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PROJECT CLIMATE

CALIFORNIA CLIMATE POLICY FACT SHEET: RENEWABLES PORTFOLIO STANDARD

Established in 2002, California's Renewables Portfolio Standard (RPS) requires electricity providers (i.e., utilities, cooperatives, and community choice aggregators) to ensure that renewable energy constitutes a specified minimum portion of their electric load. Since then, the state Legislature has modified, increased, and accelerated the RPS several times, resulting in one of the most ambitious renewable energy standards in the country: investor-owned electric utilities (IOUs) must serve 33 percent of their electric load by 2020, and 60 percent of their electric load by 2030, with renewable energy. This California Climate Policy Fact Sheet outlines the basic components and legal background of the RPS program.

Goals of California's RPS Program:
The California Public Utilities Commission (CPUC) and the California Energy Commission (CEC) jointly implement the RPS program. The goals of the program include:

- Displacing fossil fuel use;
- Building new renewable power plants;
- Reducing greenhouse gas (GHG) emissions;
- Ensuring reliable operation of the electrical grid; and
- Promoting customer affordability through stable customer rates.

The RPS program has helped California significantly reduce GHG emissions from electric power generation even as the state's population and economy have continued to grow. The electricity sector's emissions have dropped by 50 million tons of CO_2 equivalent since the RPS was introduced, now constituting 16 percent of California's total emissions (compared to 28 percent nationwide).

California RPS Program Features:

- The RPS program encourages the development of renewable energy resources to meet California's electricity demand. The program sets increasing targets for the percentage of renewable energy that retail electricity providers must procure based on multi-year compliance periods.
- The program uses Renewable Energy Credits (RECs) to determine compliance with RPS requirements. Retail electricity providers earn one REC for each megawatt hour (MWh) of generation procured from an RPS-eligible resource. RPS compliance is measured in terms of RECs procured as a percentage of total MWh of electric retail sales.
- RPS-eligible resources include solar, wind, geothermal, small hydroelectric, or biopower facilities that are located within the Western Electricity Coordinating Council (WECC) region, which encompasses fourteen western U.S. states and portions of Canada and Mexico. The majority of RPS-eligible electricity currently comes from solar and wind. Large hydroelectric dams and nuclear facilities, two major sources of carbon-free power, are not RPS-eligible.
- An electricity provider that procures excess RECs in a given compliance period can use them for compliance in subsequent compliance periods.
- Extensive systems of verification from both the CPUC and the California Energy Commission (CEC) ensure that retail electricity providers are complying with RPS requirements or are penalized accordingly.

Evolution of the California RPS Program:

- Senate Bill 1078 (Pub. Util. Code § 387 et al.) established the RPS. The bill required electricity providers to increase procurement of electricity from renewable energy sources by at least one percent per year with the goal of reaching 20 percent renewables by 2017.
- Senate Bill 107 (Pub. Util. Code § 399.15 et al.) accelerated the 20 percent RPS requirement from 2017 to 2010.
- Senate Bill 2 (1X) increased the RPS to 33 percent renewables by 2020 with compliance period targets of 20 percent by 2013 and 25 percent by 2016.
- Senate Bill 350 extended the RPS to 50 percent by 2030, with interim targets of 40 percent by 2024 and 45 percent by 2027. In addition, the bill requires that 65 percent of RPS procurement must be derived from long-term contracts (10 years or more) starting in 2021.
- Senate Bill 100 increases the RPS to 60 percent by 2030, with new interim targets of 44 percent by 2024 and 52 percent by 2027 as well. The bill further requires that all of the state's electricity come from carbon-free resources (not only RPS-eligible ones) by 2045.

Other Key California Renewable Energy Policies:

California has also enacted a number of additional laws that support the state's renewable energy goals, including:

- SB 32 and SB 2 (1X) (Pub. Util. Code § 399.20 et al.) established an IOU procurement program for small RPS-eligible resources (up to 3 megawatts) through a Renewable Market Adjusting Tariff (ReMAT). The ReMAT program was halted by a federal court in the 2017 case *Winding Creek Solar LLC v. Peevey* and is currently being litigated in the Ninth Circuit U.S. Court of Appeals.
- SB 1122 (Pub. Util. Code § 399.20 et al.) establishes another IOU procurement program for small bioenergy RPS-eligible resources (up to 5 megawatts) through the Bioenergy Market Adjusting Tariff (BioMAT).
- Governor Jerry Brown's 2015 Emergency Order Addressing Tree Mortality and SB 859 (Pub. Util. Code § 399.20.3 et al.) called upon the CPUC to aid in mitigating the threat of wildfires by instituting utility procurement from bioenergy facilities using forest fuel supplied from wildfire high hazard zones. The CPUC initiated the Bioenergy Renewable Auction Mechanism (BioRAM), requiring 175 megawatts of statewide procurement.

Key Outcomes and Next Steps for California RPS Policy

According to the CPUC, all retail sellers of electricity either met or exceeded the 2018 RPS (29 percent) and are on track to achieve their current compliance period requirement of 33 percent by 2020. In addition, the state's three large IOUs procured nearly 40 percent of their electricity from RPS-eligible sources in 2017 and are "on track" to meet the 2030 standard (60 percent). Significant renewables procurement is expected to occur statewide through 2030, especially as a result of the SB 350 long-term contract requirement starting in 2021. As California's energy market continues to evolve, ensuring compliance of renewables targets with new and emerging electricity providers is necessary to meet the goals of the RPS program. California's ambitious RPS and clean energy targets have achieved nation-leading renewable energy procurement and position the world's fifth-largest economy to strive toward 100 percent carbon-free electricity—an example that other states, and nations, can follow.