



NEW BRUNSWICK SMART ENERGY COMMUNITIES ACCELERATOR PROGRAM



# ENERGY MAPPING FINAL REPORT

Town of Oromocto, New Brunswick

OCTOBER, 2023

QUEST 

## Acknowledgements

### Lead Authors

Eddie Oldfield, Senior Lead, Projects, QUEST Canada  
Omar Bhimji, Senior Lead, Stakeholder Relations, QUEST Canada  
Ericka Wicks, Managing Director, QUEST Canada

### Funders



Copyright © QUEST - Quality Urban Energy Systems of Tomorrow, 2023.

These materials may be reproduced in whole or in part without charge or written permission, provided that appropriate source acknowledgements are made and that no changes are made to the contents. All other rights are reserved.

The analyses/views in these materials are those of QUEST Canada, but these analyses/views do not necessarily reflect those of QUEST Canada's affiliates (including supporters, funders, members, and other participants) or any endorsement by QUEST Canada's affiliates.

These materials are provided on an "as is" basis, and neither QUEST Canada nor its affiliates guarantee any parts or aspects of these materials. QUEST and its affiliates are not liable (either directly or indirectly) nor accept any legal responsibility for any issues that may be related to relying on the materials (including any consequences from using/applying the materials' contents). Each user is solely responsible, at the user's own risk, for any issues arising from any use or application of the materials' contents.



QUEST Canada is a national non-profit that supports communities in Canada on their pathway to net-zero. Since 2007, we've been facilitating connections, empowering community champions and influencing decision-makers to implement efficient and integrated energy systems that best meet community needs and maximize local opportunities. We develop tools and resources, convene stakeholders and rights holders, and advise decision-makers on how communities can contribute to net-zero. Learn more and join the network at [questcanada.org](https://questcanada.org).

## Table of Contents

List of Abbreviations	4
Executive Summary	5
Community Profile	7
Community Energy Map Exercise Results	9
Action Planning Round	16
Conclusion and Next Steps	18
Energy Map Legend	20
Participant List	21

## List of Abbreviations

<b>AT</b>	Active Transportation
<b>CEEP</b>	Community Energy and Emissions Plan
<b>CFB</b>	Canadian Forces Base
<b>CFHA</b>	Canadian Forces Housing Agency
<b>DND</b>	Department of National Defense
<b>EV</b>	Electric Vehicle
<b>GHG</b>	Greenhouse Gas
<b>GJ</b>	Gigajoule
<b>NB SECA</b>	New Brunswick Smart Energy Communities Accelerator
<b>PACE</b>	Property Assessed Clean Energy
<b>tCO<sub>2</sub>e</b>	Tonnes Carbon Dioxide Equivalent
<b>VIC</b>	Visitor Information Centre



## 1.0 Executive Summary

### 1.1 What is this Report About?

The Town of Oromocto participated in an Energy Mapping Workshop facilitated by QUEST Canada, as part of the [New Brunswick Smart Energy Community Accelerator Program](#) (NB SECA). In 2023, QUEST conducted a review of the energy mapping exercise, to include the wider territory of Oromocto which amalgamated Lincoln and local service districts during Municipal Reform.

This report summarizes the results of the exercise, including diverse stakeholder perspectives on the opportunities for energy efficiency, waste energy integration, renewable energy, land use, transportation, and more, with an eye to reduce energy costs and greenhouse gas (GHG) emissions in the community.

Eighteen participants — representing diverse stakeholder groups including elected officials, municipal staff, utilities, and Canadian Forces Base (CFB) Gagetown — attended the initial workshop. The Town of Oromocto, NB Power, Liberty Utilities, and CFB Gagetown delivered presentations about their programs, services, and energy and emissions reduction plans.

### 1.2 Who is it Intended for?

This report is intended to inform the municipal staff and councillors, as well as stakeholders and the broader public about:

- Opportunities to improve energy efficiency, integrate clean energy, improve transport, land use planning, etc. as part of a Community Energy and Emissions Plan (CEEP)
- Targeting measures and partnership facilitation

*QUEST Canada appreciates the opportunity to work with the Town of Oromocto and local stakeholders to identify opportunities for integrated community-scale solutions to lower energy costs, reduce GHG emissions, and improve local resilience.*

### 1.3 High-Level Summary of Key Findings

Based on the results of the pre-survey and the exercise/workshop, the Town of Oromocto has the following opportunities to advance community energy and emissions reduction initiatives.

**Table 1: Description of strengths and areas for improvement/opportunities**

Areas	Key Areas for Improvement/Opportunities:
Energy Efficiency	Energy efficiency retrofits for: <ul style="list-style-type: none"><li>• Homes built in the 1950s and 1960s - both in town, and along the riverside, Tamarack neighborhood, and Nevers road</li></ul>

