

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

API NUMBER: 051 24079

Approval Date: 11/03/2016  
Expiration Date: 05/03/2017

Horizontal Hole Oil & Gas

PERMIT TO DRILL

WELL LOCATION: Sec: 27 Twp: 5N Rge: 6W

County: GRADY

SPOT LOCATION:  SE  NE  NE  SW

FEET FROM QUARTER: FROM SOUTH FROM WEST

SECTION LINES: 2091 2435

Lease Name: PAULINE

Well No: 4-27X22H

Well will be 2091 feet from nearest unit or lease boundary.

Operator Name: VITRUVIAN II WOODFORD LLC

Telephone: 8324583149

OTC/OCC Number: 23144 0

VITRUVIAN II WOODFORD LLC  
4 WATERWAY SQ PL STE 400  
THE WOODLANDS, TX 77380-2692

CHARLES L. WILSON  
9905 SOUTH MORGAN ROAD  
MUSTANG OK 73064

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

	Name	Depth	Name	Depth
1	SYCAMORE	14648	6	
2	WOODFORD	15033	7	
3	HUNTON	15260	8	
4			9	
5			10	

Spacing Orders: 202704  
408097  
112036  
446322

Location Exception Orders:

Increased Density Orders:

Pending CD Numbers: 201604546  
201604548  
201604607  
201604608

Special Orders:

Total Depth: 24200

Ground Elevation: 1122

**Surface Casing: 2500**

Depth to base of Treatable Water-Bearing FM: 310

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: 2500

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)

PERMIT NO: 16-31753

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: CLOSED Closed System Means Steel Pits

Type of Mud System: OIL BASED

Chlorides Max: 325000 Average: 285000

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 22 Twp 5N Rge 6W County GRADY

Spot Location of End Point: N2 NE NE NW

Feet From: NORTH 1/4 Section Line: 25

Feet From: WEST 1/4 Section Line: 2310

Depth of Deviation: 14711

Radius of Turn: 750

Direction: 359

Total Length: 8311

Measured Total Depth: 24200

True Vertical Depth: 15260

End Point Location from Lease,  
Unit, or Property Line: 25

Notes:

Category

Description

DEEP SURFACE CASING

10/31/2016 - G71 - APPROVED WITH THE FOLLOWING CONDITIONS; 1) NOTIFY OCC FIELD INSPECTOR IMMEDIATELY FOR ANY LOSS OF CIRCULATION OR FAILURE TO CIRCULATE CEMENT TO SURFACE ON CONDUCTOR OR SURFACE CASING; AND, 2) TWO-STAGE CEMENTING TOOL TO BE SET NO DEEPER THAN 100' BELOW BTW

HYDRAULIC FRACTURING

10/31/2016 - G71 - OCC 165:10-3-10 REQUIRES: 1) THE CHEMICAL DISCLOSURE OF HYDRAULIC FRACTURING INGREDIENTS FOR ALL WELLS BE REPORTED TO FRACFOCUS USING THE FOLLOWING LINK [HTTP://FRACFOCUS.ORG/](http://fracfocus.org/) WITH NOTICE GIVEN 48 HOURS IN ADVANCE OF FRACTURING TO THE LOCAL OCC DISTRICT OFFICE; AND, 2) PRIOR TO COMMENCEMENT OF FRACTURING OPERATIONS FOR HORIZONTAL WELLS, NOTICE ALSO GIVEN FIVE BUSINESS DAYS IN ADVANCE TO OFFSET OPERATORS WITH WELLS COMPLETED IN THE SAME COMMON SOURCE OF SUPPLY WITHIN 1/2 MILE.

MEMO

10/31/2016 - G71 - PIT 1 & 2 - CLOSED SYSTEM=STEEL PITS PER OPERATOR REQUEST; PIT 2 - OBM TO VENDOR, OBM CUTTINGS PER DISTRICT

PENDING CD - 201604546

10/31/2016 - G75 - (E.O.) 22 & 27-5N-6W  
EST SIX (6) MULTIUNIT HORIZONTAL WELLS  
X202704 SCMR, HNTN 22-5N-6W  
X408097 WDFD 22-5N-6W  
X112036 SCMR 27-5N-6W  
X446322 WDFD, HNTN 27-5N-6W  
(SCMR, HNTN ASSOCIATED COMMON SOURCES OF SUPPLY TO WDFD)  
66.67% 22-5N-6W  
33.33% 27-5N-6W  
NO OP. NAMED  
REC 10-21-2016 (P. PORTER)

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 - 201604548	10/31/2016 - G75 - (I.O.) 22 & 27-5N-6W X202704 SCMR, HNTN 22-5N-6W X408097 WDFD 22-5N-6W X112036 SCMR 27-5N-6W X446322 WDFD, HNTN 27-5N-6W COMPL. INT. (27-5N-6W) NCT 2450' FSL, NCT 0' FNL, NCT 2200' FWL COMPL. INT. (22-5N-6W) NCT 0' FSL, NCT 150' FNL, NCT 2200' FWL NO OP. NAMED REC 11-1-2016 (THOMAS)
PENDING CD - 201604607	10/31/2016 - G75 - 22-5N-6W X202704 SCMR, HNTN X408097 WDFD 6 WELLS NO OP. NAMED REC 11-1-2016 (THOMAS)
PENDING CD - 201604608	10/31/2016 - G75 - 27-5N-6W X112036 SCMR X446322 WDFD, HNTN 6 WELLS NO OP. NAMED REC 11-1-2016 (THOMAS)
SPACING - 112036	10/31/2016 - G75 - (640) 27-5N-6W EXT 94778 SCMR, OTHER
SPACING - 202704	10/31/2016 - G75 - (640) 22-5N-6W EXT OTHERS EXT 112036 SCMR, OTHER EST HNTN, OTHERS
SPACING - 408097	10/31/2016 - G75 - (640) 22-5N-6W EXT OTHERS EXT 209018 WDFD, OTHER
SPACING - 446322	10/31/2016 - G75 - (640) 27-5N-6W EXT 408097 WDFD, HNTN, OTHERS EXT OTHERS
WATERSHED STRUCTURE	10/31/2016 - G71 - WELL WITHIN 1/2 MILE OF AN OKLAHOMA CONSERVATION COMMISSION WATERSHED STRUCTURE. CONTACT THE LOCAL CONSERVATION DISTRICT OFFICE AT (405) 224-0523 PRIOR TO DRILLING

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.  
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Office of the Conservation Division as to when Surface Casing will be run.