KOLAR Document ID: 1415695

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

OPERATOR: License # 32428
Name: Crawford Oil LLC
Address 1: 30842 INDIANAPOLIS RD
Address 2:
City: PAOLA State: KS Zip: 66071 + 4699
Contact Person: Keith Crawford
Phone: (913) 636-1082
CONTRACTOR: License # 32834
Name: JTC Oil, Inc.
Wellsite Geologist: NA
Purchaser:

Designate Type of Completion:
☑ New Well ☐ Re-Entry ☐ Workover
☑ Oil ☐ WSW ☐ SWD
☐ Gas ☐ DH ☐ EOR
☐ OG ☐ GSW
☐ 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 EOR ☐ Conv. to SWD
☐ Plug Back ☐ Liner ☐ Conv. to GSW ☐ Conv. to Producer

☐ Commingled Permit #:
☐ Dual Completion Permit #:
☐ SWD Permit #:
☐ EOR Permit #:
☐ GSW Permit #:

7/9/2018	7/12/2018	7/12/2018
Spud Date or Recompletion Date	Date Reached TD	Completion Date or Recompletion Date

API No.: 15-121-31491-00-00
Spot Description:
S2 - SE - NW - SW Sec. 29 Twp. 17 S. R. 22 ☑ East ☐ West
1500 Feet from ☐ North / ☑ South Line of Section
4290 Feet from ☑ East / ☐ West Line of Section
Footages Calculated from Nearest Outside Section Corner:
☐ NE ☐ NW ☑ SE ☐ SW
GPS Location: Lat: *(e.g. xx.xxxxx)* , Long: *(e.g. -xxx.xxxxx)*
Datum: ☐ NAD27 ☐ NAD83 ☐ WGS84
County: Miami
Lease Name: FEEBECK-THOMPSON Well #: C-4
Field Name:
Producing Formation: Squirrel
Elevation: Ground: 906 Kelly Bushing: 0
Total Vertical Depth: 420 Plug Back Total Depth:
Amount of Surface Pipe Set and Cemented at: 20 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: 1500 ppm Fluid volume: 20 bbls
Dewatering method used: Evaporated
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** ☐ **Drill Stem Tests Received**
☐ **Geologist Report / Mud Logs Received**
☐ **UIC Distribution**
ALT ☐ I ☑ II ☐ III **Approved by:** Karen Ritter **Date:** 12/06/2018

Operator Name: Crawford Oil LLC Lease Name: FEEBECK-THOMPSON Well #: C-4

Sec. 29 Twp. 17 S. R. 22 ☑ East ☐ West County: Miami

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 *(Attach Additional Sheets)*	☐ Yes	☑ No	
Samples Sent to Geological Survey	☐ Yes	☑ No	
Cores Taken	☐ Yes	☑ No	
Electric Log Run	☑ Yes	☐ No	
Geologist Report / Mud Logs	☐ Yes	☑ No	

List All E. Logs Run:

GammaRayNeutronCCL

☐ Log Formation (Top), Depth and Datum ☐ Sample

Name	Top	Datum
Squirrel	363	GL

CASING RECORD ☑ New ☐ 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
Surface	9	6.5	10	20	Portland	3	50/50 POZ
Production	5.875	2.875	8	410	Portland	45	50/50 POZ

ADDITIONAL CEMENTING / SQUEEZE RECORD

Purpose:	Depth Top Bottom	Type of Cement	# Sacks Used	Type and Percent Additives
☐ Perforate ☐ Protect Casing ☐ Plug Back TD ☐ Plug Off Zone	-			
	-			

1. Did you perform a hydraulic fracturing treatment on this well? ☐ Yes ☑ No *(If No, skip questions 2 and 3)*
2. Does the volume of the total base fluid of the hydraulic fracturing treatment exceed 350,000 gallons? ☐ Yes ☐ No *(If No, skip question 3)*
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)*

Date of first Production/Injection or Resumed Production/ Injection:	Producing Method: ☐ Flowing ☐ Pumping ☐ Gas Lift ☐ Other *(Explain)*					
Estimated Production Per 24 Hours	Oil Bbls.	Gas Mcf	Water Bbls.	Gas-Oil Ratio	Gravity	

DISPOSITION OF GAS:	METHOD OF COMPLETION:	PRODUCTION INTERVAL:	
		Top	Bottom
☐ Vented ☐ Sold ☐ Used on Lease *(If vented, Submit ACO-18.)*	☐ Open Hole ☑ Perf. ☐ Dually Comp. *(Submit ACO-5)* ☐ Commingled *(Submit ACO-4)*	363	373

Shots Per Foot	Perforation Top	Perforation Bottom	Bridge Plug Type	Bridge Plug Set At	Acid, Fracture, Shot, Cementing Squeeze Record *(Amount and Kind of Material Used)*
	363	373			

TUBING RECORD: Size: Set At: Packer At:

Mail to: KCC - Conservation Division, 266 N. Main, Suite 220, Wichita, Kansas 67202

Form	ACO1 - Well Completion
Operator	Crawford Oil LLC
Well Name	FEEBECK-THOMPSON C-4
Doc ID	1415695

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	9	6.5	10	20	Portland	3	50/50 POZ
Production	5.875	2.875	8	410	Portland	45	50/50 POZ

DRILL LOG

Operator License# 32428

Operator_____Crawford Oil LLC

Address 30842 Indianapolis Rd.