	<ul style="list-style-type: none"> <li>● Commercial areas such as the Restigouche Road Commercial District, Enhanced Living Oromocto (special care home), Canadian Foresters Manor, Sobeys distribution centre, and the 50-year old commercial development area along Restigouche Road</li> <li>● Town-owned facilities, so it can lead by example and reduce costs</li> <li>● New Civic Centre, could be built to high efficiency / LEED standards. Study whether net-zero is possible</li> <li>● Waste water treatment plant</li> </ul>
<b>Waste and Renewable Heat</b>	<p>Sources:</p> <ul style="list-style-type: none"> <li>● Wastewater treatment plants</li> <li>● Sobeys distribution centre</li> <li>● Arenas</li> <li>● CFB Gagetown heating plant</li> </ul> <p>End Uses:</p> <ul style="list-style-type: none"> <li>● Residential areas</li> <li>● Schools</li> </ul>
<b>Renewable Power</b>	<p>Sources:</p> <ul style="list-style-type: none"> <li>● Multiple land sites suitable for ground-mounted solar</li> <li>● Run-of-the-river hydroelectric from the Saint John River</li> <li>● Solar panels on multiple buildings</li> </ul>
<b>Land Use</b>	<ul style="list-style-type: none"> <li>● Multiple areas were identified for densification and mixed-use development - for example new 290 / multi-unit development near Waasis Road, and new Nursing Home. The focus will be on densifying existing serviced areas.</li> <li>● Rezoning some areas to enable different types of development</li> <li>● All new developments will need to consider impact on stormwater</li> <li>● Job creation zones were identified at Black Watch Avenue, the Gateway-Shopping District, Restigouche Road, Broad Road, the waterfront, and near Lewis Street close to the border with Burton</li> </ul>
<b>Transportation</b>	<ul style="list-style-type: none"> <li>● There is a great deal of enthusiasm to expand trail networks to encourage active transportation and ensure the community is better connected</li> <li>● Creating multi-use trails</li> <li>● Multiple key sites have been identified for EV charging stations</li> <li>● As CFB Gagetown is the primary trip generator in the town, there is an opportunity for a shuttle bus route, carpool system, and/or a dedicated transportation demand management program to identify and implement appropriate strategies to replace single-occupant vehicle commute trips to and from the base</li> <li>● Town could work with City of Fredericton to explore potential transit hub or park and ride from or to the City of Fredericton, with stops in Lincoln heights and near the airport.</li> <li>● Town could consider a car-share program (using EVs on municipal fleet), based on the model in Charlotte County.</li> </ul>
<b>Energy Networks</b>	<ul style="list-style-type: none"> <li>● Waste heat sources that include the old mall, Giant Tiger, Mulder's, and the hospital could be incorporated into a district heating system</li> <li>● NB Power substation on MacDonald Avenue could facilitate micro-hydro</li> </ul>

	<p>developments on the Oromocto and Saint John Rivers</p> <ul style="list-style-type: none"> <li>• The new multipurpose facility (slated to be operational in five to seven years) will house an arena and could use the waste heat it produces in its own operations. It could also be a candidate for combined heat and power</li> <li>• Microgrid for Canadian Forces Housing Agency (CFHA) housing area</li> </ul>
<b>Other</b>	<ul style="list-style-type: none"> <li>• Storm water and sanitary systems are being modeled, to understand impacts, and future planning</li> <li>• Waste water treatment in East (currently CFB Gagetown), may be taken over by the town</li> <li>• Waste water treatment in West may lack capacity to handle new developments - need to pump to the East</li> <li>• climate adaptation plan</li> </ul>

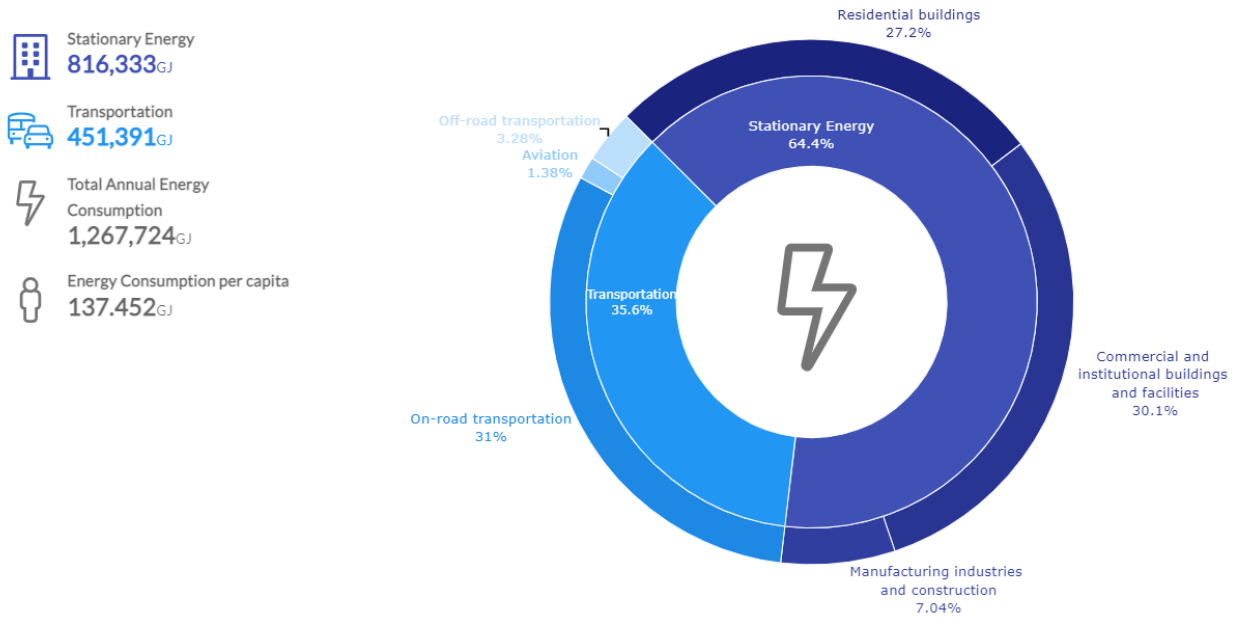
## 2.0 Community Profile

The Town of Oromocto is located in the Greater Fredericton Area of New Brunswick. The population within the town’s boundaries was 9,223, based on the 2016 census — and the area is growing slowly. After municipal reform / amalgamations, the population is now 11,486 based on the 2021 Census Info. Oromocto is known as the home of the knowledge industry of New Brunswick. One of its major employers is the CFB Gagetown, one of the largest military training centres in the Commonwealth. Oromocto is also home to the Oromocto First Nation. The Town of Oromocto does not have a CEEP, so NB SECA will allow the community to both develop one and lay the groundwork for its implementation.

