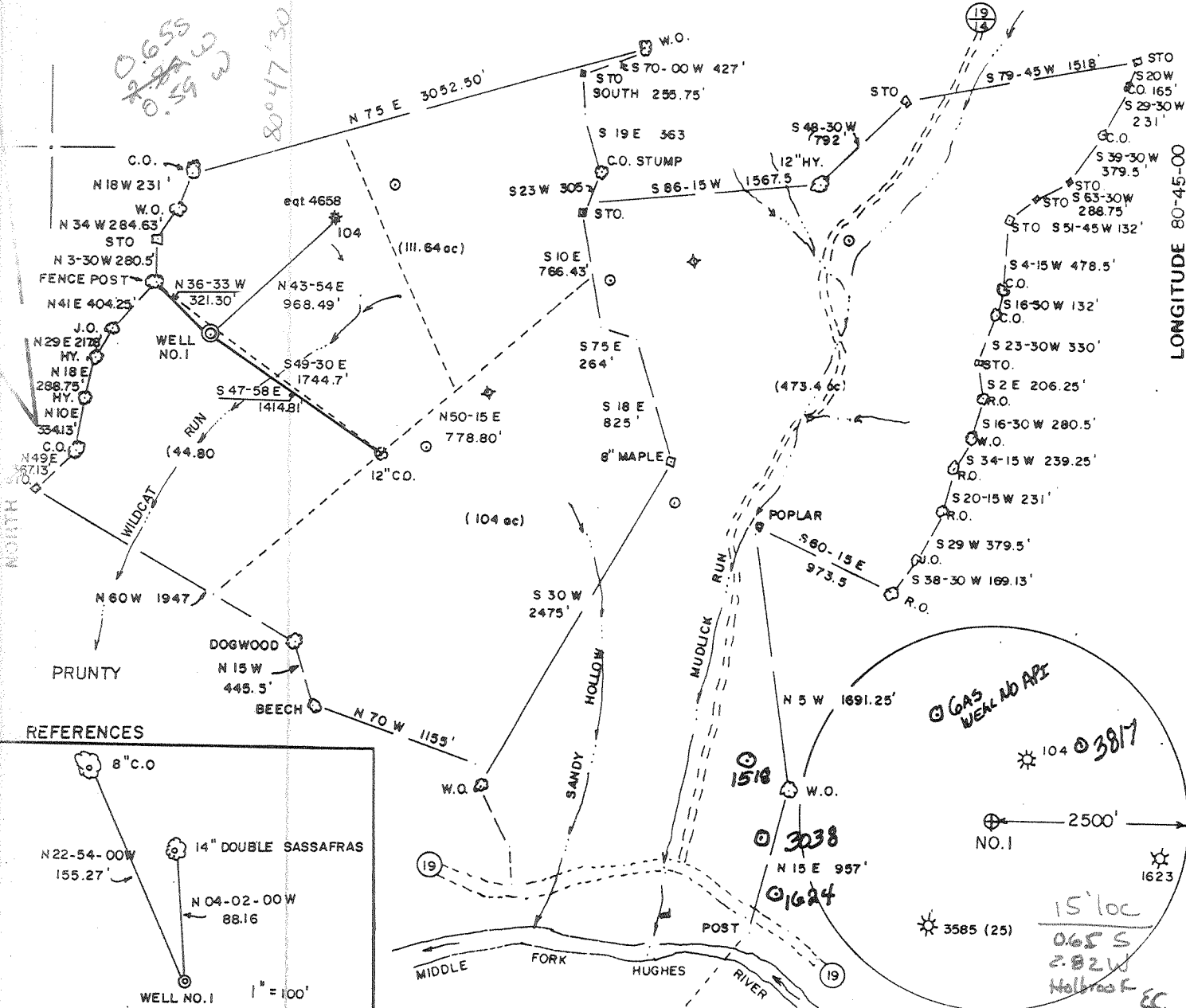


14,925'

