

DATE:

CATEGORY: Public Hearing

COUNCIL REPORT

DEPT.: City Manager's Office,

Public Works

June 25, 2024

TITLE: Energy Services Contract for Solar Array

Systems at Senior Center, Mountain
View Sports Pavilion, and Whisman
Sports Center—Various Actions

RECOMMENDATION

Adopt a Resolution of the City Council of the City of Mountain View:

- 1. Approving a Midyear Capital Improvement Program Project: Solar Arrays at the Mountain View Senior Center, Mountain View Sports Pavilion, and Whisman Sports Center ("Project Sites");
- 2. Transferring and Appropriating \$750,000 to Fund the Project;
- 3. Awarding an Energy Services Contract to Syserco Energy Solutions, Inc., for the Design and Installation of Solar Arrays at the Project Sites for a Total Amount Not to Exceed \$5,944,803;
- 4. Finding that the Project Collectively and Each Project Site Individually, Meet the Requirements of California Government Code Section 4217.12; and
- 5. Finding that the Project is Categorically Exempt as Class 1, Existing Facilities Under the California Environmental Quality Act (CEQA) Guidelines Section 15301 and on a Separate and Independent Basis is Exempt as Class 3, Construction of Small Structures, Under CEQA Guidelines Section 15301,

To be read in title only, further reading waived (Attachment 1 to the Council report). (Five votes required)

BACKGROUND

In April 2023, the City applied for the Net Energy Metering (NEM) 2.0 program to reserve incentives to install photovoltaic or solar array systems at various public facilities, including the Mountain View Senior Center, Mountain View Sports Pavilion, and Whisman Sports Center. Use

of solar at these sites helps reduce greenhouse gas emissions and enables other benefits described in the analysis section below.

The NEM program is administered by the California Public Utilities Commission and provides credits to a building's utility bill for producing excess on-site clean energy over a 20-year period. The deadline to submit projects under NEM 2.0 was April 14, 2023, which the City accomplished. NEM 2.0 projects must be completed by April 2026 to receive the incentive. Otherwise, the NEM 3.0 program, that offers reduced incentives/savings, would need to be pursued.

The Senior Center is owned and operated by the City. The Mountain View Sports Pavilion and Whisman Sports Center (gymnasiums) are jointly owned by the City and the Mountain View Whisman School District (School District). The gymnasiums are maintained by the City under the following agreements:

- Whisman Sports Center at Crittenden Middle School: Agreement for the Mutual Construction, Ownership, Maintenance, and Operation of a Sports Center (1992) (referred to hereafter as the Sports Center Agreement)
- Mountain View Sports Pavilion at Graham Middle School: Joint Ownership and Use Agreement, Graham School Gymnasium (1984) and Maintenance Agreement Between the City of Mountain View and the Mountain View Whisman School District (Graham Middle School), County of Santa Clara, State of California, for Joint Use of Graham Middle School for Park and Recreation Purposes and Maintenance of the Mountain View Sports Pavilion (2003) (referred to hereafter as the Sports Pavilion Agreements)

The above agreements require joint decisions on enhancements and upgrades, such as installing solar arrays. City staff coordinated with School District staff to bring an item to the School District's Board of Directors on April 18, 2024. At this meeting, the School Board directed their staff to work with City staff to install the solar array projects at the gymnasiums.

On March 26, 2024, the City Council approved applying for a \$15 million Climate Pollution Reduction Grant from the Environmental Protection Agency (EPA) that could fund the installation of heat pumps, battery storage, and solar arrays at the gymnasiums. (The Senior Center was not included in this grant proposal as it was the subject of an earlier grant application that ultimately was not funded.) Notification of award is expected to be received by October 2024.

ANALYSIS

The Solar Array at Senior Center, Mountain View Sports Pavilion, and Whisman Sports Center Project (Project) aligns with the City and School District's clean energy goals and would result in utility cost savings of \$9.87 million over a 20-year period. The Project is the first step in

supporting resiliency with future building electrification projects, such as battery storage and replacement of gas-fired fossil fuel heating equipment with clean-electricity heat pumps. If pursued, these future projects would enable these facilities to have electricity during Pacific Gas and Electric (PG&E) Public Safety Power Shutoff events and other power outages.

Project Scope

School District and City staff discussed various solar array locations at both gymnasiums that would limit impacts on existing operations and maximize cost savings. Syserco, a qualified energy contractor, provided initial options on solar array locations and project costs. City and School District staff determined the following locations for the solar arrays. The solar array for the Whisman Sports Center will be located on the roof (Figure 1). The solar array location for the Mountain View Sports Pavilion (MVSP) includes rooftop and a solar carport (Figure 2). The carport location at the MVSP would require the removal of five non-Heritage trees. The City will work with the School District for on-site tree mitigation at a 1:1 replacement ratio with 24" box native-species trees. If on-site locations are not feasible, nearby off-site locations will be identified. Installing the solar carport would require parking lot upgrades to maintain compliance with Americans with Disabilities Act (ADA) requirements. This would remove one parking space to provide the required ADA parking stall.



