

3160-3
(August 1999)

EC

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENTFORM APPROVED
OMB No. 1004-0136
Expires November 30, 2000

APPLICATION FOR PERMIT TO DRILL OR REENTER

1a. Type of Work: <input checked="" type="checkbox"/> DRILL <input type="checkbox"/> REENTER		5. Lease Serial No. NMNM070522A	
1b. Type of Well: <input type="checkbox"/> Oil Well <input checked="" type="checkbox"/> Gas Well <input type="checkbox"/> Other <input checked="" type="checkbox"/> Single Zone <input type="checkbox"/> Multiple Zone		6. If Indian, Allottee or Tribe Name	
2. Name of Operator DEVON ENERGY PRODUCTION CO L P		7. If Unit or CA Agreement, Name and No.	
Contact: NORVELLA ADAMS E-Mail: Norvella.adams@dmv.com		8. Lease Name and Well No. INDIAN BASIN 25 FEDERAL 2	
3a. Address 20 NORTH BROADWAY SUITE 1500 OKLAHOMA CITY, OK 73102		9. API Well No. 30-015-34025	
3b. Phone No. (include area code) Ph: 405-552-8198		10. Field and Pool, or Exploratory INDIAN BASIN UPPER PENN ASSOC	
4. Location of Well (Report location clearly and in accordance with any State requirements. *) At surface SWSE Lot O 1075FSL 2025FEL At proposed prod. zone SWSE Lot O 660FSL 2055FEL		11. Sec., T., R., M., or Blk. and Survey or Area Sec 25 T21S R23E Mer NMP SME: BLM	
14. Distance in miles and direction from nearest town or post office* APPROXIMATELY 30 MILES NORTHWEST OF CARLSBAD NM		12. County or Parish EDDY	
15. Distance from proposed location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any) 1075'		13. State NM	
16. No. of Acres in Lease 1920.00		17. Spacing Unit dedicated to this well 320.00	
18. Distance from proposed location to nearest well, drilling, completed, applied for, on this lease, ft. 1500'		19. Proposed Depth 8633 MD 8600 TVD	
20. BLM/BIA Bond No. on file		21. Elevations (Show whether DF, KB, RT, GL, etc.) 3801 GL	
22. Approximate date work will start 05/20/2005		23. Estimated duration 45 DAYS	

RECEIVED

MAR 22 2005

24. Attachments

ROSWELL CONTROLLED WATER BASIN

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No. 1, shall be attached to this form:

- Well plat certified by a registered surveyor.
- A Drilling Plan.
- A Surface Use Plan (if the location is on National Forest System Lands, the SUPO shall be filed with the appropriate Forest Service Office).
- Bond to cover the operations unless covered by an existing bond on file (see Item 20 above).
- Operator certification
- Such other site specific information and/or plans as may be required by the authorized officer.

25. Signature (Electronic Submission)	Name (Printed/Typed) NORVELLA ADAMS Ph: 405-552-8198	Date 02/18/2005
Title AUTHORIZED REPRESENTATIVE		
Approved by (Signature) /s/ Tony J. Herrell	Name (Printed/Typed) /s/ Tony J. Herrell	Date MAR 21 2005
Title FIELD MANAGER	Office CARLSBAD FIELD OFFICE	

Application approval does not warrant or certify 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, are attached.

APPROVAL FOR 1 YEAR

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make 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.

Additional Operator Remarks (see next page)

Electronic Submission #54251 verified by the BLM Well Information System
For DEVON ENERGY PRODUCTION CO L P, sent to the Carlsbad
Committed to AFMSS for processing by ARMANDO LOPEZ on 02/18/2005 (05AL0123AE)APPROVAL SUBJECT TO
GENERAL REQUIREMENTS
AND SPECIAL STIPULATIONS
ATTACHED

Witness Surface Casing

** BLM REVISED ** BLM REVISED ** BLM REVISED ** BLM REVISED ** BLM REVISED **

Additional Operator Remarks:

Devon Energy Production Company, LP plans to drill to approximately 8,650' to test the Canyon for commercial quantities of gas. If the Canyon is deemed non commercial, the wellbore will be plugged and abandoned as per federal regulations. Programs to adhere to onshore oil and gas regulations are outlined in the following exhibits and statements.

Approximately 2435' of access road will be constructed.

DISTRICT I

P.O. Box 1880, Hobbs, NM 88241-1880

DISTRICT II

P.O. Drawer DD, Artesia, NM 88211-0710

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

OIL CONSERVATION DIVISION

P.O. Box 2088

Santa Fe, New Mexico 87504-2088

Form C-102

Revised February 10, 1994

Submit to Appropriate District Office

State Lease - 4 Copies

Fee Lease - 3 Copies

WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number		Pool Code	Pool Name
		33685	INDIAN BASIN UPPER PENN (ASSOC)
Property Code	Property Name		Well Number
	INDIAN BASIN "25" FEDERAL		F-2
GRID No.	Operator Name		Elevation
6137	Deyon Production Company, LP		3801'

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
0	25	21-S	23-E		1075	SOUTH	2025	EAST	EDDY

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
0	25	21-S	23-E		660'	SOUTH	2055'	EAST	EDDY

