Form 3160-5
(August 1999)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

OCD-HOBBS

FORM APROVED
OMB NO. 1004-0135
EXPIRES: NOVEMBER 30, 2000

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals

SUBMIT IN TRIPLICATE

1a. Type of Well ☑ Oil Well ☐ Gas Well ☐ Other	5. Lease Serial No. **NMNM-68084**
	6. If Indian, Allottee or Tribe Name
	7. Unit or CA Agreement Name and No.
2. Name of Operator **DEVON ENERGY PRODUCTION COMPANY, LP**	8. Well Name and No. **Mesa Verde 7 Federal 3H**
3 Address and Telephone No. **20 North Broadway, Oklahoma City, OK 73102** **405-552-8198**	9. API Well No. **30-025-39444**
4. Location of Well (Report location clearly and in accordance with Federal requirements)* **330 FSL & 1980 FWL, Unit N Section 7 24S 32E** **BHL: 1650' FNL & 1980' FWL Unit F Section 7 24S 32E**	10. Field and Pool, or Exploratory **Mesa Verde Delaware**
	12. County or Parish **LEA** 13. State **NM**

CHECK APPROPRIATE BOX(s) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OS SUBMISSION	TYPE OF ACTION			
☑ Notice of Intent	☐ Acidize	☐ Deepen	☐ Production (Start/Resume)	☐ Water Shut-Off
☐ Subsequent Report	☐ Alter Casing	☐ Fracture Treat	☐ Reclamation	☐ Well Integrity
☐ Final Abandonment Notice	☐ Casing Repair	☐ New Construction	☐ Recomplete	☐ Other
	☑ Change Plans	☐ Plug and Abandon	☐ Temporarily Abandon	
	☐ Convert to Injection	☐ Plug Back	☐ Water Disposal	

13 Describe Proposed or Completed Operations (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work and approximate duration thereof If the proposal deepen directionally or recomplete horizontally, give subsurface location and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No on file with BLM/BIA Required subsequent reports shall be filed within 30 days following completion of the involved operations If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed Final Abandonment Notices shall be filed only after all requirement, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection)

Devon Energy Production Company, LP respectfully requests approval to change our proposed well from a horizontal drill to a vertical drill. The attached revised drilling program contains the casing and cement changes.

The surface location will remain at 330' FSL and 1980' FWL Unit N Section 7 24S 32E Lea County, NM.

RECEIVED
OCT 19 2009
HOBBSOCD

SEE ATTACHED FOR CONDITIONS OF APPROVAL

14 I hereby certify that the foregoing is true and correct

Signed _____ Name **Norvella Adams** Title Sr. Staff Engineering Technician Date 9/22/2009

PETROLEUM ENGINEER
OCT 19 2009

(This space for Federal or State Office use)

Approved by _____ Title _____ Date OCT 13 2009

/s/ Dustin Winkler

BUREAU OF LAND MANAGEMENT
CARLSBAD FIELD OFFICE

APPROVED

Conditions of approval, if any:

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

*See Instruction on Reverse Side

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OCT 19 2009
HOBBSOCD

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 and Natural Resources Department

OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, New Mexico 87505

Form C-102
Revised October 12, 2005

Submit to Appropriate District Office
State Lease - 4 Copies
Fee Lease - 3 Copies

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number	Pool Code	Pool Name
30-025-39444	96191	Mesa Verde Delaware

Property Code	Property Name	Well Number
30873	MESA VERDE "7" FEDERAL	3
OGRID No.	**Operator Name**	**Elevation**
6137	DEVON ENERGY PRODUCTION COMPANY LP	3584'

