NEWFOUNDLAND AND LABRADOR BOARD OF COMMISSIONERS OF PUBLIC UTILITIES

AN ORDER OF THE BOARD

NO. P.U. 12(2013)

1	IN THE MATTER OF the Electrical Power
2	Control Act, 1994, SNL 1994, Chapter E-5.1 (the
3	"EPCA") and the Public Utilities Act, RSNL 1990,
4	Chapter P-47 (the "Act") and regulations thereunder;
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6	AND
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8	IN THE MATTER OF an application by Newfoundland
9	and Labrador Hydro for approval to refurbish the marine
10	terminal at the Holyrood Thermal Generating Station
11	pursuant to Section 41 of the Act.
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15	The Application
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17	On February 20, 2013 Newfoundland and Labrador Hydro ("Hydro") filed an application for
18	approval of \$5,198,000 in supplemental capital expenditures in 2013 to refurbish the marine
19	terminal at the Holyrood Thermal Generating Station (the "Application").
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21	On February 25, 2013 the Board forwarded a schedule for the consideration of the Application
22	to Newfoundland Power, the Consumer Advocate Mr. Thomas Johnson, and the Industrial
23	Customers (Corner Brook Pulp and Paper Limited, North Atlantic Refining Limited and Teck
24	Resources Limited).
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26	On March 4, 2013 the Board, the Consumer Advocate and the Industrial Customers submitted
27	Requests for Information (RFIs) to Hydro. Responses to the RFIs were filed on March 13,
28	2013. The deadline for parties to file comments was March 20, 2013. The Consumer Advocate
29	filed a written submission on that date. The Industrial Customers advised by letter they had no
30	comments on the Application. There was no filing from Newfoundland Power.
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32	On March 22, 2013 Hydro provided a written response to the Consumer Advocate's
33	submission,

Background

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As part of its 2012 Capital Budget Application filed with the Board on August 3, 2011 Hvdro submitted a capital project to refurbish the marine terminal at the Holyrood Thermal Generating Station in the amount of \$5,859,000. In Order No. P.U. 5(2012) the Board denied this project, finding that the evidence did not clearly demonstrate that it was necessary to replace fender 4. and that inspections should be conducted prior to doing any of the work.

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On August 8, 2012 Hydro filed its 2013 Capital Budget Application. In Order No. P.U. 2(2013) the Board approved Phase I capital expenditures of \$36,405,300 and, in Order No. P.U. 4(2013), approved Phase II capital expenditures of \$25,867,200.

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A supplemental 2013 capital expenditure of \$284,100 was approved in Order No. P.U. 1(2013) for the refurbishment of the stop logs at the Burnt Dam Spillway.

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Evidence and Submissions

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A report, Refurbishment of the Marine Terminal, Holyrood Thermal Generating Station, was filed with the Application which sets out in detail the required work, project schedule, and justification. The report states that the Holyrood marine terminal facility is an integral component of the fuel oil handling system, and is the single point of entry for all of the No. 6 (Bunker C) fuel oil utilized by the plant. However, according to Hydro, the facility is unable to provide a safe docking environment for vessels which utilize it to offload oil due to the fact that the structure has aged and the condition of the gravity fender system has deteriorated. This has resulted in missing, worn, and inoperable gravity fenders. The fenders serve to protect the hull of the vessels from damage during docking and fuel oil offloading operations, and are a critical component in the safe docking and fuel oil offloading processes.

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In 2008 one of the concrete fenders detached from the structure and fell to the sea bottom. Emergency repairs were completed on fender 3 and temporary refurbishments were completed on fenders 5 and 6. Hydro also implemented a revised docking procedure for vessels offloading at the facility to minimize the forces generated on the fenders during docking. The repairs were not designed to be used on a permanent basis but to facilitate fuel shipment through the winter of 2008-2009. To initiate the completion of permanent repairs, Hydro commissioned Hatch to complete a condition assessment of the marine terminal and provide recommendations to extend the service life of the structure an additional 40 years. The final report was submitted to Hydro on December 20, 2010.

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With the announcement of the proposed Labrador interconnection in 2011 Hydro requested that Hatch revisit the report findings and revise the recommendations to include only the least-cost options considered to be critical to ensuring the continued operation of the facility for the next ten years. The revised report was submitted to Hydro on April 29, 2011 and establishes the scope of work for this proposal.

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In addition to the limitations on docking capacity, there are numerous deficiencies which present life safety issues during the fuel offloading process. These are outlined in Section 7 of 45 Hatch's report (Application, pgs. B29-B31) and include the lack of a man-overboard 46

retrieval/recovery system and limited support vessel access to the marine terminal facility. Concerns with the inadequate deck lighting system were also noted as an issue.