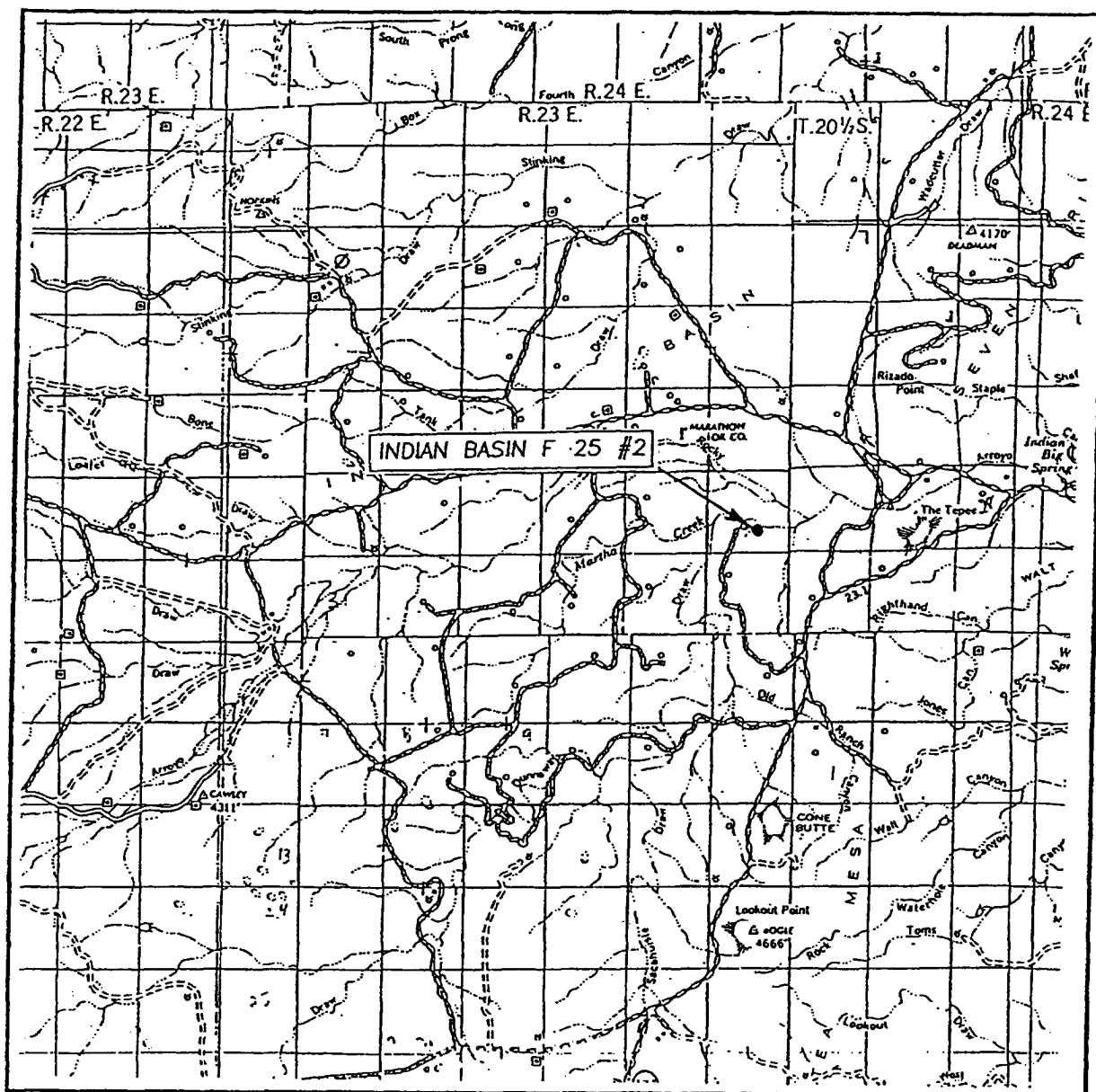
Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
320			

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>GEODETIC COORDINATES NAD 1927 NME Y= 525763.7 X=432111.8 LAT. 32°26'42.88"N LONG. 104°33'12.24"W</p>	<p>F-1</p>	<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>Noxyella Adams</i> Signature</p> <p>Noxyella Adams Printed Name</p> <p>Sr. Staff Eng. Tech Title</p> <p>2/17/05 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>SEPTEMBER 03, 2002</p> <p>Date Surveyed</p> <p>Signature of Surveyor</p> <p>Professional Surveyor</p> <p>NEW MEXICO</p> <p>02-11-0630</p> <p>Certificate No. RONALD J. EIDSON 3239 CARY EIDSON 12641</p>

EXHIBIT "A"

VICINITY MAP



SCALE: 1" = 2 MILES

SEC. 25 TWP. 21-S RGE. 23-E

SURVEY N.M.P.M.