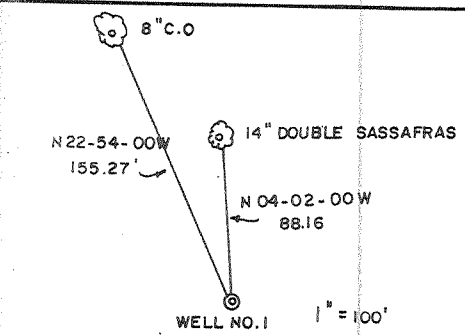
LATITUDE 39-10-00

# Jamie 5/4/90 MERT / F. MAXWELL No.1

LONGITUDE 80-45-00



### REFERENCES



FILE NO. \_\_\_\_\_  
 DRAWING NO. \_\_\_\_\_  
 SCALE 1" = 1000'  
 MINIMUM DEGREE OF ACCURACY 1/200  
 PROVEN SOURCE OF ELEVATION TOP OF KNOB  
 ELEV. 1313'

I THE UNDERSIGNED, HEREBY CERTIFY THAT THIS PLAT IS CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF AND SHOWS ALL THE INFORMATION REQUIRED BY LAW AND THE REGULATIONS ISSUED AND PRESCRIBED BY THE DEPARTMENT OF MINES.  
 (SIGNED) Robert L. Davis  
 R.P.E. \_\_\_\_\_ L.L.S. 800

PLACE SEAL HERE

(H) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS  
 FORM IV-6 (8-78)



STATE OF WEST VIRGINIA  
 DEPARTMENT OF MINES  
 OIL AND GAS DIVISION

DATE MARCH 14th 19 90  
 OPERATOR'S WELL NO. 1 (ONE)  
 API WELL NO. WVD00001501  
47 - 017 - 3816  
 STATE COUNTY PERMIT

WELL TYPE: OIL \_\_\_ GAS X LIQUID INJECTION \_\_\_ WASTE DISPOSAL \_\_\_  
 (IF "GAS,") PRODUCTION X STORAGE \_\_\_ DEEP \_\_\_ SHALLOW X  
 LOCATION: ELEVATION 1065' WATER SHED MIDDLE FORK HUGHES RIVER  
 DISTRICT SOUTHWEST 7 COUNTY DODDRIDGE  
 QUADRANGLE OXFORD 7.5  
 SURFACE OWNER JAMES P. GREATHOUSE ACREAGE 44.80  
 OIL & GAS ROYALTY OWNER F. MAXWELL Hrs. LEASE ACREAGE 252  
 LEASE NO. WV01974-+

PROPOSED WORK: DRILL X CONVERT \_\_\_ DRILL DEEPER \_\_\_ REDRILL \_\_\_ FRACTURE OR STIMULATE X PLUG OFF OLD FORMATION \_\_\_ PERFORATE NEW FORMATION \_\_\_ OTHER PHYSICAL CHANGE IN WELL (SPECIFY) \_\_\_\_\_

PLUG AND ABANDON \_\_\_ CLEAN OUT AND REPLUG \_\_\_  
 TARGET FORMATION ALEXANDER ESTIMATED DEPTH 5225'  
 WELL OPERATOR EASTERN AMERICAN ENERGY DESIGNATED AGENT JOHN M. PALETTI  
 ADDRESS BOX N 259 ADDRESS 501, 56th STREET  
GLENVILLE, WV 26351 CHARLESTON, WV 25304

MAY 11 1990

6-6 Straight Fork-Bluestone Creek (13)

OCT 19 90

Permitting  
Oil and Gas Section

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

Well Operator's Report of Well Work

Farm name: GREATHOUSE, JAMES P. Operator Well No.: MERT/MAXWELL 1, F.

LOCATION: Elevation: 1065.00 Quadrangle: OXFORD

District: SOUTHWEST County: DODDRIDGE  
Latitude: 3450 Feet South of 39 Deg. 10Min. 0 Sec.  
Longitude 14925 Feet West of 80 Deg. 45 Min. 0 Sec.

