

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL, DEEPEN, OR PLUG BACK

2005 MAY 10 PM 4 09

1a. Type of Work  
DRILL

5. Lease Number  
NMSF-077092  
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

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

8. Farm or Lease Name  
Lackey A

9. Well Number  
#293

4. Location of Well  
Unit K (NESW), 1755' FSL, 1580' FWL  
  
Latitude 36° 44.2350'N  
Longitude 107° 50.3715'W

10. Field, Pool, Wildcat  
Basin Fruitland Coal/  
WC 29N10W12; Fruitland Sand

11. Sec., Twn, Rge, Mer. (NMPM)  
K Sec. 12, T29N, R10W  
API # 30-045-33094

14. Distance in Miles from Nearest Town  
1.6 miles to the Post Office in Blanco, NM

12. County  
San Juan

13. State  
NM

15. Distance from Proposed Location to Nearest Property or Lease Line  
1580'

16. Acres in Lease

17. Acres Assigned to Well  
FG-156.42 SW/4  
FG-315.56 W/2

18. Distance from Proposed Location to Nearest Well, Drlg, Compl, or Applied for on this Lease  
830'- Lackey A #2

19. Proposed Depth  
2381'

20. Rotary or Cable Tools  
Rotary

21. Elevations (DF, FT, GR, Etc.)  
5759' GL

22. Approx. Date Work will Start

23. Proposed Casing and Cementing Program  
See Operations Plan attached

24. Authorized by: Amanda Sandora  
Regulatory Compliance Assistant II

5-16-05  
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.

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

NMOC

NMOC

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

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

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

**DISTRICT IV**  
2040 South Pacheco, Santa Fe, NM 87505

## OIL CONSERVATION DIVISION

2040 South Pacheco  
Santa Fe, NM 87505

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

☐ AMENDED REPORT

# WELL LOCATION AND ACREAGE DEDICATION PLAT

*API Number 30-045- 33094		*Pool Code 71629 / 97464	*Pool Name Basin Fruitland Coal/WC: #29NE#10W12 Fruitland Sands	
*Property Code 7238	*Property Name LACKEY A		*Well Number 293	
*OGRID No. 14538	*Operator Name BURLINGTON RESOURCES OIL AND GAS COMPANY LP		*Elevation 5759'	

## <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
K	12	29-N	10-W		1755'	SOUTH	1580'	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
K									
<sup>13</sup> Dedicated Acres			<sup>14</sup> Joint or Infill		<sup>15</sup> Consolidation Code		<sup>16</sup> Order No.		
FS-156.42 SW/4									
FG-315.56 W/2									

**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**

LOT 4                      LOT 3		LOT 2                      LOT 1	
USA SF-077092  LOT 5                      LOT 6		LOT 7                      LOT 8	
<div style="position: relative;"> <div style="position: absolute; top: 10px; left: 10px; font-size: 10px;">           10 19 18 17 16 15 14 13 12 11 10 9 8 7 6 5 4 3 2 1         </div> <div style="position: absolute; top: 50%; left: 50%; transform: translate(-50%, -50%); font-size: 40px; font-weight: bold;">12</div> <div style="position: absolute; top: 10%; left: 10%; font-size: 10px;">           LAT: 36°44.2350' N.            LONG: 107°50.3715' W.            NAD 1983         </div> <div style="position: absolute; top: 40%; left: 10%; font-size: 10px;">           1580'         </div> <div style="position: absolute; top: 60%; left: 10%; font-size: 10px;">           1765'         </div> <div style="position: absolute; top: 80%; left: 10%; font-size: 10px;">           N 88-22-56 E            2633.78'         </div> </div>		LOT 10                      LOT 9	
LOT 13                      LOT 14		LOT 15                      LOT 16	

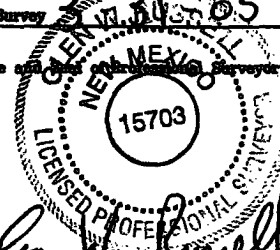
### 17 OPERATOR CERTIFICATION

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. Regulatory Specialist  
 Title  
4-4-05  
 Date

