

# Public Community Meeting for Walker BESS 4 Project

November 10, 2022

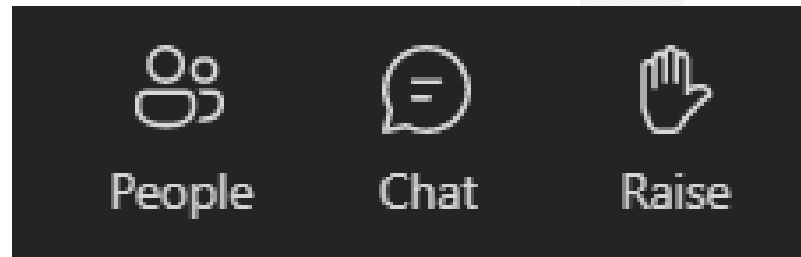


**Presented by –**



# Meeting Format

- The presentation and the meeting will be recorded.
- The presentation and Meeting minutes will be available on the Project Website after today's session.
- Reminder for everyone to keep their microphones on mute for the duration of the presentation.
- We will pause at various points in the presentation during which attendees can use the “raise your hand” functionality and unmute their mic to provide feedback.
- You can also ask us questions through the chat box.



# Meeting Agenda

1. About Us
2. What is Battery Energy Storage?
3. Why Windsor?
4. Walker BESS 4 Project Development
5. Community and Indigenous Engagement Plan
6. Questions and Comments

# Purpose of today's Public Community Meeting

Capstone Infrastructure ("Capstone") and Compass Renewable Energy Consulting Inc. ("Compass") are co-developing a battery energy storage project in the City of Windsor located at **3940 North Service Rd East, Windsor, ON, N8W 5R7.**

## Overview

- The Independent Electricity System Operator ("IESO") is running two Request for Proposals (RFP) for 4,000 MW of new capacity projects in the province.
- The City of Windsor has been identified as a priority region by the IESO.
- Both Capstone and Compass (through Wahgoshig Solar) are Qualified Applicants.
- Capstone/Compass own and operate over 33 energy projects throughout Canada. Capstone has total capital assets of more than \$1.3 billion.
- The Walker BESS 4 project will bring significant investment and local benefits including employment, lease payments and spending in the local economy.
- In order to integrate the project into the City of Windsor, we are seeking Community and Indigenous feedback and support that will inform the development of the project.

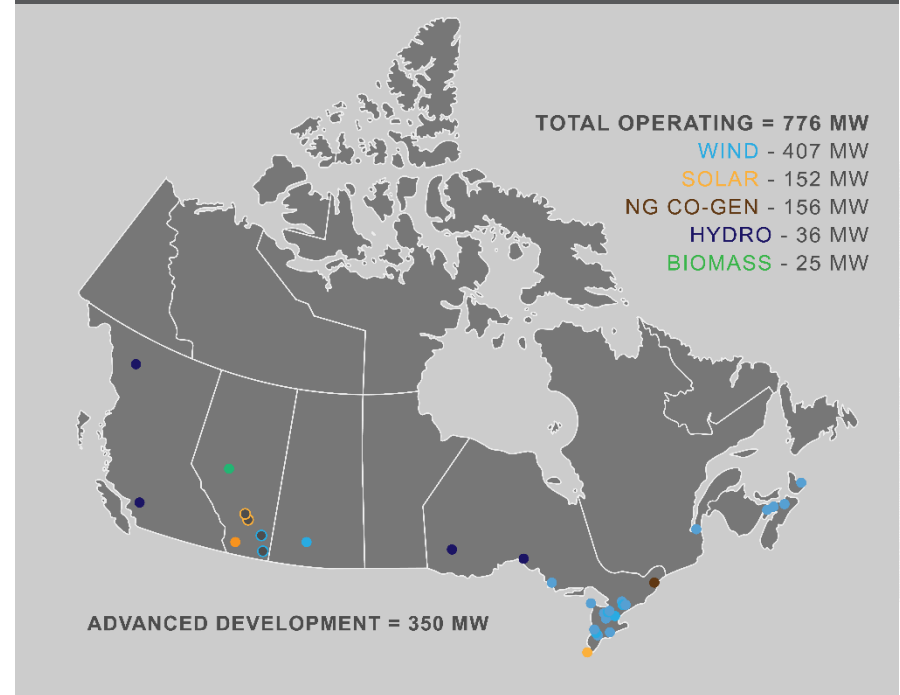
# About Capstone Infrastructure

Capstone Infrastructure Corporation (“Capstone”) is an independent, pure-play power producer focused on providing energy to homes and businesses across North America. Capstone currently develops, owns and operates thermal and renewable power generation facilities with a total installed capacity of more than 776 megawatts (MW).

