

105

Operator: Columbia Gas Trans. Corp.
 Farm: The Pittston Co.
 Well No.: 9643
 Elevation: 1599.33'
 Location: Buchanan County
 3850' E of 82°15'
 4500' N of 37°15'

Total Depth: 4472'

Remarks: Elevation and location of well site with reference to coal geology along Barts Lick Creek and measured section No. 94, indicate that well located about 15' below the Dorchester coal horizon.

Formational boundaries determined from electrical logs, which are measured from 7 feet above ground level. Depths below are uncorrected.

<u>Formation</u>	<u>Top</u>	<u>Bottom</u>	<u>Thickness</u>
Pennsylvanian System			
Post Lee Formation "in at surface"			
	Dorchester coal at -15'		
	Hagy coal at 200'		
	Splash Dam coal at 300' (284-286)		
	Kennedy coal at 620'		
Lee Formation	672	1860	1188'
	quartzose sand 672-728		56'
	quartzose sand 1141-1153		12'
	quartzose sand 1162-1185		23'
	quartzose sand 1218-1327		109'
	quartzose sand 1410-1422		12'
	quartzose sand 1442-1448		6'
	quartzose sand 1456-1487		31'
	quartzose sand 1501-1504		3'
	quartzose sand 1513-1525		12'
	War Creek coal horizon at 1550' (1597-1600)		
	quartzose sand 1685-1736		51'
	quartzose sand 1750-1808		58'
	quartzose sand 1813-1860		47'
	total quartzose sand		420'
Pocahontas Formation	1860?	1890	30'?
Mississippian System			
Bluestone Formation	1890	2565	675'
Pride Shale	2240	2565	325'
Princeton Interval	2565	2601	36'
Little Stone Gap Member	2601	?	?
Maxton Sand	2916	2965	49'
	3000	3039	39'
	3057	3071	14'
Greenbrier Formation	3205	3706	501'
MacCraday	3706		

Geologic supplementary log by Marshall S. Miller, May, 1972,
for Columbia Gas Well No. 9643.

1800-1820	20'	Sandstone, white, fine to very fine grained, subrounded, well sorted, small amount of matrix material, over 90% quartz; considerable amount of dark carbonaceous shale present, could either be contamination or a thin interbed. Gamma-ray log indicates a shale bed present from 1808 to 1813.
1820-1870	50'	Sandstone, white, quartzose, fine to coarse grained, subangular to subround, poorly sorted, little or no matrix material, scattered dark rock fragments, over 95% quartz
1870-1880	10'	Sandstone, white to light gray, very fine to fine grained, subround, well sorted, scattered fine carbonaceous material, muscovite, about 90-95% quartz
1880-1890	10'	No samples
1890-1910	20'	Shale, red, green, and gray, slightly calcareous. A coal is also present in upper 10' which may be from a thin Pocahontas interval from 1880-1890.

*cuttings do not agree with gamma-ray log below 1860 ft.
Pocahontas Formation must be estimated from Gamma ray log*