

UAF Combined Heat and Power Plant Information Item

PROJECT UPDATE

Construction has been shut down for the winter months and is scheduled to begin on March 1, 2016. Design, bidding, and equipment purchasing activities have been proceeding at full speed.

Overall design is 47% complete and is on schedule to support bidding of major equipment and construction Work Packages. Vendor information from the boiler, turbine, material handling and ash handling vendors has been submitted on time, but was incomplete. The design team has been developing strategies to keep advancing design and the vendors are being pressured for more information. Some of the issues are iterative which adds time to the resolution path. The foundation drawings that were issued for Work Package 2 (WP2) contained areas that are marked "Hold" pending more vendor information. Construction is not expected to be delayed.

The most recent major equipment purchase orders that have been placed are for the stack, material handling system, ash handling system, structural steel, elevator, and boiler feed pumps. Bidding is continuing for electrical equipment, controls, emission monitoring and miscellaneous mechanical equipment. Overall the equipment purchases have been within the budget with some packages under and some equipment over the budget.

Work Package 2 (foundations and steel) was awarded for \$34,000,000 on February 1, 2016. The bids received from material suppliers and subcontractors were within the budget for this Work Package. Construction is scheduled to begin on March 1, 2016 and will then be continuous until completion in November, 2018. Work Package 3 (Boiler Installation) is expected to be awarded in April 2016.

At this time, UAF has contract commitments of \$140,000,000 (56% of the TPC) and has expended \$34,000,000. The contract awards made to date are within the budget allocated in the November 2015 cost estimate. The contingency in that estimate has not been used yet. Several areas of cost risk still remain and won't be clarified until the design has advanced further. In general, cost risks still remain for mechanical piping, controls, electrical, and commissioning. The entire team has been working diligently to control costs.

An air permit revision is required because the scope was changed from two boilers to one boiler. The application will be submitted in mid-February 2016 and a six month approval period is anticipated. Construction can proceed under our current air permit.

A Construction Management Auditor has been selected, OAC Services. Their first report is expected in April 2016.

MILESTONES

Stanley Consultants' Design Contract May 2011 Formal Project Approval December 2013 June 2014 Schematic Design Approval (Site Preparation and Equipment Procurement) Schematic Design and Cost Estimate January 2015 Schematic Design Approval (Site Work) April 2015 Schematic Design Approval (Balance of Project) June 2015 **Boiler Contract Executed** June 2015 Steam Turbine Contract Executed June 2015 Air Cooled Condenser Contract Executed October 2015 Work Package No. 1 Executed (Site Work) June 2015 Work Package No. 2 Executed (Foundations) February 2016 Work Package No. 3 (Boiler Installation) April 2016 Work Package No. 4 (Mechanical) June 2016 Work Package No. 5 (Electrical, Instrumentation and Controls) September 2016 Substantial Completion (start of Commissioning) March 2018 Final Acceptance (completion of Commissioning) November 2018