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Form 3160-3  
(August 1999)

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

FORM APPROVED  
OMB No. 1004-0136  
Expires November 30, 2000

|   |   |   |
|---|---|---|
| 1a. Type of Work: <input checked="" type="checkbox"/> DRILL <input type="checkbox"/> REENTER  |   | 7. If Unit or CA Agreement, Name and No.<br>1-20                      |
| 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 type="checkbox"/> Multiple Zone |   | 8. Lease Name and Well No.<br>Catterson "SS" Fed. #8                  |
| 2. Name of Operator<br>YATES PETROLEUM CORPORATION 63575  |   | 9. API Well No.<br>30-005-63326                                       |
| 3a. Address<br>105 South 4th Street   | 3b. Phone No. (include area code)<br>(505) 748-1471 | 10. Field and Pool, or Exploratory<br>Wildcat Precambrian             |
| 4. Location of Well (Report location clearly and in accordance with any State requirements. *)<br>At surface 660' FSL and 1750' FWL, Unit Letter N<br>At proposed prod. zone                                |   | 11. Sec., T., R., M., or Blk. and Survey or Area<br>Sec. 21, T7S-R26E |
| 14. Distance in miles and direction from nearest town or post office*<br>20 miles E/NE of Roswell, New Mexico   |   | 12. County or Parish<br>Chaves  |
|   |   | 13. State<br>NM   |
| 15. Distance from proposed*<br>location to nearest<br>property or lease line, ft.<br>(Also to nearest drig. unit line, if any)  | 16. No. of Acres in lease<br>866.14                 | 17. Spacing Unit dedicated to this well<br>320                        |
| 18. Distance from proposed location*<br>to nearest well, drilling, completed,<br>applied for, on this lease, ft.  | 19. Proposed Depth<br>5355'                         | 20. BLM/BIA Bond No. on file<br>NM-2811                               |
| 21. Elevations (Show whether DF, KDB, RT, GL, etc.)<br>3699' GL   | 22. Approximate date work will start*<br>ASAP       | 23. Estimated duration<br>30 days                                     |

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<br><i>Pat Perez</i>           | Name (Printed/Typed)<br>PAT PEREZ | Date<br>8-31-2000   |
| Title<br>Permit Agent                       |                                   |                     |
| Approved by (Signature)<br><i>Pat Perez</i> | Name (Printed/Typed)<br>PAT PEREZ | Date<br>JAN 03 2001 |
| Title<br>Acting                             | Office<br>ROSWELL                 |                     |

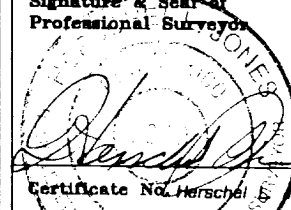
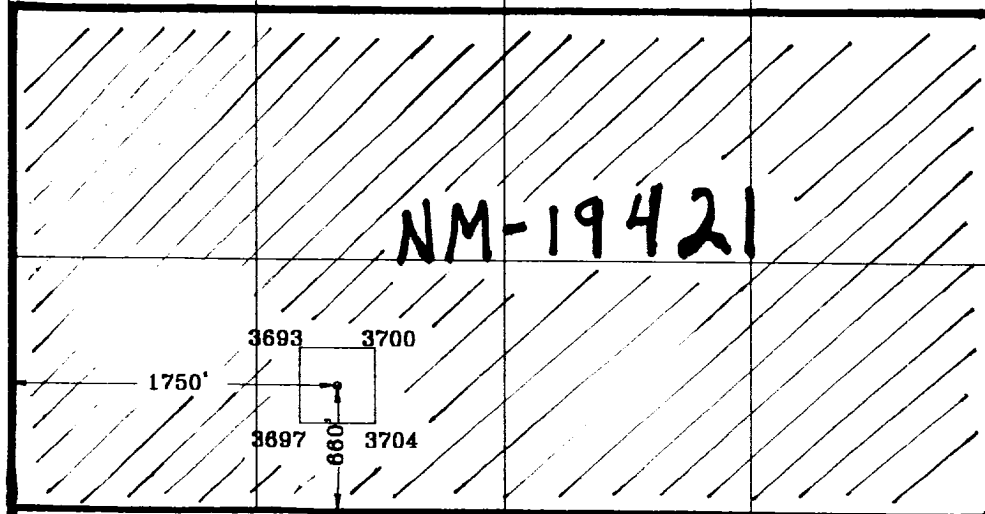
Application approval does not warrant or certify the the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

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 reverse)

