Canadian Biogas Association
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2026

Canadian Biogas & RNG Market Report

April 30, 2026

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Executive Summary

Canada's biogas and renewable natural gas (RNG) sector continues to demonstrate steady growth and increasing importance in Canada's low-carbon energy transition. As of 2024, Canada has 292 operational biogas and RNG facilities producing more than 32 PJ of renewable energy annually through agricultural and food waste anaerobic digestion, wastewater treatment systems, and landfill gas recovery projects. The sector supports energy security, methane reduction, waste diversion, and rural economic development while creating valuable circular economy opportunities across the country.

Key Market Metrics

- 292 operational biogas & RNG facilities across Canada
- 32.3 PJ of renewable energy produced annually
- Generating 8.5 PJ of RNG, 250 million kWh of electricity, and utilizing over 100 million m^3 of biogas for direct onsite uses, such as heat
- Over 2 million tonnes of organic waste processed annually
- 26 RNG projects under development, representing an additional 25.65 PJ/year of capacity
- Only 14% of Canada's available feedstock potential currently utilized
- RNG production is projected to increase four-fold by 2028, driven by projects already in development and expanding market demand

While industry growth since 2023 has been more modest than initially projected due to policy uncertainty and stronger U.S. incentives, the development pipeline remains strong. More than 70 Canadian projects are currently waiting for greater policy certainty and competitive support to move forward.

Federal Clean Fuel Regulations and provincial renewable gas programs have driven market growth, particularly in British Columbia, Québec, Ontario, and Alberta. However consistent policy signals and measures to address cost competitiveness are needed to accelerate domestic clean energy production, reduce emissions, and attract private investment to allow biogas & RNG to play a significant role in achieving Canada's climate and methane reduction goals.

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Data Sources and Methodology

Data presented in this report reflects the 2024 operational year and was primarily collected through a survey of industry participants. For facilities that did not complete the survey, information was supplemented using prior industry databases, publicly available disclosures (including news releases), and relevant publications. In certain cases, metrics were derived using standardized assumptions. Variations between this report and the 2023 market report are primarily attributed to facility reclassification and the application of more stringent inclusion criteria.

1. Introduction

The Canadian Biogas Association (CBA) prioritizes producing reports and studies that help shape public discourse and regulatory policy across Canada, including Market Reports in 2020 and 2023. The CBA is pleased to present this 2026 Market Report, which provides a comprehensive snapshot of current biogas and renewable natural gas (biogas & RNG) market conditions.

Since the last report, the industry has demonstrated modest growth, underscoring its reliability and maturity. However, projected growth has not been fully realized, largely due to an uncertain policy environment that has delayed or paused many projects. Providing stable, adequate, and equitable policy support would unlock many proven projects in the near term, delivering significant energy, environmental, and economic benefits to Canada.

Canada's biogas and renewable natural gas industry is evolving within a period of global energy system transition. Ongoing geopolitical and economic uncertainties, alongside shifting trade and investment patterns, have increased focus on energy security, affordability, and domestic supply. Within this context, Canada continues to advance its objectives of maintaining a resilient energy system while meeting climate commitments. These broader dynamics highlight the relevance of scalable, low-carbon solutions such as biogas and RNG, and reinforce the importance of stable and coordinated policy frameworks to support sector development.

2. Biogas Benefits: Energy, Economic, and Environmental

Biogas is a renewable source of methane gas that can be used as fuel for heat, power, and transportation. Biogas is created when organic waste materials from agriculture, industry and municipalities are treated in an oxygen-free environment in a process called anaerobic digestion (AD). It offers a waste management solution and creates locally produced renewable energy and recovers the nutrients and stable carbon contained in the waste.

Biogas can be used to produce electricity and heat, or it can be cleaned and upgraded to RNG. RNG is a direct substitute for fossil-based natural gas which can be injected directly into the natural gas grid or used directly in any natural gas consuming application or vehicle. Biogas upgrading separates out the biogenic CO_2 from the biogas, which can be used for industrial applications or be sequestered. As such, AD of organic waste provides many benefits for Canada's energy system and economy and helps Canada meet its climate goals.

2.1 Energy System Benefits

Biogas & RNG are part of the solution for Canada's cleaner, renewable energy future. Some benefits to the energy system unique to biogas include:

- **Flexible drop-in fuel:** Biogas upgraded to RNG is fully compatible with existing natural gas infrastructure, enabling seamless integration into pipelines, storage systems, and end-use equipment without requiring major modifications. This "drop-in" capability allows it to displace fossil natural gas immediately while supporting a gradual, lower-cost energy transition.
- **Replacement for hard -to-decarbonize industries:** Biogas and RNG are sources of renewable energy that can replace carbon intensive energy derived from coal, oil, diesel or natural gas.
- **Local energy resilience:** Biogas systems produce energy from locally available organic waste streams, reducing dependence on imported fuels and centralized energy systems. This decentralized production model enhances energy security, stabilizes supply during disruptions, and keeps energy spending within local economies.

2.2 Economic Benefits

Canadian biogas projects provide economic benefits, including but not limited to:

- **Wider economic benefits, including job creation:** With the right mix of policies, **modelling** shows that biogas & RNG can create 19,900 fulltime equivalent jobs by 2030 and lead to almost $2.2 billion in private investment
- **Cost savings and/or revenues for managing waste streams:** Municipalities, waste management companies, and private companies can benefit from using their waste as a biogas feedstock. Direct revenue sources include commercial tipping fees for source separated organics (SSO) and revenues from RNG. For wastewater treatment, the possibility of integration with other community biogas sources such as landfill gas and SSOs creates the potential for improved economies of scale, which, in turn, creates more opportunities to develop diverse energy revenue streams through both electricity and RNG production.
- **Bedding savings for dairy farms:** Solid fibre in digestate can be extracted to use as animal bedding on the farm, displacing the need to buy alternate bedding materials.
- **Land management cost efficiencies:** Nutrients contained in waste materials can be recovered in the digestate and be safely applied to growing crops, making it a marketable and valuable soil amendment or fertilizer. Applying digestate reduces the need for synthetic fertilizers, therefore reducing land management costs.
- **New revenue from the sale of carbon credits:** Biogas and RNG producers can monetize their greenhouse gas (GHG) reductions and sell their verified carbon credits for additional revenue.

2.3 Environmental Benefits

Environmental benefits offered by biogas projects include:

- **GHG reduction:** Biogas reduces GHG emissions by capturing methane that would otherwise be released into the atmosphere, and by displacing fossil fuels for energy generation. The GHG reduction (and carbon intensity of the biogas energy) varies from facility to facility as it depends on the type of feedstock and how it is typically disposed of, and on the end-use of the biogas.
- **Waste management:** All municipal and industrial waste must be managed before release into the environment. AD offers an alternative to landfilling and composting, processing organic materials into useful energy and digestate co-products that contains the stable carbon and nutrients contained in the waste using proven technology in multiple settings (i.e., agriculture, industrial, commercial).
- **Resource efficiency and circular economy:** AD derives value from discarded organic materials, converting waste into renewable energy and recovering the nutrients for new crop production.
- **Nutrient stabilization:** AD mineralizes the nitrogen and phosphorus contained in the organic waste, making these elements more available to the plant. Digestate can be applied whole or be separated into solid and liquid fractions that can be safely used on farms as fertilizer or a soil amendment.
- **Commercial fertilizer reduction:** Digestate offers nutrient value and enhanced soil properties (i.e., enriched organic matter) reducing the reliance on commercial fertilizers which are manufactured using fossil energy.
- **Water quality protection:** The AD process significantly reduces pathogens by up to 99 per cent, mitigating pollution risks in soils, groundwater, and surface water.
- **Odour reduction:** AD can reduce odours from farms, landfills, and waste processing facilities. Typically, AD facilities have much more effective air collection and treatment to reduce odours than other waste processing operations.

- **Improved air quality:** Capture and destruction of H_2S, volatile organic compounds and siloxanes created from the decomposition of organic matter in landfills leads to improvements in air quality, reducing the potential for smog and the associated health and safety concerns.
- **Preservation of valuable landfill space:** When organic material such as food waste is sent to anaerobic digesters for processing into biogas, it is diverted from landfill, which extends the longevity of landfills for other waste materials.
- **Efficient land use:** The footprint of AD facilities is much smaller than composting facilities of similar capacity, which supports the efficient use of land and increases the feasibility of locating facilities in or near urban areas.

2.4 Feedstock Sources

The majority of Canada's feedstock for biogas comes from four major sources: agriculture, food waste materials, wastewater treatment facilities (WWTFs), and landfill gas. Canadian feedstocks are widely available, but Canada is only tapping 14 per cent of its available feedstocks for use as biogas & RNG. The Canadian Biogas Association has been actively working to promote increasing the use of these waste resources for biogas & RNG.

Organic waste is generated depending on population, agricultural activity and industrial activity. On their own if not harnessed for energy production, these feedstocks will be landfilled and become a source of methane emissions in Canada. By capturing and transforming the methane these sources would otherwise release into the atmosphere, the biogas sector can contribute significantly towards meeting Canada's methane targets[1].

Agricultural Feedstock

Agricultural waste, including animal manure and crop residues, is responsible for 4 per cent of Canada's methane emissions and 11 per cent of its nitrous oxide emissions, both potent GHGs. Processing agricultural waste as feedstock for biogas & RNG systems avoids GHG emissions released during manure storage. Even so, there is still much agricultural feedstock available for use and significant opportunities for more agricultural AD facilities.

Household and Industrial Food Waste

Residual organic material includes residential and/or industrial, commercial, and institutional (IC&I) source separated organics (SSO), food processing waste, fats, oils, and greases. Using food waste to generate electricity or RNG keeps it out of landfills and allows nutrients to be returned to the soil. Agricultural AD facilities also co-digest food waste with agricultural feedstocks.

Wastewater Treatment Facilities

Most large municipal WWTFs use AD to stabilize and reduce the volume of sludge produced in the wastewater treatment process. Almost half of the biogas from WWTFs, 52%, is flared, resulting in significant potential for future RNG projects at WWTFs. Methane abatement from municipal wastewater treatment is an area of great potential.

