

RECEIVED

RCVD MAR 26 '13
OIL CONS. DIV.
DIST. 3

Form 3160-3
(April 2004)

JAN 14 2013

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

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
Farmington Field Office
Bureau of Land Management

APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of work: ☒ DRILL ☐ REENTER		5. Lease Serial No. SF-079596, SF-077329, SF-080181
1b. Type of Well: ☐ Oil Well ☒ Gas Well ☐ Other ☐ Single Zone ☒ Multiple Zone		6. If Indian, Allottee or Tribe Name N/A
2. Name of Operator XTO Energy Inc.		7. If Unit or CA Agreement, Name and No. PENDING
3a. Address 382 CR 3100 Aztec, NM 87410		8. Lease Name and Well No. MARTIN GAS COM F 1H
3b. Phone No. (include area code) 505/ 333-3100		9. API Well No. 30-045- 85452
4. Location of Well (Report location clearly and in accordance with any State requirements.)* At surface 611' FNL x 989' FWL At proposed prod. zone 685' FNL x 1980' FWL, (C) Sec. 13, T27N, R10W		10. Field and Pool, or Exploratory BASIN MANCOS
14. Distance in miles and direction from nearest town or post office* Approx. 18 miles SE of Bloomfield P.O.		11. Sec., T. R. M. or Blk. and Survey or Area (D) Sec 14, T27N, R10W
15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any) 611'	16. No. of acres in lease 80	17. Spacing Unit dedicated to this well N/2 Sec. 14(320 acres), NW/4 Sec. 13(160 acres)
18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. 332'	19. Proposed Depth 7400' 12016'	20. BLM/BIA Bond No. on file UTB000138
21. Elevations (Show whether DF, KDB, RT, GL, etc.) 6387' Ground Elevation	22. Approximate date work will start* 03/15/2013	23. Estimated duration 2 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. | 4. Bond to cover the operations unless covered by an existing bond on file (see Item 20 above). |
| 2. A Drilling Plan. | 5. Operator certification |
| 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). | 6. Such other site specific information and/or plans as may be required by the authorized officer. |

25. Signature <i>Malia Villers</i>	Name (Printed/Typed) Malia Villers	Date 1/11/13
Title Permitting Tech.		
Approved by (Signature) <i>[Signature]</i>	Name (Printed/Typed) AFM	Date 3/21/13
Title FFO		

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 statement.

Oil base muds are not to be used until

fresh water zones are cased and
cemented providing isolation from
the oil or diesel.

This includes synthetic oils

*(Instructions on page 2)

This action is subject to technical and procedural review pursuant to 43 CFR 161.2 and appeal pursuant to 43 CFR 3162.4

Hold C104

for Directional Survey
and "As Drilled" plat

BLM'S APPROVAL OR ACCEPTANCE OF THIS ACTION DOES NOT RELIEVE THE LESSEE AND OPERATOR FROM OBTAINING ANY OTHER AUTHORIZATION REQUIRED FOR OPERATIONS ON FEDERAL AND INDIAN LANDS

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

NMOC

APR 10 2013 ca

AV

Hold C104
for Directional Survey
and "As Drilled" plat

NOTIFY AZTEC OCD 24 HRS.
PRIOR TO CASING & CEMENT

District I
1625 N. French Dr., Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720
District II
811 S. First St., Artesia, NM 88210
Phone: (575) 748-1283 Fax: (575) 748-9720
District III
1000 Rio Brazos Road, Aztec, NM 87410
Phone: (505) 334-6178 Fax: (505) 334-6170
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505
Phone: (505) 476-3460 Fax: (505) 476-3462

State of New Mexico
Energy, Minerals & Natural Resources Department
OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, NM 87505

RECEIVED

Form C-102

Revised August 1, 2011

Submit one copy to appropriate

District Office

Farmington Field Office
Bureau of Land Management
AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

¹ API Number 30-045-35452	² Pool Code 97232	³ Pool Name Basin Mancos
⁴ Property Code 22769	⁵ Property Name MARTIN GAS COM F	⁶ Well Number 1H
⁷ OGRID No. 5380	⁸ Operator Name XTO ENERGY INC.	⁹ Elevation 6,387

¹⁰ Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
D	14	27 N	10 W		611	NORTH	989	WEST	SAN JUAN

¹¹ Bottom 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
C	13	27 N	10 W		685	NORTH	1980	WEST	SAN JUAN

¹² Dedicated Acres Sec. 14/320 N/2 Sec. 13/160 NW/4	¹³ Joint or Infill N/2 NW/4	¹⁴ Consolidation Code	¹⁵ Order No.
--	--	----------------------------------	-------------------------

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.

¹⁷ OPERATOR CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.

Malia Villers 1/11/13
Signature Date

Malia Villers
Printed Name

malia-villers@xtoenergy.com
E-mail Address

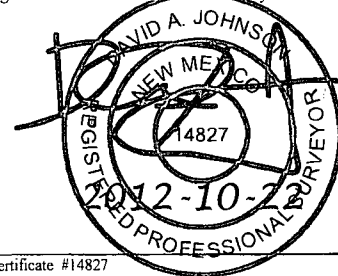
¹⁸ SURVEYOR CERTIFICATION

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.

