

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
GEOLOGICAL SURVEY  
NM OIL CONS. COMMISSION  
Power DD  
Artesia, NM 88210

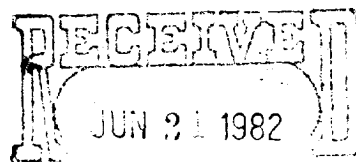
## APPLICATION FOR PERMIT TO DRILL, DEEPEN, OR PLUG BACK

1a. TYPE OF WORK DRILL <input checked="" type="checkbox"/> DEEPEN <input type="checkbox"/> <b>RECEIVED</b> <input type="checkbox"/>		5. LEASE DESIGNATION AND SERIAL NO. NM-15862	
b. TYPE OF WELL OIL WELL <input checked="" type="checkbox"/> GAS WELL <input type="checkbox"/> OTHER <input type="checkbox"/>		6. IF INDIAN, ALLOTTEE OR TRIBE NAME --	
2. NAME OF OPERATOR GREAT WESTERN DRILLING COMPANY ✓		7. UNIT AGREEMENT NAME --	
3. ADDRESS OF OPERATOR P. O. Box 1659, Midland, Texas 79702		8. FAIRM OR LEASE NAME QUAIL FEDERAL	
4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements.) At surface 660' FNL & 2180' FEL of Sec. 23-6S-25E		9. WELL NO. 9	
At proposed prod. zone same		10. FIELD AND POOL, OR WILDCAT Undesignated	
14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE* 26 air miles north-northeast of Roswell N. M.		11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA Sec. 23-6s-25E	
15. DISTANCE FROM PROPOSED* LOCATION TO NEAREST PROPERTY OR LEASE LINE, FT. (Also to nearest drilg. unit line, if any) 660'		12. COUNTY OR PARISH Chaves	
16. NO. OF ACRES IN LEASE 1759.06		13. STATE N.M.	
17. DISTANCE FROM PROPOSED* TO NEAREST WELL, DRILLING, COMPLETED, OR APPLIED FOR, ON THIS LEASE, FT. 200'		14. COUNTY OR PARISH Chaves	
18. PROPOSED DEPTH 1500' San Andres		15. STATE N.M.	
20. ROTARY OR CABLE TOOLS Cable		16. COUNTY OR PARISH Chaves	
21. ELEVATIONS (Show whether DF, RT, GR, etc.) 3821' G.L.		17. STATE N.M.	
22. APPROX. DATE WORK WILL START* July 10, 1982		18. COUNTY OR PARISH Chaves	

## 23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
11"	8 5/8"	24.0#	900'	Sufficient to circulate
8"	4 1/2"	9.5#	1500'	Sufficient to tie back

Pay zone will be selectively perforated and stimulated as needed.

Attached are: 1. Well Location & Acreage Dedication Plat  
2. Supplemental Drilling Data  
3. Surface Use PlanPosted ID-1  
7-16-82  
New Inc & APIOIL & GAS  
U.S. GEOLOGICAL SURVEY  
ROSWELL, NEW MEXICO

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.

SIGNED <i>James A. Knight</i> (This space for Federal or State office use) (Orig. Sgd.) <b>GEORGE H. STEWART</b>	TITLE Agent	DATE June 16, 1982
PERMIT NO. JUL 9 1982	APPROVAL DATE	
APPROVED BY JAMES A. CILLEY DISTRICT SUPERVISOR	TITLE	DATE

