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Subject: Spikes Peak Solar Project (Project)
Notice of Preparation (NOP)
State Clearinghouse No. 2025060597

Dear Ana Hernandez:

The California Department of Fish and Wildlife (CDFW) received a NOP from Merced County (County) for the above-referenced Project pursuant to the California Environmental Quality Act (CEQA) and CEQA Guidelines.¹

Thank you for the opportunity to provide comments and recommendations regarding those activities involved in the Project that may affect California fish and wildlife. Likewise, CDFW appreciates the opportunity to provide comments regarding those aspects of the Project that CDFW, by law, may be required to carry out or approve through the exercise of its own regulatory authority under 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 (*Id.*, § 1802). Similarly, for purposes of CEQA, CDFW is charged by law to provide, as available, biological

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.

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 2

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.

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. 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.), related authorization as provided by the Fish and Game Code may be required.

Nesting Birds: CDFW has jurisdiction over actions with potential to result in the disturbance or destruction of active nest sites or the unauthorized take of birds. Fish and Game Code sections that protect birds, their eggs and nests include, sections 3503 (regarding unlawful take, possession or needless destruction of the nest or eggs of any bird), 3503.5 (regarding the take, possession or destruction of any birds-of-prey or their nests or eggs), and 3513 (regarding unlawful take of any migratory nongame bird).

Unlisted Species: Species of plants and animals need not be officially listed as Endangered, Rare, or Threatened (E, R, or T) on any State or federal list to be considered E, R, or T under CEQA. If a species can be shown to meet the criteria for E, R, or T, as specified in the CEQA Guidelines section 15380, CDFW recommends it be fully considered in the environmental analysis for the Project.

PROJECT DESCRIPTION SUMMARY

Proponent: Spikes Peak Solar, LLC, a wholly owned subsidiary of EDF Renewables Development, Inc.

Objective: The proposed Project is construction and operation of a 150-megawatt (MW) photovoltaic (PV) solar power generation facility with up to a 150-MW battery energy storage system (BESS). The Project also includes construction of a 230-kilovolt generation tie (gen-tie) line to connect to an existing switching station, one onsite substation, a 3,600-square-foot operations and maintenance building, an onsite roadway system, and telecommunications equipment (e.g., microwave/communications tower), among other components.

Location: The proposed Project would be located on approximately 860 acres of private land in northwestern Merced County. The Project site consists of Assessor Parcel Numbers (APNs) 069-220- 014, 069-220-036, 069-220-046, 069-220-049, 069-220-067, and 069-240-028. The proposed Project site is located approximately 4 miles northeast of the San Luis Reservoir and approximately 3 miles northwest of the unincorporated community of Santa Nella. The site is just south of Butts Road and

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 3

bounded to the west by the California Aqueduct and to the east by Interstate 5 (I-5) and the Delta Mendota Canal. The southern portion of the Project site abuts McCabe Road and the existing Quinto Solar Facility.

COMMENTS AND RECOMMENDATIONS

CDFW offers the following comments and recommendations to assist the County in adequately identifying and/or mitigating the Project's significant, or potentially significant, direct and indirect impacts on fish and wildlife (biological) resources. Editorial comments or other suggestions may also be included to improve the Draft Environmental Impact Report (DEIR) prepared for this Project.

San Joaquin Kit Fox Impacts and Current Conservation Easements

Monte Dorado Easement Lands

The land upon which the Project is proposed to be sited was conserved in perpetuity with a recorded conservation easement, known as the Quinto Farms Easement Lands (Easement). The proposed Project site appears to be entirely within the Easement, which was recorded in 2005 primarily to benefit San Joaquin kit fox and San Joaquin kit fox connectivity; discussion of this issue was absent from the NOP. The County conveyed to CDFW via email correspondence that the Easement was amended in March 2025, with alternate (i.e., replacement) mitigation land being agreed to by the landowner and U.S. Fish and Wildlife Service (USFWS); USFWS subsequently verbally confirmed with CDFW that the Easement has not yet been modified but if the Project is approved by Merced County that potential alternate mitigation lands north of Los Banos Reservoir have been identified.

The Easement area was originally conserved as perpetual mitigation to offset direct project related impacts to the State threatened and federally endangered San Joaquin kit fox (*Vulpes macrotis mutica*; SJKF) as well as to address the loss of SJKF habitat connectivity caused by three separate residential development project within the County's Santa Nella Community Specific Plan (CSP) area (Monte Dorado, Arnaudo-Wathen Castanos, and River West, hereafter, Santa Nella CSP projects). The USFWS is a third-party beneficiary on the Easement. CDFW is not a third-party beneficiary on the Easement.

Quinto Solar Conserved Lands

The Quinto Solar Project (Quinto Solar) is a 110-MW solar PV electrical generating facility approved by the County in 2013 that is partially sited on the Easement and necessitated modifications to the Easement at the time of project approval. As a condition of the County's Quinto Solar approval, two parcels located directly north (i.e.,

Ana Hernandez
 Merced County Community and Economic Development Department
 July 11, 2025
 Page 4

McCabe Road Parcel) and south of the Easement (i.e., Stockton Terminal Parcel), were permanently conserved as mitigation to offset direct impacts to SJKF and SJKF connectivity (Quinto Solar Mitigation Lands) posed by the Quinto Solar project. The Quinto Solar Mitigation Lands had the intended purpose of further enhancing the permanently conserved lands for SJKF connectivity anchored by the Easement. CDFW was designated as a third-party beneficiary on the Quinto Solar Mitigation Lands.

Santa Nella Community Specific Plan

The County's Recirculated Program Environmental Impact Report prepared for the Santa Nella CSP (CSP EIR; 2001) required either preservation of habitat onsite or acquisition of suitable habitat offsite to mitigate for impacts to SJKF (Mitigation Measure 4.10-1). The CSP EIR specified that offsite habitat replacement should be located as close as possible to the Santa Nella CSP and proposed specific locations for offsite mitigation, which together formed a large, contiguous swath of land to the northeast of the San Luis Reservoir, west of I-5, and south of Cottonwood Road. The Easement and Quinto Solar Mitigation Lands fall within the area of the CSP EIR's proposed offsite mitigation lands.

Potential Project Impacts to San Joaquin Kit Fox Connectivity

For decades, the Santa Nella area has been identified by CDFW and the USFWS as an essential but constrained movement corridor or "pinch-point" in the connectivity between northern and southern populations of SJKF (Constable et al. 2009). An influx of SJKF individuals from southern populations, including the Los Banos Valley core kit fox population located immediately to the south of San Luis Reservoir, enabled by the north-south movement corridor, is thought to be critical to the continued existence and genetic diversity of the northern SJKF population. The creation of the San Luis Reservoir and O'Neil Forebay created a large movement barrier to the north-south movement of SJKF, and busy highways in the area such as I-5 and State Routes 152 and 33, as well as existing urban development, further compound this problem. CDFW comments provided during the CEQA process for Quinto Solar (2011-2012) indicated that implementation of the Quinto Solar project could result in the permanent fragmentation of this north-south movement corridor (Attachment 1). Based on the information provided in the Project NOP, CDFW is concerned that the Project could have similar if not more severe impacts on SJKF connectivity due to its current siting and further would compromise and render ineffective the previous conservation efforts and associated County conditions of approval, specifically related to the Santa Nella CSP projects and Quinto Solar project.

Quinto Solar was ultimately approved by the County within this critical pinch point area, but, as detailed above, the Quinto Solar Mitigation Lands, which, combined with the previously recorded Easement, created an expanded and enhanced north-south

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 5

corridor for SJKF. Approving the Project in the Easement area could degrade a large and particularly important portion of this corridor, further restricting the Santa Nella “pinch-point” and potentially resulting in permanent isolation of SJKF from the northern portion of their range and resulting in a significant and permanent range reduction of the species. Additionally, were the Project to be approved, the Quinto Solar Mitigation Lands (on which CDFW is a third-party beneficiary) at the north and south ends of the Project site would be fragmented, would provide minimal connectivity for SJKF movement, and would no longer function as intended.

As mentioned above, the NOP does not discuss the Easement, nor does it provide background on how the Project could proceed given the Easement restrictions. In addition, the NOP does not discuss how the previous mitigation obligations of the Quinto solar and Santa Nella CSP projects, which were required in that location, would remain satisfied. CDFW recommends that a robust discussion be included in the DEIR on these issues. Specifically, this discussion should detail the proposed process by which the Easement could allow for construction of the Project, evaluate the proposed Project’s impact on Quinto Solar and Santa Nella CSP project mitigation, and identify whether there is a need to replace prior mitigation obligations and values associated with these previously approved projects. This discussion should also include a robust cumulative impacts analysis that considers the cumulative impacts to SJKF from the Project, while incorporating the cumulative impacts of Quinto Solar and other solar development within the Project vicinity, as well as all projects previously approved in the Santa Nella CSP.

In summary, CDFW asserts that the Project, as currently proposed, is likely to result in significant and unavoidable impacts to SJKF and SJKF connectivity, fragmenting and degrading the previously conserved lands that comprise the only remaining intact north-south movement corridor in the vicinity. As such, CDFW strongly recommends that the Project proponent consider siting the Project outside of the Easement and away from the Quinto Solar Mitigation Lands. CDFW recommends the DEIR describe and quantify the direct and indirect potential impacts to SJKF from the Project, including those to the SJKF “pinch point” and other conservation areas, and outline specific proposed mitigation measures.

Special-Status Species

The NOP describes the Project site as mostly undeveloped grassland that is currently used for cattle grazing, with the presence of two intermittent streams running through the site (Quinto and Romero Creeks). Based on a review of the Project description, California Natural Diversity Database (CNDDDB) records, and aerial imagery of the Project site and surrounding habitat, the Project is within the geographic range of and could impact several special-status animal and plant species including, but not limited to, those listed in Attachment 2.

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 6

In order to support the adequate assessment of potential impacts to biological resources in the DEIR, CDFW recommends that a qualified biologist perform relevant database reviews and other research of the Project area, then conduct focused habitat assessments and/or focused biological surveys during the appropriate survey period(s) in order to determine whether any special-status species may be present within the Project site.

