

Janie C/16/89  
WALTERS

LATITUDE 39° 15' 00"

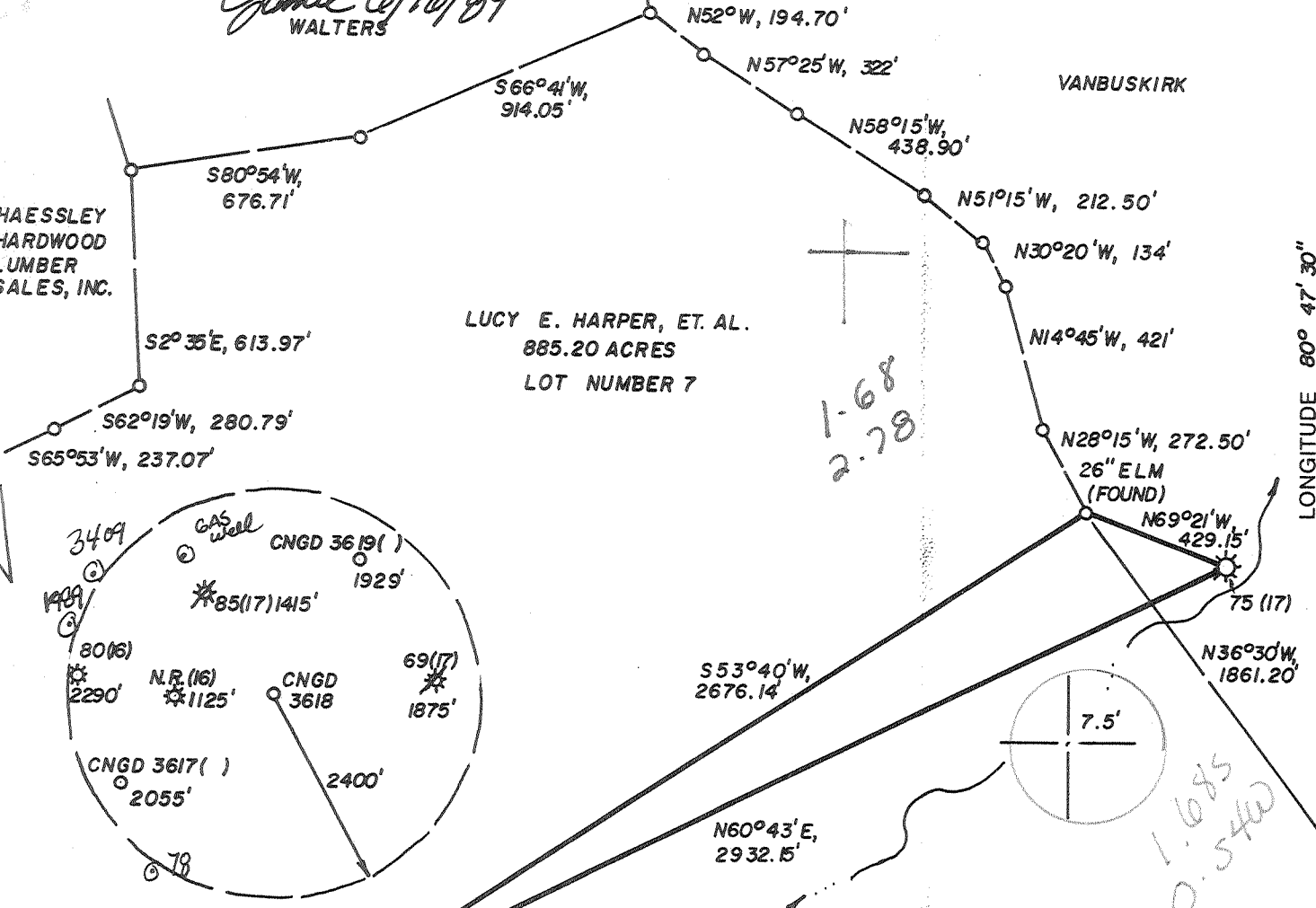
HAESSLEY  
HARDWOOD  
LUMBER  
SALES, INC.