Surface Location

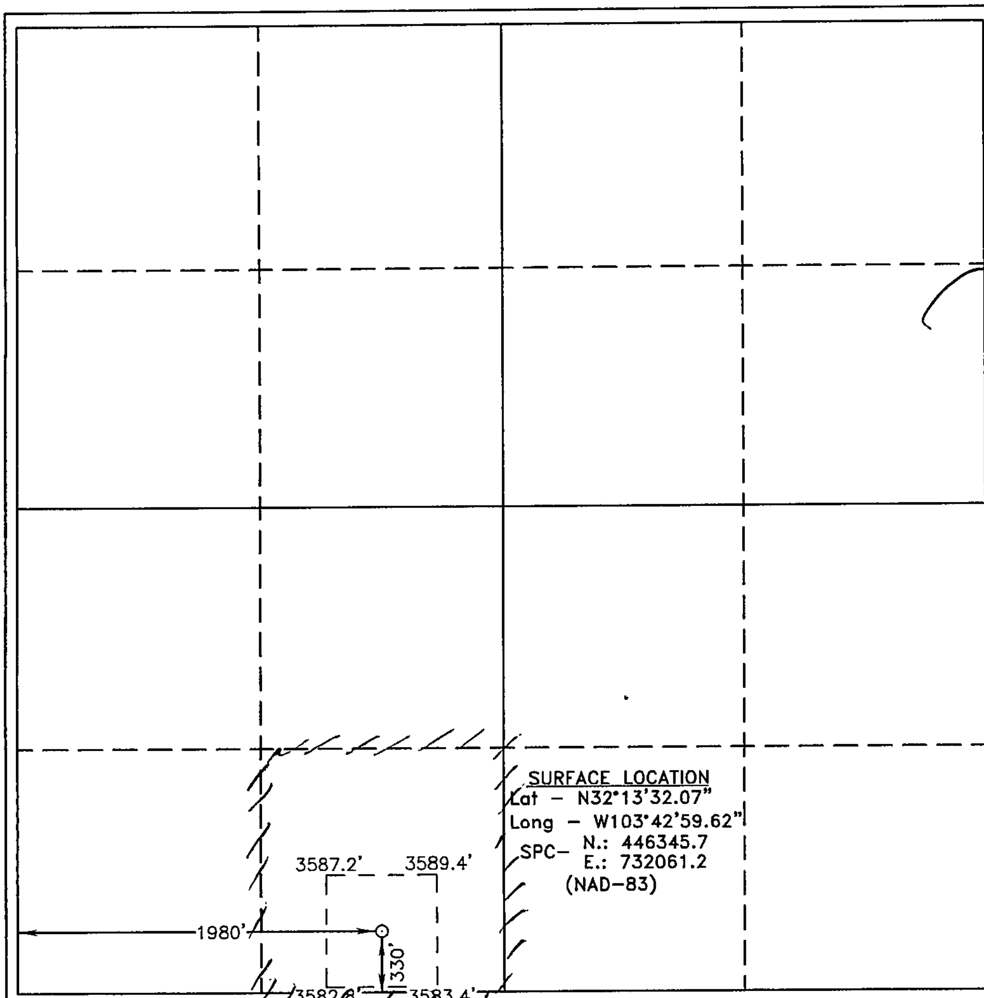
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
N	7	24 S	32 E		330	SOUTH	1980	WEST	LEA

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

Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
40			

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



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 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] 9/22/09
Signature Date

Norvella Adams
Printed Name

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 supervison, and that the same is true and correct to the best of my belief.

