



Confidentiality Requested:

Yes No

KANSAS CORPORATION COMMISSION 1195448
OIL & GAS CONSERVATION DIVISION

Form ACO-1

August 2013

Form must be Typed
Form must be Signed
All blanks must be Filled

WELL COMPLETION FORM
WELL HISTORY - DESCRIPTION OF WELL & LEASE

OPERATOR: License # _____

Name: _____

Address 1: _____

Address 2: _____

City: _____ State: _____ Zip: _____ + _____

Contact Person: _____

Phone: (_____) _____

CONTRACTOR: License # _____

Name: _____

Wellsite Geologist: _____

Purchaser: _____

Designate Type of Completion:

- New Well Re-Entry Workover
- Oil WSW SWD SIOW
- Gas D&A ENHR SIGW
- OG GSW Temp. Abd.
- CM (Coal Bed Methane)
- Cathodic Other (Core, Expl., etc.): _____

If Workover/Re-entry: Old Well Info as follows:

Operator: _____

Well Name: _____

Original Comp. Date: _____ Original Total Depth: _____

- Deepening Re-perf. Conv. to ENHR Conv. to SWD
- Plug Back Conv. to GSW Conv. to Producer
- Commingled Permit #: _____
- Dual Completion Permit #: _____
- SWD Permit #: _____
- ENHR Permit #: _____
- GSW Permit #: _____

Spud Date or Recompletion Date	Date Reached TD	Completion Date or Recompletion Date
-----------------------------------	-----------------	---

API No. 15 - _____

Spot Description: _____

_____ - _____ - _____ Sec. _____ Twp. _____ S. R. _____ East West

_____ Feet from North / South Line of Section

_____ Feet from East / West Line of Section

Footages Calculated from Nearest Outside Section Corner:

- NE NW SE SW

GPS Location: Lat: _____, Long: _____
(e.g. xx.xxxxx) (e.g. -xxx.xxxxx)

Datum: NAD27 NAD83 WGS84

County: _____

Lease Name: _____ Well #: _____

Field Name: _____

Producing Formation: _____

Elevation: Ground: _____ Kelly Bushing: _____

Total Vertical Depth: _____ Plug Back Total Depth: _____

Amount of Surface Pipe Set and Cemented at: _____ Feet

Multiple Stage Cementing Collar Used? Yes No

If yes, show depth set: _____ Feet

If Alternate II completion, cement circulated from: _____

feet depth to: _____ w/ _____ sx cmt.

Drilling Fluid Management Plan

(Data must be collected from the Reserve Pit)

Chloride content: _____ ppm Fluid volume: _____ bbls

Dewatering method used: _____

Location of fluid disposal if hauled offsite:

Operator Name: _____

Lease Name: _____ License #: _____

Quarter _____ Sec. _____ Twp. _____ S. R. _____ East West

County: _____ Permit #: _____

AFFIDAVIT

I am the affiant and I hereby certify that all requirements of the statutes, rules and regulations promulgated to regulate the oil and gas industry have been fully complied with and the statements herein are complete and correct to the best of my knowledge.

Submitted Electronically

KCC Office Use ONLY

- Confidentiality Requested
Date: _____
- Confidential Release Date: _____
- Wireline Log Received
- Geologist Report Received
- UIC Distribution
- ALT I II III Approved by: _____ Date: _____

1195448

Operator Name: _____ Lease Name: _____ Well #: _____

Sec. _____ Twp. _____ S. R. _____ East West County: _____

INSTRUCTIONS: Show important tops of formations penetrated. Detail all cores. Report all final copies of drill stems tests giving interval tested, time tool open and closed, flowing and shut-in pressures, whether shut-in pressure reached static level, hydrostatic pressures, bottom hole temperature, fluid recovery, and flow rates if gas to surface test, along with final chart(s). Attach extra sheet if more space is needed.

Final Radioactivity Log, Final Logs run to obtain Geophysical Data and Final Electric Logs must be emailed to kcc-well-logs@kcc.ks.gov. Digital electronic log files must be submitted in LAS version 2.0 or newer AND an image file (TIFF or PDF).