CDFW recommends this initial work be documented within the DEIR and used to inform further efforts that may be needed thereafter including the need for additional protocol surveys and/or the development of avoidance, minimization, and/or mitigation measures. This information and analysis may then be used in the DEIR to consider the development of modified or new Project alternatives to avoid and minimize potentially significant environmental impacts on the biological environment. This information is critical to make an informed decision during the CEQA process and to ensure Project compliance with CESA, Fish and Game Code, and other applicable State and federal laws and regulations.

San Joaquin Kit Fox

As mentioned previously, the Project site is within the known geographic range of SJKF and there are also multiple recorded occurrences of SJKF in the Project vicinity (CDFW 2025). As discussed in detail above, the Project site is located within a critical portion of the remnant north-south movement corridor for SJKF, which could be permanently fragmented as a result of the Project.

SJKF may be attracted to both construction materials (pipes, etc.) and construction footprints due to the type and level of activity (excavation, etc.) and the loose, friable soils that are created because of intensive ground disturbance. SJKF will readily use pipes, culverts, shipping containers, portable buildings, and stacks of materials (e.g., I-beams, wooden boards) with spaces within or underneath them for denning (Cypher et al. 2023). Therefore, as a mitigation measure during construction, CDFW recommends thoroughly inspecting all construction materials or structures with sufficient spaces for SJKF before these materials are used or moved in any way. To help deter SJKF from creating dens under construction materials, CDFW recommends elevating materials one foot or more off the ground using k-rails or similar structures.

To assess and minimize potential Project related impacts to SJKF and their dens, CDFW recommends that a qualified biologist assess the presence/absence of SJKF dens by conducting focused surveys to detect SJKF dens and their sign in all Project areas and a 500-foot buffer of Project areas as part of the biological studies conducted in support of the DEIR.

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 7

CDFW also recommends the DEIR include the following:

Recommended Mitigation Measure 1: SJKF Preconstruction Surveys

CDFW recommends assessing presence/absence of SJKF by conducting focused den surveys for the species prior to the initiation of Project ground disturbance activities. Specifically, CDFW recommends conducting these surveys over the entirety of the Project site no less than 14 days and no more than 30 days prior to beginning of ground and/or vegetation disturbing activities.

Recommended Mitigation Measure 2: SJKF Avoidance Buffer

CDFW recommends implementing no-disturbance buffers, as described in the USFWS “Standardized Recommendations for Protection of the San Joaquin Kit Fox Prior to or During Ground Disturbance” (2011) (USFWS Protocol) around potentially suitable or known SJKF den sites.

Recommended Mitigation Measure 3: SJKF Take Authorization

If the no-disturbance buffers outlined in the USFWS Protocol for SJKF is not feasible, CDFW recommends that consultation with CDFW occur to discuss how to implement the Project and avoid take. If take cannot be avoided, acquisition of an Incidental Take Permit (ITP), pursuant to Fish and Game Code section 2081 subdivision (b) is required to comply with CESA.

Recommended Mitigation Measure 4: SJKF Fencing

CDFW recommends that all fencing installed on the perimeter of the solar Project be designed to allow for passage of SJKF, their prey and other wildlife, while impeding the passage of larger predators such as coyotes and similar species. Perimeter fencing should be installed with a four (4) to six (6) inch gap from the bottom of the fencing material and knuckled back to form a smooth edge and allow permeability for wildlife.

Recommended mitigation Measure 5: Habitat Management within the Project Site

To help reduce Project related impacts to SJKF, CDFW recommends that minimal grading occur during construction and that during operation the Project site be managed in a condition compatible with SJKF movement, foraging, and denning. To accommodate this target, CDFW recommends preparation of a vegetation control plan, which should describe management strategies for vegetation control through mowing and/or sheep and/or goat grazing. Included

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 8

strategies should help reduce wildfire risk and maintain vegetation height and densities that are ideal for SJKF to maximize the potential for any residual habitat value for SJKF within the Project Area post construction.

Swainson's Hawk

The State threatened Swainson's hawk (*Buteo swainsoni*; SWHA) was documented near the Project site (CDFW 2025) and are known to routinely nest in the O-Neil Forebay Wildlife Area, which is less than 2 miles from the Project site. SWHA are known to breed within the Central Valley of California and prefer to nest and forage in alfalfa, fallow fields, field crops, and grassland habitats with a sufficient source of small mammals (CDFG 1994). Based on aerial imagery and the information provided in the NOP, most if not all the Project site contains suitable habitat for SWHA foraging. In addition, Romero Creek may provide potential SWHA nesting habitat near the Project site.

As SWHA have the potential to use the Project site, CDFW recommends that a qualified biologist conduct surveys for nesting SWHA following the entire survey methodology developed by the SWHA Technical Advisory Committee (SWHA TAC 2000) as part of the biological technical studies conducted in support of the DEIR.

In addition to conducting SWHA surveys, CDFW recommends the DEIR include the following measures:

Recommended Mitigation Measure 6: SWHA Surveys Prior to Construction

Depending on the time between the initial survey efforts conducted in support of the DEIR and Project construction, CDFW recommends that additional surveys, following the survey methodology developed by the SWHA Technical Advisory Committee, be repeated the survey season immediately prior to construction.

Recommended Mitigation Measure 7: SWHA Avoidance Buffer

If Project-specific activities will take place during the SWHA nesting season (i.e., March 1 through September 15), and active SWHA nests are present, CDFW recommends a minimum ½-mile no-disturbance buffer be delineated and maintained around each nest, regardless of whether it was detected by surveys or observed incidentally. These buffers would remain in place until the breeding season has ended or until a qualified biologist has determined that the birds have fledged and are no longer reliant upon the nest or parental care for survival, to prevent nest abandonment and other take of SWHA as a result of Project activities.

Ana Hernandez
 Merced County Community and Economic Development Department
 July 11, 2025
 Page 9

Recommended Mitigation Measure 8: SWHA Take Authorization

In the event an active SWHA nest is detected, and a ½-mile no-disturbance buffer is not feasible, consultation with CDFW is warranted to discuss how to implement the Project and avoid take. If take cannot be avoided, take authorization through the acquisition of an ITP, pursuant to Fish and Game Code section 2081 subdivision (b), is necessary to comply with CESA.

Recommended Mitigation Measure 9: SWHA Foraging Habitat Mitigation

Finally, CDFW recommends compensation for the loss of SWHA foraging habitat as described in CDFW's "Staff Report Regarding Mitigation for Impacts to Swainson's Hawks" (CDFG 1994) to reduce impacts to foraging habitat to less than significant. The Staff Report recommends that mitigation for habitat loss occur within a minimum distance of 10 miles from known nest sites. CDFW has the following recommendations based on the Staff Report:

- For projects within 1 mile of an active nest tree, a minimum of 1 acre of habitat management (HM) land for each acre of development is advised.
- For projects within 5 miles of an active nest but greater than 1 mile, a minimum of ¾ acre of HM land for each acre of development is advised.
- For projects within 10 miles of an active nest tree but greater than 5 miles from an active nest tree, a minimum of ½ acre of HM land for each acre of development is advised.

Tricolored Blackbird

The Project site is within the known geographic range of the State threatened tricolored blackbird (*Agelaius tricolor*; TRBL), and multiple recent occurrences were documented within 3 to 5 miles of the Project site (CDFW 2025). TRBL breed within the vicinity of fresh water, primarily in marshy areas. Important sites for nesting colonies include heavy growths of cattails, tules, thistles, willows, blackberries, mustard, nettles, and salt cedar (Grinnell and Miller 1944). TRBL are also known to breed in alfalfa, wheat, and other low agricultural crop fields, and these fields are becoming an increasingly important nesting habitat type, particularly in the San Joaquin Valley (Beedy et al. 2023). Based on aerial imagery, the Project site and adjacent areas may provide suitable habitat for TRBL nesting and foraging, particularly near Quinto Creek and Romero Creek.

As TRBL have the potential to use the Project site and have been documented within the Project vicinity, CDFW recommends that a qualified biologist conduct a habitat assessment as part of the biological technical studies conducted in support of the DEIR.

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 10

If potentially suitable habitat is identified, consultation with CDFW is recommended for guidance on focused survey methods and mitigation measures such as avoidance, take authorization, and mitigation. If take cannot be avoided, take authorization through the acquisition of an ITP, pursuant to Fish and Game Code section 2081 subdivision (b) is necessary to comply with CESA.

California Tiger Salamander

The Project site is within the known geographic range of the State and federally threatened California tiger salamander (*Ambystoma californiense*; CTS), and a recent occurrence is documented 6 miles from the Project site (CDFW 2025). CTS breed and develop in vernal and seasonal pools and stock ponds in grassland, woodland, and scrub habitat types and have been determined to be physiologically capable of dispersing up to approximately 1 ½-miles from seasonally flooded wetlands (Searcy and Shaffer 2011). As CTS are documented in the Project vicinity and have the potential to utilize the habitat within the Project site, CDFW recommends that a qualified biologist conduct a habitat assessment as part of the biological technical studies conducted in support of the DEIR. If potentially suitable habitat is identified, CDFW recommends that a qualified biologist conduct protocol-level surveys in accordance with the USFWS “Interim Guidance on Site Assessment and Field Surveys for Determining Presence or a Negative Finding of the California Tiger Salamander” (USFWS 2003) at the appropriate time of year to determine the existence and extent of CTS breeding and refugia habitat. The protocol-level surveys for CTS require more than one survey season and are dependent upon sufficient rainfall to complete. If CTS are detected during surveys, consultation with CDFW is recommended for guidance on focused survey methods and mitigation measures such as avoidance, take authorization, and mitigation. If take cannot be avoided, take authorization through the acquisition of an ITP, pursuant to Fish and Game Code section 2081 subdivision (b) is necessary to comply with CESA.

Western Burrowing Owl

The California Fish and Game Commission (FGC) approved western burrowing owl (*Athene cunicularia hypugaea*; BUOW) as a candidate for potential listing as a protected species under CESA on October 10, 2024, and published these findings in the California Regulatory Notice Register (Notice Register) on October 25, 2024. As such, BUOW is now a candidate under CESA and receives the same legal protection afforded to an endangered or threatened species (Fish & G. Code, §§ 2074.2 & 2085).

