Form 310-3-3 Concention 1999 Concention 19		•								
DEPARTMENT OF THE INTERIOR BURBALL OF LAND MANAGEMENT APPLICATION FOR PERMIT TO DRILL OR DEEPEN In 1795 OF WORK APPLICATION FOR PERMIT TO DRILL OR DEEPEN In 1795 OF WORK TYPE OF WILL WHELL SO OTHER TO STRUKE SOURCE TO ST	Form 3160-3 (December 1990)	SUBMIT IN TRIPLICATE* (Other instructions on								
BUREAU GE LAND MANAGEMENT APPLICATION FOR PERMIT TO DRILL OR DEEPEN IN THE OF WORK DRILL SI OTHER DEEPEN SERVE DATE OF THE MANE NA NA NA NA NA NA NA NA NA	` '		UNITED STA	TES		reverse side)				
APPLICATION FOR PERMIT TO DRILL OR DEEPEN IL TYPE OF WOLK DEEPEN DEEPEN NAME OF THE OF WOLK NAME OF THE OF WOLK DEEPEN NAME OF THE OF WOLK ON THE OF				-					5, LEASE DESIGNATION AN	ID SERIAL NO.
IN APPLICATION FOR PERMITTO BRILL OR DEEPEN	· ·	BU	REAU OF LAND MA	NAGEMENT						<u> </u>
DEFILE DEEPEN DE		APPLICATION	FOR PERMIT	TTO DRILL	OR	DEEPEN			1	R TRIBE NAME
DEFINITE OF WELL ORS ORSE SPICE S	la. TYPE OF WORK									<u> </u>
SOURCE SO		DRILL K	DEEP	en 🗆					I .	
NAME OF OFFICE OF THE PROJECT ON THE LOCATION OF THE PROPERTY		GAS		SINGLE	_	MULTIPLE	_		8. FARM OR LEASE NAME,	WELL NO.
Williams Production Company, LLC 1. ALGRESS AND TELEMHOR HO. P.O. Box 316—Ignacio, Colorado 81137-0316 4 LOCATION OF WELL Report toxino deady and is normbace with usy flate reparament. * 1. In SEC. 1.8. A. GRILLE A proporal prod. none 1. 675 FSL. 1. 690 FEEL. (1) 1. DESTANCE RISAD SAND DEBECTRON ROAD PEEL. (1) 1. DESTANCE RISAD SAND DEBECTRON ROAD PEEL. (2) 1. DESTANCE RISAD SAND DEBECTRON ROAD PEEL (2) 1. DESTANCE RISAD ROAD PEEL (2) 1. DESTANCE RISAD SAND DEBECTRON ROAD PEEL (2) 1. DESTANCE RISAD SAND SAND SAND ROAD PEEL (2) 1. DESTANCE RISAD SAND SAND ROAD PEEL (2) 1. DESTANCE RISAD SAND ROAD PEEL (2) 2. DESTANCE RISAD SAND SAND ROAD PEEL (2) 2. DESTANCE RISAD SAND SAND ROAD PEEL (2) 2. DESTANCE RISAD ROAD PEEL (2) 2. DESTANCE ROAD ROAD PEEL (2) 2. DESTANCE ROAD PEEL (2) 2.	METT [WELL X OTHER		ZONE	K	ZONE	\square		Cox Canyon U	nit #4C
1. PARTEC NOT TELEPHONE NO. P.O. Box 316— Ignuacio, Colorado 31137-0316 4. LOCATRON OF WELL Organ Incusion clearly and in accordance with any State representative. A proposed prof. ROSC. A proposed prof. ROSC. 1. (575 FSL. 1, 1,690° FFL. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST TOWN OR NOST OFFICE. (1) 1. DESTANCE FROM REPORT PROF. ISON OF RANGEST PR									9. API WELL NO.	22170
Signed Pion State P.O. Box 316 Ignacio, Colorado 81137-0316 Bianco MV Il SEC, 73. M. OR BLX Il SEC, 74. M. OR BLX	W ADDRESS AND TELE	Villiams Production Co	mpany, LLC						10 FIELD AND BOOK OF THE	JOI IU
4 LOCATION OF WILL (Report locations clerity and its accordance with any state requirement.*) At surface All proposed proct zone 1,675 FSL, 1,690 FEL, (1) 14. DESTANDE BY MILES AND DIRECTION FROM NEARBEST TOWN OR POST OFFICE. A Proposed proct zone 5.14 Miles NW of Cedar Hill, NM 15. DESTANDE FROM PROCED THE NO. 10 FSL 1, 10 FSL	•	_	Colomdo 9112	7 0216						шки
