Sacramento Municipal Utility District
Country Acres Solar Project

Final Environmental Impact Report • April 2023

State Clearinghouse #2021110307

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Sacramento Municipal Utility District

Country Acres Solar Project

Final Environmental Impact Report

State Clearinghouse #2021110307

April 2023

Lead Agency:

Sacramento Municipal Utility District
6201 S Street, MS B209
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or

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Acronyms and Abbreviations

AB	Assembly Bill
ACC	Advanced Clean Car Program
ADLS	Asymmetric Digital Subscriber Line
AFB	Air Force Base
ALUC	Airport Land Use Commissions
APE	Area of Potential Effect
APP	Avian Protection Plan
ARB	California Air Resources Board
ASTM	American Society for Testing and Materials
ATV	all-terrain vehicle
BAAQMD	Bay Area Air Quality Management District
BBCS	Bird and Bat Conservation Strategies
BMP	best management practice
BO	biological opinion
Board	Board of Directors
CalEEMod	California Emissions Estimator Model
CARB	California Air Resources Board
Caltrans	California Department of Transportation
CCR	California Code of Regulations
CDFA	California Department of Food and Agriculture
CDFG	California Department of Fish and Game
CDFW	California Department of Fish and Wildlife
CEC5	California Energy Commission
CERS	California Environmental Reporting Systems
CESA	California Endangered Species Act
CEQA	California Environmental Quality Act
CFR	Code of Federal Regulations
CNDDB	California Natural Diversity Database
CRPR	California Rare Plant Rank
CTS	California tiger salamander
CURE	California Unions for Reliable Energy
CV	Central Valley
CWA	Clean Water Act

DHS	Department of Homeland Security
DNH	Determinations of No Hazard
DOD	Department of Defense
DOGGR	California Department of Conservation, Division of Oil, Gas and Geothermal Resources
Draft EIR	draft environmental impact report
EIR	environmental impact report
EPA	U.S. Environmental Protection Agency
ESA	Endangered Species Act
ESAs	environmentally sensitive areas
FAA	Federal Aviation Administration
FDCP	fugitive dust control plan
Final EIR	final environmental impact report
ft	feet
GHG	greenhouse gas
HDD	horizontal directional drilling
HMBP	hazardous materials business plan
HRA	health risk assessment
HSCERP	Hazardous Substance Control and Emergency Response Plan
ITP	incidental take permit
LED	light-emitting diode
LUPC	Land Use Planning Commission
m	meter(s)
MM	Mitigation Measure
MMRP	mitigation monitoring and reporting program
mph	miles per hour
MRT	Mitigation Response Team
MBTA	Migratory Bird Treaty Act
$MTCO_2e$	metric tons of carbon dioxide equivalent
MWh	megawatt hours
NAHC	Native American Heritage Commission
NAS	National Airspace System
NOTAM	Notice to Airmen
NOP	notice of preparation
NO_X	oxides of nitrogen

NPH	Notice of Presumed Hazard
NPDES	National Pollutant Discharge Elimination System
OEHHA	Office of Environmental Health Hazards Assessment
PHEV	plug-in hybrid electric vehicle
OSHA	Occupational Health and Safety Administration
PM	particulate matter
PM_{10}	fine particulate matter
PV	photovoltaic
PRC	Public Resources Code
ROG	reactive organic gases
RWQCB	Regional Water Quality Control Board
SAA	State Aeronautics Act
SCADA	supervisory control and data acquisition
SCEMD	Sacramento County Environmental Management Department
SFB	San Francisco Bay
SMAQMD	Sacramento Metropolitan Air Quality Management District
SMUD	Sacramento Municipal Utility District
SOC	Statement of Overriding Considerations
SOW	Scope of Work
SPCC	Spill Prevention, Control, and Countermeasure
SR	State Route
SWAPE	Soil/Water/Air Protection Enterprise
SWPPP	stormwater pollution prevention plan
SWRCB	State Water Resources Control Board
TAC	Technical Advisory Committee
TCR	tribal cultural resource
the Board	SMUD Board of Directors
UAIC	United Auburn Indian Community of the Auburn Rancheria
USACE	U.S. Army Corps of Engineers
USFWS	U.S. Fish and Wildlife Service
VOC	volatile organic compound
WEAP	worker environmental awareness program
WTG	wind turbine generator
YSAQMD	Yolo-Solano Air Quality Management District
ZEV	Zero-Emission Vehicle

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1 INTRODUCTION

On September 13, 2022, the Sacramento Municipal Utility District (SMUD) released for public review the draft environmental impact report (Draft EIR) for the proposed Country Acres Solar Project (project). SMUD proposes to:

- construct a photovoltaic (PV) solar power and battery storage facility;
- construct interconnection facilities including a generation substation, switch station and interconnection lines;
- operate and maintain solar, battery storage, and interconnection facilities

At the end of the project's life (anticipated to be 30 to 35 years), the project and its assets would be decommissioned; however, SMUD may retain the substation, switching station, and battery storage facilities. Details about the decommissioning process are not known at this time, thus potential impacts from decommissioning cannot be analyzed in the Draft EIR. The project will prepare a decommissioning and reclamation plan prior to decommissioning that will detail the timeline for removal of the improvements and specific measures to return the site to agricultural capability. Additionally, prior to decommissioning, additional CEQA analysis would be performed.

1.1 Public Review and Response to Comments

In accordance with Sections 15087 and 15105 of the State CEQA Guidelines, the Draft EIR was circulated for public review and comment to lead and responsible agencies, as well as members of the public, for 45 days (September 13, 2022, through October 28, 2022). SMUD also held a public meeting on October 13, 2022, to receive comments on the Draft EIR. Written comment letters and oral comments received on the Draft EIR are provided in their entirety in Chapter 2, "Comments and Responses to Comments."

Responses to each of the comments received are provided in this document as part of the final environmental impact report (Final EIR). Although some of the comments have resulted in changes to the text of the Draft EIR (see Chapter 3, "Corrections and Revisions to the Draft EIR"), none of the changes constitute "significant new information," which would require recirculation of the Draft EIR. Significant new information is defined in Section 15088.5(a) of the State CEQA Guidelines as follows:

1. A new significant environmental impact would result from the project or from a new mitigation measure proposed to be implemented.

2. A substantial increase in the severity of an environmental impact would result unless mitigation measures are adopted that reduce the impact to a level of insignificance.

3. A feasible project alternative or mitigation measure considerably different from others previously analyzed would clearly lessen the environmental impacts of the project, but the project's proponents decline to adopt it.

4. The Draft EIR was so fundamentally and basically inadequate and conclusory in nature that meaningful public review and comment were precluded.

None of these circumstances has arisen from comments on the Draft EIR; therefore, recirculation is not required.

The Draft EIR, Final EIR, and associated appendices are available for review online at: https://www.smud.org/CEQA.

As required by State CEQA Guidelines Section 15088(b), SMUD has provided an electronic copy (through SMUD's website; see prior discussion) to each public agency, organization, and individual that submitted written comments on the Draft EIR with written responses to those comments at least 10 days prior to certifying the Final EIR.

1.2 Organization of the Responses to Comments

Chapter 2 of the Final EIR consists of the written comments received on the Draft EIR and presents responses to environmental issues raised in the comments (as required by State CEQA Guidelines Section 15132). The focus of the responses to comments is on the disposition of significant environmental issues that are raised in the comments, as required by Section 15088(c) of the State CEQA Guidelines.

Each comment letter has been reproduced with individual comments bracketed and numbered. Responses to the comments follow each letter. For example, the response to the second comment of the first letter would be indicated as Response to Comment 1-2. In some instances, clarifications of the text of the Draft EIR may be required. In those cases, the text of the Draft EIR is revised and the changes compiled in Chapter 3, "Corrections and Revisions to the Draft EIR." The text deletions are shown in strikeout (~~strikeout~~) and additions are shown in underline (<u>underline</u>).

1.3 Comments that Require Responses

Section 15088(c) of the State CEQA Guidelines specifies that the focus of the responses to comments shall be on the disposition of significant environmental issues. Responses are not required on comments regarding the merits of the project or on issues not related to the project's environmental impacts. Comments on the merits of the proposed project or other comments that do not raise environmental issues will be reviewed by SMUD's Board of Directors (the Board) before an action is taken on the project. The responses address environmental issues and indicate where issues raised are not environmental or address the merits of the project. In the latter instance, no further response is provided.

1.4 Project Decision Process

This document and the Draft EIR together constitute the Final EIR, which will be considered by the Board before a decision on whether to approve the project. If the Board decides to approve the project, it must first certify that the Final EIR was completed in

compliance with CEQA's requirements, was reviewed and considered by the Board, and reflects the Board's independent judgment and analysis, as required by State CEQA Guidelines Section 15090. The Board then would be required to adopt findings of fact on the disposition of each significant environmental impact, as required by State CEQA Guidelines Section 15091. If significant and unavoidable impacts (those that cannot be mitigated to a less-than-significant level) would result from the project and the Board chooses to approve the project, the Board would need to adopt a statement of overriding considerations, pursuant to State CEQA Guidelines Section 15093, explaining the overriding factors that the Board deems important to allow the project to move forward.

The following are important considerations in the Board approval process. SMUD would be required to provide conservation easements or pay in-lieu fees for the conservation of Important Farmland, including Farmland of Statewide Importance and Unique Farmland. However, no new farmland would be made available, and a net loss of Important Farmland in the region would occur. There is no additional feasible mitigation available that would reduce impacts associated with the permanent conversion of agricultural land, including Farmland of Statewide Importance and Unique Farmland, to a less-than-significant level and this impact would remain significant and unavoidable and therefore would require a Statement of Overriding Considerations (SOC). Additionally, implementing air quality mitigation measures would reduce emissions associated with project construction. However, even after implementation of the recommended mitigation measures, the project's construction emissions would exceed applicable thresholds during certain months of construction. Therefore, this short-term construction impact would be significant and unavoidable and would also require inclusion in the SOC from the Board. In the SOC needed for project approval, the SMUD Board states in writing the specific reasons to support its action based on the Final EIR and/or other information in the record. The SOC would be included in the Notice of Determination (California Code of Regulations 15093 (b)) that will be filed with the State Clearinghouse if the project receives approval by the Board. A Mitigation Monitoring and Reporting Program, which is required by CEQA Guidelines Section 15091(d), has been prepared and is included in Chapter 4 of this Final EIR.

1.5 Revisions to the Draft EIR

As discussed in Section 1.1, "Public Review and Response to Comments," above, CEQA requires recirculation of an EIR when the lead agency adds "significant new information" to an EIR, regarding changes to the project description or the environmental setting, after public notice is given of the availability of a draft EIR for public review under State CEQA Guidelines, California Code of Regulations (CCR) Section 15087, but before EIR certification (State CEQA Guidelines CCR Section 15088.5[a]). Recirculation is not required unless the EIR is changed in a way that would deprive the public of the opportunity to comment on significant new information, including a new significant impact in which no feasible mitigation is available to fully mitigate the impact (thus resulting in a significant and unavoidable impact), a substantial increase in the severity of a disclosed environmental impact, or development of a new feasible alternative or mitigation measures that would clearly lessen environmental impacts but that the project proponent

declines to adopt (State CEQA Guidelines CCR Section 15088.5[a]). Recirculation is not required when the new information added to the EIR merely clarifies or amplifies or makes insignificant modifications in an adequate EIR (State CEQA Guidelines CCR Section 15088.5[b]).

All revisions to the Draft EIR were minor and would not change any of the impact conclusion presented in the Draft EIR. Therefore, recirculation of the EIR would not be required.

1.5.1 Tribal Consultation

Assembly Bill (AB) 52 requires that lead agencies undertaking CEQA consult with California Native American Tribes upon the tribes' written request, and evaluate in the EIR the potential for projects to affect tribal cultural resources. Section 3.18, "Tribal Cultural Resources," of the Draft EIR describes the consultation that has occurred between the tribes and SMUD pursuant to AB 52. Specific language requested by the tribes was incorporated in the Draft EIR prior to circulation, and consultation has been completed.

2 COMMENTS AND RESPONSES TO COMMENTS

Letter 1

United States Department of the Interior

FISH AND WILDLIFE SERVICE
Sacramento Fish and Wildlife Office
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Sacramento, California 95825-1846
SFWO_mail@fws.gov

In Reply Refer to:
2022-0037237-S7-001

October 25, 2022

Amy Spitzer
SMUD Environmental Services
P.O. Box 15830 MS H201
Sacramento, California 95852-0830
Amy.Spitzer@smud.org

Subject: Service Comments on the Draft Environmental Impact Report for the SMUD Country Acres Solar Project, Placer County

Dear Amy Spitzer:

This letter is in response to the Sacramento Municipal Utility District's (SMUD) September 13, 2022, *Notice of Availability of a Draft Environmental Impact Report (EIR) for Public Review* for SMUD's Country Acres Solar Project (proposed project). The U.S. Fish and Wildlife Service (Service) thanks you for the opportunity to provide our comments on the Draft EIR. The Service recognizes that eventually a Section 7 consultation under the Endangered Species Act will be conducted with the U.S. Army Corps of Engineers as appropriate. We hope that providing our comments earlier in the process can better facilitate the necessary conversations related to conservation measures for endangered species. 1-1

The proposed project is within the boundary of the Placer County Conservation Plan (PCCP), however, solar development is not a covered activity under the PCCP. Although the proposed project will therefore have to pursue various permits outside of the PCCP, the Service would like to ensure that the proposed project does not prevent the successful implementation of the PCCP's Conservation Strategy. Therefore, we recommend that the applicant for the proposed project coordinate with the Placer Conservation Authority (PCA) to develop conservation measures that are as close to the PCCP's conservation measures as is feasible. We recognize that this coordination has already begun, including meetings attended by the Service on April 27 and 28, 2022, and October 5, 2022, and we appreciate your efforts to be proactive. 1-2

The section of the Draft EIR titled "Impact 3.4-6" (pages 3.4-86–3.4-87) describes how the proposed project will provide compensatory mitigation for sensitive natural communities, waters of the United States, and the burrowing owl and Swainson's hawk (Mitigation Measures 3.4-8, 3.4-10, and 3.14-16), and that this mitigation will be met by paying into the PCCP's in-lieu fee program under a memorandum of understanding signed by SMUD and the PCA. The memorandum of understanding may also include mitigation for the loss of Farmland of Statewide Importance and Unique Farmland, which includes rice fields that the PCCP modeled as habitat for the giant garter snake. Table BR-2 in Appendix B of the Draft EIR further details 1-3

how SMUD believes the proposed project will be as consistent as possible with PCCP requirements.

The Service would like to reiterate our concern that the proposed project may impact the PCA's ability to successfully achieve the goals of the PCCP's Conservation Strategy. SMUD has included Mitigation Measures 3.4-8 and 3.4-10 that provide mitigation fees for impacts to the burrowing owl and Swainson's hawk, but SMUD is not proposing mitigation fees for other Covered Species in the PCCP that have modeled habitat within the proposed project area, such as the federally threatened giant garter snake. Because the PCCP's fees are structured to incorporate the cost of mitigation for all Covered Species, we recommend that the EIR include a mitigation measure committing to paying mitigation fees for each of the PCCP Covered Species that have modeled habitat within the proposed project area.

1-3 (Cont

We are limiting our comments to the scope of the species included in the EIR's mitigation measures at this time. The Service works closely with the PCA on the implementation of the PCCP and we appreciate the work that SMUD has done so far to coordinate with the PCA on a potential memorandum of understanding regarding payment of mitigation fees. We encourage SMUD to continue to incorporate feedback from the PCA on the proposed project design. We look forward to continuing to work with SMUD, the PCA, and other federal and state resource agencies as this project moves forward.

1-4

If you have any questions regarding this letter, please contact Ian Perkins-Taylor, Senior Fish and Wildlife Biologist, by email (ian_perkins-taylor@fws.gov) or by phone at (916) 414-6585, or myself by email (megan_cook@fws.gov), by phone at (916) 414-6492, or at the letterhead address.

Sincerely,

Megan Cook
Sacramento Valley Division Supervisor

Letter 1 Response

Megan Cook, Sacramento Valley Division Supervisor
United States Department of the Interior
October 25, 2022

1-1 Comment noted. No further response is required.

1-2 Commenter acknowledges that the PCCP does not apply to the project. The commenter, however, does request close coordination with the PCA, which has been ongoing since the start of the environmental review, and continues as the project moved into the permitting phase. All measures in the DEIR were developed to be consistent with the PCCP to the greatest extent feasible. Table BR-2 in Appendix BR-1 of the DEIR provides a side-by-side comparison of mitigation measures in this EIR with conservation measures in the PCCP. For additional details, please see Section 3.4.3.2 Consistency with the Placer County Conservation Program on page 3.4-55 of the DEIR.

1-3 As detailed in the DEIR, SMUD conducted a project specific assessment of the project area for giant garter snake, prepared by Eric Hansen, a well-known expert on the species. The assessment determined that it was highly unlikely for the species to occur in the project area, thus the EIR determined that no impact on the species would occur. For the purpose of consistency with the PCCP and at the request of Placer County and the PCA, SMUD included *Mitigation Measure 3.4-5. Conduct Pre-construction surveys for Giant Garter Snake and Implement Avoidance and Minimization Measures* as detailed on page 3.4-62.

As mentioned by the commenter, SMUD is proposing to mitigate for Farmland of Statewide Importance and Unique Farmland. This includes mitigation for all rice fields in the project area that will be impacted by the project. Rice fields are considered “modeled habitat” for the giant garter snake in the PCCP, though SMUD’s modeling of the project area identified no giant garter snake habitat. Nonetheless, it should be noted that mitigation for the loss of these specific types of farmland and the rice fields they support would be in the form of payment of in-lieu fees for land conversion to the PCA. The PCCP specifically allows for mitigation for activities not covered by the plan in Section 8.4.8. This section states that such lands may complement and augment conservation achieved by the plan, if the location and management of the lands is consistent with the HCP/NCCP goals and objectives. Funds paid to the PCA by SMUD in accordance with Section 4.8.4 would thus specifically be available to the PCA to use in advancing the goals of the PCCP. While these fees are not called “mitigation fees for modeled giant garter snake habitat” in the DEIR and such fees not are necessary because no impact to actual giant garter snake habitat will occur, the fees amount to the functional equivalent of compensatory mitigation as they mitigate for the conversion of rice habitat at a one-to-one ratio to the extent that the PCCP makes a blanket determination that all rice fields constitute giant garter snake modeled habitat. As mentioned by the commenter, the payment of land conversion fees provides compensatory mitigation for all covered species. Thus, while the lack of specifically called out compensatory mitigation for giant garter snake modeled habitat might initially appear to be inconsistent with the PCCP, SMUD firmly believes that with

payment of these land conversion fees for the loss of important farmland, the project will not keep the PCCP from achieving its goals.

To clarify the intent of the payment with regards to rice fields, the following has been added to the second paragraph discussing PCCP consistency on page 3.4-86 in the Biological Resources section of the DEIR:

> However, in order to mitigate for project impacts, the project will provide compensatory mitigation as detailed above under sensitive natural communities, wetland and other waters of the United States, and burrowing owl and Swainson's hawk. In addition, as detailed in Mitigation Measure 3.2-1 Preserve Important Farmland on page 3.2-12 in the Agriculture and Forestry section of the DEIR, the project will also mitigate at a 1:1 ratio for the loss of Farmland of Statewide Importance and Unique Farmland, which include all rice fields in the project area. These impacts on aquatic resources; ~~and~~ PCCP covered species and their habitat, and farmland/rice fields in the project area, may be compensated through the payment of land conversion fees into the PCCP's in-lieu fee program consistent with Section 4.8.4 of the PCCP under a Memorandum of Understanding (MOU) with the PCA, as detailed under Mitigation Measures 3.4-8., 3.4-10, and 3.4-16 above, and Mitigation Measure 3.2-1 on page 3.2-12 in the Agriculture and Forestry Resources section of the DEIR. This mitigation includes a functional equivalent of payment for modelled habitat for giant garter snake, as it compensates for the loss of rice fields through payment of land conversion fees. Therefore, the proposed project contributes to the achievement of the goals of the PCCP as if it were paying for the conversion of modelled habitat.
>
> This MOU would include terms and conditions ~~as needed to~~ that would ensure compensatory mitigation for the project does not conflict with the HCP/NCCP's conservation and mitigation strategy and is consistent with Section 8.4.8 of the PCCP which details the specifics of mitigation for activities not covered in the plan. The MOU ~~and~~ would ~~be approved~~ require approval by the PCA board and SMUD prior to issuance of improvement plans. Compensatory mitigation for the project would therefore help achieve the conservation goals of the PCCP, even though the project is not a covered activity and is not required to mitigate for impacts to giant garter snake habitat. Alternatively, in the event that SMUD cannot enter into an MOU with the PCA, the project ~~SMUD~~ may acquire credits from existing mitigation banks within the PCCP Plan Area which are approved by and in good standing with the U.S. Army Corps' Interagency Review Team, and implement other mitigation, as outlined in the mitigation measures above. Under this scenario, SMUD would seek alternative ways of mitigating for the conversion of Farmland of Statewide Importance and Unique Farmland with a strong preference for mitigation located within Placer County, that

include rice conservation for the benefit of species with modeled habitat in the project area, including giant garter snake.

Tricolored blackbird is a PCCP covered species with habitat in the project area. The Draft EIR includes a detailed discussion of tricolored blackbird in Western Placer County and in the project area and acknowledges that foraging habitat and very limited breeding habitat are present. Mitigation Measure 3.4-11 *Conduct Focused Pre-Construction Surveys for Nesting Tricolored Blackbird and Avoid Impacts During Construction* addresses the protection of breeding habitat during project construction. Any loss of foraging habitat for the species (which forages in agricultural fields and grasslands) will be offset through implementation of Mitigation Measures 3.4-8., 3.4-10, and 3.4-16 above and Mitigation Measure 3.2-1 on page 3.2-12 in the Agriculture and Forestry Resources section of the DEIR. This mitigation compensates for the loss of rice fields and grassland (which also provides suitable foraging habitat for burrowing owls and Swainson's hawks) through payment of land conversion fees.

SMUD will continue to work closely with the County, PCA, and resource agencies, including CDFW and USFWS, to ensure that any mitigation is applied in a manner that advances and does not conflict with the goals of the PCCP and is consistent with the provisions of Section 8.4.8 (Mitigation for Activities not covered by the Plan).

