

OKLAHOMA CORPORATION COMMISSION
OIL & GAS CONSERVATION DIVISION
P.O. BOX 52000
OKLAHOMA CITY, OK 73152-2000
(Rule 165:10-3-1)

API NUMBER: 017 25108

Approval Date: 11/15/2017

Expiration Date: 05/15/2018

Horizontal Hole Oil & Gas

PERMIT TO DRILL

WELL LOCATION: Sec: 13 Twp: 12N Rge: 6W

County: CANADIAN

SPOT LOCATION: ☐ SW ☐ SE ☐ SW ☐ NW

FEET FROM QUARTER: FROM NORTH FROM WEST

SECTION LINES: 2324 740

Lease Name: ZION 13-24-12-6

Well No: 1HX

Well will be 740 feet from nearest unit or lease boundary.

Operator Name: JONES ENERGY LLC

Telephone: 5123282953

OTC/OCC Number: 21043 0

JONES ENERGY LLC
807 LAS CIMAS PKWY STE 350
AUSTIN, TX 78746-6193

CAREL RESOURCES LLC
15113 SW 74TH STREET
MUSTANG OK 73064

Formation(s) (Permit Valid for Listed Formations Only):

	Name	Depth	Name	Depth
1	MISSISSIPPIAN	8308	6	
2	WOODFORD	8620	7	
3	HUNTON	8750	8	
4			9	
5			10	

Spacing Orders: 668589

Location Exception Orders:

Increased Density Orders:

Pending CD Numbers: 201702654
201702655
201700899
201707423

Special Orders:

Total Depth: 16150

Ground Elevation: 1272

Surface Casing: 1500

Depth to base of Treatable Water-Bearing FM: 950

Under Federal Jurisdiction: No

Fresh Water Supply Well Drilled: No

Surface Water used to Drill: Yes

PIT 1 INFORMATION

Approved Method for disposal of Drilling Fluids:

Type of Pit System: CLOSED Closed System Means Steel Pits

Type of Mud System: WATER BASED

Chlorides Max: 5000 Average: 3000

Is depth to top of ground water greater than 10ft below base of pit? Y

Within 1 mile of municipal water well? N

Wellhead Protection Area? N

Pit is located in a Hydrologically Sensitive Area.

Category of Pit: C

Liner not required for Category: C

Pit Location is ALLUVIAL

Pit Location Formation: ALLUVIUM

D. One time land application -- (REQUIRES PERMIT)
H. SEE MEMO

PERMIT NO: 17-33241

This permit does not address the right of entry or settlement of surface damages.

The duration of this permit is SIX MONTHS, except as otherwise provided by Rule 165: 10-3-1.

Rule 165: 10-3-4 (c) (7) (e) - The Operator shall give 24 Hours notice by telephone to the appropriate District Office of the Conservation Division as to when Surface Casing will be run.

PIT 2 INFORMATION

Type of Pit System: CLOSED Closed System Means Steel Pits

Type of Mud System: OIL BASED

Chlorides Max: 300000 Average: 200000

Is depth to top of ground water greater than 10ft below base of pit? Y

Within 1 mile of municipal water well? N

Wellhead Protection Area? N

Pit is located in a Hydrologically Sensitive Area.

Category of Pit: C

Liner not required for Category: C

Pit Location is ALLUVIAL

Pit Location Formation: ALLUVIUM

HORIZONTAL HOLE 1

Sec 24 Twp 12N Rge 6W County CANADIAN

Spot Location of End Point: S2 SW SW SW

Feet From: SOUTH 1/4 Section Line: 165

Feet From: WEST 1/4 Section Line: 330

Depth of Deviation: 8063

Radius of Turn: 477

Direction: 183

Total Length: 7338

Measured Total Depth: 16150

True Vertical Depth: 8750

End Point Location from Lease,
Unit, or Property Line: 165

Notes:

Category

Description

DEEP SURFACE CASING

10/4/2017 - G71 - APPROVED; NOTIFY OCC FIELD INSPECTOR IMMEDIATELY OF ANY LOSS OF CIRCULATION OR FAILURE TO CIRCULATE CEMENT TO SURFACE ON ANY CONDUCTOR OR SURFACE CASING

HYDRAULIC FRACTURING

10/4/2017 - G71 - OCC 165:10-3-10 REQUIRES:

