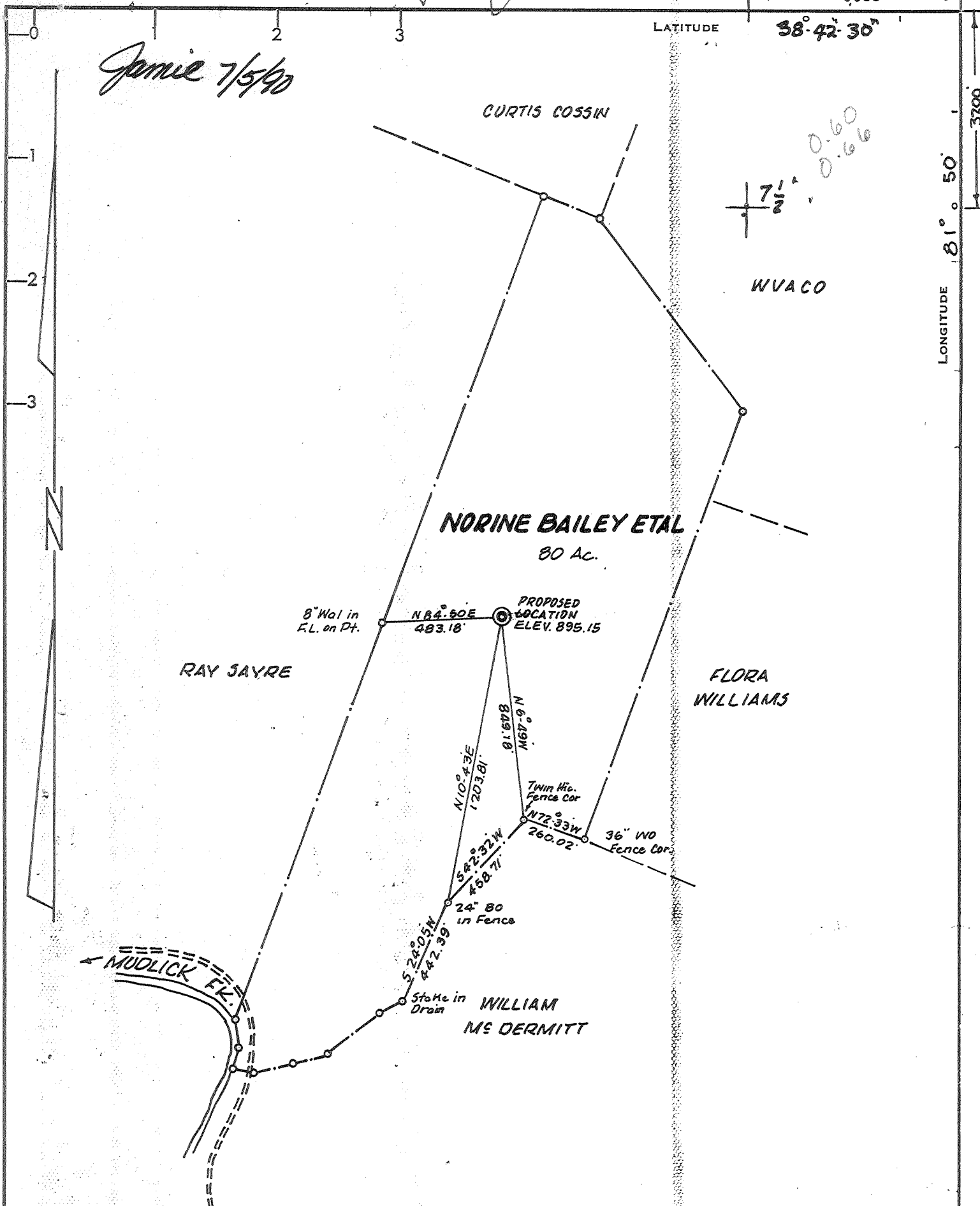


Janie 7/5/90



- Frac - 7/13/90

- NEW LOCATION
- RECONDITION
- DRILL DEEPER
- ABANDONMENT

CERTIFICATE
 "I, the undersigned, hereby certify that this map is correct to the best of my knowledge and belief and shows all the information required by paragraph 6 of the rules and regulations of the oil and gas section of the mining laws of West Virginia."

