



**Rainy River Solar
Community Meeting
Barwick Community Hall
September 23rd, 2025**

CarbonFree Background



Ontario Solar Pioneer

CarbonFree has been successful in the Ontario market for more than twenty years providing a deep understanding of the market and regulatory environment.



History of Development with First Nation Partners

CarbonFree has developed 400MW+ of solar projects with Indigenous partners in Ontario



Integration of Solar with Land Heritage

CarbonFree's design team is committed to environmental management and integration of solar with local land practices and character (agrivoltaics)



Successful Economic Results

Working with finance partners and buyers of projects, CarbonFree has learned what is required to develop, commission and operate a mutually successful project.

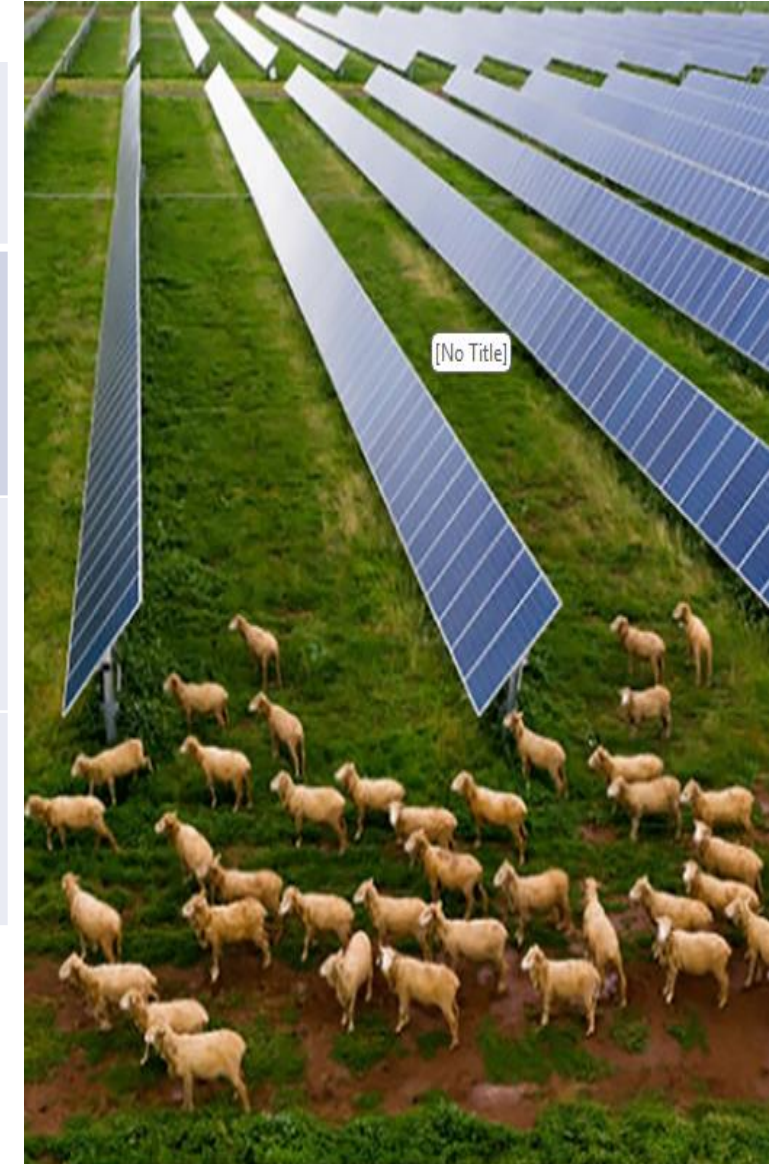


What Is The Purpose of This Meeting?



1. Feedback	<ul style="list-style-type: none">• We want your input!• Feedback sheets can be found at the door.
2. Ask Questions	<ul style="list-style-type: none">• CarbonFree is here along with HATCH to answer questions about this project, solar, Ontario's electricity system, Agrivoltaics, environmental permitting
3. Renewable Energy Approval (REA)	<ul style="list-style-type: none">• Public input is a critical part of permitting and includes Environmental, Natural and Cultural Heritage, Archaeology, Indigenous Consultation and Land Use
4. This is the First Meeting	<ul style="list-style-type: none">• This is the first of 3 public meetings to happen during the pre-development and design phase of the project.

