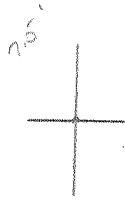


LATITUDE (25° 41' 51") 38° 30'

(25° 41' 51") 81° 30'

LONGITUDE



7'5 OGIS topo location

7.5' 10C	<u>2.875</u>	15' 10C	<u>2.875</u>
	<u>1.43w</u>	(calc.)	<u>1.43w</u>

Company Columbia Process

Farm Susan J Given 1 (GW-368)

Quad Big Chimney 75' / Charleston 15' (3)

County Kanawha

District ELK

Gas

WELL LOCATION MAP

File No. 039-293

Kanawha

DEEP WELL 6.6 ELK-Poca (Sissonville) (192)

WEST VIRGINIA DEPARTMENT OF MINES

OIL AND GAS DIVISION

WELL RECORD

Permit No. Kan-293

Gas Well

Chas. Quad.

Company - Columbian Carbon Company
 Address - Box 1240, Charleston, W. Va.
 Farm - Susan I. Given. Acres 166
 Location - Lick Branch
 Well No. - 1 (GW-368). Elev. 976.6
 District - Elk. County- Kanawha
 Surface - Susan I. Given et vir
 Address - Big Chimney, W. Va.
 Mineral/
 oil & Gas - same
 Drilling - Commenced- 10-4-36
 Completed- 3-3-37
 Date Shot - 3-4-37. Depth- 5131-5133'
 Volume - 554,000 cu. ft.
 Rock Press.- 1250# 20 hrs.
 Oil - none
 Fresh Water- none
 Salt Water - 1140 feet & 1150 feet

CASING & TUBING

14"OD 65'6"
 10 1/2"OD 548'0"
 8-5/8"OD 1694'6"
 6-5/8"OD 5032'
 3# liner on anchor 5208'1"

PACKER

Kind - O.W.S. Conical Sleeve
 Size- 5'x2" long
 Depth- 5138'

Casing cemented 8-5/8", 1087-1677', 12-24-36
 6-5/8", 4833-5040', 2-13-37

Coal was encountered at 435'60"; 484'36";
 606'48"; 620'36"; 1475'12"

Formation Color ^{Hor} TOP Bottom Result				Formation Color ^{Hor} TOP Bottom Result			
Red Rock		0	70	Slate & Shells		2575	2810
Lime		70	80	Slate		2810	3350
Sand		80	110	Slate & Hard Shells		3350	3462
Slate		110	125	Shale	Brown	3462	3485
Lime		125	150	Hard Shells & Slate		3485	3900
Red Rock		150	260	Shale, light brown		3900	4025
Clay	yellow	260	275	Shale & Shells		4025	4215
Red Rock		275	290	Shale, white		4215	4605
Slate	white	290	310	Shale, brown		4605	4940
Slate & Lime Shells		310	370	Slate, white		4940	4975
Sand	White	370	395	Slate, black		4975	5033
Slate & Shells		395	410	Corniferous		5033	5146
Sand		410	435	Gas 435-440' show		(SIM 5033')	
Coal		435	440				
Slate		440	484				
Coal		484	487	Gas 484-487' show			
Slate		487	510	Oriskany		5146	5133 SIM 5165
Sand		510	600	Holdorburg		5133	5193
Slate		600	606				
Coal		606	610	Gas 606-607' show			
Slate		610	620				
Coal		620	623	Total Depth			5193'
Slate		623	635				
Little Dunkard		635	735	Pay- 5165'-5173'			
Slate & Shells		735	815				
Big Dunkard		815	855				
Slate & Shells		855	995				
Sand		995	1010				
Slate		1010	1030				
Gas Sand		1030	1050	Gas 1040-42' show			
Borken Lime		1050	1078				
Salt Sand		1078	1378	Gas 1105-07' show			
Slate		1378	1379	Oil & Water 1140' small amt			
Salt Sand		1379	1475	HFV 1150'			
Coal		1475	1476				
Salt Sand		1476	1564				
Slate		1564	1565				
Maxon		1565	1627				
Little Lime		1627	1662				
Pencil Cave		1662	1665				
Big Lime		1665	1823	SIM 1677'			
Keener Sand		1823	1849				
Slate		1849	1854				
Sand		1854	1878				
Slate		1878	1900				
Slate & Shells		1900	2025				
Slate		2025	2044				
Slate & Shells		2044	2490				
Lime	hard & gritty	2490	2575				

ABD
 3/43
 2.25 38' 34"
 1.45 W. 81° 30'

1823
 1665
 158
 1823
 977
 845