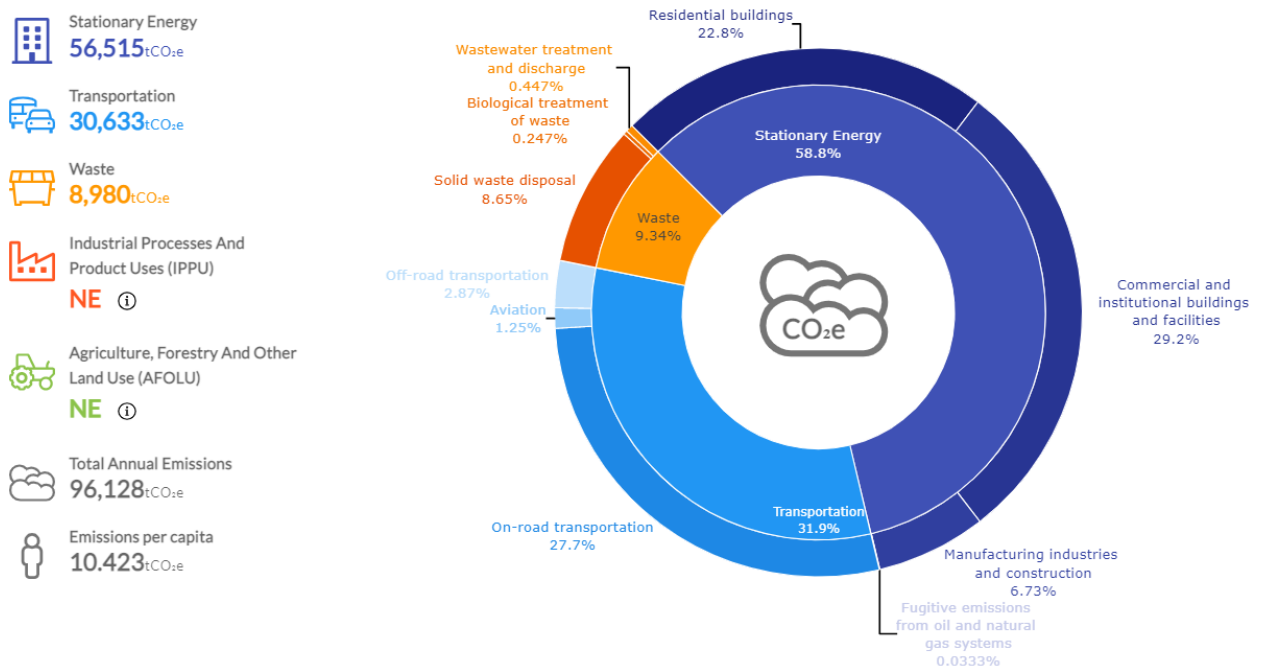
The local climate is cold and temperate, with significant rainfall (~1,200 mm per year). Seasonal flood risk areas have been identified along the town’s waterfront. Energy is provided by NB Power (electric utility) and Liberty Utilities (natural gas utility), with some buildings heated by oil and wood as well. In terms of vehicle trips, 88 per cent have a single occupant, and 6.5 per cent have a passenger. Only 3.6 per cent use walking, 0.8 percent use cycling, and 0.9 percent use another method to get around.

Data obtained from the [Municipal Energy and Emissions Database](#) show total energy consumption for the Town to be 1,267,724 GJ, mostly in the building (64.4 per cent) and transportation (35.6 per cent) sectors. Total annual GHG emissions are 96,128t of CO2 equivalent. These figures will have increased based on the recent municipal amalgamation with Lincoln and local service districts, however the Town’s recently completed GHG inventory already reflects the wider territory.

**Figure 1: Energy Consumption by Sector**



**Figure 2: Emissions by Source**





## 3.0 Community Energy Map Exercise Results

### 3.1 Goal

To provide participants with a hands-on energy mapping experience to enable them to share knowledge, discuss local opportunities, and apply basic techniques to identify opportunities in a spatial context, including planning local efficiency, clean energy, transportation, and land use actions.

### 3.2 Overview

The Map Exercise engaged multiple stakeholders, using a map, to identify opportunities for their Community Energy Plan and initiatives. The exercise enabled participants to denote these opportunities, and discuss various aspects and viewpoints.

### 3.3 Summary of Results

#### 1. Energy Efficiency

Using [green stars and circles](#), the participants identified potential buildings and neighbourhoods for energy-efficiency improvements. These are listed here:

- a) Municipal: Town Hall, fire stations, The Oromocto Arts and Learning Centre, Hazen Park Centre, the new (2018) Engineering and Public Works Facility, the wastewater treatment plant for Oromocto West, the Department of National Defence (DND) water treatment plant at the waterfront, the new civic centre (planned) and the new Visitor Information Centre (VIC), arena and curling rink, and library.
- b) Residential: Homes located in the light green shaded areas on the maps below, some of which are administered by the CFHA, that were built during the 1950s and 1960s to a uniform standard could facilitate a “templated” approach to deep energy retrofits. The high turnover of home ownership in Oromocto West could make the neighbourhood ideally suited for a Property Assessed Clean Energy (PACE) program if and when these are permitted in NB. Covert Street apartment buildings and homes located within the Oromocto First Nation also have energy efficiency potential. In addition, homes along Riverside, Tamarack neighborhood, and Nevers Road.
- c) Commercial: The Restigouche Road Commercial District, Enhanced Living Oromocto (Special Care Home), Canadian Foresters Manor, Sobeys distribution centre, the Oromocto Funeral Home and Crematorium, and the 50-year old commercial development area along Restigouche Road.
- d) Institutional: École arc-en-ciel school; Canadian Forces housing; the Oromocto Public Hospital; Saint-Vincent-de-Paul, United, and Baptist Churches; high schools; the Royal Canadian Legion; and the Kingdom Hall of Jehovah’s Witnesses.
- e) The following buildings were identified as net-zero candidates: the new VIC, École arc-en-ciel school, Hazen Park Centre, the new (2018) Engineering and Public Works Facility, Canadian Foresters Manor, the yet-to-be-built (in the next five to seven years) Community Multi-Purpose Facility, and the Long-term care facility that the community wants.

