

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

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

ENERGEN RESOURCES CORPORATION

3. ADDRESS AND TELEPHONE NO.

2198 Bloomfield Highway, Farmington, NM 87401

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

790' FNL, 1850' FWL
At proposed prod. zone

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

26 Miles Northwest of Lindrith, New Mexico

15. DISTANCE FROM PROPOSED*
LOCATION TO NEAREST
PROPERTY OR LEASE LINE, FT.
(Also to nearest drlg. unit line, if any)

790'

16. NO. OF ACRES IN LEASE

2557.76'

17. NO. OF ACRES ASSIGNED
TO THIS WELL

320/320
319.12

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

1000'

19. PROPOSED DEPTH

7624'

20. ROTARY OR CABLE TOOLS

Rotary

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

6577' GL

22. APPROX. DATE WORK WILL START*

23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	GRADE SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
12 1/4	9 5/8	36#	200	130 cu. ft. to circ.
8 3/4	7	20 & 23#	3559	1070 cu. ft. to circ.
6 1/4	4 1/2	10.5#	7624	630 cu. ft. to circ. to intermediate

An application with NMOCD is being submitted to downhole commingle. Selectively perforate and sand water fracture the Mesaverde and Dakota. This gas is dedicated.

NOTE: THIS IS A PIPELINE R.O.W. EXPEDITED APD.

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 Production Superintendent

DATE

(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

TITLE

DATE

*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,

District I
PO Box 1990, Hobbs, NM 88241-1990

District II
PO Drawer 00, Artesia, NM 88211-0719

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

District IV
PO Box 2088, Santa Fe, NM 87504-2088

State of New Mexico
Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION
PO Box 2088
Santa Fe, NM 87504-2088

Form C-102
Revised February 21, 1994
Instructions on back
Submit to Appropriate District Office
State Lease - 4 Copies
Fee Lease - 3 Copies

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

'API Number 30-039-26306	'Pool Code 72319-71599	'Pool Name Blanco Mesaverde-Basin Dakota
'Property Code 21958	'Property Name JICARILLA WEST	'Well Number 9M
'GRID No. 162928	'Operator Name ENERGEN RESOURCES CORPORATION	'Elevation 6577'

