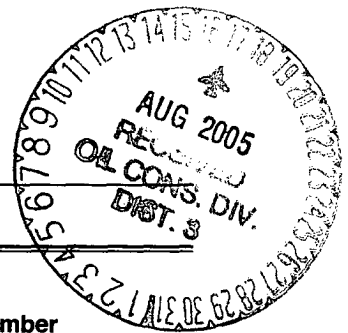


UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT



APPLICATION FOR PERMIT TO DRILL, DEEPEN, OR PLUG BACK

1a. Type of Work  
DRILL

2005 AUG 8 PM 1 37

5. Lease Number  
NM-9037  
Unit Reporting Number

1b. Type of Well  
GAS

RECEIVED  
070 FARMINGTON NM

6. If Indian, All. or Tribe

2. Operator  
**BURLINGTON**  
RESOURCES Oil & Gas Company LP

7. Unit Agreement Name

3. Address & Phone No. of Operator  
PO Box 4289, Farmington, NM 87499  
  
(505) 326-9700

8. Farm or Lease Name  
Reese Mesa  
9. Well Number  
#8T

4. Location of Well  
700' FNL, 330' FWL

10. Field, Pool, Wildcat  
Basin Fruitland Coal  
11. Sec., Twn, Rge, Mer. (NMPM)

Latitude 36° 59.8793'N, Longitude 107° 37.9459'W

Unit E, Sec. 12, T32N, R08W

API # 30-045- 33267

14. Distance in Miles from Nearest Town  
32.2 Miles from Blanco PO

12. County  
San Juan  
13. State  
NM

15. Distance from Proposed Location to Nearest Property or Lease Line  
330'

16. Acres in Lease

Sec 11, Lots 5, 6, 11-14  
Sec 12, Lots 8, 9, 16  
17. Acres Assigned to Well  
299.89 S/2 FC (Less 7, 10, 15)  
R-9055 tract 6

18. Distance from Proposed Location to Nearest Well, Drig, Compl, or Applied for on this Lease  
260'

19. Proposed Depth  
3936'

20. Rotary or Cable Tools  
Rotary

21. Elevations (DF, FT, GR, Etc.)  
7064' GR

22. Approx. Date Work will Start

23. Proposed Casing and Cementing Program  
See Operations Plan attached

24. Authorized by: Richard Thompson  
Regulatory Associate II

8/2/2005  
Date

PERMIT NO.

APPROVAL DATE

APPROVED BY: [Signature]

TITLE AFM

DATE 8-15-05

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.

NOT AN HPA FC WELL

This action is subject to technical and  
procedural review pursuant to 43 CFR 3165.3  
and appeal pursuant to 43 CFR 3165.4

DRILLING OPERATIONS AUTHORIZED ARE  
SUBJECT TO COMPLIANCE WITH ATTACHED  
"GENERAL REQUIREMENTS".

NMOCB

DISTRICT I  
1625 N. French Dr., Hobbs, N.M. 88240

State of New Mexico  
Energy, Minerals & Natural Resources Department

Form C-102  
Revised August 15, 2000

DISTRICT II  
811 South First, Artesia, N.M. 88210

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

DISTRICT III  
1069 N. Brown Rd., Aztec, N.M. 87410

OIL CONSERVATION DIVISION

2040 South Pacheco  
Santa Fe, NM 87505

DISTRICT IV  
2040 South Pacheco, Santa Fe, NM 87505

2005 AUG 8 PM 1 38 AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

<sup>1</sup> API Number 30-045- 33 267	<sup>2</sup> Pool Code 71629	<sup>3</sup> Pool Name Basin Fruitland Coal
<sup>4</sup> Property Code 18606	<sup>5</sup> Property Name HERSE MESA	<sup>6</sup> Well Number 8T
<sup>7</sup> OSHD No. 14538	<sup>8</sup> Operator Name BURLINGTON RESOURCES OIL AND GAS COMPANY LP	<sup>9</sup> Elevation 7064'

