	30	Shale Packer		
			Final Flow	45	Ruined Packer	1	260 -
			Final Shut-In	90	Mileage	41 RT motel	
			T-On Location	11:06 pm	Sub Total:		
			T-Started	12:21 am	Std. By X		
			T-Open	3:03	Acc. Chg:		
			T-Pulled	6:06	Other:		
			T-Out	9:17	Total:		

Approved By

Our Representative Chuck Smith

DRILL STEM TEST REPORT

TRILOBITE TESTING, INC

Berexco

POB 20380
Wichita, KS 67208

ATTN: Bryan Bynog

Shearer #7

Sec.23 17s-25w Ness

Job Ticket: 31856 **DST#: 3**

Test Start: 2008.04.09 @ 12:21:06

GENERAL INFORMATION:

Formation: **Mississippian**
Deviated: No Whipstock: ft (KB)
Time Tool Opened: 15:03:06
Time Test Ended: 21:16:21

Test Type: Conventional Bottom Hole
Tester: *Chuck Smith*
Unit No: 37

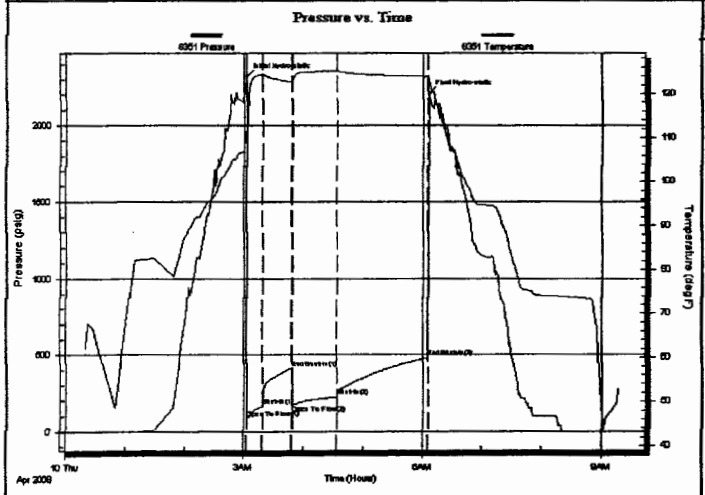
Interval: 4410.00 ft (KB) To 4416.00 ft (KB) (TVD)
Total Depth: 4416.00 ft (KB) (TVD)
Hole Diameter: 7.88 inches Hole Condition: Good

Reference Elevations: 2494.00 ft (KB)
2483.00 ft (CF)
KB to GR/CF: 11.00 ft

Serial #: 8351 **Inside**
Press@RunDepth: 224.24 psig @ 4411.00 ft (KB)
Start Date: 2008.04.10 End Date: 2008.04.10
Start Time: 00:21:06 End Time: 09:16:21

Capacity: 7000.00 psig
Last Calib.: 2008.04.10
Time On Btm: 2008.04.10 @ 03:02:51
Time Off Btm: 2008.04.10 @ 06:06:21

TEST COMMENT: IF: B.O.B. @ 5 min.
ISI: 1" return.
FF: B.O.B. @ 24 min.
FSI: 1/2" return.



PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	2319.71	111.94	Initial Hydro-static
1	84.33	110.71	Open To Flow (1)
16	164.59	124.42	Shut-In(1)
46	409.21	122.72	End Shut-In(1)
46	169.78	122.70	Open To Flow (2)
91	224.24	125.14	Shut-In(2)
183	482.15	123.94	End Shut-In(2)
184	2204.98	123.23	Final Hydro-static

Recovery

Length (ft)	Description	Volume (bbl)
360.00	MCW 15%M 85%W w ith scum of oil.	2.38
60.00	GOMCW 10%G 10%O 20%M 60%W	0.52
60.00	GMWCO 10%G 10%M 10%W 70%O	0.52
0.00	180 Feet of G.I.P.	0.00

