ATS-10-779

Secretary's Potash

OCD-ARTESIA

Form 3160-3
(April 2004)

FORM APPROVED
OMB No. 1004-0137
Expires March 31, 2007

EA10-1159

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

5. Lease Serial No.
SH: K-4562; BH: NM036379

6. If Indian, Allotee or Tribe Name

1a. Type of work: ☑ DRILL ☐ REENTER

7 If Unit or CA Agreement, Name and No.

1b. Type of Well: ☑ Oil Well ☐ Gas Well ☐ Other ☑ Single Zone ☐ Multiple Zone

8. Lease Name and Well No. 300635
Cotton Draw Unit 134H

2. Name of Operator
Devon Energy Production Company, LP 6137

9. API Well No.
30-015-38293

3a. Address **20 North Broadway, Oklahoma City, Oklahoma 73102-8260**

3b. Phone No. *(include area code)*
405-228-8699

10. Field and Pool, or Exploratory PADDOCK, 96641
BONE SPRING

4. Location of Well *(Report location clearly and in accordance with any State requirements.*)*

At surface **SW/4 SW/4 200 FSL & 330 FWL** **PP: 200 FSL & 330 FWL**

At proposed prod. zone **NW/4 SW/4 2600 FSL & 330 FWL** **SEC 35 T24S R31E**

11. Sec., T. R. M. or Blk. and Survey or Area
SEC 2 T25S R31E

14. Distance in miles and direction from nearest town or post office*
Approximately

12. County or Parish
Eddy County

13. State
NM

15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any) **40'**

16. No. of acres in lease
639.92 Acres

17. Spacing Unit dedicated to this well
240 Acres

18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. **See attached map.**

19. Proposed Depth
16,354' MD 8980' TVD

20. BLM/BIA Bond No. on file
CO-1104

21. Elevations (Show whether DF, KDB, RT, GL, etc.)
3418 ' GL

22. Approximate date work will start*

23. Estimated duration
45 days

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No.1, shall be attached to this form:

1. Well plat certified by a registered surveyor.
2. A Drilling Plan.
3. A Surface Use Plan (if the location is on National Forest System Lands, the SUPO shall be filed with the appropriate Forest Service Office).
4. Bond to cover the operations unless covered by an existing bond on file (see Item 20 above).
5. Operator certification
6. Such other site specific information and/or plans as may be required by the authorized officer.

25. ~~Signature~~ Judy A. Barnett | Name *(Printed/Typed)* **Judy A. Barnett** | Date **08/30/2010**

Title **Regulatory Analyst**

Approved by *(Signature)* /s/ Linda S. C. Rundell | Name *(Printed/Typed)* /s/ Linda S. C. Rundell | Date **OCT 27 2010**

Title **STATE DIRECTOR** | Office **NM STATE OFFICE**

Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.
Conditions of approval, if any, are attached.

APPROVAL FOR TWO YEARS

Title 18 U.S.C. ~~Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.~~

~~* OCD CONDITION OF APPROVAL of Drilling: Intent to drill ONLY — CANNOT produce until the Non-Standard Location has been approved by OCD Santa Fe office.~~

NSL#6280

CARLSBAD CONTROLLED WATER BASIN

RECEIVED
NOV 05 2010
NMOCD ARTESIA

Kz 11/23/10

APPROVAL SUBJECT TO GENERAL REQUIREMENTS AND SPECIAL STIPULATIONS ATTACHED

SEE ATTACHED FOR CONDITIONS OF APPROVAL

District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Avenue, Artesia, NM 88210
District III
1000 Rio Brazos Rd., Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy, Minerals & Natural Resources Department
OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, NM 87505

Form C-102
Revised October 15,2009
Submit one copy to appropriate
District Office

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

[1] API Number	[2] Pool Code	[3] Pool Name
30-015-38293	96641	PADUCA; BONE SPRING

[4] Property Code	[5] Property Name	[6] Well Number
300635	COTTON DRAW UNIT	134H

[7] OGRID No.	[8] Operator Name	[9] Elevation
6137	DEVON ENERGY PRODUCTION COMPANY, L.P.	3418.5

[10] Surface Location

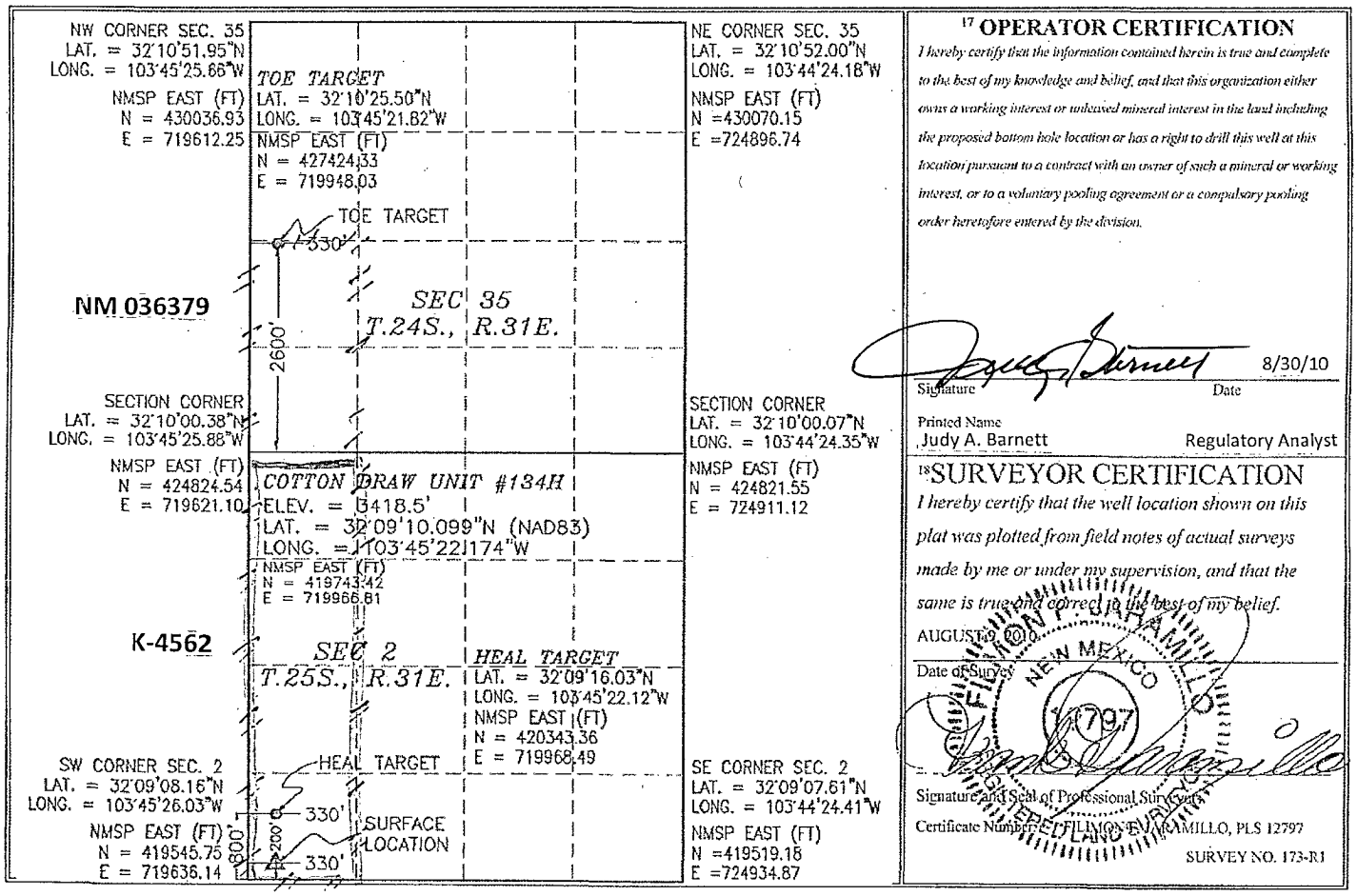
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
M	2	25 S	31 E		200	SOUTH	330	WEST	EDDY

[11] Bottom Hole Location If Different From Surface

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
L	35	24 S	31 E		2600	SOUTH	330	WEST	EDDY

[12] Dedicated Acres	[13] Joint or Infill	[14] Consolidation Code	[15] Order No.
240			NSL-6280

No allowable will be assigned to this completion until all interests have been consolidated or a non-standard unit has been approved by the division.



[17] OPERATOR CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.

Signature — Date: 8/30/10

Printed Name: Judy A. Barnett — Regulatory Analyst

[18] SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

AUGUST 9, 2010

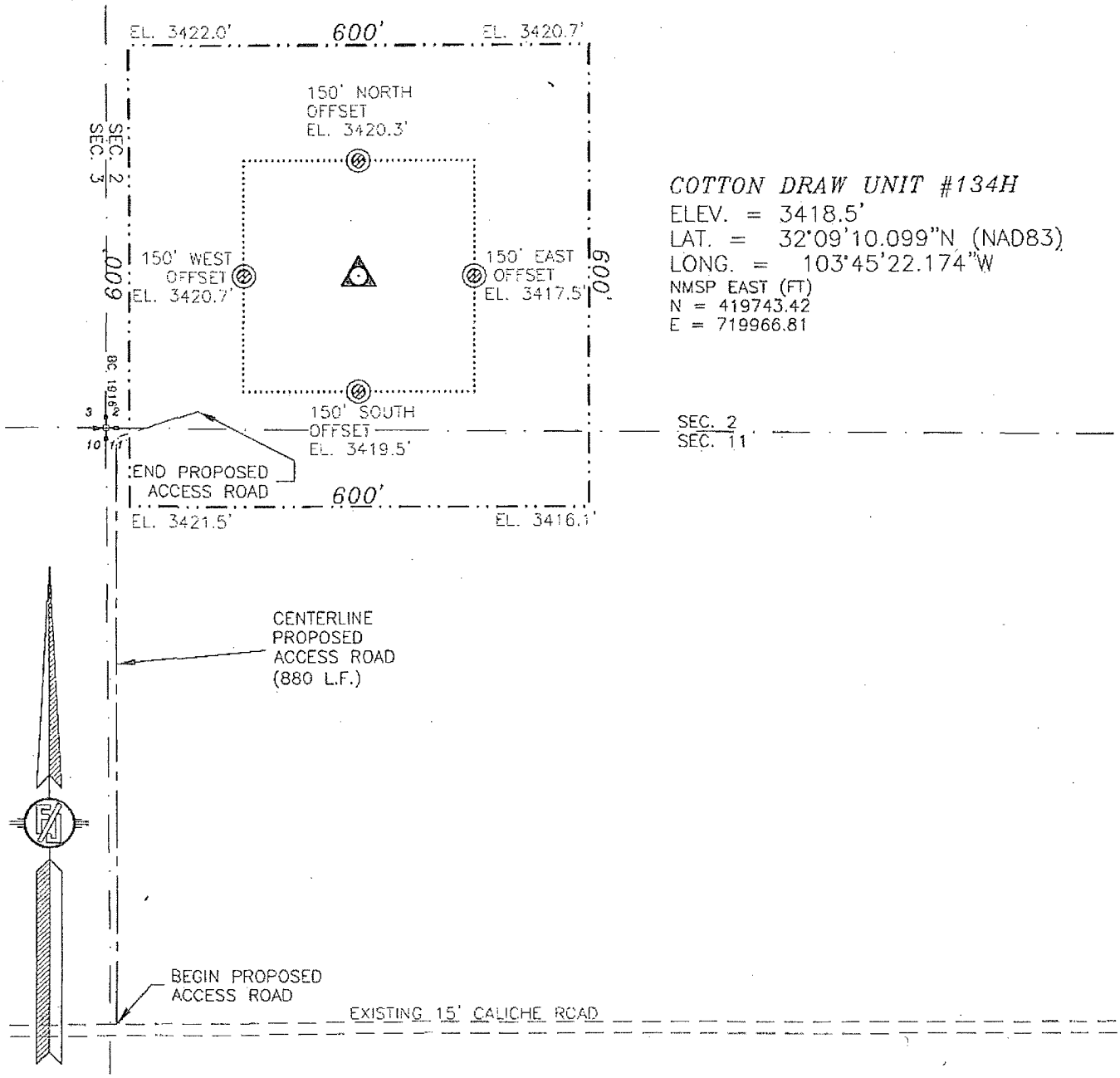
Date of Survey

Signature and Seal of Professional Surveyor

Certificate Number: FILIMON F. JARAMILLO, PLS 12797

SURVEY NO. 173-R1

SECTION 2, TOWNSHIP 25 SOUTH, RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO



COTTON DRAW UNIT #134H
ELEV. = 3418.5'
LAT. = 32°09'10.099"N (NAD83)
LONG. = 103°45'22.174"W
NMSP EAST (FT)
N = 419743.42
E = 719966.81

DIRECTIONS TO LOCATION
FROM CR.# 786 (BUCK JACKSON) (CALICHE) AND CR.# 791 (BUCK THORN) (CALICHE) GO SOUTH ON CR. 791 3.1 MILES TURN LEFT AND GO EAST 0.9 MILES TO A PROPOSED ROAD SURVEY AND FOLLOW FLAGS NORTH 880' TO A PROPOSED PAD FOR THIS LOCATION.

DEVON ENERGY PRODUCTION COMPANY, L.P.
COTTON DRAW UNIT #134H
LOCATED 200 FT. FROM THE SOUTH LINE AND 330 FT. FROM THE WEST LINE OF SECTION 2, TOWNSHIP 25 SOUTH, RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO

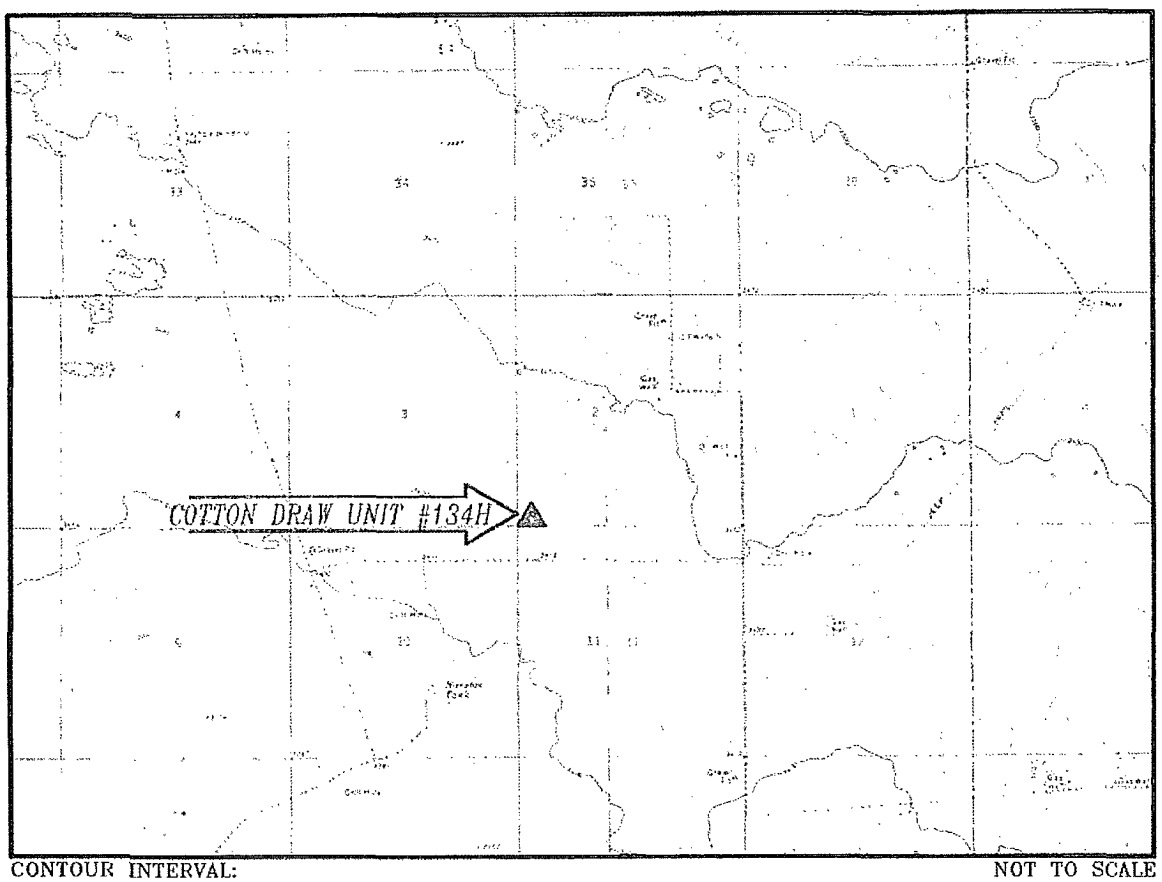
AUGUST 9, 2010

SURVEY NO. 173 - R1

MADRON SURVEYING, INC. 301 SOUTH CANAL (575) 887-5630 *CARLSBAD, NEW MEXICO*

SECTION 2, TOWNSHIP 25 SOUTH, RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO

LOCATION VERIFICATION MAP



CONTOUR INTERVAL:
BIG SINKS
PADUCA BREAKS NW

NOT TO SCALE

DIRECTIONS TO LOCATION
FROM CR.# 786 (BUCK JACKSON) (CALICHE) AND CR.# 791 (BUCK THORN) (CALICHE) GO SOUTH ON CR. 791 3.1 MILES TURN LEFT AND GO EAST 0.9 MILES TO A PROPOSED ROAD SURVEY AND FOLLOW FLAGS NORTH 880' TO A PROPOSED PAD FOR THIS LOCATION.