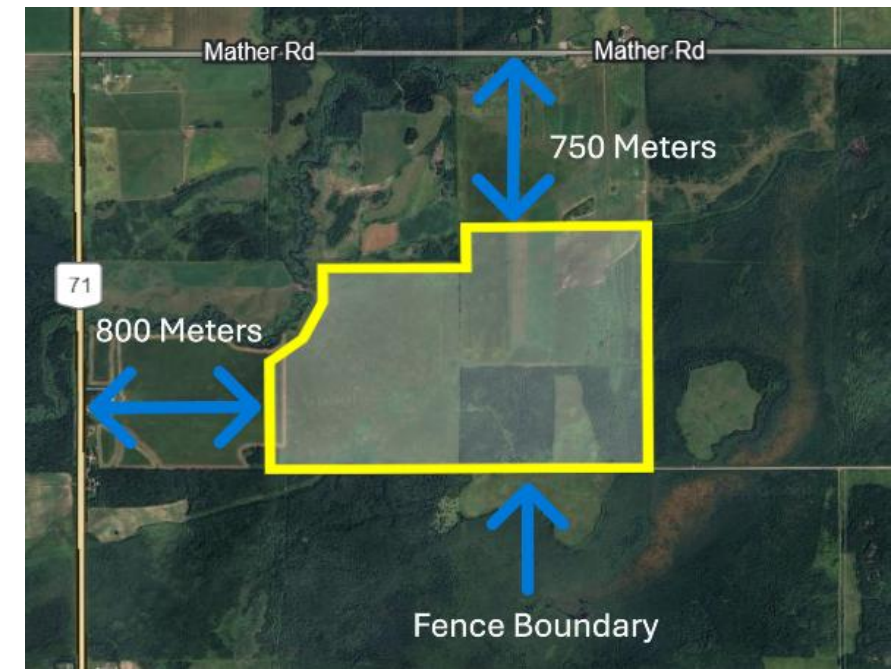
HATCH



Project Location – Hwy 71 & Mather Rd



- North of RRFN reserve area (in **green**).
- Adjacent to the 115kV Transmission Line (in **blue**) which joins the Fort Frances-Kenora Transmission corridor (in **red**).
- There is available capacity on the line to support the size of the proposed project.



Public Consultation & Input To Date



Emo Fair	CarbonFree presented at the 2025 Emo Fair and spoke with 100+ community members at the Market Square
First Nations Consultations	CF has directly engaged with the 10 local, Treaty 3 First Nations and has entered development partnerships with both Rainy River FN and Couchiching FN.
Public Meetings	Public meetings are a part of all of CF's projects and tonight's is the first of at least 3 to be conducted during the pre-development phase of the Chapple project
Regional Meetings	Meetings with the CAO's of Chapple, Emo, Alberton and Fort Frances , the ED of RRFDC, RRFA MSR to discuss the project and to receive input;
Neighbourhood Consultations	CF has met and/or spoken with many of the neighbours of the Project and our project design is evolving with the direct input that we receive



Public Feedback / CarbonFree Response



Visual Impact

- This Project will not be visible from Highway 71 or Mather Rd.
- 800m setback from Highway 71 & 700m setback from Mather Rd.
- Green screens will be planted along northern & western boundaries of the Project
- No power lines

Noise Level

- Inaudible beyond 100m at peak solar output
- No noise in evening or nighttime

Displacing Agriculture

- This Project will be an agrivoltaics project maintaining the agricultural acreage
- Haying, sheep grazing, honeybee production, pollinator seeding, and cattle grazing
- Non-Ag lands will be added to agricultural use than how it looks today

High Cost For Ratepayer

- Power is to be bought <\$0.10/kWh
- No government subsidies
- Stable, predictable pricing for decades

Agrivoltaic Design & Operation



Livestock Grazing



Pollinator Habitat



Land Use Management



IESO & Solar



Independent Electricity System Operator (IESO)

