COUNCIL MEETING DATE:

Monday, November7, 2016

ADDITIONAL CORRESPONDENCE

RECEIVED AFTER COUNCIL PACKET

PREPARATION

Item 7-1. Approving an Agreement to Participate in a Joint Powers Agency and First Reading of Ordinance Authorizing the Implementation of a Community Choice Aggregation Program

DO NOT REMOVE

Please return to Eileen Harrington, Administration

Eileen Harrington

From: Claire Griffing
Sent: Friday, October 07, 2016 9:40 AM
To: Eileen Harrington
Subject: FW: Comments on JPA
Attachments: to City Council on JPA.pdf

Hi Eileen,
Could you please forward this to Council?

Thanks,

Claire Griffing
Sustainability Coordinator
City of Albany
1000 San Pablo Avenue
Albany, CA 94706
Phone: (510) 528-5754
FAX: (510) 524-9359

From: Mark Meldgin [mailto:mmeldgin@sbcglobal.net]
Sent: Thursday, October 06, 2016 9:24 AM
To: Claire Griffing <cgriffing@albanyca.org>
Subject: Comments on JPA

Claire,

I wrote a letter on East Bay Clean Energy and the Joint Powers Agreement in the attached file. Would you please forward it to the City Council and the Sustainability Committee?

Thank you,

Mark Meldgin

October 6, 2016

Albany City Council

Re: Joint Powers Agreement for East Bay Community Energy Authority

Dear Council Members,

You will be voting later this year on a Joint Powers Agreement to join the not-for-profit East Bay Community Energy Authority (EBCE). In the terminology of the California Public Utilities Code, EBCE will be a Community Choice Aggregator, or CCA. Using PG&E's transmission and distribution wires, EBCE will procure and supply electricity to East Bay customers who choose to join it. Other CCAs are already in business, such as Marin Clean Energy.

I worked at PG&E for 34 years, including several years in PG&E's Energy Policy, Planning, and Analysis group, so I may have some relevant experience. In my opinion, EBCE might be able to provide proportionally more electricity from renewables than PG&E will, at electricity rates similar to or lower than PG&E's. That would be a wonderful outcome. However, EBCE, like other CCAs and PG&E's own electricity procurement group, are likely to face increasingly complicated decisions, so careful management and oversight will be needed.

I am not recommending a vote for or against Albany's joining the EBCE. This letter is intended to inform you by presenting a few comments. Supporting data, links, and additional comments are at the end.

Thank you,

Mark Meldgin
Albany CA

Disclaimer: The issues in this letter are complex, and I may be wrong. Discussion and constructive criticism are welcome.

Comments

1. Electricity procurement may become more complicated.
2. The sources of electricity you use differ from the sources of electricity you pay for.
3. How much an electric generator runs is largely independent of who owns it.
4. A "100% green" option may shift responsibility between California's electricity suppliers, without actually reducing California's GHG emissions.

5. "Clean" electricity may be misunderstood: More renewable electricity will have a negligible effect on air quality in the Bay Area.

Discussion

1. Electricity procurement may become more complicated.

At present, electricity procurement seems simple: It appears to be a matter of (1) signing contracts to buy electricity from existing sources and (2) supporting development of new solar plants. Marin Clean Energy (MCE) may be an instructive example. MCE has sourced electricity with a high renewable component, while offering rates comparable to PG&E's. (MCE's electricity supply plan is described in the endnotes.)

Electricity procurement may become more complicated. California's Renewable Portfolio Standard (RPS) requires that each CCA's (and PG&E's) electricity supply must include an increasing percentage of renewables over time. Solar projects are the preferred means of building renewables, but at times California cannot accommodate all the electricity from existing solar plants: The California Independent System Operator ("CAISO") curtailed solar plants by about 1% in the last 12 months, with an upward trend over that period. If CCAs and PG&E meet ever-rising goals for renewable electricity by building solar plants, curtailment will become more frequent. (Source and details in endnotes.)

