

VALLEY CLEAN ENERGY ALLIANCE

Staff Report – Item 11

TO: Community Advisory Committee

FROM: Mitch Sears, Interim General Manager

DATE: July 22, 2021

SUBJECT: VCE Proposals to the Yolo County American Recovery Plan (ARP) Funding Process

The purpose of this report is to transmit the proposals that VCE submitted to the Yolo County American Recovery Plan (ARP) Funding Process.

BACKGROUND

In early July VCE staff submitted proposals to the County’s American Rescue Plan (ARP) proposal solicitation process ([American Rescue Plan | Yolo County](#)).

The proposals were submitted on July 2nd. In summary, VCE submitted four independent proposals addressing (1) customer bill relief, (2) low-income household energy efficiency upgrades, (3) electric reliability in Downtown Winters, and (4) agricultural irrigation demand response program (Attachment 1). The funding request for the four proposals totals \$21M. Note: These are straw proposals at this stage that may be modified as the County’s process unfolds; if ultimately selected, staff assumes that fully developed proposals will be required. Staff will seek CAC input and feedback if the proposals gain traction in the County’s process.

Prior to submitting the proposals, staff was able to brief several Board members. Originally the focus was on a single proposal (customer bill relief), but after discussions with the Board members staff decided to expand the request to include several program areas that are consistent with the VCE Strategic Plan. VCE staff will be participating in the County’s public workshops that are outlined on their ARP web page linked above and will update the Board and CAC as the process moves forward.

ATTACHMENT

1. VCE Yolo County ARP Process Proposals

July 2, 2021

Narratives submitted by VCE to the Yolo County American Rescue Plan (ARP) proposal solicitation on 7/2/21. Four independent proposals addressing (1) customer bill relief, (2) low-income household energy efficiency upgrades, (3) electric reliability in Downtown Winters, and (4) agricultural irrigation demand response program.

Proposal 1

Title: Yolo Electric Bill Relief

Requested amount: \$2.56M

Valley Clean Energy (VCE) is the local public not-for-profit electricity provider created by the County and cities of Woodland, Winters, and Davis in 2018 to supply cost competitive clean electricity to Yolo County residents and businesses. VCE serves over 90% of electricity customers in our service territory, approximately 125,000 people (61,637 customer accounts). Based on customer billing data supplied by PG&E and analyzed by VCE and its energy consultant team at SMUD, non-payment of electricity generation charges in VCE service territory attributable to the COVID pandemic to date has totaled \$2.56M.

Electricity utility bill relief will serve to directly lower the economic burden associated with the pandemic for thousands of Yolo County households quickly, efficiently, and with certainty. Direct electricity utility bill relief will immediately free up household funds to focus on other essential needs such as housing, food, and health care. VCE's billing platform, designed and managed by SMUD under contract, has allowed VCE to identify those households who are struggling to pay their electricity bills during COVID. The requested ARP funding will allow VCE, with minimal administrative costs, to credit and notify all qualifying households within an estimated 30 to 60 days of a funding award. A total of 11,312 households are 6 months or more in arrears on their VCE electricity bills.

VCE also has the ability to analyze customer segments to design a relief program prioritizing emerging and historically marginalized communities to receive relief first. This is consistent with VCE's adopted statement to integrate and address the concerns and priorities of these communities in the design and implementation of VCE's services, administration, and programs—to ensure all our customers are well served.

Key co-benefits of this ARP support request include freeing up VCE resources to continue to develop local programs, source greater levels of clean energy, improve local grid reliability, and maintain greater rate stability for its 125,000 Yolo County customers. Examples of the local programs include energy efficiency improvements for residential and agricultural customers that deliver on-going cost savings and GHG reductions for years after the initial investments are made. These and other local programs are included in VCE's 3-year Programs Plan.

Note: VCE and other California electricity providers are currently working with the State to determine how funds identified in the Governor's budget and CPUC for utility payment relief will be allocated - it is unclear how much or when such funding would be allocated for non-payment of VCE electric bills. In addition, VCE will be making similar companion ARP funding requests of the cities it serves to also contribute to the Yolo Electric Bill Relief program. If funds are ultimately made available by the State for these purposes, VCE would amend its application to the County to avoid funding duplication.

Proposal 2

Title: Low-Income Household Energy Retrofits

Requested amount: \$6M

The Valley Clean Energy (VCE) 3-year Programs Plan identifies energy efficiency upgrades as a key action in delivering on-going savings and GHG emission reductions for Yolo County households. The proposed retrofit program would focus on VCE's California Alternate Rates for Energy (CARE) and Family Electric Rates Assistance (FERA) customers, CARE and FERA eligible customers, and those who have struggled to pay their VCE electricity bills during the pandemic. The CARE and FERA customers are all income qualified through the State and represent many classes of heavily impacted essential workers. The proposed retrofit program would address two important challenges: (1) sustained energy bill reductions for lower income households and (2) retrofitting the existing building stock.

