State Route 68/Corral de Tierra Road
Intersection Improvement Project

Monterey County, California
05-MON-68-PM 12.8/13.2
EA No. 05-0H8230
ID #: 0500000085

Initial Study
with Proposed Mitigated Negative Declaration

Prepared by the
State of California Department of Transportation

December 2014
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General Information about This Document

What's in this document?
The California Department of Transportation (Caltrans) has prepared this Initial Study/Mitigated Negative Declaration, which examines the potential environmental impacts of alternatives being considered for the proposed project located in the County of Monterey, California. The document describes why the project is being proposed, alternatives for the project, the existing environment that could be affected by the project, and potential impacts from each of the alternatives, and the proposed avoidance, minimization, and/or mitigation measures.

What should you do?
- Please read this Initial Study/Mitigated Negative Declaration.
- Additional copies of this document and related technical studies are available for review at the Caltrans district office at 50 Higuera Street, San Luis Obispo, California 93401; the Monterey Public Library at 625 Pacific Street, Monterey, California 93940; and the County of Monterey Resource Management Agency, Department of Public Works at 168 West Alisal Street Second Floor, Salinas, California 93901. This document may be downloaded at the following website: http://www.dot.ca.gov/dist05/projects/corraldetierra
- Please attend the public hearing: Wednesday December 10, 2014 from 6:00pm. to 8:00pm. at San Benancio Middle School, 43 San Benancio Road, Salinas, CA 93908
- We would like to hear what you think. If you have any comments about the proposed project, please attend the public hearing and/or send your written comments to Caltrans by the deadline.
- Submit comments via United States mail to Caltrans at the following address:
  Matt Fowler, Senior Environmental Planner
  Caltrans District 5
  California Department of Transportation
  50 Higuera Street
  San Luis Obispo, CA 93401
- Submit comments via email to: Matt.C.Fowler@dot.ca.gov
- Be sure to submit comments by the deadline: Tuesday December 31, 2014.

What happens next?
After comments are received from the public and reviewing agencies, Caltrans may 1) give environmental approval to the proposed project, 2) do additional environmental studies, or 3) abandon the project. If the project is given environmental approval and funding is appropriated, Caltrans could design and construct all or part of the project.

For individuals with sensory disabilities, this document is available in Braille, in large print, on audiocassette, or on computer disk. To obtain a copy in one of these alternate formats, please call or write to Caltrans, Attn: Matt Fowler, Caltrans District 5, 50 Higuera Street, San Luis Obispo, CA 93401; (805) 542-4603 Voice, or use the California Relay Service TTY number, [1 (800) 735-2929].
The proposed project consists of operational improvements at the State Route 68/Corral de Tierra Road Intersection, post mile 12.8/13.2, in an unincorporated area of the County of Monterey.

INITIAL STUDY
with Proposed Mitigated Negative Declaration

Submitted Pursuant to: (State) Division 13, California Public Resources Code

THE STATE OF CALIFORNIA
Department of Transportation

11-18-14
Date of Approval

Matt Fowler
Senior Environmental Planner
California Department of Transportation
CEQA Lead Agency
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Proposed Mitigated Negative Declaration
Pursuant to: Division 13, Public Resources Code

Project Description
The California Department of Transportation (Caltrans) proposes to improve the intersection of State Route 68 and Corral de Tierra Road (post mile 12.8/13.2) by constructing a second westbound-to-southbound left-turn lane. Minor widening and restriping of Corral de Tierra Road would create a second southbound receiving lane. The shoulders of Corral de Tierra Road within the project area would be widened to 8 feet to better accommodate pedestrians and facilitate the future addition of Class II bicycle lanes.

Determination
This proposed Mitigated Negative Declaration is included to give notice to interested agencies and the public that it is Caltrans’ intent to adopt a Mitigated Negative Declaration for this project. This does not mean that Caltrans’ decision regarding the project is final. This Mitigated Negative Declaration is subject to change based on comments received by interested agencies and the public.
Caltrans has prepared an Initial Study for this project and, pending public review, expects to determine from this study that the proposed project would not have a significant effect on the environment for the following reasons:
The proposed project would have no effect on land use, growth, farmlands, community impacts, cultural resources, or sensitive plant species (e.g., threatened, endangered, or otherwise special status plants).
In addition, the proposed project would have less than significant effects to aesthetics, air quality, geology/soils, hazards/hazardous materials, paleontology, wetlands, hydrology/water quality, noise, public services, and traffic/transportation.
The proposed project could have an effect on California tiger salamander, which is a federal and State listed threatened species.
A section 2081 Incidental Take Permit will be required from the California Department of Fish and Wildlife to authorize incidental take of California tiger salamander resulting from project construction.
Per discussions with the U.S. Fish and Wildlife Service (USFWS), it is not expected that consultation with the USFWS will be required with implementation of USFWS-approved measures.
With the following avoidance, minimization, and mitigation measures incorporated, the proposed project would have less than significant effects to biological resources during construction activities including riparian vegetation, nesting birds, and special status species:
The following Avoidance and Minimization Measures would reduce potential impacts to biological resources related to construction activities:
- Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the perimeter of the coast live oak community in the Biological Study Area.
Caltrans shall consult with the California Department of Fish and Wildlife and a qualified arborist approved by the County prior to any tree pruning activities within riparian areas. Tree limbs that must be removed shall be cut with a sharp saw (i.e., versus removal with heavy equipment).

Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the perimeter of the arroyo willow community in the Biological Study Area.

Environmentally Sensitive Area fencing shall be removed following the completion of work.

Following completion of work, any areas of the biological study area denuded of vegetation during project construction shall be revegetated using locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.

The following Avoidance and Minimization Measures would reduce potential impact to riparian vegetation related to construction activities:

- Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the reaches of the ephemeral drainage, or the adjacent riparian vegetation where present, within the biological study area to prevent unnecessary encroachment into these areas.
- Contract specifications will require the contractor to refer to the Caltrans “Water Pollution Control Program (WPCP) Preparation Manual” and “Construction Site BMPs Manual” to prepare a WPCP.
- All areas of the biological study area denuded of vegetation during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.

The following Avoidance and Minimization Measures would reduce potential impacts to migratory nesting birds related to construction:

- If work must begin during the nesting season (February 16 to August 31), no more than 14 working days prior to the start of construction a nesting bird surveys for Cooper’s hawk shall be completed. Should an active nest be discovered, protective actions would be taken to comply with the Migratory Bird Treaty Act.
- All construction shall be conducted during daylight hours.
- If work must begin during the nesting season (February 16 to August 31), preconstruction nesting bird surveys for migratory birds shall be completed. Should an active nest be discovered, protective actions would be taken to comply with the Migratory Bird Treaty Act.

The following Avoidance, Minimization and Mitigation Measures would reduce potential impacts to special status species related to construction activities:

- A retaining wall shall be constructed along the north side of State Route 68, west of Corral de Tierra Road.
- Environmentally Sensitive Area fencing shall be installed along the limits of work associated with construction of the new fill slope and retaining wall to prevent encroachment into adjacent California tiger salamander upland habitat.
- All construction staging shall be located within the existing State and County rights-of-way.
• Following completion of work, areas of potential California tiger salamander upland habitat in the biological study area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.

• Exclusion fencing shall be installed along the boundary of the work area that would affect California tiger salamander habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.

• All burrows in the area to be disturbed shall be surveyed during the dry season for presence of estivating California tiger salamander. Surveys will be conducted at each burrow via either hand excavation or surveying with a fiber optic camera. Written documentation of the survey results shall be provided to the USFWS within two weeks of completion of the surveys.

• The exclusion fence shall be removed following the completion of work.

• The loss of low-quality California tiger salamander habitat would be mitigated at a 1:1 ratio as prescribed by California Department of Fish and Wildlife. To compensate for the loss of 0.16 acre of California tiger salamander upland habitat, a total of 0.16 acre of mitigation area that provides California tiger salamander upland habitat shall be purchased and preserved in perpetuity through use of a conservation easement or equivalent means.

• Environmentally Sensitive Areas shall be marked using orange construction fencing or equivalent and shall be maintained in good condition until construction is complete.

• Following completion of work, all areas denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.

• Exclusion fencing shall be installed along the boundary of the work area that would affect western spadefoot habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.

• The exclusion fence shall be removed following completion of work.

• All construction and staging shall be located within the existing State and County rights-of-way.

• Following the completion of work, areas of potential western spadefoot upland habitat within the biological study area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.

Matt Fowler
Senior Environmental Planner
District 5
California Department of Transportation

Date

11-18-14
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Summary

The California Department of Transportation (Caltrans) proposes to improve the intersection of State Route 68 and Corral de Tierra Road (post mile 12.8/13.2) located in an unincorporated area of the County of Monterey, California. The purpose of the project is to relieve traffic congestion conditions during the evening peak traveling hours and to reduce the collision rate related to left-turn movements from State Route 68 onto Corral de Tierra Road. The alternatives identified for the project include the proposed project and the No-Build Alternative.

The proposed project consists of roadway improvements that would widen the approaches to the State Route 68/Coral de Tierra Road intersection to accommodate the construction of a second left-turn lane from westbound State Route 68 to southbound Corral de Tierra Road. In addition, a second southbound receiving lane would be constructed on Corral de Tierra Road. The proposed intersection improvement would extend along State Route 68 about 925 feet west of Corral de Tierra Road and 1,435 feet east of Corral de Tierra Road. The paved shoulders of Corral de Tierra Road within the project area would be widened to 8 feet to better accommodate pedestrians and facilitate the future addition of Class II bicycle lanes to Corral de Tierra Road.

The No-Build Alternative assumes that no new improvements would be constructed, other than the projects already approved in the area. The No-Build Alternative fails to meet the purpose and need of this project and it is anticipated that the unimproved intersection’s operational conditions will continue to deteriorate.

Two additional build alternatives were considered and analyzed in the technical studies completed for the project, but were eliminated after further consideration (refer to Section 1.3.4 for additional information about the alternatives considered but eliminated from further discussion). The second build alternative was discarded in late 2007 after Caltrans determined that it would not meet design standards for safe access, due to the shorter deceleration and storage lengths available for turns to and from the driveways. The third build alternative was discarded because it failed to address the proposed project’s purpose and need.

The proposed project would have no effect on land use, growth, farmlands, community impacts, cultural resources, or sensitive plant species.
Summary

The proposed project would have no significant effect on aesthetics, air quality, geology/soils, hazards/hazardous materials, paleontology, wetlands, hydrology/water quality, noise, public services, and traffic/transportation after implementation of Caltrans Standard Specifications and conditions (refer to Appendix C: Minimization and/or Mitigation Summary). The proposed project has the potential to impact the California tiger salamander if present and its habitat. With implementation of avoidance, minimization, and mitigation measures, there is no potential for significant impacts to California tiger salamander or their habitat. Implementation of avoidance and minimization measures such as construction of a retaining wall to minimize grading in potential California tiger salamander habitat, installation of exclusion fencing around construction areas, restricting construction staging to existing State and County rights-of-way, and revegetation with native species would reduce potential impacts to less than significant. Additionally, the loss of upland California tiger salamander habitat would be mitigated at a 1:1 ratio as prescribed by California Department of Fish and Wildlife further reducing potential impacts.

The proposed project would not result in any significant impacts with implementation of the avoidance, minimization, and mitigation measures contained in this document.

The proposed project would improve the flow of traffic through the intersection of State Route 68 and Corral de Tierra Road and would have a beneficial effect in helping to reduce congestion related pollutant emissions on roadway links in the project vicinity.
Summary of Potential Impacts from Alternatives

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<tr>
<th>Potential Impact</th>
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<tbody>
<tr>
<td><strong>Utilities/Emergency Services</strong></td>
<td>Construction Impacts: Slight increase in emergency response times for police and fire protection.</td>
<td>No impacts</td>
<td>At least one traffic lane shall be open at all times, and emergency access shall be maintained during construction through the provision of traffic detours.</td>
</tr>
<tr>
<td><strong>Traffic and Transportation/ Pedestrian and Bicycle Facilities</strong></td>
<td>Construction Impacts: Temporary congestion and temporary lane closures.</td>
<td>No impacts</td>
<td>A Traffic Management Plan shall be prepared. Temporary lane closures shall comply with Caltrans standards for construction traffic control and District 5 lane closure charts for this section of State Route 68.</td>
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<tr>
<td><strong>Long-Term Impacts:</strong> Improved flow of traffic through State Route 68/Corral de Tierra intersection.</td>
<td>Long-Term Impact: The operational conditions of the unimproved intersection will continue to deteriorate.</td>
<td>No impacts</td>
<td>The project shall include elements such as guardrail post darkening and native vegetation planting.</td>
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<tr>
<td><strong>Visual/Aesthetics</strong></td>
<td>Long-Term Impacts: Nominal change in visual character of the project area and potential impacts associated with guardrail glare and loss of vegetation.</td>
<td>No impacts</td>
<td>The Contractor shall develop and implement a Water Pollution Control Program during project construction. The Water Pollution Control Program shall be consistent with the Caltrans Storm Water Pollution Prevention Plan and Water Pollution Control Program Preparation Manual. Construction Site Best Management Practices detailed in the Water Pollution Control Program shall be implemented during construction. Monterey County and Caltrans shall ensure that the Project Contractor develops and implements an erosion control plan indicating proposed methods for the control of runoff, erosion, and sediment movement, in conjunction with the measure above. A Low Rainfall Erosivity Waiver shall be obtained from the State Water Resources Control Board prior to construction.</td>
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<tr>
<td><strong>Water Quality and Storm Water Runoff</strong></td>
<td>Construction Impacts: Increased sedimentation and erosion and increased risk of spills to surface waters.</td>
<td>No impacts</td>
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<td><strong>Long-Term Impacts:</strong> Increase in impervious area resulting in an increase in the volume of runoff during a storm and degradation of water quality. Degradation of water quality associated with roadway pollutants.</td>
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<td><strong>Geology/Soils/Seismic/Topography</strong></td>
<td><strong>Construction Impacts:</strong> Increase in soil erosion or the loss of topsoil.</td>
<td>No impacts</td>
<td>Monterey County and Caltrans shall ensure that the project discharges to unlined vegetated ditches to allow for infiltration and filtration of storm water, minimizes new impervious surfaces to the maximum extent feasible, and incorporates permanent erosion control including compost and appropriate vegetation to reduce runoff and maximize infiltration. Permanent water quality treatment facilities shall be designed and constructed in accordance with the &quot;Post-Construction Stormwater Management Requirements for Development Projects in the Central Coast Region&quot; dated July 12, 2013, as adopted by the Central Coast Regional Water Quality Control Board, Resolution No. R3 2013 0032.</td>
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<tr>
<td><strong>Paleontology</strong></td>
<td><strong>Construction Impacts:</strong> There is a potential for paleontological resources to be present within the Project Area Limits that could be impacted during excavation at depths greater than 5 feet.</td>
<td>No impacts</td>
<td>Design Pollution Prevention Best Management Practices shall be incorporated into the proposed project and an erosion control plan shall be developed and implemented to prevent erosion on the newly constructed embankment. Project activities requiring excavation greater than five feet deep shall be monitored by a qualified paleontologist to identify, evaluate, and provide recommendations for the treatment of any sensitive fossil resources that may be uncovered by the project. If any sensitive paleontological resources (vertebrate or plant fossils) are discovered during construction, it is required that construction be halted in the immediate vicinity of the discovery (33-foot radius), until the District Paleontology Coordinator has the opportunity to review the discovery. Remediation of any sensitive resources encountered before or during construction can include removal, preparation and curation of any significant remains.</td>
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<td><strong>Hazardous Waste/Materials</strong></td>
<td>Construction Impacts: Limited increase in amount of chemicals, such as solvents and paints, present in the project area. Unexploded ordnance, hydrocarbon contaminated soils, or other unknown hazardous materials may be discovered during construction due to proximity of Fort Ord and two gas stations. An aerially deposited lead investigation concluded that soil in the project area meets Caltrans variance requirements for embankment fill. There is potential for elevated lead concentrations to be present in yellow road striping paint and pavement markings. Polychlorinated biphenyls may be present in the pole-mounted transformers located along State Route 68 and Corral de Tierra Road in the project limits.</td>
<td>No impacts</td>
<td>The project shall prepare and implement a Lead Compliance Plan consistent with California Code of Regulations Title 8, Section 1531.1 and Caltrans requirements. One foot of clean soil is recommended to be placed on top of lead-impacted soil placed in the embankment along the north side of State Route 68 to minimize future exposure of the soil to aerially deposited lead. Any yellow traffic striping and pavement-marking material that must be removed shall be stored, tested, and disposed of in accordance with the applicable Standard Special Provisions issued by Caltrans for such work. Soil beneath or around any pole-mounted or pad-mounted transformers within the project area shall be tested for polychlorinated biphenyls if the transformers appear to be leaking, unless the transformer is certified polychlorinated biphenyl-free. Testing shall occur immediately following observation of a leaking transformer. In the event that unexploded ordnance is discovered in the project area, work shall stop immediately and Presidio of Monterey Military Police shall be notified by calling (831) 242-7851 or (831) 242-7852. If any previously unknown hazardous waste/material is encountered during construction, the procedures outlined in Table 7-1.1, Unknown Hazards Procedures, in the Caltrans Construction Manual shall be followed.</td>
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<tr>
<td><strong>Natural Communities</strong></td>
<td>Construction Impacts: Tree pruning of 0.001 acre of riparian vegetation (coast live oak trees [Quercus agrifolia]) in the coast live oak community to facilitate construction of the fill slope at the west end of the project study.</td>
<td>No impacts</td>
<td>Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the perimeter of the coast live oak and arroyo willow communities in the Biological Study Area. Consultation shall occur with the California Department of Fish and Wildlife and a qualified arborist prior to any tree pruning.</td>
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<td>Wetlands and other Waters&lt;br&gt;• Wetlands&lt;br&gt;• Waters of the US/State&lt;br&gt;• California Department of Fish and Wildlife Waters/Riparian</td>
<td>No impacts to wetlands or Waters of the U.S./State.&lt;br&gt;<strong>Construction Impacts:</strong> Tree pruning of 0.001 acre of riparian vegetation (coast live oak trees [Quercus agrifolia]) in the coast live oak community to facilitate construction of the fill slope at the west end of the project study area.¹</td>
<td>No impacts</td>
<td>Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the reaches of the ephemeral drainage, or the adjacent riparian vegetation where present, within the biological study area to prevent unnecessary encroachment into these areas.&lt;br&gt;Contract specifications will require the contractor to refer to the Caltrans “Water Pollution Control Program (WPCP) Preparation Manual” and “Construction Site BMPs Manual” to prepare a WPCP.&lt;br&gt;All areas of the biological study area denuded of vegetation during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.&lt;br&gt;All construction shall be conducted during daylight hours.</td>
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<tr>
<td>Animal Species</td>
<td><strong>Construction Impacts:</strong> Temporary disturbance of Cooper’s hawk or migratory nesting birds.</td>
<td>No impacts</td>
<td>If work must begin during the nesting season (February 16 to August 31), preconstruction nesting bird surveys for migratory birds shall be completed. Should an active nest be discovered, protective actions would be taken to comply with the Migratory Bird Treaty Act.&lt;br&gt;All construction shall be conducted during daylight hours.</td>
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¹ This is the same impact as previously noted in the Natural Communities row under the Alternative 1 column.
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<td>Threatened and Endangered Species</td>
<td><strong>Long-Term Impacts</strong>: Loss of 0.16 acre of potential California tiger salamander upland habitat within the biological study area. No construction impacts or long-term impacts to California red-legged frog or western spadefoot toad.</td>
<td>No impacts to California tiger salamander, California red-legged frog, or western spadefoot toad.</td>
<td><em>California tiger salamander:</em> California tiger salamander could potentially occur in the Biological Study Area and be affected by the proposed project. As a result, a section 2081 Incidental Take Permit will be required from the California Department of Fish and Wildlife to authorize incidental take of California tiger salamander resulting from project construction. While California tiger salamander could potentially occur in the Biological Study Area, per discussions with the U.S. Fish and Wildlife Service (USFWS), it is not expected that consultation with the USFWS will be required with implementation of approved avoidance and minimization measures as described below. A retaining wall shall be constructed along the north side of State Route 68, west of Corral de Tierra Road. Environmentally Sensitive Area fencing shall be installed along the limits of work associated with construction of the new fill slope and retaining wall to prevent encroachment into adjacent California tiger salamander upland habitat. All construction staging shall be located within the existing State and County rights-of-way. Following completion of work, areas of potential California tiger salamander upland habitat in the biological study area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study. Exclusion fencing shall be installed along the boundary of the work area that would affect California tiger salamander habitat. Exclusion fencing shall consist of silt fence or...</td>
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<td>California tiger salamander – assumed present within the biological study area</td>
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<td>California red-legged frog – surveys detected no California red-legged frog in the biological study area; however, marginal upland habitat does exist within the biological study area.</td>
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<td>Western spadefoot toad – surveys detected no western spadefoot toad in the biological study area; however, marginal upland habitat does exist within the biological study area.</td>
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<td>equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.</td>
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<td>The exclusion fence shall be removed following the completion of work.</td>
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<td>All burrows in the area to be disturbed shall be surveyed during the dry season for presence of estivating California tiger salamander. Surveys will be conducted at each burrow via either hand excavation or surveying with a fiber optic camera. Written documentation of the survey results shall be provided to the USFWS within two weeks of completion of the surveys.</td>
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<td><em>California red-legged frog:</em> Environmentally Sensitive Areas shall be marked using orange construction fencing or equivalent and shall be maintained in good condition until construction is complete.</td>
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<td>Following completion of work, all areas denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.</td>
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<td><em>Western spadefoot toad:</em> Exclusion fencing shall be installed along the boundary of the work area that would affect western spadefoot habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in</td>
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<td><strong>Invasive Species</strong></td>
<td><strong>Construction Impacts:</strong> Potential introduction of invasive species to the project area.</td>
<td>No impacts</td>
<td>The landscaping and erosion control included in the project shall not use species listed as noxious weeds. During construction all earthmoving equipment to be used shall be thoroughly cleaned before arriving to the project area, all seeding equipment (i.e., hydroseed trucks) shall be thoroughly rinsed at least 3 times prior to beginning seeding work, and all equipment shall be thoroughly cleaned before leaving the project area. Eradication strategies shall be implemented should an invasion occur.</td>
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<td>Good condition until project construction is complete. The exclusion fence shall be removed following completion of work. All construction and staging shall be located within the existing State and County rights-of-way. Following the completion of work, areas of potential western spadefoot upland habitat within the biological study area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study. <strong>Compensatory Mitigation for California tiger salamander:</strong> The loss of low-quality California tiger salamander habitat would be mitigated at a 1:1 ratio as prescribed by California Department of Fish and Wildlife. To compensate for the loss of 0.16 acre of California tiger salamander upland habitat, a total of 0.16 acre of mitigation area that provides California tiger salamander upland habitat shall be purchased and preserved in perpetuity through use of a conservation easement or equivalent means.</td>
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<td><strong>Air Quality</strong></td>
<td><strong>Short-Term Construction Impacts:</strong> Potential exposure of surrounding sensitive receptors to airborne particulates and fugitive dust.</td>
<td>No construction impacts; no long-term emission reduction benefits.</td>
<td>The project shall implement Monterey Bay Unified Air Pollution Control District California Environmental Quality Act Air Quality Guidelines dust minimization measures. The project shall implement Caltrans Standard Specifications recommended for reduction of air pollutants generated by vehicle and equipment exhaust during construction.</td>
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<td><strong>Long-Term Impacts:</strong> Beneficial effect in helping to reduce congestion related pollutant emissions on roadway links in the project vicinity.</td>
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<td><strong>Noise and Vibration</strong></td>
<td><strong>Construction Impacts:</strong> Temporary increase in noise levels in the immediate area.</td>
<td>No impacts</td>
<td>The following measures would reduce construction-related noise impacts for existing residences adjacent to the project area: All construction equipment shall conform to the provisions of Caltrans Standard Specifications, Section 14-8.02, “Noise Control.” This section requires the contractor to comply with all local ordinances (i.e., County of Monterey) that apply to any work as part of the contract. Therefore, the maximum 85 A-weighted decibel (dBA) at a distance of 50 feet between the hours of 9:00 p.m. and 6:00 a.m. on weekdays shall be used. Portable construction equipment shall be located as far as possible from the noise sensitive locations as is feasible. Construction vehicle staging areas and equipment maintenance areas shall be located as far as possible from sensitive receptors. All construction equipment shall have sound control devices no less effective than those provided on the original equipment. No construction equipment shall have an unmuffled exhaust. As directed by Caltrans, the contractor shall implement appropriate additional noise abatement measures including, but not limited to, shutting off idling equipment, rescheduling</td>
</tr>
</tbody>
</table>
Summary of Potential Impacts from Alternatives

<table>
<thead>
<tr>
<th>Potential Impact</th>
<th>Build Alternative</th>
<th>No-Build Alternative</th>
<th>Avoidance and Minimization Measures</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td>construction activities, notifying adjacent residents in advance of construction work, and utilizing construction equipment with tires, not tracks.</td>
</tr>
<tr>
<td>Climate Change</td>
<td><em>Long-term Impacts</em>: Beneficial effect in helping to reduce congestion related pollutant emissions on roadway links in the project vicinity and improve the flow of traffic.</td>
<td>No long-term emission reduction benefits.</td>
<td>The project shall implement Caltrans Standard Specification Provisions and comply with Title 13, California Code of Regulations §2449(d)(3).</td>
</tr>
</tbody>
</table>
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List of Abbreviated Terms

ADA                      Americans with Disabilities Act
Caltrans                  California Department of Transportation
CDFW                     California Department of Fish and Wildlife
CEQA                     California Environmental Quality Act
County                   County of Monterey
CWA                      Clean Water Act
EHB                      Monterey County Environmental Health Bureau
EO                       Executive Order
FHWA                     Federal Highway Administration
GHG                      Greenhouse gas
LEDPA                    least environmentally damaging practicable alternative
LSA                      LSA Associates, Inc.
MTBE                     methyl tertiary-butyl ether
NPDES                    National Pollutant Discharge Elimination System
OSHA                     Occupational Safety and Health Act
ppm                      parts per million
RWQCB                    Regional Water Quality Control Board
SWRCB                    State Water Resources Control Board
TPH                      Total Petroleum Hydrocarbons
US                       United States
USACE                    United States Army Corps of Engineers
USC                      United States Code
USFWS                    U.S. Fish and Wildlife Service
WPCP                     Water Pollution Control Program
Chapter 1  Proposed Project

1.1  Introduction

The proposed project was initiated by the County of Monterey (County). The Transportation Agency of Monterey County updated the Regional Transportation Plan in 2010. The proposed project is identified in the updated plan. The proposed project would be funded by a combination of State Transportation Improvement Program-Regional Improvement Program funds and local funds (development impact fees). The California Department of Transportation (Caltrans) is the lead agency for California Environmental Quality Act compliance for the proposed project. Construction of the proposed project is expected to be completed in a single season.

