

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

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

APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of Work <input checked="" type="checkbox"/> DRILL <input type="checkbox"/> REENTER		5. Lease Serial No. <b>SE-077383</b>	
1b. Type of Well <input type="checkbox"/> Oil Well <input checked="" type="checkbox"/> Gas Well <input type="checkbox"/> Other <input type="checkbox"/> Single Zone <input checked="" type="checkbox"/> Multiple Zone		6. If Indian, Allottee or Tribe Name <b>N/A</b>	
2. Name of Operator <b>XTO Energy Inc.</b>		7. Unit or CA Agreement Name and No. <b>N/A NMNM 073557</b>	
3a. Address <b>2700 Farmington Ave., Bldg. K. Ste 1 Farmington, NM</b>		8. Lease Name and Well No. <b>Davidson Gas Com G #1G</b>	
3b. Phone No. (include area code) <b>505-324-1090</b>		9. API Well No. <b>30-045-33412</b>	
4. Location of Well (Report location clearly and in accordance with any State requirements)* At surface <b>860' ENL x 845' FEL in Sec 21, T28N, R10W</b> At proposed prod. zone <b>700' ENL x 1800' FEL in Sec 21, T28N, R10W</b>		10. Field and Pool, or Exploratory <b>Basin Dakota/Otero Chacra</b>	
14. Distance in miles and direction from nearest town or post office* <b>Approx 6.5 miles from Bloomfield, NM post office</b>		11. Sec., T., R., M., or Blk. and Survey or Area <b>(A) Sec 21, T28N, R10W</b>	
15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drg. unit line, if any) <b>700'</b>		12. County or Parish <b>San Juan</b>	
16. No. of Acres in lease <b>1280</b>		13. State <b>NM</b>	
17. Spacing Unit dedicated to this well <b>DK E/2 320 - CH NE/4 160</b>		18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. <b>227'</b>	
19. Proposed Depth <b>7139'</b>		20. BLM/BIA Bond No. on file <b>UTB-000138</b>	
21. Elevations (Show whether DF, KDB, RT, GL, etc.) <b>6030' GROUND LEVEL</b>		22. Approximate date work will start* <b>WINTER 2005</b>	
		23. Estimated duration <b>2 weeks</b>	

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>Kyla Vaughan</i>	Name (Printed/Typed) <b>Kyla Vaughan</b>	Date <b>11/02/05</b>
Title <b>Regulatory Compliance Tech</b>		
Approved by (Signature) <i>[Signature]</i>	Name (Printed/Typed) <b>[Name]</b>	Date <b>4/18/06</b>
Title <b>AFM</b>	Office <b>PFO</b>	

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 statements or representations as to any matter within its jurisdiction.

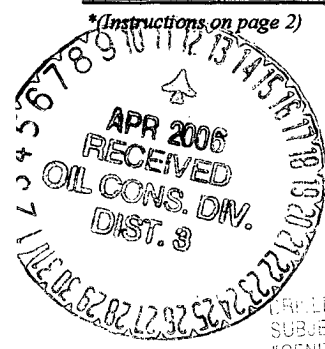
(Instructions on page 2)

HOLD C104 FOR directional Survey

**APD/ROW**

This action is subject to technical and procedural review pursuant to 43 CFR 3165.3 and appeal pursuant to 43 CFR 3165.4

NMOCD



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

DISTRICT I  
1025 N. French Dr., Hobbs, N.M. 48240

DISTRICT II  
1301 W. Grand Ave., Artesia, N.M. 88210

DISTRICT III  
1000 Rio Branson Rd., Aztec, N.M. 87410

DISTRICT IV  
1220 South St. Francis Dr., Santa Fe, NM 87505

State of New Mexico  
Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION

1220 South St. Francis Dr., Santa Fe, NM 87505

Form C-102  
Revised June 10, 2003

Submit to Appropriate District Office  
State Lease - 4 Copies  
Fee Lease - 3 Copies