SEPTEMBER 24, 2008
Date Surveyed
Signature & Seal of Professional Surveyor

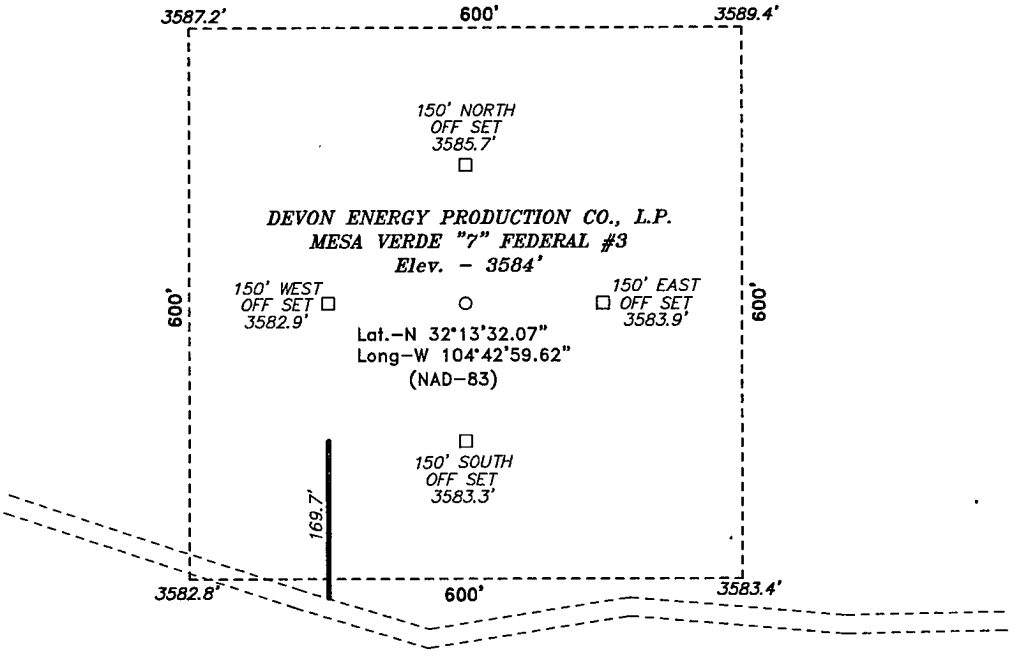
GARY L. JONES NEW MEXICO 7977 REGISTERED PROFESSIONAL LAND SURVEYOR

W.O.

Certificate No. Gary L. Jones 7977

BASIN SURVEYS

SECTION 7, TOWNSHIP 24 SOUTH, RANGE 32 EAST, N.M.P.M.,
LEA COUNTY, **NEW MEXICO.**



200 0 200 400 FEET

SCALE: 1" = 200'

Directions to Location:

FROM THE JUNCTION OF HWY 128 AND BUCK JACKSON, GO SOUTHWESTERLY 0.4 MILES TO LEASE ROAD, ON LEASE ROAD GO SOUTH 0.4 MILES TO 2-TRACK, ON 2-TRACK GO EASTERLY 0.35 MILES TO PROPOSED LEASE ROAD.

