CITY OF SAN JOSE
CAPITAL OF SILICON VALLEY

Memorandum

TO: HONORABLE MAYOR AND CITY COUNCIL

FROM: Lori Mitchell

SUBJECT: 2021 POWER MIX AND RATES

DATE: November 2, 2020

Approved D. DSyL

Date 11/5/20

RECOMMENDATION

Adopt a resolution:

(a) Establishing a power mix of at least 40% renewable energy for San José Clean Energy's (SJCE) GreenSource base product beginning January 1, 2021; provided that 1) in 2021 GreenSource is priced at an initial 0.25% discount, with flexibility to vary the discount between 0.0% and 1.0%, for all customers relative to Pacific Gas and Electric Company's (PG&E) generation rates after accounting for the franchise fee surcharge and the Power Charge Indifference Adjustment; and 2) SJCE's 100% renewable energy TotalGreen product will continue to be 0.5-1 cent per kWh higher than GreenSource; and

(b) Authorizing the City Manager or his designee to prepare and submit an Advice Letter to the California Public Utilities Commission to administer the Disadvantaged Communities-Green Tariff program.

OUTCOME

Approving the resolutions will result in SJCE offering the product options and rates in Table 1 below. GreenSource will continue to be the default product that customers receive. SJCE's 100% renewable option, TotalGreen, will continue to be verified and marketed to customers to ensure progress on Climate Smart goals.

Approving the resolution will allow SJCE to maintain minimum reserve levels to ensure financial stability and continue to achieve high participation rates in SJCE.

Depending on the result of regulatory proceedings, approving the resolution will result in a change in CO_2 emissions from SJCE customers in 2021 ranging from a decrease of 100,000 metric tons to an increase of 550,000 metric tons compared with CO_2 emissions from the Council approved SJCE electricity mix generation in 2020 (45% renewable and 86% carbon-free).

Table 1. Outcomes of Recommendation

	GreenSource
Renewable energy content	At least 40%
Rate relative to PG&E	Initial 0.25% discount for all customers with flexibility to vary discount between 0.0% and 1.0%

Submitting the Advice Letter to administer the Disadvantaged Communities-Green Tariff program will result in approximately 500 low-income customers in disadvantaged communities receiving an additional 20% discount on their electricity rates, expected to begin sometime in 2022, funded by Public Purpose funds collected and administered by the California Public Utilities Commission.

EXECUTIVE SUMMARY

City Council unanimously approved the formation of SJCE in May 2017, and SJCE launched service to most businesses and residents in February 2019. SJCE sources electricity from clean resources like solar and wind, while PG&E continues to distribute electricity, maintain powerlines, respond to power outages, and provide customer billing.

Since February 2019, generation rates for SJCE's default GreenSource service have been 1% lower than PG&E's rates, inclusive of the Power Charge Indifference Adjustment (PCIA) and Franchise Fee Surcharge (PG&E added fees), for all customers. In 2020, the GreenSource power mix was planned to be at least 45% renewable and 86% carbon-free.

All California electric customers pay the PCIA fee to cover above market generation costs of investor-owned utilities (IOUs). SJCE customers only pay for those above market costs attributable to generation acquired prior to being enrolled in SJCE. PG&E's PCIA has risen over 600% between 2013 and 2020 and is expected to rise again in 2021.

To alleviate financial impacts from an increasing PCIA, SJCE recommends adjusting the 2021 GreenSource power mix and rates. Staff recommends setting the 2021 GreenSource rates at an initial 0.25% discount, with flexibility to vary between 0.0% and 1.0%, inclusive of PG&E added fees. SJCE customers will not pay higher rates than PG&E. SJCE's 100% renewable product, TotalGreen, will continue to be 0.5-1 cent per kWh higher than GreenSource and marketed to customers to ensure progress on Climate Smart goals.

Staff recommends offering a GreenSource product with a minimum renewable content of 40%. ***The GreenSource carbon-free content is likely to increase to 92%, if the CPUC approves PG&E's resource allocation in 2021.*** While the proposed renewable content would decrease by 5% compared to 2020, 40% is higher than the state's Renewable Portfolio Standard of 36% by 2021 and PG&E's anticipated renewable content (which is expected to be close to the state requirement). Reducing the renewable content of GreenSource in 2021 is also expected to reduce power supply costs. The emissions impact of the staff recommendation and other alternatives are summarized in Table 2 below. The alternatives are discussed in greater detail later in the Policy Alternatives section of this memorandum.