The Project site is within the known geographic range of BUOW, and there are numerous occurrences located near the Project site, including one recent occurrence less than 1 mile from the site (CDFW 2024). BUOW typically inhabit open grasslands and desert scrublands containing small mammal burrows, a requisite habitat feature used by BUOW for nesting and cover. BUOW are also known to occupy agricultural

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 11

habitats and may attempt to use “man-made burrows” such as pipes or culverts. Based on aerial imagery and the information provided in the NOP, the majority of the Project site may contain suitable habitat for BUOW nesting and foraging.

As BUOW have the potential to be present within the Project site, CDFW recommends assessing presence/absence of BUOW by having a qualified biologist conduct surveys following the 2012 Staff Report on Burrowing Owl Mitigation (CDFG 2012) as part of the biological studies conducted in support of the DEIR.

In addition to conducting BUOW surveys, CDFW recommends the DEIR include the following measures:

Recommended Mitigation Measure 10: BUOW Surveys Prior to Construction

Depending on the time between the initial survey efforts conducted in support of the DEIR and Project construction, CDFW recommends that additional surveys, following 2012 Staff Report on Burrowing Owl Mitigation (CDFG 2012) be repeated the survey season immediately prior to construction.

Recommended Mitigation Measure 11: BUOW Avoidance Buffer

Should a BUOW or known BUOW den (active or inactive) be detected, either during pre-construction surveys or construction activities, CDFW recommends that no-disturbance buffers, as outlined in the 2012 Staff Report on Burrowing Owl Mitigation, be implemented prior to and during any ground-disturbing activities. CDFW also recommends that these buffers be implemented for both wintering and breeding BUOW.

Recommended Mitigation Measure 12: BUOW Take Authorization

If a BUOW or known BUOW den (active or inactive) is detected, and the no-disturbance buffers outlined in the 2012 Staff Report on Burrowing Owl Mitigation are not feasible, consultation with CDFW is warranted to discuss how to implement the Project and avoid take. If take cannot be avoided, take authorization through the acquisition of an ITP, pursuant to Fish and Game Code section 2081 subdivision (b) is necessary to comply with CESA.

Crotch's Bumble Bee

The Project site is within the known geographic range of the State candidate Crotch's bumble bee (*Bombus crotchii*; CBB), and 2 occurrences documented within the past 2 to 3 years are within approximately 2.5 and 8 miles of the Project site (CDFW 2025).

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 12

CBB are known to inhabit a variety of habitats, including grasslands, scrublands, openings in woodlands, areas with bare ground including vacant lots, dirt roads, and levees (Xerces Society et al. 2018). CBB use requisite habitat elements for nesting, such as small mammal burrows and bunch/thatched grasses, which may be present in or near the Project site.

As CBB have the potential to be present within the Project site, CDFW recommends a qualified biologist conduct a habitat assessment to determine if the Project site and the immediate surrounding vicinity contain habitat suitable to support CBB. Potential nesting sites, which include all small mammal burrows, perennial bunch grasses, thatched annual grasses, brush piles, old bird nests, dead trees, and hollow logs should be documented as part of the assessment. If suitable habitat is identified, CDFW recommends a qualified biologist conduct focused surveys for CBB and their requisite habitat features following the methodology outlined in the Survey Considerations for California Endangered Species Act Candidate Bumble Bee Species (CDFW 2023).

In addition to conducting CBB habitat assessments and surveys, CDFW recommends the DEIR include the following measures:

Recommended Mitigation Measure 13: CBB Surveys Prior to Construction

Depending on the time between the initial survey efforts conducted in support of the DEIR and Project construction, CDFW recommends that a qualified biologist conduct focused surveys for CBB and their requisite habitat features following the methodology outlined in the Survey Considerations for California Endangered Species Act Candidate Bumble Bee Species (CDFW 2023) prior to the initiation of Project construction.

Recommended Mitigation Measure 14: CBB Avoidance

If CBB is detected, CDFW recommends that all small mammal burrows and thatched/bunch grasses be avoided by a minimum of 50 feet to avoid take and potentially significant impacts. If ground-disturbing activities will occur during the overwintering period (October through February), consultation with CDFW is warranted to discuss how to implement Project activities and avoid take. Any detection of CBB prior to or during Project implementation warrants consultation with CDFW to discuss how to avoid take.

Recommended Mitigation Measure 15: CBB Take Authorization

If take cannot be avoided, CDFW recommends acquiring an ITP pursuant to Fish and Game Code Section 2081(b), prior to initiating ground-disturbing activities.

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 13

Other Special-Status Animal Species

The Project site is within the known geographic range of several other special-status animal species including the State species of special concern (SSC) American badger (*Taxidea taxus*) and northern harrier (*Circus hudsonius*); the State SSC and federally proposed threatened northwestern pond turtle (*Actinemys marmorata*) and western spadefoot (*Spea hammondi*); the State SSC and federally threatened California red-legged frog (*Rana draytonii*); the State special animal and federally endangered vernal pool tadpole shrimp (*Lepidurus packardii*); and the State special animal and federally threatened vernal pool fairy shrimp (*Branchinecta lynchi*). There are recent occurrences of these species within 1 to 15 miles of the Project site, depending on the species (CDFW 2025). To evaluate Project-related impacts to these species, CDFW recommends that a general habitat assessment be conducted as part of the biological technical studies conducted in support of the DEIR, to determine whether suitable habitat assessment is present within the Project site. If suitable habitat is present, consultation with CDFW is recommended for guidance on mitigation measures such as avoidance, minimization, and mitigation.

Special-Status Plants

As stated in the NOP, the Project site consists primarily of undeveloped grassland habitat. Additionally, several special-status plant species, including but not limited to the California Rare Plant Rank 1B.2 spiny-sealed button-celery (*Eryngium spinosepalum*), are documented in the vicinity of and may occur within the Project site (CDFW 2025). As such, CDFW recommends the Project site be surveyed for special-status plants by a qualified botanist following the Protocols for Surveying and Evaluating Impacts to Special-Status Native Plant Populations and Sensitive Natural Communities (CDFW 2018). This protocol, which is intended to maximize detectability, includes identification of reference populations to facilitate the likelihood of field investigations occurring during the appropriate floristic period. Please note that adverse conditions from yearly weather patterns may prevent botanical field surveyors from determining the presence of, or accurately identifying, some special-status plants in the surveyed area. Disease, drought, predation, fire, herbivory, or other disturbance may also preclude presence or identification of special-status plants in any given year. Visiting the survey site in more than one year increases the likelihood of detection. If special-status plants are identified during surveys, consultation with CDFW is recommended for guidance on mitigation measures such as avoidance, minimization, and mitigation. If State endangered, threatened, or rare plants are identified during special-status plant surveys, and take cannot be avoided, then to ensure compliance with CESA and the Native Plant Protection Act (NPPA), consultation with CDFW for acquisition of an ITP, pursuant to Fish and Game Code section 2081, subdivision (b) and/or California Code of Regulations, Title 14, section 786.9, subdivision (b), is necessary to comply with CESA and the NPPA.

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 14

Tule Elk

The Project site is within the geographic range of tule elk (*Cervus canadensis nannodes*), and subpopulations occur in the areas surrounding the San Luis Reservoir (Reservoir). In its historic range, the tule elk once occupied much of central California. During the 1800s, hunters took large numbers of elk to the extent that by 1870 only a few elk remained in the State. Through legislative protection and a captive breeding program, tule elk were reintroduced to much of their native habitat throughout the Central Valley; however, continued population expansion will require large, contiguous tracts of land and the ability to disperse to additional habitat (Langner 2019). The tule elk inhabiting the areas surrounding the Reservoir, in the vicinity of the Project site, are already constrained by major barriers to movement, such as busy highways and waterways. As such, it is important that future development in this area consider and facilitate the movement of tule elk and other big game species that may be present.

For big game species (i.e. ungulates) and their predators (e.g. mountain lion, *Puma concolor*), utility-scale solar development may result in direct habitat loss and movement barriers from the use of impermeable security fencing; indirect habitat loss due to these species' tendency to avoid areas with human activity, especially in flat open areas where sight and sounds are unobstructed; and movement and barrier effects, which can influence survival, reduce the nutritional benefits of migration, and restrict migratory behaviors (Sawyer and Holst 2024).

CDFW recommends the DEIR evaluate the Project's potential impacts on tule elk and other large mammal species. CDFW also recommends the Project consider ways to enable movement of big game through the Project site, such as permeable fencing or modifications to siting, size, or configuration of arrays.

Editorial Comments and/or Suggestions

Battery Energy Storage System Evaluation

The proposed Project includes installation of a 150-MW battery energy storage system (BESS) on the Project site. CDFW is aware of recent catastrophic fires resulting from lithium-ion BESS operations at similar facilities within California. As such, these BESS systems warrant a careful evaluation for potential fire-related impacts to biological resources within and surrounding the Project site, particularly within nearby natural habitats. Lithium-ion BESS fires can release an array of toxic chemicals into the air (Mylenbusch et al. 2023). In addition to the obvious public health concerns, these emissions may also impact air quality for nearby wildlife, and harmful particulate matter may settle into soils or waterways, possibly affecting soil-dwelling organisms, burrowing mammals, and aquatic life. Concentrations of toxic gases and particulates may be highest in the immediate vicinity of the fire, and the risk of explosion exists, making the

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 15

area hazardous for firefighters. Further, the use of water for fire suppression is not always appropriate and may exacerbate the fire. The distinctive characteristics of a BESS fire may increase the potential of a resulting wildfire, particularly in largely undeveloped areas such as the Project site and surrounding grassland habitat.

As such, CDFW recommends the DEIR include a thorough analysis of the BESS component of the Project and evaluate the potential impacts of a catastrophic BESS fire on biological resources. CDFW recommends the evaluation detail the Project-specific measures that would be implemented to reduce the risk of catastrophic fire, and to carefully consider BESS siting, spacing, battery life and degradation, and the most appropriate fire protection/suppression system. CDFW also recommends that the BESS be sited away from the natural habitats adjacent to the Project site and that the Project evaluate multiple alternatives that avoid and minimize potential impacts to biological resources.

