

U.S. 101 Improvement Project between Monterey Street and State Route 129

Santa Clara and San Benito Counties, California
Caltrans District 4 - SCL - 101 (PM 0.0 - 5.0),
Caltrans District 5 - SBT - 101 (PM 4.9 - 7.5),
Caltrans District 4 - SCL - 25 (PM 1.6 - 2.5)
SCH 2007102141

FINAL ENVIRONMENTAL IMPACT REPORT



Prepared by the
Santa Clara Valley Transportation Authority



May 2013

Preface to the Final Environmental Impact Report

This Final Environmental Impact Report (EIR) for the U.S. 101 Improvement Project was prepared in compliance with the California Environmental Quality Act (CEQA). This document contains the following:

- Text of the Final EIR
- Summary of the Scoping/Outreach/Coordination Process (Chapter 3)
- Responses to Comments on the Draft EIR (Chapter 4)
- Copies of Written Comments on the Draft EIR (Appendix F)
- Copy of Public Hearing Transcript (Appendix G)

To assist the reader, any changes made to the text of the Draft EIR are indicated in this Final EIR as follows: Text additions are underlined. Text deletions show the original text with a ~~strikeout~~ running through the part of the text to be deleted.

Summary

The Santa Clara Valley Transportation Authority (VTA) has prepared this Environmental Impact Report (EIR) in its role as the Lead Agency under the California Environmental Quality Act (CEQA). The VTA, in cooperation with the California Department of Transportation (Caltrans), proposes improvements to U.S. 101, as described below.

OVERVIEW OF PROJECT AREA

The proposed project is located on U.S. 101 in southern Santa Clara County/northern San Benito County, California. The northerly project limit is Monterey Street in the City of Gilroy and the southerly project limit is State Route (SR) 129. Within the project limits, U.S. 101 is currently a 4-lane expressway in Santa Clara County and a 4-lane freeway in San Benito County. Existing interchanges on U.S. 101 are located at Monterey Street, SR 25, Betabel Road/Y Road, and SR 129. Within Santa Clara County, there is also access between U.S. 101 and a number of local roadways and driveways.

PURPOSE AND NEED

The purpose of the proposed project is to accomplish the following objectives:

- Complete the upgrade of U.S. 101 to freeway standard in Santa Clara County, and improve system connectivity to SR 25 and SR 129.
- Accommodate projected traffic demand along U.S. 101, including growth anticipated under adopted land use plans, thereby reducing future congestion and delay, especially during peak travel periods.
- Improve safety along the project segment of U.S. 101, including the reduction of conflicts with agricultural traffic.
- Improve traffic operations on the project segment of U.S. 101, including those associated with connections between U.S. 101 and SR 25, SR 129, local roads, and adjacent land uses.
- Enhance the movement of goods along the U.S. 101 transportation corridor.
- Maintain and enhance bicycle access in the U.S. 101 corridor.

The need for the project is summarized as follows:

- The project segment of U.S. 101, which is currently a 4-lane expressway in Santa Clara County and a 4-lane freeway in San Benito County, has insufficient capacity to accommodate future demand during peak travel periods. As a result, delays and congestion are projected to occur during the AM and PM peak weekday commutes, as well as on weekends.
- The design of the existing U.S. 101/SR 25 interchange is inadequate to accommodate demand, the result of which is the backup of traffic onto the mainlines of U.S. 101 and SR 25.
- Existing conditions within the project segment of U.S. 101 that do not meet current standards include inadequate shoulder widths, uncontrolled local and private access, reduced sight distance, insufficient merge/weave sections, and insufficient street lighting. These conditions, coupled with relatively high volumes of traffic and relatively high travel speeds, have resulted in accident rates that are higher than those on the adjacent freeway segment of U.S. 101 to the north.
- The lack of controlled access to U.S. 101 and the absence of frontage roads along the highway requires local traffic associated with the adjacent land uses to utilize U.S. 101. This results in conflicts between fast-moving highway traffic and slower-moving vehicles that are entering/exiting along the existing highway.
- The existing at-grade crossing of the UPRR tracks on SR 25 just west of Bloomfield Road causes traffic backups during train operations.
- The lack of a signalized intersection at the U.S. 101 ramp termini on SR 129 is projected to result in delay as demand increases.

PROPOSED ACTION

A summary of the main improvements of the proposed project is provided below. Details are provided in Section 1.3 of this document.

- ▣ Widen and upgrade U.S. 101 to a 6-lane freeway between the Monterey Street interchange in Gilroy and the SR 129 interchange in northern San Benito County.

- ▶ Reconstruct the U.S. 101/SR 25 interchange. There are two design options for the reconstructed interchange being considered. Design Option A would reconstruct the U.S. 101/SR 25 interchange at a location approximately 0.2 miles north of the existing interchange. Design Option B would reconstruct the U.S. 101/SR 25 interchange at essentially the same location as the existing interchange.
- ▶ Construct an auxiliary lane in each direction on U.S. 101 between the Monterey Street and SR 25 interchanges.
- ▶ Extend Santa Teresa Boulevard approximately 0.5 miles from Castro Valley Road to the new U.S. 101/SR 25 interchange.
- ▶ Construct improvements at the southbound U.S. 101 off-ramp to SR 129.
- ▶ Construct frontage roads, as needed, to replace existing access to U.S. 101 from adjacent properties.
- ▶ Grade-separate the Union Pacific Railroad (UPRR) crossing on SR 25 just west of Bloomfield Avenue.
- ▶ Construct bicycle facilities, as needed, to replace access that will be lost when U.S. 101 is upgraded to a freeway and to improve bicycle access in the project area.

PROJECT IMPACTS

Table S-1 provides a brief summary of the environmental impacts of the project, as well as avoidance, minimization, and/or mitigation measures. The reader is referred to Chapter 2 of this EIR for detailed discussions of the existing setting, impacts, and avoidance, minimization, and/or mitigation measures.

COORDINATION WITH PUBLIC AND OTHER AGENCIES

Construction of the proposed project will require permits/approvals from the governmental agencies listed in Table S-2.

During the planning and preliminary design for the project, VTA and Caltrans have undertaken substantial outreach to the public and to affected governmental agencies. This outreach, which

is described in detail in Section 3, focused on soliciting input on a wide variety of issues, most notably the following:

- Local property access and local traffic circulation given the proposed upgrade of U.S. 101 from an expressway to a freeway in the Santa Clara County portion of the project.
- Bicycle and pedestrian access and circulation in the project area, including maximizing connections to existing and future trails.
- The substantial amount of right-of-way needed for the project, including the acquisition and relocation of four residences and two businesses.
- Coordination of the project's design to be compatible with other planned improvements, including a separate project to upgrade SR 25 to an expressway.
- The relationship of the project to the planned Santa Clara Valley Habitat Conservation Plan/Natural Communities Conservation Plan viz a viz mitigation for the project's impacts to wetlands and aquatic habitat, riparian habitat, oak woodland habitat, and a number of special-status animal species.
- Measures to facilitate wildlife movement across the U.S. 101 corridor given the project's location in an area of importance to habitat connectivity and wildlife movement.
- The location of the project in proximity to a number of historical and archaeological resources, including the Bloomfield Ranch.
- Measures to address the existing hydrological issues, including the fact that much of the area and portions of U.S. 101 are subject to flooding. There are floodplain issues along the Pajaro River that are particularly important, requiring coordination with the Pajaro River Watershed Flood Prevention Authority.
- The impacts of the project on prime agricultural lands, including those under Williamson Act contracts. The purchase of agricultural conservation easements is proposed.

Issues to be Resolved

The one substantial project-related issue to be resolved centers on the proposed reconstruction of the U.S. 101/SR 25 interchange, specifically whether to choose Design Option A or Design Option B. This decision will involve the consideration and weighing of a number of factors including their differences in construction costs and environmental impacts.

TABLE S - 1
SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
Land Use [EIR Section 2.1]	
Impact LU-1: The project will not physically divide an established community. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Impact LU-2: The project is consistent with relevant regional and local plans and policies. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Growth [EIR Section 2.2]	
Impact GR-1: The project would result in a direct and significant growth-inducing impact if and when the application for the El Rancho San Benito (ERSB) project is resubmitted and the approval of ERSB is conditioned upon the widening of U.S. 101. [Significant Impact]	There is no feasible mitigation for this impact. [Significant Unavoidable Impact]
Impact GR-2: The project's indirect effect on the rate, location, and/or amount of future growth will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Farmlands [EIR Section 2.3]	
Impact FARM-1: The project will convert 157 acres and 122 acres of prime farmland to highway uses under Design Option A and Design Option B, respectively. Included in this conversion are farmlands that are under Williamson Act contracts. [Significant Impact]	MM-FARM-1.1: Farmland conservation easements will be purchased at a 1:1 mitigation-to-impact ratio for each acre of farmland directly impacted by the project. This mitigation will not reduce this impact to a less-than-significant level. [Significant Unavoidable Impact]
Relocations [EIR Section 2.4]	
The project will require the acquisition and relocation of four residences and two businesses. The displacement of these residences and businesses is a substantial economic and social effect of the project. Under CEQA it is not, however, an environmental impact	These properties will be purchased at fair market value. Relocation assistance will be provided in accordance with the provisions of the Department's Relocation Assistance Program.

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
Utilities & Emergency Services [EIR Section 2.5]	
Impact UTIL-1: The project will not result in the disruption of utility services. The project will not hinder emergency vehicle response times. The project will not sever or alter any emergency evacuation routes. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Transportation & Traffic, Bicycle & Pedestrian Facilities [EIR Section 2.6]	
Impact TRAN-1: The project will improve peak-period traffic operations along the project segment of U.S. 101. [Beneficial Impact]	No avoidance, minimization, or mitigation measures are required.
Impact TRAN-2: The project will not result in a significant impact at any of the study intersections. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact TRAN-3: Although the project will eliminate bicycle access along the shoulder of U.S. 101 and SR 25 within the project limits, this access will be replaced with a system of new north-south and east-west bike lanes and bike paths, providing a safe and direct means for bicycle travel in this area. [Beneficial Impact]	No avoidance, minimization, or mitigation measures are required.
Visual/Aesthetics [EIR Section 2.7]	
Impact VISUAL-1: The proposed retaining walls will not result in a substantial change to the existing visual and aesthetic environment along the project segment of U.S. 101. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact VISUAL-2: Under Design Option A, the visual impact of the project from a vantage point along U.S. 101, 0.6 miles north of the 101/25 interchange, will be substantial. [Significant Impact]	MM-VISUAL-2.1: The visual effect of the new SR 25 overcrossing will be lessened through the incorporation of architectural design features (i.e., use of colors and textures that reduce visual impacts) into the structure. Landscaping will also be added to the interchange to lessen this impact. This mitigation will not reduce this impact to a less-than-significant level. [Significant Unavoidable Impact]

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
Impact VISUAL-3: Under Design Option B, the visual impact of the project from a vantage point along U.S. 101, 0.6 miles north of the 101/25 interchange, will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact VISUAL-4: Under Design Option A, the visual impact of the project from a vantage point along Santa Teresa Boulevard near Gavilan College will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact VISUAL-5: Under Design Option B, the visual impact of the project from a vantage point along Santa Teresa Boulevard near Gavilan College will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact VISUAL-6: Under Design Option A, the visual impact of the project from a vantage point at the intersection of SR 25 and Bloomfield Avenue will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact VISUAL-7: Under Design Option B, the visual impact of the project from a vantage point at the intersection of SR 25 and Bloomfield Avenue will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact VISUAL-8: Under Design Option A, the visual impact of the project from a vantage point to the west of the existing 101/25 interchange will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact VISUAL-9: Under Design Option B, the visual impact of the project from a vantage point to the west of the existing 101/25 interchange will be substantial. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-VISUAL-9.1: Small trees will be planted along the north side of Santa Teresa Boulevard in order to screen views of this roadway from the adjacent event center. The trees will function as large screening shrubs. Species that grow into tall trees will not be planted as they would block views of the Diablo Range in the distance

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Environmental Impact	Avoidance, Minimization, Mitigation Measures
Impact-VISUAL-10: The removal of vegetation by the project will not result in a significant visual impact. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Cultural Resources [EIR Section 2.8]	
Impact CUL-1: Construction-related activities will adversely impact one or more of the archaeological resources in the Project Area Limits (PAL). [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-CUL-1.1: To resolve construction-related activities that will adversely impact one or more of the historical resources in the PAL, an Archaeological Treatment Plan (ATP) will be developed that details procedures and mechanisms that will be followed by Caltrans and VTA to ensure both agencies satisfy their regulatory requirements under CEQA. The ATP will outline the process for completing the identification and evaluation phase of the regulatory process on parcels not yet acquired by the project where access was denied. When data recovery through excavation is the only feasible mitigation, provisions in the ATP for adequate recovery of scientifically consequential information from and about the historical resource, shall be implemented prior to any project-related construction or other activities being undertaken.
	MM-CUL-1.2: If cultural materials are discovered during construction, all earth-moving activity within and around the immediate discovery area will be diverted until a qualified archaeologist can assess the nature and significance of the find.
Impact CUL-2: The project will not have a substantial effect on the Bloomfield Ranch. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact CUL-3: The project will have no adverse effect on the San Felipe Church. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Impact CUL-4: The project will have no adverse effect on the Mayock House. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Hydrology & Floodplains [EIR Section 2.9]	
Impact HYDRO-1: Under both Design Option A and Design Option B, the project will result in substantial flooding impacts within the 100-year floodplain of Carnadero Creek. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-HYDRO-1.1: The project will construct a 100-foot wide trapezoidal flood control channel along the north side of the proposed Santa Teresa Boulevard extension. It will also install three new double 14' x 8' RCB culverts under the ramps and U.S. 101. The flood control channel will divert water on the west side of U.S. 101 to the three double RCB culverts. (Design Option A only)
	MM-HYDRO-1.2: The project will install nine new 12-foot x 6-foot RCB culverts under U.S. 101 to divert flows from Gavilan Creek to the east side of U.S. 101. (Design Option B only)

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Environmental Impact	Avoidance, Minimization, Mitigation Measures
	MM-HYDRO-1.3: The project will construct a detention basin adjacent to the reconstructed 101/25 interchange, on the east side of U.S. 101. The basin will have a storage capacity of 120 acre-feet and a footprint of roughly 40 acres, assuming an average depth of three feet. The basin will mitigate for the loss of floodplain storage that will occur with construction of the project. <u>The basin will be designed to drain completely following high-runoff events, without depressional areas within its bed that could result in long-term ponding that would serve as an attractant to special-status reptiles and amphibians.</u> (Both design options)
	MM-HYDRO-1.4: The project will install three double 14-foot x 8-foot RCB culverts under the southbound U.S. 101 off-ramp to SR 25 to convey flood flows under the ramp. (Design Option A only)
	MM-HYDRO-1.5: The project will construct a bridge (approximately 39-feet x 176-feet) on the southbound U.S. 101 off-ramp to SR 25 to convey flood flows under the ramp. (Design Option B only)
	MM-HYDRO-1.6: The project will construct a bridge on SR 25 just east of U.S. 101 to convey flood flows under SR 25. (Both design options)
	MM-HYDRO-1.7: The project will install five RCPs, each with a diameter of 30 inches, under the freeway to convey floodwaters downstream to mitigate the overtopping of U.S. 101 north of the Carnadero Creek crossing. (Both design options)
Impact HYDRO-2: Under Design Option A, the project will result in substantial flooding impacts within the 100-year floodplain of Gavilan Creek. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-HYDRO-2.1: The project will install a 6-foot x 4-foot RCB culvert and three RCPs (each with a 4-foot diameter) under the west side frontage road. (Design Option A only)
Impact HYDRO-3: Under Design Option B, the project will not result in substantial flooding impacts within the 100-year floodplain of Gavilan Creek. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact HYDRO-4: The project will not raise the water surface elevation of the Tick Creek floodplain during a 100-year storm. [No Impact]	No avoidance, minimization, or mitigation measures are required.

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Environmental Impact	Avoidance, Minimization, Mitigation Measures
Impact HYDRO-5: The project will not result in substantial flooding impacts within the 100-year floodplain of Tar Creek. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact HYDRO-6: The project will not result in substantial flooding impacts within the 100-year floodplain of the Pajaro River. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact HYDRO-7: The project will not result in substantial flooding impacts within the 100-year floodplain of the San Benito River. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact HYDRO-8: The project will not result in substantial flooding impacts within the 100-year floodplain of San Juan Creek. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Water Quality and Stormwater Runoff [EIR Section 2.10]	
Impact WQ-1: Construction of the project will increase impervious surfaces by approximately 75 acres, which will increase stormwater runoff. This could lead to the degradation of water quality in nearby creeks and rivers. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-WQ-1.1: The project will create approximately 32.4 acres of biofiltration strips and swales along U.S. 101 within the project limits. The strips/swales will be located along the edges of the roadways and interchange ramps. This acreage represents the maximum practicable extent of treatment for this project within the constraints of the site.
Geology/Soils/Seismicity/Topography [EIR Section 2.11]	
Impact GEO-1: Construction of the project will not expose people to significant geologic hazards or risks. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.

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Environmental Impact	Avoidance, Minimization, Mitigation Measures
Paleontology [EIR Section 2.12]	
<p>Impact PALEO-1: Construction of the proposed project could impact paleontological resources and could destroy scientifically important fossils. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-PALEO-1.1: A nonstandard special provision for paleontology mitigation will be included in the construction contract special provisions section to advise the construction contractor of the requirement to cooperate with the paleontological salvage.</p>
	<p>MM-PALEO-1.2: A qualified principal paleontologist will be retained to prepare a detailed Paleontological Mitigation Plan (PMP) prior to the start of construction. See Section 2.12 for the details as to the required contents of the PMP.</p>
Hazardous Waste/Materials [EIR Section 2.13]	
<p>Impact HAZ-1: Construction of the proposed project could expose construction workers to hazardous substances in concentrations that exceed regulatory thresholds. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-HAZ-1.1: If construction activities occur within 50' of the Chevron Service Station located at 5887 Monterey Rd and groundwater is encountered, the groundwater will be sampled and analyzed for constituents of concern related to the Chevron Station contaminants prior to disposal. If groundwater is contaminated, it will be contained and either treated and discharged to the sanitary sewer or transported to a licensed groundwater treatment facility.</p>
	<p>MM-HAZ-1.2: Prior to project development, a soil investigation will be conducted to determine whether ADL has affected soils that will be excavated as part of the proposed project. This applies to all locations where such testing has not already been completed. The investigation for ADL will be performed in accordance with the Caltrans' Lead Testing Guidance Procedure. The analytical results will be compared against applicable hazardous waste criteria. Based on analytical results, the investigation will provide recommendations regarding management and disposal of affected soils in the project area including the reuse potential of ADL-affected soil during project development. The provisions of a variance granted to the Department by the California Department of Toxic Substances Control on September 22, 2000 (or any subsequent variance in effect when the project is constructed) regarding aerially-deposited lead will be followed.</p>
	<p>MM-HAZ-1.3: If contaminated soil is encountered (based on physical observation) during trenching activities along the alignment, the soil will be stockpiled and analyzed for potential contaminants. If the soil can not be reused onsite, it will be transported to the appropriate landfill pending waste classification. In addition, if contaminated groundwater is encountered during construction, similar steps should be taken to characterize and dispose of the groundwater as was discussed in MM-HAZ-1.2, above.</p>

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Environmental Impact	Avoidance, Minimization, Mitigation Measures
	MM-HAZ-1.4: Herbicides and pesticides will be analyzed in the shallow soil in site areas located adjacent to or on agricultural land. Shallow soil samples will be collected and analyzed for metals, total petroleum hydrocarbons, volatile organic compounds, polycyclic aromatic hydrocarbons, herbicides and pesticides from site areas adjacent to railroad tracks or within railroad crossings. If soil is impacted with any of the compounds discussed above, it will be stockpiled and sampled for reuse or disposal options.
	MM-HAZ-1.5: Testing for the presence of lead-based paint on the existing bridge structures, and within the existing buildings to be demolished, will occur. If this substance is found to be present, applicable regulations pertaining to its removal and disposal will be followed.
	MM-HAZ-1.6: Testing for the presence of asbestos-containing materials on the existing bridge structures, and within the existing buildings to be demolished, will occur. If asbestos is found to be present, applicable regulations pertaining to its removal and disposal will be followed.
	MM-HAZ-1.7: During construction, soil disturbed in the vicinity of the San Benito River may contain elevated levels of naturally-occurring asbestos (NOA). If elevated levels of NOA are found, then dust suppression measures consistent with the Air Resources Board Air Toxics Control Measure for asbestos will be implemented.
Air Quality [EIR Section 2.14]	
Impact AQ-1: Construction of the proposed project would not cause or contribute to violations of carbon monoxide standards. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Impact AQ-2: Construction of the proposed project would not substantially increase mobile source air toxic (MSAT) emissions within the project limits. Regional MSAT emissions would not change due to the project. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Noise [EIR Section 2.16]	
Impact NOI-1: Depending on the location, increases in long-term noise levels will range from 0-9 dBA, which is less than the 12-dB threshold of significance. [Less-than-Significant Impact]	Although noise impacts are not significant, noise abatement was considered as noise levels will exceed the Noise Abatement Criteria. Soundwalls were determined feasible but not reasonable; see text for details.

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Environmental Impact	Avoidance, Minimization, Mitigation Measures
Natural Communities [EIR Section 2.17]	
<p>Impact NATCOM-1: The project will result in the permanent loss of eight acres of riparian habitat and temporary impacts to seven acres of riparian habitat. The project will also impact 890 linear feet of shaded riverine aquatic (SRA) habitat. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-NATCOM-1.1: The project will pay development fees to the Santa Clara Valley Habitat Conservation Plan/Natural Communities Conservation Plan HCP/NCCP for impacts to riparian habitat. For more information on the HCP/NCCP, please see Section 2.17.5.</p>
	<p>MM-NATCOM-1.2: If MM-NATCOM-1.1 turns out to be infeasible for some or all of the project, permanent impacts to riparian habitat will be mitigated by creating/restoring riparian habitat at a 3:1 ratio, on an acreage basis; temporary impacts will be mitigated at a 2:1 ratio, on an acreage basis; and SRA impacts will be mitigated at a 2:1 <u>basis ratio</u>, on a linear footage basis. These ratios are higher than those given in the HCP/NCCP as they are for restoration/creation only; there is no preservation component. <u>See Section 2.17.5 for details.</u></p> <p>As a potential alternative to the project creating/restoring riparian habitat at a nearby location, this measure could be satisfied, in whole or part, through the purchase of riparian mitigation credits from an approved mitigation bank. However, at the time this document was prepared, there were no approved mitigation banks offering riparian mitigation credits for projects located in the southern Santa Clara County/northern San Benito County area. If such banks become available and the project decides to purchase credits, the mitigation ratios given above for the creation/restoration of riparian habitat will apply.</p> <p>[Note: MM-NATCOM-1.2 will be implemented only if MM-NATCOM-1.1 is determined to be partially or completely infeasible.]</p>
<p>Impact NATCOM-2: The project will permanently impact 2.0 and 1.5 acres of oak woodland habitat under Design Option A and Design Option B, respectively. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-NATCOM-2.1: The project will pay an in-lieu fee to the HCP/NCCP for the permanent impacts to oak woodland habitat.</p>
	<p>MM-NATCOM-2.2: If MM-NATCOM-2.1 turns out to be infeasible, impacts to oak woodland will be mitigated by creating/restoring oak woodland habitat at a 2:1 ratio.</p> <p>[Note: MM-NATCOM-2.2 will be implemented only if MM-NATCOM-2.1 is determined to be infeasible.]</p>

TABLE S - 1

SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
<p>Impact NATCOM-3: The project will result in an adverse effect on wildlife movement by increasing road mortality and the ability of some animals to move across U.S. 101. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-NATCOM-3.1: North of Tar Creek, the project will maintain the existing standard fencing and thrie-beam median barrier.</p>
	<p>MM-NATCOM-3.2: New box culverts will be installed under U.S. 101 north of SR 25 for the purpose of accommodating flood flows; see MM-HYDRO 1.1 and MM-HYDRO-1.2. Although wildlife crossings are not substantial in this area, these culverts will be beneficial to wildlife movement across the U.S. 101 corridor because they will be dry year-round in most years.</p>
	<p>MM-NATCOM-3.3: A new culvert under U.S. 101 will be installed between Tar Creek and the Pajaro River. The height of the culvert will be at least 4 feet.</p>
	<p>MM-NATCOM-3.4: The existing, 90-inch, corrugated metal pipe (CMP) under U.S. 101 south of the Pajaro River will be replaced by a box culvert to maintain or increase its "openness ratio" (a measure of how "open" a culvert appears to animals, taking into account its height, width, and length) as this culvert is lengthened. This modification will at least maintain, if not enhance, the usefulness of this culvert to wildlife crossing under U.S. 101.</p>
	<p>MM-NATCOM-3.5: The existing, 54-inch, reinforced concrete pipe (RCP) under U.S. 101 just north of the Betabel Road/Y Road interchange will be replaced with a box culvert at least 90 inches in height. Increasing the height and width of this culvert will increase its openness ratio considerably, thereby enhancing its attractiveness to wildlife attempting to cross U.S. 101.</p>
	<p>MM-NATCOM-3.6: Wildlife fencing will be installed along U.S. 101 from Tar Creek south to the San Benito River to minimize the potential for wildlife to access the highway's surface. The wildlife fencing will extend 0.25 miles north of Tar Creek and south of the San Benito River to minimize the potential for wildlife to move around the fence and onto the roadway. Wildlife "jump-outs" or one-way gates will be installed in several locations within this segment so that animals that are able to find a way onto the highway will be able to exit.</p>
	<p>MM-NATCOM-3.7: Where feasible, designs for the culverts that will be lengthened by the project will include metal grating in the shoulder of the road surface. This grating will increase lighting within the culverts, offsetting the increased darkness resulting from lengthening the culverts.</p>

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
	<p>MM-NATCOM-3.8: At several existing culverts under U.S. 101, vegetation immediately in front of the culverts may block the culverts from the view of dispersing animals and provide cover in which predators may hide. Although such cover may benefit animals at times, the function of the culverts (from a wildlife perspective) is to move quickly through the corridor. Therefore, in some areas, vegetation will be cleared immediately in front of culverts to make them more conspicuous and attractive and to reduce cover in which predators may hide.</p>
	<p>MM-NATCOM-3.9: The concrete median barriers south of Tar Creek will be retrofitted to incorporate wildlife passageways (Caltrans standard "Type S, M, and/or L") to facilitate crossings by animals that are able to cross over or through the wildlife fencing in these areas.</p>
	<p>MM-NATCOM-3.10: Following completion of construction, monitoring will be performed to ensure that MM-NATCOM-3.1 through MM-NATCOM-3.6, and MM-NATCOM-3.9, have been implemented; to document that grating has been incorporated into the road shoulder per MM-NATCOM-3.7 where feasible; and to document that vegetation potentially concealing undercrossings has been cleared as appropriate to make inconspicuous undercrossings more evident to wildlife per MM-NATCOM-3.8. In addition, monitoring will occur at the Tar Creek, Pajaro River, and San Benito River bridges, as well as at the two culverts that are to be upgraded in size between the Pajaro River and the Betabel Road/Y Road interchange, to verify continued use by mammals moving from one side of U.S. 101 to the other. For details regarding the monitoring, see Section 2.17.5.3.</p>
<p>Impact NATCOM-4: Construction of the proposed project will not create barriers to the passage of fish. [No Impact]</p>	<p>No avoidance, minimization, or mitigation measures are required.</p>
<p>Wetlands [EIR Section 2.18]</p>	
<p>Impact WET-1: The project will result in the permanent loss of 3.2 acres of wetlands and aquatic habitat and temporary impacts of up to 1.5 acres of wetlands and aquatic habitat. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-WET-1.1: The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to wetlands and aquatic habitat. For more information on the HCP/NCCP, please see Section 2.17.5.</p>

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
	<p>MM-WET-1.2: If MM-WET-1.1 turns out to be infeasible for some or all of the project, permanent impacts to wetlands and aquatic habitat will be mitigated by the purchase of credits from the Pajaro River Mitigation Bank that services both Santa Clara and San Benito Counties. If credits are no longer available at this bank, and if there are no other approved mitigation banks whose service area includes the project area, then mitigation will occur through on-site or off-site creation of wetland and aquatic habitat at a 2:1 ratio, on an acreage basis.</p> <p>[Note: MM-WET-1.2 will be implemented only if MM-WET-1.1 is determined to be partially or completely infeasible.]</p>
	<p>MM-WET-1.3: The temporary wetland and aquatic habitat impacts will be mitigated at a 1:1 acreage ratio within the impact footprint through the restoration of pre-construction grades, hydrology, and soil conditions in situ to any wetland and aquatic areas temporarily disturbed during construction. Wetland vegetation, structure, and function are expected to regenerate naturally following the restoration of grades, hydrology, and soils. <u>For further details regarding this measure, please see Section 2.18.5.</u></p>
Plant Species [EIR Section 2.19]	
Impact PLANT-1: The project will not impact any special-status plant species. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Animal Species [EIR Section 2.20]	
Impact ANIMAL-1: The project will result in both short- and long-term adverse impacts to Pacific lampreys and Monterey roach. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-ANIMAL-1.1: The project will fully mitigate for impacts to SRA, riparian, and aquatic habitats. This mitigation is summarized above [see <i>Natural Communities and Wetlands</i>].
	MM-ANIMAL-1.2: Any construction activities within the low-flow channels of waterways where Pacific lamprey and Monterey roach are known or likely to occur will be limited to the period of June 15 - October 15.
	MM-ANIMAL-1.3: For waterways where Pacific lamprey and Monterey roach are known or likely to occur, measures will be taken to ensure that movement of fish is not prevented by any water diversion structures used during construction, regardless of when construction occurs. Water will be diverted through the construction site by way of an open ditch or other method approved by the regulatory agencies.
	MM-ANIMAL-1.4: The project will implement measures during construction to avoid and minimize the potential degradation of water quality within any waterways where Pacific lamprey and Monterey roach are known or likely to occur. These measures are summarized subsequently in this table [see <i>Construction Impacts</i>].

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
Impact ANIMAL-2: The project's effect on the western spadefoot toad will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact ANIMAL-3: Construction activities could result in harm to individual western pond turtles. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-ANIMAL-3.1: A pre-construction survey for the western pond turtle shall be conducted within 30 days prior to any site preparation, grading or construction activity at the Pajaro River, San Benito River, San Juan Creek, Tar Creek, Carnadero Creek, and Tick Creek. A single, intensive search for this species shall be performed in areas exhibiting even marginally suitable habitat, covering the area of potential impact at each creek crossing and extending at least 500 feet beyond the area of potential impact both upstream and downstream. If this species is found within the surveyed area, the California Department of Fish and Wildlife (CDFW) shall be notified of such occurrence and, if possible, and without injury, individuals shall be captured and moved to a safe location, at least 500 feet away from the area of potential impact.
	MM-ANIMAL-3.2: If individuals and/or suitable habitat are located within 500 feet of the area of potential impact at a creek crossing, monitoring will be performed during the process of clearing vegetation within the construction zone, to ensure that any western pond turtles that may be present will be safely relocated. The biologist conducting such monitoring, if necessary, shall have the authority to halt operations in the immediate area to avoid harming turtles, if present, until individuals are safely captured and relocated. The CDFW shall be notified of such occurrence.
	MM-ANIMAL-3.3: During pre-construction surveys and other measures to be implemented for California red-legged frogs and California tiger salamanders, a qualified biologist will look for western pond turtles within the project's impact areas. If any pond turtles are detected during these surveys, or during construction, in an area where the individuals could be impacted, they will be relocated to a suitable location outside the area of project impact in consultation with the CDFW.
Impact ANIMAL-4: The project's effect on the golden eagle and the long-eared owl will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact ANIMAL-5: The project's effect on seven special-status bird species that could nest in the project impact area will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
<p>Impact ANIMAL-6: The project could result in a loss of burrowing owl habitat and harm to individual owls if the owls are found to occupy the project site prior to construction. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-ANIMAL-6.1: Pre-construction surveys will be undertaken to determine if owls utilize the habitat to be impacted by the project.</p>
	<p>MM-ANIMAL-6.2: Prior to construction, during the non-nesting season, any owls occupying burrows within construction zones shall be passively relocated under the authorization of the CDFW. Passive relocation is an intensive process that involves the installation of one-way doors in all ground squirrel burrows occurring on the site, which allow owls to leave their burrows but do not allow them to return, thereby forcing owls to move to a different area. Owl doors shall be monitored by a qualified biologist daily for a period of no less than three days and after that period, burrows shall be destroyed to preclude owls from returning to the burrows, and grading of these areas shall commence within seven days. The passive relocation will be repeated if owls move back to the construction areas.</p>
	<p>MM-ANIMAL-6.3: Burrows within the construction zone that are occupied by owls shall not be disturbed during the nesting season (February 15 through September 1) unless a qualified biologist verifies that either the owls have not begun laying and incubating eggs, or that juvenile owls have fledged and are able to live independently of their parents. If construction will occur during the nesting season, the project shall establish and maintain a minimum of a 250-foot buffer around any active nest.</p>
	<p>MM-ANIMAL-6.4: If, based on pre-construction surveys, it is determined that owls utilize habitat that will be impacted by the project, mitigation for the loss of such habitat will take the form of the payment of development fees to the Santa Clara Valley HCP/NCCP. For more information on the HCP/NCCP, please see Section 2.17.5.</p>
	<p>MM-ANIMAL-6.5: If MM-ANIMAL-6.4 turns out to be infeasible for some or all of the project, mitigation will consist of the purchase of credits from a mitigation bank that serves the project area. If no banks or credits are available, then the project will develop and implement a plan for the creation or enhancement of burrows, maintenance of burrows and management of foraging habitat, monitoring procedures, funding assurance, annual reporting requirements, and contingency and remediation measures. <u>The extent of the mitigation lands (either for the purchase of mitigation credits or for project-specific mitigation), enhancement measures, and other details will be determined based on the circumstances surrounding the owls to be impacted and their habitat, in consultation with the CDFW.</u></p> <p>[Note: MM-ANIMAL-6.5 will be implemented only if MM-ANIMAL-6.4 is determined to be partially or completely infeasible.]</p>

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
Impact ANIMAL-7: The project's effect on the tricolored blackbird will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact ANIMAL-8: While the impact of the project on habitat used by the San Francisco dusky-footed woodrat will not be substantial, construction activities are likely to harm or kill woodrats that nest within the construction zone. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-ANIMAL-8.1: Prior to any clearing of - or work within - riparian, oak woodland, or coyote brush scrub habitat, or the removal of any oak trees located outside these habitats, a qualified biologist will conduct a survey for San Francisco dusky-footed woodrat nests.
	MM-ANIMAL-8.2: Where nests are found, and if feasible, the project will maintain a buffer of at least several feet (preferably as much as 10 feet) around these nests. The purpose of the buffer is to avoid moving or bumping the nests or logs or branches on which the nests rest. If avoidance of nests is not feasible, the nests will be dismantled and the nesting material moved to a new location outside the project's impact areas so that it can be used by woodrats to construct new nests. The process by which this mitigation will occur is described in Section 2.20.5.
Impact ANIMAL-9: During the construction phase, the project could adversely affect roosting bats, potentially resulting in temporary loss of day-roost habitat and harm to individual bats. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-ANIMAL-9.1: A pre-construction/pre-demolition survey for roosting bats will be conducted prior to any construction on the U.S. 101 southbound span over Tar Creek, which is the only bridge with potential for (and known) day roosting by bats. Such a survey will also be conducted in any trees and buildings within or immediately adjacent to the impact area that are identified by a qualified bat biologist (i.e., a biologist holding a CDFW collection permit allowing the biologist to handle and collect bats) as being high-potential roost sites. For details regarding this measure, please see Section 2.20.5.
	MM-ANIMAL-9.2: Because the aforementioned survey will be conducted prior to the breeding season, several months may pass between that survey and the initiation of construction or demolition in a given area. Therefore, a second preconstruction/ pre-demolition survey for roosting bats, following the methods described above, will be conducted within 15 days prior to the commencement of these activities in a given area to determine whether bats have occupied a roost in or near the project's impact areas. This survey should be facilitated considerably by information (e.g., on potential roost trees) gathered during the previous survey.
	MM-ANIMAL-9.3: If a maternity roost of any bat species is present, the bat biologist will determine the extent of a construction-free buffer around the active roost that will be maintained. This buffer would <u>will</u> be maintained from April 1 st until the young are flying, typically after August 31 st .

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
	MM-ANIMAL-9.4: If a day roost is found on a bridge, in a building, or in a tree that is to be completely removed or replaced, individual bats will be safely evicted under the direction of a qualified bat biologist. Eviction of bats will occur at night, so that bats will have less potential for predation compared to daytime roost abandonment. Eviction will occur between September 1 st and March 31 st , outside the maternity season, but will not occur during long periods of inclement or cold weather (as determined by the bat biologist) when prey are not available or bats are in torpor. For details regarding this measure, please see Section 2.20.5.
	MM-ANIMAL-9.5: If a day roost will be impacted, an alternative bat roost structure will be provided. The design and placement of this structure will be determined by a bat biologist, in consultation with the CDFW, based on the species of bat to be displaced, the location of the original roost, and the habitat conditions in the vicinity. For details regarding this measure, please see Section 2.20.5.
	MM-ANIMAL-9.6: In some circumstances, it may be beneficial to allow roosting bats to continue using a roost while construction is occurring on or near the roost site. For details regarding this measure and a description of the process that will be used to determine if bats should continue to roost during construction, please see Section 2.20.5.
Impact ANIMAL-10: While the impact of the project on habitat used by the ringtail will not be substantial, construction activities could harm or kill ringtails if they are found to be nesting within the construction zone. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-ANIMAL-10.1: If a ringtail nest is detected incidentally (i.e., during the woodrat surveys described above in MM-ANIMAL-8.1), a qualified mammalogist will determine the extent of a construction-free buffer zone that should be maintained around the den. Construction activities within this zone will not occur during the period March 1 st through August 31 st to avoid potential construction disturbance to the ringtail during the breeding season. After August 31 st , individuals will be safely evicted, under the direction of a qualified mammalogist, by disturbing the den site under the cover of darkness to allow the ringtail(s) to abscond safely to a new location without being exposed considerably to predators or competitors.
Impact ANIMAL-11: While the impact of the project on habitat used by the badger will not be substantial, construction activities could harm or kill badgers if they are found to be denning within the construction zone. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-ANIMAL-11.1: A qualified mammalogist will conduct preconstruction surveys for badger dens on and within 300 ft of the site (as access permits), within two weeks prior to ground-breaking in any given area currently occupied by grassland or ruderal habitat. If the mammalogist identifies any dens that appear suitable for this species (based on size, shape, or other features), such "potential dens" will be monitored via tracking media or camera for a period of at least three days to determine occupancy, then excavated if no evidence of occupancy is detected. If an active maternity badger den is located, the mammalogist will determine the measures (e.g., buffers) that will be taken to avoid impacts to the den during the pupping season (i.e., February 15 th through July 1 st , or as otherwise determined through surveys and monitoring of the den), in consultation with the CDFW. After the pupping season, if a den is located in an onsite impact area, the badgers will be evicted by excavation of the den using hand tools, in consultation with the CDFW and under the supervision of a qualified mammalogist.

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
<p>Impact ANIMAL-12: Construction activities may adversely affect birds that are nesting within or adjacent to the project's construction zone. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-ANIMAL-12.1: Vegetation that will be impacted by the project will be removed during the non-breeding season (i.e., September 1st to February 14th 1st), if feasible, to help preclude nesting. If it is not feasible to schedule vegetation removal during the non-breeding season, then pre-construction surveys for nesting birds will be conducted by a qualified ornithologist to ensure that no nests will be disturbed during project implementation. This survey will be conducted no more than seven <u>two</u> days prior to the initiation of construction activities. During this survey, the ornithologist will inspect all trees, shrubs, and other potential nesting habitats in and immediately adjacent to the impact areas for nests. If an active nest is found sufficiently close to work areas to be disturbed by these activities, the ornithologist, in consultation with CDFW, will determine the extent of a buffer zone to be established around the nest, typically 250 feet for raptors and 50 feet for other birds; which can range from 100 to 300 feet or more depending on the sensitivity of the nest and/or species.</p>
	<p>MM-ANIMAL-12.2: At bridges, to avoid impacts to nesting swallows and black phoebes, old nests will be removed prior to February 15th, or after February 15th if a qualified ornithologist determines that the nests are not active. For details regarding this measure, please see Section 2.20.5.</p>
<p align="center">Threatened and Endangered Species [EIR Section 2.21]</p>	
<p>Impact T&E-1: The project will result in both short- and long-term adverse impacts to steelhead. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-T&E-1.1: The project will mitigate for impacts to SRA, riparian, and aquatic habitats. This mitigation is summarized above [see <i>Natural Communities</i> and <i>Wetlands</i>].</p>
	<p>MM-T&E-1.2: Any construction activities within the low-flow channels of waterways where steelhead are known or likely to occur will be limited to the period of June 15 - October 15.</p>
	<p>MM-T&E-1.3: For waterways where steelhead are known or likely to occur, measures will be taken to ensure that movement of fish is not prevented by any water diversion structures used during construction, regardless of when construction occurs. Water will be diverted through the construction site by way of an open ditch or other method approved by the regulatory agencies.</p>
	<p>MM-T&E-1.4: The project will implement measures during construction to avoid and minimize the potential degradation of water quality within any waterways where steelhead are known or likely to occur. These measures are summarized below [see <i>Construction Impacts</i>].</p>
<p>Impact T&E-2: The project will result in both short- and long-term adverse impacts to the California red-legged frog. [Significant Impact; reduced to Less-than Significant with Mitigation]</p>	<p>MM-T&E-2.1: The project will fully mitigate for impacts to riparian habitat and aquatic/wetland habitat, the two habitat types of greatest value to red-legged frogs. This mitigation is summarized above [see <i>Natural Communities</i> and <i>Wetlands</i>].</p>

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
	MM-T&E-2.2: The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to upland non-breeding red-legged habitat. For more information on the HCP/NCCP, please see Section 2.17.5.
	MM-T&E-2.3: If MM-T&E-2.2 turns out to be infeasible for some or all of the project, mitigation for impacts to upland non-breeding frog habitat will consist of the purchase of credits from a mitigation bank that serves the project area. If no banks or credits are available, then the project will develop and implement a plan for the preservation and enhancement of non-breeding red-legged frog habitat at off-site location(s). [Note: MM-T&E-2.3 will be implemented only if MM-T&E-2.2 is determined to be partially or completely infeasible.]
	MM-T&E-2.4: Prior to any ground disturbance, pre-construction surveys shall be conducted by a USFWS-approved biologist for the California red-legged frog. These surveys shall consist of walking surveys of the project limits and adjacent areas accessible to the public to determine presence of the species. If any red-legged frogs are detected within construction areas, they will be relocated to predetermined sites outside the project area (with the approval of the USFWS). For details regarding this measure, please see Section 2.21.5.
	MM-T&E-2.5: An employee education program will take place before groundbreaking for the project. For details regarding this measure, please see Section 2.21.5.
	MM-T&E-2.6: Prior to the start of work each day, dedicated construction personnel will inspect trenches and pits that were left open overnight. If a California red-legged frog (or any amphibian that construction personnel think may be of this species) is encountered, a protocol will be followed, as described in Section 2.21.5.
	MM-T&E-2.7: Permanent and temporary disturbances and other types of project-related disturbance to the habitats of the California red-legged frog shall be minimized to the maximum extent practicable. To minimize temporary disturbances, all project-related vehicle traffic shall be restricted to established roads, construction areas, and other designated areas. These areas will also be included in pre-construction surveys and, to the maximum extent possible, should be established in locations disturbed by previous activities to prevent further adverse effects.
	MM-T&E-2.8: Project-related vehicles shall observe a 15 mph speed limit within construction areas, except on established public roadways; this is particularly important at night when the California red-legged frog is most active. To the maximum extent possible, nighttime construction should be minimized. Off-road traffic outside of designated project areas shall be prohibited.

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
	MM-T&E-2.9: To prevent inadvertent entrapment of red-legged frogs during construction, all excavated, steep-walled holes or trenches more than two feet deep shall be covered at the close of each working day by plywood or similar materials, or provided with one or more escape ramps constructed of earth fill or wooden planks. For more details regarding this measure, please see Section 2.21.5.
	MM-T&E-2.10: To eliminate an attraction to predators of the California red-legged frog, all food-related trash items such as wrappers, cans, bottles, and food scraps will be disposed of in closed containers and removed at least once every week.
	MM-T&E-2.11: To avoid harassment, injury, or mortality of California red-legged frogs by dogs or cats, no canine or feline pets shall be permitted in the project area.
	MM-T&E-2.12: Plastic monofilament netting (erosion control matting) or similar material shall not be used at the project site because California red-legged frogs may become entangled or trapped in it.
	MM-T&E-2.13: A biologist(s) shall be onsite during activities that may result in the take of the California red-legged frog. For details regarding this measure, please see Section 2.21.5.
	MM-T&E-2.14: Injured California red-legged frogs will be cared for by a licensed veterinarian or other qualified person; dead red-legged frogs will be preserved according to standard museum techniques and held in a secure location. The USFWS and the CDFW will be notified within one working day of the discovery of death or injury to a California red-legged frog that occurs due to project-related activities or is observed at the project site.
	MM-T&E-2.15: Environmentally sensitive area (ESA) fencing will be installed around sensitive habitat features used by the red-legged frog, such as wetlands and riparian and aquatic habitats, which are to be avoided during project construction. For details regarding this measure, please see Section 2.21.5.
	MM-T&E-2.16: Under Design Option A, a bridge and a 4-foot arch pipe will be constructed within the new frontage road near the pond south of Castro Valley Road. If red-legged frogs are breeding in or otherwise using the pond, the bridge would allow frogs to disperse under the road along the drainage leading into the pond, while the arch pipe would allow for dispersal between the pond and areas west of the pond. These features will allow frogs the ability to disperse to and from the pond without crossing the road's surface [Design Option A only].
	MM-T&E-2.17: Under Design Option B, a bridge and two 8-foot arch pipes will be constructed within the new Santa Teresa Boulevard Extension near the pond south of Castro Valley Ranch to allow frogs to move under the roadway. Because of the increased traffic on Santa Teresa Boulevard under this option, as compared to that on the frontage road under Design Option A, permanent exclusion fencing will be installed to keep frogs off the road's surface within 0.25 miles of the pond under Design Option B [Design Option B only].

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
Impact T&E-3: The project will result in both short- and long-term adverse impacts to the California tiger salamander. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-T&E-3.1: The project will fully mitigate for impacts to aquatic/wetland habitat, the habitat type of greatest value to tiger salamanders. This mitigation is described above [see <i>Wetlands</i>].
	MM-T&E-3.2: The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to upland non-breeding tiger salamander habitat. For more information on the HCP/NCCP, please see Section 2.17.5.
	MM-T&E-3.3: If MM-T&E-3.2 turns out to be infeasible for some or all of the project, mitigation for impacts to upland non-breeding tiger salamander habitat will consist of the purchase of credits from a mitigation bank that serves the project area. If no banks or credits are available, then the project will develop and implement a plan for the preservation and enhancement of non-breeding tiger salamander habitat at off-site location(s). [Note: MM-T&E-3.3 will be implemented only if MM-T&E-3.2 is determined to be partially or completely infeasible.]
	MM-T&E-3.4: The 12 mitigation measures listed above (i.e., MM-T&E-2.4 through MM-T&E-2.15) that are designed to prevent harm to individual California red-legged frogs will also serve to prevent harm to individual California tiger salamanders.
Construction Impacts [EIR Section 2.22]	
Impact CON-1: Traffic impacts during construction will not be substantial. Street closures and detours are not anticipated. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact CON-2: Access to businesses will not be affected during construction of the proposed project. [No Impact]	No avoidance, minimization, or mitigation measures are required.
Impact CON-3: Disruption of utility service during construction will not be substantial. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.
Impact CON-4: Without proper emissions control measures in place, air quality impacts during construction could be substantial. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-CON-4.1: During construction, the project will follow the Department's Standard Specification 14-8.02, Standard Specification 10, and Standard Specification 18, which address the requirements of BAAQMD and dust control and dust palliative application, respectively.

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SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
	MM-CON-4.2: The project will implement all feasible PM ₁₀ construction emissions control measures required by the BAAQMD, as indicated in Table 36 in Section 2.22.4.
Impact CON-5: Noise from construction activities is likely to constitute a temporary annoyance at residences located along U.S. 101. Construction activities may also generate noticeable ground vibration at nearby residences, with pile driving being the construction source that could produce the greatest ground vibrations. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-CON-5.1: All internal combustion engine driven equipment will be equipped with intake and exhaust mufflers that are in good condition and appropriate for the equipment.
	MM-CON-5.2: Unnecessary idling of internal combustion engines within 100 feet of residences will be strictly prohibited.
	MM-CON-5.3: Staging of construction equipment within 200 feet of residences shall not occur. All stationary noise-generating construction equipment, such as air compressors and portable power generators, will be located as far practical from residences.
	MM-CON-5.4: All construction equipment will be required to conform to Section 14-08.02 - Sound Control Requirements of the latest Caltrans Standard Specifications.
	MM-CON-5.5: Nighttime construction work within 450 feet of residential land uses will be avoided where feasible.
	MM-CON-5.6: Demolition and pile driving activities should be limited to daytime hours only. If nighttime, impulsive work is required, a construction noise monitoring program will be implemented to provide additional mitigation as necessary (in the form of noise control blankets or other temporary noise barriers, etc.) for affected receivers.
Impact CON-6: Construction activities have the potential to adversely affect water quality in nearby creeks. [Significant Impact; reduced to Less-than Significant with Mitigation]	MM-CON-6.1: Active paved construction areas will be swept as needed.
	MM-CON-6.2: Silt fencing or straw wattles will be used to retain sediment on the project site.
	MM-CON-6.3: Temporary cover of disturbed surfaces or temporary slope protection measures will be provided per regulatory requirements and the Department's guidelines to help control erosion. Permanent cover/revegetation will be provided to stabilize the disturbed surfaces after construction has been completed.

TABLE S - 1

SUMMARY OF ENVIRONMENTAL IMPACTS AND AVOIDANCE, MINIMIZATION AND/OR MITIGATION MEASURES

Environmental Impact	Avoidance, Minimization, Mitigation Measures
	MM-CON-6.4: No debris, soil, silt, sand, bark, slash, sawdust, cement, concrete, washings, petroleum products, or other organic or earthen material shall be allowed to enter into or be placed where it may be washed by rainfall or runoff into any waterways.
	MM-CON-6.5: Best Management Practices (BMPs) will be utilized by the contractor(s) during construction. The BMPs will be incorporated into a Stormwater Pollution Prevention Plan for the project, as required by the Department's NPDES permit.
Cumulative Impacts [EIR Section 2.23]	
Impact CUMUL-1: Construction of the proposed project will not result in any significant cumulative impacts. [Less-than-Significant Impact]	No avoidance, minimization, or mitigation measures are required.

TABLE S - 2		
PERMITS AND APPROVALS NEEDED		
Agency	Permit/Approval	Status
City of Gilroy	Encroachment permit for work extending onto local streets within Gilroy	Application to be submitted during final design.
Santa Clara County	Encroachment permit for work extending onto local streets within unincorporated areas of Santa Clara County	Application to be submitted during final design.
San Benito County	Encroachment permit for work extending onto local streets within unincorporated areas of San Benito County	Application to be submitted during final design.
Santa Clara Valley Water District	Permit for work in Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, and Pajaro River	Application to be submitted during final design.
San Benito County Water District	Permit for work in Pajaro River, Murphy Creek, San Benito River, and San Juan Creek	Application to be submitted during final design.
California Public Utilities Commission	Permit for any work affecting the UPRR crossings at Tar Creek/U.S. 101 & SR 25	Application to be submitted during final design.
NOAA Fisheries (National Marine Fisheries Service)	Section 7 Consultation for Threatened and Endangered Species; Review and Comment on 404 Permit	
U.S. Fish & Wildlife Service	Section 7 Consultation for Threatened and Endangered Species; Review and Comment on 404 Permit	
U.S. Army Corps of Engineers	Section 404 permit for temporary and/or permanent work in low-flow channels of Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, Murphy Creek, San Benito River, and San Juan Creek	Application to be submitted during final design.
Regional Water Quality Control Board	Section 401 Water Quality Certification for temporary and/or permanent work in low-flow channels of Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, Murphy Creek, San Benito River, and San Juan Creek	Application to be submitted during final design.
California Department of Fish & Wildlife	Streambed Alteration Agreement for work in Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, Murphy Creek, San Benito River, and San Juan Creek; Incidental Take Permit for impacts to endangered/threatened species.	Application to be submitted during final design.

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CHAPTER 1 PROPOSED PROJECT

1.1 INTRODUCTION

The Santa Clara Valley Transportation Authority (VTA) has prepared this Environmental Impact Report (EIR) in its role as the Lead Agency under CEQA. The VTA, in cooperation with the California Department of Transportation (Caltrans), proposes to widen and upgrade a 7.6-mile project segment of U.S. 101 in southern Santa Clara County/northern San Benito County to a 6-lane freeway. The northerly project limit is Monterey Street¹ in the City of Gilroy and the southerly project limit is State Route (SR) 129. The project location is shown on Figures 1 and 2.

Other improvements will include the reconstruction of the existing U.S. 101/SR 25 interchange, construction of a grade separation on SR 25 at the Union Pacific Railroad (UPRR) crossing, construction of frontage roads, addition of auxiliary lanes, extension of Santa Teresa Boulevard to the U.S. 101/SR 25 interchange, and construction of bicycle facilities. For project details, see Section 1.3.

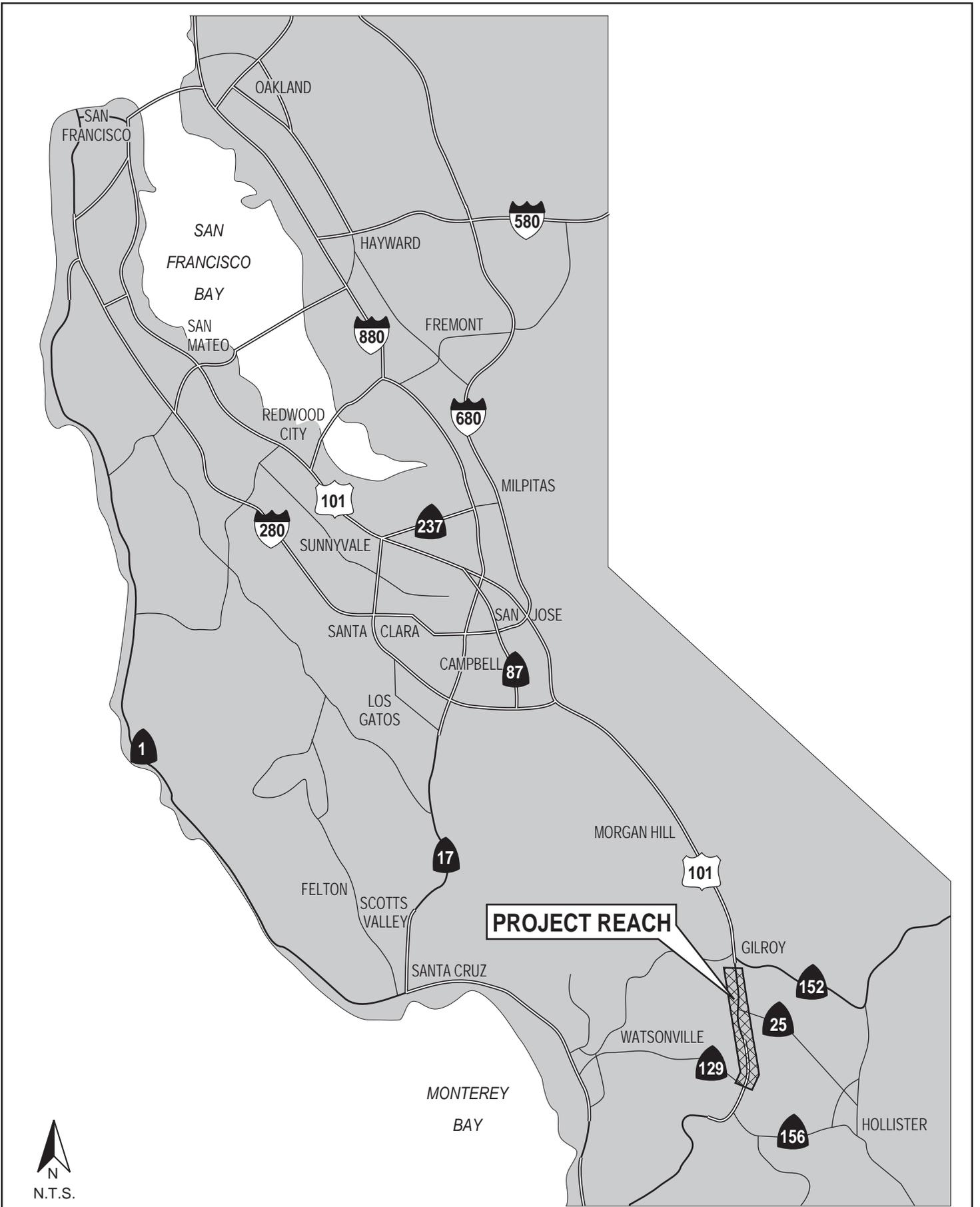
Within the project limits, U.S. 101 is currently a 4-lane expressway in Santa Clara County and a 4-lane freeway in San Benito County. Existing interchanges on U.S. 101 are located at Monterey Street, SR 25, Betabel Road/Y Road, and SR 129. Within Santa Clara County, there is also access between U.S. 101 and a number of local roadways and driveways.

The proposed project will 1) complete the upgrade of U.S. 101 to freeway standard in Santa Clara County, 2) accommodate projected traffic demand along U.S. 101, 3) improve safety along the project segment of U.S. 101, 4) improve traffic operations on the project segment of U.S. 101, 5) enhance the movement of goods along the U.S. 101 transportation corridor, and 6) maintain and enhance bicycle access in the U.S. 101 corridor.

The northerly portion of the project, including the reconstruction of the 101/25 interchange, is included in the Metropolitan Transportation Commission's (MTC) Regional Transportation Plan 2035. The segment of the project between SR 25 and the Santa Clara /San Benito County line is not currently included in MTC's RTP, but will be added prior to project approval. The portion of the project in San Benito County is included in the Council of San Benito County Government's 2010 Regional Transportation Plan.

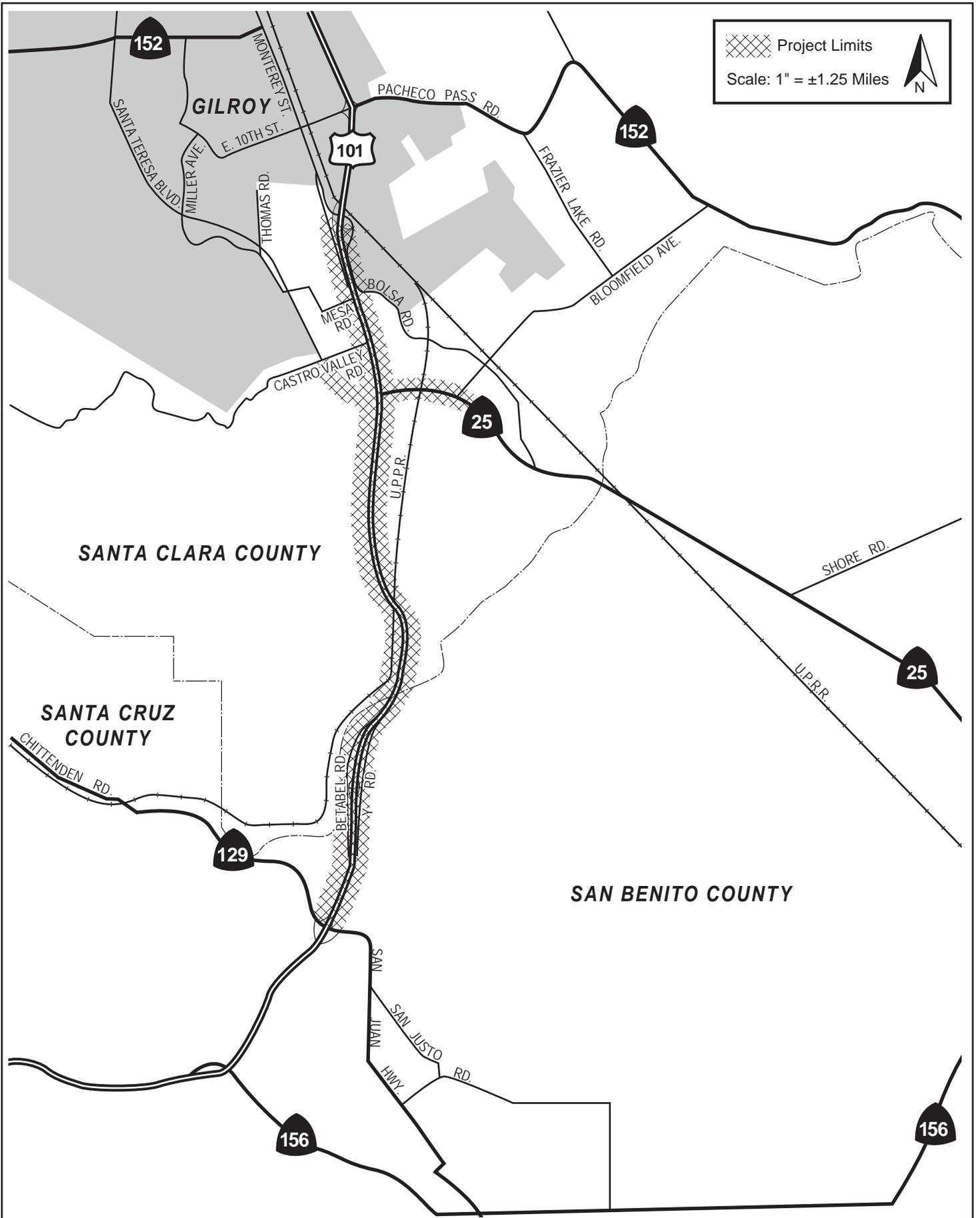
The project has independent utility, meaning that the proposed improvements can be implemented within the project limits and completion of other projects would not be required in order to realize the

¹In the project area, various publications and governmental databases refer to Monterey Street as Monterey Road or Monterey Highway. The names are used interchangeably, but all refer to the same facility.



REGIONAL MAP

FIGURE 1



VICINITY MAP

FIGURE 2

operational benefits of the proposed improvements. Establishing independent utility is important to avoid “project segmentation”.²

The project has logical starting and ending points or termini. The end points were selected to allow for construction of the proposed improvements and the integration of such improvements with the existing freeways and local street system.

1.2 PURPOSE AND NEED

1.2.1 Purpose of the Proposed Project

The purpose of the proposed project is to accomplish the following objectives:

- Complete the upgrade of U.S. 101 to freeway standard in Santa Clara County, and improve system connectivity to SR 25 and SR 129.
- Accommodate projected traffic demand along U.S. 101, including growth anticipated under adopted land use plans, thereby reducing future congestion and delay, especially during peak travel periods.
- Improve safety along the project segment of U.S. 101, including the reduction of conflicts with agricultural traffic.
- Improve traffic operations on the project segment of U.S. 101, including those associated with connections between U.S. 101 and SR 25, SR 129, local roads, and adjacent land uses.
- Enhance the movement of goods along the U.S. 101 transportation corridor.
- Maintain and enhance bicycle access in the U.S. 101 corridor.

²**Project Segmentation** would occur if a project were defined such that the proposed improvements (and/or benefits resulting from the proposed improvements) would be contingent upon the completion of additional projects. NEPA and CEQA require agencies to analyze “the whole of the action” and do not allow a project to be broken into smaller segments unless it can be demonstrated that each of the segments has independent utility.

1.2.2 Need for the Proposed Project

1.2.2.1 *Capacity, Transportation Demand and Safety*

- The project segment of U.S. 101, which is currently a 4-lane expressway in Santa Clara County and a 4-lane freeway in San Benito County, has insufficient capacity to accommodate future demand during peak travel periods. As a result, delays and congestion are projected to occur during the AM and PM peak weekday commutes, as well as on weekends. Since U.S. 101 is the primary north-south highway between the San Francisco Bay Area and the Monterey Bay Area, this congestion will result in substantial social, economic, and environmental impacts associated with delays in the movement of people and goods.³
- The design of the existing U.S. 101/SR 25 interchange is inadequate to accommodate demand, the result of which is the backup of traffic onto the mainlines of U.S. 101 and SR 25.

Accident Data

Table 1 presents a summary of accidents that occurred on the project segment of U.S. 101 during the 3-year period of October 1, 2007 through September 30, 2010. Summaries of these data are as follows:

- For the segment of U.S. 101 between Monterey Street and the Santa Clara/San Benito County line, 307 collisions were reported. The accident rates along this segment of U.S. 101 represent conditions better than the statewide average for similar facilities.
- For SR 25, 38 collisions were reported for the portion of the roadway between U.S. 101 and a short distance beyond Bloomfield Road, with no fatal accidents. The accident rates along this segment of SR 25 represent conditions better than the statewide average for similar facilities.
- For the segment of U.S. 101 between the Santa Clara/San Benito County line and SR 129, 104 collisions were reported, with no fatal accidents. The accident rates along this segment of U.S. 101 represent conditions better than the statewide average for similar facilities.
- For the on-ramp to southbound U.S. 101 from SR 25, both the total and fatal accident rates are higher than the statewide average for similar facilities.

³U.S. 101 is part of the Freeway and Expressway System, National Truck Network, and Interregional Road System (IRRS). U.S. 101 is a focus route identified by Caltrans in the 1998 Interregional Transportation Strategic Plan and is on the Freeway and Expressway System (F&E) "*...whose completion has been declared essential to the future development of the State, with provision for control of access to the extent necessary to preserve the value and utility of the facilities.*"

TABLE 1
SUMMARY OF FREEWAY ACCIDENT DATA IN THE PROJECT AREA
[October 2007 - September 2010]

Location	Total Number	Accident Rates (accidents per million vehicle miles)					
		Actual			Statewide Average		
		Fatal + Injury	Fatal	Total	Fatal + Injury	Fatal	Total
U.S. 101: Monterey St. to Co. Line	307	0.15	0.007	0.55	0.32	0.016	0.88
U.S. 101: County Line to SR 129	104	0.12	0	0.36	0.19	0.01	0.52
SR 25: U.S. 101 to just East of Bloomfield Road	38	0.12	0	0.63	0.33	0.025	0.77
Southbound U.S. 101 On-Ramp from SR 25	2	0	0.52	1.04	0.1	0.003	0.4
Northbound U.S. 101 On-Ramp from SR 25	1	0	0	0.9	0.11	0.003	0.35
Southbound U.S. 101 Off-Ramp to SR 25	3	0	0	0.25	0.19	0.006	0.75
Northbound U.S. 101 Off-Ramp to SR 25	3	0.61	0	1.83	0.1	0.003	0.3
Northbound U.S. 101 Off-Ramp to Monterey St.	3	0.17	0	0.34	0.18	0.002	0.6
Southbound U.S. 101 Off-Ramp to Monterey St.	2	0/42	0	0.85	0.42	0.004	1.20
Northbound U.S. 101 On-Ramp from Monterey St.	3	0.23	0	0.68	0.26	0.002	0.8
Southbound U.S. 101 On-Ramp from Monterey St.	0	0	0	0	0.26	0.002	0.75
Southbound U.S. 101 Off-Ramp to SR 129	2	0	0	0.45	0.19	0.006	0.75
Southbound U.S. 101 On-Ramp from Betabel Rd.	0	0	0	0	0.18	0.004	0.6
Northbound U.S. 101 Off-Ramp to Betabel Rd.	0	0	0	0	0.37	0.007	1.2
Southbound U.S. 101 Off-Ramp to Betabel Rd.	0	0	0	0	0.37	0.007	1.2
Northbound U.S. 101 On-Ramp from Betabel Rd.	0	0	0	0	0.18	0.004	0.6

Source: Caltrans' Traffic Accident Surveillance and Analysis Systems

- For the on-ramp to northbound U.S. 101 from SR 25, the total accident rate is higher than the statewide average for similar facilities.
- For the off-ramp from northbound U.S. 101 to SR 25, the injury and total accident rates are higher than the statewide average for similar facilities.
- For the off-ramp from southbound U.S. 101 to SR 25, all of the accident rates are lower than the statewide average for similar facilities.
- All of the on- and off-ramps at the U.S. 101/Monterey Street interchange have accident rates lower than the statewide average for similar facilities.
- No accidents of any type occurred during the 3-year period on any of the on- or off-ramps at the U.S. 101/Betabel Road/Y Road interchange.

1.2.2.2 *Roadway Deficiencies*

- Existing conditions within the project segment of U.S. 101 that do not meet current standards include inadequate shoulder widths, uncontrolled local and private access, reduced sight distance, insufficient merge/weave sections, and insufficient street lighting. These conditions, coupled with relatively high traffic volumes and relatively high travel speeds, have resulted in accident rates that are higher than those on the adjacent freeway segment of U.S. 101 to the north.
- The lack of controlled access to U.S. 101 and the absence of frontage roads along the highway requires local traffic associated with the adjacent land uses to utilize U.S. 101. This results in conflicts between fast-moving highway traffic and slower-moving vehicles that are entering/exiting along the existing highway.
- The existing at-grade crossing of the UPRR tracks on SR 25 just west of Bloomfield Avenue causes traffic backups during train operations.
- The lack of a signalized intersection at the U.S. 101 ramp termini on SR 129 is projected to result in delay as demand increases.

1.2.2.3 *Bicycle Access Deficiencies*

- Existing access for bicycles in the project area is limited. Since there is no existing alternative bike route between SR 25 and SR 129, the north-south bicycle traffic must ride on the outside

shoulders of U.S. 101 between Monterey Street and SR 129. The west-to-east bicycle traffic uses Mesa Road, the southbound U.S. 101 shoulder, the U.S. 101 to SR 25 off-ramp and then along the shoulder of SR 25. East-to-west bicycle traffic travels along the SR 25 shoulder, the SR 25 to U.S. 101 on-ramp, the northbound U.S. 101 shoulder, and exits at the Monterey Street interchange.

- Future access for bicycles in the project area will be eliminated when U.S. 101 (and the west end of SR 25) is upgraded to a freeway.

1.3 PROJECT DESCRIPTION

This section describes the proposed action and the design alternatives that were developed to meet the identified need through accomplishing the defined purpose(s), while avoiding or minimizing environmental impacts. The alternatives are the "Build Alternative" and the "No Build Alternative." Within the Build Alternative, there are two design options evaluated for the proposed reconstruction of the U.S. 101/SR 25 interchange.

In addition to the Build and No Build Alternatives, this section summarizes six design and location alternatives that were evaluated for their potential to meet the project's purpose and need, but which have been eliminated from further evaluation in this EIR due to one or more of the following reasons: 1) failure to adequately meet the purpose and need, 2) failure to meet minimum roadway design criteria, 3) substantial right-of-way needs that would require significant residential and/or business acquisitions and relocations, 4) substantial environmental impacts, and 5) substantial cost.

The proposed project is located along a 7.6-mile segment of U.S. 101 in southern Santa Clara County/northern San Benito County. Within the project limits, U.S. 101 is currently a 4-lane expressway in Santa Clara County and a 4-lane freeway in San Benito County.⁴ Existing interchanges on U.S. 101 are located at Monterey Street, SR 25, Betabel Road/Y Road, and SR 129. Within Santa Clara County, there is also access between U.S. 101 and a number of local roadways and driveways.

As described in Section 1.2, the purposes of the project are to 1) complete the upgrade of U.S. 101 to freeway standard in Santa Clara County, 2) accommodate projected traffic demand along U.S. 101, 3) improve safety and operations along the project segment of U.S. 101, 4) enhance the movement of goods along the U.S. 101 transportation corridor, and 5) maintain and enhance bicycle access in the U.S. 101 corridor.

⁴A **freeway** is a divided highway with full access control, meaning the owners of abutting lands have no right or easement of access to or from their abutting lands. An **expressway** is a divided highway with partial access control, meaning there may be limited driveways and/or at-grade intersections.

ALTERNATIVES

1.3.1 Build Alternative

Under the build alternative, improvements would be constructed on U.S. 101 between Monterey Street in Gilroy and SR 129 in San Benito County.

1.3.1.1 *Widen U.S. 101 to a 6-lane Freeway*

The project proposes to construct an additional lane in each direction of U.S. 101 between the Monterey Street interchange in Gilroy and the SR 129 interchange in San Benito County, a distance of 7.6 miles. The improvements will involve a combination of widening in the median and to the outside of the existing lanes. Within the Santa Clara County segment of the project, U.S. 101 will be upgraded to freeway standards, which means that all private and local access with U.S. 101 will be closed and relocated to controlled interchanges. The elimination of this direct access will require the construction of new frontage roads, as described below. In addition, all private utilities that longitudinally encroach into State right-of-way will be relocated outside of proposed State right-of-way limits.⁵

The proposed widening of U.S. 101 will require the widening or replacement of various bridges and culverts within the project limits. Table 2 lists the existing structures on U.S. 101 and provides a summary of the proposed modifications. [Note: Table 2 refers to "Design Option A" and "Design Option B", both of which are described in Section 1.3.1.2.]

The existing median of U.S. 101 varies in width from approximately four feet at the Pajaro River bridge to as much as approximately 150 feet and, depending upon the location, contains either a concrete barrier or a thrie-beam barrier.⁶ Under the proposed project, the median width of the freeway will be 70 feet north of the SR 25 interchange, and 46 feet south of the SR 25 interchange. North of Tar Creek, thrie-beam median barriers will be used as safety barriers and will continue to facilitate wildlife movement. South of Tar Creek, concrete barriers will be used as safety barriers, with wildlife passageways ("Type S, M, and L") to facilitate wildlife crossings.

Fencing will be erected at the edges of the freeway right-of-way within the project limits. Caltrans standard wire mesh or barbed wire fencing will be utilized north of Tar Creek. In the section south of Tar Creek, which is considered the most ecologically significant area for wildlife movement, various

⁵A **longitudinal encroachment** means the utilities are located within Caltrans' right-of-way and such utilities generally parallel the highway. In contrast, a **transverse encroachment** is one where the utilities cross the highway at, or close to, right angles.

⁶A **Thrie beam barrier** is a common type of metal beam barrier found along many highways. The metal beam barrier is mounted on wood or metal posts.

TABLE 2

EXISTING AND PROPOSED STRUCTURES WITHIN PROJECT LIMITS
[Listed North to South]

Location	Existing	Modifications Proposed by Project	
		Design Option A	Design Option B
U.S. 101 at Carnadero Creek	Two bridges: 4-span NB bridge, 37' in width and 140 feet in length; 4-span SB bridge, 34' in width and 141' in length	Existing NB bridge to be used by new frontage road; existing SB bridge to be widened by 37' and used for NB traffic; new 4-span bridge (71' x 122') to be constructed for SB traffic.	
U.S. 101 at SR 25 (proposed)	n/a	New bridge to be constructed to convey SR 25 over U.S. 101.	
Flood Passage Culverts on U.S. 101 north of proposed 101/25 interchange	None. U.S. 101 currently floods.	Three double 14' x 8' x 689' RCB culverts are proposed under U.S. 101 to channel floodplain flow from west to east of the freeway.	Nine 12' x 6' x 600' RCB culverts are proposed under U.S. 101 to channel floodplain flow from west to east of the freeway.
Flood Passage Culvert/Bridge on Off-Ramp from SB U.S. 101 to EB SR 25	None.	Three double 14' x 8' x 316' RCB culverts are proposed under the SB U.S. 101 off-ramp to SR 25.	New bridge (39' x 176') to be built to convey flood flow under ramp.
Flood Passage Bridge on On-Ramp from WB SR 25 to NB U.S. 101	None.	No bridge needed.	New bridge (39' x 400') to be built to convey flood flow under ramp.
Flood Passage Bridge on SR 25, just east of U.S. 101	None. SR 25 currently floods.	New bridge (56' to 63' x 450') to be built to convey flood flow under SR 25.	New bridge (73' to 86' x 400') to be built to convey flood flow under SR 25.
SR 25 at UPRR	None; at-grade crossing	New bridge (51' x 295') to be constructed to convey SR 25 over the UPRR.	New bridge (58' to 66' x 310') to be constructed to convey SR 25 over the UPRR.
SR 25 at Carnadero Creek	Existing bridge 40' x 444'.	No changes proposed.	

TABLE 2
EXISTING AND PROPOSED STRUCTURES WITHIN PROJECT LIMITS
[Listed North to South]

Location	Existing	Modifications Proposed by Project	
		Design Option A	Design Option B
Santa Teresa Blvd. at Gavilan Creek	None	New 6' x 4' x 45' RCB culvert.	None needed.
Frontage Road (Option A) or Santa Teresa Blvd. (Option B) near Pond	n/a	Bridge (approximately 100 feet in length) will be constructed near stock pond to facilitate dispersal by threatened species; see Section 2.21.	
Monterey Road at Gavilan Creek	None	New 6' x 4' x 50' RCB culvert.	None needed.
101/25 off-ramp at Gavilan Creek	14-span bridge (27' x 545')	Existing bridge to be removed.	
U.S. 101 at Gavilan Creek	8' x 6' x 185' RCB culvert	Existing culvert to be extended to a length of 425'.	Existing culvert to be extended to a length of 650'.
U.S. 101 at SR 25 (existing)	Existing bridge (44' x 212') over U.S. 101	Existing bridge to be removed.	
Monterey Rd at Tick Creek (location #1)	Double 5' x 3' x 31' RCB culvert	Existing culvert to be replaced with double 5' x 3' x 56' RCB culvert.	
Monterey Rd at Tick Creek (location #2)	Single 7' x 6' x 32' RCB culvert	Existing culvert to be replaced with single 7' x 6' x 59' RCB culvert.	
Access Driveway at Tick Creek (eastside of U.S. 101)	None.	New double 8' x 4' x 110' RCB culvert.	
U.S. 101 at Tick Creek	Double 8' x 4' x 163' RCB culvert	Existing culvert to be extended to a length of 220'.	
U.S. 101 at Sargent/ UPRR/Tar Creek	Two bridges: 11-span NB bridge (34' x 607'); 7-span SB bridge (41' x 672')	Remove NB bridge; widen SB bridge by 113' to accommodate both NB and SB traffic; build new single-span (20' x 40') bridge over Tar Creek (under the widened SB bridge) for bike access road.	
Tar Creek Access Road	None.	New bridge (19' x 40') to be constructed for access road.	

TABLE 2
EXISTING AND PROPOSED STRUCTURES WITHIN PROJECT LIMITS
[Listed North to South]

Location	Existing	Modifications Proposed by Project	
		Design Option A	Design Option B
Betabel Road at Pajaro River	No existing crossing; former bridge removed in 1940 when current U.S. 101 bridge was built.	New 3-span bridge (43' x 360') to be constructed for access road/bike path.	
U.S. 101 at Pajaro River	4-span bridge (60' x 340')	Existing bridge to be replaced with 3-span bridge (141' x 381').	
U.S. 101 at Betabel Road/Y Road	Existing bridge over U.S. 101 (37' x 215')	Existing bridge will be widened by approximately 12'.	
U.S. 101 at San Benito River	Two bridges: 13-span NB bridge (34' x 722'); 13-span SB bridge (38' x 710')	Existing NB bridge to be widened by 25'; existing SB bridge to be widened by 33'.	
Y Road at San Benito River	No existing crossing; former low-flow crossing washed away during storm in 1990s.	New 3-span bridge (13' x 300') to be constructed for bicyclists.	
101/129 off-ramp at San Juan Creek	Triple 8' x 8' x 174' RCB culvert	No changes proposed.	
U.S. 101 at San Juan Creek	3-span bridge (82' x 142')	Existing bridge will be widened to the west by approximately 17'.	
U.S. 101 at SR 129	Existing bridge over U.S. 101 (59' x 210')	No changes proposed.	
<p>Note: All proposed dimensions are approximations based on preliminary engineering and are subject to refinement during final design.</p> <p>RCB = reinforced concrete box</p> <p>NB = northbound SB = southbound EB = eastbound WB = westbound</p>			

undercrossing additions, enlargements, and/or enhancements will be combined with wildlife fencing to reduce wildlife-vehicle collisions while simultaneously increasing the permeability of the highway.

1.3.1.2 *Reconstruct U.S. 101/SR 25 Interchange*

The proposed project includes the reconstruction of the existing U.S. 101/SR 25 interchange. There are two design options under consideration for this component of the project:

- ▣ *Design Option A - Reconstruct Interchange North of Existing Location:* Design Option A will reconstruct the U.S. 101/SR 25 interchange at a location approximately 0.2 miles north of the existing interchange. The interchange will include a new bridge to convey SR 25 over U.S. 101. It will also include ramps to allow all traffic movements between U.S. 101 and SR 25, as shown on Figure 3. The proposed work at the reconstructed U.S. 101/SR 25 interchange will include the realignment of SR 25 to a location just east of the UPRR crossing, at which point it will either transition to existing SR 25 or will tie into an upgraded 4-lane SR 25.⁷
- ▣ *Design Option B - Reconstruct Interchange at Existing Location:* Design Option B will reconstruct the U.S. 101/SR 25 interchange at essentially the same location as the existing interchange. The interchange will include a new bridge to convey SR 25 over U.S. 101. It will also include ramps to allow all traffic movements between U.S. 101 and SR 25, as shown on Figure 4. The proposed work at the reconstructed U.S. 101/SR 25 interchange will include a minor realignment of SR 25 to a location just east of the UPRR crossing, at which point it will either transition to existing SR 25 or will tie into an upgraded 4-lane SR 25.

As a separate project, Caltrans is evaluating the upgrade of SR 25 to a 4-lane expressway between the UPRR crossing (just west of Bloomfield Avenue) and San Felipe Road in Hollister.

1.3.1.3 *Construct Auxiliary Lanes*⁸

The project proposes to construct an auxiliary lane in each direction on U.S. 101 between the Monterey Street interchange in Gilroy and the SR 25 interchange. The auxiliary lane will be constructed adjacent to the outside lane in each direction.

1.3.1.4 *Extend Santa Teresa Boulevard*

The existing southerly terminus of Santa Teresa Boulevard is at Castro Valley Road in Gilroy. The project proposes to extend Santa Teresa Boulevard from Castro Valley Road to the reconstructed U.S. 101/SR 25 interchange, a distance of approximately 0.5 miles. The extended roadway will include one traffic lane in each direction, two 8-foot wide shoulders, and a 4-foot wide median. The extension will

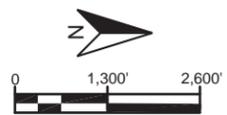
⁷As a separate project, Caltrans is evaluating the upgrade of SR 25 to a four-lane expressway between the UPRR crossing (just west of Bloomfield Avenue) and San Felipe Road in Hollister.

⁸An auxiliary lane typically extends between two adjacent interchanges. It improves weaving and overall freeway operations. It is not a "thru" lane; traffic in an auxiliary lane must either merge into the adjacent thru lane or exit the freeway at the next off-ramp.



PROPOSED PROJECT PLANS (DESIGN OPTION A)

FIGURE 3





PROPOSED PROJECT PLANS (DESIGN OPTION B)

FIGURE 4

meet minimum design standards for an expressway (i.e., 50 miles-per-hour [mph] design speed). It also includes a new traffic signal on Santa Teresa Boulevard at the driveway entrance to Gavilan College.

Under Design Option A, proposed work will include constructing Santa Teresa Boulevard on an embankment that will connect the new U.S. 101/SR 25 overcrossing to a slightly realigned Santa Teresa Boulevard north of Castro Valley Road. As shown on Figure 3, the new alignment of Santa Teresa Boulevard will be to the east of the existing alignment, which will improve traffic operations by providing for a straighter roadway.

Under Design Option B, the alignment for the Santa Teresa Boulevard extension will be along a hillside that is located on the south side of Gavilan Creek. The extension will connect to the new U.S. 101/SR 25 overcrossing, as shown on Figure 4.

Under both design options, this connection between U.S. 101 and Santa Teresa Boulevard will provide improved access to nearby Gavilan College and areas of southern Gilroy, as identified in the *City of Gilroy General Plan*, the *Southern Gateway Transportation and Land Use Study* (VTA, 2006), and the *Valley Transportation Plan 2035* (VTA, 2009).

1.3.1.5 Construct Improvements at the U.S. 101/SR 129 Southbound Off-Ramp

A traffic signal will be installed at the intersection of the U.S. 101 southbound off-ramp and SR 129. The off-ramp will be widened to provide for a second right-turn lane, which will include minor improvements on SR 129 to receive this lane. In addition, an auxiliary lane of approximately 1,300 feet in length will be constructed in the southbound direction of U.S. 101, creating a 2-lane exit to SR 129.

1.3.1.6 Construct Frontage Roads

The proposed upgrade of U.S. 101 to freeway standards, which is described in Section 1.3.1.1, will require that all private and local access with U.S. 101 be closed and relocated to controlled interchanges. The loss of this access, which in most cases is the only access to/from adjacent properties, will be mitigated by the project's construction/realignment of the following frontage roads:

- Monterey Road will be extended to the south along the east side of U.S. 101. This roadway extension will run through the northeast quadrant of the U.S. 101/SR 25 interchange, then parallel to the UPRR tracks, then east across the UPRR tracks utilizing the existing SR 25 at-grade crossing, and terminate at the SR 25/Bloomfield Avenue intersection. The extension will include a crossing of Carnadero Creek on the bridge that is now used for northbound U.S. 101 traffic.
- The existing Monterey Frontage Road (also known as the Farman Frontage Road) that runs along the west side of U.S. 101 between Carnadero Creek on the south and Monterey Road on the north will be realigned to the west.

- Under Design Option A, a new frontage road will be constructed on the west side of U.S. 101, extending from Castro Valley Road on the north and connecting to the Old Monterey Road that provides access to the existing Granite Construction/Freeman Quarry. The new frontage road will include an intersection with the extended Santa Teresa Boulevard. Under Design Option B, this frontage road will not extend north of Santa Teresa Boulevard; instead, a joint use driveway will be constructed south of Castro Valley Road to provide replacement access to a number of properties.

- Betabel Road will be extended northerly from its current terminus on the south side of the Pajaro River. The extension will cross the Pajaro River on a new bridge and connect to an existing frontage road that parallels the west side of U.S. 101 north to Tar Creek. At this point, the frontage road will extend under the 101/Sargent bridges overcrossings and across Tar Creek on a new bridge to provide access to the property and utilities located on the east side of U.S. 101.⁹ A joint access driveway will extend north of this frontage road, terminating on the north side of Tick Creek.

1.3.1.7 *Grade-Separate the SR 25/UPRR Crossing*

SR 25 currently crosses the UPRR tracks “at-grade” just west of Bloomfield Avenue, meaning that traffic is halted when trains are passing. The project will construct a bridge to convey the realigned SR 25 over the UPRR tracks.

1.3.1.8 *Construct Bicycle Facilities*

Within the project limits, bicycle travel occurs in both the north-south and east-west directions. Because U.S. 101 is designated as an expressway between Monterey Street and the southern limits of Santa Clara County, and since there is no existing alternative bike route between SR 25 and SR 129, the north-south bicycle traffic is allowed to ride on the outside shoulders of U.S. 101 between Monterey Street and SR 129. The west-to-east bicycle traffic uses Mesa Road, the southbound U.S. 101 shoulder, the U.S. 101 to SR 25 off-ramp and then along the shoulder of SR 25. East-to-west bicycle traffic travels along the SR 25 shoulder, the SR 25 to U.S. 101 on-ramp, the northbound U.S. 101 shoulder, and exits at the Monterey Street interchange.

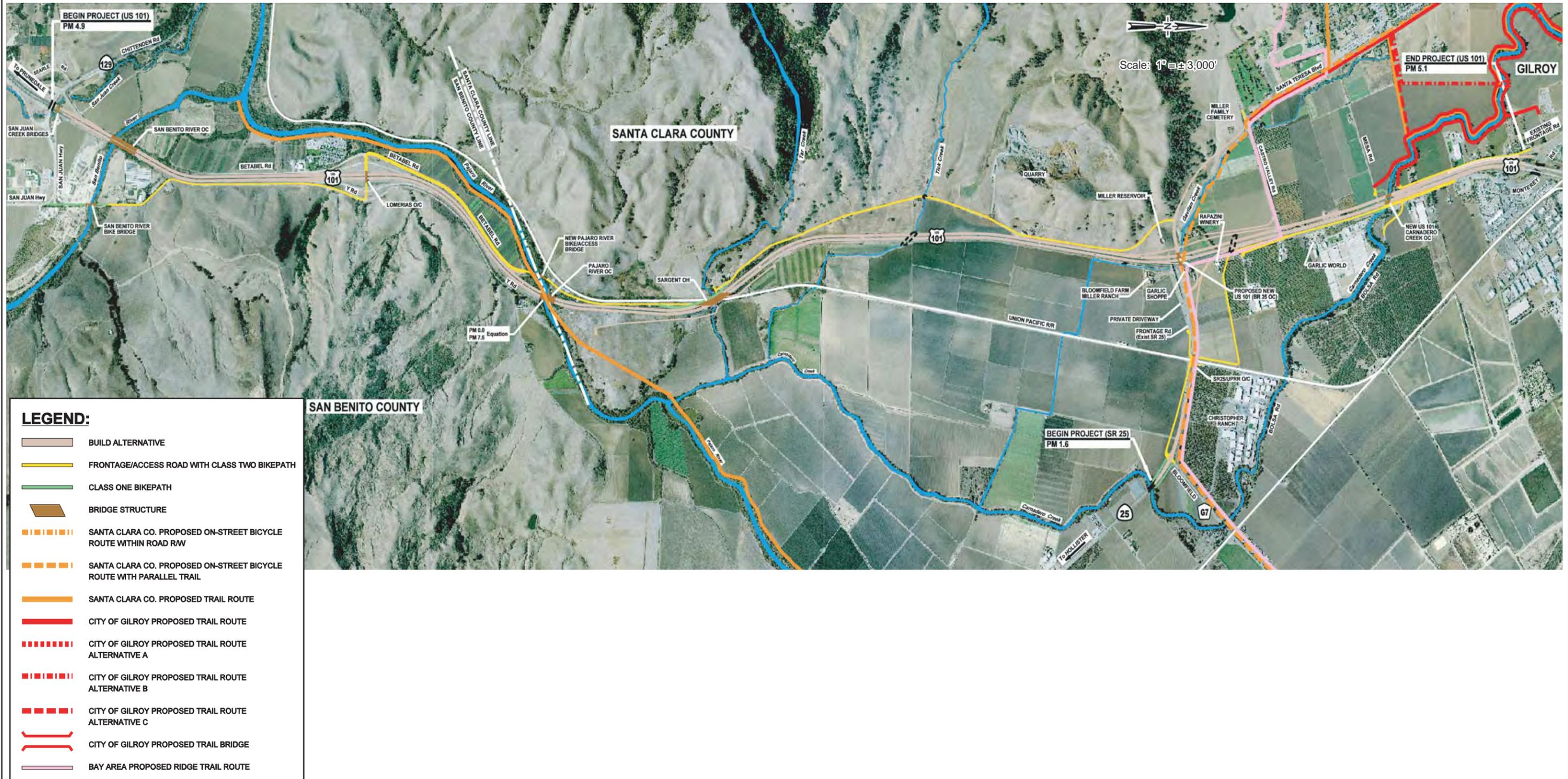
The project will eliminate bicycle access on U.S. 101 within the project limits, as well as access on SR 25 within the project limits. The project, therefore, includes replacement of north-south and east-west bicycle access, which is described below and illustrated on Figures 5 and 6.

⁹The existing U.S. 101 Sargent bridges include two U.S. 101 bridges (northbound and southbound) over the UPRR railroad and Tar Creek near Sargent Ranch. Under the proposed project, the northbound bridge will be removed and the southbound bridge will be widened to accommodate both northbound and southbound traffic. Therefore, the proposed project will include a single bridge at this location, known as the U.S. 101/Sargent bridge overcrossing.



PROPOSED BIKE AND TRAIL FACILITIES (ALTERNATIVE 1)

FIGURE 5



PROPOSED BIKE AND TRAIL FACILITIES (ALTERNATIVE 2)

FIGURE 6

North-South Bicycle Facilities

The north-south route will connect to Santa Teresa Boulevard on the north, which is a north-south roadway with Class 2 bike lanes.¹⁰ Between Santa Teresa Boulevard and Tar Creek, it will consist of Class 2 bike lanes on the existing and proposed frontage roads along the west side of U.S. 101. Bicyclists will cross Tar Creek and the UPRR on the U.S. 101/Sargent bridge overcrossing, separated from traffic by a barrier (i.e., a Class 1 bike path). Between Tar Creek and the U.S. 101/Betabel Road/Y Road interchange, there will be Class 2 bike lanes along Betabel Road, which as described above, will be extended over the Pajaro River. Beginning at the U.S. 101/Betabel Road/Y Road interchange, the bike route will transition to the east side of U.S. 101 via the overcrossing at the U.S. 101/Betabel Road/Y Road interchange, which will require the widening of the overcrossing by approximately 10 feet. Class 2 bike lanes will be constructed on Y road. South of the terminus of Y road, a Class 1 bike path will be constructed to the San Juan Highway, including a new bicycle bridge over the San Benito River.

East-West Bicycle Facilities

The east-west bicycle route will connect to Santa Teresa Boulevard on the west and SR 25 at Bloomfield Avenue on the east. Starting at a point east of the SR 25/Bloomfield Avenue intersection, there will be Class 1 bike lanes that run along both sides of SR 25 and under the Carnadero Creek bridge, which will allow non-motorized users to travel from one side of SR 25 to the other side without having to cross SR 25 traffic. These Class 1 bike lanes will connect to the extended Monterey Road (as described above) where they will become Class 2 bike lanes. West of the UPRR crossing, Monterey Road will be constructed around the perimeter of a proposed detention basin and will extend to the new U.S. 101/SR 25 interchange. At this point, two alternatives are being considered for connecting bike lanes to Santa Teresa Boulevard:

Under Design Option A, Alternative 1 will route bicyclists under U.S. 101 and the U.S. 101/SR 25 ramps via large box culverts that will be installed as part of the project for flood passage purposes (Figure 5). Alternative 2 will continue on Monterey Road along the east side of U.S. 101 between the new interchange and Carnadero Creek (Figure 6). The route will then cross under U.S. 101 along the south bank of Carnadero Creek, where it will connect to Mesa Road on the west side of U.S. 101. Alternative 2 avoids routing cyclists through long culverts under the freeway. However, the Alternative 2 alignment is approximately 1.2 miles longer than the Alternative 1 alignment.

Under Design Option B, the lack of vertical clearance in the culverts does not accommodate Alternative 1, and therefore only Alternative 2 is proposed.

¹⁰Bicycle facilities generally are categorized as follows: *Class 1* refers to a bike lane or path that is physically separated from vehicular traffic by open space or a barrier. *Class 2* is a lane on a roadway that is designated by striping, signing and pavement markings for the preferential or exclusive use of bicyclists. *Class 3* is commonly referred to as a bike route on an existing roadway wherein there are no markings or striping that delineate an area for the preferential or exclusive bicycle use.

1.3.1.9 *Other Project Features*

The project will include utility relocations, as necessary, to construct the above-described improvements. Where necessary to avoid or minimize impacts on adjacent properties and/or sensitive environmental resources, retaining walls will be utilized to reduce the amount of fill slopes, thereby reducing the footprint of the project. Lighting will be provided at interchange ramps in accordance with Caltrans' design standards. The project will also include the installation of landscaping in accordance with the policies of Caltrans. Metal beam guardrails or similar barriers will be installed, as needed, to preserve trees and vegetation located within 30 feet of the edge of the outside traffic lanes of the freeway, such vegetation that would otherwise need to be removed to comply with requirements for an object free safety/recovery zone.

1.3.1.10 *Right-of-Way Requirements*

Construction of the above-described improvements will necessitate the acquisition of a substantial amount of right-of-way. Most of the additional right-of-way required will be from properties located north of Tar Creek. South of Tar Creek, only minor right-of-way is needed (i.e., less than one acre total) from two parcels.

Based on preliminary designs, Table 3 provides data regarding the properties from which right-of-way will be needed for the project. The table includes information on the current use(s) of each property, the amount of right-of-way required, and the effects of the acquisition. In some cases, the required right-of-way will result in the demolition of residences or businesses; such information is also contained in Table 3. Please note that the data in Table 3 are preliminary and are subject to revision during the final design of the project.

1.3.1.11 *Construction Schedule*

The schedule for construction of the proposed project has not been determined because funding has not been secured. Further, recognizing the uncertainties associated with highway funding from various federal, state, and local programs, it is probable that the project will be constructed in phases as funding permits. Phasing is common on large capital improvement projects such as the proposed project.

If funding for the project or an initial phase of the project is secured in the near future, the soonest construction would commence would be in year ~~2013~~ 2015.

1.3.1.12 *Compatibility with Other Future Projects*

All of the above-described improvements will be designed so as to not preclude other planned and potential future regional and local highway projects, as well as potential future bicycle/pedestrian trail projects, in the vicinity. Such projects include the following:

TABLE 3
PRELIMINARY RIGHT-OF-WAY REQUIREMENTS

Assessor's Parcel Number	Property Address & Owner	Existing Land Use	Parcel Size (acres)	Right-of-Way Required (acres)		Notes
				Design Option A	Design Option B	
West Side of U.S. 101, listed north to south						
808-21-013	5885 Monterey Rd., Gilroy (Vatuone)	residential	4.7	0.1	0.1	Strip of right-of-way needed along the east edge of these parcels; no structures to be impacted.
808-21-014	Monterey Rd., Gilroy (Dean)	residential	1.4	0.1	0.1	
808-21-015	5825 Monterey Rd., Gilroy (Casino)	residential	3.2	0.1	0.1	
808-22-001	5815 Monterey Rd., Gilroy (Fonseca)	agricultural w/ residence	8.5	0.1	0.1	
808-22-002	5725 Monterey Rd., Gilroy (Galtman)	agricultural w/ residence	3.6	0.1	0.1	
808-22-003	5655 Monterey Rd., Gilroy (Rizutto)	residential	1.4	0.1	0.1	
808-22-012	5625 Monterey Rd., Gilroy (Rizutto)	commercial	2.1	0.1	0.1	
808-22-013	5355 Monterey Rd., Gilroy (Novartis Seeds)	commercial	12.3	0.2	0.2	
808-22-007	5365 Monterey Rd., Gilroy (Filice)	agricultural w/residence	23.8	1.8	1.8	
808-22-008	n/a (SCVWD)	open space next to Carnadero Creek	1.0	0.3	0.3	
808-22-009	n/a (Ljepava)	agricultural	41.6	0.8	0.8	
808-23-001	360 Mesa Road, Gilroy	agricultural	9.7	0.4	0.4	
808-23-002	5015 Monterey Rd., Gilroy (Milias)	agricultural	17.2	2.2	2.2	
808-23-003	4965 Monterey Rd., Gilroy (Borello)	agricultural w/ residence**	24.8	2.6	2.4	Residence & associated structures to be impacted

TABLE 3 [continued]

Assessor's Parcel Number	Property Address & Owner	Existing Land Use	Parcel Size (acres)	Right-of-Way Required (acres)		Notes
				Design Option A	Design Option B	
808-23-004	4395 Monterey Rd., Gilroy (Pelliccione)	agricultural w/ residence**	46.1	4.1	2.8	Residence & associated structures to be impacted.
808-23-005	55 Castro Valley Rd., Gilroy (Borello)	agricultural w/ residence & farmworker cottages**	49.2	7.9	3.4	Residence & associated structures & farmworker cottages to be impacted.
808-24-001	410 Mesa Rd., Gilroy (Chang)	agricultural**	17.9	0.4	0.4	
808-23-006	Santa Teresa Blvd., Gilroy (Gavilan College)	agricultural	0.5	0.4	0.1	
810-34-005	n/a (Castro Valley Properties)	agricultural**	60.7	40.2	9.9	
810-34-007	Santa Teresa Blvd. (Castro Valley Properties)	agricultural**	77.9	1.3	4.1	
810-35-008	4355 Monterey Rd., Gilroy (Wingens)	agricultural w/residence**	41.3	7.9	16.4	Residence/event center will not be impacted.
810-35-007	3201 Monterey Rd. (Castro Valley Properties)	agricultural w/residence & barn**	1,186.6	13.1	14.2	Barn will be impacted; residence will not be impacted.
810-35-004	3405-A Monterey Rd. Gilroy	agricultural	29.5	8.1	8.1	
810-38-002	Monterey Rd., Gilroy	agricultural**	17.3	10.0	10.0	
810-38-017	2775 Monterey Rd., Gilroy (Sargent Ranch)	agricultural**	325.1	1.1	1.1	
13-110-009	n/a (Rancho Gavilan)	open space	2.4	2.4	2.4	
n/a	strip of land owned by San Benito County between Betabel Road and U.S. 101			0.2	0.2	
12-010-024	Chittenden Rd. (Lavagnino)	agricultural	74.9	0.5	0.5	

TABLE 3 (continued)

Assessor's Parcel Number	Property Address & Owner	Existing Land Use	Parcel Size (acres)	Right-of-Way Required (acres)		Notes
				Design Option A	Design Option B	
East Side of U.S. 101, listed north to south						
841-14-029	5530 Monterey Rd., Gilroy (Panchal)	commercial	3.2	0.1	0.1	Existing buildings on these parcels will not be impacted.
841-14-027	n/a (Filice)	agricultural	28.2	0.2	0.2	
841-14-026	5480 Monterey Rd., Gilroy (Filice)	residential	1.0	0.1	0.1	
841-31-014	5400 Monterey Rd., Gilroy (Fortino)	residential	2.5	0.1	0.1	
841-31-021	5350 Monterey Rd. (Uchida Greenhouses)	commercial	20.0	0.1	0.1	
841-31-019	n/a (Barberi)	agricultural w/ residence	20.9	1.1	1.1	
841-31-002	Bolsa Road (Powell)	open space	4.4	0.1	0.1	
841-32-001	5020 Monterey Rd. (Headstart Nursery)	agricultural	37.0	0.1	0.1	
841-32-004	4680 Monterey Rd., Gilroy (Borello)	agricultural**	19.5	0.1	0.0	
841-32-005	4590 Monterey Rd., Gilroy (Borello)	agricultural**	19.1	0.3	0.0	
841-32-015	4420 Monterey Rd., Gilroy (Santos)	agricultural w/ residence	46.1	2.8	1.8	Residence & cherry stand to be impacted.
841-32-016	4450 Monterey Rd., Gilroy (Santos)	residential	5.0	0.8	0.0	Residence will not be impacted.
841-32-008	Monterey Rd., Gilroy (Santos)	agricultural	9.8	2.0	0.5	
841-32-009	4360 Monterey Rd., Gilroy (Santos)	agricultural & commercial	11.8	4.6	1.0	Buildings (Rapazzini Winery) to be impacted.
841-32-010	4350 Monterey Rd., Gilroy (Two Youths)	commercial	0.5	0.5	0.2	

TABLE 3 (continued)

Assessor's Parcel Number	Property Address & Owner	Existing Land Use	Parcel Size (acres)	Right-of-Way Required (acres)		Notes
				Design Option A	Design Option B	
841-32-011	4340 Monterey Hwy., Gilroy (Torres)	agricultural	28.9	28.9	28.9	
841-32-013	n/a (Filice Estate Vineyards)	agricultural & commercial	19.0	19.0	19.0	Buildings (Garlic Shoppe) to be impacted.
841-32-014	4310 Monterey Hwy. (Filice Estate Vineyards)	commercial	1.2	0.3	1.2	
841-33-008	415 Bloomfield Ave. (Christopher Ranch)	agricultural**	59.8	3.5	3.2	
841-35-002	200 Bloomfield Ave., Gilroy (Pura)	agricultural**	25.8	0.3	0.3	
841-35-003	Bloomfield Ave., Gilroy (Pura)	agricultural**	175.4	2.4	2.3	
841-35-004	n/a (Young)	agricultural**	123.9	3.5	3.5	
841-34-002	n/a (Bloomfield Ranch)	agricultural	264.7	5.5	5.5	
841-36-016	n/a (JB Ltd Partnership)	agricultural**	231.5	0.1	0.1	
841-36-019	n/a (JB Ltd Partnership)	agricultural**	32.6	5.4	5.4	
n/a	n/a (SCVWD)	Camadero Creek		0.4	0.4	
841-36-013	n/a (Sargent Ranch)	agricultural**	120.0	1.7	1.7	
n/a	strip of land owned by San Benito County between Y Road and U.S. 101			0.2	0.2	
Totals:				190.8	159.5	
Notes:						
1. Information in this table is preliminary and is subject to minor revision during final design.						
2. SCVWD = Santa Clara Valley Water District						
3. ** = parcel is under California Land Conservation (Williamson) Act contract.						

- Upgrade/widening of SR 25 to a 4-lane expressway between the UPRR crossing (just west of Bloomfield Avenue) and San Felipe Road in Hollister
- Widening of U.S. 101 to eight lanes, to extend high occupancy vehicle (HOV) lanes from Cochrane Road to SR 25
- Possible realignment of SR 152 (East) to provide a more direct connection between the SR 152/SR 156 and U.S. 101/SR 25 interchanges
- Extension of Mesa Road over U.S. 101, to connect to Bolsa Road
- Future trails identified in the *Santa Clara County Countywide Trails Master Plan* (see Section 2.1.2.2 for a discussion of this topic)

1.3.2 Transportation System Management (TSM) and Transportation Demand Management (TDM) Alternatives

Transportation systems management (TSM) strategies increase the efficiency of existing facilities by accommodating a greater number of vehicle trips on a facility without increasing the number of through lanes. Transportation demand management (TDM) focuses on regional means of reducing the number of vehicle trips and vehicle miles traveled (VMT), as well as increasing vehicle occupancy.

The project need could not be adequately satisfied by reasonable TSM and TDM strategies. The project is located in a rural area that is not served by existing or future high capacity transit systems that would have the capacity to lure motorists out of their vehicles in sufficient numbers so as to eliminate the need for the project. Likewise, neither ramp metering nor the provision of auxiliary or HOV lanes would provide sufficient benefit and none of these improvements would address the deficiencies of the existing U.S. 101/SR 25 interchange.

Although TSM and TDM measures alone could not satisfy the purpose and need for the project, the following TSM and TDM measures have been incorporated into the Build Alternative for this project:

- To increase the efficiency of the freeway system during peak travel periods, ramp metering equipment will be installed on the on-ramps at the reconstructed U.S. 101/SR 25 interchange.
- The 70-foot median width for U.S. 101 north of SR 25 will accommodate HOV lanes that are planned for U.S. 101 between Cochrane Road and SR 25 in the future.
- The new bicycle facilities that will be constructed as part of the project (see Section 1.3.1.8) will facilitate bicycle travel.

1.3.3 No Build Alternative

The No Build Alternative would consist of not constructing the project, which would avoid the environmental impacts of the project, as described in this document. However, the No Build Alternative would not meet any of the purposes of the project, which are listed in Section 1.2.1. Under the No Build Alternative, projected increases in traffic would cause congestion to worsen and the existing problems that are described in Section 1.2.2 would be exacerbated. For additional information on future traffic conditions in the project area under the No Build Alternative, please see Section 2.6.2.5.

1.3.4 Comparison of Alternatives

This section highlights the differences between the Build Alternative, including the two design options, and the No Build Alternative. Key similarities and differences are also highlighted in Table 4.

Under the Build Alternative, the primary difference between Design Option A and Design Option B is the location of the reconstructed U.S. 101/SR 25 interchange. Under Design Option A, the interchange would be reconstructed approximately 0.2 miles north of its existing location, while under Design Option B, the interchange would be reconstructed at essentially the same location as the existing facility. Both interchange design options would continue to allow all traffic movements between U.S. 101 and SR 25, and both options would include the connection to Santa Teresa Boulevard.

Under the No Build Alternative, none of the purposes and needs would be met. Under the Build Alternative, both design options would meet the purposes and needs equally.

As shown in Table 4, for many of the project design features and the majority of the environmental impacts, the differences between Design Options A and B are not substantial. There are several categories, however, where the differences between the two design options are more substantial, and these are summarized as follows:

- ▣ **Amount of Right-of-Way Needed for Project:** The amount of additional right-of-way needed to construct the project under Design Option A is approximately 191 acres, as compared to approximately 160 acres under Design Option B.
- ▣ **Impacts to Prime and Unique Farmlands:** Direct impacts to lands designated as Prime Farmland or Unique Farmland will total approximately 157 acres under Design Option A, as compared to approximately 122 acres under Design Option B.
- ▣ **Construction Phasing:** Design Option A cannot be phased into smaller construction packages and, therefore, requires a large initial phase investment to reconstruct the U.S. 101/SR 25 interchange. In contrast, Design Option B can be phased into smaller construction packages and, therefore, requires a smaller initial investment.

TABLE 4

COMPARISON OF ALTERNATIVES

	Build Alternative with Design Option A for U.S. 101/SR 25 Interchange	Build Alternative with Design Option B for U.S. 101/SR 25 Interchange	No Build Alternative
Summary of Highway Improvements	Widen 101 to 6 lanes between Monterey St. & SR 129; upgrade 101 to freeway including frontage roads; construct grade-separation on SR 25 at UPRR; extend Santa Teresa Blvd. to 101/25 interchange; construct improvements at 101/129 SB off-ramp; reconstruct 101/25 interchange 0.2 miles north of existing interchange.	Widen 101 to 6 lanes between Monterey St. & SR 129; upgrade 101 to freeway including frontage roads; construct grade-separation on SR 25 at UPRR; extend Santa Teresa Blvd. to 101/25 interchange; construct improvements at 101/129 SB off-ramp; reconstruct 101/25 interchange at same location as existing interchange.	No improvements
Summary of North-South Bicycle Improvements	From Santa Teresa Blvd. to San Juan Hwy, construct a combination of new Class 1 bike paths and Class 2 bike lanes along frontage roads, Betabel Rd., and Y Rd. Same improvements under both design options.		No improvements.
Summary of East-West Bicycle Improvements	From Santa Teresa Blvd. to SR 25 at Bloomfield Ave., construct a combination of new Class 1 bike paths and Class 2 bike lanes; there are two alternatives being considered for segment between 101/25 & Santa Teresa Blvd.	From Santa Teresa Blvd. to SR 25 at Bloomfield Ave., construct a combination of new Class 1 bike paths and Class 2 bike lanes.	No improvements.
Cost	\$ 482 million	\$ 487 million	\$ 0
Ability to Meet Purpose & Need	Both design options meet the purpose and need equally.		Does not meet the purpose & need
Overall changes in traffic patterns	Connecting Santa Teresa Blvd. to 101/25 interchange will shift some traffic from Monterey St. in Gilroy to Santa Teresa Blvd. Same effect under both design options.		No change

TABLE 4 [continued]

	Build Alternative with Design Option A for U.S. 101/SR 25 Interchange	Build Alternative with Design Option B for U.S. 101/SR 25 Interchange	No Build Alternative
Effect on existing congestion & delay	Reduction in congestion, delay and peak-period travel times. Similar benefit under both design options.		Congestion will worsen over time as planned growth continues.
Relocations	4 residences and 2 businesses. Same impact under both design options.		None
Right-of-Way Needed for Project	Total of approximately 191 acres from 56 properties.	Total of approximately 160 acres from 53 properties	None
Growth-inducing Impacts	Significant impact if and when the application for the El Rancho San Benito (ERSB) project is resubmitted and the approval of ERSB is conditioned upon the widening of U.S. 101. Same impact under both design options.		None
Prime & Unique Farmland Impacts	156.8 acres	121.8 acres	None
Williamson Act Lands to be Impacted	105.1 acres	77.6 acres	None
Floodplain Impacts	Project lies within multiple floodplains. Design includes a combination of pipes, culverts, channels, and detention basins to avoid adverse flooding impacts. Similar effect under both design options.		Historical flooding of 101 will continue; no change from existing.
View of Diablo Range from Vicinity of Residence & Business	Significant <u>and Unavoidable</u> Impact	Less-than-Significant Impact	No impact
Visual Impact near Event Center in Vicinity of 101/25	Less-than-Significant Impact	Significant Impact	No impact

TABLE 4 [continued]

	Build Alternative with Design Option A for U.S. 101/SR 25 Interchange	Build Alternative with Design Option B for U.S. 101/SR 25 Interchange	No Build Alternative
Impacts to Archaeological Resources	There are 13 known archaeological sites within the project's footprint. Depending on final design, many of these sites will likely be impacted. Same impact under both design options.		No impact
Impacts to Paleontological Resources	There are locations within the project limits that are likely to contain significant paleontological resources. If present, the project could impact these resources and could destroy fossils. Same impact under both design options.		No impact
Changes in Noise Levels Compared to Existing Conditions	+1 dBA to +9 dBA	-1 dBA to +9 dBA	No Change
Increase in Impervious Surfaces	75.5 acres	73.6 acres	None
Noise Abatement Soundwalls Proposed?	No	No	No
Permanent Impacts to Riparian Habitat	8.0 acres	8.0 acres	None
Permanent Impacts to Wetlands and Aquatic Habitat	2.98 acres	3.22 acres	None
Permanent Impacts to Oak Woodland Habitat	2.0 acres	1.5 acres	None
Construction Impacts	Noise and dust may be substantial but will be avoided/minimized. Same impact under both design options.		None
r/w = right-of-way SB = southbound			

- ▶ **Construction Staging:** Design Option A will have less construction staging issues than Design Option B because it is located farther from the existing interchange.
- ▶ **U.S. 101/SR 25 Interchange Traffic Operations:** Under Design Option A, northbound SR 25 to southbound U.S. 101 traffic is put through a loop on-ramp instead of having to make a left turn. Under Design Option B, left-turn pockets are needed at both ends of the bridge to accommodate the left-turning traffic onto southbound and northbound U.S. 101.

~~After the public circulation period, all comments will be considered, and VTA, in cooperation with Caltrans, will select a preferred design option and make the final determination of the project's effect on the environment. In accordance with CEQA, VTA will certify that the project complies with CEQA, prepare findings for all significant impacts identified, prepare a Statement of Overriding Considerations for impacts that will not be mitigated below a level of significance, and certify that the findings and Statement of Overriding Considerations have been considered prior to project approval. VTA will then file a Notice of Determination with the State Clearinghouse and the Santa Clara County Clerk-Recorder that will identify whether the project will have significant impacts, if mitigation measures were included as conditions of project approval, that findings were made, and that a Statement of Overriding Considerations was adopted.~~

Identification of a Preferred Alternative

On May 7, 2013, the U.S. 101 Improvement Project Development Team (PDT), consisting of VTA and Caltrans design, environmental, and management staff and consultants, met to identify a preferred alternative. The PDT identified the Build Alternative Design Option B as the preferred alternative, with a recommendation to the VTA Board of Directors (i.e., the decision-making body of the Lead Agency) that Build Alternative Design Option B be approved. The PDT also recommended the approval of Bike Alternative 2. This recommendation was made after considering comments from outside agencies and the public, as well as input from the PDT itself. Relevant factors that led to this recommendation include the following:

- ❑ The Build Alternative Design Option B meets the purpose and need for the project, whereas the No Build Alternative does not meet the purpose and need.
- ❑ The amount of right-of-way needed to construct the project under Design Option B is approximately 160 acres, as compared to approximately 191 acres under Design Option A.
- ❑ Direct impacts to lands designated as Prime Farmland or Unique Farmland is approximately 122 acres under Design Option B, as compared to approximately 157 acres under Design Option A.
- ❑ Design Option A cannot be phased into individual construction packages and, therefore, requires a large initial investment to reconstruct the U.S. 101/SR 25 interchange. In contrast, Design

Option B can be phased into individual construction packages and, therefore, requires a smaller initial investment.

- The Bay Area Ridge Trail Council, Central Coast Regional Water Quality Board, Council of San Benito County Governments, and members of the public have stated preference for Design Option B due to less environmental impacts overall. No commentor on the Draft EIR indicated preference for Design Option A.
- The National Park Service, Bay Area Ridge Trail Council, Santa Clara County Open Space Authority, and Santa Clara County Parks and Recreation have stated preference for Bike Alternative 2. No commentor on the Draft EIR indicated preference for Bike Alternative 1.

If the VTA Board of Directors approves the project, it will include the adoption of a Mitigation Monitoring Plan, Findings, and a Statement of Overriding Considerations, as required under CEQA. A CEQA Notice of Determination will be filed with the State Clearinghouse and the Santa Clara County Clerk-Recorder.

1.3.5 Alternatives Considered but Eliminated from Further Discussion

The purposes of the project, as described in Section 1.2.1, consist of safety and operational improvements to the U.S. 101 highway facility, which is an existing major north-south transportation route in California. As such, the various alternatives that were evaluated focused on design options for achieving these purposes through various improvements to U.S. 101 itself. Alternatives such as constructing a new highway in a different corridor were not evaluated since they would not meet the basic project objectives and purposes.

1.3.5.1 Outside Widening of U.S. 101 between SR 25 and Monterey Street

When compared to the proposed project, this design option would involve outside widening on both sides of existing U.S. 101, in lieu of the westerly shift of U.S. 101 between the U.S. 101/SR 25 and U.S. 101/Monterey Street interchanges to add one more through lane and one auxiliary lane in each direction. This alternative was studied as a way to minimize the construction footprint of the proposed project. Although this design option would achieve the same objectives as the proposed project in enhancing traffic operations, reducing congestion, and improving safety, it impacts a large number of businesses and requires the relocation of major utilities located east of U.S. 101, thus increasing the project costs significantly. It also precludes future plans to build carpool or HOT lanes in the existing median of U.S. 101 due to width limitations.

1.3.5.2 Easterly Widening of U.S. 101, South of SR 25

This design option would involve outside widening on both sides of existing U.S. 101 between SR 25 and the Tar Creek crossing (U.S. 101/Sargent bridges) to add one more through lane in each direction.

Similar to the option discussed above, this design option was studied as a way to minimize the construction footprint of the proposed project. Although this design option would achieve the same objectives as the build alternative in enhancing traffic operations, reducing congestion, and improving safety, it was determined that it is not feasible because it would directly impact the Bloomfield Ranch, which is a significant historic resource that is eligible for the *National Register of Historic Places*. Further, this option would impact an archaeological site that was identified during the cultural resources investigation phase, thus increasing the project environmental impacts significantly. Unless significant design exceptions can be approved, this option will also preclude future plans to widen U.S. 101 in the median due to the lack of sufficient width.

1.3.5.3 *Widen Northbound U.S. 101 into the Existing Median between SR 25 and Tar Creek*

This design option would widen existing U.S. 101 northbound into the median between Tar Creek (U.S. 101/Sargent bridges) and the reconstructed U.S. 101/SR 25 interchange, which would leave an existing median width of approximately 31 feet. This design option has a smaller overall footprint, and therefore a lesser environmental impact, than the proposed project. However, it was rejected since a 31-foot median width would be unacceptable because 1) it would require design exceptions to median shoulder widths standards when/if the freeway is widened to 8 lanes south of SR 25, and 2) it would not be consistent with the 46-foot median width south of Tar Creek. The standard width for freeway medians in rural areas is 62 feet and discussions with Caltrans' engineers resulted in a determination that the minimum acceptable median width is 46 feet at this location.

1.3.5.4 *Alternative Median Widths on U.S. 101 between Tar Creek and SR 129*

Under the proposed project, the median width on U.S. 101 between Tar Creek (Sargent Overhead) and SR 129 will be 46 feet. This design option explored alternative median widths of 22 feet, 36 feet, and 62 feet.

The 22-foot wide median has the advantage of having a smaller footprint than the proposed project, which in turn reduces environmental impacts. However, this design was rejected because the width is substantially below the 62-foot design standard for rural freeways and because it would preclude the construction of future lanes in the median.

The 62-foot wide median has the advantage of meeting the Caltrans Highway Design Manual standards for freeway median width in rural areas. However, it would have a larger footprint than the proposed project and would require extensive right-of-way acquisition. The larger footprint would also result in significantly greater archaeological, biological, floodplain, and visual impacts. Finally, this design would significantly increase the project's capital construction cost.

A 36-foot wide median was also considered. That option was rejected because it would require a mandatory design exception for non-standard shoulder widths when future median widening (i.e., adding one more lane in each direction) is needed. In other words, the ability to undertake the future median

widening would be questionable because the width of the shoulders would be only five feet instead of the ten foot width that is the design standard.

1.3.5.5 *Construct a Separate U.S. 101/Santa Teresa Boulevard Interchange*

This design option would extend Santa Teresa Boulevard south from its current terminus at Castro Valley Road through a new frontage road that runs behind Miller Reservoir and ties into Old Monterey Road, where a proposed second interchange would be built approximately 1.3 miles south of the reconstructed U.S. 101/SR 25 interchange. This design option was considered because it has the advantage of separating local (i.e., Santa Teresa Boulevard) traffic from freeway-to-freeway traffic. This design option was rejected because 1) it requires significant right-of-way acquisition; 2) it has a large environmental footprint that would require a significant amount of mitigation; 3) it does not meet the minimum interchange spacing requirement¹¹, which would potentially impact traffic operations; and 4) it would be less desirable by the local communities due to the extended length of travel distance needed to get from Santa Teresa Boulevard to SR 25.

1.3.5.6 *Reconstruct U.S. 101/SR 25 Interchange without Santa Teresa Boulevard Connection*

The project initially considered a design for the reconstruction of the U.S. 101/SR 25 interchange that did not include the Santa Teresa Boulevard connection. This proposal generated significant opposition from local residents and businesses, the City of Gilroy, and Santa Clara County. This design option was rejected in response to the comments received during the public scoping meeting that was held in November 2007. In addition, the Santa Teresa Boulevard connection to the U.S. 101/SR 25 interchange was included in the project as it is identified in the *City of Gilroy General Plan*, the *Southern Gateway Transportation and Land Use Study* (VTA, 2006), and the *Valley Transportation Plan 2035* (VTA, 2009).

1.4 PERMITS AND APPROVALS NEEDED

Construction of the proposed project will require permits/approvals from the governmental agencies listed in Table 5.

¹¹FHWA and Caltrans have criteria that establish minimum distances between adjacent interchanges on a freeway. These minimums are designed to avoid the operational problems that occur as vehicles are merging on and off a freeway within relatively short distances.

TABLE 5
PERMITS AND APPROVALS NEEDED

Agency	Permit/Approval	Status
City of Gilroy	Encroachment permit for work extending onto local streets within Gilroy.	Application to be submitted during final design.
Santa Clara County	Encroachment permit for work extending onto local streets in unincorporated areas of Santa Clara Co.	Application to be submitted during final design.
San Benito County	Encroachment permit for work extending onto local streets in unincorporated areas of San Benito Co.	Application to be submitted during final design.
Santa Clara Valley Water District	Permit for work in Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, and Pajaro River.	Application to be submitted during final design.
San Benito County Water District	Permit for work in Pajaro River, Murphy Creek, San Benito River, and San Juan Creek.	Application to be submitted during final design.
California Public Utilities Commission	Permit for any work affecting the UPRR crossings at Tar Creek/U.S. 101 & SR 25.	Application to be submitted during final design.
National Marine Fisheries Service	Section 7 Consultation for Threatened and Endangered Species; Review and Comment on 404 Permit.	Consultation to be undertaken by U.S. Army Corps of Engineers during processing of Section 404 permit.
U.S. Fish & Wildlife Service	Section 7 Consultation for Threatened and Endangered Species; Review and Comment on 404 Permit.	
U.S. Army Corps of Engineers	Section 404 permit for temporary and/or permanent work in low-flow channels of Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, Murphy Creek, San Benito River, and San Juan Creek.	Application to be submitted during final design.
Regional Water Quality Control Board	Section 401 Water Quality Certification for temporary and/or permanent work in low-flow channels of Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, Murphy Creek, San Benito River, and San Juan Creek.	Application to be submitted during final design.
California Department of Fish & Wildlife	Streambed Alteration Agreement for work in Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, Murphy Creek, San Benito River, and San Juan Creek; Incidental Take Permit for impacts to endangered/threatened species	Application to be submitted during final design.

CHAPTER 2 **AFFECTED ENVIRONMENT, ENVIRONMENTAL CONSEQUENCES, & AVOIDANCE, MINIMIZATION, AND/OR MITIGATION MEASURES**

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

- *Parks and Recreational Facilities:* There are no parks or recreational facilities within or adjacent to the project impact area. The alignments for a number of planned trails do, however, cross the U.S. 101 corridor. The project's consistency with the future trails is discussed in Section 2.1.2.2.
- *Timberlands:* There are no timberlands located in the project vicinity.
- *Community Cohesion:* The project will construct improvements to an existing highway. The improvements will not divide any community or neighborhood.
- *Coastal Zones:* The project site is not within or near areas covered by the Coastal Zone Management Act of 1972.
- *Wild and Scenic Rivers:* There are no waterways designated as Wild and Scenic Rivers in the project area. The closest rivers with this designation are over 100 miles from the project area.
- *Energy:* When balancing energy used during construction and operation against energy saved by relieving congestion and improving other transportation efficiencies, the project would not have substantial energy impacts.

HUMAN ENVIRONMENT

2.1 LAND USE

2.1.1 Existing and Future Land Use

Existing Land Use

The project is located in a rural/agricultural area of southern Santa Clara County/northern San Benito County. As shown on Figure 3, land uses along the project segment of U.S. 101 are predominantly associated with agriculture and grazing. Other land uses include low-density residential and commercial.

At the northerly end of the project, in the area adjacent to the U.S. 101/Monterey Street interchange, existing land uses are primarily commercial on the east side of U.S. 101 and primarily low-density residential on the west side of U.S. 101. The commercial uses include restaurants, service stations, a motel (National 9 Inn), and a recreational vehicle (RV) Park (Garlic Farm RV Park).

In the vicinity of the U.S. 101/SR 25 interchange, the primary land use is agricultural. Other land uses include a number of single-family residences and several commercial uses related to agricultural (e.g., a cherry stand, Rapazzini Winery, the Garlic Shoppe, and Garlic World). Approximately on-half mile west of this location, adjacent to the southerly end of Santa Teresa Boulevard, is Gavilan College.

South of the U.S. 101/SR 25 interchange, the existing land use is almost entirely agricultural and grazing. One exception is a rock and sand quarry (Freeman Quarry) that is located approximately 1,500 feet west of U.S. 101, 0.7 miles south of the U.S. 101/SR 25 interchange. Another exception is a RV park (Betabel RV Park) that is located along the west side of U.S. 101 adjacent to the Betabel Road/Y Road interchange.

Several commercial uses, as well as a number of single-family residences, are located at the southerly end of the project in the area adjacent to the U.S. 101/SR 129 interchange.

The UPRR parallels the project segment of U.S. 101. South of Tar Creek, the tracks are on the west side of U.S. 101, and north of this location the tracks are on the east side of U.S. 101. This UPRR line is one of the primary north-south rail lines in California and it carries both passenger and freight traffic.

Future Land Use

At the time this EIR was prepared, there were no proposed or approved projects that would change the land uses on parcels located along the project segment of U.S. 101. [Note: An application for a proposed development on an approximately 5,800-acre site located on the west side of U.S. 101, south of SR 25, was filed with San Benito County. If approved, the project, known as the El Rancho San Benito Specific Plan, would have included up to 6,800 residences, 550,000 square feet of commercial uses, and 1.1 million square feet of employment uses. In May of 2009, the application for this project was withdrawn and the project is no longer being considered by the County. See also Section 2.2, *Growth*.]

There is one development application on file that would expand an existing land use adjacent to U.S. 101. The application would increase the size of the existing Freeman Quarry from 60 acres to 120 acres.