More solar, and more curtailment, seem likely to drive at least two changes. First, CCAs and the CPUC (which sets PG&E's rates) will consider changing electricity rate schedules to encourage electricity use during daylight, and discourage use in evenings and at night. The details may be controversial if they affect customers who sell surplus electricity from their rooftop solar panels. Second, CCAs and PG&E may be required to develop significant amounts of energy storage projects that can accept electricity during daylight hours and generate electricity at night. To the best of my knowledge, no energy storage technology has emerged as a clear winner.

These possible changes do not argue for or against Albany's decision whether to join EBCE—they will affect all CCAs and PG&E. The point is that careful management and expertise may be needed for EBCE to meet PG&E's rates while beating PG&E on the percentage of electricity coming from renewables.

2. The sources of electricity you use differ from the sources of electricity you pay for.

The electricity grid is analogous to the storage tank in a water delivery system—all of the inputs are mixed together before delivery.

Imagine a water-delivery system serving several villages. It consists of three elements: (1) an elevated water-storage tank, (2) pumps to push water up into the storage tank, and (3) pipes that serve demand by allowing water to flow from the tank down to customers.

Water supply must be matched to demand: If supply exceeds demand, sooner or later the storage tank will overflow, wasting water as well as energy used to pump water up to the tank. If demand exceeds supply, sooner or later the storage tank will empty and some demand will not be met. Although demand fluctuates unpredictably, the water-system operator can match supply to demand by adjusting pumps to keep a constant water level in the storage tank.

Now imagine that the storage tank is small. Frequent adjustment of pumps is necessary to maintain a constant water level in the storage tank. This situation is analogous to the challenge faced by the operator of an electricity grid.

- The pumps in a water-delivery system are analogous to generators on an electricity grid.
- The use of water by customers in the small villages is analogous to electricity demand.
- The water level in the storage tank is analogous to the electricity system's frequency, which the grid operator must keep near 60 cycles per second to avoid damage to components of the grid.

The grid operator maintains the 60-cycle frequency by adjusting the output of generators every few seconds.

3. How much an electric generator runs is largely independent of who owns it.

Operators of electricity grids choose, or "dispatch", electric generators in order of increasing operating cost (or bid), after accounting for characteristics of the generators and the transmission system. This is a complex topic, but the U.S. Energy Information Administration posted a good summary entitled: "Electric generator dispatch depends on system demand and the relative cost of operation". (Link in end-notes)

4. A "100% green" option may shift responsibility between California's electricity suppliers, without actually reducing California's GHG emissions.

Using the water-delivery analogy, assume that village A wants its electricity to be 100% green. Village A could buy pumps powered by existing large hydroelectric generators so that, on an annual basis, its pumps move as much water into the storage tank as its customers take out. However, the change in ownership does not change the relative operation of various pumps, and does not change total GHG emissions from the entire set of water pumps. Village A could claim to be 100% green, and villages B, C, D, etc.

would then become responsible, at least on paper, for increased share of the same amount of GHG emissions.

This example has a similarity to Scenario 2 in consulting study funded by Alameda County. The consultant was MRW, Inc. MRW's Technical Study notes that:

> "The Alameda CCA's GHG emissions under Scenario 2 are much lower than those under Scenario 1. This is due to the higher renewable content in the CCA's generation mix under Scenario 2, but more importantly, the 50% hydro content in the non-renewable generation mix." (p. vii, emphasis added, source in endnotes)

In other words, EBCE could claim lower GHG emissions in Scenario 2 than in Scenario 1 partly by achieving a "50% hydro content in the non-renewable generation mix". There are no good sites for new hydroelectric dams in the Western U.S., and operators of existing hydroelectric generators maximize their output, and will continue to do so regardless of contract status, because the operators can always find a buyer for the hydroelectricity. EBCE could lay claim to this GHG-free hydroelectricity by outbidding PG&E and other CCAs to sign electricity-purchase contracts for large hydroelectric generators. It may be good publicity, but it does not reduce California's overall GHG emissions.

