Santa Rosa City Schools

District-Wide Solar PV Project

Informational Update

May 25, 2022

Agenda

- Background – Energy Initiatives
- Project Summary
- Project Benefits
- Site Specific Plans
- Next Steps

Background – Energy Initiatives

Date	Activity	District Cost	Approximate Annual Savings	Expected Multi -Year NET Savings
2017	District-Wide Energy Audit	**$0**	$0	Opportunities Identified for Energy Efficiency Improvements
2019-2021	District-Wide LED Lighting Upgrades + HVAC Improvements	**$0** (Funded via Prop 39 + PG&E OBF)	**$745,000 / year** (36% Utility Reduction)	**$18M (20 years)**
2020-2022	Develop Solar PV Project	**$0** (Funded via PPA)	**$150,000 - $320,000 / year**	**$35 – $40M**
Future TBD	Explore Future Energy Efficiency Opportunities	TBD	TBD	TBD
Future TBD	Explore Water Conservation Opportunities	TBD	TBD	TBD

Project Summary

Opportunity: Install Approximately 4.5MW of Solar Across (20) Schools

Scope of Work:
* All systems shall be “covered carport” structures + (1) Roofing System
  (intention is to preserve new bond-funded roofs)
* Includes ADA Compliance & New LED Lighting in Structures

Approach: Staff worked closely with site representatives to identify best possible locations at each school

Funding Source: Power Purchase Agreement (PPA 3rd party ownership)
= Zero Capital Required by District ; Immediate Savings
= Zero Operation & Maintenance (O&M) Costs by District

Partners: Board Approved hiring of Syserco ES to develop project
Sonoma Clean Power has provided a Preliminary Review

Savings: Approximate $150,000 - $320,000 in Year 1
Approximate System Lifetime NET Savings: $35 - $40M

Power Purchase Agreement

- A solar power purchase agreement (PPA) is a financial agreement where a developer arranges for the design, permitting, financing and installation of a solar energy system on a customer's property at little to no cost. The developer sells the power generated to the host customer at a fixed rate that is typically lower than the local utility's retail rate.
- The districts blended rate from PG&E = .3051 per KWH and the estimated PPA blended rate = .210 per KWH
- Advantages of a New PPA vs. The Old Agreement PPA at CCLA, Elsie, and Carrillo
  1)Old PPA included a annual escalator of 3.56% per year which has driven the cost above PG&E rates
  2)New PPA will bring the rates below PG&E rates and contain a lower escalator of between 0-2%