Although there are no proposed changes in land use on the parcels located along the project segment of U.S. 101, regional growth is projected to continue. Table 6 summarizes projected growth in both population and employment at the regional, county, and local levels, and the data show that substantial growth in both population and employment is projected throughout the region over the next 30 years. In Santa Clara County, population and employment growth between 2005 and 2035 is projected to be 38% and 62%, respectively. During this same period, population and employment growth in San Benito

TABLE 6

PROJECTED POPULATION AND EMPLOYMENT GROWTH

	Population			Employment		
	2005	2035	% Change	2005	2035	% Change
Monterey Bay Area	740,000	920,700	24	326,300	404,300	24
San Francisco Bay Area	7,096,500	9,073,700	28	3,449,700	5,107,400	48
San Benito County	57,300	94,700	65	16,900	21,700	28
Santa Clara County	1,763,000	2,431,400	38	872,900	1,412,600	62
City of Gilroy	48,200	69,600	44	17,400	26,400	52
City of Hollister	37,000	62,800	70	10,500	13,900	32

Notes:

- The Monterey Bay Area consists of Monterey, San Benito, and Santa Cruz Counties.
- The San Francisco Bay Area consists of Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, Santa Clara, Solano, and Sonoma Counties.
- All numbers are rounded to the nearest 100.

Sources: *Projections 2009* (Association of Bay Area Governments); *Monterey Bay Area 2008 Regional Forecast* (Association of Monterey Bay Area Governments).

County is projected to be 65% and 28%, respectively. The growth that is projected to occur will result in increased demand on services, utilities, and public infrastructure, including highways. This increased demand is reflected in the year 2035 traffic volumes that are shown in Section 2.6, *Transportation and Traffic*.

2.1.2 Environmental Consequences of the Build Alternative

2.1.2.1 *Land Use Changes*

Although the proposed project will construct improvements to an existing highway facility, the improvements will necessitate the acquisition of additional right-of-way from numerous parcels (see Table 3). In many cases, the right-of-way needed for the project would affect only a portion of a given parcel and the existing land use would remain viable and intact. In some cases, however, the entire

parcel would be acquired for the project and the existing land use would be removed. In other cases, while only part of the parcel will be acquired, the portion being acquired will impact the underlying land use. Table 7 lists those properties where the project would result in the existing land use being changed to highway purposes.

Although the project will require the acquisition of the four residences and three businesses listed in Table 7, it will not have the effect of physically dividing an established community. The existing U.S. 101 facility, as well as the UPRR that parallels U.S. 101, already function as a divide between the land uses located in this area. The affected residences and businesses are scattered along both sides of U.S. 101.

The owners of any properties acquired for project right-of-way will be compensated for the loss and/or use in accordance with Federal and State right-of-way requirements. Caltrans' relocation benefits are summarized in Appendix C of this document.

Indirect land use impacts such as noise and visual/aesthetics are discussed under their own headings in this document.

Impact LU-1: The project will not physically divide an established community. **[No Impact]**

2.1.2.2 Consistency with State, Regional, and Local Plans and Programs

Highway Plans and Policies

The project is listed in, and therefore consistent with, VTA's *Valley Transportation Plan 2035*, which is the transportation plan for Santa Clara County that was adopted in January 2009.¹²

The portion of the project within San Benito County is listed in the 2010 *San Benito County Regional Transportation Plan*.¹³

The project includes the extension of Santa Teresa Boulevard to the U.S. 101/SR 25 interchange, an improvement project that is identified in both the *Gilroy General Plan* and the *Southern Gateway Transportation and Land Use Study* (VTA, 2006).

¹²The portion of the project between Monterey Street and SR 25, including the extension of Santa Teresa Boulevard, is listed in *VTP 2035* as Project H18. The portion of the project between SR 25 and SR 129 is listed in *VTP 2035* as Project H56.

¹³It is identified in the Plan as Project # Cal-6, Widening of U.S. 101 to a 6-lane Freeway from the Santa Clara County to SR 156. [Note: These limits are slightly larger than the proposed project as SR 156 is located 1.7 miles south of SR 129.]

TABLE 7

LAND USE CHANGES RESULTING FROM THE PROJECT

Assessor's Parcel Number	Property Address	Existing Land Use	Parcel Size (acres)	Right-of-Way Required (acres)		Land Use Change
				Design Option A	Design Option B	
808-23-003	4965 Monterey Rd., Gilroy	agricultural w/ residence	24.8	2.6	2.4	Residence & associated structures to be acquired; agriculture use to remain.
808-23-004	4395 Monterey Rd., Gilroy	agricultural w/ residence	46.1	4.1	2.8	Residence & associated structures to be acquired; agriculture use to remain.
808-23-005	55 Castro Valley Rd., Gilroy	agricultural w/ residence & farmworker cottages	49.2	7.9	3.4	Residence & associated structures & farmworker cottages to be acquired; agriculture use to remain.
810-35-007	3201 Monterey Rd., Gilroy	agricultural w/residence & barn	1,186.6	13.1	14.2	Barn will be acquired; residence will not be impacted; agriculture use to remain.
841-32-015	4420 Monterey Rd., Gilroy	agricultural w/ residence	46.1	2.8	1.8	Residence & cherry stand to be acquired; agriculture use to remain.
841-32-009	4360 Monterey Rd., Gilroy	agricultural & commercial	11.8	4.6	1.0	Buildings (Rapazzini Winery) to be acquired; agriculture use to remain on residual portion of 841-32-009.
841-32-010	4350 Monterey Rd., Gilroy	commercial	0.5	0.5	0.2	
841-32-011	4340 Monterey Hwy., Gilroy	agricultural	28.9	28.9	28.9	Agriculture use to be impacted.
841-32-013	n/a	agricultural & commercial	19.0	19.0	19.0	Buildings (Garlic Shoppe) to be acquired.
841-32-014	4310 Monterey Hwy., Gilroy	commercial	1.2	0.3	1.2	

Note: Information in this table is preliminary and is subject to minor revision during final design.

There are a number of transportation-related policies in the *Santa Clara County General Plan* that are relevant to the proposed project. The policies support the expansion of the County's transportation network to meet projected demand, recognizing the importance of transportation to a healthy economy and the quality of life for residents. The *General Plan* does not contain a list of specific roadway improvements, but instead contains policies that support the implementation of VTA's *Valley Transportation Plan 2035*.

The Transportation Element of the *San Benito County General Plan* (1994) contains a policy that supports the preparation of a countywide transportation master plan, so as to identify transportation needs within the County. The 2010 *San Benito County Regional Transportation Plan*, which is referenced above, and which identifies the proposed project as a needed improvement, fulfills this policy of the General Plan. The project is, therefore, consistent with the *San Benito County General Plan*.

Bicycle Plans and Policies

The *Gilroy General Plan*, *Santa Clara County General Plan*, *San Benito County General Plan*, and VTA's *Valley Transportation Plan 2035* all contain policies that promote the completion of the planned bicycle network to facilitate bicycling for both commuting and recreational purposes. In addition, Section 888 of the California Streets and Highways Code states that Caltrans will not construct a State highway as a freeway that will result in the severance or destruction of an existing major route for bicyclists unless it provides a reasonable, safe, and convenient alternate route or unless such a route already exists.

The project will eliminate bicycle access on U.S. 101 within the project limits, as well as access on SR 25 within the project limits. The project, therefore, includes replacement of north-south and east-west bicycle access, which is described in Section 1.3.1.8. The replacement facilities will provide safe and direct routes for bicyclists in the project area.

Trails Plans and Policies

The *Santa Clara Countywide Trails Master Plan* (1995) identifies a network of existing and future trails throughout the County. Although there are no existing trails that cross the project segment of U.S. 101, several trails are planned to cross the highway in the future:

- The alignment for the Mount Madonna/Coyote Lake segment of the Bay Area Ridge Trail is shown as crossing U.S. 101 in the vicinity of the U.S. 101/SR 25 interchange.
- The alignment for the Northern Recreation Retracement Route of the Juan Bautista de Anza National Historic Trail is shown as crossing U.S. 101 at the Pajaro River.
- The alignment for the Monterey - Yosemite Trail is shown as crossing U.S. 101 at the Pajaro River.

- The alignment for the Benito - Clara Trail is shown as crossing U.S. 101 at the Pajaro River.

These same trails are also identified and referenced in the *Gilroy General Plan*.

The project will facilitate the future Bay Area Ridge Trail by constructing a Class 1 bike path under U.S. 101 in the vicinity of the U.S. 101/SR 25 interchange. As described in Section 1.3.1.8, two alternatives are being considered:

Alternative 1 would route bicyclists and trail users, including equestrians, under U.S. 101 and the U.S. 101/SR 25 ramps via the large box culverts that will be installed as part of the project for flood passage purposes. This alternative is only viable under Design Option A as there would be insufficient vertical clearance in the culverts under Design Option B.

Alternative 2 would route bicyclists and trail users, including equestrians, under U.S. 101 at Carnadero Creek via a path to be constructed on the south bank of the creek. Alternative 2 is viable under both Design Option A and Design Option B. Alternative 2 is preferred by both the Santa Clara County Parks and Recreation Department and the Bay Area Ridge Trail Council.¹⁴

In addition to the crossing of U.S. 101, there are other bike path and frontage road improvements being proposed by the project in the vicinity of the U.S. 101/SR 25 interchange, all of which are described in Section 1.3.1.8. These improvements will not only facilitate travel by bicycle, but will facilitate access by all trail users.

The project would facilitate the future trail crossing of U.S. 101 at the Pajaro River because the new freeway bridge will be designed so as to provide adequate clearance for the trail. In addition, the project proposes a new bridge on Betabel Road over the Pajaro River, which will provide the opportunity for bicyclists, pedestrians, and equestrians to access the future trail from this location.

Habitat Conservation Plans/Natural Community Conservation Plans

The Santa Clara Valley Habitat Conservation Plan/Natural Community Conservation Plan (HCP/NCCP) ~~is currently under development~~ was adopted in late 2012/early 2013 by six "local partners" (VTA, County of Santa Clara, Santa Clara Valley Water District, and the Cities of San Jose, Morgan Hill, and Gilroy), in cooperation with the California Department of Fish & Wildlife (CDFW)¹⁵ and the U.S. Fish & Wildlife Service (USFWS). The Santa Clara Valley HCP/NCCP covers approximately 520,000 acres, primarily within southern Santa Clara County, and several special status plant and animal species (called

¹⁴ Letters to VTA from the Santa Clara County Parks & Recreation Department and the Bay Area Ridge Trail Council dated 2/20/09 and 2/23/09, respectively.

¹⁵ Formerly the California Department of Fish and Game (CDFG).

“covered species” in the HCP/NCCP). The current schedule anticipates that the approval implementation of the HCP/NCCP will occur in late 2013.

The proposed project is a “covered” activity, meaning that it is a project whose impacts are described and accounted for in the proposed Santa Clara Valley HCP/NCCP. The project is, therefore, consistent with this plan. [Note: For a detailed discussion as to how many of the biological impacts of the project will be mitigated by the HCP/NCCP, see Section 2.17.5.]

Impact LU-2: The project is consistent with relevant regional and local plans and policies. [No Impact]

2.1.3 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the existing facilities along the project segment of U.S. 101 would remain and no improvements to U.S. 101 would be built. No conflict with existing land uses would occur.

The No Build Alternative would, however, be inconsistent with the regional transportation plans that are described in Section 2.1.2.2. This statement is based on the fact that those plans identify the improvements that comprise the Build Alternative as a component of the planned highway system. Therefore, not implementing the improvements would be inconsistent with the plans.

2.1.4 Avoidance, Minimization, and/or Mitigation Measures

No avoidance, minimization, or mitigation measures are required.

2.2 GROWTH

2.2.1 Regulatory Setting

CEQA requires the analysis of a project's potential to induce growth. CEQA guidelines, Section 15126.2(d), require that environmental documents “...discuss the ways in which the proposed project could foster economic or population growth, or the construction of additional housing, either directly or indirectly, in the surrounding environment.”

2.2.2 **Environmental Consequences of the Build Alternative**

2.2.2.1 ***Introduction***

The purpose of this section of an EIR is to disclose whether or not the construction of a project is likely to foster additional growth, either directly or indirectly. This information can be an important factor in a decision to approve a project because such approval can lead to additional projects that may have environmental consequences.

The fact that a project may result in additional growth does not imply that such growth is either detrimental or beneficial. For example, a project that furthers growth consistent with the adopted goals and policies of a city's general plan would likely be considered as beneficial. Conversely, a project that fosters growth that would conflict with such goals and policies would likely be considered as detrimental.

Finally, projects can induce growth directly or indirectly or both. A direct growth-inducing impact occurs when the construction of one or more projects is "conditioned on"¹⁶ the construction of another project. An indirect growth-inducing impact occurs when a project fosters such growth but there is not direct linkage to future projects. An indirect growth-inducing impact can also occur if a project such as a new highway provides access to an area that was previously inaccessible.

Numerous factors other than increased freeway capacity affect growth in the vicinity of U.S. 101 and in the region as a whole. These include the adopted general plans of cities and counties; the availability of other existing, new, and/or expanded arterial, highway, or transit facilities; the availability of other infrastructure such as utilities, solid waste, domestic water, wastewater treatment and schools; market demand for housing, employment, and commercial services; and the strength of the area economy and employment levels. The majority of these factors are independent of any decision to improve U.S. 101 and these factors would influence future growth in this area with or without the project.

2.2.2.2 ***Direct Growth Inducement***

The proposed improvements to U.S. 101 will not result in any direct growth-inducement because there are no pending or recently-approved projects whose construction is conditioned upon the implementation of the project. Similarly, the project does not include any new roadways or connections that will provide access to areas that are currently inaccessible.

¹⁶Cities and counties frequently place conditions on a project at the time it is approved. These conditions can take the form of restrictions, project modifications, and/or prerequisites to construction. An example of a prerequisite would be where the construction of a shopping center cannot proceed until the local wastewater treatment plant has been expanded to accommodate the wastewater to be generated by that facility.

El Rancho San Benito Specific Plan

The above paragraph notwithstanding, it is important to note the connection between the proposed project and a development project that was proposed on an approximately 5,800-acre site located on the west side of U.S. 101, south of SR 25, in northern San Benito County. If approved, the project, known as the El Rancho San Benito (ERSB) Specific Plan, would include up to 6,800 residences, 550,000 square feet of commercial uses, and 1.1 million square feet of employment uses. The ERSB project would also include the construction of a 4-lane divided parkway through the site, which would extend from the U.S. 101/Betabel Road/Y Road interchange to SR 25, east of Shore Road. In May of 2009, the application for this project was withdrawn.

According to a May 7, 2009 letter from the applicant, DMB Associates, Inc., the decision to withdraw the application was that “these unprecedented economic times have caused the ERSB team to reassess the possibilities and business strategies for the property”. The letter concludes with the statement “we look forward to a time when economic conditions recover to a point where we can again consider a project on the property.”

Thus, while the ERSB project is currently not under active consideration by San Benito County, there is the possibility that the project will be resubmitted in the future. This is relevant to the discussion of the U.S. 101 Improvement Project’s growth-inducing impacts because it is widely believed that the County would not approve ERSB without the widening of U.S. 101. In fact, in an effort to facilitate the widening of U.S. 101, DMB Associates, Inc. is funding a portion of the cost of both the preliminary design and this EIR for the U.S. 101 Improvement Project. The May 7, 2009 application withdrawal letter from DMB alludes to the importance of future roadway improvements when it states that “the State’s budget woes are anticipated to significantly reduce state and county transportation improvement resources that are essential for ERSB to move forward.”

The projected growth for San Benito County that is shown in Table 6 does not include ERSB. The projected year 2035 traffic volumes that are used in various analyses in this EIR do not include traffic associated with development on the ERSB site. This is due to the fact that development of the ERSB site is not planned for, or included in, the County’s adopted General Plan. Approval of ERSB would require the County to amend the General Plan land use designations for the ERSB site from *Agricultural Productive* and *Agricultural Rangeland* and to rezone the site from *Agricultural Productive District* and *Agricultural Rangeland District*.¹⁷

Similarly, the purpose and need for the proposed U.S. 101 Improvement Project, which is described in Section 1.2, is independent of, and does not include traffic generated by, ERSB. Further, approval and construction of the proposed project by Caltrans and VTA would not require the County to approve the ERSB project. Nonetheless, to the extent that the absence of the U.S. 101 improvements are an

¹⁷Source: Notice of Preparation of an EIR for the ERSB Master Community Specific Plan, San Benito County Planning & Building Department, December 2008.

impediment to the implementation of the ERSB project, then the construction of the U.S. 101 improvements will remove that impediment.

To summarize, if the application for the ERSB project is resubmitted, and the proposed magnitude of development is the same as, or similar to, that of the previous application, it is probable that approval and implementation of the ERSB project would be conditioned on the widening of the project segment of U.S. 101. If this were to occur, it would be a direct and significant growth-inducing effect of the U.S. 101 Improvement Project.

Impact GR-1: The U.S. 101 Improvement Project would result in a direct and significant growth-inducing impact if and when the application for the ERSB project is resubmitted and the approval of ERSB is conditioned upon the widening of U.S. 101. **[Significant Impact]**

2.2.2.3 *Indirect Growth Inducement*

As shown in Table 6, substantial growth is projected to occur during the coming decades in the vicinity of the project, as well as in the region. Such growth is projected based upon forecasted economic conditions, as well as the adopted general plans of each jurisdiction. The degree to which the proposed improvements to U.S. 101 will affect this planned growth is discussed below. Three aspects of this issue are examined:

1. The potential for the project to affect the rate of future growth,
2. The potential for the project to affect the location of future growth, and
3. The potential for the project to affect the amount of future growth.

Potential for the Project to Affect the Rate of Future Growth

As stated above, the rate of growth is driven in large part by economic, housing and employment pressures and local jurisdictions' responses to those demands. Santa Clara and San Benito Counties, the adjoining counties, and incorporated cities in each county have general plans that include detailed land use designations for their respective jurisdictions. How quickly or slowly the buildout of the land uses identified in each general plan is achieved is based on a complex combination of economic conditions; demand for housing and employment; local support or opposition for development; availability of key infrastructure including potable water, sewers and schools; availability of public services and other related factors.

The proposed project will increase capacity on the project segment of U.S. 101 and the increased capacity is being proposed based on the desire to accommodate existing and future traffic demand. The forecasted traffic volumes are based on the planned land uses identified in each jurisdiction's adopted general plan. The implementation of the proposed improvements on this segment of U.S. 101 by

themselves are not likely to substantially affect the regionwide pressure or rate of growth in response to economic conditions and the demand for employment and housing. Specifically, although the proposed improvements will increase capacity on the project segment of U.S. 101, decisions to alter the rate of growth by approving development faster than would occur without the improvements would be solely the responsibility of the applicable local jurisdictions.

While these proposed improvements to U.S. 101 may make southern Santa Clara County and northern San Benito County somewhat more attractive for development because of reduced congestion on U.S. 101, local land use policies, land prices and availability, developer interest, other economic factors, and the availability of water, sewer, and public services will have a much greater role in affecting the rate of growth in these areas. Of particular importance in this process is the interest of each local jurisdiction in increasing the rate of growth in their communities. While it is possible that a jurisdiction could determine that the increased capacity resulting from the project will support accelerated growth, such a decision is unlikely. Increasing the rate of growth in these jurisdictions solely in response to additional capacity on the project segment of U.S. 101 is not likely to occur as each of these cities and counties would be much more likely to pursue a faster rate of growth based on a large number of factors, including economic conditions, local desires for increased housing or jobs, developer interest, and other factors, and would not make this decision based solely on the improvements to the project segment of U.S. 101.

Therefore, the proposed project will not result in a substantial impact related to changes in the rate of local or regional growth.

Potential for the Project to Affect the Location of Future Growth

The locations for future growth in the greater project area are identified in the adopted general plans of the surrounding cities and counties. Other than the extension of Santa Teresa Boulevard, the proposed project does not include any new connections to U.S. 101. The extension of Santa Teresa Boulevard to the U.S. 101/SR 25 interchange is identified in Gilroy's General Plan and the City's land use plan assumes that extension will be in place to support planned growth. Based on these facts, the project will not result in pressure to relocate general plan land uses to the vicinity of new ramps or access points.

It is possible that a local jurisdiction could perceive that the proposed project provides improved access to/from U.S. 101 and could, therefore, modify its general plan to shift certain planned land uses closer to existing ramps serving the project segment of U.S. 101. However, the general plan land uses were planned with consideration of a number of factors, including the existing access provided to/from U.S. 101 and major arterials, the distribution of land uses in the area, and the appropriateness of identified land uses for specific areas in southern Santa Clara/northern San Benito Counties. Therefore, if a local jurisdiction chooses to shift the locations of its general plan land uses, it would likely be in response to a number of factors and not solely to due to the increased capacity on U.S. 101.

Potential for the Project to Affect the Amount of Future Growth

The total amount of growth in any jurisdiction is based on the land uses designated in its general plan and local approvals of specific land uses consistent with those land use designations. Caltrans and VTA have no authority to adopt, modify or approve local land use plans or decisions. Each city and county has land use planning and approval for the area within its specific jurisdiction.

As discussed earlier, one or more of these land planning agencies may perceive that the proposed project provides capacity that would be adequate for additional land uses beyond those already included in their adopted general plans. As a result, those agencies could approve additional growth beyond that included in their adopted general plans. However, as discussed earlier, local land use policies, land prices and availability, developer interest, other economic factors, local support/opposition and the availability of water, sewer and public services will have a much greater role in affecting the amount of growth in an area than the provision of freeway capacity. Nonetheless, one or more of these land planning agencies could decide to amend its general plan to accommodate an increase in the total amount of growth in its jurisdiction, based in part on its assumption of increased capacity on the project segment of U.S. 101. Therefore, there is some potential that the proposed project could contribute to an increase in the amount of total growth in the area. However, this potential impact is not expected to be significant because the decision to increase the amount of growth allowed within a specific jurisdiction will be based on a large number of factors, only one of which would be the increased capacity on the project segment of U.S. 101.

Impact GR-2: The project's indirect effect on the rate, location, and/or amount of future growth will not be substantial. **[Less-than-Significant Impact]**

2.2.3 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. Therefore, no direct or indirect project-related growth would occur in the project area.

2.2.4 Avoidance, Minimization, and/or Mitigation Measures

As discussed in Section 2.2.2.2, the U.S. 101 Improvement Project would result in a direct and significant growth-inducing impact if and when the application for the ERSB project is resubmitted and the approval of ERSB is conditioned upon the widening of U.S. 101. There are no feasible measures that would avoid or minimize this impact, should it occur. The responsibility for mitigating the effects of the ERSB project would fall to the County of San Benito, the Lead Agency for that project. Caltrans

would have no authority or jurisdiction over the ERSB project and/or any other future project that would be subject to the land use regulations of a local agency.

Conclusion: The project would result in a direct and significant growth-inducing impact if and when the application for the ERSB project is resubmitted and the approval of ERSB is conditioned upon the widening of U.S. 101. [Significant Unavoidable Impact]

2.3 FARMLANDS

2.3.1 Regulatory Setting

CEQA requires the review of projects that would convert Williamson Act contract land to non-agricultural uses. The main purposes of the Williamson Act are to preserve agricultural land and to encourage open space preservation and efficient urban growth. The Williamson Act provides incentives to landowners through reduced property taxes to deter the early conversion of agricultural and open space lands to other uses.

2.3.2 Affected Environment

The information in this section is based primarily on the Land Evaluation & Site Assessment (LESA) Report (April 2011) that was prepared for the project. A copy of this report is available for review at the locations listed inside the front cover of this document.

As shown on the aerial photograph (see Figure 3), the project segment of U.S. 101 is located in an area that is predominantly agricultural. Extensive farmland is present along both sides of U.S. 101, with most of the farmland cultivated for cherries and row/vegetable crops. Areas adjacent to U.S. 101 that are not farmland are identified as having vegetation that is suited for the grazing of livestock (California Department of Conservation, 2007).

As shown on Figure 7, much of the farmland in the project vicinity has been designated by the State of California as either Prime Farmland or Farmland of Statewide Importance on the *Santa Clara County Important Farmland 2006* and *San Benito County Important Farmland 2006* maps.¹⁸ Table 8 provides

¹⁸**Prime Farmland** is defined as having “the best combination of physical and chemical features able to sustain long-term agricultural production. This land has the soil quality, growing season, and moisture supply needed to produce sustained high yields.” **Farmland of Statewide Importance** is defined as “similar to Prime Farmland but with minor shortcomings, such as greater slopes or less ability to store soil moisture.” Source:

a summary of existing acreage in Santa Clara and San Benito Counties that is designated as important farmland.

TABLE 8		
IMPORTANT FARMLANDS IN SANTA CLARA AND SAN BENITO COUNTIES IN 2006		
	Santa Clara County	San Benito County
Prime Farmland	20,766 acres	30,432 acres
Farmland of Statewide Importance	4,460 acres	9,106 acres
Unique Farmland	2,452 acres	2,580 acres
Farmland of Local Importance	6,113 acres	26,482 acres
Total	33,791 acres	68,600 acres
Source: 2004-2006 Land Use Conversion Tables, California Department of Conservation, Division of Land Resource Protection, 2007.		

Within the Santa Clara County segment of the project, all of the grazing lands and the vast majority of the agricultural lands on the west side of U.S. 101 are under Williamson Act contracts. On the east side of U.S. 101, it is estimated that approximately 50% of the lands within a 0.25-mile radius of the project are under Williamson Act contracts. Many parcels are also within an area designated as the Santa Clara County Agricultural Preserve. Within the San Benito County segment of the project, only the lands east of the Betabel Road/Y Road interchange are under Williamson Act contracts.

2.3.3 Environmental Consequences of the Build Alternative

Table 9 quantifies the acreage of farmland that would be impacted by the proposed project, all of which will be within Santa Clara County. Under Design Option A (i.e., relocate the U.S. 101/SR 25 interchange to the north of the existing interchange), the project will directly impact approximately 157 acres of farmland. Under Design Option B (i.e., reconstruct the U.S. 101/SR 25 interchange at its existing location), the project will directly impact approximately 122 acres of farmland.

The acreage of land under Williamson Act contracts that would be converted to highway use by the proposed project is shown in Table 10. The acreage to be converted under Design Options A and B is approximately 105 and 78 acres, respectively. Note that several of the parcels listed in Table 10 are used

TABLE 9

AGRICULTURAL ACREAGE TO BE ACQUIRED BY THE PROJECT

Assessor's Parcel Number	Parcel Size (Acres)	Dept. Of Conservation Farmland Designation	Design Option A	Design Option B
808-22-001	8.5	Prime	0.1	0.1
808-22-002	3.6	Prime	0.1	0.1
808-22-007	23.9	Prime	1.8	1.8
808-22-009	41.6	Prime	0.8	0.8
808-23-001	9.7	Prime	0.4	0.4
808-23-002	17.2	Prime	2.2	2.2
808-23-003	24.8	Prime	2.6	2.4
808-23-004	46.1	Prime	4.1	2.8
808-23-005	49.2	Prime	7.9	3.4
808-23-006	0.5	Prime	0.4	0.1
808-24-001	17.9	Prime	0.4	0.4
810-34-005	60.7	Prime	40.2	9.9
810-35-004	29.5	Prime	8.1	8.1
810-35-008	41.3	Prime	7.9	16.4
841-14-027	26.2	Prime	0.2	0.2
841-31-019	20.9	Prime	1.1	1.1
841-32-001	37.0	Unique	0.1	0.1
841-32-004	19.4	Prime	0.1	0.0
841-32-005	19.1	Prime	0.3	0.0
841-32-015	46.1	Prime	2.8	1.8
841-32-008	9.8	Prime	2.0	0.5
841-32-009	11.8	Prime	4.6	1.0
841-32-011	28.9	Prime	28.9	28.9
841-32-013	19.0	Prime	19.0	19.0
841-33-008	59.8	Prime	3.5	3.2

TABLE 9 [continued]

Assessor's Parcel Number	Parcel Size (Acres)	Dept. Of Conservation Farmland Designation	Design Option A	Design Option B
841-35-002	25.8	Prime	0.3	0.3
841-35-003	175.4	Prime	2.4	2.3
841-35-004	123.9	Prime	3.5	3.5
841-34-002	264.7	Prime	5.5	5.5
841-36-016	231.5	Prime	0.1	0.1
841-36-019	32.6	Prime	5.4	5.4
Total:			156.8	121.8

TABLE 10**WILLIAMSON ACT ACREAGE TO BE ACQUIRED BY THE PROJECT**

				Acreage to be Acquired	
Assessor's Parcel Number	Property Address	Parcel Size (Acres)	Dept. Of Conservation Farmland Designation	Design Option A	Design Option B
808-23-003	4965 Monterey Rd.	24.8	Prime	2.6	2.4
808-23-004	4395 Monterey Rd.	46.1	Prime	4.1	2.8
808-23-005	55 Castro Valley Rd.	49.2	Prime	7.9	3.4
808-24-001	410 Mesa Rd.	17.9	Prime	0.4	0.4
810-34-005	n/a	60.7	Prime	40.2	9.9
810-34-007	Santa Teresa Blvd.	77.9	Grazing	2.2	2.2
810-35-008	4355 Monterey Rd.	41.3	Prime	7.9	16.4
810-35-007	3201 Monterey Rd.	1,186.6	Grazing	13.1	14.2
810-38-002	Monterey Rd.	17.3	Grazing	10.0	10.0
810-38-017	2775 Monterey Rd.	325.1	Grazing	1.1	1.1
841-32-004	4680 Monterey Rd.	19.4	Prime	0.1	0.0
841-32-005	4590 Monterey Rd.	19.1	Prime	0.3	0.0

TABLE 10 (continued)

				Acreage to be Acquired	
Assessor's Parcel Number	Property Address	Parcel Size (Acres)	Dept. Of Conservation Farmland Designation	Design Option A	Design Option B
841-33-008	415 Bloomfield Ave.	59.8	Prime	3.5	3.2
841-35-002	200 Bloomfield Ave.	25.8	Prime	0.3	0.3
841-35-003	Bloomfield Ave.	175.4	Prime	2.4	2.3
841-35-004	n/a	123.9	Prime	3.5	3.5
841-36-016	n/a	231.5	Prime	0.1	0.1
841-36-019	n/a	32.6	Prime	5.4	5.4
Total:				105.1	77.6

Data source for parcels that are under Williamson Act contracts is the Office of the Santa Clara County Assessor.

APNs 841-36-016 and 841-36-019 are part of the 282-acre Wang Farm Agricultural Conservation Easement that is held by the Silicon Valley Land Conservancy. Funding for this easement included both federal and state grant sources. Any changes or impacts would require approval from the California Department of Conservation and the U.S. Department of Agriculture.

for grazing, as opposed to farmlands. It is also important to note that acquiring a portion of a parcel that is under a Williamson Act contract does not typically nullify the contract on the portion not being acquired. According to California Government Code § 51295, when a project would condemn or acquire only a portion of a parcel of land subject to a Williamson Act contract, the contract is deemed null and void only as to that portion of the contracted farmland taken. The remaining land continues to be subject to the contract unless it is adversely affected by the condemnation. In such cases, the contract for the remaining portion may be canceled.

In order to determine the significance of the project's impacts on farmlands, a LESA report was prepared. The LESA model was developed by the California Department of Conservation to provide CEQA Lead Agencies with an optional methodology to ensure that significant effects of agricultural land conversions are quantitatively and consistently considered in the environmental review process. The model takes a variety of factors into account including the capability of the land itself, project size, availability of water, the agricultural land rating of surrounding properties, and the degree to which surrounding areas are protected from development.

The 1997 instruction manual for the LESA model, which is published by the Department of Conservation's Office of Land Conservation, provides a step-by-step process to be followed for the LESA. In this process, each of the above factors is assigned a score. Each factor's score is multiplied by its respective factor weight. The weighted factor scores are summed, yielding a Total LESA Score (100 points maximum). For the purpose of determining the significance of a project's conversion of agricultural lands, the LESA instruction manual correlates that determination with the Total LESA Score and the subscores, as shown in Table 11.

TABLE 11	
LESA MODEL SIGNIFICANCE CRITERIA	
Total LESA Score	Significance Determination
0 to 39 points	Not Significant
40 to 59 points	Significant <u>only</u> if Land Evaluation <u>and</u> Site Assessment subscores are each greater than or equal to 20 points
60 to 79 points	Significant <u>unless</u> either Land Evaluation <u>or</u> Site Assessment subscore is less than 20 points
80 to 100 points	Significant
<p>Source: Instruction Manual for California Land Evaluation and Site Assessment (LESA) Model, California Department of Conservation, Office of Land Conservation, 1997.</p>	

The determination of significance is based upon both the total score and the component LESA subscores. In this manner the determination is not the result of heavily skewed subscores (i.e., a site with a very high Land Evaluation score, but a very low Site Assessment score, or vice versa). As shown in Table 12, the Total LESA Scores for this project under Design Option A and Design Option B are 92.5 and 92.1, respectively. Therefore, using the LESA criteria shown in Table 11, the conversion of farmland by the project under either of the two design options is considered a significant impact under CEQA.

For those parcels under Williamson Act contracts and/or located within the Santa Clara County Agricultural Preserve, acquisition of right-of-way by the project will necessitate compliance with specific noticing and procedural requirements established by the California Department of Conservation.

Impact FARM-1: The proposed project will convert prime farmland to transportation uses. Included in this conversion are farmlands that are under Williamson Act contracts. **[Significant Impact]**

TABLE 12

FINAL LESA SCORESHEET

Factor Name	Factor Rating (0-100 points)	X	Factor Weighting (Total=1.00)	=	Weighted Factor Rating
DESIGN OPTION A					
<u>Land Evaluation</u>					
1. Land Capability Classification	98.05	X	0.25	=	24.51
2. Storie Index Rating	91.96	X	0.25	=	22.99
Land Evaluation Subtotal:					47.5
<u>Site Assessment</u>					
1. Project Size	100	X	0.15	=	15.0
2. Water Resource Availability	100	X	0.15	=	15.0
3. Surrounding Agricultural Lands	80	X	0.15	=	12.0
4. Protected Resource Lands	60	X	0.05	=	3.0
Site Assessment Subtotal:					45.0
Total LESA Score for Design Option A:					92.5
DESIGN OPTION B					
<u>Land Evaluation</u>					
1. Land Capability Classification	97.93	X	0.25	=	24.48
2. Storie Index Rating	90.48	X	0.25	=	22.62
Land Evaluation Subtotal:					47.10
<u>Site Assessment</u>					
1. Project Size	100	X	0.15	=	15.0
2. Water Resource Availability	100	X	0.15	=	15.0
3. Surrounding Agricultural Lands	80	X	0.15	=	12.0
4. Protected Resource Lands	60	X	0.05	=	3.0
Site Assessment Subtotal:					45.0
Total LESA Score for Design Option B:					92.10
Source: LESA Report for the U.S. 101 Improvement Project: Monterey Street to SR 129, 2011.					

2.3.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. Therefore, no impacts to farmland will occur and parcels that are under Williamson Act contracts will not be affected.

2.3.5 Avoidance, Minimization, and/or Mitigation Measures

Avoidance Measures

As described above, farmland is present along both sides of U.S. 101 within the project limits. Therefore, any increase in the footprint of the highway for the purpose of adding lanes and reconstructing the U.S. 101/SR 25 interchange, as well as the construction of frontage roads, will impact farmland to some degree.

The above paragraph notwithstanding, there are differences between the two design options under consideration as to the degree to which farmland will be impacted. When compared to Design Option A, Design Option B would avoid impacts to 35 acres of farmland (see Table 9).

Minimization Measures

The proposed project has been designed to minimize impacts to farmland by utilizing designs that require the smallest possible footprint. For example, south of the U.S. 101/SR 25 interchange, a reduced median width of 46 feet, instead of the 62 feet standard width, is proposed. Similarly, fill slopes of 2:1 are proposed, instead of the standard 4:1 slopes, which reduces the footprint.

Mitigation Measures

The discussion of mitigation for the above-described conversion of farmland to highway uses is guided by the following:

- CEQA defines “mitigation” to include: “a) avoiding the impact altogether by not taking a certain action or parts of an action, b) minimizing impacts by limiting the degree or magnitude of the action and its implementation, c) rectifying the impact by repairing, rehabilitating, or restoring the impacted environment, d) reducing or eliminating the impact over time by preservation and maintenance activities during the life of the action, and e) compensating for the impact by replacing or providing substitute resources or environments.” (Guidelines Section 15370)

- CEQA states that an EIR must include a discussion of feasible mitigation measures that could lessen an impact, even if the measures would not reduce the impact to a less-than-significant level. (Public Resources Code Section 21002)

For the reasons described above, it is not feasible to improve U.S. 101 without impacting farmland and, therefore, avoidance of this impact is not possible except by selecting the No Project Alternative. Similarly, as discussed above, the project has been designed to minimize the footprint of the improvements, thereby minimizing the impact to farmland, as compared to a footprint using standard design features.

The purchase of conservation easements is a form of mitigation used by various agencies for projects that impact farmland because the easements are a form of preservation. Easements can be particularly effective when used in conjunction with a project that will facilitate future growth. In *South County Citizens for Responsible Growth v. the City of Elk Grove*, the California Court of Appeals stated:

Under CEQA, mitigation is not limited to measures that would entirely avoid the environmental impacts of a project; rather, mitigation includes measures that would substantially lessen the significant environmental effects of the project (§ 21002). Obviously, when farmland is converted to urban use, a requirement that conservation easements be obtained on other land will not replace the converted land. However, conservation easements can diminish the development pressures created by the conversion of farmland and can provide important assistance to the public and private sectors in preserving other farmland against the danger of the domino effect created by the project. In this respect, conservation easements fall well within the concept of mitigation under CEQA.

The use of conservation easements for impacts to farmland is a mitigation option included in Caltrans' Environmental Handbook. The California Department of Conservation recommends that agencies consider the use of farmland conservation easements at a 1:1 ratio.

There are a number of agencies and programs that strive to preserve farmland, including:

- The Santa Clara County Open Space Authority (OSA) is a public agency that is charged with the preservation of undeveloped land in Santa Clara County, including the preservation of agricultural lands. A specific goal of the OSA is acquiring farmland conservation easements in southern Santa Clara County to help preserve the area's remaining prime farmland.
- The Silicon Valley Land Conservancy (formerly the Land Trust for Santa Clara County) is a private non-profit agency whose goal is the preservation of open space and agricultural land in Santa Clara County.
- The California Farmland Conservancy Program, which is administered by the California Department of Conservation, encourages the long-term, private stewardship of agricultural lands through the use of agricultural conservation easements.

MM-FARM-1.1: Farmland conservation easements will be acquired at a 1:1 mitigation-to-impact ratio. As shown in Table 9, the acreage of farmland directly impacted by the project will be 157 acres under Design Option A or 122 acres under Design Option B.

The purchase of the farmland conservation easements (or similar instruments) will be undertaken by the OSA, with the costs of the easements to be borne by the U.S. 101 Improvement Project. The acquisition area for the conservation easements will be within Santa Clara County.

The conservation easements will comply with the following:

- a) Properties on which the conservation easement are obtained will be those designated as Prime Farmland, Farmland of Statewide Importance, or Unique Farmland.
- b) All owners of the agricultural mitigation land will execute the document encumbering the land.
- c) The document will be recordable and contain an accurate legal description of the agricultural mitigation land.
- d) The document will prohibit any activity which substantially impairs or diminishes the agricultural productivity of the land.
- e) The document will protect any existing water rights necessary to maintain agricultural uses on the land covered by the document, and retain such water rights for ongoing use on the agricultural mitigation land.
- f) The easement will be held by the OSA or by an entity acceptable to the OSA in perpetuity. The entity will not sell, lease, or convey any interest in agricultural mitigation land which it will acquire without the prior written approval of the OSA.
- g) If the OSA or other qualifying entity owning an interest in agricultural mitigation land ceases to exist, the duty to hold, administer, monitor and enforce the interest will be transferred to another entity acceptable to the OSA.

Implementation of the above-listed measure will partially mitigate for the impact of the project to farmland. However, because the project would still result in a net loss of prime farmland, the impact would not be reduced to a less-than-significant level.

Conclusion: The project will directly result in the conversion of prime farmland and lands under Williamson Act contracts to non-agricultural uses. Mitigation is included in the project, which will partially reduce this impact, but not to a less-than-significant level. [Significant Unavoidable Impact]

2.4 RELOCATIONS AND REAL PROPERTY ACQUISITION

2.4.1 Regulatory Setting

Caltrans' Relocation Assistance Program (RAP) is based on the Federal Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970 (as amended) and Title 49 Code of Federal Regulations (CFR) Part 24. The purpose of RAP is to ensure that persons displaced as a result of a transportation project are treated fairly, consistently, and equitably so that such persons will not suffer disproportionate injuries as a result of projects designed for the benefit of the public as a whole. Please see Appendix C for a summary of the RAP.

All relocation services and benefits are administered without regard to race, color, national origin, or sex in compliance with Title VI of the Civil Rights Act (42 U.S.C. 2000d, et seq.). Please see Appendix B for a copy of Caltrans' Title VI Policy Statement.

2.4.2 Affected Environment

The project is located in a rural/agricultural area of southern Santa Clara County/northern San Benito County. Land uses along the project segment of U.S. 101 are predominantly associated with agriculture and grazing. Other land uses include low-density residential and commercial.

2.4.3 Environmental Consequences of the Build Alternative

Under both design options, the project will require the acquisition and relocation of four residences and three businesses (Rapazzini Winery, the Garlic Shoppe and a cherry stand). The affected residences and businesses are scattered along both sides of the U.S. 101 corridor and are not part of any defined residential neighborhoods or business districts.

The descriptions and locations of the four residences and three businesses to be acquired by the project are found in Table 13. These properties will be purchased at fair market value. Residents will receive relocation assistance in accordance with the provision of Caltrans' RAP. The type of relocation assistance provided will vary on a case-by-case basis, depending on such factors as whether the occupant is an owner or renter, how long the occupant has lived in the home, cost differential between existing and replacement housing, etc. Businesses will also receive relocation assistance in accordance with Caltrans' RAP. Business displacees will receive information on comparable properties for lease or purchase. For a summary of the RAP, please see Appendix C of this document.

The displacement of these residences and businesses is a substantial economic and social effect of the project. Under CEQA it is not, however, an environmental impact. Nonetheless, this information is presented in this document in accordance with § 15131 of the CEQA Guidelines.

2.4.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. No temporary and/or permanent removal of buildings in the project area would occur. Therefore, there would be no relocations of any residences or businesses.

TABLE 13			
RELOCATIONS RESULTING FROM THE PROJECT			
Assessor's Parcel Number	Property Address	Existing Land Use	Relocations
808-23-003	4965 Monterey Rd., Gilroy	agricultural w/ residence	Residence and associated structures to be acquired; agriculture use to remain.
808-23-004	4395 Monterey Rd., Gilroy	agricultural w/ residence	Residence and associated structures to be acquired; agriculture use to remain.
808-23-005	55 Castro Valley Rd., Gilroy	agricultural w/ residence and farmworker cottages	Residence and associated structures and farmworker cottages to be acquired; agriculture use to remain.
810-35-007	3201 Monterey Rd., Gilroy	agricultural w/residence and barn	Barn will be acquired; residence will not be impacted; agriculture use to remain.
841-32-015	4420 Monterey Rd., Gilroy	agricultural w/ residence	Residence and cherry stand to be acquired; agriculture use to remain.
841-32-009	4360 Monterey Rd., Gilroy	agricultural and commercial	Buildings (Rapazzini Winery) to be acquired; agriculture use to remain on residual portion of 841-32-009.
841-32-010	4350 Monterey Rd., Gilroy	commercial	
841-32-013	n/a	agricultural and commercial	Buildings (Garlic Shoppe) to be acquired.
841-32-014	4310 Monterey Hwy., Gilroy	commercial	

Note: Information in this table is preliminary and is subject to minor revision during final design.

2.5 UTILITIES/EMERGENCY SERVICES

2.5.1 Affected Environment

Various utility lines (e.g., gas, electric, water, communications, sanitary sewer, stormwater, etc.) cross U.S. 101 and SR 25 and are located along/within the local streets that cross or parallel these highways. The existing utilities include a fiber optic line owned by Charter Communications and a gas line owned by Pacific Gas & Electric Company (PG&E), which are located within Caltrans' right-of-way on the east side of U.S. 101. There is also an existing 115-kilovolt PG&E high voltage electric line that runs parallel to the UPRR tracks and crosses SR 25 adjacent to the at-grade crossing of the tracks.

Emergency services at the northerly end of the project alignment are provided by the City of Gilroy's Fire and Police Departments. The Gilroy Fire Department operates three fire stations, the closest to the project located at 7070 Chestnut Street, which is approximately one mile north of the U.S. 101/Monterey Street interchange. The Gilroy Police Department is located on Hanna Street near Downtown Gilroy.

The California Department of Forestry and Fire Protection (Cal Fire) provides fire protection services in the project area in the unincorporated portions of Santa Clara and San Benito Counties. The closest Cal Fire stations are located in Morgan Hill and Hollister.

Police services in the project area in the unincorporated portions of Santa Clara and San Benito Counties are provided by the Santa Clara County Sheriff's Department and the San Benito County Sheriff's Department, respectively. The South County Substation of the Santa Clara County Sheriff's Department is located in San Martin, about ten miles from the north end of the project area. The San Benito County Sheriff's Department is located in Hollister.

Police services on U.S. 101 and SR 25 are primarily provided by the California Highway Patrol (CHP).

Ambulance and medical transport services in the project area are provided by American Medical Response. The closest hospital is St. Louise Regional Hospital in Gilroy.

2.5.2 Environmental Consequences of the Build Alternative

A number of the existing utility lines are located in areas where they will conflict with the improvements that will be constructed by the project. Therefore, where necessary, some of the existing utility lines will be relocated to avoid such conflicts, as is commonplace for projects of this nature. Such utility work will not result in disruption of utility services in the project area because existing lines will not be disconnected prior to the relocated lines being in place.

The existing fiber optic and gas lines that are located within the Caltrans right-of-way on the east side of U.S. 101 will be relocated to adjacent frontage roads or to within easements on the adjacent private properties.

At the location where the existing 115-kilovolt electric transmission line crosses SR 25, the project will raise the profile of SR 25 in order to create a grade-separation at the UPRR crossing. In order to maintain the required vertical clearance between the elevated roadway and the transmission line, the transmission line will be raised. This will involve replacement of the PG&E towers closest to SR 25 with higher towers in order to achieve this clearance. Up to four towers will be replaced. This modification will not result in the electric lines being moved closer to any residences, schools, or other sensitive areas.

Emergency services would indirectly benefit from the proposed project in that, by reducing peak commute period congestion, emergency vehicle response times will be reduced. The project will not sever or alter any emergency evacuation routes.

Impact UTIL-1: The project will not result in the disruption of utility services. The project will not hinder emergency vehicle response times. The project will not sever or alter any emergency evacuation routes. [No Impact]

2.5.3 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. Therefore, there would be no effect on utilities or emergency services in the project area.

2.5.4 Avoidance, Minimization, and/or Mitigation Measures

No avoidance, minimization, or mitigation measures are required.

2.6 **TRAFFIC AND TRANSPORTATION/ PEDESTRIAN AND BICYCLE FACILITIES**

2.6.1 Regulatory Setting

The VTA and Caltrans are committed to carrying out the 1990 Americans with Disabilities Act (ADA) by building transportation facilities that provide equal access for all persons. The same degree of convenience, accessibility, and safety available to the general public will be provided to persons with disabilities.

2.6.2 **Affected Environment**

The information in this section is based primarily on a technical Traffic Operations Analysis Report (2013) that was prepared for the project. A copy of this study is available for review at the locations listed inside the front cover of this document.

2.6.2.1 ***Existing Roadway Network***

U.S. 101 is a major north-south highway in California, and is a key facility in Santa Clara and San Benito Counties. Within the project limits, U.S. 101 is currently a 4-lane expressway in Santa Clara County and a 4-lane freeway in San Benito County. Existing interchanges on U.S. 101 are located at Monterey Street, SR 25, Betabel Road/Y Road, and SR 129. Within Santa Clara County, there is also access between U.S. 101 and a number of local roadways and driveways.

SR 25 is a conventional 2-lane highway that is 75 miles in length. It extends southeasterly from U.S. 101 to the City of Hollister and terminates at the junction of SR 198 in Monterey County. Caltrans is currently studying the upgrade/widening of SR 25 to a 4-lane expressway between the UPRR crossing (just west of Bloomfield Avenue) and San Felipe Road in Hollister.

SR 129 is a 2- to 4-lane highway that extends in an east-west direction. Its westerly terminus is at SR 1 in Watsonville and its easterly terminus is at U.S. 101 in San Benito County.

Santa Teresa Boulevard is a north-south arterial street that extends from Watsonville Road in Morgan Hill on the north to Castro Valley Road in Gilroy on the south.

Monterey Street (also known as Monterey Highway and Monterey Road) is a main north-south street in Gilroy. In the northerly portion of the project area, it provides access to properties located along both sides of U.S. 101.

Other local roadways in the project area include Betabel Road, Y Road, Castro Valley Road, Mesa Road, Bolsa Road, and Bloomfield Avenue.

2.6.2.2 ***Existing Public Transit***

Public transit bus service in the project area is provided by several agencies:

- VTA operates bus routes throughout Santa Clara County, including the City of Gilroy. The closest bus line to the project is Route 18, which runs between the downtown Gilroy Transit Center and Gavilan College.

- San Benito County Express operates bus service between Hollister and Gavilan College in Gilroy, as well as between Hollister and the Gilroy Transit Center.
- Monterey-Salinas Transit operates one bus route through the project area. Route 55 operates on U.S. 101 between Monterey and San Jose, with a stop at the Gilroy Transit Center.

The closest rail service is Caltrain, which operates between Gilroy and San Francisco. All of the above bus routes connect with Caltrain at the Gilroy Transit Center.

Amtrak's *Coast Starlight* passenger trains traverse the project area on the UPRR tracks that generally parallel U.S. 101. These trains provide daily service between Los Angeles and Seattle. The closest stops to the project area are located in Salinas and San Jose.

2.6.2.3 Existing Bicycle and Pedestrian Facilities

Within the project limits, bicycle travel occurs in both the north-south and east-west directions. Because U.S. 101 is designated as an expressway between Monterey Street and the southern limits of Santa Clara County, and since there is no existing alternative bike route between SR 25 and SR 129, the north-south bicycle traffic is allowed to ride on the outside shoulders of U.S. 101 between Monterey Road and SR 129. The west-to-east bicycle traffic uses Mesa Road, the southbound U.S. 101 shoulder, the U.S. 101 to SR 25 off-ramp and then along the shoulder of SR 25. East-to-west bicycle traffic travels along the SR 25 shoulder, the SR 25 to U.S. 101 on-ramp, the northbound U.S. 101 shoulder, and exits at the Monterey Street interchange.

2.6.2.4 Existing Traffic Conditions

Existing AM and PM peak-hour traffic volumes on roadways located in the project area are shown in Table 14. Existing peak-hour conditions on the project segment of U.S. 101 are generally uncongested as the existing volumes are well within the capacity of the highway.

Intersection Levels of Service

Local street performance is measured using the "level of service" (LOS) concept, whereby traffic demand is evaluated in the context of capacity. Since intersections are a key factor in determining the capacity of local streets, traffic impact analyses focus on peak-hour operations at intersections. The impact methodology computes a level of service taking into account factors such as the demand for each traffic movement (i.e., left turns, straight, right turns), the number of lanes, and (where applicable) signal timing. Based on these factors, the methodology computes the average delay per vehicle at the intersection using software known as Synchro, to which a corresponding level of service is assigned.

TABLE 14**EXISTING PEAK-HOUR TRAFFIC DEMAND VOLUMES**

Segment	Direction	AM	PM
U.S. 101: North of Monterey Street	Northbound	3,300	2,700
	Southbound	1,750	3,250
U.S. 101: South of Monterey Street	Northbound	2,950	2,550
	Southbound	1,850	3,400
U.S. 101: South of SR 25	Northbound	1,700	2,100
	Southbound	1,350	2,250
U.S. 101: South of SR 129	Northbound	1,550	1,950
	Southbound	1,250	2,250
SR 25: West of Bloomfield Avenue	Eastbound	450	1,400
	Westbound	1,300	550
SR 129: West of U.S. 101	Eastbound	350	450
	Westbound	250	400
Santa Teresa Boulevard: North of Castro Valley Road	Northbound	50	50
	Southbound	150	150
Santa Teresa Boulevard: North of Mesa Road	Northbound	50	100
	Southbound	250	150
Santa Teresa Boulevard: North of Thomas Road	Northbound	350	200
	Southbound	500	250
Thomas Road: North of Santa Teresa Boulevard	Northbound	400	200
	Southbound	350	200
Luchessa Boulevard: West of Thomas Road	Eastbound	300	100
	Westbound	300	100
Monterey Street: South of Luchessa Boulevard	Northbound	700	550
	Southbound	600	650
Monterey Road: South of Travel Park Circle	Northbound	200	200
	Southbound	150	200

All volumes are rounded to the nearest 50.

Source: Traffic Operations Analysis Report for the U.S. 101 Improvement Project (Monterey Street to SR 129), 2013.

As summarized in Tables 15 and 16, level of service can range from "LOS A", representing free-flow conditions, to "LOS F", representing jammed/over-saturated conditions.

Santa Clara County's minimum acceptable LOS for peak-hour operations at local intersections is LOS D. The City of Gilroy's standard is LOS C, except in designated commercial and industrial areas where LOS D is acceptable. San Benito County's standard is LOS C.

The traffic analysis prepared for this project evaluated the peak-hour operations at 15 intersections in the project area. The study intersections, which are listed in Table 17, were chosen based on their proximity to the proposed improvements. Five of the study intersections are signalized and the rest are controlled by stop signs on one or more approaches.

Table 17 shows the existing peak-hour levels of service at each of the study intersections. The levels of service were calculated using the above-described methodology. As shown in Table 17, four of the study intersections are operating below acceptable levels of service under existing conditions:

- SR 25/U.S. 101 Southbound Ramps (AM and PM peak-hours)
- SR 25/U.S. 101 Northbound Ramps (PM peak-hour)
- SR 25/Bloomfield Avenue (AM and PM peak-hours)
- Luchessa Boulevard/Thomas Road (AM peak-hour)

2.6.2.5 Future "No Build Alternative" Traffic Conditions

VTA's Countywide travel demand model was used to forecast future traffic volumes in the project area. Consistent with standard practice, the year 2035 was chosen for the long-term horizon year as it is 20 years beyond the estimated 2015 project completion date. [Note: The 2015 completion date is subject to the availability of funding.]

The benefit of the travel demand model is that it provides projections of future traffic volumes, taking into account traffic from future development planned for in the approved general plans of the cities in Santa Clara County. The model also accounts for planned growth in the region, including the Monterey Bay Area, as well as planned improvements to the transportation network. The projected year 2035 volumes are shown in Table 18.

When compared to existing conditions, key findings as to future (2035) travel demand in the project area are as follows:

- As indicated by comparing the "existing" volumes (Table 14) to the "2035 no project" volumes (Table 18), increases in traffic will be substantial as a result of planned growth.

TABLE 15**LEVEL OF SERVICE DEFINITIONS FOR SIGNALIZED INTERSECTIONS**

Level of Service	Description of Operations	Average Control Delay ^a (seconds/vehicle)
A	Insignificant Delays: No approach phase is fully utilized and no vehicle waits longer than one red indication.	≤ 10
B	Minimal Delays: An occasional approach phase is fully utilized. Drivers begin to feel restricted.	> 10 to 20
C	Acceptable Delays: Major approach phase may become fully utilized. Most drivers feel somewhat restricted.	> 20 to 35
D	Tolerable Delays: Drivers may wait through no more than one red light. Queues may develop but dissipate rapidly, without excessive delays.	> 35 to 55
E	Significant Delays: Volumes approaching capacity. Vehicles may wait through several signal cycles and long vehicle queues from upstream.	> 55 to 80
F	Excessive Delays: Represents conditions at capacity, with extremely long delays. Queues may block upstream intersections.	> 80

^a Average Control Delay includes the time for initial deceleration delay, queue move-up time, stopped delay, and final acceleration. It is measured for the whole intersection.

Source: Transportation Research Board, 2000 Highway Capacity Manual.

TABLE 16**LEVEL OF SERVICE DEFINITIONS FOR UNSIGNALIZED INTERSECTIONS**

Level of Service	Description of Operations	Control Delay ^a (seconds/vehicle)
A	Little or no delay for controlled movements.	≤ 10
B	Some delay for controlled movements.	> 10 to 15
C	Moderate delay for controlled movements.	> 15 to 25
D	Significant delay for controlled movements.	> 25 to 35
E	Severe delay and congestion.	> 35 to 50
F	Total breakdown with extreme delays.	> 50

^a Control Delay includes the time for initial deceleration delay, queue move-up time, stopped delay, and final acceleration. It is measured for the worst turning movement.

Source: Transportation Research Board, 2000 Highway Capacity Manual.

TABLE 17

EXISTING PEAK-HOUR INTERSECTION LEVELS OF SERVICE

Intersection	Type	AM Peak		PM Peak	
		Delay (sec.)	LOS	Delay (sec.)	LOS
Monterey Street/SB 101 Ramps	Signalized	9	A	11	B
Monterey Street/NB 101 Ramps	Signalized	27	C	32	C
SR 25/SB 101 Ramps	Unsignalized	40	E	>50	F
SR 25/NB 101 Ramps	Unsignalized	13	B	>50	F
SR 129/SB 101 Ramps	Unsignalized	9	A	12	B
SR 129/NB 101 Ramps	Unsignalized	10	B	11	B
SR 156/NB 101 Ramp	Unsignalized	1	A	0	A
SR 25/Bloomfield Avenue	Unsignalized	37	E	40	E
Santa Teresa Boulevard/Thomas Road	Signalized	26	C	24	C
Santa Teresa Boulevard/Mesa Road	Signalized	12	B	12	B
Santa Teresa Boulevard/Gavilan Driveway	Unsignalized	9	A	10	A
Santa Teresa Boulevard/Castro Valley Road	Unsignalized	11	B	13	B
Luchessa Boulevard/Thomas Road	Unsignalized	40	E	10	A
Luchessa Boulevard/Monterey Street	Signalized	38	D	35	C
Searle Road/SR 129	Unsignalized	11	B	18	C

Source: Traffic Operations Report for the U.S. 101 Improvement Project (Monterey Street to SR 129), 2013.

TABLE 18**YEAR 2035 PEAK-HOUR TRAFFIC DEMAND VOLUMES**

Segment	Direction	No Project		With Project	
		AM	PM	AM	PM
U.S. 101: North of Monterey Street	Northbound	4,350	4,650	4,650	5,050
	Southbound	4,300	5,400	4,650	6,750
U.S. 101: South of Monterey Street	Northbound	4,300	4,950	4,750	5,300
	Southbound	4,150	4,950	4,850	6,550
U.S. 101: South of SR 25	Northbound	2,900	3,750	3,950	4,700
	Southbound	3,750	4,000	4,700	5,300
U.S. 101: South of SR 129	Northbound	3,150	3,200	3,550	3,700
	Southbound	2,700	3,600	3,050	4,400
SR 25: West of Bloomfield	Eastbound	1,450	1,950	1,550	1,950
	Westbound	1,850	1,450	1,850	1,750
SR 129: West of U.S. 101	Eastbound	850	2,100	1,050	2,200
	Westbound	2,350	1,650	2,500	1,900
Santa Teresa Bl: N of Castro Valley Rd	Northbound	150	150	400	950
	Southbound	650	550	650	500
Santa Teresa Bl: N of Mesa Road	Northbound	200	450	350	1,050
	Southbound	1,000	650	1,050	500
Santa Teresa Bl: N of Thomas Road	Northbound	700	500	700	800
	Southbound	1,350	900	1,350	700
Thomas Road: N of Santa Teresa Bl.	Northbound	700	450	650	700
	Southbound	650	450	550	350
Luchessa Bl: W of Thomas Road	Eastbound	700	250	600	250
	Westbound	550	550	450	600
Monterey St: S of Luchessa Bl.	Northbound	1,300	1,350	1,050	1,050
	Southbound	950	1,250	900	1,300
Monterey Rd: S of Travel Park Circle	Northbound	450	700	600	650
	Southbound	300	600	200	500

All volumes are rounded to the nearest 50.

Source: Traffic Operations Report for the U.S. 101 Improvement Project (Monterey St. to SR 129), 2013.

- By 2035, peak-hour travel demand will exceed capacity at various locations along the project segment of U.S. 101. The resulting congestion will substantially increase travel times. As shown in Table 19, the time it takes to drive the 9.4 miles between SR 156 and Monterey Street will increase by up to approximately six minutes during the AM peak-hour and up to approximately three and one-half minutes during the PM peak-hour.

TABLE 19						
COMPARISON OF YEAR 2035 TRAVEL TIME ESTIMATES ON U.S. 101 BETWEEN MONTEREY STREET AND SR 156						
[Expressed in Minutes:Seconds]						
	AM Peak Hour			PM Peak Hour		
	No Project	With Project		No Project	With Project	
		Design Option A	Design Option B		Design Option A	Design Option B
Northbound	11:48	9:24	10:00	11:30	9:24	9:24
Southbound	14:24	8:06	12:24	11:54	11:06	11:54
Distance between Monterey Street and SR 156 is approximately 9.4 miles. For reference, driving this distance at 65 mph would take approximately 8 minutes and 20 seconds (8:20).						
Source: Traffic Operations Analysis Report for the U.S. 101 Improvement Project (Monterey Street to SR 129), 2013.						

- By 2035, as shown in Table 20, nine of the study intersections will be operating under congested conditions (i.e., LOS E or F) during the AM and/or PM peak-hours.

2.6.3 Environmental Consequences of the Build Alternative

This section describes the effects of the project on traffic, transit, and pedestrian/bicycles facilities.

2.6.3.1 *Impacts to U.S. 101*

Key findings with regard to the effect of the project on U.S. 101 are as follows:

- The improvements to U.S. 101 that are proposed by the project will increase the capacity of the highway within the project limits. This increased capacity will allow U.S. 101 to accommodate more of the projected traffic demand, as indicated by the data in Table 18.

TABLE 20
YEAR 2035 PEAK-HOUR INTERSECTION LEVELS OF SERVICE

Intersection	Type		2035 - No Project		2035 - With Project	
			Delay	LOS	Delay	LOS
Monterey Street/ SB 101 Ramps	Signalized	AM	14	B	17	B
		PM	28	C	19	B
Monterey Street/ NB 101 Ramps	Signalized	AM	26	C	37	D
		PM	47	D	39	D
SR 25/ SB 101 Ramps	Unsignalized; project to add signal	AM	>50	F	Option A - 15	Option A - B
		PM	>50	F	Option B - 54	Option B - D
SR 25/ NB 101 Ramps	Unsignalized; project to add signal	AM	39	E	Option A - 15	Option A - B
		PM	>50	F	Option B - 34	Option B - C
SR 129/ SB 101 Ramps	Unsignalized; project to add signal	AM	39	E	Option A - 11	Option A - B
		PM	>50	F	Option B - 13	Option B - B
SR 129/ NB 101 Ramps	Unsignalized; project to add signal	AM	>50	F	Option A - 10	Option A - B
		PM	>50	F	Option B - 15	Option B - B
SR 129/ SB 101 Ramps	Unsignalized; project to add signal	AM	>50	F	>80	F
		PM	>50	F	>80	F
SR 129/ NB 101 Ramps	Unsignalized	AM	>50	F	44	E
		PM	46	E	>50	F
SR 156/ NB 101 Ramp	Unsignalized	AM	1	A	1	A
		PM	0	A	0	A
SR 25/ Bloomfield Ave.	Unsignalized; no left turns under project	AM	>50	F	>50	F
		PM	>50	F	47	E
Santa Teresa Blvd/ Thomas Road	Signalized	AM	45	D	46	D
		PM	30	C	34	C
Santa Teresa Blvd/ Mesa Road	Signalized	AM	42	D	45	D
		PM	22	C	26	C
Santa Teresa Blvd/ Gavilan Driveway	Unsignalized; project to add signal	AM	15	B	7	A
		PM	31	D	11	B
Santa Teresa Blvd/ Castro Valley Rd	Unsignalized	AM	>50	F	23	C
		PM	47	E	>50	F
Luchessa Blvd/ Thomas Road	Unsignalized	AM	>50	F	>50	F
		PM	>50	F	>50	F
Luchessa Blvd/ Monterey Street	Signalized	AM	>80	F	76	E
		PM	80	E	71	E
Searle Road/ SR 129	Unsignalized	AM	>50	F	>50	F
		PM	>50	F	>50	F

Source: Traffic Operations Report for the U.S. 101 Improvement Project (Monterey St. to SR 129), 2013.

- As shown in Table 19, when compared to “no project” conditions, the project will reduce peak-period travel times along the project segment of U.S. 101. This savings in travel times is a direct result of the reduction in congestion due the increased capacity that will be provided by the proposed improvements.

Impact TRAN-1: The project will improve peak-period traffic operations along the project segment of U.S. 101. **[Beneficial Impact]**

2.6.3.2 *Impact on Operations at Intersections*

Table 20 shows future levels of service/delay at the study intersections with the project in place and compares those results to “no project” conditions. The data in Table 20 show that the project will reduce delays at some of the study intersections, but increase delays at other intersections. This variation is due to several factors including 1) improvements in freeway operations that allow more vehicles to reach an intersection, 2) changes in circulation due to the extension of Santa Teresa Boulevard to the U.S. 101/SR 25 interchange, and 3) project-related changes to an intersection such as the addition of a traffic signal.

When compared to “no project” conditions, the project will improve the peak-hour level of service at the following intersections:

- Monterey Street/U.S. 101 Southbound Ramps: LOS will improve from “C” to “B” during the PM peak-hour.
- SR 25/U.S. 101 Southbound Ramps: LOS will improve from “F” to “B” (Design Option A) or “D” (Design Option B) during the AM peak-hour. LOS will improve from “F” to “B” (Design Option A) or “C” (Design Option B) during the PM peak-hour.
- SR 25/U.S. 101 Northbound Ramps: LOS will improve from “E” to “B” during the AM peak-hour (both design options). LOS will improve from “F” to “B” during the PM peak-hour (both design options).
- Santa Teresa Boulevard/Gavilan College Driveway: LOS will improve from “B” to “A” during the AM peak-hour and will improve from “D” to “B” during the PM peak-hour. This improvement will be due to the fact that the project will install a traffic signal at this intersection.
- Santa Teresa Boulevard/Castro Valley Road: LOS will improve from “F” to “C” during the AM peak-hour.
- Monterey Street/Luchessa Boulevard: LOS will improve from “F” to “E” during the AM peak-hour.

At the Santa Teresa Boulevard/Castro Valley Road intersection, the project will cause the LOS to drop from “E” to “F” during the PM peak-hour. This is not a significant impact because the corresponding

increase in delay would be minimal. [Note: Increases of less than 13 seconds are under the threshold of significance used for this assessment.]

At the SR 129/U.S. 101 Southbound Ramps intersection, the data in Table 20 appear to indicate that, when compared to “no project” conditions, the project will increase delay from >50 seconds to >80 seconds. This apparent increase is misleading because the methodology, as well as the LOS E/F threshold, used for an unsignalized intersection for the “no project” scenario is different than the methodology and threshold used for a signalized intersection for the “with project” scenario. Although this appears at face value as a substantial adverse impact, in reality the delay at this intersection will be less with the project constructed because it will install a traffic signal and it will construct a second right-turn lane on the off-ramp, both of which will increase capacity. The precise delays are not reported in the table because calculations in both methodologies can lead to unreasonable delay values when demand is greater than capacity.

Impact TRAN-2: The project will not result in a significant impact at any of the study intersections. **[Less-than-Significant Impact]**

2.6.3.3 *Impact on Pedestrian and Bicycle Facilities*

As described in Section 2.6.2.3, within the project limits, bicyclists are allowed to ride on the shoulder of U.S. 101 and SR 25. The project will eliminate bicycle access on both U.S. 101 and SR 25 within the project limits.

The project will, however, replace this access with new north-south and east-west bicycle and pedestrian facilities in the project area. The new facilities will consist of a combination of Class 1 bike paths and Class 2 bike lanes, as described in Section 1.3.1.8. See also the discussion in Section 2.1.2.2, which describes these new facilities in the context of existing plans and policies that pertain to bicycles and trails. These new facilities will provide safe and direct bicycle and pedestrian access in the project area, which would represent an improvement over existing conditions.

Impact TRAN-3: Although the project will eliminate bicycle access along the shoulder of U.S. 101 and SR 25 within the project limits, this access will be replaced with a system of new north-south and east-west bike lanes and bike paths, providing a safe and direct means for both bicycle and pedestrian travel in this area. **[Beneficial Impact]**

2.6.4 Environmental Consequences of the No Build Alternative

Please see Section 2.6.2.5, *Future "No Build Alternative" Traffic Conditions*.

2.6.5 Avoidance, Minimization, and/or Mitigation Measures

No avoidance, minimization, or mitigation measures are required.

2.7 VISUAL/AESTHETICS

2.7.1 Regulatory Setting

CEQA 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." (CA Public Resources Code Section 21001[b])

Various state, regional, and local agencies have regulations and policies that are designed to protect scenic resources. Caltrans, for example, administers the California Scenic Highway Program and also designates certain highways as Landscaped Freeways, which sets limits on locations of large advertising signs next to the highway. In addition, both Santa Clara and San Benito Counties, as well as the City of Gilroy, have designations for scenic corridors and ordinances that govern tree removal and replacement. Although Caltrans is not subject to local regulations, projects are designed to avoid or minimize visual impacts, including tree removal, to the greatest extent practicable. In addition, it is Caltrans' policy to replace highway plantings that are removed by a project with new planting, which is consistent with the intent and objectives of the local regulations and policies.

2.7.2 Affected Environment

The information in this section is based primarily on a technical Visual Impact Assessment (January 2011) that was prepared for the project. A copy of this study is available for review at the locations listed inside the front cover of this document.

2.7.2.1 *Methodology*

The viewshed for the project was determined by a visual inspection of the proposed features. The existing U.S. 101 highway, U.S. 101/SR 25 interchange, U.S. 101/SR 129 interchange, SR 25, and Santa Teresa Boulevard with vehicles, signs, lights, utility poles, bridges and roadway pavement were used to calibrate the distances from which the proposed project could be seen from a half mile radius. The visual environment was assessed from public road vantage points, some adjacent to sensitive receptors and some within the U.S. 101, SR 25 and SR 129 rights-of-way that would be representative of the range of views of the proposed improvements.

Characteristics were grouped into two categories: urban structures and natural features. Urban structures tend to be relatively uniform in character compared with natural features that tend to be random and diverse. The presence, combination and massing of these features in the views were analyzed. Characteristics were described in terms of line, form, color and texture.

The quality of the existing visual environment was determined using a combination of three criteria:

- **Vividness:** "...the visual power or memorability of landscape components as they combine in striking and distinctive visual patterns..."
- **Intactness:** "...the visual integrity of the natural and man-built landscape and its freedom from encroaching elements..."
- **Unity:** "...the visual coherence and compositional harmony of the landscape concerned as a whole..."

Viewer sensitivity or response was estimated based on their "use" of the viewshed. Sensitive receptors in the vicinity of the project include single-family residents, and users of Gavilan College and the Gavilan Golf Course. Somewhat sensitive viewers are visitors to the area and staying at the recreational vehicle parks located to the north and south central areas of the project. Residents are particularly sensitive because of their relatively prolonged exposure to visible features in their environment, and the extent to which those features are familiar and define the character of their neighborhoods. Recreation users are also sensitive receptors because of their prolonged use of the site while recreating, and the degree to which the site has been chosen as a destination for various reasons which may include enjoyment derived from the setting while recreating.

Viewers considered to be not as sensitive are within commercial and industrial sites where their primary visual focus is on job-related tasks. Motorists within transportation rights-of-way in general have a time-limited exposure to visual features and are considered not as sensitive as residential or recreation site viewers who have prolonged views of the environment. Motorists within scenic corridors would be considered sensitive receptors since scenic resources may contribute to the pleasure of the driving experience. Within the project limits, motorists are considered somewhat sensitive. Bicyclists are also considered somewhat sensitive viewers as they bicycle for recreation and to enjoy the scenic vistas of the valley and mountains.

2.7.2.2 Existing Visual Environment

The project segment of U.S. 101 is located in valley and foothill terrain in southern Santa Clara/northern San Benito Counties. The Santa Cruz Mountains are located to the south and southwest, while the Diablo Range is located to the east. The predominant character of the area is rural agriculture with urban features concentrated at the northerly end of the project in the City of Gilroy. The photos shown on Figure 8 are representative of the project's visual setting.

The urbanized features at the northerly end of the project consist of commercial, industrial, and residential buildings along U.S. 101 in the City of Gilroy. As one travels south from Gilroy along U.S.



Aerial photograph at north end of project showing urbanized uses adjacent to US 101



US 101, looking south from Sargent overcrossing



US 101, looking south, in vicinity of Castro Valley Road



US 101, looking south at Pajaro River bridge



US 101, looking south toward the SR 25 overcrossing



US 101, looking south, with SR 129 overcrossing visible in distance

101, the urbanized environment gives way to rural agricultural and open space features. The visual environment includes large expanses of cultivated fields, as well as views of both nearby hills and more distant mountains. The environment includes residences, barns, and other buildings that are typically associated with rural agricultural settings. Overhead utility lines are visible from many locations, as is the UPRR line that generally parallels U.S. 101.

Other notable man-made structures are the bridges that convey U.S. 101 over various creeks and rivers, retaining walls, and a number of overpass structures. The latter includes overpasses at SR 25, Betabel Road/Y Road, and SR 129.

A RV park (Betabel RV Park) is located along the west side of U.S. 101 adjacent to the Betabel Road/Y Road interchange. Several commercial uses, as well as a number of single-family residences, are located at the southerly end of the project in the area adjacent to the U.S. 101/SR 129 interchange.

The project segments of U.S. 101, SR 25, and SR 129 are not designated as State Scenic Highways. In addition, none of these roadway segments are classified as Landscaped Freeways, a designation that sets limits on the locations of large advertising signs next to the highway in order to preserve the visual quality of the highway from the perspective of motorists.

2.7.3 Environmental Consequences of the Build Alternative

2.7.3.1 *Overview*

Implementation of the roadway improvements that comprise the proposed project will result in a variety of changes to the existing visual environment. The changes will include the removal of four residences and two businesses that are located along U.S. 101 in the vicinity of the U.S. 101/SR 25 interchange, the construction of new frontage roads, the extension of Santa Teresa Boulevard, the construction of a new U.S. 101/SR 25 interchange, the construction of new and widened bridges, and a wider roadway on U.S. 101 to accommodate the new lanes of traffic. Other changes will result from the removal of vegetation and the construction of retaining walls. The following text describes the visual impacts of the project from several perspectives:

- The visual effects of new retaining walls,
- The net visual effects of the project from four key vantage points in the area, and
- The visual effect due to the removal of vegetation

2.7.3.2 *Visual Effects of Retaining Walls*

Based on the preliminary project design, the project will include nine retaining walls, the locations, heights, and lengths of which are shown in Table 21. Motorists are accustomed to seeing these

structures as they are common along many highways. For this project, the new walls will be visible from a number of vantage points, including U.S. 101, other roadways, and at nearby land uses.

TABLE 21**LIST OF PROPOSED RETAINING WALLS**

Wall #	Wall Length (feet)	Wall Height (feet)	Design Option	Location	Significant Visual Impact?
1	390	4-10	A & B	Southbound U.S. 101 off-ramp to SR 129	No
2	600	4-17	A & B	South approach to San Benito River bike bridge	No
3	550	4-17	A & B	North approach to San Benito River bike bridge	No
4	1,130	4-11	A & B	Between 101 & frontage road, north of Pajaro River	No
5	900	4-9	A & B	Northbound U.S. 101, north of Tar Creek	No
6	1,645	6-12	A & B	Southbound U.S. 101 on-ramp from Monterey St.	No
7	121	3	B	Southbound U.S. 101 at SR 25	No
8	510	8-35	B	Eastbound Santa Teresa Blvd, just west of U.S. 101	No
9	257	5-23	B	Southbound U.S. 101 on-ramp from SR 25	No

Note: All proposed wall dimensions and locations are approximations based on preliminary engineering and are subject to refinement during final design.

Of the nine new retaining walls, wall #8 would be most visible as it will be constructed along the hillside to the west of the existing U.S. 101/SR 25 interchange. This wall, which would only be built if Design Option B is chosen, will be noticeable from vantage points along U.S. 101, Santa Teresa Boulevard, and Castro Valley Road. By its nature, the wall structure will contrast with the existing grassy slopes and oak trees. Despite this contrast, the overall impact to the visual environment will not be significant.

Based on the assessment of each retaining wall by the landscape architect who prepared the project's Visual Impact Assessment, the character and quality of the visual environment will not be enhanced or degraded to a substantial degree from the perspective of the viewers of the walls.

Although the visual impact of the retaining walls will not be significant, the impact could be further reduced by adding brown color to the concrete. A formliner/texture could also be used. Landscaping could also be added to soften the appearance of the structures. Landscaping should be consistent with

the character of the rural environment and in accordance with Caltrans standards for replacement planting and plant materials and installation guidelines. If implemented, these measures would reduce the contrast between the walls and the surrounding natural environment, thereby diminishing their visibility from the surrounding areas.

Impact VISUAL-1: The proposed retaining walls will not result in a substantial change to the existing visual and aesthetic environment along the project segment of U.S. 101. **[Less-than-Significant Impact]**

2.7.3.3 *Visual Effects from Key Vantage Points along U.S. 101*

Four key vantage points were selected to assess the visual effect of the project from locations adjacent to the highway. These locations, which are shown on Figure 9, represent those areas where the project will have its greatest visual impact due to new/wider roads, new structures, vegetation removal, or a combination thereof.

Key View #1

Figure 10 depicts the existing and future “with project” views from Key View #1, a vantage point along northbound U.S. 101, approximately 0.6 miles north of the existing U.S. 101/SR 25 interchange. This vantage point is adjacent to an existing single-family residence and a retail business (Garlic World). The existing hills are visible in the forefront, the Diablo Range is visible in the distance, and the existing SR 25 overcrossing is barely visible. This view would be seen by persons at the adjacent residence and business as well as by motorists on southbound U. S. 101.

Under Design Option A, a high level of adverse change will occur as views of the Diablo Range will be intruded upon by the new SR 25 overcrossing structure. This change will be permanent and cannot be mitigated to a less-than-significant level through architectural and/or landscape design solutions.

Under Design Option B, a low level of adverse visual change will occur as only the lower portion of the views of the Diablo Range will be intruded upon by the new SR 25 overcrossing structure.

Impact VISUAL-2: Under Design Option A, the visual impact of the project from a vantage point along U.S. 101, 0.6 miles north of the U.S. 101/SR 25 interchange, will be substantial. **[Significant Impact]**

Impact VISUAL-3: Under Design Option B, the visual impact of the project from a vantage point along U.S. 101, 0.6 miles north of the U.S. 101/SR 25 interchange, will not be substantial. **[Less-than-Significant Impact]**



LOCATIONS OF KEY VIEWPOINTS

FIGURE 9



Existing



Proposed - Design Option A



Proposed - Design Option B

KEY VIEW #1 - VIEW LOOKING SOUTH ALONG U.S. 101 FROM A POINT JUST NORTH OF CASTRO VALLEY ROAD (VICINITY OF GARLIC WORLD) FIGURE 10

Key View #2

Figure 11 depicts the existing and future “with project” views from Key View #2, a vantage point along Santa Teresa Boulevard near Gavilan College. The view looks to the southeast towards U.S. 101 at the location where the U.S. 101/SR 25 interchange would be located under Design Option A. The buildings visible in the background are commercial structures associated with the Rapazzini Winery. This view would be seen by motorists on southbound Santa Teresa Boulevard.

Under Design Option A, minor changes to the existing visual environment will occur. Santa Teresa Boulevard will be shifted to the east in the foreground and the new U.S. 101/SR 25 interchange will be visible in the background. The overall view will remain similar to the existing view.

Under Design Option B, minor changes to the existing visual environment will occur. In the foreground, Santa Teresa Boulevard will be improved in the same general alignment as the existing road. In the distance, Santa Teresa Boulevard will be extended, with a retaining wall visible in the lower portion of the hillside. At night, lights from vehicles driving along the extended Santa Teresa Boulevard will also be visible. The overall view will remain similar to the existing view.

Impact VISUAL-4: Under Design Option A, the visual impact of the project from a vantage point along Santa Teresa Boulevard near Gavilan College will not be substantial.
[Less-than-Significant Impact]

Impact VISUAL-5: Under Design Option B, the visual impact of the project from a vantage point along Santa Teresa Boulevard near Gavilan College will not be substantial.
[Less-than-Significant Impact]

Key View #3

Figure 12 depicts the existing and future “with project” views from Key View #3, a vantage point at the intersection of SR 25 and Bloomfield Avenue. The view looks to the west towards U.S. 101. A row of eucalyptus trees and cultivated crops are visible in the foreground and the Santa Cruz Mountains are visible in the distance. This view would be seen by motorists on westbound SR 25..

Under Design Option A, minor changes to the existing visual environment will occur. The removal of a number of eucalyptus trees will open up the view of the Santa Cruz Mountains, resulting in a positive visual impact.

Under Design Option B, minor changes to the existing visual environment will occur. The removal of a number of eucalyptus trees will open up the view of the Santa Cruz Mountains, resulting in a positive visual impact. The reconstructed U.S. 101/SR 25 interchange will be visible in the distance, as will a retaining wall adjacent to the interchange.



Existing



Proposed - Design Option A



Proposed - Design Option B



Existing



Proposed - Design Option A



Proposed - Design Option B

Impact VISUAL-6: Under Design Option A, the visual impact of the project from a vantage point at the intersection of SR 25 and Bloomfield Avenue will not be substantial.
[Less-than-Significant Impact]

Impact VISUAL-7: Under Design Option B, the visual impact of the project from a vantage point at the intersection of SR 25 and Bloomfield Avenue will not be substantial.
[Less-than-Significant Impact]

Key View #4

Figures 13 and 14 depict the existing and future “with project” views from Key View #4, a vantage point along a road that serves properties located on the west side of the existing U.S. 101/SR 25 interchange. Views 4a and 4b are taken from the same location, the difference between the two is that View 4b is shifted slightly to the right (i.e., south) of View 4a to show the full effect of the project under Design Option B. The buildings in the foreground are part of a private event center (Adagio Event Center). U.S. 101 is visible through the trees. The red-painted buildings in View 4b are a retail business (Garlic Shoppe). The Diablo Range is clearly visible in the background. This view would be seen by users of the existing road that serves properties located on the west side of the existing U.S. 101/SR 25 interchange.

Under Design Option A, minor changes to the existing visual environment will occur. Views of cultivated fields to the east will be partially replaced with contrasting embankment slopes within the U.S. 101/SR 25 interchange. Additional pavement associated with the widening of U.S. 101 will also be visible.

Under Design Option B, the change in the visual environment will be substantial. With the project, moderate changes will be made to the existing visual resources resulting in a high viewer response from the perspective of vantage points to the north and east of the project. High viewer response impacts will occur from vantage points to the north and east with views of vehicles and lights on SR 25 within the slopes of the Carlyle Hills. High viewer response changes will also occur with a southbound off-ramp shifting approximately 278 feet to the west of the existing off-ramp in the view assessed. A retaining wall will be visible on the uphill side of the west extension of SR 25, which will result in moderate viewer response impacts. In addition to high and moderate viewer response changes, minor visual impacts will occur as views of cultivated fields to the east are replaced with views of contrasting bare earth embankment slopes within the interchange.

Impact VISUAL-8: Under Design Option A, the visual impact of the project from a vantage point to the west of the existing U.S. 101/SR 25 interchange will not be substantial.
[Less-than-Significant Impact]



Existing



Proposed - Design Option A

KEY VIEW #4A - VIEW LOOKING EAST FROM A ROAD THAT SERVES PROPERTIES
LOCATED ON THE WEST SIDE OF EXISTING U.S. 101 / S.R. 25 INTERCHANGE
(PHOTO TAKEN FROM SAME LOCATION AS KEY VIEW #4B)



Existing



Proposed - Design Option B

KEY VIEW #4B - VIEW LOOKING SOUTHEAST FROM A ROAD THAT SERVES PROPERTIES LOCATED ON THE WEST SIDE OF EXISTING U.S. 101 / S.R. 25 INTERCHANGE (PHOTO TAKEN FROM SAME LOCATION AS KEY VIEW #4A)

Impact VISUAL-9: Under Design Option B, the visual impact of the project from a vantage point to the west of the existing U.S. 101/SR 25 interchange will be substantial. [Less-than-Significant with Mitigation Listed in Section 2.7.5]

2.7.3.4 *Visual Effects from Removal of Vegetation*

Construction of the project will require the removal of existing vegetation at various locations along the 7.6-mile project segment of U.S. 101. Based on preliminary design, it is estimated that the footprint of the project will affect approximately 432 acres of unpaved earth area, of which roughly 326 acres would be in Santa Clara County and roughly 106 acres would be in San Benito County. The majority of this acreage is covered with grasses. A small percentage includes trees and shrubs. Areas cultivated with crops are also part of the acreage to be impacted. Trees to be removed are part of a larger grove or hedgerow and the trees that would remain will continue to provide a visual amenity.

As discussed subsequently in Section 2.17, *Natural Communities*, the project will remove a total of approximately 15 acres of native riparian vegetation at the many creeks and rivers that are crossed by U.S. 101 within the 7.6-mile project limits. While the biological impact of the removal of this vegetation will be significant, and mitigation is being provided, the visual impact from this loss of vegetation will not be significant as the impacts are limited at each waterway crossing. With the project in place, the riparian vegetation of each creek/river corridor will remain visible to motorists traveling on U.S. 101.

The loss of vegetation due to the project will not result in a significant visual impact. Nonetheless, it is Caltrans' policy to replace highway plantings that are removed by a project with new planting. Replacement planting will be provided where warranted under separate contract and will include 3-years of plant establishment.

Impact-VISUAL-10: The removal of vegetation by the project will not result in a significant visual impact. [Less-than-Significant Impact]

2.7.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. Existing landscaping and vegetation would not be removed and no construction would occur. Therefore, there would be no change to the visual/aesthetic environment in the project area.

2.7.5 Avoidance, Minimization, and/or Mitigation Measures

The following measures will be implemented as mitigation for the identified significant visual impacts (i.e., Visual Impacts #2 and #9):

MM-VISUAL-2.1: The visual effect of the new SR 25 overcrossing will be lessened through the incorporation of architectural design features (i.e., use of colors and textures that reduce visual impacts) into the structure. Highway planting will also be added to the interchange to lessen this impact (Design Option A only). Planting and three years of plant establishment will be implemented under separate contract within two years following completion of roadwork.

This mitigation will somewhat lessen the visual impact of the project at this location, but there is no feasible mitigation that can reduce the blocking of the scenic vista by the overcrossing to a less-than-significant level.

MM-VISUAL-9.1: Small trees will be planted along the north side of Santa Teresa Boulevard in order to screen views of this roadway from the adjacent event center. The trees will function as large screening shrubs. Species that grow into tall trees will not be planted as they would block views of the Diablo Range in the distance (Design Option B only). Planting and three years of plant establishment will be implemented under separate contract within two years following completion of roadwork.

This mitigation will reduce the visual impact at this location to a less-than-significant level.

Conclusion: The project will result in a significant adverse change to the visual environment at one location each under Design Options A and B. For Design Option A, mitigation MM-VISUAL-2.1 will partially reduce this impact, but not to a less-than-significant level. For Design Option B, mitigation MM-VISUAL-9.1 will reduce this impact to a less-than-significant level. [Significant Unavoidable Impact under Design Option A Only]

2.8 CULTURAL RESOURCES

2.8.1 Regulatory Setting

“Cultural resources” as used in this document refers to all historical and archaeological resources, regardless of significance.

Historical resources are considered under CEQA, as well as California Public Resources Code (PRC) Section 5024.1, which established the California Register of Historical Resources. PRC Section 5024

requires state agencies to identify and protect state-owned resources that meet National Register of Historic Places listing criteria. It further specifically requires Caltrans to inventory, evaluate for significance, and assess effects on state-owned structures in its rights-of-way early in the planning process, including providing an opportunity for comment to the SHPO.

CEQA Guidelines Section 15064.5 states that a “historical resource” shall not only include resources listed on, or eligible for, the California Register of Historic Resources, but also those listed on a local register of historic resources. This Guidelines section also notes that a resource may be deemed historic by a Lead Agency even if it is not listed on a local register of historic resources, provided that such determination is supported by substantial evidence in light of the whole record.

2.8.2 Affected Environment

The information in this section is based primarily on a technical Archaeological Survey Report (September 2010) and Historical Resources Evaluation Report (March 2010) that were prepared for the project. With the exception of the Archaeological Survey Report, these studies are available for review at the locations listed inside the front cover of this document. The Archaeological Survey Report contains information regarding the locations of archaeological resources, which by law is confidential and not available to the public.

2.8.2.1 Methodology

The project area limits (PAL) were studied to determine whether cultural resources are present and, if so, to assess the impacts of the project on those resources. The PAL consists of the area within the footprint of the project, as well as those areas directly adjacent to the project where indirect impacts to historic resources could occur. Several methodologies were employed for the purpose of determining the presence of cultural resources:

- Existing databases, records, and historic resources inventories were consulted. This included a prehistoric and historic site record and literature search at the California Historical Resources Information System, Northwest Information Center at Sonoma State University.
- Consultation with the Native American Heritage Commission and local Native American communities and individuals was undertaken.
- For archaeological resources, areas that had not been recently studied were surveyed in the field by archaeologists. In combination with areas that had been previously studied, this survey resulted in all but approximately 3% (32 acres) of the PAL being examined.

- Geoarchaeological backhoe trenching was undertaken at eight locations at which previous studies had indicated there was a high potential for buried archaeological resources. At these locations, 71 individual trenches were excavated.
- All structures within the PAL that were constructed prior to 1964 (i.e., those 45 years of age or older) were evaluated to determine their eligibility as a historic resource.

2.8.2.2 *Archaeological Resources*

There are 12 locations within the PAL where archaeological resources have been found. Most of these resources include both prehistoric and historic-era components. The most important resources have prehistoric components with human remains, features, and/or intact midden deposits, and historic-era components dating to the Mission or Rancho periods. These 12 resources are summarized in Table 22.

Of the resources listed in Table 22, three have been determined eligible (with SHPO concurrence on January 28, 1994) for the *National Register of Historic Places (NRHP)* and the *California Register of Historic Resources (CRHR)* and, therefore are historic resources for purposes of CEQA. These three eligible resources are SCL-308/H, SCL-577/H, and SCL-698.

Of the resources listed in Table 22, the following three have been determined ineligible (with SHPO concurrence on January 28, 1994) for the NRHP and CRHR: SCL-92/H, SCL-578/H, and SCL-699/H. Access to the properties where SCL-92H and SCL-578H are located was not permitted during the preparation of this EIR. At such time as access is permitted, the reevaluation of the historic components of these sites, which were previously determined as ineligible, may be required.

2.8.2.3 *Historical Resources*

There are three historical resources located within the PAL: the Bloomfield Ranch, San Felipe Church, and the Mayock Residence. These resources are described below. All other structures (including bridges) and buildings within the PAL have been determined to not be historical resources.

Bloomfield Ranch

The main portion of the Bloomfield Ranch is located on a large parcel of land (APN 841-34-002) bounded by U.S. 101 on the west, SR 25 on the north, the UPRR tracks on the east, and the grant line boundary between the Las Animas and Juristac ranchos to the south. The ranch was determined to be eligible for the NRHP and CRHR as a historic district, with SHPO concurrence in March 2007. Additionally, the Miller Reservoir, located on the west side of U.S. 101 (on APN 810-35-008) on a hill that overlooks the Bloomfield Ranch, and a 30-foot-wide area surrounding the reservoir, complete the boundary of this discontinuous historic district.

TABLE 22

ARCHAEOLOGICAL SITES WITHIN THE PROJECT AREA LIMITS

Resource Identifier	Feature Type	Study Findings	California/National Register Eligibility
SCL-92/H Prehistoric	Sparse scatter of flaked & ground stone	--	Ineligible; SHPO concurrence
Historic	Sargent Station	Buried trash feature found in trenching 2-3 feet below surface; 1920s-1940	
SCL-308/H Prehistoric	Occupation debris with housefloor feature	As described	Eligible; SHPO concurrence
Historic	Rancho period residence/Miller Cemetery	Artifacts from 1993 testing indicate a domestic residence ca. 1810-1830	
SCL-577/H Prehistoric	Intact occupation area with burials	As described	Eligible; SHPO concurrence
Historic	Vicinity of 1803 Mission Ranch (La Brea); later 1832 rancho adobe; Carlisle House 1850s	Artifacts from 1993 testing indicate a domestic residence ca. 1810-1900	
SCL-578/H Prehistoric	Highly disturbed midden	As described	Ineligible; SHPO concurrence
Historic	Vicinity of F. German rancho (1835)	Documentary research conducted; access denied	
SCL-698	Multi-component midden site with burials	As described	Eligible; SHPO concurrence
SCL-699/H Prehistoric	Very sparse lithic scatter	--	Ineligible; SHPO concurrence
Historic	Trash dump	Modern rubbish	Ineligible; SHPO concurrence

TABLE 22 [continued]

Resource Identifier	Feature Type	Study Findings	California/National Register Eligibility
SBN-149/H	Sanchez Adobe	Rancho Period refuse deposit identified in 1985	
P-43-002462	Carnadero School	Location in study area	
P-43-002463	Buried fire-cracked rock	Exposed in backhoe trench 1-3 ft below surface; identified as background scatter	
Historic	Ranch trash deposit	Exposed in backhoe trench 1-3 ft below surface	
P-35-000528	Buried deposit consisting of flakes, bone, shell and a mortar	Found during backhoe trenching 10-12.5 ft below surface	
P-35-000535	Buried deposit consisting of fire-affected rock, charcoal, and burned soil	Found during backhoe trenching 10.5-11.8 ft below surface	
P-43-002464	Buried deposit consisting of fire-affected rock and bone	Found during backhoe trenching 1-5 ft below surface	
SHPO = State Historic Preservation Officer			
Source: Archaeological Survey Report for the U.S. 101 Improvement Project, 2010.			

As the headquarters of the Miller & Lux Company cattle ranching empire, which extended over several western states, the Bloomfield Ranch is eligible for the NRHP under Criterion A at the state level of significance.¹⁹ It is also eligible for the NRHP under Criterion B at the state level of significance for its association with Henry Miller. Furthermore, the contributing buildings and structures at the Bloomfield Ranch are eligible for the NRHP under Criterion C at the local level of significance because they embody distinctive characteristics of their type. Contributing features include Miller's Original Office, Miller Station, Miller's Second Office, the Stone Masonry Culvert, and Miller Reservoir. Its period of significance is between 1859 and 1916.

¹⁹Criteria have been established to determine eligibility for the NRHP. Criterion A is for resources that are associated with events that have made significant contribution to the broad patterns of our history. Criterion B is for resources that are associated with the lives of persons significant in our past. Criterion C is for resources that embody the distinctive characteristics of a type, period, or method of construction, or that represent the work of a master, or that possess high artistic values, or that represent a significant and distinguishable entity whose components may lack individual distinction. Criterion D is for resources that have yielded, or may be likely to yield, information important in prehistory or history.

Mayock House

The Mayock House is located on the Gavilan College campus approximately 1,000 feet west of Santa Teresa Boulevard. The house appears to be eligible for listing in the CRHR at the local level of significance under Criterion 2, for its association with the Mayocks, an early and prominent Gilroy family, and Criterion 3, as a distinctive example of nineteenth century Folk Victorian residential architecture. Its period of significance spans 48 years, from 1886, when it was constructed, to 1934, when the Mayock family sold the property.

San Felipe Church

San Felipe Church is located on the Gavilan College campus approximately 1,300 feet west of Santa Teresa Boulevard. San Felipe Church appears to be eligible for listing in the CRHR at the local level of significance under Criterion 3 as an example of Queen Anne architecture with Gothic Revival details.

2.8.3 Environmental Consequences of the Build Alternative

2.8.3.1 *Impacts to Archaeological Resources*

As described in Section 2.8.2, there are 12 known archaeological sites within the project's PAL. Three of these sites have been determined to be eligible for the NRHP and CRHR and, therefore, are resources for purposes of CEQA. Three of the sites have been determined to be ineligible for the NRHP and CRHR.

The extent of impacts on these archaeological resources has not yet been fully determined. Project refinement during the subsequent design phase may minimize the extent of construction related activities, but it is reasonable to conclude that some of these archaeological resources will be subject to impacts that constitute substantial adverse change given their location in the PAL and the nature of the proposed improvements. These construction related impacts will probably derive from (but are not limited to) subsurface excavation such as utility work, foundation/ bridge pier trenches and drilling or surface related construction activities, such as staging to adversely impact buried archaeological resources and those exposed at ground surface.

Impact CUL-1: Construction-related activities will adversely impact one or more of the archaeological resources in the PAL. [**Less-than-Significant with Mitigation Listed in Section 2.8.5**]

2.8.3.2 *Impacts to Historical Resources*

Impacts to the Bloomfield Ranch

For the following reasons, the project will not result in a substantial effect on the historic significance or historic integrity of the Bloomfield Ranch:

- Under both design options, implementation of the proposed project will require construction of a new driveway or access road for the Bloomfield Ranch property. This construction activity will replace a short segment of an existing dirt farm access road with a paved road that will serve as primary access to the property. The driveway will extend approximately 600 feet in length beginning near the property's northeast corner, which will require grading of land immediately adjacent to SR 25. The location of this frontage road is more than one-quarter mile from both the main complex and Miller's Station. The buffer zone at this location extends approximately 25 feet from the proposed driveway. This impact will not demolish, damage, relocate or alter any of the buildings and structures that contribute to the property's significance, nor will it materially impact the existing setting of the ranch.
- Under both design options, the proposed project will require construction of a frontage road from Castro Valley Road to Old Monterey Road. Under neither option would the frontage road be located within the boundaries of the Bloomfield Ranch historic district. No visual impacts to the historic district will result from this frontage road.
- No work will occur within the boundaries of the Miller Reservoir, including the 30-foot buffer area that surrounds the reservoir. There will also be no visual impacts to this resource.
- Under Design Option B, the U.S. 101/SR 25 interchange would be reconstructed at its existing location, which is adjacent to the Bloomfield Ranch. This reconstruction will somewhat alter the visual environment, but the change will not be substantial since it will not affect the physical characteristics that convey historical significance of the Bloomfield Ranch and that justify its eligibility for listing in the NRHP and CRHR.

Impact CUL-2: The project will not have a substantial effect on the Bloomfield Ranch. [**Less-than-Significant Impact**]

Impacts to San Felipe Church

This resource is located on the Gavilan College campus, approximately 1,300 feet west of Santa Teresa Boulevard. Project-related improvements to Santa Teresa Boulevard will not directly or indirectly affect the San Felipe Church. Santa Teresa Boulevard is not visible from the church.

Impact CUL-3: The project will have no adverse effect on the San Felipe Church. [**No Impact**]

Impacts to the Mayock House

This resource is located on the Gavilan College campus, approximately 1,000 feet west of Santa Teresa Boulevard. Project-related improvements to Santa Teresa Boulevard will not directly or indirectly affect the Mayock House. Santa Teresa Boulevard is not visible from this building.

Impact CUL-4: The project will have no adverse effect on the Mayock House. [No Impact]

2.8.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. Therefore, there would be no effect on cultural resources in the project area.

2.8.5 Avoidance, Minimization, and/or Mitigation Measures

The following measures are included as part of the project as mitigation for the identified significant impacts to archaeological resources:

MM-CUL-1.1: To resolve construction-related activities that will adversely impact one or more of the historical resources in the PAL, an Archaeological Treatment Plan (ATP) will be developed that details procedures and mechanisms that will be followed by Caltrans and VTA to ensure both agencies satisfy their regulatory requirements under CEQA. The ATP will outline the process for completing the identification and evaluation phase of the regulatory process on parcels not yet acquired by the project where access was denied. When data recovery through excavation is the only feasible mitigation, provisions in the ATP for adequate recovery of scientifically consequential information from and about the historical resource, shall be implemented prior to any project-related construction or other activities being undertaken.

MM-CUL-1.2: If cultural materials are discovered during construction, all earth-moving activity within and around the immediate discovery area will be diverted until a qualified archaeologist can assess the nature and significance of the find.

PHYSICAL ENVIRONMENT

2.9 HYDROLOGY AND FLOODPLAIN

The information in this section is based primarily on a technical Location Hydraulic Study (September 2010) that was prepared for the project. A copy of this study is available for review at the locations listed inside the front cover of this document.

2.9.1 Affected Environment

The project alignment is located within the Pajaro River watershed²⁰ and is surrounded by open space, ranchland, agricultural uses, commercial uses, and native and non-native vegetation. Based on the Federal Emergency Management Agency (FEMA) Flood Insurance Rate Maps (FIRMs), most of the project segment of U.S. 101 is within or adjacent to 100-year floodplains.²¹ Flooding in the area occurs in the vicinity of creeks and rivers.

The project segment of U.S. 101 crosses the following waterways (from north to south): Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, San Benito River, and San Juan Creek.

Most of the project segment of U.S. 101 lies within or adjacent to floodplains. The floodplains exist due to inadequate capacity within a number of the surrounding waterways, which results in floodwaters overtopping banks/levees, and the flooding of surrounding areas. Historical flooding has occurred in the project area in 1938, 1955, 1958, 1962, 1982, 1983, 1986, and 1997. Damage to buildings and agricultural fields has occurred, as well as temporary road closures including U.S. 101.

From north to south, the project is in the existing 100-year floodplains both west and east of U.S. 101 in the vicinity of the Carnadero Creek and Gavilan Creek crossings. In the vicinity of the Tick Creek and Tar Creek crossings, the existing 100-year floodplain is only on the east side of U.S. 101. The project is in the existing 100-year floodplain (both west and east of U.S. 101) for the Pajaro River, San Benito River, and San Juan Creek.

Floodplain maps of the project area in Santa Clara County and San Benito County are shown in Figures 15 and 16, respectively. The flooding at each waterway crossed by U.S. 101 within the project limits is described in more detail below.

²⁰ The Pajaro River watershed includes watershed areas of all the rivers/creeks that are crossed by the project segment of U.S. 101, as well as the watershed area downstream of the project location.

²¹ The **100-Year Floodplain** is the area subject to flooding by the 100-year flood or the area subject to inundation by the 1% annual chance flood. The 100-year flood is the flood having a 1% chance of being equaled or exceeded in any given year.

Carnadero Creek and Gavilan Creek: Carnadero Creek at and upstream of the U.S. 101 crossing is undersized. During a 100-year flood event, floodwaters overtop the highway. Most of the floodwaters from Carnadero Creek travel south in the vicinity of U.S. 101 on both the east and west sides of the freeway and enters the Gavilan Creek watershed. The remaining Carnadero Creek floodwaters travel northeast of the creek and overtop U.S. 101, north of the Carnadero Creek bridge. Gavilan Creek crosses under U.S. 101 through an existing 8-foot x 6-foot reinforced concrete box (RCB) culvert. This culvert has insufficient capacity to convey water from its watershed as well as the flood flows from Carnadero Creek. As a result, the flow overtops U.S. 101 north of the Gavilan Creek crossing. Downstream of the U.S. 101 overflow, the flood flow also overtops SR 25 at its low point.

Tick Creek: The existing double 8-foot x 4-foot reinforced concrete box (RCB) culvert for Tick Creek under U.S. 101 has insufficient capacity to discharge flows during the 100-year flood, causing a shallow spill flow over U.S. 101. West of the frontage road, Tick Creek has insufficient capacity to convey the 100-year flood event; therefore, floodwaters overtop the frontage road at its low point.

Tar Creek: The U.S. 101 bridge over Tar Creek is approximately 30 feet above the creek flowline elevation; therefore, highway overtopping at this location is unlikely to occur.

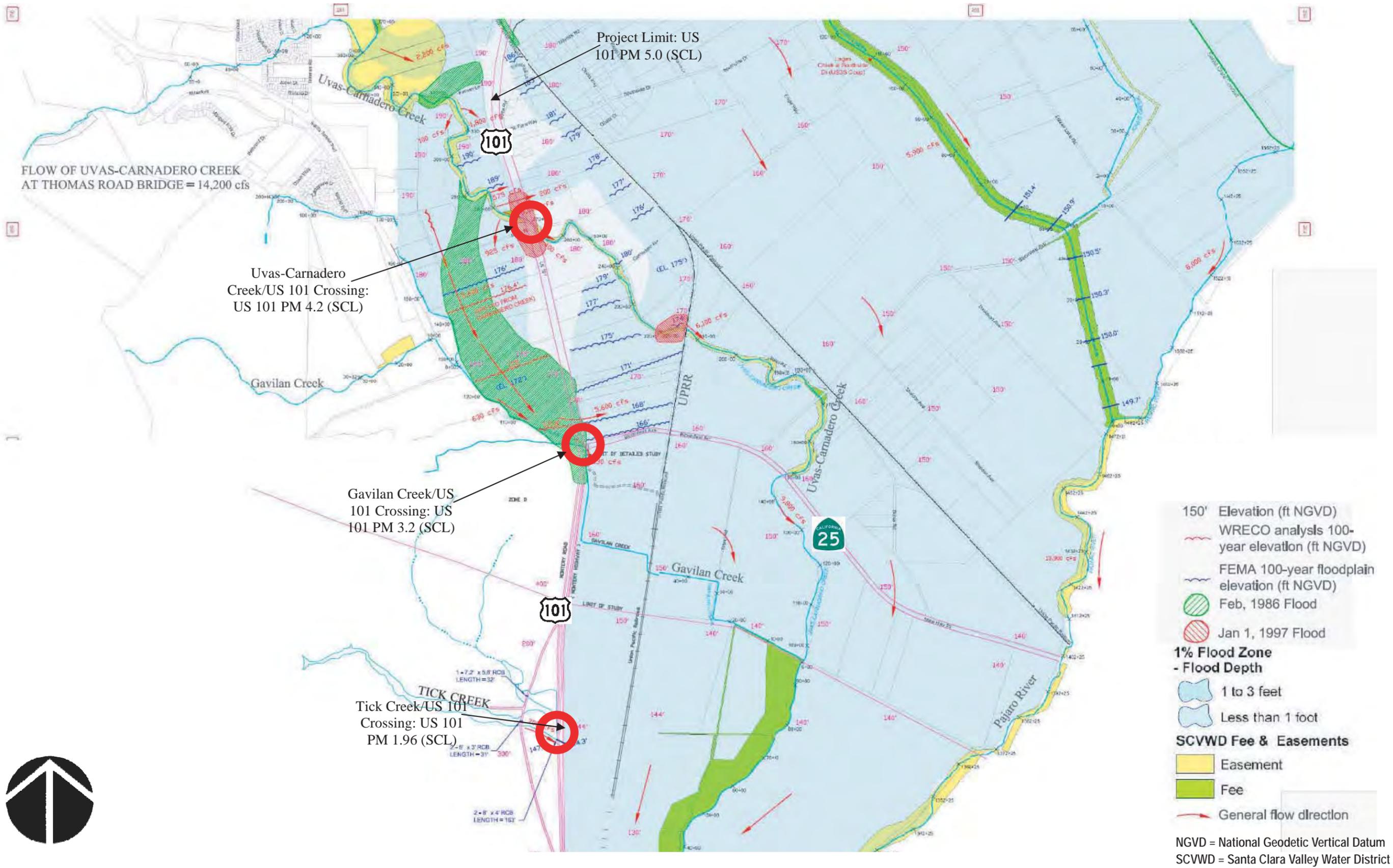
Pajaro River and San Benito River: The U.S. 101 bridges over Pajaro River and San Benito River would not be overtopped during the 100-year flood event by floodwaters, but the bridge would be under pressure from flood flows.

San Juan Creek: The U.S. 101 bridge over San Juan Creek would not be overtopped by floodwaters during the 100-year flood event. However, the existing triple 10-foot x 7-foot RCB culvert under the U.S. 101 northbound on-ramp and upstream of the U.S. 101 bridge cannot pass the 100-year peak flow. The water that does not pass through this triple RCB culvert flows to the San Benito River to the north.

The double 10-foot x 8-foot RCB culvert under SR 129, immediately downstream of the triple RCB culvert is also undersized. As a result, U.S. 101 overtops with approximately 0.6 feet of water during a 100-year flood event. This excess water flows northwest through the SR 129 bridge opening towards U.S. 101, overtops U.S. 101, and then rejoins San Juan Creek main channel, just east of U.S. 101.

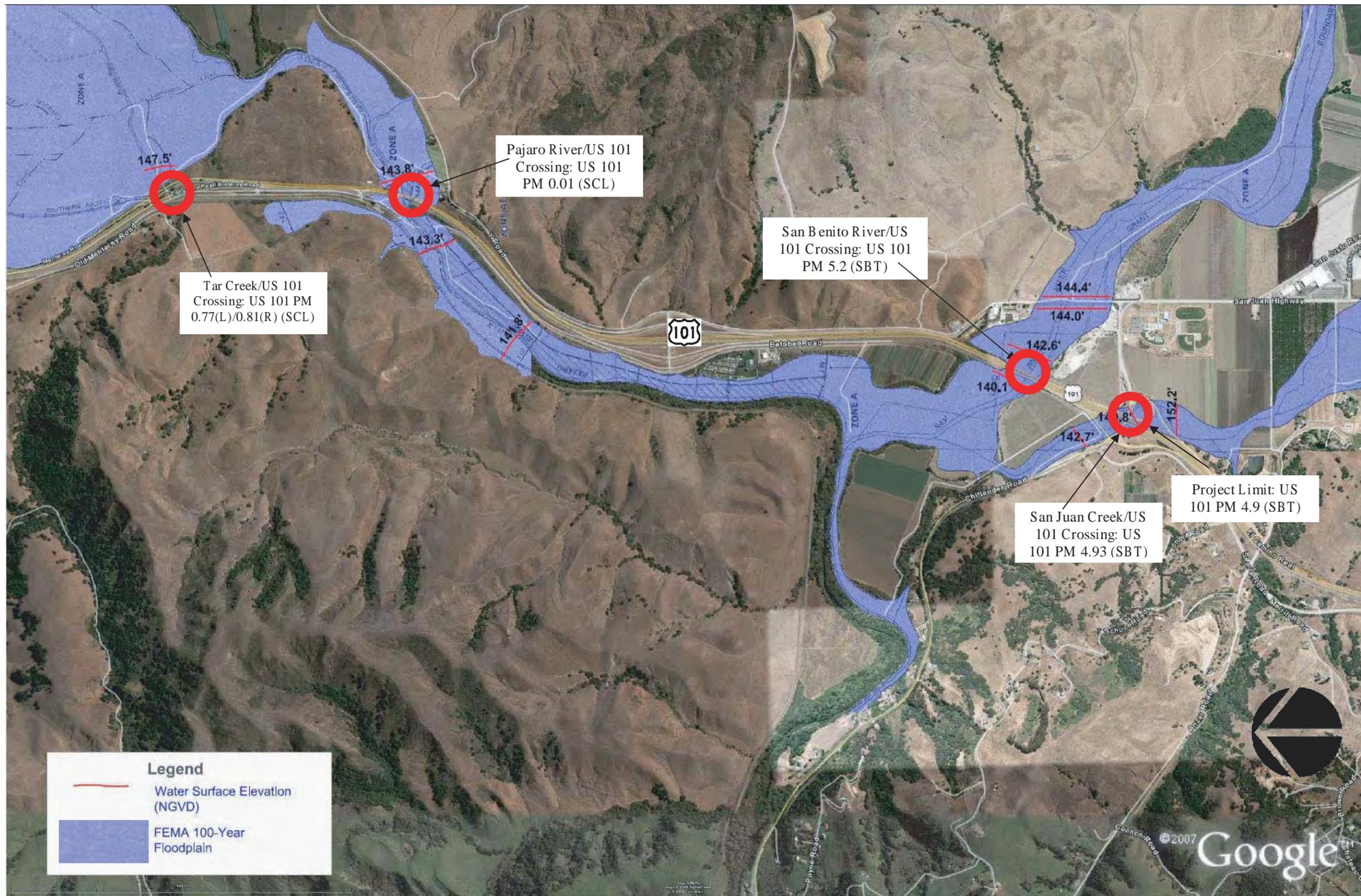
2.9.2 Environmental Consequences of the Build Alternative

The following text describes the impacts of the proposed project within each of the floodplains crossed by the project segment of U.S. 101. These impacts include 1) the placement of fill in floodplains that reduces floodplain storage capacity, 2) the blockage of floodwaters due to the construction of embankments and/or structures, and 3) increases in the peak flow rate due to an increase in impervious surfaces. Impacts were quantified using the hydraulic modeling methodologies that are described in the Location Hydraulic Study.



EXISTING FLOODPLAIN MAP OF PROJECT VICINITY IN SANTA CLARA COUNTY

FIGURE 15



EXISTING FLOODPLAIN MAP OF PROJECT VICINITY IN SAN BENITO COUNTY

FIGURE 16

2.9.2.1 *Impacts to the Carnadero Creek Floodplain*

Under Design Option A, the proposed Santa Teresa Boulevard extension will be elevated on a new embankment. This embankment will create a loss of floodplain storage capacity west of U.S. 101 as floodwaters from Carnadero Creek flowing south will no longer be able to pass through to the Gavilan Creek watershed.

As occurs under existing conditions, approximately 200 cubic-feet-per-second of floodwaters will overtop U.S. 101 at a location roughly 600 feet north of the Carnadero Creek bridge.

The increase in impervious surfaces due to the proposed highway improvements (e.g., ramps, frontage roads, additional lanes, etc.) will reduce the floodplain storage capacity. This could lead to additional flooding in the project area and/or increased depth of flooding.

Under both design options, the proposed SR 25 alignment will be elevated on an embankment to pass over the UPRR tracks and continue to the U.S. 101/SR 25 interchange. This embankment would obstruct the flood flows from Carnadero Creek and reduce the floodplain storage capacity east of U.S. 101 and disrupt the flood flow pattern.

Impact HYDRO-1: Under both Design Option A and Design Option B, the project will result in substantial flooding impacts within the 100-year floodplain of Carnadero Creek. **[Less-than-Significant with Mitigation Listed in Section 2.9.4]**

2.9.2.2 *Impacts to the Gavilan Creek Floodplain*

Under Design Option A, the increase in impervious surfaces due to new ramps, frontage roads, and additional freeway lanes in the Carnadero Creek watershed will reduce the floodplain storage capacity and disrupt the flood flow pattern in the vicinity of Gavilan Creek and U.S. 101. This impact will not occur under Design Option B.

Impact HYDRO-2: Under Design Option A, the project will result in substantial flooding impacts within the 100-year floodplain of Gavilan Creek. **[Less-than-Significant with Mitigation Listed in Section 2.9.4]**

Impact HYDRO-3: Under Design Option B, the project will not result in substantial flooding impacts within the 100-year floodplain of Gavilan Creek. **[Less-than-Significant Impact]**

2.9.2.3 *Impacts to the Tick Creek Floodplain*

The project will widen the U.S. 101 and adjacent west side frontage road crossings of Tick Creek. This widening will require extensions of the existing culverts. The project will also construct a joint access

driveway adjacent to the east side of U.S. 101, which will include a crossing of Tick Creek on double 8-foot x 4-foot RCB culverts. Although the project will slightly raise the elevation of the pavement on U.S. 101, the project will not cause the base floodplain elevation to increase.

Because the existing culverts are undersized, floodwaters from Tick Creek would continue to overtop U.S. 101 during a 100-year flood with the project in place, as they do under existing conditions. To prevent the freeway from flooding in the future, the project includes the installation of two reinforced concrete pipes (RCPs), each 3 feet in diameter, under U.S. 101. The RCPs will be placed adjacent to the existing double 8-foot x 4-foot RCB culvert.

Impact HYDRO-4: The project will not raise the water surface elevation of the Tick Creek floodplain during a 100-year flood. **[No Impact]**

2.9.2.4 *Impacts to the Tar Creek Floodplain*

The project will construct a new access road that will cross Tar Creek on a single-span bridge. The bridge will be above the elevation of the 100-year flood flow. Hydraulic analysis determined that the effect of the bridge would be a rise in the elevation of the base floodplain by less than 0.1 feet for a distance of approximately 200 feet upstream of the bridge, which would be insignificant.

Impact HYDRO-5: The project will not result in substantial flooding impacts within the 100-year floodplain of Tar Creek. **[Less-than-Significant Impact]**

2.9.2.5 *Impacts to the Pajaro River Floodplain*

The project will replace the existing U.S. 101 bridge over the Pajaro River. Betabel Road will also be extended and will include a new 3-span bridge over the Pajaro River. The new bridges will fill approximately 20.5 acre-feet of the floodplain of the river.²² For the Pajaro River, the proposed condition will raise the floodplain by 0.1 feet between the Betabel Road bridge and the U.S. 101 bridge. The water surface elevation increase upstream of the U.S. 101 bridge will be less than 0.1 feet. The proposed bridge construction above Pajaro River will have an insignificant impact to the base flood elevation.

Impact HYDRO-6: The project will not result in substantial flooding impacts within the 100-year floodplain of the Pajaro River. **[Less-than-Significant Impact]**

²² One acre-foot is defined as the quantity of water that would cover one acre to a depth of one foot. One acre-foot of water equals approximately 325,851 gallons.

2.9.2.6 *Impacts to the San Benito River Floodplain*

The project will widen the existing U.S. 101 bridges over the San Benito River. It will also construct a new 3-span bicycle bridge over the San Benito River upstream of U.S. 101. The bicycle bridge will obstruct the 100-year flow within the floodplain, resulting in an increase the base flood elevation by 0.8 feet, which in turn will cause a negligible widening of the floodplain upstream of the bridge. Fill for the embankment for the bicycle bridge will decrease the water storage capacity of the floodplain by approximately 5.6 acre-feet, which would represent an inconsequential loss in the overall capacity of the floodplain.

The bicycle bridge will include ten 12-foot x 6-foot RCB culverts at its northerly abutment to provide additional discharge capacity for flood flows. These culverts will concentrate flood flows and, therefore, such flows will be dissipated by a basin and conveyed back to the San Benito River. The basin will be constructed along the north side of the river between the bicycle bridge and U.S. 101, on a portion of a parcel that is currently bare ground. The location of the basin is depicted on Figure 3.

Impact HYDRO-7: The project will not result in substantial flooding impacts within the 100-year floodplain of the San Benito River. [**Less-than-Significant Impact**]

2.9.2.7 *Impacts to the San Juan Creek Floodplain*

The project will widen the existing U.S. 101 bridge over San Juan Creek in order to accommodate the additional lanes of traffic. Based on the hydraulic analysis, the widened bridge's effect on the water surface elevation of the floodplain will be minimal (i.e., no more than 0.1 feet).

Impact HYDRO-8: The project will not result in substantial flooding impacts within the 100-year floodplain of San Juan Creek. [**Less-than-Significant Impact**]

2.9.3 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. The existing hydrologic and flooding conditions would remain unchanged. Portions of U.S. 101 within the project limits would remain subject to flooding, as described under "Affected Environment" in Section 2.9.1.

2.9.4 Avoidance, Minimization, and/or Mitigation Measures

The following measures are included in the project. Implementation of these measures will reduce floodplain-related impacts to a less-than-significant level.

2.9.4.1 Mitigation Measures for Impacts to Carnadero Creek Floodplain

- MM-HYDRO-1.1:** The project will construct a 100-foot wide trapezoidal flood control channel along the north side of the proposed Santa Teresa Boulevard extension. It will also install three new double 14-foot x 8-foot RCB culverts under U.S. 101. The flood control channel will divert water on the west side of U.S. 101 to the three double RCB culverts. (Design Option A only)
- MM-HYDRO-1.2:** The project will install nine new 12-foot x 6-foot RCB culverts under U.S. 101 to divert flows from Gavilan Creek to the east side of U.S. 101. (Design Option B only)
- MM-HYDRO-1.3:** The project will construct a detention basin adjacent to the reconstructed U.S. 101/SR 25 interchange, on the east side of U.S. 101 (see Figures 3 and 4). The detention basin will have a storage capacity of 120 acre-feet and a footprint of roughly 40 acres, assuming an average depth of three feet. The basin will mitigate for the loss of floodplain storage that will occur with construction of the project. The basin will be designed to drain completely following high-runoff events, without depressional areas within its bed that could result in long-term ponding that would serve as an attractant to special-status reptiles and amphibians. (Both design options)
- MM-HYDRO-1.4:** The project will install three double 14-foot x 8-foot RCB culverts under the southbound U.S. 101 off-ramp to SR 25 to convey flood flows under the ramp. (Design Option A only)
- MM-HYDRO-1.5:** The project will construct a bridge (approximately 39-feet x 176-feet) on the southbound U.S. 101 off-ramp to SR 25 to convey flood flows under the ramp. (Design Option B only)
- MM-HYDRO-1.6:** The project will construct a bridge on SR 25 just east of U.S. 101 to convey flood flows under SR 25. (Both design options)
- MM-HYDRO-1.7:** The project will install five RCPs, each with a diameter of 30 inches, under the freeway to convey floodwaters downstream to mitigate the overtopping of U.S. 101 north of the Carnadero Creek crossing. (Both design options)

Hydraulic modeling with the above-described measures in place determined that these measures will reduce the impacts of the project on the Carnadero Creek floodplain to a less-than-significant level. Specific findings are as follows:

- The 100-year flood flow will not overtop U.S. 101.

- The increase in the water surface level of the 100-year flood on the west side of U.S. 101 will be less than 0.8 feet under Design Option A.
- There will be no increase in the water surface level of the 100-year flood on the west side of U.S. 101 under Design Option B.

2.9.4.2 *Mitigation Measures for Impacts to Gavilan Creek Floodplain*

MM-HYDRO-2.1: The project will install a 6-foot x 4-foot RCB culvert and three RCPs (each with a 4-foot diameter) under the west side frontage road. (Design Option A only)

These culverts will allow floodwaters to pass under the frontage road, thereby maintaining the existing flood flow pattern.

2.10 WATER QUALITY AND STORMWATER RUNOFF

2.10.1 Regulatory Setting

2.10.1.1 *Federal Requirements: Clean Water Act*

In 1972, Congress amended the Federal Water Pollution Control Act, making the addition of pollutants to the waters of the United States (U.S.) from any point source unlawful unless the discharge is in compliance with a National Pollutant Discharge Elimination System (NPDES) permit. Known today as the Clean Water Act (CWA), Congress has amended it several times. In the 1987 amendments, Congress directed dischargers of stormwater from municipal and industrial/construction point sources to comply with the NPDES permit scheme. Important CWA sections are:

- Sections 303 and 304 require states to promulgate water quality standards, criteria, and guidelines.
- Section 401 requires an applicant for a federal license or permit to conduct any activity, which may result in a discharge to waters of the U.S. to obtain certification from the State that the discharge will comply with other provisions of the act. (Most frequently required in tandem with a Section 404 permit request. See below.)
- Section 402 establishes the NPDES, a permitting system for the discharges (except for dredge or fill material) of any pollutant into waters of the U.S. Regional Water Quality Control Boards (RWQCB) administer this permitting program in California. Section 402(p) requires permits for discharges of stormwater from industrial/construction and municipal separate storm sewer systems (MS4s).
- Section 404 establishes a permit program for the discharge of dredge or fill material into waters of the U.S. This permit program is administered by the U.S. Army Corps of Engineers (USACE).

The objective of the CWA is “to restore and maintain the chemical, physical, and biological integrity of the Nation's waters.”

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 CFR 40 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. Per Guidelines, documentation is needed that a sequence of avoidance, minimization, and compensation measures has been followed, in that order. The Guidelines also restrict permitting activities that violate water quality or toxic effluent standards, jeopardize the continued existence of listed species, violate marine sanctuary protections, or cause "significant degradation" to waters of the U.S. In addition every permit from the USACE, even if not subject to the Section 404(b)(1) Guidelines, must meet general requirements. See 33 CFR 320.4. A discussion of the LEDPA determination, if any, for the document is included in Section 2.18, *Wetlands and Other Waters*.

2.10.1.2 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 gaseous) to land or surface waters that may impair beneficial uses for surface and/or groundwater of the State. It predates the CWA and regulates discharges to waters of the State. Waters of the State include more than just Waters of the U.S., like groundwater and surface waters not considered Waters of the U.S. Additionally, it prohibits discharges of “waste” as defined and this definition is broader than the CWA definition of “pollutant”. Discharges under the Porter-Cologne Act are permitted by Waste Discharge Requirements (WDRs) and may be required even when the discharge is already permitted or exempt under the CWA.

The State Water Resources Control Board (SWRCB) and RWQCBs are responsible for establishing the water quality standards (objectives and beneficial uses) required by the CWA, and regulating discharges to ensure compliance with the water quality standards. Details regarding water quality standards in a

project area are contained in the applicable RWQCB 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 then state-listed in accordance with CWA 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 CWA requires the establishment of Total Maximum Daily Loads (TMDLs). TMDLs specify allowable pollutant loads from all sources (point, non-point, and natural) for a given watershed.

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

The SWRCB administers water rights, water pollution control, and water quality functions throughout the state. RWCQBs are responsible for protecting beneficial uses of water resources within their regional jurisdiction using planning, permitting, and enforcement authorities to meet this responsibility.

2.10.1.4 NPDES Program

Municipal Separate Storm Sewer Systems

Section 402(p) of the CWA requires the issuance of NPDES permits for five categories of stormwater dischargers, including Municipal Separate Storm Sewer Systems (MS4s). The U.S. EPA defines an MS4 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, county, or other public body having jurisdiction over stormwater, that are designed or used for collecting or conveying storm water. The SWRCB has identified Caltrans as an owner/operator of an MS4 by the SWRCB. This permit covers all Caltrans rights-of-way, properties, facilities, and activities in the state. The SWRCB or the RWQCB issues NPDES permits for five years, and permit requirements remain active until a new permit has been adopted.

Caltrans' MS4 Permit, under revision at the time of this update, contains three basic requirements:

- Caltrans must comply with the requirements of the Construction General Permit (see below);
- Caltrans must implement a year-round program in all parts of the State to effectively control stormwater and non-stormwater discharges; and
- Caltrans' stormwater discharges must meet water quality standards through implementation of permanent and temporary (construction) Best Management Practices (BMPs) and other measures.

To comply with the permit, Caltrans developed the Statewide Stormwater Management Plan (SWMP) to address stormwater pollution controls related to highway planning, design, construction, and maintenance activities throughout California. The SWMP assigns responsibilities within Caltrans for implementing stormwater management procedures and practices as well as training, public education

and participation, monitoring and research, program evaluation, and reporting activities. The SWMP describes the minimum procedures and practices Caltrans uses to reduce pollutants in stormwater and non-stormwater discharges. It outlines procedures and responsibilities for protecting water quality, including the selection and implementation of BMPs. The proposed Project will be programmed to follow the guidelines and procedures outlined in the latest SWMP to address stormwater runoff.

Part of and appended to the SWMP is the Stormwater Data Report (SWDR) and its associated checklists. The SWDR documents the relevant stormwater design decisions made regarding project compliance with the MS4 NPDES permit. The preliminary information in the SWDR prepared during the Project Initiation Document (PID) phase will be reviewed, updated, confirmed, and if required, revised in the SWDR prepared for the later phases of the project. The information contained in the SWDR may be used to make more informed decisions regarding the selection of BMPs and/or recommended avoidance, minimization, or mitigation measures to address water quality impacts.

Construction General Permit

Construction General Permit (Order No. 2009-009-DWQ), adopted on September 2, 2009, became effective on July 1, 2010. The permit regulates stormwater discharges from construction sites which result in a Disturbed Soil Area (DSA) of one acre or greater, and/or are smaller sites that are part of a larger common plan of development. By law, all stormwater discharges associated with construction activity where clearing, grading, and excavation results in soil disturbance of at least one acre must comply with the provisions of the General Construction Permit. Construction activity that results in soil disturbances of less than one acre is subject to this Construction General Permit if there is potential for significant water quality impairment resulting from the activity as determined by the RWQCB. Operators of regulated construction sites are required to develop stormwater pollution prevention plans; to implement sediment, erosion, and pollution prevention control measures; and to obtain coverage under the Construction General Permit.