APPROVAL SUBJECT TO  
GENERAL REQUIREMENTS AND  
SPECIAL STIPULATIONS

|   |  |  |  |  |
|---|--|--|--|--|
|   |  |  |  | <b>OPERATOR CERTIFICATION</b><br><br><i>I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.</i><br><br><u>Pat Perez</u><br>Signature<br><u>Pat Perez</u><br>Printed Name<br><u>Permit Agent</u><br>Title<br><u>5-31-2000</u><br>Date  |
|   |  |  |  | <b>SURVEYOR CERTIFICATION</b><br><br><i>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.</i><br><br><u>8/03/2000</u><br>Date Surveyed<br><u>Pat Perez</u><br>Signature & Seal of Professional Surveyor<br><br>Certificate No. <u>Herschel E. Jones RLS 3640</u><br><u>CATTERSON 8</u> DISK 32<br>GENERAL SURVEYING COMPANY |
|  |  |  |  |  |

**YATES PETROLEUM CORPORATION**  
**Catterson "SS" Federal #8**  
**660' FSL AND 1750' FWL**  
**Section 21, T7S-R26E**  
**Chaves County, New Mexico**

1. The estimated tops of geologic markers are as follows:

|            |       |
|------------|-------|
| San Andres | 715'  |
| Glorieta   | 1740' |
| Yeso       | 1865' |
| Tubb       | 3290' |
| Abo        | 3465' |
| Wolfcamp   | 4573' |
| Cisco      | 5140' |
| Basement   | 5255' |
| TD         | 5355' |

2. The estimated depths at which anticipated water, oil or gas formations are expected to be encountered:

|             |           |
|-------------|-----------|
| Water:      | 200'-300' |
| Oil or Gas: | 3682'     |

3. Pressure Control Equipment: BOPE will be installed on the 8 5/8" casing and rated for 2000# BOP systems will be consistent with API RP 53. Pressure tests will be conducted before drilling out from under all casing strings which are set and cemented in place. Blowout preventor controls will be installed prior to drilling the surface plug and will remain in use until the well is completed or abandoned. Preventors will be inspected and operated at least daily to ensure good mechanical working order, and this inspection recorded on the daily drilling report. See Exhibit B.

Auxiliary Equipment:

- A. Auxiliary Equipment: Kelly cock, pit level indicators, flow sensor equipment, and a sub with full opening valve to fit the drill pipe and collars will be available on the rig floor in the open position at all times for use when kelly is not in use.

4. THE PROPOSED CASING AND CEMENTING PROGRAM:

- A. Casing Program: (All New)

| <u>Hole Size</u> | <u>Casing Size</u> | <u>Wt./Ft</u> | <u>Grade</u> | <u>Thread</u> | <u>Coupling</u> | <u>Interval</u> | <u>Length</u> |
|------------------|--------------------|---------------|--------------|---------------|-----------------|-----------------|---------------|
| 12 1/4"          | 8 5/8"             | 24#           | J55          | 8RD           | ST&C            | 0-950'          | 950'          |
| 7 7/8"           | 5 1/2"             | 15.5#         | J55          | 8RD           | ST&C            | 0-5355'         | 5355'         |

1. Minimum Casing Design Factors: Collapse 1.125, Burst 1.0, Tensile Strength 1.80

**B. CEMENTING PROGRAM:**

Surface casing: Cement with 325 sx. Lite "C" (Yld 2.0 Wt. 12.5). Tail in with 200 sx "C" + 2% CaCl<sub>2</sub> (Yld 1.33 Wt. 15.6).

Production Casing: Cement with 350 sx ultralite "C" + 8# Silica Lite, 5# Salt (Yld 1.34 Wt 13). TOC 3200'

## 5. Mud Program and Auxiliary Equipment:

| <u>Interval</u> | <u>Type</u>      | <u>Weight</u> | <u>Viscosity</u> | <u>Fluid Loss</u> |
|-----------------|------------------|---------------|------------------|-------------------|
| 0-950'          | FW Gel/Paper/LCM | 8.6-9.6       | 32-36            | N/C               |
| 950'-5355'      | Brine            | 10-10.2       | 28               | N/C               |
| 5355'-TD        | Polyachrilamide  | 10-10.2       | 34-38            | <10cc             |

Sufficient mud material(s) to maintain mud properties, control lost circulation and contain a blow out will be available at the well site during drilling operations. Mud will be checked hourly by rig personnel.

## 6. EVALUATION PROGRAM:

Samples: 10' samples out from surface casing.

Logging: Platform Express, DLL/ND, CNL/LDT to surface, with GR/CNL to surface, Platform Express TD to surface.

