

(July 1994)

**UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT**

(Other instructions on
reverse side)

FORM APPROVED
OMB NO. 1004-0136
Expires: February 28, 1995

APPLICATION FOR PERMIT TO DRILL OR DEEPEN

1a. TYPE OF WORK

DRILL ☒DEEPEN ☐

b. TYPE OF WELL

OIL
WELL ☒GAS
WELL ☐

OTHER

SINGLE
ZONE ☒MULTIPLE
ZONE ☐

2. NAME OF OPERATOR

CONCHO RESOURCES, INC. (ERICK NELSON) 915-883-7443

3. ADDRESS AND TELEPHONE NO.

110 WEST LOUISIANA SUITE 410 MIDLAND, TEXAS 79702 915-883-7443

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

At surface
660' FWL & 1930' FSL SEC. 25 T25S-R29E EDDY CO. NM
At proposed prod. zone SAME

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

Approximately 17 miles Southeast of Loving New Mexico

15. DISTANCE FROM PROPOSED*

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

660'

18. NO. OF ACRES IN LEASE

640

17. NO. OF ACRES ASSIGNED
TO THIS WELL

40

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

1270'

20. PROPOSED DEPTH

7000'

21. ROTARY OR CABLE TOOLS

ROTARY

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

3040' GR.

23.

PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
25"	Conductor	NA	40'	Cement to surface with Redi-mix
17½"	H-40 13 3/8"	48	785' 600'	600 Sx. circulate to surface
11"	K-55 8 5/8"	32	3200'	1000 Sx. " " "
7 7/8"	N-80 5½"	17	7000'	600 Sx. Est. TOC 2800'

1. Drill 25" hole to 40'. Set 40' of 20" conductor pipe and cement to surface with Redi-mix.
2. Drill 17½" hole to 600'. Run and set 600' of 13 3/8" H-40 48# ST&C casing. Cement with 600 Sx. of Class "C" cement + 2% CaCl, + ¼# floccle/Sx. circulate cement to surface
3. Drill 11" hole to 3200'. Run and set 3200' of 8 5/8" K-55 32# ST&C casing. Cement with 800 Sx. of Class "C" Light + 2% CaCl, tail in with 200 Sx. of Class "C" cement + 2% CaCl, circulate cement to surface.
4. Drill 7 7/8" hole to 7000'. Run and set 7000' of 5½" N-80 17# LT&C casing. Cement with 400 Sx. of Class "H" Light + additives, tail in with 200 Sx. of Class "H" Premium Plus + additives, estimate top of cement 2800' from surface.

IN ABOVE SPACE DESCRIBE PROPOSED PROGRAM: If proposal is to deepen, 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

TITLE

APPROVAL SUBJECT TO

DATE 02/26/01

(This space for Federal or State office use)

PERMIT NO.

ATTACHED

Application approval does not warrant or certify that 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:

APPROVED BY

TITLE

DATE

*See Instructions On Reverse Side

APPROVAL FOR 1 YEAR

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.

DISTRICT I
P.O. Box 1980, Hobbs, NM 88241-1980

DISTRICT II
P.O. Drawer DD, Artesia, NM 88211-0719

DISTRICT III
1000 Rio Brazos Rd., Aztec, NM 87410

DISTRICT IV
P.O. BOX 2088, SANTA FE, N.M. 87504-2088

State of New Mexico
Energy, Minerals and Natural Resources Department

Form C-102
Revised February 10, 1994
Submit to Appropriate District Office
State Lease - 4 Copies
Fee Lease - 3 Copies

OIL CONSERVATION DIVISION

P.O. Box 2088
Santa Fe, New Mexico 87504-2088

WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number	Pool Code 8085	Pool Name BRUSHY DRAW DELAWARE-NORTH
Property Code	Property Name TESUQUE "25" FEDERAL	Well Number 2
OGRID No. 166111	Operator Name CONCHO RESOURCES, INC.	Elevation 3040'

