

BONDS AND CLIMATE CHANGE

THE STATE OF THE MARKET

2015

Canada
Edition

Changing Landscape of the Canadian Universe

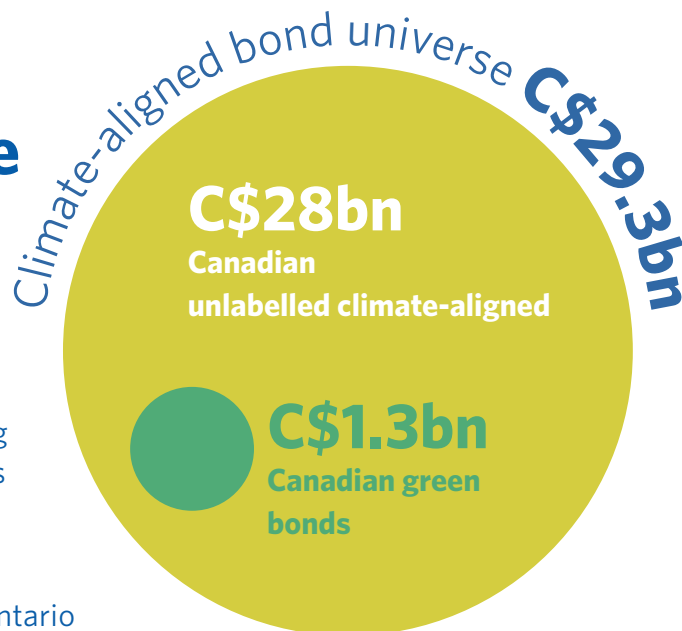
- [Bonds and Climate Change: State of the Market in 2015](#) estimates US\$597.7bn climate-aligned bonds are outstanding, with US\$65.9bn of these bonds being labelled green bonds
- Canadian issuers account for C\$29.3bn outstanding climate-aligned bonds, of which C\$1.3bn represents labelled green bonds
- Canadian green bonds have been issued by Export Development Canada (EDC), the Government of Ontario and Toronto Dominion (TD) Bank
- Since the launch of the global report in July 2015, Telus and Westbank partnered to issue a green property bond (C\$225m) and Export Development Canada (EDC) issued its second green bond US\$300m (C\$225m)
- Newly elected Liberal federal government included green bonds in its election platform. We expect federal government leadership to lead to an upsurge in Canadian green bonds activity

In July 2015, Climate Bonds Initiative launched the fourth annual edition of the [Bonds and Climate Change: State of the Market in 2015](#). The report estimates \$597.7bn climate-aligned bonds are outstanding in the market as of 10th June 2015. What was once a niche market has now grown in size and sophistication.

This is also the fourth annual update of the Bonds and Climate Change Canada report, which draws in part on the global edition. In common with international trends the climate

bonds landscape in Canada has also change, albeit less dramatically.

Climate-aligned bonds include both labelled green bonds, that use proceeds for eligible green projects, and unlabelled bonds where over 95% of the issuers revenues are from assets or projects that fit into the Climate Bonds Taxonomy (set of definitions). A large part of this global growth has been in emerging economies such as India and China, both of which had domestic issuers launching inaugural green bonds.



Defining climate-aligned bonds and green bonds

We identified two categories of bonds that finance low carbon and climate resilient assets:

Labelled green bonds: These bonds have a defined use of proceeds in which 100% of the proceeds of the bond sale are earmarked for projects or assets that fit within the Climate Bonds Taxonomy. These bonds are, by the fact of labelling, easier to locate. Climate Bonds Initiative tracks green bonds in a list available on our website.

Climate-aligned bonds: Over 400 issuers with bonds outstanding are fully aligned with the Climate Bonds taxonomy as over 95% revenues come from climate-aligned assets. The bonds are considered as climate-aligned bonds but are not labelled as such by the issuer.

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The Canadian climate-aligned universe

Within this global universe, Canadian issuers represent a small but important segment. Canadian issuers account for C\$29.3bn outstanding climate-aligned bonds as of June 10, 2015, of which labelled green bonds represent C\$1.3bn.

While the first part of 2015 was slower in terms of Canadian issuances than the latter half of 2014, this pause is likely to be short-lived; both domestic and external factors are likely to lead to further market development in 2016.