Landfill Gas

Landfill gas (LFG) is a mix of different gases created by the action of microorganisms within a landfill as they decompose organic waste. LFG is a typically 40 to 60 per cent methane, with the remainder being mostly CO_2. The gases released from landfill decomposition are captured by perforated pipes and then either flared, converted into electricity or upgraded into RNG.

1 Hitting Canada's Climate Targets with Biogas & RNG, CBA, 2022.

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3. Market Overview: Key Regions, Policies, and Industry Trends

A full overview of relevant policies and developments in Canada and key provinces was provided in the **2025 Biogas Insights Report**. The excerpt below is from the report to provide essential background on the Canadian landscape.

3.1 Federal

Clean Fuel Regulations

The federal Clean Fuel Regulations (CFR) remain the most appealing revenue option for biogas & RNG facilities. The CFR requires primary suppliers of gasoline and diesel to gradually reduce the carbon intensity (CI) of the fuels they produce and import into Canada and these reduction requirements have been in place since July 1, 2023. Biogas & RNG can generate gaseous credits for the obligated parties to purchase under Compliance Category 2 (CC2) and liquid credits under Compliance Category 3 (CC3).

Environment and Climate Change Canada releases credit market reports which provide insights into the opportunity for biogas & RNG under the CFR. *Table 1* summarizes the key findings of the reports, from June 2022 to March 2025. Positive comparisons year over year include:

- Higher credit price in 2024
- Larger market contribution from RNG
- Lower carbon intensity for RNG

Table 1. CFR Credit Market Summary

Compliance Period	June 2022 – Dec 2023	Jan – Dec 2024	Jan – Mar 2025[a]	April – June 2025
Credit Price Range	$6.75 – $300	$3.52 – $280	$1.00 – $280.00	$10 – $284.17
Credit Price Average	$133.20	$157.07	$93.08	$142.19
Credits Generated (CC2+CC3)	7.43 million	7.03 million	1.73 million	2.28 million
Credits Generated from RNG[b]	24,540	90,871	37,910	82,468
Credits Generated from Biogas[c]	--	--	--	11,393
Market Contribution from Biogas & RNG	0.4%	4%	2.2%	3.9%
Carbon Intensity for Biogas & RNG Range (gCO_2e/MJ)[d]	18 – 80	7 – 79	(-106) - 78	(-106) – 78
Carbon Intensity for RNG Average (gCO_2e/MJ)	70.1	63.1	24.2	41.8
Carbon Intensity for Biogas Average (gCO_2e/MJ)	--	--	--	25

a. Q1 of 2025 was marked with some political uncertainty that affected the market at this time. The lower credit value was likely due in part to these factors and were not necessarily expected to remain low for the rest of 2025. Values did start to rebound in the next market report.

b. Includes credit compliance credits created in respect of the gaseous class for the production and import of RNG (compliance category 2) and compliance credits created in respect of the liquid class for the production and import of renewable natural gas for use as a fuel in a vehicle (compliance category 3).

c. Includes production of biogas to produce electricity.

d. The minimum carbon intensity used to create credits for this fuel during this compliance period has been requested to be withheld as confidential. The lowest non-confidential value has been published where available. Note that the CI values include fixed default CIs, calculated default CIs, and CIs determined using the Fuel LCA Model.

Canadian Greenhouse Gas Offset Credit System Regulations

The Canadian Greenhouse Gas Offset Credit System Regulations apply across Canada to proponents of projects located in Canada that reduce GHG emissions or increase GHG removals from the atmosphere, that generate real, additional, quantifiable, verifiable, unique and permanent reductions, and that are implemented using a federal offset protocol.

Two Offset Protocols under the system provide additional opportunities for biogas & RNG projects to leverage and monetize the deep carbon reductions inherent in the technology type.

1. Landfill Methane Recovery and Destruction
   - This protocol was published February 2023 and is applicable everywhere except British Columbia, Alberta, and Québec. The *Landfill Methane Recovery and Destruction* federal offset protocol creates an incentive for landfill owners, municipalities, and other project developers to implement projects that actively recover and destroy landfill gas in an eligible destruction device, such as a flare or device for energy generation.
   - Currently one landfill is generating credits under the protocol. Canada's Greenhouse Gas Offset Credit System Public Registry indicates the Guysborough Landfill Gas Project in Nova Scotia has issued 4,974 credits.
2. Reducing Manure Methane Emissions
   - A draft protocol was published in April 2025. The *Reducing Manure Methane Emissions* federal offset protocol is expected to create an incentive for farmers, livestock operation owners, and other project developers to implement projects that treat liquid manure to reduce methane emissions. Anaerobic digestion is among the proposed eligible manure treatments to generate credits under the protocol.

Budget 2024 & Budget 2025

In Budget 2024, the federal government recognized biogas and RNG as priority fuels for development and committed significant new support for the biofuels sector—including a redesigned Clean Fuels Fund delivering $776.3 million over four years, $500 million in biofuel production investments through the Canada Infrastructure Bank, and an additional $500 million in funding derived from Clean Fuel Regulations compliance payments. Together, these measures acknowledged the sector's potential to attract new investment and unlock meaningful clean-energy generation across Canada.

Following the federal election in April 2025 and the arrival of a new government, new measures for the biofuel industry were announced as a response to ongoing trade tensions, including a Biofuel Production Incentive for canola-based biodiesel and renewable diesel and targeted amendments to the Clean Fuel Regulations that support Canadian clean fuel producers. The discussion paper on the CFR amendments was published in December 2025, and the Canadian Biogas Association has remained highly engaged throughout the process.

Budget 2025 did not introduce further measures for biogas or RNG beyond previously announced policies. This represents a missed opportunity at a time when Canada continues to trail Unites States (U.S.) incentives and when more than $1 billion in near-term domestic biogas and RNG projects remain ready to move forward with competitive support. The Canadian Biogas Association continues to underscore the economic and environmental value of biogas and push for competitive policy signals needed to fully capture this untapped opportunity.

The federal 2025 Budget did however introduce legislation to expand the 30 per cent Clean Technology Investment Tax Credit to include systems that produce electricity and/or heat from waste biomass, with retroactive eligibility for equipment acquired on or after November 21, 2023 and this is an important win for the biogas sector. While most new anaerobic digestion plants are producing RNG in response to current off-take options, biogas-to-electricity remains a viable pathway. The legislative addition of eligibility for these waste biomass systems to the Clean Technology ITC has been included in Bill C-15, which was enacted on March 26, 2026.

Landfill Methane Regulations

Canada's Landfill Methane Regulations came into force on December 12, 2025 and mandate strict controls on methane emissions from large landfills. The national impact is expected to be a 50% reduction in landfill methane emissions in 2035 relative to 2019. Compliance obligations begin to apply in 2028, starting with landfills with existing recovery systems and emissions greater than 1,000 tonnes of methane per year and will be extended to large landfills without existing systems in 2029. By 2035, the obligations will apply to landfills emitting more than 664 tonnes per year.

3.2 Provincial

British Columbia

The Government of British Columbia's *CleanBC Roadmap to 2030* climate plan has committed to a minimum of 15 per cent renewable gases to be blended by natural gas distributors into their gas supply by 2030, although the province has yet to implement a regulatory requirement to meet this target. The Greenhouse Gas Reduction Regulation (GGRR) enables utilities to produce, purchase and distribute RNG, among other fuels, through the natural gas system to their customers and allows utilities to pay up to $31/GJ to produce or purchase renewable gas. The Final Report of the CleanBC Independent Review Panel's 2025 comprehensive review of the CleanBC policies and programming, released in November 2025, recommended that increasing production of RNG in BC be a top priority for the province going forward. The Report also explicitly recommended the province introduce a regulatory requirement for incremental RNG blend rates with consideration of a made-in-B.C. component, the implementation of a registry to increase confidence in interprovincial RNG purchases via book-and-claim, and an update to the *B.C. Renewable and Low-Carbon Gas Supply Potential Study* to reflect current market realities.

In March 2024, FortisBC welcomed a decision by the BC Utilities Commission (BCUC) on their Revised Renewable Natural Gas Application, which meant that all FortisBC natural gas customers will have one per cent of their gas designated as RNG. FortisBC is the first energy utility in North America to automatically designate RNG for customers. However, the BCUC did not approve FortisBC's proposed program that would have seen all new residential buildings connecting to the gas system to have 100 per cent of their gas designated as RNG.

In June 2025, the BCUC launched an inquiry, *Review of Renewable Natural Gas Definition and Accounting*, to examine the BCUC's definition of RNG and the sufficiency of mechanisms for ensuring that GHG emissions associated with RNG purchased from projects located outside of B.C. are properly accounted for. The inquiry has continued into 2026, and the outcomes could affect how RNG is transacted in B.C. In the interim, any purchases of RNG by the utilities have been limited.

B.C.'s Low Carbon Fuel Standard (LCFS) sets requirements that encourage the use of renewable and low carbon fuels for transportation end-use and offers incentives to organizations that supply them. Biogas & RNG projects in British Columbia are eligible to generate credits for sale under the LCFS and the Standard currently has six approved carbon intensities for RNG projects in the Province, ranging from -34.4 to 21.02 gCO_2e/MJ. In November 2025, the average LCFS credit price was $238.52 per credit. In April 2026, The British Columbia Ministry of Energy and Climate Solutions invited feedback from fuel producers, suppliers, and other stakeholders on its current interpretation of chain-of-custody requirements under the *Low Carbon Fuels Act* to help the Ministry better understand current industry approaches, including mass balance accounting and controlled blending, and inform future guidance.

Alberta

Alberta is taking strides to increase RNG production and leverage its ample agricultural resources. The government is actively involved in keeping updated with the biogas sector and the Canadian Biogas Association is encouraged by early stages of provincial consideration of a voluntary RNG market.