A similar comment applies to Recital 6c in the Joint Powers Agreement for EBCE: "Develop an electric supply portfolio with a lower greenhouse gas (GHG) intensity than PG&E..." PG&E's portfolio has a low GHG intensity due partly to historical happenstance. In the late 1970s, PG&E proposed building 2 large coal plants in California and co-developing coal plants in Nevada, none of which were built.

The electricity sector can address global climate change by building renewables. EBCE can do that, or sign electricity-purchase contracts with so many existing renewables that other CCAs or utilities must build renewables sooner to meet their RPS goals. Either way is good. Buying existing large hydro (which does not count toward RPS goals) to match the GHG intensity of PG&E's portfolio does nothing to reduce statewide emissions.

5. "Clean" electricity may be misunderstood: More renewable electricity will have a negligible effect on air quality in the Bay Area.

An EBCE brochure states that "EBCE will provide electricity generated from clean renewable sources that pollute less and produce fewer greenhouse gases." The brochure also refers to "Cleaner, Greener Electric Power" and states that EBCE customers will be "benefiting from cleaner energy". Speakers at the October 4, 2016 meeting of the Alameda County Board of Supervisors spoke of the need for renewables to reduce pollution.

The "green" claim for renewable electricity is well founded: Fossil-fueled generators in California emit a lot of greenhouse gases--about 30% of the statewide total.

The "clean" claim for renewables is not so well-founded: Electricity generators emit less than 2% of urban air pollutants in the Bay Area. In addition, fossil-fueled generators run more at night than during the day, so they will not be completely displaced by solar plants unless energy storage is included. (See CAISO Daily Renewables Watch, link in endnotes.)

Here are the most recent data from the California Air Resources Board for emissions in the Bay Area Air Quality Management District.:

	Emissions in 2012 (tons per day)		
	Reactive Organics	NOx	Small Particles
Power plants	0.28	2.26	--
Cogenerators	0.29	2.94	--
Subtotal—electricity generators	0.57	5.20	--
Total from all sources	264.96	317.65	45.60
% from electricity generators	0.2%	1.6%	--

(Source in endnotes)

Data for the South Coast Air Quality Management District, which includes the Los Angeles Basin, are similar.

The emission data are surprising to many people. Electricity generators in California emitted far more pollutants in the 1980s. Since then, those generators stopped burning low-grade fuel oil and installed sophisticated emission controls. (I am not familiar with emission data for the other 49 states—renewables may have a bigger impact on air quality outside California.)

Additional Comments

A. Does the EBCE structure allow "free riders"?

This comment is speculative, and even if correct, it may be unimportant. For ease of discussion and comment, each statement is numbered:

1. Under California law, a specified percentage of EBCE's electricity sales, but those of each individual city in the EBCE, must be met by renewable electricity.
2. EBCE may sell bonds to support construction of renewables.

3. EBCE's customers are free to leave EBCE and go back to service from PG&E, so they may not be a rock-solid source of revenue for EBCE to re-pay its bond-holders.
4. Potential buyers may want EBCE bonds to be backed up by the taxpayers of individual cities.
5. A city could become a "free rider" by letting its residents be customers of EBCE, but not assuming its portion of the debt for an EBCE project. This is how I interpret a sentence in Section 2.3 of the Joint Powers Agreement: "A Party who has not agreed to assume an Authority debt, liability or obligation shall not be responsible in any way for such debt, liability or obligation even if a majority of the Parties agree to assume the debt, liability or obligation of the Authority."

My interpretation of the JPA may be incorrect, and even if it is correct, free-riding may never become a significant issue. I raise it for discussion.

B. Electricity supply plans are readily available to the public.

In each odd-numbered year, each CCA and utility must file its electricity supply plan with the California Energy Commission in Form S-2. The forms are posted for the public.

These plans cover sources of electricity that each entity will own or sign to a contract. The electricity received by its customers may differ. As an extreme example, an entity serving only nighttime electricity demand (e.g., street lights) could file a supply plan listing only solar generators.

