

Second-Party Opinion

Ontario Sustainable Bond Framework

Evaluation Summary

Sustainalytics is of the opinion that the Ontario Sustainable Bond Framework is credible and impactful and aligns with the Sustainability Bond Guidelines 2021, Green Bond Principles 2021 and Social Bond Principles 2023. This assessment is based on the following:



USE OF PROCEEDS The eligible categories for the use of proceeds¹ are aligned with those recognized by both the Green Bond Principles and Social Bond Principles. Sustainalytics considers that investments in the eligible categories will lead to positive environmental or social impacts and advance the UN Sustainable Development Goals, specifically SDGs 3, 4, 6, 7, 8, 9, 11,12,13, 14 and 15.



PROJECT EVALUATION AND SELECTION The Ontario Financing Authority (OFA) in collaboration with the Province’s Sustainable Bond Advisory Panel (SBAP) will oversee project evaluation and selection. The SBAP identifies and evaluates environmental and social risks for all allocation decisions made under the Framework. Sustainalytics considers these risk management systems to be adequate and the project selection process to be aligned with market practice.



MANAGEMENT OF PROCEEDS The OFA will be responsible for the allocation of proceeds to eligible assets and will track the proceeds through an internal tracking system. The Province intends to allocate proceeds within 12 months of issuance. Pending full allocation, proceeds will be temporarily invested in short-term Government of Canada treasury bills. This is aligned with market practice.



REPORTING The Province commits to report on the allocation of proceeds on an annual basis until full allocation publicly on its website. Allocation reporting will include breakdown of proceeds according to project category and, the balance of unallocated proceeds. In addition, the Province is committed to reporting on relevant impact metrics. Sustainalytics considers the allocation and impact reporting commitments as aligned with market practice.

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¹ The use of proceeds categories are: Clean Transportation; Green Buildings; Energy Efficiency; Clean Energy; Environmentally Sustainable Management of Living Natural Resources and Land Use; Climate Change Adaptation; Sustainable Water and Wastewater Management; Pollution Prevention and Control; Terrestrial and Aquatic Biodiversity; Circular Economy, Adapted Products, Production Technologies and Processes; Affordable Basic Infrastructure; Access to Essential Healthcare Services; Access to Essential Education and Childcare Services; Affordable Housing; and Employment Generation.

Introduction

Ontario is Canada's second-largest province, spanning an area of more than 1 million square kilometres. As of 2023, Ontario had a population of 13.5 million and accounted for 37% of Canada's GDP.²

The Government of Ontario (the "Province") has developed the Ontario Sustainable Bond Framework dated January 2024 (the "Framework") under which it intends to issue sustainability bonds and use the proceeds to finance or refinance, in whole or in part, existing or future provincial expenditures in the form of transfer payments (such as grants, contribution, loans, subsidies, fiscal measures (such as tax credits and tax expenditures) as well as capital and operational expenditures for the provincial government purposes or extended to departments, agencies and select Crown corporations. Eligible projects are expected to facilitate the transition to a low-carbon economy and contribute to the social and environmental goals set out by the Province.

The Framework defines eligible green projects under the following categories:

1. Clean Transportation
2. Green Buildings
3. Energy Efficiency
4. Clean Energy
5. Living Natural Resources and Land Use
6. Climate Change Adaptation
7. Sustainable Water and Wastewater Management
8. Pollution Prevention and Control
9. Terrestrial and Aquatic Biodiversity
10. Circular Economy Adapted Products, Production Technologies and Processes

The Framework defines eligible social projects under the following categories:

11. Affordable Basic Infrastructure
12. Access to Essential Healthcare Services
13. Access to Essential Education Services
14. Affordable Housing
15. Employment Generation

The Province engaged Sustainalytics to review the Ontario Sustainable Bond Framework and provide a second-party opinion on the Framework's environmental and social credentials and its alignment with the Sustainability Bond Guidelines 2021 (SBG), Green Bond Principles 2021 (GBP) and Social Bond Principles 2023 (SBP).³ The Framework has been published in a separate document.⁴

Scope of work and limitations of Sustainalytics' Second-Party Opinion

Sustainalytics' Second-Party Opinion reflects Sustainalytics' independent⁵ opinion on the alignment of the reviewed Framework with the current market standards and the extent to which the eligible project categories are credible and impactful.

As part of the Second-Party Opinion, Sustainalytics assessed the following:

- The Framework's alignment with the Sustainability Bond Guidelines 2021, Green Bond Principles 2021, and Social Bond Principles 2023, as administered by ICMA;
- The credibility and anticipated positive impacts of the use of proceeds; and
- The alignment of the issuer's sustainability strategy and performance and sustainability risk management in relation to the use of proceeds.

For the use of proceeds assessment, Sustainalytics relied on its internal taxonomy, version 1.15 which is informed by market practice and Sustainalytics' expertise as an ESG research provider.

² Government of Ontario, "About Ontario", at: <https://www.ontario.ca/page/about-ontario>

³ The Sustainability Bond Guidelines, Green Bond Principles and Social Bond Principles are administered by the International Capital Market Association and are available at <https://www.icmagroup.org/green-social-and-sustainability-bonds/sustainability-bond-guidelines-sbg/>

⁴ The Ontario Sustainable Bond Framework will be available on Province of Ontario's website at: <https://www.ofina.on.ca/greenbonds/greenbonds.htm>

⁵ When operating multiple lines of business that serve a variety of client types, objective research is a cornerstone of Sustainalytics and ensuring analyst independence is paramount to producing objective, actionable research. Sustainalytics has therefore put in place a robust conflict management framework that specifically addresses the need for analyst independence, consistency of process, structural separation of commercial and research (and engagement) teams, data protection and systems separation. Last but not the least, analyst compensation is not directly tied to specific commercial outcomes. One of Sustainalytics' hallmarks is integrity, another is transparency.

As part of this engagement, Sustainalytics held conversations with various representatives of the Province to understand the sustainability impact of their processes and planned use of proceeds, as well as the management of proceeds and reporting aspects of the Framework. The Province's representatives have confirmed (1) they understand it is the sole responsibility of Ontario to ensure that the information provided is complete, accurate and up to date; (2) that they have provided Sustainalytics with all relevant information and (3) that any provided material information has been duly disclosed in a timely manner. Sustainalytics also reviewed relevant public documents and non-public information.

This document contains Sustainalytics' opinion of the Framework and should be read in conjunction with that Framework.

Any update of the present Second-Party Opinion will be conducted according to the agreed engagement conditions between Sustainalytics and the Government of Ontario.

Sustainalytics' Second-Party Opinion, while reflecting on the alignment of the Framework with market standards, is no guarantee of alignment nor warrants any alignment with future versions of relevant market standards. Furthermore, Sustainalytics' Second-Party Opinion addresses the anticipated impacts of eligible projects expected to be financed with bond proceeds but does not measure the actual impact. The measurement and reporting of the impact achieved through projects financed under the Framework is the responsibility of the Framework owner.

In addition, the Second-Party Opinion opines on the potential allocation of proceeds but does not guarantee the realised allocation of the bond proceeds towards eligible activities.

No information provided by Sustainalytics under the present Second-Party Opinion shall be considered as being a statement, representation, warrant or argument, either in favour or against, the truthfulness, reliability or completeness of any facts or statements and related surrounding circumstances that the Province has made available to Sustainalytics for the purpose of this Second-Party Opinion.