To further support the industry, Alberta's government introduced legislation that came into effect June 23, 2025 to enhance clarity surrounding organic waste in the agricultural industry, with the aim of recognizing the value that biogas offers to the province. Bill 44 updates the *Agricultural Operation Practices Act* (AOPA) and provides clarity on how organic material can be managed, which provides certainty for agricultural operations regarding storing and using digestate generated from manure and provides investor confidence. One of the most significant updates is the formal inclusion of digestate management under AOPA. Digestate in Alberta can now be stored in manure storage facilities or applied directly to agricultural land following the same requirements for manure application, provided it meets the requirements outlined in the new On-Farm Storage and Land Application Code. The legislation also allows certain organic materials off the farm to be used as nutrient sources under AOPA.

Emissions Reductions Alberta (ERA), funding by the Government of Alberta's Technology Innovation Emissions Reduction (TIER) Fund, provides clean technology investments to Alberta-based technologies that lower emissions and costs for industries. ERA has also been instrumental in providing millions of dollars of funding for six biogas & RNG projects. ERA is also a registered compliance fund under the federal Clean Fuel Regulations. Any funds directed to Alberta through CFR compliance channels are managed by ERA and invested in projects that deliver outcomes aligned with the regulation.

Biogas & RNG projects are eligible to generate credits for the Alberta Emission Offset System, under the *Biogas Production & Combustion Quantification Protocol*, which enables compliance flexibility for facilities regulated under TIER, however recent changes have affected the value of credits. On September 16, 2025, the Alberta government announced two key reforms to the TIER framework: (i) Allowing facilities that had voluntarily opted in to TIER to more easily opt back out, now that the federal fuel charge has been reduced to zero; and (ii) Allowing on-site investments into emissions reductions facilities to be recognized towards an emitter's compliance obligations. Whereas formerly, obligated parties that exceeded their emissions intensity target could comply with TIER through the purchase of either Emissions Performance Credits or Emission Offsets or Sequestration Credits, or simply by making a payment into the TIER fund, beginning in 2026 they will have the option to comply through eligible investment in on-site technology and process improvements. This change earned strong criticism from climate stakeholders on the basis that it will contribute to the growing oversupply of credits in the TIER system and weaken the investment signal for new emissions reduction projects.

Ontario

Since 2023, Ontario has seen developments of both electricity and RNG projects.

In Enbridge Gas's 2024 Rebasing Application to the Ontario Energy Board (OEB), it sought approval to procure enough RNG to supply 1 per cent of its Ontario customer demand in 2025 and gradually increase to 4 per cent by 2028. The purchases would have been made on long-term contracts and the *Low-Carbon Voluntary Program* (LCVP) would have been a big step forward for Ontario offering similar RNG programs to FortisBC in British Columbia and Énergir in Québec. The LCVP would have offered gas to large volume sales service customers, and any costs not recovered would have been included in the recovery of the costs of gas supply to residential customers, up to $2 per month for typical residential customers per 1% of RNG procured. Unfortunately, even with the financial limits in place, in May 2025 the OEB denied the proposal to have system supply customers provide a financial backstop for the program. The Program was approved as a non-utility business activity and severely limited the development of RNG in Ontario.

However, a positive development was a regulatory amendment to clarify and improve the Ontario Emissions Performance Standards (EPS) in April 2024. The amendments included expanding the eligibility for RNG that allows RNG delivered by Ontario's natural gas pipeline to be eligible to deduct from the facility's verified emissions.

Opportunities for biogas to electricity projects in Ontario continue to develop. In December 2024, Ontario announced the largest competitive energy procurement in Ontario's history to meet soaring energy demand. Ontario's procurement target increased from 5,000 MW to 7,500 MW to be contracted by 2029 and the government has provided direction to the IESO (Independent Electricity System Operator) to begin the second Long-Term Procurement (LT2), for which biogas facilities >1MW are eligible. In early 2026, the IESO completed their evaluation of proposals under the LT2 RFP and has offered contracts to 14 proposals representing solar and wind. Along with LT2, the Minister of Energy and Mines asked the IESO to report back on a proposal to establish a Local Generation Program for smaller scale, distributed-connected generation which includes biogas.

The IESO's Progress Report on Contracted Electricity Supply for Q3 2025 identified one bioenergy project contracted under the first Long-Term Procurement (LT1) with a capacity of 0.95 MW. The IESO is also currently consulting on a Local Generation Program and a Repowering initiative which provide opportunities for smaller and existing facilities. The Canadian Biogas Association and its members who own and operate biogas to electricity facilities in Ontario have been actively engaged in these consultations to ensure the program criteria are viable for their projects – particularly term length, pricing, and technology specific criteria.

Québec

There have been positive regulatory developments in Québec by the Régie de l'énergie that greatly support Énergir in advancing RNG in Québec. Québec has had an RNG program since 2016. In 2022, the Provincial Biomethane Regulation was amended to add the targets of 7 per cent by 2028 and 10 per cent by 2030, including gas from renewable sources such as RNG to increase the proportion of renewable gases in the grid.

In February 2024, a decision by the Régie de l'énergie du Québec approved an initiative that required all new network connections be powered by 100 per cent renewable energy, effective April 2024. As stated in its Vision 2030–2050 report, Énergir believes that its natural gas network has reached maturity and it plans to significantly reduce the volume of fossil natural gas it distributes and make the remaining volume progressively renewable. To achieve this, Énergir offers several energy solutions to support customers in the transition to renewable energy. It begins with a focus on energy efficiency solutions to help customers reduce their energy consumption and electrification of off-peak winter heating through dual energy, then looks to RNG for the remaining portion of the energy supply.

A further decision allows Énergir to improve its RNG offering to customers. On June 6, 2025, the Québec legislature passed Bill 69, *Loi assurant la gouvernance responsable des ressources énergétiques et modifiant diverses dispositions législatives* (Act to ensure responsible governance of energy resources and to amend various legislative provisions). The Act encompasses a wide range of significant changes to the legislative and regulatory framework for both electricity and natural gas in Québec. Notably, it introduces a definition for RNG and grants natural gas distributors the ability to account for the revenue generated from the sale of carbon credits to reduce the RNG price for its customers.

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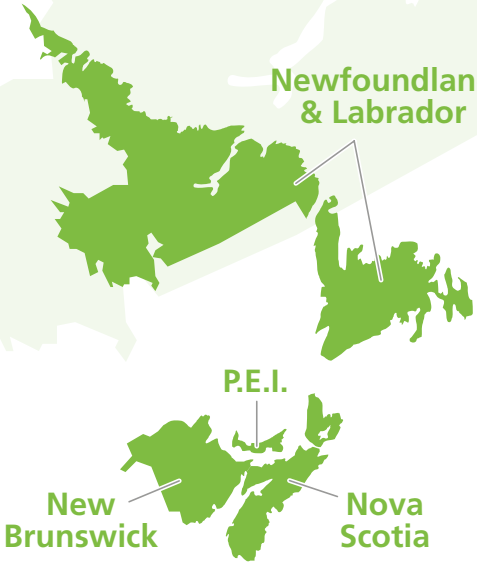
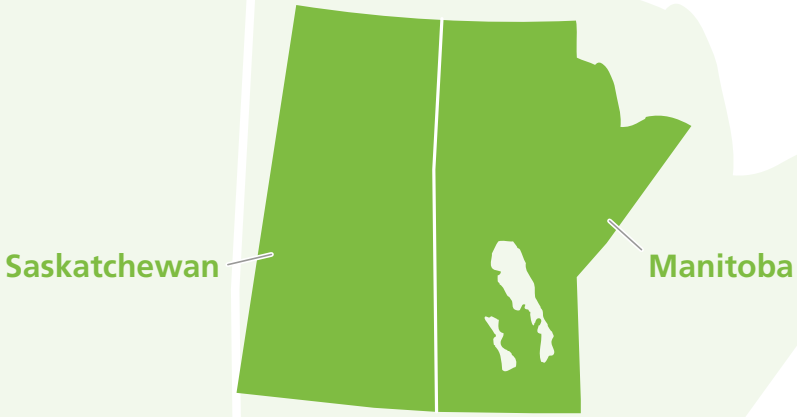
Prairie Provinces and Atlantic Canada

Biogas and RNG development in the Prairie and Atlantic provinces continue to progress where resources and project conditions allow, though activity remains more limited compared to other provinces. Saskatchewan's natural gas utility has been exploring options to integrate RNG into its system. Manitoba has identified biogas and RNG as strategic opportunities in its Path to Net Zero[2], with the City of Winnipeg choosing to sell landfill gas to a third-party upgrader, and two agricultural projects advancing. In Atlantic Canada, Nova Scotia maintains interest in new projects following earlier biogas-to-electricity developments under the COMFIT program. New Brunswick fully allocated funding for its *2024 Anaerobic Digester Feasibility Studies Program*, with several agricultural facilities now completing detailed assessments. Prince Edward Island and Newfoundland and Labrador show emerging interest but currently have minimal biogas or RNG development underway.