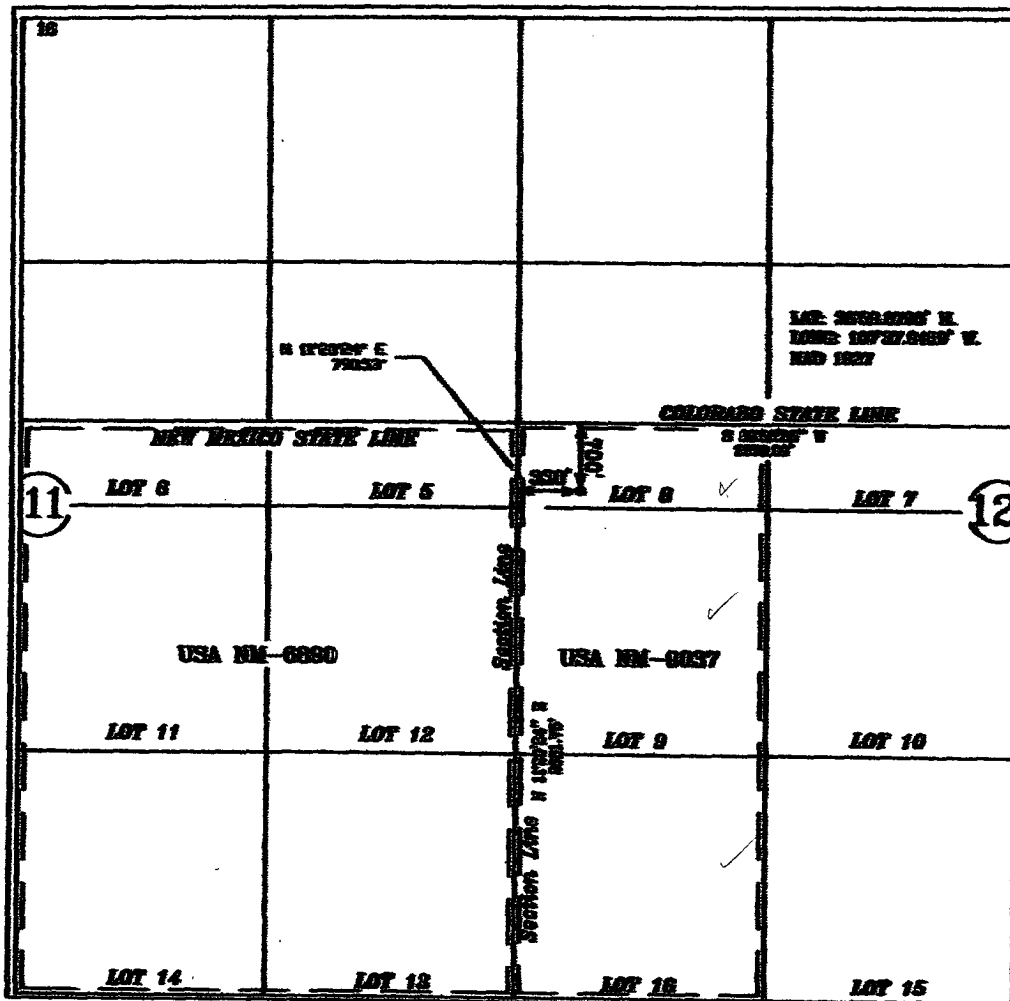
<sup>10</sup> Surface Location

UL or lot no.	Section	Township	Range	Lot No.	Feet from the	North/South Line	Feet from the	East/West Line	County
E	12	32-N	8-W		700'	NORTH	330'	WEST	SAN JUAN

<sup>11</sup> Bottom Hole Location If Different From Surface

UL or lot no.	Section	Township	Range	Lot No.	Feet from the	North/South Line	Feet from the	East/West Line	County
<sup>12</sup> Dedicated Acres S/2 299.89 FC Less 7,10,15					<sup>13</sup> Joint or Infill		<sup>14</sup> Consolidation Code		<sup>15</sup> Order No. R-9055 Tract 7

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.