As proposed pool 2006 1.675 FSL, 1,690 FEL, (1) 14. DISTANCE IN MILES AND DESCRIPTION HOLD READEST TOWN OR POST OFFICE* 6.14 miles NW of Cedar Hill, NM 15. DISTANCE PROM PROPOSED* 6.14 miles NW of Cedar Hill, NM 15. DISTANCE PROM PROPOSED* 16. NO OF ACRES IN LEASE 17. NO. OF ACRES ASSENCED TO THIS WELL. 18. DISTANCE PROM PROPOSED* 19. PROPOSED DEFTH 10. NO. OF ACRES ASSENCED 10. NO. OF ACRES ASSENCED 10. NO. OF ACRES ASSENCED 10. THIS WELL. 11. NO. OF ACRES ASSENCED 10. NO. OF ACRES ASS										
Approved good size 1,675 FSL _1600' FSL _100' FSL _1	At surface	1.675' FSI	_ 1.690' FEL. (J)						NW/4 SE/4, Se	ction 21.
1. DECATION OF REALEST TOWN OR NOST OFFICE* 1. SAID JUAN 1. STATE 1. SAID JUAN 1. SAID	At proposed prod. zone	•							10	
15. DESTANCE FROM PROPOSED LOCATION TO PREMENT FOR ACRES ASSIGNED TO THIS WELL FOR TO THIS WELL FOR TO THIS WELL FOR TO THIS WELL FOR THE WELL FOR THE WELL FOR THE WELL START* LOCATION TO NEAREST WELL BELLEVATIONS (Show whether DF.RT.(CR.cc.) 15. DESTANCE FROM PROPOSED LOCATION TO NEAREST WELL BELLEVATIONS (Show whether DF.RT.(CR.cc.) 16. JOSTANCE FROM PROPOSED LOCATION TO NEAREST WELL BELLEVATIONS (Show whether DF.RT.(CR.cc.) 17. NO OF ACRES ASSIGNED TO THIS WELL START* 18. DESTANCE FROM PROPOSED LOCATION TO NEAREST WELL BELLEVATIONS (Show whether DF.RT.(CR.cc.) 19. ROOKSED DEFTIN 21. ELEVATIONS (Show whether DF.RT.(CR.cc.) 22. APPROX DATE WORK WILL START* 23. PROPOSED CASING AND CEMENTING PROGRAM 24. APPROX DATE WORK WILL START* 25. ASSIGNED TO THIS WELL START* 26. ASSIGNED TO THIS WELL START* 26. ASSIGNED TO THIS WELL START* 26. ASSIGNED TO THIS WELL START* 27. NO OF ACRES ASSIGNED TO THIS WELL START* 28. ASSIGNED TO THIS WELL START* 29. ROTATION TO NEAREST WELL START* 20. ROTATION TO NEAREST WELL START* 20. ROTATION TO NEAREST WELL START* 21. LEVATIONS (Show whether DF.RT.(CR.cc.)) 22. APPROX DATE WORK WILL START* 23. July 15, 2005 24. ASSIGNED TO THIS WELL START* 24. ASSIGNED TO THIS WELL START* 20. ROTATION TO NEAREST WELL START* 24. ASSIGNED TO THIS WELL START* 25. CREATION TO NEAREST WELL START* 26. ASSIGNED TO THIS WELL START* 26. ASSIGNED TO THIS WELL START* 26. ASSIGNED TO THIS WELL START* 27. NO OF ACRES ASSIGNED TO THIS WELL START* 28. ASSIGNED TO THIS WELL START* 29. ROTATION TO NEAREST WELL START* 20. ROTATION TO NEAREST WELL START* 20. ROTATION TO NEAREST WELL START* 21. LEVATIONS (Show whether DF.RT.(CR.cc.) 22. APPROX DATE WELL START* 23. DEAR START	14., DISTANCE IN MILI	ES AND DIRECTION FROM NEAR	EST TOWN OR POST OFF	Œ.						
DOCATION TO INCARES! A		6.14 miles	NW of Cedar Hil							NM
PROPERTY OR LEASE LINE, FT. (Also to senser det, put libe, if any) +/- 843' 13. DESTANCE FROM PROPOSED 10. DESTANCE FROM PROPOSED 10. DESTANCE FROM PROPOSED 10. STANCE FROM PROPOSED 11. DESTANCE FROM PROPOSED 12. AFFROX DATE WORK WILL START' 13. DEVALUATION (Slow whether DF.RT.GR, de.) 14 550' 14 6,045' 12. AFFROX DATE WORK WILL START' 13. DESTANCE STANCE OF CASING AND CEMENTING PROGRAM SIZE OF HOLE 12. AFFROX DATE WORK WILL START' 13. DOS AFFROX DATE WORK WILL START' 14. A SOUTH START AFFROY DESTANCE OF THE STAND DEPTH OUT OF CREAM OF THE STAND DEPTH OUT OF THE STAND DEPTH OUT OF THE STA				16, NO, OF ACRES IN LE	EASE					
19. PRICKOSED DEPTH 20. ROTARY OR CARLE TOOLS	PROPERTY OR LEA	SE LINE, FT.	₂ ,	220			1		r /2	