As an example, consider Marin Clean Energy. MCE began operation recently. Its forecast electricity demand for 2016 (line 5 in its Form S-2, source below) is 1,986 GWh. (For comparison, Albany's annual demand is about 60 GWh and Oakland's is about 2,000 GWh.) MCE's renewable electricity supply (line 14a) increases rapidly from a planned 470 GWh in 2015 to a maximum of 873 GWh in 2018. Planned renewable supply drops off in 2019, but that does not mean MCE will buy less renewable supply: One of its significant contracts (for 338 GWh, in line 15d) expires in 2018, and, at the time of MCE's S-2 filing, it had not signed replacement contracts.

MCE's plan includes five solar projects that MCE is supporting in or near Marin County. They are shown in lines 15q through 15u of the supply form. In 2018 they account for 12 GWh.

Form S-2 is useful for a rough calculation of how an entity is faring with respect to California's Renewable Portfolio Standard, though it may not capture every detail, e.g., in treatment of plants using biomass to generate electricity.

Line 5 in Form S-2 is retail sales plus losses in the electricity transmission and distribution wires. California's Renewable Portfolio Standard is a percentage of retail

sales: Losses are excluded. Losses (typically about 7%) must be subtracted from the demand in line 5 in order to calculate how an entity is faring with respect to the RPS.

For MCE, the forecast renewable electricity in 2018 is 873 GWh and the forecast retail sales are about 1,875 GWh (2,006 GWh demand minus 7% losses), which puts MCE at 47% renewable electricity, much higher than the RPS goal for that year.

PG&E's Form S-2 shows a decrease in demand from about 85,000 GWh in 2013 to 66,000 GWh in 2024. I assume that the decrease reflects PG&E's forecast of how many of its customers switch to MCE, EBCE, and other CCAs. PG&E's forecast renewable energy in 2018 appears to be about 31% of its sales.

C. California curtails solar generators.

Curtailment is occurring to a limited extent in California. Over the last 12 months, the CAISO curtailed about 220,000 MWh of electricity that could have been generated by solar or wind plants (source below), which is less than 1% of California's electricity from solar and wind generators during that period. However, the CAISO's data show an upward trend.

Sources:

Electricity supply plans: Electricity supply plans filed in 2015 by California utilities and CCAs are available at: http://www.energy.ca.gov/almanac/electricity_data/s-2_supply_forms_2015/
The forms use the acronym LSE, or Load-Serving Entity, for utilities and CCAs that serve electricity demand, which is "load" in utility jargon.

Curtailment of solar generators: Data on the CAISO's curtailment of solar generators are shown in Figures 97 and 98 of the CAISO's Market Performance Metric Catalog for July 2016, at:
http://www.caiso.com/Documents/MarketPerformanceMetricCatalogforJul2016.pdf

Operation of generators, or "economic dispatch": The U.S. Energy Information Administration's summary of generator operation, entitled "Electric generator dispatch depends on system demand and the relative cost of operation", is here:
http://www.eia.gov/todayinenergy/detail.php?id=7590

The draft "Technical Study for Community Choice Aggregation Program in Alameda County" (lead author MRW Consulting, Inc.) is available at:
https://www.acgov.org/cda/planning/cca/documents/Feas-TechAnalysisDRAFT5312016.pdf (The final version should be posted soon.)

CAISO Daily Renewables Watch: Here is a link to the data for July 1, 2016: http://content.caiso.com/green/renewrpt/20160701_DailyRenewablesWatch.txt It shows two tables. The first is an hourly breakdown of renewable electricity by type—solar PV, small hydro, etc. The second table is an hourly breakdown of all in-area electricity supply and imports. In that table, electricity from fossil-fueled plants in the CAISO area is labeled "thermal". -- For July 1, 2016, note that the highest output in the "thermal" column is 14,292 MW at hour 20, i.e., 8 p.m. -- I chose July 1, 2016 at random. If you want to see a different date, say, September 15, 2016, replace 20160701 in the above link with 20160915.

