

30-045-24286

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 ☒ *Dual Gaswell-injection well*
 SINGLE ZONE ☐ MULTIPLE ZONE ☒

2. NAME OF OPERATOR
 ENERGY RESERVES GROUP INC

3. ADDRESS OF OPERATOR
 P.O. BOX 3280 CASPER, WYOMING 82602

4. LOCATION OF WELL (Report location clearly and in accordance with any State requirements.*)
 At surface 2,015' FSL - 830' FEL
 At proposed prod. zone NESE

14. DISTANCE IN MILES AND DIRECTION FROM NEAREST TOWN OR POST OFFICE*
 3 1/2 miles SE of Farmington, New Mexico

15. DISTANCE FROM PROPOSED* LOCATION TO NEAREST PROPERTY OR LEASE LINE, FT. (Also to nearest drig. unit line, if any) NA
 16. NO. OF ACRES IN LEASE Unitized

18. DISTANCE FROM PROPOSED LOCATION* TO NEAREST WELL, DRILLING, COMPLETED, OR APPLIED FOR, ON THIS LEASE, FT.
 19. PROPOSED DEPTH 4100'

21. ELEVATIONS (Show whether DF, RT, GR, etc.)
 5,415' GL

5. LEASE DESIGNATION AND SERIAL NO.
 05-080723
 6. IF INDIAN, ALLOTTEE OR TRIBE NAME
 7. UNIT AGREEMENT NAME
 Gallegos Canyon Unit
 8. FARM OR LEASE NAME
 9. WELL NO.
 306
 10. FIELD AND POOL, OR WILDCAT
 W. Kute ex. Fruitland Mesa Verde-Both
 11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA
 NESE Sec 19-T29N-R12W
 12. COUNTY OR PARISH
 San Juan
 13. STATE
 New Mexico

17. NO. OF ACRES ASSIGNED TO THIS WELL
 160

20. ROTARY OR CABLE TOOLS
 Rotary

22. APPROX. DATE WORK WILL START*
 As soon as approval is rec'd

23. PROPOSED CASING AND CEMENTING PROGRAM

SIZE OF HOLE	SIZE OF CASING	WEIGHT PER FOOT	SETTING DEPTH	QUANTITY OF CEMENT
13-3/4"	9-5/8"	36#	250'	Cement to surface
8-3/4"	7"	20# - 23#	4100'	Cmt above Mesa Verde in 1st stage. Cmt from base of P.C. above Fruitland in 2nd stage.

Energy Reserves Group, Inc. proposes to drill the above referenced well with rotary tools from surface to T.D. This well will be a dual completion. The Mesa Verde at 2875' and below is to be used for water disposal, the Fruitland at 1045' is to be used for production. No cores or DST's are planned. Copies of all logs run will be furnished upon completion of the well. It is planned to drill a 13-3/4" hole to 250', set 9-5/8", 36# casing to that depth. An 8-3/4" hole will be drilled to a T.D. of 4100'. 7", 20# and 23# casing will be set to T.D. The 7" casing will be cemented in two stages. The first stage will cement from the bottom to the top of the Mesa Verde.

The second stage will cement from the base of the Pictured Cliffs to the top of the Fruitland.

approval does not include clearance to begin salt water disposal operation

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 Curtis J. Mac Intyre TITLE Production Engineer DATE 3/5/80

(This space for Federal or State office use)