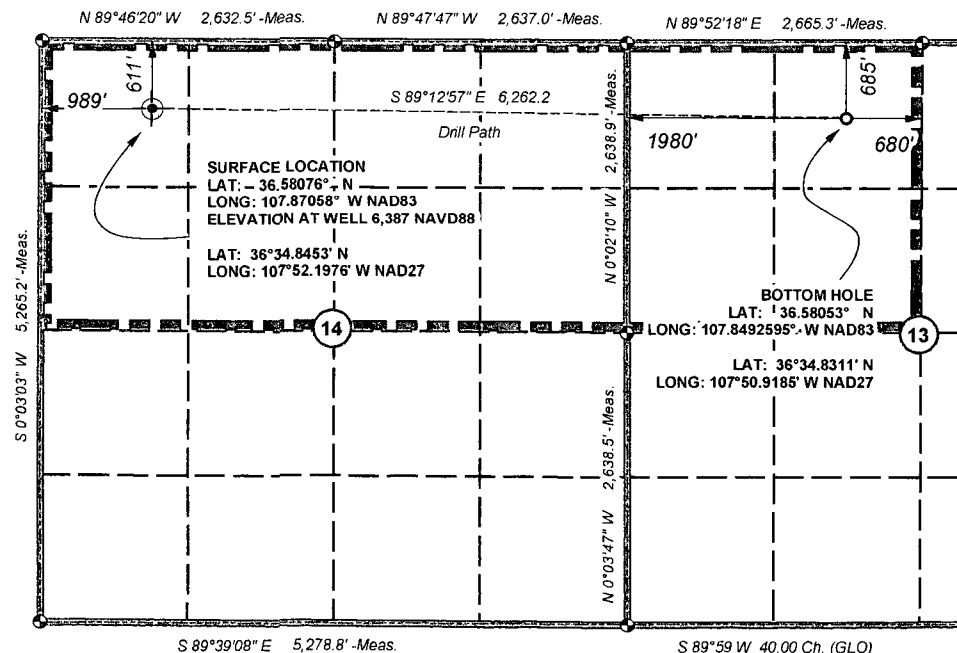
August 28, 2012

Date of Survey

Signature and Seal of Professional Surveyor:



Certificate #14827



= Project Area



= Found GLO Brass Cap Monument

XTO ENERGY INC.

Martin Gas Com F #1H

APD Data

January 10, 2013

Location: 611' FNL x 989' FWL Sec 14, T27N, R10W County: San Juan

State: New Mexico

Bottomhole Location: 685' FNL x 1980' FWL Sec 13, T27N, R10W

GREATEST PROJECTED TVD: 5997'

APPROX GR ELEV: 6387'

GREATEST PROJECTED MD: 12016'

Est. KB ELEV: 6499' (12' AGL)

OBJECTIVE: Gallup Horizontal

1. MUD PROGRAM:

INTERVAL	0' to 500'	500' to 6365'	6365' to TD
HOLE SIZE	12.25"	8.75"	6.125"
MUD TYPE	FW/Spud Mud	FW/Polymer/LSND	Oil Based Mud/Invert
WEIGHT	8.6-9.0	8.4-9.2	11-13.5
VISCOSITY	28-32	28-36	28-36
WATER LOSS	NC	NC	NC

Remarks: Use fibrous materials as needed to control seepage and lost circulation. Pump high viscosity sweeps as needed for hole cleaning.

2. CASING PROGRAM:

Surface Casing: 9.625" casing to be set at $\pm 500'$ 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 ¹	SF Burst ²	SF Ten ³
0'-500'	500'	36.0#	J-55	ST&C	2020	3520	394	8.921	8.765	8.44	14.7	21.9

Intermediate Casing: 7" casing to be set at $\pm 6365'$ MD, 5997' TVD in 8.75" 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 ¹	SF Burst ²	SF Ten ³
0'-6365'	6365'	26 #	J-55	ST&C	4320	4980	334	6.276	6.151	1.51	1.74	2.02

Production Casing: 4.5" casing to be set at $\pm 12016'$ MD, 5997' TVD in 6.125" hole filled with 13.5 ppg mud. (Mud may be weighted up to 13.5 ppg for hole stability reasons. Anticipated Reservoir pressure ~ 7.5 ppg)

Interval	Length	Wt	Gr	Cplg	Coll Rating (psi)	Burst Rating (psi)	Jt Str (M-lbs)	ID (in)	Drift (in)	SF Coll ¹	SF Burst ²	SF Ten ³
6305'-12016'	5711'	11.6#	N-80	LT&C	6350	7780	223	4.00	3.875	1.51	1.85	3.37

¹Collapse SF is based on evacuated casing and hydrostatic at TVD.

²Burst SF is based on evacuated annulus and hydrostatic at TVD.

³Tensile SF is based on hanging air weight of casing in a vertical hole at measured depth.

3. WELLHEAD:

- A. Casing Head: C-22 profile (or equivalent), 9-5/8 slip on weld on x 11", 5000# with 11" x 7-1/16" 5000# C-22 casing hanger.
- B. Tubing Head: TCM (or equivalent), 11" 5000# x 7-1/16" 5000#, TC-1A 7-1/16" x 2-3/8 tubing Hanger

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

- A. Surface: 9.625", 36.0#, J-55, ST&C casing to be set at $\pm 500'$ in 12-1/4" hole.

± 268 sx of Type V cement (or equivalent) typically containing accelerator and LCM, mixed at 15.8 ppg, 1.17 ft³/sk, & 5.01 gal wtr/sk.

Total slurry volume is 313 ft³, 100% excess of calculated annular volume to 500'.

- B. Intermediate Casing: 7", 26#/ft, J-55, ST&C casing to be set at $\pm 6365'$ MD, 5997' TVD in 8.75" hole.

LEAD 1:

± 405 sx of Type V (or equivalent) typically containing accelerator, LCM, dispersant, and fluid loss additives at 12.3 ppg, 2.36 ft³/sk, & 12.95 gal wtr/sk.

TAIL 1:

± 200 sx of Type V or Class G cement typically containing accelerator, LCM, dispersant, and fluid loss additives at 13.5 ppg, 1.81 ft³/sk, & 8.85 gal wtr/sk.

Total estimated slurry volume for the 7" production casing is 1317 ft³.

- C. Production Liner: 4.5", 11.6#/ft, N-80, LT&C casing is to be set at 12016' MD, 5997' TVD in 6.125" hole.

The production liner will be set using an uncemented liner hanger. The liner may be tied back to surface during the completion of the well.

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

5. LOGGING PROGRAM:

- A. Mud Logger: A geologic consultant or unmanned mud logging unit will begin logging the well once the surface shoe is drilled out and remain on the well to TD.
- B. Open Hole Logs as follows: Gamma Ray from Surface shoe to TD.

6. FORMATION TOPS:

See attached Directional Program.