*Philana Thompson*  
Signature  
Philana Thompson

Printed Name

Regulatory Associate II

Date  
7/14/05

Initials

<sup>18</sup> SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was plotted from field notes of actual survey made by me or under my supervision, and that the same is true and correct to the best of my belief.

Date of Survey  
7 AUG 2005

Signature  
*Calvin P. Russell*

Printed Name  
Calvin P. Russell

Surveyor License Number  
15703

State of New Mexico  
Oil and Gas Conservation Division

Surveyor License Number  
15703

Signature  
*Calvin P. Russell*

Printed Name  
Calvin P. Russell

Surveyor License Number  
15703

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-

5. Indicate Type of Lease

STATE ☐FEE ☐

6. State Oil &amp; Gas Lease No.

Federal Lease NM-9037

7. Lease Name or Unit Agreement Name

Reese Mesa

8. Well Number

#8T

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

E

:

700

feet from the

North

line and

330

feet from the

West

line

Section

12

Township

32N

Range

8W

NMPM

County

San Juan

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

7064' GR

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

&gt;1000'

Pit Liner Thickness:

NA

mil

Below-Grade Tank:

Volume

bbls;

Construction Material

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

## NOTICE OF INTENTION TO:

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

## SUBSEQUENT REPORT OF:

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

OTHER:

New Drill Pit ☒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, Unlined:

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 and vent/flare pit will be an unlined 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 unlined, 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 Associate II

DATE

7/14/2005

Type or print name

Philana Thompson

E-mail address:

PThompson@br-inc.com

Telephone No.