VANBUSKIRK

LUCY E. HARPER, ET. AL.  
885.20 ACRES  
LOT NUMBER 7

LONGITUDE 80° 47' 30"

NORTH



WELL REFERENCES:  
N43°E, 134' TO 3" WHITE OAK  
NORTH, 148.50' TO 10" BEECH



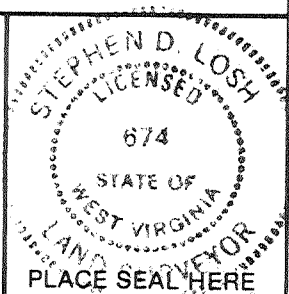
LAND SURVEYING SERVICES  
21 CEDAR LANE  
BRIDGEPORT, WV 26330  
PHONE: 304-842-2018

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

FILE NO. \_\_\_\_\_  
 DRAWING NO. \_\_\_\_\_  
 SCALE 1" = 500'  
 MINIMUM DEGREE OF ACCURACY 1 IN 200  
 PROVEN SOURCE OF ELEVATION TOP OF KNOB 2880' NW OF LOC. AT ELEV. 1378'

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. NO. 674  
**STEPHEN D. LOSH**



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



DATE APRIL 26, 19 89  
 OPERATOR'S WELL NO. CNGD 3618  
 API WELL NO. \_\_\_\_\_

WELL TYPE: OIL \_\_\_\_\_ GAS X LIQUID INJECTION \_\_\_\_\_ WASTE DISPOSAL \_\_\_\_\_  
 (IF "GAS,") PRODUCTION X STORAGE \_\_\_\_\_ DEEP \_\_\_\_\_ SHALLOW X  
 LOCATION: ELEVATION 1022' WATER SHED LEFT FORK AT ARNOLDS CREEK  
 DISTRICT WEST UNION COUNTY DODDRIDGE  
 QUADRANGLE OXFORD 7.5' 526 0583 Holbrook NE  
 SURFACE OWNER LUCY E. HARPER, ET. AL. ACREAGE 885.20  
 OIL & GAS ROYALTY OWNER LEWIS MAXWELL HRS. LEASE ACREAGE 1600.

PROPOSED WORK: DRILL X CONVERT \_\_\_\_\_ DRILL DEEPER \_\_\_\_\_ REDRILL \_\_\_\_\_ FRACTURE OR STIMULATE \_\_\_\_\_ 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 5200'  
 WELL OPERATOR CNG DEVELOPMENT CO. DESIGNATED AGENT RODNEY J. BIGGS  
 ADDRESS ONE PARK RIDGE CENTER ADDRESS RT. 2, BOX 698  
PITTSBURGH, PA 15244 BRIDGEPORT, WV 26330

JUN 30 1989

6-6 Straight Fork-Bluestone Creek (133)



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

DIVISION OF OIL & GAS Well Operator's Report of Well Work  
DEPARTMENT OF ENERGY

Farm name: HAMBLETT, MARY HARPER Operator Well No.: CNGD 3618

LOCATION: Elevation: 1022.00 Quadrangle: OXFORD

District: WESTUNION County: DODDRIDGE  
Latitude: 9010 Feet South of 39 Deg. 15Min. 0 Sec.  
Longitude 2960 Feet West of 80 Deg. 47 Min. 30 Sec.

Company: CNG DEVELOPMENT CO., A DE  
P. O. BOX 15746  
PITTSBURGH, PA 15244-0000

Agent: RODNEY J. BIGGS

Inspector: MIKE UNDERWOOD  
Permit Issued: 06/28/89  
Well work Commenced: 8/12/89  
Well work Completed: 8/17/89  
Verbal Plugging \_\_\_\_\_  
Permission granted on: \_\_\_\_\_  
Rotary X Cable \_\_\_\_\_ Rig \_\_\_\_\_  
Total Depth (feet) 5244'  
Fresh water depths (ft) 51'

Casing & Tubing Size	Used in Drilling	Left in Well	Cement Fill Up Cu. Ft.
11 3/4"	192	192	To Surf.
8 5/8"	1436	1436	To Surf.
4 1/2"	5235	5235	550 sks.
1 1/2"	4941	4941	-----

Salt water depths (ft) 1236'

Is coal being mined in area (Y/N)? N  
Coal Depths (ft): 401-404

OPEN FLOW DATA

Producing formation Alexander Pay zone depth (ft) 4990-5020  
Gas: Initial open flow \_\_\_\_\_ MCF/d Oil: Initial open flow \_\_\_\_\_ Bbl/d  
8/29/89 Final open flow 1.7 M MCF/d Final open flow \_\_\_\_\_ Bbl/d  
Time of open flow between initial and final tests 11 Hours  
Static rock Pressure 1050 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.

SEP 25 1989

For: Rodney J. Biggs, Manager  
CNG DEVELOPMENT CO., A DELAWARE CORP.

By: Rodney J. Biggs  
Date: September 7, 1989

Perforated Alexander 4990 - 5020, 20 holes, .39 HSC  
 Foam Frac Alex. Broke Formation 1250#, Pumped 542 bbl 30# Gel, 120,000# 20/40 Sand,  
 5,000# 80/100 Sand, 990,000 SCFN<sub>2</sub>. Ave Rate Downhole 20 BPM, Ave Pres. 2940#.