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

CASING RECORD <input type="checkbox"/> New <input type="checkbox"/> Used							
Report all strings set-conductor, surface, intermediate, production, etc.							
Purpose of String	Size Hole Drilled	Size Casing Set (In O.D.)	Weight Lbs. / Ft.	Setting Depth	Type of Cement	# Sacks Used	Type and Percent Additives

ADDITIONAL CEMENTING / SQUEEZE RECORD				
Purpose:	Depth Top Bottom	Type of Cement	# Sacks Used	Type and Percent Additives
<input type="checkbox"/> Perforate <input type="checkbox"/> Protect Casing <input type="checkbox"/> Plug Back TD <input type="checkbox"/> Plug Off Zone				

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

Does the volume of the total base fluid of the hydraulic fracturing treatment exceed 350,000 gallons? Yes No *(If No, skip question 3)*

Was the hydraulic fracturing treatment information submitted to the chemical disclosure registry? Yes No *(If No, fill out Page Three of the ACO-1)*

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

TUBING RECORD:	Size:	Set At:	Packer At:	Liner Run: <input type="checkbox"/> Yes <input type="checkbox"/> No
----------------	-------	---------	------------	---

Date of First, Resumed Production, SWD or ENHR.	Producing Method: <input type="checkbox"/> Flowing <input type="checkbox"/> Pumping <input type="checkbox"/> Gas Lift <input type="checkbox"/> Other <i>(Explain)</i> _____
---	--

Estimated Production Per 24 Hours	Oil Bbls.	Gas Mcf	Water Bbls.	Gas-Oil Ratio	Gravity

DISPOSITION OF GAS: <input type="checkbox"/> Vented <input type="checkbox"/> Sold <input type="checkbox"/> Used on Lease <i>(If vented, Submit ACO-18.)</i>	METHOD OF COMPLETION: <input type="checkbox"/> Open Hole <input type="checkbox"/> Perf. <input type="checkbox"/> Dually Comp. <input type="checkbox"/> Commingled <i>(Submit ACO-5)</i> <input type="checkbox"/> Other <i>(Specify)</i> _____	PRODUCTION INTERVAL: _____ _____
--	--	---

QUALITY OILWELL CEMENTING, INC.

