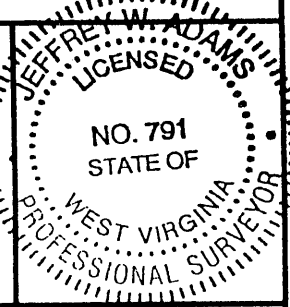
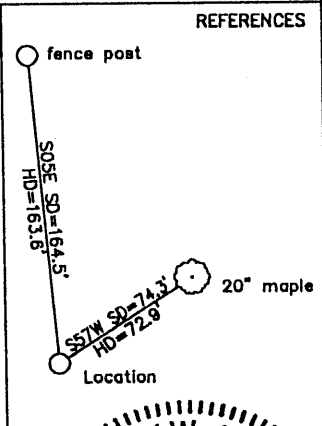


Note: Location is at least 400' from all outside lease lines.
 All wells within 3000' of this location are shown on this plat.

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

FILE NO. _____
 DRAWING NO. 1
 SCALE 1" = 500'
 MINIMUM DEGREE OF ACCURACY 1 in 200
 PROVEN SOURCE OF ELEVATION Spot Elev. 600' SW of location, El. 1953'

I THE UNDERSIGNED, HERBY 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) Jeffrey W. Adams
 R.P.E. _____ L.L.S. 791



STATE OF WEST VIRGINIA
 Division of Environmental Protection
 OFFICE OF OIL AND GAS

DATE August 13 1999
 OPERATOR'S WELL NO. 623879
 API WELL NO. _____

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

047-061-01374
 STATE COUNTY PERMIT

LOCATION: ELEVATION 1912' WATER SHED Laurel Run
 DISTRICT Clinton COUNTY Monongalia
 QUADRANGLE Gladesville 7 1/2'

SURFACE OWNER Charles E. Buchanan, et ux. ACREAGE 38.416
 OIL & GAS ROYALTY OWNER Charles E. Buchanan, et ux. LEASE ACREAGE 46.499
 LEASE NO. 1213686

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

PLUG AND ABANDON _____ CLEAN OUT AND REPLUG _____
 TARGET FORMATION Huntersville Chert ESTIMATED DEPTH 8,500'
 WELL OPERATOR Columbia Natural Resources, Inc. DESIGNATED AGENT W. A. Watson, Jr.
 ADDRESS P.O. Box 6070, Charleston, WV 25362 ADDRESS P.O. Box 6070, Charleston, WV 25362

OCT 25 1999

DEEP WELL

6-6 313

MONO COUNTY NAME PERMIT 1314

WR-35

RECEIVED
Office of Oil & Gas
Permitting
MAR 27 2000
WV Division of
Environmental Protection

DATE: 20-Oct-99
API #: 47-61-01374

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

Reviewed MS

Well Operator's Report of Well Work

Farm name: BUCHANAN, CHAS. & JOELLEN Operator Well No.: 623879

LOCATION: Elevation: 1912.00 Quadrangle: GLADESVILLE

District: CLINTON County: Monongalia

Latitude: 7775 Feet South of 39 Deg. 30 Min. 0 Sec.

Longitude 3150 Feet West of 79 Deg. 55 Min. 0 Sec.

Company: COLUMBIA NATURAL RESOURCES

	Casing & Tubing	Used in drilling	Left in well	Cement fill up Cu. Ft.
Address: Rt. 1, Box 107-10	11-3/4	315	315	CTS
Buckhannon, WV 26201	8-5/8	2998	2998	CTS
Agent: R. Mark Hackett	4-1/2	7995	7995	185 SXS
Inspector: Randal Mick				
Date Permit Issued: 10/20/99				
Date Well Work Commenced: 01/02/00				
Date Well Work Completed: 03/13/00				
Verbal Plugging:				
Date Permission granted on:				
Rotary <input checked="" type="checkbox"/> Cable <input type="checkbox"/> Rig				
Total Depth (feet): 8005				
Fresh Water depths (ft): 100, 520, 883				
Salt water depths (ft): None				
Is coal being mined in area (Y/N)? N				
Coal Depths (ft): None				

OPEN FLOW DATA

Producing formation Chert Pay zone depth (ft) 7680 - 7790
 Gas: Initial open flow 0 MCF/d Oil: Initial open flow n/a Bbl/d
 Final open flow 1210 MCF/d Final open flow n/a Bbl/d
 Time of open flow between initial and final tests 4 Hours
 Static rock Pressure 2500 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.

Signed: COLUMBIA NATURAL RESOURCES, INC.
By: R. Mark Hackett
Date: 03/22/2000

MAR 31 2000

MONO 1374

FORMATION RECORD:

0 to 658 from Driller's Log Book, 658 to TD from Gamma Ray Log

0611374

FROM	TO	ROCK TYPE (described rock types and other minerals penetrated and record occurrences of oil, gas and water from surface to total depth)
0	40	Fill
40	220	Sh.
220	280	Sd. & Sh.
280	375	Sh.
375	400	Sd. & Sh.
400	430	Sh.
430	490	Red rock
490	560	Sd.
560	600	Red rock
600	658	Sh.
658	691	Little Lime
691	880	Greenbrier LS
880	1736	Sd. & Sh.
1736	1742	4th Sd.
1742	1910	Sd. & Sh.
1910	1968	5th Sd.
1968	2600	Sd. & Sh
2600	2610	Speechley
2610	2938	Sd. & Sh.
2938	2942	Balltown
2942	7282	Sd. & Sh.
7282	7366	Tully
7366	7564	Hamilton
7564	7663	Marcellus
7663	7676	Onondaga
7676	7821	Chert
7821	7868	Needmore
7868	7881	Oriskany
7881		Helderberg
	8005	DTD
	8003	LTD

WATER:

Depth (ft)	Amount	Type
100	1" str.	fresh
520	1/2" str.	fresh
883	2" str.	fresh

GAS CHECKS:

Depth(ft)	MCF/D
7694	NS
7850	NS

OIL SHOWS:

Depth	Amount
None	

PERFORATIONS:
Chert (28 holes) 7680'- 7790' KB.

STIMULATION: ,
Chert - 15,000 lbs. 80/100 sd. & 60,000 lbs 20/40 sd. w/30 # gel & a 5% HCL acid solution throughout the job.