Cumulative Impacts: As discussed above, CDFW recommends that a cumulative impact analysis be conducted for all biological resources that will either be significantly or potentially significantly impacted by implementation of the Project, including those whose impacts are determined to be less than significant with mitigation incorporated or for those resources that are rare or in poor or declining health and will be impacted by the Project, even if those impacts are relatively small (i.e., less than significant). The cumulative impact analysis should consider the cumulative impacts to SJKF from the Project and surrounding projects including Quinto Solar and other solar development within the Project vicinity, as well as all projects approved in the Santa Nella CSP. The analysis should also consider cumulative impacts to connectivity for other highly mobile species (e.g., American badger, ungulates, and mountain lion). Cumulative impacts are recommended to be analyzed using an acceptable methodology to evaluate the impacts of past, present, and reasonably foreseeable future projects on resources and be focused specifically on the resource, not the Project. An appropriate resource study area should also be identified and mapped for each resource being analyzed and utilized for this analysis. CDFW staff is available for consultation in support of cumulative impacts analyses as a trustee and responsible agency under CEQA.

Wildlife Movement and Connectivity: As discussed above, the Project site is located in a “pinch-point” area between the northern and southern populations of SJKF. CDFW is concerned that the Project would result in significant impacts to SJKF connectivity within this pinch-point due to the Project’s current siting. Additionally, the Project vicinity supports significant biological resources and contains habitat connections and supports movement across the broader landscape, sustaining both transitory and permanent wildlife populations. In addition to the recommendation for SJKF friendly fencing, as discussed above, CDFW recommends that potential wildlife corridors should be identified and included as part of the Project design within the DEIR to facilitate movement of wildlife such as SJKF through the Project site.

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 16

Project Alternatives Analysis: CDFW recommends that the information and results obtained from the biological technical surveys, studies, and analysis conducted in support of the Project's DEIR be used to develop and modify the Project's alternatives to avoid and minimize impacts to biological resources to the maximum extent possible. When efforts to avoid and minimize have been exhausted, CDFW advises that remaining impacts to sensitive biological resources be mitigated to reduce impacts to a less than significant level, if feasible.

Lake and Streambed Alteration: According to the NOP, two intermittent streams (Quinto and Romero Creeks) are present on the Project site, and aerial imagery suggests that additional features may also run through the site. Project activities that substantially change the bed, bank, and channel of any river, stream, or lake are subject to CDFW's regulatory authority pursuant Fish and Game Code section 1600 et seq. Fish and Game Code section 1602 requires an entity to notify CDFW prior to commencing any activity that may (a) substantially divert or obstruct the natural flow of any river, stream, or lake; (b) substantially change or use any material from the bed, bank, or channel of any river, stream, or lake (including the removal of riparian vegetation); (c) deposit debris, waste or other materials that could pass into any river, stream, or lake. "Any river, stream, or lake" includes those that are ephemeral or intermittent as well as those that are perennial and may include those that are highly modified such as canals and retention basins.

CDFW is required to comply with CEQA in the issuance of a Lake or Streambed Alteration Agreement (LSAA); therefore, if the CEQA document approved for the Project does not adequately describe the Project and its impacts to lakes or streams, a subsequent CEQA analysis may be necessary for LSAA issuance. For information on notification requirements, please refer to CDFW's website (<https://wildlife.ca.gov/Conservation/LSA>) or contact CDFW staff in the Central Region Lake and Streambed Alteration Program at (559) 243-4593.

Federally Listed Species: CDFW recommends consulting with the USFWS regarding potential impacts to federally listed species including, but not limited to, SJKE, CTS, California red-legged frog, and federally listed branchiopods. Take under the Federal Endangered Species Act (ESA) is more broadly defined than CESA; take under the ESA also includes significant habitat modification or degradation that could result in death or injury to a listed species by interfering with essential behavioral patterns such as breeding, foraging, or nesting. Consultation with the USFWS in order to comply with the ESA is advised well in advance of any Project activities.

Nesting Birds: CDFW encourages that Project ground-disturbing activities occur during the bird non-nesting season; however, if ground-disturbing or vegetation-disturbing activities must occur during the nesting season (February 1st through September 15th), the Project applicant is responsible for ensuring that implementation of the Project does

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 17

not result in violation of the Migratory Bird Treaty Act or relevant Fish and Game Code sections as referenced above.

If the nesting season cannot be avoided, CDFW recommends that a qualified biologist conduct a pre-construction survey for active nests no more than 10 days prior to the start of ground or vegetation disturbance to maximize the probability that nests that could potentially be impacted are detected. CDFW also recommends that surveys cover a sufficient area around the Project site to identify nests and determine their status. A sufficient area means any area potentially affected, either directly or indirectly, by the Project. In addition to direct impacts (i.e., nest destruction), noise, vibration, and movement of workers or equipment could also affect nests. CDFW recommends that a qualified biologist establish a behavioral baseline of all identified nests. Once Project activities begin, CDFW recommends having a qualified biologist continuously monitor nests to detect behavioral changes resulting from the Project. If behavioral changes occur, CDFW recommends halting the work causing that change and consulting with CDFW for additional avoidance and minimization measures.

If continuous monitoring of identified nests by a qualified biologist is not feasible, CDFW recommends a minimum no-disturbance buffer of 250 feet around active nests of non-listed bird species and a 500-foot no-disturbance buffer around active nests of non-listed raptors. These buffers are advised to remain in place until the breeding season has ended or until a qualified biologist has determined the birds have fledged and are no longer reliant upon the nest or on-site parental care for survival. Variance from these no-disturbance buffers is possible when there is a compelling biological or ecological reason to do so, such as when the Project site would be concealed from a nest site by topography. CDFW recommends that a qualified biologist advise and support any variance from these buffers and notify CDFW in advance of implementing a variance.

CNDDDB: Please note that the CNDDDB is populated by records through voluntary submissions of species detections. As a result, species may be present in locations not depicted in the CNDDDB but where there is suitable habitat features capable of supporting species. A lack of an occurrence record in the CNDDDB does not mean a species is not present. In order to adequately assess any potential Project-related impacts to biological resources, surveys conducted by a qualified biologist during the appropriate survey period(s) using the appropriate protocol survey methodology are warranted in order to determine whether or not any special-status species are present at or near the Project site.

Artificial Lighting: Installation of outdoor artificial night lighting can disrupt the circadian rhythms of many wildlife species. Many species use photoperiod cues for communication, determining when to begin foraging, thermoregulation behavior, and migration (Longcore and Rich 2004, Miller 2006, Nightingale et al. 2006, Perry et al. 2008, Stone et al. 2009). Phototaxis, a phenomenon which results in attraction and

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 18

movement towards light, can disorient, entrap, and temporarily blind wildlife species that experience it (Longcore and Rich 2004). Project activities could result in disruption of wildlife behavior, inadvertent injury, or mortality.

CDFW recommends that the DEIR for the Project include an analysis of artificial lighting as it relates to biological resources and incorporate enforceable mitigation measures to decrease the impacts of artificial outdoor lighting on wildlife species. Potentially feasible mitigation measures include motion sensitive lighting; mounting light fixtures as low as possible to minimize light trespass; use of light fittings that direct and confine the spread of light downward; and use of long-wavelength light sources. In addition, CDFW recommends that lighting is not installed in ecologically sensitive areas (e.g., streams, wetlands, and habitat used by special-status species, such as nesting/roosting sites and riparian corridors) and the use of the white/blue wavelengths of the light spectrum be avoided.

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 CNDDB. The CNDDB field survey form can be found at the following link: <https://www.wildlife.ca.gov/Data/CNDDB/Submitting-Data>. The completed form can be mailed electronically to the CNDDB at the following email address: CNDDB@wildlife.ca.gov. The types of information reported to the CNDDB can be found at the following link: <https://www.wildlife.ca.gov/Data/CNDDB/Plants-and-Animals>.

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).

CONCLUSION

CDFW appreciates the opportunity to comment to assist the County in identifying and mitigating Project impacts on biological resources. Please see the enclosed Mitigation Monitoring and Reporting Program (MMRP) table (Attachment 3) which corresponds with the recommended mitigation measures in this comment letter. If you have any

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 19

questions, please contact Jeremy Pohlman, Senior Environmental Scientist (Supervisor), at the address provided on this letterhead, by telephone at (805) 503 - 2375, or by electronic mail at Jeremy.Pohlman@wildlife.ca.gov.

Sincerely,

DocuSigned by:

12950B95267A4F5...

For Julie A. Vance
Regional Manager

ATTACHMENTS

ec: State Clearinghouse
Land Use and Climate Innovation
state.clearinghouse@lci.ca.gov

Justin Sloan
U.S. Fish and Wildlife Service
justin_sloan@fws.gov

Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 20

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Ana Hernandez
Merced County Community and Economic Development Department
July 11, 2025
Page 21

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Ana Hernandez

Merced County Community and Economic Development Department

July 11, 2025

Page 22

and western bumble bee (*Bombus occidentalis occidentalis*) as Endangered under the California Endangered Species Act. October 2018.

Attachment 1

**CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE
CDFW COMMENT LETTERS IN RESPONSE TO QUINTO SOLAR PROJECT**

PROJECT: Spikes Peak Solar Project by Spikes Peak Solar, LLC

SCH No.: 2025060597



Central Region
1234 East Shaw Avenue
Fresno, California 93710
(559) 243-4005
<http://www.dfg.ca.gov>



January 13, 2011

Dave Gilbert
Merced County Planning Department
2222 M Street
Merced, California 95340

Subject: Notice of Preparation (NOP) of a Draft Environmental Impact Report (DEIR)
for the Quinto Solar Photovoltaic Project; SCH No. 2010121039

Dear Mr. Gilbert:

The Department of Fish and Game (Department) has reviewed the NOP submitted by Merced County for the Quinto Solar Photovoltaic Project (Project). The Project includes approval of a conditional use permit to allow the construction and operation of a 110-megawatt (MW) solar photovoltaic (PV) electrical generating facility. Electrical generation facilities associated with the Project include mounted PV panels, support beams, inverters, transformers, buried electrical cables, circuit breakers, overhead collector cables and associated poles, and a substation. Overhead lines would connect the substation to the Pacific Gas and Electric Company (PG&E) interconnection point on-site. Other facilities include a 10,000-square-foot operation and maintenance building, a new parking area, new or improved roads, and a perimeter fence. The Project is located adjacent to both the California Aqueduct and the Delta Mendota Canal, approximately 0.5 mile west of Interstate 5, 3 miles north of State Route 152, and 1.5 miles northwest of the unincorporated community of Santa Nella.