Table 2. Projected CO_2 emissions (in metric tons)

	2020 Council approved Power Mix (*45% renewable, 86% carbon-free)*	**Proposed 2021 Power Mix *(40% renewable, 53%-92% carbon-free)****	Alternative 1 (2021) *(45% renewable, 100% carbon-neutral)*	Alternative 2 (2021) *(45% renewable, 58%-97% carbon-free)*	Alternative 3 (2021) *(New product for residential - 55% renewable, 75%-100% carbon-free)*
CO_2 emissions	235,000	**135,000-785,000**	0**	50,000-710,000	0**-704,000

**Carbon-free content for 2021 is highly dependent on allocation of PCIA resources from PG&E.*
***This is estimated on an annual basis and relying on carbon-free attributes to achieve carbon neutrality. There would be some emissions associated with this alternative if estimated on an hourly basis.*

In addition to changing the 2021 GreenSource power mix and rates, this memorandum seeks approval to implement a Disadvantaged Communities-Green Tariff (DAC-GT) program. The DAC-GT program is a CPUC-funded program that provides customers in disadvantaged communities an additional 20% discount on their electricity bill. The program contributes to San José's equity work by increasing access to the benefits of renewable energy among customers that otherwise cannot afford it.

The memorandum also provides an update on a direct renewables program for San José. SJCE is evaluating the implementation of a direct renewables program, which sources energy generation "directly" from renewable resources for specific customers. Customers will receive competitive pricing and meet sustainability goals, while SJCE would benefit from more predictable loads and increased investment in new renewables.

BACKGROUND

On November 7, 2017, City Council approved an ordinance to add Title 26 to the San José Municipal Code that provides procedures for the operation and management of SJCE. Under Title 26, SJCE may provide any rate designs or programs as approved by the City Council.

On November 6, 2018, the City Council approved SJCE to set rates for the GreenSource product to be one percent below PG&E generation rates, after accounting for the franchise fees and the Power Charge Indifference Adjustment across all rate classes for 2019.

On April 16, 2019, the City Council approved enrolling small commercial customers in June 2019.

On December 10, 2019, the City Council approved SJCE to establish a power mix of at least 86 percent carbon-free energy with at least 45 percent renewable energy for the GreenSource product starting January 1, 2020. SJCE's GreenSource product continued to be one percent below PG&E generation rates, after accounting for the franchise fees and the Power Charge Indifference Adjustment across all rate classes for 2020. City Council also waived opt-out fees for SJCE customers and approved the final phase of customer enrollments for residential and small commercial Net Energy Metering customers.

ANALYSIS

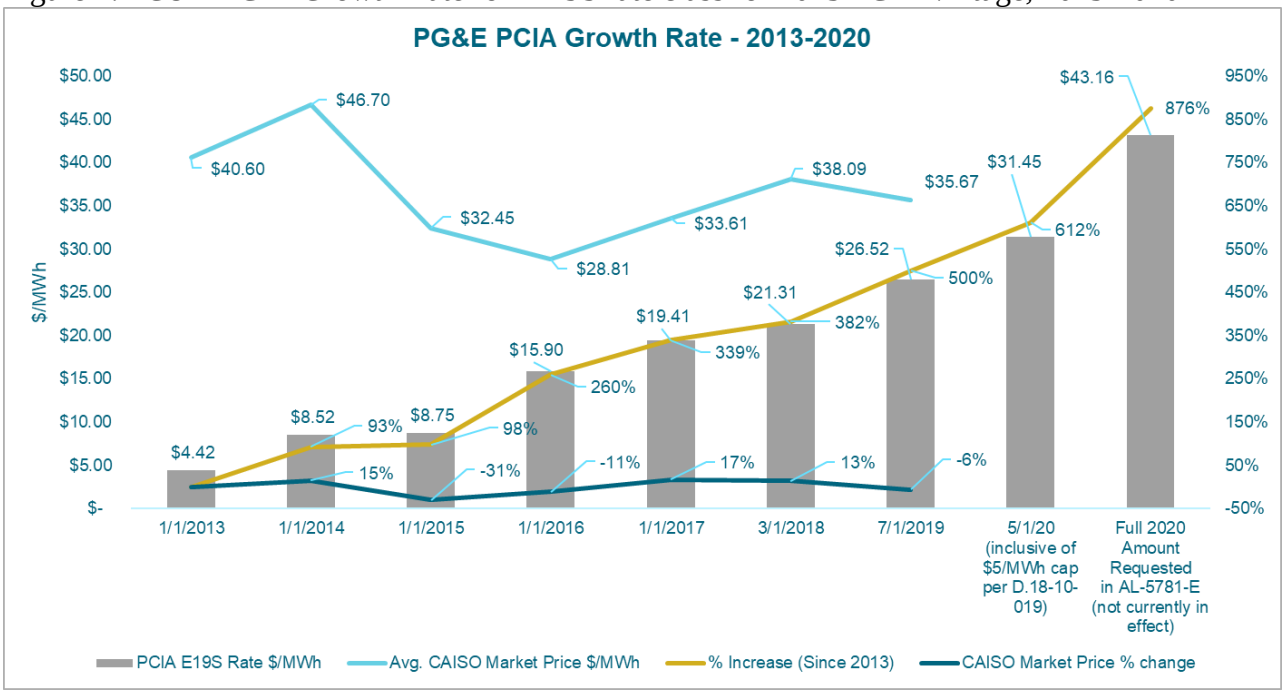
Increased Power Charge Indifference Adjustment Fee and Uncertainty

The Power Charge Indifference Adjustment (PCIA) is a fee assessed by investor-owned utilities (IOUs) on all customers to cover above market generation costs. CCA customers only pay for above market costs attributable to generation acquired prior to a customer's change in service provider. SJCE customers pay the PCIA fee to pay for their share of above market energy resource costs previously incurred by PG&E on their behalf.