505-326-9530

For State Use Only

APPROVED BY

TITLE

DEPUTY OIL &amp; GAS INSPECTOR, DIST. 4

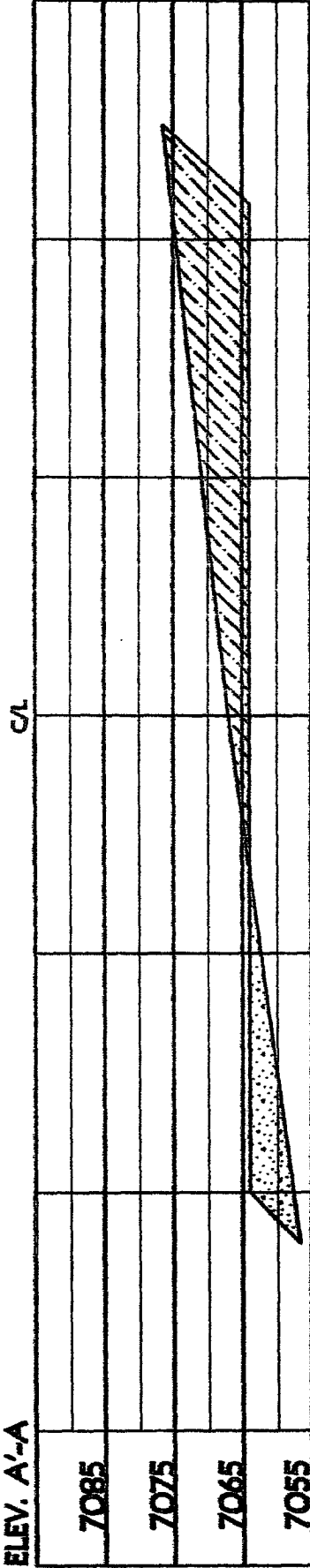
DATE

AUG 17 2005

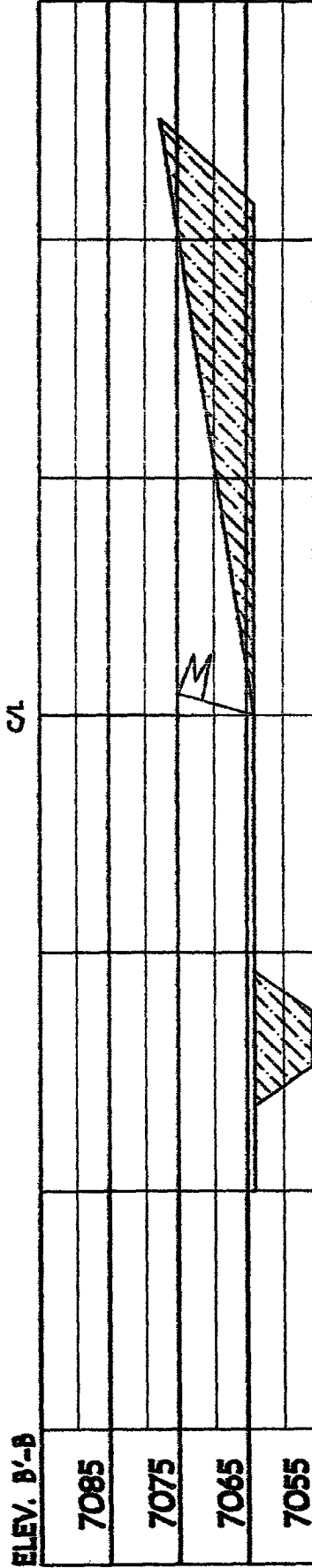
Conditions of Approval (if any):

**BURLINGTON RESOURCES OIL & GAS COMPANY LP**  
**REESE MESA 8T, 700' FNL & 330' FWL**  
**SECTION 12, T-32-N, R-8-W, NMPM, SAN JUAN COUNTY, NM**  
**GROUND ELEVATION: 7064', DATE: JUNE 22, 2005**

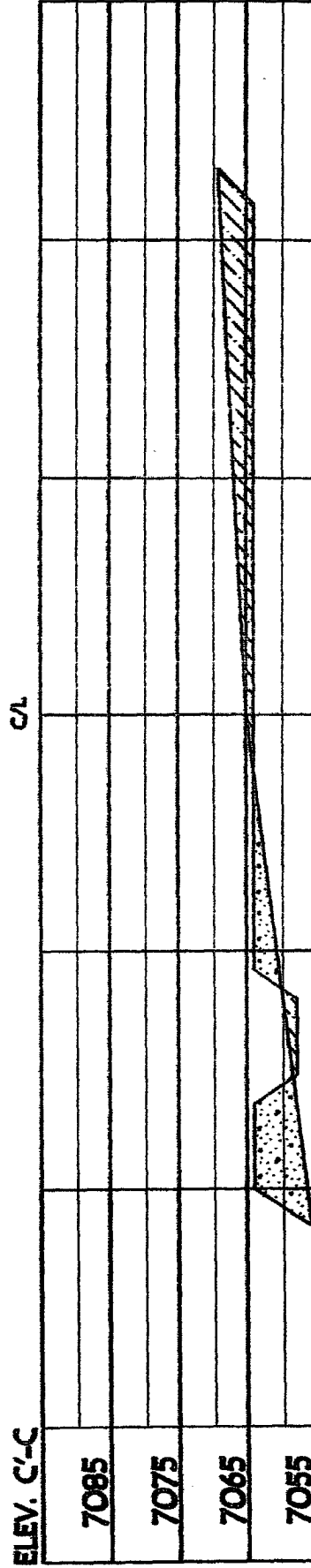
**ELEV. A'-A**



**ELEV. B'-B**



**ELEV. C'-C**



**NOTE: VECTOR SURVEYS IS NOT LIABLE FOR UNDERGROUND UTILITIES OR PIPELINES.  
 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:** Reese Mesa #8T  
**Location:** Unit E, 700' FNL, 330' FWL  
Sec. 12 T-32-N, R-8-W  
San Juan County, NM  
Latitude 36° 59.8793'N  
Longitude 107° 37.2216'W