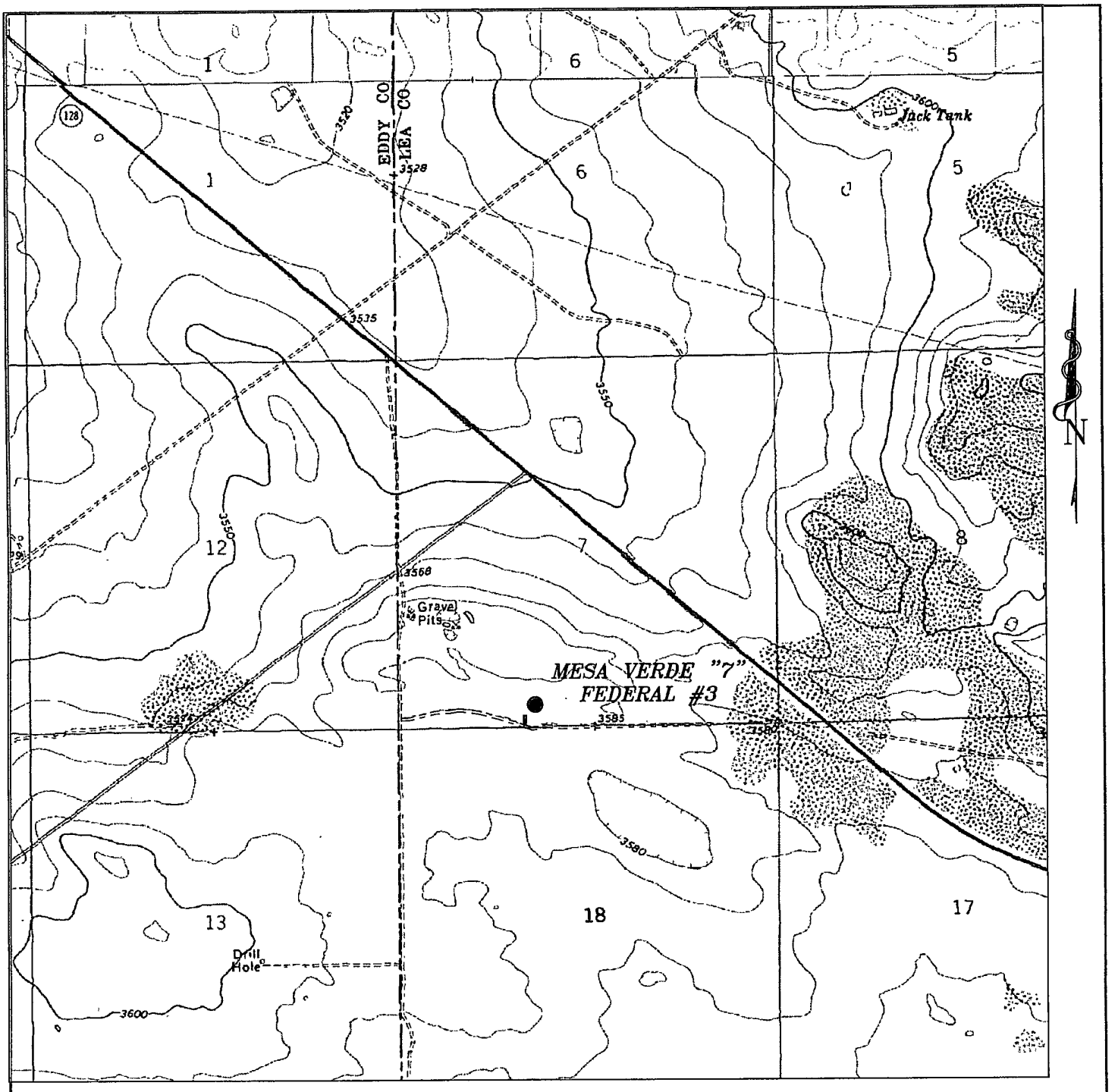
DEVON ENERGY PROD. CO., L.P.

REF: MESA VERDE "7" FEDERAL #3 / WELL PAD TOPO

THE MESA VERDE "7" FEDERAL #3 LOCATED 330' FROM THE SOUTH LINE AND 1980' FROM THE WEST LINE OF SECTION 7, TOWNSHIP 24 SOUTH, RANGE 32 EAST, N.M.P.M., LEA COUNTY, NEW MEXICO.

BASIN SURVEYS P.O. BOX 1786 - HOBBS, NEW MEXICO

W.O. Number: 20493	Drawn By: J. M. SMALL		
Date: 09-25-2008	Disk: 20493 JMS	Survey Date: 09-24-2008	Sheet 1 of 1 Sheets



