



# Minister's Report on Climate Change

Risks and Progress Toward Targets | 2023-2024

## Table of Acronyms

ALUS	Alternative Land Use Services
ARIP	Agriculture Research and Innovation Program
BBEMA	Bedeque Bay Environmental Management Association
CCF	Climate Challenge Fund
CHRIS	Climate Hazard & Risk Information System
DTI	GPEI Department of Transportation and Infrastructure
ECCC	Environment and Climate Change Canada
EPAA	East Prince Agri-Environment Improvement Association
FHIMP	Flood Hazard Identification and Mapping Program
GHG	Greenhouse gas emissions
GPEI	Government of PEI
NIR	National Inventory Report on Greenhouse Gas Emissions
PEI	Prince Edward Island
S-CAP	Sustainable Canadian Agricultural Partnership
SHIP	Soil Health Improvement Planning
SoTC	State of the Coast report
UPEI	University of Prince Edward Island



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# Executive Summary

The effects of climate change are interconnected and impact all aspects of our lives. Recognizing this, the Province has strived to have a whole-of-government approach as detailed in the **Net-Zero Framework and Provincial Climate Adaptation Plan**.

Together these plans outline actions that show the provincial government's dedication to reducing our greenhouse gas emissions and improving climate resiliency as we prepare for the impacts of climate change.

This year's Minister's Report on Climate Change Risks and Progress Toward Targets highlights key actions taken across all government departments. The initiatives featured in this report emphasize milestones in key industries, buildings and communities, transportation, nature and biodiversity, research and leadership, and extreme weather and preparedness. A full list of all climate action taken by the Government of PEI in the fiscal year 2023-24 can be found in the subsequent **Supporting Materials** document.

Investments in efforts to reduce and manage climate change risk across all Government of PEI departments in 2023-24 was approximately \$326,072,000. This includes approximately \$144,421,300 in operational investments and roughly \$181,650,700 in capital investments. This significant investment includes administration, salary, programs, and grants.

Despite the increases in our population, our emissions continue to decrease, moving the needle closer to the targets set out in the *Net-Zero Carbon Act*. The latest National Inventory Report (NIR) on Greenhouse Gas Emissions (2024) indicates that GHG emissions in PEI were 1.602 megatonnes (Mt) which is a 1.9% decrease (31,324 tonnes) over the previous year. This reduction equates to 75% of the way to PEI's legislated 2030 GHG emissions reduction target and 31% of the way to PEI's legislated 2040 GHG emissions reduction target.

2023-24 is the first year for reporting on the Provincial Climate Adaptation Plan. Since its release in late 2022, notable progress has been made on several actions to support vulnerable populations, primary industries and PEI's natural habitat. Sector-specific climate risk and opportunity work has been completed in the seafood sector, the Province received the first State of the Coast report from UPEI, and our climate resiliency has improved through education and awareness and better access to resources and supports across the Island.

While this report focuses on the Government of Prince Edward Island's climate actions, the work completed could not take place without the cooperation, collaboration, and support of a multitude of partners including community organizations, federal and Indigenous governments, municipalities, academia, and others.

The Government of Prince Edward Island will continue to invest in climate action in an effort to make progress towards reduction targets and to reduce the risks of climate change.

# Minister's Message

Islanders continue to work hard to do their part to reduce their carbon emissions and adapt to climate change. With over 12,000 free heat pumps installed since the program began and more Islanders taking public transit than ever before, we are well on our way to net-zero.

With that being said, it's not a success-only journey. New research highlighted in the Post-Fiona Update Report shows that Post-Tropical Storm Fiona had a deep impact on our forest, reducing the amount of carbon the forest can absorb. Up-to-date research like this is crucial to understanding our current carbon budget so we can design climate action programs to reach our goals.

To continue our steady progress towards our targets, in the 2023-24 fiscal year we continued to subsidize public transit, preserving \$2 rides for all, while also expanding the routes to more areas of the province. In addition, we funded 24 active transportation projects and provided 27 bike racks for installation on school properties across PEI. We have also undertaken work to modernize our forestry policy and legislation based on the best available science and public input. We are developing shoreline management plans - the first of its kind in Canada - to prepare for further erosion using best practices for each local area.

Significant investments were made to begin implementation of our whole-of-government, 5-year Climate Adaptation Plan to build resilience as we respond to the climate hazards we face. This year we saw sector-specific work completed in fisheries and agriculture, and we made investments in critical infrastructure and back-up power to prepare us for extreme weather events. We also received the first State of the Coast report from University of PEI's Canadian Centre for Climate Change and Adaptation, along with recommendations related to the development of interim shoreline policy.

We have renewed our commitment to renewable energy with the expansion of the Eastern Kings Wind Farm. We have launched funding for community based renewable energy projects like fitting the rink in Tyne Valley with solar panels and heat pumps.

Our Cleantech Park in Georgetown is well on its way to becoming a reality, with work underway on the province's first ever cleantech-focused hub for academics, industry and government.

Thank you to the staff in my department for remaining resolute in the pursuit of these goals. We are grateful to all government departments who are leading climate action in their respective sectors and mandates. PEI continues to stand out nationally through advancing this whole-of-government effort to build resiliency. I also appreciate our valued community partners such as the University of Prince Edward Island and Holland College. I am grateful for the input and feedback from our local businesses working in cleantech. Most importantly, I appreciate the work of all Islanders as you make your daily choices to reduce emissions.

Please join me in continuing this important work well into 2040 and beyond.

Sincerely,



**Hon. Gilles Arsenault**

MINISTER OF ENVIRONMENT, ENERGY AND CLIMATE ACTION

# Strategic Approach

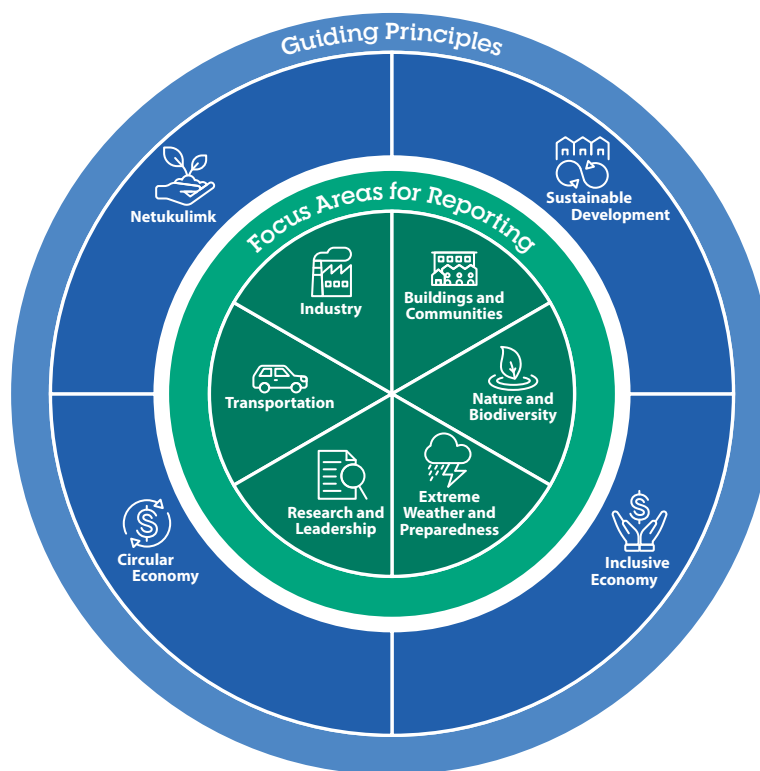
## Net-Zero Carbon Act

In accordance with Section 9(5) of the *Net-Zero Carbon Act* ('the Act') adopted in 2020, the Minister's Annual Report on Climate Change Risks and Progress Toward Targets shall be tabled in the Fall sitting of the Legislative Assembly each calendar year. Further, Section 7(1) of the Act sets out the following targets:

- By 2030 and for each subsequent calendar year, PEI greenhouse gas emissions will be less than 1.2 megatons of carbon dioxide equivalent per year; and
- By 2040 and for each subsequent year, PEI greenhouse gas emissions will be at a level where carbon neutrality is achieved.

## Guiding Principles and Legislation

The long-term objective of the Province is to achieve sustainable prosperity. The *Net-Zero Carbon Act* recognizes sustainable prosperity as both a shared responsibility and necessity for all government departments within the context of a changing climate. To ensure climate action is contributing to the Province's long-term objective, efforts should be built upon the guiding principles depicted to the right.



## 2040 Net-Zero Framework

In February 2022, the Province of PEI released the **2040 Net-Zero Framework** which sets the province on the path to achieve its vision to become Canada's first Net-Zero province by 2040. **The Framework breaks down the overarching goals into sectoral goals and emissions reduction targets through the following six distinct Pillars:**



## Provincial Climate Adaptation Plan

In October 2022, the Province of PEI released the **Provincial Climate Adaptation Plan (2022)**. The plan provides a strategic roadmap for the province to better prepare for the future while lessening climate change's impacts on people living on PEI. **The plan contains 28 actions under the following six pillars affecting all government departments along with Island residents and communities:**



## Whole-of-Government Approach

In January 2024, the Canadian Climate Institute<sup>1</sup> noted that the Province of PEI goes beyond any other government in Canada in establishing climate change as a whole-of-government priority. The responsibility for PEI's Provincial Climate Adaptation Plan (2022) and Net-Zero Framework (2022) related investments are distributed across provincial portfolios, supported by departmental Climate Change Coordinators who were appointed across government in 2020. Decentralizing climate action across government enhances the Province's capacity to adapt and respond to climate change.

## Low Carbon Resilience

Low carbon resilience is an approach used to coordinate and co-evaluate climate adaptation, mitigation and co-benefits in government policy, planning and implementation processes. This approach is intended to simultaneously reduce climate risks and emissions, while also generating ecological, economic and social benefits.

The Province strives to take actions which will build PEI's ecological, economic and social resilience to withstand the impacts of climate change, while also achieving our net-zero goals. This means adopting strategies that can reduce our greenhouse gas emissions and our vulnerability to climate change at the same time.

