February 10, 2016

REMEDIAL INVESTIGATION / FEASIBILITY STUDY

PROGRESS REPORT #1
NOVEMBER 2015 – JANUARY 2016

Prepared for

COLUMBIA FALLS ALUMINUM COMPANY, LLC
2000 Aluminum Drive, Columbia Falls
Flathead County, Montana

ROUX ASSOCIATES, INC.
Environmental Consulting & Management

209 Shafter Street, Islandia, New York 11749 ♦ 631-232-2600
TABLE OF CONTENTS

1.0 INTRODUCTION ...................................................................................................................... 1

2.0 WORK COMPLETED ............................................................................................................... 2
   2.1 Health and Safety Plan ...................................................................................................... 2
   2.2 Setup of Project Database Access .................................................................................. 3
   2.3 Contractor Qualifications ............................................................................................... 3
   2.4 Subcontractor Procurement Activities .......................................................................... 3
   2.5 Lead Delineation Sampling and Analysis Plan .............................................................. 4
   2.6 Technical Meeting with USEPA and MDEQ at the Site .............................................. 5
   2.7 Public Meeting ............................................................................................................... 5

3.0 WORK PLANNED FOR NEXT QUARTER ............................................................................ 6
   3.1 Investigation Derived Waste Management Plan ............................................................ 6
   3.2 Subcontractor Procurement Activities .......................................................................... 6
   3.3 Lead Sampling and Analysis Plan Implementation ........................................................ 6
   3.4 Freedom of Information Act (FOIA) Request ................................................................. 7
   3.5 Pre-intrusive Task 1 - Site Reconnaissance .................................................................. 7
   3.6 Pre-Intrusive Task 2 - Geophysical Survey .................................................................. 8
   3.7 Pre-intrusive Task 3 - Soil Gas Survey ......................................................................... 8

4.0 DATABASE UPDATES ............................................................................................................ 9

5.0 SCOPE/SCHEDULE REVISIONS ....................................................................................... 10

ATTACHMENT

Project Schedule
1.0 INTRODUCTION
This Progress Report (Report) presents a summary of activities completed during the period of November 2015 through January 2016, on behalf of Columbia Falls Aluminum Company, LLC (CFAC), for the Remedial Investigation / Feasibility Study (RI/FS) being performed at the Anaconda Aluminum Co Columbia Falls Reduction Plant (a/k/a Columbia Falls Aluminum Plant) generally located near Columbia Falls in Flathead County, Montana ("Site"). The RI/FS is being conducted pursuant to the Administrative Settlement Agreement and Order on Consent (AOC) dated November 30, 2015 between CFAC and the United States Environmental Protection Agency (USEPA) (CERCLA Docket No. 08-2016-0002).

This Report provides a description of the actions that have been taken to comply with the AOC during the reporting period and describes work planned for the upcoming quarter, including an updated project schedule. This report also provides updates regarding the availability of any new, validated sampling data received by CFAC during the reporting period. Lastly, this Report provides an update on any actual, or potential, problems and/or delays encountered and solutions implemented to address any actual or anticipated problems/delays.
2.0 WORK COMPLETED
This Section provides a summary of the work completed during the current reporting period.

2.1 Health and Safety Plan
A Site-specific Health and Safety plan (HASP) was developed in accordance with guidelines outlined in OSHA standard 29 CFR 1910.120(b). The HASP outlines the health and safety hazards that may exist during field operations and identifies procedures to ensure field operations are conducted safely and with full consideration and awareness of the potential risks. The HASP includes a discussion of potential hazards, precautions to be taken while working at the Site, equipment, personnel protective equipment (PPE), training of personnel, Health and Safety Officer duties, notices and signs, and emergency procedures. The HASP will be reviewed and signed by all personnel working at the Site as part of the RI/FS activities. A copy of the HASP will be available at the Site at all times during implementation of the RI/FS.

The HASP was submitted to the USEPA on December 22, 2015. The USEPA provided verbal comments on the HASP during the technical meeting held on January 21, 2016 at the Site (See Section 2.6). The HASP will be revised to incorporate USEPA comments and resubmitted to the USEPA in February 2016.
2.2 Setup of Project Database Access
The RI/FS will generate an extensive amount of information that needs to be properly documented and managed in order to support project decisions. In accordance with the RI/FS Work Plan, Roux Associates setup a project database to organize, analyze, and store project information and data during the RI/FS. The database was created in EQuIS™ as described in the RI/FS Work Plan. The USEPA and their consultant were provided access via email correspondence on December 22, 2015, with a unique user ID and login to the database. Access to the online database also comes with access to the EQuIS™ online dashboard, which can be used to display and review the analytical data for the Site throughout the project. During this reporting period, a preliminary dashboard layout was formatted. Data that is collected, verified and validated during the RI/FS will be added to the project database, as described in the AOC.