Coring: None

DST's: None

## 7. Abnormal Conditions, Bottom hole pressure and potential hazards:

Anticipated BHP:

From: 0 To: 950' Anticipated Max. BHP: 400 PSI

From: 950' To: TD Anticipated Max. BHP: 2200 PSI

Abnormal Pressures Anticipated: None

Lost Circulation zones anticipated: None

H<sub>2</sub>S Zones Anticipated: None

Maximum Bottom Hole Temperature: 145 F

## 8. ANTICIPATED STARTING DATE:

Plans are to drill this well as soon as possible after receiving approval. It should take approximately 30 days to drill the well with completion taking another 15 days.

**MULTI-POINT SURFACE USE AND OPERATIONS PLAN**  
**Yates Petroleum Corporation**  
**Catterson "SS" Federal #8**  
**660' FSL and 1750' FWL**  
**Section 21, T7S-R26E**  
**Chaves County, New Mexico**

This plan is submitted with Form 3160-3, Application for Permit to Drill, covering the above described well. The purpose of this plan is to describe the location of the proposed well, the proposed construction activities and operations plan, the magnitude of the surface disturbance involved and the procedures to be followed in rehabilitating the surface after completion of the operations, so that a complete appraisal can be made of the environmental effect associated with the operations.

1. EXISTING ROADS:

Exhibit A is a portion of the BLM map showing the well and roads in the vicinity of the proposed location. The proposed wellsite is located approximately 22 miles northeast of Roswell New Mexico and the access route to the location is indicated in red and green on Exhibit A.

DIRECTIONS:

Proceed east of Roswell on Highway 70 approximately 15 miles to Aztec Road (next to the Acme Schoolhouse). Turn left (north) and go approximately 6 miles to Bayard Road, turn left (west) and drive approximately 1 mile to the cattle guard. Across the cattle guard about 300', the road is staked on the left (south) side. Approximately 750' from the road is the northeast corner of the well location.

2. PLANNED ACCESS ROAD

The proposed new access road will be approximately 14' in width and 750' in length from the point of origin to the northeast edge of the drilling pad. The road will lie in a north to south direction.

3. LOCATION OF EXISTING WELL

- A. There is drilling activity within a one-mile radius of the wellsite.
- B. Exhibit D shows existing wells within a one-mile radius of the proposed wellsite.

4. LOCATION OF EXISTING AND/OR PROPOSED FACILITIES

- A. There are production facilities on this lease at the present time.
- B. In the event that the well is productive, the necessary production facilities will be installed on the drilling pad. If the well is productive oil, a gas or diesel self-contained unit will be used to provide the necessary power. No power will be required if the well is productive of gas.

5. LOCATION AND TYPE OF WATER SUPPLY:

- A. It is planned to drill the proposed well with a fresh water system. The water will be obtained from commercial sources, possibly in Roswell, and will be hauled to the location by truck over the existing and proposed roads shown in Exhibit A.

**6. SOURCE OF CONSTRUCTION MATERIALS:**

The dirt contractor will be responsible for finding a source of material for construction of road and pad and will obtain any permits which may be required.

**7. METHODS OF HANDLING WASTE DISPOSAL:**

- A. Drill cuttings will be disposed of in the reserve pits.
- B. Drilling fluids will be allowed to evaporate in the reserve pits until the pits are dry.
- C. Water produced during operations will be collected in tanks until hauled to an approved disposal system, or separate disposal application will be submitted.
- D. Oil produced during operations will be stored in tanks until sold.
- E. Current laws and regulations pertaining to the disposal of human waste will be complied with.
- F. All trash, junk, and other waste materials will be contained in trash cages or bins to prevent scattering and will be removed and deposited in an approved sanitary land fill. Burial on site is not approved.

**8. ANCILLARY FACILITIES: NONE**

**9. WELLSITE LAYOUT:**

- A. Exhibit C shows the relative location and dimensions of the well pad, the reserve pits, the location of the drilling equipment, rig orientation and access road approach.
- B. The reserve pits will be plastic lined.
- C. A 400' x 400' area has been staked and flagged.
- D. The pits will be put to the northeast.

**10. PLANS FOR RESTORATION**

- A. After finishing drilling and/or completion operations, all equipment and other material not needed for further operations will be removed. The location will be cleaned of all trash and junk to leave the wellsite in as aesthetically pleasing a condition as possible.
- B. Unguarded pits, if any, containing fluids will be fenced until they have dried and been leveled.
- C. If the proposed well is non-productive, all rehabilitation and/or vegetation requirements of the Bureau of Land Management will be complied with and will be accomplished as expeditiously as possible. All pits will be filled level after they have evaporated and dried.

**SURFACE OWNERSHIP:** Carl W. and Pauline Madison - SW/4 U.S. – SE/4  
HC 31, Box 1327  
Roswell, New Mexico 88201

An agreement was reached with Mr. Madison concerning surface damages.

**12. OTHER INFORMATION:**

- A. Topography: Refer to the existing archaeological report for a description of the topography, flora, fauna, soil characteristics, dwellings, historical and cultural sites.
- B. The primary surface use is for grazing.