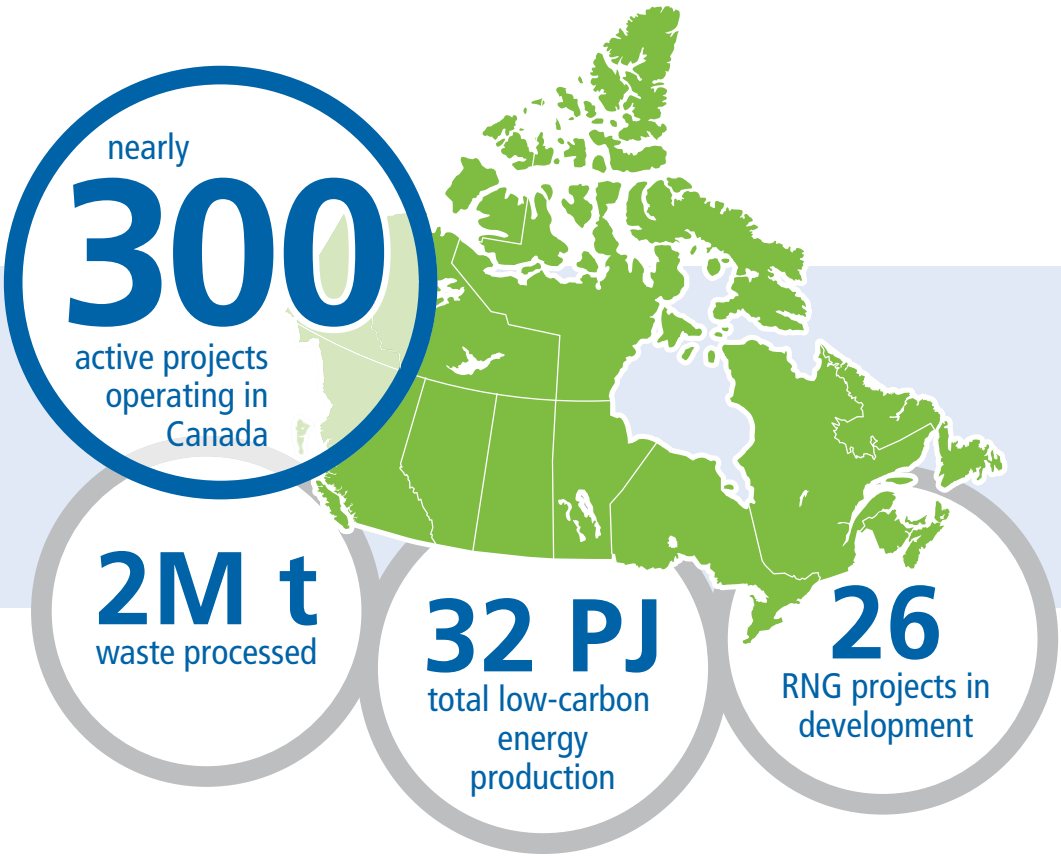


2 Manitoba's Path to Net Zero, October 2025.

4. Market Snapshot: Facilities, Feedstocks, and End-Markets

In 2024, Canada has 292 operational biogas & RNG projects. These projects are comprised primarily of agricultural, food waste, wastewater treatment and landfill gas facilities. These projects are:

- Producing biogas with the equivalent energy value of 32.28 PJ of renewable energy
- Generating 8.5 PJ of RNG, 250 million kWh of electricity, and utilizing over 100 million m^3 of biogas for direct onsite uses, such as heat[3]
- Processing over 2 million tonnes[4] of manure, crop residues, and off-farm organics annually
- Generating over 3.3 million tonnes of fertilizer, in the form of digestate, from on-farm and industrial biogas facilities and wastewater treatment facilities



3 From Agricultural, Industrial, Municipal and Industrial WWTFs. Does not include landfills.
4 Feedstock units are in wet tonnes.

Figures 1 and 2 below provide a break down of project types and the location of projects across the country. More detailed information can be found in *Appendix A*.

Figure 1. Number of Operational Facilities in Canada by Type

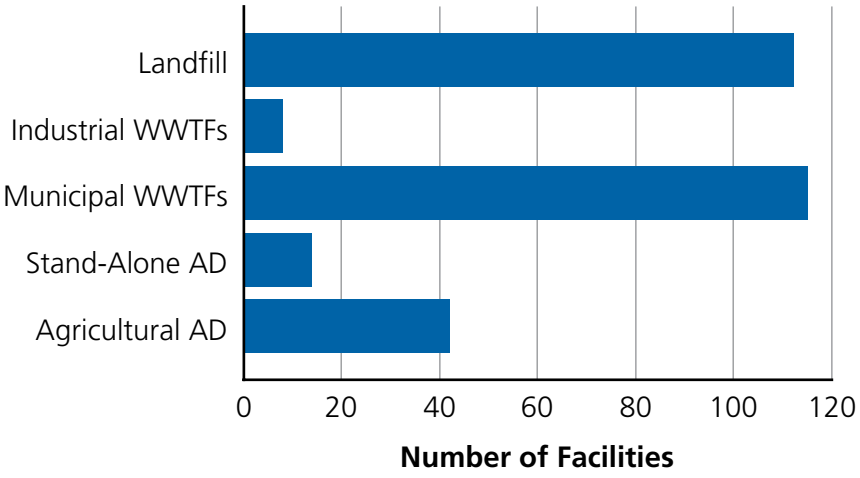
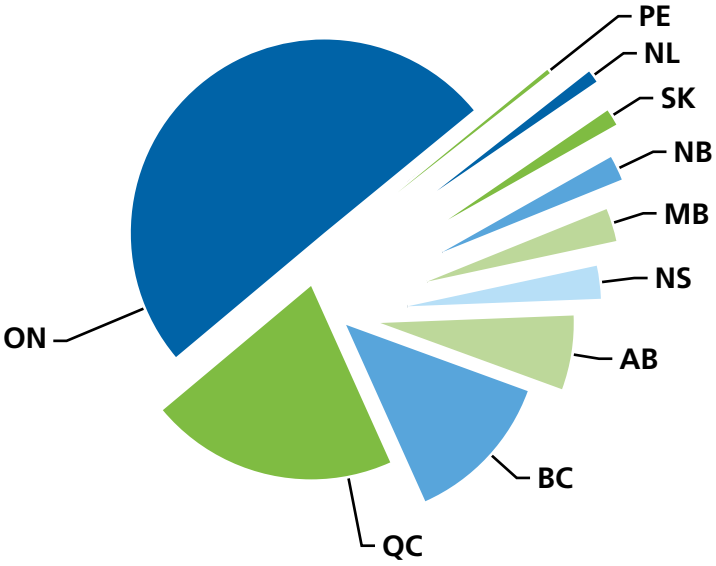


Figure 2. Total Facilities by Province



The sections below provide a detailed description of each type of project, energy production, and biogas-end use. Canada's biogas sector is comprised of three main types of facilities: 1) Anaerobic digestion facilities that primarily process food and agricultural waste, 2) Wastewater treatment facilities that use AD as part of their treatment process, and 3) Landfills that capture biogas created onsite from organic waste decomposing in the landfill.

4.1 Anaerobic Digestion Facilities

Anaerobic digestion facilities are designed to process dedicated feedstock, such as food and agricultural waste, in AD tanks. These facilities generally include feedstock receiving and preprocessing equipment, vessels for digestion, and gas treatment and utilization equipment. Feedstock can be sourced on-site, for example manure from a farm, or shipped from a short distance away, such as green bin material from a municipality.

Agricultural AD Facilities:
Agricultural AD facilities are farm-based systems primarily processing manure and agricultural feedstocks. Canada currently has 43 operational agricultural AD operations. These on-farm facilities have the technical capacity to process a combined total of over 1,170,000 wet tonnes of agricultural materials (i.e., manure and crop residuals) and off-farm organic waste (i.e., food processing waste) annually and produce the equivalent of 2 PJ of renewable energy. Digestate produced from these facilities is typically land applied, returning the nutrients to agricultural soils. Most facilities currently convert the biogas to electricity as they hold long-term contracts from feed-in-tariff (FIT) programs that ran from 2006-2016. Since FIT programs have ended, most new projects are designed to produce RNG. *Figure 3* provides a snapshot of the end-use of biogas from these facilities.

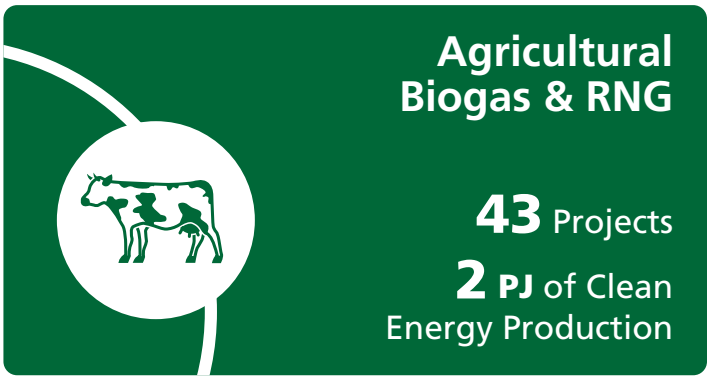
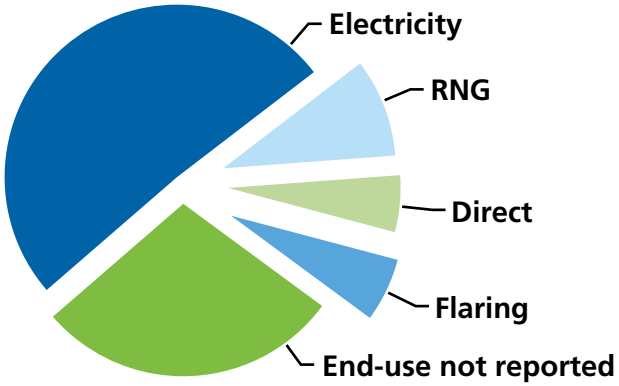


Figure 3. Agricultural AD Biogas End-Use (m^3)



Stand-Alone AD Facilities: Stand-Alone AD facilities are industrial or municipal organics facilities processing multiple organic feedstock streams, such as source separated organics, food processing residuals, fats, oils and greases, and other industrial organics. There are currently 14 operational industrial AD facilities in Canada. These facilities have the technical capacity to process over 940,000 tonnes of organic waste and produce the equivalent of 1.7 PJ of energy. These facilities mainly process household and industrial organic waste at larger volumes than on-farm facilities and are located at industrial sites. While early adopters were agricultural farm-based facilities that secured electricity power purchase agreements, most of the large stand-alone facilities came online as the biogas sector further developed with attractive offtake agreements for RNG. *Figure 4* provides a snapshot of the end-use of biogas from these facilities.

Stand-Alone AD Biogas & RNG

14 Projects

1.7 PJ of Clean Energy Production

Figure 4. Stand-Alone AD Biogas End-use (m³)

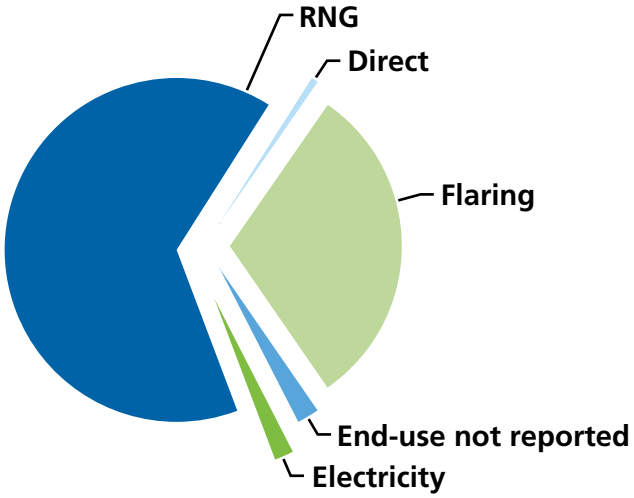


Table 2. AD Facilities Across Canada

Type	Number of Projects	Tonnes of Feedstock[5]	Energy Produced
Agricultural AD	43	1,170,000	2 PJ
Stand-Alone AD	14	940,000	1.7 PJ
Total	57	2,110,000	3.7 PJ

5 Feedstock data was not collected for all facilities, so the total amount of feedstock processed is larger than what is listed in this report. Units are reported in wet tonnes.

