PROPOSED CLYDESDALE RIDGE WIND PROJECT INFORMATION SESSION – August 21, 2024

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Project Overview

The proposed Clydesdale Ridge Wind Project is being developed and will be constructed, owned, and operated by a partnership between RMS Energy and Natural Forces. The proposed Clydesdale Ridge Wind Project is located on the border between Colchester County and Pictou County in the Berichan area, approximately 7 km northwest of the operational Dalhousie Mountain Wind Farm. The initial plans are for the Project to consist of up to 18 wind turbines. Depending on the final turbine model selected for the Project, this would result in a total installed capacity of up to 70 MW to 126 MW.

Project Owners

The proposed Clydesdale Ridge Wind Project is being developed by the partnership between RMS Energy and Natural Forces. These companies are further partnering with Mi'kmaq bands in Nova Scotia to develop, construct, own, and operate the Project.

RMS Energy

RMS Energy is a full-service wind turbine maintenance company based in Nova Scotia with experience developing, constructing, owning, operating, and maintaining large-scale and community-based wind projects. These activities are represented by Rotor Mechanical Services, which built and now maintains the Dalhousie Mountain Wind Farm and the community-based Affinity Wind projects.

Natural Forces

Natural Forces is a private independent power producer that delivers renewable energy projects in partnership with local communities across Canada, Ireland, and France. Established in 2001 in Halifax, Nova Scotia, Natural Forces remains a small company with big values and big ambitions.

Natural Forces develops, constructs, owns, and operates wind, solar, hydro and storage projects with Indigenous communities, universities, municipalities, and local community funds. Partnering with local communities for these projects not only generates clean and renewable electricity but delivers local economic prosperity and raises awareness of the challenges of climate change.

Project Benefits

- Generate enough electricity to power up to 26,000 to 46,800 Nova Scotia homes annually.
- Provide annual tax revenue to the municipal governments over the life of the Project.
- Create local employment and contracting opportunities during the development, construction, operation, and decommissioning phases of the Project.
- Increase revenue to local businesses due to economic spinoff from Project activities.
- Produce emission-free electricity that will both increase energy security and displace generation from fossil fuels, thereby reducing greenhouse gas emissions.
- Assist the province of Nova Scotia in meeting their renewable energy target to achieve 80% renewable energy on the electricity grid by 2030.
- Stabilize energy costs for Nova Scotia Power customers by increasing electricity generation sources with fixed cost contracts.

Environmental Studies

The proposed Clydesdale Ridge Wind Project requires approval through the provincial Environmental Assessment (EA) review process. Desktop and field studies have been conducted as part of the EA. These studies help shape the Project to ensure it is developed responsibly and to mitigate environmental and sociocultural impacts.

The Environmental Assessment Registration Document for the Project was submitted to the Minister of Environment and Climate Change on July 31, 2024. As part of the EA process, the public is invited to submit written comments on the Project to the Nova Scotia Department of Environment and Climate Change before September 6, 2024.

Nova Scotia Environmental Assessment:

The following is a high-level summary of the environmental assessment process:

1. The Proponent conducts the desktop and field studies required for an Environmental Assessment (EA) (1-2 years).
2. The Proponent compiles and submits the EA document to the Environmental Assessment Branch of the Nova Scotia Department of Environment and Climate Change (NSECC).
3. The EA document is registered and becomes publicly available for review within 7 days of being submitted to NSECC.
4. Starting from the date of registration, the public has 30 days to review the EA document and submit comments to NSECC.
5. NSECC conducts their review of the EA document over 50 days and the Minister makes a decision.

