



United States Department of the Interior

BUREAU OF LAND MANAGEMENT

Box 1397, Roswell, New Mexico - 88201

IN REPLY REFER TO

q/sf

NM-45236
3162.4 (065)

JUN 30 1987

Santa Fe Energy Operating Partners, L.P.
500 W. Illinois, Suite 500
Midland, Texas 79701

RECEIVED BY
JUL -7 1987
O. C. D.
ARTESIA, OFFICE

Gentlemen:

Your application for Permit to Drill Well No. 1, Triple S. 00 Federal in the S00NE1/4, sec. 35, T. 25 S., R. 31 E., Lady County, New Mexico, lease NM-45236, to a depth of 2,000 feet to test the Bone Springs formation in the oil-potash area, is hereby approved as amended by stipulations attached to the application.

One copy of the application is returned herewith. Please notify the Bureau of Land Management office checked on the attached special stipulations in sufficient time for a representative to witness all cementing operations.

Sincerely,

Orig. Sgd. Francis R. Cherry, Jr.

Francis R. Cherry, Jr.
District Manager

Enclosure

cc:
NMOCD - 2

THE UNITED STATES OF AMERICA

For the purpose of this document

RECEIVED
JUL 7-1966
C O O
AIRMAIL SERVICE

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UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

SUBMIT IN THE DATE*
(Other instructions on reverse side)
36210

30-015-25769
Form approved.
Budget Bureau No. 1004-0136
Expires August 31, 1985

APPLICATION FOR PERMIT TO DRILL, DEEPEN, OR PLUG BACK

1a. TYPE OF WORK

DRILL ☒

DEEPEN ☐

PLUG BACK ☐

b. TYPE OF WELL

OIL WELL ☒

GAS WELL ☐

OTHER

SINGLE ZONE ☐

MULTIPLE ZONE ☐

2. NAME OF OPERATOR

Santa Fe Energy Operating Partners, L.P.

3. ADDRESS OF OPERATOR

500 W. Illinois, Suite 500, Midland, TX 79701

4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements*)

At surface 1980' FNL, 2310' FEL, Section 33, T-23S, R-31E, D.

At proposed prod. zone Same

14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE*

Thirty-five miles northwest of Jal, New Mexico

15. DISTANCE FROM PROPOSED*

LOCATION TO NEAREST PROPERTY OR LEASE LINE, FT. (Also to nearest drlg. unit line, if any)

330'

16. NO. OF ACRES IN LEASE

19. PROPOSED DEPTH

9600'

18. DISTANCE FROM PROPOSED LOCATION* TO NEAREST WELL, DRILLING, COMPLETED, OR APPLIED FOR, ON THIS LEASE, FT.

N/A

17. NO. OF ACRES ASSIGNED TO THIS WELL

40

20. ROTARY OR CABLE TOOLS

Rotary

21. ELEVATIONS (Show whether DF, RT, GR, etc.)

3391.3'

22. APPROX. DATE WORK WILL START*

As soon as possible

PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
17 1/2"	13 3/8"	48.0	650'	1175 cu.ft. circulated to surface
12 1/4"	8 5/8"	24.0 & 28.0	4350'	3892 cu.ft. circulated to surface
7 7/8"	5 1/2"	17.0	9600'	Sufficient to cover possible producing zones

13 3/8" casing will be cemented with sufficient Class "C" cement containing 4% gel, 1/4#/sk cellophane flakes to circulate to surface when followed by 330 cu.ft. of Class "C" with 2% Calcium Chloride.

8 5/8" casing to be cemented with sufficient lite cement to circulate to surface when followed by 264 cu.ft. Class "C" containing 2% Calcium Chloride.

5 1/2" casing to be cemented with sufficient Class H 50/50 Poz containing 0.4% fluid loss reducer and 5#/sk KCl to cover possible producing zones.

IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen or plug back, give data on present productive zone and proposed new productive zone. If proposal is to drill or deepen directionally, give pertinent data on subsurface locations and measured and true vertical depths. Give blowout preventer program, if any.

24.

SIGNED

Michael K. Banta

TITLE

Sr. Drilling Engineer

DATE

6-3-87

(This space for Federal or State office use)

PERMIT NO.

APPROVAL DATE

APPROVED BY

TITLE

DATE

6-30-87

CONDITIONS OF APPROVAL, IF ANY:

*See Instructions On Reverse Side

Title 18 U.S.C. Section 1001, makes 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.