1-4 SMUD also appreciates the opportunity to work with the PCA and resource agencies in finding mutually beneficial mitigation options and will continue to do so as the project moves into the permitting phase.

Letter 2

CITY OF ROSEVILLE CALIFORNIA

Development Services Department
Planning Division
311 Vernon Street
Roseville, California 95678-2649

October 25, 20226

Amy Spitzer, Environmental Services Department
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Via: *Email (Page 1 of 2)*

Subject: **SMUD Country Acres Solar Project – DEIR Comments, City of Roseville Comments**

Dear Amy:

The City of Roseville has reviewed the Country Acres Solar Project Draft Environmental Impact Report (DEIR), dated September 2022. We offer the following comments based on the information provided.

1) The DEIR shows a plan to locate the solar panel farm within floodplains. New energy facilities, such as the proposed project, should be resilient to natural hazards. The project design should ensure the facility is flood-damage resistant. 2-1

2) The City of Roseville requests the following text change to the statement below (from second paragraph of Page 3.10-24), "Adding to this problem is an increase in drainage rates from the upper watershed from the cities of Roseville and Rocklin." The City of Roseville requires all modern development to mitigate its development, at the specific plan level, to pre-project conditions. Although this is achieved differently within each specific plan, no specific plan is approved without confirmation that the plan meets the City's drainage requirements. Unless there are specifics that can be cited, we request removing reference to the City of Roseville from this sentence. 2-2

3) The City's preference is that construction and operational vehicle routes be limited to Placer County roadways as shown in the DEIR, which identifies project-related vehicle routes via South Brewer and South Phillip Road. It appears that the site could also be accessed using Blue Oaks Boulevard on the north, and Santucci Boulevard on the south. The City requests that the transportation plan specifically cite that these City roads are not construction or operational routes for the project. 2-3

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Thank you for your consideration of these comments. If you have any questions regarding these comments please contact me at (916)774-5536 or tshirhall@roseville.ca.us.

Sincerely,

Terri Shirhall
Environmental Coordinator

cc: Stefanie Kemen, City of Roseville (skemen@roseville.ca.us)

Letter 2 Response

Terri Shirhall, Environmental Coordinator
City of Roseville
October 25, 2022

2-1 The project has been designed to ensure that the facility is flood-damage resistant. As discussed on page 3.10-44 in the Hydrology and Water Quality section, there is an existing dirt road crossing over the Curry Creek mainstem in the southern portion of the project site, which is below the 100-year water surface elevation based on FEMA floodplain modeling. This crossing may require minor improvements to reinforce the surface of the road to accommodate construction traffic; the project proponent is actively meeting with the County to determine how to specifically improve the crossing to match the existing FEMA model for the area. Any design solution worked out to meet County requirements will become part of the CUP.

Although on-site dirt and gravel access roads would be constructed, these roads would not require crossing the FEMA Regulatory Floodway. Furthermore, these improvements would not require in-channel work and would not affect floodplain hydraulics or impede flood channel flows, as modeled in the hydraulic analysis, because the access roads would not be raised above the FEMA 100-year surface elevation. During the winter rainy season, the access roads to some of the PV arrays may occasionally be temporarily inundated with water; however, project operation would accommodate the occasional periodic, short-term lack of availability of internal access roads to the PV arrays, which would rarely be used. The access roads to the substation, BESS area, switchyards, and project control buildings (in the southern portion of the project site, near Baseline Road) would not be constructed within any type of floodplain. As noted in Chapter 2, “Project Description,” the PV panels would be mounted on driven steel pile foundations, which would provide the necessary anchoring to resist lateral forces generated by the movement of water where the piers would be installed in the floodplain, as required by Section 15.52.170 of the County’s Flood Damage Prevention Ordinance. The PV arrays themselves would be raised above the 100-year flood water surface elevation; only the steel piers holding the PV arrays would be in the floodplain. Each steel pier is small and placement of a number of small piers is not expected to adversely impact floodplain capacity or hydrology. Similarly, placement of these poles is not considered “fill” of jurisdictional wetlands regulated under Section 404 of the Federal Clean Water Act (please see Title 33 Code of Federal Regulations § 323.3 Discharges requiring permits (c) pilings at the following link: https://www.ecfr.gov/current/title-33/chapter-II/part-323/section-323.3). This approach was recently used for SMUD’s Rancho Seco II Solar Project in Sacramento County and the USACE has indicated in a pre-consultation meeting regarding the Country Acres Solar Project that the same approach would be applicable.

2-2 As requested by the City of Roseville, the following paragraph on page 3.10-24 has been edited:

> Flood management for the Curry Creek and Pleasant Grove Creek watersheds is provided by Placer County and the PCFCWCD in the Placer County portions of the watershed, and Reclamation District No. 1000 for the Sutter County sections of the watershed (downstream and west of the project site). The lower watersheds flood regularly with water overtopping of the banks annually in some areas. This problem is caused by several factors that have occurred both locally in the Pleasant Grove and Curry Creek watershed and in the greater Sacramento River watershed. Starting in the early 1900s, levees and dikes were installed to protect landowners and assist farmers. This practice has resulted in a highly channelized and confined stream system, especially in the lower watershed, which has effectively eliminated the natural floodplain. The confined channels cause increased stream stage heights which then typically results in flooding of areas just upstream of bridges that have become undersized with respect to the increased stage heights. Adding to this problem is an increase in drainage rates from the upper watershed of Pleasant Grove and Curry Creek ~~from the cities of Roseville and Rocklin~~. Development typically increases the amount of impervious surfaces, such as roads, parking lots, and roofs, within a watershed. All of these impervious surfaces lead to increased runoff volumes and response times to storm events. The greatest single factor in increased flooding is elevated stage heights in the Sacramento River caused by development throughout the drainage basin. The increased stage heights create a pressure head differential which restricts flood waters that are draining from the watershed from entering the Sacramento River. This causes water to back up through the Natomas Cross Canal, up the Pleasant Grove Creek Canal, and into both Pleasant Grove and Curry Creeks (Foothill Associates 2006:2-39 through 2-42).

2-3 Comment noted. As discussed in Chapter 2, “Project Description,” most of the construction traffic would likely originate from Baseline Road via Highway 99, but may also access the site from the east via Interstate 80 to Watt Avenue to Baseline Road. The project site may also be accessed from South Brewer Road to the west and Phillip Road to the north. However, specifics of the transportation roads are not known at this time. Mitigation Measure 3.17-2. *Prepare and Implement a Construction Transportation Plan* on page 3.17-13 of the Draft EIR has been amended to specifically allow Placer County to share the transportation plan with other interested parties, like the City of Roseville, to accommodate specific exclusions of certain roads, if warranted. The last sentence of that mitigation measure on page 3.17-14 has been revised as follows:

> The construction contractor shall submit the CTP to Placer Country for review and approval 30 days prior to commencing construction activities. Placer County may share the plan with other interested parties at its discretion and incorporate specific input from third parties into the plan comments as it deems appropriate.

Letter 3

State of California – Natural Resources Agency
DEPARTMENT OF FISH AND WILDLIFE
North Central Region
1701 Nimbus Road, Suite A
Rancho Cordova, CA 95670-4599
916-358-2900
www.wildlife.ca.gov

GAVIN NEWSOM, Governor
CHARLTON H. BONHAM, Director

November 1, 2022

Amy Spitzer
SMUD Environmental Services
P.O. Box 15830 MS H201
Sacramento, CA 95852-0830

Dear Ms. Spitzer:

Subject: COUNTRY ACRES SOLAR PROJECT
DRAFT ENVIRONMENTAL IMPACT REPORT (DEIR)
SCH# 2021110307

The California Department of Fish and Wildlife (CDFW) received and reviewed the Notice of Availability of a DEIR from the Sacramento Municipal Utility District (SMUD) for the Country Acres Solar Project (Project) pursuant the California Environmental Quality Act (CEQA) statute and guidelines.[1] CDFW previously submitted comments in response to the Notice of Preparation of the DEIR on December 17, 2021.

Thank you for the opportunity to provide comments and recommendations regarding those activities involved in the Project that may affect California fish, wildlife, native plants, and their habitat. Likewise, we appreciate the opportunity to provide comments regarding those aspects of the Project that CDFW, by law, may need to exercise its own regulatory authority under the Fish and Game Code.

CDFW ROLE

CDFW is California's **Trustee Agency** for fish and wildlife resources, and holds those resources in trust by statute for all the people of the State (Fish & G. Code, §§ 711.7, subd. (a) & 1802; Pub. Resources Code, § 21070; CEQA Guidelines § 15386, subd. (a)). CDFW, in its trustee capacity, has jurisdiction over the conservation, protection, and management of fish, wildlife, native plants, and habitat necessary for biologically sustainable populations of those species. (Fish & G. Code., § 1802.) Similarly for purposes of CEQA, CDFW provides, as available, biological expertise during public agency environmental review efforts, focusing specifically on projects and related activities that have the potential to adversely affect fish and wildlife resources. 3-1

CDFW is also submitting comments as a **Responsible Agency** under CEQA. (Pub. Resources Code, § 21069; CEQA Guidelines, § 15381.) CDFW expects that it may need to exercise regulatory authority as provided by the Fish and Game Code. As proposed, for

[1] CEQA is codified in the California Public Resources Code in section 21000 et seq. The "CEQA Guidelines" are found in Title 14 of the California Code of Regulations, commencing with section 15000.

example, the Project may be subject to CDFW's lake and streambed alteration regulatory authority. (Fish & G. Code, § 1600 et seq.) Likewise, to the extent implementation of the Project as proposed may result in "take" as defined by State law of any species protected under the California Endangered Species Act (CESA) (Fish & G. Code, § 2050 et seq.), SMUD may seek related take authorization as provided by the Fish and Game Code. CDFW also administers the Native Plant Protection Act, Natural Community Conservation Act, and other provisions of the Fish and Game Code that afford protection to California's fish and wildlife resources.

PROJECT DESCRIPTION SUMMARY

The Project site is located on approximately 1,170 acres of land in unincorporated southwestern Placer County just west of the City of Roseville, north of Baseline Road and east of South Brewer Road. Primary access to the Project site would be provided by an entry road from Baseline Road to the south and Phillip Road to the north. The Project site includes grassland, agricultural rice fields, and almond orchards, with scattered seasonal wetlands, including vernal pools. The site also includes several drainages, including segments of upper Curry Creek. 3-1 (Cont.)

The Project consists of the construction and operation of a photovoltaic (PV) solar power and battery storage facility and interconnection facilities, including a generation substation, switch station, and interconnection lines, that would provide new power production capacity of up to 344 megawatts delivered at the point of interconnection with the grid managed by SMUD. In addition, the Project also includes limited grading and vegetation removal and other minor site improvements to facilitate construction. Project construction would take approximately 18 to 24 months and is proposed to begin in spring of 2023. At the end of the Project's useful life (anticipated to be 30 to 35 years), the site would be decommissioned; however, SMUD may retain the substation, switching station, and battery storage facilities.

COMMENTS AND RECOMMENDATIONS

Over the past year, CDFW has participated in multiple coordination meetings with SMUD, the Placer Conservation Authority (PCA), Placer County, and other State and federal regulatory agencies to discuss the Project, including meetings on June 2, 2022, July 19, 2022, and October 5, 2022. Some of the comments below reflect discussions that occurred during those coordination meetings. CDFW offers these comments and recommendations to assist SMUD in adequately identifying and, where appropriate, mitigating the Project's significant, or potentially significant, direct and indirect impacts on fish and wildlife (biological) resources. 3-2

Placer County Conservation Program

The Project is largely located within the Valley Potential Future Growth Area of the Placer County Conservation Program (PCCP), with a 57.79-acre portion of the northern and western Project boundaries falling withing the PCCP Reserve Acquisition Area (RAA).

The PCCP consists of three planning documents published by Placer County: the Western Placer County Habitat Conservation Plan and Natural Community Conservation Plan (HCP/NCCP), the Western Placer County Aquatic Resources Program (CARP), and the Western Placer County In-Lieu Fee Program (ILF). The PCCP was approved and adopted by the Permittees (Placer County, City of Lincoln, South Placer Regional Transportation Authority, Placer County Water Agency, and the PCA) and received corresponding HCP/NCCP permits and incidental take coverage for the fourteen (14) Covered Species from the Wildlife Agencies (CDFW, U.S. Fish and Wildlife Service, and National Marine Fisheries Service). In addition, the Central Valley Regional Water Quality Control Board, U.S. Army Corps of Engineers, and U.S. Environmental Protection Agency are the permitting and oversight agencies for elements of the PCCP subject to the state Porter-Cologne Water Quality Act and the federal Clean Water Act, addressed by the CARP and ILF. Because SMUD is not a Permittee under the PCCP, and municipal power generation is not considered a Covered Activity under the PCCP, SMUD cannot receive coverage under the PCCP's incidental take permits or programmatic wetland permits as a Special Participating Entity.

DEIR Table 3.4-6 identifies the impact acreages to the vegetation communities/land cover types within the Project footprint based on an overlay of 10% design features, and crosswalks those impacts with the corresponding PCCP land cover types. The DEIR proposes Mitigation Measures 3.2-1, 3.4-8, 3.4-10, and 3.4-16 to provide compensatory mitigation for important agricultural lands (Farmland of Local Importance and Unique Farmland), sensitive natural communities, wetlands and other waters of the United States and waters of the State, western burrowing owl (*Athene cunicularia hypugaea*), and Swainson's hawk (*Buteo swainsoni*). These mitigation measures generally state that compensatory mitigation will take place via acquisition of in-kind conservation easements, purchase of mitigation bank credits or other agreements with 3rd party entities to fund acquisition and management of land/easements, or payment of fees to the PCA under a Memorandum of Understanding (MOU). 3-2 (Cont.)

CDFW is concerned with the proposed Project's consistency with the PCCP, including how SMUD will ensure that the Project will not impede the PCCP's ability to meet its biological goals and objectives over the 30–35-year life of the Project. While the DEIR proposes mitigation for some of the impacted PCCP land cover types identified in Table 3.4-6 (impacts include approximately 832 acres of rice fields), the proposed species mitigation measures only address compensatory mitigation for the loss of western burrowing owl nesting and foraging habitat (Mitigation Measure 3.4-8) and Swainson's hawk foraging habitat (Mitigation Measure 3.4-10). CDFW recommends that the final EIR include compensatory mitigation for all PCCP Covered Species modeled habitat that will be permanently impacted by the Project, including giant garter snake (*Thamnophis gigas*). Additionally, CDFW recommends that any compensatory mitigation for impacts to PCCP Covered Species modeled habitat be as consistent as possible with the PCCP conservation strategy. Mitigation lands preserved for this project should also be located within the PCCP RAA.

CDFW encourages SMUD to continue working with the PCA, Placer County, and the State and federal regulatory agencies with permitting authority over the Project to develop a

mitigation strategy that is as consistent as possible with the PCCP's conservation strategy, biological goals and objectives, and conditions on covered activities. 3-2 (Cont.)

CESA Candidate Bumble Bee Species

Project-related activities have the potential to impact habitat of the Crotch's bumble bee (*Bombus crotchii*) and western bumble bee (*Bombus occidentalis occidentalis*), both listed as candidate species under CESA. As candidate species, they receive the same legal protections afforded to endangered or threatened species (Fish and G. Code §§ 2074.2 and 2085). The DEIR does not analyze potential Project impacts to Crotch's and western bumble bee and associated habitats. Without appropriate avoidance and minimization measures for the bumble bees and their habitat, Project-related activities involving ground and vegetation-disturbance could result in significant impacts, including loss of foraging resources, changes in foraging behavior, burrow collapse, nest abandonment, reduced nest success, reduced health and vigor of eggs, young and/or queens, and direct mortality.

Due to the presence of suitable Crotch's and western bumble bee habitat within the Project site, CDFW recommends that the final EIR includes appropriate avoidance, minimization, and mitigation measures that will be implemented during the Project construction and operation. CDFW recommends that prior to vegetation removal and/or grading, a qualified entomologist familiar with the species' behavior and life history conducts surveys to determine the presence/absence of Crotch's and western bumble bee. Surveys should be conducted during flying season when the species are most likely to be detected above ground, between March 1 to September 1 (Thorp et al. 1983). During surveys, the qualified entomologist should flag inactive small mammal burrows and other potential nest sites to reduce the risk of take. Once Project activities begin, the qualified entomologist should continuously monitor potential nest sites and floral resources for Crotch's and western bumble bee activity for the duration of construction. If either species is detected, the qualified entomologist should notify CDFW immediately as further coordination may be required to avoid or mitigate significant impacts. Survey results including negative findings should be submitted to CDFW prior to initiation of Project activities. 3-3

If "take" to Crotch's or western bumble bee cannot be avoided either during Project construction or over the life of the Project, SMUD should consult with CDFW to determine if a CESA incidental take permit is necessary prior to starting any construction activities.

ENVIRONMENTAL DATA

CEQA requires that information developed in environmental impact reports and negative declarations be incorporated into a database which may be used to make subsequent or supplemental environmental determinations (Pub. Resources Code, § 21003, subd. (e)). Accordingly, please report any special-status species and natural communities detected during Project surveys to the California Natural Diversity Database (CNDDB). The CNNDB field survey form can be found at the following link: https://www.wildlife.ca.gov/Data/CNDDB/Submitting-Data. The completed form can be submitted online or mailed electronically to CNDDB at the following email address: CNDDB@wildlife.ca.gov. 3-4

FILING FEES

The Project, as proposed, would have an impact on fish and/or wildlife, and assessment of filing fees is necessary. Fees are payable upon filing of the Notice of Determination by the Lead Agency and serve to help defray the cost of environmental review by CDFW. Payment of the fee is required in order for the underlying project approval to be operative, vested, and final. (Cal. Code Regs, tit. 14, § 753.5; Fish & G. Code, § 711.4; Pub. Resources Code, § 21089.) 3-5

CONCLUSION

Pursuant to Public Resources Code §21092 and §21092.2, CDFW requests written notification of proposed actions and pending decisions regarding the proposed project. Written notifications shall be directed to: California Department of Fish and Wildlife North Central Region, 1701 Nimbus Road, Rancho Cordova, CA 95670 or emailed to R2CEQA@wildlife.ca.gov. 3-6

CDFW appreciates the opportunity to comment on the DEIR to assist in identifying and mitigating Project impacts on biological resources. CDFW personnel are available for consultation regarding biological resources and strategies to minimize and/or mitigate impacts. Questions regarding this letter or further coordination should be directed to Patrick Moeszinger, Senior Environmental Scientist (Specialist) at (916) 767-3935 or patrick.moeszinger@wildlife.ca.gov.

Sincerely,

DocuSigned by:
Kevin Thomas
A2A0A8C574C3445

Kevin Thomas
Regional Manager

ec: Juan Torres, Senior Environmental Scientist (Supervisor)
Patrick Moeszinger, Senior Environmental Scientist (Specialist)
Department of Fish and Wildlife

Office of Planning and Research, State Clearinghouse, Sacramento

REFERENCES

Thorp, R. W., D. S. Horning, Jr., and L. L. Dunning. 1983. Bumble bees and cuckoo bumble bees of California. Bulletin of the California Insect Survey 23: 1-79.

Letter 3 Response

Kevin Thomas, Regional Manager
California Department of Fish and Wildlife
November 1, 2022

3-1 Comment noted. No further response is required.

3-2 SMUD appreciates the frequent coordination with the Department over the past year and looks forward to a continued discussion as the project moves towards implementation.

As stated by the commenter, 57.79 acres of the project site overlap with the PCCP's reserve acquisition area (RAA). While this initially appears to be inconsistent with the goals of the PCCP, the project team has analyzed this area in more detail and determined that this section of RAA is fragmented, occurring south of Phillip Road. Habitat in this location consists of rice fields with ruderal vegetation present along the shoulder of Phillip Road. Coordination with the County and PCA determined that it is possible that this fragmented strip of land was included in the RAA due to its designation as a buffer to a conservation easement for the City of Roseville. The project is a solar project with a 30-35 year lifespan. Should this area be determined crucial for achieving the goals of the PCCP through maintaining the buffer of the City of Roseville's conservation easement, the habitat in this buffer area could be restored to open space as necessary at the end of the solar project's lifespan. As the commenter notes, SMUD has been working closely with the PCA, Placer County, and the state and federal regulatory agencies to ensure that the project, including the overlap into the RAA, is not considered to be in conflict with the goals of the PCCP.

With regard to mitigation for all PCCP covered species, including giant garter snake with modelled habitat in the project area, please see response to USFWS comment 1-3 above for additional detail on how the proposed mitigation measures will compensate for impacts to these species through the payment of land conversion fees consistent with Section 4.8.4 (Mitigation for Activities not Covered by the Plan) of the PCCP. Applying these land conversion fees to the acquisition of lands in the RAA and ensuring the greatest benefits to covered species will ultimately be up to the PCA as the recipients of these funds.

SMUD will continue to work closely with the Department, the USFWS and the PCA to avoid conflict with the goals of the PCCP.

3-3 Potential suitable habitat for Crotch's and western bumble bee in the project area is limited to natural vegetation, namely the annual grassland interspersed with vernal pools in the northwestern corner of the project area. Only a small area of this habitat will be used by the project and the impact footprint within this habitat is currently being refined as 30% design drawings are developed and will likely further decrease. The likelihood of either of these species occurring within the project area is very low. Crotch's bumble bee was historically common in the Central Valley of California; however, it now appears to be absent from most of it, especially in the center of its historic range where the project

area falls. Additionally, the project area does not fall within the 2002 to 2012 projected extent of occurrence for western bumble bee (Xerces Society 2018). Further, the decline of these species is largely attributed to the habitat loss resulting from conversion of grasslands and prairies to agricultural lands (Xerces Society 2018). Most of the project area is currently in use for agricultural purposes, with limited natural landscape remaining in small fragments. The natural landscape that could be suitable habitat for these species within the project area is scarce and surrounded by agricultural lands, making the remaining suitable habitat isolated from any potential nearby habitat. The greatly diminished range of this species in combination with the lack of suitable habitat makes occurrence of this species within the project area unlikely.

