

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

NMM-6893

Unit Reporting Number

1b. Type of Well  
GAS

6. If Indian, All. or Tribe

2. Operator

**BURLINGTON**

RESOURCES Oil & Gas Company

7. Unit Agreement Name

APR 2008

RECEIVED

OIL CONS. DIV.

3. Address & Phone No. of Operator

PO Box 4289, Farmington, NM 87499

8. Farm or Lease Name

Wilmer Canyon

9. Well Number

#102

4. Location of Well

Unit C (NENW), 950' FNL, 1935' FWL

10. Field, Pool, Wildcat

Basin Fruitland Coal

Latitude 36° 58.3803'N

Longitude 107° 37.7263'W

11. Sec., Twn, Rge, Mer. (NMPM)

Sec. 24, T32N, R8W

API # 30-045-33617

14. Distance in Miles from Nearest Town

23 miles to Navajo Dam P.O

12. County

San Juan

13. State

NM

15. Distance from Proposed Location to Nearest Property or Lease Line

950'

16. Acres in Lease

17. Acres Assigned to Well

320 W2

18. Distance from Proposed Location to Nearest Well, Drig, Compl, or Applied for on this Lease

2700' - Reese Mesa #13

19. Proposed Depth

3952'

20. Rotary or Cable Tools

Rotary

21. Elevations (DF, FT, GR, Etc.)

7023' GL

22. Approx. Date Work will Start

23. Proposed Casing and Cementing Program

See Operations Plan attached

24. Authorized by:

Regulatory Compliance Assistant II

2-27-06

Date

PERMIT NO.

APPROVAL DATE

APPROVED BY

TITLE

DATE

Archaeological Report attached

Threatened and Endangered Species Report attached

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.

District I  
PO Box 1980, Hobbs, NM 88241-1980

State of New Mexico  
Energy, Minerals & Natural Resources Department

Form C-102

Revised February 21, 1994

District II  
PO Drawer 00, Artesia, NM 88211-0719

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

OIL CONSERVATION DIVISION

PO Box 2088  
Santa Fe, NM 87504-2088

District III  
1000 Rio Brazos Rd., Aztec, NM 87410

District IV  
PO Box 2088, Santa Fe, NM 87504-2088

AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

<sup>1</sup> API Number <b>30-045-33617</b>	<sup>2</sup> Pool Code <b>71629</b>	<sup>3</sup> Pool Name <b>Basin Fruitland Coal</b>
<sup>4</sup> Property Code <b>18641</b>	<sup>5</sup> Property Name <b>WILMER CANYON</b>	<sup>6</sup> Well Number <b>102</b>
<sup>7</sup> OGRID No. <b>14358</b>	<sup>8</sup> Operator Name <b>BURLINGTON RESOURCES OIL &amp; GAS COMPANY, LP</b>	<sup>9</sup> Elevation <b>7023</b>