The NOP states that a detailed biological assessment will be prepared for the DEIR and will include a description of the existing site conditions, regulatory framework for biological resource management, potential impacts that may occur as a result of the Project, the significance of those impacts, and proposed mitigation. The NOP describes the historical use on the north part of the Project site as orchard-based agricultural production, and grazing on the southern portion of the Project site. Romero Creek, an intermittent stream and drainage channel, bisects the Project site. The Department is quite familiar with the biological resources present in the project area vicinity, which forms the basis for our comments below.

The San Joaquin kit fox (*Vulpes macrotis mutica*), which is listed as threatened and endangered pursuant to the California Endangered Species Act (CESA) and the federal Endangered Species Act, respectively, and the Swainson's hawk (*Buteo swainsoni*),

which is listed as threatened pursuant to CESA, have both been documented near the Project site and likely forage, and possibly den or nest, on-site. The proposed Project is located within a critical portion of the remnant north-south movement corridor for San Joaquin kit fox (SJKF). The Santa Nella area has been identified by the Department and the United States Fish and Wildlife Service (USFWS) as a "pinch-point" in the connectivity between north and south populations of SJKF (H.T. Harvey and Associates, 2004). An influx of individuals from southern populations, including the Los Banos Valley core kit fox population, is thought to be critical to the continued existence of populations in the northern range of SJKF. The DEIR needs to address the cumulative impacts from the Project and other existing, planned, and potential development in or near this corridor that could substantially interfere with the movement of SJKF and other wildlife. The Project site may also be used as foraging habitat by Swainson's hawks (SWHA), and riparian vegetation associated with Romero Creek may provide nesting habitat for this species. Other special status species may also occur on the Project site.

In addition, the NOP states that the southern portion of the Project site is under a habitat conservation easement (Easement) as described in the *Monte Dorado (Parkway) Project: Quinto Farms Phase 1 Conservation Easement Deed* and the *Monte Dorado (Parkway) Project: Quinto Farms Phase 2 Conservation Easement Deed* documents. The Easement was recorded as part of the mitigation for the Monte Dorado (Parkway) Project. The explicit purpose of the Easement is to prevent any use of that property that will impair or interfere with its conservation values, including SJKF. The NOP states that Project consistency with the Easement will be evaluated in the DEIR, but also states an amendment to the Easement may be required. Project actions may be in conflict with the purpose of the Easement, and the Department, as a matter of long-standing practice, will likely not consider an Easement amendment under the circumstances as we understand them in the NOP. We recommend the County request the habitat conservation easement documents, and a description of the purpose of the Easement, be provided in their entirety in the Environmental Impact Report.

The following represent our initial comments based on information contained in the NOP and additional, more-specific comments may be provided after review of the biological assessment and DEIR that will be prepared for this Project.

Department Jurisdiction

Trustee Agency Authority: The Department is a Trustee Agency with the responsibility under the California Environmental Quality Act (CEQA) for commenting on projects that could impact fish and wildlife resources. Pursuant to Fish and Game Code Section 1802, the Department has jurisdiction over the conservation, protection, and

management of fish, wildlife, native plants, and habitat necessary for biologically sustainable populations of those species. As a Trustee Agency for fish and wildlife resources, the Department is responsible for providing, as available, biological expertise to review and comment on environmental documents and impacts arising from project activities, as those terms are used under CEQA.

Responsible Agency Authority: The Department is a Responsible Agency when a subsequent permit or other type of discretionary approval is required from the Department, such as an Incidental Take Permit (ITP), pursuant to CESA, or a Stream Alteration Agreement (SAA) issued under Fish and Game Code Section 1600 *et seq.* Project incidental "take" authorization may be warranted for SJKF and SWHA. If Project activities are proposed that will involve work within the bed, bank, or channel of any stream (e.g., Romero Creek), a notification for an SAA may be necessary.

The Department's issuance of an ITP or SAA is also considered a "project" subject to CEQA (CEQA Guidelines Section 15378). The Department typically relies on the Lead Agency's CEQA compliance to make findings, pursuant to CEQA Guidelines Section 15091. CEQA grants Responsible Agencies authority to require changes in a project to lessen or avoid effects of that part of the project which the agency will be called on to approve (CEQA Guidelines Section 15041). In addition, the Department may not issue an ITP that is supported by a CEQA project whose certification relies on a Statement of Overriding Considerations regarding significant impacts and/or "take" of State-listed species. For the Lead Agency's CEQA document to suffice for ITP or SAA issuance, it must fully describe the potential Project-related impacts to State-listed species and/or streams and commit to measures to avoid, minimize, and mitigate impacts to these resources. If the CEQA document for this Project does not contain these commitments, the Department may need to act as a Lead Agency and complete a subsequent CEQA document to support permit issuance. This could significantly delay permit issuance and, subsequently, Project implementation.

Project Recommendations

Habitat Conservation Easement: The south part of the Project site was placed under a habitat conservation easement (Easement) as a requirement of the Formal Section 7 Consultation on the Proposed Monte Dorado Project, Santa Nella, Merced County, California (FWS# 1-1-03-F-0102) (Conservation Instrument) to the United States Army Corps of Engineers (Corps) for issuance of a permit pursuant to Section 404 of the Clean Water Act (Corps #199900272). The purpose of the Easement is "to ensure that the Property will be retained forever in a condition contemplated by the Conservation Instrument and to prevent any use of the Property that will significantly impair or interfere with the conservation values of the Property," and is intended to remain in

perpetuity. Conservation values in the Easement are defined as the ecological and habitat values that benefit endangered, threatened, and other species, including SJKF. The Easement also granted all present and future development rights to the Habitat Management Foundation (Grantee).

Project implementation on the south part of the site may not be compatible with the purpose of the Easement. In addition, as we currently understand the conditions of the Easement, Project implementation would violate several of the covenants, terms, conditions, and restrictions of the Easement, including several prohibited uses of the property. These prohibited uses include "Construction, reconstruction or placement of any building, billboard, sign, structure, or other improvement except as provided for in the Management Plan;" "Commercial or Industrial uses;" and "Altering the surface or general topography of the Property including building roads, paving or otherwise covering the Property with concrete, asphalt, or any other impervious material, except as stated in the Management Plan."

The NOP does state that an amendment to the Easement may be required. Notwithstanding approvals that may be required by other agencies, and assuming the Project will require "take" authorization, as previously stated, the Department is unlikely to consider an amendment to an Easement that was specifically put in place as mitigation for listed species impact mitigation.

San Joaquin Kit Fox: Project implementation could result in the permanent fragmentation of the north-south movement corridor of SJKF. The area from around Los Banos Reservoir to the north of San Luis Reservoir has been identified by the Department and the USFWS as a migratory corridor critical to the continued existence and genetic diversity of the northern kit fox population. As stated above, the Santa Nella area has been identified as a critical SJKF migratory "pinch-point" within this area. The creation of the San Luis Reservoir and O'Neil Forebay created a large migratory barrier to the north-south migration of SJKF, and busy highways in the area such as State Routes 152 and 33 and Interstate 5, as well as the existing urban development further compounded this problem. As a result, any upland habitat in this area that could serve as movement or rest areas for SJKF has very high conservation values for this species.

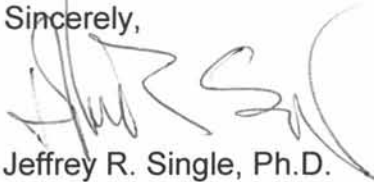
The Department recommends the DEIR quantify and describe the direct and indirect potential impacts to SJKF, including those to the SJKF movement corridor and other conservation areas, and outline the specific proposed mitigation measures. The evaluation should include the cumulative impacts to SJKF from other existing, planned and potential development from south of the Los Banos Reservoir to north of the San Luis Reservoir that may impact existing upland habitat.

Dave Gilbert
January 13, 2011
Page 5

Swainson's Hawk: Swainson's hawks have been documented near the Project site, and routinely nest in the O'Neil Forebay Wildlife Area, which is less than 2 miles from the Project site. The historic grazing area in the southern part of the Project site provides potential foraging habitat for SWHA. In addition, Romero Creek may provide potential SWHA nest habitat at the Project site. Potentially significant impacts that may result from Project-related activities include nest abandonment, loss of nest trees, loss of foraging habitat that would reduce nesting success (loss or reduced health or vigor of eggs or young) and direct mortality. To avoid such impacts, surveys for nesting SWHA and other raptors should be conducted following the survey methodology developed by the Swainson's Hawk Technical Advisory Committee (SWHA TAC, 2000) prior to any disturbance within 10 miles of a potential nest tree, and appropriate avoidance measures developed. In the event that SWHA is detected during surveys, consultation with the Department would be warranted to discuss how to implement the Project and avoid "take." The Department also recommends that the Project implement the avoidance, minimization, and mitigation measures (including habitat compensation) described in the Department "Staff Report regarding for Impacts to Swainson's Hawks in the Central Valley of California" (1994).

If you have any questions regarding these comments, please contact Craig Bailey, Environmental Scientist, at the address provided on this letterhead, by telephone at (559) 243-4014, extension 261, or by email at cbailey@dfg.ca.gov.