13. OPERATOR'S REPRESENTATIVE

A. Through A.P.D. Approval:

Randy G. Patterson, Land Manager  
Yates Petroleum Corporation  
105 South Fourth Street  
Artesia, New Mexico 88210  
Phone (505) 748-1471

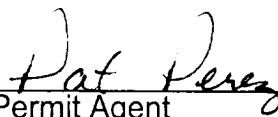
B. Through Drilling Operations,  
Completions and Production:

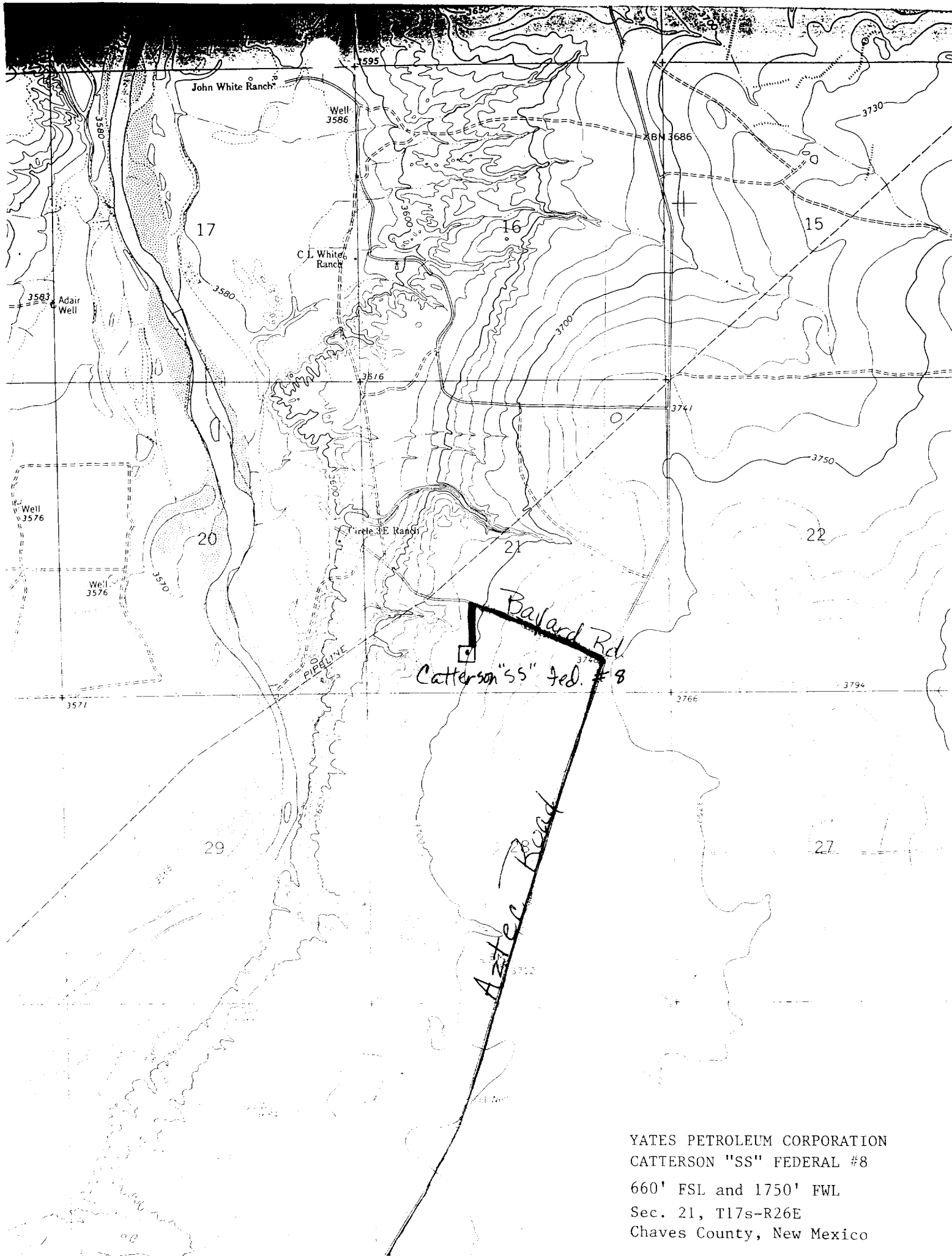
Brian Collins, Operations Manager  
Yates Petroleum Corporation  
105 South Fourth Street  
Artesia, New Mexico 88210  
Phone (505) 748-1471

14. 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 presently exist; that the statements made in this plan are to the best of my knowledge, true and correct; and , that the work associated with the operations proposed herein will be performed by Yates Petroleum Corporation and its contractors and subcontractors in conformity with this plan and the terms and conditions under which it is approved. This statement is subject to the provisions of 18 U.S.C. 1001 for the filing of a false statement.

