

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of Work ☒ DRILL ☐ REENTER
1b. Type of Well ☐ Oil Well ☒ Gas Well ☐ Other ☐ Single Zone ☐ Multiple Zone

2. Name of Operator
Attn: Diane Busch Devon Energy Production Company, L.P.

3a. Address 20 N. Broadway Oklahoma City, OK 73102
3b. Phone No. (include area code) (405) 228-4362

4. Location of well (Report location clearly and in accordance with any State requirements. *)
At surface 1880' FSL & 1300' FEL NE SE Unit I
At bottom hole 900' FSL & 1975' FEL SW SE Unit O
At proposed prod. zone

14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE*
Approximately 58 miles northeast of Bloomfield, New Mexico

15. Distance from proposed* location to nearest property or lease line, ft. 1300'
(Also to nearest drlg unit line, if any)
16. No. of Acres in lease 640
17. Spacing Unit dedicated to this well 320 E/2

18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft.
19. Proposed Depth 3455'
20. BLM/ BIA Bond No. on file CO-1104

21. Elevations (Show whether DF, RT, GR, etc.) 6479' GL
22. Approximate date work will start* Upon Approval
23. Estimated Duration 20 Days

24. Attachments ~~Drilling operations authorized are subject to compliance with attached General Requirements.~~
~~This action is subject to technical and procedural review pursuant to 43 CFR 3165.3 and appeal pursuant to 43 CFR 3165.4~~

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 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 Diane Busch Name (Printed/ Typed) Diane Busch Date 5-30-03
Title Sr. Operations Technician
Approved By (Signature) /s/ David J. Mankiewicz Name (Printed/ Typed) David J. Mankiewicz Date JUN 12 2003
Title 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 operations thereon.

Conditions of approval, if any, are attached.

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.

* (Instructions on reverse)

HOLD C104 FOR Directional survey NMOC

District I
PO Box 1980, Hobbs NM 88241-1980
District II
PO Drawer KK, Artesia, NM 87211-0719
District III
1000 Rio Brazos Rd., Aztec, NM 87410
District IV
PO Box 2088, Santa Fe, NM 87504-2088

State of New Mexico
Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION
PO Box 2088
Santa Fe, NM 87504-2088

Form C-102
Revised February 21, 1994

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

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

¹ API Number 30-039-2744 1/4		² Pool Code 71629		³ Pool Name BASIN FRUITLAND COAL	
⁴ Property Code 19641		⁵ Property Name NEBU			⁶ Well Number # 497A
⁷ OGRID No. 6137		⁸ Operator Name Devon Energy Production Company, L.P.			⁹ Elevation 6479

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
I	30	31 N	6 W		1880	SOUTH	1300	EAST	Rio Arriba

¹¹ Bottom Hole Location If Different From Surface

⁷ UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
O	30	31 N	6 W		900	SOUTH	1975	EAST	Rio Arriba

¹² Dedicated Acres FC-E/320	¹³ Joint or Infill	¹⁴ Consolidation Code	¹⁵ Order No.
---	-------------------------------	----------------------------------	-------------------------

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

5280(R)	30	5271(R)	Bottom Hole Location 900' F/SL 1975' F/EL	Azimuth - 214°31' 1190'	1300'	1881	5273(R)	¹⁷ OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief. Diane Busch Signature DIANE BUSCH Printed Name SR. OPERATIONS TECH. Title 5-30-03 Date
								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. January 27, 2003 Date of Survey Signature and Seal of Professional Surveyor GARY D. VANN NEW MEXICO REGISTERED PROFESSIONAL LAND SURVEYOR 7016 Certificate Number

**NEBU 497A
Unit I 30-31N-6W
Rio Arriba Co., NM**

DRILLING PLAN

1. ESTIMATED TOPS OF IMPORTANT GEOLOGIC MARKERS & ANTICIPATED WATER, OIL, GAS OR MINERAL FORMATIONS:

Formation	TMD (ft)	TVD (ft)	Hydrocarbon/Water Bearing Zones
San Jose	Surface	Surface	
Ojo Alamo	2819	2560'	Aquifer
Kirtland	2937	2665'	
Fruitland	3394	3110'	Gas
Pictured Cliffs	3739	3455'	Gas
TD	3739'	3455'	

All shows of fresh water and minerals will be adequately protected and reported.