### 18 SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plan 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.

3-11-05  
 Date of Survey  
GEN. MEXICO  
 Signature and Title of Licensed Professional Surveyor  
  
15703  
 Certificate Number

**LACKEY A #293, 1755' FSL & 1580' FWL**

SECTION 12, T-29- N, R-10-W, NMPM, SAN JUAN COUNTY, NM  
GROUND ELEVATION: 5759', DATE: MARCH 18, 2005

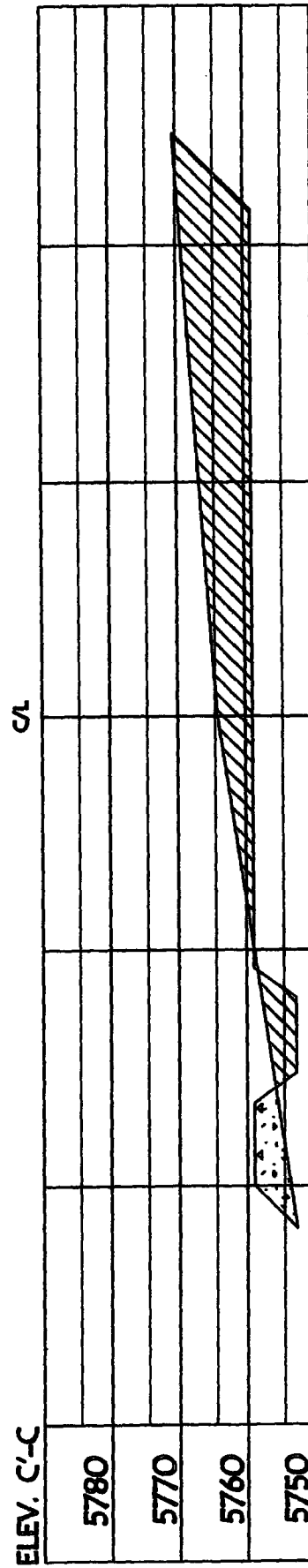
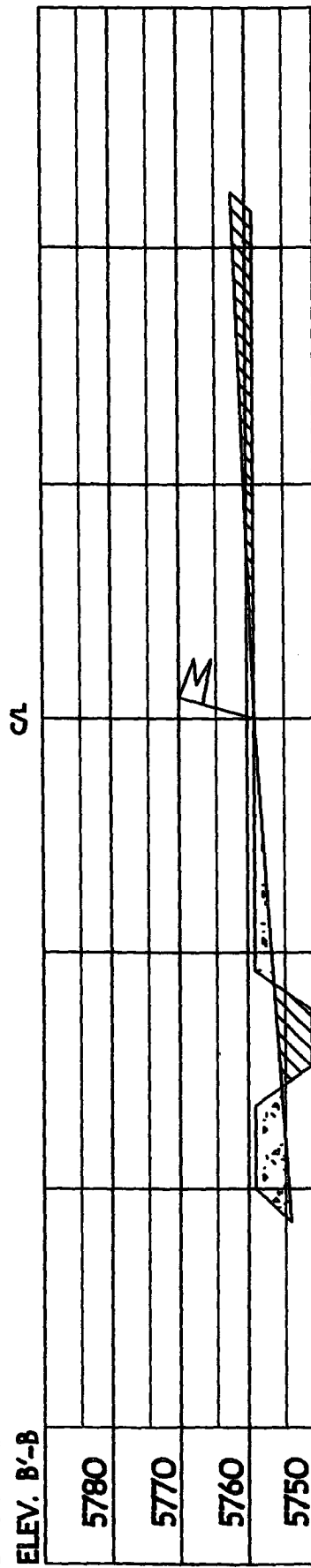
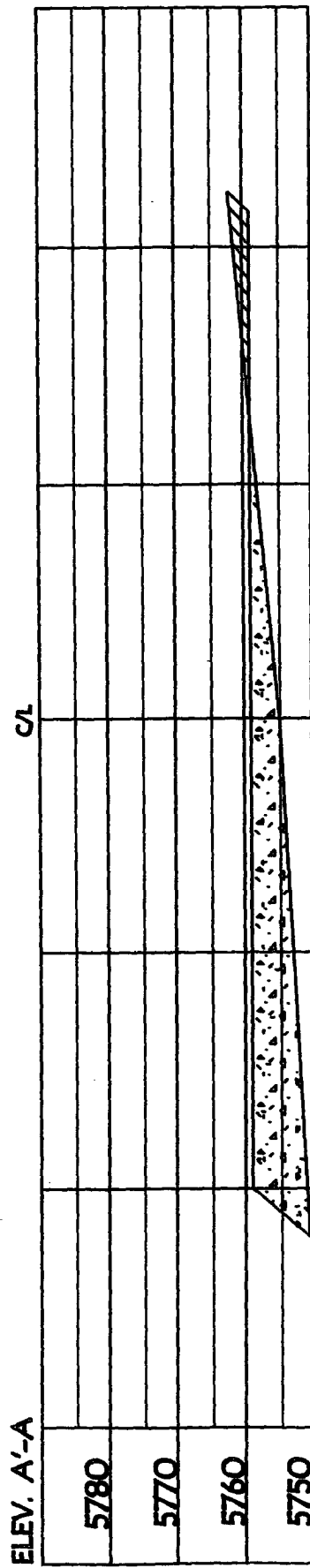


