

POWERING ALBERTA'S ECONOMY: The Alberta NDP's submission on the AUC inquiry into the ongoing economic, orderly and efficient development of electricity generation in Alberta





INTRODUCTION

A global boom in renewable energy is (or net-zero) economy by 2050 and the currently underway. The International Energy province has already made strides in Agency (IEA) estimates investment in solar lowering the greenhouse gas footprint of Alberta's electricity system. This has been will overtake investment in oil and gas as \$1.8 trillion will be invested globally in clean accomplished through the phase out of coal, energy and infrastructure this year alone. This setting a target of 30 per cent renewable investment is expected to roughly double by energy generation by 2030, and the creation of the Renewable Electricity Program (REP) 2030 as nearly half of the world's electricity that set a record low price for renewables in supply will come from renewable energy. Canada and has led to significant growth in renewables since 2019 with \$5 billion flowing into the province and the creation of 5,500 iobs.

This growth in renewables has been driven by government policies as jurisdictions move towards a net-zero economy by 2050 and provide incentives for the development of low-emissions energy. As the first step in As can be seen in figure 1 below, Alberta is achieving net zero by 2050, G7 countries rapidly increasing its installed capacity of have committed to decarbonizing their grids both wind and solar. Alberta is not alone in by 2035. This includes the United States, this rapid development of wind and solar largely as a result of the confluence of rapid Canada's largest competitor and trading cost reductions and the desire for lowpartner, which has also implemented gamechanging incentives to attract investment into emissions electricity with stable fuel costs. renewables through the Inflation Reduction Act.

The Government of Alberta has stated it intends to achieve a carbon-neutral



FIGURE 1: ALBERTA WIND AND SOLAR CUMULATIVE CAPACITY (DATA SOURCE: AESO)

As can be seen in figure 2, the United States is experiencing similar growth rates, and the Energy Information Agency (EIA) reported that energy from renewables overtook both <u>coal and nuclear in 2022</u>. Annual net changes in U.S. electric power sector generating capacity (2018-2024) gigawatts



FIGURE 2: ANNUAL NET CHANGES IN U.S. ELECTRIC POWER SECTOR GENERATING CAPACITY (2018-2024) (SOURCE: EIA, 2023)

Alberta has been the most attractive market for renewable energy in Canada with our abundant natural resources, the arowing need for low-carbon, affordable generation and the entrepreneurs in Alberta making investments to help diversify rural communities' economies. However, the government's seven month ban on renewables threatens to squander this opportunity and the progress made to date. In fact, the Pembina Institute estimates there are 118 projects at various stages of development across the province, totalling \$33 billion in investment, 24,000 jobs, and \$263 million in land lease payments and local taxes.

The growth in wind and solar as well as the issues facing development are not unique to Alberta, and could have been anticipated without shutting down an entire industry with an abrupt moratorium that will impact Alberta's reputation as an investment destination. In fact, many companies have already voiced their concerns on the lack of investor certainty in Alberta.

"We do have growth plans in Alberta (but) I can't justify them right now. I will spend our time and effort elsewhere."

- Grant Arnold, CEO, BluEarth Renewables

"Unfortunately, the proposed moratorium risks diverting our resources away from Alberta towards more predictable

jurisdictions, compromising both our investments and the province's economic growth."

- Nu-E Corp

"The almost seven-month unplanned and unprecedented pause implemented by the Alberta government will have significant negative implications on the proposed project, and overall investment and development confidence in Alberta." - SPWC Development Group

"The moratorium will result in severe uncertainty among investors, jeopardizing billions of dollars of investment in Alberta. All the options below will create significant negative outcomes, as a total moratorium on approvals with no warning or discussion with stakeholders causes disruption to in-flight projects worth billions of dollars."

- Renewable Energy Systems Canada

"Such arbitrary change to regulation does not reflect the stable investment climate that attracts development and construction investors and lenders and makes other provinces and international jurisdictions more appealing."

- Dunmore Solar

"The regulatory delay places undue burden on the project economics, placing investment and jobs in jeopardy." - Aira

Governments around the world — and throughout history — have managed to review and improve regulations as new science and data come to light. This does not require a ban or a pause or any total shut down, not in Alberta or anywhere else. Investing in Alberta in good faith based on the existing laws should not be subject to a government changing the rules without consultation or warning. While this damage has been done, the AUC should not compound it by setting precedents of imposing rules on



1. RECLAMATION SECURITY

Alberta has rearettably allowed for a massive unfunded liability from orphan oil and gas wells. As the provincial government has correctly pointed out, we cannot let the mistakes of the past be repeated. As such, reclamation liabilities need to be urgently and equitably addressed across all types of energy development in Alberta commensurate with their scale, financial risks and threats posed to public health and environmental impact.

Landowners do have every right to expect any energy project developed on their lands are safely reclaimed after their operating lives, and it is reasonable to expect reassurances that companies will be viable to reclaim the land and pay taxes and lease agreements given the Rural Municipalities Association (RMA) has reported "rural municipalities are owed approximately \$268 million in unpaid property taxes from the oil and gas industry" as of 2023.