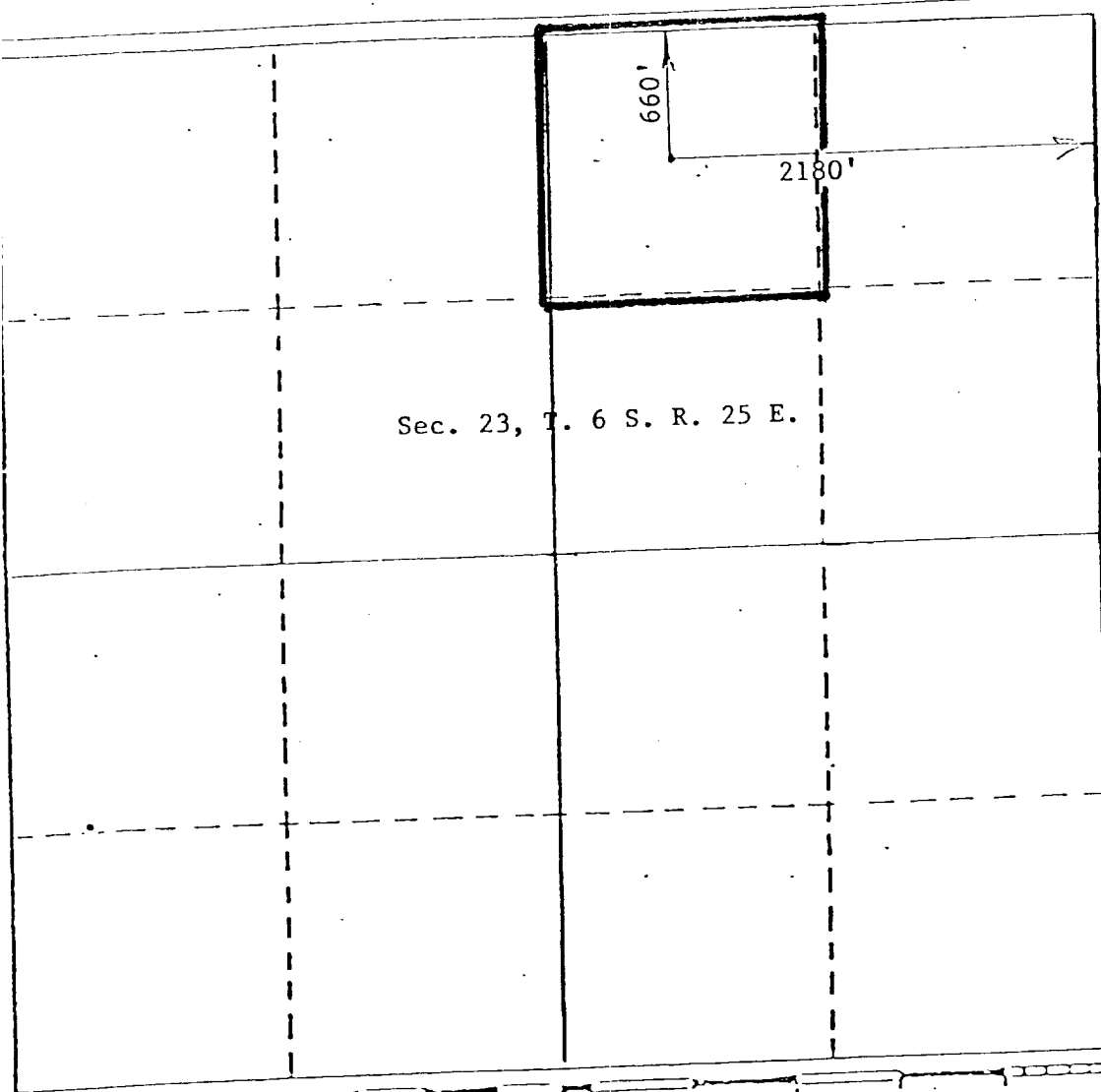
All distances must be from the outer boundaries of the Section.

Great Western Drilling Co.		Lease		Quail Federal		Well No. #9	
Section	23	Township	6 S.	Range	25 E.	County Chaves	
Postage Location of Well:		North		2180		East	
660		feet from the		line and		line	
Sound Level Elev.	3821	Producing Formation		Pool		Dedicated Acreage:	
San Andres		Undesignated		40		Acres	

1. Outline the acreage dedicated to the subject well by colored pencil or hatchure 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 Division.



# CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief.

*James A. Knauf*  
Name  
James A. Knauf

Position  
Agent

Company  
GREAT WESTERN DRILLING CO.

Date  
June 11, 1982

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.

*John D. Jaquess*  
Date Surveyed  
5-12-82  
6290  
Registered Professional Engineer  
and/or Land Surveyor  
John D. Jaquess, P.E. & L.S.  
Certificate No. 6290

## SUPPLEMENTAL DRILLING DATA

GREAT WESTERN DRILLING COMPANY  
WELL #9 QUAIL FEDERAL  
NW $\frac{1}{4}$ NE $\frac{1}{4}$  SEC. 23-6S-25E  
CHAVES COUNTY, NEW MEXICO

1. SURFACE FORMATION: Artesia Group of Permian Age.

2. ESTIMATED TOPS OF GEOLOGIC MARKERS:

San Andres	550'
Glorietta	1570'