Fill	0	12	1/4" stream water @ 51'
Sd, Sh & RR	12	401	Wet at 1236'
Coal	401	404	
Sd, Sh & RR	404	1628	Coal 401 - 404
L. Lime	1628	1641	
Shale	1641	1674	
B.Lime/Injun	1674	1805	
Sd & Sh	1805	4698	
Benson	4698	4704	
Sd & Sh	4704	5244	

LOG TOPS

Big Lime	1666	1734
Big Injun	1734	1816
Weir	1970	2086
Berea	2175	2182
Gordon Gp.	2402	2557
Warren	3045	3100
U. Speechley	3118	3208
Speechley	3630	3674
Balltown	4004	4172
Bradford	4230	4310
Riley	4470	4632
Benson	4690	4751
Leopold	4830	4910
Alexander	4940	5030

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 SEP 18 1989

DIVISION OF OIL & GAS  
 DEPARTMENT OF ENERGY

1988 3 14 932

js

47-017-3729

STATE OF WEST VIRGINIA *Issued 6/28/89 Expires 6/28/91*  
DEPARTMENT OF ENERGY, DIVISION OF OIL AND GAS  
WELL WORK PERMIT APPLICATION

- 1) Well Operator: CNG DEVELOPMENT COMPANY *10110, E, 525*
- 2) Operator's Well Number: CNGD 3618 3) Elevation: 1022
- 4) Well type: (a) Oil  / or Gas  /  
(b) If Gas: Production  / Underground Storage  /  
Deep  / Shallow  /
- 5) Proposed Target Formation(s): Alexander
- 6) Proposed Total Depth: 5200 feet
- 7) Approximate fresh water strata depths: 240,340
- 8) Approximate salt water depths: none
- 9) Approximate coal seam depths: none
- 10) Does land contain coal seams tributary to active mine? Yes  / No  /
- 11) Proposed Well Work: Drill 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						
Fresh Water	11 3/4	H-40	42	200	200	To surface
Coal						To surface
Intermediate	8 5/8	X-42	23	1400	1400	38CSR18-11.2.2 & 38CSR18-11.3
Production	4 1/2	J-55	10.5	5200	5200	200-400 sks 38CSR18-11.1
Tubing	1 1/2	CN-55	2.75	5100	5100	
Liners						

8979

PACKERS : Kind \_\_\_\_\_  
Sizes \_\_\_\_\_  
Depths set \_\_\_\_\_

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JUN 09 1989

For Division of Oil and Gas Use Only DIVISION OF OIL & GAS  
DEPARTMENT OF ENERGY

*029140*  
*14*  
*14*

Fee(s) paid:  Well Work Permit  Reclamation Fund  WPCP  
Plat  WW-9  WW-2B  Bond 50 blanket sure  Agent  
(Type)

**RECEIVED**  
JUN 09 1989

DIVISION OF OIL & GAS<sup>3)</sup>  
DEPARTMENT OF ENERGY

Date: May 30, 1989  
Operator's well number  
CNGD 3618  
API Well No: 47 - 017 - 3729  
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 Mary Harper Hamblett  
Address 15 N. Wirt St.  
Leesburg, VA 22075  
(b) Name \_\_\_\_\_  
Address \_\_\_\_\_  
(c) Name \_\_\_\_\_  
Address \_\_\_\_\_  
6) Inspector Mike Underwood  
Address Route 2, Box 135  
Salem, WV 26426  
Telephone (304)- 782-1043

5) (a) Coal Operator:  
Name \_\_\_\_\_  
Address \_\_\_\_\_  
(b) Coal Owner(s) with Declaration  
Name Robert L. Holland, Jr. Agent  
Address Lewis Maxwell Heirs  
105 High St., P.O. Box 425, West Union, WV  
Name \_\_\_\_\_  
Address 26456  
(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)
- 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 CNG Development Company  
By: [Signature]  
Its: Supervisor Purchasing/Production Services  
Address One Park Ridge Center, P. O. Box 15746  
Pittsburgh, PA 15244  
Telephone (412) 787-4117

Subscribed and sworn before me this 30 day of May, 1989

[Signature]  
My commission expires 5/21/90

NOTARIAL SEAL  
SHEILA L. MIRICH, NOTARY PUBLIC  
FINDLAY TOWNSHIP, ALLEGHENY COUNTY  
MY COMMISSION EXPIRES MAY 21, 1990

Member, Pennsylvania Association of Notaries