Clean Power Alliance Power Ready Program

CPA CLEAN POWER ALLIANCE

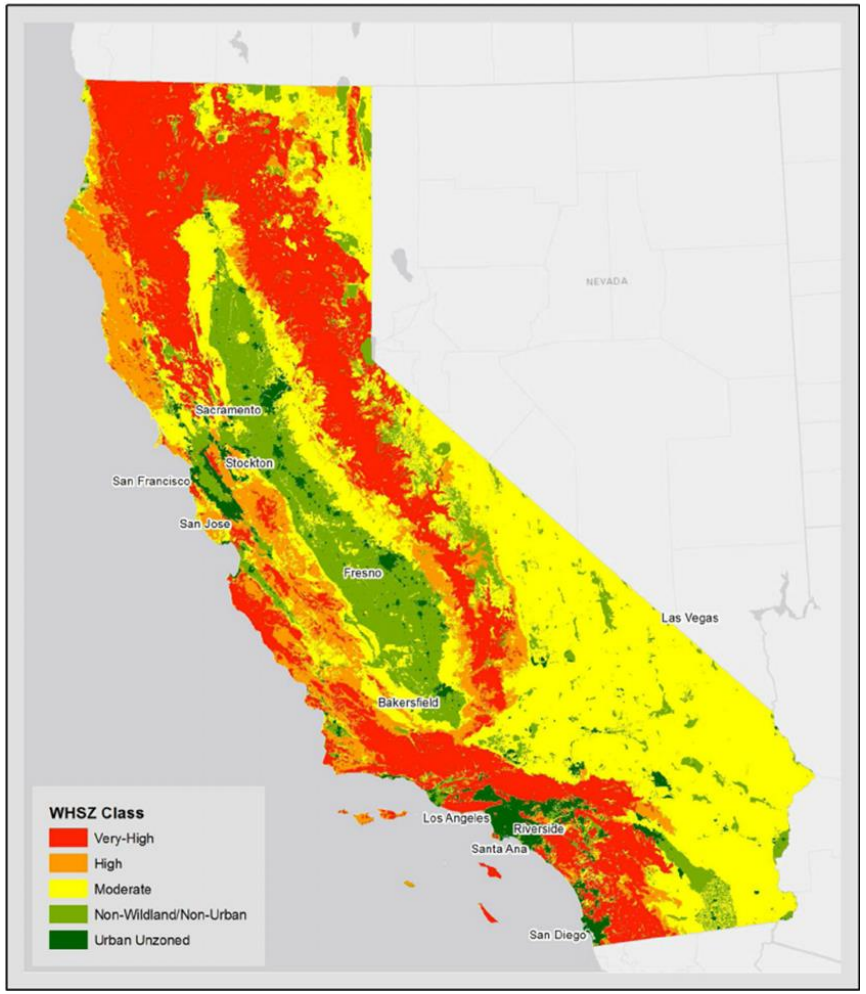
Who is Clean Power Alliance?

- Clean Power Alliance (CPA) is a public entity formed through a Joint Powers Authority (JPA)
- Partner with local leaders to help bring access to clean power to everyone in Southern California.
- 32 communities across Los Angeles and Ventura counties have opted for clean power through CPA.

Who does Clean Power Alliance serve?

- Comprised of 32 public agencies across Ventura and Los Angeles Counties, including the City of Calabasas.
- Approximately 1 million customer accounts (3 million residents and businesses)
- Largest CCA (Community Choice Aggregator) in California
- 5th largest electricity provider in California
- More customers receiving 100% renewable energy than any other utility in the nation

The Need for Resilience



Fire Hazard Severity Zones of California.

More frequent, unexpected power outages are occurring:

- Increased wildfire threat and severity
- Public Safety Power Shutoff (PSPS) events
- Rising temperatures and more extreme heat
- Increased summer grid stress due to high heat
- More extreme droughts

Backup power systems at critical facilities are often lacking and when present often rely on diesel generators that contribute to local GHG emissions and poor air quality.

Building Community Resilience

- CPA conducted a request for information (RFI) to local governments to learn about each agency's resilience goals
- Many showed interest in solar powered battery storage system at a facility that provides a critical community or municipal function in times of an outage
- CPA wanted to develop a program that served its member communities could help member agencies achieve a level of resilience for critical loads

Power Ready Overview

What is Power Ready?

- Power Ready is a resiliency program where CPA member agencies have the opportunity to host a solar powered battery storage system at a facility that provides a critical community or municipal function in times of an outage.

How Does it Work?

- Batteries can be discharged at peak times to provide more cost-effective electricity prices for our customers.
- During outages, the member agency will get the benefit of islanded backup power.

