

Current Production of Wells Producing from the South Blanco-Tocito Pool

Case #14395

Well Name	Well No	Status	Location	First Production Date	Current Gas Rate (MCF/D)	Current Oil Rate (BBL/D)	Current Water Rate (BBL/D)
Breach A	136	Active	10 26N 6W	3 / 1998	29	1.0	0.1
Breach A	136F	Active	10 26N 6W	7 / 2004	511	4.0	0.9
Breach A	132R	Active	9 26N 6W	9 / 2004	410	12.0	3.9
Breach A	182	Plugged	10 26N 6W	5 / 1952	0	0	0
Breach A	136E	Plugged	10 26N 6W	8 / 1952	0	0	0
Breach A	175E	Plugged	8 26N 6W	4 / 1953	0	0	0
Breach A	125	Plugged	8 26N 6W	9 / 1954	0	0	0
Breach A	204	Plugged	9 26N 6W	3 / 1956	0	0	0
Breach A	132	Plugged	9 26N 6W	12 / 1951	0	0	0
Breach A	679	Plugged	9 26N 6W	7 / 1951	0	0	0
Breach A	132E	Plugged	9 26N 6W	1 / 1953	0	0	0
Breach A	204M	Plugged	9 26N 6W	3 / 1953	0	0	0
Breach A	182A	Plugged	10 26N 6W	5 / 1952	0	0	0
Breach A	682E	Plugged	10 26N 6W	4 / 1952	0	0	0
Breach B	147	Active	7 26N 6W	10 / 2004	106	0.8	0.4
Breach B	123	Plugged	7 26N 6W	12 / 1953	0	0	0
Breach C	144	Active	12 26N 6W	11 / 1964	103	1.6	0.0
Breach C	144E	Active	12 26N 6W	11 / 1990	19	0.0	0.0
Breach C	689M	Active	12 26N 6W	11 / 2003	75	0.2	0.0
Breach C	244E	Active	14 26N 6W	2 / 2006	211	2.9	0.0
Breach C	689	Inactive	12 26N 6W	3 / 1964	0	0	0
Breach D	140M	Active	11 26N 6W	11 / 2005	206	1.8	0.1
Breach D	685E	Active	11 26N 6W	1 / 2006	186	1.6	0.0
Breach D	240E	Active	15 26N 6W	9 / 2005	185	0.3	0.1
Breach D	140	Inactive	11 26N 6W	8 / 1960	0	0	0
Breach D	185	Plugged	11 26N 6W	12 / 1951	0	0	0
Breach E	79	Active	1 26N 6W	11 / 2006	35	0.0	0.0
Breach E	89E	Active	3 26N 6W	1 / 1986	71	0.9	0.1
Breach E	58M	Active	3 26N 6W	7 / 2003	133	1.0	0.0
Breach E	50E	Active	5 26N 6W	1 / 2004	104	1.1	0.0
Breach E	850	Active	5 26N 6W	10 / 2005	64	0.2	0.6
Breach E	65	Active	5 26N 6W	10 / 2007	69	0.5	0.0
Breach E	104	Inactive	5 26N 6W	12 / 1958	0	0	0
Breach E	583M	Inactive	5 26N 6W	8 / 1963	0	0	0
Breach E	102	Plugged	5 26N 6W	5 / 1960	0	0	0
Breach E	109	Plugged	3 26N 6W	4 / 1952	0	0	0
Breach F	1F	Active	33 27N 6W	2 / 1999	122	1.0	30.5
Breach F	8M	Active	34 27N 6W	12 / 2002	54	0.4	0.0
Breach F	1E	Plugged	33 27N 6W	8 / 1984	0	0	0
Jicarilla 152 W	3	Active	7 26N 5W	4 / 1965	27	0.1	0.0
Johnston A	13M	Active	36 27N 6W	12 / 1999	8	0.1	1.0
Johnston A Com C	9A	Active	36 27N 6W	1 / 2000	1	0.0	0.7
Reuter	2	Active	34 27N 6W	2 / 1995	51	0.9	1.0
Rincon Unit	150	Active	6 26N 6W	4 / 1994	188	0.9	0.1
Rincon Unit	130E	Inactive	32 27N 6W	11 / 1992	0	0	0
Rincon Unit	166	Plugged	32 27N 6W	4 / 1995	0	0	0
Rincon Unit	6	Plugged	6 26N 6W	2 / 1954	0	0	0
Rincon Unit	11	Plugged	6 26N 6W	2 / 1954	0	0	0
Rincon Unit	20	Plugged	6 26N 6W	2 / 1954	0	0	0
Rincon Unit	11E	Plugged	6 26N 6W	10 / 1995	0	0	0
State A	62M	Active	2 26N 6W	11 / 2002	93	1.5	0.1
State B Com	233R	Active	16 26N 6W	7 / 1994	107	1.0	0.0
State Com	113	Active	2 26N 6W	11 / 1997	57	1.0	0.1
State Com	113E	Active	2 26N 6W	4 / 2006	59	0.0	0.0