Emission data: Data in the table were taken from the California Air Resources Board's emission inventory: https://www.arb.ca.gov/app/emsinv/2013/emssumcat_query.php?F_YR=2012&F_DIV=-4&F_SEASON=A&SP=2013&F_AREA=AB&F_AB=SF ARB labels its data as "estimated" because emissions from some categories, such as traffic, cannot be measured directly. Emissions from electricity generators are based on continuous emission monitors. The ARB's category "electric utilities" includes all power plants, regardless of ownership, and is shown in this letter as "power plants". The category "cogenerators" represents facilities that simultaneously produce electricity and a thermal product, such as high-pressure steam. NOx, or "oxides of nitrogen", is frequently confused with N2O, or nitrous oxide. NOx refers to a group of reactive urban air pollutants. N2O (used by dentists as "laughing gas") is a greenhouse gas so unreactive that it persists in the atmosphere for decades.

Eileen Harrington

From: Claire Griffing
Sent: Thursday, October 13, 2016 11:34 AM
To: Eileen Harrington
Subject: CCE Letter
Attachments: to City Council on organization.pdf

Hi Eileen,
Could you please forward this letter to Council from Mark Meldgin? It is a table about the organizational structure of a CCA versus PG&E's Energy Procurement, in response to a blog post by Dr. Severin Borenstein of U.C. Berkeley.

Thanks,

Claire Griffing
Sustainability Coordinator
City of Albany
1000 San Pablo Avenue
Albany, CA 94706
Phone: (510) 528-5754
FAX: (510) 524-9359

October 12, 2016

Albany City Council

Re: East Bay Community Energy Authority

Dear Council Members,

Following my letter to you dated October 6, 2016, I became aware of a February 2016 blog post by Dr. Severin Borenstein of U.C. Berkeley, on Community Choice Aggregators (CCAs). It notes the importance of the organizational structures of CCAs and utilities. His post concludes as follows:

> "Regulated investor-owned utilities are flawed organizations that operate under a distorted set of incentives. But local governments are also flawed organizations subject to their own set of distortions .... If your community is considering a CCA, you need to think about which organizational structure is most likely to have the sophistication and the incentives to serve you best." (Emphasis added, link in endnotes)

This letter contains a table in which I list some activities by retail sellers of electricity, and my best guess as to who would perform those activities under two different organizational structures, namely a CCA versus PG&E.

Disclaimer: Some topics in this letter are outside my direct experience during my career at PG&E, so the probability that I am mistaken is higher than usual.

Thank you,

Mark Meldgin
Albany CA

Discussion:

The following table lists some activities associated with supplying electricity and meeting requirements such as California's Renewable Portfolio Standard. It is not an encyclopedic list, but I hope it is useful as a starting point for thought and discussion.

An Administrative Services Provider is likely to be an important part of the organizational structure of East Bay Community Energy (EBCE) for its first few years. The Joint Powers Agreement for EBCE states:

> "The [EBCE] Board may appoint one or more administrative services providers to serve as the Authority's agent for planning, implementing, operating and administering the CCA Program..." (JPA Section 4.15)

Though EBCE's administrative services provider may be a for-profit company, it will not suffer from a criticism noted in Dr. Borenstein's post. He notes a claim by CCA advocates that:

- "...utilities [e.g., PG&E] like to build their own power plants so they can earn a rate of return on their investment."

Dr. Borenstein's post notes another criticism of utilities by CCA advocates:

- "And when they [utilities] do buy power from merchant generators they get to pass those costs along [to customers], so they are not out there searching for the best possible deal."

If EBCE uses a for-profit administrative services provider, EBCE will undoubtedly aim to write a contract that gives the provider a strong incentive to search for the best possible deal for EBCE's customers.

In the following table, I use "PG&E" for brevity, but I am referring to PG&E's electricity procurement group. PG&E's "wires" business is separate. I use "ASP" for EBCE's administrative services provider, though it is possible that within a few years after startup, EBCE will have developed its own staff.