Minimum degree of accuracy is one part in 200
 Signed Frank D. Barica US# 289

| | | | |
|---------------------------|---|------------|-----------------|
| COMPANY | <u>Beake Energy Inc.</u> | | |
| ADDRESS | <u>P.O. BOX 8 RAVENSWOOD, WEST VIRGINIA 26116</u> | | |
| FARM | <u>NORINE BAILEY ETAL</u> | | |
| MAP | ACRES <u>80</u> | LEASE NO. | |
| WELL (FARM) NO. | <u>1</u> | SERIAL NO. | <u>KEM 29</u> |
| ELEVATION (SPIRIT LEVEL) | <u>895.15</u> | | |
| QUADRANGLE | <u>ELMINOOD 7 1/2</u> | | |
| COUNTY | <u>MASON</u> | DISTRICT | <u>UNION 9</u> |
| POINT OF PROVEN ELEVATION | <u>USGS BM EL. 691</u> | | |
| FILE NO. | DRAWING NO. | | |
| DATE | <u>JAN 29, 1980</u> | SCALE | <u>1" = 500</u> |

| |
|---|
| STATE OF WEST VIRGINIA DEPARTMENT OF MINES OIL AND GAS DIVISION CHARLESTON |
| WELL LOCATION MAP |
| <u>API WAL NO. 47-053-0240 FRAC</u> |
| <u>FORMERLY 47-053-0216</u> |
| + DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS. SCALE 1 TO 62,500. LATITUDE AND LONGITUDE LINES BEING REPRESENTED BY BORDER LINES AS SHOWN. |
| - DENOTES ONE INCH SPACES ON BORDER LINE OF ORIGINAL TRACING. |

