

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

API NUMBER: 093 25090

Approval Date: 08/23/2017
Expiration Date: 02/23/2018

Horizontal Hole Oil & Gas

PERMIT TO DRILL

WELL LOCATION: Sec: 30 Twp: 20N Rge: 12W County: MAJOR
SPOT LOCATION: NE NW NE NW FEET FROM QUARTER: FROM NORTH FROM WEST
SECTION LINES: 230 1670

Lease Name: SUNKEY 2012 Well No: 1-19H Well will be 230 feet from nearest unit or lease boundary.
Operator Name: SANDRIDGE EXPLORATION & PRODUCTION LLC Telephone: 4054295610 OTC/OCC Number: 22281 0

SANDRIDGE EXPLORATION & PRODUCTION LLC
123 ROBERT S KERR AVE STE 1702
OKLAHOMA CITY, OK 73102-6406

JESSIE H. HOSKINS & VALERIE HOSKINS
ROUTE 1, BOX 171X
LONGDALE OK 73755

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

	Name	Depth	Name	Depth
1	MISSISSIPPIAN	8400	6	
2			7	
3			8	
4			9	
5			10	

Spacing Orders: No Spacing

Location Exception Orders:

Increased Density Orders:

Pending CD Numbers: 201704431
201704432

Special Orders:

Total Depth: 13817 Ground Elevation: 1482 **Surface Casing: 1500** Depth to base of Treatable Water-Bearing FM: 210

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: 10000 Average: 5000

E. Haul to Commercial pit facility: Sec. 33 Twn. 26N Rng. 15W Cnty. 151 Order No: 627651

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

H. SEE MEMO

Within 1 mile of municipal water well? N

Wellhead Protection Area? N

Pit is not located in a Hydrologically Sensitive Area.

Category of Pit: C

Liner not required for Category: C

Pit Location is NON HSA

Pit Location Formation: BLAINE

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: 500000 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 not located in a Hydrologically Sensitive Area.

Category of Pit: C

Liner not required for Category: C

Pit Location is NON HSA

Pit Location Formation: BLAINE

HORIZONTAL HOLE 1

Sec 19 Twp 20N Rge 12W County MAJOR

Spot Location of End Point: NE NW NW NW

Feet From: NORTH 1/4 Section Line: 150

Feet From: WEST 1/4 Section Line: 430

Depth of Deviation: 7926

Radius of Turn: 900

Direction: 350

Total Length: 4477

Measured Total Depth: 13817

True Vertical Depth: 8400

End Point Location from Lease,
Unit, or Property Line: 150

Notes:

Category

Description

DEEP SURFACE CASING

8/10/2017 - G58 - 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

8/10/2017 - G58 - 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

INTERMEDIATE CASING

8/10/2017 - G58 - 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

MEMO

8/10/2017 - G58 - PIT 1 & 2 - CLOSED SYSTEM=STEEL PITS (REQUIRED - SAND CREEK); PIT 2 - OBM TO VENDOR, OBM CUTTINGS PER DISTRICT

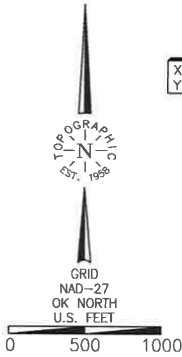
This permit does not address the right of entry or settlement of surface damages.
The duration of this permit is SIX MONTHS, except as otherwise provided by Rule 165: 10-3-1.
Rule 165: 10-3-4 (c) (7) (e) - The Operator shall give 24 Hours notice by telephone to the appropriate District Office of the Conservation Division as to when Surface Casing will be run.

Category	Description
PENDING CD - 201704431	8/23/2017 - G75 - (640)(HOR) 19-20N-12W VAC 272994 UNCCR, MSSLM N2, SW4 EST MSSP, OTHERS POE TO BHL NLT 660' FB (COEXIST SP. ORDER # 272994 UNCCR, MSSLM SE4) REC 8-8-2017 (LEAVITT)
PENDING CD - 201704432	8/23/2017 - G75 - (I.O.) 19-20N-12W X201704431 MSSP COMPL. INT. NCT 150' FSL, NCT 150' FNL, NCT 330' FWL NO OP. NAMED REC 8-8-2017 (LEAVITT)

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.

MAJOR _____ County, Oklahoma
 230'FNL - 1670'FWL Section 30 Township 20N Range 12W I.M.

API 093-25090



-NOTE-
 The information shown herein is for construction purposes ONLY.

