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 PERM	IT TO DRILL O	R REENTER	5. Lease S	erial No.  RCUD DEC28'01
la. Type of Work R DRILL	☐ REENTER	<u></u>	A STREET OF STREET, STREET, ST. P. LEWIS CO., S. LEWIS CO.	n, Allotee or Tribe Name
1b. Type of Well Oil Well 🗶 Gas Well [	Other 🗶	<u>. 2265 OCT</u>	~	CA Agreement Name and No.
2. Name of Operator			N/A 8. Lease N	lame and Well No.
XTO Energy Inc.		program.	TINT	FC #4
3a. Address		3b. Phone No. (include area co	de) 9. API We	
2700 Farmington Ave., Bldg. K. Ste 1			30-04	<u>15-34035</u>
4. Location of Well (Report location clearly and in accord	ance with any State	equirements)*		d Pool, or Exploratory
At surface 2090' FNL x 860' FWL				, R., M., or Bik. and Survey or Area
At proposed prod. zone			ļ	SEC 6, T30N, R13W
14. Distance in miles and direction from nearest town or post	office*	· · · · · · · · · · · · · · · · · · ·	12. County	
Approximatley 12 miles Nor	thwest of Fan	minton, NM post office	SAN JUA	NM NM
15. 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 drg. unit line, if any)		2395.24		N/2 252.44
18. Distance from proposed location*		19. Proposed Depth	20. BLM/BIA B	ond No. on file
to nearest well, drilling, completed, applied for, on this lease, ft. 36'		1783'		UIB000138
21. Elevations (Show whether DF, KDB, RT, GL, etc.		22. Approximate date work will sta	n* 23 Es	timated duration
5747' GROUND ELEVATION	ŀ	FEBRUARY 2007		2 WEEKS
				Z REEZO
<ol> <li>A Surface Use Plan (if the location is on National Forest SUPO shall be filed with the appropriate Forest Service</li> </ol>	•	<ul><li>5. Operator certification.</li><li>6. Such other site specific is authorized officer.</li></ul>	nformation and/or p	olans as may be required by the
25. Signature	Na	ame (Printed/Typed)		Date
Tylalaughan	K	yla Vanghan	10/24/06	
Title ()				
Approved by (Signature) 10.0	I Na	ume (Printed/Typed)		Date
D/Marlie word				12/21/06
Title AT-11	Off	fice FF		
Application approval does not warrant or certify that the a conduct operations thereon.	pplicant holds legal	or equitable title to those rights in	the subject lease v	which would entitle the applicant to
Conditions of approval, if any, are attached.				
Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 12 States any false, fictitious or fraudulent statements or representations.			ully to make to any	department or agency of the United
*(Instructions on page 2)		( / **	OLD GIOA FI	NSL
				<b>A</b>
	MIT			A I
				/ \
				T V

This action is subject to technical and procedural review pursuant to 43 CFR 3165 3 and appeal pursuant to 43 CFR 3165 4

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

DISTRICT & 1625 N. French Dr., Hobbs, N.M. 88240

State of New Mexico Energy, Minerale & Hatural Resources Department

Form C-102 Revised October 12, 2005 Submit to Appropriate District Office

OIL CONSERVATION DIVISION
1220 South St. Francis Dr. 1 25
Santo Fe, NM 87505

5 12 State Lease - 4 Copies

DISTRICT III
1000 Não Broses Rd., Aztec, H.M. 87410

Fee Lease - 3 Copies

DISTRICT TV 1220 South St. Francis Dr., Sairta Fe, NM 87505

AMENDED REPORT

#### WELL LOCATION AND ACREAGE DEDICATION PLAT

RIGIN

30 - 045-	34035 71639	Basin Fruit was	'.oal		
*Property Code		Property Home	* Welt Humber		
30160		LUNT FC			
TOGRAD He.		*Cporptor Name			
Henour	6380 x10	D ENERGY INC.	5747		

