Silicon Valley Power (SVP) EV Charging Technical Assistance Program:

Commercial Properties

Brought to you by SVP; Administered by CLEAResult
9/21/22

TODAY'S AGENDA

- Introductions & Program Overview
- EV Charging Overview
- Rebates
- Considerations Discussion
- Questions

INTRODUCTION

- SVP Personnel
  - Arielle Romero Cox – Program Manager
  - Scott Anderson – Principal Electrical Estimator
- CLEAResult Personnel
  - Jacob Abramson – Program Manager
  - Sam Mackintosh – Account Manager

SVP AND CLEARESULT

- Silicon Valley Power hired CLEAResult to implement their EV Charging Technical Assistance Program.
- Across **Santa Clara** and **San Mateo** Counties, CLEAResult has designed over **130 EV charging projects** over the past 2 years.
- CLEAResult is the largest provider of emission-reducing energy solutions across North America.

Technical Assistance Lead

CLEAResult®

800+ active programs
2,500+ current employees
30,000+ contractor partners
$681M saved by customers annually
$38M saved by LMI customers annually
5,200+ GWh saved annually
68M+ Therms saved annually

CALIFORNIA FOCUS

- Four offices
- 80+ local staff
- 20+ programs

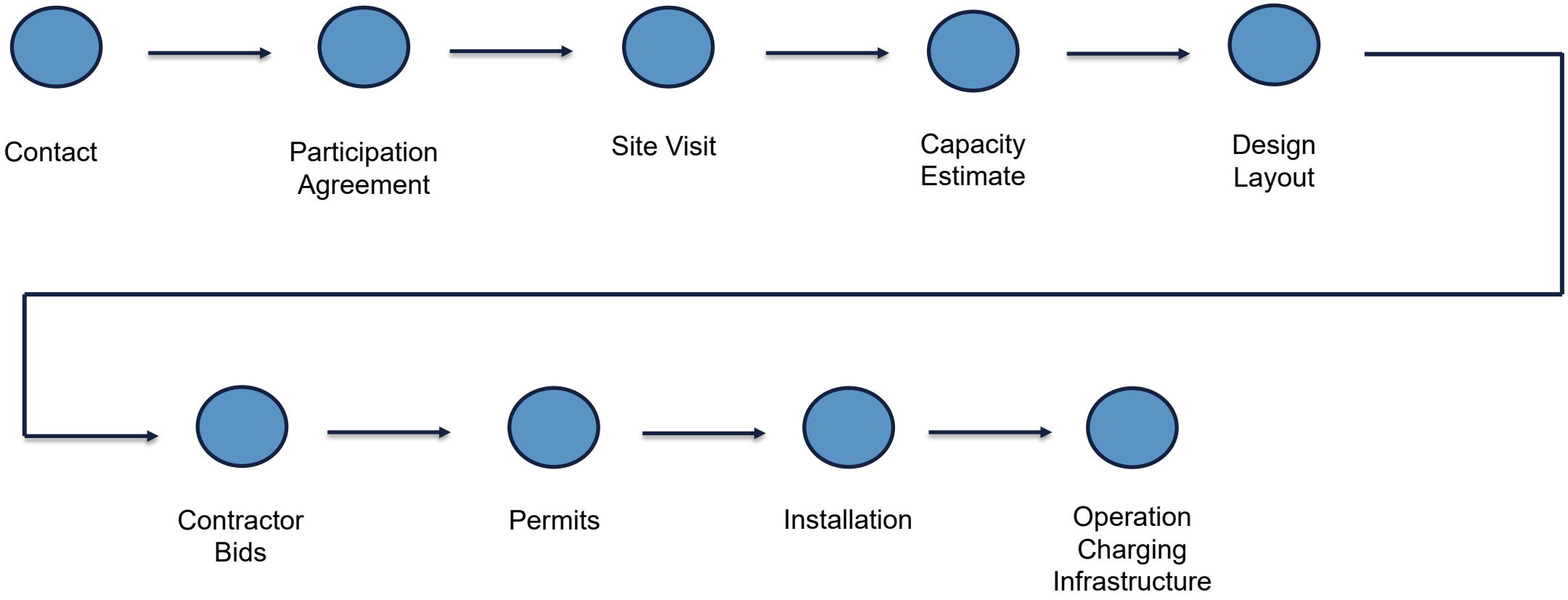
Sample Programs:
- PG&E EV Charge Network (subcontractor)
- CPAU EV Technical Assistance
- SVCE EV Technical Assistance
- Alameda Power Residential EV Charger