2.3 Contractor Qualifications
In accordance with Paragraph 32 of the AOC, CFAC provided the USEPA with a letter correspondence dated December 22, 2015 to identify that CFAC selected Roux Associates as the primary consultant to support CFAC in completing the requirements outlined in the AOC. The letter describes Roux’s qualifications to complete the work outlined in the RIFS Work Plan and Roux’s role in screening, procuring, and managing subcontractors to assist with the implementation of the Phase I Site Characterization.

2.4 Subcontractor Procurement Activities
Pre-qualified analytical laboratories were invited to submit bids to Roux Associates, on behalf of CFAC, to complete the analysis of environmental samples throughout the Phase I Site Characterization investigation in accordance with the analytical procedures outlined in the Phase I Sampling and Analysis Plan (SAP). As part of the bid responses, the laboratories will provide a copy of their Quality Assurance Project Plan (QAPP) in order to demonstrate their capability to comply with the Quality Assurance and Quality Control (QA/QC) requirements specified in the Phase I SAP. Additionally, third-party data validation subcontractors were invited to submit bids to Roux Associates, on behalf of CFAC, to complete verification and validation of analytical data received from the laboratories throughout the RI/FS.
Pre-selected drilling companies were invited to submit bids to Roux Associates, on behalf of CFAC, for the completion of soil borings and well installations at the CFAC Site as outlined in the RI/FS Work Plan and Phase I SAP. The purpose of the request for bid was so that CFAC could select a qualified driller that is licensed in the State of Montana and has experience in both Rotary-Sonic and Geoprobe drilling methods.

As part of the subcontractor procurement, Roux Associates, on behalf of CFAC, also has entered into a subcontractor agreement with Hydrometrics, Inc, an environmental consulting and engineering firm based in Helena, Montana. Hydrometrics will be providing support to Roux Associates during the Phase I Site Characterization field activities, including drilling oversight, soil sampling, and groundwater sampling.

2.5 Lead Delineation Sampling and Analysis Plan
On January 29, 2016, Roux Associates submitted a letter to the USEPA describing CFAC’s proposed sampling and analysis plan to conduct investigation activities aimed at evaluating the potential presence of, and delineation of, an area of surface soil containing leachable lead at concentrations exceeding the Resource Conservation and Recovery Act (RCRA) criteria for definition of a hazardous waste. The need for this work was determined based upon information provided to CFAC by Calbag Resources (Calbag). On January, 29, 2016, the USEPA provided concurrence with the approach outlined in the sampling and analysis plan via email correspondence.
2.6 Technical Meeting with USEPA and MDEQ at the Site
A technical planning and coordination meeting was held on January 21, 2016 at the CFAC facility. Representatives from the USEPA, Montana Department of Environmental Quality (MDEQ), CDM Smith (USEPA consultant), CFAC, and Roux Associates were present at the meeting. The purpose of the meeting was to discuss preliminary logistics and coordination for the field scope of work planned in 2016. Planning topics that were discussed include personnel roles and responsibilities for the project, schedule, and health and safety. During the meeting, USEPA provided CFAC with verbal comments on the HASP and health and safety project orientation. Meeting minutes documenting the meeting were provided to the USEPA on January 29, 2016.

2.7 Public Meeting
On January 21, 2016, USEPA held a public meeting and CFAC held a meeting of its Community Liaison Panel. The meetings were held together at the Columbia Falls High School. During the meetings, the USEPA provided a presentation summarizing the potential options for community participation. The USEPA also provided an update regarding the potential National Priorities List (NPL) listing for the Site and the potential designation as a Superfund Alternative Site.

During the meeting, CFAC provided a project update and a preliminary schedule for the Phase I Site Characterization work. A representative from Calbag Resources was also present to provide an update on the demolition activities that have been completed, and are ongoing, at the Site.
3.0 WORK PLANNED FOR NEXT QUARTER
This Section provides a summary of activities expected to be completed or ongoing during February through April 2016.

