

Community choice aggregators are local government agencies that purchase and may develop power on behalf of their communities to exercise local control over power mix and rates. For example, CCA members can determine the amount of renewable resources, or cleaner energy, from wind, geothermal, biomass, solar and small hydro to make up their power mix in support of their respective CAP goals.

MCE Clean Energy (MCE) is an authorized CCA by the California Public Utilities Commission. They have invited Solano County to join its Joint Powers Authority (JPA) at no-cost through an expedited inclusion period ending September 15, 2018. MCE currently provides service in the City of Benicia and is approaching other cities in Solano County about participation.

After receiving a presentation from MCE, the Board can choose to implement a CCA in unincorporated Solano County and request membership in MCE; or request further analysis of the ramifications of CCA implementation, including impacts on PG&E.

FINANCIAL IMPACT:

There is no cost to join MCE; all expenses associated with public outreach, load data analysis, and noticing requirements are waived. However, if Solano County (County) decides to withdraw from the JPA, there may be an appropriation increase from General Fund Contingencies to cover the cost of power that MCE has procured on behalf of unincorporated County customers. A possible exception is if another local government becomes a member at the time of withdrawal and can assume the costs associated with those contracts. Similarly, PG&E will collect a Power Charge Indifference Adjustment every month from all MCE customers to cover the cost of energy contracted to purchase prior to CCA participation by the County.

Additionally, there is no cost to the County with regards to the adoption of the ordinance or resolution other than the staff time involved to prepare the documents. Staff time to participate in, and support, Climate Action Plan measures and actions is borne by the Department of Resource Management's General Fund budget.

DISCUSSION:

CLIMATE ACTION PLAN

The General Plan adopted by the Solano County Board of Supervisors (Board) on August 5, 2008 and by the Solano County Voters on November 4, 2008 required the development of a Climate Action Plan (CAP). The CAP identifies actions to reduce greenhouse gas emissions to at least 20% below 2005 baseline emission levels by 2020, as required by Assembly Bill 32 - the Global Warming Solutions Act of 2006. It was adopted by the Board on June 7, 2011.

The CAP includes a GHG inventory divided into five emission sectors: Transportation, Energy, Agriculture, Water, and Solid Waste. Each sector includes a set of recommended measures and actions with an associated GHG reduction potential. Energy makes up 42% of the total reduction plan. Of all the recommended measures in the energy strategy, participation in a CCA has the single-most GHG reduction potential but at the highest cost to the County (estimated at \$250,001, or greater, at the time of CAP adoption).

COMMUNITY CHOICE AGGREGATION

Pursuant to Assembly Bill 117 (Statute 2002, Chapter 838; see California Public Utilities Code section 366.2), any California city or county, whose governing body so elects, is authorized to combine electricity load of its residents and businesses in a CCA. A CCA is subject to the regulations governed by the California Public Utilities Commission (CPUC) and is involved only in the source acquisition of electrical generation, not the transmission and distribution of electricity.

Since 2011, the CPUC has approved 18 CCAs to-date making it far simpler and economical to join an existing CCA. Unlike an investor-owned utility like PG&E, or a municipal utility like Sacramento Metropolitan Utility District, a CCA does not own the transmission and delivery systems but is responsible for buying and generating electrical power on behalf of its customers. The CCA may own electric generating facilities, but

more often, it purchases renewable power from private electricity generators such as G2 Energy (G2).

In 2013, a partnership between G2 and Recology Hay Road Landfill (RHR) was secured to construct a landfill gas-to-energy conversion facility on the RHR site. The methane, or landfill gas, that RHR used to flare is now captured, processed, and sold by G2 as biogas to a CCA through a long-term contract. This is a key benefit of a CCA because participating jurisdiction(s) can exercise local control over the amount of renewable energy that makes up their generation portfolio in direct support of their GHG reduction goals. Renewable energy sources include biomass, biowaste, bioenergy, geothermal, hydropower, wind, and solar. According to the U.S. Energy Information Administration, "U.S. renewable energy sources accounted for nearly 20% of the country's net electrical generation during the first half of 2018 and narrowly beat out that provided by nuclear power."