Sustainalytics' Opinion

Section 1: Sustainalytics' Opinion on the Ontario Sustainable Bond Framework

Sustainalytics is of the opinion that the Ontario Sustainable Bond Framework is credible, impactful and aligns with the four core components of the GBP and SBP. Sustainalytics highlights the following elements of the Framework:

- Use of Proceeds:
 - The eligible categories for the use of proceeds are aligned with those recognized by the GBP and SBP. The use of proceeds categories are: Clean Transportation; Green Buildings; Energy Efficiency; Renewable Energy; Environmentally Sustainable Management of Living Natural Resources and Land Use; Climate Change Adaptation; Sustainable Water and Wastewater Management; Pollution Prevention and Control; Terrestrial and Aquatic Biodiversity; Circular Economy, Adapted Products, Production Technologies and Processes; Affordable Basic Infrastructure; Access to Essential Healthcare Services; Access to Essential Education and Childcare Services; Affordable Housing; and Employment Generation.
 - The Framework defines a look-back period of six months for refinancing eligible projects. This is in line with market practice.
 - Under the Clean Transportation category, the Province's Framework includes the financing or refinancing of projects related to: i) low- and zero-emission vehicles; ii) clean transportation infrastructure; iii) public transportation vehicles; iv) active transportation; v) smart mobility systems.
 - The Province has communicated to Sustainalytics that development and deployment of low- and zero-emission passenger vehicles will include battery electric vehicles, hydrogen fuel cell vehicles and plug-in hybrid vehicles with an emissions threshold below 50 gCO₂/km.
 - Construction, extension, and maintenance of clean transportation infrastructure including:

- Stations to charge electric vehicles and hydrogen fuel cell vehicles. The Province has confirmed to Sustainalytics that standalone parking facilities will be excluded from the Framework.
- Dedicated bus lanes and light-rail transit corridors that are solely used by eligible low- and zero-emission public transportation vehicles with an emissions threshold below 50 gCO₂e/pkm.
- Electrified rail and passenger trains will have emissions threshold below 50 gCO₂e/pkm. The Province has confirmed to Sustainalytics that freight transportation will be excluded from the Framework.
- The Province has confirmed to Sustainalytics that it would consider as a standard the test procedure suggested by automakers. Sustainalytics considers best practice to use the World Harmonized Light-duty Vehicle Test Procedure (WLTP), as it replicates realistic driving conditions and yields more accurate emissions results.⁶
- Development and deployment of active transportation projects including:
 - Bicycle lanes, parking and sharing schemes.
 - Electric micro mobility units, such as e-scooters.
- Development and deployment of smart mobility ICT systems intended to improve clean transportation services. The Province has communicated to Sustainalytics that these may include ride sharing for bikes, e-scooters and passenger cars; and first-mile and last-mile public transportation solutions, such as micro-transit services.
- Sustainalytics views expenditure under this category to be aligned with market practice.
- Under the Green Buildings category, the Province's Framework includes the financing or refinancing of public buildings and transit infrastructure buildings that achieve one of the following certifications at minimum: LEED Gold⁷ or Envision Gold.⁸
 - Sustainalytics views these certifications to be credible and the levels selected as aligned with market practice.
- Under the Energy Efficiency category, the Province contemplates investments aimed at promoting energy efficiency in buildings and fuel switching, including the following:
 - Development, construction, operation, acquisition and maintenance of products, systems and processes that increase energy efficiency and reduce GHG emissions by a minimum of 30% over the baseline before retrofit or current standards.⁹
 - Building energy retrofit projects including:
 - Electricity-powered energy-efficient heating, ventilation, air-conditioning, refrigeration, lighting and electrical equipment in line with Ontario's efficiency standard.¹⁰
 - Projects that optimize building energy consumption and efficiency, such as demand management technologies, building energy control optimization systems, smart thermostats and controllers, and electric thermal storage systems.
 - The Province has communicated to Sustainalytics that its Framework includes the financing, purchase and replacement of energy-efficient equipment and consumer appliances as part of building renovation costs. Sustainalytics notes that the purchase of such appliances will contribute to the targeted reduction in energy use.
 - Programmes and incentives to support fuel switching to low- and zero-carbon alternatives in residential, commercial and public buildings, such as the Home Efficiency Rebate Plus programme.¹¹ Sustainalytics notes that such programmes may include the installation of heat pumps in residential and commercial buildings. The Province has communicated to Sustainalytics that this will include electric and ground

⁶ NEDC test procedure, while still used worldwide, uses theoretical driving data, which can lead to material differences in terms of vehicles' CO₂ emissions compared to WLTP.

⁷ LEED: <https://www.usgbc.org/leed>

⁸ ENVISION: <https://sustainableinfrastructure.org/envision/overview-of-envision/>

⁹ Ontario's current standard follows the requirements of Ontario Regulation 509/18. Government of Ontario, "O. Reg. 509/18: Energy and Water Efficiency - Appliances and Products", (2023), at: <https://www.ontario.ca/laws/regulation/180509>

¹⁰ Ibid.

¹¹ Enbridge, "Home Efficiency Rebate Plus", at: <https://www.enbridgegas.com/residential/rebates-energy-conservation/home-efficiency-rebate-plus>

source heat pumps, and that the latter will be powered by geothermal-heated water and not by fossil fuels. Sustainalytics notes that heat pumps offer an energy-efficient heat transfer alternative to conventional systems. Nevertheless, Sustainalytics recommends the Province to exclude financing of heat pumps with high-GWP refrigerants, and to promote robust refrigerant leak control, detection and monitoring, while ensuring recovery, reclamation, recycling or destruction of refrigerants at end of life.

- The Province has confirmed to Sustainalytics that equipment and technologies designed or intended for processes that are primarily driven or powered by fossil fuels will be excluded from the Framework.
- Sustainalytics considers expenditures under this category to be aligned with market practice.
- Under the Clean Energy category, the Province's Framework includes the financing or refinancing of the production, transmission and distribution of clean energy, including the following:
 - Onshore and offshore wind energy projects; solar photovoltaic projects; and geothermal projects with direct emissions below 100 gCO₂/kWh. Sustainalytics considers these expenditures under this category to be aligned with market practice.
 - The Province has communicated to Sustainalytics that financed hydropower projects will meet one of the following specified thresholds: i) run-of-river plants without an artificial reservoir; or ii) facilities with power density higher than 5 W/m² if operational prior to 2020. Facilities becoming operational after 2020 will have a power density higher than 10 W/m². Sustainalytics notes that all new hydropower projects will be subject to an environmental and social impact assessment to ensure that no significant risks, negative impact or significant controversies related to the projects are identified. Additionally, the Province has communicated to Sustainalytics its commitment to ensuring that the hydropower projects financed under the Framework meet the Climate Bonds Standard.¹²
 - For refurbishments that increase the capacity of existing facilities, the Province will require that these meet the above-mentioned emissions thresholds and that new assessments of social and environmental risks be carried out prior to being considered eligible.
 - Hydrogen production projects. The Province has communicated to Sustainalytics that hydrogen will be produced through electrolysis powered by grid electricity with lifecycle emissions lower than 100 gCO₂/kWh. Sustainalytics notes that hydrogen production from water electrolysis has significant potential to reduce emissions over its conventional pathway of production, i.e., steam reforming of natural gas or light ends. Sustainalytics encourages the Province to favour the sourcing of low-carbon intensity power for electrolysis.
 - In the area of nuclear energy, the Province has communicated to Sustainalytics that it intends to finance: i) the deployment of new facilities for nuclear heat or electricity generation; ii) the refurbishment, upgrade, operation or maintenance of existing nuclear energy generation facilities, including the expenditures associated with the procurement of nuclear fuel, the production and recycling of heavy water, and the R&D expenditures for nuclear fuel reprocessing; and iii) R&D of advanced technologies for nuclear power generation and management or storage of radioactive waste.
 - Sustainalytics recognizes the benefits of nuclear energy as a low-carbon source of electricity and its potential role in the decarbonization of electricity production. Sustainalytics also recognizes that there are substantial risks associated with nuclear energy, including, most notably, the management and long-term disposal of radioactive waste. The management of such risks requires: i) effective governance of nuclear energy generation, including a formal governing body and regulations that address, among other areas, site selection, operational safety, radioactive waste management and decommissioning, as well as effective monitoring and enforcement of such