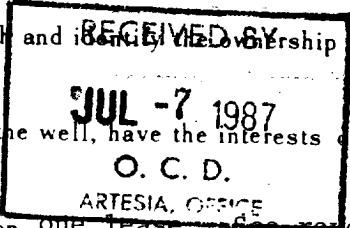
**NEW MEXICO OIL CONSERVATION COMMISSION
WELL LOCATION AND ACREAGE DEDICATION PLAT**

Form C-102
Supersedes C-128
Effective 1-4-65

All distances must be from the outer boundaries of the Section

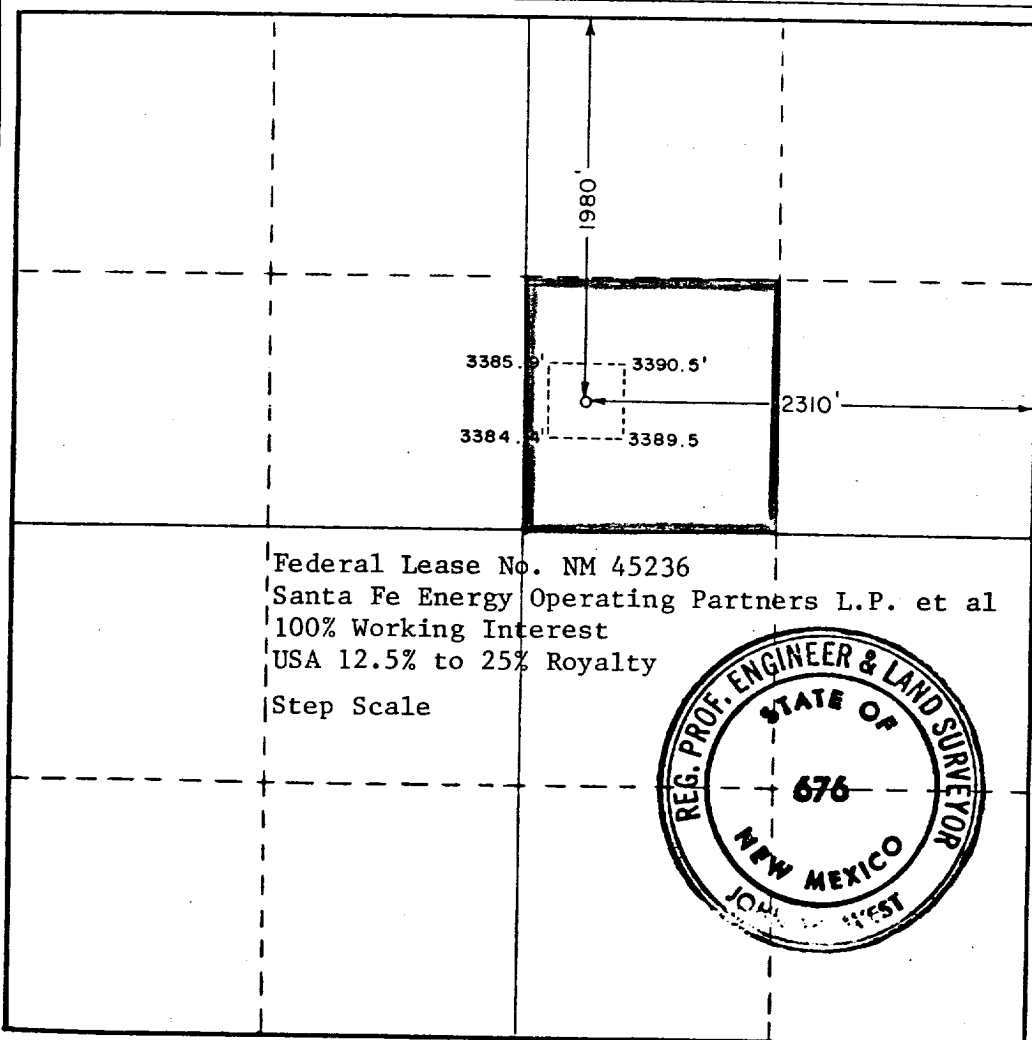
Operator SANTA FE ENERGY OPERATING PARTNERS LP			Lease TRIPLE S 33 FEDERAL		Well No. 1
Unit Letter G	Section 33	Township 23 SOUTH	Range 31 EAST	County EDDY	
Actual Footage Location of Well: <div style="display: flex; justify-content: space-between;"> 1980 feet from the NORTH line and 2310 feet from the EAST line </div>					
Ground Level Elev. 3391.3	Producing Formation Bone Springs	Pool W. 1/4 - 33	Dedicated Acreage: 40 Acres		