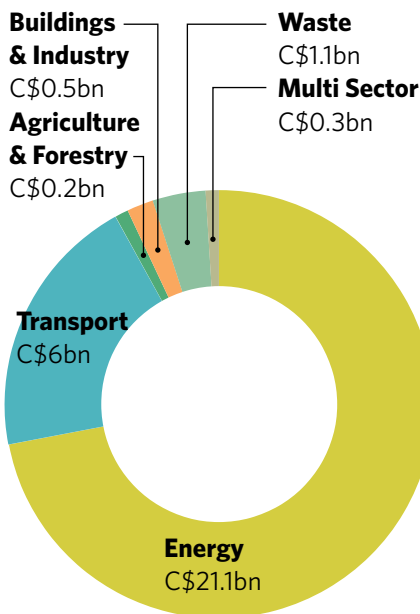
Energy is the single largest sector in Canada's climate-aligned bonds market, accounting for 72% of bonds outstanding. The majority of energy bonds are for hydropower, though other renewable energy contribute to the total, in particular geothermal, solar and wind.

Transport is the second largest theme in the domestic climate-aligned bond universe due to the prevalence of rail bonds (rail transport is low carbon, compared to road-based transportation.)

Waste management and recycling entities account for the third placed sector with C\$1.1bn. The remaining sectors are smaller but still key areas of investment: Buildings and Industry (C\$500m), Multi-sector (C\$300m (all labelled-green bonds)) and Agriculture and Forestry (C\$200m).

So far, there are no water themed bonds in Canada, despite the rush from south of the border for US municipalities to finance water projects with green bonds. Globally, accelerated growth in this area is anticipated for the coming years with the release of the Climate Bonds Standard for Water and the need for municipalities to invest in climate resilience within water conservation, reticulation systems, drainage, and improving energy efficiency and capture of waste water treatment.

Energy remains the largest sector in Canadian climate-aligned bonds



Climate-aligned asset-backed securitisation (ABS)

Green securitisation, the securitisation of low-carbon assets, can support recycling of capital to free up bank lending allocations and equity capital. It gives lenders and investors an exit strategy, allowing them to more rapidly recycle their limited capital into new projects. Project lending and investment requires due diligence capabilities that most bond buyers lack; and recapitalisation pressures on banks have reduced their allocations to such lending, and equity remains scarce in policy-vulnerable sectors.

As an example, Canadian corporate Northland Power issued C\$232m of ABS in November 2014. The BBB-rated bond was backed by solar projects, and had 18-year tenor with a semi-annual coupon of 4.397%. Northland earmarked proceeds for refinancing the solar projects, and acquisition of a wind farm (NordSee One). This is one indication of the growing diversity in the Canadian unlabelled climate-aligned universe.

Upcoming Canadian issuances

A recently announced Canadian green bond, not included in the totals reported here, is a joint venture between telecommunication company

TELUS and Westbank called the '500 Georgia Partnership.' This C\$225m green bond will finance two green buildings in Vancouver – TELUS's headquarters and a high-rise residential building – that are expected to achieve LEED gold and LEED platinum certification respectively. This green bond is backed by the mortgages on the two buildings. Another bond still under the radar due to timing is a C\$200 wind project bond backed by a 91.4MW wind project in Dufferin County, Ontario.

Municipalities express an interest

Faced with significant infrastructure needs, decision makers in some Canadian municipalities have expressed an interest in exploring how green bonds could be used as a financing tool for low carbon and climate resilient investments such public transit, green infrastructure, district energy systems or local renewable energy projects.

Still in the Province of Ontario the Provincial Government in its annual budget, committed to a new issuance of green bonds in 2015/16¹. Another sign that more green and climate-aligned project bonds are in the pipeline for the 2016 report.

Learning lessons from south of the border: Booming US municipal green bond market

The US municipal green bond market heated up in 2014 with US\$27.7bn issued and continues to thrive in 2015 with US\$13bn by June 10. Since then there has been a flurry of green municipal bonds including the largest ever municipal bond issued, US\$942m by Puget Sound Transit Authority for a range of low carbon transportation projects. Canada can look to opportunity highlighted in the 'How to issue green municipal bond' guide produced by the Green City Bonds Campaign, in partnership with Climate Bonds Initiative, CDP, C40 Cities, NRDC, CERES and As You Sow².