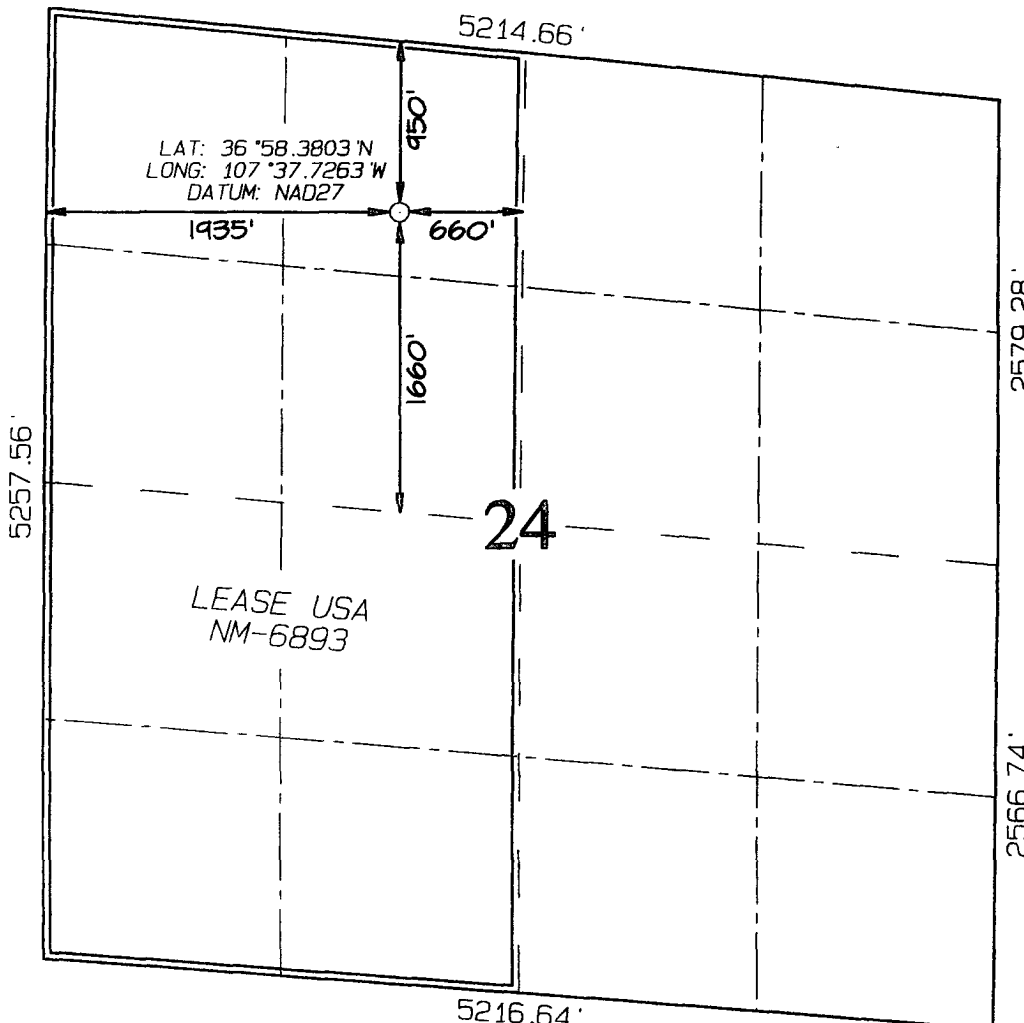
<sup>10</sup> Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
C	24	32N	8W		950	NORTH	1935	WEST	SAN JUAN

<sup>11</sup> 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
C									
<sup>12</sup> Dedicated Acres <b>320.0 acres W/2</b>					<sup>13</sup> Joint or Infill	<sup>14</sup> Consolidation Code	<sup>15</sup> 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



<sup>17</sup> OPERATOR CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief

*Patsy Clugston*  
Signature

**Patsy Clugston**

Printed Name

**Sr. Regulaotry Specialist**

Title

**1-6-06**

Date

<sup>18</sup> 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.

Survey Date: **DECEMBER 8, 2005**

Signature and Seal of Professional Surveyor



**JASON C. EDWARDS**

Certificate Number

**15269**

Office

Energy, Minerals and Natural Resources

May 27, 2004

District I

1625 N. French Dr., Hobbs, NM 88240

District II

1301 W. Grand Ave., Artesia, NM 88210

District III

1000 Rio Brazos Rd., Aztec, NM 87410

District IV

1220 S. St. Francis Dr., Santa Fe, NM 87505

## OIL CONSERVATION DIVISION

1220 South St. Francis Dr.

Santa Fe, NM 87505

WELL API NO.

30-045-

33617

5. Indicate Type of Lease

STATE ☐FEE ☐

6. State Oil &amp; Gas Lease No.

NMNM-6893

7. Lease Name or Unit Agreement Name

Wilmer Canyon

8. Well Number

#102

9. OGRID Number

14538

10. Pool name or Wildcat

Basin Fruitland Coal

SUNDRY NOTICES AND REPORTS ON WELLS  
(DO NOT USE THIS FORM FOR PROPOSALS TO DRILL OR TO DEEPEN OR PLUG BACK TO A  
DIFFERENT RESERVOIR. USE "APPLICATION FOR PERMIT" (FORM C-101) FOR SUCH  
PROPOSALS.)