1) PRIOR TO COMMENCEMENT OF HYDRAULIC FRACTURING OPERATIONS FOR HORIZONTAL WELLS, NOTICE GIVEN FIVE BUSINESS DAYS IN ADVANCE TO OFFSET OPERATORS WITH WELLS COMPLETED IN THE SAME COMMON SOURCE OF SUPPLY WITHIN 1/2 MILE;

2) WITH NOTICE ALSO GIVEN 48 HOURS IN ADVANCE OF HYDRAULIC FRACTURING ALL WELLS TO BOTH THE OCC CENTRAL OFFICE AND LOCAL DISTRICT OFFICES, USING THE "FRAC NOTICE FORM" FOUND AT THE FOLLOWING LINK: OCCEWEB.COM/OG/OGFORMS.HTML; AND,

3) THE CHEMICAL DISCLOSURE OF HYDRAULIC FRACTURING INGREDIENTS FOR ALL WELLS TO BE REPORTED TO FRACFOCUS WITHIN 60 DAYS AFTER THE CONCLUSION THE HYDRAULIC FRACTURING OPERATIONS, USING THE FOLLOWING LINK: FRACFOCUS.ORG

MEMO

10/4/2017 - G71 - PITS 1 & 2 - CLOSED SYSTEM=STEEL PITS PER OPERATOR REQUEST, PIT 2 - OBM RETURNED TO VENDOR, CUTTINGS PERMITTED PER DISTRICT

PENDING CD - 201700899

10/17/2017 - G60 - (640)(HOR) 24-12N-6W
EST MSSP, WDFD, HNTN
COMPL. INT. (MSSP, HNTN) NCT 660' FB
COMPL. INT. (WDFD) NCT 165' FNL/FSL, NCT 330' FEL/FWL
(COEXIST WITH SP. ORDER 140207 MISS, HNTN; SP. ORDER 142863 MCSTR, WDFD)
REC. 5/4/17 (THOMAS)

This permit does not address the right of entry or settlement of surface damages.

017 25108 ZION 13-24-12-6 1HX

The duration of this permit is SIX MONTHS, except as otherwise provided by Rule 165: 10-3-1.

Rule 165: 10-3-4 (c) (7) (e) - The Operator shall give 24 Hours notice by telephone to the appropriate District Office of the Conservation Division as to when Surface Casing will be run.

Category	Description
PENDING CD - 201702654	10/16/2017 - G60 - (I.O.) 13 & 24-12N-6W EST MULTIUNIT HORIZONTAL WELL X201700899 (24-12N-6W) MSSP, WDFD, HNTN X668589 (13-12N-6W) MSSP, WDFD, HNTN (MSSP AND HNTN ARE ASSOCIATED COMMON SOURCES OF SUPPLY TO WDFD) 33.5% 13-12N-6W 66.5% 24-12N-6W NO OP. NAMED REC. 9/19/17 (M. PORTER)
PENDING CD - 201702655	10/16/2017 - G60 - (I.O.) 13 & 24-12N-6W X201700899 (24-12N-6W) MSSP, WDFD, HNTN X668589 (13-12N-6W) MSSP, WDFD, HNTN COMPL. INT. (24-12N-6W) NCT 165' FSL, NCT 0' FNL, NCT 330' FWL COMPL. INT. (13-12N-6W) NCT 0' FSL, NCT 165' FNL, NCT 330' FWL NO OP. NAMED REC. 11/8/17 (M. PORTER)
PENDING CD - 201707423	11/14/2017 - G60 - (E.O.) 13-12N-6W X668589 MSSP, WDFD, HNTN 1 WELL NO OP. NAMED REC. 11/14/17 (JACKSON)
SPACING - 668589	10/16/2017 - G60 - (640)(HOR) 13-12N-6W VAC 141069 MISS, HNTN VAC 140135 MSSLM, HNTN EST MSSP, WDFD, HNTN COMPL. INT. (MSSP, HNTN) NCT 660' FB COMPL. INT. (WDFD) NCT 165' FNL/FSL, NCT 330' FEL/FWL

This permit does not address the right of entry or settlement of surface damages.

The duration of this permit is SIX MONTHS, except as otherwise provided by Rule 165: 10-3-1.

Rule 165: 10-3-4 (c) (7) (e) - The Operator shall give 24 Hours notice by telephone to the appropriate District Office of the Conservation Division as to when Surface Casing will be run.

S.H.L. Sec. 13-12N-6W I.M.
B.H.L. Sec. 24-12N-6W I.M.