**** Maximum anticipated BHP should be <2,000 psig (<0.38psi/ft) ****

7. **COMPANY PERSONNEL:**

Name	Title	Office Phone	Cellular Phone
Ross Lubbers	Drilling Manager	303-397-3721	405-659-8563
Justin Niederhofer	Drilling Engineer	303-397-3719	505-320-0158
Bobby Jackson	Drilling Superintendent	303-397-3720	505-486-4706
Charles Musekamp	Project Geologist	817-885-2800	--

JDN
1/10/13



Well Name: Martin Gas Com F #1H

San Juan Division
Drilling Department

Calculation Method: Minimum Curvature
Geodetic Datum: North American Datum 1983
Lat: 36° 34' 50.74 N
Long: 107° 52' 14.09 W



Azimuths to True North
Magnetic North: 10.08°

Magnetic Field
Strength: 50803.4snT
Dip Angle: 63.35°
Date: 12/31/2009
Model: IGRF200510

FORMATION TOP DETAILS

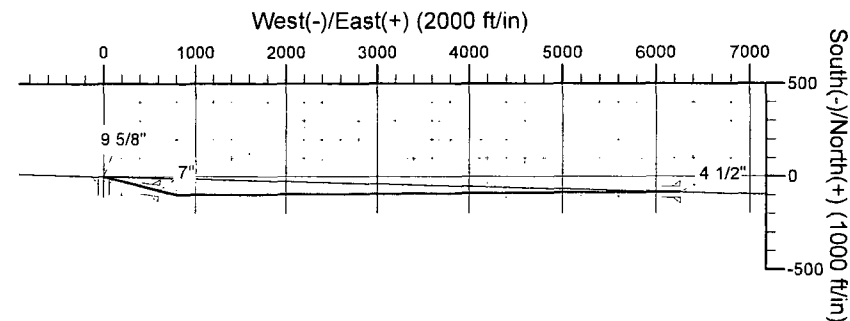
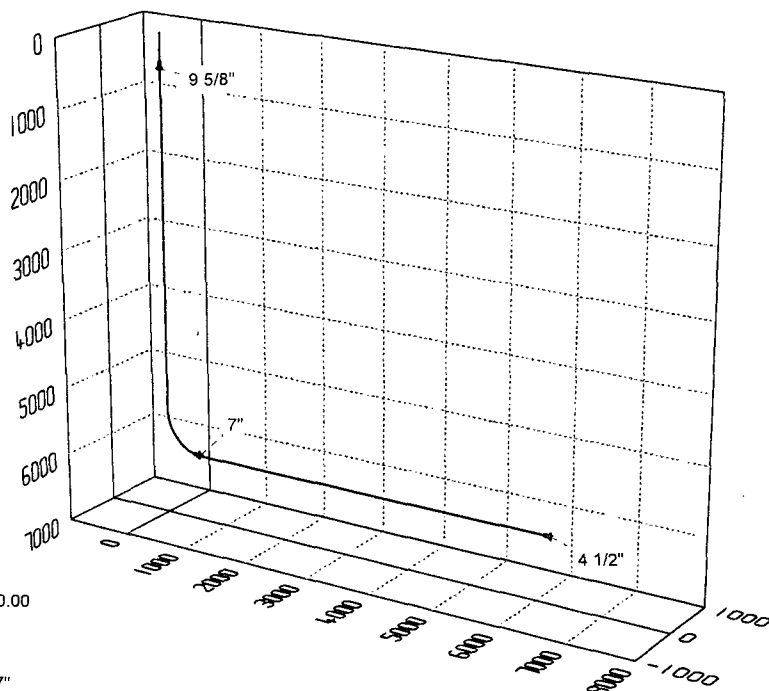
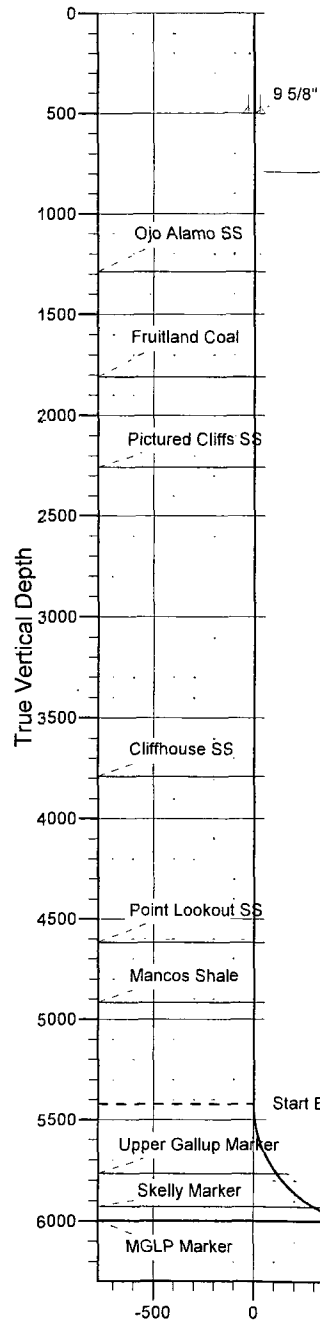
TVDPath	MDPath	Formation
1287.00	1287.00	Ojo Alamo SS
1807.00	1807.00	Fruitland Coal
2257.00	2257.00	Pictured Cliffs SS
3790.00	3790.00	Cliffhouse SS
4617.00	4617.00	Point Lookout SS
4915.00	4915.00	Mancos Shale
5767.00	5791.73	Upper Gallup Marker
5929.00	6042.07	Skelly Marker
5994.00	6265.41	MGLP Marker

SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec	Target
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
2	5424.00	0.00	0.00	5424.00	0.00	0.00	0.00	0.00	0.00	
3	6324.07	90.00	97.00	5997.00	-69.83	568.73	10.00	97.00	569.61	
4	6474.07	90.00	97.00	5997.00	-88.11	717.61	0.00	0.00	718.72	
5	6653.27	90.00	89.83	5997.00	-98.78	896.38	4.00	-90.00	897.61	Proposed BHL -- Martin Gas Com F #1H
6	12016.72	90.00	89.83	5997.00	-83.04	6259.80	0.00	0.00	6260.35	Proposed BHL -- Martin Gas Com F #1H

CASING DETAILS

TVD	MD	Name	Size
500.00	500.00	9 5/8"	9.625
5997.00	6365.00	7"	7.000
5997.00	12016.00	4 1/2"	4.500



Vertical Section at 90.76°

TD at 12016.72

XTO Energy Inc.