The 2009 Construction General Permit separates projects into Risk Levels 1, 2, or 3. Risk levels are determined during the planning and design phases, and are based on potential erosion and transport to receiving waters. Requirements apply according to the Risk Level determined. For example, a Risk Level 3 (highest risk) project would require compulsory stormwater runoff pH and turbidity monitoring, and before construction and after construction aquatic biological assessments during specified seasonal windows. For all projects subject to the permit, applicants are required to develop and implement an effective Stormwater Pollution Prevention Plan (SWPPP). In accordance with Caltrans' Standard Specifications, a Water Pollution Control Plan (WPCP) is necessary for projects with a DSA less than one acre.

Section 401 Permitting

Under Section 401 of the Clean Water Act (CWA), any project requiring a federal license or permit that may result in a discharge to a water body must obtain a 401 Certification, which certifies that the project

will be in compliance with State water quality standards. The most common federal permits triggering 401 Certification are CWA Section 404 permits issued by the U.S. Army Corps of Engineers (USACE). The 401 permit certifications are obtained from the appropriate Regional Water Quality Control Board (RWQCB), dependent on the project location, and are required before USACE issues a 404 permit.

In some cases the RWQCB may have specific concerns with discharges associated with a project. As a result, the RWQCB may issue a set of requirements known as Waste Discharge Requirements (WDRs) under the State Water Code that define activities, such as the inclusion of specific features, effluent limitations, monitoring, and plan submittals that are to be implemented for protecting or benefitting water quality. WDRs can be issued to address both permanent and temporary discharges of a project.

2.10.2 Affected Environment

The information in this section is based primarily on a technical Stormwater Data Report (August 2010) that was prepared for the project. This study is available for review at the locations listed inside the front cover of this document.

Some of the stormwater runoff from the project area percolates into the ground, but much of it flows into local waterways. As noted previously, the project segment of U.S. 101 crosses Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, San Benito River, and San Juan Creek. All of these streams eventually flow into the Pajaro River, which in turn flows into Monterey Bay. The water quality in the creeks depends upon the volume of water at a given time of the year. Water quality is also dependent upon the concentration of contaminants, which flow into the creeks (either overland or through storm drains) as a component of agricultural or urban runoff. These contaminants include such items as oil and grease, fuel residues, tire particles, agricultural byproducts (fertilizers, herbicides, and pesticides), plant and animal debris (e.g., leaves, dust, animal feces, etc.) litter, and heavy metals. In sufficient concentrations, these pollutants have been found to adversely affect the aquatic habitat of these streams and Monterey Bay, into which the streams flow.

Section 303(d) of the Clean Water Act requires that states develop a list of water bodies that do not meet water quality standards. According to the latest list developed by the Central Coast RWQCB in 2006, the Pajaro River is listed as an impaired water body for boron, fecal coliform, nitrate, nutrients and sedimentation/siltration. The San Benito River is also listed as an impaired water body for fecal coliform and sedimentation/siltration.

2.10.3 Environmental Consequences of the Build Alternative

The proposed project may affect water quality during the short-term (i.e., construction phase) and during the long-term (i.e., operational phase). The short-term effects are described in Section 2.22.6. The long-term effects are described below.

The proposed project will result in an increase in impervious surfaces in the project area.²³ The additional impervious areas that will result from the project will increase the volume and velocity of the stormwater discharge. The increase in post-project stormwater discharges will, in turn, have the potential to increase erosion and cause other adverse effects in local waterways. The additional impervious area that will result from the project is shown in Table 23.

T A B L E 23			
ADDITIONAL IMPERVIOUS SURFACE CREATED BY THE PROJECT			
	Santa Clara County	San Benito County	Total
Design Option A	62.5 acres	13.0 acres	75.5 acres
Design Option B	60.6 acres	13.0 acres	73.6 acres

Source: Stormwater Data Report for U.S. 101 Improvement Project, 2010.

The additional stormwater runoff resulting from the project will contain the same pollutants as the existing stormwater runoff. As noted above, these pollutants adversely affect the water quality of the streams into which the stormwater is discharged.

Impact WQ-1: Construction of the project will increase impervious surfaces, which will increase stormwater runoff. This could lead to the degradation of water quality in nearby creeks and rivers. **[Less-than-Significant with Mitigation Listed in Section 2.10.5]**

2.10.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. There would be no increase in impervious surfaces and no changes to the existing drainage system along U.S. 101. The stormwater treatment areas that would be constructed as part of the Build Alternative would not be constructed.

²³*Impervious* surfaces are those that seal the ground surface and prevent water from infiltrating into the ground. Such surfaces include asphalt, concrete, brick, stone, rooftops. When compared to total surface area, the percentage of impervious surfaces in urbanized areas is significantly high than in rural areas.

2.10.5 Avoidance, Minimization, and/or Mitigation Measures

To minimize post-construction water quality effects, post-construction best management practices (BMPs) have been considered for incorporation into the project. Those considered include infiltration devices, biofiltration strips and swales, wet basins, media filters, detention devices, and multichamber treatment devices (often referred to as "treatment trains"). Biofiltration strips or swales have been identified as the most feasible BMPs for this project.²⁴ Therefore, the following measures are included in the project. Implementation of these measures will reduce water quality impacts due to the project to a less-than-significant level.

MM-WQ-1.1: The project will create approximately 32.4 acres of biofiltration strips and swales along U.S. 101 within the project limits. The strips/swales will be located along the edges of the roadways and interchange ramps. Consistent with the requirements of Caltrans' NPDES permit, this acreage represents the maximum practicable extent of treatment for this project within the constraints of the site. This acreage is based upon preliminary design and will be updated during final design. (Both Design Options)

2.11 GEOLOGY/SOILS/SEISMIC/TOPOGRAPHY

2.11.1 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 CEQA.

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 its projects. The current policy is to use the anticipated Maximum Credible Earthquake (MCE), from young faults in and near California. The MCE is defined as the largest earthquake that can be expected to occur on a fault over a particular period of time.

²⁴ *Biofiltration strips and swales* are vegetated surfaces that remove pollutants by filtration through grass, sedimentation, adsorption to soil or grass and infiltration through the soil. Strips and swales are mainly effective at removing debris and solid particles, although some constituents are removed by adsorption into the soil.

2.11.2 Affected Environment

The information in this section is based primarily on a Geotechnical Assessment Report (December 2009) that was prepared for the project. A copy of this report is available for review at the locations listed inside the front cover of this document.

The project segment of U.S. 101 is relatively flat (with elevations gradually climbing in certain areas) and bound by moderately steep to steep slopes and agricultural fields. Existing slope failures have been mapped and observed on the cut and natural slopes that are present along the project alignment. The ground surface elevation in the project area ranges from approximately 140 to 190 feet above mean sea level (msl).

The project alignment is generally underlain by alluvial soils associated with southern Santa Clara Valley, the Pajaro River and San Benito River floodplains, and fill soils associated with roadway and bridge construction. On-site soils have a high expansion potential. Expansive soil can be detrimental to slope stability, pavements, retaining structures, and other improvements. The on-site soils also have potential to corrode or weaken concrete structures and uncoated steel.

The project alignment is located within the seismically active San Francisco Bay Area. A complex zone of interconnecting, northwest-trending faults, known as the Sargent fault zone, crosses through the central portion of the project alignment. The Sargent Fault (Northwestern section) is considered an active fault and crosses beneath the U.S. 101/Sargent bridges. The Sargent Fault (Southeastern section), which crosses beneath the Pajaro River, is not considered "active" at this time; however, it is possible that it will be zoned as such in the future. Other nearby active faults include the San Andreas Fault located approximately 0.5 miles southwest of the project alignment, the Zayante-Vergeles Fault located approximately 4.8 miles south of the project alignment, and the Calaveras Fault zone (Southern Calaveras section) located approximately 4.5 miles east of the project alignment.

The Sargent, San Andreas, Zayante-Vergeles, and Calaveras Faults have Maximum Credible Earthquake (MCE) magnitudes of 6.75, 7.9, 7.0, and 7.4, respectively. Significant seismic events with respect to existing and/or proposed structures would be associated with the Sargent (MCE = 6.75) or San Andreas (MCE = 8.0) fault zones due, in part, to their proximity to the project alignment. Generally, hazards associated with seismic activity include ground surface rupture, strong ground motion, liquefaction, seismically-induced settlement, and seismically-induced slope instability. The project area is subject to all of these hazards.

2.11.3 Environmental Consequences of the Build Alternative

The proposed project will involve typical highway excavation and grading practices necessary to widen the highway (which requires the widening or replacement of bridges and culverts within the project limits), reconstruction of the U.S. 101/SR 25 interchange, extension of Santa Teresa Boulevard, and

construction of auxiliary lanes, bicycle facilities, ramp improvements, and a grade-separated railroad crossing. There are no geologic features within the project alignment that would pose special or unique hazards to users of the proposed improvements. The project will implement standard engineering practices to ensure that geotechnical and soil hazards do not result from its construction or operation and comply with Caltrans' Standard Specifications.

The site is within the seismically active San Francisco Bay Area and severe ground shaking is probable during the anticipated life of the project. Users of the highway, interchanges, roadways, bridges, and bicycle facilities would be exposed to hazards associated with severe ground shaking during a major earthquake on one of the region's active faults. This hazard is not unique to the project because it applies to all locations throughout the greater Bay Area. The proposed project will not increase the existing exposure to hazards associated with earthquakes; the hazards in the area will be the same with or without the project.

The project will be designed and constructed in accordance with Caltrans' Seismic Design Criteria to avoid or minimize potential damage from seismic shaking on the site. The structures and roadways will be built to withstand a peak bedrock acceleration of 0.5g. Potential seismic effects will be minimized by the use of standard engineering techniques mandated by the California Building Code and Caltrans' Design Standards.

Impact GEO-1: Construction of the project will not expose people to significant geologic hazards or risks. **[Less-than-Significant Impact]**

2.11.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. The existing environment would remain unchanged.

2.11.5 Avoidance, Minimization, and/or Mitigation Measures

No avoidance, minimization, or mitigation measures are required.

2.12 PALEONTOLOGY

2.12.1 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 under CEQA.

2.12.2 Affected Environment

The information in this section is based primarily on a technical Paleontological Evaluation Report (November 2008, with May 2011 Addendum). A copy of this report is available for review at the locations listed inside the front cover of this document.

Locations were identified within the project limits where there is a high potential for construction activities to impact paleontological resources. The following locations include rock types which, based on previous studies, contain or are likely to contain significant animal and/or plant fossils.

- Miocene-Pliocene sedimentary rocks
- Plio-Pleistocene continental deposits
- Quaternary alluvium that includes Pleistocene older alluvium and Holocene alluvium²⁵

Miocene-Pliocene sedimentary rocks contain fossils of mammals, fish, sharks and birds, and are highly sensitive.

Plio-Pleistocene continental deposits contain fossils of bison, camels, horses and mammoths. Mammoth fossils have been recovered from these continental deposits near the project area at two locations just north and south of Hollister. These fossils are also highly sensitive.

The Pleistocene older alluvium contains fossils of bison, peccaries (similar to a large pig) and mammoths. Although the uppermost few feet of Holocene alluvium are not very sensitive, deeper excavation may encounter scientifically important fossils. These fossils are considered highly sensitive.

Miocene-Pliocene mammal, fish, shark, and bird fossils, the upper Pliocene to lower Pleistocene camel and horse fossils, and the Pleistocene mammoth and peccary fossils are scientifically important for several reasons. Fossils found here could provide important data for the interpretation of the relationship between species and their evolution. Fossils have also been very important in establishing the ages of, and relationships between, sedimentary rock units in central California, and thus have played an important role in deciphering the history of faulting in this region.

2.12.3 Environmental Consequences of the Build Alternative

As described in the previous section, there are locations within the project limits that are likely to contain significant paleontological resources. Under both design options, construction of the project will

²⁵These terms represent geologic time spans. **Miocene** is the period from 23 million to 5 million years ago. **Pliocene** is the period from 5 million to 2.5 million years ago. **Pleistocene** is the period from 2.5 million to 10 thousand years ago. **Holocene** is the period from 10 thousand years ago to the present.

involve excavation in these sensitive locations. If paleontological resources are present, the construction activities would impact those resources and could destroy scientifically important fossils.

Impact PALEO-1: Construction of the proposed project could impact paleontological resources and could destroy scientifically important fossils. **[Less-than-Significant with Mitigation Listed in Section 2.12.5]**

2.12.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed and no ground-disturbing activities would occur. Therefore, there would be no impact on paleontological resources that might be present in the project area.

2.12.5 Avoidance, Minimization, and/or Mitigation Measures

The following measures are included in the project. Implementation of these measures will reduce impacts to paleontological resources to a less-than-significant level.

MM-PALEO-1.1: A nonstandard special provision for paleontology mitigation will be included in the construction contract special provisions section to advise the construction contractor of the requirement to cooperate with the paleontological salvage.

MM-PALEO-1.2: A qualified principal paleontologist (M.S. or PhD in paleontology or geology familiar with paleontological procedures and techniques) will be retained to prepare a detailed Paleontological Mitigation Plan (PMP) prior to the start of construction. The PMP will include the following elements and stipulations:

- Areas where preconstruction survey and salvage are needed will be identified. This will apply to any areas where paleontologically sensitive strata are exposed at the surface and will be disturbed by project construction.
- A monitoring plan that will identify all areas where excavation will disturb in situ surface exposures of strata assigned to geologic units identified as highly sensitive for paleontological resources. Monitoring will be required for all disturbance of highly sensitive units. Monitoring will not be needed for shallow (less than about three feet deep) disturbance in areas mapped as underlain by units of low paleontological sensitivity, or where disturbance would be entirely confined (in three dimensions) within existing artificial fill. However, monitoring will be required where disturbance more than three feet deep, including drilling

for cast-in-place foundation piers or pilings, will be required in areas where highly sensitive strata are present in the subsurface beneath a veneer of low-sensitivity material.

- All geologic work will be performed under the supervision of a California Professional Geologist.
- The qualified principal paleontologist will be present at pre-grading meetings to consult with grading and excavation contractors.
- Before excavation begins, a training session in employee environmental awareness and fossil identification will be conducted by the principal paleontologist for all personnel involved in earthmoving for the project.
- A paleontological monitor, approved by the qualified principal paleontologist, will be on-site to inspect cuts for fossils at all times during original grading involving sensitive geologic formations.
- When fossils are discovered, the paleontologist (or paleontological monitor) will be called to recover them. Construction work in these areas will be halted or diverted to allow recovery of fossil remains in a timely manner.
- Bulk sediment samples will be recovered from fossiliferous horizons and processed for microvertebrate remains as determined necessary by the principal paleontologist.
- Fossil remains collected during the monitoring and salvage portion of the mitigation program will be cleaned, repaired, sorted, and cataloged.
- Prepared fossils, along with copies of all pertinent field notes, photos, and maps, will then be deposited in a scientific institution with paleontological collections. The repository institution should be identified in advance of construction (typically as part of PMP development), and the PMP should include info on the repository agreement.
- A final report will be completed that outlines the results of the mitigation program and will be signed by the Principal Paleontologist and Professional Geologist. Copies of the final report will be sent appropriate institutions so that the documentation will be available to the scientific community going forward.

2.13 HAZARDOUS WASTE/MATERIALS

2.13.1 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 (RCRA) and the Comprehensive Environmental Response, Compensation and Liability Act of 1980 (CERCLA). The purpose of CERCLA, often referred to as Superfund, is to clean up contaminated sites so that public health and welfare are not compromised. RCRA 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 (OSHA)
- Atomic Energy Act
- Toxic Substances Control Act
- Federal Insecticide, Fungicide, and Rodenticide Act

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.

2.13.2 Affected Environment

The information in this section is based primarily on a technical Initial Site Assessment (December 2009) that was prepared for the project. A copy of this study is available for review at the locations listed inside the front cover of this document.

Historically, the project area has been developed with a highway (i.e., U.S. 101), local roadways, a railroad, bridges, agriculture including agricultural buildings and orchards, a sand quarry, and businesses including a Chevron Service Station, a concrete product manufacturing facility, a school, and a RV park. The land uses today are much the same with the addition of commercial and residential developments.

Sites with Known Contamination

There are several sites within a 0.25-mile radius of the project alignment where some type of hazardous materials spill/leakage/contamination has occurred. Based on the status of the sites (e.g., remediation complete/closed case, plume contained on-site) and the direction of groundwater flow at the sites, only one of the identified sites has the potential to adversely affect the project.

The one site is the Chevron Service Station at 5887 Monterey Road in Gilroy, which is adjacent to the northbound U.S. 101 off-ramp to Monterey Street. At that site, a leaking underground storage tank resulted in contaminated soil and groundwater. There are 13 groundwater monitoring wells at the site that monitor the concentrations of various pollutants and the direction of groundwater flow. At present, contamination does not appear to have migrated off-site, but monitoring is continuing.

Sites with Potential Contamination

An abandoned truck scale is located along U.S. 101 at the U.S. 101/Sargent bridges. There is a potential that hydraulic oil was used during the time the scale was in operation. While staining was not observed around the scale, there is a potential for oil to impact unseen areas of adjacent soil in the immediate vicinity of the scale.

Agricultural uses are present, and have historically been present, along much of the project segment of U.S. 101. Soil, surface water, and groundwater in these agricultural areas may be impacted with herbicide and pesticides.

Based on the estimated date of construction (pre-1990) of the Willis Construction Company, a concrete product manufacturing facility situated on the northwest corner of the SR 129/Y Road intersection, there is a potential for asbestos to have been added to concrete products at this facility. Asbestos-containing dust emanating from this facility may have impacted surficial soils near the property.

Railroads use lubricants containing petroleum hydrocarbons for train maintenance and herbicides and pesticides to control weeds and insects along their tracks. Railroad ties are also coated with creosote in many cases. Therefore, the three railroads intersecting the alignment (plus one former railroad) may have used chemicals associated with maintaining the track and train, which may have impacted shallow soils on-site.

During the preparation of the Initial Site Assessment, a debris pile was observed near U.S. 101 Post Mile 1.2 (i.e., between the Tick Creek and Tar Creek crossings), adjacent to and east of where the UPRR crosses an access road. The pile contained concrete, metal, and wood debris, as well as approximately 40 linear feet of 8-inch piping that likely contains asbestos.

Aerially-Deposited Lead

Until recently, lead was commonly added to gasoline.²⁶ As a result, lead was emitted as a component of motor vehicle exhaust. Soil sampling along many roadways has found that concentrations of lead exceed applicable thresholds for classification as a hazardous material. This phenomenon known as

²⁶Lead is a heavy metal that is found in many products. Lead is poisonous to humans. It is especially toxic to the nervous system, although it can adversely affect many systems and organs. In recent years, lead has been removed from certain products such as paint and gasoline in order to reduce the potential for chronic exposure.

"aerially-deposited lead" (ADL) is widespread. Because the project segment of U.S. 101 was built prior to the phaseout of lead as a gasoline additive, elevated concentrations of lead are likely to be present in the soil along the freeway. In fact prior sampling and testing within portions of the project alignment found elevated concentrations of ADL in the soil.

Asbestos-Containing Materials and Lead-Based Paint

Due to the age of the buildings and bridge structures located within the project limits, there is a high potential for the presence of asbestos-containing materials²⁷ and/or lead-based paint. Lead-based paint may also be present in the lane striping and other pavement markings on the highways located within the project limits. Naturally occurring asbestos may also be contained in the aggregate used in bridge construction materials.

2.13.3 Environmental Consequences of the Build Alternative

As discussed above, there is one site (the Chevron Service Station at 5887 Monterey Road) adjacent to U.S. 101 where there is known groundwater contamination. If construction occurs near that site and contaminated groundwater is encountered, construction workers could be exposed.

Based on the ages of the buildings to be demolished by the project, it is likely that asbestos-containing materials and lead-based paints are present. Asbestos-containing materials and lead-based paints are also likely to be present in the existing highway bridges. Demolition and construction activities at these locations could expose construction workers to unsafe levels of these substances.

Aerially-deposited lead is present within the project alignment. Based on testing completed to date, there are a number of locations where the concentrations of lead in the soil are such that the soil meets the definition of a hazardous waste.

Construction activities within or immediately adjacent to the UPRR could expose construction workers to various hazardous substances (e.g., petroleum hydrocarbons, pesticides, herbicides, creosote) that were commonly used by the railroad.

Construction activities within soils that are used, and were historically used, for agricultural purposes could expose construction workers to various hazardous substances (e.g., pesticides and herbicides) that were commonly associated with crop production.

²⁷Asbestos is a mineral that is found in many products because of its resistance to damage from chemicals and heat, as well as its noise absorption properties. However, asbestos is toxic, especially when inhaled. It can cause diseases such as lung cancer, mesothelioma, and asbestosis.

If construction occurs within the site of the former truck scale, and the soil is determined to be contaminated with hydraulic oil, construction workers could be exposed to the hazards associated with that substance.

Impact HAZ-1: Construction of the proposed project could expose construction workers to hazardous substances in concentrations that exceed regulatory thresholds. **[Less-than-Significant with Mitigation Listed in Section 2.13.5]**

2.13.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be built and no construction activities would occur. Therefore, by definition, there would be no potential for encountering hazardous waste or materials that might be present in the project area.

2.13.5 Avoidance, Minimization, and/or Mitigation Measures

The following measures are included in the project. Implementation of these measures will reduce hazardous materials impacts to a less-than-significant level.

MM-HAZ-1.1: If construction activities occur within 50 feet of the Chevron Service Station located at 5887 Monterey Road and groundwater is encountered, the groundwater will be sampled and analyzed for constituents of concern related to the Chevron Service Station contaminants prior to disposal. If groundwater is contaminated, it will be contained and either treated and discharged to the sanitary sewer (if sample analytical results meet local sanitary sewer acceptance criteria) or transported to a licensed groundwater treatment facility.

MM-HAZ-1.2: Prior to project development, a soil investigation will be conducted to determine whether aerially deposited lead (ADL) has affected soils that will be excavated as part of the proposed project. This applies to locations where such testing has not already been completed. The investigation for ADL will be performed in accordance with Caltrans' Lead Testing Guidance Procedure. The analytical results will be compared against applicable hazardous waste criteria. Based on analytical results, the investigation will provide recommendations regarding management and disposal of affected soils in the project area including the reuse potential of ADL-affected soil during project development. The provisions of a variance granted to Caltrans by the California Department of Toxic Substances Control on September 22, 2000 (or any subsequent variance in effect when the project is constructed) regarding aerially-deposited lead will be followed.

- MM-HAZ-1.3:** If contaminated soil is encountered (based on physical observation) during trenching activities along the alignment, the soil will be stockpiled and analyzed for potential contaminants. If the soil can not be reused on-site, the analyses will be sent to a permitted landfill for profiling and waste characterization prior to transport to the landfill. In addition, if contaminated groundwater is encountered during construction, similar steps should be taken to characterize and dispose of the groundwater as was discussed in MM-HAZ-1.2.
- MM-HAZ-1.4:** Herbicides and pesticides will be analyzed in the shallow soil within the project limits in site areas located adjacent to or on agricultural land. Shallow soil samples will be collected and analyzed for metals, total petroleum hydrocarbons, volatile organic compounds, polycyclic aromatic hydrocarbons, herbicides and pesticides from areas adjacent to railroad tracks or within railroad crossings. If soil is impacted with any of the compounds discussed above, it will be stockpiled and sampled for reuse or disposal options.
- MM-HAZ-1.5:** Testing for the presence of lead-based paint will be undertaken on the existing bridge structures, in pavement markings, and within the existing buildings to be demolished. If this substance is found to be present, applicable regulations pertaining to its removal and disposal will be followed.
- MM-HAZ-1.6:** Testing for the presence of asbestos-containing materials on the existing bridge structures, and within the existing buildings to be demolished, will occur. If asbestos is found to be present, applicable regulations pertaining to its removal and disposal will be followed.
- MM-HAZ-1.7:** During construction, soil disturbed in the vicinity of the San Benito River may contain elevated levels of naturally-occurring asbestos (NOA). If elevated levels of NOA are found, then dust suppression measures consistent with the Air Resources Board Air Toxics Control Measure for asbestos will be implemented.

2.14 AIR QUALITY

2.14.1 Regulatory Setting

The Federal Clean Air Act (FCAA) as amended in 1990 is the federal law that governs air quality. The California Clean Air Act of 1988 is its companion state law. These laws, and related regulations by the United States Environmental Protection Agency (U.S. EPA) and the California Air Resources Board (ARB), 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 (NAAQS). NAAQS and State ambient air

quality standards have been established for six transportation-related criteria pollutants that have been linked to potential health concerns. The criteria pollutants are: carbon monoxide (CO), nitrogen dioxide (NO₂), ozone (O₃), particulate matter (PM, broken down for regulatory purposes into particles of 10 micrometers or smaller - PM₁₀ and particles of 2.5 micrometers and smaller - PM_{2.5}), lead (Pb), and sulfur dioxide (SO₂). In addition, State standards exist for visibility reducing particles, sulfates, hydrogen sulfide (H₂S), and vinyl chloride. The NAAQS and State standards are set at a level that protects public health with a margin of safety, and are subject to periodic review and revision. Both State and Federal regulatory schemes also cover toxic air contaminants (air toxics); some criteria pollutants are also air toxics or may include certain air toxics within their general definition.

Federal and State air quality standards and regulations provide the basic scheme for project-level air quality analysis under the National Environmental Policy Act (NEPA) and the California Environmental Quality Act (CEQA). In addition to this type of environmental analysis, a parallel "Conformity" requirement under the FCAA also applies.

FCAA Section 176(c) prohibits the U.S. Department of Transportation and other Federal agencies from funding, authorizing, or approving plans, programs or projects that are not first found to conform to State Implementation Plan (SIP) for achieving the goals of Clean Air Act requirements related to the NAAQS. "Transportation Conformity" takes place on two levels: the regional, or planning and programming, level, and the project level. The proposed project must conform at both levels to be approved. Conformity requirements apply only in nonattainment and "maintenance" (former nonattainment) areas for the NAAQS, and only for the specific NAAQS that are or were violated. U.S. EPA regulations at 40 CFR 93 govern the conformity process.

Regional conformity is concerned with how well the regional transportation system supports plans for attaining the standards set for carbon monoxide (CO), nitrogen dioxide (NO₂), ozone (O₃), particulate matter (PM₁₀ and PM_{2.5}), and in some areas sulfur dioxide (SO₂). California has attainment or maintenance areas for all of these transportation-related "criteria pollutants" except SO₂, and also has a nonattainment area for lead (Pb). However, lead is not currently required by the FCAA to be covered in transportation conformity analysis. Regional conformity is based on Regional Transportation Plans (RTPs) and Federal Transportation Improvement Programs (FTIPs) that include all of the transportation projects planned for a region over a period of at least 20 years (for the RTP), and 4 years (for the FTIP). RTP and FTIP conformity is based on use of travel demand and air quality models to determine whether or not the implementation of those projects would conform to emission budgets or other tests showing that requirements of the Clean Air Act and the SIP are met. If the conformity analysis is successful, the Metropolitan Planning Organization (MPO), and the Federal Highway Administration (FHWA) and Federal Transit Administration (FTA), make the determinations that the RTP and FTIP are in conformity with the SIP for achieving the goals of the Clean Air Act. Otherwise, the projects in the RTP and/or FTIP must be modified until conformity is attained. If the design concept, scope, and "open-to-traffic" schedule of a proposed transportation project are the same as described in the RTP and the FTIP, 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 (CO) and/or particulate matter (PM₁₀ or PM_{2.5}). A region is "nonattainment" if one or more of the monitoring stations in the region measures violation of the relevant standard, and U.S. EPA officially designates the area nonattainment. Areas that were previously designated as nonattainment areas but subsequently meet the standard may be officially redesignated to attainment by U.S. EPA, and are then called "maintenance" areas. "Hot spot" analysis is essentially the same, for technical purposes, as CO or particulate matter analysis performed for NEPA purposes. Conformity does include some specific procedural and documentation standards for projects that require a "hot spot" analysis. In general, projects must not cause the "hot spot"-related standard to be violated, and must not cause any increase in the number and severity of violations in nonattainment areas. If a known CO 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.

2.14.2 Affected Environment

The information in this section is based primarily on an Air Quality Report (October 2010) and a Mobile Source Air Toxics Emissions Report (October 2010) that were prepared for the project. Copies of these studies are available for review at the locations listed inside the front cover of this document.

San Francisco Bay Air Basin

The Santa Clara County portion of the project is in the San Francisco Bay Area Air Basin²⁸, which has been designated by the U.S. EPA as nonattainment for ground level ozone and PM_{2.5} and as an attainment/maintenance area for CO. The Air Basin does not meet State ozone and PM standards set by the California Air Resources Board (CARB). The Bay Area Air Quality Management District (BAAQMD), along with MTC and the Association of Bay Area Governments, are the agencies responsible for developing plans to attain and maintain ambient air quality standards in the San Francisco Bay Area.

The San Francisco Bay Area is considered to be one of the cleanest metropolitan areas in the country with respect to air quality. BAAQMD monitors air quality conditions at over 30 locations throughout the Bay Area. The monitoring stations closest to the project site are in Gilroy and San Jose. The Gilroy station monitors only ozone.

Ozone is the air pollutant of greatest concern in summer. Prevailing summertime wind conditions tend to cause a build-up of ozone in Santa Clara County. Ozone levels measured in Gilroy exceeded the state 1-hour standard from zero to four times in 2003-2007. Exceedances of the national 8-hour standard occurred two times in 2003. The new state 8-hour standard was exceeded two times in 2006.

²⁸The **San Francisco Bay Area Air Basin** encompasses the following nine counties: Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, Santa Clara, Solano, and Sonoma.

The combination of vehicle exhaust and wood smoke under stagnant air quality conditions leads to a build up of particulates in late fall and winter and, therefore, PM is another pollutant of concern in Santa Clara County.²⁹ The Gilroy station does not measure PM₁₀ or PM_{2.5}, so data from the San Jose station, where PM is measured every sixth day, are reported. Measured exceedances of the state PM₁₀ standard have occurred two to four measurement days in recent years in San Jose, therefore PM₁₀ standards are exceeded about 12 to 24 days per year. Although the PM_{2.5} levels did not exceed standards during this period, the new national 24-hour standard would have been exceeded each year in San Jose.

North Central Coast Air Basin

The San Benito County portion of the project is in the North Central Coast Air Basin³⁰, which has been designated by EPA as attainment/unclassified for ground level ozone and as an attainment/unclassified for CO. The North Central Coast Air Basin does not meet state ozone and PM standards set by CARB. The Monterey Bay Unified Air Pollution Control District (MBUAPCD) and Association of Monterey Bay Area Governments are the agencies responsible for developing plans to attain and maintain ambient air quality standards in the North Central Coast Air Basin.

Similar to the San Francisco Bay Area, the Monterey Bay Area is considered to be one of the cleanest metropolitan areas in the country with respect to air quality. The MBUAPCD monitors air quality conditions at nine locations throughout the North Central Coast Area. The monitoring station closest to the project site is in Hollister.

Ozone is the air pollutant of greatest concern in summer in San Benito County. Ozone levels measured in Hollister exceeded the state 1-hour standard from zero to four times in 2003-2007. Exceedances of the national 8-hour standard occurred once in 2006. The new state 8-hour standard was exceeded five times once in 2006. The current state 8-hour ozone standard was exceeded 77 times between 2003 and 2007 at a monitoring station located in Pinnacles National Park. There have been no PM₁₀ exceedances measured since 2003 at the Hollister station.

²⁹EPA's website (www.epa.gov) defines particulate matter (PM) as a complex mixture of extremely small particles and liquid droplets, including acids (such as nitrates and sulfates), organic chemicals, metals, and soil or dust particles. The size of particles is directly linked to their potential for causing health problems. Small particles less than 10 micrometers in diameter pose the greatest problems, because they can get deep into your lungs, and some may even get into your bloodstream. Exposure to such particles can affect both your lungs and your heart. Small particles of concern include "inhalable coarse particles" (such as those found near roadways and dusty industries), which are larger than 2.5 micrometers and smaller than 10 micrometers in diameter; and "fine particles" (such as those found in smoke and haze), which are 2.5 micrometers in diameter and smaller.

³⁰The **North Central Coast Air Basin** encompasses Monterey, San Benito, and Santa Cruz Counties. The North Central Coast Air Basin is sometimes referred to as the Monterey Bay Air Basin.

Mobile Source Air Toxics

Mobile source air toxics (MSATs) are compounds emitted from highway vehicles and non-road equipment that are known or suspected to cause cancer or other serious health and environmental effects. Some toxic compounds are present in fuel and are emitted to the air when the fuel evaporates or passes through the engine unburned. Other toxics are emitted from the incomplete combustion of fuels or as by-products. Metal air toxics result from engine wear or from impurities in oil or gasoline.

The EPA and CARB have identified six priority MSATs. These are 1) benzene, 2) formaldehyde, 3) acetaldehyde, 4) diesel particulate matter/diesel exhaust organic gases, 5) acrolein, and 6) 1,3-butadiene. CARB has found that diesel PM contributes over 70% of the known risk from air toxics and poses the greatest cancer risks among all identified air toxics. Diesel trucks contribute more than half of the total diesel combustion sources. However, the CARB has adopted a Diesel Risk Reduction Plan with control measures that would reduce the overall diesel PM emissions by about 85% from 2000 to 2020.

2.14.3 Environmental Consequences of the Build Alternative

The short-term (i.e., construction phase) air quality effects of the proposed project are described in Section 2.22.4. The project's long-term (i.e., operational phase) effects are described below.

Clean Air Act Conformity

The Santa Clara County portion of the project is located in the San Francisco Bay Area Air Basin, which does not meet federal ambient air quality standards for O₃ and PM_{2.5}. Due to the nonattainment designation for O₃ and PM_{2.5}, and because the project is a regionally significant project, the Santa Clara County portion of the project is subject to federal regional conformity rules.

The San Benito County portion of the project is located in the North Central Coast Air Basin, which is classified by EPA as attainment under the 8-hour NAAQS for ground level ozone. The area is also classified by the EPA as unclassified/attainment under the NAAQS for CO. Therefore, the San Benito County portion of the project is not subject to federal conformity rules.

The northerly portion of the proposed project, including the reconstruction of the U.S. 101/SR 25 interchange, is included in MTC's 2035 RTP as Project Number 21714, which was approved on April 22, 2009. That same portion of the project is also included in the 2009 Transportation Improvement Program (TIP) as Project Number SCL070003. The 2009 TIP was found to conform by FHWA and the Federal Transit Administration (FTA) in November 2008.

The segment of the project between SR 25 and the Santa Clara County/San Benito County line is not currently included in MTC's RTP or TIP. A regional conformity analysis that includes this portion of the project will be undertaken before the project is approved.

According to MTC, the project is not subject to project-level conformity for PM_{2.5}, because no federal approvals and/or federal funds are involved.

Traffic-Related Carbon Monoxide (CO) Impacts

Project impacts from local traffic were evaluated by the quantitative method, which is modeling roadside CO concentrations associated with the project and comparing them to federal and state CO Standards. A total of five locations along the U.S. 101 alignment in the project area, where there would be a combination of the 1) highest traffic volumes, 2) greatest project traffic contribution, and 3) highest level of congestion, were modeled. This is because high volume freeways and congested intersections with a large volume of traffic have the greatest potential to cause high-localized concentrations of CO.

Predicted CO concentrations, which include background levels, are shown in Table 24. This assessment was conducted for future No-Build and Build conditions in 2015 and 2035. The results indicate that future CO levels with or without the project would remain well below both federal and state standards.

TABLE 24								
PROJECTED WORST-CASE CARBON MONOXIDE CONCENTRATIONS								
[Expressed in parts-per-million]								
Location along U.S. 101	Year 2015				Year 2035			
	No Build		Build		No Build		Build	
	1-hr.	8-hr.	1-hr.	8-hr.	1-hr.	8-hr.	1-hr.	8-hr.
North of Monterey Street	4.6	3.3	4.6	3.3	4.5	3.2	4.5	3.2
North of SR 25	4.6	3.3	4.7	3.4	4.4	3.1	4.5	3.2
North of San Benito County Line	4.5	3.2	4.6	3.3	4.4	3.1	4.5	3.2
North of Y Road	4.7	3.4	4.8	3.5	4.6	3.3	4.7	3.4
North of SR 129	4.7	3.4	4.7	3.4	4.6	3.3	4.6	3.3

The 1-hour state standard is 20 parts-per-million. The 1-hour federal standard is 35 parts-per-million. Both the state and federal 8-hour standards are 9 parts-per-million

Source: Air Quality Study for the U.S. 101 Improvement Project, 2010.

Comparing the No-Build and Build alternatives at the five modeled locations, CO concentrations would be the same or the difference would be negligible (i.e., one-tenth of one part-per-million).

Impact AQ-1: Implementation of the proposed project would not cause or contribute to violations of CO standards. **[No Impact]**

Mobile Source Air Toxics Impacts

While there are existing uncertainties that do not allow quantitative estimates of health effects from MSAT emissions in the project area, MSAT emissions can be examined in the project area and the relative impacts of these emissions can be estimated under different scenarios. The University of California, Davis, under contract to Caltrans developed a project-level MSAT analysis spreadsheet tool. This tool was developed with cooperation of Caltrans, CARB and FHWA. This analysis predicts emissions of the six priority MSATs using project-specific traffic information and vehicle emissions factors.

Table 25 represents the total MSAT emissions from traffic on the project segment of U.S. 101 under various scenarios, both with and without the project. The data in Table 25 provide information as to 1) how MSAT emissions will decrease between existing conditions and the year 2035, and 2) the effect of the project on MSAT emissions. The data show that, with or without the project, emissions for all six MSATs are projected to decrease considerably over existing conditions as a result more stringent emissions standards mandated by EPA and CARB. Diesel PM is projected to experience a decrease of 82% from 2005 to 2035, while the other MSATs are projected to decrease by between 50% and 83%.

	Diesel PM	Benzene	1,3-Butadiene	Acetaldehyde	Acrolein	Formaldehyde
Base Year (2005)	75.3	10.9	2.1	10.5	0.4	23.8
2015 - No Project	40.0 (-47%)	4.9 (-55%)	0.9 (-57%)	4.8 (-54%)	0.2 (-50%)	11.0 (-54%)
2015 - With Project	45.6 (-39%)	5.7 (-48%)	1.1 (-48%)	5.5 (-48%)	0.2 (-50%)	12.5 (-47%)
2035 - No Project	13.7 (-82%)	3.2 (-71%)	0.6 (-69%)	1.8 (-83%)	0.1 (-75%)	4.5 (-81%)
2035 - With Project	13.9 (-82%)	3.5 (-68%)	0.7 (-67%)	2.0 (-81%)	0.2 (-50%)	5.0 (-79%)

Numbers in () represent the percentage change from the 2005 base year.

Source: U.S. 101 Improvement Project Mobile Source Air Toxics Report, 2010.

When the “with project” scenario is compared to the “no project” scenario, the data in Table 25 indicate that MSAT emissions would be slightly higher within the project limits if the project is implemented. The reason for this increase is that the increase in capacity provided by the proposed roadway improvements will accommodate more of the traffic demand within the project limits, which correlates to higher emissions. However, the project would not increase regional MSAT emissions because overall traffic demand would not be affected by the project. In other words, the project will accommodate more traffic within the project limits, but overall traffic demand will remain constant.

Impact AQ-2: Implementation of the proposed project would not substantially increase MSAT emissions within the project limits. Regional MSAT emissions would not change due to the project. **[Less-than-Significant Impact]**

2.14.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. As shown in Table 24, future CO levels under the No Build Alternative would remain well below both federal and state standards. With regard to MSAT emissions, the data in Table 25 show that under the No Build Alternative, emissions for all six MSATs are projected to decrease considerably over existing conditions as a result more stringent emissions standards mandated by EPA and CARB. Diesel PM is projected to experience a decrease of 82% from 2005 to 2035, while the other MSATs are projected to decrease by between 50% and 83%.

2.14.5 Avoidance, Minimization, and/or Mitigation Measures

No avoidance, minimization, or mitigation measures are required.

2.15 CLIMATE CHANGE

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 gases (GHGs), 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 (GHG) emissions reduction and climate change research and policy have increased dramatically in recent years. These efforts are primarily concerned with the emissions of GHG related to human activity that include carbon dioxide (CO₂), methane, nitrous oxide,

tetrafluoromethane, hexafluoroethane, sulfur hexafluoride, HFC-23 (fluoroform), HFC-134a (s, s, s, 2-tetrafluoroethane), and HFC-152a (difluoroethane).

There are typically two terms used when discussing the impacts of climate change. "Greenhouse Gas (GHG) Mitigation" is a term for reducing GHG emissions in order to reduce or "mitigate" the impacts of climate change. "Adaptation," refers to the effort of planning for and adapting to impacts due to climate change (such as adjusting transportation design standards to withstand more intense storms and higher sea levels).³¹

Transportation sources (passenger cars, light duty trucks, other trucks, buses and motorcycles) in the state of California make up the largest source (second to electricity generation) of greenhouse gas emitting sources. Conversely, the main source of GHG emissions in the United States is electricity generation followed by transportation. The dominant GHG emitted is CO₂, mostly from fossil fuel combustion.

There are four primary strategies for reducing GHG emissions from transportation sources: 1) improve system and operation efficiencies, 2) reduce growth of vehicle miles traveled (VMT), 3) transition to lower GHG fuels, and 4) improve vehicle technologies. To be most effective all four should be pursued collectively. The following regulatory setting section outlines state and federal efforts to comprehensively reduce GHG emissions from transportation sources.

2.15.1 Regulatory Setting

2.15.1.1 *State*

With the passage of several pieces of legislation including State Senate and Assembly Bills and Executive Orders, California launched an innovative and pro-active approach to dealing with greenhouse gas emissions and climate change at the state level.

Assembly Bill 1493 (AB 1493), Pavley - Vehicular Emissions: Greenhouse Gases (AB 1493), 2002: requires the California Air Resources Board (ARB) 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. In June 2009, the United States Environmental Protection Agency (U.S. EPA) Administrator granted a Clean Air Act waiver of preemption to California. This waiver allowed California to implement its own GHG emission standards for motor vehicles beginning with model year 2009. California agencies will be working with Federal agencies to conduct joint rulemaking to reduce GHG emissions for passenger cars model years 2017-2025.

³¹ http://climatechange.transportation.org/ghg_mitigation

Executive Order S-3-05: (signed on June 1, 2005, by Governor Arnold Schwarzenegger) the goal of this Executive Order is to reduce California's GHG 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.

AB32 (AB 32), the Global Warming Solutions Act of 2006: AB 32 sets the same overall GHG emissions reduction goals as outlined in Executive Order S-3-05, while further mandating that ARB 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 AB 32, including the recommendations made by the State's Climate Action Team.

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 ten percent by 2020.

Senate Bill 97 (Chapter 185, 2007): required the Governor's Office of Planning and Research (OPR) to develop recommended amendments to the State CEQA Guidelines for addressing greenhouse gas emissions. The Amendments became effective on March 18, 2010.

2.15.1.2 *Federal*

Although climate change and GHG reduction is a concern at the federal level; currently there are no regulations or legislation that have been enacted specifically addressing GHG emissions reductions and climate change at the project level. Climate change and its associated effects are being addressed through various efforts at the federal level to improve fuel economy and energy efficiency, such as the "National Clean Car Program" and Executive Order 13514- Federal Leadership in Environmental, Energy and Economic Performance.

Executive Order 13514 is focused on reducing greenhouse gases internally in federal agency missions, programs and operations, but also direct federal agencies to participate in the interagency Climate Change Adaptation Task Force, which is engaged in developing a U.S. strategy for adaptation to climate change.

On April 2, 2007, in *Massachusetts v. EPA*, 549 U.S. 497 (2007), the Supreme Court found that greenhouse gases are air pollutants covered by the Clean Air Act and that the U.S. EPA has the authority to regulate GHG. The Court held that the U.S. EPA Administrator must determine whether or not emissions of greenhouse gases from new motor vehicles cause or contribute to air pollution which may reasonably be anticipated to endanger public health or welfare, or whether the science is too uncertain to make a reasoned decision.

On December 7, 2009, the U.S. EPA Administrator signed two distinct findings regarding greenhouse gases under section 202(a) of the Clean Air Act:

- **Endangerment Finding:** The Administrator found that the current and projected concentrations of the six key well-mixed greenhouse gases - carbon dioxide (CO₂), methane (CH₄), nitrous oxide (N₂O), hydrofluorocarbons (HFCs), perfluorocarbons (PFCs), and sulfur hexafluoride (SF₆) – in the atmosphere threaten the public health and welfare of current and future generations.
- **Cause or Contribute Finding:** The Administrator found 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.

Although these findings did not themselves impose any requirements on industry or other entities, this action was a prerequisite to finalizing the U.S. EPA's *Proposed Greenhouse Gas Emission Standards for Light-Duty Vehicles*, which was published on September 15, 2009.³² On May 7, 2010 the final *Light-Duty Vehicle Greenhouse Gas Emissions Standards and Corporate Average Fuel Economy Standards* was published in the Federal Register.

U.S. EPA and the National Highway Traffic Safety Administration (NHTSA) are taking coordinated steps to enable the production of a new generation of clean vehicles with reduced GHG emissions and improved fuel efficiency from on-road vehicles and engines. These next steps include developing the first-ever GHG regulations for heavy-duty engines and vehicles, as well as additional light-duty vehicle GHG regulations. These steps were outlined by President Obama in a memorandum on May 21, 2010.³³

The final combined U.S. EPA and NHTSA standards that make up the first phase of this national program apply to passenger cars, light-duty trucks, and medium-duty passenger vehicles, covering model years 2012 through 2016. The standards require these vehicles to meet an estimated combined average emissions level of 250 grams of carbon dioxide per mile, equivalent to 35.5 miles per gallon if the automobile industry were to meet this carbon dioxide level solely through fuel economy improvements. Together, these standards will cut GHG emissions by an estimated 960 million metric tons and 1.8 billion barrels of oil over the lifetime of the vehicles sold under the program (model years 2012-2016).

On January 24, 2011, the U.S. EPA along with the U.S. Department of Transportation and the State of California announced a single timeframe for proposing fuel economy and greenhouse gas standards for model years 2017-2025 cars and light-trucks. Proposing the new standards in the same timeframe (September 1, 2011) signals continued collaboration that could lead to an extension of the current National Clean Car Program.

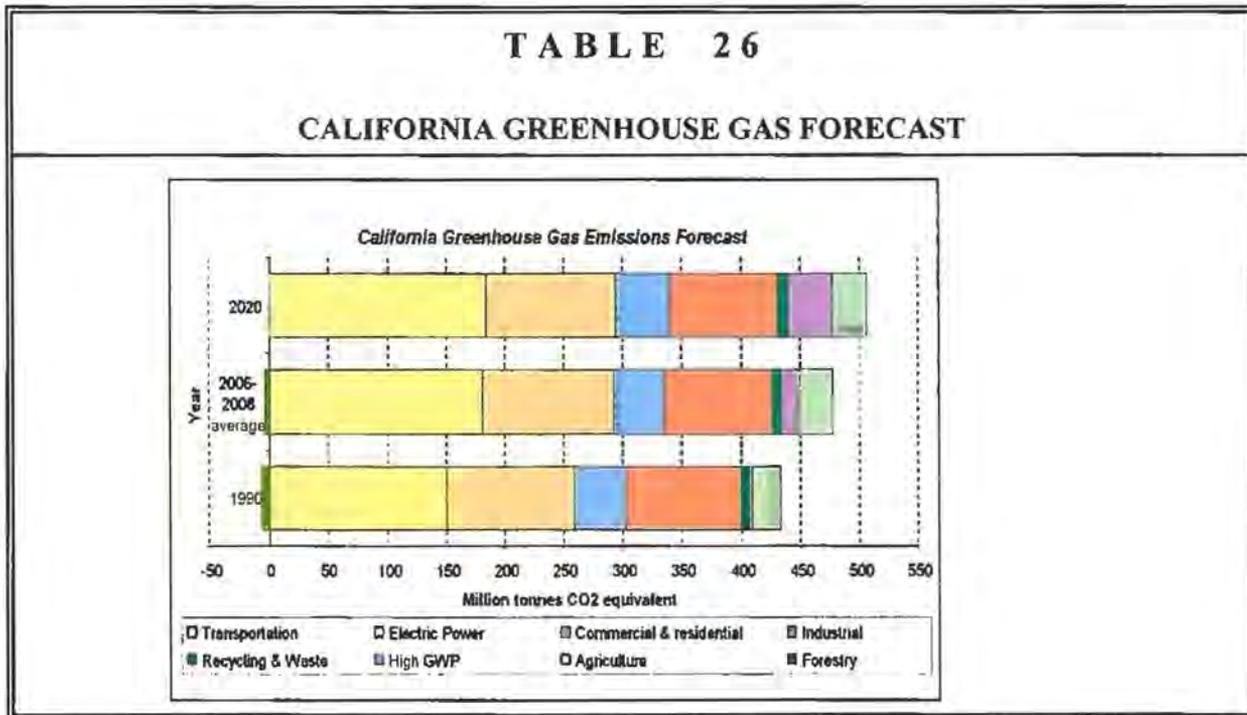
³² <http://www.epa.gov/climatechange/endangerment.html>

³³ <http://epa.gov/otaq/climate/regulations.htm>

2.15.2 **Project Analysis**

An individual project does not generate enough GHG 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 GHG.³⁴ In assessing cumulative impacts, it must be determined if a project's incremental effect is "cumulatively considerable." See CEQA Guidelines sections 15064(h)(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.

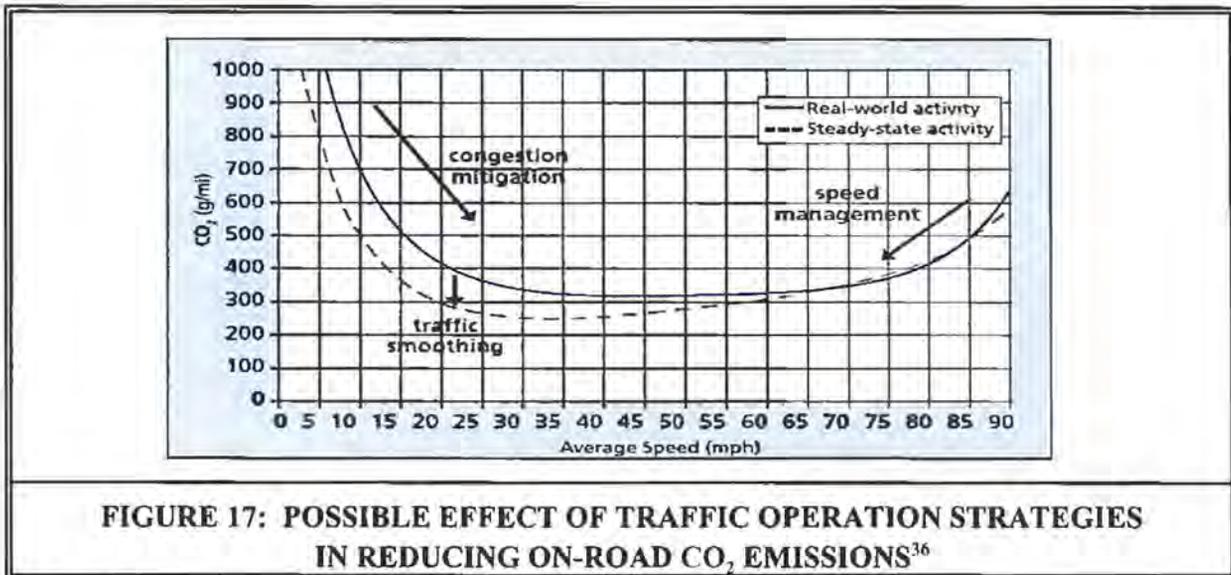
The AB 32 Scoping Plan contains the main strategies California will use to reduce GHG. As part of its supporting documentation for the Draft Scoping Plan, CARB released the GHG inventory for California (Forecast last updated: 28 October 2010). The forecast, which is shown in Table 26, is an estimate of the emissions expected to occur in the year 2020 if none of the foreseeable measures included in the Scoping Plan were implemented. The base year used for forecasting emissions is the average of statewide emissions in the GHG inventory for 2006, 2007, and 2008.



³⁴This approach is supported by the AEP: *Recommendations by the Association of Environmental Professionals on How to Analyze GHG Emissions and Global Climate Change in CEQA Documents* (March 5, 2007), as well as the SCAQMD (Chapter 6: : The CEQA Guide, April 2011) and the US Forest Service (Climate Change Considerations in Project Level NEPA Analysis, July 13, 2009).

Caltrans and its parent agency, the Business, Transportation, and Housing Agency, have taken an active role in addressing GHG emission reduction and climate change. Recognizing that 98 percent of California's GHG emissions are from the burning of fossil fuels and 40 percent of all human made GHG emissions are from transportation, Caltrans has created and is implementing the Climate Action Program at Caltrans that was published in December 2006 (see Climate Action Program at Caltrans (December 2006)).³⁵

One of the main strategies in Caltrans' Climate Action Program to reduce GHG 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 mph; the most severe emissions occur from 0-25 miles per hour (see Figure 17). To the extent that a project relieves congestion by enhancing operations and improving travel times in high congestion travel corridors GHG emissions, particularly CO₂, may be reduced.



The project alignment between Monterey Street and SR 129 will help relieve congestion in the peak traffic periods. With the construction of the project, vehicle-miles-traveled (VMT) in project area will be higher due to an eight percent increase in average daily traffic volumes. During the peak hours, the speeds in some areas would decrease slightly, 2-3 mph, and in other areas the speeds would increase by as much as 20 to 25 mph to a maximum speed of 70 mph. The speed during the off peak hours would generally remain the same. These changes will have an overall negative effect on the GHG emissions

³⁵Caltrans Climate Action Program is located at the following web address: http://www.dot.ca.gov/hq/tpp/offices/ogm/key_reports_files/State_Wide_Strategy/Caltrans_Climate_Action_Program.pdf

³⁶Traffic Congestion and Greenhouse Gases; Matthew Barth and Kanok Boriboonsomsin (TR News 268 May-June 2010) <<http://onlinepubs.trb.org/onlinepubs/trnews/trnews268.pdf>>

generated in the project area, as compared with the No-Build scenario. Table 27 shows the GHG, as expressed in tons per day of CO₂.

T A B L E 2 7			
COMPARISON OF CARBON DIOXIDE (CO₂) EMISSIONS			
[Expressed in Tons per Day]			
	Year 2009	Year 2015	Year 2035
Existing	217		
No Build		271	350
Build		315	402

Source: U.S. 101 Improvements Project Air Quality Report, 2010.

The CO₂ emissions numbers shown in Table 27 are only useful for a comparison between alternatives. The numbers are not necessarily an accurate reflection of what the true CO₂ emissions will be because CO₂ emissions are dependent on other factors that are not part of the model such as the fuel mix³⁷, rate of acceleration, and the aerodynamics and efficiency of the vehicles. Further, this project level analysis shows only the CO₂ levels associated with the travel on the project segment of U.S. 101; the traffic data did not include detailed information on alternate routes where the travel may be reduced. The analysis also does not take into account the reductions that would occur with the passage of AB 1493 (approximately 2 percent reduction).

Future no-build scenarios as well as future build scenarios are expected to cause an increase in CO₂ emissions when compared to existing conditions. In the year 2035, when comparing No Build to Build Alternatives, the daily CO₂ emissions are expected to increase by approximately 15%, from 350 tons per day to 402 tons per day (see Table 27).

The purpose of the proposed project is to accommodate future planned growth and to reduce congestion, delay and peak period travel times and is part of a regional plan to reduce congestion and provide improvements to local bike trails to enhance multi-modal travel.

MTC, in the preparation of its regional *Transportation 2035 Plan* for the San Francisco Bay Area EIR, discussed the potential impacts of the overall Plan, which includes the proposed project. According to MTC's EIR, the current daily emission of CO₂ from the existing regional transportation system is close

³⁷EMFAC model emission rates are only for direct engine-out CO₂ emissions, not the full fuel cycle; fuel cycle emission rates can vary dramatically depending on the amount of additives like ethanol and the source of the fuel components.

to 90,000 tons per day. With the enactment of AB 1493 and the buildout of the *Transportation 2035 Plan*, the future CO₂ emissions are expected to drop to 75,600 tons per year. The project-level analysis that yielded the results contained in Table 27, shows only the CO₂ levels associated with travel on U.S. 101; the traffic data did not include detailed information on alternate routes where the travel may be reduced. The analysis also does not take into account the reductions that would occur with the passage of AB 1493 (approximately 2% reduction). With the construction of the proposed project, the total contribution of CO₂ is less than 0.05% of the projected CO₂ emissions in the San Francisco Bay Area in the year 2035.

Limitations and Uncertainties with Modeling

Emissions Factors (EMFAC) Model

Although EMFAC can calculate CO₂ emissions from mobile sources, the model does have limitations when it comes to accurately reflecting CO₂ emissions. According to the National Cooperative Highway Research Program report, *Development of a Comprehensive Modal Emission Model* (April 2008), studies have revealed that brief but rapid accelerations can contribute significantly to a vehicle's carbon monoxide and hydrocarbon emissions during a typical urban trip. Current emission-factor models are insensitive to the distribution of such modal events (i.e., cruise, acceleration, deceleration, and idle) in the operation of a vehicle and instead estimate emissions by average trip speed. This limitation creates an uncertainty in the model's results when compared to the estimated emissions of the various alternatives with baseline in an attempt to determine impacts. Although work by EPA and the CARB is underway on modal-emission models, neither agency has yet approved a modal emissions model that can be used to conduct this more accurate modeling. In addition, EMFAC does not include speed corrections for most vehicle classes for CO₂; for most vehicle classes emission factors are held constant, which means that EMFAC is not sensitive to the decreased emissions associated with improved traffic flows for most vehicle classes. Therefore, unless a project involves a large number of heavy-duty vehicles, the difference in modeled CO₂ emissions due to speed change will be slight.

CARB is currently not using EMFAC to create its inventory of greenhouse gas emissions. It is unclear why the CARB has made this decision. Their website only states:

REVISION: Both the EMFAC and OFFROAD Models develop CO₂ and CH₄ [methane] emission estimates; however, they are not currently used as the basis for [CARB's] official [greenhouse gas] inventory which is based on fuel usage information. . . However, ARB is working towards reconciling the emission estimates from the fuel usage approach and the models.

Other Variables

With the current science, project-level analysis of greenhouse gas emissions is limited. Although a greenhouse gas analysis is included for this project, there are numerous key greenhouse gas variables

that are likely to change dramatically during the design life of the proposed project and would thus dramatically change the projected CO₂ emissions.

First, vehicle fuel economy is increasing. The EPA's annual report, "Light-Duty Automotive Technology and Fuel Economy Trends: 1975 through 2008 (<http://www.epa.gov/oms/fetrends.htm>)," which provides data on the fuel economy and technology characteristics of new light-duty vehicles including cars, minivans, sport utility vehicles, and pickup trucks, confirms that average fuel economy has improved each year beginning in 2005, and is now the highest since 1993. Most of the increase since 2004 is due to higher fuel economy for light trucks, following a long-term trend of slightly declining overall fuel economy that peaked in 1987. These vehicles also have a slightly lower market share, peaking at 52 percent in 2004 with projections at 48 percent in 2008. Table 28 shows the alternatives for vehicle fuel economy increases studied by the National Highway Traffic Safety Administration in its Final EIS for New Corporate Average Fuel Economy (CAFE) Standards (October 2008).

	No Action	25% Below Optimized	Optimized (Preferred)	25% Above Optimized	50% Above Optimized	Total Costs Equal Total Benefits	Technology Exhaustion
Cars	27.5	33.9	35.7	37.5	39.5	43.3	52.6
Trucks	23.5	27.5	28.6	29.8	30.9	33.1	34.7

Second, near zero carbon vehicles will come into the market during the design life of this project. According to a March 2008 report released by University of California Davis (UC Davis), Institute of Transportation Studies:

"Large advancements have occurred in fuel cell vehicle and hydrogen infrastructure technology over the past 15 years. Fuel cell technology has progressed substantially resulting in power density, efficiency, range, cost, and durability all improving each year. In another sign of progress, automotive developers are now demonstrating over 100 fuel cell vehicles (FCVs) in California - several in the hands of the general public - with configurations designed to be attractive to buyers. Cold-weather operation and vehicle range challenges are close to being solved, although vehicle cost and durability improvements are required before a commercial vehicle can be successful without incentives. The pace of development is on track to approach pre-commercialization within the next decade.

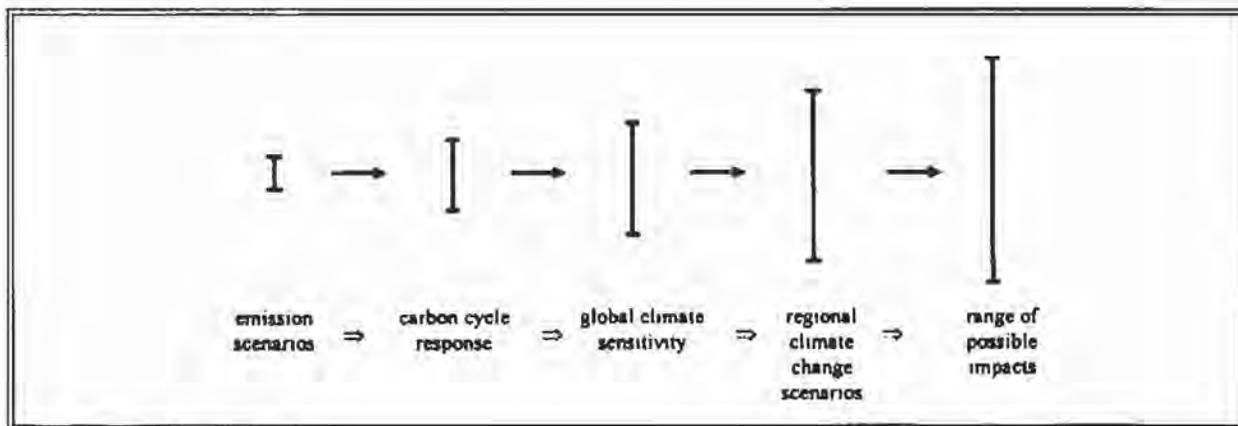
"A number of the U.S. DOE 2010 milestones for FCV development and commercialization are expected to be met by 2010. Accounting for a five to six year production development cycle, the scenarios developed by the U.S. DOE suggest that 10,000s of vehicles per year from 2015 to 2017 would be possible in a federal demonstration program, assuming large cost share grants by the government and industry are available to reduce the cost of production vehicles." ³⁸

Third and as previously stated, California has recently adopted a low-carbon transportation fuel standard. CARB is scheduled to come out with draft regulations for low carbon fuels in late 2008 with implementation of the standard to begin in 2010.

Fourth, driver behavior has been changing as the U.S. economy and oil prices have changed. In its January 2008 report, "Effects of Gasoline Prices on Driving Behavior and Vehicle Market," (<http://www.cbo.gov/ftpdocs/88xx/doc8893/01-14-GasolinePrices.pdf>) the Congressional Budget Office found the following results based on data collected from California: 1) freeway motorists have adjusted to higher gas prices by making fewer trips and driving more slowly; 2) the market share of sports utility vehicles is declining; and 3) the average prices for larger, less-fuel-efficient models have declined over the past five years as average prices for the most-fuel-efficient automobiles have risen, showing an increase in demand for the more fuel efficient vehicles.

Limitations and Uncertainties with Impact Assessment

Taken from p. 3-70 of the National Highway Traffic Safety Administration Final EIS for New CAFE Standards (October 2008), the diagram below illustrates how the range of uncertainties in assessing greenhouse gas impacts grows with each step of the analysis:



³⁸Cunningham, Joshua, Sig Cronich, Michael A. Nicholas. March 2008. Why Hydrogen and Fuel Cells are Needed to Support California Climate Policy, UC Davis, Institute of Transportation Studies, pp. 9-10.

"Cascade of uncertainties typical in impact assessments showing the "uncertainty explosion" as these ranges are multiplied to encompass a comprehensive range of future consequences, including physical, economic, social, and political impacts and policy responses."

Much of the uncertainty in assessing an individual project's impact on climate change surrounds the global nature of the climate change. Even assuming that the target of meeting the 1990 levels of emissions is met, there is no regulatory or other framework in place that would allow for a ready assessment of what any modeled increase in CO₂ emissions would mean for climate change given the overall California greenhouse gas emissions inventory of approximately 430 million tons of CO₂ equivalent. This uncertainty only increases when viewed globally. The IPCC has created multiple scenarios to project potential future global greenhouse gas emissions as well as to evaluate potential changes in global temperature, other climate changes, and their effect on human and natural systems. These scenarios vary in terms of the type of economic development, the amount of overall growth, and the steps taken to reduce greenhouse gas emissions. Non-mitigation IPCC scenarios project an increase in global greenhouse gas emissions by 9.7 up to 36.7 billion metric tons CO₂ from 2000 to 2030, which represents an increase of between 25 and 90%.³⁹

The assessment is further complicated by the fact that changes in greenhouse gas emissions can be difficult to attribute to a particular project because the projects often cause shifts in the locale for some type of greenhouse gas emissions, rather than causing "new" greenhouse gas emissions. It is difficult to assess the extent to which any project level increase in CO₂ emissions represents a net global increase, reduction, or no change; there are no models approved by regulatory agencies that operate at the global or even statewide scale.

The complexities and uncertainties associated with project level impact analysis are further borne out in the recently released Final EIS completed by the National Highway Traffic Safety Administration for New CAFE standards (October 2008). As the text quoted below shows, even when dealing with greenhouse gas emission scenarios on a national scale for the entire passenger car and light truck fleet, the numerical differences among alternatives is very small and well within the error sensitivity of the model.

"In analyzing across the CAFE 30 alternatives, the mean change in the global mean surface temperature, as a ratio of the increase in warming between the B1 (low) to A1B (medium) scenarios, ranges from 0.5 percent to 1.1 percent. The resulting change in sea level rise (compared to the No Action Alternative) ranges, across the alternatives, from 0.04 centimeter to 0.07 centimeter. In summary, the impacts of the model year 2011-2015 CAFE alternatives on global mean surface temperature, sea level rise, and precipitation are relatively small in the context of the expected changes associated with

³⁹Intergovernmental Panel on Climate Change (IPCC). February 2007. Climate Change 2007: The Physical Science Basis: Summary for Policy Makers. <http://www.ipcc.ch/SPM2feb07.pdf>.

the emission trajectories. This is due primarily to the global and multi-sectoral nature of the climate problem. Emissions of CO₂, the primary gas driving the climate effects, from the United States automobile and light truck fleet represented about 2.5 percent of total global emissions of all greenhouse gases in the year 2000 (EPA, 2008; CAIT, 2008). While a significant source, this is a still small percentage of global emissions, and the relative contribution of CO₂ emissions from the United States light vehicle fleet is expected to decline in the future, due primarily to rapid growth of emissions from developing economies (which are due in part to growth in global transportation sector emissions)." [NHTSA Draft EIS for New CAFE Standards, June 2008, pp.3-77 to 3-78]

2.15.3 Construction Emissions

GHG emissions for transportation projects can be divided into those produced during construction and those produced during operations. Construction GHG 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 will 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 GHG emissions produced during construction can be mitigated to some degree by longer intervals between maintenance and rehabilitation events.

The project includes measures that will reduce GHG emissions during construction, including the following:

- A traffic management plan (TMP) will be prepared and implemented. Among other benefits, the TMP will reduce traffic congestion during construction.
- Unnecessary idling of internal combustion engines will be strictly prohibited.

2.15.4 CEQA Conclusion regarding Climate Change

As discussed above, both the future with project and future no build show increases in CO₂ emissions over the existing levels; the future build CO₂ emissions are higher than the future no build emissions. In addition, as discussed above, there are also limitations with EMFAC and with assessing what a given CO₂ emissions increase means for climate change. Therefore, it is Caltrans determination that in the absence of further regulatory or scientific information related to greenhouse gas emissions and CEQA significance, it is too speculative 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 section.

2.15.5 Greenhouse Gas Reduction Strategies

2.15.5.1 *AB 32 Compliance*

Caltrans continues to be actively involved on the Governor's Climate Action Team as CARB works to implement the Executive Orders S-3-05 and S-01-07 and help achieve the targets set forth in AB 32. Many of the strategies Caltrans is using to help meet the targets in AB 32 come from the California Strategic Growth Plan, which is updated each year. Former Governor Arnold Schwarzenegger's Strategic Growth Plan calls for a \$222 billion infrastructure improvement program to fortify the state's transportation system, education, housing, and waterways, including \$100.7 billion in transportation funding during the next decade. The Strategic Growth Plan targets a significant decrease in traffic congestion below today's level and a corresponding reduction in GHG 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 are expected to reduce congestion. The Strategic Growth Plan relies on a complete systems approach to attain CO₂ reduction goals: system monitoring and evaluation, maintenance and preservation, smart land use, demand management, and operational improvements as depicted in Figure 18, *The Mobility Pyramid*.



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 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, light and heavy-duty trucks; Caltrans is doing this by supporting on-going research efforts at universities, by supporting legislative efforts to increase fuel economy, and by its participation on the Climate Action Team. It is important to note, however, that the control of the fuel economy standards is held by U.S. EPA and ARB. Lastly, the use of alternative fuels is also being considered; Caltrans is participating in funding for alternative fuel research at the UC Davis.

Table 28 summarizes the Caltrans and statewide efforts that Caltrans is implementing in order to reduce GHG emissions. More detailed information about each strategy is included in the Climate Action Program at Caltrans (December 2006).

To the extent that it is applicable or feasible for the project and through coordination with the project development team, the following measures will also be included in the project to reduce the GHG emissions and potential climate change impacts from the project:

- Caltrans and the California Highway Patrol are working with regional agencies to implement intelligent transportation systems (ITS) to help manage the efficiency of the existing highway system. ITS is commonly referred to as electronics, communications, or information processing used singly or in combination to improve the efficiency or safety of a surface transportation system.
- In addition, the VTA provides ridesharing services and park-and-ride facilities to help manage the growth in demand for highway capacity.
- Landscaping reduces surface warming, and through photosynthesis, decreases CO₂. The project proposes planting, as described in Section 2.7, *Visual/Aesthetics*
- The project will incorporate the use of energy efficient lighting, such as LED traffic signals. LED bulbs - or balls, in the stoplight vernacular - cost \$60 to \$70 apiece but last five to six years, compared to the one-year average lifespan of the incandescent bulbs previously used. The LED balls themselves consume 10 percent of the electricity of traditional lights, which will also help reduce the projects CO₂ emissions.

2.15.6 Adaptation Strategies

“Adaptation strategies” refer to how Caltrans 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,

storm surges and intensity, and the frequency and intensity of wildfires. These changes may affect the transportation infrastructure in various ways, such as damaging roadbeds by 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 October 14, 2010 outlining recommendations to President Obama for how Federal Agency policies and programs can better prepare the United States 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 adaption 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, Governor Schwarzenegger signed Executive Order S-13-08 which directed a number of state agencies to address California's vulnerability to sea level rise caused by climate change. This Executive Order 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)⁴⁰, 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 Executive Order 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 Environmental Protection; 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.

⁴⁰<http://www.energy.ca.gov/2009publications/CNRA-1000-2009-027/CNRA-1000-2009-027-F.PDF>

TABLE 29

CLIMATE CHANGE/CO₂ REDUCTION STRATEGIES

Strategy	Program	Partnership		Method/Process	Estimated CO ₂ Savings (Million Metric Tons)	
		Lead	Agency		2010	2020
Smart Land Use	Intergovernmental Review	Caltrans	Local governments	Review and seek to mitigate development proposals	Not Estimated	Not Estimated
	Planning Grants	Caltrans	Local/Regional Agencies, other stakeholders	Competitive selection process	Not Estimated	Not Estimated
	Regional Plans & Blueprint Planning	Regional Agencies	Caltrans	Regional plans and application process	0.975	7.8
Operational Improvements & Intelligent Transportation System (ITS) Deployment	Strategic Growth Plan	Caltrans	Regions	State ITS; Congestion Management Plan	.07	2.17
Mainstream Energy & GHG into Plans & Projects	Office of Policy Analysis & Research; Division of Environmental Analysis	Interdepartmental effort		Policy establishment, guidelines, technical assistance	Not Estimated	Not Estimated
Educational & Information Program	Office of Policy Analysis & Research	Interdepartmental, CalEPA, CARB, CEC		Analytical report, data collection, publication, workshops, outreach	Not Estimated	Not Estimated
Fleet Greening & Fuel Diversification	Division of Equipment	Department of General Services		Fleet Replacement B20 B100	0.0045	0.0065 0.045 0.0225
Non-vehicular Conservation Measures	Energy Conservation Program	Green Action Team		Energy Conservation Opportunities	0.117	.34

TABLE 29 [continued]

CLIMATE CHANGE STRATEGIES

Strategy	Program	Partnership		Method/Process	Estimated CO ₂ Savings (Million Metric Tons)	
		Lead	Agency		2010	2020
Portland Cement	Office of Rigid Pavement	Cement and Construction Industries		2.5% limestone cement mix	1.2	4.2
				25% fly ash cement mix, >50% fly ash/slag mix	.36	3.6
Goods Movement	Office of Goods Movement	CalEPA, CARB, BT&H, MPOs		Goods Movement Action Plan	Not Estimated	Not Estimated
Total:					2.72	18.18

Resources Agency was also directed to request the National Academy of Science to prepare a Sea Level Rise Assessment Report by December 2010 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

Until the final report from the National Academy of Sciences is released, interim guidance has been released by The Coastal Ocean Climate Action Team (CO-CAT) as well as Caltrans as a method to initiate action and discussion of potential risks to the states infrastructure due to projected sea level rise.

All projects that have filed a Notice of Preparation, and/or are programmed for construction funding from 2008 through 2013, or are routine maintenance projects as of the date of Executive Order S 13 08

may, but are not required to, consider these planning guidelines. This project is exempt from these planning guidelines because a Notice of Preparation was filed on October 31, 2007, which was prior to the date of Executive Order S-13-08.

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

Currently, Caltrans 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 impacts, Caltrans 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, Caltrans 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. Caltrans is an active participant in the efforts being conducted in response to Executive Order S-13-08 and is mobilizing to be able to respond to the National Academy of Science report on Sea Level Rise Assessment, which is due to be released in 2012.

2.16 NOISE

2.16.1 Introduction

Noise is measured in "decibels" (dB), which is a numerical expression of sound levels on a logarithmic scale. A noise level that is 10 dB higher than another noise level has ten times as much sound energy and is perceived as being twice as loud. A sound change of less than 3 dB is just barely perceptible, and then only in the absence of other sounds. Intense sounds of 140 dB are so loud that they are painful and can cause damage with only brief exposure. These extremes are not commonplace in our normal working and living environments. An "A-weighted decibel" (dBA) approximates the frequency response of the average young ear when listening to most ordinary everyday sounds. Thus, traffic noise impact analyses commonly use the dBA.

With regard to traffic-generated noise, noise levels rise as vehicle speeds, overall volumes, and truck volumes increase. In general, a doubling of traffic results in a 3 dBA increase in noise at a nearby receptor, assuming a relatively homogeneous traffic composition (i.e., mainly passenger cars). The peak noise hour is typically not the peak commute hour due to lower operating speeds during the latter. The

combination of volumes and speeds that produces the peak noise hour is that which is associated with level of service C/D.

2.16.2 Regulatory Setting

CEQA 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. CEQA 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 CEQA, then CEQA dictates that mitigation measures must be incorporated into the project unless such measures are not feasible.

The regulations of the FHWA and Caltrans require that potential noise impacts in areas of frequent human use be identified during the planning and design of a highway project. The regulations contain noise abatement criteria (NAC) that are used to determine when a noise impact would occur. As shown in Table 30, the NAC differ depending on the type of land use under analysis. For example, the NAC for residences (67 dBA) is lower than the NAC for commercial areas (72 dBA).

TABLE 30		
NOISE ABATEMENT CRITERIA OF THE FEDERAL HIGHWAY ADMINISTRATION		
[Expressed in dBA]		
Activity Category	Peak-Hour Leq(h)	Description of Activity Category
A	57 (Exterior)	Lands on which serenity and quiet are of extraordinary significance and serve an important public need and where the preservation of those qualities is essential if the area is to continue to serve its intended purpose.
B	67 (Exterior)	Picnic areas, recreation areas, playgrounds, active sports areas, parks, residences, motels, hotels, schools, churches, libraries, and hospitals.
C	72 (Exterior)	Developed lands, properties, or activities not included in Categories A or B above.
D	---	Undeveloped lands.
E	52 (Interior)	Residences, motels, hotels, public meeting rooms, schools, churches, libraries, hospitals, and auditoriums.

Table 31 lists the noise levels of common activities to enable readers to compare the actual and predicted highway noise-levels discussed in this section with common activities.

TABLE 31

NOISE LEVELS ASSOCIATED WITH COMMON ACTIVITIES

Common Outdoor Activities	Noise Level (dBA)	Common Indoor Activities
Jet Fly-over at 300m (1000 ft)	110	Rock Band
Gas Lawn Mower at 1 m (3 ft)	100	
Diesel Truck at 15 m (50 ft), at 80 km (50 mph)	90	Food Blender at 1 m (3 ft)
Noisy Urban Area, Daytime	80	Garbage Disposal at 1 m (3 ft)
Gas Lawn Mower, 30 m (100 ft)	70	Vacuum Cleaner at 3 m (10 ft)
Commercial Area		Normal Speech at 1 m (3 ft)
Heavy Traffic at 90 m (300 ft)	60	Large Business Office
Quiet Urban Daytime	50	Dishwasher Next Room
Quiet Urban Nighttime	40	Theater, Large Conference Room (Background)
Quiet Suburban Nighttime		Library
Quiet Rural Nighttime	30	Bedroom at Night, Concert Hall (Background)
	20	Broadcast/Recording Studio
	10	
Lowest Threshold of Human Hearing	0	Lowest Threshold of Human Hearing

In accordance with Caltrans' *Traffic Noise Analysis Protocol for New Highway Construction and Reconstruction Projects*, August 2006, a noise impact occurs when the future noise level with the project results in a substantial increase in noise level (defined as a 12 dBA or more increase) or when the future noise level with the project approaches or exceeds the NAC. Approaching the NAC is defined as coming within 1 dBA of the NAC. If it is determined that the project will have noise impacts, then potential abatement measures must be considered. Noise abatement measures that are determined to be reasonable and feasible at the time of final design are incorporated into the project plans and specifications. This document discusses noise abatement measures that would likely be incorporated in the project.

Caltrans' *Traffic Noise Analysis Protocol* sets forth the criteria for determining when an abatement measure is reasonable and feasible. Feasibility of noise abatement is basically an engineering concern. A minimum 5 dBA reduction in the future noise level must be achieved for an abatement measure to be considered feasible. Other considerations include topography, access requirements, other noise sources and safety considerations. The reasonableness determination is basically a cost-benefit analysis. Factors used in determining whether a proposed noise abatement measure is reasonable include: residents acceptance, the absolute noise level, build versus existing noise, environmental impacts of abatement, public and local agencies input, newly constructed development versus development pre-dating 1978, and the cost-per-benefitted-residence.

2.16.3 Affected Environment

The information in this section is based primarily on a technical Noise Report (July 2010) that was prepared for the project. This study is available for review at the locations listed inside the front cover of this document.

The existing noise environment throughout the project corridor varies by location, depending on site characteristics such as proximity to U.S. 101, SR 25, or other local roadways, the relative elevation difference between the highways and receivers, and any intervening topography, structures, or barriers. There is a mix of single-family and multi-family residential, commercial, industrial, and agricultural land-uses throughout the project area.

U.S. 101 is a major source of noise in the project vicinity. Vehicles traveling on U.S. 101 produce Leq(h) noise levels that exceed FHWA's noise abatement criteria at various land uses that are located in proximity to the highway. At the northerly end of the project, vehicles using Monterey Street and other local roadways, as well as the adjacent commercial and residential land uses, contribute to the existing noise environment.

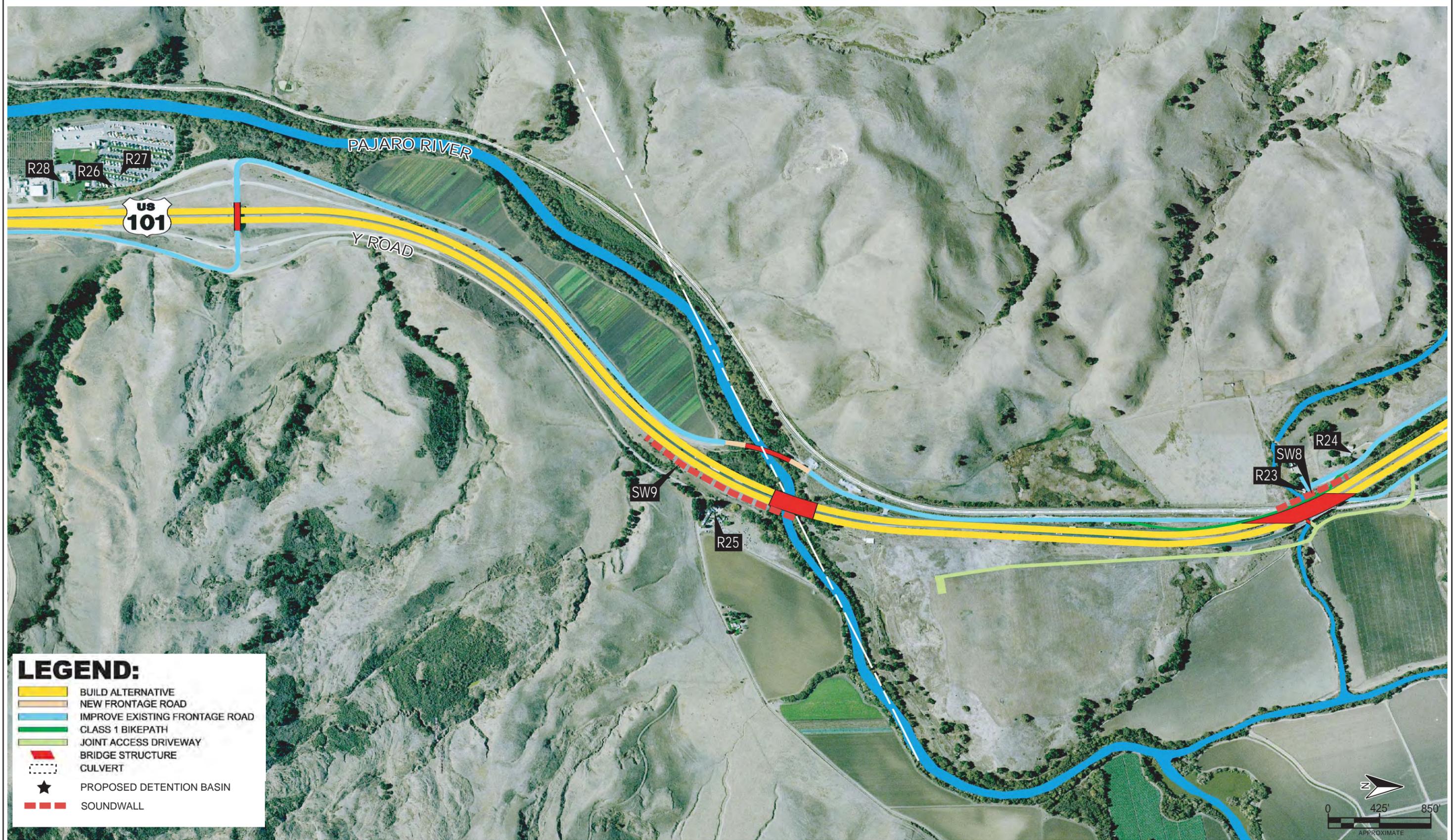
There are no soundwalls along U.S. 101 within the project limits. There are, however, existing noise barriers at the two RV parks located within the project limits. The Garlic Farm RV Park, which is located adjacent to the U.S. 101/Monterey Street interchange in Gilroy, is shielded with a 7-foot berm/wall. The Betabel RV Park, which is located adjacent to the U.S. 101/Betabel Road/Y Road interchange, is shielded from U.S. 101 traffic noise by a 10 to 12-foot earth berm.

Existing peak-hour noise levels were measured and quantified along U.S. 101 within the project limits where there are existing residences, as well as at a motel and the two RV parks. These locations are shown on Figure 19. The existing noise levels range from 57 to 75 dBA Leq(h), as shown in Table 32. The existing noise levels shown in Table 32 take into account the existing noise barriers adjacent to the two RV parks.



NOISE RECEPTOR AND SOUNDWALL EVALUATION LOCATIONS

FIGURE 19A



NOISE RECEPTOR AND POTENTIAL SOUNDWALL LOCATIONS

FIGURE 19B

TABLE 32

COMPARISON OF EXISTING AND FUTURE NOISE LEVELS
[Expressed in Loudest Hour Noise Levels, Leq(h), dBA]

Receptor #	Land Use	Existing Sound-wall in place?	Existing Noise Level	Year 2035			
				No Build Alt. Noise Level	Build Alternative with Design Option A Noise Level (change from Existing/No Build)	Build Alternative with Design Option B Noise Level (change from Existing/No Build)	Noise Level Approach or Exceed NAC?
1	Single-family	No	63	63	67 (+ 4)	67 (+ 4)	Yes
2	Single-family	No	66	66	75 (+ 9)	75 (+ 9)	Yes
3	Single-family	No	67	67	76 (+ 9)	76 (+ 9)	Yes
4	RV Park	Yes	64	64	68 (+ 4)	68 (+ 4)	Yes
5	Motel	No	67	67	71 (+ 4)	71 (+ 4)	No
6	Single-family	No	64	64	68 (+ 4)	68 (+ 4)	Yes
7	Single-family	No	68	68	72 (+ 4)	72 (+ 4)	Yes
8	Single-family	No	67	67	75 (+ 8)	75 (+ 8)	Yes
9	Single-family	No	62	62	68 (+ 6)	68 (+ 6)	Yes
10	Single-family	No	70	70	73 (+ 3)	73 (+ 3)	Yes
11	Single-family	No	74	74	receptor removed by project		
12	Single-family	No	72	72	receptor removed by project		
13	Single-family	No	74	74	receptor removed by project		
14	Single-family	No	71	71	72 (+ 1)	70 (- 1)	Yes
15	Single-family	No	67	67	68 (+ 1)	68 (+ 1)	Yes
16	Multi-family	No	63	63	receptor removed by project		
17	Single-family	No	65	65	66 (+ 1)	67 (+ 2)	Yes
18	Single-family	No	74	74	receptor removed by project		
19	Multi-family	No	75	75	receptor removed by project		
20	Single-family	No	73	73	receptor removed by project		
21	Single-family	No	61	61	66 (+ 5)	62 (+ 1)	Yes*

TABLE 32 [continued]

Receptor #	Land Use	Existing Sound-wall in place?	Existing Noise Level	Year 2035			
				No Build Alt. Noise Level	Build Alternative with Design Option A Noise Level (change from Existing/No Build)	Build Alternative with Design Option B Noise Level (change from Existing/No Build)	Noise Level Approach or Exceed NAC?
22	Single-family	No	70	70	73 (+ 3)	73 (+ 3)	Yes
23	Single-family	No	66	66	67 (+ 1)	67 (+ 1)	Yes
24	Single-family	No	71	71	76 (+ 5)	76 (+ 5)	Yes
25	Multi-family	No	63	63	66 (+ 3)	66 (+ 3)	Yes
26	RV Park	Yes	58	58	61 (+ 3)	61 (+ 3)	No
27	RV Park	Yes	57	57	60 (+ 3)	60 (+ 3)	No
28	RV Park	Yes	60	60	63 (+ 3)	63 (+ 3)	No

*NAC approached under Design Option A only.

NAC = noise abatement criteria of FHWA

Receptors are shown on Figure 19.

Source: U.S. 101 Improvements Project Noise Study Report, 2010.

2.16.4 Environmental Consequences of the Build Alternative

The short-term (i.e., construction phase) noise effects of the proposed project are described in Section 2.22.5. The project's long-term (i.e., operational phase) effects are described below.

Future traffic-related noise levels at land uses adjacent to U.S. 101 within the project limits were quantified in accordance with FHWA and Caltrans procedures. Projected noise levels were then compared to FHWA's noise abatement criteria shown in Table 30 to determine whether the consideration of noise abatement measures was warranted. Projected noise levels were also compared with existing noise levels to determine whether the increase (if any) would be substantial.

As shown in Table 32, the effect of the project on noise levels will vary by location. The location that would experience the largest increase in noise is at the residences located along the frontage road on the west side of U.S. 101, just south of the U.S. 101/Monterey Street interchange. At that location (represented by receptors #2, #3, #8, and #9 in Table 32), the noise increase due to the project would be 6 to 9 dBA under either design option. At other locations, the change in noise levels due to the project would range from a decrease of 1 dBA to an increase of 5 dBA.

In all cases, projected increases in noise levels would not be substantial because the increase would be less than the 12-dB increase described above.

Impact NOI-1: Depending on the location, changes in long-term noise levels will range from a decrease of 1 dBA to an increase of 9 dBA, which is less than the 12-dB increase that would be considered substantial. [**Less-than-Significant Impact**]

2.16.5 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. Table 32 quantifies the projected future noise levels under the No Build Alternative. The data show that noise levels under the No Build Alternative from traffic on U.S. 101 would be unchanged from the existing noise levels.

2.16.6 Avoidance, Minimization, and/or Mitigation Measures

Although the project would not result in a substantial increase in traffic-related noise, projected noise levels will, however, exceed FHWA's noise abatement criteria at many locations, as some locations currently do under existing conditions. As a result, the feasibility and reasonableness allowances of noise abatement measures were considered. This process involved an evaluation of the feasibility and reasonableness allowance for constructing a new soundwall at each location where the noise abatement criteria will be approached or exceeded.

The feasibility of soundwalls was determined by the 5-dBA minimum reduction in noise level as well as overall constructability. The reasonableness allowances for the soundwalls were determined using criteria contained in Caltrans' *Traffic Noise Analysis Protocol*.

Based on the studies, Caltrans has determined that the construction of nine new soundwalls, as shown in Table 33 and on Figure 19, would be feasible (i.e., they would meet the minimum 5-dBA noise reduction criterion). However, the cost estimate for each of the nine soundwalls substantially exceeds the calculated reasonableness allowance. These soundwalls are described in the following paragraphs.

Soundwall #1

Soundwall #1 is actually two 16-foot soundwalls, both of which would be needed to achieve a 5-dB reduction in traffic noise at two adjacent single-family residences. As shown on Figure 19, Soundwall #1A would be 800 feet in length and would be constructed along the edge-of-shoulder of southbound U.S. 101. Soundwall #1B would be 600 feet in length and would be constructed along the edge-of-shoulder of the southbound U.S. 101 on-ramp from Monterey Street.

TABLE 33

EVALUATION OF NOISE ABATEMENT SOUNDWALLS

Soundwall Number and Location	Approximate Soundwall Height/Length (feet)	Amount of Reduction in Noise (dBA)	# of Residences Benefitting by ≥ 5 dBA	Reasonable Allowance	Preliminary Cost Estimate
#1: SW quadrant of 101/Monterey St. Interchange	16 / 1,400	5	2	\$90,000	\$1,210,000
#2: Westside of 101, S of Monterey Street	8 / 1,300	5 to 6	3	\$157,000	\$562,000
	10 / 1,300	7 to 8	3	\$159,000	\$702,000
	12 / 1,300	8 to 10	3	\$163,000	\$842,000
	14 / 1,300	9 to 10	3	\$165,000	\$983,000
	16 / 1,300	9 to 11	3	\$165,000	\$1,123,000
#3: Eastside of 101, N of Carnadero Creek	10 / 1,900	5	2	\$94,000	\$1,026,000
	12 / 1,900	6 to 7	4	\$194,000	\$1,231,000
	14 / 1,900	7 to 8	4	\$194,000	\$1,436,000
	16 / 1,900	7 to 8	4	\$194,000	\$1,642,000
#4: Westside of 101, N of Carnadero Creek	8 / 1,400	6	1	\$53,000	\$605,000
	10 / 1,400	7	1	\$53,000	\$756,000
	12 / 1,400	5 to 10	2	\$100,000	\$907,000
	14 / 1,400	5 to 11	2	\$100,000	\$1,058,000
	16 / 1,400	6 to 12	2	\$104,000	\$1,210,000
#5A: Eastside of 101, vicinity of Garlic World	10 / 2,600	5	2	\$88,000	\$1,404,000
	12 / 2,600	5 to 7	3	\$135,000	\$1,685,000
	14 / 2,600	6 to 8	3	\$137,000	\$1,966,000
	16 / 2,600	6 to 8	3	\$137,000	\$2,246,000
#5B: Eastside of 101, vicinity of Garlic World	10 / 2,600	5	2	\$88,000	\$1,404,000
	12 / 2,600	5 to 8	3	\$139,000	\$1,685,000
	14 / 2,600	6 to 9	3	\$143,000	\$1,966,000
	16 / 2,600	6 to 9	3	\$143,000	\$2,246,000
#6: Westside of 101, vicinity of 101/25 interchange	12 / 900	5	1	\$45,000	\$583,000
	14 / 900	5	1	\$45,000	\$680,000
	16 / 900	6	1	\$47,000	\$778,000

TABLE 33 [continued]

Soundwall Number and Location	Approximate Soundwall Height/Length (feet)	Amount of Reduction in Noise (dBA)	# of Residences Benefitting by ≥ 5 dBA	Reasonable Allowance	Preliminary Cost Estimate
#7: Westside of 101, N of driveway to quarry	10 / 1,000	5	2	\$94,000	\$540,000
	12 / 1,000	6	2	\$98,000	\$648,000
	14 / 1,000	9	2	\$102,000	\$756,000
	16 / 1,000	10	2	\$102,000	\$864,000
#8: Westside of 101, at Tar Creek	8 / 800 ft.	7	1	\$51,000	\$346,000
	10 / 800 ft.	8	1	\$51,000	\$432,000
	12 / 800 ft.	8	1	\$51,000	\$518,000
	14 / 800 ft.	9	1	\$53,000	\$605,000
#9: Eastside of 101, S of Pajaro River	16 / 800 ft.	9	1	\$53,000	\$691,000
	12 / 1,200	6	5	\$235,000	\$778,000
	14 / 1,200	6	5	\$235,000	\$907,000
	16 / 1,200	7	5	\$235,000	\$1,037,000

- All of the above soundwalls are feasible, meaning they provide a minimum of five decibels of noise reduction at one or more receptors.
- Wall 5A is applicable to Design Option A and Wall 5B is applicable to Design Option B.
- Wall 6 is applicable to Design Option A only.
- \$40 per square foot is the current unit cost being used for conceptual estimates for soundwalls. Cost estimates include 25% contingency + 10% mobilization allowances.
- Soundwall locations are shown on Figure 19.

Source: U.S. 101 Improvement Project Noise Study Report, 2010.

Soundwall #2

Soundwall #2 would be constructed along the westside of U.S. 101, south of the 101/Monterey Street interchange. It's length would be approximately 1,300 feet and it would benefit three single-family residences. As shown in Table 33, wall heights ranging from 8 to 16 feet are feasible. A minimum wall height of 12 feet would, however, be required to intercept the line of sight between a truck exhaust stack and a 5-foot high receiver.⁴¹

⁴¹Truck exhaust stacks are a notable source of noise. Therefore, breaking the line of sight between the top of an exhaust stack and an adjacent receptor is typically desired as it serves to reduce this noise source.

Soundwall #3

Soundwall #3 would be constructed along the eastside of U.S. 101, north of Carnadero Creek. It's length would be approximately 1,900 feet and it would benefit up to four single-family residences. As shown in Table 33, soundwall heights ranging from 10 to 16 feet are feasible. A minimum wall height of 12 feet would, however, be required to intercept the line of sight between a truck exhaust stack and a 5-foot high receiver.

Soundwall #4

Soundwall #4 would be constructed along the westside of U.S. 101, north of Carnadero Creek. It's length would be approximately 1,400 feet and it would benefit up to two single-family residences. As shown in Table 33, soundwall heights ranging from 8 to 16 feet are feasible. A minimum wall height of 12 feet would, however, be required to intercept the line of sight between a truck exhaust stack and a 5-foot high receiver.

Soundwall #5

Soundwall #5 would be constructed along the eastside of U.S. 101, north of the U.S. 101/SR 25 interchange. It's length would be approximately 2,600 feet and it would benefit up to three single-family residences. As shown in Table 33, soundwall heights ranging from 10 to 16 feet are feasible. A minimum wall height of 12 feet would, however, be required to intercept the line of sight between a truck exhaust stack and a 5-foot high receiver. [Note: Table 33 shows Soundwalls #5A and #5B. This does not mean that two soundwalls would be built. Rather, Soundwall #5A illustrates the noise reduction that would occur if Design Option A is chosen and Soundwall #5B illustrates the noise reduction that would occur if Design Option B is chosen.]

Soundwall #6

Soundwall #6 would be constructed along the westside of U.S. 101, near the U.S. 101/SR 25 interchange. It's length would be approximately 900 feet and it would benefit one single-family residence. As shown in Table 33, soundwall heights ranging from 12 to 16 feet are feasible. Soundwall #6 would be constructed only if Design Option A is selection; noise levels at this receptor under Design Option B do not warrant consideration of a soundwall.

Soundwall #7

Soundwall #7 would be constructed along the westside of U.S. 101, north of the driveway that leads to the nearby quarry. It's length would be approximately 1,000 feet and it would benefit two single-family residences. As shown in Table 33, soundwall heights ranging from 10 to 16 feet are feasible.

Soundwall #8

Soundwall #8 would be constructed along the westside of U.S. 101 at Tar Creek. It's length would be approximately 800 feet and it would benefit one single-family residence. As shown in Table 33, soundwall heights ranging from 8 to 16 feet are feasible.

Soundwall #9

Soundwall #9 would be constructed along the eastside of U.S. 101, south of the Pajaro River. It's length would be approximately 1,200 feet and it would benefit five multi-family residences. As shown in Table 33, soundwall heights ranging from 12 to 16 feet are feasible.

Final Decision on Soundwalls

As stated above, while all nine soundwalls are feasible (i.e., they would meet the minimum 5-dB noise reduction criterion), the costs of each of the soundwalls substantially exceed the calculated reasonableness allowance. Based on this information, a preliminary decision has been made to not construct any of these soundwalls as a part of the project. A final decision on which, if any, of the nine soundwalls will be constructed will be made upon completion of the public involvement process.

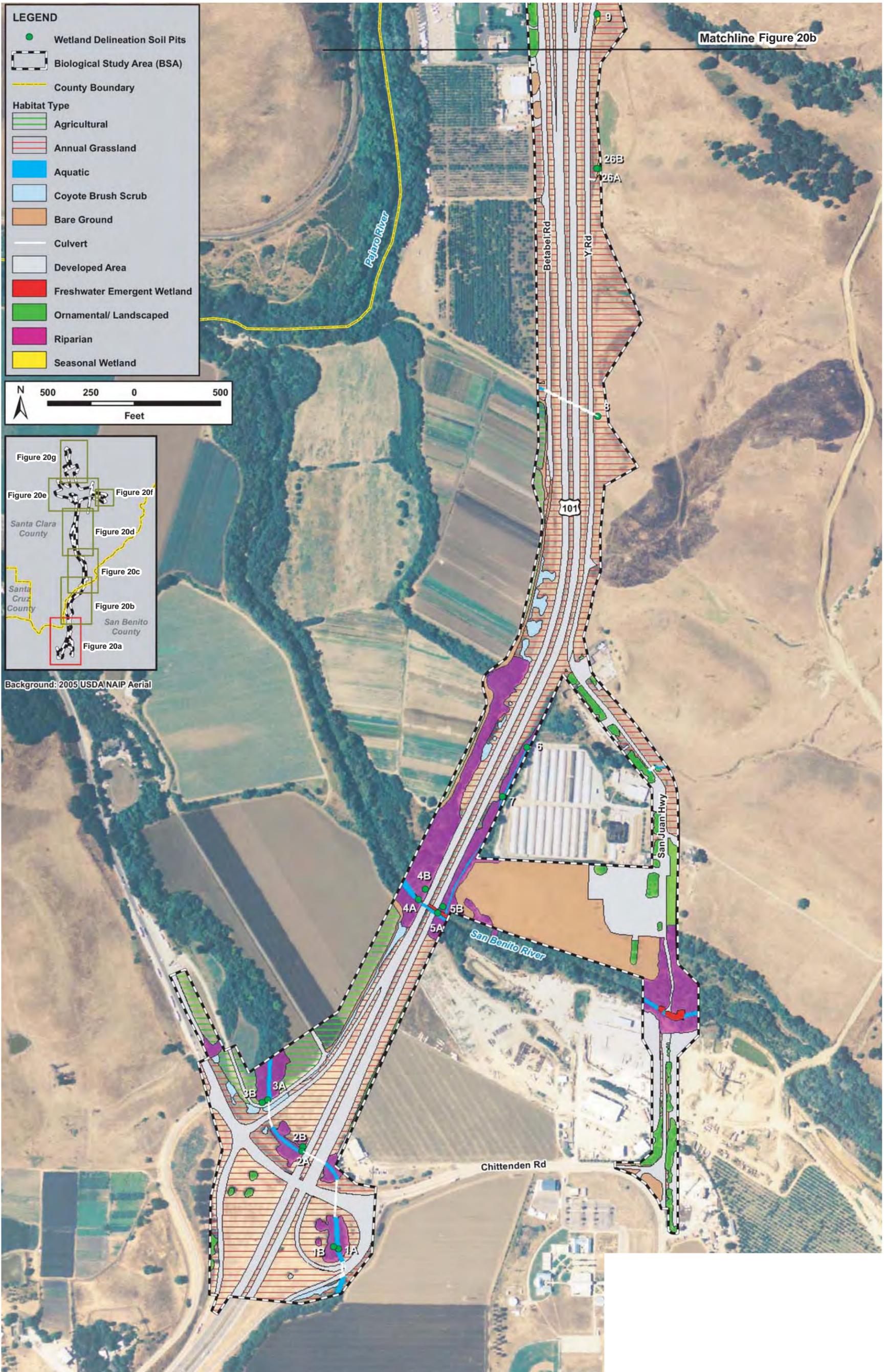
BIOLOGICAL ENVIRONMENT

The information in this section is based primarily on a Natural Environment Study (April 2011) that was prepared for the project. A copy of this study is available for review at the locations listed inside the front cover of this document.

Overall Methodology

In order to identify the biological resources that are discussed in each of the following sections (e.g., natural communities, wetlands, special-status plant and animal species, and threatened and endangered species), a biological study area (BSA) for the proposed project was delineated. The BSA was drawn to include all areas that could be temporarily or permanently impacted by the project. In addition, in order to ensure that all resources were adequately identified, the BSA was conservatively delineated to include an area somewhat larger than that where direct impacts will occur. Therefore, the project's impacts, as quantified in the following sections, are a subset of the acreage of each habitat identified in Table 34 as occurring within the BSA.

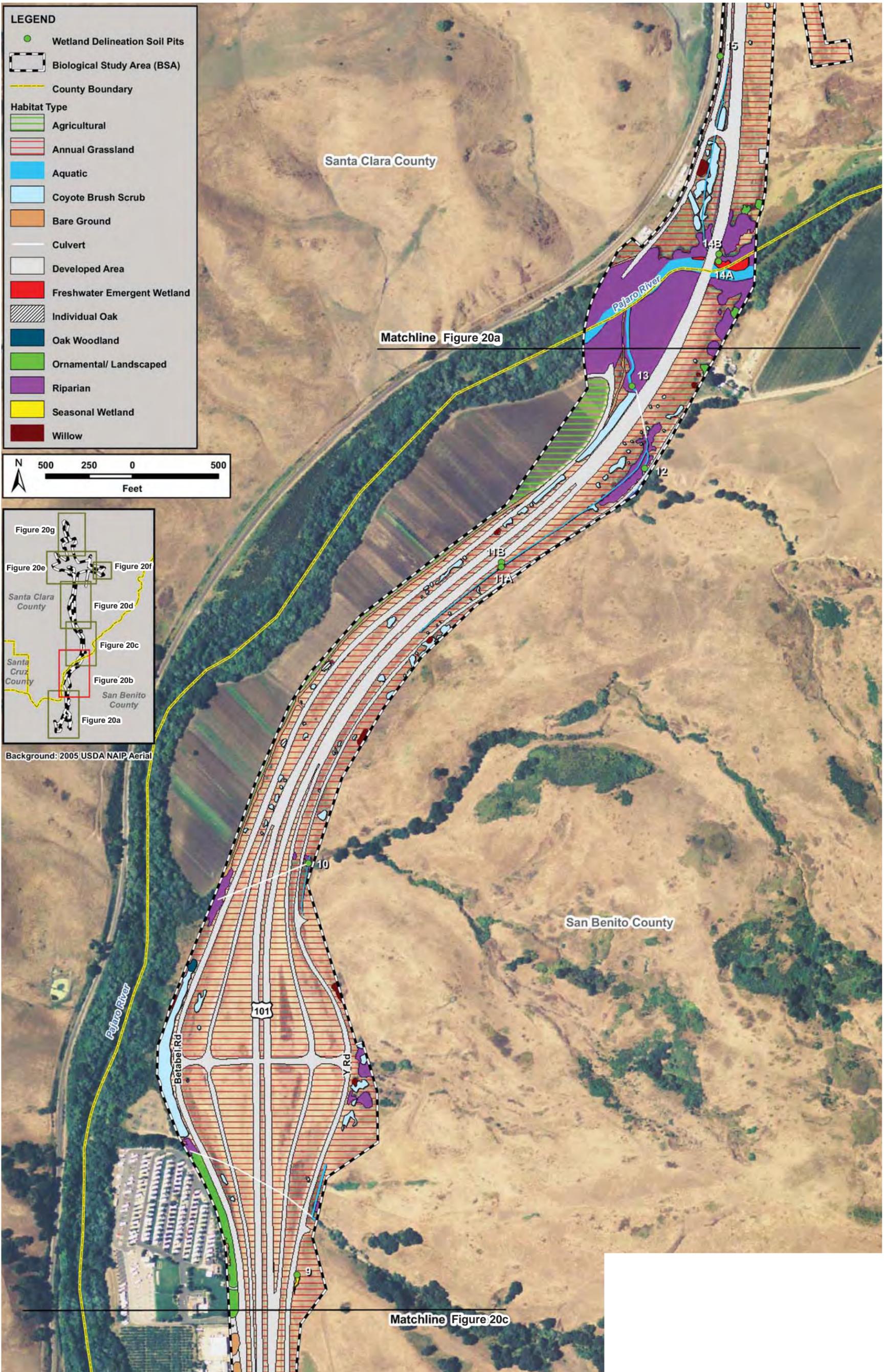
Figures 20a through 20g on the following pages depict the BSA and the habitats that occur within it.



BIOLOGICAL STUDY AREA

FIGURE 20a

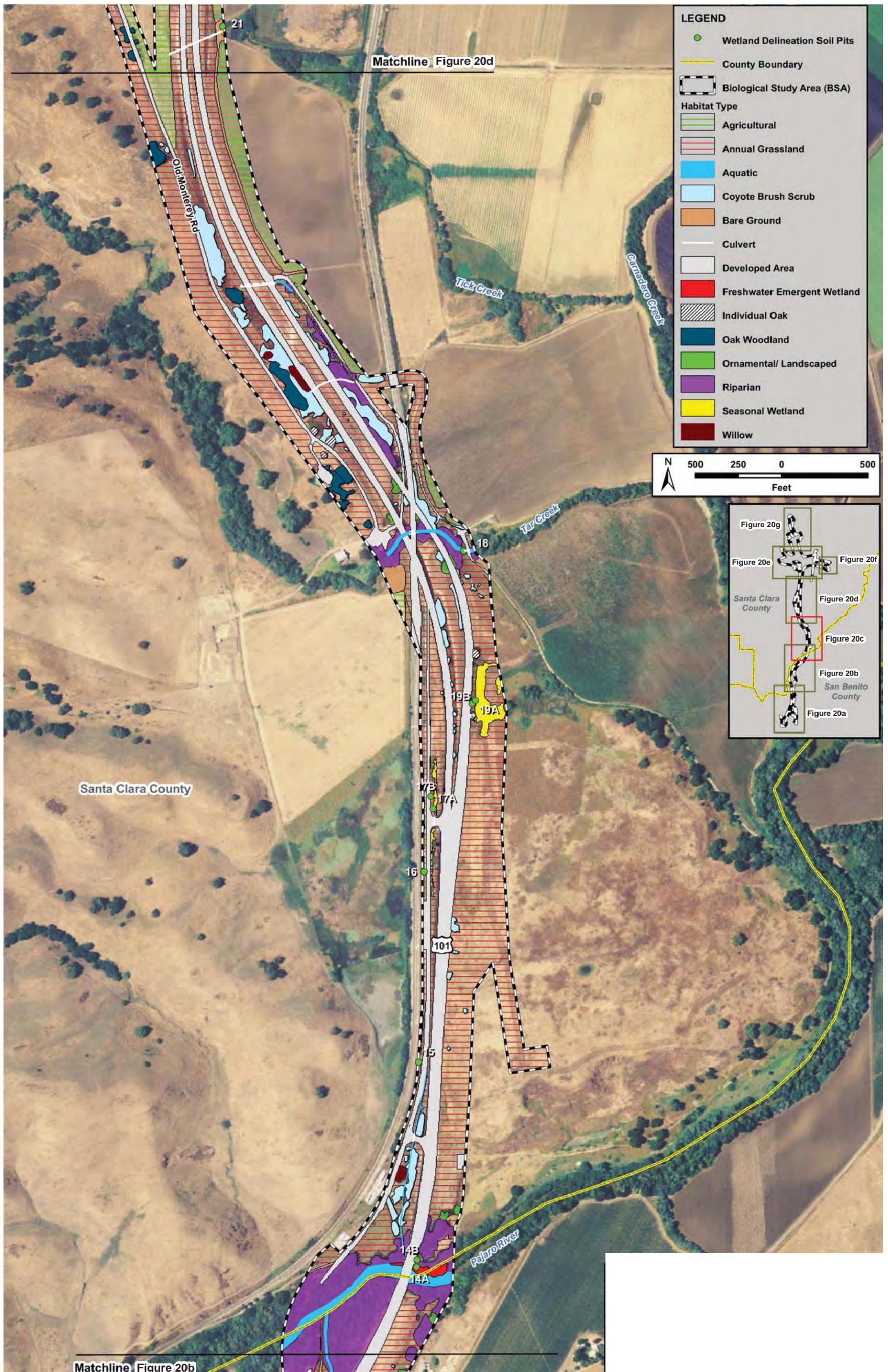
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BIOLOGICAL STUDY AREA

FIGURE 20b

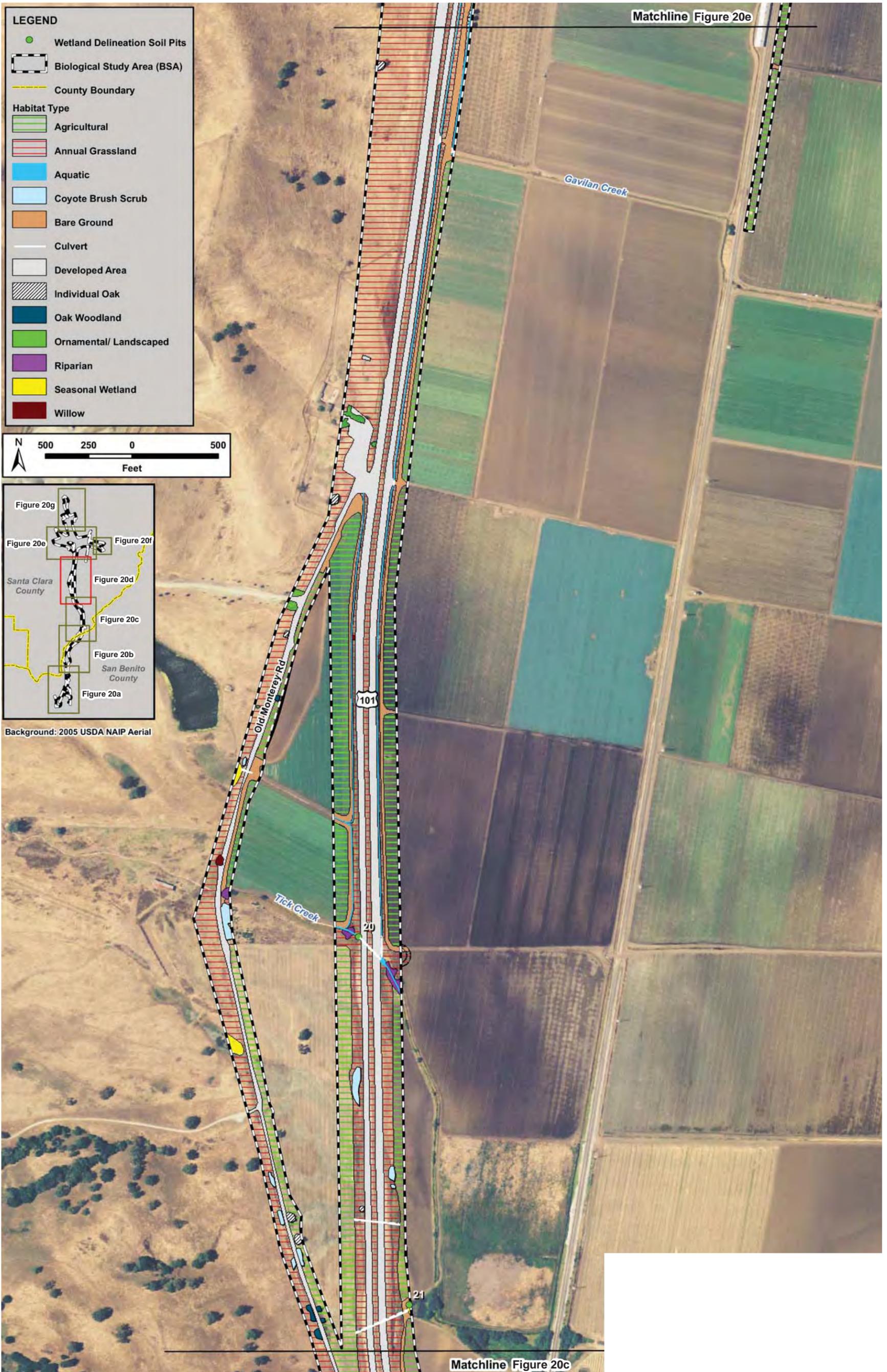
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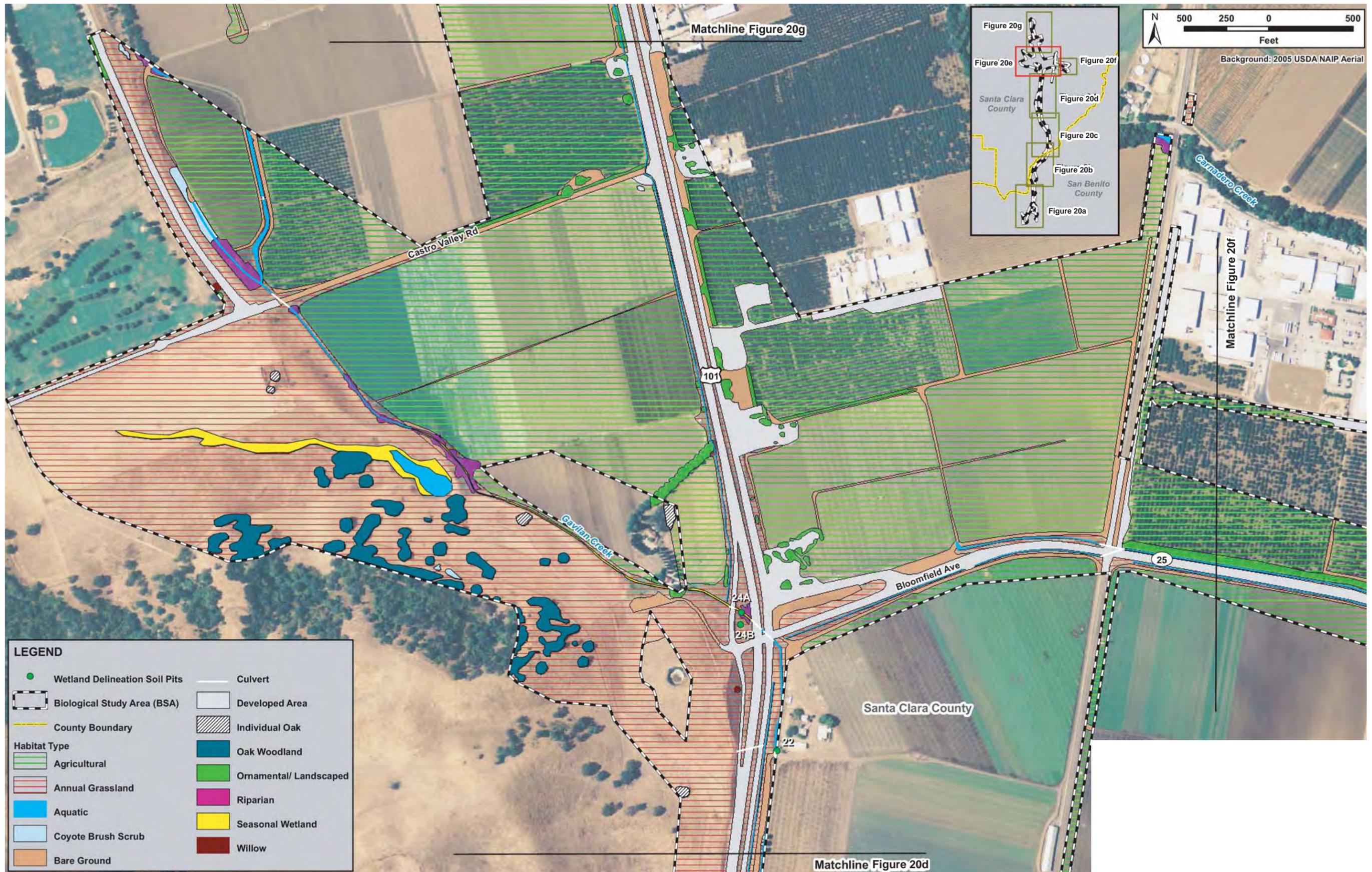
BIOLOGICAL STUDY AREA

FIGURE 20c



BIOLOGICAL STUDY AREA

FIGURE 20d



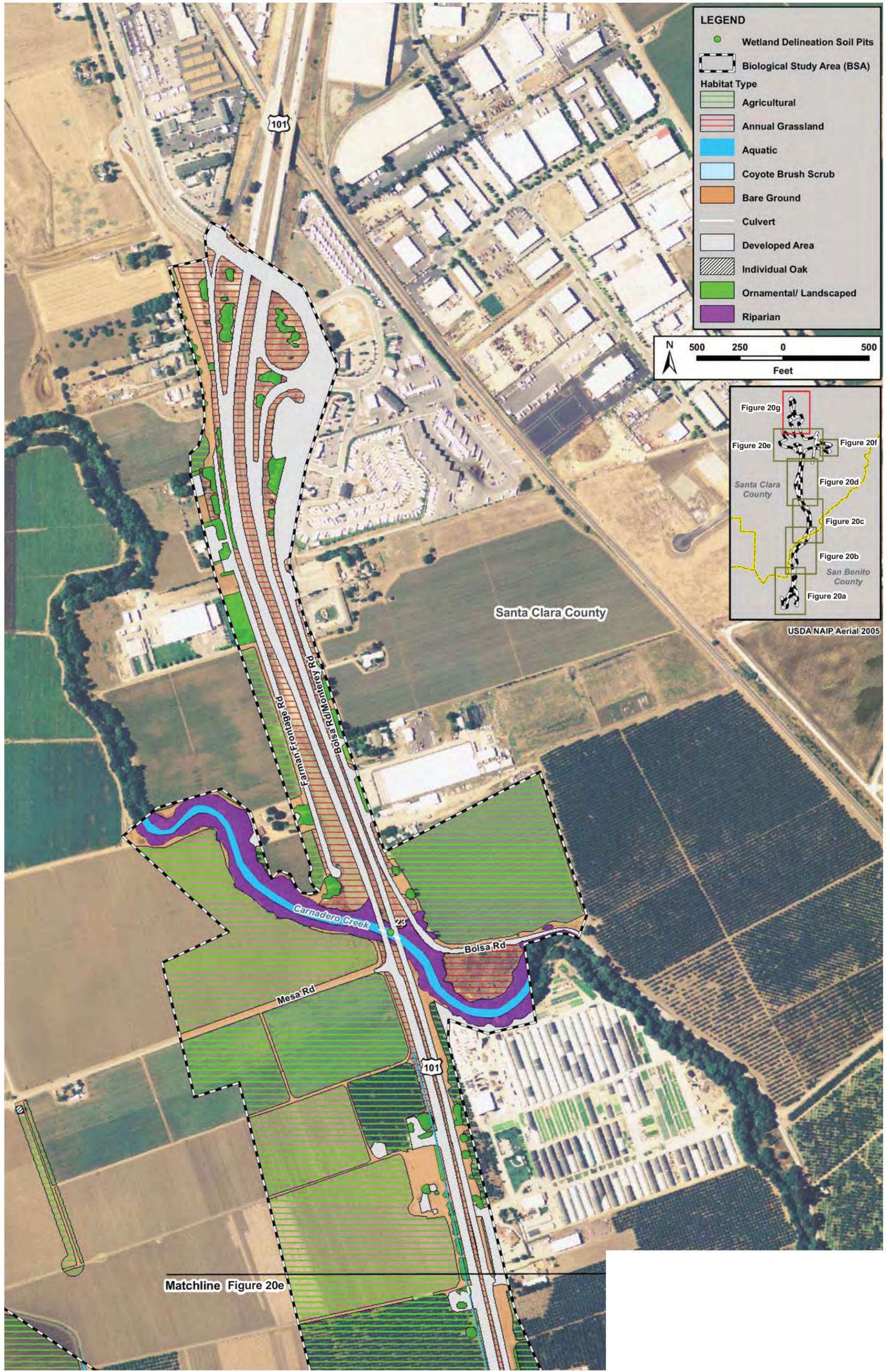
BIOLOGICAL STUDY AREA

FIGURE 20e



BIOLOGICAL STUDY AREA

FIGURE 20f



XXX

BIOLOGICAL STUDY AREA

FIGURE 20g

TABLE 34**IMPACTS TO BIOLOGICAL HABITATS**
[Expressed in Acres]

Habitat Type	Existing Within BSA			Impacts of the Build Alternative						
	Santa Clara County	San Benito County	Total	Design Option	Temporary			Permanent		
					Santa Clara County	San Benito County	Total	Santa Clara County	San Benito County	Total
Annual Grassland	218.3	95.9	314.2	A	75.0	59.0	134.0	34.0	11.0	45.0
				B	81.5	59.0	140.5	38.0	11.0	49.0
Riparian	16	19	35	A	2.0	5.0	7.0	3.5	4.5	8.0
				B	2.0	5.0	7.0	3.5	4.5	8.0
Freshwater Emergent Wetlands	.11	.35	.46	A	0.01	0.05	0.06	0.05	0.04	0.09
				B	0.01	0.05	0.06	0.05	0.04	0.09
Seasonal Wetlands	4.25	.07	4.32	A	0.26	0.03	0.29	1.12	0.03	1.15
				B	0.46	0.03	0.49	1.29	0.03	1.32
Aquatic	6.59	1.65	8.24	A	0.74	0.24	0.98	1.49	0.25	1.74
				B	0.74	0.24	0.98	1.56	0.25	1.81
Coyote Brush Scrub	4.8	5.9	10.7	A	5.5	3.0	8.5	1.0	1.0	2.0
				B	5.0	3.0	8.0	1.0	1.0	2.0
Oak Woodland	8.7	.06	8.76	A	0.0	0.0	0.0	2.0	0.0	2.0
				B	0.0	0.0	0.0	1.5	0.0	1.5
Ornamental/Landscaped	12.4	4.7	17.1	A	6.0	3.5	9.5	2.5	0.5	3.0
				B	5.5	3.5	9.0	2.5	0.5	3.0
Agriculture	327.8	9.2	337	A	95.5	4.0	99.5	40.0	0.5	40.5
				B	77.0	4.0	81.0	23.5	0.5	24.0
Developed	105.4	66.6	172	A	--	--	--	--	--	--
				B	--	--	--	--	--	--
Bare Ground	34.2	12.7	46.9	A	13.0	11.5	24.5	6.0	0.5	6.5
				B	14.5	11.5	26.0	6.0	0.5	6.5

BSA = Biological Study Area

Source: Natural Environment Study for the U.S. 101 Improvement Project, April 2011.

2.17 NATURAL COMMUNITIES

2.17.1 Introduction

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. 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 Section 2.21, *Threatened and Endangered Species*. Wetlands and other waters are also discussed in Section 2.18, *Wetlands and Other Waters*.

2.17.2 Affected Environment

The following sensitive habitats are listed by the California Natural Diversity Rarefind Database as occurring in the region⁴²: 1) northern maritime chaparral; 2) central maritime chaparral; 3) maritime coast ponderosa pine forest; 4) northern coastal salt marsh; and 5) and coastal brackish marsh. The project site does not present suitable soil substrates or microclimatic regimes for any of these sensitive habitats, and none of these habitats was observed to occur within the BSA.

The BSA does, however, contain other natural communities of special importance, including riparian habitat and oak woodland habitat, both of which are discussed in this section. Wetlands and aquatic habitat, which are also natural communities of special importance, are discussed in Section 2.18, *Wetlands and Other Waters*. Wildlife corridors and fish passage issues are discussed in this section.

2.17.2.1 *Riparian Habitat*

The project segment of U.S. 101 crosses the following waterways (from north to south): Carnadero Creek, Gavilan Creek, Tick Creek, Tar Creek, Pajaro River, San Benito River, and San Juan Creek. Habitat along these waterways, commonly referred to as riparian habitat, comprises approximately 35 acres within the BSA. The majority of riparian habitat within the BSA consists of high-quality riparian forest dominated by willow trees and understory shrubs. The Pajaro River, the San Benito River, and Carnadero Creek support the largest areas of high-quality riparian habitat within the project alignment. Riparian vegetation within these drainages is dominated by a well-developed overstory canopy of red willow trees and occasional coast live oak, valley oak, and sycamore trees. The majority of the rivers, creeks, and drainages on-site also support a lush understory of riparian shrub vegetation including red

⁴²“Region” is the United States Geological Survey quadrangle map where the project is located (i.e., Chittenden Quadrangle) and all of the surrounding quadrangle maps.

willow, yellow willow, and narrow-leaved willow. These shrubs form a rather dense layer of vegetation beneath the overstory tree canopy. Other associate shrubs within the riparian understory include poison oak, blue elderberry, California coffeeberry, California rose, coyote brush, and Himalayan blackberry.

An herbaceous ground layer of annual native and non-native plant species is also present where gaps in the tree canopy permit sunlight to reach the forest floor. Native herbaceous plants include California sagebrush, stinging nettle, fiesta flower, California man-root, willow herbs, virgin's bower, and honeysuckle. The rivers, creeks, and intermittent drainages on-site also support aquatic habitat, freshwater emergent wetlands, and seasonal wetlands that are described in Section 2.18, *Wetlands and Other Waters*.

