

Millerton Road Improvement Project Mitigation Monitoring and Reporting Plan

Purpose of and Need for Monitoring

In compliance with the California Environmental Quality Act (CEQA), the County of Fresno (County) has prepared an Initial Study (IS) for the Millerton Road Improvement Project (Proposed Project). The IS identifies potentially significant impacts that would potentially affect the resource areas listed below, along with mitigation measures to reduce those impacts.

- Aesthetics
- Air Quality
- Biological Resources
- Cultural Resources
- Greenhouse Gas Emissions
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Noise

Public Resources Code Section 21081.6 specifies that when a public agency makes findings required by paragraph (1) of subdivision (a) of Section 21081, it “shall adopt a reporting or monitoring program for the changes made to the project or conditions of project approval, adopted in order to mitigate or avoid significant effects on the environment.” Public Resources Code Section 21081.6 further specifies that the Mitigation Monitoring and Reporting Plan (MMRP) “ensure compliance during project implementation.”

Mitigation Monitoring and Reporting Plan

This MMRP for the Proposed Project lists the mitigation measures identified within the IS, the timing of each measure, and the parties responsible for implementing and monitoring the measures. This MMRP is intended to ensure the effective implementation of mitigation measures that are within the County’s authority to implement, including monitoring where identified, throughout all phases of development of the Proposed Project. Where the responsibility of implementing the mitigation is listed as belonging to Fresno County, the County may choose to delegate that responsibility to the construction contractor or other qualified individual as deemed appropriate by the County and any other regulatory agency.

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Measure	Timing	Implementation Responsibility	Responsible Department/ Agency
Aesthetics			
<p>Mitigation Measure AES-1: The following mitigation measure would further reduce impacts to visual resources:</p> <ul style="list-style-type: none"> ▪ Cut and fill slopes shall be contour graded to a non-uniform profile to blend with the adjacent slopes. Slope grades shall be constructed to facilitate planting, erosion control, and ease of maintenance by increasing slope rounding at the top and bottom of cuts and fills, and by creating liberal slope variances. 	Prior to and during construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning
Air Quality			
<p>Mitigation Measure AQ-1: The construction contractor shall implement the following applicable San Joaquin Valley Air Pollution Control District (SJVAPCD) Regulation VIII control measures outlined in the Guide for Assessing and Mitigating Air Quality Impacts (2002), to reduce particulate matter (both PM₁₀ and PM_{2.5}) emissions due to construction activities in accordance with SJVAPCD Rule 4641:</p> <ul style="list-style-type: none"> ▪ All disturbed areas, including storage piles, which are not being actively utilized for construction purposes, shall be effectively stabilized of dust emissions using water, chemical stabilizer/suppressant, covered with a tarp or other suitable cover or vegetative ground cover. ▪ All on-site unpaved roads and off-site unpaved access roads shall be effectively stabilized of dust emission using water or chemical stabilizer/suppressant. ▪ All land clearing, grubbing, scraping, excavation, land leveling, grading, cut and fill, and demolition activities shall be effectively controlled of fugitive dust emissions utilizing application of water or by presoaking. ▪ When materials are transported off-site, all material shall be covered, or effectively wetted to limit visible dust emissions, and at least six inches of freeboard space from the top of the container shall be maintained. ▪ All operations shall limit or expeditiously remove the accumulation of mud or dirt 	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning

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<p>from adjacent public streets at the end of each workday.</p> <ul style="list-style-type: none"> ▪ Following the addition of materials to, or the removal of materials from, the surface of outdoor storage piles, said piles shall be effectively stabilized of fugitive dust emissions utilizing sufficient water or chemical stabilizer/suppressant. 			
<p>Mitigation Measure AQ-2: The construction contractor shall implement the following NOx, odor, and diesel particulate matter (DPM) emission control measures in accordance with SJVAPCD Rule 4102 and 9510:</p> <ul style="list-style-type: none"> ▪ All heavy duty diesel equipment shall be equipped with diesel particulate filter. ▪ All heavy duty diesel equipment shall use aqueous diesel fuel. 	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning
<p>Mitigation Measure AQ-3: Implement Mitigation Measure GHG-1 to reduce construction related NOx and ROG emissions.</p>	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning
<p>Mitigation Measure AQ-4: In accordance with SJVAPCD Rule 9510, construction contractors shall reduce construction emissions by using a “clean fleet” or paying appropriate compensatory mitigation to off-set emission as determined in consultation with the SJVAPCD.</p>	Prior to and during construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning
Biological Resources			
<p>Mitigation Measure BR-1: A Biological Opinion with an incidental take statement has been obtained from the United States Fish and Wildlife Service (USFWS) and an Incidental Take Permit shall be obtained from the California Department of Fish and Wildlife (CDFW) for impacts to California Tiger Salamander (CTS) prior to construction. All conditions of the permits, including preservation and compensatory measures required by USFWS and by CDFW, shall be implemented. At a minimum, the following proposed mitigation measures shall be implemented to compensate for take of CTS:</p> <ul style="list-style-type: none"> ▪ Before discharge of fill material, three preservation credits will be obtained from a USFWS and CDFW approved mitigation bank for every acre of breeding and 	Prior to and during construction	Fresno County	Fresno County Department of Public Works and Planning U.S. Fish and Wildlife Service California Department of Fish and Wildlife

