## **MANITOBA HYDRO'S**

# **CLIMATE CHANGE STRATEGY**

## **CLIMATE CHANGE AFFECTS US ALL**

International efforts like the Paris Agreement bring humanity closer to solutions, but realities like increased greenhouse gasses in our atmosphere and continued global industrialization mean that some climate change effects are inevitable. Manitoba Hydro's interaction with climate change is two-way: we can be impacted by physical changes in the climate and our operations can impact greenhouse gas emissions that contribute to climate change.

- As earth's climate changes, our environment is also changing, which can affect our water supply, infrastructure, energy demand, and other things. These effects of climate change may require us to adapt in order to continue meeting Manitobans' energy expectations.
- Renewable energy like hydropower is environmentally friendly and helps mitigate climate change. We continually strive to maintain our leadership in reducing global greenhouse gas emissions.

### **5 STRATEGIES HELP SHAPE OUR RESPONSE**



#### **UNDERSTAND**

Earth's climate is warming and temperature changes affect many of the planet's natural processes like precipitation, streamflow and wind patterns. We collaborate with leading researchers and apply rigorously reviewed scientific knowledge to more thoroughly understand historical climate records and future climate projections.





AVERAGE
AMERICAN
UTILITY'S
CO<sub>2</sub> PER GWh
473
TONNES



AVERAGE
CANADIAN
UTILITY'S
CO<sub>2</sub> PER GWh
144
TONNES



MANITOBA HYDRO'S CO<sub>2</sub> PER GWh 1.3 TONNES 2

#### **REPORT**

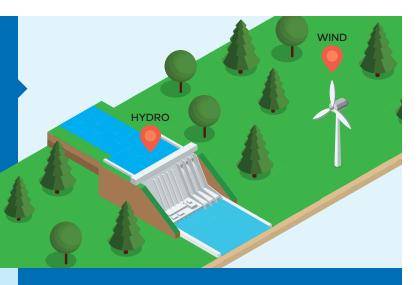
Canadian governments now require large companies to report their greenhouse gas emissions, but we began voluntarily reporting in 1995. Reporting on emissions helps us see how we're doing and find out how we can improve.



#### **REDUCE**

Greenhouse gas emissions cause climate change. By relying as much as possible on renewable resources including hydro instead of fossil fuels, Manitoba Hydro is reducing global emissions. The Keeyask hydroelectric generating station is under construction and we have ceased all generation using coal as fuel.

Our hydro energy is often abundant and hydropower systems offer flexibility. Exporting extra electricity to neighbouring provinces and states can help reduce their emissions, too.







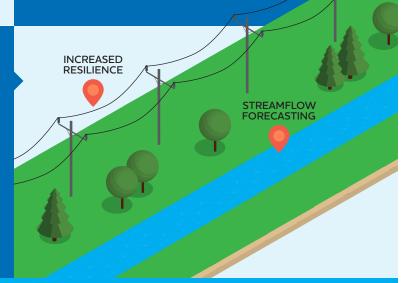
#### **SUPPORT**

Everyone needs to help reduce greenhouse gas emissions. Through engagement with governments, industry groups, non-government organizations, and other stakeholders, we support the development of policies that reduce emissions and help mitigate climate change. Our support also includes openly sharing the technical knowledge and experience we've gained over decades.



### **ADAPT**

Whether it's increasing our system's resilience or enhancing our streamflow forecasting capabilities, applying climate information helps us reduce weather-related risks, manage reliability, and capitalize on opportunities. We're continuing our work to identify, assess, prioritize and study climate change's effect on our world and our business. Areas of interest include energy generation, energy demand, environmental sustainability, and infrastructure.







Manitoba Hydro is committed to helping the world reduce emissions and mitigate the effects of climate change. As the climate continues to change, we are adapting our processes to ensure we continue delivering reliable, renewable energy to Manitobans

#### hydro.mb.ca/environment

Email: corporatecommunications@hydro.mb.ca Available in accessible formats upon request.

Manitoba Hydro

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