

Solar Photovoltaic Installations at Walker Elementary and Wangenheim Middle School

Initial Study/Mitigated Negative Declaration



Prepared for:
San Diego Unified School District
4860 Ruffner Street, Annex Room 5
San Diego, CA 92111



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SDU-02.34

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1.0 INTRODUCTION

1.1 OVERVIEW

The San Diego Unified School District (SDUSD or District), as the lead agency under the California Environmental Quality Act (CEQA), has prepared this Initial Study/Mitigated Negative Declaration (IS/MND) to evaluate the potential environmental consequences associated with solar photovoltaic (PV) canopy installations (proposed project) at two District sites, including Walker Elementary School (ES) and Wangenheim Middle School (MS). Specifically, the proposed project involves the installation of solar PV canopy systems at both of the school sites. Implementation of the proposed project would require approval by the SDUSD Board of Education. As part of the District's discretionary review process, the proposed project is required to undergo an environmental review in accordance with CEQA.

1.2 CEQA REQUIREMENTS

In accordance with CEQA, the proposed project has undergone an initial environmental review and it has been determined that the project is subject to the requirements of CEQA (Public Resources Code, Division 13, Sections 21000–21177) and the State CEQA Guidelines (California Code of Regulations [CCR], Title 14, Sections 15000–15387). Initial studies, such as this document, are typically used as a basis for deciding whether to prepare an environmental impact report (EIR), a mitigated negative declaration (MND), or a negative declaration (ND) for a project pursuant to CEQA. Per CEQA (14 CCR 15070), an MND may be prepared for a project subject to CEQA when an IS has identified potentially significant impacts on the environment, but when mitigation measures are included so that no significant impacts on the environment would result from project implementation. Based on the findings of the IS, the District has determined that preparation of an IS/MND is the appropriate method to present environmental review of the proposed project in compliance with CEQA. Chapter 3 of this IS/MND contains the Environmental Initial Study Checklist.

1.3 INITIAL STUDY ORGANIZATION

The content and format of this report are designed to meet the requirements of CEQA. This IS/MND identifies the potential environmental impacts of the project to support the decision to prepare an EIR, MND, ND, or Notice of Exemption. This IS/MND contains the following chapters:

- Chapter 1, Introduction, identifies the purpose and scope of the IS/MND and the terminology used in the report.
- Chapter 2, Project Description, identifies the location, background, and planning objectives of the project and describes the proposed project in detail. The proposed improvements at both of the sites are described separately.
- Chapter 3, Environmental Initial Study Checklist, presents the CEQA checklist responses for each resource topic. This section includes a brief setting section for each resource topic and identifies the potential impacts of implementing the proposed project. A discussion of the approach to the analysis for each resource is also included prior to the analysis. The analyses may be combined for both sites and/or separated for a specific site, depending on the resource.
- Chapter 4, References, identifies printed references cited in this IS/MND.

- Chapter 5, List of Preparers, identifies the individuals who prepared this report and their areas of technical specialty.

1.4 ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED

The following checklist is used to evaluate the potential for significant environmental impacts resulting from construction and operation of the proposed project. Responses consider the project in its entirety and any actions involved, including on- and off-site impacts, project-level and cumulative impacts, direct and indirect impacts, and construction and operational impacts. As the overall project involves the implementation of solar PV canopy system improvements at two adjacent District properties, the analysis for each resource topic is combined.

This checklist is adapted from the form provided in Appendix G of the 2019 State CEQA Guidelines. The checklist is modified as appropriate for this project. There are 21 CEQA subject categories to be considered, with this checklist organized as such. Each subject discussion includes an evaluation matrix, followed by a brief discussion explaining the evaluation rationale. As appropriate, each subject discussion may address more than one specific issue if there is a salient interrelation.

The 21 CEQA subject categories – or environmental factors – that must be considered are presented below. Each category is scored according to the potential level of impact significance the proposed project may have on the environment. The levels of significance are indicated and described below:

3 = Potentially Significant. There is evidence that an effect could be significant.

2 = Less than Significant with Mitigation. Applies in situations where a “potentially significant” impact can be reduced to a “less than significant” level with the incorporation of adequate and feasible mitigation measure(s).

1 = Less than Significant. This is an effect that is discernible but would not cause a significant impact.

0 = No Impact. This is an adequate determination if the referenced information sources show that the impact simply does not apply to projects like the one involved.

1	Aesthetics	0	Agriculture and Forestry Resources	1	Air Quality
0	Biological Resources	1	Cultural Resources	0	Energy
1	Geology/Soils	0	Greenhouse Gas Emissions	2	Hazards and Hazardous Materials
1	Hydrology/Water Quality	0	Land Use/Planning	1	Mineral Resources
2	Noise	0	Population/Housing	0	Public Services
0	Recreation	1	Transportation	1	Tribal Cultural Resources
0	Utilities and Service Systems	1	Wildfire	0	Mandatory Findings of Significance

1.5 DETERMINATION

On the basis of this initial evaluation:

<input type="checkbox"/>	I find that the proposed project COULD NOT have a significant effect on the environment, and an EXEMPTION will be prepared.
<input type="checkbox"/>	I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.
<input checked="" type="checkbox"/>	I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project proponent. A MITIGATED NEGATIVE DECLARATION will be prepared.
<input type="checkbox"/>	I find that the proposed project MAY have a significant effect on the environment, and an environmental impact report is required.
<input type="checkbox"/>	I find that the proposed project MAY have a “potential impact” or “potentially significant unless mitigated” impact on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.
<input type="checkbox"/>	I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier EIR pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR, including revisions or mitigation measures that are imposed upon the proposed project, nothing further is required.

Signature

Date

Printed Name:

For:

2.0 PROJECT DESCRIPTION

2.1 PROJECT OVERVIEW

The proposed project involves solar PV canopy installations with the potential for battery storage at two District schools. The solar PV canopy installations are proposed within existing paved areas or disturbed areas within Walker ES and Wangenheim MS.

2.2 PROJECT LOCATION AND ENVIRONMENTAL SETTING

The proposed project would occur at two District sites within the City of San Diego, California (City). The sites are adjacent to each other and their individual locations are depicted on Figure 1, *Aerial Vicinity*, and Figure 2, *Aerial Photograph*. The project would occur within the existing boundaries of the school sites. The following includes a separate description for the existing environmental setting at each site.

I. Walker Elementary School

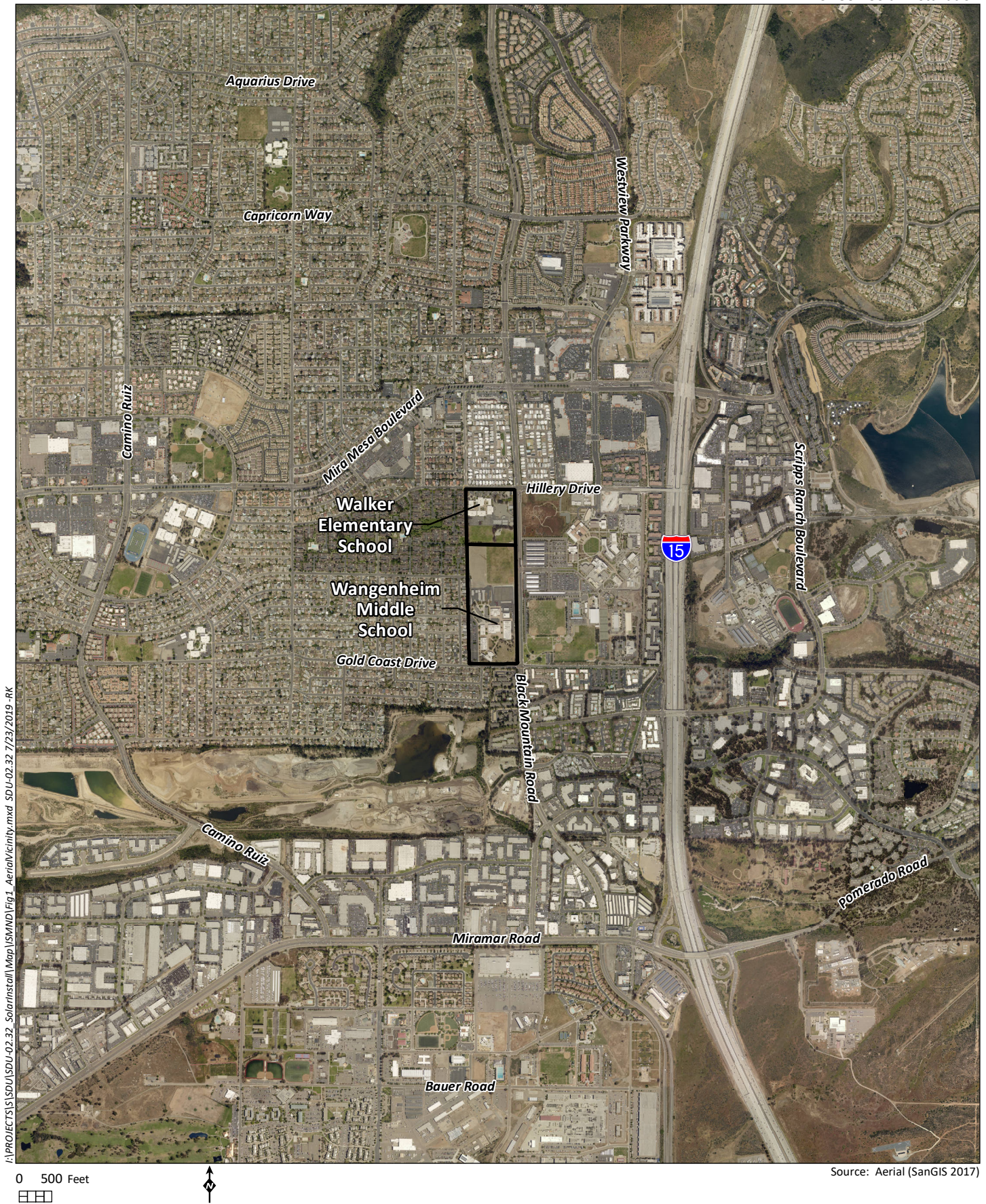
Walker ES was constructed in 1972 in the Mira Mesa neighborhood of the City and serves kindergarten through fifth grade (K-5). The school is located near Black Mountain Road on Hillery Drive, and access to the I-15, approximately 0.5-mile east of Walker ES, is provided via Mira Mesa Boulevard or Miramar Road. The school site is surrounded by a mobile home park to the north, a joint-use park between the District and the City (Walker-Wangenheim Neighborhood Park) and Wangenheim MS to the south, a single-family residential neighborhood to the west, and San Diego Miramar College to the east, across Black Mountain Road. The school site consists of classrooms in the western portion of the site and administrative and athletic facilities in the southern portion of the site. The northern portion of the site is currently a paved parking area along Hillery Drive.

II. Wangenheim Middle School

Wangenheim MS was built in 1977 in the Mira Mesa neighborhood of the City and serves grades 6-8. The school is located near Black Mountain Road on Gold Coast Drive. The I-15 is located approximately 0.5 mile east of the site, which can be accessed via Mira Mesa Boulevard or Miramar Road. Walker ES and the Walker-Wangenheim Neighborhood Park immediately border the site to the north and San Diego Miramar College is located across Black Mountain Road to the east. Single-family residences surround the school to the south and west (see Figures 1 and 2). Wangenheim MS is developed with classroom and administrative buildings in the central and southern portions of the site. The western portion of the site consists of a paved parking area.