Planning Report

Database:	EDM	Local Co-ordinate Reference:	Well Martin Gas Com F #1H
Company:	XTO Energy	TVD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Project:	San Juan Basin (NAD 83)	MD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Site:	Martin Gas Com F #1H	North Reference:	True
Well:	Martin Gas Com F #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Martin Gas Com F #1H		
Design:	Permitted wellbore - Martin Gas Com F #1H		

Project:	San Juan Basin (NAD 83), San Juan Co, NM		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	New Mexico Western Zone		

Site:	Martin Gas Com F #1H, T27N, R10W		
Site Position:		Northing:	2,030,708.18 ft
From:	Lat/Long	Easting:	2,712,155.92 ft
Position Uncertainty:	0.00 ft	Slot Radius:	in
		Latitude:	36° 34' 50.74 N
		Longitude:	107° 52' 14.09 W
		Grid Convergence:	-0.02 °

Well:	Martin Gas Com F #1H, Horizontal Mancos					
Well Position	+N/-S	0.00 ft	Northing:	2,030,708.18 ft	Latitude:	36° 34' 50.74 N
	+E/-W	0.00 ft	Easting:	2,712,155.92 ft	Longitude:	107° 52' 14.09 W
Position Uncertainty		0.00 ft	Wellhead Elevation:	6,387.00 ft	Ground Level:	6,387.00 ft

Wellbore:	Martin Gas Com F #1H
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Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF200510	12/31/2009	10.08	63.35	50,803

Design:	Permitted wellbore - Martin Gas Com F #1H
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Audit Notes:				
Version:	Phase:	PROTOTYPE		Tie On Depth: 0.00
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.00	0.00	0.00	90.76

Plan Sections										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	TFO (°)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
5,424.00	0.00	0.00	5,424.00	0.00	0.00	0.00	0.00	0.00	0.00	
6,324.07	90.00	97.00	5,997.00	-69.83	568.73	10.00	10.00	0.00	97.00	
6,474.07	90.00	97.00	5,997.00	-88.11	717.61	0.00	0.00	0.00	0.00	
6,653.27	90.00	89.83	5,997.00	-98.78	896.38	4.00	0.00	-4.00	-90.00	Proposed BHL - Mart
12,016.72	90.00	89.83	5,997.00	-83.04	6,259.80	0.00	0.00	0.00	0.00	Proposed BHL - Mart

XTO Energy Inc.

Planning Report

Database:	EDM	Local Co-ordinate Reference:	Well Martin Gas Com F #1H
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Project:	San Juan Basin (NAD 83)	MD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Site:	Martin Gas Com F #1H	North Reference:	True
Well:	Martin Gas Com F #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Martin Gas Com F #1H		
Design:	Permitted wellbore - Martin Gas Com F #1H		

Planned Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
100.00	0.00	0.00	100.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
200.00	0.00	0.00	200.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
400.00	0.00	0.00	400.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
500.00	0.00	0.00	500.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
9 5/8"										
600.00	0.00	0.00	600.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
700.00	0.00	0.00	700.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
800.00	0.00	0.00	800.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
900.00	0.00	0.00	900.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,000.00	0.00	0.00	1,000.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,100.00	0.00	0.00	1,100.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,200.00	0.00	0.00	1,200.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,287.00	0.00	0.00	1,287.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Ojo Alamo SS										
1,300.00	0.00	0.00	1,300.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,400.00	0.00	0.00	1,400.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,500.00	0.00	0.00	1,500.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,600.00	0.00	0.00	1,600.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,700.00	0.00	0.00	1,700.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,800.00	0.00	0.00	1,800.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,807.00	0.00	0.00	1,807.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Fruitland Coal										
1,900.00	0.00	0.00	1,900.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,000.00	0.00	0.00	2,000.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,100.00	0.00	0.00	2,100.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,200.00	0.00	0.00	2,200.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,257.00	0.00	0.00	2,257.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Pictured Cliffs SS										
2,300.00	0.00	0.00	2,300.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,400.00	0.00	0.00	2,400.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,500.00	0.00	0.00	2,500.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,600.00	0.00	0.00	2,600.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,700.00	0.00	0.00	2,700.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,800.00	0.00	0.00	2,800.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
2,900.00	0.00	0.00	2,900.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,000.00	0.00	0.00	3,000.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,100.00	0.00	0.00	3,100.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,200.00	0.00	0.00	3,200.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,300.00	0.00	0.00	3,300.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,400.00	0.00	0.00	3,400.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,500.00	0.00	0.00	3,500.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,600.00	0.00	0.00	3,600.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,700.00	0.00	0.00	3,700.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,790.00	0.00	0.00	3,790.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Cliffhouse SS										
3,800.00	0.00	0.00	3,800.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
3,900.00	0.00	0.00	3,900.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4,000.00	0.00	0.00	4,000.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4,100.00	0.00	0.00	4,100.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4,200.00	0.00	0.00	4,200.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4,300.00	0.00	0.00	4,300.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
4,400.00	0.00	0.00	4,400.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

XTO Energy Inc.