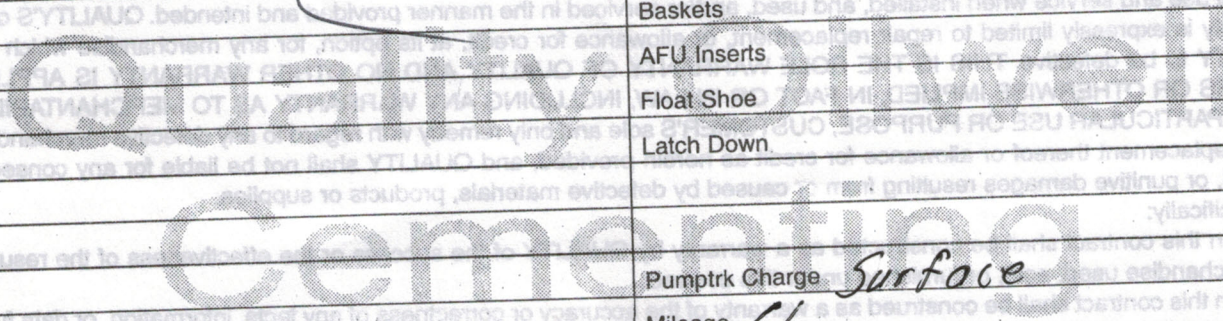
Federal Tax I.D.# 20-2886107

No. 7735

Phone 785-483-2025
Cell 785-324-1041

Home Office P.O. Box 32 Russell, KS 67665

Date	2-28-14	Sec.	23	Twp.	5	Range	21	County	Norton	State	KS	On Location		Finish	5:45pm		
Location								Densmore 4E to E 12 3S 1/2ES into									
Lease	Kemper B							Well No.	2								
Contractor	WW#6							Owner	To Quality Oilwell Cementing, Inc. You are hereby requested to rent cementing equipment and furnish cementer and helper to assist owner or contractor to do work as listed.								
Type Job	Surface							Charge To	Black Diamond								
Hole Size	12 1/4			T.D.	209			Street									
Csg.	8 5/8			Depth	208			City	State								
Tbg. Size				Depth				The above was done to satisfaction and supervision of owner agent or contractor.									
Tool				Depth				Cement Amount Ordered	1500m 3/CC 2/62								
Cement Left in Csg.	15			Shoe Joint													
Meas Line				Displace	12 1/2 BCL												
EQUIPMENT								Common	150								
Pumptrk	16	No.		Cementer	Craig			Poz. Mix									
				Helper				Gel.	3								
Bulktrk		No.		Driver	Billy			Calcium	5								
				Driver				Hulls									
Bulktrk	9	No.		Driver	Dodge			Salt									
				Driver				Flowseal									
JOB SERVICES & REMARKS								Kol-Seal									
Remarks:	Rat Hole																
	Mouse Hole																
	Centralizers																
	Baskets																
	D/V or Port Collar																
	8 5/8 on bottom. Est Circulation																
	Mix 150 SK & Displace																
	Cement Circulator																
FLOAT EQUIPMENT								Guide Shoe									
									Centralizer								
									Baskets								
									AFU Inserts								
									Float Shoe								
									Latch Down								
									Pumptrk Charge	Surface							
									Mileage	61							
									Tax								
									Discount								
									Total Charge								
X Signature	KS																



QUALITY OILWELL CEMENTING, INC.