The California Public Utilities Commission (CPUC) amended the PCIA calculation methodology in 2018 with a goal of achieving predictability and stability in PCIA rates, which apply to both IOU and departing customers.[1] However, the PCIA continued to rise significantly in 2019 and 2020 without increased rate stability. PG&E's PCIA has risen over 600% between 2013-2020, despite energy markets remaining relatively stable during the same period (Figure 1). ***Later this year the PCIA is projected to have risen by 10 times its value in 2013 or almost 900% for the E-19S large commercial rate class***. Residential rate classes have followed a comparable trend.

[1] Decision Modifying the Power Charge Indifference Adjustment, D.18-10-019, 10.11.18

Figure 1. PG&E PCIA Growth Rate for E-19S rate class for 2013 PCIA vintage, 2013-2020



Source: A.19-06-001, Comments of the Joint Community Choice Aggregators, p.4 (Dec.6, 2019) ("November Update Comments"). The PCIA growth rate figures were derived from historical growth rate in the E-19S rate in the 2013 vintage, including the use of Tables 19-3.1 and 19-3.2 of the November Update (and then updated based on the utility's Dec. 20 updated testimony, which the Proposed Decision essentially adopts).

The 2018 Decision introduced an annual CCA PCIA rate cap of $5/MWh and assumed the actual PCIA will rarely come close to the cap or exceed it. However, PCIA rates have risen significantly since the 2018 Decision was adopted, and the IOUs have reported their inability to recover their total annual revenue requirements due to the CCA PCIA cap. The PCIA Undercollection Balancing Account (PUBA) is a record of the shortfall in revenue charged to CCA customers because rates are limited by the cap. When an IOU's under-collected revenue reaches 7% of its anticipated annual revenue requirement, the CPUC requires the IOUs to file a proposal to amortize these under-collections through revised PCIA rates. PCIA rates could see a dramatic increase if the utilities propose to recover the entire under-collected amounts for that year over the remaining few months of that calendar year.

San Diego Gas & Electric (SDG&E) hit the 7% threshold in April 2020 and filed a proposal in July to revise PCIA rates to amortize the entire $8.9 million forecasted year-end shortfall within three months, October through December 2020. SDG&E PCIA rates in these months would increase by 126% to 3,412%, depending on the customer class[2]. The SDG&E proposal introduces further unpredictability for all CCAs in modeling future PCIA rates.

[2] Expedited Application of SDG&E under the PCIA account trigger mechanism, A. 20-07-009, 10.7.20

PG&E reached the 7% under-collection threshold in August 2020 and filed a trigger application to authorize additional PCIA cost recovery in September 2020. PG&E proposes to amortize the entire 2020 PUBA balance to zero over 12 months, January 1, 2021 to December 31, 2021. They recommend that the CPUC adopt a 2021 PUBA rate adder in addition to the 2021 PCIA, capped at $5/MWh. The under-collected PCIA amount for SJCE as of December 31, 2020 is expected to be approximately $26 million. The PUBA adder would add $6.08/MWh to SJCE's 2021 PCIA capped rate of $36.7 for a total of $42.8/MWh PCIA plus PUBA rate at the beginning of 2021. This would represent a 35% increase relative to current PCIA rates. On October 19, 2020, the Joint CCAs filed a protest to PG&E's trigger application seeking to extend the PG&E proposed one-year PUBA amortization to three years. A three-year amortization is expected to reduce PUBA adder to $2/MWh.

It is uncertain how the CPUC will rule on SDG&E and PG&E PCIA under-collection in 2020 and how that will translate into 2021 PCIA charges for SJCE customers. The PCIA rates are established each year through the utility Energy Resource Recovery Account (ERRA) forecast process. For a given year, each IOU submits their annual generation cost forecasts to the CPUC in July and then again in November of the preceding year before the CPUC authorizes the utility's final cost recovery requirement. Utility electric generation costs are recovered in customer rates, including PCIA rates, which are set in January each year, unless there is an unavoidable regulatory delay. Significant uncertainty in the 2021 PCIA remains based on PG&E's November submission. If the outcomes of the various regulatory proceedings are worse than anticipated, SJCE may need to take additional actions to maintain financial stability.

On August 27, 2020, CPUC Commissioner Martha Guzman Aceves announced her intent to reopen the 2018 PCIA Decision[3] to address the PCIA cap and trigger mechanism relating to utility PCIA revenue collection. The California Community Choice Association (CalCCA), the CCA trade association, has proposed amortizing these PCIA costs over a longer period of time to avoid the type of rate shock witnessed as a result of the SDG&E PCIA Trigger Application.