Participant Poll

PROGRAM OVERVIEW

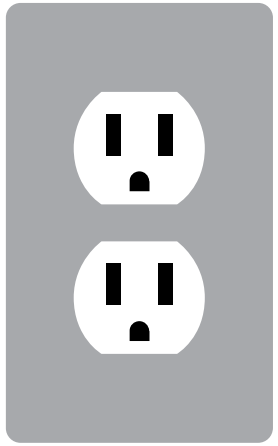
- The Program provides commercial properties with electric vehicle (EV) charging technical assistance from vendor-agnostic consultants.
- $250 copay for properties with peak electricity demand >200kW
- This includes:
  - Load Analysis
  - Site Visit
  - Installation
  - Charging Evaluation Report
  - Contractor Bid Support
  - Support

HOW EV TECHNICAL ASSISTANCE WORKS



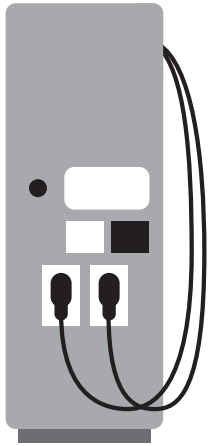
ELECTRIC VEHICLE CHARGING EQUIPMENT

An EV charging station or EV charging outlet safely charges the battery of an electric vehicle



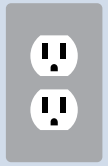
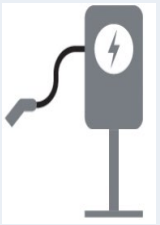
Level 1

Level 2



Level 3 (DC Fast Charger)

EV CHARGING LEVEL COMPARISON

Type of charger		Electric supply	Electrical Upgrades Needed?	Miles of Range per Hour	Use Case
	**Level 1 Outlet**	120-volt wall outlet	Less likely	2-5 miles	Overnight/All day Parking
	**Level 2 Charger**	208-240-volt circuit	More likely	20-30 miles	2+ Hours parking
	**DC Fast Charger**	480-volt	Probable	100-200 miles	Quick Charging <1 hour

PROPOSED REBATE OVERVIEW: NON-RESIDENTIAL

Workplace

	Port Type	Port Incentive	Incentive Cap
Workplace	Level 1 outlet	$2,000	None
Workplace	Level 2 connector	$4,000	Up to 75% of project cost, maximum $80,000 per property

Public Agency/Non-Profit

	Port Type	Port Incentive	Incentive Cap
Public Agency or Nonprofit	Level 1 outlet	$2,500	None
Public Agency or Nonprofit	Level 2 connector	$4,500	Up to 75% of project cost, maximum $90,000 per property

CALeVIP REBATE OVERVIEW: NON-RESIDENTIAL

For sites in Disadvantaged Communities (DAC):

Shared Level 2 EV Charger Rebate	Amount per Connector
Base Rebate	Up to $4,500, or 75% of project costs, whichever is less
Disadvantaged Community (DAC) Adder	Additional $500