Federal Tax I.D.# 20-2886107

Phone 785-483-2025
Cell 785-324-1041

Home Office P.O. Box 32 Russell, KS 67665


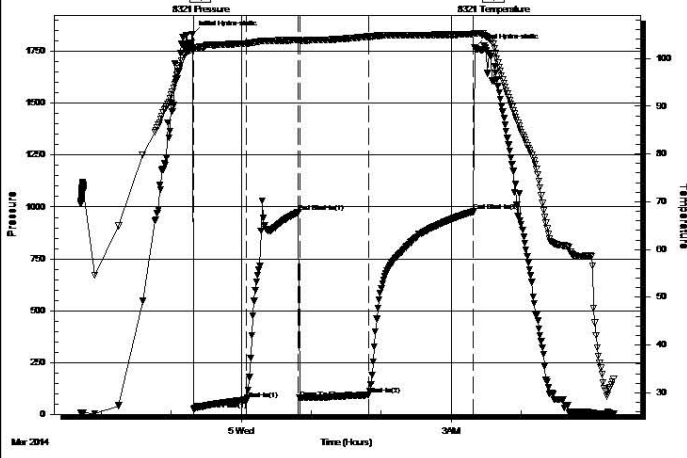
No. 7082

Date	Sec.	Twp.	Range	County	State	On Location	Finish
3-5-14	23	5	21	Norton	KS		5:45 PM
Lease Kemper "B"				Well No. #2		Owner	
Contractor WW #6				To Quality Oilwell Cementing, Inc. You are hereby requested to rent cementing equipment and furnish cementer and helper to assist owner or contractor to do work as listed.			
Type Job Production Top to Bottom String				Charge To Black Diamond			
Hole Size 7 7/8		T.D. 3626		Street			
Csg. 5 1/2		Depth 3625		City State			
Tbg. Size		Depth		The above was done to satisfaction and supervision of owner agent or contractor.			
Tool		Depth		Cement Amount Ordered 450 QMDC 1/4 # Flt			
Cement Left in Csg. 42.42		Shoe Joint 42.42		150 com 10% Salt 5% Gilsenite			
Meas Line		Displace 85 1/4 bbl		Common 150			
EQUIPMENT				Poz Mix 450 QMDC			
Pumptrk 17 No.	Cementor	Nick Brett		Gel.			
Bulktrk 19 No.	Helper	David		Calcium			
Bulktrk 9 No.	Driver	Lonnie M		Hulls			
JOB SERVICES & REMARKS				Salt 13			
Remarks:				Flowseal 112#			
Rat Hole - 30sx				Kol-Seal 750#			
Mouse Hole				Mud CLR 48 500 gal			
Centralizers - 1, 3, 5, 7, 9, 11 & 43				CFL-117 or CD110 CAF 38			
Baskets - 2, 4, 6, 8, 12 & 44				Sand			
D/V or Port Collar				Handling 620			
Pump 500 gal Mud Flush				Mileage 5 1/2			
Plug Rat hole 30sx				FLOAT EQUIPMENT			
Mix 420 QMDC 1/4 Flt then				Guide Shoe			
150 bx com 10% Salt 5% Gilsenite				Centralizer - 7			
Displaced 85 1/4 bbl				Baskets - 6			
Lift Pressure @ 700 lbs				AFU Inserts			
Landal @ 2000 lbs				Float Shoe - 1			
Plug held				Latch Down - 1			
Cement Circulated!!				Rubber Plug - 1			
Pumptrk Charge prod string				Tax			
Mileage 61				Discount			
Signature <i>B. J. Patten</i>				Total Charge			
Signature <i>Shane / dsgd - Mud House</i>							

CHRONOLOGY OF DAILY ACTIVITY

- 2-28-14** RU, Spud 2:00 PM, set 8 5/8" surface casing to 209' w/150 sxs
Common 2%gel 3%CC, plug down 5:45PM, slope 1/4 degree
- 3-01-14** 690', drill plug at 1:45 AM
- 3-02-14** 2357', drilling, displacement complete at 2901'
- 3-03-14** 3233', drilling, CFS 3330', short trip-pulled 34 stands, CFS 3380'
- 3-04-14** 3621', drilling, CFS 3621', CFS 3626', RTD 3626' @7:05 AM, mini
short trip 14 stands, DST # 1, 3568' to 3626'-packer failure, TOWT,
logs, start DST # 2 3576' to 3626' Arbuckle
- 3-05-14** 3626', finish DST # 2, TIWB, CCH, LDDP, run production casing, RD

