

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENTFORM APPROVED  
OMB No. 1004-0136  
Expires November 30, 2000

## APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of Work: <input checked="" type="checkbox"/> DRILL <input type="checkbox"/> REENTER		5. Lease Serial No. SF-078835
1b. Type of Well: <input type="checkbox"/> Oil Well <input checked="" type="checkbox"/> Gas Well <input type="checkbox"/> Other <input type="checkbox"/> Single Zone <input checked="" type="checkbox"/> Multiple Zone		6. Indian, Allottee or Tribe Name
2. Name of Operator CONOCO INC. Contact: VICKI WESTBY E-Mail: Vicki.R.Westby@conoco.com		7. If Unit or CA Agreement, Name and No.
3a. Address 10 DESTA DR., ROOM 608W MIDLAND, TX 79705	3b. Phone No. (include area code) Ph: 915.686.5799 Ext: 5799	8. Lease Name and Well No. SAN JUAN 28-7 253M
4. Location of Well (Report location clearly and in accordance with any State requirements. *) At surface SESE 1155FSL 1260FEL At proposed prod. zone		9. API Well No. 30-039-26794
14. Distance in miles and direction from nearest town or post office*		10. Field and Pool, or Exploratory BLANCO MESAVERDE/BASIN DAKOTA
15. Distance from proposed location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any)		11. Sec., T., R., M., or Blk. and Survey or Area p Sec 7 T27N R7W Mer NMP
16. No. of Acres in Lease		12. County or Parish RIO ARRIBA
17. Spacing Unit dedicated to this well		13. State NM
18. Distance from proposed location to nearest well, drilling, completed, applied for, on this lease, ft.		20. BLM/BIA Bond No. on file
19. Proposed Depth 7650 MD		
21. Elevations (Show whether DF, KB, RT, GL, etc.) 6641 GL		23. Estimated duration
22. Approximate date work will start		

## 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 an 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	Name (Printed/Typed) VICKI WESTBY	Date 08/14/2001
Title AUTHORIZED SIGNATURE		
Approved by (Signature) /s/ Joel Farrah	Name (Printed/Typed)	Date AUG 20 2001
Title	Office	

Application approval does not warrant or certify the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct 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 of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

## Additional Operator Remarks (see next page)

Electronic Submission #6415 verified by the BLM Well Information System  
For CONOCO INC., sent to the Farmington  
Committed to AFMSS for processing by Maurice Johnson on 08/15/2001 ()

This action is subject to internal and  
procedural review pursuant to 43 CFR 3155.3  
and appeal pursuant to 43 CFR 3155.4.

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

\*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\* ORIGINAL \*\*

WMOO

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

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

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

*API Number <b>30-039-26794</b>		*Pool Code <b>72319 / 71599</b>	*Pool Name <b>BLANCO MESAVERDE / BASIN DAKOTA</b>
*Property Code <b>016608</b>	*Property Name <b>SAN JUAN 28-7 UNIT</b>		*Well Number <b>253M</b>
*GRID No. <b>005073</b>	*Operator Name <b>CONOCO, INC.</b>		*Elevation <b>6641'</b>