Planning Report

Database:	EDM	Local Co-ordinate Reference:	Well Martin Gas Com F #1H
Company:	XTO Energy	TVD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Project:	San Juan Basin (NAD 83)	MD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Site:	Martin Gas Com F #1H	North Reference:	True
Well:	Martin Gas Com F #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Martin Gas Com F #1H		
Design:	Permitted wellbore - Martin Gas Com F #1H		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
4,500.00	0.00	0.00	4,500.00	0.00	0.00	0.00	0.00	0.00	0.00
4,600.00	0.00	0.00	4,600.00	0.00	0.00	0.00	0.00	0.00	0.00
4,617.00	0.00	0.00	4,617.00	0.00	0.00	0.00	0.00	0.00	0.00
Point Lookout SS									
4,700.00	0.00	0.00	4,700.00	0.00	0.00	0.00	0.00	0.00	0.00
4,800.00	0.00	0.00	4,800.00	0.00	0.00	0.00	0.00	0.00	0.00
4,900.00	0.00	0.00	4,900.00	0.00	0.00	0.00	0.00	0.00	0.00
4,915.00	0.00	0.00	4,915.00	0.00	0.00	0.00	0.00	0.00	0.00
Mancos Shale									
5,000.00	0.00	0.00	5,000.00	0.00	0.00	0.00	0.00	0.00	0.00
5,100.00	0.00	0.00	5,100.00	0.00	0.00	0.00	0.00	0.00	0.00
5,200.00	0.00	0.00	5,200.00	0.00	0.00	0.00	0.00	0.00	0.00
5,300.00	0.00	0.00	5,300.00	0.00	0.00	0.00	0.00	0.00	0.00
5,400.00	0.00	0.00	5,400.00	0.00	0.00	0.00	0.00	0.00	0.00
5,424.00	0.00	0.00	5,424.00	0.00	0.00	0.00	0.00	0.00	0.00
5,450.00	2.60	97.00	5,449.99	-0.07	0.59	0.59	10.00	10.00	0.00
5,500.00	7.60	97.00	5,499.78	-0.61	5.00	5.00	10.00	10.00	0.00
5,550.00	12.60	97.00	5,548.99	-1.68	13.69	13.72	10.00	10.00	0.00
5,600.00	17.60	97.00	5,597.25	-3.27	26.62	26.66	10.00	10.00	0.00
5,650.00	22.60	97.00	5,644.19	-5.36	43.67	43.73	10.00	10.00	0.00
5,700.00	27.60	97.00	5,689.45	-7.95	64.71	64.81	10.00	10.00	0.00
5,750.00	32.60	97.00	5,732.70	-11.00	89.59	89.73	10.00	10.00	0.00
5,791.73	36.77	97.00	5,767.00	-13.89	113.15	113.33	10.00	10.00	0.00
Upper Gallup Marker									
5,800.00	37.60	97.00	5,773.59	-14.50	118.11	118.30	10.00	10.00	0.00
5,850.00	42.60	97.00	5,811.83	-18.43	150.07	150.30	10.00	10.00	0.00
5,900.00	47.60	97.00	5,847.11	-22.74	185.21	185.49	10.00	10.00	0.00
5,950.00	52.60	97.00	5,879.18	-27.41	223.27	223.61	10.00	10.00	0.00
6,000.00	57.60	97.00	5,907.78	-32.41	263.95	264.36	10.00	10.00	0.00
6,042.07	61.80	97.00	5,929.00	-36.84	300.00	300.46	10.00	10.00	0.00
Skelly Marker									
6,050.00	62.60	97.00	5,932.70	-37.69	306.96	307.43	10.00	10.00	0.00
6,100.00	67.60	97.00	5,953.75	-43.21	351.96	352.50	10.00	10.00	0.00
6,150.00	72.59	97.00	5,970.76	-48.94	398.61	399.22	10.00	10.00	0.00
6,200.00	77.59	97.00	5,983.62	-54.83	446.55	447.24	10.00	10.00	0.00
6,250.00	82.59	97.00	5,992.22	-60.83	495.42	496.18	10.00	10.00	0.00
6,265.41	84.13	97.00	5,994.00	-62.69	510.61	511.39	10.00	10.00	0.00
MGLP Marker									
6,300.00	87.59	97.00	5,996.49	-66.90	544.85	545.69	10.00	10.00	0.00
6,324.07	90.00	97.00	5,997.00	-69.83	568.73	569.61	10.00	10.00	0.00
6,365.00	90.00	97.00	5,997.00	-74.82	609.36	610.30	0.00	0.00	0.00
7									
6,400.00	90.00	97.00	5,997.00	-79.09	644.10	645.09	0.00	0.00	0.00
6,474.07	90.00	97.00	5,997.00	-88.11	717.61	718.72	0.00	0.00	0.00
6,500.00	90.00	95.96	5,997.00	-91.04	743.38	744.52	4.00	0.00	-4.00
6,600.00	90.00	91.96	5,997.00	-97.95	843.12	844.34	4.00	0.00	-4.00
6,653.27	90.00	89.83	5,997.00	-98.78	896.38	897.61	4.00	0.00	-4.00
6,700.00	90.00	89.83	5,997.00	-98.65	943.11	944.33	0.00	0.00	0.00
6,800.00	90.00	89.83	5,997.00	-98.35	1,043.11	1,044.32	0.00	0.00	0.00
6,900.00	90.00	89.83	5,997.00	-98.06	1,143.11	1,144.31	0.00	0.00	0.00
7,000.00	90.00	89.83	5,997.00	-97.76	1,243.11	1,244.30	0.00	0.00	0.00
7,100.00	90.00	89.83	5,997.00	-97.47	1,343.11	1,344.28	0.00	0.00	0.00
7,200.00	90.00	89.83	5,997.00	-97.18	1,443.11	1,444.27	0.00	0.00	0.00

XTO Energy Inc.