RECEIVED

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

*API Number 30-045-33412		*Pool Code 82329	*Pool Name Otero Chacra (GAS)
*Property Code 22680	*Property Name DAVIDSON GAS COM O		*Well Number 1G
*OGRIID No. 167067	*Operator Name XTO ENERGY INC.		*Elevation 6030

<sup>10</sup> Surface Location

UL or lot no	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
A	21	28-N	10-W		860	NORTH	845	EAST	SAN JUAN

<sup>11</sup> 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
B	21	28-N	10-W		700	NORTH	1800	EAST	SAN JUAN
*Dedicated Acre 16002.14		*Foot or Infill		*Consolidation Code		*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

16 SEC. CORNER FD 2 1/2" BC 1913 U.S.C.L.O.	<p>N 89-49-12 W 5269.6' (M)</p> <p>700'</p> <p>1800'</p> <p>960'</p> <p>BOTTOM HOLE</p> <p>LAT: 36°39'09.5" N (NAD 27) LONG: 107°53'39.2" W (NAD 27)</p> <p>345'</p> <p>SURFACE LOCATION</p> <p>SEC. CORNER FD 2 1/2" BC 1913 U.S.C.L.O.</p> <p>21</p> <p>QTR. CORNER FD 2 1/2" BC 1913 U.S.C.L.O.</p>	17 OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief.  _____ Signature  _____ Printed Name Drilling Assistant _____ Title 3/1/05 _____ Date
		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 knowledge and belief.  JAN 10 2005 _____ Signature and Seal of Professional Surveyor  _____ Certificate Number

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

DISTRICT II  
1301 W. Grand Ave., Artesia, N.M. 88210

DISTRICT III  
1000 Rio Brazos Rd., Aztec, N.M. 87410

DISTRICT IV  
1220 South St. Francis Dr., Santa Fe, NM 87505

State of New Mexico  
Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION

1220 South St. Francis Dr.  
Santa Fe, NM 87505

Form C-102  
Revised June 10, 2003

Submit to Appropriate District Office  
State Lease - 4 Copies  
Fee Lease - 3 Copies

RECEIVED  
OIL CONSERVATION DIVISION

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

1 API Number 30-045-33412		2 Pool Code 71599		3 Pool Name Basin Dakota	
4 Property Code 22680		5 Property Name DAVIDSON GAS COM C			6 Well Number 1G
7 OGRID No. 1167067		8 Operator Name XTO ENERGY INC.			9 Elevation 5030

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
A	21	28-N	10-W		860	NORTH	845	EAST	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
B	21	28-N	10-W		700	NORTH	1800	EAST	SAN JUAN

12 Dedicated Acres 320 2/3	13 Joint or Infill	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

16 SEC. CORNER FD 2 1/2" BC 1913 U.S.G.L.O.	N 89-49-12 W 5263.6' (M) BOTTOM HOLE LAT: 36°39'06.5" N (NAD 27) LONG: 107°53'39.2" W (NAD 27) SEC. CORNER FD 2 1/2" BC 1913 U.S.G.L.O.	17 OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief. Signature: <u>Henry H. Simon</u> Printed Name: <u>Henry H. Simon</u> Title: <u>Drilling Assistant</u> Date: <u>3/1/05</u>

Submit 3 Copies To Appropriate District  
Office  
District I  
1625 N. French Dr., Hobbs, NM 87240  
District II  
1301 W. Grand Ave., Artesia, NM 88210  
District III  
1000 Rio Brazos Rd., Aztec, NM 87410  
District IV  
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico  
Energy, Minerals and Natural Resources

