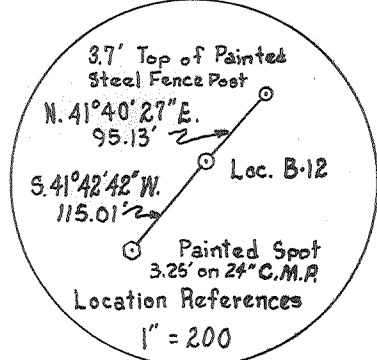
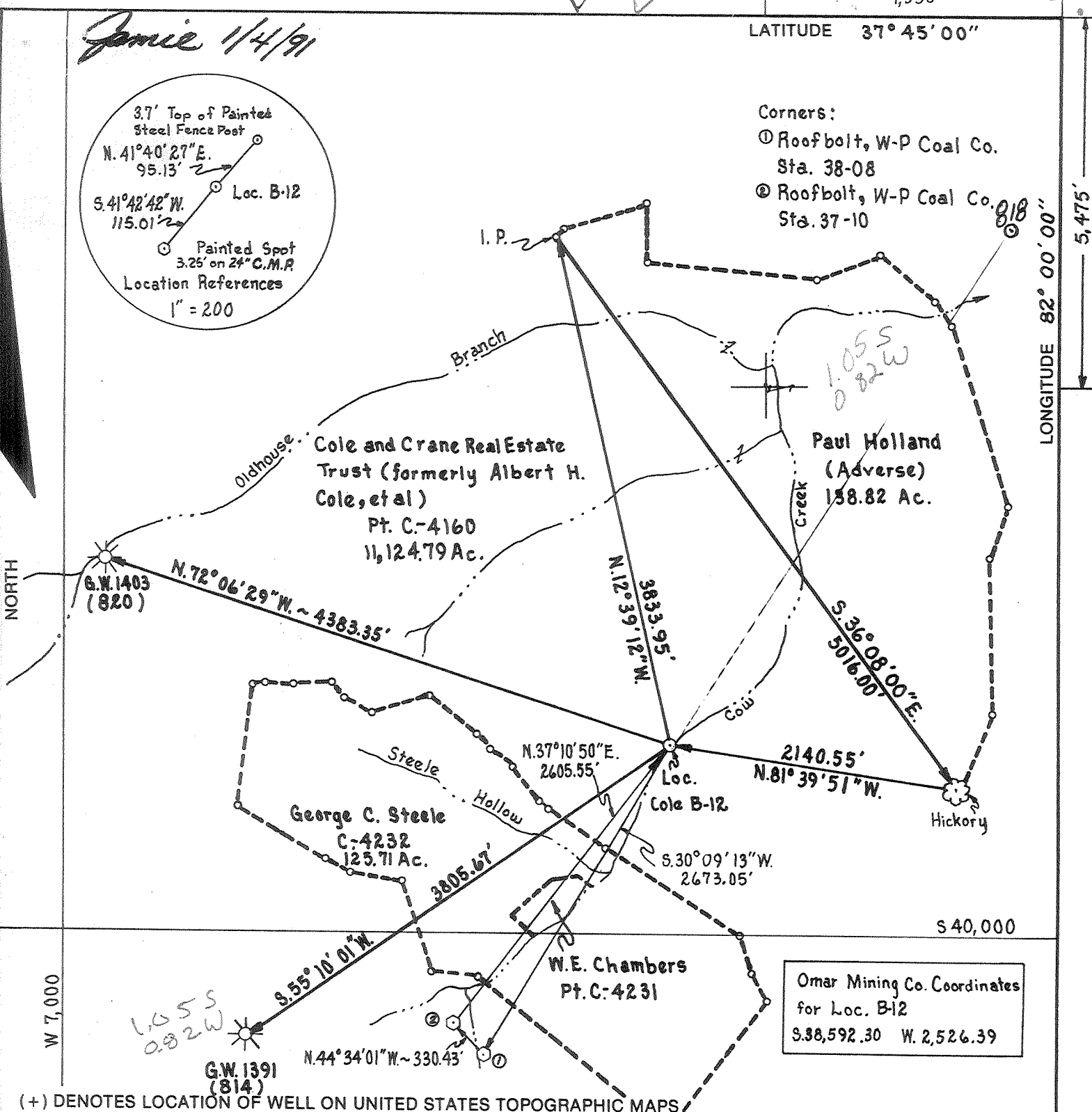


Jamie 1/4/91

LATITUDE 37° 45' 00"



Corners:
 ① Roofbolt, W-P Coal Co. Sta. 38-08
 ② Roofbolt, W-P Coal Co. Sta. 37-10