Normalized Production Plot for Wells in the South Blanco-Tocito Pool (Drilled after 2005)

XTO Energy Inc.

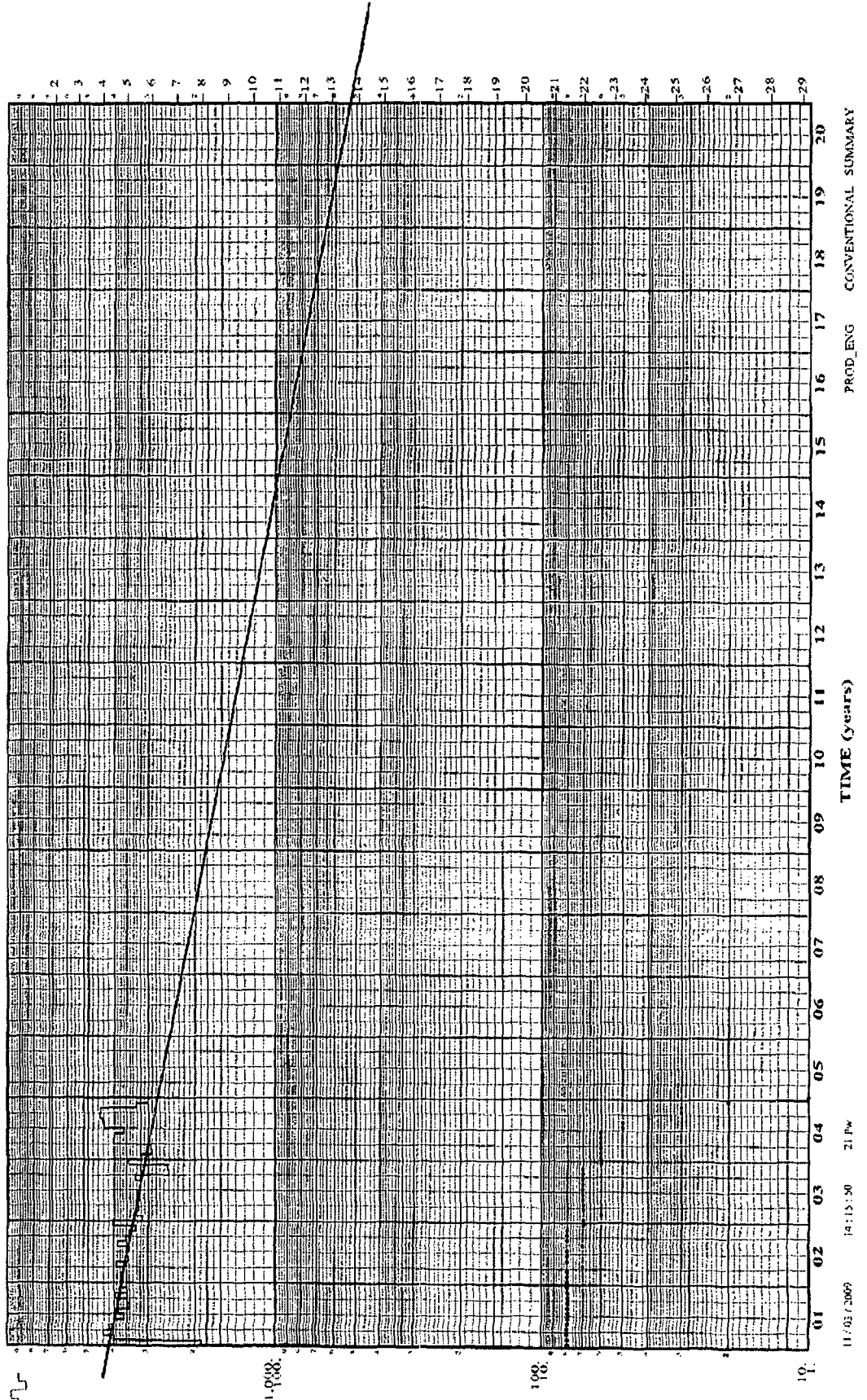
4200 MCF/MO @ 10%.