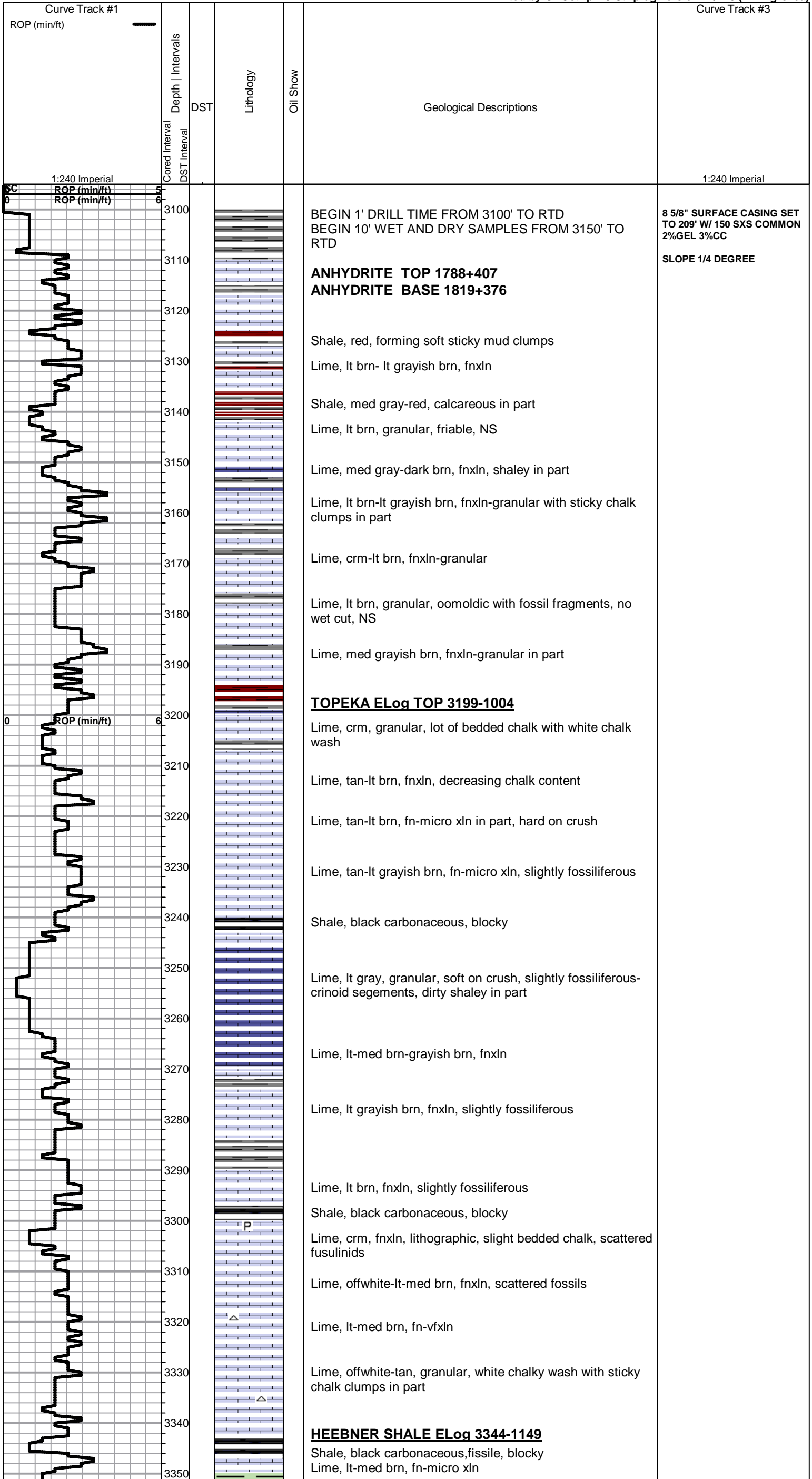
DST # 2 3576' TO 3626' ARBUCKLE

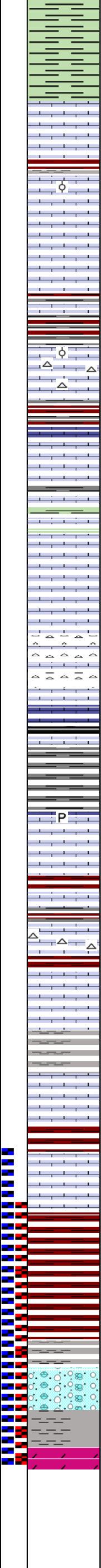
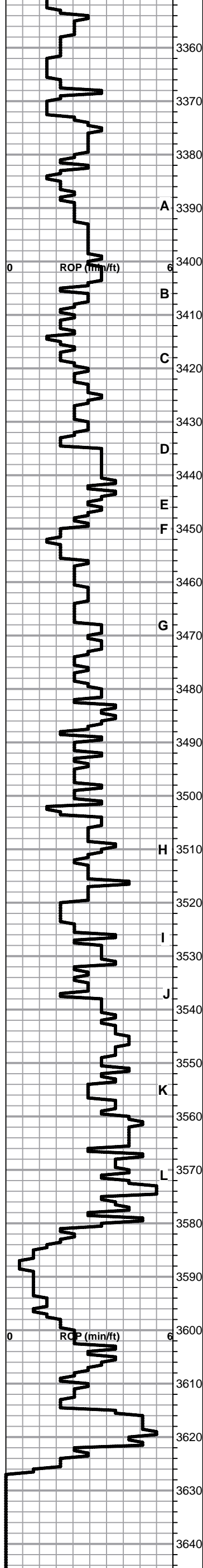
	DRILL STEM TEST REPORT																																						
	Black Diamond Oil, Inc. PO Box 641 Hays, KS 67601 ATTN: Herb Deines	23-5S-21W Norton, KS Kemper B(Unit)#2 Job Ticket: 54012 DST#: 2 Test Start: 2014.03.04 @ 21:42:37																																					
GENERAL INFORMATION:																																							
Formation: Arbuckle Deviated: No Whipstock: ft (KB) Time Tool Opened: 23:19:07 Time Test Ended: 05:19:07		Test Type: Conventional Bottom Hole (Reset) Tester: Brannan L Unit No: 46																																					
Interval: 3576.00 ft (KB) To 3626.00 ft (KB) (TVD) Total Depth: 3626.00 ft (KB) (TVD) Hole Diameter: 7.88 inches Hole Condition: Fair		Reference Elevations: 2195.00 ft (KB) 2186.00 ft (CF) KB to GR/CF: 9.00 ft																																					
Serial #: 8321 Inside Press@RunDepth: 93.58 psig @ 3577.00 ft (KB) Capacity: 8000.00 psig Start Date: 2014.03.04 End Date: 2014.03.05 Last Calib.: 2014.03.05 Start Time: 21:42:38 End Time: 05:19:07 Time On Btm: 2014.03.04 @ 23:18:07 Time Off Btm: 2014.03.05 @ 03:20:07																																							
TEST COMMENT: 45- IF- Slow ly built to 5.5" 45- IS- No blow 60- FF- Slow ly built to 5.5" 90- FS- No blow																																							
Pressure vs. Time 		PRESSURE SUMMARY																																					
		<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Time (Min.)</th> <th>Pressure (psig)</th> <th>Temp (deg F)</th> <th>Annotation</th> </tr> </thead> <tbody> <tr><td>0</td><td>1834.47</td><td>101.82</td><td>Initial Hydro-static</td></tr> <tr><td>1</td><td>24.01</td><td>101.79</td><td>Open To Flow (1)</td></tr> <tr><td>47</td><td>70.32</td><td>103.14</td><td>Shut-In(1)</td></tr> <tr><td>91</td><td>974.95</td><td>103.84</td><td>End Shut-In(1)</td></tr> <tr><td>92</td><td>78.63</td><td>103.66</td><td>Open To Flow (2)</td></tr> <tr><td>151</td><td>93.58</td><td>104.54</td><td>Shut-In(2)</td></tr> <tr><td>241</td><td>977.96</td><td>105.03</td><td>End