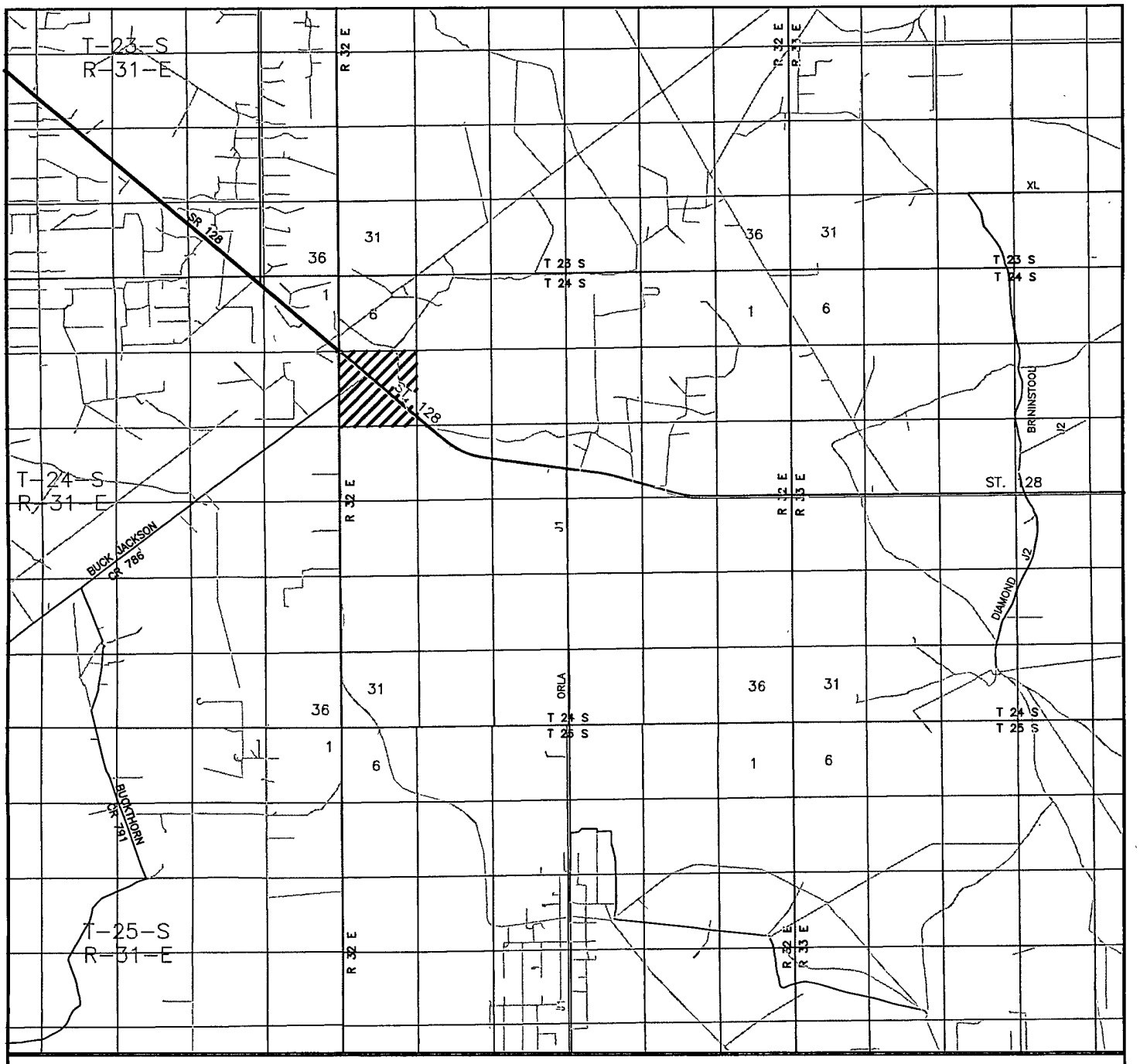
MESA VERDE "7" FEDERAL #3
Located at 330' FSL AND 1980' FWL
Section 7, Township 24 South, Range 32 East,
N.M.P.M., Lea County, New Mexico.

basin surveys
focused on excellence in the oilfield

P.O. Box 1786
1120 N. West County Rd.
Hobbs, New Mexico 88241
(575) 393-7316 - Office
(575) 392-2206 - Fax
basinsurveys.com

W.O. Number:	JMS 20493
Survey Date:	09-24-2008
Scale:	1" = 2000'
Date:	09-25-2008

DEVON ENERGY PROD. CO., L.P.



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1120 N. West County Rd.
Hobbs, New Mexico 88241
(575) 393-7316 - Office
(575) 392-2206 - Fax
basinsurveys.com

W.O. Number:	JMS 20493
Survey Date:	09-24-2008
Scale:	1" = 2 MILES
Date:	09-25-2008

DEVON ENERGY PROD. CO., L.P.