Please note that any grassland converted by the project would be compensated for, as the grassland serves as suitable foraging habitat for Swainson's hawk. As detailed in Mitigation Measure 3.4-10. *Compensate for the Loss of Swainson's Hawk Foraging Habitat,* SMUD will provide compensatory mitigation for loss of Swainson's hawk foraging habitat. Where this mitigation will occur in the form of annual grassland, it will also benefit native bumble bees and other pollinators. Furthermore, the project proposes grazing and native pollinator habitat in the extensive area to be covered by solar panels (currently mostly covered by rice). The presence of additional grazing and native pollinator habitat will largely increase the suitability of the project site for Crotch's and western bumble bee and other native pollinators compared to current conditions (i.e., rice fields). These changes should provide a net increase to the amount of habitat useable by native bumble bees. SMUD will continue to coordinate closely with the Department to ensure the project does not result in adverse impacts on Crotch's and western bumble bee.

3-4 Any special-status species found during project specific surveys will be reported to the California Natural Diversity Database.

3-5 SMUD will pay all applicable fees at the time of filing of the Notice of Determination for the EIR.

3-6 SMUD will notify CDFW of proposed actions and pending decisions and will continue to work closely with CDFW as the project moves into permitting. SMUD appreciates the Department's support.

Pacific Gas and Electric Company

Plan Review Team
Land Management

PGEPlan **Letter 4**

September 20, 2022

Amy Spitzer
SMUD
6201 S Street, Mail Stop B209
Sacramento, CA 95817

Ref: Gas and Electric Transmission and Distribution

Dear Amy Spitzer,

Thank you for submitting the SCH#2021110307 plans for our review. PG&E will review the submitted plans in relationship to any existing Gas and Electric facilities within the project area. If the proposed project is adjacent/or within PG&E owned property and/or easements, we will be working with you to ensure compatible uses and activities near our facilities.

Attached you will find information and requirements as it relates to Gas facilities (Attachment 1) and Electric facilities (Attachment 2). Please review these in detail, as it is critical to ensure your safety and to protect PG&E's facilities and its existing rights.

Below is additional information for your review:

1. This plan review process does not replace the application process for PG&E gas or electric service your project may require. For these requests, please continue to work with PG&E Service Planning: https://www.pge.com/en_US/business/services/building-and-renovation/overview/overview.page.

2. If the project being submitted is part of a larger project, please include the entire scope of your project, and not just a portion of it. PG&E's facilities are to be incorporated within any CEQA document. PG&E needs to verify that the CEQA document will identify any required future PG&E services.

3. An engineering deposit may be required to review plans for a project depending on the size, scope, and location of the project and as it relates to any rearrangement or new installation of PG&E facilities.

4-1

Any proposed uses within the PG&E fee strip and/or easement, may include a California Public Utility Commission (CPUC) Section 851 filing. This requires the CPUC to render approval for a conveyance of rights for specific uses on PG&E's fee strip or easement. PG&E will advise if the necessity to incorporate a CPUC Section 851filing is required.

This letter does not constitute PG&E's consent to use any portion of its easement for any purpose not previously conveyed. PG&E will provide a project specific response as required.

Sincerely,

Plan Review Team
Land Management

Pacific Gas and Electric Company

Attachment 1 – Gas Facilities

There could be gas transmission pipelines in this area which would be considered critical facilities for PG&E and a high priority subsurface installation under California law. Care must be taken to ensure safety and accessibility. So, please ensure that if PG&E approves work near gas transmission pipelines it is done in adherence with the below stipulations. Additionally, the following link provides additional information regarding legal requirements under California excavation laws: https://www.usanorth811.org/images/pdfs/CA-LAW-2018.pdf

1. Standby Inspection: A PG&E Gas Transmission Standby Inspector must be present during any demolition or construction activity that comes within 10 feet of the gas pipeline. This includes all grading, trenching, substructure depth verifications (potholes), asphalt or concrete demolition/removal, removal of trees, signs, light poles, etc. This inspection can be coordinated through the Underground Service Alert (USA) service at 811. A minimum notice of 48 hours is required. Ensure the USA markings and notifications are maintained throughout the duration of your work.

2. Access: At any time, PG&E may need to access, excavate, and perform work on the gas pipeline. Any construction equipment, materials, or spoils may need to be removed upon notice. Any temporary construction fencing installed within PG&E's easement would also need to be capable of being removed at any time upon notice. Any plans to cut temporary slopes exceeding a 1:4 grade within 10 feet of a gas transmission pipeline need to be approved by PG&E Pipeline Services in writing PRIOR to performing the work.

3. Wheel Loads: To prevent damage to the buried gas pipeline, there are weight limits that must be enforced whenever any equipment gets within 10 feet of traversing the pipe.

Ensure a list of the axle weights of all equipment being used is available for PG&E's Standby Inspector. To confirm the depth of cover, the pipeline may need to be potholed by hand in a few areas.

Due to the complex variability of tracked equipment, vibratory compaction equipment, and cranes, PG&E must evaluate those items on a case-by-case basis prior to use over the gas pipeline (provide a list of any proposed equipment of this type noting model numbers and specific attachments).

No equipment may be set up over the gas pipeline while operating. Ensure crane outriggers are at least 10 feet from the centerline of the gas pipeline. Transport trucks must not be parked over the gas pipeline while being loaded or unloaded.

4. Grading: PG&E requires a minimum of 36 inches of cover over gas pipelines (or existing grade if less) and a maximum of 7 feet of cover at all locations. The graded surface cannot exceed a cross slope of 1:4.

5. Excavating: Any digging within 2 feet of a gas pipeline must be dug by hand. Note that while the minimum clearance is only 12 inches, any excavation work within 24 inches of the edge of a pipeline must be done with hand tools. So to avoid having to dig a trench entirely with hand tools, the edge of the trench must be over 24 inches away. (Doing the math for a 24 inch

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wide trench being dug along a 36 inch pipeline, the centerline of the trench would need to be at least 54 inches [24/2 + 24 + 36/2 = 54] away, or be entirely dug by hand.)

Water jetting to assist vacuum excavating must be limited to 1000 psig and directed at a 40° angle to the pipe. All pile driving must be kept a minimum of 3 feet away.

Any plans to expose and support a PG&E gas transmission pipeline across an open excavation need to be approved by PG&E Pipeline Services in writing PRIOR to performing the work.

6. Boring/Trenchless Installations: PG&E Pipeline Services must review and approve all plans to bore across or parallel to (within 10 feet) a gas transmission pipeline. There are stringent criteria to pothole the gas transmission facility at regular intervals for all parallel bore installations.

For bore paths that cross gas transmission pipelines perpendicularly, the pipeline must be potholed a minimum of 2 feet in the horizontal direction of the bore path and a minimum of 12 inches in the vertical direction from the bottom of the pipe with minimum clearances measured from the edge of the pipe in both directions. Standby personnel must watch the locator trace (and every ream pass) the path of the bore as it approaches the pipeline and visually monitor the pothole (with the exposed transmission pipe) as the bore traverses the pipeline to ensure adequate clearance with the pipeline. The pothole width must account for the inaccuracy of the locating equipment.

4-2 (Cont.)

7. Substructures: All utility crossings of a gas pipeline should be made as close to perpendicular as feasible (90° +/- 15°). All utility lines crossing the gas pipeline must have a minimum of 12 inches of separation from the gas pipeline. Parallel utilities, pole bases, water line 'kicker blocks', storm drain inlets, water meters, valves, back pressure devices or other utility substructures are not allowed in the PG&E gas pipeline easement.

If previously retired PG&E facilities are in conflict with proposed substructures, PG&E must verify they are safe prior to removal. This includes verification testing of the contents of the facilities, as well as environmental testing of the coating and internal surfaces. Timelines for PG&E completion of this verification will vary depending on the type and location of facilities in conflict.

8. Structures: No structures are to be built within the PG&E gas pipeline easement. This includes buildings, retaining walls, fences, decks, patios, carports, septic tanks, storage sheds, tanks, loading ramps, or any structure that could limit PG&E's ability to access its facilities.

9. Fencing: Permanent fencing is not allowed within PG&E easements except for perpendicular crossings which must include a 16 foot wide gate for vehicular access. Gates will be secured with PG&E corporation locks.

10. Landscaping: Landscaping must be designed to allow PG&E to access the pipeline for maintenance and not interfere with pipeline coatings or other cathodic protection systems. No trees, shrubs, brush, vines, and other vegetation may be planted within the easement area. Only those plants, ground covers, grasses, flowers, and low-growing plants that grow unsupported to a maximum of four feet (4') in height at maturity may be planted within the easement area.

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11. Cathodic Protection: PG&E pipelines are protected from corrosion with an "Impressed Current" cathodic protection system. Any proposed facilities, such as metal conduit, pipes, service lines, ground rods, anodes, wires, etc. that might affect the pipeline cathodic protection system must be reviewed and approved by PG&E Corrosion Engineering.

12. Pipeline Marker Signs: PG&E needs to maintain pipeline marker signs for gas transmission pipelines in order to ensure public awareness of the presence of the pipelines. With prior written approval from PG&E Pipeline Services, an existing PG&E pipeline marker sign that is in direct conflict with proposed developments may be temporarily relocated to accommodate construction work. The pipeline marker must be moved back once construction is complete.

13. PG&E is also the provider of distribution facilities throughout many of the areas within the state of California. Therefore, any plans that impact PG&E's facilities must be reviewed and approved by PG&E to ensure that no impact occurs which may endanger the safe operation of its facilities.

4-2 (Cont.)

Pacific Gas and Electric Company

Attachment 2 – Electric Facilities

It is PG&E's policy to permit certain uses on a case by case basis within its electric transmission fee strip(s) and/or easement(s) provided such uses and manner in which they are exercised, will not interfere with PG&E's rights or endanger its facilities. Some examples/restrictions are as follows:

1. Buildings and Other Structures: No buildings or other structures including the foot print and eave of any buildings, swimming pools, wells or similar structures will be permitted within fee strip(s) and/or easement(s) areas. PG&E's transmission easement shall be designated on subdivision/parcel maps as "**RESTRICTED USE AREA – NO BUILDING.**"

2. Grading: Cuts, trenches or excavations may not be made within 25 feet of our towers. Developers must submit grading plans and site development plans (including geotechnical reports if applicable), signed and dated, for PG&E's review. PG&E engineers must review grade changes in the vicinity of our towers. No fills will be allowed which would impair ground-to-conductor clearances. Towers shall not be left on mounds without adequate road access to base of tower or structure.

3. Fences: Walls, fences, and other structures must be installed at locations that do not affect the safe operation of PG&'s facilities. Heavy equipment access to our facilities must be maintained at all times. Metal fences are to be grounded to PG&E specifications. No wall, fence or other like structure is to be installed within 10 feet of tower footings and unrestricted access must be maintained from a tower structure to the nearest street. Walls, fences and other structures proposed along or within the fee strip(s) and/or easement(s) will require PG&E review; submit plans to PG&E Centralized Review Team for review and comment.

4-3

4. Landscaping: Vegetation may be allowed; subject to review of plans. On overhead electric transmission fee strip(s) and/or easement(s), trees and shrubs are limited to those varieties that do not exceed 10 feet in height at maturity. PG&E must have access to its facilities at all times, including access by heavy equipment. No planting is to occur within the footprint of the tower legs. Greenbelts are encouraged.

5. Reservoirs, Sumps, Drainage Basins, and Ponds: Prohibited within PG&E's fee strip(s) and/or easement(s) for electric transmission lines.

6. Automobile Parking: Short term parking of movable passenger vehicles and light trucks (pickups, vans, etc.) is allowed. The lighting within these parking areas will need to be reviewed by PG&E; approval will be on a case by case basis. Heavy equipment access to PG&E facilities is to be maintained at all times. Parking is to clear PG&E structures by at least 10 feet. Protection of PG&E facilities from vehicular traffic is to be provided at developer's expense AND to PG&E specifications. Blocked-up vehicles are not allowed. Carports, canopies, or awnings are not allowed.

7. Storage of Flammable, Explosive or Corrosive Materials: There shall be no storage of fuel or combustibles and no fueling of vehicles within PG&E's easement. No trash bins or incinerators are allowed.

Pacific Gas and Electric Company

8. Streets and Roads: Access to facilities must be maintained at all times. Street lights may be allowed in the fee strip(s) and/or easement(s) but in all cases must be reviewed by PG&E for proper clearance. Roads and utilities should cross the transmission easement as nearly at right angles as possible. Road intersections will not be allowed within the transmission easement.

9. Pipelines: Pipelines may be allowed provided crossings are held to a minimum and to be as nearly perpendicular as possible. Pipelines within 25 feet of PG&E structures require review by PG&E. Sprinklers systems may be allowed; subject to review. Leach fields and septic tanks are not allowed. Construction plans must be submitted to PG&E for review and approval prior to the commencement of any construction.

10. Signs: Signs are not allowed except in rare cases subject to individual review by PG&E.

11. Recreation Areas: Playgrounds, parks, tennis courts, basketball courts, barbecue and light trucks (pickups, vans, etc.) may be allowed; subject to review of plans. Heavy equipment access to PG&E facilities is to be maintained at all times. Parking is to clear PG&E structures by at least 10 feet. Protection of PG&E facilities from vehicular traffic is to be provided at developer's expense AND to PG&E specifications.

12. Construction Activity: Since construction activity will take place near PG&E's overhead electric lines, please be advised it is the contractor's responsibility to be aware of, and observe the minimum clearances for both workers and equipment operating near high voltage electric lines set out in the High-Voltage Electrical Safety Orders of the California Division of Industrial Safety (https://www.dir.ca.gov/Title8/sb5g2.html), as well as any other safety regulations. Contractors shall comply with California Public Utilities Commission General Order 95 (http://www.cpuc.ca.gov/gos/GO95/go_95_startup_page.html) and all other safety rules. No construction may occur within 25 feet of PG&E's towers. All excavation activities may only commence after 811 protocols has been followed.

Contractor shall ensure the protection of PG&E's towers and poles from vehicular damage by (installing protective barriers) Plans for protection barriers must be approved by PG&E prior to construction.

13. PG&E is also the owner of distribution facilities throughout many of the areas within the state of California. Therefore, any plans that impact PG&E's facilities must be reviewed and approved by PG&E to ensure that no impact occurs that may endanger the safe and reliable operation of its facilities.

4-3 (Cont.)

Letter 4 Response

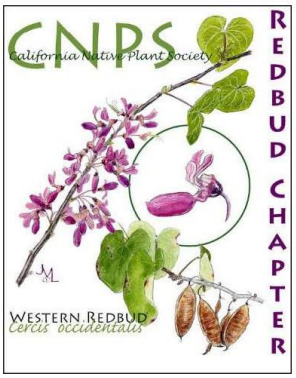
SMUD
Plan Review Team–Land Management
September 20, 2022

4-1 Comment noted. SMUD will coordinate with PG&E regarding any PG&E owned property and/or easements to ensure compatible uses and activities near PG&E's facilities.

4-2 Comment noted. SMUD will coordinate with PG&E regarding gas transmission pipelines and/or facilities in the area.

4-3 Comment noted. SMUD will coordinate with PG&E regarding any PG&E owned property and/or easements to ensure compatible uses and activities near PG&E's electric facilities.

Letter 5



Redbud Chapter
California Native Plant Society
Serving Placer and Nevada Counties
P.O. Box 266, Nevada City CA 95959
https://chapters.cnps.org/redbud/

October 26, 2022

Amy Spitzer
SMUD Environmental Services
P.O. Box 15830 MSH 201
Sacramento, CA 95852-0830

Submitted vis email to: Amy.spitzer@smud.org

Re: Response to DEIR for Proposed County Acres Solar Project

Dear Ms. Spitzer,

The California Native Plant Society is a Statewide non-profit organization seeking to preserve our state's unique botanical heritage, conserve special status plant species and sensitive natural communities, and increase understanding and appreciation of California's native plants. Thank you for the opportunity to comment on the Draft Environmental Impacts Report for SMUD's County Acres Solar Project (CASP). 5-1

Our comments raise several concerns and questions about gaps in the DEIR that must be addressed.

First, the surveys of plants conducted for the CASP do not meet the standards of the California Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations in several respects, including the absence of a complete list of all plants and natural communities detected in the project area, which makes it impossible to determine if special status plants were not correctly identified. 5-2 In addition, the plant surveys that were conducted failed to search for several special status plants on the premise that there were no nearby populations of such plants. 5-3

In fact, there is documentation of three such species within the past year that was not available to the surveyors. Finally, none of the surveys were conducted at times when these special status species (and others) would be both evident and identifiable. 5-3 (Cont.)

Further, the DEIR does not address the destruction of carbon-sequestering grasslands, or the cumulative impacts of habitat loss resulting from this project. 5-4

As stated in the California Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations, promulgated by the California Natural Resources Agency, Department of Fish and Wildlife, "The conservation of special status native plants and their habitats, as well as sensitive natural communities, is integral to maintaining biological diversity."

To this end, California's Plant Survey Protocols include requirements for surveying and evaluating impacts to plants and plant communities, including standards for botanical field surveys. Under these standards, field surveys must identify every plant taxon occurring in the area to the taxonomic level necessary to determine rarity and listing status. "More than one field visit is usually necessary to adequately capture the floristic diversity of a project area."

The field survey for the SMUD project does not appear to have the required list of "all plants and natural communities detected in the project area" and does not reflect multiple field visits. In fact, field surveys are required to be conducted "at the times of year when plants will be both evident and identifiable" which is usually during flowering or fruiting. As noted below, no surveys were done when certain special status plants were likely to be "evident and identifiable." 5-5

Because no floristic plant list is provided, no review of plants possibly misidentified can be conducted. Several taxa are likely to have been misidentified at the time of survey particularly those with long blooming periods for which localized blooming times may have been outside the time at which surveys were conducted. Navarretia, Juncus, Gratiola, and Brodiaea can be very difficult to identify. With no floristic survey list, we can't be sure that other plants in these genera were indeed found and then possibly misidentified.

The DEIR for the CASP found no evidence of rare or threatened plants within a 10-mile radius of the 1,180 acre project site. The Biological Resources Report, Appendix B to the DEIR, states that the "Amount of habitat present on site is not significant to support an ongoing population of this species [*Hibiscus lasiocarpus var. occidentalis*]."

Hibiscus lasiocarpus ssp. occidentalis is a California Rare Plant ranked 1B.2 (Rare and moderately threatened in California with 20 to 80% of occurrences threatened / moderate degree and immediacy of threat). In September, 2022, two populations of this species were found at 38.862782,-121.294561 and 38.878615,-121.284028, respectively, within approximately 8 miles of the project site.

A voucher specimen was collected at the first location and documentation on CNDDB is forthcoming. The habitat where these two occurrences were found is profoundly human-impacted. The habitat is marginal and small. Yet, healthy populations survive.

Further, another listed species has been documented within 10 miles of the project site in the past year but has not yet been collected or added to the CNDDB. *Chloropyron molle ssp. hispidus* is a California Rare Plant ranked 1B.1 (Rare and seriously threatened in California with over 80% of occurrences threatened / high degree and immediacy of threat) .

The reasons given for not surveying for these species in the project area are not well supported and those surveys that were conducted were completed well before these species would be evident and identifiable. The surveys conducted do not meet protocol requirements for accurately determining whether these species do occur at the project site. We recommend the appropriate habitat for these species be resurveyed when they are blooming locally: the *Chloropyron* in July through August and the *Hibiscus* in September.

5-5 (Cont.)

We look forward to receiving your responses to our comments.

Sincerely,

Shane Hanofee
President, Redbud Chapter
Redbudchapter@gmail.com

Leslie Warren and Jeanne Wilson
Co-Chairs, Conservation Advocacy Committee for Redbud Chapter
Redbudchapter@gmail.com

Letter 5 Response	Shane Hanofee Redbud Chapter October 26, 2022

5-1 Comment noted. No further response is necessary.

5-2 It is unclear which survey report the commenter is referring to. The rare plant survey report prepared for the Country Acres Solar Project was not included in the DEIR. The biological resources section summarizes the results of the survey, and also includes a discussion by species as to why four of the six species originally identified as potentially occurring in the project area would not be impacted by the project (the project avoids all vernal pool and seasonal wetland habitat plus a 250-foot buffer). The survey conducted in support of the project followed CDFW protocols, and includes maps of the survey area, detailed reasoning of why specific target species were included or excluded, methods and results, a list of all taxa observed, and representative photographs. The survey was conducted by qualified botanists at a time of year (early May 2022) when the two target species (dwarf downingia and Sanford's arrowhead) would have been present and identifiable. As identified in Table 3.4-4 Special Status Plants with Potential to occur in the SMUD Country Acres Solar Project Area, the blooming period of dwarf downingia extends from March to May. Dwarf downingia was included in the target species because in addition to vernal pools (which will not be impacted by the project) it can occur in mesic areas which are present in limited areas of the project site. Sanford's arrowhead blooms from May through October, and would have been identifiable during the survey, both by its flowers, and by its characteristic leaves. In comment 5-4 the commenters mention the biological resources report in the DEIR and the dismissal of *Hibiscus lasioc*arpus. Appendix B of the DEIR includes biological resources related material, including a table of all special-status plant surveys with potential to occur. The table states that Hibiscus had not been documented within 10 miles of the project area. This statement is true for the time of publication of the DEIR. The commenters mention that the species has since been documented within 8 miles of the project area. We encourage the commenter to submit these data to the CNDDB so it will come up in future database searches for the area. Suitable habitat for *Hibiscus lasiocarpus* in the project area would occur in the marshy areas and along drainages in the project area. These areas will either be avoided by the project (marshes), or were surveyed for special-status plants (drainages) as they also provide suitable habitat for Sanford's arrowhead. Although the botanical surveys did not coincide with the blooming period of *Hibiscus lasiocarpus*, the shrub is easily identifiable outside of its blooming period due to visible characteristic features. No hibiscus shrubs were identified on the project site and their occurrence is unlikely. No further surveys are warranted.

5-3 Please also note that SMUD has been coordinating closely with the California Department of Fish and Wildlife on the biological resources analysis conducted in support of the DEIR and project permitting and consistency with the PCCP. The Department has not expressed any concerns about SMUD's approach to special-status plant impact analysis, or any of the species-specific surveys conducted in support of the project.

5-4 The commenter provides no basis for their claim that the project would result in destruction of carbon-sequestering grasslands. The loss of grassland resulting from the proposed project will be mitigated through the mitigation of Swainson's hawk foraging habitat. Furthermore, as stated in the Project Description of the DEIR, all areas under the solar panels will be re-vegetated with native grasses and pollinator habitat, which will allow the land to continue providing carbon sequestration functions.