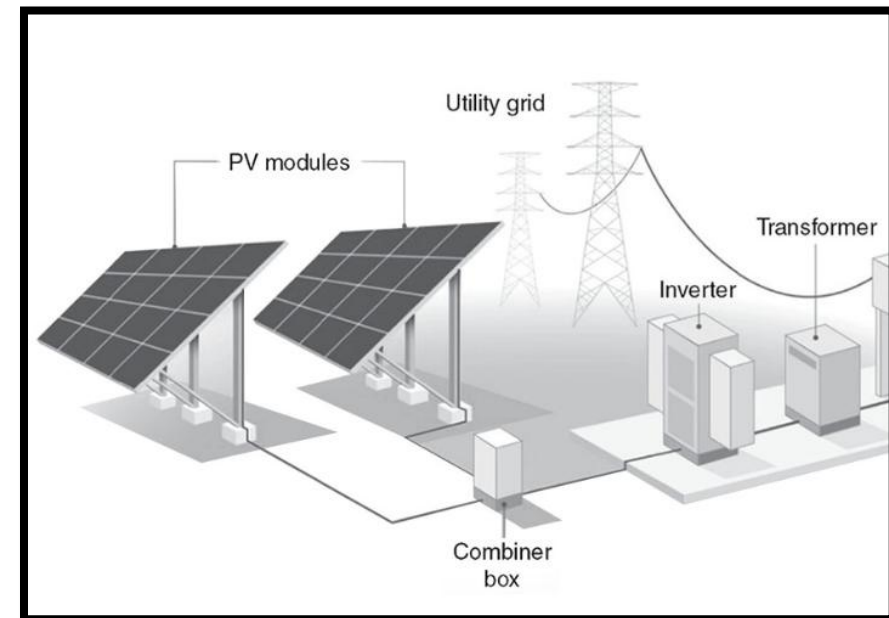
- Controls the provincial electricity grid
- Manages electricity generation
- Forecasts future electricity needs (**demand growth**)

Long-Term 2 energy (LT2e)