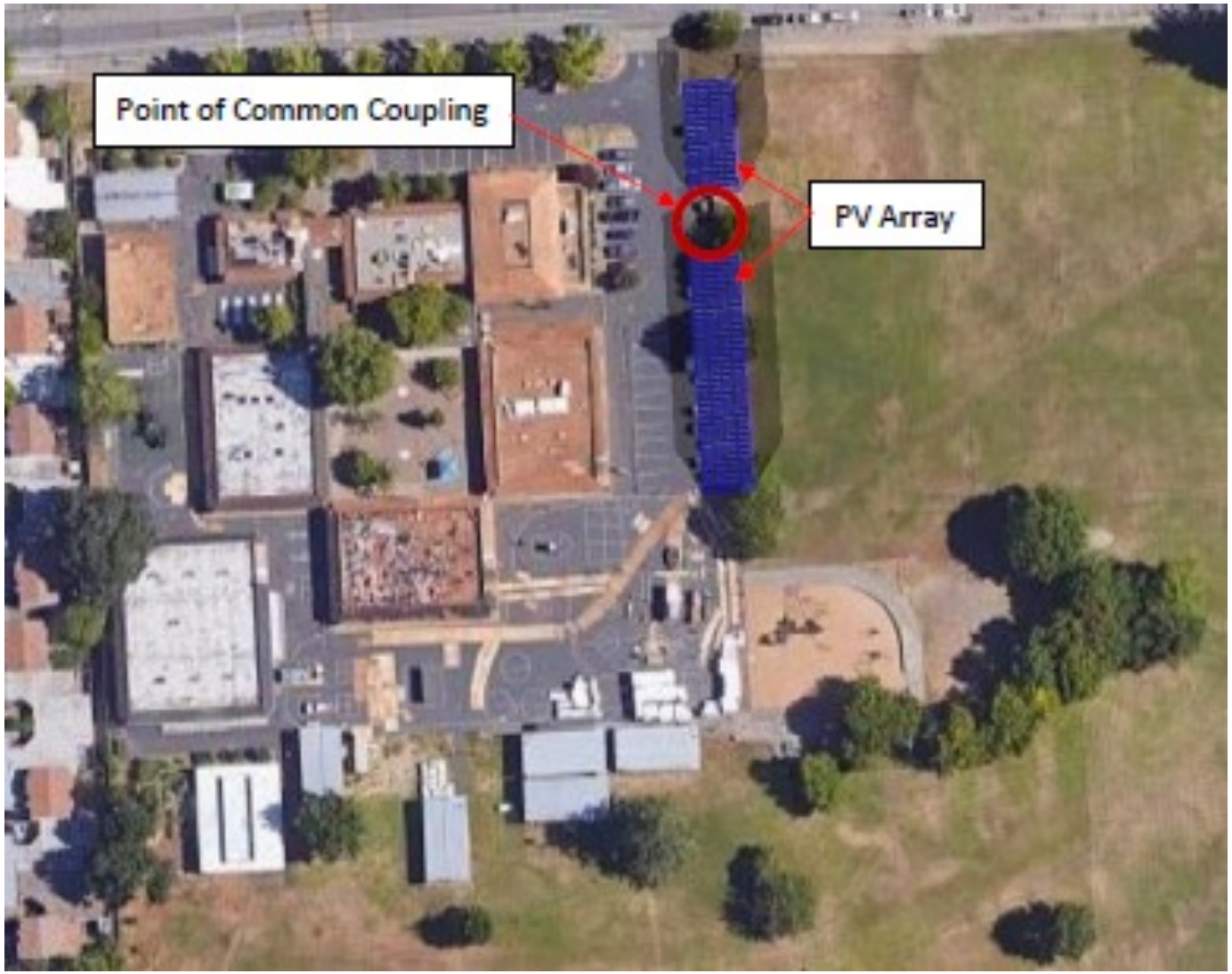
Project Benefits

- Environmental Stewardship & Leadership
- Shade Protection for Vehicles and Students/Staff
- No Capital Required
- Reduced Annual Electricity Bills
- Predictable/Fixed Electricity Bills for 25+ Years
- System Lifetime NET Savings Estimate: $35 - $40M
- No Maintenance or O&M Required by District Staff
- Local Power Generation