Figure 1: Whisman Sports Center Proposed Roof Solar Array Location



Figure 2: Mountain View Sports Pavilion
Proposed Roof and Carport Solar Array Locations

The Senior Center would include solar arrays on the rooftop and using carports (Figure 3). The locations are preliminary and have yet to be finalized. One to three parking spaces may need to be removed to provide additional space for ADA parking spaces under the solar array carports. In addition, up to seven non-Heritage trees may need to be removed to install the carports. Staff is exploring other potential areas to install solar arrays that would reduce removal of trees, such

as nearby rooftops. If tree removal is required, tree mitigation will be at a 1:1 tree replacement ratio with 24" box native species trees, either on- or off-site.



Figure 3: Senior Center Proposed Roof and Carport Solar Array

Project Costs and Savings Analysis

Table 1 provides a breakdown of project costs, incentives, and savings. The pay-back period in NEM 2.0 utility savings (last column) for the projects ranges from eight to 12 years. In addition to payback from the utility savings, the Federal Investment Tax Credit program (known as Direct Pay) under the Inflation Reduction Act can cover \$1,527,418 of the project costs after completion. Additional incentives will be explored for feasibility, such as Renewable Energy Credits, but have not been included in this analysis. In addition, a portion of the EPA Climate Pollution Reduction Grant, if the City is successful in its application, could be used toward the costs of the solar arrays for the gymnasiums.

Table 1: Project Costs and Savings Analysis

Facility	Total Project Cost with 15% Contingency	Total Project Cost After Receiving Direct Pay Incentive	City Cost	School District Cost	Utility Savings Over 20 Years
Senior Center	\$3,206,013	\$2,369,662	\$2,369,662	-0-	\$5,957,062
Whisman Sports Center	695,373	513,971	256,985	256,985	1,363,830
Mountain View Sports Pavilion	2,043,417	1,533,752	1,533,752	-0-	2,545,147
TOTAL	\$5,944,803	\$4,417,385	\$4,160,399	\$256,985	\$9,866,039

Note: Totals may not add due to rounding

Under the Sports Center Agreement, the School District and the City split operations and maintenance costs 50/50 for the Whisman Sports Center. Initial cost share estimates provided to the School District in March were lower (\$163,000). The City will request the School District to fund its share of the cost, which is currently estimated at \$256,985 after the Direct Pay incentive is received upon project completion. Refined cost estimates will be provided to the School District once the project design phase is completed.

For the Mountain View Sports Pavilion, as the City is responsible for all the utility costs under the Sports Pavilion Agreement, no cost share is being requested from the School District, and the City would receive the full utility savings from the solar array project at this site.

Energy Conservation Contracting Process

School facilities require additional review through the Division of the State Architect, which can take up to 12 months. Due to the NEM 2.0 deadline to complete projects by April 2026, a traditional design-bid-build method of public works contracting is not possible to complete the solar array projects on time. For this reason, staff recommends using the Energy Conservation Contracting process for all three projects, as authorized in California Government Code Sections 4217.10 through 4217.18. This streamlined process allows public agencies to select a qualified energy services contractor for both design and construction, allowing for a design-build contract. This contracting process was created by the state to encourage energy efficiency within existing public facilities by allowing public agencies to use the ensuing energy savings as an alternative funding source to finance infrastructure upgrades that were deemed a net benefit and cost-effective.

Syserco is a qualified energy services contractor. Section 4217 allows a public agency to select a qualified energy services contractor to design and deliver energy efficiency projects so long as the City makes the following findings at a public hearing:

- 1. The energy services contract with Syserco is in the best interests of the City; and
- 2. The anticipated cost to the City for the electrical energy provided by the solar array systems under the contract will be less than the anticipated marginal cost to the City of thermal, electrical, or other energy that would have been consumed by the City in the absence of the solar array systems.

The City is able to make these findings for the solar array project. A sole-source, design-build contract with Syserco will ensure the project can be delivered within the timeline needed to qualify under NEM 2.0. This satisfies the first finding.

After applying the Direct Pay Incentive and School District's proportional share to the project, the total estimated initial cost of the improvements to the City is \$4,160,399. The solar array system is expected to have a life of at least 20 years. The net-present value of the cumulative energy and related facilities maintenance savings after 20 years of continuous operation is estimated at approximately \$9,866,039, exceeding the City's estimated cost of \$4,160,399. With the value of the anticipated lifetime project energy cost savings exceeding the net cost of the improvements to the City, the recommended contract satisfies the second finding listed above.