1. Type of Well:

Oil Well ☐Gas Well ☒

Other

2. Name of Operator

BURLINGTON RESOURCES OIL &amp; GAS COMPANY LP

3. Address of Operator

3401 E. 30TH STREET, FARMINGTON, NM 87402

4. Well Location

Unit Letter C : 950 feet from the North line and 1935 feet from the West line  
Section 24 Township 32N Rng 8W NMPM County San Juan

11. Elevation (Show whether DR, RKB, RT, GR, etc.)

7023'

Pit or Below-grade Tank Application

☐ or Closure ☐

Pit type

New Drill

Depth to Groundwater

&gt;100'

Distance from nearest fresh water well

&gt;1000'

Distance from nearest surface water

&lt;1000'

Pit Liner Thickness:

12

mil

Below-Grade Tank:

Volume

bbbs;

Construction Material

## 12. Check Appropriate Box to Indicate Nature of Notice, Report or Other Data

## NOTICE OF INTENTION TO:

PERFORM REMEDIAL WORK ☐TEMPORARILY ABANDON ☐PULL OR ALTER CASING ☐PLUG AND ABANDON ☐CHANGE PLANS ☐MULTIPLE COMPL ☐

OTHER:

New Drill ☒

## SUBSEQUENT REPORT OF:

REMEDIAL WORK ☐COMMENCE DRILLING OPNS. ☐CASING/CEMENT JOB ☐ALTERING CASING ☐P AND A ☐OTHER: ☐

13. Describe proposed or completed operations. (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work). SEE RULE 1103. For Multiple Completions: Attach wellbore diagram of proposed completion or recompletion.

New Drill, Lined:

Burlington Resources proposes to construct a new drilling pit and an associated vent/flare pit. Based on Burlington's interpretation of the Ecosphere's risk ranking criteria, the new drilling pit will be a lined pit as detailed in Burlington's Revised Drilling / Workover Pit Construction / Operation Procedures dated November 11, 2004 on file at the NMOCD office. A portion of the vent/flare pit will be designed to manage fluids and that portion will be lined as per the risk ranking criteria. Burlington Resources anticipates closing these pits according to the Drilling / Workover Pit Closure Procedure dated August 2, 2004 on file at the NMOCD office.

I hereby certify that the information above is true and complete to the best of my knowledge and belief. I further certify that any pit or below-grade tank has been/will be constructed or closed according to NMOCD guidelines ☐, a general permit ☒ or an (attached) alternative OCD-approved plan ☐.

SIGNATURE

TITLE

Regulatory Assistant II

DATE

1/17/2006

Type or print name

Amanda Sandoval

E-mail address:

asandoval@br-inc.com

Telephone No.

505-326-9891

For State Use Only

APPROVED BY

TITLE

DEPUTY OIL &amp; GAS INSPECTOR, DIST. 9

DATE

APR 03 2006

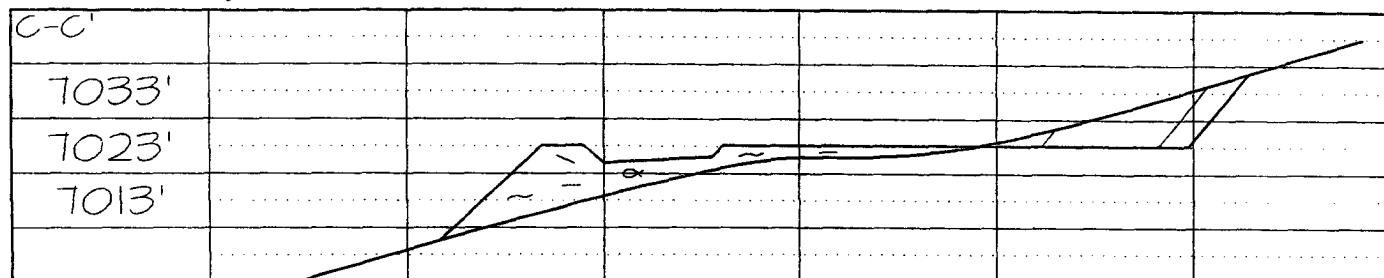
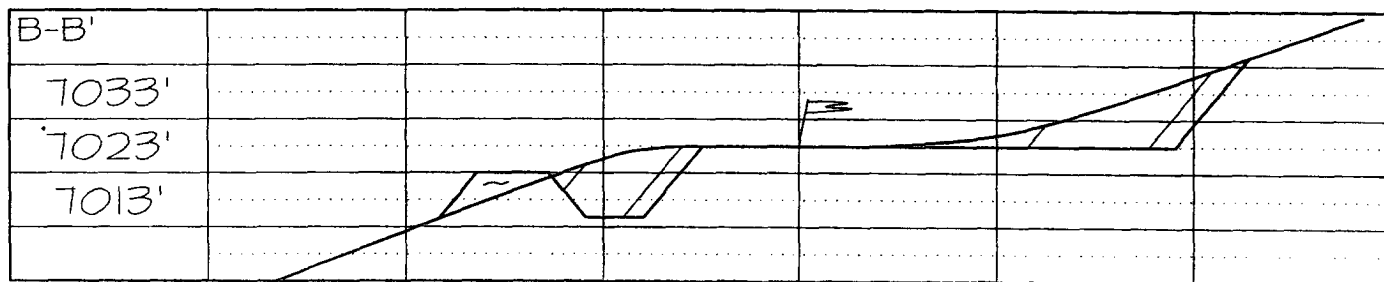
Conditions of Approval (if any):