Sincerely,



Jeffrey R. Single, Ph.D.
Regional Manager

cc: United States Fish and Wildlife Service
San Joaquin Valley Branch
2800 Cottage Way, Room W-2805
Sacramento, California 95825-1846

ec: See Page Six

Dave Gilbert
January 13, 2011
Page 6

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United States Fish and Wildlife Service
Kenneth_Sanchez@fws.gov

Bill Condon
Department of Fish and Game
Renewable Energy Program

Julie Vance
Craig Bailey
Department of Fish and Game
Central Region

Literature Cited

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SWHA TAC, 2000. Recommended Timing and Methodology for Swainson's Hawks Nesting Surveys in California's Central Valley. Swainson's Hawk Technical Advisory Committee, May 2000.



State of California – The Natural Resources Agency
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EDMUND G. BROWN JR., Governor
CHARLTON H. BONHAM, Director



May 21, 2012

Dave Gilbert
Merced County Planning Department
2222 M Street
Merced, California 95340

Subject: Draft Environmental Impact Report (DEIR) for the Quinto Solar Photovoltaic Project; SCH No. 2010121039

Dear Mr. Gilbert:

The Department of Fish and Game (Department) has reviewed the DEIR submitted by Merced County for the Quinto Solar Photovoltaic Project (Project). The Project is located adjacent to both the California Aqueduct and the Delta Mendota Canal, approximately 0.5 mile west of Interstate 5, 3 miles north of State Route 152, and 1.5 miles northwest of the unincorporated community of Santa Nella. The Project includes approval of a conditional use permit to allow the construction and operation of a 110-megawatt (MW) solar photovoltaic (PV) electrical generating facility. Electrical generation facilities associated with the Project include mounted PV panels, support beams, inverters, transformers, buried electrical cables, circuit breakers, overhead collector cables and associated poles, switchyard and a substation. Overhead lines would connect the substation to the Pacific Gas and Electric Company (PG&E) interconnection point on-site, and approximately 30 miles of transmission line would be re-conducted from the Project site to the Westley substation in Stanislaus County. Other facilities as described in the DEIR include a 10,000-square-foot operation and maintenance building, new parking area, new or improved roads, landscape screening for aesthetic purposes, perimeter fence, and a commercial grazing program. The portion of the Project located south of McCabe Road is referred to as "Site 1" and the portion of the Project north of McCabe Road is referred to as "Site 2."

In 2006, Site 1 was encumbered with a habitat conservation easement (Easement) as described in the *Monte Dorado (Parkway) Project: Quinto Farms Phase 1 Conservation Easement Deed* and the *Monte Dorado (Parkway) Project: Quinto Farms Phase 2 Conservation Easement Deed* documents. Based on our review of the DEIR, environmental documents prepared for other projects in the vicinity, and a review of the Santa Nella Habitat Conservation Plan (HCP), we believe this Easement was executed for purposes of conserving the site in perpetuity for San Joaquin kit fox connectivity and habitat. As previously stated in our comment letter on the notice of preparation (NOP)

prepared for this DEIR, the Project is located within a critical portion of the remnant north-south movement corridor for the San Joaquin kit fox (*Vulpes macrotis mutica*), which is listed as threatened and endangered pursuant to the California Endangered Species Act (CESA) and the federal Endangered Species Act (FESA), respectively. The Department and the United States Fish and Wildlife Service (USFWS) consider the Santa Nella area a "pinch-point" in the connectivity between the north and south San Joaquin kit fox (SJKF) populations, and the associated movement corridor is considered critical to the continued existence and genetic diversity of the northern SJKF population. The Project would reduce remaining habitat in the north-south movement corridor and, when considered in light of other projects and land uses affecting the corridor, could result in its permanent fragmentation. Given the uncertainty regarding the overall efficacy of the remaining corridor, the Department is unable to conclude the corridor as proposed in the DEIR is sufficient to provide the necessary exchange between northern and southern SJKF populations to support the continued viability of the northern SJKF population.

The Department is also concerned about potential Project-related impacts to California tiger salamander (*Ambystoma californiense*), which is listed as threatened pursuant to both CESA and ESA, and Swainson's hawk (*Buteo swainsoni*), which is listed as threatened pursuant to CESA.

Our specific comments follow.

Department Jurisdiction

Trustee Agency Authority: The Department is a Trustee Agency with the responsibility under the California Environmental Quality Act (CEQA) for commenting on projects that could impact fish and wildlife resources. Pursuant to Fish and Game Code Section 1802, the Department has jurisdiction over the conservation, protection, and management of fish, wildlife, native plants, and habitat necessary for biologically sustainable populations of those species. As a Trustee Agency for fish and wildlife resources, the Department is responsible for providing, as available, biological expertise to review and comment on environmental documents and impacts arising from project activities, as those terms are used under CEQA.

Responsible Agency Authority: The Department is a Responsible Agency when a subsequent permit or other type of discretionary approval is required from the Department, such as an Incidental Take Permit (ITP), pursuant to CESA, or a Stream Alteration Agreement (SAA) issued under Fish and Game Code Section 1600 *et seq.* CEQA requires a Mandatory Finding of Significance if a project is likely to substantially impact threatened or endangered species (sections 21001{c}, 21083, Guidelines

sections 15380, 15064, 15065). Impacts must be avoided or mitigated to less than significant levels unless the CEQA Lead Agency makes and supports a Statement of Overriding Consideration (SOC). The CEQA Lead Agency's SOC does not eliminate the Project proponent's obligation to comply with CESA or Fish and Game Code sections 1600 et seq.

Project Recommendations

San Joaquin Kit Fox: The DEIR appears to include a provision in the Easement that allows for aggregate mining on a portion of the site as part of the Project's baseline for the purposes of impact assessment. A conditional use permit application for the mine was submitted to the County in 2008, but was later withdrawn. Currently, there are no State or County entitlements pursuant to the State Mining and Reclamation Act (SMARA), and no environmental review has been conducted to comply with SMARA on a mine's potential impacts. The DEIR should consider the Project's impacts to the existing physical conditions of the Project site and vicinity without consideration for a potential aggregate mine, because a mine was not part of the existing physical conditions at the time the NOP was published. The DEIR also states that the site would be available for mineral resource production after the solar Project is decommissioned in 35 years (Page 13-5). If the Project's impacts are going to be considered with a potential future aggregate mine, its impacts should be considered in addition to the mine rather than in lieu of it.

The Department considers the environmental setting and habitat conditions described in the Habitat Management Foundation's (Grantee) 2009 annual report for the previously described easement (Easement) as the Project's baseline. The environmental setting normally constitutes the baseline physical conditions as they exist at the time the NOP is published, which a Lead Agency uses to determine whether an impact is significant (CEQA Guidelines Section 15125). The environmental setting in the DEIR describes the Project area as 204-acre almond orchard, 780 acres of grazing land, and 28 acres of Romero Creek and agriculture pond/detention features. SJKF habitat conditions, including on-site corridors, for Site 1 are reported to be in good condition and actively maintained per the habitat management plan associated with the Easement (Habitat Management Foundation 2009). In addition, the habitat model presented by Constable et al. (2009) indicates the high and medium quality SJKF habitat as particularly narrow in the Quinto Farms vicinity, and every alternative of the "least cost" movement corridor for SJKF from southern populations dispersing north is located through the Project site. Cost is the difficulty of movement through a landscape for each unit of distance traveled.

Therefore, the Department considers any commercial or industrial use on Site 1 a potential reduction in habitat value, because it is currently managed for SJKF and the habitat features are in good condition. Project implementation would result in the loss of 324 acres of the existing upland habitat features that could be used by SJKF as a movement corridor or rest area. In addition to the Project-related SJKF habitat loss, the proposed landscape screen (DEIR Appendix B) proposed on the western parcel of Site 1 may limit SJKF dispersal west of the California Aqueduct and/or prevent dispersing SJKF from using the western parcel as refugia. Trees and shrubs are known to provide cover for SJKF predators such as coyote and bobcat, and such cover also reduces the opportunity for SJKF to visually detect predators, all of which may lead to increased predation of SJKF. Trees and shrubs may also create a visual deterrent for SJKF on the western parcel of Site 1, because SJKF may avoid the trees even if not trying to cross through them. The optional fruit grove associated with the operation and maintenance building (Figure 8) may present similar concerns, but would not impact the Project baseline if located inside the footprint of the pre-existing almond orchard.

The DEIR describes the movement corridor as sub-optimal, but does not adequately assess the difficulty for SJKF individuals to use the corridor as a result of Project impacts. When a movement corridor is already sub-optimal, additional impacts to the corridor are extremely significant and will likely further limit or potentially preclude gene flow. The DEIR should identify how the Project's impacts may affect the integrity of the corridor, including impacts to the habitat west of the California Aqueduct, and how these impacts may increase the difficulty for SJKF to successfully negotiate the corridor. Proposed mitigation measures should reduce the cost to dispersing SJKF individuals to baseline or near the baseline condition to reduce impacts to less than significant.

The mitigation measures proposed in the DEIR include a new 110-acre conservation easement recorded immediately north of the Easement, artificial escape dens, and the eastern parcel of Site 1 will remain open space and be managed consistently with the San Joaquin Kit Fox Management Plan for the Monte Dorado (Parkway) Project. The Department is unable to conclude that these mitigation measures alone will eliminate impacts to SJKF movement. The proposed escape dens and new 110-acre conservation easement will potentially enhance habitat values, but the proposed commercial sheep grazing operation may reduce the overall SJKF habitat quality of the Site 1 eastern parcel. Protecting this acreage does not "enhance habitat conditions" as described on page 7-38, because as stated above, it is already managed for SJKF and in good condition.

Potential mitigation measures to enhance the movement corridor and reduce SJKF dispersal cost may include increased width of the movement corridor through the Santa Nella area, conservation and management of land (e.g., vegetation management,

restriction of rodent control) at other areas within the pinch-point, linkage of potential refugia to the corridor to create additional rest areas and escape opportunities, creation of new crossings through potential barriers, and enhancement of potential alternative corridors. The Department understands that not all of these potential mitigation measures may be easy to implement, but the Department recommends a discussion of these alternatives and the implementation of all feasible measures to return the corridor to baseline. Absent additional mitigation, impacts to SJKF with respect to the corridor would persist.