OIL CONSERVATION DIVISION  
1220 South St. Francis Dr.  
Santa Fe, NM 87505

Form C-103  
May 27, 2004

SUNDRY NOTICES AND REPORTS ON WELLS (DO NOT USE THIS FORM FOR PROPOSALS TO DRILL OR TO DEEPEN OR PLUG BACK TO A DIFFERENT RESERVOIR. USE "APPLICATION FOR PERMIT" (FORM C-101) FOR SUCH PROPOSALS.)		WELL API NO <u>30-045-33412</u>
1. Type of Well: Oil Well <input type="checkbox"/> Gas Well <input checked="" type="checkbox"/> Other		5. Indicate Type of Lease STATE <input type="checkbox"/> FEE <input type="checkbox"/>
2. Name of Operator <u>XTO Energy Inc.</u>		6. State Oil & Gas Lease No. <u>SF-077383</u>
3. Address of Operator <u>2700 Farmington Ave., Bldg. K. Ste 1 Farmington, NM 87401</u>		7. Lease Name or Unit Agreement Name: <u>Davidson Gas Com G</u>
4. Well Location Unit Letter <u>A</u> : <u>860</u> feet from the <u>North</u> line and <u>845</u> feet from the <u>East</u> line Section <u>21</u> Township <u>28N</u> Range <u>10W</u> NMPM <u>NMEM</u> County <u>SAN JUAN</u>		8. Well Number <u>#1G</u>
11. Elevation (Show whether DR, RKB, RT, GR, etc.) <u>6030'</u>		9. OGRID Number <u>167067</u>
Pit or Below-grade Tank Application <input checked="" type="checkbox"/> or Closure <input type="checkbox"/>		10. Pool name or Wildcat <u>Basin Dakota/Otero Chacra</u>
Pit type <u>DRILL</u> Depth to Groundwater <u>&lt;50</u> Distance from nearest fresh water well <u>&gt;1000</u> Distance from nearest surface water <u>&gt;200'</u>		
Pit Liner Thickness: <u>12</u> mil Below-Grade Tank: Volume <u>8000</u> bbls; Construction Material		

12. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data	
NOTICE OF INTENTION TO:	SUBSEQUENT REPORT OF:
PERFORM REMEDIAL WORK <input type="checkbox"/> PLUG AND ABANDON <input type="checkbox"/>	REMEDIAL WORK <input type="checkbox"/> ALTERING CASING <input type="checkbox"/>
TEMPORARILY ABANDON <input type="checkbox"/> CHANGE PLANS <input type="checkbox"/>	COMMENCE DRILLING OPNS. <input type="checkbox"/> PLUG AND ABANDONMENT <input type="checkbox"/>
PULL OR ALTER CASING <input type="checkbox"/> MULTIPLE COMPLETION <input type="checkbox"/>	CASING TEST AND CEMENT JOB <input type="checkbox"/>
OTHER: <u>PIT</u> <input checked="" type="checkbox"/>	OTHER: <input type="checkbox"/>

13. Describe proposed or completed operations. (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work). SEE RULE 1103. For Multiple Completions: Attach wellbore diagram of proposed completion or recompletion.

XTO Energy proposed to install a pit on location for drilling.

I hereby certify that the information above is true and complete to the best of my knowledge and belief. I further certify that any pit or below-grade tank has been/will be constructed or closed according to NMOCD guidelines ☒ , a general permit ☐ or an (attached) alternative OCD-approved plan ☐

SIGNATURE \_\_\_\_\_ TITLE Regulatory Compliance Tech DATE 11/02/05  
E-mail address: kyla\_vaughan@xtoenergy.com  
Type or print name Kyla Vaughan Telephone No. 505-564-6726

