GAS IS NOT GREEN: WHY GAS DOES NOT BELONG IN A CANADIAN SUSTAINABLE FINANCE TAXONOMY

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Does Anyone Think that Gas is Green?

Certain members within the Canadian government and the financial sector have advocated to label oil and gas-related investments as sustainable, contrary to the counsel of international energy economists, climate specialists, and scientists[1] [2]. This report explores why investments in 'natural' gas are incompatible with limiting global warming to below 1.5 degrees Celsius and therefore should not be designated as a sustainable investment.

Background - What is this Taxonomy?

In 2021, the Canadian government tasked a Sustainable Finance Action Council (SFAC) to recommend parameters for a taxonomy that would define and label which projects or investments credibly align with achieving net-zero emissions by 2050. Its goal would be to mobilize private investment for the government's 2030 and 2050 climate commitments[3] [4], draw positive attention to sustainable projects to increase investments, and provide clarity to help investors avoid greenwashing from unsustainable projects.

In 2023, SFAC released its recommendations in a Taxonomy Roadmap report. The report noted that coal, new oil fields, and industrial projects that fail to significantly reduce emissions should be ineligible for the sustainability label.[5] The group recommended that any eligible project must establish a net-zero transition plan that is grounded in science, including emission reductions targets for 2030 aligned with achieving net-zero emissions by 2050. Eligible projects must contribute to long-term efforts to limit global warming to below 1.5 degrees Celsius. While criteria for the qualifying industries and projects is still under review, there is concern about potential inclusion of 'natural' gas under the sustainability label.[6]

Introducing The 'Natural' Polluting Greenhouse Gas

'Natural' gas, despite its innocuous nickname[7], is a fossil fuel and non-renewable resource. It contributes significantly to global warming and climate change. Between 85-95 per cent of 'natural' gas is methane, combined with other hydrocarbons including ethane, propane and butane. Methane has a global warming potential 83 to 87 times greater than carbon dioxide over a 20-year period.[8] It is responsible for 30 per cent of the current global temperature rise to date and over 14 per cent of Canada's annual greenhouse gas emissions.[9]

During the transportation of 'natural' gas, significant methane leaks often occur. When burned, it creates carbon-dioxide – meaning throughout its production and use, it contributes various forms of harmful greenhouse gasses. Given the potent global warming potential of methane and the frequency of methane leaks during transportation, the full lifecycle emissions from ‘natural’ gas can exceed the emissions from coal.[10]

Methane ‘Natural’ Gas Should Not Receive the Sustainability Label

The proposed sustainability labelling system, known as a taxonomy, aims to clarify which investments align with Canada succeeding on its climate commitments.

However, to credibly deliver on this goal, the determination of whether a project or industry is deemed ‘sustainable’ or ‘not’ must reflect leading scientific and economic analyses related to limiting global warming below 1.5 degrees Celsius. Activities related to the extraction, use, and export of 'natural' gas are not aligned. Including ‘natural’ gas in the sustainability label would invalidate the taxonomy’s credibility and utility.

Climate change is made worse by ‘natural’ gas – there is no such thing as ‘green’ gas

There are three main commercial stages of ‘natural’ gas within Canada: the extraction and production, use for energy, and export and transportation for sale. Despite gas not being sustainable nor aligned with climate action at any of these commercial stages, Canadian oil and gas companies have made efforts to advocate that ‘natural’ gas should be considered sustainable.[11]

First, regarding production, the International Energy Agency clearly states “no new oil and gas fields [can be] approved for development”[12] in the scenario that limit global warming below 1.5-degrees. The extraction and processing of oil and gas is the largest source of emissions in Canada[13], and is a major reason Canada has failed to meet historical emission reduction targets.[14] At a provincial level, such as in British Columbia, ongoing ‘natural’ gas extraction is similarly responsible for undelivered climate commitments.[15]

Second, the use of ‘natural’ gas in Canada occurs primarily through combusting gas for power generation, heating, or industrial purposes. This stage of activity is also not aligned with climate action, since ‘natural’ gas creates carbon dioxide when combusted. In Ontario for example, electricity sector emissions have significantly risen in recent years due to tripled usage of ‘natural’ gas, and are projected to increase 400 per cent by 2030 due to this increased reliance.[16] New policies across the country aim to reduce emissions by limiting ‘natural’ gas use in electricity and heating. For example, the forthcoming Clean Electricity Regulations effectively direct the phase out of ‘natural’ gas in power generation.[17] For heating, similarly, cities including Montreal and Nanaimo are banning gas connections for new construction of homes.[18] [19]

Third, the exportation and sale of 'natural' gas is likewise not sustainable. Yet within the Canadian taxonomy, the export and sale of 'natural' gas has the largest risk of being deceptively labelled as sustainable.

A common argument from interest groups such as the Canadian Association of Petroleum Producers is that exporting liquified 'natural' gas (LNG) to Asian countries would displace global use of coal.[20] However, exporting LNG from Canada to Asia is shown to have overall negative impacts on climate action, increasing emissions both in Canada and globally. Exporting LNG is more likely to displace new renewables than to displace existing coal.[21] And furthermore, coal-fired electricity within China results in up to 18.5 per cent fewer emissions than LNG exported from British Columbia to Asia.[22]

The high emissions from transported LNG are in part due to methane leaks, known as fugitive emissions, during the export process. These methane leaks are usually underreported[23], and have been demonstrated to be over seven-times higher than officially reported numbers.[24] Considering these underreported leaks, exported LNG may be even worse than existing research suggests when compared with coal.

