

# Kansas Corporation Commission Oil & Gas Conservation Division

1060007

Form ACO-1

June 2009

Form Must Be Typed

Form must be Signed

All blanks must be Filled

# WELL COMPLETION FORM WELL HISTORY - DESCRIPTION OF WELL & LEASE

OPERATOR: License #	API No. 15
Name:	Spot Description:
Address 1:	SecTwpS. R
Address 2:	Feet from North / South Line of Section
City:	Feet from East / West Line of Section
Contact Person:	Footages Calculated from Nearest Outside Section Corner:
Phone: ()	□NE □NW □SE □SW
CONTRACTOR: License #	County:
Name:	Lease Name: Well #:
Wellsite Geologist:	Field Name:
Purchaser:	Producing Formation:
Designate Type of Completion:	Elevation: Ground: Kelly Bushing:
☐ New Well ☐ Re-Entry ☐ Workover	Total Depth: Plug Back Total Depth:
Oil WSW SWD SIOW Gas D&A ENHR SIGW OG GSW Temp. Abd. CM (Coal Bed Methane) Cathodic Other (Core, Expl., etc.):	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: sx cmt
Operator:	
Well Name:	Drilling Fluid Management Plan (Data must be collected from the Reserve Pit)
Original Comp. Date: Original Total Depth: Onv. to ENHR	Chloride content: ppm Fluid volume: bbls  Dewatering method used:
Plug Back: Plug Back Total Depth	Location of fluid disposal if hauled offsite:
Commingled Permit #:	Operator Name:
Dual Completion Permit #:	Lease Name: License #:
SWD Permit #:	Quarter Sec TwpS. R
☐ ENHR         Permit #:           ☐ GSW         Permit #:	County: Permit #:
Spud Date or Date Reached TD Completion Date or Recompletion Date	

#### **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
Letter of Confidentiality Received
Date:
Confidential Release Date:
Wireline Log Received
Geologist Report Received
UIC Distribution
ALT I I II Approved by: Date:

Side Two



Operator Name:			Lease	Name: _			_ Well #:	
Sec Twp	S. R	East West	Count	y:				
	osed, flowing and shu es if gas to surface te	t-in pressures, wheth st, along with final ch	er shut-in pres	ssure read	ched static level,	hydrostatic press	sures, bottom h	giving interval tested, sole temperature, fluid py of all Electric Wire-
Drill Stem Tests Taker (Attach Additional		☐ Yes ☐ No	)		og Formation	n (Top), Depth ar	nd Datum	☐ Sample
Samples Sent to Geo	logical Survey	Yes No	)	Nam	е		Тор	Datum
Cores Taken Electric Log Run Electric Log Submitte (If no, Submit Copy	d Electronically	Yes No	)					
List All E. Logs Run:								
			ING RECORD	☐ Ne	ew Used	on. etc.		
Purpose of String	Size Hole Drilled	Size Casing Set (In O.D.)	We	eight . / Ft.	Setting Depth	Type of Cement	# Sacks Used	Type and Percent Additives
	Dimod	00t (iii 0.b.)		., , , ,	Борин	Comon	0000	7 Idaili VOS
		ADDITIO	NIAL CEMENT	ING / SOL	    EEZE RECORD			
Purpose:	Depth	Type of Cement		s Used	LEZE RECORD	Type and I	Percent Additives	
Perforate Protect Casing	Top Bottom							
Plug Back TD Plug Off Zone								
Shots Per Foot	PERFORATI Specify I	ON RECORD - Bridge Footage of Each Interva	Plugs Set/Type I Perforated			cture, Shot, Cemen mount and Kind of Mi		d Depth
TUBING RECORD:	Size:	Set At:	Packer /	At:	Liner Run:	Yes No		[
Date of First, Resumed	Production, SWD or EN	HR. Producing		ng 🗌	Gas Lift C	Other (Explain)		
Estimated Production Per 24 Hours	Oil	Bbls. Gas	Mcf	Wate	er Bl	bls.	Gas-Oil Ratio	Gravity
DISPOSITION	ON OF GAS:		METHOD O	F COMPLE	ETION:		PRODUCTION	ON INTERVAL:
Vented Solo	d Used on Lease	Open Hole	Perf.	Dually		nmingled mit ACO-4)		
(If vented, Sui	bmit ACO-18.)	Other (Specif	y)	(GUDITIIL)				

Conservation Division Finney State Office Building 130 S. Market, Rm. 2078 Wichita, KS 67202-3802



Phone: 316-337-6200 Fax: 316-337-6211 http://kcc.ks.gov/

Sam Brownback, Governor

Mark Sievers, Chairman Ward Loyd, Commissioner Thomas E. Wright, Commissioner

July 21, 2011

Leon Rodak Murfin Drilling Co., Inc. 250 N WATER STE 300 WICHITA, KS 67202-1216

Re: ACO1 API 15-039-21134-00-00 Fox 'A' 2-34 NW/4 Sec.34-03S-27W Decatur County, Kansas

# **Dear Production Department:**

We are herewith requesting that the Well Completion Form ACO-1 and attached information for the subject well be held confidential for a period of two years.

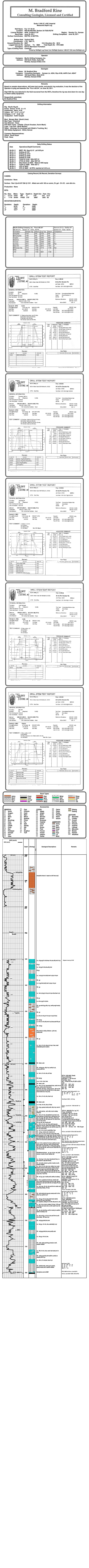
Should you have any questions or need additional information regarding subject well, please contact our office.

Respectfully, Leon Rodak

MDCI
Fox 'A" #2-34
900 FNL 900 FWL
Sec. 34-T3S-R27W
2612' KB

Raymond Oil Co. Steffan #3 W2 NW NW Sec. 34-T3S-R27W 2622' KB

	2012 KB					2022	NB	
Formation	Sample top	Datum	Ref	Log Top	Datum	Ref	Log Top	Datum
Anhydrite	2134	+478	-8	2134	+478	-8	2136	+486
B/Anhydrite	2166	+446	-9	2164	+448	-7	2167	+455
Topeka	3303	-691	-3	3302	-690	-2	3310	-688
Heebner	3472	-860	-3	3470	-858	-1	3479	-857
Toronto	3499	-887	-3	3498	-886	-2	3506	-884
Lansing	3512	-900	-2	3512	-900	-2	3520	-898
BKC	3718	-1106	Flat	3718	-1106	Flat	3728	-1106
RTD	3800						3736	
LTD				3801			3736	





Murfin Drilling Co.

Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43704

DST#: 1

ATTN: Brad Rine

Test Start: 2011.06.25 @ 00:40:00

#### GENERAL INFORMATION:

Formation: Oread

Interval:

Start Time:

Deviated: No Whipstock: ft (KB)

Time Tool Opened: 03:15:30 Time Test Ended: 08:10:30

3422.00 ft (KB) To 3469.00 ft (KB) (TVD)

Total Depth: 3469.00 ft (KB) (TVD)

7.88 inches Hole Condition: Good Hole Diameter:

Test Type: Conventional Bottom Hole

Tester:

Chuck Kreutzer Jr.

Unit No:

Reference Elevations:

2612.00 ft (KB)

2607.00 ft (CF)

KB to GR/CF: 5.00 ft

Serial #: 6752 Inside

Press@RunDepth: 3423.00 ft (KB) 27.91 psig @

Start Date: 2011.06.25 End Date:

> 00:40:05 End Time:

2011.06.25 08:10:29

Capacity: Last Calib.: 8000.00 psig

Time On Btm:

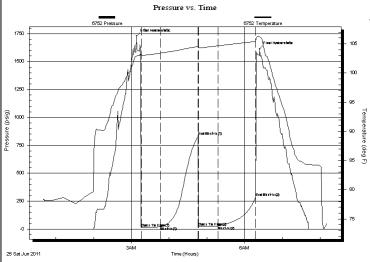
2011.06.25 2011.06.25 @ 03:08:00

Time Off Btm:

2011.06.25 @ 06:24:00

TEST COMMENT: IF: Weak surface blow over 30 mins.

ISI: No blow back over 60 mins. FF:No blow over 30 mins. FSI: No blow back over 60 mins.



Pl	RESSUR	RΕ	SUN	Λl	MARY
	_		•		

Ī	Time	Pressure	Temp	Annotation
	(Min.)	(psig)	(deg F)	
	0	1726.88	102.89	Initial Hydro-static
	8	16.03	103.09	Open To Flow (1)
	39	20.80	103.41	Shut-In(1)
۱,	98	831.97	104.52	End Shut-In(1)
Temperature	99	23.95	104.30	Open To Flow (2)
04	130	27.91	104.66	Shut-In(2)
(den	190	288.15	105.42	End Shut-In(2)
ן	196	1611.97	106.21	Final Hydro-static

#### Recovery

Length (ft)	Description	Volume (bbl)
10.00	HMCO-20%m80%o	0.05
		!

#### Gas Rates

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

Trilobite Testing, Inc. Ref. No: 43704 Printed: 2011.06.25 @ 09:11:59 Page 1



**FLUID SUMMARY** 

Murfin Drilling Co.

Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43704

Serial #:

DST#: 1

ATTN: Brad Rine

Test Start: 2011.06.25 @ 00:40:00

#### **Mud and Cushion Information**

Mud Type:Gel ChemCushion Type:Oil A Pl:deg A PlMud Weight:9.00 lb/galCushion Length:ftWater Salinity:ppm

Viscosity: 67.00 sec/qt Cushion Volume: bbl

5.60 in<sup>3</sup> Gas Cushion Type:

Resistivity: ohm.m Gas Cushion Pressure: psig

Salinity: 1000.00 ppm Filter Cake: 2.00 inches

#### **Recovery Information**

Water Loss:

#### Recovery Table

Length ft	Description	Volume bbl
10.00	HMCO-20%m80%o	0.049

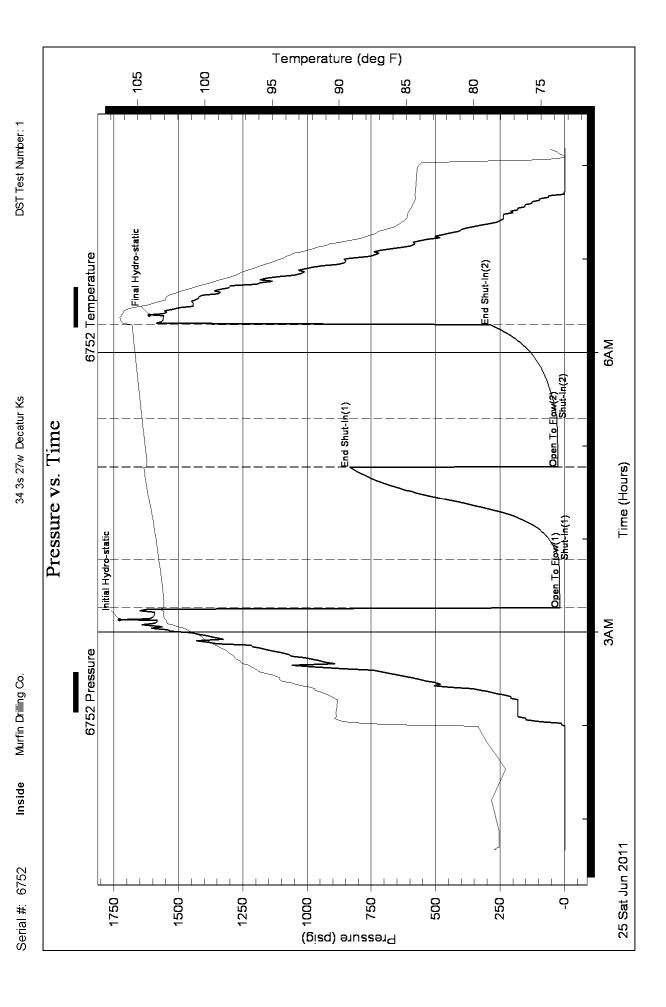
Total Length: 10.00 ft Total Volume: 0.049 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0

Laboratory Name: Laboratory Location:

Recovery Comments:

Trilobite Testing, Inc Ref. No: 43704 Printed: 2011.06.25 @ 09:11:59 Page 2



Printed: 2011.06.25 @ 09:11:59 Page 3 43704 Ref. No: Trilobite Testing, Inc



Murfin Drilling Co. Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43705 DST#: 2

ATTN: Brad Rine Test Start: 2011.06.25 @ 18:00:00

Tester:

Unit No:

#### GENERAL INFORMATION:

Formation: Toronto, LKC- A

Deviated: Whipstock: Test Type: Conventional Bottom Hole ft (KB)

Time Tool Opened: 20:05:00 Time Test Ended: 04:34:00

Interval: 3480.00 ft (KB) To 3532.00 ft (KB) (TVD)

Total Depth: 3522.00 ft (KB) (TVD)

7.88 inches Hole Condition: Good Hole Diameter:

Reference Elevations: 2612.00 ft (KB)

Chuck Kreutzer Jr.