1 <https://440megatonnes.ca/insight/are-the-provinces-and-territories-holding-themselves-accountable-for-climate-action/>

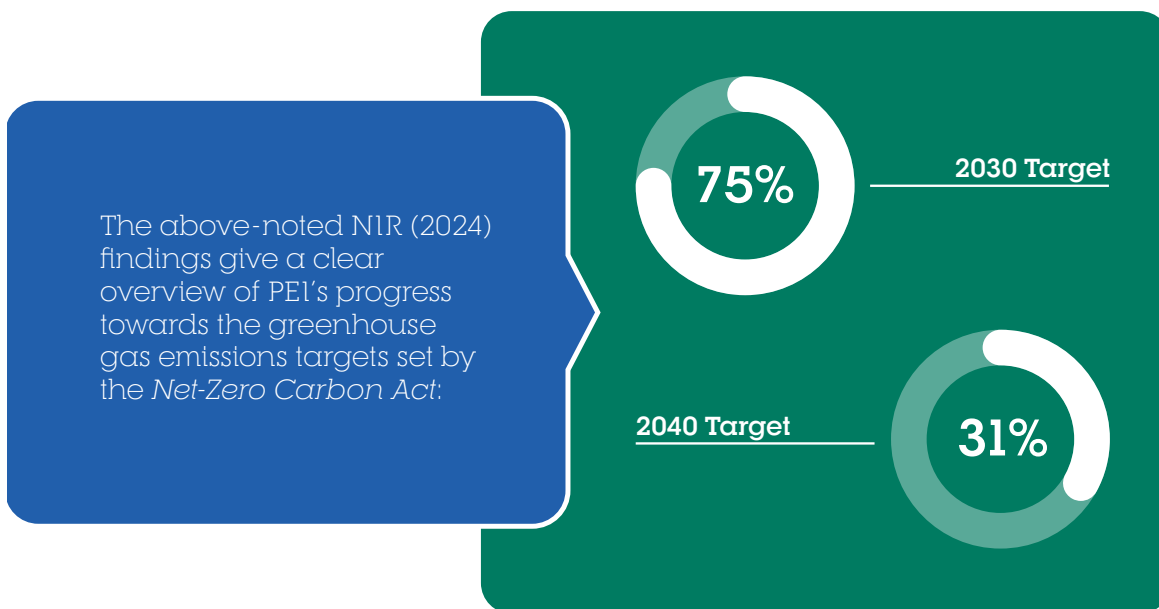
# Progress to Net-Zero Targets

**Bold and innovative action is needed to achieve PEI's Net-Zero targets and build a sustainable and prosperous Prince Edward Island.**

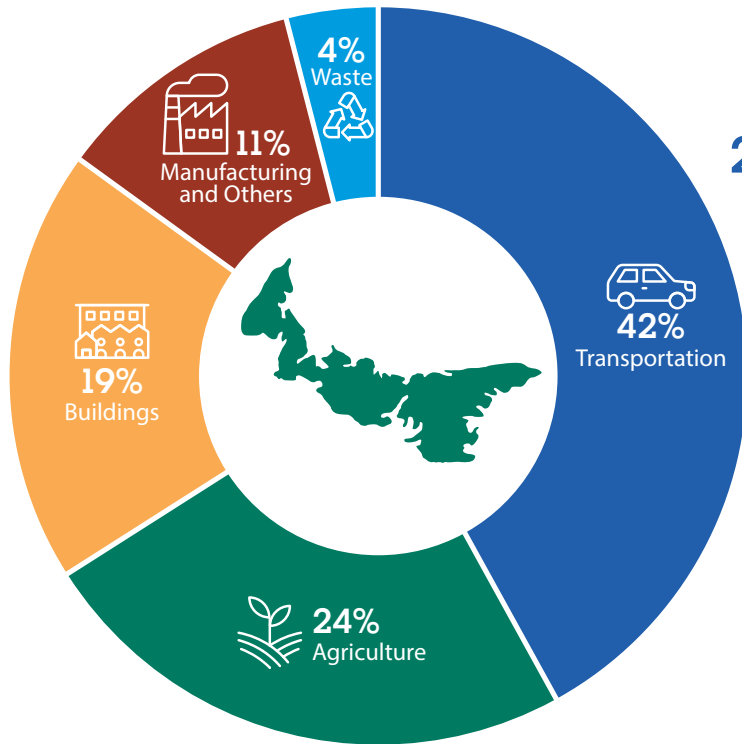
The Government of PEI relies on the Environment and Climate Change Canada (ECCC) National Inventory Report (NIR) on Greenhouse Gas Sources and Sinks in Canada for its official provincial emissions data across all sectors. The NIR uses an internationally accepted methodology that remains the most accurate resource available for federal, provincial, and territorial emissions data. The latest NIR (2024) includes information on national, provincial, and territorial greenhouse gas (GHG) emissions from 1990-2022.

## Key findings from the NIR (2024) include:

- GHG Emissions in Prince Edward Island were 1.602 megatonnes (Mt) during the data year (2022), representing a 1.9% decrease (31,324 tonnes) over the previous year (2021); and
- PEI's per capita emissions were 9.6 tonnes during the data year.







## 2022 GHG Emissions at a Glance



**1.602 Megatonnes**

31,324 tonnes less than 2021



**9.6 Tonnes**

Per capita emissions

In recent years, PEI’s ambitious targets and legislative reporting requirements on progress toward targets has led to a need for some independent exploration of historical and projected emissions data. In response, the Government of PEI has worked with Navius Research and their proprietary energy-economy modelling software (gTech) to develop estimates for all sources of emissions tracked by NIR from 2015-2035 to better understand how provincial mitigation policies impact emissions projections.

Type	NIR		Navius Projections (Current Policy)			
	2005	2022	2023	2024	2025	2030
Energy-related	1,439	1,167	1,127	1,086	1,045	945
Non-energy related	447	435	432	437	442	446
Total	1,886	1,602	1,559	1,523	1,488	1,391

Sources: (1) Environment and Climate Change Canada’s 2022 National Inventory Report, (2) Navius analysis using gTech.

The most promising opportunity for additional emissions reductions is to build on the abatement actions PEI is already promoting, namely electrification and renewable energy deployment, as well as exploration into renewable fuel sources to decarbonize transportation sub-sectors. One thing is certain, **strengthened climate mitigation policies and programs will be needed for PEI to achieve its legislated net-zero target.**

# Climate-Related Expenditures

In 2023-24, Government spent an estimated \$326,072,000 on actions dedicated to reducing greenhouse gas emissions and managing PEI's climate change risk.

These investments span across departments and are summarized in key categories related to the Net-Zero Framework and Provincial Climate Adaptation Plan.

## OPERATING INVESTMENTS

	Forecast 2023-24	Estimates 2024-25
Industry	\$17,150,100	\$19,182,200
Buildings and Communities	\$93,054,500	\$75,773,400
Nature and Biodiversity	\$15,497,900	\$17,738,000
Research and Leadership	\$2,275,200	\$4,460,000
Transportation	\$16,443,600	\$14,642,600
Extreme Weather Preparedness and Recovery	\$15,112,600	\$4,059,700
<b>TOTAL</b>	<b>\$144,421,300</b>	<b>\$135,856,000</b>

## CAPITAL INVESTMENTS

	Forecast 2023-24	Estimates 2024-25
Buildings and Communities	\$90,627,300	\$2,500,000
Transportation	\$89,034,700	\$106,619,300
Extreme Weather Preparedness and Recovery	\$1,988,700	\$230,000
<b>TOTAL</b>	<b>\$181,650,700</b>	<b>\$109,349,300</b>
<b>GRAND TOTAL</b>	<b>\$326,072,000</b>	<b>\$245,205,200</b>

\*Budget forecasts and estimates were collected from respective departments and represent the most up to date information at the time of writing this report.

\*\*Some actions are cost-shared with the federal government and/or other organizations. The forecasts and estimates provided represent the total budget of those actions including GPEI costs.

\*\*\* PEI Energy Corp expenditures are reported in their annual report and are excluded here.

## Federal Contributions

While the Province's spending on climate action is substantial, many of the programs and projects also rely on a federal cost share.



# Climate Action

This section offers key highlights of provincial climate actions taken across various domains during the 2023-24 fiscal year, as well as actions underway or planned for the 2024-25 fiscal year.

This includes actions taken to manage climate risks and adapt to a changing climate (climate adaptation), as well as those taken to reduce Greenhouse Gas (GHG) emissions (climate mitigation). These actions have been guided by the goals set out in the Province's 2040 Net-Zero Framework (2022) and actions set out in the Province's Climate Adaption Plan (2022).

This work requires a whole-of-government effort. For a comprehensive look at all actions taken in the 2023-24 fiscal year and planned for the 2024-25 fiscal year, including which Provincial Government departments contributed to the actions highlighted below, please refer to the **Supporting Materials**.

The changing climate will affect the natural, built, and social environments on Prince Edward Island, so our approach to climate action must be equally holistic. Enhancing the quality of people's lives is the core objective of climate mitigation and climate adaptation initiatives. This goal is the common thread through actions taken to strengthen our built communities, social support networks, and natural environment. Through research and leadership on climate action, PEI continues to assert its ability to drive investment and innovation in a variety of sectors. Through extreme weather and emergency preparedness, the Province is working to ensure that communities have access to the tools and knowledge that build resilience to climate events. Empowering individuals with the knowledge, connections and tools to take climate action allows for communities to maintain their unique strengths and define their own goals in the context of a changing climate.

“

The changing climate will affect the natural, built, and social environments on Prince Edward Island, so our approach to climate action must be equally holistic.

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# Climate Action - Industry

## Net-Zero Framework

Priority areas for investment in climate mitigation across industry are outlined in Pillars 3 and 5.

## Provincial Climate Adaptation Plan

Priority areas for investment in climate adaptation in industry are outlined in Pillar 3.

Much of PEI's industry-related greenhouse gas emissions impact is associated with agriculture and the built environment. To achieve GHG emission reduction targets in the industrial sector, strong partnership between industry and government is required. Environmental efforts must also be balanced with sustainable economic growth. Building industry resilience to climate impacts and supporting climate-sensitive livelihoods remain key areas of focus.


## The following are Industry sector highlights of provincial investments from 2023-24:



**105**  
Agriculture Research & Innovation Program (ARIP) Projects Approved.



Completing a Climate Change Risk and Opportunity Assessment and Adaptation Strategy for the Seafood Industry.



**73**  
Projects Approved Through the Agriculture Energy Systems (AES) Pilot Program.

- Creating a new Climate Adaptation Section within the Agriculture Resources Division to provide additional capacity to develop and deliver climate related programs and services.
- Finalizing the bilateral agreement between PEI and Agriculture and Agri-Food Canada, and launched their Sustainable Canadian Agricultural Partnership (S-CAP) (2023-28).
- Providing cost-share support for backup power generation capacity on farm through the On-Farm Electrical Interruption Assistance Program.
- Collaborating with the PEI Federation of Agriculture to support industry-led adaptation planning activities and development of a carbon offset market access strategy.
- Diverting 59,043 tonnes of material from the province's landfill (excluding material sent to private recycling markets and waste diversion activities). In addition, producing 9,878 tonnes of 'Category A' compost at the Central Compost Facility and processing 23,723 tonnes of waste at the PEI Energy Systems facility.
- Initiating work with Synergy Enterprises to "green" the Port of Charlottetown, focusing on clean energy and ship arrival. In 2023-24, a feasibility and carbon capture analysis was conducted as part of the initial phase of the project.
- Supporting, in partnership with Lennox Island First Nation, an Electric Fishing Feasibility Study focused on three lobster boats in Lennox Island First Nation, which concluded that the vessels are strong candidates for electric propulsion.
- Providing funding to the PEI BioAlliance to conduct a Cleantech Strategy.
- Supporting, in partnership with the federal government, two climate mitigation orientated projects in PEI's fish and seafood sector through the Atlantic Fisheries Fund.

