

Type or print only

RAILROAD COMMISSION OF TEXAS
Oil and Gas DivisionForm W-2
Rev. 4/1/83

EAG0697

API No. 42-003-38502		7. RRC District No. 08
Oil Well Potential Test, Completion or Recompletion Report, and Log		8. RRC Lease No. 39152
1. FIELD NAME (as per RRC Records or Wildcat) University Block 9 (Devonian)	2. LEASE NAME University Block 9	9. Well No. 8EC
3. OPERATOR'S NAME (Exactly as shown on P-5, Organization Report) XTO ENERGY, INC.		10. County of well site Andrews
4. ADDRESS 200 North Loraine, Suite 800, Midland, TX 79701		11. Purpose of filing
5. If Operator has changed within the last 60 days, name the former operator		Initial Potential <input type="checkbox"/>
6a. Location (Section, Block, and Survey) Sec 14 Blk 9 UL Survey	6b. Distance and direction to nearest town in this county. 8 miles SW from Andrews	Retest <input checked="" type="checkbox"/>
12. If workover or reclass, give former field (with reservoir) & gas ID or oil lease no. FIELD & RESERVOIR	GAS ID or OIL LEASE #	Reclass <input type="checkbox"/>
	Oil - O Gas - G	Well record only <input type="checkbox"/> (explain in Remarks)
13. Type of electric or other log run None Ran	14. Completion or recompletion date 11/9/09	

SECTION I: POTENTIAL TEST DATA

IMPORTANT: Test should be for 24 hours unless otherwise specified in field rules.

15. Date of test 11/11/09	16. No. of hours tested 24 hrs	17. Production method (Flowing, Gas Lift, Jetting, Pumping - Size & Type of pump) 2-1/2x1-1/2x30' RHBC	18. Choke size
19. Production during Test Period Oil - BBLS 293	Gas - MCF 114	Water - BBLS 143	Gas - Oil Ratio 389
20. Calculated 24-Hour Rate Oil - BBLS	Gas - MCF	Water - BBLS	Oil Gravity - API - 60° 42.5
21. Was swab used during this test? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	22. Oil produced prior to test (New & Reworked wells)		23. Injection Gas-Oil Ratio
REMARKS: Kicked off and drilled second sidetracked horizontal open hole from existing vertical hole and recompleted in the same field and reservoir.			

INSTRUCTIONS: File an original and one copy of the completed Form W-2 in the appropriate RRC District Office within 30 days after completing a well and within 10 days after a potential test. If an operator does not properly report the results of a potential test within the 10-day period, the effective date of the allowable assigned to the well will not extend back more than 10 days before the W-2 was received in the District Office. (Statewide Rules 16 and 51) To report a completion or recompletion, fill in both sides of this form. To report a retest, fill in only the front side.

WELL TESTER'S CERTIFICATION I declare under penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I conducted or supervised this test by observation of (a) meter readings or (b) the top and bottom gauges of each tank into which production was run during the test. I further certify that the potential test data shown above is true, correct, and complete, to the best of my knowledge.		
Signature: Well Tester	XTO Energy, Inc. Name of Company	RRC Representative

OPERATOR'S CERTIFICATION I declare under the penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I am authorized to make this report, that this report was prepared by me under my supervision and direction, and that data and facts stated therein are true, correct, and complete, to the best of my knowledge.		
DeeAnn Kemp Typed or printed name of operator's representative	Regulatory Title of Person	Signature
432-620-6724 Telephone: Area Code Number	01 / 07 / 2010 Date: mo. day year	

2nd Lat Sec 13

1267 FNL + 236 FWL

TVD 10.484

MD 12.131

Orig TD
of Vert WB 10.721

SECTION II DATA ON WELL COMPLETION AND LOG (Not Required on Retest)																																									
24. Type of Completion New Well <input type="checkbox"/> Deepening <input type="checkbox"/> Plug Back <input type="checkbox"/> Other <input checked="" type="checkbox"/>					25. Permit to Drill, Plug Back or, Deepen DATE 9/9/09 PERMIT NO. 678503																																				
26. Notice of Intention to Drill this well was filed in Name of XTO Energy Inc.					Rule 37 Exception Water Injection Permit Salt Water Disposal Permit Other																																				
27. Number of producing wells on this lease in this field (reservoir) including this well 62					28. Total number of acres in this lease 4819.5																																				
29. Date Plug Back, Deepening, Workover or Drilling Operations: Commenced 9/25/09 Completed 11/11/09					30. Distance to nearest well. Same Lease & Reservoir 900'																																				
31. Location of well, relative to nearest lease boundaries of lease on which this well is located 4159 Feet from North Line and 5648 Feet from NE Line of the University Block 9 Lease					32. Elevation (DF, RKB, RT, GR, ETC.) 3151' GL																																				
33. Was directional survey made other than inclination (W-12)? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No					34. Top of Pay 10370' TVD 35. Total Depth 10469' TVD 36. P. B. Depth 10469' TVD 37. Surface Casing Determined by: Field Rules <input type="checkbox"/> Recommendation of T.D.W.R. Railroad Commission (Special) <input checked="" type="checkbox"/>																																				
38. Is well multiple completion? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No					39. If multiple completion, list all reservoir names (completions in this well) and Oil Lease or Gas ID No. FIELD & RESERVOIR																																				
40. Intervals Drilled by: <input checked="" type="checkbox"/> Rotary Tools <input type="checkbox"/> Cable Tools					41. Name of Drilling Contractor Key																																				
42. Is Cementing Affidavit Attached? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No					43. CASING RECORD (Report All Strings Set in Well)																																				
<table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th>CASING SIZE</th> <th>WT #/FT.</th> <th>DEPTH SET</th> <th>MULTISTAGE TOOL DEPTH</th> <th>TYPE & AMOUNT CEMENT (sacks)</th> <th>HOLE SIZE</th> <th>TOP OF CEMENT</th> <th>SLURRY VOL. cu. ft.</th> </tr> </thead> <tbody> <tr> <td>13-3/8"</td> <td>48#</td> <td>312'</td> <td></td> <td>375 SXS</td> <td>17-1/2"</td> <td>Surf</td> <td>502</td> </tr> <tr> <td>8-5/8"</td> <td>32#</td> <td>5203'</td> <td>1750</td> <td>1060/815 SXS</td> <td>12-1/4"</td> <td>Surf</td> <td>2113</td> </tr> <tr> <td>5-1/2"</td> <td>17/20#</td> <td>10721'</td> <td>8032'</td> <td>725/665 SXS</td> <td>7-7/8"</td> <td>3240'</td> <td>1457</td> </tr> </tbody> </table>										CASING SIZE	WT #/FT.	DEPTH SET	MULTISTAGE TOOL DEPTH	TYPE & AMOUNT CEMENT (sacks)	HOLE SIZE	TOP OF CEMENT	SLURRY VOL. cu. ft.	13-3/8"	48#	312'		375 SXS	17-1/2"	Surf	502	8-5/8"	32#	5203'	1750	1060/815 SXS	12-1/4"	Surf	2113	5-1/2"	17/20#	10721'	8032'	725/665 SXS	7-7/8"	3240'	1457
CASING SIZE	WT #/FT.	DEPTH SET	MULTISTAGE TOOL DEPTH	TYPE & AMOUNT CEMENT (sacks)	HOLE SIZE	TOP OF CEMENT	SLURRY VOL. cu. ft.																																		
13-3/8"	48#	312'		375 SXS	17-1/2"	Surf	502																																		
8-5/8"	32#	5203'	1750	1060/815 SXS	12-1/4"	Surf	2113																																		
5-1/2"	17/20#	10721'	8032'	725/665 SXS	7-7/8"	3240'	1457																																		
44. LINER RECORD																																									
<table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th>Size</th> <th>TOP</th> <th>Bottom</th> <th>Sacks Cement</th> <th>Screen</th> </tr> </thead> <tbody> <tr> <td> </td> <td> </td> <td> </td> <td> </td> <td> </td> </tr> </tbody> </table>										Size	TOP	Bottom	Sacks Cement	Screen																											
Size	TOP	Bottom	Sacks Cement	Screen																																					
45. TUBING RECORD																																									
<table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th>Size</th> <th>Depth Set</th> <th>Packer Set</th> <th>From</th> <th>To</th> </tr> </thead> <tbody> <tr> <td>2-7/8"</td> <td>10668' MD</td> <td>None</td> <td>10389 MD</td> <td>10660 MD Vert Perfs</td> </tr> <tr> <td> </td> <td> </td> <td> </td> <td>10370' TVD *</td> <td>10516' TVD 1st later</td> </tr> <tr> <td> </td> <td> </td> <td> </td> <td>10370' TVD *</td> <td>10469 TVD 2nd later</td> </tr> <tr> <td> </td> <td> </td> <td> </td> <td>*Open Hole lateral</td> <td> </td> </tr> </tbody> </table>										Size	Depth Set	Packer Set	From	To	2-7/8"	10668' MD	None	10389 MD	10660 MD Vert Perfs				10370' TVD *	10516' TVD 1st later				10370' TVD *	10469 TVD 2nd later				*Open Hole lateral								
Size	Depth Set	Packer Set	From	To																																					
2-7/8"	10668' MD	None	10389 MD	10660 MD Vert Perfs																																					
			10370' TVD *	10516' TVD 1st later																																					
			10370' TVD *	10469 TVD 2nd later																																					
			*Open Hole lateral																																						
46. Producing Interval (this completion) Indicate depth of perforation or open hole																																									
47. ACID, SHOT, FRACTURE, CEMENT SQUEEZE, ETC.																																									
<table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th>Depth Interval</th> <th>Amount and Kind of Material Used</th> </tr> </thead> <tbody> <tr> <td>10370' - 10469' TVD 2nd lateral</td> <td>Acidz 15000 g. emulsified acid & 8000 g. 15% HCL</td> </tr> <tr> <td> </td> <td>Acidz 12000 g. emulsified acid/6000 g. 15% HCL</td> </tr> <tr> <td> </td> <td>Acidz 12000 g. emulsified acid/6000 g. 15% HCL</td> </tr> <tr> <td> </td> <td>Acidz 12000 g. emulsified acid/6000 g. 15% HCL</td> </tr> </tbody> </table>										Depth Interval	Amount and Kind of Material Used	10370' - 10469' TVD 2nd lateral	Acidz 15000 g. emulsified acid & 8000 g. 15% HCL		Acidz 12000 g. emulsified acid/6000 g. 15% HCL		Acidz 12000 g. emulsified acid/6000 g. 15% HCL		Acidz 12000 g. emulsified acid/6000 g. 15% HCL																						
Depth Interval	Amount and Kind of Material Used																																								
10370' - 10469' TVD 2nd lateral	Acidz 15000 g. emulsified acid & 8000 g. 15% HCL																																								
	Acidz 12000 g. emulsified acid/6000 g. 15% HCL																																								
	Acidz 12000 g. emulsified acid/6000 g. 15% HCL																																								
	Acidz 12000 g. emulsified acid/6000 g. 15% HCL																																								
48. FORMATION RECORD (LIST DEPTHS OF PRINCIPAL GEOLOGICAL MARKERS AND FORMATION TOPS)																																									
<table border="1" style="width:100%; border-collapse: collapse;"> <thead> <tr> <th>Formations</th> <th>Depth</th> <th>Formations</th> <th>Depth</th> </tr> </thead> <tbody> <tr> <td>Mississippian</td> <td>9941' TVD</td> <td> </td> <td> </td> </tr> <tr> <td>Woodford</td> <td>10299' TVD</td> <td> </td> <td> </td> </tr> <tr> <td>Devonian</td> <td>10370' TVD</td> <td> </td> <td> </td> </tr> </tbody> </table>										Formations	Depth	Formations	Depth	Mississippian	9941' TVD			Woodford	10299' TVD			Devonian	10370' TVD																		
Formations	Depth	Formations	Depth																																						
Mississippian	9941' TVD																																								
Woodford	10299' TVD																																								
Devonian	10370' TVD																																								
REMARKS Lateral OH starts at 10174' TVD in the Mississippian which is non-productive of oil/gas. Lateral OH also crosses Woodford zone which is non-productive of oil/gas. Top of pay zone is at 10370' TVD which is top of Devonian.																																									