EUR = 417 MMCF

Stand Alone Tocito Well

Run Date: 02/06/09
Run Time: 17:41:52

GAS (mcf/mo)
Well Count



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Normalized Production Plot for Wells in the Basin-Dakota Pool (Drilled after 2005)

XTO Energy Inc.

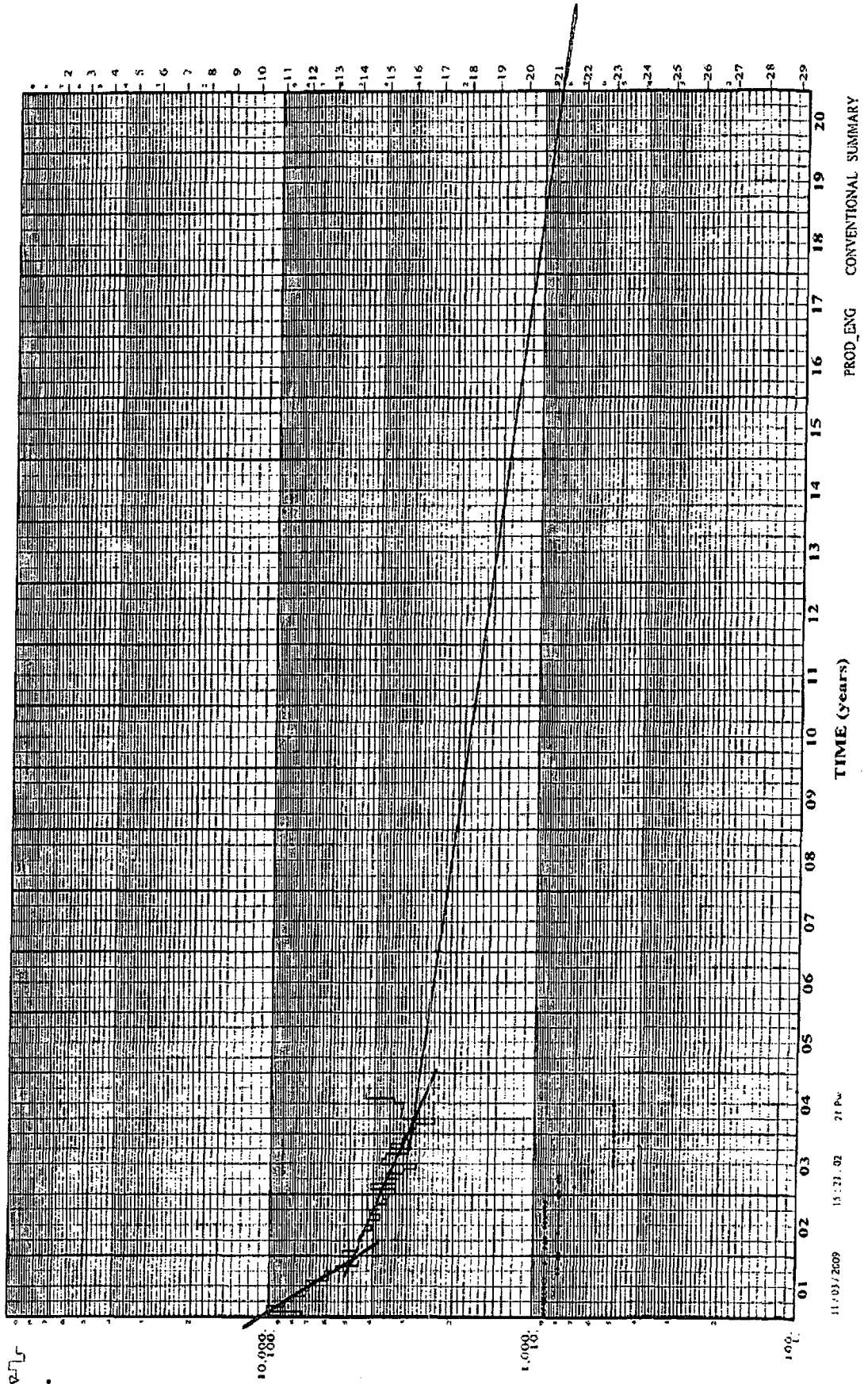
Stand Alone Dakota Well

10500 MCF/MO @ 60%
4800 MCF/MO @ 20%
2900 MCF/MO @ 7%

EUR = 551 MMCF

Run Date: 02/06/09
Run Time: 17:41:47

GAS (mcf/mo)
Well Count



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Economics

- Average EUR for Wells Producing from the South Blanco-Tocito Pool (Drilled after 2005)
 - 417 MMCF, 5 MBO
- Average EUR for Wells Producing from the Basin-Dakota Pool (Drilled after 2005)
 - 551 MMCF, 3 MBO

Comparison
At \$5 / MCF, \$80 / BBL

	EUR (MMSCF)	EUR (MBO)	Capital Cost (M\$)	Operating Cost (\$)	Rate of Return (%)	PV @ 10% (M\$)
Tocito Only	417	5	900	3200	5.26	-138.37
Tocito + Dakota	968	8	1100	5000	21.10	407.77

Downhole Commingling

- Existing wells in the South Blanco-Tocito Pool will not be adversely affected by inclusion in the Basin-Mancos Gas Pool or by being downhole commingled with production from the Basin-Dakota Pool
- Gas Samples from each show similar compositions
- The fluid level will be kept low because wells will be put on pump, no further secondary recovery will occur
- Commingling the South Blanco-Tocito Pool and Basin-Dakota Pool will not result in shut-in or flowing well bore pressures in excess of their fracture parting pressure
- Commingling will not reduce the value of the total remaining production

Component	Tocito Mole %	Dakota Mole %
Nitrogen	0.486	0.276
CO ₂	0.867	1.140
Methane	84.828	82.695
Ethane	7.796	9.626
Propane	3.571	3.565
I-Butane	0.593	0.583
N-Butane	0.954	0.934
I-Pentane	0.305	0.337
N-Pentane	0.217	0.254
Hexane Plus	0.383	0.590

	Fracture Parting Pressure (psi)	Current SI BHP (psi)
Tocito	4976	991
Dakota	4875	827

APPLICATION FOR DOWNHOLE COMMINGLING

Operator XTO Energy Address 810 Houston St, Fort Worth, TX 76102
Breech A 132R G-9-26N-6W Rio Arriba
Lease Well No. Unit Letter-Section-Township-Range County
OGRID No. 003824 Property Code 2455 API No. 30039266200000 Lease Type: ☒ Federal ☐ State ☐ Fee