**Formation:** Basin Fruitland Coal

<b><u>Formation Tops:</u></b>	<b><u>Top</u></b>	<b><u>Bottom</u></b>	<b><u>Contents</u></b>
Surface	San Jose	2369'	
Ojo Alamo	2369'	4707'	aquifer
Kirtland	2446'	4630'	gas
Top/Fruitland Coal	3601'		gas
Base/Fruitland Coal	3886'		
Pictured Cliffs	3889'		gas
TD	3939'		

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:**

<b><u>Interval</u></b>	<b><u>Type</u></b>	<b><u>Weight</u></b>	<b><u>Vis.</u></b>	<b><u>Fluid Loss</u></b>
0- 120'	Spud Mud/Air/Air Mist	8.4-9.0	40-50	no control
120'- 3936'	LSND/Clear Water/ Starch-Polymer	8.4-9.0	30-60	no control

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):**

<b><u>Hole Size</u></b>	<b><u>Depth Interval</u></b>	<b><u>Csq. Size</u></b>	<b><u>Wt.</u></b>	<b><u>Grade</u></b>
8 3/4"	0' - 120'	7"	20.0#	J-55
6 1/4"	120'- 3939'	5 1/2"	15.5#	J-55
			or open hole	

**Tubing Program:**

0' - 3936'	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 5-1/2" 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). ~~Choke manifold will be used for cavitation rig operations.~~

**Wellhead Equipment:** 7" x 5-1/2" 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:**

7" surface casing Pre-Set w/42sx (54cf) @ 1.28 yield. *1.61 ft<sup>3</sup>/sx, 14.5 ppg*

Cement with Type I, II cement with 20% flyash mixed at 15.2 ppg, 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.

7" surface casing Conventionally w/42sx (54cf) @ 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.

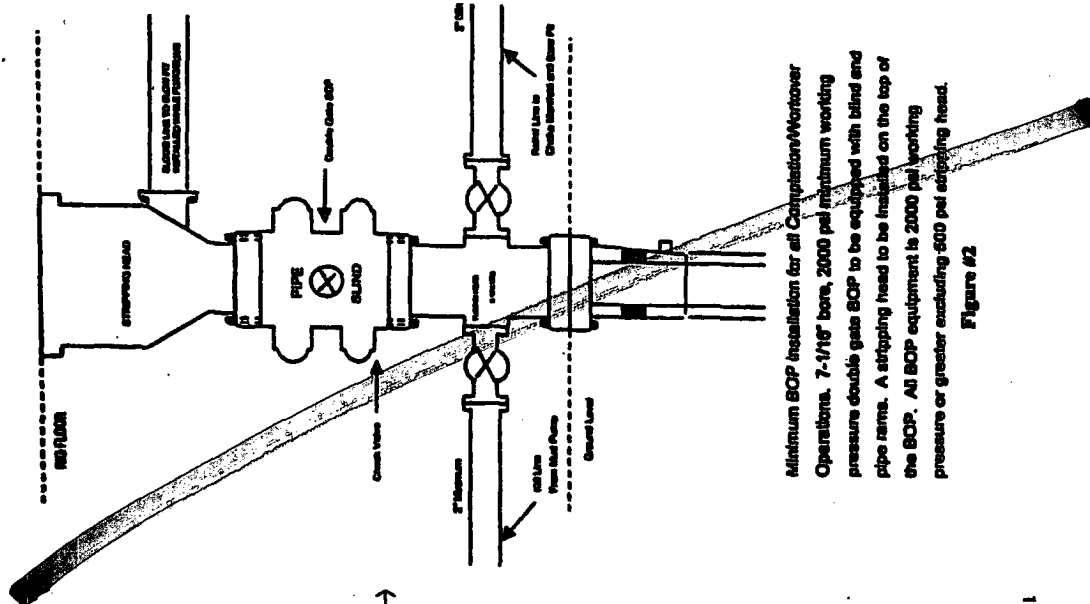
Saw tooth guide shoe on bottom. Bowspring centralizers will be run in accordance with Onshore Order #2.