DEPTH OF USABLE-QUALITY GROUND WATER TO BE PROTECTED

Date: February 17, 2009

TCEQ File No.: SC- 12993

API Number	00338502
------------	----------

RRC Lease No.	000000
---------------	--------

Attention: **SORINA FLORES**

SC 945936 00338502 000000 12993.pdf

XTO ENERGY INC
200 N LORAIN ST
STE 800
MIDLAND TX 79701

P-5# 945936

--Measured--

1502 ft FEL

1450 ft FNL

MRL: SURVEY

Digital Map Location:

X-coord/Long	435187
--------------	--------

Y-coord/Lat	232500
-------------	--------

Datum	27	Zone	NC
-------	----	------	----

County **ANDREWS**

Lease & Well No. UNIVERSITY 9 CEC #8H

Purpose	RE
---------	----

Location	SUR-UL,BLK-9,SEC-14,--[TD=10650],[RRC 8],
----------	---

To protect usable-quality ground water at this location, the Texas Commission on Environmental Quality recommends:

The interval from the land surface to a depth of 250 feet and the ZONE from 1300 feet to 1700 feet must be protected.

Note: Unless stated otherwise, this recommendation is intended to apply only to the subject well and not for area-wide use. Approval of the well completion methods for protection of this groundwater falls under the jurisdiction of the Railroad Commission of Texas. This recommendation is intended for normal drilling, production, and plugging operations only. It does not apply to saltwater disposal operation into a nonproductive zone (BRC Form W-14).

If you have any questions, please contact us at 512-239-0515, sc@tceq.state.tx.us, or by mail MC-151.

Sincerely,

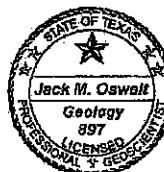
[Signature]

Digitally signed by Jack M. Condit
DN: c=US, st=Texas, o=Austin, ou=Surface Casting,
ou=Texas Commission on Environmental Quality,
cn=Jack M Condit, email=jcondit@tcq.state.tx.us
Date: 2008.02.27 09:29:24 -0600

Jack M. Oswalt, P.G.

Geologist, Surface Casing Team
Waste Permits Division

GEOLOGIST SEAL



The seal appearing on this document was authorized by Jack M. Oswat on 2/17/2009
Note: Alteration of this electronic document will invalidate the digital signature.

TCEQ Form-0051R
Rev. 9/9/2008

P.O. Box 13087 Austin, Texas 78711-3087

512-239-1000

Internet address: www.tceq.state.tx.us

RAILROAD COMMISSION OF TEXAS

Oil and Gas Division

Please Read Instructions

ELECTRIC LOG
STATUS REPORT

FORM L-1

Rev. 01/02

EAG0402

INSTRUCTIONS

When to file the L-1

- with Forms G-1, W-2, and GT-1 for new and deepened gas, oil, and geothermal wells
- with Form W-3 for plugged dry holes
- when sending in a log which was held under a request for confidentiality and the period of confidentiality has not yet expired

When the L-1 is NOT required

- with Forms W-2, G-1, and GT-1 filed for injection wells, disposal wells, water supply wells, service wells, re-test wells, re-classifications, and plugbacks of oil, gas, and geothermal wells
- with Form W-3 for plugging of other than a dry hole

Where to file the L-1

- with the appropriate Commission district office

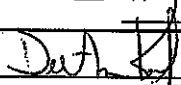
Filling out the L-1

- Section I and the signature section must be filled out for all wells
- complete only the appropriate part of Section II

Type of log required

- any wireline survey run for the purpose of obtaining lithology, porosity, or resistivity information
- no more than one such log is required but it must be of the subject well
- if such a log is NOT run on the subject well, do NOT substitute any other type of log; just select Section II, Part A below

