Woodcreek Oaks Boulevard Widening Project
Initial Study/proposed Mitigated Negative Declaration

October 2016

CITY OF ROSEVILLE
CALIFORNIA

311 Vernon Street
Roseville, CA 95678
Contact: Mark Morse
(916) 774-5334

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NOTICE OF INTENT
TO ADOPT A MITIGATED NEGATIVE DECLARATION

for the

Woodcreek Oaks Boulevard Widening Project — City of Roseville

Public Notice is hereby given that a Mitigated Negative Declaration (Environmental Report) is available for public review for the Woodcreek Oaks Boulevard Widening Project – City of Roseville.

Project Location: The proposed project is located in the City of Roseville, Placer County, northwest of I-80 and southwest of State highway 65. Woodcreek Oaks Boulevard currently serves as a local road connection between Blue Oaks Boulevard and Pleasant Grove Boulevard. The proposed project would widen a segment of Woodcreek Oaks Boulevard from Crimson Ridge Way south to 600 feet north of Pleasant Grove Boulevard.

Project Description: The project proposes to reconfigure approximately 1.5 miles of roadway to allow two travel lanes in each direction, Class II bike lanes, curb, gutter, sidewalk, curb ramps, center median, and drainage system improvements.

Document Review and Availability: The public review and comment period will extend for 31 days in accordance with CEQA Guidelines Section 15105 starting **October 21, 2016** and ending **November 21, 2016**. The Initial Study/Proposed Mitigated Negative Declaration (IS/MND) is available for public review at the following location:

- City of Roseville Permit Center
  311 Vernon Street
  Roseville, CA 95678
  (8:00 A.M. to 5:00 P.M., Monday through Friday)

The IS/MND can also be viewed and/or downloaded at the City of Roseville website via the following: http://www.roseville.ca.us/gov/development_services/planning/environmental_documents_n_public_notices.asp.

Comments/Questions: Comments and/or questions regarding the IS/MND may be directed to: Mark Morse, Environmental Coordinator, City of Roseville, City Manager's Office, 311 Vernon Street, Roseville, CA 95678 (916) 774-5334.

Public Meetings: The findings of the IS/MND will be presented to the City of Roseville Transportation Commission on November 15, 2016. Additionally, the IS/MND is tentatively scheduled for consideration and possible adoption by the Roseville City Council on **December 7, 2016**. City Council meetings start at 7:00 P.M. in the Roseville Council Chambers, 311 Vernon Street. Interested parties should call the Roseville City Clerk's Office to confirm meeting agendas, times, and dates (916) 774-5263.

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PROPOSED MITIGATED NEGATIVE DECLARATION

PROJECT TITLE:	Woodcreek Oaks Boulevard Widening Project
PROJECT LOCATION:	Woodcreek Oaks Boulevard, Roseville, Placer County, California
DATE	October 21, 2016
PROJECT APPLICANT:	City of Roseville, Public Works Department
LEAD AGENCY:	City of Roseville
CONTACT PERSON:	Mark Morse, Environmental Coordinator: (916) 774-5334

PROJECT DESCRIPTION:

The project proposes to reconfigure approximately 1.5 miles of roadway to allow two travel lanes in each direction, Class II bike lanes, curb, gutter, sidewalk, curb ramps, center median, and drainage system improvements.

DECLARATION

The City of Roseville Environmental Coordinator has determined that the above project will have no significant effect on the environment and is therefore exempt from the requirement of an Environmental Impact Report (EIR). The determination is based on the attached initial study and the following findings:

a) *The project will not degrade environmental quality, substantially reduce habitat, cause a wildlife population to drop below self-sustaining levels, reduce the number or restrict the range of special-status species, or eliminate important examples of California history or prehistory.*

b) *The project does not have the potential to achieve short-term, to the disadvantage of long-term, environmental goals.*

c) *The project will not have impacts that are individually limited, but cumulatively considerable.*

d) *The project will not have environmental effects that will cause substantial adverse effects on human beings, either directly or indirectly.*

e) *No substantial evidence exists that the project will have a negative or adverse effect on the environment.*

f) *The project incorporates all applicable mitigation measures identified in the Initial Study.*

g) *This Mitigated Negative Declaration reflects the independent judgment of the lead agency.*

Written comments shall be submitted no later than November 15, 2016. City Council determination on this Mitigated Negative Declaration is final.

Submit comments to:

Mark Morse, Environmental Coordinator
City of Roseville, City Manager's Office
311 Vernon Street
Roseville, CA 95678

Posting Period:

October 21, 2016 through November 21, 2016

Initial Study approved by:

Mark J Morse

Mark Morse, Environmental Coordinator

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Initial Study/ Proposed Mitigated Negative Declaration

Woodcreek Oaks Boulevard Widening Project

Lead Agency: City of Roseville
311 Vernon Street
Roseville, CA 95678

Prepared by:

DOKKEN ENGINEERING

110 BLUE RAVINE ROAD, SUITE 200

FOLSOM, CALIFORNIA 95630

(916) 858-0642

October 2016

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1.0 INTRODUCTION

This project-level Initial Study/Proposed Mitigated Negative Declaration (IS/MND) has been prepared for the Woodcreek Oaks Boulevard Widening Project (proposed project) to satisfy the requirements of the California Environmental Quality Act (CEQA) (Public Resources Code [PRC] 21000 *et seq.*) and State CEQA Guidelines (14 California Code of Regulations [CCR] 15000 *et seq.*). The City of Roseville (City) is the lead agency for this project under CEQA.

1.1 Initial Study Purpose

CEQA requires that all State and local government agencies consider the environmental consequences of projects over which they have discretionary authority before acting on those projects. An Initial Study is a public document used by the decision-making lead agency to determine whether a project may have a significant impact on the environment. If it is determined that the proposed project may have a significant impact on the environment, but that these impacts will be reduced to a Less Than Significant Level through implementation of specific recommended mitigation measures, a Mitigated Negative Declaration shall be prepared.

This Initial Study has been prepared to identify and assess the anticipated environmental impacts of the Woodcreek Oaks Boulevard Widening project and relies on a combination of a previous environmental document and site-specific studies to address in detail the effects or impacts associated with the proposed project. In particular, this Initial Study assesses the extent to which the impacts of the proposed project have already been addressed in the Final Environmental Impact Report ("EIR") for Phase 1 of the *North Roseville Specific Plan* (certified August 1997) and the Final EIR for the *Amoruso Ranch Specific Plan* (certified June 15, 2016). In some instances, the City or consultants reporting to the City undertook new site-specific analyses to evaluate potential impacts resulting from implementation of the proposed project as consistent with, or no worse than, those impacts evaluated and disclosed within Phase1 of the *North Roseville Specific Plan Environmental Impact Report* and the *Amoruso Ranch Specific Plan Environmental Impact Report*. Site-specific studies were also used where the City determined that particular impacts of the proposed project had not been thoroughly addressed in the previous EIR.

This IS/MND is a public information document that describes the proposed project, existing environmental setting at the project site, and potential environmental impacts of construction and operation of the proposed project. It is intended to inform decision-makers of the proposed project's compliance with CEQA and the State CEQA Guidelines.

1.2 Review Process

This IS/MND will be circulated for a 30-day public review and comment period as required by CEQA. During the review period, written comments may be submitted to:

Mr. Mark Morse
Environmental Coordinator
Roseville City Manager's Office
311 Vernon Street
Roseville, CA 95678
mmorse@roseville.ca.us

2.0 PROJECT DESCRIPTION

This section provides an overview of the proposed project and contains the information used to analyze potential effects on environmental resources.

2.1 Project Location

The project site is located in the City of Roseville, Placer County, northwest of I-80 and southwest of State Highway 65 (Figure 1 Project Vicinity, Figure 2 Project Location). Woodcreek Oaks Boulevard currently serves as a local road connection between Blue Oaks Boulevard and Pleasant Grove Boulevard. The proposed project will widen a 1.5 mile segment of Woodcreek Oaks Boulevard from Crimson Ridge Way south to 600 feet north of Pleasant Grove Boulevard.

2.2 Project Setting

Woodcreek Oaks Boulevard is in a generally north-to-south orientation. There are 5 residential intersections along the Woodcreek Oaks Boulevard project segment, including Horncastle Avenue, Marblethorpe Drive/Jonquil Drive, Camino Capistrano/Zinnia Way, Calle Las Casas, and Canevari Drive/Arsenault Drive.

The project segment of Woodcreek Oaks Boulevard south of Crimson Ridge Way has two drive lanes, bike lanes, sidewalks, and a landscaped median designed to accommodate widening into the median to convert the roadway to four lanes.

The proposed project area is generally flat to gently rolling with ground surface elevations ranging from approximately 110 feet above mean sea level (amsl) to approximately 135 feet amsl. Within Blue Oaks Park, Woodcreek Oaks Boulevard crosses over the South Branch of Pleasant Grove Creek with a bridge, where natural slopes vary in inclination with the creek channel thalweg at about elevation 95 feet amsl.

2.3 Project Description

The City of Roseville proposes to construct the Woodcreek Oaks Boulevard Widening Project, located in the City of Roseville, Placer County (Figures 1 and 2). The proposed project would widen 1.5 miles of Woodcreek Oaks Boulevard from two to four lanes, between Pleasant Grove Boulevard and Crimson Ridge Way. The widening occurs in two distinct settings: the developed Quail Glen Neighborhood, between Pleasant Grove Boulevard and Horncastle Avenue, and the Blue Oaks Park area, between Horncastle Avenue and Crimson Ridge Way, where a new bridge crossing of the South Branch of Pleasant Grove Creek is also proposed.

Improvements will begin on Woodcreek Oaks Boulevard approximately 600’ north of Pleasant Grove Boulevard and end at Crimson Ridge Way. A private development called Campus Oaks will widen Woodcreek Oaks Boulevard between Blue Oaks Boulevard and Crimson Ridge Way. The Campus Oaks segment of Woodcreek Oaks Boulevard is expected to be constructed in late 2016, and will be the tie-in point for the City’s project.

The project consists of reconfiguring approximately 1.5 miles of roadway to allow two travel lanes in each direction, Class II bike lanes, curb, gutter, sidewalk, curb ramps, center median, and drainage system improvements. Improvements will be consistent with current City of Roseville design and construction standards and West Placer Stormwater Quality Design Manual (April 2016). Where applicable and to the greatest extent possible, the road shall be widened by narrowing the existing median, thereby protecting and maintaining existing curb, gutter and sidewalk infrastructure, and protecting the existing trees and landscaping currently existing in the median to the greatest extent practicable.

The roadway would include one 12’ lane and one 11’ lane, a 5’ bike lane, and a 3’ curb and gutter in each direction. The northbound and southbound lanes would be separated by a 14’ landscaped median. From Pleasant Grove Boulevard to Horncastle Avenue, the existing meandering 7’ landscaped strips often separate the roadway from the 8’ sidewalk. From Horncastle Avenue to Crimson Ridge Way, 6’ sidewalks

would be adjacent to the roadway; however, some sections may be separated from the roadway with landscaped strips. At the left turn lanes, the landscaped median would be tapered down to 2' segments and 12' left turn lanes would be constructed.

Drainage improvements include pipe extensions and reconfiguration of existing inlets and manholes. Additional low impact development (LID) improvements include additional tree plantings within the medians, and incorporation of bioswales within the existing right-of-way within the Blue Oaks Park segment of the roadway, adjacent to the proposed bridge.

Existing curb ramps not in compliance with the ADA Transition Plan will be replaced.

Signal modifications to relocate loop detectors and adjust turn pockets will be necessary. Signal standards will be modified or replaced to allow for longer mast arms.

The project also includes constructing a new bridge adjacent to the existing bridge over South Branch Pleasant Grove Creek. The new bridge will be approximately 130' long and 50' wide and will parallel the existing bridge with an approximately 6' gap separating the bridges. The existing bridge will be restriped to carry the southbound lanes and the new bridge will carry the northbound lanes. Both the new and existing bridge widths will provide sufficient width to carry bridge railings at each edge of deck, a sidewalk or a multi-use path, two shoulders/bike lanes and two vehicle travel lanes. The new bridge deck will consist of a reinforced concrete slab, supported by two linear sets of extension piers and reinforced concrete abutments supported on a pile foundation. The new bridge and roadway profile would be elevated to provide the necessary freeboard over the 100-year flood event water surface elevation for South Branch Pleasant Grove Creek.

The planned improvements are not expected to require right of way acquisition. This is a City Capital Improvement Project which will not involve any land-use decisions affected by the California Department of Water Resources Urban Level of Flood Protection.

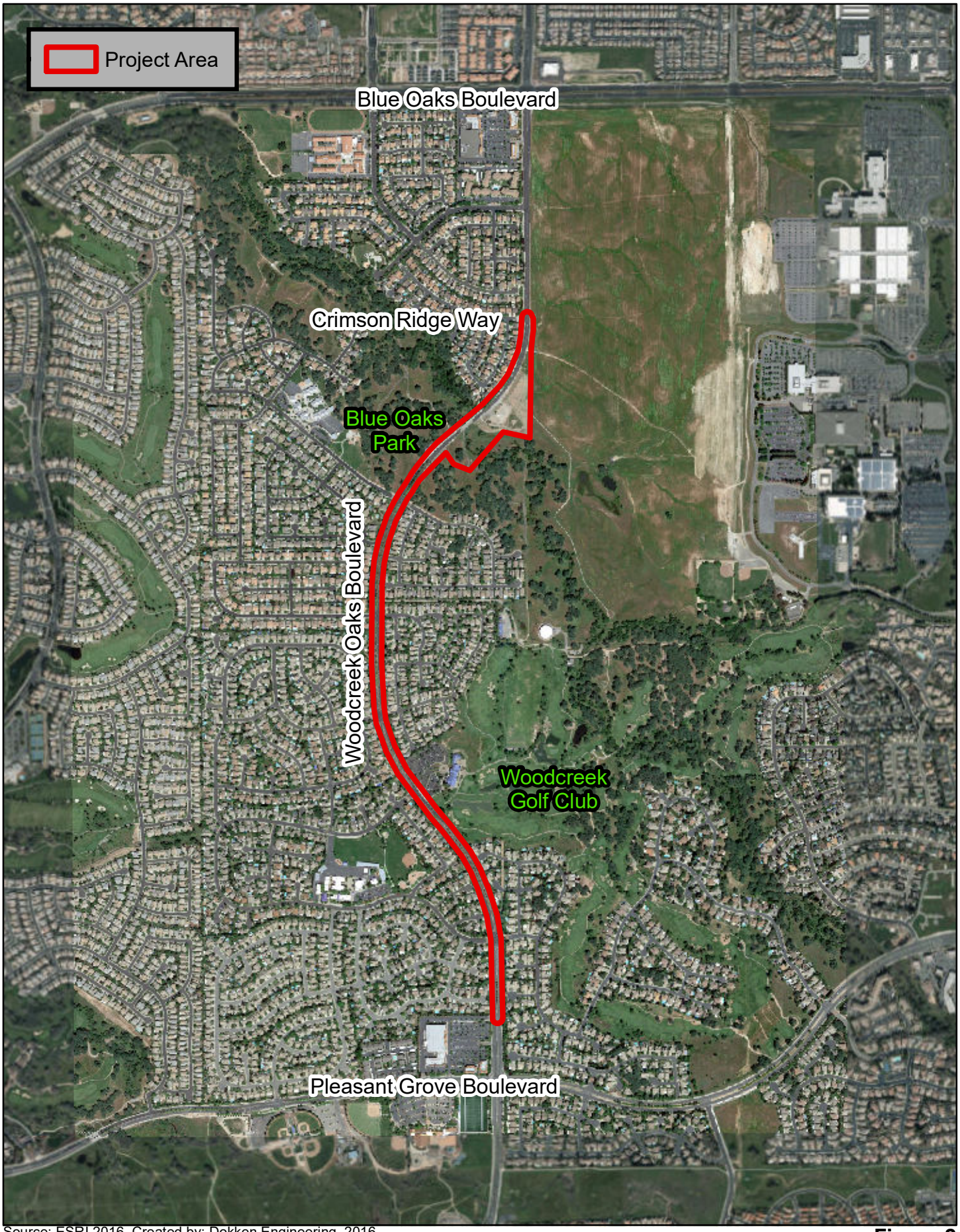
The proposed project would require coordination with existing telephone, electric, water, reclaimed water, sewer, gas, and fiber optics utilities. The project would continue to accommodate these existing utilities. A reclaimed water line passes under the proposed bridge, which will be left in place. If, during future design, it is determined the reclaimed water line cannot be left in place, the utility would be relocated within the current right-of-way and easements or attached to the new bridge. An existing sewer line is anticipated to be protected in place as well; however, if during future design, it is determined the sewer line cannot be left in place, it will be relocated within the existing right-of-way and easements. None of the existing facilities conflict with the proposed widening of Woodcreek Oaks Boulevard.

