

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
GEOLOGICAL SURVEY

30-039-22016  
U. S. LEASE DESIGNATION AND SERIAL NO.

Joint Venture

U. S. INDIAN, ALLOTTEE OR TRIBE NAME

Jicarilla Apache

U. S. UNIT AGREEMENT NAME

U. S. FARM OR LEASE NAME

Apache-JVA

U. S. WELL NO.

#7

U. S. FIELD AND FOM. OR WILDCAT

Blanco-Mesaverde

U. S. SEC. T., R., M. OR BLM.  
AND SURVEY OR AREA

NW1/4 Sec. 17-27N-2W

U. S. COUNTY OR PARISH

Rio Arriba

New Mexico

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

Palmer Oil & Gas Company

3. ADDRESS OF OPERATOR

P.O. Box 2564, Billings, Montana 59103

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

At surface

NW1/4 Sec. 17-27N-2W

At proposed prod. zone

same

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

Approx. 27 miles North of Ojito

15. DISTANCE FROM PROPOSED\*

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

1500'

16. NO. OF ACRES IN LEASE

Joint Venture

17. NO. OF ACRES ASSIGNED  
TO THIS WELL

E/320

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

19. PROPOSED DEPTH

6350'

20. ROTARY OR CABLE TOOLS

Rotary

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

7238' GR.

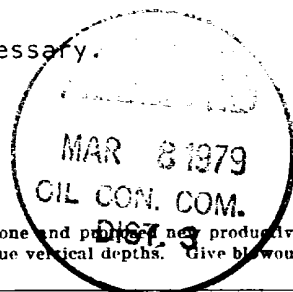
22. APPROX. DATE WORK WILL START\*

April 1, 1979

23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
12-1/4"	9-5/8" (new)	36#	300'	300 sacks
8-3/4"	7" (new)	20#	4000'	250 sacks
6-1/4"	4-1/2" (new)	10.5#	6350'	600 sacks

- Palmer Oil & Gas Company will drill a 6350' Mesaverde test in the NW1/4 of Section 17-27N-2W.
- Well to be drilled by rotary tools. Set 300' of 9-5/8" casing and cement to surface; drill 8-3/4" hole to 4000' and set 7" casing. Air drill 4000' to T.D. and run 4 1/2" casing.
- IES and Porosity Logs will be run at T.D. All potential zones will be analyzed from surface to total depth, and if potentially commercial, 4 1/2" casing or liner will be set, cemented and perforated.
- After perforating, the productive zones will be fractured, if necessary.
- Survey plat attached.
- Spacing unit will be E1/2 of Section 17.
- Gas is not dedicated.



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 prevention program, if any.

24.

SIGNED Robert D. Ballantyne  
Robert D. Ballantyne

TITLE Drilling Superintendent DATE March 5, 1979

(This space for Federal or State office use)

PERMIT NO.

APPROVAL DATE

RECEIVED

APPROVED BY

TITLE

DATE

CONDITIONS OF APPROVAL, IF ANY:

ok 3mch

MAR 7 1979

U. S. GEOLOGICAL SURVEY  
DURANGO, COLO.

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

Form C-100  
Supersedes C-128  
Effective 1-1-65

All distances must be from the outer boundaries of the Section.