Shut-In(2)</td></tr> <tr><td>242</td><td>1771.01</td><td>105.24</td><td>Final Hydro-static</td></tr> </tbody> </table>	Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation	0	1834.47	101.82	Initial Hydro-static	1	24.01	101.79	Open To Flow (1)	47	70.32	103.14	Shut-In(1)	91	974.95	103.84	End Shut-In(1)	92	78.63	103.66	Open To Flow (2)	151	93.58	104.54	Shut-In(2)	241	977.96	105.03	End Shut-In(2)	242	1771.01	105.24	Final Hydro-static	
Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation																																				
0	1834.47	101.82	Initial Hydro-static																																				
1	24.01	101.79	Open To Flow (1)																																				
47	70.32	103.14	Shut-In(1)																																				
91	974.95	103.84	End Shut-In(1)																																				
92	78.63	103.66	Open To Flow (2)																																				
151	93.58	104.54	Shut-In(2)																																				
241	977.96	105.03	End Shut-In(2)																																				
242	1771.01	105.24	Final Hydro-static																																				
Recovery		Gas Rates																																					
<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Length (ft)</th> <th>Description</th> <th>Volume (bbl)</th> </tr> </thead> <tbody> <tr> <td>175.00</td> <td>OCM, 70%M 30%O</td> <td>1.33</td> </tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> </tbody> </table>		Length (ft)	Description	Volume (bbl)	175.00	OCM, 70%M 30%O	1.33													<table border="1" style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th>Choke (inches)</th> <th>Pressure (psig)</th> <th>Gas Rate (Mcf/d)</th> </tr> </thead> <tbody> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> <tr><td> </td><td> </td><td> </td></tr> </tbody> </table>		Choke (inches)	Pressure (psig)	Gas Rate (Mcf/d)															
Length (ft)	Description	Volume (bbl)																																					
175.00	OCM, 70%M 30%O	1.33																																					
Choke (inches)	Pressure (psig)	Gas Rate (Mcf/d)																																					
<small>* Recovery from multiple tests</small>																																							