# Climate Action - Buildings and Communities

## Net-Zero Framework

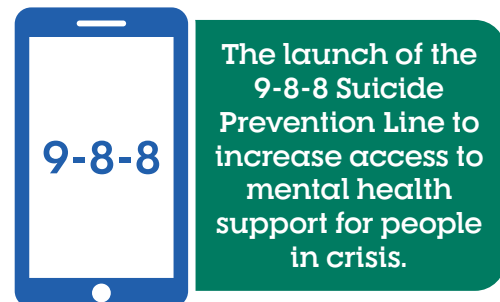
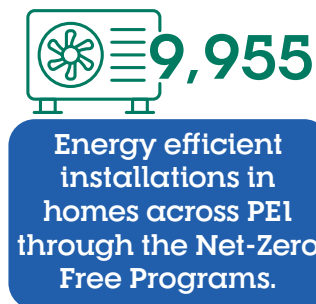
Priority areas for investment in building and communities related climate mitigation are outlined in Pillar 2.

## Provincial Climate Adaptation Plan

Priority areas for investment in climate adaptation in buildings and communities are outlined in Pillars 2 and 4.

The Province recognizes the importance of strengthening our communities while making smart choices to ensure our sustainable future. Ensuring that the places where people grow up, work, live, and come together are energy efficient and resilient to climate change is critical to the strength of our communities. Emissions from buildings continue to decrease despite increases in population, residential investments, and new home construction. Continued support to communities around how to best develop and adapt existing infrastructure to be climate resilient remains vital.

## Highlights in the domain of Buildings and Communities from 2023-24 by the Province include:



- Delivering 7,259 free heat pumps, 1,848 free electric hot water heaters, and 848 free energy efficient insulation installations in homes across PEI through the Net-Zero Free Programs. This resulted in approximately nine (9) million litres of home heating oil savings for PEI residents.
- EfficiencyPEI programming (residential and commercial) resulted in 188,744 GJ of energy savings and reduced 22,495 tonnes of GHG emissions. For further information on this, please see the **Supporting Materials**.
- Setting the foundation to begin voluntary initial digital energy efficiency assessments of PEI homes—the first move towards a “live labelling system” intended to achieve a digitalized, collaborative and equitable low-carbon homes ecosystem across PEI by 2030.
- Initiating the design and construction of public infrastructure built to a Net-Zero standard including the new Sherwood elementary school in the City of Charlottetown and the new high school in the Town of Stratford, both of which are currently under construction.
- Amending the design of Charlottetown supportive housing projects to address flood risk and accessibility following a review of applicable climate data.
- Adopting the 2020 editions of the national building and energy codes. The 2020 codes incorporate advanced energy performance tiers. The Code Acceleration Program was launched to help with the adoption of the advanced energy performance tiers to enhance energy efficiency in housing and small buildings.

## CLIMATE ACTION - BUILDINGS AND COMMUNITIES

- Investing in energy efficiency, resiliency, and emergency preparedness upgrades to public housing buildings that includes new heating, ventilation, and electrical systems, exterior upgrades to insulation, windows, roofing, siding, and waterproofing, as well as installation of backup power systems.
- Installing approximately 230 heat pumps through the Community Revitalization Fund's Heat Pump Initiative for community centers, places of worship, and municipalities.
- Developing guidelines for the Municipal Infrastructure Fund, requiring projects to be located within proximity and easy access to local services to reduce car dependency. Coastal Hazard Assessments and the Climate Hazard & Risk Information System (CHRIS) will be used to anticipate additional climate risks.
- Connecting vulnerable Islanders to programs and services across departments through Seniors Navigators.



# Climate Action - Transportation

## Net-Zero Framework

Priority areas for investment in transportation related climate mitigation are outlined in Pillar 1.

## Provincial Climate Adaptation Plan

Priority areas for investment in climate adaptation in transportation are outlined in Pillar 2.

Making electric vehicles more affordable, shifting to renewable fuels, investing in charging infrastructure, and prioritizing lower-cost resilient avenues for active transportation and transit remain a priority. Ensuring our transportation investments can withstand climate impacts continues to be important.

## Highlights in Transportation from 2023-24 include:



- The Hillsborough Bridge tracked 43,310 crossings by active transportation users, and the North River Bridge tracked 16,140 crossings by active transportation users.
- The Public School Board bus fleet added 25 electric school buses, bringing the fleet to 30% electric (excluding spare buses).
- Rural T3 Transit one-way passenger ridership increased by 43,758 trips. The Cavendish Summer Shuttle service, operating routes between Charlottetown/Cavendish and Summerside/Cavendish, saw ridership increase to over 9,000 one-way trips (from 6000 the year prior).
- In collaboration with the federal government Investing in Canada Infrastructure Program, work continued on the Route 2 Abegweit Connects project in Scotchfort, PEI, including structural stormwater enhancements and the construction of pedestrian walkways.
- Launching a course with Holland College to build upon Automotive Service Technicians' previous knowledge of conventional vehicle systems and develop the skills required to safely diagnose, service, and repair electric vehicle systems.
- Creating a new permanent Climate Action Coordinator position within the Department of Transportation and Infrastructure, to ensure environmental sustainability, stewardship, and climate action is at the forefront of the Province's transportation and infrastructure investments.
- Raising the under-clearance of the Rusticoville bridge by 0.75 m to account for improved water flow, future surge during storm events, and the expected gradual sea level rise. The bridge also includes a separate multi-use lane for active transportation.

# Climate Action - Nature and Biodiversity

## Net-Zero Framework

Priority areas for investment in nature and biodiversity related climate mitigation are outlined in Pillar 4.

## Provincial Climate Adaptation Plan

Priority areas for investment in climate adaptation in nature and biodiversity are outlined in Pillar 5.

Restoring our forests following the devastating consequences of Post-Tropical Storm Fiona was a key focus of 2023-24. Protecting nature and preserving biodiversity and ecosystem functions is vital. These investments can help sequester carbon, protect needed habitat and existing infrastructure, as well as support our mental health and well-being.

## Nature and Biodiversity highlights from 2023-24 by the Province include:



Supporting BBEMA to deliver  
**14 Nature-based  
Training Sessions**  
with newcomers.

 **1,829**  
**HECTARES**  
of private land designated  
**Natural Area**

**3**

**New Greenhouses  
Installed At The  
Provincial Tree Nursery**

Increasing production by up to 30%,  
to 1.3 million plants per annum.

- Acquiring 293.1 hectares of land for conservation uses through the Buffer Zone Acquisition Program.
- Assigning a Conservation Easement to 6.84 hectares of land.
- Installing the final two intertidal reefs at West Point Cedar Dunes Provincial Park. This installation completes the project with seven intertidal reefs and one terminal groyne. This innovative adaptation project helps rebuild the shoreline, which provides protection to the beach and the campground.
- Increasing the investment and contribution to wildland fire response and suppression, including new equipment for Provincial wildfire staff and Volunteer Fire Departments, and expanding training to create a cadre of Type 3 wildland firefighters able to respond when needed.
- Adopting interim permitting policies associated with coastal protection and development, expanding policy to accept green shore alternative projects, and expanding coastal inclusion zones to allow more homeowners to participate in shoreline protection projects for threatened structures.
- Continuing to support the agricultural sector's transition from surface water irrigation to more sustainable and low impact groundwater usage by targeting over-allocated river systems that have historically been reliant upon surface water irrigation.



# Climate Action - Research and Leadership

## Net-Zero Framework

Priority areas for investment in research and leadership related to climate mitigation are outlined in Pillar 6.

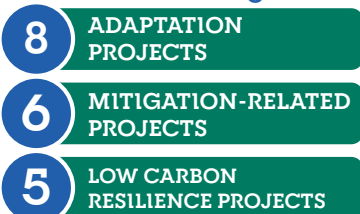
## Provincial Climate Adaptation Plan

Priority areas for investment in climate adaptation in research and leadership are outlined in Pillar 6.

Research and leadership play an essential role in achieving emissions reductions while also building a resilient place to live, work, and play. The Province is focused on strengthening existing relationships with Indigenous leaders and communities, various levels of government, business and industry, and on establishing new collaborations within the province, nationally and internationally.

## Highlights in Research and Leadership in climate action from 2023-24 by the Province include:

### 2023-24 Number of Projects funded by the Climate Challenge Fund



7 out of 12

Departments reported increase in staff contributions to advancing climate goals



- All government departments are leading climate action. Acting as catalysts in advancing whole-of-government climate action, Climate Change Coordinators continued their interdepartmental work participating in training, guidance, and opportunities to work on policy together. In 2023-24, several departments added to their capacity by appointing additional coordinators or by making their Climate Change Coordinators full-time positions.
- Supporting the Center for Marine Applied Research Study (jointly funded with Nova Scotia).
- Updating the Treasury Board Policy and Procedures manual to formalize the incorporation of a Climate Change lens towards implications on policies, decisions, and financial planning being developed.
- Continuing support for workforce development through ClimateSense and the Clean Foundation Clean Leaders program.
- Partnering with East Prince Agri-Environment Improvement Association (EPAA) and Agriculture and Agri-Food Canada to support Agriculture Climate Solutions – Living Laboratories.
- The Cleantech Academy, in partnership with Holland College, launched the inaugural program in Sustainable Business Leadership.
- The Cleantech Academy, UPEI, Holland College, and the Department of Environment, Energy and Climate Action partnered to hold the first Cleantech Innovative Collaborations Event, which brought together First Nations, industry leaders, academia, government, and non-profit organizations to showcase and spur collaboration on research and development in clean technology.
- The Climate Challenge Fund (CCF) continued to be a highly subscribed, annual \$1-million fund that provides up to \$100,000 to support projects that reduce greenhouse gas emissions and assist communities in adapting to climate change. A full list of CCF projects funded in 2023-24 can be found in the **Supporting Materials**.

# Climate Action - Extreme Weather and Preparedness

## Net-Zero Framework

Pillars 3 and 4 contain goals which align with extreme weather and emergency preparedness.

## Provincial Climate Adaptation Plan

Priority areas for investment in climate adaptation in extreme weather and preparedness are outlined in Pillars 1 and 4.

Extreme weather events are occurring more often due to climate change and directly impact our homes, workplaces, essential services, and the natural and built infrastructure in our communities. Investing in the ability of infrastructure and other assets to withstand these impacts ensures residents' safety and access to emergency and essential services. Alignment of extreme weather and preparedness efforts with climate mitigation actions is key to ensuring a sustainable future for Islanders.

## Extreme Weather and Preparedness highlights from 2023-24 by the Province include:



- Establishing a permanent Critical Infrastructure Coordinator position. The Critical Infrastructure Coordinator is responsible for developing partnerships with all critical infrastructure providers and users across the province.
- The creation of a Reception Center Resiliency Program, which provided funding to 15 centres in municipalities and not-for-profit organizations to provide backup power and upgrades to their facilities to be used as reception centers during emergencies.
- Investing in private Long-term Care and Community Care homes to bolster emergency preparedness and resiliency of this sector considering rising operation costs and in the event of extreme weather, especially during extreme heat events or power outages.
- Initiating work to reduce gender-based violence in the context of provincial responses to the impacts of climate change.
- Continuing collaboration to improve the Finance Emergency Payment System.
- Accepting a vertical setback distance above expected storm surge levels to allow for commercial business re-development in legislated buffer zones.
- Continuing to adopt Coastal Hazard Assessments as a critical tool in permit assessment related to development requests in coastal areas. In 2023-24, 371 Coastal Hazard Assessments were completed.
- Creating a provincial FireSmart Coordinator position to promote this national fire mitigation program throughout communities and among landowners across PEI.
- Providing “go-kits” to foster families to increase resilience and emergency preparedness.



