Form 3160-3 (April 2004)

UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT

FORM APPROVED OMB NO. 1004-0137 Expires March 31, 2007

APPLICATION FOR PERMIT TO	5. Lease Serial No.				
	NM-021125				
a. Type of Work DRILL	6. If Indian, Allotee or Tribe Name				
b. Type of Well Oil Well Gas Well Othe	N/A 7. Unit or CA Agreement Name and No.				
b. Type of Well Oil Well 🔀 Gas Well 🗌 Othe	Single Zone Multiple Zon	N/A			
Name of Operator	PERECEIVED SO	8. Lease Name and Well No.			
XTO Energy Inc.	OFTE EVENING TON MICH	Ohio E Government #2			
a. Address	3b. Phone No (include area go	9. API Well No.			
2700 Farmington Ave., Bldg. K. Ste 1 Farmi	ngton, NM 505-324-1090	30045 32672			
Location of Well (Report location clearly and in accordance wit	h any State equarements)*	10. Field and Pool, or Exploratory			
At surface 900' FSL x 1585' FEL in Sec 18, '	r31N, R12W	Basin Fruitland Coal			
		11. Sec., T., R., M., or Blk. and Survey or Are			
of proposed prod. zone same		\mathcal{O}_{Sec} 18, T31N, R12W			
1. Distance in miles and direction from nearest town or post office*		12. County or Parish 13. State			
Approx 13 air miles NW of 1	Farmington NM Post Office	San Juan 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. 900 (Also to nearest drg. unit line, if any)	320	320 E/2			
3. Distance from proposed location*	19. Proposed Depth	20.BLM/BIA Bond No. on file			
to nearest well, drilling, completed, applied for, on this lease, ft.					
100'	2325'				
. Elevations (Show whether DF, KDB, RT, GL, etc.	22. Approximate date work will sta	start* 23. Estimated duration			
5890' Ground Level	winter 2004	2 weeks			
 he following, completed in accordance with the requirements of On Well plat certified by a registered surveyor. A Drilling Plan A Surface Use Plan (if the location is on National Forest System SUPO shall be filed with the appropriate Forest Service Office). 	4. Bond to cover the operat Item 20 above). 5. Operator certification.	I to this form: ions unless covered by an existing bond on file (see formation and/or plans as may be required by the			
SOFO shall be filed with the appropriate Forest Service Office).	authorized officer.	normation and/or plans as may be required by the			
		<u> </u>			
5. Signuature	Name (Printed/Typed)	Date			
Kula Valushan	Kyla Vaughan	11/04/04			
itle					
Regulatory Compliance Tech	_	•			
pproved by (Signautre)	Name (Printed/Typed)	Date			
	Name (17 mew 1 ypeu)	17.AC			
DIII (ankee (a)		62/203			
itle	Office	·			
ATM	1 77-0				
pplication approval does not warrant or certify that the applicant onduct operations thereon. onditions of approval, if any, are attached.	holds legal or equitable title to those rights in	the subject lease which would entitle the applicant t			
Table 10 LLC C. Consider 1001 and Titals 42 LLC C. Consider 1010	i	Illusta mala ta anni dan antat			
Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make states any false, fictitious or fraudulent statements or representations.		illy to make to any department or agency of the Unite			
(Instructions on page 2)					

NMOCD

DESTRICT I 1625 N. French Dr., Hobbs, N.M. 68240 State of New Mexico Energy, Minerals & Natural Resources Department

Form C-102 Revised August 15, 2000

DESTRICT IN SOUTH Firmt, Artesia, N.M. 86210

DISTRICT III

OII. CONSERVATION DIVISION 2040 South Facheco Santa Fe, NM 87505 Submit to Appropriate District Office State Lease - 4 Copies Fee Lease - 3 Copies