With regard to the commenter's concern regarding cumulative impacts, please refer to Chapter 4 of the DEIR which discusses cumulative impacts, as mandated by CEQA.

5-5 See response to comment 5-2 above regarding specifics of the special-status plant survey conducted for the Project and the discussion of the potential for *Hibiscus lasiocarpus* to occur in the Project area. The special-status plant survey conducted for the project meets all regulatory requirements. No further revisions to the biological resources section are necessary and no further special-status plant surveys are needed at this time.

Letter 6

Alliance for Environmental Leadership

October 26, , 2022

SMUD Environmental Services
P.O. Box 15830 MSH 201
Sacramento, CA 95852-0830
Attn: Amy Spitzer

Subject: County Acres Solar Project

Dear Ms. Spitzer,

The Alliance for Environmental Leadership (AEL) appreciates the opportunity to submit comments on the DEIR for the SMUD Community Acres Solar Project. We are an alliance of 16 environmental and civic organizations, several of which contributed content to this letter.*

What are the heat island effects of the project? How will these effects be mitigated? To what degree does the heat island effect contribute to warming in the mountains and loss of Sierra snowpack? What is the environmental and economic impact to Placer County's tourism-economy of waste heating in the short and long term? What alternative site development concepts would reduce heat island impacts? 6-1

While the CASP will provide carbon zero electricity to 80,000 homes, how much CO2 will be generated in the fabrication, installation and servicing of the project? How much CO2 sequestration value will be lost with the elimination of 1.176 acres of carbon sequestering habitat? Please break this out in a manner to facilitate analysis. For instance - identity cradle to grave carbon sources from making and transport of concrete foundation material to excavation of metals necessary for panel fabrication, to access road construction, VMT during construction and including materials transport from global sites, and materials, construction, etc. We are seeking information to ascertain if, when all inputs necessary for development are counted and grassland ecosystem services are recognized, if, there is, in fact, a net CO2 benefit and what that is. 6-2

What ecosystem services (carbon sequestration, flood control, drought mitigation, species habitat etc.) does the site currently provide? Please describe what life forms will survive and 6-3

6-3 (Cont.)

what ecosystem services will be present after project completion. To what extent does the functioning grassland ecosystem function better for carbon sequestration than the solar farm? What is the total annual ecosystem service capacity of the site for carbon sequestration? What is the anticipated loss of carbon sequestration services from the site over the life of CASP and what is the net carbon benefit with the CASP? . Please compare this to solar farm generation predictions and create a net value considering not only flora, but water sequestration, the loss of ecosystem services necessary for all species (avian, mammal, amphibian etc.) that utilize the site permanently or as migrant visitors. Does SMUD have a caretaking obligation for habitat that is critical to the survival of non-human species - flora and fauna? 6-4

Innovative technology and disruptive technologies can alter a society in a matter of a very few years. An example is how horses and buggies were displaced by automobiles in San Francisco in just 10 years. To what extent are new energy generation technologies anticipated to "disrupt" the need for vast solar farms in the near future? 6-5

Grasslands are among the most vulnerable ecosystems in the world. Over the last decade, millions of acres of grasslands have been lost to development, wildfire, fragmentation and other threats. While forests mostly store carbon in woody biomass and leaves, grasslands sequester most of their carbon in their roots underground. That makes grasslands a more reliable carbon sink than forests, which release their sequestered carbon back into the atmosphere when logged or when affected by wildfire. Globally, grasses sequester 3 gigatonnes of carbon per year - equivalent to reducing atmospheric CO2 by 50 ppm over 50 years. Soil carbon makes up approximately 81% of total ecosystem carbon found in grasslands. How much soil carbon and below ground biomass sequestered carbon will be lost during each phase of the CASP and over the lifetime of the project? By extension, how does this carbon sequestration value compare to the CO2 offsets anticipated with the CASP project. What is the "net" benefit of the CASP project if CO2 generation in all phases of project development and CO2 offsets are measured? 6-6

What policy guidance does the Governor's Climate Action Strategy provide for soil-carbon conservation? How much soil sequestered carbon will be emitted into the environment during the construction phase? 6-7

How will the CASP affect achievement of revenue goals necessary to implement PCCP? Will SMUD meet PCCP mitigation ratios? 6-8

A 2007 Jones and Stokes report, prepared for the County of Placer, identified the area of the CASP as the winter home to the densest and most diverse raptor population in North America. The DEIR fails to address how cumulative losses of grassland will affect these bird species 6-9

whose populations are in precipitous decline. Grassland bird populations are declining at the highest rate of all avian species due to habitat loss. What is the current status of grassland bird populations and what members of this community depend upon the project site for survival? Grassland sites are highly productive for wildlife because they act as insect nurseries and provide food necessary for all trophic level residents. What impacts will the project have on the precipitous decline of insect population? 2 6-9 (Cont.)

With the approval of the Sunset Area Plan, the County of Placer has approved a massive urban development scheme for West Placer. What is the total acreage of Placer County grassland that has been and will be converted to urban uses since 1970? 6-10

How will conversion of this site to CASP affect the Federally-listed and special status species including: 6-11

- Swainson's hawk
- Western burrowing owl
- Tricolored black bird
- California black rail
- Vernal Pool branchiopods
- Valley elderberry longhorn beetle
- Western pond turtle
- Giant garter snake
- Western spadefoot
- Loggerhead shrike
- Bat species
- Dwarf downingia
- Boggs lake hedge-hyssop
- Sanford's arrowhead
- Other listed and non-listed species of special concern and migratory bird species

The Project area comprises a significant amount of active and inactive rice fields which also support vernal pool grasslands, and other natural and semi-natural lands. The rice fields include irrigated wetlands, the vernal pool grasslands include vernal pools, seasonal wetlands, and other waters. All of which provide habitat to listed and non-listed species. How is this project consistent with the Governor's Agricultural Lands Conservation Policy? Please describe how conversion of irrigated farmland to CASP meets the intention of this Policy. 6-12

What is the extent of wetland loss anticipated in the project? To what extent are these wetlands Vernal Pools? Over 95% of CA's historical vernal pool complexes are destroyed due to land conversion. As these remaining pools may be strongholds of genetic information, resources for drought adaptation strategies and stress, is SMUD utilizing best management practices in destroying them? Vernal Pool's shallow depressions contain unique soil, microbes and species unique in the world. They are essentially our own Galapagos Islands - only in reverse. What important secrets lie within these age-old biological libraries? Should they not be preserved because of the special status of species that depend upon them for survival? Is the project consistent with State policy for avoidance? What will this project contribute to cumulative Statewide yearly loss of vernal pool wetland?

3 6-13

What water quality and hydrologic impacts will the project have to Curry Creek and surrounding watersheds? What impacts will soil compaction and loss of plant life have on the grasslands natural ability to capture, filter and acclimate rainwater before it enters larger aquatic systems? What are the downstream flood implications? Please analyze all aspects of the change to plant cover, root systems, production and composition and the elimination of organisms living in the soil and the impact - direct and indirect on the downstream watersheds.

6-14

The State of CA's Essential Wildlife Connectivity Project identifies blocs of intact habitat that need to be maintained as corridors for wildlife. At least two of these corridors are on or proximate to the SMUD CARP site. How will SMUD accommodate wildlife movement through the CARP site? Will SMUD preserve these wildlife corridors should the CARP project be approved? How will secure wildlife mobility be preserved within the site and beyond?

6-15

Please describe the process SMUD utilized to establish that regionally, there are no alternative sites (with previously altered habitat) that are suitable, or more efficient, for redevelopment as a solar generation site. Is the choice to utilize agricultural and grassland actually the best and preferred choice? What methodology was utilized to undertake a regional survey of potential alternative sites? Certainly development is frequently more "difficult" than utilizing virgin ground; however as we experience climate catastrophe in "real-time", might there be net benefit to redevelopment; as compared to desertifying 1,176 acres of productive grassland habitat? What climate, social, benefits would be realized by utilizing an existing underutilized, abandoned, blighted site or sites vs establishing CARP on the proposed site? How was monetary consideration weighted against the existential considerations of climate change and the real value of habitat?

6-16

We are pleased to refer you to the Citizen Initiated Smart Growth Plan (www.enviro

6-17

alliance,org) for a comprehensive analysis of natural systems, economic analyses and regional land use data to support your response to these questions. 6-17 (Cont.)

4

Sincerely,

Leslie Warren
Alliance for Environmental Leadership
enviroalliance.org
chair@enviroalliance.org

Letter 6 Response

Leslie Warren
Alliance for Environmental Leadership
September 28, 2022

6-1 The commenter asks a series of questions related to ecosystem services and environmental processes (heat island effects, mountain warming, snowpack loss, economic impacts, alternative concepts), but provides no evidence of impacts or basis for further analysis as a result of the project relative to those issues. Further, the proposed project includes revegetation under the solar panels following construction, which has been shown in limited studies to reduce the potential heat-island effects of the panels. It should be noted that SMUD is undertaking the project to meet its zero carbon goal by 2030. SMUD is taking on a leading role to achieve regional carbon neutrality at the earliest possible date in an effort to contribute to the climate change effects solution.

6-2 The kind of calculations requested by the commenter reach far beyond those required in a CEQA analysis. Furthermore, the commenter does not provide substantial evidence that these kinds of calculations would be necessary to further the analysis. Carbon emissions from construction traffic and project operation of the project are analyzed in Section 3.3 Air Quality and also taken into account in Section 3.8 Greenhouse Gas Emissions of the DEIR. Please note that the total habitat conversion is far below the total acreage of the 1,176 acres cited by the commenter. In fact, the entire acreage below the solar panels (more than 800 acres) will be re-vegetated following construction, and managed as grazing habitat including habitat for native pollinators, restoring the carbon sequestration capacity of these lands once construction is complete.

6-3 The commenter asks a series of questions related to ecosystem services, but provides no evidence of impacts or basis for further analysis as a result of the project relative to those issues. Detailed information on the habitat types currently present at the project site and the species using these habitats is provided in Section 3.4 Biological Resources of the EIR, and numerous protocol level surveys are underway as outlined in the mitigation measures in Section 3.4. Furthermore, SMUD is working closely with the wildlife agencies (USFWS, CDFW), Placer County, and the PCA to ensure the project is not in conflict with the goals of the PCCP.

6-4 The commenter asks a series of questions related to ecosystem services and environmental processes (carbon sequestration of solar farm vs. grassland, annual carbon sequestration capacity, solar farm generation predictions, water sequestration), but provides no evidence of impacts or basis for further analysis as a result of the project relative to those issues. Please also see response to comment 6-1 above regarding SMUD's leadership role in combatting the adverse effects of climate change. Please also see response to comment 6-3 regarding where in the DEIR to find information on ecosystem services such as wildlife habitat, wetlands functions, etc.

6-5 The commenter asks a rhetorical question. No further response is required.

6-6 Please see response to comment 6-1 through 6-4. Please also note that compared to current conditions, the grassland acreage in the project area will be increased following project implementation due to the conversion of rice fields to grasslands, as the area beneath and interspersed among all solar panels will be re-vegetated with native grass species following construction to provide opportunities for sheep grazing and native pollinator habitat.

6-7 The governor's climate action strategy is a broad scale document that covers the entire state and specific policies from statewide strategies and is not typically relied upon when making local scale land use decisions. SMUD is working closely with Placer County, the PCA, and the regulatory agencies to ensure consistencies with all local policies and with all relevant state and federal laws that apply to the project.

6-8 SMUD is working closely with the wildlife agencies and the PCA to ensure that the project is not in conflict with the goals of the PCCP, as detailed in the DEIR. Please also see response to comment 1-2 above.

6-9 Section 3.4 Biological Resources of the DEIR provides detailed information on the habitat types present at the project site and the wildlife values they provide, and a detailed analysis of the potential effect of the project on common and special-status species, including raptors that use the grassland in the project area for foraging habitat. The DEIR includes mitigation measures to offset loss of grassland (Swainson's hawk foraging habitat).

6-10 Quantifying grassland conversion in Placer County since 1970 is beyond the scope of the DEIR. The PCCP includes detailed information on future development zones in the County and the habitat that will be converted, and how regional conservation will be achieved in the PCCP's reserve area. SMUD's EIR was prepared in close coordination with Placer County and the PCA to ensure that the project is consistent with ongoing conservation efforts in Placer County across all habitat types, including grassland, and for covered species.

6-11 Section 3.4 Biological Resources of the DEIR provides detailed information on the habitat types present at the project site and the wildlife values they provide, and a detailed analysis of the potential effect of the project on common and special-status species, including all of those listed by the commenter. The Biological Resources Appendix of the DEIR provides further detail on the database searches conducted, information of all special-status species screened for and considered during EIR preparation, and a cross walk information to the PCCP.

6-12 Section 3.4 Biological Resources of the DEIR provides detailed information on the habitat types present at the project site including wetlands, rice fields etc. and a detailed analysis of the potential effect of the project on common and special-status species. Impacts on agricultural resources are analyzed in detail in Section 3.2 Agriculture and Forestry Resources of the DEIR. This includes a detailed analysis of state and local agricultural conservation policy consistency.

6-13 Section 3.4 Biological Resources of the DEIR provides detailed information on the habitat types present at the project site including wetlands such as vernal pools and seasonal wetlands, and a detailed analysis of the potential effects on these important resources. As detailed in Section 3.4, all vernal pools on the project site along with a 250-foot buffer around these important resources are avoided by the project footprint. This information informed the project design. As such, no impacts on vernal pools and associated species will occur as a result of project implementation.

6-14 Section 3.10 Hydrology and Water Quality provides a detailed analysis of impacts associated with these resources (i.e., Curry Creek and surrounding watersheds), as required by CEQA. Some of the resource topics mentioned by the commenter (changes to root systems, elimination of soil living organisms) are beyond the scope of the EIR, and the commenter does not provide substantial evidence of potential impacts that would necessitate the evaluation of these topics in the EIR. Habitat conversion acreages are detailed in Section 3.4 Biological Resources of the DEIR.

6-15 Please refer to Section 3.4.2.29 Connectivity and Migration Corridors and Section 3.4.2.30 Important Bird Areas and Flyways in the DEIR for a detailed description of these resources in the project vicinity. Please refer to *Impact 3.4-4. 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?* in the DEIR for a detailed analysis of the project on these resources which finds that specific impacts on waterfowl and raptors that use migratory corridors in the area and the PCCP connectivity corridors resulting from the project are less than significant.

6-16 SMUD went through an extensive screening process for a suitable site for the project using the following criteria:

- Sufficient space to accommodate a large scale project
- Sufficient capacity in the transmission/distribution network to minimize needed upgrades
- Within SMUD's service area or immediately adjacent to SMUD transmission lines just outside of SMUD's service area
- Area slated for future development (avoid greenfield development)
- Landowner willing to sell or lease the site
- Compatibility of existing land use zoning

SMUD settled on the proposed site after careful consideration of all of these topics. Re-development of a brownfield site for a utility scale solar project is not an option because there is no such site available that meets the above criteria. Financial considerations were not a driving factor in the selection of the site. Please see Chapter 6 Alternatives and specifically section 6.2.3 Alternatives Considered but not Evaluated Further for additional details regarding site selection, including consideration of offsite alternatives.

6-17 Comment noted, thank you for the resource referral.

Letter 7

From:	Jennifer Byous
To:	Amy E. Spitzer; Amanda Beck
Cc:	Leigh Chavez
Subject:	[EXTERNAL] FW: [EXTERNAL] SMUD "Country Acres" Solar Project proposal to undermine the California Natural Communities Conservation Plan Act (NCCP) -- DEIR meeting cmment
Date:	Sunday, October 30, 2022 7:44:58 AM

FWD. This should be included in public comment as it is time stamped 10/28/22 at 4:57. Thanks, Jen

From: Michael Garabedian <michaelgarabedian@earthlink.net>
Sent: Friday, October 28, 2022 4:57 PM
To: brandondrose@hotmail.com; nancy.bui@smud.org; gbfishman@gmail.com; Rosanna.Herber@smud.org; rob@kerth.us; davetamayo2@gmail.com; Heidi.Sanborn@smud.org
Cc: Jennifer Byous <JByous@placer.ca.gov>
Subject: [EXTERNAL] SMUD "Country Acres" Solar Project proposal to undermine the California Natural Communities Conservation Plan Act (NCCP) -- DEIR meeting cmment

Re: "There are no known areas of controversy at this time as SMUD has been working closely with Placer County and the Placer Conservation Authority regarding issues related to land use; utilities; public services, and conservation, including implementation of the Placer County Conservation Program." SMUD

TO: SMUD President and Directors

I lived south of Dixon for 12 years and participated in the effort that stopped the DOW Chemical proposal to extend its Contra Costa County chemical plant across the apex of river delta by pipeline to the waterfront of the Montezuma Hills. The proposal was stopped because it would have violated California's Williamson Act. SMUD's wind generation project in those hills that followed is a model of energy generation consistent with the rotation grazing and grain growing agriculture in those hills for generations. 7-1

Now comes a SMUD project hostile to agriculture, conservation, habitat, wildlife, and the NCCP, the misleadingly named Country Acres Solar Project. The State Fish and Game Code NCCP is not being meaningfully implemented here by state and federal agencies in the PCCP. NCCP requires landscape level ecosystem protection, not destruction by the highly secretive PCCP Placer County Authority.

DEIR October 13, 2022, CEQA Placer County Planning Commission meeting procedural legal 7-2

issue

The project name is in itself seems a public relations gimmick and title for a project fragmenting five square miles of agriculture and precious habitat to provide power for destructive development proposed to follow.
The CEQA legal issue presented on on October 13 is if CEQA requires meaningful disclosure and description of a project's environmental impacts at the mandated CEQA meeting or hearing.
There were no maps, acreage or other meaningful project impact description and presentation in the county staff report and not in the County and SMUD power point presentations.
SMUD had a choice about what to present to the public at the meeting including decisions about where, when and how to have this meeting, along with what entity to have chosen to make the meeting and presentation. In making these decisions SMUD chose irresponsibly, and perhaps in violation of CEQA, to do little to nothing to present at the meeting the environmental impacts in a County overtly hostile to the NCCP, to the environment and to agriculture, a County that has a public public in the dark what Country Acres proposes to be as well as what the PCCP is.
CEQA law is all about procedure as are these hearing decision choices leaving the public in the dark.
SMUD chose Placer County for its hearing and the result of this choice was one person from the public, myself, speaking, and I was cut off by the Placer County Planning Commission chair after three minutes. No one else from the public spoke in person to this agenda item, nor by zoom or by telephone.
SMUD should plan and inform the public about and conduct another CEQA DEIR meeting with full, even honest impact information including photos and maps, not to meting honest presentation of project impacts. There would need to be an extended comment period after that. Referring people to the DEIR is not enough in the face of informational institutional nonchalance.

7-2

Placer County hostility to the NCCP is joined in by SMUD

The SMUD country acres project challenges the NCCP law. The PCCP is a 450 square miles with a core development area of wanton destruction of agriculture, habitat, wildlife vernal pool prairie. Ecological relationship between state and federal water uplands are wrecked. Major precious areas are wiped out through the use in lieu fees.
It is impermissible under the NCCP for the county to completely develop the PCCP core area's protected state waters, all waters uplands and habitat, as this project proposes.
SMUD's proposed country acres project design and execution is unwise, unacceptable and hostile to agriculture and species conservation. SMUD as other projects have, including in Placer County staff reports, depending on which staff is presenting, needs to apply its own standards to its required environmental impact meeting presentation on Country Acres.
SMUD is urged to correct course and hold a public hearing correctly noticed

7-3

assuring the public is informed.

About the NCCP, look to the South Sacramento County HCP/NCCP as an example for comparison to the PCCP. South County has far more protected species and special areas of concern.

7-3 (Cont.)

Michael Garabedian
Placer County Tomorrow
Pacific to American Divide
P.O. Box 1328
Lincoln CA 95648
916-719-7296

Letter 7 Response **Michael Garabedian October 30, 2022**

7-1 The commenter's background and opposition to the project are noted. No further response is required.

7-2 The public meeting held during the DEIR comment period was conducted in close coordination with Placer County as a responsible agency and followed a standard protocol for such meetings in the County. All information requested by the commenter is included in the DEIR in detail. It is not the purpose of a public meeting to present detailed information on a particular topic, but to provide an overview of the project and its impacts and provide the public and agencies with a meaningful way to comment. No further response is required.

7-3 The Placer County Conservation Program (PCCP) is a joint Habitat Conservation Plan and Natural Communities Conservation Plan and has been fully adopted by the County. The PCA is its implementing agency. Throughout the planning and environmental review process, SMUD has been working closely (including weekly meetings) with the County and the PCA to ensure the project (while not a covered activity under the PCCP) is not in conflict with the goals of the PCCP. All measures in the DEIR were developed to be consistent with the PCCP to the greatest extent feasible. Table BR-2 in Appendix BR-1 of the DEIR provides a side-by-side comparison of mitigation measures in this EIR with conservation measures in the PCCP. For additional details, please see Section 3.4.3.2 Consistency with the Placer County Conservation Program on page 3.4-55 of the DEIR. SMUD has also engaged in extensive coordination with the resource agency on how to site, plan, review, and permit the project and to ensure that the project does not adversely affect the PCCP and its conservation goals. Please refer to DEIR Section 3.4 Biological Resources for extensive detail on the analysis and studies that went into preparing the DEIR and continue to go into project permitting.

Letter 8

From: Lyn Greenhill <lyn.greenhill@yahoo.com>
Sent: Friday, September 16, 2022 11:17 AM
To: Amy E. Spitzer <Amy.Spitzer@smud.org>
Cc: Country Acres Project <CountryAcres@smud.org>
Subject: [EXTERNAL] Country Acres Solar Project

Amy,

I am strongly objecting to this proposed solar farm. I am flabbergasted that SMUD would want to dump what is an eyesore in a neighboring county. I see no benefit to Placer County and I'm stunned that Roseville would agree to be boxed in on their western boundary. 8-1

There is plenty of worthless land in Sacramento County that SMUD should be looking at for such a project, rather than do a land grab in Placer County. This is prime farmland that you will be converting and your draft EIR just brushes over this significant change in land use. 8-2

It ignores the regional university and potential future growth areas of the County's Specific Plan. 8-3

Lyn Greenhill
Rocklin

Letter 8 Response **Lyn Greenhill September 16, 2022**

8-1 The objection of the commenter is noted. The comment does not pertain to the adequacy of the DEIR. No further response is required.

