

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

API NUMBER: 017 25454

Approval Date: 05/08/2019

Expiration Date: 11/08/2020

Horizontal Hole  
Oil & Gas  
Multi Unit

PERMIT TO DRILL

WELL LOCATION: Sec: 31 Twp: 11N Rge: 6W

County: CANADIAN

SPOT LOCATION:

FEET FROM QUARTER: FROM SOUTH FROM EAST

SECTION LINES: 440 2340

Lease Name: BIG BROWN 6-7-10-6

Well No: 1MXH

Well will be 440 feet from nearest unit or lease boundary.

Operator  
Name: ROAN RESOURCES LLC

Telephone: 4058968453

OTC/OCC Number: 24127 0

ROAN RESOURCES LLC  
14701 HERTZ QUAIL SPRINGS PKWY  
OKLAHOMA CITY, OK 73134-2641

JANET GATZ  
18385 SW 89TH  
UNION CITY OK 73090

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

Name	Depth	Name	Depth
1	MISSISSIPPIAN	6	
2		7	
3		8	
4		9	
5		10	

Spacing Orders: 288569

Location Exception Orders:

Increased Density Orders:

Pending CD Numbers: 201902302  
201902303  
201902300  
201902301

Special Orders:

Total Depth: 20458

Ground Elevation: 1279

Surface Casing: 1500

Depth to base of Treatable Water-Bearing FM: 290

Under Federal Jurisdiction: No

Fresh Water Supply Well Drilled: No

Surface Water used to Drill: No

PIT 1 INFORMATION

Type of Pit System: ON SITE

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: 2

Liner not required for Category: 2

Pit Location is BED AQUIFER

Pit Location Formation: DUNCAN

Approved Method for disposal of Drilling Fluids:

A. Evaporation/dewater and backfilling of reserve pit.

B. Solidification of pit contents.

D. One time land application -- (REQUIRES PERMIT)

PERMIT NO: 19-36566

H. SEE MEMO

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: ON SITE

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: 3

Liner required for Category: 3

Pit Location is BED AQUIFER

Pit Location Formation: DUNCAN

## HORIZONTAL HOLE 1

Sec 07 Twp 10N Rge 6W County GRADY

Spot Location of End Point: SE SW SE SW

Feet From: SOUTH 1/4 Section Line: 65

Feet From: WEST 1/4 Section Line: 1900

Depth of Deviation: 9358

Radius of Turn: 573

Direction: 190

Total Length: 10200

Measured Total Depth: 20458

True Vertical Depth: 10258

End Point Location from Lease,  
Unit, or Property Line: 65

### Notes:

#### Category

#### Description

#### DEEP SURFACE CASING

5/7/2019 - G71 - APPROVED; NOTIFY OCC FIELD INSPECTOR IMMEDIATELY FOR ANY LOSS OF CIRCULATION OR FAILURE TO CIRCULATE CEMENT TO SURFACE ON CONDUCTOR OR SURFACE CASING

#### HYDRAULIC FRACTURING

5/7/2019 - 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](http://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](http://FRACFOCUS.ORG)

#### MEMO

5/7/2019 - G71 - PIT 1 & 2 - CONCRETE-LINED PIT PER OPERATOR REQUEST; PIT 2 - OBM TO VENDOR, OBM CUTTINGS PER DISTRICT

#### PENDING CD - 201902300

5/7/2019 - G75 - (I.O.) 6-10N-6W  
XOTHER  
X288569 MSSP  
4 WELLS  
NO OP. NAMED  
REC 5-7-2019 (DENTON)

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.