ROCK TYPES					
	Cht		Lmst fw<7		shale, grn
	Clystgy		Lmst fw7>		shale, gry
	Dolprim		Lscongl		Carbon Sh
					shale, red

ACCESSORIES	
MINERAL	FOSSIL
P Pyrite	φ Oolite
△ Chert White	

Printed by GEOstrip VC Striplog version 4.0.7.0 (www.grsi.ca)





Shale, dove gray-lime green, soft forming soft mud

TORONTO ELog 3370-1175

Lime, crm, fnxln, lot of chalk, some sticky clumps, trace of stain in fine interxln granular lime, lt halo wet cut, NFO, No Odor

LKC ELog 3384-1189

Lime, tan, most fnxln with chalk, few pieces oolitic with trace of lt stain in interoolitic porosity. Appears poorly developed

Lime, tan, fn-sub micro xln, slight bedded chalk

Shale, red wash forming soft mud

Lime, med brn-med grayish brn, fn-micro xln, hard on crush

Lime, crm, fnxln-granular in part, lot of chalk with white chalk wash, few oolitic chips with trace of spotty staining, NFO, interoolitic porosity with scattered fine vugs in part,

Shale, reddish brn-lime green in part, soft-sticky in part

Lime, tan-lt brn, fn-micro xln, bedded chalk, hard, NS

Shale, gray-black, blocky

Lime, lt gray w/ green tint, fnxln

Lime, tan, fnxln with few oolitic chips, trace of staining, NFO, no odor, appears poorly developed

Lime, tan, fnxln, chalky with white chalk wash

Lime, crm-tan, fnxln, lot of bedded chalk with white wash
Chert, tan, fresh, sharp, conchodial, bedded

Lime, dark grayish brn, fnxln, gray mottling, slightly fossiliferous

Shale, dove gray, soft forming soft mud and sticky clumps

Lime, off white-crm-tan, fnxln, lot of bedded chalk and fine xln pyrite inclusions in lime

Shale, deep red, soft forming soft mud and sticky clumps

Lime, tan-lt brn, fn-vfxln, flaky dead oil in many chips with trace of fresh oil stain in a few, NFO, No odor

Shale, red wash

Lime, tan-lt grayish brn, fn-vfxln, slight bedded chalk, trace of dead oil staining, no visible porosity

Shale, dove gray, soft mud forming sticky clumps in part

Lime, crm-tan, fnxln, bedded chalk w/ chalky white wash, thin bed of oolitic-fossil fragments, spotty staining, NFO, no odor

Shale, red to dark brn, firm blocky

Lime, lt-med brn, slightly fossiliferous, micro xln, hard

BKC ELog 3578-1383

Shale, red to reddish brn, dark red wash

Shale, red-brn, soft with reddish brn wash

Shale, dove gray, soft, sticky

Lime, crm-tan, mostly granular, soft on crush, chalky with white chalk wash

Shale, lt gray, soft sticky

ARBUCKLE SPL TOP 3622-1427

Arbuckle, ivory-tan, fnxln-granular, interxln porosity, scattered to saturated staining, good odor with MSFO, range of fine inter xln to coarse xln with rhombic xln development with evidence of vuggy channel enlargement with recrystallized surfaces

DST # 1 3568' TO 3626'
PACKER FAILURE

DST # 2 3576' TO 3626' SEE
HEADER FOR TEST
SUMMARY

STRAP 3642.54
BOARD 3644.03
1.49

SLOPE 3/4 DEGREE @3626'

CFS 3621'
CFS 3626'

88 JTS 5 1/2" SET TO 3626'
W/ 600 SXS QMD-QUALITY
CEMENTING