

**APPENDIX I – SAMPLING RESULTS FOR SOLID WASTE
MANAGEMENT UNIT 114 PHOSPHATE SLAG STORAGE AREA**

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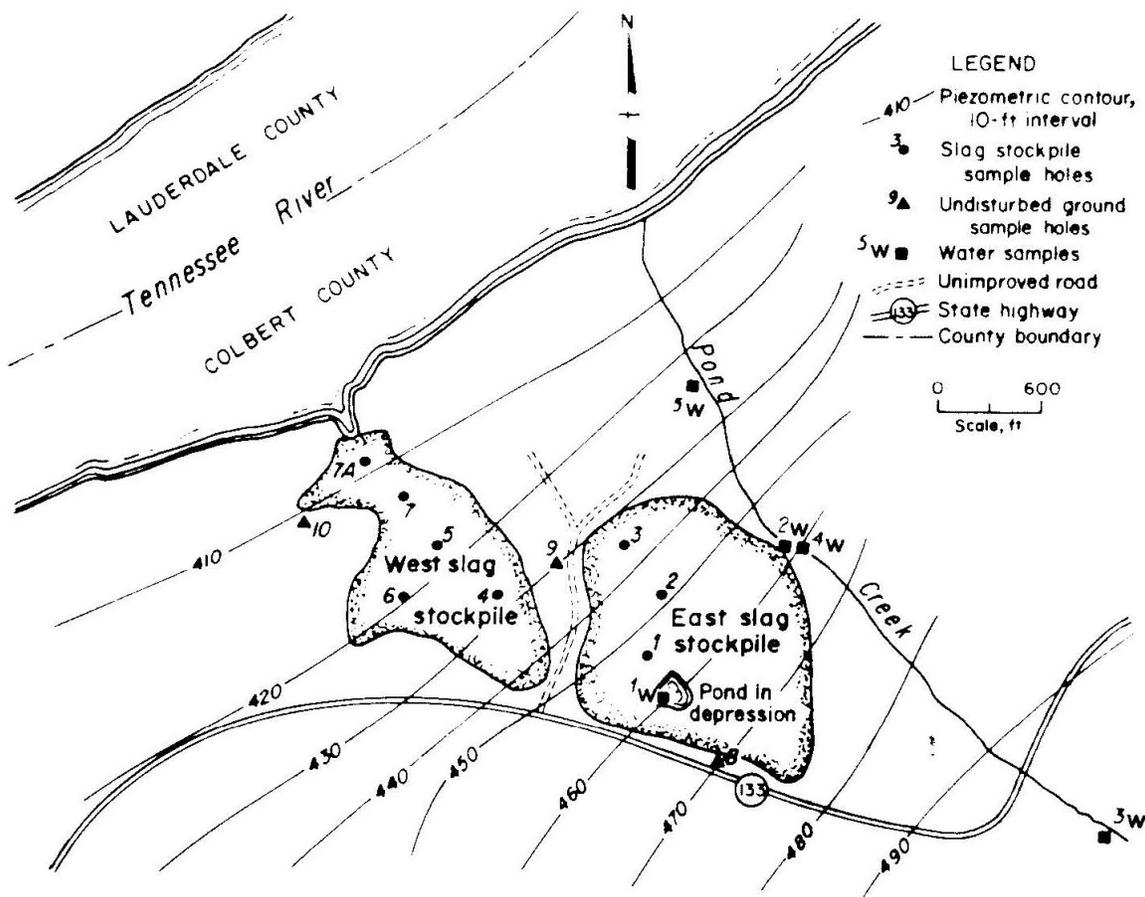


Figure I-1. Solid Waste Management Unit 114 Phosphate Slag Storage Area Groundwater Potentiometric Map and Sampling Locations

Source: May, A., and J. R. Boyle. 1990. *Assessment of Ra226 and Toxic Element Distribution at Tennessee Valley Authority Phosphate Slag Stockpiles, Muscle Shoals, Alabama*. U.S. Bureau of Mines Report of Investigations 9288.

Table I-1. Water Analyses in Milligrams per Liter

Parameter	Sampling Location					
	1W	2W	3W	4W	5W	S
Silver	<0.050	<0.050	<0.050	<0.050	<0.050	0.05
Arsenic	<.005	<.005	<.005	<.005	<.005	.05
Barium	<.010	.170	.020	.030	.040	1
Cadmium	<.004	.010	<.004	<.004	<.004	.010
Chromium	<.040	¹ .060	<.040	<.040	<.040	.05
Mercury	¹ .004	¹ .006	.001	¹ .004	.001	.002
Lead	<.010	.010	<.010	<.010	<.010	.05
Selenium	.001	.001	<.001	<.001	<.001	.01
Bicarbonate, as CaCO ₃	8	0	139	100	62	NA
Carbonate, as CaCO ₃	0	0	0	0	7	NA
Chloride	1	1	47	35	33	NA
Fluoride	¹ 31	¹ 11	1	1	1	4.0
Hardness, as CaCO ₃	93	430	74	78	130	NA
Sulfate	13	45	13	27	25	NA
pH	6.2	3.7	8.0	8.3	9.1	NA
Adapted from May and Boyle 1990						
NA Not applicable						
1W Depression pond in east slag stockpile						
2W Seepage from east slag stockpile						
3W Pond Creek, upstream from east slag stockpile						
4W Pond Creek, at east slag stockpile						
5W Pond Creek, downstream from east slag stockpile						
S Primary drinking water standards (8). For noncompliance with these standards, the maximum contaminant levels must be exceeded, rounded 10 the digits indicated.						
¹ Noncompliance with primary drinking water standards						