Form 3160-3
(August 1999)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

NOV 2001

FORM APPROVED
OMB No. 1004-0136
Expires November 30, 2000

APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of Work: ☒ DRILL ☐ REENTER	5. Lease Serial No. SF 078433 ✓
	6. If Indian, Allottee or Tribe Name
	7. If Unit or CA Agreement, Name and No. 18109
1b. Type of Well: ☐ Oil Well ☒ Gas Well ☐ Other ☒ Single Zone ☐ Multiple Zone	8. Lease Name and Well No. [redacted] NEWSOM 15E
2. Name of Operator CONOCO INC. Contact: KIM SOUTHALL E-Mail: kim.j.southall2@usa.conoco.com	9. API Well No. 30-045-30688 C
3a. Address 10 DESTA DRIVE, SUITE 607W MIDLAND, TX 79705	3b. Phone No. (include area code) Ph: 915.686.5565 Fx: 915.686.6503
	10. Field and Pool, or Exploratory BASIN DAKOTA
4. Location of Well *(Report location clearly and in accordance with any State requirements.)* At surface NWSE 1725FSL 1795FEL At proposed prod. zone	ENTERED AFMSS MAY 29 2001 BY
	11. Sec., T., R., M., or Blk. and Survey or Area J Sec 18 T26N R8W Mer NMP
14. Distance in miles and direction from nearest town or post office*	12. County or Parish SAN JUAN / 13. State NM
15. Distance from proposed location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any)	16. No. of Acres in Lease 320.00 ✓ / 17. Spacing Unit dedicated to this well 320.00 E/2
18. Distance from proposed location to nearest well, drilling, completed, applied for, on this lease, ft.	19. Proposed Depth 6668 MD / 20. BLM/BIA Bond No. on file
21. Elevations (Show whether DF, KB, RT, GL, etc. 6222 GL	22. Approximate date work will start / 23. Estimated duration

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) KIM SOUTHALL	Date 05/23/2001
Title SUBMITTING CONTACT		
Approved by (Signature) /s/ Jim Lovato	Name (Printed/Typed)	Date NOV - 8
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 #4483 verified by the BLM Well Information System
For CONOCO INC., sent to the Farmington
Committed to AFMSS for processing by Maurice Johnson on 05/29/2001 ()

procedural review pursuant to 43 C.F.R. 3165.3
and appeal pursuant to 43 CFR 3165.4.

**** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ****

NMOCD

✓

K

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

District II
PO Drawer DD, 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

¹API Number	²Pool Code	³Pool Name
30-045-30680	71599	BASIN DAKOTA

⁴Property Code	⁵Property Name	⁶Well Number
18109	NEWSOM	15E
⁷OGRID No.	⁸Operator Name	⁹Elevation
005073	CONOCO, INC.	6222'

¹⁰Surface Location

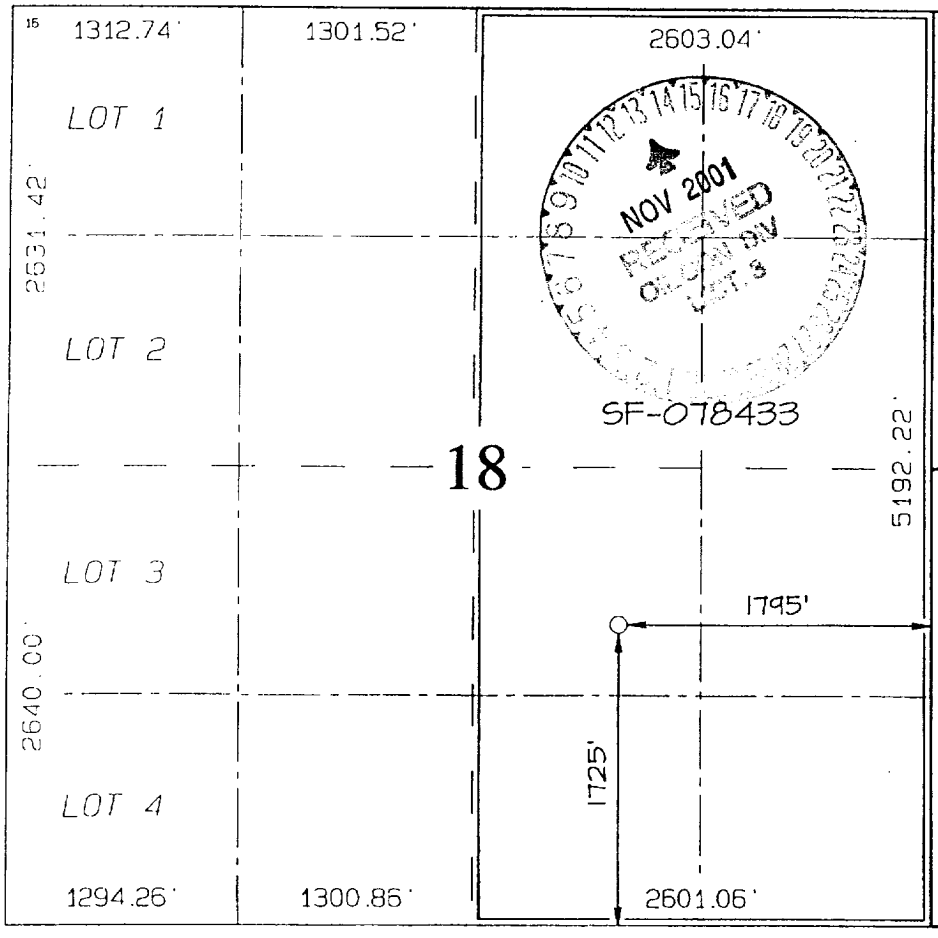
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
J	18	26N	8W		1725	SOUTH	1795	EAST	SAN JUAN