<sup>10</sup> Surface Location

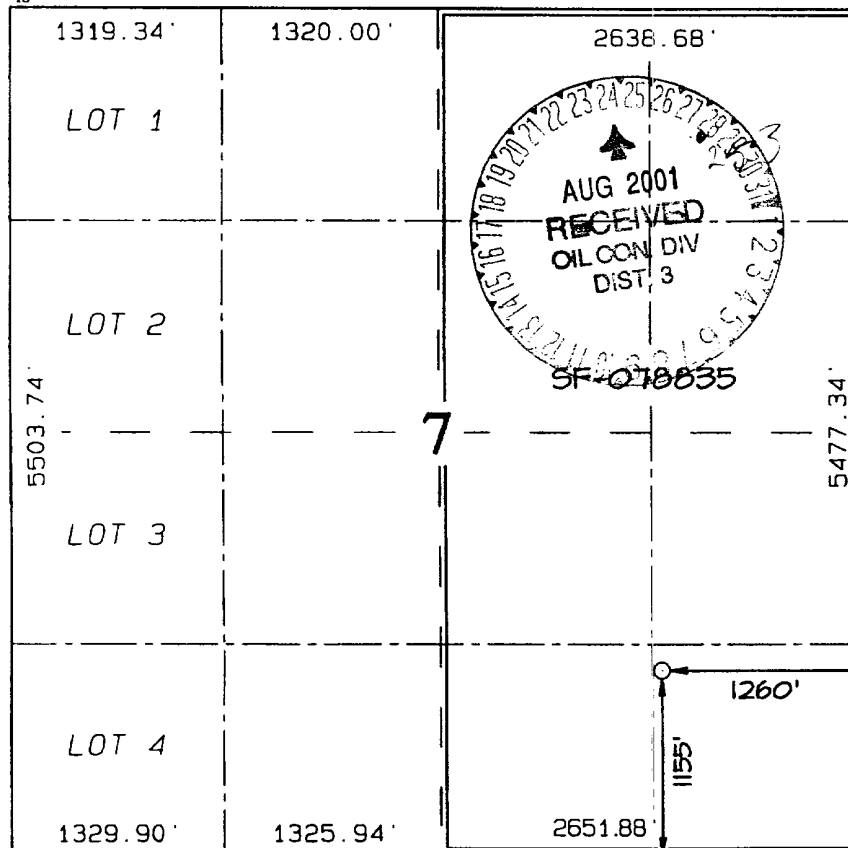
U. or lot no. <b>P</b>	Section <b>7</b>	Township <b>27N</b>	Range <b>7W</b>	Lot Idn.	Feet from the <b>1155</b>	North/South line <b>SOUTH</b>	Feet from the <b>1260</b>	East/West line <b>EAST</b>	County <b>RIO ARriba</b>
---------------------------	---------------------	------------------------	--------------------	----------	------------------------------	----------------------------------	------------------------------	-------------------------------	-----------------------------

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

U. or lot no.	Section	Township	Range	Lot Idn.	Feet from the	North/South line	Feet from the	East/West line	County
<sup>12</sup> Dedicated Acres <b>320 Acres (E/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>16</sup>



<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

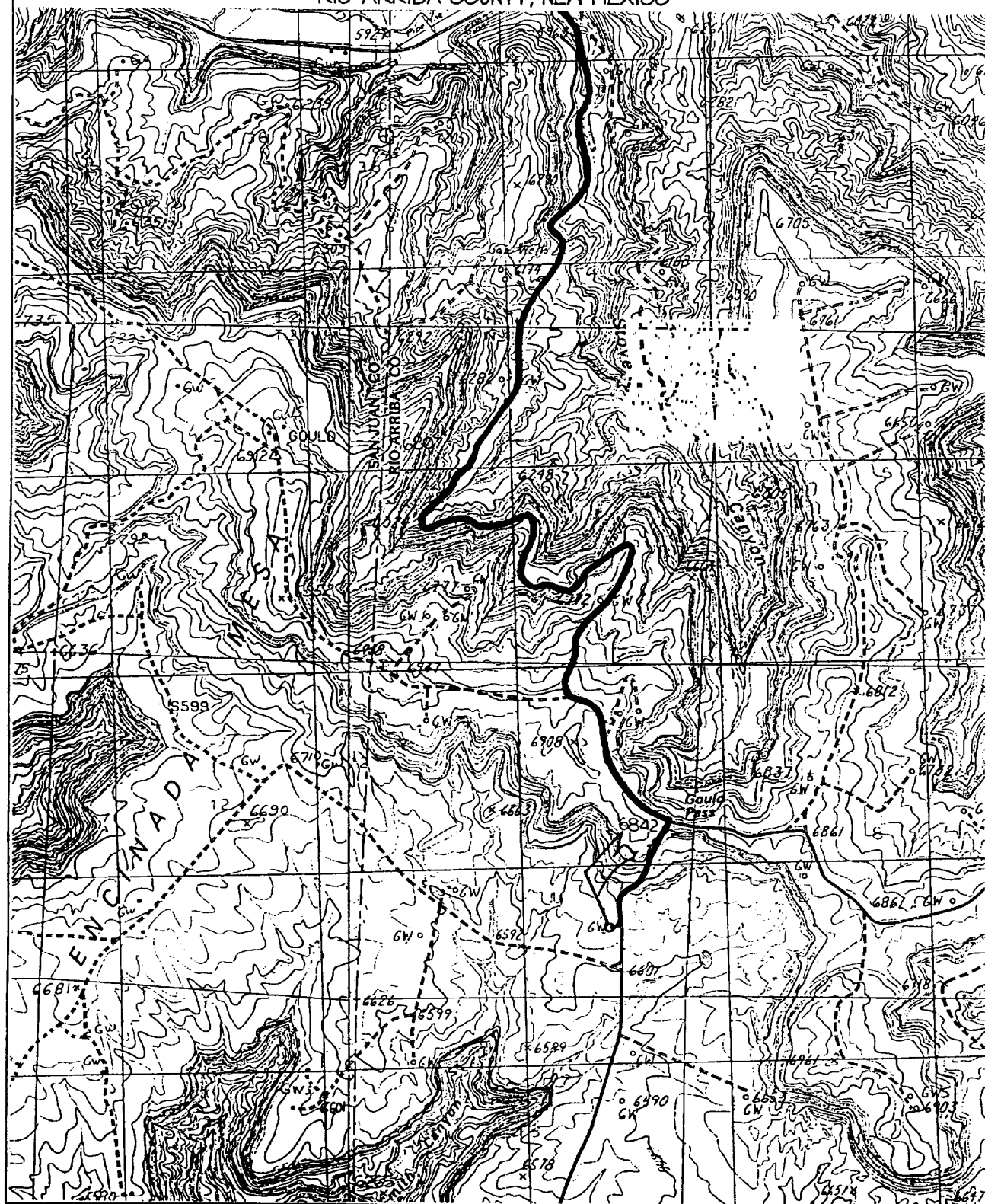
*Kim Southall*  
Signature  
Kim Southall  
Printed Name  
Property Analyst  
Title  
Date **6-3-01**