**LATITUDE: 36° 44.2350' LONGITUDE: 107° 50.3715' NAD27**

**RESERVE PIT DIKE, TO BE 8' ABOVE DEEP SIDE (OVERFLOW - 5' WIDE AND 4' ABOVE SHALLOW SIDE).**

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.

LACKEY A #293, 1755' FSL & 1580' FWL  
SECTION 12, T-29- N, R-10-W, NMPM, SAN JUAN COUNTY, NM  
GROUND ELEVATION: 5759', DATE: MARCH 18, 2005



**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.**

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.

NMSF-077092

7. Lease Name or Unit Agreement Name

Lackey A

8. Well Number

293

9. OGRID Number

14538

10. Pool name or Wildcat

Basin Fruitland Coal/ Fruitland Sands

**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 **K** : **1755** feet from the **South** line and **1580** feet from the **West** lineSection **12** Township **29N** Range **10W** NMPM County **San Juan**

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

5759'

Pit or Below-grade Tank Application

☒ or Closure ☐Pit type **New Drill** Depth to Groundwater **>100'** Distance from nearest fresh water well**>1000'** Distance from nearest surface water**>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 ☐TEMPORARILY ABANDON ☐PULL OR ALTER CASING ☐PLUG AND ABANDON ☐CHANGE PLANS ☐MULTIPLE COMPL ☐**SUBSEQUENT REPORT OF:**REMEDIAL WORK ☐COMMENCE DRILLING OPNS. ☐CASING/CEMENT JOB ☐ALTERING CASING ☐P AND A ☐

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.

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

*Amanda Sandoval*

TITLE

Regulatory Assistant II

DATE

5/10/2005

Type or print name

Amanda Sandoval

E-mail address:

asandoval@br-inc.com

Telephone No.

505-326-9700

**For State Use Only**

APPROVED BY

*[Signature]*

TITLE

DEPUTY OIL &amp; GAS INSPECTOR, DIST. OF

DATE

JUL - 5 2005

Conditions of Approval (if any):

OPERATIONS PLAN

**Well Name:** Lackey A #293  
**Location:** Unit K (NE/SW) 1755' FSL & 1580' FWL, Section 12, T29N, R10W  
 San Juan County, New Mexico  
 Latitude 36° 44.2350'N; Longitude 107° 50.3715'W  
**Formation:** Basin Fruitland Coal/ Fruitland Sands  
**Elevation:** 5759' GR

Formation:	Top	Bottom	Contents
Surface	San Jose		
Ojo Alamo	1048'		
Kirtland	1146'	1993'	gas
T/Fruitland	1993'		gas
B/Fruitland Coal	2181'		gas
Pictured Cliffs	2193'		
<b>Total Depth</b>	<b>2381'</b>		

**Note:** The Total Depth for this well is into the Pictured Cliffs interval, but currently only have plans to complete the Fruitland Coal interval. We could in the near future perforate/stimulate the Pictured Cliffs interval, but only would once Regulatory approval was asked for and received.