The City of Roseville proposes to widen the roadway using local funds for engineering, environmental, construction, and construction engineering.

Source: ESRI 2008; Dokken Engineering7/8/2016; Created By: amyd

0 10 20 Miles

FIGURE 1
Project Vicinity
Woodcreek Oaks Boulevard Widening Project
City of Roseville, Placer County, California



Source: ESRI 2016. Created by: Dokken Engineering, 2016

0 500 1,000 2,000 3,000 4,000 Feet

Figure 2
Project Location
Woodcreek Oaks Boulevard Widening Project
City of Roseville, Placer County, California

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CITY OF ROSEVILLE CALIFORNIA
WOODCREEK OAKS BLVD WIDENING
FIGURE 3: Project Features
OCTOBER 2016
DOKKEN ENGINEERING
110 BLUE RAVINE ROAD, SUITE 200
FOLSOM, CA 95630
PH: 916-858-0642 FAX:916-858-0643
R/W 76' R/W
LSE 8' 7' 3' 5' 11' LANE 12' LANE 14' 12' LANE 11' LANE 5' 3' 7' 8' LSE
R/W 76' R/W
LSE 8' 7' 3' 5' 11' LANE 12' 2' 12' LEFT TURN 12' LANE 11' LANE 5' 3' 7' 8' LSE
R/W 76' R/W
LSE 19' 6' 3' 5' 11' LANE 12' LANE 14' 12' LANE 11' LANE 5' 3' 6' 19' LSE
EXISTING BRIDGE WIDTH = 43'-9"
PROPOSED BRIDGE WIDTH = 46'-6"
8'-6" SIDEWALK
7'-6" BIKE LANE
11'
12'
2'
6'-6"
2'
12'
11'
7'-6" BIKE LANE
11'-6" SIDEWALK
-2%
-2%
UTILITY CONDUITS
18" Ø PILE EXTENSIONS
10'
EXISTING 16" WATER
EXISTING 10" SEWER
EXISTING 8" RECLAIMED WATER
CAMINO CAPISTRANO
AVENIDA MARTINA
MARGUERITE-HORPE DR
LUDLOW DR
LIVERPOOL LN
HORNCASTLE AVE
CALLE LAS CASAS
ZINNIA WAY
JONQUIL DR
ALPINE VIEW DR
CANEVARI DR
WOODCREEK OAKS BLVD
ARSENAULT DR
SUNNINGDALE DR
CRIMSON RIDGE WAY
SPEED LIMIT 40
SPEED LIMIT 45
BRIDGE APPROACH
BRIDGE AND CREEK AREA
MODIFY EXISTING SIGNALS
WIDEN IN PLANNED AREA
CONFORM TO CAMPUS OAKS IMPROVEMENTS (UNDER CONSTRUCTION)

2.4 Background

The Proposed project is located within Phase 1 of the North Roseville Specific Plan area (Plan Area) (EIP Associates 1997) and the Northwest Roseville Specific Plan. Phase 1 of the North Roseville Specific Plan Area includes approximately 749 acres of the City of Roseville and is located directly west of Foothills Boulevard, north of Blue Oaks Boulevard to the City limits and south of Blue Oaks Boulevard to the Woodcreek Golf Club. The Northwest Roseville Specific Plan includes approximately 2,650 acres and is bounded on the north by the North Roseville Industrial Area, on the east by Highway 65, on the south by Baseline Road, and on the west by the west boundary of Section 32.

The *North Roseville Specific Plan Environmental Impact Report* was prepared in May 1997 pursuant to the California Environmental Quality Act (CEQA). The final EIR was certified in July 1997 and Phase 1 of the Plan Area was subsequently adopted in August 1997 (EIP Associates 1997). The Northwest Roseville Specific Plan Final EIR was adopted by the City of Roseville City Council on May 10, 1989. Additionally, the Proposed project is within the area studied by the *Amoruso Ranch Specific Plan Environmental Impact Report*. The *Amoruso Ranch Specific Plan Environmental Impact Report* was certified by the City of Roseville City Council on June 15, 2016.

2.5 Construction

It is estimated that construction of the proposed project would take between 9 and 13 months, beginning in June 2017 and ending by approximately August 2018.

Activities

The project site would be prepared to accommodate the widened roadway and new bridge over South Branch Pleasant Grove Creek. For areas to be disturbed, this work would remove above ground material including all vegetation, non-salvageable trees, and debris. Existing vegetation and trees within the medians and landscaped sidewalks would not be disturbed or removed to the greatest extent practicable. Following initial clearing, the site would be rough-graded.

Construction of the project would require narrowing of the existing median along Woodcreek Oaks Boulevard and widening Woodcreek Oaks Boulevard within Blue Oaks Park. Narrowing of the median will require the existing curbs, base, soils, and some vegetation to be removed to accommodate the additional lanes of traffic. The existing vegetation and trees within the medians would be maintained to the greatest extent practicable. Widening of Woodcreek Oaks Boulevard will consist of grading, placing aggregate base, paving, and striping the new roadway.

Additionally, the proposed bridge will be a three-span, cast-in-place, reinforced concrete-slab bridge. Equipment access routes will be cleared and graded; however, these cleared sites will be treated with erosion control and revegetated following construction. If the creek is still flowing during construction, any flowing water will be piped through the construction site using a coffer dam upstream and downstream of the project to direct water into culvert pipes. The piling for the pile extension piers and abutments will be installed adjacent to South Branch Pleasant Grove Creek. The pile extension piers will be installed using an impact pile driver. Falsework will be installed to provide support for placing the concrete bridge deck. The bridge deck formwork and reinforcing steel will be placed and the concrete will be cast. Formwork and falsework will be removed after the concrete has been cured. The roadway embankment and slopes will be placed and compacted behind and adjacent to the bridge abutments. The concrete bridge railing and sidewalks will be placed and the approach roadway will be paved and striped.

Construction Access and Staging

Construction access to the project site is available from existing public roadways (Blue Oaks Boulevard and Pleasant Grove Boulevard to Woodcreek Oaks Boulevard). Construction staging is anticipated to occur within the vacant lot northeast of the existing bridge. All construction staging (equipment and materials)

would be located within the project area. It is anticipated construction may require temporary closure of travel lanes, but one lane would remain open at all times.

Construction Phases and Equipment

A list of the construction phases and equipment that may be used during the project is provided in **Table 1** below:

Table 1 — Construction Phases and Equipment

Phase	Equipment	Number of Pieces
Initial clearing	Skip Loader	1
	Excavator	1
Rough-grading	Skip Loader	1
	Excavator	1
	Scraper	1
Drainage and utilities	Loader/Backhoe	1
	Grader	1
Excavation and foundation work	Loader/Backhoe	2
	Crane	1
	Dump Truck	1
	Impact Pile Driver	1
	Roller	1
	Bulldozer	1
	Drill Rig	1
	Concrete Truck	1
Finish grading	Loader/Backhoe	1
	Scraper	1
	Paver	1
Landscaping	Loader/Backhoe	1
	Trencher	1

2.6 City Of Roseville Mitigating Ordinances, Guidelines, and Standards

The CEQA Guidelines allow the use of previously adopted development policies or standards as mitigation for the environmental effects of future projects, when the standards have been adopted by the City with findings, based on substantial evidence, that the policies or standards will substantially mitigate environmental effects, unless substantial new information shows that the policies or standards will not substantially mitigate the effects (§15183[f]). In April 2008, the City of Roseville adopted Findings of Fact related to the mitigating policies and standards, and adopted the City of Roseville CEQA implementing procedures for the preparation, processing, and review of environmental documents (Resolution 08-172). These Findings are applicable to the following regulations and ordinances, which include standards and policies that are uniformly applied throughout the City, and will substantially mitigate specified environmental effects of future projects:

- Noise Regulation (RMC Ch.9.24)
- Urban Stormwater Quality Management and Discharge Control Ordinance (RMC Ch.14.20)
- Stormwater Quality Design Manual (Resolution 07-432)
- City of Roseville Design and Construction Standards (Resolution 07-137)
- Community Design Guidelines (Resolution 95-347)
- Tree Preservation Ordinance (RMC Ch.19.66)

The City's Mitigating Ordinances, Guidelines, and Standards are referenced, where applicable, in the Environmental Checklist, and will be implemented as part of the proposed project to reduce potential impacts to a Less Than Significant Level.

2.7 Environmental Commitments

In addition to the City's Mitigating Ordinances, Guidelines, and Standards discussed above, the following Best Management Practices (BMPs) will be implemented in order to avoid and/or minimize potential impacts due to construction of the proposed project.

BMP — 1: **Tree Preservation Ordinance Measures**

The requirements of the City of Roseville Tree Preservation Ordinance (RMC 19.66) will be implemented, including avoidance, minimization, or compensation for the removal or disturbance of native oak trees greater than six inches diameter at breast height (DBH) during construction. If native oak trees will be affected by the project, the City will prepare a tree mitigation plan that identifies trees that qualify for protection and specifies mitigation for impacts, including temporary construction impacts associated with any work required within the drip line of native oaks. For any oak trees that would be removed, the City will develop a replacement planting plan to be included in the construction documents or purchase credits through the City maintained In-lieu fee program.

BMP — 2: **Biological Resource Protection Measures**

The following measures will be incorporated into the construction specifications for the proposed project to reduce and control potential impacts to biological resources consistent with various City, state, and federal policies:

- Prior to the start of construction activities, the project limits in proximity to jurisdictional waters must be marked with high visibility Environmentally Sensitive Area (ESA) fencing or staking to ensure construction will not further encroach into waters. The project biologist will periodically inspect the ESA to ensure sensitive locations remain undisturbed.
- Prior to arrival at the project site and prior to leaving the project site, construction equipment that may contain invasive plants and/or seeds must be cleaned to reduce the spreading of noxious weeds.
- All temporarily disturbed areas will be restored following construction. All plant material used to re-vegetate temporarily disturbed areas will be locally appropriate native species. The re-vegetation plan must not include any species listed by Cal-IPC as invasive.
- Plastic mono-filament netting (erosion control matting) or similar material that could trap wildlife must not be used. Acceptable substitutes include jute, coconut coir matting or tackified hydroseeding compounds.
- A pre-construction clearance survey will be conducted by the project biologist to verify that no wildlife is located within the project area before ground disturbing activities.
- The contractor must not apply rodenticide or herbicide within the project area during construction.
- The contractor must dispose of all food-related trash in closed containers, and must remove it from the project area each day during construction. Construction personnel must not feed or attract wildlife to the project area.

BMP — 3: **Storm Water Pollution Prevention Plan**

Because the project would disturb more than an acre, the project contractor will be required to implement a storm water pollution prevention plan (SWPPP) to comply with the National

Pollutant Discharge Elimination System (NPDES) general permit administered by the State Water Resources Control Board (refer to http://www.swrcb.ca.gov/stormwtr/index.html for more information on the NPDES permit process). The SWPPP would identify structural and nonstructural BMPs to control erosion. The SWPPP will include a spill prevention and control plan to ensure transport, storage, and handling of hazardous materials required for construction is conducted in a manner consistent with relevant regulations and guidelines

In addition, the project will comply with the City's design/construction standards (refer to http://www.roseville.ca.us/gov/development_services/engineering_land_development/design_construction_standards.asp) and the City's Stormwater Quality BMP Guidance Manual for Construction (2011). The project would also implement the applicable requirements of the West Placer Storm Water Quality Design Manual (West Placer 2016).

Contract specifications will include the following BMPs, where applicable, to reduce erosion during construction:

- Implementation of the project will require approval of a site-specific Storm Water Pollution Prevention Plan (SWPPP) that would implement effective measures to protect water quality, which may include a hazardous spill prevention plan and additional erosion prevention techniques;
- Existing vegetation will be protected in place where feasible to provide an effective form of erosion and sediment control;
- Stabilizing materials will be applied to the soil surface to prevent the movement of dust from exposed soil surfaces on construction sites as a result of wind, traffic, and grading activities;
- Roughening and terracing will be implemented to create unevenness on bare soil through the construction of furrows running across a slope, creation of stair steps, or by utilization of construction equipment to track the soil surface. Surface roughening or terracing reduces erosion potential by decreasing runoff velocities, trapping sediment, and increasing infiltration of water into the soil, and aiding in the establishment of vegetative cover from seed.

BMP — 4: **Water Quality Measures**

No work, including staging or storage of construction equipment or materials, shall occur below the elevation of the 100-year water surface elevation from November 1st through April 15th, during the flood season.

BMP — 5: **Noise Control Measures**

The following measures will be incorporated into the construction specifications for the proposed project to reduce and control noise generated by construction-related activities, consistent with City ordinances and standards:

- All construction equipment will have sound-control devices no less effective than those provided on the original equipment. No equipment will have an unmuffled exhaust.
- Appropriate additional noise-reducing measures will be implemented, including (but not limited to) the following: stationary construction equipment will be located as far as possible from sensitive land uses as described in the City of Roseville General Plan Noise Element (residential areas, schools, and hospitals); sensitive uses will be identified on construction drawings; and equipment idling will be prohibited when the equipment is not in use.

BMP — 6: **Traffic Control Plan**

The City will require the construction contractor to implement a traffic control plan, including a construction schedule and plan to meet the City's notice procedures, before construction activities are initiated. This plan would identify general methods by which construction activities will be managed to minimize substantial delays to traffic. These methods may include (but are not limited to):

- Appropriately sequencing activities (e.g., segment phasing, timing of grading, hours of construction) to minimize effects on traffic flow,
- Maintaining traffic flow in the project area to the extent possible, and
- Maintaining bicycle and pedestrian access.

BMP — 7: **Solid Waste Measures**

As per the City's Design and Construction Standards for Solid Waste (Section 151) (City of Roseville 2014), the City will ensure that contractors meet with the designated Roseville Environmental Utilities Inspector prior to beginning work to ensure that an approved plan is in place to store and dispose of all construction debris, according to relevant federal, State, and local statutes.

2.8 Required Permits and Approvals

The following permits and/or approvals are anticipated for the proposed project:

- Section 1602 Streambed Alteration Agreement — California Department of Fish and Wildlife (CDFW);
- Section 404 Nationwide Permit – U.S. Army Corp of Engineers (USACE);
- Section 401 Water Quality Certification – Regional Water Quality Control Board (RWQCB);
- Adoption of the Mitigated Negative Declaration for the Proposed project and a Mitigation Monitoring and Reporting Plan are enclosed as **Appendix A** of this document – Roseville City Council; and
- Project Approval – Roseville City Council.