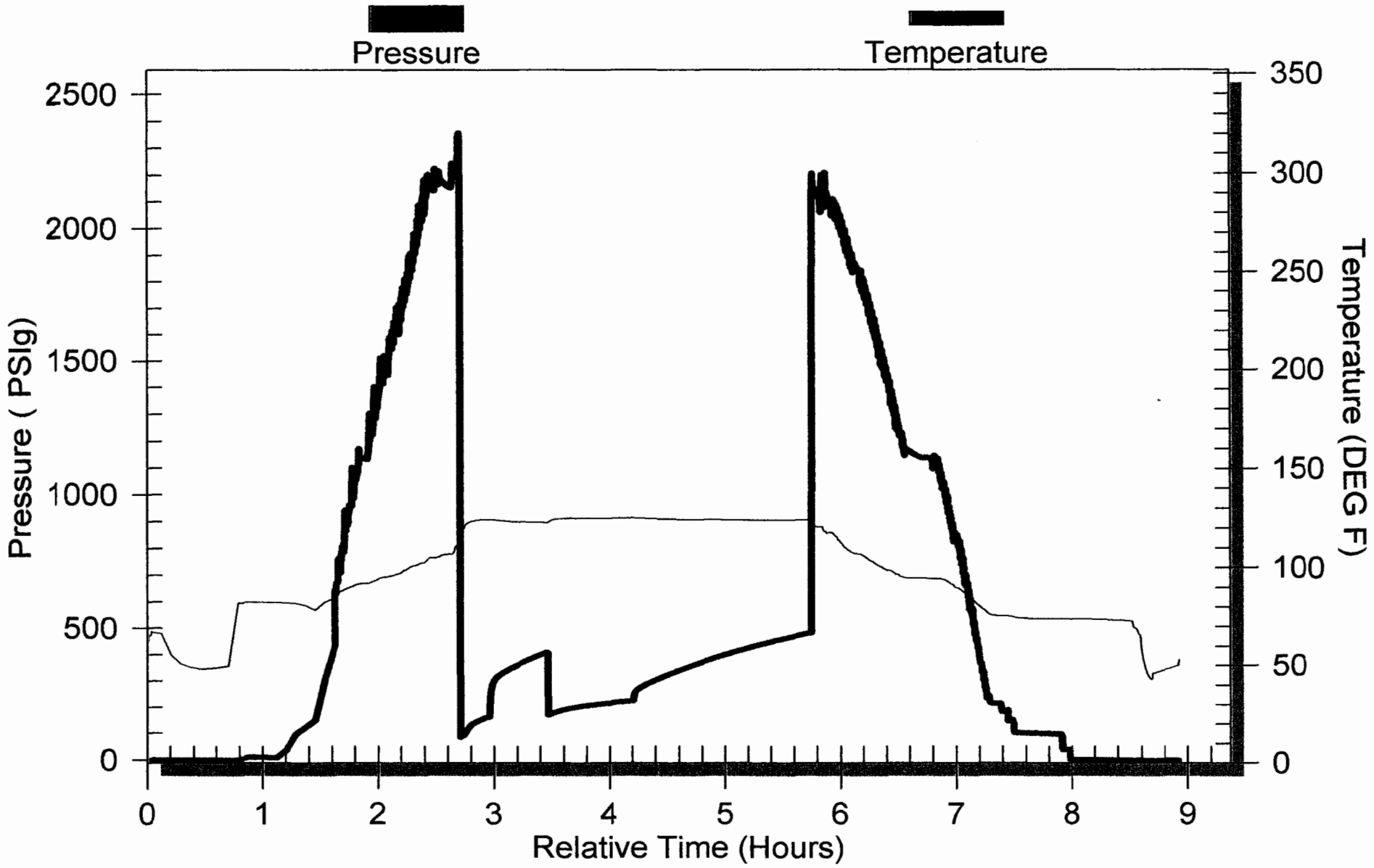
Gas Rates

	Choke (inches)	Pressure (psig)	Gas Rate (Mcfd)

Pressure & Temperature: Recorder# 8351

Every 1 Points are Plotted.

Run ID: dst#3
Start Time: Wed Apr 09 12:21:06 2008
File: C:\testdata\40981221.351



BIT RECORD

Bit #	SIZE	MAKE	TYPE	DEPTH OUT	FOOTAGE	HOURS
1	12 ¼	VARREL	CH20	267	267	
2	7 7/8	VARREL	CH20MS	4450	4183	115.5

DEVIATION RECORD

DEPTH	ANGLE
4340	1.25

DAILY CHRONOLOGY

DATE	DEPTH AT 7:00	FOOTAGE	REMARKS
4-2-2008	267	267	Spud well
4-3-2008	267	0	Set surface, W.O.C.
4-4-2008	1500	1273	Drilling
4-5-2008	3100	1600	Drilling
4-6-2008	3744	644	Drilling
4-7-2008	4100	256	Drilling
4-8-2008	4340	240	DST# 1
4-9-2008	4412	72	DST# 2
4-10-2008	4416	4	DST# 3
4-11-2008	4450	34	Logging

LITHOLOGY

HEEBNER	
3768-75	Shale black, firm, carbonaceous
3775-90	SHALE green, soft
TORONTO	
3790-3800	Limestone cream, hard, microcrystalline, poor porosity
3800-10	Shale as above
LANSING	
3810-40	Limestone white-cream, very hard, dense
3840-50	Shale gray, green, firm, fissile
B ZONE	
3850-65	Limestone buff, very hard, dense, chalky, some Chert white, smoky
3865-70	Shale green, firm, fissile with interbedded Limestone as above
C ZONE	
3870-80	Limestone cream, hard, dense
D ZONE	
38080-90	Limestone white, very hard, dense
3890-95	Shale as above
F ZONE	
3895-3930	Limestone white, firm, chalky, abundant Chert as above
G ZONE	

3930-40	Limestone cream, firm, oolitic, good moldic porosity, no show
3940-50	Shale gray green, as above
H ZONE	
3950-70	Limestone cream-white, hard, dense
3970-4000	Shale as above
I ZONE	
4000-25	Limestone cream tan, hard, dense, abundant Chert white
4025-30	Shale gray, green, firm, fissile, waxy
J ZONE	
4030-40	Limestone cream, firm, oocastic, fair-good moldic porosity, no show
4040-50	Limestone cream buff, very hard, dense, Chert as above
4050-60	Shale black, green, firm, fissile
K ZONE	
4060-80	Limestone cream, hard, dense, Chert as above
4080-90	Shale as above
L ZONE	
4090-4110	Limestone white cream, hard, dense, chalky
BKC	
4110-40	Shale green, red, firm, waxy
MARMATON	
4140-70	Limestone white gray, hard, dense
4170-80	Shale green, firm
4180-4230	Limestone gray, very hard, dense

PAWNEE

4230-90	Limestone gray tan, hard, dense, shaly
4290-4310	Shale black, green, red, firm, fissile

FORT SCOTT

4310-30	Limestone tan, hard, microcrystalline, fossiliferous, poor vuggy porosity, spotty stain, fair cut with interbedded Limestone tan, very hard, dense
4330-60	Limestone white, hard, dense with thin Shale black, carbonaceous
4360-80	Limestone gray cream, hard, some rare poor pin point porosity with very spotty stain, fair cut & odor
4380-4404	Shale green, red, firm with thin interbedded SS white, yellow, very fine grain, shaly, poor porosity, no show