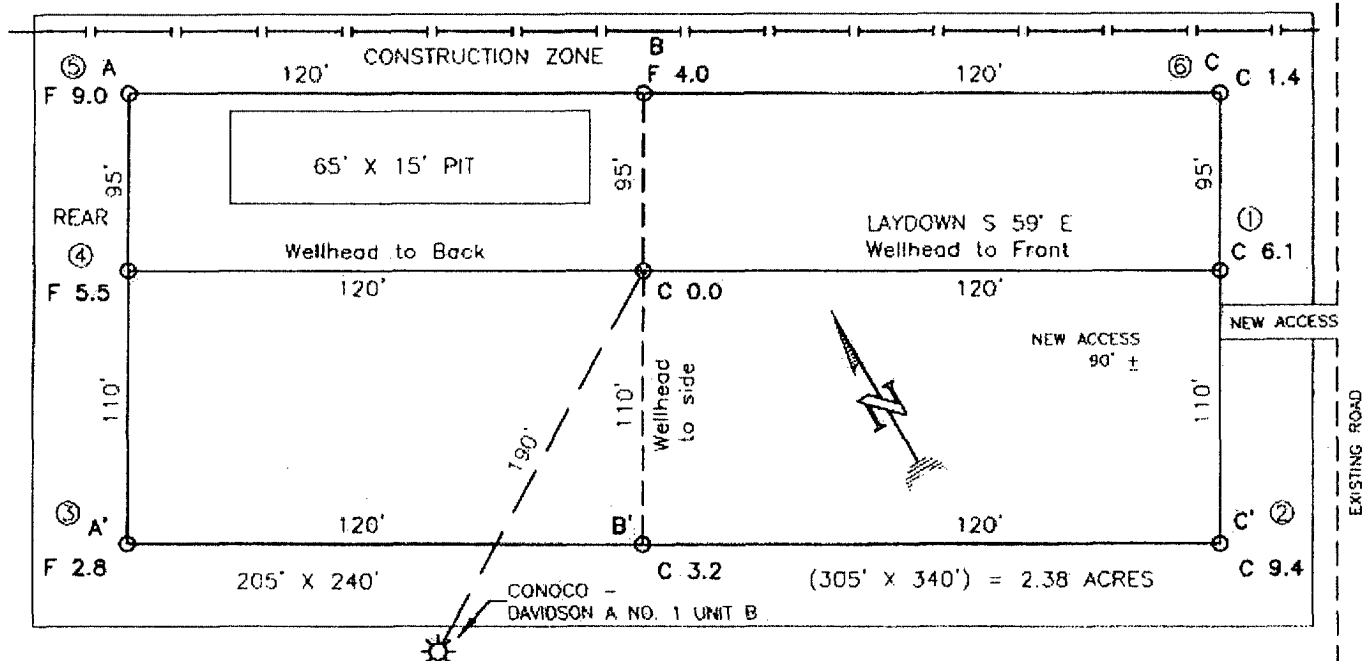
For State Use Only

APPROVED BY \_\_\_\_\_ TITLE DEPUTY OIL & GAS INSPECTOR, DIST. 8 DATE APR 12 2006  
Conditions of Approval, if any:

EXHIBIT D

XTO ENERGY INC.  
 DAVIDSON GAS COM G NO. 1G 860' FNL 845' FEL  
 SECTION 21, T28N, R10W, N.M.P.M., SAN JUAN COUNTY, N.M.  
 GROUND ELEVATION: 6030', DATE: JANUARY 18, 2005

LAT. = 36°39'09.5" N  
 LONG. = 107°53'39.2" W  
 NAD 27

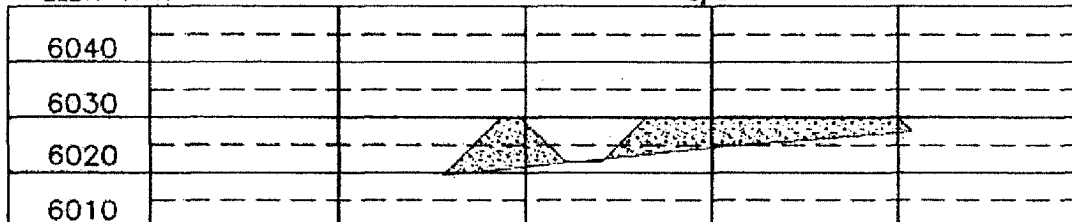


RESERVE PIT DIKE: TO BE 8' ABOVE DEEP SIDE (OVERFLOW - 3' WIDE AND 1' ABOVE SHALLOW SIDE).  
 BLOW PIT: OVERFLOW PIPE HALFWAY BETWEEN TOP AND BOTTOM AND TO EXTEND OVER PLASTIC LINER AND INTO BLOW PIT.

