KOLAR Document ID: 1428705

Confidentiality Requested:

Yes No

Kansas Corporation Commission Oil & Gas Conservation Division

Form ACO-1
January 2018
Form must be Typed
Form must be Signed
All blanks must be Filled

WELL COMPLETION FORM WELL HISTORY - DESCRIPTION OF WELL & LEASE

Name:	
Feet from North / South Li	
City: State: Zip:	∃ast
Contact Person:	ne of Section
Phone: () NE NW SE SW CONTRACTOR: License #	ne of Section
CONTRACTOR: License #	
Name:	
Name:	
Wellsite Geologist:	xxx.xxxxx)
Purchaser:	
Designate Type of Completion:	_
New Well Re-Entry Workover Field Name:	
Producing Formation:	
Gas DH EOR	
OG GSW Total Vertical Depth: Plug Back Total Depth:	
CM (Coal Bed Methane) Amount of Surface Pipe Set and Cemented at:	Feet
☐ Cathodic ☐ Other (Core, Expl., etc.): Multiple Stage Cementing Collar Used? ☐ Yes ☐ No	
If Workover/Re-entry: Old Well Info as follows:	Feet
Operator: If Alternate II completion, cement circulated from:	
Well Name: feet depth to:w/	sx cmt.
Original Comp. Date: Original Total Depth:	
☐ Deepening ☐ Re-perf. ☐ Conv. to EOR ☐ Conv. to SWD ☐ Drilling Fluid Management Plan	
Plug Back Liner Conv. to GSW Conv. to Producer (Data must be collected from the Reserve Pit)	
Chloride content:ppm Fluid volume:	bbls
Commingled Permit #: Dewatering method used:	
SWD Permit #: Location of fluid disposal if hauled offsite:	
EOR Permit #:	
GSW Permit #: Operator Name:	
Lease Name: License #:	
Spud Date or Date Reached TD Completion Date or Quarter Sec. Twp. S. R	East West
Recompletion Date Recompletion Date Countv: 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 Drill Stem Tests Received
Geologist Report / Mud Logs Received
UIC Distribution
ALT I II III Approved by: Date:

KOLAR Document ID: 1428705

Page Two

Operator Name: _				Lease Name:	me: Well #:						
Sec Twp.	S. R.	E	ast West	County:							
	flowing and shu	ut-in pressures, v	vhether shut-in pre	ssure reached st	atic level, hydrosta	tic pressures, bot		val tested, time tool erature, fluid recovery,			
Final Radioactivity files must be subm						iled to kcc-well-lo	gs@kcc.ks.gov	v. Digital electronic log			
Drill Stem Tests Ta			Yes No			on (Top), Depth ar		Sample			
Samples Sent to 0	Geological Surv	/ey	Yes No	Na	me		Тор	Datum			
Cores Taken Electric Log Run Geologist Report / List All E. Logs Ru	_		Yes No Yes No Yes No								
		B	CASING eport all strings set-c		New Used	ion, etc.					
Purpose of Strir		Hole illed	Size Casing Set (In O.D.)	Weight Lbs. / Ft.	Setting Depth	Type of Cement	# Sacks Used	Type and Percent Additives			
			ADDITIONAL	CEMENTING / SO	UEEZE RECORD						
Purpose:		epth T Bottom	ype of Cement	# Sacks Used		Type and F	Percent Additives				
Perforate Protect Casi Plug Back T											
Plug Off Zor											
Did you perform a Does the volume Was the hydraulic	of the total base f	fluid of the hydrauli		_	=	No (If No, sk	ip questions 2 an ip question 3) out Page Three	,			
Date of first Product Injection:	tion/Injection or R	esumed Production	Producing Meth	nod:	Gas Lift 0	Other (Explain)					
Estimated Production Per 24 Hours	on	Oil Bbls.					Gas-Oil Ratio	Gravity			
DISPOS	SITION OF GAS:		N	METHOD OF COMP	LETION:			DN INTERVAL: Bottom			
	Sold Used	I on Lease	Open Hole			mmingled mit ACO-4)	Тор	BOROTT			
,	,			B.11 B1							
Shots Per Foot	Perforation Top	Perforation Bottom	Bridge Plug Type	Bridge Plug Set At	Acid,	Fracture, Shot, Cer (Amount and Kind	menting Squeeze I of Material Used)	Record			
TUBING RECORD:	: Size:	Set	Δ+-	Packer At:							
TODING RECORD:	. 3126.	Set	n.	i donei Al.							