MISSISSIPIAN

4404-20	Dolomite buff, firm-hard, microsucrosic, fair to good intercrystalline and vuggy porosity, even stain, good cut & odor, good show free oil
4420-25	Dolomite buff, hard, microcrystalline, fair porosity, spotty stain, good cut
4425-30	Dolomite buff, firm, microsucrosic, good porosity, spotty to even stain, good cut & odor, good show free oil
4430-40	Dolomite cream, hard, dense, no show
4440-50	Dolomite white, hard, crystalline, chalky, fair porosity, spotty stain, fair cut & odor

ANDY'S "Mud Doctor"
MUD & CHEMICAL CO. L.L.C.
785-625-3531
HAYS, KANSAS 67601

DRILLING MUD REPORT

REPORT NO. 1

DATE 4-1 20 08 DEPTH spud

APT WELL NO.	STATE	COUNTY	WELL	S/T

OPERATOR	CONTRACTOR	RIG NO.
Berexco Inc.	Beredco Drlg	#10
ADDRESS	**ADDRESS**	**SPUD DATE**
Co.	Rig	4-1-08
REPORT FOR MR.	**REPORT FOR MR.**	**SECTION, TOWNSHIP, RANGE**
Bryan Bynog (Geo)	Marvin Julian	23-17S-25W

WELL NAME AND NO.	FIELD OR BLOCK NO.	COUNTY AREA	STATE
Shearer #7		Mass	Ks

Drillling Assembly			Casing	Mud Volume (BBL)		Circulation Data		
Bit Size 7 7/8	No. Bits	Jet Size	Surface 8 5/8 @ Ft.	Hole	Pits 400	Pump Size x in. 6 x 14		Annular Vel (Ft/Min) DP 197 DC 356
Drill Pipe Size 4 1/2	Type XH	Length	Intermediate @ Ft.	Total Circulating Volume		Pump Make, Model	Assumed Eff 90	Circulation Pressure (PSI) 800+
Drill Collar Size 6 1/4	Length	No. Pits	Production or Liner @ Ft.	Mud Up Depth approx		Bbl/Stroke .139	Stroke/Min. 60	Bottoms Up (Min.)
Bit RPM	Weight on Bit 30000					Bbl/Min. 8.0	Gal/Min. 336	Total Circ Time (Min.)
Last Bit No.	Present Activity Rig-up		Mud Type Native mud			Elevation 2483 GL		

Sample from ☐ Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES

Time Sample Taken	3pm		
Depth (ft.)	R		
Weight ☐ (ppg) ☐ (lb./cu. ft.)	9		
Mud Gradient (psi/ft.)			
Funnel Viscosity (sec./qt.) API at °F			
Plastic Viscosity cp at / °F			
Yield Point (lb./100 sq. ft.)			
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.			
pH ☐ Strip ☐ Meter			
Filtrate API (ml./30 min.)			
API HP-HT Filtrate (ml/30 min.) °F			
Cake Thickness 32nd in. API ☐ HP - HT ☐			
Alkalinity, Mud (Pm)			
Alkalinity, Filtrate (Pf / Mf)			
Salt ☐ppm ☐ppg Chloride ☐ppm ☐ppg			
Calcium ☐ ppm ☐ Gyp (ppb)			
Sand Content (% by Vol.)			
Solids Content (% by Vol.)			
Oil Content (% by Vol.)			
Water Content (% by Vol.)			
LCM, #/bbl			
Methylene Blue Capacity ☐ (ml/ml mud) ☐ (equiv. #/Bbl. bent.)			

Mud Used:

Daily Cost | Cumulative Cost

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0 - 9.4	29-32	NC

BY AUTHORITY: ☐ OPERATOR'S WRITTEN ☐ DRILLING CONTRACTOR ☐ OPERATOR'S REPRESENTATIVE ☐ OTHER

RECOMMENDED TOUR TREATMENT

☑ Under surface to approx 3600 use native mud & plenty of fresh water & jet often. Keep wt low as possible.
☐
☑ Suggest preflush w/ premix at
☐ 2000 - 2200 w/ following: 18-20 gel
1 sode ash
8-10 hulls
☐

REMARKS:

Also run 80-100 bbls of fresh water ahead of free board.

Always keep hole full & pipe moving.

LCM as needed.

Again @ 3000 preflush w/ premix and mix: 18-20 gel
1 sode ash
15 hulls for LCM

* Begin filling free tank w/ premix until full and also no. 2 pit & premix on hand to be ready to displace @ 3600
24 gel 1 lignite
2 sode ash 1/4 Drispac

ANDY'S "Mud Doctor"
MUD & CHEMICAL CO. L.L.C.
785-625-3531
HAYS, KANSAS 67601

DRILLING MUD REPORT

REPORT NO. 2

DATE 4-4 20 08 DEPTH 2806

API WELL NO.	STATE	COUNTY	WELL	S/T

OPERATOR: Berexco, Inc	CONTRACTOR: Beredco Drlg	RIG NO. #10
ADDRESS: Co	ADDRESS: Rig	SPUD DATE 4-1-08
REPORT FOR MR. Bryan Bynog (Geo)	REPORT FOR MR. Marvin Julian	SECTION, TOWNSHIP, RANGE 23-17S-25W

