

8091

OCD-ARTESIA

ATS-07-73

Form 3160-3  
(April 2004)

THIS IS A RE-ENTRY

S

FORM APPROVED  
OMB No. 1004-0137  
Expires March 31, 2007UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

OCD APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of Well: ☐ DRILL☒ REENTER1b. Type of Well: ☐ Oil Well ☒ Gas Well ☐ Other☒ Single Zone ☐ Multiple Zone2. Name of Operator  
LATIGO PETROLEUM, INC. (RICHARD WRIGHT 432-685-8140)3a. Address P.O. BOX 10340  
MIDLAND, TEXAS 79702-73403b. Phone No. (include area code)  
432-685-81004. Location of Well (Report location clearly and in accordance with any State requirements.)  
At surface 860' FNL & 1780' FWL SECTION 25 T19S-R21E EDDY CO. NM  
SUBJECT TO LIKE 660 FSL & 1980 FWL  
At proposed prod. zone APPROVAL BY STATE14. Distance in miles and direction from nearest town or post office\*  
Approximately 14 miles South of Hope New Mexico12. County or Parish  
EDDY CO.13. State  
NM15. Distance from proposed\* location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any)  
860' ROSWELL CONTROLLED WATER BASIN16. No. of acres in lease  
60017. Spacing Unit dedicated to this well  
32018. Distance from proposed location\* to nearest well, drilling, completed, applied for, on this lease, ft.  
1800'19. Proposed Depth  
MD-8075' TVD-4486±20. BLM/BIA Bond No. on file  
NMB-00018621. Elevations (Show whether DF, KDB, RT, GL, etc.)  
4181' GR.22. Approximate date work will start\*  
WHEN APPROVED23. Estimated duration  
20 Days to drill

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No.1, shall be attached to this form:

- Well plat certified by a registered surveyor.
- A Drilling Plan.
- A Surface Use Plan (if the location is on National Forest System Lands, the SUPO shall be filed with the appropriate Forest Service Office).
- Bond to cover the operations unless covered by an existing bond on file (see Item 20 above).
- Operator certification
- Such other site specific information and/or plans as may be required by the authorized officer.

25. Signature

Joe T. Janica

Name (Printed/Typed)

Joe T. Janica

Date

10/27/06

Title

Agent

Approved by (Signature)

/s/ Don Peterson

Name (Printed/Typed)

Nov 17 2008

Title

ACTING FIELD MANAGER

Office

CARLSBAD FIELD OFFICE

Application approval does not warrant  
conduct operations thereon.  
Conditions of approval, if any, are aIf earthen pits are used in  
association with the drilling of this  
well, an OCD pit permit must be  
obtained prior to pit construction.

hose rights in the subject lease which would entitle the applicant to

APPROVAL FOR 1 YEAR

Title 18 U.S.C. Section 1001 and Title  
States any false, fictitious or fraudulentgly and willfully to make to any department or agency of the United  
fiction.

\*(Instructions on page 2)

SEE ATTACHED FOR  
CONDITIONS OF APPROVALAPPROVAL SUBJECT TO  
GENERAL REQUIREMENTS  
AND SPECIAL STIPULATIONS  
ATTACHED

## DISTRICT I

1625 N. FRENCH DR., HOBBS, NM 88240

## State of New Mexico

Energy, Minerals and Natural Resources Department

Form C-102

## DISTRICT II

1301 W. GRAND AVENUE, ARTESIA, NM 88210

OIL CONSERVATION DIVISION  
1220 SOUTH ST. FRANCIS DR.  
Santa Fe, New Mexico 87505Revised 10/18/2003  
Submit to Appropriate District Office

State Lease - 4 Copies

Fee Lease - 3 Copies

## DISTRICT III

1000 Rio Brazos Rd., Aztec, NM 87410

## DISTRICT IV

1220 S. ST. FRANCIS DR., SANTA FE, NM 87505

## WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number	Pool Code 97489	Pool Name -WILDCAT WOLFCAMP
Property Code	Property Name HIGHLANDS 25 FEDERAL	Well Number 2
OGRID No. 227001	Operator Name LATIGO PETROLEUM, INC.	Elevation 4181'

## Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
C	25	19-S	21-E		860	NORTH	1780	WEST	EDDY

## 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
N	25	19-S	21-E		660	SOUTH	1980	WEST	EDDY

Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
320			

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

	<p>GEODETIC COORDINATES NAD 27 NME SURFACE HOLE LOCATION Y=595415 N X=371763 E</p> <p>LAT.=32.6362° N LONG.=104.7499° W</p> <p>PRODUCING AREA</p> <p>PROJECT AREA</p> <p>NOTE: ALL COORDINATE VALUES ARE SCALED.</p> <p>BOTTOM HOLE LOCATION NAD 27 NME Y=591655 N X=371962 E</p> <p>LAT.=32.6259° N LONG.=104.7492° W</p>	<p><b>OPERATOR CERTIFICATION</b></p> <p>I hereby certify that the information 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 mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.</p> <p><i>Joe T. Janica</i> Signature Date 10/27/06 Joe T. Janica Printed Name Agent</p> <p><b>SURVEYOR CERTIFICATION</b></p> <p>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.</p> <p>MARCH 13, 2002</p> <p>Date Surveyed: LA REV: 10/19/06 Signature &amp; Seal of Professional Surveyor <i>Gary E. Eidson</i> 10/19/06 06.11.1610 Certificate No. GARY EIDSON 12641 RONALD J. EIDSON 3239</p>
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EXHIBIT "A"

## HIGHLANDS 25 FED # 2

**Summary: Re enter existing plugged Latigo well. Drill out cement plugs to 4115'. Spot 100 sk plug. Dress off to KOP @  $\pm$  4050'. Run Gyro.**

**TIH w/ Kickoff assembly and drill curve.**

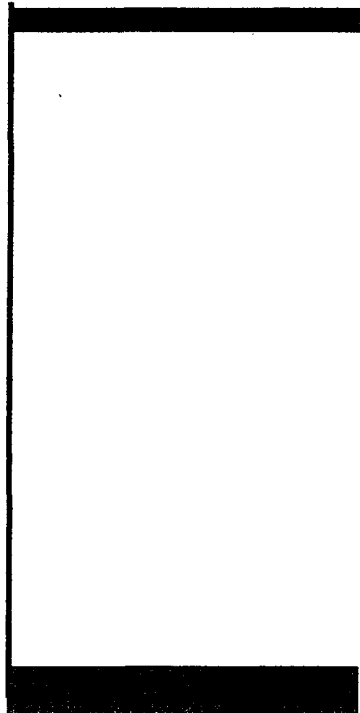
**Drill lateral to 660 FSL & 1980 FWL. Total MD should be 8075' & TVD should be 44**