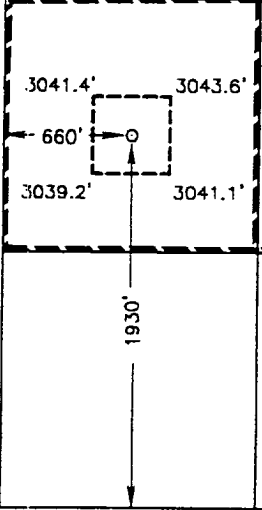
Surface Location

UL or lot No. L	Section 25	Township 25-S	Range 29-E	Lot Idn	Feet from the 1930	North/South line SOUTH	Feet from the 660	East/West line WEST	County EDDY
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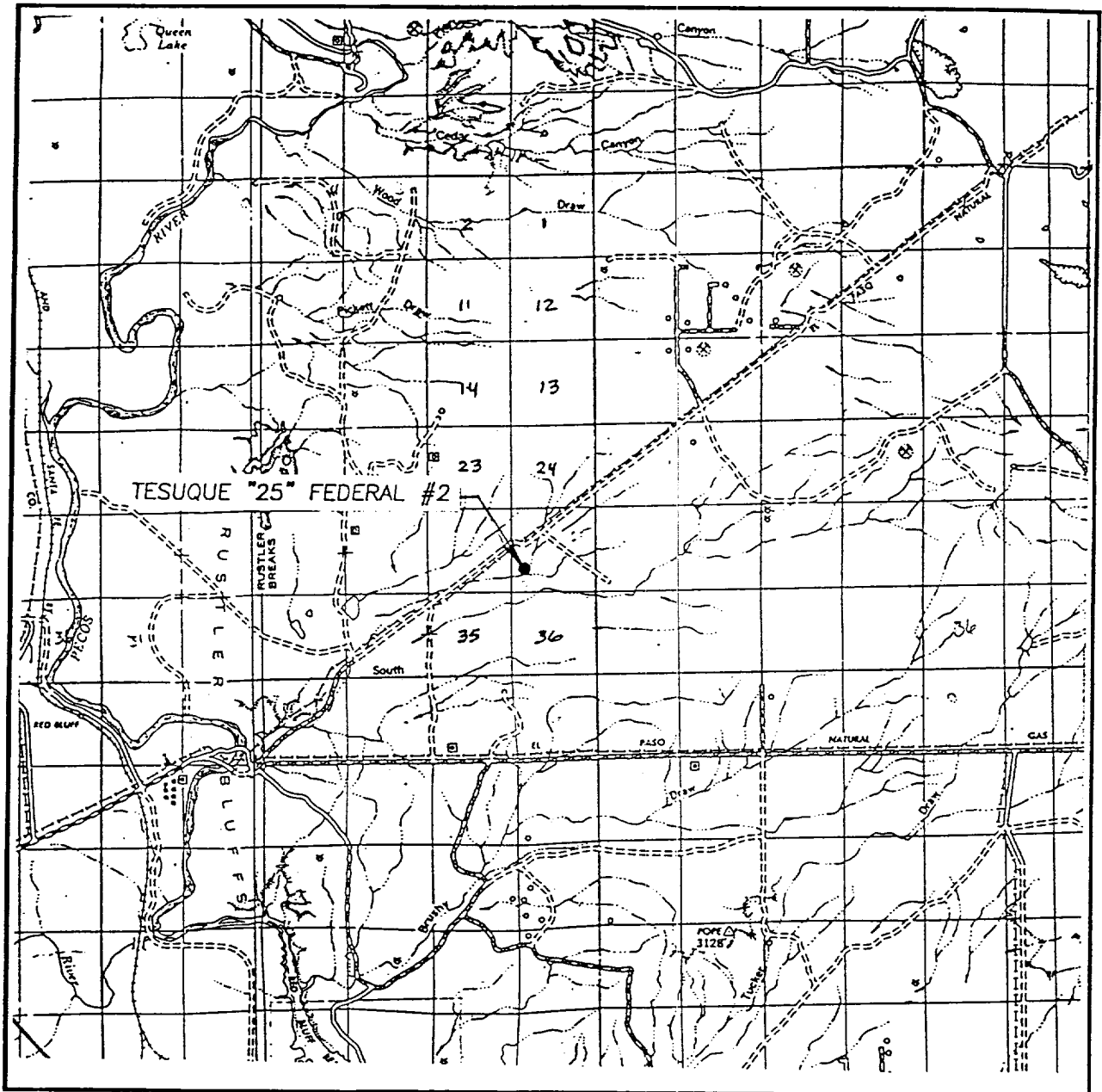
Bottom Hole Location If Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
Dedicated Acres 40	Joint or Infill	Consolidation Code	Order No.						

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>OPERATOR CERTIFICATION</p> <p>I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.</p> <p><i>Joe T. Janica</i> Signature Joe T. Janica Printed Name Agent Title 02/26/01 Date</p> <p>SURVEYOR CERTIFICATION</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>FEBRUARY 06, 2001</p> <p>Date Surveyed Signature & Seal of Professional Surveyor <i>Ronald J. Edson</i> 02/09/01 01-11-0174 Certificate No. RONALD J. EDSON 3239 GARY EDSON 12641</p>
				

VICINITY MAP



SCALE: 1" = 2 MILES

SEC. 25 TWP. 25-S RGE. 29-E

SURVEY N.M.P.M.

COUNTY EDDY

DESCRIPTION 1930'FSL & 660'FWL

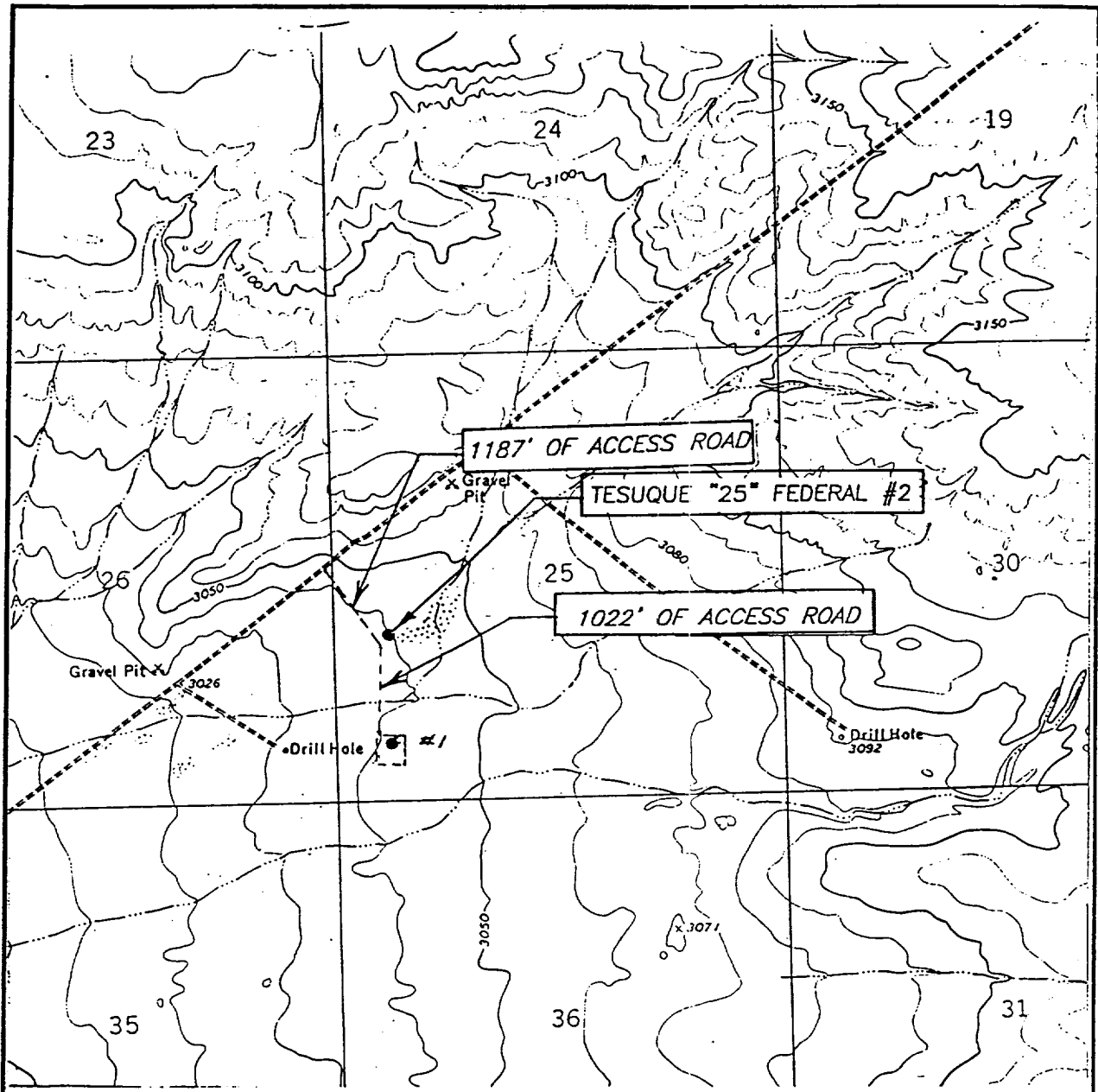
ELEVATION 3040'