## About Capstone

- Founded in 2004 and based in Toronto, Capstone is publicly traded on the Toronto Stock Exchange (TSX:CSE.PR.A).
- Capstone has a long history of operating and investing in clean power businesses including wind, solar, run-of-river hydro, biomass, and natural gas.
- Capstone prides itself as being a leading Canadian independent power producer with over a decade of experience developing, owning and operating diversified power facilities across Canada.
- Capstone is focused on sustainable development and operational excellence to deliver reliable emission-free power to communities.

## Map of Projects



<https://www.capstoneinfrastructure.com/>



# About Compass Energy Consulting

Compass Energy Consulting (“Compass”) has been consulting and developing energy projects in Ontario for over 10 years. We have experience across the development lifecycle from pre-screening, contracting, construction, commissioning and operations.

## 10+ years Experience in Energy Development in Ontario

- We have developed over 100 renewable energy projects in Ontario representing over 100 megawatts (MW) in the last 6 years and supported the development of over 2,000 MWs for our clients.
- Track record of success with principles that designed and launched Ontario’s renewable and clean energy procurements in the public sector.
- Our projects provide sustainable energy to communities while offering land-owners long-term, guaranteed passive income through lease payments.

## About Wahgoshig Solar FIT5 LP

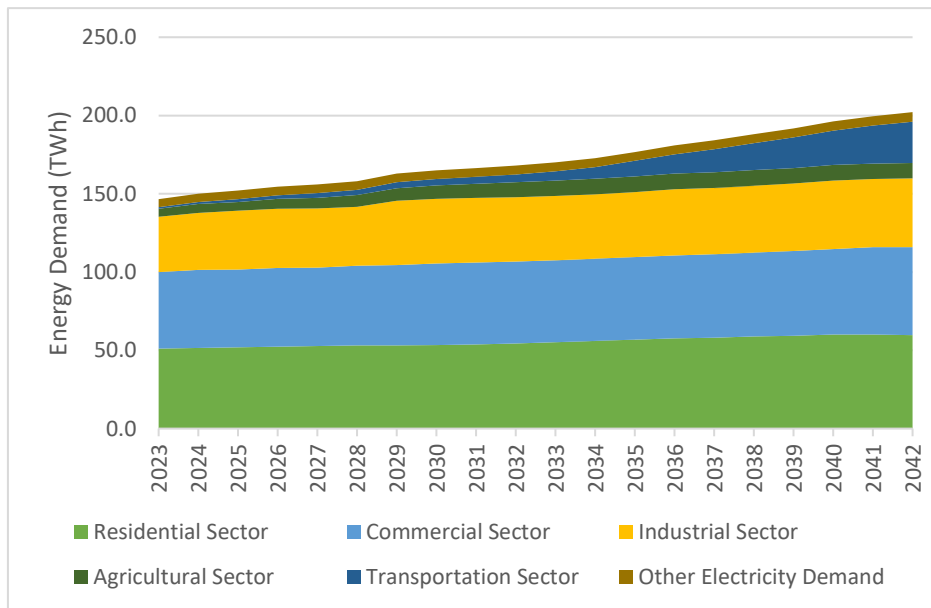
- Wahgoshig Solar FIT 5 LP (“Wahgoshig Solar”), is a partnership formed between Wahgoshig First Nation and Compass Renewable Energy Consulting Inc. for developing, constructing, and operating four 600-kilowatt (2.4 MW total) ground mount solar projects in Ontario.
- Wahgoshig Solar engaged Compass to manage the development, permitting and construction of these facilities.