WELL NAME AND NO.	FIELD OR BLOCK NO.	COUNTY/AREA	STATE
Shearer #7		Ness	Ks

Drilling Assembly			Casing	Mud Volume (BBL)		Circulation Data		
Bit Size 7 7/8	No. Bits	Jet Size	Surface 8 5/8 @ 267 Ft.	Hole 227	Pits 400	Pump Size x in. 6 x 14		Annular Vel (Ft/Min) DP 197 DC 356
Drill Pipe Size 4½	Type XH	Length	Intermediate @ Ft.	Total Circulating Volume 627		Pump Make, Model	Assumed Eff.	Circulation Pressure (PSI) 800+
Drill Collar Size 6¼	Length	No. Pits	Production or Liner @ Ft.	Mud Up Depth approx 3400		Bbl/Stroke .139	Stroke/Min. 60	Bottoms Up (Min.) 28
Bit RPM		Weight on Bit 30000				Bbl/Min. 8.0	Gal/Min. 336	Total Circ Time (Min.)
Last Bit No.		Present Activity Drlg	Mud Type Native mud			Elevation 2483 GL		78

Sample from [x] Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES

Time Sample Taken	2:30pm		
Depth (ft.)	2806		
Weight [x] (ppg) [ ] (lb./cu. ft.)	9.2		
Mud Gradient (psi/ft.)	.478		
Funnel Viscosity (sec./qt.) API at °F	28		
Plastic Viscosity cp at / °F	7		
Yield Point (lb./100 sq. ft.)	2		
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.	4	/	/
pH [x] Strip [ ] Meter	7.0		
Filtrate API (ml./30 min.)	7		
API HP-HT Filtrate (ml/30 min.) °F			
Cake Thickness 32nd in. API [ ] HP - HT [ ]	2		
Alkalinity, Mud (Pm)			
Alkalinity, Filtrate (Pf / Mf)	4	/	/
Salt [ ] ppm [ ] gpg Chloride [x] ppm [ ] gpg	62,000		
Calcium [x] ppm [ ] Gyp (ppb)	Hvy		
Sand Content (% by Vol.)	Trace		
Solids Content (% by Vol.)	2.6		
Oil Content (% by Vol.)	—		
Water Content (% by Vol.)	97.4		
LCM, #/bbl	—		
Methylene Blue Capacity [ ] (ml/ml mud) [ ] (equiv. #/Bbl. bent.)	—		

Mud Used:

144 Gel	1576.80
7 Soda ash	146.65
3 Caustic	152.25
3 Lignite	65.85
17 Hulls	327.25
1 Drispac	320.00
6 Lime	65.70
Daily Cost $2654.50	Cumulative Cost $2654.50

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0 - 9.4	27-32	NC

BY AUTHORITY: [ ] OPERATOR'S WRITTEN [ ] OPERATOR'S REPRESENTATIVE [ ] DRILLING CONTRACTOR [ ] OTHER

RECOMMENDED TOUR TREATMENT

[x] Suggest by 3000 in premix w/ fresh
[ ] water & mix following to preflush
[ ] hole. 18-20 gel
[ ] 1 soda ash
[ ] 15 hulls for LCM (Possible lost
[ ] circulation @ 3000)
[ ] Begin filling frac tank w/ premix until full & also do 2 pit and premix on hand to be ready to displace @ 3400

24 gel 1 lignite
2 soda ash 1/4 drispac
1 caustic 4 hulls

At approx 3400 jet & wash down pits well and add frac mud. Also run 80-100 bbls of fresh water ahead of frac mud.

REMARKS:

Thank you!

Always [illegible]

ANDY'S "Mud Doctor"
MUD & CHEMICAL CO.
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HAYS, KANSAS 67601

DRILLING MUD REPORT

REPORT NO. 3

DATE 4-5 20 08 DEPTH 3365

API WELL NO.	STATE	COUNTY	WELL	S/T

OPERATOR: Berexco, Inc	CONTRACTOR: Beredco Drlg	RIG NO. #10
ADDRESS: Co	ADDRESS: Rig	SPUD DATE 4-1-08
REPORT FOR MR. Bryan Bynog (Geo)	REPORT FOR MR. Marvin Julian	SECTION, TOWNSHIP, RANGE 23-17S-25W
WELL NAME AND NO. Shearer #7	FIELD OR BLOCK NO. / COUNTY AREA Ness	STATE Ks

Drilling Assembly			Casing	Mud Volume (BBL)		Circulation Data		
Bit Size 7 7/8	No. Bits	Jet Size	Surface 8 5/8 @ 267 Ft.	Hole 262	Pits 400	Pump Size x in. 6 X 14		Annular Vel (Ft/Min) DP 197 DC 356
Drill Pipe Size 4 1/2	Type XH	Length	Intermediate @ X Ft.	Total Circulating Volume 662		Pump Make, Model	Assumed Eff.	Circulation Pressure (PSI) 800+
Drill Collar Size 6 1/4	Length	No. Pits	Production or Liner @ X Ft.	Mud Up Depth 3400		Bbl/Stroke .139	Stroke/Min. 60	Bottoms Up (Min.) 33
Bit RPM		Weight on Bit 30000				Bbl/Min. 8.0	Gal/Min. 336	Total Circ Time (Min.) 83
Last Bit No.		Present Activity Drlg	Mud Type Native mud			Elevation 2483 GL		

