CITY AND COUNTY OF SAN FRANCISCO BOARD OF SUPERVISORS

BUDGET AND LEGISLATIVE ANALYST

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February 10, 2017

TO: Government Audit and Oversight Committee

FROM: Budget and Legislative Analyst

SUBJECT: February 16, 2017 Government Audit and Oversight Committee Meeting

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Item 1	Department:
File 16-1179	Public Utilities Commission (PUC)

EXECUTIVE SUMMARY

Legislative Objectives

The proposed ordinance amends the Environment Code, Chapter 18, to revise (i) the
incentives paid to San Francisco residents and businesses to participate in the Solar
Energy Incentive Program for the installation of solar systems on residential and
commercial properties, and (ii) certain program requirements; and affirms the Planning
Department's determination under the California Environmental Quality Act.

Key Points

- GoSolarSF is administered by the San Francisco Public Utilities Commission (SFPUC) and
 offers incentives for installation of solar systems to all qualified residents and businesses
 in San Francisco.
- This ordinance would (a) limit eligibility for GoSolarSF incentives to customers of SFPUC's Hetch Hetchy Power Enterprise and SFPUC's community choice aggregation program (CleanPowerSF); (b) simplify and put into place annual reductions in the amount of the incentives paid to San Francisco residences and businesses to reflect the lower cost of solar system installation and to extend the program budget through 2021; (c) revise the amount of incentives paid to low-income households and residents of Environmental Justice Districts; (d) modify the workforce development requirements to require that any individual or company installing solar systems as part of the GoSolarSF program participate in the City's First Source Hiring program; (e) provide that the SFPUC may extend program eligibility to complementary distributed energy programs, such as incentives for inverter replacement, energy storage or electric vehicle infrastructure; and (f) delete references to the one-year pilot program that is no longer in effect.
- SFPUC is recommending changes to the SFPUC Solar Energy Incentive Program because of reductions in the costs of installing solar systems and availability of tax credits to San Francisco residents.

Fiscal Impact

• The Solar Energy Incentive Program is funded by Hetch Hetchy Power revenues. The current fund balance for the Solar Energy Incentive Program is \$7.275 million, as previously appropriated by the Board of Supervisors. Under the proposed ordinance, the funds of \$7.275 million would pay for program incentives and administrative expenses through approximately December 2021.

Recommendations

- Amend the proposed ordinance to revise the language on page 4, lines 13-14 from "the SFPUC intends to allocate \$11 million of power revenues" to "the SFPUC intends to allocate \$7.275 million of power revenues."
- Approval of the proposed ordinance as amended is a policy matter for the Board of Supervisors.

MANDATE STATEMENT

Charter Section 2.105 requires that legislative acts in San Francisco be by ordinance, subject to approval by a majority of the Board of Supervisors.

BACKGROUND

GoSolarSF was established in 2008 by Ordinance 102-08 (File 07-1679), which amended the Environment Code by adding Chapter 18 creating a Solar Energy Incentive Program. GoSolarSF is administered by the San Francisco Public Utilities Commission (SFPUC) and offers incentives for installation of solar systems to all qualified residents and businesses in San Francisco. GoSolarSF requires all installers to participate in City workforce development programs and includes additional incentives for low-income homeowners and households, applicants in Environmental Justice Districts, and installers having their principal office located in San Francisco. Chapter 18 allows the SFPUC to extend program eligibility to other types of customer-owned distributed renewable energy generation systems. The original program also included a one-year pilot program for low income customers. The pilot program is no longer in effect; however the current program includes a low income incentive.

DETAILS OF PROPOSED LEGISLATION

The proposed ordinance amends the Environment Code, Chapter 18, to revise (i) the incentives paid to San Francisco residents and businesses to participate in the Solar Energy Incentive Program for the installation of solar systems on residential and commercial properties, and (ii) certain program requirements; and affirms the Planning Department's determination under the California Environmental Quality Act.

This ordinance would:

- Limit eligibility for GoSolarSF incentives to customers of SFPUC's Hetch Hetchy Power Enterprise and SFPUC's community choice aggregation program (CleanPowerSF);
- Simplify and put into place annual reductions in the amount of the incentives paid to San Francisco residences and businesses to reflect the lower cost of solar system installation and to extend the program budget through 2021;
- Revise the amount of incentives paid to low-income households and residents of Environmental Justice Districts;
- Modify the workforce development requirements to require that any individual or company installing solar systems as part of the GoSolarSF program participate in the City's First Source Hiring program;
- Provide that the SFPUC may extend program eligibility to complementary distributed energy programs, such as incentives for inverter replacement, energy storage or electric vehicle infrastructure: and
- Delete references to the one-year pilot program that is no longer in effect.

According to Mr. Randall Smith, SFPUC Project Manager, SFPUC is recommending changes to the SFPUC Solar Energy Incentive Program because of reductions in the costs of installing solar

systems and availability of tax credits to San Francisco residents. Since implementation of the Solar Energy Incentive Program in 2008, the cost of solar power has declined significantly, and San Francisco residents and businesses often install solar systems on their property without using SFPUC's Solar Energy Incentive Program or the California's Solar Incentives (CSI) program administered by the California Public Utilities Commission (CPUC). California residents who install solar systems may also apply for a 30 percent federal tax credit for solar power. In addition, CPUC has put into place net-energy metering terms for Pacific Gas and Electric Company customers installing solar power. San Francisco offers similar net-energy metering terms to CleanPowerSF customers.¹

In 2015, the SFPUC launched CleanPowerSF, San Francisco's community choice aggregation program. CleanPowerSF offers Standard, Green and SuperGreen options. The SFPUC intends to market GoSolarSF with the SuperGreen CleanPowerSF option to maximize participation in both programs. This ordinance would reduce incentives paid to San Francisco electric customers over time in order to maximize the benefit of GoSolarSF to San Francisco.