2.17.2.2 Oak Woodland Habitat

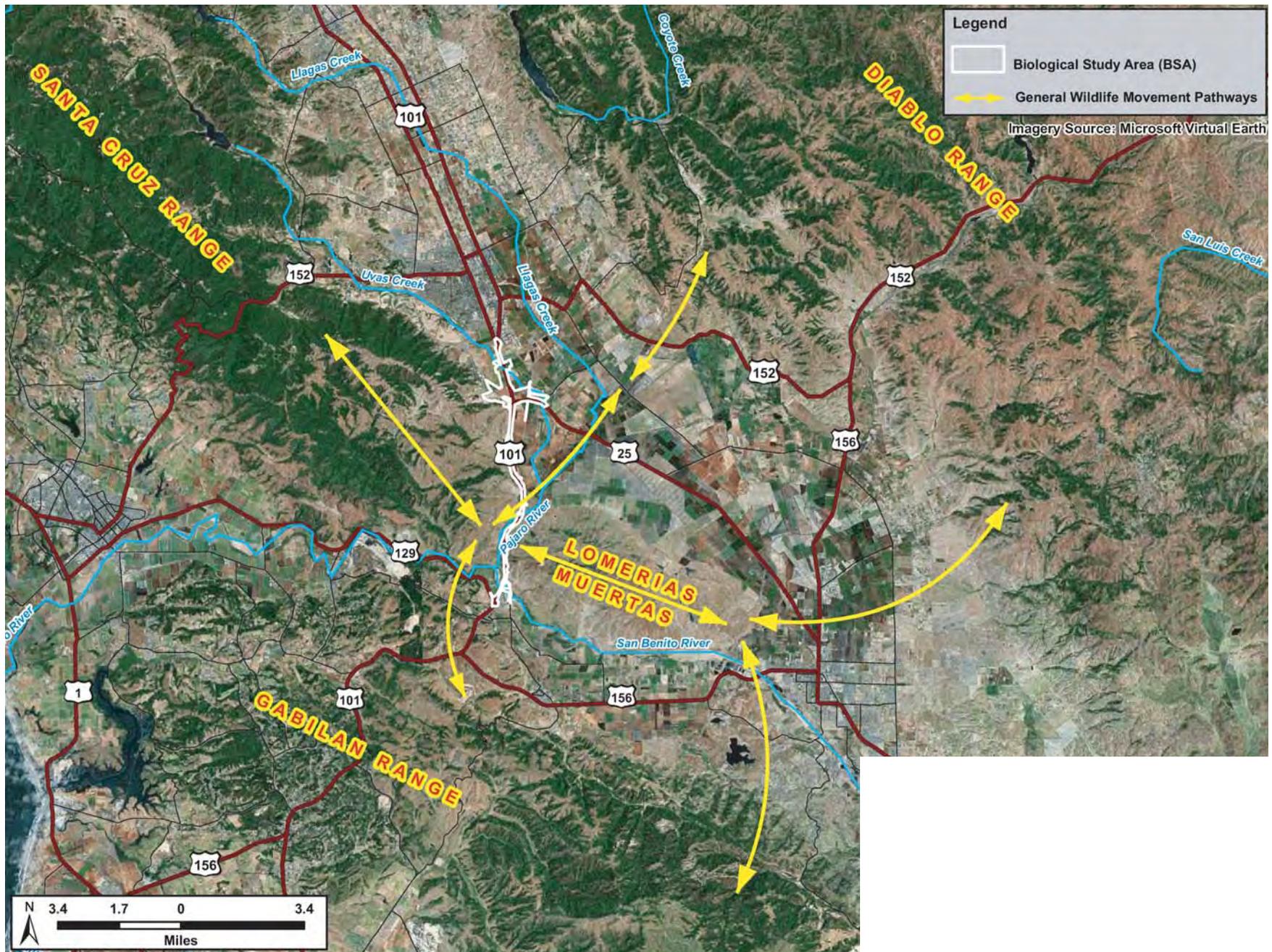
Oak woodland habitat occupies approximately 8.76 acres in the BSA, most of which occurs as relatively small and fragmented patches of mature trees dominated by California coast live oak and valley oak (Figures 20b – 20e) or of individual trees of the same species. The majority of the oak woodland habitat occurring within the BSA is located within Santa Clara County (8.7 acres), with only 0.06 acres of oak woodland habitat occurring in San Benito County. However, there are areas of more substantial and higher quality oak woodland habitat immediately south of Gavilan Creek (outside of the BSA) that support a dense understory shrub layer of vegetation that includes coyote brush, poison oak, California coffeeberry, Himalayan blackberry, and California rose (Figure 20e).

2.17.2.3 Wildlife Movement Corridors

The project is located in an area of importance to habitat connectivity and wildlife movement. An assessment of potential landscape linkages, observations of road-killed animals, and four months of monitoring of U.S. 101 undercrossings with motion-sensor cameras provided information on existing wildlife use of the roadway and undercrossings, and the likely effects of the project on wildlife movement.

Overview

The Santa Cruz Mountains to the north/northwest, the Gabilan Range to the south, and the Diablo Range across the Santa Clara Valley to the east provide vast areas of natural habitat that support sizeable populations of common and special-status plant and animal species. Exchange of individuals and genes among the populations in these three ranges is important to the long-term maintenance of populations and genetic diversity in these three ranges and in central California as a whole. Due to the scarcity of urban development and other barriers to wildlife dispersal, natural habitats in southern Santa Clara County and northern San Benito County provide landscape linkages between the Santa Cruz Mountains and Diablo Range, and between these mountain ranges and the Gabilan Range. Figure 21 illustrates these landscape linkages.



POTENTIAL WILDLIFE MOVEMENT PATHWAYS

FIGURE 21

For birds and larger, more mobile mammals such as the black-tailed deer, mountain lion, and coyote, it may be possible for individuals to move among these mountain ranges. Such movements may occur in brief dispersal events (e.g., a juvenile mountain lion dispersing from its natal area to establish its own home range) or over a period of weeks, months, or years. For smaller, less mobile species such as reptiles, amphibians, and small mammals, such “dispersal” can occur over many generations as genes are exchanged throughout a population, as long as habitat connectivity across the valleys separating these mountain ranges is maintained.

Ideally, such connectivity would consist of broad, continuous areas of “core” habitat that are large enough to support multiple home ranges of each species. However, given the presence of roads, agricultural habitats, and low-density development within the habitat mosaic of the project area, such continuous core habitat is currently lacking for many species. Sub-optimal habitat (e.g., narrow corridors or “stepping stones” of suitable habitat separated by less suitable areas) linking areas of core habitat are suitable for movement as long as they provide sufficient resources (e.g., cover, food, and water) to allow for dispersal and lack significant impediments to dispersal.

Assessment of Existing Linkages and Impediments

Within the immediate vicinity of the project, there are two main areas of habitat connectivity important to wildlife. Immediately west of the project area, the Santa Cruz Mountains narrow from north to south, ending at the Pajaro River Valley and SR 129. South of SR 129 and the Pajaro River, the Gabilan Range begins. Although the river and SR 129 (as well as low density development) both represent impediments to wildlife movement, there are many opportunities for wildlife to move across these two impediments. Larger animals can easily move between the two ranges in this area, and this linkage is considered very important for the movement of mountain lions. Also, there is sufficient core habitat for many of the smaller, less mobile species that genetic exchange can occur over a series of generations. Because this primary linkage between the Santa Cruz Mountains and the Gabilan Range lies entirely west of the project area, it will not be adversely affected by the proposed project.

The second important landscape linkage, which is bisected by U.S. 101, lies between the Santa Cruz Mountains to the west and the Diablo Range to the east. Unlike the Santa Cruz and Gabilan Ranges, which are contiguous, the distance between the eastern foothills of the Santa Cruz Mountains immediately west of U.S. 101 and the western foothills of the Diablo Range varies from approximately four miles at U.S. 101 and SR 25 to six to seven miles at U.S. 101 and the Pajaro River. Due to the cover and habitat connectivity provided by riparian vegetation along the Pajaro River itself; the cover provided by riparian vegetation along tributaries such as Carnadero and Llagas Creek; and relatively natural habitat (e.g., fallow fields and ranchlands rather than heavily cultivated agricultural habitats in many areas), the Pajaro River connection is likely very important in maintaining this linkage.

A smaller-scale and more local, but still important area of potential wildlife movement is provided by the proximity of the southern Santa Cruz Mountains and the Lomerias Muertas (i.e., the hills east of U.S. 101 between the Pajaro and San Benito Rivers). The foothills of the Santa Cruz Mountains are separated

from the Lomerias Muertas by the Pajaro River, a narrow strip of mostly agricultural land, U.S. 101, Betabel Road, and Y Road. From U.S. 101, the Lomerias Muertas stretch to the southeast. As indicated on Figure 21, these hills provide potentially important secondary linkages between the Santa Cruz Mountains and the Gabilan Range, and between the Gabilan Range and the Diablo Range. For a number of species, including the California red-legged frog, California tiger salamander, and grassland species such as the American badger, the Lomerias Muertas also provide a vast area of core habitat that can serve as the source or recipient of dispersing individuals and genes.

Although larger mammals may be capable of traversing the median barrier and undercrossings are available and used by mammals and fish, U.S. 101 does restrict surface movements of many species, particularly where continuous concrete median barriers are present. Therefore, U.S. 101 is likely a substantial impediment to the movement of wildlife. Due to development, cultivation, a fairly high chain-link fence along the highway north of Carnadero Creek, and a concrete median barrier between Carnadero Creek and SR 25, the area north of SR 25 is likely not very permeable for regional wildlife movements. Despite the presence of high-quality habitat west of U.S. 101, the area from SR 25 south to Tar Creek is likewise not as critical a wildlife crossing area given the inhospitable character of the heavily cultivated fields to the east, but should not be discounted altogether. Overall, the most successful and ecologically significant movement by wildlife across U.S. 101 occurs from Tar Creek south to the San Benito River. However, because most of this segment contains a median barrier, successful movement by most species in this segment likely relies on the use of the existing undercrossings.

2.17.2.4 Fish Passage

Fish are able to move through the project area along the Pajaro River, San Benito River, Carnadero Creek, Tar Creek, and San Juan Creek, and (at least a short distance, due to low flow) up Tick Creek. The ability of these species to move through the project area depends on flow conditions rather than on infrastructure associated with U.S. 101. Although piers for the Carnadero Creek bridges are located within the middle of the channel, piers for other bridges are located outside of, or right at the edges of, the stream channels. Fish passage assessments performed for the existing bridges and culverts did not identify any substantial impediments to fish movement within the BSA.

2.17.3 Environmental Consequences of the Build Alternative

2.17.3.1 Impacts to Riparian Habitat

The project has been designed to avoid and minimize impacts to riparian habitat to the greatest extent feasible. Given the number of creek and river crossings within the project segment, protection of these resources was accorded a high priority during design. As an example, temporary construction impacts will be limited to 10 feet beyond the edge of each new or widened bridge, beyond which access will be prohibited by the use of temporary construction fencing.

The above statement notwithstanding, construction of the project will result in the permanent loss of eight acres of riparian habitat. Such impacts will occur due to the construction of new bridges, widened bridges, new culverts, and lengthened culverts at the creeks and rivers crossed by the project. In addition to this permanent impact of eight acres, seven acres of riparian habitat will be temporarily impacted by construction activities. These impacts will be the same under Design Option A and Design Option B.

Riparian habitat impacts will include the loss of approximately 890 linear feet of shaded riverine aquatic (SRA) habitat on the San Benito and Pajaro Rivers and Carnadero Creek. The loss of SRA habitat will result in the loss of some shading of these creeks, which could have a minor impact on habitat quality for aquatic species such as steelhead, which thrive in cooler streams. The loss of SRA habitat will also reduce the input of organic matter and coarse woody debris into these streams, thus affecting the aquatic food chain and aquatic habitat structure, respectively.

Impact NATCOM-1: The project will result in the permanent loss of eight acres of riparian habitat and temporary impacts to seven acres of riparian habitat. The project will also impact 890 linear feet of SRA habitat. **[Less-than-Significant with Mitigation Listed in Section 2.17.5]**

2.17.3.2 *Impacts to Oak Woodland Habitat*

As part of the project, a new frontage road will be constructed south of Gavilan Creek. This frontage road will permanently impact 2.0 and 1.5 acres of oak woodland habitat under Design Option A and Design Option B, respectively. The loss of oak woodland habitat will result in a loss of breeding, foraging, and resting opportunities for several common and special-status wildlife species.

The project will not result in any temporary impacts to oak woodland habitat.

Impact NATCOM-2: The project will permanently impact 2.0 and 1.5 acres of oak woodland habitat under Design Option A and Design Option B, respectively. **[Less-than-Significant with Mitigation Listed in Section 2.17.5]**

2.17.3.3 *Impacts to Wildlife Movement Corridors*

The proposed project will provide for an increase in vehicle capacity. In addition, by increasing the number of lanes and improving interchanges, particularly at SR 25, the project will result in an increase in the speed of traffic on U.S. 101 and the segment of SR 25 near U.S. 101 during peak commute periods. The project will also increase the number of traffic lanes that individual animals would have to cross in order to safely cross these roads. Furthermore, the project includes the construction of a median barrier along portions of U.S. 101 where no such barrier currently exists. Collectively, the increased width of the roadway, increased speed of traffic, and presence of a median barrier will increase road mortality and reduce the ability of some animals to move across U.S. 101.

Culverts and bridges providing wildlife undercrossings currently exist in the project area. Of these, the most valuable wildlife undercrossings are located at the bridges over the larger streams. These are expected to maintain their value to wildlife after construction. Though the bridges at these locations will be slightly wider, the use of these undercrossings by wildlife is not expected to be reduced. The increase in length and corresponding decrease in openness ratios of the culverts under U.S. 101 may discourage some individual animals from moving through these culverts. However, given that numerous animals are currently using these culverts for movement, despite their length (more than 900 feet in the case of the culvert immediately south of the Betabel Road/Y Road interchange) and the dark conditions inside these existing culverts, an increase in their length is expected to have little effect on wildlife use. Also, the use of grates on the road shoulders at the ends of these culvert extensions, where feasible, will allow more light into the culverts, encouraging their use by wildlife.

Wildlife is expected to move under the new Betabel Road bridge over the Pajaro River (or over the road itself), and under the footbridge that will span the San Benito River at Y Road. Therefore, these new roads will provide only minor impediments to wildlife movement.

However, the new segment of frontage road south of Castro Valley Road (under Design Option A), or the new extension of Santa Teresa Boulevard (under Design Option B), will pass near a potential California tiger salamander and California red-legged frog breeding pond. These proposed new roadways have the potential to hinder movement, causing mortality of and/or reduced immigration and emigration by both amphibians. See Sections 2.21.3 and 2.21.5 for a discussion of this impact and the corresponding avoidance measures that are included as part of the project.

Impact NATCOM-3: The project will result in an adverse effect on wildlife movement by increasing road mortality and the ability of some animals to move across U.S. 101. **[Less-than-Significant with Mitigation Listed in Section 2.17.5]**

2.17.3.4 *Impacts to Fish Passage*

The project has been designed to maintain stream continuity and fish (and other aquatic organism) passage by avoiding placing new obstacles within stream channels. Although bridge piers within Carnadero Creek will be enlarged somewhat longitudinally (i.e., along the length of the stream), they will not substantially reduce the ability of aquatic organisms to move along the stream.

Impact NATCOM-4: Construction of the proposed project will not create permanent barriers to the passage of fish. **[No Impact]**

2.17.4 **Environmental Consequences of the No Build Alternative**

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. There would be no modification to existing facilities or to the existing environment. There would, therefore, be no impacts to any natural communities.

2.17.5 Avoidance, Minimization, and/or Mitigation Measures

**Santa Clara Valley Habitat Conservation Plan/
Natural Community Conservation Plan⁴³**

A Habitat Conservation Plan (HCP) is a document that supports issuance of an incidental take permit consistent with the federal Endangered Species Act. A Natural Community Conservation Plan (NCCP) is the state counterpart to the federal HCP and provides a means of complying with the California Endangered Species Act. The NCCP goes further than the HCP in that it not only addresses mitigation of development impacts, but also includes actions necessary to promote the long-term conservation of species at a regional scale. Thus, the State requirements go above and beyond the federal mitigation requirements. The Santa Clara Valley HCP/NCCP will allow local agencies to approve projects in endangered species' habitat in exchange for identifying a maximum level of impacts permitted under the HCP/NCCP and mitigation strategies based on a coordinated regional plan for conserving natural communities and endangered species.

HCPs and NCCPs are tools for the protection of endangered species and represent an important integration of land-use planning and habitat conservation. The plans provide an efficient process for protecting the environment and processing applications for local public and private projects that may affect endangered species. Without such plans, project proponents, including local governments, must evaluate projects individually in consultation with a variety of federal and state regulators to mitigate for habitat loss, which is a lengthy process that can cost both parties considerable time and money. In addition, the absence of these plans also does less to protect wildlife because project-specific mitigation measures result in land being set aside on a piecemeal basis, resulting in fragmented habitats that are less ecologically viable and more difficult to manage.

The Santa Clara Valley HCP/NCCP ~~is currently under development~~ was adopted in late 2012/early 2013 by six "local partners" (VTA, County of Santa Clara, Santa Clara Valley Water District, and the Cities of San Jose, Morgan Hill, and Gilroy), in cooperation with the California Department of Fish & Wildlife (CDFW) and the U.S. Fish & Wildlife Service (USFWS). The Santa Clara Valley HCP/NCCP covers approximately 520,000 acres, primarily within southern Santa Clara County, and several special status plant and animal species (called "covered species" in the HCP/NCCP). The current schedule anticipates that the approval implementation of the HCP/NCCP will occur in late 2013.

The proposed project is a "covered" activity, meaning that it is a project whose impacts are described and accounted for in the HCP/NCCP. For such projects, a variety of development-based fees are paid to the HCP/NCCP program to fund mitigation that will offset take of covered species, covered species habitat, and loss of other biological values. These one-time fees pay for the full cost of mitigating project effects on covered species and natural communities. Once paid, project proponents do not need

⁴³Much of the information and text in this overview is excerpted from the official website for the Santa Clara Valley Habitat Conservation Plan/Natural Communities Conservation Plan: www.scv-habitatplan.org.

to implement their own mitigation to satisfy state and federal endangered species laws. Therefore, it is the intent of this project to mitigate for impacts to biological resources using the HCP/NCCP to the greatest extent feasible. The discussion of mitigation, below, as well as in subsequent sections, follows this approach.

While it is the intent to mitigate for impacts to endangered species and their habitat due to the entire project using the Santa Clara Valley HCP/NCCP, it is recognized that the southerly portion of the project segment extends approximately 2.5 miles into San Benito County, an area just outside the HCP/NCCP boundaries. However, based on coordination to date, it is anticipated that approval for mitigating the project's impacts in San Benito County using the Santa Clara Valley HCP/NCCP will be granted by the regulatory agencies.

In addition, while approval of the HCP/NCCP is likely, there is no guarantee that it will be approved. Therefore, if mitigation through the HCP/NCCP is not feasible for impacts in one or both counties, on-site or off-site habitat restoration will be implemented, as described below.

2.17.5.1 Mitigation for Impacts to Riparian Habitat

The project includes the following mitigation, which will reduce the above-described impacts to riparian habitat to a less-than-significant level:

MM-NATCOM-1.1: The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to riparian habitat. For more information on the HCP/NCCP, please see Section 2.17.5.

MM-NATCOM-1.2: If MM-NATCOM-1.1 turns out to be infeasible for some or all of the project, permanent impacts to riparian habitat will be mitigated by creating/restoring riparian habitat at a 3:1 ratio, on an acreage basis; temporary impacts will be mitigated at a 2:1 ratio, on an acreage basis; and SRA impacts will be mitigated at a 2:1 basis ratio, on a linear footage basis. These ratios are higher than those given in the HCP/NCCP as they are for restoration/creation only; there is no preservation component.

A search for appropriate locations for this mitigation revealed that there are numerous nearby locations where riparian habitat could be created or restored. These areas include the proposed staging area along the San Benito River, as well as numerous agricultural parcels along the Pajaro River corridor. Off-site SRA mitigation opportunities are also present on adjacent properties along Tar Creek." The Pajaro River system is large, important, and impaired in many areas, and there are riparian and wetland restoration opportunities along the river, as well as Tequisquita Slough. Restoration of riparian habitat is needed on an easement property adjacent to The Nature Conservancy's property near the

Pajaro River. The Uvas watershed, a tributary to the Pajaro River, has a steelhead run, and several segments are in need of restoration. Millers Canal, San Felipe Lake, and Pacheco Creek are identified as steelhead bearing streams in the National Marine Fisheries Service steelhead recovery plan, and have opportunity for restoration. There are many in-kind or out-of-kind, on-site or off-site, opportunities. If desired, numerous old and poorly functioning fish ladders in the Uvas system could be replaced, with riparian restoration as a component of a project.

As a potential alternative to the project creating/restoring riparian habitat at a nearby location, this measure could be satisfied, in whole or part, through the purchase of riparian mitigation credits from an approved mitigation bank. However, at the time this document was prepared, there were no approved mitigation banks offering riparian mitigation credits for projects located in the southern Santa Clara County/northern San Benito County area. If such banks become available and the project decides to purchase credits, the mitigation ratios given above for the creation/restoration of riparian habitat will apply.

If on-site or off-site riparian habitat creation or restoration is necessary, a restoration ecologist will develop a Riparian Habitat Mitigation and Monitoring Plan (HMMP), which shall contain the following components (or as otherwise modified by regulatory agency permitting conditions):

1. Summary of habitat impacts and proposed mitigation ratios.
2. Goal of the restoration to achieve no net loss of habitat functions and values.
3. Location of mitigation site(s) and description of existing site conditions.
4. Mitigation design:
 - Existing and proposed site hydrology
 - Grading plan if appropriate, including bank stabilization or other site stabilization features
 - Soil amendments and other site preparation elements as appropriate
 - Planting plan
 - Irrigation and maintenance plan
 - Remedial measures/adaptive management, etc.
5. Monitoring plan (including performance and final success criteria, monitoring methods, data analysis, reporting requirements, monitoring schedule, etc.). At a minimum, success criteria will include quantifiable measurements of vegetation type (e.g., dominance by native riparian species) and extent appropriate for the restoration location, and provision of ecological functions and values equal to or exceeding those in the riparian habitats that are impacted.
6. Contingency plan for mitigation elements that do not meet performance or final success criteria.

At least five years of monitoring shall be conducted to document whether the success criteria are achieved, and to identify any remedial actions that must be taken if the identified success criteria are not met.

[Note: MM-NATCOM-1.2 will be implemented only if MM-NATCOM-1.1 is determined to be partially or completely infeasible.]

2.17.5.2 Mitigation for Impacts to Oak Woodland Habitat

The project includes the following mitigation, which will reduce the above-described impacts to oak woodland habitat to a less-than-significant level:

MM-NATCOM-2.1: The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to oak woodland habitat. For more information on the HCP/NCCP, please see Section 2.17.5.

MM-NATCOM-2.2: If MM-NATCOM-2.1 turns out to be infeasible, impacts to oak woodland habitat will be mitigated by creating/restoring oak woodland habitat at a 2:1 ratio. A search for appropriate locations for this mitigation revealed that there are numerous nearby locations where oak woodland habitat could be created or restored.

[Note: MM-NATCOM-2.2 will be implemented only if MM-NATCOM-2.1 is determined to be infeasible.]

If project-specific oak woodland restoration is necessary, a restoration ecologist will develop an Oak Woodland HMMP. This plan will contain the same types of information described in MM-NATCOM-1.2, but will focus on oak woodlands instead of riparian habitat. At a minimum, success criteria will include quantifiable measurements of oak survival and abundance. At least five years of monitoring will be conducted to document whether the success criteria are achieved, and to identify any remedial actions that must be taken if the identified success criteria are not met.

2.17.5.3 Mitigation for Impacts to Wildlife Movement Corridors

Recognizing the importance of wildlife movement in the project area, the project's design team and biologists undertook extensive coordination with personnel from the CDFW to 1) determine those locations along the U.S. 101 corridor where wildlife movement was most critical, and 2) determine the best options for maintaining or improving habitat connectivity in light of the project. This coordination focused on improving connectivity in the most important crossing locations while reducing mortality in areas where even successful wildlife crossings may be unlikely to result in a substantial population

benefit. Two strategies emerged, one for the project segment north of Tar Creek, and the other for the project segment south of Tar Creek.

For the project segment north of Tar Creek, the approach to allowing wildlife movement will be to maintain the ability of wildlife to access the highway surface, and to cross the median, that currently exists. For human safety reasons, wildlife access to U.S. 101 will not be enhanced, but to maintain habitat connectivity, the existing fencing and median designs will remain in place. For example, between Tar Creek and SR 25, standard fencing⁴⁴ will be used along the highway, and a thrie-beam median barrier will be used. North of SR 25, where wildlife movement is not very important to regional connectivity, a continuous concrete median barrier (which is currently present from SR 25 to Camadero Creek) will be used.

For the project segment south of Tar Creek, the approach to allowing wildlife movement will be to improve connectivity across U.S. 101. Most important is the segment between Tar Creek and the San Benito River since this area represents the juncture of the Santa Cruz Mountain foothills and the Lomerias Muertas. Currently, the large undercrossings at Tar Creek, the Pajaro River, and the San Benito River receive heavy wildlife use. In addition, several culverts along this segment are used by fairly large numbers of mammals. However, the existing median barrier prevents many mammals from successfully making surface crossings on the road, and a disproportionately large number of roadkills was observed in this segment during opportunistic surveys.

In the context of the above-stated strategies, the following avoidance, minimization, and mitigation measures are included in the project for the purposes of 1) reducing wildlife movement impacts of the project to a less-than-significant level, and 2) improving wildlife connectivity across the U.S. 101 corridor.

MM-NATCOM-3.1: North of Tar Creek, the project will maintain the existing standard fencing and thrie-beam median barrier.

MM-NATCOM-3.2: New box culverts will be installed under U.S. 101 north of SR 25 for the purpose of accommodating flood flows; see MM-HYDRO 1.1 and MM-HYDRO-1.2. Although wildlife crossings are not substantial in this area, these culverts will be beneficial to wildlife movement across the U.S. 101 corridor because they will be dry year-round in most years.

⁴⁴“Standard Fencing” may include wire mesh or barbed-wire fencing. ~~This type of fencing is not expected to inhibit most wildlife movement and is considered permeable.~~ This type of fencing is currently present along most of the project alignment, and thus maintaining the presence of standard fencing is not expected to inhibit wildlife movement, relative to existing conditions. Standard fencing is also considered relatively permeable because many wildlife species can jump over or cross through/under this fencing.

- MM-NATCOM-3.3:** A new culvert under U.S. 101 will be installed between Tar Creek and the Pajaro River. The height of the culvert will be at least 4 feet.
- MM-NATCOM-3.4:** The existing, 90-inch, corrugated metal pipe (CMP) under U.S. 101 south of the Pajaro River will be replaced by a box culvert to maintain or increase its "openness ratio" (a measure of how "open" a culvert appears to animals, taking into account its height, width, and length) as this culvert is lengthened. This modification will at least maintain, if not enhance, the usefulness of this culvert to wildlife crossing under U.S. 101.
- MM-NATCOM-3.5:** The existing, 54-inch, reinforced concrete pipe (RCP) under U.S. 101 just north of the Betabel Road/Y Road interchange will be replaced with a box culvert at least 90 inches in height. Increasing the height and width of this culvert will increase its openness ratio considerably, thereby enhancing its attractiveness to wildlife attempting to cross U.S. 101.
- MM-NATCOM-3.6:** Wildlife fencing⁴⁵ will be installed along U.S. 101 from Tar Creek south to the San Benito River to minimize the potential for wildlife to access the highway's surface. The wildlife fencing will extend 0.25 miles north of Tar Creek and south of the San Benito River to minimize the potential for wildlife to move around the fence and onto the roadway. Wildlife "jump-outs" or one-way gates will be installed in several locations within this segment so that animals that are able to find a way onto the highway will be able to exit.
- MM-NATCOM-3.7:** Where feasible, designs for the culverts that will be lengthened by the project will include metal grating in the shoulder of the road surface. This grating will increase lighting within the culverts, offsetting the increased darkness resulting from lengthening the culverts.
- MM-NATCOM-3.8:** At several existing culverts under U.S. 101, vegetation immediately in front of the culverts may block the culverts from the view of dispersing animals and provide cover in which predators may hide. Although such cover may benefit animals at times, the function of the culverts (from a wildlife perspective) is to move quickly through the corridor. Therefore, in some areas, vegetation will be cleared immediately in front of culverts to make them more conspicuous and attractive and to reduce cover in which predators may hide.

⁴⁵"Wildlife Fencing" consists of small-gauge mesh at the base (to reduce the potential for mammals larger than mice and voles to pass through) and barbed wire at the top for a height of at least 7 feet. Wildlife fencing is used to guide wildlife to undercrossings for safe movement across the highway.

MM-NATCOM-3.9: The concrete median barriers south of Tar Creek will be retrofitted to incorporate wildlife passageways (Caltrans standard "Type S, M, and/or L") to facilitate crossings by animals that are able to cross over or through the wildlife fencing in these areas.

MM-NATCOM-3.10: Following completion of construction, monitoring will be performed to ensure that MM-NATCOM-3.1 through MM-NATCOM-3.6, and MM-NATCOM-3.9, have been implemented; to document that grating has been incorporated into the road shoulder per MM-NATCOM-3.7 where feasible; and to document that vegetation potentially concealing undercrossings has been cleared as appropriate to make inconspicuous undercrossings more evident to wildlife per MM-NATCOM-3.8.

In addition, monitoring will occur at the Tar Creek, Pajaro River, and San Benito River bridges, as well as at the two culverts that are to be upgraded in size between the Pajaro River and the Betabel Road/Y Road interchange, to verify continued use by mammals moving from one side of U.S. 101 to the other. Such monitoring may be performed via remote cameras, track plates, observation of mammal tracks in existing sediment, or other means to verify use. Success will be measured by verification of use of each of these undercrossings by mammals. If verification of use of all five of these undercrossings by mammals cannot be provided within six months following the initiation of monitoring, VTA will consult with Caltrans and the CDFW regarding further monitoring.

2.18 WETLANDS AND OTHER WATERS

2.18.1 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 U.S.C. 1344)] is the primary law regulating wetlands and surface waters. The CWA regulates the discharge of dredged or fill material into waters of the United States (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 Corps of Engineers (USACE) with oversight by the U.S. Environmental Protection Agency (U.S. EPA).

USACE issues two types of 404 permits: Standard and General permits. Nationwide permits, a type of General permit, are issued to authorize a variety of minor project activities with no more than minimal effects. 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 CFR Part 230), and whether permit approval is in the public interest. The 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.

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 the 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 Section 2.10, *Water Quality*, for additional details.

2.18.2 Affected Environment

As shown in Table 34, seasonal wetland habitat occupies approximately 4.32 acres of the BSA within several of the unnamed intermittent drainages and agricultural irrigation ditches as isolated patches of wetlands. Of this total, 0.07 acres occurs in San Benito County and 4.25 acres occurs in Santa Clara

County. These wetlands receive water from seasonal irrigation runoff, native springs, adjacent livestock ponds, or culverts and storm drains associated with U.S. 101 (Figures 20a – 20f).

Freshwater emergent wetland habitat occurs within approximately 0.46 acres of the BSA in two separate locations along the outer bed and lower banks of the Pajaro River and San Benito River (Figures 20a – 20c). The high-quality freshwater emergent wetlands are dominated by tall, dense, perennial stands of broad-leaved cattail, acute bulrush, and bur-reed. These patches of wetland vegetation expand considerably in area and size during the spring and summer months due to a continuous supply of water and adequate sunlight.

Aquatic habitat occurs within approximately 8.24 acres in the BSA and includes all of the water within the beds of the rivers, creeks, and intermittent drainages (Figures 20a – 20f). Of this total, 1.65 acres occurs in San Benito County and 6.59 acres occurs in Santa Clara County. Aquatic habitat also includes the agricultural irrigation ditches and culvert undercrossings beneath U.S. 101 and SR 25. The majority of the aquatic habitat on-site does not support aquatic vegetation as it is either perennial and deep, or seasonally dry. A stock pond located south of Castro Valley Road is also within the BSA.

2.18.3 Environmental Consequences of the Build Alternative

The project will result in the removal of wetland and aquatic habitat due to relocation of bridge abutments and piers, addition of new bridge abutments and piers, and shifting of road alignments and associated fill. In Santa Clara County, these actions will result in permanent impacts to 1.49 acres of aquatic habitats, 0.05 acres of freshwater emergent wetlands, and 1.12 acres of seasonal wetlands under Design Option A, or 1.56 acres of aquatic habitats, 0.05 acres of freshwater emergent wetlands, and 1.29 acres of seasonal wetlands under Design Option B. In San Benito County, under either option, these actions will permanently impact 0.25 acres of aquatic habitats, 0.04 acres of freshwater emergent wetlands, and 0.03 acres of seasonal wetlands. The loss of wetland and aquatic habitats will result in a loss of breeding, foraging, resting, rearing, and migration opportunities for numerous common and special-status wildlife species.

Temporary impacts to wetland and aquatic habitat will result from operating equipment in and immediately adjacent to these areas and removal of herbaceous vegetation, but will not result in any placement of fill within these habitat areas. Temporary impacts to these habitats will be avoided whenever possible. In Santa Clara County, these actions will result in temporary impacts to 0.74 acres of aquatic habitats, 0.01 acres of freshwater emergent wetlands, and 0.26 acres of seasonal wetlands under Design Option A, or 0.74 acres of aquatic habitats, 0.01 acres of freshwater emergent wetlands, and 0.46 acres of seasonal wetlands under Design Option B. In San Benito County, under either option, these actions will result in temporary impacts to 0.24 acres of aquatic habitats, 0.05 acres of freshwater emergent wetlands, and 0.03 acres of seasonal wetlands.

Impact WET-1: The project will result in the permanent loss of up to 3.2 acres of wetlands and aquatic habitat and temporary impacts of up to 1.5 acres of wetlands and aquatic habitat. **[Less-than-Significant with Mitigation Listed in Section 2.18.5]**

2.18.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. There would be no modification to existing facilities or to the existing environment. There would, therefore, be no impacts to any wetlands or aquatic habitat.

2.18.5 Avoidance, Minimization, and/or Mitigation Measures

The project includes the following mitigation, which will reduce the above-described impacts to wetlands and aquatic habitat to a less-than-significant level:

MM-WET-1.1: The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to wetlands and aquatic habitat. For more information on the HCP/NCCP, please see Section 2.17.5.

MM-WET-1.2: If MM-WET-1.1 turns out to be infeasible for some or all of the project, permanent impacts to wetlands and aquatic habitat will be mitigated by the purchase of credits from the Pajaro River Mitigation Bank that services both Santa Clara and San Benito Counties. If credits are no longer available at this bank, and if there are no other approved mitigation banks whose service area includes the project area, then mitigation will occur through on-site or off-site creation of wetland and aquatic habitat at a 2:1 ratio, on an acreage basis. A search for appropriate locations for this mitigation revealed that there are numerous nearby locations where wetlands and aquatic habitat could be created or expanded.

[Note: MM-WET-1.2 will be implemented only if MM-WET-1.1 is determined to be partially or completely infeasible.]

If project-specific wetland creation or restoration is necessary, a restoration ecologist will develop an HMMP for wetlands and other waters. This plan will contain the same types of information described in MM-NATCOM-1.2, but will focus on wetlands and other waters instead of riparian habitat. At a minimum, success criteria will include quantifiable measurements of vegetation type (e.g., dominance by native hydrophytes) and extent appropriate for the restoration location, and provision of ecological functions and values equal to or exceeding

those in the wetlands and other waters that are impacted. At least five years of monitoring shall be conducted to document whether the success criteria are achieved, and to identify any remedial actions that must be taken if the identified success criteria are not met.

MM-WET-1.3: The temporary wetland and aquatic habitat impacts will be mitigated at a 1:1 acreage ratio through the restoration of pre-construction grades, hydrology, and soil conditions at the location of the impact to wetland and aquatic areas temporarily disturbed during construction. Wetland vegetation, structure, and function are expected to regenerate naturally following the restoration of grades, hydrology, and soils. To ensure that restoration of temporarily impacted areas is successful, a restoration plan will be developed for temporarily impacted wetlands and aquatic habitats. This plan will include a discussion or depiction of grading to restore wetland hydrology; soil amendments; planting/seeding or justification regarding why planting or seeding is unnecessary (e.g., in the event that a wetland vegetation seed source is present in immediately adjacent areas); monitoring; and success criteria, as necessary.

2.19 PLANT SPECIES

2.19.1 Regulatory Setting

The U.S. Fish and Wildlife Service (USFWS) and the CDFW share regulatory responsibility for the protection of special-status plant species. "Special-status" species are selected for protection because they are rare and/or subject to population and habitat declines. Special status is a general term for species that are afforded varying levels of regulatory protection. The highest level of protection is given to threatened and endangered species; these are species that are formally listed or proposed for listing as endangered or threatened under the Federal Endangered Species Act (FESA) and/or the California Endangered Species Act (CESA). Please see Section 2.21, *Threatened and Endangered Species*, for detailed information regarding these species.

This section of the document discusses all the other special-status plant species, including CDFW fully protected species and species of special concern, USFWS candidate species, and non-listed California Native Plant Society (CNPS) rare and endangered plants.

The regulatory requirements for FESA can be found at United States Code 16 (USC), Section 1531, et seq. See also 50 CFR Part 402. The regulatory requirements for CESA can be found at California Fish and Game Code, Section 2050, et seq. Caltrans projects are also subject to the Native Plant Protection Act, found at Fish and Game Code, Section 1900-1913, and CEQA, Public Resources Code, Sections 2100-21177.

2.19.2 Affected Environment

An initial list of 32 special-status plants were identified as occurring (either currently or historically) within the general area in a wide variety of different habitat types (defined by the Chittenden United States Geological Survey [USGS] quadrangle map in which the project occurs, the eight adjacent quadrangle maps, and the Santa Clara County/San Benito County search area).⁴⁶ Of the 32 species, 23 were dismissed outright due to a total lack of habitat (such as serpentine soils, alkaline soils, etc.) for these species within the project's BSA. The remaining 9 species were further considered for their occurrence because suitable habitat was observed within the BSA or because the database noted an historical occurrence of the species within the BSA. Table 35 lists these species, as well as the results of the additional study that was undertaken to determine their presence or absence within the BSA. For all 9 species, the additional study included protocol-level, blooming period surveys during 2007 and 2008 by a botanist. Informal surveys were also conducted during numerous site visits.

As summarized in Table 35, none of the nine special-status plant species was detected during multiple focused surveys conducted during the appropriate blooming period for each plant. These special-status plant species are therefore considered absent from the BSA and further surveys are not warranted.

2.19.3 Environmental Consequences of the Build Alternative

Since no special-status plant species are present within the project area, the project will not impact any special-status plant species.

Impact PLNT-1: The project will not impact any special-status plant species. [No Impact]

2.19.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. There would be no modification to existing facilities or to the existing environment. There would, therefore, be no impacts to any special status plant species.

2.19.5 Avoidance, Minimization, and/or Mitigation Measures

No avoidance, minimization, or mitigation measures are required.

⁴⁶This excludes those plant species listed under the Federal Endangered Species Act and/or the California Endangered Species Act, as those species are discussed separately in Section 2.21, *Threatened and Endangered Species*.

TABLE 35

ASSESSMENT OF SPECIAL-STATUS PLANT SPECIES FOR THEIR POTENTIAL TO OCCUR WITHIN THE PROJECT'S BIOLOGICAL STUDY AREA

Species	Habitat	Conclusion	Rationale
Bent-flowered fiddleneck (<i>Amsinckia lunaris</i>)	Coastal bluff scrub, cismontane woodland, valley and foothill grassland. CNDDDB records document a single occurrence for this species in the adjacent USGS Laurel Quadrangle at Polo Ranch in Scotts Valley.	habitat present; species absent	Although low-quality valley and foothill grassland habitat and limited oak woodland habitat occurs within the BSA, due to degraded site conditions, this species is unlikely to occur within the BSA. Plant was not detected during surveys conducted during the March - June blooming period.
Big-scale balsamroot (<i>Balsamorhiza macrolepis</i> var. <i>macrolepis</i>)	Chaparral, cismontane woodland, valley and foothill grassland (sometimes on serpentine). No CNDDDB records occur in the vicinity of the BSA for this species.	habitat present; species absent	Low-quality valley and foothill grassland habitat and limited oak woodland habitat occur within the BSA. However, this habitat is of poor quality and this species is unlikely to occur within the BSA. Plant was not detected during surveys conducted during the March - June blooming period.
Round-leaved filaree (<i>California macrophyllum</i>)	Cismontane woodland, Valley and foothill grassland (clay). CNDDDB records document a single occurrence for this species in the adjacent USGS Hollister Quadrangle near San Justo Reservoir.	habitat present; species absent	Low-quality valley and foothill grassland habitat and limited oak woodland habitat occur within the BSA. However, this habitat is of poor quality and this species is unlikely to occur within the BSA. Plant was not detected during surveys conducted during the March - May blooming period.
Fragrant fritillary (<i>Fritillaria liliacea</i>)	Valley and foothill grassland, coastal scrub, coastal prairie (often on serpentine). CNDDDB records document a single occurrence for this species in the adjacent USGS Prunedale Quadrangle one mile south of the City of Aromas.	habitat present; species absent	Low-quality valley and foothill grassland habitat and limited oak woodland habitat occur within the BSA. However, this habitat is of poor quality and this species is unlikely to occur within the BSA. In addition, no serpentine soils occur on-site. This plant was not detected during surveys conducted during the February - April blooming period.
Loma Prieta hoita (<i>Hoita strobilina</i>)	Riparian woodland, cismontane woodland, riparian woodland (serpentine and mesic sites). CNDDDB records document a single occurrence for this species in the BSA Chittenden Quadrangle), and two occurrences in the adjacent Gilroy & Loma Prieta quadrangles.	habitat present; species absent	High-quality riparian forest habitat and limited oak woodland habitat occur within the BSA. However, this species was not detected during surveys conducted in the May - October blooming period.

TABLE 35 [continued]

Species	Habitat	Conclusion	Rationale
Santa Cruz tarplant (<i>Holocarpha macradenia</i>)	Valley and foothill grassland, coastal prairie (sandy soil or sandy clay). CNDDDB records document numerous occurrences for this species in the adjacent USGS Watsonville East, Prunedale, Felton & Laurel quadrangles. The nearest occurrence to the BSA is near the Santa Cruz County Fairgrounds.	habitat present; species absent	Low-quality valley and foothill grassland habitat and limited oak woodland habitat occur within the BSA. This plant was not detected during surveys conducted in the June - October blooming period.
Hooked popcorn-flower (<i>Plagiobothrys uncinatus</i>)	Chaparral, cismontane woodland, valley and foothill grassland. There are no CNDDDB records of occurrences for this species in the vicinity of the BSA.	habitat present; species absent	Low-quality valley and foothill grassland habitat and limited oak woodland habitat occur within the BSA. However, this habitat is of poor quality and this species is unlikely to occur within the BSA. This species was not detected during surveys conducted in the April - May blooming period.
Saline clover (<i>Trifolium depaupertatum</i> var. <i>hydrophilium</i>)	Marshes and swamps, valley and foothill grassland, vernal pools (mesic and alkaline sites). CNDDDB records document two occurrences for this species in the Chittenden Quadrangle, between Millers Canal and the Pajaro River near the San Benito/Santa Clara County line and at Soda Lake just north of SR 129 in Santa Cruz County.	habitat present; species absent	Low-quality valley and foothill grassland habitat occur within the BSA. However, this habitat is of poor quality and this species is unlikely to occur within the BSA. This species was not detected during surveys conducted in the April - June blooming period and alkaline soils do not occur on-site.
Showy madia (<i>Madia radiata</i>)	Cismontane woodland, Valley and foothill grassland. No CNDDDB records occur in the vicinity of the BSA for this species.	habitat present; species absent	Low-quality valley and foothill grassland habitat and limited oak woodland habitat occur within the BSA. However, this habitat is of poor quality and this species is unlikely to occur within the BSA. This species was not detected during surveys conducted during the March - May blooming period.
<p>CNDDDB = California Natural Diversity Data Base</p> <p>USGS = United States Geological Survey</p> <p>Source: Natural Environment Study for the U.S. 101 Improvement Project, 2011.</p>			

2.20 ANIMAL SPECIES

2.20.1 Regulatory Setting

Many state and federal laws regulate impacts to wildlife. The USFWS, NOAA Fisheries and the CDFW 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 Acts. Species listed or proposed for listing as threatened or endangered are discussed below in Section 2.21, *Threatened and Endangered Species*. All other special-status animal species are also discussed here, including CDFW fully protected species and species of special concern, and USFWS or NOAA 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
- Section 4150 and 4152 of the Fish and Game Code

2.20.2 Affected Environment

An initial list of 28 special-status animals (other than state or federally threatened or endangered species) were identified as occurring (either currently or historically) within the general project area in a wide variety of different habitat types (defined by the Chittenden USGS quadrangle map in which the project occurs, the eight adjacent quadrangle maps, and the Santa Clara County/San Benito County search area).⁴⁷ Of the 28 species, 8 were dismissed outright due to a lack of habitat for these species within the project's BSA and/or because the BSA is outside of the range of the species. The remaining 20 species were further considered for their occurrence because suitable habitat is present within the BSA or because the database noted an historical occurrence of the species within or in the vicinity of the BSA. Table 36 lists these species, as well as the results of the additional study that was undertaken to determine their presence or absence within the BSA.

As summarized in Table 36, of the 20 special-status species (other than state or federally threatened or endangered species) evaluated in greater detail, 9 are present within the BSA. These consist of two species of fish (Pacific lamprey and Monterey roach), four species of birds (white-tailed kite, northern harrier, yellow warbler, and yellow-breasted chat), and three species of mammals (pallid bat, San

⁴⁷This excludes those animal species listed under FESA and/or CESA, as those species are discussed separately in Section 2.21, *Threatened and Endangered Species*.

TABLE 36

ASSESSMENT OF SPECIAL-STATUS ANIMAL SPECIES (OTHER THAN STATE OR FEDERALLY THREATENED OR ENDANGERED SPECIES) FOR THEIR POTENTIAL TO OCCUR WITHIN THE PROJECT'S BIOLOGICAL STUDY AREA

Species	Habitat	Conclusion	Rationale
Pacific lamprey (<i>Lampetra tridentate</i>)	Coastal streams and rivers	species present	Known to occur in the Pajaro River and in Carnadero Creek. May occur in other creeks within the BSA.
Monterey roach (<i>Lavinia symmetricus subditus</i>)	Fairly warm streams and rivers flowing into Monterey Bay	species present	Known to occur in the Pajaro River and likely also present in its tributaries, such as Tar, Carnadero, & San Juan Creeks and the San Benito River.
Western spadefoot toad (<i>Spea hammondi</i>)	Breeds in temporary rain pools; spends much of life in burrows or cracks in hard soil.	habitat present; species not observed but could potentially be present	No records from project vicinity (e.g., unrecorded in Santa Clara County or the Pajaro River floodplain); project site is likely outside of species' range. Closest CNDDDB record is approximately 10 miles to the southeast. However, habitat exists in moist areas in the grasslands in the Lomerias Muertas, and possibly in other temporary pools in the BSA.
Western pond turtle (<i>Actinemys marmorata</i>)	Creeks, ponds and other aquatic habitat. Needs upland heavy soils to breed.	habitat present; species not observed but presumed to be present	Suitable aquatic habitat is present in the BSA in the Pajaro & San Benito Rivers, and in Tar & Carnadero Creeks. However, this species was not observed in ostensibly high-quality habitat during numerous surveys. Likely present in these streams in low numbers, possibly nesting in surrounding open upland habitats.
White-tailed kite (<i>Elanus leucurus</i>)	Nests in tall shrubs and trees, forages in grasslands, marshes, and ruderal habitats.	species present	Grasslands and agricultural edges in and adjacent to the BSA provide suitable foraging habitat, and numerous trees within the BSA provide suitable nesting habitat.
Northern harrier (<i>Circus cyaneus</i>)	Nests in extensive marshes and wet fields, forages in marshes, grasslands, and ruderal habitats.	species present	No suitable breeding habitat within the BSA, but may breed in the large marsh immediately west of the BSA south of Tar Creek. Occasionally forages in open habitats adjacent to and within the project alignment, especially during migration and winter, but considered "special status" only when breeding.

TABLE 36 [continued]

Species	Habitat	Conclusion	Rationale
Golden eagle (<i>Aquila chrysaetos</i>)	Nests in tall trees or on cliffs, forages in grasslands and other open habitats.	habitat present; species not observed but could occasionally forage	Expected to forage in grasslands on and near the BSA. No nesting habitat on or near site.
Western burrowing owl (<i>Athene cunicularia</i>)	Grasslands and ruderal habitats where ground squirrel burrows or other burrows are present.	habitat present; species not observed but could be present	Not observed during the 2007 breeding season protocol-level survey that covered most of the BSA. Known to breed nearby at Bluestone Quarry. Habitat is present in the BSA, and areas with highest potential for occurrence (e.g., extensive grasslands south of Castro Valley Road) were not included in the protocol-level survey. Could breed or roost in grasslands and at the edges of agricultural fields within the BSA.
Long-eared owl (<i>Asio otus</i>)	Nests in dense woodland, including riparian woodland, forages in open habitats	habitat present; species not observed; may occur as a rare nonbreeding visitor	Riparian habitat along creeks provides potential nesting habitat, but this species has not been recorded breeding (and has rarely been recorded at all) in valley-floor areas in the project vicinity; likely absent, or at best occurs as an infrequent forager during the non-breeding season.
Loggerhead shrike (<i>Lanius ludovicianus</i>)	Nests in tall shrubs and dense trees, forages in grasslands, marshes, and ruderal habitats.	habitat present; species not observed; may nest or forage in BSA	Though not observed during project surveys, shrubs and trees in open habitats provide suitable nesting sites, and ruderal habitats and grasslands in the BSA provide foraging habitat. May occur in low numbers.
Yellow warbler (<i>Dendroica petechia</i>)	Nests in dense stands of willow and other riparian habitat.	species present	Nests and forages in willow- and sycamore-dominated riparian habitat in the BSA along the Pajaro River, San Benito River, Tar Creek, and Carnadero Creek.
Yellow-breasted chat (<i>Icteria virens</i>)	Nests in dense stands of willow and other riparian habitat.	species present	A single singing male was recorded in willow-dominated riparian habitat along the San Benito River during least Bell's vireo protocol-level surveys. Expected to nest in such habitats in low numbers.

TABLE 36 [continued]

Species	Habitat	Conclusion	Rationale
Bryant's savannah sparrow (<i>Passerculus sandwichensis alaudinus</i>)	Breeds and forages in meadows, fallow fields, pastures, and salt marshes.	habitat present; species not observed but could nest within BSA.	Nests in extensive grassland adjacent to the BSA to the west of U.S. 101 and in the Lomerias Muertas to the east. Unlikely to nest in the BSA due to proximity to disturbance and other habitats, but breeding could occur in the more extensive grassland in the BSA south of Castro Valley Road, and birds breeding outside the BSA elsewhere could forage on-site during the breeding season and during other seasons.
Grasshopper sparrow (<i>Ammodramus savannarum</i>)	Breeds and forages in meadows, fallow fields, and pastures.	habitat present; species not observed but could nest within BSA.	Nests in extensive grassland adjacent to the BSA to the west of U.S. 101 and in the Lomerias Muertas to the east. Unlikely to nest in the BSA due to proximity to disturbance and other habitats, but breeding could occur in the more extensive grassland in the BSA south of Castro Valley Road, and birds breeding outside the BSA elsewhere could forage on-site during the breeding season and during other seasons.
Tricolored blackbird (<i>Agelaius tricolor</i>)	Nests colonially in cattails or other emergent vegetation around freshwater ponds. Considered "special-status" only when breeding.	foraging habitat present; species not observed but could forage within BSA.	Emergent wetlands within the BSA are not extensive enough to support a colony of this species, though birds breeding in adjacent areas, and non-breeding birds, may forage in agricultural, ruderal, and grassland habitats in the BSA. A marsh south of Tar Creek and west of the BSA provides potential breeding habitat.
Western red bat (<i>Lasiurus blossevillii</i>)	This species is often found in forest or woodlands, especially in or adjacent to riparian habitat.	foraging habitat present; species not observed but could forage within BSA.	Likely present within riparian areas of the BSA during migration and winter months, but the habitats on-site are not suitable for breeding, as species is not known to breed in the greater Bay Area and they prefer wide, relatively pristine riparian areas for breeding.
Pallid bat (<i>Antrozous pallidus</i>)	Forages over many habitats; roosts in buildings, large oaks or redwoods, rocky outcrops and rocky crevices in mines and caves.	species present	Evidence of night roosting activity under the NB 101 span of the San Benito River Bridge was found during spring 2007 surveys. Cavities in larger trees in the BSA provide potential day-roosting habitat. Could roost and breed on-site.

TABLE 36 [continued]

Species	Habitat	Conclusion	Rationale
San Francisco dusky-footed woodrat (<i>Neotoma fuscipes annectens</i>)	Builds large stick nests in a variety of habitats, including riparian areas, oak woodlands, and scrub.	species present	Numerous nests found in the BSA during reconnaissance-level surveys in areas with oak trees, coyote brush scrub, or riparian habitat.
Ringtail (<i>Bassariscus astutus</i>)	Occurs in riparian and heavily wooded habitats near water, and on rocky talus slopes,	habitat present; species not observed but could occur in BSA.	No records of occurrence in project area or in adjacent quadrangles. Could potentially occur in riparian habitats along the streams that cross the BSA.
American badger (<i>Taxidea taxus</i>)	Establishes burrows in open grasslands.	species present	Recorded in a culvert east of U.S. 101 south of the Y/Betabel interchange, and three road-kills were recorded along the project segment of U.S. 101 during project surveys. Grasslands and edges of agricultural habitats provide suitable habitat, though no dens appearing to be of this species were observed during surveys. Could occur virtually throughout the BSA, though the broader expanses of intensively cultivated agricultural lands east of U.S. 101 and north of the Pajaro River and developed habitats provide only marginal dispersal habitat for this species.
CNDDB = California Natural Diversity Data Base			
Source: Natural Environment Study for the U.S. 101 Improvement Project, 2011.			

Francisco dusky-footed woodrat, and American badger). While the remaining 11 species were not observed within the BSA during numerous biological surveys, they could occur within the BSA due to the presence of suitable breeding and/or foraging habitat.

Nesting Birds

The Migratory Bird Treaty Act and California Fish and Game Code protect migratory birds, including their eggs, nests, and young. The killing or harassment of such birds, including activities that may result in the abandonment of active nests during the nesting season (generally February 15 through September 1), is prohibited. Numerous species of birds protected by these laws nest within the project area. Black phoebes, cliff swallows, and barn swallows nest under several of the bridges and in several culverts within the BSA. In addition, various other species nest in trees and shrubs, and on the ground, within the BSA.

Roosting Bats

Focused surveys for roosting bats were conducted on six occasions from April to July 2007. Each bridge within the BSA was evaluated for its potential for bat habitat and visually surveyed for the presence of bats and/or signs of bats. Bridges with potential for night and/or day roosting were also surveyed acoustically with the use of Anabat and Z-Caim recorders, which are devices used to detect vocalizing bats.

Only three of the 10 bridges surveyed had bat use or potential roosting habitat for bats. Pallid bat guano was found under the U.S. 101 northbound span over the San Benito River during the summer 2007 surveys. This location is used as a night roost, and no evidence of day-roosting by pallid bats was observed. Additionally, two other bridges, the U.S. 101 southbound span over Tar Creek and U.S. 101 northbound span over Carnadero Creek, were confirmed night roost habitat based on the presence of night-roosting non-special-status bats during an evening survey. Pallid bats could also use these two bridges for roosting habitat.

The Yuma bat forages over permanent streams, such as Carnadero and Tar Creeks in the BSA. Night roosts of Yuma myotis were observed on all three bridges on the site that had evidence of bat use (i.e., U.S. 101 southbound span over Tar Creek, the U.S. 101 northbound span over Carnadero Creek, and the U.S. 101 northbound span over the San Benito River). Because several Yuma myotis were observed entering and leaving mud nests from an active cliff swallow colony within about an hour after sunset, this species likely day roosts and night roosts at the southbound U.S. 101 bridge over Tar Creek and the UPRR. Based on the low numbers of bats observed leaving and entering these nests, the roosts were likely occupied by males (and not breeding females). These bats were not day-roosting under the Carnadero Creek bridge, and thus their maternity colony is likely located in an off-site structure or in a tree.

2.20.3 Environmental Consequences of the Build Alternative

This section of the EIR describes the impact of the project on the 20 special-status animal species that are known to be present, or could be present, within the BSA. For some of these species, impacts are discussed separately, while impacts to other species are grouped into one discussion due to the similarity of habitat, impacts, and (if warranted) mitigation.

2.20.3.1 *Impacts to Pacific Lamprey and Monterey Roach*

Project-related impacts to aquatic habitats have been avoided to the maximum extent feasible. The bridge improvements have been designed so that no new piers or structures will be placed in the low-flow channel of any waterway supporting the Monterey roach and Pacific lamprey, although in Carnadero Creek, existing piers will be extended upstream to support the new span.

The detention basin proposed adjacent to the San Benito River just upstream from U.S. 101 is being designed to minimize the risk of fish entrapment. The entire basin will be graded so that it drains completely through an outlet to the river, with no depressional areas that would support long-term ponding. The outlet will be elevated above the ordinary flow of the river. Therefore the pipe's outlet would not be accessible to fish except during very high flows, when water would be flowing out of the pipe, thus limiting the ability of fish to enter the basin. Fish would only be able to enter the basin during flood flows and would be expected to exit the basin as water levels drop. They will thus spend little time within the basin and there is little chance of entrapment when retained water recedes.

Removal of riparian vegetation by the project will adversely affect fish because it provides cover for fish, shade to reduce water temperatures, and food input (i.e., terrestrial invertebrates), and is considered a very valuable component of fish habitat.

The removal of approximately 890 linear feet of SRA habitat at the Pajaro River, San Benito River, and Carnadero Creek may reduce habitat quality within and downstream from affected stream reaches due to slightly increased water temperatures and reduction in inputs of organic matter and coarse woody debris, thus affecting the aquatic food chain and aquatic habitat structure, respectively. However, shading from widened bridge structures will offset impacts to water temperatures somewhat, and given the sizes of the watersheds contributing to the stream reaches in the BSA, the small-scale, localized effects of reduction in SRA habitat are expected to be minimal.

Approximately 0.02 acres of aquatic habitat in Carnadero Creek will be lost due to the extension of existing piers upstream to support the new U.S. 101 bridge span. This impact will result in the loss of a small amount of aquatic habitat for the Pacific lamprey and Monterey roach. On the scale of the Pajaro River watershed, or even on the scale of Carnadero Creek itself, such impacts will have minimal effects on these species. These structures will not impede fish movement, and no individuals are expected to be impacted due to the minor loss of foraging opportunities associated with the new structures.

There is some potential for Pacific lampreys or Monterey roach to be killed or injured during construction of cofferdams used to dewater reaches of creek where work will occur (if these reaches contain water during the construction period). Construction activities adjacent to waterways could disturb soils and cause sediment to be transported into and through the channel, which would result in temporary increases in turbidity and sedimentation downstream of construction sites. In addition, fuel, concrete, and other contaminants could spill into the waterway during construction.

Pacific lampreys or Monterey roach may suffer higher predation rates swimming through bypass channels constructed around cofferdams. The fish could also be adversely impacted by noise and vibrations related to pile driving during installation of bridge supports. Noise and vibration from pile driving, jack-hammering, or other percussive activities could cause the mortality of individual fish or could cause sensory damage. The loss of hearing sensitivity may adversely affect the ability of the fish to orient themselves, detect predators, locate prey, or sense their acoustic environment. Fish also may exhibit noise-induced avoidance behavior that causes them to move into less suitable habitat.

Impact ANIMAL-1: The project will result in both short- and long-term adverse impacts to Pacific lampreys and Monterey roach. [**Less-than-Significant with Mitigation Listed in Section 2.20.5**]

2.20.3.2 *Impacts to Western Spadefoot Toad*

The western spadefoot toad is not expected to occur in the Santa Clara County portion of the BSA. As a result, impacts to ponds and seasonal wetlands in the Santa Clara County portion of the BSA will not affect this species. There is a low potential for the western spadefoot to occur in the San Benito County portion of the BSA, and even if it does occur there, the project will not impact any potential western spadefoot breeding habitat in the San Benito County part of the project. Some upland habitat for the species could be impacted along the eastern side of the BSA in the vicinity of the Lomerias Muertas; however, quantification of these habitat impacts is not possible given the uncertainty regarding where the species occurs, if it occurs in the project area at all.

To summarize, there is a very low potential for impacts to western spadefoot toads, and if impacts do occur, they will affect only a small amount of habitat (and small number of individuals). As a result, project impacts to this species will not be substantial.

Impact ANIMAL-2: The project's effect on the western spadefoot toad will not be substantial. [**Less-than-Significant Impact**]

2.20.3.3 *Impacts to Western Pond Turtle*

Although no western pond turtles were observed during surveys that were undertaken during the preparation of this EIR, this species is expected to occur within the BSA in very low numbers in the Pajaro River, San Benito River, San Juan Creek, Tar Creek, Carnadero Creek, and possibly Tick Creek. As a result, construction-related activities at these locations could result in harm to individual turtles if they are trampled by personnel or equipment.

The project's impact to the wetland and aquatic habitat that is utilized by the western pond turtle will not constitute a substantial loss of this species' habitat. In any event, as described in Section 2.18.5, the project's impacts to wetland and aquatic habitat will be mitigated.

Impact ANIMAL-3: Construction activities could result in harm to individual western pond turtles. [**Less-than-Significant with Mitigation Listed in Section 2.20.5**]

2.20.3.4 *Impacts to Non-Breeding Special-Status Bird Species*

Impacts to the golden eagle and long-eared owl are grouped together because 1) they are not expected to nest in the project vicinity, and 2) they will be minimally affected by the project.

A very small amount of potential foraging habitat for the golden eagle and long-eared owl will be lost due to grading and paving associated with the project. In addition, small numbers of individuals of these species may be disturbed during construction by construction personnel, heavy equipment, and noise, and such individuals may avoid foraging in the BSA during construction as a result. However, the BSA does not provide important foraging habitat used regularly or by large numbers of individuals of either of these species, and the project will have no long-term or large-scale effects on populations of these species. In addition, riparian, wetland, aquatic, and oak woodland habitats impacted by this project will be mitigated by the provision of such habitat elsewhere (see Sections 2.17.5 and 2.18.5). Such mitigation habitat will provide foraging habitat for these bird species.

Impact ANIMAL-4: The project's effect on the golden eagle and the long-eared owl will not be substantial. **[Less-than-Significant Impact]**

2.20.3.5 *Impacts to Breeding Special-Status Bird Species of Limited Occurrence*

Impacts to the following seven special-status bird species are grouped together because they are expected to nest in or adjacent to the BSA, but in numbers so low that the proposed project will have a limited impact on regional populations: white-tailed kite, northern harrier, loggerhead shrike, yellow warbler, yellow-breasted chat, Bryant's savannah sparrow, and grasshopper sparrow.

A relatively small amount of potential nesting and foraging habitat for these seven species will be lost due to the project, and small numbers of foraging individuals of these species may be disturbed during construction. However, riparian, wetland, aquatic, and oak woodland habitats impacted by this project will be mitigated by the provision of such habitat elsewhere (see Sections 2.17.5 and 2.18.5). Such mitigation habitat will provide nesting and foraging habitat for these bird species.

Impacts to individual birds that could be nesting in trees that will be removed during construction, or trees immediately adjacent to the construction zone, are described in Section 2.20.3.12, *Impacts to Nesting Birds*.

Impact ANIMAL-5: The project's effect on seven special-status bird species that could nest in the project impact area will not be substantial. **[Less-than-Significant Impact]**

2.20.3.6 *Impacts to the Western Burrowing Owl*

Protocol-level surveys for the burrowing owl were conducted in 2007 for a portion of the BSA. Although no owls were found during the surveys, owls are known to be present in the vicinity of the BSA. Further, the portion of the BSA that was not accessible for the 2007 surveys contains burrowing owl habitat. Therefore, owls could be present within the project area at the time of construction.

If western burrowing owls occupy the project site prior to construction, the project will result in a loss of nesting and/or roosting habitat; such impacts could be substantial given the low size of the burrowing

owl population in southern Santa Clara County and northern San Benito County. Construction activities could also harm individual owls if they are nesting within the project's impact area at the time of construction.

Impact ANIMAL-6: The project could result in a loss of burrowing owl habitat and harm to individual owls if the owls are found to occupy the project site prior to construction. [Less-than-Significant with Mitigation Listed in Section 2.20.5]

2.20.3.7 *Impacts to the Tricolored Blackbird*

Habitat located within the BSA is not suitable for breeding by tricolored blackbirds and, therefore, no breeding habitat for this species will be impacted by the project. Although the project will result in the loss of grassland, wetland, and agricultural habitat that could be used by foraging tricolored blackbirds, foraging habitat for this species is regionally abundant. Therefore, project impacts to tricolored blackbird foraging habitat will not result in substantial impacts to this species.

Impact ANIMAL-7: The project's effect on the tricolored blackbird will not be substantial. [Less-than-Significant Impact]

2.20.3.8 *Impacts to the San Francisco Dusky-footed Woodrat*

During biological surveys undertaken for this EIR, suitable woodrat habitat containing woodrat nests was found in most of the oak woodland, riparian, and coyote brush scrub habitats in the BSA, and nests were observed even in isolated oaks. Woodrats are semi-colonial species and often more than one nest was detected in a relatively small area within suitable habitat. Although nests were not counted or mapped, the density and widespread nature of woodrat nests suggests that 100 or more woodrat nests may be present within the BSA.

Construction activities within riparian, oak woodland, and coyote brush habitats will likely result in the destruction of woodrat nests and harm to nesting woodrats.

Construction of the proposed project will also result in the loss of oak woodland, riparian, and coyote brush habitat that is utilized by the woodrat. As shown in Table 34, permanent impacts to these habitats will be up to 12 acres and temporary impacts to these habitats will be up to 15.5 acres. Despite the high number of woodrat nests that will be impacted, and the extent of occupied woodrat habitat that will be lost, these impacts will affect only a very small proportion of the regional population/habitat. Biologists have documented very high densities of woodrats using oak woodland and riparian habitats in the Pajaro River Valley, and this project will not appreciably reduce regional populations of this species.

Impact ANIMAL-8: While the impact of the project on habitat used by the San Francisco dusky-footed woodrat will not be substantial, construction activities are likely to harm

or kill woodrats that nest within the construction zone. [Less-than-Significant with Mitigation Listed in Section 2.20.5]

2.20.3.9 *Impacts to Bats*

As described in Section 2.20.2, the only known bat roosts within the BSA are night roosts on the U.S. 101 northbound span over Carnadero Creek and the U.S. 101 northbound span over the San Benito River, and a day roost for small numbers of Yuma myotis and Mexican free-tailed and/or big brown bats on the U.S. 101 southbound span over Tar Creek. Construction-related disturbance from the project would only temporarily impact these roosts, as the new or modified structures are expected to provide night-roosting habitat of similar quality to that currently present. Bats may continue to use bridges that are not demolished during construction as long as night work involving bright lighting under the bridges is not used. If the bats are displaced (e.g., due to demolition), sufficient alternative night-roosting habitat is present that displacement during construction will not result in substantial loss of individuals from local and regional populations.

If bats are day-roosting in trees or buildings in the BSA (which were not surveyed), the removal of these trees and structures will result in the permanent loss of day-roost habitat and may result in the injury or mortality of individual bats. If bats establish a maternity colony in one of the project's bridges prior to the initiation of construction, project activities could result in the temporary loss of day-roost habitat and may result in the injury or mortality of individual bats.

Impact ANIMAL-9: During the construction phase, the project could adversely affect roosting bats, potentially resulting in temporary loss of day-roost habitat and harm to individual bats. [Less-than-Significant with Mitigation Listed in Section 2.20.5]

2.20.3.10 *Impacts to the Ringtail*

There are no CNDDDB records of the ringtail in the project area and none was observed during wildlife surveys. Ringtails are, however, secretive by nature and not easy to detect. Therefore, since habitat used by the ringtail is present within the BSA, it is possible that ringtails are present.

If present within the project's construction zone, ringtail dens could be destroyed, possibly causing the injury or mortality of ringtails and their young.

Loss of ringtail habitat due to the project will constitute only a very small proportion of the habitat locally available for this species. Therefore, project impacts will not substantially affect local or regional ringtail populations.

Impact ANIMAL-10: While the impact of the project on habitat used by the ringtail will not be substantial, construction activities could harm or kill ringtails if they are found

to be nesting within the construction zone. **[Less-than-Significant with Mitigation Listed in Section 2.20.5]**

2.20.3.11 *Impacts to the American Badger*

The primary effects of the project on American badgers will be a potential increase in road mortality and the potential effects of the project on badger movement across U.S. 101. This impact is discussed in Section 2.17.3.3, *Impacts to Wildlife Movement Corridors*.

Loss of badger habitat due to the project will constitute only a very small proportion of the habitat locally available for this species. Additionally, badger habitat to be impacted by the project is of lower quality than the extensive grasslands adjacent to the BSA. Therefore, project impacts will not substantially affect local or regional American badger populations.

If present within the project's construction zone, badger dens could be destroyed, possibly causing the injury or mortality of badgers and their young. If badgers have to be evicted from their dens, there is some potential that they may be exposed to greater predation risk or greater road mortality while they are seeking out new denning sites, especially if suitable habitat in adjacent areas is already occupied by badgers.

Impact ANIMAL-11: While the impact of the project on habitat used by the badger will not be substantial, construction activities could harm or kill badgers if they are found to be denning within the construction zone. **[Less-than-Significant with Mitigation Listed in Section 2.20.5]**

2.20.3.12 *Impacts to Nesting Birds*

Construction activities could adversely impact birds that nest under the existing bridges, and/or in the trees and shrubs that are within or adjacent to the project impact area. Potential impacts include the destruction of active nests, the incidental loss of fertile eggs or nestlings, or the abandonment of nests.

Impact ANIMAL-12: Construction activities may adversely affect birds that are nesting within or adjacent to the project's construction zone. **[Less-than-Significant with Mitigation Listed in Section 2.20.5]**

2.20.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. There would be no modification to existing facilities or to the existing environment. There would, therefore, be no impacts to any special status animal species.

2.20.5 Avoidance, Minimization, and/or Mitigation Measures

The following measures, which are included in the project, will reduce the project's significant effects on the Pacific lamprey and Monterey roach to a less-than-significant level:

- MM-ANIMAL-1.1:** The project will fully mitigate for impacts to SRA, riparian, and aquatic habitats. This mitigation is described in Sections 2.17.5 and 2.18.5.
- MM-ANIMAL-1.2:** Any construction activities within the low-flow channels of waterways where Pacific lamprey and Monterey roach are known or likely to occur will be limited to the period of June 15 to October 15.
- MM-ANIMAL-1.3:** For waterways where Pacific lamprey and Monterey roach are known or likely to occur, measures will be taken to ensure that movement of fish is not prevented by any water diversion structures used during construction regardless of when construction occurs. Water will be diverted through the construction site by way of an open ditch, enclosed culvert (which further protects fish from pressure waves created during pile driving [see MM-T&E-1.5]), or other method approved by the regulatory agencies.
- MM-ANIMAL-1.4:** The project will implement measures during construction to avoid and minimize the potential degradation of water quality within any waterways where Pacific lamprey and Monterey roach are known or likely to occur. These measures are described in Section 2.22.6.

The following measures, which are included in the project, will reduce the project's significant effects on the western pond turtle to a less-than-significant level:

- MM-ANIMAL-3.1:** A pre-construction survey for the western pond turtle will be conducted within 30 days prior to any site preparation, grading or construction activity at the Pajaro River, San Benito River, San Juan Creek, Tar Creek, Carnadero Creek, and Tick Creek. A single, intensive search for this species will be performed in areas exhibiting even marginally suitable habitat, covering the area of potential impact at each creek crossing and extending at least 500 feet beyond the area of potential impact both upstream and downstream. If this species is found within the surveyed area, the CDFW will be notified of such occurrence and, if possible, and without injury, individuals will be captured and moved to a safe location by a qualified biologist, at least 500 feet away from the area of potential impact.
- MM-ANIMAL-3.2:** If individuals and/or suitable habitat are located within 500 feet of the area of potential impact at a creek crossing, monitoring will be performed during the

process of clearing vegetation within the construction zone, to ensure that any western pond turtles that may be present will be safely relocated. The biologist conducting such monitoring, if necessary, will have the authority to halt operations in the immediate area to avoid harming turtles, if present, until individuals are safely captured and relocated. The CDFW will be notified of such occurrence.

MM-ANIMAL-3.3: During pre-construction surveys and other measures to be implemented for California red-legged frogs and California tiger salamanders (see Section 2.21.5), a qualified biologist will look for western pond turtles within the project's impact areas. If any pond turtles are detected during these surveys, or during construction, in an area where the individuals could be impacted, they will be relocated to a suitable location outside the area of project impact in consultation with the CDFW.

The following measures, which are included in the project, will reduce the project's significant effects on the western burrowing owl to a less-than-significant level:

MM-ANIMAL-6.1: Pre-construction surveys will be undertaken to determine if owls utilize the habitat to be impacted by the project.

MM-ANIMAL-6.2: Prior to construction, during the non-nesting season (September 2 - February 14), any owls occupying burrows within construction zones will be passively relocated under the authorization of the CDFW. Passive relocation is an intensive process that involves the installation of one-way doors in all ground squirrel burrows occurring on the site; such doors allow owls to leave their burrows but do not allow them to return, thereby forcing owls to move to a different area. The doors will be monitored by a qualified biologist daily for a period of no less than three days and after that period, burrows will be destroyed to preclude owls from returning to the burrows, and grading of these areas will commence within seven days. The passive relocation will be repeated if owls move back to the construction areas.

MM-ANIMAL-6.3: Burrows within the construction zone that are occupied by owls will not be disturbed during the nesting season (February 15 through September 1) unless a qualified biologist verifies that either the owls have not begun laying and incubating eggs, or that juvenile owls have fledged and are able to live independently of their parents. If construction will occur during the nesting season, the project will establish and maintain a minimum of a 250-foot buffer around any active nest.

MM-ANIMAL-6.4: If, based on pre-construction surveys, it is determined that owls utilize habitat that will be impacted by the project, mitigation for the loss of such habitat will take the form of the payment of development fees to the Santa Clara Valley HCP/NCCP. For more information on the HCP/NCCP, please see Section 2.17.5.

MM-ANIMAL-6.5: If MM-ANIMAL-6.4 turns out to be infeasible for some or all of the project, mitigation will consist of the purchase of credits from a mitigation bank that serves the project area. If no banks or credits are available, then the project will develop and implement a plan for the creation or enhancement of burrows, maintenance of burrows and management of foraging habitat, monitoring procedures, funding assurance, annual reporting requirements, and contingency and remediation measures. The extent of the mitigation lands (either for the purchase of mitigation credits or for project-sponsored mitigation), enhancement measures, and other details will be determined based on the circumstances surrounding the owls to be impacted and their habitat, in consultation with the CDFW. Mitigation would be provided at a ratio of 6.5 acres of burrowing owl habitat per pair or unpaired owl that will be impacted by the project.

[Note: MM-ANIMAL-6.5 will be implemented only if MM-ANIMAL-6.4 is determined to be partially or completely infeasible.]

If project-sponsored burrowing owl mitigation is necessary, a wildlife ecologist will develop an HMMP for burrowing owls, in consultation with the CDFW, which will contain the following components:

1. Summary of habitat impacts and proposed mitigation ratios.
2. Goal of the habitat mitigation.
3. Location of mitigation site(s) and description of existing site conditions.
4. Mitigation design:
 - Habitat enhancement measures
 - Remedial measures/adaptive management, etc.
5. Monitoring plan (including performance and final success criteria, monitoring methods, data analysis, reporting requirements, monitoring schedule, etc.). At a minimum, success criteria will include the presence of burrowing owls, suitable burrows for owls, and quantitative measures of vegetation characteristics for suitable owl habitat.
6. Contingency plan for mitigation elements that do not meet performance or final success criteria.

At least five years of monitoring shall be conducted to document whether the success criteria are achieved, and to identify any remedial actions that must be taken if the identified success criteria are not met.

The following measures, which are included in the project, will reduce the project's significant effects on the San Francisco dusky-footed woodrat to a less-than-significant level:

MM-ANIMAL-8.1: Prior to any clearing of - or work within - riparian, oak woodland, or coyote brush scrub habitat, or the removal of any oak trees located outside these habitats, a qualified biologist will conduct a survey for San Francisco dusky-footed woodrat nests.

MM-ANIMAL-8.2: Where nests are found, and if feasible, the project will maintain a buffer of at least several feet (preferably as much as 10 feet) around these nests. The purpose of the buffer is to avoid moving or bumping the nests or logs or branches on which the nests rest.

If avoidance of nests is not feasible, the nests will be dismantled and the nesting material moved to a new location outside the project's impact area. Prior to dismantling, understory vegetation will be cleared within the project site or in the area immediately surrounding the nest. Then, each active nest will be disturbed by a qualified wildlife biologist to the degree that the woodrats leave the nest and seek refuge out of the impact area. Whether the nest is on the ground or in a tree, the nest would be nudged to cause the woodrats to flee, and then dismantled. For tree nests, a tarp will be placed below the nest and the nest dismantled using hand tools (either from the ground or from a lift).

Nesting material will be located outside the project's impact area in a way that it can be used by woodrats to construct new nests. The nest material will be piled at the base of a nearby hardwood tree (preferably an oak, willow, or other appropriate tree species, with refuge sites among the tree roots). If nearby habitat outside the impact area lacks suitable structure, logs (e.g., 4 feet long and 6 inches in diameter) will be placed in undisturbed riparian or oak woodland habitat nearby and the sticks from the dismantled nests will be placed among these logs. Ideally, the spacing distance between the newly placed piles of sticks should not be less than 100 feet, unless a qualified wildlife biologist has determined that a specific habitat can support higher densities of nests.

The following measures, which are included in the project, will reduce the project's significant effects on roosting bats to a less-than-significant level:

MM-ANIMAL-9.1: A pre-construction/pre-demolition survey for roosting bats will be conducted prior to any construction on the U.S. 101 southbound span over Tar Creek, which is the only bridge with day roosting by bats. Such a survey will also be conducted in any trees and buildings within or immediately adjacent to the project impact area that are identified by a qualified bat biologist (i.e., a

biologist holding a CDFW collection permit allowing the biologist to handle and collect bats) as being high-potential roost sites. If suitable roost sites are found but a visual survey is not adequate to determine presence or absence of bats, acoustical equipment will be used to determine occupancy. This survey will be conducted prior to the beginning of the breeding season (i.e., prior to March 1) in the year in which construction or demolition in a given area is scheduled to occur so that adequate measures can be implemented, if feasible, to evict the bats during the non-breeding season.

MM-ANIMAL-9.2: Because the aforementioned survey will be conducted prior to the breeding season, several months may pass between that survey and the initiation of construction or demolition in a given area. Therefore, a second preconstruction/pre-demolition survey for roosting bats, following the methods described above, will be conducted within 15 days prior to the commencement of these activities in a given area to determine whether bats have occupied a roost in or near the project's impact areas. This survey should be facilitated considerably by information (e.g., on potential roost trees) gathered during the previous survey.

MM-ANIMAL-9.3: If a maternity roost of any bat species is present, the bat biologist will determine the extent of a construction-free buffer around the active roost that will be maintained. This buffer ~~would~~ will be maintained from April 1 until the young are flying, typically after August 31.

MM-ANIMAL-9.4: If a day roost is found on a bridge, in a building, or in a tree that is to be completely removed or replaced, individual bats will be safely evicted under the direction of a qualified bat biologist. Eviction of bats will occur at night, so that bats will have less potential for predation compared to daytime roost abandonment. Eviction will occur between September 1st and March 31st, outside the maternity season, but will not occur during long periods of inclement or cold weather (as determined by the bat biologist) when prey are not available or bats are in torpor. No day roosts are currently known to occur in crevices on bridges in the BSA, but if such a roost is found during preconstruction surveys, one-way doors will be inserted into the crevices to allow bats to exit, but not re-enter, the crevices. These one-way doors will be inspected regularly until demolition commences, and will be removed the morning of demolition.

If a day roost is found within a building, eviction will occur by opening the roosting area to allow airflow through the cavity. Demolition should then follow no sooner than the following day (i.e., there should be no less than one night between initial disturbance for airflow and the demolition). This action should allow bats to leave during dark hours, thus increasing their chance of finding new roosts with a minimum of potential predation during daylight.

If feasible, one-way doors will also be used to evict bats from tree roosts. If use of a one-way door is not feasible, or the exact location of the roost entrance in a tree is not known, the trees with roosts that need to be removed should first be disturbed by removal of some of the trees' limbs not containing the bats. Such disturbance will occur at dusk to allow bats to escape during the darker hours. These trees would then be removed the following day. All of these activities will be performed under the supervision of the bat biologist.

MM-ANIMAL-9.5: If a day roost will be impacted, an alternative bat roost structure will be provided. The design and placement of this structure will be determined by a bat biologist, in consultation with the CDFW, based on the species of bat to be displaced, the location of the original roost, and the habitat conditions in the vicinity. The roost structure will be built to specifications as determined by a bat biologist and CDFW, or it may be purchased from an appropriate vendor. The structure will be placed as close to the impacted roost site as feasible, which may include placement within trees, on bridge structures, or other locations as determined by a bat biologist and CDFW. This bat structure will be erected at least one month (and preferably a year or more) prior to removal of the original roost structure. A bat biologist will monitor this structure during the breeding season for up to three years following completion of the project, or until it is found to be occupied by bats, to provide information for future projects regarding the effectiveness of such structures in minimizing impacts to bats.

MM-ANIMAL-9.6: In some circumstances, it may be beneficial to allow roosting bats to continue using a roost while construction is occurring on or near the roost site. For example, if a bridge found to contain a day roost is being widened but is not being demolished, and if pile-driving, jack-hammering, or other sources of "extreme" disturbance will not occur, a qualified bat biologist (in consultation with the CDFW) will determine whether the bats should be evicted or whether they should remain in place. If it is determined that the risks to bats from eviction (e.g., increased predation or exposure, or competition for roost sites) are greater than the risk of colony abandonment, then the bats will not be evicted. In the case of non-maternity colonies, no alternative roost structures will need to be provided, and no monitoring of the colony during construction will be necessary.

However, if a maternity colony is maintained in place while construction on or immediately adjacent to the colony takes place, some minimal information on the increase in disturbance to which bats are subjected during construction and on the bats' response to that disturbance will be collected. This information will help to inform the impact assessment of, and the development of impact minimization measures for, similar projects in the future. Baseline data on the

vibration and sound levels at the bridge site will also be collected for a minimum of 2 days within 5 days of construction commencement. Following this pre-construction, baseline monitoring, the colony will then be monitored every night during construction using acoustic surveying methods, such as Anabat equipment, to determine the status of the colony (i.e. to determine if the colony abandons the roost). Monitoring equipment will also be used to sample construction-related increases in noise and vibration.

Project implementation will not have to be modified based on the findings of this monitoring, even if the bats abandon the roost. However, these data will allow for a determination of whether or not the bats remained at the bridge during construction and/or changed their activity patterns in relation to varying levels of noise and vibration.

The following measure, which is included in the project, will reduce the project's significant effects on nesting ringtails to a less-than-significant level:

MM-ANIMAL-10.1: If a ringtail nest is detected incidentally (i.e., during the woodrat surveys described in MM-ANIMAL-8.1), a qualified mammalogist will determine the extent of a construction-free buffer zone that should be maintained around the den. Construction activities within this zone will not occur during the period March 1 through August 31 to avoid potential construction disturbance to the ringtail during the breeding season. After August 31, individuals will be safely evicted, under the direction of a qualified mammalogist, by disturbing the den site under the cover of darkness to allow the ringtail(s) to move safely to a new location without being exposed considerably to predators or competitors.

The following measure, which is included in the project, will reduce the project's significant effects on nesting badgers to a less-than-significant level:

MM-ANIMAL-11.1: A qualified mammalogist will conduct preconstruction surveys for badger dens on and within 300 feet of the site (as access permits), within two weeks prior to groundbreaking in any given area occupied by grassland or ruderal habitat. If the mammalogist identifies any dens that appear suitable for this species (based on size, shape, or other features), such "potential dens" will be monitored via tracking media or camera for a period of at least three days to determine occupancy, then excavated if no evidence of occupancy is detected. If an active maternity badger den is located, the mammalogist will determine the measures (e.g., buffers) that will be taken to avoid impacts to the den during the pupping season (i.e., February 15 through July 1, or as otherwise determined through surveys and monitoring of the den), in consultation with the CDFW. After the pupping season, if a den is located in the project impact area, the badgers will

be evicted by excavation of the den using hand tools under the supervision of a qualified mammalogist, in consultation with the CDFW.

The following measures, which are included in the project, will reduce the project's significant effects on nesting birds to a less-than-significant level:

MM-ANIMAL-12.1: Vegetation that will be impacted by the project will be removed during the non-breeding season (i.e., September 1 to February 14), if feasible, to help preclude nesting. If it is not feasible to schedule vegetation removal during the non-breeding season, then pre-construction surveys for nesting birds will be conducted by a qualified ornithologist to ensure that no nests will be disturbed during project implementation. This survey will be conducted no more than ~~seven~~ two days prior to the initiation of construction activities. During this survey, the ornithologist will inspect trees, shrubs, and other potential nesting habitats in and immediately adjacent to the project impact areas for nests. If an active nest is found sufficiently close to work areas to be disturbed by these activities, the ornithologist, in consultation with CDFW, will determine the extent of a buffer zone to be established around the nest, which can range from ~~50 to 250~~ 100 to 300 feet or more depending on the sensitivity of the nest and/or species.

MM-ANIMAL-12.2: At bridges, to avoid impacts to nesting swallows and black phoebes, old nests will be removed prior to February 15, or after February 15 if a qualified ornithologist determines that the nests are not active. Maintaining bridges free from nesting birds may require the placement of netting or other structures over the underside of the bridges to prevent swallows and other birds from accessing suitable nesting substrate. Alternatively, nest starts may be removed on a regular basis (e.g., every other day) to prevent active nests from becoming established. Because both roosting bats and nesting swallows occur on at least one bridge (the southbound U.S. 101 span over the UPRR/Tar Creek), coordination of exclusion efforts may be necessary. Thus, if exclusion devices such as netting will be installed prior to February 15 to prevent swallows from nesting, and if measures are taken to exclude roosting bats, all these measures will need to be implemented prior to February 15.

2.21 THREATENED AND ENDANGERED SPECIES

2.21.1 Regulatory Setting

The primary federal law protecting threatened and endangered species is the Federal Endangered Species Act (FESA): 16 USC Section 1531, et seq. See also 50 CFR 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 (FHWA), are required to consult with the US Fish and Wildlife Service (USFWS) and the National Oceanic and Atmospheric Administration's National Marine Fisheries Service (NOAA 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 FESA 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 (CESA), California Fish and Game Code Section 2050, et seq. CESA 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 (CDFW) is the agency responsible for implementing CESA. 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." CESA allows for take incidental to otherwise lawful development projects; for these actions an incidental take permit is issued by CDFW. For species listed under both FESA and CESA requiring a Biological Opinion under Section 7 of the FESA, CDFW may also authorize impacts to CESA 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.

2.21.2 Affected Environment

2.21.2.1 Threatened and Endangered Plants

An initial list of 12 threatened or endangered plants were identified as occurring (either currently or historically) within the general project area in a wide variety of different habitat types. Of the 12 species, the following 11 species were dismissed outright due to a total lack of habitat (such as serpentine soils, alkaline soils, etc.) for these species within the project's BSA:

- Coyote ceanothus
- Ben Lomond spineflower
- Monterey spineflower
- Scotts Valley spineflower
- Robust spineflower
- Santa Cruz cypress
- Santa Cruz wallflower
- White-rayed pentachaeta
- Yadon's rein orchid
- San Francisco popcorn-flower
- Scotts Valley polygonum

The one species for which habitat is present within the BSA, the showy Indian Clover, is discussed in the following paragraph.

The habitat for the showy Indian clover is coastal bluff scrub, as well as valley and foothill grassland. Although low-quality valley and foothill grassland habitat occurs within the BSA, due to degraded site conditions, this species is unlikely to occur within the BSA. CNDDDB records document a single occurrence for this species in the project's Chittenden quadrangle from 1903, but the species is believed extirpated. Showy Indian clover was not detected during surveys conducted during the appropriate blooming period, and this species is determined absent from the BSA.

2.21.2.2 Threatened and Endangered Animals

An initial list of 11 threatened and endangered animals were identified as occurring (either currently or historically) within the general area in a wide variety of different habitat types (defined by the Chittenden USGS quadrangle map in which the project occurs, the eight adjacent quadrangle maps, and the Santa Clara County/San Benito County search area). Of these 11 species, the following 6 were determined absent from the BSA due to a lack of suitable habitat and/or the fact that there are no known historic or current records of the species occurring within or near the BSA:

- Bay checkerspot butterfly
- Coho salmon, Central California Coast Evolutionary Significant Unit (ESU)⁴⁸
- Chinook salmon, Sacramento River Winter-Run ESU
- Chinook salmon, Central Valley Spring-Run ESU
- Willow flycatcher
- Bank swallow

⁴⁸An evolutionary significant unit (ESU) is a population that is distinct from other populations, such distinction being geographic and/or genetic.

The remaining five species are discussed below.

San Joaquin Kit Fox (*Vulpes macrotis mutica*)

During the preparation of this EIR, a kit fox habitat evaluation survey was undertaken per the USFWS's *San Joaquin Kit Fox Survey Protocol* to determine habitat suitability for the kit fox within and around the BSA. No evidence of kit fox was observed during the habitat evaluation. Furthermore, no San Joaquin kit foxes were detected by motion-sensor cameras during the four-month wildlife crossing study of the various bridges and culverts within the project limits.

Historically, there have been a number of sightings of kit fox east and southeast of the project alignment, mostly in the Hollister area, but numerous San Joaquin kit foxes surveys conducted in the 1980s and 1990s in northern San Benito County and Santa Clara County produced negative results. In 2003, an extensive survey with scent dogs was conducted along SR 25, a possible corridor for kit fox between Hollister and U.S. 101 near Gilroy; this survey also produced negative results. Since 1975, there has been only one CNDDDB report of a San Joaquin kit fox in Santa Clara County in an outlying area of Henry Coe State Park, many miles from the proposed project. Habitat modeling conducted for the HCP/NCCP identified no habitat for the kit fox in the BSA.

In summary, there is no evidence that San Joaquin kit foxes currently occur in, nor any historical records from, the immediate vicinity of the project, and the habitat evaluation conducted for this project reached the conclusion that this species should be considered absent from the project site.

Least Bell's Vireo (*Vireo bellii pusillus*)

The least Bell's vireo is a small migratory bird that breeds in riparian habitats. In the Pajaro River Valley, the willow-dominated riparian habitat along streams such as Llagas Creek, the Pajaro River, and the San Benito River provides potentially suitable breeding habitat for least Bell's vireos. However, the abundance of brown-headed cowbirds throughout the region may prevent the colonization of the project area by successfully breeding least Bell's vireos, unless a cowbird control program is initiated. Furthermore, because there is no historical evidence of a widespread breeding population in the Pajaro River watershed even before this species decline in the 20th century, it is possible that some other factors limit the potential for this species to become established in the project area.

Protocol-level surveys for the least Bell's vireo were conducted in 2007 as part of the preparation of this EIR. No least Bell's vireos were recorded during these surveys. Further, this species has not been recorded in the project area since 1932.

Steelhead, South-Central California Coast Distinct Population Segment (DPS)⁴⁹

The steelhead is a form of rainbow trout that migrates upstream from the ocean to spawn in late fall or early winter, when flows are sufficient to allow them to reach suitable habitat in far upstream areas. In the Pajaro River system, spawning occurs between December and June. Steelhead usually spawn in clear, cool, perennial sections of relatively undisturbed streams.

Steelhead are known to spawn in Uvas Creek (which becomes Carnadero Creek near the project's BSA), Tar Creek, and other tributaries to the Pajaro River located well upstream from the project site. Steelhead have been found in the San Benito River and its tributaries in wet years, but temperatures are likely too high for successful rearing. The Pajaro and San Benito rivers, Tar Creek, and Carnadero Creek are all designated critical habitat in the BSA.

Within the BSA, the Pajaro River provides suitable passage for fish migration to and from spawning and rearing habitats in the upper watershed. However, aquatic habitat within the portion of the Pajaro River in the BSA is not suitable spawning and rearing habitat due to the warm turbid water, silt substrate, likely eutrophic condition, and lack of habitat complexity, such as riffle pool complexes.

Steelhead are able to access the portion of the San Benito River within the BSA. However during the 2007 surveys, this portion of the river was largely stagnant, lacking channel integrity and complexity with a silt substrate rendering it suitable to provide passage only in high flow years. Steelhead may enter the San Benito River in wet years, but temperatures are likely too high for successful rearing.

Tar Creek supports spawning steelhead in reaches upstream from the BSA, and steelhead migrate through the BSA between those spawning areas and the Pajaro River. The reach of Tar Creek within the BSA possesses water quality and habitat complexity suitable for steelhead migration, though due to the low amount of flow and warm temperatures within this portion of the creek during the dry season, suitable steelhead rearing habitat is likely absent.

Aquatic conditions in lower San Juan Creek are similar to those in the Pajaro River and as such aquatic habitat within the portion of San Juan Creek in the BSA is not suitable for spawning and rearing, but steelhead may enter the creek. Other creeks in the BSA, such as Tick Creek and Gavilan Creek, do not provide suitable hydrology or substrate to support spawning steelhead, and thus the species is not expected to occur in these creeks.

California Red-legged Frog (*Rana draytonii*)

The California red-legged frog is California's largest native frog. The species is generally restricted to riparian and lake habitats in California and northern Baja California. Red-legged frogs prefer deep, calm

⁴⁹Under the Endangered Species Act, a distinct population segment (DPS) is a subset of a species that is both genetically discrete and significant.

pools in creeks, rivers, or lakes below 5,000 feet in elevation. The USFWS listed the California red-legged frog as threatened in 1996, due to continued habitat degradation throughout the species' range and population declines. The USFWS has designated critical habitat for the California red-legged frog. However, no portion of the BSA is within designated critical habitat. This species is a "covered species" under the proposed Santa Clara Valley HCP/NCCP.

Habitat surveys in the BSA and vicinity were conducted in April, October, and November 2007. The purpose of the surveys was to document potential amphibian habitat within, and adjacent to, the BSA as well as assess potential impacts of the project on California red-legged frogs. Prior to these site visits, the CNDDDB was queried for information on the distribution of California red-legged frogs within the project vicinity. The California red-legged frog has not been recorded within the BSA. However, there are seven CNDDDB records of California red-legged frogs within 2 miles of the BSA. Four records are from ponds at Bluestone Quarry and on Castro Valley Ranch immediately west of the northern portion of the BSA, and two records are from ponds east of the San Benito County portion of the BSA. All of these locations could serve as breeding sites. The seventh record is from the confluence of the Pajaro River and Carnadero Creek. In addition, a single adult frog was also observed in Carnadero Creek approximately 985 feet downstream from the confluence of Tick and Carnadero Creeks in September 2007. This locality is approximately 650 feet northeast of the project BSA.

Many of the numerous ponds distributed throughout the annual grassland surrounding the BSA are likely to provide suitable breeding habitat for California red-legged frogs. Whether or not reproduction is successful in a particular pond largely depends upon the duration the pool remains wet and whether or not introduced predators, such as bullfrogs, are present. Based on the surveys, along with CNDDDB accounts, the highest quality potential breeding habitats within close proximity to the BSA are:

- The stock pond within the BSA south of Castro Valley Road (marked as aquatic habitat on Figure 20e);
- A large wetland just south of Tar Creek and west of the BSA; and
- A series of ponds located west of the BSA on Bluestone Quarry and Castro Valley Ranch.

While isolated and off-channel ponds throughout the project region represent potential breeding habitat for California red-legged frogs, the creeks and rivers themselves are unlikely to support successful breeding of California red-legged frogs due to high predator populations (especially in perennial streams) and/or short hydroperiods in intermittent creeks such as Tick Creek and Gavilan Creek.

Adult California red-legged frogs spend the majority of their time either in close proximity to their breeding habitat or in other moist habitats; however, they will disperse across a wide variety of habitats. Thus, potential California red-legged frog dispersal habitat within the general project vicinity includes areas adjacent to ponds, depressional wetlands, and rivers as well as grasslands, scrub habitat, forested areas, and even agricultural lands. Essentially, all non-developed habitat has the potential to be used by California red-legged frogs, at least for upland dispersal between aquatic habitats.

Although suitable non-breeding habitat for California red-legged frogs exists throughout the project area, dispersal across U.S. 101 is impeded by heavy traffic and concrete median barriers that separate south- and northbound traffic along much of the project alignment. However, the riparian habitats along the Pajaro River, San Benito River, Tick Creek, Gavilan Creek, Carnadero Creek, Tar Creek, and San Juan Creek, and the culverts that drain seasonal tributaries, represent potential dispersal routes for California red-legged frogs between the western and eastern boundaries of the BSA.

California Tiger Salamander (*Ambystoma californiense*)

The California tiger salamander occurs in areas of the Central Valley and California Coast Ranges where temporary ponded environments (e.g., vernal pools or human-made ponds providing water for at least three months) are surrounded by uplands that support small mammal burrows, which salamanders use for aestivation (i.e., a state of dormancy during the summer) and refuge. Breeding pools are usually ephemeral pools (e.g., vernal pools), but they must retain water long enough for metamorphosis to occur. Permanent ponds are also used for breeding, but larger ponds often contain predators that consume eggs and larvae, and prevent successful breeding.

In 2004, the USFWS listed the California tiger salamander as threatened throughout its range. No portion of the project BSA, however, is within designated critical habitat for this species. ~~In February 2009, the CDFW accepted a petition to list the species as endangered under the California Endangered Species Act, thus, the species is currently a candidate for state listing.~~ In 2010, the CDFW listed the species as threatened under the California Endangered Species Act. The California tiger salamander is considered a “covered species” by the Santa Clara Valley HCP/NCCP.

Habitat assessments in the BSA and vicinity were conducted in April, October, and November 2007. The purpose of the surveys was to document potential amphibian habitat within, and adjacent to, the BSA as well as assess potential impacts of the project on California tiger salamanders. Prior to these site visits, the CNDDDB was queried for information on the distribution of California tiger salamanders within the project vicinity. There are numerous CNDDDB records of California tiger salamanders near the BSA. A seasonal wetland depression located within the BSA west of Old Monterey Road on Sargent Ranch was inaccessible during surveys for this project, but according to the CNDDDB, tiger salamanders have bred in this pool. Also within the BSA, the stock pond south of Castro Valley Road provides suitable breeding habitat for tiger salamanders, though the pond has not been surveyed. Several additional CNDDDB records are from ponds immediately west of the BSA near Bluestone Quarry and elsewhere on Castro Valley Ranch. There are also known tiger salamander breeding ponds both east and west of the southern terminus of the project.

No surveys for California tiger salamanders were conducted for this project. Rather, presence in areas with suitable breeding ponds was assumed, and the location of potential habitat was assessed on the basis of the locations of these ponds, the type and quality of upland habitat, and the presence of barriers to dispersal. It was also assumed that all suitable upland habitat within 1.2 miles of potential breeding

ponds was upland dispersal or aestivation habitat for California tiger salamanders unless the upland habitat was separated from these ponds by insurmountable barriers.

Many of the numerous ponds distributed throughout annual grassland surrounding the BSA are likely to provide suitable breeding habitat for California tiger salamanders. The vast areas of annual grassland surrounding the BSA provide high-quality upland habitat that may be used for dispersal and aestivation. In contrast, agricultural areas within the BSA are unsuitable for use as aestivation habitat due to the frequency of disturbance and lack of small mammal burrows. The majority of habitat within and adjacent to the BSA (with the exception of developed areas) represents potential dispersal habitat for California tiger salamanders. However, the following areas are unlikely to provide high quality habitat for tiger salamanders due to their isolation from potential breeding sites, significant impediments to dispersal (e.g., heavy traffic, large rivers, and highway median barriers), and/or frequent disturbance and lack of refuge:

- Annual grassland along the eastern side of U.S. 101 between the southern boundary of the project and the San Benito River agricultural lands, and associated small pockets of annual grassland that flank U.S. 101 along the western edge of the highway between the San Benito and Pajaro Rivers.
- Much of the habitat in the northern and eastern regions of the BSA consists of agricultural land and isolated pockets of annual grassland. Although dispersing tiger salamanders could walk over these areas, they do not provide breeding habitat and in most areas do not provide suitable refuge (e.g., small mammal burrows) due to intensive small mammal control efforts.

Generally, the habitat on the east side of U.S. 101 north of SR 25 is not considered potential California tiger salamander habitat due to the lack of suitable aestivation habitat and presence of significant impediments to dispersal (e.g., U.S. 101, developed areas, and heavily cultivated lands) between those areas and tiger salamander breeding locations.

2.21.3 Environmental Consequences of the Build Alternative

2.21.3.1 *Impacts to Steelhead*

Project-related impacts to aquatic habitats have been avoided to the maximum extent feasible. The bridge improvements have been designed so that no new piers or structures will be placed in the low-flow channel of any waterway supporting steelhead, although in Carnadero Creek, existing piers will be extended upstream to support the new span.

The detention basin proposed adjacent to the San Benito River just upstream from U.S. 101 is being designed to minimize the risk of fish entrapment. The entire basin will be graded so that it drains completely through an outlet to the river, with no depressional areas that would support long-term ponding. The outlet will be elevated above the ordinary flow of the river. Therefore, the pipe's outlet

would not be accessible to fish except during very high flows, when water would be flowing out of the pipe, thus limiting the ability of fish to enter the basin. Fish would only be able to enter the basin during flood flows and would be expected to exit the basin as water levels drop. They will thus spend little time within the basin and there is little chance of entrapment when retained water recedes.

Removal of riparian vegetation by the project will adversely affect fish because it provides cover for fish, shade to reduce water temperatures, and food input (i.e., terrestrial invertebrates), and is considered a very valuable component of fish habitat.

The removal of approximately 890 linear feet of SRA habitat at the Pajaro River, San Benito River, and Camadero Creek may reduce habitat quality within and downstream from affected stream reaches due to slightly increased water temperatures and reduction in inputs of organic matter and coarse woody debris, thus affecting the aquatic food chain and aquatic habitat structure, respectively. However, shading from widened bridge structures will offset impacts to water temperatures somewhat, and given the sizes of the watersheds contributing to the stream reaches in the BSA, the small-scale, localized effects of reduction in SRA habitat are expected to be minimal.

Approximately 0.02 acres of aquatic habitat in Camadero Creek will be lost due to the extension of existing piers upstream to support the new U.S. 101 bridge span. This impact will result in the loss of a small amount of aquatic habitat for steelhead. On the scale of the Pajaro River watershed, or even on the scale of Camadero Creek itself, such impacts will have minimal effects on steelhead. These structures will not impede fish movement, and no individuals are expected to be impacted due to the minor loss of foraging opportunities associated with the new structures.

There is some potential for steelhead to be killed or injured during construction of cofferdams used to dewater reaches of creek where work will occur (if these reaches contain water during the construction period). Construction activities adjacent to waterways could disturb soils and cause sediment to be transported into and through the channel, which would result in temporary increases in turbidity and sedimentation downstream of construction sites. In addition, fuel, concrete, and other contaminants could spill into the waterway during construction.

Steelhead may suffer higher predation rates swimming through bypass channels constructed around cofferdams. Steelhead could also be adversely impacted by noise and vibrations related to pile driving during installation of bridge supports. Noise and vibration from pile driving, jack-hammering, or other percussive activities could cause the mortality of individual fish or could cause sensory damage. The loss of hearing sensitivity may adversely affect the ability of salmonids to orient themselves, detect predators, locate prey, or sense their acoustic environment. Fish also may exhibit noise-induced avoidance behavior that causes them to move into less suitable habitat.

Impact T&E-1: The project will result in both short- and long-term adverse impacts to steelhead. [Less-than-Significant with Mitigation Listed in Section 2.21.5]

2.21.3.2 *Impacts to California Red-legged Frog*

Construction and maintenance activities associated with the project could result in the direct loss and indirect disturbance of California red-legged frogs and their habitats. The project could affect individual red-legged frogs as a result of:

- Direct mortality during construction as a result of trampling by construction personnel or equipment;
- Increased mortality due to roadkill caused by the increase in traffic speed and increase in number of lanes within project roadways;
- Increased mortality due to roadkill caused by the construction and vehicular use of either a frontage road (under Design Option A) or the Santa Teresa Boulevard Extension (under Design Option B) between a potential breeding pond south of Castro Valley Road and upland dispersal habitat to the north and west;
- Potential reduction in dispersal to and from the pond south of Castro Valley Road due to the physical impediment posed by, and vehicular use of, either a frontage road (under Design Option A) or the Santa Teresa Boulevard Extension (under Design Option B);
- Direct mortality from the collapse of underground burrows (which may be used as refuges in upland areas by red-legged frogs), resulting from soil compaction; and
- Direct mortality or loss of suitable habitat resulting from the loss of dispersal habitat, fill of wetland and aquatic habitats, and removal of riparian vegetation

No known red-legged frog breeding habitat will be directly impacted by the project's construction activities. However, it is possible that red-legged frogs breed in some of the aquatic or freshwater emergent wetlands that will be impacted by the project; see Section 2.18 for details. Other potential breeding habitat, such as the stock pond south of Castro Valley Road and the wetlands south of Tar Creek, will not be directly impacted. The new frontage road/extension of Santa Teresa Boulevard near the stock pond south of Castro Valley Road will not impact any aquatic breeding habitat within the pond itself and will bridge any aquatic habitat in the inlet to the pond. However, as described in the following paragraph, this project feature may limit dispersal to and from the pond, as well as potentially increasing mortality due to roadkill.

Under Design Option A, a new frontage road would be constructed to the east of the stock pond south of Castro Valley Road. Under Design Option B, the extension of Santa Teresa Boulevard would be constructed to the east of the pond. In both cases, the new roadway would limit dispersal of red-legged frogs to and from the pond. In addition, any frogs attempting to cross over the roadway would risk harm from vehicular traffic. The impact would be greater under Design Option B because traffic volumes will be higher.

The proposed project could result in impacts to as much as 394 acres of potential red-legged frog habitat including aquatic and wetland habitat that may serve as breeding habitat, riparian habitat that may serve as cover for frogs associated with aquatic habitat, and upland grassland, agricultural, coyote brush scrub

and oak woodland habitat that may serve as dispersal habitat for red-legged frogs. Because it was assumed that red-legged frogs could occur virtually anywhere in the BSA, all impacted natural habitat (i.e., areas that were not already paved or otherwise developed) was considered impacted red-legged frog habitat. Two categories of habitat impacts were identified:

Permanent Impacts

Under Design Option A, approximately 110 acres of potential red-legged frog habitat, including 92 acres in Santa Clara County and 18 acres in San Benito County, will be permanently lost due to the construction of pavement and other improvements in areas that currently provide natural habitat that may be used by red-legged frogs. Under Design Option B, this impact would total approximately 97 acres, of which 79 acres would be in Santa Clara County and 18 acres would be in San Benito County.

Temporary Impacts

Under Design Option A, approximately 284 acres of potential red-legged frog habitat, including 198 acres in Santa Clara County and 86 acres in San Benito County, will be used for construction access and staging while the project is being constructed or will be impacted by grading activities as part of the project. Under Design Option B, this impact would total approximately 273 acres, of which 187 acres would be in Santa Clara County and 86 acres would be in San Benito County. Areas used for construction access and staging during construction will not be subject to grading and will not be paved or otherwise permanently altered. These areas are expected to provide habitat of similar quality to existing conditions shortly (i.e., in less than one year) after the completion of construction. Areas that will be temporarily impacted by grading will not be paved, and instead will be revegetated following the completion of construction; such areas are expected to provide habitat of similar quality to the existing habitat that will be impacted within approximately one year (for grassland habitat) to five years (for riparian habitat) after the completion of construction.

Impact T&E-2: The project will result in both short- and long-term adverse impacts to the California red-legged frog. **[Less-than-Significant with Mitigation Listed in Section 2.21.5]**

2.21.3.3 *Impacts to California Tiger Salamander*

Construction and maintenance activities associated with the project could result in the direct loss and indirect disturbance of California tiger salamanders and their habitats. The project could affect individual tiger salamanders as a result of:

- Direct mortality during construction as a result of trampling by construction personnel or equipment;
- Increased mortality due to roadkill caused by the increase in traffic speed and increase in number of lanes within project roadways;

- Increased mortality due to roadkill caused by the construction and vehicular use of either a frontage road (under Design Option A) or the Santa Teresa Boulevard Extension (under Design Option B) between a potential breeding pond south of Castro Valley Road and upland dispersal habitat to the north and west;
- Potential reduction in dispersal to and from the pond south of Castro Valley Road due to the physical impediment posed by, and vehicular use of, either a frontage road (under Design Option A) or the Santa Teresa Boulevard Extension (under Design Option B);
- Direct mortality from the collapse of underground burrows, resulting from soil compaction; and
- Direct mortality or loss of suitable habitat resulting from the loss of dispersal habitat, loss of refuge areas, and fill of wetland and aquatic habitats.

No known or potential tiger salamander breeding habitat will be directly impacted by the project's construction activities. Although the known breeding pond on Sargent Ranch and the potential breeding pond south of Castro Valley Road are located in the BSA, they will not be directly impacted by the project. The new frontage road/extension of Santa Teresa Boulevard near the stock pond south of Castro Valley Road will not impact any aquatic breeding habitat within the pond itself and will span any aquatic habitat in the inlet to the pond. However, as described in the following paragraph, this project feature may limit dispersal to and from the pond, as well as potentially increasing mortality due to roadkill.

Under Design Option A, a new frontage road would be constructed to the east of the stock pond south of Castro Valley Road. Under Design Option B, the extension of Santa Teresa Boulevard would be constructed to the east of the pond. In both cases, the new roadway would limit dispersal of tiger salamanders to and from the pond. In addition, any salamanders attempting to cross over the roadway would risk harm from vehicular traffic. The impact would be greater under Design Option B because traffic volumes will be higher.

The project could result in impacts to as much as 281 acres of non-breeding habitat including aquatic, wetland, and riparian habitat, as well as upland grassland, agricultural, coyote brush scrub and oak woodland habitat that may serve as upland habitat for California tiger salamanders. The reader will note that the impact assessments for California red-legged frogs and California tiger salamanders differ somewhat. The California red-legged frog impact assessment, described above, assumes that all impacted natural habitat (i.e., areas that were not already paved or otherwise developed) is considered impacted red-legged frog habitat. For the California tiger salamander, areas on the east side of U.S. 101 north of SR 25 are not considered potential California tiger salamander habitat due to the lack of suitable aestivation habitat and presence of significant impediments to dispersal (e.g., U.S. 101, developed areas, and heavily cultivated lands) between those areas and tiger salamander breeding locations. Two categories of habitat impacts were identified:

Permanent Impacts

Under Design Option A, approximately 76 acres of potential tiger salamander habitat, including 58 acres in Santa Clara County and 18 acres in San Benito County, will be permanently lost due to the

construction of pavement and other improvements in areas that currently provide natural habitat that may be used by tiger salamanders. Under Design Option B, this impact would total approximately 74 acres, of which 56 acres would be in Santa Clara County and 18 acres would be in San Benito County. These permanent habitat impacts include both upland and non-breeding wetland/aquatic habitat impacts.

Temporary Impacts

Under Design Option A, approximately 215 acres of potential tiger salamander habitat, including 129 acres in Santa Clara County and 86 acres in San Benito County, will be used for construction access and staging while the project is being constructed or will be impacted by grading activities as part of the project. Under Design Option B, this impact would total approximately 205 acres, of which 119 acres would be in Santa Clara County and 86 acres would be in San Benito County. Areas used for construction access and staging during construction will not be subject to grading and will not be paved or otherwise permanently altered. These areas are expected to provide habitat of similar quality to existing conditions shortly (i.e., in less than one year) after the completion of construction. Areas that will be temporarily impacted by grading will not be paved, and instead will be revegetated following the completion of construction; such areas are expected to provide habitat of similar quality to the existing habitat that will be impacted within approximately one year (for grassland habitat) to five years (for riparian habitat) after the completion of construction.

Impact T&E-3: The project will result in both short- and long-term adverse impacts to the California tiger salamander. **[Less-than-Significant with Mitigation Listed in Section 2.21.5]**

2.21.4 Environmental Consequences of the No Build Alternative

Under the No Build Alternative, the improvements to U.S. 101 that comprise the Build Alternative would not be constructed. There would be no modification to existing facilities or to the existing environment. There would, therefore, be no impacts to any threatened or endangered species.

2.21.5 Avoidance, Minimization, and/or Mitigation Measures

The following measures, which are included in the project, will reduce the project's significant effects on steelhead to a less-than-significant level:

MM-T&E-1.1: The project will fully mitigate for impacts to SRA, riparian, and aquatic habitats. This mitigation is described in Sections 2.17.5 and 2.18.5.

MM-T&E-1.2: Any construction activities within the low-flow channels of waterways where steelhead are known or likely to occur will be limited to the period of June 15 to October 15.

- MM-T&E-1.3:** For waterways where steelhead are known or likely to occur, measures will be taken to ensure that movement of fish is not prevented by any water diversion structures used during construction, regardless of when construction occurs. Water will be diverted through the construction site by way of an open ditch, enclosed culvert (which further protects fish from pressure waves created during pile driving [see MM-T&E-1.5]), or other method approved by the regulatory agencies.
- MM-T&E-1.4:** The project will implement measures during construction to avoid and minimize the potential degradation of water quality within any waterways where steelhead are known or likely to occur. These measures are described in Section 2.22.6.
- MM-T&E-1.5:** To avoid and minimize impacts to fish resulting from pressure waves created during pile driving, the following measures will be implemented: (a) pile driving work will be limited to the period of June 15 to October 15; (b) in-water installation of piles will be avoided either by placing piles outside the low-flow channel or by driving the piles in an area that has been de-watered; (c) where practical, low-impact pile driving equipment such as vibratory hammers or hydraulic casing oscillators, which minimize underwater sound pressure levels, or press-in pile installation will be used instead of impact hammers; (d) where practical, steel piles will be avoided; (e) construction-related underwater sound exposure levels will be limited to less than 187 dB accumulated sound exposure levels and peak sound pressure levels of less than 208 dB; and (f) if necessary, other sound reduction measures, such as air bubble curtains or coffer dams, will be implemented to attenuate noise levels.

The following measures, which are included in the project, will reduce the project's significant effects on the California red-legged frog to a less-than-significant level:

- MM-T&E-2.1:** The project will fully mitigate for impacts to riparian habitat and aquatic/wetland habitat, the two habitat types of greatest value to red-legged frogs. This mitigation is described in Sections 2.17.5 and 2.18.5.
- MM-T&E-2.2:** The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to upland non-breeding red-legged habitat. For more information on the HCP/NCCP, please see Section 2.17.5.
- MM-T&E-2.3:** If MM-T&E-2.2 turns out to be infeasible for some or all of the project, mitigation for impacts to upland non-breeding frog habitat will consist of the purchase of credits from a mitigation bank that serves the project area. If no banks or credits are available, then the project will develop and implement a

plan for the preservation and enhancement of non-breeding red-legged frog habitat at off-site location(s).

[Note: MM-T&E-2.3 will be implemented only if MM-T&E-2.2 is determined to be partially or completely infeasible.]

If project-specific mitigation for impacts to California red-legged frog habitat is necessary, a wildlife ecologist will develop a California red-legged frog HMMP. This plan will contain the same types of information described above in MM-ANIMAL-6.5, but will focus on the red-legged frog instead of the burrowing owl. At a minimum, success criteria will include the presence of suitable habitat conditions for the red-legged frog, and provision of ecological functions and values equal to or exceeding those in the red-legged frog habitat that is impacted.

MM-T&E-2.4: Prior to any ground disturbance, pre-construction surveys shall be conducted by a USFWS-approved biologist for the California red-legged frog. These surveys shall consist of walking surveys of the project limits and adjacent areas accessible to the public to determine presence of the species. All aquatic, wetland, and riparian habitats within construction areas will be surveyed by the qualified biologist for the presence of larval and adult California red-legged frogs prior to construction activities. If any red-legged frogs are detected within construction areas, they will be relocated to predetermined sites outside the project area (with the approval of the USFWS). Only USFWS-approved biologist(s) who are familiar with the biology and ecology of the California red-legged frog shall capture or handle this listed species. Generally, if an individual needs to be relocated, it will be moved outside the project area and placed in appropriate habitat providing adequate cover.

MM-T&E-2.5: An employee education program will take place before groundbreaking for the project, and a USFWS-approved biologist will explain to construction workers how best to avoid the accidental take of California red-legged frogs. The approved biologist will train construction workers on recognition of this species, their potential for occurrence in the project area, measures to avoid take, and penalties for take. The program will consist of a brief presentation by the on-site biologist to explain endangered species concerns to all contractors, their employees, and agency personnel involved in the project. The program should include a description of the California red-legged frog and its habitat needs; an explanation of the status of this species and its protection under the Endangered Species Act; and a description of the measures being taken to reduce effects to this species during project construction and implementation. Documentation of the training, including individual signed affidavits, will be kept on file.

- MM-T&E-2.6:** Prior to the start of work each day, dedicated construction personnel will inspect trenches and pits that were left open overnight. If a California red-legged frog (or any amphibian that construction personnel think may be of this species) is encountered, the following protocol will be implemented: 1) All work that could result in direct injury, disturbance, or harassment of the individual animal will immediately cease; 2) the resident engineer or inspector will be immediately notified; 3) the resident engineer or inspector will immediately notify the appropriate Construction Environmental Coordinator, or similar responsible party, who in turn will immediately notify the USFWS and CDFW; and 4) a qualified biologist approved by the USFWS to handle the individual frog will be contacted to remove the individual to a safe location nearby.
- MM-T&E-2.7:** Permanent and temporary disturbances and other types of project-related disturbance to the habitats of the California red-legged frog shall be minimized to the maximum extent practicable. To minimize temporary disturbances, all project-related vehicle traffic shall be restricted to established roads, construction areas, and other designated areas. These areas will also be included in pre-construction surveys and, to the maximum extent possible, should be established in locations disturbed by previous activities to prevent further adverse effects.
- MM-T&E-2.8:** Project-related vehicles shall observe a 15 mph speed limit within construction areas, except on established public roadways; this is particularly important at night when the California red-legged frog is most active. To the maximum extent possible, nighttime construction should be minimized. Off-road traffic outside of designated project areas shall be prohibited.
- MM-T&E-2.9:** To prevent inadvertent entrapment of red-legged frogs during construction, all excavated, steep-walled holes or trenches more than two feet deep shall be covered at the close of each working day by plywood or similar materials, or provided with one or more escape ramps constructed of earth fill or wooden planks. Before such holes or trenches are filled, they will be inspected for trapped animals. If at any time a trapped listed animal is discovered, the procedure described in MM-T&E-2.6 will be followed.
- MM-T&E-2.10:** To eliminate an attraction to predators of the California red-legged frog, all food-related trash items such as wrappers, cans, bottles, and food scraps will be disposed of in closed containers and removed at least once every week.
- MM-T&E-2.11:** To avoid harassment, injury, or mortality of California red-legged frogs by dogs or cats, no canine or feline pets shall be permitted in the project area.

- MM-T&E-2.12:** Plastic monofilament netting (erosion control matting) or similar material shall not be used at the project site because California red-legged frogs may become entangled or trapped in it. Acceptable substitutes include coconut coir matting or tackified hydroseeding compounds.
- MM-T&E-2.13:** A qualified biologist(s) shall be on-site during activities that may result in the take of the California red-legged frog. The qualifications of the biologist(s) must be presented to the USFWS for review and written approval prior to groundbreaking at the project site. The biologist(s) shall be given the authority to stop any work that may result in take of frogs. If the biologist(s) exercises this authority, the USFWS and the CDFW shall be notified by telephone and electronic mail within one working day. The need for the monitor may be determined at the discretion of your environmental coordinator. The biologist should be on-site during initial clearing and grubbing and during rainy periods when frogs are most likely to be dispersing.
- MM-T&E-2.14:** Injured California red-legged frogs will be cared for by a licensed veterinarian or other qualified person; dead red-legged frogs will be preserved according to standard museum techniques and held in a secure location. The USFWS and the CDFW will be notified within one working day of the discovery of death or injury to a California red-legged frog that occurs due to project-related activities or is observed at the project site. Notification must include the date, time, and location of the incident or of the finding of a dead or injured animal clearly indicated on a USGS 7.5 minute quadrangle and other maps at a finer scale, as requested by the USFWS, and any other pertinent information.
- MM-T&E-2.15:** Environmentally sensitive area (ESA) fencing will be installed around sensitive habitat features used by the red-legged frog, such as wetlands and riparian and aquatic habitats, which are to be avoided during project construction. The ESA fencing will be installed at a minimum distance from the edge of the resource as determined through coordination with the CDFW and USFWS. The construction specifications will contain clear language stating that construction-related activities, vehicle operation, material and equipment storage, and other surface-disturbing activities are prohibited within the fenced ESA.
- [Note: Construction of wildlife exclusion fencing around a project's impact areas is a standard practice to minimize the potential for red-legged frogs (or other species, such as the California tiger salamander) to enter, and be injured or killed in, construction areas. However, such fencing over such a long, linear project area would adversely affect the dispersal of some smaller mammals

through the project area. Such fencing is not required by the HCP/NCCP, and is not proposed for this project.]

- MM-T&E-2.16:** Under Design Option A, a bridge and a 4-foot arch pipe will be constructed within the new frontage road near the pond south of Castro Valley Road. If red-legged frogs are breeding in or otherwise using the pond, the bridge would allow frogs to disperse under the road along the drainage leading into the pond, while the arch pipe would allow for dispersal between the pond and areas west of the pond. These features will allow frogs the ability to disperse to and from the pond without crossing the road's surface [Design Option A only].
- MM-T&E-2.17:** Under Design Option B, a bridge and two 8-foot arch pipes will be constructed within the new Santa Teresa Boulevard Extension near the pond south of Castro Valley Ranch to allow frogs to move under the roadway. Because of the increased traffic on Santa Teresa Boulevard under this option, as compared to that on the frontage road under Design Option A, permanent exclusion fencing will be installed to keep frogs off the road's surface within 0.25 miles of the pond under Design Option B [Design Option B only].

The following measures, which are included in the project, will reduce the project's significant effects on the California tiger salamander to a less-than-significant level:

- MM-T&E-3.1:** As described in Section 2.18.5, the project will fully mitigate for impacts to aquatic/wetland habitat, the habitat type of greatest value to tiger salamanders.
- MM-T&E-3.2:** The project will pay development fees to the Santa Clara Valley HCP/NCCP for impacts to upland non-breeding tiger salamander habitat. For more information on the HCP/NCCP, please see Section 2.17.5.
- MM-T&E-3.3:** If MM-T&E-3.2 turns out to be infeasible for some or all of the project, mitigation for impacts to upland non-breeding tiger salamander habitat will consist of the purchase of credits from a mitigation bank that serves the project area. If no banks or credits are available, then the project will develop and implement a plan for the preservation and enhancement of non-breeding tiger salamander habitat at off-site location(s).

[Note: MM-T&E-3.3 will be implemented only if MM-T&E-3.2 is determined to be partially or completely infeasible.]

If project-specific mitigation for impacts to California tiger salamander habitat is necessary, a wildlife ecologist will develop a California tiger salamander HMMP. This plan will contain the same types of information described above

in MM-ANIMAL-6.5, but will focus on the tiger salamander instead of the burrowing owl. At a minimum, success criteria will include the presence of suitable habitat conditions for the tiger salamander, and provision of ecological functions and values equal to or exceeding those in the tiger salamander habitat that is impacted.

MM-T&E-3.4: The 12 mitigation measures listed above (i.e., MM-T&E-2.4 through MM-T&E-2.15) that are designed to prevent harm to individual California red-legged frogs will also serve to prevent harm to individual California tiger salamanders.

2.22 CONSTRUCTION IMPACTS

This section describes the impacts of the Build Alternative that will occur during the construction phase of the project. The No Build Alternative will not result in any changes to existing facilities or conditions and, therefore, there would be no construction impacts.

2.22.1 Traffic Effects/Street Closures During Construction

Except for temporary off-peak lane closures, the same number of traffic lanes will be maintained on U.S. 101 and local streets during the construction period. Narrowed lanes on U.S. 101 through the construction zone will be likely.

Prior to construction, a Transportation Management Plan (TMP) will be prepared. The TMP will address all traffic-related aspects of construction including, but not limited to: traffic handling in each stage of construction, pedestrian safety/access, emergency access, and bicycle safety/access. A component of the TMP will involve public dissemination of construction-related information through notices to the neighborhoods, press releases, and the use of changeable message signs.

The effect of the project on emergency vehicle response times during construction will be minimal because road closures are not anticipated and lane closures will be limited to off-peak periods. Coordination with emergency services regarding lane closures, etc. will be part of the TMP.

Impact CON-1: Traffic impacts during construction will not be substantial. Street closures and detours are not anticipated. **[Less-than-Significant Impact]**

2.22.2 Effects on Businesses during Construction

No roadway or driveway access to businesses is expected to be severed during the construction of the project.

Impact CON-2: Access to businesses will not be affected during construction of the proposed project. **[No Impact]**

2.22.3 Effects on Utilities during Construction

The project will require the relocation of a number of overhead and underground utility lines (e.g., electric poles, telephone poles, anchor poles, gas pipelines, water lines, fiber-optic cables, etc.) that are located within the footprint of the project. However, no disruption of any utility service(s) for an extended period of time (i.e., more than 24 hours) is expected to be necessary.

Impact CON-3: Disruption of utility service during construction will not be substantial. **[Less-than-Significant Impact]**

2.22.4 Air Quality Effects during Construction

Construction-related emissions are generally short-term in duration but may still cause adverse air quality impacts unless proper emission control measures are implemented.

Construction activities such as earthmoving, excavation and grading operations, construction vehicle traffic and wind blowing over exposed earth will generate exhaust emissions and fugitive particulate matter emissions that would affect local and regional air quality. Construction activities are also a source of organic gas emissions. Asphalt used in paving is a source of organic gases for a short time after its application. Solvents in adhesives, non-waterbase paints, and thinners would also evaporate into the atmosphere and would participate in the photochemical reaction that creates urban ozone. Many types of construction equipment emit diesel exhaust, which is known to result in adverse health effects.

Construction dust could affect local air quality at various times during construction of the project. The dry, windy climate of the area during the summer months creates a high potential for dust generation when and if underlying soils are exposed to the atmosphere.

The effects of construction activities would be increased dustfall and locally elevated levels of PM10 downwind of construction activity. Construction dust has the potential for creating a nuisance at nearby properties, and may constitute a health effect for children or persons with chronic health problems.

Standard Caltrans construction management practices are adequate to assure that associated air quality impacts will be minimal. These include requiring emission controls on construction equipment and spraying water on exposed surfaces to minimize dust.

Impact CON-4: Without proper emissions control measures in place, air quality impacts during construction could be substantial. **[Less-than-Significant with Mitigation Listed Below]**

The following measures will be implemented by the project for the purpose of avoiding or minimizing air quality effects during construction:

MM-CON-4.1: During construction, the project will follow Caltrans' Standard Specification 14-8.02, Standard Specification 10, and Standard Specification 18, which address the requirements of BAAQMD and dust control and dust palliative application, respectively.