DATA ELEMENT	UPPER ZONE	INTERMEDIATE ZONE	LOWER ZONE
Pool Name	<u>South Blanco Tooto</u>	<u>---</u>	<u>Basin Dakota</u>
Pool Code	<u>06460</u>	<u>---</u>	<u>71599</u>
Top and Bottom of Pay Section (Perforated or Open-Hole Interval)	<u>6645-6659'</u>	<u>---</u>	<u>7134-7432'</u>
Method of Production (Flowing or Artificial Lift)	<u>Flowing</u>	<u>---</u>	<u>Flowing</u>
Bottomhole Pressure (Note: Pressure data will not be required if the bottom perforation in the lower zone is within 150% of the depth of the top perforation in the upper zone)	<u>991</u>	<u>---</u>	<u>827</u>
Oil Gravity or Gas BTU (Degree API or Gas BTU)	<u>76° API</u>	<u>---</u>	<u>71° API</u>
Producing, Shut-In or New Zone	<u>Producing</u>	<u>---</u>	<u>Producing</u>
Date and Oil/Gas/Water Rates of Last Production. (Note: For new zones with no production history, applicant shall be required to attach production estimates and supporting data.) <u>(MCFPD or BBL/D)</u>	Date: <u>9/2009</u> Rates: <u>9/261/3</u>	Date: <u>---</u> Rates: <u>---</u>	Date: <u>9/2009</u> Rates: <u>0.3/283/47</u>
Fixed Allocation Percentage (Note: If allocation is based upon something other than current or past production, supporting data or explanation will be required.)	Oil <u>97</u> % Gas <u>48</u> %	Oil <u>---</u> % Gas <u>---</u> %	Oil <u>3</u> % Gas <u>52</u> %

ADDITIONAL DATA

Are all working, royalty and overriding royalty interests identical in all commingled zones? Yes ☒ No ☐
If not, have all working, royalty and overriding royalty interest owners been notified by certified mail? Yes ☐ No ☐
Are all produced fluids from all commingled zones compatible with each other? Yes ☒ No ☐
Will commingling decrease the value of production? Yes ☐ No ☒
If this well is on, or communitized with, state or federal lands, has either the Commissioner of Public Lands or the United States Bureau of Land Management been notified in writing of this application? Yes ☒ No ☐
NMOCD Reference Case No. applicable to this well: _____

Attachments:

C-102 for each zone to be commingled showing its spacing unit and acreage dedication.
Production curve for each zone for at least one year. (If not available, attach explanation.)
For zones with no production history, estimated production rates and supporting data.
Data to support allocation method or formula.
Notification list of working, royalty and overriding royalty interests for uncommon interest cases.
Any additional statements, data or documents required to support commingling.