Abraham Lincoln ES

- System Size: 97.2 KW
- Covered Parking Spaces: 21
- *Electricity Offset: 76%

*Not sized at 100% to allow for future efficiency projects

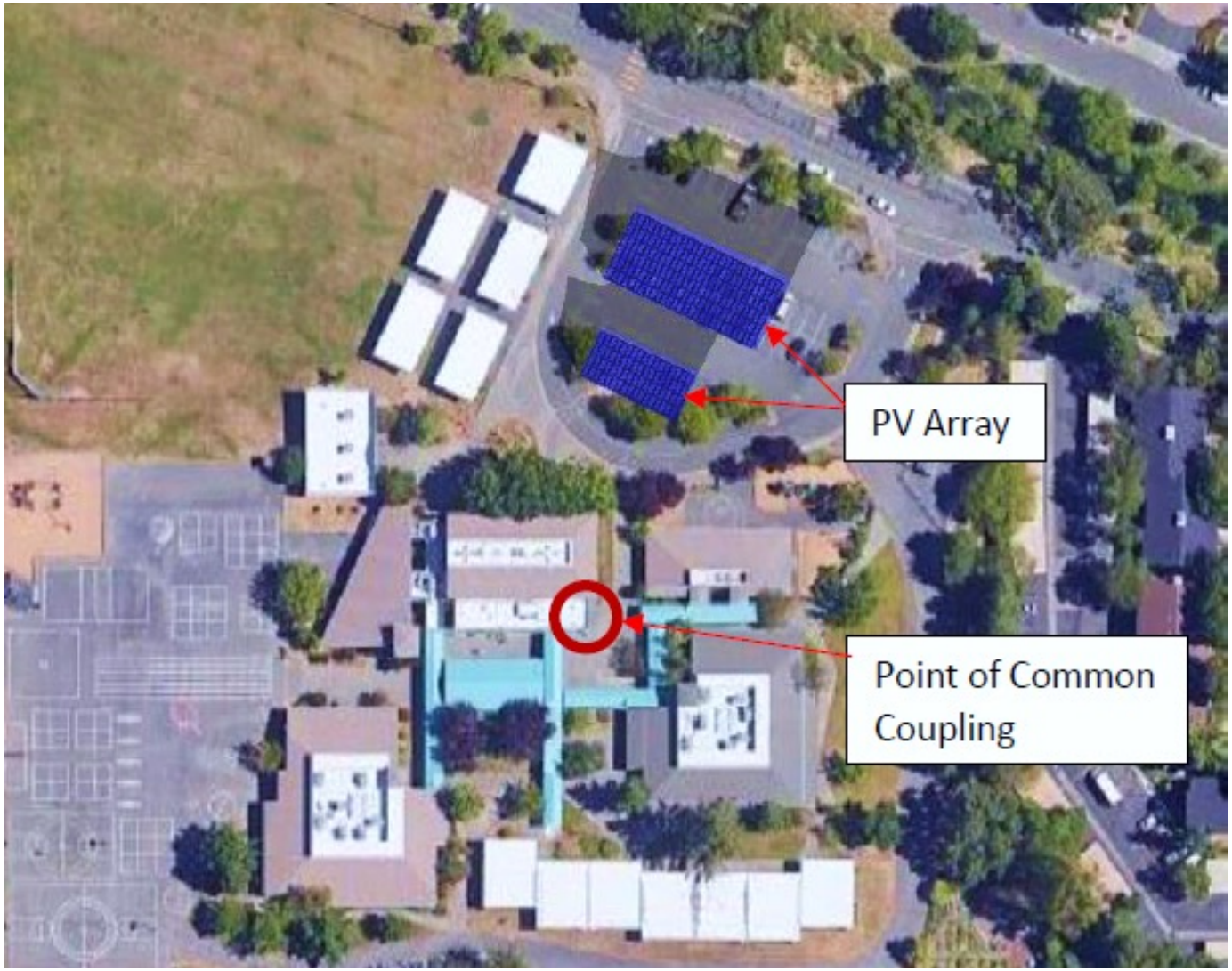


Albert Biella ES

- System Size: 103.5 KW
- Covered Parking Spaces: 26

*Electricity Offset:70%

*Not sized at 100% to allow for future efficiency projects



Brook Hill ES

- System Size: 72.9 KW
- Covered Parking Spaces: 0

*Electricity Offset: 59%

*Not sized at 100% to allow for future efficiency projects

Hilliard Comstock MS

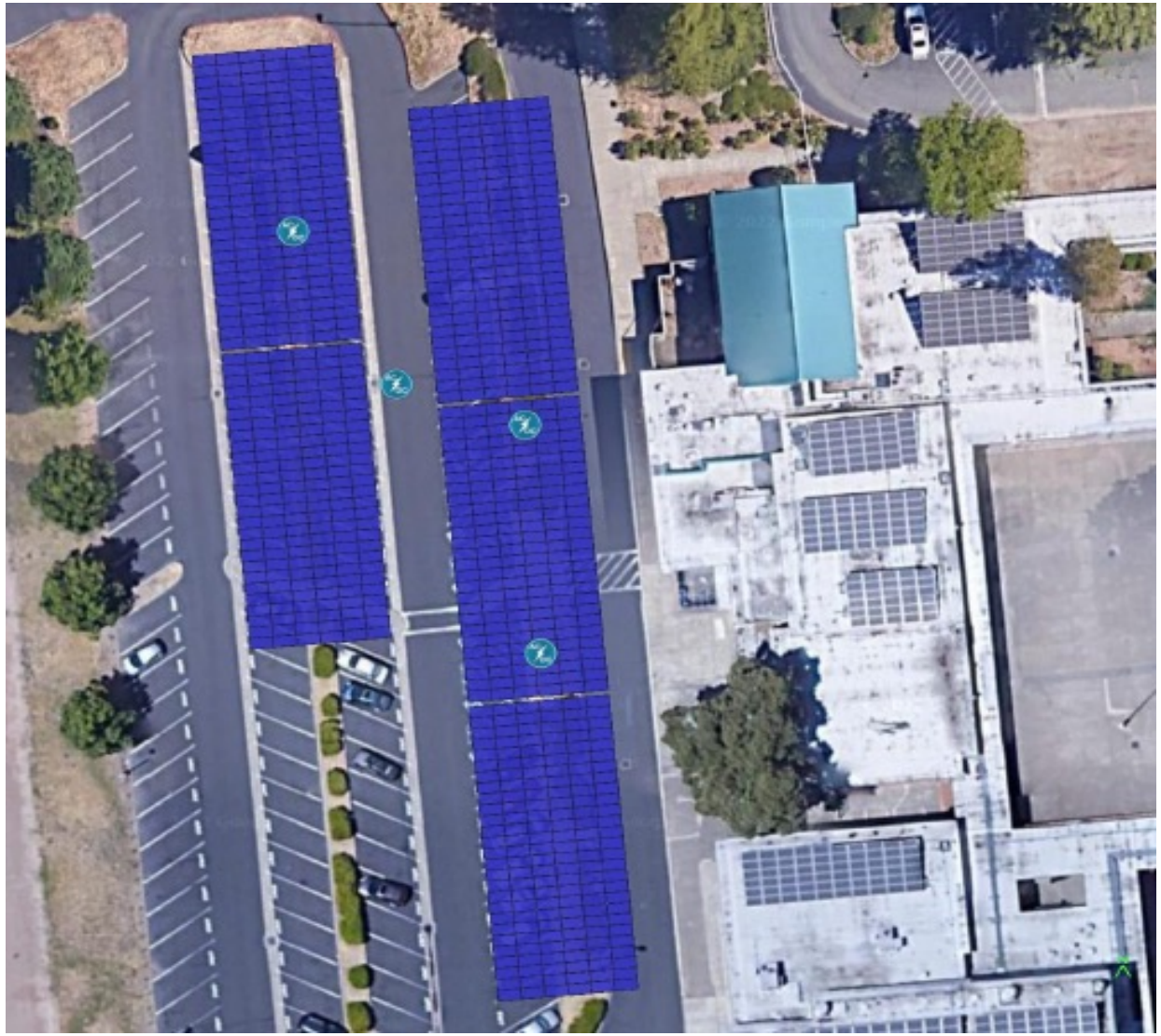
- System Size: 267.3 KW
- Covered Parking Spaces: 60