Sample from ☑ Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES

Time Sample Taken	2pm		
Depth (ft.)	3365		
Weight ☑ (ppg) ☐ (lb./cu. ft.)	9.3		
Mud Gradient (psi/ft.)	.484		
Funnel Viscosity (sec./qt.) API at °F	28		
Plastic Viscosity cp at / °F			
Yield Point (lb./100 sq. ft.)			
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.	/	/	/
pH ☑ Strip ☐ Meter	7.0		
Filtrate API (ml./30 min.)	NC		
API HP-HT Filtrate (ml/30 min.) °F			
Cake Thickness 32nd in. API ☐ HP - HT ☐			
Alkalinity, Mud (Pm)			
Alkalinity, Filtrate (Pf / Mf)	/	/	/
Salt ☐ppm ☐gpg Chloride ☐ppm ☐gpg	30000		
Calcium ☑ ppm ☐ Gyp (ppb)	Hvy		
Sand Content (% by Vol.)	Trace		
Solids Content (% by Vol.)	5.4		
Oil Content (% by Vol.)	—		
Water Content (% by Vol.)	94.6		
LCM, #/bbl	—		
Methylene Blue Capacity ☐ (ml/ml mud) ☐ (equiv. #/Bbl. bent.)	—		

Mud Used:

79 Gel	865.05
7 Sodaash	146.65
2 Caustic	101.50
2 Lignite	43.90
24 Hulls	463.00
1 Dispex	320.00

Daily Cost $1939.10 Cumulative Cost $4593.60

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0-9.4	27-32	NC

BY AUTHORITY: ☐ OPERATOR'S WRITTEN ☐ OPERATOR'S REPRESENTATIVE ☐ DRILLING CONTRACTOR ☐ OTHER

RECOMMENDED TOUR TREATMENT

☑ Make sure frac tank full & premix
☐ on hand w/ following to be ready
☐ to displace @ approx 3400
☐ 24 gel 1 caustic 1/4 dispex
☐ 7 sodaash 1 lignite 4 hulls
☐
☑ At approx 3400 jet & wash down pits well & add frac tank to system. Also run 80-100 bbls of fresh water ahead of fresh mud.

After displace cut in no 2 pit by mixing same as above to work into system.

Always keep hole full & pipe moving.

LCM as needed

REMARKS:

Maintain viscosity @ 50-55 sec/qt after displace w/ gel as needed.

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DRILLING MUD REPORT

REPORT NO. 4

DATE 4-6 20 08 | DEPTH 3833

APT WELL NO. | STATE | COUNTY | WELL | S/T

OPERATOR: Berexco, Inc	CONTRACTOR: Bereco Drlg	RIG NO.: #10
ADDRESS: Co	ADDRESS: Rig	SPUD DATE: 4-1-08
REPORT FOR MR.: Bryan Byrne (Geo)	REPORT FOR MR.: Marvin Julian	SECTION, TOWNSHIP, RANGE: 23-17S-25W
WELL NAME AND NO.: Schearer #7	FIELD OR BLOCK NO.:	COUNTY AREA: Ness
		STATE: Ks

Drillling Assembly

Bit Size: 7 7/8	No. Bits:	Jet Size:
Drill Pipe Size: 4 1/2	Type: XH	Length:
Drill Collar Size: 6 1/4	Length:	No. Pits:
Bit RPM:	Weight on Bit: 30000	
Last Bit No.:	Present Activity: Drlg	

Casing

Surface: 8 5/8 @ 267 Ft.	
Intermediate: @ Ft.	
Production or Liner: @ Ft.	

Mud Volume (BBL)

Hole: 291	Pits: 400
Total Circulating Volume: 691	
Mud Up Depth: 3400	

Mud Type: Chemical mud

Circulation Data

Pump Size x in.: 6 x 14	Annular Vel (Ft/Min) DP: 197 DC: 356
Pump Make, Model:	Assumed Eff.:
Bbl/Stroke: .139	Stroke/Min.: 60
Bbl/Min.: 8.0	Gal/Min.: 336
Elevation: 2483 GL	Circulation Pressure (PSI): 800+
	Bottoms Up (Min.): 36
	Total Circ Time (Min.): 82

Sample from ☑ Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES

Time Sample Taken	12:30pm
Depth (ft.)	3833
Weight ☑ (ppg) ☐ (lb./cu. ft.)	9.0
Mud Gradient (psi/ft.)	.468
Funnel Viscosity (sec./qt.) API at °F	48
Plastic Viscosity cp at / °F	20
Yield Point (lb./100 sq. ft.)	16
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.	12/15
pH ☑ Strip ☐ Meter	10.5
Filtrate API (ml./30 min.)	10.4
API HP-HT Filtrate (ml/30 min.) °F	—
Cake Thickness 32nd in. API ☑ HP - HT ☐	1/32
Alkalinity, Mud (Pm)	.7
Alkalinity, Filtrate (Pf / Mf)	.3/—
Salt ☐ ppm ☐ ppg Chloride ☑ ppm ☐ ppg	4800
Calcium ☑ ppm ☐ Gyp (ppb)	20
Sand Content (% by Vol.)	Trace
Solids Content (% by Vol.)	4.7
Oil Content (% by Vol.)	—
Water Content (% by Vol.)	95.3
LCM, #/bbl	2#
Methylene Blue Capacity ☐ (ml/ml mud) ☐ (equiv. #/Bbl. bent.)	—

Mud Used:

79 Gel	865.05
8 Sodaash	116.60
3 Caustic	152.25
3 Lignite	65.85
10 Wells	192.50
1 Drispac	320.00

Daily Cost: $1763.25
Cumulative Cost: $16356.85

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0 - 9.4	48-52	10-12cc

BY AUTHORITY: ☐ OPERATOR'S WRITTEN ☐ OPERATOR'S REPRESENTATIVE ☐ DRILLING CONTRACTOR ☐ OTHER

RECOMMENDED TOUR TREATMENT

☑ Suggest add premix on hand as needed for viscosity or add prior to testing to maintain viscosity @ 48-52 sec/qt
☐
☐
☐
☑ Run stream of water at flowline to control wt 9.0-9.4#/gal
☐

REMARKS:

LCM as needed

Always keep hole full & pipe moving.