Form	CO1 - Well Completion							
Operator	O'Brien Energy Resources Corp.							
Well Name	PREEDY 3-4							
Doc ID	1428705							

Tops

Name	Тор	Datum
Heebner	4442	-1761
Toronto	4454	-1773
Lansing	4586	-1905
Marmaton	5223	-2542
Cherokee	5395	-2714
Atoka	5643	-2962
Morrow	5695	-3014
Mississippi	5800	-3119
Basal Chester	6006	-3325
Ste. Genevieve	6038	-3357
St. Louis	6129	-3448
Spergen	6325	-3644

Form	CO1 - Well Completion							
Operator	O'Brien Energy Resources Corp.							
Well Name	PREEDY 3-4							
Doc ID	1428705							

Casing

Purpose Of String	Size Hole Drilled	Size Casing Set	Weight	Setting Depth	Type Of Cement	Number of Sacks Used	Type and Percent Additives
Surface	12.25	8.625	24	1530	ACON BLEND	525	3% CaCl, 1/4#floseal
Production	7.875	4.5	11.6	6350	AA-2	220	5% W-60, 10%CaCl, 6%C-15, 1/4# DEFOAM ER, 5# GILSONI TE
	_						_

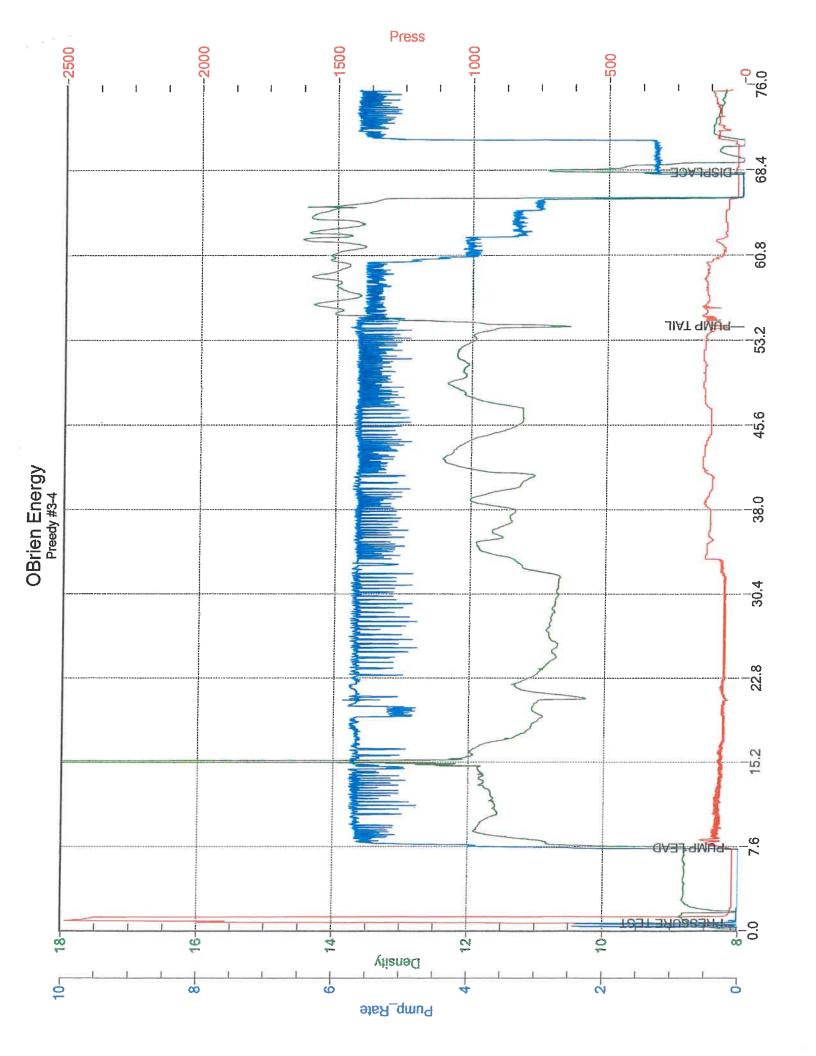


Liberal Yard #1717 - Phone 620-624-2277 - 1700 S. Country Estates Road, Liberal KS 67901