The table includes entries on Requests for Proposals (RFPs). These are likely to become more important in the next few years: Senate Bill 350, signed by Governor Brown in October 2015, requires that 65% of each CCA's or utility's RPS procurement consist of resources that are owned or under long-term contracts of 10 years or more.

Organizational Structure		Activity
PG&E / CPUC	EBCE / Admin Svcs Provider	
		(1)Electricity Supply Plan (incl. % renewables)
PG&E	ASP	- Develop
CPUC	EBCE	- Approve
CPUC	EBCE	(2)Set rates and rate structure (e.g., peak, off-peak periods)
		(3)Power-purchase contracts
PG&E	ASP	- Negotiate
CPUC	EBCE	- Approve
PG&E	EBCE/consultants?	(4)Participate in CPUC proceedings (e.g., Power Charge Indifference Adjustment)
		(5)Support solar projects
PG&E	ASP?	- Write specs for RFP (limits on location, construction labor)
PG&E	ASP?	- Develop contract terms (price, escalation, curtailment)
PG&E/CPUC	EBCE?	- Select winners (min and max amounts e.g., to meet RPS)
		(6)Support energy storage projects
PG&E	ASP?	- Write specs for RFP (limits on location, construction labor)
PG&E	ASP?	- Develop contract terms (price, escalation)
PG&E	EBCE/consultants?	- Develop evaluation criteria (how to balance longevity, % efficiency, rates of absorbing electricity and generating electricity etc.)
PG&E/CPUC	EBCE?	- Select winners
		(7)Electric operations (e.g., bidding into CAISO markets)
PG&E	ASP?	- Strategy
PG&E	ASP	- Implementation

Dr. Borenstein's post, "Is 'Community Choice' Electricity Supply a Solution or a Problem?", is here:
https://energyathaas.wordpress.com/2016/02/08/is-community-choice-electric-suppy-a-solution-or-a-problem/
(Note the typo in the link: It should be "supply", but it really is "suppy".)

Eileen Harrington

From: Eileen Harrington
Sent: Monday, October 24, 2016 9:08 AM
Subject: FW: another letter to City Council
Attachments: to CIty Council on pre-mortem.pdf

Eileen Harrington
Deputy City Clerk and
Secretary to City Manager
CITY OF ALBANY
1000 San Pablo Avenue
Albany, CA 94706
Ph: (510) 528-5710

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From: Claire Griffing
Sent: Monday, October 24, 2016 9:02 AM
To: Eileen Harrington <EHarrington@albanyca.org>
Subject: FW: another letter to City Council

Hi Eileen,
Could you please forward this additional letter to Council from Mark Meldgin regarding the CCE item on November 7th?

Thanks,

Claire Griffing
Sustainability Coordinator
City of Albany
1000 San Pablo Avenue
Albany, CA 94706
Phone: (510) 528-5754
FAX: (510) 524-9359

October 24, 2016

Albany City Council

Re: East Bay Community Energy

Dear Council Members,

Nobelist Daniel Kahneman has been involved in many decisions and projects, not all of which turned out well. He believes overconfident optimism is a common human bias. To counter that bias, and minimize the chance of a painful post-mortem years after a decision has been made, he suggests a pre-mortem: Imagine that you are looking back on a decision that did not turn out well, and write a plausible account of how that happened. ("Thinking: Fast and Slow", by D. Kahneman, p. 264).

A pre-mortem is a negative story, but it is intended to serve a positive purpose: To identify pitfalls and work to avoid falling into them.

This letter presents a pre-mortem on East Bay Community Energy. I tried to imagine an analyst in 2025, retrospectively examining why EBCE did not completely meet expectations.

The bad outcome in my pre-mortem is not that bad, and it should be weighed against the possibilities of other outcomes, including the vision of its proponents: Greater emission reductions than PG&E would provide, at similar or lower rates, for a large number of customers, using some local renewable resources.