COUNTY EDDY

DESCRIPTION 1075' FSL & 2025' FEL

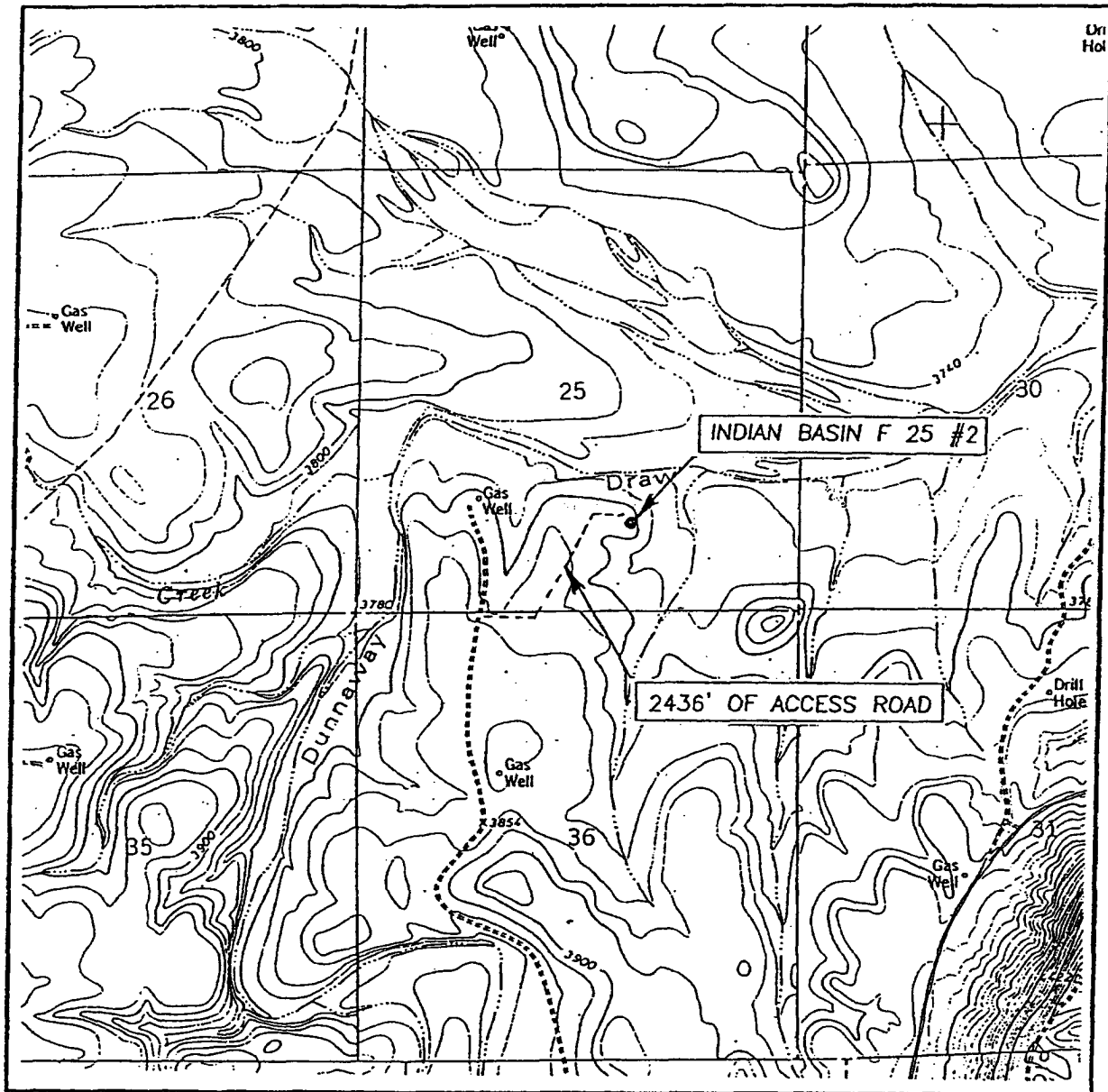
ELEVATION 3801'

OPERATOR Devon Energy Production Co., LP

LEASE INDIAN BASIN F 25

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

LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL: 20'
MARTHA CREEK, N.M.

SEC. 25 TWP. 21-S RGE. 23-E

SURVEY N.M.P.M.

COUNTY EDDY

DESCRIPTION 1075' FSL & 2025' FEL

ELEVATION 3801'

OPERATOR Devon Energy Production Co., LP

LEASE INDIAN BASIN F 25

U.S.G.S. TOPOGRAPHIC MAP
MARTHA CREEK, N.M.

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

DRILLING PROGRAM

Devon Energy Production Company, LP

Indian Basin 25 Federal 2

Surface Location: 1075' FSL & 2025' FEL, Unit O, Sec 25 T21S R23E, Eddy, NM

Bottom hole Location: 660' FSL & 2055' FEL, Unit O, sec 25 T21S R23E, Eddy, NM

1. Geologic Name of Surface Formation

- a. Quaternary Aeolian Deposits

2. Estimated tops of geological markers:

a. San Andres	520'
b. Glorieta	2650'
c. Bone Spring	3,500'
d. Wolfcamp	7,300'
e. Cisco-Canyon	7,850'
f. Canyon	8,300'
g. Total Depth	8,633' TVD

3. Estimated Depths of Anticipated Fresh Water, Oil or Gas

- | | |
|----------------------------|-------|
| a. San Andres | Water |
| b. Wolfcamp, Cisco, Canyon | Gas |

4. Casing Program:

<u>Hole Size</u>	<u>Interval</u>	<u>OD Csg</u>	<u>Weight</u>	<u>Collar</u>	<u>Grade</u>
25"	0' -40'	20"	Na	Na	Conductor
12 1/4"	0' - 1,400'	9 5/8"	36#	ST&C	H-40 WITNESS
8 3/4"	0' - 8,633'	7"	23	LT&C	HCL80/L-80

5. Cement & Setting Depth:

- | | | |
|-----------|------------|---|
| a. 20" | Conductor | Cement with ready-mix to surface. |
| b. 9 5/8" | Surface | Cement w/330 sx Class C 35:65 Pozmix, tail w/ 200 sx Class C. Circulate cement to surface. |
| c. 7" | Production | Cement with 320 sx Class C 15:61:11. The cement volumes could be revised pending the caliper measurement from the open hole logs. The top of cement is to be @ 6450'. |

6. Pressure Control Equipment:

The blowout preventor equipment (BOP) shown in Exhibit #1 will consist of a (3M system) double ram type (3000 psi WP) preventor and a bag-type (Hydril) preventor (3000 psi WP). Both units will be hydraulically operated and the ram type preventor will be equipped with blind rams on top and 4 1/2" drill pipe rams on bottom. Both BOP's will be installed on the 9 5/8" surface casing and utilized continuously until total depth is reached. **All BOP's and associated equipment will be**

tested to 1200 psi with the rig pump before drilling out the 9 5/8" casing shoe. BOP's will be tested as per BLM Drilling Operations Order #2, prior to drilling out the 9 5/8" casing shoe, the BOP's and Hydril will be function tested.

Pipe rams will be operated and checked each 24 hour period and each time the drill pipe is out of the hole. These functional tests will be documented on the daily drillers log. A 2" kill line and 3" choke line will be incorporated in the drilling spool below the ram-type BOP. Other accessory BOP equipment will include a kelly cock, floor safety valve, choke lines and choke manifold having 3000 psi WP rating.

7. Proposed Mud Circulation System

<u>Depth</u>	<u>Mud Wt.</u>	<u>Visc</u>	<u>Fluid Loss</u>	<u>Type System</u>
40' – 1400'	8.5 – 8.7	29-34	NC	Air or Fresh Water
1400-TD'	8.5-8.7	32-40	10 cc or less	FW mud or Dris-pac system

Sufficient mud materials will be kept on location at all times in order to combat lost circulation, or unexpected kicks. In order to run DST's, open hole logs, & casing the viscosity and/or water loss may have to be adjusted to meet these needs.

