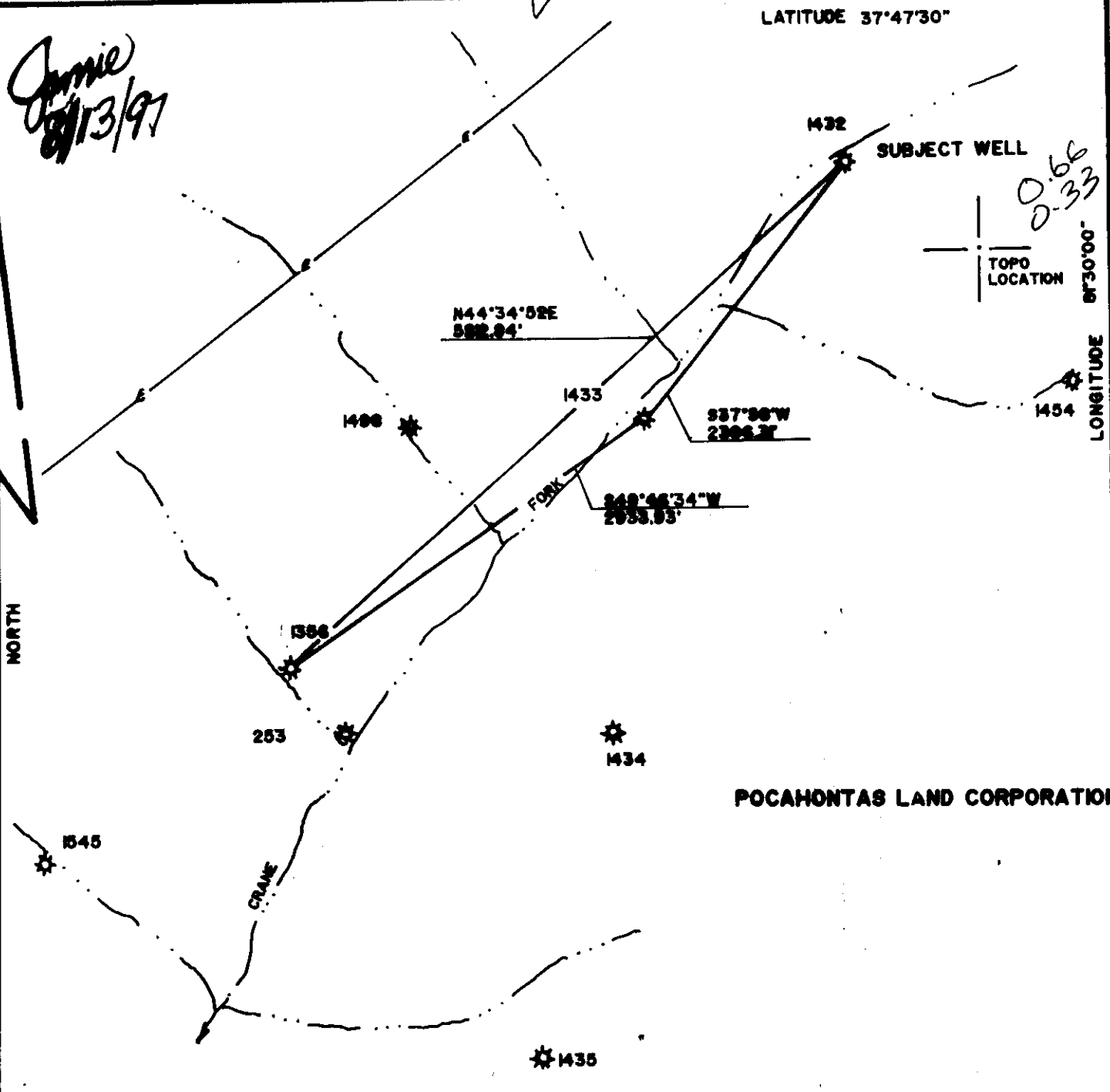


LATITUDE 37°47'30"