Types of Facilities:

- Community Centers/Parks
- City Halls/Civic Centers
- Police/Fire Stations
- Public Works
- Other

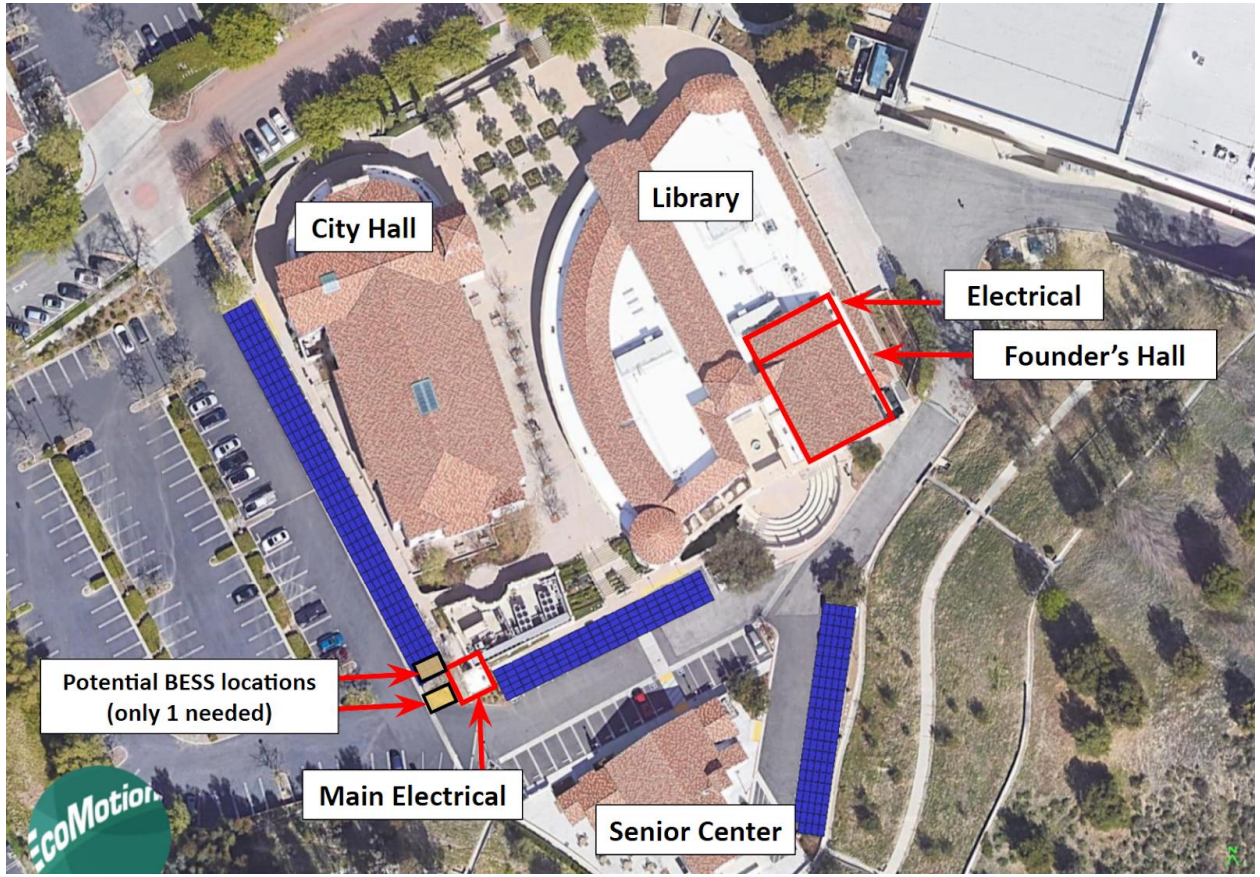
Program Benefits

City of Calabasas	CPA	Community
• Host a turnkey clean backup power system that provides islanded power during outage • No up-front cost and no monthly bill increase • Backup power to support critical loads in an outage • The developer handles all operations and maintenance • City staff learn about hosting battery storage	• Offers CPA opportunity for demand side management/demand response • Lowers procurement costs during most expensive hours • Delivering public goods programing	• Systems contribute to enhanced grid resilience • Community gets the benefits of a resilient critical facility during an outage • Reduced local emissions associated with diesel generators

How Does This Work?

- Local governments were asked to submit their top five candidate sites
- EcoMotion, CPA's engineering consultant, reviewed each site
- Optimal sites were selected for participating local governments
- Local governments execute a Memorandum of Understanding (MOU) to confirm participation in the program
- CPA to execute a solar Power Purchase Agreement (PPA) with developer to own, construct, operate, and maintain systems
- Systems will begin construction in 2023
- No cost will be passed to the local governments
- The City's electricity bill from CPA will be equal to or less than what they would have paid if they were not participating in the program

