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The Right Honourable Justin Trudeau, P.C., M.P. Prime Minister of Canada Langevin Block Ottawa, ON K1A 0A2

Members of the Cabinet Committee on Environment, Climate Change and Energy:

The Honourable Stéphane Dion
The Honourable Chrystia Freeland
The Honourable Lawrence MacAulay
The Honourable Carolyn Bennett
The Honourable Navdeep Singh Bains
The Honourable James Gordon Carr
The Honourable Catherine McKenna
The Honourable Amarjeet Sohi
The Honourable Hunter Tootoo
The Honourable Kirsty Duncan

Date: 17<sup>th</sup> of November, 2015

Dear Prime Minister Trudeau and members of the Cabinet Committee on Environment, Climate Change and Energy:

We write to honour and thank you for your stated commitment to action on climate change, and your decision to attend the upcoming COP 21 conference in Paris. In choosing to reverse a decade of inaction on climate change you and your Cabinet have taken on the mammoth task of not only preparing for the conference – in less than a month from taking your oath of office – but also in guiding crucial conversations within the cabinet, and with the provinces, to develop a credible, science-based climate change strategy for our nation.

The urgent purpose of sending you this letter is to ask that you not support the Site C dam as part of Canada's climate strategy presented at the Paris conference.

We believe that the Site C dam will be a net contributor to climate change both directly and indirectly. The dam is strongly opposed by Treaty 8 First Nations, as well as local governments across the province (by unanimous resolution of the Union of B.C. Municipalities), labour and civil society groups. In addition to its severe impacts on First Nations, which the Joint Review

Panel<sup>1</sup> found "cannot be mitigated", there are severe ecosystem impacts including massive biodiversity loss in an area already suffering extreme cumulative impacts from existing and planned resource extraction.

In the lead-up to COP 21, Canada's Intended Nationally Determined Contribution (INDC) states that it will use "low-impact hydro" as one of its "investments to encourage the generation of electricity from renewable energy". Please recognize that Site C cannot be remotely considered low-impact hydro. It would flood over 100 kilometres of valley bottom, triggering a release of methane for many decades to come. Large dams are a globally significant source of methane emissions<sup>2</sup>, a source that countries are required to acknowledge and count under IPCC guidelines.<sup>3</sup> At the same time, the dam would destroy the carbon sequestration and biodiversity services and functions of what is a largely intact pristine ecosystem.

As for indirect emissions, the B.C. government has said that the dam is needed to power the development of the LNG industry based on natural gas extracted by hydraulic fracturing. The climate impacts of unconventional ("fracked") gas and LNG are as bad as those of coal.<sup>4</sup> Meanwhile, financial experts agree that the window of opportunity for new LNG projects has closed due to supply glut.<sup>5</sup> Finally, it is unacceptable to incur the lost opportunity costs of investing at least \$9 billion in one outdated technology rather than supporting a forward-looking investment in implementing truly green technologies for the future.

Flooding the Peace valley for Site C would mean a significant loss of prime valley bottom alluvial soils with a high organic matter content and therefore a significant carbon sink for biosequestration.<sup>6</sup> According to FAO, agricultural soils are among the planet's largest reservoirs of carbon and hold potential for expanded carbon sequestration, thereby mitigating climate change (Hansen et al., 2008)<sup>7</sup>.

Site C also poses a potential threat to the Peace Athabasca Delta – Wood Buffalo National Park, a World Heritage Site, and itself a significant carbon sink. The threat prompted the UNESCO World Heritage Committee, at its session in Bonn on July 1, 2015, to launch an investigative mission to Canada and request the federal government to suspend any resource projects in the region that would cause irreversible impacts, pending the result of the investigation.

In addition to these direct and indirect harms, Site C dam would significantly hamper any meaningful attempts to increase food security, resilience and adaptation to climate change. The uniquely productive alluvial soils and microclimate of the Peace valley are capable of producing sufficient fruits and vegetables to meet the nutritional needs of one million people ever year in perpetuity.<sup>8</sup> This represents one quarter of the B.C. population.

<sup>&</sup>lt;sup>1</sup> Report of the Joint Review Panel, https://www.ceaa-acee.gc.ca/050/documents/p63919/99173E.pdf.

<sup>&</sup>lt;sup>2</sup> http://pubs.acs.org/doi/pdf/10.1021/es501871g

<sup>&</sup>lt;sup>3</sup> http://www.ipcc-nggip.iges.or.jp/public/2006gl/pdf/4 Volume4/V4 p Ap3 WetlandsCH4.pdf

<sup>&</sup>lt;sup>4</sup> http://www.eeb.cornell.edu/howarth/publications/Howarth 2014 ESE methane emissions.pdf

<sup>&</sup>lt;sup>5</sup> http://business.financialpost.com/news/energy/window-of-opportunity-for-new-lng-projects-is-gone-because-of-supply-glut-consultancy-says

<sup>&</sup>lt;sup>6</sup> http://www.fao.org/soils-portal/soil-management/soil-carbon-sequestration/en/

<sup>&</sup>lt;sup>7</sup> http://www.fao.org/fileadmin/templates/solaw/files/thematic reports/TR 04b web.pdf

<sup>&</sup>lt;sup>8</sup> "Diminished and Dismissed", expert report by agrologist Wendy Holm, P.Ag. submitted to the Joint Review Panel on Site C.

According to the latest IPCC report, warming temperatures will lead to lower crop yields and lower overall food production. British Columbia is currently highly dependent on food imports from California and other areas that are experiencing severe, ongoing drought and loss of productive capacity. The prices of imported fruits and vegetables are quickly rising and this trend is predicted to continue. To ensure availability of fresh, local produce to Canadians, a meaningful climate adaptation strategy needs to give special status to protecting the productive capacity of food-producing lands.

In closing, we ask that the federal government recognize that Site C is not a climate solution, and that it not give support to the BC government in Paris regarding Site C. Federal support for Site C would negate attempts to restore our international reputation as an important contributor to international efforts to mitigate climate change. When combined with strong opposition from Treaty 8 First Nations, and international concern over the rights of indigenous peoples in Canada and UNESCO's pending investigation into impacts to the Wood Buffalo National Park, Canada's support for this megaproject would interfere with achieving many of the goals you have set for your government and the country.

We respectfully request that the question of Site C dam be taken off the table for any negotiations in Paris.

Jef Keighly, Alliance4Democracy

Peter Wood, Canadian Parks and Wilderness Society

Andrea Morison, Peace Valley Environment Association

Ken Boon, Peace Valley Landowners Association

Bob Peart, Sierra Club BC

Joe Foy, Wilderness Committee

Wendy Francis, Yellowstone to Yukon Conservation Initiative

<sup>&</sup>lt;sup>9</sup> http://www.theguardian.com/environment/2014/mar/31/climate-change-threat-food-security-humankind