# Carbon Abatement Cost of Programs

In essence, carbon abatement cost in the Government of PEI context means the investment cost of a Provincial energy efficiency program that will reduce GHG emissions by one tonne over its lifetime.

It is calculated using the program costs incurred by the Government of PEI throughout the program's administration, and excludes total costs incurred by program users. The following table summarizes the GHG emission savings and carbon abatement costs associated with a variety of Government of PEI energy efficiency programs throughout 2023-24.

Program	Weighted Average Measure Life	Annual GHG Savings	Annual Program Costs	Updated Abatement Cost
Business Energy Rebates Program	18	640	\$247,208	\$21
Home Insulation Rebates	23	2,538	\$1,338,851	\$23
Energy Efficient Equipment Rebates	18	15,884	\$7,691,792	\$27
Community Energy Solutions Program	15	254	\$159,010	\$42
New Home Construction Program	30	178	\$431,762	\$81
Free Home Insulation Program	23	3,827	\$7,709,763	\$88
Winter Warming Program	8	246	\$196,741	\$100
Free Hot Water Electrification Program	14	3,152	\$4,559,753	\$103
Free Heat Pump Program	18	12,681	\$34,423,011	\$151
Instant Energy Savings	7	621	\$737,951	\$170
Solar Electric Rebate Program	25	2,113	\$12,961,316	\$245
Universal Electric Vehicle Incentive Program	13	1,310	\$4,229,091	\$248



# Climate Change Risks

**In 2023-24, continued investments were made to deepen the Province's understanding of the top climate risk facing PEI, which is coastal hazards.**

Following Post-Tropical Storm Fiona, increasing public discourse related to shoreline armouring and coastal management emerged. The Province instituted a moratorium on shoreline armouring in December 2022, the Environmental Protection Order for which was signed in January 2023.

In March 2023, the University of PEI's Canadian Centre for Climate Change and Adaptation was engaged to develop a State of the Coast (SoTC) report, as well as recommendations related to the development of interim shoreline policy.

The final SoTC report was released in December 2023 and provides an overview of the current conditions of PEI's coastline, highlighting the state of both natural and human systems along the coast. It provides an overview of the current conditions of PEI's coastline. The primary purpose was to identify the conditions under which: natural coastal processes and coastal development intersect, ecosystems are vulnerable, and built systems are at risk.

The SoTC report provides the background information necessary to develop policies for better management of coastal risks and was accompanied by a report on Interim Coastal Policy Recommendations, which identifies actions that can be taken by the Province on an interim basis to move toward more holistic coastal zone management on PEI.

**Additional progress towards understanding climate risks facing the Province in 2023-24 included:**

- The Department of Agriculture provided funding for the PEI Federation of Agriculture to undertake Climate Action Initiatives, including undertaking an adaptation planning initiative to respond to climate risks facing the industry.
- The Department of Fisheries, Tourism, Sport and Culture completed a Climate Change Risk and Opportunity Assessment and Adaptation Strategy for the Seafood Industry which identifies potential risk and opportunities of key species and infrastructure assets.
- The Department of Environment, Energy and Climate Action launched the Climate Hazard & Risk and Information System (CHRIS), an interactive map portal that allows anyone to browse and visualize different climate hazards that affect PEI's communities and properties.
- Maritime Electric began evaluating the 25 climate change adaptation recommendations identified in their recent Climate Change Risk Assessment, which the Department of Environment, Energy and Climate Action supported through the Climate Challenge Fund. Their 2023-24 Climate Challenge Fund project will build on the risk assessment results to further evaluate and analyze a selection of the adaptation options and develop a climate change adaptation strategy.



# Net-Zero Advisory Committee

The Net-Zero Advisory Committee ('the Committee') is a group of individuals appointed by Minister of Environment, Energy and Climate Action ('the Minister') with a legislated mandate to provide advice to the Minister based on diverse experience, knowledge, and evidence with respect to climate change matters, including among other things:

1. Plans and actions to achieve the Government of PEI's 2030 and 2040 greenhouse gas (GHG) emission reduction targets; and
2. Plans and actions to manage climate change risks.

Throughout the 2023-24 fiscal year, the Committee held five meetings with guest speakers focusing on diverse topics associated with climate change:

- Net-Zero Framework/ Climate Adaptation Plan
- PEI Energy Blueprint
- Office of Net-Zero Programs
- Department of Agriculture/ Land use planning
- State of the Forest Report

In addition, throughout the latter portion of 2023-24 and early portion of 2024-25 fiscal years, the Committee partook in a workshop and a survey facilitated by Committee member Christina MacLeod that culminated in their identification of the following two low-carbon resiliency actions:

1. **Commit to maintaining and re-establishing wetlands:** Although wetland ecosystems make up less than 5% of PEI's total land area<sup>2</sup>, they are vital to sustaining our way of life and the wildlife that depends on them. Wetlands provide multiple benefits, including stormwater management, carbon sequestration, nutrient and sediment capture, improving water quality, and providing a refuge for wildlife. By embracing nature-based solutions, we can help our communities adapt to a changing climate while maintaining and expanding critical habitat for species-at-risk and other wildlife.
2. **Investment in skills training and upgrading:** Not only is PEI seeking to be Canada's first carbon neutral province, PEI is facing the largest shortage of skilled trade workers in decades. The construction industry has never been in greater demand than it is now, not only for the construction of new housing and infrastructure, but to retrofit existing buildings to meet new codes containing higher energy efficiency and climate resiliency standards. As a result, the Government of PEI needs to prioritize investment in energy efficiency and climate resiliency skills training for the construction industry.

The Committee's focus throughout the 2024-25 and 2025-26 fiscal years will be to provide advice to the Sustainability Division throughout the development of a five-year Net-Zero Action Plan.

2 State of the Forest Report (2020)



# Looking Ahead

Many climate actions noted within this report are ongoing and require a sustained effort. In addition to those, new actions are planned for the 2024-25 fiscal year that will help achieve goals within both the Net-Zero Framework and the Provincial Climate Adaptation Plan. These plans are reflected in the **Supporting Materials**. Some highlights anticipated for 2024-25 include, but are not limited to:

- Expansion of the Net-Zero Free Programs.
- Continuing to support new Climate Challenge Fund and Active Transportation Fund projects across PEI.
- Continuing the Summer Shuttle service and subsidies for student and senior transit riders, and adding a new subsidy to ensure youth under 18 years of age ride transit for free.
- Over 200 new forest management plans are expected to be completed through the Province's Forest Enhancement Program for Private Forest Land Owners.
- The Post-Fiona Forestry Update Report is expected to be released publicly, including a detailed update on the impact of Post-Tropical Storm Fiona on PEI forests using high resolution satellite imagery and an overview of the Province's response.
- The final report of the Forestry Commission is expected to be released in December 2024 with recommendations that are expected to help to inform legislative changes and an updated Forest Policy which will serve Islanders and their forests for decades to come.
- Continued work with Natural Resources Canada through the Flood Hazard Identification and Mapping Program (FHIMP) to further update PEI's understanding of erosion and flood hazards and risks.
- The Fuel Station Resiliency Program is expected to see 80% of fuel stations across the Province with back-up power.
- Development of a reception centre application and map to assist in communications prior to and during prolonged weather events.
- The Agricultural Resiliency Program will be developed and launched to build strength and viability in the industry through initiatives that assist in preparing for current and future threats such as climate change and extreme weather.
- Over 80 Soil Health Improvement Planning (SHIP) service projects are expected to be undertaken.
- Phased implementation of the UPEI Interim Coastal Policy Recommendations including the development of shoreline management plans and a coastal policy, coastal hazard education, and increased hazard disclosure for properties at risk.
- Continuing support for several food security and food waste reduction initiatives to improve access to affordable local food and improving health and food safety.
- Continued development of the Cleantech Academy, including construction of the Cleantech Park in Georgetown, events in partnership with industry, government and academia, and curriculum for future students.
- Through a competitive bid process, Sustainability Solutions Group was awarded the role of leading the development of the Provincial Net-Zero Pathway: 5 Year Mitigation Action Plan throughout 2024-25 and 2025-26 fiscal years.









# Minister's Report on Climate Change

Risks and Progress Toward Targets | 2023-2024

*Supporting Materials*

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## Table of Acronyms

AGR	Department of Agriculture
ALUS	Alternative Land Use Services
CCF	Climate Challenge Fund
CHC	Community Health Center
CHRIS	Climate Hazard & Risk Information System
CLIVE	Coastal Impacts Visualization Environment
CPHO	Canadian Public Health Organization
CEA	Controlled Environment Agriculture Program
DMAF	Disaster Mitigation and Adaptation Fund
EDIT	Department of Economic, Development, Innovation and Trade
EECA	Department of Environment, Energy and Climate Action
EEY	Department of Education and Early Years
EMO	Emergency Measures Organization
FFW	Forests, Fish and Wildlife
EFP	Environmental Farm Plans

FIN	Department of Finance
FTSC	Department of Fisheries, Tourism, Sport and Culture
GIS	Geographic Information System
HBAT	Habitat and Biodiversity Assessment Tool
HLC	Department of Housing, Land and Communities
HW	Department of Health and Wellness
IPEI	Innovation PEI
JPS	Department of Justice and Public Safety
KCMH	Kings County Memorial Hospital
NGO	Non-Governmental Organization
PEIEC	PEI Energy Corporation
PSC	Public Service Commission
SDS	Department of Social Development and Seniors
TI	Department of Transportation and Infrastructure
RFP	Request for Proposal
WALP	Department of Workforce, Advanced Learning and Population



# Climate Mitigation Actions - Net Zero Framework



PILLAR 01

Transform the Way People and Goods Move

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
1.1	<b>Reduce Reliance on Passenger Vehicles</b>	<ul style="list-style-type: none"> <li>Active Transportation Fund - Funded 24 active transportation projects</li> <li>Provided 27 bike racks to various schools</li> </ul>	<ul style="list-style-type: none"> <li>Active Transportation Fund (ongoing) - 27 new active transportation projects approved</li> </ul>	EECA TI FTSC
		<ul style="list-style-type: none"> <li>Preparation of the Active Transportation Network</li> </ul>	<ul style="list-style-type: none"> <li>Publication of the Active Transportation Network</li> </ul>	EECA TI FTSC
		<ul style="list-style-type: none"> <li>Transit Project - Renewal of summer shuttle services between Cavendish and Charlottetown/Summerside</li> </ul>		EECA TI
		<ul style="list-style-type: none"> <li>Transit Project - Launch of year-round service between North Rustico and Charlottetown</li> </ul>		EECA TI
		<ul style="list-style-type: none"> <li>Transit Subsidy - the Province continues to financially support Charlottetown, Stratford and Cornwall with T3 system</li> </ul>	<ul style="list-style-type: none"> <li>Transit Subsidy - youth under 18 years ride for free</li> </ul>	EECA TI
		<ul style="list-style-type: none"> <li>Transit Subsidy - the Province continues offsetting Trius Transit passenger costs to make transit more affordable for riders (youth under 18 years ride for free, adult monthly pass is \$20 and student/seniors monthly pass is \$10)</li> </ul>	<ul style="list-style-type: none"> <li>Transit Subsidy for Summer Shuttle Service</li> <li>Transit Subsidy for Student and Senior riders</li> </ul>	EECA TI
		<ul style="list-style-type: none"> <li>e-Bike Rebate Program - 629 rebates issued (between January 1 - December 31, 2023)</li> </ul>	<ul style="list-style-type: none"> <li>e-Bike Rebate Program (ongoing) - 381 rebates issued (between January - August 22, 2024)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>Bicycle Rebate Program - 5,457 bike rebates issued</li> </ul>	<ul style="list-style-type: none"> <li>Bicycle Rebate Program (ongoing)</li> </ul>	EECA