STEPS	DESCRIPTION
1	LOCATE WELL HEAD. DIG OUT CELLAR. INSTALL HEAD ON 9 5/8" CASING. N/U BOP'S.
2	RIH W/ 8 1/2" BIT & BHA CLEANING OUT PLUGS TO 4114'. POH
3	RIH OPEN ENDED. Run Gyro. Spot 100 SK CEMENT PLUG. POH.
4	TIH W/ 8 1/2" BIT & DRILL CEMENT TO KOP OF $\pm$ 4050. POH.
6	RIH W/ DIRECTIONAL TOOLS & DRILL CURVE W/ 8 1/2" BIT & MWD/LWD. POH.
7	RIH W/ 7 7/8" BIT & LATERAL DRILLING ASSEMBLY. DRILL LATERAL AS DIRECTED IN WLFCMP
8	POH. RUN 5 1/2" PRODUCTION CASING (5 1/2" 17# L-80) BTC THROUGH CURVE. CEMENT SAME.
9	R/D M/O ROTARY TOOLS.
10	MIRU WELL SERVICE UNIT. CLEAN OUT LATERAL. DISPLACE W/ 2% KCL FW.
11	PERFORATE LATERAL W/ TCP GUN WHILE BREAKING DOWN W/ ACID.
12	FRAC WELL DOWN CASING AS DIRECTED. FLOW BACK WELL

## HIGHLANDS 25 FEDERAL # 2

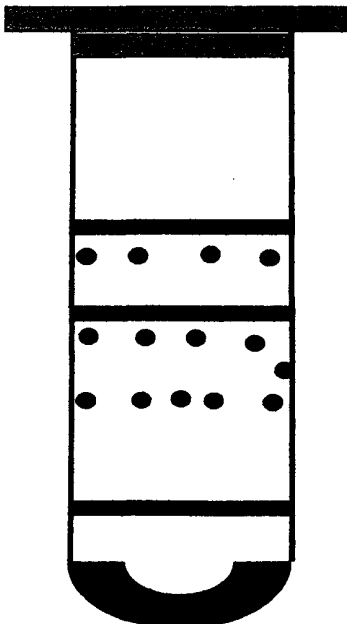
ORIGINAL API # 30 015 32311

20 SK SURFACE PLUG



CMT'D W/ 700 SKS "C" FOAM  
MIXED @ 9.0 PPG, TAILED W/  
200 SKS "C" MIXED 14.8 PPG  
CIRC 296 SKS TO PIT

9 5/8" 36# K-55 CASING @ 1456'  
SPOT 35 SK PLUG @ 1507'. TAGGED @ 13



35 SK PLUG. TAGGED @ 4114'  
TOP OF 5 1/2" CSG @ 4200'  
CMT PLUG 5935' - 6100' ( 50 SKS)

CIBP @ 6957' + 35' CMT.  
6997' - 7008' & 7104' - 7022'

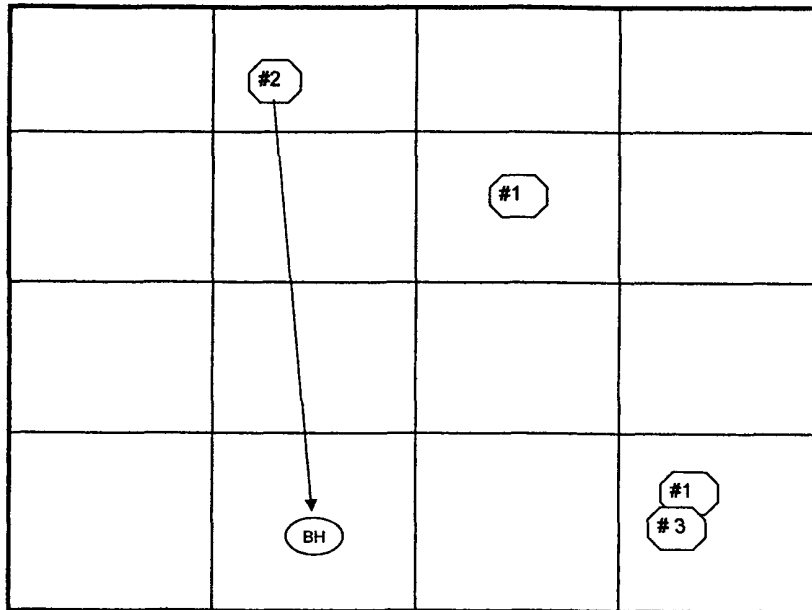
CIBP @ 7150' + 35' CMT.  
STWN 7204-7234

MRW 7578' - 7584'

5 1/2" FC @ 7908'  
5 1/2" 17# N-80 @ 7950'

# HIGHLANDS 25 FED Well Goupings

Sec 25, T-19-S, R-21-E, Eddy County, New Mexico



Well Name	Legal Location in 19	Depth and Strata	Current Prod Zone	
HIGHLANDS 25 FD # 2	860 FNL & 1780 FWL	RE ENTER & HRZ WLFCP	P&A'D	LATIGO
HIGHLANDS 25 FD # 1	1900 FNL & 1980 FEL	TD= 8000 MORROW	ATOKA PRODUCER	LATIGO
HIGHLANDS 25 FD # 3	760 FSL & 990 FEL	MORROW PROPOSAL	NOT DRILLED	LATIGO
FEDERAL 25 # 1	810 FSL & 810 FEL	YATES TEST	D&A	MITCHELL

COPYRIGHT 1990 MITCHELL ENGINEERING, PO BOX 1492, GOLDEN, CO, 80402, USA (303) 273 3744

**LONG's METHOD OF SURVEY COMPUTATION****OBLIQUE CIRCULAR ARC INTERPOLATION**

0	MD OF INTERPOLATION DEPTH,(feet)
#N/A	TVD COORDINATE OF THE DEPTH (feet)
#N/A	N/S COORDINATE OF DEPTH (feet)
#N/A	E/W COORDINATE OF DEPTH (feet)