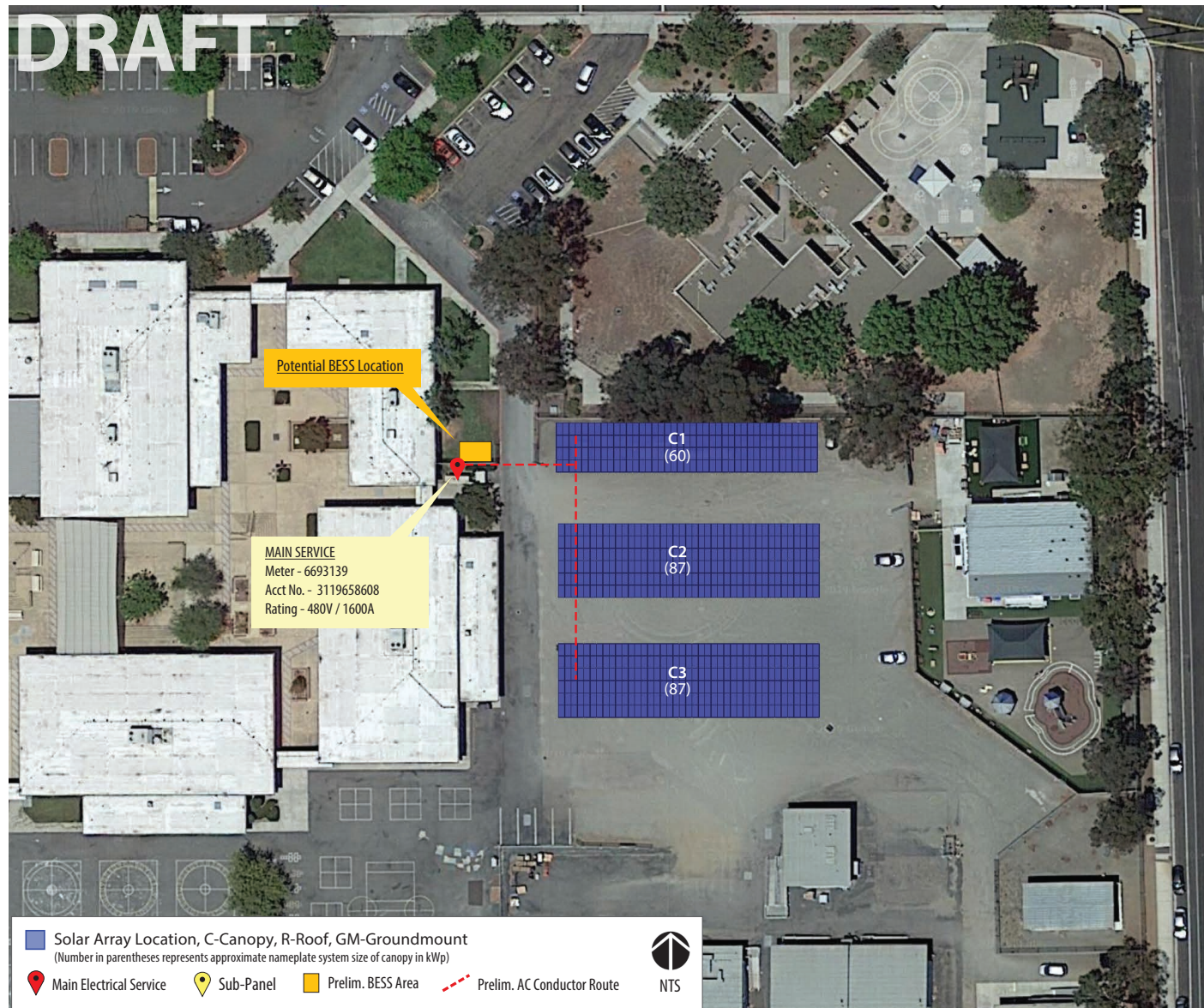
2.3 PROPOSED PROJECT

The proposed project involves the installation of solar PV canopy systems along with some trenching to connect to the grid at existing electric main service connections at each of the campuses. Potential battery storage locations are also identified near the main electrical service points at each campus. The individual project components are described further below and are depicted on Figure 3, *Walker Elementary School Solar Site Plan*, and Figure 4, *Wangenheim Middle School Solar Site Plan*, which include site plans for each campus and depict the locations of the proposed solar PV canopies and preliminary conductor routes to main electrical service connection points. The proposed project would





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Preliminary PV Target

Nameplate (kWp)	Production (kWh)	Array Area (SF)
230	393,500	13,500

Notes

- Multiple additional meters/services on site. 1) service for portables, 2) CDC facility. Target above reflects offset of main service and one other service via NEMA. Consumption on Main (391 MWh), NEMA (46 MWh).
- C1-C3 in area used for parent pickup. Current arrangement anticipates future parking in this area with 24-ft drive aisles.
- Wangenheim site adjacent to the south.
- Rock present at this site, assume open trench.
- Pad mounted equipment not anticipated at canopies. If required, could locate along fenceline north of C1.
- CDC meter cabinet room locked during site visit 5/13/19, could not confirm meter number.

Source: Sage Renewables 2019

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Preliminary PV Target

Nameplate (kWp)	Production (kWh)	Array Area (SF)
460	760,500	26,500

Notes

1. Sub-panel tie-in assumed adjacent to parking area. Tie-in at 480V is preferred.
2. Alternative ground-mount area to south of main service. Eliminated to preserve space for potential future structure, more economic build if future footprint is not needed.
3. Walker site adjacent to the north. Adequate room to build additional system at Wangenheim for NEMA arrangement with Walker. Less financial benefit for Walker, however more efficient build.
4. Rock present at this site, assume open trench.
5. Pad mounted gear may be required at canopies. Potential location in median south of C1.

Source: Sage Renewables 2019

include the installation of an elevated solar PV canopy system within existing paved parking areas or disturbed areas at both school campuses.

The individual solar PV panels would be constructed of dark-colored (usually blue or black) materials and covered with anti-reflective coatings. Modern solar PV panels reflect as little two percent of incoming sunlight, which is about the same as water, and less than soil or wood shingles (Meister Consultants Group 2014). The proposed project would be designed to comply with Americans with Disabilities Act accessible paths of travel.

Typically, electricity produced by the solar panels would be converted from direct current to alternating current with inverters. The inverters would be mounted near the top of the canopy structure columns, under the panel canopies. Wiring from the inverters would be routed underground from the solar PV canopies to a combiner panel, then to the main electrical service panel at each site. The combiner panel may require a small concrete pad near the solar PV canopy. Electrical transmission lines would be installed in an underground conduit. The electrical transmission lines would extend from the combiner to the main electrical service in one of the existing school buildings. All affected hardscape and/or landscape areas would be restored to pre-project conditions once construction is complete.

The inverters would have integrated disconnects. Additional disconnects would be located near the service panels at the point of interconnection to the main service and the distribution grid. Some small monitoring equipment would be mounted on the solar PV canopy and/or near the main service panel. Additional freestanding equipment would not be required. Due to the limited footprint of the PV canopy in the parking lots, there would be no loss of parking. Post construction, parking areas would be repaved and striped so that the post project parking would be equal to pre-project conditions.

During project operation, the solar PV canopy systems would operate during daylight hours 7 days a week, 365 days a year throughout the 25-year design life of the project. In accordance with Occupational Safety and Health Administration safety regulations, at least two qualified personnel would be present during all energized electrical maintenance activities at the facility. Operations and maintenance would entail washing of the solar PV canopies approximately one time per year, or as needed to clean the active surface of the panels to optimize energy production. Washing would be undertaken using a light utility vehicle with an extendable boom for personnel to reach the height of the canopies. Water usage would vary depending on the operations and maintenance provider to be selected. Some providers utilize no water, while others may use pressure washers or water combined with brushes. Wash water is typically minimized to prevent overland flow. Chemical cleaners are not typically used for washing of the solar PV canopies or associated equipment. Operation and maintenance of the proposed project would not require the use of hazardous materials or generate hazardous waste. The solar PV canopies and inverters would not produce waste during project operation.

The solar operations and maintenance operator would be located off site and would be on-call to respond to alerts generated by the monitoring equipment at both project sites. The solar operations and maintenance operator would also analyze collected data on an ongoing basis to schedule maintenance. The solar contractor's support personnel would be deployed to the project sites, as needed, and there would be no permanent on-site personnel. Annual visual inspections and preventive maintenance would be performed as needed by solar contractor personnel visiting the site. This would include inspection and cleaning of major electrical equipment and inspection of steel structures, modules, and monitoring equipment.

The electricity generated by the proposed project would either be consumed on site or exported to the utility grid. At their peak, the proposed solar power generation systems are expected to reduce the demand for electricity from the grid by up to 1.154 million kilowatt-hours (kWh) annually. The District would participate in a Net Energy Metering program with the local utility company. When electricity produced by the solar power generation system exceeds on-site consumption of electricity, the excess electricity would flow back into the electrical grid. When on-site consumption exceeds solar production, electricity would be drawn from the grid. The flow of energy to and from the grid is recorded by the utility meter and an annual accounting is done to determine net usage. An overview of the improvements at each school is provided in the following sections.

I. Walker Elementary School

Solar improvements at the Walker ES campus would consist of elevated solar PV canopies near the center of the school campus within paved areas (see Figure 3). Some trenching would be required to connect the solar PV canopies to the grid at the existing campus electric main. A total of 13,500 square feet (sf) of solar panels would be installed within three separate canopies to produce 393,500 kWh of electricity per year.

II. Wangenheim Middle School

Solar improvements at the Wangenheim MS campus would consist of elevated solar PV canopies within the existing paved parking area along the campus' eastern boundary (see Figure 4). Trenching would be required to connect the solar PV canopies to the grid at the existing campus sub panel. The campus' electric main is located closer to Black Mountain Road and there is the potential to locate a battery storage area near the electric main. The project would include approximately 26,500 sf of solar panels within three separate canopies, which would produce 760,500 kWh of electricity per year.

III. Construction

Construction at the Walker ES and Wangenheim MS is anticipated to begin in summer of 2020 and is expected to last approximately two months at each site. Development would occur sequentially at each site and would not overlap. All construction areas and staging areas would be fenced off and isolated from the schools.

Construction may take place during the school year. Construction on non-school days would be limited to the hours of 7 a.m. to 7 p.m. to comply with the City's noise ordinance. If construction must occur when school is in session, the hours for construction activities may be limited to between 2 p.m. and 7 p.m. to avoid disruptions to students and faculty or require the installation of 1/2-inch plywood sound barriers to reduce noise impacts to students and staff. Installation of plywood noise barriers would also occur for construction activities occurring within 50 feet of a residence.

During construction, the District would implement several standard operating procedures or contractor specifications to ensure compliance with federal and state environmental regulations, including but not limited to the Migratory Bird Treaty Act and California Fish and Game Code Sections 3503 and 3503.5. The school sites would also be noticed during construction activities to inform staff and students of construction timing and protocols to leave windows and doors shut, as feasible, during noisy construction events.

Migratory Bird Treaty Act and Fish and Game Code Section 3503 and 3503.5

To comply with the federal Migratory Bird Treaty Act (MBTA) and California Fish and Game Code Sections 3503 and 3503.5, the District would retain a qualified biologist to conduct a pre-construction survey if removal of vegetation must occur at either of the project sites during the breeding season. The purpose of the pre-construction surveys would be to determine the presence or absence of nesting birds in the proposed areas of disturbance. A pre-construction survey must be conducted within seven calendar days prior to the start of construction activities (including removal of vegetation). If nesting birds are detected, to ensure that disturbance of breeding activities is avoided, the qualified biologist would set up appropriate avoidance construction buffers from the nest and visit the site weekly until it is determined that the fledglings are no longer dependent on the nest. Construction may be delayed until the end of the breeding season or until the fledglings are no longer dependent on the nest.