¹¹Bottom 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

¹²Dedicated Acres	¹³Joint or Infill	¹⁴Consolidation Code	¹⁵Order No.
320.0 Acres (E/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



¹⁷OPERATOR CERTIFICATION

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

Signature

Kim Southall

Printed Name

Property Analyst

Title

May 4, 2001

Date

¹⁸SURVEYOR 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.

APRIL 17, 2001

Date of Survey

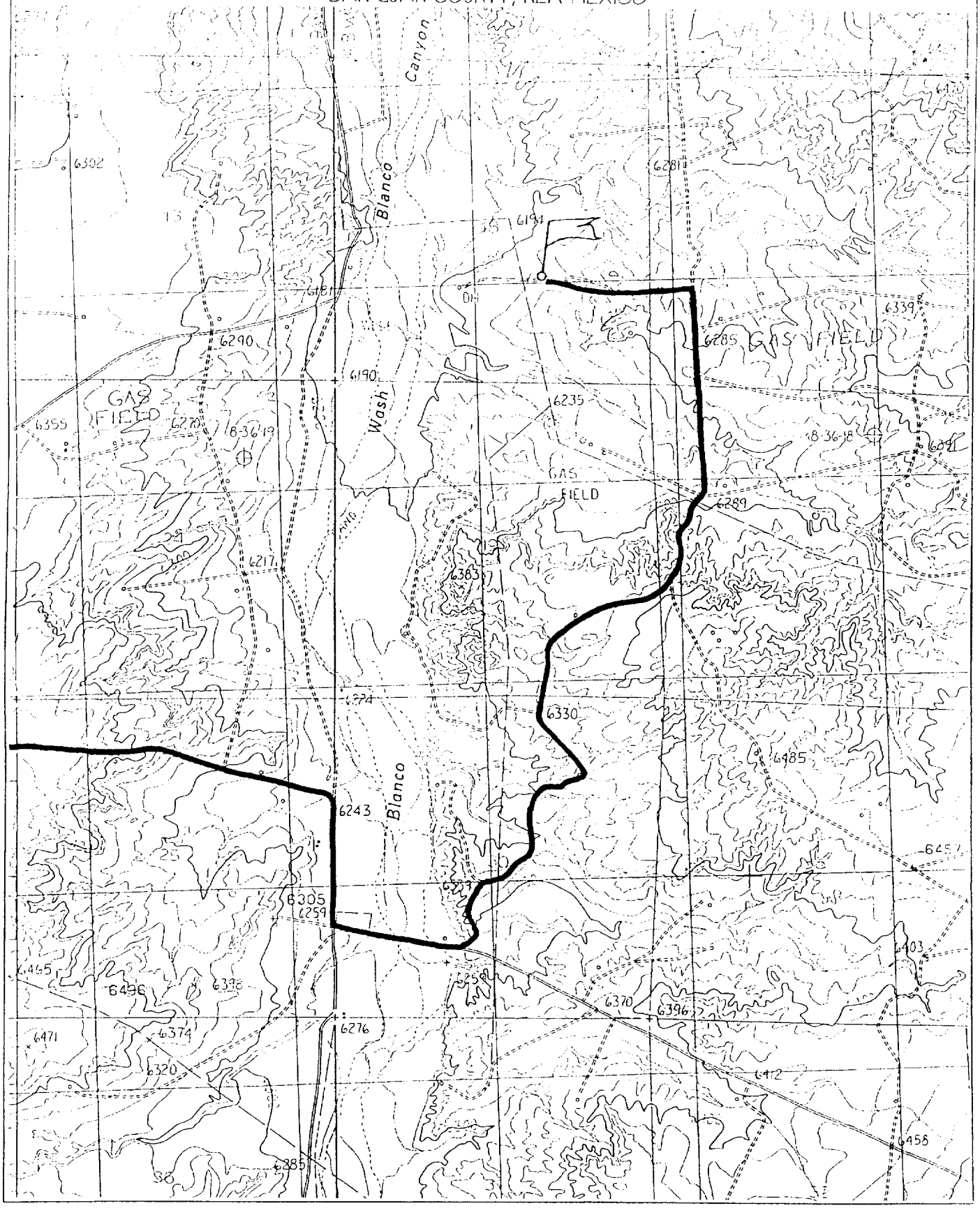
Signature and Seal of Professional Surveyor