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3.0 INITIAL STUDY CHECKLIST

The California Environmental Quality Act (CEQA) Guidelines recommend that lead agencies use an Initial Study checklist to determine the potential impacts of the proposed project on the physical environment. The checklist provides a list of questions concerning a comprehensive array of environmental issue areas potentially affected by the proposed project. This section of the Initial Study incorporates a portion of the Appendix "G" environmental checklist form, contained in the CEQA Guidelines (revised 2014). Impact questions and responses are included in both tabular and narrative formats for each of the 17 environmental topic areas. There are four possible answers to the environmental impacts checklist questions on the following pages. Each possible answer is explained herein:

1) A "**Potentially Significant Impact**" is appropriate if there is enough relevant information and reasonable inferences from that information that a fair argument can be made to support a conclusion that a substantial or potentially substantial adverse change may occur to any of the physical conditions within the area affected by the proposed project. When one or more "Potentially Significant Impact" entries are made, an EIR is required.

2) A "**Less Than Significant With Mitigation Incorporated**" answer is appropriate when the Applicant has agreed to incorporate a mitigation measure to reduce an impact from "Potentially Significant" to "Less Than Significant." For example, impacts to flood waters could be reduced from a "Potentially Significant Impact" to a "Less Than Significant Impact" by relocating a building to an area outside the floodway. The lead agency must describe the mitigation measures, and briefly explain how the measures would reduce the impact to a "Less Than Significant Level."

3) A "**Less Than Significant Impact**" is appropriate if there is evidence that one or more environmental impacts may occur, but the impacts are determined to be less than significant or the application of development policies and standards to the project will reduce the impact(s) to a "Less Than Significant Level." For example, the application of the City's Improvement Standards reduces potential erosion impacts to a "Less Than Significant Impact."

4) A "**No Impact**" answer is appropriate where it can be clearly seen that the impact at hand does not have the potential to adversely affect the environment. For example, a project in the center of an urbanized area will clearly not have an adverse effect on agricultural resources or operations.

All answers must take into account the whole action involved, including off-site as well as on-site, cumulative, as well as project-level, indirect as well as direct, and construction as well as operational impacts, except as provided for under CEQA Guidelines Section 15183 and CEQA Section 21083.3.

A brief explanation is required for all answers except "No Impact" answers that are adequately supported by the information sources cited in the parentheses following each response. A "No Impact" answer should be explained where it is based on project-specific factors as well as general standards.

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Less than Significant with Mitigation Incorporated" as indicated by the checklist on the following pages.

☐	Aesthetics	☐	Agriculture and Forestry	☐	Air Quality
☒	Biological Resources	☒	Cultural Resources	☐	Geology/ Soils
☐	Greenhouse Gas Emissions	☐	Hazards and Hazardous Materials	☐	Hydrology/ Water Quality
☐	Land Use/ Planning	☐	Mineral Resources	☒	Noise
☐	Population/ Housing	☐	Public Services	☐	Recreation
☐	Transportation/ Traffic	☐	Tribal Cultural Resources	☐	Utilities/ Service Systems
☒	Mandatory Findings of Significance				

On the basis of this initial evaluation:

☐ I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.

■ I find that although the Proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the proposed project have been made by or agreed to by the applicant. A MITIGATED NEGATIVE DECLARATION will be prepared.

☐ I find that the Proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.

☐ I find that the Proposed project MAY have a "Potentially Significant Impact" or "Potentially Significant Unless Mitigated" impact on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.

☐ I find that although the Proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR OR NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the Proposed project, nothing further is required.

10-18-16
Date

Mark Morse, Environmental Coordinator

City of Roseville
Organization

3.1 Aesthetics

	Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Have a substantial adverse effect on a scenic vista?	☐	☐	☐	☒
b.	Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings along a scenic highway?	☐	☐	☐	☒
c.	Substantially degrade the existing visual character or quality of the site and its surroundings?	☐	☐	☒	☐
d.	Create a new source of substantial light or glare which would adversely affect daytime or nighttime views in the area?	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b. **No Impact**. The City has not designated any specific scenic vistas to be protected in the City of Roseville, and there is not a state-designated scenic highway in the project vicinity. There would be ***No Impact***. No mitigation is required.

c. **Less Than Significant Impact**. The Proposed project would involve the widening of Woodcreek Oaks Boulevard, an existing roadway and construction of a new bridge adjacent to an existing bridge over South Branch Pleasant Grove Creek. No new operational characteristics would be introduced that would substantially degrade the existing visual character of the site. Construction of the proposed project would require widening the roadway into the existing unlandscaped portions of the medians along Woodcreek Oaks Boulevard, and widening Woodcreek Oaks Boulevard within Blue Oaks Park with a new bridge over the South Branch of Pleasant Grove Creek. The project will avoid removal of vegetation and trees within the previously landscaped portions of the existing medians along Woodcreek Oaks Boulevard to the greatest extent practicable.

The proposed project may involve removal of existing trees and vegetation as part of the widening within the existing medians and storm drainage improvements. Impacts to native oaks would be mitigated consistent with the City of Roseville Tree Preservation Ordinance. In the context of the existing tree canopy, the proposed removals would not substantially degrade the existing visual quality of the site. Furthermore, the project would include tree plantings in certain areas including the medians and existing landscape, where feasible. Drainage improvements would also not significantly degrade the existing visual character, and related impacts would therefore be considered ***Less Than Significant***.

d. **No Impact**. The Proposed project would not include any project components that could increase glare in the project area. The project may involve the installation of new light fixtures along the new bridge over the South Branch of Pleasant Grove Creek; however, this lighting would conform to City standards and would be downward shielded. No new substantial source of light or glare that would adversely affect nighttime views in the area is proposed by the Project. There would be ***No Impact***. No mitigation is required.

3.2 Agriculture and Forest Resources

	Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?	☐	☐	☐	☒
b.	Conflict with existing zoning for agricultural use or conflict with a Williamson Act contract?	☐	☐	☐	☒
c.	Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?	☐	☐	☐	☒
d.	Result in the loss of forest land or conversion of forest land to non-forest use?	☐	☐	☐	☒
e.	Involve other changes in the existing environment that, due to their location or nature, could result in conversion of Farmland to non-agricultural use?	☐	☐	☐	☒

Discussion of Checklist Answers:

a-e. **No Impact**. According to the *California Important Farmland Finder*, the site contains no Prime Farmland, Unique Farmland, Farmland of Statewide Importance, or active agricultural operations. Additionally, the proposed project area is surrounded by open space, commercial and residential land uses. While the proposed project area contains some area of riparian woodland, it is not zoned as forest land or Timberland Production. Therefore, the proposed project would not involve the loss of any forest land. The project site is not zoned for any agricultural use nor is it designated for agricultural use by the City's General Plan or Zoning Ordinance (City of Roseville 2010). No agricultural operations exist in the project vicinity, and the project would not involve any changes that could result in conversion of any farmland to a non-agricultural use or forestland to non-forestland use. Therefore, there would be ***No Impact*** related to agricultural and/or forest resources. No mitigation is required.

3.3 Air Quality

	Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Conflict with or obstruct implementation of the applicable air quality plan?	☐	☐	☒	☐
b.	Violate any air quality standard or contribute substantially to an existing or projected air quality violation?	☐	☐	☒	☐
c.	Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is a non-attainment area for an applicable federal or state ambient air quality standard (including releasing emissions that exceed quantitative thresholds for ozone precursors)?	☐	☐	☒	☐
d.	Expose sensitive receptors to substantial pollutant concentrations?	☐	☐	☒	☐
e.	Create objectionable odors affecting a substantial number of people?	☐	☐	☒	☐

Discussion of Checklist Answers:

a. **Less Than Significant Impact**. Project development would occur under the jurisdiction of the Placer County Air Pollution Control District (PCAPCD) within the Sacramento Valley Air Basin (SVAB). The SVAB is designated unclassified for the federal particulate matter 2.5 microns in diameter ($PM_{2.5}$) and non-attainment for the State particulate matter 10 microns in diameter (PM_{10}) standards, as well as for both the federal and State ozone standards. In order to address the federal non-attainment status for ozone, the PCAPCD, along with other local air districts in the SVAB, is required to comply with and implement the State Implementation Plan (SIP) to demonstrate when and how the region can attain the federal ozone standards (CARB 2013). As such, the PCAPCD, along with the other air districts in the region, prepared the Sacramento Regional 8-Hour Ozone Attainment and Reasonable Further Progress Plan (Plan) in December 2008 (CARB 2014). The PCAPCD adopted the Plan on February 19, 2009. The California Air Resources Board (CARB) determined that the Plan meets Clean Air Act requirements and approved the Plan on March 26, 2009 as a revision to the SIP. Accordingly, the Plan is the applicable air quality plan for the proposed project site. It should be noted that an update to the Plan, the Sacramento Regional 8-Hour Ozone Attainment and Reasonable Further Progress Plan (2013 SIP Revisions), has been prepared and was approved and adopted on September 26, 2013. The 2013 Revisions to the Sacramento Regional 8-Hour Ozone Attainment and Reasonable Further Progress Plan were submitted to the U.S. Environmental Protection Agency (USEPA) as a revision to the SIP in November 2013. USEPA has found adequate the motor vehicle emissions budgets within the revised SIP, their findings are effective as of August 25, 2014.

The Plan demonstrates how existing and new control strategies would provide the necessary future emission reductions to meet the federal Clean Air Act requirements, including the National Ambient Air Quality standards (NAAQS). Adoption of all reasonably available control measures is required for

attainment. Measures could include, but are not limited to the following: regional mobile incentive programs; urban forest development programs; and local regulatory measures for emission reductions related to architectural coating, automotive refinishing, natural gas production and processing, asphalt concrete, and various others.

A conflict with, or obstruction of, implementation of the Plan could occur if a project generates greater emissions than what has been projected for the site in the emission inventories of the Plan. Emission inventories are developed based on projected increases in population, employment, regional vehicle miles traveled (VMT), and associated area sources within the region, which are based on regional projections that are, in turn, based on the General Plan Land Use and Zoning Designations for the region. In addition, general conformity requirements of the Plan include whether a project would cause or contribute to new violations of any NAAQS, increase the frequency or severity of an existing violation of any NAAQS, or delay timely attainment of any NAAQS.

The Proposed project would not modify the existing land use or operations on the site. The Proposed project would include widening an existing roadway from two lanes to four. The widening would also allow for bike lanes, thereby encouraging alternative modes of transportation. Thus, the proposed project would not conflict with the emissions inventories of the Plan, and would be considered consistent with the Plan. In addition, the PCAPCD's permits, rules, and regulations are in compliance with the Plan, and the proposed project is required to comply with all applicable PCAPCD rules and regulations. Furthermore, as analyzed and determined in the discussions below, the proposed project would not result in project-level construction emissions that would exceed the applicable thresholds of significance. Thus, the proposed project would not cause or contribute to new violations of any NAAQS, increase the frequency or severity of an existing violation of any NAAQS, or delay timely attainment of any NAAQS.

Because the Proposed project would not conflict with the emissions inventories of the Regional Air Quality Plan, would result in emissions below the thresholds of significance, and would not conflict with or obstruct implementation of the applicable Air Quality Plan, impacts would be considered ***Less Than Significant***. No mitigation is required.

b. **Less Than Significant Impact**. In order to evaluate ozone and other criteria air pollutant emissions and support attainment goals for those pollutants, the PCAPCD recommends significance thresholds for emissions of PM_{10}, carbon monoxide (CO), and ozone precursors – reactive organic gases (ROG) and nitrous oxides (NO_X). The significance thresholds, expressed in pounds per day (lbs/day), listed in **Table 2** below are the PCAPCD's recommended thresholds of significance for use in the evaluation of air quality impacts associated with proposed development projects. The City of Roseville, as Lead Agency, utilizes the PCAPCD's recommended construction phase criteria air pollutant thresholds of significance for CEQA evaluation purposes. Thus, if the proposed project's emissions exceed the pollutant thresholds presented in **Table 2**, the project could have a significant effect on air quality and the attainment of federal and State Ambient Air Quality Standards.

Table 2 — PCAPCD Recommended Thresholds of Significance

Pollutant	Construction Threshold (lbs/day)
ROG	82
NO_X	82
PM_{10}	82
CO	550

Source: PCAPCD 2012.

Implementation of the proposed project would contribute local emissions in the area during construction. Short-term construction-related emissions resulting from project construction were estimated using the Roadway Construction Emissions Model version 7.1.5.1, a model developed by

Jones & Stokes and TIAX LLC in partnership with the Sacramento Metropolitan Air Quality Management District (SMAQMD 2013).

Construction Emissions

During construction of the project, various standard types of equipment and vehicles would temporarily operate on the project site. Construction exhaust emissions would be generated from construction equipment, earth movement activities, construction worker commutes, and construction material hauling for the entire construction period. The aforementioned activities would involve the use of diesel- and gasoline-powered equipment that would generate emissions of criteria pollutants. Project construction activities also represent sources of fugitive dust, which includes PM emissions. As construction of the proposed project would generate air pollutant emissions intermittently within the alignment and vicinity of the alignment, until all construction has been completed, construction is a potential concern because the proposed project is in a non-attainment area for ozone and PM.

The project is required to comply with all PCAPCD rules and regulations for construction, including, but not limited to Rule 202 related to visible emissions and Rule 228 related to fugitive dust, which would be noted on City-approved construction plans. In addition, the City has adopted construction standards that apply to all projects within the City limits that require projects to meet specific engineering and design requirements. The Proposed project would be required to comply with the City's Department of Public Works Construction Standards, Section 111, that are intended to minimize fugitive dust and PM_{10} emissions during construction activities. Compliance with the engineering and design requirements would be noted on City-approved construction plans as well.

As shown in **Table 2** above, the PCAPCD-recommended threshold of significance for construction is 82 pounds per day for ROG, NOX, and PM_{10} and 550 pounds per day for CO (PCAPCD 2016). **Table 3** below presents the estimated construction-related emissions of ROG, NOX, PM_{10}, and CO resulting from the proposed project.

Table 3 — Maximum Unmitigated Project Construction Emissions

Pollutant	Project Emissions (lbs/day)	PCAPCD Significance Threshold (lbs/day)
ROG	6.26	82.0
NO_x	69.07	82.0
PM_{10}	23.45	82.0
CO	40.37	550.0

Source: Road Construction Emissions Model, August 2016 (**Appendix B**).

As shown in **Table 3**, the project's associated short-term construction-related emissions would be well below the PCAPCD recommended thresholds of significance. Therefore, construction activities associated with development of the proposed project would not substantially contribute to the PCAPCD's non-attainment status for ozone or PM. Because the Proposed project would not result in emissions above the PCAPCD's recommended thresholds of significance and would comply with PCAPCD rules and regulations for construction, the project would be considered to result in a ***Less Than Significant Impact*** associated with construction emissions.

Operational Emissions

Operational emissions of ROG, NOX, CO, and PM_{10} are generated by mobile and stationary sources, including day-to-day activities such as vehicle trips to and from a project site, natural gas combustion from heating mechanisms, landscape maintenance equipment exhaust, and consumer products (e.g., deodorants, cleaning products, spray paint, etc.). However, as discussed previously, the proposed project would not significantly modify the existing land use or operations on the project site. Thus, the

proposed project would not involve mobile, stationary, or area sources and new operational emissions would not occur. Therefore, the proposed project would be considered to result in a ***Less Than Significant Impact*** associated with operational emissions.

Conclusion

The Proposed project would not exceed the applicable thresholds of significance for air pollutant emissions during construction or operation. The Proposed project would not violate any air quality standard or contribute substantially to an existing or projected air quality violation. Therefore, implementation of the proposed project would result in a ***Less Than Significant Impact*** impact related to air quality. No mitigation is required.

c. **Less Than Significant Impact**. The Proposed project is within a non-attainment area for ozone and PM. The growth and combined population, vehicle usage, and business activity within the non-attainment area from the project, in combination with other past, present, and reasonably foreseeable projects within the City of Roseville and surrounding areas, could either delay attainment of the standards or require the adoption of additional controls on existing and future air pollution sources to offset emission increases.