<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.

**JUNE 16, 2001**  
Date of Survey  
Signature and Seal of Surveyor  
*Neale Edwards*  
NEALE EDWARDS  
NEW MEXICO  
6857  
Certificate No. **6857**

CONOCO, INC. SAN JUAN 28-7 UNIT #253M

1155' FSL & 1260' FEL, SECTION 7, T27N, R7W, N.M.P.M.  
RIO ARriba COUNTY, NEW MEXICO



# PROJECT PROPOSAL - New Drill / Sidetrack



Well : SAN JUAN 28-7 253M Lease : SAN JUAN 28-7 AFE # : 3248 (MV) AFE \$ :  
 Field Name : EAST 28-7 Rig : Key 43 State : NM County : Rio Arriba API # :  
 Geoscientist : Glaser, Terry J Phone : (281) 293 - 6538 Prod. Engineer : Moody, Craig E. Phone : (281) 293 - 6559  
 Res. Engineer : Valvatne, Christine K. Phone : (281) 293 - 5767 Proj. Field Lead : Phone :

## Primary Objective (Zones) :

Pool Pool Name  
 FRR BASIN DAKOTA (PRORATED GAS)  
 RON BLANCO MESAVERDE (PRORATED GAS)

*"Air Drill"*

## Surface Location :

Latitude : 36.583831 Longitude : -107.6106 X : Y : Section : 7 Survey : 27N Abstract : 7W  
 Footage X : 1260 FEL Footage Y : 1155 FSL Elevation: 6641 (FT)

## Bottom Hole Location :

Latitude : Longitude : X : Y : Section : Survey : Abstract :

Location Type : Year Round Start Date (Est.) : Completion Date : Date In Operation :

Formation Data : Assume KB = 6654 Units = FT

Formation Call & Casing Points	Depth (TVD in Ft)	SS (Ft)	Depletion (Yes/No)	BHP (PSIG)	BHT	Remarks
Surface Casing	239	6415	<input type="checkbox"/>			Severe lost circulation is possible. 9 5/8", 36 ppf, J-55, STC casing. <u>Circulate cement to surface.</u>
OJAM	2314	4340	<input type="checkbox"/>			Possible water flows
KRLD	2406	4248	<input type="checkbox"/>			
FRLD	2854	3800	<input type="checkbox"/>			Possible gas
PCCF	3103	3551	<input type="checkbox"/>			
LEWS	3503	3151	<input type="checkbox"/>			
Intermediate Casing	3603	3051	<input type="checkbox"/>			7", 20 ppf, J-55, STC Casing. <u>Circulate cement to surface.</u>
CHRA	4039	2615	<input type="checkbox"/>			
CLFH	4762	1892	<input type="checkbox"/>	1300		Gas; possibly wet
MENF	4777	1877	<input type="checkbox"/>			Gas
PTLK	5287	1367	<input type="checkbox"/>			Gas
GLLP	6504	150	<input type="checkbox"/>			
GRHN	7264	-610	<input type="checkbox"/>			Gas possible, highly fractured
TWLS	7354	-700	<input type="checkbox"/>			Gas
CBBO	7488	-834	<input type="checkbox"/>			Gas
Total Depth	7650	-996	<input type="checkbox"/>	3000		4 1/2", 10.5 ppf, J-55, STC casing. <u>Circulate cement a minimum of 100' inside the previous casing string. No open</u>