8/31/00

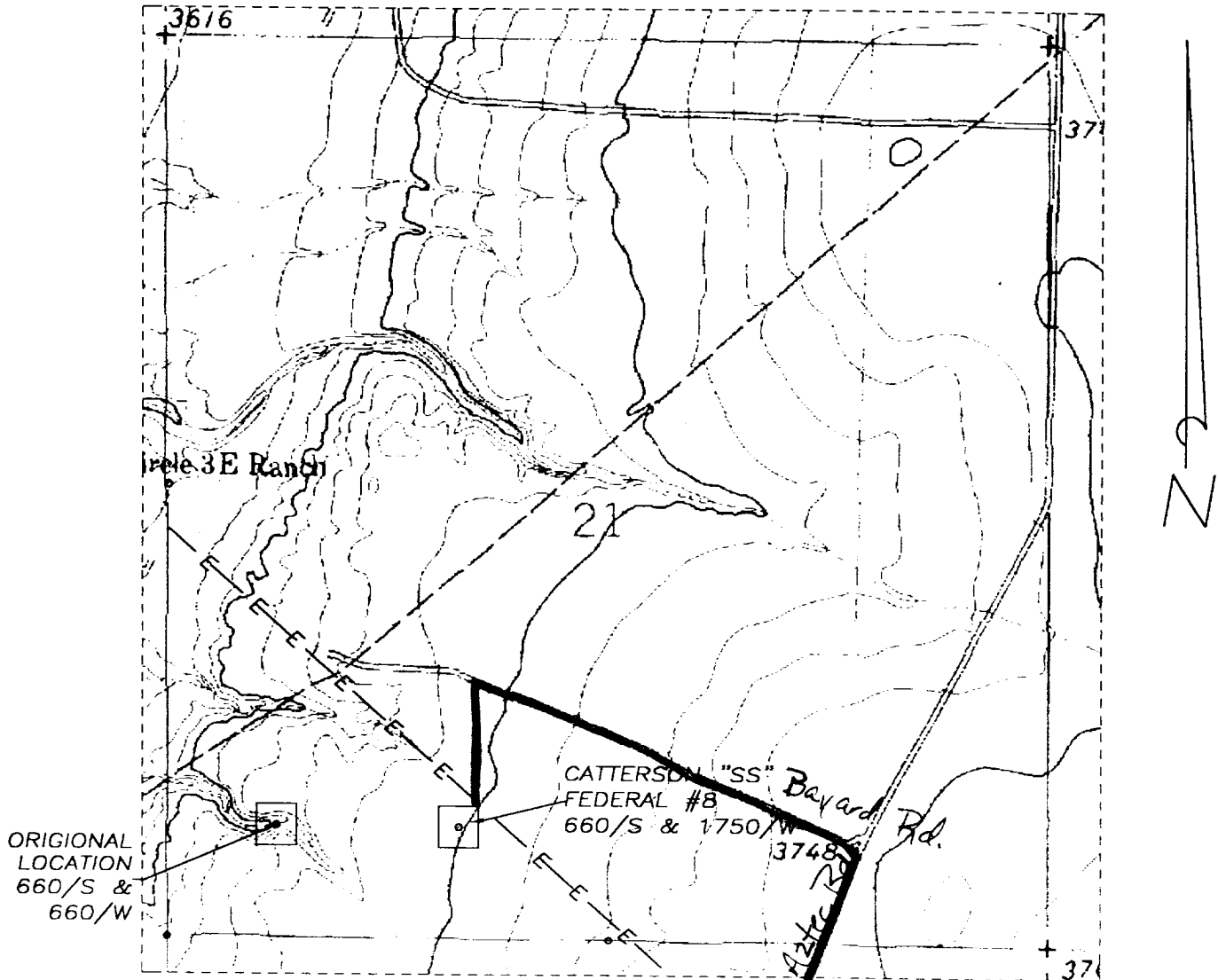
  
\_\_\_\_\_  
Permit Agent



YATES PETROLEUM CORPORATION  
CATTERSON "SS" FEDERAL #8  
660' FSL and 1750' FWL  
Sec. 21, T17S-R26E  
Chaves County, New Mexico



SECTION 21, TOWNSHIP 7 JTH, RANGE 26 EAST, NMPM, CHAVES COUNTY, NEW MEXICO.



YATES PETROLEUM CORP.