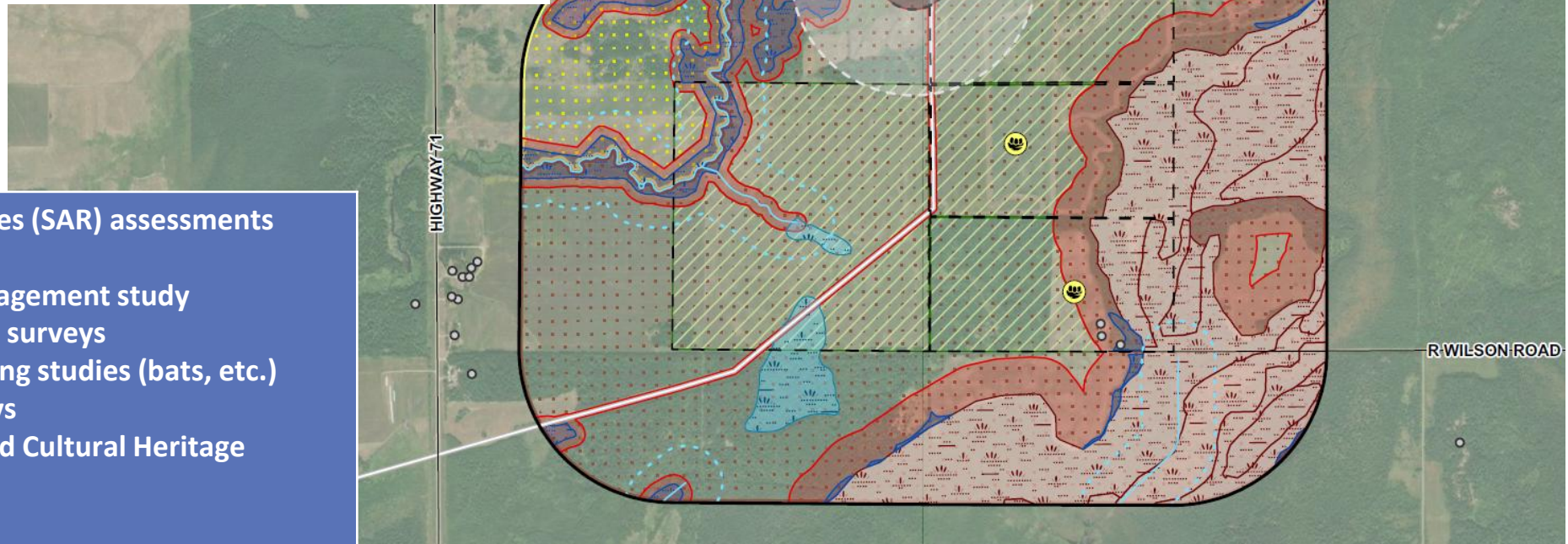
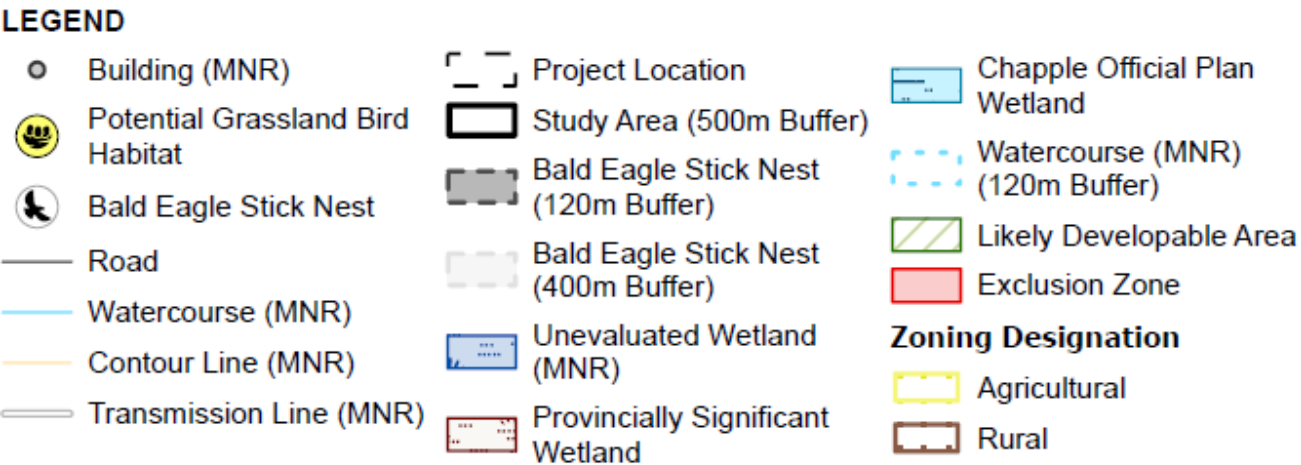
- The IESO is running a competitive auction for new generation from all potential sources of generation (technology agnostic)
- Pricing for this auction is forecast to be <\$0.10/kWh making it competitive with lowest cost power in the province.
- IESO forecast - by 2050 Ontario's demand for electricity will increase by 60%

How Does it Work?

- Electricity generated by solar photovoltaic (PV) panels
- Inverters convert Direct Current (DC) to Alternating Current (AC)
- Voltage is stepped up at a substation transformer.
- Electricity is connected to an existing transmission line



Environmental Studies



Environmental Studies Undertaken & Completed

- Endangered species (SAR) assessments
- Wetland studies
- Storm water management study
- Amphibian & Bird surveys
- Acoustic monitoring studies (bats, etc.)
- Vegetation surveys
- Archaeological and Cultural Heritage Assessments

Rainy River First Nation Partnership



Economic Partner	<ul style="list-style-type: none">• Rainy River First Nations to be 50.1% owners of the Project
First Nations Consultations	<ul style="list-style-type: none">• CF has directly engaged with the 10 local, Treaty 3 First Nations• CF has entered development partnerships with Rainy River FN where open-houses have been conducted and regular meetings taken with the departments of the Nation.
Ziibi Anishinaabe Investments Inc.	<ul style="list-style-type: none">• Ziibi Inc. is the economic development wing of RRFN and has worked with CF throughout the process of establishing the economic partnership.