SEC. 2 TWP. 25-S RGE. 31-E
SURVEY N.M.P.M.
COUNTY EDDY STATE NEW MEXICO
DESCRIPTION 200' FSL & 330' FWL
ELEVATION 3418.5'
OPERATOR DEVON ENERGY PRODUCTION COMPANY, LP
LEASE COTTON DRAW

DEVON ENERGY PRODUCTION COMPANY, L.P.
COTTON DRAW UNIT #134H
LOCATED 200 FT. FROM THE SOUTH LINE
AND 330 FT. FROM THE WEST LINE OF
SECTION 2, TOWNSHIP 25 SOUTH,
RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO

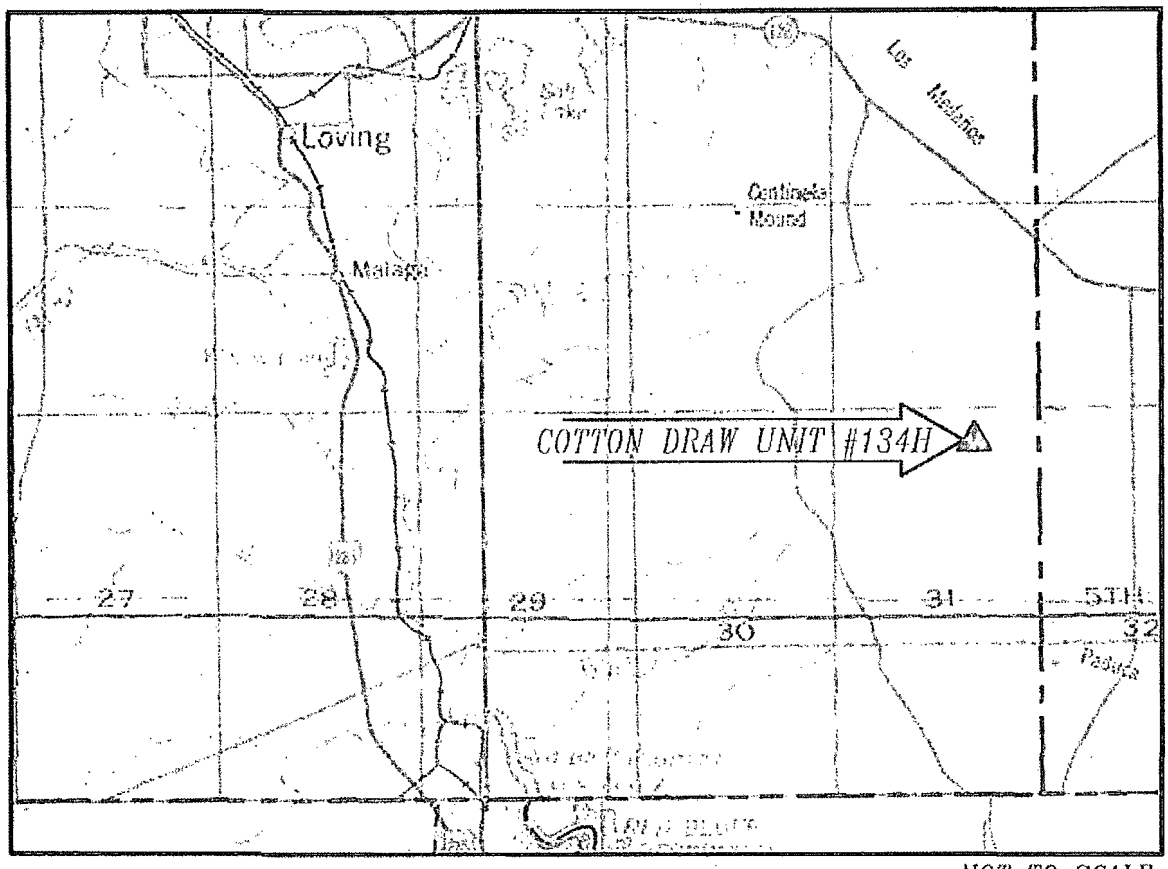
AUGUST 9, 2010

SURVEY NO. 173 - R1

MADRON SURVEYING, INC. 301 SOUTH CANAL (575) 887-5630 CARLSBAD, NEW MEXICO

SECTION 2, TOWNSHIP 25 SOUTH, RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO

VICINITY MAP



NOT TO SCALE

DIRECTIONS TO LOCATION
FROM CR.# 786 (BUCK JACKSON) (CALICHE) AND CR.# 791 (BUCK THORN) (CALICHE) GO SOUTH ON CR. 791 3.1 MILES TURN LEFT AND GO EAST 0.9 MILES TO A PROPOSED ROAD SURVEY AND FOLLOW FLAGS NORTH 880' TO A PROPOSED PAD FOR THIS LOCATION.

SEC. 2 *TWP.* 25-S *RGE.* 31-E
SURVEY N.M.P.M.
COUNTY EDDY *STATE* NEW MEXICO
DESCRIPTION 200' FSL & 330' FWL
ELEVATION 3418.5'
OPERATOR DEVON ENERGY PRODUCTION COMPANY, LP
LEASE COTTON DRAW

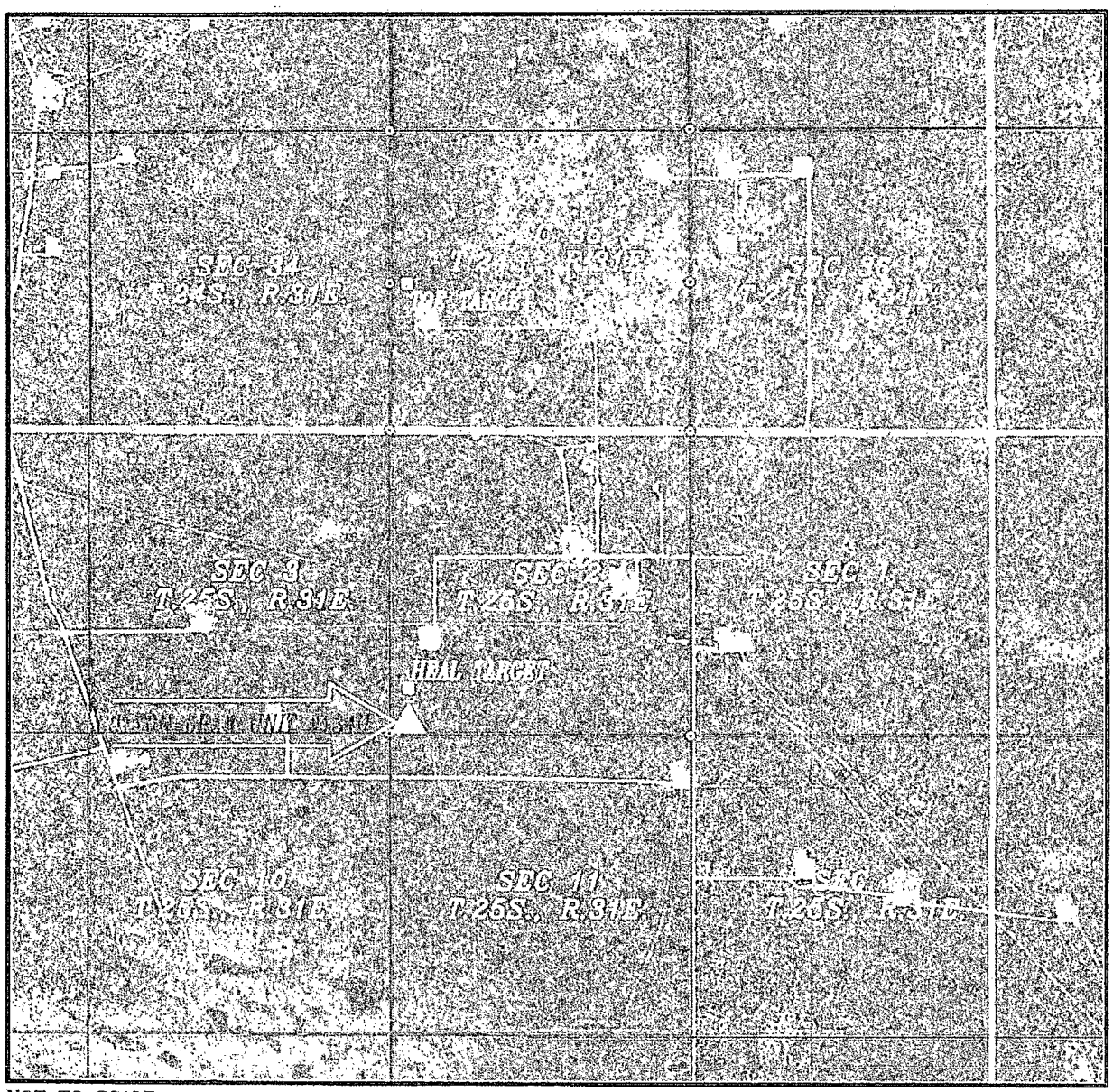
DEVON ENERGY PRODUCTION COMPANY, L.P.
COTTON DRAW UNIT #134H
LOCATED 200 FT. FROM THE SOUTH LINE AND 330 FT. FROM THE WEST LINE OF SECTION 2, TOWNSHIP 25 SOUTH, RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO

AUGUST 9, 2010

SURVEY NO. 173 - R1
MADRON SURVEYING, INC. 301 SOUTH CANAL (575) 887-5830 *CARLSBAD, NEW MEXICO*

SECTION 2, TOWNSHIP 25 SOUTH, RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO

AERIAL PHOTO



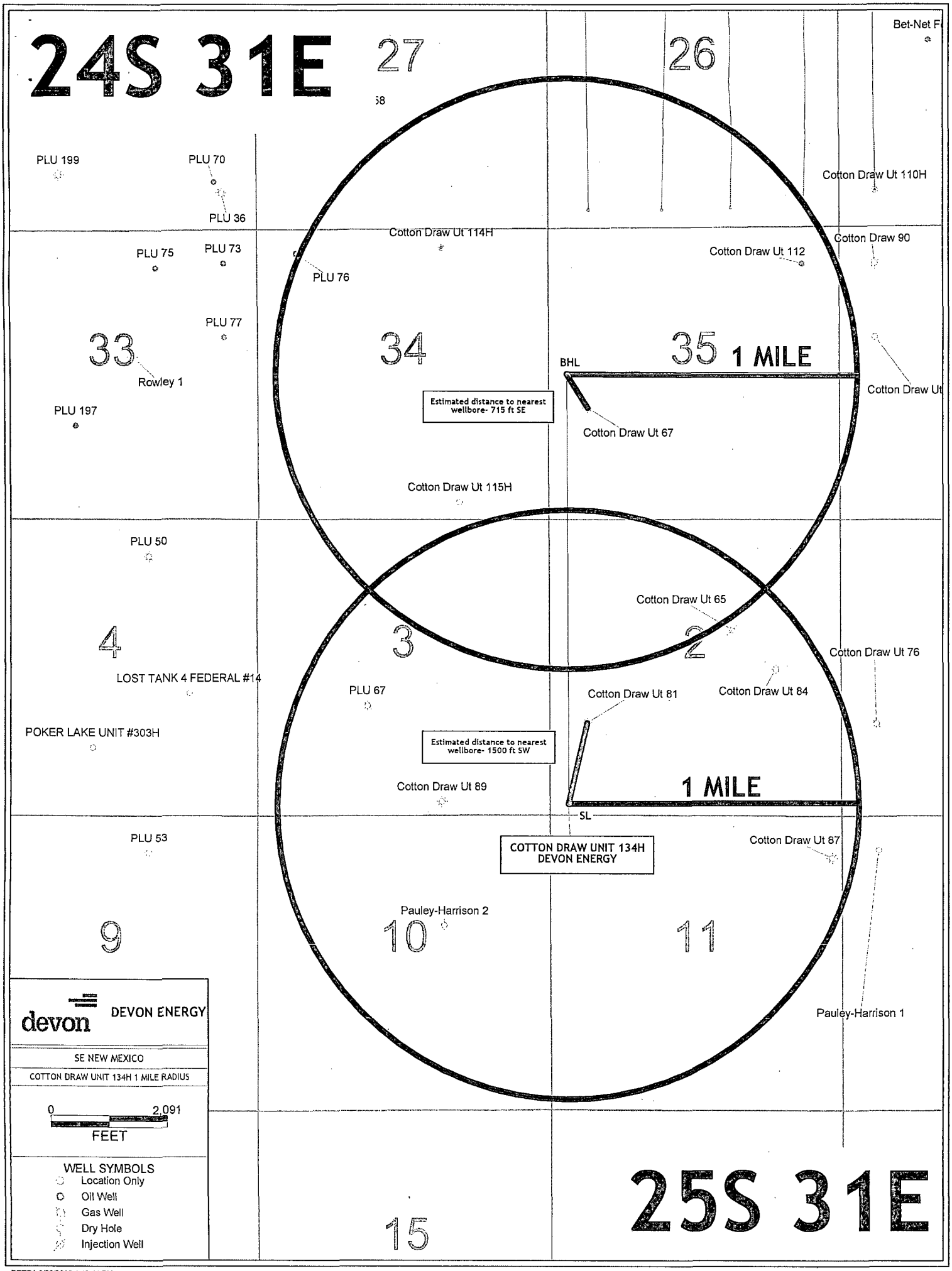
NOT TO SCALE
AERIAL PHOTO:
GOOGLE EARTH
USDA – AUG, 2009

DEVON ENERGY PRODUCTION COMPANY, L.P.
COTTON DRAW UNIT #134H
LOCATED 200 FT. FROM THE SOUTH LINE
AND 330 FT. FROM THE WEST LINE OF
SECTION 2, TOWNSHIP 25 SOUTH,
RANGE 31 EAST, N.M.P.M.
EDDY COUNTY, STATE OF NEW MEXICO

AUGUST 9, 2010

SURVEY NO. 173 – R1

MADRON SURVEYING, INC. 301 SOUTH CANAL (575) 887-5630 CARLSBAD, NEW MEXICO



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DRILLING PROGRAM

Devon Energy Production Company, LP

Cotton Draw Unit 134H

Surface Location: 200' FSL & 330' FWL, Unit M, Sec 2 T25S R31E, Eddy, NM

Bottom Hole Location: 2600' FSL & 330' FWL, Unit L, Sec 35 T24S R31E, Eddy, NM

1. Geologic Name of Surface Formation

a. Quaternary

2. Estimated Tops of Geological Markers & Depths of Anticipated Fresh Water, Oil or Gas:

a.	Rustler	574'	
b.	Salado	944'	
c.	Base Salt	4064'	
d.	Delaware	7289'	
e.	Bell Canyon	4314'	
f.	Cherry Canyon	5319'	Oil
g.	Brushy Canyon	6599'	Oil
h.	Bone Spring	8564'	Oil
i.	Total Depth	16,354'	

No other formations are expected to yield oil, gas or fresh water in measurable volumes. The surface fresh water sands will be protected by setting 17 ½"casing at 650' and circulating cement back to surface. Fresh water sands will be protected by setting 9 5/8" casing at 4250' and circulating cement to surface. The Bone Spring intervals will be isolated by setting 5 ½" casing to total depth and circulating cement above the base of the 9 5/8" casing.