1. Outline the acreage dedicated to the subject well by colored pencil or hachure marks on the plat below.
2. If more than one lease is dedicated to the well, outline each and identify the ownership thereof (both as to working interest and royalty).
3. If more than one lease of different ownership is dedicated to the well, have the interests of all owners been consolidated by communitization, unitization, force-pooling, etc?
☐ Yes ☒ No If answer is "yes," type of consolidation one lease - see reverse side for ownership



If answer is "no," list the owners and tract descriptions which have actually been consolidated. (Use reverse side of this form if necessary.) _____

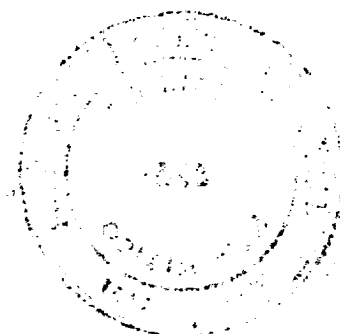
No allowable will be assigned to the well until all interests have been consolidated (by communitization, unitization, forced-pooling, or otherwise) or until a non-standard unit, eliminating such interests, has been approved by the Commission.



CERTIFICATION	
I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief.	
<i>Michael R. Burton</i>	
Name	<i>Michael R. Burton</i>
Position	<i>Sr. Drilling Engineer</i>
Company	<i>Santa Fe Energy Operating Partners, L.P.</i>
Date	<i>JUNE 8, 1987</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 knowledge and belief.	
Date Surveyed	<i>May 14, 1987</i>
Registered Professional Engineer and/or Land Surveyor <i>John W. West</i>	
Certificate No.	<i>JOHN W. WEST, 676</i>
	<i>RONALD J. EIDSON, 3239</i>

96580

Santa Fe Energy Operating Partners LP	37.5%
Pogo Producing Company	37.5%
Florida Exploration Company	8.3334%
Texas Gas Exploration Company	8.3333%
Primary Fuels, Inc.	6.1875%
P.W. Production Company	2.0833%
Heathary Resources	.0625%
	<hr/> 100.000%



APPLICATION FOR DRILLING
SANTA FE ENERGY COMPANY
Triple S 33 Federal No. 1

In conjunction with form 9-331C, Application to Drill subject well, Santa Fe Energy Company submits the following ten items of pertinent information in accordance with BLM requirements.

1. The geologic surface formation is sand.
2. The estimated tops of geologic markers are as follows:

Rustler	959'
Base of Salt	4234'
Delaware Lamar Lime	4314'
Cherry Canyon	5344'
Bone Springs	8124'
TD	9600'

3. The estimated depth at which water, oil, or gas formations are expected to be encountered:

Water	Water is not expected to be encountered.
Oil or Gas	Cherry Canyon 5344'
	Bone Spring 8124'

4. Proposed casing program: See Form 3160-3 and Exhibit A.
5. Pressure control Equipment: See Form 3160-3 and Exhibit B.
6. Drilling Fluid Program: See Exhibit C.
7. Auxilliary Equipment: See Exhibit D.
8. Testing, Logging and Coring Programs:

Drill Stem Tests (all DST's to be justified by a valid show of oil or gas):

Cherry Canyon	5344'
Bone Spring	8124'

Logging:

Logging from 4350 - TD:
Dual Laterolog with Gamma Ray
Neutron-Density with Gamma Ray
Computer Process Log over selected intervals

Logging from surface to 4350':
Neutron with Gamma Ray

9. Abnormally high pressured zones are not expected at this location.
10. Starting Date: As soon as possible.

MULTI-POINT SURFACE USE AND OPERATIONS PLAN
SANTA FE ENERGY COMPANY
Triple S 33 Federal No. 1
1980' FNL, 2310' FWL
Section 33, T-23S, R-31E
Eddy 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 necessary surface disturbance involved, and the procedures to be followed by rehabilitating the surface after completion of the operations, so that a complete appraisal can be made of the environmental effects associated with the operation.