4.2 Wastewater Treatment Facilities (WWTFs)

Canada has a total of 123 WWTFs (municipal and industrial) that employ anaerobic digestion. These facilities produce the energy equivalent of 9.9 PJ of biogas annually.

Municipal WWTFs: AD facilities can be utilized to process sewage sludge, a by-product of municipal WWTFs. Sewage sludge contains the particles removed from the wastewater, which are energy- and nutrient-rich. During the AD process, the organic matter in sewage sludge is broken down by microorganisms and turned into biogas. At the same time, the sludge is stabilized and its volume is reduced.

In Canada, a high proportion of biogas produced in AD facilities is from municipal WWTFs. As of 2024, there were a total of 115 operational municipal WWTFs generating and capturing biogas across the country.

Industrial WWTFs: Some industrial facilities (e.g., food and beverage) utilize AD to treat high-strength wastewater with high organic carbon content. This reduces the volume of sludge generated while producing biogas that can be used internally for power and heat, thereby directly reducing their fossil fuel consumption. In addition, AD of wastewater can conserve water where the treated effluent can be reused within the process plant. There are a total of eight industrial WWTFs across Canada that include the production of biogas.

Often municipal and industrial WWTFs employ AD as part of the wastewater treatment process, without the primary purpose of capturing and selling biogas. *Figure 5* illustrates the end-use of biogas at WWTFs. Most WWTFs use the biogas directly for onsite needs and to offset fossil energy uses instead of flaring to destroy the methane. However, there are WWTFs producing and selling energy from biogas in the form of RNG and electricity, such as **The City of Hamilton** and **Saint-Hyacinthe**. More WWTFs are looking into the feasibility of this option.

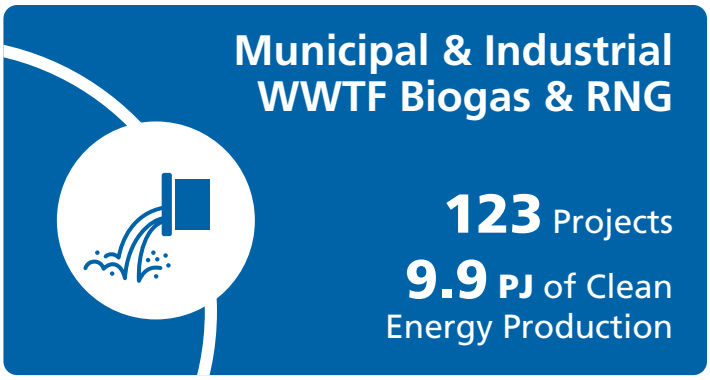
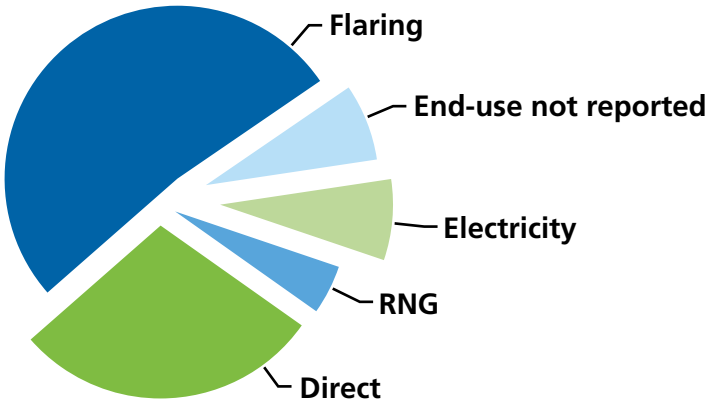


Figure 5. Municipal and Industrial WWTP Biogas End-Use (m^3)



4.3 Landfill Gas Capture Systems

Landfill Gas (LFG) is the gaseous product of anaerobic decomposition of organic waste in landfills. It is composed of roughly 50 per cent methane, 45 per cent carbon dioxide, and a small amount of hydrogen sulfide, siloxanes and non-methane volatile organic compounds. Instead of allowing LFG to escape into the atmosphere where it will contribute to climate change, LFG can be captured and flared or be used as a renewable energy source. Extraction of LFG is done using a series of wells and a blower system, which directs the captured gas to a central point where it can be processed and treated depending on the ultimate use for the gas. From here, LFG can be flared or beneficially used in an LFG energy project.

Environment and Climate Change Canada (ECCC) completed an LFG inventory analysis in 2024 to provide an understanding of landfill gas utilization.

Of the 271 landfills in the inventory, 112 had methane utilization producing the energy equivalent of 18.8PJ[6]. 62 per cent of facilities are currently flaring the gas, however 11 facilities that are flaring are developing RNG utilization and three are developing projects converting the gas to electricity. The breakdown of LFG utilization for RNG, electricity, and direct utilisation are seven per cent, 25 per cent, and six per cent respectively. An overview of landfill gas end use is provided in *Figure 6*.

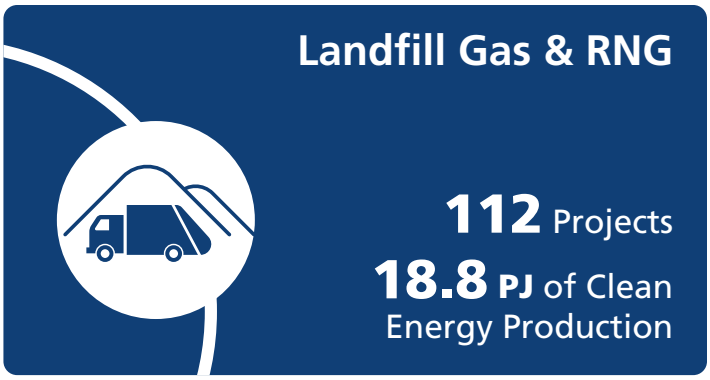
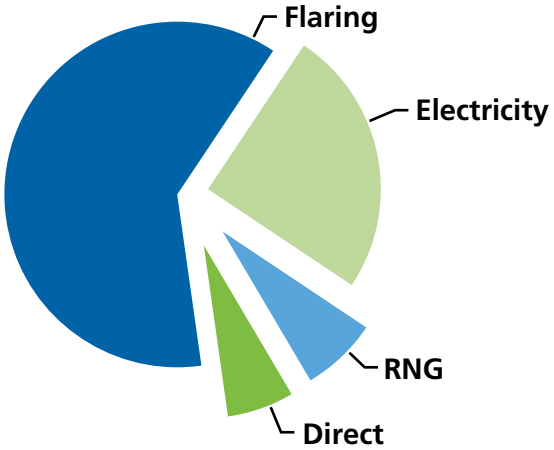


Figure 6. Landfill Biogas End-Use (by project)



The outlook for landfill gas development looks strong, with 16 facilities currently developing RNG projects in five provinces.

Table 3. Landfill RNG Projects in Development

Province	Number of LFG to RNG projects in development
BC	6
AB	1
MB	1
ON	4
QC	4

6 Assumption for landfill gas projects. In the 2020 inventory, 99 projects were identified to generate the equivalent of 16.6 PJ of clean energy. Scaling for growth, with the 2024 inventory identifying 112 projects, the energy generation can be assumed to be 18.8 PJ.

5. Market Trends: Growth, Biogas Utilization, and Future Projects

As Canada prepares for a future with increased clean energy needs, biogas & RNG is undeniably part of the solution. One that is already proven and scalable with a unique ability to meet Canada's needs.

- It offers a practical pathway to decarbonize hard-to-abate sectors such as heavy industry, transportation, and agriculture.
- It strengthens local economies by creating new revenue streams for farmers and supporting Canadian businesses across the value chain.
- As a flexible, drop-in fuel compatible with existing infrastructure, biogas & RNG can accelerate GHG emissions reductions without requiring costly system overhauls.
- Harnessing Canada's biogas & RNG potential leverages domestic resources and enhances energy independence by turning organic materials that are usually regarded as waste into renewable energy and clean fuels and recovering its nutrients for reuse.

As with many countries, Canada has a significant amount of room for the biogas industry to grow as it is estimated only 14 per cent of available feedstock is being utilized. Despite these advantages and a solid foundation of projects and expertise, the sector remains constrained by policy uncertainty and investment gaps. With the right level of support, Canada can unlock the full potential of biogas, transforming it into a key component of a resilient, low-carbon economy.

5.1 Industry Growth Since 2023

Since the 2023 market report, there has been recorded growth in the industry (*Table 4*). The maintained production and growth in the industry in the past three years demonstrates the strength of the industry. It also highlights the missed opportunities for more accelerated growth as there are at least 70 projects across the country waiting for more certainty before moving forward.

Table 4. 2023 vs 2026 comparison

	2023 Market Report[7]	2026 Market Report[8]
Number of Projects	282	292
PJ Equivalent	22	32.4
Feedstock Processed in AD (not including WWTP and Landfill)	<1,900,00 wet tonnes	< 2,100,000 wet tonnes

7 Based on 2021 operational data.
8 Based on 2024 operational data. The updated database removed smaller, pilot-scale facilities that are no longer operational. The removal of these facilities had minimal impact on the gas generation.

5.2 Industry Trends

As noted in previous Market Reports, the early adoption of biogas in Canada was focused on its use for generating electricity due to favourable electricity procurement led by several provinces. Currently, RNG markets continue to grow, and Canada has seen its biogas utilization grow most rapidly into RNG. Moving forward, Ontario is supporting new biogas-electricity opportunities to support an ever-expanding drive toward electrification. *Figure 7* below illustrates the trends of electricity and RNG project development in Canada.