*OWWO - Deep well
6-6 Rock Castle (346)*

JUL 16 1990

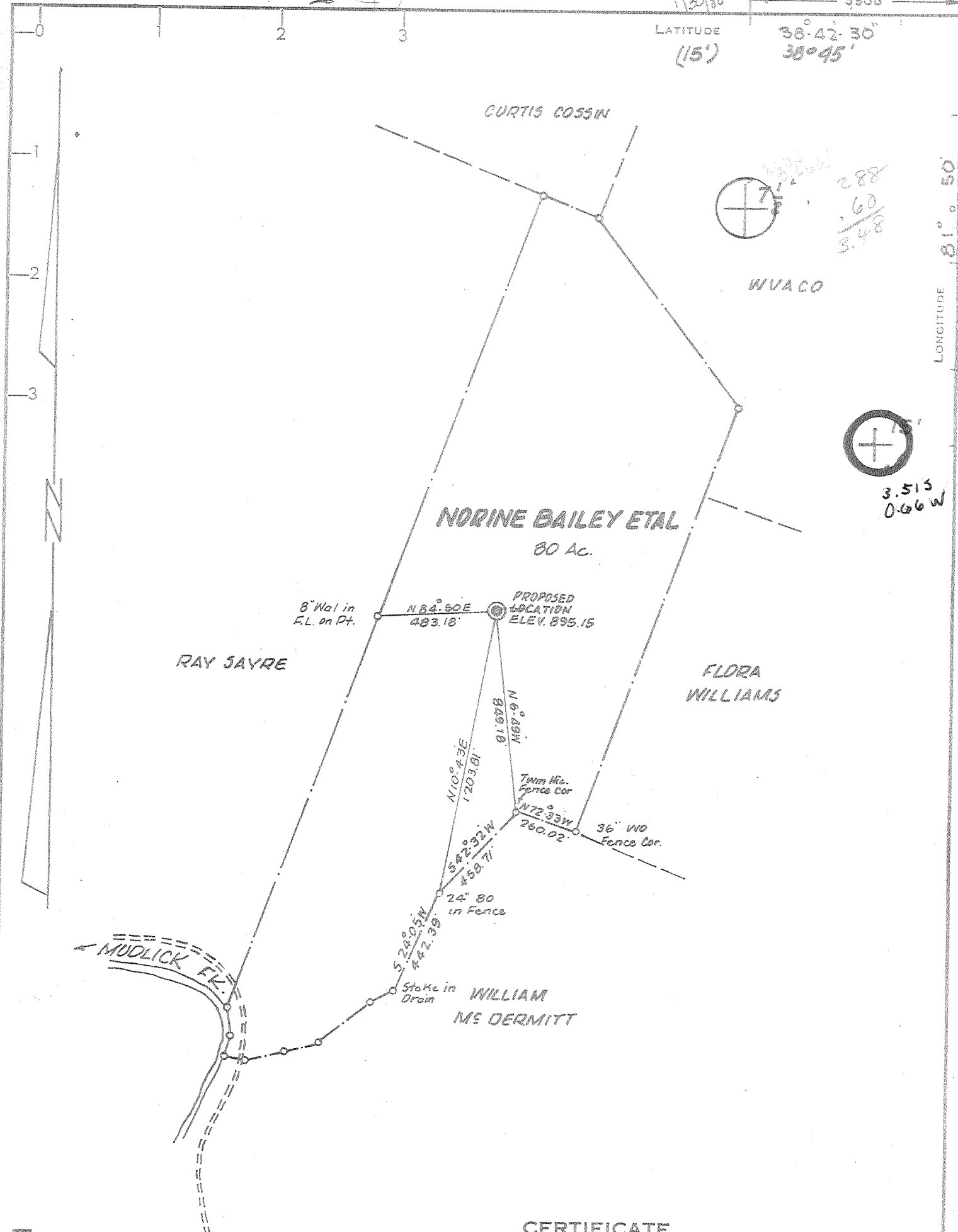
245

1/30/80

3500

LATITUDE
(15')

38° 42' 30"
38° 45'



- NEW LOCATION
- RECONDITION
- DRILL DEEPER
- ABANDONMENT

CERTIFICATE

"I, the undersigned, hereby certify that this map is correct to the best of my knowledge and belief and shows all the information required by paragraph 6 of the rules and regulations of the oil and gas section of the mining laws of West Virginia."

Minimum degree of accuracy is one part in 200

Signed Frank H. Barber LLS #289

COMPANY KAISER EXPLORATION & MINING COMPANY
 ADDRESS P.O. BOX 8 RAVENSWOOD, WEST VIRGINIA
 FARM NORINE BAILEY ETAL
 MAP _____ ACRES 80 LEASE NO. _____
 WELL (FARM) NO. 1 SERIAL NO. KEM 29
 ELEVATION (SPIRIT LEVEL) 895.15
 QUADRANGLE ELMWOOD 7 1/2 WINFIELD 15' NC
 COUNTY MASON DISTRICT UNION
 POINT OF PROVEN ELEVATION USGS BM EL. 691
 FILE NO. _____ DRAWING NO. _____
 DATE JAN 29, 1980 SCALE 1" = 500

STATE OF WEST VIRGINIA
 DEPARTMENT OF MINES
 OIL AND GAS DIVISION
 CHARLESTON
 WELL LOCATION MAP
 FILE NO. 47-053-0240
~~FORMERLY 053-0216~~
— DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS. SCALE 1 TO 62,500. LATITUDE AND LONGITUDE LINES BEING REPRESENTED BY BORDER LINES AS SHOWN.
— DENOTES ONE INCH SPACES ON BORDER LINE OF ORIGINAL TRACING.

Deep Well 6-6 Rock Castle (346)



STATE OF WEST VIRGINIA
DEPARTMENT OF MINES

Oil and Gas Division

WELL RECORD

Rotary Oil _____
 Cable _____ Gas
 Recycling _____ Comb. _____
 Water Flood _____ Storage _____
 Disposal _____ (Kind) _____

Quadrangle Elmwood

Permit No. MAS 240

| Company | Casing and Tubing | Used in Drilling | Left in Well | Cement fill up Cu. ft. (Sks.) |
|---|----------------------|------------------|--------------|-------------------------------|
| Kaiser Exploration and Mining Company | | | | |
| Address P. O. Box 8, Ravenswood, WV, 26164 | | | | |
| Farm <u>Norine Bailey et al</u> Acres <u>80</u> | | | | |
| Location (waters) <u>Mud Lick Ford</u> | | | | |
| Well No. <u>KEM #29</u> Elev. <u>895.15'</u> | Size 20-16 | | | |
| District <u>Union</u> County <u>Mason</u> | Cond. 13-10" 10 3/4' | 255' (KB) | 255' (KB) | 150 sks class (to surface) |
| The surface of tract is owned in fee by <u>Norine Bailey, et al</u> | 9 5/8 | | | 65 sks 50/50 p |
| Address <u>3939 Bickles Rd., Columbus, OH 43220</u> | 8 5/8 | | | 100 sks class (1400' fillup) |
| Mineral rights are owned by <u>Same</u> | 7 | 2676' (KB) | 2676' (KB) | 225 sks 50/50 (2000' fillup) |
| Address <u>Same</u> | 5 1/2 | | | |
| Drilling Commenced <u>10/22/80</u> | 4 1/2 | 4935' (KB) | 4935' (KB) | |
| Drilling Completed <u>10/28/80</u> | 3 | | | |
| Initial open flow <u>45 M</u> cu. ft. == bbls. | 2 | | | |
| Final production <u>700 M</u> cu. ft. per day == bbls. | Liners Used | | | |
| Well open <u>6</u> hrs. before test <u>1800</u> RP. | | | | |

Well treatment details: Attach copy of cementing record.