VCE's low-income household energy retrofit program would be focused on a basic package of building envelope improvements (e.g. windows, air sealing, etc.), smart controls, and high efficiency heating/cooling/water heating and appliance upgrades. These types of improvements would allow some of the most economically impacted households in Yolo County (renters and owners alike), to improve comfort and see short and long-term reductions in energy costs. Most improvements would be "fixed" to the building helping to maintain the housing stock and benefit any tenant/owner over the life of the improvements. In addition, this would be an opportunity to simultaneously improve indoor air-quality in lower-income households as gas devices are replaced with efficient electric appliances.

VCE's objective would be to "stack" existing rebates and incentives from the State with ARP funding to maximize impact and the number of households that could participate. VCE would draw on SMUD's decades of experience in design and implementation of energy efficiency retrofits and invite the UC Davis Energy and Efficiency Institute to advise on program design and measurement of outcomes to build a strong foundation for future energy retrofit programs in Yolo County.

Key co-benefits of this ARP support request include the potential for customer driven reduction of VCE's peak load through reduced demand. This not only results in household energy cost savings but also helps reduce VCE's need to buy the most expensive type of power for its customers during the summer peak. This type of power is called Resource Adequacy and cost VCE customers over \$17M in 2020. Even a small reduction in the peak load can save VCE customers hundreds of thousands of dollars a year while contributing to grid reliability. Another important co-benefit is the job creation potential for a retrofit program of this scale. In particular, the trades would be called on heavily for retrofits and installation of energy efficiency equipment.

Proposal 3

Title: Downtown Winters Reliability Upgrade

Requested amount: \$5M

With a high concentration of restaurants and food service employment, downtown Winters faced significant economic hardship during COVID. Overall, State analysis has shown that the principal impact to the California economy occurred to the leisure and hospitality services sector, including hotel/motel and restaurant workers. This impact in Winters was compounded by the LMU fires and repeated Public Safety Power Shutoffs (PSPS) made necessary by PG&E's lack of long-term investment in its powerline infrastructure system. VCE proposes to plan and implement a grid-innovation project that would allow critical facilities on the downtown Winters feeder electrical distribution line to continue basic operations even if the surrounding distribution system was non-operational (planned or unplanned). This reliability upgrade would cause installation of switching equipment in the west Winters sub-station to isolate the downtown Winters feeder line and link VCE's newly contracted Putah Creek 3 MW solar plus battery storage project to partially power that single feeder line. The demand of critical facilities and the production/storage capacity on the feeder line would need to be balanced to ensure reliability and safety. This grid-innovation plan would allow downtown Winters to continue basic functions and buffer future disruptions for the service oriented downtown district.

Key co-benefits of this ARP support request include the ability to incorporate energy resilience into local planning and optimizing the local distribution system and renewable energy production to directly address critical local needs.

Proposal 4

Title: Farm Irrigation Efficiency Program

Requested amount: \$7.5M

Agricultural production is a key industry in Yolo County, employing thousands of essential workers. Based on economic forecasting by the State, Central Valley farmers were substantially impacted by the COVID-19 shelter in place orders commencing in March of 2020, which significantly impacted essential workers in the agricultural sector – including in Yolo County. With the agricultural sector representing 15% of VCE's overall local electricity load, more efficient on-farm electricity use can help lower costs and support employment of essential workers.

The proposed irrigation efficiency program supports the objective of helping rebuild economic sectors impacted by the pandemic. A strong and thriving Yolo County agricultural sector serves to support the essential workers that are critical to its success. In addition, the proposed program contributes to overall electric system reliability and the County's decarbonization goals by reducing load at the right time of day. With the ratemaking authority afforded to it, VCE can identify and take advantage of latent

demand flexibility of the local irrigation load to advance these goals and meet the moment by reducing net peak demand going forward.

The requested ARP funding would allow VCE to implement an agricultural auto demand response program to be made available to VCE customers on irrigation pumping electricity rates. The program will include automation of these loads to receive demand response and price signals prompting a shift in demand to more favorable periods in the day. Customers who successfully respond to the price signals and shift load out of expensive hours—typically the late afternoon ramp hours as solar power production is declining—will enjoy bill savings while contributing to grid reliability when it is most needed. This will allow VCE to lower its overall peak loads in the summer, avoiding the need to purchase expensive market power (Resource Adequacy) in the peak season. This cost avoidance benefit accrues to the agricultural sector as well as the overall VCE customer base.

In addition, Sonoma Clean Power Authority (another Community Choice Aggregation Program), has expressed its support for VCE's proposal and has offered to partner to provide technical support to the design and optimization of the program using data and experience gained through their own auto demand response program. The support and collaboration offered by SCPA will serve to enhance the design and execution of the proposed program as well as catalyze its dissemination.

ARP funding for this agricultural auto demand response program will help support recovery by a key economic sector in Yolo County, its essential workforce, and demonstrate how a large-scale aggregated demand response program focused on the agricultural sector can help meet needed grid reliability during heat events and provide a roadmap for larger scale implementation in the following years.