My pre-mortem is presented below. I encourage you to imagine and write your own pre-mortem: A lot of pre-mortems would facilitate discussion and promote good decision-making.

Thank you,

Mark Meldgin
Albany CA

A Pre-mortem for East Bay Community Energy

(**This is a fictional account**. I am imagining that an analyst is writing in, say 2025, explaining why EBCE did not completely meet initial expectations. References to events before October 2016 are fact, but all references to "events" after October 2016 are fictional.)

In retrospect, EBCE was adversely affected by (1) a requirement in California Senate Bill 350, (2) a perception that PG&E was more creditworthy than EBCE, and (3) EBCE's decisions to build lots of small solar projects in Alameda County while PG&E was building large solar projects in sunnier spots with cheaper land.

Governor Jerry Brown signed Senate Bill 350 on October 7, 2015. Most attention on SB 350 focused on its requirement for increasing percentages of renewable electricity in the portfolios of EBCE, PG&E, and other California entities that sell electricity to retail customers. Earlier law had required 33% renewables by 2020. SB 350 mandated higher Renewable Portfolio Standards (RPS) in subsequent years: 40% renewables during 2021-2024, 45% during 2025-2027, and 50% thereafter.

A less-publicized provision in SB 350 was its requirement for long-term contracts or ownership of renewable electricity sources: By 2021, 65% of the renewables used to meet each entity's RPS mandate had to be owned or under long-term contract. For 2021-2024 for example, the RPS was 40%. SB 350 required that 65% of that 40% renewable requirement, or 26% of each retail seller's total portfolio (26% = 65% x 40%), had to be renewables that were owned by the retail seller or under long-term contract.

In retrospect, that requirement of SB 350 was significant. Developers, before bidding to build renewable resources for retail sellers, naturally considered the creditworthiness of each counterparty. PG&E was considered creditworthy. It had "deep pockets" because of its assets. In addition, part of its customer base was considered captive because some parts of PG&E's service area had no local pressure to create or join a Community Choice Aggregator like EBCE.

Developers considered EBCE less creditworthy than PG&E. EBCE's customers were not captive—they had the option to leave EBCE and return to PG&E on short notice.

The perception that EBCE might be less creditworthy than PG&E caused developers to offer relatively high prices to EBCE. A consultant's report in the summer of 2016 had estimated that large solar projects in Alameda County would cost 15% more, and small solar projects 55% more, than large projects in more favorable locations. In hindsight, those were underestimates.

EBCE's constituencies strongly supported local solar projects, despite the costs. By 2021, EBCE's rates were higher than PG&E's by an amount that caused some EBCE customers to return to PG&E service. PG&E, serving an unexpected influx of customers, applied to the CPUC and received a temporary waiver from PG&E's RPS requirement.

By 2025, the situation improved: EBCE had retained a stable base of customers buying electricity with a higher renewable content than PG&E's, largely from local sources, even though EBCE's rates were higher than PG&E's. Greenhouse gas emissions from

California's electricity sector were slightly higher during the period of PG&E's waiver. But by 2025, emissions were lower, and on track to remain lower than if EBCE had not been created: PG&E was meeting the RPS requirement, but EBCE was exceeding it, as had been promised back in 2016.

References:

PUC Code: http://www.leginfo.ca.gov/cgi-bin/displaycode?section=puc&group=00001-01000&file=399.11-399.32

Consultant's report: 15% premium for large solar in Alameda County, 55% premium for small solar, on p. 11 of draft report.

Eileen Harrington

From: Jessica Tovar <jessica@localcleanenergy.org>
Sent: Wednesday, November 02, 2016 1:43 PM
To: citycouncil; Peter Maass; Michael Barnes; Nick Pilch; Peggy McQuaid; Rochelle Nason
Subject: Letter to Albany City Council re: Community Choice
Attachments: EBCPA Letter to Albany City Council_11-2-16.pdf

Attached you will find a letter from East Bay Clean Power Alliance to Albany City Council.