IV. Discretionary Approvals Required

SDUSD is the lead agency under CEQA and is responsible for the approval and implementation of the project. There are no responsible or trustee agencies. The Division of the State Architect is a reviewing agency that reviews the project design for compliance with the California Code of Regulations, Title 24.

3.0 ENVIRONMENTAL INITIAL STUDY CHECKLIST

1. Project Title: Solar Photovoltaic Installations at Walker Elementary School and Wangenheim Middle School
2. Lead Agency Name and Address: San Diego Unified School District
Facilities Planning & Construction
4860 Ruffner Street, Annex Room 5
San Diego, CA 92111
3. Contact Person and Phone Number: Paul Garcia, Lead CEQA Project Manager
San Diego Unified School District
(858) 637-6290
4. Project Locations: Walker Elementary School
9225 Hillery Drive
San Diego, CA 92126

Wangenheim Middle School
9230 Gold Coast Drive
San Diego, CA 92126
5. Project Sponsor's Name and Address: San Diego Unified School District
Facilities Planning & Construction
4860 Ruffner Street
San Diego, CA 92111
6. General Plan Designation: Institutional and Public and Semi-Public Facilities (both sites)
7. Zoning: Walker Elementary School: AR-1-2, *Agricultural-Residential Zone*
(Residential – Single Unit, minimum 1-acre lot)

Wangenheim Middle School: AR-1-2, *Agricultural-Residential Zone*
(Residential – Single Unit, minimum 1-acre lot)
8. Description of Project: Installation of elevated solar PV canopies on existing District properties
(see Chapter 2, *Project Description*)
9. Surrounding Land Uses and Settings: Varies (see Chapter 2, *Project Description*)
10. Other Public Agencies Whose Approval is Required: Office of the Division of State Architect (Administrative Approval of Project Design for Compliance with California Code of Regulations Title 24)

11. Have California Native American tribes traditionally and culturally affiliated with the project area requested consultation pursuant to Public Resources Code Section 21080.3.1? If so, is there a plan for consultation that includes, for example, the determination of significance of impacts to tribal cultural resources, procedures regarding confidentiality, etc.?

Pursuant to Assembly Bill (AB) 52, California Native American tribes that are traditionally and culturally affiliated with the area can request notification of projects in their traditional cultural territory. In October 2018, the Jamul Indian Village requested AB 52 consultation with the District on future projects throughout the District if they would occur on a list of specific schools. A list of schools determined by the Jamul Indian Village to be in sensitive areas was sent to District staff in November 2018 and did not include Walker ES and Wangenheim MS. No other California Native American tribes are on the District's consultation list for AB 52. As a result, no additional consultation pursuant to AB 52 is necessary for District actions at Walker ES or Wangenheim MS.

I. AESTHETICS

AESTHETICS: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Have a substantial adverse effect on a scenic vista?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Have a substantial adverse effect on a scenic vista?

No Impact. A review of applicable community plans was conducted to determine if there are notable scenic resources, such as parks or natural areas, identified as important visual or scenic resources in the community. Specifically, the community plan for Mira Mesa was reviewed to determine whether substantial adverse effects on a scenic vista would occur with implementation of the proposed solar PV canopies at the two District-owned sites. The Mira Mesa community plan does not specifically identify scenic resources within the community. However, the nearest natural area is the Los Peñasquitos Canyon Preserve, located approximately one mile north of the project sites, and the nearest public parks include Walker-Wangenheim Neighborhood Park, located between the two schools, and the Hourglass Community Park, located directly east of Black Mountain Road. Due to intervening structures, topography, and landscaping, the proposed project would not be readily visible from these locations. The solar PV canopies associated with Walker ES may be visible from portions of Black Mountain Road,

and the solar PV canopies associated with Wangenheim MS may be visible from the nearby residential neighborhood. However, this would not impact a scenic vista, and no impacts would occur.

- b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?

No Impact. Officially Designated State Scenic Highways within the City and County of San Diego include portions of State Route (SR-) 52, SR-75, SR-78, SR-125, and SR-163. The closest scenic highway to the project site is SR-52, which is located approximately 4.5 miles to the south (Caltrans 2015). Due to the distance and topography, the project solar PV canopies would not be visible to those traveling on SR-52. In addition, the proposed project would not involve damage to scenic resources, including trees, rock outcroppings, and historic buildings. Therefore, the proposed project would not damage scenic resources within a state scenic highway.

- c) Substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?

Less Than Significant Impact. The proposed project sites are within an urbanized residential area. Both of the school sites are developed with operating schools consisting of educational structures, parking lots, recreational areas, and landscaping. Nearby schools, including the adjacent San Diego Miramar College, currently have elevated solar canopies in parking areas on campus fronting Black Mountain Road, directly east of the project site. The proposed project would involve the installation of elevated solar PV canopies within existing campus parking lots. While these additions would be noticeable to school visitors and from the general public in the immediately surrounding areas, the school sites would continue to operate and appear as a school with solar PV canopies in parking areas, similar to solar PV canopies in the adjacent San Diego Miramar College parking lot, and the project would not result in the substantial degradation of the existing developed and urbanized visual character and quality of public views of the school sites and surrounding areas. In addition, the project would not conflict with applicable zoning or other regulations governing scenic quality as there are no City policies in the Mira Mesa Community Plan related to scenic quality. Therefore, impacts on the visual character or quality of the site or surrounding area would be less than significant.

- d) Create a new source of substantial light or glare that would adversely affect day or nighttime views in the area?

No Impact. During the summer and on non-school days, construction activities would only occur during permitted daytime hours from 7 a.m. to 7 p.m., in accordance with the City's Municipal Code. However, there is the potential that construction would occur when school is in session. To avoid disruptions to students and faculty, construction activities may be limited to occur between the hours of 2 p.m. and 7 p.m. As such, construction of the proposed project would not introduce new sources of substantial nighttime lighting or glare, and potential impacts associated with construction would not occur. The proposed project would incorporate materials that would not create new sources of substantial glare. The proposed solar PV canopies would be constructed of dark-colored (typically blue or black) materials and would be covered with anti-reflective coatings. As such, the proposed project would not create a new source of substantial light or glare at the project site or surrounding area as a result of project implementation.

II. AGRICULTURE AND FORESTRY RESOURCES

AGRICULTURE AND FORESTRY RESOURCES:		Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:					
a)	Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b)	Conflict with existing zoning for agricultural use, or a Williamson Act contract?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c)	Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d)	Result in the loss of forest land or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e)	Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non- forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?

No Impact. Walker ES and Wangenheim MS are located in an urbanized area and the proposed solar PV canopies would be located on existing paved areas of the campuses. According to the California Department of Conservation's California Important Farmland Finder, the project sites are classified as "Residential," which does not contain agricultural uses or areas designated as Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (California Department of Conservation 2016). As a result, the project would not result in the conversion of Prime Farmland, Unique Farmland, or Farmland of Statewide Importance to non-agricultural use. Therefore, no impact would occur.

- b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?

No Impact. As discussed above in Item II.a, the project sites are in developed areas where there are no farmlands or agricultural resources. The project sites are zoned for residential use. The sites are developed and not eligible for designation under a Williamson Act contract. The areas surrounding Walker ES and Wangenheim MS are developed with urban or suburban uses and do not support existing Williamson Act contracts. The land does not include existing Williamson Act contracts (California Department of Conservation 2013). As a result, no impacts would occur.

- c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?

No Impact. As discussed above in item II.b, the project sites are in developed areas where there are no farmlands. The project sites and surrounding areas are zoned for residential use and do not support agricultural activities. As such, the proposed project would not involve changes that would result in the conversion of farmland to non-agricultural use. Therefore, there would be no impact.

- d) Result in the loss of forest land or conversion of forest land to non-forest use?

No Impact. As discussed above in item II.c, the project sites are in developed areas where there are no farmlands or forest resources. Additionally, the project would occur on existing paved surfaces. The project sites and surrounding areas are classified as "Urban and Built-Up Land" and are not zoned as forest land, timberlands, or timberland zoned Timberland Production (California Department of Conservation 2016). As such, the proposed project would not result in a loss of forest land or conversion of forest land to non-forest uses. Therefore, there would be no impact.

- e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?

No Impact. Implementation of the proposed project would have no impact on agriculture and/or forestry resources. The project sites are within developed areas where there are no farmlands or forest resources. The project sites and surrounding areas are classified as "Urban and Built-Up Land," which do not contain agricultural uses or areas designated Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (California Department of Conservation 2016). Furthermore, there are no Williamson Act contracts or forest lands in the project vicinity (California Department of Conservation 2013). The project improvements would occur on existing paved surfaces. There would be no changes in the existing environment, which, due to their location and nature, would result in the conversion of Farmland to non-agricultural use or conversion of forest land to non-forest use with implementation of the proposed project. Therefore, there would be no impact.

III. AIR QUALITY

AIR QUALITY: Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations. Would the project:				
	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Conflict with or obstruct implementation of the applicable air quality plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

AIR QUALITY:

Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations. Would the project:

	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
c) Expose sensitive receptors to substantial pollutant concentrations?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d) Result in other emissions such as those leading to odors adversely affecting a substantial number of people?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Impact Analysis**Setting**

The project sites are in the San Diego Air Basin (SDAB), which coincides with the boundaries of San Diego County. The San Diego Air Pollution Control District (SDAPCD) is required, pursuant to the federal and state Clean Air Acts, to reduce emissions of criteria pollutants for which the SDAB is in nonattainment. The SDAB is currently classified as a nonattainment area for the federal 8-hour ozone (O₃) standard (2008 standard of 0.075 part per million [ppm]) and as a maintenance area for both the old (1997 standard of 0.08 ppm) 8-hour O₃ standard and the federal carbon monoxide (CO) standard. The U.S. Environmental Protection Agency (USEPA) lowered the federal 8-hour O₃ standard to 0.070 ppm effective October 2015, but demonstration of attainment of this new standard will not be required until after the California Air Resources Board (CARB) makes its final area attainment designations. In addition, the SDAB is classified as a nonattainment area for state O₃, particulate matter less than 2.5 microns (PM_{2.5}), and particulate matter less than 10 microns (PM₁₀) standards (U.S. EPA 2015, CARB 2014).

a) Conflict with or obstruct implementation of the applicable air quality plan?

No Impact. All areas designated as nonattainment areas are required to prepare plans demonstrating how the area would meet the state and federal air quality standards by its attainment dates. The CARB and SDAPCD are responsible for ensuring that state and federal air quality standards are met, as well as for developing policies and plans to reduce statewide emissions. The San Diego Regional Air Quality Strategy (RAQS) is the region's applicable air quality plan for improving air quality in the region and attaining federal and state air quality standards. The RAQS relies on information from CARB and the San Diego Association of Governments, including projected growth in the county, which is based in part on local general plans. Generally, projects that propose development that are consistent with the land use designations and growth anticipated by the local general plan and the San Diego Association of Governments would be consistent with the RAQS.

Implementation of the proposed project would occur at two existing schools and would involve the installation of solar PV canopies on paved surfaces. The proposed project would not result in an increase in student or employee capacity at the two schools and would not involve temporary relocation of students or employees during construction. Project construction would comply with SDAPCD Rules and Regulations, including Rules 50, 51, and 55, which forbid visible emissions, forbid nuisance activities, and require fugitive dust control measures, respectively. The proposed project would not result in changed land uses, nor would it increase student or worker population or motor vehicle trips to the project site aside from occasional trips for panel cleaning, visual inspections, and preventative maintenance. Project

implementation would decrease the reliance of the campus on electricity generated at power-generating facilities within the region, including some within the SDAB, thereby contributing to an overall reduction in criteria pollutants. As such, the project would not conflict with or obstruct the implementation of an applicable air quality plan and no impacts would occur.