Perforated Oriskany from 4840' - 4848' (KB). 4 holes/ft. 32 holes; Halliburton and Dowell nitrogen hydrofractured zone w/30,000# 80/100 sand, 30,000# 20/40 sand, 1000 gal 28% HCL acid, 190,000 SCF of nitrogen, and 945 bbl of water; breakdown pressure was 3200 psig; treated zone at 22.5 BPM, 4050 psig pressure; maximum recorded pressure was 4200 psig; instantaneous shut in pressure was 3600 psig; 15 minute shut in pressure was 3200 psig; used 2223 hydraulic horsepower.

Coal was encountered at _____ Feet _____ Inches

Fresh water _____ Feet _____ Salt Water _____ Feet _____

Producing Sand Oriskany Sandstone Depth 4840' - 4848' (K.B.)

| Formation | Color | Hard or Soft | Top Feet | Bottom Feet | Oil, Gas or Water | Remarks |
|----------------|-------|--------------|----------|-------------|-------------------|---------|
| Soil and Shale | | | 0 | 21 | | |
| Sand | | | 21 | 53 | | |
| Siltstone | | | 53 | 132 | | |
| Sand | | | 132 | 173 | | |
| Siltstone | | | 173 | 284 | | |
| Red Rock | | | 284 | 649 | | |
| Sand | | | 649 | 660 | | |
| Shale | | | 660 | 715 | | |
| Sand | | | 715 | 731 | | |
| Red Rock | | | 731 | 1001 | | |
| Shale | | | 1001 | 1022 | | |
| Sand | | | 1022 | 1050 | | |
| Shale | | | 1050 | 1078 | | |
| Sand | | | 1078 | 1092 | | |
| Shale | | | 1092 | 1143 | | |
| Sand | | | 1143 | 1151 | | |
| Shale | | | 1151 | 1166 | | |
| Sand | | | 1166 | 1233 | | |
| Shale | | | 1233 | 1308 | | |
| Sand | | | 1308 | 1456 | | |
| Shale | | | 1456 | 1716 | | |
| Sand | | | 1716 | 1734 | | |
| Shale | | | 1734 | 1752 | | |

| Formation | Color | Hard or Soft | Top Feet | Bottom Feet | Oil, Gas or Water | Remarks |
|-----------------|-------|--------------|----------|-------------|------------------------------|-------------------|
| Sand | | | 1752 | 1765 | | Tops from KB-907. |
| Shale | | | 1765 | 1832 | | |
| Sand | | | 1832 | 1855 | | |
| Shale | | | 1855 | 1892 | | |
| Sand | | | 1892 | 1959 | | |
| Big Lime | | | 1959 | 2052 | | |
| Shale | | | 2052 | 2097 | | |
| Big Injun | | | 2097 | 2144 | | |
| Shale | | | 2144 | 2537 | | |
| Coffee Shale | | | 2537 | 2558 | | |
| Berea Sand | | | 2558 | 2573 | | |
| Shale | | | 2573 | 3744 | Show/Gas 3138', 3208', 3280' | |
| | | | | | 3475', 3715' | |
| Brown Shale | | | 3744 | 4195 | Show/Gas 3753', 3873', 4025' | |
| | | | | | 4185' | |
| Shale | | | 4195 | 4526 | Show/Gas 4425', 4455' | |
| Marcellus Shale | | | 4526 | 4744 | Show/Gas 4550', 4658', 4685' | |
| Onondaga Lime | | | 4744 | 4821 | Show/Gas 4772'-91' | |
| Oriskany Sand | | | 4821 | 4861 | Gas 4847' | |
| Heiderberg Lime | | | 4861 | 4950 | | |
| Total Depth | | | 4950 | | | |

GR log - el 907 KB

- H 3750
- J 4190
- A 4325
- Rh 4529
- On 4745

December 3,

K.A. Pryor, Jr.
 Operation Manager

State of West Virginia
DEPARTMENT OF ENERGY
Division of Oil and Gas

Well Operator's Report of Well Work

Farm name: BAILEY, NORINE Operator Well No.: KEM 29 BAILEY

LOCATION: Elevation: 895.15 Quadrangle: ELMWOOD

District: UNION County: MASON
Latitude: 3200 Feet South of 38 Deg. 42Min. 30 Sec.
Longitude 3500 Feet West of 81 Deg. 50 Min. 0 Sec.