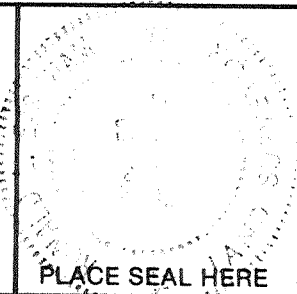


Omar Mining Co. Coordinates for Loc. B-12
 S. 98,592.30 W. 2,526.39

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

FILE NO. _____
 DRAWING NO. _____
 SCALE 1" = 1,000'
 MINIMUM DEGREE OF ACCURACY 1:25,080
 PROVEN SOURCE OF ELEVATION U.S.G.S. B.M. "142 RHP" elev. 956.904

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) Ronald L. East
 R.P.E. _____ L.L.S. 150



STATE OF WEST VIRGINIA
 DEPARTMENT OF ENERGY
 OIL AND GAS DIVISION



DATE Nov. 26, 19 90
 OPERATOR'S WELL NO. Albert H. Cole Trustee, et al
 API WELL NO. B-12
S.N. 133451
47 - 045 - 1150
 STATE COUNTY PERMIT

WELL TYPE: OIL ___ GAS X LIQUID INJECTION ___ WASTE DISPOSAL ___
 (IF "GAS,") PRODUCTION ___ STORAGE ___ DEEP ___ SHALLOW X
 LOCATION: ELEVATION 946.13 WATER SHED Cow Creek
 DISTRICT Island Creek COUNTY Logan
 QUADRANGLE Barnabus Mohavian NE
 SURFACE OWNER Cole and Crane Real Estate Trust ACREAGE 13,292.15
 OIL & GAS ROYALTY OWNER Cole and Crane Real Estate Trust LEASE ACREAGE 11,124.79
 LEASE NO. C-4160
 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 Devonian shale ESTIMATED DEPTH 4,906' KB
 WELL OPERATOR Ashland Exploration, Inc. DESIGNATED AGENT Forrest Burkett
 ADDRESS P.O. Box 391 ADDRESS P.O. Box 379
Ashland, Ky. 41114 Brenton, W.V. 24818

DEEP WELL 6-6 Magnolia (265)

COUNTY NAME PERMIT

JAN 11 1991

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

Well Operator's Report of Well Work

Farm name: COLE & CRANE REAL ESTATE Operator Well No.: B-12-S-133451

LOCATION: Elevation: 946.13 Quadrangle: BARNABUS

District: ISLAND CREEK County: LOGAN
Latitude: 5475 Feet South of 37 Deg. 45Min. 0 Sec.
Longitude 4350 Feet West of 82 Deg. 0 Min. 0 Sec.

Company: ASHLAND EXPLORATION, INC.
P.O. BOX 391, A1-6
ASHLAND, KY 41114-0391

Agent: FORREST BURKETT

Inspector: TIM BENNETT
Permit Issued: 01/08/91
Well work Commenced: 3/15/91
Well work Completed: 4/5/91
Verbal Plugging
Permission granted on:
Rotary X Cable _____ Rig _____
Total Depth (feet) 4875
Fresh water depths (ft) 50', 75'-3/4"
90'-2 1/2", 130' - 5" stream
Salt water depths (ft) 1240'

Casing & Tubing Size	Used in Drilling	Left in Well	Cement Fill Up Cu. Ft.
20"	39'	39'	driven
16"	68'	68'	17.7
11 3/4"	351	351	236
8 5/8"	2197	2197	707
5 1/2"	4855	4855	452

Is coal being mined in area (Y/N)? N
Coal Depths (ft): not noted while drlg.

OPEN FLOW DATA

Producing formation Dev. Shale/Berea Pay zone depth (ft) 2997-4796
Gas: Initial open flow 0 MCF/d Oil: Initial open flow _____ Bbl/d
Final open flow 876 MCF/d Final open flow _____ Bbl/d
Time of open flow between initial and final tests 3 Hours
Static rock Pressure 820# psig (surface pressure) after 72 Hours

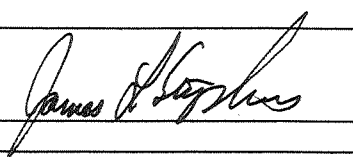
Second producing formation _____ Pay zone depth (ft) _____
Gas: Initial open flow _____ MCF/d Oil: Initial open flow _____ Bbl/d
Final open flow _____ MCF/d Final open flow _____ Bbl/d
Time of open flow between initial and final tests _____ Hours
Static rock Pressure _____ psig (surface pressure) after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

By: Jim Stephens Eng.-Tech.