As outlined in the EcoVenture report to the AUC, the Texas Utilities Code, Title 6, Chapter 301 and 302 for wind and solar respectively have models which can be adapted for Alberta where a 3rd party professional engineering assessment is made on or before the 10th year of operations. The report includes reclamation costs as well as the

specific sectors that are not equitably applied across other areas of development. The principles of fairness and level plaving fields are applied to the avestions raised in this inguiry.

A fair, stable, and workable framework for renewable energy is in everyone's best interest to attract the low emissions investment needed in Alberta to keep the system reliable, affordable, and low-emitting.

salvage value of equipment and materials in order to provide adequate information for private landowners and municipalities to understand the scale of any anticipated costs. In Texas, the EcoVenture report states "evidence of financial assurance must be provided to the landowner" in terms of a ⁱminimum investment grade credit rating for the parent company issued by a major domestic credit rating agency, a letter of credit, a bond, or another form of financial assurance reasonably acceptable to the landowner."

In addition, it is important to recognize the true cost of reclamation. While the premier has claimed it costs \$1 million per wind turbine, the AUC's own external report cites the cost to be between \$74,000 and \$180,000 after a wind turbine reaches end of life and after 30 years in operation. Moreover, wind turbines' steel towers are valuable as raw material once the turbine is decommissioned and can be used for other purposes, while functional components often continue to have after-market value.

Retroactive application of any securities would need to be equitably applied to all energy development ranging from coal plants, to hydro dams, gas pipelines, oil wells and oil sands tailings.

2. DEVELOPMENT ON AGRICULTURAL AND ENVIRONMENTAL LANDS

Agriculture is an important industry in Alberta that has supported our province's economy for generations. At the same time, the industry is under growing pressure to produce higher yields for a growing population with limited amounts of land. This demand must be balanced with other forms of economic development.

However, the Government of Alberta does not have a history of prescribing what type of economic choices private landowners make on specific soil types such as what crops they choose to grow or animals they raise.

Renewable energy offers income diversification opportunities for farmers who are subject to intermittent revenue streams throughout the course of the year, and price and yield variability from year-to-year depending on the weather. Restricting renewable energy development on specific soil types may create economic disadvantages for farmers looking to diversify their revenue sources.

It is also worth noting that while it is important to evaluate land use, private landowners have the final say on their land. Renewable energy companies cannot build projects or start any type of operation on private lands without the approval of the landowner, which is different from the oil and gas industry.

At the same time, it is important to minimize environmental and shared land use impacts to the extent possible. Alberta Environment and Parks' has wildlife directives for both wind and solar projects that can be used to ensure sensitive lands are protected and impacts are mitigated.

Furthermore, consultation with rural municipalities in Rule 007 (Applications for Power Plants, Substations, Transmission Lines, Industrial System Designations, Hydro Developments and Gas Utility Pipelines) should be required earlier in the process to ensure local decision makers are consulted to address local land use and planning challenges in the early stages of project development.

While vitally important, food is not the only crop that farmers may choose to grow, nor does the government place mandates on the use of crop choices. Crops are already grown today for end uses ranging from insulation, to bioplastics, to biofuels. Restricting land uses by soil type sets a precedent for governments dictating to landowners what crops are acceptable. It also creates a perverse incentive for a landowner who may want a renewable energy project to degrade their soils over time by not following best practices to prevent things like topsoil erosion.



Renewable energy is one of the few types energy and wildlife directives for both wind of energy types whose development is not and solar energy can also be adapted for permitted on Crown land. Again, there is no renewable energy projects on crown land to need for this restriction to apply to renewable balance ecological impacts and economic development. Enabling renewable energy energy when it does not apply to other types of energy development. Permitting on crown land can help distribute renewable that allows for oil and aas development on energy production over geographically crown lands can be adapted for renewable diverse weather patterns.

4. PRISTINE VIEWSCAPES

Alberta has long looked to balance economic development with environmental protection. Alberta's rural landscape is covered in economic development activities from farmlands, to roads, to grain silos, to oil and gas infrastructure and transmission lines. Defining what is pristine and what is not must





be applied consistently, fairly, and clearly in the energy sector as whole. As is the case for all economic development choices, this definition must be balanced against public benefits and should be applied consistently without targeting one particular sector over another.



CONCLUSION

Alberta plays an important role in energy supply in Canada, and has been a leader in renewable energy development. The opportunities for economic diversification as well as emissions reductions are at risk if Alberta government intervention unevenly targets one sector.

As renewable energy has grown, Alberta should strive for continuous improvement on how it manages this development, including for the benefit of Albertans without the risk of deterring investment in the province. As the RMA has stated: "Rural municipalities are leaders in piloting alternative and renewable energy technologies on community facilities. Not only have these technologies assisted rural municipalities and residents in lowering their long-term energy costs, but they also contribute to mitigating the impacts of climate change."

Renewable energy is not unique in balancing competing land uses, and while it needs to be developed in a socially and environmentally responsible way, restrictions that target one particular energy type sets unwanted precedents and will deter future investment, drive up power bills, and put jobs at risk.