SEE REVERSE SIDE

SECTION I. IDENTIFICATION		
Operator Name XTO Energy, Inc.	District No. 08	Completion Date 11/9/09
Field Name University Block 9 (Devonian)	Drilling Permit No. 678503	
Lease Name University Block 9	Lease/ID No. 39152	Well No. 8EC
County Andrews	API No. 42-003-38502	
SECTION II. LOG STATUS (complete either A. or B.)		
<input checked="checked" type="checkbox"/> A. BASIC ELECTRIC LOG NOT RUN		
<input type="checkbox"/> B. BASIC ELECTRIC LOG RUN (select one)		
<input type="checkbox"/> 1. Confidentiality is requested and a copy of the header for each log that has been run on the well is attached.		
<input type="checkbox"/> 2. Confidentiality already granted on basic electric log covering this interval (applicable to deepened wells only).		
<input type="checkbox"/> 3. Basic electric log covering this interval already on file with Commission (applicable to deepened wells only).		
<input type="checkbox"/> 4. Log attached to (select one)		
<input type="checkbox"/> (a) Form L-1 (this form). If the company/lease name on log is different from that shown in Section I, please enter name on log here: _____ Check here if attached log is being submitted after being held confidential <input type="checkbox"/>		
<input type="checkbox"/> (b) Form P-7, Application for Discovery Allowable and New Field Designation.		
<input type="checkbox"/> (c) Form W-4, Application for Multiple Completion: lease or ID no.(s) _____, well no.(s) _____		
 signature		Regulatory title
DeeAnn Kemp name (print)	432 620-6724 phone	1/07/10 date
For Railroad Commission use only		

gyro/data

Gyrodata Incorporated
3811 S. Co. Rd. 1285
Odessa, TX. 79765

432/561-8458
Fax: 432/563-7982

Date: October 23, 2009

XTO Energy
200 N. Loraine St.
Midland, Texas 79701

Attn: Regulatory Dept.

Re: University Block 9 Well No. 8EC
Andrews County, Texas

Please find enclosed a copy of the information filed with the Railroad
Commission on the above referenced well.

If any additional information is required, please feel free to contact me.

Sincerely,


Jeri Turnlin
Operations

Enclosure

Serving the Worldwide Energy Industry with Precision Survey Instrumentation

gyrodata

Gyrodata Incorporated
3811 S. Co. Rd. 1285
Odessa, TX. 79765

432/561-8458
Fax: 432/563-7982

Date: November 16, 2009

Railroad Commission of Texas
Oil & Gas Division
P.O. Box 12967
Capitol Station
Austin, Texas 78711

Attn: Ms. Pam Johns

RE:
XTO Energy
University Block 9 Well No. 8EC
RRC Lease/Gas ID No. Not Assigned
University Block 9 (Devonian)
University Lands, Abstract not given
Andrews County, Texas
API No. 42-003-38502
CERTIFIED MAIL 7009082000119774461

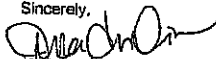
Ms. Johns,

Enclosed, please find the original and one copy of the survey performed on the referenced well by Gyrodata, Inc. (P-5 No. 339711). Other information required by your office is as follows:

Name & Title Of Surveyor	Drainhole Number	Surveyed Depths	Dates Performed	Type of Survey
Wesley Vessell Surveyor	Original Hole	10271' - 12131'	10/30/09	Magnetic Gyroscopic

A certified plat on which the bottom hole location is oriented both to the surface location and to the lease lines (or unit lines in the case of pooling) is attached to the survey report. If any other information is required, please contact the undersigned at the letterhead address and phone number.

Sincerely,


Jerra Tumlin
Operations
Enclosure

Serving the Work-

Industry with Quality Survey Instrumentation

A Gyrodata Directional Survey

for

XTO ENERGY

Lease: University Land Block 9 Well: 8EC,
Location: Key #36, Andrews County, Texas

Job Number: M090901STW197

Run Date: 10/30/2009 1:33:10 PM

Surveyor: Thomas Shatwell; Chris Ray; Jeremy Tapp; Wesley Vessell

Survey Latitude: 0 deg 0 min 0 sec deg. N

A Gyrodata Directional Survey

XTO Energy
 Lease: University Land Block 9 Well: REC
 Location: Key #36, Andrews County, Texas
 Job Number: MD0908STW197

MEASURED DEPTH feet	INCL deg.	AZIMUTH deg.	VERTICAL SECTION feet	DOGLEG SEVERITY deg/ 100 ft.	VERTICAL DEPTH feet	CLOSURE DIST. AZIMUTH feet deg.	HORIZONTAL COORDINATES feet
10180.00	1.27	203.04	-18.2	0.00	10179.16	25.6 205.4	23.13 S 10.99 W
10271 FT TO 12131 FT MAGNETIC MULTISHOT SURVEY							
ALL MEASURED DEPTHS AND COORDINATES REFERENCED TO KEY # 36							
file in provided by pathfinder job # 101069006							
10271.00	15.20	72.90	-6.9	17.63	10269.15	20.5 179.7	20.53 S 0.09 E
10286.00	17.20	74.50	-2.7	13.66	10283.55	19.8 168.0	19.36 S 4.11 E
10302.00	19.90	76.50	2.4	17.35	10298.72	20.2 153.5	18.09 S 9.04 E
10317.00	23.10	74.70	7.8	21.78	10312.67	22.0 139.3	16.72 S 14.36 E
10334.00	25.40	73.30	14.8	13.94	10328.17	25.7 125.1	14.79 S 21.07 E
10349.00	28.60	72.10	21.6	21.64	10341.53	30.4 114.8	12.76 S 27.57 E
10365.00	29.20	71.80	29.3	3.86	10355.54	36.4 106.5	10.37 S 34.52 E
10380.00	31.20	71.20	36.9	13.48	10368.51	42.8 100.7	7.97 S 42.07 E
10397.00	34.50	71.20	46.1	19.41	10382.78	51.0 95.6	5.00 S 50.80 E
10412.00	38.30	72.00	55.0	25.53	10394.86	59.3 92.1	2.20 S 59.25 E
10428.00	41.60	72.40	65.3	20.69	10407.12	69.0 89.2	0.94 N 69.03 E
10443.00	45.80	72.70	75.6	28.03	10417.96	79.0 87.1	4.05 N 78.91 E
10460.00	49.50	72.40	88.2	21.80	10429.41	91.2 85.1	7.82 N 90.90 E
10475.00	53.70	72.10	99.9	28.04	10438.73	102.7 83.6	11.40 N 102.09 E
10491.00	57.30	72.10	113.1	22.50	10447.79	115.7 82.3	15.45 N 114.63 E
10506.00	61.40	71.20	126.0	27.82	10453.43	128.4 81.3	19.52 N 126.88 E
10523.00	65.00	70.00	141.2	22.09	10463.10	143.3 80.1	24.56 N 141.19 E
10538.00	69.40	69.90	155.0	29.34	10468.91	156.9 79.2	29.30 N 154.17 E
10555.00	73.20	70.50	171.1	22.60	10474.36	172.9 78.4	34.75 N 169.32 E

A Gyrodata Directional Survey

XTO Energy
 Lease: University Land Block 9 Well-88C
 Location: Key #36, Andrews County, Texas
 Job Number: MD0909ESTW197

MEASURED DEPTH feet	INCL deg.	CL deg.	VERTICAL SECTION feet	DOGLEG SEVERITY deg./ 100 ft.	VERTICAL DEPTH feet	CLOSURE DIST, AZIMUTH feet deg.	HORIZONTAL COORDINATES feet
10570.00	77.30	71.00	185.6	27.52	10478.18	187.2 77.8	39.53 N 133.01 E
10586.00	81.20	71.50	201.3	24.57	10481.16	202.9 77.3	44.58 N 197.90 E
10601.00	86.00	72.40	216.2	32.55	10482.83	217.7 76.9	49.20 N 212.07 E
10617.00	89.10	71.70	232.2	19.86	10483.52	233.6 76.6	54.13 N 227.27 E
10632.00	90.40	71.50	247.2	8.77	10483.58	248.6 76.3	58.86 N 241.50 E
10648.00	90.50	72.30	263.2	5.04	10483.46	264.5 76.0	63.83 N 256.71 E
10660.00	90.10	72.80	295.1	2.00	10483.29	296.5 75.7	73.43 N 287.24 E
10711.00	89.90	73.30	326.1	1.74	10483.29	327.4 75.4	82.46 N 316.89 E
10742.00	89.80	73.50	357.0	0.72	10483.37	358.4 75.2	91.32 N 346.60 E
10774.00	90.90	69.70	389.0	12.36	10483.17	390.4 74.9	101.42 N 376.96 E
10805.00	90.80	69.20	420.0	1.64	10482.71	421.2 74.5	112.30 N 405.98 E
10837.00	90.90	69.50	452.0	0.99	10482.24	453.1 74.3	123.58 N 435.92 E
10868.00	90.70	69.30	483.0	0.91	10481.81	484.0 73.9	134.49 N 464.94 E
10900.00	91.10	69.60	515.0	1.56	10481.30	515.9 73.6	145.72 N 494.90 E
10931.00	91.10	71.00	546.0	4.52	10480.71	546.8 73.4	156.17 N 524.08 E
10963.00	91.00	70.90	578.0	0.44	10480.12	578.8 73.3	166.61 N 554.32 E
10995.00	90.80	71.10	610.0	0.88	10479.62	610.8 73.2	177.05 N 584.57 E
11026.00	90.70	71.00	641.0	0.46	10479.21	641.8 73.1	187.09 N 613.89 E
11058.00	90.40	70.90	673.0	0.99	10478.91	673.7 73.0	197.54 N 644.13 E
11089.00	90.60	68.50	704.0	7.77	10478.64	704.7 72.8	208.29 N 673.21 E
11121.00	90.20	68.70	736.0	1.40	10478.41	736.6 72.6	219.97 N 703.00 E
11153.00	90.30	68.70	767.9	0.31	10478.27	768.5 72.5	231.59 N 732.81 E
11184.00	90.20	68.40	798.9	1.02	10478.14	799.5 72.3	242.93 N 761.66 E
11216.00	90.50	68.40	830.9	0.31	10478.00	831.4 72.2	254.71 N 791.42 E