3 D DISTANCE BETWEEN STATION A AND STATION B

**DISTANCE TABLE**

STATION A	STATION B
0.00	ft

**TABLE OF SURVEY STATIONS**

Calculator =

STA #	ΔMD ft	INCL deg	AZIM deg	MD ft	TVD ft	N+S- ft	E+W- ft	DLS deg/100FT
1	TIE POINT =>	0	0	4055.00	4055.00	0.00	0.00	-
2	100	12	176.9555	4155.00	4154.27	-10.42	0.55	12.00
3	100	24	176.9555	4255.00	4249.20	-41.22	2.19	12.00
4	100	36	176.9555	4355.00	4335.65	-91.06	4.84	12.00
5	100	48	176.9555	4455.00	4409.83	-157.76	8.39	12.00
6	20	60	176.9555	4475.00	4421.56	-173.88	9.25	60.00
7	100	72	176.9555	4575.00	4462.16	-264.94	14.09	12.00
8	100	84	176.9555	4675.00	4482.91	-362.44	19.28	12.00
9	50	90	176.9555	4725.00	4485.53	-412.28	21.93	12.00
10	100	90	176.9555	4825.00	4485.53	-512.14	27.24	0.00
11	100	90	176.9555	4925.00	4485.53	-612.00	32.55	0.00
12	100	90	176.9555	5025.00	4485.53	-711.86	37.86	0.00
13	100	90	176.9555	5125.00	4485.53	-811.71	43.17	0.00
14	100	90	176.9555	5225.00	4485.53	-911.57	48.48	0.00
15	100	90	176.9555	5325.00	4485.53	-1011.43	53.79	0.00
16	100	90	176.9555	5425.00	4485.53	-1111.29	59.11	0.00
17	100	90	176.9555	5525.00	4485.53	-1211.15	64.42	0.00
18	100	90	176.9555	5625.00	4485.53	-1311.01	69.73	0.00
19	100	90	176.9555	5725.00	4485.53	-1410.87	75.04	0.00
20	100	90	176.9555	5825.00	4485.53	-1510.73	80.35	0.00
21	100	90	176.9555	5925.00	4485.53	-1610.59	85.66	0.00
22	100	90	176.9555	6025.00	4485.53	-1710.44	90.97	0.00
23	100	90	176.9555	6125.00	4485.53	-1810.30	96.28	0.00
24	100	90	176.9555	6225.00	4485.53	-1910.16	101.59	0.00
25	1000	90	176.9555	7225.00	4485.53	-2908.75	154.71	0.00
26	850	90	176.9555	8075.00	4485.53	-3757.55	199.85	0.00
27								
28								
29								
30								
31								
32								
33								
34								

APPLICATION TO DRILL

LATIGO PETROLEUM, INC.  
HIGHLAND "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM

In response to questions asked under Section II of Bulletin NTL-6, the following information on the above well is provided for your information.

1. LOCATION: 860' FNL & 1780' FWL SECTION 25 T19S-R21E
2. ELEVATION ABOVE SEA LEVEL: 4181' GR.
3. GEOLOGIC NAME OF SURFACE FORMATION: Quaternary Aeolian Deposits.
4. DRILLING TOOLS AND ASSOCIATED EQUIPMENT: Conventional rotary drilling rig using drilling mud as a circulating medium for solids removal from hole.
5. PROPOSED DRILLING DEPTH: TVD-4486±' MD-8075±'
6. ESTIMATED TOPS OF GEOLOGICAL MARKERS:

San Andres	480'	Abo	3810'
Glorietta	1575'	Wolfcamp	4450'
Tubb	3080'		
7. POSSIBLE MINERAL BEARING FORMATION:

Wolfcamp	Gas
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8. CASING PROGRAM:

Hole Size	Interval	OD of Casing	Weight	Thread	Collar	Grade
12 1/4"	0-1456'*	9 5/8"	36#	8-R	ST&C	J-55
8 3/4"	0-7950'*	5 1/2"	17#	*-R	LT&C	N-80

\* This casing was set in the original well bore.

# APPLICATION TO DRILL

LATIGO PETROLEUM, INC.  
 HIGHLAND "25" FEDERAL # 2  
 UNIT "C" SECTION 25  
 T19S-R21E EDDY CO. NM

## 9. CASING CEMENTING & SETTING DEPT

9 5/8"	Surface	This string of casing is already in place and cemented to surface.
5 1/2"	Production	Run and set 8075' of 5 1/2" 17# N-80 LT&C casing. cement with 1000 Sx. of Class "C" cement + additives. Estimate top of cement 1000' from surface.

10. PRESSURE CONTROL EQUIPMENT: Exhibit "E" shows a 900 Series 3000 PSI working pressure B.O.P., consisting of an annular bag type preventor, middle blind rams and bottom pipe rams. The B.O.P. will be nipped up on the 13 3/8" casing and tested to API specifications. The B.O.P. will be operated at least once in each 24 hour period and the blind rams will be operated when drill pipe is out of hole on trips. Full opening stabbing valve and upper kelly cock will be utilized. Exhibit "E-1" shows a hydraulically operated closing unit and a 2" 3000 PSI choke manifold with dual adjustable chokes. No abnormal pressures or temperatures are expected.

## 11. PROPOSED MUD CIRCULATING SYSTEM:

DEPTH	MUD WT.	VISC.	FLUID LOSS	TYPE MUD SYSTEM
0-8075'	9.8-10.0	29-38	NC	Cut brine mud system

Sufficient mud materials will be kept on location at all times in order to combat lost circulation, or unexpected kicks. In order to run DST's, open hole logs, and casing viscosity and/or water loss may have to be adjusted to meet these needs.



APPLICATION TO DRILL

LATIGO PETROLEUM, INC.  
HIGHLAND "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM

12. LOGGING, CORING, AND TESTING PROGRAM:

- A. Clean out hole and run Gyro.
- B. Use logs that were run in original hole.

13. POTENTIAL HAZARDS:

No abnormal pressures or temperatures are expected. There is no known presence of H<sup>2</sup>S in this area. If H<sup>2</sup>S is encountered the operator will comply with the provisions of Onshore Oil and Gas Order No. 6. No lost circulation is expected to occur. All personnel will be familiar with all aspects of safe operation of equipment being used to drill this well. Estimated BHP 2300 PSI, and Estimated BHT 180°±.

14. ANTICIPATED STARTING DATE AND DURATION OF OPERATION:

Road and location construction will begin after the BLM has approved the APD. Anticipated spud date will be as soon after BLM approval and as soon as a rig will be available. Move in operation and drilling is expected to take 18 days. If production casing is run then an additional 30 days will be needed to complete well and construct surface facilities and/or lay flowlines in order to place well on production.

15. OTHER FACETS OF OPERATIONS:

After running casing, cased hole Gamma Ray, Neutron Collar logs will be run from TD back to all possible productive zones. The Abo formation will be perforated and stimulated in order to establish production. The well will be swab tested and potentialized as a gas well.