PRE-APPROVED POOLS

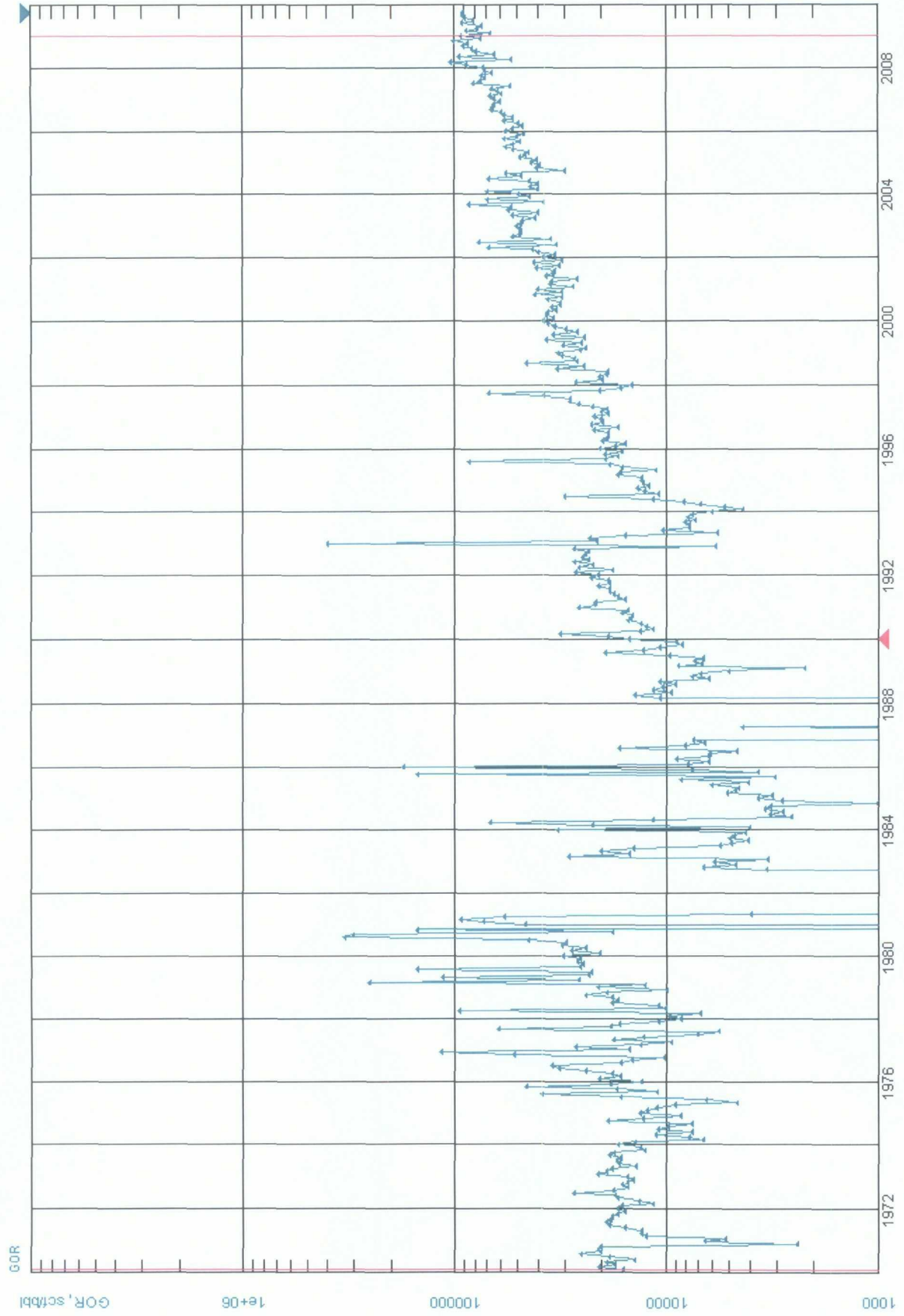
If application is to establish Pre-Approved Pools, the following additional information will be required:

List of other orders approving downhole commingling within the proposed Pre-Approved Pools
List of all operators within the proposed Pre-Approved Pools
Proof that all operators within the proposed Pre-Approved Pools were provided notice of this application.
Bottomhole pressure data.

I hereby certify that the information above is true and complete to the best of my knowledge and belief.