Short trip pipe circulate to condition hole prior to testing.

Thank You!

ANDY'S "Mud Doctor"
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HAYS, KANSAS 67601

DRILLING MUD REPORT

REPORT NO. 5

DATE 4-7 20 08 | DEPTH 4157

APT WELL NO. | STATE | COUNTY | WELL | S/T

OPERATOR	CONTRACTOR	RIG NO.
Beredco, Inc	Beredco Drlg	#10
ADDRESS	ADDRESS	SPUD DATE
Co.	Rig	4-1-08
REPORT FOR MR.	REPORT FOR MR.	SECTION, TOWNSHIP, RANGE
Bryan Bynog (Geo)	Marvin Julian	23-17S-25W
WELL NAME AND NO.	FIELD OR BLOCK NO.	COUNTY AREA / STATE
Shearers #7		Ness / K

Drillling Assembly			Casing	Mud Volume (BBL)		Circulation Data		
Bit Size 7 7/8	No. Bits	Jet Size	Surface 8 5/8 @ 267 Ft.	Hole 312	Pits 400	Pump Size x in. 6X14		Annular Vel (Ft/Min) DP 197 DC 356
Drill Pipe Size 4 1/2	Type XH	Length	Intermediate @ Ft.	Total Circulating Volume 712		Pump Make, Model	Assumed Eff.	Circulation Pressure (PSI) 800+
Drill Collar Size 6 1/4	Length	No. Pits	Production or Liner @ Ft.	Mud Up Depth 3400		Bbl/Stroke .139	Stroke/Min. 60	Bottoms Up (Min.) 39
Bit RPM	Weight on Bit 30000					Bbl/Min. 8.0	Gal/Min. 336	Total Circ Time (Min.) 89
Last Bit No.	Present Activity Drlg		Mud Type Chemical mud			Elevation 2483 GL		

Sample from ☑ Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES			
Time Sample Taken	12:30pm		
Depth (ft.)	4157		
Weight ☑ (ppg) ☐ (lb./cu. ft.)	9.3		
Mud Gradient (psi/ft.)	.484		
Funnel Viscosity (sec./qt.) API at °F	49		
Plastic Viscosity cp at / °F	18		
Yield Point (lb./100 sq. ft.)	14		
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.	11/16	/	/
pH ☑ Strip ☐ Meter	10.0		
Filtrate API (ml./30 min.)	10.2		
API HP-HT Filtrate (ml/30 min.) °F			
Cake Thickness 32nd in. API ☐ HP - HT ☐	1/32		
Alkalinity, Mud (Pm)	.5		
Alkalinity, Filtrate (Pf / Mf)	.2 / —	/	/
Salt ☐ppm ☐ppg Chloride ☐ppm ☐ppg	5000		
Calcium ☑ ppm ☐ Gyp (ppb)	40		
Sand Content (% by Vol.)	Trace		
Solids Content (% by Vol.)	6.8		
Oil Content (% by Vol.)	—		
Water Content (% by Vol.)	93.2		
LCM, #/bbl	1#		
Methylene Blue Capacity ☐ (ml/ml mud) ☐ (equiv. #/bbl. bent.)	—		

Mud Used:
Gel
Sodaash
Caustic
Lignite
Hulls
Drispac

Daily Cost: NA
Cumulative Cost: $6356.85

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0-9.4	48-52	10-12cc

BY AUTHORITY: ☐ OPERATOR'S WRITTEN ☐ OPERATOR'S REPRESENTATIVE ☐ DRILLING CONTRACTOR ☐ OTHER

RECOMMENDED TOUR TREATMENT

- ☑ Maintain viscosity @ 48-52 sec/qt
- ☐ while Drlg. If need viscosity
- ☐ use mud in premix on hand.
- ☐
- ☑ Run stream of water at flowline
- ☐ to control wt 9.0-9.4#/gal
- ☐

LCM as needed

Always keep hole full & pipe moving.

Short trip pipe, circulate to condition hole prior to coming out.

Watch wt & use premix when necessary prior to Testing.

REMARKS:

Thank You!

ANDY'S "Mud Doctor"
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HAYS, KANSAS 67601

DRILLING MUD REPORT

REPORT NO. 6

DATE 4-8 20 08 | DEPTH 4340

APT WELL NO. | STATE | COUNTY | WELL | S/T

OPERATOR: Bereco, Inc	CONTRACTOR: Bereco Drlg	RIG NO.: #10
ADDRESS: Co	ADDRESS: Rig	SPUD DATE: 4-1-08
REPORT FOR MR.: Bryan Bynog (Geo)	REPORT FOR MR.: Marvin Julian	SECTION, TOWNSHIP, RANGE: 23-17S-25W
WELL NAME AND NO.: Shearers #7	FIELD OR BLOCK NO.:	COUNTY AREA: Ness
		STATE: Ks

Drillling Assembly			Casing	Mud Volume (BBL)		Circulation Data		
Bit Size: 7 7/8	No. Bits	Jet Size	Surface: 8 5/8 @ 267 Ft.	Hole: 325	Pits: 400	Pump Size x in.: 6 x 14		Annular Vel (Ft/Min) DP: 197 DC: 356
Drill Pipe Size: 4 1/2	Type: XH	Length	Intermediate: @ Ft.	Total Circulating Volume: 725		Pump Make, Model	Assumed Eff.	Circulation Pressure (PSI): 800+
Drill Collar Size: 6 1/4	Length	No. Pits	Production / Liner: @ Ft.	Mud Up Depth: 3400		Bbl/Stroke: .139	Stroke/Min.: 60	Bottoms Up (Min.): 40
Bit RPM	Weight on Bit: 30000					Bbl/Min.: 8.0	Gal/Min.: 336	Total Circ Time (Min.): 90
Last Bit No.	Present Activity: DST #1		Mud Type: Chemical mud			Elevation: 2483 GL		

