

Rio Algom Mining LLC

May 11, 2017

ADDRESSEE ONLY

Mr. Varughese Kurian, Project Manager
Materials Decommissioning Branch
Office of Nuclear Material Safety and Safeguards
U.S. Nuclear Regulatory Commission
Two White Flint North, Mailstop T8F5
11545 Rockville Pike
Rockville, MD 20852

CERTIFIED MAIL

RE: Planned Final Status Survey Sampling for 2017 in the Alternate Release Criterion (ARC) Areas of the Ambrosia Lake NM Facility, License SUA-1473, Docket No. 40-8905

Dear Mr. Kurian,

Rio Algom Mining LLC (RAML) is planning to implement the soil sampling requirements described in Section 8 of the Soils Decommissioning Plan (the Plan) (dated January 19, 2005 and approved by the NRC on August 11, 2006) during the 2017 summer. Prior to conducting this sampling, RAML would like to clarify one aspect of the Plan with the NRC.

Section 8.2.1 of the Plan defines the soil characterization requirements for areas of deeper contamination that are subject to the Alternate Release Criterion (ARC) and includes the statement: *“For areas where no data are available, 30 samples are initially required for characterization purposes.”* The Plan does not provide a specific definition of “Area.”

Figure 1 shows the locations where RAML proposes to apply the ARC requirements. Note that these locations consist of 12 non-contiguous polygons ranging in size from 0.10 to 20 acres in size. RAML has grouped these locations into spatially related larger locations described as ARC Locations 1 through 5 in Table 1. Two of these locations, ARC Locations 1 and 2, are near historical ponds already reclaimed using the ARC remedy. RAML plans to use historical characterization data for like areas as allowed by the Plan for these two locations. Three of these locations, ARC Locations 3 through 5, will require soil sampling to meet the characterization requirements of the plan. Each of these locations would require 30 samples according to the Plan for a total of 90 sample locations. RAML believes that it would not be practical or feasible to place 30 sample locations in each separate location.

Table 1 provides the sampling strategy RAML proposes to implement to meet of the characterization requirements for each area subject to the ARC. RAML is proposing to

distribute 90 samples over all areas using a consistent sample density of approximately 3.6 samples per acre. Figure 1 shows the spatial distribution of the proposed sample locations.

This approach keeps the same minimum number of samples required by the Plan for the three areas, but simply distributes them on equal spacing for all areas being investigated. RAML will evaluate the vertical extent of contamination using downhole logging of sample locations with appropriate field instruments as described in the Plan. The samples that are collected will be a composite of the entire contaminated soil profile at each location. Please let me know if this approach is acceptable to the NRC. We will schedule our sampling program once we have received notice from the NRC that it concurs that the sampling approach described in this letter meets the requirements of the Plan for the characterization of the area subject to ARC.

Please feel free contact me at (209)736-4803 with any questions.

Sincerely

A handwritten signature in black ink, appearing to read "Theresa Ballaine". The signature is written in a cursive style with a long horizontal stroke at the end.

Theresa Ballaine
Manager
Rio Algom Mining, LLC

cc. NRC Document Control

Table 1. Proposed Sample Number for ARC Area Sampling in 2017

ARC Location	Description on Figure 1	Characterization Method	Area (Acres)	Number of Sample Locations	Comments
1	ARC 2,3,4	Estimated from like areas.	0.8	None	Area is adjacent to historical ponds 9 and 10 and the pond 9 and 10 characterization data will be used.
2	ARC 5 and 6	Estimated from like areas.	0.3	None	Area is adjacent to historical ponds 4 and 5 and the pond 4 and 5 characterization data will be used.
3	ARC 1 and 10	Soil Sampling	20	73	
4	ARC 8 ,11 and 12	Soil Sampling	3.4	12	
5	ARC 7 and 9	Soil Sampling	1.2	5	

