

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

API NUMBER: 007 25629

Approval Date: 07/31/2013  
Expiration Date: 01/31/2014

Horizontal Hole Oil & Gas

PERMIT TO DRILL

WELL LOCATION: Sec: 03 Twp: 1N Rge: 20ECM County: BEAVER

SPOT LOCATION:  NE  SE  SW  SE FEET FROM QUARTER: FROM SOUTH FROM EAST  
SECTION LINES: 525 1520

Lease Name: COWAN A Well No: 1-10H Well will be 525 feet from nearest unit or lease boundary.

Operator Name: UNIT PETROLEUM COMPANY Telephone: 9184937700; 9184937 OTC/OCC Number: 16711 0

UNIT PETROLEUM COMPANY  
P.O. Box 702500  
TULSA, OK 74170-2500

RICHARD LEE COWAN  
ROUTE 1, BOX 123  
BALCO OK 73931-

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

	Name	Depth	Name	Depth
1	DOUGLAS	5019	6	
2	LANSING-KANSAS CITY	5120	7	
3	MARMATON	5995	8	
4			9	
5			10	

Spacing Orders: No Spacing

Location Exception Orders:

Increased Density Orders:

Pending CD Numbers: 201304690  
201304688

Special Orders:

Total Depth: 10932 Ground Elevation: 2851

Surface Casing: 1995

Depth to base of Treatable Water-Bearing FM: 40

Under Federal Jurisdiction: No

Fresh Water Supply Well Drilled: Yes

Surface Water used to Drill: No

PIT 1 INFORMATION

Type of Pit System: ON SITE

Type of Mud System: WATER BASED

Chlorides Max: 20000 Average: 5000

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: 1B

Liner required for Category: 1B

Pit Location is BED AQUIFER

Pit Location Formation: OGALLALA

Approved Method for disposal of Drilling Fluids:

A. Evaporation/dewater and backfilling of reserve pit.

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

H. SEE MEMO

PERMIT NO: 13-23830

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 10 Twp 1N Rge 20E County BEAVER

Spot Location of End Point: E2 SE SW SE

Feet From: SOUTH 1/4 Section Line: 330

Feet From: EAST 1/4 Section Line: 1520

Depth of Deviation: 5500

Radius of Turn: 740

Direction: 360

Total Length: 4500

Measured Total Depth: 10932

True Vertical Depth: 6186

End Point Location from Lease,  
Unit, or Property Line: 330

Notes:

Category	Description
DEEP SURFACE CASING	7/23/2013 - 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
MEMO	7/23/2013 - G71 - SOIL COMPACTED PIT, NOTIFY DISTRICT PRIOR TO TESTING SOIL PIT LINER, 20 MIL LINED GEOMEMBRANE TRENCH PIT FOR SOIL FARMING
PENDING CD - 201304688	7/24/2013 - G30 - (640 HOR) 10-1N-20ECM EXT 608948 DGLS, LGKC, MRMN POE TO BHL: NLT 660' FB REC 7/30/13 (MCKEOWN)
PENDING CD - 201304690	7/24/2013 - G30 - 10-1N-20ECM X201304688 DGLS, LGKC, MRMN SHL NCT 150 FSL, NCT 660 FEL 3-1N-20ECM COMP. INT. NCT 330 FNL, NCT 330 FSL, NCT 660 FEL 10-1N-20ECM NO OP. NAMED REC 7/30/13 (MCKEOWN)

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