MCE CLEAN ENERGY

This past July, MCE invited unincorporated Solano County to join its CCA through an expedited inclusion period ending September 15, 2018. MCE is the longest-serving CCA in California and currently provides service to all of Marin and Napa Counties, most of Contra Costa County, and the City of Benicia for a total of 33 local governments; all of whom have a seat on the MCE Board of Directors. MCE is a not-for-profit, public agency that serves as an alternative to PG&E for power mix electric supply only.

MCE offers an electric power mix of 50% renewables at a cost of 2-5% less than PG&E, or 100% renewables at a premium rate. If Solano County decides to participate, State law requires MCE to be the default electric generation provider. However, customers may opt out anytime and continue electric service with PG&E.

MCE, like PG&E, is funded by electricity ratepayers through their monthly energy purchases, not by taxpayers. A cornerstone to MCE's mission is to redirect ratepayer dollars back to local economies, and reinvest in its communities by providing low, stable rates, supporting local workforce development, and partnering with community-based organizations.

MCE RENEWABLES PORTFOLIO

MCE primarily sources from non-polluting renewables such as solar, wind, geothermal, bioenergy, and hydroelectric. They offer two service options based on 50% or 100% renewable sources for electric generation. Currently, MCE customer rates are billing at 2-5% less than PG&E for electric generation. However, the charges for metering, gas service, energy delivery, and power line maintenance are still charged and billed as usual by PG&E. This results in a slight change to MCE customers since they still receive the same PG&E bill that they always have but with the addition of a single line item on Page One under Account Summary that says, "MCE Electric Generation Charges".

PG&E RENEWABLES

PG&E's portfolio is mostly natural gas and nuclear sources. In June 2018, PG&E filed a Power Source Disclosure with the CPUC. PG&E reports it has met the State mandate of 33% renewables by 2020 and is actively working toward 50% renewables by 2030 as required by Senate Bill 350. The renewable power mix includes wind, geothermal, biomass, solar, and small hydro. The remainder of its power mix includes 27% nuclear, 18% large hydro, 20% natural gas, and 2% unspecified. Additionally, PG&E does offer its customers 100% solar electricity but also for a premium like MCE.

MCE RATES

MCE offers two service options based on 50% or 100% renewable sources for electric generation. Depending on a customer's rate class, MCE's 50% renewable option costs 2-5% less than PG&E's 33% renewable portfolio standard which is required of all investor-owned utilities by 2020 (Executive Order-S-14-08). These charges are not static and will change in response to market conditions. Both MCE and PG&E also offer 100% renewable at a premium.

The MCE Board intends to keep rates as competitively-priced as possible otherwise customers are more likely to opt out. MCE knows they cannot guarantee a percentage by which MCE rates will be lower than PG&E, or

that they will always be lower at any given time. The MCE/PG&E rate comparison is a moving target because it is subject to PG&E's rate-setting processes which are out of the control for any CCA.

Historically-speaking, MCE does have a track record of lowering its rates to remain below those of PG&E; it has done so the previous two years by about 9% and 3.7%. As part of its mission, MCE desires to provide electricity customers with rate stability which is why MCE typically only changes rates once per year, if at all. PG&E rates have historically changed about three to five times per year.

MCE OPT-OUT

State law requires CCAs to be the primary electric generation provider in the service area if a local government decides to participate, rather than the investor-owned utility such as PG&E. As the primary provider, customers receive service from a CCA by default but may opt out to continue service from the investor-owned utility. MCE's customer base has grown to over 450,000 customers with an average opt-out rate of 15%. Participation in MCE will subject all of unincorporated Solano County residents, businesses, and agricultural facilities to automatic enrollment unless they take action to opt-out to remain, or return, to PG&E. While opting-out can occur at any time, the customer may not return to service with a CCA for up to one-year. The Solano County CAP calculated the GHG reduction potential of unincorporated Solano County participating in a CCA to be 23,170 metric tons of carbon dioxide equivalent per year based on a 25% opt-out rate.

