Form 3160-3 FORM APPROVED OMB No. 1004-0136 (August 1999) **UNITED STATES** Expires November 30, 2000 DEPARTMENT OF THE INTERIOR 5. Lease Serial No. **BUREAU OF LAND MANAGEMENT** Jicarilla Contract #97 If Indian, Allottee or Tribe Name APPLICATION FOR PERMIT TO DRILL OR REE Jicarilla Apache Tribe 74 If Unit or CA Agreement, Name and No. Type of Work: X DRILL REENTER 8. Lease Name and Well No. Oil Well b. Type of Well: Gas Well Single Zone Tribal C #9C 9. API Well No. 2. Name of Operator Cordillera Energy, Inc. 3b. Phone No. (include area code) 10. Field and Pool, or Exploratory 3A. Address c/o Walsh Engineering,7415 E. Main, Farmington, NM 87402 (505) 327-4892 Basin DK/Blanco Mesa Verde 4. Location of Well (Report location clearly and in accordance with any State requirements.*) 11. Sec., T., R., M., or Blk, and Survey or Area 660' FSL and 660' FEL Sec. 7, T26N, R3W At proposed prod. Zone Distance in miles and direction from nearest town or post office* 12. County or Parish 13. State 21 miles south of Dulce, NM Rio Arriba NM Distance from proposed 16. No. of Acres in lease 17. Spacing Unit dedicated to this well location to nearest property or lease line, ft. (Also to nearest drig, unit line, if any) 660' 320+ 320 acres E/2 Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. 19. Proposed Depth 20. BLM/BIA Bond No. on file 1300' 8200' +/-21. Elevations (Show whether DF, KDB, RT, GL, etc.) 22. Approximate date work will start* 23. Estimated duration 7046' GL September 15, 2003 3 weeks 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. Bond to cover the operations unless covered by an existing bond on file (see 2. A Drilling Plan. Item 20 above). 3. A Surface Use Plan (if the location is on National Forest System Lands, th 5. Operator certification. SUPO shall be filed with the appropriate Forest Service Office. Such other site specific information and/or plans as may be required by the authorized office. 25. Signature Name (Printed/Typed) Date Paul C. Thompson, P.E. 8/11/03 Title Agent Approved by (Signature) Name (Printed/Typed) /s/ David R. Sitzler 2 7 2004 SEP Title Assistant Field Manager Office Application approval does not warrant or certify that 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. *(Instructions on reverse)

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

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

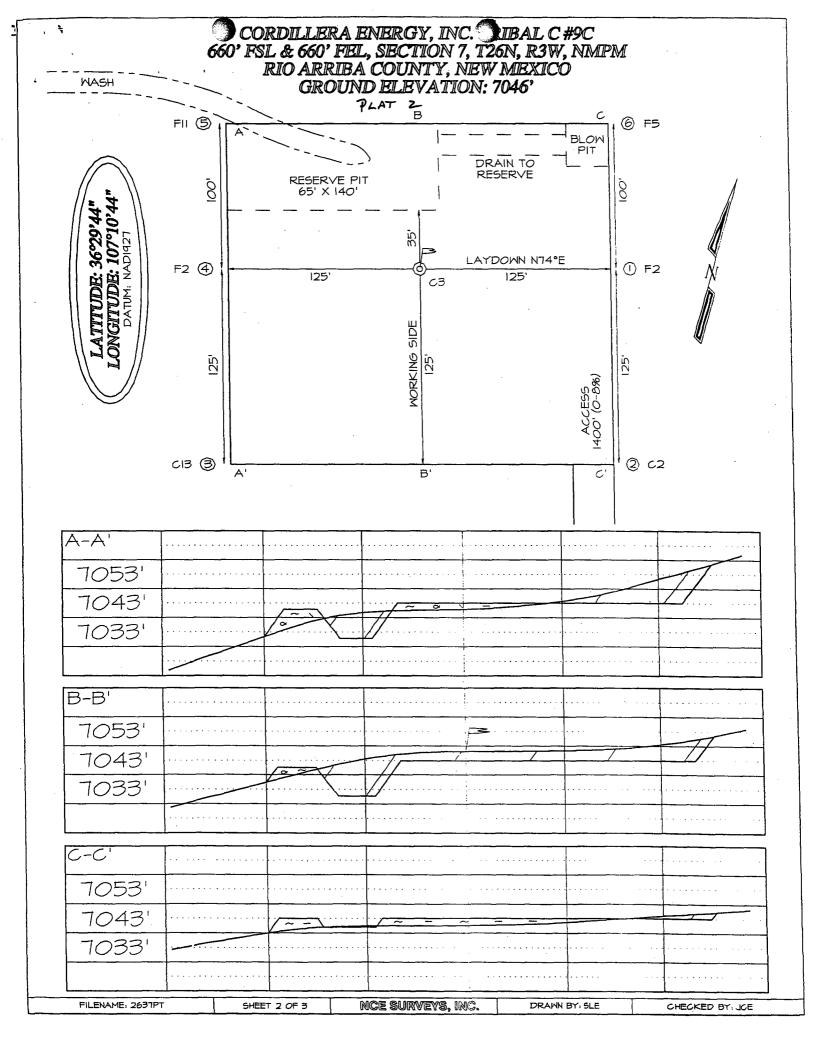
District IV PO Box 2088, Santa Fe, NM 87504-2088 State of New Mexicus Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION PO Box 2088 Santa Fe, NM 87504-2088 Form C-102 Revised February 21, 1994 Instructions on back Dmit to Appropriate District Office