PERMIT NO. APPROVED AS AMENDED

APPROVAL DATE APR 16 1980
OIL CON. COM.
DIST. 3

CONDITIONS OF APPROVAL, IF ANY
APR 1 1980
JAMES F. SIMS
 DISTRICT ENGINEER

*See Instructions On Reverse Side

Hold C-104 for NSL

NMCCO

All distances must be from the outer boundaries of the Section

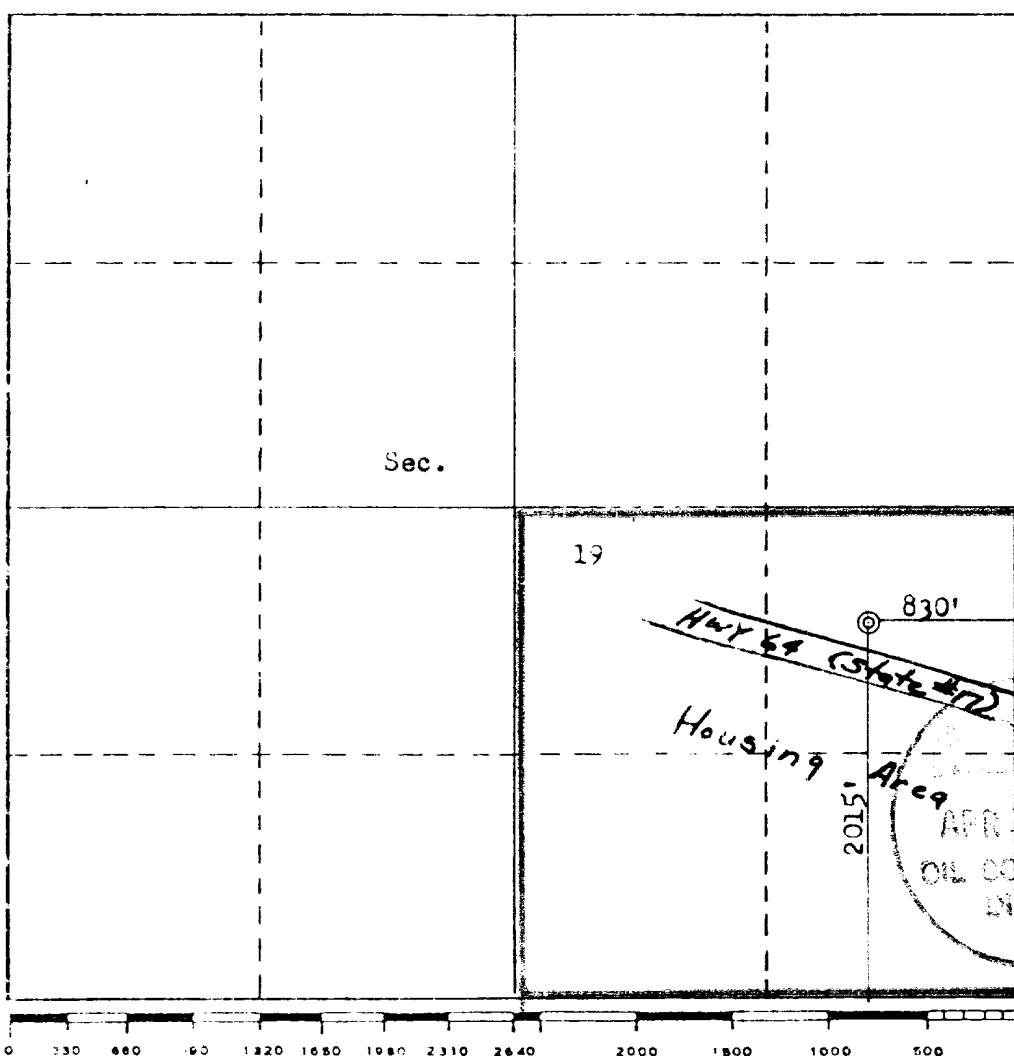
Section		Lease		Well No	
19		GALLEGOS CANYON UNIT		306	
Letter	Section	Township	Range	County	
	19	22N	12W	San Juan	
Well Footage Location of Well					
feet from the		South	line and	330	feet from the East
Unit Depth Elev.	Production Formation		Pool	Dedicated Acreage	
3015	Fruitland (Gas) Mesa Verde		Disposal	160	
				Acres	

- Outline the acreage dedicated to the subject well by colored pencil or hatchure marks on the plat below.
- If more than one lease is dedicated to the well, outline each and identify the ownership thereof (both as to working interest and royalty).
- 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
Curt Mac Intyre
Position
Production Engineer
Company
Energy Reserves Group
Date
March 11, 1980

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
March 11, 1980
Registered Professional Engineer
and/or Land Surveyor
Fred B. Kerr, Jr.
Certification No. *3950*

Supplemental to Form 9-331C

1. The geologic name of the surface formation.

Kirtland

2. The estimated tops of important geologic markers.

Fruitland	1045'
Pictured Cliffs	1315'
Lewis	1585'
Mesa Verde	2875'

3. The estimated depths at which anticipated water, oil, gas, or other mineral-bearing formations are expected to be encountered.

