

May 25, 2006
Mr. Shiu Ng, P.Eng.
Works Manager
Hamilton Specialty Bar Corporation
319 Sherman Avenue North
P.O. Box 2943
Hamilton, Ontario,
L8N 3R5

Dear Mr. Ng:

**Hamilton Specialty Bar Corporation – Replacement of 115 kV switches 92-HL3 & 92-HL4
Notification of Conditional Approval of Connection Proposal
CAA ID Number: 2006-EX276**

Thank you for the information regarding the replacement of two 115 kV switches (92-HL3 and 92-HL4) at Hamilton Specialty Bar. The existing switches are reaching end of life and the new switches are scheduled to be installed before the end of July 2006.

From the information provided, our review concludes that the proposed changes will not result in a material adverse effect on the reliability of the IESO-controlled grid. Subject to your signed acknowledgment below, the IESO is pleased to grant conditional approval for the proposed modifications, subject to the implementation of the requirements detailed in the attached assessment report. Any material changes to your proposal may require re-assessment by the IESO in accordance with Market Manual 2.10, and may nullify your conditional approval.

Final approval will be granted upon successful completion of the IESO Market Entry process. During this process you will be expected to demonstrate that you have fulfilled the requirements and the modification is in line with the proposal assessed by the IESO. Please contact market.entry@ieso.ca if you have not received a Facility Registration Summary package within the next 10 days.

For further information, please contact the undersigned.

Yours truly

Michael Falvo
Manager - Transmission Assessments & Performance
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cc: IESO Records

**Hamilton Specialty Bar Corporation – Replacement of 115 kV switches 92-HL3 & 92-HL4
CAA ID Number: 2006-EX276**

Hamilton Specialty Bar Corporation acknowledges receipt of the System Impact Assessment Report setting out the IESO requirements for final approval, and commits to fulfill these requirements, and all other applicable Market Rules, before receiving final approval to connect to the IESO-controlled grid.

Dated: _____

Per: _____

Name: _____

Title: _____

ASSESSMENT SUMMARY

Hamilton Specialty Bar Corporation

Replacement of 115 kV switches 92-HL3 & 92-HL4 CAA ID Number 2006-EX276

1.0 GENERAL DESCRIPTION

Hamilton Specialty Bar is planning to replace 115 kV switches 92-HL3 & 92-HL4 reaching end-of-life. The switches are used to isolate transformers T1 and T2 which are connected to circuits HL4 and HL3 respectively. The attached single line diagram shows the facility and switches to be replaced.

The proposed work is scheduled to be completed by the end of July 2006.

2.0 PROPOSED MODIFICATION

The proposed new switches will be Southern States Type EVB with the following ratings:

Nominal Voltage	115 kV
Maximum Voltage	121 kV
BIL	550 kV
Continuous Amps	1200 A
Momentary Amps	61,000 A

The existing Kearney switches have a voltage rating of 138 kV and continuous current rating of 600 Amps.

3.0 ASSESSMENT

Since a connection Assessment study was not required, this assessment was performed under the Expedited Connection Assessment Process.

The Market Rules require that all equipment with a nominal voltage of 115 kV must be able to operate in the range between 113 kV – 127 kV. The new switches have a maximum voltage capability of 121 kV which is lower than the maximum voltage requirements.

Based on the Transmission System Code (Appendix 2), all 115 kV interrupting devices should have an interrupting capability of 50 kA. The new switches are rated above this performance standard set in the TSC and it can be concluded that the short term thermal ratings of the new switches are adequate.

The assessment indicates that the ratings of the new switches are either higher or very close to the existing switches. The installed switches will operate and remain in their original configuration and location. Hence, these replacements represent like-for-like exchanges and will not have any material adverse effect on the IESO-controlled grid.

4.0 CONCLUSIONS AND REQUIREMENTS

It can be concluded that the replacement switches represent like-for-like exchanges or improvements of existing equipment. However, the switches maximum voltage rating of 121 kV does not meet the Market Rule requirement of operating between 113 kV to 127 kV.

- **It is required that the new switches be able to operate at a continuous system voltage ranging from 113 kV to 127 kV.**

On-line Monitoring

The Market Rules (Chapter 4 section 7.5) require that each connected wholesale customer shall provide the IESO on a continual basis with on-line monitored quantities as specified in Appendix 4.17. The status of the old switches are monitored by the IESO on a continual basis and the IESO requires that the status of the new switches be monitored the same way.

- **It is required that Hamilton Specialty Bar Corp. retain all the equipment required to monitor the information required by the IESO on a continual basis.**

Protection Systems

With respect to the protection and telecommunication requirements, the connection applicant will have to follow the Transmission System Code technical requirements.

- **It is required that Hamilton Specialty Bar Corp. meet the requirements with respect to protection systems and coordination with the existing protection systems as outlined in the Transmission System Code.**

This work will not have any material adverse effect on the IESO-controlled grid.

5.0 NOTIFICATION OF APPROVAL

This expedited System Impact Assessment concludes that the installation of a replacement switches at Hamilton Specialty Bar Corporation will have no have a material adverse effect on the IESO-controlled grid. It is therefore recommended that a Notification of Conditional Approval of the Connection Proposal be issued, subject to the requirements detailed above.

Specialty Bar CTS
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