- b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in non-attainment under an applicable federal or state ambient air quality standard (including releasing emissions that exceed quantitative thresholds for ozone precursors)?

Less Than Significant Impact. Construction of the proposed project would result in short-term emissions of volatile organic compounds, nitrogen oxides, CO, sulfur oxides, PM₁₀, and PM_{2.5} through the use of construction equipment, material haul trucks, and worker vehicles over an approximate four-month period (construction at each site would take about two months and would be developed sequentially). Maximum daily construction emissions modeled for the Patrick Henry High School Solar Power Generation System Project, which is similar to the proposed project, are shown in Table 1, *Estimated Maximum Daily Criteria Pollutant Emissions from Project Construction (Pounds per Day)*.

Table 1
ESTIMATED MAXIMUM DAILY CRITERIA POLLUTANT EMISSIONS FROM PROJECT CONSTRUCTION
(POUNDS PER DAY)

Construction Year	ROG	NO _x	CO	SO _x	PM ₁₀	PM _{2.5}
Henry High School Solar Installation	2.0	22.7	13.8	0.0	1.3	0.9
Maximum Daily Concurrent Emissions ¹	4	45.4	27.6	0.0	2.6	1.8
Threshold	75	250	550	250	100	55
Exceed Threshold?	No	No	No	No	No	No

Source: San Diego Unified School District, 2017

¹ Assumes concurrent construction of both solar installations.

As shown in Table 1, the maximum daily criteria pollutant emissions associated with construction of both solar PV array systems concurrently, assuming the same level of construction activity as the Patrick Henry Solar Power Generation System Project, would be well below the SDAPCD thresholds. In addition, all construction activities would be subject to applicable provisions of SDAPCD Rules and Regulations, including Rules 50, 51, and 55, as discussed in item III.a above, and would further reduce emissions.

Operation of the solar PV canopies would not require active management and maintenance would be minimal, with washings of the panels as needed to optimize productivity, approximately once per year. Mobile source emissions related to the maintenance requirements would be minor. Project implementation would decrease the District's reliance on electricity from fossil-fuel power generating facilities within the region, thereby reducing demand and contributing to reductions in criteria pollutants. Consequently, project operation is expected to result in a regional air quality benefit, as electricity formerly provided from non-renewable sources would be provided on site by the solar PV canopies. Impacts related to violations of air quality standards would be less than significant.

The proposed project activities would not result in a cumulatively considerable net increase of criteria pollutants in a nonattainment area. The project sites are in the SDAB, which is classified as a nonattainment area for certain federally and state-designated criteria pollutants, including O₃, PM₁₀, and PM_{2.5}. As discussed above, the proposed project would not increase the number of students or employees at the two sites, and therefore, would not contribute to additional vehicle trips to the site or

additional energy demand. Emissions resulting from construction activities would be temporary, localized, minimal, and not exceed significance thresholds. Additionally, the project would comply with all applicable SDAPCD rules and regulations. Compliance with these measures would ensure that the cumulative contribution of criteria pollutants during construction and operation would be less than significant.

c) Expose sensitive receptors to substantial pollutant concentrations?

Less Than Significant Impact. The proposed project would not result in the exposure of sensitive receptors to substantial pollutant concentrations. Sensitive receptors are facilities and structures where people live or spend considerable amounts of time, and include retirement homes, residences, schools, playgrounds, childcare centers, and athletic facilities. The proposed project would be located near residences and would be located on two school sites, which are considered sensitive receptors. The nearest off-site receptor locations are the single-family residences and mobile homes that surround the school sites. Construction would be minimal and short-term and would occur over a timeframe of approximately two months at each site for a total of four months of project-related construction. Exposure at the school and nearby residences would be minimal and of short duration, significantly lower than the 70-year exposure period typically associated with chronic cancer health risks. Accordingly, construction of the project would not result in substantial pollutant concentrations at exposed sensitive receptors. Once operational, the project would generate emissions similar to existing conditions. As such, there would be no measurable increase in localized emissions affecting exposed sensitive receptors when compared with existing conditions. Given that project activities would comply with all SDAPCD rules, localized emissions would not expose nearby sensitive receptors to substantial pollutant concentrations and impacts would be less than significant.

d) Result in other emissions such as those leading to odors adversely affecting a substantial number of people?

Less Than Significant Impact. Project-related odor emissions would be minimal and would not affect a substantial number of people. During construction activities, emissions from construction equipment may be evident in the immediate area on a temporary basis. Material delivery truck trips could create an occasional odor of diesel exhaust for nearby receptors along paths of travel, but these odors would not affect a substantial number of people because the scale of construction would be limited in size. Operation of the proposed project would not produce other emissions such as those leading to odors, and there would be no permanent impacts. Therefore, impacts would be less than significant.

IV. BIOLOGICAL RESOURCES

BIOLOGICAL RESOURCES:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:				
a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

BIOLOGICAL RESOURCES:				
Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations, or by the California Department of Fish and Wildlife or US Fish and Wildlife Service?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?
- b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?

No Impact. The proposed project involves the installation of solar PV canopies on existing paved surfaces at two sites that are developed and functioning schools. The sites are located in a completely developed and urbanized area and are not located within proximity to neighboring sensitive biological areas or riparian habitat. Because project improvements would occur on existing paved surfaces, the project would have no adverse impact on vegetation or wildlife and impacts to biological resources would not occur.

- c) Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal wetlands, etc.) through direct removal, filling, hydrological interruption, or other means?

No Impact. No federally protected wetlands are present within the project sites. The proposed project would occur on existing paved surfaces within District-owned sites. While vernal pools are located east

of Black Mountain Road on the San Diego Miramar College campus, the project would not directly or indirectly impact these vernal pools as project-related activities would occur within the school campuses and would not affect hydrology or drainage that could indirectly affect a protected wetland. Therefore, the proposed project would not affect federally protected wetlands, and no impacts would occur.

- d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?

No Impact. The project sites do not consist of wildlife corridors as they are developed with schools within an urbanized area. As such, the proposed project would not interfere with the movement of fish or wildlife and would not affect wildlife corridors. The sites are located in proximity to ornamental trees, which may potentially be inhabited by nesting birds protected under the MBTA during the avian breeding season (February 1 through August 15). However, potential impacts on migratory birds and raptors would be avoided with the implementation of the standard operating procedures and/or contractor specifications identified in Chapter 2, Project Description, of this Initial Study. Therefore, no impacts would occur.

- e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?

No Impact. The proposed project would occur on existing paved areas and would not involve the removal of either ornamental or native trees. The project sites do not contain sensitive vegetation that may provide potentially suitable habitat for listed species. As such, the proposed project would not conflict with local policies or ordinances protecting biological resources, and no impacts would occur.

- f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?

No Impact. In the City, local habitat, species, and biological resources are protected under the City's Multiple Species Conservation Plan (MSCP), which is implemented through the MSCP Subarea Plan (City of San Diego 1997). The City's MSCP Subarea Plan was developed to meet the requirements of the California Natural Communities Conservation Planning Act of 1992, and as such serves as the City's approved local natural community conservation plan. To implement its portion of the MSCP preserve, the City developed the Multiple Habitat Planning Area (MHPA), which is considered an urban preserve that delineates core biological resource areas and corridors targeted for conservation. MHPA lands are typically constrained by existing or approved development, and comprise linkages connecting several large areas of habitat. The project is not located adjacent to or within the vicinity of MHPA lands. No habitats, species, or resources protected under the MSCP are present within the project sites. Therefore, implementation of the proposed project would not conflict with applicable conservation plans, and impacts would not occur.

V. CULTURAL RESOURCES

CULTURAL RESOURCES: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Cause a substantial adverse change in the significance of a historical resource pursuant to §15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Disturb any human remains, including those interred outside of formal cemeteries?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Impact Analysis

- a) Cause a substantial adverse change in the significance of a historical resource as defined in §15064.5?

No Impact. Generally, historical resources are considered to be resources that are eligible for listing in the California Register of Historical Resources if they are greater than 50 years in age, or if the lead agency (e.g., the District) considers the buildings to be historically significant. As further detailed below, neither of the school campuses are 50 years old and none of the proposed solar PV installations would alter the existing campus buildings. The solar improvements consist of elevated solar PV canopies within paved areas and parking lots and would not result in modifications to existing buildings. Additionally, the District also does not consider these school sites to have historical significance. Therefore, the proposed project would not cause a substantial adverse change in the significance of a historical resource as defined in Section 15064.5 of the State CEQA Guidelines. No impact to historical resources would occur.

- b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?

No Impact. Record searches were conducted by HELIX at the South Coastal Information Center on September 24, 2019. The results of the records searches indicate that no known archaeological resources are located within the project sites. Additionally, the project involves the installation of solar PV canopies on existing paved surfaces. Ground-disturbing activities would be limited to excavation for canopy pier foundations and electrical trenching. Due to the developed nature of the project sites, it is not anticipated that archaeological resources would be discovered. Therefore, the project would not result in a substantial adverse change in the significance of an archaeological resource, and no impacts would occur.

- c) Disturb any human remains, including those interred outside of formal cemeteries?

Less Than Significant Impact. The project sites are not formal cemeteries and are not near a formal cemetery. The project sites and surrounding areas are developed, and there is no record of human remains being identified during development of the schools. The sites are not known to be on a burial ground. Therefore, it is highly unlikely that the proposed project would disturb human remains during construction at the project sites. Should human remains be uncovered during construction, as specified by State Health and Safety Code Section 7050.5, no further disturbance would occur until the County

Coroner has made the necessary findings as to the origin and disposition pursuant to Public Resources Code 5097.98. If such a discovery occurs, excavation or construction would halt in the area of the discovery, the area would be protected, and consultation and treatment would occur as prescribed by law. If the County Coroner recognizes the remains to be Native American, he or she would contact the Native American Heritage Commission, which would appoint the Most Likely Descendant. Additionally, if the bones are determined to be Native American, a plan would be developed regarding the treatment of human remains and associated burial objects, and the plan would be implemented under the direction of the Most Likely Descendant. Therefore, impacts would be less than significant.

VI. ENERGY

ENERGY: Would the project:	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?

No Impact. The proposed project entails the installation of solar PV canopies on existing paved surfaces within school sites. The installation of solar panels would enhance the school's reliance on renewable energy and the electricity generated by the proposed project would either be consumed on site or exported to the utility grid. The District would participate in a Net Energy Metering program with the local utility company. When electricity produced by the solar panels exceeds on-site consumption of electricity, the excess electricity would flow back into the electrical grid. When on-site consumption exceeds solar production, electricity would be drawn from the grid. The flow of energy to and from the grid is recorded by the utility meter and an annual accounting is done to determine net usage. Minimal energy consumption would be necessary during construction of the project. Therefore, the project would not result in wasteful, inefficient, or unnecessary consumption of energy resources during construction or operation, and no impact would occur.

- b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?

No Impact. The installation of solar PV canopies would contribute to displacing fossil-fuel-powered electricity with renewable energy. Therefore, the proposed project would not conflict with or obstruct a state or local plan for renewable energy or energy efficiency, and no impact would occur.

VII. GEOLOGY AND SOILS

GEOLOGY AND SOILS:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:				
a) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
i. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
ii. Strong seismic ground shaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iii. Seismic-related ground failure, including liquefaction?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iv. Landslides?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
e) Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Impact Analysis

- a) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:
- i. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42?
 - ii. Strong seismic ground shaking?
 - iii. Seismic-related ground failure, including liquefaction?
 - iv. Landslides?