Topics of Study

- Wetlands and watercourses
- Vegetation
- Terrestrial wildlife and habitat
- Bats
- Breeding and migratory birds
- Archaeology
- Geology
- Sound levels
- Shadow flicker
- Visual Impact Studies
- Wind Resource Assessment
- Local economy and land use
- Radiocommunication Impact Assessment

Sound Levels

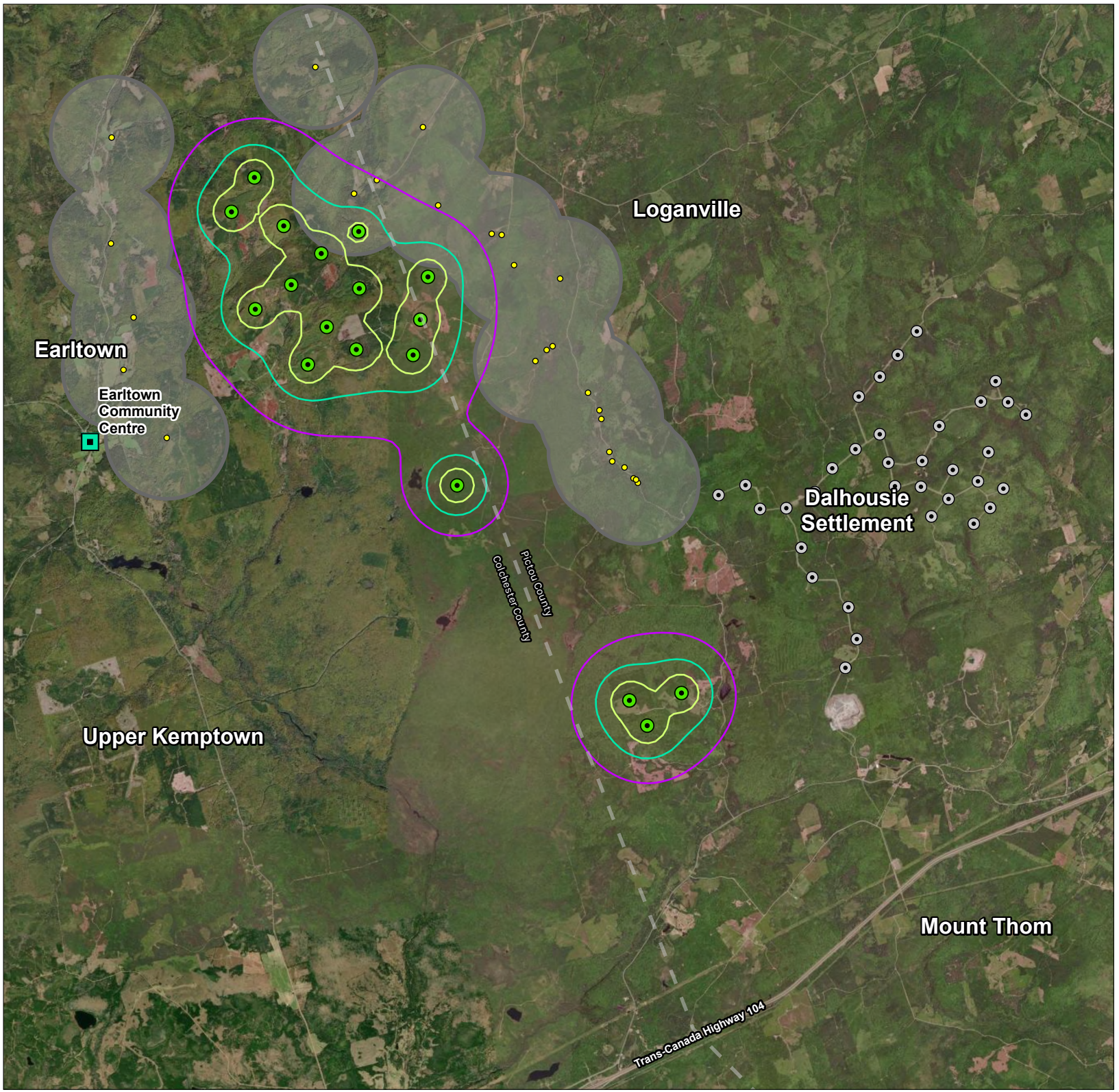
The most significant factor when limiting sound impacts to nearby residences is where wind turbines are sited. As such, the wind turbine locations are no closer than 1 km from non-participating residences, and 600 m from participating residences. Based on this siting, Natural Forces assessed the impact of sound levels from the Clydesdale Ridge Wind Project on nearby homes. This assessment uses industry best practices to model how the sound created by the wind turbines will travel over the landscape.

