

Topic: Revay Report cost details

Reference: Exhibit 72.01, IPCAA-AESO-1, Exhibit 72.02, Revay Report, September 9, 2010
AUC Ruling on IPCAA Submission, paragraph 29.

Request:

IPCAA requests that the AESO, working with CPC, provide the actual costs for each of the line items included in the cost estimates provided in Attachments A and B of the Revay Report. Note that Attachments are also labelled Appendices in the index of the Revay Report. These actual costs should be provided for each line item for each project and not aggregated for all three projects. The AESO should also provide explanations for all material cost overruns, by line item for each project.

Response:

Please see Attachment IPCAA.AESO-002 which provides the actual costs for the transformers associated with each of the three Genesee units.

It is not possible to provide actual costs in the same breakdown as the cost estimates, as the actual costs were not recorded in that manner in Capital Power's accounting records. For example:

- invoices from external contractors may have been for more than one activity listed by line item in the estimate, and
- project coordination activities were recorded on the basis of hours to the project rather than to the individual transformers.

The AESO has worked with Capital Power to identify actual costs by generating unit as provided in the attachment. The AESO notes that the cost component totals presented in Attachment IPCAA.AESO-002 differ slightly from the totals provided previously in the summary in information response IPCAA.AESO-001, reflecting a more detailed reconciliation with Capital Power's accounting records.

The unit transformers conversion project required additional equipment monitoring capability and additional detailed coordination beyond what is usually required and had originally been estimated. The AESO requested additional monitoring capability to provide accurate and timely technical information that would have been critical to decision-making in the event of a transformer failure during the conversion project. The AESO requested additional detailed coordination due to the risk to generation supply adequacy on the Alberta interconnected electric system associated with potential contingencies with the project.

As well, costs associated with demobilization and remobilization have been identified in the attachment where possible. Demobilization and remobilization costs accounted for \$464,932 of total actual project costs and represent about 51% of the total variance from the cost estimate.

The majority of demobilization and remobilization costs arise from contractual penalties resulting from delaying the project. Other costs relate to work that needed to be redone to complete the project, including project planning, administration, engineering, plant shutdown planning, and construction planning, as well as coordination activities to support the project.

Escalation of primary contractor labour costs also resulted from the rescheduling of the work to occur in 2008. Escalation accounted for \$249,650 of total actual project costs and represent about 27% of the total variance from the cost estimate.

The project cost variance is provided in more detail in the following table.

Variance Component	Genesee 1	Genesee 2	Genesee 3	All Units	% of Total
Demobilization and remobilization					
Contractual penalties	\$167,325	\$100,275	\$106,875	\$374,475	40.9%
Other costs	47,965	23,799	18,693	90,458	9.9%
Total de/remobilization	\$215,290	\$124,074	\$125,568	\$464,933	50.8%
Escalation of labour costs	111,550	66,850	71,250	249,650	27.3%
Other cost variances	186,381	177,338	(162,848)	200,870	21.9%
Total variance	\$513,221	\$368,262	\$33,970	\$915,453	100.0%

If demobilization and remobilization costs and escalation of labour costs are excluded, actual project costs total \$4,734,938 which is \$200,870 (or 4.4%) more than the approved estimate of \$4,534,068.

Topic: Reports, Agreements and Correspondence relative to the projects involved in the Genesee Generating Station – 500 kV Transformer Upgrade

Reference: September 9, 2010 AUC Ruling on IPCAA Submission, paragraph 30.

Request:

Provide all the reports, agreements and relevant correspondence relative to the CPC projects (identified as the Genesee Generating Station – 500 kV Transformer Upgrade) between the AESO and EPCOR/CPC and between the AESO and other involved parties such as Revay and Associates. This would include, but not be limited to, reports and information provided to the AESO under ISO Rules 9.1.3.1 through to ISO Rule 9.1.3.6.

Response:

The relevant documents for the project are included in the Revay and Associates Cost Review Report, as follows:

- (a) Appendix A: EPCOR-TransAlta Agreement letter with AESO dated February 29, 2008 (for Unit 3 Upgrade);
- (b) Appendix B: EPCOR Agreement letter with AESO dated March 11, 2008 (for Units 1 and 2 Upgrades);
- (c) Appendix E: Four EPCOR Invoices to AESO; and
- (d) Appendix J: RAL's Interim Status Report to AESO dated March 6, 2009.

Appendices A and B (items (a) and (b) above) were included in the redacted Cost Review Report provided as Attachment IPCAA.AESO-001 on July 5, 2010.

Appendices E and J (items (c) and (d) above) are included in the unredacted Cost Review Report provided to the Commission on September 15, 2010.

ISO Rule 9.1.3 relates to project reporting by designated owners of transmission facilities (TFOs). As the unit transformers conversion project related to facilities associated with generating units, the AESO did not require monthly reporting by Capital Power. However, as noted in information response IPCAA.AESO-002, the AESO requested additional detailed coordination for the project and was apprised throughout the project of scope and schedule changes. As well, given that the AESO would be validating the quantum of costs incurred through the Revay and Associates cost review report, the AESO did not require a final cost report as contemplated under ISO Rule 9.1.3.6.

Topic: Confirmation of accuracy of amounts untested in Revay Report

Reference: Exhibit 72.01, IPCAA-AESO-1, Exhibit 72.02, Revay Report, September 9, 2010 AUC Ruling on IPCAA Submission, paragraph 33. Refer also to IPCAA's July 30, 2010 Submission, paragraph 15, page 7.

Request:

Confirm the accuracy of the EPCOR/CPC in-house labour costs and Capitalized Interest Costs used in the final project amounts proposed to be approved by the AUC. Include the supporting details.

Response:

The AESO has confirmed with Capital Power the accuracy of the in-house labour costs and capitalized interest costs used in the final project amounts, and has worked with Capital Power to provide the following additional information.

In-House Labour Costs

Capital Power's in-house labour costs for the project were \$731,272 or 13.4% of the project's total cost.

Additional information on Capital Power's in-house labour costs is provided below.

Component	Total (\$)	Hours	Average Rate (\$/hr)
Direct labour			
Regular	\$212,935	6,781	\$31.40
Overtime	41,222	503	81.95
Total direct labour	\$254,157		
Burden rate	51,414	<i>vacation and benefits on direct labour</i>	
Contracted labour	120,618		
Direct expenses	14,913		
Overhead charge	290,170	<i>administration and general expense allocated to project</i>	
Total in-house labour	\$731,272		

Capitalized Interest Costs

Capital Power's capitalized interest costs are calculated on a monthly basis and reflect a short-term borrowing rate based on the Canadian prime lending rate applicable at the time. For

example, a short-term annual rate of 4.75% would be converted to a monthly rate of 0.40%, which would be applied to the amount of capital spent over the course of the project.

Annual interest rates between 4.75% and 6.50% were applicable in the months during which capital was spent over the course of the unit transformers conversion project.

Capitalized interest is calculated by applying a half-month rule to new capital incurred. That is, the opening balance of outstanding capital for the current month incurs interest at the full applicable rate, while capital incurred during the current month incurs interest at half of the applicable rate. The same half-month rule is also applied in the final month at project completion.

The average capital balance outstanding during the project was \$1,142,730. The total capitalized interest for the project was \$87,394 which represents 1.6% of the total cost of the project.