Less Than Significant Impact. Based on geologic mapping, the project sites are not within a State of California Earthquake Fault Zone (formerly known as an Alquist-Priolo Special Studies Zone). The closest known active fault is the Rose Canyon Fault, which is approximately 8 miles southwest of the project sites. No known active faults cross the project sites or surrounding areas. However, the project sites are within a known seismically active region where the potential of seismic hazards exists. A seismic event on the Rose Canyon Fault could cause significant ground shaking on the proposed project sites. While the potential for ground rupture due to faulting at the sites is considered low, lurching, or cracking of the ground surface as a result of a nearby seismic event is possible.

According to the City of San Diego's Seismic Safety Study, the project sites are mapped within low risk areas for geologic risk including landslides and liquefaction. Specifically, these sites are within Geologic Hazard Category 51 and/or 52. Geologic Hazard Category 51 is defined as "level mesas underlain by terrace deposits and bedrock, nominal risk." Geologic Hazard Category 52 is defined as "other level areas, gently sloping to steep terrain, favorable geologic structure, low risk" (City of San Diego 2008a).

The proposed project solar canopies would be constructed in existing disturbed locations within the campuses, such as within parking lots or paved areas. Design and construction of the proposed project would comply with all seismic-safety development requirements, including the Title 24 standards of the California Building Code. Conformance with all applicable seismic-safety development requirements would minimize seismic ground shaking effects in the event of a major earthquake and ensure that the potential seismic or geologic hazard impacts would not be significant.

The project sites are not mapped within a liquefaction or landslide hazard zone in the City of San Diego's Seismic Safety Study (City of San Diego 2008a). Therefore, there is low potential for liquefaction or landslides at the project sites. As a result, the proposed project would not expose people or structures to potentially substantial adverse effects, including the risk of loss, injury, or death, and impacts would be less than significant.

b) Result in substantial soil erosion or the loss of topsoil?

Less Than Significant Impact. While project construction could result in some short-term increase in on-site erosion and sediment transport potential (e.g., through excavation), these impacts would be addressed through conformance with applicable elements of the National Pollutant Discharge Elimination System (NPDES) Construction General Permit (refer to Response IX.a for additional discussion of NPDES permit requirements), which is required as part of a District standard specification. Specifically, this would entail implementing appropriate measures such as: (1) seasonal grading restrictions during the rainy season (October 1 to April 30) for applicable areas; (2) use of erosion control/stabilizing measures such as geotextiles, mats, fiber rolls, or soil binders; (3) use of sediment controls to protect the site perimeter and prevent off-site sediment transport, including measures such as silt fencing, fiber rolls, gravel bags, temporary sediment basins, street sweeping, stabilized construction access points and sediment stockpiles, and use of properly fitted covers for sediment transport vehicles; and (4) compliance with local dust control measures. Areas would be returned to their pre-existing condition at the completion of construction, thereby precluding the potential for long-term erosion impacts.

Based on implementation of appropriate erosion and sediment control measures as part of, and in conformance with, applicable NPDES requirements, associated potential erosion and sedimentation impacts from implementation of the proposed project would be less than significant.

- c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction, or collapse?

Less Than Significant Impact. As discussed above in item VI.a, the project sites are in areas identified as having low geologic risk. All work would occur within existing developed or disturbed portions of the campuses. Neither of the project sites is mapped within a liquefaction or landslide hazard zone in the City of San Diego Seismic Safety Study (City of San Diego 2008a). As a result, the underlying geologic structure of the project sites would not become unstable as a result of the project, resulting in an on-site or off-site landslide, lateral spreading, subsidence, liquefaction, or collapse. Therefore, impacts would be less than significant.

- d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?

Less Than Significant Impact. Expansive soils are fine-grained soils (generally high-plasticity clays) that can undergo a significant increase in volume with an increase in water content and a significant decrease in volume with a decrease in water content. Changes in the water content of an expansive soil can result in severe distress to structures constructed upon the soil. Development would occur within soils with some potential for expansion; however, the proposed project would occur on fully developed school sites. Additionally, the proposed project involves the construction of solar infrastructure and does not include the construction of classrooms or other structures intended for human occupancy. Furthermore, design and construction of the proposed project would comply with the requirements of the California Building Code. As such, the proposed project does not include components that would create substantial risks to life or property associated with expansive soils. Therefore, impacts would be less than significant.

- e) Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?

No Impact. Implementation of the proposed project would not result in impacts regarding inadequate soils to support septic systems. Each of the sites use existing sewer systems for the disposal of wastewater and would not use septic tanks or alternative wastewater disposal systems as a result of project implementation. Therefore, there would be no impact.

- f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

Less Than Significant Impact. The City of San Diego's CEQA Significance Determination Thresholds state that paleontological monitoring during construction is required if a project is underlain by a geologic formation assigned with a high paleontological resource sensitivity, includes greater than 1,000 cubic yards of grading/excavation, and extends to a depth greater than 10 feet deep (City of San Diego 2011). Construction activities would occur within paved areas for nearly all of the proposed project components, with the exception of trenching required for electrical cable connections. Extensive grading is not anticipated, and project-related activities are not expected to extend into native soil nor exceed the 1,000 cubic yards of grading/excavation or 10-foot depth thresholds established by the City of San Diego. As a result, impacts related to paleontological resources would be less than significant.

VIII. GREENHOUSE GAS EMISSIONS

GREENHOUSE GAS EMISSIONS:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:				
a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

Setting

California's AB 32, the Global Warming Solutions Act of 2006, codified the state's greenhouse gas (GHG) emissions target by requiring the state's global warming emissions to be reduced to 1990 levels by 2020. The State CEQA Guidelines do not prescribe a particular threshold of significance or method for determining significance of GHG emissions in CEQA documents, but instead allow lead agencies to adopt thresholds and methods that are previously adopted or recommended by other public agencies or recommended by experts (State CEQA Guidelines Sections 15064.4(a) and 15064.7(c)).

The District has not yet formally adopted specific thresholds of significance with regard to GHG emissions, nor has the District adopted a qualified plan, policy, or regulation to reduce GHG emissions that qualifies for tiering in CEQA documents (per State CEQA Guidelines Section 15183.5(a)). Other lead agencies throughout the state, including the County of San Diego, recommend projects be compared to a 900-metric ton (MT) carbon dioxide equivalent (CO₂e) screening level to identify which projects require additional analysis and mitigation. Project emissions below this 900-MT CO₂e level are considered less than cumulatively considerable, and project emissions above this level require additional analysis. Moreover, projects that result in a net benefit by reducing GHG emissions are determined to have a less-than-significant impact related to GHG emissions. In accordance with the State CEQA Guidelines and scientific consensus regarding the cumulative nature of GHGs,¹ the analysis herein includes a cumulative, rather than project-level, evaluation of GHG impacts.

- a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?

No Impact. Project construction activities would contribute GHG emissions as a result of exhaust from off-road diesel equipment to install the canopies and emissions from worker vehicles and material deliveries traveling to and from the project site. Primary GHG emissions would occur as carbon dioxide (CO₂) from gasoline and diesel combustion, with more limited vehicle tailpipe emissions of nitrous oxide

¹ Climate change is a global problem, and GHGs are global pollutants, unlike criteria air pollutants (such as ozone precursors), which are primarily pollutants of regional and local concern. Given their long atmospheric lifetimes, GHGs tend to accumulate in the atmosphere. Therefore, GHG impacts are inherently cumulatively considerable.

(N₂O) and methane (CH₄). As discussed in items III.a through III.c, construction activities would be minimal.

Once the proposed project is constructed, no GHGs would be emitted with the exception of vehicle and equipment emissions associated with occasional maintenance activities. The proposed solar PV canopies would meet a portion of the energy requirements of the school, thereby displacing GHGs from fossil-fuel-powered electricity facilities. For comparison, the 1.19 kWh produced by the Patrick Henry High School Solar Generation Project would displace the generation of approximately 296 MT CO₂e annually compared to 21.7 MT CO₂e per year of emissions associated with construction and operation (SDUSD 2017). As such, the combined construction and operational emissions of each of the solar projects would result in a net reduction of GHG emissions and would provide a net benefit by helping the District and State achieve their prescribed reduction targets. The proposed project would not directly or indirectly result in GHG emissions that would have a significant impact on the environment. Therefore, no impact would occur.

- b) Conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases?

No Impact. As described above under item VII, the District has yet to adopt a qualified plan, policy, or regulation to reduce GHG emissions. The City adopted a Climate Action Plan in December 2015, which is the City's plan to reduce GHG emissions, but this Climate Action Plan does not include emissions associated with District and school operations. Therefore, the most applicable plan, policy, or regulation adopted for the purpose of reducing GHG emissions is AB 32, which codified the state's GHG emissions reduction targets for the future. CARB adopted the AB 32 Scoping Plan as a framework for achieving AB 32. Upon completion of the project, GHG emissions would be reduced compared to existing conditions. Therefore, no impact regarding a conflict with an applicable plan, policy or regulation would occur.

IX. HAZARDS AND HAZARDOUS MATERIALS

HAZARDS AND HAZARDOUS MATERIALS: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

HAZARDS AND HAZARDOUS MATERIALS:		Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:					
e)	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
f)	Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
g)	Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?

Less Than Significant Impact. Project construction would require the use of materials that are typically associated with construction activities, such as diesel fuels, hydraulic liquids, oils, solvents, and paint. Hazardous materials used during project construction would be transported, used, and stored in accordance with state and federal regulations regarding hazardous materials. During project operation, the solar PV canopies would be washed approximately one time per year, or as needed to clean the active surface of the canopies to optimize energy production. Water usage would vary depending on the operations and maintenance provider to be selected. Some providers utilize no water, while others may use pressure washers or water combined with brushes. Wash water is typically minimized to prevent overland flow. Chemical cleaners are not typically used for washing of the solar PV canopies or associated equipment. Operation and maintenance of the proposed project would not require the use of hazardous materials or generate hazardous waste. The solar PV canopies would not produce waste during project operation. As a result, the proposed project would not create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials. Impacts would be less than significant.

- b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?

Less Than Significant with Mitigation. The two sites at which the proposed project would occur are existing and operating schools. Project construction would require minor ground-disturbing activities associated with excavation of the canopy pier foundations and trenching for the installation of electrical transmission lines. According to the California Department of Toxic Substances Control (DTSC) Envirostor Database, the project sites are located within the Linda Vista Valley Auxiliary Field Formerly Used Defense Site (Linda Vista FUDS; DTSC 2019). The Linda Vista FUDS is located one mile north of Marine Corps Air Station Miramar and west of I-15 in the community of Mira Mesa. The 215-acre site was historically used by the United States Navy as an auxiliary airfield and emergency landing strip for MCAS Miramar. Practice bombing was conducted at this site during World War II. In the early 1960s, the

property was divided and sold to the District and a private developer. Walker ES, Wangenheim MS, San Diego Miramar College, and the adjacent mobile home parks were constructed over the next 15 years.

Due to the historic use of the site, munitions and unexploded ordnances (UXOs) could be encountered during ground-disturbing activities. Therefore, such activities must comply with mitigation measure HAZ-1, which requires the preparation of a Munitions Response Plan (MRP) by the District, the presence of a UXO technician during all ground-disturbing activities, and awareness briefings for all District staff and contractors who will be involved in any ground-disturbing activities at Walker ES or Wangenheim MS. Compliance with mitigation measure HAZ-1 would reduce potential impacts associated with ground-disturbing activities to a less than significant level. Therefore, the proposed project would not create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment.