Casing Program:

Hole Size	Hole Interval	OD Csg	Casing Interval	Weight	Collar	Grade
17 ½"	0 - 650'	13 3/8""	0'-650'	48#	ST&C	H-40
12 ¼"	650-4250'	9 5/8"	0'-4250'	40#	LT&C	J-55
8 ¾"	4250-8000'	5 ½"	0-8000'	17#	LT&C	HCP-110
8 ¾"	8000-16,354'	5 ½"	8000-16,354'	17#	BTC	HCP-110

Design Parameter Factors:

Casing Size	Collapse Design Factor	Burst Design Factor	Tension Design Factor
13 3/8"	2.53	5.69	10.32
9 5/8" 40#	1.15	1.77	2.83
5 ½" 17#	2.00	2.50	1.70
5 ½" 17#	1.80	2.20	4.00

Cement Program:

13 3/8"

Lead: w/ 400 sx Cl C + 2% bwoc Calcium Chloride + 0.25#/sx CF + 4% bwoc Bentonite + 81.4% FW, 13.50 ppg Yld: 1.75 cf/sx. **Tail:** w/250 sx Cl C + 2% bwoc Calcium Chloride + 0.125 #/sx CF + 56.3% FW. 14.8 ppg, Yld: 1.35 cf/sx. **TOC @** surface.

9 5/8" Intermediate

Lead: w/ 1100 sx (35:65) Poz (Fly Ash): Cl C + 5% bwow Sodium Chloride + 0.125#/sx CF + 6% bwoc Bentonite + 107.8% FW, 12.5 ppg, Yld: 2.04 cf/sx. **TOC @** surface. **Tail**: w/300 sx 60:40 POZ (Fly Ash): Cl C + 5% bwow Sodium Chloride +0.125#/sx CF + 4% bwoc Sodium Metasilicate + 4% bwoc MPA-5 + 64.7% FW, 13.8 ppg Yld: 1.37 cf/sx.

5 ½" Production

1st Stage

Lead: w/ 500 sx (35:65) Poz (Fly Ash): Cl H + 5% bwow Sodium Chloride + 0.3% bwoc CD-32 + 0.5% bwoc FL-25 + 2% bwoc Bentonite + 0.6% bwoc Sodium Metasilicate + 0.5% bwoc FL-52A + 102.5% FW, 12.5 ppg, Yld: 2.01 cf/sx. **Tail:** w/2000 sx (50:50) Poz Fly Ash Cl H+1% bwow Sodium Chloride + 0.2% bwoc R-3 + 0.125#/sx CF + 0.5% bwoc BA-10A + 4% bwoc MPA-5 58.3% FW, 14.2 ppg, Yld: 1.28 cf/sx

2nd Stage . DV TOOL @ 6000'

Lead: w/300 sx Cl C + 1% bwow Calcium Chloride + 0.125#/sx CF + 157.8% FW, 11.4 ppg. Yld: 2.89 cf/sx.

Tail: w/ 200 sx (60:40) Poz (Fly Ash) Cl C + 1% bwow Sodium Chloride + 0.2% bwoc R-3 + 0.125#/sx CF + 0.5% bwoc BA-10A + 4% bwoc MPA-5 + 63.2% FW, 13.8 ppg. Yld: 1.37 cf/sx.

TOC @ ~~11,000~~ 3750' per operator

10/20/10

See COA

The above cement volumes could be revised pending the caliper measurement from the open hole logs. The top of cement is designed to reach approximately 500' above the 9 5/8" casing shoe. All casing is new and API approved.

Pressure Control EquipmentBOP DESIGN: See COA

The BOP system used to drill the intermediate hole will consist of a 13-5/8" 5M Double Ram and Annular preventer. The BOP system will be tested as per BLM Onshore Oil and Gas Order No. 2 as a 3M system prior to drilling out the surface casing shoe.

The BOP system used to drill the production hole will consist of a 13-5/8" 5M Double Ram and Annular preventer. The BOP system will be tested as per BLM Onshore Oil and Gas Order No. 2 as a 5M system prior to drilling out the intermediate casing shoe.

The pipe rams will be operated and checked each 24 hour period and each time the drill pipe is out of the hole. These tests will be logged in the daily driller's log. A 2" kill line and 3" choke line will be incorporated into the drilling spool below the ram BOP. In addition to the rams and annular preventer, additional BOP accessories include a kelly cock, floor safety valve, choke lines, and choke manifold rated at 5,000 psi WP.

Flex line should be described in this section.

Proposed Mud Circulation System

Depth	Mud Wt.	Visc	Fluid Loss	Type System
0' – 650'	8.4-9.0	30-34	NC	FW
650'– 4250'	9.8-10.0	28-32	NC	Brine
4250'–8200'	8.6-9.0	28-32	NC-12	FW
8200-16,354'	8.6-9.0	28-60	NC-12	60/40 OBM

See COA

The necessary mud products for weight addition and fluid loss control will be on location at all times.

3. Auxiliary Well Control and Monitoring Equipment:
   a. A Kelly cock will be in the drill string at all times.
   b. A full opening drill pipe stabbing valve having the appropriate connections will be on the rig floor at all times
   c. Hydrogen Sulfide detection equipment will be in operation after drilling out the 20" casing shoe until the 5 1/2" casing is cemented. Breathing equipment will be on location upon drilling the 20" shoe until total depth is reached.

4. **Logging, Coring, and Testing Program:** See COA
   a. Drill stem tests will be based on geological sample shows.
   b. If a drill stem test is anticipated; a procedure, equipment to be used and safety measures will be provided via sundry notice to the BLM.

c. The open hole electrical logging program will be: See COA
   i. Total Depth to Intermediate Casing Dual Laterolog-Micro Laterolog with SP and Gamma Ray. Compensated Neutron – Z Density log with Gamma Ray and Caliper.
   ii. Total Depth to Surface Compensated Neutron with Gamma Ray
   iii. No coring program is planned
   iv. Additional testing will be initiated subsequent to setting the 5 ½" production casing. Specific intervals will be targeted based on log evaluation, geological sample shows and drill stem tests.

5. Potential Hazards:

a. No abnormal pressures or temperatures are expected. There is no known presence of H2S in this area. If H2S is encountered the operator will comply with the provisions of Onshore Oil and Gas Order No. 6 No lost circulation is expected to occur. All personnel will be familiar with all aspects of safe operation of equipment being used to drill this well. Estimated BHP 5500 psi and Estimated BHT 170°. No H2S is anticipated to be encountered.

6. Anticipated Starting Date and Duration of Operations:

a. Road and location construction will begin after the BLM has approved the APD. Anticipated spud date will be as soon after BLM approval and as soon as a rig will be available. Move in operations and drilling is expected to take 32 days. If production casing is run then an additional 30 days will be needed to complete well and construct surface facilities and/or lay flow lines in order to place well on production.

Weatherford®

Drilling Services

Proposal

---

devon

COTTON DRAW #134H

EDDY COUNTY, NM

WELL FILE: **PLAN 1**

AUGUST 23, 2010

Weatherford International, Ltd.
P.O. Box 61028
Midland, TX 79711 USA
+1.432.561.8892 Main
+1.432.561.8895 Fax
www.weatherford.com

devon

Cotton Draw #134H
Eddy Co., New Mexico

Weatherford

SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec	Target
1	0.00	0.00	359.86	0.00	0.00	0.00	0.00	0.00	0.00	
2	8263.80	0.00	359.86	8263.80	0.00	0.00	0.00	0.00	0.00	
3	9388.80	90.00	359.86	8980.00	716.20	-1.75	8.00	359.86	716.20	
4	16353.54	90.00	359.86	8980.00	7680.91	-18.78	0.00	0.00	7680.93	Pbhl

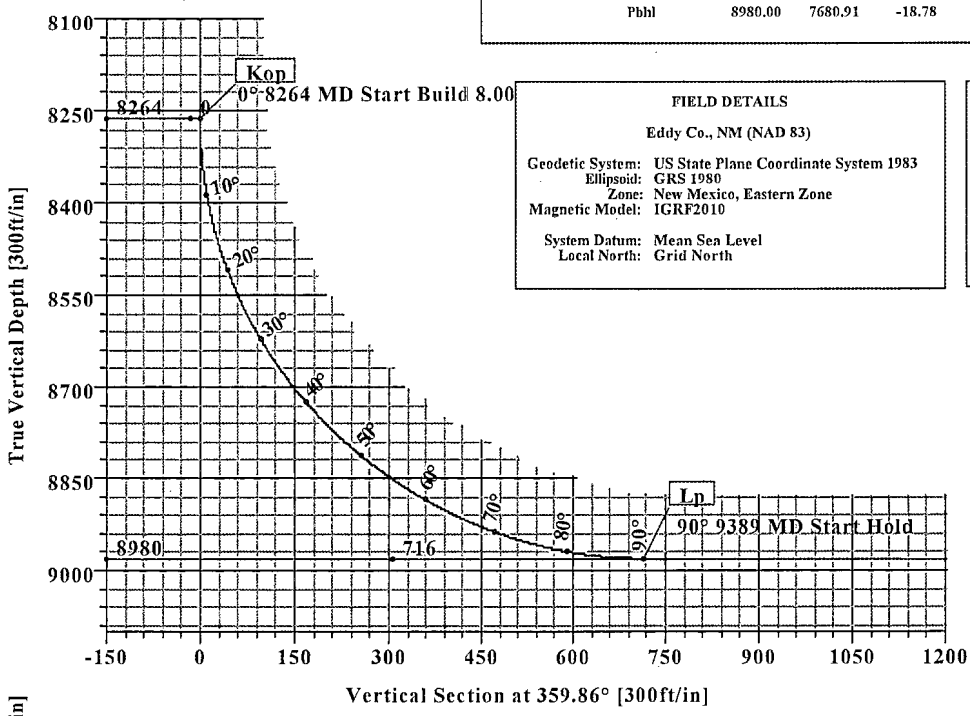
WELL DETAILS

Name	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Slot
Cotton Draw #134H	0.00	0.00	419743.42	719966.81	32°09'09.484N	103°45'22.098W	N/A

TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Northing	Easting	Shape
Pbhl	8980.00	7680.91	-18.78	427424.33	719948.03	Point

KB ELEV: 3443.5
GL ELEV: 3418.5



FIELD DETAILS

Eddy Co., NM (NAD 83)

Geodetic System: US State Plane Coordinate System 1983
Ellipsoid: GRS 1980
Zone: New Mexico, Eastern Zone
Magnetic Model: IGRF2010

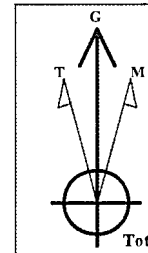
System Datum: Mean Sea Level
Local North: Grid North

SITE DETAILS

Cotton Draw #134H

Site Centre Northing: 419743.42
Easting: 719966.81

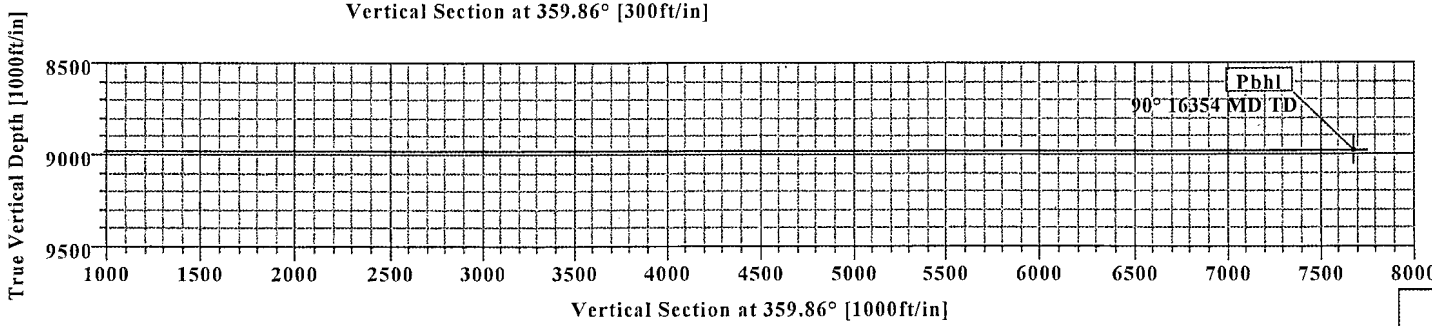
Ground Level: 3418.50
Positional Uncertainty: 0.00
Convergence: 0.31

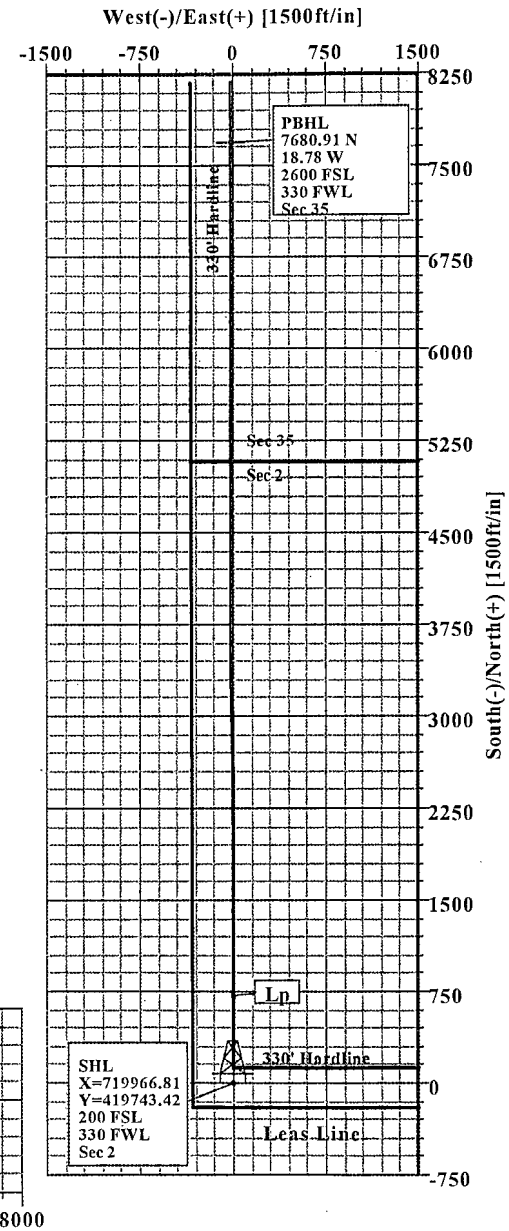


Azimuths to Grid North
True North: -0.31°
Magnetic North: 7.45°

Magnetic Field
Strength: 48651nT
Dip Angle: 60.11°
Date: 9/21/2010
Model: IGRF2010

Total Correction to Grid North: 7.45°





Plan: Plan #1 (Cotton Draw #134H/1)

Created By: Russell W. Joyner Date: 8/21/2010

Weatherford International Ltd.

