

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

API NUMBER: 027 21467

Approval Date: 09/25/2014
Expiration Date: 03/25/2015

Horizontal Hole Oil & Gas

PERMIT TO DRILL

WELL LOCATION: Sec: 02 Twp: 8N Rge: 1E County: CLEVELAND
SPOT LOCATION: NE NW NW NW FEET FROM QUARTER: FROM SOUTH FROM WEST
SECTION LINES: 2329 339

Lease Name: WOODSTOCK Well No: 34-1H Well will be 339 feet from nearest unit or lease boundary.
Operator Name: ORCA OPERATING COMPANY LLC Telephone: 9185824284 OTC/OCC Number: 22354 0

ORCA OPERATING COMPANY LLC
427 S BOSTON AVE STE 400
TULSA, OK 74103-4114

ORCA OPERATING COMPANY LLC
427 SOUTH BOSTON AVENUE, SUITE 400
TULSA OK 74103

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

Name	Depth	Name	Depth
1 HUNTON	4650	6	
2		7	
3		8	
4		9	
5		10	

Spacing Orders: 617349

Location Exception Orders:

Increased Density Orders:

Pending CD Numbers:

Special Orders:

Total Depth: 10500

Ground Elevation: 976

Surface Casing: 850

Depth to base of Treatable Water-Bearing FM: 550

Under Federal Jurisdiction: No

Fresh Water Supply Well Drilled: No

Surface Water used to Drill: Yes

PIT 1 INFORMATION

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

Approved Method for disposal of Drilling Fluids:

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

PERMIT NO: 14-28290

H. CLOSED SYSTEM=STEEL PITS PER OPERATOR REQUEST

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.

HORIZONTAL HOLE 1

Sec 34 Twp 9N Rge 1E County CLEVELAND

Spot Location of End Point: C SW NW

Feet From: SOUTH 1/4 Section Line: 660

Feet From: WEST 1/4 Section Line: 660

Depth of Deviation: 2993

Radius of Turn: 3

Direction: 305

Total Length: 3461

Measured Total Depth: 10500

True Vertical Depth: 5670

End Point Location from Lease,
Unit, or Property Line: 660

Notes:

Category	Description
DEEP SURFACE CASING	9/2/2014 - G71 - APPROVED CONTINGENT ON NOTIFYING OCC FIELD STAFF IMMEDIATELY OF ANY LOSS OF CIRCULATION OR FAILURE TO CIRCULATE CEMENT TO SURFACE ON ANY CONDUCTOR OR SURFACE CASING
POE	9/25/2014 - G72 - WILL BE AT A LEGAL LOCATION IN SECTION 34 PER OPERATOR.
SPACING - 617349	9/25/2014 - G72 - (600 HORZ)(IRR) S2 & NW & W2 NE & SE NE 34-09N-01E REFORM 583992 HNTN