MCE PUBLIC OUTREACH

Over the last month, MCE met with local agricultural groups and hosted a public workshop to introduce the concept of a CCA while also giving everyone an opportunity to learn more about MCE. Public outreach included a brief overview to the Solano County Agricultural Advisory Committee on August 8 and Solano Resource Conservation District Board on August 13. Both groups presented neutral on the subject matter and were encouraged to attend the public workshop for more program details. The in-person community meeting was open to all unincorporated residents and businesses. MCE developed and funded a direct mail invite to 7,314 addresses provided by Solano County GIS. The meeting was held at 6:00 p.m. on Monday, August 20 and approximately 20 people were in attendance. MCE organized and staffed informational tables for the public to receive specific information related to community outreach, billing, energy-efficiency programs, renewable resources, solar net metering (solar energy producers are credited for the energy produced from arrays), and governance structure.

PG&E POWER CHARGE INDIFFERENCE ADJUSTMENT

PG&E collects a Power Charge Indifference Adjustment (PCIA) to cover the cost of the energy that PG&E contracted to purchase on the customers' behalf prior to them becoming a CCA customer. In April 2017, PG&E and the other two investor-owned utilities (Southern California Edison and San Diego Gas & Electric) filed a proposal with the California Public Utilities Commission to change the way that the PCIA fee is calculated. They proposed a new methodology called Portfolio Allocation Method which places more of the burden for the costs of the unneeded power on CCA customers. If approved, it is likely to impact the rates of all CCAs.

OTHER CCAs

California CCAs have been formed by a collection of multiple jurisdictions to create a Joint Powers Authority to administer the CCA, energy efficiency programs, and other greenhouse gas emission reducing activities. Potential benefits of the CCA include: providing customer choice and establishing greater local control over electrical generation providers and policies, expanding renewable energy portfolios, enhancing local economic development, and implementing the CAP.

There are currently six CCAs in the greater Bay Area and Sacramento Valley that initiated after MCE in 2010: Sonoma Clean Power (2014), CleanPowerSF (2015), Peninsula Clean Energy (2016), Silicon Valley Clean Energy (2017), East Bay Community Energy (2017), and Valley Clean Energy (2018). Currently, CCAs account for 13% of electrical demand on PG&E's grid and that is expected to increase to 38% by 2020.

According to MCE, current forecasts show that CCAs, behind-the-meter solar, and direct-access providers will

serve 85% of California's retail load by 2025. At the same time, there is a rapid transition away from fossil fuels for power generation.

ALTERNATIVES:

The Board of Supervisors could take one of the following actions upon conclusion of the presentation by MCE Clean Energy (MCE):

- a) Introduce an Ordinance to authorize implementation of a CCA in unincorporated Solano County and approve the MCE Joint Powers Agreement; Adopt a resolution requesting membership in MCE; and Authorize the County Administrator, or designee, to execute the Memorandum of Understanding and all other MCE-related documents. This option provides for MCE to prepare and plan for service start-up in 2020.
- b) Continue the item to another date for further consideration and direct staff to return with additional analysis of other CCAs for comparison. This option delays service until 2021, or later.
- c) Remain with Pacific Gas and Electric as the sole energy provider.

OTHER AGENCY INVOLVEMENT:

County Administrator's Office has reviewed this report and concurs with the Department's recommendations. County Counsel has reviewed the Ordinance, Resolution, Joint Powers Agreement, and Memorandum of Understanding.

CAO RECOMMENDATION:

APPROVE DEPARTMENTAL RECOMMENDATION