3. ANTICIPATED POROSITY ZONES:

Fresh Water:	50-150', 550-635'
Oil:	970-1185'

4. CASING DESIGN:

<u>Size</u>	<u>Interval</u>	<u>Weight</u>	<u>Grade</u>	<u>Joint</u>	<u>Condition</u>
8 5/8"	0 - 900'	32.75#	K-55	STC	New
4 1/2"	0 - 1500'	9.5 #	K-55	STC	New

5. SURFACE CONTROL EQUIPMENT: A pressure control valve and oil saver.

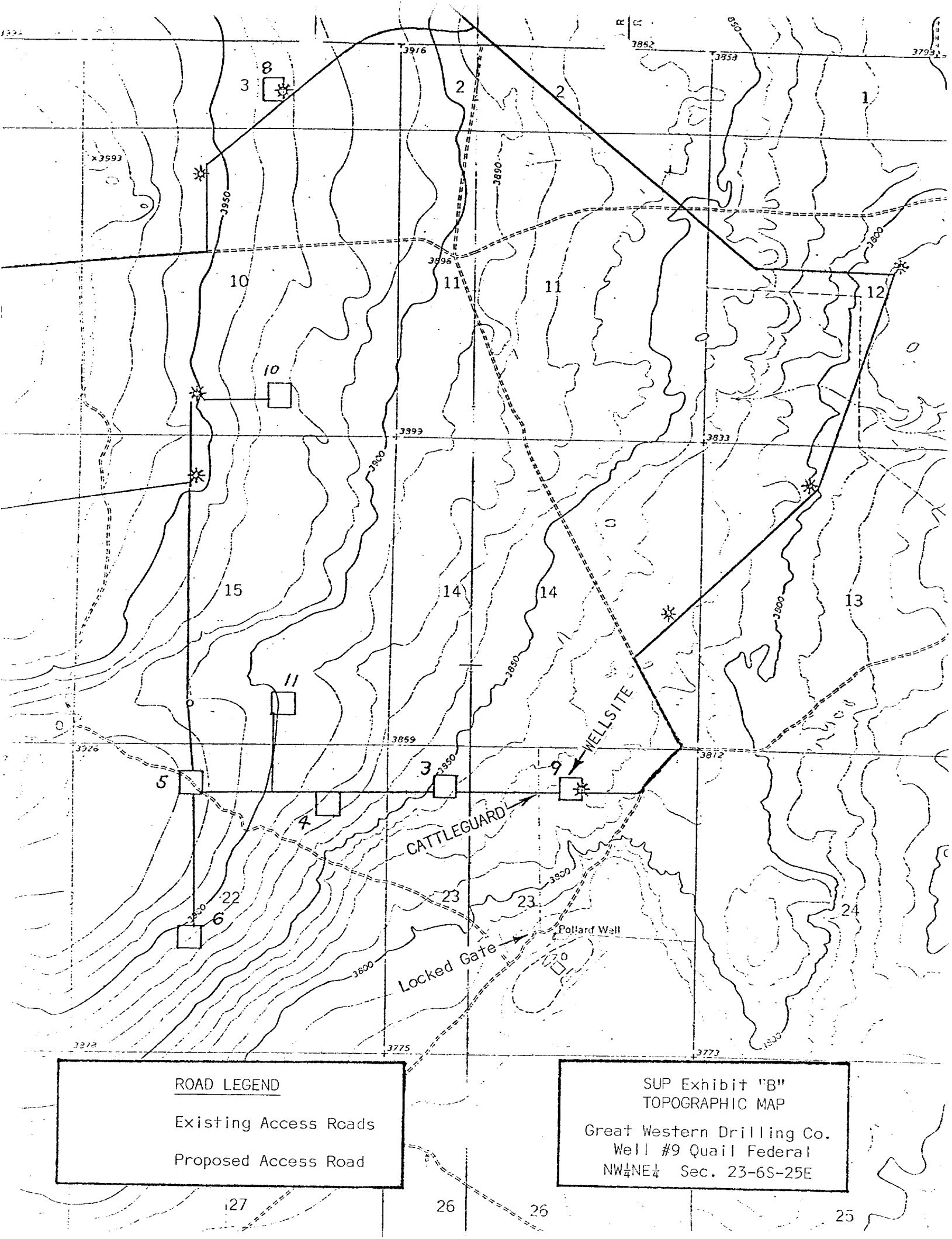
6. CIRCULATING MEDIUM: Not applicable for cable tool hole.