# Ontario's Power Needs

Ontario's Independent Electricity System Operator (IESO), has identified the urgent need to bring 4,000 megawatts (MW) of new supply onto the electricity grid by 2030 as energy demand is expected to grow 30% over 20 years.



## ON's Energy Demand Forecast



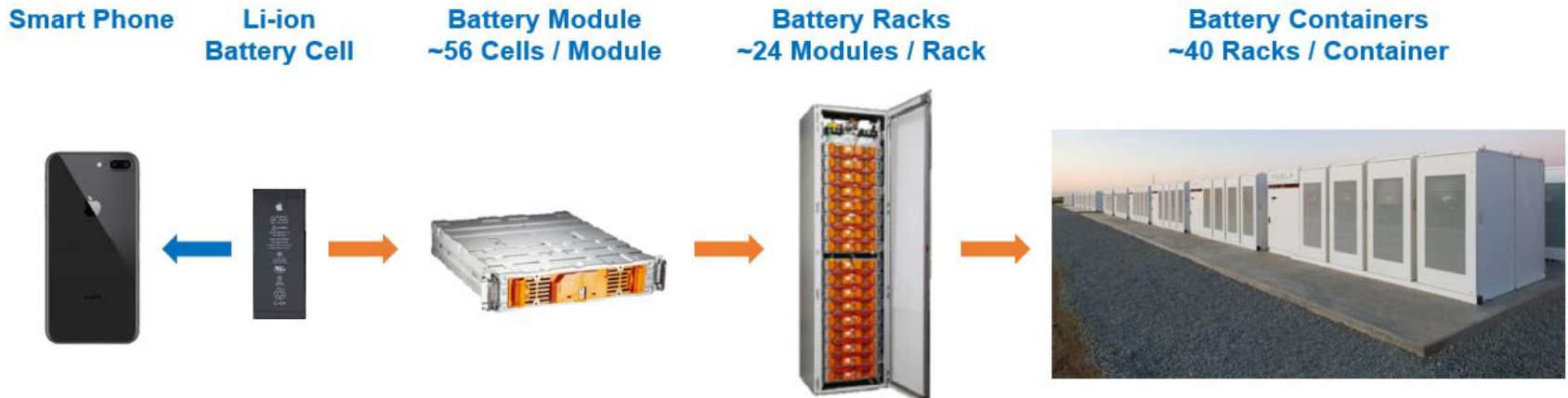
## What is causing this growth?

- Increased Economic Activity
- Electrification of Transport
- Agricultural Sector
- Retirement of Generation

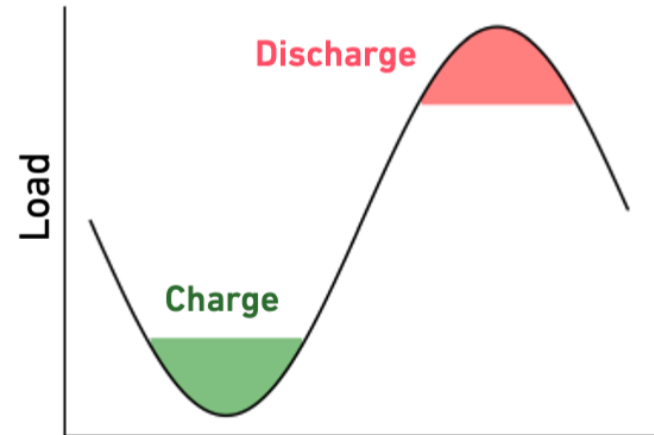
To close this supply gap by 2030, the IESO is planning two major procurement cycles over 2023-24 – the Expedited Long-Term 1 (E-LT1) RFP and the Long-Term 1 (LT1) RFP. **Both Capstone and Compass (through Wahgoshig Solar) are Qualified Applicants for the RFPs.**

# What is Battery Energy Storage?

## Battery System Components and Integration



- Lithium-ion battery cells are the building blocks of Battery Energy Storage Systems (BESS).
- BESS can bridge the gap between high and low demand period, improving the stability and quality of grid power and reducing the price burden on the consumers in the long run.





# What is Battery Energy Storage?

Battery energy storage projects are critical infrastructure assets that provide flexibility and stability to the electricity grid during peak demand periods, avoiding events such as rolling blackouts. Battery energy storage systems (BESS) have been procured by the IESO since 2014.

