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March 3, 2008

**BY COURIER (10 COPIES) AND EMAIL**

Ms. Kirsten Walli  
Board Secretary  
Ontario Energy Board  
P.O. Box 2319  
2300 Yonge Street, Suite 2700  
Toronto, Ontario M4P 1E4  
Fax: (416) 440-7656  
Email: boardsec@oeb.gov.on.ca

Dear Ms. Walli:

**Re: Pollution Probe – Written Interrogatories – Part 2  
EB-2007-0050 – Hydro One – Bruce-Milton Transmission  
Reinforcement Project**

Pursuant to the Board's oral decision on February 21, 2008 and Procedural Order No. 5, please find enclosed Pollution Probe's second set of written interrogatories to Hydro One for this matter.

Yours truly,

A handwritten signature in dark ink, appearing to read "Basil Alexander", with a stylized flourish above the name.

Basil Alexander

BA/ba

Encl.

cc: Applicant and Intervenors per Procedural Order #4

**Pollution Probe's Interrogatories for Hydro One – Part 2**

March 3, 2008

**Interrogatory No. 14**

**Ref.** *Ontario Energy Board Act, 1998*, section 92; Technical Conference Presentation by Hydro One, Panel 1, Existing Facilities and Grid Operation, Need, Alternatives and Evaluation, and Near-term & Interim Measures, "Bruce Area Generation Beyond 2014" October 15/16, 2007

**Issue Number 1.0**

**1.0 Issue:** Project Need and Justification

**Request**

- a) Please provide all existing documents and analyses conducted to date that consider or are regarding the refurbishment of any Bruce B units.
- b) Please provide all existing documents and analyses conducted to date on possible new Bruce area nuclear units, including current estimates of costs of construction and operation.

**Interrogatory No. 15**

**Ref.** *Ontario Energy Board Act, 1998*, section 92; Technical Conference Presentation by Hydro One, Panel 1, Existing Facilities and Grid Operation, Need, Alternatives and Evaluation, and Near-term & Interim Measures, "Bruce Area Generation Beyond 2014" October 15/16, 2007

**Issue Number 1.0**

**1.0 Issue:** Project Need and Justification

**Request**

If there is no future refurbishment of the Bruce B reactors after they come to their current end of life, what is the need for transmission capacity out of the region as each of the four Bruce B reactors reach the end of their current lives and no longer deliver electricity to the grid?

## **Interrogatory No. 16**

**Ref.** *Ontario Energy Board Act, 1998*, section 92; Technical Conference Presentation by Hydro One, Panel 1, Existing Facilities and Grid Operation, Need, Alternatives and Evaluation, and Near-term & Interim Measures, October 15/16, 2007 Section 6. “Near Term and Interim Measure Improvements”

### **Issue Number 1.0**

#### **1.0 Issue: Project Need and Justification**

#### **Request**

Please provide the following information:

- a) What are the total costs associated with the implementation of each of the transmission system improvements below?
- b) In what year or years are those costs incurred?
- c) What is the increased transmission system capability away from the Bruce area for each transmission system improvement?
- d) What is the cumulative total transmission transfer capability away from the Bruce area after each transmission system improvement is completed? and
- e) In what year does each incremental transmission capability increase occur?

The transmission system improvements referenced above include:

- a) Near term improvements including the Hanover to Orangeville line and dynamic and static reactive resources at various southwestern Ontario substations;
- b) Medium-term improvement or “interim” measure of expansion of Bruce special protection system and employment of generation rejection system;
- c) Medium-term improvement of implementation and employment of series compensation on the southwestern Ontario 500 kV system;
- d) Any other transmission system improvements not covered by these stated near-term and medium term measures; and
- e) The proposed double-circuit 500 kV lines from Bruce to Milton.

**Interrogatory No. 17**

**Ref. Exh. B / T 1 / S 1** page 3, “Other alternatives considered”

**Issue Number 1.0**

**1.0 Issue:** Project Need and Justification

**Request**

- a) Has Hydro One or the OPA conducted any analyses of the total costs of transmission alternatives that exclude the proposed Bruce to Milton 500 kV double circuit or other new double circuit 500 kV lines or HVDC lines, and instead include generation rejection schemes (including expected “operating” costs or costs of invoking generation rejection schemes)?
- b) If so, please provide those studies.
- c) In particular, has Hydro One or the OPA assessed the expected level of operation or likelihood of use of any Bruce-area generation rejection schemes during the period 2011-2020 due to forced outages of the 500 kV or lower voltage transmission system in the region?
- d) If so, please provide those analyses and their results.

**Interrogatory No. 18**

**Ref. Exh. B / T 1 / S 1**, page 3, “Other alternatives considered”

**Issue Number 1.0**

**1.0 Issue:** Project Need and Justification

**Request**

For the potential use of Bruce area generation rejection schemes, please provide the following requested information or answers:

- a) Any and all documents or analyses developed by Hydro One or the OPA concerning the historical and forecasted future use of generation rejection schemes at the Bruce site.
- b) What are the historical levels of forced outages on the 500 kV transmission system in the Ontario Southwest Area? Please provide all documentation or studies that address the actual level of forced outages that have been experienced with the transmission system in this region. Please also include both the number and duration of outages by year.

### **Interrogatory No. 19**

**Ref.** EB-2007-0050, Exhibit B, Tab 6, Schedule 5, Appendix 6, IPSP Discussion Paper #7, Integrating the Elements, page 162, Table 10.1

#### **Issue Number 1.0**

**1.0 Issue:** Project Need and Justification

#### **Request**

- a) Please provide detailed, year-by year breakdowns of the specific resources that comprise the “Existing Nuclear”, “Refurbished Nuclear” and “New Nuclear” resources listed in Table 10.1.
- b) Please provide detailed, year-by year breakdowns of the specific resources that comprise each of the remaining categories of resources listed in Table 10.1.
- c) Please confirm that Hydro One uses the resources projection values in Tables 10.1 and 10.2 in determining need for the proposed transmission circuits.
- a) For both of responses to a) and b), please provide a copy of the data electronically in an MS Excel spreadsheet or other spreadsheet readable format.

### **Interrogatory No. 20**

**Ref.** EB-2007-0050, Exhibit B, Tab 6, Schedule 5, Appendix 6, IPSP Discussion Paper #7, Integrating the Elements, page 130, Preliminary Plan price for new and refurbished nuclear plant.

#### **Issue Number 1.0**

**1.0 Issue:** Project Need and Justification

#### **Request**

- a) What is the “refurbished contract price” or yearly price stream associated with any Bruce B refurbishment power and over what years is this price assumed?
- b) Please provide all analyses in support of the use of the refurbished price reported in a) above.
- c) What is the assumed contract price or yearly price stream associated with any new nuclear units at the Bruce B site and over what years is this price assumed?
- d) Please provide all analyses in support of the use of the “new nuclear” price reported in c) above.

**Interrogatory No. 21**

**Ref.** EB-2007-0050, Exhibit B, Tab 6, Schedule 5, Appendix 6, IPSP Discussion Paper #7, Integrating the Elements, page 133-134, Congestion Management Settlement Uplift.

**Issue Number 1.0**

**1.0 Issue:** Project Need and Justification

**Request**

- a) How does the congestion management settlement uplift (CMSU) amounts used by OPA affect the value of Bruce area generation relative to GTA generation?
- b) For each year of the IPSP planning period and out to 2037, please provide the OPA's or Hydro One's estimate of the effect of the CMSU, in total dollars per year and in dollars per MWh of Bruce area generation.