7. AUXILLARY EQUIPMENT: None considered necessary.

8. LOGGING PROGRAM: A Gamma Ray Log will be run to TD.

9. ABNORMAL PRESSURES, TEMPERATURES OR GASES: None anticipated.

10. ANTICIPATED STARTING DATE: It is planned that operations will commence about July 10, 1982. Duration of drilling, testing, and completion operations should be 2 to 5 weeks.



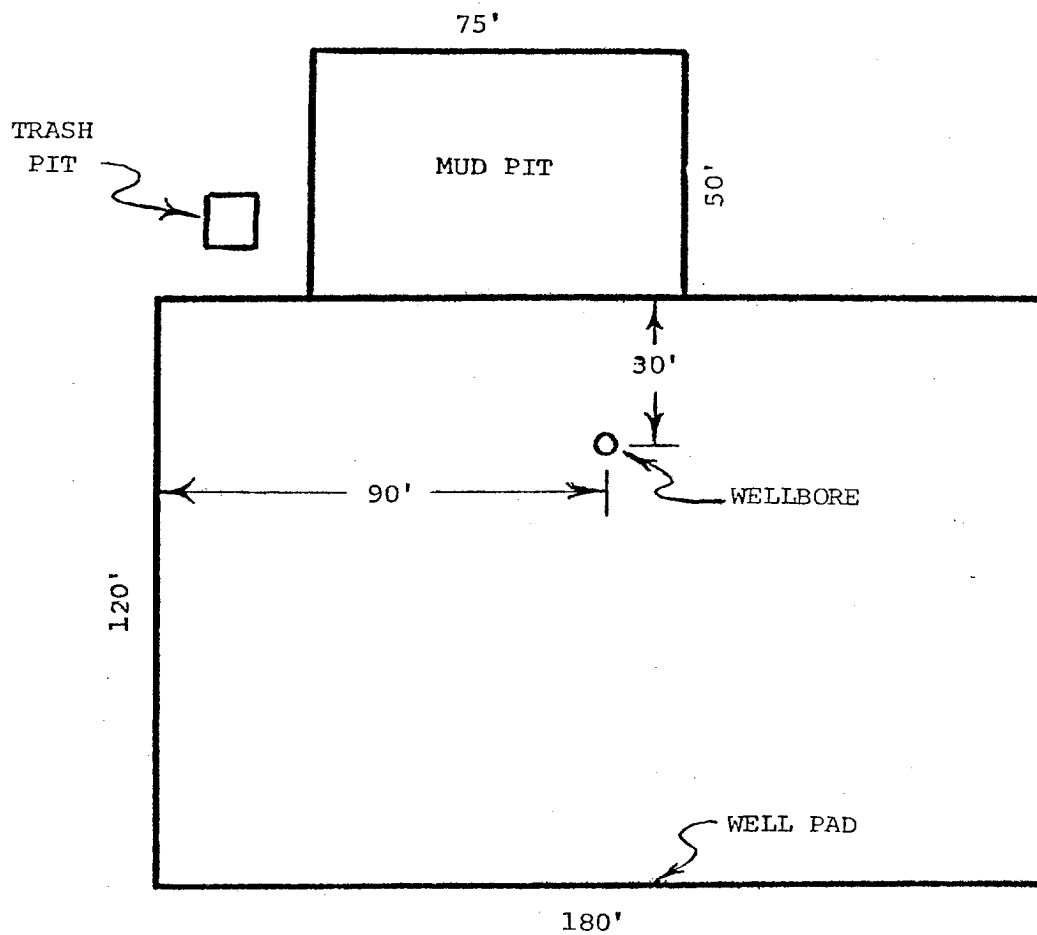
ROAD LEGEND

Existing Access Roads

Proposed Access Road

SUP Exhibit "B"  
TOPOGRAPHIC MAP

Great Western Drilling Co.  
Well #9 Quail Federal  
NW¼NE¼ Sec. 23-6S-25E



SUP Exhibit "D"  
SKETCH OF WELL PAD  
Great Western Drilling Co.  
Well #9 Quail Federal  
NW $\frac{1}{4}$ NE $\frac{1}{4}$  Sec. 23-6S-25E