Planning Report

Database:	EDM	Local Co-ordinate Reference:	Well: Martin Gas Com F #1H
Company:	XTO Energy	TVD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Project:	San Juan Basin (NAD 83)	MD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Site:	Martin Gas Com F #1H	North Reference:	True
Well:	Martin Gas Com F #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Martin Gas Com F #1H		
Design:	Permitted wellbore- Martin Gas Com F #1H		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
7,300.00	90.00	89.83	5,997.00	-96.88	1,543.11	1,544.26	0.00	0.00	0.00
7,400.00	90.00	89.83	5,997.00	-96.59	1,643.11	1,644.24	0.00	0.00	0.00
7,500.00	90.00	89.83	5,997.00	-96.30	1,743.11	1,744.23	0.00	0.00	0.00
7,600.00	90.00	89.83	5,997.00	-96.00	1,843.11	1,844.22	0.00	0.00	0.00
7,700.00	90.00	89.83	5,997.00	-95.71	1,943.11	1,944.20	0.00	0.00	0.00
7,800.00	90.00	89.83	5,997.00	-95.42	2,043.10	2,044.19	0.00	0.00	0.00
7,900.00	90.00	89.83	5,997.00	-95.12	2,143.10	2,144.18	0.00	0.00	0.00
8,000.00	90.00	89.83	5,997.00	-94.83	2,243.10	2,244.16	0.00	0.00	0.00
8,100.00	90.00	89.83	5,997.00	-94.53	2,343.10	2,344.15	0.00	0.00	0.00
8,200.00	90.00	89.83	5,997.00	-94.24	2,443.10	2,444.14	0.00	0.00	0.00
8,300.00	90.00	89.83	5,997.00	-93.95	2,543.10	2,544.12	0.00	0.00	0.00
8,400.00	90.00	89.83	5,997.00	-93.65	2,643.10	2,644.11	0.00	0.00	0.00
8,500.00	90.00	89.83	5,997.00	-93.36	2,743.10	2,744.10	0.00	0.00	0.00
8,600.00	90.00	89.83	5,997.00	-93.07	2,843.10	2,844.09	0.00	0.00	0.00
8,700.00	90.00	89.83	5,997.00	-92.77	2,943.10	2,944.07	0.00	0.00	0.00
8,800.00	90.00	89.83	5,997.00	-92.48	3,043.10	3,044.06	0.00	0.00	0.00
8,900.00	90.00	89.83	5,997.00	-92.19	3,143.10	3,144.05	0.00	0.00	0.00
9,000.00	90.00	89.83	5,997.00	-91.89	3,243.10	3,244.03	0.00	0.00	0.00
9,100.00	90.00	89.83	5,997.00	-91.60	3,343.10	3,344.02	0.00	0.00	0.00
9,200.00	90.00	89.83	5,997.00	-91.31	3,443.10	3,444.01	0.00	0.00	0.00
9,300.00	90.00	89.83	5,997.00	-91.01	3,543.10	3,543.99	0.00	0.00	0.00
9,400.00	90.00	89.83	5,997.00	-90.72	3,643.10	3,643.98	0.00	0.00	0.00
9,500.00	90.00	89.83	5,997.00	-90.42	3,743.10	3,743.97	0.00	0.00	0.00
9,600.00	90.00	89.83	5,997.00	-90.13	3,843.10	3,843.95	0.00	0.00	0.00
9,700.00	90.00	89.83	5,997.00	-89.84	3,943.10	3,943.94	0.00	0.00	0.00
9,800.00	90.00	89.83	5,997.00	-89.54	4,043.10	4,043.93	0.00	0.00	0.00
9,900.00	90.00	89.83	5,997.00	-89.25	4,143.10	4,143.91	0.00	0.00	0.00
10,000.00	90.00	89.83	5,997.00	-88.96	4,243.10	4,243.90	0.00	0.00	0.00
10,100.00	90.00	89.83	5,997.00	-88.66	4,343.09	4,343.89	0.00	0.00	0.00
10,200.00	90.00	89.83	5,997.00	-88.37	4,443.09	4,443.88	0.00	0.00	0.00
10,300.00	90.00	89.83	5,997.00	-88.08	4,543.09	4,543.86	0.00	0.00	0.00
10,400.00	90.00	89.83	5,997.00	-87.78	4,643.09	4,643.85	0.00	0.00	0.00
10,500.00	90.00	89.83	5,997.00	-87.49	4,743.09	4,743.84	0.00	0.00	0.00
10,600.00	90.00	89.83	5,997.00	-87.20	4,843.09	4,843.82	0.00	0.00	0.00
10,700.00	90.00	89.83	5,997.00	-86.90	4,943.09	4,943.81	0.00	0.00	0.00
10,800.00	90.00	89.83	5,997.00	-86.61	5,043.09	5,043.80	0.00	0.00	0.00
10,900.00	90.00	89.83	5,997.00	-86.31	5,143.09	5,143.78	0.00	0.00	0.00
11,000.00	90.00	89.83	5,997.00	-86.02	5,243.09	5,243.77	0.00	0.00	0.00
11,100.00	90.00	89.83	5,997.00	-85.73	5,343.09	5,343.76	0.00	0.00	0.00
11,200.00	90.00	89.83	5,997.00	-85.43	5,443.09	5,443.74	0.00	0.00	0.00
11,300.00	90.00	89.83	5,997.00	-85.14	5,543.09	5,543.73	0.00	0.00	0.00
11,400.00	90.00	89.83	5,997.00	-84.85	5,643.09	5,643.72	0.00	0.00	0.00
11,500.00	90.00	89.83	5,997.00	-84.55	5,743.09	5,743.70	0.00	0.00	0.00
11,600.00	90.00	89.83	5,997.00	-84.26	5,843.09	5,843.69	0.00	0.00	0.00
11,700.00	90.00	89.83	5,997.00	-83.97	5,943.09	5,943.68	0.00	0.00	0.00
11,800.00	90.00	89.83	5,997.00	-83.67	6,043.09	6,043.67	0.00	0.00	0.00
11,900.00	90.00	89.83	5,997.00	-83.38	6,143.09	6,143.65	0.00	0.00	0.00
12,000.00	90.00	89.83	5,997.00	-83.08	6,243.09	6,243.64	0.00	0.00	0.00
12,016.00	90.00	89.83	5,997.00	-83.04	6,259.09	6,259.64	0.00	0.00	0.00
4 1/2"									
12,016.72	90.00	89.83	5,997.00	-83.04	6,259.80	6,260.35	0.00	0.00	0.00

XTO Energy Inc.