Janie
8/13/97



POCAHONTAS LAND CORPORATION

FILE NO. _____

DRAWING NO. _____

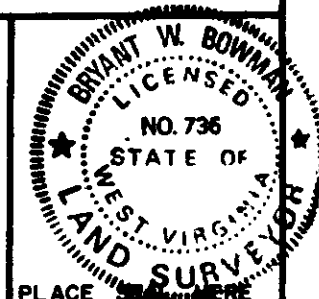
SCALE $\bar{1}=\bar{1000}'$

MINIMUM DEGREE OF ACCURACY $\bar{1}=\bar{2000}$

PROVEN SOURCE OF ELEVATION COPPER PLUG IN ROCK ELEVATION 2789

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) *Bryant W. Bowman*
R. P. E. _____ L. L. S. 736



WEST VIRGINIA
DIVISION OF ENVIRONMENTAL PROTECTION
OFFICE OF OIL AND GAS
#10 McJUNKIN ROAD
NITRO, WEST VIRGINIA 25143-2506



DATE MAY 24, 19 97

OPERATOR'S WELL NO. LC-7

API WELL NO.

47-109-01432.7

STATE COUNTY PERMIT

WELL TYPE: OIL ___ GAS X LIQUID INJECTION ___ WASTE DISPOSAL ___
(IF "GAS", PRODUCTION X STORAGE ___ DEEP ___ SHALLOW ___)

LOCATION: ELEVATION 2378 WATER SHED CRANE FORK OF CLEAR FORK

DISTRICT OCEANA COUNTY WYOMING

QUADRANGLE PILOT KNOB, WV 7.5'

SURFACE OWNER POCAHONTAS LAND CORPORATION ACREAGE 23088

OIL & GAS ROYALTY OWNER POCAHONTAS LAND CORPORATION LEASE ACREAGE 34886

LEASE NO. _____

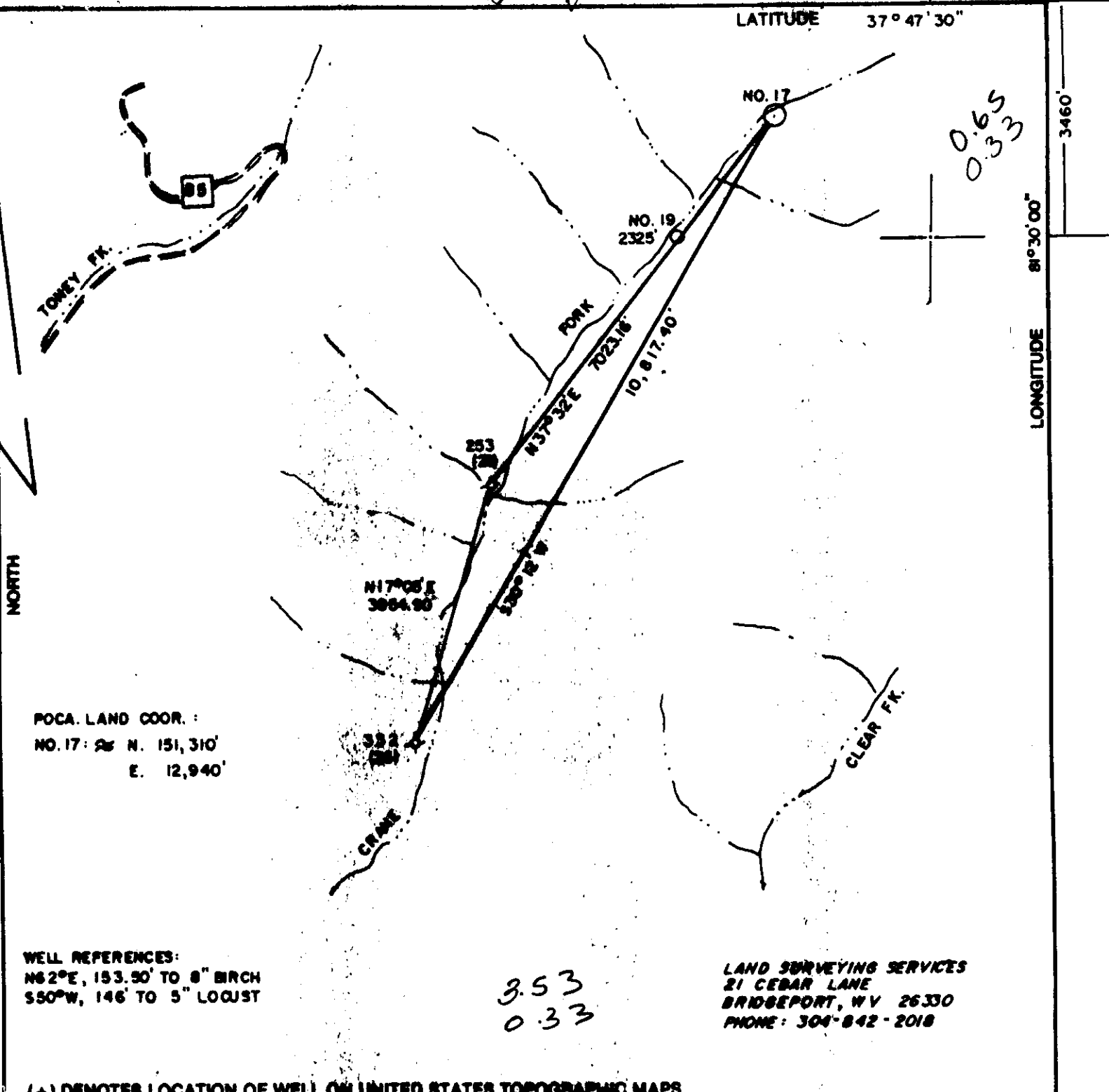
PROPOSED WORK: DRILL ___ CONVERT ___ DRILL DEEPER ___ REDRILL ___ FRACTURE 105 1997
STIMULATE ___ PLUG OFF OLD FORMATION ___ PERFORATE NEW FORMATION ___ OTHER PHYSICAL CHANGE IN WELL (SPECIFY) _____