Sample from ☑ Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES			
Time Sample Taken	2:30 pm		
Depth (ft.)	4340		
Weight ☑ (ppg) ☐ (lb./cu. ft.)	9.3+		
Mud Gradient (psi/ft.)	.484		
Funnel Viscosity (sec./qt.) API at °F	49		
Plastic Viscosity cp at / °F	20		
Yield Point (lb./100 sq. ft.)	14		
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.	12/18	/	/
pH ☑ Strip ☐ Meter	10.0		
Filtrate API (ml./30 min.)	11.2		
API HP-HT Filtrate (ml/30 min.) °F	—		
Cake Thickness 32nd in. API ☑ HP - HT ☐	1/32		
Alkalinity, Mud (Pm)	.2		
Alkalinity, Filtrate (Pf / Mf)	.1/—	/	/
Salt ☐ ppm ☐ ppg Chloride ☑ ppm ☐ ppg	5000		
Calcium ☑ ppm ☐ Gyp (ppb)	60		
Sand Content (% by Vol.)	Trace		
Solids Content (% by Vol.)	6.8		
Oil Content (% by Vol.)	—		
Water Content (% by Vol.)	93.2		
LCM, #/bbl	1½#		
Methylene Blue Capacity ☐ (ml/ml mud) ☐ (equiv. #Bbl. bent.)	—		

Mud Used:
Gel
Soda ash
Caustic
Lignite
Lime
Drispac

Daily Cost: $50.75
Cumulative Cost: $6407.60

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0-9.4	48-52	10-12cc

BY AUTHORITY: ☐ OPERATOR'S WRITTEN ☐ OPERATOR'S REPRESENTATIVE ☐ DRILLING CONTRACTOR ☐ OTHER

RECOMMENDED TOUR TREATMENT

☑ Suggest after DST #1, jet hole in pits & add premix on hand to run fresh
☐ mud to system. Maintain
☐ viscosity @ 48-52 wt while drlg
☐ or testing.
☐
☑ Run stream of water at flowline to control wt 9.0-9.4#/gal.

LCM as needed

Prior to drlg into arbuckle, suggest mix 15-20 bbl gels for LCM 3-4#/bbl

Always keep hole full & pipe moving.

Short trip pipe, circulate to condition hole prior to coming out.

REMARKS:

Mud @ 48-52 wt

ANDY'S "Mud Doctor"
MUD & CHEMICAL CO.
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HAYS, KANSAS 67601

DRILLING MUD REPORT

REPORT NO. 7

DATE 4-9 20 08 DEPTH 4412

APT WELL NO.	STATE	COUNTY	WELL	S/T

OPERATOR	CONTRACTOR	RIG NO.
Berexco, Inc	Beredco Drlg	410
ADDRESS	**ADDRESS**	**SPUD DATE**
Co	Rig	4-1-08
REPORT FOR MR.	**REPORT FOR MR.**	**SECTION, TOWNSHIP, RANGE**
Bryan Bynog (Geo)	Marvin Julian	23-17S-25W

WELL NAME AND NO.	FIELD OR BLOCK NO.	COUNTY AREA	STATE
Shearers #7		Ness	Ks

Drillling Assembly			Casing	Mud Volume (BBL)		Circulation Data		
Bit Size 7 7/8	No. Bits 1	Jet Size	Surface 8 5/8 @ 267 Ft.	Hole 328	Pits 400	Pump Size x in. 6 X 14		Annular Vel (Ft/Min) DP 197 DC 356
Drill Pipe Size 4½	Type XH	Length	Intermediate @ Ft.	Total Circulating Volume 728		Pump Make, Model	Assumed Eff.	Circulation Pressure (PSI) 800#
Drill Collar Size 6¼	Length	No. Pits	Production or Liner @ Ft.	Mud Up Depth 3400		Bbl/Stroke .139	Stroke/Min. 60	Bottoms Up (Min.) 41
Bit RPM	Weight on Bit 30000					Bbl/Min. 8.0	Gal/Min. 336	Total Circ Time (Min.)
Last Bit No.	Present Activity DST #2		Mud Type Chemical mud			Elevation 2483 GL		91

Sample from ☑ Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES			
Time Sample Taken	11:55AM		
Depth (ft.)	4412		
Weight ☑ (ppg) ☐ (lb./cu. ft.)	9.4		
Mud Gradient (psi/ft.)	.489		
Funnel Viscosity (sec./qt.) API at °F	51		
Plastic Viscosity cp at / °F	22		
Yield Point (lb./100 sq. ft.)	16		
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.	12/15	/	/
pH ☑ Strip ☐ Meter	10.0		
Filtrate API (ml./30 min.)	8.8		
API HP-HT Filtrate (ml/30 min.) °F	—		
Cake Thickness 32nd in. API ☐ HP - HT ☐	2/32		
Alkalinity, Mud (Pm)	.8		
Alkalinity, Filtrate (Pf / Mf)	.4/—	/	/
Salt ☐ppm ☐spg Chloride ☐ppm ☐spg	4000		
Calcium ☑ ppm ☐ Gyp (ppb)	40		
Sand Content (% by Vol.)	Trace		
Solids Content (% by Vol.)	7.7		
Oil Content (% by Vol.)	—		
Water Content (% by Vol.)	92.3		
LCM, #/bbl	1½#		
Methylene Blue Capacity ☐ (ml/ml mud) ☐ (equiv. #/Bbl. bent.)	—		