KB to GR/CF: 5.00 ft

2607.00 ft (CF)

Serial #: 6752 Inside

Press@RunDepth: 3471.00 ft (KB) 337.18 psig @ Capacity: 8000.00 psig

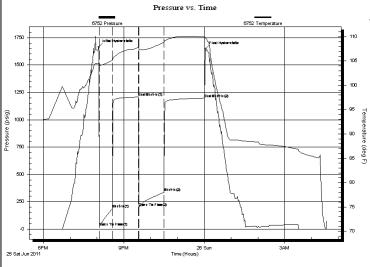
Start Date: 2011.06.25 End Date: 2011.06.26 Last Calib.: 2011.06.26 Start Time: 18:00:05 End Time: 04:34:00 Time On Btm: 2011.06.25 @ 20:04:00 2011.06.26 @ 00:03:00 Time Off Btm:

TEST COMMENT: IF: Fair blow, Built to B.O.B over 30 mins.

ISI: No blow back over 60 mins.

FF: Fair blow . Built to B.O.B over 22 mins.

FSI: No blow back over 90 mins.



Time	Pressure	Temp	Annotation
(Min.)	(psig)	(deg F)	
0	1665.51	104.51	Initial Hydro-static
1	22.64	104.30	Open To Flow (1)
0.4	400.00	405 40	01 (1 (4)

PRESSURE SUMMARY

0	1665.51	104.51	Initial Hydro-static	
1	22.64	104.30	Open To Flow (1)	
31	189.99	105.18	Shut-In(1)	
89	1207.11	107.86	6 End Shut-In(1)	
90	199.78	107.55	Open To Flow (2)	
146	337.18	108.88	Shut-In(2)	
237	1196.80	109.94	End Shut-In(2)	
239	1648.82	109.67 Final Hydro-static		

#### Recovery

Length (ft)	Description	Volume (bbl)
515.00	gocmw -1%g3%o5%m91%w	2.53
124.00	gocmw -5%g15%o10%m70%w	1.74
62.00	gmco-5%g5%m90%o	0.87
30.00	go-5%g95%o	0.42

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

Trilobite Testing, Inc. Ref. No: 43705 Printed: 2011.06.26 @ 08:25:05 Page 1



**FLUID SUMMARY** 

Murfin Drilling Co.

Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43705

DST#: 2

ATTN: Brad Rine

Test Start: 2011.06.25 @ 18:00:00

#### **Mud and Cushion Information**

Mud Type:Gel ChemCushion Type:Oil A Pl:deg A PlMud Weight:8.00 lb/galCushion Length:ftWater Salinity:ppm

Viscosity: 50.00 sec/qt Cushion Volume: bbl

5.99 in<sup>3</sup> Gas Cushion Type:

Resistivity: ohm.m Gas Cushion Pressure: psig

Salinity: 1700.00 ppm Filter Cake: 2.00 inches

#### **Recovery Information**

Water Loss:

### Recovery Table

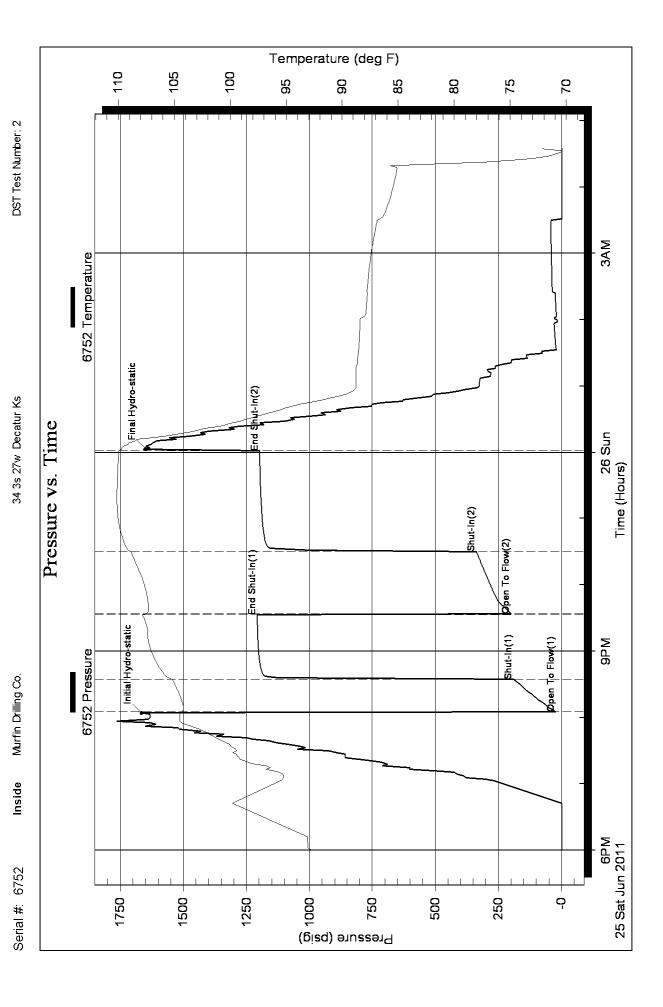
Length ft	Description	Volume bbl
515.00	gocmw -1%g3%o5%m91%w	2.533
124.00	gocmw -5%g15%o10%m70%w	1.739
62.00	gmco-5%g5%m90%o	0.870
30.00	go-5%g95%o	0.421

Total Length: 731.00 ft Total Volume: 5.563 bbl

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

Laboratory Name: Laboratory Location: Recovery Comments: Gravity-19@82\*=16.8 corrected gravity.

Trilobite Testing, Inc Ref. No: 43705 Printed: 2011.06.26 @ 08:25:05 Page 2



Printed: 2011.06.26 @ 08:25:06 Page 3 43705 Ref. No: Trilobite Testing, Inc



Murfin Drilling Co.

ATTN: Brad Rine

Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43706

Test Start: 2011.06.27 @ 22:32:00

**GENERAL INFORMATION:** 

Formation: LSG "B,C,D"

Deviated: No Whipstock: ft (KB)

Test Type: Conventional Bottom Hole Time Tool Opened: 00:58:30 Tester: Kevin Mack 36

Time Test Ended: 08:31:00 Unit No:

Interval: 3527.00 ft (KB) To 3566.00 ft (KB) (TVD) Reference Elevations: 2612.00 ft (KB) Total Depth: 3566.00 ft (KB) (TVD)

2607.00 ft (CF)

DST#: 3

Hole Diameter: 7.88 inches Hole Condition: Good KB to GR/CF: 5.00 ft

Serial #: 8651 Outside

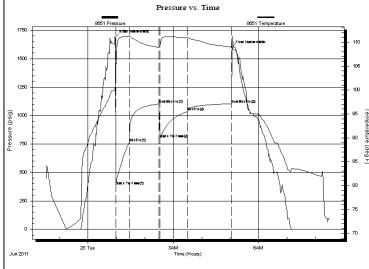
Press@RunDepth: 1035.48 psig @ 3528.00 ft (KB) Capacity: 8000.00 psig

Start Date: 2011.06.27 End Date: 2011.06.28 Last Calib.: 2011.06.28 Start Time: 22:32:05 End Time: 2011.06.28 @ 00:57:30 08:31:00 Time On Btm: Time Off Btm: 2011.06.28 @ 05:03:30

TEST COMMENT: IF: BoB in 1 1/2 min.