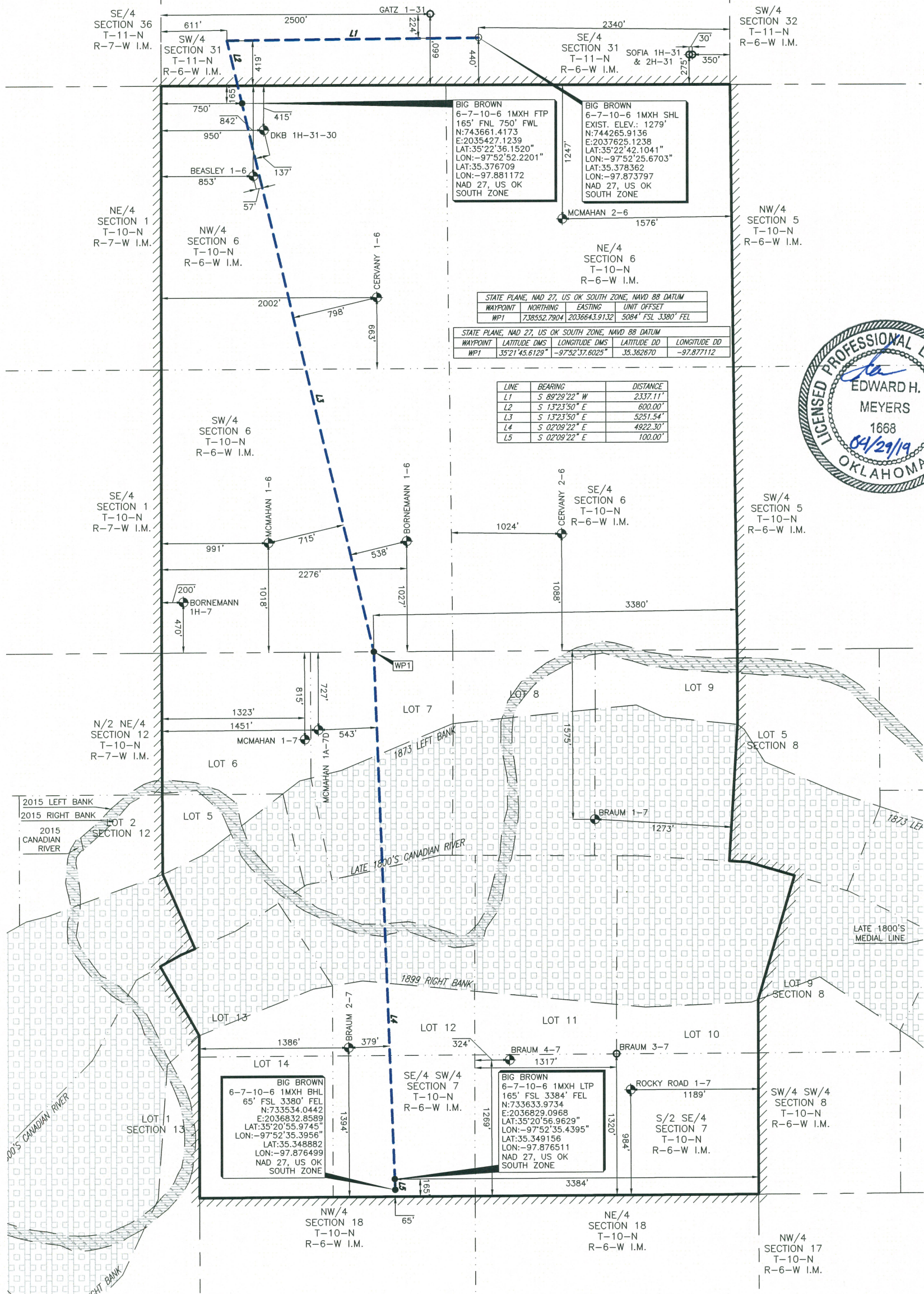
Rule 165: 10-3-4 (c) (7) (e) - The Operator shall give 24 Hours notice by telephone to the appropriate District Office of the Conservation Division as to when Surface Casing will be run.

017 25454 BIG BROWN 6-7-10-6 1MXH

Category	Description
PENDING CD - 201902301	5/7/2019 - G75 - (I.O.) 7-10N-6W XOTHER X288569 MSSP 4 WELLS NO OP. NAMED REC 5-7-2019 (DENTON)
PENDING CD - 201902302	5/7/2019 - G75 - (I.O.) 6 & 7-10N-6W EST MULTIUNIT HORIZONTAL WELL XOTHER X288569 MSSP 50% 6-10N-6W 50% 7-10N-6W NO OP. NAMED REC 5-7-2019 (DENTON)
PENDING CD - 201902303	5/7/2019 - G75 - (I.O.) 6 & 7-10N-6W XOTHER X288569 MSSP X165:10-3-28 (C)(2)(B) WILL BE CLOSER THAN 600' TO EXISTING/PROPOSED WELL COMPL. INT. (6-10N-6W) NCT 150' FNL, NCT 0' FSL, NCT 330' FWL COMPL. INT. (7-10N-6W) NCT 0' FNL, NCT 150' FSL, NCT 330' FWL NO OP. NAMED REC 5-7-2019 (DENTON)
SPACING - 288569	5/7/2019 - G75 - (640) 6 & 7-10N-6W EXT OTHERS EXT 285956 MSSP



