Form 3160-3
(August 1999)

RECEIVED
2003 MAY 29 AM 11:

FORM APPROVED
OMB NO. 1004-0136
Expires: November 30, 2000

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

5. Lease Serial No.
SF-078988

6. If Indian, Allottee or Tribe Name
N/A

7. If Unit or CA Agreement, Name and No.
NORTHEAST BLANCO UNIT

1a. Type of Work [X] DRILL [ ] REENTER

1b. Type of Well [ ] Oil Well [X] Gas Well [ ] Other [ ] Single Zone [X] Multiple Zone

8. Lease Name and Well No.
NEBU 303E

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

9. API Well No.
30-039-27447

3a. Address
20 N. Broadway Oklahoma City, OK 73102

3b. Phone No. *(include area code)*
(405) 228-4362

10. Field and Pool, or Exploratory
Blanco Mesaverde Basin Dakota

4. Location of well *(Report location clearly and In accordance with any State requirements.*)*
At surface **1785' FSL & 1470' FEL NW SE Unit J**
At bottom hole **1310' FNL & 1310' FEL NE NE Unit A**
At proposed prod. zone

11. Sec., T., R., M., or Blk. And Survey or Area
Sec. **20** ,T **31N** ,R **6W**
BH Sec. **20** ,T **31N** ,R **6W**

14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE*
Approximately 57 miles northeast of Bloomfield, New Mexico

12. County or Parish
Rio Arriba

13. State
NM

15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drlg unit line, if any)
1470'

16. No. of Acres in lease
2560

17. Spacing Unit dedicated to this well
320 E2

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

19. Proposed Depth
8000'

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

21. Elevations (Show whether DF. RT, GR, etc.)
6281' GL

22. Aproximate date work will start*
Uppon Approval

23. Estimated Duration
20 Days

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

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 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: 5-27-03

Title
Sr. Operations Technician

Approved By *(Signature)*
Name *(Printed/ Typed)*: /s/ David J. Mankiewicz
Date: SEP 15 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 applic 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 o States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

* (Instructions on reverse)

NMOCD

HOLD C104 FOR Directional Survey

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	[2] Pool Code	[3] Pool Name
30-039-27447	72319 / 71599	BLANCO MESAVERDE / BASIN DAKOTA

[4] Property Code	[5] Property Name	[6] Well Number
19641	NEBU	# 303E

[7] OGRID No.	[8] Operator Name	[9] Elevation
6137	Devon Energy Production Company, L.P.	6281

[10] Surface Location

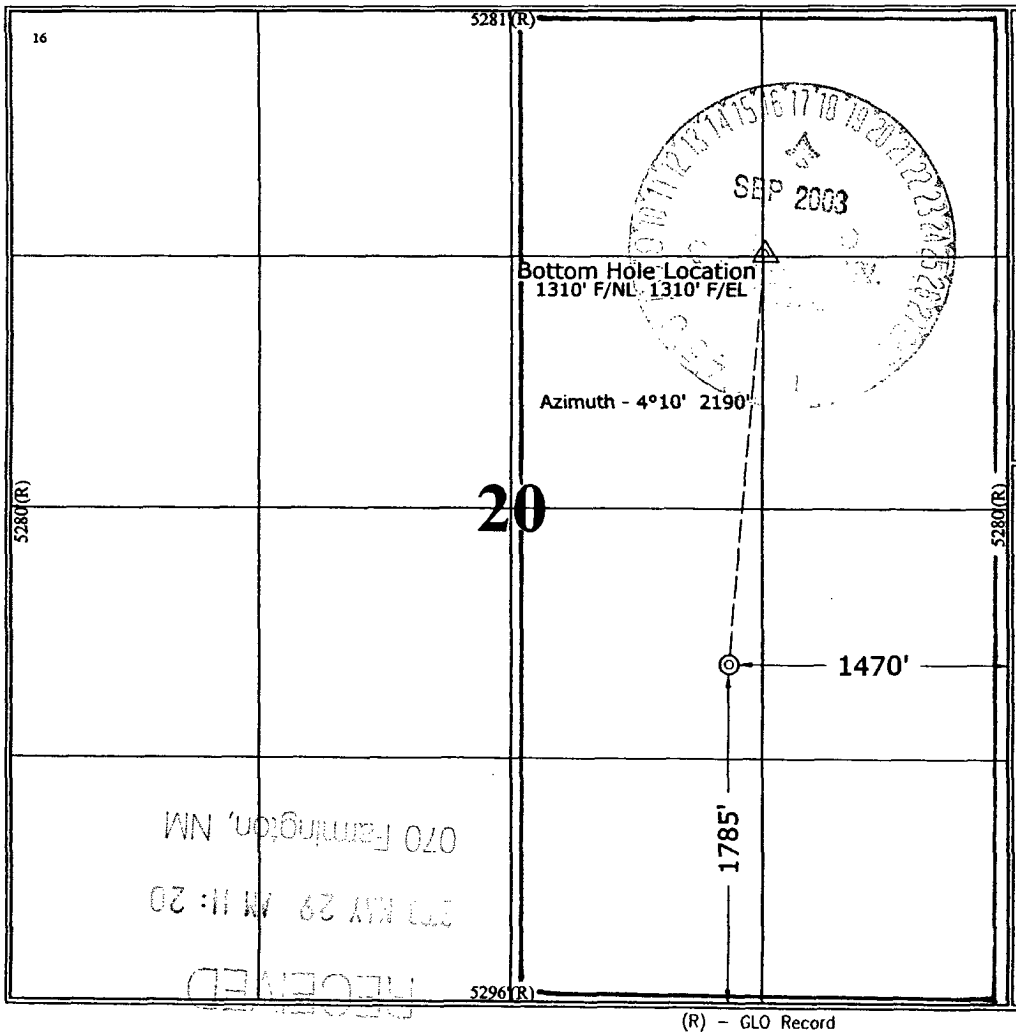
UL or Lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
J	20	31 N	6 W		1785	SOUTH	1470	EAST	Rio Arriba

