

Minnesota's 100% carbon-free energy proposal doesn't make sense for **YOUR ELECTRIC COOPERATIVE** members

Policymakers in Minnesota are pursuing a potentially dangerous proposal that would mandate all electricity sold in the state be produced by carbon-free resources by 2040.

YOUR COOPERATIVE has a long history of environmental stewardship and supports efforts to lower carbon dioxide (CO₂) emissions. However, a mandate that requires radical transformation of our electricity system has the strong likelihood of creating power reliability challenges and rate affordability issues.

The complexity and difficulty in achieving a carbon-free electric grid cannot be understated. No single technology, power source or approach will be sufficient on its own. It will take an all-of-the-above strategy and many technological breakthroughs occurring rapidly in the coming years.

Here are five things to consider about Minnesota's 100% carbon-free energy proposal.

1 You – our members – are better positioned to make decisions for **YOUR COOPERATIVE** than legislators in St. Paul.

As a member-owner, you have a voice in how your cooperative operates and the decisions that are made through the board of directors you elect. This board is made up of local people who are friends and neighbors in your community – not Twin Cities legislators. Local decision-making is vitally important to ensure you receive reliable, affordable and sustainable electricity. What might work in Minneapolis may not be right for our region.

2 **YOUR COOPERATIVE's** power supply mix already includes significant renewable resources and work is being done to further decarbonize.

Approximately 42% of the power generation capacity provided to our members is generated by carbon-free resources, including wind (34%) and hydro (8%). Minnesota Power Cooperative, **YOUR COOPERATIVE'S** wholesale power provider, is also evaluating Project Tundra, which would equip a North Dakota power plant with one of the largest carbon capture systems in the world. If the project moves forward (a decision is anticipated within the next year) Minnesota would be one of the fastest decarbonizing utilities in the U.S.

3 Electric grid reliability is at risk.

Rolling blackouts have taken place in other parts of the country, including Texas and California. Minnesota is not immune to these challenges and the lack of reliable resources could exacerbate an already strained grid. Grid regulators, including the North American Electric Reliability Corporation (NERC), anticipate significant electricity shortfalls over the next 10 years as coal, nuclear and natural gas generation retire faster than replacement resources are connected. This has the potential to create grid reliability issues and more frequent outage events.

4 Wind, solar and batteries are currently incapable of meeting the 24/7 demand for electricity.

While wind and solar resources provide zero-emissions energy, they are also limited by the fact that they cannot operate on a

frequent enough basis to stabilize the electric grid by themselves. Backup resources are still needed for when the wind doesn't blow and the sun doesn't shine. While many are optimistic about the future of battery storage technology, it is still in its infancy at grid scale. Large battery banks can currently only dispatch energy into the grid for a few hours at a time, when multiple days of backup power can be needed.

5 Extreme cold weather in our region creates challenges.

Minnesota's electricity resources need to be prepared for both 110-degree summer days and 40-below-zero winter nights. Extreme cold temperatures create specific challenges due to the dramatic increase in electricity usage and the lack of production from wind and solar facilities, which are prone to shutdown in 20-below-zero conditions. Resilient resources, like coal and nuclear, are still required to meet electricity demand during these volatile weather events.

What can I do?

Contact your state representatives and senators (visit gis.lcc.mn.gov/iMaps/districts/ to find out who represents you) and encourage them to prioritize electric reliability and affordability when considering energy-related proposals. The 100% carbon-free energy by 2040 proposal is virtually impossible to meet with existing technology. If mistakes are made as the energy transition continues forward, they will be extraordinarily difficult to reverse. Instead of implementing burdensome mandates, the state should develop ways to help utilities access new clean energy funding available in the federal Inflation Reduction Act.