<sup>10</sup> Surface Location

UL or lot no.	Section	Township	Rongo	Lol Mh	Feet from the	Horth/South line	Feet from the	East/West line	County
F	6	30-N	13-W		2090	NORTH	860	WEST	SAN JUAN

<sup>11</sup> Bottom Hale Location If Different From Surface Feet from the North/South fine Feet from the East/West fine Ut or let no. County

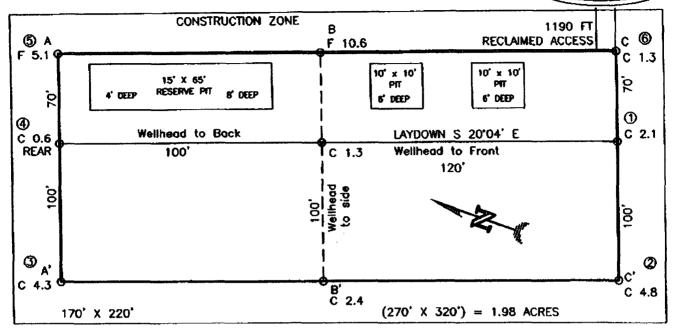
To Joint or Infill 14 Consolidation Code \*Order No.

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

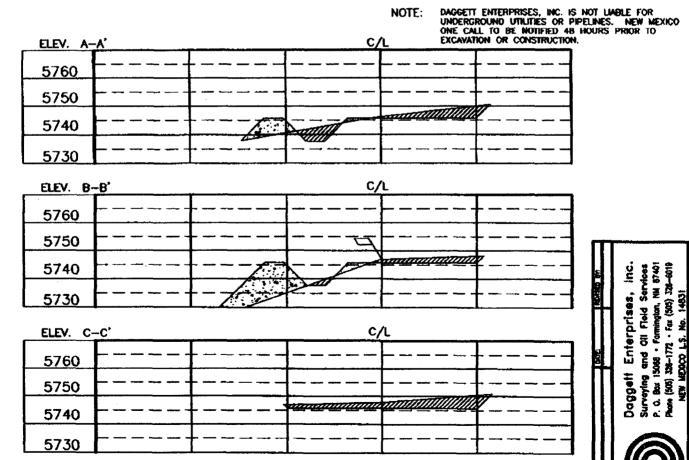
	OR A NON-STAN	DARD UNIT HAS B	EEN APPROVED BY	THE DIVISION
16 FD. 3 1/4° BC. 1952 G.L.O.   ★ (天)  10 C (天)	ro1 3 :0805	PD: 3 1/4" BC: 1952 GLO: N 89-26-18 E 1495.30' (M)	LOT 1	OPERATOR CERTIFICATION  I headly certify that the information contained herein is have and complete to the heat of my hapshops and belts, and that this ergositation either cause a working informat or unlessed mineral informations a working informat or unlessed mineral information or has a right to dist this wall of this location pursuant to a contract with an owner of such a released or vertical bitased, or to a submillary people agreement or a computatory peopling order heretafore entered by the distance.
FD. 2 1/2" BC. 1936 G.L.O.	1 1	LAT: 36.84365' N. LONG: 108.24850' LAT: 36'58'37.1" N. (1 LONG: 108'14'52.3" W	Ŵ. (NÀQ`83)	AURY SMAR SHOKE
9	1			18 SURVEYOR CERTIFICATION  I hereby cartify that the wall location about on this plot were plotted from field notice of actors surveys made by now or under my supervision, and that the same is brus and correct to the heat of my balart.  Date of Separation of the Separation Surveyor.
1017	ł			Cortificator Planter