8. Logging, Coring, and Testing Program:

- a. Open hole logs: Dual Induction, SNP, LDT, MSFL, Gamma Ray, Caliper from TD to 1400'. Run Gamma Ray, neutron from 1400' to surface.
- b. Mud Logger may be rigged up on hole at the request of the operator
- c. No cores or DST's are planned at this time.
- d. After running casing, cased hole Gamma Ray, Neutron Collar logs will be run from TD back to all possible productive zones.

9. Potential Hazards:

- a. No abnormal pressures or temperatures are foreseen. The anticipated bottom hole temperature at total depth is 185 degrees and maximum bottom hole pressure is 4250 psig. Hydrogen sulfide gas may be encountered in this area. A hydrogen sulfide operations plan will be implemented prior to penetrating the Penn formation (see attached Hydrogen Sulfide Operations Plan). Lost circulation intervals have been encountered in the Cisco-Canyon zones in adjacent wells.

10. Anticipated Starting Date and Duration of Operations:

- a. Road and location construction will begin after the BLM has approved the APD. Anticipated spud date will be as soon after BLM approval and as soon as a rig will be available. Move in operations and drilling is expected to take 36 days. If production casing is run then an additional 30 days will be needed to complete well and construct surface facilities and/or lay flowlines in order to place well on production.

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 procedures, routes and first aid.
 - f. Proper use of 30 minute pressure demand air pack.
2. H2S Detection and Alarm System
 - 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 mud pit 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 "1"
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 telephones 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 igniter 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.
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 or formation. A mud gas separator will be brought into service along with H2S scavengers if necessary.

SURFACE USE PLAN

Devon Energy Production Company, LP

Indian Basin 25 Federal 2

Surface Location: 1075' FSL & 2025' FEL, Unit O, Sec 25 T21S R23E, Eddy, NM

Bottom hole Location: 660' FSL & 2055' FEL, Unit O, sec 25 T21S R23E, Eddy, NM

1. Existing Roads:

- a. The well site and elevation plat for the proposed are reflected on Exhibit A. The well was staked by Basin Surveys.
- b. All roads into the location are depicted on Exhibit B.
- c. Directions to Location: From Carlsbad New Mexico take U.S. Highway 285 North 12 miles to the junction with State highway 137, turn Left go to Marathon Road (CR-401) bear Left go 3.1 miles, turn Right and follow lease road 2 miles to double pole powerline and turn right, follow road .15 miles, bear Left, go .3 miles, bear Right, go 500' to location.

2. Access Road

- a. Exhibit #C shows the existing and proposed roads. All new construction will adhere to the following.
- b. The maximum width of the road will be 15'. It will be crowned and made of 6" of rolled and compacted caliche. Water will be deflected, as necessary, to avoid accumulation and prevent surface erosion.
- c. Surface material will be native caliche. This material will be obtained from a BLM approved pit nearest in proximity to the location. The average grade will be approximately 1%.
- d. No cattle guards, grates or fence cuts will be required. No turnouts are planned.

3. In the event the well is found productive, the necessary paperwork will be submitted to the BLM prior to producing the well.

4. Methods of Handling Waste Material:

- a. Drill cuttings will be disposed of in the reserve pits.
- b. All trash, junk and other waste material will be contained in trash cages or trash bins to prevent scattering. When the job is completed all contents will be removed and disposed of in an approved sanitary landfill.
- c. Salts remaining after completion of well will be picked up by the supplier, including broken sacks.
- d. Waste water from living quarters will be drained into hole with a minimum of 10'. These holes will be covered during drilling and will be back filled when the well is completed. A Porto-john will be provided for the rig crews. This equipment will be properly maintained during the drilling and completion operations and will be removed when all operations are complete.
- e. Remaining drilling fluids will be allowed to evaporate in the reserve pits until the pits are dry enough to be closed pursuant to NMOCD rules and guidelines. Water produced during completion will be put in reserve pits. Oil and condensate produced will be put in a storage tank and sold.

5. Well Site Layout

- a. Exhibit D Shows the proposed well site layout.
- b. This exhibit indicates proposed location of reserve and sump pits and living facilities.
- c. Mud pits in the active circulating system will be steel pits & the reserve pits is proposed to be lined with a 12 mil synthetic woven liner.
- d. 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.

6. Other Information:

- a. The soil is shallow, calcareous, grayish-brown, loose to slightly compact, stony silty loam overlying limestone bedrock; slopes consist primarily of limestone rock and small pockets of colluvium and alluvium.
- b. The surface and minerals are owned by the US Government and is administered by the Bureau of Land Management. The surface is of limited use except for the grazing of livestock and the production of oil and gas.
- c. An archaeological survey will be conducted of the well pad location and the results will be filed with the Bureau of Land Management in Carlsbad Field office.
- d. There are no dwellings within 2 miles of location.

Operators Representative:

The Devon Energy Production Company, L.P. representatives responsible for ensuring compliance of the surface use plan are listed below.

Robert Elliott
Operations Engineer Advisor

Don Mayberry
Superintendent

Devon Energy Production Company, L.P.
20 North Broadway, Suite 1500
Oklahoma City, OK 73102-8260

Devon Energy Production Company, L.P.
Post Office Box 250
Artesia, NM 88211-0250

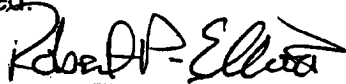
(405) 228-8609 (office)
(405) 323-4616 (Cellular)

(505) 748-3371 (office)
(505) 746-4945 (home)

Certification

I hereby certify that I, or persons under my direct supervision, have inspected the proposed drill site and access road; that I am familiar with the conditions that 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 Devon Energy Production Company, L.P. and its contractors and subcontractors in conformity with this plan and the terms and conditions under which it is approved.