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
1.2	<b><i>Transition to Zero Emissions Vehicles</i></b>	<ul style="list-style-type: none"> <li>Universal Electric Vehicle Incentive Program - 665 incentives processed</li> </ul>	<ul style="list-style-type: none"> <li>Universal Electric Vehicle Incentive Program (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>Electric Vehicle (EV) Charging Network - 46 Level 2 charger installations - 12 Level 3 charger installations</li> </ul>		EECA TI
		<ul style="list-style-type: none"> <li>EV Experience Tours - 8 tours completed</li> </ul>	<ul style="list-style-type: none"> <li>EV Experience Tours (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>PEI EV Charger Funding Program- 245 Level 2 installations - 9 Level 3 installations</li> </ul>	<ul style="list-style-type: none"> <li>PEI EV Charger Funding Program (ongoing)</li> <li>PEI Fast Charger Network Expansion - 3 charger installations (100-200 kW power)</li> </ul>	EECA TI
		<ul style="list-style-type: none"> <li>Solar Powered EV Charging Pilot - 2 solar powered EV chargers installed</li> </ul>		PEIEC
		<ul style="list-style-type: none"> <li>EV Fleet Enhancements - Purchased 3 hybrid EV vehicles and 4 plug-in EV hybrids; - Purchased 25 electric school buses</li> </ul>	<ul style="list-style-type: none"> <li>EV Fleet Enhancements (ongoing)</li> </ul>	EECA EEY TI



Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
2.1	<b><i>Make Existing Homes and Buildings More Energy Efficient</i></b>	<ul style="list-style-type: none"> <li>• Winter Warming Program - 540 clients received services</li> </ul>		EECA
		<ul style="list-style-type: none"> <li>• Home Insulation Rebates - 845 applications processed</li> </ul>	<ul style="list-style-type: none"> <li>• Home Insulation Rebates (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Solar Electric Rebate Program - 1,382 applications processed</li> </ul>	<ul style="list-style-type: none"> <li>• Solar Electric Rebate Program (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Energy Efficient Equipment Rebates - 4,321 applications processed</li> </ul>	<ul style="list-style-type: none"> <li>• Energy Efficient Equipment Rebates (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Free Home Insulation Program - 848 installations completed</li> </ul>	<ul style="list-style-type: none"> <li>• Free Home Insulation Program (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Free Hot Water Electrification Program - 1,848 installations completed</li> </ul>	<ul style="list-style-type: none"> <li>• Free Hot Water Electrification Program (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Free Heat Pump Program - 7,259 installations completed</li> </ul>	<ul style="list-style-type: none"> <li>• Free Heat Pump Program (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Home Energy Assessments</li> </ul>	<ul style="list-style-type: none"> <li>• Home Energy Assessments (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Instant Energy Savings</li> </ul>	<ul style="list-style-type: none"> <li>• Instant Energy Savings (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>• Community Revitalization Program for municipalities, non-profits and Band Councils - 3 approved solar project applications</li> </ul>	<ul style="list-style-type: none"> <li>• Community Revitalization Program for municipalities, non-profits and Band Councils (ongoing)</li> </ul>	EECA HLC FTSC
<ul style="list-style-type: none"> <li>• Energy Efficiency Equipment for Residential Rental Properties - 419 applications processed</li> </ul>	<ul style="list-style-type: none"> <li>• Energy Efficiency Equipment for Residential Rental Properties (ongoing)</li> </ul>	EECA		

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
2.1	<b><i>Make Existing Homes and Buildings More Energy Efficient (con't)</i></b>	<ul style="list-style-type: none"> <li>Public Infrastructure Projects with Mitigation Aspect</li> <li>- 23 projects undertaken, of which 14 were completed</li> </ul>	<ul style="list-style-type: none"> <li>Public Infrastructure Projects with Mitigation Aspect (ongoing)</li> <li>- 15 projects underway</li> </ul>	EECA TI HLC FTSC
			<ul style="list-style-type: none"> <li>Oil to Heat Pump Affordability Program (OHPA)</li> </ul>	EECA TI
			<ul style="list-style-type: none"> <li>New program for heat pumps in social housing units (low-income, seniors, group homes, non-profit, and cooperative housing)</li> </ul>	EECA TI HLC SDS
		<ul style="list-style-type: none"> <li>Government Energy Program</li> </ul>		EECA TI
		<ul style="list-style-type: none"> <li>Heat Pumps Initiative</li> <li>- 96 approved applications</li> </ul>	<ul style="list-style-type: none"> <li>Heat Pumps Initiative (ongoing)</li> </ul>	EECA FTSC
		<ul style="list-style-type: none"> <li>RUDI program encouraging carbon footprint reduction</li> </ul>	<ul style="list-style-type: none"> <li>RUDI program encouraging carbon footprint reduction (ongoing)</li> </ul>	FIN
		<ul style="list-style-type: none"> <li>Energy Efficiency Loan Programs</li> </ul>	<ul style="list-style-type: none"> <li>Energy Efficiency Loan Programs (ongoing)</li> </ul>	FIN

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
2.2	<b><i>Construct More Efficient Homes and Buildings</i></b>	<ul style="list-style-type: none"> <li>New Home Construction Program               <ul style="list-style-type: none"> <li>- 121 applications processed that exceeded Building Code minimum standards by 20%</li> <li>- 24 applications processed that exceeded Building Code minimum standards by 50%</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>New Home Construction Program (ongoing)</li> </ul>	EECA TI
		<ul style="list-style-type: none"> <li>Public Infrastructure Projects (New Construction and Upgrades) Built to Net Zero Ready Standard:               <ul style="list-style-type: none"> <li>New Sherwood Elementary</li> <li>New Stratford High School</li> <li>Cardigan Consolidated School</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Public Infrastructure Projects (New Construction) Built to Net Zero Ready Standard:               <ul style="list-style-type: none"> <li>New Sherwood Elementary</li> <li>New Stratford High School</li> </ul> </li> </ul>	EECA TI EEY JPS HW HLC
		<ul style="list-style-type: none"> <li>PEI Code Acceleration Project</li> </ul>	<ul style="list-style-type: none"> <li>PEI Code Acceleration Project (ongoing)</li> </ul>	EECA TI EEY HW HLC
			<ul style="list-style-type: none"> <li>Building Labeling Pilot Project</li> </ul>	EECA TI
2.3	<b><i>Pilot and Scale-up Cost-effective Solutions</i></b>		<ul style="list-style-type: none"> <li>Smart Flower Educational Microgrid</li> </ul>	EECA TI EEY



Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
3.1	<b>Reduce Emissions from Crop and Livestock</b>	<ul style="list-style-type: none"> <li>Agriculture Stewardship Program               <ul style="list-style-type: none"> <li>- 3 manure storage projects</li> <li>- 4 covered feedlots and exercise yards</li> <li>- 8 improved silage storages</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Agriculture Stewardship Program delivery (ongoing)</li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Ruminant Feeding Trial               <ul style="list-style-type: none"> <li>- Beef cattle: observed an 11.5% reduction in methane emissions in the groups that received 1% kelp compared to control group</li> <li>- Dairy cattle: observed an 11% reduction in methane emissions in the groups that received 2% kelp compared to control group</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Ruminant Feeding Trial               <ul style="list-style-type: none"> <li>- Research will be ongoing in collaboration with Agriculture and Agrifood Canada (AAFC) and Dalhousie Agriculture Campus</li> </ul> </li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Manure Management Guidelines updated with climate lens and published in November 2023</li> </ul>		AGR
			<ul style="list-style-type: none"> <li>Leading Agriculture Climate Solutions Living Labs trials</li> </ul>	AGR
			<ul style="list-style-type: none"> <li>Extension Specialist at PEI Analytical Labs Optimizing fertilizer inputs</li> </ul>	AGR



Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
3.2	<b><i>Improve Soil Health and Ability to Absorb Carbon</i></b>	<ul style="list-style-type: none"> <li>Alternative Land Use Service Program (ALUS) relaunched and expanded:               <ul style="list-style-type: none"> <li>- 273 clients enrolled, accounting for 2,718 hectares +17,9250 metres of fenced land area</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>ALUS delivery (ongoing)</li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Agriculture Stewardship Program               <ul style="list-style-type: none"> <li>- 23 erosion control structure projects</li> <li>- 6 strip till</li> <li>- 2 transitions to zero till,</li> <li>- 11 increasing soil building crops in rotation</li> <li>- 3 increasing perennial forages in rotation</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Agriculture Stewardship delivery (ongoing)</li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Soil Health testing               <ul style="list-style-type: none"> <li>- 1,751 soil health samples submitted from 57 clients</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Soil Health testing (ongoing) to meeting industry demand</li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Soil Health Improvement Planning (SHIP) Service               <ul style="list-style-type: none"> <li>- 61 projects completed</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Soil Health Improvement Planning (SHIP) Service               <ul style="list-style-type: none"> <li>- 82 projects in development</li> </ul> </li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Perennial Crop Development Program               <ul style="list-style-type: none"> <li>- 33 applications received, 22 projects approved</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Perennial Crop Development Program delivery (ongoing)</li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Regenerative Perennial Agriculture Project               <ul style="list-style-type: none"> <li>- Hired two (2) regenerative agriculture specialists</li> <li>- Undertook research into alternative perennial cropping opportunities on PEI</li> <li>- Undertook a cost of production study for lowbush blueberries</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Regenerative Perennial Agriculture Project delivery (ongoing)               <ul style="list-style-type: none"> <li>- Develop agroforestry extension materials and design guidance documents</li> <li>- Modeling afforestation carbon potential in ALUS features</li> <li>- Begin development of precision agriculture extension initiatives</li> </ul> </li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Grazing management for livestock producers               <ul style="list-style-type: none"> <li>- Led workshops focused on improving grazing management</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>New Advanced Grazing Extension Services:               <ul style="list-style-type: none"> <li>- Hosting pasture walks</li> <li>- Grazing planning workshops</li> <li>- One-on-one grazing mentorship service</li> </ul> </li> </ul>	AGR