Figure 7. Biogas Project Development

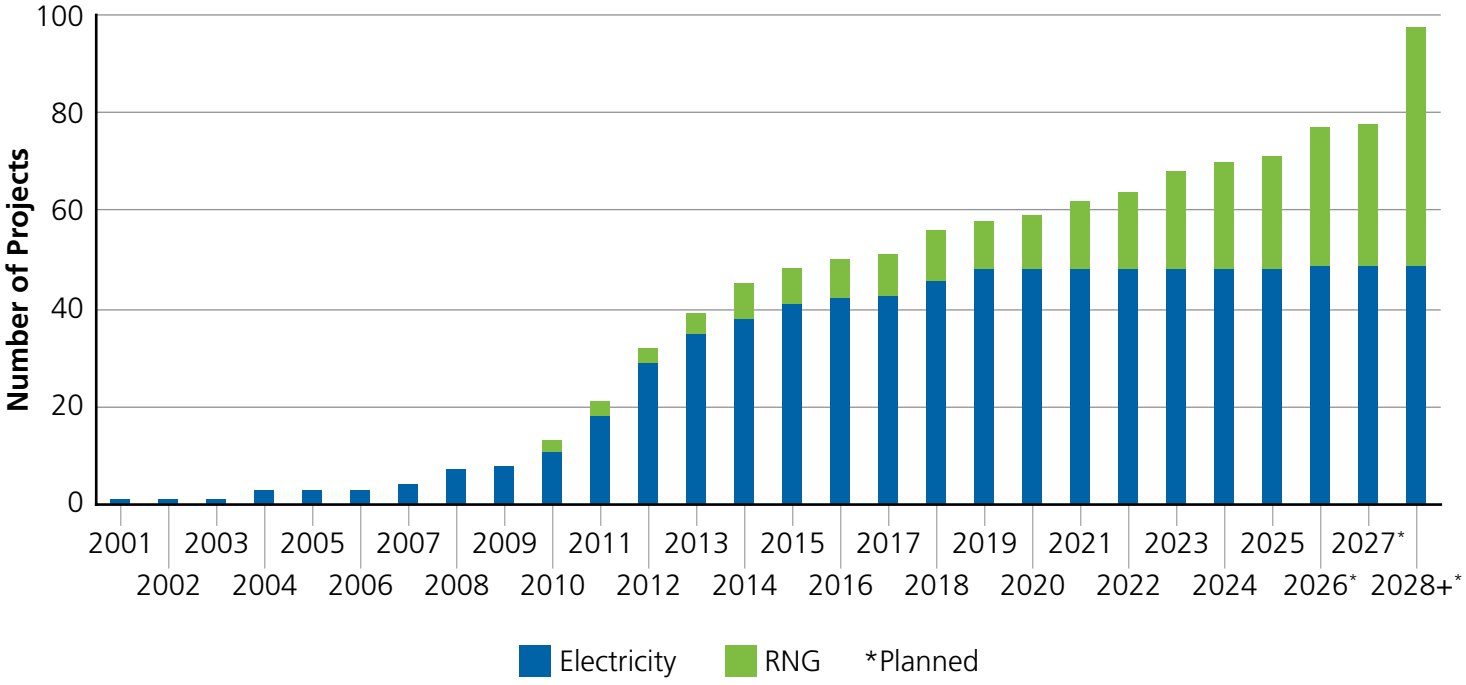


Figure 8 below provides a breakdown of RNG projects by province, and *Figure 9* shows the trend in production capacity from RNG projects from 2010 - 2028 Note that since RNG is injected directly into the natural gas network, it can be sold outside of the province where the facility is located to favourable end markets. A list of existing projects and planned projects (by 2027) is included in *Appendix B*.

Figure 8. RNG Projects Across Canada

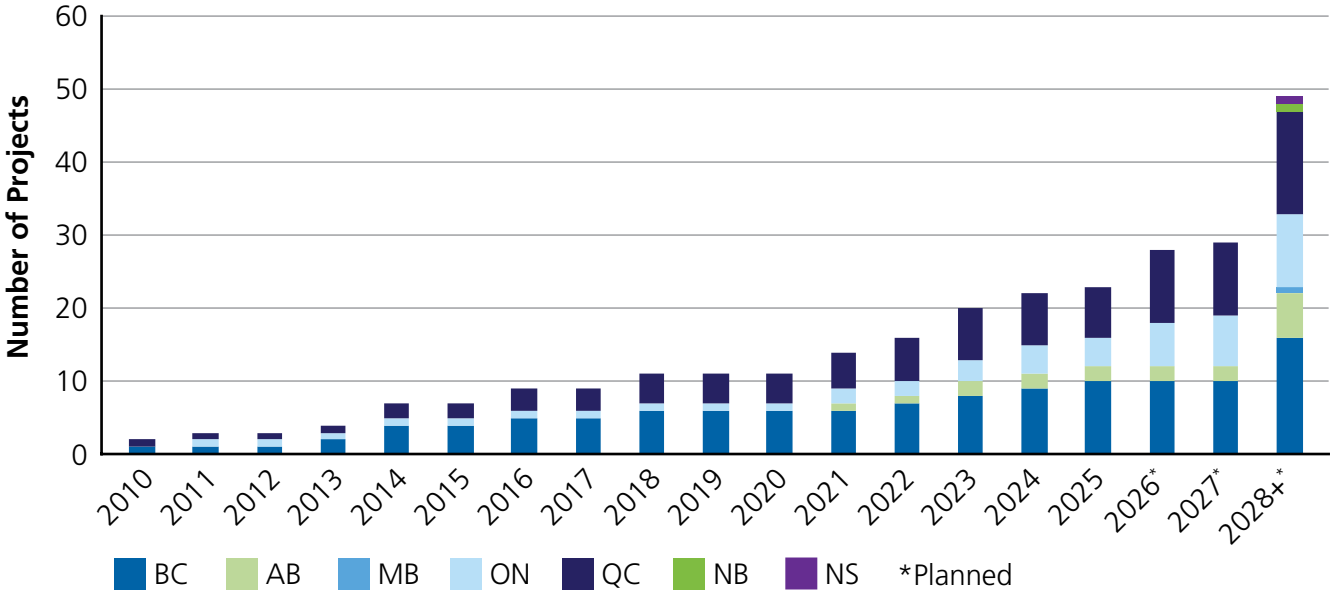
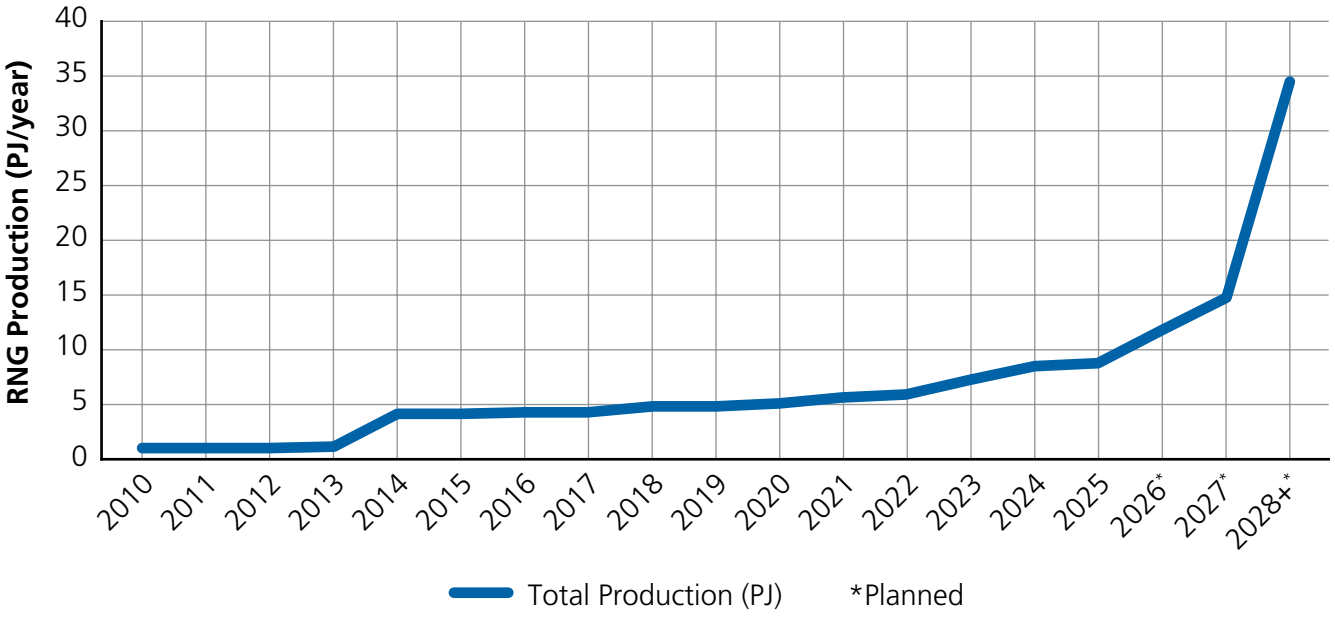