¹² Climate Bonds Initiative, "Climate Bonds Standard v4.0", at: <https://www.climatebonds.net/climate-bonds-standard-v4>

- regulations; and ii) evidence of the pursuit of viable options for the secure, long-term storage of high-level radioactive waste. All nuclear energy-related expenditures financed under the Framework will be made in Canada which, in Sustainalytics' opinion, has adequate governance and regulations to address these risks. (For additional discussion of relevant risks and the management of them, see Section 2).
- With regard to R&D expenditures related to nuclear energy, the Province has communicated to Sustainalytics that it may also finance the deployment of new facilities for nuclear such as Small Modular Reactors (SMR) under the Government of Canada's Enabling SMR Programme, which entails R&D initiatives related to the development and deployment of SMRs in Canada. The Province has communicated to Sustainalytics that it would also allocate proceeds only to those R&D projects in Ontario under the programme that align with the criteria defined above for nuclear energy. Sustainalytics notes that the achievement of intended outcomes of certain R&D projects, such as nuclear fusion projects, remains uncertain. Sustainalytics nonetheless recognizes their potential to further the development of nuclear energy as a low-carbon source of energy and to lessen some of the risks associated with it.
 - Under the Living Natural Resources and Land Use category, the Framework contemplates projects that support reforestation and afforestation; conservation or restoration of natural areas; climate smart farming and agriculture; sustainable forestry management; and projects to reduce the negative environmental impacts of fisheries and aquaculture.
 - Forestry projects will include expenditures towards reforestation, afforestation and conservation projects that have sustainable management plans following the Crown Forest Sustainability Act¹³ and the Ontario Tree Seed Transfer Policy.¹⁴
 - The Province has confirmed to Sustainalytics that reforestation projects will use tree species that are well adapted to site conditions. Furthermore, all projects are required to comply with provincial, and federal laws that have authority over the management of most forested land in their respective jurisdictions.
 - For sustainable forestry management projects, the Province has communicated to Sustainalytics that investments will be limited to projects certified with Forest Stewardship Council¹⁵ or Programme for the Endorsement of Forest Certification.¹⁶
 - Sustainalytics notes that the Province may finance forestry projects and research and development activities on utilizing forest resources for carbon sequestration intents. This is aligned with market practice.
 - Investments related to restoration and climate-smart farming and agriculture include activities, such as improving nitrogen management and cover cropping practices that store carbon in agricultural land, as well as adopting management practices towards soil management. Financed projects may support the restoration of wetlands, peatlands and grasslands through land management activities.
 - The Province has confirmed to Sustainalytics that the projects will have a sustainable management plan in place following the Crown Forest Sustainability Act.¹⁷
 - Sustainalytics recognizes that projects supporting restoration of wetlands, peatlands and grasslands may be financed on farms that include industrial-scale livestock activities. However, such projects will not include the financing of such activities.
 - For investments related to aquaculture and fisheries, the Province has communicated to Sustainalytics that financed projects will focus on conservation as opposed to

¹³ Government of Ontario, "Crown Forest Sustainability Act", (1994), at: <https://leap.unep.org/sites/default/files/legislation/on67258.pdf>

¹⁴ Government of Ontario, "Ontario Tree Seed Transfer Policy", at: <https://www.ontario.ca/page/ontario-tree-seed-transfer-policy>

¹⁵ Forest Stewardship Council, at: <https://connect.fsc.org/>

¹⁶ Programme for the Endorsement of Forest Certification, at: <https://www.pefc.org/>

¹⁷ Government of Ontario, "Crown Forest Sustainability Act", (1994), at: <https://www.ontario.ca/laws/statute/94c25>

resource exploitation. This may include research and development of technology solutions that minimize the environmental impact of harvesting, as well as other areas that improve management practices. Sustainalytics notes that financing should not be for the mitigation of negative impacts that have been created through the fisheries' own operations.

- Sustainalytics notes that commercial fisheries in Ontario are not required to achieve a sustainable fisheries certification, but the Province encourages them to do so. Sustainalytics recognizes the various programmes, plans and initiatives of the Province, such as its strategic policy for commercial fisheries.¹⁸ Additionally, Sustainalytics considers that sustainable fisheries certifications provide credible assurance mechanisms that encompass respect for marine ecosystems, including adaptations to the reproductive rate of fish and considering the survival of all species. Sustainalytics encourages the Province to report on any specific schemes and certifications it intends to use.
- Under the Climate Change Adaptation category, the Province's Framework includes the financing or refinancing of the construction of infrastructure projects that mitigate climate change and weather-related events, such as floods, drought, wildfires and extreme weather events. The Province has confirmed to Sustainalytics that it intends to finance projects supported by a climate change vulnerability assessment and adaptation plans to identify and responsibly manage the identified risks following Ontario's Environmental Assessment Act.¹⁹ Sustainalytics considers the financing of such projects as credible green expenditures that have the potential to advance climate change adaptation and resilience in Ontario.
- Under the Sustainable Water and Wastewater Management category, the Province's Framework includes the financing or refinancing of the development of infrastructure projects supporting the treatment and management of water or wastewater including:
 - Clean- and drinking-water treatment facilities.
 - Wastewater treatment and urban drainage systems. The Province has confirmed to Sustainalytics the exclusion of treatment of wastewater from fossil fuel operations and hard-to-abate industries.
 - Sustainalytics views expenditures under this category to be aligned with market practice.
- Under the Pollution Prevention and Control category, the Province's Framework includes the financing or refinancing of activities related to air pollution reduction, GHG control, soil remediation and waste-to-energy projects.
 - Expenditure related to air pollution reduction and GHG control may include projects to reduce emissions in the steel and automobile industry, such as replacing coal-fed coke ovens and blast furnaces with hydrogen-ready direct reduced iron (DRI) fed electric arc furnace (EAF). Sustainalytics notes that the Province has a regulatory framework for air pollution which is aligned with the Canadian Environmental Protection Act.²⁰ Additionally, the Province has communicated to Sustainalytics its commitment to investing under this category as per the regulatory framework and the Climate Bond Standard.²¹ Sustainalytics views it to be ideal for average emissions intensity over the lifetime of the facility at or below 0.8971 tCO₂e/tonnes of steel and notes that in the case of DRI fed EAF the range of emissions intensity (scope 1 and 2) may vary from 0.7 to 1.1 tCO₂e/tonne of steel, depending on the source of the electricity. Hence, Sustainalytics encourages the Province to transition to low carbon energy sources.
 - The Province has confirmed that soil remediation projects intended to reduce soil pollution or degradation will not be related to contamination or negative environmental externalities from its own activities.

¹⁸ Government of Ontario, "Strategic policy for commercial fisheries", at: <https://www.ontario.ca/page/strategic-policy-commercial-fisheries-2011>

¹⁹ Government of Ontario, Ministry of the Environment, Conservation and Parks, at: "Considering climate change in the environmental assessment process", at: <https://www.ontario.ca/page/considering-climate-change-environmental-assessment-process>

²⁰ Government of Canada, "Canadian Environmental Protection Act, 1999 and Bills and related documents", at: <https://www.canada.ca/en/environment-climate-change/services/canadian-environmental-protection-act-registry/related-documents.html>

²¹ Climate Bonds Initiative, "Climate Bonds Standard v4.0", at: <https://www.climatebonds.net/climate-bonds-standard-v4>