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
3.3	<i>Accelerate Use of Advanced Agricultural Clean Technologies</i>	<ul style="list-style-type: none"> <li>UAV Imagery Research</li> </ul>		AGR EECA
		<ul style="list-style-type: none"> <li>Agriculture Research and Innovation Program (ARIP) - 105 applied research, innovation and technology adoption projects completed</li> </ul>	<ul style="list-style-type: none"> <li>Agriculture Research and Innovation Program (ARIP)</li> </ul>	AGR
		<ul style="list-style-type: none"> <li>Renewables in Agriculture</li> </ul>		EECA
		<ul style="list-style-type: none"> <li>Agriculture Energy Systems Pilot Program - 73 projects approved across PEI (15 in Kings County, 25 in Queens County, 33 in Prince County)</li> </ul>	<ul style="list-style-type: none"> <li>Agriculture Energy Systems Pilot Program delivery (ongoing)</li> </ul>	AGR
			<ul style="list-style-type: none"> <li>Hire Agriculture Energy Systems Specialist</li> </ul>	AGR



Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
4.1	<b>Maintain What We Have</b>	• Forestry Field Services	• Forestry Field Services (ongoing)	EECA
		• Forest Resource Inventory and Modelling	• Forest Resource Inventory and Modelling (ongoing) - Post Fiona Forest Update publicly released in August 2024	EECA
		• Forest Fire Protection	• Forest Fire Protection (ongoing)	EECA JPS
		• Environmental Land Management	• Environmental Land Management (ongoing)	EECA
		• Production Development	• Production Development (ongoing)	EECA
		• Industry Study to gauge harvest, silviculture, and processing capacity	• Industry Study to gauge harvest, silviculture, and processing capacity (ongoing)	EECA
		• Update to Ecosystem Based Forest Management Policy	• Update to Ecosystem Based Forest Management Policy (ongoing)	EECA
		• Sustainable Forest Alliance		EECA
		• Forest Enhancement Program: Forestry Services for Private Forest Land Owners - 214 forest management plans completed	• Forest Enhancement Program: Forestry Services for Private Forest Land Owners - Over 200 forest management plans estimated to be completed	EECA

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
4.2	<b>Grow What We Need</b>	• Two Billion Trees Program - Processed seven (7) municipal government applications, resulting in the planting of 920 trees		EECA
		• Atlantic Tree Improvement Council		EECA
		• Greening Spaces Program		EECA
		• Provincial Nursery Expansion - Three (3) new greenhouses constructed	• Provincial Nursery Expansion (ongoing)	EECA
		• Hedgegrow Planting Program		EECA



PILLAR 05

Create a Clean Industry and Waste Advantage

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
5.1	<b>Enable Cleaner PEI Businesses and Industries</b>	• Inshore Fishing Fleet Sustainability Strategy		FTSC
		• Community Energy Solutions Program - 12 applications processed	• Community Energy Solutions Program	EECA
		• Business Energy Rebates Program - 159 applications processed	• Business Energy Rebates Program (ongoing)	EECA
		• PEI Clean Tech Academy	• PEI Clean Tech Academy (ongoing)	EECA
		• End-of-life Fishing Gear Management Pilot		FTSC

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
5.1	<b>Enable Cleaner PEI Businesses and Industries (con't)</b>	<ul style="list-style-type: none"> <li>Waste Reduction, Recovery, and Recycling - Central Compost Facility produced 9,878 tonnes of Category A compost - 23,723 tonnes of waste was processed at the PEI Energy Systems facility - 59,043 tonnes of material was diverted from the landfill (number excludes material sent to recycling facilities and waste diversion activities)</li> </ul>	<ul style="list-style-type: none"> <li>Waste Reduction, Recovery, and Recycling (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>GHG Buyback Program</li> </ul>		EECA
		<ul style="list-style-type: none"> <li>CleanTech Research and Innovation Fund</li> </ul>	<ul style="list-style-type: none"> <li>CleanTech Research and Innovation Fund (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>Climate Challenge Fund</li> </ul>	<ul style="list-style-type: none"> <li>Climate Challenge Fund (ongoing)</li> </ul>	EECA
		<ul style="list-style-type: none"> <li>Aquaculture Adaptation Program</li> </ul>	<ul style="list-style-type: none"> <li>Aquaculture Adaptation Program</li> </ul>	FTSC
		<ul style="list-style-type: none"> <li>Greening the Port of Charlottetown</li> </ul>	<ul style="list-style-type: none"> <li>Greening the Port of Charlottetown</li> </ul>	FTSC
			<ul style="list-style-type: none"> <li>Demand Side Management (DSM) Strategies Pilot Initiatives</li> </ul>	EECA
5.2	<b>Invest in Next Generation Technologies</b>		<ul style="list-style-type: none"> <li>Outboard Motor Electrification Program Development</li> </ul>	FTSC EECA
		<ul style="list-style-type: none"> <li>Development of Customer Relationship Management System (CRM) for Operator Online Portal</li> </ul>	<ul style="list-style-type: none"> <li>Development of Customer Relationship Management System (CRM) for Operator Online Portal</li> </ul>	FTSC FIN



Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
6.1	<b>Create the Right Environment to Drive Change</b>	• Cleantech Strategy	• Cleantech Strategy	EECA
		• PEI Seafood Sector Climate Change Risk Assessment		FTSC EECA
		• PEI Watershed Alliance Agriwatershed Partnership		AGR
			• Develop and Launch the Agriculture Resiliency Program: Resiliency Research subprogram	AGR
		• Treasure Board policy change - environmental and climate implications to be incorporated in any policy decision		FIN
		• Implementation of digital forms to reduce housing paperwork	• Implementation of digital forms to reduce housing paperwork and use of aerial imagery to reduce assessment staff travel	FIN
			• New Treasury Board Initiative - part time work from home to reduce emissions	FIN
		• Jacques Cartier Shoreline Protection		EECA TI
		• West Point Cedar Dunes Provincial Park intertidal reefs		EECA TI
		• Renewed the MoA with First Nations and PEI government for immunizations and communicable disease management		HW FIN
6.2	<b>Empower Islanders on the Path Ahead</b>	• Empower Islanders on the Path Ahead Clean Tech Research and Innovation Fund		EECA

Goal	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
6.2	<b><i>Empower Islanders on the Path Ahead (con't)</i></b>	• Fed of Ag Climate Action Initiative	• Fed of Ag Climate Action Initiative	AGR
		• Integration of climate education into kindergarten to grade 12 English and French programs	• Integration of climate education into kindergarten to grade 12 English and French programs	EEY
			• Enabling Strategies from the Electrical Efficiency and Conservation Plan	EECA
			• Implementation of a Provincial Wellness Action Plan	HW
6.3	<b><i>Lead Through Expertise and Collaboration</i></b>	• Net-Zero Advisory Committee	• Net-Zero Advisory Committee	EECA
		• Francophone Immigration Strategic Plan		EDIT
		• Behavioral Insights Project		EDIT
		• Biological Nitrogen Availability Trials		AGR
			• Biomass Quantification Research Project	AGR
			• RGI Community Capacity of Building Program - At least 3 applications expected to be approved	FTSC
		• Finance Emergency Payment System Project	• Finance Emergency Payment System Project	FIN
		• Clean Foundation internships		WALP
		• Holland College EV Maintenance Training		WALP EECA
		• Post Secondary Student Program including 26 watershed groups		WALP
• Coastal Zones Canada 2025 planning	• Execution of Coastal Zones Canada 2025 conference	EECA		

# Net Zero Efficiency Program Savings

Program	Energy Savings (GJ)	GHG Savings (Tonnes)
Energy Efficient Equipment Rebates	91,064	15,884
Home Insulation Rebates	31,183	2,538
New Home Construction Program	2,927	178
Winter Warming Program	3,496	246
Instant Energy Savings	11,760	621
Business Energy Rebates Program	4,275	640
Community Energy Solutions Program	3,755	254
Home Comfort Program	252	23
Solar Electric Rebate Program	40,031	2,113
Free Heat Pump Program	145,437	12,681
Free Hot Water Electrification Program	38,062	3,152
Free Home Insulation Program	44,096	3,827
<b>Total</b>	<b>416,337</b>	<b>42,156</b>



# PEI Electricity Sector Generation Assets

## *Wind (2023.6 MW)*

<b>Location</b>	<b>Owner</b>	<b>Generation Capacity (MW)</b>
West Cape East	ENGIE	99
Hermanville	PEIEC	30
Eastern Kings	PEIEC	30
Summerside	Summerside Utility	12
North Cape	PEIEC	10.6
WEICAN R&D	WEICAN	10
Norway	ENGIE	9
Aeolus	PEIEC	3

## *Solar (31MW + 16.3MW)*

Summerside Solar Energy Farm & Battery Storage Facility 'Sunbank'	Summerside Utility	21
Slemon Park Microgrid Project	PEIEC	10
Net-metering Program: Rooftop Solar	Maritime Electric Corp. Ltd.	40

## *Thermal Generation (104MW)*

Borden Generation Station (CT1 & CT2)	Maritime Electric Corp. Ltd.	40
Summerside Generating Station	Summerside Utility	15
Charlottetown (CT3)	Maritime Electric Corp. Ltd.	49

# Public Infrastructure Projects with Climate Change Aspects

Sector	Project Name	Mitigation Aspect
Health	KCMH - Roof Repair	Improved insulation value to roof
Health	QEH - Roof Replacement	Improved insulation value to roof
Health	QEH - Air Handling Unit #5 Replacement	Improved equipment operating efficiency
Health	Beachgrove and Wedgewood Manors - Roof Replacements	Improved insulation value to roof
Health	KCMH - Heat Exchange Unit Replacement	Improved equipment operating efficiency
Health	Western Hospital - Basement Ventilation System	Improved climate control
Health	KCMH - Roof Repair	Improved insulation value to roof
Environment	Solar Installations - Schools Pilot (Cardigan Elementary)	New building system (elec) and Solar panels to approach net Zero standard
Education	Eliot River - New Addition & Infrastructure Improvements	Renovation and systems improved to meet or exceed NECB
Education	Montague Consolidated - Renovation & Infrastructure Improvements	Renovation and systems improved to meet or exceed NECB
Education	Alberton Elementary - Boiler Replacement	Improved equipment operating efficiency
Education	M E Callaghan Intermediate - Boiler Replacement	Improved equipment operating efficiency
Education	Ellerslie Elementary - Boiler Replacement	Improved equipment operating efficiency
Education	St. Louis Elementary - Boiler Replacement	Improved equipment operating efficiency
Education	Southern Kings Consolidated - Boiler Replacement	Improved equipment operating efficiency
Education	Amherst Cove Consolidated - 2nd Boiler	Improved equipment operating efficiency
DTI	Province House - Operational Enhancements	Renovation and systems improved to meet or exceed NECB

# Public Infrastructure Project New Builds with Climate Change Aspects

Sector	Project Name	Mitigation Aspect
Health (new)	CHC - Summerside	New construction built to net Zero ready standard
Health (new)	CHC - Queens County	New construction built to net Zero ready standard
Education	New Sherwood School	New construction built to net Zero ready standard
Education	New Stratford High School - Grades 10 -12	New construction built to net Zero ready standard
Education	New Evangeline School	New construction built to net Zero ready standard
Education	Ecole Francois-Buote Addition	Raised floor elevation to accommodate sea level rise
DTI	Kings County Highways Depot - Addition	New construction built to net Zero ready standard
DTI/Health	West Prince Community Health Center (CHC)	New construction built to net Zero ready standard
Housing	10 Unit - Apartment Complex - Morell	New construction built to net Zero ready standard
Housing	10 Unit - Apartment Complex - Georgetown	New construction built to net Zero ready standard
Housing	31 Unit - Apartment Complex, Summerside (Lefurgy Ave.) - Project #1	New construction built to net Zero ready standard
Housing	30 Unit Apartment Complex, Charlottetown (Beachgrove Rd.)	New construction built to net Zero ready standard
Housing	10 Unit Apartment Complex, Alberton	New construction built to net Zero ready standard
Housing	6 Unit Housing, Mount Stewart	New construction built to net Zero ready standard
Justice & Public Safety	Provincial Corrections Center (PCC) - Women's Unit Addition (34 Bed)	New addition to meet or exceed NECB

