



RETA c/o 23324 Township Road 515, Sherwood Park, AB T8B 1L1

January 5, 2011

Honourable Rob Renner  
Minister of Environment  
Room 425, Legislature Building  
10800 – 97 Avenue  
Edmonton, AB T5K 2B6

Dear Minister Renner:

**Re: Environmental Impact Assessment for Proposed Heartland Transmission Project**

We were inspired by your January 4, 2011 letter to the *Edmonton Journal* editor (<http://www.edmontonjournal.com/opinion/letters/committed+comprehensive+monitoring+environment/4055334/story.html>) which ended with, and I quote, “We have no intention of diminishing our efforts at a time when Albertans rightfully expect us to step up and protect their health and their environment.”

RETA (Responsible Electricity Transmission for Albertans) appeals to you and requests that you apply this most laudable intention to appropriate health and environmental oversight of the construction of the proposed Heartland Transmission Project.

Based on Alberta Environment’s website, Alberta Environment is responsible for ensuring that large-scale industrial and resource development projects do not adversely affect Alberta’s environmental quality. Environmental assessment is required where the complexity and scale of a proposed project, technology, resource allocation, or siting conditions:

- create uncertainty about the exact nature of environmental effects, or
- result in a potential for significant adverse environmental effects.

Alberta Environment fulfills the above-mentioned responsibilities by requiring formal Environmental Impact Assessments pursuant to a number of regulations under the *Environmental Protection and Enhancement Act*, including the *Environmental Assessment Regulation*.

As you are aware, the Heartland Transmission Project is a proposed 500kV double circuit electricity transmission line from Lake Wabamun to the Industrial Heartland. This project would certainly qualify as a large-scale industrial development project, since it has been characterized by

the Alberta Government and the Alberta Electric System Operator as linking coal-fired electricity generation at Lake Wabamun to proposed oil sands upgrading at the Industrial Heartland. As well, the complexity and scale of the proposed project, technology and siting conditions create uncertainty about the exact nature of environmental and health effects and result in a potential for significant adverse environmental and health effects.

However, in April 2008, the Alberta Government passed amendments to the *Environmental Assessment (Mandatory and Exempted Activities) Regulation*, which among other changes, exempted all electricity transmission lines from the requirement for formal Environmental Impact Assessments. Prior to this amendment, Environmental Impact Assessments for lines of 500kV or greater were mandatory and those less than 130kV were exempt. **It is important to note that the Minister of Environment retains the authority under the *Environmental Protection and Enhancement Act* to require an Environmental Impact Assessment, even with the exemption.**

For reasons cited above and as follows, RETA requests that, pursuant to your Ministerial authority, you require the transmission facility operators to prepare a formal Environmental Impact Assessment pursuant to provincial legislation for their preferred and alternate routes for the Heartland Line:

- The proposed Heartland Transmission Project would be the largest overhead high voltage power lines and towers ever built in Alberta (500kV double circuit with 73-metre-tall towers). Environmental impacts of such large lines, including the standard elements of environmental, public health and safety, and socio-economic impact assessments, have never been reviewed before in Alberta.
- The Heartland Transmission Project is the first project to be considered under the “critical transmission infrastructure” legislation passed by the Alberta Government in November 2009.
- Significant natural areas, environmentally sensitive areas and protected areas are situated along and adjacent to both of the proponents’ preferred and alternate routes that would be adversely affected by the proposed Heartland Line. Many species of birds and mammals would be negatively impacted. A number of species at risk, rare species and species of special concern are found along both routes (see RETA Fact Sheets #10a and #10b at [www.RETA.ca](http://www.RETA.ca)).
- There are many documented negative effects of overhead high voltage power lines and their associated electromagnetic fields on wildlife, livestock and vegetation. For example, about 175 million birds are killed annually in the U.S. alone, crashing into power lines and towers. Studies in the Netherlands and U.S. have estimated 214 and 124 bird deaths, respectively, per kilometer of overhead power line per year (see RETA Fact Sheets #11, #19 and #20).
- There are well documented causal correlations between overhead high voltage power line electromagnetic fields and dozens of diseases and other health problems including: leukemia, many other forms of cancer, Alzheimer’s disease, miscarriage and birth defects, suicide and depression, heart problems, immune system deficiencies, and many more (see RETA Fact Sheets #1, #2a, #2b, #2c, #3, #5a, #5b, #5c, #12, #13, #14a, #14b, #16, #17, #21, #25, #27). As well, there is a growing body of knowledge about the negative health effects of pollutant-laden corona ions downwind of overhead high voltage lines (see

RETA Fact Sheet #24). Research on all of these health risks is reported in well respected peer-reviewed scientific and medical journals.

- Many safety concerns about overhead high voltage power lines have been reported in the public and scientific literature including: electric shocks, pipelines, lightning, tornadoes, ice storms and weather deterioration (see RETA Fact Sheets #15, #22, #23).
- With respect to socio-economic impacts, overhead high voltage power lines have been reported to depreciate home property values by up to 38% and agricultural properties between 16% and 29% (see RETA Fact Sheet #9).
- The environmental assessments including public health, safety and socio-economic impact information required by the Alberta Utilities Commission are extremely insufficient and significantly less rigorous than those required by your department under the *Environmental Protection and Enhancement Act*.

RETA makes this request on behalf of its over 8,000 registered members and many other Albertans who have expressed concerns to us about the negative impacts of the proposed overhead Heartland Line on the environment, public health and safety, and property values along the transmission facility operators' preferred and alternate routes. As is the case with other formal Environmental Impact Assessments, we ask that the transmission facility operators be required to make the requested Environmental Impact Assessment available for public review as part of its Facility Application to the Alberta Utilities Commission.

We would appreciate receiving a written response to this request at your earliest convenience, and we trust that your department will protect our health and environment as you so eloquently stated in your recent letter to the *Edmonton Journal*.

Sincerely yours,

Original Signed

Bruce Johnson  
President, RETA

cc: All Alberta MLAs  
Alberta Utilities Commission