1. EXISTING ROADS.

- A. Exhibit E is a topographic map of a scale of approximately one inch to the mile which shows location of the proposed wellsite and roads in the vicinity. The proposed location is situated approximately 38 miles northwest of Jal, New Mexico.

DIRECTIONS:

1. Proceed West on Highway 128 from Jal, New Mexico for 38 miles.
2. Turn left (south) onto oilfield road and continue for 1.5 miles.
3. Turn left on dirt road into location.

2. PLANNED ACCESS ROAD.

No new access roads will be required as this location is an immediate offset to a well which produces from a formation deeper than this well is permitted for.

3. LOCATION OF EXISTING WELLS.

- A. The well locations in the vicinity of the proposed well are shown in Exhibit F.

4. LOCATION OF EXISTING AND/OR PROPOSED FACILITIES.

- A. There is one producing well on this lease at this time. It is located 330' east of this prospect and produces from the Morrow formation.
- B. In the event the well is productive, the necessary production equipment will be installed on the drilling pad. If the well is productive of 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 well with both fresh water and brine water systems. Both types of waters will be hauled to the location by truck over existing roads. Both types of waters will be obtained from commercial sources.

6. SOURCES OF CONSTRUCTION MATERIALS.

- A. Any caliche required for construction of the drilling pad will be obtained from a pit located off of the wellsite. The pit is located in Section 35, T-23S, R-31E.

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 either placed in the reserve pits and allowed to evaporate or collected in tanks until hauled to an approved disposal system or a separate disposal application will be submitted to the USGS for appropriate approval.
- D. Oil produced during operations will be stored in tanks until sold.
- E. Human waste will be buried.
- F. Trash, waste paper, garbage, and junk will be buried in a separate trash pit and covered with a minimum of 24" of dirt. All waste material will be contained to prevent scattering by the wind.
- G. All trash and debris will be buried or removed from the wellsite within 30 days after finishing drilling and/or completion operations.

8. ANCILLARY FACILITIES.

None required.

9. WELLSITE LAYOUT.

- A. Exhibit G. shows the dimensions of the well pad and reserve pits, and the location of major rig components.
- B. The ground surface of the location is sloping down toward the northwest. Cutting will be required to level the pad area, which will be covered with at least six inches of compacted caliche.

- C. The reserve pits will be plastic lined.
- D. A 400' X 400' work area which will contain the pad and pit area has been staked and flagged.

10. PLAN FOR RESTORATION OF THE SURFACE.

- 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 cleared 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 been filled.
- C. If the proposed well is non-productive, all rehabilitation and/or vegetation requirements of the Bureau of Land Management and the United States Geological Survey will be compiled with and will be accomplished as expeditiously as possible. All pits will be filled and levelled within 90 days after abandonment.

11. TOPOGRAPHY.

- A. The wellsite and access route are located in a hilly area.
- B. The top soil at the wellsite is sandy.
- C. The vegetation cover at the wellsite is moderately sparse, with prairie grasses, some yucca, and miscellaneous weeds.
- D. No wildlife was observed but it is likely that rabbits, lizards, insects, and rodents traverse the area.
- E. There are no ponds, lakes, streams, or rivers within one mile of the wellsite.
- F. The wellsite is located on federal surface.
- G. There is no evidence of any archaeological, historical, or cultural sites in the vicinity of the location.

12. OPERATOR'S REPRESENTATIVES.

- A. The field representative responsible for assuring compliance with the approved surface use plan are:

Hugh Boyt
District Production Manager
Santa Fe Energy Company
500 West Illinois
Midland, Texas 79701
915/687-3551 - office
915/697-4768 - home

Michael R. Burton
Senior Drilling Engineer
Santa Fe Energy Company
500 West Illinois
Midland, Texas 79701
915/687-3551 - office
915/699-1260 - home
806/373-1911 - mobile

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 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 Santa Fe Energy Company and its contractors and subcontractors in conformity with this plan and the terms and conditions under which it is approved.