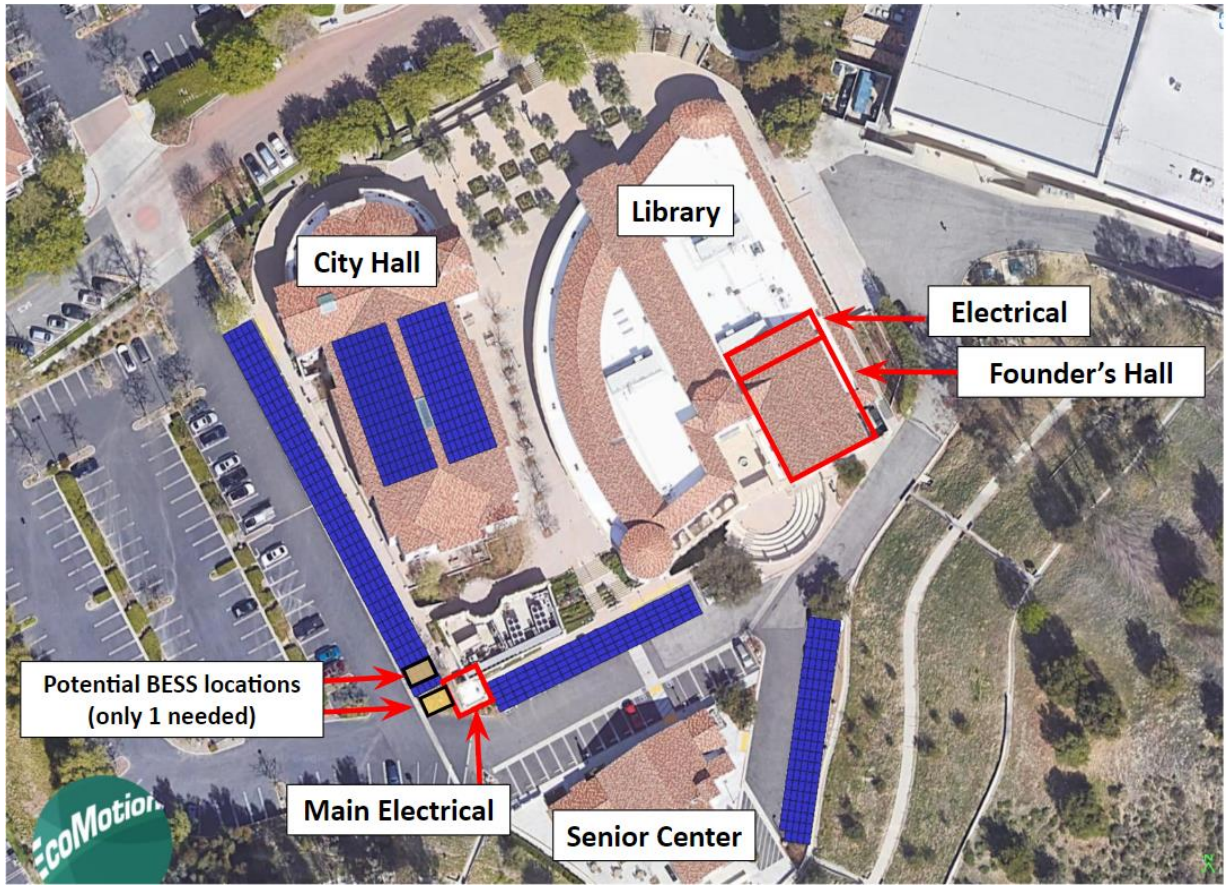
Site Configuration – Option 1



- **Site:** Calabasas City Hall + Founder's Hall
- **Critical Use Case:** Founders Hall to serve as a community resource center during an outage
- **Solar Potential:** 165 kW (30% of entire campus annual load)
- **Storage Potential:** 167 kW / 667 kWh
- **Priorities Supported:** Plug loads, lighting, all servers, internet equipment, and AV equipment

Working with City of Calabasas staff, CPA and EcoMotion identified Founder's Hall as Calabasas' priority site for Power Ready. The site has sufficient load to offset with solar and storage in order to create optimal value, and ample parking lot space to install the solar.

Site Configuration – Option 2



- **Site:** Calabasas City Hall + Founder's Hall
- **Critical Use Case:** Founders Hall to serve as a community resource center during an outage
- **Solar Potential:** 270 kW (48% of entire campus annual load)
- **Storage Potential:** 167 kW / 667 kWh
- **Priorities Supported:** Plug loads, lighting, all servers, internet equipment, and AV equipment

The addition of the 105 kW rooftop array yields an increased annual production of about 155,000 kWh, which represents over a 50% increase in annual energy production compared to the carports alone with no rooftop solar. This will provide more resiliency at the site, as there will be more energy available on average to recharge the battery during a grid outage, extending the duration of off-grid functionality for all loads connected to the solar and battery (i.e., the Founder's Hall loads).

What is a Solar Carport?

Examples of Rooftop Solar

Next Steps & Timeline

June 2022
- City Council MOU Presentation

August 2022
- CPA Opens Request for Offer (RFO)

October 2022
- RFO Evaluation and Selection

Q4 2022
- Agreement Negotiation

2023
- Break Ground

MOU Executed
Sierra Madre Ventura County Oak View/Ojai* Beverly Hills *(Ventura County Site)

Site Identified*	
Agoura Hills Calabasas Carson Claremont** LA County	Manhattan Beach Oxnard Paramount** South Pasadena West Hollywood Westlake Village
**(LA County Site)	

* Site selections are not final until an MOU is executed