DRELIPING, COMPLETED, OR APPLIED FOR, ON THIS LEASE.FT. +/- 550' +/- 6,045' ROTATY 21. ELEVATIONS (Show whether DF,RT,GR,etc.) SYSTEM OF HOLE GRADE, SIZE OF CASING WEIGHT PER FOOT SETTING DEPTH QUANTITY OF CEMENT 12-1/A" 9-5/8" K-55 36/6 +/- 300' 150 sacks Type III cement +2% CaCl ₂ + 1/4 #/sk. Cello-Flakes 8-3/A" 7" K-55 20/6 +/- 2,765' 330 sacks Lead and 50 sacks Tail (see Drilling Plan) 6-1/4" 4-1/2" K-55 10.5# +/- 2,665-6,045' 75 sacks Lead and 110 sacks Tail (see Drilling Plan) Other Information: Drilling Plan, Surface Use Plan and pit application are attached.	18. DISTANCE FROM P	ROPOSED	3							
21. ELEVATIONS (Show whether DF,RT,GR,etc.) 6,578° GR 1. July 15, 2005 22. APPROX DATE WORK WILL START 6,578° GR 1. July 15, 2005 23. PROPOSED CASING AND CEMENTING PROGRAM SIZE OF HOLE GRADE, SIZE OF CASING WEIGHT PER POOT SETTING DEPTH QUANTITY OF CEMENT 12-14" 9-5/8" K-55 36# 4/-300" 150 sacks: Type III cement + 2% CaCl., + 1/4 #/sk. Cello-Flakes 8-34" 7' K-55 20# +/-2,765' 330 sacks: Lead and 50 sacks: Tail (see Drilling Plan) 6-1/4" 4-1/2" K-55 10.5# +/-2,665-6,045' 75 sacks: Lead and 110 sacks: Tail (see Drilling Plan) Other Information: Drilling Plan, Surface Use Plan and pit application are attached.			Í				1			
SIZE OF HOLE GRADE, SIZE OF CASING AND CEMENTING PROGRAM SIZE OF HOLE GRADE, SIZE OF CASING WEIGHT PER FOOT SETTING DEPTH QUANTITY OF CEMENT 12-14" 9-58" K-55 36# +/- 300' 150 sacks Type III cement + 2% CaCl ₃ + 14 #/sk. Cello-Flakes 8-3/4" 7" K-55 20# +/- 2,765' 330 sacks Lead and 50 sacks Tail (see Drilling Plan) 6-1/4" 4-1/2" K-55 10.5# +/- 2,665-6,045' 75 sacks Lead and 110 sacks Tail (see Drilling Plan) Other Information: Drilling Plan, Surface Use Plan and pit application are attached.		17- 33	0,	+/- 6,045'						
SIZE OF HOLE GRADE, SIZE OF CASING WEIGHT PER POOT SETTING DEPTH QUANTITY OF CEMENT 12-1/4" 9-5/8" K-55 36# 4-300' 150 sacks Type III cement + 2% CaCl, + 1/4 #/sk. Cello-Flakes 8-3/4" 7" K-55 20# 4-/-2,765' 330 sacks Lead and 50 sacks Tail (see Drilling Plan) 6-1/4" 4-1/2" K-55 10.5# +/-2,665-6,045' 75 sacks Lead and 110 sacks Tail (see Drilling Plan) Other Information: Drilling Plan, Surface Use Plan and pit application are attached. FARMINGTON OTHER PROPOSED PROGRAM: If proposal is to deepen, give data present productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any. Ancent for Williams In a Don Hamilton Accent for Williams In a Don Hamilton In a Don Hamilton Accent for Williams In a Don Hamilton In a Don Hamilton Accent for Williams In a Don Hamilton In a Don Hamilton In a Don Hamilton Accent for Williams In a Don Hamilton Accent for Williams In a Don Hamilton Accent for Williams	21. ELEVATIONS (Show	w whether DF,RT,GR,etc.)	~					22	. APPROX. DATE WORK WILL S	TART*
SIZE OF HOLE GRADE, SIZE OF CASINO WEIGHT PER FOOT SETTING DEPTH QUANTITY OF CEMENT 12-1/4" 9-5/8" K-55 36# #-300' 150 sacks Type III cement + 2% CaCl ₃ + 1/4 #/sk. Cello-Flakes 8-3/4" 7" K-55 20# #-2,765' 330 sacks Lead and 50 sacks Tail (see Drilling Plan) 6-1/4" 4-1/2" K-55 10.5# #-2,665-6,045' 75 sacks Lead and 110 sacks Tail (see Drilling Plan) Other Information: Drilling Plan, Surface Use Plan and pit application are attached.		6,578						i	July 15, 2005	