- Additionally, the Province's Framework includes investment in energy efficient waste-to-energy projects. Sustainalytics notes that due to constraints on recycling capacity in many parts of the world, energy from waste can offer a better residual waste management option than landfills in many cases. Sustainalytics also recognizes that energy from waste could take out of circulation potential of recyclable materials and undermine two of the main objectives of a zero-waste circular economy, namely waste prevention and recycling. The Province has communicated to Sustainalytics its intent to follow the Climate Bond Standard's criteria on energy from waste, which does not always ensure the removal of recyclables before incineration. However, Ontario had already achieved a recycling rate of municipal waste of 53.3% in 2021, and the financing of waste-to-energy plants could potentially hinder further improvement in the recycling rate. Additionally, for such projects to have low emissions intensities, the composition of residual waste is a crucial consideration, particularly fossil carbon content, with typical emissions intensities for waste-to-energy plants being potentially very high.²² However, the Ontario grid has a considerably low carbon intensity of 25 gCO₂e/kWh, and financing a waste-to-energy facility is expected to add carbon-intensive electricity and heat generation. Sustainalytics notes that financing waste-to-energy projects can be considered as a negative step because it may potentially increase the carbon intensity of the Ontario grid, even though such financing may meet the relevant Climate Bonds Standard criteria.²³ Sustainalytics recommends the Province to promote the removal of increasing amounts of recyclables, especially plastics and metals, and the monitoring of the thermal efficiency of the financed facilities.
- Under the Terrestrial & Aquatic Biodiversity category, the Province's Framework includes the financing or refinancing of projects towards the conservation and protection of watershed environments and the Great Lakes in line with Ontario's Biodiversity Strategy,²⁴ including:
 - Development and deployment of measures to support the protection and restoration of biodiversity, wetland and aquatic ecological systems, including safeguarding and recuperating species in danger. The Province has communicated to Sustainalytics the projects will have recovery strategies and a sustainable management plan in place following Ontario's Endangered Species Act.²⁵
 - Sustainalytics recognizes the importance of such ecosystems and biodiversity contained within and views such expenditures as aligned with market expectations.
- Under the Circular Economy, Adapted Products, Production Technologies and Processes category, the Framework considers expenditures related to waste prevention, extending the life span of products, and ensuring proper end-of-life recycling and reuse.
 - Waste management activities financed may include prevention, reduction, and recycling. Sustainalytics views the financing of waste prevention and recycling programs to be aligned with market expectations.
 - The Province has communicated to Sustainalytics that circularity projects include reuse, repair, refurbishment, upcycling, remanufacturing and repurposing. The adaptive reuse of materials and components may result in extended lifespans and therefore deliver environmental benefits by avoiding the need to manufacture new items.
 - Sustainalytics views expenditures under this category to be aligned with market practice.
- Under the Affordable Basic Infrastructure category, the Province's Framework includes the financing or refinancing of projects that improve access in disadvantaged, unserved, or remote underserved areas in Ontario to: i) clean drinking water; ii) sewers and sanitation; iii) public transportation infrastructure;²⁶ iv) energy grids; and v) broadband and cellular services

²² Incineration plants of municipal waste in Europe have, for instance, a carbon intensity between 500 and 600 gCO₂e/kWh. Climate Bonds Initiative, "Waste Management Criteria, Background Paper", (2022) at: https://www.climatebonds.net/files/files/Waste%20Management%20Background%20Paper_August2022.pdf

²³ The Climate Bonds Standard criteria prescribes thresholds on the carbon intensity of energy-from-waste facilities, but they can potentially be met without removing certain types of waste, such as plastics.

²⁴ Ontario Biodiversity Council, "Ontario's Biodiversity Strategy", at: <https://ontariobiodiversitycouncil.ca/ontarios-strategy/>

²⁵ Government of Ontario, "Endangered Species Act", at: <https://www.ontario.ca/laws/statute/07e06>

²⁶ Government of Ontario, "Ontario builds – our infrastructure plan", at: <https://www.ontario.ca/page/building-ontario>

- Sustainalytics notes that public transportation infrastructure expenditures may include transit projects, as well as roads and bridges in areas which lack connectivity or with clearly inadequate connectivity. Moreover, the Province has communicated to Sustainalytics that the expenditure under this category may also include projects to provide safer transportation infrastructure for remote and indigenous communities such as temporary winter roads, replacing ice bridges with pre-engineered portable bridges and culverts.
 - The Province has communicated to Sustainalytics that it may invest to expand internet access for unserved and underserved communities to provide internet speed that is at least 50 megabits per second (Mbps) download and 10 Mbps upload.
 - Sustainalytics notes that the Province will more specifically define the exact target population during the issuance stage.
 - Sustainalytics views expenditure under this category to be socially impactful.
- Under the Access to Essential Healthcare Services category, the Province's Framework includes the financing or refinancing of the construction, operation, renovation and maintenance of facilities, services, systems and equipment linked to public, subsidized or non-profit physical and mental healthcare. The Province confirmed that such healthcare facilities and services are accessible to all regardless of the ability to pay, including vulnerable populations such as elderly and those in underserved areas.
 - Sustainalytics considers that investments under this category are expected to enhance access to healthcare for the aforementioned target populations.
- Under the Access to Essential Education Services category, the Province's Framework includes the financing or refinancing of the construction, operation, renovation and maintenance of facilities, services, systems and equipment linked to public and subsidized educational and childcare services. The Province confirmed that such facilities and services are affordable and accessible to all regardless of the ability to pay, including underprivileged or disadvantaged populations.²⁷
 - Further, the Province's Framework includes the financing of programs and initiatives to integrate disadvantaged population in the education system, including special education for students with behavioural, communicational, intellectual, or physical exceptionalities, minority language education, student assistance programmes for under-represented learners and scholarships.
 - Sustainalytics notes that the Province will more specifically define the exact target population during the issuance stage.
 - Sustainalytics considers that investments under this category are expected to enhance access to education for underprivileged and disadvantaged populations, and therefore, views these investments to be socially impactful.
- Under the Affordable Housing category, the Province's Framework includes the financing or refinancing of the construction and retrofits of affordable housing including home ownership, rental housing and non-profit housing developments for low- and moderate-income population.
 - With regards to home ownership, the Province has communicated that affordable housing should meet the least expensive threshold of the following criteria: i) the purchase price does not exceed 30% of gross annual total income of low- and moderate-income households; or ii) the purchase price is at least 10% lower than the average purchase price of a resale unit in the regional market area.
 - With regards to rental housing, the Province has communicated that affordable housing should meet the least expensive threshold of the following criteria: i) the rent does not exceed 30% of gross annual total income of low- and moderate-income households; or ii) the rent is at or below the average market rent for a unit in the regional market area.
 - Sustainalytics notes that low- and moderate-income households are defined as per the Provincial Policy Statement: i) in the case of ownership housing, households with incomes in the lowest 60% of the income distribution for the regional market area; or ii) in the case of rental housing, households with incomes in the lowest 60% of the

²⁷ The Province has communicated to Sustainalytics that the definitions of underprivileged and disadvantaged populations are contextual and will be further defined for each respective programme.

