



SME IN TRANSITION

Manufacturing Industry

Towards a Low-Carbon Economy

Collaborative Action Research Initiative

First Synthesis Report

January 2023 – January 2024

Published on January 31, 2024

Table of Contents

Acknowledgments	3
Introduction	5
Objectives	6
Highlights	8
About Quebec Net Positive	10
For more information	10

To quote this report:

Quebec Net Positive (2024). SMEs in Transition – Collaborative Action Research. First Synthesis Report.

Directed by Katrin Hauschild in collaboration with: Rachel Lefrançois, Jeanne Martel-Thibault, Anne-Josée Laquerre, Philippe Poitras, Sylvain Foulon, Frédérique Mouly, Laurence Roger, Melody Tim Yen, Jérémie Bourgault, and Caroline Bouchard.

This English summary presents the highlights of a more detailed synthesis report, available in French on our website: <https://www.quebecnetpositif.ca/pmeentransition>.



Quebec Net Positive would like to express gratitude to all individuals who participated in interviews as well as any of the action research activities implemented since the inception of the initiative.

Each new encounter is an opportunity to learn together, build bridges, and take another step towards transition. Thank you!

Thanks to our:

Financial partners

Ce projet a été réalisé avec l'appui financier du gouvernement du Canada.

This project was undertaken with the financial support of the Government of Canada.



LAURENTIAN BANK

Collaborators



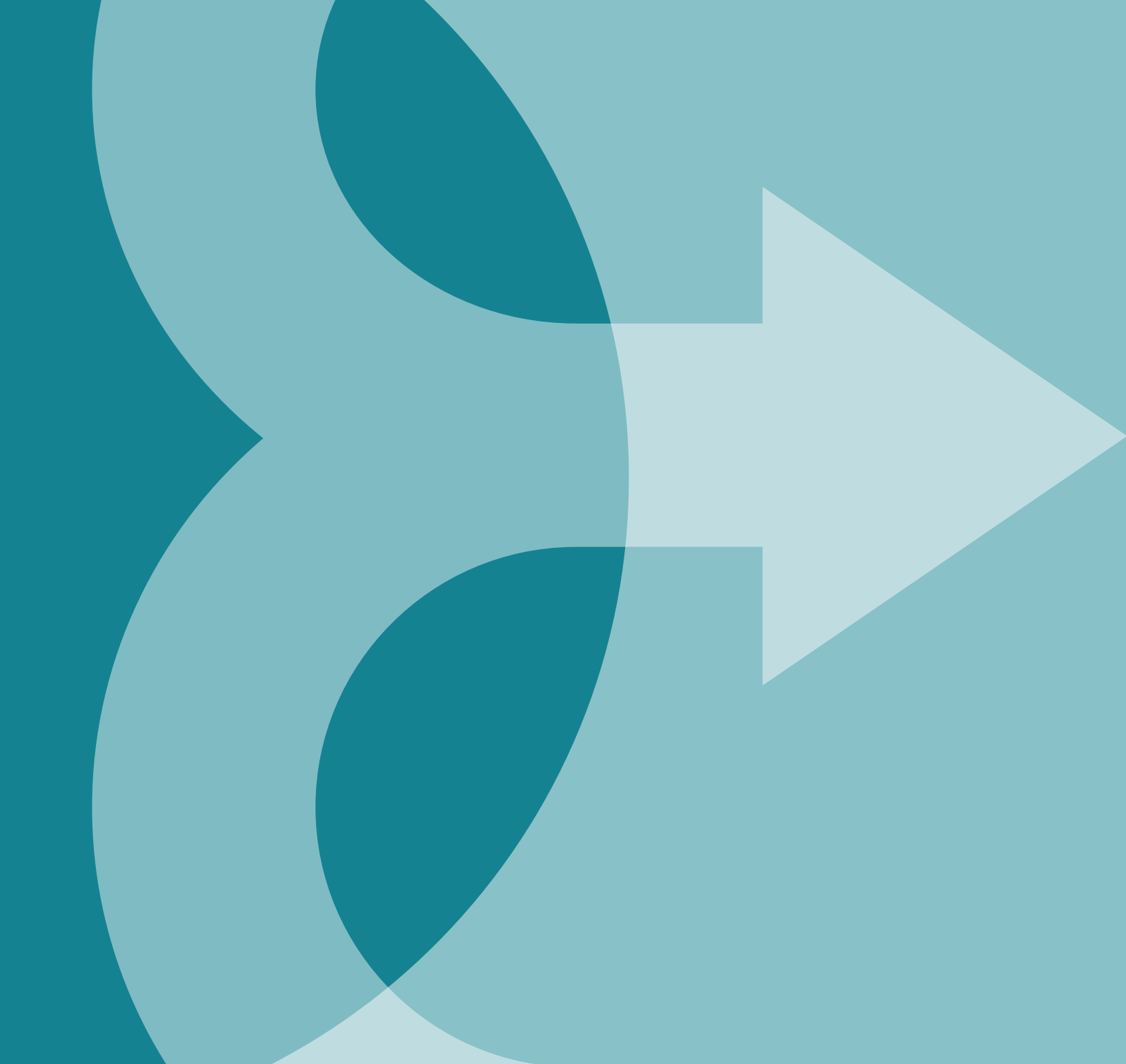
Ensemble pour un futur souhaitable
Espace pour la vie | Université de Montréal