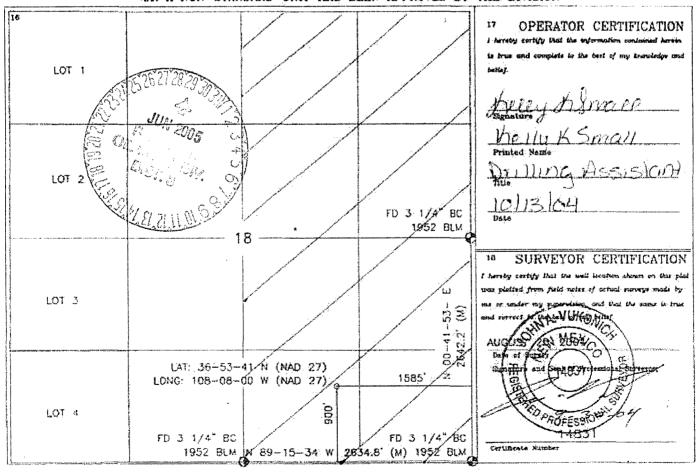
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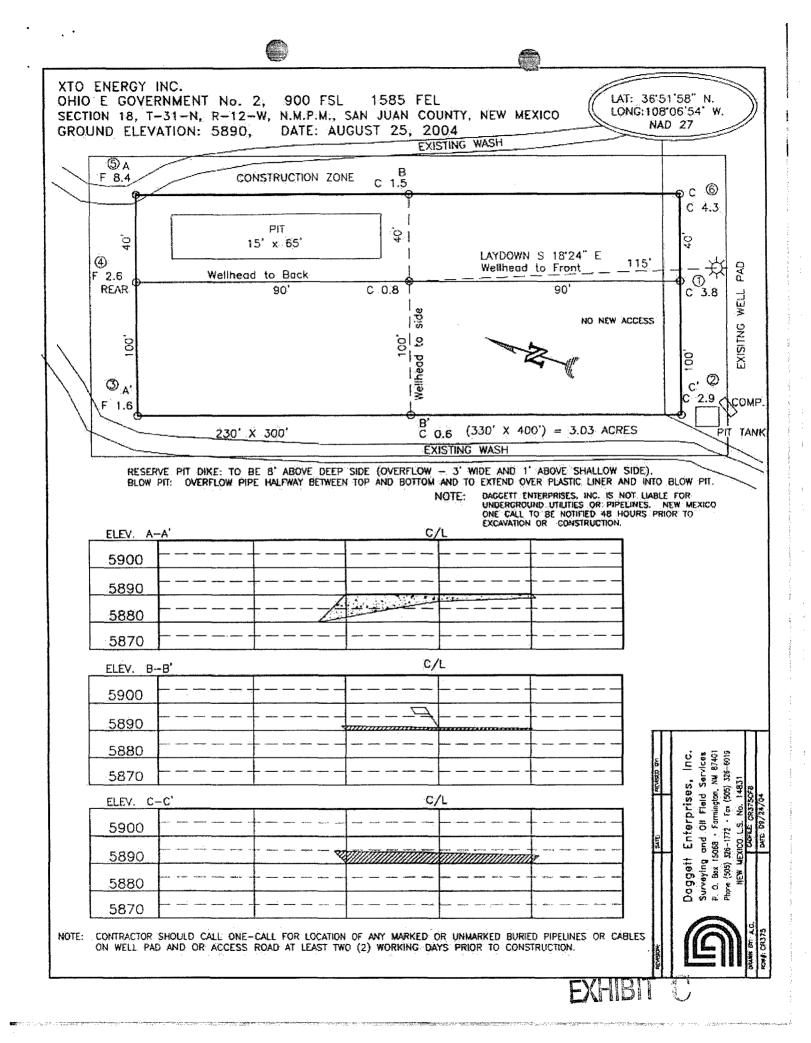
1000 Rio Brazos Rd., Aztes, M.M. 87410 DISTRICT IV 2040 South Pacheco, Sants Fe, NM 87505

☐ AMENDED REPORT

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3037	7				OHIO E GOV	ERNMENT			2	
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16706			XTO ENERGY INC. 5890'							
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Ul, or lot na.	Section 18	Township 31-N	Fownship Range Lot Idn Fest from the North/South line Feet from the East					East/Vest line	County SAN JUAN	
Andrew Mary and Andrew Control of the Control of th	,	*	" Botte	m Hole	Location I	Different Fro	m Surface		82	
UL of let no	Section	Township	Rongo	lot ldn	Feet from the	North/South line	Feet from the	East/West line	County	
Dedicated Acre	4	L	is Joint or	inf\li	** Consolidation C	ode	"Order No.		<u>L</u>	
320	812		I			22. 71.4000	N. 1947		and the state of t	

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





XTO ENERGY INC.

