Form 9-331 C
(May 1963)

COPY TO OCC

SUBMIT IN TRIPLICATE*
(Other instructions on reverse side)

Form approved.
Budget Bureau No. 42-R1425.

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

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
CONTINENTAL OIL COMPANY

3. ADDRESS OF OPERATOR
P.O. BOX 460 HOBBS N.M. 88240

4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements.*)
At surface
1980' FNL AND 1980' FWL
At proposed prod. zone
SAME

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

5. LEASE DESIGNATION AND SERIAL NO.
LC 063458

6. IF INDIAN, ALLOTTEE OR TRIBE NAME

7. UNIT AGREEMENT NAME
NMFU

8. FARM OR LEASE NAME
WARREN UNIT

9. WELL NO.
73

10. FIELD AND POOL, OR WILDCAT
BLINEBRY OIL + GAS
WARREN TUBB (OIL) UNDESIGNATED

11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA
SEC. 25, T20S, R38E

12. COUNTY OR PARISH: LEA
13. STATE: NM.

15. DISTANCE FROM PROPOSED* LOCATION TO NEAREST PROPERTY OR LEASE LINE, FT. (Also to nearest drlg. unit line, if any)	16. NO. OF ACRES IN LEASE	17. NO. OF ACRES ASSIGNED TO THIS WELL
	1920	40
18. DISTANCE FROM PROPOSED LOCATION* TO NEAREST WELL, DRILLING, COMPLETED, OR APPLIED FOR, ON THIS LEASE, FT.	19. PROPOSED DEPTH	20. ROTARY OR CABLE TOOLS
	6900'	RTY

21. ELEVATIONS (Show whether DF, RT, GR, etc.)
3566.8' GR

22. APPROX. DATE WORK WILL START*
MAY 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"	32.3#	1600'	600 SX CIRC
8 3/4"	7"	23# & 26#	6900'	1425 CIRC

IT IS PROPOSED TO DRILL A STRAIGHT HOLE TO A TD OF 6900' AND COMPLETE AS A DUAL BLINEBRY AND TUBB OIL WELL.
SEE ATTACHMENT FOR 10 POINT WELL PLAN.
SEE ATTACHED FOR 13 POINT SURFACE USE PLAN.

RECEIVED
FEB 20 1979
U. S. GEOLOGICAL SURVEY
HOBBS, 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.

24.
SIGNED Wm A. Dutton Jr. TITLE ADMINISTRATIVE SUPERVISOR DATE 2-14-79

(This space for Federal or State office use)

PERMIT NO. _____ APPROVAL DATE _____

APPROVED BY _____ TITLE _____ DATE _____

CONDITIONS OF APPROVAL, IF ANY:

APPROVED AS AMENDED
MAR 1 1979
JAMES F. SIMS
DISTRICT ENGINEER

USGS 6
NMFU 4
JFB REL
FILE
VMS

*See Instructions On Reverse Side

ATTACHMENT TO FORM 9-331 C
APPLICATION FOR PERMIT TO DRILL

Continental Oil Company
Warren Unit Nos. 70-74
T-20S, R-38E
Lea County, New Mexico

1. The geologic name of the surface formation is Quaternary Sand.

2. The estimated tops of important geologic markers are shown on the attached Proposed Well Plan.

3. The estimated depths at which anticipated water, oil, gas or other mineral-bearing formations to be encountered are shown on attached Proposed Well Plan.

4. The proposed casing program is as follows:

0' - 1600'	9 5/8", 32.3#, H-40, ST&C
0' - 5800'	7", 23#, K-55, ST&C
5800' - 6900'	7", 26#, K-55, ST&C

5. A drawing of an API Series 900 Blowout Preventer Specification is attached. Pipe rams and blinds will be checked to 1,000 PSI for 30 minutes when BOP is installed. BOP will be checked when casing string is set and operated daily for checks.

6. The proposed mud program is as follows:

0' - 1600'	8.5 - 9.0 ppg	spud mud
1600' - 6900'	9.0 - 10.0 pg	saltwater gel

7. The auxiliary equipment to be used is:

(1) kelly cocks
(2) floats at the bit

8. It is proposed to run GR CAL CNL FCD PDC logs at selected intervals, as shown on the attached Proposed Well Plan.

9. No abnormal pressures or temperatures are expected to be encountered in this well.

10. The anticipated starting date for the first well is February 12, 1979, with a duration of approximately 21 days for each well.

PEB:vjk

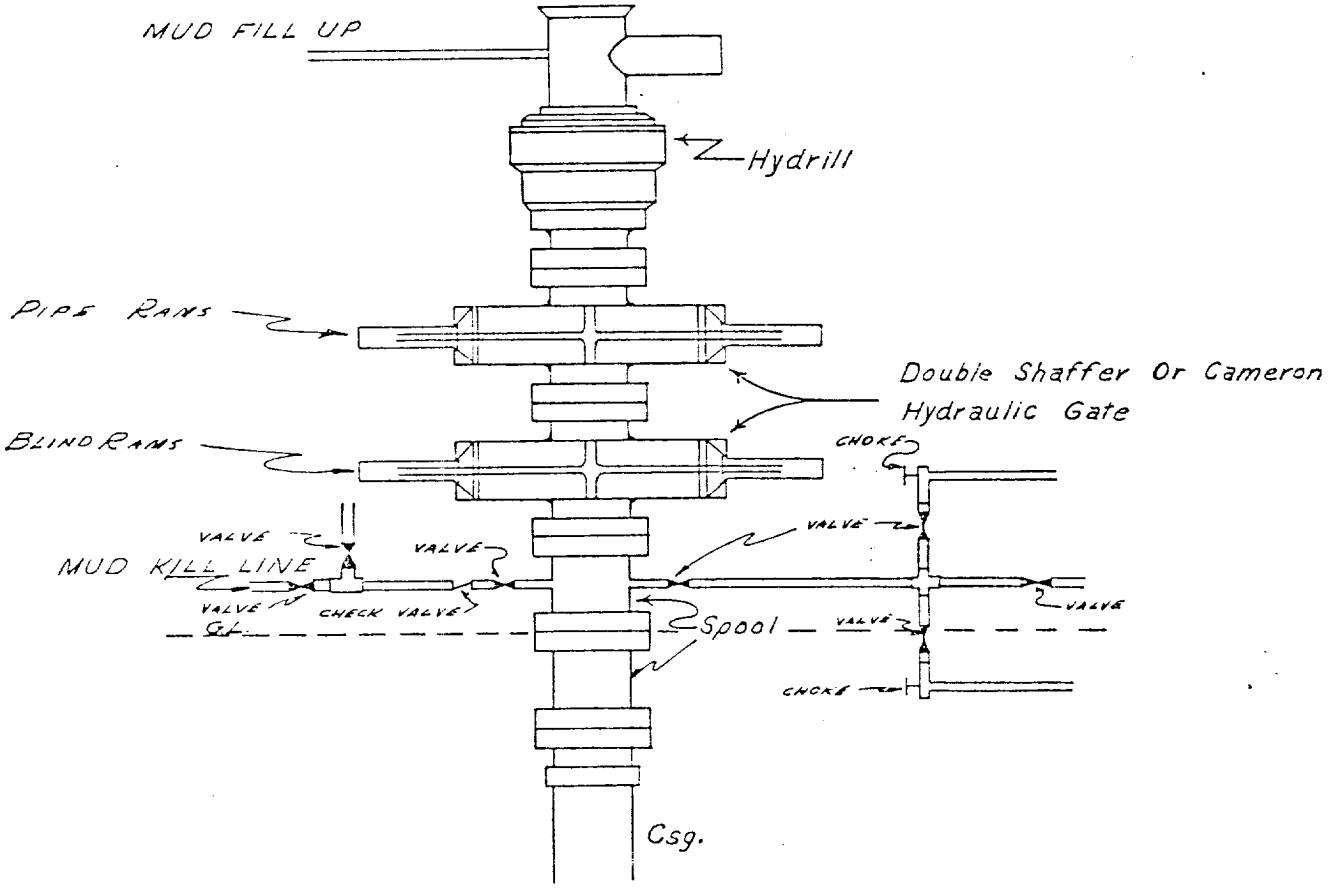
PROPOSED WELL PLAN OUTLINE

WELL NAME: Warren Unit No. 73 COUNTY: Lea

LOCATION: 1980'FNL & 1380'FWL STATE: New Mexico
Sec. 25 T-20S, R-38E

DEPTH	FORMATION TOPS & TYPE	DRILLING PROBLEMS	TYPE OF FORMATION EVALUATION	HOLE	CASING		FRACTURE GRADIENT	FORMATION PRESSURE GRADIENT	MUD	
				SIZE (IN)	SIZE (IN)	DEPTH (FT)	(PPG)	(PPG)	WEIGHT (PPG)	
	Pliestocene-Surface Santa Rosa 100-200									
1000										
	Rustler Anhy. 1570 Salado Salt 1660			12 1/4	9 5/8	1600'			8.5-9.0	Fr Wa
2000										
	Tansill Anhy. 2730 Yates SS 2870									
3000		None Anticipated	Geolograph Deflection 0-TD							
4000	San Andres dolo. 4280									
5000										
	Glorieta SS 5550									
6000	Blinebry Mkr 6035		GR-CNL-FDC DLL-Rxo TD-2600'				14.9			
	Tubb Mkr 6530							Less Than 8.5		
	Drinkard Dolo. 6800 TD-6900		Dipmeter TD-5400'	8 3/4	7"	6900'	15.1		9.0-10.0	Sa Ge
7000										

CONTINENTAL OIL COMPANY
Blow-out Preventer Specifications



API Series 900

NOTE:

Manual and Hydraulic controls with closing unit no less than 75' from well head. Remote controls on rig floor.

DUE TO SUBSTRUCTURE CLEARANCE, HYDRILL MAY OR MAY NOT BE USED.

NEW MEXICO OIL CONSERVATION COMMISSION

WELL LOCATION AND ACREAGE DEDICATION PLAT

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

All distances must be from the outer boundaries of the Section

Operator	Lease	Well No.
Continental Oil Co.	Warren Unit	73

Unit Letter	Section	Township	Range	County
F	25	20 South	38 East	Lea

Actual Footage Location of Well:
1980 feet from the North line and 1980 feet from the West line

Ground Level Elev.	Producing Formation	Pool	Dedicated Acreage:
3566.8	Blinebry and Tubb	Blinebry Oil & Gas / Warren Tubb Oil	40 Acres

1. Outline the acreage dedicated to the subject well by colored pencil or hachure marks on the plat below.

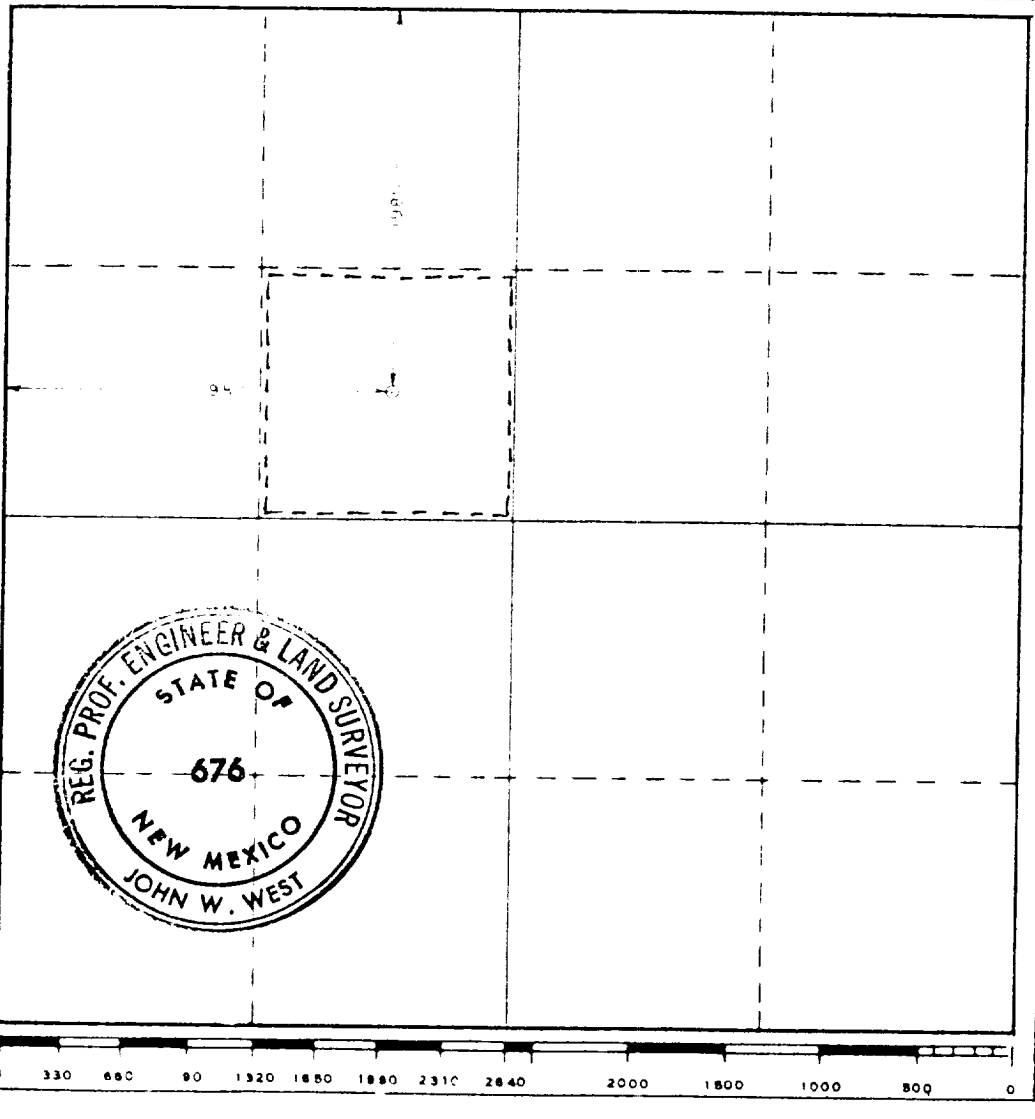
2. If more than one lease is dedicated to the well, outline each and identify the ownership thereof (both as to working interest and royalty).

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 _____

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.

Name: W. A. Buttenhoff

Position: Administrative Supervisor

Company: Continental Oil Co.

Date: Feb. 14, 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: January 10, 1979

Registered Professional Engineer and/or Land Surveyor

John W. West

Certificate No. John W. West 676
Ronald J. Eidson 3239

District Engineer
U. S. Geological Survey

Gentlemen:

Re: Warren Unit Nos 71,72,73,74

This refers to the Form 9-331C, Application to Drill, Deepen or Plugback accompanying this letter. The undersigned hereby states that he has personally contacted EARL KORNEGAY, the owner of the surface land where the proposed work is to be conducted and advised him of the proposed work, the construction site and pertinent roads included in the project. It is further stated that, upon being fully advised of the extent of the work and the effect upon the surface, said owner has consented to the said work and that agreement as to the compensation for damages to the surface estate has been reached.

It has been agreed, subject to change at that time, that upon abandonment of operations the roads shall be (ripped or ~~left intact~~) and the pad shall be (ripped or ~~left intact~~).

X [signature]

STATE OF NEW MEXICO
COUNTY OF LEA

Subscribed and sworn to before me this 15th day of February, 1979

[signature]
Notary Public

My commission expires 2-20-81

Continental Oil Company
Surface Use Plan for 10 Wells in T-20S, R-38E
Lea County, New Mexico

The plan is to accompany "Application for Permit to Drill" the subject wells. The following is a discusssion of pertinent information concerning possible effect which the proposed drilling of the wells may have on the environment of the wells and road sites and surrounding acreage. A copy will be posted on the derrick floors so that all contractors and sub-contractors will be aware of all items of this plan.

1. Existing Roads

A. The proposed well sites are as follows:
Warren Unit No. 71 - 1980' FSL and 660' FWL, Section 25
Warren Unit No. 72 - 1980' FSL and 1980' FWL, Section 25
Warren Unit No. 73 - 1980' FNL and 1980' FWL, Section 25
Warren Unit No. 74 - 660' FNL and 1980' FWL, Section 25
SEMU Warren No. 103 - 1980' FNL and 330' FWL , Section 29
SEMU Burger B No. 104 - 1980' FSL and 1650' FWL, Section 20
SEMU Permian No. 105 - 1320' FSL and 1320' FWL, Section 19
SEMU Permian No. 106 - 2640' FSL and 1320' FWL, Section 19
SEMU Permian No. 107 - 2640' FSL and 2640' FWL, Section 19
SEMU Burger B No. 108 - 1980' FSL and 330' FWL, Section 20

B. Exhibit "A" is a portion of a New Mexico road map showing existing black top roads. Directions to the area are as follows: From Stanolind Road south of Hobbs, travel south on Highway 18 for approximately 9.5 miles to Conoco's Warren Unit. The Warren Unit wells are located on the east side of the highway. Access is obtained by driving on the lease road opposite Conoco's red, white, and blue pumping units. The remaining wells are accessed via the lease road opened by Conoco's red, white and blue cattleguard. Refer to attached Exhibit "B" for lease road directions.

C. Access raods are shown on Exhibits "B" and "C".

D. No improvement or maintenance is anticipated for the existing roads.

2. Planned Access Roads

A. Width and Length: New [illegible] varying in length as shown on Exhibit "C". The new roads are labeled and coded on Exhibits "B" and "C".

B. Turnouts: None

C. Drainage Design: New roads will have a drop of 6" from center line on each side.

D. Culverts, Cuts and Fills: No culverts, major cuts or fills are required.

E. Surfacing Material: Six inches of caliche, bladed, watered, and compacted.

F. Gates, Cattleguards, Fences: None required.

G. The proposed roads are staked.

3. Location of Existing Wells

See Exhibit "C"

4. Location of Existing and/or Proposed Facilities

A. Tank Batteries: Existing batteries are spotted on Exhibit "C".

B. Producing Facilities: No new producing facilities are required.

C. Oil Gathering Lines: Flowlines will lay on the surface alongside the roads.

D. Other Lines: Electrical power lines will be constructed on 330' spans as shown on Exhibit "E". The construction and equipment specifications are included.

E. Rehabilitation: Pits will be backfilled and leveled as soon as practical to orginal condition. Commencement of rehabilitation operations will immediately follow removal of drilling and completion equipment from location. Rehabilitation of the surface is planned to be completed within 45 days from commencement.

5. Water Supply

Water for the Warren Unit Wells will be hauled from Eunice, N. M. The remaining wells will be supplied from the Eumont Hardy Water System.

6. Source of Construction Materials

Caliche will be hauled over existing roads from an existing pit in Section 15, T-20S, R-38E. See Exhibit "C".

7. Methods for Handling Waste Disposal

Waste Disposal: Well cuttings will be disposed in reserve pit. Barrel trash containers to be in accessible locations within drill site area during drilling and completion procedures. All detrimental waste will be hauled away, burned, or buried with a minimum cover of 24" of dirt. See Exhibit "D" for location of pits. If well is productive, maintenance waste will be placed in special trash cans and hauled away periodically. Any produced water will be collected in tanks until hauled to an approved disposal system, or separate disposal applications will be submitted to the survey for appropriate approval.

8. Ancillary Facilities

None

9. Well Site Layout

Exhibit "D" shows the relative location and dimensions of the well pad, mud pit, reserve pit, etc. The reserve pit will be lined with plastic. The pad and pits are staked.

10. Plans for Restoration of Surface

Pits will be backfilled and leveled as soon as practical to original condition. Commencement of rehabilitation operations will immediately follow removal of drilling and completion equipment from location and rehabilitation of the surface is planned to be completed within 45 days from commencement.

11. Other Information

A. Terrain: Rolling sand hills

B. Soil: Sandy

C. Vegetation: Shinnery, sparse

D. Surface Use: Grazing

E. Ponds and Streams: None within one mile.

F. Water Wells: See Exhibit "C"

G. Residences and Building: None

H. Arroyos, Canyons, Etc.: None

I. Well Sign: Sign identifying and locating wells will be maintained at drill sites with the spudding of the wells.

J. Open Pits: All pits containing mud or other liquids will be fenced.

K. Archaeological Resources: None observed.

12. Operator's Representive

Field personnel who can be contacted concerning compliance of this Surface Use Plan are as follows:

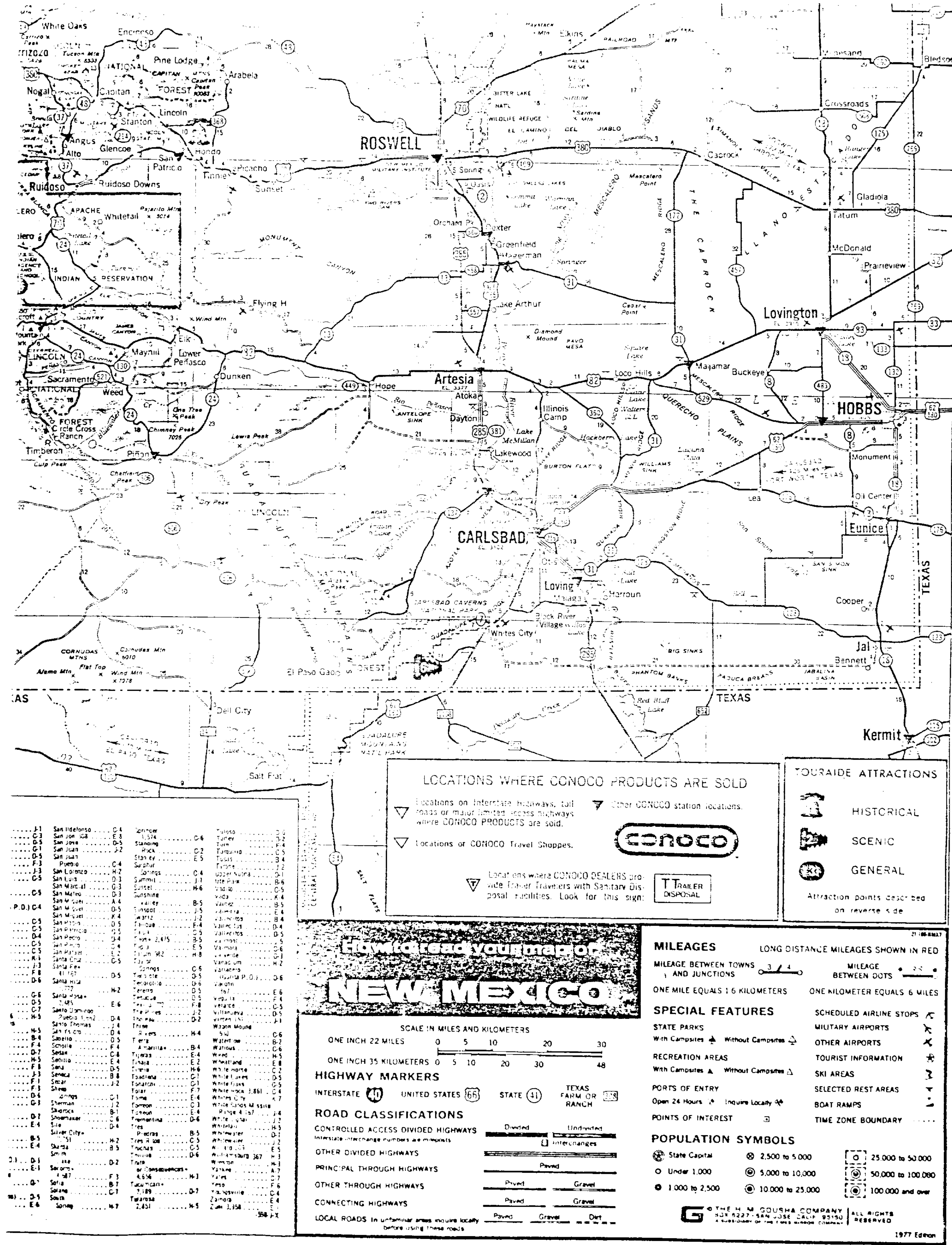
Production and Drilling
W. D. Cates or H. C. Pokrandt
1001 North Turner
Hobbs, New Mexico 88240
Phone: 393-4141

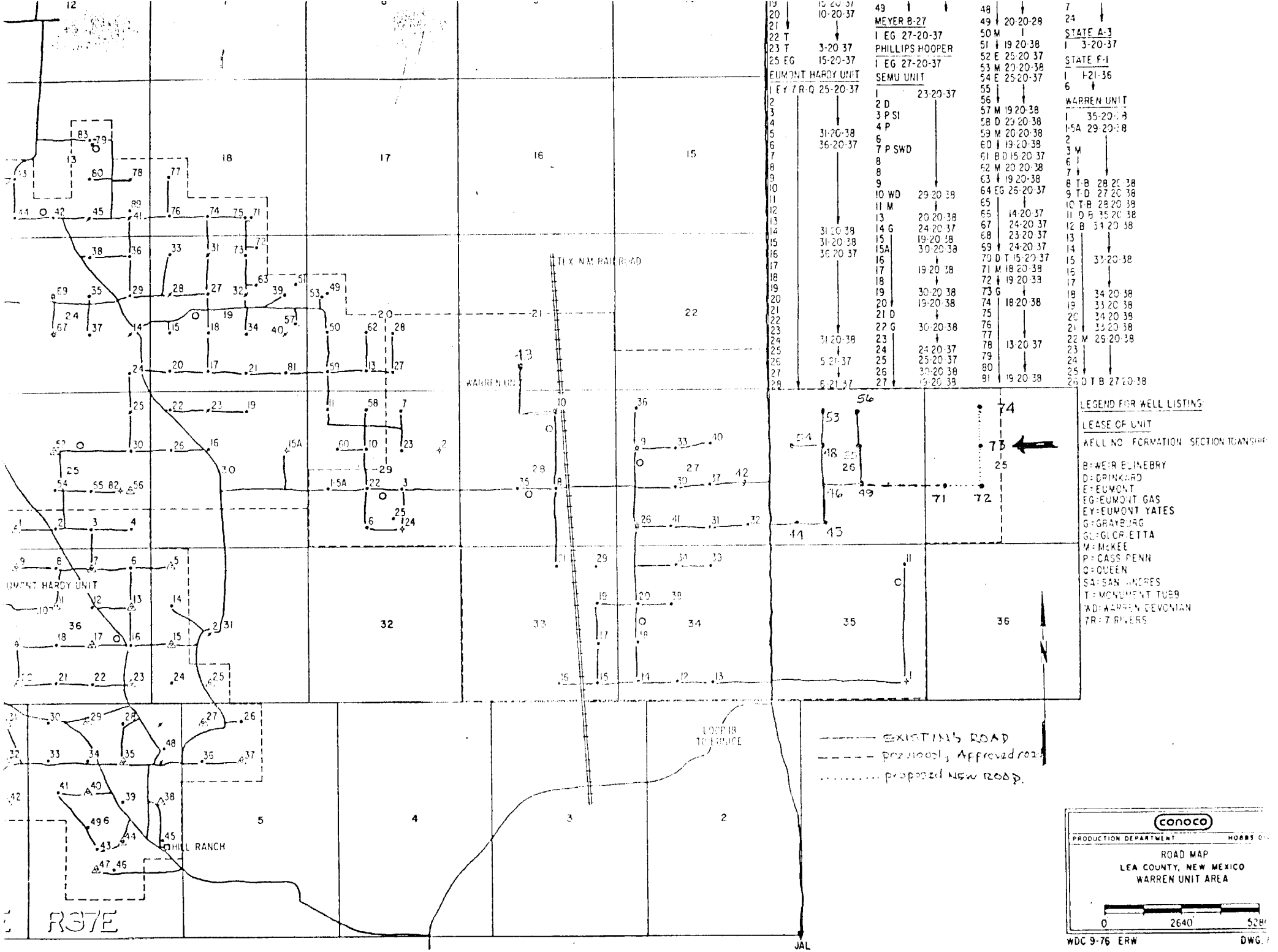
13. Certification

I hereby certify that I, or persons under my direct supervision, have inspected the proposed drill sites 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 Continental Oil Company and its contractors and sub-contractors in conformity with this plan and the terms and conditions under which it is approved.

2/13/79
DATE

H. C. Pokrandt
Production Superintendent


ROSWELL
Artesia
CARLSBAD
HOBBS
Lovington
Eunice
Jal
Kermit
Ruidoso
Ruidoso Downs
Capitan
Lincoln
Nogal
Alto
Glencoe
Hondo
San Patricio
Picacho
Tinnie
Sunset
Arabela
Pine Lodge
White Oaks
Encinoso
Dexter
Greenfield
Hagerman
Lake Arthur
Hope
Atoka
Dayton
Lakewood
Loving
Malaga
Harroun
Whites City
Loco Hills
Maljamar
Buckeye
Caprock
Tatum
Gladiola
McDonald
Prairieview
Crossroads
Bledsoe
Monument
Oil Center
Cooper
Bennett
Dunken
Mayhill
Cloudcroft
Sacramento
Weed
Timberon
Piñon
Dell City
Salt Flat
El Paso Gap
Orchard Pk
Elkins
Illinois Camp
TEXAS
To Brownfield
To Brownfield and Lamesa
G
H
J
K
L
M
5
6
7
8
LOCATIONS WHERE CONOCO PRODUCTS ARE SOLD
Locations on Interstate Highways, toll roads or major limited access highways where CONOCO PRODUCTS are sold.
Other CONOCO station locations.
Locations of CONOCO Travel Shoppes.
Locations where CONOCO DEALERS provide Trailer Travelers with Sanitary Disposal Facilities. Look for this sign:
TRAILER DISPOSAL
CONOCO
TOURAIDE ATTRACTIONS
HISTORICAL
SCENIC
GENERAL
Attraction points described on reverse side
How to read your map of NEW MEXICO
SCALE IN MILES AND KILOMETERS
ONE INCH 22 MILES
ONE INCH 35 KILOMETERS
HIGHWAY MARKERS
INTERSTATE
UNITED STATES
STATE
TEXAS FARM OR RANCH
ROAD CLASSIFICATIONS
CONTROLLED ACCESS DIVIDED HIGHWAYS
Divided
Undivided
Interstate interchange numbers are mileposts
Interchanges
OTHER DIVIDED HIGHWAYS
PRINCIPAL THROUGH HIGHWAYS
Paved
OTHER THROUGH HIGHWAYS
CONNECTING HIGHWAYS
Paved
Gravel
LOCAL ROADS In unfamiliar areas inquire locally before using these roads
Dirt
MILEAGES
LONG DISTANCE MILEAGES SHOWN IN RED
MILEAGE BETWEEN TOWNS AND JUNCTIONS
MILEAGE BETWEEN DOTS
ONE MILE EQUALS 1.6 KILOMETERS
ONE KILOMETER EQUALS .6 MILES
SPECIAL FEATURES
STATE PARKS
With Campsites
Without Campsites
RECREATION AREAS
PORTS OF ENTRY
Open 24 Hours
Inquire Locally
POINTS OF INTEREST
SCHEDULED AIRLINE STOPS
MILITARY AIRPORTS
OTHER AIRPORTS
TOURIST INFORMATION
SKI AREAS
SELECTED REST AREAS
BOAT RAMPS
TIME ZONE BOUNDARY
POPULATION SYMBOLS
State Capital
Under 1,000
1,000 to 2,500
2,500 to 5,000
5,000 to 10,000
10,000 to 25,000
25,000 to 50,000
50,000 to 100,000
100,000 and over
THE H. M. GOUSHA COMPANY
ALL RIGHTS RESERVED
1977 Edition
Lithographed in U.S.A.



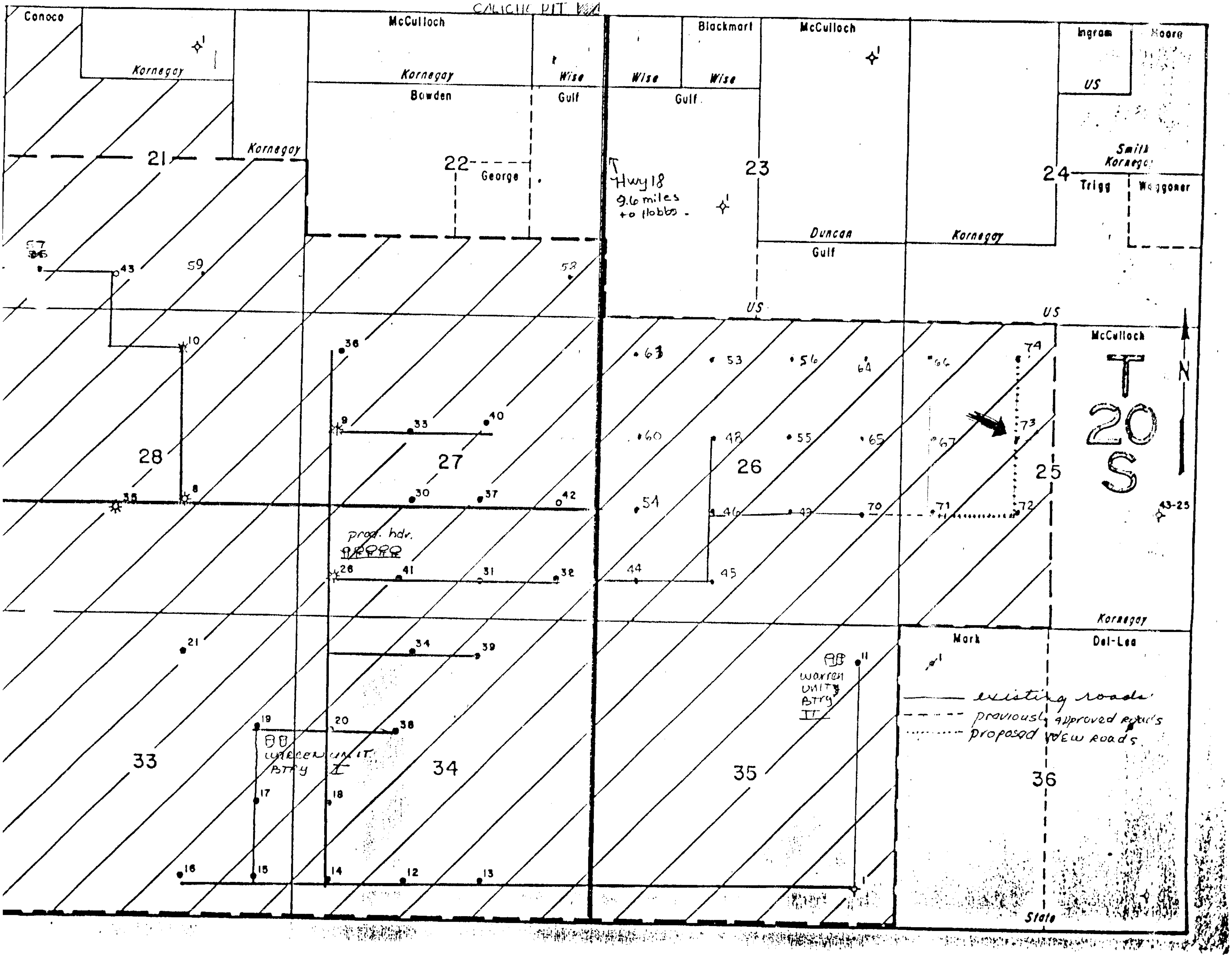
conoco

PRODUCTION DEPARTMENT HOBBS DIV.

ROAD MAP
LEA COUNTY, NEW MEXICO
WARREN UNIT AREA

0 2640 5280

WDC 9-76 ERW DWG.

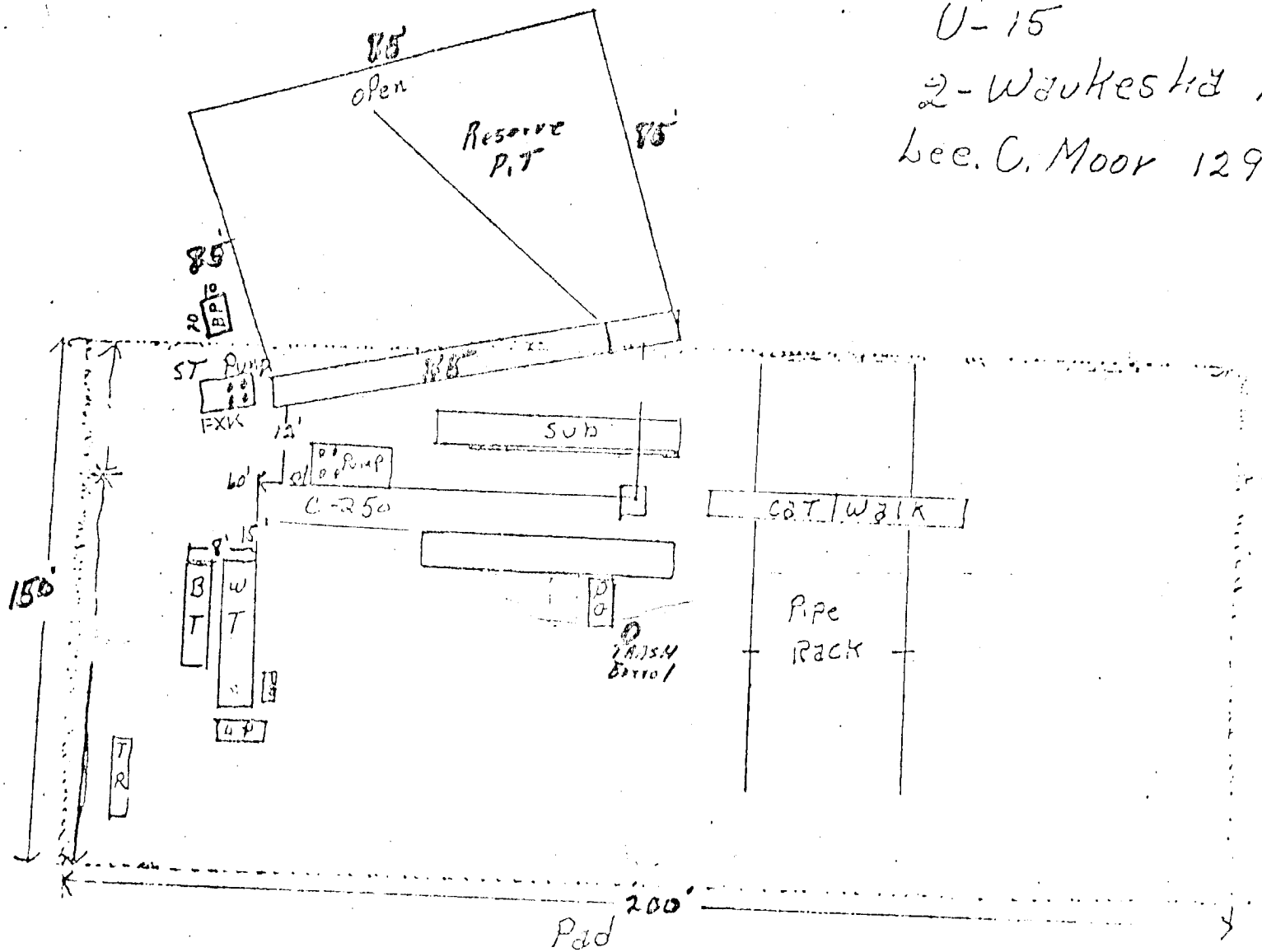

CALICHE PIT
Conoco
Kornegay
McCulloch
Kornegay
Bowden
Wise
Gulf
Wise
Wise
Gulf
Blackmart
McCulloch
Ingram
US
Moore
Smith
Kornegay
Trigg
Waggoner
21
22
George
23
24
Hwy 18
9.6 miles
to Hobbs
Duncan
Gulf
Korenegay
US
US
McCulloch
T
20
S
N
28
27
26
25
33
34
35
36
prod. hdr.
Warren Unit Btry I
Warren Unit Btry II
Kornegay
Mark
Del-Lea
State
existing roads
previously approved roads
proposed new roads

Hondo Rig #1

U-15

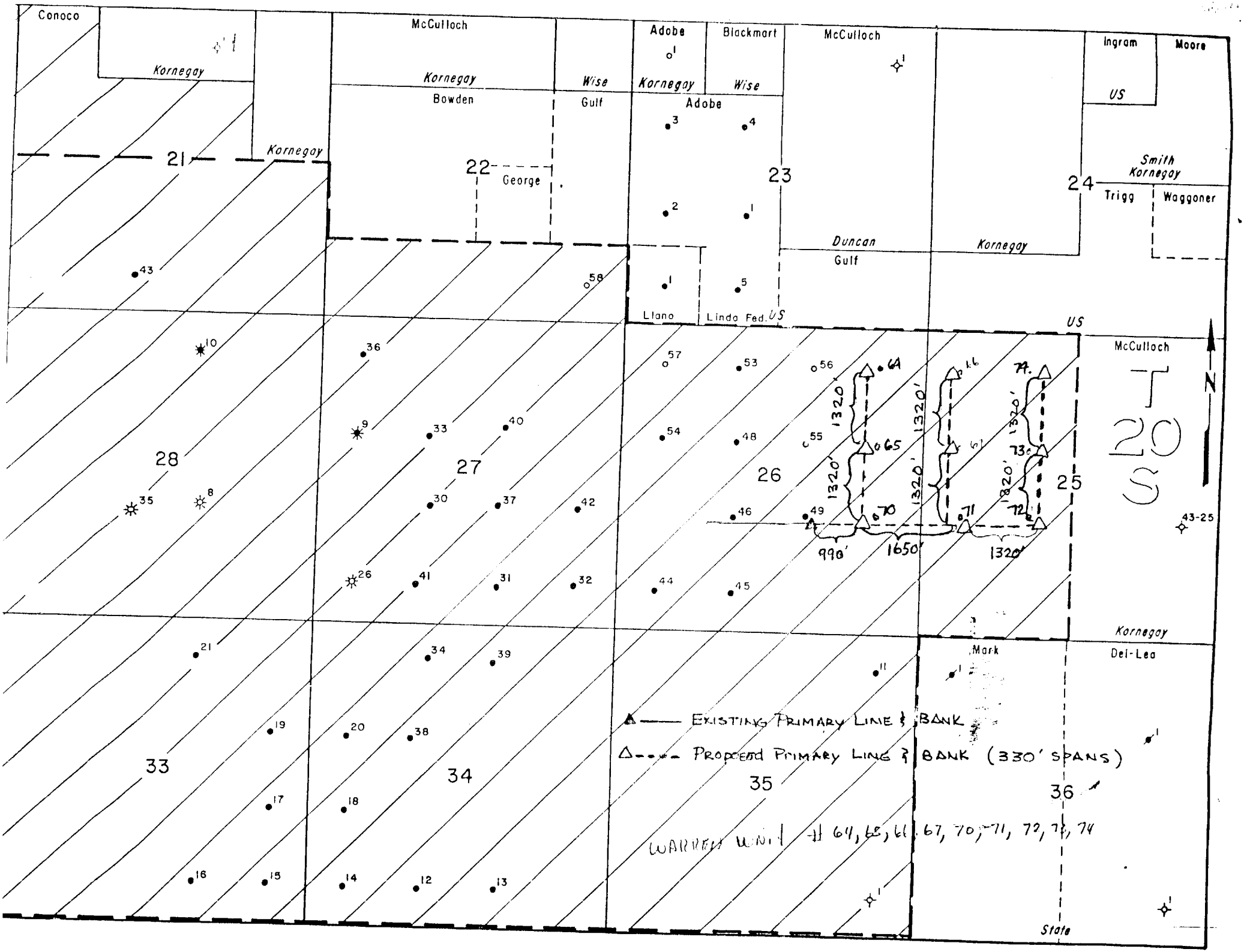
2-Waukesha NKR

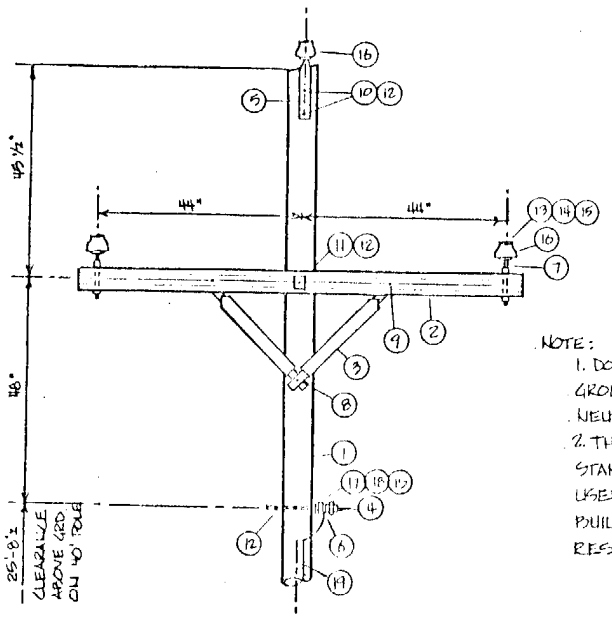
Lee C. Moor 129'



CONTINENTAL OIL CO.

EXHIBIT


Conoco
Kornegay
McCulloch
Kornegay
Wise
Bowden
Gulf
Adobe
Kornegay
Blackmart
Wise
Adobe
McCulloch
Ingram
US
Moore
Smith
Kornegay
Trigg
Waggoner
Duncan
Gulf
Kornegay
21
22
George
23
24
Llano
Linda Fed. US
US
McCulloch
T
20
S
N
28
27
26
25
1320'
1320'
1320'
1320'
1320'
990'
1650'
1320'
Kornegay
Mark
Del-Lea
State
43-25
33
34
35
36
Existing Primary Line & Bank
Proposed Primary Line & Bank (330' spans)
Warren Unit #64, 65, 66, 67, 70, 71, 72, 73, 74

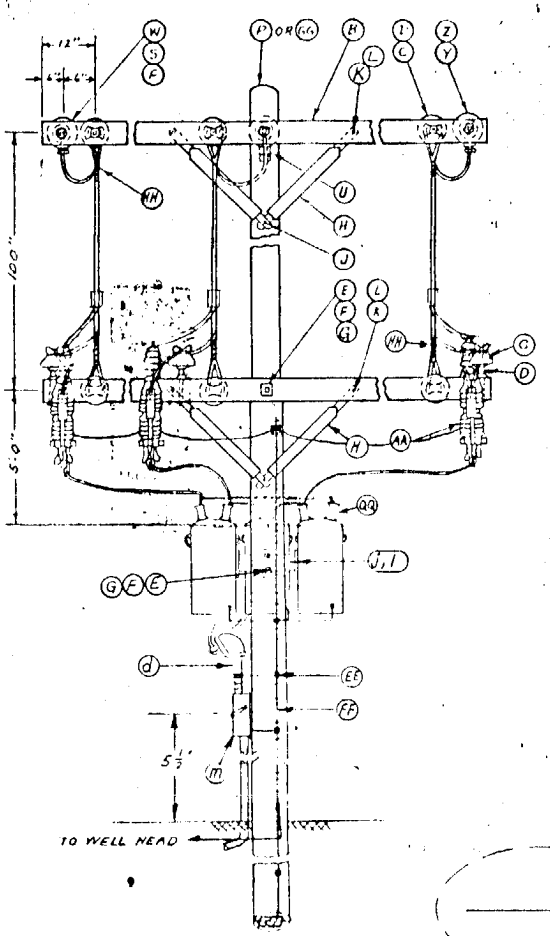


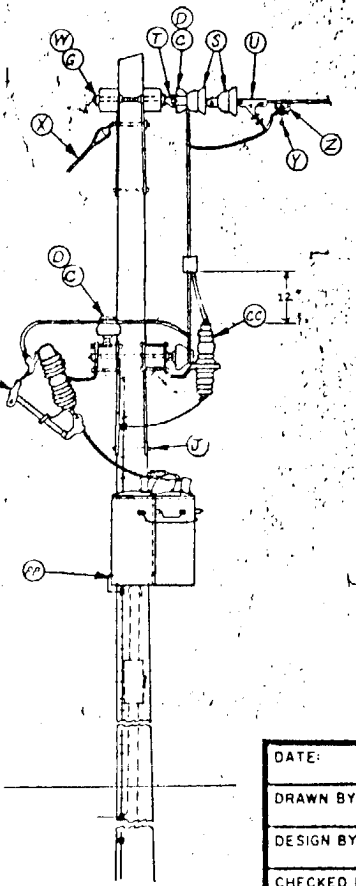
NOTE:
1. DO NOT INSTALL GROUND WIRE PAST NEUTRAL CONDUCTOR
2. THIS CONSTRUCTION STANDARD TO BE USED ON ALL LINES BUILT ON NATIONAL RESOURCE LANDS

MATERIALS

ITEM	DESCRIPTION	REQ'D.	ITEM	DESCRIPTION	REQ'D
1	POLE, 40'	1	17	NEUTRAL CONDUCTOR	—
2	CROSSARM, 3½"x 4½" x 8'	1	18	ARMOR ROD	1
3	BRACE, WOOD	2	19	POLE GROUND WIRE, #6 CU.	5=
4	STUD RACK	1			
5	RIDGE PIN, 15"	1			
6	SPOOL INSULATOR	1			
7	STEEL PIN, ⅝" x 5"	2			
8	LAG SCREW, ½" x 4"	1			
9	CARRAGE BOLT, ⅜" x 4½"	2			
10	MACHINE BOLT, ⅝" x 10"	2			
11	MACHINE BOLT, ⅝" x 14"	1			
12	WASHER, 2½" SQ.	5			
13	PHASE CONDUCTOR	—			
14	ARMOR ROD	3			
15	TIE WIRE, #6 AL.	1=			
16	PIN INSULATOR, 9 KV	3			

DATE: 7-15-77	TITLE: PRIMARY IN LINE POLE ... 12,500 VOLT ASCR
DRAWN BY: L. Morrill	conoco
DESIGN BY:	PRODUCTION DEPT. HOBBS DIVISION
CHECKED BY: SK	JOB: 12 EL. SPECS.
APPROVED BY: SK	DRAWING NO.: ES-26
SCALE: NONE	





ITEM	QTY REQ'D	REF
B	4	
C	9	
D	9	
E	3	
F	24	
G	12	
H	8	
J	4	
K	8	
L	8	
P OR GG	1	ES-1A, NOTE 5
S	6	
T	3	
U	3	
W	5	
X	1	
Y	3	
Z	3	
AA	3	
CC	3	
EE	8	
FF	1	
HH	6	
d	1	
J,I	1	ES-1A, NOTE 2
m	1	
PP	3	
QQ	6	

NOTE:

1. CENTER PHASE ON BANK WILL HAVE EPOXY INSULATOR, KEARNEY # 523015-24 INS. (REF.- REFER TO DRWG. ES-20)

2. ALL WIRE FROM POINT "U" WILL BE INSULATED TYPE WIRE ON TRANSFORMER BANK.

DATE: 12-13-71	TITLE: SINGLE POLE SUBSTA. 1 PH. TRANS. CLUSTER MOUNT PRIM. DEAD-END - 12500/4800 V ACSR
DRAWN BY: LRD	conoco
DESIGN BY: LRD	PRODUCTION DEPT. HOBBS DIVISION
CHECKED BY:	JOB: ELEC SPECS
APPROVED BY:	DRAWING NO.: ES-9
SCALE: NONE	

ITEM	DESCRIPTION	A. B. CHANCE NO.	JOSLYN NO.	OTHER MFRS. NO.	NO. SUB.
A	35' class 6 creosoted pine pole				
B	3 1/2" x 4 1/2" x 8' treated crossarm				
C	High density wet process porcelain pin insulator		163		
D	5/8" x 5" Forged steel pin w/sq. washer, nut, & locknut	881			
E	5/8" x 12" machine bolt w/ nut (or length req'd)	8812			
F	2 1/4" x 2 1/4" x 3/16" x 11/16" hole sq. washer	6813			
G	5/8" MF Locknut	3512			
H	1/4" x 1 1/4" x 28" flat Crossarm Brace	7128			
J	1/2" x 4" EZ Fetter Drive Log Screw	508754			
K	3/8" x 4 1/2" Carriage Bolt w/ Nut	8634 1/2			
L	3/8" MF Locknut	3510			
M	Preformed Aluminum Alloy Armor Rods, size req'd				
N	tie wire #6 strong alum. alloy				
O	Epoxy Insulator (Extension Link)			KEARNEY #32102560	X
P	35' class 5 creosoted pine pole				
R	Aluminum double tab Squeeze on Connector for ACSR, Aluminum, or Copper-size req'd			KEARNEY SERIES "81"	X
S	6" Suspension Insulator	66200			
T	5/8" Standard Oval Eye Nut	6502			
U	Primary Dead End Clamp		49050		
W	5/8" x 18" (or length req'd) Double Arming Bolt w/4 sq. nuts	8868			
X	guying detail - see dwg No. ES-10 for specs.				
Y	Hot Line Clamp	51520AGP		KEARNEY	X
Z	Squeeze on basket, size required				

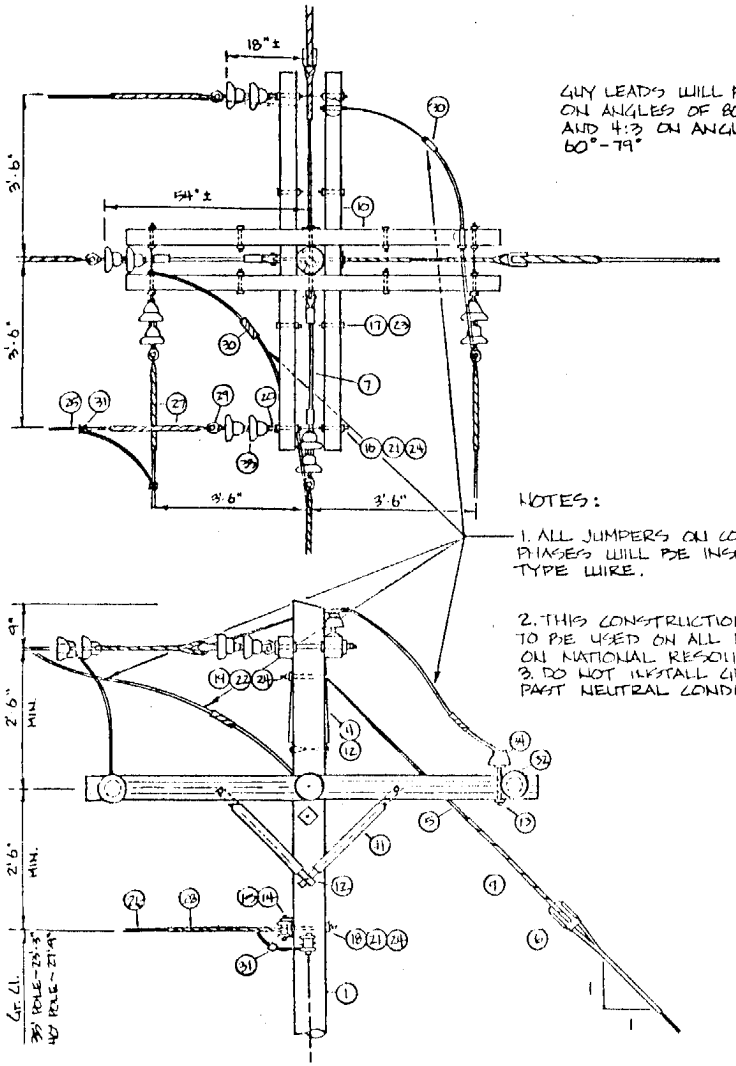
DATE: 12-27-71	TITLE: DESCRIPTION MATERIALS
DRAWN BY: E. WINTER	conoco
DESIGN BY:	PRODUCTION DEPT. HOBBS DIVISION
CHECKED BY:	JOB: ELEC SPECS
APPROVED BY:	DRAWING NO.: ES-1
SCALE: NONE	SHEET 1 OF 3

ITEM	DESCRIPTION	A. B. CHANCE NO.	JOSLYN NO.	OTHER MFRS. NO.	NO SUB.
AA	Primary Cutout - 100 amp, 15 KV, 16000 amp int. cap.	FZXX1015G			X
BB	General Purpose "U" bolt Clamp	UC510AGP			
CC	Lightening arrestor, 10 KV			MCGRAW-EDISON KNMC2Z	
DD	Single phase oil switch, 14.4 KV			BLACKBURN 'F' SERIES	
EE	split bolt connector, size req'd				
FF	grounding specs. see dwg No. ES-11 & ES-1A, Note 3				
GG	35' class 4 creosoted pine pole				
HH	Aluminum deadend Preforms for ACSR, size req'd				
JJ	30' class 6 creosoted pine pole				
KK	OVERHEAD GRND, #4 ACSR - If Req'd - Ref. Dwg ES-11, ES-1A - Note 3				
LL	ground connector, motor			BURNDY KC-22	X
MM	600 V. secondary lightening arrestor single phase				
NN	Greenfield Type EF liquid-tight flexible steel conduit, size req'd, w/ necessary liquid-tight connectors.				
OO	req'd size LB fitting & cover & gasket				
PP	transformer tank grounding terminal	GWS-15			
QQ	Bird Guards (Insulating boots on transformer bushings)				

DATE: 12-27-71	TITLE: DESCRIPTION MATERIAL
DRAWN BY: E. WINTER	conoco
DESIGN BY:	PRODUCTION DEPT. HOBBS DIVISI
CHECKED BY:	JOB: ELEC. SPECS — DRAWING NO.: ES-1
APPROVED BY:	SCALE: NONE — SHEET 2 OF 3

ITEM	DESCRIPTION	A. B. CHANCE NO.	JOSLYN NO.	OTHER MFRS. NO.	NO. SUB.
a	double upset bolt s/sq. nut, round washer, and cotter key on short end, sq. nut and MF locknut on long end, 15 1/8" long (or length required.)	7828			
b	wet process porcelain secondary spool insulator, 3", brown glaze		J1101		
d	required size conduit w/ servicehead(s) & req'd size & rated insulated conductors. Ref. Dwg ES-1B Note: provide clamp and ground conduit				
e	parallel groove clamp, size req'd			BURNDY SERIES "UC"	
f	secondary insulator clevis for 4" insulator				
g	5/8" thimbleye nut	6510			
h	5/8" x 12" (or length req'd) straight thimbleye bolt w/sq. nut	5512			
j	transformer cluster mount bracket (small)			ALUMA-FORM 6M3-6	X
l	transformer cluster mount bracket (large)			ALUMA-FORM 15M3-6	X
m	req'd size raintight disconnect & fuses, 3-phase, 600 V, Ref. Dwg No. ES-1B				
n	16" cross plate anchor (or size req'd)	X-16			
q	8-way expanding anchor (size req'd)	88135			
t	4" brown glaze wet process porcelain secondary spool insulator		J0101		
u	5/8" x 7' thimbleye anchor rod w/nut (use twineye if req'd - Chance No. 5347)	5317 (NUT 55006P)			
aa	3/8" high strength guy strand (10,800 lb.)				
bb	preformed guy grip for 3/8" guy strand				
dd	5/8" x 10" angle thimbleye bolt w/nut	5010			
ee	3"x3"x1/4"x11/16" hole curved washer	6823 1/2			X
ff	6" - guy clamp w/3-1/2" bolts				
gg	medium size strain insulator				
hh	serving sleeve for 3/8" guy strand	6454			
jj	3/16" x 2-1/2" x 7" lift plate	7887			X
nn	pole bottom ground plate (may use butt-wrapp if desired)				
qq	Ground Connection (See Dwg. ES-12)				
rr	wet process porcelain secondary spool insulator, 3" - white glaze				
tt	wet process porcelain secondary spool insulator, 4" - white glaze				

DATE: 12-27-71	TITLE: DESCRIPTION MATERIALS
DRAWN BY: E. WINTER	conoco
DESIGN BY:	PRODUCTION DEPT. HOBBS DIVISION
CHECKED BY:	JOB: ELEC SPECS
APPROVED BY:	DRAWING NO.: ES-1
SCALE: NONE	SHEET 3 OF 3



GUY LEADS WILL BE 1:1 ON ANGLES OF 80°-90° AND 4:3 ON ANGLES OF 60°-79°

NOTES:

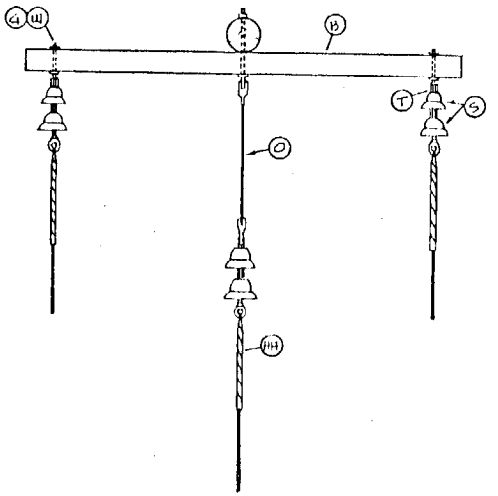
1. ALL JUMPERS ON CONDUCTOR PHASES WILL BE INSULATED TYPE WIRE.

2. THIS CONSTRUCTION STANDARD TO BE USED ON ALL LINES BUILT ON NATIONAL RESOURCE LANDS.
3. DO NOT INSTALL GROUND WIRE PAST NEUTRAL CONDUCTOR.

MATERIALS

ITEM	DESCRIPTION	REQ'D
1	POLE _____ LENGTH, CLASS _____	1
2	ANCHOR, 8"	2
3	ANCHOR ROD, 5/8" x 7'	2
4	GUY ATTACHMENT, P133A	2
5	GUY CABLE, 3/8" H.S.	24 **
6	GUY INSULATOR, 506	2
7	EPOXY INSULATOR, KEARNEY # 323015-24	2
8	CLAMP, 3-BOLT	2
9	GUY GRIP, 3/8"	6
10	CROSS ARM, 8'	4
11	BRACE, 30" GPA	8
12	LAG SCREW, 1/2"	6
13	STEEL PIN 5/8" x 5"	2
14	RACK, 1-POINT	2
15	SPOOL INSULATOR, 3"	2
16	BOLT, D.A., 5/8" x 18"	6
17	BOLT, MACH., 3/8" x 4 1/2"	8
18	BOLT, MACH., 5/8" x 10"	2
19	BOLT, MACH., 5/8" x 12"	2
20	EYE NUT, 5/8"	6
21	WASHER, 2 1/4" FLAT	22
22	WASHER, 3" CURVED	2
23	LOCK NUT, 3/8"	8
24	LOCK NUT, 5/8"	10
25	PHASE CONDUCTOR NO. _____	—
26	NEUTRAL CONDUCTOR NO. _____	—
27	PREF. DE, NO. _____	6
28	PREF. DE, NO. _____	2
29	CLEVIS, THIMBLE	6
30	JUMPER SLEEVE, NO. _____	2
31	CONNECTOR, S.O. SML. AL.	2
32	INSULATOR, 9KV PIN	2
33	INSULATOR, 6" DISC	12
34	TIE WIRE, NO. 6 AL.	1/2 **

DATE: 7-15-77	TITLE: PRIMARY ANGLE STRUCTURE 60°-90° 12,500 VOLT ALGR
DRAWN BY: myrrill	conoco
DESIGN BY:	PRODUCTION DEPT. HOBBS DIVISION
CHECKED BY: SK	JOB: ELEC. SPECS.
APPROVED BY: SK	DRAWING NO.: ES-27
SCALE: NONE	



ITEM	QTY. REQ'D
B	1
G	3
HH	3
O	1
S	6
T	2
W	3

NOTE:
FOR MATERIALS, SEE DRWGS. ES-1

DATE: 7-15-77	TITLE: EPOXY INSULATOR (EXTENSION LINK)
DRAWN BY: T. morrill	conoco
DESIGN BY:	PRODUCTION DEPT. HOBBS DIVISION
CHECKED BY: SK	JOB: ELEC. SPECS.
APPROVED BY: SK	DRAWING NO.: ES-28
SCALE: NONE	