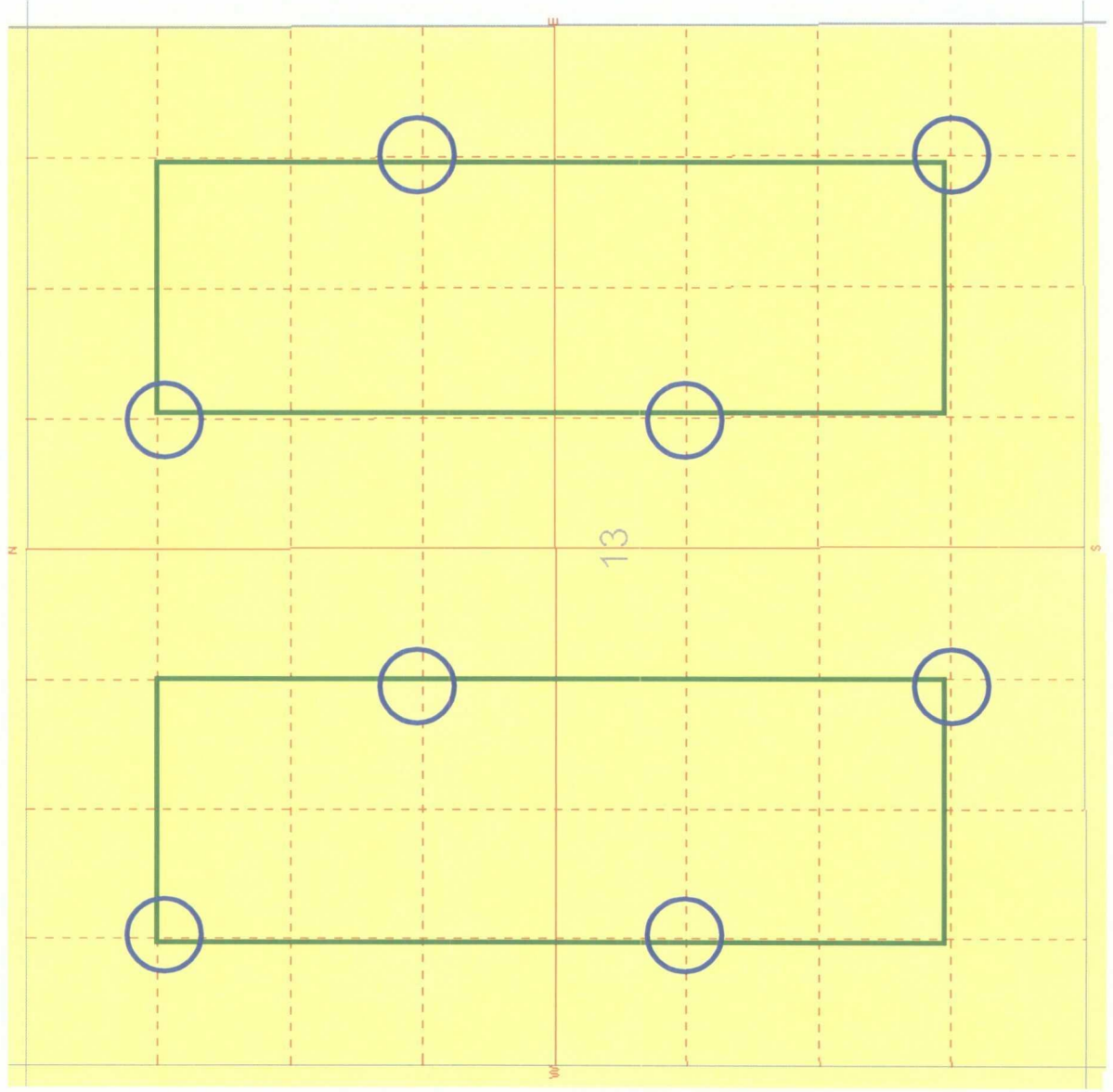
SIGNATURE John Fitzgerald TITLE Reservoir Engineer DATE 11/4/09
TYPE OR PRINT NAME John Fitzgerald TELEPHONE NO. (817) 885-2190
E-MAIL ADDRESS John-Fitzgerald@XTOEnergy.com