The proposed project is located about 9 miles west of the City of Salinas and 13 miles east of the City of Monterey (refer to Figure 1-1: Project Location and Vicinity Map). The proposed project includes operational improvements at the State Route 68 and Corral de Tierra Road intersection in an unincorporated area of the County of Monterey. State Route 68 provides a regional east-west link connecting State Route 1 on the Monterey Peninsula and State Route 101 in the City of Salinas. A portion of State Route 68 from State Route 1 in Monterey to the Salinas River is a State-designated scenic highway. Through the project area, State Route 68 is a two-lane arterial highway with a posted speed limit of 55 miles per hour. Corral de Tierra Road is classified as a Collector roadway. It is predominately a north-south two-lane County road that serves rural low-density residential parcels located south of State Route 68 with a posted speed limit of 50 miles per hour.

The State Route 68/Corral de Tierra Road intersection has four approaches (eastbound, westbound, northbound, and southbound). The eastbound State Route 68 approach has an existing single lane, a dedicated right-turn lane and a dedicated left-turn lane. The westbound State Route 68 approach has an existing single through lane which also accommodates right turns, and a dedicated left-turn lane. There is an existing single lane departing the intersection in both directions on State Route 68. The northbound Corral de Tierra Road approach has an existing single through/right lane and a single dedicated left-turn lane. The southbound Cypress Community Church driveway approach has an existing single through/left lane and a single dedicated right-turn lane. The existing intersection traffic signal system provides control for all movements, including separate phases for left-turn movements from State Route 68.
The proposed roadway improvements would widen the approaches to the State Route 68/Corral de Tierra Road intersection to accommodate the construction of a second left turn lane from westbound State Route 68 to southbound Corral de Tierra Road by shifting the through lane to the north. In addition, a second southbound receiving lane would also be constructed on Corral de Tierra Road departing the intersection to receive traffic from the second left-turn lane. The proposed project would not change the existing eastbound State Route 68 approach, northbound Corral de Tierra Road approach, or southbound Cypress Community Church driveway approach. The paved shoulders of Corral de Tierra Road within the project area would be widened to 8 feet to better accommodate pedestrians and facilitate the future addition of Class II bicycle lanes to Corral de Tierra Road. The intersection traffic signal system would be modified to accommodate the widening on the north side of State Route 68 to relocate the westbound through lane and the second west-to-southbound left-turn lane.

State Route 68/Corral de Tierra Road intersection, the proposed project has been designed to improve existing conditions at the intersection and therefore is not dependent on the approval/implementation of other projects.

State Route 68 crosses (east-west) the northern extent of the Sierra De Salinas range, which separates the Salinas Valley and the coast. The Sierra De Salinas range is typified by mountainous terrain as well as rolling hills and valleys.

The proposed project area is mostly flat, sloping gently to the northeast with an elevation of about 300 feet above mean sea level. The proposed project area is predominantly comprised of developed and disturbed areas, but contains some native vegetation and a drainage feature. Plant communities within the project area include coast live oak series, arroyo willow series, coyote brush series, California annual grassland series, eucalyptus series, and disturbed ruderal areas.
Chapter 1 • Proposed Project

Figure 1-1  Project Location and Vicinity Map

SR 68 / Corral de Tierra Road Intersection Improvement Project
Project Location Map
MON-68 PM 12 9/13 2
05-OH2250

State Route 68/Corral de Tierra Intersection Improvement Project • 3
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1.2 Purpose and Need

1.2.1 Purpose
The purpose of the proposed project is to relieve traffic congestion conditions during the evening peak traveling hours, to reduce the collision rate related to left-turn movements from State Route 68 onto Corral de Tierra Road, and to improve traffic operations within the intersection to Level of Service C upon completion of project construction.

1.2.2 Need
Levels of Service describe the operating conditions a motorist would experience while traveling on a highway or through an intersection. The Level of Service rating system includes A through F, A being free flowing/little delay and F being heavy congestion and considerable delay. Figure 1-2 illustrates the levels of service for signalized intersections. Based on the 2012/2013 traffic volumes, the State Route 68/Corral de Tierra intersection operates at a Level of Service C (30.3 seconds per vehicle delay) in the morning peak hour and Level of Service D (36.7 seconds per vehicle delay) in the evening peak hour resulting in long traffic queues on State Route 68 (refer to Traffic Operations Technical Memorandum). The two-lane section of this segment of State Route 68 provides inadequate capacity for peak-hour traffic demands. In addition the State Route 68/Corral de Tierra intersection has a higher-than-average collision rate related to left-turn movements from State Route 68 onto Corral de Tierra Road compared to similar intersections within the State.
### Level of Service

<table>
<thead>
<tr>
<th>Level of Service</th>
<th>Delay per Vehicle (seconds)</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>≤10</td>
</tr>
<tr>
<td>B</td>
<td>11-20</td>
</tr>
<tr>
<td>C</td>
<td>21-35</td>
</tr>
<tr>
<td>D</td>
<td>36-55</td>
</tr>
<tr>
<td>E</td>
<td>56-80</td>
</tr>
<tr>
<td>F</td>
<td>&gt;80</td>
</tr>
</tbody>
</table>

**Factors Affecting LOS of Signalized Intersections**
- Traffic Signal Conditions:
  - Signal Coordination
  - Cycle Length
  - Protected left turn
  - Timing
  - Pre-timed or traffic activated signal
  - Etc.
- Geometric Conditions:
  - Left- and right-turn lanes
  - Number of lanes
  - Etc.
- Traffic Conditions:
  - Percent of truck traffic
  - Number of pedestrians
  - Etc.

*Source: 2000 HCM, Exhibit 16-2, Level of Service Criteria for Signalized Intersections*
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The objective for driving conditions for County roads and intersections defined by the 2010 Monterey County General Plan is Level of Service D; therefore, the State Route 68/Corral de Tierra intersection is not currently operating at a deficient Level of Service. However, without implementation of the proposed project, the State Route 68/Corral de Tierra intersection Level of Service is predicted to deteriorate due to increased traffic. Forecast traffic operations for the year 2024 predict that the State Route 68/Corral de Tierra intersection would have a Level of Service E (75.3 seconds per vehicle delay) in the morning peak hour and a Level of Service F (90.4 seconds per vehicle delay) in the evening peak hour (refer to Traffic Operations Technical Memorandum).

1.3 Alternatives

The proposed project would widen the State Route 68/Corral de Tierra intersection to accommodate the construction of an additional left-turn lane and receiving lane. The proposed intersection improvements would extend along State Route 68 about 925 feet west of Corral de Tierra Road and 1,435 feet east of Corral de Tierra Road. The alternatives identified include the proposed project and the No-Build Alternative. Project alternatives were evaluated and studied for traffic impacts, property impacts, right-of-way required, environmental impacts, and construction costs. Second and third build alternatives were considered but rejected as explained below in Section 1.3.4.

1.3.1 Build Alternative

The proposed project would widen the State Route 68/Corral de Tierra intersection to the north of the existing alignment to accommodate the construction of a second (additional) left turn lane from westbound State Route 68 onto southbound Corral de Tierra Road. Both of the left turn lanes (in the median of State Route 68) would have sufficient length to accommodate deceleration from 53 miles per hour. An additional receiving lane would also be constructed on southbound Corral de Tierra Road. The paved shoulders of Corral de Tierra Road within the project area would be widened to 8 feet to better accommodate pedestrians and facilitate the future addition of Class II bicycle lanes to Corral de Tierra Road.

About 520 feet of Steel Crib retaining wall (or equivalent) would be constructed in the northwest quadrant along the north embankment of State Route 68. The retaining wall would lie below the existing road grade and therefore would not be visible from State Route 68. The retaining wall would minimize the footprint of the embankment needed to accommodate the widened road section.
A left turn lane would also be constructed from westbound State Route 68 into the Corral de Tierra Country Club driveway. The Corral de Tierra Country Club driveway is located east of Corral de Tierra Road on the south side of State Route 68.

No provisions for left turns to or from the residential driveway on the north side of State Route 68 would be made. As part of the proposed project, a painted median island would be created in front of the residential driveway restricting drivers to right-in, right-out access. Drivers needing to make left-in, left-out movements would need to make a U-turn at the traffic signal at either San Benancio Road or at Corral de Tierra Road. U-turn movements at these signalized intersections are legal.

Construction of the retaining wall would require removal of any landscape vegetation present (including one young oak tree) along the north embankment of State Route 68. The landscape vegetation is not visible to motorist traveling along State Route 68 and does not provide any habitat value. As part of the proposed project native vegetation would be planted within the project limits. Additionally, the proposed project would relocate and replace the existing guardrails along the north side of State Route 68 and west of the intersection of Corral de Tierra Road. If new or relocated guardrails are erected with metal posts, the posts would be darkened to reduce glare and reflectivity.

There is an existing bus pull out and curb return at the northeast corner of the intersection and a curb return at the northwest corner of the intersection. There is also an existing sidewalk on the south side of State Route 68 at the southeast corner of the intersection.

Implementation of the proposed project would require modifications to existing facilities located on the northwest corner of the intersection to accommodate the widening of State Route 68. The existing Monterey-Salinas Transit bus stop would be relocated slightly to the north at the northeast corner of the intersection. The proposed bus pull out would comply with Monterey-Salinas Transit standards and would have an 80 foot entrance taper, 50 foot bus bay, 40 foot exit taper, and 16 foot-wide bay. The proposed sidewalks would be 6 feet wide at the passenger loading area and would be Americans with Disabilities (ADA) compliant.

All of the work would be constructed within existing State and County rights-of-way, except for a small area of new State right-of-way that would be acquired on the north side of State Route 68 just east of the intersection to accommodate relocation of the existing bus stop, widening and grading. Also, a temporary construction easements
Figure 1.3 Build Alternative Design Plan

Chapter 1 • Proposed Project
would be acquired along the east side of Corral de Tierra Road to accommodate grading near the edge of the County right-of-way (refer to Figure 1-3: Build Alternative Design Plan). Temporary staging areas for construction equipment and materials would be located in those areas of the existing State and County rights-of-way that are not designated as environmentally sensitive areas. Construction is expected to be completed in a single season.

### 1.3.2 No-Build Alternative

The No-Build Alternative assumes that no new improvements would be constructed, other than projects already approved in the area. Under the No-Build Alternative, the roadway’s operational conditions will continue to decline during both a.m. and p.m. peak hours. Projections indicated that the unimproved intersection would operate at Level of Service E in the a.m. peak hour and Level of Service F in the p.m. peak hour by 2024, and therefore, the No-Build Alternative fails to meet the purpose and need of this project.

### 1.3.3 Comparison of Alternatives

Based on the discussion provided above under Section 1.3.2, the No-Build Alternative fails to meet the purpose of the project to relieve traffic congestion conditions during the evening peak traveling hours and to reduce the collision rate related to left-turn movements from State Route 68 onto Corral de Tierra Road.

The proposed project described in Section 1.3.1 would successfully address the purpose and need for the project. The proposed project would improve the flow of traffic through the intersection of State Route 68 and Corral de Tierra Road by decreasing the percentage of cycle time devoted to westbound left-turn movements, thereby increasing the percentage of cycle time devoted to through movements. Improving the flow of traffic through the intersection of State Route 68 and Corral de Tierra Road would have a beneficial effect in helping to reduce congestion (and congestion related pollutant emissions) on roadway links in the project vicinity. Additionally, the proposed project would provide a second left-turn lane reducing the potential collision rate related to left-turn movements from State Route 68 onto Corral de Tierra Road. The capital cost for the Build Alternative is estimated at $1.743 million, sourced from State Transportation Improvement Program funds and local development impact fees.

After the public circulation period, all comments will be considered, and Caltrans will select a preferred alternative and make the final determination of the project’s effect
on the environment. In accordance with the California Environmental Quality Act, if no unmitigable significant adverse impacts are identified, Caltrans will prepare a Negative Declaration or Mitigated Negative Declaration.

1.3.4 Alternatives Considered but Eliminated from Further Discussion
A second build alternative was considered and analyzed in the technical studies completed for the project, but was eliminated after further consideration. The second build alternative was similar to the proposed project in all aspects except that a two-lane left-turn pocket would extend 160 feet from the limit line, then would taper to a single left-turn lane in the median of State Route 68 farther east. A two way left-turn lane would provide for left turns to/from the Corral de Tierra Country Club driveway on the south side of State Route 68 and for left turns to/from the residential driveway on the north side of State Route 68. (Alternative 1 does not provide for left turns into and out of the residential driveway on the north side of State Route 68). This alternative was intended to maintain left-turn access to State Route 68 for residents living on the north side of State Route 68. This alternative was eliminated in late 2007 after Caltrans determined that it would not meet design standards for safe access, due to the shorter deceleration and storage lengths available for turns to and from the driveways.

A third build alternative was considered but eliminated after further consideration because it failed to address the proposed project’s purpose and need. The third alternative would extend the existing westbound left-turn bay on State Route 68, providing more queue length, which would reduce the queue spillover. However, the third alternative would not relieve traffic congestion conditions during the evening peak traveling hours (signal-cycle time would not be reduced) or reduce the collision rate related to left-turn movements from State Route 68 onto Corral de Tierra Road.

1.4 Permits and Approvals Needed
California tiger salamander, listed as a threatened species under the Federal Endangered Species Act and California Endangered Species Act, is known to occur in the vicinity of the proposed project. The proposed project could affect California tiger salamanders if this species is present in the project area during construction. The County has taken the approach of assuming presence of California tiger salamanders. Consequently, a Section 2081 Incidental Take Permit would be required from the California Department of Fish and Wildlife to authorize incidental take of California tiger salamander resulting from project construction. United States Fish and Wildlife Service has indicated that if the County would be willing to implement certain
avoidance and minimization measures, the United States Fish and Wildlife Service would be able to issue a technical assistance letter stating that the proposed project would not result in take of California tiger salamander. The County has agreed to implement United States Fish and Wildlife Service-recommended measures; therefore, no federal incidental take authorization for California tiger salamander will be required.

The following permits, reviews, and approvals would be required for project construction:

<table>
<thead>
<tr>
<th>Agency</th>
<th>Permit/Approval</th>
<th>Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>California Department of Fish</td>
<td>Section 2081 Incidental Take Permit</td>
<td>Pending coordination with California Department of Fish and Wildlife on</td>
</tr>
<tr>
<td>and Wildlife</td>
<td></td>
<td>draft application and project information.</td>
</tr>
</tbody>
</table>
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Chapter 2  Affected Environment, Environmental Consequences, and Avoidance, Minimization, and/or Mitigation Measures

This chapter explains the impacts that the project would have on the human, physical, and biological environments in the project area. It describes the existing environment that could be affected by the project, potential impacts from each of the alternatives, and proposed avoidance, minimization, and/or mitigation measures. Any indirect impacts are included in the general impacts analysis and discussions that follow. Technical study references are provided for each environmental issue as addressed in the California Environmental Quality Checklist provided in Appendix A.

As part of the scoping and environmental analysis conducted for the project, the following environmental issues were considered, but no adverse impacts were identified as described briefly here. Consequently, there is no further discussion regarding these issues in this document.

- **Land Use**: The proposed roadway improvements are consistent with the County’s designation for State Route 68 and Corral de Tierra Road in the Monterey County General Plan Land Use Element (Monterey County General Plan Land Use Element, October 2010). Furthermore, the proposed project would not physically divide an established community or conflict with any applicable habitat conservation plans or natural community conservation plans. There are no park or recreation facilities located within two miles of the proposed project and no park or recreation facilities would be impacted by implementation of the proposed project.

- **Growth**: Since the proposed project does not add capacity to the roadway, it is not growth-inducing, and therefore growth beyond levels anticipated in the County’s General Plan is not expected as a result of the project (Growth-Related Impacts Technical Memorandum, July 2012).

- **Farmlands/Timberlands**: No farmland or agricultural operations are located within the proposed project area (Farmland Mapping and Monitoring Program website: http://www.consrv.ca.gov/DLRP/fmmp, accessed December 22, 2009; and Monterey County General Plan Land Use Element, October 2010).
• **Community Impacts:** The proposed project involves improvements and changes to an existing roadway intersection. The proposed project would be constructed within existing State and County rights-of-way, except for a small area of new State right-of-way that would be acquired on the north side of State Route 68 just east of the intersection to accommodate relocation of the existing Monterey-Salinas Transit bus stop, widening, and grading. The proposed project would not result in any significant community impacts (Monterey County General Plan Land Use Element, October 2010).

• **Cultural Resources:** The background research, consultation, and field survey identified no historical or archaeological resources within or adjacent to the area of potential effect (Archaeological Survey Report, June 2013).

## 2.1 Human Environment

### 2.1.1 Utilities/Emergency Services

#### Affected Environment

Telephone and cable television lines are located along the north side of State Route 68 within the study area. Additionally, existing poles, gas, and water lines are located on the east side of Corral de Tierra Road. Implementation of the proposed project would require relocation of three to six existing poles along the east side of Corral de Tierra Road and the north side of State Route 68.

#### Environmental Consequences

The existing poles would be relocated within the project vicinity at least 20 feet from the edge of the roadway to meet Caltrans roadway safety requirements. Relocation of the existing poles would be coordinated with the service providers ensuring that service would be maintained during construction of the proposed project. Relocation of the existing poles would not affect other resources such as aesthetics or biological resources because no sensitive resources occur within 20 feet of the roadway edge.

Implementation of the proposed project would not result in the need for additional utilities, service systems, or emergency services beyond what currently exists within the project area.

During construction, movement of equipment and vehicles may result in temporary lane closures potentially impacting emergency response times within the project vicinity. Emergency response times for police and fire protection may be slightly increased during construction as a result of temporary lane closures. Emergency
access for police and fire protection would be maintained during construction through the provision of traffic detours.

**Avoidance, Minimization, and/or Mitigation Measures**

Caltrans and the County shall coordinate relocation of the existing poles with the service providers to ensure that service would be maintained during construction of the proposed project. At least one traffic lane would remain open at all times, and emergency access for police and fire protection would be maintained during construction through the provision of traffic detours. Implementation of a Traffic Management Plan would reduce potential impacts associated with emergency services. A Traffic Management Plan using approved Caltrans control guidelines shall be prepared and implemented. The Plan shall include a condition that “at least one traffic lane will be open at all times, and emergency access for police and fire protection will be maintained during construction through the provision of traffic detours.”

### 2.1.2 Traffic and Transportation/Pedestrian and Bicycle Facilities

**Regulatory Setting**

Caltrans, as assigned by the Federal Highway Administration, directs that full consideration should be given to the safe accommodation of pedestrians and bicyclists during the development of federal-aid highway projects (see 23 Code of Federal Regulations 652). It further directs that the special needs of the elderly and the disabled must be considered in all federal-aid projects that include pedestrian facilities. When current or anticipated pedestrian and/or bicycle traffic presents a potential conflict with motor vehicle traffic, every effort must be made to minimize the detrimental effects on all highway users who share the facility.

In July 1999, the U.S. Department of Transportation issued an Accessibility Policy Statement pledging a fully accessible multimodal transportation system. Accessibility in federally-assisted programs is governed by the U.S. Department of Transportation regulations (49 CFR Part 27) implementing Section 504 of the Rehabilitation Act (29 United States Code 794). The Federal Highway Administration has enacted regulations for the implementation of the 1990 Americans with Disabilities Act, including a commitment to build transportation facilities that provide equal access for all persons. These regulations require application of the Americans with Disabilities Act requirements to federal-aid projects, including Transportation Enhancement Activities.
Chapter 2 • Affected Environment, Environmental Consequences, and Avoidance, Minimization, and/or Mitigation Measures

**Affected Environment**

Information in this Section is based on the *Traffic Operations Technical Memorandum* (February 2005) and the *Traffic Operations Technical Memorandum Addendums* (March 2011 and October 2014). State Route 68, also known as the “Monterey-Salinas Highway”, provides a regional east-west link connecting State Route 1 on the Monterey Peninsula and State Route 101 in the City of Salinas. The length of the entire route is about 22 miles. State Route 68 carries both commuter traffic and recreational/tourist traffic between Salinas and Monterey. Through the project area, the westbound direction of State Route 68 is the predominant commute direction in the morning peak period and the eastbound direction is the predominant commute direction in the afternoon peak period. Through the project area, State Route 68 is a two-lane arterial highway with a posted speed limit of 55 miles per hour.

Corral de Tierra Road is predominantly a north-south two-lane County roadway that serves rural low-density residential parcels located south of State Route 68. Corral de Tierra Road has a posted speed limit of 50 miles per hour.

The State Route 68/Corral de Tierra Road intersection has four approaches (eastbound, westbound, northbound, and southbound). The eastbound State Route 68 approach has an existing single lane, a dedicated right-turn lane and a dedicated left-turn lane. The westbound State Route 68 approach has an existing single through lane which also accommodates right turns, and a dedicated left-turn lane. There is an existing single lane departing the intersection in both directions on State Route 68. The northbound Corral de Tierra Road approach has an existing single through/right lane and a single dedicated left-turn lane. The southbound Cypress Community Church driveway approach has an existing single through/left lane and a single dedicated right-turn lane. The existing intersection traffic signal system provides control for all movements, including separate phases for left-turn movements from State Route 68.

An analysis of collisions at the Corral de Tierra Road intersection on State Route 68 was conducted based off of Traffic Accident Surveillance and Analysis System collision data provided by Caltrans. Based on the analysis, the majority of collisions at the intersection appear to be rear-end collisions related to congestion in the intersection area.
Based on the 2012/2013 traffic volumes, in the a.m. peak hour, State Route 68 westbound left operates at Level of Service F, the westbound through movement operates at Level of Service B, the eastbound left operates at Level of Service D, and the eastbound through movement operates at Level of Service C. In the p.m. peak hour, State Route 68 westbound left operates at Level of Service F, the westbound through movement operates at Level of Service A, the eastbound left operates at Level of Service D, and the eastbound through movement operates at Level of Service C.

Based on the 2012/2013 traffic volumes, in the a.m. peak hour, Corral de Tierra Road northbound left operates at Level of Service D and the northbound shared through/right operates at Level of Service B. In the p.m. peak hour, Corral de Tierra Road northbound left operates at Level of Service D and the northbound shared through/right operates at Level of Service A.

Projections indicate that without improvements the State Route 68/Corral de Tierra intersection would decline from a Level of Service C, based on the 2012/2013 traffic volumes in the a.m. peak hour, to a Level of Service E and from a Level of Service D based on the 2012/2013 traffic volumes in the p.m. peak hour, to a Level of Service F by the year 2024.