*production*  
5-1/2" ~~intermediate~~ casing w/133sx (284cf) @ 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. Two turbolating centralizers at the base of the Ojo Alamo. Bowspring centralizers spaced every fourth joint from the base of the Ojo Alamo to the base of the surface casing.

# BURLINGTON RESOURCES

Completion/Workover Rig  
BOP Configuration  
2,000 psi System



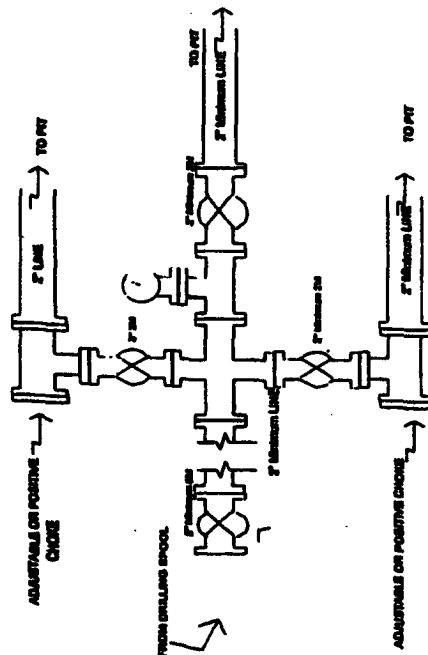
Minimum BOP Installation for all Completion/Workover Operations. 7-1/16" bore, 2000 psi minimum working pressure double gate BOP to be equipped with blind and pipe rams. A stripping head to be installed on the top of the BOP. All BOP equipment is 2000 psi working pressure or greater excluding 500 psi stripping head.

Figure #2

4-20-01

# BURLINGTON RESOURCES

Drilling Rig  
Choke Manifold Configuration  
2000 psi System



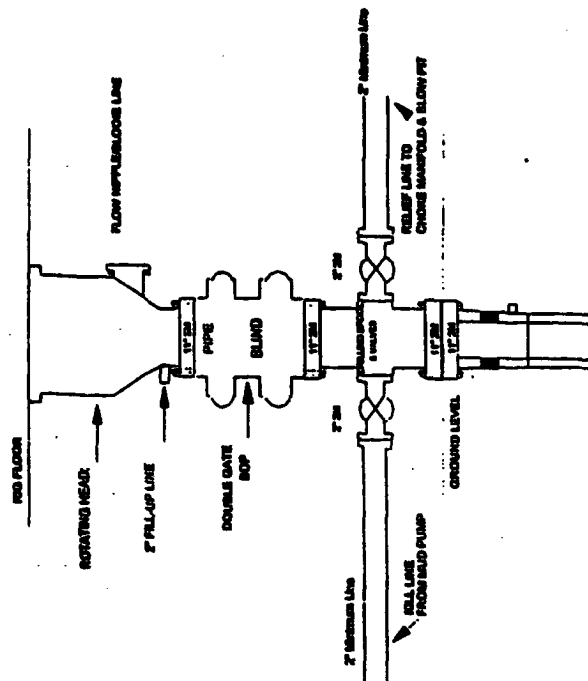
Choke manifold installation from Surface Casing Point to Total Depth. 2,000psi working pressure equipment with two chokes.

Figure #3

4-20-01

# Burlington Resources

Drilling Rig  
2000 psi System



BOP Installation from Surface Casing Point to Total Depth. 11" Bore 10" Nominal, 2000 psi working pressure double gate BOP to be equipped with blind rams and pipe rams. A 500 psi rotating head on top of ram preventers. All BOP equipment is 2,000 psi working pressure.

Figure #1

# BURLINGTON RESOURCES

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