# Adaptation Table



PILLAR 01

Disaster Resilience and Response

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
1	<b><i>Enhance Emergency and Extreme Weather Preparedness and Response</i></b>	<ul style="list-style-type: none"> <li>• Development of the Finance Emergency Payment System by securing data and resources needed for implementation</li> <li>• Completed the post-Fiona Assessment of Conway narrows Sandhills</li> <li>• Completion of the Centre for Marine Applied Research Study</li> <li>• Developed a reception centre application and map to assist in communications</li> <li>• Improved resiliency of public buildings through maintenance and upgrades</li> <li>• Completion of the Fiona After-Action Review</li> <li>• Offering online and in-person emergency management training</li> <li>• Financial contributions to first responder organizations ensure effective and appropriate response</li> <li>• Gender-based violence prevention in disaster management project phase 1</li> <li>• Development of the NGO Council for emergency management planning</li> <li>• Delivery of Fiona recovery programming</li> <li>• Provided funding for go-kits for foster families</li> </ul>	<ul style="list-style-type: none"> <li>• Development of the Finance Emergency Payment System entering the design phase</li> <li>• Updating the Business Continuity Plans to be better prepared for extreme weather conditions</li> <li>• Integration of the Centre for Marine Applied Research Study where suitable to increase resiliency in the aquaculture industry</li> <li>• Improving public awareness of the new Reception Centre Map</li> <li>• Supporting municipalities in using the new Reception Centre Map</li> <li>• Improving resiliency of public buildings through maintenance and upgrades</li> <li>• Assessing trees in close proximity to public buildings for removal in preparation of extreme weather events</li> <li>• Gender-based violence prevention in disaster management project engagement</li> <li>• Developing and launching the Agriculture Resiliency Program: Extreme Weather Preparedness subprogram</li> </ul>	FIN JPS-EMO FTSC AGR HLC SDS

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
2	<b><i>Develop a Coastal Flood Warning System</i></b>	<ul style="list-style-type: none"> <li>• Provided support to ECCC for the development of the Coastal Flood Warning System</li> </ul>	<ul style="list-style-type: none"> <li>• Development of the Finance Emergency Payment System entering the design phase</li> <li>• Updating the Business Continuity Plans to be better prepared for extreme weather conditions</li> </ul>	EECA JPS-EMO
3	<b><i>Improve the Electrical System</i></b>	<ul style="list-style-type: none"> <li>• Provided financial support to Maritime Electric through the Climate Challenge Fund to develop their Adaptation Plan</li> </ul>		PEIEC
4	<b><i>Increase Backup Power for Critical Infrastructure</i></b>	<ul style="list-style-type: none"> <li>• Review of power supplies for essential equipment</li> <li>• Investments in backup power continued to be made across government</li> <li>• Delivery of the Fuel Station Resiliency Program to install generators at pumps resulting in an increase of 35% Island wide</li> <li>• Significant investment in on-farm backup power generation</li> </ul>	<ul style="list-style-type: none"> <li>• Continue review of power supplies for essential equipment</li> <li>• Continue to invest in backup power across government. (JPS-EMO) Critical Infrastructure Coordinator improving relationships with critical infrastructure stakeholders.</li> <li>• Continue delivery of the Fuel Station Resiliency Program to install generators at pumps to address gaps.</li> <li>• Develop and launch the Agricultural Resiliency Program: Extreme Weather Preparedness subprogram</li> </ul>	FIN TI HLC EDIT-IPEI AGR JPS-EMO SDS
5	<b><i>Enhance Community Reception Centres and Supports</i></b>	<ul style="list-style-type: none"> <li>• Delivery of the Reception Centre Resiliency Fund. 11 applications were approved</li> <li>• Critical Infrastructure Coordinator improving relationships with energy and utility stakeholders</li> <li>• Providing support to municipalities and non-for-profits to upgrade facilities used as reception centres</li> <li>• Setting up provincially run reception centres in rural communities</li> </ul>	<ul style="list-style-type: none"> <li>• Continuation of the Reception Centre Resiliency Fund</li> <li>• Reception Centre Training Day</li> <li>• Continue providing support to municipalities and non-for-profits to upgrade facilities used as reception centres</li> <li>• Finalize setting up provincially run reception centres in rural communities</li> </ul>	FTSC JPS-EMO HLC

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
6	<b>Create a Provincial Land Use Plan</b>	<ul style="list-style-type: none"> <li>State of the Island Report was drafted</li> <li>RFP for the next phase of provincial planning modernization (engagement) was drafted</li> </ul>	<ul style="list-style-type: none"> <li>State of the Island Report to be released</li> <li>Release RFP for the next phase of provincial planning modernization (engagement)</li> </ul>	HLC
7	<b>Develop Province-wide Stormwater Management Standards</b>	<ul style="list-style-type: none"> <li>Initiation of the Action 7 Working Group involving staff from TI and HLC</li> </ul>	<ul style="list-style-type: none"> <li>Continuing working towards commitment progress and completion of Action 7</li> </ul>	TI HLC
8	<b>Increase Resilience of Public Infrastructure</b>	<ul style="list-style-type: none"> <li>Improving the resiliency of road infrastructure by enhancing stormwater management and building materials</li> <li>West Point Cedar Dunes Provincial Park intertidal reef project expansion with the installation of two new intertidal reefs, beach nourishment, and sand fencing</li> <li>Panmure Island causeway improvements to better withstand impacts of climate change</li> <li>Installation of sand fencing at Crowbush to retain sand and build the dune system</li> <li>Adopted the 2020 National Building Codes with Tier 1 energy specifications</li> <li>Continued fortification of Marine Access for the Seafood Sector, where applicable</li> </ul>	<ul style="list-style-type: none"> <li>Continue to improve the resiliency of road infrastructure by upgrading roads, bridges, and other public property to better withstand climate impacts</li> <li>2025 National Building Codes to be adopted once released</li> </ul>	TI EECA HLC FTSC

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
9	<b><i>Home Adaptation Renovations and Upgrades</i></b>	<ul style="list-style-type: none"> <li>• Staff participation in Home Flood Risk Training with Seneca College</li> <li>• Intact Centres Protecting PEI Homes from Flooding and Erosion</li> </ul>		EECA
10	<b><i>Adaptation Plans for At-Risk Historical, Cultural and Archaeological Assets</i></b>	<ul style="list-style-type: none"> <li>• Monitoring the Archaeological Record of PEI for Climate Change Impacts</li> <li>• Protecting heritage and archaeological sites from erosion in Panmure Island</li> </ul>	<ul style="list-style-type: none"> <li>• Protecting heritage and archaeological sites from erosion in West Cape</li> <li>• Monitoring existing shoreline protection work at archaeological sites</li> <li>• Continue monitoring the Archaeological Record of PEI for Climate Change Impacts</li> </ul>	FTSC TI
11	<b><i>Create a Municipal Climate Adaptation Program</i></b>			HLC
12	<b><i>Expand Climate Challenge Fund</i></b>	<ul style="list-style-type: none"> <li>• Eight adaptation projects, six mitigation-related projects and five low carbon resilience projects were funded by the CCF</li> </ul>	<ul style="list-style-type: none"> <li>• New projects anticipated to be funded by CCF across mitigation, adaptation and low-carbon resilience domains</li> </ul>	EECA



Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
13	<b><i>Partner with Industry to Respond to Climate Risks of Farm, Fishing, and Tourism Sectors</i></b>	<ul style="list-style-type: none"> <li>Working on securing funding opportunities through DMAF to enhance protection measures at Crowbush to help reduce impacts to the shoreline and Tourism</li> <li>Began building a new wharf for the shellfish industry in Malpeque</li> <li>Improvements to commercial buildings to strengthen wind resistance</li> <li>Completed the Seafood Sector Climate Change Risk Assessment</li> <li>Development of the Seafood Sector Adaptation Strategy</li> <li>PEI Federation of Agriculture Climate Action Initiatives</li> </ul>	<ul style="list-style-type: none"> <li>Assessment of climate risks to PEI Tourism</li> <li>Develop asset management relocation &amp; decommissioning plans for coastal public property and infrastructure</li> <li>Continue working on the new wharf in Malpeque</li> <li>Implementation of the Seafood Sector Adaptation Strategy</li> <li>PEI Federation of Agriculture Climate Action Initiatives continued</li> <li>Develop and Launch the Agriculture Resiliency Program: Resiliency Research subprogram.</li> </ul>	FTSC EECA AGR TI
14	<b><i>Regional Supply Chain Resilience Study</i></b>	<ul style="list-style-type: none"> <li>CLIMAtlantic completed a Transboundary Risk Assessment Scoping Project</li> </ul>		
15	<b><i>Climate Change Training</i></b>	<ul style="list-style-type: none"> <li>Provided financial support to Bedeque Bay Environmental Management Association to deliver training for newcomers</li> <li>Seneca College – Protecting PEI Homes from Flooding and Erosion</li> <li>Financial support for continuation of ClimateSense</li> </ul>	<ul style="list-style-type: none"> <li>Continue providing financial support for ClimateSense</li> <li>Engage in dissemination of flood hazard information including hosting a policy hackathon with a Climate Adaptation theme</li> <li>Development of seafood sector climate resiliency training</li> </ul>	FTSC WALP HLC TI EECA





Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
16	<b>Access to Food and Drinking Water</b>	<ul style="list-style-type: none"> <li>The Public Library added home and garden tools to their Library of Things collection</li> <li>Financial support through the CPHO Wellness Grants for food security initiatives</li> <li>Developed the CPHO Wellness Action Plan for healthy eating</li> <li>Delivered the Community Food Security Program Initiative</li> <li>Delivered the Agri-Food Growth Program</li> <li>CPHO-Health Promotion sits on a Food Waste Reduction Strategy committee. An arm of this is related to food waste as a result of climate change</li> <li>Pilot to provide low-cost meals to seniors</li> <li>School Food Program and Children’s Summer Food Program</li> </ul>	<ul style="list-style-type: none"> <li>Continue expansion of the Library of Things</li> <li>Continue financial support through the CPHO Wellness Grants for food security initiatives</li> <li>Implementation of the CPHO Wellness Action Plan for healthy eating</li> <li>Develop and launch the Controlled Environment Agriculture (CEA) program</li> <li>Develop a food waste reduction strategy including the creation of an interdepartmental committee.</li> <li>Deliver the Community Food Security Program Initiative</li> <li>Deliver the Agri-Food Growth Program</li> <li>Financial support for community fridges &amp; develop a plan for community fridge administration</li> </ul>	EEY HW-CPHO AGR SDS
17	<b>Extreme Heat Strategy</b>	<ul style="list-style-type: none"> <li>WCB released 2 heat stress resources to educate and prepare workers</li> <li>Promotion of PEI’s Digital Heat Guide - Stay Cool PEI</li> <li>Provided financial support to private LTC homes and community care homes to purchase cooling equipment (air conditioners, heat pumps, fans).</li> <li>Continued to expand access and support for heat pumps</li> <li>Continuation of the Greening Spaces program to provide native trees to communities</li> <li>Continuation of the 2 Billion Trees - municipal stream to increase their urban forest</li> </ul>	<ul style="list-style-type: none"> <li>Development and engagement of stakeholders on a heat response protocol</li> <li>Initiation of syndromic surveillance of the health impacts of extreme heat</li> <li>Updating the Health Living Guidelines for Early Years Centers to include extreme heat</li> </ul>	WALP-WCB HW-CPHO HW-HPEI JPS EEY

