

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL, DEEPEN, OR PLUG BACK

1a. Type of Work DRILL ✓	5. Lease Number SF-079492A Unit Reporting Number DK-8910009500 MV-891000950A
1b. Type of Well GAS	6. If Indian, All. or Tribe
2. Operator BURLINGTON RESOURCES Oil & Gas Company	7. Unit Agreement Name San Juan 27-5 Unit
3. Address & Phone No. of Operator PO Box 4289, Farmington, NM 87499 (505) 326-9700	8. Farm or Lease Name San Juan 27-5 Unit 9. Well Number 57M
4. Location of Well 1570' FNL, 1660' FEL, Latitude 36° 34.6, Longitude 107° 18.4	10. Field, Pool, Wildcat Blanco MV/Basin DK 11. Sec., Twn, Rge, Mer. (NMPM) G Sec. 13, T-27-N, R-5-W API # 30-039- 26293
14. Distance in Miles from Nearest Town 50 miles from Blanco	12. County Rio Arriba
15. Distance from Proposed Location to Nearest Property or Lease Line 1570'	13. State NM
16. Acres in Lease	17. Acres Assigned to Well DK - 320 N/2 MV - 320 E/2
18. Distance from Proposed Location to Nearest Well, Drig, Compl, or Applied for on this Lease 600'	20. Rotary or Cable Tools Rotary
19. Proposed Depth 8128'	22. Approx. Date Work will Start
21. Elevations (DF, FT, GR, Etc.) 6846' GR ✓	
23. Proposed Casing and Cementing Program See Operations Plan attached	DRILLING OPERATIONS AUTHORIZED ARE SUBJECT TO COMPLIANCE WITH ATTACHED "GENERAL REQUIREMENTS". 12-6-99
24. Authorized by: <u>[Signature]</u> Regulatory/Compliance Administrator	Date

PERMIT NO. _____ APPROVAL DATE _____
APPROVED BY /s/ Jim Lovato TITLE _____ DATE MAY 4 2 2000

Archaeological Report to be submitted

Threatened and Endangered Species Report to be submitted

NOTE: This format is issued in lieu of U.S. BLM Form 3160-3

Title 18 U.S.C. Section 1001, makes 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 presentations as to any matter within its jurisdiction.

OK [Signature]

[Signature]

NMOC

DISTRICT I
P.O. Box 1980, Hobbs, N.M. 88241-1980

State of New Mexico
Energy, Minerals & Natural Resources Department

Form C-102
Revised February 21, 1994

DISTRICT II
P.O. Drawer DD, Artesia, N.M. 88211-0719

Instructions on back
Submit to Appropriate District Office

DISTRICT III
1000 Rio Brazos Rd., Aztec, N.M. 87410

OIL CONSERVATION DIVISION

P.O. Box 2088
Santa Fe, NM 87504-2088

State Lease - 4 Copies
Fee Lease - 3 Copies

DISTRICT IV
P.O. Box 2088, Santa Fe, NM 87504-2088

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

¹ API Number 30-039-26293		² Pool Code 72319/71599		³ Pool Name Blanco Mesaverde/Basin Dakota	
⁴ Property Code 7454		⁵ Property Name SAN JUAN 27-5 UNIT			⁶ Well Number # 57M
⁷ GRID No. 14538		⁸ Operator Name BURLINGTON RESOURCES OIL & GAS COMPANY			⁹ Elevation 6846'

¹⁰ Surface Location

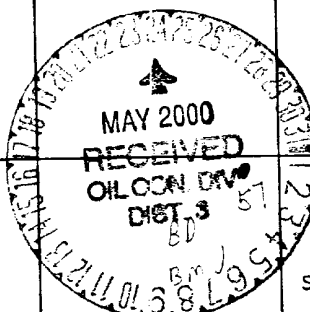
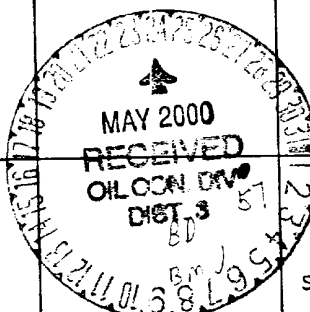
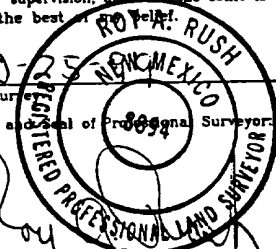
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
G	13	27-N	5-W		1570	NORTH	1660	EAST	RIO ARRIBA

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

¹² Dedicated Acres MV: E/320 DK: N/320		¹³ Joint or Infill	¹⁴ Consolidation Code	¹⁵ Order No.
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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

 FD. 1957 BLM BRASS CAP N 84-59-12 W 2660.47' (MEAS.) 1570' 57M SF-079492-A 13	 FD. 1957 BLM BRASS CAP N 84-59-12 W 2660.47' (MEAS.) 1570' 57M SF-079492-A 13	17 OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief. Signature: <u>Peggy Cole</u> Printed Name: <u>Peggy Cole</u> Title: <u>Regulatory Administrator</u> Date: <u>12-6-99</u>	
		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. Date of Survey: <u>10-25-99</u> Signature and Seal of Professional Surveyor:  Certificate Number: <u>8894</u>	