SJCE Actions to Achieve a Favorable PCIA Outcome

CalCCA and SJCE continue to engage at the CPUC and the legislature to seek fair and just treatment of CCA customers now and in the future. CalCCA and SJCE are advocating for increased transparency measures; requiring utilities to allocate resources to load serving entities whose customers pay for them; and measures that compel utilities to optimize their electricity generation supply portfolios and reduce costs for all customers.

Transparency Measures

In the 2020 legislative session, the City of San José and CalCCA sponsored Assembly Bill (AB) 2689 (Kalra) to compel IOUs to provide reasonable access to their generation related cost information in CPUC cost recovery proceedings to verify the accuracy and appropriateness of utility costs that are passed on to ratepayers, including to CCA customers through the PCIA.

[3] D.18-10-019, Decision Modifying the Power Charge Indifference Adjustment Methodology, Oct, 11, 2018

Assembly member Kalra has indicated his intention to sponsor a similar bill in the next legislative session.

PG&E Resource Allocations and PCIA Costs

To calculate the PCIA, the CPUC calculates the cost of PCIA eligible generation resources in the IOU portfolios and subtracts the value of the resources that the IOUs should be able to monetize by selling the attributes to other suppliers or to customers. The CPUC ascribes a value, or "market price benchmark", to resource adequacy, renewable energy, and conventional power (i.e., fossil fuels). However, since the CPUC does not ascribe value to the carbon-free resources (i.e., large hydropower and nuclear) in the IOU portfolios, the CPUC includes the full cost of these resources in the PCIA. ***Although CCA customers pay the utility for these resources through the PCIA, CCAs do not get credit for the resources on their power content label (PCL) which is used to demonstrate carbon content of CCA portfolios relative to IOU portfolios.*** In order to have carbon-free power represented on their power content label, CCAs must purchase carbon-free attributes for their customers which increases CCA customer costs.

2020 and 2021 PG&E Resource Allocations of Carbon-free Resources

In D. 18-10-019, the CPUC determined that carbon-free power does not garner a price premium in the market. This decision is contrary to the experience of CCAs who routinely have paid a premium for these products to achieve their portfolio content goals.

CPUC staff have encouraged IOUs to voluntarily address this concern. In response, PG&E submitted Advice Letter E-5705 on December 2, 2019 which allowed CCAs to contract with PG&E to receive their proportional share of carbon-free attributes between June 15, 2020 through December 31, 2020. ***This allocation saved SJCE approximately $5 million in procurement costs and should result in a 94% carbon-free portfolio for SJCE in 2020, exceeding the Council approved 86% carbon-free power mix.*** The CPUC's approval of the allocation on May 7, 2020 came after SJCE had already bought most of the carbon-free resources needed to meet the Council-approved mix. PG&E has now allocated substantial carbon-free attributes to all CCAs in its territory for 2020, therefore depressing demand for these excess resources.

PG&E submitted Advice Letter E-5930 on August 27, 2020 for approval to continue allocating carbon-free energy delivery in 2021, 2022, and 2023.[4] Resources are allocated according to the pro-rata share of the load-serving entity's monthly load forecast for all PCIA-paying customers. Preliminary estimates show that this allocation will be roughly 1,500 GWh of carbon-free power in 2021, which currently is valued between $3 million and $7.5 million. ***This would increase the carbon-free content of SJCE's power mix by roughly 39%, for a potential 2021 carbon-free energy percentage of 92%, and reduce total carbon emissions by approximately 650,000 metric tons across its customer base compared with the energy mix in the staff***

[4] PG&E's advice letter also included the option to allocate carbon-free resources in 2022 and 2023. However, allocations in these years are expected to be addressed through a separate process, detailed below. PG&E's proposal did not include any information on the allocation of resource adequacy or renewable energy.

recommendation. PG&E has requested expedited approval from the CPUC by October 31, 2020.

PG&E Allocations of Resource Adequacy, Renewable Energy, and Carbon-free Resources through PCIA Working Group 3

In 2019, a working group co-led by CalCCA and Southern California Edison (SCE) known as PCIA Working Group 3 was formed to better manage excess IOU PCIA eligible resources, including resource adequacy (local, system and flex), renewable energy, and carbon-free energy. The working group's Final Report to the CPUC in February 2020 recommends annual resource allocations or auction for these resources beginning in 2022 and 2023. Per the report's recommendations, CCAs could choose to buy the IOUs' excess resource adequacy and renewable energy at the most recent market price benchmark established by the CPUC; the carbon-free energy would continue to be allocated at no cost. The amount eligible for allocation is based on a CCA's forecasted, vintaged, annual load share in MWh.

PG&E protested these recommendations in March 2020 and proposed different allocation mechanisms and timing for these resource allocations. It is unclear whether the CPUC will rule on the Working Group 3 recommendations before the end of 2020, and the substance of its ruling and implementation date are also uncertain. In the absence of regulatory guidance enabling IOU PCIA-eligible resource allocations, CCAs find it difficult to assess their short- and medium-term procurement needs. Staff expect that the resources SJCE could obtain through the implementation of an eventual Working Group 3 decision are likely to result in lower overall customer costs, but the details remain uncertain.