NEALE C. EDWARDS
NEW MEXICO
6857
REGISTERED PROFESSIONAL SURVEYOR

Certificate Number 6857

CONOCO, INC. NEWSOM #15E

1725' FSL & 1795' FEL, SECTION 18, T26N, R8W, N.M.P.M.
SAN JUAN COUNTY, NEW MEXICO



PROJECT PROPOSAL - New Drill / Sidetrack

conoco

Well : LEWIS 67 1M Lease : NEWSOM AFE # : AFE $:

Field Name : EAST BLOOMFIELD Rig : State : NM County : San Juan API # :

Geoscientist : Carlson, Terry J Phone : (281) 293 - 6538 Prod. Engineer : Moody, Craig F Phone : (281) 293 - 6556

Res. Engineer : Shannon, Marc Phone : (281) 293 - 6564 Proj. Field Lead : Bergman, Pat W. Phone : (281) 293 - 6517

Primary Objective (Zones) :

Pool	Pool Name
FRR	BASIN DAKOTA (PRORATED GAS)

Surface Location :

Latitude : 36.48545 Longtitude : -107.7199 X : Y : Section : 18 Survey : 26N Abstract : 8W

Footage X : 1795 FEL Footage Y : 1725 FSL Elevation: 6222 (FT)

Bottom Hole Location :

Latitude : Longtitude : X : Y : Section : Survey : Abstract :

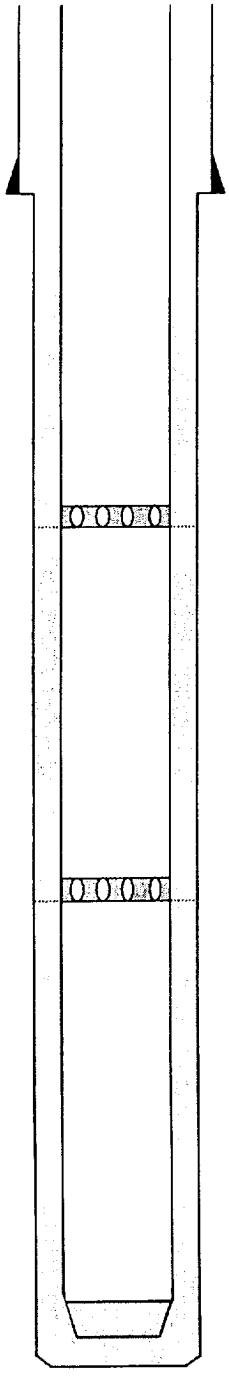
Location Type : Year Round Start Date (Est.) : Completion Date : Date In Operation :