WFT Plan Report - X & Y's

devon

Weatherford

Company:	Devon Energy	**Date:** 8/21/2010	**Time:** 12:19:25	**Page:**	1
Field:	Eddy Co., NM (NAD 83)	**Co-ordinate(NE) Reference:**	Well: Cotton Draw #134H, Grid North		
Site:	Cotton Draw #134H	**Vertical (TVD) Reference:**	SITE 3443.5		
Well:	Cotton Draw #134H	**Section (VS) Reference:**	Well (0.00N,0.00E,359.86Azi)		
Wellpath:	1	**Survey Calculation Method:**	Minimum Curvature	**Db:**	Sybase

Plan:	Plan #1	**Date Composed:**	8/21/2010
		Version:	1
Principal:	Yes	**Tied-to:**	From Surface

Field:	Eddy Co., NM (NAD 83)		
Map System:	US State Plane Coordinate System 1983	**Map Zone:**	New Mexico, Eastern Zone
Geo Datum:	GRS 1980	**Coordinate System:**	Well Centre
Sys Datum:	Mean Sea Level	**Geomagnetic Model:**	IGRF2010

Site:	Cotton Draw #134H				
Site Position:		**Northing:**	419743.42 ft	**Latitude:**	32 9 9.484 N
From:	Map	**Easting:**	719966.81 ft	**Longitude:**	103 45 22.098 W
Position Uncertainty:	0.00 ft			**North Reference:**	Grid
Ground Level:	3418.50 ft			**Grid Convergence:**	0.31 deg

Well:	Cotton Draw #134H				**Slot Name:**	
Well Position:	+N/-S	0.00 ft	**Northing:**	419743.42 ft	**Latitude:**	32 9 9.484 N
	+E/-W	0.00 ft	**Easting :**	719966.81 ft	**Longitude:**	103 45 22.098 W
Position Uncertainty:		0.00 ft				

Wellpath:	1		**Drilled From:**	Surface	
			Tie-on Depth:	0.00 ft	
Current Datum:	SITE	**Height** 3443.50 ft	**Above System Datum:**	Mean Sea Level	
Magnetic Data:	9/21/2010		**Declination:**	7.76 deg	
Field Strength:	48651 nT		**Mag Dip Angle:**	60.11 deg	

Vertical Section:	**Depth From (TVD)** ft	**+N/-S** ft	**+E/-W** ft	**Direction** deg
	8980.00	0.00	0.00	359.86

Plan Section Information

MD ft	Incl deg	Azim deg	TVD ft	+N/-S ft	+E/-W ft	DLS deg/100ft	Build deg/100ft	Turn deg/100ft	TFO deg	Target
0.00	0.00	359.86	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
8263.80	0.00	359.86	8263.80	0.00	0.00	0.00	0.00	0.00	0.00	
9388.80	90.00	359.86	8980.00	716.20	-1.75	8.00	8.00	0.00	359.86	
16353.54	90.00	359.86	8980.00	7680.91	-18.78	0.00	0.00	0.00	0.00	Pbhl

Survey

MD ft	Incl deg	Azim deg	TVD ft	N/S ft	E/W ft	VS ft	DLS deg/100ft	MapN ft	MapE ft	Comment
8200.00	0.00	359.86	8200.00	0.00	0.00	0.00	0.00	419743.42	719966.81	
8263.80	0.00	359.86	8263.80	0.00	0.00	0.00	0.00	419743.42	719966.81	Kop
8300.00	2.90	359.86	8299.98	0.91	0.00	0.91	8.00	419744.33	719966.81	
8400.00	10.90	359.86	8399.18	12.91	-0.03	12.91	8.00	419756.33	719966.78	
8500.00	18.90	359.86	8495.74	38.60	-0.09	38.60	8.00	419782.02	719966.72	
8600.00	26.90	359.86	8587.79	77.47	-0.19	77.47	8.00	419820.89	719966.62	
8700.00	34.90	359.86	8673.53	128.78	-0.31	128.78	8.00	419872.20	719966.50	
8800.00	42.90	359.86	8751.29	191.52	-0.47	191.52	8.00	419934.94	719966.34	
8900.00	50.90	359.86	8819.57	264.47	-0.65	264.47	8.00	420007.89	719966.16	
9000.00	58.90	359.86	8877.03	346.21	-0.85	346.21	8.00	420089.63	719965.96	
9100.00	66.90	359.86	8922.56	435.16	-1.06	435.16	8.00	420178.58	719965.75	
9200.00	74.90	359.86	8955.26	529.57	-1.29	529.57	8.00	420272.99	719965.52	
9300.00	82.90	359.86	8974.50	627.62	-1.53	627.62	8.00	420371.04	719965.28	
9388.80	90.00	359.86	8980.00	716.20	-1.75	716.20	8.00	420459.62	719965.06	Lp
9400.00	90.00	359.86	8980.00	727.39	-1.78	727.39	0.00	420470.81	719965.03	
9500.00	90.00	359.86	8980.00	827.39	-2.02	827.39	0.00	420570.81	719964.79	
9600.00	90.00	359.86	8980.00	927.39	-2.27	927.39	0.00	420670.81	719964.54	

Weatherford International Ltd.

WFT Plan Report - X & Y's

devon

Weatherford

Company:	Devon Energy	**Date:** 8/21/2010 **Time:** 12:19:25	**Page:** 2
Field:	Eddy Co., NM (NAD 83)	**Co-ordinate(NE) Reference:**	Well: Cotton Draw #134H, Grid North
Site:	Cotton Draw #134H	**Vertical (TVD) Reference:**	SITE 3443.5
Well:	Cotton Draw #134H	**Section (VS) Reference:**	Well (0.00N,0.00E,359.86Azi)
Wellpath:	1	**Survey Calculation Method:**	Minimum Curvature **Db:** Sybase

Survey

MD ft	Incl deg	Azim deg	TVD ft	N/S ft	E/W ft	VS ft	DLS deg/100ft	MapN ft	MapE ft	Comment
9700.00	90.00	359.86	8980.00	1027.39	-2.51	1027.39	0.00	420770.81	719964.30	
9800.00	90.00	359.86	8980.00	1127.39	-2.76	1127.39	0.00	420870.81	719964.05	
9900.00	90.00	359.86	8980.00	1227.39	-3.00	1227.39	0.00	420970.81	719963.81	
10000.00	90.00	359.86	8980.00	1327.39	-3.25	1327.39	0.00	421070.81	719963.56	
10100.00	90.00	359.86	8980.00	1427.39	-3.49	1427.39	0.00	421170.81	719963.32	
10200.00	90.00	359.86	8980.00	1527.39	-3.73	1527.39	0.00	421270.81	719963.08	
10300.00	90.00	359.86	8980.00	1627.39	-3.98	1627.39	0.00	421370.81	719962.83	
10400.00	90.00	359.86	8980.00	1727.39	-4.22	1727.39	0.00	421470.81	719962.59	
10500.00	90.00	359.86	8980.00	1827.39	-4.47	1827.39	0.00	421570.81	719962.34	
10600.00	90.00	359.86	8980.00	1927.39	-4.71	1927.39	0.00	421670.81	719962.10	
10700.00	90.00	359.86	8980.00	2027.39	-4.96	2027.39	0.00	421770.81	719961.85	
10800.00	90.00	359.86	8980.00	2127.39	-5.20	2127.39	0.00	421870.81	719961.61	
10900.00	90.00	359.86	8980.00	2227.39	-5.45	2227.39	0.00	421970.81	719961.36	
11000.00	90.00	359.86	8980.00	2327.39	-5.69	2327.39	0.00	422070.81	719961.12	
11100.00	90.00	359.86	8980.00	2427.39	-5.94	2427.39	0.00	422170.81	719960.87	
11200.00	90.00	359.86	8980.00	2527.39	-6.18	2527.39	0.00	422270.81	719960.63	
11300.00	90.00	359.86	8980.00	2627.39	-6.42	2627.39	0.00	422370.81	719960.39	
11400.00	90.00	359.86	8980.00	2727.39	-6.67	2727.39	0.00	422470.81	719960.14	
11500.00	90.00	359.86	8980.00	2827.39	-6.91	2827.39	0.00	422570.81	719959.90	
11600.00	90.00	359.86	8980.00	2927.39	-7.16	2927.39	0.00	422670.81	719959.65	
11700.00	90.00	359.86	8980.00	3027.39	-7.40	3027.39	0.00	422770.81	719959.41	
11800.00	90.00	359.86	8980.00	3127.39	-7.65	3127.39	0.00	422870.81	719959.16	
11900.00	90.00	359.86	8980.00	3227.38	-7.89	3227.39	0.00	422970.80	719958.92	
12000.00	90.00	359.86	8980.00	3327.38	-8.14	3327.39	0.00	423070.80	719958.67	
12100.00	90.00	359.86	8980.00	3427.38	-8.38	3427.39	0.00	423170.80	719958.43	
12200.00	90.00	359.86	8980.00	3527.38	-8.62	3527.39	0.00	423270.80	719958.19	
12300.00	90.00	359.86	8980.00	3627.38	-8.87	3627.39	0.00	423370.80	719957.94	
12400.00	90.00	359.86	8980.00	3727.38	-9.11	3727.39	0.00	423470.80	719957.70	
12500.00	90.00	359.86	8980.00	3827.38	-9.36	3827.39	0.00	423570.80	719957.45	
12600.00	90.00	359.86	8980.00	3927.38	-9.60	3927.39	0.00	423670.80	719957.21	
12700.00	90.00	359.86	8980.00	4027.38	-9.85	4027.39	0.00	423770.80	719956.96	
12800.00	90.00	359.86	8980.00	4127.38	-10.09	4127.39	0.00	423870.80	719956.72	
12900.00	90.00	359.86	8980.00	4227.38	-10.34	4227.39	0.00	423970.80	719956.47	
13000.00	90.00	359.86	8980.00	4327.38	-10.58	4327.39	0.00	424070.80	719956.23	
13100.00	90.00	359.86	8980.00	4427.38	-10.83	4427.39	0.00	424170.80	719955.98	
13200.00	90.00	359.86	8980.00	4527.38	-11.07	4527.39	0.00	424270.80	719955.74	
13300.00	90.00	359.86	8980.00	4627.38	-11.31	4627.39	0.00	424370.80	719955.50	
13400.00	90.00	359.86	8980.00	4727.38	-11.56	4727.39	0.00	424470.80	719955.25	
13500.00	90.00	359.86	8980.00	4827.38	-11.80	4827.39	0.00	424570.80	719955.01	
13600.00	90.00	359.86	8980.00	4927.38	-12.05	4927.39	0.00	424670.80	719954.76	
13700.00	90.00	359.86	8980.00	5027.38	-12.29	5027.39	0.00	424770.80	719954.52	
13800.00	90.00	359.86	8980.00	5127.38	-12.54	5127.39	0.00	424870.80	719954.27	
13900.00	90.00	359.86	8980.00	5227.38	-12.78	5227.39	0.00	424970.80	719954.03	
14000.00	90.00	359.86	8980.00	5327.38	-13.03	5327.39	0.00	425070.80	719953.78	
14100.00	90.00	359.86	8980.00	5427.38	-13.27	5427.39	0.00	425170.80	719953.54	
14200.00	90.00	359.86	8980.00	5527.38	-13.51	5527.39	0.00	425270.80	719953.30	
14300.00	90.00	359.86	8980.00	5627.38	-13.76	5627.39	0.00	425370.80	719953.05	
14400.00	90.00	359.86	8980.00	5727.38	-14.00	5727.39	0.00	425470.80	719952.81	
14500.00	90.00	359.86	8980.00	5827.38	-14.25	5827.39	0.00	425570.80	719952.56	
14600.00	90.00	359.86	8980.00	5927.38	-14.49	5927.39	0.00	425670.80	719952.32	
14700.00	90.00	359.86	8980.00	6027.38	-14.74	6027.39	0.00	425770.80	719952.07	
14800.00	90.00	359.86	8980.00	6127.38	-14.98	6127.39	0.00	425870.80	719951.83	
14900.00	90.00	359.86	8980.00	6227.38	-15.23	6227.39	0.00	425970.80	719951.58	

Weatherford International Ltd.

WFT Plan Report - X & Y's

devon

Weatherford

Company:	Devon Energy	**Date:** 8/21/2010 **Time:** 12:19:25	**Page:** 3
Field:	Eddy Co., NM (NAD 83)	**Co-ordinate(NE) Reference:**	Well: Cotton Draw #134H, Grid North
Site:	Cotton Draw #134H	**Vertical (TVD) Reference:**	SITE 3443.5
Well:	Cotton Draw #134H	**Section (VS) Reference:**	Well (0.00N,0.00E,359.86Azi)
Wellpath:	1	**Survey Calculation Method:**	Minimum Curvature **Db:** Sybase

Survey

MD ft	Incl deg	Azim deg	TVD ft	N/S ft	E/W ft	VS ft	DLS deg/100ft	MapN ft	MapE ft	Comment
15000.00	90.00	359.86	8980.00	6327.38	-15.47	6327.39	0.00	426070.80	719951.34	
15100.00	90.00	359.86	8980.00	6427.38	-15.72	6427.39	0.00	426170.80	719951.09	
15200.00	90.00	359.86	8980.00	6527.38	-15.96	6527.39	0.00	426270.80	719950.85	
15300.00	90.00	359.86	8980.00	6627.37	-16.20	6627.39	0.00	426370.79	719950.61	
15400.00	90.00	359.86	8980.00	6727.37	-16.45	6727.39	0.00	426470.79	719950.36	
15500.00	90.00	359.86	8980.00	6827.37	-16.69	6827.39	0.00	426570.79	719950.12	
15600.00	90.00	359.86	8980.00	6927.37	-16.94	6927.39	0.00	426670.79	719949.87	
15700.00	90.00	359.86	8980.00	7027.37	-17.18	7027.39	0.00	426770.79	719949.63	
15800.00	90.00	359.86	8980.00	7127.37	-17.43	7127.39	0.00	426870.79	719949.38	
15900.00	90.00	359.86	8980.00	7227.37	-17.67	7227.39	0.00	426970.79	719949.14	
16000.00	90.00	359.86	8980.00	7327.37	-17.92	7327.39	0.00	427070.79	719948.89	
16100.00	90.00	359.86	8980.00	7427.37	-18.16	7427.39	0.00	427170.79	719948.65	
16200.00	90.00	359.86	8980.00	7527.37	-18.40	7527.39	0.00	427270.79	719948.41	
16300.00	90.00	359.86	8980.00	7627.37	-18.65	7627.39	0.00	427370.79	719948.16	
16353.54	90.00	359.86	8980.00	7680.91	-18.78	7680.93	0.00	427424.33	719948.03	Pbhl

Targets

Name	Description Dip.	Dir.	TVD ft	+N/-S ft	+E/-W ft	Map Northing ft	Map Easting ft	<---- Latitude ----> Deg Min Sec	<--- Longitude ---> Deg Min Sec
Pbhl			8980.00	7680.91	-18.78	427424.33	719948.03	32 10 25.493 N	103 45 21.837 W