<u>Approaches of Other CCAs</u>

In response to increasing PCIA fees in 2020 and 2021, CCAs are either lowering rates to shield customers or utilizing several approaches that ease revenue shortfalls. Agencies that have been in operation for several years are able to utilize reserves to cover anticipated revenue shortfalls and protect customers while maintaining their discounts.

Other agencies have decided to adjust their rates to cover costs, which results in rates higher than PG&E. ***Some CCAs have ceased procuring carbon-free power to cut costs and decided to benchmark on renewable content only.*** As evidenced from CCA websites, many have already stopped advertising the carbon-free content in their power mixes. This strategy allows them to reduce costs and maintain lower rates. Approving the recommendation would allow SJCE to also implement this strategy.

Bay Area CCAs offer between 35% and 60% renewable power as a default, with pricing ranging from 5% below PG&E to 6% above PG&E (inclusive of PG&E added fees).

Establishment of GreenSource Power Content and Rates

Summary of SJCE and PG&E 2019 and 2020 Power Mixes and Rates

SJCE's default GreenSource product being provided to customers in 2020 has a planned minimum renewable content of 45% and carbon-free content (renewable plus large hydropower) of 86%. The carbon-free content is expected to increase to 94% as a result of PG&E's resource attribute allocation discussed above, made up by additional large hydropower and nuclear resources. This represents an increase of at least 6% carbon-free power compared to SJCE's 2019 GreenSource mix. In 2019 and 2020, rates for GreenSource are set at 1% below PG&E rates for all customers, inclusive of the PCIA and Franchise Fee Surcharge.

Compared with PG&E's unaudited 2019 power mix, SJCE's 2020 GreenSource product offers at least 16% more renewable energy. PG&E's 2019 power mix does not include natural gas usage or "unspecified" power purchased on the open market, indicating that its power is 100% carbon-free. However, PG&E owns gas plants that generate greenhouse gas (GHG) emissions and holds a number of power purchase agreements for this resource. GHG emissions associated with these plants are expected to be significant.[5] Per current regulations, however, PG&E is able to display only renewable and carbon-free sources in its power mix because it has a significant amount of excess renewable resources as more CCAs like SJCE have formed and PG&E has retained its legacy renewable power contracts.

PG&E's 2020 power mix is expected to be close to 33% renewable to be in compliance with state requirements yet take advantage of financial incentives to sell off excess renewable resources or pass costs to customers through the PCIA rate. Due to the resource attribute allocation to CCAs, PG&E's 2020 mix is expected to be less than 100% carbon-free. PG&E's final, audited 2020 power mix will be published in October 2021.

San José's Climate Smart Carbon Neutrality Goal

The Climate Smart San José plan adopted by the City Council in 2018 included a goal for SJCE to offer 100% carbon-neutral power as a default by 2021. In SJCE's Integrated Resources Plan memo presented to and approved by Council on August 25, 2020, staff advised against pursuing this goal in 2021 for a number of reasons.

To develop SJCE's 2020 Integrated Resources Plan adopted by Council in August 2020, staff worked with Siemens to model the most cost-effective power procurement strategies to meet load, state requirements, and climate goals. Siemens modeled four GHG emissions reduction scenarios, including meeting the Climate Smart carbon neutrality goal. This scenario resulted in SJCE emitting the lowest amount of carbon in 2030 – 238,000 metric tons (MT) compared to the 640,000 MT that would be emitted should SJCE follow the California Public Utilities Commission's electric system 46 MMT requirement.

[5] PG&E SEC 10-K Filing, February 18, 2020.

Siemens' modeling revealed that the lowest cost approach to meeting GHG emissions targets is to significantly overbuild renewables (primarily solar) and add adequate battery storage. The carbon neutrality scenario required the largest investment in new renewable resources and battery storage. However, contracting for and building new resources takes time, requiring SJCE to buy short-term renewable energy credits (RECs) and low-carbon attributes from existing projects, such as large hydropower facilities, in the short-term to meet the Climate Smart carbon neutrality goal. RECs and low-carbon attributes are more expensive than procuring power from new renewable projects through long-term contracts. The sale of these attributes provides revenue to existing resources and supports their continued operation and maintenance but does not result in adding new clean resources to the California grid to reduce overall emissions. Therefore, staff recommend focusing on increasing investment in new renewable resources and storage instead of achieving carbon neutrality in 2021.

Pursuing the Climate Smart goal would likely lead to over-procurement and higher costs if SJCE procures the carbon-free power and then later receives the PG&E resource allocation and is unable to sell excess carbon-free resources.

Recommended 2021 GreenSource Power Mix and Rates

Given the significant increase in the PCIA fee forecast for 2021, staff recommend taking an array of cost-cutting measures, including adjusting procurement and customer rates. Staff recommend offering a GreenSource product with a minimum renewable content of 40% starting January 1, 2021. While the proposed renewable content would decrease by 5% compared to previous years, 40% is higher than the state mandate of 36% for 2021. The 2021 GreenSource carbon-free content is likely to increase to 92% through the 2021 PG&E resource allocation and reduce emissions from the 2020 GreenSource portfolio by approximately 100,000 metric tons of CO_2.