CALeVIP.org/incentive-project/peninsula-silicon-valley

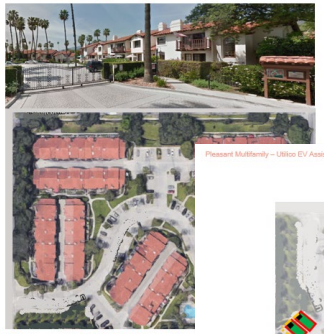
EV CHARGING EVALUATION REPORT

- Informs property owner of existing electrical capacity
- Assesses feasibility of desired chargers against existing capacity
- Identifies likely electrical upgrades
- Provides estimated project budget
- Can be used as basis for installer bids

	Solution 1		Solution 2		Solution 3	
	This is exactly what you asked for		This is the best deal, with optimal delivery for your existing capacity		This is the plan that will prepare you for the future	
Category	Quantity	Est. Cost	Quantity	Est. Cost	Quantity	Est. Cost
Level 1 Outlet	4	$ 2,500	6	$3,800	8	$5,000
Level 2 Charging Station	4	$ 12,300	16	$47,800	40	$153,200
Level 2 Make-Ready	0	-	8	-	12	-
Design and Infrastructure	1	$ 59,600	1	$114,200	1	$228,900
SVP/Building Division Costs	-	TBD	-	TBD	-	TBD
Project Cost	$107,800		$199,200		$420,500	
Incentive	$72,000		$146,000		$420,500	
Net Project Cost	$35,800		$53,200		$244,500	
Cost per Port	$3,978		$1,773		$4,075	

EV CHARGING EVALUATION REPORT

EV Charging Assessment Report



Pleasant Multifamily
20 Level 2 EV ports
Project #12345

January 1, 2020

PREPARED FOR Pleasant Multifamily Owner

PREPARED BY CLEAResult

WITH SUPPORT FROM Utilico

OPERATING MODEL

There are many ways an EVSE site host may structure access and fees to shape the operating cost for their site. Many site hosts choose to provide EVSE as a site amenity, charging little or nothing. Others set fees to break even or even produce net operating income from the chargers.

Based on information Pleasant Multifamily provided about the intended use of the chargers, the program staff has estimated likely annual usage and costs based on two projections. First, a current projection where Pleasant Multifamily serves 2 electric vehicles per day. Second, a projection for 2030 where Pleasant Multifamily serves 35 electric vehicles per day. The following tables present Pleasant Multifamily' estimated annual operating costs followed by a potential revenue break-even operating model for each projection.

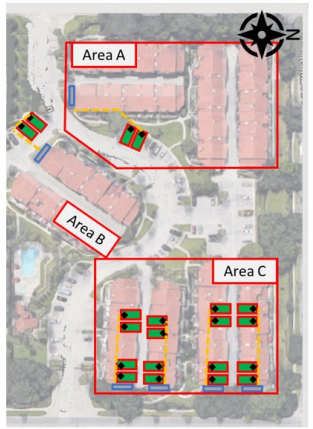
Forecast Operations: 2 vehicles per day				
	Off Peak	Partial Peak	Peak	Total
Period Definitions	9:30PM to 8:30AM (M-F) and all Weekend Hours	8:30AM to Noon and 6:00PM to 9:30PM (M-F)	Noon to 6:00PM (M-F) Summer Only	Total
Annual Charge Port Utilization (kWh)				
Level 2 EVSE	851	2,447	157	3,484
Annual Operating Costs				
				A-10-B-S
		$78	$257	
Charges				$2,372
rk Fees				$4,658
perating Cost				$7,391
Other Annual Costs				
enance Costs				$1,596
Potential Revenue Scenario				
Revenue Model				
	Average per kWh	$2.12		
evenues				
perating Revenue				

Forecast Operations: 35 vehicles per day			
	Off Peak	Partial Peak	Peak
	9:30PM to 8:30AM (M-F) and all Weekend Hours	8:30AM to Noon and 6:00PM to 9:30PM (M-F)	Noon to 6:00PM (M-F) Summer Only
Annual Charge Port Utilization (kWh)			
	15,415	42,820	
Annual Operating Costs			
			A-10-B-S
	$1,361	$4,499	
Charges			$2,403
rk Fees			$4,658
perating Cost			$13,382
Other Annual Costs			
enance Costs			$1,596
Potential Revenue Scenario			
Revenue Model			
	Average per kWh	$0.22	
evenues			
perating Revenue			

of Level 2 EVSE Network Fees are bundled into the project cost est
our annual operating costs until the 4th year of operation.

es reflects the hypothetical cost per kWh usage charge necessary to
hown in the table above. These price settings are configurable in the
tions governing EVSE pricing for public charging that must be follow
should you choose to use that capability.

