NextEra Energy Canada Bluewater Wind Energy Centre

Community Liaison Committee (CLC): Meeting #4

April 7th, 2015 6:00 p.m. to 8:00 p.m.

Stanley Community Centre 38594 Mill Road Varna ON N0M 2R0

NOTE: This meeting package was compiled by the CLC Coordinators and Facilitators (AECOM) and as such may be subject to clarification or correction by NextEra Energy Canada and its technical staff/specialists. The CLC members will be notified of any revisions to the meeting package, and the final package will be posted and available for public review on NextEra Energy Canada's website.





Agenda

1. Introductions

- 2. Recap of CLC Meeting # 3
 - Construction process
 - Operations Overview
 - Public Attendance and Depositions
- 3. Parking Lot Items and any Questions/Comments Raised since the Third CLC Meeting
- 4. Update on Post-Construction Activities
- 5. Monitoring and Mitigation Measures
- 6. Retirement and Decommissioning Process
- 7. Ongoing Access to Information or Providing Input
- 8. Conclusion of the CLC
- 9. Depositions, if any requests received



Introductions

CLC Members:

- Paul Steckle
- Judy Keightly
- Dean Jacobs
- Kevin Wilbee

CLC Coordinators and Facilitators (AECOM):

- Avril Fisken
- Adam Wright

NextEra Energy Canada:

- Catie Mitchell, Business Manager
- Jeff Damen, Construction
- Andrea Garcia, Environmental Services
- Doug McIntosh, Regional Operations Manager
- Jeffrey MacFarlane, Operations Manager

Consultants

Christy Humphrey, NRSI



Recap: CLC Meeting #3 Purpose of the CLC

- A forum for two-way communication between NextEra Energy Canada and the public
- An opportunity to provide additional information and updates, and to respond to questions or concerns related to:
 - Construction and installation
 - Use and operation
 - Maintenance
 - Retirement of the Facility

Project Overview:

- Class 4 Wind Facility, in the Municipality of Bluewater and a transmission line that extends into Huron East in Huron County
- 37 turbines, with 80 metre towers and 50.5 metre blades
- A generating capacity of 60 MWs
- Status of studies and approvals.
- Outline of construction process

Public Attendance and Depositions:

- Local residents in attendance.
- · No depositions.





Recap: CLC Meeting #3

Meeting Summary for our 3rd CLC Meeting:

- Draft minutes were prepared by AECOM and circulated to the CLC on January 30, 2015
- Members were asked to advise AECOM of any errors, omissions or changes by February 13, 2015
- All recommended comments/changes were incorporated and the minutes were posted on NextEra's publically accessible website on February 18, 2015
- CLC members were also emailed the final minutes on February 18, 2015





Recap: CLC Meeting #3 – Post-Construction and Operations

- Construction Clean up, Modifications and Road Repairs: July 2014 onward
- Reclamation: (August to Spring 2015)
- Wind Turbine Commissioning: July 19, 2014
- Operations Update and Maintenance Scheduling
- Operations Complaint Resolution process
- Monitoring and Mitigation Measures





Recap: CLC Meeting #3 – Parking Lot Items

Parking Lot Concern	Response to Concern
Indirect Economic Benefits	NextEra to provide study regarding indirect economic benefits.
Information regarding seed mixture.	NextEra to provide information regarding seed mixture for CLC meeting #4.
Link to NextEra's emergency protocol.	Link to be included in FINAL Meeting Summary for CLC #3.
Ratio for Butternut re-planting	NextEra to provide butternut re-planting ratio in Meeting Summary for CLC #3 (see pg. 11).
Update of the Community Benefits Agreement	NextEra to provide update for CLC meeting #4.
More information regarding the indexing of the CVF.	NextEra to provide additional information regarding indexing of the CVF for CLC meeting #4.



Status of Post-Construction Activities

1) Modifications and Road Repairs: largely complete

 NextEra is complete with its physical restoration work but has an agreement in place with the Municipality of Bluewater to pay for the restoration of key roads that were used during construction. This concluded in September 2014 and payment was made to the Public Works department to complete necessary repairs.