The Fruitland @ 1045' is expected to be gas productive. The Pictured Cliffs @ 1315' is expected to be gas productive. The Mesa Verde @ 2875' is expected to be water productive.

4. The proposed casing program, including the size, grade, and weight-per-foot of each string and whether new or used.

9-5/8"	36#	200'	cement to surface
7"	20# & 23#	4100'	cement from TD to above Mesa Verde in 1st stage. Cement from base of Pictured Cliffs to above Fruitland in 2nd stage.

5. The lessee's or operator's minimum specifications for pressure control equipment which is to be used, a schematic diagram thereof showing sizes, pressure ratings (or API series), and the testing procedures and testing frequency.

Pressure control equipment to consist of a 10" hydraulically operated double ram BOP series 900, 3000#. The BOP will be pressure tested to 800 psi, after installation and prior to drilling out from under surface casing.

6. The type and characteristics of the proposed circulating medium or mediums to be employed for rotary drilling and the quantities and types of mud and weighting material to be maintained.

Well is to be drilled with gel mud plus required additives for hole conditions and formations to be drilled. Normally about 50-100 sx of gel will be on location at one time.

7. The auxiliary equipment to be used, such as (1) kelly cocks, (2) floats at the bit, (3) monitoring equipment on the mud system, (4) a sub on the floor with a full opening valve to be stabbed into drill pipe when the kelly is not in the string.

Kelly cock stop for 3½" drill pipe and a full opening floor valve to stab into the drill pipe.

8. The testing, logging, fracing, and coring programs to be followed with provision made for required flexibility.

No coring or DST's are planned. Logs will include DIL & FDC-CNL-GR from base of surface casing to TD. The Fruitland will be Nitrogen/water foam fraced with approximately 20,000 gal of 70% quality foam & 25,000# 10-20 sand. The Mesa Verde will be acidized with approximately 50 gal 15% HCL acid per foot of perfs.

9. Any anticipated abnormal pressures or temperatures expected to be encountered or potential hazards such as hydrogen sulfide gas, along with plans for mitigating such hazards.

No abnormal pressures or temperatures are anticipated. H2S is not a potential problem in the area.

10. The anticipated starting date and duration of the operations.

It is planned to commence operations as soon as regulatory approval has been received and a rig can be obtained. It is anticipated it will take about 14 days to drill and log this well.

MULTI POINT SURFACE USE PLAN

1. Existing Roads

Go east from Farmington 4 miles, turn north for approximately $\frac{1}{4}$ mile.

2. Planned Access Roads

No new access road will be required. The existing access road to Gallegos Canyon Unit Number 300 will be used.

3. Location of Existing Wells

See attachments

4. Location of Existing and/or Proposed Facilities

- A. (1) None anticipated
- (2) A separator may be required if well produces fluid
- (3) N/A
- (4) If the well is a producer, El Paso Natural Gas Company will install a gathering line under a right of way permit.
- (5) None are installed at the present time.
- (6) None are installed at the present time.
- B. If the well is productive, all facilities will be within the disturbed area. A small pit (20' x 20') may be required if any water is produced. The pit will be fenced with sheep wire to protect livestock and wildlife. Injection facilities will include 2-400 bbl tanks and an injection pump and motor skid mounted within an enclosed building.
- C. If the well is productive, the reserve pit will be fenced and allowed to dry up. As soon as it is dry, it will be filled and the area restored to its original contour. All trash and debris will be removed. If the well is dry, the pit will be fenced and allowed to dry up.
The location and access road will be recontoured and reseeded as per BLM specifications.

5. Location and Type of Water Supply

Water will be hauled by truck, probably from the San Juan River.

6. Sources of Construction Materials

None anticipated.

7. Methods for Handling Waste Disposal

- (1 & 2) All cuttings and drilling fluids will be contained in the reserve pit.
- (3) Produced fluids, if any, will be contained in portable tanks, unless it is good water which will be directed into the pit and allowed to evaporate or soak into the ground.
- (4) A portable toilet will be used during drilling and completing operations.
- (5) All trash will be buried in a small trash pit along side of the reserves pit.
- (6) See item 4C.