3501725108



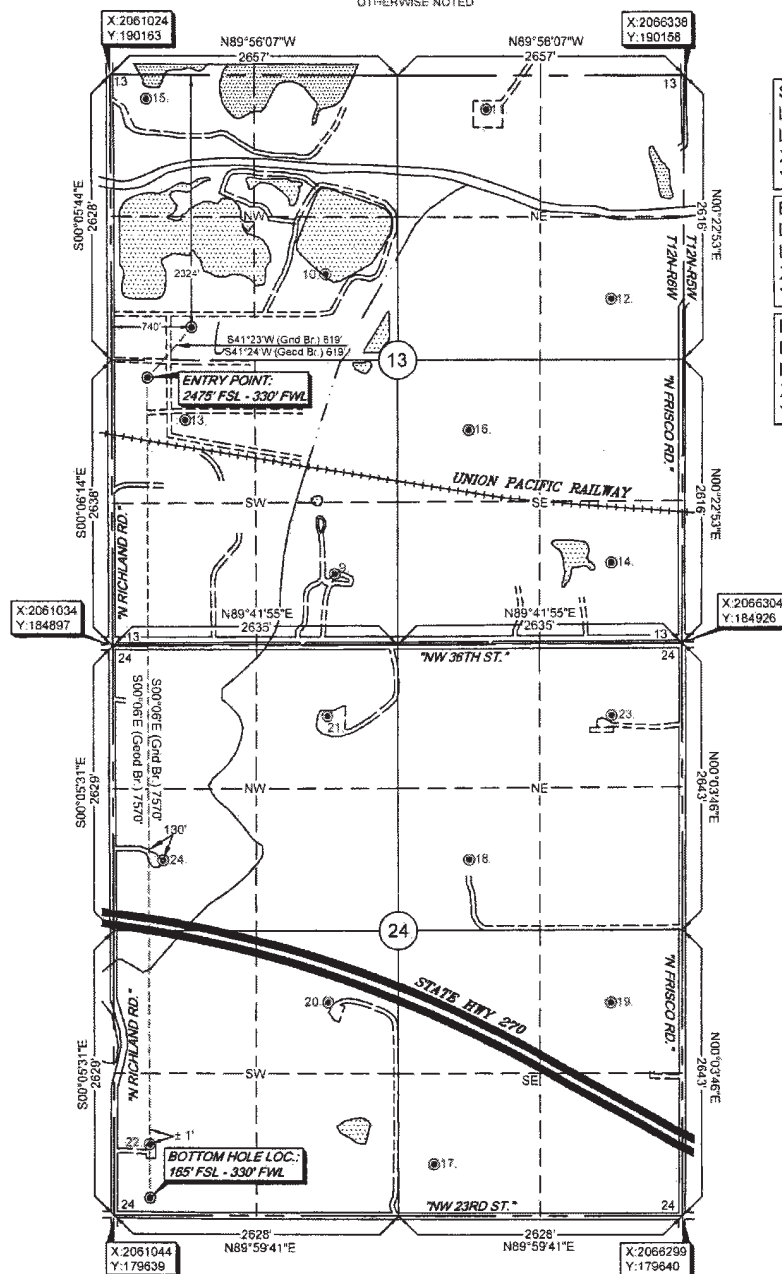
1"= 1320'
GPS DATUM
NAD 27

OK NORTH ZONE

Surface Hole Loc.:
Lat: 35°30'57.03"N
Lon: 97°47'32.85"W
X: 2061769
Y: 187838

Entry Point:
Lat: 35°30'52.45"N
Lon: 97°47'37.81"W
X: 2061359
Y: 187374

Bottom Hole Loc.:
Lat: 35°29'37.59"N
Lon: 97°47'37.83"W
X: 2061373
Y: 179804



Please note that this location was taken from the ground under supervision of a Licensed Professional Land Surveyor, but the accuracy of this survey is not guaranteed. The data collected from Aerialcam Surveying and Mapping promptly if any inconsistency is identified. GPS data is downloaded from NTRIP-GPS.

NOTE: X and Y data shown herein for Quarter Sections may NOT represent a true Boundary Survey surveyed on-the-ground, and further, does not represent a true Boundary Survey surveyed on-the-ground, and further, does not represent a true boundary survey. Quarter Section distances may be assumed from a Government Survey (Peg or corner at proportionate distance from opposite section corners, or occupation thread), and may not have been measured on-the-ground, and further, does not represent a true boundary survey.

Lance G. Mathis
LANCE G. MATHIS

09/15/17

OK LPLS 1664