*Electricity Offset: 90%

*Not sized at 100% to allow for future efficiency projects

Cesar Chavez Learning Academy

- System Size: 364.5 KW
- Covered Parking Spaces: 106
- Electricity Offset: 87%



District Office / Ridgway

- System Size: 291.6 KW
- Covered Parking Spaces: 42

*Electricity Offset: 85%

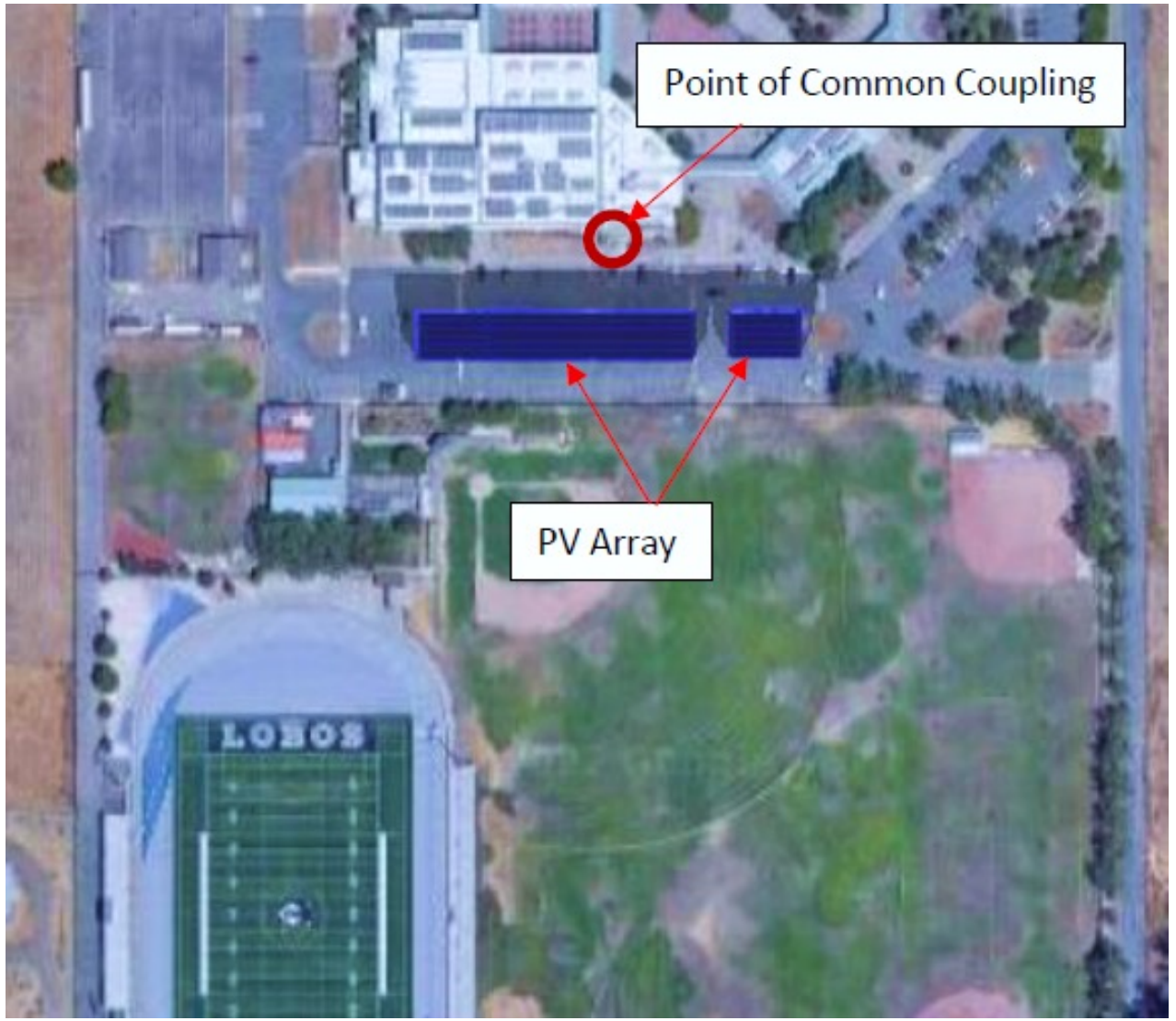
*Not sized at 100% to allow for future efficiency projects

Elsie Allen HS

- System Size: 243 KW
- Covered Parking Spaces: 84

*Electricity Offset: 96%

*Not sized at 100% to allow for future efficiency projects



Helen Lehman ES

- System Size: 72.9 KW
- Covered Parking Spaces: 0

*Electricity Offset: 58%

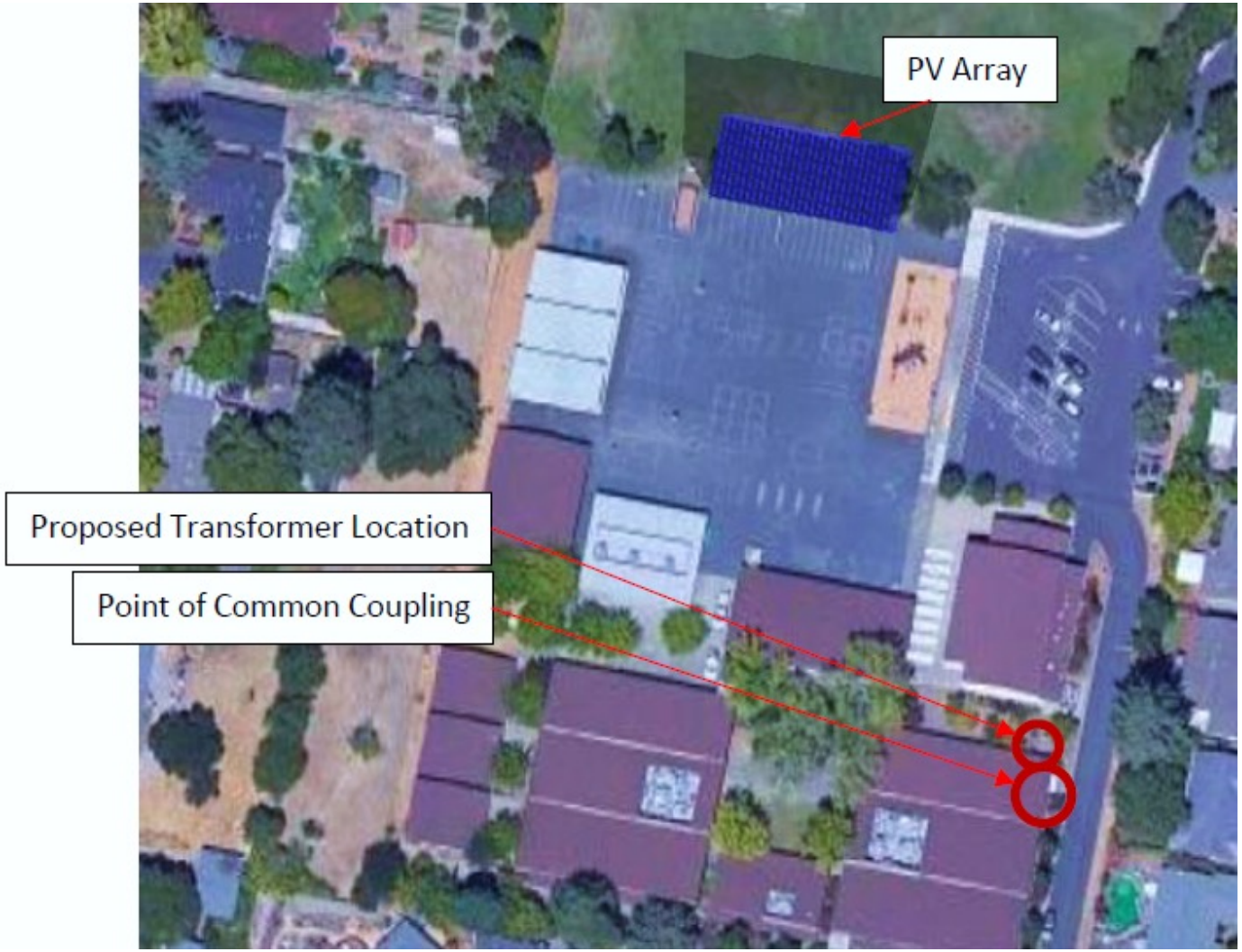
*Not sized at 100% to allow for future efficiency projects