8. Ancillary Facilities

None required

9. Well-Site Layout

- (1) see attachment
- (2) see attachment
- (3) see attachment
- (4) It is not planned to line any pits.

10. Plans for Restoration of Surface

Upon completion of the well, the reserv pit will be fenced and allowed to dry. Any accumulation of oil will be skimmed off the pit and trucked to a disposal site.

The disturbed area will be recontoured to its original contour and reseeded as per BLM's recommendations. It is planned to commence rehabilitation as soon as the pit has dried and weather permits.

11. Other Information

- (1) The area is generally rolling hills near the well site. The soil is composed mostly of sand with only sparce vegetation of sage brush, cactus and assorted native grasses. Wildlife consists of rodents and birds.
- (2) The surface is public land and is not presently used for any activity ie grazing, recreation etc.
- (3) The san Juan River is approximately 1-½ miles south of the proposed well.

There is no evidence of any historical archaeological or cultural sites in the area to be disturbed.

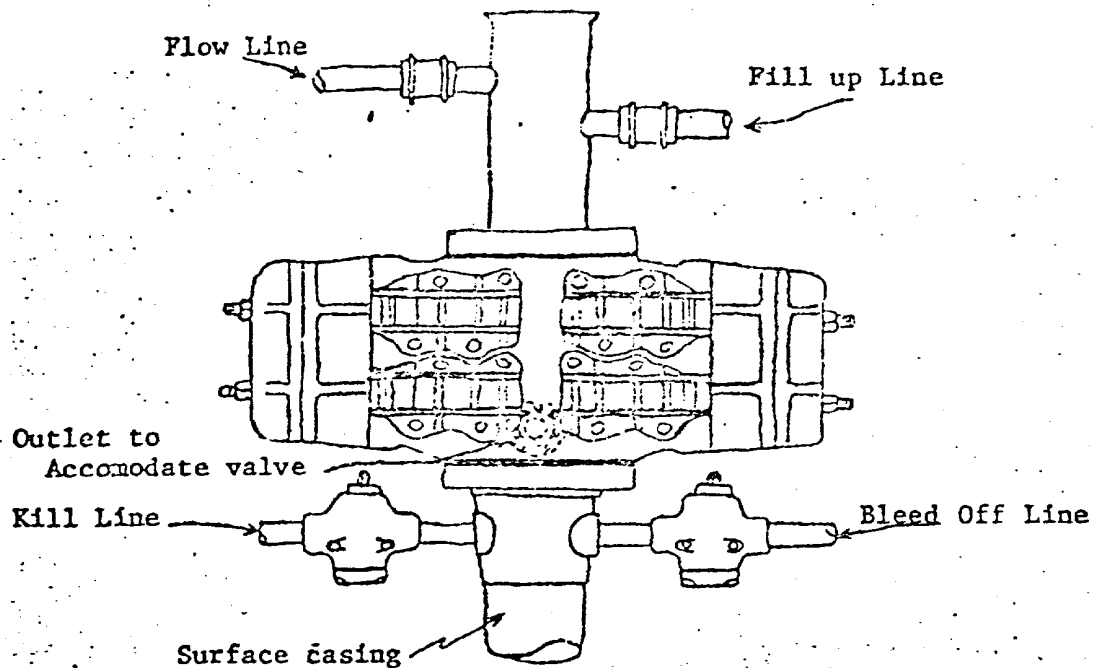
CERTIFICATION

I hereby certify that I, or persons under my direct supervision, have inspected the proposed drillsite 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 _____

Jack Fritz
and its contractors and subcontractors in conformity with this plan and the terms and conditions under which it is approved.

3/5/80
Date

Curtis J. Mac Intyre-Prod. Eng.
Name and Title



Blowout preventer is Shaffer double hydraulic equipped with drill pipe rams in the top and blind rams in the bottom.

Blowout preventer closing unit is Kookey 30 gallon accumulator unit.

When choke manifold is used, it will be installed downstream from bleed off valve.

Kill line or bleed off line may be installed at flanged opening in blowout preventer.

FARMINGTON SOUTH QUADRANGLE
NEW MEXICO—SAN JUAN CO.
7.5 MINUTE SERIES (TOPOGRAPHIC)

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