2) Reclamation: (August to Spring 2015)

- Stripped soil will be replaced and re-contoured in the construction areas and disturbed areas will be reseeded during appropriate conditions for germination (as seasonality allows).
- The majority of the restoration work in 2015 will be drainage repair related



Update on Operations

Wind Energy Centre Reached Commercial Operation: July 19, 2014

- Operations building located in Zurich
- Over 133,000 megawatt hours of wind energy has been produced since commercial operation. The average home uses approximately 1 megawatt (1 million watts) of energy each month.
- The facility has been operating extremely well with an Availability Factor > 98%.
- Bluewater Wind employs 4 Full Time employees as well as more than a dozen shared specialists in Ontario
- Operations staff have completed both the required 500 hour "Break In" maintenance on all turbines and the first semi-annual scheduled service.





Operations – Complaint Resolution:

- NextEra acknowledges that some members of the community may have concerns regarding construction activities and long-term wind farm operations.
- To resolve disputes in a collaborative manner, NextEra follows its complaints resolution process.
- Should any complaints arise throughout the course of the construction, operation and decommissioning phases, a NextEra representative will contact the complainant to understand and seek a resolution.
- NextEra will notify the local MOE (Ministry of Environment) district office of the complaint within 2 business days of receipt of the complaint (1 business day if the complaint is related to Ground Water).
- The MOE notification will include:
 - Description of the nature of the complaint;
 - Wind direction at the time of the incident related to the complaint;
 - Time and date of the incident related to the complaint; and
 - A description of the measures taken to address the cause of the incident and to prevent a similar occurrence in the future



Operations – Complaint Resolution, cont'd:

- NextEra will provide the local MOE district office with a written records of the complaint within 8 business days of the complaint.
- As soon as possible, no later than three (3) days call complainant to follow up.
- Prepare letter to respond to customer/citizen and mail within 5 days of receiving complaint.
- Information requests and complaints about the local operations and maintenance can be addressed to:

NextEra Energy Canada, LP 390 Bay Street, Suite 1720 Toronto, ON M5H 2Y2

Toll Free Phone: 1-877-463-4963

Main Office Line: 416-364-9714

Email: bluewater.wind@nexteraenergy.com

Website: www.NextEraEnergyCanada.com



Monitoring and Mitigation Measures

- Species-At-Risk (SAR) Monitoring
 - Annual Report on the 2014 Species at Risk mortality monitoring has been prepared.
 (Not required to be submitted to the MNR, it is required that we keep it on file at the site).
 - All 45 turbines were searched monthly
 - Two Species at Risk mortalities were observed in 2014. In response, we adhered to the measures required by our Operational Mitigation plan and conducted a habitat assessment within 200m of the turbine at which the mortality was found. We also increased the frequency of monitoring at those turbines from monthly to weekly for the remainder of the 2014 season
 - Species at Risk Monitoring continues for the life of the project
 - 2015 Species at Risk monitoring will begin May 1 and continue through October 31

Bird and Bat Monitoring

- Monitoring will be conducted in accordance with requirements of the REA and MNR Guidelines
- Monitoring will begin May 1, 2015
- Turbine searches will occur twice weekly from May 1st through October 31st, and raptor surveys will continue weekly from November 1st through November 30th.
- Correction factors are applied in order to calculate overall estimated mortality rates across the project
- Annual report provided to MNR by March 1 following each year of monitoring
- A minimum of 3 years of monitoring are required





Monitoring and Mitigation Measures

• Environmental Effects Monitoring Plan:

 In accordance with the requirements of Ontario Regulation (O.Reg.) 359/09, the Environmental Effects Monitoring Plan addresses various elements including, but not limited to, heritage and archaeological resources, natural heritage features and noise.

• Noise

 The Provincial Environmental Protection Act (EPA) requires that noise emissions for any new projects must not have any adverse effects on the natural environment and not exceed 40dBA when wind speeds are of 6 metres/second and below.

NOTE: the allowable noise levels increase during higher wind speeds.