NOTE: DAGGETT ENTERPRISES, INC. IS NOT LIABLE FOR UNDERGROUND UTILITIES OR PIPELINES. NEW MEXICO ONE CALL TO BE NOTIFIED 48 HOURS PRIOR TO EXCAVATION OR CONSTRUCTION.

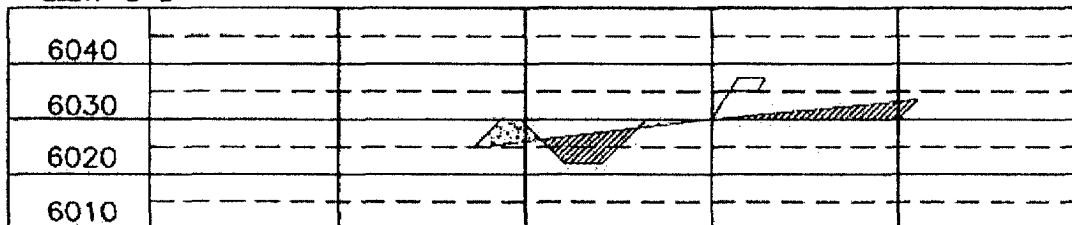
ELEV. A-A'

C/L



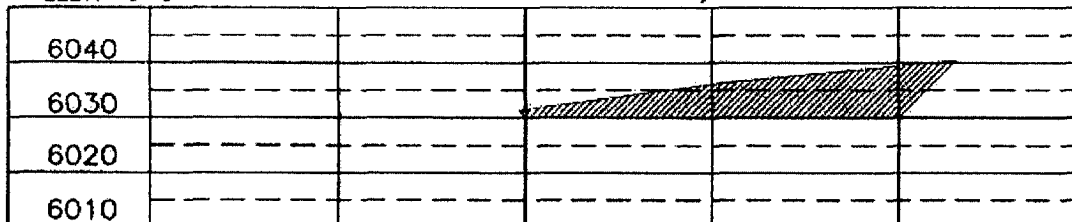
ELEV. B-B'

C/L



ELEV. C-C'

C/L



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.

REVISION	DATE	REVISION BY	DATE

**Daggett Enterprises, Inc.**  
 Surveying and Oil Field Services  
 P. O. Box 15068 - Farmington, NM 87401  
 Phone (505) 326-1772 - Fax (505) 326-6019  
 NEW MEXICO L.S. No. 14831  
 CDR: CR404, CFB  
 DATE: 02/09/05

Drawn BY: G.V.  
 Check: CR404

EXHIBIT E

# XTO ENERGY INC.

Davidson Gas Com G #1G

APD Data

November 2, 2005

Location: 860' FNL x 845' FEL Sec 21, T28N, R10W

County: San Juan

State: New Mexico

GREATEST PROJECTED TD: 7139'

OBJECTIVE: Basin Dakota / Otero Chacra

APPROX GR ELEV: 6030'

Est KB ELEV: 6042' (12' AGL)

## 1. MUD PROGRAM:

INTERVAL	0' to 360'	360' to 2500'	2500' to 7139
HOLE SIZE	12.25"	7.875"	7.875"
MUD TYPE	FW/Spud Mud	FW/Polymer	LSND / Gel Chemical
WEIGHT	8.6-9.0	8.4-8.8	8.6- 9.20
VISCOSITY	28-32	28-32	45-60
WATER LOSS	NC	NC	8-10

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.