The proposed project would only involve new emissions during construction. Since the proposed project is designed to facilitate cumulative growth in traffic volume as disclosed in the ARSP EIR, traffic emissions from long-term operation of the proposed project have already been accounted for. Construction emissions are a one-time release and would occur temporarily. Accordingly, the incremental contribution of the proposed project's construction-related emissions would not be cumulatively considerable. Therefore, the proposed project would result in a ***Less Than Significant Impact***, cumulatively. No mitigation is required.

d. **Less Than Significant Impact**. As presented above, CO emissions were determined to be well below thresholds during both construction and operation of the proposed project. Emissions of CO results from the incomplete combustion of carbon-containing fuels such as gasoline or wood and are particularly related to traffic levels. The proposed bike lanes and sidewalk improvements would connect to the existing Pleasant Grove Creek Trail within an existing park and would be accessible to pedestrians and bicyclists via access points off of Woodcreek Oaks Boulevard into Blue Oaks Park; therefore, the proposed project would not result in a land use which would be unique to the community and would not generate a substantial increase in vehicle trips to the area. Further, significant traffic congestion, which can lead to elevated concentrations of vehicle emissions at intersections, is not expected within the project limits. Accordingly, the proposed project would not cause substantial levels of CO at surrounding intersections or generate localized concentrations of CO that would exceed standards.

Toxic Air Contaminants (TACs) are a category of environmental concern as well. The CARB's *Air Quality and Land Use Handbook: A Community Health Perspective* (Handbook) provides recommendations for citing new sensitive land uses near sources typically associated with significant levels of TAC emissions, including, but not limited to, freeways and high traffic roads, distribution centers, and rail yards (CARB 2005). The CARB has identified diesel particulate matter (DPM) from diesel-fueled engines as a TAC; thus, high volume freeways, stationary diesel engines, and facilities attracting heavy and constant diesel vehicle traffic are identified as having the highest associated health risks from DPM. Health risks from TACs are a function of both the concentration of emissions and the duration of exposure. Health-related risks associated with DPM in particular are primarily associated with long-term exposure and associated risk of contracting cancer.

Because the Proposed project does not involve on-site operations other than recreational use by pedestrians and bicyclists, long-term operation of any stationary diesel engine or other major on-site stationary source of TACs would not occur. Emissions of DPM resulting from construction-related equipment and vehicles would be temporary and sensitive receptors from the surrounding

neighborhood would not be exposed to substantial long-term concentrations of DPM emissions associated with construction of the proposed project.

Furthermore, the proposed project would not introduce any sensitive receptors to the area, and, thus, would not expose sensitive receptors to any existing sources of substantial pollutant concentrations.

In conclusion, the proposed project would not introduce sensitive receptors to the area and would not generate substantial levels of pollutant concentrations that would expose existing sensitive receptors in the area. Therefore, impacts related to exposing sensitive receptors to substantial pollutant concentrations would be a ***Less Than Significant Impact***. No mitigation is required.

e. Less Than Significant Impact. While offensive odors rarely cause any physical harm, they can be unpleasant, leading to considerable distress among the public and often generating citizen complaints to local governments and air districts. Project-related odor emissions would be limited to the construction period, when emissions from equipment may be evident in the immediately surrounding area. These activities would be short-term and are not likely to result in nuisance odors that would violate PCAPCD odor regulations. This impact is therefore considered to be a ***Less Than Significant Impact***. No mitigation is required.

3.4 Biological Resources

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	☐	☒	☐	☐
b. Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	☐	☒	☐	☐
c. Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marshes, vernal pools, coastal wetlands, etc.) through direct removal, filling hydrological interruption, or other means?	☐	☒	☐	☐
d. Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	☐	☐	☒	☐
e. Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	☐	☐	☒	☐
f. Conflict with the provisions of an adopted habitat conservation plan, natural community conservation plan, or other approved local, regional, or state habitat conservation plan?	☐	☐	☐	☒

Discussion of Checklist Answers:

a. **Less Than Significant Impact With Mitigation Incorporated**. Based on a records search of the California Natural Diversity Database (CNDDB), the U.S. Fish and Wildlife Service (USFWS), and California Native Plant Society (CNPS) lists as well as field observations, several special-status species are found to have the potential to occur onsite or in the vicinity of the site. The CNDDB special-status species occurrences in the project vicinity are shown in Appendix B of the *Biological Resources Report* prepared by Dokken engineering in August 2016 for the proposed project.

Special-Status Plants

Preliminary literature research determined special status plant species had the potential to occur in the vicinity of the project. Literature review and database searches identified 10 special status plant species with potential to occur within the vicinity of the project. The specific soil and habitat requirements of each species as well as known occurrences of each species were further researched. Based on habitat assessments, soil maps, botanical surveys and recorded occurrences of regional special status plant species, 2 special status plant species (Dwarf Downingia [Downingia pusilla] and Sanford's arrowhead [Sagittaria sanfordii]), have the potential to occur within the BSA and are discussed below.

Dwarf Downingia

A review of the known occurrence of dwarf downingia suggests that the BSA is located within the current range of the species. The BSA is within suitable elevation range of the species and potentially suitable mesic valley and foothill grassland communities for the species are present within oak woodland portions of the BSA. During the August 11th 2016 field survey, dwarf downingia was not observed; however, surveys were conducted outside of the blooming period for the species. The species is considered to have a high potential of occurring within the BSA based on the presence of potentially suitable mesic grassland habitat as well as numerous documented recent occurrences of the species within the local area. Implementation of **Mitigation Measure BIO — 1**, which requires pre-construction focused plant survey during the blooming season, would reduce potential impacts to Dwarf Dowingia to ***Less than Significant with Mitigation Incorporated***.

Sanford's arrowhead

A review of the known occurrence of Sanford's arrowhead suggests that the BSA is located within the current range of the species. The BSA is within the suitable elevation range of the species and a potentially suitable seasonal freshwater stream does run through the BSA. During the August 2016 survey, Sanford's arrowhead was not observed. This species is considered to have a low potential of occurrence within the BSA based on the presence of suitable seasonal habitat, and the single recent occurrence within 5.5 miles of the BSA. Implementation of **Mitigation Measure BIO — 1** would reduce potential impacts to Sanford's arrowhead to ***Less than Significant with Mitigation Incorporated***.

Special-Status Wildlife

Literature research and habitat assessments determined that special status wildlife species have the potential to occur within the project vicinity. On August 11th, 2016 the BSA was surveyed for presence of regional special status species. No special status species were observed or are presumed present within the BSA.

Though no special status species were observed, a total of 6 special status wildlife species were identified as potentially occurring within the BSA, including: Western spadefoot, burrowing owl, grasshopper sparrow, Swainson's Hawk, white-tailed kite, and valley elderberry longhorn beetle. In addition, native birds, protected under the the Migratory Bird Treaty Act (MBTA) and similar provisions under CFG code, could nest within the BSA and the project impact area. During the biological surveys, evidence of suitable nesting habitat was observed within the shrubs, grasslands and trees

adjacent to the project BSA. No additional suitable habitat for federal or state sensitive, threatened or endangered species occur within the BSA.

Western spadefoot

The BSA contains a small segment of suitable mesic grassland habitat that may provide temporary pools for breeding and reproduction. Currently there is no habitat (mesic grassland) with the proposed project BSA. The nearest CNDDB occurrence is a recent 2001 recording of the species, 1.5 miles from the BSA (CNDDB 2016). This species is considered to have a low potential of occurring within the BSA based on potentially suitable habitat and recent occurrences near the BSA. No impacts to the Western spadefoot are anticipated with species surveys conducted prior to construction as required by **BMP — 2** discussed in Section 2.7 under Environmental Commitments. Therefore, potential impacts to Dwarf Dowingia are considered **Less than Significant**.

Burrowing Owl

During the August 2016 biological surveys, friable soils and open areas with sparse vegetation were observed. The BSA does not contain any mammal burrows suitable for burrowing owl. The Project contains valley grassland that may provide suitable burrow and foraging habitat for burrowing owl. The nearest CNDDB occurrence is a recent 2008 recording at the Moore Ranch Conservancy, approximately 5 miles from the BSA (CNDDB 2016). The species is considered to have a moderate potential of occurring within the BSA based on potentially suitable habitat and nearby recent/historic occurrences of the species. No impacts to burrowing owls are anticipated with species specific surveys conducted prior to construction. Implementation of **Mitigation Measures BIO — 2**, **BIO — 3**, and **BIO — 4** would reduce potential impacts to Burrowing owl to ***Less than Significant with Mitigation Incorporated***.

Grasshopper Sparrow

The project has valley grasslands potentially suitable for the species' foraging and nesting habitat. Although the grassland habitat onsite lacks the species' preferred structural diversity, the BSA contains adequately dense cover during the breeding season. The nearest CNDDB occurrence is approximately 6 miles from the project location. The species is considered to have a low potential of occurring within the BSA based on presence of potentially suitable habitat and a recent occurrence within 6 miles. No impacts to grasshopper sparrows are anticipated with species specific surveys conducted prior to construction. Implementation of **Mitigation Measures BIO — 2** and **BIO — 3** would reduce potential impacts to Grasshopper Sparrow to ***Less than Significant with Mitigation Incorporated***.

Swainson's Hawk

The project has annual grasslands within oak woodlands suitable for the species' foraging. Although little to no nesting habitat occurs within the BSA, suitable nesting habitat is present within the project vicinity. The nearest CNDDB occurrence documented a nesting pair with young in 2008, approximately 1 mile from the BSA. The species is considered to have a high potential of occurring within the BSA based on presence of potentially suitable habitat and local and regional occurrences of the species. No impacts to Swainson's Hawks are anticipated with species specific surveys conducted prior to construction. Implementation of **Mitigation Measures BIO — 2** and **BIO — 3** would reduce potential impacts to Swainson's Hawk to ***Less than Significant with Mitigation Incorporated***.

White-tailed Kite

The BSA has annual grasslands suitable for the species' foraging, and suitable nesting habitat in the valley foothills riparian woodland and oak woodland areas are in the vicinity of the BSA. Also, the species is regularly seen by local bird enthusiasts (ebird.org 2016) along creek corridors. The nearest CNDDB occurrence documented a nesting adult with young in 2003, approximately 7.5 miles from the BSA (CNDDB 2016). This species is considered to have a moderate potential of occurring within the BSA based on the presence of potentially suitable habitat and regular sightings occurring in the local area. No impacts to white-tailed kite are anticipated with species specific surveys conducted prior to

construction. Implementation of **Mitigation Measures BIO — 2** and **BIO — 3** would reduce potential impacts to White-tailed Kite to ***Less than Significant with Mitigation Incorporated***.

Western Pond Turtle

Within the BSA, stream flows typically end in mid to late May in the Pleasant Grove Creek South Branch east of the bridge spanning the creek. However, there seems to be a permanent water body west of the bridge provided by an output culvert. Three recent occurrences have been documented within 10 miles of the BSA. The nearest CNDDB occurrence documented is approximately 7 miles from the BSA (CNDDB 2016). This species is presumed to have a low potential of occurring because of the suitable habitat within the BSA and multiple recent occurrences. No impacts to Western pond turtle are anticipated with field surveys within the BSA conducted prior to construction. As required by **BMP - 2** discussed in Section 2.7 under Environmental Commitments. Therefore, potential impacts to Western Pond Turtle are considered ***Less than Significant***.

b. **Less Than Significant Impact With Mitigation Incorporated**. Much of the project site consists of developed residential neighborhoods, but also includes a small area of the Woodcreek Golf Club, a small area of valley grassland, and Blue Oaks Park with the riparian zone of the South Branch Pleasant Grove Creek.

Blue Oak Woodland

A portion of the BSA includes Blue Oak Woodland. Blue Oak woodland consists of a zone of blue oak (Quercus douglasii) dominated, comprising 85-100 percent of the trees present. Common associates include interior live oak, and valley oak. Historically, losses of oak woodlands occurred because of clearing for range improvements and agriculture; the major losses now are from intensive residential and industrial development. Oak woodlands are important wildlife habitat, and they provide public recreation and aesthetics. Since virtually all of the state's water flows through or is impounded in the oak woodland belt, these communities are also very important to water quantity and quality (Placer County, 2004).The habitat understory composed of grass and forbs was dominated by wild oat (Avena fatua) and yellow-star thistle (Centaurea solstitialis), with minimal shrub species.

Valley Foothill Riparian Woodland

A portion of the BSA includes valley foothill riparian woodland cover type. Valley foothill riparian woodland is defined as all stands of deciduous trees near perennial streams in western Placer County. These water-dependent ecosystems include widely distributed riparian habitats dominated by white alder, willows, and Fremont cottonwood, as well as stands of Valley Oak Woodland (Placer County, 2004). Within the BSA, a portion of valley foothill riparian woodland runs along the Pleasant Grove Creek South Branch, composed of patchy Narrowleaf willow (Salix exigua), Interior Live Oak (Quercus wislizeni), and California wild rose (Rosa californica).

Riverine

A portion of the BSA includes a riverine ecosystem. The riverine system occurring within the BSA is the seasonal stream channel of the Pleasant Grove Creek South Branch. Intermittent streams receive some input from groundwater discharge in addition to precipitation runoff and flow seasonally; ephemeral streams receive no input from groundwater and flow only during and following storm events in response to precipitation runoff (Placer County, 2004). The creek channel was composed of spreading rush, rough cocklebur, pennyroyal, and common cattail.

Conclusion

The proposed project would primarily affect previously disturbed and developed land in residential areas. Between Horncastle Avenue and Crimson Ridge Way, where a new bridge crossing of the South Branch of Pleasant Grove Creek is proposed, a potential loss of Blue Oak Woodland would

occur but is not considered a significant impact. Potential relocation of the sewer and reclaimed water lines are included within the temporary impacts below. These impacts are shown in Figure 4 and are tabulated in Table 4 below:

Table 4 — Natural Community Impacts

	Permanent Impacts	Temporary Impacts
Blue Oak Woodland	0.51 acres	0.56 acres

Compliance with the Federal Clean Water Act (CWA), State Fish and Game Code and the City of Roseville Tree Preservation Ordinance, and implementation of **BIO — 5** would ensure that any impacts to sensitive natural communities within the project site would be ***Less Than Significant with Mitigation Incorporated***.

c. Less Than Significant Impact With Mitigation Incorporated. The proposed project would result in temporary and permanent impacts to jurisdictional waters of the U.S. and waters of the State. Permanent effects include the roadway widening at the creek due to the placement of the bridge piers and northern bridge abutment. These impacts are shown in Figure 5. Temporary effects include construction areas associated with the roadway widening and within the temporary dewatering area. Potential relocation of the sewer and reclaimed water lines are included within the temporary impacts below. These areas would be re-contoured to preconstruction conditions and re-vegetated after construction.

The project would have less than 0.01 acres permanent effects to the Waters of the U.S and waters of the State. As shown in Table 5 below, the project would temporarily affect approximately 0.07 acres of waters of the U.S. and 0.17 acres of waters of the State.

Table 5 — Impacts to Jurisdictional Waters

	Permanent Impacts	Temporary Impacts
Waters of the U.S. (Riverine)	<0.01	0.07
Waters of the State (Riparian)	<0.01	0.17

Implementation of **BMP — 2** would ensure temporary impacts to waters are minimized and affected areas are restored to pre-project contours/conditions. Further, mitigation measures **BIO — 5** and **BIO — 6** would ensure permanent impacts to waters of the State are mitigated at a 2:1 ratio and waters of the US are mitigated to no net loss consistent with typical requirements of CDFW and USACE. Therefore, implementation of **BIO — 5** and **BIO — 6** would reduce impacts to waters to ***Less Than Significant with Mitigation Incorporated***.

d. Less Than Significant Impact. According to the *Biological Resources Report*, there are no sensitive fish species known to occur within the proposed project area. Temporary work would be conducted within the ordinary high water mark (OHWM) of the creek; however, a water diversion plan would be implemented which would pipe the water under the proposed bridge using a coffer dam upstream of the bridge to direct water into culvert pipes. The proposed bridge is not anticipated to interfere with the movement of resident or migratory fish or wildlife species.