Company: PEAKE ENERGY, INC
P. O. BOX 8
RAVENSWOOD, WV 26164-0000

Agent: JOHN V. McCALLISTER

Inspector: JERRY TEPHABOCK
Permit Issued: 07/12/90

plug-back work Commenced: 08/15/90
plug-back work Completed: 08/16/90
Verbal Plugging
Permission granted on:
~~xxxxxx~~ ~~xxxxxx~~ Service Rig
plug-back Depth (feet) 4400 ft.
Fresh water depths (ft) _____

Salt water depths (ft) _____

Is coal being mined in area (Y/N)? N
Coal Depths (ft): N/A

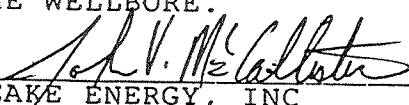
| Casing & Tubing | xxxxxxx EXISTING xxxxxxx | Left in Well | Cement Fill Up Cu. Ft. |
|-----------------|--|--------------|------------------------|
| Size | | | |
| 10-3/4" | 255' | | 150 sx |
| 7" | 2676' | | 165 sx |
| 4-1/2" | 4935' | | 225 sx |
| | | | |
| | | | |

OPEN FLOW DATA

Producing formation Devonian Brown Shale Pay zone depth (ft) 3713-4188
Gas: Initial open flow -- MCF/d Oil: Initial open flow -- Bbl/d
Final open flow 80 MCF/d Final open flow 0 Bbl/d
Time of open flow between initial and final tests 4 Hours
Static rock Pressure 900 psig (surface pressure) after 72 Hours

Second producing formation _____ Pay zone depth (ft) _____
Gas: Initial open flow _____ MCF/d Oil: Initial open flow _____ Bbl/d
Final open flow _____ MCF/d Final open flow _____ Bbl/d
Time of open flow between initial and final tests _____ Hours
Static rock Pressure _____ psig (surface pressure) after _____ Hours

NOTE: ON BACK OF THIS FORM PUT THE FOLLOWING: 1). DETAILS OF PERFORATED INTERVALS, FRACTURING OR STIMULATING, PHYSICAL CHANGE, ETC. 2). THE WELL LOG WHICH IS A SYSTEMATIC DETAILED GEOLOGICAL RECORD OF ALL FORMATIONS, INCLUDING COAL ENCOUNTERED BY THE WELLBORE.


For: PEAKE ENERGY, INC

By: John V. McCallister, Assistant Operations Manager
Date: 8/29/90

SEP 14 1990

DETAILS OF PERFORATED INTERVALS, FRACTURING OR STIMULATING, PHYSICAL CHANGE, ETC.

8/15/90 Young's Wireline set permanent, mechanical plug with cal-seal in 4-1/2" casing at 440 ft. Perforated the Brown Shale interval from 3713 to 4188 ft with 31 holes.

8/16/90 Dowell foam-fractured the Brown Shale using 60,000 lbs of sand, 297 bbl of fluid, and 616,000 SCF of nitrogen. BDP = 2050 psig. ATP = 2300 psig. ISIP = 1250 psig.

WELL LOG

| FORMATION | TOP | BOTTOM | REMARKS |
|--|-----|--------|---------|
| <p>NOTE: Well was originally drilled and completed in the Oriskany Sand by Kaiser Exploration & Mining Co. All casing and formation data remains the same as previously submitted by Kaiser in 1980.</p> | | | |

10865-59001

1) Date: June 6, 1990
2) Operator's well number
KEM #29
3) API Well No: 47 - 053 - 0240 - FRAC
State - County - Permit