OPERATOR CONCHO RESOURCES, INC.

LEASE TESUQUE "25" FEDERAL

JOHN WEST SURVEYING
HOBBS, NEW MEXICO
(505) 393-3117

LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL: 10'

ROSS RANCH, N.M.

SEC. 25 TWP. 25-S RGE. 29-E

SURVEY N.M.P.M.

COUNTY EDDY

DESCRIPTION 1930' FSL & 660' FWL

ELEVATION 3040'

OPERATOR CONCHO RESOURCES, INC.

LEASE TESUQUE "25" FEDERAL

U.S.G.S. TOPOGRAPHIC MAP

ROSS RANCH, N.M.

JOHN WEST SURVEYING
HOBBS, NEW MEXICO
(505) 393-3117

APPLICATION TO DRILL
CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E 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 consideration.

1. Location: 660' FWL & 1930' FSL SEC. 25 T25S-R29E EDDY CO. NM
2. Elevation above Sea Level: 3040' 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: 7000'
6. Estimated tops of geological markers:

Salt	800'	Bell Canyon	3250'
Lamar	3200'	Cherry Canyon	4230'
		Delaware	6500'
7. Possible mineral bearing formations:

Cherry Canyon	Oil
Delaware	Oil
8. Casing program:

Hole size	Interval	OD of casing	Weight	Thread	Collar	Grade
25"	0-40'	20"	NA	NA	NA	Conductor
17½"	0-600' 755'	13 3/8"	48#	8-R	ST&C	N-40
11"	0-3200'	8 5/8"	32#	8-R	ST&C	K-55
7 7/8"	0-7000'	5½"	17#	8-R	LT&C	J-55 N-80

CONCHO RESOURCES, INC.
 TESUQUE "25" FEDERAL # 2
 UNIT "L" SECTION 25
 T25S-R29E EDDY CO. NM

9. Cementing and Setting Depth:

20"	Conductor	Set 40' of 20" conductor pipe and cement to surface with Redi-mix.
13 3/8"	Surface	Set 600' of 13 3/8" 48# H-40 ST&C casing. Cement with 600 Sx. of Class "C" cement + 2% CaCl ₂ + 1/4# Flocele/Sx., circulate cement to surface.
8 5/8"	Intermediate	Set 3200' of 8 5/8" 32# K-55 ST&C casing. Cement with 800 Sx. of Class "C" Light cement + additives, tail in with 200 Sx. of Class "C" + 2% CaCl ₂ + 1/4# Flocele/Sx., circulate cement to surface.
5 1/2"	Production	Set 7000' of 5 1/2" 17# N-80 & J-55 LT&C casing. Cement with 400 Sx. of Class "H" Light + additives, tail in with 200 Sx. of Class "H" Premium Plus + additives estimate top of cement 2800'.

10. Pressure Control Equipment: Exhibit "E". A 900 Series 3000 PSI working pressure B.O.P. consisting of a double ram type preventor with a bag type annular preventor. BOP unit will be hydraulically operated. Exhibit "E-1". Choke manifold and closing unit. BOP will be nipped up on 13 3/8" casing and will be operated at least once each 24 Hr. period while drilling and blind rams will be operated when out of hole during trips. Flow sensor, PVT, full opening stabbing valve and upper kelly cock will be utilized. No abnormal pressure or temperature is expected while drilling.

11. Proposed Mud Circulating System:

Depth	Mud Wt.	Visc.	Fluid Loss	Type Mud
40-600' 785	8.4-8.7	29-36	NC	Fresh water spud mud add paper to control seepage.
600-3200'	10.2-10.4	29-38	NC	Brine water add paper to control seepage and high viscosity sweeps to clean hole.
3200-7000'	8.4-8.6	29-38	NC	Fresh water add Gel for viscosity and clean hole with high viscosity sweeps. Lower water loss with a Polymer if necessary.

Sufficient mud materials to maintain mud properties, meet lost circulation and weight increase requirements will be kept at well site at all times. In order to log well and run casing the viscosity may have to be raised and the water loss lowered in order to do so.

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

12. Testing, Logging and Coring Program:

- A. Open hole logs: Run Dual Induction, SNP, Gamma Ray, Caliper from TD to 3200'. Run Gamma Ray, Neutron from 3200' to surface.
- B. Rig up mud logger on hole at 3200' and keep on hole to TD.
- C. No cores of DST's are planned at this time.

13. Potential Hazards:

No abnormal pressures or temperatures are expected. Hydrogen Sulfide gas may be encountered, H₂S detectors will be in place to detect any presence. No lost circulation is expected to occur. All personnel will be familiar with all aspects of safe operation of equipment being used. Estimated BHP 3500 PSI, estimated BHT 135°.

14. Anticipated Starting Date and Duration of Operation:

Road and location construction will begin after BLM approval of APD. Anticipated spud date as soon as approved. Drilling expected to take 20 days. If production casing is run an additional 30 days will be required to complete and construct surface facilities.