Casing Points

MD	TVD	Diameter	Hole Size	Name

Annotation

MD ft	TVD ft	
8263.80	8263.80	Kop
9388.80	8980.00	Lp
16353.53	8980.00	Pbhl

Formations

MD	TVD	Formations	Lithology	Dip Angle	Dip Direction

Weatherford Drilling Services

GeoDec v5.03

Report Date:	August 21, 2010
Job Number:	
Customer:	Devon Energy
Well Name:	Cotton Draw #134H
API Number:	
Rig Name:	
Location:	Eddy Co., NM (NAD 83)
Block:	
Engineer:	RWJ

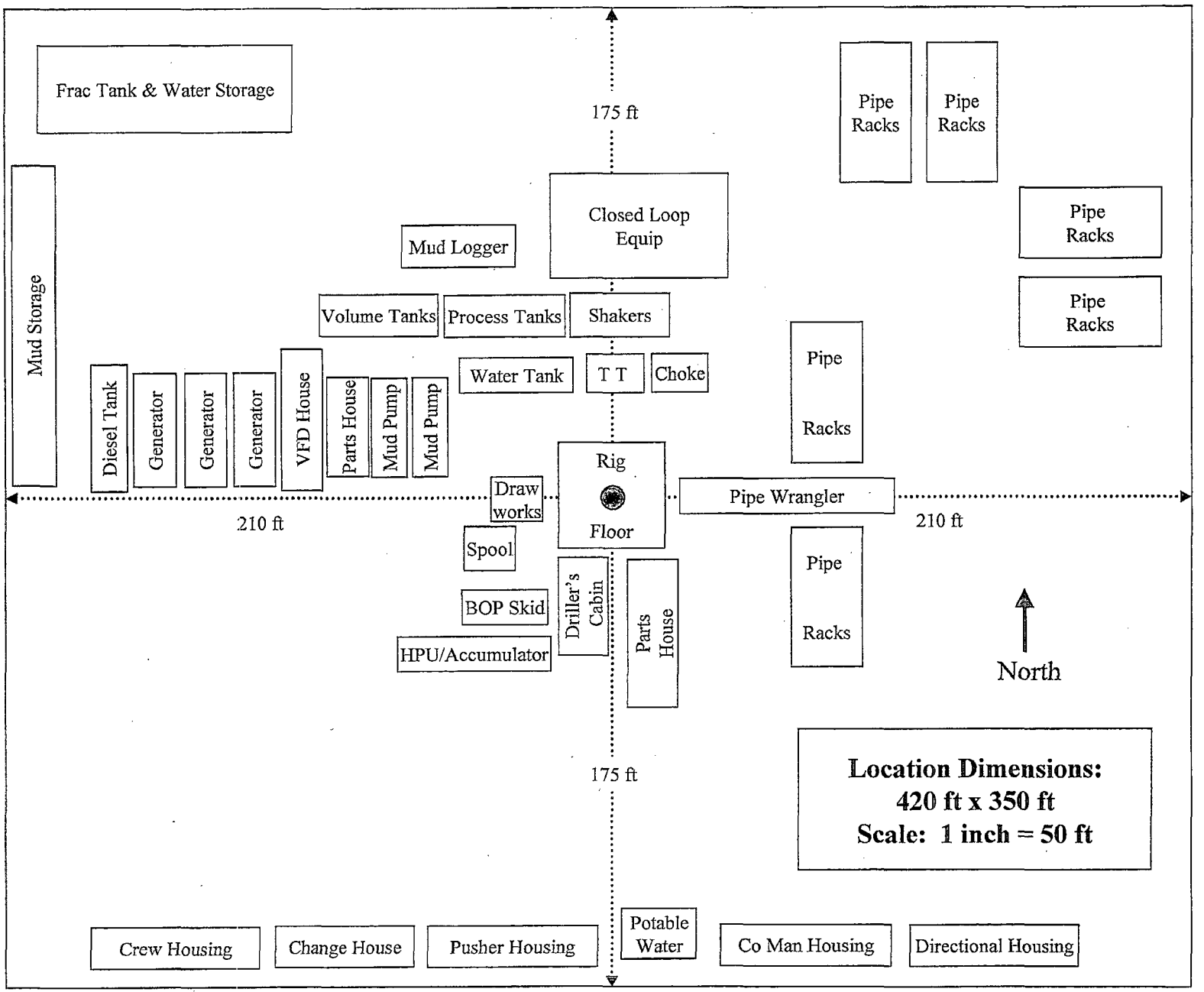
US State Plane 1983	Geodetic Latitude / Longitude
System: New Mexico Eastern Zone	System: Latitude / Longitude
Projection: Transverse Mercator/Gauss Kruger	Projection: Geodetic Latitude and Longitude
Datum: North American Datum 1983	Datum: North American Datum 1983
Ellipsoid: GRS 1980	Ellipsoid: GRS 1980
North/South 419743.420 USFT	Latitude 32.1526368 DEG
East/West 719966.810 USFT	Longitude -103.7561336 DEG
Grid Convergence: .31°	
Total Correction: +7.45°	

Geodetic Location WGS84	Elevation = 0.0 Meters	
Latitude =	32.15264° N	32° 9 min 9.492 sec
Longitude =	103.75613° W	103° 45 min 22.081 sec

Magnetic Declination =	7.76°	[True North Offset]	
Local Gravity =	.9988 g	CheckSum =	6539
Local Field Strength =	48647 nT	Magnetic Vector X =	24024 nT
Magnetic Dip =	60.11°	Magnetic Vector Y =	3272 nT
Magnetic Model =	IGRF-2010g11	Magnetic Vector Z =	42175 nT
Spud Date =	Sep 21, 2010	Magnetic Vector H =	24245 nT

Signed:_____ Date:_____

H&P Flex Rig Location Layout



NOTES REGARDING BLOWOUT PREVENTERS
Devon Energy Production Company, LP
Cotton Draw Unit 134H
Surface Location: 200' FSL & 330' FWL, Unit M, Sec 2 T25S R31E, Eddy, NM
Bottom Hole Location: 2600' FSL & 330' FWL, Unit L, Sec 35 T24S R31E, Eddy, NM

1. Drilling nipple will be constructed so it can be removed mechanically without the aid of a welder. The minimum internal diameter will equal BOP bore.

2. Wear ring will be properly installed in head.

3. Blowout preventer and all associated fittings will be in operable condition to withstand a minimum 3,000 psi working pressure.

4. All fittings will be flanged.

5. A full bore safety valve tested to a minimum 3,000 psi WP with proper thread connections will be available on the rotary rig floor at all times.

6. All choke lines will be anchored to prevent movement.

7. All BOP equipment will be equal to or larger in bore than the internal diameter of the last casing string.

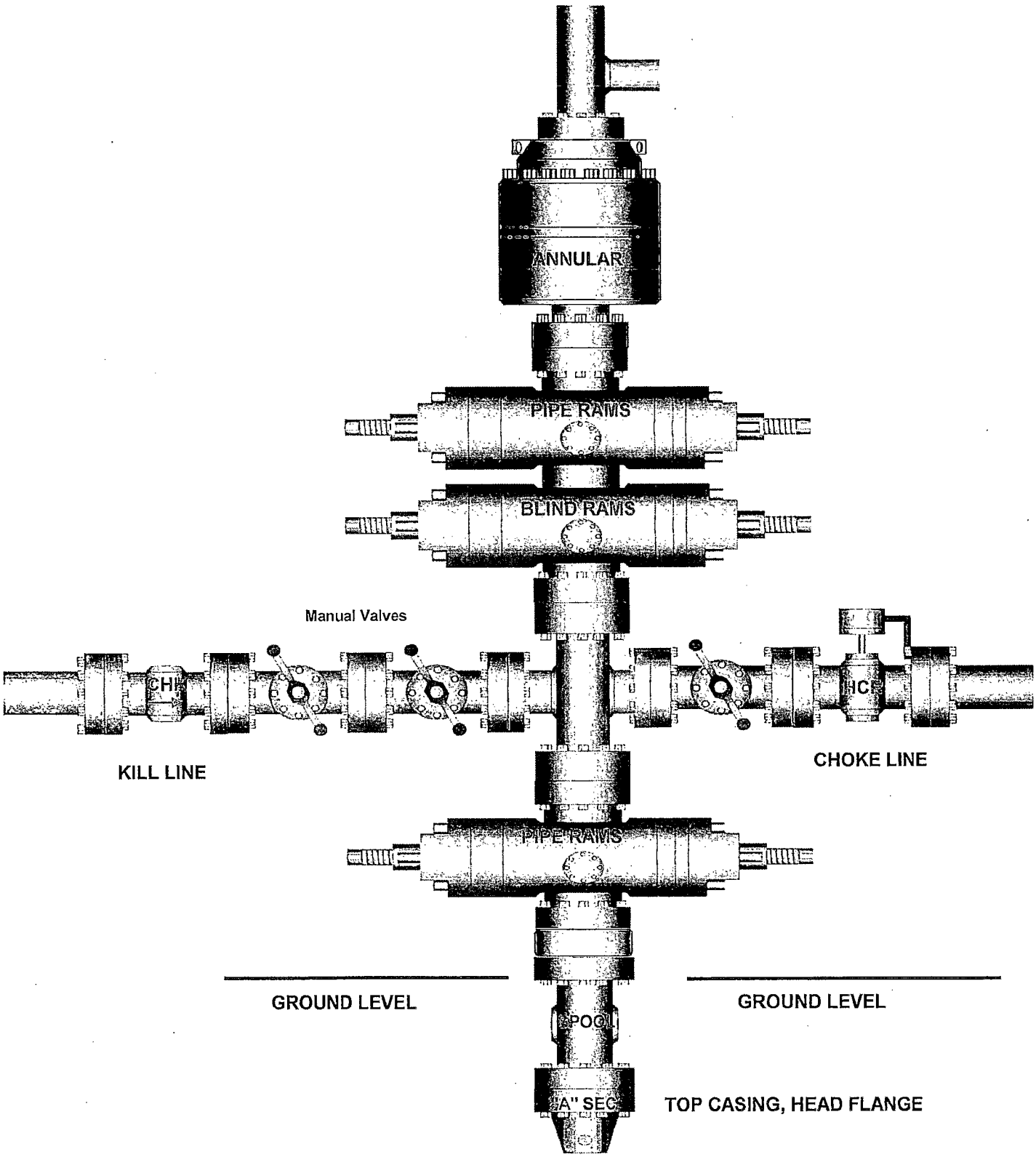
8. Will maintain a kelly cock attached to the kelly.

9. Hand wheels and wrenches will be properly installed and tested for safe operation.

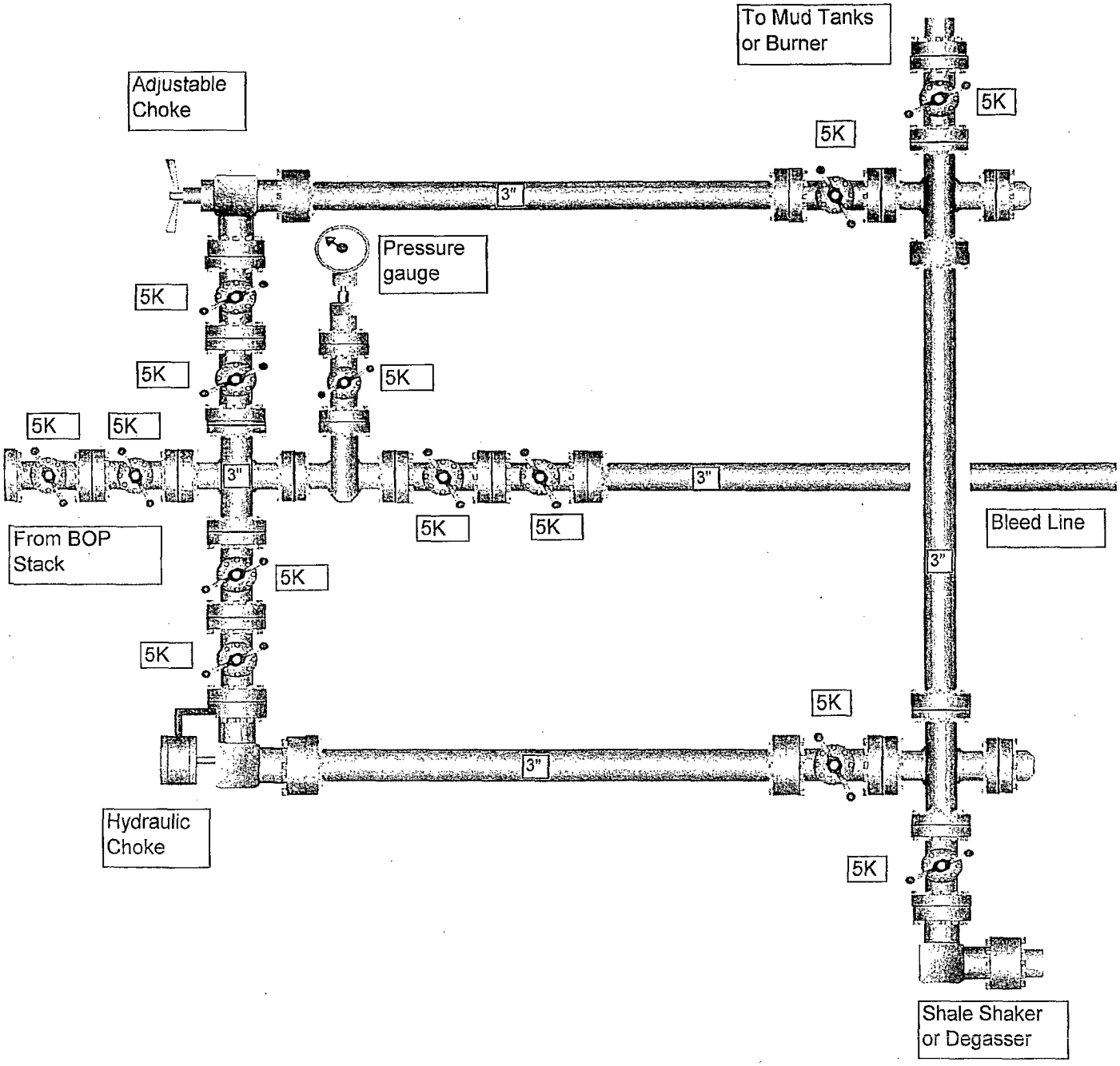
10. Hydraulic floor control for blowout preventer will be located as near in proximity to driller's controls as possible.

11. All BOP equipment will meet API standards and include a minimum 40 gallon accumulator having two independent means of power to initiate closing operation.

13-5/8" x 5,000 psi BOP Stack



5,000 PSI CHOKE MANIFOLD



Fluid Technology

ContiTech Beattie Corp.
Website: www.contitechbeattie.com

Monday, June 14, 2010

RE: Drilling & Production Hoses
Lifting & Safety Equipment

To Helmerich & Payne,

A Continental ContiTech hose assembly can perform as intended and suitable for the application regardless of whether the hose is secured or unsecured in its configuration. As a manufacturer of High Pressure Hose Assemblies for use in Drilling & Production, we do offer the corresponding lifting and safety equipment, this has the added benefit of easing the lifting and handling of each hose assembly whilst affording hose longevity by ensuring correct handling methods and procedures as well as securing the hose in the unlikely event of a failure; but in no way does the lifting and safety equipment affect the performance of the hoses providing the hoses have been handled and installed correctly. It is good practice to use lifting & safety equipment but not mandatory.

Should you have any questions or require any additional information/clarifications then please do not hesitate to contact us.

ContiTech Beattie is part of the Continental AG Corporation and can offer the full support resources associated with a global organization.