Formation Data : Assume KB = 6235 Units = FT

Formation Call & Casing Points	Depth (TVD in Ft)	SS (Ft)	Depletion (Yes/No)	BHP (PSIG)	BHT	Remarks
Surface Casing	282	5953				Severe lost circulation is possible. 9 5/8", 36 ppf, J-55, STC casing. Circulate cement to surface.
OJAM	1092	5143				Possible water flows"
KRLD	1142	5093				
FRLD	1652	4583				Possible gas
PCCF	1952	4283		1100		
CHRA	2847	3388				
CLFH	3537	2698				Gas; possibly wet
MENF	3627	2608				Gas
PTLK	4287	1948				Gas
GLLP	5427	808				
GRHN	6237	-2				Gas possible, highly fractured
TWLS	6315	-80				Gas
PAGU	6405	-170				Gas
CBBO	6467	-232				Gas
Total Depth	6668			3000		4 1/2", 10.5 ppf, J-55, STC casing. Circulate cement a minimum of 100' inside the previous casing string. No open hole logs. Cased hole TDT with GR to surface.

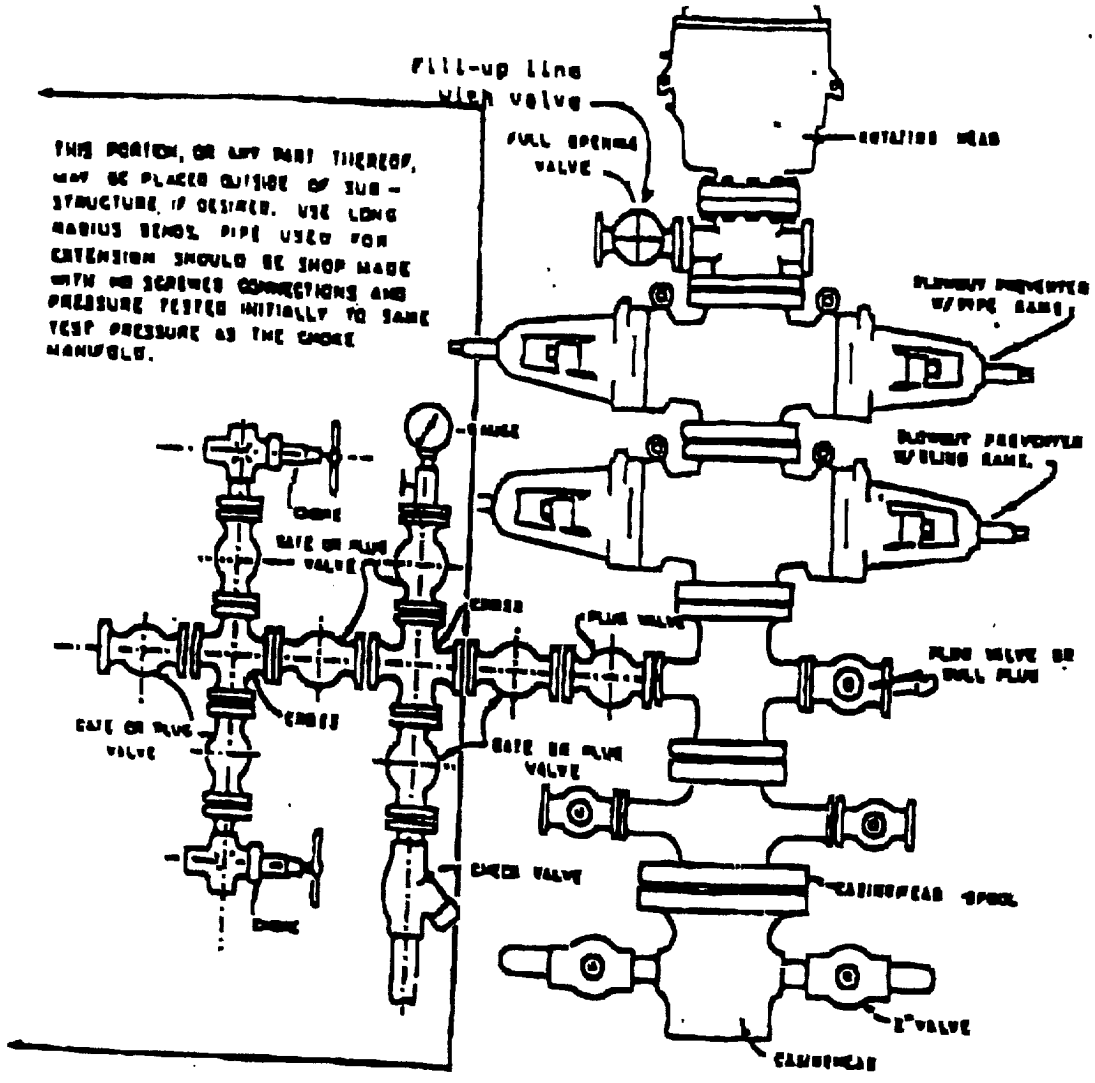
Cementing Summary

Newsom 15E



	Depth	OH Excess					
9-5/8" Sfc. Casing	0		Class 'H' Cement	183 sx	Slurry Volume	194.0	cu ft
			Flocele (if req'd)	0.25 lb/sk		34.6	bbl
			CaCl2	2.00% bwoc-db	Slurry Density	16.5	ppg
			Defoamer (if req'd)	0.05 gal/bbl	Slurry Yield	1.06	cu ft/sk
					Mix Fluid	4.2	gal/sk
9-5/8" shoe	282	100%					
			Cement Blend	622 sx			
			Class 'H' Cement	84 lb/sk	Slurry Volume	1760.2	cu ft
			San Juan Poz	lb/sk		313.5	bbl
			Econolite	3.00% bwob	Slurry Density	11.4	ppg
			CaCl2	bwob	Slurry Yield	2.83	cu ft/sk
			CFR-3	bwob	Mix Fluid	17.29	gal/sk
			HR-5	bwob			
			Silicalite-blended	10 lb/sk			
			Flocele	0.5 lb/sk			
			Defoamer (if req'd)	0.05 gal/bbl			
DV Tool #2 Stage #3	3,387	75%					
			Cement Blend	809 sx			
			Class 'H' Cement	47 lb/sk	Slurry Volume	1376	cu ft
			San Juan Poz	24 lb/sk		245.1	bbl
			Bentonite	3.00% bwob	Slurry Density	12.8	ppg
			Halad-344	0.40% bwob	Slurry Yield	1.70	cu ft/sk
			CFR-3	0.20% bwob	Mix Fluid	8.26	gal/sk
			HR-5	0.15% bwob			
			Silicalite-blended	20 lb/sk			
			Flocele	0.25 lb/sk			
			Defoamer (if req'd)	0.05 gal/bbl			
DV Tool #1 Stage #2	6,087	60%					
			Cement Blend	201 sx			