## HYDROGEN SULFIDE DRILLING OPERATIONS PLAN

1. All Company and Contract personnel admitted on location must be trained by a qualified H<sub>2</sub>S safety instructor to the following:
  - A. Characteristics of H<sub>2</sub>S
  - B. Physical effects and hazards
  - C. Proper use of safety equipment and life support systems.
  - D. Principle and operation of H<sub>2</sub>S detectors, warning system and briefing areas.
  - E. Evacuation procedure, routes and first aid.
  - F. Proper use of 30 minute pressure demand air pack.
2. H<sub>2</sub>S Detection and Alarm Systems
  - A. H<sub>2</sub>S detectors and audio alarm system to be located at bell nipple, end of blooie line (mud pit) and on derrick floor or doghouse.
3. Windsock and/or wind streamers
  - A. Windsock at mudpit area should be high enough to be visible.
  - B. Windsock at briefing area should be high enough to be visible.
  - C. There should be a windsock at entrance to location.
4. Condition Flags and Signs
  - A. Warning sign on access road to location.
  - B. Flags to be displayed on sign at entrance to location. Green flag, normal safe condition. Yellow flag indicates potential pressure and danger. Red flag, danger, H<sub>2</sub>S present in dangerous concentration. Only emergency personnel admitted to location.
5. Well control equipment
  - A. See exhibit "E"
6. Communication
  - A. While working under masks chalkboards will be used for communication.
  - B. Hand signals will be used where chalk board is inappropriate.
  - C. Two way radio will be used to communicate off location in case of emergency help is required. In most cases cellular telephoned will be available at most drilling foreman's trailer or living quarters.
7. Drillstem Testing
  - A. Exhausts will be watered.
  - B. Flare line will be equipped with an electric ignitor or a propane pilot light in case gas reaches the surface.
  - C. If location is near any dwelling a closed D.S.T. will be performed.

## HYDROGEN SULFIDE DRILLING OPERATIONS PLAN

8. Drilling contractor supervisor will be required to be familiar with the effects  $H_2S$  has on tubular goods and other mechanical equipment.
9. If  $H_2S$  is encountered, mud system will be altered if necessary to maintain control of formation. A mud gas separator will be brought into service along with  $H_2S$  scavengers if necessary.

SURFACE USE PLAN

LATIGO PETROLEUM, INC.  
HIGHLANDS "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM

1. EXISTING ROADS: Area maps, Exhibit "B" is a reproduction of a County General Highway Map. Exhibit "C" is a reproduction of a USGS Topographic Map, showing existing roads and proposed roads. All existing roads will be maintained in a condition equal to or better than current conditions. Any new roads will be constructed to BLM specifications.
  - A. Exhibit "A" shows the proposed well site as staked.
  - B. From Hope New Mexico take CR-12 (Armstrong Road) South 7± miles, bear Left go 6.3± miles to Siegreast Road, turn Right (West) go 1.5± miles to cattle pens, continue West 1± mile and location is on the North side of road.
  - C. Exhibit "C" is a topographic map showing roads and proposed pipeline routes.
2. PLANNED ACCESS ROADS: No additional roads will be required.
  - A. The access road will be crowned and dirched to a 12'00" wide travel surface with a 40' right-of-way.
  - B. Gradient on all roads will be less than 5.00%.
  - C. Turn outs will be constructed where necessary.
  - D. If needed, road will be surfaced with a minimum of 4" of caliche. This material will be obtained from a local source.
  - E. Centerline for the new access road has been flagged. Earthwork will be as required by field conditions.
  - F. Culverts in the access road will not be used. The road will be constructed to utilize low water crossings for drainage as required by the Topography.
3. LOCATION OF EXISTING WELLS IN A ONE-MILE RADIUS EXHIBIT "A-1"

A. Water wells	-	One approximately 1.2 miles South-East of location.
B. Disposal wells	-	None known
C. Drilling wells	-	None Known
D. Producing wells	-	As shown on Exhibit "A-1"
E. Abandoned wells	-	As shown on Exhibit "A-1"

## SURFACE USE PLAN

LATIGO PETROLEUM, INC.  
HIGHLANDS "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM

4. If on completion this well is a producer the operator will lay pipelines and construct powerlines along existing road R-O-W's or other existing R-O-W's. Possible routes of pipelines, flowlines and powerlines are shown on Exhibit "C".

### 5. LOCATION AND TYPE OF WATER SUPPLY:

Water will be purchased locally from a commercial source and trucked over the access roads or piped to location in flexible lines laid on top of the ground.

### 6. SOURCE OF CONSTRUCTION MATERIAL:

If possible construction material will be obtained from the excavation of drill site, if additional material is needed it will be obtained from a local source and transported over the access roads as shown on Exhibit "C".

### 7. METHODS OF HANDLING WASTE MATERIAL:

- A. Drill cuttings will be disposed of in the reserve pits.
- B. All trash, junk and other waste material will be contained in trash cages or trash bins to prevent scattering. When the job is completed all contents will be removed and disposed of in a approved sanitary land fill.
- C. Salts remaining after completion of well will be picked up by the supplier, including broken sacks.
- D. Waste water from living quarters will be drained into holes with a minium of 10'. These holes will be covered during drilling and will be back filled when the well is completed. A Porto-John will be provided for the rig crews. This equipment will be properly maintained during the drilling and completion operations and will be removed when all operations are complete.
- E. Remaining drilling fluids will be allowed to evaporate in the reserve pits until the pits are dry enough to be broken out for furthed drying. If the drilling fluids do not evaporate in a reasonable time they will be hauled off by transports to a state approve disposal site. Later pips will be broken out to speed drying. Water produced during completion will be put in reserve pits. Oil and condensate produced will be put in storage tanks and sold.

### 8. ANCILLARY FACILITIES:

- A. No camps or air strips will be constructed on location.

## SURFACE USE PLAN

LATIGO PETROLEUM, INC.  
HIGHLANDS "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM

### 9. WELL SITE LAYOUT:

- A. Exhibit "D" shows the proposed well site layout.
- B. This Exhibit shows the location of reserve pit, sump pits, and living facilities.
- C. Mud pits in the active circulating system will be steel pits and the reserve pits will be unlined unless subsurface conditions encountered during pit construction indicate that a plastic liner is required to contain lateral migration.
- D. If needed the reserve pits will be lined with polyethelene. The pit liner will be no less than 6 mils thick and the liner will be extended at least 3 feet over the top of the dikes and secured in place to keep edge of liner in place.
- E. The reserve pit will be fenced on three sides and fenced with four strands of barbed wire during drilling and completion phases. The 4th side will be fenced after drilling operations are complete and the drilling rig has moved out. If the well is a producer the mud pits will remain fenced in until the mud has dried up enough to break out the pits and reclaimed according to BLM requirements.

### 10. PLANS FOR RESTORATION OF SURFACE:

Rehabilitation of the location and reserve pits will be allowed to dry properly, fluids may be moved and disposed of in accordance with article 7-E as previously noted. The pit area will then be leveled and contoured to conform to the original and surrounding area. Drainage systems, if any will be reshaped to the original configuration with provisions made to alleviate future erosion. In case of the well completed as a producer the drilling pad will be necessary to construct production facilities. After the area has been shaped and contoured top soil from the spoil pile will be placed over the disturbed area to the extent possible so that revegetation procedures can be accomplished to comply with the BLM specifications.

If the well is a dry hole the pad and road area will be contoured to match the existing terrain. Top soil will be spread to the extent possible and revegetation will be carried out according to the BLM specifications.