Signed: _____



Robert Elliott
Operations Engineer Advisor

Date: February 18, 2005

Attachment to Exhibit #1
NOTES REGARDING BLOWOUT PREVENTERS
Devon Energy Production Company, LP

Indian Basin 25 Federal 2

Surface Location: 1075' FSL & 2025' FEL, Unit O, Sec 25 T21S R23E, Eddy, NM
Bottom hole Location: 660' FSL & 2055' FEL, Unit O, sec 25 T21S R23E, Eddy, NM

1. Drilling nipple will be constructed so it can be removed mechanically without the aid of a welder. The minimum internal diameter will equal BOP bore.
2. Wear ring will be properly installed in head.
3. Blowout preventer and all associated fittings will be in operable condition to withstand a minimum 3000 psi working pressure.
4. All fittings will be flanged.
5. A full bore safety valve tested to a minimum 3000 psi WP with proper thread connections will be available on the rotary rig floor at all times.
6. All choke lines will be anchored to prevent movement.
7. All BOP equipment will be equal to or larger in bore than the internal diameter of the last casing string.
8. Will maintain a kelly cock attached to the kelly.
9. Hand wheels and wrenches will be properly installed and tested for safe operation.
10. Hydraulic floor control for blowout preventer will be located as near in proximity to driller's controls as possible.
11. All BOP equipment will meet API standards and include a minimum 40 gallon accumulator having two independent means of power to initiate closing operation.

UNITED STATES DEPARTMENT OF THE INTERIOR

Bureau of Land Management

Roswell Field Office

2909 West Second Street

Roswell, New Mexico 88201-1287

Statement Accepting Responsibility for Operations

Operator Name: **Devon Energy Production Company, LP**
Street or Box: **20 North Broadway, Suite 1500**
City, State: **Oklahoma City, Oklahoma**
Zip Code: **73102-8260**

The undersigned accepts all applicable terms, conditions, stipulations and restrictions concerning operations conducted on the leased land or portion thereof, as described below.

Lease No.: **NM-070522-A**

Legal Description of Land: **320 acres; Sec 25 T21S R23E,**

Penn

Formation(s):


Nationwide

Bond Coverage:

CO-1104

BLM Bond File No.:

Authorized Signature:


Robert Elliott

Title:

Operations Engineering Advisor

Date:

2/18/05

MINIMUM BLOWOUT PREVENTER REQUIREMENTS

3,000 psi Working Pressure

3 MWP

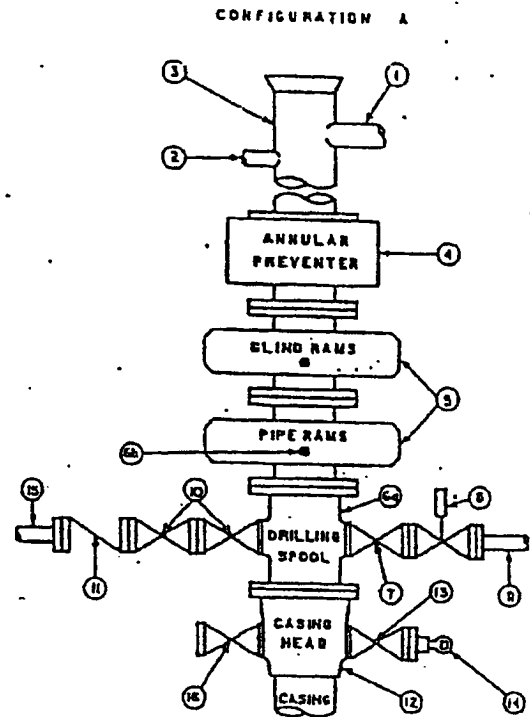
EXHIBIT # 1

STACK REQUIREMENTS

No.	Item	Min. I.D.	Min. Nominal
1	Flowline		
2	Fill up line		2"
3	Drilling nipple		
4	Annular preventer		
5	Two single or one dual hydraulically operated rams		
6a	Drilling spool with 2" min. kill line and 3" min choke line outlets		
6b	2" min. kill line and 3" min. choke line outlets in ram. (Alternate to 6a above.)		
7	Valve Gate <input type="checkbox"/> Plug <input type="checkbox"/>	3-1/8"	
8	Gate valve—power operated	3-1/8"	
9	Line to choke manifold		3"
10	Valves Gate <input type="checkbox"/> Plug <input type="checkbox"/>	2-1/16"	
11	Check valve	2-1/16"	
12	Casing head		
13	Valve Gate <input type="checkbox"/> Plug <input type="checkbox"/>	1-13/16"	
14	Pressure gauge with needle valve		
15	Kill line to rig mud pump manifold		2"

OPTIONAL

16	Flanged valve	1-13/16"	
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CONTRACTOR'S OPTION TO FURNISH:

1. All equipment and connections above bradenhead or casinghead. Working pressure of preventers to be 3,000 psi, minimum.
2. Automatic accumulator (80 gallon, minimum) capable of closing BOP in 30 seconds or less and, holding them closed against full rated working pressure.
3. BOP controls, to be located near drillers position.
4. Kelly equipped with Kelly cock.
5. Inside blowout preventer or its equivalent on derrick floor at all times with proper threads to fit pipe being used.
6. Kelly saver-sub equipped with rubber casing protector at all times.
7. Plug type blowout preventer tester.
8. Extra set pipe rams to fit drill pipe in use on location at all times.
9. Type RX ring gaskets in place of Type R.