			Class 'H' Cement	47 lb/sk	Slurry Volume	342.2	cu ft
			San Juan Poz	24 lb/sk		60.9	bbl
			Bentonite	3.00% bwob	Slurry Density	12.8	ppg
			Halad-344	0.40% bwob	Slurry Yield	1.70	cu ft/sk
			CFR-3	0.20% bwob	Mix Fluid	8.26	gal/sk
			HR-5	0.10% bwob			
			Silicalite-blended	20 lb/sk			
			Flocele	0.25 lb/sk			
			Defoamer (if req'd)	0.05 gal/bbl			
4-1/2" Csg Sh Stage #1	6,668	60%					

Note: Conoco to confirm DV depths



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 3000 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 preventor.
11. Rotating head.

Cathodic Protection System Description

Anode Bed Type	Deep Well	
Hole Size	8"	
Hole Depth	200' - 500'	As required to place anodes below moisture and in low resistance strata.
Surface Casing	8" Diam., ≥ 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.
Vent Pipe	1" Diam. PVC	Vent pipe will extend from bottom of hole, through top of casing cap, and sealed with a 1" perforated PVC cap.
Type Of Anodes	Cast Iron Or Graphite	
Number Of Anodes	8 - 20	Sufficient quantity to achieve a total anode bed resistance of < 1 ohm and a design life ≥ 20 years.
Anode Bed Backfill	Loresco SW Calcined Petroleum Coke Breeze	Installed from bottom of hole to 10' above top anode.
Anode Junction Box	8 - 20 Circuit Fiberglass Or Metal	Sealed to prevent insect & rodent intrusion.
Current Splitter Box	2 - 5 Circuit Metal	Sealed to prevent insect & rodent intrusion.
DC / AC Cable	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 arroyo's and streams. EXCEPTION: If trenching is in extremely hard substratum, depth will be 8 - 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 *always* installed under foreign pipeline in conduit).
Power Source	1) Rectifier 2) Solar Power Unit 3) Thermoelectric Generator	Choice of power source depending on availability of AC & other economic factors.
External Painting	Color to be selected according to BLM specifications.	Paint applied to any surface equipment associated with the CP system which can reasonably be painted.