Environmental Consequences

Build Alternative

Implementation of the proposed project would provide additional deceleration length and storage in the left turn pocket(s) in the median of State Route 68, which is anticipated to help reduce rear-end collisions related to that turning movement.

Upon completion of construction of the proposed project, traffic operations are anticipated to improve within this intersection to Level of Service C in the a.m. and p.m. peak hour.

As described in Section 1.3.1, Build Alternative, no provisions would be made for eastbound left turns into the former Cypress Community Church/residential driveway on the north side of State Route 68 (vicinity of post mile 13). As part of the proposed project, a painted median island would be created in front of the residential driveway restricting drivers to right-in, right-out access. Five residences share access to this driveway. Drivers wanting to make left turns into the residential driveway would need to make a U-turn at the traffic signal at either San Benancio Road or at Corral de Tierra Road. U-turn movements at these signalized intersections are legal.
Chapter 2 • Affected Environment, Environmental Consequences, and Avoidance, Minimization, and/or Mitigation Measures

As part of the Cypress Community Church project, completed in 2010, access to Cypress Community Church is no longer via the shared residential driveway. Access to the church is now provided by the new fourth (north) leg of the State Route 68/Corral de Tierra Road intersection. The proposed project provides for a second left-turn lane westbound on State Route 68 into Corral de Tierra Road, and the extended westbound dual left-turn lanes replace the existing left-turn pocket into the former church driveway (refer to Figure 1-3).

The existing bus stop on the north side of State Route 68 just east of the State Route 68/Corral de Tierra intersection would be relocated as a result of the proposed widening of this intersection. The bus stop would be relocated slightly to the north although it would remain in the same general location relative to the intersection. A bus pull out and additional sidewalk in the loading area would be constructed as part of the proposed project.

During construction of the proposed project, movement of equipment and vehicles may result in temporary congestion and require temporary lane closures. A standard public information package would be required for construction of the proposed project. Both “Construction Area” signs and “Expect Delay” signs would be used during construction to alter motorists of construction. Any temporary lane closures would be completed during the day and at least one traffic lane would remain open at all times during construction. Temporary pedestrian facilities would be provided where existing pedestrian facilities are impacted during construction of the proposed project.

No-Build Alternative

The No-Build Alternative assumes that no new improvements would be constructed other than projects already approved in the area. Under the No-Build Alternative the operational conditions would not be improved to the standard Level of Service C in the a.m. or p.m. peak hours. Based on the 2012/2013 traffic volumes, traffic at the State Route 68/Corral de Tierra intersection operates at Level of Service D in the p.m. hour as previously described. Under the No-Build Alternative for the forecast year 2024, the State Route 68/Corral de Tierra intersection is forecast to operate at Level of Service E in the a.m. peak hour and Level of Service F in the p.m. peak hour. Therefore the No-Build Alternative does not meet the purpose and need of the proposed project.
Avoidance, Minimization, and/or Mitigation Measures

To minimize street and lane closures during construction, particularly during peak traffic hours, the Contractor shall prepare a Traffic Management Plan using approved Caltrans traffic control guidelines. The Traffic Management Plan shall include a condition that “at least one traffic lane will be open at all times, and emergency access for police and fire protection shall be maintained during construction through the provision of traffic detours.” Temporary lane closures would comply with Caltrans standards for construction traffic control and District 5 lane closure charts for this section of State Route 68.

2.1.3 Visual/Aesthetics

Regulatory Setting

The California Environmental Quality Act establishes that it is the policy of the state to take all action necessary to provide the people of the state “with…enjoyment of aesthetic, natural, scenic and historic environmental qualities.” (California Public Resources Code Section 21001[b]).

Affected Environment

Information in this section is based on the Visual Impact Assessment (February 2013). A portion of State Route 68 from State Route 1 in Monterey to the Salinas River is a State-designated scenic highway. The intersection of State Route 68 and Corral de Tierra Road is located along this State-designated scenic highway, and therefore, the proposed project is subject to Caltrans Scenic Highway Guidelines.

The predominant existing visual character of the project study area and surrounding landscape is semirural. The project study area is distinguished by large open natural areas, rolling hills, a community church, and low-density residential, including a golf course. There is also a minor amount of commercial development (and property currently vacant but is proposed for commercial development) at the intersection of State Route 68 and Corral de Tierra Road.

Sensitive viewers in the project study area include motorists, bicyclists, and pedestrians traveling east and west along State Route 68 and north and south along Corral de Tierra Road. The Cypress Community Church, located on a hill to the north of the project area, can be seen from limited vantage points along State Route 68 and has a middleground view of the project area. A residential subdivision located on the south side of State Route 68 and east of the Corral de Tierra Road intersection has a limited view of the project area because trees separate the residential land uses from...
the road. A gasoline station (currently closed) and real estate office are located on the southeast quadrant of the intersection. An active gasoline station and corner store are located at the southwest quadrant of the intersection of State Route 68 and Corral de Tierra Road and dominate the foreground view at that location. Houses scattered along the hillsides above Corral de Tierra Road would also have a middleground and background view of the improvements proposed for State Route 68/Corral de Tierra Road.

**Environmental Consequences**

The proposed project would prune 0.001 acre of riparian vegetation in the coast live oak community at the west end of the project study area. Additionally, construction of the retaining wall would require removal of any landscape vegetation present (including one young oak tree less than 1 inch diameter at breast height) along the north embankment of State Route 68. The landscape vegetation is not visible to motorists traveling along State Route 68. The project would not result in the removal of any scenic resources and given the similarity in visual quality from existing to proposed views, the proposed project would not result in substantial adverse impacts to State Route 68.

The proposed project would add a nominal amount of additional roadway/pavement within the project area. The additional roadway would result in only minimal changes to the overall visual character of the project area and to the visual experience for observers. Landscape and aesthetic improvements incorporated into the project design would reduce the visual impacts of widening the roadways, and the post project visual character would remain semirural.

The proposed project includes relocating the existing bus stop and sidewalk at the northeast corner of the intersection to accommodate the widening of State Route 68. The minimal shift of the existing bus stop to the north would not result in a substantial change in the visual appearance of the intersection because the bus stop would remain in the same general location relative to the intersection. The proposed project also includes relocating or replacing the existing guardrails along the north side of State Route 68 and west of the intersection within Corral de Tierra Road. If new or relocated guardrails are erected with metal posts, the posts would be darkened to reduce glare and reflectivity.
Avoidance, Minimization, and/or Mitigation Measures
Implementation of the following project elements would minimize the nominal visual changes associated with the proposed project:

- Guardrail post darkening
- Native vegetation will be planted within the project limits to improve the appearance of the project area

No mitigation measures for visual impacts are required for the proposed project.

2.2 Physical Environment

2.2.1 Hydrology and Floodplain

Regulatory Setting
Executive Order 11988 (Floodplain Management) directs all federal agencies to refrain from conducting, supporting, or allowing actions in floodplains unless it is the only practicable alternative. The Federal Highway Administration requirements for compliance are outlined in 23 Code of Federal Regulations 650 Subpart A.

In order to comply, the following must be analyzed:

- The practicability of alternatives to any longitudinal encroachments
- Risks of the action
- Impacts on natural and beneficial floodplain values
- Support of incompatible floodplain development
- Measures to minimize floodplain impacts and to preserve/restore any beneficial floodplain values impacted by the project.

The base floodplain is defined as “the area subject to flooding by the flood or tide having a one percent chance of being exceeded in any given year.” An encroachment is defined as “an action within the limits of the base floodplain.”

Affected Environment
Information in this section is based on the Water Quality Assessment Report (February 2013). The proposed project lies within the Salinas Hydrologic Unit in the Monterey Peninsula Hydrologic Sub-Area. The watershed is about 75,113 acres in size and ultimately drains to the Pacific Ocean at Monterey Bay.

The eastern, southern, and northern portions of the proposed project area are on level floodplain in the El Toro Creek valley. The western portion is on a gently sloping
hillside in Canyon Del Rey. The proposed project is not located within a 100-year or
500-year flood plain boundary.

The nearest receiving water is an ephemeral tributary to El Toro Creek, which is
located to the north of the project area. El Toro Creek flows northeasterly to the
Salinas River (about five miles downstream of the project area) and then to Monterey
Bay. The ephemeral tributary originates near the west end of the proposed project
area, north of State Route 68, and flows east along the length of the proposed project
area before crossing beneath State Route 68 via a box culvert near the east end of the
proposed project area.

The proposed project area is located in the Corral de Tierra Area subbasin of the
Salinas Valley Groundwater Basin. Groundwater beneath the project area occurs at
depths of 16.8–87.0 feet.

Environmental Consequences
The proposed project would increase the impervious surface area by 0.48 acre. The
proposed project would not raise the profile of State Route 68, Corral de Tierra Road,
or El Toro Creek; therefore, no measurable impact would occur to the 100-year
floodplain. The proposed project would not place any structures within a 100-year
flood hazard area. Additionally, construction of the proposed project has the potential
to result in nominal water consumption necessary for construction-related activities
such as dust-control and/or compaction. Operation of the proposed project would not
result in any water consumption. Excavation for the proposed improvement would be
limited to three feet for expanded approach lanes and 10 feet at signal pole locations
and is not expected to affect groundwater.

Avoidance, Minimization, and/or Mitigation Measures
No avoidance, minimization, and/or mitigation measures are required.

2.2.2 Water Quality and Storm Water Runoff
Regulatory Setting
Federal Requirements: Clean Water Act
In 1972, the Federal Water Pollution Control Act was amended, making the discharge
of pollutants to the waters of the United States from any point source unlawful, unless
the discharge is in compliance with a National Pollutant Discharge Elimination
System permit. The Federal Water Pollution Control Act was subsequently amended
in 1977, and was renamed the Clean Water Act. The Clean Water Act, as amended in
1987, directed that storm water discharges are point source discharges. The 1987
Clean Water Act amendment established a framework for regulating municipal and industrial storm water discharges under the National Pollutant Elimination Discharge System program. Important Clean Water Act sections are as follows:

- Sections 303 and 304 provide for water quality standards, criteria, and guidelines.
- Section 401 requires an applicant for any federal project that proposes an activity, which may result in a discharge to waters of the United States to obtain certification from the State that the discharge will comply with other provisions of the act.
- Section 402 establishes the National Pollutant Elimination Discharge System, a permitting system for the discharges (except for dredge or fill material) into waters of the United States. Regional Water Quality Control Boards administer this permitting program in California. Section 402(p) establishes addresses storm water and non-storm water discharges.
- Section 404 establishes a permit program for the discharge of dredge or fill material into waters of the United States. This permit program is administered by the United States Army Corps of Engineers.

The objective of the Clean Water Act is “to restore and maintain the chemical, physical, and biological integrity of the Nation’s waters.”

**State Requirements: Porter-Cologne Water Quality Control Act**

*(California Water Code)*

California’s Porter-Cologne Act, enacted in 1969, provides the legal basis for water quality regulation within California. This Act requires a “Report of Waste Discharge” for any discharge of waste (liquid, solid, or otherwise) to land or surface waters that may impair beneficial uses for surface and/or groundwater of the state.

The State Water Resources Control Board and Regional Water Quality Control Boards are responsible for establishing the water quality standards (objectives) required by the Clean Water Act, and regulating discharges to ensure that the objectives are met. Details regarding water quality standards in a project area are contained in the applicable Regional Water Quality Control Board Basin Plan. States designate beneficial uses for all water body segments, and then set criteria necessary to protect these uses. Consequently, the water quality standards developed for particular water segments are based on the designated use and vary depending on such use. In addition, each state identifies waters failing to meet standards for specific pollutants, which are state listed in accordance with Clean Water Act Section 303(d).
If a state determines that waters are impaired for one or more constituents and the standards cannot be met through point source controls, the Clean Water Act requires establishing Total Maximum Daily Loads. Total Maximum Daily Loads establish allowable pollutant loads from all sources (point, non-point, and natural) for a given watershed.

**State Water Resources Control Board and Regional Water Quality Control Boards**

The State Water Resources Control Board administers water rights, water pollution control, and water quality functions throughout the state. Regional Water Quality Control Boards are responsible for protecting beneficial uses of water resources within their regional jurisdiction using planning, permitting, and enforcement authorities to meet this responsibility.

- **NPDES Program**

  The State Water Resources Control Board adopted Caltrans Statewide National Pollutant Discharge Elimination System Permit (Order No. 2012-0011-DWQ) on September 19, 2012. This permit covers all Caltrans rights-of-way, properties, facilities, and activities in the State. National Pollutant Discharge Elimination System permits establish a 5-year permitting time frame. National Pollutant Discharge Elimination System permit requirements remain active until a new permit has been adopted.

  In compliance with the permit, Caltrans developed the Statewide Storm Water Management Plan to address storm water pollution controls related to highway planning, design, construction, and maintenance activities throughout California. The Statewide Storm Water Management Plan describes the minimum procedures and practices Caltrans uses to reduce pollutants in storm water and non-storm water discharges. It outlines procedures and responsibilities for protecting water quality, including the selection and implementation of Best Management Practices. The proposed Project will be programmed to follow the guidelines and procedures outlined in the 2003 Statewide Storm Water Management Plan to address storm water runoff or any subsequent Statewide Storm Water Management Plan version draft and approved.
• Municipal Separate Storm Sewer System Program

The United States Environmental Protection Agency defines a Municipal Separate Storm Sewer System as any conveyance or system of conveyances (roads with drainage systems, municipal streets, catch basins, curbs, gutters, ditches, human-made channels, and storm drains) owned or operated by a state, city, town, country, or other public body having jurisdiction over storm water, that are designed or used for collecting or conveying storm water. As part of the National Pollutant Discharge Elimination System program, United States Environmental Protection Agency initiated a program requiring that entities having Municipal Separate Storm Sewer Systems apply to their local Regional Water Quality Control Board for storm water discharge permits. The program proceeded through two phases. Under Phase I, the program initiated permit requirements for designated municipalities with populations of 100,000 or greater. Phase II expanded the program to municipalities with populations less than 100,000.

• Construction Activity Permitting

Section H.2, Construction Program Management of Caltrans National Pollutant Discharge Elimination System permit states: “The Construction Management Program shall be in compliance with requirement of the National Pollutant Discharge Elimination System General Permit for Construction Activities (Construction General Permit)”. Construction General Permit (Order No. 2009-009-DWQ, adopted on September 2, 2009. The permit regulates storm water discharges from construction sites that result in a disturbed surface area of 1 acre or greater, and/or are part of a common plan of development. By law, all storm water discharges associated with construction activity where clearing, grading, and excavation results in soil disturbance of at least 1 acre must comply with the provisions of the General Construction Permit.

The permit separates projects into Risk Levels 1–3. Requirements apply according to the Risk Level determined. For example, a Risk Level 3 (highest risk) project would require compulsory storm water runoff pH and turbidity monitoring. Risk levels are determined during the design phase and are based on potential erosion and transport to receiving waters. Applicants are required to develop and implement an effective Storm Water Pollution Prevention Plan.

The Construction General Permit also includes a Low Rainfall Erosivity Waiver provision if a project is determined to disturb less than five acres and has a
rainfall erosivity factor of less than or equal to 5. If a project qualifies for an erosivity waiver it is not subject to the requirements of the Construction General Permit.

Caltrans Statewide National Pollutant Discharge Elimination System Permit requires Caltrans to submit a Notice of Intent (NOI) to the Regional Water Quality Control Board in the Stormwater Multi-Application Report Tracking System (SMARTS) to obtain coverage under the Construction General Permit. Upon the project completion, a Notice of Termination (NOT) is submitted to SMARTS to suspend coverage. This process will continue to apply to Caltrans projects until a new Caltrans Statewide National Pollutant Discharge Elimination System Permit is adopted by the State Water Resources Control Board. A NOT or equivalent form will be submitted to the Regional Water Quality Control Board at least 30 days prior to construction if the associated disturbed surface area is 1 acre or more. In accordance with Caltrans Standard Specifications, a Water Pollution Control Plan is used for projects with disturbed surface areas less than 1 acre, or with an erosivity waiver. This project qualifies for an erosivity waiver from the Construction General Permit.

During the construction phase, compliance with the permit and the Caltrans Standard Plans and the Standard Special Provisions requires appropriate selection and deployment of both structural and non-structural Best Management Practices. These Best Management Practices must achieve performance standards of Best Available Technology economically achievable/Best Conventional Pollutant Control Technology to reduce or eliminate storm water pollution.

**Affected Environment**

The information in this section is based on the *Water Quality Assessment Report* (February 2013). The proposed project lies within the Salinas Hydrologic Unit in the Monterey Peninsula Hydrologic Sub-Area (309.50). The watershed is about 75,113 acres in size and ultimately drains to the Pacific Ocean at Monterey Bay.

The nearest receiving water is an ephemeral tributary to El Toro Creek, which is located to the north of the project area, parallel to State Route 68. El Toro Creek flows into the Salinas River (about 5 miles downstream of the project area) and then to Monterey Bay, located 15 miles west of the project area.

The project area is located in the Corral de Tierra Area sub-basin of the Salinas River Groundwater Basin. Groundwater flow in the region is from southwest to northeast,
consistent with the topographic gradient. A well about 0.25 mile southeast of the project area has been measured monthly since 1960. Depth to groundwater at the well ranges between 16.8 and 87.0 feet.

Environmental Consequences
Only minor earthwork would be required during construction of the proposed intersection improvements; therefore, no groundwater dewatering activities are anticipated as part of the proposed project.

Pollutants of concern during construction include sediments, trash, petroleum products, and chemicals. Construction activities would disturb 1.44 acre, which would increase erosion and sedimentation. In addition, chemicals, liquids, petroleum products and concrete waste may be spilled or leaked during construction.

The proposed project would implement Construction Site Best Management Practices consistent with the requirement of the statewide Caltrans National Pollutant Discharge Elimination System permit. These construction site Best Management Practices would include soil stabilization, sediment control, housekeeping and waste management practices, and non-stormwater management Best Management Practices. With implementation and maintenance of these Construction Site Best Management Practices, no adverse impacts to water quality would occur during construction of the proposed project.

An increase in impervious area increases the volume of runoff during a storm, which can more effectively transport pollutants to receiving waters and may lead to downstream erosion. The proposed project would increase the impervious surface area by 0.48 acre; although, the increase in impervious surface is not anticipated to substantially alter peak flow volumes or velocities of storm water discharges from the project area. Because the increase in storm water runoff would be minor, the increase in pollutant loading from the project area would also be minor.

Design Pollution Prevention Best Management Practices such as preservation of existing vegetation, installation of erosion control, energy dissipation, and flow conveyance devices would be incorporated into the project to reduce potential downstream impacts related to erosion. With implementation and maintenance of these Design Pollution Prevention Best Management Practices, no adverse impacts to water quality would occur during operation of the proposed project.
Avoidance, Minimization, and/or Mitigation Measures

The County and Caltrans shall comply with the provision of the National Discharge Elimination System Permit Statewide Storm Water Permit and Waste Discharge Requirements for the State of California Department of Transportation Properties Facilities and Activities Order No. 2012-0011-DWQ. In addition, the proposed project shall implement the following measures:

- The County of Monterey and Caltrans shall ensure that the Contractor develops and implements a Water Pollution Control Program during project construction to prevent water pollution during construction. The Water Pollution Control Program shall be consistent with the Caltrans Storm Water Pollution Prevention Plan and Water Pollution Control Program Preparation Manual. Construction Site Best Management Practices detailed in the Water Pollution Control Program shall be implemented during construction.

- Monterey County shall incorporate Design Pollution Prevention Best Management Practices into the project to ensure that the project does not cause off-site erosion and to ensure that the project area is permanently stabilized.

- Monterey County and Caltrans shall ensure that the Project Contractor develops and implements an erosion control plan indicating proposed methods for the control of runoff, erosion, and sediment movement, in conjunction with developing and implementing a Water Pollution Control Program.

- Prior to construction, Monterey County shall obtain a Low Rainfall Erosivity Waiver from the State Water Resources Control Board by demonstrating that the construction activity would occur only when the Rainfall Erosivity Factor is less than 5 ("R" in the Revised Universal Soil Loss Equation), in compliance with the provisions of the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities (Construction General Permit) (Order No. 2009-0009-DWQ, NPDES No. CAS000002), as amended by Order No. 2010-0014-DWQ.

- Monterey County and Caltrans shall ensure that the project discharges to unlined vegetated ditches to allow for infiltration and filtration of storm water, minimizes new impervious surfaces to the maximum extent feasible, and incorporates permanent erosion control including compost and appropriate vegetation to reduce runoff and maximize infiltration. Permanent water quality treatment facilities shall be designed and constructed in accordance with the “Post-Construction Stormwater Management Requirements for Development Projects in
the Central Coast Region” dated July 12, 2013, as adopted by the Central Coast Regional Water Quality Control Board, Resolution No. R3 2013 0032.

2.2.3 Geology/Soils/Seismic/Topography

Regulatory Setting

For geologic and topographic features, the key federal law is the Historic Sites Act of 1935, which establishes a national registry of natural landmarks and protects “outstanding examples of major geological features.” Topographic and geologic features are also protected under the California Environmental Quality Act.

This section also discusses geology, soils, and seismic concerns as they relate to public safety and project design. Earthquakes are prime considerations in the design and retrofit of structures. Caltrans Office of Earthquake Engineering is responsible for assessing the seismic hazard for Caltrans projects. Structures are designed using Caltrans’ Seismic Design Criteria. The Seismic Design Criteria provides the minimum seismic requirements for highway bridges designed in California. For more information, please see the Caltrans’ Division of Engineering Services, Office of Earthquake Engineering, Seismic Design Criteria.

Affected Environment

The information in this section is based on the Geotechnical Design and Materials Report (December 2012) and the Hazardous Waste Initial Site Assessment (February 2013). Geologically, the area of potential effects is situated on three Quaternary deposits: Continental deposits; older Holocene floodplain deposits; and recent Holocene floodplain deposits (Archaeological Sensitivity Assessment, November 2007). The Continental deposits consist of undivided Pleistocene to Plio-Pleistocene nonmarine poorly sorted sand, gravels, and cobbles. The older Holocene floodplain deposits are typically about 60 feet or more thick and are composed of heterogeneous layers of gravel, sand, silt, and clay. The younger floodplain deposits are typically less than about 20 feet thick and are composed of similar material as the older floodplain deposits. Stratigraphically, the younger deposits are typically incised into the older deposits, however in some areas they occur as a thin veneer over the older deposits.

Soils in the eastern, southern, and intersection portions of the project study area consist of Gorgonio sandy loam which is an extremely well-drained soil. Soils in the western portion of the project study area consist of Santa Ynez fine, sandy loam, which is a hilly moderately well-drained soil.
The proposed project is located in a seismically active part of northern California. Many faults in the Monterey County Area are capable of producing earthquakes, which may cause strong ground shaking at the site. Faults in the project vicinity include the King City-Reliz (maximum credible earthquake magnitude of 7.0) and the Zayante Vergales (maximum credible earthquake magnitude of 7.25). The King City-Reliz fault’s estimate closest distance to the project study area is 6.5 miles. The Zayante Vergales fault’s estimated closest distance to the project study area is 5.9 miles. No active faults pass through the project study area; therefore, the potential for fault rupture is low. Furthermore, the proposed project is not located within the Alquist-Priolo Earthquake Fault Zone.

**Environmental Consequences**

The proposed project would not increase the carrying capacity of the roadway or construct or modify a bridge; therefore, impacts related to seismic activity would not be increased from the existing conditions. Due to relatively low risk improvements associated with the proposed project (low crib wall and pavement widening) and the deep groundwater, the liquefaction potential at the project study area is generally considered low.

The proposed project has the potential to result in soil erosion and the loss of topsoil due to construction activity. The following avoidance and minimization measures would be implemented to reduce these potential impacts.

**Avoidance, Minimization, and/or Mitigation Measures**

Design Pollution Prevention Best Management Practices shall be incorporated into the proposed project and an erosion control plan shall be developed and implemented to prevent erosion on the newly constructed embankment (refer to Avoidance, Minimization, and/or Mitigation Measures prescribed for avoiding and minimizing impacts to water quality and storm water runoff).

### 2.2.4 Paleontology

**Regulatory Setting**

Paleontology is the study of life in past geologic time based on fossil plants and animals.

Under California law, paleontological resources are protected by the California Environmental Quality Act (CEQA).
Affected Environment

The information in this Section is based on the *Paleontological Identification Report* (July 2013). A field survey (on foot) of the Project Area Limits was conducted on March 30, 2007. No recorded paleontological resources were identified within the Project Area Limits.

The majority of the Project Area Limits does not contain any outcrops of paleontologically sensitive formations and is situated on Quaternary flood plain deposits which are not sensitive for significant paleontological resources.