Best regards,

Robin Hodgson
Sales Manager
ContiTech Beattie Corp

ContiTech Beattie Corp,
11535 Brittmoore Park Drive,
Houston, TX 77041
Phone: +1 (832) 327-0141
Fax: +1 (832) 327-0148
www.contitechbeattie.com

PHOENIX

QUALITY DOCUMENT

PHOENIX RUBBER INDUSTRIAL LTD.

H-6728 Szeged, Budapesti út 10. Hungary • H-6701 Szeged, P. O. Box 152
Phone: (3662) 566-737 • Fax: (3662) 566-738

SALES & MARKETING: H-1092 Budapest, Ráday u. 42-44. Hungary • H-1440 Budapest, P. O. Box 26
Phone: (361) 456-4200 • Fax: (361) 217-2972, 456-4273 • www.taurusemerge.hu

QUALITY CONTROL INSPECTION AND TEST CERTIFICATE				CERT. N°:	555	
PURCHASER:	Phoenix Beattie Co.			P.O. N°:	1519FA-871	
PHOENIX RUBBER order N°:	170466	HOSE TYPE:	3" ID	Choke and Kill Hose		
HOSE SERIAL N°:	34137	NOMINAL / ACTUAL LENGTH:		11,43 m		
W.P. 68,96 MPa	10000 psi	T.P. 103,4 MPa	15000 psi	Duration:	60	min.

Pressure test with water at ambient temperature

See attachment. (1 page)

↑ 10 mm = 10 Min.

→ 10 mm = 16 MPa

COUPLINGS

Type	Serial N°	Quality	Heat N°
3" coupling with	714 715	AISI 4130	C7626
4 1/16" Flange end		AISI 4130	47357

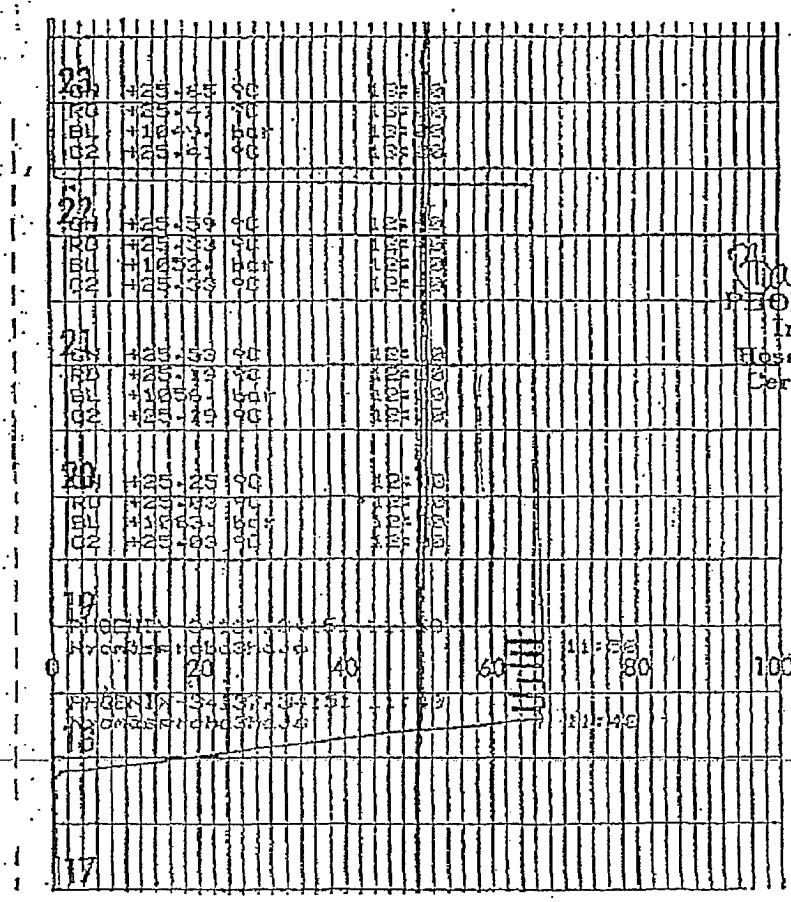
API Spec 16 C
Temperature rate:"B"

All metal parts are flawless

WE CERTIFY THAT THE ABOVE HOSE HAS BEEN MANUFACTURED IN ACCORDANCE WITH THE TERMS OF THE ORDER AND PRESSURE TESTED AS ABOVE WITH SATISFACTORY RESULT.

Date:	Inspector	Quality Control
30. April. 2002.		PHOENIX RUBBER Industrial Ltd. Hose Inspection and

Page: 1/1

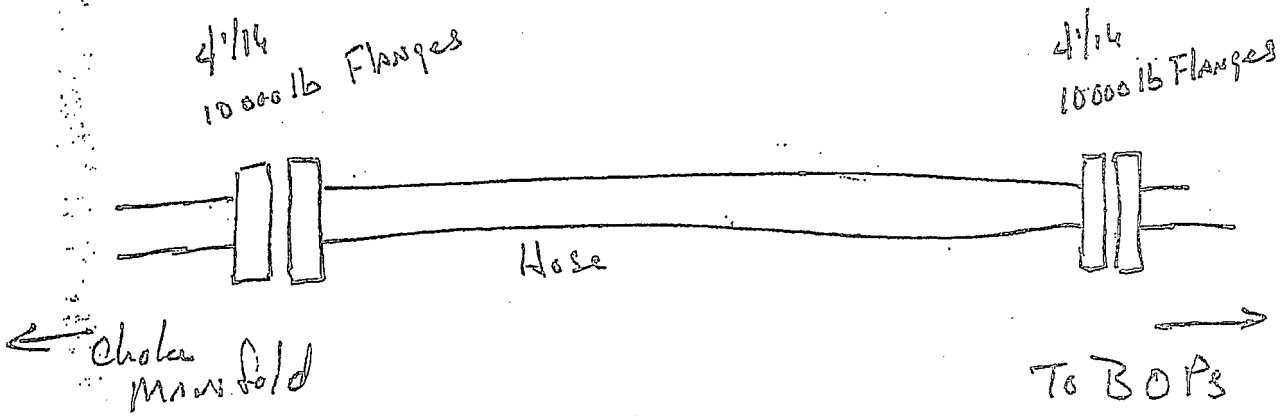


PHOENIX RUBBER
Industrial Ltd.
Hose Inspection and
Certification Dept.

VERIFIED TRUE COPY
PHOENIX RUBBER LTD.

H&P 214

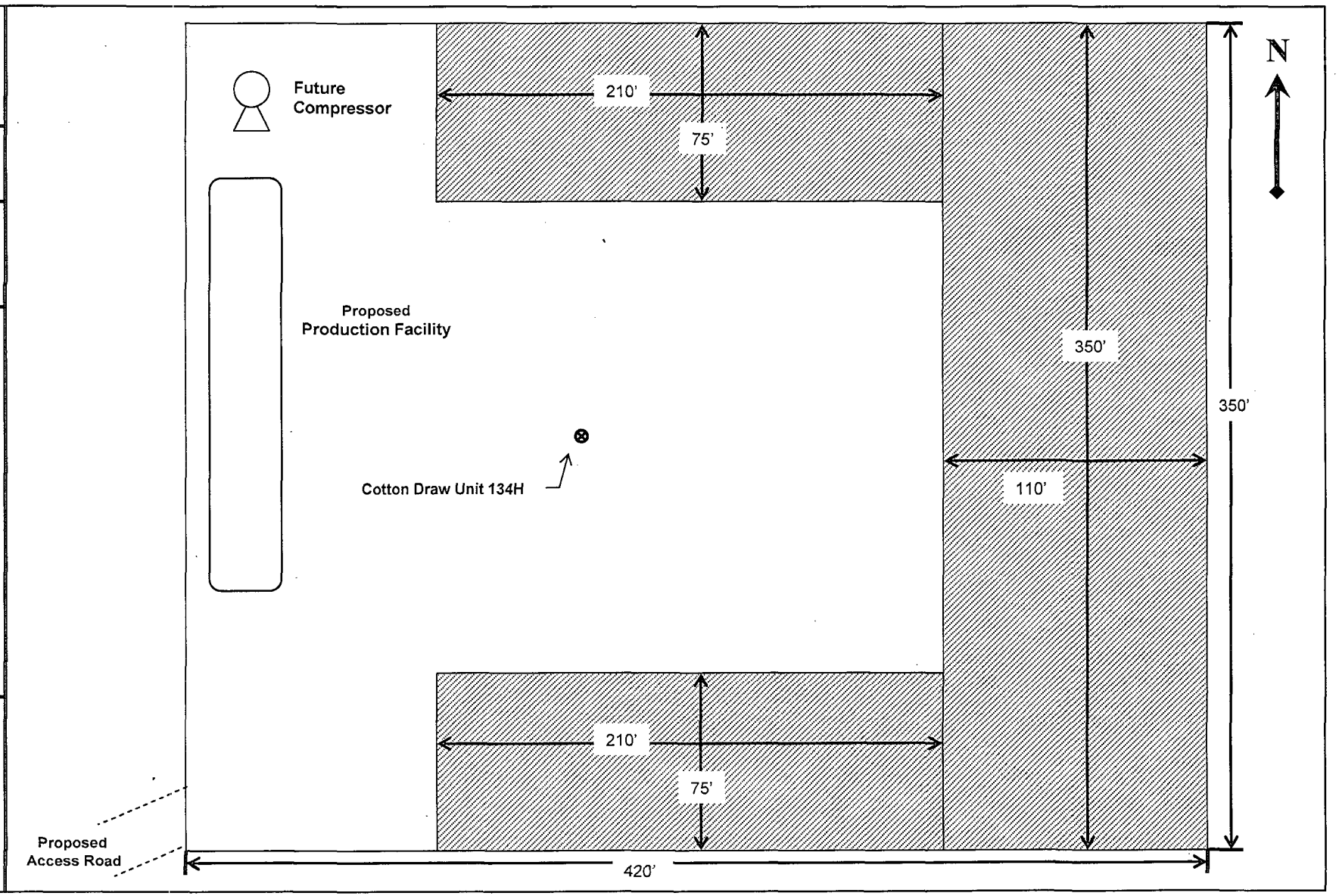
Choke hose



devon

Proposed Interim Site Reclamation

Devon Energy Production Co.
Cotton Draw Unit 134H
200' FSL & 330' FWL
Sec. 2-T25S-R31E
Eddy County, NM



Proposed Reclamation Area

1" : 50'

GM 8/26/10

Assumed 100 ppm ROE = 3000'

100 ppm H_2S concentration shall trigger activation of this plan.

Emergency Procedures

In the event of a release of gas containing H_2S, the first responder(s) must

- Isolate the area and prevent entry by other persons into the 100 ppm ROE.
- Evacuate any public places encompassed by the 100 ppm ROE.
- Be equipped with H_2S monitors and air packs in order to control the release.
- Use the "buddy system" to ensure no injuries occur during the response
- Take precautions to avoid personal injury during this operation.
- Contact operator and/or local officials to aid in operation. See list of phone numbers attached.
- Have received training in the
  - Detection of H_2S, and
  - Measures for protection against the gas,
  - Equipment used for protection and emergency response.

Ignition of Gas Source

Should control of the well be considered lost and ignition considered, take care to protect against exposure to Sulfur Dioxide (SO_2). Intentional ignition must be coordinated with the NMOCD and local officials. Additionally the NM State Police may become involved. NM State Police shall be the Incident Command on scene of any major release. Take care to protect downwind whenever there is an ignition of the gas

Characteristics of H_2S and SO_2

Common Name	Chemical Formula	Specific Gravity	Threshold Limit	Hazardous Limit	Lethal Concentration
Hydrogen Sulfide	H_2S	1.189 Air = 1	10 ppm	100 ppm/hr	600 ppm
Sulfur Dioxide	SO_2	2.21 Air = 1	2 ppm	N/A	1000 ppm

Contacting Authorities

Devon Energy Corp. personnel must liaison with local and state agencies to ensure a proper response to a major release. Additionally, the OCD must be notified of the release as soon as possible but no later than 4 hours. Agencies will ask for information such as type and volume of release, wind direction, location of release, etc. Be prepared with all information available. The following call list of essential and potential responders has been prepared for use during a release. Devon Energy Corp. Company response must be in coordination with the State of New Mexico's 'Hazardous Materials Emergency Response Plan' (HMER)

Devon Energy Corp. Company Call List

Artesia (575)	Cellular	Office	Home
Foreman – Robert Bell	748-7448	748-0178	746-2991
Asst. Foreman –Tommy Polly	748-5290	748-0165	748-2846
Don Mayberry	748-5235	748-0164	746-4945
Montral Walker	390-5182	748-0193	936-414-6246
Engineer – Marcos Ortiz	(405) 317-0666	(405) 552-8152	(405) 381-4350

Agency Call List

Lea County (575)

Hobbs

State Police	392-5588
City Police	397-9265
Sheriff's Office	393-2515
Ambulance	911
Fire Department	397-9308
LEPC (Local Emergency Planning Committee)	393-2870
NMOCD	393-6161
US Bureau of Land Management	393-3612

Eddy County (575)

Carlsbad

State Police	885-3137
City Police	885-2111
Sheriff's Office	887-7551
Ambulance	911
Fire Department	885-2111
LEPC (Local Emergency Planning Committee)	887-3798
US Bureau of Land Management	887-6544
New Mexico Emergency Response Commission (Santa Fe)	(505)476-9600
24 HR	(505) 827-9126
National Emergency Response Center (Washington, DC)	(800) 424-8802

Emergency Services

Boots & Coots IWC	1-800-256-9688 or (281) 931-8884
Cudd Pressure Control	(915) 699-0139 or (915) 563-3356
Halliburton	(575) 746-2757
B. J. Services	(575) 746-3569

Give GPS position:

Flight For Life - Lubbock, TX	(806) 743-9911
Aerocare - Lubbock, TX	(806) 747-8923
Med Flight Air Amb - Albuquerque, NM	(575) 842-4433
Lifeguard Air Med Svc. Albuquerque, NM	(575) 272-3115

Prepared in conjunction with
Wade Rohloff of;

Compliance Services
PO Box 2727 Hobbs NM 88240 (505) 631-4568

SURFACE USE PLAN
Devon Energy Production Company, LP
Cotton Draw Unit 134H
Surface Location: 200' FSL & 330' FWL, Unit M, Sec 2 T25S R31E, Eddy, NM
Bottom Hole Location: 2600' FSL & 330' FWL, Unit L, Sec 35 T24S R31E, Eddy, NM

1. **Existing Roads:**
   a. The well site and elevation plat for the proposed well are reflected on the well site layout; Form C-102. The well was staked by Madron Surveying, Inc.
   b. All roads into the location are depicted on Exhibit 3.
   c. Directions to Location: From the junction of Buck Jackson and Buck Thorn, go south 3.1 miles , turn left and go east 0.9 miles to a proposed road survey and follow flags north 880' to proposed location.

2. **New or Reconstructed Access Roads:**
   a. The well site layout, Form C-102 shows the existing County road. Approximately 880' of new access road will be constructed as follows. The maximum width of the road will be 15'. It will be crowned and made of 6" rolled and compacted caliche. Water will be deflected, as necessary, to avoid accumulation and prevent surface erosion.
   b. Surface material will be native caliche. This material will be obtained from a BLM approved pit nearest in proximity to the location. The average grade will be approximately 1%.
   c. No cattle guards, grates or fence cuts will be required. No turnouts are planned.

3. **Location of Existing Wells:**
   One Mile Radius Plat shows all existing and proposed wells within a one-mile radius of the proposed location. See attached plat.

4. **Location of Existing and/or Proposed Production Facilities:**
   a. In the event the well is found productive it will go to a battery on site and the necessary production equipment will be installed at the well site. (See Attached diagram)
   b. If necessary, the well will be operated by means of an electric prime mover. Electric power poles will be set along side of the access road.
   c. All flow lines will adhere to API standards.
   d. If the well is productive, rehabilitation plans are as follows:
      i. The original topsoil from the well site will be returned to the location. The drill site will then be contoured as close as possible to the original state.