6/4/87
Date

Michael R. Burton
Michael R. Burton

SANTA FE ENERGY COMPANY
OPERATIONS PLAN
Triple S 33 Federal No. 1

1. Drill a 17 1/2" hole to 650'.
2. Run 13 3/8" 48.0 ppf H-40 casing. Cement with sufficient Class C containing 4% gel, 1/4#/sk cellophane flakes to circulate to surface when followed by 330 cu.ft. Class C containing 2% Calcium Chloride. Run Texas Pattern shoe on bottom and float collar one joint above shoe. Run centralizers on every other joint above shoe. Apply thread lock to bottom two joints, float collar, and guide shoe.
3. Wait on cement six hours.
4. Cut off casing. Nipple up and install BOP system.
5. Test casing to 600 psi after cement has attained 500 psi compressive strength.
6. Drill a 12 1/4" hole to 4350'.
7. Run 8 5/8" 24.0# S-80 casing. Cement with sufficient lite weight cement to circulate to surface when followed by 264 cu.ft. Class C Neat to circulate cement to surface. Centralize bottom 1000' of casing with one centralizer on every third joint above shoe. Run guide shoe on bottom and float collar two joints above shoe. Apply thread lock to bottom two joints, float collar, and shoe.
8. Wait on cement six hours.
9. Cut off 13 3/8" casing head. Install 8 5/8" casinghead. Install BOP stack and choke manifold.
10. Test BOP stack and choke manifold to 3000 psi. Test casing to 1500 psi.
11. Drill 7 7/8" hole to TD.
12. Run Logs.
13. Run 5 1/2" 17.0# N-80 casing. Cement with sufficient Class H 50/50 Poz containing 0.4% fluid loss reducer and 5#/sk KCl to cover possible producing zones. Run guide shoe on bottom and float collar two joints above shoe. Centralize bottom 1000' with centralizers placed on every other joint above shoe.

Exhibit A
Santa Fe Energy Company
Triple S 33 Federal No. 1
Sec. 33, T-23S, R-31E
Eddy County, New Mexico