In addition, SFPUC has identified additional opportunities to promote distributed energy technologies, including incentives for inverter replacements, energy storage and electric vehicle infrastructure.

FISCAL IMPACT

The Solar Energy Incentive Program is funded by Hetch Hetchy Power revenues. The current fund balance for the Solar Energy Incentive Program is \$7.275 million, as previously appropriated by the Board of Supervisors.

The proposed ordinance reduces the amount of incentives to be paid for each (a) residential solar installation from the current amount of up to \$2,000² per installation to the new amount of \$500 per kilowatt³; and (b) commercial solar installation from the current amount of up to \$1,500 per kilowatt to the new amount of \$500 per kilowatt. The incentive payment would be reduced each year by \$100 per kilowatt⁴. According to Mr. Smith, the Solar Energy Incentive Program was originally set to expire in 2018. The reduction in the incentive amount would allow the program to be extended to 2021, using the current available funding of \$7.275 million.

Residents of Environmental Justice Districts and recipients of the California Department of Housing and Community Development's CalHOME loan program would receive an additional

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¹ "Net energy metering" is a special billing arrangement that provides credit to customers with solar photovoltaic systems for the full retail value of the electricity their system generates.

² The ordinance provides for incentive amounts up to \$3,000 but SFPUC has reduced the incentive amounts for FY 2014-15 and FY 2015-16 to \$2000 per installation.

³ For example, an average household may install solar panels totaling 3 kilowatts and receive an incentive payment of \$1,500. The proposed ordinance provides for other incentives and limits for specific customers or installation types.

⁴ Upon approval of the proposed ordinance, the incentive payments for residential and commercial solar installations will be reduced to \$400 per kilowatt per 2017 step-down guidelines. There will be a one month grace period to implement the adjustment.

\$100 per kilowatt for solar system installation. Households certified by the Mayor's Office of Housing and Community Development (MOHCD) as earning incomes at or below the San Francisco median income are eligible for an additional \$2,000 per kilowatt for solar system installation. This revises the existing program, which provides incentive payments to these residents of up to \$7,000.⁵

The cumulative total amount of incentives paid by the SFPUC to owners of residences and businesses, as well as nonprofits, in San Francisco as of December 2016 is approximately \$24.5 million since the Solar Energy Incentive Program's inception in 2008, as shown in Table 1 below.

Number of **Time Period** kWac Amount **Applications** FY08 - 09 \$2,169,000 350 980 FY09 - 10 5,135,000 640 2,269 FY10 - 11 446 1,440 4,274,000 FY11 - 12 398 1,060 3,144,000 FY12 - 13 447 1,016 3,009,000 FY13 - 14 559 2,335 2,322,000 FY14 - 15 599 2,311 1,974,000 FY15 - 16 437 1,969 1,489,000 FY16 - 17 (as of Dec. 2016) 313 1,633 1,009,000 4.189 15,013 \$24,525,000 Total

Table 1: Incentives Paid to Date for GoSolarSF Program

As noted in Table 1 above, the Solar Energy Incentive Program's payments have decreased from \$5.1 million in FY 2009-10 to \$1.5 million in FY 2015-16, and the number of applications decreased from 640 in FY 2009-10 to 437 in FY 2015-16.

According to Mr. Smith, SFPUC projects that the current Hetch Hetchy fund balance of \$7.275 million in the Solar Energy Incentive Program will pay for incentives and the program's administrative expenses to December 2021. Table 2 below shows the revised estimated cost of incentives until the program is projected to sunset in December 2021.

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⁵ Under the current program, recipients of CPUC's California Alternative Rates for Energy (CARE) program receive incentive payments; this provision is removed from the proposed ordinance.

Table 2: Revised Estimated Cost of Incentives for the Extended Program Duration

Time Period	Amount	Administrative	Administrative Costs as a Percent of Incentive Payments
FY17 – 18	\$1,487,000	\$371,750	25%
FY18 – 19	1,385,000	346,250	25%
FY19 – 20	1,253,000	313,250	25%
FY20 – 21	983,000	245,750	25%
FY21 – 22	719,000	179,750	25%
Total Cost of Incentives	\$5,827,000	\$1,456,750	25%
Grand Total (Incentives and Admin Fees) ⁶	\$7,2	283,750	

Administrative costs consist of SFPUC staff time (including one full time Utility Analyst and one half-time Manager III position), consultant staff, and application software.

Proposed Amendment

The proposed ordinance states on page 4, lines 13-14 that "the SFPUC intends to allocate \$11 million of power revenues". However, as discussed above, the SFPUC intends to allocate approximately \$7.275 million of power revenues to be paid out in incentives over the remaining extended duration of the Solar Energy Incentive Program. Therefore, the proposed ordinance should be amended on page 4, lines 13-14 to state "the SFPUC intends to allocate \$7.275 million of power revenues."

RECOMMENDATIONS

- 1. Amend the proposed ordinance to revise the language on page 4, lines 13-14 from "the SFPUC intends to allocate \$11 million of power revenues" to "the SFPUC intends to allocate \$7.275 million of power revenues."
- 2. Approval of the proposed ordinance as amended is a policy matter for the Board of Supervisors.

⁶ The difference of \$8,750 in planned expenditures of \$7,283,750 to available funds of \$7,275,000 will be absorbed in the program budget.