5. **Location and Types of Water Supply:**
This location will be drilled using a combination of water mud systems (outlined in the Drilling Program). The water will be obtained from commercial water stations in the area and hauled to location by transport truck using the existing and proposed roads shown in the C-102. On occasion, water will be obtained from a pre-existing water well, running a pump directly to the drill rig. In these cases where a poly pipeline is used to transport water for drilling purposes, proper authorizations will be secured. If a poly pipeline is used, the size, distance, and map showing route will be provided to the BLM via sundry notice.

6. **Construction Materials:**
The caliche utilized for the drilling pad and proposed access road will be from minerals that are located onsite or will be used onsite. If minerals are not available onsite, then an established mineral pit will be used to build the location and stem road.

7. **Methods of Handling Waste Material:**
   a. Drill cuttings will be disposed.
   b. All trash, junk and other waste material will be contained in trash cages or trash bins to prevent scattering. When the job is completed all contents will be removed and disposed of in an approved sanitary landfill.
   c. The supplier, including broken sacks, will pick up salts remaining after completion of well.
   d. A Porto-john will be provided for the rig crews. This equipment will be properly maintained during the drilling and completion operations and will be removed when all operations are complete.
   e. Remaining drilling fluids will be sent to a closed loop system. Water produced during completion will be put into a closed loop system. Oil and condensate produced will be put into a storage tank and sold.
   f. Disposal of fluids to be transported by the following companies:
      i. American Production Service Inc, Odessa TX
      ii. Gandy Corporation, Lovington NM
      iii. I & W Inc, Loco Hill NM
      iv. Jims Water Service of Co Inc, Denver CO

8. **Ancillary Facilities:** No campsite or other facilities will be constructed as a result of this well.

9. **Well Site Layout**
   a. Exhibit D shows the proposed well site layout with dimensions of the pad layout.
   b. This exhibit indicated proposed location of sump pits and living facilities.
   c. Mud pits in the active circulating system will be steel pits.
   d. A closed loop system will be utilized.

e. If a pit or closed loop system is utilized, Devon will comply with the NMOCD requirements 19.15.17 and submit form C-144 to the appropriate NMOCD District Office. A copy to be provided to the BLM.

10. Plans for Surface Reclamation Include Both Final & Interim:

a. After concluding the drilling and/or completion operations, if the well is found non-commercial, the caliche will be removed from the pad and transported to the original caliche pit or used for other drilling locations. The road will be reclaimed as directed by the BLM. The original top soil will again be returned to the pad and contoured, as close as possible, to the original topography. We will use a closed loop system.
b. The location and road will be rehabilitated as recommended by the BLM.
c. If the well is deemed commercially productive, caliche from areas of the pad site not required for operations will be reclaimed. The original top soil will be returned to the area of the drill pad not necessary to operate the well. These unused areas of the drill pad will be contoured, as close as possible, to match the original topography.
d. All disturbed areas not needed for active support of production operations will undergo interim reclamation. The portions of the cleared well site not needed for operational and safety purposes will be recontoured to a final or intermediate contour that blends with the surrounding topography as much as possible. Topsoil will be respread over areas not needed for all-weather operations.

11. Surface Ownership

a. The surface is owned by the State of New Mexico. An agreement has been reached with the State. The minerals are owned and administered by the U.S. Federal Government. The surface is multiple use with the primary uses of the region for the grazing of livestock and the production of oil and gas.
b. The proposed road routes and the surface location will be restored as directed by the BLM.

12. Other Information:

a. The area surrounding the well site is grassland. The topsoil is very sandy in nature. The vegetation is moderately sparse with native prairie grass, sage bush, yucca and miscellaneous weeds. No wildlife was observed but it is likely that deer, rabbits, coyotes, and rodents traverse the area.
b. There is no permanent or live water in the general proximity of the location.
c. There are no dwellings within 2 miles of location.
d. A Cultural Resources Examination will be completed by the Permian Basin Cultural Resource Fund in lieu of being required to conduct a Class III Survey for cultural resources associated with their project within the BLM office in Carlsbad, New Mexico.

13. Bond Coverage:

Bond Coverage is Nationwide; Bond # is CO-1104

Operators Representative:

The Devon Energy Production Company, L.P. representatives responsible for ensuring compliance of the surface use plan are listed below.

Greg McGowen - Operations Engineer Advisor
Devon Energy Production Company, L.P.
20 North Broadway
Oklahoma City, OK 73102-8260
(405) 228-8965 (office)
(405) 464-9769 (Cellular)

Don Mayberry - Superintendent
Devon Energy Production Company, L.P.
Post Office Box 250
Artesia, NM 88211-0250
(575) 748-3371 (office)
(575) 746-4945 (home)

Certification

I hereby certify that I, or persons under my direct supervision, have inspected the proposed drill site and access road proposed herein; that I am familiar with the conditions that presently exist; that I have full knowledge of State and Federal laws applicable to this operation; that the statements made in this APD package are, to the best of my knowledge, true and correct; and that the work associated with the operations proposed herein will be performed in conformity with this APD package and the terms and conditions under which it is approved. I also certify that I, or Devon Energy Production Company, L.P. am responsible for the operations conducted under this application. These statements are subject to the provisions of 18 U.S.C. 1001 for the filing of false statements.

I hereby also certify that I, or Devon Energy Production Company, L.P. have made a good faith effort to provide the surface owner with a copy of the Surface Use Plan of Operations and any Conditions of Approval that are attached to the APD.

Executed this _30th___ day of __August, 2010.
Printed Name: Judy A. Barnett
Signed Name: _____
Position Title: Regulatory Analyst
Address: 20 North Broadway, OKC OK 73102
Telephone: (405)-228-8699
Field Representative (if not above signatory):
Address (if different from above):
Telephone (if different from above):

PECOS DISTRICT
CONDITIONS OF APPROVAL

OPERATOR'S NAME:	DEVON ENERGY PROD. CO. LP.
LEASE NO.:	NM036379 - State Surface
WELL NAME & NO.:	Cotton Draw Unit # 134H
SURFACE HOLE FOOTAGE:	0200' FSL & 0330' FWL
BOTTOM HOLE FOOTAGE	2600' FSL & 0330' FWL Sec 35, T 24S R31E
LOCATION:	**Section 02, T. 25 S., R. 31 E., NMPM (SHL)**
COUNTY:	Lea County, New Mexico

TABLE OF CONTENTS

Standard Conditions of Approval (COA) apply to this APD. If any deviations to these standards exist or special COAs are required, the section with the deviation or requirement will be checked below.

I. GENERAL PROVISIONS

The approval of the Application For Permit To Drill (APD) is in compliance with all applicable laws and regulations: 43 Code of Federal Regulations 3160, the lease terms, Onshore Oil and Gas Orders, Notices To Lessees, New Mexico Oil Conservation Division (NMOCD) Rules, National Historical Preservation Act As Amended, and instructions and orders of the Authorized Officer. Any request for a variance shall be submitted to the Authorized Officer on Form 3160-5, Sundry Notices and Report on Wells.

II. PERMIT EXPIRATION

If the permit terminates prior to drilling and drilling cannot be commenced within 60 days after expiration, an operator is required to submit Form 3160-5, Sundry Notices and Reports on Wells, requesting surface reclamation requirements for any surface disturbance. However, if the operator will be able to initiate drilling within 60 days after the expiration of the permit, the operator must have set the conductor pipe in order to allow for an extension of 60 days beyond the expiration date of the APD. (Filing of a Sundry Notice is required for this 60 day extension.)

III. ARCHAEOLOGICAL, PALEONTOLOGY & HISTORICAL SITES

Any cultural and/or paleontological resource discovered by the operator or by any person working on the operator's behalf shall immediately report such findings to the Authorized Officer. The operator is fully accountable for the actions of their contractors and subcontractors. The operator shall suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the Authorized Officer. An evaluation of the discovery shall be made by the Authorized Officer to determine the appropriate actions that shall be required to prevent the loss of significant cultural or scientific values of the discovery. The operator shall be held responsible for the cost of the proper mitigation measures that the Authorized Officer assesses after consultation with the operator on the evaluation and decisions of the discovery. Any unauthorized collection or disturbance of cultural or paleontological resources may result in a shutdown order by the Authorized Officer.

IV. NOXIOUS WEEDS

The operator shall be held responsible if noxious weeds become established within the areas of operations. Weed control shall be required on the disturbed land where noxious weeds exist, which includes the roads, pads, associated pipeline corridor, and adjacent land affected by the establishment of weeds due to this action. The operator shall consult with the Authorized Officer for acceptable weed control methods, which include following EPA and BLM requirements and policies.

V. SPECIAL REQUIREMENT(S)

Timing Limitation Stipulation / Condition of Approval for lesser prairie-chicken: Oil and gas activities including 3-D geophysical exploration, and drilling will not be allowed in lesser prairie-chicken habitat during the period from March 1st through June 15th annually. During that period, other activities that produce noise or involve human activity, such as the maintenance of oil and gas facilities, pipeline, road, and well pad construction, will be allowed except between 3:00 am and 9:00 am. The 3:00 am to 9:00 am restriction will not apply to normal, around-the-clock operations, such as venting, flaring, or pumping, which do not require a human presence during this period. Additionally, no new drilling will be allowed within up to 200 meters of leks known at the time of permitting. Normal vehicle use on existing roads will not be restricted. Exhaust noise from pump jack engines must be muffled or otherwise controlled so as not to exceed 75 db measured at 30 feet from the source of the noise.

Ground-level Abandoned Well Marker to avoid raptor perching: Upon the plugging and subsequent abandonment of the well, the well marker will be installed at ground level on a plate containing the pertinent information for the plugged well. For more installation details, contact the Carlsbad Field Office at 575-234-5972.

Commercial Well Determination

A commercial well determination will need to be submitted after production has been established for at least six months.

Plan of Development

A Unit Plan of Development (UPOD) is to be submitted annually to the BLM. Guidelines for UPOD are available upon request at the BLM Carlsbad Field Office.

VI. CONSTRUCTION

A. NOTIFICATION

The BLM shall administer compliance and monitor construction of the access road and well pad. Notify the Carlsbad Field Office at (575) 234-5972 at least 3 working days prior to commencing construction of the access road and/or well pad.

When construction operations are being conducted on this well, the operator shall have the approved APD and Conditions of Approval (COA) on the well site and they shall be made available upon request by the Authorized Officer.

B. TOPSOIL

The operator shall stockpile the topsoil in a low profile manner in order to prevent wind/water erosion of the topsoil. The topsoil to be stripped is approximately 6 inches in depth. The topsoil will be used for interim and final reclamation.

C. CLOSED LOOP SYSTEM

Tanks are required for drilling operations: No Pits.

The operator shall properly dispose of drilling contents at an authorized disposal site.

D. FEDERAL MINERAL MATERIALS PIT

Payment shall be made to the BLM prior to removal of any federal mineral materials. Call theCarlsbad Field Office at (575) 234-5972.

E. WELL PAD SURFACING

Surfacing of the well pad is not required.

If the operator elects to surface the well pad, the surfacing material may be required to be removed at the time of reclamation.

The well pad shall be constructed in a manner which creates the smallest possible surface disturbance, consistent with safety and operational needs.

F. ON LEASE ACCESS ROADS

Road Width
The access road shall have a driving surface that creates the smallest possible surface disturbance and does not exceed fourteen (14) feet in width. The maximum width of surface disturbance, when constructing the access road, shall not exceed twenty (20) feet.

Surfacing
Surfacing material is not required on the new access road driving surface. If the operator elects to surface the new access road or pad, the surfacing material may be required to be removed at the time of reclamation.

Where possible, no improvements should be made on the unsurfaced access road other than to remove vegetation as necessary, road irregularities, safety issues, or to fill low areas that may sustain standing water.

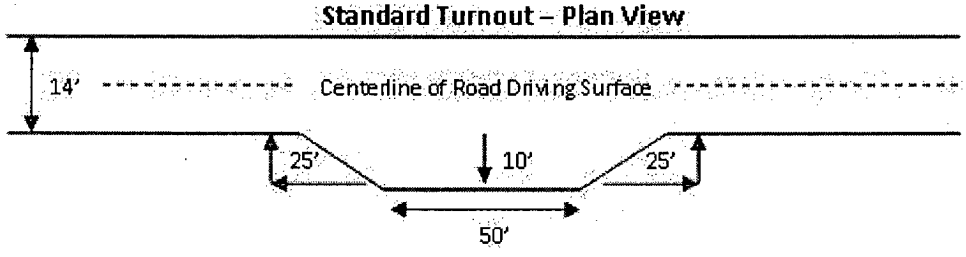
The Authorized Officer reserves the right to require surfacing of any portion of the access road at any time deemed necessary. Surfacing may be required in the event the road deteriorates, erodes, road traffic increases, or it is determined to be beneficial for future field development. The surfacing depth and type of material will be determined at the time of notification.

Crowning
Crowning shall be done on the access road driving surface. The road crown shall have a grade of approximately 2% (i.e., a 1" crown on a 14' wide road). The road shall conform to Figure 1; cross section and plans for typical road construction.

Ditching

Ditching shall be required on both sides of the road.

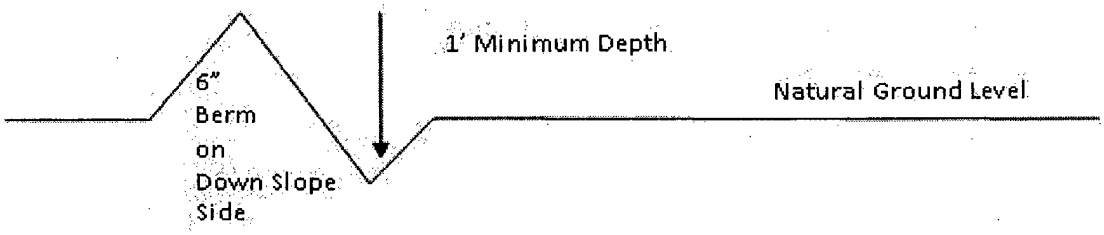
Turnouts
Vehicle turnouts shall be constructed on the road. Turnouts shall be intervisible with interval spacing distance less than 1000 feet. Turnouts shall be constructed on all blind curves. Turnouts shall conform to the following diagram:



Drainage
Drainage control systems shall be constructed on the entire length of road (e.g. ditches, sidehill outsloping and insloping, lead-off ditches, culvert installation, and low water crossings).

A typical lead-off ditch has a minimum depth of 1 foot below and a berm of 6 inches above natural ground level. The berm shall be on the down-slope side of the lead-off ditch.

Cross Section of a Typical Lead-off Ditch



All lead-off ditches shall be graded to drain water with a 1 percent minimum to 3 percent maximum ditch slope. The spacing interval are variable for lead-off ditches and shall be determined according to the formula for spacing intervals of lead-off ditches, but may be amended depending upon existing soil types and centerline road slope (in %);

Formula for Spacing Interval of Lead-off Ditches

Example - On a 4% road slope that is 400 feet long, the water flow shall drain water into a lead-off ditch. Spacing interval shall be determined by the following formula:

$$\text{400 foot road with 4\% road slope: } \frac{400'}{4\%} + 100' = 200' \text{ lead-off ditch interval}$$

Culvert Installations
Appropriately sized culvert(s) shall be installed at the deep waterway channel flow crossing.

Cattleguards
An appropriately sized cattleguard(s) sufficient to carry out the project shall be installed and maintained at fence crossing(s).