MM HAZ-1: Prior to any excavation activities occurring within the boundaries of Walker Elementary and Wangenheim Middle schools, the following procedures shall be implemented by the District to ensure safety for all students, staff, and contractors working in these areas:

- Preparation of a Munitions Response Plan (MRP) by the District shall be required prior to commencement of ground disturbing activities at Walker Elementary and Wangenheim Middle school. The purpose of the MRP is to outline the procedures that must take place in the event unexploded ordnance is discovered during ground-disturbing activities.
- An unexploded ordnance (UXO) awareness briefing shall be conducted for all District staff and contractors, by District Staff or its assigned UXO contractor, who will be involved in any ground disturbing activities at Walker Elementary and Wangenheim Middle school. The awareness briefings shall be completed prior to the start of ground-disturbing activities. Any new personnel shall be briefed prior to beginning work on site.
- Any ground disturbance at Walker Elementary and Wangenheim Middle school shall require a District contracted UXO technician be present during ground-disturbing activities.

c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?

Less Than Significant Impact. The proposed project would occur at existing and operating schools and would involve the use of materials that are typically associated with construction activities (e.g., diesel fuel, gasoline, oil, hydraulic fluid, solvent for welding PVC, asphalt and binders, paint). Hazardous materials used during project construction would be transported, used, and stored in accordance with state and federal regulations regarding hazardous materials. Additionally, project operation would not require the use of hazardous materials or generate hazardous waste. The solar PV canopies would be washed approximately one time per year, or as needed to clean the active surface of the canopies to optimize energy production; however, chemical cleaners are not typically used during washing activities. As such, construction and operational impacts associated with the proposed project would be less than significant.

- d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?

Less Than Significant with Mitigation. As discussed in Item IV.b, the proposed project is located on a hazardous site according to the DTSC EnviroStor Database. Implementation of mitigation measure HAZ-1 would reduce impacts to less than significant.

- e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?

No Impact. The Marine Corps Air Station Miramar, Montgomery Field, and Lindberg Field are the primary airports in the San Diego region. Both sites are within two miles of MCAS Miramar. However, the sites are developed as operating schools in a developed area. The proposed project would occur on existing paved surfaces and the solar installations is not expected to result in a safety hazard. Therefore, no impacts would occur.

- f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?

No Impact. Emergency management services for the schools are overseen by the San Diego Fire-Rescue Department, which responds to emergencies such as earthquakes, floods, and terrorist acts. In addition, the District maintains a Natural Hazards Mitigation Plan that addresses issues related to multiple hazards, including earthquakes, floods, wildfires, landslides, and tsunamis. Construction activities at the two project sites would not restrict access for emergency vehicles traveling to the sites as no campus entrances or driveways would be hindered by construction equipment and no road closures would be necessary. Following construction of the project, emergency access to the sites would remain similar to the existing conditions. As a result, implementation of the proposed project would not impair or physically interfere with an emergency response, and no impacts would occur.

- g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury, or death involving wildland fires?

No Impact. The City is subject to both wildland and urban fires due to its climate, topography, and native vegetation (City of San Diego 2015b). The extended droughts characteristic of the region's Mediterranean climate and increasingly severe dry periods associated with global warming result in large areas of dry native vegetation that provide fuel for wildland fires. State law requires that all local jurisdictions identify very high fire hazard severity zones (VHFHSZ) within their areas of responsibility (California Government Code Sections 51175–51189). Inclusion within these zones is based on vegetation density, slope severity, and other relevant factors that contribute to fire severity.

According to the VHFHSZ Maps prepared by the City in collaboration with the California Department of Forestry and Fire Protection, Walker ES and Wangenheim MS are not located within or adjacent to a VHFHSZ (City of San Diego 2009). The proposed solar PV canopies would be installed on existing paved surfaces and would not increase the number of students or employees on site nor would the project result in an increase in future exposure of buildings to fire risk. As a result, implementation of the proposed project would not expose people to a significant risk from wildland fires and impacts would not occur.

X. HYDROLOGY AND WATER QUALITY

HYDROLOGY AND WATER QUALITY:		Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:					
a)	Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b)	Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c)	Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				
i)	result in substantial erosion or siltation on- or off-site?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
ii)	substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iii)	create or contribute runoff water which would exceed the capacity of existing or planned substantial additional sources of polluted runoff?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
d)	In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e)	Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?

Less Than Significant Impact. The proposed project involves the installation of solar PV canopy installation systems consisting of elevated solar PV canopies within previously disturbed and paved areas on the school campuses. Ground-disturbing activities would be limited to excavation for canopy pier foundations and electrical trenching. During construction, excavation activities and exposed soil have the potential to temporarily increase the amount of suspended solids (sediment) in sheet flow or runoff that would enter the existing storm drain system during a rain event. The total limits of ground disturbance would be determined at the time of final project design; however, it is not anticipated that ground disturbance would exceed one acre. In the event that the proposed project includes over one acre of land disturbance at each site, the District would be required to obtain and comply with the State Water Resource Control Board's NPDES General Permit for Stormwater Discharges Associated with Constructions and Land Disturbance Activities (General Construction Permit).

Compliance with the General Construction Permit requires the development of a Stormwater Pollution Prevention Plan (SWPPP) by a qualified SWPPP developer, the elimination or reduction of non-stormwater discharge off site into storm drainage systems or other water bodies, and the implementation of best management practices (BMPs) throughout the construction period. Stormwater BMPs would be required to limit erosion, minimize sedimentation, and control stormwater runoff water quality during construction activities. The SWPPP requires a description of the project site, identification of sources of sediment and other pollutants that may affect the quality of stormwater discharges, a list of BMPs to provide sediment and erosion control, waste handling measures, and non-stormwater management. However, if the limits of ground disturbance for project construction would be less than one acre, a Water Pollution Control Plan (WPCP) would be required in lieu of a SWPPP. The specific BMPs that would be implemented with the proposed project would be identified during development of the SWPPP or WPCP, which would occur concurrently with final project design and be completed prior to construction. Typical construction BMPs include but are not limited to soil cover of inactive areas, gravel bags, and fiber rolls. Compliance under the General Construction Permit and SWPPP or WPCP as applicable would ensure that construction activities would not degrade the surface water quality of receiving waters to levels that would exceed the standards considered acceptable by the San Diego Regional Water Quality Control Board or other regulatory agencies.

The amount of stormwater runoff from the school sites would not change with implementation of the proposed project. During project operation, solar array washing would occur approximately one time per year at both school sites, or as needed to clean the active surface of the solar PV canopies to optimize energy production. Water usage would vary depending on the operations and maintenance provider to be selected. Some providers utilize no water, while others may use pressure washers or water combined with brushes. Wash water is typically minimized to prevent overland flow. Chemical cleaners are not typically used for washing. As such, wastewater generated during project operation and maintenance activities (if any) would be minimal and would not create a substantial source of additional polluted runoff. Therefore, the proposed project would not violate water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality, and impacts would be less than significant.

- b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?

No Impact. The proposed project would not decrease groundwater supplies or interfere with groundwater recharge. The project sites are within established communities serviced by the City, Public Utilities Department, and the project does not propose the use of groundwater. The solar PV canopies would be installed on paved areas and would not increase in the amount of impervious surfaces at the sites and would therefore not interfere with groundwater recharge. Therefore, the proposed project would not decrease groundwater supplies or interfere with groundwater recharge.

- c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:
 - i) result in substantial erosion or siltation on- or off-site?
 - ii) substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?

- iii) create or contribute runoff water which would exceed the capacity of existing or planned substantial additional sources of polluted runoff?

Less Than Significant Impact. Implementation of the proposed project would not affect the existing drainage pattern of the school sites. The project sites are developed as operating schools in urbanized communities. No streams or river courses exist within the vicinity of the school sites that could be affected by the proposed project, either through direct modification or from storm water runoff from the project sites. Additionally, no component of the proposed project would result in a substantial alteration of the existing drainage pattern of the sites. Implementation of the proposed project would occur on existing paved surfaces and would not increase the amount of impervious surfaces or contribute to an increase in runoff water. Although periodic maintenance of the panels may require water for washing, the water usage would be minimal and would not be a substantial source of polluted runoff.

During construction, BMPs would be implemented in compliance with either the SWPPP or WPCP and the General Construction Permit issued for the project, which would require that erosion and siltation does not result in off-site water quality impacts. Installation of the canopies would require minor excavation for pier foundations. The electrical transmission lines would be installed in an underground conduit. The electrical transmission lines would extend from the combiner to the main electrical service in one of the existing school buildings. All excavated areas would be restored to pre-project conditions once construction has been completed. As such, the proposed project would not result in substantial erosion or siltation, increase the rate or amount of surface runoff, or create or contribute runoff water which would exceed the capacity of existing or planned substantial additional sources of polluted runoff. Therefore, impacts would be less than significant.

- d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?

No Impact. According to the Federal Emergency Management Agency's (FEMA) Flood Map Service Center, neither of the sites are within a 100-year flood hazard area (FEMA 2012). In addition, the project sites are not downstream of or adjacent to major water bodies, including lakes or rivers, that could contribute to impacts associated with inundation by seiche. The closest water body is Lake Miramar, which is located more than one mile east of the project sites across the I-15. Additionally, because the project sites are located more than three miles inland, the likelihood of the project sites being inundated by a tsunami is extremely low. As such, impacts would not occur.

- e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?

No Impact. As described under items IX.a and IX.b, the proposed project would not result in adverse impacts to water quality, decrease groundwater supplies or interfere with groundwater recharge. The solar PV canopies would be installed on existing paved areas and would not increase the amount of runoff or impervious surfaces at the site and would therefore not interfere with groundwater recharge. Therefore, the proposed project would not conflict with or obstruct implementation of water quality control plan or sustainable groundwater management plan.

XI. LAND USE AND PLANNING

LAND USE AND PLANNING: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Physically divide an established community?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

a) Physically divide an established community?

No Impact. The proposed project would occur entirely within the boundaries of the existing District sites that are within established, developed areas of the Mira Mesa community. The addition of solar PV canopies would not physically divide established communities and no impacts would occur.

b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?

No Impact. The proposed project would not result in changes to the existing land use at either site. In addition, there are no components of the proposed project that, once operational, would have the potential to conflict with adjacent land uses. The proposed project would serve as ancillary components to existing facilities and would not change or alter existing operations at either of the school sites. Therefore, no impacts would occur.

XII. MINERAL RESOURCES

MINERAL RESOURCES: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Impact Analysis

- a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?
- b) Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan?

Less Than Significant Impact. The Surface Mining and Reclamation Act of 1975 required the State Geologist to initiate mineral land classification to help identify and protect mineral resources in areas within the state. In accordance with guidelines established by the State Mining and Geology Board, mineral deposits in western San Diego County have been classified into Mineral Resource Zones (MRZ). According to the Conservation Element of the City's General Plan (City of San Diego 2008b), both project sites are all mapped within the MRZ-2 classification.

The MRZ-2 classification identifies areas containing mineral deposits of potential importance. While no mineral resource extraction or other mining operations currently occur within the project sites, there is an existing sand mine located less than 0.25 mile south of Wangenheim MS. However, the District does not intend to remove the existing uses and would not have approval authority for on-site mineral extraction operations; therefore, the sites are not expected to be available for mineral extraction activities in the future. Furthermore, the project consists of installing solar PV canopies on existing paved surfaces, which would not impact potential underlying mineral resources. As such, the proposed project would not result in the loss of availability of known mineral resources that would be of value to the region and the residents of the state. Therefore, impacts would be less than significant.

XIII. NOISE

NOISE: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b) Generation of excessive groundborne vibration or groundborne noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c) For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?

Less Than Significant Impact with Mitigation. The proposed project would involve short-term construction over an approximately four-month period for both school sites. Project construction would generate noise from daytime operation of construction equipment at the school sites and from truck trips on local roadways accessing and departing the project site. As the project sites are adjacent to residences along the western border of both school sites, as well as the fact that the project sites are school campuses, the residences and the schools are considered sensitive noise receptors for the purpose of this analysis.