The Project partners engaged a third-party consultant to review the methodology used to carry out this modelling. The consultants, Aercoustics Engineering, concluded that the methodology used by the Project partners is appropriate and provides conservative results, likely overestimating the expected sound levels.

Results of the modelling show that turbine sound levels experienced at nearby receptors during the Project operation will be below 40 decibels, which is comparable to a soft whisper. The attached sound map visually shows the results of the sound modelling.

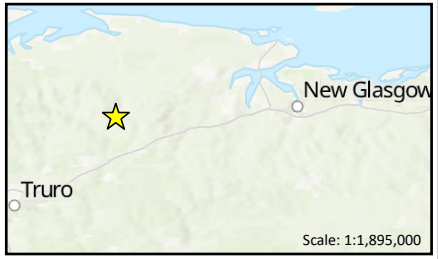
Sound Comparisons - 40 decibels: quiet library sounds, 50 decibels: refrigerator, 60 decibels: electric toothbrush.

August 21, 2024



Clydesdale Ridge Wind Project

Modelled Sound Level Assessment (Turbine Sound Only)



Legend

- Proposed Turbine Locations
- Dalhousie Mountain Wind Farm (Operational)
- Surrounding Residences
- 1km Buffer from Residences

Modelled Turbine Sound Level

- 35 dBA
- 40 dBA
- 45 dBA

Notes

1. Turbine markers not to scale.

2. These lines depict only the wind turbine sound levels and do not take into account the existing ambient noise.

Sources

- Base data provided by Province of Nova Scotia
- Basemap: ESRI World Hybrid Imagery

N

0 0.5 1 2

Kilometers

Scale: 1:85,000

Spatial Reference: NAD 1983 UTM Zone 20N

Page Size: 8.5" x 11"

Production Date: Jul 25, 2024

Natural Forces

RMS Energy

Project Timeline

Work Completed to Date:

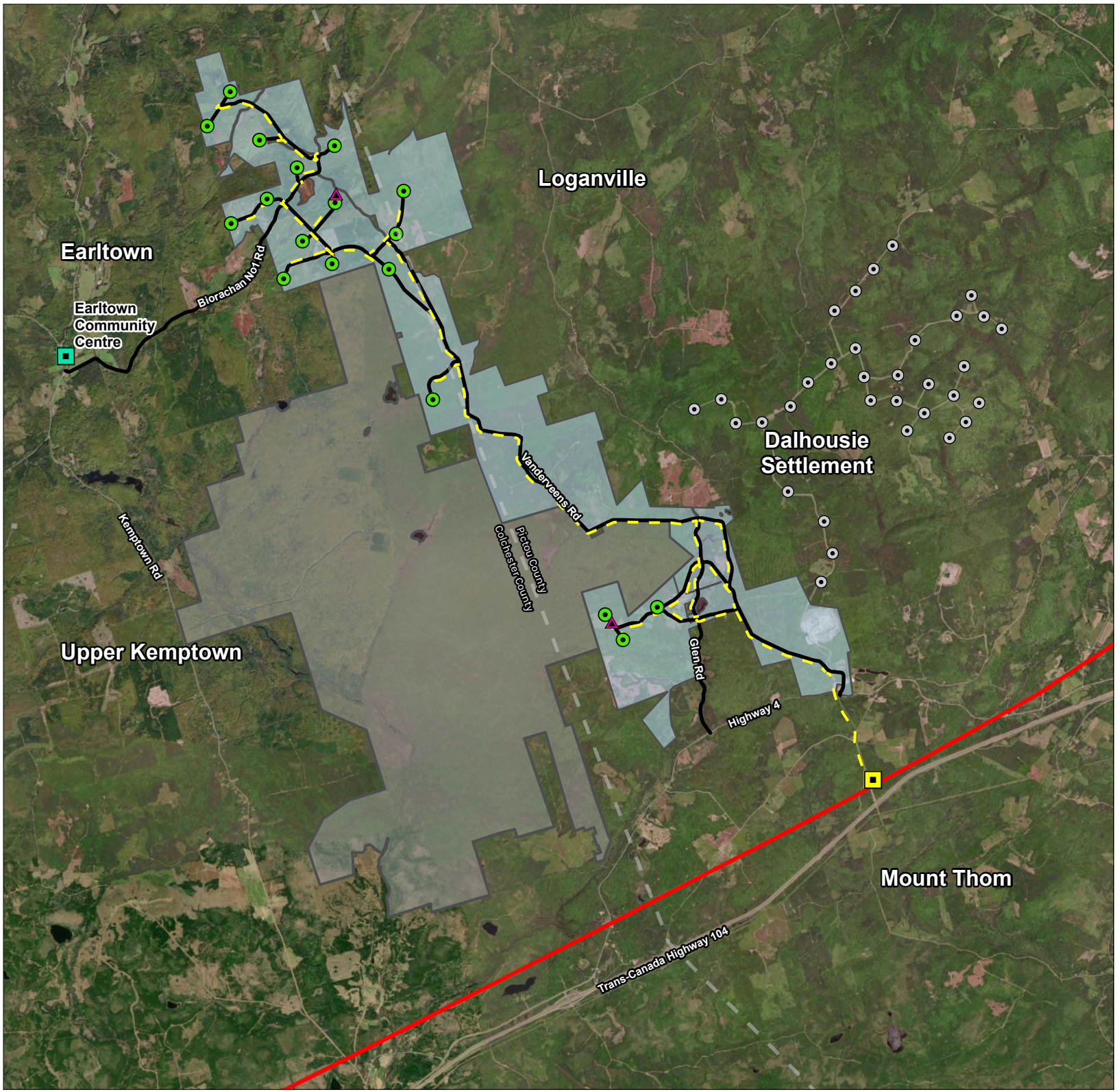
- Environmental Assessment field and desktop studies
- Radar and Acoustic Monitoring for birds and bats (2 years)
- Archaeological Resource Impact Assessment
- Installation of wind measurement instrumentation
- Submission of Environmental Assessment

Ongoing Work:

- Public and stakeholder consultation
- Engagement with Mi'kmaq communities
- Municipal development permitting
- Interconnection studies with NS Power

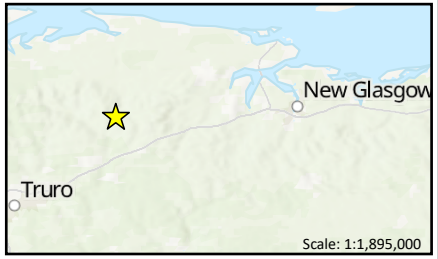
Future Work:

- Environmental Assessment approval
- Secure a Power Purchase Agreement
- Pre-construction site activities
- Turbine procurement
- Civil work
- Electrical works and interconnection
- Turbine erection
- Project commissioning
- Site reclamation from construction activities
- Operation of turbines
- Post-construction environmental studies
- Site maintenance and upkeep
- Decommissioning and site reclamation



Clydesdale Ridge Wind Project

Proposed Project Layout



Legend

- Proposed Turbine Locations
- Dalhousie Mountain Wind Farm (Operational)
- Meteorological Masts Location
- Proposed Overhead Collector Lines
- Existing Substation Location
- Existing NSPI Transmission Line
- Proposed Project Roads
- Project Lands
- Gully Lake Wilderness Area

Notes

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0 0.5 1 2

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