API NUMBER: 049 25217

Oil & Gas

Horizontal Hole

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

Approval Date: 08/24/2018 02/24/2019 **Expiration Date** 

PERMIT TO DRILL

County: GARVIN WELL LOCATION: Sec: Twp: 4N Rge: 3W

FEET FROM QUARTER: SPOT LOCATION: NW FROM NORTH WEST NW NE llnw SECTION LINES:

301 867

Lease Name: JESTER Well No: 1-16H Well will be 301 feet from nearest unit or lease boundary.

**RED ROCKS OIL & GAS OPERATING LLC** Operator OTC/OCC Number: Telephone: 4056003065 22649 0 Name:

RED ROCKS OIL & GAS OPERATING LLC 1141 N ROBINSON AVE STE 301

OKLAHOMA CITY. OK 73103-4919 MICHAEL SCOTT MOORE

P.O. BOX 851

LINDSAY OK 73052

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

Name Depth Name Depth WOODFORD 7688 1 6 2 7 3 8 4 9 10 681808 Spacing Orders: Location Exception Orders: Increased Density Orders:

Pending CD Numbers: Special Orders:

Total Depth: 12800 Depth to base of Treatable Water-Bearing FM: 260 Ground Elevation: 958 Surface Casing: 1500

Under Federal Jurisdiction: 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?

located in a Hydrologically Sensitive Area.

Category of Pit: С

Liner not required for Category: C

Pit Location is ALLUVIAL

ALLUVIUM Pit Location Formation:

D. One time land application -- (REQUIRES PERMIT) PERMIT NO: 18-34919

H. SEE MEMO

## 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 16 Twp 4N Rge 3W County GARVIN

Spot Location of End Point: SW SW SE SW
Feet From: SOUTH 1/4 Section Line: 165
Feet From: WEST 1/4 Section Line: 1385

Depth of Deviation: 7248
Radius of Turn: 382
Direction: 178

Total Length: 4951

Measured Total Depth: 12800

True Vertical Depth: 7783

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

Notes:

Category Description

COMPLETION INTERVAL 8/23/2018 - G57 - THE COMPLETION INTERVAL (FIRST PERFORATION TO LAST PERFORATION

OR POINT OF ENTRY TO TERMINUS) FOR THE WOODFORD WILL BE GREATER THAN 165' FNL AND FSL; GREATER THAN 330' FEL AND FWL OF 16-4N-3W PER SPACING ORDER # 681808

PER OPERATOR

DEEP SURFACE CASING 8/20/2018 - 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 8/20/2018 - 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:

WELLS COM LETED IN THE SAME COMMON SOURCE OF SOFT ET 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

INTERMEDIATE CASING 8/20/2018 - G71 - DUE TO THE KNOWN POTENTIAL RISK OF ENCOUNTERING AN OVER-

PRESSURED ZONE IN THE MORROW SERIES IN THIS AREA, THE TECHNICAL MANAGER RECOMMENDS SETTING AN INTERMEDIATE STRING OF CASING IMMEDIATELY ABOVE THE

MORROW SERIES

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.

Category Description

8/20/2018 - G71 - PITS 1 & 2 - CLOSED SYSTEM=STEEL PITS (REQUIRED - WASHITA RIVER), PIT 2 - OBM RETURNED TO VENDOR, CUTTINGS PERMITTED PER DISTRICT MEMO

**SPACING - 681808** 8/23/2018 - G57 - (640)(HOR) 16-4N-3W

VAC 250476 WDFD SE4 EXT 677883 WDFD

POE TO BHL NCT 165' FNL & FSL, NCT 330' FEL & FWL

8/20/2018 - G71 - MIN. 400' PER ORDER 64240 SURFACE CASING

TOPOGRAPHIC LAND SURVEYORS OF OKLAHOMA
13800 WIRELESS WAY, OKLA. CITY, OKLA. 73134 \* LOCAL (405) 843-4847 \* OUT OF STATE (800) 654-3219

Certificate of Authorization No. 1293 LS API:049 25217 GARVIN 🗕 County, Oklahoma 301 FNL-867 FWL Township 4N Range \_3W\_I.M. Section PROPOSED WASHITA RIVER -> LANDING POINT RIVER X 2141734 Y 543618 Corner Falls in River — Calculated CORNER FALLS IN RIVER — CALCULATED X 2146995 Y 543645 Y 543631 SURFACE HOLE 301'FNL-867'FWL NAD-83 34.825483232'N 97.525161220'W WASHITA 11 // 11 11 11 LANDING POINT 2340 165'FNL-1385'FWL NAD - 27 34.49 32.8 N 97.31 23.3 W 34.825782275 N PATH 1) DRILL 11 97.523129839'W X 2143120 Y 543460 NAD-83 34.825857075'N 97.523437102°W 16 X 2141750 Y 540977 X 2147015 Y 541003 GRID NAD-27 OK SOUTH 500 1000 PROPOSED BOTTOM HOLE 165'FSL-1385'FWL NAD-27 NAU-27 34'48'43.8"N 97'31'23.2"W 34.812177533'N 97.523101107'W X 2143152 Y 538509 NAD-83 34.812252698'N 97.523408199'W PROPOSED BOTTOM HOLE X 2144401 2147035 538361 -NOTE-LANDING POINT, BOTTON HOLE AND DRILL PATH INFORMATION PROVIDED Y 538338 The information shown herein is for BY OPERATOR LISTED, NOT SURVEYED construction purposes ONLY. **ELEVATION:** 958' Gr. at Stake (NAVD88) Operator: RED ROCK OIL & GAS OPERATING, LLC 958' Gr. at Stake (NGVD29) Lease Name: JESTER Well No.: 1-16H Topography & Vegetation Location fell in level grass pasture, ±349' NE of abandoned well head Reference Stakes or Alternate Location Stakes Set None Good Drill Site? \_ From North off lease road Best Accessibility to Location \_\_\_ Distance & Direction From the junction of St. Hwy. 74 N-S and St. Hwy. 28 West, North of Maysville, OK, go ±3.0 miles West on St. Hwy. 24, then from Hwy Jct or Town. Lection 16

OBS.

THO

THO continue West ±4 miles on county road, then ±1 mile South, then ±0.25 mile East to lease road, then follow lease road South to the NW/4 of Section 16-T4N-R3W. Date of Drawing: July 2, 2018 DATUM: NAD-27

LAT: 34\*49'31.5"N

LONG: 97\*31'29.5"W Invoice # 296688 Date Staked: \_ June 26, 2018 **CERTIFICATE:** LAT: 34.825408441°N LONG: 97.524853912°W Thomas L. Howell OKLAHOWA DOWN JURVE \_an Oklahoma Licensed Land Surveyor and an authorized agent of Topographic Land STATE PLANE Surveyors of Oklahoma, do hereby certify to the COORDINATES: (US Feet) information shown herein ZONE: OK SOUTH 2142603 543322 Oklahoma Lic. No. \_\_