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<p>upland habitat permanently lost, or an alternative option of equal mitigation as approved by USFWS and CDFW. Approximately 26.14 acres of CTS habitat would be affected as a result of the proposed action, requiring the purchase of 79.11 acres preservation credits.</p> <ul style="list-style-type: none"> ▪ Construction within central CTS breeding habitat will be timed to occur during the dry season, between approximately April 15 and October 15, so as to avoid impacting breeding individuals at seasonal wetland locations. The dry season window may depend on rainfall and/or site conditions. ▪ Temporary high-visibility construction fencing shall be installed along the edge of work areas within 50 feet of mapped seasonal wetlands and channels. ▪ Temporary stockpiling of excavated or imported material shall occur only in approved construction staging areas. Excess excavated soil shall be used onsite or disposed of at a regional landfill or other appropriate facility. ▪ Project personnel will exercise caution when commuting to the construction area to minimize any chance for the inadvertent injury or mortality of species encountered on major roads leading to and from the construction area. Project related vehicles and equipment will not exceed 20 miles per hour in the action area. ▪ All fueling and maintenance of vehicles and other equipment and staging areas will occur at least 65 feet from any water body. All workers shall be informed during the worker education program of the importance of preventing spills and of the appropriate measures to take should a spill occur. ▪ No surface water will be drafted from aquatic features in the proposed action area. Water will be trucked in as needed for use during construction. ▪ Standard precautions shall be employed by the construction contractor to prevent the accidental release of fuel, oil, lubricant, or other hazardous materials associated with construction activities into potentially jurisdictional features. ▪ Should construction activities occur from December 1 to February 28, the activities shall be limited to between 30 minutes after sunrise and 30 minutes before sunset. 			

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<ul style="list-style-type: none"> ▪ Construction activities shall be finished by 7 pm daily to the extent practicable. ▪ A USFWS and CDFW approved biologist will provide a habitat sensitivity training to all construction personnel either in the form of a power point presentation or in person with training materials. The training shall include identification of special-status species, required practices before the start of construction, general measures that are being implemented to conserve these species as they relate to the proposed action, penalties for noncompliance, and boundaries of the action area and of the permitted disturbance zones. Supporting materials containing training information will be prepared and distributed. Upon completion of training, all construction personnel will sign a form stating that they have attended the training and understand all the conservation measures. Training shall be conducted in languages other than English, as appropriate. Proof of this instruction will be kept on file with the applicant. The applicant will provide the USFWS and the CDFW with a copy of the training materials and copies of the signed forms by project staff indicating that training has been completed within 30 days of the completion of the first training session. Copies of signed forms will be submitted monthly as additional training occurs for new employees. The crew foreman will be responsible for ensuring that construction personnel adhere to the guidelines and restrictions. If new construction personnel are added to the proposed action, the crew foreman will ensure that the personnel receive the mandatory training before starting work. ▪ A representative shall be appointed by the applicant who will be the contact source for any contractor who might inadvertently kill or injure a CTS or finds a dead, injured, or entrapped individual. The representative shall be identified during the employee education program. The representative's name and telephone number shall be provided to the USFWS prior to the initiation of ground-disturbance activities. Any worker who inadvertently injures or kills a federally listed species or finds one dead, injured, or entrapped will immediately report the incident to the applicant's appointed representative. The applicant's representative will immediately notify the applicant, who will provide verbal 			

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<p>notification to the USFWS Endangered Species Office in Sacramento, California, and to the local CDFW warden or biologist within one working day. The applicant will follow up with written notification to the USFWS and the CDFW within five working days. All observations of federally listed species will be recorded on California Natural Diversity Database (CNDDDB) field sheets and sent to the CDFW.</p> <ul style="list-style-type: none"> ▪ In the case of injured and/or dead central CTSs, the Service shall be notified of events within one day and the animals shall only be handled by a Service-approved biologist. Injured CTSs shall be cared for by a licensed veterinarian or other qualified person. In the case of a dead animal, the individual animal shall be preserved and held in a secure location until instructions are received from the Service regarding the disposition of the specimen or until the Service takes custody of the specimen. The Corps must report to the Service within one calendar day any information about take or suspected take of federally-listed species not exempted in this opinion. Notification must include the date, time, and location of the incident or of the finding of a dead or injured animal. The Service contacts are Daniel Russell, Deputy Assistant Field Supervisor, Endangered Species Program, Sacramento, at (916) 414-6600 and Rebecca Roca, the Resident Agent-in-Charge of the Service's Law Enforcement Division at (916) 414-6660. ▪ The USFWS and the CDFW approved biologist shall have oversight over the implementation of all conservation measures, and shall have the authority to stop project activities if any of the requirements associated with these measures is not being fulfilled. If the biologist has requested work stoppage due to take of any federally listed species, the USFWS and the CDFW will be notified within one working day via email. ▪ All stakes, flagging, and fencing used to delineate the construction area will be removed no later than 30 days after construction and restoration are complete. ▪ If requested during or upon completion of construction activities, the USFWS-approved biologist will accompany USFWS or CDFW personnel on an onsite inspection of the site to review proposed project effects to the CTS and its 			

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<p>habitat.</p> <ul style="list-style-type: none"> ▪ Plastic monofilament netting (erosion control matting) will be prohibited because CTS can become caught in this type of erosion control material. Tightly woven (less than 0.25 inch diameter) fiber netting or similar material shall be used for erosion control or other purposes to ensure that CTS do not become trapped. Biodegradable fiber netting or coconut coir matting is an acceptable erosion control material. This limitation will be communicated to the contractor(s) through use of special provisions included in the bid solicitation package. ▪ All construction pipe, culverts, or similar structures that are stored at the construction site for one or more overnight periods will be thoroughly inspected before the pipe is subsequently moved, buried, or capped. If during inspection a central CTS is discovered inside a pipe, that section of pipe shall not be moved until the salamander has escaped on its own or the Service will be contacted for further instruction. ▪ Vehicles and equipment will be thoroughly inspected for the presence of central CTS prior to movement. If a salamander is found the Service shall be contacted for further guidance. No equipment will be moved until the salamander has left voluntarily. ▪ To prevent inadvertent entrapment of central CTSs during construction, at the end of each work day all excavated, steep-walled holes or trenches will be covered with plywood or similar materials or will be filled with one or more escape ramps constructed of earth fill or wooden planks. Before such holes or trenches are filled, they will be thoroughly inspected for trapped animals. If, at any time, a trapped central CTS is located, all work in the immediate area will cease, the animal will be allowed to leave on its own or the Service will be contacted for further instruction. The appropriate contact is Thomas Leeman, Chief, San Joaquin Valley Division, (916) 414-6600. ▪ If at any time, a central CTS is located, all work in the immediate vicinity will cease, and the animal will be allowed to leave voluntarily or the Service will be contacted for further guidance. ▪ A litter control program shall be instituted at the entire project site. The 			