Mud Used:
Gel
Seabond
Caustic
Lignite
Soda Ash
Drispac

Daily Cost NA

Cumulative Cost $6407.60

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0-9.4	48-52	10-12cc

BY AUTHORITY: ☐ OPERATOR'S WRITTEN ☐ OPERATOR'S REPRESENTATIVE ☐ DRILLING CONTRACTOR ☐ OTHER

RECOMMENDED TOUR TREATMENT

- ☐ After DST #2, maintain viscosity @ 50-55 sec/qt for testing or logging.
- ☐
- ☑ Control wt 9.0-9.4 #/gal w/ stream of water at flowline as needed.
- ☐
- ☑ LCM as needed

REMARKS:

Always keep hole full & pipe moving. Short trip pipe, circulate to condition hole prior to coming out.

Suggest if decide to drill 100 ft or more, mix 15-20 sx Soda Ash for LCM 3-4 #/bbl.

*Maintain every 24 hr treatment: Gel for viscosity, Lignite

Thank You!

ANDY'S "Mud Doctor"
MUD & CHEMICAL CO.
(785) 625-3531
HAYS, KANSAS 67601

DRILLING MUD REPORT

REPORT NO. 8

DATE 4-10 2008 DEPTH 4416

APT WELL NO. | STATE | COUNTY | WELL | S/T

OPERATOR: Berexco, Inc	CONTRACTOR: Beredco Drlg	RIG NO.: #10
ADDRESS: Co	ADDRESS: Rig	SPUD DATE: 4-1-08
REPORT FOR MR.: Bryan Byrnes (Geo)	REPORT FOR MR.: Marvin Julian	SECTION, TOWNSHIP, RANGE: 23-17S-25W
WELL NAME AND NO.: Shearer #7	FIELD OR BLOCK NO.:	COUNTY AREA: Ness
		STATE: Ks

Drillling Assembly			Casing	Mud Volume (BBL)		Circulation Data		
Bit Size 7 7/8	No. Bits	Jet Size	Surface 8 5/8 @ 267 Ft.	Hole 328	Pits 400	Pump Size x in. 6 x 14		Annular Vel (Ft/Min) DP 197 DC 356
Drill Pipe Size 4 1/2	Type XH	Length	Intermediate @ Ft.	Total Circulating Volume 728		Pump Make, Model	Assumed Eff.	Circulation Pressure (PSI) 800+
Drill Collar Size 6 1/4	Length	No. Pits	Production or Liner @ Ft.	Mud Up Depth 3400		Bbl/Stroke .139	Stroke/Min. 60	Bottoms Up (Min.) 41
Bit RPM	Weight on Bit 30000					Bbl/Min. 8.0	Gal/Min. 336	Total Circ Time (Min.)
Last Bit No.	Present Activity DST #3		Mud Type Chemical mud			Elevation 2483 GL		91

Sample from ☑ Flowline ( ) Pit
Flowing Temperature F

MUD PROPERTIES			
Time Sample Taken	11:30AM		
Depth (ft.)	4416		
Weight ☑ (ppg) ☐ (lb./cu. ft.)	9.3+		
Mud Gradient (psi/ft.)	.484		
Funnel Viscosity (sec./qt.) API at °F	48		
Plastic Viscosity cp at / °F	15		
Yield Point (lb./100 sq. ft.)	15		
Gel Strength (lb./100 sq. ft.) 10 sec./10 min.	8 / 12	/	/
pH ☑ Strip ☐ Meter	9.5		
Filtrate API (ml./30 min.)	10.8		
API HP-HT Filtrate (ml/30 min.) °F	—		
Cake Thickness 32nd in. API ☑ HP - HT ☐	1/32		
Alkalinity, Mud (Pm)	.5		
Alkalinity, Filtrate (Pf / Mf)	.2 / —	/	/
Salt ☐ppm ☐ppg Chloride ☑ppm ☐ppg	5000		
Calcium ☑ ppm ☐ Gyp (ppb)	40		
Sand Content (% by Vol.)	Trace		
Solids Content (% by Vol.)	7.0		
Oil Content (% by Vol.)	—		
Water Content (% by Vol.)	93.0		
LCM, #/bbl	1#		
Methylene Blue Capacity ☐ (ml/ml mud) ☐ (equiv. #/Bbl. bent.)	—		
Reserve Pit- chl content ppm	36000 / 900		bbls

Mud Used:

Daily Cost	Cumulative Cost
NA	$6407.60

MUD PROPERTIES SPECIFICATIONS

WEIGHT	VISCOSITY	FILTRATE
9.0-9.4	48-52	10-12cc

BY AUTHORITY: ☐ OPERATOR'S WRITTEN ☐ OPERATOR'S REPRESENTATIVE ☐ DRILLING CONTRACTOR ☐ OTHER

RECOMMENDED TOUR TREATMENT

- ☑ Suggest in premix w/pit mud
- ☐ and mix following to raise
- ☐ viscosity to 50-55sec/qt for logging
- ☐ 20-25 gel 2 caustic 1/2 drispac
- ☐ 2 soda ash 1 lignite Rhodo
- ☐ Roll in premix & add back to
- ☐ system over 1 1/2 hr period.

REMARKS:

LCM as needed

Always keep hole full & pipe moving.

Short trip pipe circulate to condition hole prior to coming out for logging.

Thank You!