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

AMENDED REPORT

		W	ELL LO	CATI	ON AND AC	REAGE D	EDIC	CATI	ON PL	ΔT		
					7 Code POOL Name BLANCO MESAVERDE / BAS						DAKO	ATI
Property Code			*Property Name TRIBAL C						"Well Number 9C			
'DGRID No. 173252				*Operator Name CORDILLERA ENERGY, INC.						*Elevation 7046		
					OSURFACE I	Location						
UL or lot no. Section Township Range P 7 26N 3W		3M	v (Feet from the		East/West line EAST		RIO ARRIBA	
	an lot on Section	11 Bot			ocation I				n Surf			
u ·	or lot no. Section	TOWNSHIP	Range Lo	t Ion	Feet from the	North/Sauth	line	7991	from the	East/We	st line	County
12 Ded	icated Acres 320	.0 Acres	- (E/2)		Joint or Infill	¹⁴ Consolidation	Code	⁵ Order	No.	•		
) ALLOWABLE W	ILL BE ASS	SIGNED T ION-STAND	O TH	IS COMPLETION UNIT HAS BE	ON UNTIL EN APPRO	ALL I VED B	NTER Y TH	RESTS H	AVE BE	EN CON	NSOL IDATED
.00.0	1039.50 LOT 1	1320.0	00	المراد الديانية	SEP 20 SEP 20 SEP 20 SEP 20 SEP 20 SEP 20 SEP 20 SEP 20 SEP 20	0.00 	7	0.00 '	I hereby containe to the formal signature. Printed AGE Title Date	Remarks of the control of the contro	CERTI	FICATION information informati
5280	LOT 3						66	528	my super- and corre Date O	f Surver and Seal	that the best of ey: APF of Profes	same is true my belief RIL 10. 2003 ssional Surveyor
	1059.30	1320	.00. C		264	40.00	,099		JAS	ficate i	C.E	DWARDS 15269



CORDILLERA ENERGY, INC. OPERATIONS PLAN Tribal C #9C

I. Location: 660' FSL & 660' FEL

Sec 7, T26N, R3W

Rio Arriba County, NM

Field: Blanco MV & Basin DK

Surface: Jicarilla Apache Tribe Minerals: Jicarilla Contract #97 Date: August 11, 2003

Elev: GL 7046'

II. Geology: Surface formation _ San Jose

Α.	Formation Tops	Depths
	Ojo Alamo	
	Kirtland	
	Pictured Cliffs	3575 '
	Cliff House	5400 ′
	Menefee	5525 ′
	Point Lookout	5850 ′
	Greenhorn	7925 ′
	Graneros	
	Dakota	8005 ′
	Total Depth	8200 ′

Estimated depths of anticipated water, oil, gas, and other mineral bearing formations which are expected to be encountered:

Water and gas - 3575', 5400', 5850', 8005'.