## Battery Storage Characteristics

- **Small Footprint Size:** 1 – 5 acres
- **Secure:** Project is fenced in and locked.
- **Operations:**
  - Project is 24/7 remote monitored and controlled. Operations and maintenance contractors are locally based in Ontario.
  - Scheduled site visits occur 4 times a year.
- **Design:** Each container or battery storage cabinet will have its own HVAC system and meet provincial sound limits.
- **Safety:** Project will be built to comply with several accredited international standards to ensure safe operation and prevent damage to the BESS and land.

## Look and Feel

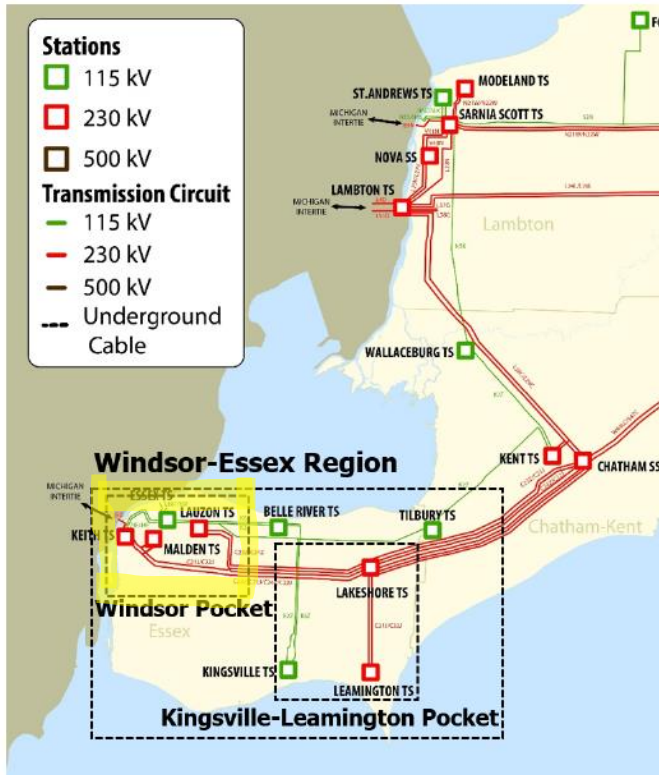
- The project will consist of painted, 40 ft containers, electrical equipment and a transformer.
- The containers will rest on a concrete pad and be interconnected.
- The containers will then connect to the transformer before going out to the grid.



# Why Windsor?

The IESO has identified the “Windsor Pocket” as one of the primary areas of demand growth in the province and has a “strong preference” for new resources in this area.

## Windsor Pocket



## Local Electrical Benefits

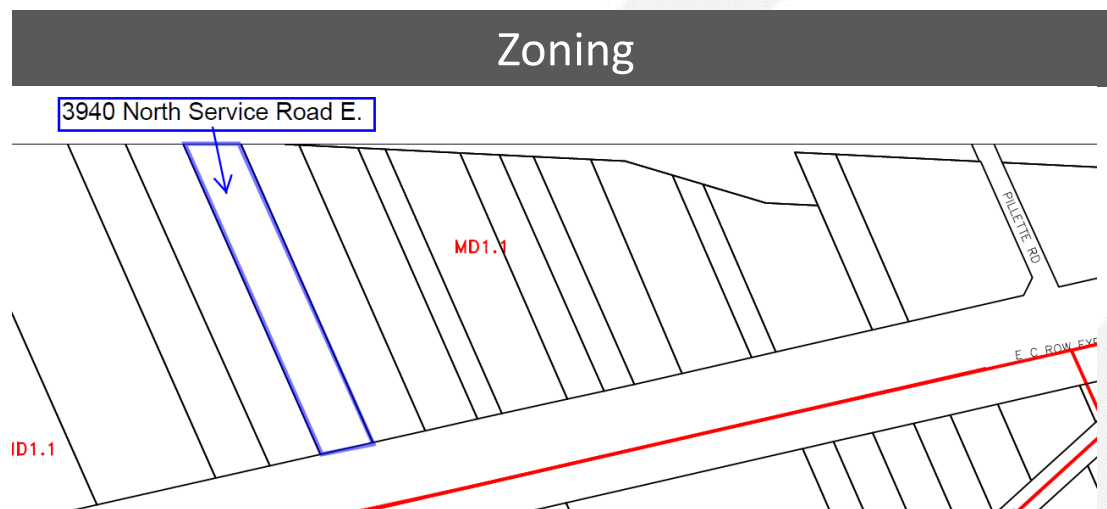


- Our proposed project is located between the Lauzon and Essex transformer station in a high priority area for the IESO.