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<p>contractor will provide closed garbage containers for the disposal of all food-related trash items (e.g., wrappers, cans, bottles, food scraps). All garbage will be removed daily from the project site. Construction personnel will not feed or otherwise attract fish or wildlife to the action area.</p> <ul style="list-style-type: none"> ▪ No canine or feline pets or firearms (except for federal, state, or local law enforcement officers and security personnel) shall be permitted at the project site to avoid harassment or killing or injuring wildlife. ▪ A post-construction compliance report prepared by the monitoring biologist will be submitted to the Deputy Assistant Field Supervisor at the Sacramento Fish and Wildlife Office within 30 calendar days of the completion of construction activities or within 30 calendar days of any break in construction activity lasting more than 30 days. The report shall detail the following information: dates that groundbreaking activities at the proposed project started and the project was completed; pertinent information concerning the success of the proposed project in meeting compensation and other conservation measures; an explanation of failure to meet such measures, if any; known project effects on CTS, if any; any occurrences of incidental take of CTS; and other pertinent information. 			
<p>Mitigation Measure BR-2: An Incidental Take Permit for Vernal Pool Fairy Shrimp (VPFS) and Vernal Pool Tadpole Shrimp (VPTS) has been obtained from the USFWS. All conditions of the permit required by USFWS shall be implemented. At a minimum, the following conservation measures shall be implemented to minimize impacts to the federally listed VPFS and VPTS and/or other nonlisted vernal pool branchiopods including midvalley fairy shrimp and California linderiella:</p> <ul style="list-style-type: none"> ▪ Effects of permanent losses and degradation of VPFS and VPTS habitat shall be minimized and, to the greatest extent practicable, habitat restored. Before discharge of fill material, one creation credit will be obtained from a USFWS-approved mitigation bank for every acre of habitat directly impacted, and two preservation credits will be obtained for every acre of habitat directly and 	Prior to and during construction	Fresno County	<p>Fresno County Department of Public Works and Planning</p> <p>U.S. Fish and Wildlife Service</p>

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<p>indirectly affected by the proposed action. Approximately 0.23 acres that would be directly affected as a result of the proposed action would require the purchase of creation credits at a 3:1 ratio, for a total of 0.69 acres. Because VPFS and VPTS share the same habitat as CTS, the preservation credits that would be purchased for the 26.14 acres of impacted CTS habitat at a 3:1 ratio would satisfy the requirement to purchase preservation credits for the 0.23 acres of impacted VPFS and VPTS habitat at a 3:1 ratio.</p> <ul style="list-style-type: none"> ▪ Temporary high-visibility construction fencing shall be installed as identified under the CTS conservation measures. ▪ Staging areas shall be located away from the fenced seasonal wetlands and channels. Temporary stockpiling of excavated or imported material shall occur only in approved construction staging areas. Excess excavated soil shall be used onsite or disposed of at a regional landfill or other appropriate facility. ▪ A USFWS-approved biologist conduct habitat sensitivity training related to VPFS and VPTS for all project contractors and personnel as identified under the CTS conservation measures. 			
<p>Mitigation Measure BR-3: The following mitigation measures shall be implemented to avoid project-related impacts to potential nesting and/or wintering habitat for burrowing owls:</p> <ul style="list-style-type: none"> ▪ A qualified biologist shall conduct a preconstruction take avoidance survey no less than 14 days prior to initiating ground disturbance active using the recommended methods described in the Detection Surveys Section in Appendix D of the <i>Staff Report on Burrowing Owl Mitigation</i> (CDFW, 2012). If no burrowing owls or their sign are detected in the vicinity of the project site during the preconstruction survey, a letter report documenting survey methods and findings shall be submitted to the County and the CDFW, and no further mitigation is required. ▪ If burrowing owls are detected, no-construction buffers and timing outlined in Table 2 on page 9 of the <i>Staff Report on Burrowing Owl Mitigation</i> (CDFW, 2012) shall be followed unless a qualified biologist verifies through noninvasive 	Prior to and during construction	Fresno County	<p>Fresno County Department of Public Works and Planning</p> <p>California Department of Fish and Wildlife</p>