12-14" 9-5/8" K-55 36# +/-300' 150 sacks Type III cement + 2% CaCl ₂ + 1/4 #/sk. Cello-Flakes 8-3/4" 7" K-55 20# +/-2,765' 330 sacks Lead and 50 sacks Tail (see Drilling Plan) 6-1/4" 4-1/2" K-55 10.5# +/-2,665-6,045' 75 sacks Lead and 110 sacks Tail (see Drilling Plan) Other Information: Drilling Plan, Surface Use Plan and pit application are attached. Plant Plant Proposal is to deepen give data present productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any.	23.		PROPOSED CAS	ING AND CEMENT	ING P	ROGRAM				
8-3/4" T K-55 20# 44-2,765' 330 sacks Lead and 50 sacks Tail (see Drilling Plan) 6-1/4" 4-1/2" K-55 10.5# 14-2,665-6,045' 75 sacks Lead and 110 sacks Tail (see Drilling Plan) Other Information: Drilling Plan, Surface Use Plan and pit application are attached. PRECEIVED OTHER PROPOSED PROGRAM: If proposal is to deepen, give data present productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any.	SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOO	T SETTING DEP	ТН			QUAN	TITY OF CEMENT	
Other Information: Drilling Plan, Surface Use Plan and pit application are attached. Drilling Plan, Surface Use Plan and pit application are attached. N ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen, give data present productive zone. If proposal is to drill or deepen directionally, give pertinent data on advantage locations and measured and true vertical depths. Give blowout proventer program, if any. A gent for Williams. In a 10, 2005	/ 12-1/4"	9-5/8" K-55	36#	+/- 300`		150 sacks Typ	e III ceme	ent + 2% (CaCl ₂ + 1/4 #/sk. Cello-Flai	kes
Other Information: Drilling Plan, Surface Use Plan and pit application are attached. RECEIVED NABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen, give data present productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any A great for Williams. Nagent for Williams.	8-3/4"	T" K-55	20#	+/- 2,765'		330 sacks Lea	d and 50 :	acks Tail	(see Drilling Plan)	
Other Information: Drilling Plan, Surface Use Plan and pit application are attached. RECEIVE NABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen, give data present productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any. Agent for Williams. Don Hamilton Agent for Williams.	6-1/4"	4-1/2" K-55	10.5#	+/-2,665-6,04	45'	75 sacks Lead	and 110 s	acks Tail	(see Drilling Plan)	
IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen, give data present productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any. 24. Don Hamilton A gent for Williams	Other Inform		irface Use Plan an	d pit application	are a	ttached.	31173			
SIGNED Jon Hamilton Title Agent for Williams DATE JUNE 10, 2005	pertinent data on subsurface 24.	ce locations and measured and true w	ertical depths. Give blowout;	preventer program, if any.			De Silver	5678 buctive zone.	If proposal is to drill or deepen direct	tionally, give
(This space for Federal or State office use)		X Historia	VII I I GIIIII WII TI	TLEAgent for	WII	1141112		DA1	E	