**Logging Program:** Newton-Density to surface.

**Mud Program:**

Interval	Type	Weight	Vis. Fluid Loss
0- 120'	Spud / air / air-mist	8.4-8.9	40-50 no control
120-2381'	Non-dispersed	8.4-9.5	30-60 no control

**Casing Program:**

Hole Size	Depth Interval	Csg.Size	Wt.	Grade
8 $\frac{3}{4}$ "	0 - 120'	7"	20.0#	J-55
6 $\frac{1}{4}$ "	0 - 2381'	4 1/2"	10.5#	J/K-55

**Tubing Program:**

0 - 2381'	2 3/8"	4.7#	J-55
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**Float Equipment:** 7" surface casing - guide shoe. Centralizers will be run in accordance with Onshore Order #2.

4 1/2" production casing - float shoe and float collar on bottom. Centralizers run every third joint above shoe to the base of the Ojo Alamo @ 1146'. Two turbolizing type centralizers - one below and one into the base of the Ojo Alamo @ 1146'. Standard centralizers thereafter every fourth joint up to the base of the surface pipe.

**Wellhead Equipment:** 7" x 4 1/2" x 2 3/8" x 11" 2000 psi xmas tree assembly.

April 12, 2005

**Cementing:**

7" surface casing Pre-Set Drilled - Cement with Type I, II cement with 20% flyash mixed at 14.5 ppg, 1.61 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 - Cement with 42 sx Type III cement with 0.25 pps Celloflake, 3% CaCl. (54 cu ft of slurry @ 1.28 yield). 200% excess, bring cement to surface. Wait on cement for 8 hrs for conventionally set holes before pressure testing or drilling out from under surface. **WOC until cement establishes 250 psi compressive strength prior to NU of BOPE.**

4 1/2" production casing - Cement with 113 sx (241 cu ft of slurry @ 2.13 yield) Premium Lite with 3% calcium chloride, 5 pps LCM-1, and 1/4#/sack celloflake, 0.4% FL-52, & 0.4% SMS. Tail with 90 sacks (124 cu ft of slurry @ 1.38 yield) Type III cmt with 1% calcium chloride, 1/4#/sack Celloflake and 0.2% FL-52. Total of 366 cf - 50% excess to circulate to surface.

**BOP and tests:**

Surface to TD - 11" 2000 psi (minimum double gate BOP stack (Reference Figure #1 and #2). Prior to drilling out surface casing, test rams to 600 psi/30 min.


Completion - 6" 2000 psi (minimum) double gate BOP stack (Reference Figure #2). Prior to completion operations, test rams and casing to 1500 psi/30 min.

From surface to TD - choke manifold (Reference Figure #3).

Pipe rams will be actuated at least once each day and blind rams actuated once each trip to test proper functioning. An upper kelly cock valve with handle and drill string safety valves to fit each drill string will be maintained and available on the rig floor.