The City would coordinate with the required agencies as a part of the permitting processes. Impacts are therefore considered ***Less Than Significant*** and no mitigation is required.

e. Less Than Significant Impact. According to the *Biological Resources Report*, the proposed project would not necessitate the removal of native oak trees protected by the City of Roseville Tree Preservation Ordinance. If it becomes necessary for any native oak trees to be removed, tree removal

and mitigation would be consistent with **BMP — 1** discussed in Section 2.7 under Environmental Commitments. Impacts are ***Less than Significant***.

f. No Impact. There are no approved Habitat Conservation Plans, Natural Conservation Community Plans, or other adopted plans applicable to the proposed project. Therefore, there would be ***No Impact*** and no mitigation is required.

Mitigation Measures:

Sensitive Plant Species

BIO — 1: A focused plant survey will be conducted during the blooming season prior to the start of Construction (March-May). If rare plants are discovered during these surveys, additional ESA fencing or relocation will be implemented to avoid and minimize impact to the species. Coordination with CDFW may be required to determine appropriate buffer distances.

Avian Species

Native birds, protected under the Migratory Bird Treaty Act (MBTA) and similar provisions under California Fish and Game (CFG) code, currently nest or have the potential to nest within the BSA and the project impact area. During the August 2016 biological survey, habitat for nesting birds was identified within the BSA. The BSA contains interior live oaks, a small riparian habitat, and numerous other large trees suitable for nesting birds. To minimize and avoid potential impacts to migratory birds, the following mitigation measures will be implemented:

BIO — 2: If possible, vegetation removal should occur outside the nesting season for all bird species (February 1st – August 31st).

BIO — 3: If vegetation removal is to take place during the nesting season (February 1st – August 31st), a pre-construction nesting bird survey must be conducted within 7 days prior to vegetation removal. Within 2 weeks of the nesting bird survey, all vegetation cleared by the biologist will be removed by the contractor.

A minimum 100 foot no-disturbance buffer will be established around any active nest of migratory birds and a minimum 300 foot no-disturbance buffer will be established around any nesting raptor species. The contractor must immediately stop work in the nesting area until the appropriate buffer is established and is prohibited from conducting work that could disturb the birds (as determined by the project biologist and in coordination with wildlife agencies) in the buffer area until a qualified biologist determines the young have fledged. A reduced buffer can be established if determined appropriate by the project biologist and approved by CDFW.

BIO — 4: A preconstruction survey will be conducted within 7 days prior to ground disturbing activities to find active burrowing owl burrows within a 500-foot buffer zone around construction activities, between February 1st – August 31st. If burrowing owls are observed during the preconstruction survey, coordination with CDFW will be required to determine appropriate no-work buffer distances and other avoidance strategies.

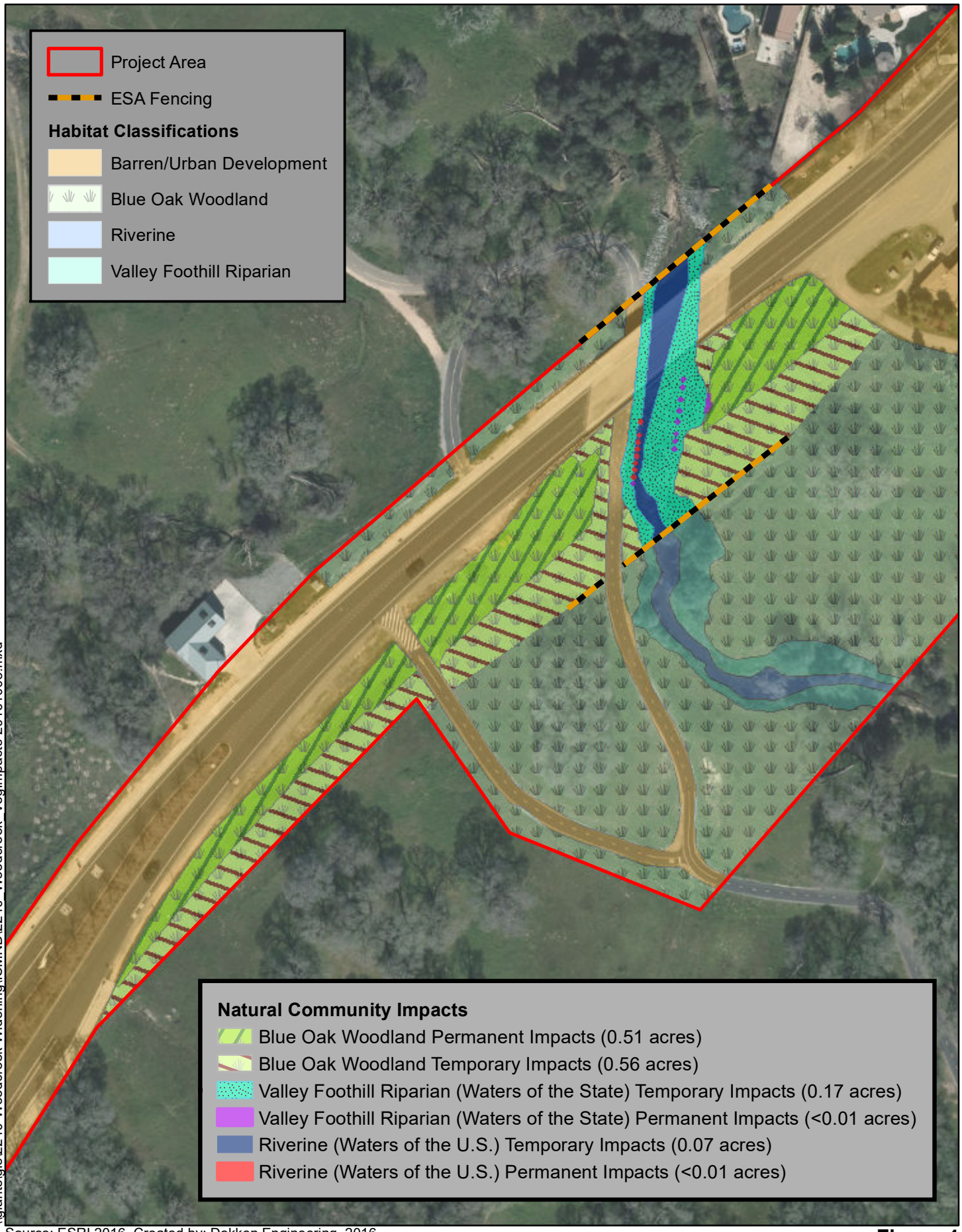
Riparian Habitat

BIO — 5: As required by **BMP — 2**, all temporary disturbed riparian areas will be restored following construction. In addition, all permanent impacts to riparian habitat (waters of the State) will be mitigated a minimum of 2:1 ratio via purchase of mitigation credits at an agency approved mitigation bank. Exact mitigation ratios and locations will be documented in the Section 1602 Lake and

Streambed Alteration Agreement to be obtained from the California Department of Fish and Wildlife prior to construction.

Riverine Habitat

BIO — 6: Permanent impacts to riverine (waters of the U.S.) will be mitigated to ensure no net loss by purchasing mitigation credits from the National Fish and Wildlife Foundation in-lieu fee program or an agency approved mitigation bank. Exact mitigation ratios and locations will be documented in the Section 404 Nationwide Permit to be obtained from the U.S. Army Corp of Engineers prior to construction.

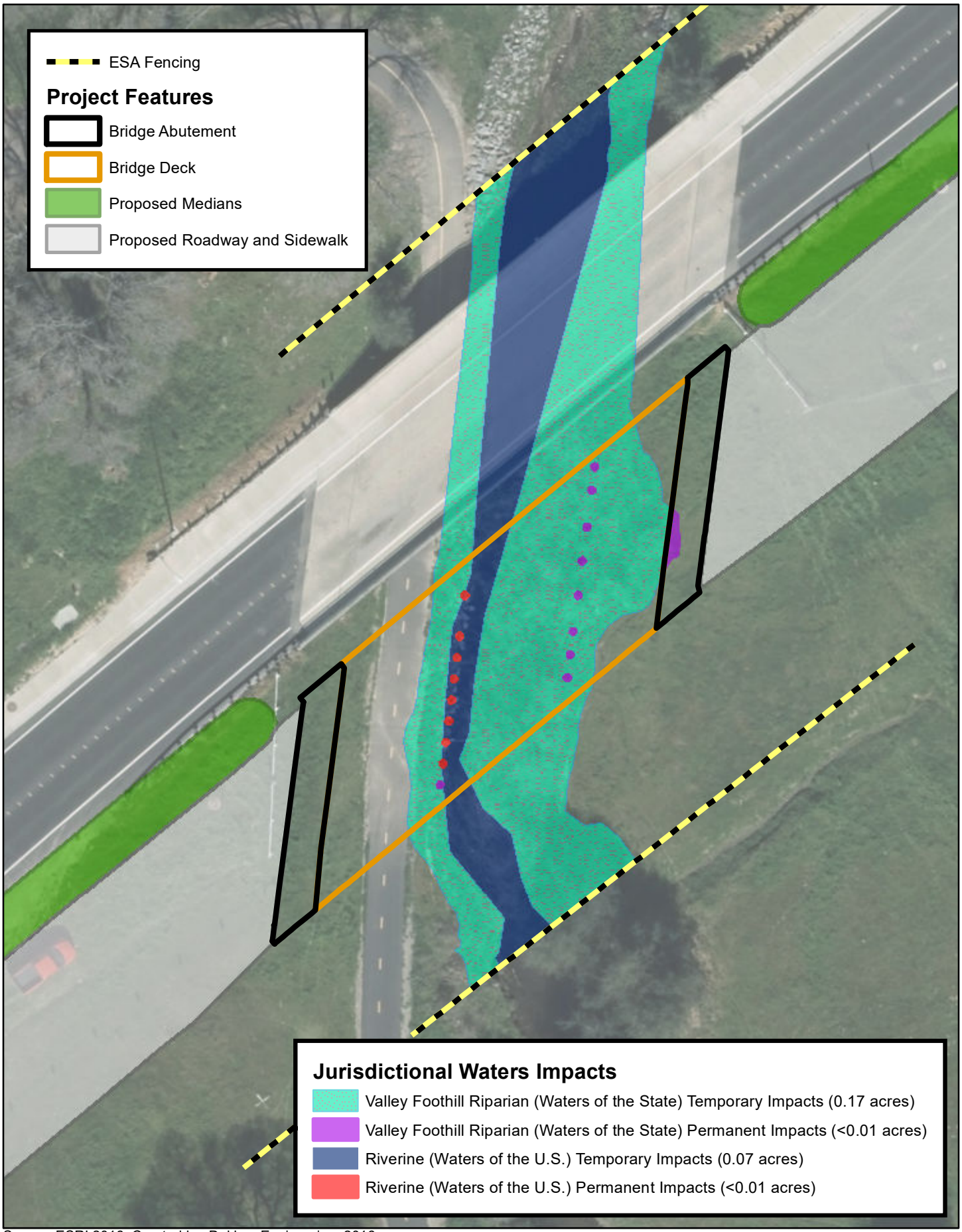


\giants\gis\2240-Woodcreek Widening\ISMND\2240_Woodcreek_VegImpacts-20161003.mxd

Source: ESRI 2016. Created by: Dokken Engineering, 2016

0 50 100 150 200 Feet

Figure 4
Natural Community Impacts
Woodcreek Oaks Boulevard Widening Project
City of Roseville, Placer County, California



Source: ESRI 2016. Created by: Dokken Engineering, 2016

0 25 50 75 100 Feet

Figure 5
Impacts to Jurisdictional Waters
Woodcreek Oaks Boulevard Widening Project
City of Roseville, Placer County, California

3.5 Cultural Resources

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Cause a substantial adverse change in the significance of a historical resource as defined in Section 15064.5?	☐	☒	☐	☐
b. Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5?	☐	☒	☐	☐
c. Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	☐	☒	☐	☐
d. Disturb any human remains, including those interred outside of dedicated cemeteries?	☐	☒	☐	☐
e. Cause a substantial adverse change in the significance of a tribal cultural resource as defined in Public Resource Code 21074?	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b. **Less Than Significant with Mitigation Incorporated**. According to the *Cultural Resources Inventory Report* prepared by Dokken Engineering in August 2016 for the proposed project, efforts to identify potential historic properties in the Area of Potential Effects (APE) include background research, a search of site records and survey reports on file at the North Central Information Center (NCIC), efforts to coordinate with Native American representatives, and a pedestrian ground surface inventory. A record search was obtained for the project area on July 19, 2016, which included the project area. The NCIC identified no previously recorded cultural resources within the APE but 28 cultural resources within one-mile of the APE. These 28 resources consist of 16 prehistoric sites and 10 historic-era sites. None of these previously recorded resources would be impacted by the proposed project.

On August 16, 2016 Dokken Engineering archaeologist Dr. Brian Marks conducted a ground surface inventory of the APE. No prehistoric or historic cultural resources were identified during the August 16, 2016 surface inventory. The pedestrian ground surface inventory did not identify any archaeological sites. Based on these findings, the project Cultural Resources Inventory Report found that the proposed project would result in no impacts to historic resources.

However, it is possible that ground-disturbing activities may inadvertently uncover buried and previously unidentified cultural resources. In the event that construction activities occur within previously undisturbed soils and buried cultural resources are discovered, such resources could be damaged or destroyed, potentially resulting in significant impacts on cultural resources. Implementation of **Mitigation Measure CR — 1** stated below would cease work in the event of a discovery and would require consultation with a Qualified Archaeologist to assess the resource and provide management recommendations (EIP Associates 1997). Implementation of **Mitigation Measure CR — 1** would therefore reduce potential impacts to historical and archaeological resources to ***Less Than Significant With Mitigation Incorporated***.

c. **Less Than Significant With Mitigation Incorporated**. It is possible that ground-disturbing activities may inadvertently uncover previously unidentified buried paleontological resources (i.e. fossils). In the event that construction activities occur within previously undisturbed soils and buried paleontological resources are discovered, such resources could be damaged or destroyed, potentially resulting in significant impacts to paleontological resources. Implementation of **Mitigation Measure CR — 2** below would reduce impacts to ***Less Than Significant With Mitigation Incorporated***.

d. **Less Than Significant With Mitigation Incorporated**. There are no known formal cemeteries within the project area. However, the possibility that ground-disturbing activities during construction may inadvertently uncover previously unidentified and buried human remains exists, and this inadvertent discovery would be considered a potentially significant impact. Implementation of **Mitigation Measure CR — 3** would reduce this impact to ***Less Than Significant With Mitigation Incorporated***.

e. **No Impact**. According to the *Cultural Resources Inventory Report*, Dokken Engineering sent a letter and a map depicting the project vicinity to the NAHC in West Sacramento, asking the commission to review the sacred land files for any Native American cultural resources that might be affected by the project on July 8, 2016. The request to the NAHC seeks to identify any Native American cultural resources within or adjacent to the project area. A list of Native American individuals who might have information or concerns about the project was also requested. On July 18, 2016, Sharaya Souza (NAHC Staff Services Specialist), informed Dokken Engineering via email that a review of the sacred lands file failed to indicate the presence of native American cultural resources in the "immediate project area".

The City sent AB52 letters via certified mail to tribes who requested to be notified of proposed project on July 11. The letters provided a summary of the project and requested information regarding comments or concerns the Native American community might have about the project. No response from the tribes was received within 30 days of receipt of AB52 notification letter from the City. Therefore, no TCRs have been identified within or near the project area, and there would be ***No Impact.***

Mitigation Measures:

No known cultural resources are present within the project area. However, grading and excavation activities associated with project implementation may result in the inadvertent discovery of cultural resources.