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<p>methods that either 1) the birds have not begun egg laying and incubation or 2) that juveniles from the occupied burrows are capable of independent survival (i.e., foraging independently). Buffer diameters outlined in Table 2 in the <i>Staff Report on Burrowing Owl Mitigation</i> (CDFW, 2012) are as follows:</p> <table border="1"> <thead> <tr> <th>Location</th> <th>Time of Year</th> <th colspan="3">Level of Disturbance</th> </tr> <tr> <td></td> <td></td> <th>Low</th> <th>Med</th> <th>High</th> </tr> </thead> <tbody> <tr> <td>Nesting Sites</td> <td>April 1-Aug 15</td> <td>200 meters</td> <td>500 meters</td> <td>500 meters</td> </tr> <tr> <td>Nesting Sites</td> <td>Aug 16-Oct 15</td> <td>200 meters</td> <td>200 meters</td> <td>500 meters</td> </tr> <tr> <td>Nesting Sites</td> <td>Oct 16-Mar 31</td> <td>50 meters</td> <td>100 meters</td> <td>500 meters</td> </tr> </tbody> </table>	Location	Time of Year	Level of Disturbance					Low	Med	High	Nesting Sites	April 1-Aug 15	200 meters	500 meters	500 meters	Nesting Sites	Aug 16-Oct 15	200 meters	200 meters	500 meters	Nesting Sites	Oct 16-Mar 31	50 meters	100 meters	500 meters			
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<p>Mitigation Measure BR-4: The following mitigation measures shall be implemented in accordance with the Staff Report to avoid and/or minimized impacts to nest sites for Swainson’s hawk:</p> <ul style="list-style-type: none"> ▪ A qualified biologist shall conduct a minimum of two protocol level preconstruction surveys during the recommended survey periods immediately prior (no more than 10 days) to the anticipated commencement of construction activities, in accordance with the <i>Recommended Timing and Methodology for Swainson’s Hawk Nesting Surveys in California’s Central Valley</i> (Swainson’s Hawk Technical Advisory Committee, 2000). The qualified biologist shall conduct surveys for nesting Swainson’s hawk in the project site and within 0.5 miles of construction activities where legally permitted. The biologist will use binoculars visually determine whether Swainson’s hawk nests occur beyond the 0.5-mile survey area if access is denied on adjacent properties. If no active Swainson’s hawk nests are identified on or within 0.5 miles of construction activities within the recommended survey periods, a letter report summarizing the survey results shall be submitted to the County and the CDFW within 30 days following the survey, and no further mitigation for nesting habitat is required. ▪ If active Swainson’s hawk nests are found within 0.5 miles of construction 	Prior to and during construction	Fresno County	<p>Fresno County Department of Public Works and Planning</p> <p>California Department of Fish and Wildlife</p>																									

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<p>activities, the biologist shall contact the County and the CDFW within one day following the preconstruction survey to report the findings. Construction activities include heavy equipment operation associated with construction, use of cranes or draglines, new rock crushing activities) or other project-related activities that could cause nest abandonment or forced fledging within 0.5 miles of a nest site between February 1 and September 15. Should an active nest be present within 0.5 miles of construction areas, then the CDFW shall be consulted to establish an appropriate noise buffer, develop take avoidance measures, and implement a monitoring and reporting program prior to any construction activities occurring within 0.5 miles of the nest. The monitoring program would require that a qualified biologist shall monitor all activities that occur within the established buffer zone to ensure that disruption of the nest or forced fledging does not occur. Should the biologist determine that the construction activities are disturbing the nest, then the biologist shall halt construction activities until the CDFW is consulted. The construction activities shall not commence until the CDFW determines that construction activities would not result in abandonment of the nest site. If the CDFW determines that take may occur, the applicant would be required to obtain a CESA take permit. Should the biologist determine that the nest has not been disturbed during construction activities within the buffer zone, then a letter report summarizing the survey results shall be submitted to the County and the CDFW and no further mitigation for nesting habitat is required.</p>			
<p>Mitigation Measure BR-5: The following mitigation measures shall be implemented to avoid project-related impacts to nest sites for birds of prey and migratory birds. These measures would also mitigate for impacts to state listed roosting bats:</p> <ul style="list-style-type: none"> ▪ A qualified biologist shall conduct a preconstruction survey for active nests should construction commence during the nesting season for birds of prey and migratory birds (between February 1 and September 15). Cavities within trees proposed to be removed shall be surveyed for the roosting bats. The 	<p>Prior to and during construction</p>	<p>Fresno County</p>	<p>Fresno County Department of Public Works and Planning California Department of Fish and Wildlife</p>

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<p>preconstruction survey will be conducted no more than 10 days prior to commencement of construction activities. If surveys show that there is no evidence of nests, then no additional mitigation will be required so long as construction commences within 10 days of the survey.</p> <ul style="list-style-type: none"> ▪ If any active nests are located within the study area, a buffer zone shall be established around the nests. A qualified biologist shall monitor nests weekly during construction to evaluate potential nesting disturbance by construction activities. The biologist shall delimit the buffer zone with construction tape or pin flags within 250 feet of the active nest and maintain the buffer zone until the end of breeding season or the young have fledged. Guidance from CDFW will be requested if establishing a 250-foot buffer zone is impractical. ▪ Trees anticipated for removal should be removed prior to nesting season. The dates outside of the nesting season include from September 16 to January 31. If trees are anticipated to be removed during the nesting season, a preconstruction survey shall be conducted by a qualified biologist. If the survey shows that there is no evidence of active nests, then the tree shall be removed within ten days following the survey. If active nests are located within trees identified for removal, a 250 foot buffer shall be installed around the tree. Guidance from the CDFW will be requested if the 250 foot buffer is infeasible. ▪ Exclusionary netting should be installed beneath the bridge that crosses the Friant-Kern Canal prior to nesting season if any construction activities are anticipated to occur on the bridge structure between February 1 and September 15 to eliminate nest sites for swallows. If exclusion netting is infeasible, then the Engineer shall be required to spray beneath the bridge on a daily basis prior to and during the nesting season to remove partial nests prior to the nests becoming established. If an active nest becomes established before the spraying has initiated, then guidance from the CDFW will be requested prior to commencement of construction activities on the bridge over the Friant-Kern Canal. 			