- income distribution for rental households for the regional market area.²⁸ The Province has communicated to Sustainalytics that such definition surrounding affordability is currently being further developed by the Ministry of Municipal Affairs and Housing.
- Additionally, the Province has communicated to Sustainalytics that expenditure under this category will also include investments in: i) social or community housing; ii) supportive housing for homeless people, iii) housing for survivors of domestic violence and human trafficking; iv) housing projects for indigenous people v) housing for soldiers.²⁹
 - In Sustainalytics' opinion, in order to ensure a contribution to increasing access to affordable housing, it is best practice to define a target population with an upper threshold at or below the annual median income at the municipal or regional level. Sustainalytics recognizes that in certain high-cost markets in Ontario,³⁰ housing may even be unaffordable for moderate-income households and providing housing to such families may have positive social impacts. Sustainalytics encourages the Province to define high-cost markets during the issuance stage. Furthermore, Sustainalytics encourages the Province to report on the regions or cities where it may finance affordable housing projects and the income levels of the target populations positively impacted by such projects, to the extent possible.
- Under the Employment Generation category, the Province's Framework includes the financing or refinancing of programmes and initiatives to provide employment opportunities to youth, new immigrants, individuals on social assistance, indigenous people and disadvantaged young people with prior involvement with the criminal justice system. Additionally, the Province may support the launch of new businesses and start-ups and finance programmes supporting MSMEs.
 - The programmes supporting new business and MSMEs will be aimed at providing resources and training to individuals to develop trade skills. The Province has communicated to Sustainalytics that it defines MSMEs as businesses with up to 499 employees.
 - The Province has communicated to Sustainalytics that expenditure under this category will exclude activities that have a negative social or environmental impact such as tobacco, firearms, fossil fuels and gambling.
 - Sustainalytics views expenditure under this category to be socially impactful.
- Project Evaluation and Selection:
 - Projects will be evaluated by the Ontario Financing Authority (OFA) in collaboration with the Sustainable Bond Advisory Panel (SBAP). The SBAP includes representatives from the OFA, OFA board, the Ontario Ministry of Environment Conservation and Parks and relevant provincial agencies whose projects are being evaluated or with related technical expertise. The Province is committed to completing the project evaluation and selection process before the bond issuance and the project details will be included in the investor information documents as part of the bond issuance process.
 - The SBAP identifies and evaluates environmental and social risks for all allocation decisions made under the Framework. Sustainalytics considers this risk management process to be adequate and aligned with market expectations. For additional details, please see Section 2.
 - Based on the cross-functional oversight for project evaluation and selection and the presence of adequate environmental and social risk management systems, Sustainalytics considers this process to be aligned with market expectations.
 - Management of Proceeds:
 - The OFA will be responsible for the management and allocation of proceeds to eligible projects. The proceeds will be deposited and tracked in designated accounts in the Province's financial records.

²⁸ Government of Ontario, "Provincial Policy Statement", (2020), at: <https://files.ontario.ca/mmah-provincial-policy-statement-2020-accessible-final-en-2020-02-14.pdf>

²⁹ Government of Ontario, "Housing in Ontario", at: <https://www.ontario.ca/page/housing-in-ontario>

³⁰ Government of Ontario, "Ontario's housing context, challenges and needs", at: <https://www.ontario.ca/document/ontarios-second-action-plan-under-national-housing-strategy-2022-23/ontarios-context#section-1>

- The Province intends to allocate proceeds in full within 12 months of issuance. Pending full allocation, proceeds will be temporarily invested in short-term Government of Canada Treasury bills.
- Based on the use of an internal tracking system and disclosure of the temporary use of proceeds, Sustainalytics considers this process to be aligned with market practice.
- Reporting:
 - The Province will report annually on the allocation of proceeds and corresponding impact in a newsletter, which will be published on its website until full allocation.
 - Allocation reporting will include the breakdown of proceeds according to project category and the amount of unallocated proceeds. The Province also intends to engage a third party to provide verification on the allocation of proceeds.
 - Impact reporting is intended to include, where feasible, metrics such as CO₂ emissions avoided, energy savings (in MWh), installed renewable energy capacity (in MW), number of people assisted, and number of jobs created.
 - Based on the Province's commitment to both allocation and impact reporting, Sustainalytics considers this process to be aligned with market practice.

Alignment with Sustainability Bond Guidelines 2021

Sustainalytics has determined that the Ontario Sustainable Bond Framework aligns with the four core components of the GBP and SBP.

Section 2: Sustainability Strategy of Ontario

Contribution of the Framework to Ontario's sustainability strategy

Sustainalytics is of the opinion that the Province of Ontario demonstrates a commitment to sustainability, by having published strategic plans for: i) energy; ii) environment, conservation and parks; iii) natural resources and forestry; iv) agriculture, food and rural affairs; v) education; vi) job creation; vii) transportation and viii) housing among other strategic plans.³¹ The Province also established the Made-in-Ontario Environment Plan in 2018, which focuses on the following environmental areas: i) addressing climate change; ii) reducing waste; iii) conserving land and greenspace; and iv) protecting Ontario's air, land and rivers.³²

The Government of Ontario has set a target to reduce GHG emissions in the province by 30% between 2005 and 2030, having achieved a 27% reduction as of 2022.³³ To achieve the 30% goal, the Province focuses on the following initiatives: i) phased out coal-fired electricity generation and focusing primarily on hydroelectric power generation; ii) supporting industries to reduce their GHG emissions across supply chains; and iii) establishing an integrated transit network by using electric rail technology across all new subway and light rail projects in the Province.³⁴ Additionally, in 2023, the Ontario Biodiversity Council renewed its biodiversity strategy, including the following 2030 targets: i) implement land use planning approaches to maintain and enhance biodiversity at local, regional and provincial levels; ii) restore biodiversity to at least 30% of priority restoration areas; iii) conserve 30% of terrestrial and aquatic ecosystems through well-connected networks of protected areas and conservation land, amongst others.³⁵

As part of its Environment Plan developed in 2018, the Province aims to reduce the amount of landfill waste, having implemented waste diversion programs to reuse, recycle and safely dispose the following types of waste: tires, electrical and electronic waste, hazardous and special products, batteries, paper and packaging.^{36,37} As of 2023, the Province is transitioning to a producer responsibility model for waste, in which producers are fully responsible for collecting and managing paper, packaging and single-use items. The Province aims to complete the transition to the producer responsibility model by January 2026.³⁸ Furthermore, to protect natural spaces and species across Ontario, the provincial government has made the following investments between 2018 and 2023: i) CAD 12 million to support non-profit organizations, indigenous communities and other stakeholder groups that help protect and recover at-risk species through local

³¹ Government of Ontario, "Published plans and annual reports 2022–2023", at: <https://www.ontario.ca/page/published-plans-and-annual-reports-2022-2023>

³² Government of Ontario, "A Made-in-Ontario Environment Plan", (2018), at: <https://prod-environmental-registry.s3.amazonaws.com/2018-11/EnvironmentPlan.pdf>

³³ Government of Ontario Sustainable Bond Framework 2023, at: <https://www.ofina.on.ca/greenbonds/greenbonds.htm>

³⁴ Ibid.

³⁵ Ontario Biodiversity Council, "Ontario's Biodiversity Strategy 2023-2030", at: <https://ontariobiodiversitycouncil.ca/ontarios-strategy/>

³⁶ Government of Ontario, "A Made-in-Ontario Environment Plan", at: <https://www.ontario.ca/page/made-in-ontario-environment-plan>

³⁷ Government of Ontario, "Waste management", at: <https://www.ontario.ca/page/waste-management>

³⁸ Government of Ontario, "Waste management", at: <https://www.ontario.ca/page/waste-management>

projects; ii) CAD 30 million for wetland restoration and management; and iii) CAD 20 million dedicated to land conservation efforts.³⁹

As part of its social initiatives, the Province invested CAD 2.9 billion in residential and other support services for people with disabilities and CAD 60 million to provide rehabilitation services for children and youth with special needs in 2021 and 2022.⁴⁰ The Province also invested CAD 85 million in healing, health and wellness programmes designed for indigenous people in urban and rural communities in 2021 and 2022.⁴¹ The Province also plans to invest 15% of the total CAD 184.4 billion 2023 Ontario Budget to improve the public education system.⁴²

Sustainalytics is of the opinion that the Ontario Sustainable Bond Framework is aligned with the Province's overall strategic plans and will further its action on its key environmental and social priorities.

Approach to managing environmental and social risks associated with the projects

Sustainalytics recognizes that the proceeds from the instruments issued under the Framework will be directed towards eligible projects that are expected to have positive environmental and social impact. However, Sustainalytics is aware that such eligible projects could also lead to negative environmental and social outcomes. Some key environmental and social risks possibly associated with the eligible projects may include issues involving i) land use, biodiversity and resource issues associated with large-scale development; ii) waste management; iii) management and long-term disposal of radioactive waste from nuclear projects; iv) community relations; v) occupational health and safety (OHS); and vi) social inclusion and equity.