*See Instructions On Reverse Side Title 18 U.S.S. Section In the Indian makes it a crime for any person knowingly and willfully to make to any department or agency or the DRILLING OPERATIONS AUTHORIZED ARE SUBJECT TO COMPLIANCE WITH ATTACHED This action is subject to technical and procedural review pursuant to 43 CFR 3165.3 and appeal pursuant to 43 CFR 3165.4

_ APPROVAL DATE_

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:

PERMIT NO.

APPROVED BY_

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

District II PO Orawer DD, Artesia, NM 88211-0719

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

District IV PO Box 2088, Santa Fe, NM 87504-2088

Section

UL or lot no.

Township

Range

State of New Mexico Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION PO Box 2088 Santa Fe. NM 87504-2088

Revised February 21, 1994 Instructions on back

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

AMENDED REPORT

Form C-102

WELL LOCATION AND ACREAGE DEDICATION PLAT

'API Number 30-045-33170	*Pool Code 72319	Pool Name BLANCO MESAVERDE				
'Property Code	⁹ Pr	operty Name CANYON UNIT	Well Number 4C			
'0GRID №. 120782	°op WILLIAMS PF	*Elevation 6578				
	10 Sunfi	ace Location	······································			

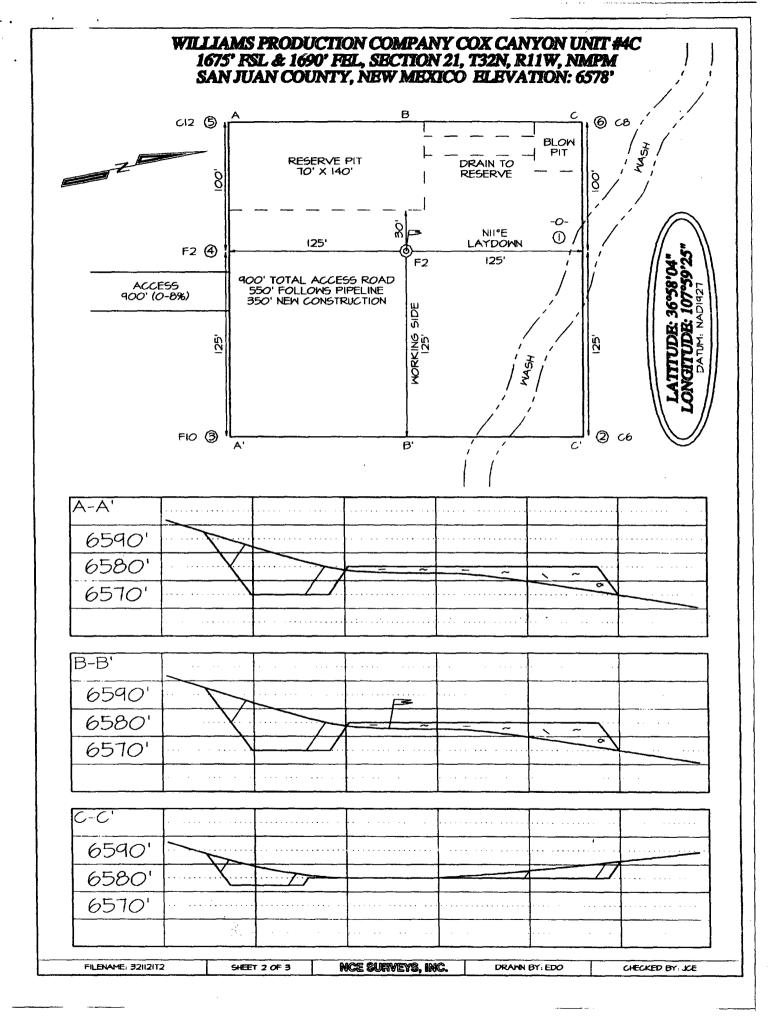
Lot Ido Feet from the North/South line Feet from the East/West line County NAUL NAZ 1675 SOUTH 1690 EAST