Staff recommend setting rates at an initial 0.25% discount to PG&E, with flexibility to vary the discount between 0.0% and 1.0%. A 0.25% change in discount for customers results in a $1.0M change to revenue, so the 0.0% to 1.0% discount range provides $4.0M in revenue flexibility.

Staff recommend against setting rates above those of PG&E. During the pandemic, many San José families have been impacted by loss of jobs or income, and rising utility bills can exacerbate strained finances. Studies show low-income, African American, and Latinx households spend disproportionate amounts of their income on energy bills.[6] Furthermore, setting rates higher than PG&E will likely cause customers to lose trust in SJCE and prompt opt outs, lowering revenue. Once a customer opts out of CCA service, it is difficult to encourage them to return, limiting the future impact of SJCE greenhouse gas reductions and programs.

To determine customer preferences and reactions to potential changes to power mix and rates, staff administered a survey to residential and small commercial customers and interviewed large commercial customers. When asked what customers valued in their electricity service, cost was identified as the most important across customer groups:

[6] https://www.aceee.org/press/2016/04/report-energy-burden-low-income

1. Lowest cost
2. Good customer support
3. Transparency & accountability
4. Overall reputation
5. Renewable energy content
6. Minimizing fossil fuels
7. Availability of incentives/programs
8. Small, local provider vs larger corporate provider

Indeed, price sensitivity was revealed through responses to other questions; for example, nearly 22% of customers indicated they would switch providers if their rates increased by 6% (or $3 per month for the average home). Customers were less sensitive to changes to the amount of renewable energy provided. When asked what they would do if their provider decreased their service's renewable content from 45% to 36%, more than half said they would do nothing, nearly a quarter said they would contact their provider to learn more, nearly 20% said they would contact their provider to inquire about switching to another option, and just 5% said they would switch providers.

Staff believe the recommended power mix balances the need to cut costs while staying competitive with PG&E on renewable resources and pricing.

Selling Resources

To date, staff have procured a significant amount of renewable energy attributes for 2021. Selling a portion of the already procured renewable resources, to get to the recommended 40% renewable energy content for GreenSource, would result in an estimated $2.4 million in savings. The savings would come from the sale of renewable resources.

DAC Green Tariff

In June 2018, the CPUC approved D.18-06-027, adopting three new programs to promote the installation of renewable energy generation in disadvantaged communities (DAC), as directed by the California Legislature in Assembly Bill 327. One of these programs is the DAC-Green Tariff (DAC-GT) program, which provides 100% solar energy and a 20% discount on electricity bills for income-qualifying customers who live in DACs. This discount is in addition to customer discounts received through California Alternate Rates for Energy (CARE) or Family Electric Rate Assistance (FERA) programs. CCAs interested in developing and implementing DAC-GT programs are required to submit an Advice Letter to the CPUC on or before January 1, 2021.

SJCE is interested in implementing a DAC-GT program to improve access to renewable energy generation in San José. The eligible DAC-GT project site for SJCE must be located in a DAC within PG&E's service territory. SJCE is currently reviewing options for a solar site in San José but the location will ultimately be determined through a Request for Offers (RFO) process, in which respondents would offer SJCE solar energy from a newly constructed power plant at a site of the respondents' choosing, at a certain price. There must be a power purchase agreement established between SJCE and the selected developer. ***SJCE has been allocated 1.4 MW of energy for the DAC-GT project site, which could provide renewable power to approximately 500 SJCE customers.*** SJCE may partner with other interested CCAs to issue a joint RFO.

The DAC-GT program is fully funded by the CPUC through California greenhouse gas allowance proceeds and public purpose programs funds. SJCE will submit costs to the CPUC through an annual budget submission process and funds will be transferred back to SJCE on a quarterly basis for each upcoming quarter. Recoverable costs include excess generation costs, unsubscribed energy output, participant bill discounts, program administration, marketing, education, and outreach.

Other CCAs such as Clean Power Alliance, MCE and EBCE have already submitted their Advice Letters to the CPUC. Peninsula Clean Energy and CleanPowerSF are in the process of developing their implementation plans and intend to submit Advice Letters by the end of 2020.

The City of San José is focused on advancing equity within its programs and services. ***SJCE believes implementing a DAC-GT program in San José is an important step in increasing access to 100% renewable energy generation among customers that otherwise cannot afford it.*** Providing this option to SJCE customers will benefit people who rent their home, whose home is unsuitable for solar, or otherwise cannot afford access to solar energy. Bringing the DAC-GT program to San José brings the City another step closer to creating a more sustainable community for current and future generations.

Staff are currently developing the implementation plan and other key deliverables to submit with the Advice Letter by the end of December 2020. If approved by the CPUC, SJCE could administer an RFO and commence marketing, outreach and program enrollment in 2021. Electricity generation from the new 1.4 MW solar plant – along with customer discounts – would likely begin in 2022.