The Department considers appropriate livestock grazing a valuable habitat management tool for special-status species and other wildlife, especially in non-native grassland habitats. However, the proposed commercial grazing plan explicitly lists food and fiber as its primary goal. The Department is concerned that the proposed program may not maximize benefits for SJKF, because extended periods of overgrazing have the potential to eliminate forage for the SJKF prey base and the working dogs described in the commercial grazing plan may pursue, exclude, and/or kill SJKF. Any grazing management plan should explicitly list habitat management for SJKF as its primary goal, and maintain vegetation levels comparable to those of optimal SJKF habitat as required by the Easement.

Habitat Conservation Easement: Site 1 is entirely within the Easement. Recordation of this Easement was required by USFWS (pursuant to FESA) and Merced County (pursuant to CEQA) to offset direct impacts to SJKF as well as to address the loss of SJKF habitat connectivity caused by three separate residential development projects, all of which are located in Merced County's Santa Nella Community Specific Plan Area (CSP). The three projects which mitigated for project-related impacts to SJKF on the Quinto Farms Easement (of which Site 1 is a part) are as follows:

- 1) Monte Dorado Project (River West): This is a 398-acre residential development project located entirely within the CSP. The Formal Section 7 Consultation (subsequently amended twice) for this project issued to the United States Army Corps of Engineers (Corps), required that the loss of approximately 356.4 acres of SJKF habitat on the Monte Dorado project site be mitigated through in perpetuity conservation of 1,069.2 acres at Quinto Farms, resulting in recordation of the Easement. An additional amendment to the Section 7 consultation required that an additional 52.83 acres of mitigation occur at Quinto Farms to replace on-site mitigation at the Monte Dorado site which proved infeasible due to County requirements. Approximately 484 acres of the Easement is to offset the impacts from a potential 242.4 acres of mining.

- 2) Wathen-Castanos Project: This is a 58.4-acre residential development project also located entirely within the CSP.
- 3) Arnaudo Brothers Project: This is a 110-acre residential development project also located entirely within the CSP.

Federal "take" coverage (pursuant to FESA) and the associated mitigation obligations for project-related impacts to SJKF from the Wathen-Castanos and Arnaudo Brothers projects, along with a wastewater treatment plant (12 acres), for Parkway South, Inc., the last of which is located outside the CSP area, were addressed in an HCP entitled *Habitat Conservation Plan for the San Joaquin kit fox at the Arnaudo Brothers, Wathen-Castanos, and Parkway South Sites Within, and Adjacent to, the Santa Nella Community Specific Plan Area*, dated July 21, 2005. A portion (36 acres) of the mitigation required in the HCP also was at Quinto Farms (Easement). The Department issued a Consistency Determination pursuant to Fish and Game Code Section 2080.1 on the above referenced HCP and associated take statement to confer State take coverage for SJKF pursuant to CESA for the projects covered by the HCP. Consequently, in the event that the management of the Easement becomes less protective as a result of the amendment as proposed by the Quinto Solar project, or if this mitigation acreage for which the Department provided past CESA coverage is affected directly or indirectly by the Quinto Solar project, the HCP may no longer meet the "fully mitigate" (CESA) standard

We also recommend the DEIR identify the need to replace prior mitigation obligations and values. The DEIR states there is no Project impacts resulting from conflict with the Easement or the Recovery Plan for Upland Species of the San Joaquin Valley (1998), because the Project's activities are consistent with the goals of the San Joaquin Kit Fox Management Plan for the Monte Dorado (Parkway) Project. The Department has concerns with this finding because, as stated above, the Project will reduce overall SJKF quality on Site 1 and could present overall impacts to the SJKF movement corridor.

Of primary concern to the Department is the location of the Easement in an area of critical connectivity that made it an appropriate area to offset impacts in the CSP area. Amending the Easement to provide for commercial and industrial uses in addition to a future aggregate mine is inconsistent with the stated purpose of the Easement. We recommend the County consider as part of the impact analysis, all approved projects in the CSP area that could affect SJKF and evaluate the SJKF mitigation for these projects in this context.

Burrowing Owl: The Department released an updated Staff Report on Burrowing Owl Mitigation on March 7, 2012. We recommend updating Mitigation Measure BIO-3 with the current Staff Report. This recommendation includes extending buffers to 50 to 500 meters depending on time of year and level of disturbance, and if appropriate, application of artificial burrows and habitat compensation as described in the 2012 Staff Report.

California Tiger Salamander: Page 7-13 of the DEIR states that California tiger salamander (CTS) was determined to be absent from the site. The determination was based on a habitat assessment and no aquatic or upland surveys were conducted. The DEIR states there is potential breeding habitat and summer refugia on the Project site, but considered it too isolated from known CTS populations.

An auditory detection of an unknown amphibian was detected in March 2011 within the Romero Creek Channel, and the DEIR lists western spadefoot (*Scaphiopus hammondi*), a California Species of Special Concern, as potentially occurring on the Project site. Western spadefoot and CTS have similar habitat requirements, and the potential presence of western spadefoot may indicate suitable habitat for CTS. There is insufficient information for the Department to determine CTS absence based on the DEIR.

The Department recommends the "Interim Guidance on Site Assessment and Field Surveys for Determining Presence or a Negative Finding of the California Tiger Salamander" (USFWS and Department 2003) to determine if CTS may occur on the Project site. If CTS is detected on the Project site prior to or during construction, the Project applicant should stop or delay initiation of construction and contact the Department immediately to determine how to implement the Project and avoid take under CESA.

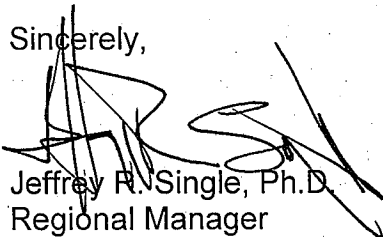
Swainson's hawk: The DEIR estimates a loss of 379 acres of Swainson's hawk (SWHA) foraging habitat resulting from Project construction, and requires habitat compensation at either a 1:1 or 0.5:1 mitigation ratio (Mitigation Measure BIO-8). Page 7-38 of the DEIR states the Site 1 parcel of east of the California Aqueduct may serve as potential habitat compensation for loss of SWHA foraging habitat. This parcel is already under Easement and therefore no additional mitigation value would be gained by preservation of this area. Swainson's hawk foraging habitat compensation can be implemented with the Project's agricultural conservation requirements (Mitigation Measure AG-1) if the agricultural crop is suitable SWHA foraging habitat, and the conservation easement explicitly lists protection of SWHA foraging habitat as one of its purposes.

Dave Gilbert
May 21, 2012
Page 8

Romero Creek: The DEIR states the Romero Creek crossing will not impact Department jurisdictional waters and does not warrant an SAA, because the bridge will span the creek avoid the jurisdictional area by at least five feet. The DEIR does not provide construction drawings for the bridge, and there is insufficient information for the Department to determine if an SAA is warranted. We recommend the Project submit a Notification of Streambed Alteration to the Department to so that we can determine if an SAA is necessary to comply with Fish and Game Code Section 1600 *et seq.*

If you have any questions regarding these comments, please contact Craig Bailey, Staff Environmental Scientist, at the address provided on this letterhead, by telephone at (559) 243-4014, extension 261, or by email at cbailey@dfg.ca.gov.

Sincerely,



Jeffrey R. Single, Ph.D.
Regional Manager

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Consatable, J.L., B.L. Cypher, S.E. Phillips, and P.A. Kelly. 2009. Conservation of San Joaquin Kits Foxes in Western Merced County, California. Prepared for the United States Bureau of Reclamation. May 13, 2009.

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EDMUND G. BROWN, Jr., Governor
CHARLTON H. BONHAM, Director



September 26, 2012

Dave Gilbert
Planning and Community Development Department
County of Merced
2222 M Street, 2nd Floor
Merced, California 95340

Subject: Final Environmental Impact Report (FEIR) for the Quinto Solar Photovoltaic Project;
SCH No. 2010121039

Dear Mr. Gilbert:

The Department of Fish and Game (Department) has reviewed the response to the Department's comments on the Draft Environmental Impact Report (DEIR) as well as the FEIR submitted by Merced County for the Quinto Solar Photovoltaic Project (Project). The Project evaluated in the FEIR is the construction of a 110-megawatt (MW) solar photovoltaic (PV) electrical generating facility and its subsequent operation for a duration of 30 years, as well as associated facilities. The Project is located adjacent to both the California Aqueduct and the Delta Mendota Canal, approximately 0.5 miles west of Interstate 5, 3 miles north of State Route 152, and 1.5 miles northwest of the unincorporated community of Santa Nella in western Merced County. Our specific comments follow.

The Project applicant has committed to implementing several Project changes to address the Department's concerns with Project-related impacts to SJKF. Many of these changes are memorialized in the FEIR, but some associated details were not finalized until after the FEIR went to print and important details regarding implementation are still being addressed. Provided that implementation of the following six items occurs, and these items are addressed appropriately, including Conditions of Approval (COA) where relevant, by Merced County, the Department believes that the permeability of the SJKF corridor will be at least as good or better than current conditions with Project implementation and should reduce impacts to the SJKF to less than significant levels. However, the Department respectfully disagrees with statements in the FEIR regarding the overall suitability of the Santa Nella region for SJKF, including the presumption that the area represents a population sink.

Below we list the six specific items that, if implemented, would lead to the determination described above:

- 1) A Conservation Easement (CE) in a form approved by the Department will be recorded within 15 days of the Commercial Operation Date (COD) on two separate areas: 1) a 110 acre parcel north of McCabe Road; 2) a 534-acre site (Site 2), also referred to as the Stockton Terminal parcel. Recordation of this CE will be ensured by placing a Department-approved CE into escrow prior to the initiation of construction. However, in a few places within the FEIR, the timing of recordation is identified as at the time of decommissioning (e.g. 30 years after the start of operation). The timing of CE recordation should be specified as within 15 days of the COD throughout the FEIR. The Department will review the form of the CE in its entirety with respect to permanent protection for SJKF, not just for consistency with the Monte Dorado (Parkway) Project

Conserving California's Wildlife Since 1870

Management Plan as indicated in the FEIR. The FEIR indicates that the above referenced CEs will be held by the Department or a "qualified easement holder." In the event that the Department is not the CE holder, the Department should be named as a third party beneficiary to the CE. In addition to the "qualified easement holder" requirements identified in the FEIR, the qualified easement holder must also meet the requirements of Government Code Section 65965, et seq, as amended. The County's COAs should be updated to reflect all of the above clarifications.