A Gyrodata Directional Survey

XTO Energy
 Lease: University Land Block 9 Well: 88C
 Location: Key #36, Andrews County, Texas
 Job Number: MD090BESTW197

MEASURED DEPTH feet	INCL deg.	AZIMUTH deg.	VERTICAL SECTION feet	DOGLEG SEVERITY deg/ 100 ft.	VERTICAL DEPTH feet	CLOSURE DIST. AZIMUTH feet deg.	HORIZONTAL COORDINATES feet
11246.00	90.50	68.40	860.9	0.67	10477.79	861.3 72.0	265.75 N 819.31 E
11277.00	90.50	68.00	891.9	1.29	10477.52	892.3 71.9	277.26 N 848.09 E
11308.00	92.40	68.30	922.8	6.20	10476.73	923.2 71.8	288.80 N 876.83 E
11340.00	92.80	68.30	954.8	1.25	10475.28	955.1 71.7	300.62 N 906.56 E
11371.00	93.10	68.40	985.7	1.02	10473.69	986.0 71.6	312.04 N 935.33 E
11403.00	91.20	68.50	1017.7	5.95	10472.49	1017.9 71.5	323.78 N 965.07 E
11434.00	90.80	68.30	1048.7	1.44	10471.95	1048.9 71.4	335.19 N 993.89 E
11466.00	90.50	67.70	1080.7	2.10	10471.58	1080.8 71.3	347.18 N 1023.56 E
11497.00	90.60	67.60	1111.6	0.46	10471.28	1111.8 71.2	358.97 N 1052.23 E
11528.00	90.20	67.60	1142.6	1.29	10471.07	1142.7 71.1	370.78 N 1080.89 E
11560.00	90.40	67.30	1174.6	1.13	10470.90	1174.7 71.0	383.03 N 1110.44 E
11592.00	90.60	67.40	1206.5	0.70	10470.62	1206.6 70.9	395.37 N 1139.97 E
11623.00	90.80	67.60	1237.5	0.91	10470.24	1237.5 70.8	407.24 N 1168.61 E
11654.00	90.70	67.40	1268.4	0.72	10469.84	1268.5 70.7	419.10 N 1197.25 E
11686.00	90.90	67.60	1300.4	0.88	10469.39	1300.4 70.6	431.34 N 1226.81 E
11717.00	90.70	67.30	1331.3	1.16	10468.96	1331.4 70.6	443.23 N 1255.44 E
11749.00	90.70	67.50	1363.3	0.62	10468.57	1363.3 70.5	455.53 N 1284.98 E
11780.00	90.50	67.50	1394.3	0.65	10468.24	1394.3 70.4	467.39 N 1313.62 E
11811.00	90.30	67.80	1425.3	0.97	10467.97	1425.3 70.4	479.18 N 1342.29 E
11843.00	90.40	67.90	1457.2	0.44	10467.72	1457.2 70.3	491.24 N 1371.92 E
11875.00	90.20	68.60	1489.2	2.28	10467.55	1489.2 70.3	503.10 N 1401.64 E
11906.00	90.30	68.20	1520.2	1.33	10467.42	1520.2 70.2	514.51 N 1430.47 E
11937.00	89.90	68.20	1551.2	1.29	10467.36	1551.2 70.2	526.02 N 1459.25 E
11969.00	89.50	68.90	1583.2	2.52	10467.33	1583.2 70.1	537.73 N 1489.03 E

A Gyrodata Directional Survey

XTO Energy
 Lease: University Land Block 9 Well: 8EC
 Location: Key #36, Andrews County, Texas
 Job Number: MID0909ESTW197

MEASURED DEPTH feet	INCL deg.	AZMUTH deg.	VERTICAL SECTION feet	DOGLEG SEVERITY deg./ 100 ft.	VERTICAL DEPTH feet	CLOSURE DIST. AZMUTH feet deg.	HORIZONTAL COORDINATES feet
12000.00	89.50	68.40	1614.1	1.61	10467.80	1614.1 70.1	549.01 N 1317.90 E
12032.00	89.40	68.70	1646.1	0.59	10468.11	1646.1 70.1	560.71 N 1347.69 E
12064.00	89.30	68.30	1678.1	1.29	10468.47	1678.1 70.1	572.44 N 1377.46 E
12093.00	89.20	68.40	1707.1	0.49	10468.85	1707.1 70.0	583.14 N 1604.41 E
12131.00	89.20	68.40	1745.1	0.00	10469.38	1745.1 70.0	597.13 N 1639.74 E

Final Station Closure: Distance: 1745.08 ft Az: 69.99 deg.


gyrodata

Gyrodata Incorporated
3811 S. Co. Rd. 1285
Odessa, TX, 79765

432/561-8458
Fax: 432/563-7982

State of Texas
County of Harris

I, Jena Tumlin, certify that; I am employed by Gyrodata Inc.; that I am authorized and qualified to review the magnetic Gyroscopic Multishot survey from a depth of 10271 feet to a depth of 12131 feet conducted on the day(s) of 10/30/09 through 10/30/09; that this survey was conducted at the request of XTO Energy for the University Block 9 Well No. 8EC API No. 42-003-38602 in Andrews County, Texas; that the data is true, correct, complete, and within the limitations of the tool as set forth by Gyrodata Inc; that I am authorized and qualified to make this report; and that I have reviewed this report and find that it conforms to the principles and procedures as set forth by Gyrodata Inc.