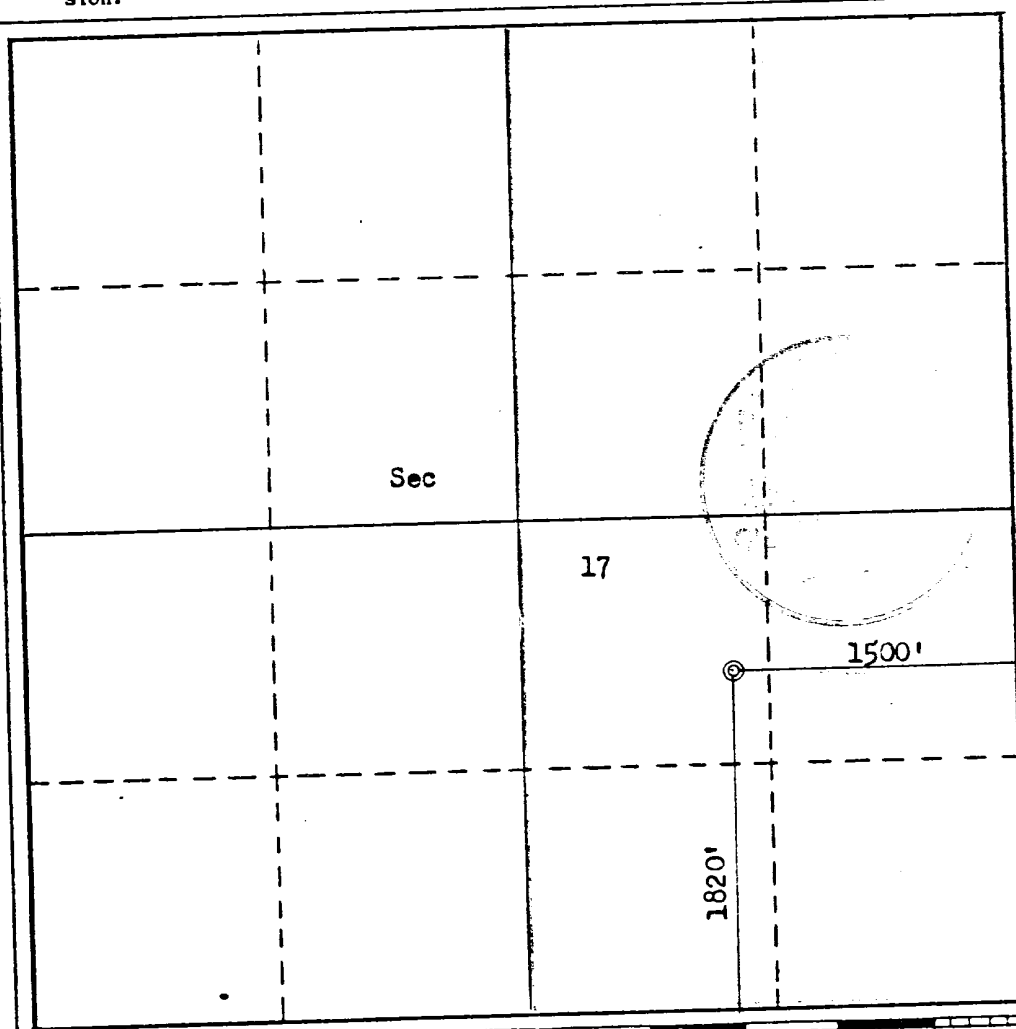
Operator <b>PALMER OIL &amp; GAS COMPANY</b>			Lease <b>APACHE JVA</b>		Well No. <b>7</b>
Unit Letter <b>J</b>	Section <b>17</b>	Township <b>27N</b>	Range <b>2W</b>	County <b>RIO ARriba</b>	
Actual Footage Location of Well: <b>1820</b> feet from the <b>South</b> line and <b>1500</b> feet from the <b>East</b> line					
Ground Level Elev. <b>7238</b>	Producing Formation <b>Mesaverde</b>	Pool <b>Blanco-Mesaverde</b>		Dedicated Acreage: <b>320</b> 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 \_\_\_\_\_

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.

*Robert D. Ballantyne*

Name  
**Robert D. Ballantyne**  
Position  
**Drilling Superintendent**  
Company  
**Palmer Oil & Gas Company**  
Date  
**March 5, 1979**

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  
**December 8, 1978**  
Registered Professional Engineer and/or Land Surveyor  
*Fred B. Kerr Jr.*  
Certificate No. **3950**

## TWELVE POINT PLAN OF DEVELOPMENT

For Surface Use for Palmer Oil & Gas Company's  
Apache JVA #7  
NW $\frac{1}{4}$ SE $\frac{1}{4}$  Section 17-T27N-R2W  
Rio Arriba County, New Mexico