IS: No Return FF: BoB in 2 min

FS: No Return Max H2S 35ppm



Ī	Time	Pressure	Temp	Annotation
	(Min.)	(psig)	(deg F)	
	0	1687.64	99.87	Initial Hydro-static
	1	386.34	102.29	Open To Flow (1)
	30	764.11	111.17	Shut-In(1)
Ţ	93	1102.20	108.90	End Shut-In(1)
Temperature	94	797.92	109.00	Open To Flow (2)
ature	153	1035.48	110.92	Shut-In(2)
ídea F	246	1104.30	109.00	End Shut-In(2)
9	246	1597.97	109.14	Final Hydro-static

PRESSURE SUMMARY

#### Recovery

Length (ft)	Description	Volume (bbl)
5.00	Heavy Mud 100M	0.02
660.00	Water 100W	4.61
434.00	MW 95W 5M	6.09
620.00	MW 90W 10M	8.70
310.00	MW 70W 30M	4.35
155.00	OSWM 40W 60M (oil spots)	2.17

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

Trilobite Testing, Inc. Ref. No: 43706 Printed: 2011.06.28 @ 09:31:30 Page 1



**FLUID SUMMARY** 

Murfin Drilling Co.

Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43706

DST#: 3

ATTN: Brad Rine

Test Start: 2011.06.27 @ 22:32:00

#### **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: 75000 ppm

Viscosity: 55.00 sec/qt Cushion Volume: bbl

Water Loss: 5.99 in<sup>3</sup> Gas Cushion Type:

Resistivity: 0.00 ohm.m Gas Cushion Pressure: psig

Salinity: 2800.00 ppm Filter Cake: 2.00 inches

#### **Recovery Information**

#### Recovery Table

Length ft	Description	Volume bbl
5.00	Heavy Mud 100M	0.025
660.00	Water 100W	4.612
434.00	MW 95W 5M	6.088
620.00	MW 90W 10M	8.697
310.00	MW 70W 30M	4.348
155.00	OSWM 40W 60M (oil spots)	2.174

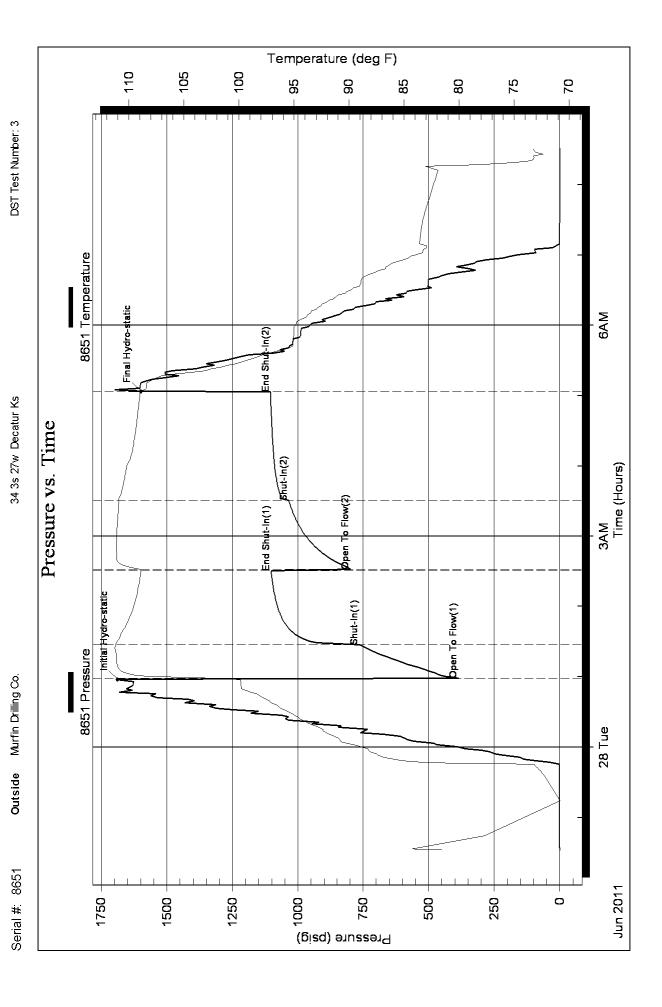
Total Length: 2184.00 ft Total Volume: 25.944 bbl

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

Laboratory Name: Laboratory Location: Recovery Comments: RW .13 @ 62 deg=75000ppm

Max H2S 35 ppm.

Trilobite Testing, Inc Ref. No: 43706 Printed: 2011.06.28 @ 09:31:31 Page 2





Murfin Drilling Co.

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43707

Reference Elevations:

Fox- A #2-34

Test Start: 2011.06.28 @ 17:33:00

DST#: 4

2612.00 ft (KB)

2607.00 ft (CF)

**GENERAL INFORMATION:** 

Formation: LSG "E,F,G,H"

Deviated: No Whipstock: ft (KB) Test Type: Conventional Bottom Hole

Time Tool Opened: 19:27:30 Tester: Kevin Mack
Time Test Ended: 01:14:30 Unit No: 36

Interval: 3588.00 ft (KB) To 3615.00 ft (KB) (TVD)

Total Depth: 3615.00 ft (KB) (TVD)

Hole Diameter: 7.88 inches Hole Condition: Good KB to GR/CF: 5.00 ft

ole Diameter. 7.00 inches note Condition. Good RB to GRCF. 5.00 in

Serial #: 6752 Inside

Press@RunDepth: 39.77 psig @ 3589.00 ft (KB) Capacity: 8000.00 psig

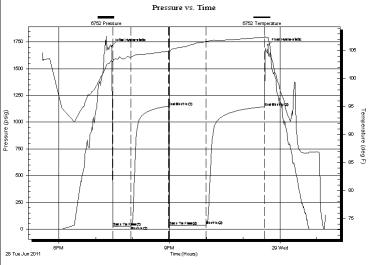
 Start Date:
 2011.06.28
 End Date:
 2011.06.29
 Last Calib.:
 2011.06.29

 Start Time:
 17:33:05
 End Time:
 01:14:29
 Time On Btm:
 2011.06.28 @ 19:26:30

 Time Off Btm:
 2011.06.28 @ 23:40:30

TEST COMMENT: IF: Blow built to 1/2"

IS: No Return FF: No Blow FS: No Return



	FINESSUINE SUIVIIVIAINT					
Ī	Time	Pressure	Temp	Annotation		
	(Min.)	(psig)	(deg F)			
	0	1712.41	103.24	Initial Hydro-static		
	1	22.03	102.80	Open To Flow (1)		
	31	30.46	103.87	Shut-In(1)		
<b>-</b>	92	1149.60	104.91	End Shut-In(1)		
empe	93	31.12	104.70	Open To Flow (2)		
rature	153	39.77	106.63	Shut-In(2)		
Temperature (deg F)	248	1143.53	107.37	End Shut-In(2)		
J	254	1719.04	107.35	Final Hydro-static		
				-		
		1				

PRESSURE SUMMARY

#### Recovery

Length (ft)	Description	Volume (bbl)
20.00	Mud 100M	0.10

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

Trilobite Testing, Inc Ref. No: 43707 Printed: 2011.06.29 @ 08:05:42 Page 1



**FLUID SUMMARY** 

Murfin Drilling Co.

Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43707

Serial #:

DST#: 4

ATTN: Brad Rine

Test Start: 2011.06.28 @ 17:33:00

**Mud and Cushion Information** 

Mud Type:Gel ChemCushion Type:Oil A Pl:deg A PlMud Weight:9.00 lb/galCushion Length:ftWater Salinity:ppm

Mud Weight: 9.00 lb/gal Cushion Length: ft
Viscosity: 59.00 sec/qt Cushion Volume: bbl

Water Loss: 5.60 in<sup>3</sup> Gas Cushion Type:

Resistivity: 0.00 ohm.m Gas Cushion Pressure: psig

Salinity: 2600.00 ppm Filter Cake: 2.00 inches

#### **Recovery Information**

#### Recovery Table

Length ft	Description	Volume bbl
20.00	Mud 100M	0.098

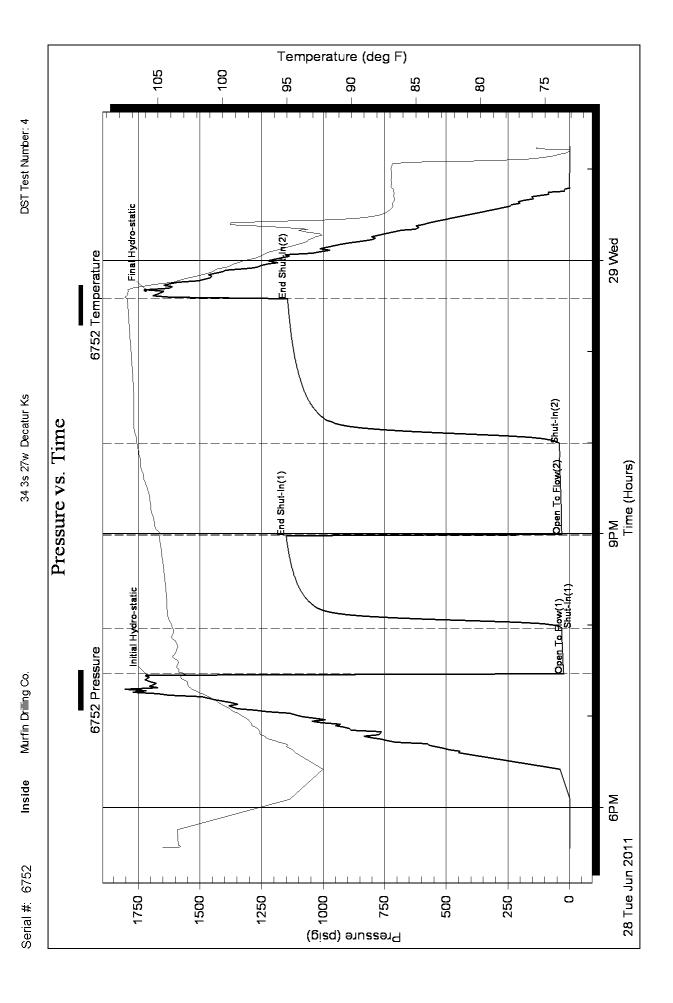
Total Length: 20.00 ft Total Volume: 0.098 bbl

Num Fluid Samples: 0 Num Gas Bombs: 0

Laboratory Name: Laboratory Location:

Recovery Comments:

Trilobite Testing, Inc Ref. No: 43707 Printed: 2011.06.29 @ 08:05:42 Page 2



Printed: 2011.06.29 @ 08:05:43 Page 3 43707 Ref. No: Trilobite Testing, Inc



Murfin Drilling Co. Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202 34 3s 27w Decatur Ks

> Job Ticket: 43708 DST#: 5

ATTN: Brad Rine Test Start: 2011.06.29 @ 08:23:00

#### **GENERAL INFORMATION:**

Formation: LKC "H"

Deviated: Test Type: Conventional Bottom Hole No Whipstock: ft (KB)

Time Tool Opened: 10:22:30 Tester: Kevin Mack Time Test Ended: 16:22:00 Unit No: 36

Interval: 3609.00 ft (KB) To 3643.00 ft (KB) (TVD)

Reference Elevations: 2612.00 ft (KB) Total Depth: 3643.00 ft (KB) (TVD)

2607.00 ft (CF)

7.88 inches Hole Condition: Good KB to GR/CF: Hole Diameter: 5.00 ft

Serial #: 8651 Outside

Press@RunDepth: 3610.00 ft (KB) 277.25 psig @ Capacity: 8000.00 psig

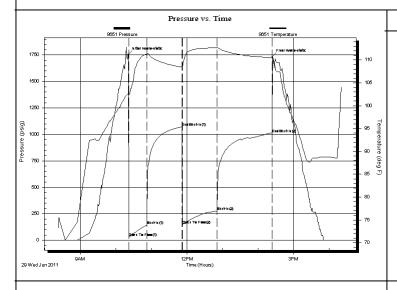
Start Date: 2011.06.29 End Date: 2011.06.29 Last Calib.: 2011.06.29 Start Time: 08:23:05 End Time: 2011.06.29 @ 10:21:30 16:21:59 Time On Btm: Time Off Btm: 2011.06.29 @ 14:24:30

TEST COMMENT: IF: Blow built to 9 3/4"

IS: No Return

FF: Blow started at 3 min. Built to BoB in 50 min.

FS: No Return Max H2s: 2 ppm



### PRESSURE SUMMARY

Time	Pressure	Temp	Annotation
(Min.)	(psig)	(deg F)	
0	1755.89	102.70	Initial Hydro-static
1	28.82	102.40	Open To Flow (1)
31	143.27	111.31	Shut-In(1)
90	1071.16	108.45	End Shut-In(1)
91	146.02	108.41	Open To Flow (2)
149	277.25	112.67	Shut-In(2)
242	1009.63	110.50	End Shut-In(2)
243	1737.85	110.55	Final Hydro-static

#### Recovery

Length (ft)	Description	Volume (bbl)
62.00	WM 45W 55M	0.30
130.00	MW 90W 10M	0.64
365.00	MW 80W 20M	2.18
3.00	MCWO 90o 5W 5M	0.04

#### Gas Rates

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

Trilobite Testing, Inc. Ref. No: 43708 Printed: 2011.06.29 @ 16:59:37 Page 1



**FLUID SUMMARY** 

Murfin Drilling Co.