These findings are made in the resolution (Attachment 1).

The contract with Syserco will be design-build for the solar arrays at the gymnasiums and Senior Center. Syserco has agreed that, after the contract is executed, they will receive a Notice to Proceed for the design phase only. The design phase will require an approximate one-year review time for the gymnasiums by the Division of State Architect. Funding for the construction phase will be requested in 2025 once design review is nearing completion, at which time a Notice to Proceed for construction will be issued.

Operation and Maintenance

Once the solar arrays are installed, the terms of the Sports Center and Sports Pavilion Agreements would guide the roles and responsibilities for operating and maintaining the solar arrays at the gymnasiums. The City would be responsible for the operation and maintenance costs of the solar arrays at the Mountain View Sports Pavilion and Senior Center. For the Whisman Sports Center, operation and maintenance costs would be split between the School District and the City.

Environmental Clearance

In accordance with the requirements of the California Environmental Quality Act (CEQA), the project has been determined to be categorically exempt as Class 1, Minor Alteration of Existing Structures, pursuant to Article 19, Section 15301(a), and as Class 3, Construction of Small Structures, pursuant to Article 19, Section 15303(e), as it consists of minor alternations to existing buildings and construction of small structures in the form of solar carports. Staff recommends Council make findings that the project is categorically exempt from CEQA.

Project Schedule

If approved by Council, staff will return to Council and the School District in 2025 for budget appropriations to fund the construction phase of the project. Construction is anticipated to begin in fall 2025 and be completed in early 2026.

FISCAL IMPACT

The design and construction cost to install solar arrays on the Senior Center and gymnasiums is estimated to be \$5,944,803 without incentives. A total of \$1,527,418 from the Federal Direct Pay program would be reimbursed to the City after project completion. The School District would provide approximately \$256,985 as the proportional share for the Whisman Sports Center location once the project is completed. Thus, the total cost to the City is estimated at \$4,160,399. The cost may decrease if the City's proposal for the EPA Climate Pollution Reduction Grant is successful.

Upon contract execution, Syserco will be given a Notice to Proceed for the design phase only. Thus, budget appropriations and transfers requested at this time are for the design phase. Staff will return to the City Council and the School District to appropriate funds for construction in 2025. The estimated design phase costs are shown in Table 2.

Table 2: Total Design Phase Costs

Design (including contingency)	\$616,843
City Project Management	<u>87,157</u>
Subtotal	\$704,000
City Administration	46,000
TOTAL ESTIMATED DESIGN COST	\$750,000

An appropriation of \$750,000 is requested to fund the design phase. Staff recommends transferring and appropriating \$500,000 from the Construction/Conveyance Tax Fund and \$250,000 in General Non-Operating funds from Sustainability Projects, Project 20-99. There are sufficient funds in the Construction/Conveyance Tax Fund and Sustainability Projects, Project 20-99, for the recommended actions. If the EPA Climate Pollution Reduction Grant is received, the grant funds can be used in place of the funds from the Construction/Conveyance Tax Fund and Project 20-99, which can be returned to each proportionately.

The NEM 2.0 incentive and utility bill savings resulting from the solar arrays is estimated to be \$9,866,039 over 20 years.

CONCLUSION

The Solar Array Project aligns with the City and School District's clean-energy goals and would result in utility cost savings of \$9.87 million over a 20-year period under NEM 2.0. After applying the Direct Pay Incentive and School District's proportional share to the project, the total initial estimated cost of the improvements to the City is \$4,160,399 and meets California Government Code Section 4217 energy conservation contract requirements for a sole-source design-build contract.

ALTERNATIVES

- 1. Do not adopt the resolution and defer the project, forgoing the use of NEM 2.0.
- 2. Do not adopt the resolution, forgo the use of NEM 2.0 and the Energy Conservation Contracting process, and direct staff to follow the standard Public Works project delivery process of design-bid-build, beginning with issuing a Request for Proposals for design services
- 3. Provide other direction.

PUBLIC NOTICING

In addition to the agenda posting, a public notice was published in the *Palo Alto Daily Post* on June 10, 2024 as required by Section 4217.

Prepared by: Approved by:

Rebecca Lucky Dawn S. Cameron
Sustainability Manager Public Works Director

David O. Printy

Principal Project Manager

Kimbra McCarthy

City Manager

Reviewed by:

Danielle Lee Chief Sustainability and Resiliency Officer

Edward Arango Assistant Public Works Director/ City Engineer

RL-DOP/6/CAM 628-06-25-24CR 204212

Attachment: 1. Resolution