8-2 Conversion of farmland is discussed in detail in Section 3.2 Agricultural and Forestry Resources of the DEIR. Specifically, Impact 3.2-1 on page 3.2-10 of the DEIR discusses conversion of agricultural land. The project area does not include Prime Farmland and thus there would be no impact. As detailed in Table 3.2-2. of the DEIR, the project would result in the conversion of 44.3 acres of Farmland of Statewide Importance and 858 acres of Unique Farmland. Mitigation Measure 3.2-1 on page 3.2-12 discusses the mitigation SMUD proposes to implement to offset this loss.

8-3 The Regional University Specific Plan (and other plans in the project area) were specifically considered during project siting, design and planning. The potential future growth area is discussed in Section 3.11 Land Use and Planning, and in Section 3.4 Biological Resources (with regards to the Placer County Conservation Program). Exhibit 3.11-1 on page 3.11-8 of the DEIR shows the project's relationship to the Regional University Specific Plan and all other specific plans in the area. Exhibit 3.4-1 on page 3.4-8 shows the Project's relationship to the potential future growth area, as described in the PCCP.

Letter 9

From:	Country Acres Project
To:	Amy E. Spitzer
Subject:	FW: [EXTERNAL] Country Acres Solar project
Date:	Tuesday, September 27, 2022 12:10:01 PM

From: Tom Tribur <tom.tribur@gmail.com>
Sent: Friday, September 23, 2022 9:40 PM
To: Country Acres Project <CountryAcres@smud.org>
Subject: [EXTERNAL] Country Acres Solar project

To whom it may concern,

Why is this project in Placer County if it's for SMUD customers in Sacramento County? Just south of that area is a vast amount of land in Sacramento County that is more barren land that would suit a solar farm better than destroying farmland that enables California to be one of farm to fork leaders in the country. Save our farmland, rethink this plan, we can't just keep importing everything from China. 9-1

Tom

Letter 9 Response	Tom Tribur September 23, 2022

9-1 The objection of the commenter is noted. SMUD went through an extensive screening process when siting the project, including ruling out land located adjacent to SMUD's existing transmission system that is already encumbered by Specific Plans for future development. SMUD has been working closely with Placer County to ensure that the project is compatible with local and regional plans. Please also see response to comment 6-16 above which discusses the screening process and response to comment 8-2 above which includes specifics about the agricultural farmland impacts.

Commissioner Comments at the October 13, 2022 Draft EIR Scoping Meeting

Commissioner DeMattei: Is agriculture not considered a cultural resource given the importance of agriculture in the region?

Jody Fessler: Agriculture is not considered a cultural resource; however, the EIR analyzes the agriculture impact. The project area is part of PCCP potential future growth area and is slated for long-term development.

Commissioner DeMattei: What is the life span of solar panels? What is the impact when they have to be replaced?

Amanda Beck: About 30 years with full decommissioning planned at end; property is leased; all infrastructure will be removed and land will go back to landowner; sheep grazing can help keep agricultural soils productive in the meantime; the project is also keeping the wells.

Commissioner DeMattei: Does the EIR analyze disposal impact of panels? Will we put this burden on another country?

Amanda Beck: Disposal of modules is covered in the hazardous materials section – panels are universal waste; there are rules of how to dispose of them; parts that can be recycled will be.

Commissioner DeMattei: Are we just trading one environmental impact for another one? As a farmer I want to preserve as much ag lang as possible. Need to feed people before considering how lights come on.

Amanda Beck: That is why we chose this area in the future growth area.

Commissioner DeMattei: Still trying to serve as much ag as possible. Food costs are going up and we are trying to keep as much land in ag as possible to help our local population.

Commissioner Johnson: Will work in the University Specific Plan area require modification of USP?

Jen Byous: Yes, some panels are proposed on the south side; University Specific Plan requires a master plan; we will modify the specific plan to allow for this exception; project would be considered under its own entitlements.

Commissioner Johnson: Will the property owner still own the property?

Amanda Beck: Yes, north end of property will be leased from a couple of landowners; one of them is the USP landowner and SMUD is working with them; good source of income to fund their plans; property in question are north of campus.

Commissioner Johnson: Is wildfire an issue? When grass under panels dries out it becomes volatile – this can be an issue if not mitigated.

Amanda Beck: Wildfire is a key consideration in any design for power projects; SMUD works with local fire department; in touch with County Chief and Assistant Chief regarding design/setbacks; designing with appropriate setback distances; sheep are good grazers and will keep vegetation down; grazing plan will be adapted over time as part of maintenance needs.

Commissioner Johnson: Grazing could be presented as part of fire mitigation.

Commissioner DeMattei: Could solar panels be mounted on university buildings to not take up ag land?

Amanda Beck: SMUDs 2030 plan includes both mounted rooftop and regular solar; don't have density on rooftops to get the generation required.

Commissioner DeMattei: If we are taking land away from food, we are taking more out of production. Thank you!

3 CORRECTIONS AND REVISIONS TO THE DRAFT EIR

This chapter contains changes to the text of the Draft EIR in response to certain comments. These changes are generally referenced in the responses to comments in Chapter 2, or are provided to be consistent with changes referenced in Chapter 2. The changes are presented in the order in which they appear in the Draft EIR and are identified by Draft EIR page number. Text deletions are shown in strikeout (~~strikeout~~) and additions are shown in underline (underline). The changes identified below do not alter the conclusions of the EIR with respect to any of the significant impacts of the project and do not necessitate recirculation of the Draft EIR.

3.1 Revisions to Project Description

The following minor additions have been made to the Project Description.

Revisions to Project Description to include Agricultural Production

The following minor addition has been made to the fifth bullet in section 2.3 Project Objectives in the project description in the DEIR to include the study of agricultural crop production in a small portion of the project.

- Integrate compatible agricultural activities such as grazing, agricultural crop production, and/or pollinator habitat into solar operations.

Additionally, a short paragraph has been added to the bottom of section 2.5.2 Other Structures and Improvements, expanding on the objective above.

> *Agrivoltaics*
>
> The proposed project is planning to incorporate California's first to-scale agrivoltaic farm constructed within an 11-acre footprint within the planned project site. In this planned agrivoltaic area of the project, solar panels will be divided into 0.25-acre plots with different configurations and heights and planted with different food crops to demonstrate utilization of the land for the co-production of food and energy. Additionally, throughout the project site the project will utilize sheep grazing for vegetation management and will integrate pollinator habitat.

Revisions to Project Description for Clarification

The following minor edits have been made to page 2-5 of the DEIR in section 2.4 Land Use and Zoning:

~~The County and~~ SMUD and County staff have agreed to proposed language for ~~on~~ a General Plan Amendment subject to approval by the County Board of Supervisors to Policy 8.b.1.4, which will state the following:

> *New construction shall not be permitted within 100 feet of the centerline of permanent streams and within 50 feet of intermittent streams, or within the 100-*

year floodplain, whichever distance is greater, except for long-term, nonpermanent solar electric generation projects with a conditional use permit, as long as any impacts to the floodplain, vegetation and wetlands are less than significant, grading and increases to water surface elevations of the base flood are minor, and the stream is not anadromous fish bearing.

The discussion regarding the memorandum of understanding (MOU) on page 2-21 in section 2.6 Potential Permits and Approvals Required in the DEIR (last two paragraphs), has been moved to section 2.4 Land Use and Zoning.

3.2 Revisions Clarifying Compensation for Rice Fields and PCCP Consistency

The following minor revisions have been made to the second paragraph on page 3.4-86 in the Biological Resources section of the DEIR to clarify the intent of the payment with regards to rice fields and PCCP consistency.

> However, in order to mitigate for project impacts, the project will provide compensatory mitigation as detailed above under sensitive natural communities, wetland and other waters of the United States, and burrowing owl and Swainson's hawk. In addition, as detailed in Mitigation Measure 3.2-1 Preserve Important Farmland on page 3.2-12 in the Agriculture and Forestry section of the DEIR, the project will also mitigate at a 1:1 ratio for the loss of Farmland of Statewide Importance and Unique Farmland, which include all rice fields in the project area. These impacts on aquatic resources; ~~and~~ PCCP covered species and their habitat, and farmland/rice fields in the project area, may be compensated through the payment of land conversion fees into the PCCP's in-lieu fee program consistent with Section 4.8.4 of the PCCP under a Memorandum of Understanding (MOU) with the PCA, as detailed under Mitigation Measures 3.4-8., 3.4-10, and 3.4-16, above and Mitigation Measure 3.2-1 on page 3.2-12 in the Agriculture and Forestry Resources section of the DEIR. This mitigation includes a functional equivalent of payment for modelled habitat for giant garter snake, as it compensates for the loss of rice fields through payment of land conversion fees. Therefore, the proposed project contributes to the achievement of the goals of the PCCP as if it were paying for the conversion of modelled habitat.
>
> This MOU would include terms and conditions ~~as needed to~~ that would ensure compensatory mitigation for the project does not conflict with the HCP/NCCP's conservation and mitigation strategy and is consistent with Section 8.4.8 of the PCCP which details the specifics of mitigation for activities not covered in the plan. The MOU ~~and~~ would ~~be approved~~ require approval by the PCA board and SMUD prior to issuance of improvement plans. Compensatory mitigation for the project would therefore help achieve the conservation goals of the PCCP, even though the project is not a covered activity and is not required to mitigate for impacts to giant garter snake habitat. Alternatively, in the event that SMUD cannot enter into an MOU with the PCA, the project ~~SMUD~~ may acquire credits from existing

mitigation banks within the PCCP Plan Area which are approved by and in good standing with the U.S. Army Corps' Interagency Review Team, and implement other mitigation, as outlined in the mitigation measures above. Under this scenario, SMUD would seek alternative ways of mitigating for the conversion of Farmland of Statewide Importance and Unique Farmland, with a strong preference for mitigation located within Placer County, that include rice conservation for the benefit of species with modeled habitat in the project area, including giant garter snake.

Tricolored blackbird is a PCCP covered species with habitat in the project area. The Draft EIR includes a detailed discussion of tricolored blackbird in Western Placer County and in the project area and acknowledges that foraging habitat and very limited breeding habitat are present. Mitigation Measure 3.4-11 *Conduct Focused Pre-Construction Surveys for Nesting Tricolored Blackbird and Avoid Impacts During Construction* addresses the protection of breeding habitat during project construction. Any loss of foraging habitat for the species (which forages in agricultural fields and grasslands) will be offset through implementation of Mitigation Measures 3.4-8., 3.4-10, and 3.4-16 above and Mitigation Measure 3.2-1 on page 3.2-12 in the Agriculture and Forestry Resources section of the DEIR. This mitigation compensates for the loss of rice fields and grassland (which also provides suitable foraging habitat for burrowing owls and Swainson's hawks) through payment of land conversion fees.

SMUD will continue to work closely with the County, PCA, and resource agencies, including CDFW and USFWS, to ensure that any mitigation is applied in a manner that advances and does not conflict with the goals of the PCCP and is consistent with the provisions of Section 8.4.8 (Mitigation for Activities not covered by the Plan).

3.3 Revisions to Description of Potential Types of Batteries Utilized

The following minor revisions have been made to include potential use of an additional type of battery on page 3.9-7:

The project would use lithium ion batteries; lithium iron phosphate or nickel manganese cobalt technology for energy storage. Lithium iron phosphate batteries are a variation of a lithium ion battery. These rechargeable batteries are commonly used for vehicles and backup power. The cathode is comprised of LiFePO4 and the anode is comprised of a carbon electrode with a metallic current collector grid. Compared to other lithium ion battery options, lithium iron phosphate is more difficult to ignite, and thus, more resilient in high temperatures (Battery Recyclers of America 2022). Nickel manganese cobalt batteries are a type of lithium ion battery and have a cathode made of a combination of nickel, manganese, and cobalt. They are used to power smartphones, laptops, and electric vehicles, as well as used for solar storage (Solar Reviews 2023). Disposal of these batteries must and will comply with California's Universal Waste Rule.

This additional information regarding battery type will not have any additional CEQA impacts or require additional CEQA analysis.

3.4 Revisions to Description of Drainage Rates from Curry Creek and Pleasant Grove Creek Watersheds.

The following minor revision has been made as requested by the City of Roseville to the following paragraph on page 3.10-24:

> Flood management for the Curry Creek and Pleasant Grove Creek watersheds is provided by Placer County and the PCFCWCD in the Placer County portions of the watershed, and Reclamation District No. 1000 for the Sutter County sections of the watershed (downstream and west of the project site). The lower watersheds flood regularly with water overtopping of the banks annually in some areas. This problem is caused by several factors that have occurred both locally in the Pleasant Grove and Curry Creek watershed and in the greater Sacramento River watershed. Starting in the early 1900s, levees and dikes were installed to protect landowners and assist farmers. This practice has resulted in a highly channelized and confined stream system, especially in the lower watershed, which has effectively eliminated the natural floodplain. The confined channels cause increased stream stage heights which then typically results in flooding of areas just upstream of bridges that have become undersized with respect to the increased stage heights. Adding to this problem is an increase in drainage rates from the upper watershed <u>of Pleasant Grove and Curry Creek</u> ~~from the cities of Roseville and Rocklin~~. Development typically increases the amount of impervious surfaces, such as roads, parking lots, and roofs, within a watershed. All of these impervious surfaces lead to increased runoff volumes and response times to storm events. The greatest single factor in increased flooding is elevated stage heights in the Sacramento River caused by development throughout the drainage basin. The increased stage heights create a pressure head differential which restricts flood waters that are draining from the watershed from entering the Sacramento River. This causes water to back up through the Natomas Cross Canal, up the Pleasant Grove Creek Canal, and into both Pleasant Grove and Curry Creeks (Foothill Associates 2006:2-39 through 2-42).

3.5 Revisions to Construction Transportation Plan (CTP) Requirements.

The following minor revision has been made to the last sentence of **Mitigation Measure 3.17-2** *Prepare and Implement a Construction Transportation Plan* on pages 3.17-13 and 3.17-14 as follows:

> The construction contractor shall submit the CTP to Placer County for review and approval 30 days prior to commencing construction activities. <u>Placer County may share the plan with other interested parties at its discretion and incorporate specific input from third parties into the plan comments as it deems appropriate.</u>

4 MITIGATION MONITORING AND REPORTING PROGRAM

This mitigation monitoring and reporting program (MMRP) summarizes the mitigation measures, implementation schedule, and responsible parties for monitoring the mitigation measures required of the proposed Country Acres Solar Project, as set forth in the EIR prepared for the project.

Section 21081.6 of the California Public Resources Code and Section 15091(d) and Section 15097 of the State CEQA Guidelines require public agencies "to adopt a reporting or monitoring program for changes to the project which it has adopted or made conditions of project approval to mitigate or avoid significant effects on the environment." A MMRP is required for the project because the EIR for the project identified potentially significant adverse impacts related to construction and operation of the project, and mitigation measures have been identified to reduce most of those impacts to a less-than-significant-level.

This MMRP will be adopted by SMUD if it approves the project and will be kept on file at SMUD's Customer Service Center at 6301 S Street, Sacramento, CA 95817; and at SMUD's East Campus Operations Center at 4401 Bradshaw Road, Sacramento, CA 95827. SMUD will use this MMRP to ensure that identified mitigation measures, adopted as a condition of project approval, are implemented appropriately.

4.1 Mitigation Implementation and Monitoring

SMUD shall be responsible for monitoring the implementation of mitigation measures designed to minimize impacts associated with the project. Allthough SMUD shall have ultimate responsibility for ensuring implementation, others may be assigned the responsibility of actually implementing the mitigation. SMUD shall retain the primary responsibility for ensuring that the project meets the requirements of this MMRP and other permit conditions imposed by participating regulatory agencies.

SMUD shall designate specific personnel who will be responsible for monitoring implementation of the mitigation that will occur during project construction. The designated personnel will be responsible for submitting documentation and reports to SMUD on a schedule consistent with the mitigation measure and in a manner necessary for demonstrating compliance with mitigation requirements. SMUD shall ensure that the designated personnel have authority to require implementation of mitigation requirements and shall be capable of terminating project construction activities found to be inconsistent with mitigation objectives or project approval conditions.

SMUD and its appointed contractor also shall be responsible for ensuring that its construction personnel understand their responsibilities for adhering to the performance requirements of the mitigation plan and other contractual requirements related to the implementation of mitigation as part of project construction. In addition to the prescribed mitigation measures, Table 4-1 lists each identified environmental resource being affected (in the same order and using the same numbering system as in the EIR), the associated CEQA checklist question (used as the thresholds of significance in the EIR), the corresponding monitoring and reporting requirement, the party responsible for

ensuring implementation of the mitigation measure and monitoring effort, and the project component to which the mitigation measure applies.

If an issue addressed in the EIR does not result in mitigation, it is not included in the table.

4.2 Mitigation Enforcement

SMUD shall be responsible for enforcing mitigation measures. If alternative measures are identified that would be equally effective in mitigating the identified impacts, implementation of these alternative measures will not occur until agreed on by SMUD.

4.3 Reporting

SMUD shall, or may require the developer to, prepare a monitoring report on completion of the project describing the compliance of the activity with the required mitigation measures. Information regarding inspections and other requirements will be compiled and explained in the report. The report will be designed to simply and clearly identify whether mitigation measures have been adequately implemented. At a minimum, each report will identify the mitigation measures or conditions to be monitored for implementation, whether compliance with the mitigation measures or conditions has occurred, the procedures used to assess compliance, and whether further action is required. The report will be presented to SMUD's Board of Directors.

4.4 Mitigation Monitoring and Reporting Program Table

The categories identified in Table 4.1 are described below.

CEQA Issue Area – This column identifies which CEQA issue area the mitigation measure is attributed to in the EIR.

Impacts – This column provides the potential impacts summary.

Mitigation Measures – This column provides the verbatim text of the adopted mitigation measure.

Implementation Duration – This column identifies when the mitigation measure will be implemented (e.g., before construction, during construction, during operations-maintenance, during decommissioning).

Monitoring Duration – This column identifies the period within which monitoring will be conducted.

Responsibility – This column identifies the party(ies) responsible for implementation and/or enforcing compliance with the requirements of the mitigation measure.

Applicable Project Component – This column identifies with what component or under what conditions the mitigation measure will be implemented (e.g., all project components, project components during construction, project components during operations and maintenance, construction near sensitive habitat, decommissioning).

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
Agriculture and Forestry Resources	**Impact 3.2-1.** Project induced conversion of Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland) to non-agricultural use.	**Mitigation Measure 3.2.1. Preserve Important Farmland** SMUD shall implement one of the following methods to minimize the loss Farmland of Statewide Importance and Unique Farmland at a 1:1 ratio (i.e., 1 acre on which easements are acquired to 1 acre of Farmland of Statewide Importance and Unique Farmland removed from agricultural use): • Acquire agricultural conservation easement(s) that provide in-kind or similar resource value protection in the region, with a strong preference for locating the agricultural conservation easement(s) in Placer County. This can be achieved by the acquisition of conservation easements, farmland deed restriction, or other appropriate farmland conservation mechanism to ensure the preservation of the land in perpetuity. • Pay in-lieu fees to an established, agreed-upon (by County and SMUD) mitigation program with a presence in Placer County (e.g., Placer Land Trust) to fully fund the acquisition and maintenance of agricultural land or easements. • Alternatively, this may occur through the payment of fees into the PCCP's in-lieu fee program under a Memorandum of Understanding (MOU) with the PCA prior to issuance of improvement plans. (In-lieu fee payments would also address impacts on special-status species through loss of foraging habitat for burrowing owl and Swainson's hawk, and impacts on sensitive natural communities and wetlands and other waters of the US and state/ County, as detailed in Mitigation Measures 3.4-8, 3.4-10 and 3.4-16 in Section 3.4 "Biological Resources" of the DEIR). Payments of in-lieu fees or acquisition of agricultural conservation easements may be spread out in alignment with construction phasing but must occur no later than the start of each new phase. The impact acreage requiring offset shall be based on the most current FMMP at the time of the County's issuance of the Conditional Use Permit.	Before the start of each new phase of construction and or prior to Improvement Plan approval.	Before construction	SMUD	SMUD	All phases of construction that result in Farmland of Statewide Importance and Unique Farmland conversion
Air Quality	**Impact 3.3-1.** Conflicts with the applicable air quality plan.	**Mitigation Measure 3.3-1.** Implement Mitigation Measures 3.3-2a, 3.3-2b, and 3.3-2c.	See MM 3.3-2a, 3.3-2b, and 3.3-2c	See MM 3.3-2a, 3.3-2b, and 3.3-2c	See MM 3.3-2a, 3.3-2b, and 3.3-2c	See MM 3.3-2a, 3.3-2b, and 3.3-2c	See MM 3.3-2a, 3.3-2b, and 3.3-2c
Air Quality	**Impact 3.3-2.** Cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment.	**Mitigation Measure 3.3-2a. Implement Fugitive Dust Control Measures** In order to minimize fugitive dust generation from earthwork and on-site travel on unpaved roadways, the applicant shall submit a Dust Control Plan to the Placer County Air Pollution Control District (PCAPCD). The Dust Control Plan shall be submitted to the PCAPCD a minimum of 21 days before construction activity is scheduled to commence. The Dust Control Plan can be submitted online via the fill-in form: http://www.placerair.org/dustcontrolrequirements/dustcontrolform. In addition, the applicant shall include as a condition of the construction bidding, incorporation of dust control measures that shall include, at a minimum, the below requirements of Rule PCAPCD Rule 228, Section 400, and any additional measures identified as part of the Dust Control Plan. All dust control measures shall be shown on grading and improvement plans, to be initiated at the start and maintained throughout the duration of construction. • Dry mechanical sweeping is prohibited. Watering of a construction site shall be carried out to mitigate visible emissions. (Based on PCAPCD Rule 228, Section 301.) • The contractor shall apply water or use methods to control dust impacts offsite. Construction vehicles leaving the site shall be cleaned to prevent dust, silt, mud, and dirt from being released or tracked offsite. (Based on PCAPCD Rule 228, Section 304.) • During construction activity, traffic speeds on all unpaved surfaces shall be limited to 15 miles per hour or less unless the road surface and surrounding area is sufficiently stabilized to prevent vehicles and	Dust Control Plan shall be submitted to PCAPCD at least 21 days before construction begins. Dust control measures shall be implemented during construction.	Before and during construction	Contractor	SMUD	All project components during construction