API 017-25454



RIVER SURVEY NOTE:  
THE SECTION BOUNDARY SHOWN HEREON REPRESENTS THE CORRELATION BETWEEN THE SECTION CORNERS FOUND OF RECORD AND THE ORIGINAL GLO SURVEYS OF 1873 & 1874 "NORTH BANK OF THE RIVER" AND 1889 "SOUTH BANK OF THE RIVER." DUE TO THE MOVEMENT OF THE CANADIAN RIVER AND THE INSTABILITY OF ITS BANKS THE EXACT BOUNDARY OF THE GOVERNMENT LOTS IS NOT REPRESENTED HEREON. THERE MAY BE RIGHTS TO TITLE THAT ARE SUBSTANTIALLY AFFECTED BY RIVERBANK LAW RELATED TO THE CHANGE IN THE COURSE OF THE RIVER. LEGAL COUNSEL SHOULD BE SOUGHT BEFORE RELYING ON THE INFORMATION SHOWN HEREON RELATING TO THE DIVISION OF ACTUAL PROPERTY RIGHTS. ADDITIONALLY THE ORIGINAL GLO SURVEYS STATED ABOVE NEVER CROSSED SAID RIVER.

- NOTE:
1. COMBINED SCALE FACTOR: 0.999947069
  2. SHL IS APPROXIMATELY 3.67 MILES S 75°33'21" E OF UNION CITY OKLAHOMA.

PERMIT PLAT OF  
ROAN RESOURCES, LLC.  
**BIG BROWN 6-7-10-6 1MXH**  
**440' FSL 2340' FEL OF SECTION 31**  
MINCO FIELD  
SECTION 6, TOWNSHIP 10 NORTH, RANGE 6 WEST I.M. &  
SECTION 7, TOWNSHIP 10 NORTH, RANGE 6 WEST I.M.  
**LEASE LINES**  
**SHL: 440' FNL & 2340' FEL**  
GRADY/CANADIAN COUNTY, OKLAHOMA

FILE: S:\OK\GRADY\PROJECTS\T10N-R06W\DWG\

**LEGEND**

- POINT
- EXISTING WELLHEAD
- PENETRATION POINT
- FIRST TAKE POINT
- LAST TAKE POINT
- BHL
- BOTTOM HOLE LOCATION
- OKLAHOMA CORPORATION COMMISSION

AS-DRILLED LATERAL  
SUBJECT PROPOSED LATERAL  
PROPOSED LATERAL  
LEASE LINE  
SURVEY LINE

ORIGINAL STAKE DATE: 03/28/19  
ADDED LATERAL DATE: 04/26/19  
CORRECTED WELL DATE: 04/29/19

NOTE:

1. BEARINGS, DISTANCES & ACRES ARE GRID, NAD 27 US OK SOUTH ZONE AND ARE OBTAINED BY NORMAL GPS TECHNIQUES.
  2. ELEVATIONS ARE BASED ON NAVD 88 COMPUTED USING GEOID 12B.
  3. THIS SURVEY IS FOR AN OIL & GAS SUB-SURFACE LEASE AND IS NOT A BOUNDARY SURVEY.
  4. LOCATION OF ADJOINING WELLS OUTSIDE LEASE BOUNDARY ARE APPROXIMATED FROM OKLAHOMA CORPORATION COMMISSION DATA.
  5. DOWNHOLE INFORMATION PROVIDED BY THE CLIENT.
  6. THIS SURVEY COMPLIES WITH THE US PUBLIC LAND SURVEY SYSTEM AND MEETS THE OKLAHOMA MINIMUM STANDARDS FOR THE PRACTICE OF LAND SURVEYING AS ADOPTED BY THE OKLAHOMA STATE BOARD OF REGISTRATION FOR PROFESSIONAL ENGINEERS AND LAND SURVEYORS, EFFECTIVE JULY 25, 2013.
  7. THIS IS NOT A BOUNDARY SURVEY.
  8. THIS PERMIT PLAT HAS BEEN PREPARED FROM A SURVEY PLAT ON FILE IN THE OFFICE OF JOHN F. WATSON & COMPANY, MIDLAND TEXAS.
- I, THE UNDERSIGNED, DO HEREBY CERTIFY THAT THE SURVEY INFORMATION FOUND ON THIS PLAT WAS DERIVED FROM ACTUAL FIELD NOTES OF ON-THE-GROUND SURVEYS MADE BY ME OR UNDER MY SUPERVISION AND IS TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

**John F. Watson & Company**  
LAND & DEVELOPMENT SERVICES  
PROFESSIONAL LAND SURVEYORS  
200 N. Lorraine, Ste. 220  
Midland, Texas 79701  
Tel: (432) 520-2400  
Fax: (432) 520-2404



CA#5957 EXPIRATION 6-30-2019  
200 N LORRAINE #220  
MIDLAND, TX 79701  
(432) 520-2400

REV: 1 AFE NO.: - JOB NO.: 19-0054  
FIELD BOOK: SERVER VER: 1 DRAWN BY: LLF

PROFESSIONAL LAND SURVEYOR

04/29/19

SHEET 1 OF 1