PLUG AND ABANDON ___ CLEAN OUT AND REPLUG ___ *Expanding well drilled in 1994 to 4500' production from top of Gordon*
5/15/95 for Raven Cliff

TARGET FORMATION _____ ESTIMATED DEPTH _____

WELL OPERATOR PENN VIRGINIA OIL & GAS CORP DESIGNATED AGENT DANA BLACKSHRE *Compld.*

ADDRESS 999 EXECUTIVE PARK BLVD., SUITE 300 ADDRESS PO BOX 460
KINGSPORT, TN 37660 RAVENCLIFF, WV 25913



POCA. LAND COOR. :
 NO. 17: N. 151, 310'
 E. 12,940'

WELL REFERENCES:
 N62°E, 153.50' TO 8" BIRCH
 S50°W, 146' TO 5" LOCUST

LAND SURVEYING SERVICES
 21 CEDAR LANE
 BRIDGEPORT, WV 26330
 PHONE: 304-842-2018

3.53
 0.33

(+) DENOTES LOCATION OF WELL ON UNITED STATES TOPOGRAPHIC MAPS

FILE NO. _____ DRAWING NO. _____ SCALE <u>1" = 2000'</u> MINIMUM DEGREE OF ACCURACY <u>1 in 2500</u> PROVEN SOURCE OF ELEVATION <u>EXIST. WELL 332-P</u> ELEV. <u>1724'</u>	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 ENERGY. (SIGNED) _____ R.P.E. _____ L.L.S. <u>674</u> <u>STEPHEN D. LOSH</u>	PLACE SEAL HERE
--	---	-----------------