Planning Report

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Company:	XTO Energy	TVD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Project:	San Juan Basin (NAD 83)	MD Reference:	Rig KB @ 6399.00ft (Aztec 781)
Site:	Martin Gas Com F #1H	North Reference:	True
Well:	Martin Gas Com F #1H	Survey Calculation Method:	Minimum Curvature
Wellbore:	Martin Gas Com F #1H		
Design:	Permitted wellbore--Martin Gas Com F #1H		

Design Targets									
Target Name	Dip Angle	Dip Dir.	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
- hit/miss target	(°)	(°)	(ft)	(ft)	(ft)	(ft)	(ft)		
- Shape									
Proposed BHL -- Martin	0.00	0.00	5,997.00	-83.04	6,259.80	2,030,622.72	2,718,415.68	36° 34' 49.91 N	107° 50' 57.33 W
- plan hits target									
- Point									

Casing Points					
Measured Depth	Vertical Depth		Name	Casing Diameter	Hole Diameter
(ft)	(ft)			(in)	(in)
500.00	500.00	9 5/8"		9.625	12.250
6,365.00	5,997.00	7"		7.000	8.750
12,016.00	5,997.00	4 1/2"		4.500	6.125

Formations						
Measured Depth	Vertical Depth	Name	Lithology	Dip	Dip Direction	
(ft)	(ft)			(°)	(°)	
1,287.00	1,287.00	Ojo Alamo SS		0.00		
1,807.00	1,807.00	Fruitland Coal		0.00		
2,257.00	2,257.00	Pictured Cliffs SS		0.00		
3,790.00	3,790.00	Cliffhouse SS		0.00		
4,617.00	4,617.00	Point Lookout SS		0.00		
4,915.00	4,915.00	Mancos Shale		0.00		
5,791.73	5,767.00	Upper Gallup Marker		0.00		
6,042.07	5,929.00	Skelly Marker		0.00		
6,265.41	5,994.00	MGLP Marker		0.00		

SURFACE USE PLAN

XTO Energy Inc.
Martin Gas Com F 1H
611' FNL x 989' FWL
Section 14, T27N, R10W
San Juan County, New Mexico

TWELVE-POINT SURFACE USE PLAN

The dirt contractor will be provided with an approved copy of the surface use plan of operations before initiating construction.

1. Existing Roads:

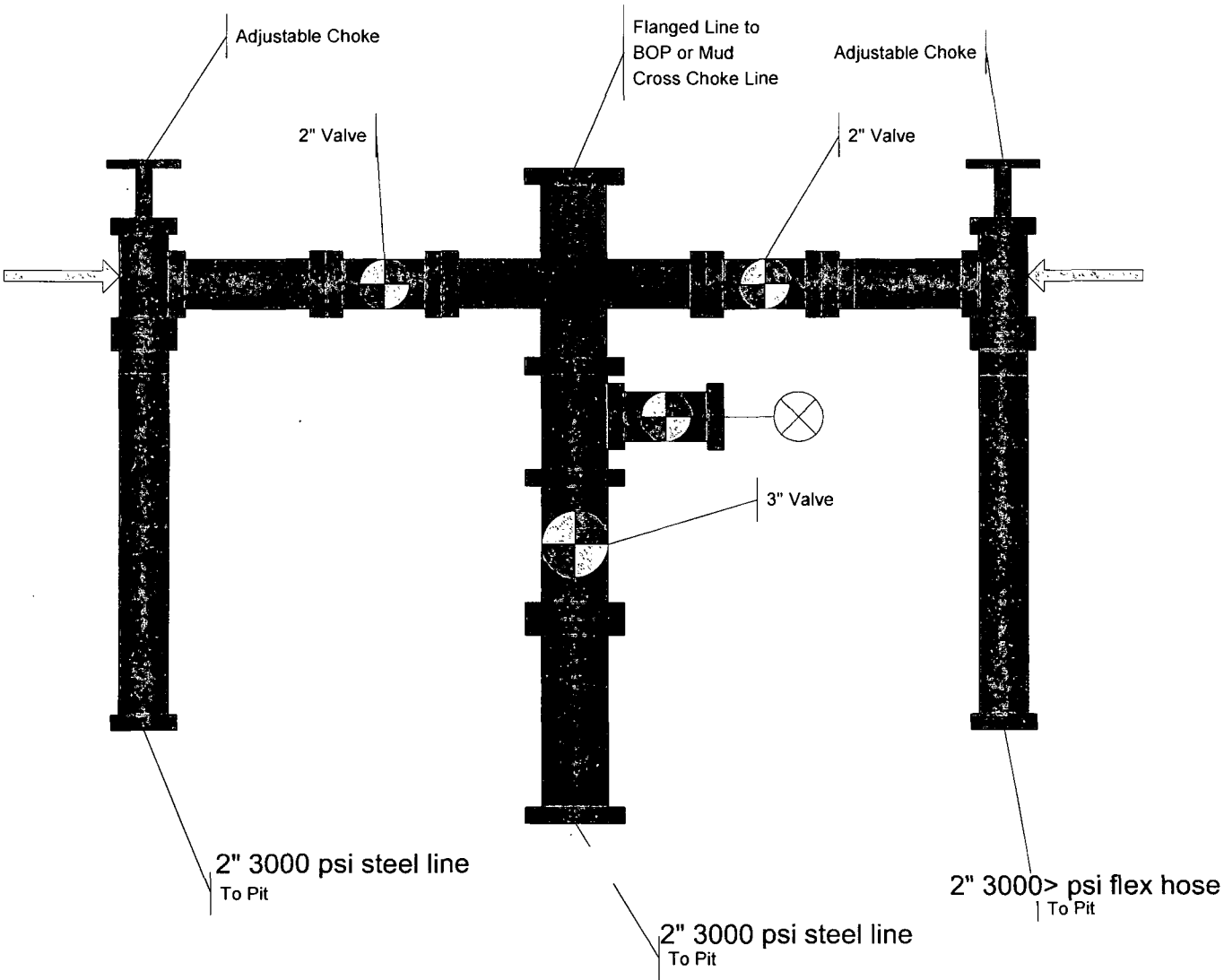
- a. Proposed route to location is shown on the USGS quadrangle map: **See Exhibit "A"**.
- b. The proposed well site is located at 611' FNL & 989' FWL (NWNW) Sec. 14, T27N, R10W, San Juan County, NM.
- c. Location of proposed well in relation to town or other reference point:

From intersection of Highway 550 and U.S. Highway 64 in Bloomfield, New Mexico:
Travel South on Highway 550 for 8.6 miles Turn left on Road 7010 and travel East 7.1 miles. Turn slight right onto field road and travel South 2.3 miles. Turn right onto field road and travel 0.2 miles to existing well location KUKUI AP14-5S. Travel through location to existing access to staked location.
- d. All existing roads within 1 mile of the drill site are shown on **Exhibit "A"**. If necessary, all existing roads that will be used for access to the well location will be maintained to their current condition or better unless BLM approval or consent is given to upgrade the existing road(s).