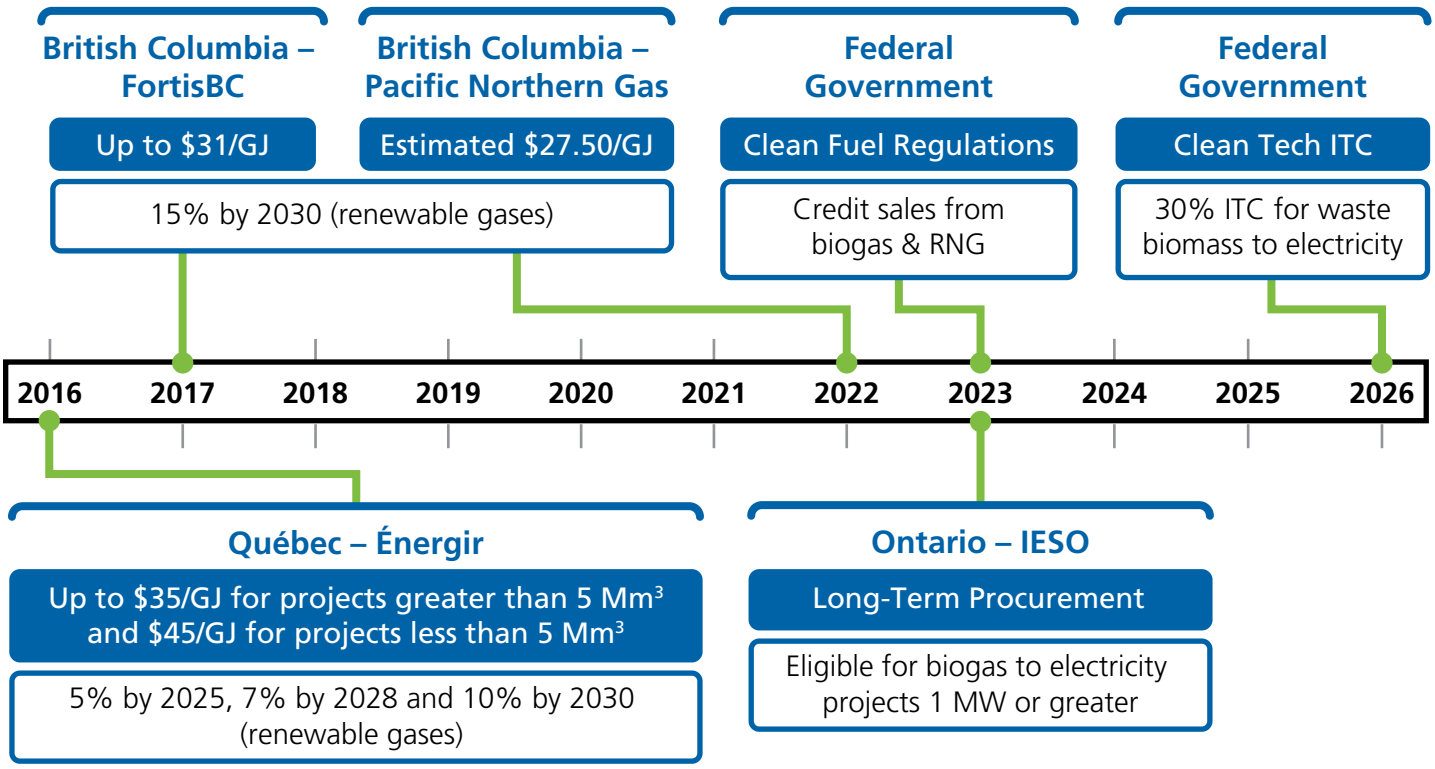
Figure 9. RNG Production in Canada (2010-2028)



British Columbia and Québec were early leaders in RNG adoption due to favourable RNG programs in those provinces that offered high premiums for RNG. As these two provincial programs expanded, projects in Ontario and Alberta developed to sell RNG to FortisBC in British Columbia and Énergir in Québec under long-term contracts.

An overview of offtake and revenue options for biogas & RNG projects is illustrated in the timeline in *Figure 10*.

Figure 10. Canadian Biogas & RNG Offtake Options



5.3 Upcoming RNG Projects

While there is a need for immediate policy and financial support for the biogas & RNG sector to achieve its full potential, there are numerous projects under development which demonstrates this technology's value to business and communities.

There are currently 26 RNG projects under development which account for an additional 25.65 PJ of RNG. A summary table is provided below indicating project type, location, and aggregated RNG production.

Table 5. RNG Facilities in Development (projects operational dates 2026 and beyond)

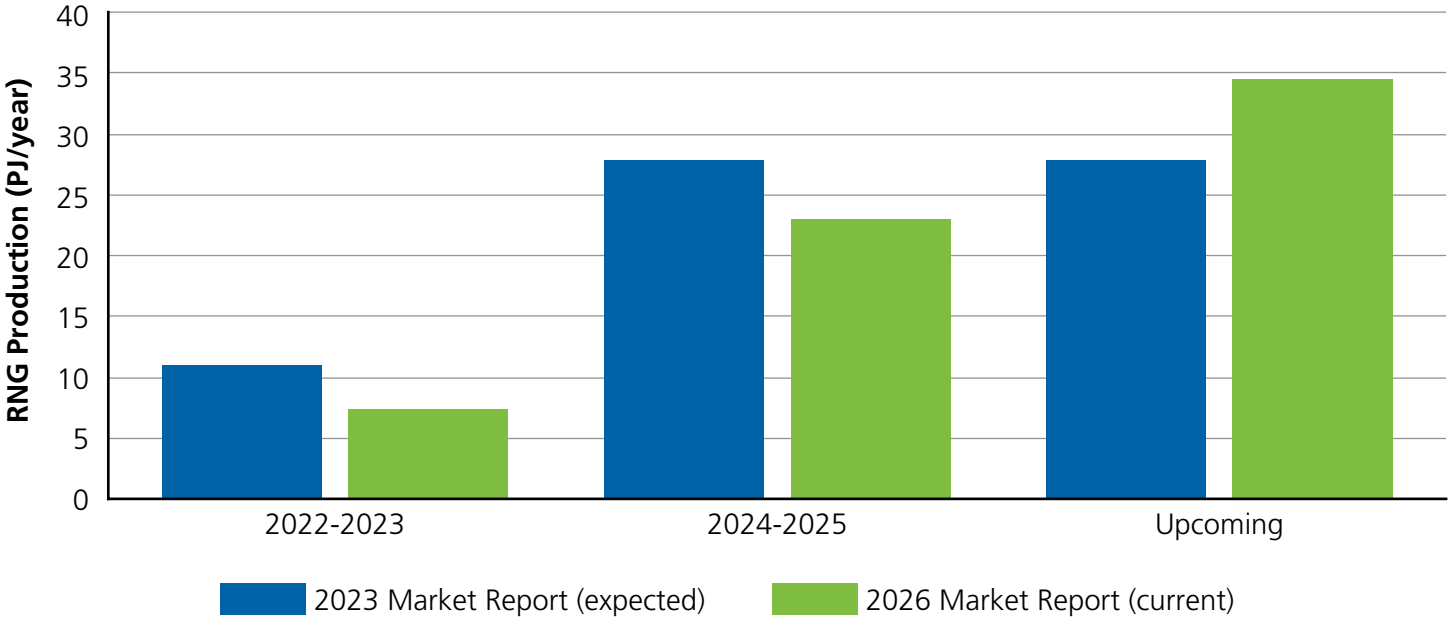
Province	AD Facilities (Agricultural and Stand-Alone)	LFG Facilities	Total Number of Projects	RNG Production (PJ/year)[9,10]
BC		6	6	4.5
AB	3	1	4	10.1
MB		1	1	0.75
ON	2	4	6	5.48
QC	3	4	7	4.52
NS	1	0	1	0.15
NB	1	0	1	0.15
Total	10	16	26	25.65

9 This table includes 13 RNG facilities under development from the ECCC landfill inventory. A production capacity of 750,000 GJ/year was assumed for landfill facilities as a conservative estimate based on an average production capacity of 925,000 GJ/year from the ten known landfill RNG facilities.

10 Where project capacities were not publicly available for AD projects, an average project size of 150,000 GJ/year was assumed to align with modeling in the Hitting Canada's Climate Targets study.

In the 2023 Market Report, it was stated that production capacity was set to increase four-fold in the next few years compared to 2021. While we have seen an increase in production since 2021, the industry has not grown as expected largely due to projects putting development on hold in response to policy uncertainty, thus limiting the full potential of the industry. *Figure 11* below compares the expected production projections from the 2023 Market Report to what we are currently seeing.

Figure 11. Expected vs. Current RNG Production Growth



Production capacity growth between 2023 and 2025 was lower than expected. The gap between projected and actual RNG production signals a development bottleneck, not a lack of opportunity, potential projects exist but development is stalled. The forward outlook however remains strong, with nearly 30 projects still in the pipeline for development. At the current rate, the four-fold increase may be achieved by 2028 and beyond compared to 2024 numbers.

6. Barriers to Biogas & RNG Development in Canada

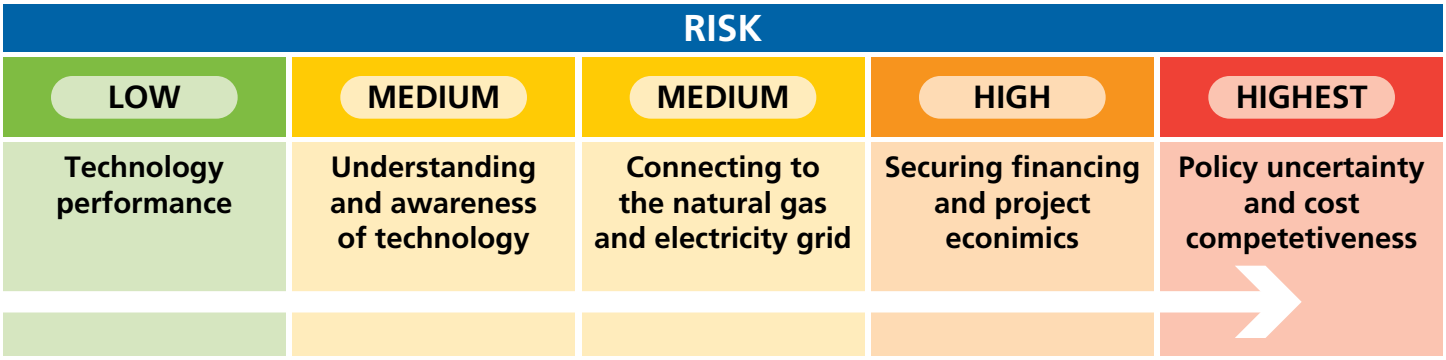
Canada's biogas & RNG sector is poised for steady growth, with new projects emerging across landfill, agricultural, and organics streams.

This growth is supported by a patchwork of policy that is fragmented and therefore limiting. The pace of development continues to be constrained by uncertainty and gaps in federal and provincial programs, underscoring the need for clearer, more consistent market signals to unlock the full biogas & RNG opportunity.