STATE OF WEST VIRGINIA DEPARTMENT OF ENERGY OIL AND GAS DIVISION 	DATE <u>APRIL 22</u> , 19 <u>94</u> OPERATOR'S WELL NO. <u>LOUP CK. NO. 17</u> API WELL NO. <u>47-109-1432</u> STATE COUNTY PERMIT <u>47</u> <u>109</u> <u>1432</u>
WELL TYPE: OIL <input type="checkbox"/> GAS <input checked="" type="checkbox"/> LIQUID INJECTION <input type="checkbox"/> WASTE DISPOSAL <input type="checkbox"/> (IF "GAS,") PRODUCTION <input checked="" type="checkbox"/> STORAGE <input type="checkbox"/> DEEP <input type="checkbox"/> SHALLOW <input checked="" type="checkbox"/>	
LOCATION: ELEVATION <u>2382'</u> WATERSHED <u>CRANE FORK</u> DISTRICT <u>OCEANA</u> COUNTY <u>WYOMING</u> QUADRANGLE <u>PILOT KNOB 7.5 min. Hard Knob S4</u>	
SURFACE OWNER <u>POCAHONTAS LAND CORP.</u> ACREAGE <u>23058.53</u> OIL & GAS ROYALTY OWNER <u>LOUP CK. COLLIERY CO.</u> LEASE ACREAGE <u>34588.60</u> LEASE NO. _____	
PROPOSED WORK: DRILL <input checked="" type="checkbox"/> CONVERT <input type="checkbox"/> DRILL DEEPER <input type="checkbox"/> REDRILL <input type="checkbox"/> FRACTURE OR STIMULATE <input type="checkbox"/> PLUG OFF OLD FORMATION <input type="checkbox"/> PERFORATE NEW FORMATION <input type="checkbox"/> OTHER PHYSICAL CHANGE IN WELL (SPECIFY) <u>6-6 248</u>	
PLUG AND ABANDON <input type="checkbox"/> CLEAN OUT AND REPLUG <input type="checkbox"/> TARGET FORMATION <u>BEREA/Gordon</u> ESTIMATED DEPTH <u>4550'</u> WELL OPERATOR <u>UMC PETROLEUM CORR</u> DESIGNATED AGENT <u>GREG SHOCKLEY</u> ADDRESS <u>P.O. DRAWER 1738</u> ADDRESS <u>P.O. DRAWER 1738</u> <u>CLARKSBURG, WV 26302-1738</u> <u>CLARKSBURG, WV 26302-1738</u>	

JUN 3 1994

COUNTY NAME PERMIT

WR-35

06-Aug-97
API # 47-109-01432 F

State of West Virginia
Division of Environmental Protection
Section of Oil and Gas

Reviewed: [Signature]

Well Operator's Report of Well Work

Farm name: POCAHONTAS LAND CORP. Operator Well No.: LC-17

LOCATION: Elevation: 2,378.00 Quadrangle: PILOT KNOB

District: OCEANA County: WYOMING
Latitude: 3460 Feet South of 37 Deg. 47Min. 30 Sec.
Longitude 1790 Feet West of 81 Deg. 30 Min. 0 Sec.

Company: PENN VIRGINIA OIL AND GAS
999 EXEC. PARK BLVD., STE. 300
KINGSPORT, TN 37660-0000

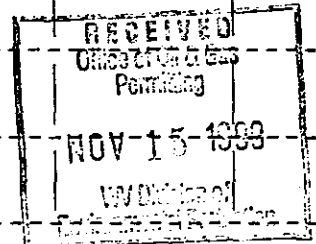
Agent: HARRY JEWELL, III

Inspector: OFIE HELMICK
Permit Issued: 08/13/97
Well work Commenced: 06/08/99
Well work Completed: 07/09/99
Verbal Plugging
Permission granted on: _____
Rotary Cable Rig
Total Depth (feet) _____
Fresh water depths (ft) NA

Salt water depths (ft) NA

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

Casing & Tubing Size	Used in Drilling	Left in Well	Cement Fill Up Cu. Ft.
	RECOMPLETION	RECOMPLETION	



OPEN FLOW DATA

Producing formation Ravencliff Pay zone depth (ft) _____
 Gas: Initial open flow _____ MCF/d Oil: Initial open flow _____ Bbl/d
 Final open flow 169 MCF/d Final open flow _____ Bbl/d
 Time of open flow between initial and final tests 4 Hours
 Static rock Pressure 410 psig (surface pressure) after 12 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: PENN VIRGINIA OIL AND GAS CORPORATION

By: [Signature]
Date: 11/10/99

WYO 1432 F

NOV 23 1999

FORM WR-35R
(REVERSE)

PERMIT #: 47-109-01432F
WELL #: LC-17

DETAILS OF PERFORATIONS, FRACTURING, OR PHYSICAL CHANGE, ETC.