MM-CON-4.2: The project will implement all feasible PM10 construction emissions control measures required by the BAAQMD, as indicated in Table 37.

2.22.5 Noise and Vibration Effects during Construction

Construction phases anticipated with the project would include demolition, clearing and grubbing, earthwork, construction of bridges and ramps (including pile driving), and paving. Each construction phase would require a different combination of construction equipment necessary to complete the task and differing usage factors for such equipment.

Highway construction activities typically occur for relatively short periods of time as construction proceeds along the project's alignment. Construction noise would mostly be of concern in areas where impulse-related noise levels from construction activities would be concentrated for extended periods of time (e.g., U.S. 101/SR 25 interchange, bridge widening or replacement), where noise levels from individual pieces of equipment are substantially higher than ambient conditions, or when impulse-related noise levels occur during noise-sensitive nighttime hours. Noise associated with the construction of the project would be a temporary effect that will cease upon completion of construction activities.

Construction of the project is anticipated to occur during daytime and nighttime hours. During the daytime, ambient traffic noise levels are on average about 69 dBA Leq(h) at the nearest unshielded locations. Construction activities proposed by the project would generate hourly average noise levels above ambient average daytime traffic noise levels when these activities occur within approximately 315 feet of existing sensitive receivers. At night, ambient average traffic noise levels are approximately 66 dBA Leq(h). Construction activities occurring within about 450 feet of receivers would generate hourly average noise levels above ambient traffic noise conditions.

Project-generated construction noise would primarily result from the operation of vehicles and equipment. The highest noise levels would result from impulsive construction techniques such as pile driving and demolition activities including the use of hoe rams. FHWA's Roadway Construction Noise Model was used to calculate the maximum and average noise levels anticipated during each phase of construction at a distance of 50 feet. Table 38 presents the construction noise levels calculated for each major phase of the project. Noise generated by construction equipment drops off at a rate of 6 dB per doubling of distance. Shielding by terrain or existing noise barriers could provide an additional 5 to 10 dBA of noise reduction.

TABLE 37

FEASIBLE CONTROL MEASURES FOR CONSTRUCTION EMISSIONS OF PM10

Basic Control Measures. The following controls will be implemented at all construction sites.

- Water all active construction areas at least twice daily.
- Cover all trucks hauling soil, sand, and other loose materials or require all trucks to maintain at least 2 feet of freeboard.
- Pave, apply water three times daily, or apply (nontoxic) soil stabilizers on all unpaved access roads, parking areas, and staging areas at construction sites.
- Sweep daily (with water sweepers) all paved access roads, parking areas, and staging areas at construction sites. Sweep streets daily (with water sweepers) if visible soil material is carried onto adjacent public streets.

Enhanced Control Measures. The following measures will be implemented at construction sites greater than four acres in area.

- Hydroseed or apply (nontoxic) soil stabilizers to inactive construction areas (i.e., previously graded areas inactive for 10 days or more).
- Enclose, cover, water twice daily, or apply (nontoxic) soil binders to exposed stockpiles (e.g., dirt and sand).
- Limit traffic speeds on unpaved roads to 24.1 kilometers per hour (15 miles per hour). Install sandbags or other erosion control measures to prevent silt runoff to public roadways.
- Replant vegetation in disturbed areas as quickly as possible.

Optional Control Measures. The following control measures are strongly encouraged at construction sites that are large in area, located near sensitive receptors, or for any other reason may warrant additional emissions reductions, but the project applicant is not required to implement.

- Install wheel washers for all exiting trucks, or wash off the tires or tracks of all trucks and equipment leaving the site.
- Install windbreaks or plant trees or vegetative wind breaks at windward side(s) of construction areas.
- Suspend excavation and grading activity when winds (instantaneous gusts) exceed 25 mph.
- Limit the area subject to excavation, grading, and other construction activity at any one time.

Source: Assessing the Air Quality Impacts of Projects, BAAQMD, December 1999.

TABLE 38		
CONSTRUCTION EQUIPMENT NOISE LEVELS AT 50 FEET		
Construction Phase	Maximum Noise Level (Lmax dBA)	Hourly Average Noise Level (Leq dBA)
Demolition	90	84
Clear and Grub	81	79
Earthwork	82	84
Paving	85	85
Structures (with pile driving)	101	95
Structures (without pile driving)	83	84
Source: U.S. 101 Improvement Project Noise Study Report, 2009.		

Impact CON-5: Noise from construction activities is likely to constitute a temporary annoyance at residences located along U.S. 101. Construction activities may also generate noticeable ground vibration at nearby residences, with pile driving being the construction source that could produce the greatest ground vibrations. **[Less-than-Significant with Mitigation Listed Below]**

The following measures will be implemented by the project for the purpose of avoiding or minimizing noise and vibration effects during construction:

MM-CON-5.1: All internal combustion engine driven equipment will be equipped with intake and exhaust mufflers that are in good condition and appropriate for the equipment.

MM-CON-5.2: Unnecessary idling of internal combustion engines within 100 feet of residences will be strictly prohibited.

MM-CON-5.3: Staging of construction equipment within 200 feet of residences will be avoided. All stationary noise-generating construction equipment, such as air compressors and portable power generators, will be located as far as practical from residences.

MM-CON-5.4: All construction equipment will be required to conform to Section 14-8.02 - Sound Control Requirements of the latest Standard Specifications.

MM-CON-5.5: Nighttime construction work within 450 feet of residential land uses will be avoided where feasible.

MM-CON-5.6: Demolition and pile driving activities will be limited to daytime hours to the greatest extent possible. If nighttime, demolition or pile driving is required, a construction noise monitoring program will be implemented to provide additional mitigation as necessary (in the form of noise control blankets or other temporary noise barriers, etc.) for affected receivers.

2.22.6 Water Quality Effects during Construction

The project will involve excavating and grading activities for the purpose of widening U.S. 101, constructing frontage roads, extending Santa Teresa Boulevard, reconstructing the U.S. 101/SR 25 interchange, and constructing related improvements (e.g., retaining walls, detention basins, etc.). These activities have the potential to degrade water quality in the form of sedimentation, erosion, and fuels/lubricants from equipment. In the project area, the water quality of various creeks and rivers could be affected by construction activities. Since these waterways support numerous wildlife and plant species, a short-term degradation of water quality could adversely affect such species.

Impact CON-6: Construction activities have the potential to adversely affect water quality in nearby creeks. [**Less-than-Significant with Mitigation Listed Below**]

In order to avoid or minimize the potential for water quality impacts to occur, the project will implement the following measures:

MM-CON-6.1: Active paved construction areas will be swept as needed.

MM-CON-6.2: Silt fencing or straw wattles will be used to retain sediment on the project site.

MM-CON-6.3: Temporary cover of disturbed surfaces or temporary slope protection measures will be provided per regulatory requirements and Caltrans' guidelines to help control erosion. Permanent cover/revegetation will be provided to stabilize the disturbed surfaces after construction has been completed.

MM-CON-6.4: No debris, soil, silt, sand, bark, slash, sawdust, cement, concrete, washings, petroleum products, or other organic or earthen material will be allowed to enter into or be placed where it may be washed by rainfall or runoff into any waterways.

MM-CON-6.5: Best Management Practices (BMPs) will be utilized by the contractor(s) during construction. The BMPs will be incorporated into a Stormwater Pollution Prevention Plan for the project, as required by Caltrans' NPDES permit.

2.23 CUMULATIVE IMPACTS

2.23.1 Regulatory Setting

Cumulative impacts are those that result from past, present, and reasonably foreseeable future actions, combined with the potential impacts of this project. A cumulative effect assessment looks at the collective impacts posed by individual land use plans and projects. Cumulative impacts can result from individually minor, but collectively substantial impacts taking place over a period of time.

Cumulative impacts to resources in the project area may result from residential, commercial, industrial, and highway development, as well as from agricultural development and the conversion to more intensive types of agricultural cultivation. These land use activities can degrade habitat and species diversity through consequences such as displacement and fragmentation of habitats and populations, alteration of hydrology, contamination, erosion, sedimentation, disruption of migration corridors, changes in water quality, and introduction or promotion of predators. They can also contribute to potential community impacts identified for the project, such as changes in community character, traffic patterns, housing availability, and employment.

CEQA Guidelines, Section 15130, describes when a cumulative impact analysis is warranted and what elements are necessary for an adequate discussion of cumulative impacts. The definition of cumulative impacts, under CEQA, can be found in Section 15355 of the CEQA Guidelines.

2.23.2 Impacts of the Build Alternative

In a cumulative impacts analysis, the identification of "past, present, and reasonably foreseeable future actions" can utilize either the "list approach" or the "adopted plan" approach. The list approach identifies specific projects in the vicinity, typically provided by a local planning department. The adopted plan approach relies on a general plan or transportation plan or other planning document, which by definition accounts for cumulative growth in a defined area.

For this analysis, the adopted plan approach was utilized for the assessment of cumulative traffic, noise, and air quality impacts as it is compatible with the nature of the proposed infrastructure project, which is to accommodate projected transportation demand over the long term. As examples, VTA's Countywide traffic model, which was utilized to project future build and no build conditions, is based on the planned growth of Santa Clara County, as contained in the adopted general plans of each jurisdiction within that county. The model also accounts for planned growth in adjacent areas, including the Monterey Bay Area.

In addition to the adopted plan approach, local agencies were contacted to determine if there were any recent and/or reasonably foreseeable projects adjacent to U.S. 101 that could contribute to one or more cumulative impacts. Two proposed projects were identified:

- The owners of the existing Freeman Quarry, which is located approximately 1,500 feet west of U.S. 101 and roughly 0.7 miles south of the U.S. 101/SR 25 interchange, have applied to Santa Clara County for approval to expand. [Note: The quarry is visible on Figures 3 and 4.] If approved, the area of the quarry's operations would expand from 60 acres to 150 acres and the annual volume of material to be extracted would increase from 500,000 tons to 1.5 million tons. This project is discussed below for subject areas where cumulative impacts could occur: traffic, visual, biology, and noise.
- Caltrans is proposing to upgrade/widen SR 25 to a 4-lane expressway between the UPRR crossing (just west of Bloomfield Avenue) and San Felipe Road in Hollister. The SR 25 project is adjacent to the U.S. 101 Improvement; the UPRR crossing of SR 25 is the boundary between the two projects. That project is currently undergoing environmental review. The SR 25 project is discussed below for the subject areas where cumulative impacts could occur: traffic, visual, biological resources, and farmlands.

The discussion, below, addresses only those resource areas where the project will result in an impact and, therefore, there is a potential for a cumulative impact. Per CEQA, if a project would not cause direct or indirect impacts on a resource, it would not contribute to a cumulative impact on that resource and need not be further evaluated.

2.23.2.1 *Cumulative Traffic Impacts*

For traffic, the Resource Study Area (RSA) was defined as the area within the project limits, as well as the surrounding area where the project will result in measurable changes in traffic patterns. Thus, the RSA includes the freeway segments, arterial streets, and intersections identified in the tables shown in Section 2.6.

Cumulative development has resulted in a significant increase in traffic on U.S. 101, SR 25, and in the project area as a whole, and future increases are projected to occur. As described in Section 2.6.2.5, the traffic forecasts that were prepared for year 2035 take into account traffic from future development planned for in the approved general plans of the cities in Santa Clara County. The forecasts also account for planned growth in the region, including the Monterey Bay Area, as well as planned improvements to the transportation network including the adjacent project that proposes to upgrade SR 25 to a 4-lane expressway.

The proposed expansion of Freeman Quarry will add up to approximately 40 additional AM peak-hour truck trips. There is no PM peak-hour traffic associated with the quarry as the quarry is prohibited from operating during that timeframe. Under existing conditions, all quarry-related traffic enters and exits U.S. 101 via a driveway located south of the U.S. 101/SR 25 interchange. Since there is a center divider on U.S. 101, traffic desiring to head north must first drive south on U.S. 101 to the Y Road/Betabel Road interchange before heading north. Under the No Build Alternative, this pattern will remain in place.

Under the Build Alternative, all quarry-related traffic will access U.S. 101 via the reconstructed U.S. 101/SR 25 interchange, which will be safer and will eliminate the existing circuitous route.

The improvements that would be constructed under the proposed project would not contribute toward any increase in traffic volumes on the roadway network. This statement is based on the fact that, unlike a development project that generates traffic (e.g., a shopping center, residential subdivision, industrial park, etc.), this project will not add traffic to the roadway network. Instead, this project, like most infrastructure projects, is intended to *accommodate* traffic demand.

As described in Section 2.6, the facilities to be constructed by the project will improve traffic safety and operations. Therefore, by definition, the project would not result in an adverse cumulative traffic impact because the project's overall traffic effect would be beneficial.

Impact CU-1: The project's overall effect on traffic will be beneficial and, therefore, the project will not result in an adverse cumulative traffic impact. **[No Cumulative Impact]**

2.23.2.2 *Cumulative Loss of Agricultural Land*

For agricultural lands, the RSA is defined as Santa Clara County, as that is the jurisdiction where the project will result in the loss of prime farmland. Although Santa Clara County encompasses more than 1,300 square miles, most of the County's prime farmland is located in the southern portion along both sides of U.S. 101, including the project segment.

Lands with soils that support prime agricultural uses are a finite resource. Cumulative development has resulted in a significant loss of prime farmland in Santa Clara County. Between 1984 and 2008, the acreage of prime farmland in Santa Clara County decreased from 38,000 acres to 18,800 acres, which is an average annual loss of approximately 800 acres.⁵⁰ Although programs such as Williamson Act contracts and the purchase of farmland conservation easements are in place to preserve this resource, the conversion of prime farmland to non-agricultural uses is typically a significant and unmitigable impact.

In the immediate project area, a project that would widen SR 25 to a 4-lane expressway is currently being evaluated by Caltrans. According to that project's Draft EIR/EIS, the upgrade of SR 25 to an expressway will result in the loss of 85 acres of prime farmland in Santa Clara County.

As discussed in Section 2.3, the proposed project will result in the loss of 156.8 acres of prime farmland under Design Option A and 121.8 acres of prime farmland under Design Option B. Although the project

⁵⁰Source: California Department of Conservation, Farmland Mapping & Monitoring Program, Historic Land Use Conversion for Santa Clara County (1984 - Present) [www.conservation.ca.gov].

proposes to purchase farmland conservation easements, this impact cannot be mitigated to a less-than-significant level.

Impact CU-2: The loss of agricultural lands from cumulative development would be significant, and the contribution of the proposed project to this impact would be considerable. **[Significant Cumulative Impact]**

2.23.2.3 *Cumulative Impacts to Biological Resources*

For biological resources, the RSA encompasses the project footprint and those adjacent lands where an indirect effect could occur.

Historically, cumulative development has resulted in a substantial loss of valuable ecological habitats in the greater project area including wetlands, oak woodlands, riparian and aquatic. The loss of these and other habitats has directly impacted many plant and animal species, resulting in direct threats to the continued existence of a number of species. Another related effect of cumulative development has been the creation of barriers and hazards to the migration of animals along various wildlife corridors.

All of these factors led to the enactment of various statutes, regulations, and policies whose goals are to halt, and in many cases reverse, this trend. These include the federal Endangered Species Act, the California Endangered Species Act, the Clean Water Act, the Porter-Cologne Water Quality Control Act, NEPA, and CEQA. These statutes require private and public projects to include measures that avoid and/or fully mitigate for impacts to sensitive habitats and the special-status species that are found within them. The proposed Santa Clara Valley HCP/NCCP, in which this U.S. 101 Improvement Project is a “covered activity”, is an effort to address this issue on a large-scale, as opposed to a piecemeal, basis.

In the case of the proposed project, while it would result in impacts to various habitats and special status animal species, it would not contribute to cumulative impacts because mitigation and avoidance measures are included in the project. Specifically, all loss of sensitive habitats resulting from the proposed highway improvements will be fully mitigated by the creation of replacement habitats. In fact, replacement-to-impact ratios are greater than 1:1. See Section 2.17, *Natural Communities*, Section 2.18, *Wetlands*, Section 2.20, *Animal Species*, and Section 2.21, *Threatened & Endangered Species*.

The proposed project would also include measures that would not only mitigate for impacts to wildlife movement, but would improve the ability of wildlife to traverse the U.S. 101 corridor relative to existing conditions. These measures include the replacement of existing culverts with those that are more conducive to use by wildlife, the construction of additional undercrossings, and the use of “wildlife fencing”. Please see Section 2.17, *Natural Communities*, for details. The net effect of these measures is that the project would not contribute to cumulative impacts to wildlife movement.

Similarly, the proposed improvements to SR 25 and the expansion of Freeman Quarry, if approved, would not contribute to the cumulative loss of sensitive habitats because mitigation and avoidance measures will be required by regulatory agencies as conditions of approval.

Impact CU-3: The project would not contribute to a cumulative impact on important biological resources. **[No Cumulative Impact]**

2.23.2.4 *Cumulative Air Quality Impacts*

For air quality, the RSA was defined as the land uses adjacent to the freeway segments within the project limits. These land uses are those where project-related changes, coupled with increased traffic from ongoing growth, could result in cumulatively substantial increases in emissions of air pollutants.

Cumulative development has resulted in a substantial degradation in ambient air quality in the greater project area. However, due to emissions control technology, overall air quality has been improving in recent years. Although most present and future development will likely increase emissions, improvements in technology are largely expected to offset such increases. Regulatory strategies, including compliance with California's AB 32 (see Section 2.15), will also lead to a reduction in emissions.

The proposed project will not contribute to the region's emissions because it will not generate additional vehicle trips. Further, as described in Section 2.14, exceedances of federal and state carbon monoxide standards are not expected in the project area, either with or without the proposed project.

Impact CU-4: Although growth in the region will continue, improvements in technology and the implementation of regulations aimed at emissions reductions are expected to offset the air quality effects of such growth. **[Less-than-Significant Cumulative Impact]**

2.23.2.5 *Cumulative Noise Impacts*

For noise, the RSA was defined as the land uses adjacent to U.S. 101 within the project limits. These land uses are those where project-related changes, coupled with increased traffic from ongoing growth, could result in cumulatively substantial increases in noise.

As discussed in Section 2.16, the primary source of noise in the project area is traffic on U.S. 101. The improvements that will be implemented under the proposed project, including the highway widening, new U.S. 101/SR 25 interchange, and the new frontage roads, will affect noise levels at adjacent land uses. The change in noise will vary by location, and will range from a decrease of 1 dBA to an increase of 9 dBA, which is less than the 12-dB increase that would be considered substantial. These changes in noise account for both the improvements proposed by the project and the increase in traffic that will result from cumulative development.

If approved, any additional noise from expanded mining activities at the Freeman Quarry will not combine with noise from U.S. 101 at any given receptor. This conclusion is based on the fact that the quarry is separated from U.S. 101 by elevated terrain and 1,500 feet horizontally. Therefore, noise from these two noise sources will not be cumulative.

The previous paragraph notwithstanding, it is estimated that there will be approximately 40 additional peak-hour truck trips associated with expanded quarry operations. These trucks will use the new frontage road to travel between the quarry and U.S. 101, which will add to the noise increases associated with the proposed project at two single-family residences, Receptors 21 and 22 in Table 32. Noise associated with these truck trips will add roughly 1 dBA to the noise levels shown in Table 32 for these receptors. This increase would not be cumulatively significant.

Impact CU-5: Noise increases from the proposed project, ongoing development in the region, and the proposed Freeman Quarry expansion will not be cumulatively significant. **[Less-than-Significant Cumulative Impact]**

2.23.2.6 *Cumulative Visual Impacts*

For visual impacts, the RSA consists of the area encompassing the four key viewpoints described in Section 2.7. The key viewpoints were chosen to help evaluate the project's visual impact as experienced by viewers at various locations in the vicinity of U.S. 101. These viewpoints are representative of the visual environment experienced by a cross-section of viewers.

As discussed in Section 2.7, changes to the visual setting due to the proposed project will primarily occur in the vicinity of the reconstructed U.S. 101/SR 25 interchange. Such changes, which are represented in the four key views, will result from the new SR 25 structure over U.S. 101, new ramps, new frontage roads, the extension of Santa Teresa Boulevard, and new retaining walls. Visual impacts associated with components of the project unrelated to the U.S. 101/SR 25 interchange would not be substantial.

The visual changes associated with the adjacent proposed SR 25 Expressway Project will not occur in the same location as the four key viewpoints that comprise the RSA.

Freeman Quarry is not visible from the segment of U.S. 101 that is in the vicinity of the U.S. 101/SR 25 interchange as there is intervening elevated terrain. The quarry is only visible from U.S. 101 at greater distances such as near the U.S. 101/Sargent bridges over the UPRR and Tar Creek. Therefore, any changes in the visual setting that will result from the expansion of the quarry will not combine with visual changes due to the proposed project to create cumulative effects.

Impact CU-6: Visual impacts from the proposed project will not occur in the same viewshed as the visual impacts from the expansion of Freeman Quarry and the upgrade of SR 25 to an expressway. **[No Cumulative Impact]**

2.23.2.7 *Cumulative Hazardous Materials Impacts*

The RSA for hazardous materials is defined as the footprint of the project as the effect of the project with regard to exposure to hazardous materials is limited to the construction area.

The proposed project, along with other development, has the potential to expose construction workers to the adverse effects of hazardous materials (e.g., ADL, lead-based paint, asbestos-containing building materials, etc.). However, implementation of mitigation and avoidance measures, such as those listed in Section 2.13, *Hazardous Materials*, are required on a project-by-project basis to avoid or reduce hazardous materials impacts to a less than significant level. Specifically, regulations set forth by the Occupational Safety & Health Administration (OSHA), EPA, and other agencies are designed to prevent construction workers from exposure to hazardous materials at levels that would be cumulatively significant. Therefore, cumulative development will not result in a significant cumulative hazardous materials impact and the proposed project will not contribute towards a significant cumulative impact.

Impact CU-7: Exposure to hazardous materials from the proposed project and ongoing development in the region will not be cumulatively significant. [**Less-than-Significant Cumulative Impact**]

2.23.2.8 *Cumulative Water Quality Impacts*

The RSA for water quality is defined as the watersheds within which the project is located.

Runoff from past and existing development, as well as from agricultural operations, has been identified as a significant source of water pollution. Runoff flows untreated to local creeks, rivers, San Francisco and Monterey Bays, and the ocean, carrying pollutants that are detrimental to the beneficial uses of these water bodies. Examples of pollutants commonly generated include: sediment from construction sites; pesticides, herbicides, and fertilizers from agricultural fields; products of internal combustion engine operation such as hydrocarbons from automobiles; heavy metals, such as copper from automobile brake pad wear and zinc from tire wear; dioxin as a product of combustion; mercury resulting from atmospheric deposition; and naturally-occurring minerals from local geology.

In addition to the pollution issue, the increased peak flows and volumes of stormwater associated with urbanization have led to adverse impacts such as bank erosion, channel widening, flooding, channel modification and loss of the natural floodplain. This occurs because development typically increases the amount of impervious surface area within a watershed by converting natural ground cover to impervious surfaces such as paved highways, streets, rooftops, and parking lots, thereby diminishing the stormwater retention, detention and purification characteristics provided by the vegetated soils.

In the project area, runoff from U.S. 101, SR 25, and local roadways contributes to the degradation of water quality, as does runoff from the many acres of farmland in the project area. The proposed project will add to the amount of impervious surfaces in the area, which will contribute to a degradation in water

quality for the reasons stated above. The proposed improvements to SR 25 will have similar impacts. The proposed expansion of Freeman Quarry will also have the potential to affect water quality due to the increase in mining activities.

In recent years, however, new regulations promulgated by the U.S. EPA and California Department of Water Resources have gone into effect that are requiring individual projects to incorporate measures that will offset these impacts. For example, as discussed in Section 2.10, the proposed project is incorporating biofiltration strips and swales into its design for the purpose of treating highway runoff before discharge into local waterways. If approved and constructed, the SR 25 project will be required to incorporate water treatment features into its design. Similarly, Freeman Quarry will be required to comply with an industrial NPDES permit that contains specific provisions related to avoiding the water quality impacts associated with quarrying activities. The intent of the new regulations is that each project should be responsible for treatment of its water quality impacts, thereby avoiding a cumulative degradation of water quality over the long-term.

Impact CU-8: In view of the applicability of ordinances, laws and regulations that would avoid the occurrence of significant water quality impacts, it is concluded that cumulative water quality impacts will not be significant. **[Less-than-Significant Cumulative Impact]**

2.23.2.9 *Cumulative Floodplain Impacts*

For floodplains, the RSA is defined as the floodplains crossed by the project segment of U.S. 101.

As discussed in Section 2.9, the proposed project has been designed to avoid and mitigate impacts to the floodplains that will be affected by the highway improvements. Further, upon completion of the project, the degree to which U.S. 101 is subject to flooding will be less than that which occurs under existing conditions. This has been achieved through a combination of culverts, pipes, bridges, detention basins, and a flood control channel that will be constructed as an integral part of the project. Therefore, the project will not contribute to any cumulative floodplain impacts.

Impact CU-9: The project has been designed to avoid floodplain impacts. **[No Cumulative Impact]**

2.23.3 **Impacts of the No Build Alternative**

Under the No Build Alternative, there would be no changes to existing facilities and, therefore, no environmental impacts on the existing environment. Since the No Build Alternative would not result in environmental impacts, by definition there would be no cumulative impacts.

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, interagency coordination meetings, a scoping meeting, presentations to neighborhood groups, and meetings with commercial property owners. This chapter summarizes the results of Caltrans' and VTA's efforts to fully identify, address and resolve project-related issues through early and continuing coordination.

Substantial coordination, outreach, and public participation regarding the proposed project have occurred, which is summarized as follows:

- >> On June 7, 2007, a coordination meeting was held with the City of Gilroy regarding floodplain issues. Additional coordination meetings with the City of Gilroy were held on February 12, 2008 and December 6, 2008.
- >> On December 13, 2007, the project team met with the staff of the Santa Clara Valley Water District to discuss floodplain and hydrologic issues and concerns.
- >> On June 12, 2007, a coordination meeting was held with PG&E to discuss the relocation of a number of electrical transmission towers.
- >> On February 27, 2008, a field meeting was held with PG&E to discuss utility coordination and relocation issues.
- >> The project team met with the following stakeholders to discuss the project and to solicit input: Rapazzini Winery (August 15, 2007, September 21, 2007, and June 12, 2008); Gavilan College (August 9, 2007 and October 25, 2007); and Christopher Ranch (August 9, 2007).
- >> A Notice of Preparation of an EIR was circulated to local, regional, state, and federal agencies from October 31, 2007 through November 30, 2007.
- >> An Environmental Scoping Meeting was held in Gilroy on November 15, 2007. Approximately 40 persons attended the meeting.
- >> A coordination meeting between the project team and the San Benito County Planning and Public Works Departments was held on April 25, 2008.
- >> On May 21, 2008 and December 5, 2008, coordination meetings were held between the project team and the Santa Clara County Roads & Airports Department.

- >> During 2007, Native American consultation was undertaken for the project by VTA on behalf of Caltrans. The Native American Heritage Commission (NAHC) was contacted. Based on a list provided by the NAHC, 13 members of the local Native American community were also contacted. Members of the Ohlone community were also kept informed of the backhoe trench work that was undertaken for the project.
- >> On March 27, 2007, VTA and the project's designers met with Chris Nagano and Cori Mustin of the USFWS and David Johnston of the CDFW at the VTA offices to go over the project and then tour the project site. Comments received during the meeting and site visit were noted.
- >> On November 15, 2007, VTA submitted the project through the Interim Project Review Process of the Santa Clara Valley HCP/NCCP. This submittal included the Notice of Preparation for this EIR, a map of the project, a project description, biotic habitats map based on the BSA, and the preliminary information on the biological resources within the BSA. This information was also sent via e-mail to Cori Mustin of the USFWS, Jonathan Ambrose of the NMFS, and David Johnston of the CDFW.
- >> On December 5, 2007, VTA received a written response from the NMFS to the Interim Project Review Process submittal. This letter was similar to that received during the EIR scoping period.
- >> On December 12, 2007, VTA staff and the project's biologists attended an HCP/NCCP meeting held at Mare Island. Verbal comments were received on the project from Jonathon Ambrose of the NMFS and Cori Mustin & Chris Nagano of the USFWS and were noted.
- >> On December 18, 2007, VTA staff, Caltrans staff, the project's biologists, and the project's designers met with David Johnston and Laura Diaz-Anderson of the CDFW to tour the project site. Comments received during the site visit were noted.
- >> On February 25, 2008, a follow-up e-mail to the 15 November 2007 e-mail was sent through the HCP/NCCP Interim Project Review Process to the same resource agency staff. The purpose was to provide updated project information including a new project map that incorporated design changes, which also changed the BSA, revised information on the biological resources within the BSA, and a table describing existing and future creek crossing and median designs.
- >> On February 26, 2008, VTA staff, Caltrans staff, the project's biologists, and the project's designers met with David Johnson of the CDFW to discuss wildlife connectivity. The designers have refined the design to the extent feasible to address issues raised by Mr. Johnston.
- >> On July 18, 2008, a second follow up e-mail to the November 15, 2007 and February 25, 2008 e-mails was sent to Jonathan Ambrose of the NMFS. The purpose was to provide updated

project information, in particular the updated information included in the table describing existing and future creek crossing and median designs (previously sent on February 25, 2008).

- >> Ongoing e-mail coordination with CDFW regarding the contents of the project's biological studies.
- >> On September 11, 2007, December 5, 2007, and January 18, 2008, meetings were held with the Santa Clara County Parks & Recreation Department to solicit input regarding trails and bicycle facilities.
- >> On January 23, 2009, the project team met with the staffs of the Santa Clara County Parks & Recreation Department and the Bay Area Ridge Trail Council to ensure consistency between the proposed improvements and existing/planned trails, bikeways, and recreational facilities.
- >> On November 9, 2010, VTA staff, Caltrans staff, the project's biologists, and the project's designers met with David Johnson of the CDFW to discuss wildlife connectivity, as well as to discuss impacts to the California tiger salamander.
- >> The VTA website (www.vta.org) contains an overview of the project, a project "FAQ", and information about the schedule for the project's approval and construction (including a listing of upcoming public meetings). The website also provides an opportunity for people to submit comments and questions regarding the project.

Noticing, Circulation, and Review of the Draft EIR

The Draft EIR was made available for public review and comment from March 14, 2013 to April 29, 2013. In addition, a public hearing was held at the Gilroy Public Library on March 28, 2013. Notices of the availability of the Draft EIR and the public hearing were provided to the public via multiple methods including:

- Notices were printed in local newspapers including the Morgan Hill Times, the Gilroy Dispatch the Hollister Freelance News, Viet Nam, Philippines Today, Sing Tao Daily, Korea Times, and El Observador.
- Notices were mailed to approximately 950 business and residential addresses (landlord and tenant) located within a one-half mile radius of the project alignment.
- Notices were electronically mailed to federal, state, and local agencies and organizations, as well as interested stakeholders
- Notices were posted on VTA's Twitter and Facebook links, as well as on VTA's website.
- Notices were posted with the County of Santa Clara, the County of San Benito, and the State Office of Planning and Research (State Clearinghouse).
- News releases were provided to local media outlets.

- Notices were provided to the Gilroy Public Library, Morgan Hill Public Library, San Benito County Library, and San Juan Bautista Library.

The March 28th hearing was attended by approximately 25 members of the public from San Juan Bautista, Gilroy, and San Jose. A representative from the office of Santa Clara County Supervisor Mike Wasserman also attended, as did a member of the Gilroy Planning Commission and the Gilroy Traffic Engineer.

Materials provided at the hearing included Fact Sheets in English and Spanish. Copies of the Draft EIR were available at the hearing and were provided to members of the public, on request. Comment cards were also provided. The hearing included display boards, as well as a PowerPoint presentation by VTA staff on the project and its environmental effects.

All comments on the Draft EIR, both written and oral, are responded to in Chapter 4 of this document. A copy of each written comment is contained in Appendix F. A copy of the public hearing transcript, which contains the verbatim oral comments, is contained in Appendix G.

CHAPTER 4 RESPONSES TO COMMENTS ON DRAFT EIR

The Draft EIR was made available for public review and comment from March 14, 2013 to April 29, 2013. Comments received, including the page on which the response(s) to comments begins, are shown below. A copy of each written comment is contained in Appendix F. The transcript, which contains the verbatim oral comments from the March 28, 2013 public meeting, is contained in Appendix G.

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**RESPONSE TO COMMENT #1:
CALIFORNIA DEPARTMENT OF CONSERVATION**

Comment 1-A: The VTA DEIR does not acknowledge that 282-acre Wang Farm Agricultural Conservation Easement ("Wang Farm") may be impacted by the proposed project. The Wang Farm (Figure 1) is under a permanent agricultural conservation easement held by the Silicon Valley Land Conservancy.

The Department's CFCP and the United States Department of Agricultural, National Resource Conservation Service, Farm and Ranch Land Protection Program provided grant funding to purchase of the Wang Farm in 2005. As part of the original application, both the City Council of the City of Gilroy and the Santa Clara County Board of Supervisors passed resolutions of support on July 7, 2003 and June 24, 2003, respectively, supporting establishment of the Wang Farm Agricultural Conservation Easement, which was designated to be held in perpetuity. Terminating portions of the easement and fragmentation of the remaining agricultural property is directly at odds with the intent of the easement and the City's and County's support of the easement. Any future changes to use of this property would require permission of the United States Department of Agriculture.

The implications of this potential easement disruption are beyond the scope of the DEIR itself, but must be addressed if VTA chooses to continue with the project as described.

***Response 1-A:** Thank you for this information. Table 10 has been revised in the Final EIR to disclose the fact that two of the parcels from which right-of-way would be required are part of the 282-acre Wang Farm Agricultural Conservation Easement. This impact would be associated with the upgrade of the existing property access road (which is currently partially paved) to a full standard access road. This was included in the project because an upgrade is typically required by property owners when an adjacent highway is improved to freeway standards.*

In light of this comment, there are alternatives that VTA can discuss with the owners of the parcels: 1) eliminate the access road upgrade altogether and construct a retaining wall in lieu of the embankment along the existing right-of-way line, or 2) undertake a more limited improvement to the access road that would minimize impacts. These options can be discussed with the owners and the easement holder during the final design phase of the project.

**RESPONSE TO COMMENT #2:
CALTRANS - DISTRICT 4**

Comment 2-A: Section 1.2 - The second purpose "Accommodate projected traffic demand along U.S. 101 ..." and the fifth purpose "Enhance the movement of ..." have no correlating need statement or data. Information demonstrating the future congestion and delay needs to be included in the need section of

the document. The same information is lacking to demonstrate that the movement of goods along U.S. 101 is a problem.

Response 2-A: *VTA disagrees that there is no correlating need statement or data. Section 1.2.2.1 discusses the fact that the project segment of U.S. 101 "has insufficient capacity to accommodate future demand..." That same section states that the insufficient capacity will result in delays and congestion, which will result in "substantial social, economic, and environmental impacts associated with delays in the movement of people and goods." The discussion in Section 1.2.2.1 is supported by the data in Section 2.6.*

Comment 2-B: Section 2.6 - All tables and information (including but not exclusively Tables 19 and 20) in this section should be updated so the information in the Final Environmental Impact Report (FEIR) matches and is consistent with the information in the Project Report and TOAR. The information in the Draft Environmental Impact Report does not match/is not consistent with that in the Draft Project Report and TOAR.

Response 2-B: *VTA compared the data in all of the tables in Section 2.6 of the EIR (including Tables 19 and 20) to the tables in the TOAR, which was made available for public review during circulation of the Draft EIR. No inconsistencies were found.*

Comment 2-C: Section 2.8.1 - Please edit the final sentence of the section to read: It further specifically requires Caltrans to inventory, evaluate for significance, assess effects, and early in the planning process give notice and opportunity to comment to the SHPO.

Response 2-C: *This edit has been made, as requested. See Section 2.8.1 of the Final EIR.*

Comment 2-D: Section 2.8.2.2 - The numbers of resources discussed do not add up. 12 resources are mentioned, but only six are discussed as eligible or ineligible. This document as currently written obfuscates which resources are of maybe in State Right of Way, and are thus subject to PRC 5024.6. Eligible and potential effects for the remaining six sites not specifically have not been completed and the SHPO has not been consulted. This process must be completed prior to approval of the FEIR, to be in compliance with PRC 5024.5.

Response 2-D: *VTA disagrees that the document obfuscates those resources that are in the existing/proposed right-of-way. Section 2.8.2.2 states that there are 12 such resources, each of which is identified and described in the accompanying Table 22. Further, MM-CUL-1.1 in Section 2.8.5 sets forth the process to be followed by VTA for follow-up identification, evaluation, and mitigation (if warranted) of all historical resources prior to construction. Consultation with the SHPO will occur during this process, consistent with PRC 5024.5. There is no requirement in PRC 5024.5 that such consultation be undertaken prior to completion of a FEIR.*

**RESPONSE TO COMMENT #3:
CALTRANS - DISTRICT 5**

Comment 3-A: Page XIV: Impact NATCOM-4: By adding the word "permanent" in the following sentence it precludes barriers that might be used during construction such as cofferdams and diversions. "Construction of the proposed project will not create permanent barriers to the..."

Response 3-A: *The text in Impact NATCOM-4 has been revised to clarify that the project will not create permanent barriers to the passage of fish.*

Comment 3-B: Page XIX: MM-Animal - 9: The project is permanently removing up to 5.5 acres of riparian and oak woodland. This will undoubtedly have an impact on bats that use the area for both foraging and roosting. It is tremendously difficult to detect a bat roost in a tree (personal communication with J. Szewczak during tree removal on another project I had), therefore there may be roosts that go undetected during tree removal. Bat habitat should be provided as part of this project to help offset permanent impacts to them as a result of this project. This habitat may be incorporated into new bridge structures (several have been constructed or are in the process of being constructed in District 5) or merely an Oregon wedge type design has also been found to be successful on an existing or new structure. Off-bridge habitats have not been found to be very successful in Central/Northern California.

Response 3-B: *As shown in Table 34, under Design Option A, 8 acres of riparian habitat and 2 acres of oak woodland habitat are permanently impacted. Under Design Option B, 8 acres of riparian habitat and 1.5 acres of oak woodland habitat are permanently impacted. Avoidance and minimization measures to address roosting bats occupying these habitats include preconstruction surveys by a qualified bat biologist, buffers around active maternity roosts, and eviction of bats only under certain conditions, as described in MM-ANIMAL-9.4. Overall, the loss of potential roost sites in trees will affect only a very small proportion of available habitat in the project vicinity and regional area, and alternative roosts will be provided if a day roost is impacted, as described in MM-ANIMAL-9.5.*

Three of the 10 bridges surveyed showed evidence of bat use or potential roosting habitat: 1) northbound U.S. 101 bridge over Carnadero Creek, 2) southbound U.S. 101 bridge over the Southern Pacific Railroad and Tar Creek, and 3) northbound U.S. 101 span of the San Benito River bridge. Under both design options, the northbound U.S. 101 bridge over Carnadero Creek will be used for the new frontage road. The southbound U.S. 101 bridge over the Southern Pacific Railroad and Tar Creek will be widened by over 100 feet. The northbound U.S. 101 span of the San Benito River bridge will be widened by 25 feet. Therefore, these structures will remain suitable as bat habitat.

For the remaining bridge structures that are to be modified or replaced, Caltrans has expressed concerns over creating bat habitat that increases costs and safety precautions necessary for

inspecting bridges, and reduces the flexibility in the timing of those inspections (Caltrans, Division of Research and Innovation, "The Effectiveness of Off-Structure Bat Houses Meeting Attraction/Mitigation Regulatory Agency Requirements for State Highway Projects"). During final engineering, VTA will revisit the potential for bat habitat on the bridge structures; however, this would be an enhancement to the project and not required mitigation.

According to H. T. Harvey & Associates bat biologist Dave Johnston, Ph.D., detection of bat roosts in trees is feasible if performed by a qualified biologist using appropriate techniques. First, a qualified bat biologist would inspect all trees that are to be removed visually to determine which provide potential roost sites. Acoustic monitoring equipment would then be deployed to determine whether bats are roosting in the vicinity of these potential roosts. Because such acoustic monitoring equipment cannot detect the precise roost location (only whether concentrations of bats are present in a given area), the bat biologist would then use a combination of acoustic and visual monitoring (e.g., using the acoustic equipment to detect when bats are emerging from a roost and night-vision equipment to see bats moving to and from a roost) to identify the roost site. Dr. Johnston has used this technique to perform surveys for tree roosts of bats as described in MM-ANIMAL-9.1.

Thus, detecting whether the project will impact a day roost is feasible, and MM-ANIMAL-9.5 identifies compensatory mitigation to offset the loss of any day roost.

Comment 3-C: Page XX: MM-Animal-12.1: Permits that are currently being issues from CDFW have nest buffers for passerines and raptors of 250 and 500 feet, respectively.

Response 3-C: *It is not necessarily the case that all permits issued by the California Department of Fish and Wildlife (CDFW) incorporate buffers for passerines and raptors of 250 and 500 feet, respectively. The standard used in Santa Clara County is generally 100 feet for passerines and 300 feet for raptors. In addition, buffer zones may be adjusted to reflect existing conditions including ambient noise, topography, and disturbance, with the approval of CDFW (personal communication with Dave Johnston, CDFW, May 6, 2013).*

The text in MM-ANIMAL-12.1 has been revised to reflect the recent communication with CDFW regarding buffers, timing of preconstruction surveys, and the start of the nesting season.

Comment 3-D: Page XXI: MM-T&E-2.4: Although the creeks and rivers are not expected to provide good breeding habitat for frogs, frogs could still be present during dewatering or diversion activities. There is no mention of appropriate methods to put in place during dewatering or diversion as is discussed in the steelhead section.

Response 3-D: *It is unknown what the commentor means by "appropriate methods."*

Measures to protect steelhead during dewatering or diversion would also protect California red-legged frogs. MM-T&E-2.4 requires that a U.S. Fish and Wildlife Service (USFWS) approved biologist conducts preconstruction surveys for red-legged frogs in aquatic habitat, as well as other habitats where frogs may be found. If frogs are found, they are relocated outside the work area in appropriate habitat. Measures to protect California red-legged frogs, and other aquatic vertebrates, are also included in Chapter 6 (Table 6-2) of the Santa Clara Valley Habitat Conservation Plan/Natural Community Conservation Plan (HCP/NCCP), which states, "If native fish or non-covered, native aquatic vertebrates are present when cofferdams, water bypass structures, and silt barriers are to be installed, a native fish and aquatic vertebrate relocation plan shall be implemented when ecologically appropriate as determined by a qualified biologist to ensure that significant numbers of native fish and aquatic vertebrates are not stranded." This information is included in the Natural Environment Study, Appendix C. As the project is included in the HCP/NCCP as a covered activity, the conditions on projects, as applicable, will be implemented.

Comment 3-E: Page XXII: MM-T&E-2.15: Silt fencing or Ertec fencing should be considered to exclude species from the construction zone, especially around the Castro Valley area.

Response 3-E: *As stated in this mitigation measure, "Construction of wildlife exclusion fencing around a project's impact areas is a standard practice to minimize the potential for red-legged frogs (or other species, such as the California tiger salamander) to enter, and be injured or killed in, construction areas. However, such fencing over such a long, linear project area would adversely affect the dispersal of some smaller mammals through the project area. Such fencing is not required by the HCP/NCCP, and is not proposed for this project."*

If the USFWS or CDFW choose at a later date (e.g., during Federal or California Endangered Species Act consultation, if portions of the project are not covered by the HCP/NCCP), to require temporary wildlife exclusion fencing, the type of fencing will be determined at that time. For VTA's recent projects, the USFWS/CDFW and Caltrans have refrained from requiring a particular brand name of fence, such as Ertec, and instead have required fencing that is simply approved by the USFWS/CDFW.

It should be noted that this issue is addressed in the Natural Environment Study (NES). Caltrans approved the NES on April 8, 2011.

Comment 3-F: Page 173: 2.17.3.4: Same comment as #1.

Response 3-F: *Please see Response 3-A.*

Comment 3-G: Page 177-178: The new and enhanced culverts for wildlife crossing should have post-construction monitoring to determine if the methods were successful and ways to improve in the future.

Response 3-G: *Please see Response 17-D.*

Comment 3-H: Page 196: 2.20.3.9 Impacts to Bats: See Comment #2. Removal of riparian and woodlands has a direct impact on bats, bridges are not the only bat habitat type in the project area.

Response 3-H: *Please see Response 3-B. In addition to impacts to natural habitats and bridge structures, buildings can serve as bat habitat. This is also discussed in the EIR and Natural Environment Study (NES). VTA believes the discussion of bats and the inclusion of several avoidance, minimization, and mitigation measures in the project adequately addresses potential impacts to individual bats and bat habitat. VTA was under the impression the Caltrans reviewer of the NES, who is also the author of these comments on the Draft EIR, was in agreement with the analysis included in the NES, which is summarized in the EIR, as Caltrans approved the NES on April 8, 2011. The issues regarding bats the commentor is raising at this time have been reviewed by VTA's biological consultant, who has determined that the extensive consideration bats have received in the analysis is appropriate.*

Comment 3-I: Page 202: MM-Animal - 9.5: See Comment #2. The document refers to the day roosting areas on the Tar Creek Bridge that will be impacted, yet no mitigation is being offered for this roost. Just because it is not a maternity roost does not mean that it is not important for bats. Even night roosts, when disturbed, can impact the distance that bats have to fly to and from their foraging locations, therefore lowering productivity - so it should not be discounted.

Response 3-I: *Several bat species and roosts were identified on the southbound U.S. 101 bridge over Tar Creek during biological surveys including Yuma myotis (small numbers day roosting; night roost), big brown bat (possible night roost), and Mexican free-tailed bat (small numbers day roosting; night roost). The analysis in the NES and EIR does not discount the importance of any of the bat species and roosts in the project area. Even though the species potentially day-roosting on the Tar Creek bridge are regionally common, and even though only small numbers of these bats are expected to day-roost on this bridge (since they roost in and/or between swallow nests rather than in high-quality sites such as extensive cavities), alternative roosts will be provided if a day roost of any bat species will be impacted, even if the impact is temporary, and will be erected at least one month (preferably one year or more) prior to removal of the original roost structure.*

In some circumstances, it may be beneficial to allow roosting bats to continue using a roost on a bridge structure during construction, rather than evict the bats. It should be noted that VTA's recent experience with the U.S. 101 Auxiliary Lanes Project (Route 85 to Embarcadero Rd)

indicated that bats did not use the alternative roost structures provided, but did return to the bridge after construction was completed.

Comment 3-J: Page 203: MM-Animal-9.6: Just because a non-maternity colony of bats are using a structure does not justify not providing alternative roosts or lack of monitoring.

Response 3-J: *Please see Responses 3-B, 3-H, and 3-I.*

Comment 3-K: Page 204: MM-Animal - 12.1: Same as Comment #3.

Response 3-K: *Please see Response 3-C.*

Comment 3-L: Page 210: CTS Section: CTS is no longer a candidate - it is state listed as threatened.

Response 3-L: *The text in Section 2.21.2 of the EIR has been revised to reflect the change in status for the California tiger salamander.*

Comment 3-M: Section 2.17.4, Pg 174, discussion on the HCP, 3rd paragraph: The HCP was adopted in August 2012 and the EIR should reflect that it's no longer a work in progress.

Response 3-M: *The text in Sections 2.1.2.1 and 2.17.5 of the EIR has been revised to reflect the recent activity related to the Santa Clara Valley HCP/NCCP, including the adoption of the Plan and pending implementation. Note that there are six Local Partners involved with preparation and implementation of the Plan. Each Local Partner adopted the Plan separately. The VTA Board of Directors adopted the Plan on December 13, 2012. The City of San Jose was the last Local Partner to adopt the Plan on January 29, 2013. Implementation of the Plan is anticipated in late 2013.*

Comment 3-N: Section 2.21.2.2, Pg 210, California Tiger Salamander, 2nd paragraph: CTS are no longer a "candidate species" they were State listed under CESA in 2010.

Response 3-N: *Please see Response 3-L.*

RESPONSE TO COMMENT #4: GAVILAN COLLEGE

Comment 4-A: I am writing on behalf of Gavilan College, located at 5055 Santa Teresa Blvd in Gilroy. Most of our staff and students will be directly impacted by the proposed project: U.S. 101 Improvement Project between Monterey Street and State Route 129. In reviewing the EIR, our priority was continued access to, and egress from, the existing college campus. We considered the peak traffic times to and

from the campus under the proposed scenarios. The location of our primary concern is the Hwy 25/Hwy 101 interchange, and the portion of Santa Teresa Blvd from this interchange to the college entrance. We would like to make sure the following considerations are noted and addressed:

Both options show a single lane in each direction on Santa Teresa Blvd between the college and the proposed highway 25/101 interchange. Given the large numbers of staff and students who arrive on campus (and leave) at the same time, we question whether one lane will be sufficient in this location. As it stands now, many staff and students approaching the Gavilan College campus from the north use either Mesa Road or Castro Valley Road to exit Hwy 101. When both of these are closed, the students coming from the north (as well as those from San Benito County) will use the Santa Teresa Blvd exit.

Response 4-A: *The trips generated to and from Gavilan College were accounted for in the traffic modeling conducted for the project and the analysis showed that the proposed number of lanes on Santa Teresa Boulevard will be sufficient to accommodate the projected traffic growth in the area. The project also maintains the existing right-of-way width available along Santa Teresa Boulevard, which would allow future widening of this roadway if and when the need arises in the future.*

Comment 4-B: Large numbers of cars (described above) will be making a left turn from Santa Teresa Blvd onto campus during the morning commute, and a right turn from campus onto Santa Teresa during the afternoon commute. This intersection will be upgraded with a traffic light in the proposal. We ask that consideration be made of adequate space in turn lanes to accommodate the high traffic to and from campus at peak commute times.

Response 4-B: *VTA concurs with this comment. The specific intersection layout with the appropriate length of turn lanes and turn pockets will be undertaken during the final design phase of the project. The design will take projected peak-hour demand into account.*

Comment 4-C: Access to northbound Santa Teresa Blvd from Southbound 101 must be assured. Access to northbound 101 from southbound Santa Teresa Blvd. must be assured. It does not look as though Option 2 provides for this.

Response 4-C: *Design Option B provides both of the movements mentioned in this comment. The southbound U.S. 101 to northbound Santa Teresa Boulevard traffic will make a right turn at the intersection of the off-ramp with Santa Teresa Boulevard. The southbound Santa Teresa Boulevard to northbound U.S. 101 traffic will be allowed to make a left turn at the intersection of the loop-off ramp with Santa Teresa Boulevard and merge with the northbound SR 25 to northbound U.S. 101 diagonal ramp to enter northbound U.S. 101. Please see Figure 4 in the EIR.*

Comment 4-D: Signage to Gavilan College from Hwy 25, northbound 101, southbound 101, and Santa Teresa Blvd. should be incorporated for the permanent plan and during construction.

Response 4-D: *VTA concurs with this suggestion. Appropriate signage will be installed, both during construction and on a permanent basis.*

Comment 4-E: It will be important to consider access to and from the campus during construction.

Response 4-E: *VTA concurs with this comment. As described in Section 2.22.1 of the EIR, a Transportation Management Plan (TMP) will be prepared prior to the start of construction. The TMP will address all traffic-related aspects of construction including, but not limited to: traffic handling in each stage of construction, pedestrian safety/access, emergency access, and bicycle safety/access. Safe access to and from Gavilan College will be an important component of the TMP. The TMP will also involve public dissemination of construction-related information through notices to Gavilan College and the neighborhoods, press releases, and the use of changeable message signs.*

RESPONSE TO COMMENT #5:

MONTEREY BAY UNIFIED AIR POLLUTION CONTROL DISTRICT

Comment 5-A: The Air Quality DEIR section and the Air Quality Report are outdated and should be updated to reflect current air quality. For example, both documents reference air quality data which is five years out of date. Additionally, the linkage between the Air Quality Report and Section 2.14 Air Quality in the DEIR is unclear. The DEIR should summarize the Air Quality Report so the findings are consistent.

Response 5-A: *Under CEQA guidelines Section 15125, the environmental baseline is established at the time the Notice of Preparation (NOP) of an EIR is circulated, which in this case was 2007. The technical studies for this EIR commenced at that time and utilized the most current data available. For large infrastructure projects such as this, it often takes several years for all studies to be completed and the DEIR to be written. CEQA does not, however, require a lead agency to continually update studies during this time as the process would never be completed. The CEQA statutes notwithstanding, VTA is not aware of any new information that would change the conclusions of the air quality analysis undertaken for this project and no such information has been provided by MBUAPCD.*

VTA is not aware of any discrepancies between the air quality technical analysis and the air quality section in the main body of the EIR.

Comment 5-B: The air quality aspects of the project should be considered in relation to the District's 2008 California Environmental Quality Act (CEQA) Air Quality Guidelines. Emissions associated with the construction and operational phases of the project should be estimated and compared to the significance thresholds in the document. The guidelines can be accessed at:

http://www.mbuapcd.org/mbuapcd/pdf/mbuapcd/pdf/CEQA_full.pdf.

Response 5-B: *For the analysis of projects on the state highway system under both CEQA and NEPA, Caltrans has prepared and adopted guidelines and procedures, which are published on the Caltrans website (www.dot.ca.gov) and are known as the Standard Environmental Reference (SER). For air quality, the SER includes specific procedures and requirements for determining conformity with the Clean Air Act, as required by EPA and FHWA. Since the U.S. 101 Improvement Project is on the state highway system, the Caltrans' procedures were required to be utilized.*

Comment 5-C: For CEQA evaluations, project impacts should be evaluated compared to existing conditions. Section 2.14 compares No Build and Build alternatives but does not compare either alternative to existing conditions. Please also confirm what was considered as the year for existing conditions. The year 2005 was reported as the base year in Table 25 while the year 2009 was reported as existing in Table 27.

Response 5-C: *Section 2.14 includes data and information regarding existing, "Future No Build", and "Future Build" conditions. For example, the text notes that CO concentrations will not exceed standards under any of these scenarios. In addition, Section 2.14.4 compares future emissions of mobile source air toxics (MSATs) to existing conditions. With regard to the base year, Table 25 references 2005 as that was the latest year for which MSAT data was available at the time the air quality analysis was undertaken. Similarly, Table 27 used 2009 as that was the most current data available for CO₂ when the analysis was undertaken.*

Comment 5-D: The following specific comments address the Summary, Section 2.14 Air Quality, Section 2.15 Climate Change, and Air Quality Report.

Table S-1, Summary of Environmental Impacts, Air Quality on page xii: Construction of the proposed project could cause or contribute to exceedances of the Californian 24-hour PM₁₀ standard, as well as local nuisance, if appropriate fugitive dust management measures are not implemented. Mitigation measure MM-CON-4 on page xxiv indicates that the project will employ CALTRANS Standard Specifications to reduce construction dust, as well as the BAAQMD dust control measures as listed in Table 37 of the DEIR. Therefore, mitigation measure MM-CON-4 should also be listed under Air Quality and applied to construction of the entire length of the project, including the portion in San Benito County.

Response 5-D: *The EIR was organized to group all of the short-term, construction-related impacts in one location. This is the reason why fugitive dust emissions are addressed under "Construction Impacts." Although MM-CON-4.1 and 4.2 reference BAAQMD measures, the intent is that the mitigation will be implemented at all project locations.*

Comment 5-E: 2.13 Hazardous Waste/Materials starting on Page 117 - Figure 3 on page 14 shows the San Benito River passing under Highway 101 project near Highway 129. The San Benito River is known to contain elevated levels of naturally occurring asbestos (NOA). Consequently, soil disturbed during construction activity may contain elevated levels of NOA. If elevated levels of NOA are found, then dust suppression measures consistent with ARB Air Toxics Control Measure (ATCM) for asbestos should be applied. The ATCM can be found at: www.arb.ca.gov/toxics/atcm/asb2atcm.htm.

Response 5-E: *VTA appreciates this information. MM-HAZ-1.7 has been added to Section 2.13 of the Final EIR to address this potential.*

Comment 5-F: Section 2.14.1, Regulatory Setting, page 122: This section focuses on federal requirements, such as, the Federal Clean Air Act and has no mention of the California Clean Air Act of 1988, which drives many California air quality planning activities. This section should be updated to include the California Clean Air Act.

Response 5-F: *The California Clean Air Act, as well as the California Air Resources Board and various California regulations, are described in the first paragraph of Section 2.14.1.*

Comment 5-G: The regulatory setting section should describe applicable local Air District rules. For example, Section 2.13 Hazardous Waste/Materials, identifies the potential for asbestos-containing materials to be present in buildings to be demolished. If asbestos-containing material is present, the project will be required to comply with the Air District Rule 424 and any demolition will be subject to District Rule 439.

Response 5-G: *Rule 424 pertains to control of asbestos-containing material during its removal. Compliance with this rule is covered by MM-HAZ-1.6 in Section 2.13.5 of the EIR. Rule 439 pertains to the control of particulates during building demolition. Compliance with this rule is covered by MM-CON-4.1 in Section 2.22.4 of the EIR.*

Comment 5-H: Section 2.14.2, Affected Environment, NCCAB, page 125: The text should be updated to include a discussion of ozone transport. Studies conducted by the California Air Resources Board indicate that exceedances of the state ozone standard in the North Central Coast Air Basin (NCCAB) are caused primarily by transport from the Bay Area. Although San Benito County only represents approximately nine percent of the population of the NCCAB, the attainment status of the entire region is often linked to conditions in San Benito County.

Response 5-H: *For highway projects, ozone is addressed through the regional conformity process. However, as stated in Section 2.14.3, the San Benito County portion of the project is located in the North Central Coast Air Basin, which is classified by EPA as an attainment area. Therefore, a regional conformity analysis is not required.*

Comment 5-I: The transport impacted ozone monitor at Pinnacles National Park in San Benito County should also be mentioned in the third paragraph. This station is key to the attainment status of the entire NCCAB so activities, such as major highway widening projects, along the upwind corridor can be important. The current state 8-hour ozone standard was exceeded 77 times between 2003 and 2007 at Pinnacles National Park. Also, the text indicates that the new state 8-hour ozone standard was only exceeded once at Hollister in 2006. Actually, the current 8-hour standard was exceeded five times in 2006.

Response 5-I: *As requested, the monitor located at Pinnacles National Park has been added to the third paragraph under "North Central Coast Air Basin" in Section 2.14.2.*

Comment 5-J: Section 2.14, Impact AQ-1, page 126: The project's potential impact to cause or contribute to a violation of an ambient air quality standard does not only apply to CO standards. More importantly, the impact of the project on ozone precursor emissions should also be evaluated. The entire section fails to address the potential impacts of the project to the nonattainment pollutant ozone. Therefore, in order to be more complete, the DEIR should assess project operation emissions in relation to applicable District thresholds, as outlined in the District's 2008 CEQA Guidelines.

Response 5-J: *As stated in Response 5-B, the air quality effects of the project were analyzed in accordance with the requirements of the Caltrans SER. As stated in Response 5-H, ozone was addressed per the regional conformity process.*

Comment 5-K: The impact analysis should also address state particulate matter air quality standards. Re-entrained road dust is a major contributor to PM10 emissions. Therefore, the Air District suggests that the following measures for minimizing re-entrained road dust also be considered whenever feasible: 1) Construct shoulders with a minimum width of eight feet; 2) Construct medians with minimum of four foot wide shoulders; 3) Plant ground cover to paved edge of roadway to stabilize shoulders and reduce fire hazard from dry weeds; 4) Pave or use non-toxic surfactants on unpaved shoulders and turnouts; 5) Plant hedges or shrubs along the Right of Way to reduce offsite migration of "dust devils" caused by large trucks traveling at high speeds; 6) Plant hedges in medians; 7) Promptly remove soil deposits after wind or storm events.

Response 5-K: *Measures #1 - #5 are already incorporated into the proposed design. For example, the freeway shoulders will exceed the widths listed in Measures #1 and #2. Shoulders will be paved as suggested in Measure #4. Landscaping will be included consistent with*

Measures #3 and #5. Measure #7 is a standard maintenance practice. Measure #6, however, is not feasible given the median widths in this segment of U.S. 101.

Comment 5-L: Fig 17, Possible Effect of Traffic Operation Strategies in Reducing On-Road CO₂ Emissions on Pg. 134: This figure and the supporting text immediately under it indicate that speeds could increase by as much as 20 to 25 mph to a maximum of 70 mph. Since CO₂, as well as other pollutants such as NO_x increase above 55 mph, excess emissions associated with this change should be estimated and compared to the applicable Air District CEQA significance thresholds.

Response 5-L: *The purpose for including Figure 17 in the EIR is to show that reducing congestion can result in the reduction of CO₂ emissions. Therefore, to the extent that the project will reduce peak-period congestion, there will be benefits with regard to CO₂ emissions. However, emissions associated with motorists traveling at speeds up to 65 mph, which is the speed limit on this segment of U.S. 101, is not an impact of the project as the project does not include a change in the speed limit.*

Comment 5-M: Section 2.15.4, CEQA Conclusion regarding Climate Change, page 140: CEQA was amended in 2010, in accordance with SB 97, because California's lawmakers recognized the need to analyze greenhouse gas emissions as a part of the CEQA process. The CEQA Guidelines were updated to direct lead agencies to analyze the greenhouse gas emissions of proposed projects (see §15064.4) and this analysis is not necessarily restricted to whether the impact would be cumulatively considerable. Other Air Districts have established thresholds indicating GHG emissions ranging from 1,150 to 10,000 metric tons CO₂ per year would result in a significant impact. Table 27 reports the potential annual CO₂ emissions for this project of 133,084 metric tons and the text on page 134 states, "These changes will have an overall negative effect on the GHG emissions generated in the project area, as compared with the No-Build scenario."

Please explain how a project with annual emissions that far exceed any established Air District threshold and that would have a negative effect on GHG emissions is considered too speculative to make a significance determination.

Response 5-M: *The text in Section 2.15.4 sets forth the basis for the determination that it is too speculative for determining the significance of the project with regard to climate change. Further, while it is acknowledged that various air districts have established thresholds for CO₂ emissions from various development projects, this type of project is different in that it does not generate traffic; rather, it accommodates traffic generated by the full range of land uses in the region's cities and counties. Although the project will accommodate more traffic, which allows for the comparison of emissions in the project area between the No Build and Build Alternatives shown in Table 27, the project is not creating such emissions because those vehicle trips will be made with or without the project. Thus, from the perspective of making a determination of the*

project's cumulative effect on the scale of global climate change, there is no basis for concluding that the project's contribution would be cumulatively considerable or significant.

Comment 5-N: Air Quality Report, Table 3-1, Air Quality Standards on Page 10: Table 3 needs to be completely updated. Incorrect standards are reported for many of the pollutants which appears to be due to a table formatting problem. Please refer to the link below to ARB's current standards table for these revisions: <http://www.arb.ca.gov/research/aaqs/aaqs2.pdf>.

Response 5-N: *Thank you for this comment. There were some formatting problems in Table 3.1 of the air quality technical report, which have been corrected.*

Comment 5-O: Air Quality Report, Air Quality Planning, MBUAPCD on Page 23: The list of applicable air quality plans at the top of this page should be updated to include the 2012 Triennial Plan Revision to the Air District's Air Quality Management Plan for the California ambient air quality standard for ozone. The plan is available on the Air District's website at: <http://www.mbuapcd.org/programs/planning>.

Response 5-O: *Thank you for this update. As noted earlier, the list of plans on page 23 of the air quality report was accurate at the time the analysis was undertaken. The addition of 2012 Triennial Report does not affect the findings of the analysis.*

Comment 5-P: Air Quality Report, Significance Criteria, MBUAPCD on Page 33: Please explain why the Air District's significance criteria are listed on page 33 and then not used as part of the impact assessment in Section 5.1. The operational impact assessment should include an evaluation of the nonattainment pollutant ozone by using the ozone precursor emission thresholds (NO_x and VOC).

Response 5-P: *As stated in Response 5-B, the air quality effects of the project were analyzed in accordance with the requirements of the Caltrans SER. As stated in Response 5-H, ozone was addressed per the regional conformity process. The MBUAPCD standards were included as background information.*

Comment 5-Q: Air Quality Report, Appendix A – Air Quality Monitoring Sites: Please note, the monitoring stations shown in the figure for Scotts Valley, Davenport, Watsonville and Moss Landing have been closed. A current map of the Air District's monitoring sites can be found on page 10 of the Air District's 2012 Triennial Plan referred to in the previous comment.

Response 5-Q: *Thank you for this update. As noted earlier, the information regarding the locations of the MBUAPCD monitoring stations was accurate at the time the analysis was undertaken. The closure of these stations does not affect the findings of the analysis.*

**RESPONSE TO COMMENT #6:
NATIONAL PARK SERVICE**

Comment 6-A: Please accept these comments from the National Park Service (NPS) in response to the Draft Environmental Impact Report (DEIR) for the proposed improvements to US 101 in south Santa Clara and north San Benito counties. The project area falls within the recognized historic corridor of the Juan Bautista de Anza National Historic Trail (Anza Trail), and also overlaps with segments of the Recreational Retracement Route of Anza Trail. The Juan Bautista de Anza National Historic Trail commemorates the 1775-76 Spanish expedition of the more than 240 men, women and children who journeyed across the frontier of New Spain to settle Alta California. The Anza Trail connects history, culture and outdoor recreation along a 1,200-mile corridor extending from Nogales, Arizona to the San Francisco Bay Area.

The Anza Trail Comprehensive Management and Use Plan (1996) envisions a continuous recreation trail from Nogales, Arizona to the San Francisco Bay Area. The Santa Clara Countywide Trails Master Plan identifies the planned recreational trail segments within the Santa Clara County. Within the project area, an east-west segment of the Anza Trail is intended to follow the same alignment as the Bay Area Ridge Trail. The north-south spine of the Anza Trail is intended to connect through the project area to an existing trail segment, located on Old Stage Road in San Juan Bautista. Some of these trail alignments are shown in Figures 5 and 6 of the Draft EIR.

Due to the Anza Trail's planned alignment with the Bay Area Ridge Trail for the east-west connection across the valley, NPS concurs the Bay Area Ridge Trail Council's recommendation that VTA adopt Alternative 2, which includes a multiuse trail connection along Camadero Creek under the freeway bridges.

NPS also supports the planned extension of bicycle facilities along Highway 101 where the widening project is planned. Santa Clara County's Trails Master Plan identifies Santa Theresa Boulevard (at the north end of the project area) as the Anza Trail bicycle route. At the southern end of the project boundary, the planned bicycle path to the San Juan Highway would connect with a proposed trail route to San Juan Bautista State Park and the popular trail segment on Old Stage Road. Draft EIR Figures 5 & 6 also depict the proposed Pajaro River Trail, which is planned to be a multi-use north-south segment of the Anza Trail. We are supportive of the eventual development of the Pajaro River Trail, as it would provide a superior multi-use recreational trail route for pedestrians and equestrians. We are pleased to see that the Highway 101 improvement project incorporates trail undercrossings to accommodate this future trail.

Response 6-A: The recommendation of the National Park Service for the selection of Bicycle/Trail Alternative 2 is noted for the record. This recommendation is consistent with that of the project development team, as discussed in Section 1.3.4 of the Final EIR.

RESPONSE TO COMMENT #7:

PAJARO RIVER WATERSHED FLOOD PREVENTION AUTHORITY

Comment 7-A: On behalf of the Pajaro River Watershed Flood Prevention Authority (Authority), I am pleased to submit this comment letter on the Draft Environmental Impact Report (EIR) for the proposed US 101 Improvement Project. Unfortunately, the EIR notification was addressed to retired Authority Executive Directors and this comment letter is based only on a cursory review of the document, given the time available. A more thorough review of the Draft EIR and Appendix B Hydrology and Water Quality Environmental Impact Analysis may result in additional comments to be submitted for your consideration.

Response 7-A: VTA acknowledges receipt of this comment letter and notes that no further comments were received from the Pajaro River Watershed Flood Prevention Authority during the Draft EIR circulation period.

Comment 7-B: Summary Page iii – Coordination with Public and Other Agencies: In addition to the notable issues listed that require focused input from public and other agencies, please add the significant flooding issues along the Lower Pajaro River that are affected by floodplain impacts in the upper watershed, including the loss of floodplain storage. Please also list the Authority as an agency that requires focused coordination.

The Authority was established in July 2000 by State Assembly Bill 807 in order to “identify, evaluate, fund, and implement flood prevention and control strategies in the Pajaro River Watershed, on an intergovernmental basis.” The watershed covers areas of four counties and four water districts and the board is comprised of one representative from each:

- County of Monterey/Monterey County Water Resources Agency
- County of San Benito/San Benito County Water District
- County of Santa Clara/Santa Clara Valley Water District
- County of Santa Cruz/Santa Cruz County Flood Control Water Conservation District, Zone 7

Response 7-B: As requested, the floodplain issues along the Pajaro River have been added to page iv of the Summary, and the Flood Prevention Authority has been listed. In addition, as noted in Section 3 of the EIR, VTA met with the SCVWD (a member of the Flood Prevention Authority) during the development of the preliminary design and to obtain the most current hydraulic data for use in the Location Hydraulic Study.

Comment 7-C: The Authority is implementing the Soap Lake Floodplain Preservation Project (Soap Lake Project) to build upon the Pajaro River Risk Reduction Project being developed by the U.S. Army Corps of Engineers (Corps) on the Lower Pajaro River. Soap Lake is a floodplain within the watershed that has been found to be an extremely important flood protection feature. It acts like a natural detention basin, storing water and reducing peak flows that would otherwise increase flooding in the lower Pajaro

River in the Watsonville area. The Soap Lake Project does not involve building any structural facilities, but instead would include financially supporting the purchase of land or flood easements for the land within the Soap Lake floodplain. The objective is to maintain the current flood protection benefits provided by the Soap Lake floodplain by protecting the area from changes that would impact the flood protection properties of the floodplain.

The purchase of land or floodplain easements would restrict development and preserve agriculture and open space in the approximately 9,000 acre floodplain with the goal of preserving the floodplain attenuation benefits. Several conservation easements have already been obtained within the Soap Lake project area totaling over 1,000 acres and funding has been secured for another 1,200 acres.

The Soap Lake Project would maintain the current hydrologic and hydraulic conditions at the project site and adjacent properties. The floodplain limits would not be changed. This Project is an outcome of the Authority's Watershed Study, which investigated the Pajaro River Watershed land-use plans, existing and planned flood protection infrastructure, and alternative strategies to assure effective coordination of the former. The Soap Lake Project was selected as the preferred alternative, and the Watershed Study's Technical Appendices, and HECRAS Model provide details regarding the Project's flood attenuate functionality and performance. This Watershed Study is available via the Authority's link <http://www.pajaroriverwatershed.org/>

Response 7-C: Thank you for this information on the Soap Lake Floodplain Preservation Project. VTA is aware of the Soap Lake Project and its importance with regard to floodplain issues in the Pajaro River Watershed. As noted on page 28 of the Location Hydraulic Study, the Soap Lake Model was obtained from the SCVWD and was used in the analysis of the U.S. 101 Improvement Project's impacts on floodplains.

Comment 7-D: Summary Page x - Impact HYDRO-6 and Section 2.9.2.5 – Impacts to the Pajaro River Floodplain: The U.S. 101 Improvement Project will include replacement of the existing U.S. 101 bridge over the Pajaro River. Betabel Road will also be extended and will include a new 3-span bridge over the Pajaro River. The new bridges will fill approximately 20.5 acre-feet of the floodplain of the river. For the Pajaro River, the proposed condition will raise the floodplain by 0.1 feet between the Betabel Road bridge and the U.S. 101 bridge. The water surface elevation increase upstream of the U.S. 101 bridge will be less than 0.1 feet. These floodplain and water surface impacts within the 100-year floodplain of the Pajaro River are designated as less than significant and no mitigation measures are proposed.

Given the high flood risks along the Lower Pajaro River, any loss of floodplain storage or increase in water surface elevations should be considered significant and should require mitigation. Flooding throughout the reaches of the Lower Pajaro River is a hazard to public and private property including residences, agriculture, highways, watercourses, and environmental resources. Flooding has been recorded in 1955, 1982, 1986, 1995, 1997 and 1998 causing millions of dollars in damage. The flood event of February 1998 produced the highest flows ever recorded on the Pajaro River at the U.S.

Geological Survey gage at Chittenden. These high flows resulted in overtopping and a subsequent levee break downstream of Highway 1 on the Santa Cruz side of the river (Santa Cruz County 1998).

The Pajaro River Risk Reduction Project currently being developed by the U.S. Army Corps of Engineers (Corps) on the Lower Pajaro River assumes a functioning Soap Lake floodplain as part of the baseline condition. Thus, the purpose of the Authority's project is to protect the Soap Lake floodplain so as not to exacerbate flooding downstream and any loss of floodplain storage is considered significant and requiring mitigation.

Response 7-D: *The hydraulic analysis undertaken for the project, which is described in Section 2.9 of the EIR and in the accompanying technical Location Hydraulic Study, determined that the proposed new U.S. 101 bridge over the Pajaro River would have an insignificant effect on the 100-year flood water surface elevation (WSE). The new Betabel Road bicycle bridge across the Pajaro River, which would be located 600 feet downstream of the U.S. 101 bridge, would cause an increase in the 100-year WSE of 0.1 feet (1.2 inches) between the bridges. Upstream of the bridges, the increase in WSE would be less than 0.1 feet. Based on this analysis, VTA believes this increase would not be significant under CEQA.*

The above paragraph notwithstanding, VTA understands the sensitive issues with regard to flooding along the Pajaro River. Therefore, during final design, VTA will work with the Flood Prevention Authority toward an objective of having no increase in WSE. This will most likely be achieved by slightly revising the design of the Betabel Road bicycle bridge.

RESPONSE TO COMMENT #8:

REGIONAL WATER QUALITY CONTROL BOARD

Comment 8-A: This project has the potential to impact water quality and beneficial uses of waters of the State. Therefore Central Coast Water Board staff offers the following recommendations for improving the environmental value and environmental review of the Project.

Design Option B: Central Coast Water Board staff recommends that the Santa Clara Valley Transportation Authority (SCVTA) select Design Option B, since it appears to result in fewer environmental impacts than Design Option A. Design Option A involves two additional crossings of natural drainage features/swales which can be avoided through implementation of Design Option B.

Response 8-A: *The recommendation of the Water Board for the selection of Design Option B is noted for the record. This recommendation is consistent with that of the project development team, as discussed in Section 1.3.4 of the Final EIR.*

Comment 8-B: Riparian Impacts: The Project will result in permanent loss of eight acres of riparian habitat, temporary impacts to seven acres of riparian habitat, and impacts to 890 linear feet of shaded riverine aquatic (SRA) habitat. This impact will occur in two rivers (Pajaro and San Benito), four named creeks (Uvas, Gavilan, Tick, and Tar), and numerous unnamed streams, drainage features, and other waters of the State. There is likely to be variation in the type, robustness, and environmental value of habitat in these various waterbodies. Therefore the final EIR should contain a more comprehensive and differentiated analysis of impacts to riparian habitat. This information is necessary to evaluate the adequacy of avoidance and mitigation measures.

***Response 8-B:** The Natural Environment Study (NES) and EIR discuss the broad categories of habitat types in the project area. Impacts to these habitats are shown in Table 6 in the NES and Table 34 in the EIR. Some of these habitats are considered more sensitive than others. For sensitive habitats, the mitigation proposed is not determined based on high quality, moderate quality, or low quality habitat. It is assumed to be of high quality, with corresponding functions and values. Avoidance and minimization measures are applied to all riparian habitats.*

The project is currently early in the design phase and considerable attention has been given to avoid and minimize impacts to sensitive habitats to the greatest extent feasible. As the design moves forward, avoidance and minimization will continue to be paramount.

Comment 8-C: Mitigation for Riparian Impacts: The DEIR proposes to mitigate for impacts to riparian habitat through payment of development fees to the Santa Clara Valley Habitat Conservation/Natural Communities Conservation Plan (HCP/NCCP). However, the HCP/NCCP was not established to provide mitigation for impacts to riparian habitat and has not been approved by the Central Coast Water Board for this purpose. Therefore MM-NATCOM-1.1 will not mitigate for the Project's riparian impacts. As a second option, the DEIR proposes to mitigate for Project impacts to riparian habitat by creating/restoring riparian habitat. However, the DEIR does not provide sufficient information to demonstrate that appropriate mitigation areas will be available. Therefore the DEIR fails to provide mitigation for this significant impact, and the statement in the DEIR that Impact NATCOM-1 has been reduced to less than significant is unsupported. The final EIR must provide for adequate and feasible mitigation for all Project impacts.

***Response 8-C:** VTA is a Local Partner in the development and implementation of the Santa Clara Valley HCP/NCCP, and the project is a "covered activity" under the HCP/NCCP. As a result, VTA has included payment of a base fee to the Implementing Entity of the HCP/NCCP (known as the Santa Clara Valley Habitat Agency) to offset impacts to habitat through the creation or restoration of equivalent habitat on a regional basis. For highly sensitive habitats, there are additional fees that must be paid beyond the base fee to offset impacts to these habitats.*

The HCP/NCCP has established requirements for both preservation and restoration/creation of riparian habitats to guide the use of impact fees paid to the Santa Clara Valley Habitat Agency. According to Table 5-12 of the HCP/NCCP (part of the conservation strategy), the HCP/NCCP is required to provide mitigation for impacts to riparian habitats via preservation and enhancement at a 2:1 ratio and restoration at a 1:1 ratio. Thus, VTA's payment of impact fees for this project will directly support a conservation program that includes riparian habitat preservation, enhancement, and restoration. As a key part of its conservation strategy, the HCP/NCCP will create, restore, and preserve hundreds of acres of riparian habitat, as discussed in Section 5 of the HCP/NCCP. This will occur on a large-scale, regional basis, which will have far greater ecological value than "traditional" mitigation that relies on isolated, piecemeal, mitigation sites. This holistic strategy is strongly endorsed by the California Department of Fish & Wildlife and the U.S. Fish & Wildlife Service, which are the state and federal trustee agencies, respectively, that have stewardship over these resources. Both of these agencies are partners in, and strong proponents of, the HCP/NCCP as they see its value as a tool for the mitigation of impacts and the long-term protection and recovery of the important resources.

VTA understands that the RWQCB is not currently a HCP partner and has not approved the use of an HCP for purposes of its regulatory permitting authority under the Clean Water Act or Porter-Cologne Act. However, the purpose of the EIR is to evaluate the project's impacts, and specify mitigation measures, under CEQA rather than under any state or federal waters and wetlands regulations. For the purposes of adequate mitigation under CEQA, the HCP/NCCP meets all requirements: 1) in-kind habitat will be created, 2) the general locations for the mitigation have been identified, and 3) there is a mechanism for its funding, implementation, maintenance, and monitoring.

However, the EIR also acknowledges that project-specific mitigation of impacts may be needed in the unlikely event that the HCP/NCCP is not ultimately implemented, or if the HCP/NCCP cannot be used to cover the entire project (such as impacts occurring in San Benito County). As a result, MM-NATCOM-1.2 includes project-specific mitigation (please see Response 17-M for the revised text applicable to MM-NATCOM-1.2), as well as the potential to purchase credits in a mitigation bank.

The NES, which was the technical report on which the text in the biology section of the EIR is based and made available for public review, identifies possible mitigation opportunities for project-specific mitigation. As stated in the NES, "A search for appropriate mitigation locations near the impacts sites was conducted, and numerous opportunities were identified to create or expand existing riparian habitat within or immediately adjacent to the BSA. These areas include the proposed staging area along the San Benito River as well as numerous agricultural parcels along the Pajaro River corridor. Off-site SRA mitigation opportunities are also present on adjacent properties along Tar Creek." The Pajaro River system is large, important, and

impaired in many areas, and there are riparian and wetland restoration opportunities along the river, as well as Tequisquita Slough. Restoration of riparian habitat is needed on an easement property adjacent to The Nature Conservancy's property near the Pajaro River. The Uvas watershed, a tributary to the Pajaro River, has a steelhead run, and several segments are in need of restoration. Millers Canal, San Felipe Lake, and Pacheco Creek are identified as steelhead bearing streams in the National Marine Fisheries Service steelhead recovery plan, and have opportunity for restoration. There are many in-kind or out-of-kind, on-site or off-site, opportunities. If desired, numerous old and poorly functioning fish ladders in the Uvas system could be replaced, with riparian restoration as a component of a project.

The text in Section 2.17.5.1 of the EIR has been revised to reflect these potential opportunities as examples of mitigation that could be implemented. In any case, VTA is committed to implementing mitigation to offset impacts to riparian habitat, and this commitment is included in the EIR.

It should be noted that the project is unfunded beyond the environmental clearance phase. When funding is obtained, it will be to advance the design and then enter construction. It is unknown when this would occur. Furthermore, the project development team recommends the selection of Design Option B for the interchange configuration. One of the advantages of this option is the ability to phase construction. Phases may be implemented over a short or long period. That remains to be determined. Any mitigation sites identified today may not be available in the future. VTA has considered doing advance mitigation for certain projects, but that has been met with some resistance due to the lack of advanced design for the civil project and precise impact calculations to various habitat types.

As already stated, and as evidenced by VTA's longstanding involvement and commitment to the HCP/NCCP, VTA is committed to mitigating impacts to riparian habitat. However, in the event the HCP/NCCP cannot provide sufficient mitigation, and project-sponsored mitigation is needed, it is premature to identify a particular site at this time due to funding constraints, schedule issues, and site availability in the future. Should project-sponsored mitigation be necessary, during the final design phase and when permit applications are prepared for the project, the details of such mitigation will be identified.

Comment 8-D: Wetland Impacts: The Project will result in permanent loss of 3.2 acres of wetlands and aquatic habitat, and temporary impacts to as much as 1.5 acres of wetlands and aquatic habitat. The final EIR should include a more comprehensive and differentiated analysis of wetland impacts, including identification and delineation of each wetland area, and a description of type (including vegetation), robustness, and environmental value of the habitat in each wetland area. This information is necessary to evaluate the adequacy of avoidance and mitigation measures.

Response 8-D: *As discussed in Response 8-B, the NES and EIR discuss the broad categories of habitat types in the project area. Impacts to these habitats are shown in Table 6 in the NES and Table 34 in the EIR. Wetlands are categorized as either freshwater emergent or seasonal. For these sensitive habitats, the mitigation proposed is not determined based on high quality, moderate quality, or low quality habitat. It is assumed to be of high quality, with corresponding functions and values. Avoidance and minimization measures are applied to all wetland and aquatic habitats. Also as stated in Response 8-B, the project is currently early in the design phase and considerable attention has been given to avoid and minimize impacts to sensitive habitats to the greatest extent feasible. As the design moves forward, avoidance and minimization will continue to be paramount.*

Comment 8-E: Wetland Mitigation: The DEIR proposes to mitigate for impacts to wetlands and aquatic habitat through payment of development fees to the Santa Clara Valley Habitat Conservation/Natural Communities Conservation Plan (HCP/NCCP). However, the HCP/NCCP was not established to provide mitigation for impacts to wetlands and aquatic habitat and has not been approved by the Central Coast Water Board for this purpose. Therefore MM-WET-1.1 will not mitigate for the Project's wetlands and aquatic habitat impacts. As a second option, the DEIR proposes to mitigate for Project impacts to wetlands and aquatic habitat by purchasing credits from the Pajaro Wetland Mitigation Bank or by creating/restoring wetlands. However, the DEIR does not provide sufficient information to demonstrate that appropriate mitigation areas will be available. Therefore the DEIR fails to provide mitigation for this significant impact, and the statement in the DEIR that Impact WET-1 has been reduced to less than significant is unsupported. The final EIR must provide for adequate and feasible mitigation for all Project impacts.

Response 8-E: *Please also see Response 8-C. Several of the areas mentioned in Response 8-C certainly would serve as project-specific mitigation for aquatic impacts, and many of the creeks could provide wetland mitigation as well, particularly if floodplains need to be restored. VTA has completed three floodplain restoration projects recently, and there are plenty of opportunities for this type of mitigation. As with impacts to riparian habitat, VTA is committed to implementing mitigation to offset aquatic and wetland impacts, and this commitment is included in the EIR.*

It should be noted that the project is unfunded beyond the environmental clearance phase. When funding is obtained, it will be to advance the design and then enter construction. It is unknown when this would occur. Furthermore, the project development team recommends the selection of Design Option B for the interchange configuration. One of the advantages of this option is the ability to phase construction. Phases may be implemented over a short or long period. That remains to be determined. Any mitigation sites identified today may not be available in the future. VTA has considered doing advance mitigation for certain projects, but that has been met with some resistance due to the lack of advanced design for the civil project and precise impact calculations to various habitat types.

As already stated, and as evidenced by VTA's longstanding involvement and commitment to the HCP/NCCP, VTA is committed to mitigating impacts to aquatic and wetland habitats. However, in the event the HCP/NCCP cannot provide sufficient mitigation, and project-sponsored mitigation is needed, it is premature to identify a particular site at this time due to funding constraints, schedule issues, and site availability in the future. Should project-sponsored mitigation be necessary, during the final design phase and when permit applications are prepared for the project, the details of such mitigation will be identified.

Comment 8-F: Mitigation for Temporary Wetland Impacts: The DEIR proposes to mitigate for temporary impacts to wetlands through the restoration of pre-construction grades, hydrology, and soil conditions, but proposes to let wetland vegetation structure, and function regenerate without further human intervention. This is not adequate to ensure mitigation of these significant impacts to less than significant levels. Temporarily impacted areas must be fully restored, including revegetation, and monitored over time to ensure that mitigation efforts result in wetlands that replace lost habitat functions and benefits. The final EIR must provide complete mitigation for all Project impacts.

Response 8-F: *As discussed in the response to comment 8-C, VTA is a Local Partner in the development and implementation of the Santa Clara Valley HCP/NCCP, and the project is a "covered activity" under the HCP/NCCP. As a result, VTA has included payment of a base fee to the Implementing Entity of the HCP/NCCP (known as the Santa Clara Valley Habitat Agency) to offset impacts to habitat through the creation or restoration of equivalent habitat on a regional basis. For highly sensitive habitats such as wetlands, there are additional fees that must be paid beyond the base fee to offset impacts to these habitats. The HCP/NCCP even requires payment of impact fees for temporary wetland impacts, and thus, the project's contribution to the HCP/NCCP's conservation program, through payment of impact fees, will help to compensate for its impacts.*

Nevertheless, in order for those impacts to be considered temporary, wetlands and aquatic habitats that are temporarily impacted will need to be restored in situ. This restoration is described in MM-WET-1.3 in the EIR. However, in response to this comment, MM-WET-1.3 has been revised; see Section 2.18.5 of this Final EIR.

Comment 8-G: Floodplain Basin: Mitigation measure MM-HYDRO-1.3 describes construction of a 120-acre-foot basin to mitigate for lost floodplain volume resulting from the Project. The DEIR proposes placing the basin in agricultural fields northeast of the existing U.S. 101/S.R. 25 interchange. However, this location is isolated from the creeks and rivers flowing through the project site. What process and criteria were used to select the location for the floodplain basin? Central Coast Water Board staff recommends locating the basin in land adjacent to Uvas Creek to provide connectivity between creek and floodplain. In addition, Central Coast Water Board staff recommends that the basin be designed and vegetated in a manner that provides full-fledged floodplain habitat, and that it be protected

as such through a permanent conservation easement. In any event, please provide information in the final EIR describing how this basin will be designed, revegetated, and used.

Response 8-G: *The purpose of the detention basin, as well as the system of culverts, bridges, and channel described in MM-HYDRO-1.1 through MM-HYDRO-1.7 is to accommodate flood flows from Carnadero Creek through the SR 25/U.S. 101 interchange area without resulting in new flooding impacts. The basin is intended to mitigate the loss of the floodplain storage volume from the geometric modifications for the proposed U.S. 101 modifications and Santa Teresa Boulevard Extension. As shown on Figures 3 and 4 of the EIR, the culverts that will accommodate flood flows under the freeway will connect to the detention basin. Thus, it was necessary to locate the basin in this area. In addition, locating the basin near Uvas Creek is not viable in terms of achieving the purpose of preventing flood impacts due to the Carnadero Creek overflow. For additional details regarding the flooding issues at this location, as well as the discussion of how the hydrological features of the project will function to prevent any significant floodplain impacts, please see the Location Hydraulic Study, which is the technical study on which Section 2.9 of the EIR is based.*

Details regarding the detention basin will be worked out when funding for the project is obtained and the project moves into the final design phase. The design will focus on the primary function of the basin, which is flood control. Other features, including vegetation, will be chosen to be consistent with this objective. VTA will coordinate the design with the Santa Clara Valley Water District, as that agency has primary responsibility for flood control at this location.

Comment 8-H: Stormwater Quality Treatment. The DEIR proposes to create 34.2 acres of biofiltration strips and swales to mitigate for stormwater quality impacts resulting from increased impervious surfaces. However, it is not clear that this amount adequately mitigates for runoff volume, rate, and quality conditions caused by the Project. Therefore it is not possible to determine whether the DEIR provides sufficient mitigation to support the statement in Impact WQ-1 that Project stormwater quality impacts have been reduced to a less than significant level.

Response 8-H: *The U.S. 101 Improvement Project follows Caltrans' policies and procedures, as it is a project on the state highway system. As stated in Section 2.10.1.4, Caltrans developed the Statewide Stormwater Management Plan (SWMP) to address stormwater pollution controls related to highway planning, design, construction, and maintenance activities throughout California. The SWMP describes the minimum procedures and practices Caltrans uses to reduce pollutants in stormwater and non-stormwater discharges. It outlines procedures and responsibilities for protecting water quality, including the selection and implementation of BMPs. The proposed project will follow the guidelines and procedures outlined in the latest SWMP to address stormwater runoff.*

The Stormwater Data Report (SWDR), which is the technical report on which Section 2.10 of this EIR is based, was prepared to implement the SWMP. Per the SWDR, the project is obligated to include treatment BMPs for stormwater runoff to the maximum extent practicable. Compliance with this requirement forms the basis for concluding that stormwater impacts have been reduced to a less-than-significant level. In this case, based on preliminary plans, MM-WQ-1.1 states "the project will create approximately 32.4 acres of biofiltration strips and swales along U.S. 101 within the project limits. The strips/swales will be located along the edges of the roadways and interchange ramps. Consistent with the requirements of Caltrans' NPDES permit, this acreage represents the maximum practicable extent of treatment for this project within the constraints of the site. This acreage is based upon preliminary design and will be updated during final design."

**RESPONSE TO COMMENT #9:
COUNCIL OF SAN BENITO COUNTY GOVERNMENTS**

Comment 9-A: The Council of Governments would like to extend its support for the US 101 Improvement Project especially the new interchange connection at US 101 and SR 25. This new interchange is a critical safety improvement for thousands of motorists who commute between Hollister and San Benito County and Santa Clara County, whether for work, recreation, or school. The extension of Santa Teresa Boulevard will be a benefit to Gavilan College students who drive or ride the bus to school. This new Santa Teresa Boulevard connection will cut travel time and improve safety.

Response 9-A: The support of the Council of San Benito County Governments for the project, including the Santa Teresa Boulevard connection, is noted for the record.

Comment 9-B: The Council of Governments is committed to preserving agriculture and the rural and historic character of San Benito County. Given this commitment, the Council of Governments recommends that the project preserve agricultural lands by requiring agricultural mitigation easements to occur within the general vicinity of the project site.

Response 9-B: The purchase of conservation easements for impacts to prime farmland is a mitigation measure that is included in the project. VTA intends to work with the Open Space Authority to identify potential easements. For details, please see MM-FARM-1.1 in Section 2.3.5 of the EIR. While MM-FARM-1.1 states these easements "will be within Santa Clara County," locating easements as close to the project site is also preferred by VTA.

Comment 9-C: The Council of Governments also supports the State Route 152 project and recommends that Design Option B accommodate the future connection of State Route 152. The Council of Governments supports Design Option B because the impact to prime and unique farmland is less than with Design Option A.

Response 9-C: *The support of the Council of San Benito County Governments for the selection of Design Option B is noted for the record. This recommendation is consistent with that of the project development team, as discussed in Section 1.3.4 of this Final EIR.*

**RESPONSE TO COMMENT #10:
SANTA CLARA COUNTY**

Comment 10-A: Cultural Resources - Issue 1 - Section 2.8.1: Regulatory Setting: Under the Regulatory Setting in Page 89, the DEIR does not include adequate language addressing all applicable federal, state and local laws and ordinances that apply for this project.

Federal: The National Historic Preservation Act of 1966, as amended, (NHPA) sets the national policy and procedures regarding historic properties, defined as districts, sites, buildings, structures, and objects included in or eligible for the National Register of Historic Places. In addition, properties eligible to the National Register are also subject to Section 106 of NHPA and Section 4(f) of the U.S. Department of Transportation Act.

State: Include all applicable state laws that govern the project for review of impacts to historic resources.

Local: The Santa Clara County General Plan and Historic Preservation Ordinance (Division C17) would apply for properties in unincorporated Santa Clara County as stated below:

Santa Clara County General Plan: The following County General Plan Heritage Resource Policies (1994) are applicable to the proposed project:

R-RC 81: Cultural heritage resources within the rural unincorporated areas of Santa Clara County should be preserved, restored wherever possible, and commemorated as appropriate for their scientific, cultural, historic, and place values.

R-RC-85: The following strategies should provide overall direction to efforts to preserve heritage resources: 1) Inventory and evaluate heritage resources; 2) Prevent, or minimize, adverse impacts on heritage resources; 3) Restore, enhance, and commemorate resources as appropriate.

R-RC-85: No heritage resource shall knowingly be allowed to be destroyed or lost through a discretionary action (zoning, subdivision, site approval, grading permit, building permit, etc.) of the County of Santa Clara unless: a) The site or resources has been reviewed by experts and the County Historic Heritage Commission and has been found to be of insignificant value; or b) There is an overriding public benefit from the project and compensating mitigation to offset the loss is made part of the project.

R-RC-86: Projects in areas found to have heritage resources shall be conditioned and designed to avoid loss or degradation of the resources. Where conflict with the resource is unavoidable mitigation measures that offset the impact may be imposed.

R-RC-87: Land divisions in areas with heritage resources shall be encouraged to cluster building sites in locations, which will minimize the impacts to heritage resources.

R-RC-88: For projects receiving environmental assessment, expert opinions and field reconnaissance may be required if needed at the applicant's expense to determine the presence, extent and condition of suspected heritage resources and the likely impact of the project upon the resources.

Santa Clara County Historic Preservation Ordinance: Santa Clara County established a Historic Preservation Ordinance (Division C17) on October 17, 2006. The ordinance was established for the preservation, protection, enhancement, and perpetuation of resources of architectural, historical, and cultural merit within Santa Clara County and to benefit the social and cultural enrichment, and general welfare of the people.

Issue 2: Identifying Historic Resources - Discrepancy - Difference between Public Resources Code (5024.1) and Office of Historic Preservation Listed Criteria: The DEIR does not clearly state the criteria that identify potential historic resources as required under CEQA. There is a slight difference or discrepancy between the CEQA historic resource criteria cited in Public Resources Code 5024.1 and the designation criteria for the California Register of Historical Resources posted on the web site for the Office of Historic Preservation.

Public Resources Code (PRC) 5024.1 (c) cites the criteria as needing to meet the criteria for the National Register of Historic Places, but refers that significance level to California. In addition, PRC 5024.1: U) states "Historical resource" includes, but is not limited to, any object, building, structure, site, area, place, record, or manuscript which is historically or archaeologically significant, or is significant in the architectural, engineering, scientific, economic agricultural, educational, social, political, military, or cultural annals of California.

The California Register criteria (under Office of Historic Preservation), is much more inclusive and considers a resource to be a historic resource if it meets at least one of the criteria listed below:

- Criterion 1 - Associated with events that have made a significant contribution to the broad patterns of local or regional history or the cultural heritage of California or the United States
- Criterion 2 - Associated with the lives of persons important to local, California or national history
- Criterion 3 - Embodies the distinctive characteristics of a type, period, region or method of construction or represents the work of a master or possesses high artistic values
- Criterion 4 - Has yielded or has the potential to yield information important to the prehistory or history of the local area, California or the nation.

Include appropriate language for the Criteria for identifying historic resources as relevant for the project under CEQA.

Response 10-A: *VTA concurs that the discussion in Section 2.8.1 of the Draft EIR did not describe all of the criteria that is relevant to identifying historic resources under CEQA. In response to this comment, Section 2.8.1 of this Final EIR has been revised to include an expanded discussion of the criteria for determination of a historic resource under CEQA.*

This comments mentions compliance with Section 4(f) of the Department of Transportation Act and Section 106 of the National Historic Preservation Act. These requirements apply only to projects with federal approvals and/or funding, neither of which are applicable to this project.

Since this is a project on the state highway system, it is not subject to local plans and policies such as those listed in this comment. Nonetheless, VTA acknowledges that the criteria used to determine the significance of resources under CEQA might not have been clearly described in the Draft EIR and the accompanying Historic Resources Evaluation Report (HREER). Therefore, the responses to the following comments, which pertain to the process used to determine the historic significance of specific resources located within or adjacent to the project footprint, provide a discussion of such criteria.

Comment 10-B: Issue 3 - Section 2.8.2.3 Historical Resources (Page 91): The Draft EIR does not include evaluation of impacts to the historic Castro Valley Ranch/Calhoun Ranch (SCL-112) located at 4355 Monterey Road (APN 810-35-008), a resource listed in the Santa Clara County Heritage Resource Inventory. Under PRC 5024.1 (k): "Local register of historic resources" means a list of properties officially designated or recognized as historically significant by a local government pursuant to a local ordinance or resolution. Calhoun Ranch is a locally significant historic resource listed in the County Heritage Resource Inventory. Include evaluation and adequate mitigation as applicable for the property.

Issue 4 - Review of the Technical Report - Cultural Resources (Attachment B) Historic Resources Evaluation Report (Webb and Wee 2010): The following are comments/concerns related to the Historic Resource Evaluation Reports prepared by JRP and Webb and Wee (dated March 2010).

Comment 1: The remark under footnote on Page 7 of the report states: 9 Dana Peak, Historic Preservation Program Manager, Santa Clara County, personal communication with Tony Webb, July 2007 and December 11, 2009. Santa Clara County recently adopted a historic preservation ordinance in 2006 that provides for landmark designation as well as a listing of potential or known historic resources (Heritage Resources Inventory). The County is currently in the process of updating (by re-evaluating those resources listed in) the Heritage Resource Inventory and will, at later day, adopt this updated inventory. To date, the Miller Cemetery and Calhoun Ranch, are not officially designated county landmarks, and therefore have no standing as historical resources in terms of CEQA. This

statement is incorrect. A historic resource does not have to be designated as a Landmark for consideration under CEQA. As stated under CERES:

"...resources which are listed in a local historic register or deemed significant in a historical resource survey as provided under Section 5024.1 (g) are to be presumed historically or culturally significant unless "the preponderance of evidence" demonstrates they are not. The next step is to consult the pertinent existing local register and survey. Because a local register or survey may not employ the same criteria as the California Register, listing or identification in a local survey does not necessarily establish if the property is eligible for listing on the Register. The Lead Agency will need to evaluate the resource in light of the Register's listing criteria (these will be included in guidelines expected to be released by SHPO in June 1994). The Lead Agency may determine that the preponderance of evidence demonstrates that the property in question is not historically or culturally significant despite being listed on a local register or identified in a local historic survey. When making this determination, OPR strongly recommends that the agency cite for the record the specific, concrete evidence which supports that determination."

"Third, a resource that is not listed in, or determined to be eligible for listing in, the California Register of Historic Resources, not included in a local register of historic resources, or not deemed significant in a historical resource survey may nonetheless be historically significant, pursuant to Section 21084.1."

Hence Calhoun Ranch and Miller Cemetery should be considered historic resources and evaluated for impacts under CEQA per PRC Code 5024.1.

Response 10-B: *This comment asserts that VTA erred in its conclusion that neither the Calhoun Ranch nor the Miller Cemetery is a historic resource under CEQA. For the reasons stated in the following paragraphs, VTA believes that its conclusions were correct. At the conclusion of this response, VTA explains that even if one were to assume that the Calhoun Ranch and Miller Cemetery were historic resources, the impact of the project on those resources would not be significant and, therefore, no mitigation is warranted.*

Process and Criteria Used to Evaluate Calhoun Ranch and Miller Cemetery

VTA, as CEQA Lead Agency for the proposed project, in consultation with Caltrans, determined that neither the Calhoun Ranch property nor the Henry Miller family cemetery were historical resources as defined under CEQA [California Code of Regulations, CEQA guidelines Section 15064.5(a)] because the preponderance of evidence (outlined below) demonstrated that these properties were not culturally or historically significant [California Code of Regulations, CEQA guidelines Section 15064.5(a)(2)].

Both the cemetery and Calhoun Ranch were listed in the Santa Clara County Heritage Resource Inventory before 1999. Neither the cemetery nor the Calhoun property is currently designated

as a county landmark. The Heritage Resource Inventory was adopted by the County as the local register of historical resources in its Preservation Ordinance in 2006 [Sec. C17-4]. According to the ordinance, a historic resource is an evaluated building, structure, object, or site that potentially meets the County's designation criteria for landmarks [Sec. C17-5]. The County's landmark designation criteria mimics the California Register of Historical Resources (California Register) criteria, and as a Certified Local Government, is consistent with the National Register of Historic Places (National Register) criteria.

The Calhoun Ranch and the Henry Miller family cemetery were previously inventoried and evaluated on two separate occasions, first by Caltrans between 1989 and 1991 and then by JRP Historical Consulting, LLC, in 2003, three years before the County adopted its Preservation Ordinance. Both Caltrans and JRP concluded the neither of these properties were eligible for inclusion in either the National Register or the California Register because the properties lacked significance or integrity. The State Historic Preservation Officer (SHPO) concurred with each determination of ineligibility in 1994 and 2007. These surveys conducted by Caltrans and JRP were prepared according to the Secretary of the Interior's Standards and Guidelines for the identification and evaluation of cultural resources, conforming with state standards for intensive surveys [California Public Resource Code 5024.1(g)], and meet the definition of a historic resources survey under the County's Historic Preservation Ordinance [Sec. C17-3.(K)].

Consultation with Santa Clara County's Historic Preservation Program Manager in 2009 provided further clarification of the CEQA status of these properties. Both properties were determined ineligible for listing in the National Register and California Register during an update of the Santa Clara County Heritage Resource Inventory prepared by Dill Design Group (Dill) in 2003 for the County of Santa Clara.

Project's Effect on Calhoun Ranch and Miller Cemetery Would Not be Significant

For the reasons stated above, VTA, as CEQA Lead Agency, believes that the Calhoun Ranch and Miller Cemetery are not historic resources under CEQA. This conclusion notwithstanding, given the County's current conclusion that the Calhoun Ranch and Miller Cemetery should be considered historical resources under CEQA, the following text provides the assessment of potential impacts to these properties in accordance with CEQA Guidelines Section 15064.5(b).

The project has no potential to directly impact the Henry Miller family cemetery or the two buildings that currently make up the former Calhoun Ranch. In the vicinity of these properties, the proposed project would include the widening of U.S. 101, reconstruction of the U.S. 101/SR25 interchange, extension of Santa Teresa Boulevard, and construction of new frontage roads. There are no predicted vibration or audible impacts from the construction or operation of the proposed project that would alter the characteristics of either historical resource that qualify them for inclusion in a local register of historical resources. The only potential impact

from this project are indirect visual impacts; however, these impacts are negligible and do not diminish the historic integrity of the resources' locations, setting, feeling, association, workmanship, design, or materials for the historical resource.

Under Design Option A, the Miller family cemetery would be located more than 300 feet west of the proposed frontage road that would extend southwest from Castro Valley Road, and approximately 500 feet west of the Santa Teresa Boulevard extension and the northernmost portion of the proposed interchange. Under Design Option B, the cemetery would be located approximately 75 feet west of the proposed Santa Teresa Boulevard extension and approximately a half mile northwest of the proposed interchange that would be reconstructed at the same location as the current interchange.

While the new frontage road and Santa Teresa Boulevard extension under both design options would be visible from the cemetery, neither of these project elements would cause a substantial adverse change to the cemetery property because they do not materially alter in an adverse manner the view or setting of the cemetery. The proposed interchange under Design Option A may be partially visible from the cemetery when looking northeast; however, it would be nearly at-grade at its closest point and would not materially alter the view or setting in an adverse manner. The reconstructed interchange under Design Option B would be a considerable distance away from the cemetery and would not be visible from the cemetery. Therefore, the U.S. 101 Improvement Project would not result in a substantial adverse change to the Henry Miller family cemetery.

Under Design Option A, a new interchange would be constructed northeast of the Calhoun property. The closest component of the proposed interchange would be an on-ramp that would be sited approximately 280 feet east of the property's main and secondary residences. The on-ramp would be at-grade and while it would be visible when looking east from both residences, it would not materially alter in an adverse manner the view or setting of these buildings. The new view from these building would be similar to the existing view when looking east to the modern, at-grade highway and the view to the northeast toward the proposed interchange would be partially blocked by existing landscaping bordering the north side of the main residence and driveway. While a portion of this parcel's eastern edge adjacent to the existing highway would be acquired for the widening of U.S. 101 and construction of the on-ramp, the acquisition of this vacant land would account for less than 20 percent of the entire parcel and would not materially alter in any adverse manner the physical features of this property that may convey its potential historical significance that may justify its potential eligibility for listing in a local register of historical resources.

Design Option A would also include the construction of a new access road for the Calhoun property. The location and design of the new access road will be determined at a later date by the property owner and the project proponent and will be designed and constructed so as to not

cause any substantial adverse changes to either residence on this property. Lastly, neither the extension of Santa Teresa Boulevard nor the construction of a proposed frontage road would adversely impact this property. The Santa Teresa Boulevard extension would be more than a quarter mile northwest of this property and would not be visible from either building. The proposed frontage road would be sited more than 350 feet west of the property and while it may be visible when looking from the west (secondary) sides of the residences, it would not materially alter in an adverse manner the view or setting of these buildings. Therefore, the construction of the U.S. 101 Improvement Project would not result in a substantial adverse change to the Calhoun property.

Comment 10-C: Technical Report - DPR 523 Series - SPRR - Watsonville Branch (Railroad 2) (Page 2 of 6): The DPR for the Southern Pacific Railroad (Railroad 2) included the following under Evaluation of Significance (Page 2 of 6): The Coast Line of the Southern Pacific Railroad (SPRR) is one of the major railroad trunk lines in California and was important in opening many areas of the coast counties between San Francisco and Los Angeles to settlement; it was also instrumental in the founding of many new towns and in the economic development of industries relying upon shipping goods and products to distant markets. The economy of Gilroy, for example, with its agricultural food products, the mainstay of its economy, relied upon the branch to export its products to distant markets at a time when the area was hampered by the lack of good roads or navigable rivers for commercial transportation (Criterion A). This seems to conclude that the Railroad was significant under Criterion A (Events). But the Historic Resource Evaluation report and the DEIR do not address or include its evaluation as a historic resource. A structure would be considered significant if it meets any one of the criteria listed under the Office of Historic Preservation.

Criterion 1 - Associated with events that have made a significant contribution to the broad patterns of local or regional history or the cultural heritage of California or the United States. The DEIR does not address this as a potential historic resource and does not evaluate impacts under CEQA.

Response 10-C: 1. *As stated in the DPR 523 forms prepared for the Southern Pacific Railroad in the HRER, the segment of the Watsonville Branch of the Southern Pacific Railroad and its associated bridges located within the project study area have been previously inventoried and evaluated on two separate occasions and found not eligible for inclusion in the National Register and California Register. The SHPO concurred with these findings in 1994 and 2007.*

Eligibility to the National Register and California Register rests on twin factors: significance and integrity. A property must have both significance and integrity to be considered eligible for listing on the National Register or California Register. Loss of integrity, if sufficiently great, will overwhelm the historical significance of a resource and render it ineligible. While the Watsonville branch has potential significance under National Register Criterion A and California Register Criterion 1, the segment of the railroad within the project study area has been heavily altered by the replacement of tracks, ties, ballast, and signals and no longer retains

integrity of materials, design, and workmanship. Because this segment of railroad lacks integrity, it is not eligible for inclusion in the National Register or California Register and requires no further consideration under California Public Resource Code 5024.1.

Comment 10-D: Pacific Gas and Electric Transmission Towers: (DPR 523 - Page 2 of 5) - The DPR for Pacific Gas & Electric Transmission Towers & Sargent Substation: "The transmission line (and towers) do appear to meet the criteria for listing in the National Register of Historic Places (NRHP) or the California Register of Historical Resources (CRHR), nor do they appear to be a historical resource for the purposes of CEQA." This is probably a typo? Correct as necessary.

Response 10-D: *This is a typo. These facilities do not meet the criteria for listing in the National Register or California Register.*

Comment 10-E: Evaluation of Impacts and Mitigation Measures: The DEIR needs to provide clarification and additional documentation regarding the following:

Under Table S-1: Summary of Environment Impacts and Avoidance, Minimization and/or Mitigation Measures: (Page viii) Impact CUL-2: Bloomfield Ranch: A project eligible to the National Register is subject to Section 4(f). No mitigation has been provided to protect the resources during construction related activities. Although the report addresses that a 25 feet buffer zone is provided from the access road improvement, it is not included as a mitigation measure. Adoption of a Transportation Management Plan (TMP) during construction activities around Bloomfield Ranch that addresses construction impacts may be a possible mitigation.

Response 10-E: *As noted in Response 10-A, this project is not subject to Section 4(f) as it is not a federal project. The buffer zone is not identified as a mitigation measure as it is a design feature of the project itself. As described in Section 2.22.1 of the EIR, a Transportation Management Plan (TMP) will be prepared to address construction-related impacts. The TMP will address access issues to all properties that may be impacted during construction, including the Bloomfield Ranch.*

Comment 10-F: Include SPRR - Watsonville Branch (Railroad 2): Evaluation of the Southern Pacific Railroad (Railroad 2) indicates the structure to be a historic resource significant under Criterion A/1 (Events) and eligible to the California Register. The DEIR does not evaluate nor provide mitigations for impacts to the resource.

Response 10-F: *For the reasons described previously in Response 10-C, the railroad is not a historic resource and, therefore, no mitigation is required.*

Comment 10-G: Include Calhoun Ranch/Castro Valley Ranch: Castro Valley Ranch/Calhoun Ranch (SCL-112) located at 4355 Monterey Road (APN 810-35-008) is a resource listed in the Santa Clara

County Heritage Resource Inventory. The DEIR does not evaluate nor provide mitigation measures for impacts to the resource.

Response 10-G: *This comment is a repeat of Comment 10-B. Please see Response 10-B.*

Comment 10-H: Land Conservation (Williamson Act) contracted land and land under an Agricultural Preserve: Any public agency (as defined by Gov. Code §51291, subd. (a)) considering locating a public improvement on land restricted by a Land Conservation (Williamson Act) contract or land within an agricultural preserve is required to notify the Director of the Department of Conservation, of its intentions (Gov. Code §51291, subd.(b)). In addition, termination of a Williamson Act contract for a public improvement by acquisition can only be accomplished by a public agency which has the power of eminent domain. The State Department of Conservation must be notified in advance of any proposed public acquisition (Government Code §51290 - 51292), and specific findings must be made. This notification shall be submitted separately from the CEQA process and CEQA documentation. It would be advised that VTA contact the Department of Conservation directly and speak to Jacquelyn Ramsey at (916) 323-2379 for technical assistance. She can also be reached via email at: Jacquelyn.Ramsey@conservation.ca.gov.

The Santa Clara County Planning Office has identified several parcels in both option A and option B either restricted by a Williamson Act contract or under an Agricultural Preserve. As you can see in the enclosed map under Option A, 41 parcels are under the Santa Clara County Agricultural Preserve and six (6) parcels are under a Williamson Act contract and within an agricultural preserve. Under Option B, the map identifies 40 parcels under an Agricultural Preserve and 4 parcels restricted by a Williamson Act Contract and within an Agricultural Preserve. We have attached the two maps to assist VTA identify all the parcels subject to the State Department of Conservation noticing requirements for public acquisition. All Williamson Act restricted parcels and parcels under an Agricultural Preserve identified in the Draft EIR are subject to Williamson State Law noticing requirements.

Enclosed are detailed noticing requirements along with instructions. Although the project may not be constructed in the near future, once Williamson Act restricted parcels or parcels within an Agricultural Preserve have been identified as part of the scope of work they are subject to the Williamson Act public acquisition notification process as described in the enclosed Land Conservation (Williamson) Act Public Acquisition Notification Process. Please contact the State Department of Conservation for further assistance on this matter.

Response 10-H: *Thank you for this information, including the maps that show properties with Williamson Act contracts and/or within the Santa Clara County Agricultural Preserve. VTA acknowledges and understands that there are public noticing and other procedural requirements associated with such parcels. When funding is obtained and the project moves into the final design/right-of-way phase, VTA will coordinate with the Department of Conservation and other agencies, as appropriate, to implement all of the required noticing and procedures.*

Comment 10-I: Additional Recommended Agricultural Mitigations: In addition to the proposed Agricultural Mitigation measures in the Draft EIR the County would highly recommend VTA follow the LAFCO adopted agricultural mitigation policies that best address local concerns to protect and preserve agricultural land. Please see the enclosed LAFCO "Agricultural Mitigation Policies."

Due to the net loss of prime farmland we would recommend the purchase of agricultural conservation easements be located within Santa Clara County within the Sphere of Influence of a local City. Prime farmlands are generally located on the valley floor within the Sphere of Influence of local Cities. This in turn will help preserve the remaining prime agricultural land within Santa Clara County while preventing urban sprawl.

Other innovative forms of agricultural mitigations can also be incorporated into the EIR. For example, given the rich agricultural heritage and legacy of the Santa Clara Valley, public art work such as engraved cement work depicting agricultural symbols such as garlic, row crops, cherry orchards or slogans such as the Valley of Hearts Delight can face traffic along the freeway overpasses or onramps. This would be a unique form of preserving the rich agricultural history in the area given the significant and unavoidable loss of prime farmland caused by the proposed project.

Response 10-I: *As described in MM-FARM-1.1, the project will acquire farmland conservation easements at a 1:1 mitigation-to-impact ratio. The easements will be held by the Open Space Authority and will be for farmland within Santa Clara County. This mitigation measure is the same as that identified on page 3 of the LAFCO Agricultural Mitigation Policies that were attached to this comment.*

At the time the project moves into final design, VTA will work with the County and/or other agencies such as the Open Space Authority to explore the feasibility of implementing the suggestions pertaining to some form of public art with an agricultural history theme. Although such ideas would not be true mitigation for the project's impact to farmlands, there may be opportunities to incorporate such features into the design of the project.

Comment 10-J: The Santa Clara County Parks and Recreation Department, in partnership with other public agencies, is charged with furthering the implementation of the Santa Clara Countywide Trails Master Plan Update. Under Section 2.1.2.2, the DEIR correctly identifies the Trails Plans and Policies of the Countywide Trails Master Plan Update, adopted as part of the County's General Plan in 1995. However, for clarity the DEIR must characterize these regional trails as shared-use (equestrian, bicycle, pedestrian uses on shared alignment) to be in full compliance Countywide Trails Master Plan Update's polices for regionally significant routes.

Per our prior preliminary plan review and correspondence with VTA in 2008 and 2009, we recommended implementation of trail routes that would result in readily accessible and safe alignments

for all users. As such, we recommend that the project implement Alternative 2 (trail crossing under Hwy 101 at Uvas-Carnadero Creek) as the preferred alternative under either Freeway Design Option A or B.

Response 10-J: *The recommendation of the Santa Clara County Parks and Recreation Department for the selection of Bicycle/Trail Alternative 2 is noted for the record. This recommendation is consistent with that of the project development team, as discussed in Section 1.3.4 of the Final EIR.*

Comment 10-K: While recommended trail widths can be modified to suit final site conditions, Alternative 2 should be designed to accommodate equestrians as well as hikers and cyclists (see recommended Trail Design Guidelines Figure G-2 and G-7 attached). Similarly, we also recommend that future trail crossing of U.S. 101 at the Pajaro River accommodate all users in compliance with its designation as a national historic trail.

We appreciate your efforts to provide safe and accessible trail routes as part of this project's design objectives. Santa Clara County Parks and Recreation Department looks forward to working closely with VTA and other interested agencies to finalize design development for this project.

Response 10-K: *VTA concurs with this recommendation. The facilities will be designed to accommodate pedestrian, bicyclist, and equestrian users. During final design, VTA will coordinate with the County in the design of these facilities.*

Comment 10-L: Chapter 1.3.1.11 (Page 21): Construction Schedule states, "If funding for the project or an initial phase of the project is secured in the near future, the soonest construction would commence would be in the year 2013." The construction year seems to be in error; please provide the corrected scheduled construction year.

Response 10-L: *Thank you for this comment. The date in Section 1.3.1.11 has been revised in the Final EIR to state that the earliest construction would commence would be in the year 2015.*

Comment 10-M: With the completion of the SR-25 interchange improvements, Santa Teresa Boulevard will become the major connecting link from SR-25 West/Northbound and US-101 Northbound to SR-152 Westbound. The EIR needs to identify traffic impacts to the SR-152 Westbound/Santa Teresa Boulevard intersection.

Response 10-M: *The traffic analysis evaluated the impacts of the project at various intersections along Santa Teresa Boulevard including Castro Valley Road, Gavilan College, Mesa Road, and Thomas Road (see Table 20 in the EIR). However, the Santa Teresa/SR 152 intersection, which is north of these intersections, was not included because the analysis showed that the impacts of the project beyond these intersections would not be substantial.*

Comment 10-N: The extension of the Santa Teresa Boulevard will become part of the County Roads system when completed, and we look forward to working with the Valley Transportation Authority during the design phase of the project.

Response 10-N: *VTA will work with the County's Roads and Airports Department during the final design of the extension of Santa Teresa Boulevard.*

Comment 10-O: A section of the Pajaro River from just north of the existing US 101 bridges running south to parallel with SR 129 toward Chittenden is identified as a Floodway on the current FIRM panels. Please see the attached FIRMettes. These facilities have been identified in the current Federal Insurance Study (FIS) as a regulatory floodway and floodplain of known and unknown base flood elevation and are located in the unincorporated Santa Clara County. Pursuant to Title 44 Code of Federal Regulation, Section 65.3 all improvements that will affect the base flood elevations in the Pajaro River through that portion of the unincorporated County floodway will require the submittal and issuance of a Floodplain Development Permit through the Santa Clara County Building Office.

Though the DEIR does speak to Federal Emergency Management Agency's (FEMA) floodplain issues on Carmadero, Gavilan, Tar, and Tick Creeks and the Pajaro River, and briefly discusses impacts to the water surface impacts, most of this area has been identified in Flood Zone A where the Base Flood Elevation has not been determined. Pursuant to Title 44 Code of Federal Regulation, Section 60.3(b) and the Santa Clara County Floodplain Ordinance, Santa Clara County requires that the above Floodplain Development Permit include base flood elevation data for the above Zone A areas.

The above Floodplain Development Permit (FOP) application will require a Conditional Letter of Map Revision (CLOMR) be prepared to the FEMA requirements with review and approval by County and FEMA staff prior to issuance of the FOP. The permit application will also require a Letter of Map Revision (LOMR) be prepared to the FEMA requirements, with review and approval by the County, the Santa Clara Valley Water District, and FEMA staff six months prior to the completion of construction. When you submit plans for the Floodplain Development Permit, please make sure you submit the following information:

- Two full sets of construction improvement plans including erosion control.
- Two complete CLOMR applications with all required hard copies and electronic copies.
- Clearance Letters or copies of permits as applicable from Army Corp (404 permit), Regional Board (401), NOAA Fisheries, Fish 8, Wildlife, Fish 8, Game, and any other state, local or federal agencies, including San Benito and Santa Cruz Counties. Per FEMA requirements of the local floodplain administrator, Santa Clara County will review the plans and check for conformance with the local, state, and federal agencies.
- A signed and stamped No Rise Certificate prepared by a Registered Civil Engineer.
- No Adverse Impact Certificate I Statement prepared by a Registered Civil Engineer.
- A No Impact to Structures Statement prepared by a registered Civil Engineer. The SCVTA can use the FEMA example No Rise language on SCVTA letterhead. No Impact to Structures

statement should state that there are no structures located in areas that could be impacted by the proposed development and/or be affected by the increased BFE (unless they have been purchased for relocation or demolition).

- The SCVTA can also include the following statements on the same letter to address the No Adverse Impact and No Impact to Structures. The No Adverse Impact statement should state that the proposed project does not: 1) Increase the flow velocities of "Pajaro River"; 2) Expand or change the limits of the floodplain; 3) Alter or change the physical characteristics of the floodplain, and 4) Decrease the flood storage capacity.

The lead time for CLOMR approval can vary from six months to two years.

Response 10-O: *Thank you for this information. Per standard procedure, when funding is secured and the project moves into the final design phase, all of the hydraulic data and studies will be revisited, as necessary, to ensure that the project meets all applicable requirements, including those described in this comment. Modifications to various project elements (e.g., size of culverts, capacity of detention basins, bridge dimensions, roadway elevations, etc.) may occur to ensure that the project does not result in significant floodplain impacts. The most current hydraulic data available will be used. As applicable, permits will be obtained.*

RESPONSE TO COMMENT #11: SANTA CLARA COUNTY OPEN SPACE AUTHORITY

Comment 11-A: Farmlands: Per the DEIR the project will convert 157 acres and 122 acres of prime farmland to highway uses under Design Options A and B, respectively; and will convert farmlands that are under Williamson Act contracts or held under conservation easement. The County's last remaining prime cultivated croplands on large economically viable farms occurs in the area south of Gilroy where the Project is proposed. The area is part of a very fertile agricultural region that extends south of Gilroy into San Benito County. Its deep alluvial soils are fed by numerous streams, which in turn provide a relatively high and stable water table that is ideal for irrigation. As part of the upper Pajaro River floodplain the south Gilroy farmlands play a critical role in retaining floodwaters that would otherwise inundate downstream farmlands and portions of Watsonville and the unincorporated town of Pajaro. Due to its critical importance to the agricultural economy, Santa Clara County's General Plan has designated this area as an "Agricultural Preserve." It has been recognized as a conservation priority by the both the California Department of Conservation and the United States Natural Resource Conservation Service, which provided funding for agricultural conservation easements that protect over 1,100 acres of south Gilroy's farmlands.

Given the importance of the south Gilroy farmlands to the region's agricultural economy, heritage and for community health, the Authority recommends:

Increase the mitigation ratio from 1:1 to 2:1 due to the unique and vital importance of this area to Santa Clara's agricultural economy, and the potential for cumulative impacts. Please note that 2:1 is the policy of many agricultural communities with similar, predominantly prime agricultural lands at stake, including the cities of Davis in Yolo County and Hughson in Stanislaus County. The need for 2:1 mitigation is further justified by the fact that the project will result in significant growth inducing impacts if and when the application for the El Rancho San Benito Development is re-submitted. Though the Project improvements are needed independent of the ERSB, the freeway widening will likely be a condition of ERSB approval, and thus help facilitate the ERSB project. The cumulative impacts to agriculture need to be taken into account. The ERSB project will not only result in an increase in traffic along local roads in this productive agricultural region, but further erode the agricultural economy by placing additional pressures for more ranches in the vicinity to be developed for non-agricultural uses.

Response 11-A: *As noted in Section 2.3.5 of the EIR, the California Department of Conservation recommends that agencies consider the use of farmland conservation easements at a 1:1 ratio. VTA is proposing the 1:1 ratio consistent with this recommendation, recognizing that there is no feasible mitigation that will avoid the net loss of prime farmland. Despite this fact, VTA believes that the 1:1 ratio is appropriate because it recognizes (per Section 2.2 of the EIR) that the project will facilitate future growth - including ERSB should its application be re-submitted and approved - and the easements are a tool for preserving farmland from development pressures associated with such growth. As stated in Section 2.3.5, this approach has been recognized as a valid approach to CEQA mitigation by the California Court of Appeals.*

VTA further notes that the project itself has been designed to minimize its footprint and, thereby minimize impacts to farmland; see discussion of "Minimization Measures" in Section 2.3.5. Finally, the project development team is recommending Design Option B, which when compared to Design Option A will avoid impacts to 35 acres of farmland.

For the above reasons, VTA believes that the purchase of farmland conservation easements at a ratio greater than 1:1 is not justified.

Comment 11-B: Increase the total mitigation acreage due to cumulative impacts from new frontage roads. Consider adding to the proposed mitigation ratio additional acreage based upon the proposed or similar formula: multiply the linear feet of new frontage roads by a depth of likely conversion from potential non-agricultural uses (150 to 200 feet).

Response 11-B: *The calculations of the project's impact to agricultural lands that are contained in Section 2.3 already account for the footprints of the new frontage roads.*

Comment 11-C: Provide up front funding for project and stewardship costs to the agencies that will transact and hold the farmland conservation easements in order to ensure that the mitigation ratio is met.

Project costs and long-term stewardship costs borne by the agency or agencies purchasing and holding future easements should be reimbursed by the VTA. It is not clear in the DEIR that these costs are included in the "costs of the easements", or if these refer to just the easement acquisition costs. We recommend that an amount be set aside for the agency that is 18% of total estimated easement value, which represents 5% for transactions, 5% for an easement stewardship endowment and 8% for other overhead costs. This is a standard practice used by the Central Valley Farmland Trust, Sequoia Riverlands Trust, Yolo Land Trust and other nonprofits engaged in mitigation transactions.

Response 11-C: *The intent of MM-FARM-1.1 is that the project would be responsible for all of the direct costs associated with the purchase of the conservation easements. Consistent with that intent, VTA will work with the OSA to determine an appropriate value for the costs of long-term stewardship. It is VTA general policy to implement mitigation simultaneously with the construction of each phase of the project.*

Comment 11-D: Due to the fact that the project will impact 5.9 acres of the JB Limited Partners property, which is protected by an agricultural conservation easement funded by local, state and federal agencies, consider shifting the freeway widening to the west to completely avoid this property. The Silicon Valley Land Conservancy holds a conservation easement over property. The taking of a portion of this property by eminent domain will result in substantial costs to the easement holder and landowner, as well as the various agencies which funded the easement. For example, one such recent taking of a portion of an easement-encumbered farm in Solano County, in which the landowners could not agree on the transportation authority's appraised value, has resulted in a two-month-long litigation process that has severely depleted the legal defense funds of the local land trust which holds the easement. In the case of this Project, the parties will also be required to engage an appraiser to determine both the current conservation easement value and the encumbered value of the portion of the property involved in the taking and reimburse the various agencies that were involved in the funding of the conservation easement. As an alternative, VTA should explore the feasibility of shifting the Project to the west so that none of the easement-encumbered property held by JB Limited Partners is impacted by the Project. If the project cannot be shifted west, costs borne by the various parties due to the eminent domain taking should be provided separately and in addition to the funding for the farmland mitigation.

Response 11-D: *As shown in Table 3 of the EIR, the right-of-way impact of the project to the JB Limited Partners parcels (APNs 841-36-016 and 841-36-019) is estimated to be 5.5 acres. This impact would be associated with the upgrade of the existing property access road (which is currently partially paved) to a full standard access road. This was included in the project because an upgrade is typically required by property owners when an adjacent highway is improved to freeway standards.*

In light of this comment, there are alternatives that VTA can discuss with the owners of the JB Limited Partners parcels: 1) eliminate the access road upgrade altogether and construct a retaining wall in lieu of the embankment along the existing right-of-way line, or 2) undertake

a more limited improvement to the access road that would minimize impacts. These options can be discussed with JB Limited Partners during the final design of the project.

