

NOTE: a) Not Detected
NOTE: b) Not analyzed for that year

Data Table 5-9 Migration of Radioactivity from Seepage Basins and the Solid Waste Disposal Facility
Sample Measurement Section
2010-2014 Migration of Radioactivity from Seepage Basins and the Solid Waste Disposal Facility

Location	Source Description	Nuclide (units)	2010	2011	2012	2013	2014
FMA7-(FM3A+FM2B)	200-F seepage basins to Fourmile Branch	Tritium (curies)	34	13.0	32.6	49.1	118
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to Fourmile Branch	Tritium (curies)	85	68.0	63.8	111	77.0
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to Fourmile Branch	Tritium (curies)	381	457	272	392	228
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Tritium (curies)	69	68.3	69.9	158	47.6
(PB3)-(K Canal)	K-Area retention basin to Indian Grave Branch	Tritium (curies)	489	197	212	202	186
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Cesium-137 (millicuries)	25.70	a	a	2.50	22.0
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Cesium-137 (millicuries)	11.73	19.5	46.3	a	22.3
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Cesium-137 (millicuries)	a	a	a	a	a
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Total Strontium (millicuries)	3.67	3.70	2.50	2.33	32.3
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Total Strontium (millicuries)	22.2	10.4	13.0	18.5	19.6
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Total Strontium (millicuries)	a	1.10	a	0.19	a
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Iodine-129 (millicuries)	21.9	13.1	11.7	19.9	23.0
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Iodine-129 (millicuries)	0.73	1.59	1.54	7.07	1.52
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Iodine-129 (millicuries)	a	0.08	a	a	a
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Technetium-99 (millicuries)	11.78	8.25	4.71	a	19.7
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Technetium-99 (millicuries)	1.66	2.32	5.88	18.02	6.39
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Technetium-99 (millicuries)	a	a	a	a	0.05
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Uranium-234 (millicuries)	b	b	b	b	22.91
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Uranium-234 (millicuries)	b	b	2.36	b	0.31
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Uranium-234 (millicuries)	b	b	b	b	a
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Uranium-234 (millicuries)	b	65	72.1	45.1	48.9

2010-2014 Migration of Radioactivity from Seepage Basins and the Solid Waste Disposal Facility

Location	Source Description	Nuclide (units)	2010	2011	2012	2013	2014
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Uranium-235 (millicuries)	b	b	b	b	1.22
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Uranium-235 (millicuries)	b	b	0.1	b	0.01
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Uranium-235 (millicuries)	b	b	b	b	a
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Uranium-235 (millicuries)	b	3.05	3.72	2.82	2.46
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Uranium-238 (millicuries)	b	b	b	b	28.43
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Uranium-238 (millicuries)	b	b	2.18	b	0.27
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Uranium-238 (millicuries)	b	b	b	b	a
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Uranium-238 (millicuries)	b	78.3	74.9	54.9	55.78
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Plutonium-238 (millicuries)	b	b	b	b	0.03
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Plutonium-238 (millicuries)	b	b	a	b	a
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Plutonium-238 (millicuries)	b	b	b	b	a
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Plutonium-238 (millicuries)	b	b	a	a	a
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Plutonium-239 (millicuries)	b	b	b	b	0.14
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Plutonium-239 (millicuries)	b	b	a	b	a
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Plutonium-239 (millicuries)	b	b	b	b	a
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Plutonium-239 (millicuries)	b	b	a	a	a
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Americium-241 (millicuries)	b	b	b	b	0.39
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Americium-241 (millicuries)	b	b	0.65	b	0.09
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Americium-241 (millicuries)	b	b	b	b	0.003
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Americium-241 (millicuries)	b	b	3.22	4.22	2.87
FMA7-(FM3A+FM2B)	200-F seepage basins to fourmile Branch	Curium-244 (millicuries)	b	b	b	b	0.44
FM2B-(FM1C+H17+H18+HP52)	200-H seepage basins to fourmile Branch	Curium-244 (millicuries)	b	b	0.67	b	0.04
FM3A-(FM3+F12+F13)	200-H seepage basin 4 and Solid Waste Disposal Facility to fourmile Branch	Curium-244 (millicuries)	b	b	b	b	a
(U3R4)-(Direct)	Solid Waste Disposal Facility to Upper Three Runs	Curium-244 (millicuries)	b	b	a	a	a