1. Existing roads including location of the exit from the main highway.  
Existing roads include the main road which runs along the southern boundary of the Jicarilla Apache Reservation, turn north on good gravel road two miles to a fork, then right for one mile into Leavry Canyon, turn south on access road and travel for a quarter of a mile to the location. See Appendix 1, Pages 87, 88, and 89 of Environmental Study dated October 10, 1976, and Maps #1 and #2.
2. Planned access road.  
See Topographic Map #1.  
Access road will be bladed and not more than 25' wide.
3. Location of wells.  
See map #3.
4. Location of tank batteries, production facilities and production gathering and service lines.  
If this well is productive, it would be gas; therefore, the facilities would be the wellhead, tanks for oil and condensate, 10' x 10' water pit if necessary, separator and gas line to the well. The tanks and separator would be set within 150' of the well and the gas line would run adjacent and parallel to roads.
5. Location and type of water supply.  
Water hole at Bassett Springs, located in approximate Center of Sec. 5-26N-2W.
6. Source of construction materials.  
All construction material such as gravel, sand timbers, etc. will be purchased and hauled to the location. No water, sand or gravel will be used from this land.
7. Methods for handling waste disposal.
  - 1) Cuttings will be buried three feet below the surface.
  - 2) Drilling fluids will be left in a fenced, open pit to evaporate.
  - 3) Produced oil or condensate (if any) will be stored in a tank.
  - 4) Portable toilet to be provided.
  - 5) Trash will be burned in burn pit.
  - 6) After pit area is sufficiently dry, cuttings will be pushed into pit and sub-soil will be placed on any remaining fluid and cuttings, then top soil, if any, will be placed over both pit and location area.
8. Ancillary facilities.  
No camps or airstrips will be used.
9. Wellsite layout.  
See Plat #3. Top soil, if any, will be stockpiled and reused. Pits will not be lined. If there are any trees which have to be destroyed in building the location or access road, these trees will be counted by BIA and Palmer's representative and the Jicarilla Apache Tribe will be compensated for same.

10. Plans for restoration of surface.

Upon completion of the well, all pits will be backfilled and top soil replaced and recontoured back to the original terrain. Pits will be backfilled as soon as they evaporate enough to permit such work. Should it be necessary to protect livestock or wild game, pits will be fenced and maintained until clean-up operations are commenced. Should oil accumulate on the pit, it will be removed and buried six feet deep or overhead flagging will be employed to protect wildlife.

11. Other information.

- 1) Topography - Drillsite and access low valley profile. See Pages 87, 88, and 89 of Environmental Study.
- 2) Vegetation - Sparse grass, sagebrush.
- 3) Land use - Land is used for grazing with no reservoir or water on this site. There are no known archaeological, cultural, or historical sites on this site. An archaeological survey will be done at the time of the location inspection by the Government Agency and Palmer's representative.

12. Lessee's or operator's representative.

Elledge Consulting and Production Company  
1701 Bloomfield Highway  
Farmington, New Mexico 87401

Harold W. Elledge, President

Office Phone (505) 327-1181

OR

Robert D. Ballantyne  
P. O. Box 2564  
Billings, Montana 59103

Office Phone (406) 248-3151  
Home Phone (406) 656-1304

13. I hereby certify that I, or persons under my direct supervision, have inspected the proposed drillsite 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 Four Corners Drilling Co. and its contractors and sub-contractors in conformity with this plan and the terms and conditions under which it is proposed.