Hidden Valley ES

- System Size: 72.9 KW
- Covered Parking Spaces: 0

*Electricity Offset: 45%

*Not sized at 100% to allow for future efficiency projects

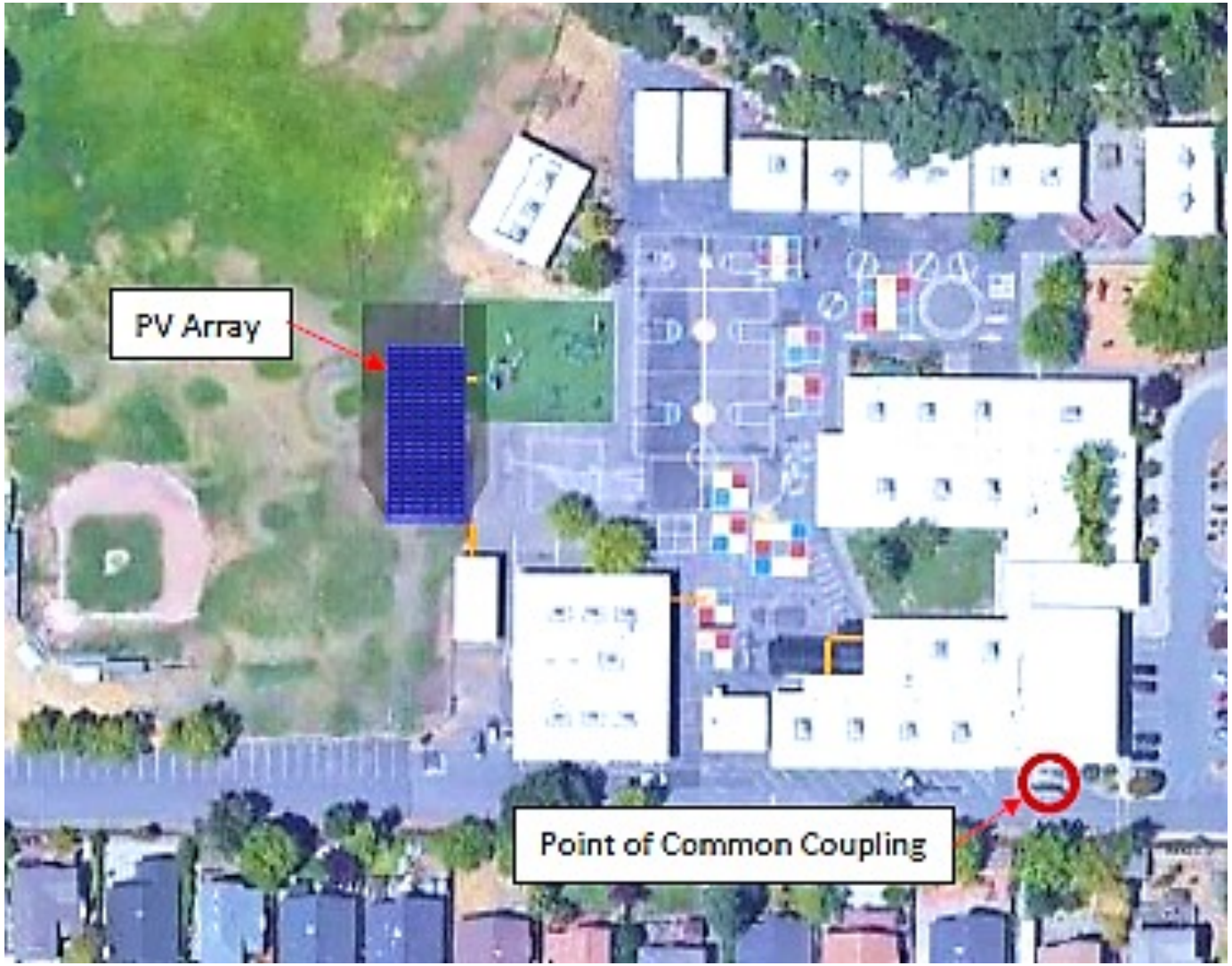


James Monroe ES

- System Size: 72.9 KW
- Covered Parking Spaces: 0

*Electricity Offset: 70%

*Not sized at 100% to allow for future efficiency projects

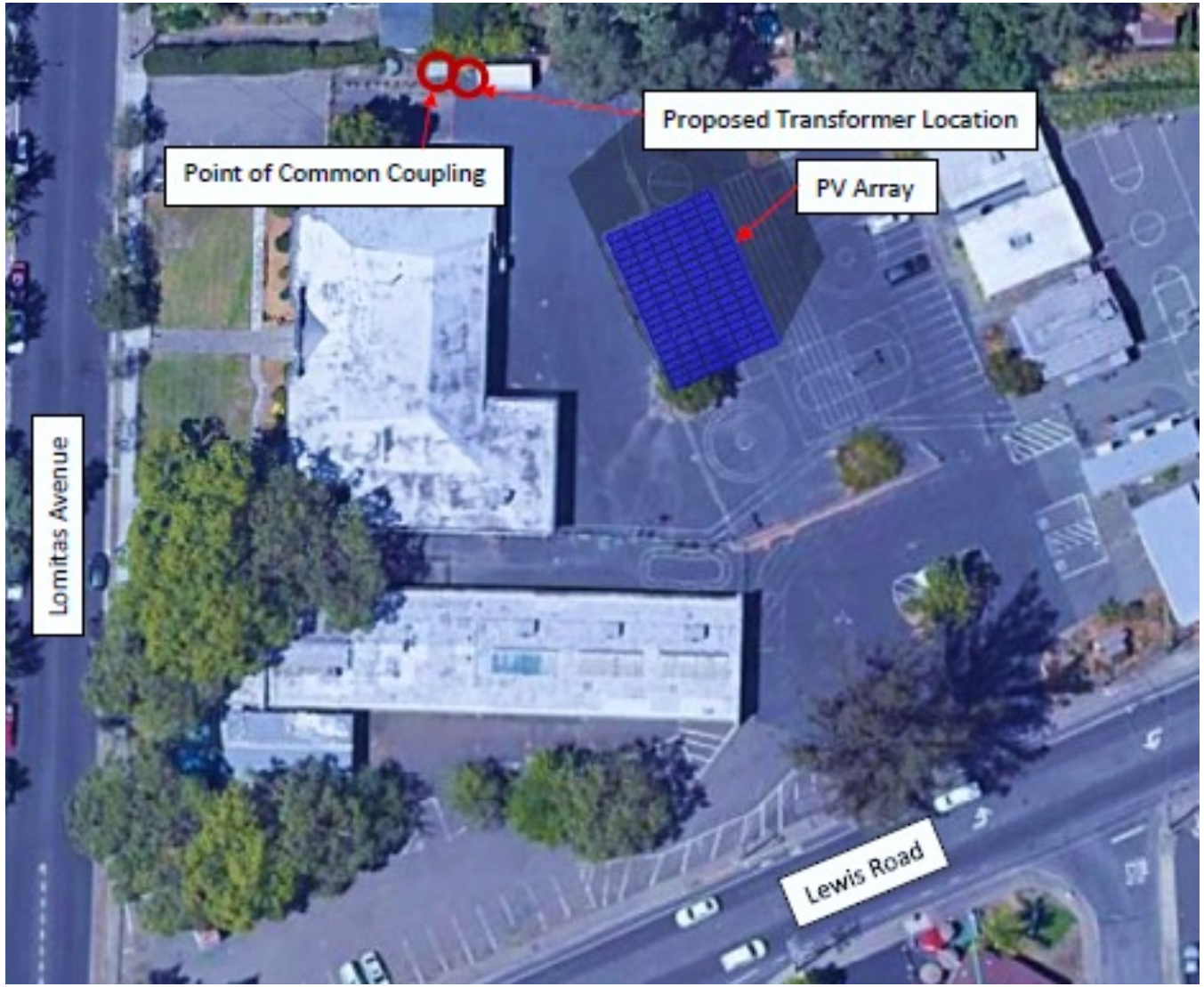


Lewis Opportunity School

- System Size: 48.6 KW
