

**Public Benefits Program Proposal for FY 2023-2024  
through 2027- 2028**

**Silicon Valley Power**

**City of Santa Clara**



# Public Benefits Program Proposal for FY 23/24 to 27/28

The City is required to collect and spend 2.85% of its electric sales revenues on cost effective energy efficiency, new renewable generation, low-income energy programs, and new electric technologies research and development. Assembly Bill 2021 (AB 2021), which passed in 2006, required the City Council to adopt energy efficiency goals for the next ten years and to report its energy efficiency savings to the California Energy Commission (CEC). The most recent energy efficiency potential study was conducted by GDS Associates, Inc. and the goals were adopted by City Council in 2021 at the following rate:

CUMULATIVE SAVINGS	UTILITY SPECIFIED FEASIBLE GOAL IN MWH
2021-2022	11,584
2022-2023	11,536
2023-2024	11,013
2024-2025	10,604
2025-2026	8,913
2026-2027	7,305
2027-2028	6,651
2028-2029	5,808
2029-2030	5,817
2030-2031	5,372

## **Goals & Objectives**

1. Implement cost-effective energy efficiency programs to lower energy use. The cost to implement energy efficiency programs should be lower than the capital cost to build new generation and benefits of the total programs should exceed costs under the Total Resource Cost (TRC) test under the methodology reviewed and approved by the Northern California Public Agency (NCPA) Demand Management Working Group, of which Silicon Valley Power's PBC program manager is a member.
2. Provide the PBC programs in a manner that creates value to the community and meets all applicable legal requirements.
3. Assist Divisions and City Departments in achieving optimal energy efficiency at City facilities and assist in implementing new energy related technologies for the benefit of the City and community.
4. Implement programs to support renewable power generation that increase resource diversity and minimize adverse environmental impacts from electric generation and operation of the electric system.
5. Support emerging technologies to speed up market acceptance therefore, allowing

energy efficiency services and products to compete in the open market.

6. Assist low-income residents in helping them to pay their electric bills and in installing energy efficient appliances and other measures.
7. Determine the best energy programs to offer Santa Clara customers by collecting input from community organizations, businesses and other City departments.

## ***Program Summaries***

### **Proposed New and Modified Programs for FY 22/23 to 27/28**

#### **New Programs**

- *Commercial Solar and/or Solar Plus Battery Storage Performance Incentive Program:* This program will provide performance-based incentives to commercial customers who install large solar plus battery storage systems to assist in reducing the coincident peak demand and/or assist in areas where electric transmission and distribution resources are constrained. A performance-based incentive for installation of large solar systems may also be offered if there are significant grid benefits to Silicon Valley Power for installations without battery storage systems.
- *Municipal Energy Efficiency Project On-Bill Financing Program:* This program will provide on-bill financing for projects implemented at City facilities where the City is the utility account holder and that meet all other requirements of Silicon Valley Power's energy efficiency programs. Projects must have a payback period not more than 5 years after rebates. Payments will be spread across utility bills based on the payback period, not to exceed 5 years. The intent of this program is to help City departments fund energy efficiency projects through utility bill savings.
- *Scholarship Program for Income-qualified Residents:* This program will provide scholarships to customers who meet specified income requirements. Eligibility will be working age adults who enroll in a technical school or training program for a career that will support the energy industry. Examples include but are not limited to HVAC technicians, solar system installers, utility lineworkers, etc. The intent of the program is to assist those with the lowest incomes to obtain the skills and certifications necessary to obtain higher paying jobs and to support workforce development in the energy industry or industries that support energy efficiency and building electrification programs.
- *Income Qualified Used Electric Vehicle (EV) Rebate:* This program will provide an incentive for income-qualified customers to purchase a used EV or plug-in hybrid electric vehicle. Incentives will be tiered to provide a higher incentive for an EV over a plug-in hybrid, and will include an equity component with a bonus incentive for those who qualify for the LIHEAP program. An additional bonus incentive maybe included for vehicles meeting specified minimum charging efficiency (kWh per 100 miles driven). Funding for past Low Income EV Rebates came from Low Carbon Fuel Standard Credit funding, and this program will be funded under the low income category of the Public Benefits Charge.