Operator: SANDRIDGE EXPLORATION & PRODUCTION, LLC
 Lease Name: SUNKEY 2012
 Topography & Vegetation: Location fell in sloped rough pasture; 198' South of existing fence and powerline
 Good Drill Site? Fair
 Best Accessibility to Location: From North off county road.
 Distance & Direction from Hwy Jct or Town: From Fairview, Ok., go ±5.5 miles South on St. Hwy. 58, then ±3 miles West, to the NW corner of Section 30, T20N - R12W.
 Reference Stakes or Alternate Location: Stakes Set None

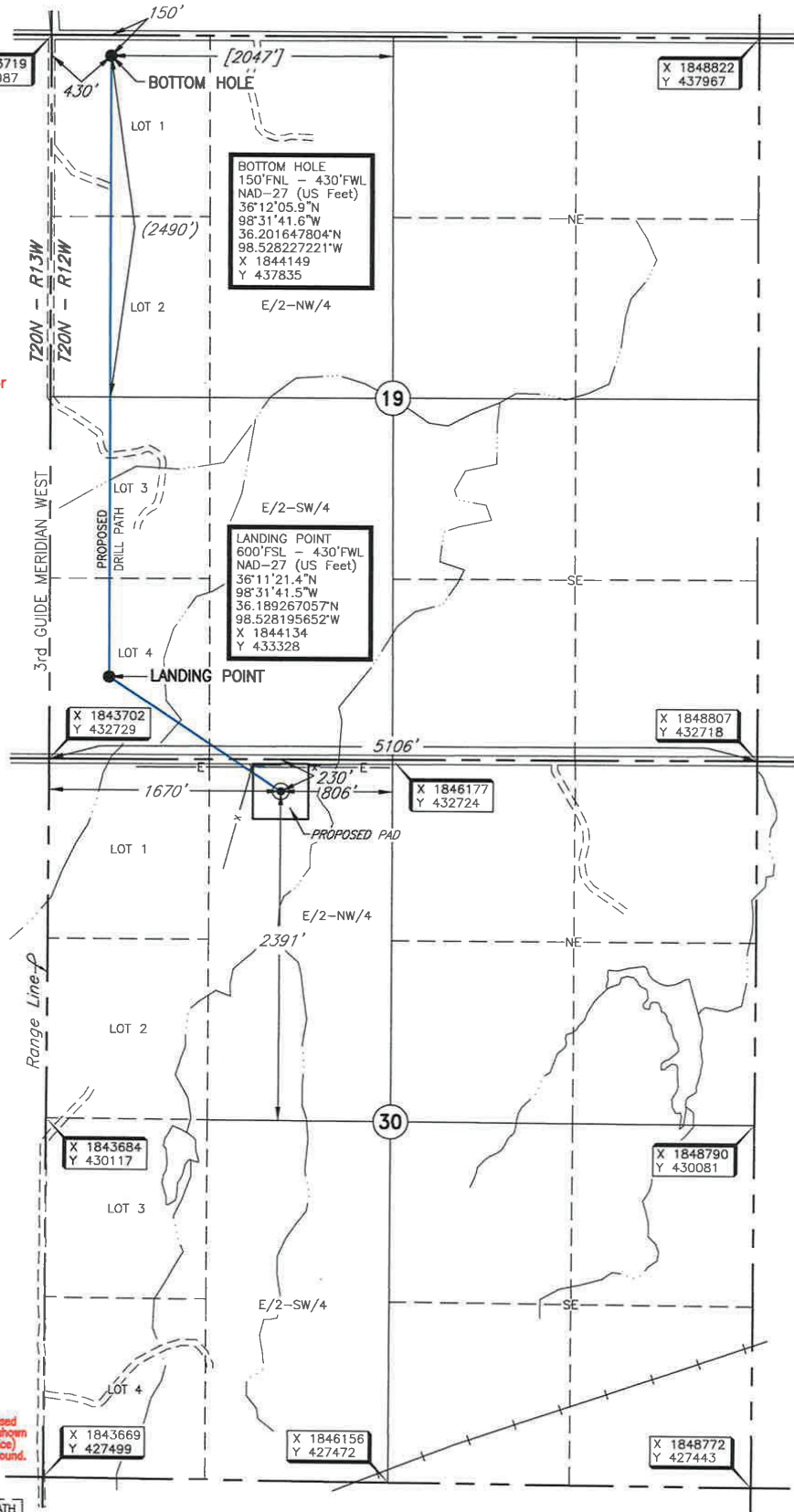
Well No.: 1-19H

ELEVATION:
 1482' Gr. at Stake

Distances shown in (parenthesis) are calculated based upon the Quarter Section being 2640 feet, those shown as (brackets) are based on G.D. (General Land Office) distances and have NOT been measured on the ground.

LANDING POINT, BOTTOM HOLE AND DRILL PATH INFORMATION PROVIDED BY OPERATOR LISTED, NOT SURVEYED.

This information was gathered with a GPS receiver with not horiz./vert. accuracy.
 DATUM: NAD-27
 LAT: 36°11'13.2"N
 LONG: 98°31'26.4"W
 LAT: 36.1869978999°N
 LONG: 98.523991208°W
 STATE PLANE COORDINATES: (US Feet)
 ZONE: OK NORTH
 X: 1845370
 Y: 432495



Date of Drawing: July 3, 2017
 Invoice # 278361 Date Staked: June 29, 2017 RKM

CERTIFICATE:

I, Thomas L. Howell an Oklahoma Licensed Land Surveyor and an authorized agent of Topographic Land Surveyors of Oklahoma, do hereby certify to the information shown herein

Thomas L. Howell
 Oklahoma Lic. No. 1433