21 35N 11W J ¹¹ Bottom Hole Location If Different From Surface UL or lot no. Lot Idn Feet from the North/South line Feet from the East/West line 12 Deducated Acres ¹³ Joint or Infill ⁵⁴ Consolidation Code ²⁵ Order No. 320.0 Acres - (E/2)

NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED

	UH A NUN-STANDARU UNII H	AS BEEN ANTHOVES BY T	HE DIAISION
16	5109.72		17 OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief
			Don Hamilton Signature Don Hamilton
			Printed Name Hamilton Title
		EASE USA NM-03189	June 10, 2005 Date
5304.42	-21-	. 308.38	¹⁸ 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.
က်		w	Survey Date: FEBRUARY 15, 2005 Signature and Seal of Professional Surveyor
		1690'	SECH C. EDWARD OF MEXICO
NN	RECEIVED CTO FARMINGTON		T (15269) B
52	5065.50°		JASON C. EDWARDS Certificate Number 15269

Submit 3 Copies To Appropriate District	State of N	lew Me	exico		Form C-103	
Office District I	Energy, Minerals a	nd Natu	ral Resources		May 27, 2004	
1625 N. French Dr., Hobbs, NM 88240				WELL API NO.	5-33170	
<u>District II</u> 1301 W. Grand Ave., Artesia, NM 88210	, Artesia, NM 88210 OIL CONSERVATION DIVISION			5. Indicate Type	of Lease Federal	
<u>District III</u> 1000 Rio Brazos Rd., Aztec, NM 87410	1220 South		•	STATE	FEE	
District IV	Santa Fe,	, NM 87	7505	6. State Oil & G	as Lease No.	
1220 S. St. Francis Dr., Santa Fe, NM 87505				NM-03189		
SUNDRY NOTI	CES AND REPORTS ON			7. Lease Name of	or Unit Agreement Name	
(DO NOT USE THIS FORM FOR PROPOSE DIFFERENT RESERVOIR. USE "APPLICE				G G		
PROPOSALS.)				Cox Canyon 8. Well Number	AC	
71	Gas Well 🛛 Other			9. OGRID Numl		
2. Name of Operator Williams Production Company, I	I.C			9. OGRID Nulli 120782	CI	
3. Address of Operator				10. Pool name or Wildcat		
999 Goddard Ave, Ignacio, CO 8	1137			Blanco MV		
4. Well Location						
Unit Letter J: 1.5	975 feet from the S	_ line and	d <u>1,690</u> feet from	the <u>E</u>	line	
Section 21			ange 11W	NMPM	County San Juan	
	11. Elevation (Show whe	ether DR,	RKB, RT, GR, etc.)			
Pit or Below-grade Tank Application O	6,578' GL r Closure □				>200'41000	
	dwater > 100' Distance from	a nearest fi	resh water well >1000	ft Distance from nea		
Pit Liner Thickness: 12 mil	Below-Grade Tank: Volum		bbls; Construct			
	Appropriate Box to Ind	licate N			· Data	
12. Check A	ippropriate box to mid	iicaic 14	ature of Motice,	report of Ouler	Data	
NOTICE OF IN			P .	SEQUENT RE	PORT OF:	
PERFORM REMEDIAL WORK	PLUG AND ABANDON		REMEDIAL WORL	_	ALTERING CASING	
TEMPORARILY ABANDON DULL OR ALTER CASING	CHANGE PLANS MULTIPLE COMPL		COMMENCE DRI		P AND A	
FOLE ON ALTEN CASING	MIOCTIFEE COMPL	ч	CASING/CEMEN	TJOB []		
OTHER:			OTHER:		_	
13. Describe proposed or complete of starting any proposed we	leted operations. (Clearly:	state all p	pertinent details, and	l give pertinent dat	es, including estimated date	
of starting any proposed wo or recompletion.	ik). See Kule 1103. Po	or Munip	ie Completions: Au	ach wellbore diagr	am of proposed completion	
•			·	•	•	
Pit to be located approximately 50) to 75 feet from well he	ad Dity	will be for multi us	o drilling and som	anlation to avaid	
additional site disturbance and pit	will be considered out of	of service	e once production	e unling and con tubing set Pit to	ipletion to avoid	
operated and closed in accordance	e with NMOCD guidelin	es and \	Williams procedure	es.	, no concuración,	
			·			
I hereby certify that the information a	above is true and complete	to the be	et of my knowlodge	and balias as a		
grade tank has been/will be constructed or	closed according to NMOCD gr	nidelines 2	at of my knowledge ☐, a general permit ☐ (e and benen. I furth or an (attached) altern	er certify that any pit or below- native OCD-approved plan .	
SIGNATURE Don Ho	. 01	ITLE		TE 6/10/05		
Type or print name Don Han	nilton E-mail addres	ss: sta	rpoint@etv.net	Telephone No. 43	5-719-2018	
For State Use Only						
APPROVED BY:Conditions of Approval (if any):	2 / T	IT MEPUT	Y OIL & GAS INSPE	CTOR, DIST.	DEC 0 1 200 	