3.1 Investigation Derived Waste Management Plan
As described in the RI/FS Work Plan, Roux Associates will submit an Investigation-Derived Waste (IDW) Management Plan which identifies the approach to manage the various types of waste anticipated to be generated during project activities. Waste management will be conducted to comply with regulatory requirements and ensure protection of human health and the environment. All personnel (including all subcontractors) who handle, transport, store, and/or dispose of IDWs will be trained to comply with requirements set forth in the IDW Management Plan.

3.2 Subcontractor Procurement Activities
Analytical laboratories and data validation firms bidding on the work will submit final bids and qualifications to Roux Associates in February 2016. Roux Associates and CFAC will review the submittals and select the laboratory and data validation firm by the end of March 2016. Following the selection, CFAC will provide the name(s) and qualifications to the USEPA for review in accordance with the AOC.

The drilling companies will submit bids and qualifications to Roux Associates in early February 2016. It is expected that the drilling Subcontractor will be procured by the end of March 2016, at which time CFAC will provide the name and qualifications to the USEPA for review in accordance with the AOC.

3.3 Lead Sampling and Analysis Plan Implementation
Investigation and delineation activities associated with the lead sampling and analysis plan will commence in February 2016. Results of the field activities will be provided to the USEPA in a summary memorandum to be submitted within 30 days of the receipt of the final laboratory data. The summary memorandum will present and evaluate the data, and will be used to determine if a plan to remove the impacted soil is necessary. The data collected during this work will be
incorporated into the RI/FS database and will be included as part of the overall data evaluated during the RI/FS activities described in the RI/FS Work Plan and Phase I SAP.

3.4 Freedom of Information Act (FOIA) Request
As described in the RI/FS Work Plan, Roux Associates will submit a Freedom of Information Act (FOIA) request to various governmental agencies, including the USEPA, MDEQ, and U.S. Army Corp of Engineers (USACE). The FOIA request will request reports of environmental investigations and remedial actions, records pertaining to hazardous substance or hazardous waste activity (permitting records, waste storage and disposal, release response records), results of regulatory site inspections, maps pertaining to any of the above, or any other issues pertinent to the assessment of environmental quality at the Site. The findings from the additional records review will be evaluated to further the understanding of Site history and environmental conditions; and, if appropriate, to update CSM and identify additional areas for investigation.

3.5 Pre-intrusive Task 1 - Site Reconnaissance
Field activities associated with the Phase I Site Characterization are currently proposed to start at the beginning of April 2016, pending snowmelt at the Site. The first activity planned is a detailed Site reconnaissance to document the conditions of the Site.

The objectives of the Site reconnaissance, as described in the RI/FS Work Plan, are:

- Verify existing base maps and aerial photographs (check for accuracy of coordinates using a GPS);
- Refine soil boring locations that are proposed to be biased towards areas of known or suspected areas of contamination;
- Identify any additional areas/Site features where Contaminants of Potential Concern (COPCs) were potentially released and where samples should be collected, based upon visual indications of waste materials, soil piles, staining, stressed vegetation, etc.;
- Develop a further understanding of drainage/overland flow and document any erosional features at the Site that may be contaminant migration pathways;
- Evaluate the conditions of the existing monitoring wells; and
- Confirm accessibility and determine equipment requirements for access to proposed sampling locations.
The Site reconnaissance will be conducted as described in Section 5.2.2 of the RI/FS Work Plan.

**3.6 Pre-Intrusive Task 2 - Geophysical Survey**
Following Site reconnaissance, a geophysical survey will be completed as a screening tool to provide an initial assessment of subsurface characteristics prior to drilling activities. The geophysical survey will employ electrical resistivity technology, with the goal of providing a preliminary understanding of approximate depth to bedrock, approximate depth to groundwater, approximate depth of Site features, potential changes in subsurface hydrogeological conditions, and other subsurface anomalies that may contribute to the delineation of source areas.

As part of the geophysical surveying task, ground penetrating radar (GPR) technology will be utilized to obtain information on the horizontal extent of landfills and associated landfill caps, and potentially the landfill cap thickness. The actual methodology and scope of the geophysical survey task will be finalized in communication with potential geophysical subcontractors based upon an evaluation of the potential benefits towards achieving the RI objectives. The Scope of Work and qualifications of the selected subcontractor will be provided to the USEPA prior to mobilization to the Site in April.

**3.7 Pre-intrusive Task 3 - Soil Gas Survey**
Prior to initiating drilling activities, a soil gas investigation will be conducted as a screening method within RI Areas and Site features where existing information suggests that VOCs could potentially be present.