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<p>Mitigation Measure BR-6: The following precautionary mitigation measures shall be implemented to avoid project-related effects to San Joaquin Kit Fox (SJKF) in accordance with the <i>U.S. Fish and Wildlife Service Standardized Recommendations for Protection of the San Joaquin Kit Fox Prior To or During Ground Disturbance</i> (1999a) (Recommendations) for linear projects:</p> <ul style="list-style-type: none"> ▪ A preconstruction survey must be conducted for SJKF dens within 15 days prior to commencement of construction activities. If no SJKF dens are observed, a letter report summarizing the survey results shall be submitted to the County, the USFWS, and the CDFW within 30 days following the survey, and no further mitigation for nesting habitat is required. ▪ Should SJKF dens be observed, then the following mitigation measures shall be implemented: <u>Exclusion Zones</u> <ul style="list-style-type: none"> ▪ The configuration of exclusion zones around the SJKF dens shall have a radius measured outward from the entrance or cluster of entrances. The following radii are minimums and if they cannot be followed the USFWS must be contacted: <ul style="list-style-type: none"> ○ 50 feet from potential den; ○ 100 feet from known den; ○ USFWS must be contacted if presence of occupied and unoccupied natal/pupping den; and ○ 50 feet from a typical den. ▪ For known dens, the exclusion zone shall be demarcated by fencing that encircles each den at the appropriate distance and does not prevent access to the den by SJKF. Exclusion zone fencing should be maintained until all construction related or operational disturbances have been terminated. At that time, all fencing shall be removed to avoid attracting subsequent attention to the dens. 	<p>Prior to and during construction</p>	<p>Fresno County</p>	<p>Fresno County Department of Public Works and Planning</p> <p>U.S. Fish and Wildlife Service</p> <p>California Department of Fish and Wildlife</p>

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<ul style="list-style-type: none"> ▪ For potential and atypical dens, the placement of four to five flagged stakes 50 feet from the den entrance(s) will suffice to identify the den location. No fencing is required, but the exclusion zone must be observed. ▪ Construction and other project activities shall be prohibited or greatly restricted within these exclusion zones. Only essential vehicle operation on existing roads and foot traffic shall be permitted. All construction, vehicle operation, material storage, or any other type of surface-disturbing activity shall be prohibited within the exclusion zones. <p><u>Destruction of Dens</u></p> <ul style="list-style-type: none"> ▪ Disturbance to all SJKF dens shall be avoided to the maximum extent possible. Protection provided by SJKF dens for use as shelter, escape, cover, and reproduction is vital to the survival of the species. Limited destruction of SJKF dens may be allowed, if avoidance is not a reasonable alternative, provided the following procedures are observed. The value to SJKF of potential, known, and natal/pupping dens differ, and therefore, each den type needs a different level of protection. Destruction of any known or natal/pupping SJKF den requires a take authorization/permit from the USFWS and the CDFW. ▪ Occupied natal/pupping dens will not be destroyed until the pups and adults have vacated and then only after consultation with the USFWS and the CDFW. Project activities at some den sites may have to be postponed. ▪ Known dens occurring within the footprint of the activity must be monitored for three days with tracking medium or an infra-red beam camera to determine the current use. If no SJKF activity is observed at the den during this period, the den should be monitored for at least five consecutive days from the time of the observation to allow any resident animal to move to another den during its normal activity. Use of the den can be discouraged during this period by partially plugging its entrances with soil in a manner that any resident animal can escape easily. Only when the den is determined to be unoccupied may the den be excavated under the direction of the biologist. If the animal is still 			

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<p>present after five or more consecutive days of plugging and monitoring, the den may have to be excavated when, in the judgment of a biologist, it is temporarily vacant, for example during the animal's normal foraging activities. The USFWS encourages hand excavation, but realizes that soil conditions may necessitate the use of excavating equipment. Extreme caution must be exercised. Destruction of the den should be accomplished by careful excavation until it is certain that no SJKF are inside. The den should be fully excavated, filled with dirt and compacted to ensure that SJKF cannot reenter or use the den during the construction period. If at any point during excavation a SJKF is discovered inside the den, the excavation activity shall cease immediately and monitoring of the den as described above should be resumed. Destruction of the den may be completed when in the judgment of the biologist, the animal has escaped from the partially destroyed den.</p> <ul style="list-style-type: none"> ▪ If a take authorization/permit has been obtained from the USFWS and the CDFW, destruction of potential dens may proceed without monitoring, unless other restrictions were issued with the take authorization/permit. If no take authorization/permit has been issued, then potential dens should be monitored as if they were known dens. If any den was considered to be a potential den, but is later determined during monitoring or destruction to be currently, or previously used by SJKF (e.g. if SJKF sign is found inside), then destruction shall cease and the USFWS and the CDFW shall be notified immediately. <p><u>Construction and Operational Requirements</u></p> <ul style="list-style-type: none"> ▪ Habitat subject to permanent and temporary construction disturbances and other types of project-related disturbance shall be minimized. Project designs shall limit or cluster permanent project features to the smallest area possible while still permitting project goals to be achieved. To minimize temporary disturbances, all project-related vehicle traffic shall be restricted to established roads, construction areas, and other designated areas. These areas shall also be included in preconstruction surveys and, to the extent possible, shall be 			