Comment 11-E: Revisit the farmland impact analysis to account for potentially underrepresented impacts to prime farmlands. The Project DEIR (Table 10, p.52) identifies APN 810-34-007 as grazing land. This appears to be incorrect, as the 2010 Important Farmland Mapping and Monitoring Program classifies this area as Farmland of Local Importance. Note that there is no longer a record of this APN in the County GIS parcel database. This parcel is listed in the 2011 GIS parcel database as APN 810-82-002. Likewise, APN 810-38-017 (Table 10 pg. 52) is identified as grazing land, but a portion of this parcel is classified as Farmland of Local Importance and is described as prime farmland according to the Natural Resource Conservation Service SSURGO dataset.

Response 11-E: *It is acknowledged that the Assessor has recently changed some of the parcel numbers. However, the Land Evaluation and Suitability Evaluation (LESA) model, which is the basis for the impact assessment in Section 2.3, did not rely on the parcel numbers or the Important Farmlands Map, but rather on the soils and other properties of the land with regard to agricultural suitability. Therefore, impacts were not underreported.*

VTA also notes that the right-of-way and associated farmland impacts of the project will likely change as the project elements are refined during the final design phase. As part of this process, the LESA report will be updated to reflect the revised data, changes in farmland mapping, etc. This process will also allow for a final calculation of farmland impacts, which in turn will dictate the conservation easement requirements using the 1:1 ratio.

Comment 11-F: Natural Communities: The Upper Pajaro River corridor has been identified in the Bay Area Critical Linkages Project and other studies as an important regional landscape linkage between the Santa Cruz Mountains and Gabilan and Diablo Ranges. It is vital to design infrastructure improvements that maintain if not enhance the ability of wildlife to travel between core habitat areas. Researchers with Connectivity for Wildlife have documented numerous road kills along the entire stretch of Highway included in the Project area, as well as use of existing culverts by many wildlife species. While the DEIR identifies improvements and culvert upgrades that should improve wildlife connectivity, use of directional fencing is limited to about half of the project area (MM-NATCOM-3.6). To enhance connectivity, the Authority recommends:

Directional fencing be installed and maintained to span all of the crossing structures associated with the project. Given the abundant wildlife in this area and its regional significance for connectivity, additional directional fencing will increase the likelihood that species will be able to successfully pass through this landscape.

Response 11-F: *We appreciate the recommendation for directional fencing from SR 25 south to the San Benito River to direct animals to undercrossings and reduce road mortality. As*

described in MM-NATCOM-3.6, such fencing will be installed from a point 0.25 mile north of Tar Creek south to the San Benito River bridge. However, such fencing is not proposed north of the point 0.25 mile north of Tar Creek, for reasons discussed below.

When planning this project and assessing its potential impacts, VTA and the design team coordinated extensively with Caltrans District 5 biologists (including Nancy Siepel, Caltrans Biologist/Mitigation Specialist in the Environmental Stewardship Branch, who is extremely knowledgeable about wildlife movement issues on road projects), CDFW staff (particularly Santa Clara County biologist David Johnston), USFWS staff, and personnel preparing the Santa Clara Valley HCP/NCCP to incorporate design elements that would continue to allow wildlife movement through the project area, or even enhance wildlife movement, while reducing road mortality of wildlife in key areas and maintaining public safety. Multiple field visits with these personnel were conducted to examine the existing conditions, including existing crossings of U.S. 101 and adjacent land uses conducive to wildlife movement, to assess and discuss how the project might affect wildlife movement through the project area, and to consider measures to maintain or improve wildlife movement across the U.S. 101. In addition, a number of meetings and conference calls were held with those staff to discuss these issues.

Wildlife movement across U.S. 101 in the project area is expected to be relatively low north of SR 25 due to developed land uses in some areas and the presence of a solid median barrier north of SR 25. Between SR 25 and Tar Creek, the presence of extensive areas of intensively cultivated lands east of U.S. 101, which do not provide high-quality habitat or cover for dispersing animals, likely limits the importance of this area for dispersal as compared to the area from Tar Creek south to the San Benito River. In the segment between Tar Creek and SR 25, it was determined that because no changes to fencing or the median were necessary to construct the project, and because wildlife movement across this segment is not as important to regional habitat connectivity as the areas south of Tar Creek, there would be no need to change the existing fencing or median designs for wildlife movement from 0.25 mile north of Tar Creek northward.

Comment 11-G: For all other described impacts to natural communities, animals, plants, riparian resources and wetlands, the Authority recommends focusing mitigation in areas that are in close proximity to the Project location. Where feasible, in-lieu fees to the HCP/NCCP for permanent impacts to natural communities or species should be directed to the southernmost areas in the County identified as high conservation priorities in the HCP/NCCP Conservation Strategy. Where in-lieu fees are not feasible, mitigation measures should be restricted to locations that are within the Pajaro River Watershed.

Response 11-G: *VTA concurs with the Open Space Authority's recommendation that mitigation priorities should be focused as close to the project site as possible, whether the mitigation is through the HCP/NCCP, mitigation banks, or project-specific mitigation, whenever feasible.*

Sometimes, benefits may be achieved locally even if the mitigation is implemented on a watershed or regional scale. Nevertheless, for biological impacts that require compensatory mitigation including impacts to natural communities, special status animals, riparian and wetland habitat (there are no impacts to special status plants due to the project), VTA will pay development fees to the Santa Clara Valley HCP/NCCP, as the project is a covered activity in this Plan. As stated in the HCP/NCCP, potential restoration sites will be evaluated in coordination with local agencies or organizations active in restoration, such as the Open Space Authority and The Nature Conservancy.

For compensatory mitigation of wetlands, an alternative approach to the HCP involves purchasing credits in a wetland mitigation bank. The closest bank to the project site is the Pajaro River Wetland Mitigation Bank.

If the use of the HCP is not viable as mitigation for all impacts, another alternative for compensatory mitigation for biological impacts is project-sponsored mitigation. If this type of mitigation is implemented, VTA will also coordinate with local agencies and organizations active in habitat restoration, such as those mentioned above. An early inquiry into potential mitigation sites revealed numerous opportunities in the project vicinity (see Response 8-C).

Please also see Responses 15-B, 8-E, and 17-M.

Comment 11-H: Bicycle and Pedestrian Facilities: An important element of the Authority's mission is to provide public recreational access to open spaces. The Authority works in close partnership with other agencies and organizations to implement regionally significant trail and public access projects. The Authority supports the recommendations from the Bay Area Ridge Trail Council and the Santa Clara County Parks and Recreation Department to establish a multiple-use trail route that will support safe, enjoyable access across U.S. 101 via a new trail to be built along Carnadero Creek, under the freeway bridges.

Incorporate Alternative 2 in the final Project plans. This alternative appears to be viable under either Freeway Design Option A or B. Where feasible, we recommend integrating design elements and native landscaping along all trail routes, and especially at road crossings, that will help facilitate wildlife movement.

Response 11-H: *The recommendation of the Santa Clara County Open Space Authority for the selection of Bicycle/Trail Alternative 2 is noted for the record. This recommendation is consistent with that of the project development team, as discussed in Section 1.3.4 of this Final EIR. Where landscaping will be provided, it is VTA and Caltrans policy to utilize native plants and to avoid the use of any invasives.*

Comment 11-I: Direct Growth Inducement: As mentioned earlier, the Project area is part of a very productive agricultural region that extends south of Gilroy into San Benito County as far as Hollister. Santa Clara County's last remaining prime cultivated croplands on large economically viable farms occur in the area south of Gilroy where the Project is proposed. Growth inducement and cumulative impacts from potential developments on surrounding ranches facilitated by the freeway widening could over time erode the agricultural economy of this region.

Response 11-I: *This comment mirrors the conclusion in Section 2.2 of the EIR, namely that the project will result in a significant and direct growth-inducing impact if and when the application for the ERSB project is resubmitted and if the approval of ERSB is conditioned on the widening of U.S. 101.*

RESPONSE TO COMMENT #12: SANTA CLARA VALLEY WATER DISTRICT

Comment 12-A: Hydrology and Floodplain, Section 2.9: General Comment No. 1: In general, this section does not address the difference between Federal Emergency Management Agency (FEMA) hydrology and floodplain mapping which is regulated by the National Flood Insurance Program (NFIP) and the local floodplain administrators, such as the City of Gilroy and the County of Santa Clara (for the portion of the project located within the County of Santa Clara) and the use of best available or current hydrology and mapping for the project. This project proposes changes to the FEMA floodplain and must follow NFIP regulations as administered by the local floodplain administrators. For NFIP purposes, the project must use FEMA effective map hydrology to determine impacts of the project on the effective FEMA floodplain or apply to change the map to reflect new existing conditions and then analyze the project to address changes in the existing condition. The Location Hydraulic Study utilizes some FEMA information, but does not use FEMA flow rates for Uvas Creek at Highway 101, the Uvas Creek-East Overbank Above Highway 101 at Highway 101, or the Uvas Creek-South Spill. As another example of inconsistency with FEMA information, it was noted that the 100-year water surface elevations on Uvas Creek at Highway 101 calculated in the Location Hydraulic Study are approximately 2.5 feet lower using a flow rate of 8400 cfs than FEMA maps show using the incorrect (and low) flow rate of 8000 cfs.

General Comment No. 2 - The District has information that the hydrology currently used by FEMA for Uvas Creek is incorrect. Additionally, during the 2009 FEMA re-mapping process to convert paper maps to Digital FIRMs, the Uvas Creek watershed, in addition to adjoining watersheds in Gilroy, were mapped incorrectly. The correct Uvas Creek 100-year flow rate at Highway 101, without spills taken into consideration, is 16,900 cubic feet per second (cfs). In order to calculate the actual flow from Uvas Creek, the full flow rate needs to be routed through the channel and the overbank flows need to be calculated (such as for the area FEMA calls Uvas Creek-East Overbank Above Highway 101 and the overflow from the south bank of Uvas Creek, which flows towards Gavilan Creek, and the flows which overtop Highway 101). Similarly, the flows which currently cross Highway 101 and form the floodplain

FEMA calls Uvas Creek-East Overbank Above SPRR, the Uvas Creek floodplain in Uvas Creek, and FEMA's Uvas Creek-South Spill all join the floodplain which currently floods Highway 25. Detailed flow routing for this area should be provided using current hydrology, in addition to performing the necessary NFIP modeling. These flows should be calculated for the existing and proposed condition.

Response 12-A: *As noted in Chapter 3 of the EIR, VTA met with both the SCVWD and the City of Gilroy on various occasions in 2007 and 2008 for the purpose of discussing floodplain and hydraulic issues that were relevant to the project. During these meetings, VTA was informed that there was concern that the FEMA hydraulic model had flow rates less than those being used by the SCVWD for Uvas-Carnadero Creek. This concern was also conveyed to VTA in the SCVWD's response to the EIR Notice of Preparation (NOP) dated November 30, 2007. As a result, SCVWD provided its model to VTA, which was used instead of the FEMA model in the preparation of the project's Location Hydraulic Study.*

Comparing the FEMA and SCVWD models, the channel flowline elevation of Uvas-Carnadero Creek at U.S. 101 in the FEMA Flood Insurance Study's (FIS) flood profiles and SCVWD hydraulic model is approximately 172 feet NAVD and approximately 167 feet NAVD, respectively. The difference in the channel flowline elevation caused the 100-year water surface elevation of Uvas-Carnadero Creek in the Project's hydraulic analysis to be 2.5 feet lower than the elevation from the FEMA FIS flood profiles. In layman's terms, because the SCVWD model used a higher flow and a lower flowline than the FEMA model, it was more conservative.

To summarize, VTA utilized the most current data available to quantify the existing hydrologic conditions as they existed at the time the NOP was circulated, as required by CEQA Guidelines Section 15125(a). The data used was provided by the SCVWD and the model itself was the one used by the SCVWD on its projects.

The above notwithstanding, per standard procedure, when funding is secured and the project moves into the final design phase, all of the hydraulic data and studies will be revisited, as necessary, to ensure that the project meets all applicable requirements. Modifications to various project elements (e.g., size of culverts, capacity of detention basins, bridge dimensions, roadway elevations, etc.) may occur to ensure that the project does not result in significant floodplain impacts. The most current hydraulic data available will be used. VTA will coordinate with the SCVWD at that time.

Comment 12-B: General Comment No. 3 - The post-project analysis did not include new flow rate calculations for flow routing changes due to the raising of Highway 101, the reduction in bridge capacity and freeboard at the proposed Highway 101 bridge at Uvas Creek, the added culvert capacity or addition of new culverts at the Tick Creek, Tar Creek, Gavilan Creek and State Route 25 floodplain crossings/bridges to allow more 100-year flow to cross Highway 101 and State Route 25 at an early time in the hydrograph which currently backs-up and pools floodwaters until they eventually weir flow over

the highways under existing conditions. These hydrograph changes can change the peak flow rate in the receiving stream, as well as the downstream receiving streams. The post-project flow rates were assumed to be the same for existing and post-project scenarios with the only change being the new cross-section geometry. This does not show how the post-project geometry and cross-section changes will change the flow rates and flood routing in the watershed.

General Comment No. 4 - The Location Hydraulic Study only looked at mitigations for increased runoff from increased impervious surfaces to the peak 100-year flow rate. The analysis did not show how the project will change the hydrographs in the various downstream watersheds and how the project will mitigate for increased flood flow volumes, as well as peak flows, to the downstream receiving water bodies and the Soap Lake floodplain under various flow events.

Response 12-B: *The analyses in the Location Hydraulic Study utilized steady state models at the request of the SCVWD. The steady state models were provided to VTA by the SCVWD for use in the analysis. No other modeling, such as that now being requested in this comment, was requested by the SCVWD at the time of the coordination meetings in 2007 and 2008. VTA notes that the steady state modeling used in the Location Hydraulic Study is a conservative approach based on an assumption of no storage of water.*

Comment 12-C: General Comment No. 5 - The Location Hydraulic Study only analyzed the 100-year flood flow event. There is no study identifying the existing capacity of downstream receiving waterbodies to contain flood waters. Downstream receiving waterbodies currently flood during more frequent events, such as the 2-year event, 10-year event, etc. based on information obtained from the Pajaro River Watershed Flood Prevention Authority. There was no analysis showing the impacts of the project on the frequency of flooding downstream or on the lateral extent of flooding during these more frequent flood events or how the project will impact the hydrograph for downstream receiving waterbodies and the Soap Lake floodplain in order to avoid flooding Highway 101 or State Route 25.

Response 12-C: *The analysis in the Location Hydraulic Study was based on the 100-year flood event, which is the standard used in most analyses and referenced in the CEQA Checklist. The SCVWD response to the EIR NOP did not request analyses of more frequent events such as the 2-year or 10-year storms.*

During the final design phase, VTA will continue its coordination with the SCVWD (and other entities such as the Pajaro River Watershed Flood Prevention Authority) on floodplain and hydrological issues to ensure that the project design meets all applicable requirements at that time.

Comment 12-D: Section 2.9.2.3 - Impacts to the Tick Creek Floodplain: The DEIR states that there is no impact since the water surface in the Tick Creek floodplain will not raise. Please see General Comment No. 3. The District is concerned that post-project hydrology may change and that the

hydrograph in Tick Creek and the downstream receiving waterbodies such as Uvas Creek and the Pajaro River may be impacted without further analysis.

Response 12-D: *This comment raises the same issue as Comment 12-B regarding the request for the use of supplemental non-steady state analyses. Please refer to Response 12-B.*

Comment 12-E: Section 2.9.3.1 - Mitigation Measures for Impacts to Carnadero Creek Floodplain - Please see General Comments No.1 through 5. Additionally, the Location Hydraulic Study only recommends purchasing flooding easements where the water surface increases up to 0.8 feet under Design Option A. Depending on an analysis of existing structures in the watershed, any increase in flood elevations can adversely impact existing properties and cause structures that are at or above the existing 100-year water surface elevation to be below the 100-year water surface elevation which triggers NFIP compliance, flood insurance, and more onerous building requirements. This does not appear to have been analyzed. Also, the County of Santa Clara has a policy of zero-increase in the floodplain for areas outside a project's right of way limits. The Location Hydraulic Study shows several areas, utilizing its existing analysis, where the 100-year water surface elevations will increase. If the flood flows are re-analyzed based on our General Comments, this may change again. The proposed detention basin only mitigates for increased runoff due to the new impervious surface area for the freeway and only addresses 100-year flooding. Again, existing studies show that flooding in downstream receiving water bodies occurs during more frequent events. Any unmitigated flows during those more frequent events may increase the frequency of flooding downstream.

Response 12-E: *The water surface increase up to 0.8 feet in the hydraulic model for Design Option A is local; it only occurs between the downstream side of Castro Valley Road and the upstream face of the cross-culverts underneath the proposed U.S. 101 on/off-ramp cloverleaf. Upstream of Castro Valley Road, Design Option A would not increase the 100-year water surface elevation of the Uvas-Carnadero Creek overbank flow flowing into Gavilan Creek. The project includes purchasing the right-of-way between Castro Valley Road and the proposed interchange under Design Option A where an increase in water surface elevation is anticipated.*

VTA notes that this increase in water surface elevation would not occur under Design Option B, which is recommended for approval by the project development team, as discussed in Section 1.3.4 of the Final EIR.

Comment 12-F: Section 2.10.1.4 - NPDES Program: This section only identifies the Caltrans MS4 municipal NPDES permit and does not include mention of the Santa Clara County MS4 municipal NPDES permit. This section should make clear whether any portion of the project will drain from Caltrans right of way into the Santa Clara County storm sewer system or if the Caltrans storm waters will discharge directly into waters of the state or waters of the U.S. The Storm Water Data Report states that the "...Project is not located within any Municipal Separate Storm Sewer System (MS4)." It also states that the "...Project is currently not within a municipality or RWQCB that requires hydromodification

mitigation." However, it does not state how it came to that conclusion since there is no discussion of the Phase II municipal NPDES permit for Santa Clara County and the City of Gilroy.

Section 2.10.3 - Environmental Consequences of the Build Alternative: This section does not discuss how Tick Creek, Gavilan Creek, Uvas Creek and the Pajaro River will be impacted by hydromodification and increased erosion due to the constriction and/or expansion of the culverts or bridges along Highway 101 and along State Route 25. The Storm Water Data Report for the project states that peak attenuation basins will be designed to avoid downstream erosion from increased flow rates from the new impervious surface areas. This is a separate issue from increased flow rates from the changes in the culvert and bridge capacities at the various stream crossings and floodplain crossings.

Response 12-F: At the time the NOP for the EIR was circulated and the hydraulic analyses were prepared, there were no hydromodification requirements in either the Santa Clara County or City of Gilroy Phase II municipal NPDES permits. For this reason, the EIR does not include a hydromodification analysis. Nonetheless, as stated previously in Response 12-A, VTA will be revisiting and updating the hydrological analyses during the final design phase. That process will include compliance with the latest NPDES requirements and the use of the most current hydraulic data and models. All such analysis will include coordination with the SCVWD.

RESPONSE TO COMMENT #13: BAY AREA RIDGE TRAIL COUNCIL

Comment 13-A: Please accept these comments from the Bay Area Ridge Trail Council (Council) in response to the Draft Environmental Impact Report (DEIR) for the proposed improvements to US 101 in south Santa Clara and north San Benito counties. The Ridge Trail, a planned 550+ mile multiple use regional trail, will cross US 101 within the footprint of the Improvement Project. The Council is committed to preserving the best possible trail alignment in VTA's plan.

Some years back, representatives from the Council and planners from the Santa Clara County Parks Department met with VTA staff and consultants to review preliminary plans for the project. Through those meetings and subsequent site visits we identified a route that will support safe, enjoyable access across US 101 via a trail to be built along Carnadero Creek, under the freeway bridges. The alignment is incorporated in your DEIR as Alternative 2. This alternative would be viable under either Freeway Design Option A or B.

The Council recommends adoption of Alternative 2 in the final project plans. We also recommend adding text stating that the trail will accommodate equestrians as well as hikers and cyclists. Regarding the Design Options generally, the Council supports an option that allows for safe passage parallel to the freeway frontage, and through the various interchanges. These parallel trails, paths and bike lanes are

important for continuity of through passage for non-motorized travel, and connection to the regional trails.

Based on my analysis of the two Options, there does not appear to be much difference between them on that point. However, there seems to be a significant difference regarding impacts to the agricultural features of the south Santa Clara region. Option A would require taking 30 acres (about 20%) more farmland than Option B. Though the Council does not have a specific policy regarding farmland preservation, we do stand for preservation of open space (that could include working landscapes). Thus, the Council recommends ranking Option B higher than Option A.

Response 13-A: The recommendation of the Bay Area Ridge Trail Council for the selection of Design Option B and Bicycle/Trail Alternative 2 is noted for the record. This recommendation is consistent with that of the project development team, as discussed in Section 1.3.4 of this Final EIR. Finally, as suggested, equestrians have been added to the list of trail users; see Section 2.1.2.2 of this Final EIR.

RESPONSE TO COMMENT #14: CASTRO VALLEY PROPERTIES

Comment 14-A: Castro Valley Ranch is committed to respectful stewardship of the land and we value this opportunity to comment on the Draft Environmental Impact Report prepared regarding the 101 expansion and the 101/25 interchange. We understand the need to improve the transportation infrastructure, but believe it must be done with sensitivity to the unique character and agricultural heritage of the area.

Castro Valley Ranch has 8,400 acres and a long history of operating as a cattle ranch, farm and timberland in an environmentally sensitive manner. Much of the 101/25 interchange will be built on or near agricultural and pasture lands owned by Castro Valley Ranch and we are concerned that the Draft Environmental Impact Report inadequately addresses many of the impacts that would be caused by Design Option A.

Design Option A and Design Option B have such different environmental impacts, that we question why they are designated as "Design Options" rather than alternatives. We believe the final Environmental Impact Report should consider each of the options as alternatives and weigh the relative impact of each and choose one as preferred.

Response 14-A: VTA chose to use the term "design option" instead of "alternative" because in the context of the project as a whole, the only difference between the options is the location of the reconstructed U.S. 101/SR 25 interchange. More important than the way these options are identified, however, is the fact that they are treated as alternatives throughout the EIR, in

that the environmental impacts of each are broken out. Throughout Chapter 2 of the EIR, the analyses clearly differentiate between each option. Examples include, but are not limited to, farmlands, right-of-way, traffic, hydrology, visual, noise, and biology.

Comment 14-B: Pursuant to section 15126.6(d) of the CEQA Guidelines the EIR must include sufficient information to allow meaningful evaluation, analysis and comparison of the options. We do not believe the EIR in its current form meets this standard. However, in our review of what information is included in the EIR and its technical reports, the negative impacts of Design Option A seem much greater than Design Option B, and we suggest Design Option B as the preferred alternative. In the list below we have selected a few of the areas where the report must be revised to allow a meaningful comparison between Design Option A and Design Option B.

Table 4 on pages 28 through 30 of the report has several errors that imply both design options have similar or identical environmental impacts, when in fact Design Option A creates significantly more negative environmental impacts. For example, while Design Option A has significant visual impacts that cannot be mitigated, all of Design Option B's visual impacts can be mitigated to a less than-significant level. (See page 89 of the Draft EIR). Table 4 must be revised to note that there is a Significant Unavoidable Impact on views under Design Option A only.

Although Table 4 notes that Design Option A increases the impervious surfaces by 1.9 acres, nowhere does the table indicate that Design Option A also increases the Disturbed Soil Area by more than 20 acres versus Design Option B. All of these acres are in the northern area of the project, where the risk of soil erosion is highest, according to the Storm Water Data Report (page 7).

Design Option A takes significantly more prime and unique farmland but the report does not adequately consider potential mitigations. For example, the use of engineered walls rather than sloped fill might preserve much of the agricultural land, but this possibility does not seem to have been considered in the draft EIR.

Response 14-B: *Table 4 in the EIR is intended to provide a summary comparison between Design Option A, Design Option B, and the No Build Alternative. It is not intended to take the place of the detailed analyses contained throughout Chapter 2 of the EIR, nor is it intended to be all-inclusive.*

With regard to visual effects, the comment is correct in that the visual impact from Key View #1 (see Section 2.7) is significant and unavoidable under Design Option A but is less-than-significant under Design Option B. The word "unavoidable" has been added to Table 4 in this Final EIR.

The amount of disturbed soil was not called-out in Table 4 as it is not a significant factor with regard to environmental impacts in this case because the topography is relatively flat and the

soil erosion potential is low. Even if the potential for soil erosion were high, that potential could be addressed through the use of standard engineering design and construction best management practices.

With regard to minimizing farmland impacts, Section 2.3.5 of the EIR notes that the project design has been modified to reduce its footprint to the greatest extent practicable. This includes the use of retaining walls.

Finally, it is important to note that, from the perspective of the project as a whole, VTA concurs that there are fewer environmental impacts under Design Option B than under Design Option A. This fact is one of the reasons why the project development team is recommending that Design Option B be selected, as discussed in Section 1.3.4 of this Final EIR.

Comment 14-C: Design Option A permanently alters the floodplain and severs the connection between the Carnadero Creek and Gavilan Creek watersheds so that overspill from the Carnadero Creek never reaches Gavilan Creek whereas Design Option B does not. (Location Hydraulic Study Report, pg. 50.)

Response 14-C: *As stated in Section 2.9.2.1 of the EIR, both design options would result in significant impacts within the Carnadero Creek 100-year floodplain. However, mitigation is included in the project under both options to reduce the impact to a less-than-significant level. The net result will be an increase in the water surface level of the 100-year flood on the west side of U.S. 101 by less than 0.8 feet under Design Option A, with no increase under Design Option B. As noted previously, the project development team is recommending that Design Option B be selected.*

Comment 14-D: We note with great concern that Design Option A places the new 101/SR25 interchange in a location highly susceptible to liquefaction (Preliminary Geotechnical Report, Figure 17) and a high level of earthquake hazard (Preliminary Geotechnical Report, Figure 18) whereas Design Option B places the extension of Santa Theresa Boulevard outside of these hazard areas. In spite of including the maps identifying these hazards, the Preliminary Geotechnical Report defers any discussion of these hazards or their possible mitigation to a future date. (pg. 27)

Response 14-D: *This comment is incorrect. Figure 17 of the Preliminary Geotechnical Report shows both interchange options in locations having the same earthquake shaking potential. Similarly, Figure 18 of the Preliminary Geotechnical Report shows both interchange options in locations having the same susceptibility to liquefaction.*

Comment 14-E: The draft EIR notes that Design Option A destroys more acres of habitat for both the California Red-Legged Frog and the California Tiger Salamander, but fails to identify Design Option B as potential mitigation of this impact.

Response 14-E: *Both Design Options have been analyzed for impacts to California red-legged frog and the California tiger salamander habitats, with mitigation identified for these impacts. Design Option B cannot serve to mitigate for impacts under Design Option A. However, it should be noted that the project development team recommends the selection of Design Option B for the interchange configuration, as this option avoids or minimizes many of the impacts identified under Design Option A, including impacts to red-legged frog and tiger salamander habitats.*

Comment 14-F: Design Option A will disturb far more alluvium deposits than Design Option B and we question why, at least with respect to Design Option A, Caltrans allowed reliance on a Paleontology report developed for another project covering a different area and which did not consider the potential differences in effect between the two design options.

Response 14-F: *The paleontological report that was originally prepared in 2008 for the State Route 25 Project covered the footprint of the U.S. 101 Improvement Project, with the exception of the southernmost segment. Therefore, in 2011, an addendum to the 2008 report was prepared to address the missing segment. The addendum also reviewed and updated the findings and recommendations of the 2008 report, as necessary, to specifically address the U.S. 101 Improvement Project. There are no substantial differences between Design Option A and Design Option B with regard to paleontology as both pass through the same soil types that have the potential to contain paleontological resources.*

Comment 14-G: Design Option A requires two new culverted crossings of Gavilan Creek (one north of and one south of Castro Valley Road) and one new culverted crossing of Farman Canyon Creek, none of which are required by Design Option B. The environmental impact of, and potential mitigations for, these alterations to riparian habitats and stream beds do not appear to be detailed in the draft report.

Response 14-G: *The impacts of these new crossings on wetland and aquatic habitats were included in the impact acreages provided in Section 2.18.3 of the EIR. Under Design Option A, a new 6-foot x 4-foot x 45-foot reinforced concrete box culvert (RCB) would be required at the Santa Teresa crossing of Gavilan Creek and a new 6-foot x 6-foot x 50-foot RCB culvert at the Monterey Street crossing. There is no culvert required at Farman Canyon Creek for the Santa Teresa Extension. These structures are not required under Design Option B.*

The EIR and associated Natural Environment Study (NES) note that the majority of sensitive habitats, including wetland, riparian, and aquatic habitats, within the study area are associated with the bed and banks of the several creeks and rivers that cross the alignment including Gavilan Creek, and/or several unnamed intermittent drainages. Impacts to these sensitive habitats and associated mitigation are described in Section 2.17 of the EIR. Please also see the responses to comments 8-F and 17-M, which include additional text that has been added to the EIR to provide more detail on wetland and aquatic habitat mitigation. Typically, during final

engineering, when the design of the project is better defined and impacts are precisely calculated at each creek crossing, the details of compensatory mitigation, which are based on the information presented in the EIR, are refined in cooperation with the regulatory agencies having jurisdiction over biological resources; this information is then included in the permit applications. VTA has a strong record of working cooperatively with the resource agencies to identify mitigation that best offsets the impacts and ultimately provides environmental benefits at a local, watershed, or regional scale, depending on the biological objectives of each agency.

The recommendation for the selection of Design Option B is noted for the record. This recommendation is consistent with that of the project development team, as this option avoids many of the impacts identified under Design Option A, including those to biological resources, as discussed in Section 1.3.4 of this Final EIR.

Comment 14-H: The coyote brush scrub, aquatic and riparian habitats located north of Castro Valley Road (see the Natural Environment Study appendix Figure 2e) would be impacted only by Design Option A. Design Option B does not seem to have any impacts on these areas, especially if Design Option B is revised to eliminate the unnecessary eastern shift of Santa Teresa Blvd from its current alignment. Design Option A would not only directly impact these biologically valuable environments, but would leave them surrounded on all sides by roads permanently disconnecting them from the surrounding area.

Response 14-H: *Coyote brush scrub habitat is located in the northwest quadrant of the Castro Valley Road/Santa Teresa Boulevard intersection. This habitat is impacted under both design options, with the total permanent impacts to this type of habitat shown in Table 34 of the EIR. Permanent impacts to aquatic habitats are greater under Design Option B for the project as a whole. Permanent impacts to riparian habitat are the same under both design options. The stock pond (aquatic habitat) located south of Castro Valley Road, as shown on Figure 20e in the EIR, has been identified as suitable breeding habitat for California red-legged frogs and California tiger salamanders. This pond is not directly impacted by either design option. However, to facilitate movement of these species and reduce potential mortality associated with crossing roads, the project includes a bridge and one or two culverts to allow animals to cross under the frontage road (under Design Option A) or Santa Teresa Boulevard (under Design Option B), as described in Section 4.3.3.2 of the NES and Section 2.21.5 in the EIR. The alignment (easterly shift) under Design Option B is necessary to meet the design speed criterion for the road and avoid the Miller Family Cemetery.*

Comment 14-I: High intensity night lights may affect the behavior, biology, and ecology of nocturnal animals, such as bats, frogs and salamanders. Under Design Option A high intensity night lights will affect a much larger area than Design Option B both because the interchange would be significantly larger and because the additional connecting loops and ramps would cause headlights to be cast in more

directions. The Draft EIR needs to address this potentially significant impact and identify possible mitigations.

Response 14-I: *Lighting will be provided in accordance with Caltrans design standards. Where possible, the project will include low intensity, low-glare, or no-glare lighting to reduce light pollution. Lighting will be directed away from natural areas (to the greatest extent practicable considering safety issues) and vegetation will be planted to minimize long distance glare. No artificial lighting will be installed under bridges or within culverts to minimize impacts to bats and other nocturnal wildlife.*

Comment 14-J: Design Option A significantly alters the topography of the interchange site and creates more opportunities for the creation of permanent standing water which could attract nonnative predators and adversely impact protected amphibian species such as frogs and salamanders.

In addition to the potential for new permanent bodies of water, the alterations in topography may create small temporary bodies of water that attract breeding California Red-legged Frogs and California Tiger Salamanders, but which may not hold water long enough to support these species through the completion of their metamorphosis and thus significantly reduce the breeding success of these sensitive species. We do not believe that the draft EIR adequately addresses these potential impacts of Design Option A.

Response 14-J: *It is difficult to assess why the commentor believes standing water will result with implementation of the project, as no details or specific examples are given. Under Design Option A, any water that accumulates within the interchange footprint will drain to the large culverts that ultimately discharge into the detention basin. The detention basin under Design Option A is larger than under Design Option B; however, under both options, the basin includes design features that allow the water to discharge to Carnadero Creek.*

As mentioned under Response 14-H, to facilitate movement of California red-legged frogs and California tiger salamanders, the project includes a bridge and one or two culverts to allow animals to cross under the frontage road under Design Option A (or Santa Teresa Boulevard under Design Option B). These features not only serve for wildlife connectivity but also allow for drainage.

Comment 14-K: In Design Option A, the destruction of one or more wells on Castro Valley Ranch land north of the current interchange will significantly impact the area's resource base and may also result in as yet unexplored impacts on the ecological systems that are directly or indirectly dependent on the water from that well, or water that will now need to be taken from other sources of supply. The draft EIR should identify this as a significant impact and list possible mitigation measures.

Response 14-K: *To VTA's knowledge, the wells located on Castro Valley Ranch serve agricultural purposes. Any well closed due to implementation of the project will be replaced in-kind and as close to the original location as possible with minimal or no downtime. It is*

anticipated that due to relocation and minimal/no downtime, these wells will continue to serve their original function.

Comment 14-L: The items listed above are just some of the differences in environmental impacts between Design Option A and Design Option B. Even for those items where the EIR mentions a difference between the two design options, it fails to satisfy section 15126.6(a) of the CEQA Guidelines because the options are not identified as alternatives to be compared and fails to satisfy section 15126.6(d) because there is insufficient information in the EIR to allow a meaningful evaluation.

Perhaps most importantly, the draft EIR fails to comply with section 15126.6(b) and undermines the very purpose of an Environmental Impact Report because it fails to compare the options to identify if one of the two options can mitigate or avoid some of the environmental impacts of the project.

Response 14-L: *VTA disagrees with this comment. As noted in Response 14-A, the differences between Design Option A and Design Option B are clearly described throughout Chapter 2 of the EIR, including the technical analyses upon which Chapter 2 is based. In fact, both options are analyzed fully and equally throughout the EIR, which exceeds the requirements of Section 15126.6(d) of the CEQA Guidelines, which states that alternatives shall be discussed at lesser detail than a proposed project. The fact that the term "design option" instead of "alternative" is used does not change the fact that both options are evaluated fully and equally in the EIR.*

Comment 14-M: We have several additional concerns with the Draft Environmental Impact Report beyond its treatment of the design options. In reviewing the travel time analysis, we would like the final EIR to provide more detail regarding how the travel times were calculated. If these are intended to be U.S. 101 mainline travel times, they seem inconsistent with the results in Table 1 (US 101 Bottleneck Locations and Queuing) and Table 2 (Ramp Junction Level of Service) in the Traffic Operations Report and inconsistent with the results in Appendix E and F.

Response 14-M: *The travel times shown in Table 19 of the EIR are for the mainline on U.S. 101. The travel times take into account projected bottlenecks - if any - under each scenario. In other words, they take into account delays as a result of the bottlenecks and queuing shown in Table 1 of the traffic report. Table 2, Ramp Junction Levels of Service, depicts how the intersection of each freeway ramp with the local streets will operate. The data in Table 2 are not used in the travel time calculations. Appendices E and F contain input used to calculate the data shown in Tables 1 and 2. It is important to note that these numbers are only approximate calculations of the anticipated travel times through the project corridor and are intended to provide the public an indication of the anticipated travel times under the build and no-build scenarios in 2035.*

Comment 14-N: The draft EIR does not address the impact of the destruction of our large barn near the Freeman Quarry entrance. The removal of this agricultural building (which is also host to a seasonal

fruit stand) is a significant change in the use of the land and should be considered in the draft EIR as required by section 15126.2(a) of the CEQA Guidelines. We are concerned also that the planned roadways will encroach on several residences near the barn and would like the draft EIR to disclose how close the edge of the new roadways will be to the residences and perimeter fence and discuss possible mitigation measures.

The proposed project will significantly impede access to our land at several points including limiting access to Castro Valley Road. We would like the draft EIR to discuss access to ranch lands and farmlands as access limitations may change the land use and have a significant impact on the environment. At a minimum Castro Valley Ranch will require roads sufficient for farm access of heavy tractors and routine farm operations and right of ways consistent with the new upgraded road required under the Castro Valley Ranch Subdivision Environmental Impact Report.

Response 14-N: The removal of the barn is addressed in Section 2.4 of the EIR. The project will not require removal of any other residences on the property. The edge of pavement will be 37 feet away from the nearest residence. The project will enhance access to Castro Valley Ranch by providing the owner with multiple options for connecting to the new frontage road at various locations along the property line, as best suited for the farming operations. All new publicly-owned roadways will have standard roadway geometry that can accommodate farming vehicles. Turn radii are also designed to accommodate farm vehicles.

RESPONSE TO COMMENT #15: THE NATURE CONSERVANCY

Comment 15-A: Provide directional wildlife fencing throughout the Project to ensure wildlife connectivity: TNC supports the Valley Transportation Authority's (VTA) efforts to provide for wildlife movement across the improved section of U.S. 101 in Santa Clara and San Benito counties, given the Project's location in an area of importance for both habitat connectivity and wildlife passage. TNC has invested significant resources in identifying and preserving important properties and wildlife connections in this region, and has participated in regional planning processes that have identified the Project location as crucial to the survival of wildlife populations moving between the Gabilan, Santa Cruz, and Mount Hamilton ranges.

Based on this work, TNC recommends that EIR Mitigation Measure NATCOM-3.6 be revised to specify that directional wildlife fencing be installed at the following specific locations which will encompass all crossing structures within the study area:

- From the San Benito Bridge to the U.S. 101 - Pajaro Bridge;
- From U.S. 101 - Pajaro Bridge to the Tar Creek Culvert;
- From the Tar Creek Culvert to the Tick Creek Culvert; and

- Up to Hwy 25 from Tick Creek.

This recommendation is based on the high volume of multiple species animal movement recorded at the U.S. - 101 Pajaro Bridge, Tar Creek, and Tick Creek, as shown by camera installations commissioned by TNC at each of these locations. Furthermore, TNC has tracked a high number of animals hit by vehicles along this stretch of road, including a North American Badger, a species designated by the California Department of Fish and Wildlife as a California Species of Special Concern.

Response 15-A: *Please refer to the response to Comment 11-F above.*

Comment 15-B: Direct compensatory mitigation funding to conservation priorities in the region: Where there is a need for compensatory mitigation, we recommend the VTA engage in strategic mitigation to achieve better conservation outcomes. There exists a wealth of data and plans in the region that identify conservation priorities embraced by the environmental community and wildlife agencies. Examples include: the Bay Area Critical Linkages project, the California Department of Fish and Wildlife Conservation Action Plan and the conservation reserve design in the Santa Clara Valley Habitat Conservation Plan / Natural Communities Conservation Plan.

We urge the VTA to direct mitigation funds to protect conservation priorities that contribute to ecosystem function and in places that most closely reflect the type and location of project impacts. Although the Project may proceed in phases, to the extent practicable given funding availability, VTA should secure mitigation for the entire project as soon as possible in order to ensure the most comprehensive conservation outcome. As an added benefit, securing property for mitigation at an early stage will achieve cost savings and avoid conversion to other land uses.

Response 15-B: *VTA concurs with The Nature Conservancy's recommendation to fund conservation priorities in the region. Consistent with that intent, VTA is one of six local partners in the just-approved Santa Clara Valley HCP/NCCP. As described in Sections 2.17 through 2.21 of the EIR, the project is a "covered activity" under the HCP/NCCP and mitigation for all biological impacts will utilize the HCP/NCCP to the greatest extent permitted.*

For biological impacts that require compensatory mitigation including impacts to wetlands and aquatic habitat, riparian habitat, oak woodland habitat, and a number of special-status animal species, VTA will pay development fees to the HCP/NCCP. The Implementing Entity (formally known as the Santa Clara Valley Habitat Agency) will use the funds to offset project impacts within the Plan's reserve system or, in some cases, outside the reserve system if the environmental benefits are greater and the conservation goals of the Plan are met. As stated in the HCP/NCCP, potential restoration sites will be evaluated in coordination with local agencies or organizations active in restoration, such as the Open Space Authority and The Nature Conservancy.

For compensatory mitigation of wetlands, an alternative approach to the HCP involves purchasing credits in a wetland mitigation bank. The closest bank to the project site is the Pajaro River Wetland Mitigation Bank.

Another alternative for compensatory mitigation for biological impacts is project-sponsored mitigation. Typically, this type of mitigation is implemented on a smaller scale, whereas the HCP/NCCP and mitigation banks are on a larger in scale. Nevertheless, if this type of mitigation is implemented, VTA will coordinate with local agencies and organizations active in habitat restoration, such as those mentioned above. An early inquiry into potential mitigation sites revealed numerous opportunities in the project vicinity (see Response 8-C).

The project is currently unfunded beyond the environmental clearance phase. When funding is obtained, it will be to advance the design and then enter construction. Depending on the amount of funding identified, the project may be implemented in phases. Phases may be years apart. It is likely that funding would only include enough money to implement mitigation requirements related to a particular phase. However, if there is opportunity to do additional mitigation that the regulatory agencies would accept as "credit" for future project phases, or for other VTA projects in the area, then VTA may consider implementing a larger mitigation project. VTA's experience is that "credit" is not easily given by the regulatory agencies. Alternatively, if grant funding is available to do additional mitigation, VTA is open to discussing this with The Nature Conservancy, or other interested organizations. However, grant funding cannot typically be used for mitigation purposes.

Please also see Responses 11-G, 8-E, 17-M.

Comment 15-C: Ensure proper mitigation for growth-inducing impacts with respect to potential future development: While the EIR makes a finding of significant unavoidable impacts with respect to the growth-inducing impacts of the El Rancho San Benito (ERSB) development (Impact GR-1), it concludes without further explanation that no feasible mitigation measures exist to lessen this impact. The EIR states that as of May 2009, the application for the ERSB Specific Plan had been withdrawn and was no longer under consideration by San Benito County. However, TNC believes that the ERSB project may be resubmitted to the County in the near future, potentially as part of the San Benito County General Plan update process which is currently underway.

We understand that the Project will go forward regardless of the ERSB development, and that approval of the ERSB development lies within the jurisdiction of other regulatory entities. But the widening of U.S. 101 and improvements to the U.S. 101/Betabel Road/Y Road interchange remain a necessary component of any eventual ERSB development. Despite this, the EIR's current traffic model does not take into account the ERSB development's additional vehicle trips or other related impacts. TNC believes traffic-related impacts from the ERSB development may present threats to important habitat and to the ability of wildlife to move through the region. Given that the ERSB development may

currently be under consideration again, TNC believes that that Project's indirect effect on regional growth (Impact GR-2) merits further analysis.

Response 15-C: *As noted in the EIR and as acknowledged in this comment, there is currently no ERSB application on file. It is not known if the ERSB developer will file a new application and, if that occurs, what the ERSB project will be proposing. Therefore, an analysis of ERSB traffic, or any other environmental effect, is neither feasible nor required under CEQA. Such analysis would be speculation. The traffic forecast used in the EIR does, however, account for the growth identified in the approved San Benito County General Plan.*

RESPONSE TO COMMENT #16: PACIFIC GAS & ELECTRIC COMPANY (PG&E)

Comment 16-A: Section 2.5.1 (Utilities/Emergency Services) of the EIR explains that a PG&E gas line is “located within Caltrans’ right-of-way on the east side of U.S. 101. There is also an existing 115-kilovolt PG&E high voltage electric line that runs parallel to the UPRR tracks and crosses SR 25 adjacent to the at-grade crossing of the tracks.” The EIR’s effects analysis concludes that “some of the existing utility lines will be relocated” and that “replacement of the PG&E towers closest to SR 25 with higher towers” will be needed to maintain vertical clearance requirements.

PG&E is subject to the jurisdiction of the California Public Utilities Commission (CPUC) and must comply with CPUC General Order 131-D on the construction, modification, alteration, or addition of all electric transmission facilities (i.e., lines, substations, switchyards, etc.). In most cases where PG&E’s electric facilities are under 200 kV and are part of a larger project (e.g., highway project), G.O. 131-D exempts PG&E from obtaining an approval from the CPUC provided its planned facilities have been included in the larger project’s California Environmental Quality Act (CEQA) review. PG&E may proceed with construction once PG&E has filed notice with the CPUC and the public on the project’s exempt status, and the public has had a chance to protest PG&E’s claim of exemption. If PG&E facilities are not adequately evaluated in the larger project’s CEQA review, or if the project does not qualify for the exemption, PG&E may need to seek approval from the CPUC (i.e., Permit to Construct), taking as long as 2 years or more since the CPUC would need to conduct its own environmental evaluation (e.g., Initial Study).

PG&E therefore offers the VTA the following recommendations:

- Coordinate as early as possible with PG&E’s Environmental Management on the development and review of required agency permits and authorizations
- Include impacted PG&E facilities in its project description and evaluate under CEQA all impacts caused by PG&E facilities relocation
- Include construction work and design of utility facilities impacted in any permits and authorizations required by resource agencies

- Coordinate with PG&E on plans to alleviate “temporary” impacts and avoid accidental impacts to PG&E facilities during construction.

The above recommendations could reduce the project’s cost and schedule by avoiding the need for additional environmental evaluation or permitting for the relocation, replacement, and/or modification of PG&E facilities. PG&E is committed to working with VTA on this project, while maintaining its commitment to provide timely, reliable, and cost effective electric service to its PG&E customers.

Response 16-A: *VTA concurs with these recommendations. This EIR is intended to provide CEQA clearance for utility relocations associated with the project. In that regard, the analyses contained in the EIR account for the environmental impacts of the relocations of utilities, to the extent that the project will necessitate such relocations. As described in Section 2.5.2, utilities will be relocated to adjacent frontage roads or within easements on adjacent private properties. The text also notes that up to four towers supporting an existing 115-kV electric line will be replaced. The limits of disturbance delineated for the various technical analyses (e.g., cultural, biology, farmlands, etc.) include the areas where utility lines would be relocated.*

When the project enters the final design phase, VTA will work closely with PG&E regarding impacts to, or relocations of, its utility lines.

RESPONSE TO COMMENT #17: SIERRA CLUB & AUDUBON SOCIETY

Comment 17-A: I. Incomplete Species List: The DEIR provides an incomplete list of special status species that may be impacted by the Project. Table 36 (Assessment of Special-Status Animal Species for their Potential to Occur Within the Project’s Biological Study Area) does not include the California redlegged frog and California tiger salamander, although these species are discussed in the text of the document. Other species that should be included are: coast horned lizard, Swainson’s hawk, least Bell’s vireo, and legless lizard.

Response 17-A: *Section 2.20 in the EIR, in which Table 36 appears, is applicable to “wildlife not listed or proposed for listing under the state or federal Endangered Species Acts.” Species that are listed as threatened or endangered under either the Federal or State Endangered Species Act, and that could potentially be impacted by the project, such as the California red-legged frog, California tiger salamander, and least Bell’s vireo, are discussed in Section 2.21.2.2.*

As described in the Natural Environment Study (NES) for the project, the habitat for coast horned lizard consists of sandy soils, usually in dry creek channels, or coastal dunes. Habitat within the Biological Study Area (BSA) for the project is not consistent with the dry, sandy

habitat in which this species typically occurs; therefore, the species is considered absent from the project area. Likewise, suitable sandy habitat for the silvery legless lizard is absent from the project area, and this species is not known to occur in the project vicinity. Because both of these California species of special concern are absent from the project area, they did not need to be included in Table 36.

Swainson's hawk, which is state-listed as threatened, occurs as an occasional migrant through Santa Clara and San Benito counties, but it is not known or expected to nest anywhere in the project area (e.g., there are no recent nest records for Santa Clara or San Benito Counties), and it is not expected to forage frequently or for long periods in the project area during migration. Therefore, this species will not be affected by the project, and its inclusion in the Draft EIR was unnecessary.

To clarify the use of the term "special-status species" in Section 2.20 as not including state or federally threatened or endangered species, the text of the EIR and the title of Table 36 have been revised.

Comment 17-B: Impacts to Wildlife Movement: The importance of this region for wildlife movement and linkage between the Santa Cruz, Diablo, and Gabilan ranges via Lomerias Muertas is acknowledged in the DEIR, and has been documented by numerous agency and planning organization projects (Missing Linkages project, 2001; California Essential Habitat Connectivity Project (CEHCP), 2010). We asked Dr. Fraser Shilling, Co-Director of the Road Ecology Center at the University of California, Davis, to provide us with a map of wildlife movement through the study area. The map he prepared (Figure 1) is based on research and documents from Caltrans and the California Department of Fish and Wildlife (CDFW). It clearly shows that US 101 at the project area cuts right through an area that Caltrans and the CDFW have designated as important for wildlife movement.

[Note: Figure 1 submitted with this comment is reproduced in Appendix F of this Final EIR.]

Response 17-B: *Figure 21 in the EIR depicts important wildlife movement pathways matching those in the figure provided with this comment, and the EIR discusses the importance of these pathways for regional wildlife movements. It should be noted that the crossing of the movement pathway along the Pajaro River by U.S. 101 is an existing condition; thus, Caltrans and CDFW have designated this movement pathway as important even in the presence of U.S. 101. The project will maintain important undercrossings, such as those at Tar Creek and the Pajaro River, to allow wildlife to continue to move under U.S. 101 at this point, and it incorporates directional fencing to guide wildlife to these undercrossings.*

Comment 17-C: We consider it unfortunate that the DEIR proposes inadequate mitigations rather than the incorporation of Best Management Practices (BMPs) for wildlife movement in the evaluation, design, construction, operations, maintenance, development of success criteria, and monitoring for this

project. North of Gilroy, US 101 creates a formidable barrier to wildlife movement. The proposed project would extend this barrier south, all the way to highway 129. This would be a great loss to California's wildlife. We recommend these documents be consulted to better evaluate the project's impacts and reduce impacts:

- Vermont's Best Management Practices for Highways & Wildlife Connectivity
- Wildlife Crossings Guidance Manual, California Department of Transportation

Response 17-C: *When planning this project and assessing its potential impacts, VTA and the design team coordinated extensively with Caltrans District 5 biologists (including Nancy Siepel, Caltrans Biologist/Mitigation Specialist in the Environmental Stewardship Branch, who is extremely knowledgeable about wildlife movement issues on road projects), CDFW staff (particularly Santa Clara County biologist David Johnston), USFWS staff, and personnel preparing the Santa Clara Valley HCP/NCCP to incorporate design elements that would continue to allow wildlife movement through the project area, or even enhance wildlife movement, while reducing road mortality of wildlife in key areas and maintaining public safety. Multiple field visits with these personnel were conducted to examine the existing conditions, including existing crossings of U.S. 101, to assess and discuss how the project might affect wildlife movement through the project area, and to consider measures to maintain or improve wildlife movement across U.S. 101. In addition, a number of meetings and conference calls were held with those staff to discuss these issues. With respect to ecological issues, more time was spent by the team investigating solutions to wildlife movement/connectivity issues than any other issue.*

A number of references on wildlife crossings and best management practices for road design were consulted to determine measures that could feasibly be incorporated into the project to meet the aforementioned goals of maintaining or enhancing wildlife movement while maintaining public safety. These references included:

- *Caltrans' Wildlife Crossings Guidance Manual*
- *Barnum, S. A. 2003. Identifying the best locations to provide safe highway crossing opportunities for wildlife. International Conference on Ecology and Transportation, 2003 Proceedings.*
- *Forman, R. T. T., D. Sperling, J. A. Bissonette, A. P. Clevenger, C. D. Cutshall, V. H. Dale, L. Fahrig, R. France, C. R. Goldman, K. Heanue, J. A. Jones, F. J. Swanson, T. Turrentine, and T. C. Winter. 2003. Road Ecology: Science and Solutions. Island Press, Washington, D.C.*
- *Jackson, S. D. and C. R. Griffin. 2000. A strategy for mitigating highway impacts on wildlife. Pages 143-159 in Messmer, T. A. and B. West (eds), Wildlife and highways: seeking solutions to an ecological and socio-economic dilemma. The Wildlife Society.*

- Ng, S. J., J. W. Dole, R. M. Sauvajot, S. P. D. Riley, and T. J. Valone. 2004. *Use of highway undercrossings by wildlife in southern California. Biological Conservation 115:499-507.*
- Ruediger, B. 2007. *Safe passage: a user's guide to developing effective highway crossings for carnivores and other wildlife. Southern Rockies Ecosystem Project.*

Wildlife movement requirements of the Santa Clara Valley HCP/NCCP, which was in development at the time of design and environmental review of the project, were also referenced. The design team then took a segment-by-segment approach to implementing such measures, as feasible, to avoid and minimize adverse effects on the ability of wildlife to move successfully across U.S. 101, focusing on the following:

- *Minimizing the footprint of expansion areas, particularly where bridges will be widened and culverts will be lengthened.*
- *Reducing road mortality in areas where wildlife movement across the highway is (or will be) of less benefit to populations.*
- *Increasing connectivity where wildlife movement across the highway is of greatest benefit to populations.*

Using this approach, best management practices were applied with the individual characteristics of existing crossings, medians, and adjacent habitats in mind. The resulting approaches could have been simply incorporated into the project design, or considered "BMPs", to support a less-than-significant impact determination. However, VTA took the more conservative approach of considering the impact to be less than significant with mitigation, and the segment-by-segment measures that were developed to maintain and enhance wildlife movement were included as mitigation measures.

We disagree that the project will extend a barrier to wildlife movement south to SR 129. Even without the implementation of mitigation measures, wildlife use of existing undercrossings would continue. Mitigation measures specified in the EIR will provide additional opportunities for wildlife movement.

Additional detail regarding existing conditions and project impacts with respect to wildlife movement, including an assessment of measures to maintain/enhance wildlife movement, can be found in the project's NES, which is the technical study on which Sections 2.17 through 2.21 of the EIR were based, and which was made available for public review.

Comment 17-D: The DEIR proposed mitigation for wildlife movement is haphazard, with little focus on the species to be impacted, design and placement of fences and crossings, monitoring to determine whether or not the goals of maintaining connectivity across suitable habitats will be achieved, or success criteria.

Response 17-D: *The mitigation for impacts to wildlife movement is not haphazard. As discussed in the response to comment 17-C, extensive discussion of wildlife movement issues and mitigation/enhancement measures occurred during the project design and initial impact assessment process. Species-specific connectivity issues were assessed in the project's NES, which is the technical study on which Sections 2.17 through 2.21 of the EIR were based, and which was made available for public review. This species-specific assessment allowed for an examination of where certain focal species move through the project area under existing conditions, what types of crossings they use, and what types of crossings (and modifications of crossings) might be needed to maintain connectivity with construction of the project.*

The design and placement of fencing, as well as the design of medians, was carefully considered, taking into account existing conditions in each segment. For example, as described in MM-NATCOM-3.6, wildlife fencing will be installed from a point 0.25 mile north of Tar Creek south to the San Benito River to direct wildlife to undercrossings. Under existing conditions, a solid median barrier throughout the majority of this segment currently prevents most animals from being able to make surface crossings, and thus keeping animals off the road and directing them toward undercrossings will reduce road mortality of animals and increase public safety while enabling animals to more easily find undercrossings. In the segment from 0.25 mile north of Tar Creek north to SR 25, existing standard fencing and the existing thrie-beam median barrier will be maintained.

The project is included in the HCP/NCCP as a covered activity; therefore, the conditions on covered projects, as applicable, will be implemented. In the case of post-construction monitoring of new and enhanced culverts for wildlife connectivity, the HCP/NCCP states, "...all structures constructed for wildlife movement (tunnels, culverts, underpasses, fences) will be monitored at regular intervals by the Local Partner facility owner and repairs made promptly to ensure that the structure is in proper condition. For facilities owned by entities not participating in the Habitat Plan (e.g., California Department of Transportation [Caltrans]) and where feasible, the Implementing Entity will secure access and data collection agreements with these entities to allow the Implementing Entity to conduct this monitoring." (See Chapters 6 and 7 in the HCP/NCCP). Also applicable to wildlife connectivity, the HCP/NCCP further states, "Fencing must be monitored regularly by the facility owner and repairs made promptly to ensure effectiveness."

Caltrans owns the project facility, except for any local roads in the project footprint such as Santa Teresa Boulevard. However, Caltrans is not a Partner to the HCP/NCCP. Therefore, the HCP/NCCP Implementing Entity, formally titled the Santa Clara Valley Habitat Agency, will be responsible for monitoring the performance of undercrossings following construction. The fees VTA will pay into the HCP/NCCP as a Local Partner and for this covered project will contribute to the funding of this effort.

As described in detail in the project's NES, monitoring using remote cameras documented wildlife use of a wide variety of undercrossings in the project area. Although the project will lengthen most of these undercrossings slightly as the highway is widened, there is no expectation that wildlife use of undercrossings, particularly the large, well-lit features such as the Tar Creek, Pajaro River, and San Benito River undercrossings, will decline substantially due to widening of the road or other project elements. Further, the upgrading of two culverts south of the Pajaro River to larger sizes (solely to enhance wildlife movement), the installation of an additional culvert between Tar Creek and the Pajaro River specifically for wildlife movement, and other mitigation measures described in the EIR are expected to allow wildlife movement to continue to occur at rates similar to existing rates. However, absent years of intensive study, existing rates of movement through the project area by various species cannot be determined with any statistical robustness for comparison with future rates of movement. Such intensive pre-project study is not necessary given that (a) this project's CEQA assessment is required to determine the impact of the project relative to existing conditions (which include the presence of the existing highway), rather than relative to a condition in which wildlife can move unimpeded by the existing roads, and (b) the project will not remove any existing undercrossings or substantially reduce the utility of the largest, most important undercrossings relied upon by dispersing animals. As a result, we do not believe that intensive, quantitative monitoring is necessary to document that the project has not had a significant impact on wildlife movement.

Nevertheless, in response to this comment, a new mitigation measure (MM-NATCOM-3.10) related to wildlife movement has been added to this Final EIR.

Comment 17-E: Specific information regarding the species of animals that were detected by remote camera and other surveys was not provided in the DEIR, nor were locations of animal detections described. It is stated that camera surveys were conducted over a 4-month period. This may not have been sufficient to capture data from animals moving during breeding seasons and juvenile dispersal. Road kill information is also lacking in the DEIR.

Response 17-E: *More detailed information regarding the results of the remote camera study and road kill surveys can be found in the project's NES. These studies assisted in the determinations regarding locations of existing animal movements and the types of crossings that are used by different species, and the resulting information informed the design with respect to installation or enhancement of undercrossings and placement of directional fencing. In our opinion, extension of camera studies into different seasons would not have substantively altered the strategies for maintaining and enhancing wildlife movement through the project area or reducing road mortality of animals. For example, finding that juveniles of a given species (e.g., American badger or coyote) occur more widely than those observed during the road kill surveys or camera study, or that juveniles use a specific type of undercrossing, would not alter the strategy for facilitating wildlife movement over or under U.S. 101 as described in the EIR. A variety of undercrossing types and sizes are currently present, and will be present following*

addition/modification of selected crossings as described in the EIR's mitigation measures, to enable movement by a wide variety of wildlife species and age classes. The project's design with respect to median and fencing types reflects a desire to maintain existing conditions.

Road kill data indicated primarily that numerous animals die attempting to make surface crossings (a) where there is a solid concrete median, and (b) near some of the larger undercrossings, such as at the Pajaro River and Tar Creek. As a result, mitigation measure MM-NATCOM-3.6 describes wildlife fencing to minimize the ability of wildlife to enter the roadway in these areas.

Comment 17-F: The mitigations proposed for wildlife protection (and avoiding roadkill) and for wildlife crossing and connectivity are grossly inadequate and do not come close to what is currently accepted as Best Management Practices for wildlife connectivity. The DEIR proposes to:

- replace 2 existing pipe culverts with box culverts (one 90" in height; height of the other not specified)
- install 1 new culvert; unspecified design, "at least" 4 feet in height
- install new box culverts north of Hwy 25 (these are for flood flows, not designed for wildlife passage, and are of unspecified size or location)
- install wildlife fencing 0.25 miles south from Tar Creek and 0.25 miles north from the San Benito River to minimize animal movement onto the highway, and to install several one-way gates to allow egress from the highway
- clear vegetation from in front of existing culverts

We do not consider these mitigations adequate to reduce impacts to wildlife movements in this important linkage area to a level of less-than-significant, and ask for a reevaluation of project design to allow for adequate wildlife connectivity:

MM-NATCOM-3.1 proposes to maintain existing standard fencing and three-beam barrier north of Tar Creek. Because this does not result in any improvement in conditions for wildlife movement, it should not be considered a mitigation measure. Furthermore, the DEIR erroneously states that wire mesh and barbed-wire fencing will not inhibit wildlife movement. This is only true if the fence is no higher than 42", and has a smooth bottom wire; no lower than 16" from the ground.

Response 17-F: *We disagree that the mitigation measures are inadequate. As discussed in the response to comment 17-C, extensive discussion of wildlife movement issues and mitigation/enhancement measures occurred during the project design and initial impact assessment process to identify measures appropriate for specific project segments and specific species known or expected to be crossing the project area. Biologists from the CDFW, USFWS, and Caltrans assisted VTA and its consultants in determining the appropriate fencing, median, and undercrossing design for this project.*

As discussed in the response to comment 17-C, measures applied to individual segments of the project to maintain or enhance wildlife movement were conservatively considered mitigation measures rather than being incorporated into the project, to allow for a more transparent description of the approach to enabling wildlife movement through the project area. The commenter is correct that maintaining standard fencing and the three-beam barrier north of Tar Creek is not a new measure. However, wildlife movement through this area was carefully considered, and it was determined that no changes to the existing fencing or median designs were necessary in this segment.

Footnote number 44 of the EIR has been revised to clarify the statement regarding the effect of standard fencing on wildlife movement.

Comment 17-G: The DEIR does not rely on state-of-the-art BMPs and design criteria to allow adequate wildlife crossings. It is not clear that the proposed box culverts are favorable for movement of all affected wildlife species. For example, underpasses for deer should be at least 20 feet wide and 8 feet high, and deer should be able to see the horizon as they go through the underpass. Location, substrate, internal light and vegetation are all important considerations for design of wildlife undercrossing structures and of course – locations are of critical importance.

Focal species need to be identified, and references need to be cited to assure that crossing designs utilize the best available information regarding species' needs.

Response 17-G: *As discussed in the response to comment 17-C, the project's design team, VTA and its consultants, and biologists from Caltrans and wildlife agencies referred to a number of sources of information on design criteria for wildlife movement, taking into account existing conditions and public safety issues. All the criteria listed in this comment were considered. For example, MM-NATCOM-3.7 indicates that, where feasible, culverts that are to be lengthened will include metal grating in the shoulder to increase internal lighting.*

Deer were recorded by remote cameras using four existing undercrossings (Tar Creek/Southern Pacific Railroad, Pajaro River, San Benito River, and a 90-inch corrugated metal pipe north of the Pajaro River); although the criteria listed in this comment (e.g., ability of deer to see the horizon as they use an undercrossing) are ideal, deer in the project area regularly use undercrossings, based on the camera study and observations of tracks, where the horizon cannot be seen. There is no expectation that deer will not continue to use the very wide/high Tar Creek/Southern Pacific Railroad, Pajaro River, and San Benito River undercrossings even after the project is constructed. Replacement of the 90-inch corrugated metal pipe north of the Pajaro River with a box culvert that is at least as high as the existing culvert, but that is broader, will increase the "openness ratio" of the culvert, which is expected to maintain or enhance its attractiveness for wildlife movement. Similarly, replacement of the 54-inch reinforced concrete pipe culvert under U.S. 101 just north of the Betabel Road/Y Road

interchange with a box culvert at least 90 inches high will improve the ability of deer to cross under U.S. 101 at this location.

Species-specific connectivity issues were assessed in the NES, which is the project's technical biology report that is part of this EIR.

Comment 17-H: In the approximately 5 ½ mile distance between Hwy 25 and the San Benito River there are 2 stretches of over 2 miles with no undercrossings. More undercrossing structures must be provided, designed and located specifically as wildlife crossings, not primarily as flood control structures with utilization by wildlife as a secondary consideration. Existing culverts will be virtually unusable during periods of high flows. Wildlife crossing structures should be placed in locations with little human traffic or access, and where wildlife movement is favored by habitat and topography. Bridges, as well as culverts, may need to be re-designed to facilitate animal movement. The Caltrans/Calif. Dept. of Fish and Game 2010 CEHCP suggests spacing of crossing structures suitable for large animals such as deer at one per mile, and culvert-type structures suitable for small animals such as amphibians and small mammals at one per quarter-mile.

Response 17-H: *Figure 5 in the project's NES depicts the locations of existing bridges and culverts that could potentially be used by wildlife crossing under U.S. 101 (crossings that were confirmed in the case of many culverts by the camera study). As indicated on this figure, the longest segment between existing undercrossings, between SR 25 and the San Benito River, is approximately 1.25 miles (between Gavilan Creek near SR 25 and Tick Creek to the south). No other segments without undercrossings occur between SR 25 and the San Benito River that exceed 0.8 miles. Therefore, we disagree with the statement that there are two segments of over two miles in length without undercrossings.*

We agree that existing undercrossings have limited utility during high flows; however, this is the case both with the current project and with the proposed project. A new culvert to be installed between Tar Creek and the Pajaro River, described by MM-NATCOM-3.3, will not be located within a drainage and thus will provide an undercrossing that will not be inundated during high flows.

Both existing and proposed wildlife crossing structures are located in a variety of areas and habitat types, facilitating use by numerous wildlife species. As indicated by the camera study, many of these crossings receive considerable wildlife use. Many occur along drainages that provide cover for dispersing wildlife, and whose natural topography is conducive to wildlife movement. As indicated by Figure 5 in the project's NES, many of these undercrossings occur in areas with little human activity.

The project team attempted to locate large undercrossings at intervals that did not exceed one per mile. However, existing topography constrains the project's ability to provide such

undercrossings in relatively level areas where the road is not elevated. For example, replacement of the 54-inch reinforced concrete pipe culvert under U.S. 101 just north of the Betabel Road/Y Road interchange with a box culvert at least 90 inches high will improve this culvert's utility to movement by large animals. However, in the 1.3-mile segment between this culvert and the San Benito River to the south, the existing topography is not conducive to providing a tall culvert, as the highway is not elevated far enough above the lands to the west. Nevertheless, in the 3-mile segment from Tar Creek to the San Benito River, five undercrossings at least 90 inches high (and much higher at Tar Creek, the Pajaro River, and the San Benito River) will be present following project construction. Between Tar Creek and SR 25, the existing topography is not conducive to providing a tall culvert, but the project is not expected to result in a substantial change in the ability of large animals to move through the project area in this segment. In the 5.3-mile segment between SR 25 and the San Benito River, culverts will be present in 15 locations, for an average of one culvert every 0.35 mile. Given the existing impediments to wildlife movement due to U.S. 101, the relatively low increase (relative to existing conditions) in impacts to wildlife movement that would result from the project, and the dispersion and number of undercrossings, it is our opinion that the project will not have a significant impact on the movement of large or small wildlife species.

Comment 17-I: Success criteria should be specified in the Final EIR, and Project plans must include ongoing monitoring of undercrossings, with funding available for remediation if they are not used by all impacted wildlife species. Monitoring of crossing locations should be conducted both before and after structures are installed so that effectiveness can be assessed. Maintenance of culverts or other crossing structures also needs to be included in project plans.

Response 17-I: *Please see the response to Comment 17-D regarding monitoring of wildlife use of undercrossings.*

Comment 17-J: Wildlife barrier fencing adjacent to Tar Creek and the San Benito River should be extended. The proposed one-quarter mile barrier fencing is not a sufficient distance to guide animals away from the highway to the creek crossings. A more thorough assessment of topography, habitat, and animal use of the locations is needed to determine appropriate fence length, north and south of both drainages, and at a minimum, fencing should stretch several miles on both sides of the crossing.

Response 17-J: *As discussed in Response 17-C, extensive discussion of wildlife movement issues and mitigation/enhancement measures occurred during the project design and initial impact assessment process to identify measures appropriate for specific project segments and specific species known or expected to be crossing the project area. The extent/location of fencing to exclude wildlife from the road's surface was considered in detail. Of concern were the number of road-killed animals observed near large undercrossings such as Tar Creek and the Pajaro River, and it was determined that directional fencing was necessary near these structures not only to direct animals to the undercrossings, but also to minimize the number that*

move onto the road's surface at these locations. However, there was also a need to balance the value of this fencing in keeping animals off the road's surface with the desire to maintain existing conditions with respect to fencing and median design in the northern portion of the site. It was determined that 0.25 miles of directional fencing would be sufficient to achieve both sets of objectives.

Comment 17-K: It is stated in the DEIR that new median barriers will be installed where they do not currently exist. Solid median barriers make it virtually impossible for an animal to get across the highway. Thrie-beam barriers, as are to be maintained north of Tar Creek, or other median structures that allow animal movement, should be used throughout the project site.

Response 17-K: *The project's strategy with respect to median barriers is to generally maintain the types of barriers that currently exist in a given segment. Given the number of large, high-quality undercrossings present in the segment between Tar Creek and the San Benito River, it was determined that directing animals to undercrossings would best facilitate wildlife movement and maintain public safety. As a result, in that segment, replacement of the existing solid median barrier with a thrie-beam barrier was determined to be unnecessary. Nevertheless, the solid median barriers will be fitted with wildlife passageways (Caltrans standard "Type S, M, and/or L") so that, in the event that animals cross through the directional fencing and attempt to cross the highway, their probability of a successful crossing will improve relative to existing conditions. The presence of such passageways will actually enhance the ability of animals that get onto this segment of U.S. 101 to cross the highway, as currently, no such passageways exist on the road's surface. The Draft EIR refers to these passageways in Section 1.3.1; because they are an important component of the measures being implemented to maintain and enhance wildlife movement, a new mitigation measure related to wildlife movement has been added to this Final EIR.*

Comment 17-L: We ask for the project to incorporate a comprehensive set of BMPs in evaluation, design, construction, operations, maintenance, defining success criteria and monitoring. At the very least, design should include and specify locations for:

- Fences several miles long on each side of each crossing.
- At least four (4) crossing structures to accommodate large mammals, with no more than one mile between large crossing structures, and no more than one-quarter mile between crossing structures appropriate for small animals.
- For constructed crossings to be effective in maintaining wildlife connectivity, mitigation should include permanent protection of suitable wildlife habitat adjacent to the crossings.

Response 17-L: *Please see Responses 17-D, 17-H, and 17-J. Undercrossings that will accommodate large mammals will be located at Uvas/Carnadero Creek, just north of SR 25, at Tar Creek, at the Pajaro River, in two locations where existing culverts will be replaced with*

box culverts at least 90 inches high between the Pajaro River and the Betabel Road/Y Road interchange, and at the San Benito River.

Permanent protection of suitable wildlife habitat adjacent to the crossings is not necessary for this project to mitigate its impacts to less-than-significant levels. It is important to note that this project's impacts under CEQA are evaluated relative to existing conditions, and relative to existing conditions, this project would not alter the land use or ownership of lands in areas adjacent to the project area. The project's design and mitigation measures will reduce impacts to less-than-significant levels given the existing conditions of wildlife habitat adjacent to crossings in the project area.

Comment 17-M: Proposed Mitigation for Biological Resources: For virtually every potential impact on wildlife species and habitats, the proposed mitigation is either reliance upon payment of fees to the Santa Clara Valley Habitat Conservation Plan / Natural Communities Conservation Plan (SCVHCP), or, if that is infeasible, purchase of credits in an unidentified mitigation bank that serves the project area, or if no banks or credits are available, development of unspecified project-specific mitigation. The SCVHCP provides a permit from the wildlife agencies for the 'take' of several listed species. It should not be used as blanket coverage for any and all impacts to biological resources. This nebulous plan for mitigation for the many potential impacts of the project is not acceptable. Deference of a clear mitigation plan until after approval of the EIR violates the disclosure intent of CEQA. The DEIR also needs to include mechanisms for monitoring and funding, as well as success criteria and enforceable remediation should goals not be achieved.

Response 17-M: *The Santa Clara Valley HCP/NCCP is not used as blanket coverage for all impacts to biological resources. Other biological resources, such as nesting birds, have specific mitigation associated with their protection. The HCP/NCCP is described as the first alternative approach for mitigation for special status species and their habitats that are covered under the Plan, with other alternatives (mitigation banks or project-sponsored mitigation) given in the case of non-approval of the HCP/NCCP (highly unlikely) or the inability to use the HCP/NCCP in San Benito County (likely). For project-sponsored mitigation, the text in several measures has been revised to include additional detail:*

- *MM-NATCOM-1.2 has been revised to include additional detail regarding the project-specific mitigation that will be performed in the event that MM-NATCOM-1.1 and the purchase of credits in a mitigation bank are both infeasible, necessitating project-specific mitigation.*
- *Text has been added at the end of MM-NATCOM-2.2 for oak woodland habitat.*
- *Text has been added at the end of MM-WET-1.2 for wetlands and other waters.*
- *Text has been added at the end of MM-ANIMAL-6.5 for burrowing owls.*
- *Text has been added at the end of MM-T&E-2.3 for California red-legged frogs.*
- *Text has been added at the end of MM-T&E-3.3 for California tiger salamanders.*

Also see Responses 8-C, 8-E, 8-F, and 17-S.

Comment 17-N: Exclusive Reliance upon the SCVHCP is inappropriate because: At this time, the participating partners in the SCVHCP have approved the plan. However, implementation is still conditional upon agreements that may or may not be achieved, an implementation body has yet to be created, and the SCVHCP has yet to secure a “take” permit for the covered species from the California Department of Fish and Wildlife and the US Fish and Wildlife Service.

Response 17-N: *The six Local Partners involved with preparation and implementation of the Plan have adopted the HCP/NCCP, as the commentor has noted, and have signed the Memorandum of Understanding. Four of the Local Partners with land use authority have signed the Joint Powers Agreement. Each of the Local Partners has appointed representatives to the Governing Board and Implementation Board of the Implementing Entity, formally known as the Santa Clara Valley Habitat Agency. On May 16, 2013, the two Boards met to begin the business of the Habitat Agency including electing Presiding Officers, appointing an interim Executive Director, adopting a budget, and executing other start-up actions. The Wildlife Agencies, also Partners in the HCP/NCCP, have yet to issue incidental take permits; however, after many years of effort to develop the Plan, it is extremely unlikely incidental take permits would not be issued. Once the permits are issued, the Local Partners with land use authority will adopt implementing ordinances. Implementation of the Plan by the Santa Clara Valley Habitat Agency is anticipated in late 2013.*

The EIR recognizes the possibility that mitigation via payment of fees to the HCP/NCCP may not fully satisfy mitigation requirements to reduce impacts to less-than-significant levels under CEQA, either for impacts within San Benito County (which may not be covered by payment of fees to the HCP/NCCP) or for all impacts, in the unlikely event that the USFWS and CDFW do not issue incidental take permits as expected. Therefore, the EIR's biological resources mitigation measures describe alternative mitigation that would be implemented for impacts that are not mitigated through the HCP/NCCP. Thus, the EIR is not relying exclusively on the HCP/NCCP. Please also see the responses to Comments 8-F and 17-M.

Comment 17-O: The SCVHCP does not cover all species and habitats that would be impacted by this project: (the only mammal covered is the San Joaquin kit fox; not badger, special status bats, or ringtail - a Fully Protected species). Impacts to habitat of special status species, including the American badger and other California Species of Special Concern need to be addressed under CEQA. The only mitigation provided for the badger are steps to avoid disturbance of maternity dens during the pupping season, and eviction of badgers after the pupping season. For a number of species, including special status birds and ringtail, no mitigation for loss of habitat is proposed, based on the unsubstantiated assumption that low numbers of animals will be impacted. Mitigation for habitat loss of badgers and other special status species is needed.

Response 17-O: *Correct, the HCP/NCCP does not cover all special-status species that could be impacted by the project. However, all special-status species that do occur or could potentially occur in the project area are included in the detailed analysis in the NES with a summation of the analysis given in the EIR. Thus, if habitat mitigation was not proposed for a given species, such mitigation was determined to be unnecessary by the CEQA analysis. Nevertheless, it should be noted that the project's mitigation for impacts to other species will provide benefits to some of the special-status species for which species-specific mitigation was not required. For example, whether through payment of impact fees or project-sponsored mitigation, the project will compensate for its impacts to habitat of the California tiger salamander and California red-legged frog. Such mitigation will include preservation, enhancement, and management of upland habitat of these species, and that upland habitat will benefit species such as the American badger.*

Comment 17-P: Species without special status are not covered by the SCVHCP, but impacts to movement corridors for all species need to be addressed under CEQA.

Response 17-P: *The analysis of project impacts on wildlife movement in the EIR did not focus only on special-status species, but rather addressed the array of species for which movement through the project area is important. Additional detail (beyond that discussed in the EIR) regarding existing conditions and project impacts with respect to wildlife movement, including an assessment of these issues for certain species, can be found in the NES.*

Even though species without special status are not covered by the HCP/NCCP, the mitigation measures to minimize impacts on wildlife movement described in the EIR are intended to benefit both special-status and non-special-status species.

Please also see the Responses 17-C through 17-L, which pertain to both special-status and non-special-status species.

Comment 17-Q: Although it is stated in the DEIR that regulatory agencies are likely to accept mitigation through SCVHCP for impacts to special status species that occur in San Benito County, there is no assurance that this is the case, nor that it is legally defensible to do so. A separate Habitat Conservation Plan may be needed for take of listed species in San Benito County, as well as additional avoidance and mitigation measures for other impacts covered under CEQA.

Response 17-Q: *The HCP/NCCP is described as the proposed approach for mitigation for special status species and their habitats that are covered under the Plan, with other alternatives (mitigation banks or project-sponsored mitigation) given in the case of non-approval of the HCP/NCCP or the inability to use the HCP/NCCP in San Benito County. For project-sponsored mitigation, the text in several measures has been revised to include additional detail (please see Response 17-M).*

As the project elements in San Benito County will impact waters of the U.S. including wetlands, an Army Corps of Engineers Section 404 permit will be required, as stated in Table 5 of the EIR. In this case, consultation with the USFWS (and National Marine Fisheries Service) will occur pursuant to Section 7 of the federal Endangered Species Act. The Section 7 process does not require the development and implementation of an HCP. In fact, Section 7 only legally requires avoidance and minimization of impacts to federally-listed species. However, under the California Endangered Species Act (CESA) and CEQA, compensatory mitigation is also required.

In San Benito County, VTA is committed to providing funds to the HCP/NCCP for impacts to special status species and habitats, even through the Section 7 process; however, as the commentor notes, this may not be possible (e.g., the USFWS and/or CDFW may determine during Federal and State Endangered Species Act consultation that this is not appropriate). If project-specific mitigation is required, there are ample opportunities to implement mitigation in the project vicinity (see Response 8-C). It should be noted that environmental benefits may be achieved locally even if the mitigation is implemented on a watershed or regional scale, meaning potentially in Santa Clara County.

The avoidance and minimization measures included in the EIR for biological resources are appropriate for both Santa Clara County and San Benito County. VTA's commitment to these measures, whether derived from the HCP/NCCP or not, is stated in the EIR. It is not anticipated that additional avoidance and minimization measures for impacts to species and habitats, which are not defined by County lines, would be required in San Benito County.

Comment 17-R: The mitigations proposed as alternatives if payment of fees to the SCVHCP is infeasible are inadequate. Creation or restoration of sensitive habitats, riparian, wetland, and oak woodland needs to be achieved prior to impacting existing habitat, or permanent protection of additional existing habitat is needed to compensate for temporal loss of habitat. Similarly, roosting or other habitat occupied by special status species, including bats and burrowing owls needs to be created and successfully used by the species in question before habitat is impacted on the project site.

Response 17-R: *Please see Response 17-M for revised text in the EIR applicable to project-sponsored mitigation for impacts to riparian habitat, oak woodlands, wetlands and other waters. With inclusion of the revised text, the mitigation measures are adequate to reduce impacts to these habitats to less-than-significant levels. For example, the text revisions include additional detail regarding the details of mitigation plans and success criteria, which may or may not specify when occupancy of mitigation lands must occur. Mitigation does not necessarily need to be provided before habitat is impacted by a project; for example, during California Endangered Species Act permitting, it is standard practice for the CDFW to allow applicants up to 18 months between issuance of an Incidental Take Permit and satisfaction of compensatory mitigation.*

Certainly, it is preferred to create, restore, or enhance habitats in advance of the impacts to offset the functions and values lost due to the project. As the commentor notes, when there is a temporal loss, there is often additional mitigation required. However, to offset temporal loss, typically there is an increase in the mitigation ratio between the loss of habitat and the mitigation rather than permanently protecting (or preserving) existing habitat. The mitigation site is usually under a conservation easement to ensure permanent protection. One of the benefits of the HCP/NCCP is the "stay-ahead provision" whereby conservation of habitats must be implemented at or faster than the rate at which impacts on habitat or covered species occur.

A stated in the EIR (MM-ANIMAL-9.5), alternative roosts structures will be provided if a day roost of any bat species will be impacted on a bridge or in a tree, even if the impact is temporary, and will be erected at least one month (preferably one year or more) prior to removal of the original structure. In some circumstances, it may be beneficial to allow roosting bats to continue using a roost on a bridge structure during construction, rather than evict the bats. MM-ANIMAL-9.5 requires that a bat biologist monitor the alternative roost structure for up to three years following completion of the construction, or until the structure is occupied by bats in order to determine the effectiveness of the structures. It should be noted that VTA's recent experience with the U.S. 101 Auxiliary Lanes Project (Route 85 to Embarcadero Road), which is in post-construction monitoring, indicated that bats did not use the alternative roost structures provided, but did return to the bridge after construction was completed. For bats roosting in trees, the loss of potential roost sites will affect only a very small proportion of available habitat in the project vicinity and regional area; therefore, there is ample habitat for bats to find new roosts.

Please see Responses 17-M and 17-S for revised text in the EIR applicable to project-sponsored mitigation for impacts to burrowing owls, which complies with the 2012 CDFW Staff Report on Burrowing Owl Mitigation.

Comment 17-S: In lieu of SCVHCP participation, proposed mitigation for loss of burrowing owl habitat is creation of burrows and management of foraging habitat at a ratio of 6.5 acres per unpaired owl or owl pair. In 2012, CDFW issued new guidelines for burrowing owl mitigation that specifically acknowledges the older one(s) are ineffective and no longer acceptable to CDFW. The alternative to mitigation via the SCVHCP should follow the 2012 CDFW Staff Report on Burrowing Owl Mitigation.

Response 17-S: *No burrowing owls are known to occur in the project area. Based on the negative results of the protocol-level survey conducted on the majority of the project area during this project's planning, the known distribution of this species in the region (i.e., with owls occasionally wintering in the project vicinity but with breeding burrowing owls currently unknown there), and the relatively low habitat quality for this species present in the project area, as opposed to grasslands further removed from U.S. 101, there is a low probability that individual owls or occupied habitat will be impacted. As a result, mitigation for impacts to*

burrowing owls and their habitat will be required only if owls are observed during habitat mapping for this species (required by the HCP/NCCP) or during pre-construction surveys. As described in MM-ANIMAL-6.4, mitigation of impacts to burrowing owls will be provided via the payment of impact fees to the HCP/NCCP to the extent feasible. Project-specific mitigation of impacts to this species will be necessary only in the case of non-approval of the HCP/NCCP (highly unlikely) or the inability to use the HCP/NCCP in San Benito County (likely).

We agree that it is appropriate to incorporate the 2012 CDFW Staff Report on Burrowing Owl Mitigation into MM-ANIMAL-6.5 in the event that burrowing owls are detected and impacts to burrowing owls cannot be mitigated entirely via the HCP/NCCP. The 2012 CDFW Staff Report indicates that the mitigation to be provided should be based on the permanent impacts to burrowing owl habitat, requiring a site-specific assessment that cannot be conducted now (since owls are not currently known to be present), but that would rather be conducted if and when burrowing owls are detected. Therefore, MM-ANIMAL-6.5 has been revised in this Final EIR.

Please also see Response 17-M.

Comment 17-T: Several detention basins are proposed near the highway. These may attract wildlife, including California red-legged frogs, tiger salamanders, and western pond turtles, and may increase the potential for road mortalities. This potential impact needs to be addressed.

Response 17-T: *Two new detention basins are proposed - one on the north side of the San Benito River east of U.S. 101 and one in the existing northeast quadrant of the 101/25 interchange. The basin north of the San Benito River is not in an area very close to known occurrences of California tiger salamanders or California red-legged frogs, or to likely breeding ponds for these species. As indicated in Section 2.20.3 of the EIR, this basin will be graded to drain completely. It will not have depression areas that could support long-term ponding. Rather, this basin will drain completely following high-runoff events, and thus it will not provide an attractant to California tiger salamanders, California red-legged frogs, or western pond turtles. The text in Sections 2.20.3 and 2.21.3 of this Final EIR has been revised to clarify this.*

Owing to the absence of suitable habitat on the east side of the existing 101/25 interchange (due to development and intensive cultivation), these three species are not expected to be present in, or to easily reach, the area where the new detention basin will be constructed near that interchange. However, all three species may be present in a pond on the west side of this interchange, and a few individuals may be able to disperse to the basin through the new box culverts proposed. This basin has also been designed to drain quickly (within a few days of a high-runoff event, like the basin proposed north of the San Benito River). Additional text has been added to the end of MM-HYDRO-1.3 in this Final EIR to reflect this.

Comment 17-U: Impacts of loss of riparian habitat and wetlands (NATCOM-1, WET-1) are not limited to the endangered species that are covered by the SCVHCP – the impacts are to beneficial uses of as described in the Basin Plan for the stream. The project must secure permits from the US Army Corps of Engineers and the California Water Quality Control Board (404, 401), and may require increasing efforts to avoid or minimize the Project's impact, and to provide local mitigation in addition to or in lieu of payment to the SCVHCP.

Response 17-U: *Impacts to riparian habitats and wetlands are well described in the EIR. VTA agrees that impacts of loss of riparian habitat and wetlands are not limited to the endangered species that are covered by the HCP/NCCP. However, the benefits of restoration, creation, enhancement, and protection of these habitats by the HCP/NCCP extend well beyond the HCP/NCCP-covered species to all species that use these habitats, and to the other ecological functions that these habitats provide. As a result, contribution of development fees to the HCP/NCCP for impacts to these habitats will compensate for impacts to beneficial uses of these habitats. Please also see Responses to Comments #8-B through 8-F and Response 17-M.*

VTA acknowledges that the project will need to obtain permits from the U.S. Army Corps of Engineers and Regional Water Quality Control Board. These regulatory requirements are separate from the CEQA process, however, and therefore any conditions of these permits that are not also addressed in the EIR and in these responses to comments are not relevant to the adequacy of the CEQA assessment.

Comment 17-V: The SCVHCP does not provide mitigation for loss of Oak Woodland (NATCOM-2), since the species covered by the plan do not utilize oak woodland habitat. Payment to the SCVHCP does not provide in-kind mitigation.

Response 17-V: *The Natural Communities Conservation Act requires that natural communities within a study area be identified in a Natural Communities Conservation Plan. The Santa Clara Valley HCP/NCCP identifies oak woodland as one of the vegetative communities, or land cover types, covered in the Plan irrespective of any covered species that may use this habitat. Most of the biological goals and objectives in the HCP/NCCP "are designed at least to conserve current populations of covered and other native species in the study area." One of these goals is to "maintain and enhance functional oak woodland communities to benefit covered species and promote native biodiversity." Section 5.3.5 of the HCP/NCCP's conservation strategy contains extensive discussion of oak woodland conservation and management, including discussion of enhancement measures (which may include oak planting).*

The project will avoid or minimize impacts to oak woodland to the extent feasible. Based on the current level of design, 2 acres of oak woodland habitat are permanently impacted under Design Option A and 1.5 acres are permanently impacted under Design Option B (see Table 34 in the EIR). All of these impacts are in Santa Clara County. It should be noted that the project

development team recommends the selection of Design Option B for the interchange configuration.

VTA is a Local Partner in the development and implementation of the Santa Clara Valley HCP/NCCP, and the project is a "covered activity" under the HCP/NCCP. As a result, VTA has included payment of a base fee to the Implementing Entity of the HCP/NCCP (known as the Santa Clara Valley Habitat Agency) to offset impacts to habitat through the creation or restoration of equivalent habitat on a regional basis. Fees must be paid into the HCP/NCCP to protect oak woodland through either fee title purchase or conservation easement and then enhancing and managing that land as part of the HCP/NCCP Reserve System. Once land is acquired or a conservation easement is established, "an additional objective is to enhance oak woodlands using specific management actions to promote regeneration that will in turn sustain beneficial processes and native species diversity."

In the unlikely event that the HCP/NCCP is not ultimately approved, MM-NATCOM-2.2 includes project-specific mitigation for impacts (also see Response 17-M for the revised text applicable to MM-NATCOM-2.2).

Comment 17-W: Impacts to fish species are not covered by the SCVHCP. The project could potentially have a significant impact to Pacific Lamprey and Monterey Roach, and thus requires the development of specific mitigation measures and a permit from National Marine Fisheries Service (NMFS).

Response 17-W: *The EIR acknowledges that the project will result in both short- and long-term adverse impacts to Pacific lampreys and Monterey roach. Mitigation measures are included in the project to reduce impacts to a less than significant level pursuant to CEQA.*

Some of the project elements will impact waters of the U.S.; therefore, an Army Corps of Engineers Section 404 permit will be required, as stated in Table 5 of the EIR. In this case, consultation with the National Marine Fisheries Service (NMFS) will occur pursuant to Section 7 of the federal Endangered Species Act owing to the presence of the South-Central California Coast steelhead; neither the Pacific lamprey nor the Monterey roach is federally listed, and thus consultation with NMFS regarding these species is not necessary. VTA will include the measures identified in the EIR in the Biological Assessment for the Project. If take of steelhead is assumed, which is likely, NMFS will issue a Biological Opinion (BO) for the project.

Please also see response 17-M for revised text applicable to mitigation for riparian and aquatic habitats.

Comment 17-X: Growth-Inducing effects and Other Impacts: The DEIR acknowledges that the project will have a direct and significant growth-inducing impact if and when the application for the massive

El Rancho San Benito (ERSB) new community development project is approved. The approval of the ERSB project is conditioned upon the widening of U.S. 101 (Impact GR-1). Because of this direct dependency, this project's EIR needs to include disclosure of all the reasonably foreseeable potential impacts of ERSB including impacts to special status species and habitats, wildlife movement corridors and other biological resources; air quality; hydrology and water quality; climate change; regional traffic, etc. The fact that the ERSB project proponents (DMB) are helping to fund this Highway 101 widening project underscores the link between the two projects.

Response 17-X: *The statement that the "approval of ERSB is conditioned upon the widening of U.S. 101" is a misstatement of the language in Section 2.2 of the EIR. The EIR text states that the U.S. 101 Improvement Project would have a direct and significant growth-inducing impact if and when the application for the ERSB is resubmitted and if the approval of the ERSB project is conditioned on the widening of U.S. 101. It is important to note that neither of the events has occurred. There is currently no ERSB application on file. Further, it is not known if the ERSB developer will in fact file a new application and, if that occurs, what the project will be proposing. Therefore, a cumulative analysis taking into account the environmental effects of an ERSB project, is neither feasible nor required under CEQA. Such analysis would be speculation.*

Regarding the comment that DMB, the ERSB proponent, is helping to fund the U.S. 101 project, that funding consisted of paying for a portion of the cost of the preliminary design and this EIR. VTA is unaware of any funding of the actual construction of the project by DMB.

Comment 17-Y: In the DEIR, it is stated that the "The project's indirect effect on the rate, location, and/or amount of future growth will not be substantial." (Impact GR-2). We do not agree. The DEIR for the San Benito County 2035 General Plan, now available for public review, makes provisions for "New Communities" in the northern part of the County, several of them adjacent to Highway 101. Among the New Community Location Requirements listed is that "They are accessible to existing major transportation routes and corridors, such as State highways..." It is reasonable to assume that, like the ERSB development, other "New Communities" placement near Highway 101 will depend upon this widening project.

Response 17-Y: *The relevant question for a significant indirect growth-inducement impact is not whether this or any other infrastructure will facilitate growth. By their very nature, all infrastructure projects serve/accommodate development to some degree. If that were not true, no public agency would consider, fund, or construct an infrastructure project. The relevant question under CEQA for significant growth-inducement is whether a project would substantially affect the rate, location, and/or amount of future growth. Each of these three aspects is analyzed in Section 2.2.2.3 of the EIR and the analyses concluded that there is no basis for concluding that the project's indirect growth-inducing effect would be significant.*

Comment 17-Z: The DEIR contends that the project is not expected to have significant impact on air quality in the region. We believe that more information is needed to substantiate this assumption. Air pollutants from Highway 101 in the Coyote Valley of Santa Clara County, and their impact on listed species triggered the need for that County's HCP. Widening of Highway 101 and resultant increases in traffic in this project site may have similar effect.

Response 17-Z: *The conclusion in Section 2.14 of the EIR that the project will not result in a significant impact on air quality is based on the results of two technical reports prepared for the project: Air Quality Report (October 2010) and Mobile Source Air Toxics Emissions Report (October 2010). Both of these reports were available for public review during the circulation of the Draft EIR. Although this comment requests more information, it does not specify what aspect(s) of the analyses it believes are deficient and/or what information is needed.*

With regard to the indirect air quality effect of the project on listed species, that impact is addressed and accounted for in the recently-approved HCP/NCCP, of which this project is a "covered activity". The HCP/NCCP includes an extensive analysis of the air quality effects of development (including this project) on the serpentine habitat that is used by endangered species. The analysis concluded that the nitrogen component of such emissions does have an adverse effect on such habitat and, as a result, the HCP/NCCP includes a fee specifically related to nitrogen deposition. The fee covers such costs as the management of serpentine habitat to mitigate these adverse effects (e.g., increased invasive species control). For more information, please see Section 9.4.1 of the HCP/NCCP.

Comment 17-AA: Cumulative impacts of this project on biological resources, air quality, water quality and hydrology, and noise have not been addressed adequately. Impacts of increased traffic volumes on biological resources, air quality, water quality and hydrology, and noise have not been addressed adequately.

Response 17-AA: *Section 2.23 of the EIR analyzes the cumulative impacts of the project for each of the subject areas identified in this comment. The comment provides no data, information, or analysis to support the assertion that these impacts have not been adequately addressed. Absent such supporting information, a detailed response is not possible.*

Comment 17-BB: Conclusions and Recommendations: We oppose approval of the DEIR in its current form. We believe that the project as proposed will result in significant impacts to wildlife movement corridors and to special status species. At a minimum, Best Management Practices for wildlife movement corridors should be incorporated into the project design; whether these could reduce impacts to wildlife movement to a level of less-than-significant cannot be determined with the information that has been provided. Impacts to species that are not covered by the SCVHCP need to be disclosed, analyzed and mitigated. Mitigation for impacts to all biological resources need to be developed for San Benito County portion of the project, and alternative mitigation for species covered by the SCVHCP

needs to be developed for Santa Clara for the potential risk that the SCVHCP is not implemented, or the implementation is delayed.

Growth inducing impacts and cumulative impacts of the project require further study and analysis, as well as impacts to air quality and climate change. While we recognize the problem of traffic congestion throughout the region, investing in mass transit systems and community planning to reduce sprawl of urbanized areas offer better long-term solutions than continuing to widen and expand our existing highways.

Response 17-BB: *This comment is a summary of the detailed comments contained in this letter. Please refer to the above responses to each of the detailed comments.*

RESPONSE TO COMMENT #18: OMAR CHATTY

Comment 18-A: In addition to my comments made at the March 28, 2013 public meeting, I would like to encourage, restate and emphasize the following:

This document is excellent in its breadth, depth, thorough, and comprehensive detail from not only environmental perspectives, but also human issues, and animal protection and road safety.

This EIR ought to make Caltrans and VTA management very proud of its excellence as produced by VTA and Caltrans staff.

In peer conferences such as ASHTOO and ASCE and others, I would recommend this as a template model for other jurisdictions to use as a baseline of completeness and environmental sensitivity while exercising the best in engineering standards for highway construction in the 21st century.

This EIR should serve as a baseline model for a future direct SR130 route from San Jose to Interstate 5, where environmental considerations, such as those exhibited here, are of paramount importance.

A key point of this project from a financial and human sensitivity perspective is that it has no economic dislocation outcome due to the wrong-headedness of Toll Road or Toll Lane. This road must be funded by existing motorist-generated sources.

Response 18-A: *Thank you for your comment. This input will be considered by the VTA Board of Directors when considering certification of the EIR and approval of the project.*

**RESPONSE TO COMMENT #19:
JESUS CISNEROS**

Comment 19-A: I want to tell them that if they are going to connect 25 to Santa Teresa, it should go straight through. I have seen lots of accidents and there are a lot of students who come from Castroville who can use this.

Response 19-A: Thank you for your comment. Both Design Option A and Design Option B would directly connect SR 25 to Santa Teresa Boulevard.

**RESPONSE TO COMMENT #20:
RICH CRIPPS**

Comment 20-A: I'm all for it. That is a very dangerous section of road that carries way too much traffic. The 25 interchange is a joke. Anyone trying to go Southbound 25 to 101 is out of luck because of traffic. 25 merge to Northbound 101 is Russian Roulette. Improvements along that entire corridor are definitely needed.

Response 20-A: Thank you for your comment. This input will be considered by the VTA Board of Directors when considering certification of the EIR and approval of the project.

**RESPONSE TO COMMENT #21:
JIMMY GALTMAN**

Comment 21-A: Add comments that the 100 year flood map does not include our property 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001, 80822007, 80822008, 8082115, 8082114, 8082113, 8082127, 8082126, 8082128, 8082129, 8082130, 8082131, and 8082133 all had ~2ft. of standing water on our properties in the 1986 flood. The design team needs to make sure that the additional flood water culverts will be large enough to handle more than just an 100 year storm because in 1997 the only reason we didn't get flooded again was that the Carnadero Creek over ran its banks near where it meets the Pajaro River and relieved the Carnadero Creek and only the end of Monterey frontage road had got flooded by the highway 101 bridge. This was a close call for us just eleven years from the previous flood. Another point that needs to be considered is that debris from the Carnadero Creek that flows down the stream during heavy storms and can pile up under neat the W Luchessa Ave bridge and the highway 101 bridge. This is due to Santa Clara Water District not cleaning up the over growth vegetation of the Carnadero Creek banks and creek bed, which was one of the conditions they said they were going to do when we give up property easements in the year 1987 so that the Corps of Engineering

would build the levee on the west side of City of Gilroy. The Carnadero Creek banks and creek bed have not been maintained and this is the existing condition.

Response 21-A: *The first part of this comment consists of a request to design facilities to accommodate flows larger than those from a 100-year storm. The 100-year flood is the standard used by the Santa Clara Valley Water District, the agency with floodplain jurisdiction at this location. The 100-year flood is also the standard used by other agencies including FEMA and the U.S. Army Corps of Engineers. Therefore, the project will be designed based on the 100-year flood.*

The second part of this comment states that there are problems associated with debris in Carnadero Creek that need to be addressed. This problem is not an impact associated with the project. Instead, as acknowledged in the comment, it is a maintenance issue that needs to be addressed with the Santa Clara Valley Water District.

Comment 21-B: Add comments that all property owners of parcels including our property 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001 want the sound wall SW2. Note that because of the existing 101 highway bridge overpass of southern pacific RR tracks higher elevation and the existing Truck stop on the eastern side of high way 101 the large semi-trucks are using their air operated Jake to slow down instead of applying their conventional brakes which creates a large amount of excessive noise at all times of the day. Another point is that the vegetation along highway 101 in front of our properties have grew to a level that acts as addition sound barrier to our 40 year old Pine/Walnut/Sequoia/Oak trees and looking at your plans to build an retention wall on the west side of highway 101 would probably remove that vegetation hence more noise problems.

Response 21-B: *As stated in Section 2.16.6 of the EIR, the costs of each of the nine soundwalls considered (including Soundwall #2), substantially exceed the calculated reasonableness allowance. Based on this information, a preliminary decision has been made to not construct the soundwalls. However, during the final design phase for the project, VTA implements a process whereby a letter is sent to all property owners adjacent to potential soundwalls to solicit their input on the construction of the soundwalls. This input will be considered by VTA when a final decision on the soundwalls is made.*

Based on the preliminary plans developed to date, only some vegetation may need to be removed to accommodate the width of the roadway, as well as to maintain an adequate clearance zone between the travel lanes and the trees for safety purposes. It is expected that the majority of the trees will remain.

Comment 21-C: Add comment that we are opposed about proposed Bike path behind our properties 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties

#80822003, 80822012, 80822013, 80822001, 80822007, and 80822008. We give up property easements in the year 1987 of 50 feet from the middle of Carnadero Creek across the back of our properties so that the Carnadero Creek would be able to be cleaned of over growth vegetation. The Corp of Engineering would not have built the levee on the west side of City of Gilroy without these property easements being granted and the cleaning of the over growth vegetation has not been maintain. To build the proposed Bike path behind our properties 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001, 80822007, and 80822008 the existing trees and old growth vegetation along the Carnadero Creek banks would be disturbed and fences would need to be taken down along property lines. We feel that the city of Gilroy and this project should use the existing right of way on Farman Ln dirt road that can be used to reach the same end point of the bike path at highway 101/Carnadero Creek bridge and would cost less than trying to follow the twisted Carnadero Creek banks behind our properties 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001, 80822007, and 80822008.

Response 21-C: The project is not proposing to bring any bike lanes behind the subject properties or along the banks of Carnadero Creek north of the Carnadero Creek/U.S. 101 crossing. The project only proposes to construct a new bike path on the southern bank of Carnadero Creek under U.S. 101. This new bike path would connect Mesa Road to the frontage road on the east side of U.S. 101. The right-of-way impact to the properties listed is needed to accommodate shifting the alignment of U.S. 101 to the west and widening the freeway to six-lanes.

**RESPONSE TO COMMENT #22:
LIBBY LUCAS**

Comment 22-A: In regards VTA's proposed project to widen #101 between Monterey Street in Gilroy to State Route 129, I would like to submit comment, with a qualification that I have not attended Pajaro River task force meetings recently and so do not know present status of COE flood control designs in this particular reach of the river.

In that Pajaro River has been said to have the most extensive acreage of upper watershed of any California river system, it would appear that with eight tributaries joining Pajaro's main channel in this 101 project area that San Francisco District Army Corps of Engineers's flood control design must be given the top priority.

Figure 16 of a Google map of FEMA 100 year Pajaro River, San Benito and San Juan Creeks' floodplain in San Benito County gives some idea of flood flows to be contended with in project area. It would suggest to me that generous setback levees would perhaps be the only feasible flood control design.

COE flood control criteria cannot come in after the fact and so not to have it front and center in this DEIR is a deficiency. There is also the constraint of the railroad line that flood control must accommodate. 101 upgrade is the more flexible element of infrastructure in project area.

At a SCVWD workshop last Thursday FEMA staff acknowledged that their flood maps do not account for back to back storm systems as with a Pacific Ocean pineapple express weather front or for any increased intensity of storm systems that might be anticipated due to climate change or global warming. Therefore, it might be prudent for this DEIR to reference FEMA 500 year floodplain parameters rather than 100-year ones.

Response 22-A: *Under numerous federal, state, and local regulations, including CEQA, projects are designed and assessed using the 100-year flood event as this event typically represents a reasonable worst-case scenario. The 100-year flood is the standard used by most agencies including, but not limited to, FEMA, the Army Corps of Engineers, the Pajaro River Watershed Flood Prevention Authority, the SCVWD, Caltrans, and numerous counties and cities.*

Comment 22-B: On DEIR biological study area maps it appears that magenta purple areas designate riparian removal. This impact would result in critical loss of riparian corridor flood retention capability as well as critical habitat loss. Please avoid this impact entirely in the proposed #101 project design. Do not believe such an impact can be mitigated except by replanting riparian corridor on site. In high water, biofiltration strips and swales provide no retention capability. They can only improve water quality by filtering out freeway contaminants. (2.10.5)

Response 22-B: *The purple areas shown on Figures 20a through 20g depict the riparian habitat in the Biological Study Area (BSA); these areas do not necessarily represent riparian removal. The BSA is an area that is greater than that expected to be directly impacted by the project in order to identify biological resources adjacent to the project. Table 34 in the EIR shows the total acreage in the BSA for various habitat types, as well as the permanent and temporary impacts to these habitats due to the project. For example, the BSA includes 35 acres of riparian habitat. Under either Design Option A or B for the interchange, 8 acres of riparian habitat would be permanently impacted and 7 acres would be temporality impacted. Section 2.17.5.1 of the EIR describes the proposed mitigation to offset permanent and temporary impacts to riparian habitat. Please also see the response to comment 17-M, which includes additional text that will be added to the EIR to provide more detail on riparian habitat mitigation.*

Biofiltration strips and swales would be included in the project to address water quality issues, in accordance with State water quality requirements. The project also includes two detention basins to retain and release floodwaters. We do not agree that the impacts to riparian habitats cannot be mitigated except by planting on-site. The extent of riparian habitat impacted is small enough, relative to the abundance of this habitat type elsewhere along the creeks and rivers

flowing through the project area, that riparian habitat loss due to the project will not result in substantial impairment of water quality or flood retention capability in and along these creeks. Nevertheless, mitigation of impacts to riparian habitat will be provided as described in the EIR, and as clarified in the response to Comment 17-M, to compensate for all the impacted riparian functions and values resulting from the project.

Comment 22-C: In regards Threatened and Endangered species, the proposed loss of riparian SRA by this project design, will have a cumulative impact on water temperature in the Pajaro River and all its tributary steelhead streams such as Llagas, Pacheco, Uvas/Carnadero and Tar Creek. Gavilan and Tick Creeks will be contributing more warm waters due to their loss of riparian cover. San Benito River may also suffer degradation of SRA habitat. As steelhead travel in cooler conditions and at night they are not always observed in a stream system so a conservative design should be a preferred management protocol. (Please note that in implementing #85 flyover with #101 at Bernal Road and Coyote Creek in 1992 Caltrans dryback killed off all fish by flawed plan).

Response 22-C: *Approximately 890 linear feet of shaded riverine aquatic (SRA) habitat at the Pajaro River, San Benito River, and Carnadero Creek will be permanently impacted by the project. The permanent impacts to this habitat are due to new or widened bridge structures. The water, therefore, will be shaded by the structures. It is not anticipated that the temperature of the water will change. In addition, it is unlikely that such a relatively small impact area compared to the quantity of water present and flowing past the project site would cumulatively impact the Pajaro River and tributaries. Please see Section 2.21.3.1 in the EIR.*

Although conventional wisdom has held that very cool, highly shaded creeks might provide better habitat for steelhead, there is some evidence that extensive shading may reduce productivity for fish, even "cold-water" fish such as steelhead. Casagrande (Casagrande, J. 2010. Distribution, abundance, growth and habitat use of steelhead in Uvas Creek, CA. M.S. Thesis, San Jose State University), studying steelhead in Uvas Creek, found that steelhead grew much more quickly, and thus were much larger by their first winter, at less shaded, somewhat warmer sites, which had higher prey abundance, than at densely shaded, cooler sites. Casagrande verified that invertebrate biomass was considerably higher at less heavily shaded sites than under a dense forest canopy. His findings confirm those of other studies demonstrating greater stream productivity, and greater salmonid production, along reaches with lower canopy closure and higher light levels. Although we are not suggesting that removal of riparian habitat necessarily benefits steelhead, it is unlikely that removal of approximately 890 linear feet of SRA habitat would have substantial adverse effects on these fish. Nevertheless, permanent impacts to SRA habitat will be mitigated at a 2:1 ratio, on a linear footage basis, and along streams that support South-Central California Coast steelhead, which may also benefit Pacific lamprey and Monterey roach. Temporary impacts to SRA habitat will be mitigated by restoring the habitat on-site.

VTA was not involved in the construction of the Route 85 project in the early 1990s. VTA is unaware of a "Caltrans dryback that killed all fish" associated with that project. In any case, any impacts from that project at Coyote Creek are unrelated to the proposed project, which is in a different location and different watershed.

Comment 22-D: At some point in DEIR read that mitigation for impacts to steelhead would be through payments to Santa Clara County HCP mitigation bank. Fisheries are not included in final Santa Clara County HCP so this is invalid option. Also, this reach of Pajaro River, if sufficiently degraded with warm water, can so stress the indigenous run of steelhead as to affect their health and reproductive capability. (2.17.5)

Response 22-D: *Please see Response 22-C regarding steelhead and water temperature.*

MM-T&E-1.1, which describes mitigation for the loss of SRA, riparian, and aquatic habitats, refers to Section 2.17.5 and Section 2.18.5. Section 2.17.5 describes mitigation for impacts to these habitats, not necessarily for direct impacts to steelhead. Nonetheless, mitigation for impacts to SRA, riparian, and aquatic habitats will offset impacts to steelhead habitat, whether that mitigation occurs via payment of impact fees to the HCP/NCCP or project-specific mitigation.

Also, please see Response 17-M for the revised text applicable to MM-NATCOM-1.2 for riparian and SRA habitat impacts and MM-WET-1.2 for wetland and aquatic habitat impacts.

Comment 22-E: Cumulative impacts on the species need to include aforementioned COE flood control project's loss of SRA for the Pajaro River system, as it has been ongoing for over a decade with all affected jurisdictions. Do not find cumulative impacts sufficiently addressed or an alternative of avoidance of impact seriously considered.

Response 22-E: *It is acknowledged that projects by the U.S. Army Corps of Engineers and others along the lower Pajaro River have the potential to impact steelhead. However, the U.S. 101 Improvement Project will avoid, minimize, and mitigate its impacts on steelhead so that it will not result in a considerable contribution to cumulative impacts to the species.*

Comment 22-F: Wetlands are not sufficiently clear as to location on biological study maps so cannot comment on extent of impacts. Perhaps on further study I will be able to understand this element appropriately.

Response 22-F: *This concern may be similar to that expressed in Comment 22-B regarding riparian impacts in the BSA; therefore, please see Response 22-B, as this response also applies to wetlands shown on Figures 20a through 20g.*

The BSA includes 4.78 acres of wetland habitat, which includes freshwater emergent wetlands and seasonal wetlands. Under Design Option A for the interchange, 1.24 acres of wetland habitat would be permanently impacted and 0.35 acres would be temporality impacted. Under Design Option B, 1.41 acres of wetland habitat would be permanently impacted and 0.55 acres would be temporality impacted. MM-WET-1.1 and MM-WET-1.2 in the EIR describes the proposed mitigation to offset permanent impacts to wetland habitat. Please also see Response 17-M, which includes revised text in the EIR that provides details on wetland mitigation for permanent impacts. MM-WET-1.3 describes the proposed mitigation to offset temporary impacts to wetland habitat. Please also see the Response 8-F, which includes revised text in the EIR that provides details on wetland mitigation for temporary impacts.

Comment 22-G: The Figure 21 Potential Wildlife Movement Pathways is one of the most important considerations in the #101 Improvement Project. It clearly illustrates how the project area is crossroads for wildlife from Diablo Range, Santa Cruz Range, Gabilan Range and Lomerias Muertas. This can mean essential revitalization of gene pools for all species of the region, as well as sustaining migratory flight paths for butterflies, hummingbirds and a myriad of birds of the Pacific Flyway. Native grasslands and oak woodlands are equally important to be preserved in and adjacent to project and natural bridges need to be designed to provide crossover facility to allow large animals like elk and kit fox, as well as small mammals safe continuity of wildlife corridor.

***Response 22-G:** Please see Response 17-C for a discussion of this project's consideration of wildlife movement impacts and mitigation measures. We disagree that a crossover facility is necessary for elk or kit fox. It is important to note that this project's impacts under CEQA are evaluated relative to existing conditions, and neither the elk nor the kit fox are currently present in the project area. Nevertheless, most of the existing undercrossings would be suitable for use by kit foxes, if present, and the larger undercrossings (such as those at Tar Creek and the Pajaro River) would accommodate animals as large as elk.*

Comment 22-H: Culverts serve opportunity for inter-range exchange but provide predators with exceptional hunting options so not ideal.

***Response 22-H:** The project alignment includes many culverts and creek crossings that provide passage for wildlife under U.S. 101. Culverts serve primarily to provide drainage, with safe passage by wildlife a secondary benefit. Numerous species were documented with remote cameras using the culverts successfully. With project implementation, wildlife use of the culverts and creek crossings would continue.*

On the other hand, road kill data indicated that numerous animals die on U.S. 101 attempting to make the surface crossings (a) where there is a solid concrete median, and (b) near some of the larger undercrossings, such as at the Pajaro River and Tar Creek. As a result, mitigation

measure MM-NATCOM-3.6 describes wildlife fencing to minimize the ability of wildlife to enter the roadway in these areas and, therefore, reduce road kill mortality.

For additional information on wildlife connectivity, please see Responses 17-C through 17-L, and 17-P.

Comment 22-I: Also, in 1980 public hearings on #101 upgrades along Coyote Creek, horsemen/horsewomen were promised equestrian underpasses which were never implemented. Believe natural bridge could accommodate either man on horseback or man leading horse. Precedent would be De Anza Trail implementation facility. Believe that Canada has designed exceptionally appealing natural bridges so please reference them here.

Response 22-I: *Section 2.1.2.2 of the EIR describes the elements of the project that will facilitate and accommodate planned trails. These elements will be designed to accommodate equestrians. See also Responses 6A and 13A.*

It is not known what the commentor means by the term "natural" bridge. If the commentor is referring to vegetated bridges that cannot be used for motorized vehicles, these types of bridges are prohibitively expensive. Regardless, the project includes facilities that will accommodate equestrians.

Comment 22-J: Other studies that might be included in this DEIR is the nitrogen deposition study that evaluated conversion of native grasses and incursion of invasives into natural grassland communities due to emissions from increased auto traffic, and archeological/paleontological studies that have recently unearthed camels as well as mammoths in region.

Response 22-J: *With regard to the effects of nitrogen deposition on certain habitats, that impact is addressed and accounted for in the recently-approved HCP/NCCP, of which this project is a "covered activity". The HCP/NCCP includes an extensive analysis of the air quality effects of development (including this project) on the serpentine habitat that is used by endangered species. The analysis concluded that the nitrogen component of such emissions does have an adverse effect on such habitat and, as a result, the HCP/NCCP includes a fee specifically related to nitrogen deposition. The fee covers such costs as the management of serpentine habitat to mitigate these adverse effects (e.g., increased invasive species control). For more information, please see Section 9.4.1 of the HCP/NCCP.*

With regard to the potential for the project to unearth fossils, that issue is addressed in Section 2.12 of the EIR and the accompanying technical Paleontological Evaluation Report. The EIR concludes that the project has the potential to impact paleontological resources and, as a result, a series of avoidance, minimization, and/or mitigation measures will be implemented. For the complete list of these measures, please see Section 2.12.5 of this EIR.

Comment 22-K: Geology element needs to provide stronger evaluation of geologic and plate tectonic impacts on Pajaro River watershed and channel evolution. Believe Coyote Creek once flowed into Pajaro and some other major river system is supposed to have dug out Monterey Bay's canyon, but not through here? Reason I feel this might be important is that whole nest of earthquake faults seem to focus on this crossover point of mountain range which might imply that upgrade design needs to be as resilient as possible to natural catastrophe.

Response 22-K: *As part of the preparation of this EIR, a Preliminary Geotechnical Report (PGR) was prepared for the purpose of identifying all geologic and soils conditions - including seismic risks - that could affect the project. The PGR included the mapping of active faults and an assessment of the magnitude of ground shaking that would be associated with the Maximum Credible Earthquake on each fault. Considering these data, the project will be designed and constructed in accordance with Caltrans' Seismic Design Criteria to avoid or minimize potential damage from seismic shaking on the site. Please see Section 2.11 of this EIR for a discussion of this issue; technical details can be found in the PGR.*

Comment 22-L: Finally, please restore as much riparian forest as possible for flood retention capabilities as well as for under flow supplied by tree roots and prevention of erosion.

Response 22-L: *The goal of creating, restoring, or enhancing riparian habitat is to achieve no net loss of habitat functions and values, such as erosion control. In many cases, however, mitigation for riparian habitat impacts can often improve functions and values on a local, watershed, and/or regional scale.*

Please see Responses 8-C and 17-M, which provide details of riparian mitigation for the project.

Comment 22-M: Trees should be noise reduction element, rather than sound walls which would only augment flood hazards both on and adjacent to freeway.

Response 22-M: *There is a common perception that trees can be substituted for soundwalls because trees are effective in lowering noise. However, the planting of trees has been shown to have little value with regard to noise reduction. The reason is that a noise reduction barrier should be a solid structure without holes in order to effectively block the transmission of sound waves. A row of trees would provide a visual screen but only a very limited noise reduction.*

**RESPONSE TO COMMENT #23:
EMILY RENZEL**

Comment 23-A: I completely agree with the comments submitted by Libby Lucas re widening 101 from Monterey Street in Gilroy to Highway 129.

Response 23-A: *Thank you for this comment. Please see the above responses to the comments submitted by Libby Lucas.*

**RESPONSE TO COMMENT #24:
BOB SCALES**

Comment 24-A: How much of the \$480 million cost estimate is for the portion of the project from Monterey Road to the SR 25 interchange including the connection to Old Monterey Road?

Response 24-A: *The following table provides the requested cost information.*

<i>Project Cost - Monterey St to SR 25 Including Connection to Old Monterey Rd.</i>		
<i>Item Description</i>	<i>Design Option A</i>	<i>Design Option B</i>
<i>Roadway</i>	<i>\$ 132.5 million</i>	<i>\$ 134.5 million</i>
<i>Structures</i>	<i>\$ 62.0 million</i>	<i>\$ 66.5 million</i>
<i>Right-of-Way</i>	<i>\$ 27.5 million</i>	<i>\$ 24.5 million</i>
<i>Escalation to 2017</i>	<i>\$ 12.0 million</i>	<i>\$ 12.5 million</i>
<i>Design Phase (PS&E)</i>	<i>\$ 16.0 million</i>	<i>\$ 16.5 million</i>
<i>Construction Administration</i>	<i>\$ 16.0 million</i>	<i>\$ 16.5 million</i>
<i>TOTAL:</i>	<i>\$ 266 million</i>	<i>\$ 271 million</i>

**RESPONSE TO COMMENT #25:
TED THOENY**

Comment 25-A: We would appreciate your consideration in the design of an interchange for S.H. 152 at the present intersection of US 101 and S.H.25 for traffic traveling north and east over the Pacheco Pass. This would help alleviate the present and future traffic impacts on northern San Benito County,

especially the small historic Mission town of San Juan Bautista and the farming community of the San Juan Valley. None of the interstate truck traffic traveling east or west, nor most of the commuter traffic using S.H. 156, stops in San Benito County. Utilizing highway tax dollars designated for S.H. 156 could be better spent supplementing your US 101 funding. Your consideration of keeping interstate traffic on US 101 would be greatly appreciated and would save the town of San Juan Bautista.

Response 25-A: *VTA concurs with the suggestion regarding SR 152. As stated in Section 1.3.1.12 of the EIR, the design of the reconstructed U.S. 101/SR 25 interchange will not preclude a possible realignment of SR 152 to provide a more direct connection between the SR 152/SR 156 and U.S. 101/SR 25 interchanges.*

Thank you for your comment suggesting a shift in funding from SR 156 to U.S. 101. SR 156 lies primarily in the counties of San Benito and Monterey. The proposed SR 156 Improvements Project near San Juan Bautista is entirely within San Benito County, and the development and funding of the project is being led by Caltrans in coordination with San Benito County. VTA does not have the authority to program or redirect another agency's funding.

**RESPONSE TO COMMENT #26:
JOSEPH THOMPSON**

Comment 26-A: Thanks for sending me the notice. I will submit a response as I did previously on Hwy 101, 25, 152 proposals. Based on VTA's conduct, one would think you had your own window on the ground floor of the Capitol. It's no wonder why VTA earned "worst in the Nation" ranking among your peers from the MIT Study of all the Nation's transit agencies. It is obvious why the Editorial Board of the Gilroy Dispatch has voted to terminate the VTA. I second their motion, again.

Response 26-A: *Thank you for your comment. This input will be considered by the VTA Board of Directors when considering certification of the EIR and approval of the project.*

Note: The following comments were made in the form of verbal testimony at the public hearing held on December 4, 2012. For each comment, a synopsis of each speaker's comments is shown. A copy of the public hearing transcript, which contains the verbatim oral comments, is contained in Appendix G.

**RESPONSE TO COMMENT #27:
OMAR CHATTY**

Comment 27-A: Please consider the impacts of the project on SR 25, SR 129, SR 152, and SR 156.

Response 27-A: *The study area for traffic impacts is depicted on Figure 3 in the technical Traffic Operations Analysis Report that was prepared for this project. The study area included those portions of SR 25, SR 129, SR 152, and SR 156 where the data indicate that this project could result in an impact. The analysis did not identify any substantial adverse effects on any of these highways.*

Comment 27-B: There may be a legal issue with VTA money being spent in San Diego County. This may need to be addressed.

Response 27-B: *This comment does not provide any information as to how or where VTA money is being spent in San Diego County. VTA is unaware of any of its monies being spent in San Diego County and believes that this statement is not correct.*

Comment 27-C: Please, no tolls on this project.

Response 27-C: *Thank you for this comment. There are no plans for tolls associated with this project.*

Comment 27-D: Please address the effects of the sun in drivers' eyes. Will some type of mitigation for this impact be necessary?

Response 27-D: *It is understood that there are certain times of the day and certain circumstances (e.g., direction of travel) where the sun can interfere with drivers' vision. It is also acknowledged that there are some projects that build facilities that direct glare from sunlight into drivers' eyes, a prime example of which would be a high-rise building with reflective glass on its exterior. However, this project is not building any such facilities or creating any circumstances that would create new sources of glare and/or exacerbate existing problems associated with sunlight. Therefore, no mitigation will be necessary.*

Comment 27-E: Please consider berms with vegetation instead of soundwalls.

Response 27-E: *For a berm to be as effective as a soundwall in terms of reducing noise, it would need to be the same height. For a berm, this would require a large footprint to accommodate slopes in a manner that does not cause erosion or slope failure. Thus, berms are practical only at locations where there is a substantial amount of room between the highway and the adjacent land use. Further, when comparing berms with soundwalls, other impacts such as greater right-of-way cost, increased land use impacts (e.g., greater loss of farmland), and maintenance costs need to be considered. In this case, in reviewing the locations where soundwalls were evaluated, the use of berms would not be a practical alternative.*

Comment 27-F: Please consider the impact of the project on emergency vehicles.

Response 27-F: *This issue is evaluated in Section 2.5 of the EIR. As stated in that section, "emergency services would indirectly benefit from the proposed project in that, by reducing peak commute period congestion, emergency vehicle response times will be reduced. The project will not sever or alter any emergency evacuation routes." In addition, with regard to the construction phase, Section 2.22.1 of the EIR states that "the effect of the project on emergency vehicle response times during construction will be minimal because road closures are not anticipated and lane closures will be limited to off-peak periods. Coordination with emergency services regarding lane closures, etc. will be part of the Traffic Management Plan."*

Comment 27-G: Regarding relocations, do you relocate businesses near off-ramps?

Response 27-G: *VTA does not physically relocate businesses. Section 2.4 discusses real property acquisition and relocations. Relocations from the project are identified in Table 13. Properties involving relocations would receive fair market value and relocation assistance in accordance with the provisions of the Caltrans Relocation Assistance Program; see Appendix C of the EIR.*

RESPONSE TO COMMENT #28:

CAROL TOGNETTI

Comment 28-A: I am concerned about farmland impacts, especially Design Option A that takes more farmland. What about the agricultural properties where only a portion of the parcel will be taken? Will the remainder be usable and, in particular, will there be access?

Response 28-A: *As stated in Section 2.3.5 of the EIR, the project has been designed to reduce its footprint to the greatest extent practicable so as to minimize impacts to farmland. Where right-of-way will be needed from agricultural properties, only the minimum amount needed for*

the project will be acquired. The intent is that the remainder of the parcel would still be viable for farming and, if warranted, replacement access will be provided by the project. In certain limited cases, the remainder of a parcel may not be viable, in which case the entire parcel would be acquired at fair market value. The calculations of farmland impacts contained in Section 2.3 have accounted for such situations.

Comment 28-B: I am concerned about greenhouse gases. Did you comply with regulations related to climate change?

Response 28-B: Section 2.15 of the EIR is devoted entirely to the subject of greenhouse gases and climate change and was written to comply with applicable regulations. The section includes an analysis of greenhouse gas emissions associated with the project. For an overview of current regulations and policies pertaining to this issue, please see Section 2.15.1.

Comment 28-C: I am glad that the project is addressing the issue of wildlife connectivity.

Response 28-C: Thank you for this comment. This input will be considered by the VTA Board of Directors when considering certification of the EIR and approval of the project.

RESPONSE TO COMMENT #29: JIMMY GALTMAN

Comment 29-A: I am concerned about noise. There is a truck stop directly across from my property. Noise from trucks, especially their “jake brakes” is annoying. We would like a soundwall even though it’s probably not cost-effective.

Response 29-A: Mr. Galtman also submitted this comment in writing. Please see Comment #21-B and the accompanying response.

Comment 29-B: When they built U.S. 101 around Gilroy it created a dam. We were flooded in 1986. I’m concerned that if you elevate the area between where I live and Carnadero Creek, you will create a dam and water won’t be able to get through. Please consider the bridge you’re going to rebuild over Carnadero Creek; will the grade level stay the same?

Response 29-B: The project will not result in an increase in flooding or the water surface elevation at this location under either Design Option A or Design Option B. For details regarding the effect of the project on flooding in this area, please see the technical Location Hydraulic Study.

Comment 29-C: Will there be an easement on the frontage road that I live on? I have a bunch of pine trees across the front of my property, which essentially are there for a sound barrier. They're dying due to pitch canker and I've already removed about one dozen. Will these trees be impacted by the project?

Response 29-C: *Based on the preliminary plans developed to date, only some vegetation may need to be removed to accommodate the width of the roadway, as well as to maintain an adequate clearance zone between the travel lanes and the trees for safety purposes. It is expected that the majority of the trees will remain. Note that while trees provide a visual screen, they have been shown to provide very little noise reduction*

**RESPONSE TO COMMENT #30:
JOLENE COSIO**

Comment 30-A: I live in San Juan Bautista and I do not understand why Design Option A would even be considered since Option B uses up so much less prime farmland. It appears that Design Option B should be the preferred option.

Response 30-A: *Thank you for this comment. Your preference for the selection of Design Option B is noted for the record. This preference is consistent with the recommendation of the project development team, as discussed in Section 1.3.4 of this Final EIR.*

Comment 30-B: I don't know that driveways on a highway are as bad as Caltrans and VTA think they are. With proper acceleration and deceleration lanes, I think you can accommodate businesses along a highway.

Response 30-B: *U.S. 101 is a designated freeway north and south of the project site; therefore this segment of the corridor needs to be upgraded to freeway standards to match the adjacent segments. Freeways are known as "access-controlled" highways, with driveways and at-grade intersections not allowed. This control facilitates the safe movement of large numbers of vehicles at higher speeds without issues associated with ingress/egress except at interchanges.*

**RESPONSE TO COMMENT #31:
ALEX LARSON**

Comment 31-A: My brother and I own Rapazzini Winery and The Garlic Shoppe. The EIR says we will receive fair market value. However, in 1985, you constructed an overpass right in front of us, which resulted in a loss of 50% of our business. Then, you put a median down the middle of the road, which took away our southbound access, which resulted in another 30% loss of business. So, will you compensate us for the total effect of everything you've done in a piecemeal fashion over the years?

