



Pathway to 2030: Reducing Greenhouse Gas Emissions

The Northern California Power Agency (NCPA) and our 16 members are diligent in doing our part to reduce emissions to achieve the State’s goal of 40% below 1990 greenhouse gas emissions levels by 2030. According to the California Air Resources Board’s latest *Greenhouse Gas Emissions Inventory*, the State reached its 2020 greenhouse gas emissions target level in 2016. The electricity generation sector achieved the most significant reduction, dropping its emissions by 18% that year. As we push for even greater emissions reductions, NCPA members are proactively taking strides in the areas of renewable energy, electric vehicles, energy efficiency, and advanced technologies:

Investing in Renewable Energy

In 2017, approximately 37% of NCPA members’ retail electricity sales came from renewable energy sources – far exceeding the State’s mandated 33% target for 2020 and positioning members well to meet the 60% by 2030 requirement.

NCPA’s commitment to renewable energy extends for decades, with members making early investments

in the development of geothermal and hydroelectric resources. Both projects will continue to provide clean, renewable power to our member communities for decades to come.

NCPA is currently developing a combined 23 megawatts of community solar projects to serve six NCPA member communities. These projects allow utility customers who may not have otherwise been able to install solar directly on their homes or businesses to buy or lease solar

NCPA is in the process of developing a combined 23 megawatts of community solar projects to serve six NCPA member communities.

panels from a centralized solar project and receive credits for the solar generation on their utility bills. Economies of scale are achieved by working through NCPA, providing members with access to clean energy at a lower cost. Furthermore, some NCPA members are also evaluating the potential for pairing their community solar with onsite energy storage to capture additional renewable capacity that can be dispatched when the sun is not shining.

Promoting Electric Vehicles

NCPA members are actively supporting the deployment of electric vehicles and charging infrastructure in their communities through engagement in State policymaking and use of customer incentive programs. The California Air Resources Board’s Cap-and-Trade and Low Carbon Fuel Standard (LCFS) programs provide critical funding for publicly owned utility transportation electrification efforts and play an instrumental role in facilitating the State’s transition to five million zero emission vehicles on the road by 2030.

As of January 2018, NCPA member communities had over 8,700 battery electric and plug-in

hybrid vehicles registered in their service areas. This could generate more than one million dollars in revenues through the LCFS program and allow for re-investment of funds in furtherance of increased transportation electrification in NCPA member service areas.

Achieving Energy Efficiency Savings

NCPA members collectively spend approximately \$20 million each year on energy efficiency programs, reducing electricity consumption by nearly 50 gigawatt-hours annually. Member program offerings serve the residential, commercial, and industrial sectors and include programs such as appliance, lighting, and HVAC rebates; free energy audits; support for low-income customers; and customer education efforts. Through sharing best practices with one another, NCPA members evaluate new customer programs that could lead to even greater energy savings.

NCPA members collectively spend approximately \$20 million each year on energy efficiency programs, reducing electricity consumption by nearly 50 gigawatt-hours annually.

Evaluating Advanced Technologies

As technologies advance, our members are continually assessing options for the use of innovative technologies in their utility operations. Assembly Bill (AB) 2514 (Chapter 469, Statutes of 2010) directs utilities to evaluate the use of energy storage in their communities. Pursuant to this legislation, our members regularly analyze the extent to which cost-effective energy storage technologies could be used to meet their system needs. These ongoing evaluations take into account a utility's resource mix, peak demand and climate zone, transmission infrastructure, other available resources, and economies of scale. NCPA is also supporting its members with the development of programs for deploying advanced metering infrastructure or "smart

meters." Working with contractors that have proven successful at implementing advanced metering infrastructure on a national scale, our members can benefit from the lessons learned and best practices of other utilities.