WILLIAMS PRODUCTION COMPANY

Operations Plan

(Note: This procedure will be adjusted on site based upon actual conditions)

DATE:

6/6/2005

FIELD:

Blanco MV

WELL NAME:

Cox Canyon #4C

SURFACE:

BLM

BH LOCATION:

NWSE Sec 21-32N-11W Rio Arriba, NM

MINERALS:

BLM

ELEVATION:

6,578' GR

LEASE#

NM-03189

MEASURED DEPTH: 6,045'

I. GEOLOGY: Surface formation - San Jose

A. FORMATION TOPS: (KB)

Name	MD	Name	MD
Ojo Alamo	1,450	Cliff House	5,090
Kirtland	1,505	Menefee	5,185
Fruitland	2,815	Point Lookout	5,545
Picture Cliffs	3,280	Mancos	5,870
Lewis	3,420	TD	6,045
Huerfanito Bentonite	3,955		

- B. MUD LOGGING PROGRAM: None
- C. LOGGING PROGRAM: High Resolution Induction/ GR and Density/ Neutron log from surface to intermediate casing point and High Resolution Induction/ GR and Density/ Neutron log from intermediate shoe to TD. Onsite geologist will pick Density/ Neutron log intervals on both logging runs.
- D. NATURAL GAUGES: Gauge any noticeable increases in gas flow. Record all gauges in Tour book and on morning reports.

II. DRILLING

- A. MUD PROGRAM: Clear water with benex to 7" casing point. Convert to a LSND mud to log and run pipe. Treat for lost circulation as necessary. Obtain 100% returns prior to cementing. Notify Engineering of any mud losses. Use air w/Air Hammer from 7 in. csg.to TD.
- B. BOP TESTING: While drill pipe is in use, the pipe rams and the blind rams will be function tested once each trip. The anticipated reservoir is expected to be less than 1300 psi, so the BOPE will be tested to 250 psi (Low) for 5 minutes and 1500 psi (High) for 10 minutes. Utilize a BOPE Testing Unit with a recording chart and appropriate test plug for testing. The drum brakes will be inspected and tested each tour. All tests and inspections will be recorded in the tour book as to time and results.