Response 31-A: *The fair market value of these businesses will be determined during the right-of-way phase. The procedure for acquiring right-of-way, including the determination of fair market value, is based on the Real Property Acquisition Policies Act of 1970. The process includes appraisals and procedures to be followed if there is a disagreement over value. In addition, businesses will also receive relocation assistance in accordance with Caltrans' Relocation Assistance Program, a copy of which is reproduced in Appendix C of this document.*

RESPONSE TO COMMENT #32:

JOE RIZUTTO

Comment 32-A: We've been at 5625-5655 Monterey Frontage Road since 1908. They took 90 feet from us the first time, then 150 feet the second time. Are they going to take more this time?

Response 32-A: *According to Table 3 of the EIR, the project will require 0.1 acre of right-of-way from APN 808-22-003 at 5655 Monterey Road, as well as 0.1 acre of right-of-way from APN 808-22-012 at 5625 Monterey Road. No structures on either parcel will be impacted.*

Comment 32-B: I don't know what they're going to do with the frontage road. If they raise the bridge at Carmadero Creek, the water will back up and flood us.

Response 32-B: *The project will not result in an increase in flooding or the water surface elevation at this location under either Design Option A or Design Option B. For details regarding the effect of the project on flooding in this area, please see the technical Location Hydraulic Study.*

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Jennifer Gworek, M.S., Wildlife Ecologist

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Robin Carle, M.S., Wildlife Ecologist

Bat biologist Dave Johnston, Ph.D., Bat Biologist

Jennifer Brown, Ph.D., Fisheries Ecologist

Sharon Kramer, Ph.D., Fisheries Ecologist

Illingworth & Rodkin, Inc. [Noise, Air Quality, & MSAT Studies]

Michael S. Thill, Senior Consultant

James Reyff, Senior Consultant
Alina Pommerenck, Consultant
Keith Pommerenck, Consultant

Ninyo & Moore [Preliminary Geotechnical Report and Initial Site Assessment]

Greg Corson, Project Geologist
Mark Caruso, Principal Engineering Geologist
Terence Wang, Principal Engineer
D. Blair Bridges, Senior Staff Environmental Geologist
Kristopher Larson, Senior Environmental Geologist

Infrastructure Engineering Corporation [Paleontological Evaluation Report Addendum]

Anna Busing, Principal

Haygood & Associates [Visual Impact Assessment]

Leah Haygood, Principal
Charlene Saito, Photosimulations

WRECO, Inc. [Stormwater Data Report and Location Hydraulic Study]

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Analette A. Ochoa, Senior Associate

CHAPTER 6 DISTRIBUTION LIST

This EIR was distributed to the following legislators, public officials, agencies and organizations:

Legislators and Public Officials

- U.S. Senator Dianne Feinstein
- U.S. Senator Barbara Boxer
- U.S. Representative Mike Honda
- U.S. Representative Sam Farr
- California Senator Elaine Alquist
- California Senator Anthony Cannella
- California Assemblyman Luis Alejo
- Santa Clara County Supervisor Mike Wasserman
- San Benito County Supervisor Anthony Botelho
- City of Gilroy Mayor Al Pinheiro

Federal Agencies

- U.S. Fish & Wildlife Service (Sacramento Office)
- U.S. Army Corps of Engineers (San Francisco District)
- NOAA Fisheries Service (Santa Rosa & Long Beach Offices)
- National Park Service (De Anza National Historic Trail, Oakland)

State Agencies (via State Clearinghouse)

- California Highway Patrol
- California Department of Fish & Wildlife (Region 3)
- California Department of Toxic Substances Control
- California Department of Conservation
- Regional Water Quality Control Board (Central Coast Region)
- California Public Utilities Commission
- State Historic Preservation Office
- California Transportation Commission

Regional Agencies

- Metropolitan Transportation Commission
- Association of Bay Area Governments
- Association of Monterey Bay Area Governments
- Council of San Benito County Governments
- Bay Area Air Quality Management District

- Monterey Bay Unified Air Pollution Control District
- Santa Clara Valley Water District
- Pajaro River Watershed Flood Prevention Authority
- San Benito County Express
- Monterey-Salinas Transit

Local Agencies

- City of Gilroy
- City of Hollister
- San Benito County Planning Department
- Santa Clara County Planning Department
- Santa Clara County Parks & Recreation Department
- Santa Clara County Roads & Airports Department
- Santa Clara County Open Space Authority

Organizations

- Pacific Gas & Electric Company
- Bay Area Ridge Trail Council
- Gavilan College

Appendix A

CEQA Checklist

CEQA Environmental Checklist

04-SCL-101-25
05-SBT-101

0.0-5.0; 1.6-2.5
4.9-7.5

3A1600

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P.M/P.M.

E.A.

This checklist identifies physical, biological, social and economic factors that might be affected by the proposed project. In many cases, background studies performed in connection with the projects indicate no impacts. A NO IMPACT answer in the last column reflects this determination. Where there is a need for clarifying discussion, the discussion is included either following the applicable section of the checklist or is within the body of the environmental document itself. The words "significant" and "significance" used throughout the following checklist are related to CEQA, not NEPA, impacts. The questions in this form are intended to encourage the thoughtful assessment of impacts and do not represent thresholds of significance.

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
I. AESTHETICS: Would the project:				
a) Have a substantial adverse effect on a scenic vista	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Substantially degrade the existing visual character or quality of the site and its surroundings?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

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?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d) Result in the loss of forest land or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Violate any air quality standard or contribute substantially to an existing or projected air quality violation?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d) Expose sensitive receptors to substantial pollutant concentrations?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
e) Create objectionable odors affecting a substantial number of people?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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 Game or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
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 Game or US Fish and Wildlife Service?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
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?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

V. CULTURAL RESOURCES: Would the project:

a) Cause a substantial adverse change in the significance of a historical resource as defined in §15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
c) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
d) Disturb any human remains, including those interred outside of formal cemeteries?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
ii) Strong seismic ground shaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
iii) Seismic-related ground failure, including liquefaction?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
iv) Landslides?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Result in substantial soil erosion or the loss of topsoil?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
e) Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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

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.

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?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
g) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

IX. HYDROLOGY AND WATER QUALITY: Would the project:

a) Violate any water quality standards or waste discharge requirements?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
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)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner which would result in substantial erosion or siltation on- or off-site?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
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?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
f) Otherwise substantially degrade water quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
h) Place within a 100-year flood hazard area structures which would impede or redirect flood flows?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
j) Inundation by seiche, tsunami, or mudflow	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

X. LAND USE AND PLANNING: Would the project:

a) Physically divide an established community?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Conflict with any applicable habitat conservation plan or natural community conservation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
b) Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c) A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
d) A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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)?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b) Displace substantial numbers of existing housing, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
c) Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Police protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Schools?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Parks?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Other public facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact
--------------------------------------	--	------------------------------------	--------------

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? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

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? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| 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? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| 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? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| d) Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| e) Result in inadequate emergency access? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| 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? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

XVII. UTILITIES AND SERVICE SYSTEMS: Would the project:

- | | | | | |
|--|--------------------------|--------------------------|--------------------------|-------------------------------------|
| a) Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| 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? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

	Potentially Significant Impact	Less Than Significant 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
d) Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
f) Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
g) Comply with federal, state, and local statutes and regulations related to solid waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
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)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

Appendix B

Title VI Policy Statement

DEPARTMENT OF TRANSPORTATION

OFFICE OF THE DIRECTOR
P.O. Box 942873, MS-49
SACRAMENTO, CA 94273-0001
PHONE (916) 654-5266
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*"Flex your power!
Be energy efficient!"*

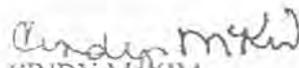
July 20, 2010

TITLE VI 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, 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, or age, please visit the following web page:
http://www.dot.ca.gov/hq/bep/title_vi/t6_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 Charles Wahnnon, Manager, Title VI and Americans with Disabilities Act Program, California Department of Transportation, 1823 14th Street, MS-79, Sacramento, CA 95811. Phone: (916) 324-1353 or toll free 1-866-810-6346 (voice), TTY 711, fax (916) 324-1869, or via email: charles_wahnnon@dot.ca.gov.


CINDY MCKIM
Director

Appendix C

Summary of Relocation Benefits

California Department of Transportation Relocation Assistance Program

DECLARATION OF POLICY

“The purpose of this title is to establish a **uniform policy for fair and equitable treatment** of persons displaced as a result of federal and federally assisted programs in order that such persons **shall not suffer disproportionate injuries** as a result of programs designed for the benefit of the public as a whole.”

The Fifth Amendment to the U.S. Constitution states, “No Person shall...be deprived of life, liberty, or property, without due process of law, nor shall private property be taken for public use without just compensation.” The Uniform Act sets forth in statute the due process that must be followed in Real Property acquisitions involving federal funds. Supplementing the Uniform Act is the government-wide single rule for all agencies to follow, set forth in 49 Code of Federal Regulations, Part 24. Displaced individuals, families, businesses, farms, and nonprofit organizations may be eligible for relocation advisory services and payments, as discussed below.

FAIR HOUSING

The Fair Housing Law (Title VIII of the Civil Rights Act of 1968) sets forth the policy of the United States to provide, within constitutional limitations, for fair housing. This Act, and as amended, makes discriminatory practices in the purchase and rental of most residential units illegal. Whenever possible, minority persons shall be given reasonable opportunities to relocate to any available housing regardless of neighborhood, as long as the replacement dwellings are decent, safe, and sanitary and are within their financial means. This policy, however, does not require Caltrans to provide a person a larger payment than is necessary to enable a person to relocate to a comparable replacement dwelling.

Any persons to be displaced will be assigned to a relocation advisor, who will work closely with each displacee in order to see that all payments and benefits are fully utilized, and that all regulations are observed, thereby avoiding the possibility of displacees jeopardizing or forfeiting any of their benefits or payments. At the time of the initiation of negotiations (usually the first written offer to purchase), owner-occupants are given a detailed explanation of the state's relocation services. Tenant occupants of properties to be acquired are contacted soon after the initiation of negotiations, and also are given a detailed explanation of the Caltrans Relocation Assistance Program. To avoid loss of possible benefits, no individual, family, business, farm, or nonprofit organization should commit to purchase or rent a replacement property without first contacting a Caltrans relocation advisor.

RELOCATION ASSISTANCE ADVISORY SERVICES

In accordance with the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970, as amended, Caltrans will provide relocation advisory assistance to any person, business, farm or nonprofit organization displaced as a result of the acquisition of real property for public use, so long as they are legally present in the United States. Caltrans will assist eligible displacees in obtaining comparable replacement housing by providing current and continuing information on the availability and prices of both houses for sale and rental units that are "decent, safe and sanitary." Nonresidential displacees will receive information on comparable properties for lease or purchase (For business, farm and nonprofit organization relocation services, see below).

Residential replacement dwellings will be in a location generally not less desirable than the displacement neighborhood at prices or rents within the financial ability of the individuals and families displaced, and reasonably accessible to their places of employment. Before any displacement occurs, comparable replacement dwellings will be offered to displacees that are open to all persons regardless of race, color, religion, sex, national origin, and consistent with the requirements of Title VIII of the Civil Rights Act of 1968. This assistance will also include the supplying of information concerning Federal and State assisted housing programs, and any other known services being offered by public and private agencies in the area.

Persons who are eligible for relocation payments and who are legally occupying the property required for the project will not be asked to move without first being given at least 90 days written notice. Residential occupants eligible for relocation payment(s) will not be required to move unless at least one comparable "decent, safe and sanitary" replacement dwelling, available on the market, is offered to them by Caltrans.

RESIDENTIAL RELOCATION PAYMENTS

The Relocation Assistance Program will help eligible residential occupants by paying certain costs and expenses. These costs are limited to those necessary for or incidental to the purchase or rental of a replacement dwelling and actual reasonable moving expenses to a new location within 50 miles of the displacement property. Any actual moving costs in excess of the 50 miles are the responsibility of the displacee. The Residential Relocation Assistance Program can be summarized as follows:

Moving Costs

Any displaced person, who lawfully occupied the acquired property, regardless of the length of occupancy in the property acquired, will be eligible for reimbursement of moving costs.

Displacees will receive either the actual reasonable costs involved in moving themselves and personal property up to a maximum of 50 miles, or a fixed payment based on a fixed moving cost

schedule. Lawful occupants who move into the displacement property after the initiation of negotiations must wait until the Department obtains control of the property in order to be eligible for relocation payments.

Purchase Differential

In addition to moving and related expense payments, fully eligible homeowners may be entitled to payments for increased costs of replacement housing.

Homeowners who have owned and occupied their property for 180 days or more prior to the date of the initiation of negotiations (usually the first written offer to purchase the property), may qualify to receive a price differential payment and may qualify to receive reimbursement for certain nonrecurring costs incidental to the purchase of the replacement property. An interest differential payment is also available if the interest rate for the loan on the replacement dwelling is higher than the loan rate on the displacement dwelling, subject to certain limitations on reimbursement based upon the replacement property interest rate. The maximum combination of these three supplemental payments that the owner-occupant can receive is \$22,500. If the total entitlement (without the moving payments) is in excess of \$22,500, the Last Resort Housing Program will be used (See the explanation of the Last Resort Housing Program below).

Rent Differential

Tenants and certain owner-occupants (based on length of ownership) who have occupied the property to be acquired by Caltrans prior to the date of the initiation of negotiations may qualify to receive a rent differential payment. This payment is made when Caltrans determines that the cost to rent a comparable "decent, safe and sanitary" replacement dwelling will be more than the present rent of the displacement dwelling. As an alternative, the tenant may qualify for a down payment benefit designed to assist in the purchase of a replacement property and the payment of certain costs incidental to the purchase, subject to certain limitations noted under the Down Payment section below. The maximum amount payable to any eligible tenant and any owner-occupant of less than 180 days, in addition to moving expenses, is \$5,250. If the total entitlement for rent supplement exceeds \$5,250, the Last Resort Housing Program will be used.

In order to receive any relocation benefits, the displaced person must buy or rent and occupy a "decent, safe and sanitary" replacement dwelling within one year from the date the Department takes legal possession of the property, or from the date the displacee vacates the displacement property, whichever is later.

Down Payment

The down payment option has been designed to aid owner-occupants of less than 180 days and tenants in legal occupancy prior to Caltrans' initiation of negotiations. The down payment and incidental expenses cannot exceed the maximum payment of \$5,250. The one-year eligibility

period in which to purchase and occupy a "decent, safe and sanitary" replacement dwelling will apply.

Last Resort Housing

Federal regulations (49 CFR 24) contain the policy and procedure for implementing the Last Resort Housing Program on federal-aid projects. Last Resort Housing benefits are, except for the amounts of payments and the methods in making them, the same as those benefits for standard residential relocation as explained above. Last Resort Housing has been designed primarily to cover situations where a displacee cannot be relocated because of lack of available comparable replacement housing, or when the anticipated replacement housing payments exceed the \$22,500 and \$5,250 limits of the standard relocation procedure, because either the displacee lacks the financial ability or other valid circumstances.

After the initiation of negotiations, Caltrans will within a reasonable length of time, personally contact the displacees to gather important information, including the following:

- Number of people to be displaced;
- Specific arrangements needed to accommodate any family member(s) with special needs;
- Financial ability to relocate into comparable replacement dwelling which will adequately house all members of the family;
- Preferences in area of relocation;
- " Location of employment or school.

NONRESIDENTIAL RELOCATION ASSISTANCE

The Nonresidential Relocation Assistance Program provides assistance to businesses, farms and nonprofit organizations in locating suitable replacement property, and reimbursement for certain costs involved in relocation. The Relocation Advisory Assistance Program will provide current lists of properties offered for sale or rent, suitable for a particular business's specific relocation needs. The types of payments available to eligible businesses, farms and nonprofit organizations are: searching and moving expenses, and possibly reestablishment expenses; or a fixed in lieu payment instead of any moving, searching and reestablishment expenses. The payment types can be summarized as follows:

Moving Expenses

Moving expenses may include the following actual, reasonable costs:

- The moving of inventory, machinery, equipment and similar business-related property, including: dismantling, disconnecting, crating, packing, loading, insuring, transporting, unloading, unpacking, and reconnecting of personal property. Items acquired in the Right

of Way contract may not be moved under the Relocation Assistance Program. If the displacee buys an Item Pertaining to the Realty back at salvage value, the cost to move that item is borne by the displacee.

- Loss of tangible personal property provides payment for actual, direct loss of personal property that the owner is permitted not to move.
- Expenses related to searching for a new business site, up to \$2,500, for reasonable expenses actually incurred.

Reestablishment Expenses

Reestablishment expenses related to the operation of the business at the new location, up to \$10,000 for reasonable expenses actually incurred.

Fixed In Lieu Payment

A fixed payment in lieu of moving, searching, and reestablishment payments may be available to businesses which meet certain eligibility requirements. This payment is an amount equal to half the average annual net earnings for the last two taxable years prior to the relocation and may not be less than \$1,000 nor more than \$20,000.

ADDITIONAL INFORMATION

Reimbursement for moving costs and replacement housing payments are not considered income for the purpose of the Internal Revenue Code of 1954, or for the purpose of determining the extent of eligibility of a displacee for assistance under the Social Security Act, or any other law, except for any Federal law providing local "Section 8" Housing Programs.

Any person, business, farm or nonprofit organization which has been refused a relocation payment by the Caltrans relocation advisor or believes that the payment(s) offered by the agency are inadequate, may appeal for a special hearing of the complaint. No legal assistance is required. Information about the appeal procedure is available from the relocation advisor.

California law allows for the payment for lost goodwill that arises from the displacement for a public project. A list of ineligible expenses can be obtained from Caltrans Right of Way. California's law and the federal regulations covering relocation assistance provide that no payment shall be duplicated by other payments being made by the displacing agency.

RESIDENTIAL RELOCATION PAYMENTS PROGRAM

The links below are to the Relocation Assistance for Residential Relocation Brochure.

- http://www.dot.ca.gov/hq/row/pubs/residential_english.pdf
- http://www.dot.ca.gov/hq/row/pubs/residential_spanish.pdf

Appendix D

List of Acronyms

List of Acronyms

ABAG	Association of Bay Area Governments
AMBAG	Association of Monterey Bay Area Governments
BAAQMD	Bay Area Air Quality Management District
BSA	biological study area
CalEPA	California Environmental Protection Agency
CARB	California Air Resources Board
CEC	California Energy Commission
CEQA	California Environmental Quality Act
CERCLA	Comprehensive Environmental Response, Compensation and Liability Act
CFR	Code of Federal Regulations
CO	carbon monoxide
CO ₂	carbon dioxide
CRHR	California Register of Historic Resources
CWA	Clean Water Act
EB	eastbound
EPA	Environmental Protection Agency
ESU	evolutionary significant unit
FEMA	Federal Emergency Management Agency
FHWA	Federal Highway Administration
FIRM	Flood Insurance Rate Map
GHG	greenhouse gas
HCP	habitat conservation plan
HOV	high occupancy vehicle
ISA	Initial Site Assessment
LESA	Land Evaluation & Site Assessment
LOS	level of service
MBUAPCD	Monterey Bay Unified Air Pollution Control District
MCE	maximum credible earthquake
MPO	metropolitan planning organization
MS4	municipal separate storm sewer system
MSATs	mobile source air toxics
MTC	Metropolitan Transportation Commission

NAAQS	National Ambient Air Quality Standards
NB	northbound
NCCP	natural communities conservation plan
NEPA	National Environmental Policy Act
NHPA	National Historic Preservation Act
NO ₂	nitrogen dioxide
NPDES	National Pollutant Discharge Elimination System
NRHP	National Register of Historic Places
O ₃	ozone
PM	particulate matter
POC	pedestrian overcrossing
PRC	(California) Public Resources Code
RAP	Relocation Assistance Program
RCB	reinforced concrete box
RCP	reinforced concrete pipe
RCRA	Resource Conservation and Recovery Act
RTP	Regional Transportation Plan
RWQCB	Regional Water Quality Control Board
SB	southbound
SCVWD	Santa Clara Valley Water District
SHPO	State Historic Preservation Officer
SO ₂	sulfur dioxide
SR	State Route
SWMP	Stormwater Management Plan
SWPPP	Stormwater Pollution Prevention Plan
SWRCB	State Water Resources Control Board
TMDL	total maximum daily load
WB	westbound
WDR	waste discharge requirement
VOC	volatile organic compound
VTA	Santa Clara Valley Transportation Authority
VTP 2035	Valley Transportation Plan 2035

Appendix E

List of Technical Studies

List of Technical Studies

The following technical studies were prepared during the preparation of this EIR for this project.

These studies are available for review at the locations listed inside the front cover of this document.

Traffic Operations Assessment Report (Dowling Associates)

Visual Impact Assessment (Haygood & Associates)

Land Evaluation Suitability Assessment (LESA) Report (David J. Powers & Associates)

Historic Properties Compliance Report (Far Western Anthropological Research Group)

Historic Resources Evaluation Report (JRP Historical Consulting)

Archaeological Survey Report (Far Western Anthropological Research Group)

Location Hydraulic Study (WRECO)

Stormwater Data Report (WRECO)

Preliminary Geotechnical Report (Ninyo & Moore)

Paleontological Evaluation Report Addendum (Infrastructure Engineering Corporation)

Initial Site Assessment (Ninyo & Moore)

Air Quality Report (Illingworth & Rodkin)

Mobile Source Air Toxics Report (Illingworth & Rodkin)

Noise Study Report (Illingworth & Rodkin)

Natural Environment Study (H.T. Harvey & Associates)

Appendix F

Comments Received on the Draft EIR



DEPARTMENT OF CONSERVATION

Managing California's Working Lands

DIVISION OF LAND RESOURCE PROTECTION

801 K STREET • MS 18-01 • SACRAMENTO, CALIFORNIA 95814

PHONE 916 / 324-0850 • FAX 916 / 327-3430 • TDD 916 / 324-2555 • WEBSITE conservation.ca.gov

April 29, 2013

VIA EMAIL to [101 Widening@VTA.org](mailto:101_Widening@VTA.org)

FAX at (408) 321-7535

Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
3331 North First Street – Building B-2
San Jose, CA 95134-1927
Attn: Ann Calnan

Subject: U.S. 101 IMPROVEMENT PROJECT BETWEEN MONTEREY STREET AND STATE ROUTE 129; DRAFT ENVIRONMENTAL IMPACT REPORT (SANTA CLARA AND SAN BENITO COUNTIES) SCH# 2007102141; WANG FARM AGRICULTURAL CONSERVATION EASEMENT

Dear Ms. Calnan:

The Department of Conservation's Division of Land Resource Protection has reviewed the Draft Environmental Impact Report (DEIR) for the referenced project. The Department's Division of Land Resource Protection monitors farmland conversion on a statewide basis and administers the California Land Conservation Act (Williamson Act), the California Farmland Conservancy Program (CFCP), the Farmland Mapping and Monitoring Program (FMMP); and other agricultural land conservation programs. We offer the following comments.

Project Description

The Santa Clara Valley Transportation Authority (VTA) has prepared this DEIR in its role as the Lead Agency under the California Environmental Quality Act (CEQA). The VTA, in cooperation with the California Department of Transportation (Caltrans), proposes improvements to U.S. 101 in southern Santa Clara County and northern San Benito County.

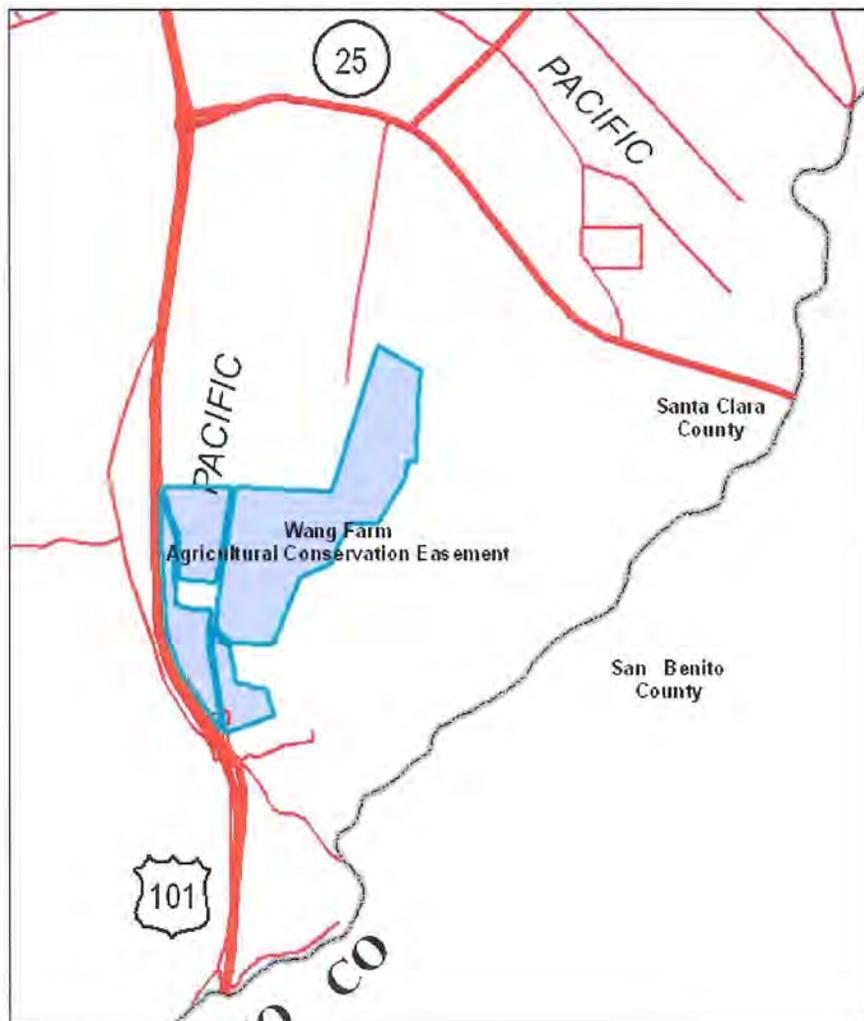
Impacts to Agricultural Conservation Easements

The VTA DEIR does not acknowledge that 282-acre Wang Farm Agricultural Conservation Easement¹ ("Wang Farm") may be impacted by the proposed project. The Wang Farm (Figure 1) is under a permanent agricultural conservation easement held by the Silicon Valley Land Conservancy.

¹ Wang Farm Agricultural Conservation Easement: APN 841-036-011 (portion)

The Department's CFCP and the United States Department of Agricultural, National Resource Conservation Service, Farm and Ranch Land Protection Program provided grant funding to purchase of the Wang Farm in 2005. As part of the original application, both the City Council of the City of Gilroy and the Santa Clara County Board of Supervisors passed resolutions of support on July 7, 2003 and June 24, 2003, respectively, supporting establishment of the Wang Farm Agricultural Conservation Easement, which was designated to be held in perpetuity. Terminating portions of the easement and fragmentation of the remaining agricultural property is directly at odds with the intent of the easement and the City's and County's support of the easement. Any future changes to use of this property would require permission of the United States Department of Agriculture.

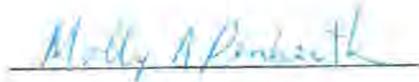
Figure 1:



The implications of this potential easement disruption are beyond the scope of the DEIR itself, but must be addressed if VTA chooses to continue with the project as described.

Thank you for giving us the opportunity to comment on this DEIR. If you have questions on our comments, please contact Tim Bryant, CFCP Grant Manager, at (209) 742-6191; or for Williamson Act related questions Meri Meraz at (916) 445-9411, 801 K Street, MS 18-01, Sacramento, California 95814.

Sincerely,

A handwritten signature in blue ink that reads "Molly A. Penberth". The signature is written in a cursive style and is positioned above a horizontal line.

Molly A. Penberth, Manager
Division of Land Resource Protection
Conservation Program Support Unit

cc:
State Clearinghouse

Silicon Valley Land Conservancy, 117 Bernal Rd, #70-181, San Jose, CA 95119

USDA-NRCS-Farm and Ranchland Protection Program 430 G Street, #4164
Davis, California 95616

Memorandum

*Flex your power!
Be energy efficient!*

To: NICK SALEH
Regional Project Manager
Project Management South

Date: April 25, 2013

File: 3A160

From: CRISTIN HALLISSY 
Branch Chief
Office of Environmental Analysis

Subject: US 101 Improvement Project Between Monterey St. and SR 129 DEIR OEA Comments

The Office of Environmental Analysis offers the following comments on the Draft Environmental Impact Report for the U.S. 101 Improvement Project between Monterey Street and State Route 129 in Santa Clara and San Benito Counties. The Santa Clara Valley Transportation Agency (VTA) is the CEQA lead agency for this project, and the California Department of Transportation (Caltrans) is a CEQA responsible agency.

Section 1.2 – The second purpose “Accommodate projected traffic demand along U.S. 101...” and the fifth purpose “Enhance the movement of...” have no correlating need statement or data. Information demonstrating the future congestion and delay needs to be included in the need section of the document. The same information is lacking to demonstrate that the movement of goods along U.S. 101 is a problem.

Section 2.6 – All tables and information (including but not exclusively Tables 19 and 20) in this section should be updated so the information in the Final Environmental Impact Report (FEIR) matches and is consistent with the information in the Project Report and TOAR. The information in the Draft Environmental Impact Report does not match/is not consistent with that in the Draft Project Report and TOAR.

Section 2.8.1 – Please edit the final sentence of the section to read: It further specifically requires Caltrans to inventory, evaluate for significance, assess effects, and early in the planning process give notice and opportunity to comment to the SHPO.

Section 2.8.2.2 – The numbers of resources discussed do not add up. 12 resources are mentioned, but only six are discussed as eligible or ineligible. This document as currently written obfuscates which resources are of may be in State Right of Way, and are thus subject to PRC 5024.6. Eligible and potential effects for the remaining six sites not specifically have not been completed and the SHPO has not been consulted. This process must be completed prior to approval of the FEIR, to be in compliance with PRC 5024.5.

c: File

From: Moonjian, Jennifer M@DOT
Sent: Thursday, April 25, 2013 2:18 PM
To: Olejnik, John@DOT
Cc: Siepel, Nancy R@DOT; Bonner, Larry E@DOT
Subject: Hwy 101 Improvement Project - DEIR Comments from D-5 Bio

Dear John,

Below are my comments for the 101 Widening Project. Let me know if you have any questions or concerns.

Thank you,
Jennifer Moonjian
Biologist (District 5)
805-542-4763

Highway 101 Improvement Project between Monterey Street and State Route 129
Draft Environmental Impact Report
Comments from Jennifer Moonjian
25 April 2013

1. Page XIV: Impact NATCOM-4: By adding the word "permanent" in the following sentence it precludes barriers that might be used during construction such as cofferdams and diversions. "Construction of the proposed project will not create **permanent** barriers to the..."
2. Page XIX: MM-Animal - 9: The project is permanently removing up to 5.5 acres of riparian and oak woodland. This will undoubtedly have an impact on bats that use the area for both foraging and roosting. It is tremendously difficult to detect a bat roost in a tree (personal communication with J. Szwczak during tree removal on another project I had), therefore there may be roosts that go undetected during tree removal. Bat habitat should be provided as part of this project to help offset permanent impacts to them as a result of this project. This habitat may be incorporated into new bridge structures (several have been constructed or are in the process of being constructed in District 5) or merely an Oregon wedge type design has also been found to be successful on an existing or new structure. Off-bridge habitats have not been found to be very successful in Central/Northern California.
3. Page XX: MM-Animal-12.1: Permits that are currently being issues from CDFW have nest buffers for passerines and raptors of 250 and 500 feet, respectively.
4. Page XXI: MM-T&E-2.4: Although the creeks and rivers are not expected to provide good breeding habitat for frogs, frogs could still be present during dewatering or diversion activities. There is no mention of appropriate methods to put in place during dewatering or diversion as is discussed in the steelhead section.
5. Page XXII: MM-T&E-2.15: Silt fencing or Ertec fencing should be considered to exclude species from the construction zone, especially around the Castro Valley area.
6. Page 173: 2.17.3.4 : Same comment as #1.
7. Page 177-178: The new and enhanced culverts for wildlife crossing should have post-construction monitoring to determine if the methods were successful and ways to improve in the future.
8. Page 196: 2.20.3.9 Impacts to Bats: See Comment #2. Removal of riparian and woodlands has a direct impact on bats, bridges are not the only bat habitat type in the project area.
9. Page 202: MM-Animal - 9.5: See Comment #2. The document refers to the day roosting areas on the Tar Creek Bridge that will be impacted, yet no mitigation is being offered for this roost. Just because it is not a maternity roost does not mean that it is not important for bats. Even night roosts, when disturbed, can impact the distance

that bats have to fly to and from their foraging locations, therefore lowering productivity - so it should not be discounted.

10. Page 203: MM-Animal-9.6: Just because a non-maternity colony of bats are using a structure does not justify not providing alternative roosts or lack of monitoring.

11. Page 204: MM-Animal - 12.1: Same as Comment #3.

12. Page 210: CTS Section: CTS is no longer a candidate - it is state listed as threatened.

From: Jan Bernstein-Chargin [<mailto:jbchargin@gavilan.edu>]

Sent: Friday, April 12, 2013 1:02 PM

To: 101_Widening

Subject: Comments on Draft EIR: U.S. 101 Improvement Project between Monterey Street and State Route 129

Attn: Ann Calnan

I am writing on behalf of Gavilan College, located at 5055 Santa Teresa Blvd in Gilroy. Most of our staff and students will be directly impacted by the proposed project: U.S. 101 Improvement Project between Monterey Street and State Route 129.

In reviewing the EIR, our priority was continued access to, and egress from, the existing college campus. We considered the peak traffic times to and from the campus under the proposed scenarios. The location of our primary concern is the Hwy 25/Hwy 101 interchange, and the portion of Santa Teresa Blvd from this interchange to the college entrance.

We would like to make sure the following considerations are noted and addressed:

1. Both options show a single lane in each direction on Santa Teresa Blvd between the college and the proposed highway 25/101 interchange. Given the large numbers of staff and students who arrive on campus (and leave) at the same time, we question whether one lane will be sufficient in this location. As it stands now, many staff and students approaching the Gavilan College campus from the north use either Mesa Road or Castro Valley Road to exit Hwy 101. When both of these are closed, the students coming from the north (as well as those from San Benito County) will use the Santa Teresa Blvd exit.
2. Large numbers of cars (described above) will be making a left turn from Santa Teresa Blvd onto campus during the morning commute, and a right turn from campus onto Santa Teresa during the afternoon commute. This intersection will be upgraded with a traffic light in the proposal. We ask that consideration be made of adequate space in turn lanes to accommodate the high traffic to and from campus at peak commute times.
3. Access to northbound Santa Teresa Blvd from Southbound 101 must be assured.
4. Access to northbound 101 from southbound Santa Teresa Blvd. must be assured. It does not look as though option 2 provides for this.
5. Signage to Gavilan College from Hwy 25, northbound 101, southbound 101, and Santa Teresa Blvd. should be incorporated for the permanent plan and during construction.
6. It will be important to consider access to and from the campus during construction.

Thank you for your consideration.

Jan Bernstein Chargin
Director, Public Information
Gavilan College
(408) 848-4724



April 29, 2013

Submitted Via E-mail

Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
Attn: Ann Calnan
3331 North First Street - Building B-2
San Jose, California 95134-1927
101_Widening@VTA.org

Subject: U.S. 101 Improvement Project between Monterey Street and State Route 129
Draft Environmental Impact Report (SCH 2007102141)

Dear Ms. Calnan:

Thank you for providing the Monterey Bay Unified Air Pollution Control District (Air District) the opportunity to comment on the above-referenced document. The Air District has reviewed the document and has the following general and specific comments to address the air quality and climate change sections.

General Comments on Section 2.14 Air Quality and Air Quality Report

- The Air Quality DEIR section and the Air Quality Report are outdated and should be updated to reflect current air quality. For example, both documents reference air quality data which is five years out of date. Additionally, the linkage between the Air Quality Report and Section 2.14 Air Quality in the DEIR is unclear. The DEIR should summarize the Air Quality Report so the findings are consistent.
- The air quality aspects of the project should be considered in relation to the District's 2008 California Environmental Quality Act (CEQA) Air Quality Guidelines. Emissions associated with the construction and operational phases of the project should be estimated and compared to the significance thresholds in the document. The guidelines can be accessed at: http://www.mbuapcd.org/mbuapcd/pdf/mbuapcd/pdf/CEQA_full.pdf.
- For CEQA evaluations, project impacts should be evaluated compared to existing conditions. Section 2.14 compares No Build and Build alternatives but does not compare either alternative to existing conditions. Please also confirm what was considered as the year for existing conditions. The year 2005 was reported as the base year in Table 25 while the year 2009 was reported as existing in Table 27.

Specific Comments

The following specific comments address the Summary, Section 2.14 Air Quality, Section 2.15 Climate Change, and Air Quality Report.

Table S-1, Summary of Environmental Impacts, Air Quality on page xii

- Construction of the proposed project could cause or contribute to exceedances of the Californian 24-hour PM10 standard, as well as local nuisance, if appropriate fugitive dust management measures are not implemented. Mitigation measure MM-CON-4 on page xxiv indicates that the project will employ CALTRANS Standard Specifications to reduce construction dust, as well as the BAAQMD dust control measures as listed in Table 37 of the DEIR. Therefore, mitigation measure MM-CON-4 should also be listed under Air Quality and applied to construction of the entire length of the project, including the portion in San Benito County.

2.13 Hazardous Waste/Materials starting on Page 117

- Figure 3 on page 14 shows the San Benito River passing under Highway 101 project near Highway 129. The San Benito River is known to contain elevated levels of naturally occurring asbestos (NOA). Consequently, soil disturbed during construction activity may contain elevated levels of NOA. If elevated levels of NOA are found, then dust suppression measures consistent with ARB Air Toxics Control Measure (ATCM) for asbestos should be applied. The ATCM can be found at: <http://www.arb.ca.gov/toxics/atcm/asb2atcm.htm>.

Section 2.14.1, Regulatory Setting, page 122

- This section focuses on federal requirements, such as, the Federal Clean Air Act and has no mention of the California Clean Air Act of 1988, which drives many California air quality planning activities. This section should be updated to include the California Clean Air Act.
- The regulatory setting section should describe applicable local Air District rules. For example, Section 2.13 Hazardous Waste/Materials, identifies the potential for asbestos-containing materials to be present in buildings to be demolished. If asbestos-containing material is present, the project will be required to comply with the Air District Rule 424 and any demolition will be subject to District Rule 439.

Section 2.14.2, Affected Environment, NCCAB, page 125

- The text should be updated to include a discussion of ozone transport. Studies conducted by the California Air Resources Board indicate that exceedances of the state ozone standard in the North Central Coast Air Basin (NCCAB) are caused primarily by transport from the Bay Area. Although San Benito County only represents approximately nine percent of the population of the NCCAB, the attainment status of the entire region is often linked to conditions in San Benito County.
- The transport impacted ozone monitor at Pinnacles National Park in San Benito County should also be mentioned in the third paragraph. This station is key to the attainment status of the entire NCCAB so activities, such as major highway widening projects, along the upwind corridor can be important. The current state 8-hour ozone standard was exceeded 77 times between 2003 and 2007 at Pinnacles National Park. Also, the text indicates that the new state 8-hour ozone standard was only exceeded once at Hollister in 2006. Actually, the current 8-hour standard was exceeded five times in 2006.

Section 2.14, Impact AQ-1, page 126

- The project’s potential impact to cause or contribute to a violation of an ambient air quality standard does not only apply to CO standards. More importantly, the impact of the project on ozone precursor emissions should also be evaluated. The entire section fails to address the potential impacts of the project to the nonattainment pollutant ozone. Therefore, in order to be more complete, the DEIR should assess project operation emissions in relation to applicable District thresholds, as outlined in the District’s 2008 CEQA Guidelines.
- The impact analysis should also address state particulate matter air quality standards. Re-entrained road dust is a major contributor to PM10 emissions. Therefore, the Air District suggests that the following measures for minimizing re-entrained road dust also be considered whenever feasible:
 - Construct shoulders with a minimum width of eight feet.
 - Construct medians with minimum of four foot wide shoulders.
 - Plant ground cover to paved edge of roadway to stabilize shoulders and reduce fire hazard from dry weeds.
 - Pave or use non-toxic surfactants on unpaved shoulders and turnouts.
 - Plant hedges or shrubs along the Right of Way to reduce offsite migration of “dust devils” caused by large trucks traveling at high speeds.
 - Plant hedges in medians.
 - Promptly remove soil deposits after wind or storm events

Fig 17, Possible Effect of Traffic Operation Strategies in Reducing On-Road CO2 Emissions on Pg. 134

- This figure and the supporting text immediately under it indicate that speeds could increase by as much as 20 to 25 mph to a maximum of 70 mph. Since CO₂, as well as other pollutants such as NO_x increase above 55 mph, excess emissions associated with this change should be estimated and compared to the applicable Air District CEQA significance thresholds.

Section 2.15.4, CEQA Conclusion regarding Climate Change, page 140

- CEQA was amended in 2010, in accordance with SB 97, because California’s lawmakers recognized the need to analyze greenhouse gas emissions as a part of the CEQA process. The CEQA Guidelines were updated to direct lead agencies to analyze the greenhouse gas emissions of proposed projects (see §15064.4) and this analysis is not necessarily restricted to whether the impact would be cumulatively considerable. Other Air Districts have established thresholds indicating GHG emissions ranging from 1,150 to 10,000 metric tons CO₂ per year would result in a significant impact. Table 27 reports the potential annual CO₂ emissions for this project of 133,084 metric tons and the text on page 134 states, “These changes will have an overall negative effect on the GHG emissions generated in the project area, as compared with the No-Build scenario.”

Please explain how a project with annual emissions that far exceed any established Air District threshold and that would have a negative effect on GHG emissions is considered too speculative to make a significance determination.

Air Quality Report, Table 3-1, Air Quality Standards on Page 10

- Table 3 needs to be completely updated. Incorrect standards are reported for many of the pollutants which appears to be due to a table formatting problem. Please refer to the link below to ARB's current standards table for these revisions:
<http://www.arb.ca.gov/research/aaqs/aaqs2.pdf>

Air Quality Report, Air Quality Planning, MBUAPCD on Page 23

- The list of applicable air quality plans at the top of this page should be updated to include the 2012 Triennial Plan Revision to the Air District's Air Quality Management Plan for the California ambient air quality standard for ozone. The plan is available on the Air District's website at: <http://www.mbuapcd.org/programs/planning>.

Air Quality Report, Significance Criteria, MBUAPCD on Page 33

- Please explain why the Air District's significance criteria are listed on page 33 and then not used as part of the impact assessment in Section 5.1. The operational impact assessment should include an evaluation of the nonattainment pollutant ozone by using the ozone precursor emission thresholds (NOx and VOC).

Air Quality Report, Appendix A – Air Quality Monitoring Sites

- Please note, the monitoring stations shown in the figure for Scotts Valley, Davenport, Watsonville and Moss Landing have been closed. A current map of the Air District's monitoring sites can be found on page 10 of the Air District's 2012 Triennial Plan referred to in the previous comment.

Please contact me if you have questions, I can be reached at (831) 647-9418 ext. 227 or aclymo@mbuapcd.org.

Best regards,



Amy Clymo
Supervising Air Quality Planner

cc: Mike Gilroy, Deputy Air Pollution Control Officer



United States Department of the Interior



NATIONAL PARK SERVICE
Pacific West Region
Juan Bautista de Anza National Historic Trail
333 Bush Street, Suite 500
San Francisco, California 94104

IN REPLY REFER TO

April 25, 2013

VTA Environmental Programs/Resources Management Dept.
Attn: Ann Calnan
3331 N. First St., Bldg. B-2
San Jose, CA 95134

RE: US 101 Improvement Project – Monterey St. to State Route 129

Dear Ms. Calnan:

Please accept these comments from the National Park Service (NPS) in response to the Draft Environmental Impact Report (DEIR) for the proposed improvements to US 101 in south Santa Clara and north San Benito counties. The project area falls within the recognized historic corridor of the Juan Bautista de Anza National Historic Trail (Anza Trail), and is also overlaps with segments of the Recreational Retracement Route of Anza Trail.

The Juan Bautista de Anza National Historic Trail commemorates the 1775-76 Spanish expedition of the more than 240 men, women and children who journeyed across the frontier of New Spain to settle Alta California. The Anza Trail connects history, culture and outdoor recreation along a 1,200-mile corridor extending from Nogales, Arizona to the San Francisco Bay Area.

The Anza Trail Comprehensive Management and Use Plan (1996) envisions a continuous recreation trail from Nogales, Arizona to the San Francisco Bay Area. The Santa Clara Countywide Trails Master Plan identifies the planned recreational trail segments within the Santa Clara County. Within the project area, an east-west segment of the Anza Trail is intended to follow the same alignment as the Bay Area Ridge Trail. The north-south spine of the Anza Trail is intended to connect through the project area to an existing trail segment, located on Old Stage Road in San Juan Bautista. Some of these trail alignments are shown in Figures 5 and 6 of the Draft EIR.

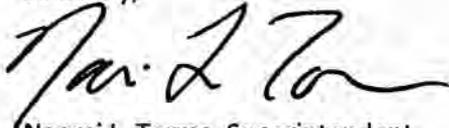
Due to the Anza Trail's planned alignment with the Bay Area Ridge Trail for the east-west connection across the valley, NPS concurs the Bay Area Ridge Trail Council's recommendation that VTA adopt Alternative 2, which includes a multiuse trail connection along Carnadero Creek, under the freeway bridges.

NPS also supports the planned extension of bicycle facilities along Highway 101 where the widening project is planned. Santa Clara County's Trails Master Plan identifies Santa Theresa Boulevard (at the north end of the project area) as the Anza Trail bicycle route. At the southern end of the project boundary, the planned bicycle path to the San Juan Highway would connect with a proposed trail route

to San Juan Bautista State Park and the popular trail segment on Old Stage Road. Draft EIR Figures 5 & 6 also depict the proposed Pajaro River Trail, which is planned to be a multi-use north-south segment of the Anza Trail. We are supportive of the eventual development of the Pajaro River Trail, as it would provide a superior multi-use recreational trail route for pedestrians and equestrians. We are pleased to see that the Highway 101 improvement project incorporates trail undercrossings to accommodate this future trail.

Thank you for your consideration of our comments.

Sincerely,

A handwritten signature in black ink, appearing to read "Naomi L. Torres". The signature is fluid and cursive, with the first name being the most prominent.

Naomi L. Torres, Superintendent
Juan Bautista de Anza National Historic Trail

Cc: Bern Smith, Bay Area Ridge Trail Council
Jane Mark, Santa Clara County Parks and Recreation Department
Janelle Cox, San Benito County Parks and Recreation Commission

April 29, 2013

Member Agencies:

County of Monterey

Ann Calnan
VTA Environmental Programs/
Resources Management
3331 North First Street, Bldg. B-2
San Jose, CA 95134-1927

County of San Benito

County of Santa Clara

County of Santa Cruz

Dear Ms. Calnan:

Monterey County Water
Resources Agency

On behalf of the Pajaro River Watershed Flood Prevention Authority (Authority), I am pleased to submit this comment letter on the Draft Environmental Impact Report (EIR) for the proposed US 101 Improvement Project. Unfortunately, the EIR notification was addressed to retired Authority Executive Directors and this comment letter is based only on a cursory review of the document, given the time available. A more thorough review of the Draft EIR and Appendix B Hydrology and Water Quality Environmental Impact Analysis may result in additional comments to be submitted for your consideration.

San Benito County
Water District

Santa Clara Valley
Water District

Santa Cruz County Zone
7 Flood Control District

Comment No. 1 Summary Page iii – Coordination with Public and Other Agencies

In addition to the notable issues listed that require focused input from public and other agencies, please add the significant flooding issues along the Lower Pajaro River that are affected by floodplain impacts in the upper watershed, including the loss of floodplain storage. Please also list the Authority as an agency that requires focused coordination.

The Authority was established in July 2000 by State Assembly Bill 807 in order to “identify, evaluate, fund, and implement flood prevention and control strategies in the Pajaro River Watershed, on an intergovernmental basis.” The watershed covers areas of four counties and four water districts and the board is comprised of one representative from each:

- County of Monterey / Monterey County Water Resources Agency
- County of San Benito / San Benito County Water District
- County of Santa Clara / Santa Clara Valley Water District
- County of Santa Cruz / Santa Cruz County Flood Control and Water Conservation District, Zone 7

The Authority is implementing the Soap Lake Floodplain Preservation Project (Soap Lake Project) to build upon the Pajaro River Risk Reduction Project being developed by the U.S. Army Corps of Engineers (Corps) on the Lower Pajaro River. Soap Lake is a floodplain within the watershed that has been found to be an extremely important flood protection feature. It acts like a natural detention basin, storing water and reducing peak flows that would otherwise increase flooding in the lower Pajaro River in the Watsonville area.

The Soap Lake Project does not involve building any structural facilities, but instead would include financially supporting the purchase of land or flood easements for the land within the Soap Lake floodplain. The objective is to maintain the current flood protection benefits provided by the Soap Lake floodplain by protecting the area from changes that would impact the flood protection properties of the floodplain.

The purchase of land or floodplain easements would restrict development and preserve agriculture and open space in the approximately 9,000 acre floodplain with the goal of preserving the floodplain attenuation benefits. Several conservation easements have already been obtained within the Soap Lake project area totaling over 1,000 acres and funding has been secured for another 1,200 acres.

The Soap Lake Project would maintain the current hydrologic and hydraulic conditions at the project site and adjacent properties. The floodplain limits would not be changed. This Project is an outcome of the Authority's Watershed Study, which investigated the Pajaro River Watershed land-use plans, existing and planned flood protection infrastructure, and alternative strategies to assure effective coordination of the former. The Soap Lake Project was selected as the preferred alternative, and the Watershed Study's Technical Appendices, and HECRAS Model provide details regarding the Project's flood attenuate functionality and performance. This Watershed Study is available via the Authority's link <http://www.pajaroriverwatershed.org/>.

Comment No. 2 Summary Page x - Impact HYDRO-6 and Section 2.9.2.5 – Impacts to the Pajaro River Floodplain

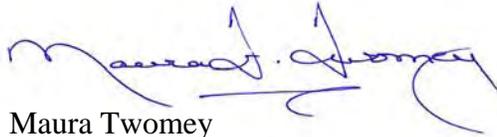
The US 101 Improvement Project will include replacement of the existing U.S. 101 bridge over the Pajaro River. Betabel Road will also be extended and will include a new 3-span bridge over the Pajaro River. The new bridges will fill approximately 20.5 acre-feet of the floodplain of the river. For the Pajaro River, the proposed condition will raise the floodplain by 0.1 feet between the Betabel Road bridge and the U.S. 101 bridge. The water surface elevation increase upstream of the U.S. 101 bridge will be less than 0.1feet. These floodplain and water surface impacts within the 100-year floodplain of the Pajaro River are designated as less than significant and no mitigation measures are proposed.

Given the high flood risks along the Lower Pajaro River, any loss of floodplain storage or increase in water surface elevations should be considered significant and should require mitigation. Flooding throughout the reaches of the Lower Pajaro River is a hazard to public and private property including residences, agriculture, highways, watercourses, and environmental resources. Flooding has been recorded in 1955, 1982, 1986, 1995, 1997 and 1998 causing millions of dollars in damage. The flood event of February 1998 produced the highest flows ever recorded on the Pajaro River at the U.S. Geological Survey gage at Chittenden. These high flows resulted in overtopping and a subsequent levee break downstream of Highway 1 on the Santa Cruz side of the river (Santa Cruz County 1998).

The Pajaro River Risk Reduction Project currently being developed by the U.S. Army Corps of Engineers (Corps) on the Lower Pajaro River assumes a functioning Soap Lake floodplain as part of the baseline condition. Thus, the purpose of the Authority's project is to protect the Soap Lake floodplain so as not to exacerbate flooding downstream and any loss of floodplain storage is considered significant and requiring mitigation.

Thank you for your consideration.

Sincerely,



Maura Twomey
Executive Coordinator
PRWFPA

Central Coast Regional Water Quality Control Board

April 29, 2013

Ann Calnan
Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Department
3331 North First Street, Building B-2
San Jose, CA 65134-1927
Email: ann.calnan@vta.org

BY ELECTRONIC MAIL

Dear Ms. Calnan:

CENTRAL COAST WATER BOARD COMMENTS ON THE MARCH 2013 DRAFT ENVIRONMENTAL IMPACT REPORT FOR THE U.S. 101 IMPROVEMENT PROJECT BETWEEN MONTEREY STREET AND STATE ROUTE 129, SANTA CLARA AND SAN BENITO COUNTIES, FILE NO. 430313CQ1

Thank you for the opportunity to review the Draft Environmental Impact Report (DEIR) for the above-referenced project. The Central Coast Regional Water Quality Control Board (Central Coast Water Board) is a responsible agency under the California Environmental Quality Act (CEQA). Central Coast Water Board staff understands that the proposed U.S. Highway 101 Improvement Project between Monterey Street and State Route 129 (Project) includes the following elements:

- Widen U.S. 101 from four lanes to six lanes between the Monterey Street interchange in Gilroy and the S.R. 129 interchange in San Benito County (approximately 7.6 miles);
- Upgrade U.S. 101 to a freeway within the same bounds by removing connections to surface streets and adjacent properties;
- Reconstruct the U.S. 101/S.R. 25 interchange, either at the current location or 0.2 mile further north;
- Construct an additional auxiliary lane in each direction on U.S. 101 between the Monterey Street and S.R. 25 interchanges;
- Extend Santa Teresa Boulevard approximately 0.5 miles from Castro Valley Road to the new U.S. 101/S.R. 25 interchange;
- Construct new frontage roads to replace existing connections to surface streets and adjacent properties;
- Grade-separate the Union Pacific Railroad crossing on S.R. 25 west of Bloomfield Avenue;
- Construct bicycle facilities, as needed, to replace access lost due to upgrading U.S. 101 to a freeway; and
- Construct new or widened crossings over Uvas Creek, Tick Creek, Tar Creek, Gavilan Creek, Pajaro River, San Benito River, and numerous unnamed streams, drainage features, and other waters of the State.

This project has the potential to impact water quality and beneficial uses of waters of the State. Therefore Central Coast Water Board staff offers the following recommendations for improving the environmental value and environmental review of the Project.

- 1) Design Option B. Central Coast Water Board staff recommends that the Santa Clara Valley Transportation Authority (SCVTA) select Design Option B, since it appears to result in fewer environmental impacts than Design Option A. Design Option A involves two additional crossings of natural drainage features/swales which can be avoided through implementation of Design Option B.
- 2) Riparian Impacts. The Project will result in permanent loss of eight acres of riparian habitat, temporary impacts to seven acres of riparian habitat, and impacts to 890 linear feet of shaded riverine aquatic (SRA) habitat. This impact will occur in two rivers (Pajaro and San Benito), four named creeks (Uvas, Gavilan, Tick, and Tar), and numerous unnamed streams, drainage features, and other waters of the State. There is likely to be variation in the type, robustness, and environmental value of habitat in these various waterbodies. Therefore the final EIR should contain a more comprehensive and differentiated analysis of impacts to riparian habitat. This information is necessary to evaluate the adequacy of avoidance and mitigation measures.
- 3) Mitigation for Riparian Impacts. The DEIR proposes to mitigate for impacts to riparian habitat through payment of development fees to the Santa Clara Valley Habitat Conservation/Natural Communities Conservation Plan (HCP/NCCP). However, the HCP/NCCP was not established to provide mitigation for impacts to riparian habitat and has not been approved by the Central Coast Water Board for this purpose. Therefore MM-NATCOM-1.1 will not mitigate for the Project's riparian impacts. As a second option, the DEIR proposes to mitigate for Project impacts to riparian habitat by creating/restoring riparian habitat. However, the DEIR does not provide sufficient information to demonstrate that appropriate mitigation areas will be available. Therefore the DEIR fails to provide mitigation for this significant impact, and the statement in the DEIR that Impact NATCOM-1 has been reduced to less than significant is unsupported. The final EIR must provide for adequate and feasible mitigation for all Project impacts.
- 4) Wetland Impacts. The Project will result in permanent loss of 3.2 acres of wetlands and aquatic habitat, and temporary impacts to as much as 1.5 acres of wetlands and aquatic habitat. The final EIR should include a more comprehensive and differentiated analysis of wetland impacts, including identification and delineation of each wetland area, and a description of type (including vegetation), robustness, and environmental value of the habitat in each wetland area. This information is necessary to evaluate the adequacy of avoidance and mitigation measures.
- 5) Wetland Mitigation. The DEIR proposes to mitigate for impacts to wetlands and aquatic habitat through payment of development fees to the Santa Clara Valley Habitat Conservation/Natural Communities Conservation Plan (HCP/NCCP). However, the HCP/NCCP was not established to provide mitigation for impacts to wetlands and aquatic habitat and has not been approved by the Central Coast Water Board for this purpose. Therefore MM-WET-1.1 will not mitigate for the Project's wetlands and aquatic habitat impacts. As a second option, the DEIR proposes to mitigate for Project impacts to wetlands and aquatic habitat by purchasing credits from the Pajaro Wetland Mitigation Bank or by creating/restoring wetlands. However, the DEIR does not provide sufficient information to demonstrate that appropriate mitigation areas will be available. Therefore the DEIR fails to

provide mitigation for this significant impact, and the statement in the DEIR that Impact WET-1 has been reduced to less than significant is unsupported. The final EIR must provide for adequate and feasible mitigation for all Project impacts.

- 6) Mitigation for Temporary Wetland Impacts. The DEIR proposes to mitigate for temporary impacts to wetlands through the restoration of pre-construction grades, hydrology, and soil conditions, but proposes to let wetland vegetation structure, and function regenerate without further human intervention. This is not adequate to ensure mitigation of these significant impacts to less than significant levels. Temporarily impacted areas must be fully restored, including revegetation, and monitored over time to ensure that mitigation efforts result in wetlands that replace lost habitat functions and benefits. The final EIR must provide complete mitigation for all Project impacts.
- 7) Floodplain Basin. Mitigation measure MM-HYDRO-1.3 describes construction of a 120-acre-foot basin to mitigate for lost floodplain volume resulting from the Project. The DEIR proposes placing the basin in agricultural fields northeast of the existing U.S. 101/S.R. 25 interchange. However, this location is isolated from the creeks and rivers flowing through the project site. What process and criteria were used to select the location for the floodplain basin? Central Coast Water Board staff recommends locating the basin in land adjacent to Uvas Creek to provide connectivity between creek and floodplain. In addition, Central Coast Water Board staff recommends that the basin be designed and vegetated in a manner that provides full-fledged floodplain habitat, and that it be protected as such through a permanent conservation easement. In any event, please provide information in the final EIR describing how this basin will be designed, revegetated, and used.
- 8) Stormwater Quality Treatment. The DEIR proposes to create 34.2 acres of biofiltration strips and swales to mitigate for stormwater quality impacts resulting from increased impervious surfaces. However, it is not clear that this amount adequately mitigates for runoff volume, rate, and quality conditions caused by the Project. Therefore it is not possible to determine whether the DEIR provides sufficient mitigation to support the statement in Impact WQ-1 that Project stormwater quality impacts have been reduced to a less than significant level.

If we may clarify any of our comments or be of further assistance, please contact **Jon Rohrbough** at (805) 549-3458, or via email at jrohrbough@waterboards.ca.gov, or Phil Hammer at (805) 549-3882.

Sincerely,

for
Kenneth A. Harris, Jr.
Interim Executive Officer



April 18, 2013

Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
Attn: Ann Calnan
3331 North First Street - Building B-2
San Jose, CA 95134-1927

RE: Comments on the US 101 Improvement Project Environmental Impact Report

Dear Ms. Calnan:

The Council of San Benito County Governments submits this letter for comment on the draft Environmental Impact Report for the US 101 Improvement Project between Monterey Street and State Route 129.

The Council of Governments would like to extend its support for the US 101 Improvement Project especially the new interchange connection at US 101 and SR 25. This new interchange is a critical safety improvement for thousands of motorists who commute between Hollister and San Benito County and Santa Clara County, whether for work, recreation, or school. The extension of Santa Teresa Boulevard will be a benefit to Gavilan College students who drive or ride the bus to school. This new Santa Teresa Boulevard connection will cut travel time and improve safety.

The Council of Governments is committed to preserving agriculture and the rural and historic character of San Benito County. Given this commitment, the Council of Governments recommends that the project preserve agricultural lands by requiring agricultural mitigation easements to occur within the general vicinity of the project site.

The Council of Governments also supports the State Route 152 project and recommends that Design Option B accommodate the future connection of State Route 152.

The Council of Governments supports Design Option B because the impact to prime and unique farmland is less than with Design Option A.

Thank you for the opportunity to comment on the US 101 Improvement Project. If you have any questions, please contact Lisa Rheinheimer, Executive Director, at (831) 637-7665.

Sincerely,

Anthony Botelho
Chair

cc: Tim Gubbins, Caltrans District 5

County of Santa Clara

Department of Planning and Development
Planning Office

County Government Center, East Wing, 7th Floor
70 West Hedding Street
San Jose, California 95110-1705
(408) 299-5770 FAX (408) 288-9198
www.sccplanning.org



April 29, 2013

Ms. Ann Calnan
Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
3331 N. First Street, Building B-2
San Jose, CA 95134-1927

**RE: Comments regarding Draft Environmental Impact Report (DEIR) for US 101
Improvement Project Between Monterey Street and State Route 129**

Dear Ms. Calnan:

Please find enclosed comments from the County regarding the Draft Environmental Impact Report (DEIR) for the US 101 Improvement Project Between Monterey Street and State Route 129. These include comments from Planning, Land Development Engineering, Roads and Airports, and Parks & Recreation Dept.

The attached comments include concerns the County has regarding agricultural/Williamson Act, historical, floodplain, traffic, and recreational trails.

If you have any questions regarding coordination of comments on the DEIR from the County, please contact Priya Cherukuru, Historical Heritage Coordinator at (408) 299-5787, Sylvia Ornelas Wise, Williamson Act Program Manager at (408) 299-5759, Chris Freitas at (408) 299-5732, in Land Development Engineering, Dawn Cameron at (408) 573-2465, in Roads & Airports Dept. and Elish Ryan at (408) 355-2236 in Parks & Recreation Dept.

We look forward to reviewing the Final Environmental Impact Report (FEIR), and working with the VTA during the design phase of the project.

Sincerely,

A handwritten signature in black ink, appearing to read "Ignacio Gonzalez", is written over a horizontal line.

Ignacio Gonzalez
Director of Planning and Development

cc:

Rob Eastwood, Priya Cherukuru, Sylvia Ornelas-Wise – Planning
Chris Freitas, Darrell Wong – Land Development Engineering
Dawn Cameron – Roads & Airports Dept.
Elish Ryan, Jane Mark – Parks & Recreation Dept.
Roland Velasco, Mike Wasserman - Board of Supervisors District 1
Sylvia Gallegos – Deputy County Executive, County Executive Office

County of Santa Clara

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www.sccplanning.org



April 25, 2013

Ann Calnan
Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
3331 N. First Street, Building B-2
San Jose, CA 95134-1927

**RE: Comments regarding Draft Environmental Impact Report (DEIR) for US 101
Improvement Project Between Monterey Street and State Route 129**

Dear Ms. Calnan:

Thank you for the opportunity to comment on the Draft Environmental Impact Report (DEIR) for US 101 Improvement Project Between Monterey Street and State Route 129. The County Planning Office has comments related to environmental impacts associated historical resources, and agricultural/Williamson Act impacts as detailed below.

**Please contact Priya Cherukuru, Historical Heritage Coordinator at (408) 299-5787,
Priya.Cherukuru@pln.sccgov.org regarding the following:**

The following are comments from County Planning Department for review of Historic Resources- **Cultural Resources Section (2.8)** in the Draft EIR and the related Technical Report - *Cultural Resources (Attachment B) Historic Resources Evaluation Report (Webb and Wee 2010)*:

2.8 : Cultural Resources

Issue 1:

Section 2.8.1: Regulatory Setting

Under the Regulatory Setting in Page 89, the DEIR does not include adequate language addressing all applicable federal, state and local laws and ordinances that apply for this project.

Federal

The National Historic Preservation Act of 1966, as amended, (NHPA) sets the national policy and procedures regarding historic properties, defined as districts, sites, buildings, structures, and objects included in or eligible for the National Register of Historic Places.

In addition, properties eligible to the National Register are also subject to Section 106 of NHPA and Section 4(f) of the U.S. Department of Transportation Act.

State

Include all applicable state laws that govern the project for review of impacts to historic resources.

Local

The Santa Clara County General Plan and Historic Preservation Ordinance (Division C17) would apply for properties in unincorporated Santa Clara County as stated below:

Santa Clara County General Plan

The following County General Plan Heritage Resource Policies (1994) are applicable to the proposed project:

- R-RC 81** Cultural heritage resources within the rural unincorporated areas of Santa Clara County should be preserved, restored wherever possible, and commemorated as appropriate for their scientific, cultural, historic, and place values.
- R-RC 85** The following strategies should provide overall direction to efforts to preserve heritage resources
1. Inventory and evaluate heritage resources.
 2. Prevent, or minimize, adverse impacts on heritage resources.
 3. Restore, enhance, and commemorate resources as appropriate.
- R-RC 85** No heritage resource shall knowingly be allowed to be destroyed or lost through a discretionary action (zoning, subdivision, site approval, grading permit, building permit, etc.) of the County of Santa Clara unless:
- a. The site or resources has been reviewed by experts and the County Historic Heritage Commission and has been found to be of insignificant value; or
 - b. There is an overriding public benefit from the project and compensating mitigation to offset the loss is made part of the project.
- R-RC 86** Projects in areas found to have heritage resources shall be conditioned and designed to avoid loss or degradation of the resources. Where conflict with the resource is unavoidable mitigation measures that offset the impact may be imposed.
- R-RC 87** Land divisions in areas with heritage resources shall be encouraged to cluster building sites in locations, which will minimize the impacts to heritage resources.
- R-RC 88** For projects receiving environmental assessment, expert opinions and field reconnaissance may be required if needed at the applicant's expense to determine the presence, extent and condition of suspected heritage resources and the likely impact of the project upon the resources.

Santa Clara County Historic Preservation Ordinance

Santa Clara County established a Historic Preservation Ordinance (Division C17) on October 17, 2006. The ordinance was established for the preservation, protection, enhancement, and perpetuation of resources of architectural, historical, and cultural merit within Santa Clara County and to benefit the social and cultural enrichment, and general welfare of the people.

Issue 2:

Identifying Historic Resources: Discrepancy / Difference between Public Resources Code (5024.1) and Office of Historic Preservation Listed Criteria.

The DEIR does not clearly state the criteria that identify potential historic resources as required under CEQA.

There is a slight difference or discrepancy between the CEQA historic resource criteria cited in Public Resources Code 5024.1 and the designation criteria for the California Register of Historical Resources posted on the web site for the Office of Historic Preservation.

Public Resources Code (PRC) 5024.1(c) cites the criteria as needing to meet the criteria for the National Register of Historic Places, but refers that significance level to California. In addition,

PRC 5024.1: (j) states "Historical resource" includes, but is not limited to, any object, building, structure, site, area, place, record, or manuscript which is historically or archaeologically significant, or is significant in the architectural, engineering, scientific, economic agricultural, educational, social, political, military, or cultural annals of California.

The California Register criteria (under Office of Historic Preservation), is much more inclusive and considers a resource to be a historic resource if it meets at least one of the criteria listed below:

Criterion 1 - Associated with events that have made a significant contribution to the broad patterns of local or regional history or the cultural heritage of California or the United States

Criterion 2 - Associated with the lives of persons important to local, California or national history

Criterion 3 - Embodies the distinctive characteristics of a type, period, region or method of construction or represents the work of a master or possesses high artistic values

Criterion 4 - Has yielded or has the potential to yield information important to the prehistory or history of the local area, California or the nation.

Include appropriate language for the Criteria for identifying historic resources as relevant for the project under CEQA.

Issue 3:

Section 2.8.2.3 Historical Resources (Page 91)

The Draft EIR does not include evaluation of impacts to the historic **Castro Valley Ranch/ Calhoun Ranch (SCL 112)** located at 4355 Monterey Road (APN 810-35-008), a resource listed in the Santa Clara County Heritage Resource Inventory.

Under PRC 5024.1 (k): "Local register of historic resources" means a list of properties officially designated or recognized as historically significant by a local government pursuant to a local ordinance or resolution.

Calhoun Ranch is a locally significant historic resource listed in the County Heritage Resource Inventory. Include evaluation and adequate mitigation as applicable for the property.

Issue 4:

Review of the Technical Report- Cultural Resources (Attachment B) Historic Resources Evaluation report (Webb and Wee 2010)

The following are comments/ concerns related to the Historic Resource Evaluation Reports prepared by JRP and Webb and Wee (dated March 2010).

Comment 1: The remark under footnote on Page 7 of the report states:

9 Dana Peak, Historic Preservation Program Manager, Santa Clara County, personal communication with Tony Webb, July 2007 and December 11, 2009. Santa Clara County recently adopted a historic preservation ordinance in 2006 that provides for landmark designation as well as a listing of potential or known historic resources (Heritage Resources Inventory). The county is currently in the process of updating (by re-evaluating those resources listed in) the Heritage Resource Inventory and will, at later day, adopt this updated inventory. **To date, the Miller Cemetery and Calhoun Ranch, are not officially designated county landmarks, and therefore have no standing as historical resources in terms of CEQA.**

This statement is incorrect. A historic resource does not have to be designated as a Landmark for consideration under CEQA. As stated under CERES:

“ .. resources which are listed in a local historic register or deemed significant in a historical resource survey as provided under Section 5024.1(g) are to be presumed historically or culturally significant unless "the preponderance of evidence" demonstrates they are not. The next step is to consult the pertinent existing local register and survey. Because a local register or survey may not employ the same criteria as the California Register, listing or identification in a local survey does not necessarily establish if the property is eligible for listing on the Register. The Lead Agency will need to evaluate the resource in light of the Register's listing criteria (these will be included in guidelines expected to be released by SHPO in June 1994). The Lead Agency may determine that the preponderance of evidence demonstrates that the property in question is not historically or culturally significant despite being listed on a local register or identified in a local historic survey. When making this determination, OPR strongly recommends that the agency cite for the record the specific, concrete evidence which supports that determination.”

“Third, a resource that is not listed in, or determined to be eligible for listing in, the California Register of Historic Resources, not included in a local register of historic resources, or not deemed significant in a historical resource survey may nonetheless be historically significant, pursuant to Section 21084.1.”

Hence Calhoun Ranch and Miller Cemetery should be considered historic resources and evaluated for impacts under CEQA per PRC Code 5024.1.

Technical Report - DPR 523 Series

1. SPRR – Watsonville Branch (Railroad 2) (Page 2 of 6)

The DPR for the **Southern Pacific Railroad (Railroad2)** included the following under Evaluation of Significance (Page 2 of 6).

The Coast Line of the Southern Pacific Railroad (SPRR) is one of the major railroad trunk lines in California and was important in opening many areas of the coast counties between San Francisco and Los Angeles to settlement; it was also instrumental in the founding of many new towns and in the economic development of industries relying upon shipping goods and products to distant markets. The economy of Gilroy, for example, with its agricultural food products, the mainstay of its economy, relied upon the branch to export its products to distant markets at a time when the area was hampered by the lack of good roads or navigable rivers for commercial transportation (Criterion A).

This seems to conclude that the Railroad was significant under Criterion A (Events). But the Historic Resource Evaluation report and the DEIR do not address or include its evaluation as a historic resource.

A structure would be considered significant if it meets any one of the criteria listed under the Office of Historic Preservation.

Criterion 1 - Associated with events that have made a significant contribution to the broad patterns of local or regional history or the cultural heritage of California or the United States.

The DEIR does not address this as a potential historic resource and does not evaluate impacts under CEQA.

2. Pacific Gas and Electric Transmission Towers: (DPR 523 – Page 2 of 5)

The DPR for Pacific Gas & Electric Transmission Towers & Sargent Substation

“The transmission line (and towers) do appear to meet the criteria for listing in the National Register of Historic Places (NRHP) or the California Register of Historical Resources (CRHR), nor do they appear to be a historical resource for the purposes of CEQA.”

This is probably a typo? Correct as necessary.

Issue 5:

Evaluation of Impacts and Mitigation Measures:

The DEIR needs to provide clarification and addition documentation regarding the following:

Under Table S-1: *Summary of Environment Impacts and Avoidance, Minimization and/or Mitigation Measures*: (Page viii)

Impact CUL -2: Bloomfield Ranch:

A project eligible to the National Register is subject to Section 4(f). No mitigation has been provided to protect the resources during construction related activities. Although the report addresses that a 25 feet buffer zone is provided from the access road improvement, it is not included as a mitigation measure.

Adoption of a Transportation Management Plan (TMP) during construction activities around Bloomfield Ranch that addresses construction impacts may be a possible mitigation.

Include SPRR – Watsonville Branch (Railroad 2)

Evaluation of the Southern Pacific Railroad (Railroad 2) indicates the structure to be a historic resource significant under Criterion A/1 (Events) and eligible to the California Register.

The DEIR does not evaluate nor provide mitigations for impacts to the resource.

Include Calhoun Ranch/Castro Valley Ranch

Castro Valley Ranch/ Calhoun Ranch (SCL 112) located at 4355 Monterey Road (APN 810-35-008) is a resource listed in the Santa Clara County Heritage Resource Inventory.

The DEIR does not evaluate nor provide mitigation measures for impacts to the resource.

Please contact Sylvia Ornelas-Wise, Williamson Act Program Manager at (408) 299-5759, Sylvia.Ornelas-Wise@pln.sccgov.org regarding the following:

Land Conservation (Williamson Act) contracted land and land under an Agricultural Preserve

Any public agency (as defined by Gov. Code §51291, subd. (a)) considering locating a public improvement on land restricted by a Land Conservation (Williamson Act) contract or land within an agricultural preserve is required to notify the Director of the Department of Conservation, of its intentions (Gov. Code §51291, subd.(b)). In addition, termination of a Williamson Act contract for a public improvement by acquisition can only be accomplished by a public agency which has the power of eminent domain. The State Department of Conservation must be notified in advance of any proposed public acquisition (Government Code §51290 - 51292), and specific findings must be made. This notification shall be submitted separately from the CEQA process and CEQA documentation. It would be advised that VTA contact the Department of Conservation directly and speak to Jacquelyn Ramsey at (916) 323-2379 for technical assistance. She can also be reached via email at Jacquelyn.Ramsey@conservation.ca.gov.

The Santa Clara County Planning Office has identified several parcels in both option A and option B either restricted by a Williamson Act contract or under an Agricultural Preserve. As you can see in the enclosed map under Option A, 41 parcels are under the Santa Clara County Agricultural Preserve and six (6) parcels are under a Williamson Act contract and within an agricultural preserve. Under Option B, the map identifies 40 parcels under an Agricultural Preserve and 4 parcels restricted by a Williamson Act Contract and within an Agricultural Preserve. We have attached the two maps to assist VTA identify all the parcels subject to the State Department of Conservation noticing requirements for public acquisition. All Williamson Act restricted parcels and parcels under an Agricultural Preserve identified in the Draft EIR are subject to Williamson State Law noticing requirements.

Enclosed are detailed noticing requirements along with instructions. Although the project may not be constructed in the near future, once Williamson Act restricted parcels or parcels within an Agricultural Preserve have been identified as part of the scope of work they are subject to the Williamson Act public acquisition notification process as described in the enclosed Land Conservation (Williamson) Act Public Acquisition Notification Process.

Please contact the State Department of Conservation for further assistance on this matter.

Additional Recommended Agricultural Mitigations:

In addition to the proposed Agricultural Mitigation measures in the Draft EIR the County would highly recommend VTA follow the LAFCO adopted agricultural mitigation policies that best address local concerns to protect and preserve agricultural land. Please see the enclosed LAFCO "Agricultural Mitigation Policies." Due to the net loss of prime farmland we would recommend the purchase of agricultural conservation easements be located within Santa Clara County within the Sphere of Influence of a local City. Prime farmlands are generally located on the valley floor within the Sphere of Influence of local Cities. This in turn will help preserve the remaining prime agricultural land within Santa Clara County while preventing urban sprawl.

Other innovative forms of agricultural mitigations can also be incorporated into the EIR. For example, given the rich agricultural heritage and legacy of the Santa Clara Valley, public art work such as engraved cement work depicting agricultural symbols such as garlic, row crops, cherry orchards or slogans such as the Valley of Hearts Delight can face traffic along the freeway overpasses or onramps. This would be a unique form of preserving the rich agricultural history in the area given the significant and unavoidable loss of prime farmland caused by the proposed project.

If you have any questions of the comments, please contact Priya Cherukuru and/or Sylvia Ornelas-Wise; contact information provided above. The Planning Office would appreciate notification of the Final Environmental Impact Report to review when it is available.

Sincerely,

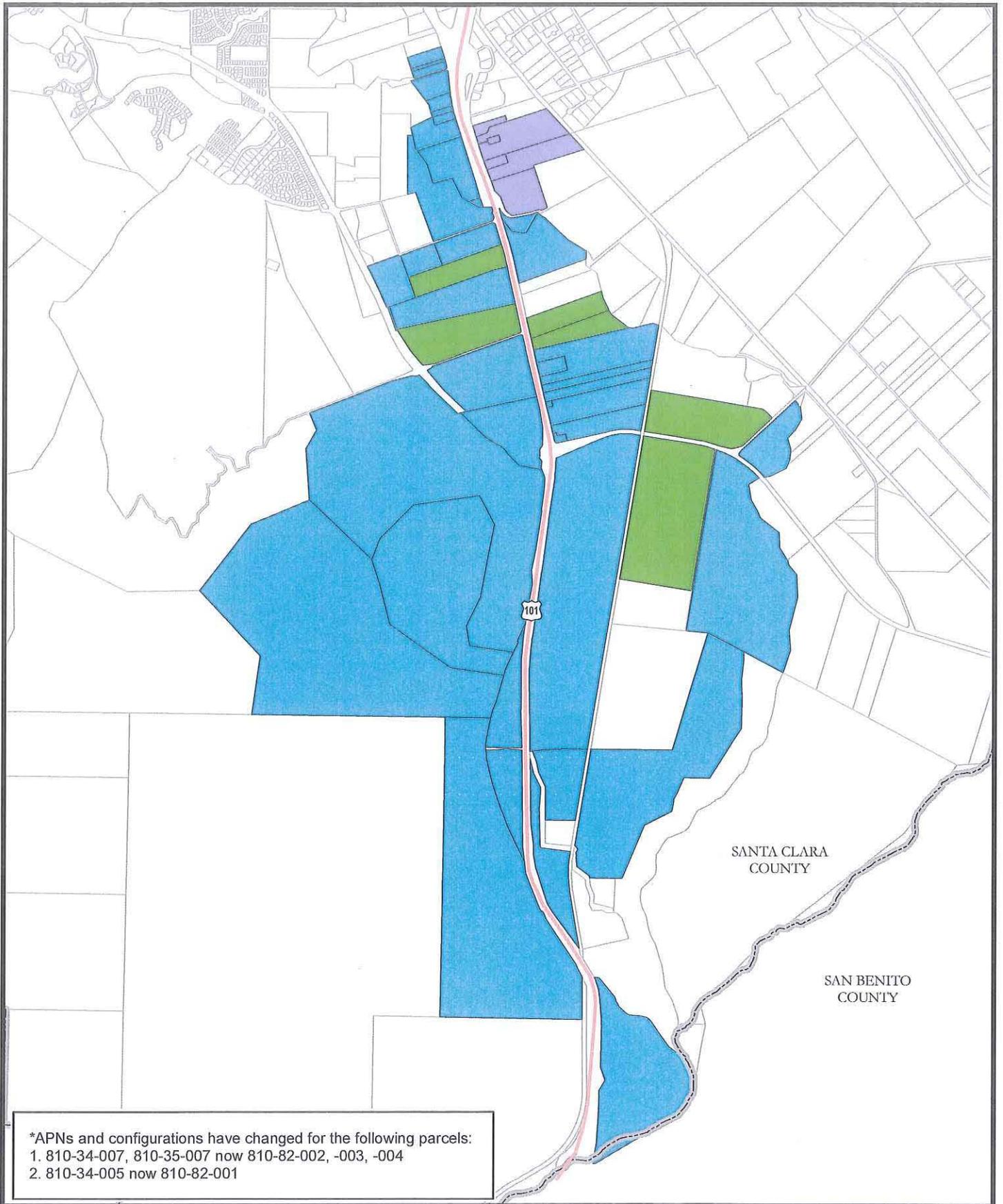


Rob Eastwood
Principal Planner, AICP

cc: Planning - Priya Cherukuru, Sylvia Ornelas-Wise
LAFCO – Dunia Noel, Neelima Palacherla
Dept. of Conservation – Jacquelyn Ramsey

Enclosures:

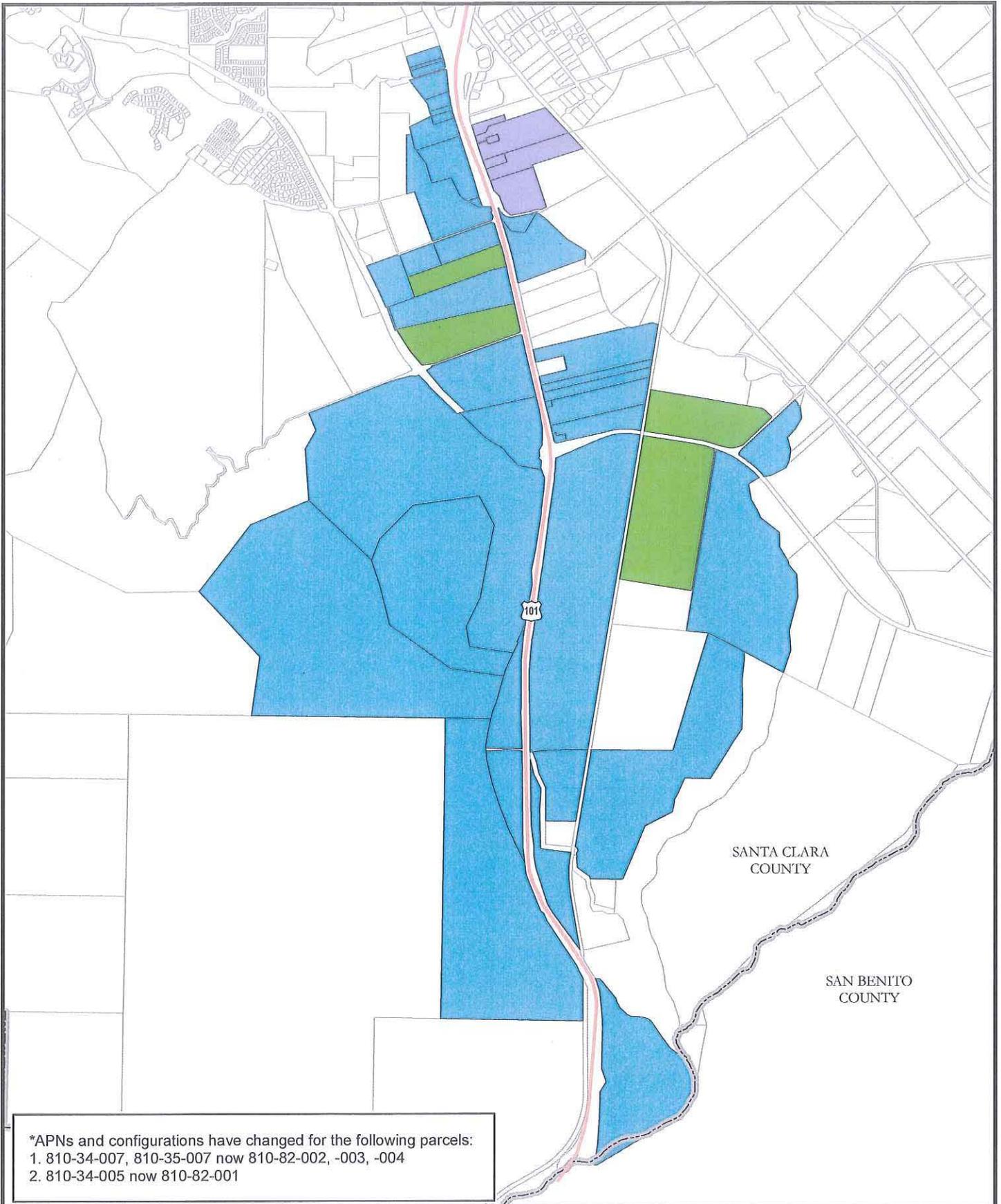
- Williamson Act Contract/Agricultural Preserve Maps
- State Dept. of Conservation Williamson Act Public Acquisition Notification process and notification packet guidelines
- LAFCO Agricultural Mitigation Policies



*APNs and configurations have changed for the following parcels:
 1. 810-34-007, 810-35-007 now 810-82-002, -003, -004
 2. 810-34-005 now 810-82-001

Parcels Under Williamson Act Contract/Agricultural Preserve in Santa Clara County Impacted by U.S. 101 Improvement Project, Option A

Agricultural Preserve (41 parcels)
 Ag. Preserve/Williamson Act (6 parcels)
 Neither (6 parcels)



Parcels Under Williamson Act Contract/Agricultural Preserve in Santa Clara County Impacted by U.S. 101 Improvement Project, Option B

■ Agricultural Preserve (40 parcels)
 ■ Ag. Preserve/Williamson Act (4 parcels)
 ■ Neither (6 parcels)

4/10/2013

Sylvia

LAND CONSERVATION (WILLIAMSON) ACT PUBLIC ACQUISITION NOTIFICATION PROCESS

The following is information about public acquisition and the notification process for public acquisition of land located in an Agricultural Preserve and/or under Land Conservation (Williamson) Act contract:

What is Public Acquisition?

- A public acquisition is the acquisition of land located in an "agricultural preserve" by a "public agency" or "person", acting on behalf of a public agency, (Government Code section 51291, subd. (a)) for a "public improvement" as defined by Government Code section 51290.5 (which includes interests in real property).

When is Notice Required?

- Public Acquisition Notice is required whenever it appears that land within an agricultural preserve may be required by a public agency, or by a person (acting on behalf of a public agency) for a public use. The public agency or person shall advise the Director of Conservation and the local governing body responsible for the administration of the agricultural preserve of its intention to consider the location of a public improvement within the preserve (Government Code section 51291(b)), or on property restricted by a Williamson Act contract.

What is not Public Acquisition Notice?

- Public Acquisition Notice must be provided separately from CEQA environmental notice. CEQA Notice does not equal Williamson PA Notice.

What are the Legal Requirements for Notice?

- The requirement to notice occurs three times in Williamson Act statute.

FIRST NOTICE: A Public Agency must notify (1) the Director of the Department of Conservation and (2) the local jurisdiction (city/county) administering the agricultural preserve (City/County) when the Public Agency has the intention to acquire land in an agricultural preserve or on property restricted by Williamson Act contract for a public purpose (Government Code section 51291(b)).

The **First Notice** prior to acquisition should include the following information:

1. The public agency's explanation of [its] preliminary considerations of the findings of Government Code section 51292 (a) and (b);
 2. A description of the agricultural preserve land or the property restricted by a Williamson Act contract the public agency intends to acquire for the public improvement;
 3. A copy of any Williamson Act contract that pertains to the subject land (Government Code section 51291(b)).
- The Department must be notified in advance of any proposed public acquisition (Government Code sections 51290-51295), and specific findings must be made by the public agency.

**LAND CONSERVATION (WILLIAMSON) ACT PUBLIC ACQUISITION NOTIFICATION
PROCESS (Continued)**

- The public agency **must** consider the Department of Conservation's comments prior to taking action on the acquisition.
- The Public Agency **must** acquire the property via eminent domain or in lieu of eminent domain in order to void the contract (Government Code section 51295). The Public Agency is required to provide evidence that the acquisition actually occurred via eminent domain or in lieu of eminent domain (e.g., documents such as copies of condemnation orders or a copy of the offer letter made to the landowner to purchase the land in lieu of eminent domain to complete the administrative record).

SECOND NOTICE:

A **Second Notice** is required within 10 working days after acquisition (escrow has closed), (Government Code Section 51291 (c)). The **Notice** shall include the following:

1. The notice shall include a general explanation of the decision and the findings made pursuant to section 51292.
2. A general description, in text or by diagram, of the agricultural preserve land acquired (a vicinity map is good); and
3. A copy of any applicable Williamson Act contract(s).

Note: If the information and documents, noted above, were provided to the Department in the original notification then the **Second Notice** need only list the documents previously provided and reference the date of the Public Agency's original letter to the Department, unless the Department requests resubmission of the documentation in its comment response letter.

THIRD NOTICE (if necessitated):

- If there is a significant change in the public improvement, the Public Agency must provide **Notice** to the Department and the local jurisdiction (city/county) regarding the actual land acquired, increases or decreases in the amount of land acquired, or any changes in the project (Government Code section 51291(d)); **OR**
- If the Public Agency decides not to acquire the property and/or decides to return the property to private ownership;
- If the Public Agency decides not use the land it acquired for the public improvement that it originally notified the Department it intended to locate on the property it acquired, the land **must** be reenrolled under a contract that is as restrictive as the one it was under before acquisition occurred (Government Code Section 51295).

All required Notices should be sent to:

Mark Nechodom, Director
Department of Conservation
Division of Land Resource Protection
801 K Street, MS 18-01
Sacramento, CA 95814-3528



CALIFORNIA DEPARTMENT OF CONSERVATION

Division of Land Resource Protection

Public Acquisition of land within agricultural preserves and/or enrolled in the
Williamson Act:

What to include in notification packet

The following material is provided to assist you in compiling and submitting information to the Department of Conservation (Department) when your agency plans to acquire land that is located within an agricultural preserve, or is enrolled in the Williamson Act, for public improvements. It is the Department's goal to ensure your project moves forward in a streamlined manner, by providing technical assistance toward meeting the requirements of Government Code §51291.

If you have additional questions, or suggestions for improvement of this document, please contact the Williamson Act Program at 916-324-0850.

(Agency letterhead)

NOTIFICATION OF PUBLIC ACQUISITION OF WILLIAMSON ACT LAND

Date of Notification

Mark Nechodom, Director
Department of Conservation
c/o Division of Land Resource Protection
801 K Street, MS 18-01
Sacramento, CA 95814

Subject:

Dear Director Nechodom,

1. *What is the total number of acres of Williamson Act contracted land and/or agricultural preserve land being considered for acquisition?*

Contracted land must be located within an agricultural preserve. Some jurisdictions make the contracted land co-terminus with the agricultural preserve, so that the boundary of the preserve is the same as the contracted parcel(s). An acquisition usually will involve contracted land only, in which case, specify the number of acres under contract(s). However, if the acquisition involves agricultural preserve land not under contract, make that distinction and specify the number of acres. Identify the Assessor Parcel Number (APN) of each parcel (or portion of a parcel) to be acquired and the number of acres per parcel. A table can be included if multiple APNs are to be acquired.

2. *Is the land considered prime or nonprime agricultural land according to Government Code §51201(c)?*

Customarily, the City or County Assessor's Office or Planning Department will have this information. If the acquisition will involve both prime and nonprime land, specify the number of acres under each designation and which APNs are included within each designation. A table can be included if multiple APNs are to be acquired.

3. *What is the purpose of the acquisition?*

Describe the planned public improvement - the project or reason for acquiring the property.

4. *Where is the land located?*

Describe the location of the property using a street address, if available, nearest roads or landmarks with approximate distance and direction from the roads or landmarks, the city, if applicable, and the county. Submit a vicinity map and a location map (see #8, below).

5. *What are the characteristics of the adjacent land?*

Describe the characteristics of the land adjacent to the Williamson Act/agricultural preserve property. Is the adjacent land Williamson Act contracted land, noncontract agricultural land, open-space, urban development, etc.?

6. *Why was this land identified as necessary for the public improvement?*

Describe the reasons for selecting this particular property. This description should be consistent with the findings indicated below. Describe the steps that will be taken or that have been taken to acquire the property by eminent domain or in lieu of eminent domain pursuant to Government Codes §7267.1, 7267.2 and 51295.

As a public agency, the Authority to acquire property through the eminent domain process should be expressed in statute. Please provide for the administrative record the relevant citations codified in statute through which your agency derives the authority to acquire property using the power of eminent domain.

7. *How does this acquisition meet the findings required under Government Code §51292(a) and 51292(b)?*

Describe how the findings would be met and submit any supporting documentation. A simple declarative statement that the findings have been or would be met; or repeating or paraphrasing the findings; is not sufficient. **There must be an explanation or rationale in support of the findings.** The descriptions above and documents submitted must be consistent with this explanation. Some points to keep in mind:

- *"The location is not based primarily on a consideration of the lower cost of acquiring land in an agricultural preserve (§51292(a))."*

The cost of land under contract or within an agricultural preserve is presumed to be less because of its restricted status. The explanation should make it clear whether cost was or will be a primary consideration and provide evidence in support of this.

- *"If the land is agricultural land covered under a contract pursuant to this chapter for any public improvement, that there is no other land within or outside the preserve on which it is reasonably feasible to locate the public improvement (§51292(b))."*

The second finding requires that there are "no other" locations, not under contract, that are "reasonably feasible" for the public improvement. Consideration of the area immediately adjacent to or surrounding the selected property may not be sufficient in meeting this finding. Because the area of consideration is determined by the nature of the public improvement, it may be restricted by very limited boundaries or may be open to any county or regional land. This area should be well defined and justified. In this regard, a map showing the selected property, the area of consideration, and a description of the geographic context, should be submitted. It should denote the selected property and land uses within the defined area by parcel or some other boundary. Land uses should be described in terms of agricultural, residential, commercial, industrial, vacant, etc. If the land is planned for a particular use, specify planned residential, planned commercial, etc. Local zoning designations are not sufficient unless they distinguish

between current and planned use. In addition, identify land that is under Williamson Act contract or within an agricultural preserve.

Preferences generally cannot support the second finding. CEQA analysis, for example, may be expressed in terms of a preferred location and feasible alternatives. Such an analysis often does not support the finding for public acquisition because it does not speak in terms of "reasonable feasibility." The explanation should focus on the feasibility or infeasibility of other locations in comparison to the selected property. It is the responsibility of the public agency to define and support what is feasible or infeasible.

Although local zoning and general plans are important considerations in locating the public improvement, they can change and do not necessarily define feasibility or infeasibility. Moreover, the Williamson Act is the prevailing authority governing contracted land and agricultural preserves.

Many public agencies wish to avoid an acquisition by eminent domain and, therefore, seek a negotiated purchase. However, the fact that a location is not for sale or cannot be negotiated for purchase does not, in itself, make it infeasible.

Exemptions Under Government Code §51293

Public agencies may avoid the requirements of Government Code §51292 if the public improvement is exempt from the requirements pursuant to Government Code §51293. Several types of public improvements are identified under Government Code §51293 as exempt from the requirements to make the findings required by Government Code §51292. **These exemptions are described in Attachment A.** However, even if the Government Code §51293 exemptions apply, the requirement to provide notice to the Department under Government Code §51291(b) remains in place. Furthermore, Government Code §51293's exemption does not eliminate a public agency's responsibility under State policy, which is to avoid locating public improvements in agricultural preserves or upon land that is subject to a Williamson Act contract (Government Code §51290(a) and (b)), and to give consideration to the value to the public of such land as set forth in the Williamson Act (Government Code §51290(c) Prime Farmland).

If it is determined that the public improvement is exempt under Government Code §51293, please explain the nature of the contemplated public improvement and why the improvement would be exempt from the findings stipulated in Government Code §51292 pursuant to Government Code §51293.

8. Submit a vicinity map and a location map.

Include a map of the proposed site and an area of surrounding land identified by characteristics and large enough to help clarify that no other, noncontract land is reasonably feasible for the public improvement. The vicinity map should include the entire project outline and the area of consideration (described under #7, above). The location map should include the parcel outlines, APNs, and identify which parcel(s) (or portion of parcel(s)) are being considered for the public improvement.

9. Submit a copy of the contract(s) covering the land.

Contracts are held by the landowner and local jurisdiction (city or county) with administrative authority for the agricultural preserve. The Department does not maintain individual contracts. Submit copies of the entire contract(s). If the acquisition involves preserve land not under contract, submit a copy of

the Agricultural Preserve Resolution. Make sure the contract(s)/resolution is an official recorded copy that includes the date stamp from the county Assessor's Office.

10. Submit copies of all related Environmental Impact Reviews pursuant to the CEQA process.

Please submit a copy of the Title Page, Project Summary, and the Agricultural Resources sections of the CEQA document. Listing a link to the document on the Internet is also sufficient. If the project is exempt, submit the supporting document for exemption. If a document has not been completed, describe the plan for its completion.

11. Submit copies of all related Eminent Domain (or in lieu of Eminent Domain) documents pursuant to Government Code §51295.

A Williamson Act contract is an enforceable restriction pursuant to Article XIII, §8 of the California Constitution and Government Code §51252. Pursuant to Government Code section 51295, only public acquisitions made via eminent domain (or in-lieu of) will nullify a Williamson Act contract (assuming other necessary requirements are met). Unless the public acquisition is purchased via eminent domain or in-lieu of it, the use of the property will remain limited by the terms of the existing contract and the provisions of the Williamson Act.

Submit copies of any documents supporting acquisition by eminent domain, such as the Resolution of Necessity, eminent domain proceedings and copies of any other pertinent documents. If in lieu of eminent domain, submit copies of the property appraisal and written offer and copies of any other pertinent documents. If the acquisition will not be by eminent domain or in lieu of eminent domain, describe the steps that will be taken or that have been taken and submit any supporting documents. If a document has not been completed, describe the plan for its completion.

Signature

Contact Person
Title

cc: County Board of Supervisors or the local governing body (i.e. City Council) responsible for the administration of the agricultural preserve.

Note: The local governing body responsible for the administration of the agricultural preserve must also be notified. The local governing body is usually the County, but may be a City or other local agency. A copy of this notification will serve as notice to the local governing body.

Attachment A

Exemptions Under Government Code §51293:

(a) The location or construction of improvements where the board or council administering the agricultural preserve approves or agrees to the location thereof, except when the acquiring agency and administering agency are the same entity.

(b) The acquisition of easements within a preserve by the board or council administering the preserve.

(c) The location or construction of any public utility improvement which has been approved by the Public Utilities Commission.

(d) The acquisition of either (1) temporary construction easements for public utility improvements, or (2) an interest in real property for underground public utility improvements. This subdivision shall apply only where the surface of the land subject to the acquisition is returned to the condition and use that immediately predated the construction of the public improvement, and when the construction of the public utility improvement will not significantly impair agricultural use of the affected contracted parcel or parcels.

(e) The location or construction of the following types of improvements, which are hereby determined to be compatible with or to enhance land within an agricultural preserve:

(1) Flood control works, including channel rectification and alteration.

(2) Public works required for fish and wildlife enhancement and preservation.

(3) Improvements for the primary benefit of the lands within the preserve.

(f) Improvements for which the site or route has been specified by the Legislature in a manner that makes it impossible to avoid the acquisition of land under contract.

(g) All state highways on routes as described in Sections 301 to 622, inclusive, of the Streets and Highways Code, as those sections read on October 1, 1965.

(h) All facilities which are part of the State Water Facilities as described in subdivision (d) of Section 12934 of the Water Code,

except facilities under paragraph (6) of subdivision (d) of that section.

(i) Land upon which condemnation proceedings have been commenced prior to October 1, 1965.

(j) The acquisition of a fee interest or conservation easement for a term of at least 10 years, in order to restrict the land to agricultural or open space uses as defined by subdivisions (b) and (o) of Government Code Section 51201.



State of California Department of Conservation

[DLRP](#) → [LCA](#) → [Basic Contract Provisions](#)

Williamson Act Program - Basic Contract Provisions

PUBLIC ACQUISITIONS

When there is a need for a public agency or other eligible entity to acquire land enrolled in a Williamson Act contract, or located in an agricultural preserve, the Department of Conservation must be notified. Specific information must accompany the notification in order to ensure the requirements of Government Code §§51290 - 51295 and 51296.6 are met.

While agencies are not required to follow a specific template to submit Williamson Act Public Acquisitions notices, these example documents may be useful if you are compiling a notice. Following this outline may streamline your work process, by ensuring that all required material is contained in your initial notice. The items are in PDF format.

- [Notification form template](#) - describes each item that is required in the notification.
- [Example notification letter](#) - an example of what the notification form would contain for a theoretical project.
- [Examples of supporting documentation \(5.9 MB\)](#) - the attachments a notification requires, including a Williamson Act contract, agricultural preserve resolution, pertinent CEQA information, Eminent domain documentation, and example maps.

Questions and Answers about Williamson Act Public Acquisition Notification

- [What is public acquisition of Williamson Act land?](#)
- [Who can acquire Williamson Act land by public acquisition?](#)
- [What happens to the contract?](#)
- [What is a public improvement?](#)
- [What are the requirements for public acquisition of Williamson Act contracted land?](#)
- [What kinds of information must be included with notification?](#)
- [Can we notify the Department through the CEQA process?](#)
- [Will selecting the "best" location for the public improvement satisfy the findings required?](#)
- [Will the contract terminate when we acquire the property?](#)
- [Isn't an acquisition "in lieu" of eminent domain simply a purchase from a willing seller?](#)
- [What if we provide notice and then decide to modify the project?](#)
- [What if we acquire the property and then decide not to use it for the public improvement?](#)

→ Once we provide notice, does our responsibility end?

What is public acquisition of Williamson Act land?

Public acquisition of Williamson Act land is acquisition, by provision in the Act (Government Code §§51290 - 51295, 51296.6), of land located within an agricultural preserve or enforceably restricted by a Williamson Act or Farmland Security Zone contract by a public agency or person for a public improvement.

Who can acquire Williamson Act land by public acquisition?

A public agency or person may acquire Williamson Act land by public acquisition. As defined by the Williamson Act,

"(1) 'public agency' means any department or agency of the United States or the state, and any county, city, school district, or other local public district, agency, or entity, and (2) 'person' means any person authorized to acquire property by eminent domain (Government Code §51291(a))."

A school district cannot acquire land that is under a Farmland Security Zone contract (§51296.6).

What happens to the contract?

If requirements for public acquisition of Williamson Act land are met, the land may be acquired and the contract may be terminated. If requirements are not met, the acquisition may not be valid, and the contract may remain in force and continue to restrict use of the land. If the acquired property remains within an agricultural preserve, land use remains subject to the rules of the preserve.

What is a public improvement?

As defined,

"'public improvement' means facilities or interests in real property, including easements, rights-of-way, and interests in fee title, owned by a public agency or person, as defined in subdivision (a) of Section 51291 (Government Code §51290.5)."

What are the requirements for public acquisition of Williamson Act contracted land?

The policy of the state, consistent with the purpose of the Williamson Act to preserve and protect agricultural land, is to avoid, whenever practicable, locating public improvements and any public utilities improvements in agricultural preserves. If it is necessary to locate within a preserve, it shall be on land that is not under contract (Government Code §51290(a)(b)). More specifically, the basic requirements are:

- Whenever it appears that land within a preserve or under contract may be required for a public improvement, the public agency or person shall notify the Department of Conservation (Department) and the city or county responsible for administering the preserve (§51291(b)).
- Within 30 days of being notified, the Department and city or county shall forward comments, which shall be considered by the public agency or person (§51291(b)).
- "No public agency or person shall locate a public improvement within an agricultural preserve unless the following findings [emphasis added] are made (§51292):"

"(a) The location is not based primarily on a consideration of the lower cost of acquiring land in an agricultural preserve (§51292(a)).

b) If the land is agricultural land covered under a contract pursuant to this chapter for any public improvement, that there is no other land within or outside the preserve on which it is reasonably feasible to locate the public improvement (§51292(a)(b))."

- ⇒ The contract shall be terminated when land is acquired by eminent domain or in lieu of eminent domain (§51295).
- ⇒ The Department and city or county shall be notified before project completion of any proposed, significant changes to the public improvement (§51291(d)).
- ⇒ The Department shall be notified within 10 working days upon completion of the acquisition (§51291(c)).
- ⇒ If, after acquisition, the acquiring public agency determines that the property will not be used for the proposed public improvement, before returning the land to private ownership, the Department and city or county administering the involved preserve shall be notified. The land shall be reenrolled in a new contract or encumbered by an enforceable restriction at least as restrictive as that provided by the Williamson Act (§51295).

What kinds of information must be included with notification?

Pursuant to Government Code §51291(b), the notice shall include:

- ⇒ The total number of acres of Williamson Act land to be acquired and whether the land is considered prime agricultural land according to §51201.
- ⇒ The purpose of the acquisition and why the land was identified for acquisition.
- ⇒ A description of where the parcel(s) is located.
- ⇒ Characteristics of adjacent land (urban development, Williamson Act, noncontract agricultural, etc.).
- ⇒ A vicinity map and a location map (see below also).
- ⇒ A copy of the contract(s) covering the land.
- ⇒ CEQA documents for the project.
- ⇒ The findings required under Government Code §51292, an explanation of the preliminary consideration of §51292 and documentation to support the findings. (Include a map of the proposed site showing an area of surrounding land identified by characteristics and large enough to demonstrate, along with the explanation, that no other, noncontracted land is reasonably feasible for the public improvement.)
- ⇒ Documentation to support acquisition by eminent domain or in lieu of eminent domain to void the contract pursuant to §51295. (Include copies of eminent domain proceedings, if applicable, a property appraisal and written offer pursuant to Government Code §§7267.1 and 7267.2, a chronology of steps taken or planned to effect acquisition by eminent domain or in lieu of eminent domain and copies of any other pertinent documents, such as a Resolution of Necessity.)

Can we notify the Department through the CEQA process?

No, it is not permissible to provide notice through CEQA. Notification must be made separately to the Department (Government Code §51291(b)).

Will selecting the "best" location for the public improvement satisfy the finding required?

No, selecting the "best" or "preferred" location will not satisfy the finding. The criterion to locate on contract land is that there is no other location that is not under contract and reasonably feasible for the public improvement (Government Code §51292(b)).

Will the contract terminate when we acquire the property?

Not necessarily. The contract will be terminated or voided when the property is acquired by eminent domain or in lieu of eminent domain (Government Code §51295). If these requirements are not met, the contract will remain in force and continue to restrict use of the land.

Isn't an acquisition "in lieu" of eminent domain simply a purchase from a willing seller?

No, an acquisition "in lieu" of eminent domain must follow eminent domain law. The Department does not provide counsel as to the requirements of eminent domain law. We recommend that the public agency or person obtain legal counsel for this purpose.

What if we provide notice and then decide to modify the project?

The Department and city or county responsible for administering the involved agricultural preserve shall be notified before project completion of any proposed significant changes to the public improvement (Government Code §51291(d)).

What if we acquire the property and then decide not to use it for the public improvement?

If, after acquisition, the acquiring public agency determines that the property will not be used for the proposed public improvement, before returning the land to private ownership, the Department and city or county administering the involved agricultural preserve shall be notified. The land shall be reenrolled in a new contract or encumbered by an enforceable restriction at least as restrictive as that provided by the Williamson Act (Government Code §51295).

Once we provide notice, does our responsibility end?

No. The notice may be incomplete, in which case the Department will request additional information to complete proper notice. The public agency or person is required to consider the Department's comments (Government Code §51291(b)) and to adhere to the Williamson Act statute in determining whether to complete the acquisition. As noted above, additional notice is required if significant changes are proposed and if the property will not be used for the proposed public improvement. In addition, when the land is acquired, the Department shall be notified within 10 working days, and the notice shall include a general explanation of the decision and findings made (§51291(c)).

AGRICULTURAL MITIGATION POLICIES

Background

LAFCO's mission is to encourage orderly growth and development, discourage urban sprawl, preserve open space and prime agricultural lands, promote the efficient provision of government services and encourage the orderly formation of local agencies. LAFCO will consider impacts to agricultural lands along with other factors in its evaluation of proposals. LAFCO's Urban Service Area (USA) Amendment Policies discourage premature conversion of agricultural lands, guide development away from existing agricultural lands and require the development of existing vacant lands within city boundaries prior to conversion of additional agricultural lands. In those cases where LAFCO proposals involve conversion of agricultural lands, LAFCO's USA Amendment Policies require an explanation of why the inclusion of agricultural lands is necessary and how such loss will be mitigated.

Purpose of Policies

The purpose of these policies is to provide guidance to property owners, potential applicants and cities on how to address agricultural mitigation for LAFCO proposals and to provide a framework for LAFCO to evaluate and process in a consistent manner, LAFCO proposals that involve or impact agricultural lands.

General Policies

1. LAFCO recommends provision of agricultural mitigation as specified herein for all LAFCO applications that impact or result in a loss of prime agricultural lands as defined in Policy #6. Variation from these policies should be accompanied by information explaining the adequacy of the proposed mitigation.
2. LAFCO encourages cities with potential LAFCO applications involving or impacting agricultural lands to adopt citywide agricultural mitigation policies and programs that are consistent with these policies.
3. When a LAFCO proposal impacts or involves a loss of prime agricultural lands, LAFCO encourages property owners, cities and agricultural conservation agencies to work together as early in the process as possible to initiate and execute agricultural mitigation plans, in a manner that is consistent with these policies.
4. LAFCO will work with agricultural entities, the County, cities and other stakeholders to develop a program and public education materials to improve the community's understanding of the importance of agriculture in creating sustainable communities within Santa Clara County.

5. LAFCO will review and revise these policies as necessary.

Definition of Prime Agricultural Lands

6. "Prime agricultural land" as defined in the Cortese Knox Hertzberg Act means an area of land, whether a single parcel or contiguous parcels, that has not been developed for a use other than an agricultural use and that meets any of the following qualifications:
 - a. Land that qualifies, if irrigated, for rating as class I or class II in the USDA Natural Resources Conservation Service land use capability classification, whether or not land is actually irrigated, provided that irrigation is feasible.
 - b. Land that qualifies for rating 80 through 100 Storie Index Rating.
 - c. Land that supports livestock used for the production of food and fiber and that has an annual carrying capacity equivalent to at least one animal unit per acre as defined by the United States Department of Agriculture in the National Handbook on Range and Related Grazing Lands, July, 1967, developed pursuant to Public Law 46, December 1935.
 - d. Land planted with fruit or nut-bearing trees, vines, bushes, or crops that have a nonbearing period of less than five years and that will return during the commercial bearing period on an annual basis from the production of unprocessed agricultural plant production not less than four hundred dollars (\$400) per acre.
 - e. Land that has returned from the production of unprocessed agricultural plant products an annual gross value of not less than four hundred dollars (\$400) per acre for three of the previous five calendar years.

Mitigation Recommendations

7. Proposals involving the conversion of prime agricultural lands should provide one of the following mitigations at a not less than 1:1 ratio (1 acre preserved for every acre converted) along with the payment of funds as determined by the city / agricultural conservation entity (whichever applies) to cover the costs of program administration, land management, monitoring, enforcement and maintenance of agriculture on the mitigation lands:
 - a. The acquisition and transfer of ownership of agricultural land to an agricultural conservation entity for permanent protection of the agricultural land.
 - b. The acquisition and transfer of agricultural conservation easements to an agricultural conservation entity for permanent protection of the agricultural land.

- c. The payment of in-lieu fees to an agricultural conservation entity that are sufficient to fully fund*:
 - 1. The cost of acquisition of agricultural lands or agricultural conservation easements for permanent protection, and
 - 2. The cost of administering, managing, monitoring and enforcing the agricultural lands or agricultural conservation easements, as well as the costs of maintaining agriculture on the mitigation lands.

* with provisions for adjustment of in-lieu fees to reflect potential changes in land values at the time of actual payment
- 8. Agricultural lands or conservation easements acquired and transferred to an agricultural conservation entity should be located in Santa Clara County and be lands deemed acceptable to the city and entity.
- 9. The agricultural mitigation should result in preservation of land that would be:
 - a. Prime agricultural land of substantially similar quality and character as measured by the Average Storie Index rating and the Land Capability Classification rating, and
 - b. Located within cities' spheres of influence in an area planned/envisioned for agriculture, and
 - c. That would preferably promote the definition and creation of a permanent urban/agricultural edge.
- 10. Because urban/non-agricultural uses affect adjacent agricultural practices and introduce development pressures on adjacent agricultural lands, LAFCO encourages cities with LAFCO proposals impacting agricultural lands to adopt measures to protect adjoining agricultural lands, to prevent their premature conversion to other uses, and to minimize potential conflicts between the proposed urban development and adjacent agricultural uses. Examples of such measures include, but are not limited to:
 - a. Establishment of an agricultural buffer on the land proposed for development. The buffer's size, location and allowed uses must be sufficient to minimize conflicts between the adjacent urban and agricultural uses.
 - b. Adoption of protections such as a Right to Farm Ordinance, to ensure that the new urban residents shall recognize the rights of adjacent property owners conducting agricultural operations and practices in compliance with established standards.
 - c. Development of programs to promote the continued viability of surrounding agricultural land.

Agricultural Conservation Entity Qualifications

11. The agricultural conservation entity should be a city or a public or non-profit agency. LAFCO encourages consideration of agricultural conservation entities that:
 - a. Are committed to preserving local agriculture and have a clear mission along with strategic goals or programs for promoting agriculture in the areas that would be preserved through mitigation,
 - b. Have the legal and technical ability to hold and administer agricultural lands and agricultural conservation easements and in-lieu fees for the purposes of conserving and maintaining lands in agricultural production and preferably have an established record for doing so, and
 - c. Have adopted written standards, policies and practices (such as the Land Trust Alliance's "Standards and Practices") for holding and administering agricultural lands, agricultural conservation easements and in-lieu fees and are operating in compliance with those standards.

Timing and Fulfillment of Mitigation

12. LAFCO prefers that agricultural mitigation be in place at the time of LAFCO approval or as soon as possible after LAFCO approval. The mitigation (as detailed in the Plan for Mitigation) should be fulfilled no later than at the time of city's approval of the final map, or issuance of a grading permit or building permit, whichever occurs first.
13. Cities should provide LAFCO with information on how the city will ensure that the agricultural mitigation is provided at the appropriate time.
14. Cities should provide LAFCO with a report on the status of agricultural mitigation fulfillment every year following LAFCO approval of the proposal until the agricultural mitigation commitments are fulfilled.
15. The agricultural conservation entity should report annually to LAFCO on the use of the in-lieu fees until the fees have been fully expended.

Plan for Mitigation

16. A plan for agricultural mitigation that is consistent with these policies should be submitted at the time that a proposal impacting agricultural lands is filed with LAFCO. The plan for mitigation should include all of the following:
 - a. An agreement between the property owner, city and agricultural conservation entity (if such an entity is involved) that commits the property owner(s) to provide the mitigation for the loss of prime agricultural lands and establishes the specifics of the mitigation. Upon LAFCO approval of the proposal, the agreement should be recorded with

the County Recorder's office against the property to be developed. The agreement should specify:

1. The type of mitigation that will be provided in order to mitigate for conversion of agricultural lands. (purchase of fee title or easement or payment of in-lieu fees)
 2. The agricultural conservation entity that will be involved in holding the lands, easements, or in-lieu fees.
 3. The acreage that would be preserved through mitigation and /or the amount of in-lieu fees that would be paid (with provisions to adjust fees to reflect land values at time of payment) along with the methodology adopted by the entity for calculating the in-lieu fees.
 4. The location of the mitigation lands, when possible.
 5. Information on the specific measures adopted by the city as encouraged in Policy #10 (mitigation for impacts to adjacent agricultural lands)
 6. The time-frame within which the mitigation will be fulfilled, which should be no later than at the time of city's approval of the final map, or issuance of the grading permit or building permit, whichever occurs first.
 7. The mitigation agreement is to be contingent on LAFCO approval of the proposal.
- b. Applicant should provide all other supporting documents and information to demonstrate compliance with these policies.

County of Santa Clara

Parks and Recreation Department

298 Garden Hill Drive
Los Gatos, California 95032-7669
(408) 355-2200 FAX 355-2290
Reservations (408) 355-2201
www.parkhere.org



April 23, 2013

VTA Environmental Programs/Resources Management Dept.
Attention: Ms. Ann Calnan
3331 N First St, Bldg. B-2
San Jose CA 95134

Subject: **SCH 2007102141** - Draft EIR for U.S. 101 Improvement Project between Monterey St. and State Route 129, Santa Clara and San Benito Counties, California

Dear Ms. Calnan,

Thank you for the opportunity to provide comments on the DEIR for proposed improvements to U.S. Hwy 101 between the city of Gilroy and the Santa Clara/San Benito County line and improved connectivity to State Route 25 and Route 129 in response to projected traffic demand and need to improve public safety.

Section 2.1.2.2 Compliance with State, Regional, and Local Plans and Programs

The Santa Clara County Parks and Recreation Department, in partnership with other public agencies, is charged with furthering the implementation of the Santa Clara Countywide Trails Master Plan Update. Under Section 2.1.2.2, the DEIR correctly identifies the Trails Plans and Policies of the Countywide Trails Master Plan Update, adopted as part of the County's General Plan in 1995. However, for clarity the DEIR must characterize these regional trails as shared- use (equestrian, bicycle, pedestrian uses on shared alignment) trail to be in full compliance Countywide Trails Master Plan Update's polices for regionally significant routes.

Per our prior preliminary plan review and correspondence with VTA in 2008 and 2009, we recommended implementation of trail routes that would result in readily accessible and safe alignments for all users. As such, we recommend that the project implement **Alternative 2** (trail crossing under Hwy 101 at Uvas-Carnadero Creek) as the preferred alternative under either Freeway Design Option A or B.

While recommended trail widths can be modified to suit final site conditions, **Alternative 2** should be designed to accommodate equestrians as well as hikers and cyclists (see recommended Trail Design Guidelines Figure G-2 and G-7 attached). Similarly, we also recommend that future trail crossing of U.S. 101 at the Pajaro River accommodate all users in compliance with its designation as a national historic trail.

Board of Supervisors: Mike Wasserman, Dave Cortese, Ken Yeager, S. Joseph Simitian

County Executive: Jeffrey V. Smith



Participation in Ongoing Design Development

We appreciate your efforts to provide safe and accessible trail routes as part of this project's design objectives. Santa Clara County Parks and Recreation Department looks forward to working closely with VTA and other interested agencies to finalize design development for this project.

Sincerely,

Elish Ryan
Planner III

Attachments: Countywide Trails Master Plan Update Figure G-2 and Figure G-7

Cc: Colleen Oda, County Planning Department
Naomi Torres, NPS De Anza Trail Superintendent
Bern Smith, Bay Area Ridge Trail Council

Board of Supervisors: Mike Wasserman, Dave Cortese, Ken Yeager, S. Joseph Simitian

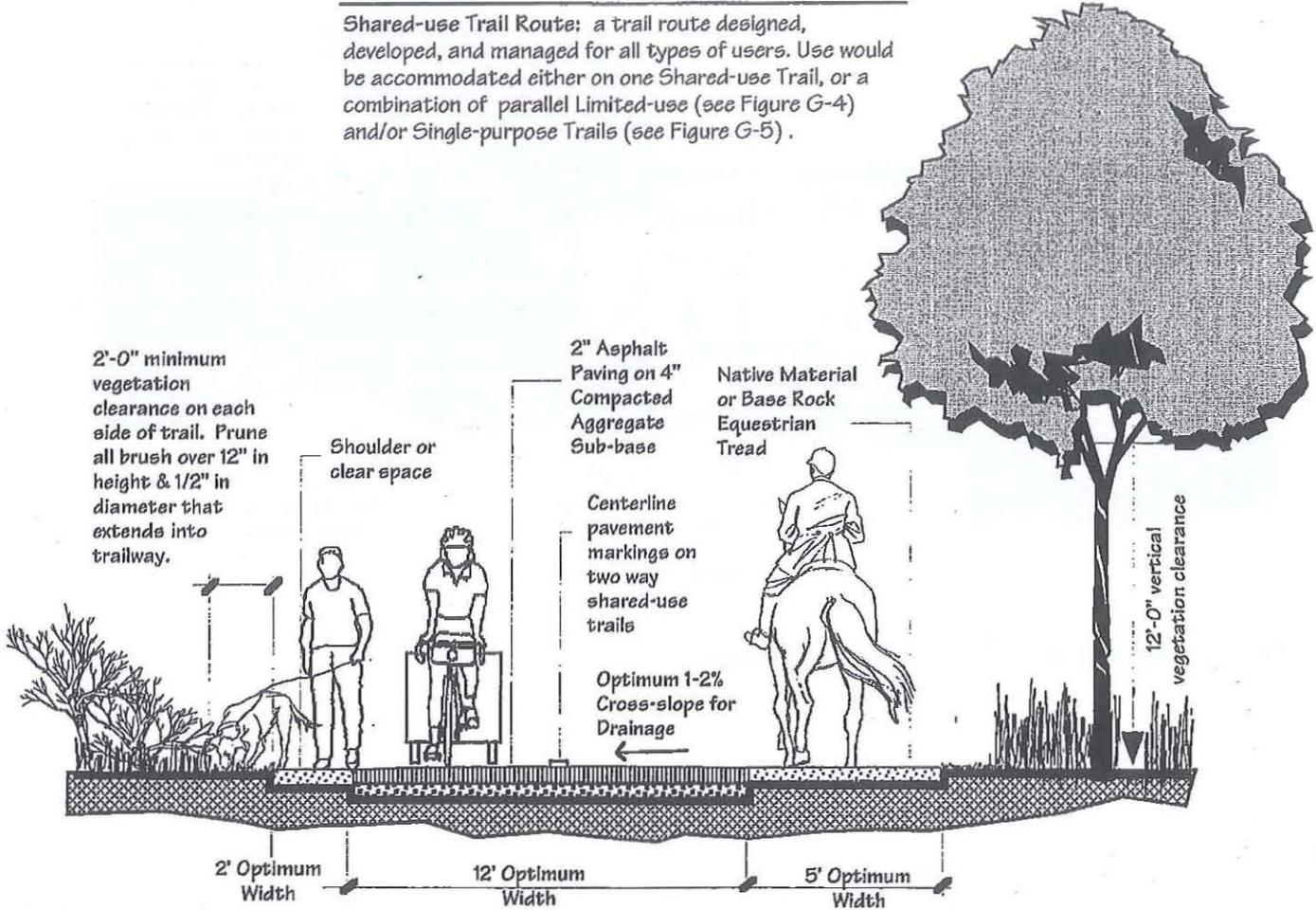
County Executive: Jeffrey V. Smith



Shared-use Trails

Paved Tread - Double Track Trail Equestrians, Hikers & Bicycles

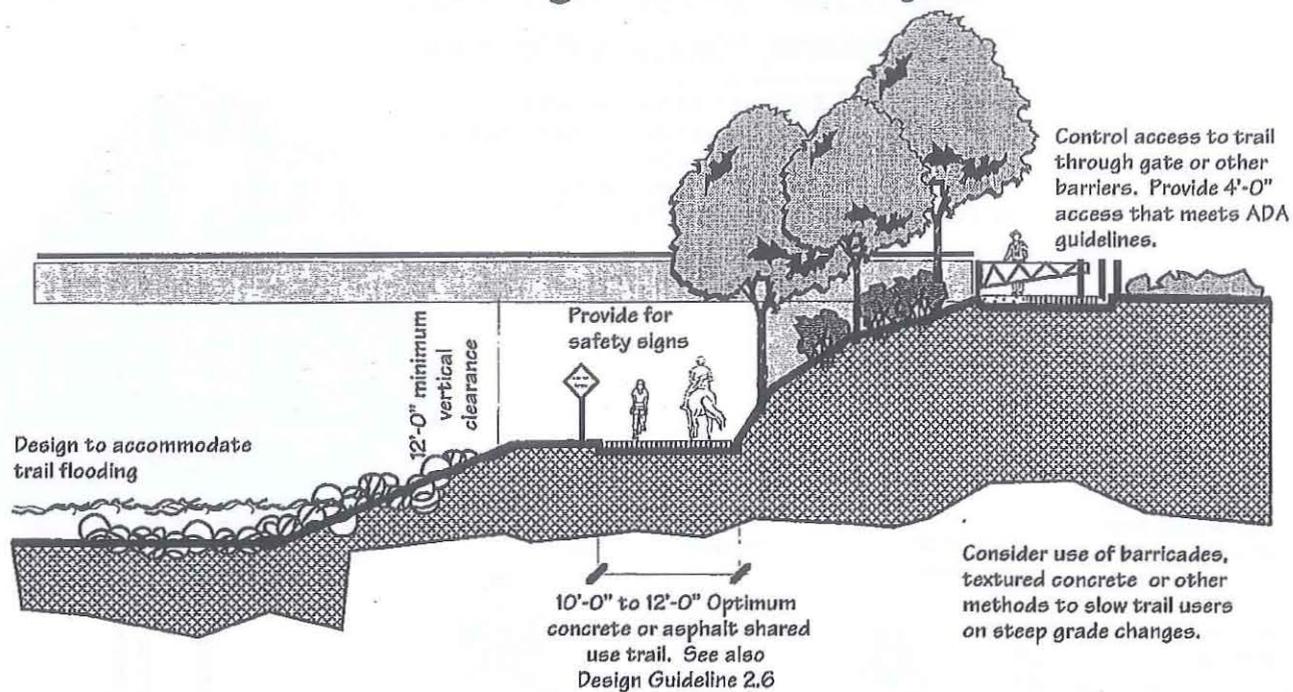
Shared-use Trail Route: a trail route designed, developed, and managed for all types of users. Use would be accommodated either on one Shared-use Trail, or a combination of parallel Limited-use (see Figure G-4) and/or Single-purpose Trails (see Figure G-5).



Notes:

- "Optimum:" the best or most favorable condition for a particular trail situation from the perspective of responsible management.
- Should a situation be encountered where the optimum width indicated can not be achieved or a staged development approach is used where narrower trails precede the optimum buildout width, mitigation measures should be used to provide for trail user safety. Such measures could include, but are not limited to: brush removal and clearing to augment lines-of-sight, trail pullouts at regular intervals, one-way trail management, signage, or dismounting requirements.

Trail Under - Crossings at Roadways



Grade Separation - Trail Undercrossings

County of Santa Clara

Roads and Airports Department

101 Skyport Drive
San Jose, California 95110-1302
1-408-573-2400



April 15, 2013

Ann Calnan
Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
3331 N. First Street, Building B-2
San Jose, CA 95134-1927

**SUBJECT: Draft Environmental Impact Report
U.S. 101 Improvement Project between Monterey Street and State Route 129**

Dear Ms. Calnan:

The County of Santa Clara Roads and Airports Department appreciates the opportunity to comment on the Draft Environmental Impact Report. The Department is submitting the following comments for clarification and analysis:

1. Chapter 1.3.1.11 (Page 21) Construction Schedule states, "If funding for the project or an initial phase of the project is secured in the near future, the soonest construction would commence would be in the year 2013." The construction year seems to be in error; please provide the corrected scheduled construction year.
2. With the completion of the SR-25 interchange improvements, Santa Teresa Boulevard will become the major connecting link from SR-25 West/Northbound and US-101 Northbound to SR-152 Westbound. The EIR needs to identify traffic impacts to the SR-152 Westbound/Santa Teresa Boulevard intersection.

The extension of the Santa Teresa Boulevard will become part of the County Roads system when completed, and we look forward to working with the Valley Transportation Authority during the design phase of the project.

Sincerely,

Dawn S. Cameron
County Transportation Planner

c: MA, MLG

County of Santa Clara
Department of Planning and Development
County Government Center, East Wing
70 West Hedding Street, 7th Floor
San Jose, California 95110



Administration	Affordable Housing	Building Inspection	Fire Marshal	Land Development Engineering	Planning
Ph: (408) 299-6740	(408) 299-5750	(408) 299-5700	(408) 299-5760	(408) 299-5730	(408) 299-5770
Fax: (408) 299-6757	(408) 299-6709	(408) 279-8537	(408) 299-6757	(408) 279-8537	(408) 288-9198

Via USPS

April 9, 2013

Ms. Ann Calnan
VTA Environmental Programs/Resources Management Department
3331 North First Street, Building B-2,
San Jose, CA 95134-1927

Subject: Santa Clara County's review comments for the
Santa Clara Valley Transportation Authority's Draft Environmental Impact Report
for U.S. 101 Improvement Project Between Monterey Street and State Route 129.