Jena Tumlin
Operations

Serving the Work

Industry

Survey Instrumentation

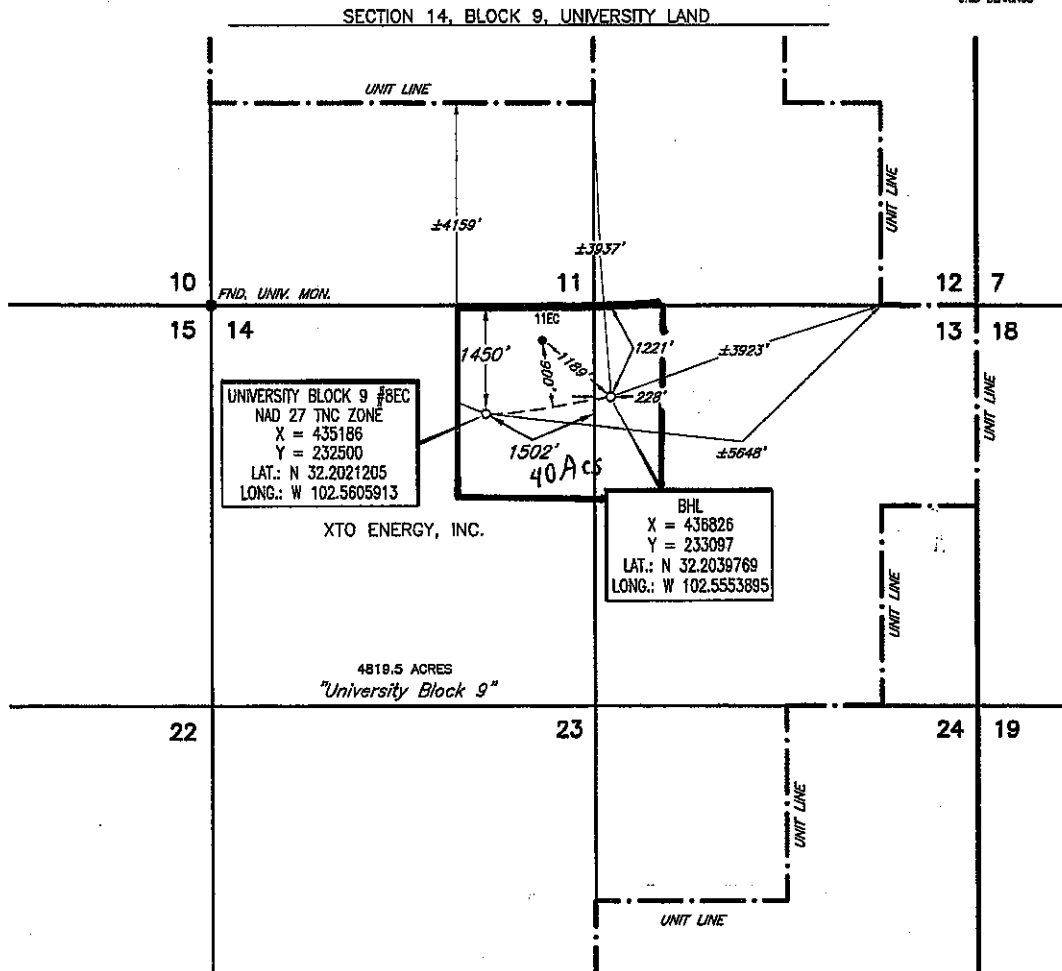
TOPOGRAPHIC

SURVEYING • MAPPING • GIS • GPS
2903 N. BIG SPRING • MIDLAND, TEXAS 79705
TELEPHONE: (432) 682-1553 (800) 767-1853 • FAX (432) 682-1743

"AS-DRILLED"

ANDREWS County, Texas
SHL: 1450' FNL & 1502' FEL
Description BHL: 1221' FNL & 228' FWL (SEC. 13)

NAD 27
GRID BEARINGS



SCALE: 1" = 2000'
0' 1000' 2000'

AS-DRILLED INFORMATION PROVIDED
BY XTO ENERGY, INC.

This location has been very carefully staked on the ground according to the best official survey records, maps, and other data available to us. This plat does not in any way represent a "Boundary Survey", and does not comply with correct T.S.P.L.S. Minimum Standards of Procedures for Boundary Surveys.

Operator

XTO
ENERGY, INC.

Date Staked MAY 1, 2009

Lease Name & Well No. UNIVERSITY BLOCK 9 #8EC

Ground Elev. 3151' Reference Stakes or NONE

Alternate Location

Good Drill Site? YES Stakes Set ±8.0 MILES SOUTHWEST OF ANDREWS, TEXAS

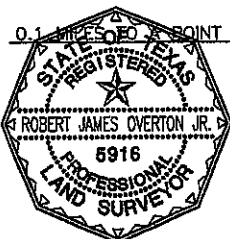
Topography & Vegetation EXISTING WELL PAD

Best Accessibility to Location FROM LEASE ROAD ±150' WEST OF THE LOCATION

Distance & Direction
from Hwy Jct. or Town FROM THE JCT. OF U.S. HWY. 385 & COUNTY ROAD 5900, GO WEST 3.1 ON

COUNTY ROAD 5900, THENCE NORTH 0.6 MILES ON LEASE ROAD, THENCE WEST 0.5 MILES, THENCE SOUTH

0.1 MILES SOUTHWEST POINT ±150' WEST OF LOCATION.



CERTIFICATION:

I, Robert J. Overton, Jr., a Registered Professional Land Surveyor, and an authorized agent of Topographic Land Surveyors, do hereby certify that in my professional opinion the above described well location was surveyed and staked on the ground as shown. This plat is for Texas Railroad Commission permitting only.

Robert J. Overton Jr.

Texas Reg. No.

5916

Invoice # 150172/726NE
E.U.O.
REVISED: 10/29/09; EVO



XTO

Andrews County
University Block 9
#8EC
OH

Survey: MWD #1

Pathfinder X & Y Survey Report

05 October, 2009

PATHFINDER



Pathfinder Energy Services
Pathfinder X & Y Survey Report



Company: XTO
Project: Andrews County
Site: University Block 9
Well: #8EC
Wellbore: OH
Design: OH

Local Co-ordinate Reference:
TVD Reference: WELL @ 3163.00ft (Key #36)
MD Reference: WELL @ 3163.00ft (Key #36)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Midland Database

Project		Andrews County	
Map System:	US State Plane 1927 (Exact solution)		
Geo Datum:	NAD 1927 (NADCON CONUS)		
Map Zone:	Texas North Central 4202		
Site			
Site Position:	University Block 9		
From:	Map		
Position Uncertainty:	0.00 ft		
Northing: 230,644,000 ft			
Easting: 434,089,000 ft			
Slot Radius: "			
Latitude: 32° 11' 48.767 N			
Longitude: 102° 33' 49.844 W			
Grid Convergence: -2.76°			
Well			
Well Position	+N/-S	0.00 ft	32° 12' 7.635 N
	+E/-W	0.00 ft	102° 33' 38.133 W
Position Uncertainty	0.00 ft		Ground Level: 3,151.00 ft
Wellbore			
OH			
Magnetics	Model Name	Sample Date	Field Strength
	IGRF200510	08/31/2009	(nT) 48,922
Declination (°) 7.31			
Dip Angle (°) 60.40			
Tie On Depth: 0.00			
Phase: ACTUAL			
Audit Notes:	OH		
Version:	1.0	Depth From (TVD) (ft)	Direction (°)
Vertical Section:		+N/-S (ft) 0.00	+E/-W (ft) 0.00
		0.00	70.17



Pathfinder Energy Services

Pathfinder X & Y Survey Report

**Company:**

XTO
Andrews County
University Block 9
#8EC
OH
OH

Project:

XTO
Andrews County
University Block 9
#8EC
OH
OH

Site:

XTO
Andrews County
University Block 9
#8EC
OH
OH

Well:

XTO
Andrews County
University Block 9
#8EC
OH
OH

Wellbore:

XTO
Andrews County
University Block 9
#8EC
OH
OH

Design:

XTO
Andrews County
University Block 9
#8EC
OH
OH

Local Co-ordinate Reference:

Well #8EC
TVD Reference:
MD Reference:
North Reference:
Survey Calculation Method:
Database:

WELL @ 3163.00ft (Key #36)
WELL @ 3163.00ft (Key #36)
Grid
Minimum Curvature
Midland Database

Survey Program		Date	10/05/2009	
From (ft)	To (ft)	Survey (Wellbore)		
100.00	10,180.00	Baker Inteq Surveys (OH)		
10,271.00	12,131.00	MWD #1 (OH)		
		Tool Name	Description	
		MWD	MWD - Standard	
		MWD	MWD - Standard	