Source: Locational Considerations for New Resources, IESO

# About The Walker BESS 4 Project

Walker BESS 4 is a proposed up to 50 Mega-Watt (“MW”) stand-alone lithium-ion battery storage Project located at 3940 North Service Road East, Windsor, ON, N8W 5R7, being developed by Walker BESS 4 Limited Partnership. It will connect to either the EnWin lines on North Service Road East or the Hydro One lines running along the north of the property.



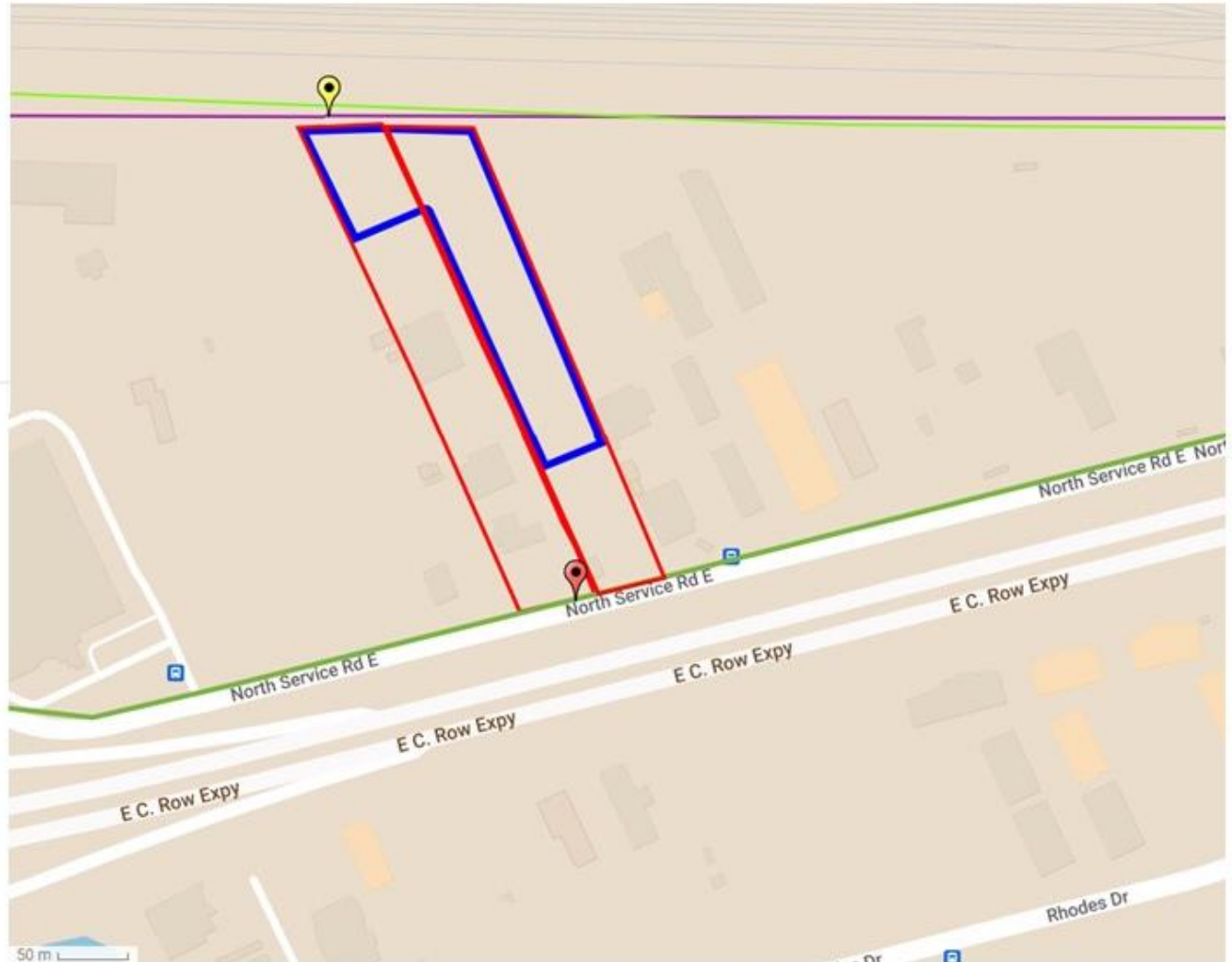
- Zoning of the property is Light Industrial with limited Commercial (MD1.1).
- Per Zoning By-law 8600, this zoning allows for Bulk Storage Facility, Food Processing Facility, Manufacturing Facility, Repair Shop – Heavy, Gas Bar.