Local Economic Stimulation



Regional Economic Growth

- >\$1m/yr of revenue, income and local economic activity during the operating term of the project

Employment and Contract Opportunities

- Creation of local employment throughout construction, operations, and maintenance
- Roughly 150,000-man hours (~80 full time jobs during construction)

Community Benefit Agreement (CPBA)

- Community Benefit Agreement proposed to Chapple Twp

Lease & Project Distribution Revenues

- Landowners receive annual lease payments
- Rainy River First Nations – majority owners of the Project earn yearly distributions



Where Is the Power Going?



Rainy River Electricity Demand

Rainy River Electricity Generation

- The Rainy River District —has several **large electricity consumers** incl. Newgold, WestFraser OSB, Manitou sawmill along with local industrial, commercial and residential loads
- Local power demand exceeds what is produced in Rainy River District from existing generation (hydro, solar) meaning electricity is typically **imported from other parts of northwestern Ontario** (E.G. Atikokan biomass, Kenora hydro).
- This solar project will help balance the local grid by producing more power locally when it is needed and keeping a significant portion of **generation revenues (\$\$) local**.
- The power from the RR solar project will be substantially **consumed by local** industrial, commercial, and residential customers.



Why Is Solar A Good Choice for Ontario?



Reliability & Diversity of Supply

- Ontario's demand is shifting — electrification (EVs, industry, data centers) means more load growth, especially in Northern Ontario. Adding solar diversifies the supply mix, reducing reliance on a few large generating stations.

Cost Competitiveness

- Solar costs have declined dramatically. From the IESO's perspective, it's one of the most cost-effective new sources of clean electricity available, especially when paired with storage.