Gas Oil Ratio's for Active Wells in South-Blanco Tocito Pool



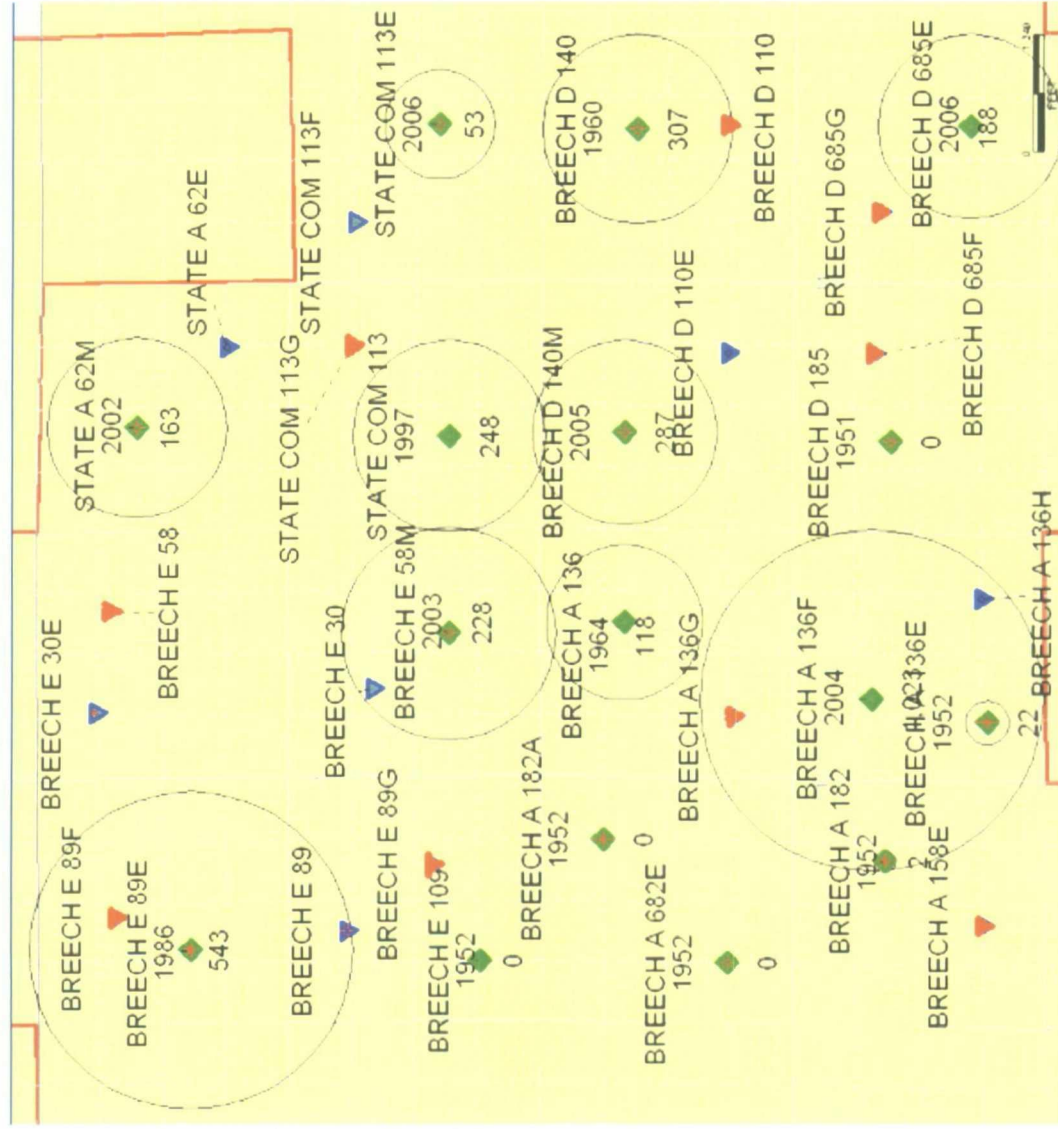
Current Legal Locations for Wells in the South Blanco-Tocito Pool

Current Legal Locations for Wells in the Basin-Mancos Gas Pool



Example Drainage Areas for the South Blanco-Tocito Pool

Proposed Locations for New Drills



Case #14395

Key

- Well Label
- Completion Date
- Cumulative Production (MMCF)

TOCITO WELL

PLANNED NEW DRILL OR RE-COMplete

PLANNED NEW DRILL OR RE-COMplete (NSL)

Equation Used to Calculate Drainage Areas

From pg. 856 of Reservoir Engineering Handbook, 3rd Edition, by Tarek Ahmed

$$A = \frac{G * B_{gi} * 1E6}{43,560 * h * Por * (1 - S_{wi})}$$

Where:

A =

Drainage Area, acres

G =

Gas in place, MMscf

h =

Average reservoir thickness, ft

Por =

Porosity

S_{wi} =

Water Saturation

B_{gi} =

Gas Formation Volume Factor, cf/scf

Conclusions

- Drilling of wells in the pool pursuant to the current well location rules will cause XTO and the NMOCD to devote unnecessary time, money, and effort to file and process unorthodox well location applications
- It is economically advantageous to drill commingled wells producing from the South Blanco-Tocito Pool and Basin-Dakota Pool. This well help further develop and recover production from these pools.
- The existing wells open in the South Blanco-Tocito Pool have demonstrated limited drainage areas, leaving possible production at locations outside the "standard" well location windows for the pool
- The Basin-Mancos Gas Pool should be expanded to include all acreage currently within the South Blanco-Tocito Pool except for that acreage within the Rincon Unit.