LATITUDE: 36°58'23"  
LONGITUDE: 107°37'44"

DATUM: NAD1927



A-A'										
7033'										
7023'										
7013'										



Note: Contractor should call One-Call for location of any marked or unmarked buried pipelines or cables on well pad and/or access road at least two (2) working days prior to construction

OPERATIONS PLANS FOR FRUITLAND COAL WELLS

Well Name: Wilmer Canyon #102  
Location: Unit C (NENW), 950' FNL, 1935' FWL  
Sec. 24 T-32-N, R-8-W  
San Juan County, NM  
Latitude 36° 58.3803'N  
Longitude 107° 37.7263'W

2006 MAR 24 AM 8 49

RECEIVED  
070 FARMINGTON NM

Formation: Basin Fruitland Coal

<u>Formation Tops:</u>	<u>Top</u>	<u>Bottom</u>	<u>Contents</u>
Surface	San Jose	2615'	
Ojo Alamo	2615'	2677'	aquifer
Kirtland	2677'	3565'	gas
Top/Fruitland Coal	3565'		gas
Base/Fruitland Coal	3867'		
Intermediate TD	3535'		
Pictured Cliffs	3870'		gas
TD	3952'		

This will be a single producing FC well, and is not an HPA well. Burlington requests permission to use the 85' into the Pictured Cliffs interval as a sump. There will be a mudlogger on site during drilling to verify PC gas isn't reached.

Logging Program:

Mudlog from intermediate to TD  
Cores - none

Mud Program:

<u>Interval</u>	<u>Type</u>	<u>Weight</u>	<u>Vis.</u>	<u>Fluid Loss</u>
0- 120'	Spud Mud/Air/Air Mist	8.4-9.0	40-50	no control
120'- 3535'	LSND/Clear Water/ Starch-Polymer	8.4-9.0	30-60	no control
3535' - 3952'	Air/Mist			

Circulating media will be contractor dependent.

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#	H-40
8 3/4"	200' - 3535'	7"	20.0#	J-55
6 1/4"	3535'- 3952'	5 1/2"	15.5#	J-55

or open hole

Tubing Program:

0' - 3952'      2 3/8"      4.7#      J-55

**BOP and tests:**

Surface to intermediate TD - 11" 2000 psi (minimum) double gate BOP stack (Reference Figure #1). Prior to drilling out surface casing, test BOPE to 600 psi for 30 min.

Intermediate TD to Total Depth - 7 1/6" 2000 psi (minimum) completion BOP stack (Reference Figure #2). Prior to drilling out intermediate casing, test BOPE and casing to 1500 psi for 30 minutes.

From surface to 7" TD - a choke manifold will be installed in accordance with Onshore Order No. 2 (Reference Figure #3). When the cavitation completion rig drills the production hole, the completion rig configuration will be used (Reference Figure #4). ~~At this time, the choke manifold will be used for cavitation rig operations.~~

**Wellhead Equipment:** 9 5/8" x 7" x 2 3/8" x 11" 2000 psi xmas tree assembly.

**General -**

- Pipe rams will be actuated once each day and blind rams will be actuated once each trip to test proper functioning.
- An upper kelly cock valve with handle available and drill string valves to fit each drill string will be available on the rig floors at all times.
- BOP pit level drill will be conducted weekly for each drilling crew.
- All BOP tests and drills will be recorded in daily drilling reports.
- Blind and pipe rams will be equipped with extension hand wheels.