Stage 1

Perforated 4 ½" cgs @ 2390' with 4 shots/ft, Set CIBP @ 2450' squeeze with 5 bbl cw-100 and 45 bbl water, followed by 75 sks Class A neat cement. Displaced cement with 37 bbl F.W.

Ravencliff

Perforated from 2410' to 2422' with 25 holes. Breakdown 250 gallons 15% HCL acid and N2. Treated with 170 bbls of gelled water. 46000 lbs 20/40 sand and 375000 SCF N2.

ATR: 25 BMP ATP: 3000 psi ISIP: 2600 psi

CIBP still in hole @ 2450'. Currently evaluating Ravencliff production prior to drilling out CIBP.

OCT 31 1994

State of West Virginia
 Division of Environmental Protection
 Section of Oil and Gas

Permitting
 Office of Oil & Gas Well Operator's Report of Well Work

Farm Name: POCAHONTAS LAND CORP. Operator Well No. LOUP CREEK # 17

LOCATION: Elevation: 2,382.00 Quadrangle: PILOT KNOB

District: Oceana County: Wyoming
 Latitude: 3460 Feet South of 37 Deg. 47 Min. 30 Sec.
 Longitude 1790 Feet West of 81 Deg. 30 Min. 0 Sec.

Company: UMC PETROLEUM CORPORATION
 P.O. DRAWER 1738
 CLARKSBURG, WV 26301-1738

Casing & Tubing Size	Used in Drilling	Left in Well	Cement Fill up Cu. Ft.
16"	30'	30'	
11 3/4"	560'	560'	369
8 5/8"	1798'	1798'	551
4 1/2"		4382'	546

Agent: GREGORY A. SHOCKLEY

Inspector: OFIE A. HELMICK
 Permit Issued: 06/01/94
 Well work Commenced: 09/29/94
 Well Work Completed: 10/09/94
 Verbal Plugging

Permission granted on: _____
 Rotary X Cable _____ Rig
 Total Depth (feet) 4520'
 Fresh Water depths (ft) 1085'
 Salt water depths (ft) None
 Is coal being mined in area (Y/N)? N
 Coal Depths (ft): 160'-165', 221'-225', 251'-256', 520-523', 617'-622', 647'-651', 696-698'

OPEN FLOW DATA

Producing formations Big Lime } * 3282' - 3315'
Gordon } Pay zone depth (ft) 4300' - 4312'
 Gas: Initial open flow _____ MCF/d Oil: Initial open flow _____ Bbl/d
 Final open flow * 190 MCF/d Final open flow _____ Bbl/d
 Time of open flow between initial and final tests _____ Hours
 Static rock Pressure * 510 psig (surface pressure) after 24 Hours
 * Co-mingled

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: UMC Petroleum Corporation

By: Gregory A. Shockley / DISTRICT MANAGER

Date: 10/19/94

OCT 20 1994

Perforated Gordon at 4300' - 4312' with 16 shots. Broke down with 500 gals. 15% HCL. Fraced with 75 quality foam and 50,000# 20/40 sand. Break = 2130#, AIR = 30 BPM foam, ATP = 2000#, ISIP = 1520#.

Perforated Big Lime at 3282' - 3315' with 13 shots. Broke down with 500 gals. 18% HCL and acidized with 8,500 gals. 18% HCL with 400 Scf N₂/Bbl. Break = 2700#, AIR = 10 BPM, ATP = 2600#, ISIP = 1560#.

<u>Formation</u>	<u>Color</u>	<u>Hard or Soft</u>	<u>Top</u>	<u>Bottom</u>	<u>Oil, Gas Or Water</u>	<u>Depth</u>	<u>Remarks</u>
Fill			0	10			
Sd & Sh	Grey	Hard	10	160			
Coal	Black	Soft	160	165			
Sd & Sh	Grey	Hard	165	221			
Coal	Black	Soft	221	225			
Sand	Grey	Hard	225	251			
Coal	Black	Soft	251	256			
Sd & Sh	Grey	Hard	256	520			
Coal	Black	Soft	520	523			
Sand	Grey	Hard	523	617			
Coal	Black	Soft	617	622			
Sand	Grey	Hard	622	647			
Coal	Black	Soft	647	651			
Sand	Grey	Hard	651	696			
Coal	Black	Soft	696	698			
Sand	Grey	Hard	698	3265	Water	1085'	1" stream
Little Lime	Grey	Hard	3265	3261			
Big Lime	Grey	Hard	3261	3600			
Shale	Grey	Soft	3600	3820			
Weir	Grey	Hard	3820	3855			
Sd & Sh	Grey	Soft	3855	4185			
Berea	Grey	Hard	4185	4193			
Sd & Sh	Grey	Hard	4193	4520	TD Gas	4366' 4520'	162 MCFPD 162 MCFPD