Sustainalytics is of the opinion that Ontario is able to manage and mitigate potential risks through implementation of the following:

- With regard to land use, biodiversity and resources issues, the overarching Provincial Policy Statement provides sustainable land use planning guidelines by setting minimum standards to protect the environment, natural resources and the population's well-being.⁴³ Further, the Province reports on the status and health of Ontario's forests, fisheries, land, and terrestrial and aquatic ecosystems as part of the State of Ontario's Natural Resources Report.⁴⁴ In line with the Canadian Environmental Assessment Act,⁴⁵ Ontario has a process for conducting environmental assessments before infrastructure projects are initiated.⁴⁶ Furthermore, the Province complies with the Invasive Species Act,⁴⁷ which outlines rules to prevent and control the spread of invasive species in Ontario, as well as Ontario's Crown Forest Sustainability Act,⁴⁸ which focuses on sustainable forest management and operations.
- The Province has developed a waste management approach to align with the Canadian Environmental Protection Act,⁴⁹ covering requirements for waste collection and waste recovery, as well as standards for disposal sites.⁵⁰ Further, the Resource Recovery and Circular Economy Act focuses on increasing the reusability and recyclability of products and packaging, minimizing environmental impacts resulting from resource recovery and waste reduction activities, and minimizing the generation of waste.⁵¹
- With regard to the management of nuclear waste, federal laws related to the management of radioactive waste include the Nuclear Safety and Control Act (NSCA),⁵² Nuclear Fuel Waste Act,⁵³

³⁹ Ibid.

⁴⁰ Government of Ontario, "Published plans and annual reports 2022-2023: Ministry of Children, Community and Social Services", at: <https://www.ontario.ca/page/published-plans-and-annual-reports-2022-2023-ministry-children-community-and-social-services#section-4>

⁴¹ Ibid.

⁴² Government of Ontario, "Building a strong Ontario – 2023 Ontario budget", at: <https://budget.ontario.ca/2023/pdf/2023-ontario-budget-en.pdf>

⁴³ Government of Ontario, "Provincial Policy Statement", (2020), at: <https://files.ontario.ca/mmah-provincial-policy-statement-2020-accessible-final-en-2020-02-14.pdf>

⁴⁴ Government of Ontario, "State of Ontario's Natural Resources Report", at: <https://www.ontario.ca/page/state-ontarios-natural-resources-report>

⁴⁵ Government of Ontario, "Environmental Assessment Act", (2012), at: <https://www.ontario.ca/laws/statute/90e18>

⁴⁶ Government of Ontario, "Environmental Assessments", at: <https://www.ontario.ca/page/environmental-assessments>

⁴⁷ Government of Ontario, "Invasive Species Act", (2015), at: <https://www.ontario.ca/laws/statute/15i22#BK3>

⁴⁸ Government of Ontario, "Crown Forest Sustainability Act", (1994), at: <https://www.ontario.ca/laws/statute/94c25>

⁴⁹ Government of Ontario, "Environmental Protection Act", (1990), at: <https://www.ontario.ca/laws/statute/90e19>

⁵⁰ Government of Ontario, "Waste Management", at: <https://www.ontario.ca/page/waste-management>

⁵¹ Government of Ontario, "Resource Recovery and Circular Economy Act", (2016), at: <https://www.ontario.ca/laws/statute/16r12#BK5>

⁵² Government of Canada, "Nuclear Safety and Control Act (S.C. 1997, c.9)", at: <https://laws-lois.justice.gc.ca/eng/acts/N-28.3/index.html>

⁵³ Government of Canada, "Nuclear Fuel Waste Act (S.C. 2002, c.23)", at: <https://laws-lois.justice.gc.ca/eng/acts/N-27.7/page-1.html>

Nuclear Energy Act,⁵⁴ and the Nuclear Liability and Compensation Act.⁵⁵ The Canadian Nuclear Safety Commission (CNSC) draws its mandate from these laws and administers the management of nuclear materials, including inspection of radioactive waste facilities to ensure protection of health, safety, security and the environment. The CNSC also relies on the recommendations from the International Atomic Energy Agency for best practices for managing radioactive waste.⁵⁶ The CNSC's REGDOC-2.3.1, Conduct of Licensed Activities: Construction and Commissioning Programs sets out requirements and guidance for the construction and commissioning of facilities in Canada that use nuclear reactors and requires safety measures to be consistent with the Canada-IAEA safeguards agreement.⁵⁷ The REGDOC-2.3.2, Accident Management, version 2⁵⁸ lays out the CNSC's requirements for the development, implementation and validation of integrated accident management at reactor facilities and provides guidance on how these requirements should be met. REGDOC-2.3.3 Periodic Safety Reviews⁵⁹ speaks to the requirements and guidance with regard to the conduct of a periodic safety review of a nuclear power plant. Canada is also a signatory to the Joint Convention on the Safety of Spent Fuel Management and on the Safety of Radioactive Waste Management, an international, legally binding treaty that aims to ensure safe management of radioactive waste.⁶⁰

- As for the long-term disposal of nuclear waste, Canada's Nuclear Waste Management Organization⁶¹ is responsible for implementing Canada's rolling five-year strategic implementation plan for a safe and long-term management of used nuclear fuel – *Implementing Adaptive Phased Management 2023-2027*.⁶² The plan is designed to be implemented in phases over many decades and indicates that a single preferred site for the deep geological repository will be identified by 2024, with construction expected to begin in 2033 and operation expected to commence between 2040 and 2045.⁶³ As Canada's nuclear regulator, the CNSC is responsible for licensing geological repositories intended to provide long-term management of radioactive waste.⁶⁴ REGDOC-2.11.2, *Decommissioning*, part of the CNSC's waste management series of regulatory documents, sets out requirements and guidance regarding the planning and preparation for as well as the execution and completion of decommissioning of Class I and Class II nuclear facilities, among other identified operations, that are required to have decommissioning plans or strategies as a result of a regulatory requirement or a condition of their license.⁶⁵
- With respect to community relations, the Ministry of Community and Social Services Act outlines overarching guidelines for the provision of community and social services.⁶⁶ Furthermore, the Province focuses on engagement with indigenous communities to find solutions for climate change adaptation and include the knowledge of indigenous peoples in land use planning processes and decision-making.^{67,68}
- Ontario's Occupational Health and Safety Act provides the legal framework on healthy and safety for workplaces, mandating procedures for dealing with workplace hazards and the formation of health

⁵⁴ Government of Canada, "Nuclear Energy Act (R.S.C., 1985, c. A-16)", at: <https://laws-lois.justice.gc.ca/eng/acts/a-16/>

⁵⁵ Government of Canada, "Nuclear Liability and Compensation Act (S.C. 2015, c. 4, s. 120)", at: <https://laws-lois.justice.gc.ca/eng/acts/n-28.1/fulltext.html>

⁵⁶ Canadian Nuclear Safety Commission, "International cooperation" at: <https://www.cnsccsn.gc.ca/eng/resources/international-cooperation/#code-of-conduct>

⁵⁷ Canadian Nuclear Safety Commission, "REGDOC-2.3.1, *Conduct of Licensed Activities: Construction and Commissioning Programs*", at: <https://www.cnsccsn.gc.ca/eng/acts-and-regulations/regulatory-documents/published/html/regdoc2-3-1/>

⁵⁸ Canadian Nuclear Safety Commission, "REGDOC-2.3.2, *Accident Management, Version 2*", at: <https://www.cnsccsn.gc.ca/eng/acts-and-regulations/regulatory-documents/published/html/regdoc2-3-2v2/>

⁵⁹ Canadian Nuclear Safety Commission, "REGDOC-2.3.3, *Periodic Safety Reviews*", at: <https://www.cnsccsn.gc.ca/eng/acts-and-regulations/regulatory-documents/history/regdoc2-3-3/>

⁶⁰ Canadian Nuclear Safety Commission, "Oversight of Canada's Framework for Radioactive Waste Management", (2018), at: <https://www.cnsccsn.gc.ca/eng/resources/fact-sheets/oversight-canada-framework-radioactive-waste-management/>

⁶¹ NWMO, "Who we are", at: <https://www.nwmo.ca/en/ABOUT-US/Who-We-Are>

⁶² NWMO, "Implementing Adaptive Phased Management 2023-27", at: https://implementationplan.nwmo.ca/2023_27/storage/2023/03/Implementing-Adaptive-Phased-Management-2023-27-EN-2.pdf

⁶³ Ibid.