Any existing cattleguard(s) on the access road shall be repaired or replaced if they are damaged or have deteriorated beyond practical use. The operator shall be responsible for the condition of the existing cattleguard(s) that are in place and are utilized during lease operations.

A gate shall be constructed and fastened securely to H-braces.

Fence Requirement

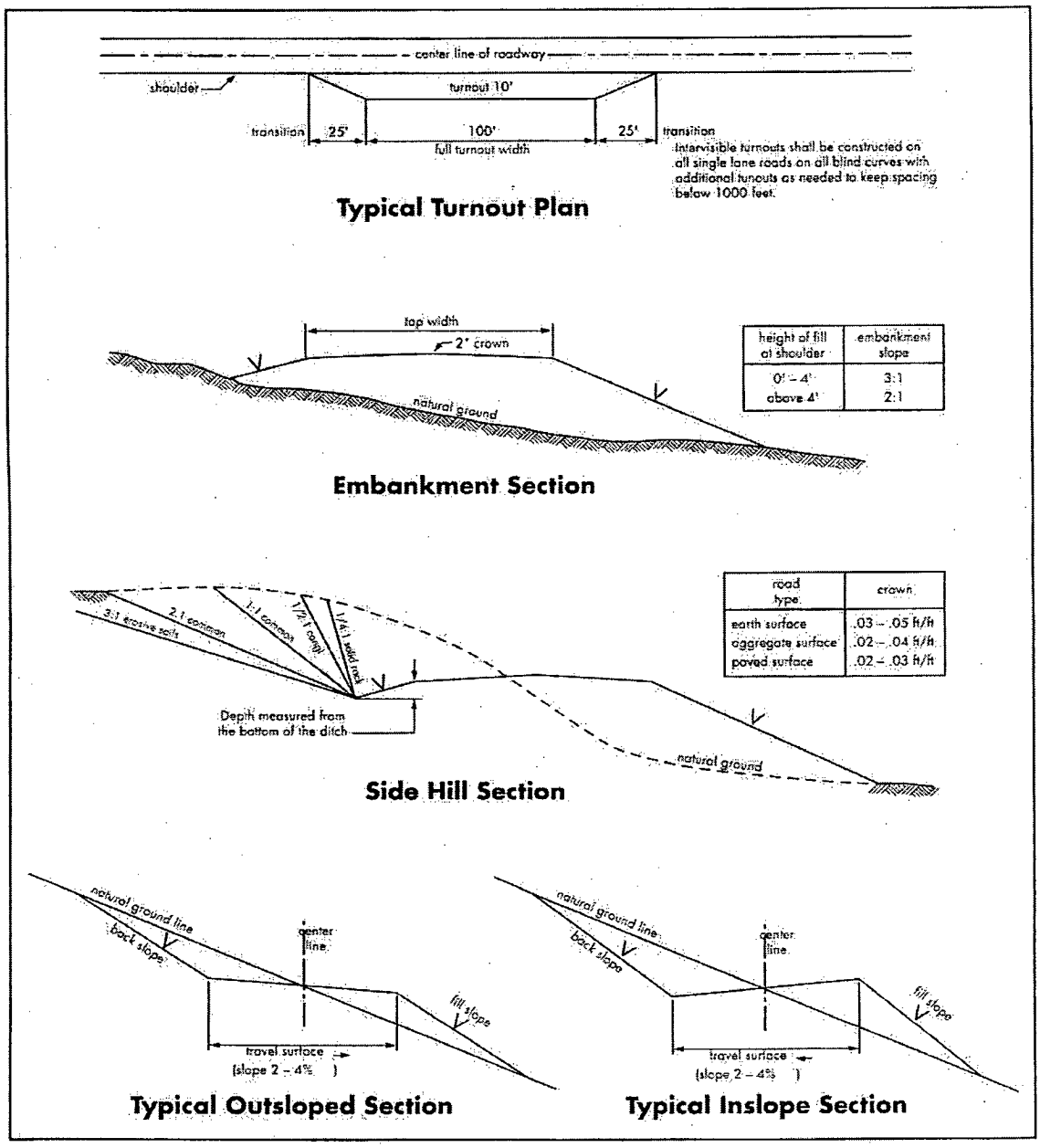
Where entry is required across a fence line, the fence shall be braced and tied off on both sides of the passageway prior to cutting.

The operator shall notify the private surface landowner or the grazing allotment holder prior to crossing any fence(s).

Public Access

Public access on this road shall not be restricted by the operator without specific written approval granted by the Authorized Officer.

Figure 1 – Cross Sections and Plans For Typical Road Sections



VII. DRILLING

A. DRILLING OPERATIONS REQUIREMENTS

The BLM is to be notified a minimum of 4 hours in advance for a representative to witness:

a. Spudding well
b. Setting and/or Cementing of all casing strings
c. BOPE tests

☒ **Eddy County**
Call the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220, (575) 361-2822

1. **Due to recent H2S encounters in the salt formation, it is recommended that monitoring equipment be onsite for potential Hydrogen Sulfide prior to drilling out the surface shoe. If Hydrogen Sulfide is encountered, please report measurements and formations to the BLM.**

2. Unless the production casing has been run and cemented or the well has been properly plugged, the drilling rig shall not be removed from over the hole without prior approval. **If the drilling rig is removed without approval – an Incident of Non-Compliance will be written and will be a "Major" violation.**

3. Floor controls are required for 3M or Greater systems. These controls will be on the rig floor, unobstructed, readily accessible to the driller and will be operational at all times during drilling and/or completion activities. Rig floor is defined as the area immediately around the rotary table; the area immediately above the substructure on which the draw works are located, this does not include the dog house or stairway area.

4. **The record of the drilling rate along with the GR/N well log run from TD to surface (horizontal well – vertical portion of hole) will be submitted to the BLM office as well as all other logs run on the borehole 30 days from completion. If available, a digital copy of the logs is to be submitted in addition to the paper copies. The Rustler top and top and bottom of Salt are to be recorded on the Completion Report.**

B. CASING

Changes to the approved APD casing and cement program require submitting a sundry and receiving approval prior to work. Failure to obtain approval prior to work will result in an Incident of Non-Compliance being issued.

Centralizers required on surface casing per Onshore Order 2.III.B.1.f.

Wait on cement (WOC) time prior to drilling out for a primary cement job will be a minimum 18 hours for a water basin, 24 hours in the potash area, or 500 pounds compressive strength, whichever is greater for all casing strings. DURING THIS WOC TIME, NO DRILL PIPE, ETC. SHALL BE RUN IN THE HOLE. Provide compressive strengths including hours to reach required 500 pounds compressive strength prior to cementing each casing string. See individual casing strings for details regarding lead cement slurry requirements.

No pea gravel permitted for remedial or fall back remedial without prior authorization from the BLM engineer.

Secretary's Potash
Possible water/brine flows in the Salado, Castile, Delaware and Bone Spring.
Possible lost circulation in the Delaware and Bone Spring.

1. The **13-3/8** inch surface casing shall be set at approximately **650** feet (a minimum of 25 feet into the Rustler Anhydrite and above the salt) and cemented to the surface. If the salt is encountered, the casing is to be set 25 feet above the salt.

    a. If cement does not circulate to the surface, the appropriate BLM office shall be notified and a temperature survey utilizing an electronic type temperature survey with surface log readout will be used or a cement bond log shall be run to verify the top of the cement. Temperature survey will be run a minimum of six hours after pumping cement and ideally between 8-10 hours after completing the cement job.

    b. Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry.

    c. Wait on cement (WOC) time for a remedial job will be a minimum of 4 hours after bringing cement to surface or 500 pounds compressive strength, whichever is greater.

    d. If cement falls back, remedial cementing will be done prior to drilling out that string.

2. The minimum required fill of cement behind the **9-5/8** inch intermediate casing is:

    ☒ Cement to surface. If cement does not circulate see B.1.a, c-d above.
    Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to potash.

Formation below the 9-5/8" shoe to be tested according to Onshore Order 2.III.B.1.i. Test to be done as a mud equivalency test using the mud weight necessary for the pore pressure of the formation below the shoe (not the mud weight required to prevent dissolving the salt formation) and the mud weight for the bottom of the hole. Report results to BLM office.

Centralizers required on horizontal leg, must be type for horizontal service and minimum of one every other joint.

3. The minimum required fill of cement behind the **5-1/2** inch production casing is:

    a. First stage to DV tool, cement shall:

    ☒ Cement to circulate. If cement does not circulate, contact the appropriate BLM office before proceeding with second stage cement job. Operator should have plans as to how they will achieve circulation on the next stage.

    b. Second stage above DV tool, cement shall:

    ☒ Cement should tie-back at least **500** feet into previous casing string due to Secretary's Potash. Operator shall provide method of verification.

4. If hardband drill pipe is rotated inside casing, returns will be monitored for metal. If metal is found in samples, drill pipe will be pulled and rubber protectors which have a larger diameter than the tool joints of the drill pipe will be installed prior to continuing drilling operations.

C. PRESSURE CONTROL

1. All blowout preventer (BOP) and related equipment (BOPE) shall comply with well control requirements as described in Onshore Oil and Gas Order No. 2 and API RP 53 Sec. 17.

2. **Variance approved to use flex line (Serial # 34137) from BOP to choke manifold. Check condition of 3" flexible line from BOP to choke manifold, replace if exterior is damaged or if line fails test. Line to be as straight as possible with no hard bends.**

3. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the surface casing shoe shall be **3000 (3M)** psi. **Operator installing a 5M system and testing as a 3M.**

    a. **For surface casing only:** If the BOP/BOPE is to be tested against casing, the wait on cement (WOC) time for that casing is to be met (see WOC statement at start of casing section). Independent service company required.

4. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the **9-5/8"** intermediate casing shoe shall be **5000 (5M)** psi. **5M system requires an HCR valve, remote kill line and annular to match. The remote kill line is to be installed prior to testing the system and tested to stack pressure.**

5. The appropriate BLM office shall be notified a minimum of 4 hours in advance for a representative to witness the tests.

    a. In potash areas, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. For all casing strings, casing cut-off and BOP installation can be initiated at twelve hours after bumping the plug. However, **no tests** shall commence until the cement has had a minimum of 24 hours setup time.

    b. The tests shall be done by an independent service company utilizing a test plug **not a cup or J-packer**. The operator also has the option of utilizing an independent tester to test without a plug (i.e. against the casing) pursuant to Onshore Order 2 with the pressure not to exceed 70% of the burst rating for the casing. Any test against the casing must meet the WOC time for water basin (18 hours) or potash (24 hours) prior to initiating the test.

    c. The results of the test shall be reported to the appropriate BLM office.

    d. All tests are required to be recorded on a calibrated test chart. **A copy of the BOP/BOPE test chart and a copy of independent service company test will be submitted to the appropriate BLM office.**

    e. The BOP/BOPE test shall include a low pressure test from 250 to 300 psi. The test will be held for a minimum of 10 minutes if test is done with a test plug and 30 minutes without a test plug.

D. DRILLING MUD

See Waste Material section for oil based mud disposal.

E. DRILL STEM TEST

If drill stem tests are performed, Onshore Order 2.III.D shall be followed.

F. WASTE MATERIAL AND FLUIDS

All waste (i.e. drilling fluids **(oil based mud)**, trash, salts, chemicals, sewage, gray water, etc.) created as a result of drilling operations and completion operations shall be safely contained and disposed of properly at a waste disposal facility. No waste material or fluid shall be disposed of on the well location or surrounding area.

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VIII. PRODUCTION (POST DRILLING)

A. WELL STRUCTURES & FACILITIES

Placement of Production Facilities
Production facilities should be placed on the well pad to allow for maximum interim recontouring and revegetation of the well location.

Containment Structures
The containment structure shall be constructed to hold the capacity of the entire contents of the largest tank, plus 24 hour production, unless more stringent protective requirements are deemed necessary by the Authorized Officer.

Painting Requirement
All above-ground structures including meter housing that are not subject to safety requirements shall be painted a flat non-reflective paint color
Shale Green, Munsell Soil Color Chart # 5Y 4/2

B. PIPELINES – not requested

C. ELECTRIC LINES – not requested

IX. INTERIM RECLAMATION

During the life of the development, all disturbed areas not needed for active support of production operations should undergo interim reclamation in order to minimize the environmental impacts of development on other resources and uses.

Within six (6) months of well completion, operators should work with BLM surface management specialists (Jim Amos: 575-234-5909) to devise the best strategies to reduce the size of the location. Interim reclamation should allow for remedial well operations, as well as safe and efficient removal of oil and gas.

During reclamation, the removal of caliche is important to increasing the success of revegetating the site. Removed caliche that is free of contaminants may be used for road repairs, fire walls or for building other roads and locations. In order to operate the well or complete workover operations, it may be necessary to drive, park and operate on restored interim vegetation within the previously disturbed area. Disturbing revegetated areas for production or workover operations will be allowed. If there is significant disturbance and loss of vegetation, the area will need to be revegetated. Communicate with the appropriate BLM office for any exceptions/exemptions if needed.

All disturbed areas after they have been satisfactorily prepared need to be reseeded with the seed mixture provided below.

Upon completion of interim reclamation, the operator shall submit a Sundry Notices and Reports on Wells, Subsequent Report of Reclamation (Form 3160-5).

X. FINAL ABANDONMENT & RECLAMATION

At final abandonment, well locations, production facilities, and access roads must undergo "final" reclamation so that the character and productivity of the land are restored.

Earthwork for final reclamation must be completed within six (6) months of well plugging. All pads, pits, facility locations and roads must be reclaimed to a satisfactory revegetated, safe, and stable condition, unless an agreement is made with the landowner or BLM to keep the road and/or pad intact.

After all disturbed areas have been satisfactorily prepared, these areas need to be revegetated with the seed mixture provided below. Seeding should be accomplished by drilling on the contour whenever practical or by other approved methods. Seeding may need to be repeated until revegetation is successful, as determined by the BLM.

Operators shall contact a BLM surface protection specialist prior to surface abandonment operations for site specific objectives (Jim Amos: 575-234-5909).

Ground-level Abandoned Well Marker to avoid raptor perching: Upon the plugging and subsequent abandonment of the well, the well marker will be installed at ground level on a plate containing the pertinent information for the plugged well.

Seed Mixture for LPC Sand/Shinnery Sites

The holder shall seed all disturbed areas with the seed mixture listed below. The seed mixture shall be planted in the amounts specified in pounds of pure live seed (PLS)* per acre. There shall be no primary or secondary noxious weeds in the seed mixture. Seed will be tested and the viability testing of seed will be done in accordance with State law(s) and within nine (9) months prior to purchase. Commercial seed will be either certified or registered seed. The seed container will be tagged in accordance with State law(s) and available for inspection by the authorized officer.

Seed will be planted using a drill equipped with a depth regulator to ensure proper depth of planting where drilling is possible. The seed mixture will be evenly and uniformly planted over the disturbed area (smaller/heavier seeds have a tendency to drop the bottom of the drill and are planted first). The holder shall take appropriate measures to ensure this does not occur. Where drilling is not possible, seed will be broadcast and the area shall be raked or chained to cover the seed. When broadcasting the seed, the pounds per acre are to be doubled. The seeding will be repeated until a satisfactory stand is established as determined by the authorized officer. Evaluation of growth will not be made before completion of at least one full growing season after seeding.

Species to be planted in pounds of pure live seed* per acre:

Species	lb/acre
Plains Bristlegrass	5lbs/A
Sand Bluestem	5lbs/A
Little Bluestem	3lbs/A
Big Bluestem	6lbs/A
Plains Coreopsis	2lbs/A
Sand Dropseed	1lbs/A
Four-winged Saltbush	5lbs/A

*Pounds of pure live seed:

Pounds of seed **x** percent purity **x** percent germination = pounds pure live seed