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		equipment traveling more than 15 miles per hour from emitting dust or visible emissions from crossing the project boundary line. (Based on PCAPCD Rule 228, Section 401.2.) • Storage piles and disturbed areas not subject to vehicular traffic must be stabilized by being kept wet, treated with a chemical dust suppressant, or covered when material is not being added to or removed from the pile. (Based on PCAPCD Rule 228, Section 401.3.) • The contractor shall suspend all grading operations when fugitive dust exceeds the APCD Rule 228 (Fugitive Dust) limitations. Visible emissions of fugitive dust shall not exceed 40% opacity, nor go beyond the property boundary at any time. Lime or other drying agents utilized to dry out wet grading areas shall not exceed APCD Rule 228 limitations. (Based on PCAPCD Rule 228, Sections 302 & 401.4.) • The prime contractor shall be responsible for keeping adjacent public thoroughfares clean by keeping dust, silt, mud, dirt, and debris from being released or tracked offsite. Wet broom or other methods can be deployed as control and as approved by the individual jurisdiction. (Based on PCAPCD Rule 228, Section 401.5.) • The contractor shall suspend all grading operations when wind speeds (including instantaneous gusts) are high enough to result in dust emissions crossing the boundary line, despite the application of dust mitigation measures. (Based on PCAPCD Rule 228, Section 401.6.) • The contractor shall prohibit trucks from transporting excavated material off-site unless the trucks are maintained such that no spillage can occur from holes or other openings in cargo compartments, and loads are either covered with tarps or wetted and loaded such that the material does not touch the front, back, or sides of the cargo compartment at any point less than six inches from the top and that no point of the load extends above the top of the cargo compartment. (Based on PCAPCD Rule 228, Section 401.7) • To minimize wind-driven dust during construction, the prime contractor shall apply methods such as surface stabilization, the establishment of a vegetative cover, paving (or use of another method to control dust as approved by Placer County). (Based on APCD Rule 228 / section 402).					
Air Quality	**Impact 3.3-2.** Cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment.	**Mitigation Measure 3.3-2b. Reduce Exhaust-related Emissions During Construction** Prior to the approval of grading or improvement plans, whichever would occur first, the construction contractor shall submit a Construction Emissions Control Plan to the Placer County Air Pollution Control District and SMUD, and provide written evidence to SMUD that the plan has been submitted to and approved by PCAPCD. The applicant shall not initiate any on-site construction activity until PCAPCD has approved the Construction Emissions Control Plan. The Construction Emissions Control Plan shall include the following: • The contractor shall submit to the PCAPCD a comprehensive equipment inventory (e.g., make, model, year, emission rating) of all the heavy-duty off-road equipment (50 horsepower or greater) that will be used in an aggregate of 40 or more hours. If any new equipment is added after submission of the inventory, the contractor shall notify the PCAPCD before the new equipment being utilized. At least three business days before the use of subject heavy-duty off-road equipment, the project representative shall provide the PCAPCD with the anticipated construction timeline including start date, name, and phone number of the property owner, project manager, and on-site foreman. • With submittal of the equipment inventory, the contractor shall provide a written calculation to the PCAPCD for approval demonstrating that the heavy-duty (> 50 horsepower) off-road vehicles to be used in the construction project, including owned, leased and subcontractor vehicles, will achieve a project-wide fleet-average of 20 percent Nitrogen Oxides (NO_X) reduction and 45 percent particulate reduction compared with the statewide fleet averages. Acceptable options for reducing emissions may	Construction Emissions Control Plan shall be submitted to PCAPCD and SMUD prior to approval of Grading or Improvement Plans. If any new heavy-duty off-road equipment is added, at least three business days before the use of subject heavy-duty off-road equipment, the project representative shall provide the PCAPCD with the anticipated construction timeline	Before and during construction	Contractor PCAPCD	SMUD and PCAPCD	All project components during construction

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		include the use of late model engines, low-emission diesel products, alternative fuels, engine retrofit technology, after-treatment products, and other options as they become available. The emissions reductions shall be calculated using the Sacramento Metropolitan Air Quality Management District's Construction Mitigation Calculator to identify the equipment fleet and measures that achieve the required reductions; this tool is currently available on the Sacramento Metropolitan Air Quality Management District's website at the following link: http://www.airquality.org/businesses/ceqaland-useplanning/mitigation (click on the current "Construction Mitigation Tool" spreadsheet under Step 1) • If any new equipment is added after the submission and approval of the inventory, the construction contractor shall update the inventory and provide to the PCAPCD and SMUD prior to the use of such equipment, demonstrating that the 20-percent NO_X reduction performance standard is still met. • The approved equipment inventory and a note regarding update requirements, as detailed above, shall be include as an attached form to the Grading and Improvement Plans. • Include the following standard notes on Grading and Improvement Plans: Construction equipment exhaust emissions shall not exceed the APCD Rule 202 Visible Emissions limitations. Operators of vehicles and equipment found to exceed opacity limits are to be immediately notified by the APCD to cease operations, and the equipment must be repaired within 72 hours. The contractor shall not discharge into the atmosphere volatile organic compounds caused by the use or manufacture of Cutback or Emulsified asphalts for paving, road construction or road maintenance unless such manufacture or use complies with the provisions of Rule 217 Cutback and Emulsified Asphalt Paving Materials. During construction, open burning of removed vegetation is only allowed under APCD Rule 304 Land Development Smoke Management. (Based on APCD Rule 304) Any device or process that discharges 2 pounds per day or more of air contaminants into the atmosphere, as defined by Health and Safety Code Section 39013, may require an APCD permit. Developers/contractors should contact the APCD before construction and obtain any necessary permits before the issuance of a Building Permit. (APCD Rule 501) The contractor shall utilize existing power sources (e.g., power poles) or clean fuel (e.g., gasoline, biodiesel, natural gas) generators rather than temporary diesel power generators. The contractor shall minimize idling time to a maximum of 5 minutes for all diesel-powered equipment. (Placer County Code Chapter 10, Article 10.14). Idling of construction-related equipment and construction-related vehicles shall be limited to 2 minutes within 1,000 feet of any sensitive receptor (i.e., house, hospital, or school), allowing for the same exceptions identified in Placer County Code Chapter 12, Article 10.14.	and phone number of the property owner, project manager, and on-site foreman. Implement Construction Emission Control Plan during construction				
Air Quality	**Impact 3.3-2.** Cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment.	**Mitigation Measure 3.3-2c. Off-site Mitigation** If, based upon the incorporation of all on-site measures described above in Mitigation Measures 3.3.1 and 3.3.2, NO_X or PM emissions still do not meet the daily PCAPCD thresholds, the project shall participate in the PCAPCD's Offsite Mitigation Program by paying to PCAPCD a mitigation fee for construction activities, to be determined at the time of construction based on the submitted equipment inventory and emissions calculations for the purposes of mitigating NO_X and PM_{10} emissions, such that emissions are reduced to a less-than-significant level. The fee calculation to mitigate daily emissions shall be based on the PCAPCD-determined cost to reduce emissions and the project's contribution of pollutants to be less than the PCAPCD threshold of 82 pounds per day for NO_X. The fee shall be submitted for approval by PCAPCD as the total required to achieve emissions reductions that would reduce total emissions to a less-than-significant level after all other mitigation measures are implemented. The fee shall be calculated, approved by PCAPCD and paid prior to the issuance of grading or improvement plans.	Prior to Grading or Improvement Plan approval. During and after construction.	During and after construction	SMUD PCAPCD	SMUD and PCAPCD	All project components involving construction

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status amphibians and reptiles.	**Mitigation Measure 3.4-1. Worker Environmental Awareness Program (WEAP) and Biological Monitor Inspection** SMUD will prepare a Worker Environmental Awareness Program that will educate staff regarding the presence or potential presence of all special-status species, sensitive natural communities, and protected wetlands with potential to occur, or that are known to occur, within the project area. The program shall describe their identification, habitat requirements, and penalties for species impacts, as well as immediate steps to take should special-status species be observed by staff on site. This WEAP shall include biological resource avoidance and minimization measures/mitigation measures from the project's CEQA Mitigation Monitoring and Reporting Program, and any resource permits or agreements, as applicable. The WEAP will educate workers regarding sensitive species and their habitats, the need to avoid impacts, state and federal protection, and the legal implications of violating environmental laws and regulations. The WEAP can be provided in the form of a handout and/or video presentation. All staff working onsite shall attend the WEAP training prior to commencing onsite work. Staff that attend the training shall fill out a sign-in sheet indicating that they completed the training. Prior to construction, a qualified biological monitor shall inspect all areas within the project site with the potential to support sensitive biological resources to ensure the proper implementation of all avoidance and minimization and mitigation measures, agency permit requirements, and environmentally sensitive area exclusion flagging and/or fencing have been properly implemented, and to deliver WEAP training as needed. The biological monitor shall remain available on an on-call basis for the duration of project construction to conduct inspections and follow up surveys, as needed, and to ensure compliance with permit conditions. The qualified biological monitor shall have the experience, education and training necessary to conduct special status species surveys and monitoring as described in the mitigation measures below. During operation and maintenance, an annual Environmental Awareness Training shall be provided to onsite personnel, covering any sensitive biological resources that could be present onsite.	SMUD to provide WEAP training to all project personnel before construction and ongoing WEAP trainings to new personnel during construction, operations and maintenance, and decommissioning. Prior to construction, qualified biological monitors shall ensure environmentally sensitive areas are properly flagged and/or fenced. Ongoing biological monitoring inspections.	Before, during construction, operations and maintenance, and decommissioning	Qualified Biologist	SMUD	All project components
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status amphibians and reptiles.	**Mitigation Measure 3.4-2. Establish Non-Disturbance Buffers around Vernal Pools and Seasonal Wetlands to protect Western Spadefoot during construction** Based on the assumptions that all vernal pools and seasonal wetlands in the project areas could provide suitable habitat for western spadefoot, SMUD, in coordination with a qualified biologist, will establish a 250-foot no-disturbance buffer from the high-water mark of the vernal pool or seasonal wetland habitat prior to commencement of ground-disturbing activities. The perimeter of the no-disturbance buffer will be delineated with a wildlife-friendly fence that allows the movement of wildlife, including western spadefoot (and also wide-ranging wildlife, such as coyotes), through the area. The fence will be maintained for the duration of project construction and operation. Signage will be installed on the fence indicating the buffer is an environmentally sensitive area. The boundaries of vernal pools, seasonal wetlands and associated 250- foot buffers will also be clearly delineated on project plans and specifications boundaries. No construction or ground-disturbing activities shall occur within the 250- foot buffer. The fencing shall be kept in place for the duration of project construction and operations and shall be kept in good condition to prevent any construction, operation and maintenance activities from disturbing the sensitive habitat areas.	Vernal pool and wetland exclusion fencing to be installed in coordination with qualified biologist before start of construction. Fencing to be maintained during construction, operations and maintenance, and decommissioning.	Before and during construction, and during operations and maintenance, and decommissioning.	Qualified Biologist and Contractor	SMUD	All project components within 25- feet of vernal pools and seasonal wetlands.

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status amphibians and reptiles.	**Mitigation Measure 3.4-3. Conduct Pre-Construction Surveys for Western Pond Turtle** • Project ground-disturbing activities will be conducted outside of western pond turtle's active breeding and dispersal season (i.e., after May 1 and before September 15), to the extent feasible. If project activities must be implemented during the breeding and dispersal season, they will not start until 30 minutes after sunrise and must be completed 30 minutes prior to sunset. • A qualified biologist shall conduct a pre-construction survey for western pond turtle within 48 hours prior to the start of construction activities within 300 feet of suitable habitat (e.g., any adjacent waterway, marsh, or emergent wetland). Concurrently with the pre-construction survey, searches for nesting sites shall be conducted and any identified sites shall be delineated with high-visibility flagging or fencing and avoided during construction activities. If avoidance is not possible, the nest and/or turtle shall be removed by a qualified biologist and relocated to an appropriate location in consultation with CDFW.	Surveys to be conducted and fencing to be installed within 48 hours of ground-disturbing activities within 300 feet of suitable habitat. Flagging/fencing and monitoring required for nest sites if identified.	Before construction and during construction (if nests are found).	Qualified Biologist	SMUD	All project components during construction that require work within 300 feet of suitable habitat.
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status amphibians and reptiles.	**Mitigation Measure 3.4-4. Avoid Impacts on Western Pond Turtle during Construction** If turtles and/or nests are encountered during the preconstruction survey, a qualified biologist shall be present during grubbing and clearing activities in suitable habitat (aquatic) to monitor for western pond turtle. If a turtle is observed in the active construction zone, construction shall cease within a 100-foot buffer. Construction may resume when the biologist has, in consultation with CDFW, either hand-captured and relocated the turtle to nearby suitable habitat outside the construction zone, or, after thorough inspection, determined that the turtle has moved away from the construction zone. On-site personnel will observe a 20-mile-per-hour speed limit at all times. Information about avoidance and minimization measures for western pond turtles shall be included in the WEAP described above in Mitigation Measure 3.4- 1.	Biological monitor shall be present during grubbing and clearing activities in suitable habitat if turtles or nests are found during pre-construction survey.	During construction	Qualified Biologist	SMUD	All project components during construction that require work within 300 feet of suitable habitat.
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status amphibians and reptiles.	**Mitigation Measure 3.4-5. Conduct Pre-Construction Surveys for Giant Garter Snake and Implement Avoidance and Minimization Measures** Project ground-disturbing activities in aquatic habitat and adjacent upland habitat within 200 feet of aquatic habitat will be conducted during the giant garter snake's active season (i.e., after May 1 and before October 1), to the extent feasible. During this period, the potential for direct mortality is reduced, because snakes are expected to actively move and avoid danger. If project activities in aquatic habitat and adjacent upland habitat within 200 feet of aquatic habitat must be implemented outside of the snake's active season, the following mitigation measures must be implemented: • Within 24-hours prior to commencement of construction activities within 200 feet of potential giant garter snake habitat, the site shall be inspected by a qualified biologist who is approved by the CDFW and USFWS. If construction activities stop for a period of 2 weeks or more, another preconstruction clearance survey will be conducted within 24 hours before resuming construction activity. If snakes, or evidence of snakes, are encountered during preconstruction surveys, a biological monitor shall be present during construction activities in aquatic habitat and adjacent upland habitat within 200 feet of aquatic habitat. • The monitoring biologist shall be present during construction within 200 feet of potential aquatic habitat for giant garter snake (i.e., drainages that contain water) for the duration of the project. If a snake is encountered during construction activities, the monitoring biologist shall have the authority to stop construction activities until appropriate corrective measures have been completed or it is determined that the snake will not be harmed. The monitor will remain in the area for the remainder of the workday to ensure the snake is not harmed or, if it leaves the site, does not return. The qualified biologist will work with the PCA, USFWS, and CDFW to redirect the snake away from the disturbance area within 3 days of reporting the snake's presence at the construction site to USFWS and CDFW.	If construction is proposed between October 1 and May 1, a pre-construction survey within 24 hours before construction within aquatic and adjacent upland habitat within 200 feet of aquatic habitat shall be conducted. If construction activities stop for 2 weeks or more, another preconstruction clearance survey will be required. Biological monitor to be present on-site during construction within 200 feet of	Before and during construction Species observations to be reported to CDFW and USFWS within 24 hours of detection	Qualified Biologist	SMUD, CDFW, and USFWS	All project components during construction occurring within 200 feet of suitable aquatic habitat

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		• The project biologist shall report any observations of giant garter snake to CDFW and USFWS within 24 hours of detection. • Information about avoidance and minimization measures for giant garter snake shall be included in the WEAP described above in Mitigation Measure 3.4-1.	potential aquatic habitat.				
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status birds.	**Mitigation Measure 3.4-6. Survey for California Black Rails and Implement Avoidance Measures** • Preconstruction Call-Playback Surveys for California Black Rail. A qualified biologist will conduct a preconstruction survey in potentially suitable habitat for this species in the project footprint and a 500-foot buffer to the project footprint. Surveys will be initiated sometime between March 15 and May 31, preferably before May 15. A minimum of four surveys will be conducted. The survey dates will be spaced at least 10 days apart and will cover the time period from the date of the first survey through the end of June to early July. This will allow the surveys to encompass the time period when the highest frequency of calls is likely to occur. Projects must conduct surveys during this time period, regardless of when the project is scheduled to begin, and shall be conducted the year in which ground disturbance activities commence. Surveys will follow a standardized tape call-playback/response protocol similar to that of Evens et al. 1991 and Richmond et al. 2008 or other CDFW-approved method. The surveys will document the presence or absence of black rail. CDFW will be notified within 2 business days of any identified black rail detections. • If California black rails are detected during preconstruction surveys, the following additional measures will be implemented in association with occupied California black rail habitats: o SMUD will establish and maintain a non-disturbance buffer of up to 500 feet around all identified occupied wetland habitat, depending on site-specific conditions and at the discretion of a qualified biologist in consultation with CDFW. Where feasible, all construction-related activities will be excluded from the buffer for the duration of project implementation. o Where maintaining the non-disturbance buffer for the duration of the project is not feasible, at minimum, all construction-related activities will be excluded from the buffer for the duration of the breeding season (March through September, or for lesser duration as approved by CDFW). o If project activities are necessary within the established non-disturbance buffer or within occupied habitat, including potential alterations to hydrological conditions that support black rail habitat, SMUD will consult with CDFW to identify a strategy that will avoid take of the year-round resident California black rail. This may or may not include work windows outside the breeding season, installation of wildlife exclusion fencing, and/or methods for passive exclusion of individuals out of the temporary and permanent impact area such as through the hand removal of vegetation before other project-related ground disturbances, as determined in consultation with CDFW. A qualified biologist will be present for any construction activities occurring within the non-disturbance buffer; the intensity and frequency of the monitoring will be established in consultation with CDFW. • Information about avoidance and minimization measures for California black rails shall be included in the WEAP described above in Mitigation Measure 3.4-1.	Four (4) pre-construction surveys to be conducted between March 15 and May 31 during the year which ground disturbing activities are scheduled to begin if construction occurs within 500 feet of potentially suitable habitat. If California black rails are detected during preconstruction surveys, implement additional measures as described in MM.	Before and during construction CDFW to be notified within 2 days of any California black rail detections	Qualified Biologist	SMUD, USFWS, and CDFW	All project components during construction occurring within 500 feet of suitable California black rail habitat
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status birds.	**Mitigation Measure 3.4-7 Avoid and Minimize Impacts on Burrowing Owl** • SMUD will have preconstruction burrowing owl surveys conducted in all areas that may provide suitable nesting habitat according to CDFW (CDFG 2012) guidelines. A qualified wildlife biologist shall conduct take avoidance surveys, including documentation of burrows and burrowing owls, in all suitable burrowing owl habitat within 250 feet of proposed construction. Two surveys will be conducted within 15 days prior to ground disturbance to establish the presence or absence of burrowing owls. The surveys will be conducted at least 7 days apart (if burrowing owls are detected on the first survey, a second	Two (2) preconstruction surveys within 15 days prior to ground disturbance conducted 7 days apart.	Before construction	Qualified Biologist	SMUD and CDFW	All project components during construction involving work within 250 feet of suitable

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		survey is not needed) for both breeding and non-breeding season surveys. All burrowing owls observed will be counted and mapped. • During the breeding season (February 1 to August 31), surveys will document whether burrowing owls are nesting in or within 250 feet of the project area. • During the non-breeding season (September 1 to January 31), surveys will document whether burrowing owls are using habitat in or directly adjacent to any area to be disturbed. Survey results will be valid only for the season (breeding or nonbreeding) during which the survey was conducted. • The qualified biologist will survey the proposed footprint of disturbance and a 250-foot radius from the perimeter of the proposed footprint to determine the presence or absence of burrowing owls. The site will be surveyed by walking line transects, spaced 20 to 60 feet apart, adjusting for vegetation height and density. At the start of each transect and, at least, every 300 feet, the surveyor, with use of binoculars, shall scan the entire visible project area for burrowing owls. During walking surveys, the surveyor will record all potential burrows used by burrowing owls, as determined by the presence of one or more burrowing owls, pellets, prey remains, whitewash, or decoration. Some burrowing owls may be detected by their calls; therefore, observers will also listen for burrowing owls while conducting the survey. • Adjacent parcels under different land ownership will be surveyed only if access is granted. If portions of the survey area are on adjacent sites for which access has not been granted, the qualified biologist will get as close to the non-accessible area as possible and use binoculars to look for burrowing owls. • The presence of burrowing owl or their sign anywhere on the site or within the 250-foot accessible radius around the site will be recorded and mapped. Surveys will map all burrows and occurrence of sign of burrowing owl on the project site. Surveys must begin 1 hour before sunrise and continue until 2 hours after sunrise (3 hours total) or begin 2 hours before sunset and continue until 1 hour after sunset. Additional time may be required for large project sites. If a burrowing owl or evidence of presence at or near a burrow entrance is found to occur within 250 feet of the project site, the following measures will be implemented: • **Burrowing Owl 2.** If burrowing owls are found during the breeding season (approximately February 1 to August 31), the project applicant will: ○ Avoid all nest sites that could be disturbed by project construction during the remainder of the breeding season or while the nest is occupied by adults or young (occupation includes individuals or family groups foraging on or near the site following fledging). ○ Establish a 250-foot non-disturbance buffer zone around nests. The buffer zone will be flagged or otherwise clearly marked. Should construction activities cause the nesting bird to vocalize, make defensive flights at intruders, or otherwise display agitated behavior, then the exclusionary buffer will be increased such that activities are far enough from the nest so that the bird(s) no longer display this agitated behavior. The exclusionary buffer will remain in place until the chicks have fledged or as otherwise determined by a qualified biologist. ○ Construction may only occur within the 250-foot buffer zone during the breeding season only if a qualified raptor biologist monitors the nest and determines that the activities do not disturb nesting behavior, or the birds have not begun egg-laying and incubation, or that the juveniles from the occupied burrows have fledged and moved off site. Measures such as visual screens may be used to further reduce the buffer with Wildlife Agency approval and provided a biological monitor confirms that such measures do not cause agitated behavior. • **Burrowing Owl 3.** If burrowing owls are found during the non-breeding season (approximately September 1 to January 31), the project applicant will establish a 160-foot buffer zone around active	If burrowing owl or evidence of presence is found, implement additional measures as described in MM (monitor must be present for any activities within 250 feet of identified burrows; establish 160-foot buffer zone around active burrows during the non-breeding season; CDFW approval for any further buffer reductions).				burrowing owl habitat