#### **Ongoing Programs**

- *Data Center Efficiency Program:* This program targets data centers with IT server load greater than 350 kW or cooling load greater than 100 tons. The incentive is paid as a performance incentive over multiple years.
- *Customer Directed Rebate:* This program provides incentives based on actual energy saved for energy efficiency measures that do not fall into SVP's standard business rebate programs. The program also includes a performance incentive option for projects where persistence savings is questionable.
- *Commercial Lighting Rebates:* This program provides an incentive for upgrading to more efficient lighting paid based on actual energy saved.
- *Residential Pool Pump Rebate:* This program provides a rebate to residential customers installing a new variable speed pool pump with a qualifying controller.
- *Residential Heat Pump Electric Water Heater Rebate:* SVP offers a rebate for the purchase of a qualified electric heat pump water heater with bonus incentives to income-qualified customers.
- *Residential In-Home Energy Audits, Education, and Hotline:* The program encourages residents to become more energy efficient and reduce their energy bills through home audits, online and in person classes, school programs and community outreach at events. Energy audits include free items to improve home weatherization where needed. This program also includes support of the Santa Clara City libraries and schools located in the city of Santa Clara through donation of materials on the topics of energy efficiency and renewable energy for libraries and classrooms.
- *Tool Lending Library:* This program provides tools and equipment to the Santa Clara City libraries so they may be checked out to library patrons to assist in measuring energy consumption and installing energy efficient measures in their homes.
- *Tier II Advanced Power Strip Giveaway Program:* Silicon Valley Power provides free Tier II Advanced Power Strips (APS) to income-qualified customers and residents of multifamily apartment complexes. A Tier II APS is also included in the energy saving items provided during a home energy audit.
- *Financial Rate Assistance Program (FRAP):* This program provides a discount on the electric portion of utility bills for income-qualified residential customers, up to the first 800 kWh of use per month.
- *Residential Blower Door and Duct Testing Pilot Program:* In an attempt to help customers improve the efficiency and comfort of their homes through the reduction of leaks, this pilot program will be available to residential customers in single family homes who have central air conditioning. A free SVP audit will be required to determine if the home is a good candidate for the blower door test. Duct testing is a much more involved process and will be offered to those customers who are a good candidate for reducing the leaks in their air conditioning duct system, who demonstrate an interest in taking action to improve the duct work, and who are not already doing an air conditioning system upgrade where a duct test is required by building code. The service will be free to eligible customers under the pilot program. At the time of this report, this pilot program is still in the design phase and has not yet been launched.
- *Silicon Valley Power Marketplace:* The Marketplace is an online marketplace where residential customers can purchase energy saving equipment and electric yard care

equipment. Instant rebates are available on some types of equipment, with higher rebate levels available to income-qualified customers. Shipping is free on all purchases over \$50 and is a flat rate of \$5 per order for all other orders.

- *Low Income EV Charging Station Grant for Multi-family properties* – Under its low income programs, SVP offers a grant per charging station for multi-family properties where 15% of customers residing at the property qualify for SVP’s low income programs.
- *Medical Rate Assistance Program*: Customers receive a 25% discount on their electric bill if they qualify due to high electric use for medical reasons. The programs are managed in-house.
- *Low Income Solar Grant Program*: This program provides a grant to income-qualified homeowners to install a solar system on their roof. The program is intended to offset up to 100% of their annual energy use.
- *Emerging Technologies Grant*: This program encourages businesses to demonstrate new products and product applications not yet commercially viable in today’s marketplace, install energy efficient technologies not generally known or widely accepted, yet show potential for successful market growth, successfully apply energy efficiency solutions in new ways, or introduce energy efficiency into industries or businesses that are resistant to adopting new technologies or practices.
- *Commercial New Construction Rebate*: This program provides a rebate to customers who exceed Title 24 by 10 percent for the measure being incentivized, in line with other prescriptive rebates for retrofit projects. A Design Team Incentive matching the Investor Owned Utilities’ program is provided.
- *Business Energy Audits*: Provides free energy efficiency audits to business customers. Energy & Resource Solutions administers this and other business PBC programs.
- *Business Rebates*: Encourages businesses to install energy efficient lighting, HVAC equipment, enhanced ventilation controls, food service equipment, etc. The programs are occasionally changed to match statewide programs.
- *Small Business Efficiency Services Program*: This program is targeted at small business customers, and provides assistance in identifying energy efficiency projects, selecting and managing contractors, and help with filling out rebate application paperwork. The program also provides a bonus incentive for lighting and HVAC rebates, provided that customers install the lighting measures within 6 months of program enrollment and HVAC measures within 12 months of enrollment in order to receive the additional incentive.
- *Energy Efficiency Grant for Nonprofit Organizations*: This program provides grants to nonprofit organizations to improve the energy efficiency of their facilities.
- *Energy Efficiency Grant for Homeowners Associations*: This program provides a grant for Homeowners Associations (HOAs) to upgrade to more energy efficient equipment in the common areas of their communities.
- *Community Outreach Grants for Energy Efficiency and Building Electrification Education*: This program provides an opportunity for nonprofits and community-based organizations to receive a grant up to \$10,000 to promote energy efficiency and building electrification benefits within our community. A focus on traditionally