Figure 3: Proposed EVSE Layout



3. BID REQUEST

INSTRUCTIONS TO CONTRACTOR

1. Carefully review the preferred solution description and Site Assessment above
2. Contact the Pleasant Multifamily and Program contacts identified above if additional information is needed
3. Complete the bid response template below
4. Submit your bid response by email to the Pleasant Multifamily and Program contacts **before 5pm on the 20th business day** after receipt of the bid request email
5. Please ensure the power management specification in the above Installation Requirements section is in your proposed scope

SCOPE

The scope of your response should encompass all items marked with an "Y" in the following table:

Include?	Scope Item
Y	Design and permitting including additional site visits
Y	All infrastructure and additional requirements
Y	If a new or upgraded utility service is required, contractor shall request and facilitate upgrades but will not be responsible for any utility fees
Y	Purchase, installation and commissioning of the EVSE*
N	Load study to specify additional project infrastructure support

**For avoidance of doubt, this does not include software licenses that may be required for ongoing EVSE operation*

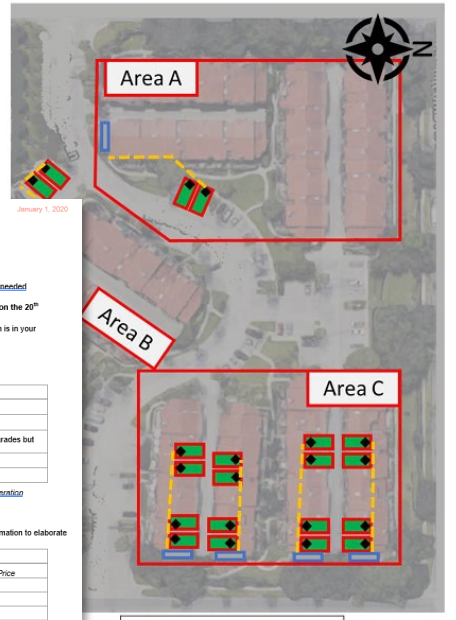
RESPONSE TEMPLATE

Please populate this exact template and include in your bid response. You may also include additional information to elaborate on your qualifications or proposed solution, but this chart is **REQUIRED** to be included.

Task	Materials			Labor		
	Units	*Unit Rate*	*Price*	*Hours*	*Hourly Rate*	*Price*
Level 1 Outlets						
Level 2 EVSE						
EVSE Circuits						
Subpanel						
Transformer						
Main Panel						
Design and Permitting						
Utility Service						
Additional Tasks*						
Subtotal						
Total Bid Price						
Please note any assumptions here that you feel are important:						

**Additional Tasks are proposed tasks that you deem as required for project success but are not found in the chart's standard task list above.*

Figure 3: Proposed EVSE Layout



PROPERTY CONSIDERATIONS

- Tenants' commuting habits
- Benefits of installing EV chargers
- Possible utility upgrades
- Cost calculations
- Building standards, green codes, and ADA requirements
- Planning or permitting timelines
- Assessments timelines
- Construction timelines
- Operating and managing the charging equipment

NEXT STEPS

- Enroll in Program
  https://siliconvalleypower.com/evexpert
- Submit Co-pay (if applicable)
- Pre-Evaluation Call
- Site Visit
- EV Charging Evaluation

Q&A | Participant Poll

THANK YOU!

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Web: SiliconValleyPower.com/EV

Brought to you by SVP; Administered by CLEAResult

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