Company: EASTERN AMERICAN ENERGY C  
P. O. BOX N  
GLENVILLE, WV 26351-0000

Agent: DONALD C. SUPCOE

Inspector: MIKE UNDERWOOD  
Permit Issued: 05/08/90  
Well work Commenced: 09/01/90  
Well work Completed: 09/20/90  
Verbal Plugging  
Permission granted on:  
Rotary X Cable Rig  
Total Depth (feet) 5235'  
Fresh water depths (ft) 142'

Salt water depths (ft) None

Is coal being mined in area (Y/N)? N  
Coal Depths (ft): None

Casing & Tubing Size	Used in Drilling	Left in Well	Cement Fill Up Cu. Ft.
11-3/4"	275'	275'	C.T.S.
8-5/8"	1280.25'	1280.25'	C.T.S.
4-1/2"	5155.85'	5155.85'	839
1-1/2"	---	4980.0'	---

OPEN FLOW DATA

Riley (Commingled)

Producing formation Alexander, Benson/3rd Riley, Pay zone depth (ft) 5057.5-4332  
Gas: Initial open flow 492 MCF/d Oil: Initial open flow N/A Bbl/d  
Final open flow 311 MCF/d Final open flow N/A Bbl/d  
Time of open flow between initial and final tests 15 Hours  
Static rock Pressure 810 psig (surface pressure) after 24 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: Rich Heffelfinger  
EASTERN AMERICAN ENERGY CORP.  
Rich Heffelfinger  
By: Vice President - Regional Operations  
Date: October 3, 1990

OCT 30 1990

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

3-STAGE FOAM FRAC:

- Stage 1: Alexander - 14 holes (5057.5'-5021.5') Breakdown 1760 psi, 65 Quality foam, 20 lbs/1000 gals Gel, 70,000 lbs 20/40 sand, 500 gals 15% HCl, 556,400 scf of N<sub>2</sub>
- Stage 2: Benson/3rd Riley - 11 holes (4712'-4664') Breakdown 2000 psi, 65 Quality foam, 20 lbs/1000 gals Gel, 5,000 lbs 80/100 sand, 60,000 lbs 20/40 sand, 500 gals 15% HCl, 750,000 scf of N<sub>2</sub>
- Stage 3: Riley - 13 holes (4345.5'-4332') Breakdown 3780 psi, 65 Quality foam, 20 lbs/1000 gals Gel, 5,000 lbs 80/100 sand, 21,000 lbs 20/40 sand, 500 gals 15% HCl, 450,000 scf of N<sub>2</sub>

WELL LOG

FORMATION	COLOR	HARD OR SOFT	TOP FEET	BOTTOM FEET	REMARKS
					Including indication of all fresh and salt water, coal, oil and gas
Ground Level			0	10	Hole Damp @ 142'
Red Rock & Fill			10	27	
Red Rock and Sand			27	51	
Red Rock and Shale			51	113	<u>GAS CHECKS:</u>
Sand, Shale and Red Rock			113	142	2896' - No show
Sand and Shale			142	240	3116' - 6/10 thru 2" w/water
Sand			240	245	3175' - Mist
Sand, Shale and Red Rock			245	1736	3366' - 4/10 thru 2" w/water
Big Lime			1736	1817	3804' - 4/10 thru 2" w/water
Sand and Shale			1817	1822	*4427' - 4/10 thru 2" w/water
Big Injun			1822	1865	4610' - 4/10 thru 2" w/water
Sand and Shale			1865	2005	T.D. - 2/10 thru 2" w/water
Weir			2005	2175	D.C. - 2/10 thru 2" w/water
Sand and Shale			2175	4691	
Benson			4691	4696	
Shale and Sand			4696	5235 T.D.	*4212' - 4/10 thru 2" w/water