However, a portion of the Project Area Limits is underlain by Holocene-aged flood plain deposits, and the hills directly adjacent are composed of Pliocene/Pleistocene aged Paso Robles Formation and the upper Micocene aged Santa Margarita Sandstone Formation. The Paleontology Sensitivity Mapping Project lists the Paso Robles Formation as having a high potential for significant paleontological resources. Outcrops of the Paso Robles Formation intersect the Project Area Limits at small areas on the west side of Corral de Tierra Road, and both sides of State Route 68 in the western end of the Area of Potential Effects. The Santa Margarita Sandstone is not listed as paleontologically sensitive in the Project Area Limits; however, there is a Santa Margarita Sandstone locality relatively close to State Route 68 which, for this project, should be considered sensitive. Therefore, the western portion of the Project Area Limits is considered sensitive for paleontological resources. Additionally, areas in the rest of the Project Area Limits below a depth of five feet are possibly sensitive.

Environmental Consequences

No driven piles are required for the proposed project. The proposed project would require an excavation depth of three feet for the widening of the roadway approaches. Shallow trenching, less than three feet deep, would also be required to install conduits for the traffic signals. The excavation of the crib wall will require removal approximately two feet of soil below the existing ground to meet the requirement for the buried portion of the wall. Construction activities conducted on or near the surface (at a depth of less than five feet), such as those listed above, are not expected to affect significant paleontological resources.

However, excavation deeper than five feet would be required for installation of the major traffic signal poles (which would be on cast-in-drilled-hole piles). Because there is a potential for paleontological resources to be present within the Project Area
Limits at depths below five feet, excavation for the traffic signal poles would be monitored by a qualified paleontologist as stated below.

**Avoidance, Minimization, and/or Mitigation Measures**
Project activities requiring excavation greater than five feet deep shall be monitored by a qualified paleontologist to identify, evaluate, and provide recommendations for the treatment of any sensitive fossil resources that may be uncovered by the project.

If any sensitive paleontological resources (vertebrate or plant fossils) are discovered during construction, it is required that construction be halted in the immediate vicinity of the discovery (33-foot radius), until the District Paleontology Coordinator has the opportunity to review the discovery. Remediation of any sensitive resources encountered before or during construction can include removal, preparation and curation of any significant remains.

**2.2.5 Hazardous Waste or Materials**

**Regulatory Setting**
Hazardous materials and hazardous wastes are regulated by many state and federal laws. These include not only specific statutes governing hazardous waste, but also a variety of laws regulating air and water quality, human health and land use.

The primary federal laws regulating hazardous wastes/materials are the Resource Conservation and Recovery Act of 1976 and the Comprehensive Environmental Response, Compensation and Liability Act of 1980. The purpose of the Comprehensive Environmental Response, Compensation and Liability Act of 1980, often referred to as Superfund, is to clean up contaminated sites so that public health and welfare are not compromised. Resource Conservation and Recovery Act of 1976 provides for “cradle to grave” regulation of hazardous wastes. Other federal laws include:

- Community Environmental Response Facilitation Act of 1992
- Clean Water Act
- Clean Air Act
- Safe Drinking Water Act
- Occupational Safety and Health Act
- Atomic Energy Act
- Toxic Substances Control Act
- Federal Insecticide, Fungicide, and Rodenticide Act
In addition to the acts listed above, Executive Order 12088, Federal Compliance with Pollution Control, mandates that necessary actions be taken to prevent and control environmental pollution when federal activities or federal facilities are involved.

Hazardous waste in California is regulated primarily under the authority of the federal Resource Conservation and Recovery Act of 1976, and the California Health and Safety Code. Other California laws that affect hazardous waste are specific to handling, storage, transportation, disposal, treatment, reduction, cleanup and emergency planning.

Worker health and safety and public safety are key issues when dealing with hazardous materials that may affect human health and the environment. Proper disposal of hazardous material is vital if it is disturbed during project construction.

**Affected Environment**

The information in this section is based on the *Hazardous Waste Initial Site Assessment* (February 2013). A database search conducted February 20, 2007, and updated May 6, 2011, listed Fort Ord, a former military base, as a National Priority List site. The National Priority List is the list of national priorities among the known releases or threatened releases of hazardous substances, pollutants, or contaminants throughout the United States and its territories. A visual site survey was conducted on April 6, 2007. No hazardous substance releases were noted during the site survey of the proposed project area or review of historical photographs.

Two gasoline stations (one closed and one in operation) are located at properties adjacent to and south of the SR 68/Corral de Tierra Road intersection. The property at the southeast corner, 1 Corral de Tierra Road, is the site of a former Exxon service station that was closed and where a permit was issued to remove the gasoline tanks on October 23, 2002. Several soil samples indicated elevated soil levels of Total Petroleum Hydrocarbons (TPH) as gas at 110 parts per million (ppm) and 160 ppm. Monterey County Environmental Health Bureau (EHB) action levels are 100 ppm for TPH. In addition, elevated levels of benzene were detected at 0.5 to 0.7 ppm, which is above the EHB action level of 0.1 ppm. The contamination at this site has not been delimited, and therefore, the extent of the contamination is unknown.

At the southwest corner of the intersection is Corral de Tierra Flowers and Gas, a currently operating gas station and retail business at 2 Corral de Tierra Road. The latter station has a leaking underground storage tank record (refer to Environmental FirstSearch Report, May, 2011). During a recent (November 2004) upgrade of
gasoline dispensers at the site, soil samples indicated exceedance of threshold levels at this site. Soil samples of TPH gas at 3,200 ppm, TPH diesel at 190 ppm, and a groundwater sample of methyl tertiary-butyl ether (MTBE) at 450 parts per billion (ppb) were detected. The contamination at this site has not been delimitated, and therefore, the extent of the soil contamination is unknown.

The following hazardous materials are potentially of concern for the project area:

- **Petroleum Hydrocarbon Soil Contamination:** There is potential for exposure to contaminated soil in the intersection construction area due to past and present operations from the former and current service stations at I Corral de Tierra Road and 2 Corral de Tierra Road, adjacent to the intersection. Construction worker health and safety protective measures may be necessary if contaminated soil is encountered.

- **Aerially Deposited Lead:** Lead is generally encountered in unpaved areas adjoining older roads, primarily as a result of deposition from historical vehicle emissions. An aerially deposited lead investigation of the project area was conducted in July 2007 and additional soil samples were analyzed in August 2010. The California Department of Toxic Substances Control, pursuant to Health and Safety Code Section 25143, granted a variance to Caltrans for the use and reuse of lead-impacted soil associated with highway construction projects. The variance allows Caltrans to reuse soil on-site that has soluble or total lead concentrations greater than State of California hazardous waste criteria. Refer to the Environmental Consequences Section below for a discussion of aerially deposited lead within the project area.

- **Lead-Based Paint:** It is possible for elevated lead concentrations to be present within yellow striping paint and pavement markings.

- **Polychlorinated Biphenyls:** Polychlorinated biphenyls may be present in the pole-mounted transformers located along the roadways in the project limits.

- **Unexploded Ordnance:** Due to the proximity of the proposed project to the former Fort Ord property, there is a possibility of encountering unexploded ordnance during construction.

The Hazardous Waste Initial Site Assessment is based on information currently available through the database search (updated May 2011) and observations made during the visual site surveys. Changes in site conditions can occur with the passage of time, whether due to natural processes or human intervention on site or adjacent properties. In addition, changes in applicable or appropriate standards may occur,
whether they result from legislation or the broadening of knowledge. As with most major projects, conditions revealed by excavation or drilling may be at variance with the findings in the Hazardous Waste Initial Site Assessment. Additionally, the possibility of unrecorded, illegal dumping activities cannot be ruled out.

**Environmental Consequences**

Development of the proposed project would involve the use of chemical agents, solvents, paints, and other hazardous materials that are associated with construction activities. The amount of these chemicals present during construction is limited and would be in compliance with existing government regulations.

An Aerially Deposited Lead Site Investigation was conducted in 2007 for the proposed project and additional soil samples were analyzed in August 2010. Material along the north side of State Route 68 and from the east side of Corral de Tierra Road within 18 inches of the surface met the requirements of the Caltrans variance for use of aerially deposited lead-contaminated material in embankment fill. All other material in the project area was determined to be nonhazardous and therefore can be either used or removed from the project area without restriction. Based on these results, it is recommended that at least 1 foot of clean soil be placed on top of lead-impacted soil placed in embankment pursuant to the Caltrans variance to minimize the potential for future exposure to lead in soil. The soil will be able to be placed within the proposed steel crib wall on the north side of State Route 68, west of Corral de Tierra Road.

Due to the proposed project’s proximity to Fort Ord, unexploded ordnance or unknown hazardous materials may be discovered during construction.

Due to the known records of underground soil contamination in the locations of the former Exxon gasoline station at 1 Coral de Tierra Road and the current gasoline station at 2 Corral de Tierra Road, there is a possibility of encountering contaminated soils during project construction activities. As discussed in the previous section, recent soil samples at the gasoline station at 2 Corral de Tierra Road at the southwest corner of the intersection indicated contamination levels exceeding County action thresholds. Significant excavation or dewatering is not associated with the proposed project, and is not proposed on the south side of State Route 68; however, the potential to encounter groundwater contamination exists. In the event that hydrocarbon odors or apparent soil discoloration are encountered by project construction workers during excavation, work will be stopped until the work area is
assessed, by a Certified Industrial Hygienist, to determine if it is a safe working
environment in accordance with Occupational Safety and Health Act (OSHA)
standards. If the hazardous materials specialist determines that the work area is not
safe, then the work must be completed by hazardous material contractors (hazardous
certified). If potentially hazardous materials are encountered, the Monterey County
Environmental Health Department must be notified of the potential contamination
and should oversee the contaminated soil removal and disposal if necessary.

**Avoidance, Minimization, and/or Mitigation Measures**

Implementation of the following measures would reduce potential impacts associated
with hazardous waste or materials:

- A Lead Compliance Plan consistent with California Code of Regulations Title 8,
  Section 1531.1, and Caltrans requirements shall be prepared and implemented
during project construction.
- Any yellow traffic striping and pavement-marking material that must be removed
  shall be stored, tested, and disposed of in accordance with the applicable Standard
  Special Provisions issued by Caltrans for such work.
- Soil beneath or around any pole-mounted or pad-mounted transformers within the
  project area shall be tested for polychlorinated biphenyls if the transformers
  appear to be leaking, unless the transformer is certified polychlorinated biphenyl-
  free. Testing shall occur immediately following observation of a leaking
  transformer.
- In the event that unexploded ordnance is discovered in the project area, work shall
  stop immediately and Presidio of Monterey Military Police shall be notified by
calling (831) 242-7851 or (831) 242-7852.
- In the event that hydrocarbon odors or apparent soil discoloration are encountered
  by project construction workers during excavation, work will be stopped until the
  work area is assessed, by a Certified Industrial Hygienist, to determine if it is a
  safe working environment in accordance with Occupational Safety and Health Act
  (OSHA) standards. If the hazardous materials specialist determines that the work
  area is not safe, then the work must be completed by hazardous material
  contractors (hazardous certified). In addition, the Monterey County
  Environmental Health Department must be notified if potentially hazardous
  materials and/or contaminated soils are encountered. The Monterey County
  Environmental Health Department shall oversee removal and disposal of any
  contaminated soil.
As in the case for any project that proposes excavation, the potential exists for unknown hazardous contamination to be revealed during project construction. For any previously unknown hazardous waste/material encountered during construction, the procedures outlined in Table 7-1.1, Unknown Hazards Procedures, in the Caltrans Construction Manual shall be followed.

2.3 Biological Environment

2.3.1 Natural Communities
This section of the document discusses natural communities of concern. The focus of this section is on biological communities, not individual plant or animal species (refer to Sections 2.3.2 and 2.3.3). This section also includes information on wildlife corridors and habitat fragmentation. Wildlife corridors are areas of habitat used by wildlife for seasonal or daily migration. Habitat fragmentation involves the potential for dividing sensitive habitat and thereby lessening its biological value.

Habitat areas that have been designated as critical habitat under the Federal Endangered Species Act are discussed in Threatened and Endangered Species, Section 2.3.3.

Riparian Habitat/Coast Live Oak Woodland

Affected Environment
The information in this section is based on the Natural Environment Study (February 2013). The biological study area, totaling approximately 9.48 acres, includes the project footprint, existing roadways, cut/fill slopes, access and staging areas, and lands beyond the project footprint that could be potentially affected by project construction.

California Department of Fish and Wildlife waters in the study area, totaling 0.85 acre, include an ephemeral tributary to El Toro Creek and associated riparian vegetation. Riparian vegetation, where present, is comprised of coast live oak woodland at the west end of the biological study area and arroyo willow at the east end.

Coast live oak woodland occurs at the west end of the biological study area along the upper reach of the ephemeral tributary to El Toro Creek. This community supports coast live oak trees as the primary canopy species. The coast live oak trees occur in solid, closed-canopy stands and individually scattered trees throughout the biological study area. Common plant species occurring in the understory include, but are not
limited to, coyote brush (*Baccharis pilularis*), poison oak (*Toxicodendron diversilobum*), deerweed (*Lotus scoparius*), wild oats (*Avena* sp.), miner’s lettuce (*Claytonia perfoliata*), black mustard (*Brassica nigra*), English plantain (*Plantago lanceolata*), scarlet pimpernel (*Anagallis arvensis*), bedstraw (*Galium* sp.), and coast wood fern (*Dryopteris arguta*).

The arroyo willow community occurs north of State Route 68 along the ephemeral tributary to El Toro Creek near the east end of the biological study area. This community is dominated by arroyo willows (*Salix lasiolepis*) in a dense closed-canopy with the occasional coast live oak tree and sycamore (*Platanus racemosa*). Common plants species occurring in the understory include poison oak, California blackberry (*Rubus ursinus*), mugwort (*Artemisia douglasiana*), and stinging nettle (*Urtica dioica*).

**Environmental Consequences**

The proposed project would impact about 0.001 acre of riparian vegetation in the coast live oak community during construction of the fill slope at the west end of the project area. Impacts would be limited to pruning of coast live oak trees. No riparian habitat trees would be removed.

**Avoidance, Minimization, and/or Mitigation Measures**

- Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the perimeter of the coast live oak community in the biological study area to minimize encroachment during construction. Environmentally Sensitive Area fencing shall consist of orange construction fencing (or equivalent) and shall be maintained in good condition until construction is complete.

- Consultation shall occur with the California Department of Fish and Wildlife and a qualified arborist prior to any tree pruning activities within riparian areas. Tree limbs that must be removed shall be cut with a sharp saw (i.e., versus removal with heavy equipment). In this area, the Environmentally Sensitive Area fencing shall be installed along the limits of work. No trees would be removed.

- Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the limits of work adjacent to the arroyo willow community at the east end of the biological study area to prevent unnecessary encroachment during construction. Environmentally Sensitive Area fencing shall consist of orange construction fencing (or equivalent) and shall be maintained in good condition until construction is complete.
• Environmentally Sensitive Area fencing shall be removed following the completion of work.
• Following completion of work, any areas of the biological study area denuded of vegetation during project construction shall be hydroseeded with native grasses and forbs as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.

2.3.2 Wetlands and Other Waters

Regulatory Setting
Wetlands and other waters are protected under a number of laws and regulations. At the federal level, the Federal Water Pollution Control Act, more commonly referred to as the Clean Water Act (CWA) (33 United States Code [USC] 1344) is the primary law regulating wetlands and surface waters. One purpose of the CWA is to regulate the discharge of dredged or fill material into waters of the U.S., including wetlands. Waters of the U.S. include navigable waters, interstate waters, territorial seas and other waters that may be used in interstate or foreign commerce. To classify wetlands for the purposes of the CWA, a three-parameter approach is used that includes the presence of hydrophytic (water-loving) vegetation, wetland hydrology, and hydric soils (soils formed during saturation/inundation). All three parameters must be present, under normal circumstances, for an area to be designated as a jurisdictional wetland under the CWA.

Section 404 of the CWA establishes a regulatory program that provides that discharge of dredged or fill material cannot be permitted if a practicable alternative exists that is less damaging to the aquatic environment or if the nation’s waters would be significantly degraded. The Section 404 permit program is run by the U.S. Army of Engineers (USACE) with oversight by the United States Environmental Protection Agency (U.S. EPA).

USACE issues two types of 404 permits: Standard and General permits. There are two types of General permits, Regional permits and Nationwide permits. Regional permits are issued for a general category of activities when they are similar in nature and cause minimal environmental effect. Nationwide permits are issued to authorize a variety of minor project activities with no more than minimal effects.

There are two types of Standard permits: Individual permits and Letters of Permission. Ordinarily, projects that do not meet the criteria for a Nationwide Permit may be permitted under one of USACE’s Standard permits. For Standard permits, the...
USACE decision to approve is based on compliance with U.S. EPA’s Section 404(b)(1) Guidelines (U.S. EPA 40 Code of Federal Regulations [CFR] Part 230), and whether permit approval is in the public interest. The Section 404 (b)(1) Guidelines were developed by the U.S. EPA in conjunction with USACE, and allow the discharge of dredged or fill material into the aquatic system (waters of the U.S.) only if there is no practicable alternative which would have less adverse effects. The Guidelines state that USACE may not issue a permit if there is a least environmentally damaging practicable alternative (LEDPA) to the proposed discharge that would have lesser effects on waters of the U.S., and not have any other significant adverse environmental consequences.

The Executive Order for the Protection of Wetlands (EO 11990) also regulates the activities of federal agencies with regard to wetlands. Essentially, this EO states that a federal agency, such as the FHWA and/or Caltrans, as assigned, cannot undertake or provide assistance for new construction located in wetlands unless the head of the agency finds: 1) that there is no practicable alternative to the construction and 2) the proposed project includes all practicable measures to minimize harm.

At the state level, wetlands and waters are regulated primarily by the California Department of Fish and Wildlife (CDFW), the State Water Resources Control Board (SWRCB) and the Regional Water Quality Control Boards (RWQCB). In certain circumstances, the Coastal Commission (or Bay Conservation and Development Commission or Tahoe Regional Planning Agency) may also be involved. Sections 1600-1607 of the California Fish and Game Code require any agency that proposes a project that will substantially divert or obstruct the natural flow of or substantially change the bed or bank of a river, stream, or lake to notify CDFW before beginning construction. If CDFW determines that the project may substantially and adversely affect fish or wildlife resources, a Lake or Streambed Alteration Agreement will be required. CDFW jurisdictional limits are usually defined by the tops of the stream or lake banks, or the outer edge of riparian vegetation, whichever is wider. Wetlands under jurisdiction of the USACE may or may not be included in the area covered by a Streambed Alteration Agreement obtained from the CDFW.

The RWQCBs were established under the Porter-Cologne Water Quality Control Act to oversee water quality. The RWQCB also issues water quality certifications for impacts to wetlands and waters in compliance with Section 401 of the CWA. Please see the Water Quality section for additional details.
Affected Environment
The information in this section is based on the *Natural Environment Study* (February 2013). The biological study area, totaling approximately 9.48 acres, includes the project footprint, existing roadways, cut/fill slopes, access and staging areas, and lands beyond the project footprint that could be potentially affected by project construction.

A site visit for the proposed project was conducted April 17, 2007. Data was collected at five points along the ephemeral drainage. No indicators for wetland vegetation, hydric soils, or wetland hydrology were observed at any of the data points (refer to the wetland data sheets included in Appendix D of the Natural Environment Study).

Waters of the U.S./State in the biological study area are limited to the ephemeral tributary to El Toro Creek, totaling 0.07 acre of nonwetland waters.

California Department of Fish and Wildlife waters in the biological study area total 0.85 acre and include the ephemeral tributary and associated riparian vegetation. Riparian vegetation, where present, is comprised of coast live oak woodland at the west end of the biological study area and arroyo willow at the east end.

Environmental Consequences
No wetlands are present in the biological study area. The proposed project would not result in impacts to waters of the U.S./State since work would not encroach into the ephemeral tributary to El Toro Creek.

The proposed project would impact about 0.001 acre of riparian vegetation in the coast live oak community during construction of the fill slope at the west end of the project area. Impacts would be limited to pruning of coast live oak trees. No riparian habitat trees would be removed.

Avoidance, Minimization, and/or Mitigation Measures
- Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the reaches of the ephemeral drainage, or the adjacent riparian vegetation where present, within the biological study area to prevent unnecessary encroachment into these areas.
- Contract specifications will require the contractor to refer to the Caltrans “Water Pollution Control Program (WPCP) Preparation Manual” and “Construction Site Best Management Practices Manual” to prepare a WPCP.
• All areas of the biological study area denuded of vegetation during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.

Avoidance and Minimization Measures requiring Environmentally Sensitive Area fencing, consultation with the California Department of Fish and Wildlife prior to tree pruning in the riparian area, and revegetation guidelines (refer to Section 2.3.1 above) would reduce potential impacts to riparian vegetation.

2.3.3 Plant Species
No special status plants occur in the Biological Study Area. Since no construction activity will occur beyond the limits of the Biological Study Area, the project will not impact any special status plants.

2.3.4 Animal Species
This section discusses potential impacts and permit requirements associated with wildlife not listed or proposed for listing under the state or federal Endangered Species Act. Species listed or proposed for listing as threatened or endangered are discussed in Section 2.3.3. All other special-status animal species are discussed here, including California Department of Fish and Wildlife fully protected species and species of special concern, and the United States Fish and Wildlife Service or National Oceanic and Atmospheric Fisheries Service candidate species.

Regulatory Setting
Many state and federal laws regulate impacts to wildlife. The United States Fish and Wildlife Service, the National Oceanic and Atmospheric Administration Fisheries and the California Department of Fish and Wildlife are responsible for implementing these laws. This section discusses potential impacts and permit requirements associated with wildlife not listed or proposed for listing under the state or federal Endangered Species Act. Species listed or proposed for listing as threatened or endangered are discussed in Section 2.3.3 below. All other special-status animal species are discussed here, including the California Department of Fish and Wildlife fully protected species and species of special concern, and United States Fish and Wildlife Service or National Oceanic and Atmospheric Administration Fisheries candidate species.
Federal laws and regulations pertaining to wildlife include the following:

- National Environmental Policy Act
- Migratory Bird Treaty Act
- Fish and Wildlife Coordination Act

State laws and regulations pertaining to wildlife include the following:

- California Environmental Quality Act
- Sections 1600–1603 of the Fish and Game Code
- Sections 4150 and 4152 of the Fish and Game Code

**Affected Environment**

The information in this section is based on the *Natural Environment Study* (February 2013).

**Cooper’s Hawk**

The Cooper’s hawk (*Accipiter cooperii*) is a State species of concern; it has no federal status. The Cooper’s hawk generally nests in stands of riparian vegetation and forages in open woodlands.

The biological study area, totally approximately 9.48 acres, includes the project footprint, existing roadways, cut/fill slopes, access and staging areas, and lands beyond the project footprint that could be potentially affected by project construction. Marginally suitable foraging and nesting habitat for Cooper’s hawk is present at the west end of the biological study area, north of State Route 68, in the coast live oak community associated with El Toro Creek. Though potentially suitable nest trees are present, the trees are relatively small, and coupled with the proximity to State Route 68 and urban development, it is unlikely that Cooper’s hawk would nest in the biological study area. No raptor nest was identified during any of the surveys but since potential habitat is present, Cooper’s hawk has the potential to occur in the biological study area.

**Western Spadefoot Toad**

The western spadefoot toad (*Spea hammondi*) is a California Species of Special Concern. Breeding habitat for this species includes temporary pools or ephemeral drainages, and water temperatures within these pools must stay between 48 degrees Fahrenheit and 86 degrees Fahrenheit in order to serve as suitable breeding habitat.
There is no suitable aquatic habitat for western spadefoot toads in the biological study area, but suitable aquatic habitat occurs within one mile of the biological study area north of State Route 68; no suitable habitat was identified south of State Route 68. In addition, the coyote brush community in the biological study area could provide suitable upland habitat for western spadefoot toad. The potential western spadefoot toad upland habitat in the biological study area is low quality habitat due to the long distance (approximately one mile) from suitable breeding habitat and the location adjacent to a major roadway (i.e., State Route 68).

**Migratory Nesting Birds**
Marginally suitable foraging and nesting habitat for migratory birds is present at the west end of the biological study area, north of State Route 68, in the coast live oak community associated with El Toro Creek. Though potentially suitable nest trees are present, the trees are relatively small and located in close proximity to State Route 68 and urban development.

**Environmental Consequences**

**Cooper’s Hawk**
The proposed project may temporarily disturb Cooper’s hawk if they are nesting or foraging in the biological study area during construction activities. The proposed project may also result in minor impacts to potential nesting habitat if tree pruning is necessary. Implementation of preconstruction surveys, Environmentally Sensitive Area fencing, and construction activities during daylight hours only would reduce potential impacts to Cooper’s hawk.