Should the well be a producer the previously noted procedures will apply to those areas which are not required for production facilities.

SURFACE USE PLAN

LATIGO PETROLEUM, INC.  
HIGHLANDS "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM

11. OTHER INFORMATION:

- A. Topography is within a low relief drainage system which runs to the East. Vegetation consists of mesquite trees, shinnery oak, snakeweed, native grasses, and other grasses.
- B. The surface and minerals are owned by the U.S. Department of Interior and is administered by The Bureau of Land Management. The surface is leased to ranchers that graze livestock. Other use for the land is the surface facilities required to produce oil and gas.
- C. An archaeological survey has been completed prior to drilling the well originally and has been filed with The Bureau of Land Management Carlsbad Field Office in Carlsbad, New Mexico.
- D. There are no dwellings within 2 miles of this location.

12. OPERATORS REPRESENTATIVE:

Before construction:

TIERRA EXPLORATION, INC.  
P.O. BOX 2188  
HOBBS, NEW MEXICO 88241  
JOE T. JANICA  
OFFICE PHONE 505-391-8503

During and after construction:

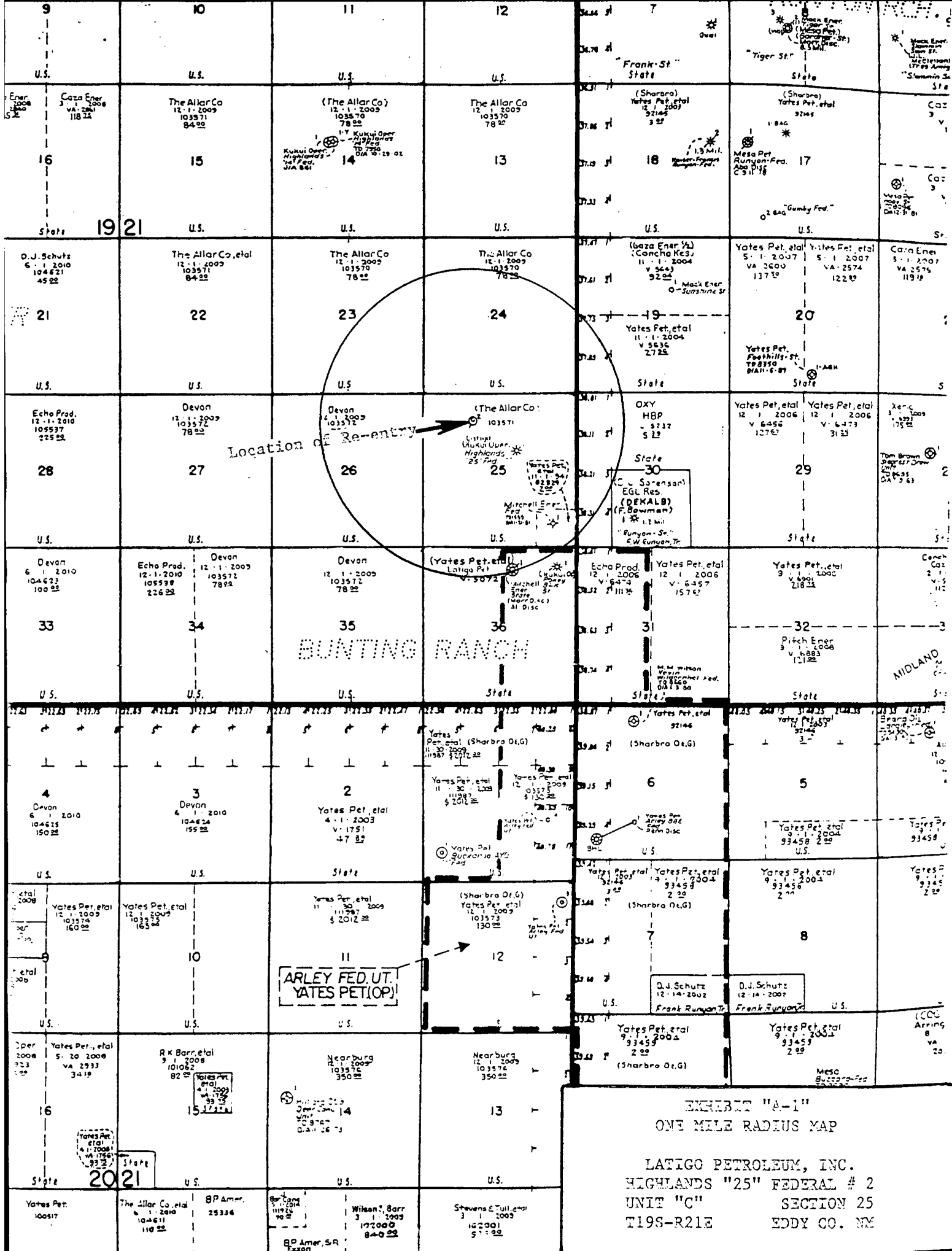
LATIGO PETROLEUM, INC.  
P.O. BOX 10340  
MIDLAND, TEXAS  
RICHARD WRIGHT  
OFFICE PHONE 432-685-8140

13. CERTIFICATION: I hereby certify that I or persons under my direct supervision have inspected the proposed drill site and access route, that I am familiar with the conditions which currently exist, that the statements made in this plan are to the best of my knowledge, are true and correct, and that the work associated with the operations proposed herein will be performed by LATIGO PETROLEUM, INC. it's contractors/subcontractors is in the conformity with this plan and the terms and conditions under which it is approved. This statement is subject to the provision of U.S.C. 1001 for the filing of a false statement.