Fertile ground for green bond market growth

Shifting political winds

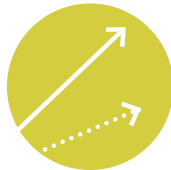
The change in Canada's government in October 2015 is expected to be positive for the growth of a domestic green bond market. The Liberals will be able to realise their commitment to establish a 'Canada Green Investment Bond'³ to support large and community scale renewable energy projects.

Other Liberal policy commitments could support the growth of green bonds, such as through the commitment to establish a C\$2bn Low Carbon Economy Trust⁴ to finance low carbon projects.

Use of national funds via sovereign wealth funds, trusts and development banks to lever their pivotal role by acting as both an issuer and purchaser of green bonds is one of the main recommendations in the recent best practice guide released by Climate Bonds Initiative⁵.

Public sector actions

There are a number of policy levers that could be explored as a means of accelerating the growth of green bond markets in Canada - both the labelled green bonds and the broader climate-aligned bond universe.



CANADIAN OPPORTUNITY

1. Strategic issuance from public entities

Demonstrated with the issuance from EDC and Ontario; potential for further federal and provincial government green bonds

2. Strengthening planning and pipeline transparency of green projects

New infrastructure programs introduced by federal and provincial governments can incorporate green criteria into decision-making on future project.

3. Improving the risk-return profile of green bonds: credit enhancement

Canada can follow the lead of the US and EU to provide credit enhancements to green project bonds.

4. Tax incentives

Canada can use tax incentives for its Canada Green Bond. Regional governments can also use tax incentives to encourage more local retail green bonds copying the US system where States provide tax incentives to more than 80% of the USD 3.7 trillion municipal bond market⁷.

5. Boosting demand: domestic fund mandates

Governments of all levels can consider purchasing green bonds for their own financing needs (in addition to issuing them).

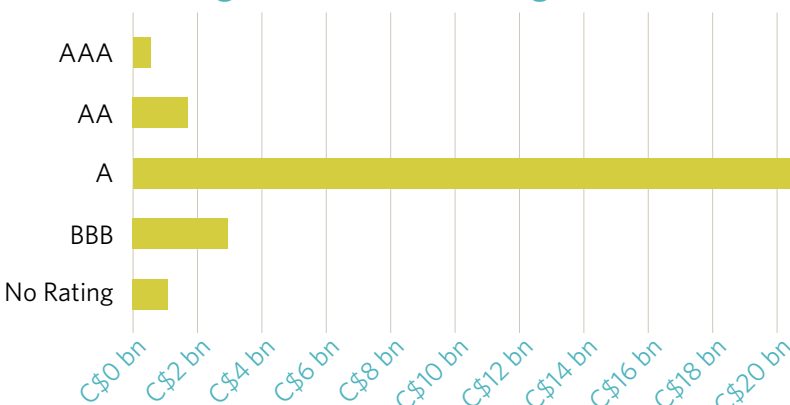
6. Boosting demand and convening power: central banks

The Bank of Canada could support green bonds by using its convening power to bring together key green bond market participants.

7. Market integrity: supporting standards development

Canada can look to work with other countries and regions to establish its own standards in line with international investor expectations.

Majority of Canadian climate-aligned bonds are investment grade (above BBB rating)



A Canadian market development committee

To grow large, liquid green bond markets around the world, the Climate Bonds Initiative convenes potential issuers, investors and intermediaries to discuss opportunity and how to overcome region-specific barriers to market growth. Such green bond market development committees have been formed in China, India and Brazil. A Canadian committee is now being established.