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<p>established in locations disturbed by previous activities to prevent further impacts.</p> <ul style="list-style-type: none"> ○ Project-related vehicles shall observe a 20-mph speed limit in all project areas, except on county roads and State and federal highways; this is particularly important at night when SJKF are most active. To the extent possible, night-time construction shall be minimized. Off-road traffic outside of designated project areas should be prohibited. ○ To prevent inadvertent entrapment of SJKF or other animals during the construction phase of a project, all excavated, steep-walled holes or trenches more than two feet deep shall be covered at the close of each working day by plywood or similar materials, or provided with one or more escape ramps constructed of earth fill or wooden planks. Before such holes or trenches are filled, they shall be thoroughly inspected for trapped animals. ○ SJKF are attracted to den-like structures such as pipes and may enter stored pipe becoming trapped or injured. All construction pipes, culverts, or similar structures with a diameter of four inches or greater that are stored at a construction site for one or more overnight periods should be thoroughly inspected for SJKF before the pipe is subsequently buried, capped, or otherwise used or moved in any way. If a SJKF is discovered inside a pipe, that section of pipe should not be moved until the USFWS has been consulted. If necessary, and under the direct supervision of the biologist, the pipe may be moved once to remove it from the path of construction activity, until the fox has escaped. ○ All food-related trash items such as wrappers, cans, bottles, and food scraps shall be disposed of in closed containers and removed at least once a week from a construction or study area. ○ No firearms shall be allowed on the study area. ○ To prevent harassment, mortality of SJKF or destruction of dens by 			

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<p>dogs or cats, no pets shall be permitted on study areas.</p> <ul style="list-style-type: none"> ○ Use of rodenticides and herbicides in project areas should be restricted. This is necessary to prevent primary or secondary poisoning of SJKF and the depletion of prey populations on which they depend. All uses of such compounds should observe label and other restrictions mandated by the U.S. Environmental Protection Agency, California Department of Food and Agriculture, and other State and federal legislation, as well as additional project-related restrictions deemed necessary by the USFWS and the CDFW. If rodent control must be conducted, zinc phosphide should be used because of proven lower risk to SJKF. ○ A representative shall be appointed by the project proponent who will be the contact source for any employee or contractor who might inadvertently kill or injure a SJKF or who finds a dead, injured or entrapped individual. The representative will be identified during the employee education program. The representative's name and telephone number shall be provided to the USFWS and the CDFW. ○ A USFWS-approved biologist conduct habitat sensitivity training related to SJKF for all project contractors and personnel as identified under the CTS conservation measures. ○ Upon completion of the project, all areas subject to temporary ground disturbances, including storage and staging areas, temporary roads, pipeline corridors, etc. shall be recontoured if necessary, and revegetated to promote restoration of the area to pre-project conditions. An area subject to "temporary" disturbance means any area that is disturbed during the project, but that after project completion will not be subject to further disturbance and has the potential to be revegetated. Appropriate methods and plant species used to revegetate such areas shall be determined on a site-specific basis in consultation with the USFWS, CDFW, and revegetation experts. ○ In the case of trapped animals, escape ramps or structures shall be 			

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<p>installed immediately to allow the animal(s) to escape, or the USFWS should be contacted for advice.</p> <ul style="list-style-type: none"> ○ Any contractor, employee, or military or agency personnel who inadvertently kills or injures a SJKF shall immediately report the incident to their representative. This representative shall contact the CDFW immediately in the case of a dead, injured or entrapped SJKF. The CDFW contact for immediate assistance is State Dispatch at (916) 445-0045. They will contact the local warden or biologist. ○ The USFWS Sacramento Office and the CDFW will be notified in writing within three working days of the accidental death or injury to a SJKF during project related activities. Notification must include the date, time, and location of the incident or of the finding of a dead or injured animal and any other pertinent information. The USFWS contact is the Chief of the Division of Endangered Species is at 2800 Cottage Way, Suite W2605, Sacramento, CA 95825, (916) 414-6620. The CDFW contact is Mr. Ron Schlorff at 1416 9th Street, Sacramento, California 95814, (916) 654-4262. 			
<p>Mitigation Measure BR-7: A Section 1600 SAA shall be obtained from CDFW for impacts to riparian habitat, and all condition and requirements of the permit shall be adhered to. As a condition of the Section 1600 SAA, the following mitigation measure shall be implemented to compensate for the removal of 0.29 acres of riparian habitat:</p> <ul style="list-style-type: none"> ▪ Riparian habitat shall be created at not less than a 1:1 ratio in an area within reasonable proximity to the project site, and a Riparian Restoration and Monitoring Plan shall be established. 	Prior to Construction.	Fresno County	Fresno County Department of Public Works and Planning California Department of Fish and Wildlife
<p>Mitigation Measure BR-8: To compensate for the removal of oak trees within the oak woodland habitat areas, the following mitigation measure shall be implemented:</p> <ul style="list-style-type: none"> ▪ Each native tree in the genus <i>Quercus</i> with a diameter at breast height of five 	Prior to project completion.	Fresno County	Fresno County Department of Public Works and Planning