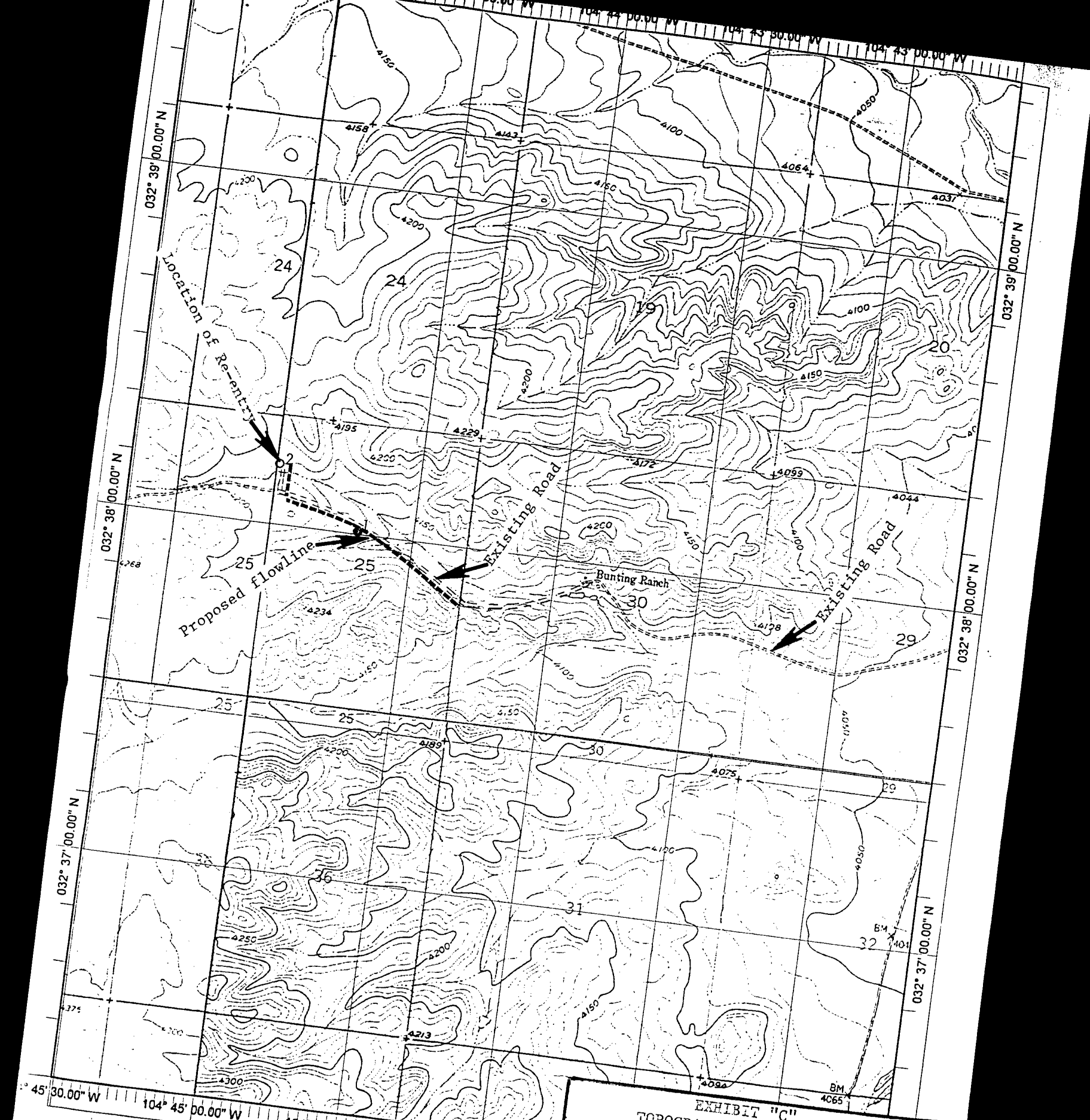
NAME : Joe T. Janica

DATE : 10/27/06

TITLE : Agent

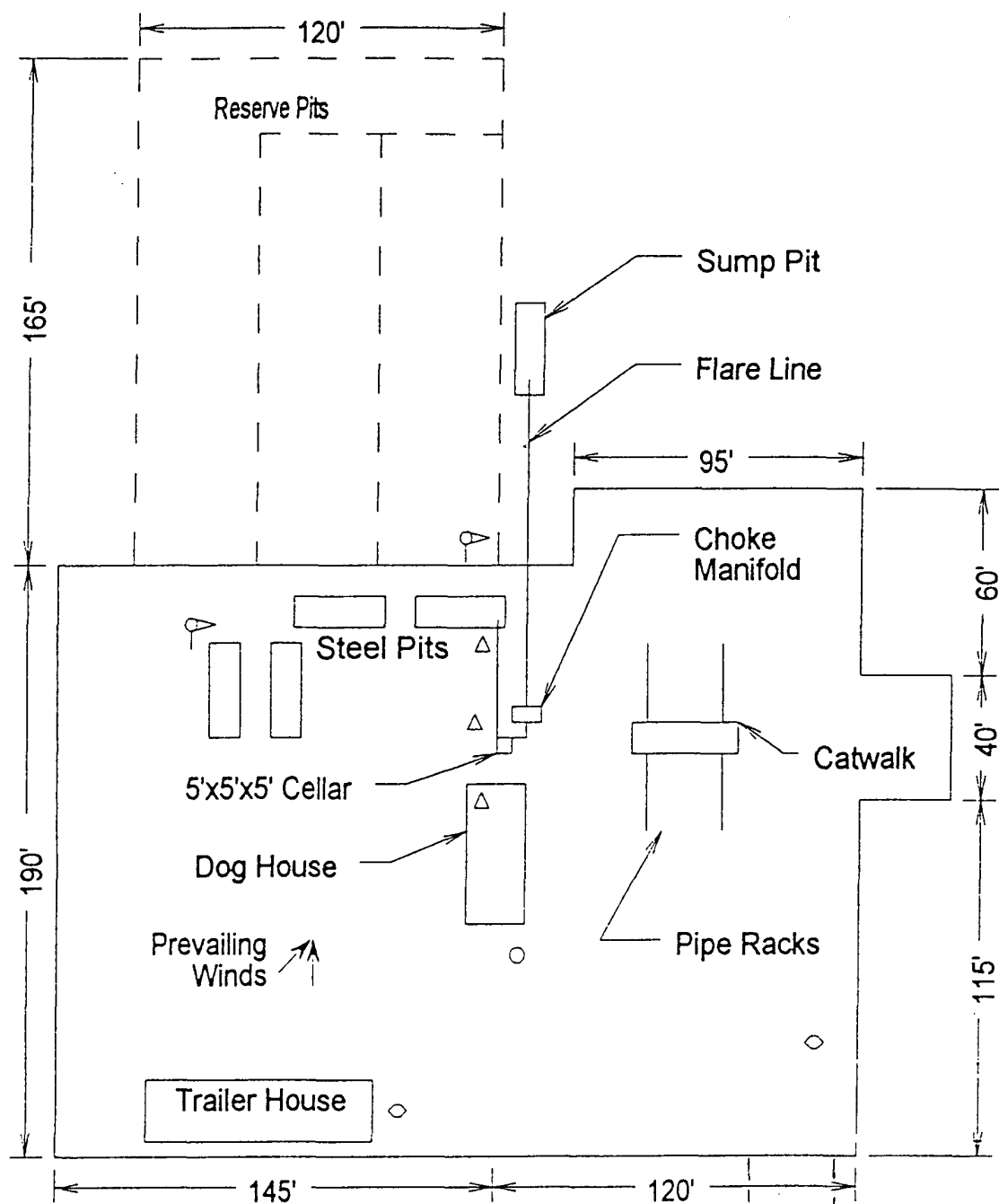






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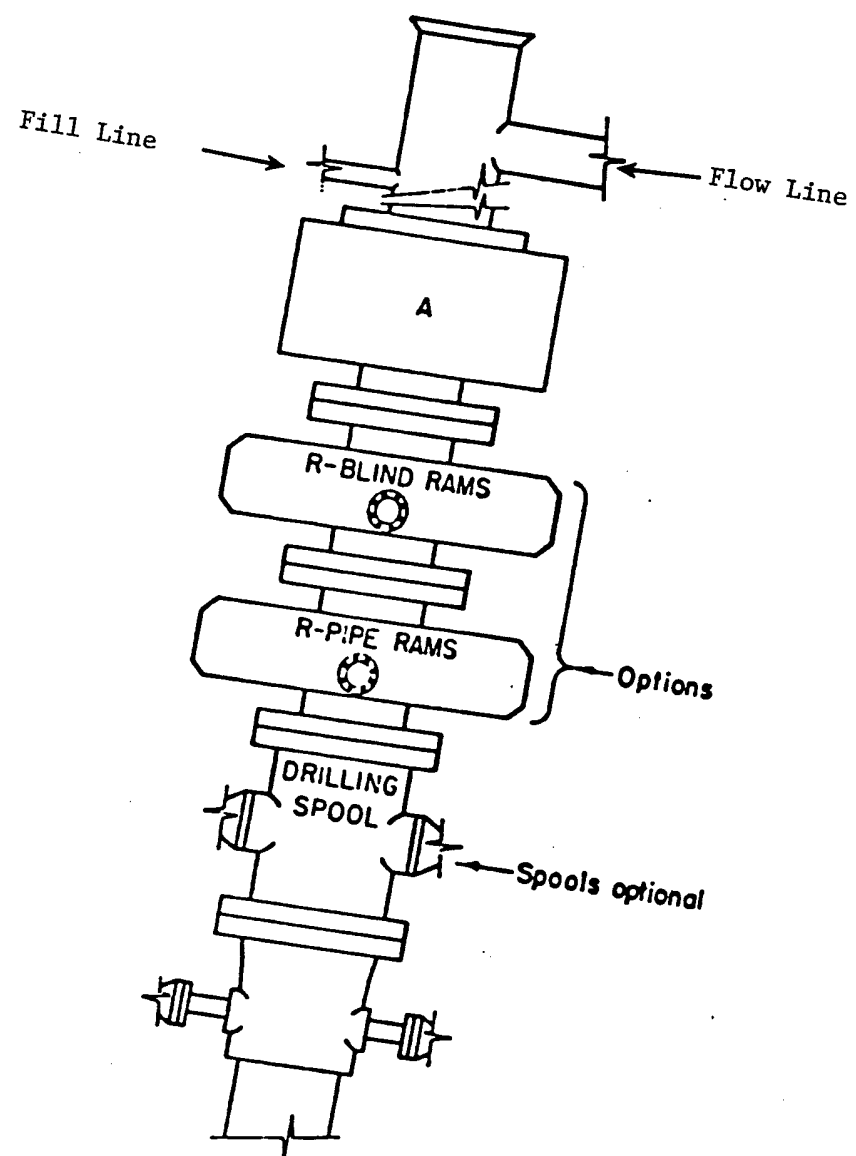
EXHIBIT "C"  
 TOPOGRAPHIC MAP SHOWING  
 ROADS & DIRECTIONS TO  
 LATIGO PETROLEUM, INC.  
 HIGHLANDS "25" FEDERAL # 2  
 UNIT "C" SECTION 25  
 T19S-R21E EDDY CO. NM



- Wind Direction Indicators  
(wind sock or streamers)