Two types of short-term noise impacts would occur during construction of the proposed project. The first would be related to construction traffic—construction workers who would commute to the site and trucks that would transport equipment and materials. Although there would be relatively high single-event noise levels, which could cause an intermittent noise nuisance (e.g., passing trucks at 50 feet would generate up to 76 A-weighted decibels [dBA]), the contribution of construction traffic to a 12-hour average ambient noise levels would be low due to the low traffic volume and infrequent trips, and construction traffic would not result in a significant noise impact.

The second type of short-term construction noise impact would be on-site construction activities at the project sites. Besides the schools themselves, the closest noise-sensitive receptors to both schools are residences in surrounding areas. Specifically, the closest off-site residential receptors to the proposed solar PV installations at Walker ES are located about 300 feet north of the school at the mobile home park along Hillery Drive and the closest off-site residential receptors to the proposed solar PV installations at Wangenheim MS are about 35 feet west of the school.

Construction work would be intermittent and temporary and would require minimal ground disturbance. Construction equipment is expected to involve the use of either a concrete saw and backhoe or an air compressor for trenching, and auger or drill and concrete truck for setting supports for the solar PV canopies, and a dump truck for construction clean-up. Construction activities at the project sites would occur in compliance with Section 59.5.0404 of the City of San Diego Municipal Code, which prohibits construction activities between the hours of 7 p.m. any day and 7 a.m. the following day or at any time on Sundays or on certain legal holidays (as specified in Section 21.04 of the San Diego Municipal Code, with the exception of Columbus Day and Washington's Birthday). Furthermore, construction activities are not permitted to generate 12-hour average noise levels greater than 75 dBA at a residential property during the period from 7 a.m. to 7 p.m. However, there is the potential that construction would occur when school is in session. To avoid disruptions to students and faculty, construction activities may be limited to occur between the hours of 2 p.m. and 7 p.m.

As shown below in Table 2, *Construction Equipment Noise Levels*, noise levels associated with the anticipated construction equipment would range between 76.5 dBA and 89.6 dBA at 50 feet when in use constantly over a one-hour period. When averaged over a 12-hour period and assuming the equipment is only used for a portion of the time, noise levels associated with construction equipment would be reduced to 73.8 dBA or less at 35 feet, except for the concrete saw, which would result in noise levels as high as 77.9 dBA at a distance of 35 feet. Also, same-day use of the auger or drill and the concrete saw

would also result in an exceedance of the City's 12-hour 75 dBA standard. These noise levels would diminish with distance from the construction site at a rate of approximately 6 dBA per doubling of distance. For example, noise levels associated with the use of a concrete saw would reach 71.9 dBA measured at 70 feet from the noise source to the receptor. Construction activities at Walker ES would occur at least 300 feet from the nearest off-site sensitive noise receptors, and temporary construction noise would not result in a significant impact. However, construction at Wangenheim MS would occur as close as 35 feet from the nearest off-site sensitive noise receptors and construction at both schools would occur near school buildings on-site. As a result, construction noise associated with the use of a concrete saw (and an auger or drill if used on the same day as the concrete saw) would result in a temporary significant impact to off-site sensitive noise receptors west of Wangenheim MS and to on-site sensitive noise receptors at both Walker ES and Wangenheim MS. Therefore, compliance with mitigation measure NOI-1 would be required to reduce impacts to less than significant. Mitigation measure NOI-1 would require noise barriers at the concrete saw and potentially the auger or drill or air compressor and would result in the reduction of construction noise by at least 10 dBA, which would reduce the 12-hour average dBA at nearby residences to less than significant.

Table 2
CONSTRUCTION EQUIPMENT NOISE LEVELS

Equipment	At 50 Feet (dBA)	Estimated Use Over One Hour (%)	12-hour average at 35 feet (dBA)
Concrete saw	89.6	20	77.9
Air compressor	77.7	40	73.8
Auger or drill	79.1	40	67.4
Backhoe or mini excavator	77.6	40	68.9
Dump truck	76.5	N/A	N/A
Concrete truck and pumper	81.8	40	70.1

Source: U.S. Department of Transportation, 2008.

Operation of the proposed project would result in minimal additional vehicle traffic related to maintenance activities. Because the project proposes the construction of solar PV canopies, overall operational noise levels would be similar to existing conditions. As a result, operations and maintenance related vehicle traffic is considered negligible. Operational impacts would be less than significant.

Mitigation Measures:

MM NOI-1: Construction Noise

The following construction equipment techniques shall be implemented by the construction contractor to reduce construction-related noise at nearby noise-sensitive receivers (on-site students at both schools and off-site residences west of Wangenheim MS):

- a. Construction contractor(s) shall ensure proper maintenance and working order of construction equipment and vehicles, and all construction equipment shall be equipped with manufacturer-approved mufflers and baffles.

- b. Construction contractor(s) shall use quieter equipment as opposed to noisier equipment (such as rubber-tired equipment rather than track equipment), when feasible. Noisy equipment shall be switched off when not in use.
- c. Construction activities shall be scheduled to avoid operating several pieces of equipment simultaneously, which causes high noise levels, to the extent feasible.
- d. The construction contractor(s) shall place all stationary construction equipment so that emitted noise is directed away from sensitive receivers nearest the construction activity on the Project Site.
- e. Temporary noise barriers shall be placed at the construction equipment operation to block the line-of-sight between the equipment and the offsite noise-sensitive receivers (adjacent residential properties) during demolition, grading, and paving phases of project construction to reduce noise levels at the residential property line below the City's construction noise level limit for residences (noise barriers can achieve a noise reduction of up to 15 dBA at the source).

The noise barriers shall also be placed at the equipment to block the line-of-sight between the equipment and the onsite noise-sensitive receivers (adjacent classroom buildings) during project construction phases to minimize construction noise levels experienced in the classrooms that are active, when school is in session. The following noise barrier design shall be implemented by the construction contractor in order to reduce construction-related noise at nearby noise-sensitive receivers to a less than significant: A temporary 50-foot by 50-foot L-shaped noise barrier shall be constructed on-site for each small construction area at a height of 14 feet with noise blankets capable of achieving sound level reductions of at least 10 dBA to block the line-of-sight between construction equipment operations and the noise-sensitive receivers, thereby reducing construction noise at noise-sensitive receivers to less than significant.

- b) Generation of excessive groundborne vibration or groundborne noise levels?

Less Than Significant Impact. Groundborne vibration can be described in terms of peak particle velocity (PPV). PPV is defined as the maximum instantaneous positive or negative peak amplitude of the vibration velocity. The unit of measurement for PPV is inches per second (in/s). Table 3, *Vibration Velocities for Construction Equipment*, below provides a list of typical vibration velocities of construction activities at three intervals.

Table 3
VIBRATION VELOCITIES FOR CONSTRUCTION EQUIPMENT

Equipment	PPV at 10 Feet (in/s)	PPV at 35 Feet (in/s)	PPV at 55 feet (in/s)
Pile Driver Impact	6.000	0.916	0.465
Pile Driver (sonic)	2.901	0.443	0.225
Large Bulldozer	0.352	0.054	0.027
Caisson Drilling	0.352	0.054	0.027
Loaded Trucks	0.300	0.046	0.023

Source: Federal Transit Authority, 1995

For transient vibration sources (single, isolated vibration events such as blasting), the human response to vibration varies from barely perceptible at a PPV of 0.04 in/s, to distinctly perceptible at a PPV of 0.25 in/s, to severe at a PPV of 2.0 in/s (see Table 4, *Vibration Annoyance Potential Criteria*). For continuous or frequent intermittent vibration sources (such as impact pile driving or vibratory compaction equipment), the human response to vibration varies from barely perceptible at a PPV of 0.01 in/s, to distinctly perceptible at a PPV of 0.04 in/s, to severe at a PPV of 0.4 in/s (Caltrans 2013a). If a person is engaged in any type of physical activity, vibration tolerance increases considerably (Caltrans 2013b).

Table 4
VIBRATION ANNOYANCE POTENTIAL CRITERIA

Human Response	Maximum PPV (inches/second)	
	Transient Sources	Continuous/Frequent Intermittent Sources
Barely perceptible	0.04	0.01
Distinctly perceptible	0.25	0.04
Strongly perceptible	0.90	0.10
Severe	2.00	0.40

Source: Caltrans, 2013b

Because construction would not use “high-intensity” methods such as pile driving or blasting, ground-borne vibration levels on the campus and in the neighborhoods surrounding the school sites would be very low (barely imperceptible). Also, there are no elements of the proposed project that would generate perceptible operational vibration levels. Therefore, there would be no operational vibration impacts.

- c) For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?

No Impact. Walker ES and Wangenheim MS are not located near a public or private airport. Although both sites are located within two miles of MCAS Miramar, they are both outside the 60 Community Noise Equivalent Level (CNEL) noise contour (San Diego County Airport Land Use Commission 2010). Additionally, the proposed project would not change the existing site use or increase student or employee exposure to aircraft noise. Therefore, no impacts would occur.

XIV. POPULATION AND HOUSING

POPULATION AND HOUSING:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:				
a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

POPULATION AND HOUSING:				
Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?

No Impact. The proposed project would occur at two existing schools in a developed area. The installation of solar PV canopies would not affect population growth or student growth in the area. Construction activities would result in the generation of temporary construction jobs. However, the additional jobs are expected to be filled by residents who currently live in the San Diego region. The jobs would not result in the relocation of a population. As such, the proposed project would not induce substantial population growth, either directly or indirectly, or result in the extension of public roads or other infrastructure. Therefore, no impacts would occur.

- b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?

No Impact. As mentioned, the project would occur at two existing schools in a developed area. The existing sites are developed and do not contain housing units. The proposed project involves the installation of solar PV canopies and would occur entirely within the footprint of the developed sites. As such, because no existing housing units would be removed or displaced, the project would not displace a substantial number of people necessitating the construction of replacement housing elsewhere. Therefore, no impacts would occur.

XV. PUBLIC SERVICES

PUBLIC SERVICES:				
Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
Fire protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Police protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

PUBLIC SERVICES: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Schools?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Parks?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Other public facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:

Fire protection?
Police protection?
Schools?
Parks?
Other public facilities?

No Impact. The proposed project would not increase the capacity or affect existing academic-related operations at the existing two school campuses. As such, no additional public services would be required as a result of project implementation. Consequently, the proposed project would not result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities or a need for new or physically altered governmental facilities in order to maintain acceptable service ratios, response times, or other performance objectives for public service agencies. Therefore, no impacts on public services and facilities would occur.

XVI. RECREATION

RECREATION: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?
- b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?

No Impact. The proposed project involves the installation of solar PV canopies at two schools. The project would not increase student or employee capacity or induce substantial population growth in the surrounding neighborhoods. Additionally, the proposed project does not include the development of recreational facilities either on site or off site, the construction of which could have an adverse physical effect on the environment. As such, the proposed project would not increase the use of existing recreational facilities such that substantial physical deterioration of the facilities would occur or be accelerated. Therefore, no impacts would occur.

XVII. TRANSPORTATION AND TRAFFIC

TRANSPORTATION AND TRAFFIC:				
Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Conflict with a program, plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b) Would the project conflict with or be inconsistent with CEQA Guidelines section 15064.3, subdivision (b)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d) Result in inadequate emergency access?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Impact Analysis

- a) Conflict with a program, plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities?