# Scale Site Map for Walker BESS 4

## Walker BESS 4

- Connection Point Option #1
- Connection Point Option #2
- Property Outline
- Proposed Site Area
- Hydro One - Circuit Z7E
- EnWin Utilities - Feeder M26



# Local Benefits

Walker BESS 4 will be a critical infrastructure asset that will provide supply to meet growing power demand, additional revenues for landowners, property taxes for the City of Windsor, and economic activity within the city.

## Local Benefits

- **Grid Stability and Flexibility** - Prevention of rolling blackouts, power brown outs, and grid failure.
- **Employment** - High skill, sustainability jobs in construction – civil works, mechanical installation, electrical connection, landscaping.
- **Financial** – Property tax benefits, diversified income stream for the landowners that currently have underutilized land.
- **Industrial Growth and Diversification** - Needed energy capacity allows for increased development in Windsor.
- **Natural Gas and Transmission Line Offset** - Distributed energy provides electrical grid support, intelligence, and resilience.



# Environmental Benefits

Battery energy storage can facilitate deeper renewable energy integration in Ontario's grid to help decarbonize our provincial energy system further. Installation of BESS supports the goals and objectives laid out by the City of Windsor's Climate Change plans.

## City of Windsor Climate Change

- In 2005, the City of Windsor started on the path of environmental actions with its first Environmental Master Plan. The City then developed many other plans to help balance the environment with Windsor's economy and social atmosphere.
- The Environmental Sustainability and Climate Change Office has helped make the environment a part of decision making for the City of Windsor. This has been through the creation of many plans and policies, which include:
  - Environmental Master Plan (2017)
  - Climate Change Adaptation Plan (2012)
  - Community Energy Plan (2017)
  - Corporate Climate Action Plan (2017)
  - Report on the State of Our Environment (2017)
  - Green the Fleet Manual (2012)
  - Community Garden Policy
  - Sustainable Purchasing Guide (2015)