<u>Direct Renewables Program</u>

A direct renewable energy program is any arrangement where a utility or other energy provider authorizes a customer or group of customers to receive generation credit from a particular renewable energy generation resource or group of resources. Sometimes known as a green tariff, direct renewable energy replaces, either in part or in whole, the standard rate on which a customer would otherwise be served. Large commercial customers often prefer direct renewable energy arrangements to standard rates because it provides them with direct access to high quality renewable projects at competitive, predictable rates. From the perspective of SJCE this model may be beneficial, because it provides SJCE with predictable customer load (mitigates the risk of

a customer departing SJCE service) and helps accelerate the deployment of new renewable resources. In short, customers receive competitive pricing that helps them meet their sustainability targets, and SJCE would have more predictable load and enable additional renewable energy development.

There are multiple models of direct renewable energy programs, and SJCE is currently partnering with the World Resources Institute and other leading sustainability non-profits through the American Cities Climate Challenge, to collect customer information on procurement preferences and requirements and determine what model will best meet SJCE and its customers' needs. If successful, a SJCE direct renewable energy program could be a potential model for expanded implementation to other California Community Choice Energy programs. SJCE is working to determine the optimal direct renewable energy program model and conduct further due diligence, and it expects to return with recommendations to City Council in 2021.

CONCLUSION

SJCE sets the power content of its GreenSource product and rates every year. Given the uncertainty surrounding the PCIA and the need to cut costs, the recommendation for the power content for 2021 is 40% renewable. The recommendation for rates is to reduce the discount for all customers to an initial 0.25%, with flexibility to vary the discount between 0.0% and 1.0% depending on regulatory outcomes on the PCIA and resource allocations.

The recommendation to implement a DAC-GT program will provide approximately 500 low-income customers in disadvantaged communities an additional 20% discount on their electricity bills. The program is fully funded by the CPUC and will increase access to 100% renewable energy generation among customers that otherwise cannot afford it.

Staff are currently evaluating direct renewable energy programs and researching which model would work best for SJCE and its customers. A direct renewable energy program, also known as a green tariff, sources energy generation from renewable resources and provides customers competitive pricing while also helping them meet their sustainability goals. SJCE would benefit from more predictable loads and additional investment in renewable energy development from customer participation in such a program. SJCE expects to present recommendations to City Council in 2021.

EVALUATION AND FOLLOW-UP

No further follow-up with the City Council related to the change in power mix, rates, or DAC-GT is anticipated at this time.

CLIMATE SMART SAN JOSÉ

The recommendation in this memo negatively impacts one or more Climate Smart San José energy, water, or mobility goals. Compared with 2020 SJCE emissions, implementing the staff recommendation would result in in a change in CO2 emissions from SJCE customers in 2021 ranging from a decrease of 100,000 metric tons (if the CPUC approves PG&E Advice Letter E-5930 Advice Letter allocating approximately 1,500 GWh of carbon-free attributes to SJCE) to an increase of 550,000 metric tons of CO_2 if that Advice Letter is not approved. Approving the recommendation in this memo also means that SJCE would not meet the Climate Smart Goal of providing 100% carbon-neutral power in 2021 as the default product.

POLICY ALTERNATIVES

Establishment of GreenSource Power Content and Rates

Alternative 1: Business-as-usual; meet Climate Smart 2021 goal
Set GreenSource at 100% carbon neutral (45% renewable, 55% hydropower) at 1% discount relative to PG&E for all customers

Pros: This alternative would reduce 2021 CO_2 emissions from SJCE service, relative to the staff recommendation, by approximately 135,000 to 785,000 metric tons (depending on if PG&E Advice Letter E-5930 Advice Letter is approved). However, because the hydropower would be procured from existing resources, this alternative would provide revenue to existing resources and support their continued operation and maintenance but would not result in adding new clean resources to the California grid to reduce overall emissions.

Cons: Energy procurement costs would be approximately $11 million higher under this alternative. As long as there is uncertainty about the amount of carbon-free resource attributes PG&E will allocate to SJCE in 2021, pursuing this alternative could lead to significant over-procurement of carbon-free resources and higher costs. It could also make SJCE become financially unstable. Offering a 1% discount relative to PG&E to all customers reduces revenue by approximately $3 million.

Reason for not recommending:
Given the significant uncertainty and forecasted increase in the PCIA for 2021 as well as the importance of meeting financial reserve targets, staff recommend pursuing cost-cutting measures. Staff recommend directing procurement funds to new renewables as opposed to existing carbon-free resources. From a carbon perspective, making long-term investments to add new renewable resources and battery storage to the grid results in reduced statewide emissions.