Proposed BOP stack Arrangement
after Prentice and Records

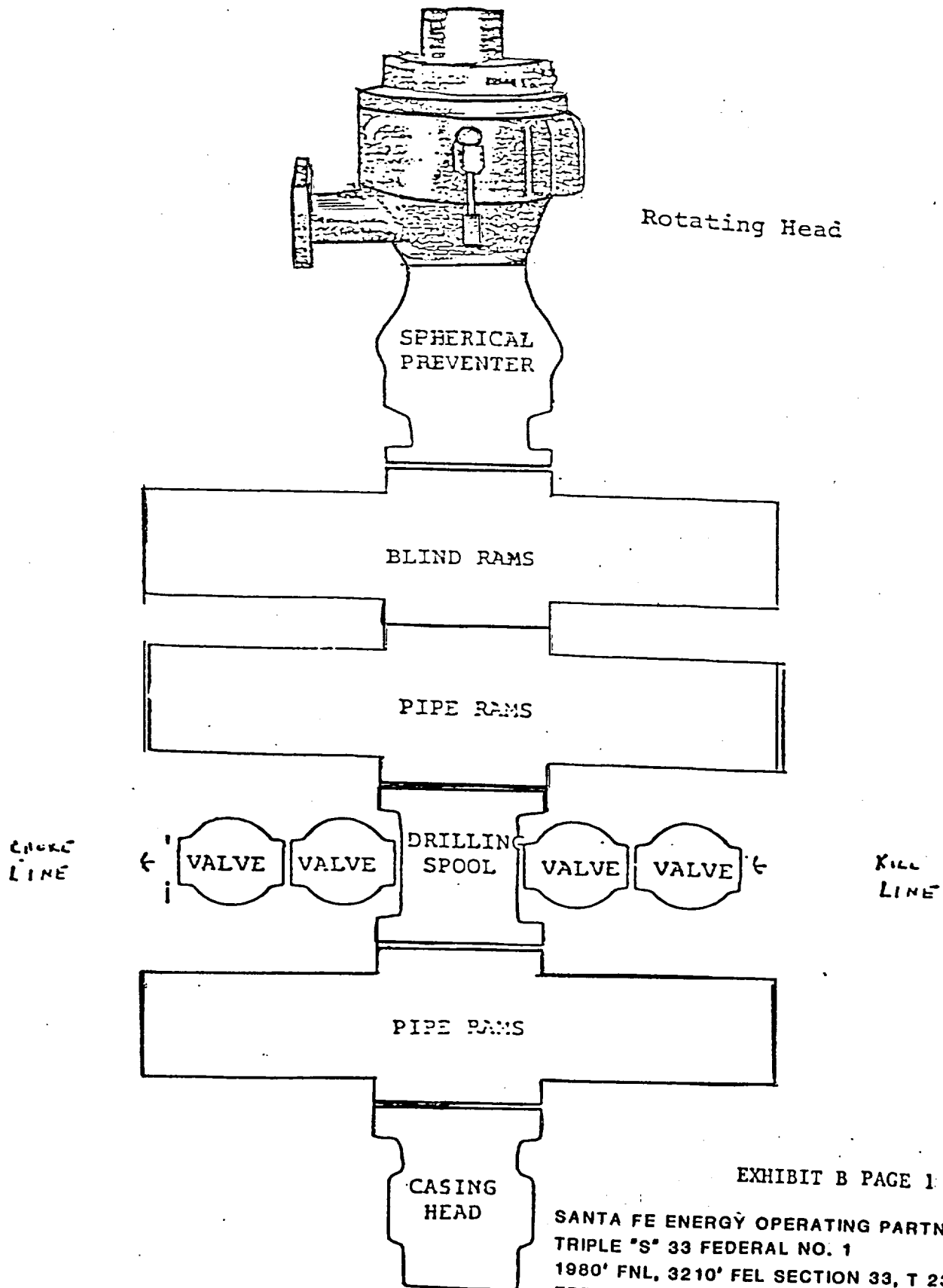


EXHIBIT B PAGE 1 OF 2

SANTA FE ENERGY OPERATING PARTNERS, LP.
TRIPLE "S" 33 FEDERAL NO. 1
1980' FNL, 3210' FEL SECTION 33, T 23 S, R 31 E
EDDY CO., NEW MEXICO