## 2. CASING PROGRAM:

Surface Casing: 8.625" casing to be set at  $\pm 360'$  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'-360'	360'	24.0#	J-55	ST&C	1370	2950	244	8.097	7.972	7.950	17.13	28.24

Production Casing: 5.5" casing to be set at TD ( $\pm 7139'$ ) in 7-7/8" 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'-7139	7139'	15.5#	J-55	ST&C	4040	4810	202	4.950	4.825	1.18	1.41	1.83

## 3. WELLHEAD:

- 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.
- 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.

EXHIBIT F

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

A. Surface: 8.625", 24.0#, J-55, ST&C casing to be set at  $\pm 360'$  in 12-1/4" hole.

214 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 297 ft<sup>3</sup>, 100% excess of calculated annular volume to 360'.*

B. Production: 5.5", 15.5#, J-55 (or K-55), ST&C casing to be set at  $\pm 7139'$  in 7.875" hole.

LEAD:

$\pm 747$  sx of Premium Lite HS (Type III/Poz/Gel) with 2% salt, 1/4 pps cello, 0.2% dispersant, 0.5% fluid loss & 2% LCM mixed at 12.5 ppg, 2.01 ft<sup>3</sup>/sk, 10.55 gal wtr/sx.

TAIL:

150 sx Type III with 5% bonding additive, 1/4 pps cello, 2% LCM, 0.3% dispersant & 0.2% 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 1732 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. Mud Logger: The mud logger will come on at 2,900' and will remain on the hole until TD. The mud will be logged in 10' intervals.

B. Open Hole Logs as follows: Run Array Induction/SFL/GR/SP fr/TD (7139') to the bottom of the surface csg. Run Neutron/Lithodensity/Pe/GR/Cal from TD (7139') to 3,000'.

## 6. FORMATION TOPS:

Est. KB Elevation: 6042'

FORMATION	TV Sub-Sea Elev.	TVD DEPTH	Measured DEPTH	FORMATION	TV Sub-Sea Elev.	TVD DEPTH	Measured DEPTH
Ojo Alamo SS	5065	977	990	Gallup Ss	465	5,577	5684
Kirtland Shale	4898	1,144	1161	Greenhorn Ls	-300	6,342	6465
Farmington SS				Graneros Sh	-358	6,400	6524
Fruitland Formation	4397	1,645	1672	1 <sup>ST</sup> Dakota Ss*	-396	6,438	6563
Lower Fruitland Coal				2 <sup>ND</sup> Dakota Ss*	-411	6,453	6578
Pictured Cliffs SS	3956	2,086	2122	3 <sup>RD</sup> Dakota Ss*	-475	6,517	6644
Lewis Shale	3777	2,265	2305	4 <sup>TH</sup> Dakota Ss*	-552	6,594	6722
Chacra SS**	2987	3,055	3111	5 <sup>TH</sup> Dakota Ss*	-574	6,616	6744
Cliffhouse SS	2396	3,646	3714	6 <sup>TH</sup> Dakota Ss*	-612	6,654	6783
Menefee	2304	3,738	3808	Burro Canyon Ss*	-667	6,709	6839
Point Lookout SS	1651	4,391	4474	Morrison Fm	-718	6,760	6891
Mancos Shale	1327	4,715	4804	<b>Total Depth</b>	-958	<b>7,000</b>	<b>7139</b>

\* Primary Objective    \*\* Secondary Objective

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

## 7. COMPANY PERSONNEL:

Name	Title	Office Phone	Home Phone
Jeff Patton	Drilling Engineer	505-324-1090	505-632-7882
John Egelston	Drilling Engineer	505-564-6734	505-330-6902
Dennis Elrod	Drilling foreman	505-486-6460	505-326-2024
Red Meek	Project Geologist	817-885-2800	817-427-2475
Barry Voigt	Reservoir Engineer	817-885-2462	817-540-2092