**Western Spadefoot Toad**
The potential western spadefoot toad upland habitat in the biological study area is likely at the outer limits (approximately one mile) of western spadefoot toad dispersal from aquatic habitat to the north. Furthermore, no suitable aquatic habitat is present in the biological study area. Therefore, western spadefoot toad is not expected to occur in the biological study area, and implementation of the proposed project would not result in impacts to this species.

**Migratory Nesting Birds**
The proposed project could potentially affect migratory birds nesting in the biological study area if they are present when construction begins. Disturbance of these birds during their nesting season (February 16 to August 31) could result in a “take” which is prohibited under the Migratory Bird Treaty Act and Section 3503 of the California
Fish and Game Code. Implementation of preconstruction nesting bird surveys would reduce potential impacts to migratory birds.

**Avoidance, Minimization, and/or Mitigation Measures**

**Coopers Hawk**
- If work must begin during the nesting season (February 16 to August 31), no more than 14 working days prior to the start of construction, a qualified biologist shall survey all suitable nest trees in the biological study area for presence of nesting Cooper’s hawks. If no nesting activity is observed, work shall proceed as planned. If an active nest is discovered, Environmentally Sensitive Area fencing shall be installed around the dripline of the tree and maintained in good condition until the end of the nesting season or until the young have fledged, as determined by a qualified biologist.
- All construction shall be conducted during daylight hours.

**Western Spadefoot Toad**
Although the proposed project would not result in impacts to western spadefoot toad, the following Avoidance and Minimization Measures would be implemented to protect western spadefoot toad habitat within the biological study area:

- Exclusion fencing shall be installed along the boundary of the work area that would affect western spadefoot toad habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.
- The exclusion fence shall be removed following the completion of work.
- All construction and staging shall be located within the existing State and County rights-of-way.

Following the completion of work, areas of potential western spadefoot toad upland habitat in the biological study area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.

**Migratory Nesting Birds**
- If work must begin during the nesting season (February 16 to August 31), no more than 10 working days prior to the start of construction, a qualified biologist
shall survey all suitable nest trees in the biological study area for presence of migratory nesting birds. If no nesting activity is observed, work shall proceed as planned. If an active nest is discovered, Environmentally Sensitive Area fencing shall be installed around the dripline of the tree and maintained in good condition until the end of the nesting season or until the young have fledged, as determined by a qualified biologist.

2.3.5 Threatened and Endangered Species

Regulatory Setting

The primary federal law protecting threatened and endangered species is the Federal Endangered Species Act: 16 United States Code Section 1531, et seq. See also 50 Code of Federal Regulations Part 402. This act and subsequent amendments provide for the conservation of endangered and threatened species and the ecosystems upon which they depend. Under Section 7 of this act, federal agencies, such as the Federal Highway Administration, are required to consult with the United States Fish and Wildlife Service and the National Marine Fisheries Service to ensure that they are not undertaking, funding, permitting or authorizing actions likely to jeopardize the continued existence of listed species or destroy or adversely modify designated critical habitat. Critical habitat is defined as geographic locations critical to the existence of a threatened or endangered species. The outcome of consultation under Section 7 is a Biological Opinion or an Incidental Take statement. Section 3 of the Federal Endangered Species Act defines take as “harass, harm, pursue, hunt, shoot, wound, kill, trap, capture or collect or any attempt at such conduct.”

California has enacted a similar law at the state level, the California Endangered Species Act, California Fish and Game Code Section 2050, et seq. the California Endangered Species Act emphasizes early consultation to avoid potential impacts to rare, endangered, and threatened species and to develop appropriate planning to offset project caused losses of listed species populations and their essential habitats. The California Department of Fish and Wildlife is the agency responsible for implementing California Endangered Species Act. Section 2081 of the Fish and Game Code prohibits “take” of any species determined to be an endangered species or a threatened species. Take is defined in Section 86 of the Fish and Game Code as “hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture, or kill.” The California Endangered Species Act allows for take incidental to otherwise lawful development projects; for these actions an incidental take permit is issued by the California Department of Fish and Wildlife. For projects requiring a Biological Opinion under Section 7 of the Federal Endangered Species Act, the California
Department of Fish and Wildlife may also authorize impacts to California Endangered Species Act species by issuing a Consistency Determination under Section 2080.1 of the Fish and Game Code.

Another federal law, the Magnuson-Stevens Fishery Conservation and Management Act of 1976, was established to conserve and manage fishery resources found off the coast, as well as anadromous species and Continental Shelf fishery resources of the United States, by exercising (A) sovereign rights for the purposes of exploring, exploiting, conserving, and managing all fish within the exclusive economic zone established by Presidential Proclamation 5030, dated March 10, 1983, and (B) exclusive fishery management authority beyond the exclusive economic zone over such anadromous species, Continental Shelf fishery resources, and fishery resources in special areas.

Affected Environment
The information in this section is based on the Natural Environment Study (February 2013). The biological study area, totally approximately 9.48 acres, includes the project footprint, existing roadways, cut/fill slopes, access and staging areas, and lands beyond the project footprint that could be potentially affected by project construction.

Two federally listed species, the California tiger salamander and the California red-legged frog, are known to occur in the vicinity of the biological study area.

California Tiger Salamander
The California tiger salamander is a federally and State threatened species. Critical habitat for the California tiger salamander was designated on August 23, 2006. The biological study area for the proposed project is within the historic range of California tiger salamander although it is not designated critical habitat; the closest critical habitat is Unit 3 – Central Coast Region, located about 14 miles southeast of the biological study area. There are 12 known occurrences within 3.1 miles of the biological study area with the closest occurrence about one mile to the north.

There is no suitable aquatic habitat for California tiger salamanders in the biological study area, but suitable aquatic habitat (i.e., seasonal pond) known to be used by California tiger salamanders occurs about 0.9 mile north of the biological study area. In addition, a second seasonal pond occurs about 0.3 mile northeast of the biological study area; though it is not known if California tiger salamanders utilize this pond. Residential and other developments occur between the seasonal pond and the
biological study area except for an about 500-foot swath of undeveloped land. The location of the development blocks much of the access to the biological study area and decreases the probability for California tiger salamanders to occur in the biological study area and utilize this seasonal pond. No suitable habitat was identified south of State Route 68. The coyote brush community and some ruderal/disturbed areas (i.e., the existing State Route 68 fill slope) in the biological study area could provide suitable upland habitat for California tiger salamanders due to the presence of ground squirrel and other rodent burrows, which could be used as refugia (an area of relatively unaltered climate during a period of climate change) during estivation (a state of dormancy during the summer). The potential California tiger salamander upland habitat in the biological study area is low since a portion of the habitat consists of the existing road fill for State Route 68 and due to the location adjacent to a major highway (i.e., State Route 68).

**California Red-legged Frog**

The California red-legged frog (*Rana aurora draytonii*) is a federally threatened species and a State species of concern. Critical habitat for California red-legged frog was initially designated in March 2001, but was subsequently vacated (with the exception of one unit in the Sierra Nevada) pursuant to a November 6, 2002, court order by the U.S. District Court for the District of Columbia. A revised critical habitat designation was finalized on April 13, 2006. Per the revised critical habitat designations, the biological study area is not located in critical habitat. The nearest critical habitat is Unit MNT-2, located approximately 3.8 miles southwest of the biological study area in the Carmel Valley.

California red-legged frogs inhabit lowlands and foothills in or near permanent sources of deep water. This frog prefers ponds or creeks with extensive shoreline vegetation but will disperse one mile or more during and after rain events.

Aquatic habitat in the biological study area is limited to the ephemeral tributary to El Toro Creek. However, since the tributary conveys only ephemeral flows (i.e., during or immediately following substantial rain events) and no continuous flows or ponding occurs, this habitat is only marginally suitable for California red-legged frog. Plant communities adjacent to the drainage could provide suitable upland habitat.
Environmental Consequences

**California Tiger Salamander**

The United States Fish and Wildlife Service has defined the dispersal limit for California tiger salamander as 1.4 miles. Because the nearest known breeding pond for California tiger salamander is almost one mile from the biological study area and because upland habitat within the biological study area is of low quality, it is unlikely that California tiger salamander would occur within the biological study area. United States Fish and Wildlife Service has indicated that if the County would be willing to implement certain avoidance and minimization measures, the United States Fish and Wildlife Service would be able to issue a technical assistance letter stating that the proposed project would not result in take of California tiger salamander. The County has agreed to implement United States Fish and Wildlife Service-recommended measures; therefore, no federal incidental take authorization for California tiger salamander will be required. However, California Department of Fish and Wildlife considers California tiger salamanders potentially present in the biological study area and the County has opted to assume presence of California tiger salamanders in the biological study area instead of conducting presence/absence surveys. Consequently, a Section 2081 Incidental Take Permit will be required by the California Department of Fish and Wildlife to authorize incidental take of the California tiger salamander resulting from project construction. About 0.16 acre of potential California tiger salamander upland habitat will be removed during construction.

**California Red-legged Frog**

Several protocol-level and other surveys for California red-legged frog have been conducted in or near the biological study area between 2003 and 2007 with negative findings (refer to Appendix F of the Natural Environment Study for detailed information). Given the negative findings from the surveys and the marginal aquatic habitat for California red-legged frog in the ephemeral drainage (i.e., no persistent flow or ponding), California red-legged frog are not expected to occur in the biological study area. Therefore, implementation of the proposed project would not result in impacts to California red-legged frog.

**Avoidance, Minimization, and/or Mitigation Measures**

**California Tiger Salamander**

Implementation of preconstruction surveys and the installation of Environmentally Sensitive Area and Exclusion fencing would limit potential impacts to California tiger salamander. Implementation of Compensatory Mitigation would compensate for the loss of California tiger salamander habitat within the biological study area.
A retaining wall shall be constructed along the north side of State Route 68, west of Corral de Tierra Road, to minimize the footprint of the new fill slope which, in turn, would minimize effects to potential California tiger salamander upland habitat.

Environmentally Sensitive Area fencing shall be installed along the limits of work associated with construction of the new fill slope and retaining wall to prevent encroachment into adjacent California tiger salamander upland habitat.

All construction staging shall be located within the existing State and County rights-of-way.

Following completion of work, areas of potential California tiger salamander upland habitat in the biological study area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.

The following measures were developed during coordination with United States Fish and Wildlife Service biologist Doug Cooper.

Exclusion fencing shall be installed along the boundary of the work area that would affect California tiger salamander habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.

All burrows in the area to be disturbed shall be surveyed during the dry season for presence of estivating California tiger salamanders. Surveys shall be conducted at each burrow via either hand excavation or surveying with a fiber optic camera. Written documentation of the survey results shall be provided to the United States Fish and Wildlife Service within two weeks of completion of the surveys. If California tiger salamanders are not found, construction may proceed at any time provided the exclusion fencing is maintained in good condition. If California tiger salamanders are identified, the surveys shall be immediately halted and United States Fish and Wildlife Service shall be contacted within 48 hours. Work shall not commence until take authorization is provided by United States Fish and Wildlife Service. Take authorization will most likely be accomplished through preparation of a Habitat Conservation Plan and issuance of an Incidental Take Permit.

The exclusion fence shall be removed following the completion of work.
Compensatory Mitigation

- The loss of low quality California tiger salamander habitat would be mitigated at a 1:1 ratio as prescribed by California Department of Fish and Wildlife. To compensate for the loss of 0.16 acre of California tiger salamander upland habitat, a total of 0.16 acre of mitigation area that provides California tiger salamander upland habitat shall be purchased and preserved in perpetuity through use of a conservation easement or equivalent means.

California Red-legged Frog

Although the proposed project would not result in impacts to California red-legged frog, the following Avoidance and Minimization Measures would be implemented to protect California red-legged frog habitat within the biological study area.

- Environmentally Sensitive Areas shall be marked using orange construction fencing or equivalent and shall be maintained in good condition until construction is complete.
- Following completion of work, all areas denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.

2.3.6 Invasive Species

Regulatory Setting

On February 3, 1999, President Clinton signed Executive Order 13112 requiring federal agencies to combat the introduction or spread of invasive species in the United States. The order defines invasive species as “any species, including its seeds, eggs, spores, or other biological material capable of propagating that species, that is not native to that ecosystem whose introduction does or is likely to cause economic or environmental harm or harm to human health.” Federal Highway Administration guidance issued August 10, 1999 directs the use of the state’s noxious weed list to define the invasive plants that must be considered as part of the National Environmental Policy Act analysis for a proposed project.

Affected Environment

The information in this section is based on the Natural Environment Study (February 2013). The biological study area, totally approximately 9.48 acres, includes the project footprint, existing roadways, cut/fill slopes, access and staging areas, and
lands beyond the project footprint that could be potentially affected by project construction.

Exotic plant species are typically more numerous adjacent to roads and developed areas. During construction, invasive species can inadvertently be introduced to a project area through the entering and exiting of construction equipment contaminated by invasive species, including invasive species in seed mixtures and mulch, mitigation plantings and mulches contaminated by invasive species, and the improper removal and disposal of invasive species that results in seeds being spread along the roadway.

**Environmental Consequences**

The proposed project has the potential to introduce invasive species into the biological study area during project construction, as discussed above. Implementation of the following measures would reduce potential impacts associated with invasive species.

**Avoidance, Minimization, and/or Mitigation Measures**

- In compliance with the Executive Order on Invasive Species, Executive Order 13112, and subsequent guidance from the Federal Highway Administration, the landscaping and erosion control included in the project would not use species listed as noxious weeds. In areas of particular sensitivity, extra precautions would be taken if invasive species were found in or adjacent to the construction areas.
- During construction all earthmoving equipment to be used shall be thoroughly cleaned before arriving to the project area, all seeding equipment (i.e., hydroseed trucks) shall be thoroughly rinsed at least three times prior to beginning seeding work, and all equipment shall be thoroughly cleaned before leaving the project area.
- Eradication strategies shall be implemented should invasive species occur on the site during construction of the proposed project.

**2.4 Construction Impacts**

**2.4.1 Air Quality**

**Regulatory Setting**

The Clean Air Act as amended in 1990 is the federal law that governs air quality. Its counterpart in California is the California Clean Air Act of 1988. These laws set standards for the quantity of pollutants that can be in the air. At the federal level, these standards are called National Ambient Air Quality Standards. Standards have
been established for six criteria pollutants that have been linked to potential health concerns; the criteria pollutants are: carbon monoxide, nitrogen dioxide, ozone, particulate matter, lead, and sulfur dioxide.

Under the 1990 Clean Air Act Amendments, the United States Department of Transportation cannot fund, authorize, or approve Federal actions to support programs or projects that are not first found to conform to State Implementation Plan for achieving the goals of the Clean Air Act requirements. Conformity with the Clean Air Act takes place on two levels—first, at the regional level and second, at the project level. The proposed project must conform at both levels to be approved.

Regional level conformity in California is concerned with how well the region is meeting the standards set for carbon monoxide, nitrogen dioxide, ozone, and particulate matter. California is in attainment for the other criteria pollutants. At the regional level, Regional Transportation Plans are developed that include all of the transportation projects planned for a region over a period of years, usually at least 20. Based on the projects included in the Regional Transportation Plans, an air quality model is run to determine whether or not the implementation of those projects would conform to emission budgets or other tests showing that attainment requirements of the Clean Air Act are met. If the conformity analysis is successful, the regional planning organization and the appropriate federal agencies, such as the Federal Highway Administration, make the determination that the Regional Transportation Plan is in conformity with the State Implementation Plan for achieving the goals of the Clean Air Act. Otherwise, the projects in the Regional Transportation Plan must be modified until conformity is attained. If the design and scope of the proposed transportation project are the same as described in the Regional Transportation Plan, then the proposed project is deemed to meet regional conformity requirements for purposes of project-level analysis.

Conformity at the project-level also requires “hot spot” analysis if an area is “nonattainment” or “maintenance” for carbon monoxide and/or particulate matter. A region is a “nonattainment” area if one or more monitoring stations in the region fail to attain the relevant standard. Areas that were previously designated as nonattainment areas but have recently met the standard are called “maintenance” areas. “Hot spot” analysis is essentially the same, for technical purposes, as carbon monoxide or particulate matter analysis performed for National Environmental Policy Act purposes. Conformity does include some specific standards for projects that require a hot spot analysis. In general, projects must not cause the carbon monoxide
standard to be violated, and in “nonattainment” areas the project must not cause any increase in the number and severity of violations. If a known carbon monoxide or particulate matter violation is located in the project vicinity, the project must include measures to reduce or eliminate the existing violation(s) as well.

**Affected Environment**

The information in this section is based on the *Air Quality Analysis Report* (February 2013). The proposed project is located in the North Central Coast Air Basin as defined by the California Air Resources Control Board. Monterey Bay Unified Air Pollution Control District is responsible for air quality in this basin. Pollutants emitted from the proposed project would not exceed the Monterey Bay Unified Air Pollution Control District significance thresholds or cause a substantial impact on air quality. The proposed project is consistent with the local General Plans and therefore consistent with the Air Quality Management Plan. The North Central Coast Air Basin is in attainment or maintenance of all federal ambient air quality standards, and is non-attainment of State ambient air quality standards for ozone and particulate matter smaller than 10 microns.

The air quality monitoring station closest to the project area that monitors all of the criteria pollutants is the Salinas Station. The Salinas Station is about 9.46 miles from the proposed project area. The criteria pollutants monitored at the Salinas Station include carbon monoxide, nitrogen dioxide, ozone, and fine particulate matter with a diameter of 2.5 microns or less. With the exception of particulate matter less than 10 microns in diameter in 2003, the levels monitored for these criteria pollutants at the Salinas Station have not exceeded State or federal standards in the past 5 years. The State particulate matter less than 10 microns in diameter standard was exceeded two times in 2008. The federal particulate matter less than 10 microns in diameter standard was not exceeded in the past 5 years.

**Environmental Consequences**

Construction of the proposed project may expose the surrounding sensitive receptors to airborne particulates and fugitive dust as well as a small quantity of pollutant emissions from construction equipment (i.e., diesel fueled vehicles and equipment). Provisions for the regulation of construction-related vehicle and dust emissions are incorporated into the Caltrans Standard Specifications, which must be followed by all contractors. Compliance with these specifications would reduce construction-related air quality impacts.
The proposed project would improve the flow of traffic through the State Route 68/Corral de Tierra Road intersection. The proposed project would not increase population in the project area and would not add additional traffic to the roadway; therefore, no long-term regional project-related air quality impacts are anticipated.

**Avoidance, Minimization, and/or Mitigation Measures**

The proposed project shall implement the following Monterey Bay Unified Air Pollution Control District California Environmental Quality Act Air Quality Guidelines dust minimization measures:

- Water all active construction sites at least twice daily. Frequency should be based on the type of operation, soil, and wind exposure.
- Apply chemical soil stabilizers on inactive construction areas (disturbed lands within construction projects that are unused for at least 4 consecutive days).
- Apply nontoxic binders (e.g., latex acrylic copolymer) to exposed areas after cut and fill operations and hydroseed area.
- Cover all trucks hauling dirt, sand, or loose materials.
- Plant vegetative ground cover in disturbed areas as soon as possible.
- Cover inactive storage piles.
- Sweep streets if visible soil material is carried out from the construction site.

The proposed project shall implement the following Caltrans Standard Specifications recommended for reduction of air pollutants generated by vehicle and equipment exhaust during construction:

- The construction contractor shall select the construction equipment used on site based on low emission factors and high energy efficiency. The construction contractor shall ensure that construction grading plans include a statement that all construction equipment will be tuned and maintained in accordance with the manufacturer’s specifications.
- The construction contractor shall ensure that construction grading plans include a statement that work crews will shut off equipment when not in use.
- The construction contractor shall time the construction activities so as not to interfere with peak hour traffic and to minimize obstruction of through traffic lanes adjacent to the site; if necessary, a flagperson shall be retained to maintain safety adjacent to existing roadways.
- The construction contractor shall support and encourage ridesharing and transit incentives for the construction crew.
California Air Resources Control Board-approved on-road diesel fuel shall be used in all diesel construction equipment when available.

2.4.2 Noise and Vibration

Regulatory Setting

The California Environmental Quality Act provides the broad basis for analyzing and abating highway traffic noise effects. The intent of this law is to promote the general welfare and to foster a healthy environment.

The California Environmental Quality Act requires a strictly baseline versus build analysis to assess whether a proposed project will have a noise impact. If a proposed project is determined to have a significant noise impact under the California Environmental Quality Act, then the California Environmental Quality Act dictates that mitigation measures must be incorporated into the project unless such measures are not feasible.

Affected Environment

The information in this section is based on the Noise Study Analysis Report (February 2013). The main existing noise sources in the proposed project area are related to transportation facilities (State Route 68 and Corral de Tierra Road). The proposed project would improve the flow of traffic through the intersection of State Route 68 and Corral de Tierra Road but would not generate new regional vehicular trips nor increase the roadway carrying capacity.

Environmental Consequences

Construction of the proposed project may temporarily increase noise levels in the immediate area. The closest sensitive receptor locations are residences located 50 feet from the project construction areas. Therefore, these receptor locations may be subject to short-term noise generated by construction activities. Equipment likely to be used during construction includes a bulldozer, grader, loader, sheep’s foot compactor, backhoe, drill rig, dump truck, water truck, and paving machine and rollers. Construction of the proposed project would not require any pile driving as driven piles are not part of the proposed project. Implementation of the Caltrans standard specifications on “Sound Control Requirements” would reduce temporary noise levels to the maximum extent feasible.

The proposed project would not significantly alter the vertical or horizontal alignment or increase the capacity of State Route 68 or Corral de Tierra Road. Therefore, the proposed project is not a Type I or Type II project. Non-Type I or II projects are not
expected to substantially alter the long-term traffic noise levels in the project area. As the proposed project would not alter future traffic noise levels in the project area, no abatement measures, such as sound barriers, are required.

**Avoidance, Minimization, and/or Mitigation Measures**
The following measures would reduce construction-related noise impacts for existing residences adjacent to the project area:

- All construction equipment shall conform to the provisions of Caltrans Standard Specifications, Section 14-8.02, “Noise Control.” This section requires the contractor to comply with all local ordinances (i.e., County of Monterey) that apply to any work as part of the contract. Therefore, no machine, mechanism, device, or contrivance which produces a noise level exceeding the maximum 85 A-weighted decibel (dBA) level at a distance of 50 feet from construction activities shall be allowed.
- Portable construction equipment shall be located as far as possible from the noise sensitive locations as is feasible.
- Construction vehicle staging areas and equipment maintenance areas shall be located as far as possible from sensitive receptors.
- All construction equipment shall have sound control devices no less effective than those provided on the original equipment. No construction equipment shall have an unmuffled exhaust.
- As directed by Caltrans, the contractor shall implement appropriate additional noise abatement measures including, but not limited to, shutting off idling equipment, rescheduling construction activities, notifying adjacent residents in advance of construction work, and utilizing construction equipment with tires, not tracks.

2.5 **Climate Change under the California Environmental Quality Act**

**Regulatory Setting**
Climate change refers to long-term changes in temperature, precipitation, wind patterns, and other elements of the earth's climate system. An ever-increasing body of scientific research attributes these climatological changes to greenhouse gas (GHG) emissions, particularly those generated from the production and use of fossil fuels.

While climate change has been a concern since at least 1988, as evidenced by the establishment of the United Nations and World Meteorological Organization’s
Intergovernmental Panel on Climate Change, the efforts devoted to greenhouse gas emissions reduction and climate change research and policy have increased dramatically in recent years. These efforts are primarily concerned with the emissions of greenhouse gases related to human activity that include carbon dioxide, methane, nitrous oxide, tetrafluoromethane, hexafluoroethane, sulfur hexafluoride, fluoroform, $s$, $s$, $s$, 2–tetrafluoroethane, and difluoroethane.

In 2002, with the passage of Assembly Bill 1493, California launched an innovative and pro-active approach to dealing with greenhouse gas emissions and climate change at the state level. Assembly Bill 1493 requires the California Air Resources Board to develop and implement regulations to reduce automobile and light truck greenhouse gas emissions. These stricter emissions standards were designed to apply to automobiles and light trucks beginning with the 2009-model year; however, in order to enact the standards California needed a waiver from the United States Environmental Protection Agency. The waiver was denied by Environmental Protection Agency in December 2007 and efforts to overturn the decision had been unsuccessful. See California v. Environmental Protection Agency, 9th Cir. Jul. 25, 2008, No. 08-70011. On January 26, 2009, it was announced that the United States Environmental Protection Agency would reconsider their decision regarding the denial of California’s waiver. On May 18, 2009, President Obama announced the enactment of a 35.5 miles per gallon fuel economy standard for automobiles and light-duty trucks which will take effect in 2012. On June 30, 2009 United States Environmental Protection Agency granted California the waiver. California is expected to enforce its standards for 2009 to 2011 and then look to the federal government to implement equivalent standards for 2012 to 2016. The granting of the waiver will also allow California to implement even stronger standards in the future. The state is expected to start developing new standards for the post-2016 model years later this year.