Well: San Juan 28-7 253M  
County: Rio Arriba  
Area: East 28-7  
Rig: Key 43

Company: Conoco, Inc.  
Engineer: Mr. Ricky Joyce  
Date: 01-May-01

**Surface Casing:**

119 sx Type III Cement + 2%bwoc Calcium Chloride + 0.25 lbs/sk Cello Flake + 60.6% H2O

Slurry Weight:	14.5	ppg
Slurry Yield	1.41	cf/sk
Amount of Mix Water	6.84	gps
Pump Time	2:47	
Compressives		
8 hrs @ 80 F	800	psi
24 hrs @ 80 F	2150	psi
48 hrs @ 80 F	3625	psi

**Intermediate Casing:**

Slurry 1 435 sx Premium Lite Cement + 2% bwoc Calcium Chloride + 0.25 lbs/sc Cello Flake + 8% bwoc Bentonite + 120.1% H2O

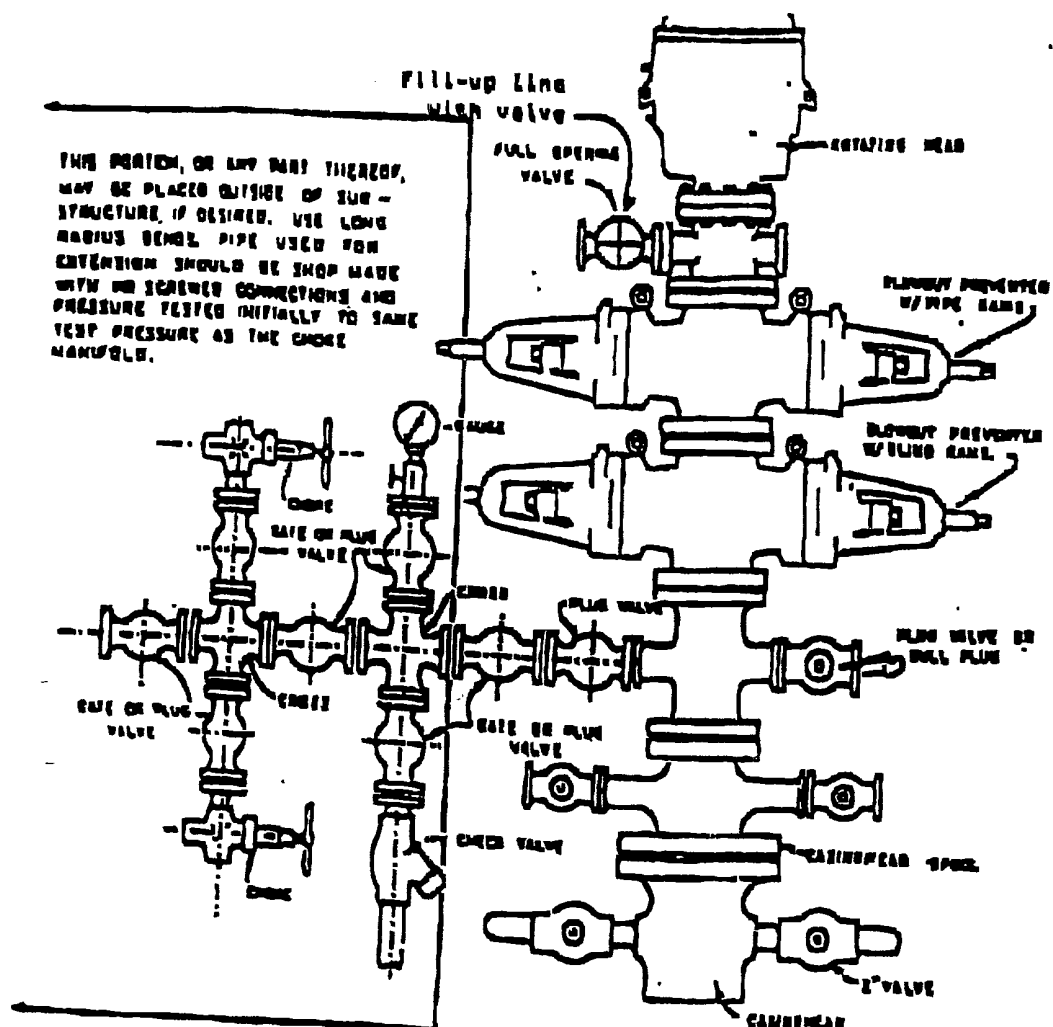
Slurry 2 74 sx Type III Cement + 2% bwoc Calcium Chloride + 0.25 lbs/sk Cello Flake + 60.6% H2O