III. MATERIALS

A. CASING PROGRAM:

CASING TYPE	HOLE SIZE	DEPTH (MD)	CASING SIZE	WT. & GRADE
Surface	12-1/4"	+/- 300'	9-5/8"	36# K-55
Intermediate	8-3/4"	+/- 2,765'	7"	20# K-55
Prod. Liner	6-1/4"	+/- 2,665'-6,045'	4-1/2"	i0.5# K-55

B. FLOAT EQUIPMENT:

- 1. <u>SURFACE CASING:</u> 9-5/8" notched regular pattern guide shoe. Run(1) standard centralizer on each of the bottom (3) joints of Surface Casing.
- 2. <u>INTERMEDIATE CASING:</u> 7" cement nose guide shoe with a self-fill insert float. Place float collar one joint above the shoe. Install (1) Turbulent centralizer on each of the bottom (3) joints and one standard centralizer every (3) joints to 2,500 ft. Run (1) Turbulent centralizer at 2,700 ft., 2,500 ft., 2,300ft., 2,000ft., 1,500 ft., and 1,000 ft. (NTL-FRA 90-1).
- 3. <u>PRODUCTION CASING:</u> 4-1/2" & 5-1/2" whirler type cement nose guide shoe with a latch collar on top of 20' bottom joint. Place marker joint above 5,400'. Place centralizers as needed across selected production intervals.

C. CEMENTING:

(Note: Volumes may be adjusted onsite due to actual conditions)

- 1. SURFACE: Slurry: 150sx (205 cu.ft.) of "Type III" + 2% CaCl₂ + ½ # of cello-flake/sk (Yield = 1.39 cu.ft./sk, Weight = 14.5 #/gal.). The 100% excess should circulate cement to the surface. WOC 12 hours. Test csg to 1500psi.
- INTERMEDIATE: Lead 330 sx (691) cu.ft.) of "Type III" 65/35 poz with 8% gel, 1% CaCl₂ and 1/4# cello-flake/sk (Yield = 2.09 cu.ft./sk, Weight = 12.1 #/gal.). Tail 50 sx (70 cu.ft.) of "Type III" with 1/4# cello-flake/sk, and 1% CaCl₂ (Yield = 1.4 cu.ft./sk, Weight = 14.5#/gal.). Use 100% excess in Lead Slurry to circulate to surface. No excess in Tail Slurry. Total volume = 761 cu.ft. Bump Plug to 1,500 psi. Notify engineering if cement is not circulated to surface.
- 3. PRODUCTION LINER: 10 bbl Gelled Water space. Lead: 75sx (194ft³) of Premium Light HS + 1% FL-52 + .2% CD-32 & 3 #/sk CSE. (Yield = 2.59 cu.ft./sk, Weight = 11.6 #/gal.). Tail: 110 sx (234 ft³) of Premium Light HS + 1% FL-52 + .2% CD-32, 3 #/sk CSE, ¼ #/sk cello flake and 4% Phenoseal. (Yield = 2.15 ft³/sk, Weight = 12.3 #/gal.). Displace cement at a minimum of 8 BPM. The 20% excess in lead and tail should cover 100 ft into intermediate casing. Total volume 428 ft³. WOC 12 hours

Cox Canyon #4C Operations Plan Page #3

IV COMPLETION

A. CBL

1. Run Cement Bond Log across all intervals to be perforated and find Top of Cement behind all casing strings if cement is not circulated to surface.

B. PRESSURE TEST

1. Pressure test 7" & 4-1/2" casing to 3300# for 15 minutes.

C. STIMULATION

- 1. Perforate the Point Lookout as determined from the open hole logs.
- 2. Stimulate with approximately 80,000# of 20/40 sand in slick water.
- 3. Isolate Point Lookout with a CIBP.
- 4. Perforate the Menefee/Cliff House as determined from the open hole logs.
- 5. Stimulate with approximately 80,000# of 20/40 sand in slick water.
- 6. Test each zone before removing bridge plugs.

D. RUNNING TUBING

1. <u>Mesa Verde:</u> Run 2-3/8", 4.7#, J-55, EUE tubing with a SN (1.91" ID) on top of bottom joint. Land tubing approximately 25' above the bottom Point Lookout perforation.

Gary Sizemore Sr. Drilling Engineer



Well Control Equipment Schematic for 2M Service

Typical BOP setup