MEC TO FURNISH:

1. Bradenhead or casinghead and side valves.
2. Wear bushing, if required.

GENERAL NOTES:

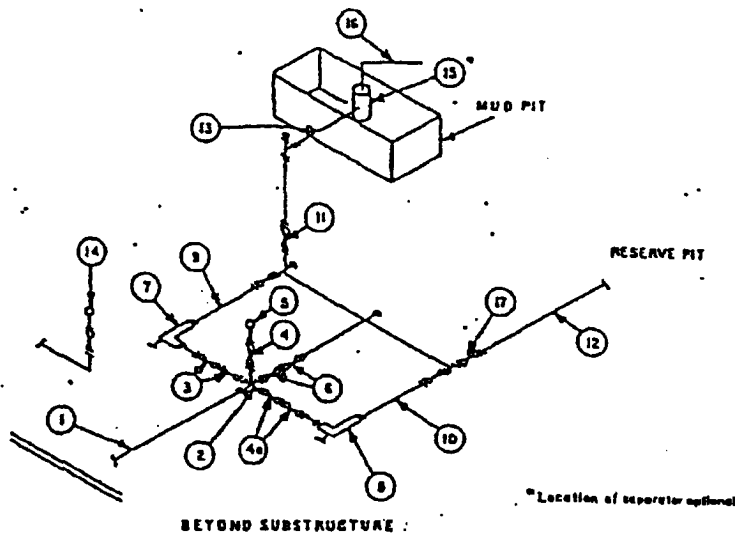
1. Deviations from this drawing may be made only with the express permission of MEC's Drilling Manager.
2. All connections, valves, fittings, piping, etc., subject to well or pump pressure must be flanged (suitable clamp connections acceptable) and have minimum working pressure equal to rated working pressure of preventers up through choke. Valves must be full opening and suitable for high pressure mud service.
3. Controls to be of standard design and each marked, showing opening and closing position.
4. Chokes will be positioned so as not to hamper or delay changing of choke beans. Replaceable parts for adjustable choke, other bean sizes, retainers, and choke wrenches to be conveniently located for immediate use.
5. All valves to be equipped with handwheels or handles ready for immediate use.
6. Choke lines must be suitably anchored.

7. Handwheels and extensions to be connected and ready for use.
8. Valves adjacent to drilling spool to be kept open. Use outside valves except for emergency.
9. All seamless steel control piping (3000 psi working pressure) to have flexible joints to avoid stress. Hoses will be permitted.
10. Casinghead connections shall not be used except in case of emergency.
11. Do not use kill line for routine fill-up operations.

MINIMUM CHOKE MANIFOLD
3,000, 5,000 and 10,000 PSI Working Pressure

3 MWP - 5 MWP - 10 MWP

EXHIBIT # 1



MINIMUM REQUIREMENTS										
No.		3,000 MWP			5,000 MWP			10,000 MWP		
		I.D.	NOMINAL	RATING	I.D.	NOMINAL	RATING	I.D.	NOMINAL	RATING
1	Line from drilling spool		3"	3,000		3"	5,000		3"	10,000
2	Cross 3"x3"x3"x2"			3,000			5,000			
	Cross 3"x3"x3"x3"									10,000
3	Valves(1) Gate □ Plug □(2)	3-1/8"		3,000	3-1/8"		5,000	3-1/8"		10,000
4	Valve Gate □ Plug □(2)	1-13/16"		3,000	1-13/16"		5,000	1-13/16"		10,000
4a	Valves(1)	2-1/16"		3,000	2-1/16"		5,000	3-1/8"		10,000
5	Pressure Gauge			3,000			5,000			10,000
6	Valves Gate □ Plug □(2)	3-1/8"		3,000	3-1/8"		5,000	3-1/8"		10,000
7	Adjustable Choke(3)	2"		3,000	2"		5,000	2"		10,000
8	Adjustable Choke	1"		3,000	1"		5,000	2"		10,000
9	Line		3"	3,000		3"	5,000		3"	10,000
10	Line		2"	3,000		2"	5,000		3"	10,000
11	Valves Gate □ Plug □(2)	3-1/8"		3,000	3-1/8"		5,000	3-1/8"		10,000
12	Lines		3"	1,000		3"	1,000		3"	2,000
13	Lines		3"	1,000		3"	1,000		3"	2,000
14	Remote reading compound standpipe pressure gauge			3,000			5,000			10,000
15	Gas Separator		2'x5'			2'x5'			2'x5'	
16	Line		4"	1,000		4"	1,000		4"	2,000
17	Valves Gate □ Plug □(2)	3-1/8"		3,000	3-1/8"		5,000	3-1/8"		10,000

(1) Only one required in Class 3M.

(2) Gate valves only shall be used for Class 10M.

(3) Remote operated hydraulic choke required on 5,000 psi and 10,000 psi for drilling.

EQUIPMENT SPECIFICATIONS AND INSTALLATION INSTRUCTIONS

- All connections in choke manifold shall be welded, studded, flanged or Cameron clamp of comparable rating.
- All flanges shall be API 5B or 6BX and ring gaskets shall be API RX or BX. Use only BX for 10 MWP.
- All lines shall be securely anchored.
- Chokes shall be equipped with tungsten carbide seats and needles, and replacements shall be available.
- Choke manifold pressure and standpipe pressure gauges shall be available at the choke manifold to assist in regulating chokes. As an alternate with automatic chokes, a choke manifold pressure gauge shall be located on the rig floor in conjunction with the standpipe pressure gauge.
- Line from drilling spool to choke manifold should be as straight as possible. Lines downstream from chokes shall make turns by large bends or 90° bends using bull plugged tees.
- Discharge lines from chokes, choke bypass and from top of gas separator should vent as far as practical from the well.