The following Mitigation Measure are proposed to reduce potential archaeological, paleontological, and cultural resource impacts related to cultural resources relevant to the proposed project to a less than significant level.

CR — 1: **Cease Work and Consult a Qualified Archaeologist**
In the event of the discovery of buried archaeological deposits it is recommended that project activities in the vicinity of the find should be temporarily halted and a Qualified Archaeologist consulted to assess the resource and provide proper management recommendation. Possible management recommendations for important resources could include resource avoidance or data recovery excavations.

CR — 2: **Previously Unidentified Paleontological Resources**
The City shall ensure construction specifications shall include the following information in the grading notes:

- If substantial fossil remains (particularly vertebrate remains) are discovered during earth-disturbing activities on the project site, activities will stop

immediately until a state-registered Professional Geologist or Qualified Professional Paleontologist can assess the nature and importance of the find and a Qualified Professional Paleontologist can recommend appropriate treatment. Treatment may include preparation and recovery of fossil materials so that they can be housed in an appropriate museum or university collection and may also include preparation of a report for publication describing the finds. The City will be responsible for ensuring that recommendations regarding treatment and reporting are implemented.

CR — 3: Inadvertent Discovery of Human Remains

The City shall ensure construction specifications include the following in the grading notes:

- If human remains are discovered during any phase of construction, including disarticulated or cremated remains, the construction contractor shall immediately cease all ground-disturbing activities within 100 feet of the remains and notify the Placer County Coroner's Office, and City of Roseville City Manager's Office.

- In accordance with California State Health and Safety Code Section 7050.5, no further disturbance shall occur until the following steps have been completed:

    - The County Coroner has made the necessary findings as to origin and disposition pursuant to Public Resources Code (PRC) § 5097.98.

    - If the remains are determined by the County Coroner to be Native American, the NAHC shall be notified within 24 hours, and the guidelines of the NAHC shall be adhered to in the treatment and disposition of the remains. It is further recommended that a professional archaeologist with Native American burial experience conduct a field investigation of the specific site and consult with the Most Likely Descendant (MLD), if any, identified by the NAHC. As necessary and appropriate, a professional archaeologist may provide technical assistance to the MLD, including but not limited to, the excavation and removal of the human remains.

3.6 Geology and Soils

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:				
i. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.	☐	☐	☒	☐
ii. Strong seismic groundshaking?	☐	☐	☒	☐
iii. Seismic-related ground failure, including liquefaction?	☐	☐	☒	☐
iv. Landslides?	☐	☐	☒	☐
b. Result in substantial soil erosion or the loss of topsoil?	☐	☐	☒	☐
c. Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	☐	☐	☒	☐
d. Be located on expansive soil, as defined in Section 1803.5.3 of the 2010 CBC, creating substantial risks to life or property?	☐	☐	☒	☐
e. Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?	☐	☐	☐	☒

Discussion of Checklist Answers:

a. **Less Than Significant Impact**. Several faults have been identified within 60 miles of the Sacramento area. However, no known active faults are located in Placer County, including the project vicinity. The south Placer County area is classified as a low-severity earthquake zone. Three inactive faults lie within the immediate Roseville vicinity: the Volcano Hill Fault, extending approximately one mile northwesterly from just east of the Roseville City Limits; the Linda Creek Fault, extending along a portion of Linda Creek through Roseville and a portion of Sacramento County; and an unnamed fault extending east to west between Folsom Lake and Rocklin. Portions of this fault are concealed, but they are possibly connected to the Bear Mountain Fault near Folsom Lake. No Alquist-Priolo Earthquake Fault Zones are located in Roseville or Placer County. Impacts related to fault rupture would be less than significant.

Placer County is classified as a low severity earthquake zone and no active faults are known to exist within the county. The Plan Area is not located within an Alquist-Priolo Special Studies Zone. Regular monitoring and enforcement of Uniform and California Building Codes regarding seismic safety would ensure that new development and construction would meet all seismic safety standards, protecting the public by reducing the risk of building damage or collapse. Site-specific geotechnical information prepared for the project has been incorporated into project design to ensure compliance with applicable California Building Code (CBC) regulations for seismic safety as well as the City of Roseville Design and Construction Standards. Because all new structures would be required to follow specific seismic safety standards, hazards associated with strong ground shaking are not significant.

Primary factors that trigger liquefaction are moderate to strong ground shaking, relatively clean, loose granular soils (primarily poorly graded sands and silty sands), and saturated soil conditions (shallow groundwater). According to the *Foundation and Geotechnical Design Report* (geotechnical report) prepared by Geocon Consultants in August 2016 for the proposed project, subsurface conditions along the proposed project generally consists of alluvial soils. The consistency of fine-grained soils generally ranges from medium stiff to hard, and relative density of granular soils ranges from loose to very dense. The silt and clay layers exhibited moderate to strong cementation beginning at about 1 to 3 feet with the degree of cementation somewhat decreasing with depth. According to the *Foundation and Geotechnical Design Report*, based on the low potential for ground shaking and soil conditions, the potential for liquefaction is also low, and mitigation measures are not necessary.

According to the *Foundation and Geotechnical Design Report*, conditions indicative of landslides or slope instability were not observed. None are known to exist at a location that would impact the proposed project.

For these reasons, potential impacts associated with fault rupture, strong groundshaking, seismic-related ground failure, including liquefaction is considered less than significant under the proposed project. Impacts are therefore considered to be a ***Less Than Significant*** and no mitigation is required.

b. **Less Than Significant Impact**. The Proposed project takes place largely at existing paved areas. Where applicable and to the greatest extent possible, the existing roadway would be widened by narrowing the existing median, thereby protecting and maintaining existing curb, gutter and sidewalk infrastructure, and existing vegetation and trees to the greatest extent practicable within the existing median. As discussed in Section 2.7 under Environmental Commitments, during construction of the proposed project, several erosion and sediment control measures would be implemented as a part of **BMP – 3**. The preparation of a Stormwater Pollution Prevention Plan (SWPPP) is required to comply with the National Pollutant Discharge Elimination System (NPDES) General Permit administered by the State Water Resources Control Board. The SWPPP will identify structural and non-structural BMPs to control erosion. Erosion and sediment control BMPs state that construction shall not commence until the SWPPP has been approved by the City and that the SWPPP must be kept onsite

at all times during construction. They also include measures to prevent erosion and topsoil loss such as hydroseeding and the use of broadcast straw and broadcast seed.

In addition, the proposed project would comply with the City's Design and Construction Standards, which prescribe erosion/sediment control and grading requirements addressing erosion. Impacts would therefore be considered to be ***Less Than Significant*** and no mitigation is required.

c. **Less Than Significant Impact**. Lateral spreading, a phenomenon associated with liquefaction, subsidence, or other geologic or soils conditions that could create unstable subsurface conditions that could affect proposed project features, is not a significant hazard for the project site. According to the *City of Roseville Hazard Mitigation Plan 2011*, Roseville's geographic location, soil conditions, and surface terrain combine to minimize risk of major damage from landslides, subsidence, or other geologic hazards resulting from seismic activity and related natural forces. According to the *Foundation and Geotechnical Design Report*, due to the low potential for liquefaction and the geometry of the subsurface conditions at the site, seismic-induced lateral spreading is not considered a hazard.

During project design and prior to construction, the City would ensure the design specifications in the site-specific geotechnical report prepared for the project are implemented, in accordance with the City of Roseville Design and Construction Standards. Impacts would therefore be considered ***Less Than Significant*** and no mitigation is required.

d. **Less than Significant Impact**. According to the *Foundation and Geotechnical Design Report*, near surface soils are generally considered to have low potential expansion. Impacts related to expansive soils are ***Less than Significant***.

e. **No Impact**. The Proposed project would involve the widening of an existing roadway and construction of a bridge. Therefore, ***No Impact*** on soils related to the use of septic tanks would occur. No mitigation is required.

3.7 Greenhouse Gas Emissions

	Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
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?	☐	☐	☒	☐

Regulatory Setting

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

While climate change has been a concern for several decades, the establishment of the Intergovernmental Panel on Climate Change (IPCC) by the United Nations and World Meteorological Organization in 1988 has led to increased efforts devoted to GHG emissions reduction and climate change research and policy. These efforts are primarily concerned with the emissions of GHGs generated by human activity including carbon dioxide (CO2), methane (CH4), nitrous oxide (N2O), tetrafluoromethane, hexafluoroethane, sulfur hexafluoride (SF6), HFC-23 (fluoroform), HFC-134a (s, s, s, 2-tetrafluoroethane), and HFC-152a (difluoroethane).

In the U.S., the main source of GHG emissions is electricity generation, followed by transportation. In California, however, transportation sources (including passenger cars, light-duty trucks, other trucks, buses, and motorcycles) make up the largest source of GHG-emitting sources. The dominant GHG emitted is CO2, mostly from fossil fuel combustion.

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

There are four primary strategies for reducing GHG emissions from transportation sources: 1) improving the transportation system and operational efficiencies, 2) reducing travel activity, 3) transitioning to lower GHG-emitting fuels, and 4) improving vehicle technologies/efficiency. To be most effective, all four strategies should be pursued cooperatively.

State

With the passage of several pieces of legislation including State Senate and Assembly bills and Executive Orders, California launched an innovative and proactive approach to dealing with GHG emissions and climate change.

Assembly Bill 1493 (AB 1493), Pavley, Vehicular Emissions: Greenhouse Gases, 2002: This bill requires the CARB to develop and implement regulations to reduce automobile and light truck GHG emissions. These stricter emissions standards were designed to apply to automobiles and light trucks beginning with the 2009-model year.

Executive Order (EO) S-3-05 (June 1, 2005): The goal of this EO is to reduce California's GHG emissions to 1) year 2000 levels by 2010, 2) year 1990 levels by 2020, and 3) 80 percent below the year 1990 levels by 2050. In 2006, this goal was further reinforced with the passage of Assembly Bill 32.

Assembly Bill 32 (AB 32), Núñez and Pavley, The Global Warming Solutions Act of 2006: AB 32 sets the same overall GHG emissions reduction goals as outlined in EO S-3-05, while further mandating that ARB create a scoping plan and implement rules to achieve "real, quantifiable, cost-effective reductions of greenhouse gases."

Executive Order S-20-06 (October 18, 2006): This order establishes the responsibilities and roles of the Secretary of the California Environmental Protection Agency (Cal EPA) and state agencies with regard to climate change.

Executive Order S-01-07 (January 18, 2007): This order set forth the low carbon fuel standard for California. Under this EO, the carbon intensity of California's transportation fuels is to be reduced by at least 10 percent by 2020.

Senate Bill 97 (SB 97) Chapter 185, 2007, Greenhouse Gas Emissions: This bill required the Governor's Office of Planning and Research (OPR) to develop recommended amendments to the CEQA Guidelines for addressing GHG emissions. The amendments became effective on March 18, 2010.

Senate Bill 375 (SB 375), Chapter 728, 2008, Sustainable Communities and Climate Protection: This bill requires the CARB to set regional emissions reduction targets from passenger vehicles. The MPO for each region must then develop a "Sustainable Communities Strategy" (SCS) that integrates transportation, land-use, and housing policies to plan for the achievement of the emissions target for their region.

Federal

Although climate change and GHG reduction are a concern at the federal level, currently no regulations or legislation have been enacted specifically addressing GHG emissions reductions and climate change at the Project level. Neither the U.S. EPA nor the Federal Highway Administration (FHWA) has issued explicit guidance or methods to conduct Project-level GHG analysis.1 FHWA supports the approach that climate change considerations should be integrated throughout the transportation decision-making process–from planning through Project development and delivery. Addressing climate change mitigation and adaptation up front in the planning process will assist in decision making and improve efficiency at the program level, and will inform the analysis and stewardship needs of Project-level decision-making. Climate change considerations can be integrated into many planning factors, such as supporting economic vitality and global efficiency, increasing safety and mobility, enhancing the environment, promoting energy conservation, and improving the quality of life.

The four strategies outlined by FHWA to lessen climate change impacts correlate with efforts that the state is undertaking to deal with transportation and climate change; these strategies include improved transportation system efficiency, cleaner fuels, cleaner vehicles, and a reduction in travel activity.

Climate change and its associated effects are also being addressed through various efforts at the federal level to improve fuel economy and energy efficiency, such as the "National Clean Car

Program" and EO 13514 - Federal Leadership in Environmental, Energy and Economic Performance.

Executive Order 13514 (October 5, 2009): This order is focused on reducing greenhouse gases internally in federal agency missions, programs and operations, but also directs federal agencies to participate in the Interagency Climate Change Adaptation Task Force, which is engaged in developing a national strategy for adaptation to climate change.

The U.S. EPA's authority to regulate GHG emissions stems from the U.S. Supreme Court decision in *Massachusetts v. EPA* (2007). The Supreme Court ruled that GHGs meet the definition of air pollutants under the existing Clean Air Act and must be regulated if these gases could be reasonably anticipated to endanger public health or welfare. Responding] to the Court's ruling, U.S. EPA finalized an endangerment finding in December 2009. Based on scientific evidence it found that six greenhouse gases constitute a threat to public health and welfare. Thus, it is the Supreme Court's interpretation of the existing Act and EPA's assessment of the scientific evidence that form the basis for EPA's regulatory actions. U.S. EPA in conjunction with National Highway Traffic Safety Administration (NHTSA) issued the first of a series of GHG emission standards for new cars and light duty vehicles in April 2010

The U.S. EPA and the 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.

The final combined standards that made 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 implemented by this program are expected to reduce 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 August 28, 2012, U.S. EPA and NHTSA issued a joint Final Rulemaking to extend the National Program for fuel economy standards to model year 2017 through 2025 passenger vehicles. Over the lifetime of the model year 2017-2025 standards this program is Projected to save approximately four billion barrels of oil and two billion metric tons of GHG emissions.

The complementary U.S. EPA and NHTSA standards that make up the Heavy-Duty National Program apply to combination tractors (semi trucks), heavy-duty pickup trucks and vans, and vocational vehicles (including buses and refuse or utility trucks). Together, these standards will cut greenhouse gas emissions and domestic oil use significantly. This program responds to President Barack Obama's 2010 request to jointly establish greenhouse gas emissions and fuel efficiency standards for the medium- and heavy-duty highway vehicle sector. The agencies estimate that the combined standards will reduce CO2 emissions by about 270 million metric tons and save about 530 million barrels of oil over the life of model year 2014 to 2018 heavy duty vehicles.

Local

The following local regulations related to GHG emissions are provided for informational purposes and to assist with CEQA review.

The project area is located within the city limits of Roseville, which has developed a communitywide sustainability action plan (SAP) to guide development and reduce GHG and air quality emissions pursuant to the goals of the AB 32 Scoping Plan. The SAP targets six main emissions sectors to reduce GHG emissions and develop a sustainable community: land use and green building, energy efficiency, recycling and waste reduction, transportation, water conservation, and marketing and education.

As part of its SAP, the City of Roseville developed a GHG emissions inventory for communitywide operations for the baseline year 2008, along with business-as-usual projects to the planning horizon year 2020. The emissions inventory determined that in 2008, Roseville's communitywide activities generated approximately 1,202,383 MT CO2e (City of Roseville 2010). Most of these emissions were generated by on-road mobile sources (44%), commercial/industrial energy use (24%), residential energy use (13%), and residential natural gas use (9%). The remaining emissions were generated by other emissions sectors that each accounted for less than 5% of the total GHG emissions.

The Roseville SAP establishes a GHG-efficiency goal, rather than a mass emission-reduction goal. The goal is to achieve GHG efficiency of 6.0 MT CO2e per service population per year, where service population equals the sum of population and employment.