Survey		MD (ft)	Inc (°)	Azi (°)	TVD (ft)	TVDSS (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLeg (°/100ft)	Northing (ft)	Easting (ft)
		10,180.00	1.27	203.04	10,179.16	7,016.16	-23.13	-10.99	-18.18	0.00	232,476.87	435,175.01
		10,271.00	15.20	72.90	10,269.14	7,106.14	-20.53	0.09	-6.88	17.64	232,479.47	435,186.09
		10,286.00	17.20	74.50	10,283.54	7,120.54	-19.36	4.11	-2.70	13.66	232,480.64	435,190.11
		10,302.00	19.90	76.50	10,298.71	7,135.71	-18.09	9.04	2.36	17.33	232,481.91	435,195.04
		10,317.00	23.10	74.70	10,312.67	7,149.67	-16.72	14.36	7.84	21.78	232,483.28	435,200.36
		10,334.00	25.40	73.30	10,328.17	7,165.17	-14.79	21.07	14.80	13.94	232,485.21	435,207.07
		10,349.00	28.60	72.10	10,341.53	7,178.53	-12.76	27.57	21.60	21.64	232,487.24	435,213.57
		10,365.00	29.20	71.80	10,355.54	7,192.54	-10.37	34.92	29.33	3.86	232,489.63	435,220.92
		10,380.00	31.20	71.20	10,368.50	7,205.50	-7.97	42.08	36.88	13.48	232,492.03	435,228.08
		10,397.00	34.50	71.20	10,382.78	7,219.78	-5.00	50.80	46.10	19.41	232,495.00	435,236.80
		10,412.00	38.30	72.00	10,394.85	7,231.85	-2.20	59.25	54.99	25.53	232,497.80	435,245.25
		10,428.00	41.60	72.40	10,407.12	7,244.12	0.94	69.03	65.26	20.69	232,500.94	435,255.03
		10,443.00	45.80	72.70	10,417.96	7,254.96	4.05	78.92	75.61	28.03	232,504.05	435,264.92
		10,460.00	49.50	72.40	10,429.41	7,266.41	7.82	90.90	88.16	21.80	232,507.82	435,276.90
		10,475.00	53.70	72.10	10,438.72	7,275.72	11.40	102.09	99.91	28.04	232,511.40	435,288.09
		10,491.00	57.30	72.10	10,447.78	7,284.78	15.45	114.64	113.08	22.50	232,515.45	435,300.64
		10,506.00	61.40	71.20	10,455.43	7,292.43	19.52	126.88	125.98	27.82	232,519.52	435,312.88
		10,523.00	65.00	70.00	10,463.09	7,300.09	24.56	141.19	141.15	22.09	232,524.56	435,327.19
		10,538.00	69.40	69.90	10,468.90	7,305.90	29.30	154.18	154.97	29.34	232,529.30	435,340.18
		10,555.00	73.20	70.50	10,474.35	7,311.35	34.75	169.33	171.07	22.60	232,534.75	435,355.33
		10,570.00	77.30	71.00	10,478.17	7,315.17	39.53	183.02	185.58	27.52	232,539.53	435,369.02



Pathfinder Energy Services

Pathfinder X & Y Survey Report



Company: XTO
Project: Andrews County
University Block 9
Site: #8EC
Well: OH
Wellbore: OH
Design: OH

Local Co-ordinate Reference:
TVD Reference: Well @ 3163.00ft (Key #36)
MD Reference: Well @ 3163.00ft (Key #36)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Midland Database

Well #8EC

WELL @ 3163.00ft (Key #36)

WELL @ 3163.00ft (Key #36)

Grid

Minimum Curvature

Midland Database

Survey

MD (ft)	Inc (°)	Azi (°)	TVD (ft)	TVDSS (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLeg (°/100ft)	Northing (ft)	Easting (ft)
10,586.00	81.20	71.50	10,481.16	7,318.16	44.58	197.90	201.29	24.57	232,544.58	435,383.90
10,601.00	86.00	72.40	10,482.83	7,319.83	49.20	212.07	216.18	32.55	232,549.20	435,398.07
10,617.00	89.10	71.70	10,483.51	7,320.51	54.13	227.27	232.16	19.86	232,554.13	435,413.27
10,632.00	90.40	71.50	10,483.58	7,320.58	58.86	241.51	247.15	8.77	232,558.86	435,427.51
10,648.00	90.50	72.30	10,483.45	7,320.45	63.83	256.71	263.15	5.04	232,563.83	435,442.71
10,680.00	90.10	72.80	10,483.28	7,320.28	73.43	287.24	295.12	2.00	232,573.43	435,473.24
10,711.00	89.90	73.30	10,483.28	7,320.28	82.46	316.89	326.08	1.74	232,582.46	435,502.89
10,742.00	89.80	73.50	10,483.36	7,320.36	91.32	346.60	357.03	0.72	232,591.32	435,532.60
10,774.00	90.90	69.70	10,483.17	7,320.17	101.42	376.96	389.01	12.36	232,601.42	435,562.96
10,805.00	90.80	69.20	10,482.71	7,319.71	112.30	405.98	420.01	1.64	232,612.30	435,591.98
10,837.00	90.90	69.50	10,482.23	7,319.23	123.58	435.92	452.00	0.99	232,623.58	435,621.92
10,868.00	90.70	69.30	10,481.80	7,318.80	134.49	464.94	482.99	0.91	232,634.49	435,650.94
10,900.00	91.10	69.60	10,481.30	7,318.30	145.72	494.90	514.99	1.56	232,645.72	435,680.90
10,931.00	91.10	71.00	10,480.70	7,317.70	166.17	524.08	545.98	4.52	232,656.17	435,710.08
10,963.00	91.00	70.90	10,480.12	7,317.12	166.61	554.32	577.97	0.44	232,666.61	435,740.32
10,995.00	90.80	71.10	10,479.61	7,316.61	177.03	584.57	609.96	0.88	232,677.03	435,770.57
11,026.00	90.70	71.00	10,479.21	7,316.21	187.10	613.89	640.96	0.46	232,687.10	435,799.89
11,058.00	90.40	70.90	10,478.90	7,315.90	197.54	644.14	672.95	0.99	232,697.54	435,830.14
11,089.00	90.60	68.50	10,478.63	7,315.63	208.29	673.21	703.95	7.77	232,708.29	435,859.21
11,121.00	90.20	68.70	10,478.41	7,315.41	219.97	703.00	735.94	1.40	232,719.97	435,889.00
11,153.00	90.30	68.70	10,478.27	7,315.27	231.59	732.82	767.92	0.31	232,731.59	435,918.82
11,184.00	90.20	68.40	10,478.13	7,315.13	242.93	761.67	798.91	1.02	232,742.93	435,947.67
11,216.00	90.30	68.40	10,477.99	7,314.99	254.71	791.42	830.90	0.31	232,754.71	435,977.42
11,246.00	90.50	68.40	10,477.78	7,314.78	265.75	819.31	860.88	0.67	232,765.75	436,005.31
11,277.00	90.50	68.00	10,477.51	7,314.51	277.26	848.09	891.86	1.29	232,777.26	436,034.09
11,308.00	92.40	68.30	10,476.73	7,313.73	288.80	876.86	922.83	6.20	232,788.80	436,062.86
11,340.00	92.80	68.30	10,475.28	7,312.28	300.62	906.56	954.78	1.25	232,800.62	436,092.56



Pathfinder Energy Services

Pathfinder X & Y Survey Report



Company:

Project: Andrews County
Site: University Block 9
Well: #8EC
Wellbore: OH
Design: OH

Local Co-ordinate Reference:

TVD Reference: WELL @ 3163.00ft (Key #36)
MD Reference: WELL @ 3163.00ft (Key #36)
North Reference: Grid
Survey Calculation Method: Minimum Curvature
Database: Midland Database