STATE OF WEST VIRGINIA
DEPARTMENT OF ENERGY, DIVISION OF OIL AND GAS
NOTICE AND APPLICATION FOR A WELL WORK PERMIT

JUN 27 90
Permitting
Oil and Gas Section

4) Surface Owner(s) to be served:
(a) Name Norine Bailey
Address 3939 Bickles Road
Columbus, OH 43220
(b) Name _____
Address _____
(c) Name _____
Address _____

5) (a) Coal Operator:
Name _____
Address _____
(b) Coal Owner(s) with Declaration
Name _____
Address _____
Name _____
Address _____

6) Inspector Jerry Tephabock
Address Rt. 1, Box 101A
Ripley, WV 25271
Telephone (304)- 372 6805

(c) Coal Lessee with Declaration
Name _____
Address _____

TO THE PERSON(S) NAMED ABOVE TAKE NOTICE THAT:

_____ Included is the lease or leases or other continuing contract or contracts by which I hold the right to extract oil and gas OR
x Included is the information required by Chapter 22B, Article 1, Section 8(d) of the Code of West Virginia (see page 2)

I certify that as required under Chapter 22B of the West Virginia Code I have served copies of this notice and application, a location plat, and accompanying documents pages 1 through _____ on the above named parties, by:
_____ Personal Service (Affidavit attached)
_____ Certified Mail (Postmarked postal receipt attached)
_____ Publication (Notice of Publication attached)

I have read and understand Chapter 22B and 38 CSR 11-18, and I agree to the terms and conditions of any permit issued under this application. I certify under penalty of law that I have personally examined and am familiar with the information submitted on this application form and all attachments, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete.

I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

Well Operator PEAKE ENERGY, INC.
By: [Signature]
Its: Designated Agent
Address P. O. Box 8
Ravenswood, WV 26164
Telephone _____

Subscribed and sworn before me this 10 day of June, 1990

[Signature] Notary Public
My commission expires October 28, 1993



STATE OF WEST VIRGINIA
DEPARTMENT OF MINES

RENEW
RECEIVED
OCT - 9 1980

Oil and Gas Division
OIL AND GAS WELL PERMIT APPLICATION

OIL & GAS DIVISION
DEPT. OF MINES

TO THE DEPARTMENT OF MINES,
Charleston, W. Va.

DATE October 7, 1980

Surface Owner Norine Bailey, et al
Address 3939 Bickles Rd., Columbus, OH 43220
Mineral Owner Same as above
Address _____
Coal Owner Union Carbide Corporation
Address 32 Sanderson Road, Clendenin, WV 25045
Coal Operator Same as above
Address _____

Company Kaiser Exploration and Mining Company
Address P. O. Box 8, Ravenswood, WV 26164
Farm Norine Bailey, et al Acres 80
Location (waters) Mud Lick Fork
Well No. KEM #29 Elevation 895.15
District Union County Mason
Quadrangle Elmwood

THIS PERMIT MUST BE POSTED AT THE WELL SITE

All provisions being in accordance with Chapter 22, of the W. Va. Code, the location is hereby approved for drilling. This permit shall expire if operations have not commenced by 6-10-81.

[Signature]
Deputy Director - Oil & Gas Division

INSPECTOR
TO BE NOTIFIED Kenneth Butcher
ADDRESS RFD #1, Barboursville, WV 25504
PHONE 736-4885

GENTLEMEN:

The undersigned well operator is entitled to drill upon the above named farm or tract of land for oil and gas, having fee title thereto, (or as the case may be) under grant or lease dated August 18 1978 by Norine Bailey, et al made to Kaiser Exploration and Mining Co. and recorded on the 14th day of November 1978, in Mason County, Book 44 Page 107

NEW WELL _____ DRILL DEEPER _____ REDRILL _____ FRACTURE OR STIMULATE
OIL AND GAS WELL ORIGINALLY DRILLED BEFORE JUNE 5, 1969.

The enclosed plat was prepared by a registered engineer or licensed land surveyor and all coal owners and/or operators have been notified as of the above date.

The above named coal owners and/or operator are hereby notified that any objection they wish to make, or are required to make by Section 3 of the Code, must be received by, or filed with the Department of Mines within ten (10) days. *

Copies of this notice and the enclosed plat were mailed by registered mail, or delivered to the above named coal operators or coal owners at their above shown respective address: _____ day _____ before, or on the same day with the mailing or delivery of this copy to the Department of Mines at Charleston, West Virginia.