## 2. Waste and Renewable Heat

Using [red stickers and stars](#), the participants identified potential waste and renewable heat opportunities. These are listed here:

- a) Municipal: Waste heat from all waste and water treatment plants. Though it was deemed cost ineffective, others have explored the potential to capture waste heat from the King's Arrow Arena. The yet-to-be-built Community Multi-Purpose Facility — which will have an ice rink that will replace the current arena — should have waste heat capture built into the design.
- b) Residential: Onondaga apartment buildings have potential as sources of waste and renewable heat. There is potential to convert Lannark, Covert, and Gilmore Streets apartments to district heating, additionally utilizing the river as a source of geothermal heat which can generate heat for buildings and return heat to the river.
- c) Commercial: Waste heat from the Sobeys distribution centre and store, Superstore, Mulder's Meats, the arena and curling club, the Giant Tiger, and the old mall. The old mall is within the proximity of the river, which was identified as a potential source of renewable power. Giant Tiger was also identified as a building that could benefit from this source of heating.
- d) Institutional: Waste heat from the hospital, Soldiers Arena, Ridgeview Middleschool, the heating plant, and water treatment plant at CFB Gagetown.

## 3. Renewable Power

Using [green stickers and stars](#), the participants identified opportunities to integrate renewable power. These are listed here:

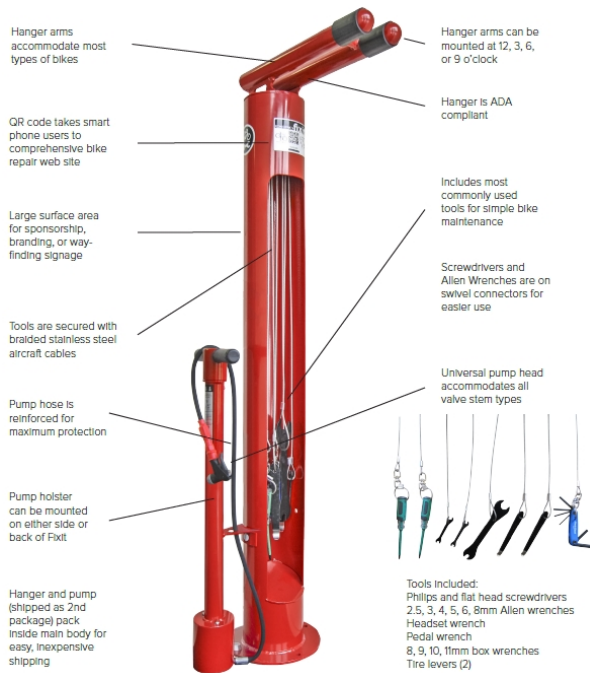
- a) A third party previously had an interest in establishing a solar farm in Oromocto West.
- b) The Sobeys parking lot has space for solar panels.
- c) The town is fortunate enough to have the Oromocto and Saint John Rivers running alongside the town. Respondents identified Canoe Road within the Oromocto First Nation, and Thatch Road as sites for the powerhouses.
- d) Solar panels could be added on the future fire hall.
- e) The current VIC site could be repurposed for electric EV charging and solar.
- f) There is land near exit 301 that will not be developed residentially as it's too close to the highway. It could be used to site a renewable energy project.
- g) The Town explored a partnership with CFB Gagetown when the base was building its solar farm, but regulatory constraints prevented the expansion of the project. Should the appropriate regulations change, an expansion of the base's system could be explored.
- h) There is a potential wind development site in an undeveloped, elevated area bordered by Restigouche Rd. to the North, Miramichi Rd. to the West, the Trans-Canada Hwy to the South, and Broad Re. to the East.
- i) The following buildings were identified as being capable of holding solar panels due to their flat roofs and large area: Sobeys distribution centre and store, Municipal Building, the Canadian Tire, Oromocto Mall, the Giant Tiger, McMinniman's Moving and Storage, the high school, and other schools in the town have potential for rooftop conversion.
- j) Respondents identified two sites along the river near the Sir Douglas Hazen Park area, as well as adjacent to the Holden and Covert Street area, as potential sites for river current power generation and heat capture facilities. The old town works department area could be converted into storage and distribution infrastructure for these facilities.

#### 4. Land Use

Using [various colours of shading](#), participants identified zones for densification, mixed use, and restricted development. These are listed here:

1. Key destinations included:
  - a. The waterfront
  - b. Deer Park
  - c. Anniversary Park
  - d. The library
  - e. The hospital
  - f. CFB Gagetown
  - g. The Visitor Information Centre
  - h. The golf course and arena
  - i. The Gateway shopping district
  - j. The downtown shopping district
  - k. The Days Inn
  - l. Schools around the town
  - m. The Base Museum
  - n. Hazen Park
  - o. Ball Diamond
  - p. Gateway Marsh
  - q. LeRoy Washburn Sportsfield
2. Areas identified for densification include the waterfront, Fynamore Street, Nevers Road, and the underdeveloped and undeveloped areas south of Oromocto High School, Black Watch Avenue, Doyle Drive apartment buildings, 101 Hershey Street, near the library, and east of King's Arrow Arena. In recent years, the CFHA has removed some high-density, multi-unit residential buildings from the area they administer, hollowing out the town's central neighbourhoods. The as-yet undeveloped land in Oromocto West is currently zoned R1 (single-family home with accessory suites permitted) but could be rezoned to allow higher-density developments.
3. Areas identified for mixed-use include the waterfront, and the under/undeveloped areas near Oromocto High School, the library, King's Arrow Arena, Black Watch Avenue, Anniversary Park, and Broad Road. There is also potential for residential development on top of the mall.
4. Respondents identified Job creation zones at Black Watch Avenue, the Gateway Shopping District, Restigouche Road, Broad Road, the waterfront, and near Lewis street close to the border with Burton.