PROPOSED CHOKE MANIFOLD DESIGN
AFTER PRENTICE AND RECORDS

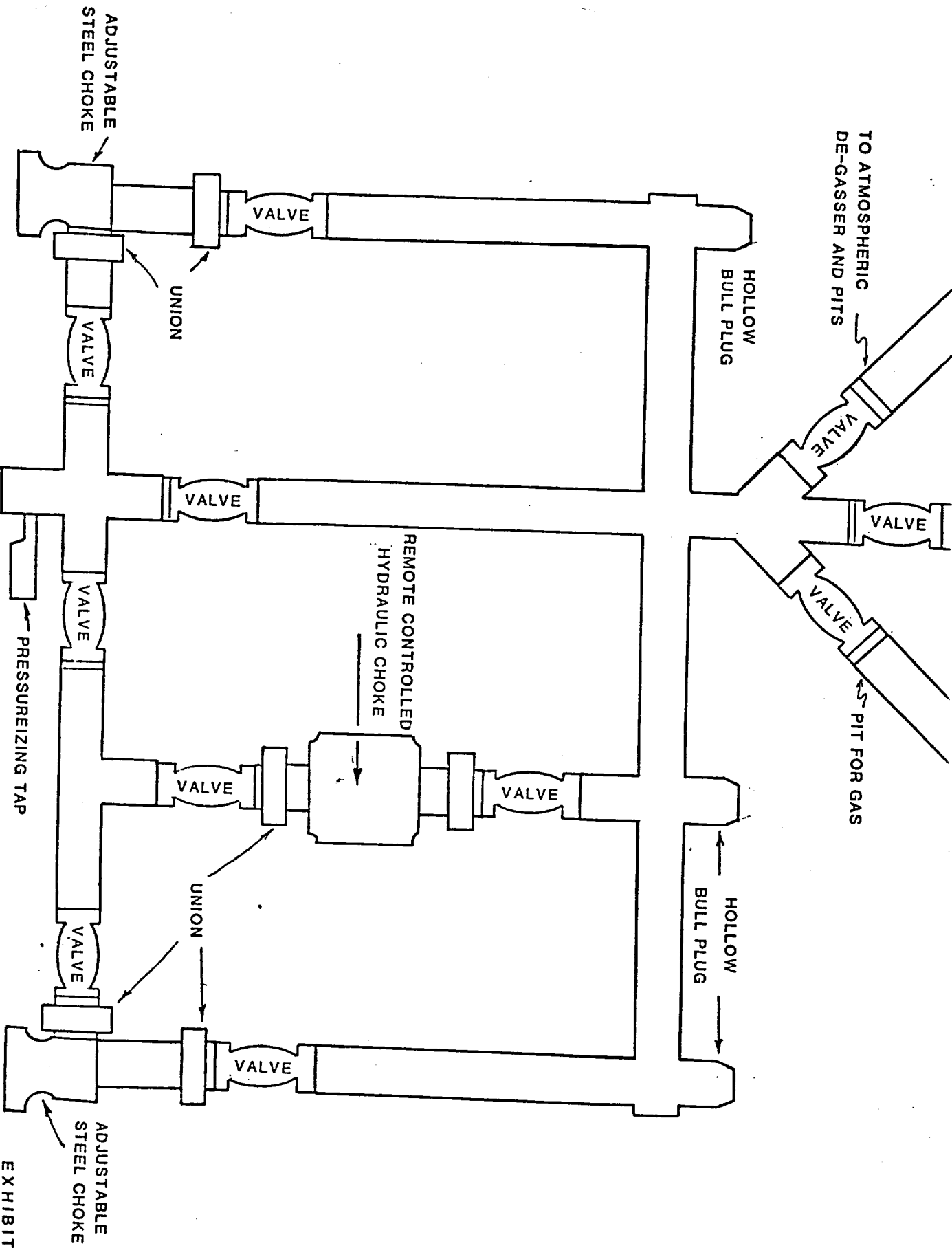


EXHIBIT B
PAGE 2 OF 2

SANTA FE ENERGY OPERATING PARTNERS, LP.
TRIPLE "S" 33 FEDERAL NO. 1
1980' FNL, 3210' FEL SECTION 33, T 23 S, R 31 E
EDDY CO., NEW MEXICO

PROPOSED DRILLING FLUID PROGRAM

0 - 650'

Spud mud consisting of AQUAGEL flocculated with Lime. Use ground paper for seepage loss of fluid and KWIK-SEAL, FIBERTEX and Cottonseed Hulls for severe or total loss.

If total loss of circulation occurs, we suggest mixing two or three 150-200 barrel pills of viscous AQUAGEL/Lime mud treated with 10-15 ppb KWIK-SEAL and/or Cottonseed Hulls. If this does not regain circulation, we suggest drilling to casing point without returns and spotting a similar pill on bottom prior to logging and running casing.

650 - 4350'

Drill out with brine water and treat with CON DET and BEN-EX/MF-1 to flocculate solids. Circulate controlled section of the reserve pit. Use ground paper for seepage loss. Use pre-hydrated AQUAGEL or ZEOGEL/paper slugs as needed to sweep hole. For corrosion control, use Sodium Bichromate.

4350 - 9600'

Drill out with fresh water or cut brine circulating a controlled section of the reserve pit using BEN-EX/MF-1 and CON DET for control of solids build up. The fluid weight in this interval should be 8.5 - 9.5 pH. Use ZEOGEL/ground paper or pre-hydrated AQUAGEL pills to sweep the hold free of cutting shen needed and prior to trips . Use Lime for a 9.0 - 9.5 pH. Use Sodium Bichromate at 600 - 800 ppm concentration for drill pipe and casing corrosion control.

The additions of MR-1/BEN-EX and CON DET may be used for control of solids build up. Use ZEOGEL/ground paper sweeps for seepage and additional hole cleaning.

Exhibit C, Page 1
Santa Fe Energy Company
Triple S 33 Federal No. 1
Section 33, T-23S, R-31E
Eddy County, New Mexico

MRB:dw-321c

AUXILLIARY EQUIPMENT

DRAW WORKS	National 80-B
COMPOUND/ENGINES	National 3 Section compound Three Caterpillar D379 diesel engines.
ROTARY	27 1/2" National C-275
MAST/SUBSTRUCTURE	Derrick Service International 142' jackknife. 25' high substructure.
TRAVELING EQUIPMENT	National 545-G 350 ton hook and block. National P-400 400 ton swivel.
PUMPS	Two National 8-P-80, 6 1/4" X 8 1/2" 800 HP triplex pumps charged by 6" X 8" centrifugal pump.
PIT SYSTEM	Three steel mud pits with lightning mixers. Two 6" X 8" centrifugal pumps each driven by a 75 HP electric motor.
GENERATORS	Two 320KW AC generators each powered by a turbo-charged diesel engine.
BOP EQUIPMENT	One annular and three ram preventers rated at 5000 psi. Choke Manifold rated at 5000 psi.