OPERATIONS PLAN

Well Name: San Juan 27-5 Unit #57M
Location: 1570' FNL, 1660' FEL, Sec 13, T-27-N, R-5-W
Rio Arriba County, NM
Latitude 36° 34.6, Longitude 107° 18.4
Formation: Blanco Mesa Verde/Basin Dakota
Elevation: 6846' GL

<u>Formation Tops:</u>	<u>Top</u>	<u>Bottom</u>	<u>Contents</u>
Surface	San Jose	3119'	
Ojo Alamo	3119'	3248'	aquifer
Kirtland	3248'	3349'	gas
Fruitland	3349'	3708'	gas
Pictured Cliffs	3708'	3791'	gas
Lewis	3791'	4203'	gas
Intermediate TD	3891'		
Mesa Verde	4203'	4648'	gas
Chacra	4648'	5358'	gas
Massive Cliff House	5358'	5518'	gas
Menefee	5518'	5853'	gas
Massive Point Lookout	5853'	6384'	gas
Mancos	6384'	7018'	gas
Gallup	7018'	7788'	gas
Greenhorn	7788'	7848'	gas
Graneros	7848'	7878'	gas
Dakota	7878'		gas
TD	8128'		

Logging Program:

Cased hole - CBL-CCL-GR - TD to surface
Cores - none

Mud Program:

<u>Interval</u>	<u>Type</u>	<u>Weight</u>	<u>Vis.</u>	<u>Fluid Loss</u>
0- 200'	Spud	8.4-9.0	40-50	no control
200- 3891'	LSND	8.4-9.0	30-60	no control
3891- 8128'	Gas	n/a	n/a	n/a

Pit levels will be visually monitored to detect gain or loss of fluid control.

Casing Program (as listed, the equivalent, or better):

<u>Hole Size</u>	<u>Depth Interval</u>	<u>Csg. Size</u>	<u>Wt.</u>	<u>Grade</u>
12 1/4"	0' - 200'	9 5/8"	32.3#	WC-50
8 3/4"	0' - 3891'	7"	20.0#	J-55
6 1/4"	3791' - 8128' ✓	4 1/2"	10.5#	K-55

Tubing Program:

0' -8128' ✓ 2 3/8" 4.7# J-55

BOP Specifications, Wellhead and Tests:

Surface to Intermediate TD -

11" 2000 psi minimum double gate BOP stack (Reference Figure #1).
After nipple-up prior to drilling out surface casing, rams and casing will be tested to 600 psi for 30 minutes.

Intermediate TD to Total Depth -

11" 2000 psi minimum double gate BOP stack (Reference Figure #1).
After nipple-up prior to drilling out intermediate casing, rams and casing will be tested to 1500 psi for 30 minutes.

Note: To facilitate higher hydraulic stimulation completion work, no liner hanger will be used. In its place, a long string of 4 1/2" casing will be run and cemented with a minimum of 100' of cement overlap between the 4 1/2" x 7" casing strings. After completion of the well, a 4 1/2" retrievable bridge plug will be set below the top of cement in the 4 1/2" x 7" overlap. The 4 1/2" casing will then be backed off above the top of cement in the 4 1/2" x 7" overlap and laid down. The 4 1/2" bridge plug will then be retrieved and the production tubing will be run to produce the well.

- If hole conditions permit, an adequate water spacer will be pumped ahead of each cement job to prevent cement/ mud contamination or cement hydration.

Special Drilling Operations (Gas/Mist Drilling):

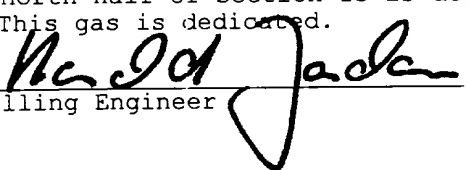
The following equipment will be operational while gas/mist drilling:

- An anchored blooie line will be utilized to discharge all cuttings and circulating medium to the blow pit a minimum of 100' from the wellhead.
- The blooie line will be equipped with an automatic igniter or pilot light.
- Compressors will be located a minimum of 100' from the wellhead in the opposite direction from the blooie line.
- Engines will have spark arresters or water cooled exhaust.
- Deduster equipment will be utilized.
- The rotating head will be properly lubricated and maintained.
- A float valve will be utilized above the bit.
- Mud circulating equipment, water, and mud materials will be sufficient to maintain control of the well.

Additional Information:

- The Dakota and Mesa Verde formations will be completed and commingled.
- No abnormal temperatures or hazards are anticipated.
- Anticipated pore pressures are as follows:

Fruitland Coal	300 psi
Pictured Cliffs	600 psi
Mesa Verde	700 psi
Dakota	2500 psi
- Sufficient LCM will be added to the mud system to maintain well control, if lost circulation is encountered.
- The east half of Section 13 is dedicated to the Mesaverde and the north half of Section 13 is dedicated to the Dakota in this well.
- This gas is dedicated.


Drilling Engineer

12/7/1999
Date

BURLINGTON RESOURCES OIL & GAS COMPANY

SAN JUAN 27-5 UNIT #57M

NE/4 SEC. 13, T-27-N, R-5-W, N.M.P.M.,

RIO ARriba COUNTY, NEW MEXICO

1570' FNL, 1660' FEL

APD MAP #1

NO NEW CONSTRUCTION

SW/NE SECTION 13, T-27-N, R-5-W