Discussion of Checklist Answers:

a,b. **Less Than Significant Impact**. The Proposed project is designed to reduce congestion and vehicle delays. The Proposed project would facilitate increase of mobile emissions since it is designed to accommodate cumulative traffic from approved projects. The Proposed project would not involve a substantial increase in stationary or area source emissions. City wide mobile emissions have already been accounted for in the ARSP EIR.

The Proposed project would generate greenhouse gas emissions that would contribute to global climate change during the construction phase, which would be temporary. Due to the inherently cumulative nature of global climate change, effects of which occur over a long periods of time, a project's GHG emissions contribution is typically quantified and analyzed on an annual basis (i.e., annual operational GHG emissions). Construction-related GHG emissions are a one-time release that occurs over a short period of time; nonetheless, construction-related GHG emissions have been quantified for the proposed project.

The estimated construction-related GHG emissions attributable to the proposed project would be primarily associated with increases of CO_2 and other GHG pollutants, such as methane (CH_4) and nitrous oxide (N_2O), from mobile sources and construction equipment usage. The Proposed project's short-term construction-related emissions were estimated using the Roadway Construction Emissions Model version 7.1.5.1, a model developed by Jones & Stokes and TIAX LLC in partnership with the Sacramento Metropolitan Air Quality Management District. The model quantifies direct GHG emissions from construction, which are expressed in tons per project of CO_2 equivalent units of measure (i.e., $MTCO_2e$), based on the global warming potential of the individual pollutants. This number is then converted from English tons to metric tons through the conversion factor of 0.91. The estimated increase in GHG emissions associated with construction of the proposed project is summarized in **Table 6**.

Table 6 — Project Total Annual Construction GHG Emissions

	CO_2 emissions ($MTCO_2e$)
Total Construction GHG Emissions	554.10

Source: Road Construction Emissions Model, August 2016 (**Appendix B**).

As presented in **Table 6**, short-term emissions of GHG associated with construction of the proposed project are estimated to be 554.10 $MTCO_2e$. As stated above, because construction-related GHG emissions are a one-time release that occurs over a short period of time and are typically considered separate from operational emissions, construction-related GHG emissions are not typically considered to result in a substantial contribution towards global climate change. In October 2016, PCAPCD

established a de minimis level greenhouse gas threshold of 1,100 MT CO_2e/year. The City still has not established thresholds of significance for construction-related GHG emissions.

The Proposed project's construction-related emissions would be substantially below the recently adopted PCAPCD de minimis level threshold of significance listed above for GHG emissions, and would occur only one time, not annually or over multiple years. Therefore, the proposed project's construction-related GHG emissions are not expected to cause a significant impact. Additionally, due to the inherently small size of the proposed project and lack of any change to annual operational emissions, the GHG emissions resulting from construction of the proposed project are not expected to significantly contribute to the cumulative GHG levels of the area.

In conclusion, operational GHG emissions would be minimal and would not change as a result of the proposed project; however, construction of the proposed project would generate GHG emissions that would contribute to the overall GHG levels in the atmosphere. Although the Proposed project would contribute to GHG levels during construction of the proposed project, the incremental contribution to cumulative GHG emissions and global climate change would be minor and below established thresholds defined for the region. In addition, the GHG emissions resulting from construction of the Proposed project would occur only once temporarily during construction. Therefore, the proposed project's contribution to global climate change through GHG emissions would be considered a ***Less Than Significant Impact***. No mitigation is required.

a. **Less Than Significant Impact**. In addition to adherence to local, regional, and state standards for pollutants, all projects under CEQA are required to identify any potential impacts the project may have on climate change and emission of greenhouse gasses (GHG). Common GHG includes vapor, carbon dioxide, methane, nitrous oxides, chlorofluorocarbons, hydrofluorocarbons, perfluorocarbons, sulfur hexafluoride, ozone, and aerosols.

The project would have less than significant impacts on climate change or GHG emissions. The project would construct a new bridge and widen an existing road; no additional traffic would be added. The addition of a formalized second through-lane would not effectively change traffic because the existing roadway and bridge currently connects with roadways carrying two-lanes. Long-term traffic volumes would be substantially the same with or without the project. There would be no difference in CO2 emissions comparing existing levels and future levels with the Build Alternative.

As shown in **Table 4**, estimated CO2 emissions during construction are estimated to be 554 tons/year for the Build Alternative, whereas the No-Build Alternative would not have construction CO2 emissions. These estimated emissions are below the recently adopted Placer County Air Pollution Control District CEQA Thresholds of Significance of 1,100 MT CO_2e/year. Due to the temporary nature of the project's CO_2 emissions, the project would have ***Less than Significant*** impacts.

3.8 Hazards and Hazardous Materials

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
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 involve handling hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	☐	☐	☐	☒
d. Be located on a site that is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?	☐	☐	☐	☒
e. Be located within an airport land use plan area or, where such a plan has not been adopted, be within two miles of a public airport or public use airport, and result in a safety hazard for people residing or working in the project vicinity?	☐	☐	☐	☒
f. Be located within the vicinity of a private airstrip and result in a safety hazard for people residing or working in the project vicinity?	☐	☐	☐	☒
g. Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	☐	☐	☒	☐
h. Expose people or structures to a significant risk of loss, injury, or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands?	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b. **Less Than Significant Impact**. The Proposed project would involve construction activities such as site preparation, grading, paving, and bridge installation. These activities would involve the use of heavy equipment, which would contain fuels, oils, lubricants, solvents, and various other possible contaminants.

The preparation of a Stormwater Pollution Prevention Plan (SWPPP), the regular disposal of sediment, trash and oil, and the establishment of an equipment storage area, in order to prevent the distribution of potentially hazardous materials would be implemented as per the Environmental Commitments described in Section 2.7.

All hazardous materials used during construction would occur in compliance with the following applicable regulations:

- Compliance with the City's Multi-Hazard Mitigation Plan (approved by the Federal Emergency Management Agency) which requires contractors to transport and store materials in appropriate and approved containers along designated truck routes, maintain required clearances, and handle materials using fire department–approved protocols, as illustrated in Roseville Fire Code Ordinance 4594 (City of Roseville 2011a).

- Compliance with the City of Roseville Design and Construction Standards and the City's *Stormwater Quality BMP Guidance Manual for Construction* (City of Roseville 2011b) would be required and the Proposed project would be required to implement the requirements of the *Placer County Flood Control and Water Conservation District's (PCFCWCD's) Stormwater Management Manual* (PCFCWCD 1994).

In addition, the City of Roseville Fire Department is the Certified Unified Program Agency (CUPA) for the City of Roseville. The Fire Department is available to respond to hazardous materials complaints or emergencies, if any, during construction.

In light of existing City ordinances, emergency planning requirements and the project-specific BMPs, combined with existing facilities/services within the project area, the Proposed project would not create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials, and would not result in reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment. Implementation and compliance with **BMP — 3** described In Section 2.7 would reduce any potential impacts to a ***Less Than Significant Level***. No mitigation is required.

c. **No Impact**. The Blue Oaks Elementary School and Quail Glen Elementary School are the nearest schools to the proposed project and are located within ¼ mile (approximately 0.15 miles) to the west of Woodcreek Oaks Boulevard. However, construction of the proposed project would not generate significant hazardous air emissions or involve the transport of acutely hazardous substances that would pose hazardous risk to these schools. The proposed roadway widening is intended to accommodate for anticipated growth of the design year 2035. As discussed in Section 3.3, Air Quality, completion of the proposed roadway widening would result in lower air quality emissions generated from Woodcreek Oaks Boulevard than the No-Build Alternative. Therefore, a ***Less than Significant Impact*** would result from development of the proposed project and no mitigation is required.

d. **No Impact**. The proposed project area is not included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5. According to the California Department of Toxic Substances Control (CDTSC) Envirostor Database, there are no known hazardous sites within the immediate vicinity of the proposed project area (CDTSC 2016).

No known hazardous material is present within the proposed project area. Therefore, ***No Impacts*** related to hazardous sites would the result from the proposed project.

e,f. **No Impact**. The proposed project area is not located within an airport land use plan area nor is it within two miles of a public airport. The proposed project is approximately two miles northwest of the privately owned Fiddyment Field Airport, which is recorded as permanently closed. However, the proposed project would result the widening of an existing roadway and would not result in people living or working within vicinity of the private airport. Therefore, ***No Impact*** would result from development of the proposed project and no mitigation is required.

g. **Less than SIgnificant**. During installation of the propose improvements to improve underground utility service to the site (e.g., water and storm drainage), some minor trenching may be necessary on Woodcreek Oaks boulevard. This could result in temporary lane narrowings or closures for a short time. In accordance with Roseville Municipal Code, the City requires any traffic lane closures to be approved by the City Engineering Department and notification provided to the City Police and Fire Departments 48 hours in advance of any road closures. The City would ensure local traffic is accommodated during construction and access to businesses and residences is maintained. Therefore, the impact would be ***Less than Signficant***, and no mitigation is required.

h. **No Impact**. According to the California Department of Forestry and Fire Protection (CDFFP) Placer County Fire Hazard Severity Zone Map, the proposed project area is not located in an identified fire hazard region. ***No Impacts*** are associated with wildland fires resulting from development of the proposed project.

3.9 Hydrology and Water Quality

	Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Violate any water quality standards or waste discharge requirements?	☐	☐	☒	☐
b.	Substantially deplete groundwater supplies or interfere substantially with groundwater recharge, resulting in 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 that would not support existing land uses or planned uses for which permits have been granted)?	☐	☐	☒	☐
c.	Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner that would result in substantial erosion or siltation onsite or offsite?	☐	☐	☒	☐
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 that would result in flooding onsite or offsite?	☐	☐	☒	☐
e.	Create or contribute runoff water that would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?	☐	☐	☒	☐
f.	Otherwise substantially degrade water quality?	☐	☐	☒	☐
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?	☐	☐	☐	☒
h.	Place structures within a 100-year flood hazard area that would impede or redirect flood flows?	☐	☐	☒	☐

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?	☐	☐	☒	☐
j.	Contribute to inundation by seiche, tsunami, or mudflow?	☐	☐	☐	☒

Discussion of Checklist Answers:

a. **Less Than Significant Impact**. The applicable waste discharge requirements for the proposed project are the Statewide General Construction Permit and the NDPES Storm Water Management Program (SWMP), which implements the General Permit for Stormwater Discharge from the Central Valley Regional Water Quality Control Board (CVRWQCB).

The City's Grading Ordinance requires grading plans to include an erosion control plan to eliminate off-site flows of sediment and to reduce site erosion to protect water quality in the storm drain system, and adjacent properties, as discussed under Environmental Commitments in Section 2.7. The City would require the contractor to comply with the ordinance and prepare a Stormwater Pollution Prevention Plan to meet the requirement of the City's General Permit for Stormwater Discharge from the CVRWQCB. In addition to required compliance with existing City ordinances, **BMP - 3** presented in Section 2.7 are intended to ensure compliance with Basin Plan Water Quality Standards and applicable NPDES requirements.

Through implementation of **BMP — 3**, **BMP — 4**, and compliance with existing enforceable City Ordinances, combined with regulatory compliance with State and Federal regulations would ensure that project development will not violate any water quality standards or waste discharge requirements. The project would result in ***Less Than Significant Impact***. No mitigation is required.

b. **Less Than Significant Impact.** The project site is located in the foothills North American Subbasin, which overlies the eastern central portion of the Sacramento Valley Groundwater Basin, which has a total surface area of approximately 351,000 acres, or 548 square miles. Groundwater recharge in the basin occurs mostly by infiltration from the Sacramento, Feather, and Bear Rivers, along with their tributaries. There are currently no artificial recharge areas for the North American Subbasin.

The Proposed project would result in approximately 3.3 acre of new paved surface due to widening of an existing roadway, which would lead to a net increase of new impervious surface. However, the proposed project would not 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. Therefore, project development would result in a ***Less Than Significant Impact*** and no mitigation is required.

c. **Less Than Significant Impact**. The Proposed project includes reconfiguring the roadway to allow gutter, and drainage system improvements. Drainage improvements include pipe extensions and reconfiguration of existing inlets and manholes. Additional low impact development (LID) improvements include additional tree plantings within the medians, and incorporation of bioswales within the existing right-of-way within the Blue Oaks Park segment of the roadway, adjacent to the proposed bridge.

Implementation of **BMP — 3** and compliance with existing enforceable City Ordinances, combined with regulatory compliance with State and Federal regulations would ensure that project development would not result in substantial erosion or siltation. The project would result in a ***Less Than Significant Impact***. No mitigation is required.

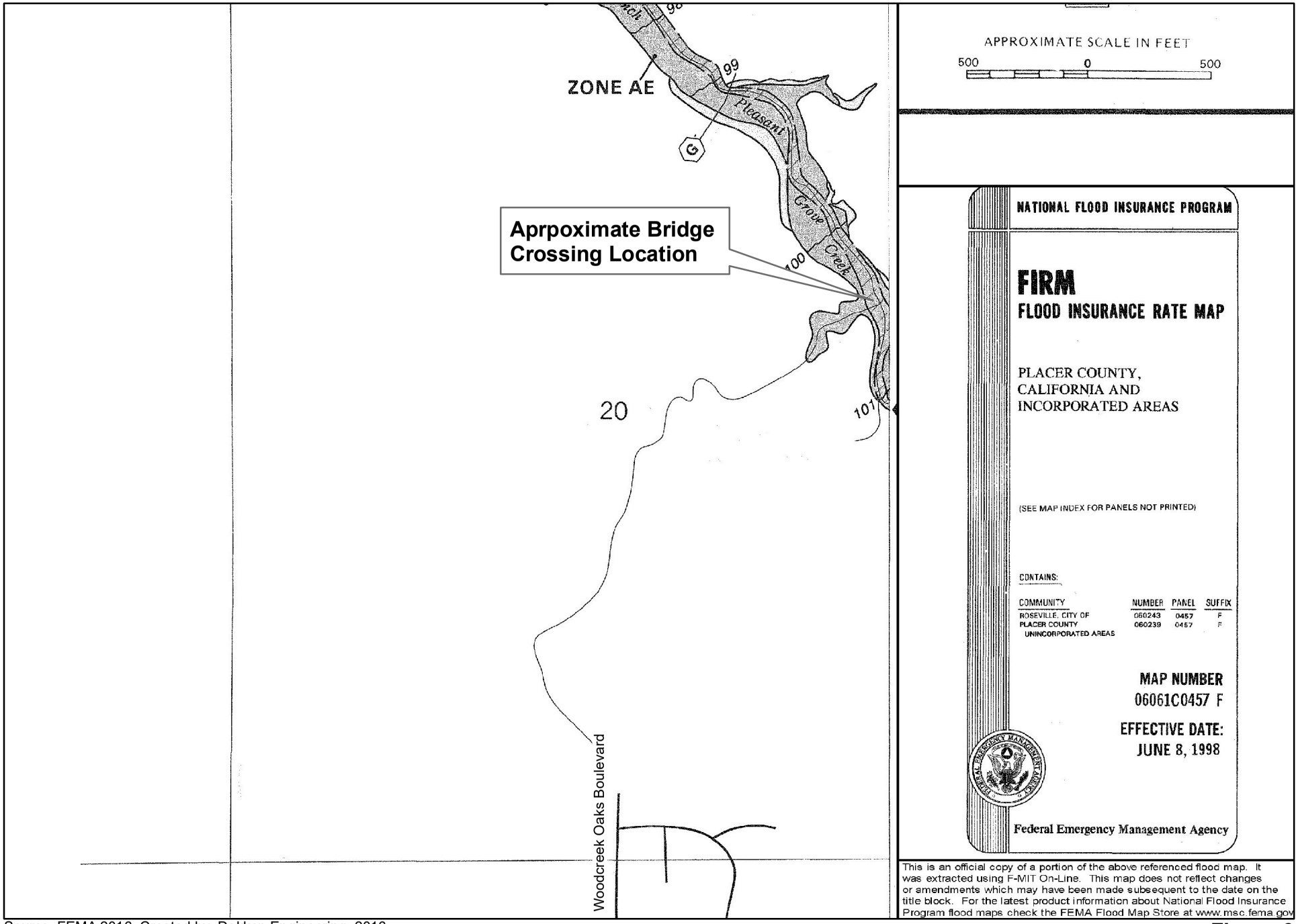
d,f. **Less Than Significant Impact**. As discussed above, the proposed project includes reconfiguring the roadway to allow gutter, and drainage system improvements. Per the Drainage Memorandum (Dokken Engineering 2016), the proposed project would introduce a net increase of 3.3 acres of new impervious surfaces. This project implements the final phase of drainage improvements along Woodcreek Oaks Boulevard by installing inlets at primarily preplanned locations and as necessary to achieve efficient intake of storm water into the existing storm drain system. The trunk system was designed as part of the initial roadway project and was preplanned for the widening. Inlet spacing and design will be in accordance with City of Roseville Standards. Tree plantings within the proposed medians and bioswales between the curb and sidewalk between Horncastle Avenue and Crimson Ridge Way, are anticipated to be implemented to meet LID guidelines as outlined in the West Placer Storm Water Quality Design Manual. The incorporation of these design elements would reduce impacts from increased surface runoff to the planned stormwater drainage systems to ***Less Than Significant***. No mitigation is required.