- Covered Parking Spaces: 0

*Electricity Offset: 76%

*Not sized at 100% to allow for future efficiency projects



Maria Carrillo HS

- System Size: 437.4 KW
- Covered Parking Spaces: 98

*Electricity Offset: 98%

*Not sized at 100% to allow for future efficiency projects

Montgomery HS

- System Size: 558.9 KW
- Covered Parking Spaces: 162

*Electricity Offset: 91%

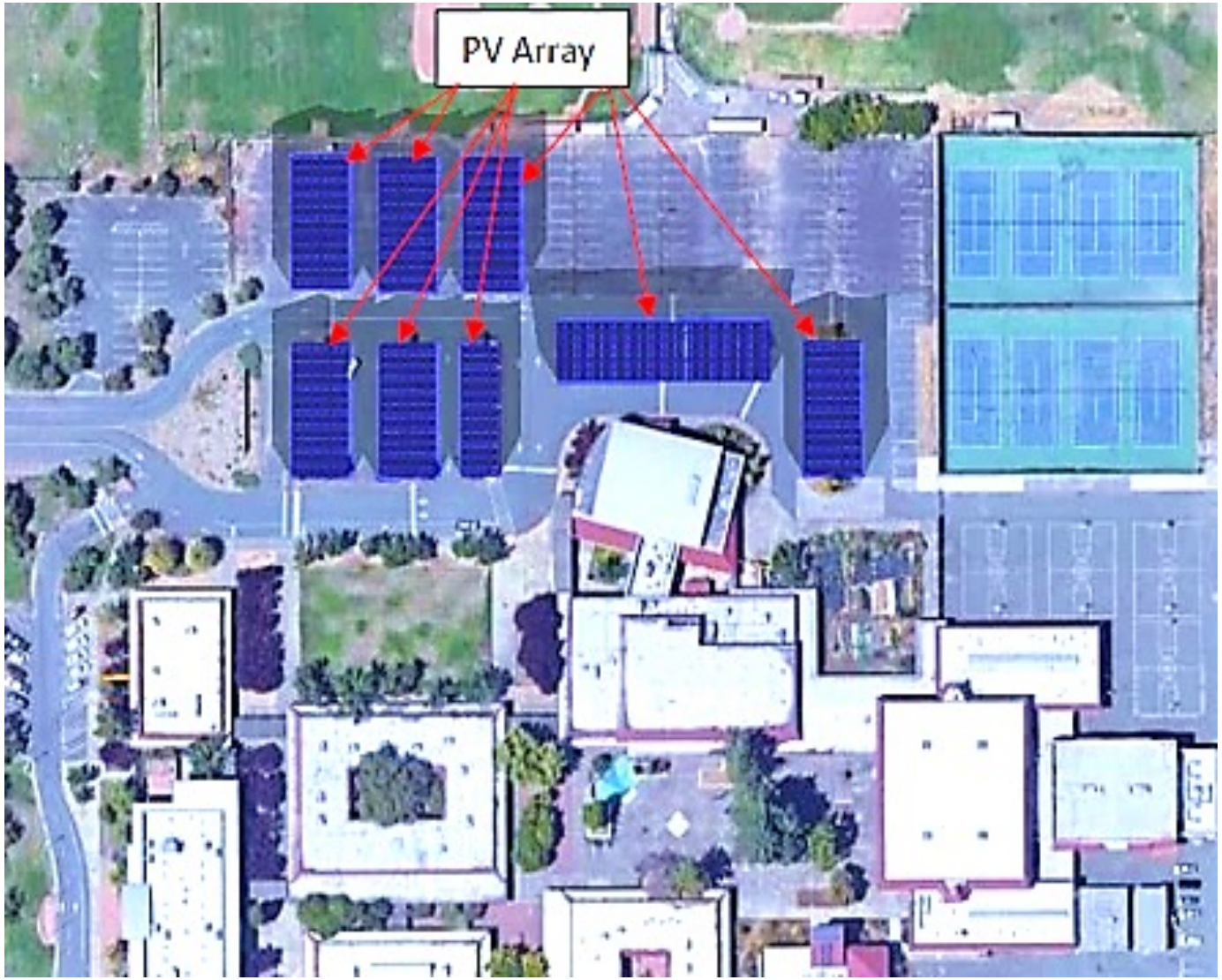
*Not sized at 100% to allow for future efficiency projects