JWP  
11/2/05

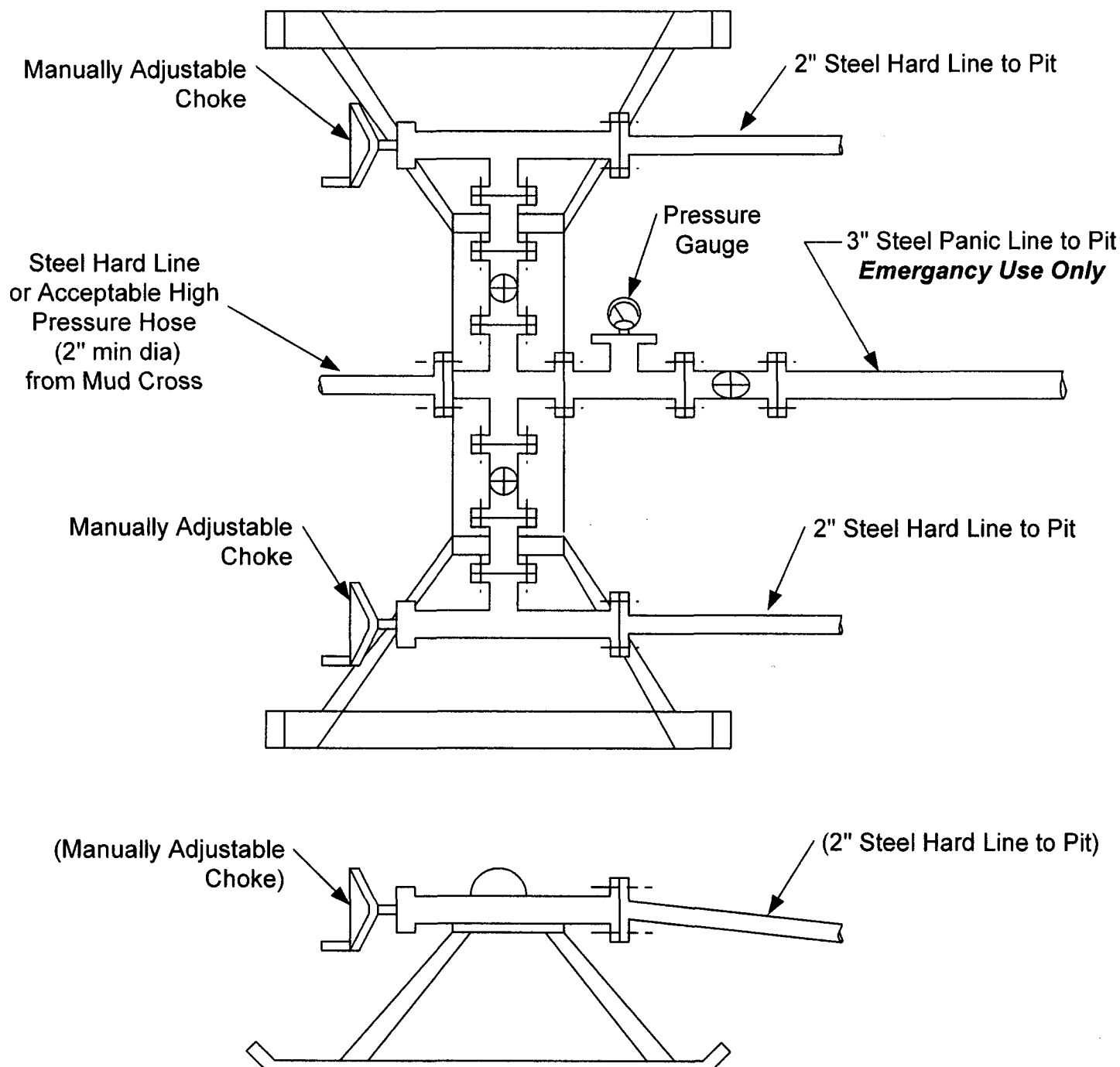
**EXHIBIT F**



# **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**



**EXHIBIT F**

# Davidson Gas Com G #1G

## Vertical Section