CATTERSON "SS" FED. #8

660' FSL and 1750' FWL

Sec. 21, T17S-R26E

Chaves County, New Mexico

EXHIBIT A-1

1000' 0 1000' 2000'  
Scale 1" = 50'

THE PREPARATION OF THIS PLAT AND THE PERFORMANCE OF THE SURVEY UPON WHICH IT IS BASED WERE DONE UNDER MY DIRECTION AND THE PLAT ACCURATELY DEPICTS THE RESULTS OF SAID SURVEY AND MEET THE REQUIREMENTS OF THE STANDARDS FOR LAND SURVEYS IN NEW MEXICO AS ADOPTED BY THE NEW MEXICO STATE BOARD OF REGISTRATION FOR PROFESSIONAL ENGINEERS AND LAND SURVEYORS.

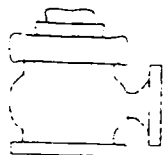
HERSCHEL L. JONES R.L.S. No. 3640

GENERAL SURVEYING COMPANY P.O. BOX 1928  
LOVINGTON, NEW MEXICO 88260

YATES PETROLEUM CORP.

LEASE ROAD TO ACCESS THE YATES CATTERSON "SS" FEDERAL #8 LOCATED IN SECTION 21, TOWNSHIP 7 SOUTH, RANGE 26 EAST, NMPM, CHAVES COUNTY, NEW MEXICO.

|                        |                             |
|------------------------|-----------------------------|
| Survey Date: 8/03/2000 | Sheet 1 of 1 Sheets         |
| Drawn By: Ed Blevins   | W.C. Number                 |
| Date: 8/04/00          | Scale 1" = 1000' CATTERSON8 |