15. Other Facets of Operations:

After running casing, cased hole gamma ray neutron collar logs will be run from total depth over possible pay intervals. The Delaware pay will be perforated and stimulated. The well will be swab tested and potentialized as an oil well.

HYDROGEN SULFIDE DRILLING OPERATIONS PLAN

1. All Company and Contract personnel admitted on location must be trained by a qualified H₂S safety instructor to the following:
 - A. Characteristics of H₂S
 - B. Physical effects and hazards
 - C. Proper use of safety equipment and life support systems.
 - D. Principle and operation of H₂S detectors, warning system and briefing areas.
 - E. Evacuation procedure, routes and first aid.
 - F. Proper use of 30 minute pressure demand air pack.
2. H₂S Detection and Alarm Systems
 - A. H₂S 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, H₂S 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 the location is near to a dwelling a closed DST will be performed.

HYDROGEN SULFIDE DRILLING OPERATIONS PLAN

8. Drilling contractor supervisor will be required to be familiar with the effects H₂S has on tubular goods and other mechanical equipment.
9. If H₂S 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 H₂S scavengers if necessary.

SURFACE USE PLAN

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

1. EXISTING ROADS. Area map, Exhibit "B" is a reproduction of the New Mexico General Hi-way Co. Map. Exhibit "C" is a reproduction of a topographic map. Existing roads and proposed roads are shown on each exhibit. All roads will be maintained in a condition equal to or better than of construction.
 - A. Exhibit "A" shows the well location as staked.
 - B. From Malaga New Mexico take U.S. Hi-way 285 South 12.5 miles to CR-725, turn Left go 3.8 miles and cross Pecos River continue .2 miles to El Paso Pipeline Road, Turn Left go 4.1 miles along pipeline road turn Right (SOUTH) go 1200' to location
 - C. Necessary flowlines and powerlines will be constructed along road R-O-W where required to produce this lease. See Exhibit "F" for proposed route of flowlines and powerlines..
2. PLANNED ACCESS ROADS: approximately 1200' of new road to be constructed. If well # 2 is drilled first.
 - A. The access road will be crowned and ditched to a 12'00" wide travel surface with 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 - None known
 - 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

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

4. If on completion this well is a producer Concho Resources, Inc. will furnish maps and/or plats showing on site facilities or off site facilities if required. R-O-W's for pipelines and powerlines along existing R-O-W's or existing roads as shown on Exhibit "F"

5. LOCATION AND TYPE OF WATER SUPPLY:

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

6. SOURCE OF CONSTRUCTION MATERIAL:

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

7. METHODS OF HANDLING WASTE MATERIAL:

- A. Drill cuttings will be disposed of in the reserve pit.
- B. All trash, junk and other waste material will be contained in trash cages or 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 supplier including broken sacks.
- D. Sewage from living quarters will drain into holes with a minimum depth of 10'. These holes will be covered during drilling and will be back filled upon completion. A Porta-John will be provided for the rig crews. This equipment will be properly maintained during the drilling operations and removed upon completion of the well.
- E. Remaining drilling fluids will be allowed to evaporate in the reserve pit until the pit is dry enough for breaking out. In the event that drilling fluids do not evaporate in a reasonable time they will be hauled off by transports and be disposed of at a state approved disposal facility. Later pits will be broken out to speed drying. Water produced during testing will be put in reserve pits. Any oil or condensate produced will be stored in test tanks until sold and hauled from the site.

8. ANCILLARY FACILITIES:

- A. No camps or airstrips to be constructed.

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

9. WELL SITE LAYOUT

- A. Exhibit "D" shows the proposed well site layout.
- B. This exhibit indicated proposed location of reserve and sump pits and living facilities.
- C. Mud pits in the active circulating system will be steel pits & the reserve pit is proposed to be unlined unless subsurface condition encountered during pit construction indicate that lining is needed for lateral containment of fluids.
- D. If needed, the reserve pit is to be lined with polyethelene. The pit liner will be 6 mils thick. Pit liner will extend a minimum 2'00" over the reserve pits dikes where the liner will be anchored down.
- E. The reserve pit will be fenced on three sides with four strands of barbed wire during drilling and completion phases. The fourth side will be fenced after all drilling operations have ceased. If the well is a producer, the reserve pit fence will be torn down. The reserve pit and those areas of the location not essential to production facilities will be reclaimed and seeded per BLM requirements.

10. PLANS FOR RESTORATION OF SURFACE

Rehabilitation of the location and reserve pit will start in a timely manner after all drilling operations cease. The type of reclamation will depend on whether the well is a producer or a dry hole.

However, in either event, the reserve pit will be allowed to dry properly, and fluid removed and disposed of in accordance with Article 7.3 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 erosion. These may need to be modified in certain circumstances to prevent inundation of the location's pad and surface facilities. After the area has been shaped and contoured, topsoil from the spoil pile will be placed over the disturbed area to the extent possible. Revegetation procedures will comply with BLM standards.

If the well is a dry hole, the pad and road area will be contoured to match the existing terrain. Topsoil will be spread to the extent possible. Revegetation will comply with BLM standards.

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

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

11. OTHER INFORMATION:

- A. Topography consists of grassy flats and rolling plains, the vegetation consists of native grasses yucca, mesquite, and snake weed. drainage is Westward toward the Pecos River.
- B. The surface is owned by the Bureau of Land Management The U.S. Department of Interior, and is used by ranchers for grazing of livestock.
- C. An archaeological survey will be conducted of the location and roads. This will be submitted to the Bureau of Land Management when it is completed.
- D. There is a dwelling approximately 1.5 miles Northeast of location.

12. OPERATORS REPRESENTATIVE:

Before construction:

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

During and after construction:

PENWELL ENERGY, INC.
600 NORTH MARIENFELD
SUITE 1100
MIDLAND, TEXAS 79701
ERICK NELSON (915-683-7443)

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, true and correct; and that the work associated with the operations proposed herein will be performed by Concho Resources, 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 : 02/26/01
TITLE : Agent

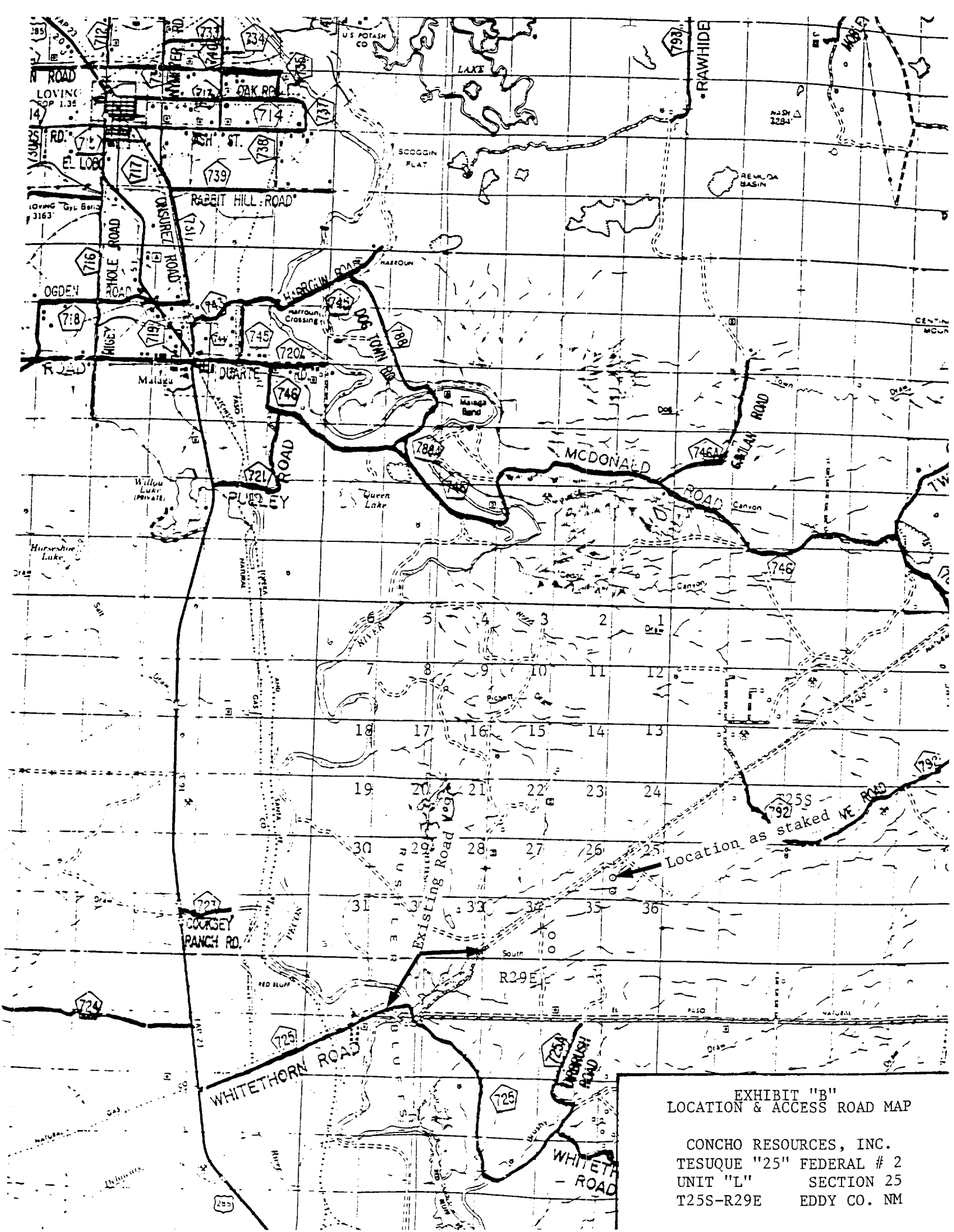


EXHIBIT "B"
LOCATION & ACCESS ROAD MAP

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

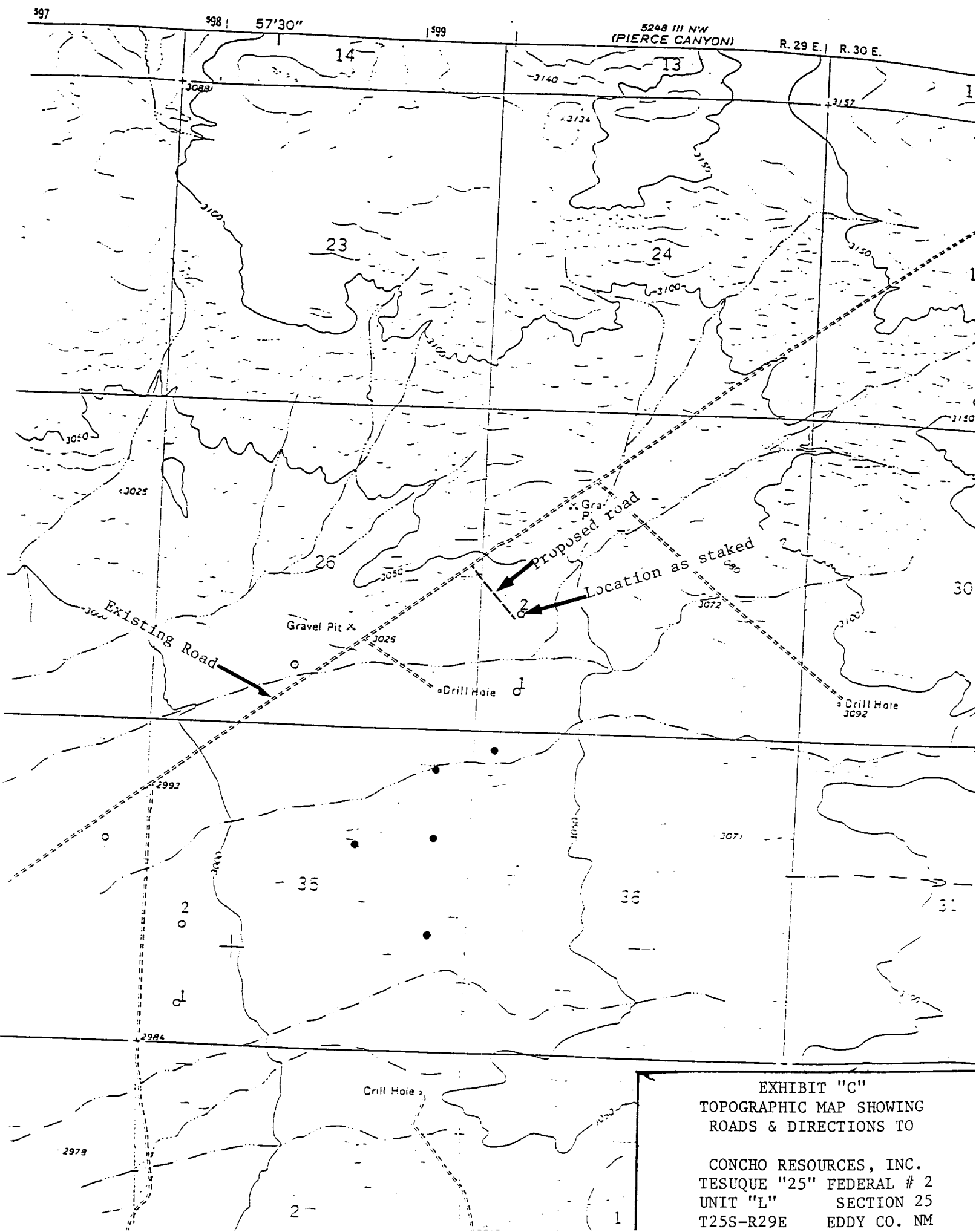


EXHIBIT "C"
TOPOGRAPHIC MAP SHOWING
ROADS & DIRECTIONS TO

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

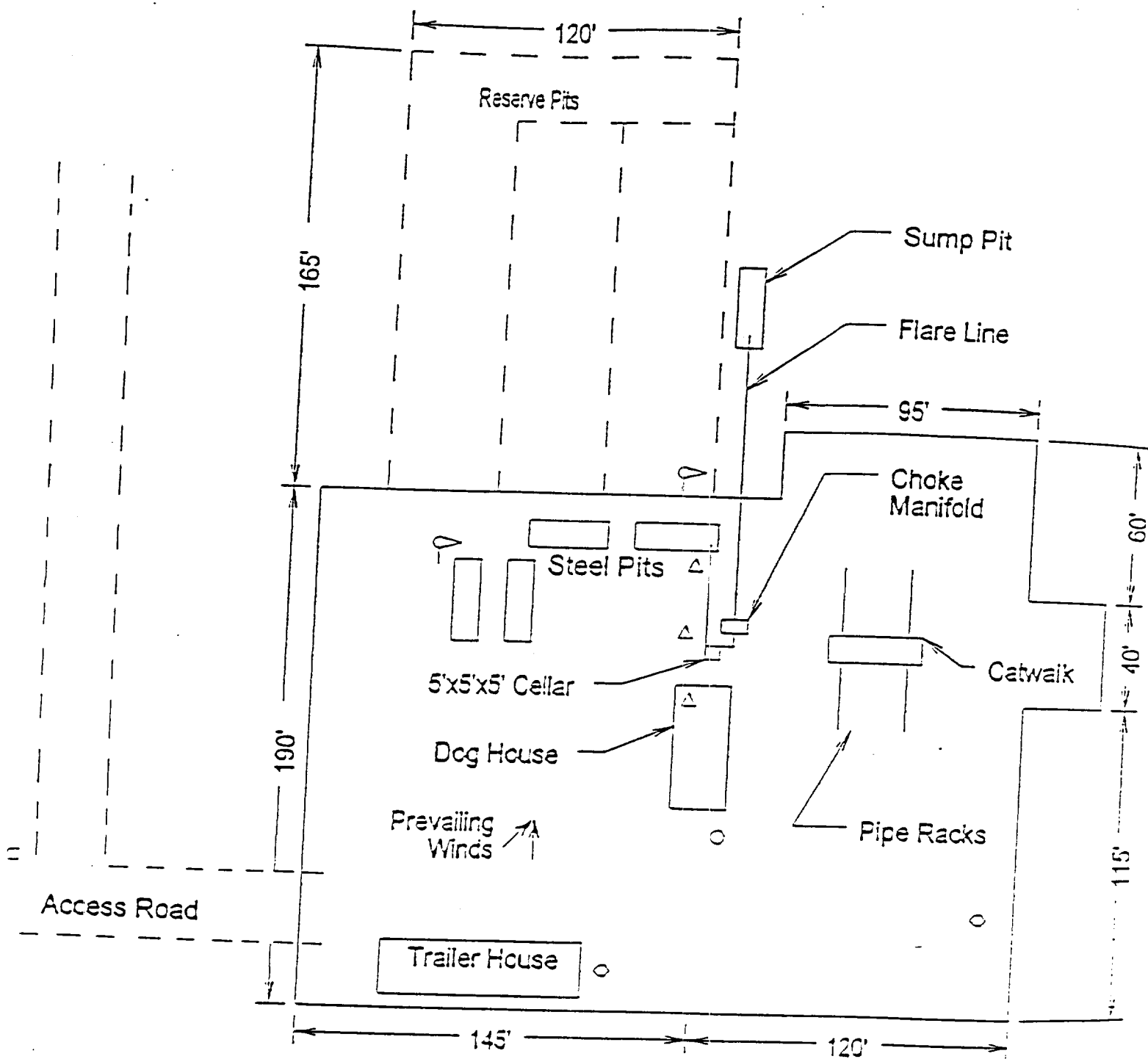
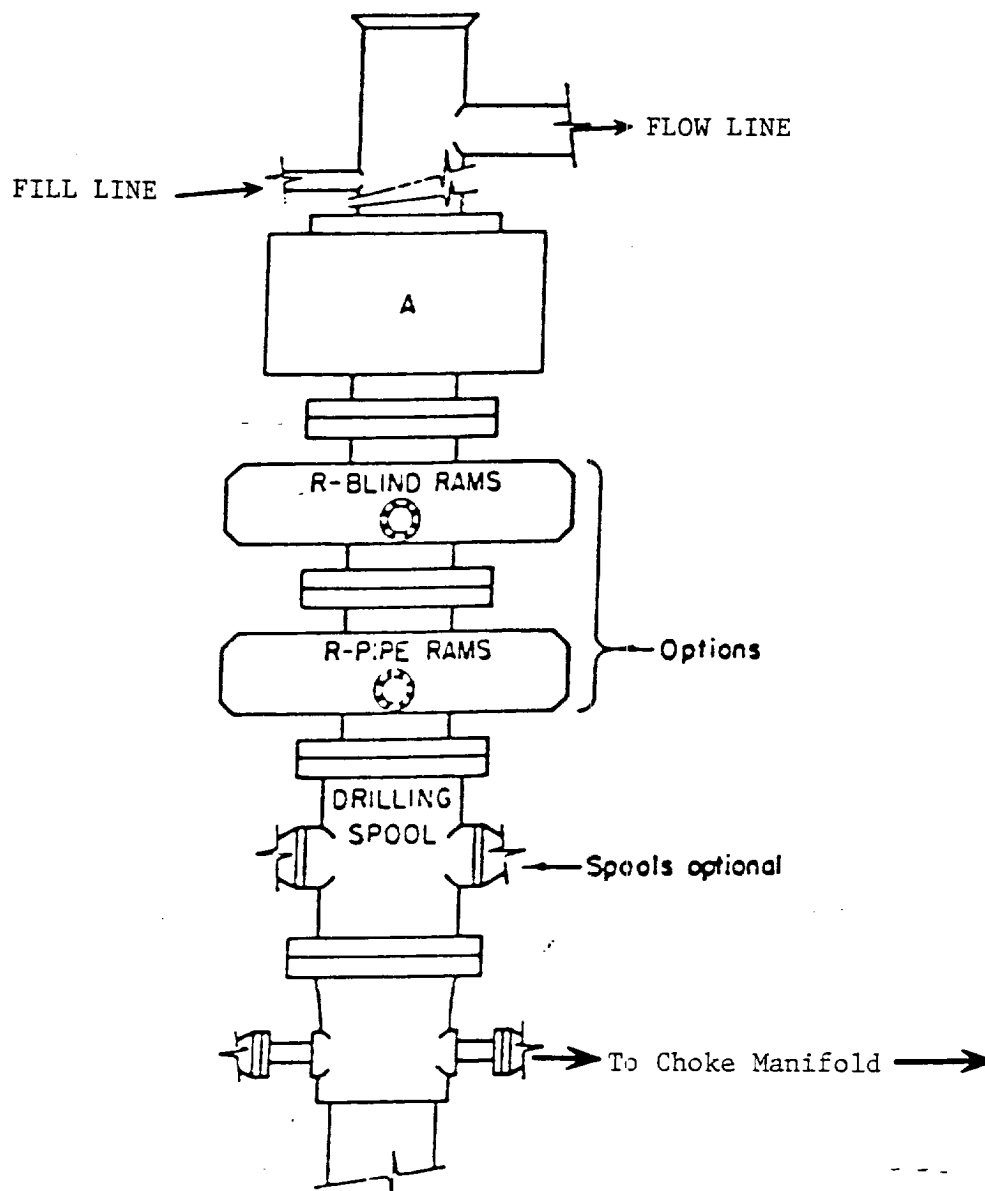


EXHIBIT "D"
RIG LAYOUT PLAT

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM



ARRANGEMENT SRRA

900 Series
3000 PSI WP

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

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

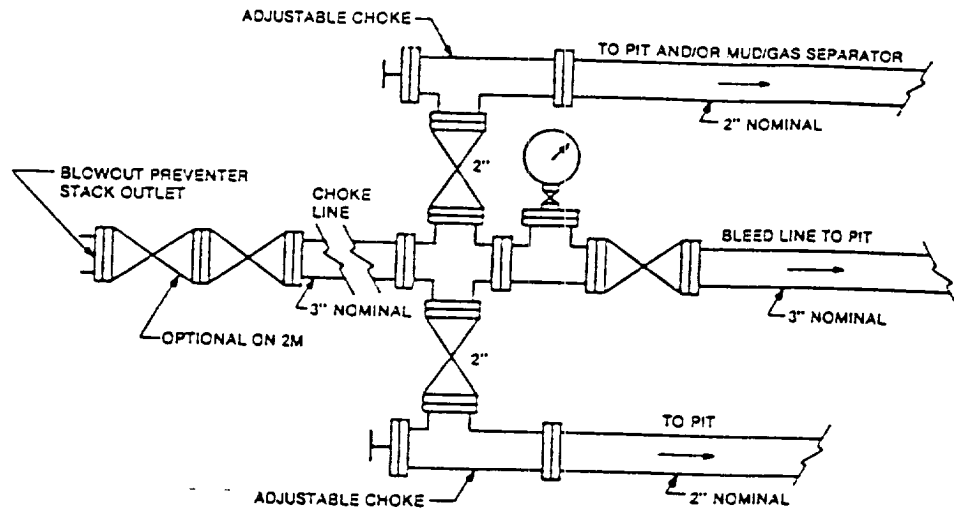


FIGURE K-1. Typical choke manifold assembly for 2M and 3M rated working pressure service — surface installation.

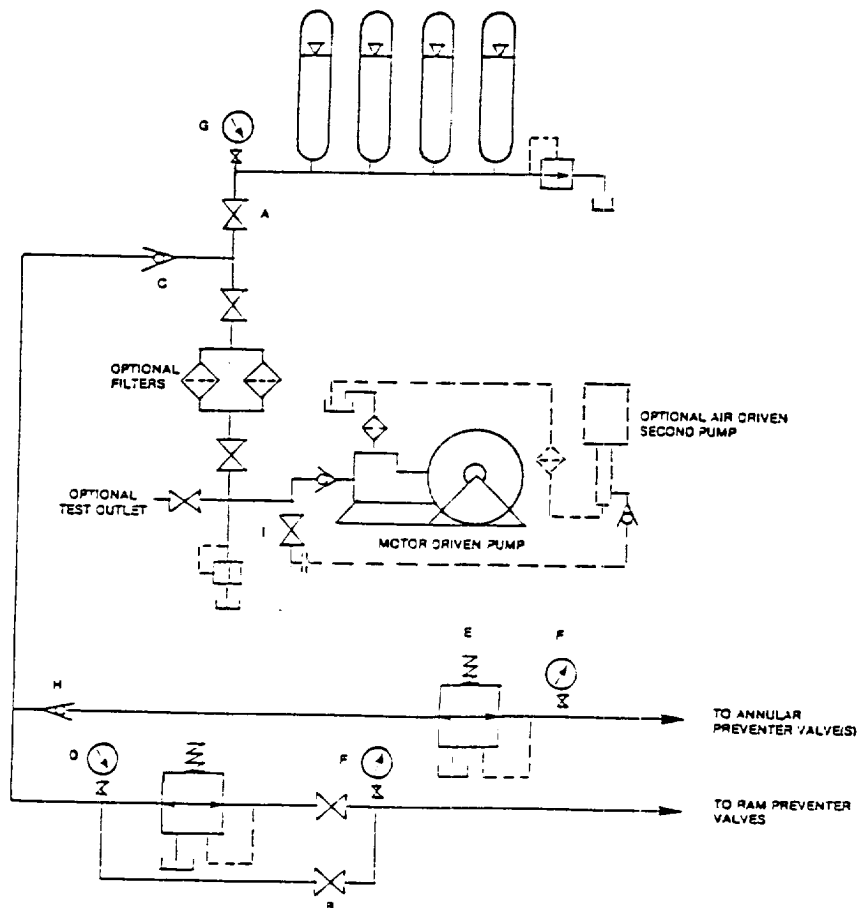


FIGURE K6-1. The schematic sketch of an accumulator system shows required and optional components.

EXHIBIT "E-1"
CHOLE MANIFOLD & CLOSING UNIT

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM

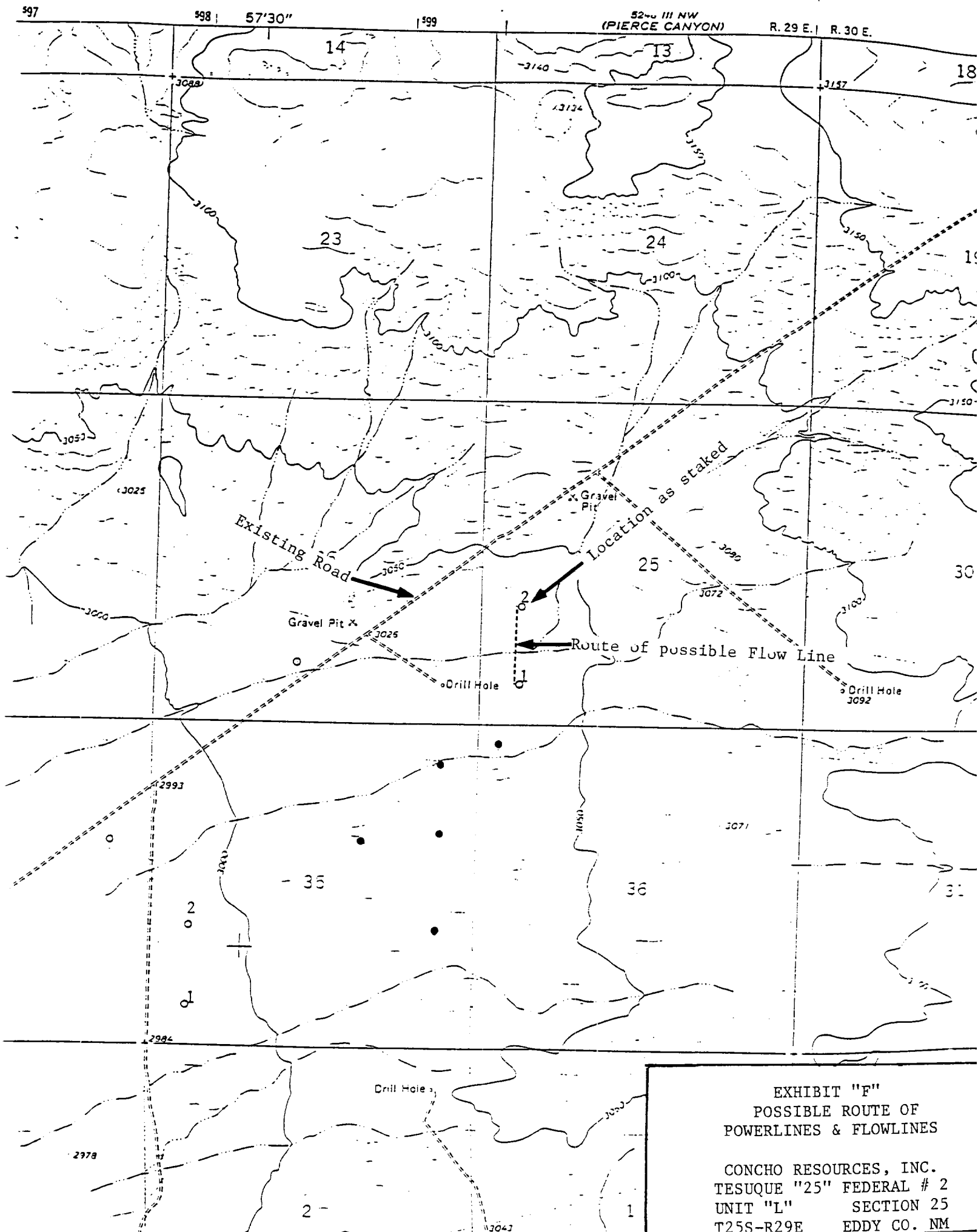


EXHIBIT "F"
POSSIBLE ROUTE OF
POWERLINES & FLOWLINES

CONCHO RESOURCES, INC.
TESUQUE "25" FEDERAL # 2
UNIT "L" SECTION 25
T25S-R29E EDDY CO. NM