On June 1, 2005, Governor Arnold Schwarzenegger signed Executive Order S-3-05. The goal of this Executive Order is to reduce California’s greenhouse gas emissions to: 1) 2000 levels by 2010, 2) 1990 levels by the 2020 and 3) 80 percent below the 1990 levels by the year 2050. In 2006, this goal was further reinforced with the passage of Assembly Bill 32, the Global Warming Solutions Act of 2006. Assembly Bill 32 sets the same overall greenhouse gas emissions reduction goals while further mandating that the California Air Resources Board create a plan, which includes market mechanisms, and implement rules to achieve “real, quantifiable, cost-effective reductions of greenhouse gases.” Executive Order S-20-06 further directs state
agencies to begin implementing Assembly Bill 32, including the recommendations made by the state’s Climate Action Team.

With Executive Order S-01-07, Governor Schwarzenegger set forth the low carbon fuel standard for California. Under this executive order, the carbon intensity of California’s transportation fuels is to be reduced by at least 10 percent by 2020.

Climate change and greenhouse gas reduction is also a concern at the federal level; however, at this time, no legislation or regulations have been enacted specifically addressing greenhouse gas emissions reductions and climate change. California, in conjunction with several environmental organizations and several other states, sued to force the United States Environmental Protection Agency to regulate greenhouse gases as a pollutant under the Clean Air Act (Massachusetts vs. Environmental Protection Agency et al., 549 U.S. 497 (2007). The court ruled that greenhouse gas does fit within the Clean Air Act’s definition of a pollutant, and that the United States Environmental Protection Agency does have the authority to regulate greenhouse gas. Despite the Supreme Court ruling, there are no promulgated federal regulations to date limiting greenhouse gas emissions.

On December 7, 2009, the United States Environmental Protection Agency Administrator signed two distinct findings regarding greenhouse gases under section 202(a) of the Clean Air Act:

- **Endangerment Finding:** The Administrator finds that the current and projected concentrations of the six key well-mixed greenhouse gases--carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride--in the atmosphere threaten the public health and welfare of current and future generations.

- **Cause or Contribute Finding:** The Administrator finds that the combined emissions of these well-mixed greenhouse gases from new motor vehicles and new motor vehicle engines contribute to the greenhouse gas pollution which threatens public health and welfare.

These findings do not themselves impose any requirements on industry or other entities. However, this action is a prerequisite to finalizing the United States Environmental Protection Agency’s proposed greenhouse gas emission standards for light-duty vehicles, which were jointly proposed by United States Environmental
Protection Agency and the Department of Transportation’s National Highway Safety Administration on September 15, 2009.2

According to Recommendations by the Association of Environmental Professionals on How to Analyze Greenhouse Gas Emissions and Global Climate Change in California Environmental Quality Act Documents (March 5, 2007), an individual project does not generate enough greenhouse gas emissions to significantly influence global climate change. Rather, global climate change is a cumulative impact. This means that a project may participate in a potential impact through its incremental contribution combined with the contributions of all other sources of greenhouse gases. In assessing cumulative impacts, it must be determined if a project’s incremental effect is “cumulatively considerable.” See California Environmental Quality Act Guidelines sections 15064(i)(1) and 15130. To make this determination the incremental impacts of the project must be compared with the effects of past, current, and probable future projects. To gather sufficient information on a global scale of all past, current, and future projects in order to make this determination is a difficult if not impossible task.

As part of its supporting documentation for the Draft Scoping Plan, California Air Resources Board recently released an updated version of the greenhouse gas inventory for California (June 26, 2008). Shown on the following graph from that update that shows the total greenhouse gas emissions for California for 1990, 2002–2004 average, and 2020 projected if no action is taken.

![California Greenhouse Gas Inventory](http://www.arb.ca.gov/cc/inventory/data/forecast.htm)

2 http://www.epa.gov/climatechange/endangerment.html
Chapter 2 • Affected Environment, Environmental Consequences, and Avoidance, Minimization, and/or Mitigation Measures

Caltrans and its parent agency, the Business, Transportation, and Housing Agency, have taken an active role in addressing greenhouse gas emission reduction and climate change. Recognizing that 98 percent of California’s greenhouse gas emissions are from the burning of fossil fuels and 40 percent of all human made greenhouse gas emissions are from transportation (see Climate Action Program at Caltrans (December 2006), Caltrans has created and is implementing the Climate Action Program at Caltrans that was published in December 2006. This document can be found at: http://www.dot.ca.gov/docs/ClimateReport.pdf.

**Project Analysis**

One of the main strategies in the California Department of Transportation’s Climate Action Program to reduce greenhouse gas emissions is to make California’s transportation system more efficient. The highest levels of carbon dioxide from mobile sources such as automobiles occur at stop-and-go speeds (0–25 miles per hour) and speeds over 55 miles per hour; the most severe emissions occur from 0–25 miles per hour (Figure 2-1). To the extent that a project relieves congestion by enhancing operations and improving travel times in high congestion travel corridors, greenhouse gas emissions, particularly carbon dioxide, may be reduced.

**Figure 2-1 Fleet Carbon Dioxide Emissions versus Speed (Highway)**

Source: Center for Clean Air Policy: http://www.ccap.org/Presentations/Winkelman%20TRB%202004%20(1-13-04).pdf
None of the elements of the proposed project are designed to increase through-capacity, but are designed to reduce congestion conditions during the evening peak traveling hours and to reduce the collision rates related to left-turn movements from State Route 68 onto Corral de Tierra Road. The proposed project would widen the approaches to the State Route 68/Corral de Tierra Road intersection to accommodate the construction of a second left-turn lane from westbound State Route 68 to southbound Corral de Tierra Road, which would reduce the potential collision rate related to left-turn movements from State Route 68 onto Corral de Tierra Road. In addition, a second southbound receiving lane would be constructed on Corral de Tierra Road. The proposed project would reduce the percentage of cycle time devoted to left-turn movements, thereby increasing the percentage of cycle time devoted to through movements. This would have a beneficial effect in helping to reduce intersection congestion.

Additionally, the proposed project would widen the paved shoulders of Corral de Tierra Road within the project area to 8 feet to better accommodate pedestrians and facilitate the future addition of Class II bicycle lanes to Corral de Tierra Road.

Given the elements of the proposed project and the anticipated reduction in intersection congestion and queuing times, Caltrans does not anticipate an increase in carbon dioxide or other greenhouse gas emissions.

**Construction Emissions**

Greenhouse gas emissions for transportation projects can be divided into those produced during construction and those produced during operations. Construction greenhouse gas emissions include emissions produced as a result of material processing, emissions produced by on-site construction equipment, and emissions arising from traffic delays due to construction. These emissions would be produced at different levels throughout the construction phase; their frequency and occurrence can be reduced through innovations in plans and specifications and by implementing better traffic management during construction phases. In addition, with innovations such as longer pavement lives, improved traffic management plans, and changes in materials, the greenhouse gas emissions produced during construction can be mitigated to some degree by longer intervals between maintenance and rehabilitation events.
California Environmental Quality Act Conclusion

While there will be construction-related increases in greenhouse gas emissions, Caltrans does anticipate that the project would not result in any increases in operational greenhouse gas emissions. It is Caltrans determination that in the absence of further regulatory or scientific information related to greenhouse gas emissions and California Environmental Quality Act significance, it contains a level of uncertainty to make a determination regarding significance of the project’s direct impact and its contribution on the cumulative scale to climate change. However, Caltrans is firmly committed to implementing measures to help reduce the potential effects of the project. These measures are outlined in the following sections.

Assembly Bill 32 Compliance

Caltrans continues to be actively involved on the Governor’s Climate Action Team as the California Air Resources Board works to implement the Governor’s Executive Orders and help achieve the targets set forth in Assembly Bill 32. Many of the strategies Caltrans is using to help meet the targets in Assembly Bill 32 come from the California Strategic Growth Plan, which is updated each year. Former Governor Arnold Schwarzenegger’s Strategic Growth Plan called for a $238.6 billion infrastructure improvement program to fortify the state’s transportation system, education, housing, and waterways, including $100.7 billion in transportation funding through 2016. As shown on Figure 2-2, the Strategic Growth Plan targets a significant decrease in traffic congestion below today’s level and a corresponding reduction in greenhouse gas emissions. The Strategic Growth Plan proposes to do this while accommodating growth in population and the economy. A suite of investment options has been created that, combined together, yield the promised reduction in congestion. The Strategic Growth Plan relies on a complete systems approach of a variety of strategies: system monitoring and evaluation, maintenance and preservation, smart land use and demand management, and operational improvements.

As part of the Climate Action Program at Caltrans, Caltrans is supporting efforts to reduce vehicle miles traveled by planning and implementing smart land use strategies: job/housing proximity, developing transit-oriented communities, and high-density housing along transit corridors. Caltrans is working closely with local

3 Governor’s Strategic Growth Plan, Fig. 1 (http://gov.ca.gov/pdf/gov/CSGP.pdf).
jurisdictions on planning activities; however, Caltrans does not have local land use planning authority. Caltrans is also supporting efforts to improve the energy efficiency of the transportation sector by increasing vehicle fuel economy in new cars and light- and heavy-duty trucks. Caltrans is doing this by supporting ongoing research efforts at universities, supporting legislative efforts to increase fuel economy, and its participation on the Climate Action Team. It is important to note, however, that control of the fuel economy standards is held by the United States Environmental Protection Agency and California Air Resources Board. Lastly, the use of alternative fuels is also being considered; Caltrans is participating in funding for alternative fuel research at the University of California, Davis. For detailed information about Caltrans and statewide efforts that Caltrans is implementing in order to reduce greenhouse gas emissions, please refer to the Caltrans Climate Action Program (December 2006).
To the extent that it is applicable or feasible for the project, the following measures can also help to reduce the greenhouse gas emissions and potential climate change impacts from projects.

- **Use of Reclaimed Water:** Currently 30 percent of the electricity used in California is for the treatment and delivery of water. Use of reclaimed water helps conserve this energy, which reduces greenhouse gas emissions from electricity production.
- **Landscaping:** Landscaping reduces surface warming and through photosynthesis decreases carbon dioxide.
- **Portland Cement:** Use of lighter color surfaces such as Portland cement helps to reduce the albedo effect (measure of how much light a surface reflects) and cool the surface; in addition, the California Department of Transportation has been a leader in the effort to add fly ash to Portland cement mixes. Adding fly ash reduces the greenhouse gas emissions associated with cement production.
- **Lighting:** Use of energy efficient lighting, such as light-emitting diode traffic signals.
- **Idling Restrictions:** For trucks and equipment.

**Adaptation Strategies**

“Adaptation strategies” refer to how the Department and others can plan for the effects of climate change on the state’s transportation infrastructure and strengthen or protect the facilities from damage. Climate change is expected to produce increased variability in precipitation, rising temperatures, rising sea levels, variability in storm surges and intensity, and the frequency and intensity of wildfires. These changes may affect the transportation infrastructure in various ways, such as damage to roadbeds from longer periods of intense heat; increasing storm damage from flooding and erosion; and inundation from rising sea levels. These effects will vary by location and may, in the most extreme cases, require that a facility be relocated or redesigned. There may also be economic and strategic ramifications as a result of these types of impacts to the transportation infrastructure.

At the federal level, the Climate Change Adaptation Task Force, co-chaired by the White House Council on Environmental Quality (CEQ), the Office of Science and Technology Policy (OSTP), and the National Oceanic and Atmospheric Administration (NOAA), released its interagency report on October 14, 2010 outlining recommendations to President Obama for how Federal Agency policies and programs can better prepare the U.S. to respond to the impacts of climate change. The
Progress Report of the Interagency Climate Change Adaptation Task Force recommends that the federal government implement actions to expand and strengthen the nation’s capacity to better understand, prepare for, and respond to climate change.

Climate change adaptation must also involve the natural environment as well. Efforts are underway on a statewide-level to develop strategies to cope with impacts to habitat and biodiversity through planning and conservation. The results of these efforts will help California agencies plan and implement mitigation strategies for programs and projects.

On November 14, 2008, former Governor Arnold Schwarzenegger signed EO S-13-08 which directed a number of state agencies to address California’s vulnerability to sea level rise caused by climate change. This EO set in motion several agencies and actions to address the concern of sea level rise.

The California Natural Resources Agency (Resources Agency) was directed to coordinate with local, regional, state and federal public and private entities to develop. The California Climate Adaptation Strategy (Dec 2009)\textsuperscript{5}, which summarizes the best known science on climate change impacts to California, assesses California’s vulnerability to the identified impacts, and then outlines solutions that can be implemented within and across state agencies to promote resiliency.

The strategy outline is in direct response to EO S-13-08 that specifically asked the Resources Agency to identify how state agencies can respond to rising temperatures, changing precipitation patterns, sea level rise, and extreme natural events. Numerous other state agencies were involved in the creation of the Adaptation Strategy document, including the California Environmental Protection Agency; Business, Transportation and Housing; Health and Human Services; and the Department of Agriculture. The document is broken down into strategies for different sectors that include: Public Health; Biodiversity and Habitat; Ocean and Coastal Resources; Water Management; Agriculture; Forestry; and Transportation and Energy Infrastructure. As data continues to be developed and collected, the state's adaptation strategy will be updated to reflect current findings.

The Resources Agency was also directed to request the National Academy of Science to prepare a Sea Level Rise Assessment Report by December 2010\(^6\) to advise how California should plan for future sea level rise. The report is to include:

- Relative sea level rise projections for California, Oregon and Washington taking into account coastal erosion rates, tidal impacts, El Niño and La Niña events, storm surge and land subsidence rates.
- The range of uncertainty in selected sea level rise projections.
- A synthesis of existing information on projected sea level rise impacts to state infrastructure (such as roads, public facilities and beaches), natural areas, and coastal and marine ecosystems.
- A discussion of future research needs regarding sea level rise.

Prior to the release of the final Sea Level Rise Assessment Report, all state agencies that are planning to construct projects in areas vulnerable to future sea level rise were directed to consider a range of sea level rise scenarios for the years 2050 and 2100 in order to assess project vulnerability and, to the extent feasible, reduce expected risks and increase resiliency to sea level rise. Sea level rise estimates should also be used in conjunction with information regarding local uplift and subsidence, coastal erosion rates, predicted higher high water levels, storm surge and storm wave data.

Interim guidance has been released by The Coastal Ocean Climate Action Team (CO-CAT) as well as the Department as a method to initiate action and discussion of potential risks to the states infrastructure due to projected sea level rise.

The proposed project is outside the coastal zone and direct impacts to transportation facilities due to projected sea level rise are not expected.

Executive Order S-13-08 also directed the Business, Transportation, and Housing Agency to prepare a report to assess vulnerability of transportation systems to sea level rise affecting safety, maintenance and operational improvements of the system, and economy of the state. The Department continues to work on assessing the transportation system vulnerability to climate change, including the effect of sea level rise.

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Currently, the Department is working to assess which transportation facilities are at greatest risk from climate change effects. However, without statewide planning scenarios for relative sea level rise and other climate change effects, the Department has not been able to determine what change, if any, may be made to its design standards for its transportation facilities. Once statewide planning scenarios become available, the Department will be able review its current design standards to determine what changes, if any, may be warranted in order to protect the transportation system from sea level rise.

Climate change adaptation for transportation infrastructure involves long-term planning and risk management to address vulnerabilities in the transportation system from increased precipitation and flooding; the increased frequency and intensity of storms and wildfires; rising temperatures; and rising sea levels. The Department is an active participant in the efforts being conducted in response to EO S-13-08 and is mobilizing to be able to respond to the National Academy of Science Sea Level Rise Assessment Report.
Chapter 3 Comments and Coordination

Early and continuing coordination with the general public and appropriate public agencies is an essential part of the environmental process to determine the scope of environmental documentation, the level of analysis, potential impacts and mitigation measures, and related environmental requirements. Agency consultation and public participation for this project have been accomplished through a variety of formal and informal methods, including project development team meetings, and interagency coordination meetings. This chapter summarizes the results of Caltrans’ efforts to identify, address, and resolve project-related issues through early and continuing coordination.

3.1 Public Coordination

A public open house was held on April 17, 2007, at San Benancio Middle School for three State Route 68 intersection improvement projects, including Corral de Tierra Road, Laureles Grade, and San Benancio Road. The purpose of the meeting was to provide information on the intersection projects and obtain public input.

Members of the public were greeted at the door, asked to sign in, handed an informational packet and comment card, and informed of the meeting format. An open house format was used.

A presentation was made by the County Director of Public Works to open the meeting. A question-and-answer session followed the presentation, and the public was given the opportunity to view the informational exhibits and talk with the County and engineering consultants about each project. Informational displays were located throughout the room, and representatives from the County, Dokken Engineering, and Wood Rodgers were present to answer questions.

Seventy-three (73) people attended the meeting. The public comments related to traffic safety, staging areas, and the environmental documentation process.

3.2 Agency Coordination

The Transportation Agency of Monterey County updated the Regional Transportation Plan in 2010. The proposed project is identified in the updated plan. The proposed project would be funded by a combination of State Transportation Improvement
Program-Regional Improvement Program funds and local funds (development impact fees).

LSA Associates, Inc. consulted with Caltrans biologist Dave Hacker on April 24, 2007 to discuss the potential project-related impact to California red-legged frog and California tiger salamander. In addition, LSA, Wood Rodgers, and County staff met with Doug Cooper from United States Fish and Wildlife Service on the project site on November 7, 2008, and with California Department of Fish and Wildlife (Laura Diaz-Peterson) and Caltrans Biologist, Lisa Schicker on June 17, 2009, to discuss potential effects to California tiger salamander. In an email from Doug Cooper April 28, 2009, United States Fish and Wildlife Service agreed with the proposed project’s approach for California tiger salamander stating that if the County implements avoidance and minimization measures such as surveys for California tiger salamander (assuming survey results will be negative) within the proposed project area and installation of exclusion fencing around the perimeter of the proposed project site, United States Fish and Wildlife Service would be able to issue a technical assistance letter stating that the proposed project would not result in take of California tiger salamander. The County has agreed to implement United States Fish and Wildlife Service-recommended measures; therefore, no federal incidental take authorization for California tiger salamander will be required. Refer to Appendix E for United States Fish and Wildlife Service coordination regarding California tiger salamander.

In addition, LSA consulted with California Department of Fish and Wildlife (Linda Connolly) during preparation of an application for take authorization under Section 2081 of the California Fish and Game Code for take of a listed species (California tiger salamander) under the assumption of California tiger salamander presence in the biological study area (refer to discussion in Section 2.3.3 herein).
Chapter 4  List of Preparers

This document was prepared by Caltrans staff in cooperation with the County of Monterey and its consultant, LSA Associates, Inc. (LSA). The following staff prepared this Initial Study/Mitigated Negative Declaration and supporting technical studies:

Brooke Langle, Senior Biologist, LSA. Biology; 11 years of experience. Contribution: Preparation of Natural Environmental Study.

Cris Timofei, Transportation Engineer MS, Civil Engineering, Cal State Fullerton, 17 years of environmental engineering experience. Contribution: Noise Study.


David Hacker, Associate Environmental Planner, Caltrans. Natural Resources Management; 12 years of experience. Contribution: Review of Natural Environmental Study.

Isaac V. Leyva, Engineering Geologist. B.S., Geology; 27 years of experience in Petroleum Geology, Environmental Geology, Geotechnical Engineering. Contribution: Paleontology Review

James Tkach, Transportation Engineer. B.S., Soil Science, California Polytechnic State University, San Luis Obispo, Certificate in Hazardous Materials Management, University of California, Santa Barbara, 5 years of experience in project design and construction, 25 years of experience in hazardous waste management. Contribution: Reviewed Initial Site Assessment and Preliminary Site Investigation.

Jeff Bray, Principal/Biologist, LSA. Wildlife Biology; 18 years of experience. Contribution: Preparation of Natural Environmental Study.


Chapter 4 • List of Preparers


Lara Bertaina, Associate Environmental Planner. Bachelor of Arts in Environmental Studies and Planning, Sonoma State University; 14 years of experience coordinating environmental process. Contribution: Reviewed Draft and Final Environmental Document.


Lisa Schicker, Associate Environmental Planner (retired). M.L.A., Landscape Architecture/Environmental Management, North Carolina State University; B.A., Biology, Hiram College; more than 25 years of experience in environmental planning, biological and arboricultural studies, permit compliance and environmental mitigation and restoration. Contribution: Reviewed biology section.

Lisa Williams, Senior Environmental Specialist, LSA. Biological and Environmental Studies; 12 years of experience. Contribution: Preparation of Water Quality Assessment.


Michael H. Thomas, Associate Environmental Planner, BS Environmental Horticulture, California Polytechnic State University, 13 Years Environmental Planning Experience. Contribution: Peer Review.
Chapter 4 • List of Preparers

Mike Jacob, Associate Environmental Planner. B.A., Environmental Studies, Urban Planning emphasis, San Jose State University; A.A., Geography, Foothill College, Los Altos Hills; 6 years of Caltrans environmental planning experience, 8 years of Caltrans transportation planning experience, and 13 years of combined urban/environmental planning experience. Contribution: Reviewed initial study.

Mike Sandecki, Associate Environmental Planner, Caltrans. Geology; 22 years of experience. Contribution: Review of environmental document.


Nicole West, Senior Environmental Specialist, LSA. Civil and Environmental Engineering; 11 years of experience. Contribution: Preparation of Water Quality Assessment.

Pamela Reading, Senior Planner, LSA. Environmental Studies; 18 years of experience. Contribution: Preparation of Visual Assessment.

Rajeev L. Dwivedi, Engineering Geologist, M.S. Geology, Wichita State University, M.S. Civil Engineering, Oklahoma State University, Ph.D. Environmental Science, Oklahoma State University; 27 years of experience related to Water Quality, Engineering Geology. Contribution: Water Quality Review.

Rick Sauerwein, Community Development Manager, County of Monterey Department of Public Works. Civil Engineering/Environmental Planning and Policy; 35 years of experience. Contribution: Review of environmental document.


Terry Goewert, Associate Environmental Planner. B.S. Food Science & Nutrition, Colorado State University Fort Collins, Colorado; 10 years of environmental planning Experience. Contribution: Reviewed Air Study.
Terry L. Joslin, Archaeologist and Native American Coordinator. Ph.D., Archaeology, University of California, Santa Barbara; 20 years of experience. Contribution: Reviewed cultural resource documents.