⁶⁴ Canadian Nuclear Safety Commission, "High-level radioactive waste", at: <https://www.cnsccsn.gc.ca/eng/waste/high-level-waste/>

⁶⁵ Canadian Nuclear Safety Commission, "REGDOC-2.11.2, *Decommissioning*", at: <https://www.cnsccsn.gc.ca/eng/acts-and-regulations/regulatory-documents/published/html/regdoc2-11-2/>

⁶⁶ Government of Ontario, "Ministry of Community and Social Services Act", (1990), at: <https://www.ontario.ca/laws/statute/90m20>

⁶⁷ Government of Ontario, "Naturally Resilient MNR's Natural Resource Climate Adaptation Strategy", at: <https://files.ontario.ca/mnr-17-313-climate-change-2021-01-26.pdf>

⁶⁸ Government of Ontario, "Provincial Policy Statement", (2020), at: <https://files.ontario.ca/mmah-provincial-policy-statement-2020-accessible-final-en-2020-02-14.pdf>

and safety committees at workplaces.⁶⁹ Ontario's Provincial Policy Statement outlines requirements to protect the population from natural and human-made hazards, including the storage of hazardous substances and ensuring essential emergency services in hazardous lands and sites.⁷⁰

- With regard to social inclusion and equity, Ontario's Human Rights Code covers equal rights and opportunities without discrimination in protected social areas, including housing, contracts, employment, goods, services and facilities, and memberships in unions, trade and professional associations.⁷¹ The Canadian Impact Assessment Act envisions tools to support indigenous participation in the assessment of impact of major projects in Canada, such as potential impacts of projects on Aboriginal and treaty rights.⁷² Moreover, Canada is a supporter of the United Nations Declaration on the Rights of Indigenous Peoples since 2016.⁷³ Canada joined the International Labor Organization as one of the founding members in 1919 and has ratified numerous ILO Conventions, including all eight Core Conventions.⁷⁴

Based on these policies, standards and assessments, Sustainalytics is of the opinion that Ontario has implemented adequate policies and measures and is well positioned to manage and mitigate environmental and social risks commonly associated with the eligible categories.

Section 3: Impact of Use of Proceeds

All 15 use of proceeds categories are aligned with those recognized by the GBP and SBP. Sustainalytics has focused on two below where the impact is specifically relevant in the local context.

The importance of clean transportation in Ontario

In 2021, Canada's top five emitting provinces combined (Alberta, Ontario, Quebec, Saskatchewan and British Columbia) released 91% of total national GHG emissions, with transport as one of the key contributing sectors.⁷⁵ In Ontario, the transportation sector is the largest emitting sector and accounted for 32% of total GHG emissions in the province in 2020.⁷⁶

To reduce GHG emissions across the transportation sector, the Government of Ontario is investing in sustainable public transport solutions. This includes the Province's support for new subway and light rail projects, such as the electrification of 600 kilometres of existing track and 200 kilometres of new track on the GO rail network. Electric rail vehicles are expected to offer faster travel times, lower operating costs and reduced emissions and noise.^{77,78} To achieve more frequent and faster train service, in 2022, the Province awarded approximately CAD 1.6 billion to implement the first project phase to electrify the GO Transit's entire rail network.⁷⁹ The Province is providing support for the uptake of low- and zero-emission vehicles, such as through the Ontario's Green License Plate Program initiative that allows low-carbon vehicles to travel on high occupancy vehicle and toll lanes with any number of occupants,⁸⁰ as well as through providing reserved parking spots for EV charging stations.^{81,82} Also as part of its effort to build a clean transportation sector, the Province has developed a flagship programme to invest CAD 56.4 million by 2024 in the Ontario Vehicle Innovation Network to: i) secure production mandates for hybrid and electric vehicles; ii) create a domestic battery ecosystem; and iii) strengthen Ontario's position as a North American automotive and electric vehicle

⁶⁹ Government of Ontario, "Occupational Health and Safety Act", (1990), at: <https://www.ontario.ca/laws/statute/90o01>

⁷⁰ Government of Ontario, "Provincial Policy Statement", (2020), at: <https://files.ontario.ca/mmah-provincial-policy-statement-2020-accessible-final-en-2020-02-14.pdf>

⁷¹ Ontario Human Rights Commission, "The Ontario Human Rights Code", at: <https://www.ohrc.on.ca/en/ontario-human-rights-code>

⁷² Government of Canada, "Policy Context: Indigenous Participation in Impact Assessment", at: <https://www.canada.ca/en/impact-assessment-agency/services/policy-guidance/practitioners-guide-impact-assessment-act/policy-indigenous-participation-ia.html>

⁷³ Government of Canada, "Canada becomes a full supporter of the United Nations Declaration on the Rights of Indigenous People", (2016), at: <https://www.canada.ca/en/indigenous-northern-affairs/news/2016/05/canada-becomes-a-full-supporter-of-the-united-nations-declaration-on-the-rights-of-indigenous-peoples.html>

⁷⁴ International Labour Organization, "Canada – ILO Cooperation", at: <https://www.ilo.org/pardev/donors/canada/lang-en/index.htm>

⁷⁵ Government of Canada, "Greenhouse gas emissions – Regional", (2021), at: <https://www.canada.ca/en/environment-climate-change/services/environmental-indicators/greenhouse-gas-emissions.html>

⁷⁶ Canada Energy Regulator, "Provincial and Territorial energy profiles – Ontario", (2020), at: <https://www.cer-rec.gc.ca/en/data-analysis/energy-markets/provincial-territorial-energy-profiles/provincial-territorial-energy-profiles-ontario.html>

⁷⁷ Government of Ontario, "Ontario's Priority Transit Projects in the Greater Golden Horseshoe Region", at: <https://www.ontario.ca/page/ontario-priority-transit-projects-greater-golden-horseshoe-region>

⁷⁸ Metrolinx, "GO Rail Network Electrification", at: <https://www.metrolinx.com/en/projects-and-programs/go-expansion-studies/go-electrification>

⁷⁹ CityNews, "Ontario government awards \$1.6B contract for 1st phase of GO Transit train electrification", (2022), at: <https://toronto.citynews.ca/2022/04/19/go-transit-train-electrification-ontario/>

⁸⁰ Government of Ontario, "Green License Plate Program", at: <https://www.ontario.ca/page/get-green-licence-plate>

⁸¹ Government of Ontario, "Charging electric vehicles", at: <https://www.ontario.ca/page/charging-electric-vehicles>

⁸² Government of Ontario, "Low carbon vehicles and electric vehicles", at: <https://www.ontario.ca/page/low-carbon-vehicles-and-electric-vehicles>

innovation hub.^{83,84} Additionally, Ontario has a low-carbon hydrogen strategy in place for a low-carbon hydrogen economy to evolve its energy system, including the following initiatives: i) investments in hydrogen fuel cell heavy-duty vehicle applications; ii) complementing hydrogen fuel cell-powered vehicles with transportation vehicles powered by lower-carbon ethanol and bio-based diesel blends; and iii) manufacturing hydrogen fuel cell heavy-duty vehicles.⁸⁵

Sustainalytics is of the opinion that investments in clean transportation infrastructure as well as low- and zero-emission vehicles under the Framework are expected to contribute to reducing GHG emissions from the transportation sector in Ontario and more broadly in Canada.