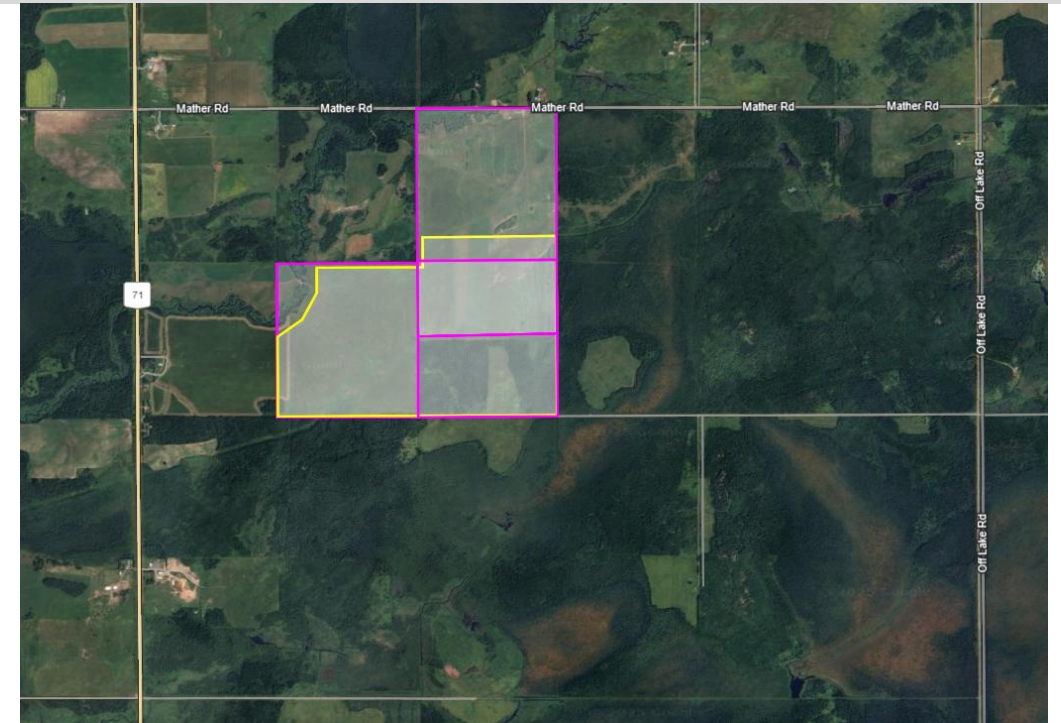
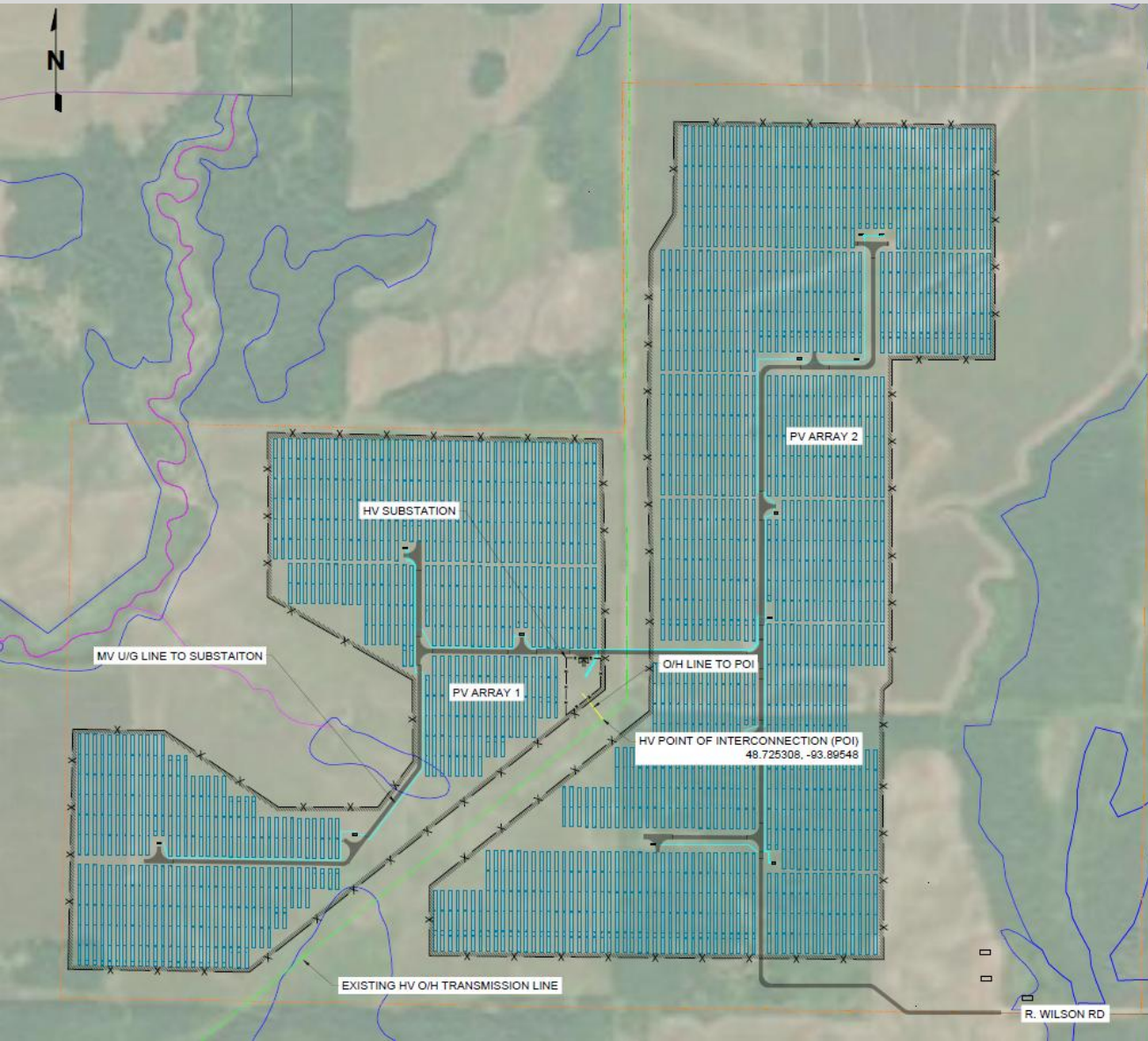
Decarbonization Goals

- The province has committed to cutting emissions from electricity. Solar provides zero-emission power and supports Ontario's broader climate targets.

Peak Demand Alignment

- Solar output often coincides with summer daytime peaks, helping offset the need for expensive gas-fired peaker plants.

Preliminary Solar Design



- The solar design applies rows of modules on a north-south axis that rotate east to west over the course of the day and which stand 9' tall. Rows are spaced at 18' intervals allowing for sunlight exposure to the ground area.

Development/LT2 Timeline