Robert D. Ballantyne  
Robert D. Ballantyne

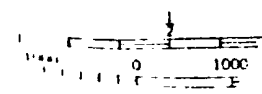
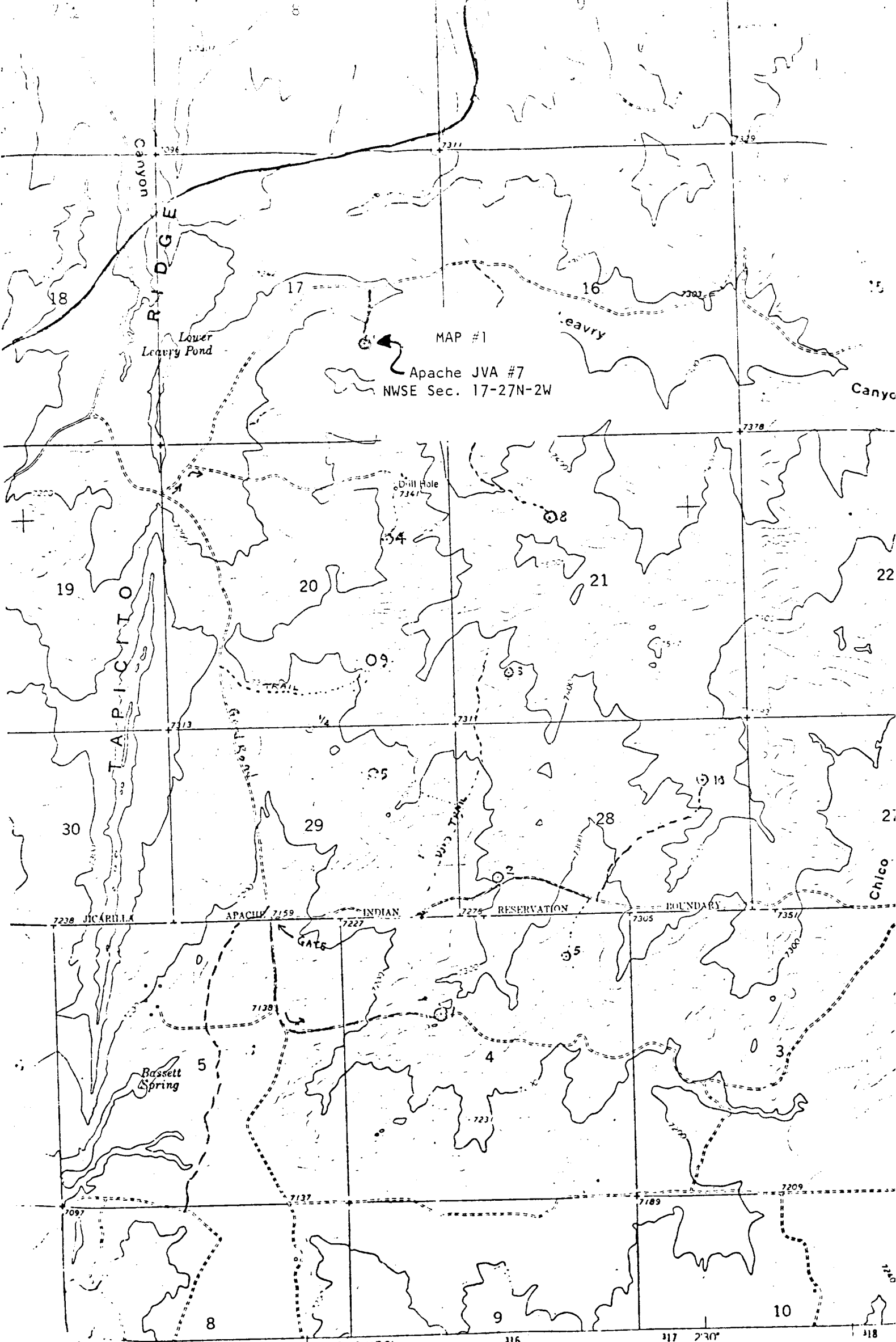
SEVEN POINT WELL CONTROL PLAN

PALMER OIL & GAS COMPANY  
Apache JVA #7  
NW1SE4 Section 17-T27N-R2W  
Rio Arriba County, New Mexico

1. Surface Casing: 9-5/8" 36#/ft., Grade K-55, Short T&C, set at 300' and cemented with pump and plug method back to surface.
2. Casinghead Flange: 10" 900 S adapted to 1500 psig W. P. Larkin (or equivalent) casinghead with two 2" 1500 psi L. P. outlets.
3. 7" intermediate casing will be set to approximately 4000' to case off any possible water from the Picture Cliff formation so as the remaining hole can be air drilled.
4. Blowout Preventor: A 10" 3000 psig W. P. Double gate hydraulic Shaffer BOP (or equivalent) with drill pipe rams and blind rams. All fill, kill, and choke lines will be minimum of 2" 2000 psi working pressure. The rams will be closed daily and checked for proper operation.
5. Auxillary Equipment: a) Drill pipe floats will be allowed at contractor's discretion; b) Visual and manual monitoring of mud system will be maintained.
6. Anticipated bottom hole pressure is less than 1800 psi at 6350' or a gradient of .277 psi/ft.
7. Well will be drilled with water base mud system with 8.8-9.0 ppg weight 35-45 seconds viscosity to 4000' - Air drilling from 4000 to T.D.

PALMER OIL & GAS COMPANY

Robert D. Ballantyne  
Robert D. Ballantyne



SCALE 1:24,000

Vicinity Map for  
PALMER OIL & GAS CO. #7 APACHE JVA  
1820' FSL 1500' FEL Sec 17-T27N-R2W  
RIO ARRIBA COUNTY, NEW MEXICO