**Figure 3: Examples of bike repair stations**



-Dero's Fixit



-Greenspoke

## 5. Transportation

Using [yellow stickers](#), [purple lines](#), and [blue stars](#), participants identified opportunities for transit amenities, EV charging, trail connectivity and intermodal hubs, etc. These are listed here:

1. Currently, Oromocto's 2012 Active Transportation Plan ensures all subdivisions are connected by pathways, but there are opportunities to connect trails and greenways further. Specific suggestions include developing trails around the wetland located at the south of the town, and extending from Oromocto West to the wetlands (this would require building a tunnel under Route 2 Highway East to connect the trails).
2. There is potential in the idea of building a footbridge over the Saint John River at the waterfront to connect to Lincoln (which amalgamated with Oromocto).
3. There is a missing connection between the multi-use trail that could link Oromocto West and the centre of town. Currently, the trail deposits users on D'Amour Street, an unlit rural highway with a soft shoulder. Creating an active transit (AT) connection between the northern trailhead and the pedestrian facilities on Restigouche Road would provide a viable AT connection between the army base, the town, and this growing residential neighbourhood.
4. Create some multi-use trails for walkers and cyclists. This can include public bike repair stations.
5. CFB Gagetown is the primary trip generator in town. Municipal staff estimate that 50 per cent of the base's complement (~7,500) live in town. A dedicated Transportation Demand Management program could identify and implement appropriate strategies to replace single-occupant vehicle commute trips to and from the base.



6. It was suggested that more EV charging stations should be placed at key parking areas in CFB Gagetown, the VIC located near Gateway Drive, the waterfront, at Waasis Road and Hiawatha Avenue, the Days Inn, the municipal building, in the parking lot of the yet-to-be-built Community Multi-Purpose Facility, and near the exit to Highway 301.
7. Respondents suggested the development of a carpool system and/or a shuttle bus route to pick up workers in Oromocto West to take them to and from CFB Gagetown. This would help to mitigate the daily traffic problems every morning at the intersection of the main highway “The Gateway” of Highway 301.
8. The town could work with the City of Fredericton to establish a Park & Ride, or transit services with stops in Lincoln Heights and near the airport.

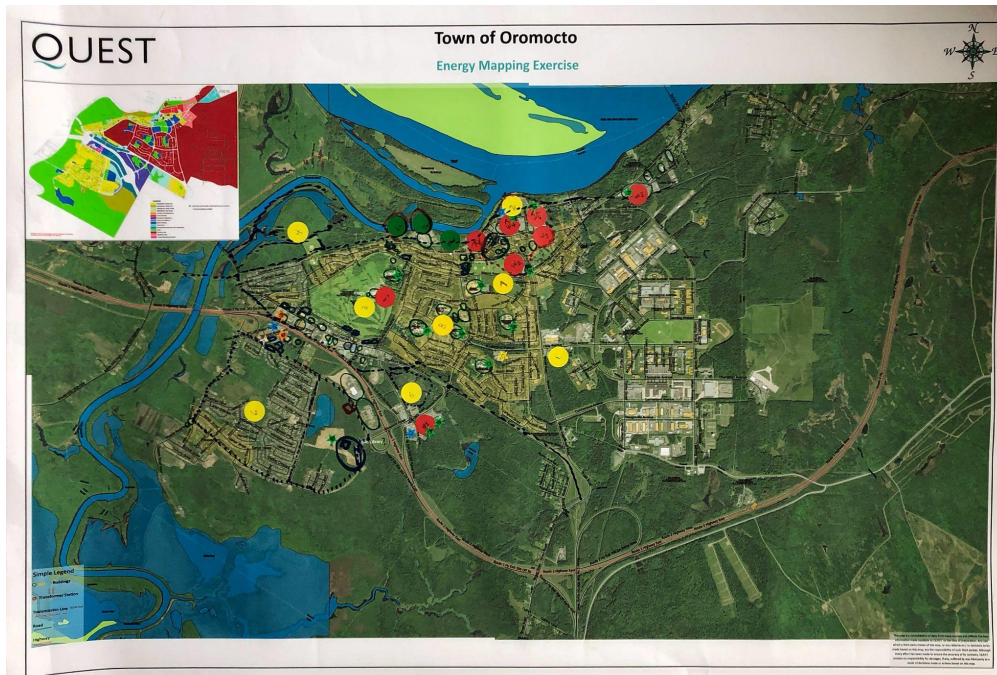
## 6. Smart Energy Networks

Using a [red marker and yellow stars](#), participants identified potential opportunities for district energy/district heat, and other types of smart energy networks. These are listed here:

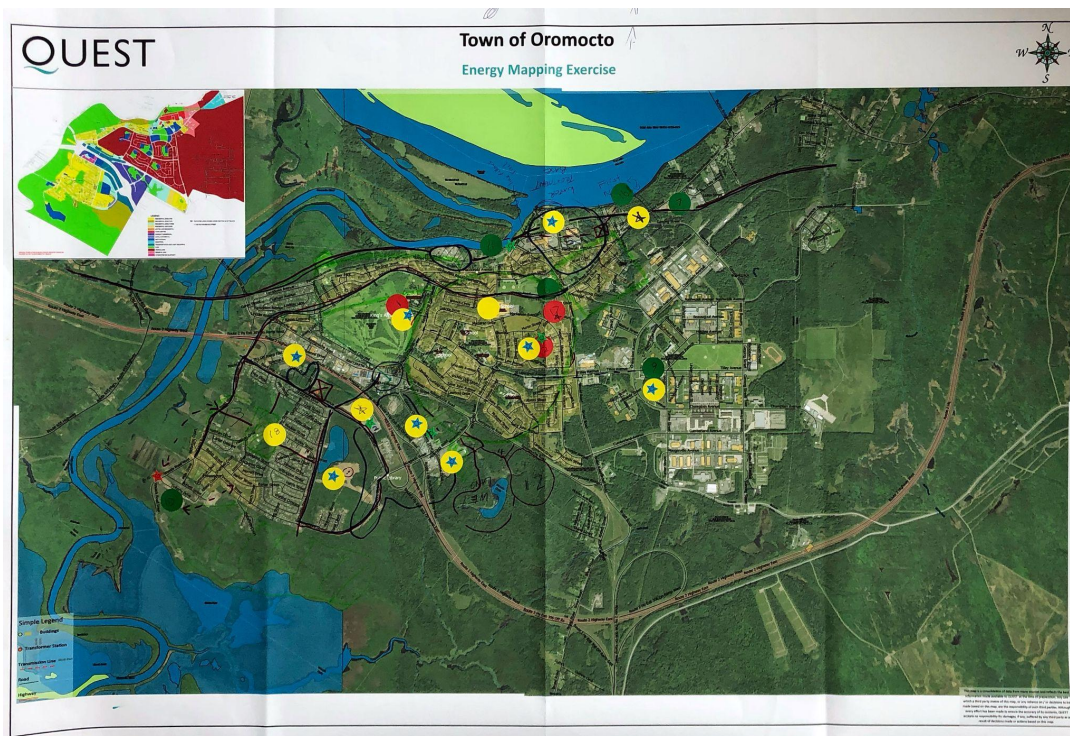
1. Waste heat from the Kings Arrow Arena could be utilized at Summerhill Street Elementary School. However, a previous study found this was not economically feasible at the time, and the arena could be decommissioned soon.
2. Waste heat from the wastewater treatment plant in Oromocto West could be used to provide heat to the nearby residences — if this is technologically and financially feasible.
3. The new multipurpose facility will house an arena, and could use the waste heat it produces in its own and Hubbard’s School’s operations. It could also be a candidate for combined heat and power.
4. The NB Power substation on MacDonald Avenue could facilitate micro-hydro development on the Oromocto and Saint John Rivers.
5. A microgrid could be developed for the CFHA housing area west of CFB Gagetown, especially if the base’s solar PV system was expanded.
6. The high turnover of home ownership in Oromocto West could make the neighbourhood ideally suited for a solar city-style Property Assessed Clean Energy (PACE) program if and when these are permitted in NB.
7. Respondents suggested that the cluster of waste heat sources — including the Oromocto Mall, the Giant Tiger, Mulder’s, and the hospital — could be incorporated into a district heating system.
8. Respondents expressed that there is potential for the development of the much-needed seniors care complex, which can utilize a smart energy network.

7. **Map Images** (High-resolution images will be sent as a separate attachment)  
See legend in the Annex.

