

FEDERAL GOVERNMENT

Martin Luymes Vice President, Government and Stakeholder Relations at the HRAI has been working with the Canadian Government on some of the programs introduced recently that will positively impact the geothermal industry in the coming years. They include:

- 1. Market Transformation Roadmap for Energy Efficient Equipment in the Building Sector
- 2. Substantial new commitments (\$1.01 billion) to the Green Municipal Fund at the Federation of Canadian Municipalities aimed at upgrading homes for energy efficiency and reducing carbon
- 3. The carbon pricing and rebates of the Pan-Canadian Framework, developed by Canadian and provincial governments
- 4. 100% first year depreciation buy Canada Revenue Agency for investments in energy efficiency, low carbon (specifically geothermal) and Clean Energy Equipment
- 5. Electric Vehicle and charger incentives
- 6. A Canada Training Benefit for clean energy technology launching in 2020.

These topics were reviewed in detail when Jamie Hulan of Natural Resources Canada spoke at our 2019 OGA conference, and his colleague Joyce Henry spoke at the HRAI Symposium on Transitioning to a Low Carbon Economy in April.

MARKET TRANSFORMATION ROADMAP

The Market Transformation Roadmap for Energy Efficient Equipment in the Building Sector includes initiatives relating to space heating, water heating and windows. Space heating and water heating represent up to 64% and 19% respectively of a Canadian building's energy use; while up to 35% of heat losses are attributed to windows. The Roadmap contains numerous initiatives in these three product categories, including research and development, lab and field-testing, product and system demonstrations, information and awareness to educate the marketplace, training for the industry, financial and non-financial incentives, establishment and harmonization of new codes and standards.

FCM GETS \$1.01 BILLION FOR RETROFITS & GREEN PROJECTS

In 2019 Canada's Federal government consulted with the OGA and HRAI before adding substantially to the Green Municipal Fund at the Federation of Canadian Municipalities, with \$1.01 billion for residential energy retrofits and new green buildings in cities. This fund has been used for more than 1,250 municipal initiatives. Recent examples include the Clayton Community Centre in Surrey and a Vancouver post-disaster emergency hub and fire hall, where geothermal is the primary heating and cooling system.

One of the speakers at our 2019 OGA Conference, Andrew Bowerbank from WSP Engineering, said the net-zero building market could be worth \$700 billion by next year and \$1.3 trillion within a decade.



NEW ELECTRIC VEHICLE INCENTIVES

In 2019 the government committed a total of \$430 million to a new electric vehicle incentive program, which includes \$4,000 for each vehicles, and \$1,000 for charging equipment.

IMMEDIATE EXPENSING FOR CLEAN ENERGY EQUIPMENT

Announced by the Canadian government in its 2018 Fall Economic Statement, the Canada Revenue Agency has adopted Immediate Expensing for companies for clean energy equipment. Simply stated, this means that companies do not need to use multi-year depreciation formulae after making capital investments in clean energy equipment. Instead they can write off 100% of the cost in the first year against their tax bill.

The OGA and HRAI sought and received confirmation from the Finance Minister's office late in 2018 that this provision includes geothermal equipment. This is seen as potentially very helpful for inducing companies to invest in geothermal. A similar program was used in the USA and it has been said it helped the rooftop solar business to really explode there. OGA members are encouraged to learn more about the incentive and promote it when pitching potential customers.

TORONTO GREEN STANDARD WILL ELIMINATE GAS BY 2030

The OGA has been working with the City of Toronto to ensure that key managers are up to date on technologies, projects, geothermal capabilities and industry views about our low carbon future. We invited Fernando Carou Manager, Community Energy Planning & Low-Carbon Energy Systems, City of Toronto Environment & Energy Division to make a presentation at the 2019 OGA conference. He confirmed what had earlier been suggested in an interview with Samantha Menard, Manager of the Energy Team at EQ Building, an engineering consultant that worked with the City of Toronto on some of the details of the most recent version of the Toronto Green Standard (TGS).

Both Menard and Carou asserted that as the evolving Toronto Green Standard continues to phase in, it will become virtually impossible to design new buildings with gas heat by 2030.

This is very good news for geothermal and other clean energy technologies, that are now key components in large multi-unit residential and commercial projects being planned in Toronto and the surrounding region. Projects in downtown Toronto, Markham and Mississauga are already including large geothermal systems, as they face modern challenges with greenhouse gas emissions and more and more regulations like the TGS.

The Toronto Green Standard was first implemented in 2006, with Version 2 introduced in 2014, and Version 3 in 2018. Each version contains Tier 1 measures that are mandatory, and voluntary measures under other Tiers. However, the voluntary measures are strong clues as to what will become mandatory in future versions, providing useful guidance to the development community.



HRAI SYMPOSIUM – DAVID MILLER

Discussions like this are taking place with other Ontario cities which will cover regulations for new construction and perhaps existing buildings too. Such changes could create a robust geothermal retrofit market in the coming years. A similar message was delivered regarding the regulatory trend among cities around the world, by former Toronto Mayor David Miller when he spoke during 2019 at the HRAI symposium.

He indicated that Toronto, Vancouver and Montreal were among 18 large cities worldwide which had pledged to go carbon neutral by 2030, and have already laid out concrete plans such as bylaws, building & energy standards, mandatory auditing, retro-commissioning, building ratings, benchmarking, reporting requirements, incentives and other actions. Miller is now the North American Director for the C40 Cities Climate Leadership Group, which connects 90 of the world's top cities, representing 650 million people. He said that, as a whole, this group is projecting peak emissions by 2020 and carbon neutrality by 2050.

ONTARIO GOVERNMENT

President Stan Reitsma and other representatives of the OGA and the HRAI met during 2019 with members of the new government in Ontario. Following the cancellation of Ontario's Cap and Trade agreements and the GreenOn program, the provincial government is seeking ways in which it can support energy efficient technologies and a strong economy in Ontario. The OGA floated several possible initiatives and will provide updates to OGA members as these discussions continue.