2. Planned Access Roads:

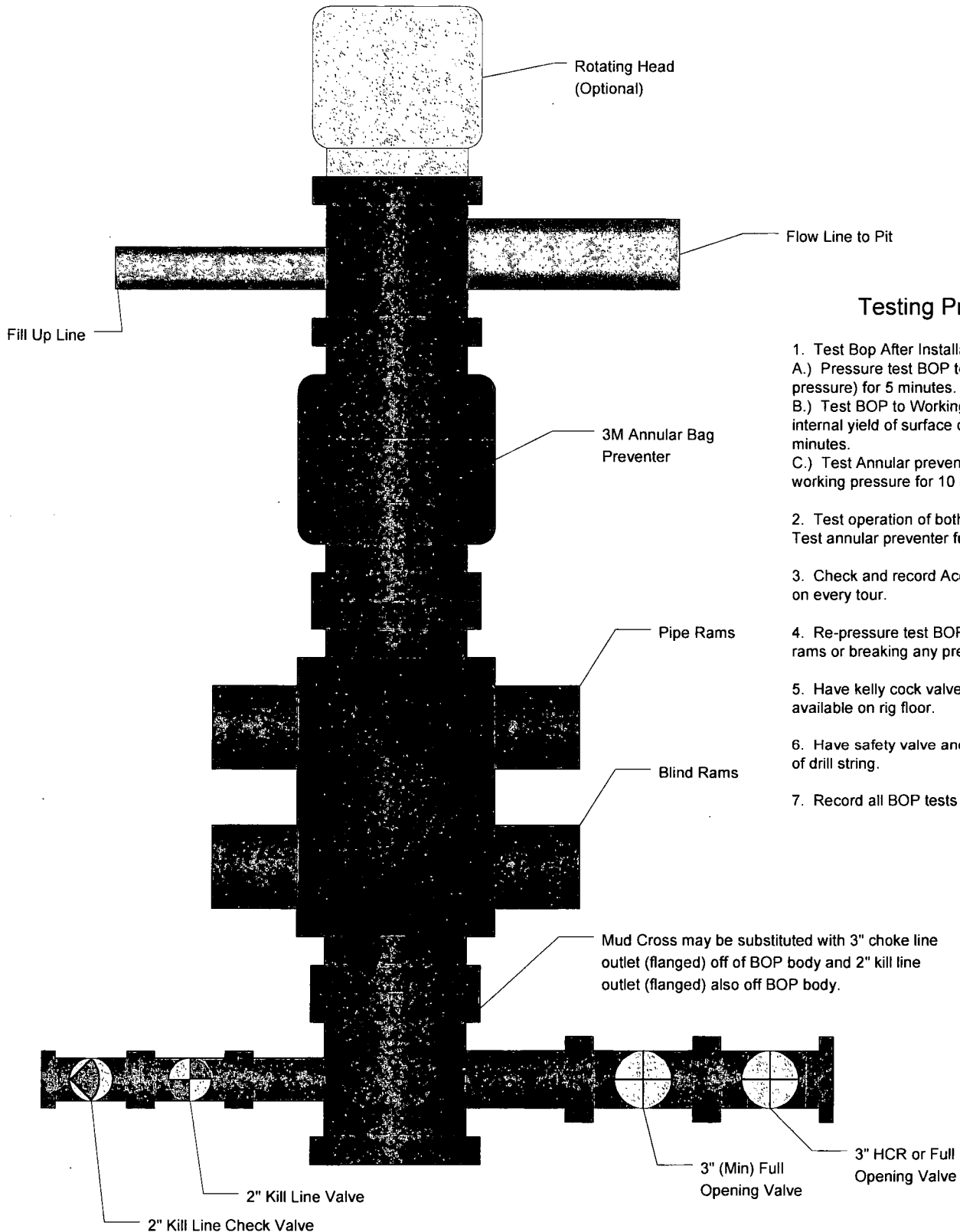
- a. Location (centerline): Starting from a point along an existing road in NWNW Sec 14, T27N, R10W.
- b. Length of new access to be constructed: No new access road will be constructed to gain safe access to the well pad.
- c. Length of existing roads to be upgraded: 0.2 miles from main lease road turnout to well pad will be upgraded to gold book standards.
- d. Maximum total disturbed width: **Typically both existing roads and new access roads require up to 40' of disturbed width in order to obtain a 20' driving surface. If both the road and pipeline are capable of sharing the ROW, then only 50' of disturbed width may be needed.**
- e. Maximum travel surface width: **25' or less**
- f. Maximum grades: **Maximum grades will not exceed 10% after construction.**
- g. Turnouts: **No turnouts are planned. They may be specified in the approved APD.**

XTO Energy		
3M Choke Manifold		



XTO Energy

3M BOP Stack



Testing Procedure

1. Test Bop After Installation:
 - A.) Pressure test BOP to 200-300 psig (low pressure) for 5 minutes.
 - B.) Test BOP to Working pressure or 70% internal yield of surface casing for 10 minutes.
 - C.) Test Annular preventer to 50% of working pressure for 10 minutes.
2. Test operation of both rams on each trip. Test annular preventer function weekly.
3. Check and record Accumulator pressure on every tour.
4. Re-pressure test BOP after changing rams or breaking any pressure tested seal.
5. Have kelly cock valve with handle available on rig floor.
6. Have safety valve and subs to fit all sizes of drill string.
7. Record all BOP tests in IADC book.