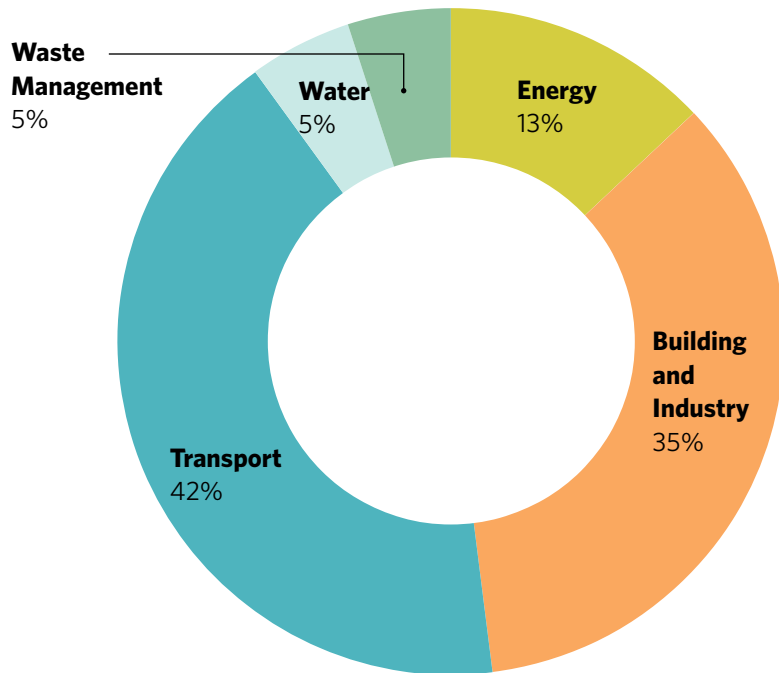


Reporting on past Canadian green bond issuances

Transparency on which eligible green projects or assets have been financed by bond proceeds is an important defining feature of labelled green bonds. For the most recent Canadian issuances, the first reports are becoming available:

- Government agency Export Development Canada (EDC) reports on a non-exhaustive sample list of entities/projects that have received a loan as part of the green bond program⁶. In its 2014 annual report, EDC committed to issue further green bond and to “give preference to investors with a green mandate”⁷. This new US\$300m (C\$225m) green bond was released on December 1, 2015.
- On the other hand Toronto Dominion Bank (TD Bank), reports a number of details on the inaugural green C\$500m bond. It provides a portfolio breakdown and a third part assurance report on the allocation of proceeds to green projects⁸. By the end of 2014 all TD Bank’s green bond proceeds had been allocated to projects. The majority (71%) of proceeds financed buildings with a LEED certification of Gold or Platinum. A further 17% was spent on solar power and the remaining was split between other renewable energy projects: hydroelectric (5%), biomass (5%) and wind (2%)⁹.
- The Province of Ontario’s green bond newsletter is not yet available to the public. However, Ontario’s Budget 2015 states: “Green Bonds will be an important tool to help Ontario finance transit and other environmentally friendly projects across the province. The Eglinton Crosstown Light Rail Transit (LRT) was selected as the first green project to receive funding through the initiative”¹⁰. According to the Budget, Ontario plans to issue its second Green Bond during fiscal year 2015-16.

Canadian green bond proceeds are primarily used for low carbon transport and energy efficiency



Looking ahead

Globally, the amount outstanding in climate-aligned bonds has increased by US\$95bn, and with further green bond issuances in Q3, the current year is on track to surpass the last year’s figures. The impact of the December climate change Conference of the Parties (UN COP21) meetings will likely lead to both short-term announcements of upcoming issuances and additional national-level policy developments.

In Canada, the existing large liquid climate-aligned market in Canada and the 2013-2015 green bond issuances shows that appetite and interest exists for climate-focused bonds in the private finance. Ontario’s intent to issue more green bonds, the new Liberal government’s platform proposal to both issue and buy green bonds, and the growing interest in exploring municipal green bonds all point to a very active green bonds market in Canada in the coming years.

Disclaimer

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The Climate Bonds Initiative is an investor-focused not-for-profit, mobilizing debt capital markets for a rapid transition to a low-carbon economy.

All source data derived from Bloomberg. All figures are rounded.

www.sustainableprosperity.ca
www.climatebonds.net

1. http://www.fin.gov.on.ca/en/budget/ontariobudgets/2015/ch5.html#ch5_3
2. <http://www.climatebonds.net/files/files/Green%20City%20Playbook.pdf>
3. Liberal Party Manifesto 2015: <https://www.liberal.ca/files/2015/08/A-new-plan-for-Canadas-environment-and-economy.pdf>
4. <https://www.liberal.ca/realchange/climate-change/>
5. <http://www.climatebonds.net/resources/publications/scaling-green-bond-markets-sustainable-development>
6. <http://www.edc.ca/EN/Investor-Relations/Documents/green-bond-report-2014.pdf>

7. <http://www.edc.ca/EN/About-Us/Corporate-Reports/Documents/annual-report-2014.pdf>
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