58161

RECEIVED
Environmental Protection

109-1432

Issued 06/01/94
Page 3 of 9
Expires 06/01/96

FORM WW-2B

MAY 16 94

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

19185

- 1) Well Operator: UMC Petroleum Corporation (50410) 4587 (D) 547
- 2) Operator's Well Number: Loup Creek #17 3) Elevation: 2382'
- Well type: (a) Oil ___ / or Gas X /
(b) If Gas: Production X / Underground Storage ___ /
Deep ___ / Shallow X /
- Proposed Target Formation(s): Gordon 419
- Proposed Total Depth: 4580' feet
- 7) Approximate fresh water strata depths: 376', 414', 485' (From 47-109-1356)
- 8) Approximate salt water depths: 1511', (?) (From 47-109-1356)
- 9) Approximate coal seam depths: 376', 411' (From 47-109-1356)
- 10) Does land contain coal seams tributary to active mine? Yes ___ / No X /
- 11) Proposed Well Work: To drill and frac new well.
- 12)

CASING AND TUBING PROGRAM

TYPE	SPECIFICATIONS			FOOTAGE INTERVALS		CEMENT
	Size	Grade	Weight per ft.	For drilling	Left in well	Fill-up (cu. ft.)
Conductor	16"	N/A	Used PE	40'	40'	CTS By Hand
Fresh Water	11 3/4"	H-40	42#	550'	550'	CTS
Coal	8 5/8"	J-55	24#/32#	1800'	1800'	CTS
Intermediate						
Production	4 1/2"	J-55	10.5#		4580'	300
Tubing						
Liners						

PACKERS Kind _____
Sizes _____
Depths set _____

For Division of Oil and Gas Use Only

062931/17

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

RECEIVED
MAY 16 94

- 1) Date: May 13, 1994
- 2) Operator's well number
Loup Creek #17
- 3) API Well No: 47 - 109 - 1432
State - County - Permit

Permitting
Office of Oil & Gas

STATE OF WEST VIRGINIA
DIVISION OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS

NOTICE AND APPLICATION FOR A WELL WORK PERMIT

- 4) Surface Owner(s) to be served:
 - (a) Name Pocahontas Land Corporation
Address P.O. Box 1517
Bluefield, WV 24701
 - (b) Name _____
Address _____
 - (c) Name _____
Address _____
- 5) (a) Coal Operator:
 - Name Eastern Associated Coal Corporation
Address P.O. Box 1233
Charleston, WV 25324
 - (b) Coal Owner(s) with Declaration
Name Pocahontas Land Corporation
Address P.O. Box 1517
Bluefield, WV 24701
 - Name _____
Address _____
- 6) Inspector Offie Helmick
Address P.O. Box 218
Fanrock, WV 24834
Telephone (304)- 732-9135
- (c) Coal Lessee with Declaration
Name Eastern Associated Coal Corporation
Address P.O. Box 1233
Charleston, WV 25324

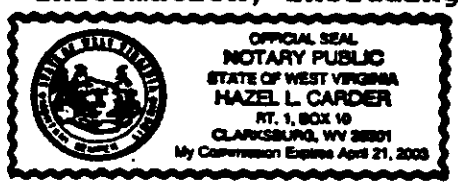
TO THE PERSON(S) NAMED ABOVE TAKE NOTICE THAT:

____ 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 9 on the above named parties, by:
____ Personal Service (Affidavit attached)
 X 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 UMC Petroleum Corporation (50410)
By: Gregory A. Shockley
Its: District Manager/Designated Agent
Address P.O. Drawer 1738
Clarksburg, WV 26302
Telephone (304) 624-9653