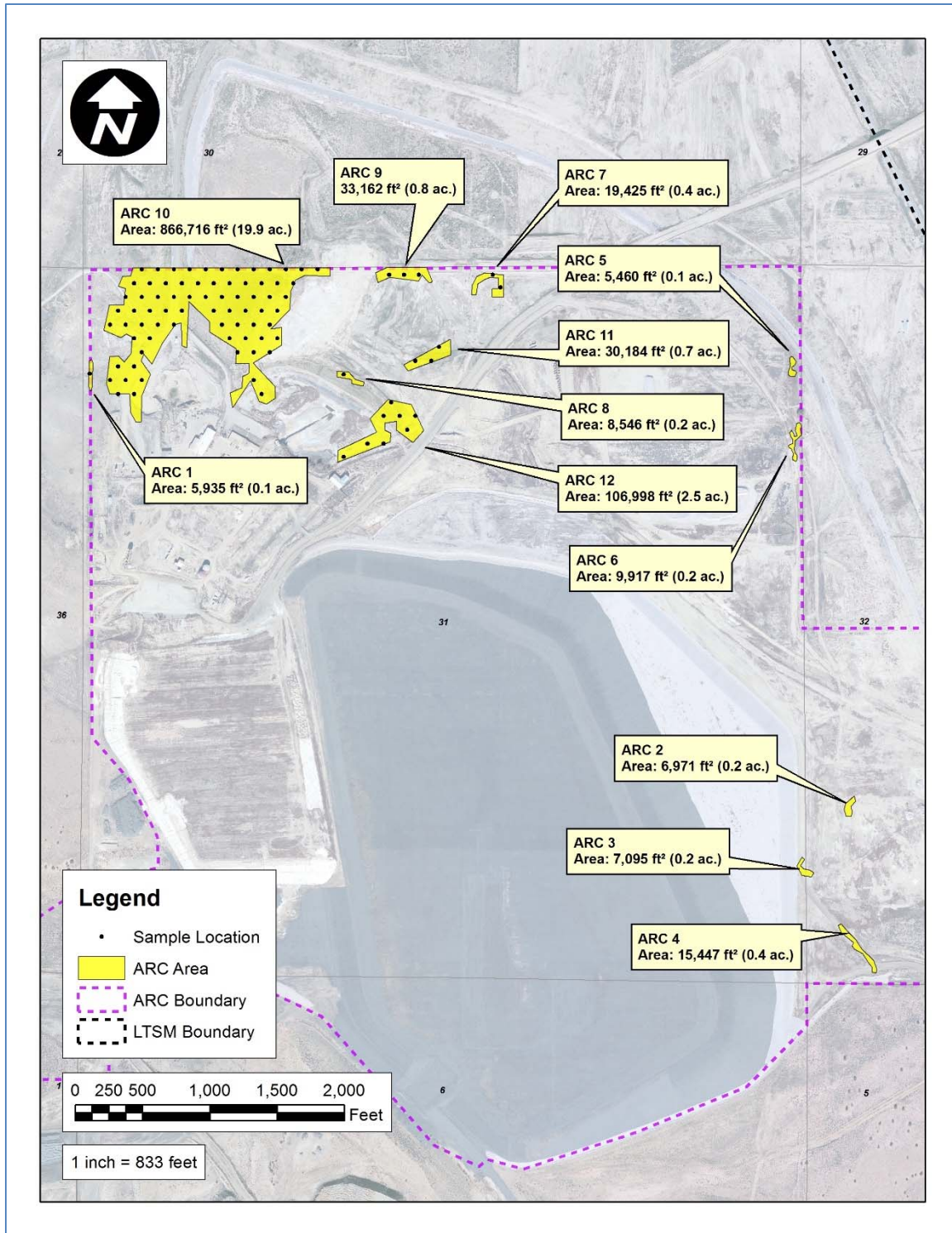


Figure 1. Additional Areas Proposed for ARC Remedy.