Contractor JTC Oil, Inc.

Contractor License 32834

T.D. 420 T.D. of Pipe 410

Surf. Pipe Size 6.5" Depth ft. 20 ft.

Kind of Well Production 35y

API # 15-121-31491-00-00

Lease Feebeck

Well # C-4

Spud Date 7/9/18 Cement 7/12/18

Location_____ of_____

_____ feet from _____

_____ feet from _____

County Miami

Thickness	Strata	From	To	Thickness	Strata	From	To
2	soil	0	2	22	lime	181	203
16	clay	2	18	5	coal	203	208
5	shale	18	23	13	lime	208	221
29	lime	23	52	141	shale	221	362
23	shale	52	75	2	oil sand	362	364 v good
6	lime	75	81	3	oil sand	364	367 v good
42	shale	81	123	3	oil sand	367	370 v good
14	lime	123	137	3	oil sand	370	373 v good
9	shale	137	146	1	oil sand	373	374 good
27	lime	146	173	1	lime oil	374	375 ok
8	coal	173	181	4	sand/shale	375	379 ok

7	shale	379	386
14	lime	386	400
20	shale	400	420

QES

PRESSURE PUMPING LLC
PO Box 884, Chanute, KS 66720
620-431-9210 or 800-467-8676

JM - 11124
PO - 17377
JT - 11016

TICKET NUMBER 54056
LOCATION Ottawa, KS
FOREMAN Casey Kennedy

FIELD TICKET & TREATMENT REPORT
CEMENT

DATE	CUSTOMER #	WELL NAME & NUMBER	SECTION	TOWNSHIP	RANGE	COUNTY
7/12/18	2571	Feebeck # C-4	SW 29	17	22	MI

CUSTOMER: Crawford, Keith
MAILING ADDRESS: 30842 Indianapolis Rd
CITY: Paola | STATE: KS | ZIP CODE: 66071

TRUCK #	DRIVER	TRUCK #	DRIVER
729	CasKen	✓	Safety Meeting
467	KeiCar	✓	
548	AlaMad	✓	
675	HarBec	✓	

JOB TYPE: longString | HOLE SIZE: 5 7/8" | HOLE DEPTH: 420' | CASING SIZE & WEIGHT: 2 7/8" EUE
CASING DEPTH: 410' | DRILL PIPE: | TUBING: | OTHER:
SLURRY WEIGHT: | SLURRY VOL: | WATER gal/sk: | CEMENT LEFT in CASING:
DISPLACEMENT: 2.37 bbls | DISPLACEMENT PSI: | MIX PSI: | RATE: 4 bpm

REMARKS: held safety meeting, established circulation, mixed & pumped 100# Gel followed by 5 bbls fresh water, mixed & pumped, 45 sks thixoblend I cement w/ 1/4 #Flosseal per sk, cement to surface, flushed pump clean, pumped 2 1/2" rubber plug to casing TD w/ 2.37 bbls fresh water, pressured to 800 PSI, released pressure to set float valve.

ACCOUNT CODE	QUANITY or UNITS	DESCRIPTION of SERVICES or PRODUCT	UNIT PRICE	TOTAL
CE0450	1	PUMP CHARGE	1500.00	
CE0002	—	MILEAGE	—	
CE0711	1/2 min	ton mileage	330.00	
WE0853	1 hr	80 Vac	100.00	
		trucks	1930.00	
		-40%	772.00	
		Subtotal		1158.00
CC5860	45 sks	Thixoblend I cement	1125.00	
CC5965	100 #	Gel	30.00	
CC6075	11 #	Flosseal	22.00	
CP8176	1	2 1/2" rubber plug	45.00	
		materials	1222.00	
		-40%	488.80	
		Subtotal		733.20
			SALES TAX	58.66
			ESTIMATED TOTAL	1949.86

SCANNED 7-12 AM

8%

(3249.76

Ravin 3737

AUTHORIZTION _____ TITLE _____ DATE _____

I acknowledge that the payment terms, unless specifically amended in writing on the front of the form or in the customer's