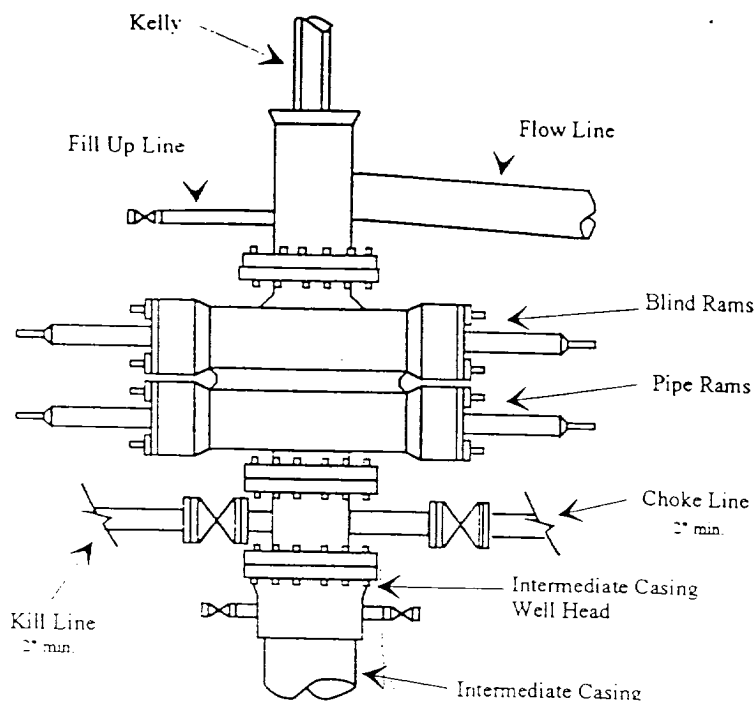


# Yates Petroleum Corporation

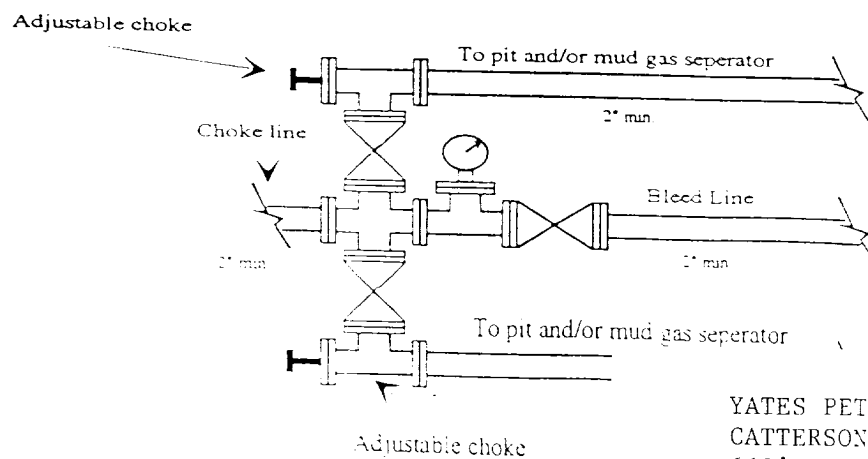
BOP-2

## Typical 2,000 psi Pressure System Schematic

### Double Ram Preventer Stack



Typical 2,000 psi choke manifold assembly with at least these minimum features



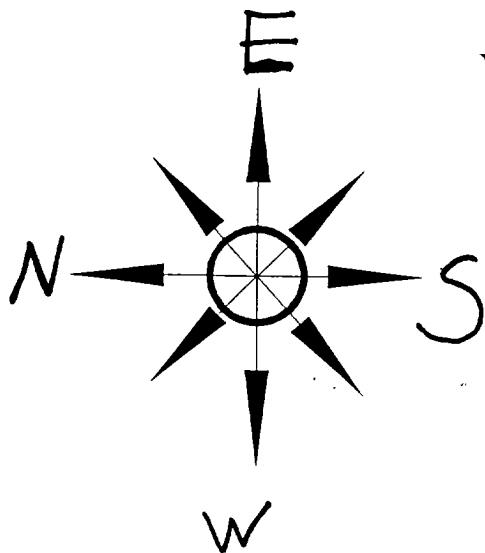
YATES PETROLEUM CORPORATION  
CATTERSON "SS" FED. #8  
660' FSL and 1750' FWL  
Sec. 21, T17S-R26E  
Chaves County, New Mexico

EVILDTM 2

# Yates Petroleum Corporation

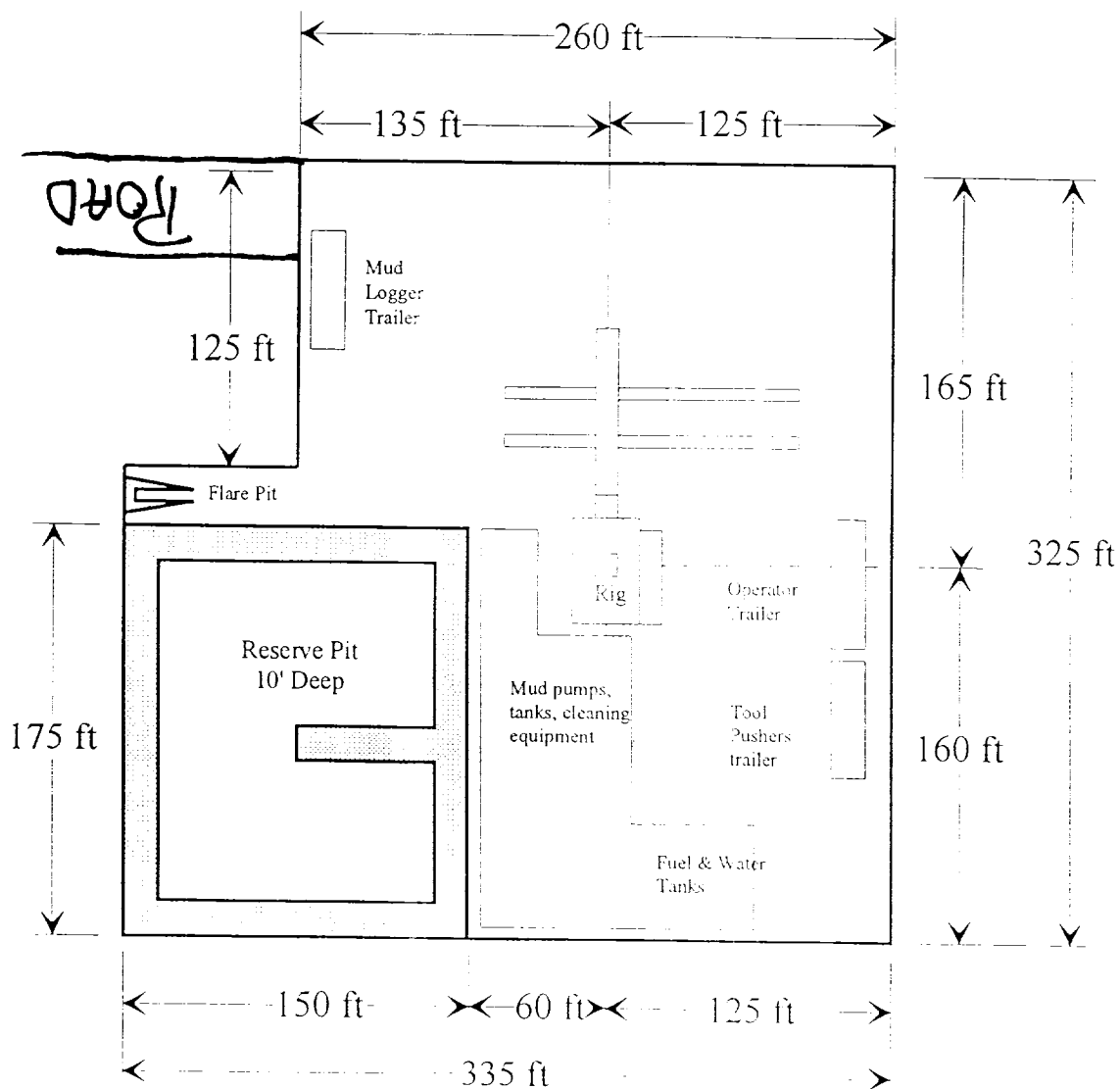
Location Layout for Permian Basin

Up to 12,000'