# Distribution List

## Federal Agencies

<table>
<thead>
<tr>
<th>Agency</th>
<th>Address</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States Army Corps of Engineers</td>
<td>915 Wilshire Boulevard, Los Angeles, CA 90017</td>
</tr>
<tr>
<td>Division Chief at Santa Cruz/San Benito/Monterey County US Fish and Wildlife Service</td>
<td>2493 Portola Road, Suite B, Ventura, CA 93003</td>
</tr>
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## State Agencies

<table>
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<tr>
<th>Agency</th>
<th>Address</th>
</tr>
</thead>
<tbody>
<tr>
<td>California Air Resources Board</td>
<td>1102 Q Street, Sacramento, CA 95802</td>
</tr>
<tr>
<td>California Department of Conservation, Division of Land Resource Protection</td>
<td>801 K Street, MS 18-01, Sacramento, CA 95814</td>
</tr>
<tr>
<td>California Department of Fish and Wildlife</td>
<td>1416 9th Street, 12th Floor, Sacramento, CA 95814</td>
</tr>
<tr>
<td>California Department of Toxic Substance Control</td>
<td>700 Heinz Avenue, Suite 200, Berkeley, CA 94710-2122</td>
</tr>
<tr>
<td>California Highway Patrol, Office of Special Projects</td>
<td>2551 1st Avenue, Sacramento, CA 95818</td>
</tr>
<tr>
<td>California State Lands Commission</td>
<td>100 Howard Avenue, Suite 100, South Sacramento, CA 95825</td>
</tr>
<tr>
<td>California Energy Commission, Media and Public Communications Office</td>
<td>1516 9th Street, MS-29, Sacramento, CA 95814</td>
</tr>
<tr>
<td>Department of Resources Recycling and Recovery (CalRecycle)</td>
<td>1001 I Street, P.O. Box 4025, Sacramento, CA 95812</td>
</tr>
<tr>
<td>Native American Heritage Commission</td>
<td>1550 Harbor Blvd Suite 100West, Sacramento, CA 95691</td>
</tr>
<tr>
<td>Gary Cathey, Division Chief, Caltrans Division of Aeronautics</td>
<td>1415 11th Street, Sacramento, CA 95814</td>
</tr>
<tr>
<td>State Clearinghouse</td>
<td>Office of Planning and Research, 1400 10th Street, Room 222, Sacramento, CA 95814</td>
</tr>
<tr>
<td>Native American Heritage Commission</td>
<td>1550 Harbor Blvd Suite 100West, Sacramento, CA 95691</td>
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<tr>
<td>State Clearinghouse</td>
<td>Office of Planning and Research, 1400 10th Street, Room 222, Sacramento, CA 95814</td>
</tr>
<tr>
<td>Public Utilities Commission</td>
<td>505 Van Ness Avenue, San Francisco, CA 94102</td>
</tr>
</tbody>
</table>
Chapter 5  •  Distribution List

County Agencies

Mike Novo, Director of Planning, County of Monterey Resource Management Agency, Monterey County Government Center 168 W. Alisal Street, 2nd Floor Salinas, CA 93901

Monterey Bay Unified Air Pollution Control District 24580 Silver Cloud Court Monterey, CA 93940

Monterey County Office of Emergency Services 1322 Natividad Road Salinas, CA 93906

Monterey County Water Resources Agency 893 Blanco Circle Salinas, CA 93901

Monterey Peninsula Water Management District 5 Harris Court, Building G PO Box 85 Monterey, CA 93942

Transportation Agency for Monterey County 55-B Plaza Circle Salinas, CA 93901

Office of the Sheriff, County of Monterey 1414 Natividad Road Salinas, CA 93906

Robert K. Murdoch, Director of Public Works, County of Monterey Resource Management Agency, Monterey County Government Center 168 W. Alisal Street, 2nd Floor Salinas, CA 93901

Dr. Nancy Kotowski, Monterey County Superintendent of Schools, Monterey County Office of Education 901 Blanco Circle, PO Box 80851 Salinas, CA 93912-0851

Regional and Local Agencies

Association of Monterey Bay Area Governments (AMBAG) 445 Reservation Road, Suite G Marina, CA 93933

Hal De Alvarez, AT&T California 515 Chappell Road Watsonville, CA 95076

Monterey-Salinas Transit One Ryan Ranch Road Monterey, CA 93940

Central Coast Regional Water Quality Control Board 895 Aerovista Place, Suite 101 San Luis Obispo, CA 93401

Charter Communications 8120 Camino Arroyo Gilroy, CA 95020

Superintendent Dee Baker, Washington Union School District 43 San Benancio Road Salinas, CA 93908

Inga Waite, Acting assistant Library Director, Monterey Public Library 625 Pacific Street Monterey, CA 93940

Laguna Seca Water, Inc. PO Box 508 Salinas, CA 93902
Chapter 5  •  Distribution List

Elected Officials

David Potter, County Supervisor
Monterey Courthouse
1200 Aguajito Road, Ste 1
Monterey, CA 93940

The Hon. Sam Farr
US Representative, 20th District
100 West Alisal Street
Salinas, CA 93901

The Hon. Chuck Della Sala, Mayor
Monterey City Hall
580 Pacific Street
Monterey, CA 93940

The Hon. Barbara Boxer
US Senate
70 Washington Street, Suite 203
Oakland, CA 94607

The Hon. Dianne Feinstein
US Senate
One Post Street, Suite 2450
San Francisco, CA 94104

Interested Groups, Organizations, and Individuals

Mike Weaver
52 Corral de Tierra Road
Salinas, CA 93908

Lawrence Thompson
68 San Benancio Road
Salinas, CA 93908

Brian Finegan in representation of OMNI
PO Box 2058
Salinas, CA 93902

Bollenbacher & Kelton, Inc.
2716 Ocean Park Boulevard, Ste 3006
Santa Monica, CA 90405-5299

Marit Evans, Landwatch Monterey County
PO Box 1876
Salinas, CA 93902-1876
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Appendix A California Environmental Quality Act Checklist

The following checklist identifies physical, biological, social, and economic factors that might be affected by the proposed project. The California Environmental Quality Act impact levels include “potentially significant impact,” “less than significant impact with mitigation,” “less than significant impact,” and “no impact.”

Supporting documentation of all California Environmental Quality Act checklist determinations is provided in Chapter 2 of this Initial Study/Environmental Assessment. Documentation of “No Impact” determinations is provided at the beginning of Chapter 2. Discussion of all impacts, avoidance, minimization, and/or mitigation measures is under the appropriate topic headings in Chapter 2.
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### Appendix A • California Environmental Quality Act Checklist

<table>
<thead>
<tr>
<th>Impact Level</th>
<th>Potentially Significant Impact</th>
<th>Less than Significant Impact with Mitigation</th>
<th>Less than Significant Impact</th>
<th>No Impact</th>
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</thead>
</table>

I. AESTHETICS: Would the project:

a) Have a substantial adverse effect on a scenic vista [ ] [ ] [ ] [ ]

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

c) Substantially degrade the existing visual character or quality of the site and its surroundings [ ] [ ] [ ] [ ]

d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area [ ] [ ] [ ] [ ]

II. AGRICULTURE AND FOREST RESOURCES: In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the state’s inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment Project; and the forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board. Would the project:

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

b) Conflict with existing zoning for agricultural use, or a Williamson Act contract [ ] [ ] [ ] [ ]

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

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

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

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

a) Conflict with or obstruct implementation of the applicable air quality plan [ ] [ ] [ ] [ ]
b) Violate any air quality standard or contribute substantially to an existing or projected air quality violation? □□□□

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

d) Expose sensitive receptors to substantial pollutant concentrations? □□□□

e) Create objectionable odors affecting a substantial number of people? □□□□

IV. BIOLOGICAL RESOURCES: Would the project:

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

b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or US Fish and Wildlife Service? □□□□

c) Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means? □□□□

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

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

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

V. CULTURAL RESOURCES: Would the project:

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

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

c) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature? □□□□
Appendix A • California Environmental Quality Act Checklist

<table>
<thead>
<tr>
<th>Impact Level</th>
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d) Disturb any human remains, including those interred outside of formal cemeteries? □ □ ✗ □

VI. GEOLOGY AND SOILS: Would the project:

a) Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:

i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42? □ □ ✗ □

ii) Strong seismic ground shaking? □ □ ✗ □

iii) Seismic-related ground failure, including liquefaction? □ □ ✗ □

iv) Landslides? □ □ ✗ □

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

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

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

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

VII. GREENHOUSE GAS EMISSIONS: Would the project:

a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment? An assessment of the greenhouse gas emissions and climate change is included in the body of environmental document. While Caltrans has included this good faith effort in order to provide the public and decision-makers as much information as possible about the project, it is Caltrans' determination that in the absence of further regulatory or scientific information related to GHG emissions and CEQA significance, it is too speculative to make a significance determination regarding the project's direct and indirect impact with respect to climate change. Caltrans does remain firmly committed to implementing measures to help reduce the potential effects of the project. These measures are outlined in the body of the environmental document.

b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?
Appendix A  •  California Environmental Quality Act Checklist

<table>
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<tr>
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<th>No Impact</th>
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VIII. HAZARDS AND HAZARDOUS MATERIALS: Would the project:

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

☐ ☐ ☒ ☐

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

☐ ☐ ☒ ☐

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

☐ ☐ ☒ ☐

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

☐ ☐ ☒ ☐

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

☐ ☐ ☒ ☐

f) For a project within the vicinity of a private airstrip, would the project result in a safety hazard for people residing or working in the project area?

☐ ☐ ☒ ☐

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

☐ ☐ ☒ ☐

h) Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands?

☐ ☐ ☒ ☐

IX. HYDROLOGY AND WATER QUALITY: Would the project:

a) Violate any water quality standards or waste discharge requirements?

☐ ☐ ☒ ☐

b) Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?

☐ ☐ ☒ ☐

c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner which would result in substantial erosion or siltation on- or off-site?

☐ ☐ ☒ ☐
## Appendix A - California Environmental Quality Act Checklist

<table>
<thead>
<tr>
<th>Impact Category</th>
<th>Potentially Significant Impact</th>
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<th>Less than Significant Impact</th>
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<tbody>
<tr>
<td>d) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?</td>
<td>☐</td>
<td>☒</td>
<td>☒</td>
<td>☐</td>
</tr>
<tr>
<td>e) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?</td>
<td>☐</td>
<td>☒</td>
<td>☒</td>
<td>☐</td>
</tr>
<tr>
<td>f) Otherwise substantially degrade water quality?</td>
<td>☐</td>
<td>☒</td>
<td>☒</td>
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<tr>
<td>g) Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?</td>
<td>☐</td>
<td>☒</td>
<td>☒</td>
<td>☐</td>
</tr>
<tr>
<td>h) Place within a 100-year flood hazard area structures which would impede or redirect flood flows?</td>
<td>☐</td>
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<td>☒</td>
<td>☐</td>
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<tr>
<td>i) Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?</td>
<td>☐</td>
<td>☒</td>
<td>☒</td>
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<tr>
<td>j) Result in inundation by seiche, tsunami, or mudflow?</td>
<td>☐</td>
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</tr>
</tbody>
</table>

### X. LAND USE AND PLANNING: Would the project:

a) Physically divide an established community? | ☐ | ☒ | ☒ | ☐ |

b) Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect? | ☐ | ☒ | ☒ | ☐ |

c) Conflict with any applicable habitat conservation plan or natural community conservation plan? | ☐ | ☒ | ☒ | ☐ |

### XI. MINERAL RESOURCES: Would the project:

a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state? | ☐ | ☒ | ☒ | ☐ |

b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan? | ☐ | ☒ | ☒ | ☐ |

### XII. NOISE: Would the project result in:

a) Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies? | ☐ | ☒ | ☒ | ☐ |

b) Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels? | ☐ | ☒ | ☒ | ☐ |
Appendix A • California Environmental Quality Act Checklist

<table>
<thead>
<tr>
<th>Impact Description</th>
<th>Potentially Significant Impact</th>
<th>Less than Significant Impact with Mitigation</th>
<th>Less than Significant Impact</th>
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<tbody>
<tr>
<td>c) A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
</tr>
<tr>
<td>d) A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?</td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
<td>☐</td>
</tr>
<tr>
<td>e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?</td>
<td>☐</td>
<td>☐</td>
<td>☐</td>
<td>☑</td>
</tr>
<tr>
<td>f) For a project within the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels?</td>
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<td>☐</td>
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<td>☑</td>
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</table>

XIII. POPULATION AND HOUSING: Would the project:

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

b) Displace substantial numbers of existing housing, necessitating the construction of replacement housing elsewhere? | ☐                              | ☐                                         | ☑                           | ☐         |

c) Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere? | ☐                              | ☐                                         | ☑                           | ☐         |

XIV. PUBLIC SERVICES:

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

Fire protection? | ☐                              | ☐                                         | ☑                           | ☐         |
Police protection? | ☐                              | ☐                                         | ☑                           | ☐         |
Schools? | ☐                              | ☐                                         | ☑                           | ☐         |
Parks? | ☐                              | ☐                                         | ☑                           | ☐         |
Other public facilities? | ☐                              | ☐                                         | ☑                           | ☐         |

XV. RECREATION:

a) Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated? | ☐                              | ☐                                         | ☑                           | ☐         |
b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

XVI. TRANSPORTATION/TRAFFIC: Would the project:

a) Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including but not limited to intersections, streets, highways and freeways, pedestrian and bicycle paths, and mass transit? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

b) Conflict with an applicable congestion management program, including, but not limited to level of service standards and travel demand measures, or other standards established by the county congestion management agency for designated roads or highways? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

c) Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risks? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

d) Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

e) Result in inadequate emergency access? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

f) Conflict with adopted policies, plans or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

XVII. UTILITIES AND SERVICE SYSTEMS: Would the project:

a) Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

b) Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

c) Require or result in the construction of new storm water drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

d) Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact

e) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project’s projected demand in addition to the provider’s existing commitments? [ ] Potentially significant impact [ ] Less than significant impact with mitigation [ ] Less than significant impact [ ] No impact
### Appendix A  •  California Environmental Quality Act Checklist

<table>
<thead>
<tr>
<th>Potentially significant impact</th>
<th>Less than significant impact with mitigation</th>
<th>Less than significant impact</th>
<th>No impact</th>
</tr>
</thead>
<tbody>
<tr>
<td>f) Be served by a landfill with sufficient permitted capacity to accommodate the project’s solid waste disposal needs?</td>
<td>☒</td>
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<tr>
<td>g) Comply with federal, state, and local statutes and regulations related to solid waste?</td>
<td>☒</td>
<td>☒</td>
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</tbody>
</table>

### XVIII. MANDATORY FINDINGS OF SIGNIFICANCE

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

b) Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)? | ☒ | ☒ | ☐ | ☒ |

c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly? | ☒ | ☒ | ☐ | ☒ |
Appendix B Title VI Policy Statement

March 2013

NON-DISCRIMINATION POLICY STATEMENT

The California Department of Transportation, under Title VI of the Civil Rights Act of 1964 and related statutes, ensures that no person in the State of California shall, on the grounds of race, color, national origin, sex, disability, religion, sexual orientation, or age, be excluded from participation in, be denied the benefits of, or be otherwise subjected to discrimination under any program or activity it administers.

For information or guidance on how to file a complaint based on the grounds of race, color, national origin, sex, disability, religion, sexual orientation, or age, please visit the following web page: http://www.dot.ca.gov/hq/bep/title_vi/6_violated.htm.

Additionally, if you need this information in an alternate format, such as in Braille or in a language other than English, please contact the California Department of Transportation, Office of Business and Economic Opportunity, 1823 14th Street, MS-79, Sacramento, CA 95811. Telephone: (916) 324-0449, TTY: 711, or via Fax: (916) 324-1949.

MALCOLM DOUGHERTY
Director

"Caltrans improves mobility across California"
## Appendix C  Minimization and/or Mitigation Summary

<table>
<thead>
<tr>
<th>Section Number Reference and Resource</th>
<th>Minimization and Mitigation Commitments</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>2.1.1 Utilities/Emergency Services</strong></td>
<td>At least one traffic lane shall be open at all times, and emergency access shall be maintained during construction through the provision of traffic detours.</td>
</tr>
<tr>
<td><strong>2.1.2 Traffic and Transportation</strong></td>
<td>To minimize street and lane closures during construction, particularly during peak traffic hours, the Contractor shall prepare a Traffic Management Plan using approved Caltrans traffic control guidelines. The Traffic Management Plan shall include a condition that “at least one traffic lane shall be open at all times, and emergency access for police and fire protection shall be maintained during construction through the provision of traffic detours.” Temporary lane closures would comply with Caltrans standards for construction traffic control and District 5 lane closure charts for this section of State Route 68.</td>
</tr>
</tbody>
</table>
| **2.1.3 Visual/Aesthetics** | Implementation of the following project elements would minimize the nominal visual changes associated with the proposed project:  
  - Guardrail post darkening  
  - Native vegetation will be planted within the project limits to improve the appearance of the project area  
No mitigation measures for visual impacts are required for the proposed project. |
| **2.2.2 Water Quality and Storm Water Runoff** | The County of Monterey and Caltrans shall ensure that the Contractor develops and implements a Water Pollution Control Program during project construction to prevent water pollution during construction. The Water Pollution Control Program shall be consistent with the *Caltrans Storm Water Pollution Prevention Plan and Water Pollution Control Program Preparation Manual*. Construction Site Best Management Practices detailed in the Water Pollution Control Program shall be implemented during construction.  
  - Monterey County shall incorporate Design Pollution Prevention Best Management Practices into the project to ensure that the project does not cause off-site erosion and to ensure that the project area is permanently stabilized.  
  - Monterey County and Caltrans shall ensure that the Project Contractor develops and implements an erosion control plan indicating proposed methods for the control of runoff, erosion, and sediment movement, in conjunction with developing and implementing a Water Pollution Control Program. |
<table>
<thead>
<tr>
<th>Section Number Reference and Resource</th>
<th>Minimization and Mitigation Commitments</th>
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</thead>
<tbody>
<tr>
<td>Prior to construction, Monterey County shall obtain a Low Rainfall Erosivity Waiver from the State Water Resources Control Board by demonstrating that the construction activity would occur only when the Rainfall Erosivity Factor is less than 5 (&quot;R&quot; in the Revised Universal Soil Loss Equation), in compliance with the provisions of the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities (Construction General Permit) (Order No. 2009-0009-DWQ, NPDES No. CAS000002), as amended by Order No. 2010-0014-DWQ. Monterey County and Caltrans shall ensure that the project discharges to unlined vegetated ditches to allow for infiltration and filtration of storm water, minimizes new impervious surfaces to the maximum extent feasible, and incorporates permanent erosion control including compost and appropriate vegetation to reduce runoff and maximize infiltration. Permanent water quality treatment facilities shall be designed and constructed in accordance with the “Post-Construction Stormwater Management Requirements for Development Projects in the Central Coast Region” dated July 12, 2013, as adopted by the Central Coast Regional Water Quality Control Board, Resolution No. R3 2013 0032.</td>
<td></td>
</tr>
<tr>
<td>2.2.3 Geology/Soils/Seismic and Topography</td>
<td>Design Pollution Prevention Best Management Practices shall be incorporated into the proposed project and an erosion control plan shall be developed and implemented to prevent erosion on the newly constructed embankment (refer to Avoidance, Minimization, and/or Mitigation Measures prescribed for avoiding and minimizing impacts to water quality and storm water runoff).</td>
</tr>
<tr>
<td>2.2.4 Paleontology</td>
<td>Project activities requiring excavation greater than five feet deep shall be monitored by a qualified paleontologist to identify, evaluate, and provide recommendations for the treatment of any sensitive fossil resources that may be uncovered by the project. If any sensitive paleontological resources (vertebrate or plant fossils) are discovered during construction, it is required that construction be halted in the immediate vicinity of the discovery (33-foot radius), until the District Paleontology Remediation of any sensitive resources encountered before or during construction can include removal, preparation and curation of any significant remains.</td>
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### Section Number Reference and Resource

<table>
<thead>
<tr>
<th>Minimization and Mitigation Commitments</th>
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<tbody>
<tr>
<td><strong>2.2.5 Hazardous Waste or Materials</strong></td>
</tr>
<tr>
<td>• The project shall prepare and implement a Lead Compliance Plan consistent with California Code of Regulations Title 8, Section 1531.1, and Caltrans requirements.</td>
</tr>
<tr>
<td>• Any yellow traffic striping and pavement-marking material that must be removed shall be removed, stored, tested, and disposed of in accordance with the applicable Standard Special Provisions issued by Caltrans for such work.</td>
</tr>
<tr>
<td>• Soil beneath or around any pole-mounted or pad-mounted transformers within the project area shall be tested for polychlorinated biphenyls if the transformers appear to be leaking, unless the transformer is certified polychlorinated biphenyl-free. Testing shall occur immediately following observation of a leaking transformer.</td>
</tr>
<tr>
<td>• In the event that unexploded ordnance is discovered in the project area, work shall stop immediately and Presidio of Monterey Military Police shall be notified by calling (831) 242-7851 or (831) 242-7852.</td>
</tr>
<tr>
<td>• In the event that hydrocarbon odors or apparent soil discoloration are encountered by project construction workers during excavation, work will be stopped until the work area is assessed, by a Certified Industrial Hygienist, to determine if it is a safe working environment in accordance with Occupational Safety and Health Act (OSHA) standards. If the hazardous materials specialist determines that the work area is not safe, then the work must be completed by hazardous material contractors (hazardous certified). In addition, the Monterey County Environmental Health Department must be notified if potentially hazardous materials and/or contaminated soils are encountered. The Monterey County Environmental Health Department shall oversee removal and disposal of any contaminated soil.</td>
</tr>
<tr>
<td>• As in the case for any project that proposes excavation, the potential exists for unknown hazardous contamination to be revealed during project construction. For any previously unknown hazardous waste/material encountered during construction, the procedures outlined in Table 7-1.1, Unknown Hazards Procedures, in the Caltrans Construction Manual shall be followed.</td>
</tr>
</tbody>
</table>
### Section Number Reference and Resource

<table>
<thead>
<tr>
<th>Natural Communities</th>
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<tr>
<td>2.3.1</td>
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</table>

#### Minimization and Mitigation Commitments

- **Riparian Habitat/Coast Live Oak Woodland:**
  - Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the perimeter of the coast live oak community in the biological study area. Environmentally Sensitive Area fencing shall consist of orange construction fencing (or equivalent) and shall be maintained in good condition until construction is complete.
  - Consultation shall occur with the California Department of Fish and Wildlife and a qualified arborist prior to any tree pruning activities within riparian areas. Tree limbs that must be removed shall be cut with a sharp saw (i.e., versus removal with heavy equipment). In this area, the Environmentally Sensitive Area fencing shall be installed along the limits of work. No trees shall be removed.
  - Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the limits of work adjacent to the arroyo willow community near the end of the biological study area. Environmentally Sensitive Area fencing shall consist of orange construction fencing (or equivalent) and shall be maintained in good condition until construction is complete.
  - Environmentally Sensitive Area fencing shall be removed following the completion of work.
  - Following completion of work, any areas of the biologically sensitive area denuded of vegetation during project construction shall be hydroseeded with native grasses and forbs as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.

<table>
<thead>
<tr>
<th>Wetlands and Other Waters</th>
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<td>2.3.2</td>
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</table>

- Prior to the start of construction, Environmentally Sensitive Area fencing shall be installed along the reaches of the ephemeral drainage, or the adjacent riparian vegetation where present, within the biological study area to prevent unnecessary encroachment into these areas.
- Contract specifications will require the contractor to refer to the Caltrans "Water Pollution Control Program (WPCP) Preparation Manual" and "Construction Site Best Management Practices Manual" to prepare a WPCP.
- All areas of the biological study area denuded of vegetation during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.
<table>
<thead>
<tr>
<th>Section Number Reference and Resource</th>
<th>Minimization and Mitigation Commitments</th>
</tr>
</thead>
<tbody>
<tr>
<td>2.3.4 Animal Species</td>
<td>Cooper’s Hawk:</td>
</tr>
<tr>
<td></td>
<td>• If work must begin during the nesting season (February 16 to August 31), no more than 14 working days prior to the start of construction, a qualified biologist shall survey all suitable nest trees in the biologically sensitive area for presence of nesting Cooper’s hawks. If no nesting activity is observed, work shall proceed as planned. If an active nest is discovered, Environmentally Sensitive Area fencing shall be installed around the dripline of the tree and maintained in good condition until the end of the nesting season or until the young have fledged, as determined by a qualified biologist.</td>
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<td></td>
<td>• All construction shall be conducted during daylight hours.</td>
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<td>Western Spadefoot Toad:</td>
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<td>• Exclusion fencing shall be installed along the boundary of the work area that would affect western spadefoot toad habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.</td>
</tr>
<tr>
<td></td>
<td>• The silt fence shall be removed following the completion of work.</td>
</tr>
<tr>
<td></td>
<td>• All construction and staging shall be located within the existing State and County rights-of-way.</td>
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<tr>
<td></td>
<td>Following the completion of work, areas of potential western spadefoot toad upland habitat in the biological study area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.</td>
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<tr>
<td></td>
<td>Migratory Nesting Birds:</td>
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<td></td>
<td>• If work must begin during the nesting season (February 16 to August 31), no more than 10 working days prior to the start of construction, a qualified biologist shall survey all suitable nest trees in the biologically sensitive area for presence of migratory nesting birds. If no nesting activity is observed, work shall proceed as planned. If an active nest is discovered, Environmentally Sensitive Area fencing shall be installed around the dripline of the tree and maintained in good condition until the end of the nesting season or until the young have fledged, as determined by a qualified biologist.</td>
</tr>
<tr>
<td>Section Number Reference and Resource</td>
<td>Minimization and Mitigation Commitments</td>
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<tr>
<td>2.3.5 Threatened and Endangered Species</td>
<td>California Tiger Salamander:</td>
</tr>
<tr>
<td></td>
<td>• California tiger salamander could potentially occur in the Biological Study Area and be affected by the proposed project. As a result, a section 2081 Incidental Take Permit will be required from the California Department of Fish and Wildlife to authorize incidental take of California tiger salamander resulting from project construction.</td>
</tr>
<tr>
<td></td>
<td>• While California tiger salamander could potentially occur in the Biological Study Area, per discussions with the U.S. Fish and Wildlife Service, it is not expected that consultation with the U.S. Fish and Wildlife Service will be required with implementation of approved avoidance and minimization measures as described below.</td>
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<tr>
<td></td>
<td>• A retaining wall shall be constructed along the north side of State Route 68, west of Corral de Tierra Road.</td>
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<tr>
<td></td>
<td>• Environmentally Sensitive Area fencing shall be installed along the limits of work associated with construction of the new fill slope and retaining wall to prevent encroachment into adjacent California tiger salamander upland habitat.</td>
</tr>
<tr>
<td></td>
<td>• All construction and staging shall be located within the existing State and County rights-of-way.</td>
</tr>
<tr>
<td></td>
<td>• Following completion of work, areas of potential California tiger salamander upland habitat in the biologically sensitive area denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines in Appendix H of the Natural Environment Study.</td>
</tr>
<tr>
<td></td>
<td>• Exclusion fencing shall be installed along the boundary of the work area that would affect California tiger salamander habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.</td>
</tr>
<tr>
<td></td>
<td>• All burrows in the area to be disturbed shall be surveyed during the dry season for presence of estivating California tiger salamander. Surveys shall be conducted at each burrow via either hand excavation or surveying with a fiber optic camera. Written documentation of the survey results shall be provided to the United States Fish and Wildlife Service within two weeks of completion of the surveys.</td>
</tr>
</tbody>
</table>