Date: April 11, 1991



APR 12 1991

<u>Formation or Rock Type</u>	<u>Top</u>	<u>Base</u>
Breathitt formation	0	751
Lee formation	751	1537
Pennington Formation	1537	2064
Maxton Sand 1897-1968		
Little Lime	2064	2187
Big Lime	2187	2463
Borden	2463	2961
Sunbury Shale	2961	2991
Berea	2991	3010
Devonian Shale	3010	4863
Onondaga Ls.	4863	TD
DTD 4875		
LTD 4879		

Well treatment

Rh
Perf U. Dev. Shale 164/4606-4796. N₂ frac using 500 gal. 7 1/2% inh fe acid, 800,000 scf N₂ @ 95,000 scf/min. BD @ 2610#, ATP 3500#, MTP 3640#, ISIP 2300# & 15 min 1910#.

LH
Per M. Dev Shale 21H/4009-4339. N₂ frac using 500 gal 7 1/2" fe acid, 810,000 scf N₂ @ 98,000 scf/min. BD @ 2140#, ATP 2800#, ISIP 1900# 15 min 1480#.

UD
Perf U. Dev Shale & Berea 21H/2997-3535. N₂ frac using 500 gal fe inh acid, 800,000 scf N₂ @ 98,000 scf/min. BD @ 1970#, ATP 2800#, MTP 2840 ISIP 1900#, 15 min 1480#.

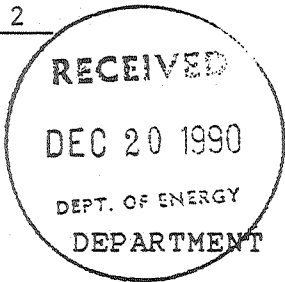
UD 3010

LH 4000

J 4350

A 4450

Rh 4600



1) Date: December 18, 1990
2) Operator's well number Serial
Albert H. Cole, Trustee etal #B-12, 133451
3) API Well No: 47 - 045 - 1150
State - County - Permit

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

- 4) Surface Owner(s) to be served:
 - (a) Name Cole & Crane Real Estate Trust
Address P.O. Box 610
Omar, WV 25638
 - (b) Name _____
Address _____
 - (c) Name _____
Address _____
- 5) (a) Coal Operator:
 - Name W-P Coal Company
Address P.O. Box 570
Omar, WV 25638
 - (b) Coal Owner(s) with Declaration
Name Same as No. 4(a)
Address _____
 - Name _____
Address _____
 - (c) Coal Lessee with Declaration
Name Same as No. 5(a)
Address _____
- 6) Inspector Tim Bennett
Address Route 2 Box 61-B
Chapmanville, WV 25508
Telephone (304)- 855-7705

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 2 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 Ashland Exploration, Inc.
By: J.T. Mellinger
Its: Vice President
Address P. O. Box 391
Ashland, KY 41114
Telephone 606-329-5450

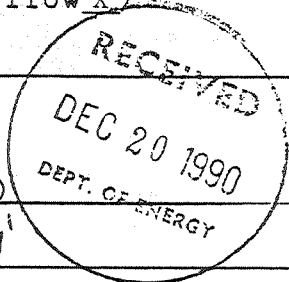
Subscribed and sworn before me this 18th day of December, 1990

Debbie W. Monte
My commission expires November 23, 1994 Notary Public

045-1150
 Drawn 11/8/91
 Expires 11/8/93
 Page 1 of 1

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

- 1) Well Operator: Ashland Exploration, Inc. ⁴³ 2750
 Albert H. Cole, Trustee et al
- 2) Operator's Well Number: B-12, Serial #133451 3) Elevation: 946.13
- 4) Well type: (a) Oil / or Gas /
 (b) If Gas: Production / Underground Storage /
 Deep / Shallow /
- 5) Proposed Target Formation(s): Devonian Shale
- 6) Proposed Total Depth: 4906'KB feet
- 7) Approximate fresh water strata depths: 131'KB (Map WV-12)
- 8) Approximate salt water depths: 416'KB (Map WV-12) ^{1251'}
- 9) Approximate coal seam depths: Not Operated - Solid Coal
- 10) Does land contain coal seams tributary to active mine? Yes / No /
- 11) Proposed Well Work:
- 12) *Drill & Install New Well*



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	LS	42.0	30	30	CTS
Fresh Water						3 1/2" CSA 12-11-1
Coal						3 1/2" CSA 12-11-1
Intermediate	8 5/8	J55	24.0	2016	2016	CTS w/Lead Cl "A" (2%Gel, 3%CaCl) Tail Cl "A" (3%Ca)
Production	5 1/2	J55	15.5	4906	4906	3 1/2" CSA 12-11-1 As Needed
Tubing	1.9	J55	2.76	-	4856	Siphon
Liners						

PACKERS : Kind _____
 Sizes _____
 Depths set _____

For Division of Oil and Gas Use Only

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

06048
 11/8/91