**Cementing:**

9 5/8" surface casing Pre-Set w/147sx <sup>237</sup> (188cf) @ <sup>1.41</sup> 1.28 yield. <sup>145</sup> 1.41  
Cement with Type I, II cement with 20% flyash mixed at <sup>15.2</sup> 15.2 ppg, <sup>1.28</sup> 1.28 cu ft per sack yield. (Bring cement to surface). Wait on cement for 24 hours for pre-set holes before pressure testing or drilling out from under surface.

9 5/8" surface casing Conventionally w/147sx (188cf) @ 1.28 yield.  
Cement with Type III cement with 0.25 pps Celloflake, 3% calcium chloride. (200% excess, bring cement to surface). Wait on cement appropriate time until cement achieves 250 psi compressive strength at 60 degrees F. prior to nipple up of BOPE. Wait on cement for 8 hrs for conventionally set holes before pressure testing or drilling out from under surface. Test casing to 600 psi for 30 minutes.

Saw tooth guide shoe on bottom. Bowspring centralizers will be run in accordance with Onshore Order #2.

7" intermediate casing w/369sx (786cf - 10bbls slurry) @ 2.13 yield. Lead with Premium Lite HS FM w/3% CaCl<sub>2</sub>, 0.25#/sx Floccelle, 5#/sx LCM-1, 0.4% FL-52 & 0.4% SMS (50% excess to circulate to surface). WOC minimum of 8 hours before drilling out intermediate casing. If cement does not circulate to surface, a CBL or a temperature survey will be run to determine TOC. Test casing to 1500 psi for 30 minutes.

Cement nose guide shoe on bottom with float collar spaced on top of shoe joint. Bowspring centralizers spaced every other joint off bottom, to the base of the Ojo Alamo 2677'. Two turbolating centralizers at the base of the Ojo Alamo 2677'. Bowspring centralizers spaced every fourth joint from the base of the Ojo Alamo to the base of the surface casing.

Cementing cont.

5 1/2" liner - will not be cemented if run.

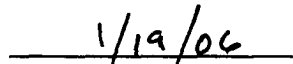
Note: If open hole logs are run, cement volumes will be based on 25% excess over caliper volumes.

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

Additional information:

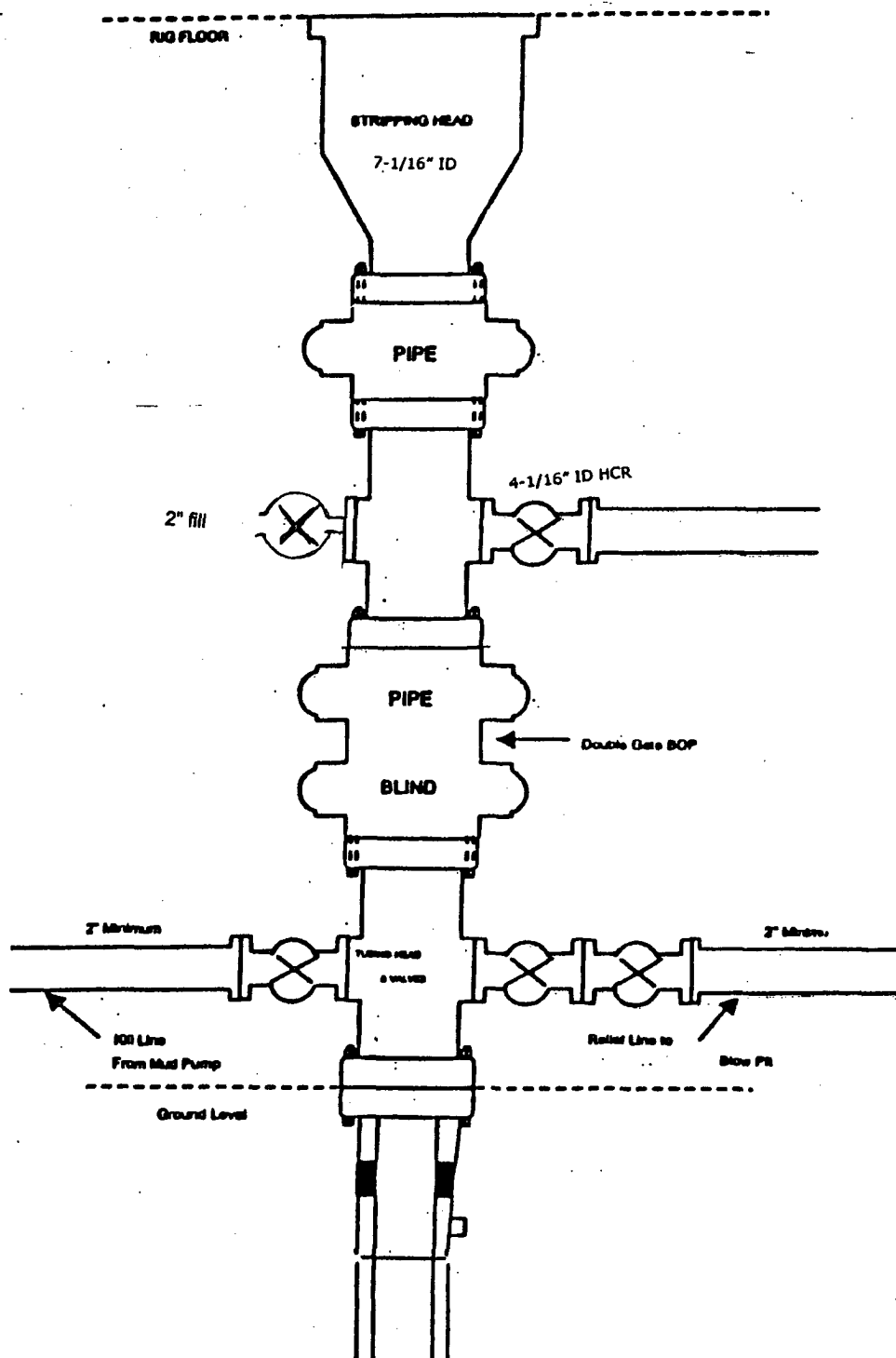
- \* The Fruitland Coal formation will be completed.
- \* No abnormal temperatures or hazards are anticipated.
- \* Anticipated pore pressure for the Fruitland is less than 500 psi.
- \* This gas is dedicated.

  
- Drilling Engineer

  
1/19/06  
Date

# BURLINGTON RESOURCES

Figure #4  
Cavitation Rig  
BOP Configuration  
2,000 psi Minimum System







UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

## Sundry Notices and Reports on Wells

2006 MAR 13 PM 4 24

1. Type of Well  
GAS

2. Name of Operator

**BURLINGTON**

RESOURCES OIL &amp; GAS COMPANY LP

3. Address &amp; Phone No. of Operator

PO Box 4289, Farmington, NM 87499 (505) 326-9700

4. Location of Well, Footage, Sec., T, R, M  
Sec., T--N, R--W, NMPM

Unit C (NENW) 950' FNL &amp; 1935' FWL, Sec. 24, T32N, R8W NMPM

## 12. CHECK APPROPRIATE BOX TO INDICATE NATURE OF NOTICE, REPORT, OTHER DATA

## Type of Submission

☒ Notice of Intent☐ Subsequent Report☐ Final Abandonment

## Type of Action

☐ Abandonment☐ Recompletion☐ Plugging☐ Casing Repair☐ Altering Casing☐ Change of Plans☐ New Construction☐ Non-Routine Fracturing☐ Water Shut off☐ Conversion to Injection☒ Other - Sump

## 13. Describe Proposed or Completed Operations

After receiving denial of sump for the referenced well, Burlington has reviewed the ownership status of the well (attached) and found that Burlington Resources owns 100% to all depths. We respectfully request your reconsideration allowing a sump to be drilled on this well, since there will not be a concern about producing any unowned gas. We will still employ mudloggers on this well to monitor the gas while drilling the PC section of the well and collect gas samples during the respective completions if warranted. We would anticipate about a two week cavitation period. If the PC is found to be contributing at that point, then we will review our options.

- Sump granted 3/15/06 CEH

## 14. I hereby certify that the foregoing is true and correct.

Signed

*Amanda Sandoval*

Amanda Sandoval Title Regulatory Assistant III Date 3/9/06

(This space for Federal or State Office use)

APPROVED BY

*D. Manley*

Title

*AFM*

Date

*3/30/06*

CONDITION 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.

NMOCD