Less Than Significant Impact. During construction, vehicles would use the roadways that surround the project sites to deliver materials. Roadway users could experience temporary delays from material deliveries, but these delays would be both brief and infrequent. Therefore, they would not affect overall traffic circulation in the project vicinity. Construction staging would occur on site and would not affect traffic operations on adjacent roadways or impede non-motorized travel or public transportation in the project vicinity. Temporary traffic control (if required) during construction would meet the requirements of the California Manual on Uniform Traffic Control Devices.

The proposed project involves the installation of solar PV canopies at two sites and would not increase student capacity, increase the number of employees, or induce population growth in the surrounding neighborhood. As a result, project operation would not alter existing traffic flow or conditions.

Therefore, construction and operation of the proposed project would not conflict with a program, plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities, and impacts would be less than significant.

- b) Would the project conflict with or be inconsistent with CEQA Guidelines section 15064.3, subdivision (b)?

Less Than Significant Impact. In accordance with Senate Bill (SB) 743, the CEQA Guidelines Section 15064.3, subdivision (b) was adopted in December 2018 by the California Natural Resources Agency. These revisions to the CEQA Guidelines criteria for determining the significance of transportation impacts are primarily focused on projects within transit priority areas and shifts the focus from driver delay to reduction of GHG emissions, creation of multimodal networks, and promotion of a mix of land uses. Vehicle miles traveled, or VMT, is a measure of the total number of miles driven to or from a development and is sometimes expressed as an average per trip or per person.

The newly adopted guidance provides that a lead agency may elect to be governed by the provisions of this section immediately. Beginning on July 1, 2020, the provisions of this section shall apply statewide. The City is currently engaged in this process and has not yet formally adopted its updated transportation significance thresholds or its updated transportation impact analysis procedures. Since the regulations of SB 743 have not been finalized or adopted by the City, the qualitative evaluation presented in Issue 17 (a), above, is used in this IS/MND to determine the significance of transportation impacts.

In addition, according to the new CEQA Guidelines, generally projects within one-half mile of either an existing major transit stop or a stop along an existing high quality transit corridor should be presumed to cause a less than significant transportation impact. The Metropolitan Transit System has a bus stop for Bus Route 235 at the Miramar Transit Center at intersection of Hillery Drive and Westview Parkway, approximately 0.25 mile west of the school sites. As the school sites are located within one-half mile of an existing major transit stop, the project would have a less-than-significant impact related to conflicts or inconsistencies with CEQA Guidelines Section 15064.3.

- c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?

No Impact. No hazardous design features or incompatible uses would be introduced during project operation. Construction equipment would be stored at the project site temporarily during the construction period but would be secured when not in use so as not to pose a hazard to the surrounding community or school operations. If construction traffic control is required, flagging personnel would ensure that traffic congestion or blocked roads do not occur. The project would not alter the design of school access or adjacent roadways. As a result, no impacts would occur.

- d) Result in inadequate emergency access?

Less Than Significant Impact. During the construction period, roadway users, including emergency vehicles, may potentially experience temporary delays on roadways surrounding the school as a result of deliveries of construction materials. Such delays would be infrequent and brief, and the potential reduction in emergency access would not result in conditions that would be substantially different from existing conditions on roadways that surround the project sites. Construction staging would occur within the boundaries of the project sites. Once construction is complete, the proposed project would not change the existing emergency access to the site. Therefore, a reduction in emergency access would not

occur as a result of project operations. As inadequate emergency access would not occur as a result of project construction or operation, impacts would be less than significant.

XVIII. TRIBAL CULTURAL RESOURCES

TRIBAL CULTURAL RESOURCES: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
i) Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k), or	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
ii) A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resources Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

Impact Analysis

- a) Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:
- i. Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k)?
 - ii. A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resources Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe?

Less Than Significant Impact. A Sacred Lands File (SLF) search request was submitted to the California Native American Heritage Commission (NAHC) on September 12, 2019. In the response dated September 24, 2019, the NAHC indicated that a search of the SLF for the project site returned negative results.

Pursuant to AB 52, California Native American tribes that are traditionally and culturally affiliated with the area can request notification of projects in their traditional cultural territory. Jamul Indian Village requested AB 52 consultation with the District on future projects on October 25, 2018. On November 12, 2018, the Jamul Indian Village provided a list of schools to District staff that were determined to be in sensitive areas, which did not include Walker ES or Wangenheim MS. No other California Native American tribes are on the District's consultation list for AB 52. As there are no known sacred sites and no California Native American tribe has indicated interest in Walker ES or Wangenheim MS, impacts are anticipated to be less than significant.

XIX. UTILITIES AND SERVICE SYSTEMS

UTILITIES AND SERVICE SYSTEMS: Would the project:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the relocation or construction of which could cause significant environmental effects?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years from existing entitlements and resources, or are new or expanded entitlements needed?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e) Comply with federal, state, and local management and reduction statutes and regulations related to solid waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the relocation or construction of which could cause significant environmental effects??

No Impact. Construction and operation of the proposed project would not increase student or employee capacity at the two school campuses, nor would it induce population growth in the surrounding neighborhoods. The proposed project would provide renewable energy for an existing school. No water, wastewater treatment, stormwater drainage, natural gas, or telecommunications

facilities would be constructed as part of the project and no existing utilities would need to be relocated. As a result, no impacts would occur.

- b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years from existing entitlements and resources, or are new or expanded entitlements needed?
- c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?

No Impact. Implementation of the proposed project would not increase student or employee capacity or alter existing operations at the two schools. Consequently, the proposed project would not generate wastewater. Impacts would not occur.

- d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?
- e) Comply with federal, state, and local statutes and regulations related to solid waste?

No Impact. Implementation of the proposed project would not increase student or employee capacity or alter existing operations at the two schools. Therefore, solid waste generation would not be greater than what currently exists at the sites during operations. Construction of the proposed project would generate primarily non-recyclable solid waste; however, quantities of solid waste generated would be minimal. All non-recyclable solid waste generated during construction would be taken to a landfill with sufficient permitted capacity. The proposed project would comply with applicable federal, state, and local statutes related to solid waste. As a result, impacts would not occur.

XX. WILDFIRE

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:				
a) Substantially impair an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

	Potentially Significant Impact	Less Than Significant with Mitigation Incorporated	Less Than Significant Impact	No Impact
c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Substantially impair an adopted emergency response plan or emergency evacuation plan?

Less Than Significant Impact. Emergency management services are overseen by the San Diego Fire-Rescue Department. Construction activities that would be reasonably foreseeable with implementation of the proposed project would have the potential to temporarily restrict access for emergency vehicles traveling to the school sites. However, construction would be required to comply with the County of San Diego's Emergency Operations Plan, and it is anticipated that construction would not result in the closure of roadways or other means of emergency access. Installation of the solar PV canopies would not impair or interfere with implementation of adopted emergency response plans or evacuation plans, as operations would occur similar to existing conditions. As such, implementation of the project would not impair an emergency response or evacuation plan, and impacts would be less than significant.

- b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?

No Impact. The City is subject to both wildland and urban fires due to its climate, topography, and native vegetation (City of San Diego 2009). The extended droughts characteristic of the region's Mediterranean climate and increasingly severe dry periods associated with global warming result in large areas of dry native vegetation that provide fuel for wildland fires. State law requires that all local jurisdictions identify VHFHSZs within their areas of responsibility (California Government Code Sections 51175–51189). Inclusion within these zones is based on vegetation density, slope severity, and other relevant factors that contribute to fire severity.

According to the VHFHSZ Maps prepared by the City in collaboration with the California Department of Forestry and Fire Protection, the school sites are not located within a VHFHSZ (City of San Diego 2009). In addition, the proposed project would not increase enrollment or otherwise increase the amount of people within the school sites. As a result, project implementation would not exacerbate wildlife risk. As such, no impacts would occur.

- b) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?

No Impact. The proposed project includes the installation of solar panels on existing paved surfaces. While the solar panels would require annual cleaning and maintenance, such activities would not exacerbate wildfire risk or result in temporary or ongoing impacts to the environment. Operations and maintenance would entail washing of the solar panels approximately one time per year, or as needed to clean the active surface of the panels to optimize energy production. Water usage would vary depending on the operations and maintenance provider to be selected. Some providers utilize no water, while others may use pressure washers or water combined with brushes. Wash water is typically minimized to prevent overland flow. Chemical cleaners are not typically used for washing of the solar panels or associated equipment. Therefore, operation and maintenance of the proposed project would not exacerbate wildfire risk or result in temporary or ongoing impacts to the environment. No impacts would occur.

- c) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?

No Impact. The proposed project would be located on an existing campus. The proposed project would not alter the drainage pattern of the site or generate additional runoff that could result in downslope or downstream flooding or landslides. Therefore, no impacts would occur.

XXI. MANDATORY FINDINGS OF SIGNIFICANCE

MANDATORY FINDINGS OF SIGNIFICANCE:	Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:				
The lead agency shall find that a project may have a significant effect on the environment and thereby require an EIR to be prepared for the project where there is substantial evidence, in light of the whole record, that any of the following conditions may occur. Where prior to commencement of the environmental analysis a project proponent agrees to MMs or project modifications that would avoid any significant effect on the environment or would mitigate the significant environmental effect, a lead agency need not prepare an EIR solely because without mitigation the environmental effects would have been significant (per Section 15065 of the State CEQA Guidelines):				
a) Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

MANDATORY FINDINGS OF SIGNIFICANCE:		Potential Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
Would the project:					
b)	Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are significant when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of past, present and probable future projects)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c)	Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Impact Analysis

- a) Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?

No Impact. As discussed above under Sections IV and V, no adverse impacts to sensitive biological resources would occur and potential impacts to cultural resources would be less than significant. The project sites are developed, and the solar PV canopies would be installed on existing paved surfaces. Due to the developed nature of the project sites, it is not anticipated that tribal cultural resources would be discovered during project implementation. However, unknown tribal cultural resources discovered during construction would be evaluated and protected in compliance with State CEQA Guidelines Section 15064.5(f). There is no sensitive vegetation on site that could provide potentially suitable habitat for federally or state-listed species. Vegetation that occurs near the sites could provide suitable nesting habitat for migratory birds and raptors. However, the proposed project would include implementation of standard operating procedures and/or contractor specifications as identified in Chapter 2, Project Description, to ensure compliance with the MBTA. No federally protected wetlands are present at the project sites, and the proposed project would not interfere with the movement of wildlife and/or wildlife corridors. As such, the project would not result in impacts that would have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory. Therefore, no impacts would occur.

- b) Does the project have impacts that are individually limited, but cumulatively considerable? (“Cumulatively considerable” means that the incremental effects of a project are significant when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of past, present and probable future projects)?

No Impact. The project sites are within primarily developed areas. It is not anticipated that there would be a substantial number of other concurrent projects in the immediate vicinity of the sites such that construction of the proposed project would contribute to a temporary cumulative impact. In addition to the proposed projects at the two sites, the District has completed and is proposing various projects at other District schools. Future proposed projects at District schools would include implementation of standard operating procedures and/or contractor specifications to avoid or minimize potential environmental impacts. As such, the proposed projects at other District sites would not result in impacts that are individually limited, but cumulatively considerable, when viewed in connection with the proposed project. In regard to operation, the proposed project would involve periodic maintenance and would not result in an increase in student or employee capacity, nor would the project result in changes to existing operations. Therefore, there would be no cumulative impacts once the project is constructed and the proposed project would not result in a cumulatively considerable impact.

- c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?

No Impact. The proposed project would involve the installation of solar PV canopies at two existing District-owned sites. Because no new classrooms or academic support facilities would be constructed, the student capacity of the campus and academic-related operations would not be affected. Furthermore, there would be no cumulative impacts associated with the project. As such, the proposed project would not cause substantial adverse effects on human beings.

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