[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
A	20	31 N	6 W		1310	NORTH	1310	EAST	Rio Arriba

[12] Dedicated Acres	[13] Joint or Infill	[14] Consolidation Code	[15] Order No.
MV - E/320 DAK - E/320			

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



(R) – GLO Record

[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

5-27-03
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
7016
REGISTERED PROFESSIONAL LAND SURVEYOR

7016
Certificate Number

NEBU 303E
Unit J 20-31N-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	
Ojo Alamo	2511'	2265	Aquifer
Kirtland	2645'	2380	
Fruitland	3128'	2795	Gas
Pictured Cliffs	3524'	3135	Gas
Lewis	3686'	3275	Gas
Intermediate TD	**3803'**	**3375**	
Huerfanito bentonite	4553'	4020	
Massive Cliff House	5812'	5250	Gas
Menefee	5842'	5280	Gas
Massive Point Lookout	6117'	5555	Gas
Mancos	6452'	5890	Gas
Gallup	7327'	6765	Gas
Greenhorn	8142'	7580	
Graneros	8192'	7630	
Dakota	8317'	7755	Gas
TD	**8562'**	**8000**	

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 and 2000# BOP With Blind Rams

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. Anticipated bottom hole pressure is 3400 psi.

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
0-3803'	0-3375'	8-3/4"	7"	K-55	23#	LTC	New
0-8562'	0'-TD	6-1/4"	4-1/2"	K-55	11.6 #	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)

Intermediate: 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 turbolizers below and throughout the Ojo Alamo. (Total 12 centralizers, 3 turbolizers estimated).

Production: The bottom three joints will have a minimum of one centralizer per joint and one centralizer every fifth joint to 4500' (estimated 22 centralizers used). Centralizers will be open bow spring or basket bow spring type.

B. The proposed cementing program will be as follows:

Surface String: Cement will be circulated to surface.

Lead: 200 sks Class "B" with additives mixed at 15.6 ppg, 1.19 ft^3/sks.

Intermediate String: Cement will be circulated to surface.

Lead: 575 sks 50/50 Poz with additives mixed at 13.0 ppg, 1.44 ft^3/sks prior to foaming, 9 ppg,2.18 ft^3/sks after foaming.
Tail: 75 sks 50/50 Poz with additives mixed at 13.0 ppg, 1.44 ft^3/sks.

If hole conditions dictate, an alternate, two stage cement design will be used: Stage 1: 85 sacks Class B 50/50 POZ, 3% gel, 5# Gilsonite, ¼# Flocele, 1/10% CFR 3, .2% Halad 344, Yield 1.47 ft^3/sks. Stage 2: 450 sacks Class B 50/50 POZ, 3% gel, 5# Gilsonite, ¼# Flocele, .1% CFR 3, .2% Halad 344, Yield 1.47 ft^3/sks. Cement designed to circulate to surface.

Production String: TOC designed to circulate to surface, cement will tie into the intermediate casing as a minimum. Volumes may vary with actual well characteristics.

Lead: 500 sks 50/50 Poz with additives mixed at 13.0 ppg, Yield 1.47 ft^3/sks.

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

If hole conditions dictate, an alternate, two stage cement design will be used. Stage 1: 325 sxs 50/50 POZ, 3% gel, .9%Halad 9, .2% CFR 3, 5# Gilsonite & ¼# Flocele. Yield 1.47 13#. Stage 2: Lead: 450 sx 50/50 POZ, 3% Gel, .9% Halad 9, .2% CFR 3, 5# Gilsonite & ¼# Flocele. Yield 1.47 13 ppg. Tail: 25 sx (5 bbls) Class B .4% Halad 9. Yield 1.18 15.6#.

4. DRILLING FLUIDS PROGRAM:

TMD	TVD	Type	Weight (ppg)	Viscosity	pH	Water Loss	Remarks
0-3803'	0-3375'	Spud-foam	8.4-9.0	29-70	8.0	NC	FW gel, LSND or stiff foam
3803'-8317'	3375-7755'	Air				NC	
8317-TD	7755-TD	Mud	8.5-9.0*	30-50	8.0-10.0	8-10cc @ TD	Low solids – nondispersed. * Min Wt. to control formation pressure.

NC = no control