

April 9, 2020

The Honourable Chrystia Freeland  
Deputy Prime Minister and Minister of Intergovernmental Affairs  
House of Commons  
Ottawa, ON  
K1A 0A6

**Re: The Clean Fuel Standard (CFS)**

Dear Minister Freeland,

On behalf of its member companies, the Canadian Hydrogen and Fuel Cell Association (CHFCA) joins the Clean Fuel Standards Association in strongly supporting the implementation of the Clean Fuel Standard (CFS) as scheduled. The CFS will provide the necessary regulatory underpinning to stimulate investment in low-carbon fuel projects, including hydrogen energy projects. Implementation of the CFS is one of the key recommendations by the CHFCA to support hydrogen energy implementation, (Attachment 1). Delay in the implementation or reduction in the targets of the CFS would severely harm the hydrogen and fuel cell sector, the economy, and Canada's ability to achieve its commitment to carbon neutrality by 2050.

To support industry in achieving and exceeding the targets, the CHFCA recommends that stimulus spending be directed to projects that help achieve the CFS CO<sub>2</sub> reduction targets. Such stimulus spending will put Canadians back to work and put essential infrastructure in place for the transition to a carbon-neutral economy.

The oil sector is undoubtedly suffering as a result of the COVID-19 crisis and low global oil prices, as has been pointed out by both the Canadian Refiners Association and the Alberta government. It is understandable that they would seek to avoid the burden of major capital expenditures in oil processing equipment to further lower the carbon intensity of the fossil fuels produced under these challenging circumstances.

Fortunately, the CFS provides flexibility, and obligated parties can choose to avoid capital burden by purchasing low-carbon feedstock such as hydrogen or biofuels. They can also purchase credits generated by the deployment of clean transportation applications such as hydrogen fuel cell electric vehicles (FCEVs) or vehicles fueled by biofuels. In these situations, the investment is by other parties. Further, these investments are of course exactly the type of actions that will provide the long-term solutions needed to achieve net neutrality by 2050.

It should also be pointed out that the fossil fuel sector can be a big winner by selling hydrogen and renewable fuels. Over the past decade, the sector has made major strides in lowering the carbon intensity of oil production – helped in part by significant federal and provincial investment. Low-carbon intensity hydrogen, produced from natural-gas combined with carbon capture and storage/sequestration (CCS) of the CO<sub>2</sub> or solid carbon produced, has played a large and growing role. Costs for CCS have been reduced and the sector is currently the global low-cost producer of low-carbon intensity hydrogen with the opportunity to participate in the huge global market for this emerging heating and transportation fuel.

Finally, we respectfully remind the Government of Canada that our country need not choose between the oil and gas industry and the clean technology industry. This is because to be successful and to meet our policy objectives, both industries must converge. In fact, the oil and gas extraction industries will provide key low-cost feedstock for the clean energy sector that will be required as Canada meets its domestic markets and looks to lead global export markets in clean energy. Maintaining the CFS will promote this convergence that will ultimately make our oil and gas sector more robust in the future and will position Canada as a clear global energy leader.

Examples of stimulus projects that would help achieve CFS targets and benefit the Alberta oil sector are shown in Attachment 2.

Repeated experience has shown that without a policy driver, industry and the public will not switch to cleaner alternatives. On the other hand, experience has also shown that once a policy is in place, (sulfur emissions, CFC emissions, chlorinated organic emissions from pulp mills, smog emissions from cars, etc.), the cost of compliance is typically lower than expected due to technological and/or business innovation.

For these reasons, the CHFCA encourages the Government of Canada to maintain the course on the CFS and to support implementation with directed stimulus spending.

Thank you and please stay safe in these challenging times.

With my regards,



Mark Kirby  
President & CEO

The Canadian Hydrogen and Fuel Cell Association

Cc: The Clean Fuel Standard Association  
The Conservative Party of Canada  
The New Democratic Party of Canada  
The Green Party of Canada  
The Bloc Québécois  
CHFCA Members

**Attachment 1:** Recommendations by the Canadian Hydrogen and Fuel Cell Association (CHFCA) to support the commercialization of Hydrogen Energy in Canada

## Why Hydrogen Energy?

### It is Canadian

- It will maintain Canadian hydrogen and fuel cell leadership that dates to 1915, with the associated investment, jobs and exportable technology.

### It is Inclusive

- It provides a path forward for energy sector across Canada, including the Oil & Gas sector, by supporting clean power generation, decarbonizing fossil fuel production and providing a new product for domestic and foreign markets;
- Industries can transform and thrive in a low-carbon environment by incorporating cost-effective hydrogen and fuel cell technologies for heating, processing and transportation;
- It provides a choice for consumers: safe, reliable gaseous fuel for heating and vehicles that meet their performance, range and fueling preferences;
- It enables First Nations-led projects in hydrogen production, distribution and application.

### It is Essential for Net-zero 2050

- Studies worldwide, including those by the Canadian federal government, have confirmed that hydrogen is an essential complement to energy efficiency, clean power production, electrification, bioproducts, carbon capture and utilization, and battery technology.
- Hydrogen enables the decarbonization of challenging sectors such as steel, chemical & fertilizer production, industrial & residential heating, and transportation – particularly heavy-duty transportation

## What is needed?

1. Visible senior government support, as summarized in Why Hydrogen Energy?;
2. Early implementation of the Clean Fuel Standard, to stimulate industrial processing, heating and transportation applications for hydrogen;
3. Support for hydrogen infrastructure – pipelines, liquefiers and HFS – by de-risking investment: especially through guaranteeing demand;
4. Support for sector transformation through task forces to target specific sectors that are ready for transformation to hydrogen energy: buses, residential/commercial heating, trucks, etc.;
5. Subsidies for early adopters of ZEV to help transform key sectors, as exemplified by the Infrastructure Canada ZEV bus program;
6. Stimulus support for lighthouse projects that lay the groundwork in key geographies, (e.g.: North Van/Burnaby; Northern Alberta; Quebec/Montreal; Metro Toronto), for the conversion of multiple industries in the area to hydrogen energy.

**Attachment 2:** Examples of CFS stimulus lighthouse projects that would achieve significant GHG benefits, position Canada for leadership AND benefit the oil and gas sector:

- Further extension of existing hydrogen and CO<sub>2</sub> pipelines in Northern Alberta to link major hydrogen/CO<sub>2</sub> producers, users and sequestration sites, providing low cost and secure low-carbon hydrogen to generate CFS credits through decarbonization of major sectors:
  - Oil sands producers and processors: for the decarbonization of hydrotreating and desulfurization operations, steam production and heavy haul ore carriers;
  - Chemical and fertilizer production;
  - Power utilities: for decarbonization of power production in coal/NG power plants;
  - Major urban centres, such as Edmonton, for decarbonization of heavy-duty trucking and municipal transportation (buses, trucks, rail);
  - Residential / Commercial natural gas pipeline grids, to lower the carbon content of residential/commercial heating.
- A hydrogen pipeline from Northern Alberta to BC, Vancouver and tidewater, linking low-carbon hydrogen production in Northern Alberta, renewable Power to Hydrogen projects in BC and major demand points, generating CFS credits through:
  - Export of low-carbon hydrogen fuel from Alberta oil producers;
  - First Nations-led Power to Gas projects on traditional lands;
  - Decarbonization of mines and communities along the route;
  - Low-cost, low-carbon hydrogen to decarbonize Lower Mainland heating and transportation applications;
  - Export sales to foreign markets;
- A hydrogen pipeline linking Northern Alberta with Calgary, Southern Alberta and the USA, providing similar benefits as above.