# Regulatory Compliance

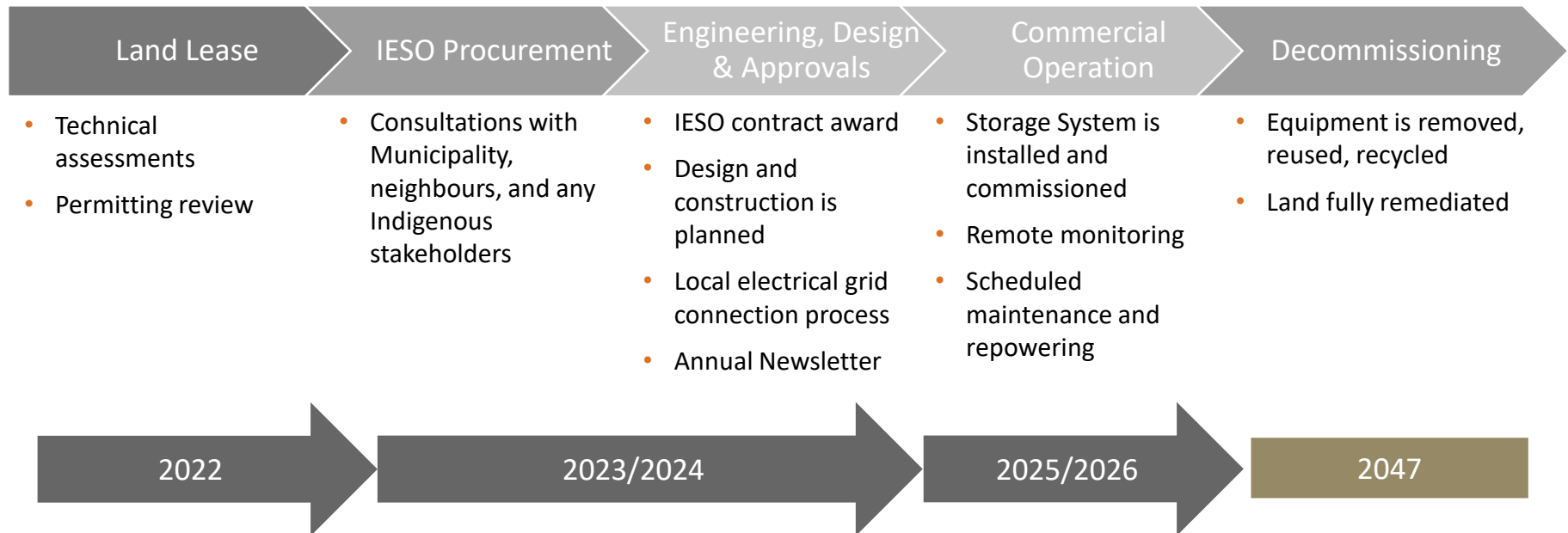
We have made careful note of the regulatory bodies that it must engage to secure the required permits and approvals for a battery energy storage Project.

## Authorities Having Jurisdiction

- ✓ City of Windsor
- ✓ EnWin Utilities, Hydro One
- ✓ Ontario Ministry of Energy
- ✓ Independent Electricity System Operator
- ✓ Ontario Ministry of Environment, Conservation and Parks
- ✓ Electrical Safety Authority

# Development Timeline

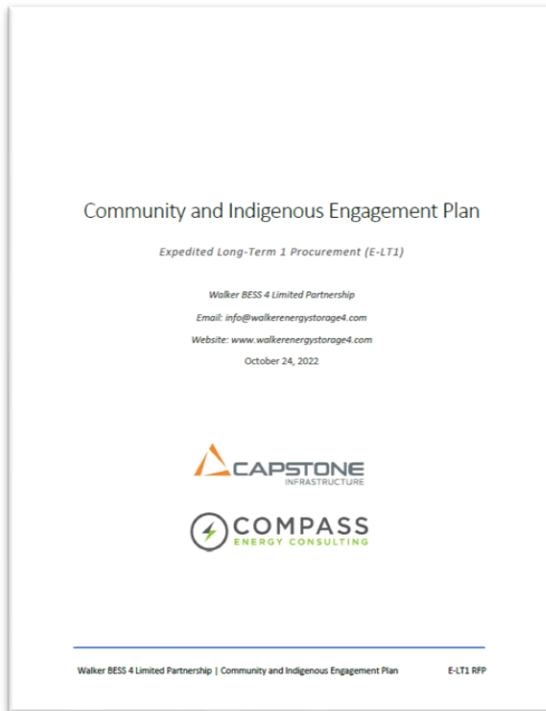
Successful developments require up to five years to reach commercial operation from initiation. Walker BESS 4 is expected to come online by 2025-26 and have an operating life of more than 20+ years.



# Community and Indigenous Engagement Plan

Capstone and Compass, on behalf of Walker BESS 4 LP, has issued a Community and Indigenous Engagement Plan that is available on the Project Website. We invite you to read this document to understand more about our public engagement process.