DRILLING PROCEDURE

Ohio "E" Government #2 Basin Fruitland Coal November 5, 2004

Location: 900' FSL & 1,585' FEL, Sec 18, T31N, R12W County: San Juan State: New Mexico

PROJECTED TOTAL DEPTH: 2,325' OBJECTIVE: Fruitland Coal GR ELEV: 5,890'

1. MUD PROGRAM:

INTERVAL	0'-200'	200'-TD
HOLE SIZE	8-3/4"	6-1/4"
MUD TYPE	FW/Native	FW/Polymer
MUD WEIGHT, ppg	8.6-9.0	8.6-9.1
VISCOSITY, sec/qt	28-32	28-33
WATER LOSS, cc	NC	NC

Remarks: Drill the surface hole with fresh water. Run and cement 7" surface casing, circulating cement to surface. NU and test BOP equipment, then drill out with fresh water. Use polymer sweeps as needed for hole cleaning. At TD, sweep the hole prior to TOH to log.

2. CASING PROGRAM:

Surface Casing: 8-5/8" casing to be set at ± 200 ' in 8.8 ppg mud in 12-1/4" open hole.

					Coll	Burst						
		Wt			Rating	Rating	Jt Str	ID	DD	SF	SF	SF
Interval	Length	(ppf)	Gr	Cplg	(psi)	(psi)	(M-lbs)	(in)	(in)	Coll	Burst	Tension
0'-200'	200'	24#	J-55	STC	1,370	2,950	244	8.097	7.972	14.64	31.52	50.8

Optimum makeup torque for 8-5/8" 24#, J-55, STC casing is **2,440 ft-lbs** (Min - 1,830 ft-lbs, Max - 3,050 ft-lbs).

Production Casing: 5-1/2" casing to be set at $\pm 2,325$ ' in 9.0 ppg mud in a 7-7/8" open hole.

					Coll	Burst						
		Wt			Rating	Rating	Jt Str	${ m ID}$	DD	SF	SF	SF
Interval	Length	(ppf)	Gr	Cplg	(psi)	(psi)	(M-lbs)	(in)	(in)	Coll	Burst	Tension
0'-TD	2,325'	15.5#	J-55	STC	4,040	4,810	22/20	4 .950	4.825	3.52	4.19	5.84

Optimum makeup torque for 4-1/2", 10.5#, J-55, casing is 1,320 ft-lbs (Min - 990 ft-lbs, Max - 1,650 ft-lbs).

Capacity of 8-5/8", 20# casing is: 0.0636 bbl/ft Capacity of 5-1/2", 15.5# casing is: 0.0238 bbl/ft

3. WELLHEAD:

Casinghead: Larkin Fig 92 (or equivalent) 2,000 psig WP (4,000 psig test) with 7", 8rd pin on

bottom and 8-5/8" API Modified 8rd thread on top.

Tubinghead: Larkin Model 612 (or equivalent) 2,000 psig WP (4,000 psig test) with 4-1/2", 8rd

bottom thread and 8-5/8" 8rd API Modified top body thread, 4.090" minimum bore.



4. **CEMENT PROGRAM:**

A. Surface: 8-5/8", 24#, J-55, STC casing at \pm 200'.

Lead: 150 sx Type III cement (or equivelent) containing ½ pps celloflake, 2% CaCl₂ (mixed at 14.6,ppg, 1.39 ft³/sk, 6.67 gal wtr/sk).

Total slurry volume is 104.25 ft³, 250% excess of calculated annular volume required to circulate cement to surface.

B. <u>Production:</u> 5-1/2", 15.5#, J-55, STC casing at $\pm 2,325$ '.

<u>Lead:</u> ±200* sx of Type III cement containing 8% gel, 1/4 pps Celloflake & 2% Phenoseal (mixed at 11.9 ppg, 2.54 ft³/sk, 15.00 gal wtr/sk).

Tail: 100 sx Type III cement containing 1% CaCl2, 1/4 pps Celloflake & 2% Phenoseal (mixed at 14.5 ppg, 1.41 ft3/sk, 6.72 gal wtr/sx).