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<p>inches or greater that is impacted shall be replaced within upland areas of the project site that would be impacted by the Proposed Project at a 3:1 ratio (or other appropriate ratio as determined by the County) of planted to impacted trees. This replacement ratio is sufficient to offset the minor number of oak trees slated for removal with the Proposed Project (up to 10 trees total would be removed). Replacement trees shall be planted from the same genetic stock in appropriate soils within appropriate habitats.</p>			
<p>Mitigation Measure BR-9: The applicant shall obtain a Section 404 Clean Water Act (CWA) Nationwide Permit from the U.S. Army Corps of Engineers (USACE) for impacts to wetlands and waters of the U.S. and comply with the mitigation measures identified in the Hydrology and Water Quality Section to prevent discharge of pollutants to surface waters during construction. This shall include complying with the State’s National Pollution Discharge Elimination System (NPDES) General Permit for Discharges of Storm Water Runoff Associated with Construction Activity (General Permit) issued by the Central Valley Regional Water Quality Control Board (CVRWQCB). All conditions of the Nationwide Permit shall be adhered to. At a minimum, impacts to waters of the U.S. shall be offset at a 1:1 ratio through the purchase of creation credits or onsite creation. The creation credits that would be purchased for the loss of VPFS, VPTS, and CTS may be used to satisfy the USACE requirements for removal of seasonal wetlands.</p>	<p>Prior to and during construction</p>	<p>Fresno County</p>	<p>Fresno County Department of Public Works and Planning U.S. Army Corps of Engineers Regional Water Quality Control Board</p>
<p>Mitigation Measure BR-10: The following precautionary mitigation measures shall be implemented to avoid project-related effects to special-status plant species:</p> <ul style="list-style-type: none"> ▪ Focused surveys by a qualified botanist with previous experience in conducting surveys-for Hartweg's golden sunburst, succulent owl's clover, and orcutt grasses will be conducted during the appropriate annual floristic period(s) prior to construction. ▪ If listed plants are detected during surveys, consultation will be initiated as appropriate with USFWS and/or CDFW in accordance with FESA and/or CESA and an Incidental Take Permit (ITP) will be acquired if appropriate. 	<p>Prior to construction</p>	<p>Fresno County</p>	<p>Fresno County Department of Public Works and Planning U.S. Fish and Wildlife Service California Department of Fish and Wildlife</p>

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Cultural Resources			
<p>Mitigation Measure CR-1: Site P-10-761 shall be avoided by all ground-disturbing activities associated with the Proposed Project. Temporary construction fencing with a height of at least five feet shall be placed along the southern margin of Site P-10-761 during construction of the Proposed Project to avoid inadvertent impacts.</p>	During construction	Fresno County	Fresno County Department of Public Works and Planning
<p>Mitigation Measure CR-2: In the event that cultural resources are inadvertently discovered during ground-disturbing activities, work should stop in that area and within 100 feet of the find until a qualified archaeologist who meets the Secretary of the Interior’s Standards for archaeologists (National Park Service 1983) can assess the significance of the find. Construction activities could continue in other areas. If the discovery proves to be significant, additional work, such as data recovery excavation, may be warranted and would be discussed in consultation with USACE, Reclamation and any other relevant regulatory agency. Should the Contractor, or any of the Contractor’s employees, subcontractors, or parties operating or associated with the Contractor, in the performance of the Contract discover evidence of possible cultural resources on state or federal lands, the Contractor shall immediately cease work at that location and provide oral notification to the Contracting Officer, giving location and nature of the findings, pursuant to the regulations at 36 CFR 800.13, respectively. The Contractor shall forward a written report of findings to USACE or Reclamation’s authorized official of the discovery (the authorized official is the Area Manager, or their designee) within 48 hours. The Contractor will not resume activity in the area of the discovery until written approval from the Contracting Officer has been received.</p>	During construction	Fresno County	Fresno County Department of Public Works and Planning U.S. Army Corps of Engineers
<p>Mitigation Measure CR-3: There is a remote possibility that an unanticipated discovery of human remains could occur. The following mitigation measures shall be implemented in the event that human remains are encountered during construction:</p> <ul style="list-style-type: none"> ▪ If human remains are discovered during project construction, work will stop at 	During construction	Fresno County	Fresno County Department of Public Works and Planning Native American Heritage Commission

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<p>the discovery location and any nearby area reasonably suspected to overlie human remains (Public Resources Code, Section 7050.5). The Fresno County coroner will be contacted to determine if the cause of death must be investigated.</p> <ul style="list-style-type: none"> ▪ If the coroner determines that the remains are of Native American origin, it is necessary to comply with state laws relating to the disposition of Native American burials, which fall within the jurisdiction of the Native American Heritage Commission (NAHC) (PRC, Section 5097). The coroner will contact the NAHC. The descendants or most likely descendants (MLD) of the deceased will be contacted, and work will not resume until they have made a recommendation to the landowner or the person responsible for the excavation work for means of treating and disposing of, with appropriate dignity, the human remains and any associated grave goods, as provided in Public Resources Code, Section 5097.98. Work may resume if NAHC is unable to identify an MLD or the descendant fails to make a recommendation within 48 hours. ▪ If human remains are discovered on federal lands, the remains shall be treated in accordance with Reclamations' Directives and Standards (LND 07-01). These directives and standards provide procedures for compliance with federal statutes when inadvertent discoveries of human remains occur on Reclamation lands. If Native American cultural items, including human remains, funerary objects, sacred objects, and items of cultural patrimony, are inadvertently discovered, work will cease immediately in the area of discovery and the requirements of the Native American Graves Protection and Repatriation Act (NAGPRA) of 1990 (25 United States Code 3001-3013), and implementing regulations at 43 C.F.R. § 10.4 (2006), will be followed. NAGPRA requires Reclamation to inventory human remains and associated funerary objects and to provide culturally affiliated tribes with the inventory of collections. NAGPRA also requires repatriation, on request, to the culturally affiliated tribes. ▪ If human remains are encountered on Tribal lands, work shall halt in the vicinity of the find and the Fresno County Coroner shall be notified immediately. 			