Jessica Tovar

--

For more information contact:

Jessica Guadalupe Tovar,

Local Clean Energy Alliance Organizer

415-766-7766 (call and text)

jessica@localcleanenergy.org

436 14th Street Suite 1216 Oakland, CA 94612

Follow Community Choice Energy on Twitter!

Click here to donate & support my work for local renewable energy solutions!

Learn more about the Local Clean Energy Alliance by checking out our video "Community Choice, Community Power"

Give Albany residents and businesses a choice:

Join the county-wide Community Choice energy program!

November 2, 2016

Dear Mayor and Members of the Albany City Council:

The Alameda County Board of Supervisors has committed over $3.7 million to establishing a Community Choice energy program that will enable cities in the county to offer their residents and businesses a choice of electrical energy service provider—without financial risk to the cities.*

Community Choice, provided for in California by AB 117, enables cities and counties to form a public energy agency, which can decide where the electricity for their homes and businesses will come from. This means we can choose to get more of our electricity from renewable energy sources: we can do that by purchasing renewable electricity on the market or, even better, by developing local renewable energy resources in the community.

Under a Community Choice program, the incumbent investor-owned utility company (PG&E) continues to deliver electricity and provide customer service.

In the Bay Area, the counties of San Francisco, San Mateo, Sonoma, and Marin have already established successful Community Choice programs.

Climate Action, Clean Energy Jobs, and Community Benefits

Community Choice is a way to reduce greenhouse gas emissions and address the impact of climate change by reducing energy consumption and demand, switching to renewable energy sources, and building local renewable electricity generation.

By developing local renewable energy resources, Alameda County's Community Choice program can spur economic development in the community, provide family-supporting and union clean energy jobs, boost our local economy, allow for cheaper and more stable electric utility bills, improve public health by reducing pollution, and provide other community benefits.

Join the Proposed Joint Powers Authority

The East Bay Clean Power Alliance is a county-wide Community Choice advocacy coalition supported by over 58 community-based organizations and collaborating with the Alameda Labor Council. We have been working for over two years to bring Community Choice to our communities as a way to address climate change, provide direct benefits to Albany's residents and businesses, and strengthen sustainability and community resilience.

We urge Albany to become a founding participant in this new energy program.

By joining the proposed Joint Powers Authority, Albany will not only be able to offer its residents and businesses a choice about where their electricity comes from, it will be able to help shape the Community Choice program from the start to ensure that their interests are represented. The more cities that join early on, the quicker the program will meet its goals.

Sincerely,

Jessica Tovar,
Coordinator of the East Bay Clean Power Alliance
For more information contact: 415-766-7766 jessica@localcleanenergy.org

** The proposed Joint Powers Authority provides a firewall protecting cities from any financial risk associated with operation of the Community Choice program.*

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November 7, 2016

Mayor Peter Maass and Members of the City Council
City of Albany
1000 San Pablo Avenue
Albany, California 94706

RE: Item 7.1 – Albany's Participation in the East Bay Community Choice Aggregation Program

Dear Mayor and Members of the City Council:

The Sierra Club strongly supports the City of Albany in becoming an East Bay Community Energy ("EBCE") participant, and we appreciate the opportunity to comment on this matter.

EBCE is the new non-profit, local power agency that would give residents and businesses within Alameda County an opportunity to decide where their electricity comes from. The program will develop a Business Plan that will work as a roadmap to foster community and economic benefits, such as local renewable energy resources and clean energy jobs. EBCE will not only provide lower and more stable electricity rates than the incumbent utility, but also serve as a crucial tool in facilitating the transition to a clean energy economy and achieving Albany's greenhouse gas emission reduction goals.

We applaud the City Council for continuing to demonstrate Albany's climate leadership, and look forward to working with you to implement this important program.

Sincerely,

Luis Amezcua
Co-Chair, Energy and Climate Committee
Sierra Club, San Francisco Bay Chapter

2530 San Pablo Ave., Suite I, Berkeley, CA 94702 Tel. (510) 848-0800 Email: info@sfbaysc.org