Dear Ms. Calnan:

This letter is in response to your "U.S. 101 Improvement Project Between Monterey Street and State Route 129 Draft Environmental Impact Report" (DEIR), prepared by the Santa Clara Valley Transportation Authority (SCVTA) and dated March, 2013. This letter discusses floodplain issues only. Other letters from Santa Clara County may be forthcoming.

A section of the Pajaro River from just north of the existing US 101 bridges running south to parallel with SR 129 toward Chittenden is identified as a Floodway on the current FIRM panels. Please see the attached FIRMettes. These facilities have been identified in the current Federal Insurance Study (FIS) as a regulatory floodway and floodplain of known and unknown base flood elevation and are located in the unincorporated Santa Clara County. Pursuant to Title 44 Code of Federal Regulation, Section 65.3 all improvements that will affect the base flood elevations in the Pajaro River through that portion of the unincorporated County floodway will require the submittal and issuance of a Floodplain Development Permit through the Santa Clara County Building Office.

Though the DEIR does speak to Federal Emergency Management Agency's (FEMA) floodplain issues on Carnadero, Gavilan, Tar, and Tick Creeks and the Pajaro River, and briefly discusses impacts to the water surface impacts, most of this area has been identified in Flood Zone A where the Base Flood Elevation has not been determined. Pursuant to Title 44 Code of Federal Regulation, Section 60.3(b) and the Santa Clara County Floodplain Ordinance, Santa Clara County requires that the above Floodplain Development Permit include base flood elevation data for the above Zone A areas.

The above Floodplain Development Permit (FDP) application will require a Conditional Letter of Map Revision (CLOMR) be prepared to the FEMA requirements with review and approval by County and FEMA staff prior to issuance of the FDP. The permit application will also require a Letter of Map Revision (LOMR) be prepared to the FEMA requirements, with review and approval by the County, the Santa Clara Valley Water District, and FEMA staff six months prior to the completion of construction.

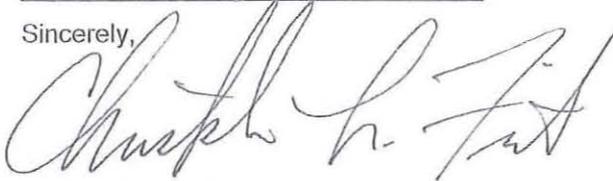
When you submit plans for the Floodplain Development Permit, please make sure you submit the following information:

- Two full sets of construction improvement plans including erosion control.
- Two complete CLOMR applications with all required hard copies and electronic copies.

- o Clearance Letters or copies of permits as applicable from Army Corp (404 permit), Regional Board (401), NOAA Fisheries, Fish & Wildlife, Fish & Game, and any other state, local or federal agencies, including San Benito and Santa Cruz Counties. Per FEMA requirements of the local floodplain administrator, Santa Clara County will review the plans and check for conformance with the local, state, and federal agencies.
- o A signed and stamped No Rise Certificate prepared by a Registered Civil Engineer.
- o No Adverse Impact Certificate / Statement prepared by a Registered Civil Engineer.
- o A No Impact to Structures Statement prepared by a Registered Civil Engineer. The SCVTA can use the FEMA example No Rise language on SCVTA letterhead. No Impact to Structures statement should state that there are no structures located in areas that could be impacted by the proposed development and/or be affected by the increased BFE (unless they have been purchased for relocation or demolition).
- o The SCVTA can also include the following statements on the same letter to address the No Adverse Impact and No Impact to Structures. The No Adverse Impact statement should state that the proposed project does not:
 1. Increase the flow velocities of "Pajaro River",
 2. Expand or change the limits of the floodplain,
 3. Alter or change the physical characteristics of the floodplain, and
 4. Decrease the flood storage capacity.

The lead time for CLOMR approval can vary from six months to two years. If you have any questions and/or when you are ready to submit, please contact me at (408) 299-5732 or CHRIS.FREITAS@PLN.SCCGOV.ORG.

Sincerely,



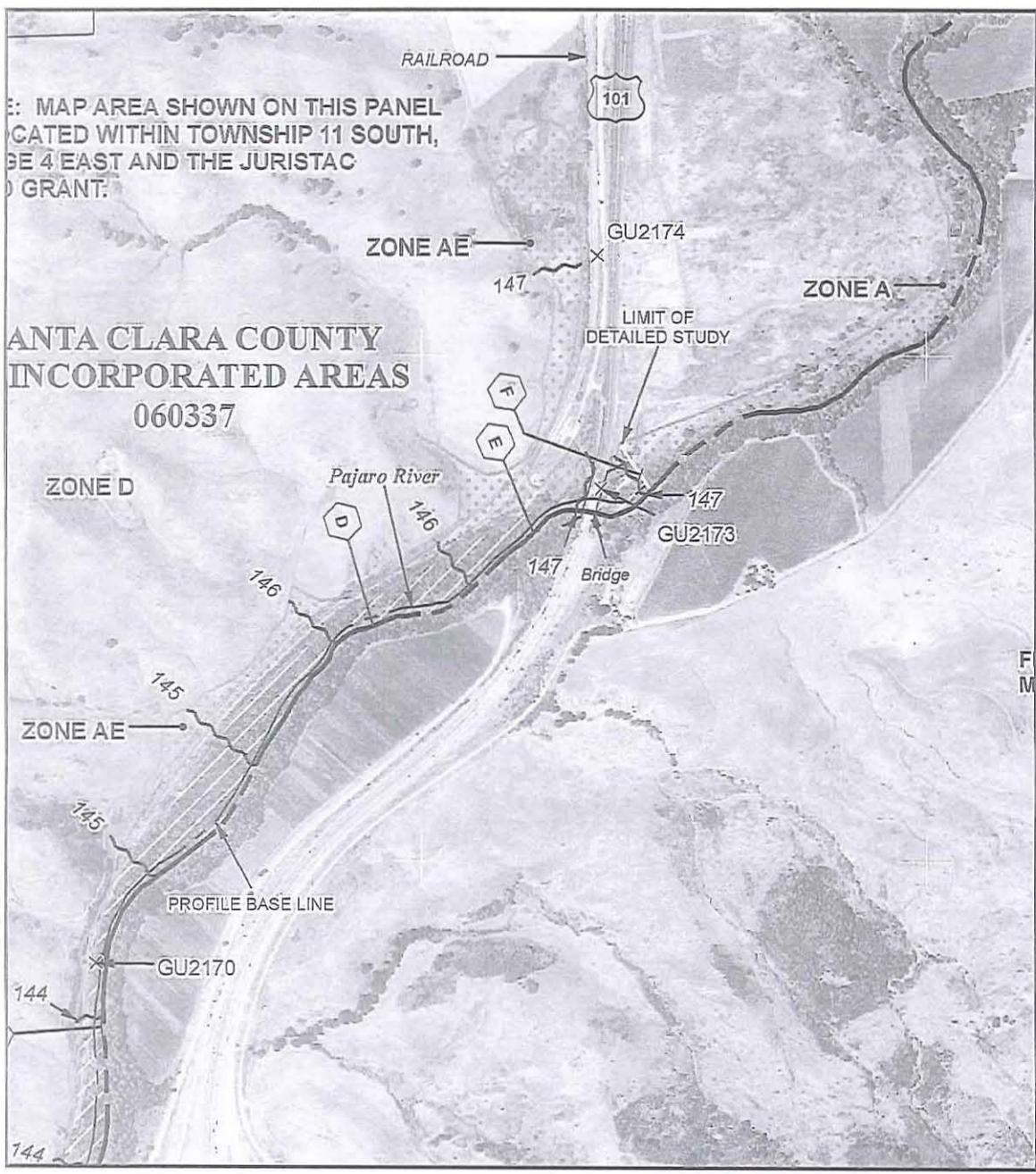
Christopher Freitas, P.E.
Senior Civil Engineer
County of Santa Clara

Attachments: Two (2) Firmettes

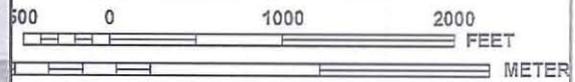
cc: Michael Harrison - Floodplain Administrator, Building Department
Darrell Wong - Principal Civil Engineer, LDE
Colleen Oda - Planner III, Planning Office
Sarah Owen - FEMA -- by E-mail Sarah.Owens@dhs.gov
Ray Lee - California State Department of Water Resources -- by E-mail Ralee@water.ca.gov

MAP AREA SHOWN ON THIS PANEL
 LOCATED WITHIN TOWNSHIP 11 SOUTH,
 RANGE 4 EAST AND THE JURISTAC
 GRANT.

**SANTA CLARA COUNTY
 INCORPORATED AREAS
 060337**



MAP SCALE 1" = 1000'



PANEL 0770H

FIRM
 FLOOD INSURANCE RATE MAP

SANTA CLARA COUNTY,
 CALIFORNIA
 AND INCORPORATED AREAS

PANEL 770 OF 830
 (SEE MAP INDEX FOR FIRM PANEL LAYOUT)

CONTAINS:

COMMUNITY	NUMBER	PANEL	SUFFIX
SANTA CLARA COUNTY	060337	0770	H

Notice to User: The Map Number shown below should be used when placing map orders; the Community Number shown above should be used on insurance applications for the subject community.

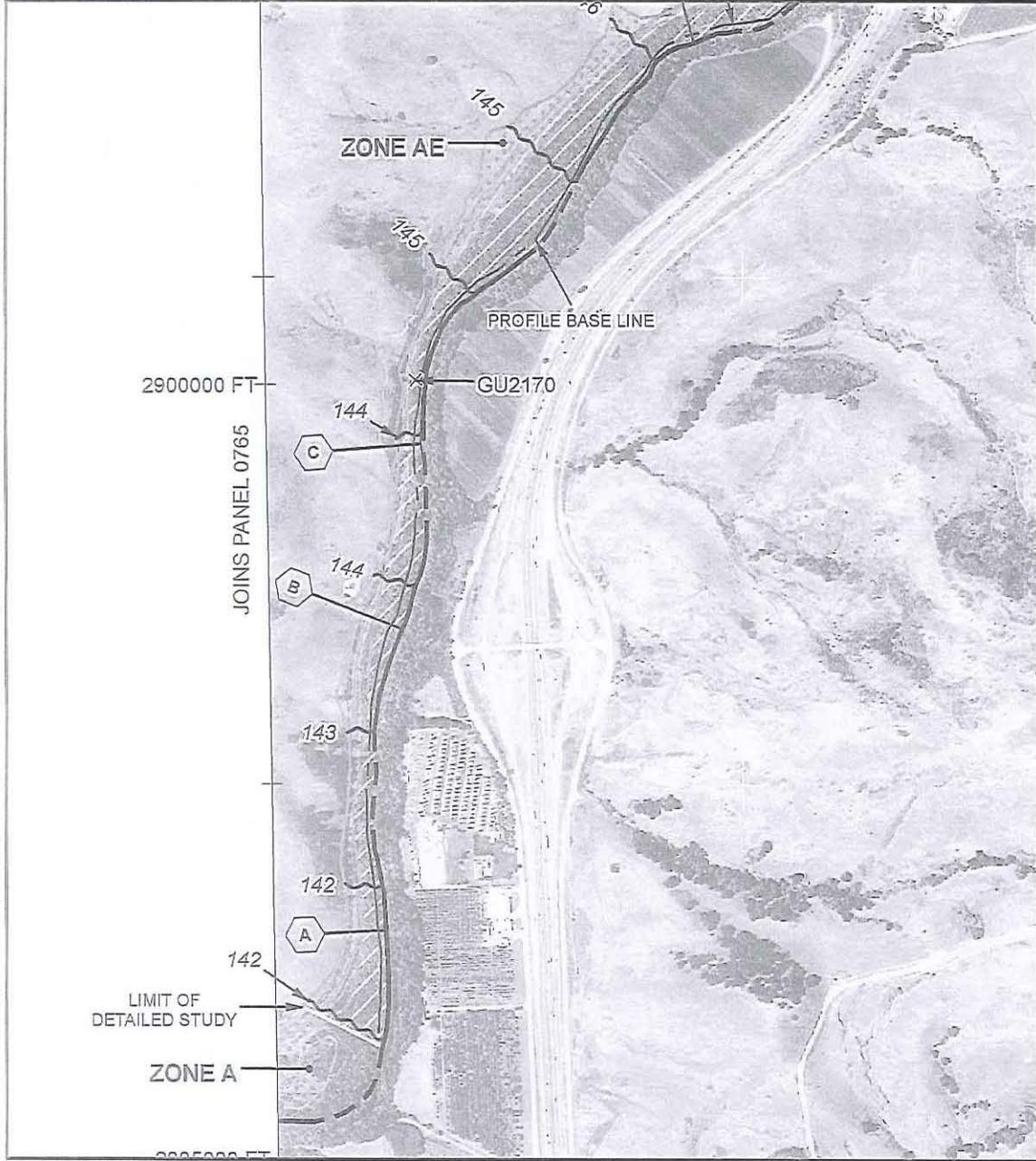


MAP NUMBER
 06085C0770H

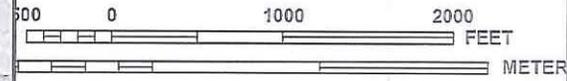
EFFECTIVE DATE
 MAY 18, 2009

Federal Emergency Management Agency

This is an official copy of a portion of the above referenced flood map. It was extracted using F-MIT On-Line. This map does not reflect changes or amendments which may have been made subsequent to the date on the title block. For the latest product information about National Flood Insurance Program flood maps check the FEMA Flood Map Store at www.msc.fema.gov



MAP SCALE 1" = 1000'



PANEL 0770H

FIRM
FLOOD INSURANCE RATE MAP

SANTA CLARA COUNTY,
CALIFORNIA
AND INCORPORATED AREAS

PANEL 770 OF 830
(SEE MAP INDEX FOR FIRM PANEL LAYOUT)

CONTAINS:

COMMUNITY	NUMBER	PANEL	SUFFIX
SANTA CLARA COUNTY	050237	0770	H

Notice to User: The Map Number shown below should be used when placing map orders; the Community Number shown above should be used on insurance applications for the subject community.



MAP NUMBER
06085C0770H

EFFECTIVE DATE
MAY 18, 2009

Federal Emergency Management Agency

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April 29, 2013

Santa Clara Valley Transportation Agency
Environmental Programs/Resources Management Department
Attention: Ann Calnan
3331 North First Street, Building B-2
San Jose, CA 95134-1927

Re: Comments on US 101 Improvement Project Draft Environmental Impact Report

Dear Ms. Calnan,

Thank you for the opportunity to review and comment on the *Draft Environmental Impact Report, US 101 Improvement Project between Monterey Street and State Route 129* (Project). The Santa Clara County Open Space Authority (Authority) is a special district created by the California Legislature in 1993, responsible for protecting greenbelts, natural resources, agricultural lands, wildlife habitat and open space within unincorporated Santa Clara County and the cities of Milpitas, Santa Clara, San Jose, Campbell and Morgan Hill. The Authority has protected nearly 16,000 acres to date through fee purchase, conservation easements, and partnerships with other conservation agencies and non-profits. The Authority's interest is in assuring the protection of natural resources, agricultural viability, and recreation and other open space values that could be impacted by the Project. On behalf of the Authority, I would like to provide feedback on a number of Project-related impacts addressed in the Project DEIR.

Farmlands

Per the DEIR the project will convert 157 acres and 122 acres of prime farmland to highway uses under Design Options A and B, respectively; and will convert farmlands that are under Williamson Act contracts or held under conservation easement.

The County's last remaining prime cultivated croplands on large economically viable farms occurs in the area south of Gilroy where the Project is proposed. The area is part of a very fertile agricultural region that extends south of Gilroy into San Benito County. Its deep alluvial soils are fed by numerous streams, which in turn provide a relatively high and stable water table that is ideal for irrigation. As part of the upper Pajaro River floodplain the south Gilroy farmlands play a critical role in retaining floodwaters that would otherwise inundate downstream farmlands and portions of Watsonville and the unincorporated town of Pajaro. Due to its critical importance to the agricultural economy, Santa Clara County's General Plan has designated this area as an "Agricultural Preserve." It has been recognized as a conservation priority by the both the California Department of Conservation and the United States Natural Resource Conservation Service, which provided funding for agricultural conservation easements that protect over 1,100 acres of south Gilroy's farmlands.

Given the importance of the south Gilroy farmlands to the region's agricultural economy, heritage and for community health, the Authority recommends:

- Increase the mitigation ratio from 1:1 to 2:1 due to the unique and vital importance of this area to Santa Clara's agricultural economy, and the potential for cumulative impacts. Please note that 2:1 is the policy of many agricultural communities with similar, predominantly prime agricultural lands at stake, including the cities of Davis in Yolo County and Hughson in Stanislaus County. The need for 2:1 mitigation is further justified by the fact that the project will result in significant growth inducing impacts if and when the application for the El Rancho San Benito Development is re-submitted. Though the Project improvements are needed independent of the ESRB, the freeway widening will likely be a condition of ESRB approval, and thus help facilitate the ERSB project. The cumulative impacts to agriculture need to be taken into account. The ERSB project will not only result in an increase in traffic along local roads in this productive agricultural region, but further erode the agricultural economy by placing additional pressures for more ranches in the vicinity to be developed for non-agricultural uses.
- Increase the total mitigation acreage due to cumulative impacts from new frontage roads. Consider adding to the proposed mitigation ratio additional acreage based upon the proposed or similar formula: multiply the linear feet of new frontage roads by a depth of likely conversion from potential non-agricultural uses (150 to 200 feet).
- Provide up front funding for project and stewardship costs to the agencies that will transact and hold the farmland conservation easements in order to ensure that the mitigation ratio is met. Project costs and long-term stewardship costs borne by the agency or agencies purchasing and holding future easements should be reimbursed by the VTA. It is not clear in the DEIR that these costs are included in the "costs of the easements", or if these refer to just the easement acquisition costs. We recommend that an amount be set aside for the agency that is 18% of total estimated easement value, which represents 5% for transactions, 5% for an easement stewardship endowment and 8% for other overhead costs. This is a standard practice used by the Central Valley Farmland Trust, Sequoia Riverlands Trust, Yolo Land Trust and other non-profits engaged in mitigation transactions.
- Due to the fact that the project will impact 5.9 acres of the JB Limited Partners property, which is protected by an agricultural conservation easement funded by local, state and federal agencies, consider shifting the freeway widening to the west to completely avoid this property. The Silicon Valley Land Conservancy holds a conservation easement over property. The taking of a portion of this property by eminent domain will result in substantial costs to the easement holder and landowner, as well as the various agencies which funded the easement. For example, one such recent taking of a portion of an easement-encumbered farm in Solano County, in which the landowners could not agree on the transportation authority's appraised value, has resulted in a two-month-long litigation process that has severely depleted the legal defense funds of the local land trust which holds the easement. In the case of this Project, the parties will also be required to engage an appraiser to determine both the current conservation easement value and the encumbered value of the portion of the property involved in the taking, and reimburse the various agencies that were involved in the funding of the conservation easement. As an alternative, VTA should explore the feasibility of shifting the Project to the west so that none of the easement-encumbered property held by JB Limited Partners is impacted by the Project. If the project cannot be shifted west, costs borne by the various parties due to the eminent domain taking should be provided separately and in addition to the funding for the farmland mitigation.

- Revisit the farmland impact analysis to account for potentially underrepresented impacts to prime farmlands. The Project DEIR (Table 10, p.52) identifies APN 810-34-007 as grazing land. This appears to be incorrect, as the 2010 Important Farmland Mapping and Monitoring Program classifies this area as Farmland of Local Importance. Note that there is no longer a record of this APN in the County GIS parcel database. This parcel is listed in the 2011 GIS parcel database as APN 810-82-002. Likewise, APN 810-38-017 (Table 10 pg. 52) is identified as grazing land, but a portion of this parcel is classified as Farmland of Local Importance and is described as prime farmland according to the Natural Resource Conservation Service SSURGO dataset.

Natural Communities

The Upper Pajaro River corridor has been identified in the Bay Area Critical Linkages Project and other studies as an important regional landscape linkage between the Santa Cruz Mountains and Gabilan and Diablo Ranges. It is vital to design infrastructure improvements that maintain if not enhance the ability of wildlife to travel between core habitat areas. Researchers with *Connectivity for Wildlife* have documented numerous road kills along the entire stretch of Highway included in the Project area, as well as use of existing culverts by many wildlife species. While the DEIR identifies improvements and culvert upgrades that should improve wildlife connectivity, use of directional fencing is limited to about half of the project area (MM-NATCOM-3.6). To enhance connectivity, the Authority recommends:

- Directional fencing be installed and maintained to span all of the crossing structures associated with the project. Given the abundant wildlife in this area and its regional significance for connectivity, additional directional fencing will increase the likelihood that species will be able to successfully pass through this landscape.
- For all other described impacts to natural communities, animals, plants, riparian resources and wetlands, the Authority recommends focusing mitigation in areas that are in close proximity to the Project location. Where feasible, in-lieu fees to the HCP/NCCP for permanent impacts to natural communities or species should be directed to the southernmost areas in the County identified as high conservation priorities in the HCP/NCCP Conservation Strategy. Where in-lieu fees are not feasible, mitigation measures should be restricted to locations that are within the Pajaro River Watershed.

Bicycle and Pedestrian Facilities

An important element of the Authority's mission is to provide public recreational access to open spaces. The Authority works in close partnership with other agencies and organizations to implement regionally significant trail and public access projects. The Authority supports the recommendations from the Bay Area Ridge Trail Council and the Santa Clara County Parks and Recreation Department to establish a multiple-use trail route that will support safe, enjoyable access across U.S. 101 via a new trail to be built along Carnadero Creek, under the freeway bridges.

- Incorporate Alternative 2 in the final Project plans. This alternative appears to be viable under either Freeway Design Option A or B. Where feasible, we recommend integrating design elements and native landscaping along all trail routes, and especially at road crossings, that will help facilitate wildlife movement.

Direct Growth Inducement

As mentioned earlier, the Project area is part of a very productive agricultural region that extends south of Gilroy into San Benito County as far as Hollister. Santa Clara County's last remaining prime cultivated croplands on large economically viable farms occur in the area south of Gilroy where the Project is proposed. Growth inducement and cumulative impacts from potential developments on surrounding ranches facilitated by the freeway widening could over time erode the agricultural economy of this region.

We appreciate the opportunity to provide comments on this Project. Please feel free to contact my office at (408) 224-7476 if you would like more information about the Authority or to discuss our input.

Sincerely,



Andrea Mackenzie
General Manager

Cc: Board of Directors, Santa Clara County Open Space Authority

File: 31247
Tick Creek
X-Fac: Uvas Carnadero Creek
Gavilan Creek
Tar Creek

April 29, 2013

Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
Attn: Ann Calnan
3331 North First Street—Building B-2
San Jose, CA 95134-1927

Subject: U.S. 101 Improvement Project: Monterey Street to SR 129

Dear Ms. Calnan:

The Santa Clara Valley Water District (District) has reviewed the Draft Environmental Impact Report (DEIR) for the subject project. The District provides flood protection and wholesale water supply to the County of Santa Clara as well as providing stream stewardship in association with its flood protection and water supply purposes. Due to the project's regional size and impact, the flooding and watershed impacts should be looked at regionally rather than site specifically. The District has concerns with the project as outlined below:

Hydrology and Floodplain, Section 2.9

General Comment No. 1—In general, this section does not address the difference between Federal Emergency Management Agency (FEMA) hydrology and floodplain mapping which is regulated by the National Flood Insurance Program (NFIP) and the local floodplain administrators, such as the City of Gilroy and the County of Santa Clara (for the portion of the project located within the County of Santa Clara) and the use of best available or current hydrology and mapping for the project. This project proposes changes to the FEMA floodplain and must follow NFIP regulations as administered by the local floodplain administrators. For NFIP purposes, the project must use FEMA effective map hydrology to determine impacts of the project on the effective FEMA floodplain or apply to change the map to reflect new existing conditions and then analyze the project to address changes in the existing condition. The Location Hydraulic Study utilizes some FEMA information, but does not use FEMA flow rates for Uvas Creek at Highway 101, the Uvas Creek-East Overbank Above Highway 101 at Highway 101, or the Uvas Creek-South Spill. As another example of inconsistency with FEMA information, it was noted that the 100-year water surface elevations on Uvas Creek at Highway 101 calculated in the Location Hydraulic Study are approximately 2.5 feet lower using a flow rate of 8400 cfs than FEMA maps show using the incorrect (and low) flow rate of 8000 cfs.

General Comment no. 2—The District has information that the hydrology currently used by FEMA for Uvas Creek is incorrect. Additionally, during the 2009 FEMA re-mapping process to convert paper maps to Digital FIRMs, the Uvas Creek watershed, in addition to adjoining

watersheds in Gilroy, were mapped incorrectly. The correct Uvas Creek 100-year flow rate at Highway 101, without spills taken into consideration, is 16,900 cubic feet per second (cfs). In order to calculate the actual flow from Uvas Creek, the full flow rate needs to be routed through the channel and the overbank flows need to be calculated (such as for the area FEMA calls Uvas Creek-East Overbank Above Highway 101 and the overflow from the south bank of Uvas Creek, which flows towards Gavilan Creek, and the flows which overtop Highway 101). Similarly, the flows which currently cross Highway 101 and form the floodplain FEMA calls Uvas Creek-East Overbank Above SPRR, the Uvas Creek floodplain in Uvas Creek, and FEMA's Uvas Creek-South Spill all join the floodplain which currently floods Highway 25. Detailed flow routing for this area should be provided using current hydrology, in addition to performing the necessary NFIP modeling. These flows should be calculated for the existing and proposed condition.

General Comment No. 3—The post-project analysis did not include new flow rate calculations for flow routing changes due to the raising of Highway 101, the reduction in bridge capacity and freeboard at the proposed Highway 101 bridge at Uvas Creek, the added culvert capacity or addition of new culverts at the Tick Creek, Tar Creek, Gavilan Creek and State Route 25 floodplain crossings/bridges to allow more 100-year flow to cross Highway 101 and State Route 25 at an early time in the hydrograph which currently backs-up and pools floodwaters until they eventually weir flow over the highways under existing conditions. These hydrograph changes can change the peak flow rate in the receiving stream, as well as the downstream receiving streams. The post-project flow rates were assumed to be the same for existing and post-project scenarios with the only change being the new cross-section geometry. This does not show how the post-project geometry and cross-section changes will change the flow rates and flood routing in the watershed.

General Comment No. 4—The Location Hydraulic Study only looked at mitigations for increased runoff from increased impervious surfaces to the peak 100-year flow rate. The analysis did not show how the project will change the hydrographs in the various downstream watersheds and how the project will mitigate for increased flood flow volumes, as well as peak flows, to the downstream receiving water bodies and the Soap Lake floodplain under various flow events.

General Comment No. 5—The Location Hydraulic Study only analyzed the 100-year flood flow event. There is no study identifying the existing capacity of downstream receiving waterbodies to contain flood waters. Downstream receiving waterbodies currently flood during more frequent events, such as the 2-year event, 10-year event, etc. based on information obtained from the Pajaro River Watershed Flood Prevention Authority. There was no analysis showing the impacts of the project on the frequency of flooding downstream or on the lateral extent of flooding during these more frequent flood events or how the project will impact the hydrograph for downstream receiving waterbodies and the Soap Lake floodplain in order to avoid flooding Highway 101 or State Route 25.

Section 2.9.2.3 Impacts to the Tick Creek Floodplain—The DEIR states that there is no impact since the water surface in the Tick Creek floodplain will not raise. Please see General Comment No. 3. The District is concerned that post-project hydrology may change and that the hydrograph in Tick Creek and the downstream receiving waterbodies such as Uvas Creek and the Pajaro River may be impacted without further analysis.

Section 2.9.3.1 Mitigation Measures for Impacts to Carnadero Creek Floodplain—Please see General Comments No. 1 through 5. Additionally, the Location Hydraulic Study only recommends purchasing flooding easements where the water surface increases up to 0.8 feet under Design Option A. Depending on an analysis of existing structures in the watershed, any increase in flood elevations can adversely impact existing properties and cause structures that are at or above the existing 100-year water surface elevation to be below the 100-year water surface elevation which triggers NFIP compliance, flood insurance, and more onerous building requirements. This does not appear to have been analyzed. Also, the County of Santa Clara has a policy of zero-increase in the floodplain for areas outside a project's right of way limits. The Location Hydraulic Study shows several areas, utilizing its existing analysis, where the 100-year water surface elevations will increase. If the flood flows are re-analyzed based on our General Comments, this may change again. The proposed detention basin only mitigates for increased runoff due to the new impervious surface area for the freeway and only addresses 100-year flooding. Again, existing studies show that flooding in downstream receiving water bodies occurs during more frequent events. Any unmitigated flows during those more frequent events may increase the frequency of flooding downstream.

2.10 Water Quality and Stormwater Runoff

Section 2.10.1.4 NPDES Program—This section only identifies the Caltrans MS4 municipal NPDES permit and does not include mention of the Santa Clara County MS4 municipal NPDES permit. This section should make clear whether any portion of the project will drain from Caltrans right of way into the Santa Clara County storm sewer system or if the Caltrans storm waters will discharge directly into waters of the state or waters of the U.S. The Storm Water Data Report states that the "...Project is not located within any Municipal Separate Storm Sewer System (MS4)." It also states that the "...Project is currently not within a municipality or RWQCB that requires hydromodification mitigation." However, it does not state how it came to that conclusion since there is no discussion of the Phase II municipal NPDES permit for Santa Clara County and the City of Gilroy.

Section 2.10.3 Environmental Consequences of the Build Alternative—This section does not discuss how Tick Creek, Gavilan Creek, Uvas Creek and the Pajaro River will be impacted by hydromodification and increased erosion due to the constriction and/or expansion of the culverts or bridges along Highway 101 and along State Route 25. The Storm Water Data Report for the project states that peak attenuation basins will be designed to avoid downstream erosion from increased flow rates from the new impervious surface areas. This is a separate issue from increased flow rates from the changes in the culvert and bridge capacities at the various stream crossings and floodplain crossings.

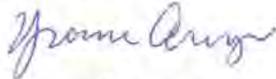
Ms. Ann Calnan

Page 4

April 29, 2013

If you have any questions, you may reach me at (408) 630-2319, or by e-mail at yarroyo@valleywater.org. Please reference District File No. 31247 on future correspondence regarding this project.

Sincerely,



Yvonne Arroyo
Associate Engineer
Community Projects Review Unit

cc: S. Tippetts, S. Katric, L. Xu, C. Presley, J. Xu, J. Men Lo, B. Ahmadi, K. Lueneburger,
File



Bay Area
Ridge
Trail
Council

VTA Environmental Programs/Resources Management Dept.
Attention: Ann Calnan
3331 N First St, Bldg. B-2
San Jose CA 95134
Re: US101 Improvement Project – Monterey St. to State Route 129

22 April 2013

Dear Ms. Calnan –

Please accept these comments from the Bay Area Ridge Trail Council (Council) in response to the Draft Environmental Impact Report (DEIR) for the proposed improvements to US 101 in south Santa Clara and north San Benito counties. The Ridge Trail, a planned 550+mile multiple use regional trail, will cross US 101 within the footprint of the Improvement Project. The Council is committed to preserving the best possible trail alignment in VTA's plan.

Some years back, representatives from the Council and planners from the Santa Clara County Parks Department met with VTA staff and consultants to review preliminary plans for the project. Through those meetings and subsequent site visits we identified a route that will support safe, enjoyable access across US 101 via a trail to be built along Carnadero Creek, under the freeway bridges. The alignment is incorporated in your DEIR as Alternative 2. This alternative would be viable under either Freeway Design Option A or B. **The Council recommends adoption of Alternative 2 in the final project plans.** We also recommend adding text stating that the trail will accommodate equestrians as well as hikers and cyclists.

Regarding the Design Options generally, the Council supports an option that allows for safe passage parallel to the freeway frontage, and through the various interchanges. These parallel trails, paths and bike lanes are important for continuity of through passage for non-motorized travel, and connection to the regional trails. Based on my analysis of the two Options, there does not appear to be much difference between them on that point. However, there seems to be a significant difference regarding impacts to the agricultural features of the south Santa Clara region.

Option A would require taking 30 acres (about 20%) more farmland than Option B. Though the Council does not have a specific policy regarding farmland preservation, we do stand for preservation of open space (that could include working landscapes). Thus, the Council recommends ranking Option B higher than Option A.

Thank you for your consideration of our comments –

A handwritten signature in blue ink, appearing to read "Bern Smith".

Bern Smith
South Bay Trail Director



Castro Valley Properties
2010 Castro Valley Road
Gilroy, CA 95020

April 29, 2013

Santa Clara Valley Transportation Authority
Environmental Programs and Resources Management Dept.
Attn: Ann Calnan
3331 North First Street – Building B-2
San Jose, CA 95134-1927

Dear Ms. Calnan:

RE: Comments on the Draft Environmental Impact Report, U.S. 101 Improvement Project
between Monterey Street and State Route 129 dated March 2013

Castro Valley Ranch is committed to respectful stewardship of the land and we value this opportunity to comment on the Draft Environmental Impact Report prepared regarding the 101 expansion and the 101/25 interchange. We understand the need to improve the transportation infrastructure, but believe it must be done with sensitivity to the unique character and agricultural heritage of the area.

Castro Valley Ranch has 8,400 acres and a long history of operating as a cattle ranch, farm and timberland in an environmentally sensitive manner. Much of the 101/25 interchange will be built on or near agricultural and pasture lands owned by Castro Valley Ranch and we are concerned that the Draft Environmental Impact Report inadequately addresses many of the impacts that would be caused by Design Option A.

Design Option A and Design Option B have such different environmental impacts, that we question why they are designated as “Design Options” rather than alternatives. We believe the final Environmental Impact Report should consider each of the options as alternatives and weigh the relative impact of each and choose one as preferred.

Pursuant to section 15126.6(d) of the CEQA Guidelines the EIR must include sufficient information to allow meaningful evaluation, analysis and comparison of the options. We do not believe the EIR in its current form meets this standard. However, in our review of what information is included in the EIR and its technical reports, the negative impacts of Design Option A seem much greater than Design Option B, and we suggest Design Option B as the preferred alternative. In the list below we have selected a few of the areas where the report must be revised to allow a meaningful comparison between Design Option A and Design Option B.

1. Table 4 on pages 28 through 30 of the report has several errors that imply both design options have similar or identical environmental impacts, when in fact Design Option A creates significantly more negative environmental impacts. For example, while Design

Option A has significant visual impacts that cannot be mitigated, all of Design Option B's visual impacts can be mitigated to a less than-significant level. (See page 89 of the Draft EIR). Table 4 must be revised to note that there is a Significant Unavoidable Impact on views under Design Option A only.

2. Although Table 4 notes that Design Option A increases the impervious surfaces by 1.9 acres, nowhere does the table indicate that Design Option A also increases the Disturbed Soil Area by more than 20 acres versus Design Option B. All of these acres are in the northern area of the project, where the risk of soil erosion is highest, according to the Storm Water Data Report (page 7).
3. Design Option A takes significantly more prime and unique farmland but the report does not adequately consider potential mitigations. For example, the use of engineered walls rather than sloped fill might preserve much of the agricultural land, but this possibility does not seem to have been considered in the draft EIR.
4. Design Option A permanently alters the floodplain and severs the connection between the Carnadero Creek and Gavilan Creek watersheds so that overspill from the Carnadero Creek never reaches Gavilan Creek whereas Design Option B does not. (Location Hydraulic Study Report, pg. 50.)
5. We note with great concern that Design Option A places the new 101/SR25 interchange in a location highly susceptible to liquefaction (Preliminary Geotechnical Report, Figure 17) and a high level of earthquake hazard (Preliminary Geotechnical Report, Figure 18) whereas Design Option B places the extension of Santa Theresa Boulevard outside of these hazard areas. In spite of including the maps identifying these hazards, the Preliminary Geotechnical Report defers any discussion of these hazards or their possible mitigation to a future date. (pg. 27)
6. The draft EIR notes that Design Option A destroys more acres of habitat for both the California Red-Legged Frog and the California Tiger Salamander, but fails to identify Design Option B as potential mitigation of this impact.
7. Design Option A will disturb far more alluvium deposits than Design Option B and we question why, at least with respect to Design Option A, Caltrans allowed reliance on a Paleontology report developed for another project covering a different area and which did not consider the potential differences in effect between the two design options.
8. Design Option A requires two new culverted crossings of Gavilan Creek (one north of and one south of Castro Valley Road) and one new culverted crossing of Farman Canyon Creek, none of which are required by Design Option B. The environmental impact of, and potential mitigations for, these alterations to riparian habitats and stream beds do not appear to be detailed in the draft report.
9. The coyote brush scrub, aquatic and riparian habitats located north of Castro Valley Road (see the Natural Environment Study appendix Figure 2e) would be impacted only by

Design Option A. Design Option B does not seem to have any impacts on these areas, especially if Design Option B is revised to eliminate the unnecessary eastern shift of Santa Teresa Blvd from its current alignment. Design Option A would not only directly impact these biologically valuable environments, but would leave them surrounded on all sides by roads permanently disconnecting them from the surrounding area.

10. High intensity night lights may affect the behavior, biology, and ecology of nocturnal animals, such as bats, frogs and salamanders. Under Design Option A high intensity night lights will affect a much larger area than Design Option B both because the interchange would be significantly larger and because the additional connecting loops and ramps would cause headlights to be cast in more directions. The Draft EIR needs to address this potentially significant impact and identify possible mitigations.
11. Design Option A significantly alters the topography of the interchange site and creates more opportunities for the creation of permanent standing water which could attract non-native predators and adversely impact protected amphibian species such as frogs and salamanders.
12. In addition to the potential for new permanent bodies of water, the alterations in topography may create small temporary bodies of water that attract breeding California Red-legged Frogs and California Tiger Salamanders, but which may not hold water long enough to support these species through the completion of their metamorphosis and thus significantly reduce the breeding success of these sensitive species. We do not believe that the draft EIR adequately addresses these potential impacts of Design Option A.
13. In Design Option A, the destruction of one or more wells on Castro Valley Ranch land north of the current interchange will significantly impact the area's resource base and may also result in as yet unexplored impacts on the ecological systems that are directly or indirectly dependent on the water from that well, or water that will now need to be taken from other sources of supply. The draft EIR should identify this as a significant impact and list possible mitigation measures.

The items listed above are just some of the differences in environmental impacts between Design Option A and Design Option B. Even for those items where the EIR mentions a difference between the two design options, it fails to satisfy section 15126.6(a) of the CEQA Guidelines because the options are not identified as alternatives to be compared and fails to satisfy section 15126.6(d) because there is insufficient information in the EIR to allow a meaningful evaluation. Perhaps most importantly, the draft EIR fails to comply with section 15126.6(b) and undermines the very purpose of an Environmental Impact Report because it fails to compare the options to identify if one of the two options can mitigate or avoid some of the environmental impacts of the project.

We have several additional concerns with the Draft Environmental Impact Report beyond its treatment of the design options.

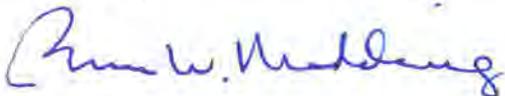
In reviewing the travel time analysis, we would like the final EIR to provide more detail regarding how the travel times were calculated. If these are intended to be U.S. 101 mainline travel times, they seem inconsistent with the results in Table 1 (US 101 Bottleneck Locations and Queuing) and Table 2 (Ramp Junction Level of Service) in the Traffic Operations Report and inconsistent with the results in Appendix E and F.

The draft EIR does not address the impact of the destruction of our large barn near the Freeman Quarry entrance. The removal of this agricultural building (which is also host to a seasonal fruit stand) is a significant change in the use of the land and should be considered in the draft EIR as required by section 15126.2(a) of the CEQA Guidelines. We are concerned also that the planned roadways will encroach on several residences near the barn and would like the draft EIR to disclose how close the edge of the new roadways will be to the residences and perimeter fence and discuss possible mitigation measures.

The proposed project will significantly impede access to our land at several points including limiting access to Castro Valley Road. We would like the draft EIR to discuss access to ranch lands and farmlands as access limitations may change the land use and have a significant impact on the environment. At a minimum Castro Valley Ranch will require roads sufficient for farm access of heavy tractors and routine farm operations and right of ways consistent with the new upgraded road required under the Castro Valley Ranch Subdivision Environmental Impact Report.

Please contact Peter Morrissey at 650-566-6448 if you have any questions or would like further clarification regarding our comments.

Sincerely



Bruce W. Madding
Chief Executive Officer

April 30, 2013

Ann Calnan, Senior Environmental Planner
Environmental Programs and Resources Management Department
Santa Clara Valley Transportation Authority

Via e-mail: 101_Widening@VTA.org

Dear Ms. Calnan,

Thank you for providing us with the opportunity to review the Draft Environmental Impact Report (EIR) for the proposed U.S. 101 Improvement Project (Project). The Nature Conservancy (TNC) is a global organization dedicated to conserving the lands and waters on which all life depends. TNC uses the best available science, a creative spirit, and a non-confrontational approach to craft innovative solutions to complex conservation problems at scales that matter and in ways that will endure. Our comments on the Draft EIR follow.

- 1) Provide directional wildlife fencing throughout the Project to ensure wildlife connectivity.

TNC supports the Valley Transportation Authority's (VTA) efforts to provide for wildlife movement across the improved section of U.S. 101 in Santa Clara and San Benito counties, given the Project's location in an area of importance for both habitat connectivity and wildlife passage. TNC has invested significant resources in identifying and preserving important properties and wildlife connections in this region, and has participated in regional planning processes that have identified the Project location as crucial to the survival of wildlife populations moving between the Gabilan, Santa Cruz, and Mount Hamilton ranges.

Based on this work, TNC recommends that EIR Mitigation Measure NATCOM-3.6 be revised to specify that directional wildlife fencing be installed at the following specific locations which will encompass all crossing structures within the study area:

- 1) From the San Benito Bridge to the U.S. 101 - Pajaro Bridge;
- 2) From U.S. 101 - Pajaro Bridge to the Tar Creek Culvert;
- 3) From the Tar Creek Culvert to the Tick Creek Culvert; and
- 4) Up to Hwy 25 from Tick Creek.

This recommendation is based on the high volume of multiple species animal movement recorded at the U.S. - 101 Pajaro Bridge, Tar Creek, and Tick Creek, as shown by camera installations commissioned by TNC at each of these locations.

Furthermore, TNC has tracked a high number of animals hit by vehicles along this stretch of road, including a North American Badger, a species designated by the California Department of Fish and Wildlife as a California Species of Special Concern.

2) Direct compensatory mitigation funding to conservation priorities in the region.

Where there is a need for compensatory mitigation, we recommend the VTA engage in strategic mitigation to achieve better conservation outcomes. There exists a wealth of data and plans in the region that identify conservation priorities embraced by the environmental community and wildlife agencies. Examples include: the Bay Area Critical Linkages project, the California Department of Fish and Wildlife Conservation Action Plan and the conservation reserve design in the Santa Clara Valley Habitat Conservation Plan / Natural Communities Conservation Plan.

We urge the VTA to direct mitigation funds to protect conservation priorities that contribute to ecosystem function and in places that most closely reflect the type and location of project impacts. Although the Project may proceed in phases, to the extent practicable given funding availability, VTA should secure mitigation for the entire project as soon as possible in order to ensure the most comprehensive conservation outcome. As an added benefit, securing property for mitigation at an early stage will achieve cost savings and avoid conversion to other land uses.

3) Ensure proper mitigation for growth-inducing impacts with respect to potential future development.

While the EIR makes a finding of significant unavoidable impacts with respect to the growth-inducing impacts of the El Rancho San Benito (ERSB) development (Impact GR-1), it concludes without further explanation that no feasible mitigation measures exist to lessen this impact. The EIR states that as of May 2009, the application for the ERSB Specific Plan had been withdrawn and was no longer under consideration by San Benito County. However, TNC believes that the ERSB project may be resubmitted to the County in the near future, potentially as part of the San Benito County General Plan update process which is currently underway.

We understand that the Project will go forward regardless of the ERSB development, and that approval of the ERSB development lies within the jurisdiction of other regulatory entities. But the widening of U.S. 101 and improvements to the U.S. 101/Betabel Road/Y Road interchange

remain a necessary component of any eventual ERSB development. Despite this, the EIR's current traffic model does not take into account the ERSB development's additional vehicle trips or other related impacts. TNC believes traffic-related impacts from the ERSB development may present threats to important habitat and to the ability of wildlife to move through the region. Given that the ERSB development may currently be under consideration again, TNC believes that that Project's indirect effect on regional growth (Impact GR-2) merits further analysis.

Please feel free to contact me if TNC can provide further resources to support these recommendations, or if I may otherwise assist you with the environmental review process.

Sincerely yours,

Abigail Ramsden
Mt. Hamilton Project Director
The Nature Conservancy



Lonn Maier, Supervisor
Environmental Management,
Electric Transmission

2730 Gateway Oaks Drive
Sacramento, CA 95818
Office: (916) 923-7020

April 17, 2013

VTA Environmental Programs/Resources Management Department
Attention: Ann Calnan
3331 North First Street, Building B-2
San Jose, CA 95134-1927

RE: Comment to the Draft Environmental Impact Report (EIR) for the U.S. 101 Improvement Project
(Monterey Street to State Route 129)

Dear Ms. Calnan:

Thank you for the opportunity to review the EIR for the U.S. 101 Improvement Project. Pacific Gas and Electric Company (PG&E) has the following comments and suggestions to offer regarding the proposed project by Santa Clara Valley Transportation Authority (VTA).

Section 2.5.1 (Utilities/Emergency Services) of the EIR explains that a PG&E gas line is “located within Caltrans’ right-of-way on the east side of U.S. 101. There is also an existing 115-kilovolt PG&E high voltage electric line that runs parallel to the UPRR tracks and crosses SR 25 adjacent to the at-grade crossing of the tracks.” The EIR’s effects analysis concludes that “some of the existing utility lines will be relocated” and that “replacement of the PG&E towers closest to SR 25 with higher towers” will be needed to maintain vertical clearance requirements.

PG&E is subject to the jurisdiction of the California Public Utilities Commission (CPUC) and must comply with CPUC General Order 131-D on the construction, modification, alteration, or addition of all electric transmission facilities (i.e., lines, substations, switchyards, etc.). In most cases where PG&E’s electric facilities are under 200 kV and are part of a larger project (e.g., highway project), G.O. 131-D exempts PG&E from obtaining an approval from the CPUC provided its planned facilities have been included in the larger project’s California Environmental Quality Act (CEQA) review. PG&E may proceed with construction once PG&E has filed notice with the CPUC and the public on the project’s exempt status, and the public has had a chance to protest PG&E’s claim of exemption. If PG&E facilities are not adequately evaluated in the larger project’s CEQA review, or if the project does not qualify for the exemption, PG&E may need to seek approval from the CPUC (i.e., Permit to Construct), taking as long as 2 years or more since the CPUC would need to conduct its own environmental evaluation (e.g., Initial Study).

PG&E therefore offers the VTA the following recommendations:

- Coordinate as early as possible with PG&E's Environmental Management on the development and review of required agency permits and authorizations
- Include impacted PG&E facilities in its project description and evaluate under CEQA all impacts caused by PG&E facilities relocation
- Include construction work and design of utility facilities impacted in any permits and authorizations required by resource agencies
- Coordinate with PG&E on plans to alleviate "temporary" impacts and avoid accidental impacts to PG&E facilities during construction.

The above recommendations could reduce the project's cost and schedule by avoiding the need for additional environmental evaluation or permitting for the relocation, replacement, and/or modification of PG&E facilities.

PG&E is committed to working with VTA on this project, while maintaining its commitment to provide timely, reliable, and cost effective electric service to its PG&E customers. Please contact Doug Edwards, Senior Land Planner, by telephoning (916) 923-7060 or emailing at DXEL@PGE.COM if you have any questions concerning our comments or recommendations.

Sincerely,

A handwritten signature in blue ink that reads "Lon Maier".

Lon Maier
Supervisor, Environmental Management, Electric Transmission



April 29, 2013

via email

Ann Calnan, Senior Environmental Planner
Environmental Programs and Resources Management
Santa Clara Valley Transportation Authority

Re: US 101 Improvement Project Between Monterey Street and State Route 129

Dear Ms. Calnan,

The Loma Prieta Chapter of the Sierra Club and the Santa Clara Valley Audubon Society thank you for the opportunity to submit public comments on the Draft Environmental Impact Report for the Valley Transportation Authority (VTA) proposed US 101 Improvement Project Between Monterey Street and State Route 129 (DEIR). Our organizations share an interest in the preservation of natural landscapes, biodiversity and habitats. We are concerned with the proposed project and its potentially significant effects on the environment. We do not believe the DEIR fulfills the requirements of the California Environmental Quality Act (CEQA) to address, disclose and mitigate the impacts of the proposed widening of US 101. In our comments, we express our concerns, request additional disclosure and analysis, and propose additional mitigation measures that would better protect our natural resources.

I. Incomplete Species List

The DEIR provides an incomplete list of special status species that may be impacted by the Project. Table 36 (Assessment of Special-Status Animal Species for their Potential to Occur Within the Project's Biological Study Area) does not include the California red-legged frog and California tiger salamander, although these species are discussed in the text of the document. Other species that should be included are: coast horned lizard, Swainson's hawk, least Bell's vireo, and legless lizard.

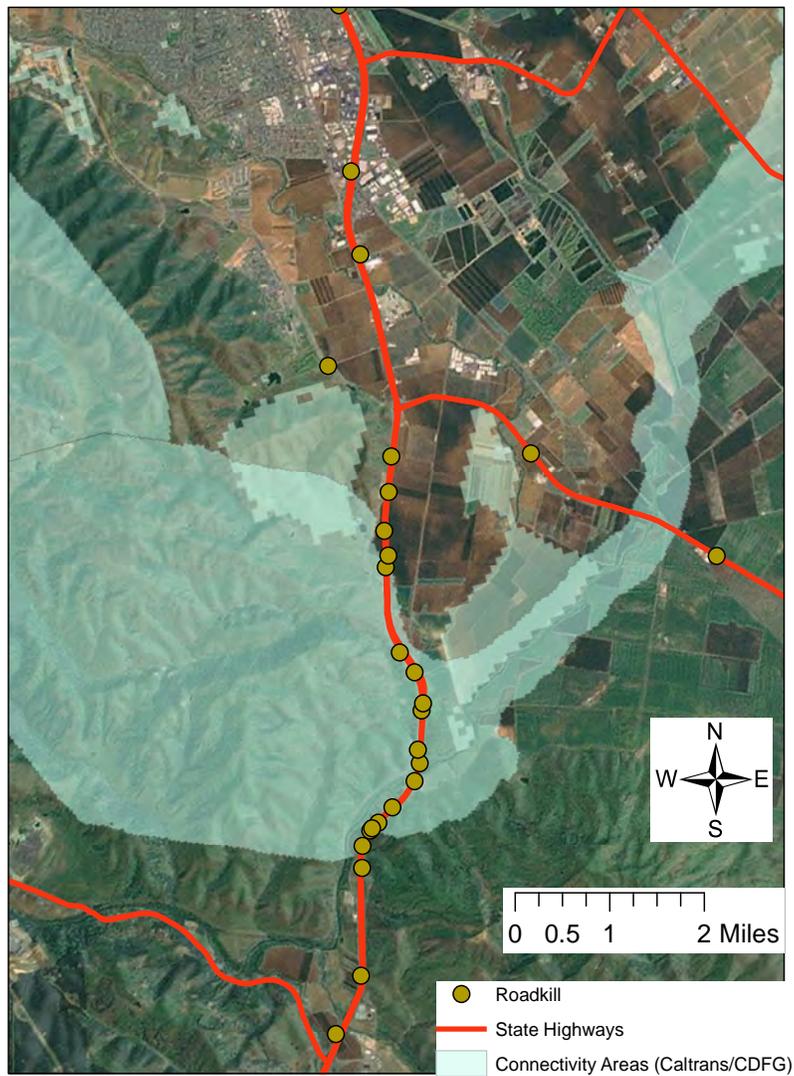
II. Impacts to Wildlife Movement

The importance of this region for wildlife movement and linkage between the Santa Cruz, Diablo, and Gabilan ranges via Lomerias Muertas is acknowledged in the DEIR, and has been documented by numerous agency and planning organization projects (Missing Linkages project, 2001¹; California Essential Habitat Connectivity Project (CEHCP),

¹ Missing Linkages Assessment, 2001. California Wilderness Coalition. www.calwild.org/linkages/

2010²). We asked Dr. Fraser Shilling, Co-Director of the Road Ecology Center at the University of California, Davis³, to provide us with a map of wildlife movement through the study area. The map he prepared (Figure 1) is based on research and documents from Caltrans and the California Department of Fish and Wildlife (CDFW). It clearly shows that US 101 at the project area cuts right through an area that Caltrans and the CDFW have designated as important for wildlife movement.

Figure 1: State highways and connectivity areas (Map by Dr. Fraser Shilling, UC Davis)



² California Essential Habitat Connectivity Project, 2010. Calif. Dept. of Transportation and Calif. Dept. of Fish and Game, 213 pp. www.dfg.ca.gov/habcon/connectivity

³ <http://roadecology.ucdavis.edu/>

We consider it unfortunate that the DEIR proposes inadequate mitigations rather than the incorporation of Best Management Practices (BMPs) for wildlife movement in the evaluation, design, construction, operations, maintenance, development of success criteria, and monitoring for this project. North of Gilroy, US 101 creates a formidable barrier to wildlife movement. The proposed project would extend this barrier south, all the way to highway 129. This would be a great loss to California's wildlife. We recommend these documents be consulted to better evaluate the project's impacts and reduce impacts:

- Vermont's Best Management Practices for Highways & Wildlife Connectivity⁴
- Wildlife Crossings Guidance Manual, California Department of Transportation⁵

The DEIR proposed mitigation for wildlife movement is haphazard, with little focus on the species to be impacted, design and placement of fences and crossings, monitoring to determine whether or not the goals of maintaining connectivity across suitable habitats will be achieved, or success criteria.

Specific information regarding the species of animals that were detected by remote camera and other surveys was not provided in the DEIR, nor were locations of animal detections described. It is stated that cameras surveys were conducted over a 4-month period. This may not have been sufficient to capture data from animals moving during breeding seasons and juvenile dispersal. Road kill information is also lacking in the DEIR.

The mitigations proposed for wildlife protection (and avoiding roadkill) and for wildlife crossing and connectivity are grossly inadequate and do not come close to what is currently accepted as Best Management Practices for wildlife connectivity. The DEIR proposes to:

- replace 2 existing pipe culverts with box culverts (one 90" in height; height of the other not specified)
- install 1 new culvert; unspecified design, "at least" 4 feet in height
- install new box culverts north of Hwy 25 (these are for flood flows, not designed for wildlife passage, and are of unspecified size or location)
- install wildlife fencing 0.25 miles south from Tar Creek and 0.25 miles north from the San Benito River to minimize animal movement onto the highway, and to install several one-way gates to allow egress from the highway
- clear vegetation from in front of existing culverts

We do not consider these mitigations adequate to reduce impacts to wildlife movements in this important linkage area to a level of less-than-significant, and ask for a re-evaluation of project design to allow for adequate wildlife connectivity:

1) MM-NATCOM-3.1 proposes to maintain existing standard fencing and three-beam barrier north of Tar Creek. Because this does not result in any improvement in conditions

⁴ Vermont's Best Management Practices for Highways & Wildlife Connectivity. 2012.

⁵ Wildlife Crossings Guidance Manual. 2009. California Department of Transportation www.dot.ca.gov/hq/env/bio/wildlife_crossings

for wildlife movement, it should not be considered a mitigation measure. Furthermore, the DEIR erroneously states that wire mesh and barbed-wire fencing will not inhibit wildlife movement. This is only true if the fence is no higher than 42", and has a smooth bottom wire; no lower than 16" from the ground⁶.

2) The DEIR does not rely on state-of-the-art BMPs and design criteria to allow adequate wildlife crossings. It is not clear that the proposed box culverts are favorable for movement of all affected wildlife species. For example, underpasses for deer should be at least 20 feet wide and 8 feet high, and deer should be able to see the horizon as they go through the underpass⁷. Location, substrate, internal light and vegetation are all important considerations for design of wildlife undercrossing structures and of course – locations are of critical importance.

Focal species need to be identified, and references need to be cited to assure that crossing designs utilize the best available information regarding species' needs.

3) In the approximately 5 ½ mile distance between Hwy 25 and the San Benito River there are 2 stretches of over 2 miles with no undercrossings. More undercrossing structures must be provided, designed and located specifically as wildlife crossings, not primarily as flood control structures with utilization by wildlife as a secondary consideration. Existing culverts will be virtually unusable during periods of high flows. Wildlife crossing structures should be placed in locations with little human traffic or access, and where wildlife movement is favored by habitat and topography. Bridges, as well as culverts, may need to be re-designed to facilitate animal movement. The Caltrans/Calif. Dept. of Fish and Game 2010 CEHCP suggests spacing of crossing structures suitable for large animals such as deer at one per mile, and culvert-type structures suitable for small animals such as amphibians and small mammals at one per quarter-mile.

4) Success criteria should be specified in the Final EIR, and Project plans must include ongoing monitoring of undercrossings, with funding available for remediation if they are not used by all impacted wildlife species. Monitoring of crossing locations should be conducted both before and after structures are installed so that effectiveness can be assessed. Maintenance of culverts or other crossing structures also needs to be included in project plans.

5) Wildlife barrier fencing adjacent to Tar Creek and the San Benito River should be extended. The proposed one-quarter mile barrier fencing is not a sufficient distance to guide animals away from the highway to the creek crossings. A more thorough assessment of topography, habitat, and animal use of the locations is needed to determine

⁶ A Landowner's Guide to Wildlife Friendly Fences, 2nd ed., 2012. Montana Fish, Wildlife and Parks, 56 pp.

⁷ Habitat Guidelines for Mule Deer, California Woodland Chaparral Ecoregion, 2007. Western Association of Fish and Wildlife Agencies, 52 pp. www.muledeerworkinggroup.com

appropriate fence length, north and south of both drainages, and at a minimum, fencing should stretch several miles on both sides of the crossing.

6) It is stated in the DEIR that new median barriers will be installed where they do not currently exist. Solid median barriers make it virtually impossible for an animal to get across the highway. Thrie-beam barriers, as are to be maintained north of Tar Creek, or other median structures that allow animal movement, should be used throughout the project site.

We ask for the project to incorporate a comprehensive set of BMPs in evaluation, design, construction, operations, maintenance, defining success criteria and monitoring. At the very least, design should include and specify locations for:

- Fences several miles long on each side of each crossing.
- At least four (4) crossing structures to accommodate large mammals, with no more than one mile between large crossing structures, and no more than one-quarter mile between crossing structures appropriate for small animals.
- For constructed crossings to be effective in maintaining wildlife connectivity, mitigation should include permanent protection of suitable wildlife habitat adjacent to the crossings.

III. Proposed Mitigation for Biological Resources

For virtually every potential impact on wildlife species and habitats, the proposed mitigation is either reliance upon payment of fees to the Santa Clara Valley Habitat Conservation Plan / Natural Communities Conservation Plan (SCVHCP), or, if that is infeasible, purchase of credits in an unidentified mitigation bank that serves the project area, or if no banks or credits are available, development of unspecified project-specific mitigation. The SCVHCP provides a permit from the wildlife agencies for the ‘take’ of several listed species. It should not be used as blanket coverage for any and all impacts to biological resources. This nebulous plan for mitigation for the many potential impacts of the project is not acceptable. Deference of a clear mitigation plan until after approval of the EIR violates the disclosure intent of CEQA. The DEIR also needs to include mechanisms for monitoring and funding, as well as success criteria and enforceable remediation should goals not be achieved.

Exclusive Reliance upon the SCVHCP is inappropriate because:

- 1) At this time, the participating partners in the SCVHCP have approved the plan. However, implementation is still conditional upon agreements that may or may not be achieved, an implementation body has yet to be created, and the SCVHCP has yet to secure a “take” permit for the covered species from the California Department of Fish and Wildlife and the US Fish and Wildlife Service.
- 2) The SCVHCP does not cover all species and habitats that would be impacted by this project: (the only mammal covered is the San Joaquin kit fox; not badger, special status bats, or ringtail - a Fully Protected species). Impacts to habitat of special status species, including the American badger and other California Species of Special Concern need to

be addressed under CEQA. The only mitigation provided for the badger are steps to avoid disturbance of maternity dens during the pupping season, and eviction of badgers after the pupping season. For a number of species, including special status birds and ringtail, no mitigation for loss of habitat is proposed, based on the unsubstantiated assumption that low numbers of animals will be impacted. Mitigation for habitat loss of badgers and other special status species is needed.

3) Species without special status are not covered by the SCVHCP, but impacts to movement corridors for all species need to be addressed under CEQA.

4) Although it is stated in the DEIR that regulatory agencies are likely to accept mitigation through SCVHCP for impacts to special status species that occur in San Benito County, there is no assurance that this is the case, nor that it is legally defensible to do so. A separate Habitat Conservation Plan may be needed for take of listed species in San Benito County, as well as additional avoidance and mitigation measures for other impacts covered under CEQA.

The mitigations proposed as alternatives if payment of fees to the SCVHCP is infeasible are inadequate. Creation or restoration of sensitive habitats, riparian, wetland, and oak woodland needs to be achieved prior to impacting existing habitat, or permanent protection of additional existing habitat is needed to compensate for temporal loss of habitat. Similarly, roosting or other habitat occupied by special status species, including bats and burrowing owls needs to be created and successfully used by the species in question before habitat is impacted on the project site.

In lieu of SCVHCP participation, proposed mitigation for loss of burrowing owl habitat is creation of burrows and management of foraging habitat at a ratio of 6.5 acres per unpaired owl or owl pair. In 2012, CDFW issued new guidelines for burrowing owl mitigation that specifically acknowledges the older one(s) are ineffective and no longer acceptable to CDFW. The alternative to mitigation via the SCVHCP should follow the 2012 CDFW Staff Report on Burrowing Owl Mitigation⁸

Several detention basins are proposed near the highway. These may attract wildlife, including California red-legged frogs, tiger salamanders, and western pond turtles, and may increase the potential for road mortalities. This potential impact needs to be addressed.

Impacts of loss of riparian habitat and wetlands (NATCOM-1, WET-1) are not limited to the endangered species that are covered by the SCVHCP – the impacts are to beneficial uses of as described in the Basin Plan for the stream. The project must secure permits from the US Army Corps of Engineers and the California Water Quality Control Board (404, 401), and may require increasing efforts to avoid or minimize the Project's impact, and to provide local mitigation in addition to or in lieu of payment to the SCVHCP.

⁸ Staff Report on Burrowing Owl Mitigation. 2012. California department of Fish and Wildlife <http://www.dfg.ca.gov/wildlife/nongame/docs/BUOWStaffReport.pdf>

The SCVHCP does not provide mitigation for loss of Oak Woodland (NATCOM-2), since the species covered by the plan do not utilize oak woodland habitat. Payment to the SCVHCP does not provide in-kind mitigation.

Impacts to fish species are not covered by the SCVHCP. The project could potentially have a significant impact to Pacific Lamprey and Monterey Roach, and thus requires the development of specific mitigation measures and a permit from National Marine Fisheries Service (NMFS)

IV. Growth-Inducing effects and Other Impacts

The DEIR acknowledges that the project will have a direct and significant growth-inducing impact if and when the application for the massive El Rancho San Benito (ERSB) new community development project is approved. The approval of the ERSB project is conditioned upon the widening of U.S. 101 (Impact GR-1). Because of this direct dependency, this project's EIR needs to include disclosure of all the reasonably foreseeable potential impacts of ERSB including impacts to special status species and habitats, wildlife movement corridors and other biological resources; air quality; hydrology and water quality; climate change; regional traffic, etc. The fact that the ERSB project proponents (DMB) are helping to fund this Highway 101 widening project underscores the link between the two projects.

In the DEIR, it is stated that the "The project's indirect effect on the rate, location, and/or amount of future growth will not be substantial." (Impact GR-2). We do not agree. The DEIR for the San Benito County 2035 General Plan, now available for public review, makes provisions for "New Communities" in the northern part of the County, several of them adjacent to Highway 101. Among the New Community Location Requirements listed is that "They are accessible to existing major transportation routes and corridors, such as State highways..." It is reasonable to assume that, like the ERSB development, other "New Communities" placement near Highway 101 will depend upon this widening project.

The DEIR contends that the project is not expected to have significant impact on air quality in the region. We believe that more information is needed to substantiate this assumption. Air pollutants from Highway 101 in the Coyote Valley of Santa Clara County, and their impact on listed species triggered the need for that County's HCP. Widening of Highway 101 and resultant increases in traffic in this project site may have similar effect.

Cumulative impacts of this project on biological resources, air quality, water quality and hydrology, and noise have not been addressed adequately.

Impacts of increased traffic volumes on biological resources, air quality, water quality and hydrology, and noise have not been addressed adequately.

Conclusions and Recommendations

We oppose approval of the DEIR in its current form. We believe that the project as proposed will result in significant impacts to wildlife movement corridors and to special status species. At a minimum, Best Management Practices for wildlife movement corridors should be incorporated into the project design; whether these could reduce impacts to wildlife movement to a level of less-than-significant cannot be determined with the information that has been provided. Impacts to species that are not covered by the SCVHCP need to be disclosed, analyzed and mitigated. Mitigation for impacts to all biological resources need to be developed for San Benito County portion of the project, and alternative mitigation for species covered by the SCVHCP needs to be developed for Santa Clara for the potential risk that the SCVHCP is not implemented, or the implementation is delayed.

Growth inducing impacts and cumulative impacts of the project require further study and analysis, as well as impacts to air quality and climate change. While we recognize the problem of traffic congestion throughout the region, investing in mass transit systems and community planning to reduce sprawl of urbanized areas offer better long-term solutions than continuing to widen and expand our existing highways.

We thank you for the opportunity to comment on this DEIR. Please do not hesitate to contact us if you have questions.



Heyward Robinson
Conservation Chair
Sierra Club Loma Prieta Chapter



Shani Kleinhaus
Environmental Advocate
Santa Clara Valley Audubon Society

From: Omar Chatty [<mailto:omarchatty@mindspring.com>]
Sent: Monday, April 29, 2013 5:01 PM
To: 101_Widening
Subject: Quick additional comments on US101-SR129 Widening Project EIR

Hello,

In addition to my comments made at the March 28, 2013 public meeting, I would like to encourage, restate and emphasize the following:

This document is excellent in its breadth, depth, thorough, and comprehensive detail from not only environmental perspectives, but also human issues, and animal protection and road safety.

This EIR ought to make Caltrans and VTA management very proud of its excellence as produced by VTA and Caltrans staff.

In peer conferences such as ASHTOO and ASCE and others, I would recommend this as a template model for other jurisdictions to use as a baseline of completeness and environmental sensitivity while exercising the best in engineering standards for highway construction in the 21st century.

This EIR should serve as a baseline model for a future direct SR130 route from San Jose to Interstate 5, where environmental considerations, such as those exhibited here, are of paramount importance.

A key point of this project from a financial and human sensitivity perspective is that it has no economic dislocation outcome due to the wrong-headedness of Toll Road or Toll Lane. This road must be funded by existing motorist-generated sources.

Regards,

Omar Chatty

Member of a number of Transportation organizations and Taxpayer watchdog groups.

US 101 Improvement Project

Comment from Jesus Cisneros

I want to tell them that if they are going to connect 25 to Santa Teresa, it should go straight through. I have seen lots of accidents and there are a lot of students who come from Castroville who can use this.

From: Richard Cripps [<mailto:richard.cripps@gmail.com>]
Sent: Tuesday, March 12, 2013 12:51 PM
To: 101_Widening
Subject: 101 Widening between Monterey St and 129

I'm all for it. That is a very dangerous section of road that carries way too much traffic. The 25 interchange is a joke. Anyone trying to go Southbound 25 to 101 is out of luck because of traffic. 25 merge to Northbound 101 is Russian Roulette. Improvements along that entire corridor are definitely needed.

Rich Cripps

--

750 Babbs Creek Drive
Gilroy, CA 95020

Things that need to be commented on for the US101 Highway/SR25 improvements

1. Add comments that the 100 year flood map does not include our property 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001, 80822007, 80822008, 8082115, 8082114, 8082113, 8082127, 8082126, 8082128, 8082129, 8082130, 8082131, and 8082133 all had ~2ft. of standing water on our properties in the 1986 flood. The design team needs to make sure that the additional flood water coverts will be large enough to handle more than just an 100 year storm because in 1997 the only reason we didn't get flooded again was that the Carnadero Creek over ran its banks near where it meets the Pajaro River and relieved the Canadero Creek and only the end of Monterey frontage road had got flooded by the highway 101 bridge. This was a close call for us just eleven years from the previous flood. Another point that needs to be considered is that debris from the Carnadero Creek that flows down the steam during heavy storms and can plies up under neat the W Luchessa Ave bridge and the highway 101 bridge. This is due to Santa Clara water district not cleaning up the over growth vegetation of the Carnadero Creek banks and creek bed, which was one of the conditions they said they going to do when we give up property easements in the year 1987 so that the Corp of Engineering would built the levee on the west side of City of Gilroy. The Carnadero Creek banks and creek bed have not been maintained and this is the existing condition.
2. Add comments that all property owners of parcels including our property 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001 want the sound wall SW2. Note that because of the existing 101 highway bridge overpass of southern pacific RR tracks higher elevation and the existing Truck stop on the eastern side of high way 101 the large semi-trucks are using their air operated Jake to slow down instead of applying their conventional brakes which creates a large amount of excessive noise at all times of the day. Another point is that the vegetation along highway 101 in front of our properties have grew to a level that acts as addition sound barrier to our 40 year old Pine/Walnut/Sequoia/Oak trees and looking at your plans to build an retention wall on the west side of highway 101 would probably remove that vegetation hence more noise problems.
3. Add comment that we are opposed about proposed Bike path behind our properties 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001, 80822007, and 80822008. We give up property easements in the year 1987 of 50 feet from the middle of Canadero Creek across the back of our properties so that the Canadero Creek would be able to be cleaned of over growth vegetation. The Corp of Engineering would not have built the levee on the west side of City of Gilroy without these property easements being granted and the cleaning of the over growth vegetation has not been maintain. To build the proposed Bike path behind our properties 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001, 80822007, and 80822008 the existing trees and old growth vegetation along the Canadero Creek banks would be disturbed and fences would need to be taken down along property lines. We feel that the city of Gilroy and this project should use the existing right of way on Farman Ln dirt road that can be used to reach the same end point of the

bike path at highway 101/ Canadero Creek bridge and would cost less than trying to follow the twisted Canadero Creek banks behind our properties 5725 MONTEREY FRONTAGE ROAD PARCEL #80822002 and the properties adjacent properties #80822003, 80822012, 80822013, 80822001, 80822007, and 80822008.

From: JLucas1099@aol.com [mailto:JLucas1099@aol.com]

Sent: Monday, April 29, 2013 4:07 PM

To: 101_Widening

Subject: DEIR US 101 Improvement Project Monterey Street to State Route 129 - comment

VTA Environmental Programs/Resources Management Department
Attention: Ann Calnan
3331 North First Street, Building B-2
San Jose, CA 95134-1927

April 29, 2013

RE: DEIR US 101 Improvement Project Between Monterey Street and State Route 129

Dear Ann Calnan,

In regards VTA's proposed project to widen #101 between Monterey Street in Gilroy to State Route 129, I would like to submit comment, with a qualification that I have not attended Pajaro River task force meetings recently and so do not know present status of COE flood control designs in this particular reach of the river.

In that Pajaro River has been said to have the most extensive acreage of upper watershed of any California river system, it would appear that with eight tributaries joining Pajaro's main channel in this 101 project area that San Francisco District Army Corps of Engineers's flood control design must be given the top priority.

Figure 16 of a Google map of FEMA 100 year Pajaro River, San Benito and San Juan Creeks' floodplain in San Benito County gives some idea of flood flows to be contended with in project area. It would suggest to me that generous setback levees would perhaps be the only feasible flood control design.

COE flood control criteria cannot come in after the fact and so not to have it front and center in this DEIR is a deficiency. There is also the constraint of the railroad line that flood control must accommodate. 101 upgrade is the more flexible element of infrastructure in project area.

At a SCVWD workshop last Thursday FEMA staff acknowledged that their flood maps do not account for back to back storm systems as with a Pacific Ocean pineapple express weather front or for any increased intensity of storm systems that might be anticipated due to climate change or global warming. Therefore, it might be prudent for this DEIR to reference FEMA 500 year floodplain parameters rather than 100-year ones.

On DEIR biological study area maps it appears that magenta purple areas designate riparian removal. This impact would result in critical loss of riparian corridor flood retention capability as well as critical habitat loss. Please avoid this impact entirely in the proposed #101 project design. Do not believe such an impact can be mitigated except by replanting riparian corridor on site. In high water, biofiltration strips and swales provide no retention capability. They can only improve water quality by filtering out freeway contaminants.(2.10.5)

In regards Threatened and Endangered species, the proposed loss of riparian SRA by this project design, will have a cumulative impact on water temperature in the Pajaro River and all its tributary steelhead streams such as Llagas, Pacheco, Uvas/Carnadero and Tar Creek. Gavilan and Tick Creeks will be contributing more warm waters due to their loss of riparian cover. San Benito River may also suffer degradation of SRA habitat. As steelhead travel in cooler conditions and at night they are not always observed in a stream system so a conservative design should be a preferred management protocol. (Please note that in implementing #85 flyover with #101 at Bernal Road and Coyote Creek in 1992 Caltrans dryback killed off all fish by flawed plan).

At some point in DEIR read that mitigation for impacts to steelhead would be through payments to Santa Clara County HCP mitigation bank. Fisheries are not included in final Santa Clara County HCP so this is invalid option. Also, this reach of Pajaro River, if sufficiently degraded with warm water, can so stress the indigenous run of steelhead as to affect their health and reproductive capability. (2.17.5).

Cumulative impacts on the species need to include aforementioned COE flood control project's loss of SRA for the Pajaro River system, as it has been ongoing for over a decade with all affected jurisdictions. Do not find cumulative impacts sufficiently addressed or an alternative of avoidance of impact seriously considered.

Wetlands are not sufficiently clear as to location on biological study maps so cannot comment on extent of impacts. Perhaps on further study I will be able to understand this element appropriately.

The Figure 21 Potential Wildlife Movement Pathways is one of the most important considerations in the #101 Improvement Project. It clearly illustrates how the project area is crossroads for wildlife from Diablo Range, Santa Cruz Range, Gabilan Range and Lomerias Muertas. This can mean essential revitalization of gene pools for all species of the region, as well as sustaining migratory flight paths for butterflies, hummingbirds and a myriad of birds of the Pacific Flyway. Native grasslands and oak woodlands are equally important to be preserved in and adjacent to project and natural bridges need to be designed to provide crossover facility to allow large animals like elk and kit fox, as well as small mammals safe continuity of wildlife corridor.

Culverts serve opportunity for interrange exchange but provide predators with exceptional hunting options so not ideal. Also, in 1980 public hearings on #101 upgrades along Coyote Creek, horsemen/horsewomen were promised equestrian underpasses which were never implemented. Believe natural bridge could accommodate either man on horseback or man leading horse. Precedent would be De Anza Trail implementation facility. Believe that Canada has designed exceptionally appealing natural bridges so please reference them here.

Other studies that might be included in this DEIR is the nitrogen deposition study that evaluated conversion of native grasses and incursion of invasives into natural grassland communities due to emissions from increased auto traffic, and archeological/paleontological studies that have recently unearthed camels as well as mammoths in region.

Geology element needs to provide stronger evaluation of geologic and plate tectonic impacts on Pajaro River watershed and channel evolution. Believe Coyote Creek once flowed into Pajaro and some other major river system is supposed to have dug out Monterey Bay's canyon, but not through here? Reason I feel this might be important is that whole nest of earthquake faults seem to focus on this crossover point of mountain range which might imply that upgrade design needs to be as resilient as possible to natural catastrophe.

Finally, please restore as much riparian forest as possible for flood retention capabilities as well as for under flow supplied by tree roots and prevention of erosion. Trees should be noise reduction element, rather than sound walls which would only augment flood hazards both on and adjacent to freeway.

Thank you for consideration of these concerns.

Libby Lucas
174 Yerba Santa Ave.,
Los Altos, CA 94022

From: Emily Renzel [<mailto:marshmama2@att.net>]

Sent: Monday, April 29, 2013 6:08 PM

To: 101_Widening

Subject: I agree 100% with Libby Lucas

Dear Ann Calnan: I completely agree with the comments submitted by Libby Lucas re widening 101 from Monterey Street in Gilroy to Highway 129.

Sincerely, Emily M. Renzel, 1056 Forest Avenue, Palo Alto, CA 94301 and also of San Juan Bautista (so I use this stretch of 101 regularly).

MARCH 2, 2013

ANN CALNAN

VTA, SANTA CLARA COUNTY

DEAR MS. CALNAN,

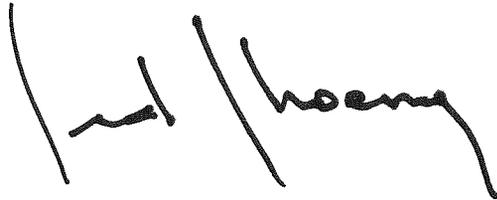
WE WOULD APPRECIATE YOUR CONSIDERATION IN THE DESIGN OF AN INTERCHANGE FOR S.H. 152 AT THE PRESENT INTERSECTION OF U.S. 101 AND S.H. 25 FOR TRAFFIC TRAVELING NORTH AND EAST OVER THE PACHECO PASS. THIS WOULD HELP ALLEVIATE THE PRESENT AND FUTURE TRAFFIC IMPACTS ON NORTHERN SAN BENITO COUNTY, ESPECIALLY THE SMALL HISTORIC MISSION TOWN OF SAN JUAN BAUTISTA AND THE FARMING COMMUNITY OF THE SAN JUAN VALLEY.

NONE OF THE INTERSTATE TRUCK TRAFFIC TRAVELING EAST OR WEST, NOR MOST OF THE COMMUTER TRAFFIC USING S.H. 156, STOPS IN SAN BENITO COUNTY.

UTILIZING HIGHWAY TAX DOLLARS DESIGNATED FOR S.H. 156 COULD BE BETTER SPENT SUPPLEMENTING YOUR U.S.101 FUNDING.

YOUR CONSIDERATION OF KEEPING INTERSTATE TRAFFIC
ON U.S.101 WOULD BE GREATLY APPRECIATED AND
WOULD SAVE THE TOWN OF SAN JUAN BAUTISTA.

SINCERELY,
TED THOENY P.E.

A handwritten signature in black ink, appearing to read "Ted Thoeny". The signature is written in a cursive style with a large initial "T" and a long, sweeping underline.

MAP ENCLOSED

North San Benito County System Analysis Study Area



PUBLIC COMMENT

Next Meeting

Subject: Re: U.S. 101 Improvement Project - Draft Environmental Document Available

From: Joseph Patrick Thompson (translaw@pacbell.net)

To: Ann.Calnan@vta.org;

Cc: pwoodward@terra-law.com; vghollister@sbcglobal.net; askmike@garlic.com; president@gilroyedc.org; editor@gilroydispatch.com; editor@freelancenews.com; editor@morganhilltimes.com; kyancey@losbanosenterprise.com; newsroom@thecalifornian.com; info@sanjuanstar.net; info@sanbenitocog.org;

Date: Thursday, March 14, 2013 11:49 PM

CHAMBER BOARD AND EDC BOARD - NEXT MEETING

Dear Ms. Calnan,
Yes. Thanks for sending me the notice. I will submit a response as I did previously on Hwy 101, 25, 152 proposals.

Joseph P. Thompson
Past-Chair, Legislation Committee, Transportation Lawyers Assn.
(408) 848-5506

PS,

Based on VTA's conduct, one would think you had your own window on the ground floor of the Capitol. It's no wonder why VTA earned "worst in the Nation" ranking among your peers from the MIT Study of all the Nation's transit agencies. It is obvious why the Editorial Board of the Gilroy Dispatch has voted to terminate the VTA. I second their motion, again.

Joe

[Handwritten signature]

JPT + GRC Too.

From: "Calnan, Ann" <Ann.Calnan@vta.org>
To: 101_Widening <101_Widening@vta.org>
Cc: 101_Widening <101_Widening@vta.org>
Sent: Thursday, March 14, 2013 11:14 AM
Subject: U.S. 101 Improvement Project - Draft Environmental Document Available!

Good morning/afternoon,

Attached is the Notice of Availability of the Draft Environmental Impact Report (EIR) for the **U.S. 101 Improvement Project (Monterey Street to State Route 129)** prepared in accordance with the California Environmental Quality Act. The Notice provides a brief description of the project and the location and time for the public meeting. The public meeting serves to provide information and answer questions about the project, and to accept comments on the project as part of the formal environmental review process. All comments received on the project at the public meeting and during the public review period will be addressed in the Final EIR. **The public review period begins on Thursday, March 14, 2013 and ends on Monday, April 29, 2013 at 5 PM.** You may submit your comments via e-mail (101_Widening@vta.org), facsimile, postal mail, or at the public meeting. Details are provided in the attached Notice. (Note that the Notice is in multiple languages.)

The Draft EIR and technical reports are available to download from this ftp site:
http://www.vta.org/cma/environmental_public/101_Improvement.Project/

Compact disks (CDs) or hard copies of the Draft EIR are available upon request. Please call

VTA - ROAD TO SEPT VOM LIKE USSR

LOS BANOS MAYOR CALLED VTA "DIRTY GOVERNMENT"

I CALL IT UNCONSTITUTIONAL

VTA Community Outreach at (408) 321-7575 or send an email to community.outreach@vta.org.

Thank you!



Ann Calnan / Senior Environmental Planner
Environmental Programs and Resources Management / Santa Clara Valley Transportation Authority
3331 North First Street, Bldg. B-2 / San Jose, CA 95134-1927
<http://www.vta.org/>

JOSEPH P. THOMPSON
Attorney at Law
8339 Church Street, Gilroy, CA 95020
Post Office Box 154, Gilroy, CA 95021-0154
Telephone (408) 848-5506; Fax (408) 848-4246
E-mail: TransLaw@PacBell.Net

July 3, 2005

Fax: 408-321-5787
Mr. Tom Fitzwater
Valley Transportation Authority
Environmental Planning
3331 North First Street, Bldg. B
San Jose, CA 95134-1927

Re: Proposed Don Pacheco "Y" Project & Community Response Opportunity

Dear Mr. Fitzwater,

Referring to the VTA's invitation for public comment regarding the proposed interchange improvements for the intersection of State Highways 152 & 156, please refer to my letter to your predecessor five years ago (copy enclosed).

Also, please find enclosed my position paper offered in response to your request.

Thank you for the opportunity to give you my opinion regarding the proposed project.

Due to the voluminous content of my response, I will not send it by fax, but rather, by mail only. If there are questions, please do not hesitate to contact me.

Very truly yours,

Encl.

JOSEPH P. THOMPSON

cc: Hon. Don Gage, Santa Clara County Board of Supervisors
cc: Hon. Reb Monaco, San Benito County Board of Supervisors
cc: COG Directors
cc: AMBAG

**Don Pacheco Y 2005: A Transportation Business and Logistics Perspective
on the Proposed Highway 152 & 156 Intersection Changes**

by

Joseph P. Thompson, Esq.

PHOTO AVAILABLE UPON REQUEST

Aftermath of a head-on collision between a big-rig and a school bus on State Highway 152, Gilroy, California, April 1994. Transportation planning must include consideration of the movement of goods and people.

This reply, like the last one I wrote to the Valley Transportation Authority (VTA) regarding the proposed widening of U.S. Highway 101 between San Jose and Morgan Hill, is made in VTA's request for public comment to the proposed changes in the intersection of State Highways 152 & 156, known as the "Don Pacheco Y," in Santa Clara County, California. A copy of my last paper, which was published in local newspapers and Chamber of Commerce papers, is attached hereto as Exhibit "A."

The Author

I volunteer this paper as a transportation policy student, not on behalf of any client, or for any association or organization to which I belong. For some time now I have been doing post-doctoral study of transportation policy at the Norman Y. Mineta International Institute for Surface Transportation Policy Studies at San Jose State University, the Transportation Research Board at Georgetown University, and at the Library of Congress. I was formerly a member of the Government Review Councils of the Gilroy and Hollister local chambers of commerce. I am the past-president of the Gilroy-Morgan Hill Bar Assn., and past-president of Vineyard Estates Mutual Water Co., Inc. I am the founder of Abraham Lincoln Learning Fortress for Responsible Enterprise Education-SBC Small Business Incubator, and have served as a member of the Executive Committee of the Debtor-Creditor-Commercial Law Section of the SCCBA. I am a member of the Conference of Freight Counsel, Citizens for Reliable and Safe Highways, Citizens Rail Advisory Committee of San Benito County, Association for Transportation Law, Logistics & Policy (ATLLP), Transportation Lawyers Association (TLA), Safe Kids Coalition, Gavilan Employers Advisory Council, and other professional organizations within the geographical region of the proposed project. I am a candidate for the American Society for Transportation & Logistics (AST&L). In 1997 I received the National Directors' Best Research Paper Award from the AST&L. For more than 42 years I have been engaged in the transportation industry either directly as a truck dispatcher, intermodal facility supervisor and railroad complaint clerk or indirectly by representing carriers and their customers on the Central California Coast before federal and state courts and agencies as an attorney in the private practice of transportation law. My reply is my personal opinion and should not be viewed as that of any organization or association to which I belong, and I am solely responsible for its content.

Summary

Focusing on the movement of goods through the Don Pacheco Y, and to and from the Central California Coast Region, I conclude, as I have previously, that the Region needs an intermodal facility. Movement of people and goods in the arteries of commerce inevitably increases when obstacles are abated, yet shippers and receivers in this Region lack a viable option to highways for their traffic. We must afford our commerce an economical and efficient option that presently existing technology has achieved in intermodal TOFC/COFC service.

Background

I here restate what I said to VTA about the U.S. 101 widening project, and refer the reader to Exhibit "A."

History

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Today

Today is worse than the "today" I described in my last paper. Why? What is the explanation for our extravagantly-funded MPO's failures? Why do we spend so much tax money furnishing the MPO's like VTA, AMBAG, MTC, TAMC, COG, SCCRTC, etc., with unlimited resources of highly compensated personnel and incomprehensible sums, yet see conditions in the highway arteries of the Region, State, and Nation, deteriorating? What are we doing wrong?

Again, I refer the reader to my earlier paper (Exhibit "A") for my analysis.

Overall, I explained the structural flaws in our transport policy in my paper, "ISTEA Reauthorization and the National Transportation Policy," 25 *Transportation Law Journal*, pp. 87-*et seq.* (1997), which was published in shortened version as "ISTEA Reauthorization and the National Transportation Policy: Overlooked Externalities and Forgotten Felt Necessities," *Transportation Lawyer* (Dec. 1997). Since then, other commentators have ventured comparable analyzes. For example, Eno Transportation Foundation CEO & President Tom Downs, in a recent speech to the American Society of Civil Engineers in Baltimore, said: "The reality of this issue is that our country has needs that transcend the needs of any individual state, but parochial greed will outweigh national purpose every time. The real problem is that it means that the program is just about revenue distribution, and not about national transportation needs. The forces behind this movement are so emotional and greed driven that I do not have much hope for a resolution that benefits the entire country."

The flaws identified by knowledgeable transportation people like Mr. Downs undermine our Region's ability to achieve sound, sustainable transportation solutions.

VTA and other MPO's waste so much money on irrational mass transit solutions that their greed make the Robber Barons seem like altar boys in comparison, yet our MPO's politicians and advocates describe such waste as "success." Is it really "success," or dreadful failure? It depends upon whether one is receiving the transit subsidies, or paying them.

Intermodal Options

What I said in the last paper is just as true today. "Neither Silicon nor Salinas Valleys have intermodal facilities. San Jose has the distinction of being the largest urban area in

debate and forests of paper on how to achieve the best solution, private or public, but until we do, we will see future generations paying for this schizophrenic transportation policy, which I believe is the fundamental reason why we have arteriosclerosis in our arteries of commerce. Better minds than mine have reached this conclusion. For example, our former Mayor and Congressman, recently nominated by the President to become our next Secretary of Commerce, said in 1995: "The crucial question in transportation today is: What should government do? And what should it leave to others?" Quoted with my earlier thoughts on this in "ISTEA Reauthorization and the National Transportation Policy," 25 *Transportation Law Journal* 87-*et seq.* (1997).

This project, as all others, will not happen in a vacuum. National and international forces will affect it. We may see, for example: (1) fuel prices continue to increase, (2) commercial drivers hours of service regulations modified to worsen the Nation's driver shortage, (3) vehicle weights "harmonized" with those of our NAFTA "partner" Mexico (107,000 lbs. vs. our present limit of 80,000 lbs.), (4) long combination vehicles (LCVs), i.e., triple short trailers and "freeway doubles" 2-53 footers, nationwide, or rather, throughout North America under NAFTA's transportation "side agreements," and (5) more axles bearing greater concrete-cracking, bridge-buckling loads. Legislation now pending in Congress may make some of these developments arrive on our highways in the near future." With TEA-21 reauthorization in the hands of the Congress, and our policy flaws unchanged, I see no hope to the deteriorating conditions. The MPO's leaders will continue to hopelessly tax people out of their cars as they Sovietize American transport policy.

Recommendations

My recommendation to our leaders at VTA, and the other MPO's, and their so-called "senior transport planners," who have co-opted the term "intermodal" to mean something entirely different than what earlier generations of transportation men understood it to mean, is the same as before:

"When there were more than 100 Class 1 railroads, the Nation had more than 2,000 intermodal facilities. Today we have 5 Class 1's and about 200 intermodal facilities. To garner 10% of our Nation's freight revenue (trucks currently take 77%), the railroad industry has been forced to contract to stay profitable. Although it takes four times as much fuel to move a ton with rubber tires over concrete highways than with steel wheels on steel rails, and although air pollution is vastly greater from one fully-loaded "big rig" than from an automobile, I do not see anyone at our MPOs promoting our intermodal options. Even studies like Jack Faucet & Associates 1995 *Freight Study* for AMBAG and Barton-Ashman Associates 1992 *I-880 Intermodal Corridor Study: Truck Travel in the San Francisco Bay Area* for Caltrans District 4 and Alameda County miss their mark or, sadly, are disregarded by our MPOs. I believe that it is wrong to restrict our senior

North America without one. The closest ones are located in Richmond on the ATSF-BN and in Lathrop on the UP. Business must cope with the congested I-880 corridor to get traffic from our Region to ATSF-BN's ramp, or dray loads over the Gabilans through Pacheco Pass or Sunol Grade and Altamont Pass to catch UP's Lathrop intermodal facility. The former intermodal facility site on the SP at Taylor and Coleman Streets in San Jose is for sale. The former intermodal yard in Salinas adjacent to the Amtrak Station off Market Street has been partly built upon. UP, SP's successor by merger, offers no intermodal service from this Region. *Union Pacific Railroad Company, Exempt Circular 20-B: Governing Publication of Rules and Charges Applying on TOFC/COFC Shipments* (12/1/1997). So, as a result, the westbound tonnage to the Region moves primarily by highway, and the eastbound tonnage, mostly produce from the Salad Bowl of America--Salinas Valley, also goes by truck. These commodity flows are constantly increasing, along with the population of motorists competing for space on the subject route, among others, e.g., State Highways 152, 156, 129, & 25. Increasing the capacity of the 101 corridor will, like a wider drain, draw more of the same flows. How long can this go on?" Well, it is still going on today in 2005, under the leadership of our MPO's planners and directors. I must ask, again, why? Are we planning for serfdom?

The Future

My prediction, resulting from my analysis of VTA's intransigence and greed for socialist mass transit solutions like Lite Rail and BART, remains the same as I said before: "Our regional metropolitan planning organizations (MPOs) Metropolitan Transportation Commission (MTC) and Association Monterey Bay Area Governments (AMBAG) have taken the position that they will not support residents' and GRC's efforts to restore intermodal facilities in the Region. MTC's 1999 *Transportation Improvement Program for the Nine-County San Francisco Bay Area* (9/23/98) mentions "multimodal" projects, but by this term it means only passenger transit operations linking, for example, transit buses with passenger trains and BART. The term "intermodal," which was the keystone of the Intermodal Surface Transportation Efficiency Act of 1991, Pub.L. 102-240 ("ISTEA"), supposedly renewed in the Transportation Efficiency Act for the 21st Century ("TEA-21"), H.R. 2400, has received little or no attention. This artificial division between public-sector passenger transit planners and private-sector transportation is a source of waste and inefficiency in our Nation. In this regard we are, I believe, a House Divided against ourselves.

The long-range congestion management plans for both Silicon and Salinas Valleys do not mention intermodal facilities. This should not be surprising because their position has been, since their inception, that they cannot support private sector transportation solutions, and are, in fact, in competition with them. Even the California Transportation Commission's (CTC) 1999 study of California's transportation infrastructure needs for the next decade failed to mention them. We can continue to sacrifice countless hours of

transportation planners at our MPOs from planning private sector options. While I do not find any legislative support for their position, that is a fundamental assumption on which they operate. I believe that we ought to untie their hands and let them harness the private sector solutions. I would recommend to our senior transportation planners and policy makers the TRB's Conference Proceedings No. 12, "National Conference on Setting an Intermodal Transportation Research Framework" (1997) for guidance on this strategy.

If the Southern California Association of County Governments can recommend "truck only" lanes, we in Northern California ought to show them a better solution, i.e., intermodal facilities. After all, the whole Nation looks to our Region as the leaders of the "new economy," so why not show us also to be brighter about transportation solutions? We ought to give our shippers and receivers an alternative to highways for their traffic, especially when truck brokers are claiming that "driver shortages" (real or imagined) exist, forcing-up the freight charges to sky-high rates. The freight savings can be passed along to the ultimate consumers."

Conclusion

Again I repeat to the "senior transportation planners" and VTA's leaders, "We have here in our Region what NAFTA calls a "barrier to trade." This barrier is a result of our previous decisions and our existing transportation policy. I think we are smart enough to remove it. Therefore, I urge you to consider these ideas in your endeavor to seek solutions in your environmental impact report." My recent paper "Intermodal Facility for the Hollister Branch Line: A Private Sector, Sustainable, User-Fees Funded Transportation Solution for the 21st Century," was attached to the last paper I gave VTA, and which I presented to the CTC at their meeting at the PUC headquarters in San Francisco in 2002. I believe that the ramifications of the proposed improvements to the Don Pacheco Y ought to be mitigated by the restoration of intermodal facilities on the Central California Coast, and if neither MTC nor AMBAG want them in this Region, then I believe that the only place to build one would be on the Hollister Branch Line beyond their jurisdiction in San Benito County.

Joseph P. Thompson

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July 2005

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 WWW: <http://home.pacbell.net/TransLaw>

July 7, 2000

Mr. Roy Molseed Fax: 408-321-5787
 Valley Transportation Authority
 Environmental Planning
 3331 North First Street, Bldg. B
 San Jose, CA 95134

Mr. Rob Oneto, Chair Fax: 831-384-0800
 Government Review Council
 Gilroy Chamber of Commerce
 7174 Monterey Street
 Gilroy, CA 95020

Re: Proposed U.S. 101 Widening Project & Community Response Opportunity

Dear Messrs. Molseed and Oneto,

Confirming my telephone conversations with you, due to 71st annual meeting of the Association for Transportation Law, Logistics & Policy (ATLLP) in Montreal, I was unable to attend the community workshops that were held in connection with this project, but as promised, I am submitting, under separate cover, my response to VTA's invitation for comments from the public.

While I am a member of GRC of both Gilroy and San Benito County Chambers of Commerce, Citizens Rail Advisory Committee, Citizens for Reliable and Safe Highways, Safe Kids Coalition, Transportation Lawyers Assn., ATLLP, and President of the Morgan Hill-Gilroy Bar Assn., among other things, my response should not be considered GRC's or that of any other association or organization with which I am affiliated, and I am solely responsible for its content.

My response is not sent on behalf of a client, but merely represents some ideas of this former transportation complaint clerk, truck dispatcher and intermodal facility supervisor in San Jose for many years, and now post-doctoral student of transportation law and policy.

Thank you for giving me this opportunity to submit my thoughts on this vital endeavor. Due to the voluminous content of my response, I will not send it by fax, but rather, by mail only. If there are questions, please do not hesitate to contact me.

Very truly yours,

JOSEPH P. THOMPSON

Encl.

cc: Hon. Don Gage, Santa Clara County Board of Supervisors
 cc: Susan Valenta, Gilroy Chamber of Commerce
 cc: Carole Appling, San Benito County Chamber of Commerce

El Camino Real 2000: A Transportation Business and Logistics Perspective
on the Proposed Widening of U.S. Highway 101

by

Joseph P. Thompson, Esq.

Aftermath of a head-on collision between a big-rig and a school bus on a State Highway, Gilroy, California, April 1994. Transportation planning must include consideration of the movement of goods and people.

This reply is gratefully offered at the invitation of the Valley Transportation Authority (VTA) to the public for comment on the proposed widening of U.S. Highway 101 between San Jose and Morgan Hill in Santa Clara County, California.

The Author

I volunteer this paper as a transportation policy student, not on behalf of any client, or for any association or organization to which I belong. Recently I have been doing some post-doctoral study of transportation policy at the Norman Y. Mineta International Institute for Surface Transportation Policy Studies at San Jose State University. I am a member of the Government Review Councils of two local chambers of commerce, Citizens for Reliable and Safe Highways, Citizens Rail Advisory Committee of San Benito County, Association for Transportation Law, Logistics & Policy (ATLLP), Transportation Lawyers Association (TLA), Safe Kids Coalition, Gavilan Employers Advisory Council, and other professional organizations within the geographical region of the proposed project. I am the President of the Morgan Hill-Gilroy Bar Association, and a candidate for the American Society for Transportation & Logistics (AST&L). In 1997 I received the National Directors' Best Research Paper Award from the AST&L. For more than 35 years I have been engaged in the transportation industry either directly as a truck dispatcher, intermodal facility supervisor and railroad complaint clerk or indirectly by representing carriers and their customers on the Central California Coast before federal and state courts and agencies as an attorney in the private practice of transportation law. My reply is my personal opinion and should not be viewed as that of any organization or association to which I belong, and I am solely responsible for its content.

Summary

Focusing on the movement of goods in the Hwy. 101 corridor, I conclude that the Central California Coast Region needs an intermodal facility. Movement of people and goods in the arteries of commerce inevitably increases when obstacles are abated, yet shippers and receivers in this Region lack a viable option to highways for their traffic. We must afford our commerce an economical and efficient option that presently existing technology has achieved in intermodal TOFC/COFC service.

Background

At least since the Roman roads were built, people and goods have moved together on highways. I will not dwell on the proposed project's consequences for commuters, except insofar as passenger travel on the highway is affected by the movement of goods. Democracy, transportation, environment, freedom, business and other major subjects of importance to society are undoubtedly intertwined in the proposed project, as are politics,

taxation, planning, zoning, housing, employment and myriad things that transportation touches in our lives. Leaving to others the difficulties inherent in those aspects of this project, giving VTA's talent pool its due, and other members of the public more knowledgeable than me about those things, I think that we owe it to ourselves and future generations of residents of this Region to consider what this project will mean for the movement of goods.

History

Since its creation by the Spanish missionaries, the El Camino Real has seen a steady increase of capacity. As the Interstate Highway System neared completion, Hwy. 101 was improved by previous generations from its trace down Monterey Road and old El Camino Real when the freeway portions were created east of Morgan Hill and Gilroy and northward to link with older freeway sections in south San Jose. Concurrently, population and commerce increased, swelling demand in the Region. During this period of highway construction in the Region, we abandoned our intermodal facilities in the Santa Clara and Salinas Valleys, while the rail option for travelers also ended. Automobile and truck traffic thus grew, no viable options being available. This Region was not alone in witnessing these trends, which have culminated in us realizing that we need non-highway transportation options.

During the Vietnam War, when I was the graveyard shift supervisor at San Jose's intermodal facility, local business owners could have their inbound loads spotted, deramped, and delivered to their doorsteps by 6AM. Cargoes as diverse as Trident missile sections and military material to domestic loads of every description moved long-haul segments of their trips to Piggyback Ramps. Examples included U.S. Mail and "swinging beef," two of the "hottest" commodities that we handled. Salinas Valley shippers and receivers also had the benefit of the less-expensive intermodal option, giving rise to the inclusion of Bud Antle's 500 refrigerated trailers to the consist of the "Salad Bowl Express."

Today

Today the loads business needed by 6AM may still be out on the highways leading into these Valleys on congested routes late into the morning. Although the Nation now utilizes the services of more than 3 million "owner-operators," Just-in-Time logistics is back-firing, and freight charges are escalating. The resurgence in passenger rail illustrates how we have gone back to the future, so to speak, in the movement of people in the Region. What about with goods movement? What are the options? To reach the airports and ports of San Francisco Bay, our business owners must use Hwy. 101. No water or air transportation options serve the Region even though agribusiness foreign sales dictate containerized freight. Even if shippers and receivers of overseas traffic utilize marine

container service, the local legs of those international trips are on the Region's highway connection with the San Francisco Bay ports. Trans-Mississippi tonnage moves OTR both EB and WB to and from this Region, mostly via long-haul trucks. Most of this tonnage is funneled onto the Hwy. 101 corridor, moving together with automobile traffic in what has become a badly congested route for both. Like other Bay Area highway corridors, e.g., Sunol Grade, Altamont Pass, etc., goods movement in our clogged arteries of commerce is a part of the problem generated by our unprecedented economic success in the Region. Free trade initiatives mean the trend will continue. If mass transit and passenger rail options deserve our respect, our attention, and our tax dollars, then what about options for movement of goods? Can we divert some of that tonnage to another mode?

Now A
Shipping
MALL
CPT

Intermodal Options

Neither Silicon nor Salinas Valleys have intermodal facilities. San Jose has the distinction of being the largest urban area in North America without one. The closest ones are located in Richmond on the ATSF-BN and in Lathrop on the UP. Business must cope with the congested I-880 corridor to get traffic from our Region to ATSF-BN's ramp, or dray loads over the Gabilans through Pacheco Pass or Sunol Grade and Altamont Pass to catch UP's Lathrop intermodal facility. The former intermodal facility site on the SP at Taylor and Coleman Streets in San Jose is for sale. The former intermodal yard in Salinas adjacent to the Amtrak Station off Market Street has been partly built upon. UP, SP's successor by merger, offers no intermodal service from this Region. **Union Pacific Railroad Company, Exempt Circular 20-B: Governing Publication of Rules and Charges Applying on TOFC/COFC Shipments** (12/1/1997). So, as a result, the westbound tonnage to the Region moves primarily by highway, and the eastbound tonnage, mostly produce from the Salad Bowl of America--Salinas Valley, also goes by truck. These commodity flows are constantly increasing, along with the population of motorists competing for space on the subject route, among others, e.g., State Highways 152, 156, 129, & 25. Increasing the capacity of the 101 corridor will, like a wider drain, draw more of the same flows. How long can this go on?

The Future

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Recommendations

When there were more than 100 Class 1 railroads, the Nation had more than 2,000 intermodal facilities. Today we have 5 Class 1's and about 200 intermodal facilities. To garner 10% of our Nation's freight revenue (trucks currently take 77%), the railroad industry has been forced to contract to stay profitable. Although it takes four times as much fuel to move a ton with rubber tires over concrete highways than with steel wheels on steel rails, and although air pollution is vastly greater from one fully-loaded "big rig" than from an automobile, I do not see anyone at our MPOs promoting our intermodal options. Even studies like Jack Faucet & Associates 1995 *Freight Study* for AMBAG and Barton-Ashman Associates 1992 *I-880 Intermodal Corridor Study: Truck Travel in the*

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Conclusion

We have here in our Region what NAFTA calls a "barrier to trade." This barrier is a result of our previous decisions and our existing transportation policy. I think we are smart enough to remove it. Therefore, I urge you to consider these ideas in your endeavor to seek solutions in your environmental impact report. My recent paper "Intermodal Facility for the Hollister Branch Line: A Private Sector, Sustainable, User-Fees Funded Transportation Solution for the 21st Century," is attached hereto. I believe that the ramifications of the proposed project on Hwy. 101 ought to be mitigated by the restoration of intermodal facilities on the Central California Coast, and if neither MTC nor AMBAG want them in this Region, then I believe that the only place to build one would be on the Hollister Branch Line beyond their jurisdiction in San Benito County.

FRA's administrator for policy announced last week at ATLLP's 71st annual meeting in Montreal that TEA-21's RRIF and TIFIA (see §7203 of TEA-21) regulations were to be released (finally) by USDOT very shortly. When they are, then we ought to encourage a short line railroad to seek that "seed money" from the federal government and use it to acquire the Hollister Branch Line from the UP and build the Central California Coast an intermodal facility like the one that the UP has at Lathrop. If that is done then the proposed Hwy. 101 widening will not be so badly congested as it will be without one. I believe that we could show the rest of the Nation how to solve some of their highway congestion and road maintenance expenses if we did this.

Joseph P. Thompson

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July 2000

YOUR OPINION COUNTS

Date: 3/28/13 Name of Project: VSFO -> Improvement to

I have a question/comment about:
This is an excellent project to + Auxiliary to
plan + enable future automobile + traffic growth
24/7 and for student + emergency ingress +
egress, commerce, safety, and safe bicycling
- Please NO toll lanes at all, never
- though not dependent, display and analyze
+ plan for US 101 widening from Cochran Road to
Consider feeder interchange + low of future SR 152 for

I would like more information about:
 Design Features Community Meetings Funding
 Property Acquisition Environmental Effects Schedule
 Construction Impacts Other: any consideration of toll
or long-term pricing or may consider such

Thank you for your comments. If you would like us to respond or be included in our mailing list, please fill out the information below. You may also call Community Outreach at (408) 321-7575 or email community.outreach@vta.org.

Name: OMAR CHATTY
 Address: 251 Vineyard Drive
 City: San Jose State: CA Zip: 95119-1865
 Phone: _____ E-mail: _____

VTA collects personal information to provide members of the public with project updates. We do not share this information with third parties unless required by law. Please be advised that the contact information you provide may be subject to inspection and copying under the California Public Records Act.

11128115

YOUR OPINION COUNTS

Date: 3/28/13 Name of Project: US 101 Improvement Project

I have a question/comment about:
Agricultural Resources
with Option A

I would like more information about:
 Design Features Community Meetings Funding
 Property Acquisition Environmental Effects Schedule
 Construction Impacts Other: _____

Thank you for your comments. If you would like us to respond or be included in our mailing list, please fill out the information below. You may also call Community Outreach at (408) 321-7575 or email community.outreach@vta.org.

Name: Carolyn Tognetti
 Address: 820 Carignone Dr
 City: Gilroy State: CA Zip: 95020
 Phone: 408-842-8583 E-mail: clyntognetti@aol.com

VTA collects personal information to provide members of the public with project updates. We do not share this information with third parties unless required by law. Please be advised that the contact information you provide may be subject to inspection and copying under the California Public Records Act.

11128115

YOUR OPINION COUNTS

Date: 3/27/13 Name of Project: US 101 Market
 I have a question/comment about: State Lake 129
Repazent Winery
The Garbc Sloop

I would like more information about:
 Design Features Community Meetings Funding
 Property Acquisition Environmental Effects Schedule
 Construction Impacts Other: _____

Thank you for your comments. If you would like us to respond or be included in our mailing list, please fill out the information below. You may also call Community Outreach at (408) 321-7575 or email community.outreach@vta.org.

Name: Charles Larson
 Address: 8407 Davis Ct
 City: Gilroy State: CA Zip: 95020
 Phone: 4088471285 E-mail: JLCLV@Garcic.com

VTA collects personal information to provide members of the public with project updates. We do not share this information with third parties unless required by law. Please be advised that the contact information you provide may be subject to inspection and copying under the California Public Records Act.

11128115

YOUR OPINION COUNTS

Date: 3-28-13 Name of Project: _____

I have a question/comment about: _____

US 101 Improvement project at bridge

I would like more information about:

- Design Features
- Property Acquisition
- Construction Impacts
- Community Meetings
- Environmental Effects
- Other: Floodway - Bridge
- Funding
- Schedule

Thank you for your comments. If you would like us to respond or be included in our mailing list, please fill out the information below. You may also call Community Outreach at (408) 321-7575 or email community.outreach@vta.org.

Name Joe Rizzuto

Address 5625-55 Monterey Fr. Rd

City: San Jose State: Ca Zip: 95020

Phone: 408 842-5004 E-mail: _____

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11128115

YOUR OPINION COUNTS

Date: 3/28/13 Name of Project: US 101 widening to SR 129

I have a question/comment about: _____

Option B
- Please consider 6 lane, plus 6 lane + auxiliary
safety of med space between cars in a
6 lane
- Retention alternatives

I would like more information about:

- Design Features
- Property Acquisition
- Construction Impacts
- Community Meetings
- Environmental Effects
- Other: _____
- Funding
- Schedule

Thank you for your comments. If you would like us to respond or be included in our mailing list, please fill out the information below. You may also call Community Outreach at (408) 321-7575 or email community.outreach@vta.org.

Name _____

Address _____

City: _____ State: _____ Zip: _____

Phone: _____ E-mail: _____

VTA collects personal information to provide members of the public with project updates. We do not share this information with third parties unless required by law. Please be advised that the contact information you provide may be subject to inspection and copying under the California Public Records Act.

11128115

YOUR OPINION COUNTS

Date: _____ Name of Project: _____

I have a question/comment about:

- 1) NOISE ISSUES
- 2) FLOOD ISSUE, HIGHWAY GRADE LEVEL TO THE SAME ELEVATION IN FRONT OF PROPERTIES NORTH/WEST SIDE OF CARANDELA CREEK/101 BRIDGE
- 3) IS THERE GOING TO BE ANY PROPERTY ACQUISITION OR EASEMENT TO MONTEREY FRONTAGE RD

I would like more information about:

- Design Features
- Community Meetings
- Funding
- Property Acquisition
- Environmental Effects
- Schedule
- Construction Impacts
- Other: _____

Thank you for your comments. If you would like us to respond or be included in our mailing list, please fill out the information below. You may also call Community Outreach at (408) 321-7575 or email community.outreach@vta.org.

Name JIMMY GALTMAN By 4/28/13

Address 5725 MONTEREY FRONTAGE RD

City: GILROY State: CA Zip: 95020

Phone: (408) 897-1192 E-mail: JIMMY.GALTMAN@GE.COM

VTA collects personal information to provide members of the public with project updates. We do not share this information with third parties unless required by law. Please be advised that the contact information you provide may be subject to inspection and copying under the California Public Records Act.

1112815

YOUR OPINION COUNTS

Date: 3-28-13 Name of Project: US 101 Improvement

I have a question/comment about:

Option A / B

I would like more information about:

- Design Features
- Community Meetings
- Funding
- Property Acquisition
- Environmental Effects
- Schedule
- Construction Impacts
- Other: _____

Thank you for your comments. If you would like us to respond or be included in our mailing list, please fill out the information below. You may also call Community Outreach at (408) 321-7575 or email community.outreach@vta.org.

Name Jolene Cesio

Address _____

City: SJB State: _____ Zip: _____

Phone: _____ E-mail: _____

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1112815

Appendix G

Public Hearing Transcript

VALLEY TRANSPORTATION AUTHORITY
PUBLIC MEETING

U.S. 101 IMPROVEMENT PROJECT
BETWEEN MONTEREY STREET
AND STATE ROUTE 129

REPORTER'S TRANSCRIPT OF PUBLIC COMMENTS

Date: Thursday, March 28, 2013
Time: 6:36 p.m.
Location: GILROY PUBLIC LIBRARY
350 West Sixth Street
Gilroy, CA 95020
Reported By: Noelia Espinola, CSR
License Number #8060

#44852

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A P P E A R A N C E S

Facilitator: CHERYL PHELPS

The Reporter: ADVANTAGE REPORTING SERVICES
BY: NOELIA ESPINOLA,
CSR #8060
1083 Lincoln Avenue
San Jose, CA 95125
(408) 920-0222

--o0o--

1 MS. PHELPS: Okay. So now we've learned more
2 about the project.

3 I've got one card, which I don't know, who's
4 got more comments. Does anybody else -- the gentleman
5 over in the aisle is getting ready to make a comment,
6 perhaps. What about anybody else? Any -- any other
7 comments tonight? Kathleen, the lady right here in the
8 pink. She said she's got a card too.

9 Okay. All right. So what I'd like for you
10 to do is that -- Kathleen here is going to be helping
11 us tonight with the timer. She's got it on her iPad.
12 You'll have three minutes to speak. And here's
13 Kathleen right here on the side, with the iPad. She'll
14 set it. We'll give you three minutes, and then it will
15 beep when the three minutes are up so you'll know it's
16 time for you to give the floor over to the next person.

17 So let's see. First I'd like to call Omar
18 Chatty. And if you would state your name for the
19 record. We have the court reporter right here, and she
20 will record your name and stuff.

21 MR. CHATTY: Okay. My name is Omar Chatty,
22 and I've been active in transportation in Santa Clara
23 Valley for well over 30 years.

24 Fighting for Highway 152 approval that
25 happened 30 years ago, saved a lot of lives. And

1 hoping to get the rest of 152 finished without tolls.

2 So this is extra presentation. This is the
3 way -- this is the hallmark of VTA. Once this is
4 approved, I hope to take this on the road, to the
5 highway engineers and other transportation planners
6 around the country. This is the model, especially your
7 environmental sensitivity and your concern about the
8 neighbors and the businesses. So I just want to give
9 you that kudos.

10 This project plan is for future -- future
11 auto mobility. It's -- I do want to consider the
12 impacts on 156, 125, 152 and 129 in the future. What
13 happens is when you widen the road, there is some
14 impacts down the road. 156 is already -- and it is
15 already dangerous for the capacity. So be careful. We
16 may need to widen that.

17 I don't know if it's a legal issue with
18 respect to VTA money being spent in San Diego County.
19 That may need to be addressed to avoid a lawsuit.

20 Again, no tolls on this. This is pure --
21 what engineers do. This is the way California used to
22 be, for those old enough to remember, when we built
23 freeways. But now we do go for the aesthetic and
24 environmental sensitivity. I really appreciate the
25 animal concern. I know some people think that's funny,

1 but it's not. Because, as indicated, people die
2 because they hit deer or they hit small animals or try
3 to avoid them.

4 So I also hope you consider sun in the
5 driver's eye. I notice there is really bad accidents
6 down by the rocks where the sun -- people coming in
7 from Prunedale. I don't know if that's going to affect
8 here, but if there's any kind of mitigation that may be
9 necessary.

10 Let's see. So, again, thank you for not
11 being political in this. It's not a bus rapid transit.
12 It's not a road diet. It's really to do something.
13 But it does seem to also meet the SB 375 requirement
14 not to produce more vehicle miles traveled because we
15 now have to reduce it, based on our beloved
16 legislature.

17 I would also ask you to consider berms with
18 vegetation. Some kind of solid vegetation instead of
19 sound walls where you have to do that. You may have
20 already done that. I don't know. But berms are good
21 as long as you don't destroy the view, because then you
22 get into significant impacts.

23 So -- so, anyway, this is just great. This
24 is what -- this is really what VTA is about when you
25 guys really are responding to the public need, both

1 locally and regionally. And I just -- I just really,
2 really, really thank you, and I wish VTA would do more
3 of it. Especially further up in the county.

4 Thank you.

5 MS. PHELPS: Thank you. Next I'd like to
6 call Carolyn Tognetti.

7 MS. TOGNETTI: Carol Tognetti. I live in
8 Gilroy. We own Garlic World. I don't live out there,
9 but we have a business that is going to be affected
10 with the frontage road. We won't be taken.

11 But my concern is actually for agriculture
12 and looking at the two options. Especially on
13 Option A, which takes more of the farmland. I think my
14 question -- it's kind more of a question -- it's
15 comment and a question. But wondering, on the farmland
16 that is not taken and that is left that is to the
17 south, I guess it is, of where the road will be, will
18 there be access for that? Because if it's not, it's
19 gone as well. It won't be able to be farmed. So I
20 don't know if there's consideration for that, but I
21 hope there is. So that at least that isn't affected by
22 the road crossing through and then nobody can get to it
23 with tractors and all of those things.

24 And the other comment I have is just -- you
25 just mentioned greenhouse gases, gas emissions. But

1 that's a huge factor. So I don't know if you're
2 complying with the climate change things and all of
3 that with the State. Anyway, that's a big issue. Glad
4 to see you're paying attention to the critters and
5 their connectivity.

6 And thank you very much.

7 MS. PHELPS: Thank you.

8 And one more card. The name is Jimmy
9 Galtman.

10 MR. GALTMAN: My name is Jimmy Galtman. I
11 live on 5725 Monterey Frontage Road. That's right
12 where the southbound lane heading south on 101 meets.

13 My concern is noise issues. You know,
14 they're talking about how they -- okay. So, basically,
15 it's a noise issue. Right now they talk about how
16 they've done an environmental impact as far as the
17 noise. Right now, because there's a truck stop
18 directly across my property -- you've heard of a Jake
19 brake? Those trucks heading northbound, heading into
20 that truck stop, go off -- I don't know how you take
21 your sound, you know, levels, but it's very noisy.
22 Plus, on the southbound lanes of 101, just after you go
23 over the overpass, heading south over the railroad
24 tracks there, there is something in the highway that
25 when these big rigs hit it, my front windows rattle.

1 So -- you know, it's a big impact to me. So
2 now you're talking about widening the freeway all the
3 way down. The traffic -- the flow of traffic is going
4 to move faster in both directions. You know, you are
5 improving the flow. We're concerned about that. And
6 we would like a sound wall through that area. I know
7 it's probably not cost-effective, but that's our
8 suggestion.

9 The other thing has to do with flood control.
10 In 1986 we were flooded. Basically, when they did the
11 bypass of 101 around Gilroy, they created a dam. If
12 you look at the history, 100-year flood, water used to
13 go under that area there, just about where the bypass
14 starts, and goes in the east side of the Highway 101 in
15 Gilroy. Well, in '86 it flooded the southern part of
16 Gilroy, backed up towards our property, and I got two
17 inches of water into my home. My neighbor, Joe
18 Rizzuto, got a lot of water in his house. He's at the
19 apex. We're concerned that between that area where I
20 live and the Canadero bridge -- if that is elevated,
21 you're going to create a dam there and water isn't
22 going to go.

23 Even though you have an easement, the
24 so-called 100-year flood, you know how our climate has
25 been changing. There is exceptions, and there's a lot

1 of them that has been happening recently if you look at
2 our weather conditions. And the way they built
3 Gilroy, it's all going to the northwest. They're
4 covering more ground up there, towards the foothills.
5 So you're getting more water that is going to that
6 creek. And if you look at the graphics of that creek,
7 the way it meanders, it's a disaster in the making.

8 So you have to consider that part north of
9 Canadero Creek, that bridge that you're going to
10 rebuild, and if the grade level will stay where it's
11 at.

12 And I guess the other thing -- let's see.
13 There was one more point we wanted to make. Oh,
14 easement. Is there going to be an easement on that
15 frontage road that I live on now? I have a bunch of
16 pine trees that run across the front of my property,
17 and essentially they're there for a sound barrier. And
18 because of the pitch canker, they're dying. I've
19 already taken out a dozen trees. I put up some
20 sequoias. I kind of want to know -- they run along
21 frontage road there -- am I going to be impacted by
22 that also.

23 I think that's it. Thank you.

24 MS. PHELPS: Thank you very much.

25 I also have a card from Jolene Cosio.

1 MS. COSIO: I'm Jolene Cosio. I live in San
2 Juan Bautista. And we've had a pretty bad experience
3 there with Caltrans, with 156 eating up a great deal of
4 farmland in the plan that they have proposed. And I do
5 not understand why Option A would even be considered
6 when Option B uses up so much less prime ag land. It
7 just -- I don't know that much about the plan, but just
8 looking at it briefly today, it appears that Option B
9 should be the preferred option. I don't know. Maybe
10 somebody likes straight lines and that's what so great
11 about Option A. It doesn't look like a good idea to
12 me.

13 And then the other thing I'm just going to
14 mention: I don't know that driveways on a highway are
15 as bad a thing as Caltrans and maybe the VTA seems to
16 think they are. With proper acceleration and
17 deceleration lanes, I think that you can accommodate
18 businesses along a highway.

19 MS. PHELPS: Thank you.

20 Does anyone else have a comment they would
21 like to have recorded for the public record? Yes.
22 Charles Larson.

23 MR. LARSON: I'm Alex Larson.

24 MS. PHELPS:

25 MR. LARSON: My brother Charlie and I both

1 own Rapazzini Winery and The Garlic Shoppe. And on the
2 EIR deal it says that you guys are going to give us
3 fair market value. My concern is that fair market
4 value has been diminished because back in 1985 you put
5 an overpass right in front of us, so you took away 50
6 percent of our business. And a few years ago you put a
7 head-on median down the middle of the road so we no
8 longer had the southbound access. So you took away
9 another 30 percent of our business -- of our retail
10 business. So I want to make sure that we're being
11 compensated for everything that you're taking away from
12 us, not what you're taking away from us after you've
13 already piecemealed it and taken away over the years.

14 Thank you.

15 MS. PHELPS: Thank you.

16 So those are all of the comments that we have
17 tonight. I would like to encourage you -- yes:

18 MS. PODRASKEY: We have one more.

19 MS. PHELPS: Oh, one more? Mr. Chatty would
20 like to come back?

21 MR. CHATTY: May I use my last 20 seconds?

22 MS. PHELPS: Yes, you may.

23 MR. CHATTY: I failed to mention, I'm hoping
24 the EIR -- I haven't had a chance to look at it -- will
25 also consider the emergency services. That was vital

1 with Highway 85, for emergency vehicles to get back and
2 forth quickly to fires and other emergencies. And so
3 with this road, when we have a fire or a flood, either
4 here or Southern California, you can see the troops of
5 CDF or Cal Fire vehicles moving up and down. And we
6 will have another earthquake and fire, so I hope they
7 consider that as well as the issue of safety of a
8 six-lane freeway where automobiles have more space
9 between them. You're less likely to have an accident
10 as you do with a four-lane. And also the emergency
11 vehicles to get to an accident in that stretch once
12 it's widened, how much better that is than today. So I
13 hope you consider that.

14 And also, on the relocation issue, I think
15 that's important. Do you relo- -- and also consider:
16 Do you relocate businesses near off ramps? There are
17 other options including lanes.

18 MS. PHELPS: Thank you.

19 For anybody else that has a comment, I would
20 like to encourage you to fill out one of the comment
21 cards and leave it with us or send something in, e-mail
22 it like Ann suggested. You can fax it. Please get in
23 touch with us if you have comments that you would like
24 to share -- we have another comment?

25 MS. PODRASKEY: We have one more.

1 MS. PHELPS: Okay. Mr. Rizzuto.

2 MR. RIZZUTO: We've been on this property --

3 MS. PHELPS: Will you please state your name,
4 and will you move a little closer.

5 MR. RIZZUTO: All right. Thank you.

6 MS. PHELPS: Thank you.

7 MR. RIZZUTO: I'm Joe Rizzuto. We've been on
8 5625-5655 Monterey Frontage Road. We've been there
9 since 1908. They took 90-some feet the first time and
10 150 feet the second time. Now what worries me, they're
11 going to come back and take more now. But I gather
12 not.

13 Now, I don't know what they're going to do on
14 the frontage road. If they raise the Canadero bridge,
15 it's going to back up and flood us. Because if you
16 state guys just walk down along the railroad tracks --
17 they're used to be openings underneath, where it could
18 flood. That's the way the water always went. But if
19 they build that bridge up, it's going to back up to us.

20 Now, Jim, you had water in your house -- what
21 is it? In '83?

22 MR. GALTMAN: '86.

23 MR. RIZZUTO: '86. And it ran two inches
24 around the bottom vents, below it.

25 And this is our problem. I don't know what

1 they're going to do with the bridge. Are they going to
2 raise it all the way up in front, where the water can't
3 get across? I don't know. I don't know if an engineer
4 can tell us.

5 MS. PHELPS: They'll be able to tell you
6 after the meeting. We're just recording your comments
7 right now.

8 MR. RIZZUTO: All right. Thank you.

9 MS. PHELPS: Thank you. So if you have
10 comments, please let us know.

11 One thing I meant to ask earlier and I
12 forgot -- I know someone is here from San Juan
13 Bautista. But is there anybody else here from San Juan
14 Bautista? Can you raise your hand if you're from San
15 Juan Bautista. So a couple more. Two or three people.

16 What about Hollister?

17 From Gilroy?

18 Anybody here from Morgan Hill? No?

19 Okay. I just was curious to see. I live in
20 Hollister, so I was curious to see where everybody
21 lives.

22 MR. CHATTY: San Jose.

23 MS. PHELPS: San Jose. Mr. Chatty is from
24 San Jose. You made the drive.

25 Well, I would like to thank you all for

1 coming and let you know that your participation is
2 appreciated, and your comments are appreciated and will
3 be included -- they will be recorded, and they will be
4 included as part of this document.

5 And please don't hesitate to stay around and
6 ask more questions. We'll be here. So if you have any
7 questions -- especially your questions, Mr. Rizzuto,
8 that weren't answered -- you can ask those.

9 And get in touch with us -- we've given you
10 several different ways to do that -- about -- you can
11 contact me about just general information or about this
12 project or anything to do with VTA.

13 Yes? You have a question?

14 UNIDENTIFIED SPEAKER: Who are the key
15 individuals that you can ask right now that know how --
16 where the project is and what are they addressing like
17 our concerns? Are there individuals here that we can
18 talk to specifically?

19 MS. PHELPS: I think so. There's -- right
20 here, John. And also Darrell Vice. Margaret
21 Simmons-Cross. Yeah. So just stick around after the
22 meeting.

23 Yes.

24 UNIDENTIFIED SPEAKER: At what point will
25 they be choosing the options? That was kind of

1 confusing. Because you're commenting, but you're not
2 sure which option you're really commenting on exactly.

3 MS. PHELPS: Right. That would be another
4 question for the people who are here with the name
5 tags. So I'd like -- can I just direct you in any way
6 before we end.

7 Yes?

8 UNIDENTIFIED SPEAKER: I'm on the VTA
9 advisory committee --

10 MS. PHELPS: Yes.

11 UNIDENTIFIED SPEAKER: -- and I understand
12 that there is actually no funding for this project at
13 all and no funding on the horizon. So I am just
14 wondering -- you know, what more -- you know, you can
15 add to that -- you know, is there any hope for a
16 timeline or what funding options are they trying for?

17 MS. PHELPS: I think Darrell addressed that
18 when he was at the microphone, and he can probably
19 address that more --

20 UNIDENTIFIED SPEAKER: I'm sorry. I came
21 late.

22 MS. PHELPS: Oh, yes. That was part -- he
23 was talking a little bit about that. But we'll all be
24 around. If you want to address that on the microphone,
25 it's fine. Or you can just stay around after the

1 meeting, and we'll be at the boards.

2 This is Darrell Vice. He's the project
3 manager. And he did address that a little bit in his
4 presentation, so I'm sure he'd be happy to speak with
5 you.

6 So thank you again for coming, and please
7 stay around and ask more questions. And next time we
8 would like to have you participate as well, when we
9 have other projects. And thank you -- thanks for your
10 questions. Thanks for coming.

11 (Public comments were concluded at 6:54 p.m.)

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1 STATE OF CALIFORNIA
2 COUNTY OF SANTA CLARA

3
4

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