## Our Public Engagement Process Tools



- **Project Website**, hosts details about the Project and status of development activities, Notice of Public Community Meeting, Community and Indigenous Engagement Plan, regularly updated FAQ section, project Contact details;
- **Notice of Public Community Meeting**, posted to the Project Website, mailed to the mandatory stakeholders as defined by the IESO;
- **Public Community Meetings**, a proposed in-person meeting upon successful contract award through the IESO's procurement process;
- **Public Community Meeting Minutes**, posted to the Project Website after this meeting; and
- **Project Email**, will accept feedback and provide responses through electronic correspondence

Available on [www.walkerenergystorage4.com](http://www.walkerenergystorage4.com)

# Thank you

## Contact

**Rishabh Mundhra**

Senior Consultant

Email: [info@walkerenergystorage4.com](mailto:info@walkerenergystorage4.com)

**James Marzotto**

Associate Director, Development

Email: [james@compassenergyconsulting.ca](mailto:james@compassenergyconsulting.ca)

Cell: 905-650-3682



# Appendices

1. BESS Frequently Asked Questions
2. Battery Storage Systems Examples
3. Service Commitment

## 2. BESS Frequently Asked Questions

Question	Answer
How safe is a BESS from a fire hazard?	<p>BESS enclosures have built in fire suppression system (FSS) solutions. The FSS system is composed of smoke detectors, gas detectors and aerosols, whose main function is to prevent fire spread in time when any open flame signal or gas signal appears in the battery system and sent out fire signal to EMS system. BESS are certified to UL9540 and UL9540A standards to prevent fire spread and suppression at the cell and the BESS system level. The management of any risks starts at the cell level, with selection of battery chemistry, and compliance with local authorities having jurisdiction (AHJs) and global certifications.</p> <p>Compass has also engaged the local Fire department for a screening of our site and to provide additional training to equip firefighters with knowledge of the BESS fire protection standards.</p>
What is the noise and visual impact of BESS?	<p>As a part of the Environmental Assessment permitting process, we will conduct a Noise Impact Assessment for the Project. As a part of this report, the ambient noise survey will identify the 'noise envelop' for the Project location based on zoning, proximity to highways and other factors that may affect sound levels.</p> <p>Once a survey is conducted, any potential risks of the BESS exceeding the 'noise budget' and violating any provincial norms would be mitigated based on suggested noise mitigation efforts that may be required to successfully secure an environmental permit.</p>
What other assurances that BESS meet these standards?	<p>BESS systems are subject to third party certification to ensure they comply with all of the required codes and standards. The Project will have to secure multiple environmental and electrical permits and complete a successful inspection certification prior to commissioning.</p>

# Battery Energy Storage Systems – Lithium-Ion Technology Examples

Project Name	Project Size (MW)	Project Status	Project Address	Project Geolocation
Ameresco Canada – “Project A”	2	Announced	Newmarket, Canada	Latitude: 44° 3' 22.529" N Longitude: 79° 27' 42.149" W
Parry Energy Storage, LP	2	Contracted	5 Elliot House Rd., Seguin, Ontario, P2A 0B2, Canada	Latitude: 45° 18' 9.828" N Longitude: 79° 56' 43.692" W
RES Amphora Ontario	4	Operational	Queen Street Strathroy, Canada	Latitude: 42° 57' 15.85" N Longitude: 81° 36' 43.816" W
Elmira Energy Storage, LP	2	Contracted	50 Martin’s Lane, Elmira, Ontario N3B 2A1, Canada	Latitude: 43° 36' 13.129" N Longitude: 80° 32' 50.395" W
Owen Sound Regulation Services	25	Under Construction	Owen Sound, Ontario, Canada	Latitude: 44° 34' 26.256" N Longitude: 80° 55' 23.772" W
Source: <a href="https://gateway.eme.nrc.ca/en/es/demo_projects?wbdisable=true">https://gateway.eme.nrc.ca/en/es/demo_projects?wbdisable=true</a>				

# 3. Service Commitment

We believe in the importance of transparency when communicating with all stakeholders and tying our success to their success.

## System Design Consultation

- Design adapted to site requirements and local building by-laws
- Layout review and consultation with landowner
- Engineered construction plan accepted by local building department
- Long-term, dependable designs

## Risk Mitigation & Minimal System Impact

- Scheduled Operation & Maintenance
- System insurance and liability insurance. Building owner named as 3<sup>rd</sup> party insured
- Physical security measures, and live performance monitoring

## Updates & Transparency

- Compass provides monthly project updates during the development and construction of the project
- Clarity for landlords to understand project progress