**Additional information:**

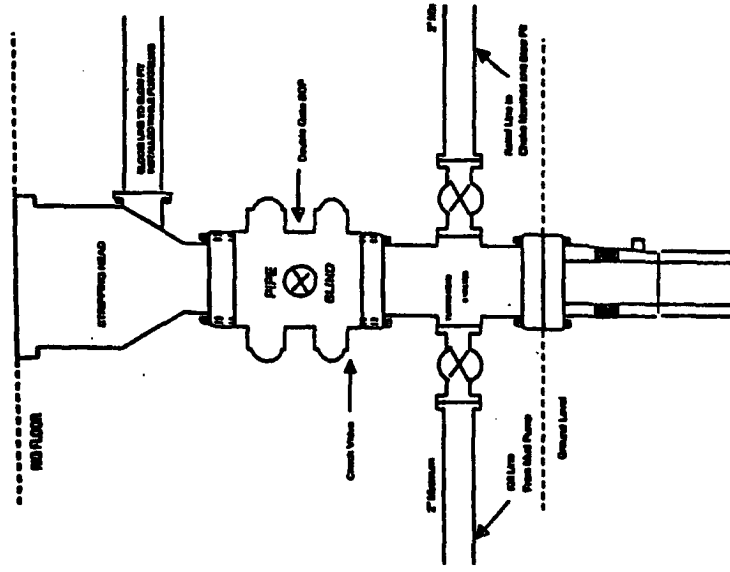
- \* The Fruitland Coal formation will be completed.
- \* Anticipated pore pressure for the Fruitland is between 600 - 700 psi.
- \* This gas is dedicated.
- \* The west half of the section is dedicated to Fruitland Coal and SW/4 is dedicated to Fruitland Sands for this well.
- \* New casing will be utilized.
- \* Pipe movement (either rotation or reciprocation) will be done if hole conditions permit.

  
Drilling Engineer

4-19-05  
Date

# BURLINGTON RESOURCES

Completion/Workover Rig  
BOP Configuration  
2,000 psi System

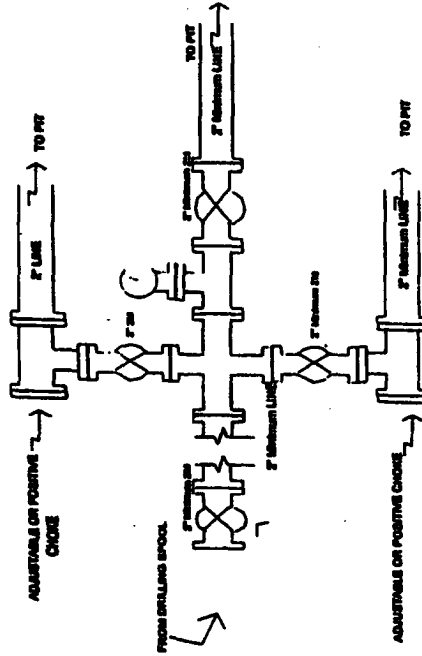


Minimum BOP Installation for all Completion/Workover Operations. 7-1/16" bore, 2000 psi minimum working pressure double gate BOP to be equipped with blind and pipe rams. A stripping head to be installed on the top of the BOP. All BOP equipment is 2000 psi working pressure or greater excluding 500 psi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

Figure #2

# BURLINGTON RESOURCES

Drilling Rig  
Choke Manifold Configuration  
2000 psi System

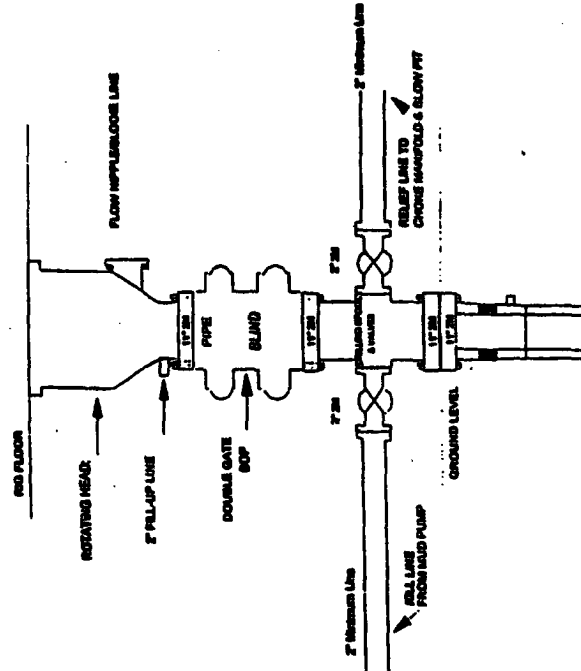


Choke manifold Installation from Surface Casing Point to Total Depth. 2,000psi working pressure equipment with two chokes.

Figure #3

# Burlington Resources

Drilling Rig  
2000 psi System



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

Figure #1

4-20-01

4-20-01