- 2) In several places in the FEIR, the COD is referenced as a threshold by which several actions are triggered or required. This should be defined in the FEIR. It is our understanding, based on information provided by the applicant, that COD is defined as the first day that electric power is commercially delivered to the grid by the Project. Based on this definition, we are assuming the time between the start of construction and COD will be relatively short.
- 3) In numerous places in the FEIR it states that the areas to be protected with the above CEs will be managed consistent with the goals contained in the SJKF management plan for the Monte Dorado (Parkway) Project, whereas in other portions of the FEIR it requires that a new Habitat Mitigation and Monitoring Plan (HMMP) will be prepared which will be similar or more rigorous than the "Kit fox Plan for Monte Dorado." For the new CE, the Department agrees that preparation of a new HMMP is necessary. The applicant has committed to preparation of a new HMMP plan for the new CE. The FEIR and COAs should be modified to require preparation of a new HMMP.

The new HMMP should integrate key elements from the California Multi-Agency Project Delivery Team Long-Term Management Plan template for mitigation banks and should be provided to the Department for review and approval prior to finalization. The new HMMP should at a minimum have the following objectives, most of which have been agreed to by the applicant:

Objective 1: Maintain and enhance habitat in conditions appropriate for use by SJKF based on the best scientific information available.

Objective 2: Manage the conserved lands to reduce the impact of predators on SJKF.

Objective 3: Monitor the population of SJKF on the conserved lands.

The existing Monte Dorado (Parkway) Kit Fox Management Plan includes annual site inspection and reporting, rangeland monitoring and reporting, SJKF monitoring and reporting, and cleanup. In addition to these elements, the new HMMP should include more specific actions to achieve the above Objectives, such as:

- installation and maintenance of kit fox escape dens (Objective 2);
- fire break maintenance along McCabe Road (Objective 1);
- noxious weed monitoring and control (Objective 1);
- signage and sign maintenance (Objective 1);
- database management; and
- replacing the 20% contingency with a 10% contingency and 24% administration fee.

- 4) The Department concurs that an endowment fund needs to be established which will fund the management of the CE properties in perpetuity according to the tasks and other obligations identified in the new HMMP. The timing of funding the endowment and the separation of duties between the CE holder and land manager should be specified before the recordation of the CE and the timing of funding shall be made a COA by the County.
- 5) In the Project areas, the applicant has agreed to provide additional SJKF escape opportunities by installation of one escape den per every 1/8 mile. Artificial dens within the solar fields should also include dual-entrance chambered subterranean designs or simple non-chambered surface designs which would encourage use by SJKF. BIO-5 and the associated COA should be updated to reflect this more protective commitment.
- 6) The revised Landscape Screening Plan is an improvement over the plan referenced in the DEIR; use of shrubby species is more limited and pruning will be conducted to reduce the impact of this landscaping on SJKF movement and visibility, as well as its use by SJKF predators. However, it is unclear how pruning for the life of the Project will be guaranteed. More importantly, it is unclear how or if this landscaping will be managed after Project decommissioning. In order to prevent this landscaping from impacting SJKF in the future, the Department recommends that this landscaping be removed at the time of Project decommissioning; this landscaping will no longer be necessary to address aesthetic impacts once the solar arrays will no longer be in place. Alternatively, the revised Landscape Screening Plan could be subsequently revised to remove inclusion of shrubby plant species and the Department could review and approve the planting palette in the Landscape Screening Plan prior to finalization.

Other Specific Comments

1. In the new HMMP prepared for the CE areas, the Department recommends more frequent SJKF den searches than specified in the SJKF management plan for the Monte Dorado (Parkway) Project. We also recommend use of SJKF monitoring techniques other than spotlighting, such as use of camera station surveys and/or scent dog surveys. In addition, we recommend frequent site visits after Project decommissioning to look for unauthorized access, dumping, and vandalism given its close proximity to the urban area of Santa Nella.
2. Based on the DEIR comments from Turlock Irrigation District and Modesto Irrigation District, there will be the need for a replacement of 3 structures in addition to the tension and pull sites for the reconductoring of the 230kV Los Banos-Westley line. Once PG&E determines the exact location of these facilities and access roads, then they will survey for California tiger salamander (*Ambystoma californiense*, CTS). If PG&E determines through these surveys there is potential of "take" of CTS, and the impacts are unavoidable, they have agreed to comply with the California Endangered Species Act (CESA) by mitigating for CTS impacts through an existing permitting process or by obtaining an Incidental Take Permit (ITP).
3. Given the potential for a future ITP for CTS with respect to the reconductoring or lake and streambed alteration agreement issuance, we recommend listing the Department as a potential responsible agency.

4. FEIR Page 4-6 states: "In the event that no contract extension is available at the end of the project's contract term, and no buyer of the *energy or project facilities* emerges, the solar facility would cease operation. At that time, the project facilities would be decommissioned and dismantled and the project site restored to pre-development conditions minus the existing orchard." This statement seems to imply that there is a potential for the Project to operate beyond the 30-year term identified throughout the FEIR. This statement should be revised to clarify that operation will not extend beyond 30 years in duration post-COD.
5. The DEIR has been generally edited to say that mineral access will be precluded in the future, but removal of mining is still characterized as a temporary loss on DEIR pages 3-30, 13-6, and 18-34. Language on FEIR page 7-37 is unedited which says the mine is currently permitted. This should be clarified.
6. Although listed in the mitigation measures to address agricultural impacts, the additional Swainson's hawk (*Buteo swainsoni*) mitigation acres are not listed in BIO-8; this still references a potential 0.5:1 mitigation ratio. This measure and the associated COA should be modified to include the additional 390 acres of agricultural mitigation that will also be Swainson's hawk mitigation.
7. The Department has not evaluated the proposed stream crossing structure at Romero Creek since we have not been provided with engineering details of this structure. If any abutments fill, riprap, or any other modifications to the bed, bank, or channel of Romero Creek may be necessary to accommodate this crossing or any other aspects of the Project, notification pursuant to Fish and Game Code Section 1600, et seq. is recommended well in advance of the installation of any proposed crossing structures.

We appreciate the efforts made by the County and the applicant to address the project-related impacts SJKF and other biological resources. If you have any questions regarding these comments or would like to discuss any of the points in this letter, please contact Julie Vance, Environmental Program Manager, at the address provided on this letterhead, by telephone at (559) 243-4005, extension 141, or by email at jvance@dfg.ca.gov.

Sincerely,



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Regional Manager

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Attachment 2**CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE
SPECIAL-STATUS SPECIES TABLE****PROJECT: Spikes Peak Solar Project by Spikes Peak Solar, LLC****SCH No.: 2025060597**

Common Name	Scientific Name	Status	
		State	Federal
San Joaquin kit fox	<i>Vulpes macrotis mutica</i>	T	E
Swainson's hawk	<i>Buteo swainsoni</i>	T	None
Tricolored blackbird	<i>Agelaius tricolor</i>	T	None
California tiger salamander – central California DPS	<i>Ambystoma californiense</i>	T	T
Western burrowing owl	<i>Athene cunicularia hypugaea</i>	C	None
Crotch's bumble bee	<i>Bombus crotchii</i>	C	None
American badger	<i>Taxidea taxus</i>	SSC	None
Northern harrier	<i>Circus hudsonius</i>	SSC	None
Northwestern pond turtle	<i>Actinemys marmorata</i>	SSC	PT
California red-legged frog	<i>Rana draytonii</i>	SSC	T
Western spadefoot	<i>Spea hammondi</i>	SSC	PT
Vernal pool tadpole shrimp	<i>Lepidurus packardii</i>	SA	E
Vernal pool fairy shrimp	<i>Branchinecta lynchi</i>	SA	T
Spiny-sepaled button-celery	<i>Eryngium spinosepalum</i>	1B.2	None
Tule elk	<i>Cervus canadensis nannodes</i>	None	None
E= Endangered, T=Threatened, C= Candidate for listing as Threatened and/or Endangered, SSC= Species of Special Concern, SA = Special Animal, PT=Proposed Threatened, 1B.2= California Rare Plant Rank, DPS= distinct population segment			

Attachment 3

**CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE
RECOMMENDED MITIGATION MONITORING AND REPORTING PROGRAM
(MMRP)**

PROJECT: Spikes Peak Solar Project by Spikes Peak Solar, LLC

SCH No.: 2025060597

RECOMMENDED MITIGATION MEASURE	STATUS/DATE/INITIALS
<i>Before Disturbing Soil or Vegetation</i>	
SJKF	
Recommended Mitigation Measure 1: SJKF Preconstruction Surveys	
Recommended Mitigation Measure 3: SJKF Take Authorization	
Recommended Mitigation Measure 4: SJKF Fencing	
SWHA	
Recommended Mitigation Measure 6: SWHA Surveys Prior to Construction	
Recommended Mitigation Measure 8: SWHA Take Authorization	
Recommended Mitigation Measure 9: SWHA Foraging Habitat Mitigation	
BUOW	
Recommended Mitigation Measure 10: BUOW Surveys Prior to Construction	
Recommended Mitigation Measure 12: BUOW Take Authorization	
CBB	
Recommended Mitigation Measure 13: CBB Surveys Prior to Construction	
Recommended Mitigation Measure 15: CBB Take Authorization	
<i>During Construction</i>	
SJKF	
Recommended Mitigation Measure 2: SJKF Avoidance Buffer	
Recommended Mitigation Measure 5: Habitat Management within the Project Site	
SWHA	

Recommended Mitigation Measure 7: SWHA Avoidance Buffer	
BUOW	
Recommended Mitigation Measure 11: BUOW Avoidance Buffer	
CBB	
Recommended Mitigation Measure 14: CBB Avoidance	