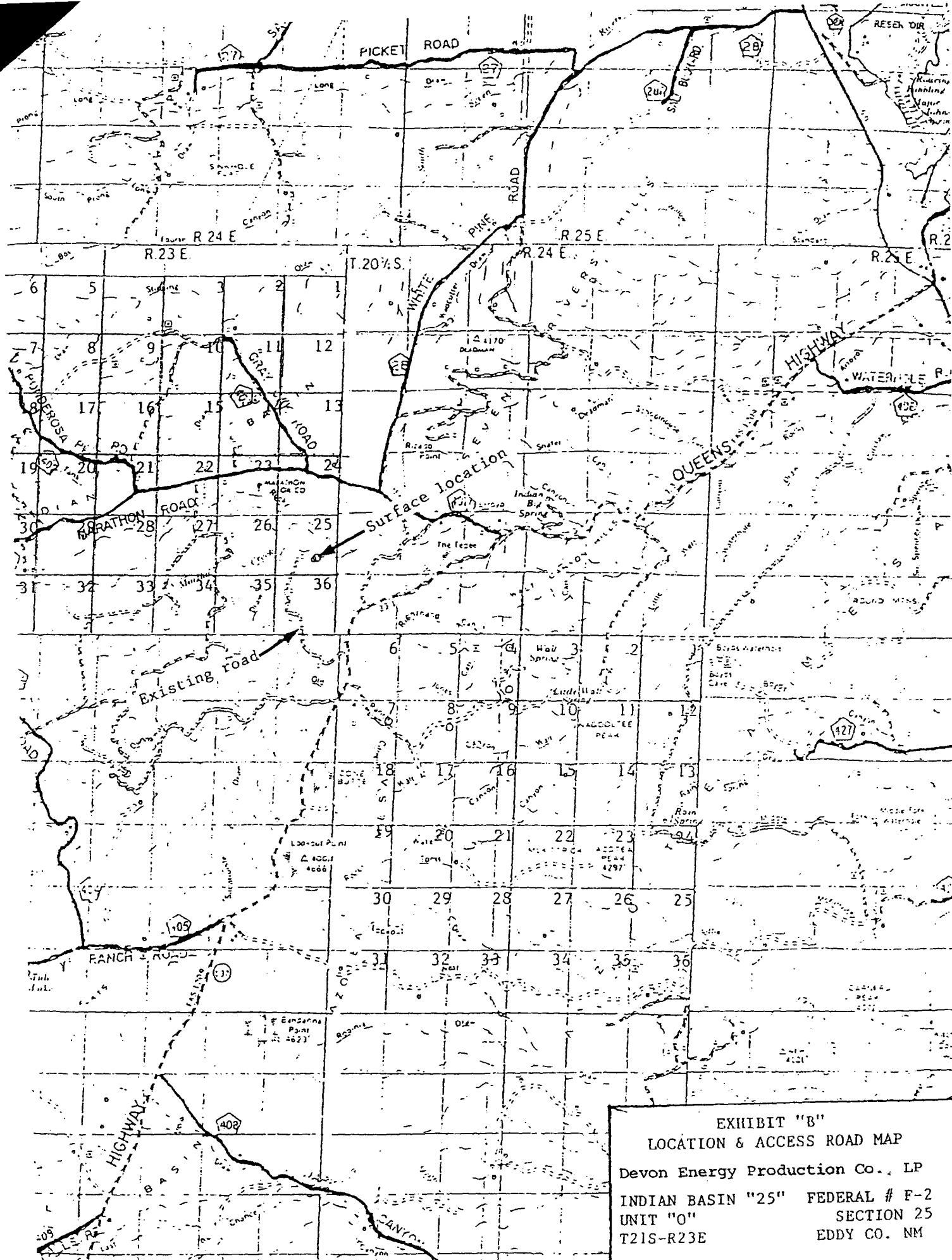


EXHIBIT "B"
LOCATION & ACCESS ROAD MAP
Devon Energy Production Co., LP
INDIAN BASIN "25" FEDERAL # F-2
UNIT "O" SECTION 25
T21S-R23E EDDY CO. NM