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		burrows. The buffer zone will be flagged or otherwise clearly marked. Measures such as visual screens may be used to further reduce the buffer with CDFW approval and provided a biological monitor confirms that such measures do not cause agitated behavior. • **Burrowing Owl 4.** During the non-breeding season only, if a project cannot avoid occupied burrows after all alternative avoidance and minimization measures are exhausted, as confirmed by CDFW, a qualified biologist may passively exclude birds from those burrows. A burrowing owl exclusion plan must be developed by a qualified biologist consistent with the most recent guidelines from CDFW (e.g., California Department of Fish and Game 2012) and submitted to and approved by CDFW. Burrow exclusion may be conducted for burrows located in the project footprint and within a 160-foot buffer zone as necessary. • Information about avoidance and minimization measures for western burrowing owl shall be included in the WEAP described above in Mitigation Measure 3.4-1.					
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status birds.	**Mitigation Measure 3.4-8. Compensate for the Loss of Burrowing Owl Habitat** If burrowing owls are documented as breeding in the project area, compensatory mitigation shall be provided for permanent impacts on (removal of) burrowing owl nesting and foraging habitat. Burrowing owl foraging and nesting habitat will still be available after installation of solar panels. However, if the project results in a net loss of nesting or grassland foraging habitat due to conversion of 57.2 acres of grassland habitat to project infrastructure the loss of habitat will be mitigated as described in CDFW guidelines (CDFG 2012) in consultation with CDFW. The performance standard for compensatory mitigation for nesting and foraging habitat will be to achieve no net loss of habitat value to the burrowing owl. Compensatory mitigation for habitat loss shall be consistent with guidance by CDFW (CDFG 2012) and may include development and implementation of a land management plan to address long-term ecological sustainability and maintenance of the site for burrowing owls on the project site, acquisition of credits in a burrowing owl mitigation bank, or another form of mitigation acceptable to CDFW, such as payment of fees into the PCCP's in-lieu fee program under a Memorandum of Understanding (MOU) with the PCA prior to issuance of improvement plans. In-lieu fee payments would address impacts to special-status species, sensitive natural communities, wetlands and other waters of the US and state/County, and impacts to agricultural lands resulting from the conversion of important farmland (see Mitigation Measure 3.2-1 in Section 3.2 "Agricultural Resources" of this Draft EIR). Payments may be spread out in alignment with construction phasing and will occur prior to the start of each new phase. The compensatory mitigation will be consistent with the PCCP goal of maintaining or increasing the population size of overwintering western burrowing owl and promoting expansion of breeding populations of burrowing owls and will be approved by CDFW. Compensatory mitigation will include the following requirements as described in CDFG 2012: • Permanently protect mitigation land through a conservation easement deeded to a non-profit conservation organization or public agency with a conservation mission, for the purpose of conserving burrowing owl habitat and prohibiting activities incompatible with burrowing owl use. This may occur through the payment of fees into the PCCP's in-lieu fee program under a Memorandum of Understanding (MOU) with the PCA prior to issuance of improvement plans. In-lieu fee payments would address impacts to special-status species, sensitive natural communities, wetlands and other waters of the US and state/County, and impacts to agricultural lands resulting from the conversion of important farmland (see Mitigation Measure 3.2-1 in Section 3.2 "Agricultural Resources" of the Draft EIR). Payments may be spread out in alignment with construction phasing and will occur prior to the start of each new phase. If the project is located within the service area of a CDFW-approved burrowing owl conservation bank, the project proponent may also purchase available burrowing owl conservation bank credits. • Develop and implement a mitigation land management plan to address long-term ecological sustainability and maintenance of the site for burrowing owls.	If burrowing owls are documented as breeding in the project area, SMUD will do the following: Compensatory mitigation shall be provided for permanent impacts as described in the MM. If payments into an in-lieu fee program will occur, payments may be spread out in alignment with construction phasing, and must be made before start of each phase prior to Improvement Plan approval. Develop and implement mitigation land management plan.	Before, during, and after construction	SMUD	SMUD, PCA, and CDFW	All project components that would result in permanent impacts to nesting or foraging habitat

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		• Fund the maintenance and management of mitigation land through the establishment of a long-term funding mechanism such as an endowment.					
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status birds.	**Mitigation Measure 3.4-9. Conduct Pre-Construction Surveys for Swainson's Hawk and Implement Protective Buffers.** **Preconstruction Surveys.** A qualified biologist will conduct preconstruction surveys for Swainson's hawks during the nesting season (March 1 through August 21) within the project footprint and of all suitable nesting habitat within line of sight of construction activities within a 0.25-mile radius of the project footprint. The surveys will be conducted no more than 15 days prior to ground disturbance and will be conducted using methods consistent with guidelines provided in Recommended Timing and *Methodology for Swainson's Hawk Nesting Surveys in the Central Valley* (SHTAC 2000) with the following exceptions: • Surveys will be required within a 0.25 miles (1,320- foot) radius around the project site. In instances where an adjacent parcel is not accessible to survey because the qualified biologist was not granted permission to enter, the qualified biologist will scan all potential nest tree(s) from the adjacent property, road sides, or other safe, publicly accessible viewpoints, without trespassing, using binoculars and/or a spotting scope to look for Swainson's hawk nesting activity; • Surveys will be required from February 1 to September 15 (or sooner if it is found that birds are nesting earlier in the year); and • If a Swainson's hawk nest is located and presence confirmed, only one follow-up visit is required (to avoid disturbance of the nest due to repeated visits). **Nest Buffers.** If active Swainson's hawk nests are found, appropriate buffers shall be established around active nest sites, in coordination with CDFW, to provide adequate protection for nesting raptors and their young. No project activity shall commence during the nesting season within the buffer areas until the qualified biologist has determined that the young have fledged, the nest is no longer active, or reducing the buffer would not result in nest abandonment. **Nest Monitoring.** Monitoring of the nest by a qualified biologist during construction activities may be required if the qualified biologist determines that the activity has potential to adversely affect the nest. If construction activities cause the nesting bird to vocalize, make defensive flights at intruders, get up from a brooding position, or fly off the nest, then the no-disturbance buffer shall be increased until the agitated behavior ceases. The exclusionary buffer will remain in place until the qualified biologist has confirmed that the chicks have fledged. Information about avoidance and minimization measures for Swainson's hawk shall be included in the WEAP described above in Mitigation Measure 3.4-1.	Preconstruction surveys no more than 15 days prior to ground disturbing activities within the nesting season (March 1 to August 21) If nests are found, implement appropriate no-disturbance nest buffers and monitoring during construction if construction could adversely affect any observed nests	Before and during construction	Qualified Biologist	SMUD	All project components during construction with potential to disturb Swainson's hawk nests
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status birds.	**Mitigation Measure 3.4-10. Compensate for the Loss of Swainson's Hawk Foraging Habitat** To offset net impacts on foraging habitat for breeding Swainson's hawks SMUD will mitigate the loss of Swainson's hawk foraging habitat in accordance with CDFW recommendations (CDFG 1994) by providing mitigation lands or securing Swainson's hawk mitigation bank credits as follows: • Foraging habitat permanently lost within 5 miles of an active Swainson's hawk nest tree but more than 1 mile from the nest tree will be replaced with 0.75 acre of mitigation land for each acre of foraging habitat permanently lost because of project construction (0.75:1 ratio). Foraging habitat for nests that are within 1 mile of the project site will be mitigated at a 1:1 ratio. All mitigation lands protected under this requirement shall be protected in a form acceptable to CDFW (e.g., through fee title acquisition or conservation easement) on agricultural lands or other suitable habitats that provide foraging habitat for Swainson's hawk. This may occur through the payment of fees into the PCCP's in-lieu fee program under a Memorandum of Understanding (MOU) with the PCA prior to issuance of improvement plans. In-lieu fee payments would address impacts to special-status species, sensitive natural communities,	If Swainson's hawk foraging habitat is impacted as described in the MM, compensatory mitigation shall be provided. If payment of fees into in-lieu fee program will occur, payments may be spread out in alignment with construction phasing	Before and during construction	SMUD	SMUD and PCA	All components that result in loss of Swainson's hawk foraging habitat or nesting habitat

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		wetlands and other waters of the US and state/County, and impacts to agricultural lands resulting from the conversion of important farmland (see Mitigation Measure 3.2-1 in Section 3.2 "Agricultural Resources" of this Draft EIR). Payments may be spread out in alignment with construction phasing and will occur prior to the start of each new phase. Management authorization holders/project sponsors will provide for management of the mitigation lands in perpetuity by funding a management endowment.	prior to Improvement Plan approval.				
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status birds.	**Mitigation Measure 3.4-11. Conduct Focused Pre-Construction Surveys for Nesting Tricolored Blackbird and Avoid Impacts During Construction** • **Preconstruction Tricolored Blackbird Surveys.** Before any ground-disturbing activities or vegetation clearing that may result in effects on potential habitat for Tricolored Blackbird (TRBL), a qualified biologist will conduct a preconstruction survey in potentially suitable nesting habitat (i.e., blackberry thickets and cattail marsh) for this species in the project footprint and a 500-foot buffer to the project footprint. The biologist will conduct three separate surveys, one each in mid-April, mid-May, and mid-June (Beedy, pers. comm., 2022a), and will use methods consistent with survey protocol used by surveyors for the Western Riverside County MSHCP 2018 https://www.wrcrca.org/species/survey_protocols/2018_Tricolored_Blackbird_Survey_Protocol.pdf). If an active nesting colony is detected during the surveys CDFW will be consulted to provide any guidance on appropriate avoidance and minimization measures in addition to those described below. • **Avoidance and Minimization.** Project activities will avoid occupied TRBL nesting habitat. If TRBL colonies are identified during the breeding season, an approximate buffer of up to 500 feet will be established around the colony, depending on site specific conditions and at the discretion of a qualified biologist in consultation with CDFW. Any construction-related activities will be excluded from the buffer until the end of the breeding season. • **Construction Monitoring.** If construction takes place during the breeding season when an active colony is present within 500 feet of construction activities, a qualified biologist will regularly monitor construction to ensure that the buffer zone is enforced and to verify that construction is not disrupting the colony. The intensity and frequency of the monitoring will be established in consultation with CDFW. If monitoring indicates that construction outside of the buffer is affecting a breeding colony, the buffer will be increased, as needed, in consultation with CDFW. • Information about avoidance and minimization measures for tricolored blackbird shall be included in the WEAP described above in Mitigation Measure 3.4-1.	Prior to ground-disturbing activities that may have impacts on tricolored blackbird habitat (blackberry thickets and cattail marsh),one survey in mid-April, one in mid-May, and one in mid-June shall be conducted. If tricolored blackbird nests are found, a 500-foot no-disturbance zone created prior to construction. Biological monitoring required if an active colony is present within 500 feet of construction activities.	Before and during construction	Qualified Biologist	SMUD and CDFW	All project components during construction that could result in impacts to tricolored blackbird habitat
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status invertebrates.	**Mitigation Measure 3.4-12. Avoid Impacts on Vernal Pool Fairy Shrimp and Vernal Pool Tadpole Shrimp During Construction** Vernal pools and seasonal wetlands in the project area provide potentially suitable habitat for vernal pool fairy shrimp and tadpole shrimp. A 250-foot no-disturbance buffer area will be established from the high-water mark of the vernal pool or wetland habitat prior to construction and will be delineated by fencing as described in Mitigation Measure 3.4-2 and confirmed by a qualified biologist. The boundaries of vernal pools, seasonal wetlands and associated 250-foot buffers will also be clearly delineated on project plans and specifications boundaries. No construction or ground-disturbing activities shall occur within the 250-foot buffer. All construction activities are prohibited within this buffer area. With complete avoidance of ground-disturbing activities within vernal pools and seasonal wetlands and a 250-foot buffer beyond the boundaries of these aquatic features, no direct or indirect impacts will occur to vernal pool fairy shrimp or tadpole shrimp and no further avoidance or minimization measures are required. Information about avoidance and minimization measures for vernal pool fairy shrimp and vernal pool tadpole shrimp shall be included in the WEAP described above in Mitigation Measure 3.4-1.	Vernal pool and wetland exclusion fencing to be installed in coordination with qualified biologist before start of construction. Fencing to be maintained during construction, operations and maintenance, and decommissioning (see MM 3.4-2).	Before and during construction, during operations and maintenance, and decommissioning.	Qualified Biologist and Contractor	SMUD	All project components within 250 feet of vernal pools or seasonal wetlands

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on special-status mammals.	**Mitigation Measure 3.4-13. Conduct Focused Pre-Construction Surveys for American Badger and Implement Avoidance Measures during Construction** A qualified biologist shall conduct focused surveys for American badger dens no more than 14 days prior to ground-disturbing activities in grassland habitat. The survey shall cover the limits of ground disturbance and a 100-foot buffer. Any winter or natal American badger dens located during the survey shall be evaluated (typically with remote cameras) to determine activity status. If American badger dens are detected in the project area, the qualified biologist shall establish a 100-foot no-disturbance buffer (e.g., wildlife-friendly fencing, flagging, or similar) around any active American badger natal dens identified during the survey. The buffer shall be maintained until the qualified biologist determines that the den is no longer active, and the young are no longer dependent upon the den for survival. If construction is scheduled to begin during the nonbreeding period (i.e., typically from June through February) and an active non-natal den is found in or adjacent to the construction footprint, a qualified biologist shall develop a plan in consultation with CDFW to trap or flush the individual and relocate it to suitable habitat away from construction. If no dens are observed, and/or after a trapping or flushing effort is completed, and/or after it is confirmed that a natal den is no longer active, the vacated or unoccupied den can be excavated, and construction can proceed. If American badger is detected during the surveys the qualified biologist will determine if regular monitoring of the badger den is required to ensure there are no impacts to this species and its habitat during construction. Information about avoidance and minimization measures for American badger shall be included in the WEAP described above in Mitigation Measure 3.4-1.	Surveys conducted no more than 14 days prior to ground-disturbing activities If an American badger natal den is detected, a no-disturbance 100-foot buffer fencing or flagging shall be installed. If an American badger non-natal den is detected during the non-breeding season, develop plan in consultation with CDFW to trap or flush individual and relocate; or if den is no longer active, den can be excavated. Monitoring to occur during construction if deemed necessary by qualified biologist.	Before and during construction	Qualified Biologist	SMUD	All project components during construction that involve ground-disturbing activities in grassland habitat
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on nesting birds and raptors.	**Mitigation Measure 3.4-14. Conduct Pre-Construction Surveys for Nesting Birds and Raptors** Tree or vegetation removal shall be conducted outside of the nesting season (i.e., the nesting season is defined as February 1 through August 31) to the greatest extent feasible. If construction activities will begin during the nesting season, a qualified biologist shall conduct a survey for nesting birds no more than 3 days prior to vegetation removal or ground-disturbing activities during the nesting season within suitable habitat (i.e., February 1 through August 31). The survey shall cover the limits of construction and accessible suitable nesting habitat within 500 feet. If any active nests are observed during surveys, a qualified biologist should establish a suitable avoidance buffer from the active nest. The buffer distance will typically range from 50 feet (for nesting passerines) to 500 feet (for nesting raptors) and will be determined based on factors such as the species of bird, topographic features, intensity and extent of the disturbance, timing relative to the nesting cycle, and anticipated ground disturbance schedule. If vegetation removal activities are delayed, additional nest surveys shall be conducted such that no more than 7 days are allowed to pass between the survey and vegetation removal activities.	If construction occurs within nesting season (February 1 to August 31), conduct preconstruction nesting survey no more than 3 days prior to vegetation removal or ground-disturbing activities. If vegetation removal activities are delayed, additional nest surveys should be conducted so that no more than 7 days pass between survey and vegetation removal. If any active nests are observed, establish	Before and during construction	Qualified Biologist	SMUD	All project components during construction that involve tree or vegetation removal or ground-disturbing activities.

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
			suitable avoidance buffer. If required, biological monitor shall be present on-site to monitor construction activities near nest				
Biological Resources	**Impact 3.4-1.** Temporary and permanent construction impacts on nesting birds and raptors.	**Mitigation Measure 3.4-15. Avoid Impacts on Nesting Birds and Raptors during Construction** Limits of construction to avoid active nests shall be established in the field with flagging, fencing, or other appropriate barriers and shall be maintained until the chicks have fledged and the nests are no longer active, as determined by the qualified biologist. If an active nest is identified in or adjacent to the construction zone after construction has started, work in the vicinity of the nest shall be halted until the qualified biologist can provide appropriate avoidance and minimization measures to ensure that the nest is not disturbed by construction. Appropriate measures may include a no-disturbance buffer until the nest has fledged and/or full-time monitoring by a qualified biologist during construction activities conducted near the nest. Information about avoidance measures to protect nesting birds and raptors shall be included in the WEAP described above in Mitigation Measure 3.4-1.	Limits of construction shall be established to avoid active nests. Active nests to be monitored during construction.	Before and during construction	Qualified Biologist and Contractor	SMUD	All project components during construction occurring near active nests
Biological Resources	**Impact 3.4-2.** Impacts on any riparian habitat or other sensitive natural community.	**Mitigation Measure 3.4-16. Avoid, Minimize and Compensate for Impacts on Sensitive Natural Communities and Comply with Federal, State and Local Permits** Prior to project implementation, SMUD shall refine potential impacts on sensitive natural communities based on advanced designs and obtain the necessary permits for impacts on any sensitive natural communities. These include the following permits: • Section 1600 Streambed Alteration Agreement from CDFW (for impact on riparian area and other sensitive natural communities not considered Waters of the U.S. (WUS) or State) • CWA Section 404 permit from USACE for impacts to WUS • CWA Section 401 Clean Water Certification from the Regional Water Quality Control Board for impacts to WUS • Waste Discharge Permit from Regional Water Quality Control board for impacts to water of the state • Floodplain encroachment permit from the County, if necessary based on advanced designs • As part of the permit applications, SMUD shall develop a habitat mitigation plan that will include mitigation for impacted sensitive natural communities on a no-net-loss basis. The plan may include onsite restoration, if feasible, offsite preservation, or purchasing mitigation credits from an agency-approved wetlands mitigation bank, paying an agency-approved in-lieu fee, and/or developing conservation lands to compensate for permanent loss of resources. Mitigation ratios shall be no less than 1:1 and shall be determined during the permitting process. This may also occur through the payment of fees into the PCCP's in-lieu fee program under a Memorandum of Understanding (MOU) with the PCA prior to issuance of improvement plans. In-lieu fee payments would address impacts to special-status species, sensitive natural communities, wetlands and other waters of the US and state/County, and impacts to agricultural lands resulting from the conversion of important farmland (see Mitigation Measure 3.2-1 in Section 3.2 "Agricultural Resources" of this Draft EIR). Payments may be spread out in alignment with construction phasing and will occur prior to the start of each new phase.	Necessary permits shall be obtained before project implementation. Develop a habitat mitigation plan to be submitted with permit applications. Compensate for impacts to sensitive natural communities as described in MM. Prior to Improvement Plan approval.	Prior to project implementation and during construction.	SMUD to obtain permits Contractor to abide by conditions set forth in permits Qualified Biologist to ensure compliance	SMUD, PCA, Regional Water Quality Control Board, and CDFW	All project components during construction that could impact sensitive natural communities

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		• SMUD shall implement all conditions of the permits, including any performance monitoring, if required for onsite restoration and report on the results of the monitoring to the appropriate agencies at the frequency and duration included in the permits. • Sensitive natural communities shall be included in the WEAP described above in Mitigation Measure 3.4-1.					
Biological Resources	**Impact 3.4-3.** Impacts on state or federally protected wetlands through direct removal, filling, hydrological interruption, or other means.	**Mitigation Measure 3.4-17. Avoid impacts to jurisdictional features and sensitive natural communities by use of horizontal directional drilling.** • The following avoidance and minimization measures shall be implemented to protect listed and other special-status plants and animals, and to avoid impacts to wetlands and riparian zones: ○ Boring activities and set-up activities for boring operations shall be situated outside of wetlands and riparian areas. An earthen or sandbag berm shall be installed around all drilling fluid mixing and pumping areas to contain any inadvertently spilled material. Sediment control devices shall be installed between the drilling staging areas and any waterways. This includes any culverts or drainage ditches that lead to a waterway. ○ HDD operations at the creek crossings and/or jurisdictional features shall be limited to daylight hours because of the difficulty in identifying the loss of bentonite or machine pressure without daylight. This shall be defined by the termination of drilling 30 minutes before dusk, and resumption of drilling at dawn. The contractor will make every effort to schedule drilling activities to be completed between dawn and 30 minutes to dusk. Should the drilling activities be within one hour of completion, 30 minutes before dusk, drilling activities may be allowed to continue until completion if the Project environmental monitor and/or the CDFW or its agents determine that completing the drilling activities will result in less risk to the stream. • Visual inspection along the bore alignment for frac-outs shall take place at all times while the drill is in operation. The monitor shall be in radio contact with the boring machine operator at all times. A biologist/monitor's presence shall be required during all boring activities (i.e. boring, back reaming, etc.) within CDFW jurisdiction unless the drainage is dry. • The HDD Operator shall design, pre-plan, and direct the HDD operation in such a way as to minimize the risk of spills of all types. The HDD Operator shall prepare and implement a Frac-Out Contingency Plan and submit it to SMUD and CDFW for review and approval 30 days prior to construction, which includes the boring plans and frac-out and clean-up plans, in the event of the accidental release of drilling lubricants through fractures in the streambed or bank ("frac-outs"). In substrates where frac-outs are likely to occur, the HDD Operator shall operate in a manner that will reduce risk, such as using lower pressure and greater boring depths. The Contingency Plan shall be kept on site at all times. • A non-toxic fluorescent water-soluble dye shall be added to the drilling muds to allow for frac-outs to be seen in muddy waters. The dye shall be used in a concentration which allows the monitors to easily determine the source of the frac-out, and shall be a type of dye approved for use by the local Regional Water Quality Control Board. • All equipment required to contain and clean up a frac-out release shall be available at the work site. • Boring plans should include: ○ A sketch of the construction site, including equipment staging areas, approximate location of drill entry and exit points and the approximate location of access roads in relation to the surrounding area, o Proposed depth of bore and statement of streambed or wetland condition (subsurface strata and percent of gravel and cobble) that support the depth of the bore, ○ Approximate length of bores (50-foot increments),	HDD operations at creek crossings and/or jurisdictional features shall be limited to daylight hours. Visual inspection along the bore alignment shall take place at all times while the drill is in operation. HDD Operator shall prepare and implement a Frac-Out Contingency Plan and submit it to SMUD and CDFW for review and approval 30 days prior to construction. If a frac-out occurs in a sensitive resources, the Operator shall immediately notify the SMUD Environmental Monitor. If a frac-out occurs and the SMUD Environmental Monitor decides that containment and clean-up is needed to prevent additional impacts, the Contractor shall begin the containment and clean up measures as described in the MM.	Before and during HDD operations	Contractor and Biological Monitor	SMUD and CDFW	All project components involving HDD operations