Fox- A #2-34

250 N. Water Suite 300 Wichita Ks. 67202

34 3s 27w Decatur Ks

Job Ticket: 43708

DST#: 5

ATTN: Brad Rine

Test Start: 2011.06.29 @ 08:23:00

#### **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: 120000 ppm

Viscosity: 58.00 sec/qt Cushion Volume: bbl

6.00 in<sup>3</sup> Gas Cushion Type:

Resistivity: 0.00 ohm.m Gas Cushion Pressure: psig

Salinity: 3600.00 ppm Filter Cake: 2.00 inches

#### **Recovery Information**

Water Loss:

#### Recovery Table

Length ft	Description	Volume bbl	
62.00	WM 45W 55M	0.305	
130.00	MW 90W 10M	0.639	
365.00	MW 80W 20M	2.178	
3.00	MCWO 90o 5W 5M	0.042	

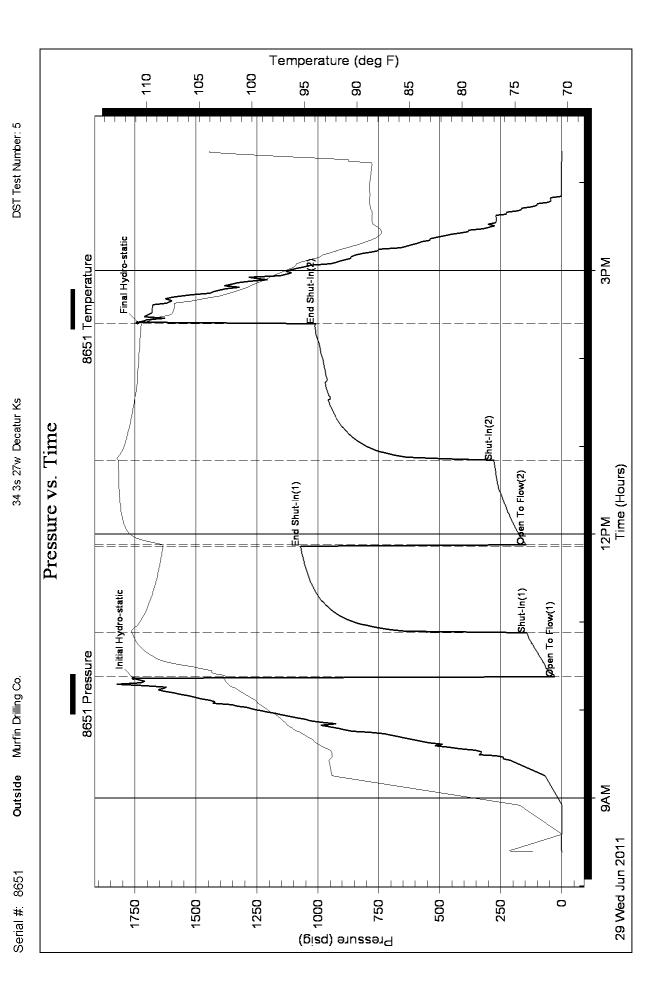
Total Length: 560.00 ft Total Volume: 3.164 bbl

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

Laboratory Name: Laboratory Location: Recovery Comments: RW .05 @ 97 deg.= 120000 ppm

Max H2s: 2 ppm

Trilobite Testing, Inc Ref. No: 43708 Printed: 2011.06.29 @ 16:59:38 Page 2



Printed: 2011.06.29 @ 16:59:39 Page 3 43708 Ref. No: Trilobite Testing, Inc



PO BOX 31 Russell, KS 67665

INVOIC

Invoice Number: 127667
Invoice Date: Jun 20, 2011

Page:

1

PROD COPY

Voice: Fax:

(785) 483-3887 (785) 483-5566

Bill To:

Federal Tax I.D.#: 20-5975804

Murfin Drilling Co. P.O. Box 661 Colby, KS 67701

MOC Pay

 Customer ID
 Well Name# or Customer P.O.
 Payment Terms

 Murfin
 Fox A #2-34
 Net 30 Days

 Job Location
 Camp Location
 Service Date
 Due Date

 KS1-01
 Oakley
 Jun 20, 2011
 7/20/11

Quantity	Item	Description Unit Price	Amount
165.00		Class A Common 16.25	2,681.25
110000000000000000000000000000000000000	MAT	Chloride 58.20	349.20
171.00	Personal Way	Handling 2.25	384.75
62.00		Mileage 171 sx @.11 per sk per mi 18.81	1,166.22
	SER /	Surface 1,125.00	1,125.00
124.00	1	Pump Truck Mileage 7.00	868.00
10000 MARKANS	SER	-Martifold Rental 200.00	200.00
124.00	SER	Light Vehicle Mileage 4.00	496.00
1.00	EQP	8.5/8 Wooden Plug 92.00	92.00
1.00	CEMENTER	Alan Ryan	
1.00	EQUIP OPER	Wayne McGhghy	
1.00	OPER ASSIST	Chris Helpingstine	
ī	(1-1		7 42 31/
	Account	4590 36 (ement ).C	59, #2-34
	1020	(2876.84)	
	3. 2.	395.0002	
	0	The second secon	
		The state of the s	
ALL PRICES	ARE NET, PAYA	Subtotal	7,362.42
30 DAYS F	OLLOWING DATE	OF Sales Tax	227.94
	1 1/2% CHARGE		7,590.36
	ER. IF ACCOUNT TAKE DISCOUNT		
		TOTAL	7,590.36
8 7	11.04		