Slurry 1			Slurry 2		
Slurry Weight:	12.1	ppg	Slurry Weight:	14.5	ppg
Slurry Yield	2.21	cf/sk	Slurry Yield	1.41	cf/sk
Amount of Mix Water	12.52	gps	Amount of Mix Water	6.84	gps
Pump Time	4:30		Pump Time	2:15	
Compressives			Compressives		
8 hrs @ 80 F		psi	8 hrs @ 80 F	800	psi
24 hrs @ 80 F	250	psi	24 hrs @ 80 F	2150	psi
48 hrs @ 80 F	525	psi	48 hrs @ 80 F	3625	psi

**Production Casing:**

377 sx Premium Lite High Strength + 0.25 lbs/sk Cello Flake + .45% bwoc CD-32 + 0.65% bwoc FL-52 + 0.1% R-3 + 107% H2O

Slurry Weight:	12.5	ppg
Slurry Yield	2.07	cf/sk
Amount of Mix Water	11.16	gps
Pump Time	2:29	
Compressives		
8 hrs @ 140 F		psi
24 hrs @ 140 F	1960	psi
48 hrs @ 140 F	2100	psi



## BLOWOUT PREVENTER HOOKUP

Drilling contractors used in the San Juan Basing supply 3000 psi equipment, but cannot provide annular preventors because of sub-structure limitations. Maximum anticipated surface pressures for this well will not exceed the working pressure of the proposed BOP system. Please see the attached BOP diagram details 2000 psi equipment according to Onshore Order No. 2 even though the equipment will test to 3000 psi. The 2000 psi system allows deletion of the annular preventor and fulfills your requirements (note diagram No. 1). In addition, the following equipment will comprise the 2000 psi system:

1. Two rams with one blind and one pipe ram.
2. Kill line (2 inch maximum).
3. One kill line valve.
4. One choke line valve.
5. Two chokes (reference diagram No. 1).
6. Upper kelly cock valve with handle.
7. Safety valve and subs to fit all drill strings in use.
8. Two-inch minimum choke line.
9. Pressure gauge on choke manifold.
10. Fill-up line above the upper most preventer.
11. Rotating head.

## Cathodic Protection System Description

<b>Anode Bed Type</b>	Deep Well	
<b>Hole Size</b>	8"	
<b>Hole Depth</b>	200' - 500'	As required to place anodes below moisture and in low resistance strata.
<b>Surface Casing</b>	8" Diam., $\geq$ 20' Length, Cemented In Annular Space	When needed, casing will be installed at an adequate depth to control ground water flow. Casing will extend a minimum of 2' above grade, be surrounded by a concrete pad, and sealed with a PVC cap. Steel casing will be substituted when boulders are encountered.
<b>Vent Pipe</b>	1" Diam. PVC	Vent pipe will extend from bottom of hole, through top of casing cap, and sealed with a 1" perforated PVC cap.
<b>Type Of Anodes</b>	Cast Iron Or Graphite	
<b>Number Of Anodes</b>	8 - 20	Sufficient quantity to achieve a total anode bed resistance of $< 1$ ohm and a design life $\geq$ 20 years.
<b>Anode Bed Backfill</b>	Loreasco SW Calcined Petroleum Coke Breeze	Installed from bottom of hole to 10' above top anode.
<b>Anode Junction Box</b>	8 - 20 Circuit Fiberglass Or Metal	Sealed to prevent insect & rodent intrusion.
<b>Current Splitter Box</b>	2 - 5 Circuit Metal	Sealed to prevent insect & rodent intrusion.
<b>DC / AC Cable</b>	DC: #2, #4, #6, #8 Stranded Copper (One Size Or Any Combination Of) With High Molecular Weight Polyethylene (HMWPE) Insulation.  AC: #8 Stranded Copper HMWPE	18" depth in typical situation, 24" depth in roadway, & 36" depth in arroyos and streams. EXCEPTION: If trenching is in extremely hard substratum, depth will be 6 - 12" with cable installed in conduit.  Installed above foreign pipelines if 1' clearance is available. If not, installed under foreign pipeline with 1' clearance (AC cable a/ways installed under foreign pipeline in conduit).
<b>Power Source</b>	1) Rectifier 2) Solar Power Unit 3) Thermoelectric Generator	Choice of power source depending on availability of AC & other economic factors.
<b>External Painting</b>	Color to be selected according to BLM specifications.	Paint applied to any surface equipment associated with the CP system which can reasonably be painted.