Well #8EC

Survey

MD (ft)	Inc (°)	Azi (°)	TVD (ft)	TVDSS (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLeg (°/100ft)	Northing (ft)	Easting (ft)
11,371.00	93.10	68.40	10,473.68	7,310.68	312.04	935.33	985.72	1.02	232,812.04	436,121.33
11,403.00	91.20	68.50	10,472.48	7,309.48	323.78	965.07	1,017.69	5.95	232,823.78	436,151.07
11,434.00	90.80	68.30	10,471.94	7,308.94	335.19	993.89	1,048.67	1.44	232,835.19	436,179.89
11,466.00	90.50	67.70	10,471.58	7,308.58	347.18	1,023.56	1,080.64	2.10	232,847.18	436,209.56
11,497.00	90.60	67.60	10,471.28	7,308.28	358.97	1,052.23	1,111.61	0.46	232,858.97	436,238.23
11,528.00	90.20	67.60	10,471.06	7,308.06	370.78	1,080.89	1,142.58	1.29	232,870.78	436,266.89
11,560.00	90.40	67.30	10,470.90	7,307.90	383.05	1,110.44	1,174.54	1.13	232,883.05	436,296.44
11,592.00	90.60	67.40	10,470.62	7,307.62	395.38	1,139.97	1,206.50	0.70	232,895.38	436,325.97
11,623.00	90.80	67.60	10,470.24	7,307.24	407.24	1,168.61	1,237.47	0.91	232,907.24	436,354.51
11,654.00	90.70	67.40	10,469.83	7,306.83	419.10	1,197.25	1,268.43	0.72	232,919.10	436,383.25
11,686.00	90.90	67.60	10,469.39	7,306.39	431.34	1,226.81	1,300.39	0.88	232,931.34	436,412.81
11,717.00	90.70	67.30	10,468.95	7,305.95	443.23	1,255.44	1,331.35	1.16	232,943.23	436,441.44
11,749.00	90.70	67.50	10,468.56	7,305.56	455.53	1,284.98	1,363.31	0.62	232,955.53	436,470.98
11,780.00	90.50	67.50	10,468.24	7,305.24	467.39	1,313.62	1,394.28	0.65	232,967.39	436,499.82
11,811.00	90.50	67.80	10,467.97	7,304.97	479.18	1,342.29	1,425.25	0.97	232,979.18	436,528.29
11,843.00	90.40	67.90	10,467.72	7,304.72	491.24	1,371.93	1,457.22	0.44	232,991.24	436,557.93
11,875.00	90.20	68.60	10,467.55	7,304.55	503.10	1,401.65	1,489.20	2.28	233,003.10	436,587.65
11,906.00	90.30	68.20	10,467.41	7,304.41	514.51	1,430.47	1,520.19	1.33	233,014.51	436,616.47
11,937.00	89.90	68.20	10,467.36	7,304.36	526.02	1,459.25	1,551.17	1.29	233,026.02	436,645.25
11,969.00	89.50	68.90	10,467.53	7,304.53	537.73	1,489.04	1,583.15	2.52	233,037.73	436,675.04
12,000.00	89.50	68.40	10,467.80	7,304.80	549.01	1,517.91	1,614.14	1.61	233,049.01	436,703.91
12,032.00	89.40	68.70	10,468.10	7,305.10	560.71	1,547.69	1,646.13	0.99	233,060.71	436,733.69
12,064.00	89.30	68.30	10,468.47	7,305.47	572.44	1,577.46	1,678.11	1.29	233,072.44	436,763.46
12,093.00	89.20	68.40	10,468.85	7,305.85	583.14	1,604.41	1,707.09	0.49	233,083.14	436,790.41
12,131.00	89.20	68.40	10,469.38	7,306.38	597.13	1,639.74	1,745.07	0.00	233,097.13	436,825.74

BHL-12131.00°MD, 89.20°INC, 68.40°AZI, 10469.38°TVD, 1745.07°VS, 597.13°N, 1639.74°E



Pathfinder Energy Services
Pathfinder X & Y Survey Report



Company:

Project: XTO
Site: Andrews County
University Block 9
Well: #8EC
Wellbore: OH
Design: OH

XTO

Local Co-ordinate Reference:

TVD Reference: Well #8EC
MD Reference: WELL @ 3163.00ft (Key #36)
North Reference: WELL @ 3163.00ft (Key #36)
Survey Calculation Method: Grid
Database: Minimum Curvature
Midland Database

Targets

Target Name
- hit/miss target
- Shape

Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (ft)	Easting (ft)	Latitude	Longitude
0.00	0.00	10,480.00	592.00	1,842.00	233,092.000	436,828.000	32° 12' 14.268 N	102° 33' 19.377 W
BHL(#8EC)								
- survey misses by 12.01ft at 12131.00ft MD (10469.38 TVD, 597.13 N, 1639.74 E)								
- Point								

Survey Annotations

Measured Depth (ft)	Vertical Depth (ft)	Local Coordinates		Comment
		+N/-S (ft)	+E/-W (ft)	
12,131.00	10,469.38	597.13	1,639.74	BHL-12131.00MD, 89.20°INC, 68.40°AZI, 10469.38TVD, 1745.07VS, 5

Checked By: _____

Approved By: _____

Date: _____



Project: Andrews County
Site: University Block 9
Well: #8EC
Wellbore: OH
Plan: Plan #1 (#8EC/OH)

G

T

M

A

↑

↑

↑

↑

Azimuths to Grid North

True North: 2.76°

Magnetic North: 10.07°

Magnetic Field

Strength: 48922.0snT

Dip Angle: 60.40°

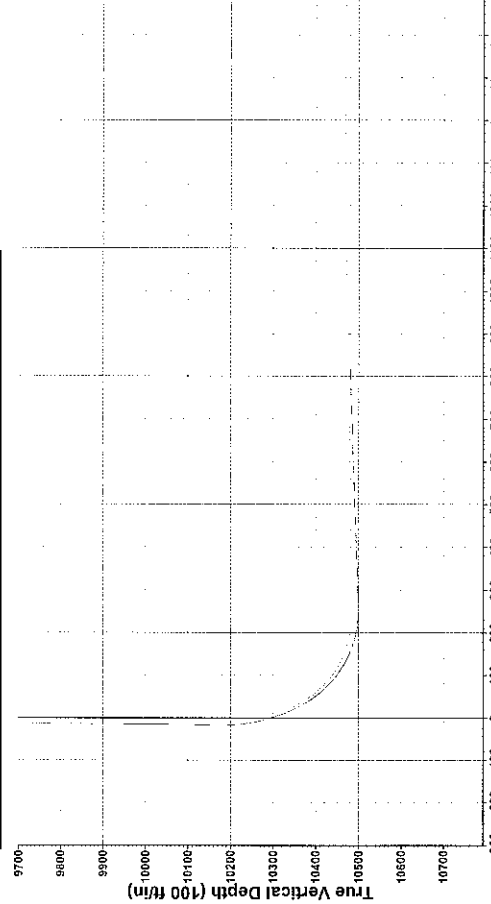
Date: 08/31/2009

Model: IGRF200510

SECTION DETAILS									
Sec	MD	Inc	Ad	TVD	+N/S	+E/W	D/Lay	T/Face	V/Sec Target
1	10160.00	1.27	303.04	10173.16	-23.13	+10.99	0.00	0.00	-15.18
2	10170.00	1.27	303.04	10183.16	-23.13	+10.99	0.00	0.00	-15.18
3	10175.00	1.27	303.04	10188.16	-23.13	+10.99	0.00	0.00	-15.18
4	10180.00	1.27	303.04	10193.16	-23.13	+10.99	0.00	0.00	-15.18
5	10185.00	1.27	303.04	10198.16	-23.13	+10.99	0.00	0.00	-15.18
6	10190.00	1.27	303.04	10203.16	-23.13	+10.99	0.00	0.00	-15.18
7	10195.00	1.27	303.04	10208.16	-23.13	+10.99	0.00	0.00	-15.18

PROJECT DETAILS: Andrews County
Geodetic System: US State Plane 1927 (Exact solution)
Datum: NAD 1927 (NADCON CONUS)
Ellipsoid: Clarke 1866
Zone: Texas North Central 4202
System Datum: Mean Sea Level
Local North: Grid

WELL DETAILS: #8EC					
Ground Elevation: 3151.00					
RIG Elevation: 3151.00 (Key #25)					
Rig Name: Key#25					
+N/S	0.00	Northing	435160.000	Latitude	32° 12' 7.53" N
+E/W	0.00	Eastng	435160.000	Longitude	102° 33' 35.133" W
Slot					



West(-)/East(+) (100 ft/in)

South(-)/North(+) (100 ft/in)

BHL-12131.00°MD,85.20°INC,68.40°AZI, 10469.38°TVD, 1745.07°VS, 597.13°N, 1639.74°E

BHL-12131.00°MD,85.20°INC,68.40°AZI, 10469.38°TVD, 1745.07°VS, 597.13°N, 1639.74°E

Vertical Section at 70.17° (100 ft/in)

Plan: Plan #1 (#8EC/OH)

Created By: Nate Blingham Date: 9/03/2009

PATHFINDER

Survey Report



Company: XTO ENERGY INC.
Well: #8EC
API or UWI: 42-003-38502
State: TX
County: ANDREWS
Comment: LEG #1

Location: ANDREWS, TX
Rig: KEY #36
Job Number: MD0909GAS197
Operator: JEREMY TEPE

Magnetic Declination: 10.070
Proposed Azimuth: 70.2
North Reference: GRID

Tiein Survey Data:

Depth	Inclination	Azimuth	TVD	N-S	E-W
10,180.00	1.3	203.0	10,179.16	-23.13	-10.99