\$ 2576.84

ONLY IF PAID ON OR BEFORE
Jul 15, 2011

-2576.84 3013.52 XX

# ALLIED CEMENTING CO., LLC. 039965 Federal Tax 1.D.# 20-5975804

RUSSELL, KANSAS 67665	1
DATE 6/20/11 SEC TWP RANGE 27 CALLED OUT ON LOCATION JOB START JOB FIN 5:300-6:00	ISH
A COUNTY STATE	/
LEASE OX # WELL# 2-34 LOCATION freshon 911 4 E/45 Lecetur State	<u> </u>
OLD OR (EW (Circle one)	
CONTRACTOR Mur Gin 3 OWNER Some	
HOLE SIZE $\partial^{9}$ T.D. $\partial$ /9 CEMENT	
CASING SIZE PR DEPTH 219 AMOUNT ORDERED 165 Com 300	
TUBING SIZE DEPTH	
DRILL PIPE DEPTH TOOL DEPTH	
PRES. MAX MINIMUM COMMON 165 @1625 2681	25
MEAS. LINE SHOE JOINT POZMIX @	
CEMENT LEFT IN CSG. 15 GEL @	
PERFS. CHLORIDE 6 @ 58 22 349 2	10_
DISPLACEMENT 12-9948 ASC @	
EQUIPMENT@	
PUMP TRUCK CEMENTER Alex	
# U22 HELPER (Many)	
BUILK TRUCK	
# 21/7 DRIVER / MC (	
BULK TRUCK  @  @  @	
# 3// DRIVER ( ) @ @ @	75
# J/ DRIVER (M ) @ @ @ @ @	75
# 3/7 DRIVER (10.5)  BULK TRUCK  # DRIVER  HANDLING  @ 2.55  384  MILEAGE   4 5K/ wle   1/66	75
# 347 DRIVER (MC 5  BULK TRUCK  # DRIVER  HANDLING  @ 2.55  384  MILEAGE   4 5K/ M/LE  TOTAL 458	75 72 72
BULK TRUCK  # DRIVER  HANDLING  MILEAGE //4 5/K/mile  REMARKS:  TOTAL 458	75
# 347 DRIVER (MC 5  BULK TRUCK  # DRIVER  HANDLING  @ 2.55  384  MILEAGE   4 5K/ M/LE  TOTAL 458	75 72 72
# 3/1) DRIVER CANS  BULK TRUCK  # DRIVER  HANDLING  MILEAGE //4 5/K/mile  1/66  REMARKS:  TOTAL 4581  Displace Conent, Worth Out College  SERVICE	75 72 792
BULK TRUCK  # DRIVER  HANDLING  MILEAGE //4 5/K/mile  1/66  REMARKS:  TOTAL 4581  DEPTH OF JOB  BULK TRUCK  # BULK TRUCK  # HANDLING  MILEAGE //4 5/K/mile  TOTAL 4581  DEPTH OF JOB	75 75 75 75 75 75 75 75 75 75 75 75 75 7
BULK TRUCK  # DRIVER  HANDLING  MILEAGE //4 5/K/m/le  Work  From 8 SP Con Grandle My Cenest  Displace Conent, Work Out College  DEPTH OF JOB  PUMP TRUCK CHARGE  1/25	75 72
# 3/1) DRIVER CANS BULK TRUCK  # DRIVER  HANDLING MILEAGE //4 5// mile  REMARKS:  TOTAL 458  SERVICE  DEPTH OF JOB PUMP TRUCK CHARGE EXTRA FOOTAGE  EXTRA FOOTAGE  @  DEPTH OF JOB EXTRA FOOTAGE	75 72
# 347 DRIVER CANS BULK TRUCK # DRIVER  HANDLING MILEAGE // 4 5/K/m/le  **TOTAL 458/  **SERVICE  DEPTH OF JOB PUMP TRUCK CHARGE EXTRA FOOTAGE MILEAGE 62 × 2 @ 25 389  **MILEAGE // 4 5/K/m/le  **TOTAL 458/  DEPTH OF JOB EXTRA FOOTAGE MILEAGE 62 × 2 @ 25 3865	75 72 772
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 4 5/K/m/le  Willeade // 4 5/K/m/le  TOTAL 4582  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE // 2 2 2 865  MANIFOLD  MANIFOLD  MANIFOLD  MEDITAL 4582  MANIFOLD  MANIFOLD  MEDITAL 4582  MANIFOLD  MANIFOLD  MEDITAL 4582  MANIFOLD  MEDITAL 4582  MEDI	75 72 72
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 5// mile  REMARKS:  TOTAL 458  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  EXTRA FOOTAGE  MILEAGE 62 X 2  MANIFOLD  MANIFOLD  Wash Start  Wash S	75 72 72 72
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 5// mile  REMARKS:  TOTAL 458  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  EXTRA FOOTAGE  MILEAGE 62 X 2  MANIFOLD  MANIFOLD  Wash Start  Wash S	75 72 772
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 5 5// mile  REMARKS:  TOTAL 4581  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 200 200 200 200 200 200 200 200 200	75 72 792
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 5// mile  REMARKS:  TOTAL 458  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  EXTRA FOOTAGE  MILEAGE 62 X 2  MANIFOLD  MANIFOLD  Wash Start  Wash S	75 72
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 5/K/m/le  HANDLING  MILEAGE // 5/K/m/le  TOTAL 4581  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 200 200  MANIFOLD  CHARGE TO: Mur Gr Dri // ing  STREET  CITY  STATE  TOTAL 26 A	75 72 772
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 5 5// mile  REMARKS:  TOTAL 4581  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 200 200 200 200 200 200 200 200 200	15 22 772 772 PO
BULK TRUCK  # DRIVER  HANDLING  MILEAGE HASK/MLE  REMARKS:  TOTAL 4581  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 X 2 @ 200 868  MANIFOLD  CHARGE TO: Man Grow Drilling  STREET  CITY  STATE  ZIP  PLUG & FLOAT EQUIPMENT	15 22 72 72 PD
BULK TRUCK  # DRIVER  HANDLING  MILEAGE // 5/K/m/le  HANDLING  MILEAGE // 5/K/m/le  TOTAL 4581  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 200 200  MANIFOLD  CHARGE TO: Mur Gr Dri // ing  STREET  CITY  STATE  TOTAL 26 A	15 22 72 72 PO 100 PO 1
BULK TRUCK  # DRIVER (Mr. )  REMARKS:  REMARKS:  TOTAL 458  Wash but allow allow service  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 2005 200  MANIFOLD  Thank I'm  Many Many Chris  STREET  CITY  STATE  ZIP  PLUG & FLOAT EQUIPMENT  Wooden Any @ 92	
BULK TRUCK  # DRIVER  HANDLING  MILEAGE HE SK/ALL  TOTAL 4581  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 200 865  MANIFOLD  CHARGE TO: Mus Grand Jing  STREET  CITY  STATE  ZIP  PLUG & FLOAT EQUIPMENT  WOOD  TO Allied Cementing Co. LLC.	
BULK TRUCK  # DRIVER  REMARKS:  REMARKS:  REMARKS:  TOTAL 458  Wash but allow  SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 200 300  MANIFOLD  Wash but allow  The May Chris  STREET  CITY  STATE  ZIP  PLUG & FLOAT EQUIPMENT  Woodan Align  @ 25 387  MILEAGE 1/4 5K/mlle  TOTAL 458  TOTAL 458  TOTAL 268	
BULK TRUCK  # DRIVER  # DRIVER  # DRIVER  # HANDLING  # MILEAGE     5K   mile  REMARKS:    TOTAL 4581    SERVICE    DEPTH OF JOB     PUMP TRUCK CHARGE               EXTRA FOOTAGE               MANIFOLD                 STREET                     CHARGE TO: Mus Greet                 STREET                       CITY   STATE   ZIP                      To Allied Cementing Co., LLC.  You are hereby requested to rent cementing equipment	
BULK TRUCK  # DRIVER  BULK TRUCK  # HANDLING  REMARKS:  REMARKS:  TOTAL 458   SERVICE  DEPTH OF JOB  PUMP TRUCK CHARGE  EXTRA FOOTAGE  MILEAGE 62 x 2 @ 200 868  MANIFOLD  CHARGE TO: Mus Great  TOTAL 268  TOTAL	
BULK TRUCK  # DRIVER  BULK TRUCK  # HANDLING  REMARKS:  REMARKS:    Wash but Collar   Wash but Collar   Service    Depth of Job   Pump truck charge   Pump truck charg	
BULK TRUCK  # DRIVER  REMARKS:    REMARKS:	
BULK TRUCK  # DRIVER  REMARKS:  REMARKS:    Wash but Collar	
BULK TRUCK  # DRIVER  REMARKS:  REMARKS:    Canal   Mileage   16 5%   mileage   16 5	80
BULK TRUCK  # DRIVER  REMARKS:  REMARKS:    Wash but Color   Connect   Wash	00
BULK TRUCK  # DRIVER  REMARKS:  REMARKS:    Canal   Mileage   16 5%   mileage   16 5	00
BULK TRUCK  # DRIVER  REMARKS:  REMARKS:    Wash but Color   Connect   Wash	00