Submit 3 Copies To Appropriate District Office	State of New Me Energy, Minerals and Natu				Form C-103 May 27, 2004
District I 1625 N. French Dr., Hobbs, NM 87240			WELL AP	INO. 3/)-/	145-34035
District II 1301 W. Grand Ave., Artesia, NM 88210	OIL CONSERVATION		5 Indicate	Type of Leas	
District III 1000 Rio Brazos Rd., Aztec, NM 87410	1220 South St. Fra Santa Fe, NM 8		1	TE	FEE 🗆
District IV	Santa 1 0, 14141 0	1303		il & Gas Leas	
1220 S. St. Francis Dr., Santa Fe, NM 87505			1	09867-A	
SUNDRY NOTIC (DO NOT USE THIS FORM FOR PROPO DIFFERENT RESERVOIR. USE "APPLIC PROPOSALS.)		OR PLUG BACK TO A	7. Lease N	Name or Unit A	Agreement Name:
1. Type of Well: Oil Well Gas Well	Other		8. Well Nu	ımber #4	
2. Name of Operator			9. OGRID		
XIO Energy Inc.				167067	
3. Address of Operator 2700 Farmington Ave., Bldg	· K Sto 1 Franciscotos N	M 97401	l	rame or Wildo UTTLAND COAT	
4. Well Location	. R. Ste I zamminical, R	M 67401	I PROTEIN EW	DITING COL	
Unit Letter F:	2090 feet from the NO	RIH line and	860	feet from the	WEST line
Section 6	Township 30N	Range 13W	NMPM	NMPM Co	unty SAN JUAN
parties of the state of the sta	11. Elevation (Show whether 5747' GRO	DR, RKB, RT, GR, e und elevation	tc.)		
	or Closure				7200
Pit type DRILL Depth to Groundwater				arest surface wat	ter <u><b>\$</b>1000</u>
Pit Liner Thickness: 12 mil	Below-Grade Tank: Volume	bbls; Constructi	ion Material		
NOTICE OF INTE PERFORM REMEDIAL WORK  TEMPORARILY ABANDON	Appropriate Box to Indicate ENTION TO: PLUG AND ABANDON  CHANGE PLANS	1	BSEQUEN	IT REPOR  AL	
PULL OR ALTER CASING	MULTIPLE COMPLETION	CASING TEST AND CEMENT JOB	)		
OTHER: PIT	X	OTHER:			
<ol> <li>Describe proposed or completed of starting any proposed work). or recompletion.</li> <li>XTO Energy intends to instance.</li> </ol>	• •	e Completions: Attac	h wellbore di		•
I hereby certify that the information al grade tank has been will be constructed or constructed	idsed according to NMOCD guideling	es x , a general permit	or an (atta Compliance yla_vaughan	ched) alternative Tech DAT (Extoenergy. Telephone	e OCD-approved plan [] E10/24/06  ccm No. 505-564-6726
APPROVED BY	TI TI	TLE	w inspector	R, DIST. DATE	DEC 28 2006
Conditions of Approval, if any:	•	·		per /1 115	BIT D
				EXHII	טוו ש

XTO ENERGY INC. LUNT FC No. 4, 2090 FNL 860 FWL SECTION 6, T30N, R13W, N.M.P.M., SAN JUAN COUNTY, N. M. GROUND ELEVATION: 5747' DATE: MARCH 7, 2006 NAD 83 LAT. = 36.84365° N LONG. = 108.24850° W NAD 27 LAT. = 36°50'37.1° N LONG. = 108°14'52.3° W



RESERVE PIT DIKE: TO BE 8' ABOVE DEEP SIDE (OVERFLOW - 3' WIDE AND 1' ABOVE SHALLOW SIDE). BLOW PIT: OVERFLOW PIPE HALFWAY BETWEEN TOP AND BOTTOM AND TO EXTEND OVER PLASTIC LINER AND INTO BLOW PIT.



NOTE: CONTRACTOR SHOULD CALL ONE-CALL FOR LOCATION OF ANY MARKED OR UNMARKED BURIED PIPELINES OR CABLES ON WELL PAD AND OR ACCESS ROAD AT LEAST TWO (2) WORKING DAYS PRIOR TO CONSTRUCTION.