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<p>Pursuant to 36 CFR Part 800.13 of NHPA: Post-Review Discoveries, and 43 C.F.R.§ 10.4 (2006) of the NAGPRA: Inadvertent Discoveries, the Tribal Cultural Resources Director and Bureau of Indian Affairs (BIA) archaeologist will also be contacted immediately. No further ground disturbance shall occur in the vicinity of the find until the County Coroner, Tribal Official, and BIA archaeologist have examined the find and agreed on an appropriate course of action. If the remains are determined to be of Native American origin, the BIA representative shall notify a MLD. The MLD is responsible for recommending the appropriate disposition of the remains and any grave goods.</p>			
Greenhouse Gas Emissions			
<p>Mitigation Measure GHG-1: The following Greenhouse Gas (GHG) Reduction Measures developed by the California Air Pollution Control Officers Association would reduce GHG emission by more than 29 percent (CAPCOA, 2010):</p> <ul style="list-style-type: none"> ▪ Idling of heavy duty construction equipment and delivery trucks shall be limited to no more than five minutes. ▪ An alternative form of fuel (i.e. biodiesel, E85, etc.) shall be used whenever possible. ▪ Hybrid and electric construction equipment shall be used whenever possible. 	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning
<p>Mitigation Measure GHG-2: Implement Mitigation Measure AQ-2.</p>	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning
Hazards and Hazardous Materials			
<p>Mitigation Measure HM-1: Construction contractors shall ensure that any construction equipment that normally includes a spark arrester shall be equipped with an arrester in good working order. This includes, but is not limited to, vehicles, heavy equipment, and chainsaws.</p>	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning
<p>Mitigation Measure HM-2: Construction contractors shall ensure that during construction, staging areas, building areas, and/or areas slated for development using spark-producing equipment shall be</p>	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning

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<p>cleared of dried vegetation or other materials that could serve as fuel for combustion. To the extent feasible, the contractor shall keep these areas clear of combustible materials to maintain a firebreak.</p>			
Hydrology and Water Quality			
<p>Mitigation Measure HYD-1: Construction contractors shall comply with the State’s NPDES General Permit for Discharges of Storm Water Runoff Associated with Construction Activity (General Permit). The Central Valley Regional Water Quality Control Board (RWQCB) requires that all construction sites have adequate control measures to prevent the discharge of sediment and other pollutants to streams. To comply with the permit, an NOI shall be filed with the Central Valley RWQCB and a Storm Water Pollution Prevention Plan (SWPPP) shall be prepared prior to construction. Preparation of the SWPPP shall adhere to the Caltrans water pollution control manuals and approved BMPs by the State Water Resources Control Board (SWRCB). A copy of the SWPPP must be obtained and remain onsite during construction activities. Control measures are required prior to and throughout the rainy season. Water quality BMPs identified in the SWPPP may include, but would not be limited to, the following:</p> <ul style="list-style-type: none"> ▪ Temporary erosion control measures (such as silt fences, staked straw bales, and temporary revegetation) shall be employed for disturbed areas. No disturbed surfaces will be left without erosion control measures in place during the winter and spring months. ▪ Sediment shall be retained onsite by a system of sediment basins, traps, or other appropriate measures. ▪ A spill prevention and countermeasure plan shall be developed which will identify proper storage, collection, and disposal measures for potential pollutants (such as fuel, fertilizers, pesticides, etc.) used onsite. The plan will also require the proper storage, handling, use, and disposal of petroleum products. ▪ Construction activities shall be scheduled to minimize land disturbance during 	<p>Prior to and during construction</p>	<p>Fresno County/ Construction Contractors</p>	<p>Fresno County Department of Public Works and Planning</p>

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<p>peak runoff periods and to the immediate area required for construction. Soil conservation practices shall be completed during the fall or late winter to reduce erosion during spring runoff. Existing vegetation will be retained where possible. To the extent feasible, grading activities shall be limited to the immediate area required for construction.</p> <ul style="list-style-type: none"> ▪ Surface water runoff shall be controlled by directing flowing water away from critical areas and by reducing runoff velocity. Diversion structures such as terraces, dikes, and ditches shall collect and direct runoff water around vulnerable areas to prepared drainage outlets. Surface roughening, berms, check dams, hay bales, or similar devices shall be used to reduce runoff velocity and erosion. ▪ Sediment shall be contained when conditions are too extreme for treatment by surface protection. Temporary sediment traps, filter fabric fences, inlet protectors, vegetative filters and buffers, or settling basins shall be used to detain runoff water long enough for sediment particles to settle out. Construction materials, including topsoil and chemicals, shall be stored, covered, and isolated to prevent runoff losses and contamination of groundwater. ▪ Topsoil removed during construction shall be carefully stored and treated as an important resource. Berms shall be placed around topsoil stockpiles to prevent runoff during storm events. ▪ Establish fuel and vehicle maintenance areas away from all drainage courses and design these areas to control runoff. ▪ Disturbed areas will be revegetated after completion of construction activities. ▪ Temporary high-visibility construction fencing shall be installed along the edge of work areas within 50 feet of mapped seasonal wetlands and channels. Temporary high-visibility construction fencing shall be installed around the channels occurring within 50 feet of construction activities. Fencing should be installed prior to any construction and remain in place until all construction activities within the action area have been completed. 			

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<ul style="list-style-type: none"> ▪ Staging areas shall be located away from the fenced seasonal wetlands and channels. Temporary stockpiling of excavated or imported material shall occur only in approved construction staging areas. Excess excavated soil shall be used onsite or disposed of at a regional landfill or other appropriate facility. ▪ No surface water will be drafted from aquatic features in the project site. Water will be trucked in as needed for use during construction. ▪ All necessary permits and approvals shall be obtained. ▪ Sanitary facilities shall be provided for construction workers. ▪ Hazardous materials shall be stored appropriate and approved containers, maintaining required clearances, and handling materials in accordance with the applicable federal, state and/or local regulatory agency protocols. 			
Noise			
<p>Mitigation Measure N-1: In accordance with the County’s Noise Ordinance, construction activities shall be limited to occur only between the hours of 6:00 am to 9:00 pm Monday through Friday, and between the hours of 7:00 am to 5:00 pm on Saturday and Sunday.</p>	During construction	Fresno County/ Construction Contractors	Fresno County Department of Public Works and Planning