Alternative 2: Keep 1% discount and cease carbon-free purchases
Set GreenSource at 45% renewable and 58+% carbon-free at 1% discount relative to PG&E for all customers

Pros: This alternative would reduce 2021 CO_2 production from SJCE service, relative to the staff recommendation, by approximately 75,000 metric tons. SJCE offered at least 45% renewable energy in 2019 and 2020. Reducing GreenSource's renewable content compared to previous years, especially if it is lower than PG&E's renewable content, risks customers opting out of SJCE service, leading to lower SJCE revenues. Keeping the rate discount allows for better customer retention and enables us to market that SJCE is affordable. In surveys, customers have rated cost to be the most important attribute of their electricity service.

Cons: This alternative results in a loss of $3 million in revenue and increased power supply cost of $2.4 million compared to the recommendation.

Reason for not recommending: Given the significant uncertainty and forecasted increase in the PCIA for 2021 as well as the importance of meeting financial reserve targets, staff recommend pursuing cost-cutting measures. This includes modifying the 1% discount to 0.25% and selling some already procured renewable and carbon-free resources should Council approve SJCE to do so. Staff believe these changes will not result in significant opt outs.

Alternative 3: Create a third product offering "TotalTeal"
Set TotalTeal at 55% renewable and 75% carbon-free and priced 5% higher than PG&E.
Customers can "opt down" to enroll in a lower cost but leaner GreenSource (40% renewable, 53% carbon-free, 1% discount relative to PG&E). Automatically enroll current GreenSource residential customers into TotalTeal except for CARE and FERA customers.

Pros: Assuming 50% of residential customers remain in the TotalTeal service offering, this alternative would reduce 2021 CO_2 emissions from SJCE service, relative to the staff recommendation, by approximately 81,000 metric tons.

Cons: Defaulting customers into a more expensive service option could result in unexpected financial impacts for customers and increase opt outs. By implementing this alternative, SJCE would be subjecting most customers to automatic enrollment in a higher cost service, risking losing trust and damaging SJCE and the City's reputation. In a survey, nearly 22% of residential respondents indicated they would switch providers if their rates increased by 6% (or $3 per month for the average home). From January 2019 to June 2020, surveys of customers who opted out revealed that half did so because of rate and cost concerns and 20% did so because they disliked being automatically enrolled in a new service.

Although staff would encourage customers to opt down to GreenSource instead of opting out of SJCE service, the pandemic limits the communication channels staff can use to amplify this message. Staff must rely on digital tactics and less on in-person outreach and meetings, the latter of which is key for reaching hard-to-reach groups like non-English speakers, those without internet access, and seniors. Though SJCE's website and call center recordings are trilingual,

non-English speaking communities may have a harder time understanding how to opt down or out.

Importantly, automatically enrolling customers in a higher cost option after months of financial strain from the pandemic, which could soon turn into a recession may negatively impact many customers. Automatically enrolling low- and middle-income customers who may not qualify for CARE or FERA into a higher cost service option puts further financial strain on household budgets. Finally, revenue would be lower by $2 million and power supply costs higher by $1 million compared with the recommendation.

Reason for not recommending: Cons outweigh the pros for this alternative.

PUBLIC OUTREACH

This memorandum will be posted on the City's website for the November 17, 2020 City Council meeting.

COORDINATION

This memorandum has been coordinated with the City Attorney's Office, the City Manager's Budget Office, and Environmental Services Department.

COMMISSION RECOMMENDATION/INPUT

During the September 17, 2020 meeting, the Clean Energy Community Advisory Commission (CECAC) agreed with staff recommendations on the 2021 power mix and rate setting. This includes the recommendations to set the power content for 2021 at 40% renewable and to reduce the discount for all customers to an initial 0.25%, with flexibility to vary the discount between 0.0% and 1.0%. However, the CECAC urged staff to increase the renewable and carbon-free content of the power mix in following years. The CECAC was also supportive of the Direct Renewables pilot program and for SJCE to apply to administer the DAC-GT program.

COST SUMMARY/IMPLICATIONS

The impacts on SJCE revenues, costs, and cash reserves of the staff recommendation and the alternatives discussed above are in Table 3 below. Due to the significant regulatory and market uncertainty discussed above, the numbers in the table below should be viewed as middle values of a range. Revenues could change significantly depending on the outcome of the PCIA.

Table 3. Projected 2021 SJCE Financials (in millions)

	Recommendation *(40% renewable, priced at 0.25% discount with flexibility to vary between 0% and 1% discount*	Alternative 1 *(45% renewable, 100% carbon neutral– at 1% discount)*	Alternative 2 *(45% renewable and 58+% carbon-free at 1% discount)*	Alternative 3 *(Create new product for residential - 55% renewable and 75% carbon- free at 5% higher)*
Revenue	$262	$259	$259	$260
Costs	$298	$309	$301	$299
Net income	-$36	-$50	-$42	-$39
Restricted and Unrestricted Cash 12/31/21	$21	$5	$13	$17

CEQA

Not a Project, File No. PP17-008, General Procedure & Policy Making resulting in no changes to the physical environment.

/s/
Lori Mitchell
Director, Community Energy

For questions please contact Zach Struyk, Assistant Director, Community Energy, at (408) 535-4868.