The soil gas investigation will consist of two elements: 1) field screening of landfill soil gas; and 2) passive soil gas samples collected at the former hazardous waste drum storage area and the former vehicle fueling area. A description of the work associated with each element is described in Section 5.2.4 of the RI/FS Work Plan.
4.0 DATABASE UPDATES

No analytical data was collected and/or validated during the months of November 2015 through January 2016; therefore no analytical data was added to the project database.

On January 26, 2016, Roux Associates submitted a request via email correspondence to the USEPA regarding obtaining a copy of the laboratory Electronic Data Deliverables (EDDs) from the USEPA Site Reassessment Report submitted by Weston Solutions on behalf of the USEPA in 2014. As specified in the RI/FS Work Plan, Roux Associates would like to incorporate this data into the project database for evaluation as part of future project decisions.
5.0 SCOPE/SCHEDULE REVISIONS

No problems were encountered during November 2015 through January 2016 that requires a deviation or revision to the scope of work or the schedule outlined in the RI/FS Work Plan. Additionally, no anticipated problems or delays are expected at this time. The current Phase I Site Characterization schedule is attached to this Progress Report.

On behalf of CFAC, Roux Associates will continue to pursue the overall objectives described in the AOC and the RI/FS Work Plan. Roux Associates will continue to inform the USEPA of completed and upcoming activities pursuant to the requirements of the AOC in future progress reports.

Respectfully submitted,

ROUX ASSOCIATES, INC.

Michael Ritorto
Senior Hydrogeologist
RI Project Manager

Andrew Baris
Vice President / Principal Hydrogeologist
RI/FS Project Manager
Project Schedule
<table>
<thead>
<tr>
<th>Task</th>
<th>Description</th>
<th>Start Date</th>
<th>End Date</th>
<th>Duration</th>
<th>Predecessors</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Project Kickoff</td>
<td>4/4/16</td>
<td>4/15/16</td>
<td>10 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>2</td>
<td>Conceptual Site Survey</td>
<td>4/15/16</td>
<td>5/2/16</td>
<td>10 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>3</td>
<td>Site Characterization</td>
<td>5/2/16</td>
<td>5/16/16</td>
<td>10 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>4</td>
<td>Soil and Waste Analysis</td>
<td>5/16/16</td>
<td>5/22/16</td>
<td>10 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>5</td>
<td>Source Review and ADDA</td>
<td>5/22/16</td>
<td>5/27/16</td>
<td>5 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>6</td>
<td>Preliminary Site Plan</td>
<td>5/27/16</td>
<td>6/2/16</td>
<td>5 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>7</td>
<td>Site Containment</td>
<td>6/2/16</td>
<td>6/24/16</td>
<td>20 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>8</td>
<td>SLERA Review</td>
<td>6/24/16</td>
<td>7/15/16</td>
<td>20 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>9</td>
<td>Site Monitoring andpostgres</td>
<td>7/15/16</td>
<td>8/19/16</td>
<td>45 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>10</td>
<td>Field Data Collection</td>
<td>8/19/16</td>
<td>11/28/16</td>
<td>90 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>11</td>
<td>Draft Report</td>
<td>11/28/16</td>
<td>12/2/16</td>
<td>4 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>12</td>
<td>Final Report</td>
<td>12/2/16</td>
<td>2/27/17</td>
<td>60 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>13</td>
<td>Validation/Completion</td>
<td>2/27/17</td>
<td>5/12/17</td>
<td>35 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>14</td>
<td>Initial Phase II Data Summary Report</td>
<td>5/12/17</td>
<td>5/16/17</td>
<td>4 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>15</td>
<td>Final Phase I Data Summary Report</td>
<td>5/16/17</td>
<td>5/27/17</td>
<td>11 days</td>
<td>EPA/CFAC</td>
</tr>
<tr>
<td>16</td>
<td>Final Report</td>
<td>5/27/17</td>
<td>6/9/17</td>
<td>295 days</td>
<td>EPA/CFAC</td>
</tr>
</tbody>
</table>

**Table Notes:**
- **Duration** is in days.
- **Predecessors** are tasks that must be completed before the task can start.

**Graph Details:**
- The graph shows the progression of tasks with scheduled dates and durations.
- Task progression completeness is indicated by different colors.
- The graph is designed to show how tasks are interrelated and the timeline for completing the project.