PRESSURE PUMPING Job

Job Log

promoter					7					
Custome	re	Obrien Energy	/		Cement Pump No	38117, 1	19919 5Hrs.	Operator TRK No.:		
Address	18 Congres	s St. Suite 20	7	7 Ticket		W: 1718	15906 L	Bulk TRK No.:	70897, 37725 Santiago	14355, 3772 Noel
City, State, Zip	Portsmouth	NH 03801			Job Type	e:	Z42 Ce	ment Surface (Casing	
Service Distric	t 17	'18 - Liberal, K	(s.		Well Type	B2		OIL		
Vell Name and No		Preedy 3-4			Well Location	n: 4,33,2	29 County	/ Meade	State	K
Туре	of Cmt	Sacks			Additives			Truck Lo	aded On	
A-Cor	n' Blend	375	3%	Calciun	n Chloride, 1/4# Po	lyflake, .2% WCA1	70897, 377	725 Santiago	Front	Back
Premium F	Plus Cement	150		2% C	Calcium Chloride, 1/	/4# Polyflake	14355, 3	37724 Noel	Front	Back
									Front	Back
Lead	l/Tail:	Weight #1 Gal.	Cu/	Ft/sk	Water Re	quirements	CU. FT.	Man	Hours / Persor	nnel
Le	ad:	11.4	2	.95	1	8.1	1106.25	TT Man Hours:	42	
Ta	ail:	14.8	1.	.34	6	.33	201	# of Men on Job:	4	
Time		Volume	Pi	umps	Pres	ssure(PSI)	[Description of Oper	ation and Materia	ls
(am/pm)	(BPM)	(BBLS)	T	С	Tubing	Casing				
13:50								ON LOC	ATION	
14:00								SAFETY M	EETING	
2:15 PM								RIG	UP	
4:20 PM								RIG TO CIF	RCULATE	
4:45 PM								RIG TO) P.T.	
16:47				PRESSURE TEST		ST TO 2400PS	1			
16:54	5.5	197.0 slurry				120	PUMP 350SX LEAD @ 11.4#			
5:41 PM	5.6	35.7 slurry			140	ı	PUMP 150SX TAIL @ 14.8#			
17:53								SHUTDOWN /	DROP PLUG	
17:55	5.5	10				80	DIS	SPLACE / CEM	ENT RETURN	S
	5.5	20				100				
	5.5	30				120				
	5.5	40				160				
	5.5	50				220			G.	
	5.5	60				270				
	5.5	70				340				
	5.5	80				400				
	5.5	84				420	SLO	W RATE TO 2.	OBPM @ 3501	PSI
	2	90				380				
18:18	2	94.7				390	LAND P	LUG / PRESSI	JRE UP TO 8	70PSI
18:20							REL	EASE BACK -	FLOAT HEL	D
			_					JOB COM	PLETE	
Size Hole	12 1/4"	Depth		1	540'		TYPE	PI	ug Container	
Size & Wt. Csg.	8 5/8" 24#	Depth	1532		New / Used		Packer		Depth	
Landing Press.	304.4psi	Depth					Retainer		Depth	
Shoe Jt.	42.03'	Туре					Perfs		CIBP	
						Basic Represe	l		Daniel Beck	
Customer Sig	nature: 🕜					Basic Signatur		Daniel		2
-/3	7					Date of Service		9/1/2018		

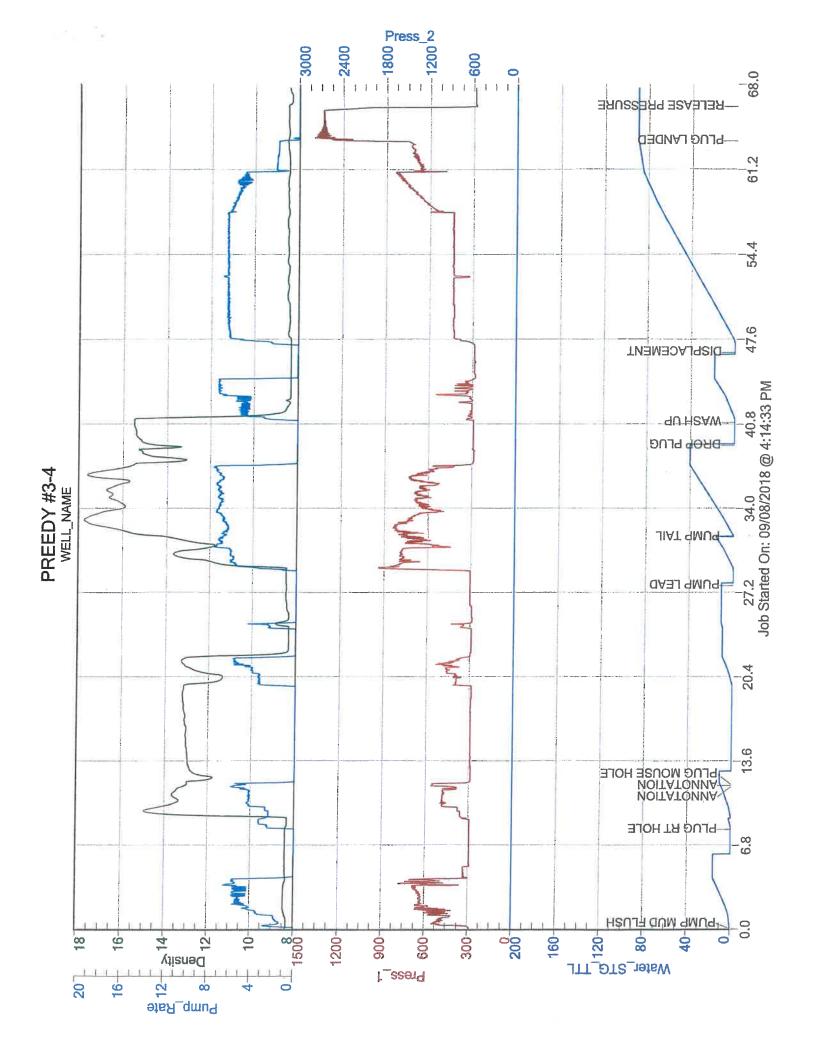




Liberal Yard #1717 - Phone 620-624-2277 - 1700 S. Country Estates Road, Liberal KS 67901

PRESSURE PUMPING Job Log

Custome	ra (Obrien Energy	1		Cement Pump No.	.: 38750	1-19842	Operator TRK No.:	78938 Rul	ben
Address	: 18 Congress St. Suite 207 : Portsmouth NH 03801				Ticket #	1718	5800 L Bulk TRK No.: 19827-19808 Ocar			
City, State, Zip				Job Type	:	Z42 Cen	nent Production			
Service Distric	la				Well Type	2		OIL		
ell Name and No		Preetdy 3-4			Well Location	4,33,29	Count	Meade	State:	K
Туре	of Cmt	Sacks			Additives			Truck Loa	ded On	
60/4	0 POZ	100					19827-1	9808 Ocar	Front	Back
AA2 C	EMENT	170			-60,10%SALT,6% FOAMER,5#GILS				Front	Back
									Front	Back
Lead	/Tail:	Weight #1 Gal.	Cu/Ft/	/sk	Water Re	quirements	CU. FT.	Man I	Hours / Personn	el
Le	ad:	12	2.08	3	11	.89	208	Man Hours:	36	
Ta	ail:	14.8	1.51		6.	.65	256.7	# of Men on Job:	3	
Time		Volume	Pum	os	Pres	sure(PSI)		Description of Open	ation and Materials	
(am/pm)	(BPM)	(BBLS)	Т	С	Tubing	Casing				
12:00								ON LOC		
12:30				_				SAFETY M		
1:00 PM				_				RIG		
4:10 PM	0.3	0.4				1500		PRESSUR		
4:14 PM	4	12		\rightarrow		100			S OF MUD FLU	SH
16:22	3	10		_		50		LUG RAT HOL		
16:23	3	8		\perp		50	P	LUG MOUSE H		
4:40 PM	5.8	18.5				200		PUMP 50S		
16:46	5.7	45.6				200		PUMP 170S		
16:54	4.	7		_		70		DROP PLUG/		
17:01	6.1	10,20		_		120		DISPLACEME	NT 3% KCL	
		30		_		120				
		40		_		120				
		50		_		120				
		60		_		120				
17:12	5.7	70		_		250		CAUGHT C		
17:15	2	85				400		SLOW F	RATE	
		90	_	-		400				
17:19		97.8		_		1000		PLUG LA		
17:21				_					RE/FLOAT HEL	
_			-	\dashv			SH	IUT DOWN/RIG	DOWN -0-PSI	
Size Hole	7 7/8	Depth		63	50'		TYPE			
Size & Wt. Csg.	4 1/2 11.6#	Depth	6331.5	3'	New / Used		Packer		Depth	
tbg.		Depth					Retainer		Depth	
Top Plugs	6295.22'	Туре					Perfs	-	CIBP	
	//	, 0				Basic Represe	ntative:	RUB	EN MARTINEZ	
ustomer Sig	ınature: 🍊	acey 6	مال	2		Basic Signatur	e:	'KL	Mest	
	2.5	0				Date of Service	ə:	9/8/2018	(0	