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
18	<b><i>Access to Food and a Support for Mental Health in our new Climate Reality</i></b>	<ul style="list-style-type: none"> <li>Expand the Student Well-being team services in school to promote mental health</li> <li>Financial support for the PEI Alliance for Mental Well-being for Climate Anxiety Project with Clean Foundation</li> <li>Redevelopment and opening of Health PEI's Mental Health Emergency Unit</li> <li>Launched the 9-8-8 Suicide Prevention Line to increase access to mental health supports</li> <li>Provided funding support for FarmersTalk (Farmers Assistance Program)</li> </ul>	<ul style="list-style-type: none"> <li>Continue expansion of the Student Well-being team services in school to promote mental health</li> <li>Financial support for the PEI Alliance for Mental Well-being for community resilience and mental health workshops with Clean Foundation</li> <li>Develop and Launch the Agriculture Resiliency Program: Farmer Wellness Subprogram to support wellness initiatives</li> <li>Continued support for FarmersTalk (Farmers Assistance Program)</li> </ul>	EEY HW AGR
19	<b><i>Provincial Vital Records Protection</i></b>	<ul style="list-style-type: none"> <li>Developed a draft of a vital records preservation policy</li> <li>Participated in a vital records preservation project involving court records</li> </ul>	<ul style="list-style-type: none"> <li>Continue working to expand storage capacity and climate resilience for vital records</li> </ul>	EEY

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
20	<b><i>Safeguard Surface Water Resources</i></b>	<ul style="list-style-type: none"> <li>Continued to retire riparian buffer and high slope retirement via ALUS</li> <li>Continued implementation of soil health and conservation initiatives</li> <li>Continued delivery of post-Fiona FFW initiatives</li> <li>Continuation of the Buffer Zone Acquisition Program</li> <li>Development of the Habitat and Biodiversity Assessment Tool (HBAT)</li> <li>Supported the Agricultural Sector in transition from surface water irrigation to sustainable and low impact groundwater usage by targetting over-allocated river systems, offering financial support for installation of groundwater wells, and focusing on operations with regulatory requirements to make the transition</li> </ul>	<ul style="list-style-type: none"> <li>Continue to retire riparian buffer and high slope retirement via ALUS</li> <li>Continue implementation of soil health and conservation initiatives</li> <li>Finalize and launch Habitat and Biodiversity Assessment tool and explore potential integration with Environmental Farm Plan</li> </ul>	AGR EECA
21	<b><i>Coastal Development and Habitat</i></b>	<ul style="list-style-type: none"> <li>Release of the UPEI State of the Coast and Interim Coastal Policy Recommendations Reports</li> <li>Developed and released the Climate Hazard &amp; Risk Information System (CHRIS)</li> <li>Oversaw the Hillsborough Park Community Development which incorporates several climate considerations in the design</li> <li>Adopted interim permitting policies associated with coastal protection and development including; accepting greenshore alternatives, expansion of the coastal inclusion zone, acceptance of a vertical setback distance, and adopting coastal hazard assessments as a tool in assessing permit requests</li> </ul>	<ul style="list-style-type: none"> <li>Begin a phased implementation of the UPEI Interim Coastal Policy Recommendations including the development of shoreline management plans and a coastal policy, coastal hazard education, and increased hazard disclosure for properties at risk</li> <li>Conduct training on CHRIS to the public, municipalities and professionals.</li> <li>Hillsborough Park Community Development Phase one scheduled to begin which incorporates several climate considerations in the design</li> </ul>	TI EECA HLC PSC

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
22	<b><i>Coastal Hazards and Adopting Nature-based Solutions</i></b>	<ul style="list-style-type: none"> <li>Continued offering Coastal Hazard Assessments to the public</li> <li>Nature-based solutions training opportunities for relevant employees</li> </ul>	<ul style="list-style-type: none"> <li>Continue to offer Coastal Hazard Assessments to the public</li> <li>Release of an updated version of the Coastal Impacts Visualization Environment (CLIVE)</li> <li>Release of flood hazard education and training materials including an updated Coastal Property Guide, PEI Flood Guide and training videos</li> <li>Assess social vulnerability to flood risks on PEI</li> </ul>	TI EECA
23	<b><i>Protection for Climate-Vulnerable Species and Habitats</i></b>	<ul style="list-style-type: none"> <li>EECA has hired a full-time land acquisition officer</li> </ul>		EECA-FFW
24	<b><i>Enhancement of Trees and Forests</i></b>	<ul style="list-style-type: none"> <li>2 Billion Tree Coordinator was hired</li> <li>Salvage incentive was created to help with post-Fiona clean up efforts</li> <li>The provincial nursery saw a 30% increase in production with the development of new greenhouses</li> <li>Received federal funding under the Fighting and Managing Wildfire in a Changing Climate program</li> <li>Hired a FireSmart Ambassador</li> </ul>		EECA-FFW



Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
25	<b><i>Research, Monitor, and Model Local Climate Conditions and Impacts</i></b>	<ul style="list-style-type: none"> <li>Continuation of the Mussel Monitoring Program</li> <li>Continuation of the Oyster Monitoring Program</li> <li>Continuation of the Oyster Growth Program</li> <li>Continuation of the aquaculture genome Canada project</li> <li>Continuation of the coastal erosion monitoring program</li> <li>Comprehensive agriculture adaptation to climate change including weather and pest modelling</li> </ul>	<ul style="list-style-type: none"> <li>FTSC will continue to support these monitoring programs</li> <li>Complete inland (pluvial) flood modelling for PEI and released province-wide inland flood maps</li> <li>Development of web-based and GIS-based PEI climate and pest prediction system</li> <li>Development of the Smart Supplemental Irrigation Decision Support System in the face of climate change</li> <li>Assessing the performance of prominent potato varieties under projected climate-induced stresses through greenhouse study</li> <li>Monitoring the dynamics of major crop pests in the field in response to climate change</li> <li>Complete a Gap Analysis for PEI flood mapping resources</li> <li>Update the PEI shoreline classification</li> </ul>	FTSC EECA AGR
26	<b><i>Provide Expertise and Resources to Departments for Climate Adaptation</i></b>	<ul style="list-style-type: none"> <li>Full-time Climate Change Coordinators established in three departments</li> <li>Creation of the Agriculture Climate Adaptation Section within the Department of Agriculture</li> <li>Continued collaboration at the provincial Climate Change Coordinators table</li> </ul>	<ul style="list-style-type: none"> <li>Creation of a training needs assessment survey for staff with a focus on climate change</li> <li>Increased staffing and development of the Agriculture Climate Adaptation Section</li> <li>Planned learning opportunities for Climate Change Coordinators</li> </ul>	WALP FTSC TI EEY HW-CPHO AGR EECA

Action	Description	Action Taken 2023-2024	Action Planned 2024-2025	Department(s) Contributing
27	<b><i>Create Curriculum Materials on Climate Impacts for K-12</i></b>	<ul style="list-style-type: none"> <li>• Teacher Professional Learning and Curriculum Materials for grades 5 &amp; 6</li> <li>• English Programming including the development of 12 exploratory modules such as Allyship through Mi'kmaw Language and Culture and The Beauty of Nature - Getting Outside.</li> <li>• Administration of outdoor education grants to promote outdoor learning</li> <li>• French Programming through collaboration with other leaders to ensure the integration of learning related to climate change into curriculum guides</li> </ul>	<ul style="list-style-type: none"> <li>• Continue to integrate climate change education into the K-12 curriculum, English and French</li> <li>• Continue to administer outdoor learning grants to promote outdoor learning, English</li> </ul>	EEY
28	<b><i>Public Awareness of Climate Impacts and Personal Adaptation Actions</i></b>	<ul style="list-style-type: none"> <li>• Public outreach and awareness campaigns on various subjects including coastal hazards and extreme heat</li> <li>• Social supports coordinators and seniors navigators</li> <li>• Inclusion of climate considerations in the PEI Seniors Guide</li> </ul>	<ul style="list-style-type: none"> <li>• Public outreach and awareness campaigns on various subjects including coastal hazards, extreme heat, FireSmart</li> </ul>	TI HW EECA SDS

# Climate Challenge Fund

PROPONENT	PROJECT
Abegweit First Nation	Best practices mission to explore a path to energy self- sufficiency for Abegweit First Nation to support generations to come.
Dr. Patrick Augustine, UPEI Faculty of Indigenous Knowledge, Education, Research, and Applied Studies	Siawa'tmnej L'ney Kjjitaqn Project
Dr. Nadja Bressan, UPEI Sustainable Design Engineering	Immersive Environment for Climate Change Adaptation
Farm Centre Association	Therapeutic Horticulture: an innovative solution to the threat of climate change
Green Learning Canada Foundation	Engaging PEI Youth in Local Climate Change Actions
Gulf Shore Community Health Cooperative	Children- and Youth-powered community and environmental resilience
Dr. Yulin Hu, UPEI Sustainable Design Engineering	Solar energy-driven hydrogen production from water splitting
Kensington North Watersheds Association Ltd.	Addressing Coastal Erosion in Kensington North using Nature-Based Climate Change Adaptation-Living Shoreline Demonstration
Maritime Electric Company, Limited	Climate Change Adaptation Strategy for Electrical Grid
Native Council of Prince Edward Island	Climate Hazards: Preparing for our Future
PEI Coalition for Women in Government	Empowering Women Advocates for Climate Resiliency
PEI Cultural Human Resources Sector Council Inc. (Creative PEI)	Climate Artist-in-Residence Program
PEI Sheep Breeders Association (PEISBA)	Parasite Resilient Sheep
Prince Edward Island Potato Board	Measuring impacts of seed sensing technology on meeting PEI's Net-Zero goals and agronomic performance in PEI potato production
Dr. Stephanie Shaw, UPEI Sustainable Design Engineering	Holistic exploration of the sustainable use of biomass as an alternative fossil fuel on Prince Edward Island
STEAM PEI	PEI Sustainable Energy Education for Grade 6 Youth and Teachers
Upcycle Green Tech	Electric Converted and Remanufactured Vehicles
UPEI School of Climate Change and Adaptation, Dr. Aitazaz Farooque	Monitoring and Modeling Greenhouse Gas Emissions in the Face of Climate Change for Sustainable Crop Production in Prince Edward Island