PROJET COLLECTIF

Broadcasting Partner





Introduction

"SMEs in Transition" is a collaborative action research initiative serving small and medium-sized manufacturing enterprises (SMEs) in Quebec and the business ecosystem that supports them. Launched on May 17, 2023, the initiative will continue until January 2025 and will be the subject of two reports: the highlights of the first report are presented here. To view the detailed First Synthesis Report, visit our website: [SMEs in Transition | Quebec Net Positive](#)

This initiative aims to reveal and co-create innovative approaches to help SMEs accelerate their transition to a low-carbon economy. By sharing the knowledge acquired to date, we aim to foster a constructive dialogue on the measures to be implemented to assist manufacturing SMEs in adopting likely transition pathways, to actively contribute to greenhouse gas (GHG) reduction, and to seize new business opportunities.

"SMEs in Transition" is led by Quebec Net Positive with the support of practitioners, experts, academic researchers, and collaborators who support SMEs in three regions of Quebec: Estrie, Montérégie, and Montreal (Saint-Laurent Borough). These regions have been chosen based on the density

of manufacturing businesses in their respective territories, their representation of rural and urban environments, and the interest of credible collaborators directly linked to manufacturing SMEs in their respective territories.

The initiative is one of 16 research projects funded under the Climate Action and Outreach Fund of the Environmental Damages Fund, administered by Environment and Climate Change Canada, to support the mandate and objectives of the Net-Zero Advisory Body (NZAB). These projects aim to address the knowledge gaps and enable NZAB to continue its critical mission to help Canada achieve GHG neutrality by 2050.



« A robust base of evidence and forward-looking research is integral to drive Canada's progress towards net-zero by 2050. NZAB is proud of catalyzing this agenda for the Canadian net-zero research community »

Dan Wicklum
NZAB Co-Chair

« These research projects will spark new conversations and insights on Canada's pathways to net-zero. The NZAB looks forward to learning from these research projects to inform our advice »

Marie-Pierre Ippersiel
NZAB Co-Chair

Objectives

Structured in three pillars, "SMEs in Transition" aims to assess the relevance and impact of various engagement approaches to:

- Strengthen the willingness and capacity of manufacturing SMEs to implement climate action;
- Activate a business ecosystem conducive to accelerating the transition to a low-carbon and "net positive" economy.

Pillar 1

Regional and Sectoral Mobilization

Objective

Identify appropriate means and key moments to promote the measurement of GHG emissions, establish reduction targets, and trigger climate action.

Collaborators



Pillar 2

Communities of Practice

Objective

Identify mechanisms to optimize the added value for leaders and participants in joining collective learning spaces on climate action and transitioning to a low-carbon economy.

Collaborators



PROJET COLLECTIF

Pillar 3

Transition Pathways, Foresight, Monitoring and Business Intelligence

Objective

To bring together leaders of manufacturing SMEs – and the ecosystem of those who accompany them – to create spaces for exchange and reflection to increase collective awareness of the needs and possibilities for change in their sector, develop a transformative vision that will help identify business opportunities and favourably orient short-term decisions towards a likely transition pathway, and be on the lookout for best practices in Quebec and beyond our borders through strategic monitoring.