Each of the three commercial stages of 'natural' gas – extraction and processing (i.e. upstream greenfield projects), use in power generation for space heating or industry (i.e. downstream infrastructure and utilities), and export and transportation – are not sustainable. Each stage results in emissions that are inconsistent with limiting warming below 1.5-degrees, and should therefore not be eligible for the sustainable finance label.

Including 'natural' gas would squash the Taxonomy's international credibility

Canada frequently positions itself as a global climate leader, including on climate finance[25], and hopes to attract international investment for a green economy.[26] Delivering a sustainable finance label that is inconsistent with the goals of the Paris Agreement would be a step in the wrong direction. Decision makers overseeing a Canadian taxonomy have a responsibility to ensure the label only applies to projects that are truly aligned with climate goals.

'Natural' gas extraction and transportation are ineligible under nearly every global sustainable finance labelling system, including in the European Union and other key trading partners of Canada.[27] The European Union faced legal suits for including nuclear and 'natural' gas power generation under its green label.[28] Youth climate activists like Greta Thunberg shamed the European Parliament for including 'natural' gas for power generation, tweeting "#NotMyTaxonomy".[29] Canadian decision makers should note this negative public response when considering inclusions in a Canadian taxonomy.

In the scenarios to limit warming below 1.5 degrees, "there are no new oil and gas fields approved for development"[30], and global demand for oil and 'natural' gas would plateau then decline.[31] Experts highlight that wealthy countries like Canada have to cut output of oil and gas by 74 per cent by 2030 and end production by 2034.[32]

To maintain international credibility of a Canadian taxonomy, decision makers have a responsibility to ensure eligible projects truthfully align with limiting warming below 1.5-degrees.

Labelling 'natural' gas as sustainable would be inconsistent with the global principle to Do No Significant Harm

Under global taxonomies like that of the European Union, a project or investment labelled sustainable has an obligation to 'do no significant harm' (DNSH) to other environmental and social factors.[33] In Canada, it is similarly recommended that "if a project violates the DNSH criteria, it would be ineligible for taxonomy financing. For example, a project categorized as green, which causes significant (non-climate) environmental damage, would be ineligible."[34]

Further investments in 'natural' gas would create social harms. Respecting workers and communities (i.e., pursuing a just transition) requires being clear and transparent about the transition away from oil and gas that is inevitable to maintain a safer climate. A just transition in Canada means implementing a managed phase out of fossil fuels.[35]

A Taxonomy in Canada must respect the rights of Indigenous peoples and comply with the United Nations Declaration on the Rights of Indigenous Peoples Act. Historically in Canada, gas projects have created harm to Indigenous communities, disrespecting rights, land and title. For example, the Coastal Gas Link Pipeline related to the Kitimat export facility has caused significant harm and proceeded without the consent of Wet'suwet'en hereditary leaders.

Stranded assets occur when a project or investment loses its value earlier than expected. Canada faces over $100-billion of stranded asset risks due to Canadian investors moving too slowly on the climate transition.[36]

The Minister of Energy and Natural Resources, Jonathan Wilkinson, shared "skepticism about how many more LNG facilities are going to be required" and highlighted "the risk of stranded assets is a real one" in Canada.[37] A sustainability labelling system is supposed to create confidence in the credibility and rigour of green investments; misleadingly including 'natural' gas as sustainable would put the Canadian economy at risk of greater stranded assets.

Canada Can Only Succeed on Climate Action if Finance is Held Accountable to Align with Climate

Canada can only achieve its climate commitments under the Paris Agreement if the financial sector aligns with credible climate action, and policymakers must set new rules and guidance to achieve this. The Canadian financial system is not aligning with climate action through voluntary measures, as indicated by greenwashing lawsuits currently under evaluation by the Competition Bureau.[38]

Canada was recognized as a "low-regulation jurisdiction by international standards" on sustainable finance by a United Nations affiliated responsible investment report.[39] Other regions like the European Union and United Kingdom have included sustainable finance policy as a keystone pillar of their climate policy packages. Canada has committed to climate action under the Paris Agreement, and enshrined a net-zero commitment under the Net-Zero Emissions Accountability Act.[40] Aligning the financial system with climate action remains the missing piece of Canada's climate plan. A sustainable finance labelling system is one piece of the policy package that is necessary to advance a financial system in Canada that aligns with climate action.[41] To have utility, the labelling system must be credibly aligned with limiting warming below 1.5-degrees; exclude fossil fuels; and link to other new corporate and financial sector disclosure regulations.

Conclusion

A taxonomy is a tool to credibly define which projects and investments are sustainable. If the labelling system includes fossil fuels like 'natural' gas, the tool would muddy the waters rather than clarify them.

Consisting of over 85 per cent methane, 'natural' gas has a high global warming potential, and is a significant contributor to worsening climate change. The global credibility of a taxonomy is key to its utility, and including 'natural' gas in Canada's version would invalidate the effort. While this research brief has focused on why 'natural' gas is not sustainable, no fossil fuel related activity should credibly qualify for the sustainability label.[42] In a letter to the federal government, over fifty climate expert groups highlighted the importance of not labelling any fossil fuels or related carbon capture, utilization and storage (CCUS) as sustainable.[43]

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