PO BOX 31 Russell, KS 67665

# PROD COPY INVOICE

Invoice Number: 127731

Jun 30, 2011 Invoice Date: Page:

Voice: Fax:

(785) 483-3887 (785) 483-5566

Bill To:

Murfin Drilling Co. P.O. Box 661 Colby, KS 67701

Federal Tax I.D.#: 20-5975804

MOCBM

GustomerID	Well Name/# or Customer P.O.	Payment	t Terms	
Murfin	Fox A #2-34	Net 30 Days		
Job Location	Camp Location	'Service Date	Due Date	
KS1-03	Oakley	Jun 30, 2011	7/30/11	

Quantity	ltem /	Description Unit Price	e Amount
132.00	depote the first probability of the second		6.25 2,145.00
88.00	MAT	Pozmix	8.50 748.00
8.00	MAT	Gel 2	1.25 170.00
55.00	MAT	Flo Seal	2.70 148.50
228.00	SER	Handling	2.25 513.00
62.00	SER	Mileage 228 sx @ 11 per sk per mi 2	5.08 1,554.96
1.00	SER /		0.00 1,250.00
124.00	SER \	Pump Truck Mileage	7.00 868.00
124.00	SER	Light Vehicle Mileage /	4.00 496.00
1.00	EQP	8.5/8_Wooden Plug \( \tau \)	2.00 82.00
1.00	CEMENTER	Terry Heinrich	
1.00	EQUIP OPER	Wayne McGhghy	
1.00	OPER ASSIST	Ethan Glassman	
		Account Hig L No. 8551.67 (2791.44)	74 234
ALL PRICES	ARE NET, PAYA	3. 2395.0002	7,975.46
30 DAYS FO	DLLOWING DATE	OFSales Tax	582.21
	11/2% CHARGE ER: IF ACCQUNT		8,557.67
	TAKE DISCOUNT		
	1	TOTAL	8,557,67

\$ 2791.41

ONLY IF PAID ON OR BEFORE
Jul 25, 2014

5766.26

- 2791.41

# ALLIED CEMENTING CO., LLC. 039852

PRINTED NAME Klint Farr

			Federal Ta:	x I.D.# 20-5975804	ļ		
REMITTO P.O. E	30X 31				SER	VICE POINT:	
RUSS	SELL, KAI	YSAS 6760	55		OLK	_OAX	0/-V
						- C)///	(2)
G-30-//	SEC.	TWP.	RANGE	CALLED OUT	ON LOCATION	JOB START	JOB FINISH A
	34	35	27W		5:00 Pm	JOB START	830PM
FOX A"	WELL#	2-34	LOCATION DES	Jan 9N-4E-	125- E Idto	COUNTY	STATE,
OLD OR NEW (CI				, 2.0	E LACO	DECATUR	15
						ل	×
CONTRACTOR	MUX	FEN X	1RL9 RI3#3	OWNER -	SAM8.		
TYPE OF JOB		1900		OWNER.	Dinie		
IOLE SIZE	72/3		10	CEMENT	1.00		
CASING SIZE		DEP		_ AMOUNT O	RDEBED		
UBING SIZE		DEP	TH		60/40,002.4	19001111	8/6/2.500l
DRILLPIPE	4/2	DEP			V-170 002 1	10821 14	010-05/4
OOL		DEP	TH				
RES. MAX		MIN	IMUM	COMMON	132 5/5	@/6-25	2145 8
IEAS, LINE		SHC	E JOINT	POZMIX	88 sks	@ \$ 50	748 %
EMENT LEFT IN	CSG.			OEL	8 5KS	@ 2135	170 %
ERFS.				CHLORIDE		@	6/5 31
ISPLACEMENT				ASC		@	
	EQU	IPMENT				@	<del></del>
						@	
UMPTRUCK (	CEMENTE	R TF	RRV	- Flo-5E	4/ 55 2	@ 2 70	14850
11	HELPER		YNE	-		@	
ULK TRUCK	TOD DIC					@	
394	DRIVER	MIKE	+ EthAN				
ULK TRUCK						_ @	
	DRIVER						
				- HANDLING		@ Z 35	5/3 %
				MILEAGE Z	LEPER SKI	MILL	1534 2
A		1ARKS:				TOTAL	5259
	77 2	1450					
	T 10	150		_	SERVI	CE	
to sks A	-	70'					
		19		DEPTH OF J	OB : 2	140'	
		10/2			K CHARGE		1250 8
30 3K5 RI	PIH	0/6		_ EXTRA FOO		@	
				_ MILEAGE _	62×2	@ 7 %	868 5
				<ul> <li>MANIFOLD</li> </ul>		@	
			THANK YOU	LIGHT U	i heck 62XI	-@ 4 E	496 8
	1.115					_@	
HARGE TO:	MURFI	W DL	19,00	_	* *		Œ43
						TOTAL.	2614 %
ITY	STA	TE	ZIP	_			
				- 11	PLUG & FLOAT	CEQUIPMEN	Γ .
				85/8 We	owlen plug		82 %
					/		
						_@	
o Allied Cement	ing Co., I	LC.				_@	
			enting equipment			@	
nd furnish cemer	ter and he	elner(e) to	acciet owner or			@	
			e above work was	Section of the second of the s		_	~
			f owner agent or	3		TOTAL	82 5
					**	TOTAL	
			d the "GENERAL	VAT PRITAR	(If Any)		
EKINO AND CO	וטוועאי	no listed	on the reverse side	. OHIDO INA	(11 / 1117)	4.	_

DISCOUNT \_\_\_\_\_ IF PAID IN 30 DAYS