**Map #1**

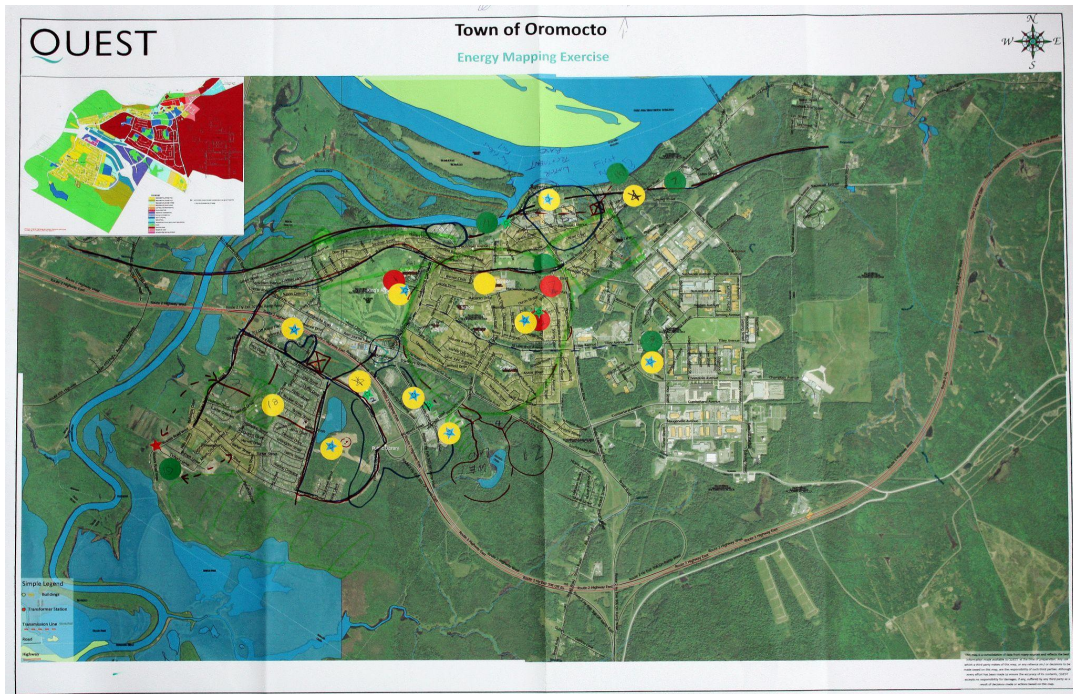


**Map #2**

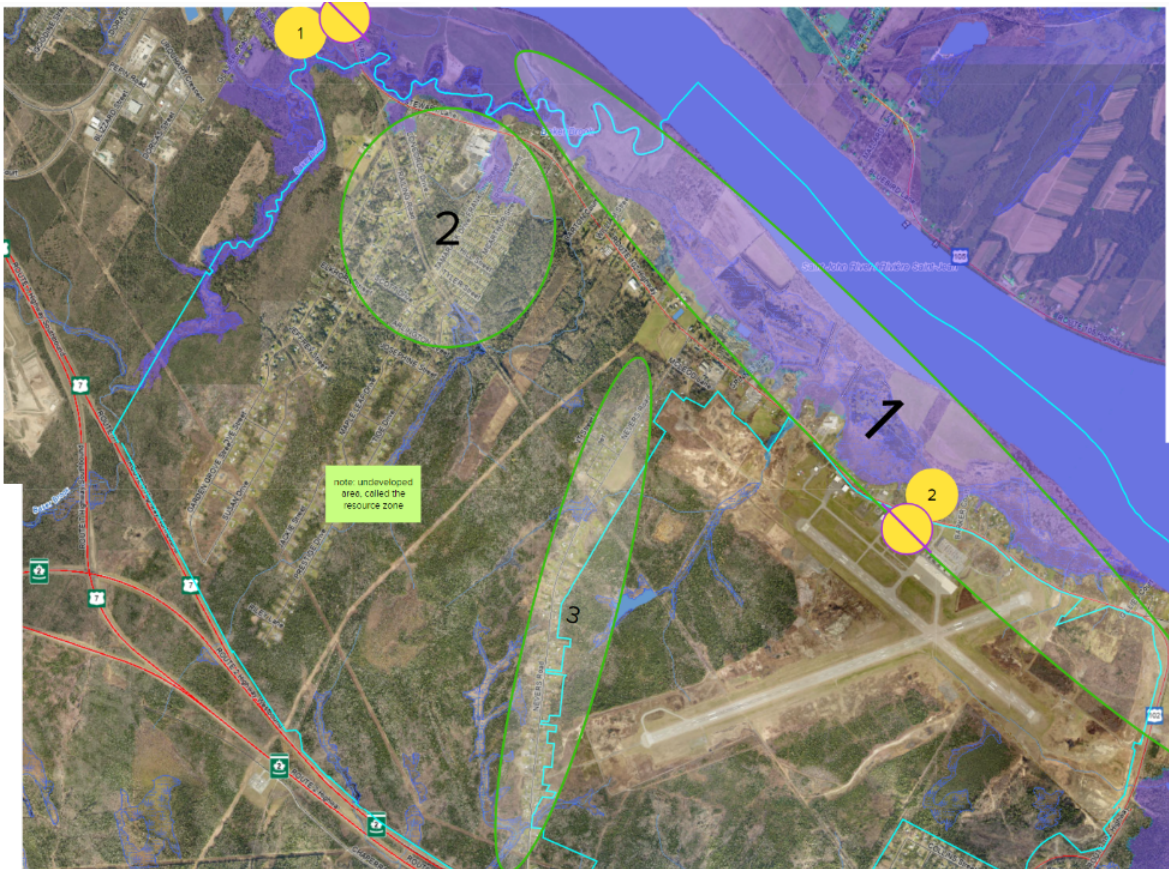




Map #3



Map #4







***Disclaimer:** Maps were produced with best available data at the time. Decisions based on map information should be taken into context. QUEST Canada will not take responsibility for any damages caused by decisions made based on these maps.*

## 4.0 Action Planning Round

### 4.1 Goal

To provide participants with an opportunity to discuss the most significant findings, and present their ideas for key areas for improvement, related needs, and potential actions.

### 4.2 Overview

Participants were asked a series of questions. For each question, they wrote their answers on a sticky note. These sticky notes were arranged onto panels by theme. The responses are summarized in the sections below.

### 4.3 Summary of Key Opportunities and Actions

Throughout the workshop, respondents identified a number of opportunities. Here is a list of opportunities, prioritized based on the Action Planning Round. Priorities include:

1. **Communications and Raising Awareness:** Due to the number of buildings that would benefit from energy efficiency retrofits — and the programs available from NB Power — there is a key opportunity to raise awareness about the benefits of energy efficiency and to begin undertaking work in this area immediately.



The town can communicate information via their Recreation and Tourism Guide, in municipal water bills, and via their social media channels. Water conservation can also be incorporated into messaging. Information can be made available at Town Hall. One group even spoke about the possibility of the town covering the \$99 evaluation cost for homeowners in certain areas to promote uptake in [NB Power's Total Home Energy Savings Program](#). The town's key account specialist at NB Power is Tamara Brown ([tbrown@nbpower.com](mailto:tbrown@nbpower.com)). Town staff are encouraged to connect to begin planning.

In addition to NB Power, other partners include CFB Gagetown, seniors' groups, local schools (to incorporate energy efficiency content into curriculum), and Liberty Utilities. Funding to undertake energy efficiency initiatives and deeper retrofits can come from NB Power, the Federation of Canadian Municipalities and the New Brunswick Environmental Trust Fund. More information will be provided to the town about funding and other services they can access.

**Residential Energy Retrofits:** Much of the housing stock in the central area of town administered by the CFHA was built in the 1950s, and from a standardized template. The age of the buildings makes them ideal candidates for substantial energy efficiency improvements. While the uniformity of their design should make a standardized approach possible, improving the efficiency and cost effectiveness of energy upgrades across multiple buildings, and reducing the time required for an intrusiveness of the retrofits. Such a unique, neighbourhood-wide community energy efficiency project could generate rapid, substantial, and widespread energy savings, and would be a good potential candidate for the Federation of Canadian Municipalities Green Municipal Fund's [Signature Initiative](#) stream, which "helps Canadian cities and communities of all sizes study bold environmental projects that reduce GHG emissions and...is designed to accommodate transformative, best-in-class municipal projects, meaning they're highly innovative and impactful."

- Densification and Active Transportation:** Respondents discussed densifying Oromocto West, Restigouche Road, Waasis Road, and the downtown core — as well as expanding the active transportation network — as options to ensure that there are areas of town where there are essential services within walking distance. Mixed-use development and densification should also be done with sustainability in mind. The town would likely require some bylaw amendments (e.g. ensuring development accounts for a minimum of affordable housing, allowing rooftop solar arrays, rezoning). From a permitting perspective, developers could also be incented to incorporate green space and/or active transportation solutions in lieu of paying certain fees.

Partners involved could include commercial and residential developers, Maritime Road Development Corporation, the Chamber of Commerce, and large retailers.

- Net-Zero Buildings:** The Town plans to consolidate a number of community facilities, including the arena, into a new community multiplex building within the next five years. The new facility — which will be potentially developed in partnership with CFB Gagetown and the region — presents an opportunity to develop the province's first net-zero public building. Energy opportunities include waste recovery from the ice rink along with a geothermal system. With a feasibility study for the new facility currently underway/recently developed, energy

considerations should be integrated into the design and development process for the new facility as soon as possible to ensure opportunities to reduce energy use and emissions considered as factors. A similar opportunity exists with the long-term care facility that the town hopes will be built in Oromocto in the near future.