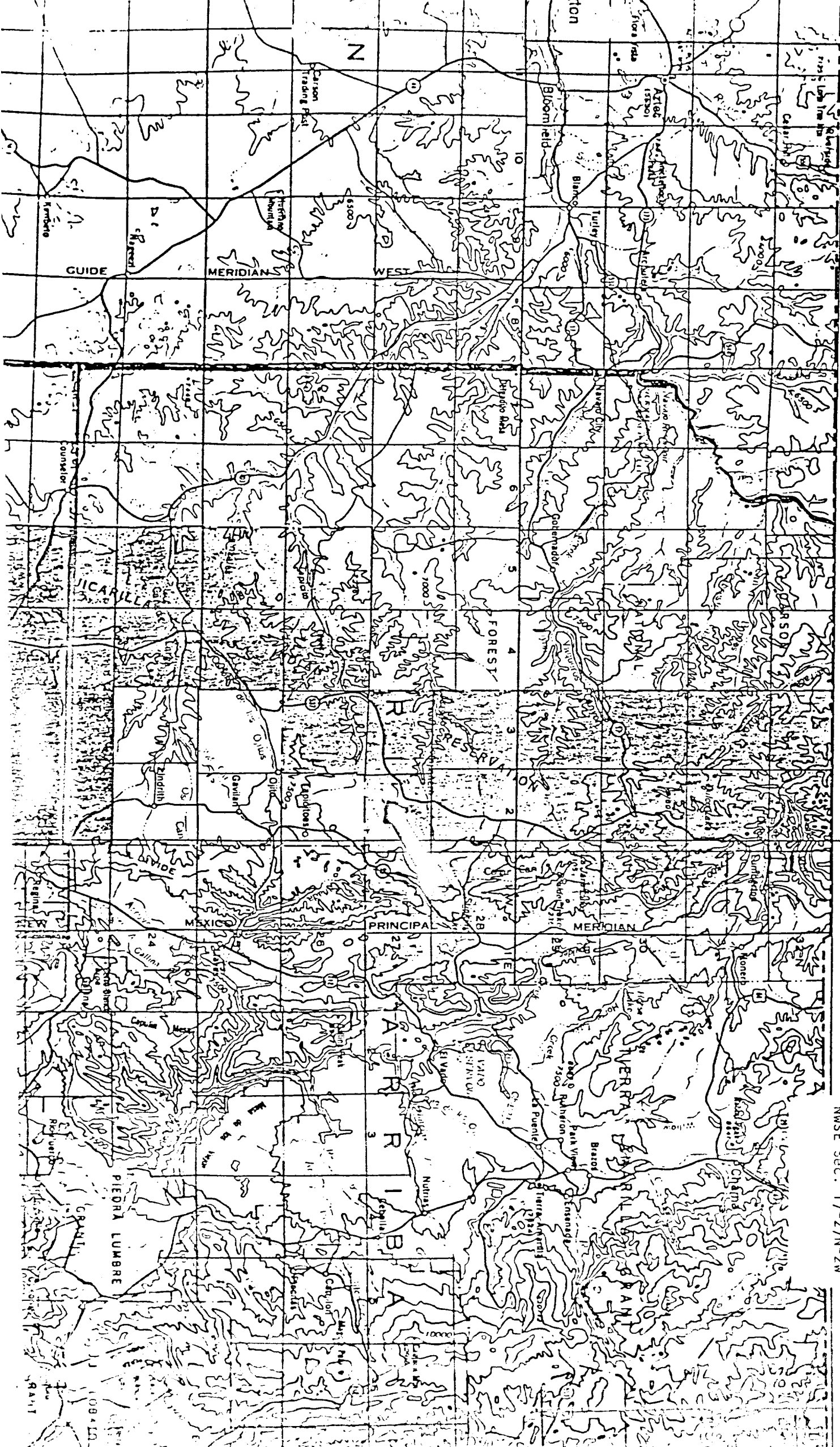
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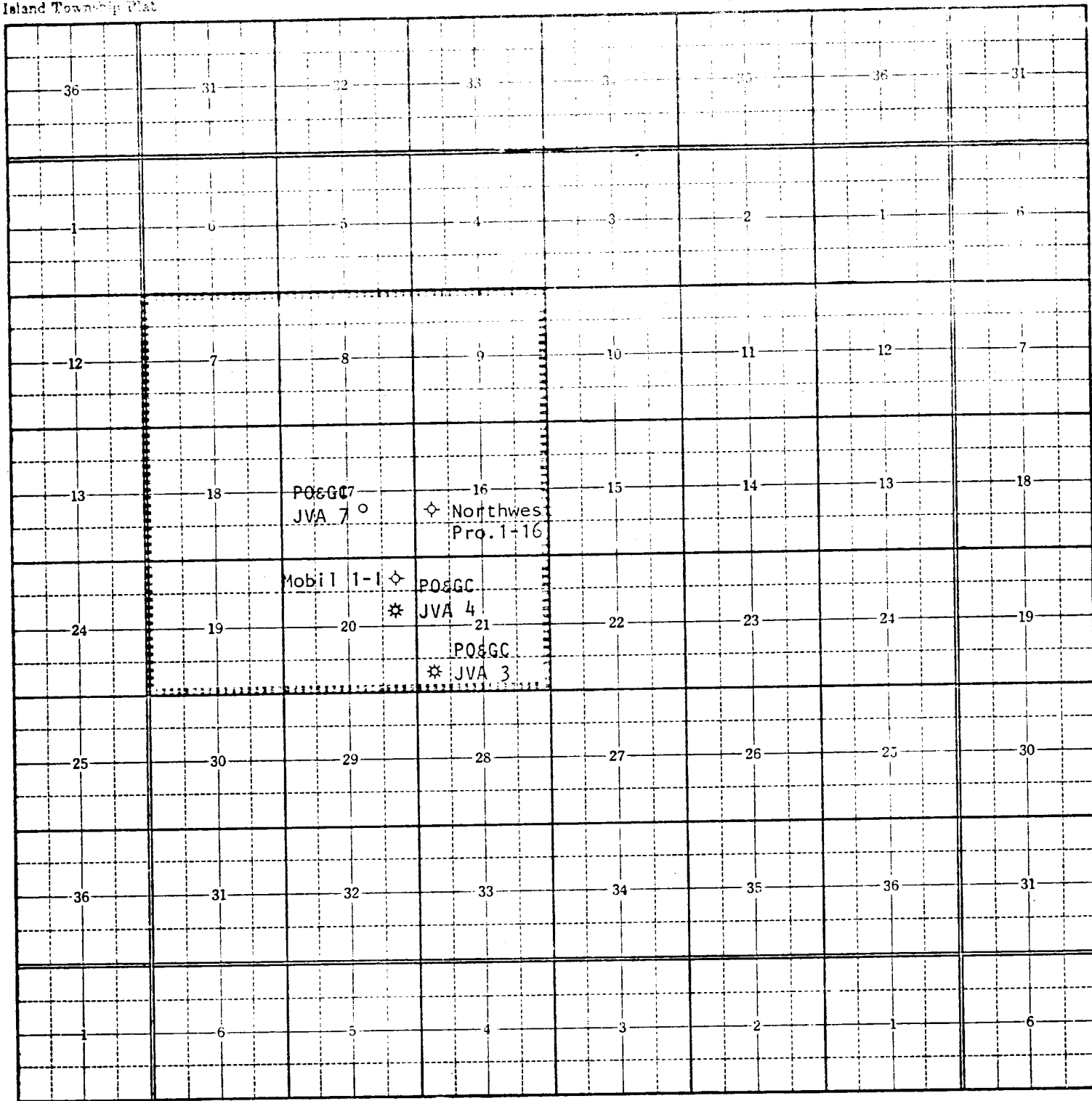
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MAP #2  
Apache JVA #7  
NMSE Sec. 17-27N-2W



Township 27N Range 2W County Rio Arriba State New Mexico

Island Township Plat



JVA #7  
 T27N-R2W, Sec. 17  
 NW $\frac{1}{4}$ SE $\frac{1}{4}$

Map #3



Proposed well 6A is to be located 825 feet from the south line and 1,100 feet from the west line of section 17 at an elevation of approximately 7,170 feet. The well will thus be only slightly west of an existing road and essentially no new construction will be necessary to gain access to the location. Should this well prove productive, a buried pipeline will be laid southward from the location parallel and adjacent to the road for about 2,000 feet to connect with the flow line from well 4A.

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Figure 27  
Looking North Across the Proposed 6A Location

Proposed well 6B is to be located 800 feet from the north line and 1,100 feet from the west line of section 17



Figure 28  
Looking South Across the Proposed 6B Location

at an elevation of approximately 7,125 feet. The well will thus lie just south of State Highway 357. Access to the well would be from an existing dirt road which crosses the location and enters the highway nearby. If this well proves to be productive, a buried pipeline laid parallel and adjacent to the highway will connect it to the existing pipeline at the 3C location, or if that well has not been drilled, to the 3A location.



Apache JVA #7  
NWSE Sec. 17-27N-2W