- △ H2S Monitors  
(alarms at bell nipple and shale shaker)
- Briefing Areas
- Remote BOP Closing Unit
- Sign and Condition Flags

EXHIBIT "D"  
RIG LAY OUT PLAT

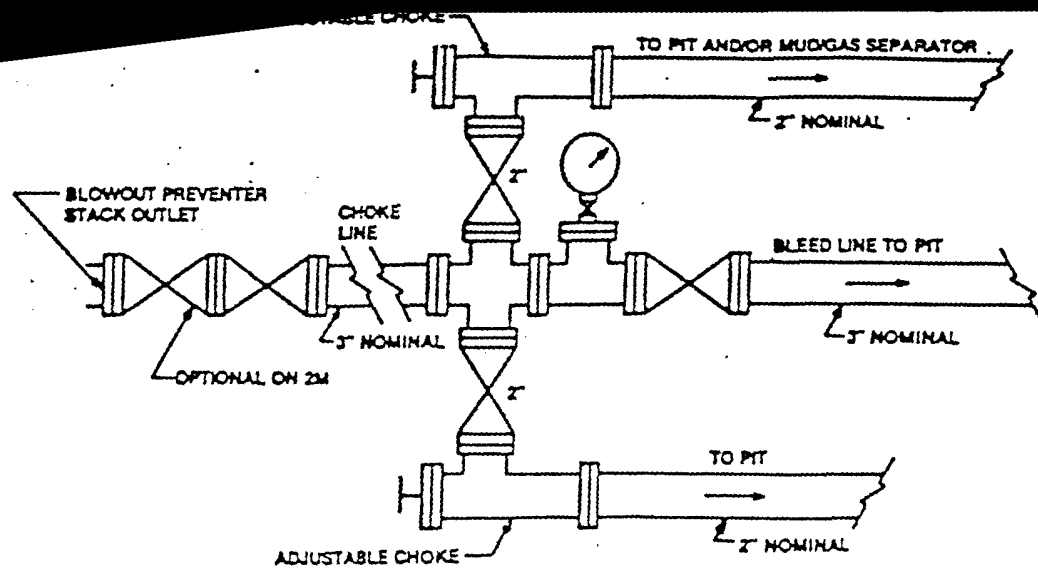
LATIGO PETROLEUM, INC.  
HIGHLANDS "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM



**ARRANGEMENT SRRA**

EXHIBIT "E"  
SKETCH OF B.O.P. TO BE USED ON

LATIGO PETROLEUM, INC.  
HIGHLANDS "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM



Typical choke manifold assembly for 3M WP system

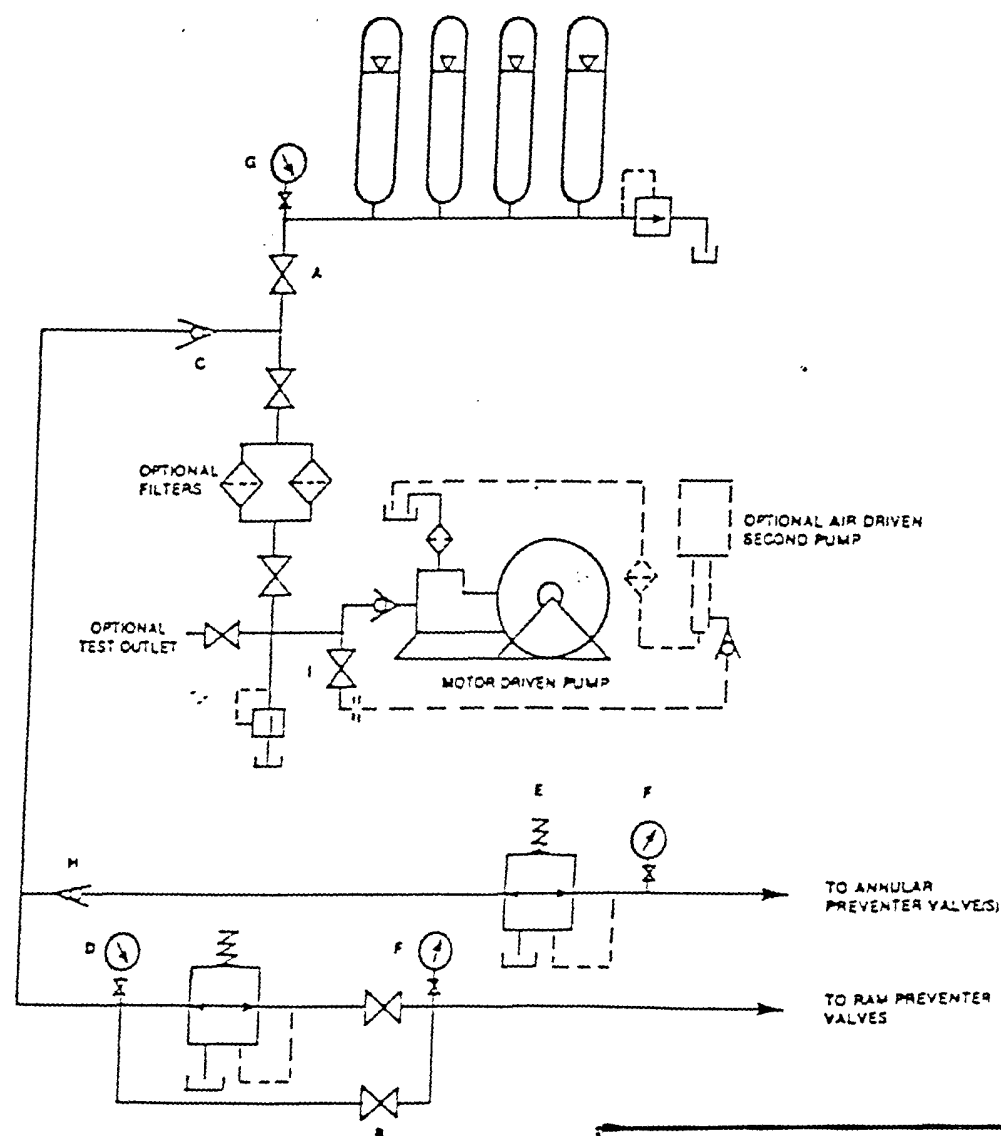


EXHIBIT "E-1"  
CHOKE MANIFOLD & CLOSING UNIT

LATIGO PETROLEUM, INC.  
HIGHLANDS "25" FEDERAL # 2  
UNIT "C" SECTION 25  
T19S-R21E EDDY CO. NM

## CONDITIONS OF APPROVAL - DRILLING

Well Name & No.      Highlands 25 Federal # 2  
Operator's Name:      Latigo Petroleum, Inc.  
Location:              860' FNL, 1780' FWL, SEC 25, T19S, R21E, Eddy County, NM  
BHL:                    660' FSL, 1980' FWL, SEC 25, T19S, R21E, Eddy County, NM  
Lease:                   NM- 103571

### I. DRILLING OPERATIONS REQUIREMENTS:

1. The Bureau of Land Management (BLM) is to be notified at the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220, (505) 361-2822 for wells in Eddy County; and the Hobbs Field Station, 414 West Taylor, Hobbs NM 88240, (505) 393-3612 for wells in Lea County, in sufficient time for a representative to witness:
  - A. Spudding
  - B. Cementing casing: 5 1/2 inch
  - C. BOP tests
2. A Hydrogen Sulfide (H<sub>2</sub>S) Drilling Plan should be activated prior to drilling into the N/A Formation. A copy of the plan shall be posted at the drilling site.
3. Unless the production casing has been run and cemented or the well has been properly plugged, the drilling rig shall not be removed from over the hole without prior approval.
4. Submit a Sundry Notice (Form 3160-5, one original and five copies) for each casing string, describing the casing and cementing operations. Include pertinent information such as; spud date, hole size, casing ( size, weight, grade and thread type), cement (type, quantity and top), water zones and problems or hazards encountered. The Sundry shall be submitted within 15 days of completion of each casing string. The reports may be combined into the same Sundry if they fall within the same 15 day time frame.
5. The API No. assigned to the well by NMOCD shall be included on the subsequent report of setting the first casing string.
6. A Communitization Agreement covering the acreage dedicated to this well must be filed for approval with the BLM. The effective date of the agreement shall be prior to any sales.
7. Gamma-Ray/Neutron logs shall be run from the base of the Salado Formation to the surface; cable speed not to exceed 30 feet per minute.

### II. CASING:

1. A CIT will be run on the existing 9 5/8 inch casing before drilling out the plug at the shoe of the casing.
2. The minimum required fill of cement behind the 5-1/2 inch production casing is cement shall be brought up at least 200 feet inside the 9 5/8 inc casing.
5. Whenever a casing string is cemented in the R-111-P Potash Area, cement shall be allowed to stand a minimum of twelve (12) hours under pressure and a total of twenty-four (24) hours before drilling the plug or initiating tests.

### **III. PRESSURE CONTROL:**

1. All BOP systems and related equipment shall comply with well control requirements as described in Onshore Oil and Gas Order No. 2. The BOP and related equipment shall be installed and operational before drilling below the 9 5/8 inch casing shoe and shall be tested as described in Onshore Order No. 2. Any equipment failing to test satisfactorily shall be repaired or replaced.

2. Minimum working pressure of the blowout preventer and related equipment (BOPE) is 2000 psi.

3. The appropriate BLM office shall be notified in sufficient time for a representative to witness the tests.

- A variance to test the \_\_\_\_\_ to the reduced pressure of \_\_\_\_\_psi with the rig pumps is approved.
- The tests shall be done by an independent service company.
- The results of the test shall be reported to the appropriate BLM office.
- Testing fluid must be water or an appropriate clear liquid suitable for sub-freezing temperatures. Use of drilling mud for testing is not permitted since it can mask small leaks.
- Testing must be done in a safe workman-like manner. Hard line connections shall be required.

**Engineers can be reached at 505-706-2779 for any variances that might be necessary.**

F Wright 11/03/06