Access to healthcare in Ontario

In 2021, Canada had only 2.6 hospital beds per 1,000 people.⁸⁶ The healthcare system in Ontario faces significant capacity constraints linked to shortage of staff and mismatch of demand and available services, leading to inadequate access to healthcare services.⁸⁷

In 2023, Ontario introduced the Your Health plan with the following goals: i) expand and improve access to healthcare; ii) improve access to healthcare by initiatives such as reducing wait times for surgeries, procedures and emergency care and building new hospitals; and iii) hiring more healthcare workers.⁸⁸ Starting from 2024, the Province plans to increase provincial annual base funding for public health units, thereby restoring the provincial-municipal cost-share ratio to 75%-25%.⁸⁹ Moreover, the Province may provide an annual 1% funding increase to local public health units between 2023 and 2026, to improve the availability of healthcare services.⁹⁰ The Province has also invested nearly CAD 33 million in 2022 and 2023 in 100 mental health and addiction programmes specifically for Indigenous communities across Ontario.⁹¹

Based on the above, Sustainalytics is of the opinion that investments in increasing access to essential healthcare services will contribute to the Province's goal to improve the healthcare system in Ontario.

Contribution to SDGs

The Sustainable Development Goals were adopted in September 2015 by the United Nations General Assembly and form part of an agenda for achieving sustainable development by 2030. The instruments issued under the Ontario Sustainable Bond Framework are expected to help advance the following SDGs and targets:

Use of Proceeds Category	SDG	SDG target
Clean Transportation	11. Sustainable Cities and Communities	11.2 By 2030, provide access to safe, affordable, accessible and sustainable transport systems for all, improving road safety, notably by expanding public transport, with special attention to the needs of those in vulnerable situations, women, children, persons with disabilities and older persons
Green Buildings	9. Industry, Innovation, and Infrastructure	9.4 By 2030, upgrade infrastructure and retrofit industries to make them sustainable, with increased resource-use efficiency and greater adoption of clean and environmentally sound technologies and industrial processes, with all

⁸³ Government of Ontario, "Ontario Creating Conditions for More Investments and Jobs", at: <https://news.ontario.ca/en/statement/1002909/ontario-creating-conditions-for-more-investments-and-jobs>

⁸⁴ Government of Ontario, "Ontario Launches Flagship Initiative to Lead Development of EV and Smart Transportation Technologies", (2021), at: <https://news.ontario.ca/en/release/1001266/ontario-launches-flagship-initiative-to-lead-development-of-ev-and-smart-transportation-technologies>

⁸⁵ Government of Ontario, "Ontario's low-carbon hydrogen strategy: A path forward", (2022), at: <https://www.ontario.ca/files/2022-04/energy-ontarios-low-carbon-hydrogen-strategy-en-2022-04-11.pdf>

⁸⁶ OECD Data, "Hospital beds", (2022), at: <https://data.oecd.org/health/hospital-beds.htm>

⁸⁷ Government of Ontario, "Hallway Health Care: A System Under Strain", (2019), at: https://www.health.gov.on.ca/en/public/publications/premiers_council/docs/premiers_council_report.pdf

⁸⁸ Government of Ontario, "Your Health – A Plan for connected and convenient care", at: <https://files.ontario.ca/moh-your-health-plan-connected-convenient-care-en-2023-02-02-v3.pdf>

⁸⁹ Government of Ontario, "Ontario Investing in a Stronger Public Health Sector", (2023), at: <https://news.ontario.ca/en/release/1003399/ontario-investing-in-a-stronger-public-health-sector>

⁹⁰ Ibid.

⁹¹ Government of Ontario, "Ontario Connecting Indigenous Communities to More Mental Health and Addictions Support", (2023), at: <https://news.ontario.ca/en/release/1003013/ontario-connecting-indigenous-communities-to-more-mental-health-and-addictions-support>

		countries taking action in accordance with their respective capabilities
Energy Efficiency	7. Affordable and Clean Energy 9. Industry, Innovation and Infrastructure	7.3 By 2030, double the global rate of improvement in energy efficiency 9.4 By 2030, upgrade infrastructure and retrofit industries to make them sustainable, with increased resource-use efficiency and greater adoption of clean and environmentally sound technologies and industrial processes, with all countries taking action in accordance with their respective capabilities
Clean Energy	7. Affordable and Clean Energy	7.2 By 2030, increase substantially the share of renewable energy in the global energy mix
Living Natural Resources and Land Use	15. Life on Land	15.2 By 2020, promote the implementation of sustainable management of all types of forests, halt deforestation, restore degraded forests and substantially increase afforestation and reforestation globally
Climate Change Adaptation	13. Climate Action	13.1 Strengthen resilience and adaptive capacity to climate-related hazards and natural disasters in all countries
Sustainable Water and Wastewater Management	6. Clean Water and Sanitation	6.3 By 2030, improve water quality by reducing pollution, eliminating dumping and minimizing release of hazardous chemicals and materials, halving the proportion of untreated wastewater and substantially increasing recycling and safe reuse globally 6.4 By 2030, substantially increase water-use efficiency across all sectors and ensure sustainable withdrawals and supply of freshwater to address water scarcity and substantially reduce the number of people suffering from water scarcity
Pollution Prevention and Control	11. Sustainable Cities and Communities 12. Responsible Consumption and Production	11.6 By 2030, reduce the adverse per capita environmental impact of cities, including by paying special attention to air quality and municipal and other waste management 12.5 By 2030, substantially reduce waste generation through prevention, reduction, recycling, and reuse
Terrestrial and Aquatic Biodiversity	14. Life Below Water	14.2 By 2020, sustainably manage and protect marine and coastal ecosystems to avoid significant adverse impacts, including by strengthening their resilience, and take action for their restoration in order to achieve healthy and productive oceans
Circular Economy Adapted Products, Production Technologies and Processes	12. Responsible consumption and production	12.5 By 2030, substantially reduce waste generation through prevention, reduction, recycling and reuse
Affordable Basic Infrastructure	9. Industry, Innovation, and Infrastructure	9.1 Develop quality, reliable, sustainable and resilient infrastructure, including regional and transborder infrastructure, to support economic development and human well-being,

		with a focus on affordable and equitable access for all
Access to Essential Services: Healthcare	3. Good Health and Wellbeing	3.8 Achieve universal health coverage, including financial risk protection, access to quality essential health-care services and access to safe, effective, quality and affordable essential medicines and vaccines for all
Access to Essential Services: Education and Childcare	4. Quality Education	4.3 By 2030, ensure equal access for all women and men to affordable and quality technical, vocational and tertiary education, including university
Affordable Housing	11. Sustainable Cities and Communities	11.1 By 2030, ensure access for all to adequate, safe and affordable housing and basic services and upgrade slums
Employment Generation	8. Decent Work and Economic Growth	8.3 Promote development-oriented policies that support productive activities, decent job creation, entrepreneurship, creativity and innovation, and encourage the formalization and growth of micro-, small- and medium-sized enterprises, including through access to financial services

Conclusion

The Government of Ontario has developed the Ontario Sustainable Bond Framework, under which it may issue green, social and sustainability bonds and use the proceeds to finance projects to facilitate the transition to a low-carbon economy, support environmental protection and advance socio-economic development in Ontario. Sustainalytics considers that the eligible projects are expected to lead to positive environmental and social impacts in Ontario.

The Ontario Sustainable Bond Framework outlines a process for tracking, allocating and managing proceeds, and makes commitments for the Province to report on their allocation and impact. Sustainalytics considers that the Framework is aligned with the overall sustainability strategy of the Province and that the green and social use of proceeds categories will contribute to the advancement of the UN Sustainable Development Goals 3, 4, 6, 7, 8, 9, 11, 12, 13, 14 and 15. Additionally, Sustainalytics is of the opinion that the Government of Ontario has adequate measures to identify, manage and mitigate environmental and social risks commonly associated with the eligible projects.

Based on the above, Sustainalytics is confident that the Government of Ontario is well positioned to issue green, social and sustainability bonds and that the Framework is robust, transparent and aligned with the core components of the Green Bond Principles 2021 and Social Bond Principles 2023.

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