- The Acoustic Emission report was submitted on February 5th, 2015, to the Ministry of the Environment and Climate Change (MOECC). The facility is operating below the maximum noise emissions thresholds set by the MOECC.
- Noise emissions will not likely change unless there is damage to the equipment (immediately recognized by the computer monitoring system and addressed by the operations team).
- The Acoustic Immission audits commenced in Fall 2014, and will continue through Spring 2015. The Fall Acoustic Immission report will be submitted by July 2015, and the Spring Acoustic Immission report will be submitted by January 2016.



Retirement and Decommissioning

Lifespan

- The average lifespan of a turbine is 25 years.
- At the end of its lifecycle, a wind facility can either be decommissioned or repowered.

Repowering:

- If the economics are viable, a facility may be repowered with new technology.
 - NextEra Energy has replaced hundreds of old turbines with 34 Siemens 2.3 MW machines at the Altamont Pass facility in California. Several kms of overhead electrical lines, electrical poles and redundant service roadways were also removed.

Decommissioning:

- The process and impacts are similar to the construction phase, but in reverse sequence:
- Temporary Work Areas:
 - Creation of temporary work areas (50 m x 50 m area with topsoil removed).
 - Creation of crane pads (15 m x 35 m area with topsoil removed and crushed gravel added).
- Removal of Equipment and Buildings:
 - Use of cranes to remove the blades and hub and tower segments and use of trucks for the removal of turbines, towers and associated equipment.
 - Removal of above-ground lines and poles that are not shared with Hydro-One and filling of holes with clean fill.
 - Demolition of the substation.
 - Removal of roads and replacement with clean sub- and top-soil, unless the landowner requests that the roads be left in place.



Retirement and Decommissioning

Decommissioned Equipment Left in Place:

- Underground electrical lines will be cut and the ends buried 1 m below grade. These
 lines are inert and will have no negative impacts on the environment, soil and cultivation
 practices.
- Foundations will be left in place. The top 1 m will be removed and replaced with clean fill and stockpiled topsoil to allow for cultivation of agricultural lands.

Recycling:

• All materials will be recycled, where possible, or disposed offsite at an approved and appropriate facility.



Ongoing Community Involvement and Access to Information

NextEra Community Support:

- Local business and member of the community.
- Continued work with local businesses and vendors and use of local services/materials when possible.
- Community Vibrancy Funds established with Municipality of Huron East
 - A Community Vibrancy Fund was established in 2013 to support community initiatives and partnerships that may not be otherwise financially feasible through the local tax base. Varna Wind, LP, will contribute \$49,000 annually for the next 20 years to the Municipality of Huron East.
- Local Charitable contributions

NextEra Website:

- The project information on NextEra's website will be live indefinitely.
- Further communication may be posted on the website, or done via direct mail or through the media
- General Requests for Information:
- Email: <u>bluewater.wind@nexteraenergy.com</u>

Telephone: 1-877-463-4963



Conclusion of the CLC Process

Requirements Under the Renewable Energy Approval (REA):

- NextEra must make reasonable efforts to form a Community Liaison Committee (CLC) in order to facilitate two-way communications on issues or concerns related to the construction, installation, use, operation, maintenance and retirement of the Facility.
- The CLC is to operate for a minimum of two years from its formation and meet at a minimum twice a year.

CLC Meetings Held To-Date:

- 4 CLC Meetings
 - CLC # 1 October 16, 2013
 - CLC # 2 May 21, 2014
 - CLC # 3 December 10, 2014
 - **CLC # 4** April 7, 2015
- Site Tour May 21, 2014

Requirement for Future CLC Meetings:

• As per the REA, at the end of the two-year period, NextEra and the MOECC will discuss whether or not the CLC should continue operating.



Depositions from Members of the Public

- The CLC meetings are open to the general public for observation.
- Brief depositions (up to 3 per meeting, at a maximum of 5 minutes each) may be made by members of the general public, providing the depositions pertain to items on the meeting agenda (i.e., the construction, installation, use, operation, maintenance and retirement of the Facility).
- Depositions will be selected at the discretion of the CLC Facilitator and in consultation with the CLC members and NextEra.
- No depositions received



Thank you!

NextEra Energy Canada and AECOM would like to sincerely thank all the CLC members for donating their time over the past two years and for their valuable input and interest in the project.



April 7, 2015