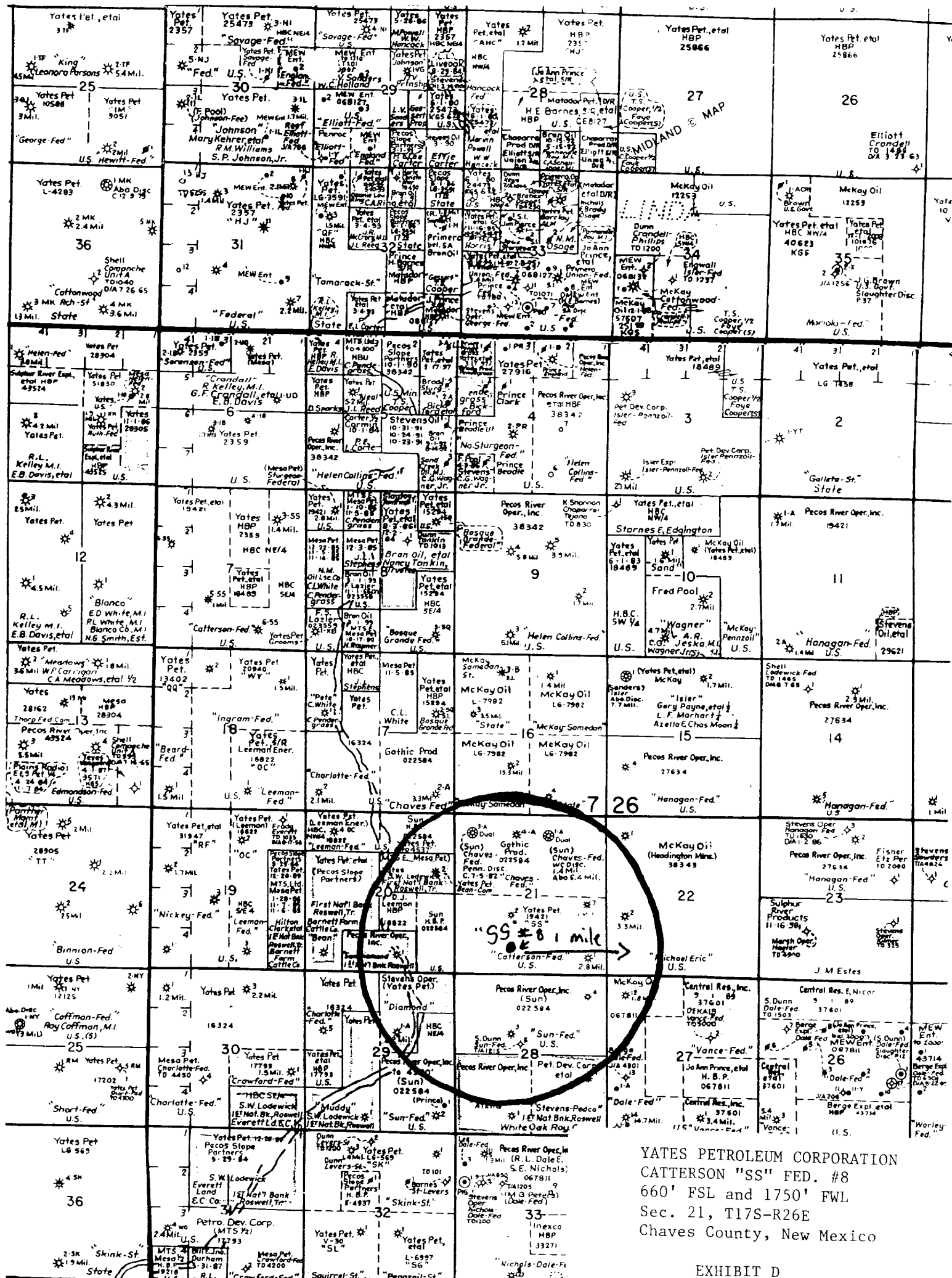
YATES PETROLEUM CORPORATION  
CATTERSON "SS" FED. #8  
660' FSL and 1750' FWL  
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EXHIBIT C



Distance from Well  
Head to Reserve Pit  
will vary between rigs

The above dimension  
should be a maximum



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EXHIBIT D