#### **XTO ENERGY INC.**

#### Lunt FC #4 **APD Data** October 24, 2006

Location: 2090' FNL x 860' FWL Sec 6, T30N, R13W

County: San Juan

State: New Mexico

GREATEST PROJECTED TD: 1783'

OBJECTIVE: Basin Fruitland Coal

APPROX GR ELEV: 5747'

Est KB ELEV: 5753' (12' AGL)

#### 1. **MUD PROGRAM:**

INTERVAL	0' to 225'	225' to 1783'
HOLE SIZE	12.25"	7.875"
MUD TYPE	FW/Spud Mud	FW/Polymer
WEIGHT	8.6-9.0	8.4-8.8
VISCOSITY	28-32	28-32
WATER LOSS	NC	NC

Remarks: Use fibrous materials as needed to control seepage and lost circulation. Pump high viscosity sweeps as needed for hole cleaning. Raise viscosity at TD for logging. Reduce viscosity after logging for cementing purposes.

#### **CASING PROGRAM:**

Surface Casing:

8.625" casing to be set at  $\pm$  225' in a 12-1/4" hole filled with 9.20 ppg mud

Interval	Length	Wt	Gr	Cplg	Coll Rating (psi)	Burst Rating (psi)	Jt Str (M-lbs)	ID (in)	Drift (in)	SF Coll	SF Burst	SF Ten
0'-225'	225'	24.0#	J-55	ST&C	1370	2950	244	8.097	7.972	12.73	27.41	45.19

Production Casing: 5.5" casing to be set at TD ( $\pm 1783$ ') in 7-7/8" hole filled with 9.20 ppg mud.

					Coll	Burst						
			l .		Rating	Rating	Jt Str	ID	Drift	SF	SF	SF
Interval	Length	Wt	Gr	Cplg	(psi)	(psi)	(M-lbs)	(in)	(in)	Coll	Burst	Ten
												,
0'-1783	1783'	15.5#	J-55	ST&C	4040	4810	202	4.950	4.825	4.74	5.64	7.31

#### 3. **WELLHEAD:**

- A. Casing Head: Larkin Fig 92 (or equivalent), 9" nominal, 2,000 psig WP (4,000 psig test) with 8-5/8" 8rnd thread on bottom and 11-3/4" 8rnd thread on top.
- B. Tubing Head: Larkin Fig 612 (or equivalent), 6.456" nominal, 2,000 psig WP (4,000 psig test), 5-1/2" 8rnd female thread on bottom (or slip-on, weld-on), 8-5/8" 8rnd thread on top.

## 4. <u>CEMENT PROGRAM (Slurry design may change slightly, but the plan is to circulate cement to surface on both casing strings):</u>

A. Surface:

8.625", 24.0#, J-55, ST&C casing to be set at  $\pm$  225' in 12-1/4" hole.

134 sx of Type III cement (or equivalent) typically containing accelerator and LCM, mixed at 14.5 ppg, 1.39 ft<sup>3</sup>/sk, & 6.70 gal wtr/sk.

Total slurry volume is 186 ft<sup>3</sup>, 100% excess of calculated annular volume to 225'.

B. Production:

5.5", 15.5#, J-55 (or K-55), ST&C casing to be set at  $\pm 1783$ ' in 7.875" hole.

#### LEAD:

±139 sx of Premium Lite HS (Type III/Poz/Gel) or equivalent, with dispersant, fluid loss, accelerator, & LCM mixed at 12.5 ppg, 2.01 ft<sup>3</sup>/sk, 10.55 gal wtr/sx.

#### TAIL:

100 sx Type III or equivalent cement with bonding additive, LCM, dispersant, & fluid loss mixed at 14.2 ppg, 1.54 cuft/sx, 8.00 gal/sx.

Total estimated slurry volume for the 5-1/2" production casing is 439 ft<sup>3</sup>.

Note: The slurry design may change slightly based upon actual conditions. Final cement volumes will be determined from the caliper logs plus 40%. It will be attempted to circulate cement to the surface.