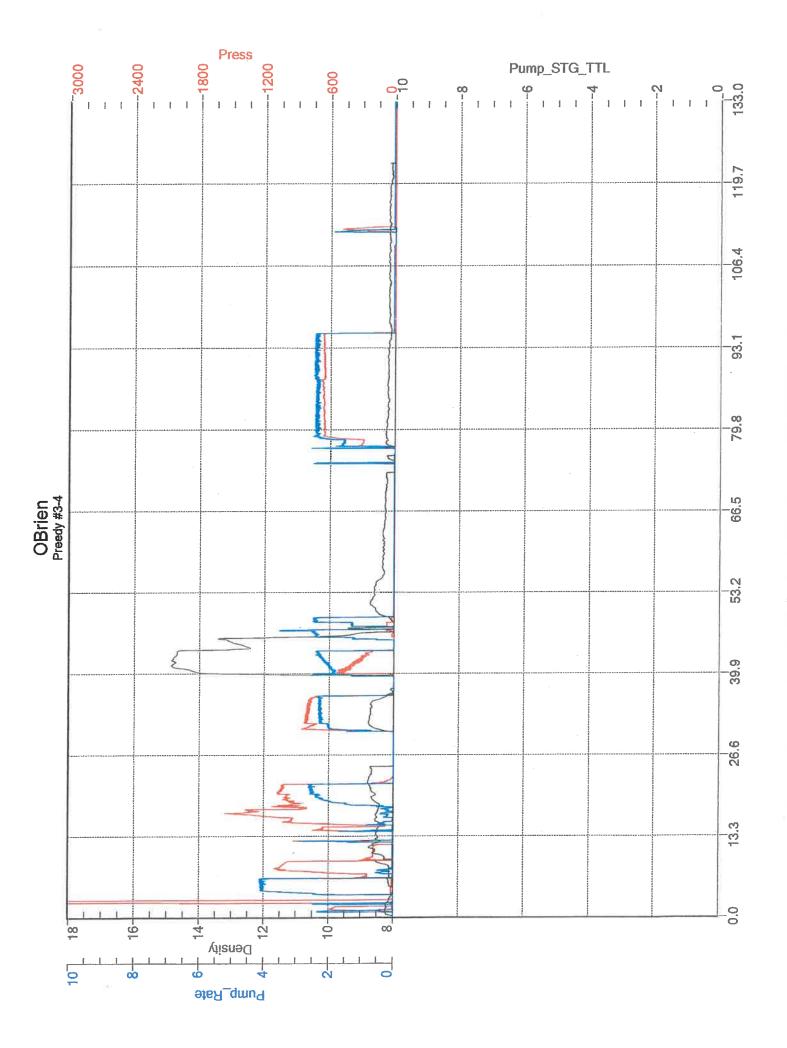


Liberal Yard #1717 - Phone 620-624-2277 - 1700 S. Country Estates Road, Liberal KS 67901

PRESSURE PUMPING

Job Log..