Total estimated slurry volume is 649 ft^3 , $\pm 40\%$ excess of calculated annular volume required to circulate cement to surface.

* Actual cement volumes will be determined using log caliper volume plus 40% excess.

5. <u>DRILLING HAZARDS:</u>

- H₂S or other Poisonous Gases: No formations known to contain H₂S or any other poisonous gases will be penetrated with this wellbore.
- Abnormal Pressures: No overpressured zones are known to exist or are anticipated to be encountered during the drilling of this well.
- Lost Circulation: Seepage and/or lost circulation may be encountered below surface casing and can be controlled with conventional lost circulation materials added to the mud system.

6. LOGGING PROGRAM:

Array Induction/DFL/GR/SP/Cal DSN/Spectral Density/GR/Cal/Pe

TD to bottom of surf csg. TD to bottom of surf csg.

7. **FORMATION TOPS:**

Formation	Subsea Depth	Well Depth
Fruitland Fm	+3970'	1926'
Lower Fruitland Coal	+3770'	2126'
Pictured Cliffs SS	+3670'	2226'
T.D.	+3570'	±2325'

Note: These depths, indicated above, are approximate. Actual depths of the formation tops will be determined from the well logs.

Maximum anticipated bottomhole pressure encountered during drilling should not exceed 0.35-0.43 psi/ft.

8. COMPANY PERSONNEL:

Name	Title	Office Phone	Home Phone
Dennis Elrod	Drilling Foreman	505-324-1090	505-326-2024
		505-486-6460 cellular	
Jeff Patton	Drilling Engineer	505-324-1090	505-632-7882
		505-330-2957 cellular	
Reed Meek	Project Geologist	817-885-2191	432-687-0615
Robin Tracy	Reservoir Engineer	817-885-2422	

9. SPECIAL INSTRUCTIONS:

A. Daily drilling reports should be called in to the San Juan District office at (505) 324-1090 or faxed to (505) 564-6700 by 8:00 a.m.

B. Deviation:

Surface Hole: Maximum of 1° and not more than 1° change per 100'. Production Hole: Maximum of 4° and not more than 1° change per 100'.

Note: Maximum distance between surveys is 500'.

- C. NU & Pressure Test BOP, choke manifold & surface casing to 250/800 psig for 30 minutes. Report the pressure test on the IADC form as required.
- D. Drill out below surface casing after WOC 12 hours. Drill cement and float equipment with minimum weight and RPM until drill collars are below the bottom of the surface casing. Keep location clean and water usage to a minimum.
- E. Check BOP blind rams each trip and pipe rams each day. Strap the pipe on the last bit trip prior to reaching TD, or on the TOH to log.

1. Test BOP after installation: Pressure test BOP to 200-300 TESTING PROCEDURE psig (low pressure) for 5 min. **BOP SCEMATIC FOR** Test BOP to Working Press or **DRILLING OPERATIONS** to 70% internal yield of surf csg CLASS 1 (2M) NORMAL (10 min). **PRESSURE** 2. Test operation of (both) rams on every trip. **ROTATING HEAD** 3. Check and record Accumulator OR STRIPPING pressure on every tour. (DIVERTING) **HEAD** 4. Re-pressure test BOP stack after changing out rams. 5. Have kelly cock valve with handle available. 6. Have safety valve and subs to fit all sizes of drill string. FILL UP LINE **FLOW LINE** TO PIT **BLIND** RAMS PIPE RAMS **SCREW ON DRILLING FLANGE** TO FILL-UP / **ADJUSTABLE** KILL LINE **CHOKE** Fig. 92 (typical) 2" dia min. **MANIFOLD CASINGHEAD** 2" dia min. Remove check or ball (SCREW-IN)

CASING COLLAR

(LOOKING UP)

from check valve and press test to same press

as BOP's. **

See Choke Manifold drawing for

EXHIBIT

CHOKE MANIFOLD SCEMATIC FOR DRILLING OPERATIONS CLASS 1 (2M) NORMAL PRESSURE

- 1. Stake all lines from choke manifold to pit.
- 2. Pressure test choke monifold after installation.
- 3. Pressure test manifold at the same time with the BOP Stack. Test manifold to the same test pressures.

TESTING PROCEDURE