- B. Logging Program: Induction/GR and density logs at TD.
- C. No over pressured zones are expected in this well. No H_2S zones will be penetrated in this well. Max. BHP = 2500 psig.

III. Drilling

- A. Contractor:
- B. Mud Program:

The surface hole will be drilled with a fresh water mud.

The intermediate hole will be drilled with a fresh water polymer mud. The weighting material will be drill solids or if conditions dictate, barite. The maximum mud weight expected is 8.5 ppg.

The production hole will be drilled with air or air/mist.

Tribal C #9C Operations Plan Pg #2

C. Minimum Blowout Control Specifications:

Double ram type 2000 psi working pressure BOP with a rotating head. See the attached Exhibit #1 for details on the BOP equipment. All ram type preventers and related equipment will be hydraulically tested at nipple-up and after any use under pressure to 1000 psi.

The blind rams will be hydraulically activated and checked for operational readiness each time pipe is pulled out of the hole. All checks of the BOP stack and equipment will be noted on the daily drilling report. The BOP equipment will include a kelly cock, floor safety valve, and choke manifold all rated to 2000 psi.

IV. Materials

A. Casing Program:

Hole Size	Depth	Casing Size	Wt. & Grade
12-1/4"	250 ′	9-5/8"	36# J-55
8-3/4"	3975 ′	7"	20# J-55
6-1/4"	8200'	4-1/2"	11.6# N-80

B. Float Equipment:

- a) Surface Casing: Notched collar on bottom and 3 centralizers on the bottom 3 joints.
- b) Intermediate Casing: 7" cement guide shoe and self fill insert float collar. Place float one joint above shoe. Ten centralizers spaced every other joint above shoe and ten turbolizers every other joint from 2000'.
- c) Production Casing: 4-1/2" whirler type cement nosed guide shoe and a float collar on top of the bottom joint.

Tribal C #9C Operations Plan Pg #3

V. Cementing:

Surface casing: 9-5/8" - Use 140 sx (165 cu. ft.) of Cl "B" with 2% CaCl₂ (Yield = 1.18 cu. ft./sk; slurry weight = 15.6 PPG). 100% excess to circulate cement to surface. WOC 12 hours. Pressure test surface casing to 1000 psi for 30 min.

Intermediate Casing: 7" - Before cementing circulate hole with at least 1-1/2 hole volumes of mud. Precede cement with 30 bbls of fresh water. Lead with 505 sx (1087 cu.ft) of Type III 65/35 poz with 8% gel, 1% CaCl₂, ¼#/sk. Celloflake. (Yield = 2.09 cu.ft./sk; slurry weight = 12.1 PPG). Tail with 100 sx (139 cu.ft.) of Type III with 1% CaCl₂, ¼#/sk. Celloflake. (Yield = 1.39 cu. ft./sk; slurry weight = 14.5 PPG). Total cement volume is 1194 cu.ft. (100% excess to circulate cement to surface). WOC for 12 hrs. Pressure test the BOP and casing to 1500 psi.

Production Casing: 4-1/2" - Blow hole clean. Precede cement with 20 bbls of gel water and 10 bbls of water. **Lead** with 285 sx(564 cu.ft.) of Premium Lite HS with 0.65% FL-52, 0.32% CD-32, $\frac{1}{4}$ #/sk celloflake, and 4% phenoseal. (Yield = 1.98 cu.ft./sk; slurry weight = 12.5 PPG). **Tail** with 100 sx(196 cu.ft.) of Premium Lite HS with 0.65% FL-52, and 0.32% CD-32. (Yield = 1.96 cu.ft./sk; slurry weight = 12.5 PPG). Total cement volume is 760 cu.ft. (70% excess to circulate 100' above the intermediate casing shoe).

Paul C. Thompson, P.E.

Cordillera Energy, Inc.

Well Control Equipment Schematic for 2M Service

Attachment to Drilling Technical Program

Typical BOP setup $E \times HIBIT = 1$