Subscribed and sworn before me this 13th day of May, 1994
Hazel L. Carder Notary Public
My commission expires April 21, 2003

STATE OF WEST VIRGINIA
DIVISION OF ENVIRONMENTAL PROTECTION, OFFICE OF OIL AND GAS
WELL WORK PERMIT APPLICATION

24058

- 1) Well Operator: PENN VIRGINIA OIL & GAS CORPORATION 37355 (4) 547
- 2) Operator's Well Number: LC-17 Workover 3) Elevation: 2378
- Well type: (a) Oil / or Gas X / *Issued 08/13/97*
 (b) If Gas: Production X / Underground Storage / *Expires 08/13/99*
 Deep / Shallow
- Proposed Target Formation(s): Ravencliff - 2402 - 2426
- Proposed Total Depth: 2426 feet
- Approximate fresh water strata depths: N/A
- 8) Approximate salt water depths: N/A
- 9) Approximate coal seam depths: N/A
- 10) Does land contain coal seams tributary to active mine? Yes / No X /
- 11) Proposed Well Work: Perfurate & Squeeze Ravencliff (Cnt. top 2410)
- 12) Frac Ravencliff Clean well out to original TD and run tubing.

REC'D
Division of
Environmental Protection
JUL 28 1997
Permitting
Office of Oil & Gas

CASING AND TUBING PROGRAM

TYPE	SPECIFICATIONS		FOOTAGE INTERVALS		CEMENT	
	Size	Grade	Weight per ft.	For drilling		Left in well
Conductor	16"			30'	30'	<i>Existing from well</i>
Fresh Water	11 3/4"			560'	560'	
Coal						
Intermediate	8 5/8"			1798'	1798'	551
Production	4 1/2"				4382'	squeeze w 60 cu. ft.
Tubing	2 3/8"			<i>5 1/2" Pressure Cement</i>	4300'	
Liners						

PACKERS : Kind _____
 Sizes _____
 Depths set _____

100 9472/24

For Office of Oil and Gas Use Only

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

Permitting
Office of Oil & Gas

1) Date: May 24, 1997
2) Operator's well number
LC-17 Workover
3) API Well No: 47 - 109 - 1432 - F
State County Permit

STATE OF WEST VIRGINIA - BUREAU OF ENVIRONMENT
DIVISION OF ENVIRONMENTAL PROTECTION
OFFICE OF OIL AND GAS

NOTICE AND APPLICATION FOR A WELL WORK PERMIT

- 4) Surface Owner(s) to be served: 5) (a) Coal Operator:
- | | |
|--------------------------------------|--|
| (a) Name <u>Pocahontas Land Corp</u> | Name <u>Eastern Associated Coal Corp</u> |
| Address <u>Post Office Box 1517</u> | Address <u>800 Laidley Tower</u> |
| <u>Bluefield, WV 24701</u> | <u>Charleston, WV 25324</u> |
| (b) Name _____ | (b) Coal Owner(s) with Declaration |
| Address _____ | Name <u>Pocahontas Land Corporation</u> |
| | Address <u>Post Office Box 1517</u> |
| | <u>Bluefield, WV 24701</u> |
| (c) Name _____ | Name _____ |
| Address _____ | Address _____ |
- 6) Inspector Mr. Ofie Helmick (c) Coal Lessee with Declaration
- | | |
|------------------------------------|---------------|
| Address <u>Post Office Box 398</u> | Name _____ |
| <u>Brenton, WV 24818-0398</u> | Address _____ |
| Telephone (304)- <u>543-0764</u> | |

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 22, Article 6, Section 8(d) of the Code of West Virginia (see page 2)

I certify that as required under Chapter 22 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)
- X Certified Mail (Postmarked postal receipt attached)
- _____ Publication (Notice of Publication attached)

I have read and understand Chapter 22-6 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 PENN VIRGINIA OIL & GAS CORPORATION
By: *C. M. Raudabaugh*
Its: Vice President
Address 999 Executive Park Blvd., Suite 300
Kingsport, TN 37660
Telephone 1-423-392-0500

Subscribed and sworn before me this 23rd day of July, 1997

Kita Wilson Notary Public
My commission expires 2-13-99