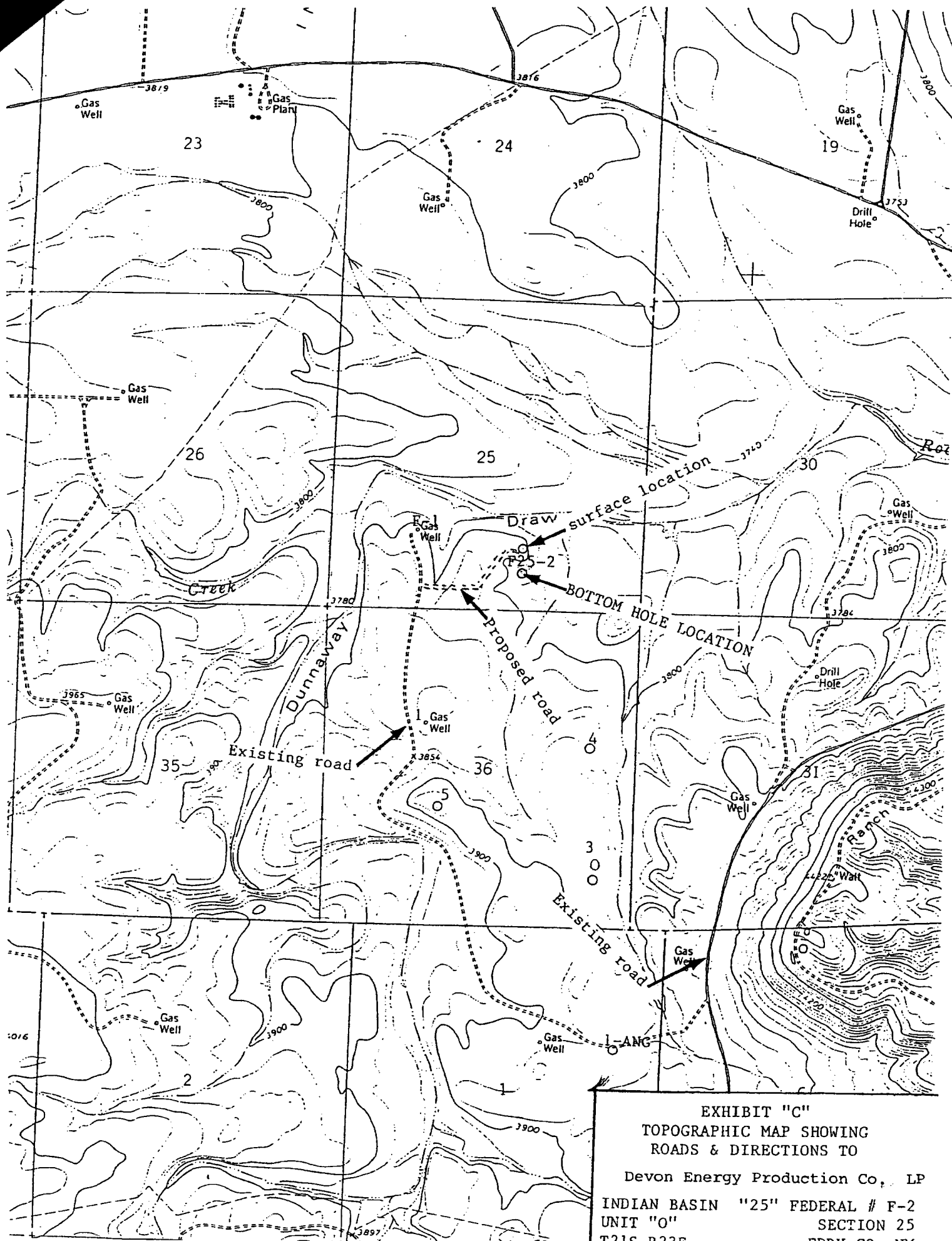
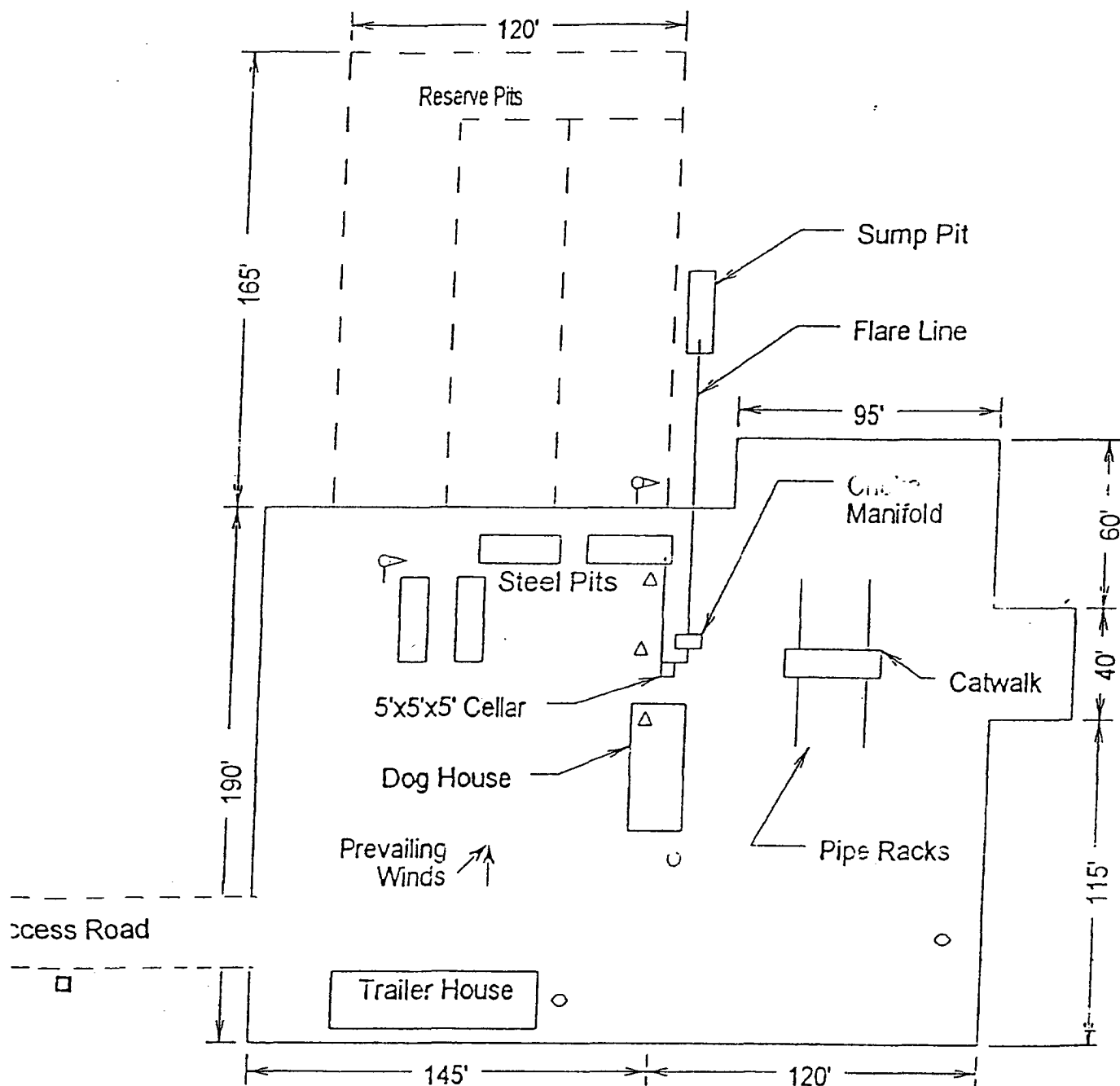


EXHIBIT "C"
TOPOGRAPHIC MAP SHOWING
ROADS & DIRECTIONS TO
Devon Energy Production Co., LP
INDIAN BASIN "25" FEDERAL # F-2
UNIT "O" SECTION 25
T21S-R23E EDDY CO. NM



- ⌂ Wind Direction Indicators
(wind sock or streamers)
- △ H2S Monitors
(alarms at bell nipple and shale shaker)
- Briefing Areas
- Remote EOP Closing Unit
- Sign and Condition Flags

EXHIBIT "D"
RIG LAY OUT PLAT

Devon Energy Production Co., LP
INDIAN BASIN "25" FEDERAL # F-2
UNIT "O"
T21S-E23E
SECTION 25
EDDY CO. NM