Exhibit D
Santa Fe Energy Company
Triple S 33 Federal No. 1
Section 33, T-23S, R-31E
Eddy County, New Mexico

MRB:dw-321d

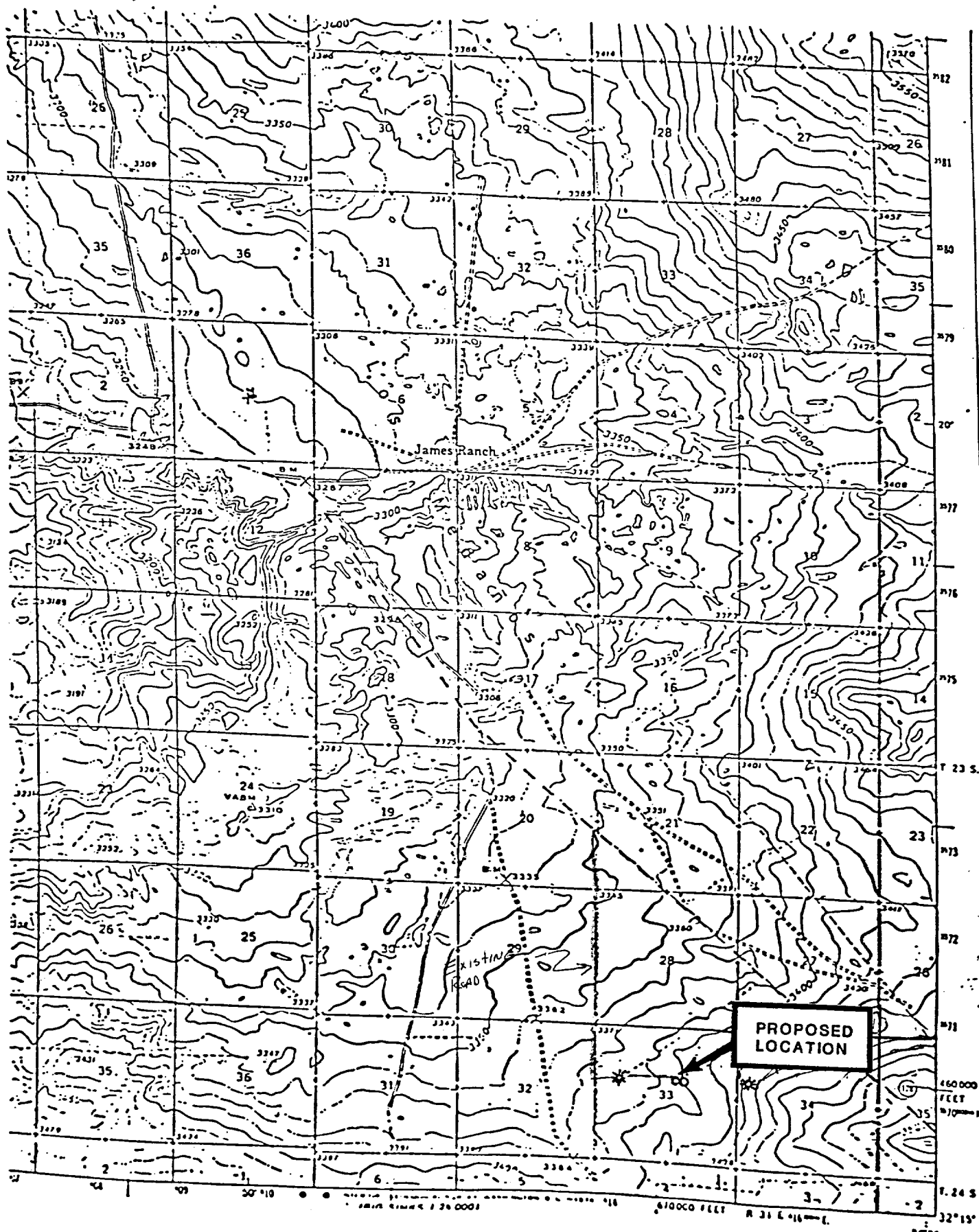


EXHIBIT E

SANTA FE ENERGY OPERATING PARTNERS, LP.
 TRIPLE "S" 33 FEDERAL NO. 1
 1980' FNL, 3210' FEL SECTION 33, T 23 S, R 31 E
 EDDY CO., NEW MEXICO

WELL SITE LAYOUT.

SANTA FE ENERGY OPERATING PARTNERS, LP.
 TRIPLE "S" 33 FEDERAL NO. 1
 1980' FNL, 3210' FEL SECTION 33, T 23 S, R 31 E
 EDDY CO., NEW MEXICO

RESERVE PIT