ir-			_	_				7	T		
Customer	7	Obrien Energy	'		Gement Pump No	37712, 19	9919 4Hrs.	Operator TRK No.	Operator TRK No.: 96816		
Address	18 Congres	s St. Suite 207	7 Ticket i		1718	15963 L	Bulk TRK No.	33021, 14284 Jesse			
City, State, Zip	Portsmouth	NH 03801			Job Type	2	Z41 - Sq	ueeze Raise (Raise Cement		
Service District	17	1718 - Liberal, Ks.			Well Type	12		OIL			
leli Name and No.	2	Preeedy 3-4	_		Well Location	4,33,29	9 County	Meade	State:	K	
Туре	of Cmt	Sacks			Additives			Truck Lo	aded On		
Premium	/ Common	75			.8% C-17		33021, 14	1284 Jesse	Front	Back	
									Frant	Beek	
							ļ		Front	Back	
	A COMMISSION IN THE				T				Front	Back	
	/Tail:	Weight #1 Gal.		Ft/sk		quirements	CU. FT.		Hours / Person		
	ad:	15.8	1.	18	. 5	.18	88.5	TT Man Hours:	28.		
Ta	ail:							# of Man on Job:	3		
Time		Volume		mps		sure(PSI)	"	escription of Ope	ration and Materia	ls	
(am/pm)	(BPM)	(BBLS)	T	С	Tubing	Casing	0)11	OÓATION O C	AFFTY MEET	110	
11:30						-	ONL		AFETY MEET	ING	
11:45								RIG UP		-	
12:45 PM						550	l .	RIG TO			
1:03 PM		1				550	LOAD BS. W/ 1BBL 550PSI		1		
1:05 PM	4.5	40			670		PRESSURE TEST TO 3540PSI				
13:06	1.5	10 11.9			670 850		PUMP 3% KCL WATER FOR CIRCULA PUMP 500GALLONS MUD FLUSH				
13:33 1:39 PM		11.9			000		FUN	SHUTE		JI 1	
13:41	2.5	10.5			500			PUMP 50S			
13:46	2.0,	10.5			JUU			SHUTDOV			
13:50	2.5	4			20			DISPLACE W			
14:18	2.0	23.2			20		SHUT		ACUUM 0,75	BPM	
14:20	2.4	10				660	Citot	REVERS			
11120	2.4	20				660					
	2.4	43				660		SHUTDOWN	/ PULL T.B.		
14:45							F	PRESSURE U	P TO 350PSI		
								CLOS	EIN		
								JOB COV	IPLETE		
Size Hole	7 7/8"	Depth					TYPE		Swage		
Size & Wt. Csg.	4 1/2" 1.5#	Depth			New / Used		Packer		Depth		
lbg.	2 3/8" 4.7#	Depth			11011 / 0000				Depth		
Top Plugs	m O/O THE	Туре		\neg				6180' 4Holes			
		1	_	7		Basic Represe			Daniel Beck		
Customer Sig	nature.\/ 5	And let	2 ×	Les		Basic Signature			l. Bar	2	
	mer Signature: Y Konald Xur					Date of Service: 10/22/2018					

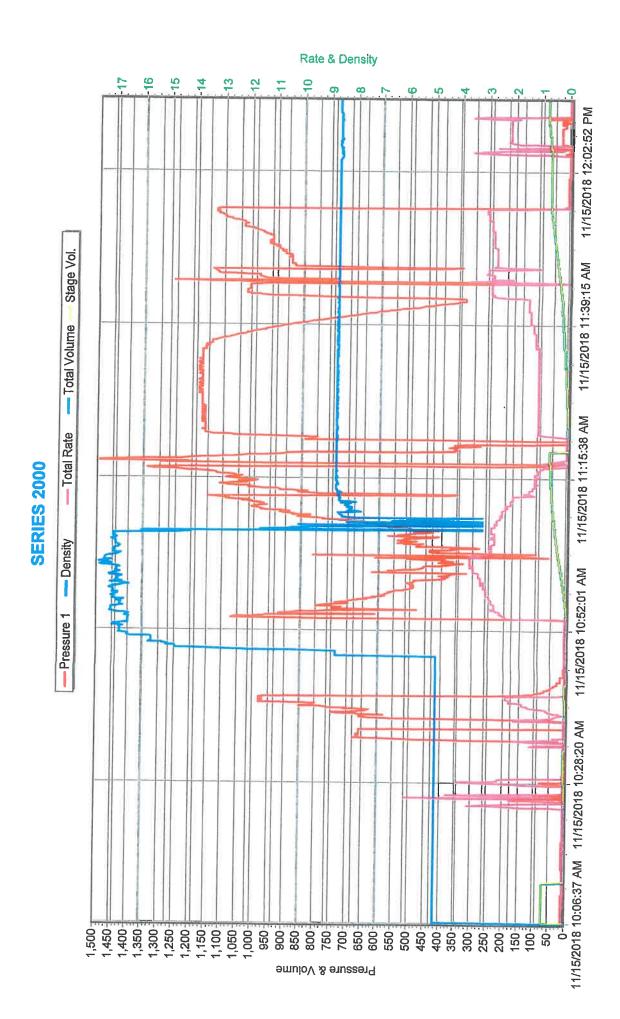




Liberal Yard #1717 - Phone 620-624-2277 - 1700 S. Country Estates Road, Liberal KS 67901