DRILLING PROGRAM – Revised 9-22-09

Devon Energy Production Company, LP
Mesa Verde 7 Federal 3
Surface Location: 330' FSL & 1980' FWL, Unit N, Sec 7 T24S R32E, Lea, NM
Bottom Hole Location: 330' FSL & 1980' FWL, Unit N, Sec 7 T24S R32E, Lea, NM

1. Geologic Name of Surface Formation

a. Permian

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

a.	Quaternary	surface	
b.	Rustler	851'	
c.	Salado	2464'	
d.	Base Salt	4401'	
e.	Delaware/Lamar	4624'	Oil & Gas
f.	Bell Canyon	4661'	Oil & Gas
g.	Cherry Canyon	5544'	Oil & Gas
h.	Brushy Canyon	6817'	Oil & Gas

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 8 5/8" casing at 4500' and circulating cement back to surface. The Delaware intervals will be isolated by setting 5 1/2" casing to total depth.

3. Casing Program:

Hole Size	Hole Interval	OD Csg	Casing Interval	Weight	Collar	Grade
14 3/4"	0'- 900'	11 3/4"	0'- 900'	42#	ST&C	H-40
11"	900-4500'	8 5/8"	0-4500'	~~24#~~ & 32#	LT&C	K-55
7 7/8"	4500 -9900'	5 1/2"	0'-9900'	17#	LT&C	N-80

Per Operator

Design Parameter Factors:

Casing Size	Collapse Design Factor	Burst Design Factor	Tension Design Factor
11 ¾"	2.54	4.7	2.42
8 5/8"	1.25	1.95	2.89
5 ½"	1.34	1.65	2.04

4. **Cement Program:** See COA

a. 11 3/4"	Surface	Lead: 285 sx (35:65) Poz Class C + 5% NaCl + ¼ lbs/sx Celloflake + 4% Bentonite + 1% Sodium Metasilicate + 5% MPA-5, 12.8 ppg, 1.97 cf/sx, 10.56 gps. Tail: 300 sx Class C cement + 2% $CaCl_2$ + ¼ #/sx Celloflake, 14.8 ppg, 1.35 cf/sx, 6.35 gps. TOC = 0.
b. 8 5/8"	Intermediate	Lead: 955 sx (35:65) Poz Class C + 5% NaCl + ¼ lbs/sx Cello Flake + 6% Bentonite + 0.25% FL-52A; 12.5 ppg, 2.04 cf/sx, 11.24 gps. Tail: 300 sx (60:40) Poz Class C + 5% NaCl + ¼ lbs/sx Cello Flake + 0.1% Sodium Metasilicate + 4% MPA-5; 13.8 ppg, 1.37 cf/sx, 6.43 gps. TOC = 0.
c. 5 1/2"	Liner	2 stage job with DV tool at 6950'. **Stage 1:** 435 sacks (15:61:11) Class C cement + 1% KCl + 0.75% EC-1 + 0.4% CD-32 + 3 lbs/sx LCM-1 + 0.6% FL-25 + 0.6% FL-52A. 13.30 ppg, 1.56 cf/sx, 7.55 gps. **Stage 2:** Lead with 375 sacks (35:65) Poz Class C + ¼ #/sx Celloflake + 6% Bentonite, 12.5 ppg, 1.94 cf/sx, 10.65 gps. Tail with 150 sacks (60:40) Poz Class C + 2% NaCl + 0.1% Sodium Metasilicate + 4% MPA-5, 13.8 ppg, 1.35 cf/sx, 6.29 gps. TOC = 4000'

The above cement volumes could be revised pending the caliper measurement from the open hole logs. The top of cement is designed to reach the surface. All casing is new and API approved.

5. **Pressure Control Equipment:** See COA

The blowout preventor equipment (BOP) shown in Exhibit #1 will consist of a (5 K system) double ram type (5000 psi WP) preventor and a bag-type (Hydril) preventor (5000 psi WP) and rotating head. Both units will be hydraulically operated and the ram type preventor will be equipped with blind rams on top and 4 ½" drill pipe rams on bottom. **The hydrill will be tested to 1000 psi (high) and 250 psi (low).** Prior to drilling out 9 5/8" casing shoe, the BOP will be tested per the BLM Drilling Operations Order # 2.