An overview of the barriers is provided below and summarized in Figure 12.

- **Cost Competitiveness:** The competitive landscape has increasingly shifted in favour of the U.S. following the implementation of the Section 45Z Clean Fuel Production Credit, further weakening the ability of Canadian biogas & RNG producers to compete with U.S. supply and continuing to draw investment dollars to the U.S. This imbalance makes it more challenging for Canadian producers to attract the funding required to develop projects.
- **Lack of consistent policy signals:** Stronger signals from the federal and provincial/territorial governments around the full environmental and economic benefits of AD, including its roles with respect to waste management, methane reduction and the circular economy are essential. The status quo, for example an electricity only ITC and 10% gaseous cap in the CFR, has resulted in biogas plants not receiving additional financial or permitting support as institutions deem these limitations as risks to project longevity. As a result, biogas & RNG projects are not being prioritized by industries and communities as a here-and-now solution for clean energy needs.
- **Securing financing and project economics:** Projects have struggled where long term power purchase agreements for RNG or electricity are not available, for example due to lack of regional programs or access to infrastructure. In some regions, electricity from biogas also competes with other low-cost renewables (i.e. hydro power, solar, wind) which makes procurement even more competitive. To secure financing and demonstrate favourable project economics, potential projects require long term contracts at a fair price.
- **Connecting to the natural gas and electricity grid:** Project proponents report a high cost of grid connection, complex or unclear interconnection processes, and long timelines to connect, all of which can hinder project development.
- **Understanding and awareness of the technology:** Some regions have especially low rates of understanding of biogas technologies, how they operate, and why they are beneficial. This means project proponents often spend significant time compiling information and responding to requests from government and the general public.

Figure 12. Barriers to Investment and Development



7. Driving Biogas & RNG Growth

The Canadian Biogas Association's analysis[11] of the industry demonstrates the impact of several potential policy measures that would unlock the Canadian biogas & RNG sector. With policy support, biogas & RNG could, by 2050:

- generate 544 PJ of clean, renewable energy;
- attract more than $2.9 billion in private investment;
- reduce 40.2 MT of CO_2e emissions;
- create and support 35,900 jobs;
- deliver more than half of Canada's methane pledge.

The Canadian Biogas Association is working with the federal government to unlock near-term investment and ensure Canadian projects can compete globally. Two priority measures would significantly accelerate development:

1) Investment Tax Credit for Renewable Natural Gas (RNG)

Introduce an investment tax credit for biogas & RNG infrastructure that would help close the competitiveness gap with the U.S. and enable ready-to-build projects to move forward. With the right policy support, the sector is positioned to mobilize substantial private capital and rapidly expand domestic RNG production.

2) Strengthening the Clean Fuel Regulations (CFR)

Targeted updates to the Clean Fuel Regulations, such as increasing the 10% gaseous cap and streamlining CI approvals, can ensure Canadian producers are able to fully participate in and benefit from the credit market. Enhancing support for domestic gaseous fuels and improving market certainty will help level the playing field and drive continued growth in Canada's low-carbon fuel industry.

Canadian Biogas Association members have access to detailed policy submissions and analysis provided to the federal government, offering further insight into these recommendations and their expected impact on the sector.

11 Hitting Canada's Climate Targets with Biogas & RNG, CBA, 2022.

Appendix A – Operational Biogas Facilities in Canada

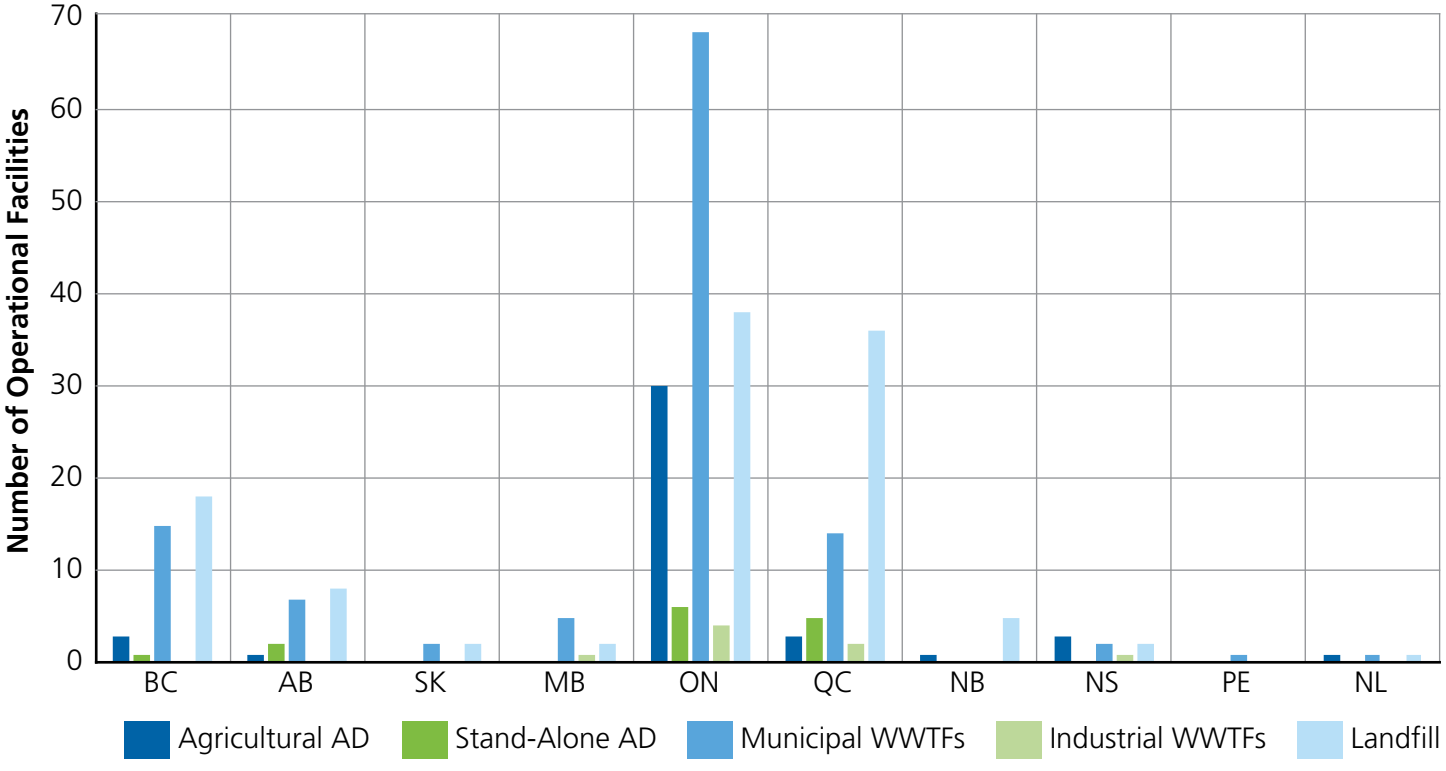
The table below provides a breakdown of project type by province.

Number of Operational Biogas Facilities in Canada by Type

Province	Agricultural AD	Stand-Alone AD	Municipal WWTFs	Industrial WWTFs	Landfill	Total Facilities by Province
BC	3	1	15	0	18	37
AB	1	2	7	0	8	18
SK	0	0	2	0	2	4
MB	0	0	5	1	2	8
ON	31	6	68	4	38	147
QC	3	5	14	2	36	60
NB	1	0	0	0	5	6
NS	3	0	2	1	2	8
PE	0	0	1	0	0	1
NL	1	0	1	0	1	3
Total	43	14	115	8	112	292

The figure below provides a breakdown of the type of projects and locations across the country.

Number of Operational Facilities in Canada by Province and Type



Appendix B – List of RNG Facilities

The following table is a list of existing RNG facilities and planned facilities to 2027. Note this list only includes dedicated RNG facilities and does not include facilities that generate electricity or use biogas on-site.
The project type "Digester" includes Stand-Alone AD and Agricultural AD facilities.

Project name	Province	Project Type	Start Date	Annual RNG Production Estimate (GJ)
Fraser Valley	BC	Digester	2010	90,000
EBI - Rive Nord	QC	Landfill	2010	960,000
Woodward Avenue WWTP	ON	WWTP	2011	72,000
Salmon Arm	BC	Landfill	2013	16,000
Seabreeze Farm	BC	Digester	2014	45,000
Glenmore	BC	Landfill	2014	65,000
Complexe Enviro Connexions	QC	Landfill	2014	2,940,000
Glenmore Landfill	BC	Landfill	2016	38,000
SEMER	QC	Landfill and Digester	2016	112,000
Surrey Biofuel Facility	BC	Digester	2018	100,000
St-Hyacinthe	QC	Digester	2018	485,000
Storm Fisher	ON	Digester	2020	225,000
Lethbridge Biogas	AB	Digester	2021	350,000
Stanton Farms	ON	Digester	2021	110,000
Co-op Agri Energie Warwick	QC	Digester	2021	83,500
Lulu Island	BC	WWTP	2022	60,000
Centre de Traitement de la Biomasse de la Monteregie	QC	Digester	2022	200,000
GrowTec	AB	Digester	2023	140,000
Dicklands Farms	BC	Digester	2023	110,000
Niagara RNG	ON	Landfill	2023	1,000,000
Centre de biométhanisation de l'agglomération de Québec (CBMO, or CBAQ)	QC	WWTP	2023	150,000
Delta Landfill	BC	Landfill	2024	1,000,000
Walker Dairy Farm	ON	Digester	2024	120,000
Hartland Landfill	BC	Landfill	2025	360,000
Southgate Renewables anaerobic digester project	ON	Digester	2026 expected	200,000
Hébertville-Station engineered landfill site (ELS)	QC	Landfill	2026 expected	190,000
Convertus Mauricie (Enercycle) facility	QC	Digester	2026 expected	70,000
Twin Creeks RNG facility	ON	Landfill	2026 expected	210,000
Saint-Sophie Landfil and Biomethanization Plant	QC	Landfill	2026 expected	2,500,000
Convertus York Biofuel facility	ON	Digester	2027 expected	3,000,000