#### 5. **LOGGING PROGRAM:**

A. Open Hole Logs as follows: Run Array Induction/SFL/GR/SP fr/TD (1783') to the bottom of the surface csg. Run Neutron/Lithodensity/Pe/GR/Cal from TD (1783') to 225'.

#### 6. FORMATION TOPS:

Est. KB Elevation: 5753'

	Sub-Sea	<u>WELL</u>
<b>FORMATION</b>	Elev.	<u>DEPTH</u>
Ojo Alamo SS		
Kirtland Shale		
Farmington SS		
Fruitland Formation*	4470	1,283
Lower Fruitland Coal*	4370	1,383
Pictured Cliffs SS	4170	1,583
Lewis Shale	4050	1,703
Total Depth	<b>3970</b> ** Secondary	1,783
* Primary Objective	Objective	

\*\*\*\* Maximum anticipated BHP should be <2,000 psig ( <0.30 psi/ft) \*\*\*\*\*

#### 7. **COMPANY PERSONNEL**:

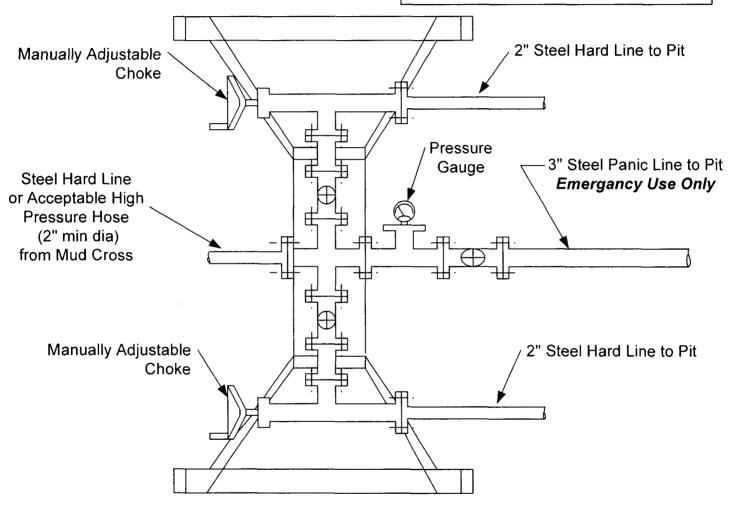
Name	Title	Office Phone	Home Phone
John Egelston	Drilling Engineer	505-564-6734	505-330-6902
Jerry Lacy	Drilling Superintendent	505-566-7917	505-320-6543
Reed Meek	Project Geologist	817-885-2800	

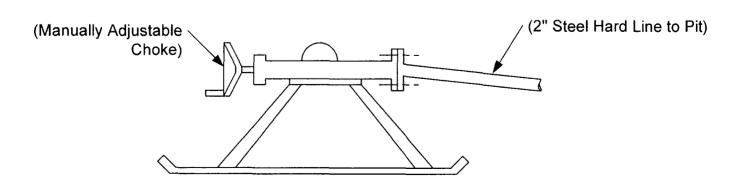
JWE 10/24/06

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

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

# TESTING PROCEDURE





### Pressure test BOP to 200-300 TESTING PROCEDURE psig (low pressure) for 10 min. **BOP** SCHEMATIC FOR Test BOP to Working Press or DRILLING OPERATIONS to 70% internal yield of surf csg CLASS 1 (2M) NORMAL (10 min) or which ever is less. **PRESSURE** 2. Test operation of (both) rams on every trip. 3. Check and record Accumulator ROTATING HEAD pressure on every tour. (OPTIONAL) 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 on the rig floor and ready to go. FILL UP LINE **FLOW LINE** TO PIT PIPE RAMS **BLIND** RAMS TO CHOKE **MANIFOLD** KILL LINE 2" dia min. See Choke Manifold drawing for 2" dia min. HCR VALVE (OPTIONAL)

MUD CROSS -

EXHIBIT G

2" (MIN) FULL OPENING

VALVE

Remove check or ball

from check valve and

press test to same press

as BOP's. \*\*

1. Test BOP after installation: