Form 3160-3
(July 1992)

OPEN COMM NO. 66485
PROPERTY NO. 19649
POOL CODE 96556
EFF DATE 10/12/96
API NO. 30-025-33626

ccm 9-26-96

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

UNITED ST
DEPARTMENT OF
BUREAU OF LAND M

APPLICATION FOR PERMI

5. LEASE DESIGNATION AND SERIAL NO.
NM 66925

6. IF INDIAN, ALLOTTEE OR TRIBE NAME

7. UNIT AGREEMENT NAME

1a. TYPE OF WORK
DRILL [X] DEEPEN [ ]

b. TYPE OF WELL
OIL WELL [X] GAS WELL [ ] OTHER SINGLE ZONE [X] MULTIPLE ZONE [ ]

8. FARM OR LEASE NAME, WELL NO.
Diaga '18' # 1 Federal

2. NAME OF OPERATOR
Meridian Oil Inc.

9. API WELL NO.
30-025-33626

3. ADDRESS AND TELEPHONE NO.
P.O. Box 51810, Midland, TX 79710-1810 915-688-6943

10. FIELD AND POOL, OR WILDCAT
Wildcat Bone Spring
Wildcat Delaware

4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements.*)
At surface
1980' FSL & 1980' FWL
At proposed prod. zone
Unit K

11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA
18, T24S, R32E

14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE*
30 miles southeast of Carlsbad, NM

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
1980'	320	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**
N/A 1st well	9,200'	Rotary

21. ELEVATIONS (Show whether DF,RT, GR, etc.)
3575' **CARLSBAD CONTROLLED WATER BASIN**

22. APPROX. DATE WORK WILL START*
Upon Approval

23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	GRADE, SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
14 3/4"	10 3/4"	40.5#	600'	500 sxs WITNESS CIRCULATE
9 1/2"	7 5/8"	26.4#	4600'	1200 sxs CIRCULATE
6 1/8"	4 1/2"	11.6#	9200'	500 sxs

Not in designated Potash Area.
Not in Prairie Chicken Area
Not in Hydrogen Sulfide Area

Notice of Staking submitted on September 10, 1996.

Contact Person: Donna Williams, 915-688-6943

SEP 25

APPROVAL SUBJECT TO
GENERAL REQUIREMENTS AND
SPECIAL STIPULATIONS
ATTACHED

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 Regulatory Compliance DATE 9/23/96

(This space for Federal or State office use)

PERMIT NO. _____ APPROVAL DATE _____

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 Tony L Ferguson TITLE for Acting DM DATE 10/10/96

*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.

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

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number	Pool Code	Pool Name
30-025-33626	96556	Wildcat Bone Spring/Wildcat Delaware

Property Code	Property Name	Well Number
19649	DIAGA 18 FEDERAL	1

OGRID No.	Operator Name	Elevation
26485	BURLINGTON RESOURCES OIL & GAS CO.	3575

Surface Location

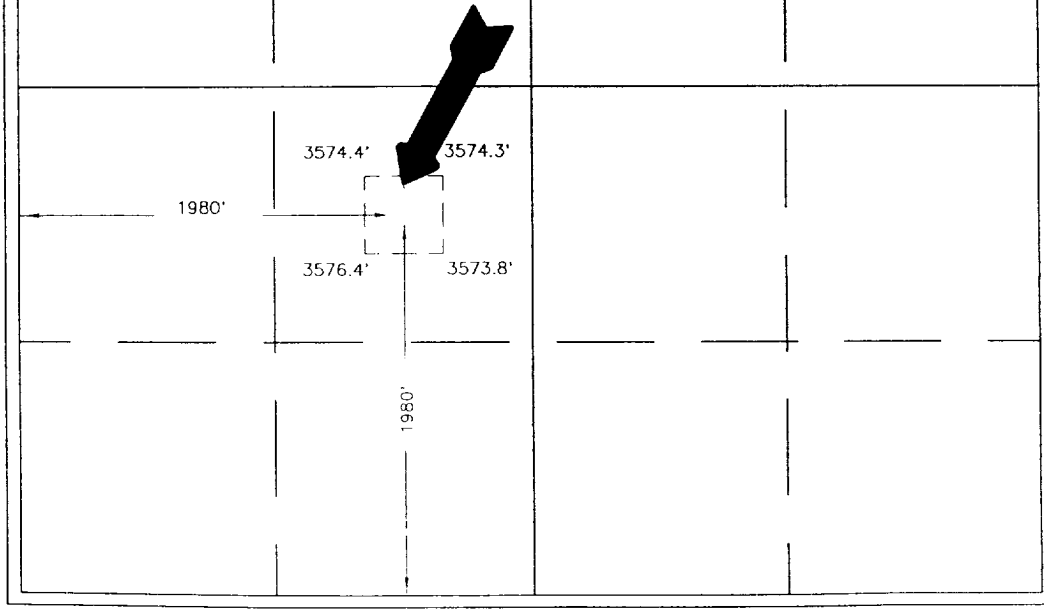
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
K	18	24 S	32 E		1980	SOUTH	1980	WEST	LEA

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	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



OPERATOR CERTIFICATION

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

Signature

Donna Williams
Printed Name

Regulatory Compliance
Title

9/24/96
Date

SURVEYOR CERTIFICATION

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 supervison, and that the same is true and correct to the best of my belief.

SEPTEMBER 12, 1969
Date Surveyed DMCC

Signature & Seal of Professional Surveyor

NEW MEXICO — RONALD J. EIDSON — 3239 — REGISTERED PROFESSIONAL SURVEYOR

9-17-96

W.O. Num. 96-11-1074

Certificate No. JOHN W. WEST 676
RONALD J. EIDSON 3239
GARY EIDSON 12641

OPERATORS NAME:	**Meridian Oil Inc.**
LEASE NAME AND WELL NO.:	**Diaga '18' Federal Well No. 1**
LOCATION:	**1980' FSL & 1980' FWL, Sec. 18, T24S, R32E**
FIELD NAME:	**Wildcat Bone Spring/Delaware**
COUNTY:	**Lea County, NM**
LEASE NUMBER:	**NM 66925**

The following information is to supplement BLM form 3160-3 Application for permit to drill in accordance with Onshore Oil and Gas Order No. 1:

9 - POINT DRILLING PLAN

1. Name and estimated tops of important geologic formation/marker horizons.

FORMATION	DEPTH
Rustler	800'
Salado	1100'
Delaware	4620'
Bone Spring	8550'

2. Estimated depths at which the top and bottom of formations potentially containing usable water, oil, gas, or prospectively valuable deposits of other minerals are expected to be encountered and the operator's plans for protecting such resources.

Bone Spring	8550'-9200'

3. The operator's minimum specifications for Blowout Preventer (BOP) and related equipment to be used and schematic diagrams thereof showing sizes, pressure ratings, and the testing procedures and testing frequency. BOP and BOP - related equipment (BOPE) schematics shall include schematics of choke manifold equipment. Accumulator systems and remote controls shall be utilized.

   13 5/8" 1.5M annular BOP w/rotating head to be installed on the 13 3/8" casing. Test to 750 psi before drilling the 13 3/8" casing shoe.

   11" - 3M BOP stack to be installed on the 8 5/8" casing. The BOP stack will consist of one blind ram BOP, one pipe ram BOP, and a rotating head. Tested to 3000 psi before drilling the 8 5/8" casing shoe.

4. The proposed casing program including size, grade, weights, type of thread and coupling, and the setting depth of each string and its condition (new or acceptably reconditioned). For exploratory wells, or for wells as otherwise specified by the authorized officer, the operator shall include the minimum design factors for tensions, burst, and collapse that are incorporated into the casing design. In cases where tapered casing strings are utilized, the operator shall also include and/or setting depths of each portion.

   EXISTING CASING:

   14 3/4" hole, 10 3/4" J-55 40.5# STC csg, set @ 600'

   9 1/2" hole, 7 5/8" J-55 26.4# LTC csg set @ 4600'

   6 1/8" hole, 4 1/2" J-55 & N-80 11.6# LTC csg set @ 9200'

5. The amount and type(s) of cement, including anticipated additives to be used in setting each casing string, shall be described. If stage cementing techniques are to be employed, the setting depth of the stage collars and amount and type of cement, including additives, and preflush amounts to be used in each stage, shall be given. The expected linear fill-up of each cemented string, or each stage when utilizing stage-cementing techniques, shall also be given.

   a. 10 3/4" csg: Cmtd w/300 sxs 'C' + 4% gel + 2% CaCl2, tail w/ 200 sxs 'C' + 2% CaCl2. Circ to surface

   b. 7 5/8" csg: Cmtd w/900 sxs 'C' Lite, tail w/300 sxs 'C' + 2% CaCl2.

c. 4 1/2" csg: Cmt w/130 sxs 'C' + 3% econolite + .5 pps flocele, tail w/ 370 sxs 'H' 50/50 Poz + .6% Halad-9 + 2% gel + 3 pps Kcl + .25% flocele. TOC @ +/-4400'.

6. The anticipated characteristics, additives, use, and testing of drilling mud to be employed, along with the types and quantities of mud products to be maintained, shall be given. When air or gas drilling is proposed, the operator shall submit the following specific information:

Mud Program:
0-600' fresh water, gel and lime system, MW 8.6-9.0
600'-4600' brine, MW 10.0-10.1 ppg
4600'-9200' fresh water, MW 8.3-8.5

7. The anticipated testing, logging, and coring procedures to be used, including drill stem testing procedures, equipment, and safety measures.

a. DST Program: None

b. Core: None

c. Mud Logging: Two man unit 4000' to TD

d. Logs to be run: DIL/GR/Density/Neutron/Sonic/Gamma Ray

. The expected bottom-hole pressure and any anticipated abnormal pressures, temperatures or potential hazards that are expected to be encountered, such as lost circulation zones and hydrogen sulfide. The operator's plans for mitigating such hazards shall be discussed. Should the potential to encounter hydrogen sulfide exist, the mitigation procedures shall comply with the provisions of Onshore Oil and Gas Order No. 6.

No abnormal pressures are anticipated. Bottom hole pressures at TD expected to be 4300 psi. Bottom hole temperature 140 F. There is no anticipated Hydrogen Sulfide in this known drilling area

9. Any other facets of the proposed operation which the operator wishes for BLM to consider in reviewing the application.

Anticipated drilling time expected to be 18 days to TD.

12-POINT SURFACE USE PLAN OF OPERATIONS

1. **Existing Roads:** A legible map (USGS topographic, county road, or other such map) labeled and showing the access route to the location, shall be used for locating the proposed well site in relation to a town, village, or other locatable point, such as a highway or county road. All access roads shall be appropriately labeled. Any plans for improvement and/or maintenance of existing roads shall be provided. All roads shall be provided. All roads shall be improved or maintained in a condition the same as or better than before operations. The information provided for use and construction of roads will also be used by BLM for the required Plan of Development for a R/W application as described in Section II C of this Order No. 1.

   See Exhibit "A" - topographic land surveyors plat showing existing roads and directions to well site.

2. **Access Roads to be Constructed or Reconstructed:** All permanent and temporary access roads to be constructed or reconstructed in connection with the drilling of the proposed well shall be appropriately identified and submitted on a map or plat. The proposed route to the proposed drill site shall be shown, including distances from the point where the access route exists established roads. All permanent and temporary access roads shall be located and designed to implement the goals of transportation planning and meet applicable standards of the appropriate SMA, and shall be consistent with the needs of the users. Final selection of the rouge location may be accepted by the SMA as early as the predrill inspection or during approval of the APD.

   See Exhibit "B" plat for road to be constructed and description.

3. **Location of Existing Wells:** This information shall be submitted on a map or plat, which includes all recorded wells (water, injection, or disposal, producing, or being drilled) within a 1-mile radius of the proposed location.

   See Exhibit "C" - portion of land map showing surrounding wells in area.

4. **Location of existing and/or proposed production facilities:** For facilities planned either on or off the well pad, a plat or diagram shall be included showing, to the extent known or anticipated, the location of all production facilities and lines to be installed if the well is successfully completed for production. If new construction is planned, the dimensions of the facility layouts are to be shown. This information for off-pad production facilities may be used by BLM for R/W application information as specified in Section II C of Order No. 1.

   This hydrocarbon product will go to the new production facilities to be built at the location.

Location of Types of Water Supply: Information concerning water supply, such as rivers, creeks, springs, lakes, ponds, and wells, may be shown by quarter-quarter section on a map or plat, or may be described in writing. The source and transportation method for all water to be used in drilling the proposed well shall be noted if the source is located on Federal or Indian Lands or if water is to be used from a Federal or Indian project. If the water is obtained from other than Federal or Indian lands, the location and transportation method shall be identified. Any access roads crossing Federal or Indian lands that are needed to haul the water shall be described as provided in paragraphs (1) and (2) of this Section. If a water supply well is to be drilled on the lease, the APD shall so state. The authorized officer of BLM may require the filing of a separate APD of a water well.

No available surface or sub-surface fresh water exists in the vicinity of the proposed well. Drilling water will be transported or pumped to the drill site from the nearest commercial source.

6. **Construction Materials:** The operator shall state the character and intended use of all construction material, such as sand, gravel, stone, and soil material. If the materials to be used are Federally owned, the proposed source shall be shown either on a quarter-quarter section on a map or plat, or in a written description.

Will try to use Caliche from reserve pit. If unable to use Caliche from reserve pit, then will get Caliche from a Federal or State approved caliche pit.

7. **Methods of Handling Waste Disposal:** A written description of the methods and locations proposed for safe containment and disposal of each type of waste material (e.g. cuttings, garbage, salts, chemicals, sewage, etc.) that results from the drilling and completion of the proposed well shall be provided.

- Drill cuttings - disposed into drilling pits.
- Drill fluids - allowed to evaporate in drill pits until pits dry.
- Produced water during testing - drill pits.
- Produced oil during testing - storage tank until sold.
- Current laws and regulations pertaining to disposal of human waste will be observed.
- Reserve pit will be plastic lined.
- Waste paper, garbage, and junk will be disposed of into a special container on location and removed regularly to an approved landfill site. All waste material will be covered with a screen or lid and contained to prevent scattering by wind.
- All trash and debris will be removed from well site within 30 days after drilling and/or completion operations are finished.

8. **Ancillary Facilities:** All ancillary facilities such as camps and airstrips shall be identified on a map or plat. Information as to location, land area required, and methods to be used in construction shall also be provided.

Information unavailable at this time.

9. **Well Site Layout:** A plat of suitable scale (not less than 1 inch = 50 feet) showing the proposed drill pad, reserve pit location, access road entry points, and its approximate location with respect to topographic features, along with cross section diagrams of the drill pad and the reserve pit showing all cuts and fills and the relation to topography. The plat shall also include the approximate proposed location and orientation of the drilling rig, dikes and ditches to be constructed, and topsoil and/or spoil material stockpiles.

See Exhibit "D"

10. **Plans for Reclamation of the Surface:** A proposed interim plan for reclamation stabilization of the site and also final reclamation plan shall be provided. The interim portion of the plan shall cover areas of the drillpad not needed for production. The final portion of the plan shall cover final abandonment of the well. The plan shall include, as appropriate, configuration of the reshaped topography, drainage systems, segregation of spoil materials, surface manipulations, redistribution of topsoil, soil treatments, revegetation, and any other practices necessary to reclaim all disturbed areas, including any access roads and pipelines. An estimate of the time for commencement and completion of reclamation operations, including consideration of weather conditions and other local uses of the area, shall be provided.

- After completion of drilling and/or completion of operations, all equipment and other material not needed for operations will be removed. Pits will be filled and locations cleaned of trash and junk to leave well in as aesthetically pleasing a condition as possible.
- Any unguarded pits containing fluids will be fenced until filled.
- After abandonment of well, surface restoration will be in accordance with the Bureau of Land Management Surface Requirements.

11. **Surface Ownership:** The surface ownership (Federal, Indian, State or private) and administration (BLM, FS, BIA, Department of Defense, etc.) at the well location, and of all lands crossed by roads which are to be constructed or upgraded, shall be indicated. Where the surface of the proposed well site is privately owned, the operator shall provide the name, address and telephone number of the surface owner.

Bureau of Land Management
620 E. Green Street
Carlsbad, New Mexico 88220

12. **Other Information:** Type of bond. The operator shall be covered by a bond in its own name as principal, or by a bond in the name of the lessee or sublessee.

Meridian Oil Inc. is covered by statewide bond.

Operator's Representatives:
Field representatives (Responsible for compliance with approved surface use operations plan.)

Meridian Oil Inc.
P.O. Box 837
Hobbs, NM 88240
Office: 505-393-5844

Mr. Ed Jackson, Drilling Foreman
Loco Hills, NM
Home: 505-677-2323
Mobil: 505-365-7206

Mr. Frank Raybon, Drilling Foreman
Eunice, NM
Home: 505-394-2449
Mobile: 505-369-5367

Tim Friesenhahn, Drilling Engr.
P.O. Box 51810
Midland, TX 79710-1810
Office: 915-688-6824
Home: 915-699-2154

Hal Lee, Drilling Superintendent
P.O. Box 51810.
Midland, TX 79710-1810
Office: 915-688-6834
Home: 915-685-6073

OPERATORS CERTIFICATION

I hereby certify that I, **Tim Friesenhahn, Drilling Engineer,** under my direct supervision, have inspected the proposed drill site and access route that I am familiar with the conditions that currently exist; that the statements made in the APD package are, to the best of my knowledge, true and correct, and that the work associated with operations proposed herein will be performed by **not yet determined** contractors and subcontractors in conformity with this APD package and the terms and conditions under which it is approved. I also certify responsibility for the operations conducted on that portion of the leased lands associated with this application, with bond coverage being provided under BLM **statewide** bond. This statement is subject to the provisions of 18 U.S.C. 1001 for the filing of a false statement.

DATE: 9/18/96

NAME AND TITLE: Tim Friesenhahn, Drilling Engineer

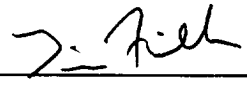
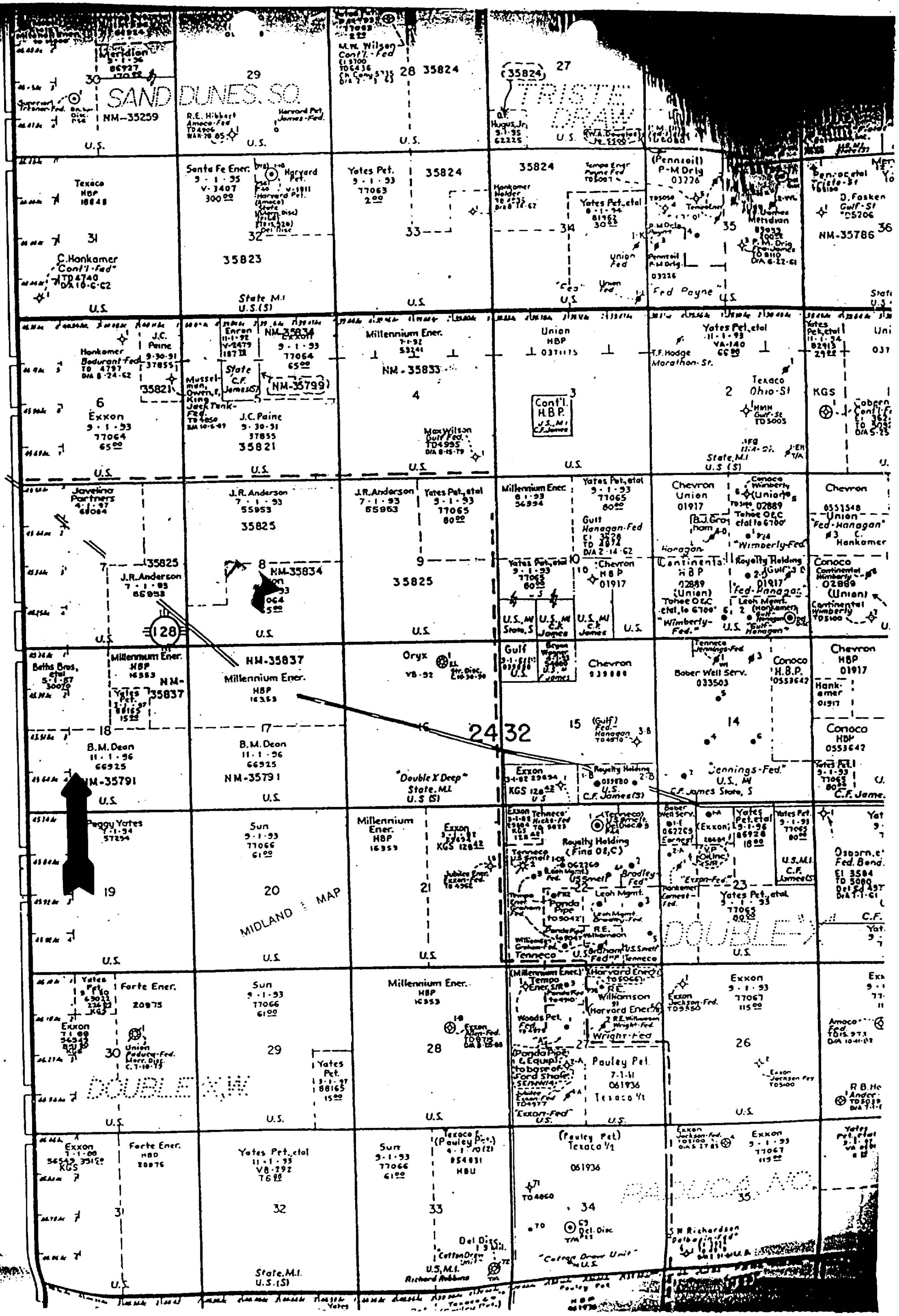
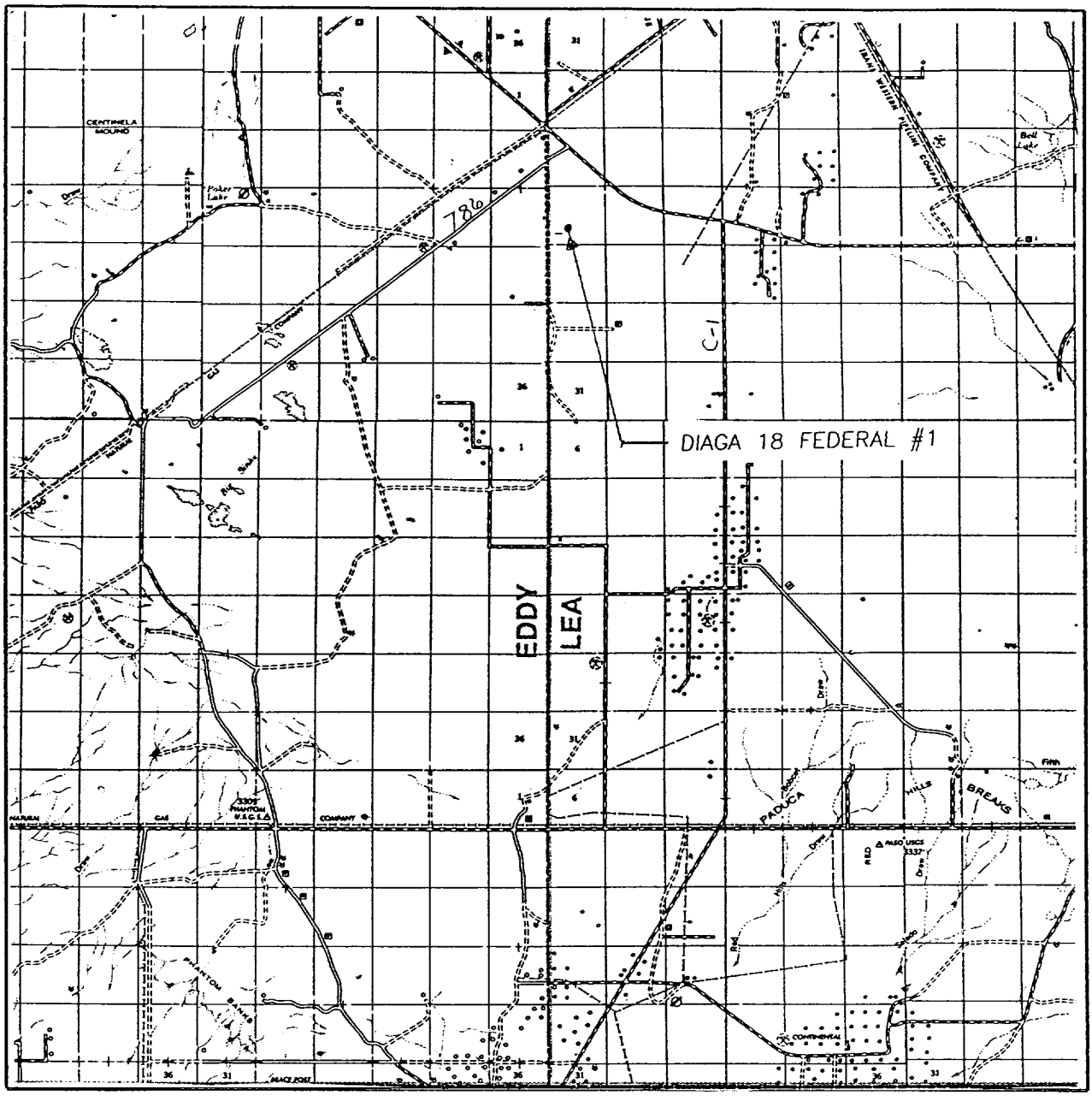
SIGNATURE: 

EXHIBIT
'C'

T
24
S



VICINITY MAP



SCALE: 1" = 3 MILES

DIRECTIONS:
FROM THE INTERSECTION OF HWY. 128 & COUNTY ROAD 1 GO 3.0 MILES WEST ON HWY. 128 TO EDDY COUNTY ROAD 786. GO SOUTHWEST ON COUNTY ROAD 786 .3 MILES, TURN SOUTH & GO 1.0 MILE TURN LEFT & GO EAST 0.4 MILES.

SEC. 18 TWP. 24-S RGE. 32-E

SURVEY N.M.P.M.

COUNTY LEA

DESCRIPTION 1980' FSL & 1980' FWL

ELEVATION 3575

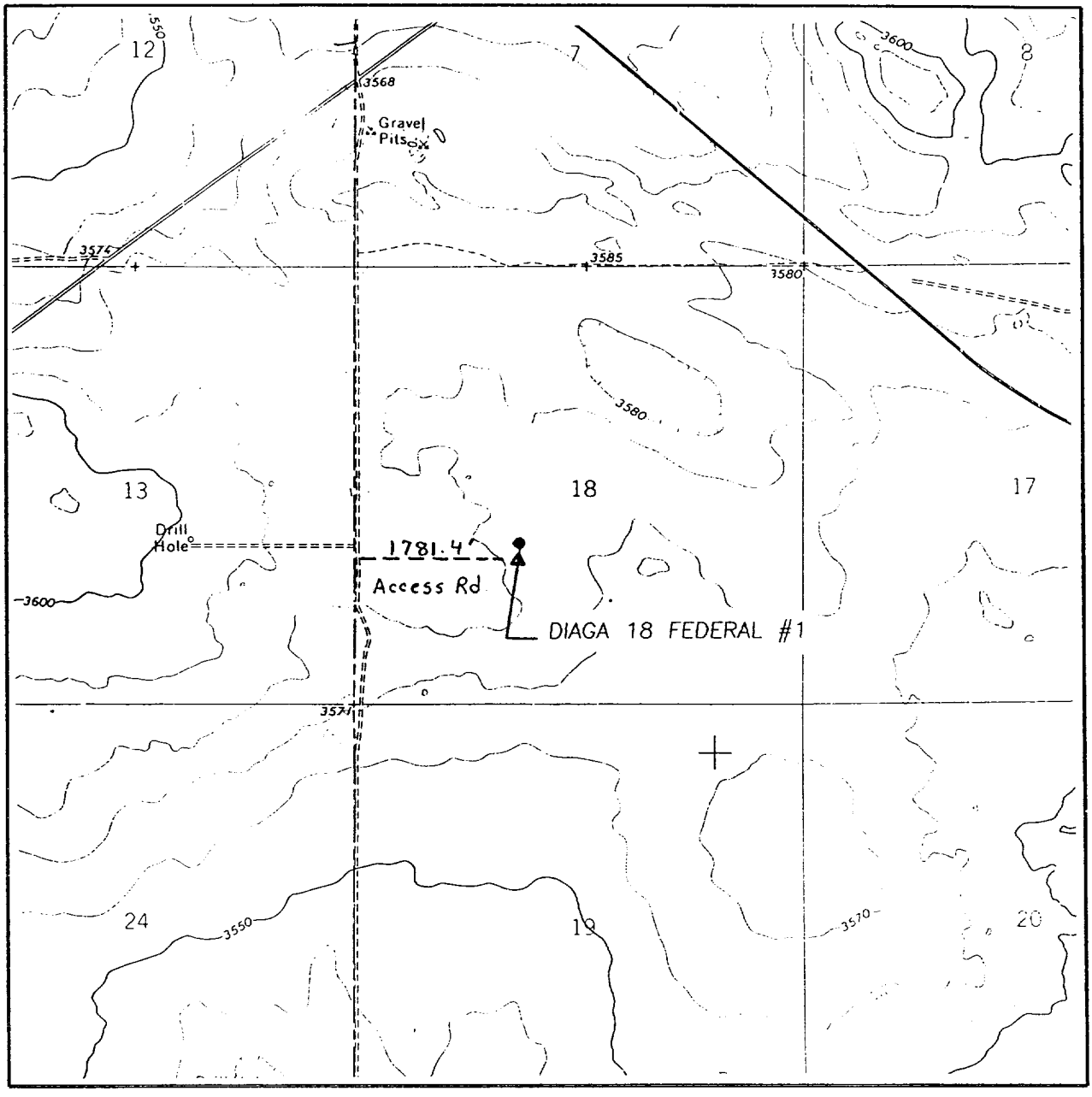
OPERATOR BURLINGTON RESOURCES OIL & GAS CO.

LEASE DIAGA 18 FEDERAL

- - - - - - - - - PROPOSED NEW ROAD

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

LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL:
PADUCA BREAKS NW - 10'

SEC. 18 TWP. 24-S RGE. 32-E

SURVEY N.M.P.M.

COUNTY LEA

DESCRIPTION 1980' FSL & 1980' FWL

ELEVATION 3575

OPERATOR BURLINGTON RESOURCES OIL & GAS CO.

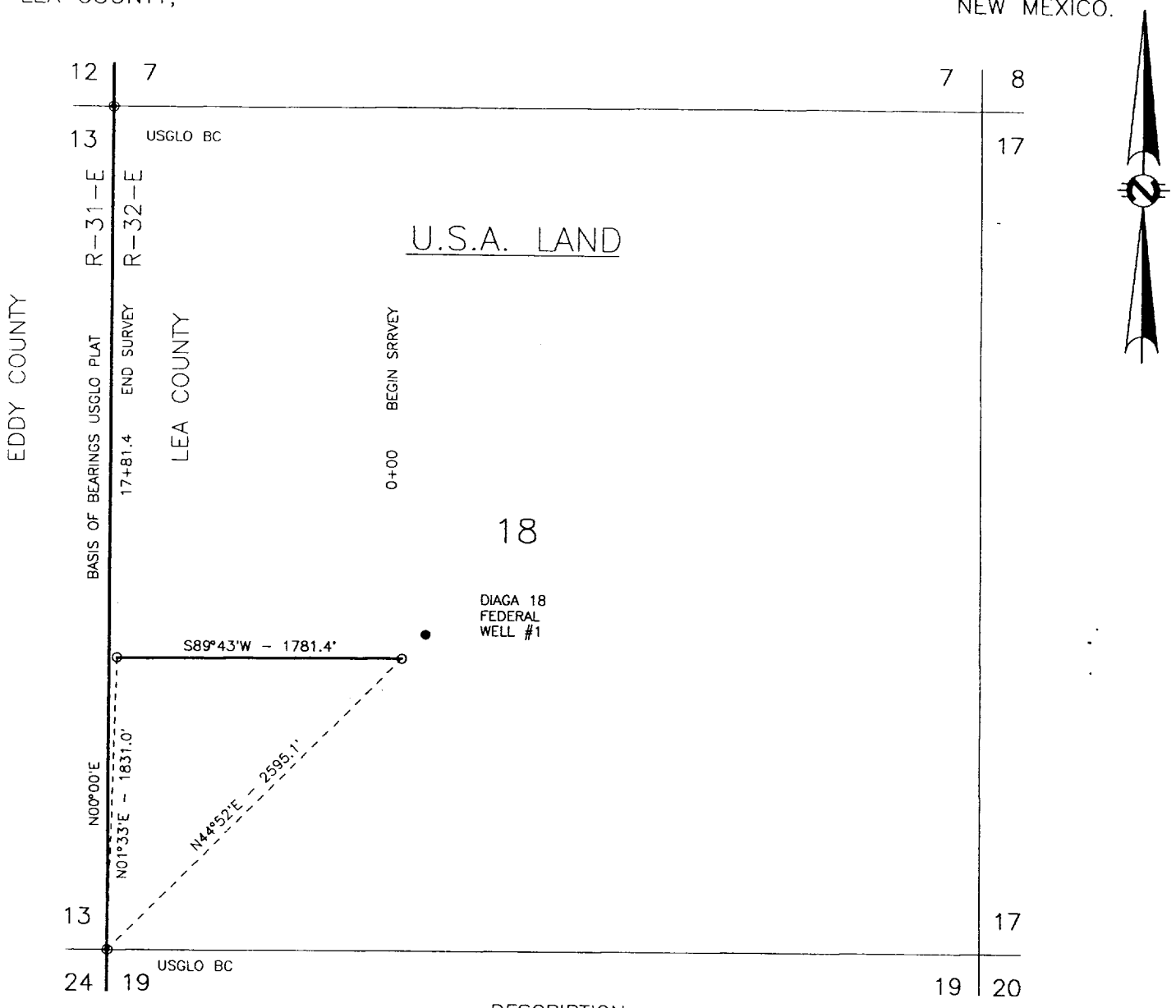
LEASE DIAGA 18 FEDERAL

U.S.G.S. TOPOGRAPHIC MAP
PADUCA BREAKS NW, N.M.

- - - - - - - - - - PROPOSED NEW ROAD

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

SECTION 18, TOWNSHIP 24 SOUTH, RANGE 32 EAST, N.M.P.M.,
LEA COUNTY, NEW MEXICO.



DESCRIPTION

A STRIP OF LAND 50.0 FEET WIDE, 1781.4 FEET OR 0.337 MILES IN LENGTH AND BEING 25.0 FEET LEFT AND 25.0 FEET RIGHT OF THE ABOVE CENTERLINE SURVEY.

1000 0 1000 2000 FEET

I HEREBY CERTIFY THAT THIS PLAT WAS PREPARED FROM FIELD NOTES OF AN ACTUAL SURVEY AND MEETS OR EXCEEDS ALL REQUIREMENTS FOR LAND SURVEYS AS SPECIFIED BY THIS STATE.

9-17-96

JOHN W. WEST, N.M. P.E. & P.S. No. 676
TEXAS P.L.S. No. 1138
RONALD J. EIDSON, N.M. P.S. No. 3239
TEXAS P.L.S. No. 1883
GARY G. EIDSON, N.M. P.S. No. 12641
TEXAS P.L.S. No. 4735

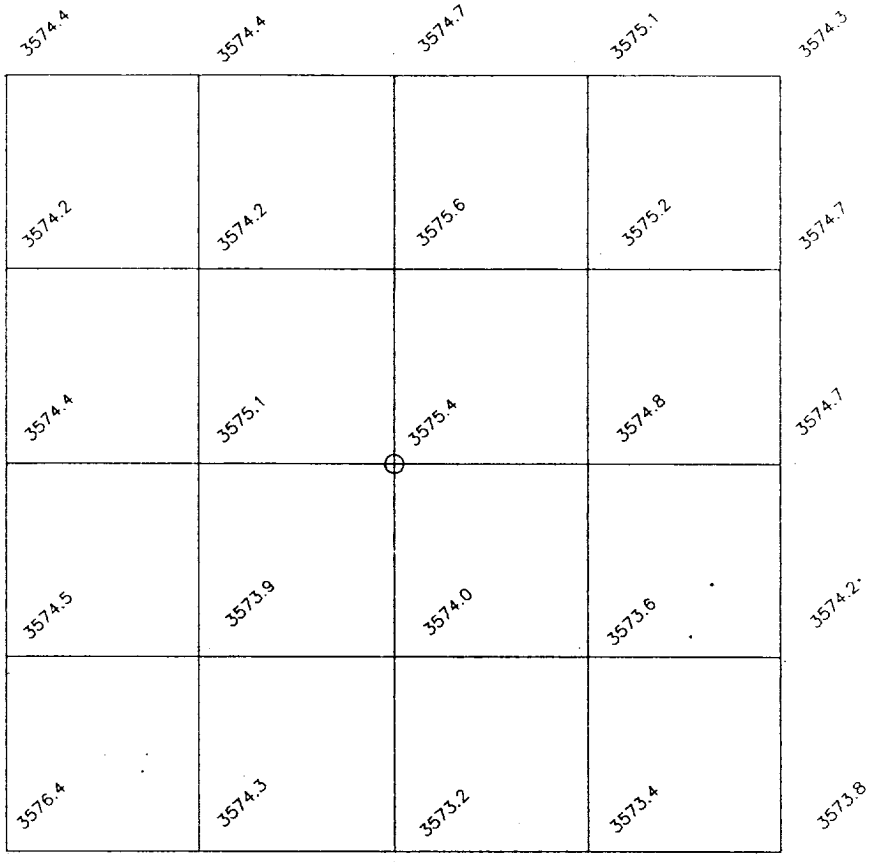
JOHN W. WEST ENGINEERING COMPANY
CONSULTING ENGINEERS & SURVEYORS – HOBBS, NEW MEXICO

BURLINGTON RESOURCES OIL & GAS CO.

SURVEY FOR AN ACCESS ROAD CROSSING
U.S.A. LAND IN SECTION 18,
TOWNSHIP 24 SOUTH, RANGE 32 EAST, N.M.P.M.,
LEA COUNTY, NEW MEXICO.

Survey Date: 9-12-96		Sheet 1 of 1 Sheets	
W.O. Number: 96-11-1174		Drawn By: D.McCARLEY	
Date: 9-13-96	BURL1174		Scale: 1" = 1000'

SECTION 18, TOWNSHIP 24 SOUTH, RANGE 32 EAST, N.M.P.M.,
LEA COUNTY, NEW MEXICO.



100 0 100 200 FEET

BURLINGTON RESOURCES OIL & GAS CO.

400' X 400' GRID AND TOPO
1980' FWL & 1980 FSL, SECTION 18
TOWNSHIP 24 SOUTH, RANGE 32 EAST, N.M.P.M.,
LEA COUNTY, NEW MEXICO.

Survey Date: 9-12-96	Sheet 1 of 1 Sheets
W.O. Number: 96-11-1174	Drawn By: D.McCARLEY
Date: 9-13-96 BURL1174	Scale: 1" = 100'

JOHN W. WEST ENGINEERING COMPANY
CONSULTING ENGINEERS & SURVEYORS – HOBBS, NEW MEXICO

MERIDIAN OIL

MIDLAND REGION
DRILL WELL LOCATION SPECIFICATIONS

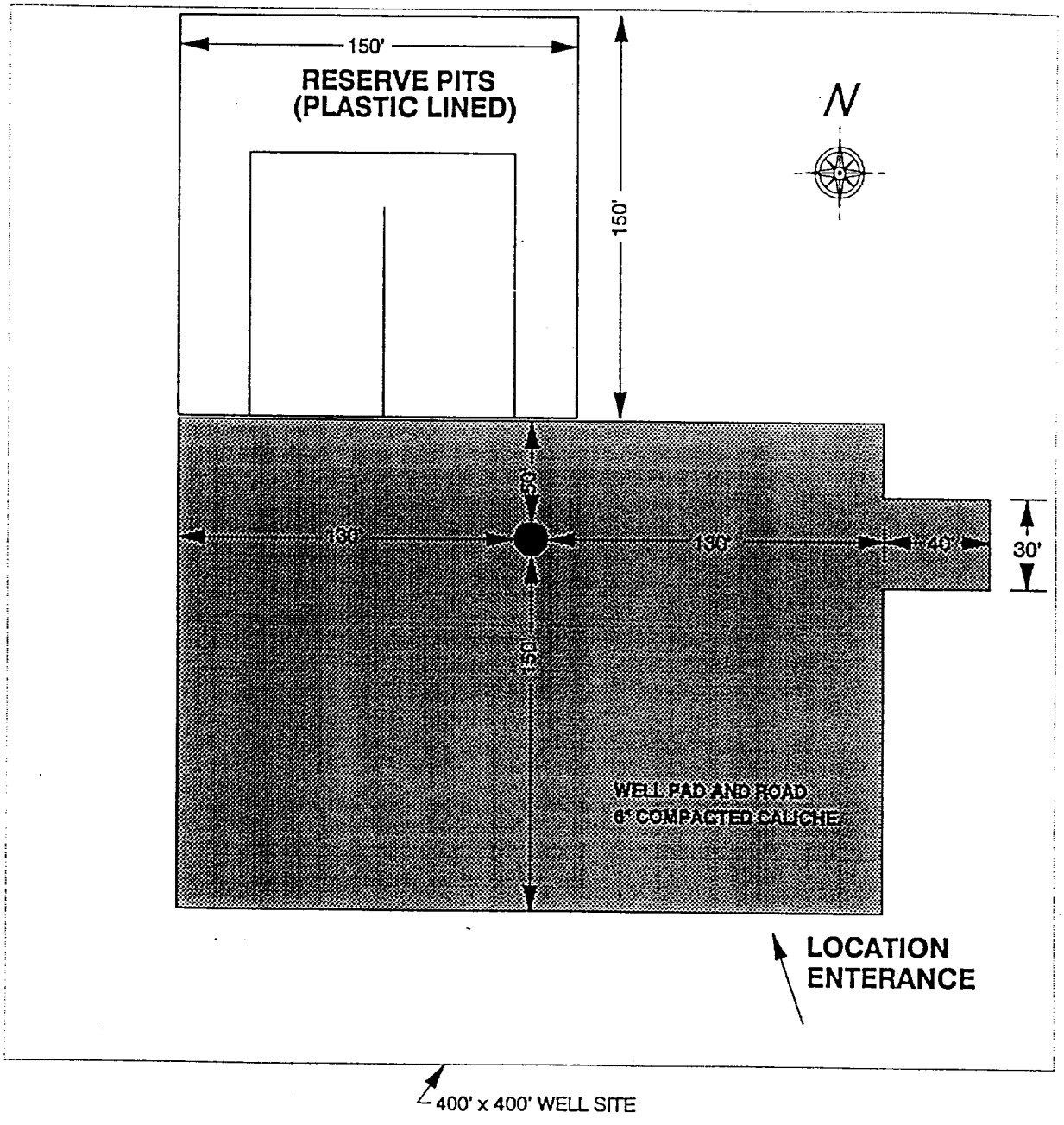
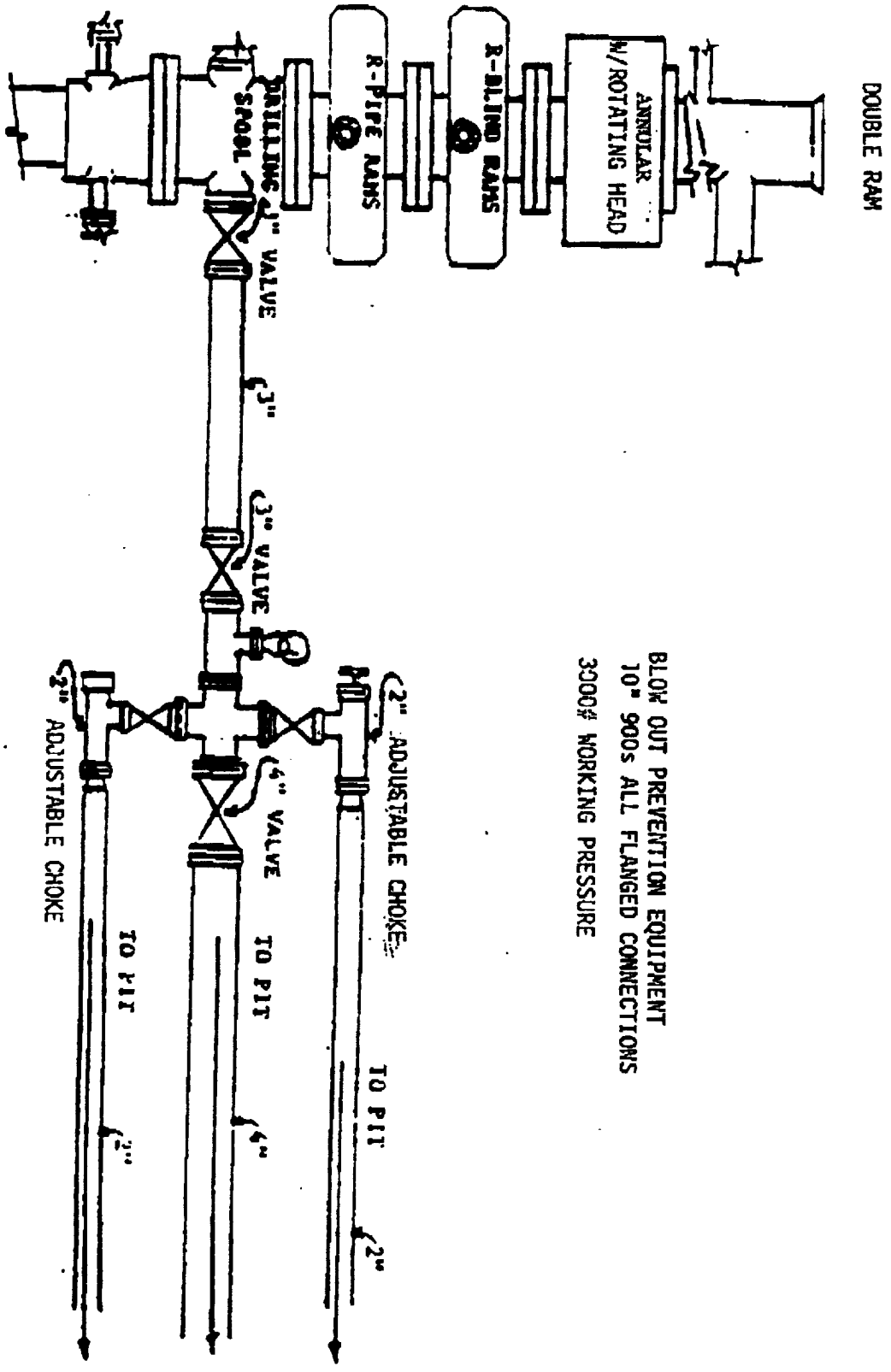


EXHIBIT
'E'



BLOW OUT PREVENTION EQUIPMENT
10" 900s ALL FLANGED CONNECTIONS
3000# WORKING PRESSURE