In his submission the Consumer Advocate states that, while Hydro's position is that two functioning fenders on both the North and South ends of the jetty are essential, neither Hydro nor Hatch can provide support for this opinion in any of the published standards and/or guidelines referred to in its report. The Consumer Advocate notes that Hydro has proposed to keep the revised docking procedure in place over the proposed project's life, which includes monitoring to ensure that vessels do not attempt to dock in unfavourable conditions. The Consumer Advocate recommends that "...the fender aspect of the proposed project be denied at this time pending Hydro providing to the Board and the parties evidence as to what current modern standards would require by way of fendering in the context of the revised docking procedures that have been instituted by Hydro."

Hydro submits that the Consumer Advocate:

 "has submitted no evidence that the fender work Hydro is proposing is in contravention of any standard;

• that the standard which the Consumer Advocate seeks from Hydro as justification does not, to Hydro's knowledge, exist; and

 • has submitted no expert evidence to refute the assertions of Hydro's internal and external professional engineers that the fendering work is a critical requirement."

Hydro also notes that none of the other parties submitted arguments that this project should not be approved and maintains that the project is essential to provide a safe docking environment.

Discussion

 In Order No. P.U. 5(2012) the Board found that a conservative approach in relation to the marine terminal facility is appropriate given the limited expected future use of this facility which Hydro estimates to be in the order of 50 shipments. Based on the evidence the Board also found that Hydro should conduct inspections first and then apply for approval to do any required work.

 In this Application Hydro confirms that it "...currently has no planned use for the marine terminal beyond 2021 when the Holyrood Thermal Generating Station is no longer required to serve as a source of generation." (CA-NLH-3) It is in this context that the approval for this expenditure of \$5,198,000 must be considered and the Board must be satisfied that the proposed work is necessary and is the least cost alternative.

In PUB-NLH-1 the Board requested Hydro to explain how it had complied with the requirement "to conduct inspections prior to doing any of the work" as required in Order No. P.U. 5(2012). Hydro stated that it understood that there were two inspections to be completed – inspections pertaining to both the gravity fenders and the steel piles and anodes. Hydro maintains that it has completed the required inspection on the gravity fender system by engaging Hatch to conduct an inspection, on an annual basis, since the implementation of the temporary repairs in 2008. Because of the structural make-up of the gravity fenders the ability

to conduct a detailed "hands-on" inspection is restricted so observation of the fender system under operating conditions is the only practical method to measure the fender condition.

In terms of the sacrificial anodes the Application only includes costs to complete the inspection of the steel piles and anodes. Hydro believes the greatest savings on inspection costs can be achieved by grouping these inspection costs with the jetty repairs. A determination on any required work on the steel piles and anodes will be made once Hydro has received the results of the inspection.

The Board also queried whether Hydro had considered re-doing temporary repairs to extend the life of the fenders. Hydro's response is that the "permanent repairs" referred to in the Hatch report reflect the minimum upgrade requirements necessary to ensure the continued operation of the facility for the next eight years. The scope of work to extend the service life of the marine terminal beyond 2021 is extensive and associated costs much higher. (PUB-NLH-2; CA-NLH-13)

The Consumer Advocate argues that approval of the proposed work for the fendering system be denied because Hydro has not provided evidence on published standards for dock fendering support. The Board notes Hydro's reply that, to its knowledge, no such standard exists. The Board also notes the comments of Hatch, Hydro's professional engineering consultants, in its May 16, 2012 letter to Hydro (Application, pg. A3):

"Hatch is concerned for the operational and environmental safety of the jetty. We cannot predict when the next failure will occur but we can identify where there are serious failure risks. In our opinion, continuing to dock vessels at the facility, without completing the permanent repairs to the North side fenders and installing a replacement for the missing fender on the South end, jeopardizes the safe docking of fuel tankers.

Hatch has repeatedly requested permanent repairs to be made to this vital facility. We cannot over emphasize the potential risk to ship safety and the environment that currently exists at the marine terminal."

Hydro relies on this professional opinion as the basis for its proposal for fender repairs. The concerns identified are significant and the potential risk and consequences of not proceeding with the necessary fender repairs cannot be ignored. The Board agrees that this project should proceed as proposed as soon as possible.

The Board is satisfied that Hydro has addressed the concerns set out in Order No. P.U. 5(2012) with respect to the fender system and that the Application contains proposals for only that work required on the fender system to provide for safe and reliable operation of the facility to 2021. The Board is also satisfied that the remaining components of the project, including the inspection of the steel pile foundations, anodes and attachment brackets, and the life safety improvements should also be completed. The Board will approve the supplemental 2013 capital expenditure of \$5,198,000 as proposed.

IT IS THEREFORE ORDERED THAT:

- 1. The proposed 2013 capital expenditure of \$5,198,000 for the refurbishment of the marine terminal at the Holyrood Thermal Generating Station is approved.
- 2. Hydro shall pay all expenses of the Board arising from this Application.

DATED at St. John's, Newfoundland and Labrador, this 11th day of April, 2013.

Darlene Whalen, P.Eng.

Vice-Chair

Commissioner

Board Secretary