10 Surface Location

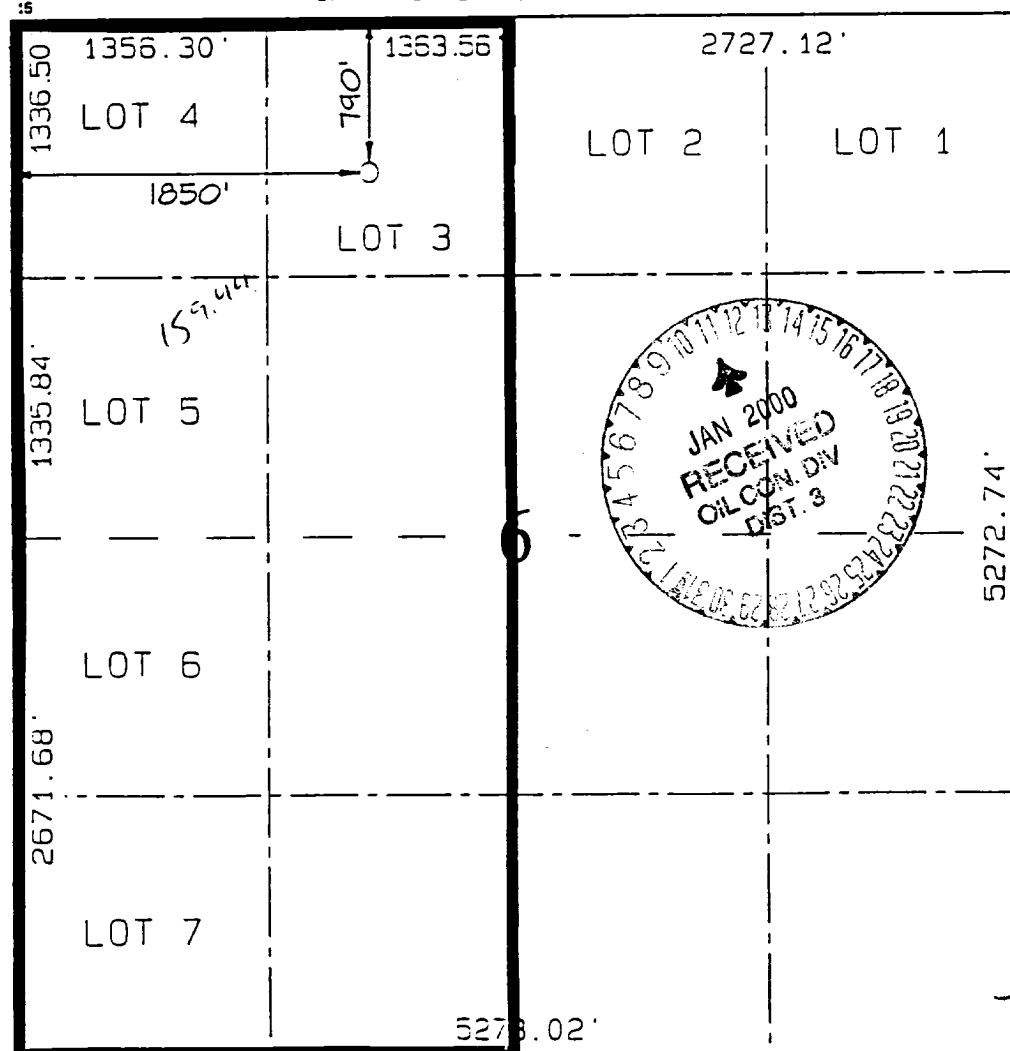
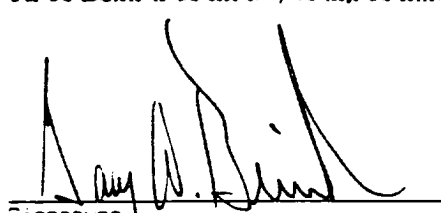
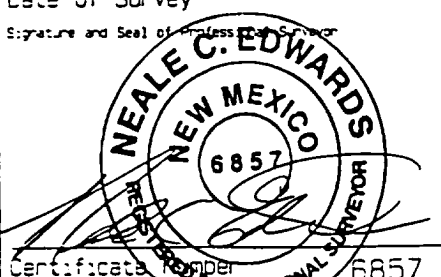
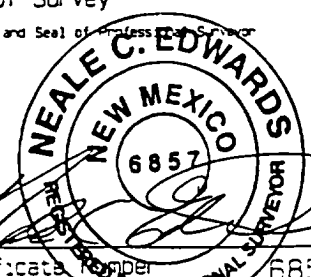
UL or lot no. C	Section 6	Township 26N	Range 5W	Lot Ion	Feet from the 790	North/South line NORTH	Feet from the 1850	East/West line WEST	County RIO ARriba
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11 Bottom Hole Location If Different From Surface

UL or lot no.	Section	Township	Range	Lot Ion	Feet from the	North/South line	Feet from the	East/West line	County
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12 Dedicated Acres 319.12/319.12 520/520	13 Joint or Infill	14 Consolidation Code	15 Order No.
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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

16		17 OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief.  Signature Gary Brink Printed Name Production Superintendant Title 10/27/99 Date
		18 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 supervision, and that the same is true and correct to the best of my belief. SEPTEMBER 17, 1999 Date of Survey  Signature and Seal of Professional Surveyor  Certificate Number 6857

OPERATIONS PLAN

WELL NAME: Jicarilla West #9M

LOCATION: 790' FNL, 1850' FWL, Section 6, T26N, R5W, Rio Arriba, New Mexico

FIELD: Blanco MV/Basin Dakota

ELEVATION: 6577'

FORMATION TOPS:

Surface	San Jose	Cliff House	4889
Ojo Alamo	2509	Menefee	4984
Kirtland	2739	Point Lookout	5399
Fruitland	3024	Gallup	6349
Pictured Cliffs	3199	Greenhorn	7319
Lewis	3359	Graneros	7379
Huerfanito Benonite	3679	Dakota	7404
		Total Depth	7624

LOGGING PROGRAM:

Open Hole Logs:

Surface to intermediate: HRI/SP/GR; CNT/LDT/MLT

Inter TD to total depth: Temp/HRI/CNT, LDT/GR

Mud Logs: 200' above Ojo Alamo to total depth

Coring: None

Natural Gauges: Every 500' from intermediate TD to total depth

MUD PROGRAM: Fresh water low solids mud from surface to intermediate TD. Air/mist from intermediate casing point to total depth.

CASING PROGRAM:

<u>HOLE SIZE</u>	<u>DEPTH</u>	<u>CSG SIZE</u>	<u>WT.</u>	<u>GRADE</u>
12 1/4"	200'	9 5/8"	36#	K-55
8 3/4"	3559'	7"	23#	K-55
6 1/4"	7624'	4 1/2"	11.6#	K-55

TUBING PROGRAM:

7475' 2 3/8 4.7# J-55

WELLHEAD: 11" 3000 x 9 5/8" casing head. 11" 3000 x 11" 3000 spool. 11" 5000 x 7 1/16" 5000 xmas tree.

BOP SPECIFICATIONS:

An 11" 2000 psi minimum double gate BOP stack (Figure 1) will be used following nipple up of casing head. During air drilling operations, a Shaffer Type 50 or equivalent rotating head will be installed on top of the stack. A 2" nominal, 2000 psi minimum choke manifold will be used.

CEMENTING:

9 5/8 surface casing - Cement with 110 sks Class B Cement with 1/4" Flocele/sx and 2% calcium chloride (130 cu. ft. of slurry, 100% excess to circulate to surface). WOC 12 hrs. Test casing to 600# for 30 minutes.

Texas Pattern Guide Shoe on bottom. *3 centralizers, 1st 3 joints*

7" intermediate casing - cement with 488 sks 65/35 Class B Poz with 6% gel, 2% calcium chloride, 10% gilsonite, and 1/4# flocele/sk. Tail with 100 sks Class B w/2% calcium chloride, 10% gilsonite and 1/4# flocele/sk. (1070 cu. ft. of slurry, 100% excess to circulate to surface). WOC 12 hrs. If cement does not circulate, run temperature survey in 8 hrs. to determine TOC. Test casing to 1200 psi for 30 minutes.

Cement nose guide shoe on bottom with a self-fill insert float valve on top of shoe joint. 8 bow spring centralizers spaced every 2nd joint off bottom. Two turbolating centralizers at the base of the Ojo Alamo.

4 1/2 Production Liner

Cement with 130 sks 65/35 Class B Poz with 6% gel, 5 PPS gilsonite, and 1/4# flocele/sk. Tail with 300 sks 50/50 poz with 2% gel, 5 PPS gilsonite, .4% halad - 9 and 1/4# flocele/sk (630 cu. ft., 50% excess to circulate liner top). WOC 18 hrs prior to completion.

Cement nose guide shoe on bottom with float collar on top of shoe joint. Liner hanger will have a neopreme packoff on top.

OTHER INFORMATION:

- 1) The Blanco Mesaverde and Basin Dakota will be completed and downhole commingled.
- 2) No abnormal temperatures or pressures are anticipated.
- 3) Anticipated pore pressure for the Mesa Verde is 1100 and the Dakota 1500 psi.
- 4) If lost circulation is encountered, sufficient LCM will be added to the mud system to maintain well control.
- 5) This gas is dedicated.

ENERGEN RESOURCES CORPORATION JICARILLA WEST #9M

790' FNL & 1850' FWL, SECTION 6, T26N, R5W, N.M.P.M.
RIO ARriba COUNTY, NEW MEXICO