Collaborators



Quebec Net Positive, its partners and collaborators

From the bottom, left to right: Rachel Lefrancois, Quebec Net Positive; Mélanie McDonald, Chemins de transition; Marguerite Rose, BDC; Anne-Josée Laquerre, Quebec Net Positive; Frédérique Mouly, Excellence industrielle Saint-Laurent; Benoît Périn, CRE Montérégie; Katrin Hauschild, Quebec Net Positive; Joëlle Vincent, Ciblexpert; Isabelle Lemay et Marie-Pierre Garcia, Banque Laurentienne; Leesa Hodgson, Excellence industrielle Saint-Laurent; Léa Leroux et Caroline Bouchard, Phar; Yves Lusignan, Ciblexpert; Jérémie Bourgault, ADDERE; Pascale Lagacé, Brav./Futur Simple; Jeanne Martel-Thibault, Quebec Net Positive; Jacques Blanchet, Maison du développement durable; Sylvain Foulon, Excellence industrielle Saint-Laurent; Marc Delesclefs, Ciblexpert. (Philippe Poitras, Futur Simple, missing from photo)



“The collaborative action research format of “SMEs in Transition” allows us to be in the field, along with committed collaborators actively fostering exchanges among various stakeholders in the business ecosystem to generate new knowledge. Our common goal is to trigger climate action by manufacturing SMEs.”

Katrin Hauschild,
Deputy General Manager and Leader of
“SMEs in Transition”, Quebec Net Positive



“It is vital for the entire Quebec economy, as a whole, that its 250,000 SMEs, which employ more than 2 million workers, are aware of the risks and business opportunities of the major economic transition underway and successfully engage in it.”

Anne-Josée Laquerre,
Executive Director and Co-Founder,
Quebec Net Positive

8 Highlights

1

Implementation of climate actions is not a priority for manufacturing SMEs in Quebec. The economic and operational uncertainty in which manufacturing businesses operate leaves little room for integrating climate action into business strategy and operations.

2

If they had funds to reduce their GHG emissions, the manufacturing SMEs interviewed would mainly consider the following actions:

- Hiring staff
- Replacing fossil fuel powered equipment
- Workforce training/awareness raising
- Hiring experts or an environmental manager to draw up and implement action plans
- Acquiring electric vehicles

3

The directional trends that are emerging for likely transition pathways for manufacturing SMEs include:

- Energy productivity (measure of economic benefit received from each unit of energy used)
- Circular economy
- Industrial symbiosis
- Industry 5.0

4

Communities of practice (CoP) are a collaborative format with strong knowledge-building potential within manufacturing SMEs. The appeal of CoPs lies mainly in the fact that they are a highly concrete and flexible learning mode that fosters trust within a network of peers, including the sharing of best practices.

5

The concept of foresight is still relatively unknown in the business community, and current approaches are not well suited to the reality of SMEs.

6

The five main climate actions identified in the first seven months of monitoring activities are consistent with the quantitative data from the [Business Transition Barometer – Manufacturing Sector](#)¹. The main actions observed are:

- Waste reduction and composting
- Optimization of operations and reduction of resources
- Improving and adapting product and service offerings to reduce GHGs
- Circular economy and recycling
- Responsible procurement

7

The three main opportunities for improvement identified in terms of regional mobilization are:

- Consolidating the role of “coordinator” of businesses’ climate action at the regional level to facilitate access to the support ecosystem and foster greater cooperation and fluidity within it.
- Simplifying access to regional data to better guide SMEs, monitor progress and encourage collaboration to help focus efforts on reducing significant sources of emissions.
- Reinforcing the boldness and leadership of local governments, including clearer and more predictable laws and regulations to guide and encourage businesses to take action.

8

The three main motivations for taking action to reduce the carbon footprint, as expressed by executives and managers in field interviews are:

- Executive and corporate values
- Individual awareness
- Business opportunities



To take things further, the manufacturing SMEs, who testified as part of the action-research project are calling for **clear directions from the government, financial incentives and support** to help them identify the most profitable and relevant actions to implement in the short term.



About Quebec Net Positive

Founded in 2016, Quebec Net Positive is an independent, non-profit think tank. Our purpose is to accelerate the transition towards a low-carbon and “net positive” economy.

Our mission is to raise awareness, mobilize, and equip businesses – specifically small and medium-sized enterprises (SMEs) and those who support them – to help them seize new business opportunities, go beyond mitigating risks, and activate their full potential to create positive impacts on society and the environment.

Quebec Net Positive aims to ensure that companies generate net positive impacts on society and the environment, and reinvest more in the global system than they take out.

www.quebecnetpositif.ca

Relevant publications:

[Transition Barometer – All Quebec Businesses | Quebec Net Positive](#),
November 2023

[Transition Barometer – Manufacturing Sector | Quebec Net Positive](#),
April 2023

[Transition Barometer – Aerospace Manufacturing Sector | Quebec Net Positive](#),
October 2023

For more information

About SMEs in Transition’s collaborative action research initiative:

<https://www.quebecnetpositif.ca/smeintransition>