2/1/01

17-017-3816  
Issued 5/8/90

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

Expires 5/8/92

- 1) Well Operator: Eastern American Energy Corporation <sup>252</sup> 14980 (7) 525
- 2) Operator's Well Number: Mert/F. Maxwell #1 - WVDOD001501 3) Elevation: 1105'
- 4) Well type: (a) Oil   / or Gas XX/  
(b) If Gas: Production XX/ Underground Storage   /  
Deep   / Shallow XX
- 5) Proposed Target Formation(s): Alexander <sup>420</sup>
- 6) Proposed Total Depth: 5225 feet
- 7) Approximate fresh water strata depths: 84', 205', 785' <sup>9.50'</sup>
- 8) Approximate salt water depths: None <sup>@ 1065'</sup>
- 9) Approximate coal seam depths: 865' <sup>809'-813' coal blossom</sup>
- 10) Does land contain coal seams tributary to active mine? Yes   / No XX/
- 11) Proposed Well Work: Drill and complete new well.
- 12)

WATER TEST  
WATER WELL 40'

CASING AND TUBING PROGRAM

TYPE	SPECIFICATIONS			FOOTAGE INTERVALS		CEMENT
	Size	Grade	Weight per ft.	For drilling	Left in well	
Conductor	11 "	F-25	37.5	250'	250'	
Fresh Water	8-5/8"	J-55	20.0	1255'	1255'	C.T.S. 38CSR18-11.3
Coal						38CSR18-11.2.2
Intermediate						
Production	4-1/2"	J-55	10.5	5140'	5140'	38CSR18-11.1
Tubing	1-1/2"	H-40	2.75			
Liners						

RECEIVED  
APR 06 1990

PACKERS : Kind     
Sizes     
Depths set   

For Division of Oil and Gas Use Only DEPARTMENT OF ENERGY

Fee(s) paid:    Well Work Permit    Reclamation Fund    WPCP  
Plat    WW-9    WW-2B    Bond Blanket Agent     
(Type)

**RECEIVED**  
APR 06 1990

DIVISION OF OIL & GAS  
DEPARTMENT OF ENERGY

Date: March 27, 1990  
Operator's well number  
Mert/F. Maxwell #1 - WVDOD001501  
API Well No: 47 - 017 - 3816  
State - County - Permit

STATE OF WEST VIRGINIA  
DEPARTMENT OF ENERGY, DIVISION OF OIL AND GAS

NOTICE AND APPLICATION FOR A WELL WORK PERMIT

- |   |   |
|---|---|
| <p>4) Surface Owner(s) to be served:</p> <p>(a) Name <u>James P. Greathouse</u><br/>Address <u>Rt. 1, Box 108</u><br/><u>New Milton, WV 26411</u></p> <p>(b) Name _____<br/>Address _____</p> <p>(c) Name _____<br/>Address _____</p> | <p>5) (a) Coal Operator:</p> <p>Name <u>None</u><br/>Address _____</p> <p>(b) Coal Owner(s) with Declaration<br/>Name _____<br/>Address _____</p> <p>Name _____<br/>Address _____</p> |
| <p>6) Inspector <u>Mike Underwood</u><br/>Address <u>Rt. 2, Box 135</u><br/><u>Salem, WV 26426</u><br/>Telephone (304)-<u>782-1043</u></p>  | <p>(c) Coal Lessee with Declaration<br/>Name _____<br/>Address _____</p>  |

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  
XX 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 8 on the above named parties, by:  
\_\_\_\_\_ Personal Service (Affidavit attached)  
XX 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 Eastern American Energy Corporation  
By: John M. Paletti *John M. Paletti*  
Its: Designated Agent  
Address P.O. Box N  
Glenville, WV 26351  
Telephone (304) 462-5781

Subscribed and sworn before me this 27th day of March, 1990

Jo Lorraine Rowe Notary Public  
My commission expires July 2, 1996