If California tiger salamanders are not found, construction may proceed at any time provided the exclusion fencing is maintained in good condition. If California tiger salamanders are identified, the surveys shall be immediately halted and United States Fish and Wildlife Service shall be contacted within 48 hours. Work shall not commence until take authorization is provided by United States Fish and Wildlife Service.
<table>
<thead>
<tr>
<th>Section Number Reference and Resource</th>
<th>Minimization and Mitigation Commitments</th>
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</thead>
<tbody>
<tr>
<td>Service. Take authorization shall most likely be accomplished through preparation of a Habitat Conservation Plan and issuance of an Incidental Take Permit.</td>
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<tr>
<td>- The silt fence shall be removed following the completion of work.</td>
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<tr>
<td><strong>Compensatory Mitigation:</strong></td>
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<tr>
<td>- The loss of low quality California tiger salamander habitat would be mitigated at a 1:1 ratio as prescribed by California Department of Fish and Wildlife. To compensate for the loss of 0.16 acre of California tiger salamander upland habitat, a total of 0.16 acre of mitigation area that provides California tiger salamander upland habitat shall be purchased and preserved in perpetuity through use of a conservation easement or equivalent means.</td>
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<tr>
<td><strong>California Red-legged Frog:</strong></td>
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<tr>
<td>- Environmentally Sensitive Areas shall be marked using orange construction fencing or equivalent and shall be maintained in good condition until construction is complete.</td>
<td></td>
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<tr>
<td>- Following completion of work, all areas denuded during project construction shall be revegetated with locally occurring native species as described in the Revegetation Guidelines provided in Appendix H of the Natural Environment Study.</td>
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</tr>
<tr>
<td><strong>2.3.6 Invasive Species</strong></td>
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<tr>
<td>The landscaping and erosion control included in the project shall not use species listed as noxious weeds.</td>
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<tr>
<td>During construction all earthmoving equipment to be used shall be thoroughly cleaned before arriving on the project site, all seeding equipment (i.e., hydroseed trucks) shall be thoroughly rinsed at least three times prior to beginning seeding work, and all equipment shall be thoroughly cleaned before leaving the project area.</td>
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<tr>
<td>Eradication strategies would be implemented should invasive species occur on the site during construction of the proposed project.</td>
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<tr>
<td><strong>2.4.1 Air Quality</strong></td>
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<tr>
<td>The project shall implement Monterey Bay Unified Air Pollution Control District California Environmental Quality Act Air Quality Guidelines dust minimization measures.</td>
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<tr>
<td>The project shall implement Caltrans Standard Specifications recommended for reduction of air pollutants generated by vehicle and equipment exhaust during construction.</td>
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<tr>
<td>Section Number Reference and Resource</td>
<td>Minimization and Mitigation Commitments</td>
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| 2.4.2 Noise and Vibration             | The following measures would reduce construction-related noise impacts for existing residences adjacent to the project area:  
All construction equipment shall conform to the provisions of Caltrans Standard Specifications, Section 14-8.02, “Noise Control”. This section requires the contractor to comply with all local ordinances (i.e., County of Monterey) that apply to any work as part of the contract. Therefore, the maximum 85 A-weighted decibel (dBA) at a distance of 50 feet between the hours of 9:00 p.m. and 6:00 a.m. on weekdays shall be used.  
Portable construction equipment shall be located as far as possible from the noise sensitive locations as is feasible.  
Construction vehicle staging areas and equipment maintenance areas shall be located as far as possible from sensitive receptors.  
All construction equipment shall have sound control devices no less effective than those provided on the original equipment. No construction equipment shall have an unmuffled exhaust.  
As directed by Caltrans, the contractor shall implement appropriate additional noise abatement measures including, but not limited to, shutting off idling equipment, rescheduling construction activities, notifying adjacent residents in advance of construction work, and utilizing construction equipment with tires, not tracks. |
| 2.6 Climate Change                    | Caltrans Standard Specification Provisions shall limit vehicle idling time for lane closure during construction to ten minutes in each direction.  
Compliance with Title 13, California Code of Regulations §2449(d)(3) shall restrict idling of construction vehicles to no longer than five consecutive minutes. |
Appendix D  Species List
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Document Number: 121106030254

Laurel Frakes
LSA Associates, Inc.
1998 Santa Barbara Street, Ste 120
San Luis Obispo, CA 93401

Subject: Species List for SR-68/Corral de Tierra Intersection Improvement Project

Dear: Ms. Frakes

We are sending this official species list in response to your November 6, 2012 request for information about endangered and threatened species. The list covers the California counties and/or U.S. Geological Survey 7½ minute quad or quads you requested.

Our database was developed primarily to assist Federal agencies that are consulting with us. Therefore, our lists include all of the sensitive species that have been found in a certain area and also ones that may be affected by projects in the area. For example, a fish may be on the list for a quad if it lives somewhere downstream from that quad. Birds are included even if they only migrate through an area. In other words, we include all of the species we want people to consider when they do something that affects the environment.

Please read Important Information About Your Species List (below). It explains how we made the list and describes your responsibilities under the Endangered Species Act.

Our database is constantly updated as species are proposed, listed and delisted. If you address proposed and candidate species in your planning, this should not be a problem. However, we recommend that you get an updated list every 90 days. That would be February 04, 2013.

Please contact us if your project may affect endangered or threatened species or if you have any questions about the attached list or your responsibilities under the Endangered Species Act. A list of Endangered Species Program contacts can be found here.

Endangered Species Division


November 6, 2012

Appendix D • Species List

Sacramento Fish & Wildlife Office Species List
Appendix D  •  Species List

Sacramento Fish & Wildlife Office Species List

U.S. Fish & Wildlife Service
Sacramento Fish & Wildlife Office
Federal Endangered and Threatened Species that Occur in or may be Affected by Projects in the Counties and/or U.S.G.S. 7 1/2 Minute Quads you requested
Document Number: 121106030647
Database Last Updated: September 18, 2011

No quad species lists requested.

County Lists

Monterey County
Listed Species
Invertebrates

Branchinecta conservatio
Conservancy fairy shrimp (E)

Branchinecta lynchii
Critical habitat, vernal pool fairy shrimp (X)
vernal pool fairy shrimp (T)

Desmocerus californicus dimorphus
valley elderberry longhorn beetle (T)

Euphydryas editha bayensis
bay checkerspot butterfly (T)

Fish

Eucyclogobius newberryi
critical habitat, tidewater goby (X)

Hypomesus transpacificus
delta smelt (T)

Oncorhynchus kisutch
coho salmon - central CA coast (E) (NMFS)

Oncorhynchus mykiss
Central Valley steelhead (T) (NMFS)
Critical habitat, Central California coastal steelhead (X) (NMFS)
South Central California steelhead (T) (NMFS)

Amphibians

Appendix D • Species List

Sacramento Fish & Wildlife Office Species List

Ambystoma californiense
California tiger salamander, central population (T)
Critical habitat, CA tiger salamander, central population (X)

Rana draytonii
California red-legged frog (T)
Critical habitat, California red-legged frog (X)

Reptiles
Gambelia (=Crotaphytus) silla
blunt-nosed leopard lizard (E)

Birds
Brachyramphus marmoratus
marbled murrelet (T)

Charadrius alexandrinus nivosus
Critical habitat, western snowy plover (X)

Gymnogyps californianus
California condor (E)

Rallus longirostris obsoletus
California clapper rail (E)

Sternula antillarum (=Sterna, =albifrons) browni
California least tern (E)

Vireo bellii pusillus
Least Bell’s vireo (E)

Mammals
Dipodomys ingens
giant kangaroo rat (E)

Vulpes macrotis mutica
San Joaquin kit fox (E)

Plants
Camissonia benitensis
San Benito evening-primrose (T)

Caulanthus californicus
California jewelflower (E)

Appendix D  •  Species List

Sacramento Fish & Wildlife Office Species List

Chorizanthe robusta var. robusta
robust spineflower (E)

Erysimum menziesii (includes ssp. yadonii)
Menzies's wallflower (E)

Holocarpha macradenia
Critical habitat, Santa Cruz tarplant (X)
Santa Cruz tarplant (T)

Lasthenia conjugens
Contra Costa goldfields (E)

Layia carnosa
beach layia (E)

Lupinus tidestromii
clover lupine [Tidestrom's lupine] (E)

Monolopia congodonii (=Lembertia congodonii)
San Joaquin woolly-threads (E)

Potentilla hickmani
Hickman's potentilla (=cinquefoil) (E)

Key:

(E) Endangered - Listed as being in danger of extinction.

(T) Threatened - Listed as likely to become endangered within the foreseeable future.

(P) Proposed - Officially proposed in the Federal Register for listing as endangered or threatened.

(NMFS) Species under the Jurisdiction of the National Oceanic & Atmospheric Administration Fisheries Service. Consult with them directly about these species.

Critical Habitat - Area essential to the conservation of a species.

(FX) Proposed Critical Habitat - The species is already listed. Critical habitat is being proposed for it.

(C) Candidate - Candidate to become a proposed species.

(V) Vacated by a court order. Not currently in effect. Being reviewed by the Service.

(X) Critical Habitat designated for this species.

Important Information About Your Species List

How We Make Species Lists
We store information about endangered and threatened species lists by U.S. Geological Survey 7½ minute quads. The United States is divided into these quads, which are about the size of San Francisco.

The animals on your species list are ones that occur within, or may be affected by projects within, the quads covered by the list.

Appendix D • Species List

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- Fish and other aquatic species appear on your list if they are in the same watershed as your quad or if water use in your quad might affect them.
- Amphibians will be on the list for a quad or county if pesticides applied in that area may be carried to their habitat by air currents.
- Birds are shown regardless of whether they are resident or migratory. Relevant birds on the county list should be considered regardless of whether they appear on a quad list.

Plants
Any plants on your list are ones that have actually been observed in the area covered by the list. Plants may exist in an area without ever having been detected there. You can find out what’s in the surrounding quads through the California Native Plant Society’s online Inventory of Rare and Endangered Plants.

Surveying
Some of the species on your list may not be affected by your project. A trained biologist and/or botanist, familiar with the habitat requirements of the species on your list, should determine whether they or habitats suitable for them may be affected by your project. We recommend that your surveys include any proposed and candidate species on your list. See our Protocol and Recovery Permits pages.

For plant surveys, we recommend using the Guidelines for Conducting and Reporting Botanical Inventories. The results of your surveys should be published in any environmental documents prepared for your project.

Your Responsibilities Under the Endangered Species Act
All animals identified as listed above are fully protected under the Endangered Species Act of 1973, as amended. Section 9 of the Act and its implementing regulations prohibit the take of a federally listed wildlife species. Take is defined by the Act as "to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect" any such animal.

Take may include significant habitat modification or degradation where it actually kills or injures wildlife by significantly impairing essential behavioral patterns, including breeding, feeding, or shelter (50 CFR §17.3).

Take incidental to an otherwise lawful activity may be authorized by one of two procedures:
- If a Federal agency is involved with the permitting, funding, or carrying out of a project that may result in take, then that agency must engage in a formal consultation with the Service.

During formal consultation, the Federal agency, the applicant and the Service work together to avoid or minimize the impact on listed species and their habitat. Such consultation would result in a biological opinion by the Service addressing the anticipated effect of the project on listed and proposed species. The opinion may authorize a limited level of incidental take.
- If no Federal agency is involved with the project, and federally listed species may be taken as part of the project, then you, the applicant, should apply for an incidental take permit. The Service may issue such a permit if you submit a satisfactory conservation plan for the species that would be affected by your project.

Should your survey determine that federally listed or proposed species occur in the area and are likely to be affected by the project, we recommend that you work with this office and the California Department of Fish and Game to develop a plan that minimizes the project’s direct and indirect impacts to listed species and compensates for project-related loss of habitat. You should include the plan in any environmental documents you file.

Appendix D • Species List

Sacramento Fish & Wildlife Office Species List

Critical Habitat
When a species is listed as endangered or threatened, areas of habitat considered essential to its conservation may be designated as critical habitat. These areas may require special management considerations or protection. They provide needed space for growth and normal behavior; food, water, air, light, other nutritional or physiological requirements; cover or shelter; and sites for breeding, reproduction, rearing of offspring, germination or seed dispersal.

Although critical habitat may be designated on private or State lands, activities on these lands are not restricted unless there is Federal involvement in the activities or direct harm to listed wildlife.

If any species has proposed or designated critical habitat within a quad, there will be a separate line for this on the species list. Boundary descriptions of the critical habitat may be found in the Federal Register. The information is also reprinted in the Code of Federal Regulations (50 CFR 17.95). See our Map Room page.

Candidate Species
We recommend that you address impacts to candidate species. We put plants and animals on our candidate list when we have enough scientific information to eventually propose them for listing as threatened or endangered. By considering these species early in your planning process you may be able to avoid the problems that could develop if one of these candidates was listed before the end of your project.

Species of Concern
The Sacramento Fish & Wildlife Office no longer maintains a list of species of concern. However, various other agencies and organizations maintain lists of at-risk species. These lists provide essential information for land management planning and conservation efforts.
More info

Wetlands
If your project will impact wetlands, riparian habitat, or other jurisdictional waters as defined by section 404 of the Clean Water Act and/or section 10 of the Rivers and Harbors Act, you will need to obtain a permit from the U.S. Army Corps of Engineers. Impacts to wetland habitats require site specific mitigation and monitoring. For questions regarding wetlands, please contact Mark Littlefield of this office at (916) 414-6520.

Updates
Our database is constantly updated as species are proposed, listed and delisted. If you address proposed and candidate species in your planning, this should not be a problem. However, we recommend that you get an updated list every 90 days. That would be February 04, 2013.
Appendix E United States Fish and Wildlife Service Coordination
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# MEETING MINUTES

**PROJECT:** SR-68/Corral de Tierra Road Intersection Operational Improvements  

**CLIENT:** Monterey County  

**LSA PROJECT NO.:** WRS0605  

**RE:** Coordination with U.S. Fish and Wildlife Service Re: CTS and the Need to Prepare an HCP  

**DATE / LOCATION:** Friday, November 7, 2008, 1:00 pm  
Project Site  

**ATTENDEES:** Jonathan Pascua, Monterey County DPW, Engineer  
Doug Cooper, USFWS Ventura, Biologist  
Keith Hallsten, Wood Rogers, Project Engineer  
Jeff Bray, LSA Associates, Biologist

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<th>TOPICS DISCUSSED</th>
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<td>Keith started the meeting by providing a brief history of the project and then describing the proposed project improvements at the intersection. Keith noted that the SR-68 roadway would be widened to the north through the SR-68/Corral de Tierra Road intersection and this is where the project would encroach into areas of possible CTS habitat.</td>
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<td>Jeff stated that there is a known CTS breeding pond approximately 0.9 mile north of the project site, so the project is within accepted CTS dispersal range. Doug confirmed this. Jeff stated that the primary purpose of the meeting was to determine if preparation of an HCP was the only approach to authorizing potential project-related effects (i.e., “take”) to CTS. Jeff explained that the County has exhausted all means to establish a Section 7 nexus (e.g., via federal funding or a Section 404 permit). Doug stated that in the absence of a federal nexus, if the project will impact suitable CTS habitat, then preparation of the HCP was the only approach to obtain “take” authorization.</td>
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<td>Jeff suggested we review the habitat on the ground before proceeding. Once on the north side of SR-68, Keith and Jeff explained that the widening would be limited to the existing fill slope and the narrow area of land between the toe of slope and the Caltrans right-of-way fence. Jeff stated that while the area to be disturbed appeared to be marginal CTS upland habitat, it did</td>
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contain rodent burrows (i.e., CTS refugia) and was within 0.9 mile of a known breeding pond. Doug agreed that the habitat was marginal upland habitat for CTS. However, he noted that it is unlikely CTS would utilize the fill slope and/or area at the toe given its disturbed nature and overall low quality. Furthermore, given that the project is at the outer limit of CTS dispersal distance from the known breeding pond, the presence of much better upland habitat to the north (i.e., between the project and the known breeding pond), and the fact that SR-68 is considered a dispersal barrier for CTS, it is even less likely CTS would utilize the fill slope and area at its toe.

Doug stated that given the low quality of the habitat to be disturbed, if the County would be willing to implement certain avoidance and minimization measures, the USFWS would be able to issue a technical assistance letter stating that the project would not result in take of CTS. The primary avoidance and minimization measures would include surveying the burrows in the area to be disturbed during the dry season when any CTS occurring there would be underground, and installing exclusion fencing along the boundary of the work area that would affect CTS habitat. Surveys could be accomplished via hand excavation of each burrow or surveying the burrows using a fiber optic camera. Doug stated that if CTS were found during the burrow surveys, then the County would need to initiate discussions with the USFWS to prepare an HCP. Doug thought the likelihood of CTS using the area to be disturbed was very low.

LSA, on behalf of Monterey County, will prepare a letter to the USFWS requesting technical assistance for project effects to CTS. The letter will describe the project and propose the avoidance and minimization measures Doug recommended.

The USFWS will respond to the letter stating that the project will not result in take of CTS provided the avoidance and minimization measures are implemented and the results of the burrow surveys are negative.

Note: These minutes are the preparer’s understanding of the items discussed at the meeting. If discrepancies or omissions are noted, please contact the preparer within three days of receipt.

PREPARED BY: Jeff Bray
REVIEWED BY: Keith Hallsten
Appendix E • United States Fish and Wildlife Service Coordination

January 20, 2009

Mr. Doug Cooper, Biologist
U.S. Fish & Wildlife Service
Ventura Fish & Wildlife Office
2493 Portola Road, Suite B
Ventura, CA 93003

Subject: SR-68/Corral de Tierra Road Intersection Operational Improvements - Request For Technical Assistance Regarding Effects to California Tiger Salamander Habitat

Dear Mr. Cooper:

LSA Associates, Inc, on behalf of the County of Monterey (County), is requesting technical assistance regarding possible effects to California tiger salamander (CTS) from the subject project. The project is located in an unincorporated area of Monterey County, approximately 13 miles east of the City of Monterey and 9 miles west of the City of Salinas, on SR-68. The project is locally funded and will not affect waters of the U.S.; therefore, the project does not have a federal nexus.

The proposed project will widen the SR-68/Corral de Tierra Road intersection to accommodate the construction of a second left turn lane from westbound SR-68 to southbound Corral de Tierra Road. In addition, a second southbound receiving lane will be constructed on Corral de Tierra Road. The proposed widening will occur to the north of SR-68 and construction will be completed in one season. All construction and related activities will occur within the existing Caltrans right-of-way fence to the north. The project will relieve traffic congestion during hours of peak use and reduce accidents related to left turns from SR-68 onto Corral de Tierra Road.

There is a known CTS breeding pond approximately 0.9 mile north of the project site, so the project is within the documented dispersal range of CTS. The potential CTS habitat that will be affected by the project is located north of SR-68 and west of Corral de Tierra Road. It is comprised of the existing fill slope that was created when the highway was originally constructed, and a narrow strip of level ground between the toe of the fill and the Caltrans right-of-way fence. The habitat quality is marginal but does contain rodent burrows that could provide refuge for CTS.

As we discussed during our field meeting on November 7, 2008, CTS are unlikely to use the area to be impacted by the project. The potential habitat is disturbed and of marginal quality, is at the outer limit of CTS dispersal distance from the nearest known breeding pond, and is next to the impassable barrier of SR-68. Furthermore, there is much better upland habitat to the north between the breeding pond and the project site. CTS would have to pass through this suitable habitat to reach the low-quality habitat in the project area.

To ensure the project will not result in “take” of CTS, the County will implement the following avoidance and minimization measures: 1) All burrows in the area to be disturbed will be surveyed once
during the dry season for presence of estivating CTS. Surveys will be conducted at each burrow via either hand excavation or surveying with a fiber optic camera. 2) Exclusion fencing will be installed along the boundary of the work area that would affect CTS habitat. Exclusion fencing shall consist of silt fence or equivalent material, and shall be installed such that no openings are present. Additionally, the bottom three inches of fence shall be buried. The exclusion fencing shall be maintained in good condition until project construction is complete.

After the surveys are completed, the County will provide written documentation of the results to USFWS. Assuming the results of the surveys are negative, and with the implementation of the avoidance and minimization measures described above, the County requests that the USFWS provide a letter confirming that the project will not result in “take” of CTS.

If the results of surveys are positive and/or CTS are otherwise found in the project area, the County understands that preparation of a Habitat Conservation Plan would be the only means to obtain “take” authorization, and would therefore be necessary for continuation of the project as proposed.

Thank you for your assistance in this matter. Please call (916-630-4600) or email (jeff.bray@lsa-assoc.com) if you have any questions or comments or need any additional information.

Sincerely,

Jeff Bray
Biologist

CC: Jonathan Pascua, County of Monterey
Keith Hallsten, Wood Rodgers
Appendix E • United States Fish and Wildlife Service Coordination

Laurel Frakes

From: Douglass.Cooper@fws.gov
Sent: Tuesday, April 28, 2009 11:34 AM
To: Jeff Bray
Subject: Re: SR-68/Corral de Tierra Road Intersection Improvements - Request for Technical Assistance

Jeff,

I am writing to follow up on our phone conversation on April 14, 2009. The County of Monterey proposes to widen SR-68 at the intersection with Corral de Tierra Road. The proposed project site is within dispersal distance of a known California tiger salamander (CTS) breeding pond. The roadside habitat at the project site is characterized by ruderal non-native grassland; although the area is disturbed, it does represent marginal CTS upland habitat. To ensure that the project avoids take of CTS, the County proposes to survey for CTS within the proposed project area during the dry season and erect exclusion fencing around the perimeter of the site. The County will submit the results of the CTS surveys to the Service with a request for a no-take concurrence.

The Service agrees that this is an appropriate approach. Our determination of the project's potential to result in take of CTS will be contingent upon the results of the surveys. The Service is not authorizing the County or its agents to take CTS. A Section 10(a)(1)(B) incidental take permit, in association with the development of a Habitat Conservation Plan, is necessary to conduct activities that will result in take of CTS.

If you have any questions, please feel free to contact me.

Regards,
Doug

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Douglass Cooper, Biologist
US Fish & Wildlife Service
Ventura Fish & Wildlife Office
2493 Portola Rd. Suite B
Ventura, CA 93003
805.644.1766 x272
douglass.cooper@fws.gov
****************************************************************************************

"Jeff Bray" <Jeff.Bray@sea-assec.com>
To "Doug Cooper" <Douglass.Cooper@fws.gov>
cc
Subject: SR-68/Corral de Tierra Road Intersection Improvements - Request for Technical Assistance

Hey Doug - I'm following up on my voicemail from earlier this week re: the technical assistance letter I sent you for this project back in January (I've attached a copy for reference). Would you let me know when you will be able to respond to the letter? We are trying to wrap the project up and a USFWS response to the letter will soon become one of the few outstanding items. Thanks.

1
- Jeff

Jeff Bray
Principal/Biologist
LSA Associates, Inc.
4200 Rocklin Road, Ste. 11B
Rocklin, CA 95677
916-960-4600 phone
916-960-4601 fax
jeff.bray@lsa-assoc.com [attachment "USFWS request - tech assist.pdf" deleted by Douglass Cooper/VFWO/R1/FWS/DOI]
List of Technical Studies that are Bound Separately

A copy of the following Technical Studies are available upon request by contacting the County of Monterey Resource Management Agency – Planning Department at (831) 755-5025.


Air Quality Analysis Report (February 2013)

Geotechnical Design and Materials Report (December 2012)

Growth-Related Impacts Technical Memorandum (July 2012)

Hazardous Waste Initial Site Assessment (February 2013)

Historical Resources Compliance Report (June 2013)

- Historic Resources Compliance Report
- Archaeological Survey Report

Natural Environment Study (February 2013)

Noise Study Analysis Report (February 2013)

Paleontology Identification Report (July 2013)

Traffic Operations Technical Memorandum (February 2005) (updated in March 2011 and October 2014)

Visual Impact Assessment Report (February 2013)

Water Quality Assessment Report (February 2013)
List of Technical Studies that are Bound Separately

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