Job Log

					OOD LOE	9						
Customer		Obrien Energy			Cement Pump No		37223-1	9572 3HRS	Operator TRK No	K No.: 21884		
Address	18 Congre	ss St. Suite 20	7		Ticket		1718	-17156L	Bulk TRK No	70897-37725		
City, State, Zip:	Portsmout	h NH 03801			Job Ty	Z41 - Sque		Squeeze Raise	Cement			
Service District:		1718-Liberal Ks		Well Ty	pe:			OIL				
Veil Name and No.:		Preeedy 3-4			Well Location	on:	4,33,2	9 Cour	ty: Meade	State	K	
Туре с	of Cmt	Sacks			Additives	s				aded On		
H		200			1/3#/SK OV	٧B		7089	97-37725	Front	Back	
										Front	Back	
										Front	Back	
Lead/	Tail:	Weight #1 Gal.	Cu	/Ft/sk	Water Re	eq	uirements	CU. FT.	Man	Hours / Person		
Lea	ad:	15.6	1	.18		5.2		236	Man Hours:	24		
Ta	il:							200	# of Men on Job:	3		
Time		Volume	P	umps	Pre	SSL	ure(PSI)		Description of Ope			
(am/pm)	(BPM)	(BBLS)	Т	С	Tubing	T	Casing	1		THE PROPERTY OF THE PARTY OF TH		
6AM									CALLED OU	T FOR JOB		
830AM									ON LOC. SAFE			
9AM									RIG UP			
1033AM	1	1		Х			500		LOAD AN	NULAS		
1037AM	2	5	Х		900				GET INJ	. RATE		
1054	2,6	42	_X_		800	1		PUMP 2	00SX CLASS F	WITH OWB (2 15.6#	
1110AM	3	23.9	Χ		400	+			PUMP DISPI	ACEMENT		
1115AM	1.5		_		1200	+		15.5 BBLS	IN PSI CAME	UP 1400 - SHL	JT DOWN	
1117AM						+			STING OUT O			
1122AM	1	55		Х		+	1000	Reverse or	it tubing - Reve		of cement	
1200PM 1200PM		55				+			SHUTE			
1200PW			_			+			JOB 0	VER		
						+						
				\vdash		╁						
						+						
						$^{+}$						
						t						
						t						
						t						
						T						
												
Size Hole		D "				F						
Size Hole Size & Wt. Csg.		Depth			Man 222 -	1		TYPE	ļ .			
tbg.		Depth	-		New / Used	-		Packer		Depth		
Top Plugs	-	Depth Type		-		-		Retainer Perfs		Depth		
P - 1-30		ı ype	_			D.			1	CIBP		
ustomer Signa	ature:					-	asic Represe			Tyce Davis		
actorner Olyric	ACH C.					1	asic Signature					
						Di	ate of Service	:				



O'Brien Energy Resources, Inc. Preedy No. 3-4 Section 4, T33S, R29W

Meade County, Kansas September 2018

Well Summary

The O'Brien Energy Resources, Preedy No. 3-4 was drilled to a total depth of 6350' in the Spergen without any problems. It offset the Keystone No. 4-4 by approximately 1900' to the East. Formation tops ran variable to this offset. The Heebner came in 7' high. The Toronto and Lansing ran 23' and 11' high. The Cherokee, Atoka and Morrow ran 8', 4' and 2' low. The Mississippian Chester came in 5' high and the primary objective St. Louis, 4' high.

The only hydrocarbon show documented occurred in the St. Louis(6129'-6135') and consists of a Dolomite: Medium to dark mottled brown, microcrystalline, microsucrosic in part, clean, brittle, predominately hard, tight to trace intercrystalline porosity with even brown oil matrix staining, fossiliferous with isolated oil filled moldic vugs, very dull gold hydrocarbon fluorescence in 5% of the samples, excellent streaming cut, oil odor. A 40 Unit gas increase was documented on the hotwire.

4 ½" production casing was run on the Preedy no 3-4 for St. Louis oil production.

Respectfully Submitted,

Peter Debenham

WELL DATA

Operator: O'Brien Energy Resources, Inc., John Forma – Portsmouth, NH

Geologist: Paul Wiemann – Denver, CO

Prospect Geologist: David Ward, Ed Schuett, Denver

Well: Preedy No. 3-4, Angell SE Field

API: 15-119-21425

Location: 1980' FSL & 2305' FEL, Section 4, T33S, R29W, Meade County, Kansas

Southeast of Plains.

Elevation: Ground Level 2668', Kelly Bushing 2681'

Contractor: Duke Drilling Rig No. 7, Type: Double jacknife, double stand, Toolpusher

Galen Roach, Drillers: Craig Merten, Scott Edwards, Steven Green

Company Man: Dana Greathouse, Casey Coats

Spud Date: 8/30/18

Total Depth: 9/8/18, Driller 6350', Logger 6351', Spergen Formation

Casing Program: 36 joints of 8 5/8", J-55, 24Lbs/ft, set at 1528'. Plug down 6:15 pm 9/2/18.