Depth	Inclination	Azimuth	TVD	N-S	E-W	CA	CD	VS	DogLeg
10,271.00	15.2	72.9	10,269.15	-20.56	0.08	179.8	20.56	-6.89	17.7
10,286.00	17.2	74.5	10,283.55	-19.38	4.10	168.1	19.81	-2.71	13.7
10,302.00	19.9	76.5	10,298.72	-18.12	9.03	153.5	20.24	2.36	17.3
10,317.00	23.1	74.7	10,312.67	-16.74	14.35	139.4	22.05	7.83	21.8
10,334.00	25.4	73.3	10,328.17	-14.82	21.06	125.1	25.75	14.80	13.9
10,349.00	28.6	72.1	10,341.54	-12.79	27.56	114.9	30.38	21.60	21.6
10,365.00	29.2	71.8	10,355.54	-10.39	34.91	106.6	36.42	29.33	3.9
10,380.00	31.2	71.2	10,368.51	-8.00	42.06	100.8	42.82	36.87	13.5
10,397.00	34.5	71.2	10,382.79	-5.02	50.79	95.6	51.04	46.09	19.4
10,412.00	38.3	72.0	10,394.86	-2.22	59.24	92.1	59.28	54.98	25.5
10,428.00	41.6	72.4	10,407.12	0.92	69.02	89.2	69.03	65.25	20.7
10,443.00	45.8	72.7	10,417.96	4.03	78.90	87.1	79.01	75.60	28.0
10,460.00	49.5	72.4	10,429.41	7.79	90.89	85.1	91.22	88.15	21.8
10,475.00	53.7	72.1	10,438.73	11.38	102.08	83.6	102.71	99.90	28.0
10,491.00	57.3	72.1	10,447.79	15.43	114.63	82.3	115.66	113.08	22.5
10,506.00	61.4	71.2	10,455.43	19.49	126.87	81.3	128.36	125.97	27.8
10,523.00	65.0	70.0	10,463.10	24.54	141.18	80.1	143.30	141.14	22.1
10,538.00	69.4	69.9	10,468.91	29.28	154.17	79.2	156.92	154.97	29.3
10,555.00	73.2	70.5	10,474.36	34.73	169.31	78.4	172.84	171.07	22.6
10,570.00	77.3	71.0	10,478.18	39.51	183.01	77.8	187.22	185.57	27.5
10,586.00	81.2	71.5	10,481.16	44.56	197.89	77.3	202.84	201.28	24.6
10,601.00	86.0	72.4	10,482.83	49.18	212.06	76.9	217.68	216.18	32.6

10,617.00	89.1	71.7	10,483.52	54.10	227.26	76.6	233.61	232.15	19.9
10,632.00	90.4	71.5	10,483.58	58.84	241.49	76.3	248.56	247.15	8.8
10,648.00	90.5	72.3	10,483.46	63.81	256.70	76.0	264.51	263.14	5.0
10,680.00	90.1	72.8	10,483.29	73.40	287.23	75.7	296.46	295.11	2.0
10,711.00	89.9	73.3	10,483.29	82.44	316.88	75.4	327.43	326.07	1.7
10,742.00	89.8	73.5	10,483.37	91.30	346.59	75.2	358.41	357.03	0.7
10,774.00	90.9	69.7	10,483.17	101.40	376.95	74.9	390.35	389.01	12.4
10,805.00	90.8	69.2	10,482.72	112.28	405.97	74.5	421.21	420.00	1.6
10,837.00	90.9	69.5	10,482.24	123.56	435.91	74.2	453.09	452.00	1.0
10,868.00	90.7	69.3	10,481.81	134.47	464.93	73.9	483.98	482.99	0.9
10,900.00	91.1	69.6	10,481.30	145.70	494.89	73.6	515.89	514.98	1.6
10,931.00	91.1	71.0	10,480.71	156.15	524.07	73.4	546.83	545.98	4.5
10,963.00	91.0	70.9	10,480.12	166.59	554.31	73.3	578.80	577.97	0.4
10,995.00	90.8	71.1	10,479.62	177.01	584.56	73.2	610.77	609.96	0.9
11,026.00	90.7	71.0	10,479.21	187.07	613.88	73.1	641.75	640.96	0.5
11,058.00	90.4	70.9	10,478.91	197.52	644.13	73.0	673.73	672.95	1.0
11,089.00	90.6	68.5	10,478.64	208.27	673.20	72.8	704.68	703.95	7.8
11,121.00	90.2	68.7	10,478.41	219.95	702.99	72.6	736.59	735.93	1.4
11,153.00	90.3	68.7	10,478.27	231.57	732.80	72.5	768.52	767.92	0.3
11,184.00	90.2	68.4	10,478.14	242.91	761.66	72.3	799.45	798.91	1.0
11,216.00	90.3	68.4	10,478.00	254.69	791.41	72.2	831.38	830.89	0.3
11,246.00	90.5	68.4	10,477.79	265.73	819.30	72.0	861.32	860.88	0.7
11,277.00	90.5	68.0	10,477.52	277.24	848.08	71.9	892.25	891.86	1.3
11,308.00	92.4	68.3	10,476.73	288.77	876.85	71.8	923.17	922.83	6.2
11,340.00	92.8	68.3	10,475.28	300.59	906.55	71.7	955.08	954.78	1.3
11,371.00	93.1	68.4	10,473.69	312.02	935.32	71.6	985.99	985.72	1.0
11,403.00	91.2	68.5	10,472.49	323.76	965.06	71.5	1,017.92	1,017.68	5.9
11,434.00	90.8	68.3	10,471.95	335.17	993.88	71.4	1,048.88	1,048.66	1.4
11,466.00	90.5	67.7	10,471.58	347.16	1,023.55	71.3	1,080.82	1,080.63	2.1
11,497.00	90.6	67.6	10,471.29	358.95	1,052.22	71.2	1,111.76	1,111.60	0.5
11,528.00	90.2	67.6	10,471.07	370.76	1,080.88	71.1	1,142.70	1,142.57	1.3
11,560.00	90.4	67.3	10,470.90	383.03	1,110.43	71.0	1,174.64	1,174.53	1.1
11,592.00	90.6	67.4	10,470.62	395.35	1,139.96	70.9	1,206.57	1,206.49	0.7
11,623.00	90.8	67.6	10,470.24	407.21	1,168.60	70.8	1,237.52	1,237.45	0.9
11,654.00	90.7	67.4	10,469.84	419.08	1,197.24	70.7	1,268.47	1,268.42	0.7

11,686.00	90.9	67.6	10,469.39	431.32	1,226.80	70.6	1,300.41	1,300.38	0.9
11,717.00	90.7	67.3	10,468.96	443.21	1,255.43	70.6	1,331.36	1,331.34	1.2
11,749.00	90.7	67.5	10,468.57	455.51	1,284.97	70.5	1,363.32	1,363.30	0.6
11,780.00	90.5	67.5	10,468.24	467.37	1,313.61	70.4	1,394.27	1,394.26	0.6
11,811.00	90.5	67.8	10,467.97	479.16	1,342.28	70.4	1,425.24	1,425.23	1.0
11,843.00	90.4	67.9	10,467.72	491.22	1,371.91	70.3	1,457.20	1,457.20	0.4
11,875.00	90.2	68.6	10,467.55	503.08	1,401.64	70.3	1,489.18	1,489.18	2.3
11,906.00	90.3	68.2	10,467.42	514.49	1,430.46	70.2	1,520.17	1,520.17	1.3
11,937.00	89.9	68.2	10,467.36	526.00	1,459.24	70.2	1,551.15	1,551.15	1.3
11,969.00	89.5	68.9	10,467.53	537.70	1,489.02	70.1	1,583.14	1,583.13	2.5
12,000.00	89.5	68.4	10,467.80	548.99	1,517.90	70.1	1,614.12	1,614.12	1.6
12,032.00	89.4	68.7	10,468.11	560.69	1,547.68	70.1	1,646.11	1,646.11	1.0
12,064.00	89.3	68.3	10,468.47	572.42	1,577.45	70.1	1,678.10	1,678.09	1.3
12,093.00	89.2	68.4	10,468.85	583.12	1,604.40	70.0	1,707.08	1,707.07	0.5
12,131.00	89.2	68.4	10,469.38	597.10	1,639.73	70.0	1,745.06	1,745.05	0.0