2. PRESSURE CONTROL EQUIPMENT:

All well control equipment shall be in accordance with Onshore Order #2 for 2M systems.

The minimum specifications for pressure control equipment that will be provided are included on the attached schematic diagram which shows the size and pressure ratings.

2000# BOP With Pipe Rams
2000# BOP With Blind Rams

The anticipated bottom hole pressure is 300 psi.

Auxiliary equipment to be used:

- Upper kelly cock with handle available.

The manifold includes appropriate valves and adjustable chokes. The kill line will have one check valve. Ram type preventers will be pressure tested to full working pressure (utilizing a test plug) or 70% of the internal yield pressure (without a test plug) at:

- Initial installation
- Whenever any seal subject to test pressure is broken
- Following related repairs+
- At 30 day intervals

Pipe and blind rams shall be activated each trip.

A BOPE pit level drill will be conducted weekly for each drilling crew.

All tests and drills will be recorded in the drilling log.

The accumulator will have sufficient capacity to close all rams and retain 200 psi above pre-charge pressure without the use of closing unit pumps.

Master controls will be at the accumulator.

3. CASING & CEMENTING PROGRAM:

A. The proposed casing program will be as follows:

TMD	TVD	Hole Size	Size	Grade	Weight	Thread	Condition
0-250'	0-250'	12-1/4"	9-5/8"	H-40	32#	STC	New
0-3394'	0-3110'	8-3/4"	7"	K-55	23#	LTC	New
3344'-3739'	3060'-TD	6-1/4"	5-1/2"	K-55	15.5 #	LTC	New

All casing strings below the conductor shall be pressure tested to 0.22 psi/ft. of casing string length or 1500 psi, whichever is greater, but not to exceed 70% minimum internal yield.

Surface: The bottom three joints of the surface casing will have a minimum of one centralizer per joint and one centralizer every joint thereafter (Total 5 centralizers estimated)

7" Casing: The bottom three joints of the 7" casing will have a minimum of one centralizer per joint and one centralizer every fifth joint thereafter to above Ojo Alamo with one turbolizer below and throughout the Ojo Alamo. (Total 12 centralizers, 3 turbolizers estimated).

B. The proposed casing and cementing program will be as follows:

Surface String: 9-5/8" Surface cemented in a 12-1/4" hole at 250'.
32.3# H-40 ST&C 8 Rnd
Saw tooth guide shoe
Cemented with 200 sacks Class B mixed at 15.6 ppg w/.25 pps
celloflake, 2% calcium chloride. Yield 1.19 ft³/sx, cement
designed to circulate to surface.

Production String: 7" Intermediate cemented in an 8-3/4" hole.
23# J-55 LT&C 8 Rnd
Float Collar
Joint
Float Shoe
Cement with 450 sacks Class B 50/50 POZ, 3% gel, 5# gilsonite,
1/4"# Flocele, .1% CFR 3, .2% Halad 344, yield 1.47 ft³/sx.
Cement designed to circulate to surface.
Pending hole conditions cement baskets may be installed above
TD.

Liner: 5-1/2" Liner
15.5# J-55 LT&C 8 Rnd
Shoe
Not cemented

Actual volumes will be calculated and adjusted with caliper log prior to cementing.

4. DRILLING FLUIDS PROGRAM:

TMD	TVD	Type	Weight (ppg)	Viscosity	pH	Water Loss	Remarks
0-250'	0-250'	Spud	8.4-9.0	29-70	8.0	NC	FW gel
250-3394'	250-3110'	LSND	8.4-9.0	29-70	8.0	10-12	LCM as needed
3394-3739	3110-TD	Air					Foam as needed

NC = no control

Sufficient quantities of mud material will be maintained on site or be readily accessible for the purpose of assuring well control. Slow pump rates will be recorded on daily drilling report after mudding up. Visual mud monitoring will be conducted during operations.

5. EVALUATION PROGRAM:

Wire Line Logs: None