PLEASE SUBMIT COPIES OF ALL
GEOPHYSICAL LOGS DIRECTLY TO:

WEST VIRGINIA GEOLOGICAL AND
ECONOMIC SURVEY
P. O. BOX 879
MORGANTOWN, WEST VIRGINIA 26505
AC-304 - 292-6331

Very truly yours,
(Sign Name) R. A. Pryce
Well Operator
R. A. Pryce, Operations Manager
Kaiser Exploration and Mining Company
Street:
P. O. Box 8,
City or Town
Ravenswood, West Virginia 26164
State

*SECTION 3 If no objections are filed with the Department of Mines within ten (10) days after the date of mailing of this notice, the well operator is authorized to

BLANKET BOND

47-053-0240
FORMERLY MAS 216

[Signature]

THIS IS AN ESTIMATE ONLY
ACTUAL INFORMATION WILL BE SUBMITTED ON OG-10 UPON COMPLETION

PROPOSED WORK ORDER TO X DRILL _____ DEEPEN _____ FRACTURE-STIMULATE _____
 DRILLING CONTRACTOR: (If Known) _____ RESPONSIBLE AGENT: _____
 NAME Not known at the present time NAME Robert A. Pryce
 ADDRESS _____ ADDRESS P. O. Box 8, Ravenswood, WV 26164
 TELEPHONE _____ TELEPHONE 273-5371
 ESTIMATED DEPTH OF COMPLETED WELL: 4990' ROTARY X CABLE TOOLS _____
 PROPOSED GEOLOGICAL FORMATION: Oriskany
 TYPE OF WELL: OIL _____ GAS X COMB. _____ STORAGE _____ DISPOSAL _____
 RECYCLING _____ WATER FLOOD _____ OTHER _____

TENTATIVE CASING PROGRAM:

| CASING AND TUBING SIZE | USED FOR DRILLING | LEFT IN WELL | CEMENT FILL UP OR SACKS - CUBIC FT. |
|------------------------|-------------------|--------------|-------------------------------------|
| 20 - 16 | | | |
| 13 - 10 | | | |
| 9 - 5/8 10 3/4" | 250 | 250 | Cement to surface |
| 8 - 5/8 | | | |
| 7 | 2650 | 2650 | 125 sks = 570 feet |
| 5 1/2 | | | |
| 4 1/2 | 4990 | 4990 | 125 sks - 1500 feet |
| 3 | | | Perf. Top |
| 2 | | | Perf. Bottom |
| Liners | | | Perf. Top |
| | | | Perf. Bottom |

APPROXIMATE FRESH WATER DEPTHS _____ FEET SALT WATER _____ FEET

APPROXIMATE COAL DEPTHS _____

IS COAL BEING MINED IN THE AREA? Not at this time BY WHOM? _____

TO DRILL:

SUBMIT FIVE (5) COPIES OF OG - 1, \$100.00 PERMIT FEE, PERFORMANCE BOND AND PERMANENT COPY OF PLAT.

TO DRILL DEEPER OR REDRILL:

SUBMIT FIVE (5) COPIES OF OG - 1, SHOWING ORIGINAL PERMIT NUMBER AND PERFORMANCE BOND. ON WELLS DRILLED PRIOR TO 1929, A PERMANENT COPY OF THE PLAT AND THE ORIGINAL WELL RECORD MUST ALSO BE SUBMITTED.

TO FRACTURE - STIMULATE:

OIL AND/OR GAS WELL ORIGINALLY DRILLED BEFORE JUNE 5, 1929, FIVE (5) COPIES OG - 1, PERFORMANCE BOND, PERMANENT PLAT AND ORIGINAL WELL RECORD.

OIL AND/OR GAS WELL ORIGINALLY DRILLED ON AND/OR AFTER JUNE 5, 1929, FIVE COPIES OG - 1, SHOWING ORIGINAL PERMIT NUMBER, AND PERFORMANCE BOND.

Required forms must be filed within ninety (90) days of completion for bond release. Inspector to be notified twenty-four (24) hours in advance.

The following waiver must be completed by the coal operator if the permit is to be issued within ten days of receipt thereof.

WAIVER: I the undersigned, Agent for _____ Coal Company, Owner or Operator of the coal under this lease have examined and place on our mine maps this proposed well location.

We the _____ Coal Company have no objections to said well being drilled at this location, providing operator has complied with all rules and regulations in Articles 4, 5, and 7, Chapter 22 of the West Virginia Code.

For Coal Company

Official Title