 $4 \frac{1}{2}$ " production casing set to TD.

Mud Program: Winter Mud, engineer Drew Smith, Theran Hegwood. displaced 2610',

Chem. gel/LCM.

Wellsite Consultant: Peter Debenham with mudlogging trailer, Call depth 3000', Box 350,

Drake, CO 80515, 720/220-4860.

Samples: 30' to 5600', 20' to TD.

Electric Logs: Weatherford, engineer Adam Sill, Array Induction, Compensated

Neutron/Density, Microlog, Hi Res.

Status: $4\frac{1}{2}$ " production casing run to TD on 9/9/2018.

WELL CHRONOLOGY

DATE	<u>DEPTH</u>	FOOTAGE	RIG ACTIVITY
8/30 ½" sur	face hole(9:15	PM).	Move and rig up rotary tools. Mix spud mud. Spud in 12
8/31	490'	490'	
9/1	1480'	990'	Drilling surface hole.
	•	_	To 1540' and circulate. Wiper trip and circulate. Trip out at 1528' and cement, did circulate. Plug down 6:15 PM. sure test BOP. Drill plug and cement.
9/3	2550'	1010'	Drill cement and 7 7/8" hole to 2550'.
9/4	3700'	1150'	Displace mud system at 2620'.
9/5	4815'	1115'	
9/6 circula	5545' ate.	730'	To 5012' and circulate and wiper trip 56 stands and
9/7	6330'	785'	
9/8 Elogs.	6350'TD Trip in and cire	20' culate.	To TD and circulate and short trip. Trip out for logs and run
9/9 joints	TD of 4 ½" product	tion casing set	Circulate. Trip out laying down and run and cement 156 at 6327'. Rig down.

BIT RECORD

<u>NO.</u>	MAKE HOURS	TYPE	SIZE	<u>OUT</u>	FOOTAGE	
1	Logic	PDC	12 1/4"	1540'	1540'	26 ½
2	HTC	DP506	7 7/8"	6350'	4810'	85 1/2

Total Rotating Hours: 112
Average: 56.7

Ft/hr

DEVIATION RECORD - degree

200' ½, 500' 1, 900' ¾, 1500' ¾, 2000' ½, 2500' ¾, 3000' ¾, 3500' ¾, 4000' ¾, 4500' ¾, 5000' 1½, 5250' 1½, 5350' 1¼, 5500' 1, 6000' ¾

MUD PROPERTIES

DATE LBS/BBL	<u>DEPTH</u>	WT	<u>VIS</u>	<u>PV</u>	<u>YP</u>	<u>pH</u>	<u>WL</u>	<u>CL</u>	LCM-
8/31	701'	9.6	35	9	18	8.0	nc	4K	4
9/1	1540'	10.0	36	5	21	8.0	nc	26K	5
9/3	2660'	8.7	65	19	19	11.6	5.0	3.7K	2
9/4	3810'	9.2	50	10	46	11.0	44.0	6.5K	2
9/5	4876'	9.3	50	16	18	12.0	16.0	5K	2
9/6	5577'	9.2	60	22	20	11.0	8.4	4.1K	6
9/7	6350'	9.1	58	16	10		7.2		

ELECTRIC LOG FORMATION TOPS- KB Elev. 2681'

			*Keystone No. 4-4	
FORMATION	DEPTH	DATUM	DATUM	POSITION
Casing	1529'			
Heebner	4442'	-1761'	-1768'	+7'
Toronto	4454'	-1773'	-1796'	+23'
Lansing	4586'	-1905'	-1916'	+11'
Marmaton	5223'	-2542'	-2536'	-6'
Cherokee	5395'	-2714'	-2706'	-8'
Atoka	5643'	-2962'	-2958'	-4'
Morrow	5695'	-3014'	-3012'	-2'
Mississippi Chester	5800'	-3119'	-3124'	+5'
Basal Chester	6006'	-3325'	-3316'	-9'
Ste. Genevieve	6038'	-3357'	-3355'	-2'
St. Louis	6129'	-3448'	-3452'	+4'
Spergen	6325'	-3644'	-3643'	-1'
TD	6350'			

 $^*{\rm O'Brien}$ Energy Resources, Keystone No. 4-4, 2305' FSL & 445' FWL, Section 4, 33 S, 29W - app. 1900' to the West, K.B. Elev. 2656'.