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		○ Type and size of boring equipment to be used (categorized as mini, mid or maxi), ○ Estimated time to complete bore, ○ List of lubricants and HDD additives to be used including Material Safety Data Sheets (MSDS), and ○ Name of Operator's agents and cell phone numbers. • Frac-out prevention and clean-up plans should include: ○ Name(s) and phone numbers of biological monitor(s) and crew supervisor(s), ○ Site specific resources of concern (if applicable, include factors such as possible presence of sensitive species), ○ Monitoring protocols (include biological monitoring and frac-out monitoring), and ○ Containment and clean-up plan (include staging location of vacuum trucks and equipment, equipment list, necessary hose lengths, special measures needed for steep topography, etc. at each location). • If a frac-out or spill occurs in a sensitive resource, the Operator shall immediately notify the SMUD Environmental Monitor. • If a frac-out occurs, the SMUD Environmental Monitor, shall determine whether clean-up actions are warranted. If containment and clean-up is needed to prevent additional impacts, the Contractor shall begin the following containment and clean up measures immediately. ○ Where water flows allow, the Contractor shall immediately construct a sandbag well around the frac-out or place a standing pipe (such as a 55-gallon drum with the top and bottom removed, heavy PVC pipe or CMP or culvert type material) around the frac-out to contain the drilling mud. ○ A trailer-mounted vacuum or vacuum truck shall be deployed to vacuum out spilled drilling fluids that continue to leak. Removed drilling fluids shall not be placed where they are likely to re-enter the stream. ○ All cleanup and containment efforts shall adhere to the Frac-out Contingency Plan approved by the SMUD for spill response.					
Cultural Resources	**Impact 3.5-1.** Impacts on archaeological resources pursuant to § 15064.5.	**Mitigation Measure 3.5-1: Halt ground-disturbing activity upon discovery of subsurface archaeological features.** In the event that any prehistoric or historic-era subsurface archaeological features or deposits, including locally darkened soil ("midden"), that could conceal cultural deposits, are discovered during construction, all ground-disturbing activity within 100 feet of the resources shall be halted and a qualified professional archaeologist shall be retained to assess the significance of the find. If the find is determined to be significant by the qualified archaeologist (i.e., because it is determined to constitute either an historical resource, a unique archaeological resource, or a tribal cultural resource), the archaeologist shall develop appropriate procedures to protect the integrity of the resource and ensure that no additional resources are affected. Procedures could include, but would not necessarily be limited to, preservation in place (which shall be the preferred manner of mitigating impacts to archaeological sites), archival research, subsurface testing, or contiguous block unit excavation and data recovery (when it is the only feasible mitigation, and pursuant to a data recovery plan).	If any prehistoric or historic-era subsurface archaeological features or deposits are discovered during construction, all ground-disturbing activity shall cease within 100 feet of the resource(s) discovered until an archaeologist can assess the significance of the find.	During construction	Contractor and Qualified Archaeologist	SMUD	All project components during construction

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
Cultural Resources	**Impact 3.5-2.** Disturbance of any human remains, including those interred outside of dedicated cemeteries.	**Mitigation Measure 3.5-2: Halt ground-disturbing activity upon discovery of human remains.** If human remains are discovered during any construction activities, potentially damaging ground-disturbing activities within 100 feet of the remains shall be halted immediately, and SMUD will notify the Placer County coroner and the NAHC immediately, according to PRC Section 5097.98 and Section 7050.5 of the California Health and Safety Code. If the remains are determined by the NAHC to be Native American, the guidelines of the NAHC shall be followed during the treatment and disposition of the remains. SMUD will also retain a professional archaeologist with Native American burial experience to conduct a field investigation of the specific site and consult with the Most Likely Descendant, if any, identified by the NAHC. Following the coroner's and NAHC's findings, the archaeologist and the NAHC-designated Most Likely Descendant shall determine the ultimate treatment and disposition of the remains and take appropriate steps to ensure that additional human interments are not disturbed. PRC Section 5097.94 identifies the responsibilities for acting upon notification of a discovery of Native American human remains.	If human remains are discovered during construction, potentially damaging ground-disturbing activities within 100 feet of the remains will be halted immediately. SMUD will notify Solano County coroner and the NAHC immediately.	During construction	SMUD, Qualified Archaeologist, and Contractor	SMUD, Placer County, and NAHC	All project components during construction
Geology and Soils	**Impact 3.7-5.** Impacts on Unique Paleontological Resources.	**Mitigation Measure 3.7-5: Avoid Impacts to Unique Paleontological Resources.** To minimize the potential for destruction of or damage to previously unknown unique, scientifically important paleontological resources during earthmoving activities at the project site, SMUD shall do the following: • Prior to the start of earthmoving activities, retain either a qualified archaeologist or paleontologist to inform all construction personnel involved with earthmoving activities regarding the possibility of encountering fossils, the appearance and types of fossils likely to be seen during construction, and proper notification procedures should fossils be encountered. • If paleontological resources are discovered during earthmoving activities, the construction crew shall immediately cease work in the vicinity of the find and notify SMUD and the County. SMUD shall retain a qualified paleontologist to evaluate the resource and prepare a recovery plan. The recovery plan may include, but is not limited to, a field survey, construction monitoring, sampling and data recovery procedures, museum curation for any specimen recovered, and a report of findings. Recommendations in the recovery plan that are determined by SMUD and the County to be necessary and feasible shall be implemented before construction activities can resume at the site where the paleontological resource or resources were discovered.	Before earthmoving activities, a qualified paleontologist or archaeologist will inform construction personnel on what paleontological resources are and what to do if one is found. Qualified paleontologist to evaluate resources if found and prepare a recovery plan.	Before and during construction activities	SMUD, Qualified paleontologist, and Contractor	SMUD and Placer County	All project components during construction
Hazards and Hazardous Materials	**Impact 3.9-2.** Hazards to the public or environment due to the accidental release of hazardous materials.	**Mitigation Measure 3.9-1: Conduct Phase II Environmental Site Assessment and Implement Remedial Measures** To reduce health hazards associated with potential exposure to hazardous substances, SMUD shall implement the following measures before the start of ground-disturbing activities: • Retain a certified environmental professional to conduct a Phase II ESA that includes appropriate soil and/or groundwater testing. Recommendations in the Phase II ESA to address any contamination that is found shall be implemented before ground-disturbing activities can resume in the areas where contamination is identified, including at the two REC areas in the Phase I ESA recommended for further investigation. • Notify the appropriate federal, State, and local agencies if evidence of previously undiscovered soil or groundwater contamination (e.g., stained or odoriferous soil or groundwater) or if previously undiscovered underground storage tanks are encountered during construction activities. Any contaminated areas shall be remediated in accordance with recommendations made by the Placer County Department of Health and Human Services-Division of Environmental Health Services, Central Valley RWQCB, DTSC, and/or other appropriate Federal, state, or local regulatory agencies.	Conduct Phase II ESA prior to ground disturbing activities. Before construction, address contamination that is found during the Phase II ESA. Notify appropriate agencies if previously undiscovered underground storage tanks are encountered during construction activities.	Before and during construction	SMUD, Certified environmental professional, and Contractor	Placer County Department of Health and Human Services-Division of Environmental Health Services, Central Valley RWQCB, DTSC, and/or other appropriate Federal, state, or local regulatory agencies.	All project components

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		• Remove all surface debris such as the used tires, tractor trailers, recreational vehicles, Polyvinyl chloride (PVC) piping, and soil piles observed within the proposed project boundaries during the site visit conducted in January 2022, and dispose of such materials at an appropriately permitted off-site disposal facility.	Remove all surface debris found within the project boundaries.				
Hydrology and Water Quality	**Impact 3.10-5.** Risk of pollutant release due to project inundation in a flood hazard, tsunami, or seiche zones.	**Mitigation Measure 3.10-1: Locate Construction Equipment and Material Storage Areas Outside of the 100-Year Floodplain During the Winter Rainy Season.** In order to protect human life, water quality, and designated in-stream beneficial uses of waterbodies, the construction contractor shall implement the following: • The on-site construction trailer and its associated portable restrooms, fencing, power supply, and parking area, shall not be located within a 100-year floodplain. • During the winter rainy season (i.e., November 1 through April 1), construction materials and equipment shall not be stored in a 100-year floodplain.	Construction materials shall be placed outside 100-year floodplain during winter rainy season (November 1 through April 1)	During construction	Contractor	SMUD	All project components during construction
Noise	**Impact 3.13-1.** Temporary, short-term exposure of sensitive receptors to construction noise.	**Mitigation Measure 3.13.1. Implement Noise Reducing Construction Practices, Prepare and Implement a Noise Control Plan, and Monitor and Record Construction Noise near Sensitive Receptors.** The project applicant(s) and primary contractors for engineering design and construction of all project phases shall employ noise-reducing construction practices and ensure that the following requirements are implemented at each worksite in any year of project construction to avoid and minimize construction noise effects on sensitive receptors. Measures that shall be used to limit noise shall include the measures listed below: • Noise-generating construction operations shall be limited to the hours between 6 a.m. and 8 p.m. Monday through Friday, and between 8 a.m. and 6 p.m. on Saturdays. • Construction equipment and equipment staging areas that could produce noise perceptible at the adjacent property boundary shall be located as far as feasible from nearby noise-sensitive land uses. • All construction equipment shall be properly maintained and equipped with noise-reduction intake and exhaust mufflers and engine shrouds, in accordance with manufacturers' recommendations. Equipment engine shrouds shall be closed during equipment operation. • All motorized construction equipment shall be shut down when not in use to prevent idling. • Individual operations and techniques shall be replaced with available quieter procedures and equipment (e.g., using welding instead of riveting, mixing concrete off-site instead of on-site). • Noise-reducing enclosures shall be used around stationary noise-generating equipment (e.g., compressors and generators). • Construction-related traffic shall be limited along roadways within residential uses such as South Brewer Road and Phillip Road as discussed in Mitigation Measure 3.17-1 Prepare and Implement Traffic Control Plan and Mitigation Measure 3.17-2 Prepare and Implement a Construction Transportation Plan. • Written notification of construction activities shall be provided to all noise-sensitive receptors located within 700 feet of construction activities. The notification shall include anticipated dates and hours during which construction activities are anticipated to occur and contact information, including a daytime telephone number, for the project representative to be contacted in the event that noise levels are deemed excessive. Recommendations to assist noise-sensitive land uses in reducing interior noise levels (e.g., closing windows and doors) shall also be included in the notification. • Acoustic barriers (e.g., lead curtains, sound barriers) shall be used, particularly during site grading and excavation activities, and when construction equipment operates along the project site boundaries within 700 feet of existing residential uses, to reduce construction-generated noise levels at affected	Noise-generating construction operations shall be limited to 6 a.m. to 8 p.m. on weekdays and 8 a.m. to 6 p.m. on weekends. Written notification of construction activities to sensitive noise receptors located within 700 feet of construction activities will be distributed prior to construction. Acoustic barriers shall be used when construction equipment operates along project site boundaries within 700 feet of existing residential uses.	During construction	SMUD and Contractor	SMUD	All project components during construction

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
		noise-sensitive land uses. The barriers shall be designed to obstruct the line of sight between the noise-sensitive land use and on-site construction equipment.					
Transportation	**Impact 3.17-1.** Conflict with a program plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities.	**Mitigation Measure 3.17.1. Prepare and Implement a Traffic Control Plan** Prior to the start of construction, the construction contractor shall prepare and submit a Traffic Control Plan (TCP) to Placer Country for review and approval. The TCP shall be implemented to minimize construction-related traffic impacts on affected roadways. The contractor shall coordinate the development and implementation of this plan with agencies with jurisdiction over the affected routes (i.e., Placer County), as appropriate, and consider any other nearby construction happening at the same time. The TCP shall, at a minimum: define traffic controls, such as flag persons, warning signs, lights, barricades, cones, and detours, etc. to provide safe work areas and to warn, control, protect, and expedite vehicular traffic, based on County requirements and any conditions of project approval and shall aim to coordinate with other projects to minimize disruption to local and regional traffic flows during construction; • show any proposed construction access location and encroachment onto a County roadway. The construction access location shall be reviewed and approved by the County at the time of Improvement Plan submittal. All approved construction access locations shall include an appropriate construction encroachment designed to the satisfaction of the County that may exceed typical construction encroachment designs (i.e. Baseline Road construction encroachment may be required to include larger radii and acceleration and deceleration tapers). • require the installation and maintenance of construction area signs in accordance with the current edition of the California Department of Transportation Manual on Uniform Traffic Control Devices (CA MUTCD) and/or California Department of Transportation Manual of Traffic Controls for Construction and Maintenance Work Zones, Traffic Control Plans must follow California MUTCD (Chapter 6) guidelines; • discuss work hours and haul routes, delineate work areas, and identify traffic control methods and plans for flagging; • develop and implement a process for communicating with affected residents and landowners about the project before the start of construction. The public notice shall include posting notices and appropriate signage regarding construction activities. The written notification shall include the construction schedule, the exact location and duration of activities on each roadway (e.g., which roads/lanes and access points/driveways will be blocked on which days and for how long), and contact information for questions and complaints; • notify the public regarding alternative routes that may be available to avoid delays; • include measures to avoid disruptions or delays in access for emergency service vehicles and to keep emergency service agencies fully informed of road closures, detours, and delays. Police departments, fire departments, ambulance services, and paramedic services shall be notified at least one month in advance by the construction contractor of the proposed locations, nature, timing, and duration of any construction activities and advised of any access restrictions that could impact their effectiveness; and • identify all emergency service agencies, include contact information for those agencies, assign responsibility for notifying the service providers, and specify coordination procedures. TCPs shall be provided to all affected police departments, fire departments, ambulance and paramedic services.	Before construction and/or prior to Improvement Plan approval, develop a Traffic Control Plan and submit to Placer County for review and approval. Implement Traffic Control Plan during construction.	Before and during construction	SMUD and Contractor	SMUD and Placer County	All project components during construction

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
Transportation	**Impact 3.17-1.** Conflict with a program plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities.	**Mitigation Measure 3.17-2. Prepare and Implement a Construction Transportation Plan** Where construction traffic has the potential to significantly affect regional and local roadways (e.g., Baseline Road, South Brewer Road, and Phillip Road) by generating additional vehicle trips, or potentially causing unsafe situations by construction vehicles making left hand turns into the construction site, the construction contractor shall prepare and implement a Construction Transportation Plan (CTP) describing alternate traffic routes, timing of commutes, reduction in crew-related traffic, potential temporary turning lanes/pockets, if required, and other mitigation methods for reducing construction-generated additional traffic on regional and local roadways and to guarantee safe local traffic patterns during construction. The CTP shall also require the following: • distribute worker trips to multiple roadways and limit construction-related trips along South Brewer Road and Phillip Road to 100 worker trips or less during the peak hours (7 a.m. – 9 a.m. and 4 p.m. – 6 p.m.); • if deemed necessary by the County to ensure safe traffic conditions during construction based on advanced designs, include temporary turning lanes/pockets off Baseline Road, South Brewer Road, and Phillip Road in the CTP; these temporary turning lanes/pockets shall be engineered according to County standards, and shall be used temporarily only during construction; following construction, any turning lanes/pockets shall be removed, and the road conditions shall be restored to pre-construction conditions; • avoid construction-related trips during the morning and afternoon peak hours; and • construction workers park personal vehicles at staging yards and carpool to work sites within the project area. The construction contractor shall submit the CTP to Placer County for review and approval 30 days prior to commencing construction activities. Placer County may share the plan with other interested parties at their discretion and incorporate specific input from third parties into their plan comments as they deem appropriate.	Prior to Improvement Plan approval and/or 30 days before construction begins, contractor will submit a Construction Transportation Plan to SMUD and Placer County. CTP to be implemented during construction.	Before and during construction	Contractor	SMUD and Placer County	All project components during construction
Transportation	**Impact 3.17-3.** Substantially increase hazards due to a geometric design feature or incompatible uses.	Implement Mitigation Measures 3.17-1 and 3.17-2, and; **Mitigation Measure 3.17-3. Resurface, Repair and/or Restore Roadways to Pre-Construction Condition.** Prior to Improvement Plan approval, the applicant shall provide a video/photo survey of the existing surfacing condition of South Brewer and Phillip Roads to the satisfaction of the County. A cash security deposit (i.e. cash, CD, letter of credit – no bonds) shall also be provided to the County in an amount determined by the County and SMUD for the repair and restoration of the roadways to their original condition, including removal of any temporary turning lanes/pockets as discussed under Mitigation Measure 3.17-2 that would be constructed under the CTP, if deemed necessary based on advanced designs. Upon completion of construction of the project improvements (i.e. beginning operation/use of the site; and/or prior to Building Permit Certificate of Occupancy; and/or acceptance of the project construction as complete by the County), the existing South Brewer and Phillip roadway surfaces shall be repaired and/or restored to their original condition by the developer, including removal of any temporary improvement to ensure save access, such as temporary turning lanes/pockets. The improvements required for repair and restoration shall be described by and at the sole discretion of the County and shall be constructed to County standards and to the satisfaction of the County. Improvement Plans and/or Encroachment Permits will need to be obtained by the developer for any required improvements, repair and restoration construction. After completing the repair and restoration to the satisfaction of the County, the cash security deposit will be released.	See MM 3.17-1 and 3.17-2 Applicant to provide video/photo survey and cash security deposit to Placer County prior to Improvement Plan approval. After project construction, roads that were modified will be returned to initial conditions. After completing the repair and restoration to the satisfaction of the County, the cash security deposit will be released.	See MM 3.17-1 and 3.17-2 Before and after construction	See MM 3.17-1 and 3.17-2 Contractor and SMUD	See MM 3.17-1 and 3.17-2 Placer County	All project components involved in construction

Table 4-1. Summary of Impacts and Mitigation Measures

CEQA Issue Area	Impacts	Mitigation Measures	Implementation Duration	Monitoring Duration	Responsibility		Applicable Project Component
					Implementation	Monitoring	
Transportation	**Impact 3.17-4.** Inadequate emergency access.	Implement Mitigation Measure 3.17-1.	See MM 3.17-1	See MM 3.17-1	See MM 3.17-1	See MM 3.17-1	See MM 3.17-1
Tribal Cultural Resources	**Impact 3.18-1.** Impacts to tribal cultural resources as defined in Public Resources Code § 21074.	**Mitigation Measure 3.18-1** The following method is intended to minimize impacts to existing or previously undiscovered Tribal Cultural Resources (TCRs), archaeological, or cultural resources during a project's ground disturbing activities at the following locations: substation, switch yard, battery storage area. The project proponent and its construction contractor(s) will implement the following methods to identify TCRs at the earliest possible time during project-related earthmoving activities: • A compensated (paid) Tribal Monitor from a traditionally and culturally affiliated Native American Tribe shall be retained to monitor specified ground disturbing project related activities in the substation, switch yard, and battery storage area of the project area. • The specified ground disturbing activities include grading, trenching, and ground disturbance to a depth of up to approximately 6 feet. • Spot monitoring at these locations will be done by the Tribal Monitor in coordination with the construction schedule. • Consulting Tribes shall be contacted at least 2 weeks prior to project ground-disturbing activities in order to retain the services of a paid Tribal Monitor. The duration of the monitoring and construction schedule shall be determined at this time. • Field-monitoring activities will be documented on a Tribal Monitor log. The total time commitment of the Tribal Monitor will vary depending on the intensity and location of construction and the sensitivity of the area, including the number of finds. • The Tribal Monitor/s shall wear the appropriate safety equipment and shall have the necessary background training in construction safety protocols. • The Tribal Monitor/s will have all necessary background training to identify and recommend appropriate treatment for any discoveries, including sites and objects of cultural value, that are a potential TCR. • Tribal Monitors or Tribal Representatives have the authority to request that work be temporarily stopped, diverted, or slowed within 100 feet of the direct impact area if sites or objects of significance are identified. Only a Tribal Monitor or Representative from a culturally affiliated Tribe can recommend appropriate treatment and final disposition of TCRs. • When avoidance is infeasible, preservation in place is the preferred option for mitigation of TCRs under CEQA and Tribal protocols, and every effort shall be made to preserve the resources in place, including through project redesign, if feasible. Culturally appropriate treatment may be, but is not limited to, processing materials for reburial, minimizing handling of cultural objects, leaving objects in place within the landscape, or returning objects to a location within the project area where they will not be subject to future impacts. Permanent curation of TCRs will not take place unless approved in writing by consulting Tribes. • The contractor shall implement any measures deemed by the CEQA lead agency to be necessary and feasible to preserve in place, avoid, or minimize impacts to the resource, including, but not limited to, facilitating the appropriate tribal treatment of the find, as necessary. Treatment that preserves or restores the cultural character and integrity of a TCR may include Tribal Monitoring, culturally appropriate recovery of cultural objects, and reburial of cultural objects or cultural soil. • Work at the discovery location cannot resume until all necessary investigation and evaluation of the discovery under the requirements of the CEQA, including AB 52, have been satisfied.	Tribal Monitor will be present during ground-disturbing activities in the substation, switch yard, and battery storage area. Consulting Tribes shall be contacted at least 2 weeks prior to project ground disturbing activities.	Before and during construction	Tribal Monitor, Contractor, and SMUD	SMUD and NAHC	All project components during construction consisting of ground disturbing activities at the substation, switch yard, and battery storage area

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