Piner HS

- System Size: 607.5 KW
- Covered Parking Spaces: 169

*Electricity Offset: 94%

*Not sized at 100% to allow for future efficiency projects

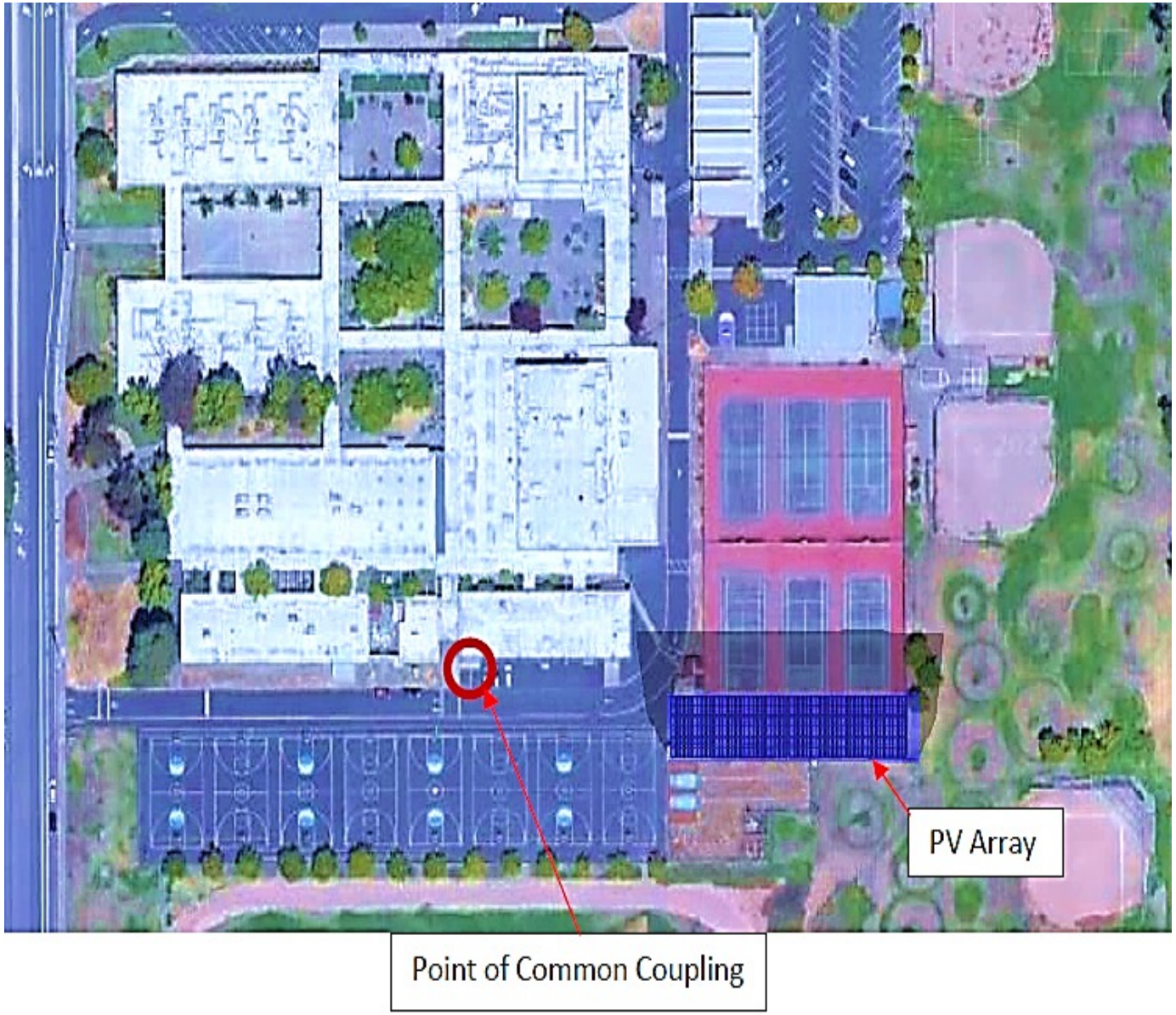


Rincon Valley MS

- System Size: 145.8 KW
- Covered Parking Spaces: 0

*Electricity Offset: 46%

*Not sized at 100% to allow for future efficiency projects



Santa Rosa Charter for the Arts

- System Size: 96.8 KW
- Covered Parking Spaces: 0

*Electricity Offset: 52%

*Not sized at 100% to allow for future efficiency projects

Santa Rosa HS

- System Size: 558.9 KW
- Covered Parking Spaces: 154

*Electricity Offset: 94%

*Not sized at 100% to allow for future efficiency projects

Santa Rosa MS

- System Size: 145.8 KW
- Covered Parking Spaces: 0

*Electricity Offset: 41%

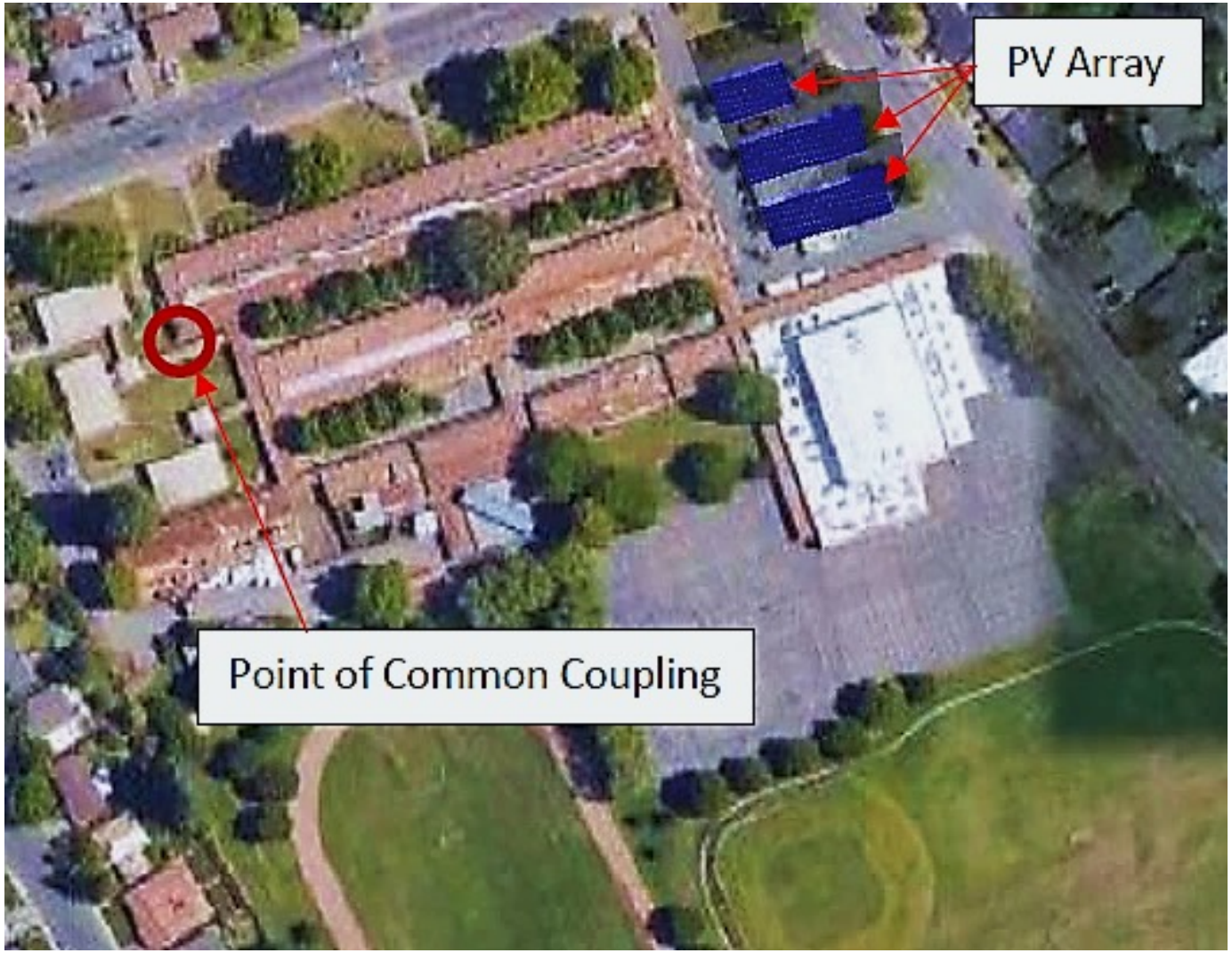
*Not sized at 100% to allow for future efficiency projects

Herbert Slater MS

- System Size: 168.8 KW
- Covered Parking Spaces: 58

*Electricity Offset: 67%

*Not sized at 100% to allow for future efficiency projects



Steele Lane ES

- System Size: 72.9 KW
- Covered Parking Spaces: 0

*Electricity Offset: 57%

*Not sized at 100% to allow for future efficiency projects

Benefit Summary

- Proposed Project is 4.5 Megawatts:

1. Is the equivalent of 133,093 tons of CO2 removed from the air
2. Is the equivalent of 1,996,448 tree seedlings grown for 10 years
3. Is the equivalent of 26,016 gasoline cars driven for 1 year removed from the road

   *(using the EPA's greenhouse gas equivalencies calculator)

- Sites not Included: Luther Burbank, French-American, and Proctor Terrace- Not any viable location for installation relative to the size of an array to point of interconnection

Next Steps

- Informational Presentation to Board of Directors — May 25
- Finish Competitive Solicitation for PPA Provider to Ensure Best Rate/Terms for District — May 27
- Finalize PPA Contract — June 3
- Board Authorization to Execute PPA Contract — June 8
- Begin Construction — July 1
- Estimated Last Site Completion Date — Fall 2023 — *(Prior to School Opening)*