4. **Property Assessed Clean Energy:** Because they are owned by families tied to CFB Gagetown, many of the homes in Oromocto West are sold within two or three years of being purchased. People who anticipate selling their homes soon have little incentive to invest in energy efficiency as they are unlikely to benefit from the energy savings generated by their investment.

Given the town's strong financial position, a Property Assessed Clean Energy (PACE)-style home energy retrofit financing program is an ideal fit for such a situation. Pioneered in Canada with Halifax's Solar City Initiative, PACE programs employ a financing mechanism that enables private home and building owners to borrow money against their property for energy efficiency and renewable energy projects. Those costs are repaid by the property owner via an assessment on the property's regular tax bill as regular monthly payments over an agreed-upon period. In the event the property is sold, the benefits of the project and responsibility for repayment shift to the new owner.

New Brunswick does not have the enabling legislation in place for its municipalities to offer PACE programs, but the idea is being discussed at the provincial level. The town could conduct a feasibility study in the near term in order to prepare for this likely eventuality. The Federation of Canadian Municipality's Community Energy Financing provides grants that cover up to 80 per cent of the costs of such projects.

## 5.0 Conclusion and Next Steps

This report highlights the consolidated results of the energy mapping exercise for the Town of Oromocto, and has identified opportunities for their CEEP, including for energy efficiency, harnessing local energy opportunities, improving land use, transportation, among others. Key findings can help inform your next steps and vision for a Smart Energy Community.

### 5.1 Next Steps

The Town of Oromocto can use the information in this report toward their CEEP, and/or specific projects and initiatives that the town or local stakeholders may wish to undertake.



As part of NB SECA, QUEST Canada also facilitated CEEP development and implementation workshops with the Town of Oromocto. The workshops included exercises to develop a community energy vision, set targets and goals, and identify who should be assigned as the lead responsible for each potential action and which partners need to be involved. The exercises also created an assignment timeline, a target (e.g. percentage of GHG reduction), and identified whether each action needs funding, a study, or supporting policies.

QUEST Canada looks forward to continued collaboration with the Town of Oromocto as part of the NB SECA Program. For any further information about this report or the Accelerator Program, please contact Eddie Oldfield, Senior Lead, QUEST Canada, Phone: 506-440-3854 or Email: [goldfield@questcanada.org](mailto:goldfield@questcanada.org).



# 6.0 Energy Map Legend

## EXERCISE LEGEND






### Step 1 - Energy Efficiency

-  Efficiency Retrofit Opportunities
-  Net-Zero / Carbon Neutral Building





### Step 2 - Waste & Renewable Heat

-  Building Clean Heat Conversion
-  Waste Heat Sources
-  Renewable Heat Sources





### Step 3 - Renewable Power

-  Building Clean Power Conversion
-  Renewable Electricity Site (e.g. S=solar)
-  Combined Heat and Power (e.g. B=biomass)
-  Utility Infrastructure (e.g. substation, storage)
-  Power Line (connecting power to grid)






### Step 4 - Land Use

-  High Density
-  New Mixed Use Development
-  Green Infrastructure
-  Job Creation Area

### Step 5 - Transportation

-  1 Key Destinations
-  EV Charging Station or destination
-  Transit Network and Transit Stop / Stations
-  Active Transit and Connectivity

### Step 6 - Smart Energy Networks

-  District Energy Plant
-  District Energy Anchor Load
-  Other Nearby Buildings (Mixed Use)
-  Draw Red Circle around the System
-  Microgrid areas (with Renewables, Storage); Solar Neighborhood (<100kW per building); Smart Grid/City Pilot or Development Site; Waste to Energy System; Geothermal / District Heat; Biogas or Fleet, etc.



## 7.0 Participant List

Name	Organization/Role	Title	Email
Bill Jarratt	Town of Oromocto	Director of Recreation and Tourism	bjarratt@oromocto.ca
Bob Clarke	Climate Action / Zero Carbon Committee Member	Committee member	rclarke.home@rogers.com
Bruce Langhus	Climate Action / Zero Carbon Committee Member	Committee member	brucelanghus@gmail.com
Cindy Goguen	Town of Oromocto	Acting Town Clerk	goguen@oromocto.ca
Clair Ripley	Climate Action / Zero Carbon Committee Member	Committee member	clairripley@gmail.com
Dallas Gillis	Town of Oromocto	Planner	dgillis@oromocto.ca
David Goodfellow	Town of Oromocto	Engineering Technologist	dgoodfellow@oromocto.ca
Dr. Vaughan Roxborough	Climate Action / Zero Carbon Committee Member	Committee member	Vaughanroxborough@yahoo.ca
Ed Genova	NB Power	Strategic Advisor - Indigenous Relations	egenova@nbpower.com
Jason Walsh	Liberty Utilities	Territory Manager, Community and Business Development	jason.walsh@libertyutilities.com
Jody Price	Town of Oromocto	Fire Chief	Pricej@oromocto.ca
John Fife	Town of Oromocto	CAO	fife@oromocto.ca
John Jackson	Town of Oromocto	Director of Planning & Compliance	jjackson@oromocto.ca
John Thomson	Town of Oromocto	Treasurer	jthomson@oromocto.ca
Lorraine Dawe	Town of Oromocto	Deputy Mayor	dawe@oromocto.ca
Marc-Etienne Rodrigue	Canadian Forces - Gagetown	Division Range and Training Area Management Officer	marc-etienne.rodrique@forces.gc.ca

---

Patrick Nicholson	Liberty Utilities	Manager, Community and Business Development	patrick.nicholson@libertyutilit ies.com
Sara Mudge	NB Power	Community Energy Specialist	smudge@nbpower.com
Tanya Malloy	Climate Action / Zero Carbon Committee Member	Committee member	tanya.malloy@yahoo.ca

---