underserved communities or diversity, equity and inclusion is required.

- *Student Grants for Energy Efficiency and Renewable Energy Projects or Awareness Campaigns:* Silicon Valley Power offers grants up to \$5,000 for high school students to create projects or awareness campaigns that will educate the Santa Clara community about energy efficiency and/or renewable energy. Examples include but are not limited to educational videos, public art displays, online resources, outreach materials, demonstration projects, webinars, or workshops.
- *Controls Program:* This program is available for projects where at least 80% of the savings come from the control strategies.
- *Building Optimization Rebate:* For buildings with HVAC systems controlled by building automation systems, a rebate is provided for reprogramming the control system to optimize HVAC performance. Typically, this involves conducting an energy assessment that provides an implementation plan for testing and making control system improvements that optimize HVAC operation.
- *Commercial Electrification Incentives:* This program provides bonus incentives for the electrification of efficient food service equipment. Incentives are also available for heat pump water heaters, heat recovery chillers, heat pump pool heaters and heat pump air conditioners.
- *Customer Directed Electrification Rebate:* This program pays an incentive based on measured and verified energy savings for any building electrification project that does not fall within the standard electrification rebates.
- *Induction Cooking Demonstration Project:* Silicon Valley Power retrofitted the Santa Clara Unified School District's Adult Education cooking classroom with induction cooktops and new cookware. This program sponsors classes once or twice per month for residents to learn to cook new cuisine while trying out an induction cooktop. Adult Education cooking instructors were provided with training on the benefits of induction cooktops and lessons they can teach to demonstrate the benefits. Handouts are also provided to all program participants.

## **Programs Ending**

- *Residential Electric Dryer Rebate Program:* This program provided a rebate for ENERGY STAR-qualified electric clothes dryers that meet the minimum Combined Energy Factor (CEF) rating. Due to low energy savings that can be claimed, this program will end.
- *VFD Air Compressor Rebate:* This measure is for VFDs on rotary screw air compressors of 5hp – less than 25hp, as the energy code requires VFDs on compressors of 25hp or greater. Following customer outreach for this program, we found very little potential within the City of Santa Clara, so this program will be retired. If a customer has a qualifying air compressor and would like to install a variable frequency drive (VFD), an incentive can be provided under the Customer Directed Rebate program.

## **Third Party Programs for Business Customers**

As one of the ways to enhance energy savings through the PBC programs and meet kilowatt hour and kilowatt demand reduction goals, SVP periodically embarks on an RFP process to add third party energy efficiency programs to its Public Benefit Program offering. Of the responses

received each cycle, a review team selects responses that are both cost-effective and the most likely to help customers without overlapping with programs already being provided. The most recent RFP was issued in April 2018 and an RFP is currently under development to be issued in late spring 2023. Additional programs will be added under contracts awarded through the RFP process.

Of the programs selected and implemented from the 2018 RFP, the following is still offered with an end date of June 30, 2023:

- *Small Business Exterior Lighting Program:* This program provides a free snapshot audit of exterior lighting efficiency opportunities. It then provides free LED exterior lights to eligible small businesses. The businesses are responsible for the installation cost and can use their own staff, the contractor of their choice, or one of the contractors working with the program provider.