

STATE CORPORATION COMMISSION OF KANSAS
OIL & GAS CONSERVATION DIVISION

WELL COMPLETION OR RECOMPLETION FORM
ACO-1 WELL HISTORY

DESCRIPTION OF WELL AND LEASE

Operator: license # 8759
name Mack Energy Co.
address P. O. Box 400
Duncan, OK 73534
City/State/Zip

Operator Contact Person Tim Hanson
Phone (316) 262-2688
KCC

Contractor: license # 5146
name Rains & Williamson Oil Co., Inc.

Wellsite Geologist
Phone
PURCHASER

Designate Type of Completion
 New Well Re-Entry Workover
 Oil SWD Temp Abd
 Gas Inj Delayed Comp.
 Dry Other (Core, Water Supply etc.)

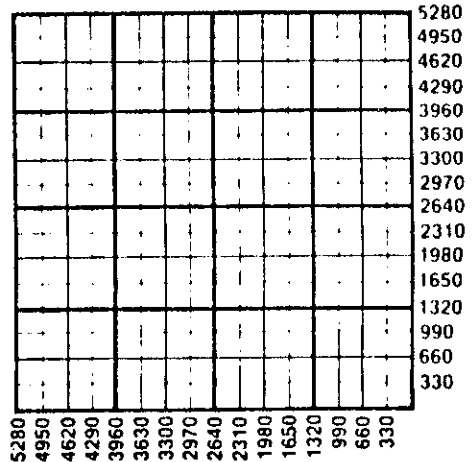
If OWWO: old well info as follows:
Operator
Well Name
Comp. Date Old Total Depth

WELL HISTORY

Drilling Method: Mud Rotary Air Rotary Cable
10-21-85 10-30-85 10-30-85
Spud Date Date Reached TD Completion Date
4500'
Total Depth PBDT
Amount of Surface Pipe Set and Cemented at 495' feet
Multiple Stage Cementing Collar Used? Yes No
If Yes, Show Depth Set feet
If alternate 2 completion, cement circulated
from feet depth to w/ SX cmt

API NO. 15 - 135-22,939-0000
County Ness
NW SE SE Sec 19 Twp 20S Rge 24 X
990 Ft North from Southeast Corner of Section
990 West from Southeast Corner of Section
(Note: locate well in section plat below)
Lease Name Copeland Well# 2
Field Name
Producing Formation
Elevation: Ground 2363 KB 2371

Section Plat



WATER SUPPLY INFORMATION

Source of Water:
Division of Water Resources Permit #
 Groundwater (Well) Ft North From Southeast Corner a
Ft. West From Southeast Corner
Sec Twp Rge East West
 Surface Water (Stream, Pond etc.) Ft North From Southeast Corner a
Ft West From Southeast Corner
Sec Twp Rge East West
 Other (explain)
(purchased from city, R.W.D.#)

Disposition of Produced Water: Disposal Repressuring
Docket #

RECEIVED
STATE CORPORATION COMMISSION

INSTRUCTIONS: This form shall be completed in duplicate and filed with the Kansas Corporation Commission, 200 Colorado Derby Building
Wichita, Kansas 67202, within 90 days after completion or recompletion of any well. Rules 82-3-130 and 82-3-107 apply.

Information on side two of this form will be held confidential for a period of 12 months if requested in writing and conserved with the form. See rule 82-3-10
for confidentiality in excess of 12 months.

One copy of all wireline logs and drillers time log shall be attached with this form. Submit CP-4 form with all plugged wells. Submit CP-111 form with
all temporarily abandoned wells.

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.

Signature [Signature]
Title Exploration Manager Date 11-12-85

Subscribed and sworn to before me this 12th day of November, 1985

Notary Public [Signature]
Date Commission Expires July 22, 1989

K.C.C. OFFICE USE ONLY
F Letter of Confidentiality Attached
C Wireline Log Received
C Drillers Timelog Received
Distribution
 KCC SWD/Rep NGPA
 KGS Plug Other
(Specify)

Operator Name Mack Energy Co. Lease Name Copeland Well# 2 SEC 19 TWP 20S RGE 24

East
 West

WELL LOG

INSTRUCTIONS: Show important tops and base of formations penetrated. Detail all cores. Report all drill stem 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 during test. Attach extra sheet if more space is needed. Attach copy of log.

Drill Stem Tests Taken Yes No
 Samples Sent to Geological Survey Yes No
 Cores Taken Yes No

Formation Description
 Log Sample

DST #1 - Cherokee/Conglomerate. 4397-4446.
 IF (20 min) 24-36, ISI (45 min) 78, FF (15 min) 36-36, FSI (80 Min) 60. IHP 2214 FHP 2191. Rec 5 ft drlg mud w/rainbow show of oil - (centrifuged) 2% H2O, 98% mud, scum of oil. 1st - 1/2" blow, slight decr. 2nd - no blow.

DST #2 - Stradle test - 4446-68'. Times - 15-45-30-90. Initial flow: 40-46. Final flow: 104-104. ISIP - 1313. FSIP - 1302. Rec 90' hvy oil cut mud. 30'/67" oil - 3% mud. 60'/63% oil, 3% wtr, 34% mud. 1st flow opened - 1/2" blow increasing to 5-1/4" blow. 2nd blow - no blow, slowly built to 4-1/2" blow.

Name	Top	Bottom
Top/Anhydrite	1624	(-747)
Base/Anhydrite	1670	(-701)
Heebner	3787	(-1416)
Lansing	3829	(-1458)
Base/Kansas City	4196	(-1825)
Pawnee	4286	(-1915)
Ft. Scott	4346	(-1975)
Cherokee	4377	(-2006)
Mississippi	4445	(-2074)
Miss. Porosity	4458	(-2087)

CASING RECORD <input checked="" 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
Surface	12 1/4"	8.5/8"	23#	495'	60/40 poz	300 sx.	2% gel, 3% cc

shots per foot	specify footage of each interval perforated	Acid, Fracture, Shot, Cement Squeeze Record	
		(amount and kind of material used)	Depth

TUBING RECORD		size	set at	packer at	Liner Run	<input type="checkbox"/> Yes <input type="checkbox"/> No
Date of First Production	Producing method <input type="checkbox"/> flowing <input type="checkbox"/> pumping <input type="checkbox"/> gas lift <input type="checkbox"/> Other (explain)					
Estimated Production 24 Hours	Oil	Gas	Water	Gas-Oil Ratio	Gravity	
	Bbls	MCF	Bbls	CFPB		

Disposition of gas: vented sold used on lease
 METHOD OF COMPLETION: open hole perforation other (specify) _____
 Dually Completed. Completed