Pipe rams will be operated and checked each 24-hour period and each time the drill pipe is out of the hole. These functional tests will be documented on the daily driller's log. A 2" kill line and 3" choke line will be incorporated in the drilling spool below the ram-type BOP. Other accessory BOP equipment will include a Kelly cock, floor safety valve, choke lines and choke manifold having 5000 psi WP rating.

6. **Proposed Mud Circulation System**

Depth	Mud Wt.	Visc	Fluid Loss	Type System
0' – 900'	8.4 – 9.0	32-34	NC	Fresh Water/Gel
900'– 4500'	8.6 – 9.0	28 -30	NC	Brine
4500'- 9,900'	8.6 – 9.0	28	NC - 20	Fresh

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

7. **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 8 5/8" casing shoe until the 5 1/2" casing is set. Breathing equipment will be on location upon drilling the 8 5/8" shoe until total depth is reached.

8. **Logging, Coring, and Testing Program:**
   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:
      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.

See COA

9. **Potential Hazards:**
   a. No abnormal pressures or temperatures are expected. A H2S contingency plan will be provided. All personnel will be familiar with all aspects of safe operation of equipment being used to drill this well. Estimated BHP 800 psi and Estimated BHT 90°.

10. **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 30 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.

PECOS DISTRICT
CONDITIONS OF APPROVAL

OPERATOR'S NAME:	Devon Energy Production Company, LP
LEASE NO.:	NM-68084
WELL NAME & NO.:	Mesa Verde 7 Federal 3
SURFACE HOLE FOOTAGE:	330' FSL & 1980' FWL
LOCATION:	Section 7, T. 24 S., R 32 E., NMPM
COUNTY:	Lea County, New Mexico

I. 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

☒ **Lea County**
Call the Hobbs Field Station, 414 West Taylor, Hobbs NM 88240,
(575) 393-3612

1. **Hydrogen Sulfide has been reported as a hazard, but no measurements have been recorded. It is recommended that monitoring equipment be onsite for potential Hydrogen Sulfide. 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.

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 CAL/GR/N well log run from TD to surface 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 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. 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.

Possible water flows in the Salado, Castile, Delaware and Bone Springs.
Possible lost circulation in the Delaware and Bone Springs.

1. The **11-3/4** inch surface casing shall be set at **approximately 900 feet (a minimum of 25 feet into the Rustler Anhydrite and above the salt)** and cemented to the surface.

    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 a surface log readout will be used or a cement bond log shall be run to verify the top of the cement.

    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 **8-5/8** inch intermediate casing is:

☒ Cement to surface. If cement does not circulate see B.1.a, c-d above.
Casing to be set in the Fletcher Anhydrite of the Salado Group.

Formation below the 8-5/8" 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.

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.

b. Second stage above DV tool, cement shall:

☒ Cement should tie-back at least 500 feet into previous casing string. 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. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the surface casing shoe shall be **2000 (2M)** psi. Though **5M** hydril will be in place, variance to test as **2M** hydril.

3. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the **8-5/8"** 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.**

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

   a. The tests shall be done by an independent service company.

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

   c. 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.**

   d. 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.

   e. BOP/BOPE must be tested by an independent service company within 500 feet of the top of the **Wolfcamp** formation if the time between the setting of the intermediate casing and reaching this depth exceeds 20 days. This test does not exclude the test prior to drilling out the casing shoe as per Onshore Order No. 2.

   f. **Effective November 1, 2008, no variances will be granted on reduced pressure tests on the surface casing and BOP/BOPE. Onshore Order 2 requirements will be in effect.**

D. DRILLING MUD

Mud system monitoring equipment, with derrick floor indicators and visual and audio alarms, shall be operating before drilling into the **Wolfcamp** formation, and shall be used until production casing is run and cemented.

E. DRILL STEM TEST

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

DHW 100109