e. **Less Than Significant Impact**. As discussed above, the proposed project includes reconfiguring the roadway to allow gutter, and drainage system improvements. The proposed project would introduce a net increase of 3.3 acres of new impervious surfaces. However, the incorporation of pipe extensions and reconfiguration of existing inlets and manholes, tree plantings within the medians, and bioswales would ensure impacts from surface runoff would remain ***Less Than Significant***. No mitigation is required.

g. **No Impact**. According to the FEMA Flood Insurance Rate Map (Map #06061C0457), part of the project area is located within a flood zone designated by FEMA, shown below in Figure 6 and Figure 7. The South Branch Pleasant Grove Creek segment that falls within the project area includes a regulatory floodway that must be kept clear in order to allow the flow of the 100-year flood waters (Figure 6 and Figure 7). However, the proposed project would not involve residential development and would not place housing in special flood hazard areas. Therefore, ***No Impact*** would result from project development and no mitigation is required.

h, i. **Less Than Significant Impact**. Although the project site is within a designated flood zone by FEMA, the project would not result in any increased risk. The proposed project would include construction of a new bridge adjacent to the existing bridge over south Branch Pleasant Grove Creek that would be elevated to provide the necessary freeboard over the 100-year flood event water surface elevation for south Branch Pleasant Grove Creek. The project would not involve the construction of occupied structures or structures that would obstruct the flow of 100-year flood waters. Levees or dams would not be impacted as a result of the proposed bridge construction. There would be no substantial risk of loss, injury, or death in the event of flooding at the project site. Therefore, impacts are considered ***Less Than Significant***. No mitigation is required.

j. **No Impact**. The project site is not located near an ocean coast or enclosed body of water that could produce a seiche or tsunami, nor is the site located near areas having steep slopes that would create mudflows. Therefore, ***No Impact*** would result from project development and no mitigation is required.



Source: FEMA 2016. Created by: Dokken Engineering, 2016

Figure 6

FEMA Flood Insurance Rate Map

Woodcreek Oaks Boulevard Widening Project

City of Roseville, Placer County, California

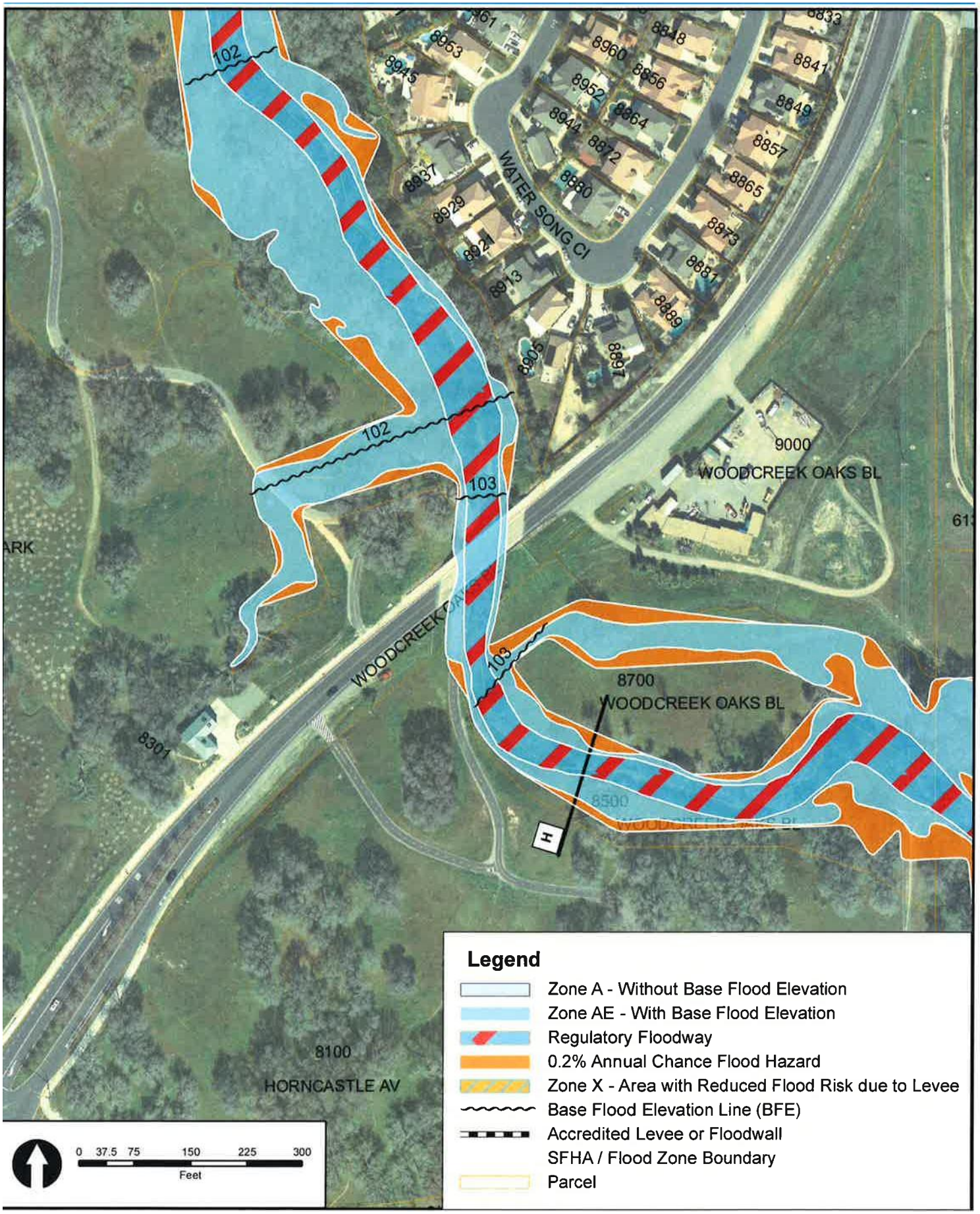


Figure 7
Preliminary DFIRM Data
Woodcreek Oaks Boulevard Widening Project
City of Roseville, Placer County, California

3.10 Land Use and Planning

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Physically divide an established community?	☐	☐	☐	☒
b. Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to, a general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?	☐	☐	☐	☒
c. Conflict with any applicable habitat conservation plan or natural community conservation plan?	☐	☐	☐	☒

Discussion of Checklist Answers:

a. **No Impact**. The Proposed project is located on an existing roadway. The proposed road widening would occur on an existing roadway and not divide an established community. Therefore, ***No Impact*** would result from project development and no mitigation is required.

b, c. **No Impact**. The project area is surrounded primarily by single-family residential land uses. In addition, there are community commercial uses to the south and north and light industrial uses to the east. The northern project area (Blue Oaks Park) and eastern (Woodcreek Golf Club) falls within land uses designated for Open Space and Park and Recreation uses within the *City of Roseville General Plan, Land Use Element* (City of Roseville 2010). Within the Zoning Code of the City of Roseville, the project area is within an area zoned for Open Space and Park and Recreation uses as well as Single-Family Residential uses. Resource related recreation is listed as a permitted use for both Open Space and Park and Recreation land use zones within the City of Roseville Municipal Code (Section 19.16.020). The Proposed project would remain consistent with the land use and zoning designation within the project area.

As discussed in Section 2.0, Project Description, this is a City Capital Improvement Project which will not involve any land-use decisions affected by the California Department of Water Resources Urban Level of Flood Protection.

The proposed project would involve construction of a new bridge adjacent to the existing bridge over South Branch Pleasant Grove Creek. According to the City of Roseville Open Space Preserve Overarching Management Plan (OSPOMP), the South Branch Pleasant Grove Creek is within the City's Open Space Preserve and is also considered Waters of the U.S. Open space considered by the OSPOMP as Open Space Preserve is land that was required to be set aside as part of a regulatory permitting action and is typically protected by either a Conservation Easement or Declaration of Covenants and Restrictions. However, according to the OSPOMP, the project site is a location where

future road widening is identified as an allowed use within the Preserve. In addition, there are no adopted Habitat Conservation Plans or Natural Community Conservation Plans located within the City or project boundaries. The proposed project would adhere to any development review processes of the City and be referred to all relevant jurisdictions, such as the U.S. Army Corps of Engineers, for comment. Therefore, there would be ***No Impact.***

3.11 Mineral Resources

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	☐	☐	☐	☒
b. Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan?	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b. **No Impact**. As stated in the *City of Roseville General Plan* (City of Roseville 2010), mineral resources, consisting of sand and gravel, are limited and no mineral extraction operations currently exist or are anticipated to exist in the City. The City of Roseville has not designated the site as a locally important mineral resource area. There would be ***No Impact***. No mitigation is required.

3.12 Noise

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	☐	☒	☐	☐
b. Expose persons to or generate excessive groundborne vibration or groundborne noise levels?	☐	☐	☒	☐
c. Result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?	☐	☐	☒	☐
d. Result in a substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?	☐	☒	☐	☐
e. Be located within an airport land use plan area, or, where such a plan has not been adopted, within two miles of a public airport or public use airport and expose people residing or working in the project vicinity to excessive noise levels?	☐	☐	☐	☒
f. Be located in the vicinity of a private airstrip and expose people residing or working in the project vicinity to excessive noise levels?	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b,c, d.Less Than Significant Impact with Mitigation Incorporated. The Proposed project would result in the widening of Woodcreek Oaks Boulevard from two to four lanes. The following discussion evaluates the construction and operational impacts of the project.

The *City of Roseville General Plan, Noise Element* (City of Roseville 2010) has established Goals and Policies relating to evaluating noise impacts due to projects. The overall noise goal for the City is to protect the health and welfare of the community by promoting community development which is compatible with noise level criteria. The *Noise Element* establishes noise standards for maximum allowable noise exposure due to transportation sources and performance standards for fixed noise sources. Transportation noise standards (65 dBA L_{dn}/CNEL) are applied at the outdoor activity area of noise sensitive land use (residential) where it is not possible to reduce noise in outdoor activity areas to 60 dB Ldn/CNEL or less using a practical application of the best-available noise reduction measures. Fixed noise sources are not to exceed 50 dBA L_{eq} and 70 dBA L_{max} during daytime hours

(7:00 A.M. to 10:00 P.M.) and 45 dBA L_{eq} and 65 dBA $L_{max\ during}$ nighttime hours (10:00 P.M. to 7:00 A.M.) as measured at the property line of noise sensitive land uses or exceed the ambient sound level by +3 dBA at the noise sensitive land use property line, whichever is greater.

The City of Roseville Municipal Code, Health and Safety Ordinance Chapter 9.24 contains specific requirements for construction activities, stating that they are exempt from the provisions of the noise codes if all activities occur between 7:00 A.M. and 7:00 P.M. Monday through Friday and 8:00 A.M. to 8:00 P.M. on Saturday and Sunday, provided that all construction equipment is fitted with factory installed muffling devices and is maintained in good working order.

The existing noise environment at the site is influenced by typical daytime noise levels from Blue Oaks Elementary and Quail Glen Elementary School, recreational uses within Woodcreek Golf Club and vehicular noise attributable to traffic on Woodcreek Oaks Boulevard. The project area is surrounded by residential development to the north and east. The nearest residences are immediately adjacent to Woodcreek Oaks Boulevard within 50 feet.

Operational Impacts

In addition to roadway traffic noise, the operational use of the project would include use by pedestrians and bicyclists which is consistent with the existing recreational use of the park portion of the project area. **Table 7** summarizes the results of the short-term noise monitoring conducted in the project area to capture the existing ambient noise levels.

Table 7 — Summary of Short Term Measurements

Position	Address	Land Uses	Start Time	Duration (minutes)	Measured L_{eq}	Observed Speed (mph)
ST-1	209 Shelly Court, Roseville, CA 95747	Residential	8/16/16 5:22 pm	20	54.8	Approx. 40
ST-2	108 Robinson Court, Roseville, CA 95747	Residential	8/16/16 4:51 pm	20	55	Approx. 40

The FHWA Traffic Noise Model Version 2.5 (TNM 2.5) was used to compare measured traffic noise levels to modeled noise levels at field measurement locations, shown below in Figure 8. **Table 8** compares measured and modeled noise levels at each measurement location. Predicted sound levels within 3 dB of the measured sound levels were considered to be in reasonable agreement with the measured sound levels. The predicted sound levels are within 3 dB of the measured sound levels and, therefore, are considered to be in reasonable agreement with the measured sound levels.

Table 8 — Comparison of Measured to Predicted Sound Levels in the TNM Model

Measurement Position	Measured Sound Level (dBA)	Predicted Sound Level (dBA)	Measured minus Predicted (dB)
ST-1/NB-3	54.8	56.8	2.0
ST-2/SB-2	55.0	57.0	2.0

Table B-1 in Appendix B of the Noise Study Report prepared by Dokken Engineering for the proposed project summarizes the traffic noise modeling results for existing conditions and design-year conditions with and without the project.

Design year conditions are based on land developments and roadway improvements that are reasonably foreseeable by 2035, which begins with the City's Capital Improvement Program (CIP) 2035 model and adds the partial build-out of Placer Ranch (50% residential, 25% non-residential, and 25,000-student University). These partial buildout assumptions are consistent with the Amoruso Ranch Specific Plan Final EIR. Additionally, the design year conditions assume the Campus Oaks (HP Campus Rezone) project include the extension of HP Way as a two- to four-lane street from Foothills Boulevard through the HP Campus northwesterly to Blue Oaks Boulevard.

Predicted design-year traffic noise levels with the project are compared to existing conditions and to design-year no-project conditions. The comparison to existing conditions is included in the analysis to identify traffic noise impacts as determined by City of Roseville General Plan Noise Element Thresholds.

The traffic noise modeling results in Table B-1 of Appendix B in the Noise Study Report prepared by Dokken Engineering, and summarized in **Table 9**, indicate that traffic along Woodcreek Oaks Boulevard would result in exterior noise levels ranging between 61 and 65 dBA Ldn in year 2035 with the project. The increase in noise between existing conditions and the design-year is predicted to be between approximately 2 - 3 dB. No noise receptors were predicted to have exterior noise levels exceeding the 65 dBA Ldn exterior noise threshold for sensitive land uses. Sensitive land uses, as described in the City of Roseville General Plan Update, consist of all residential uses, schools, religious institutions, hospitals, and convalescent hospitals.

As discussed above, modern construction techniques provide a reduction of 30 dBA from exterior noise levels to interior. The estimated interior noise levels with the exterior-to-interior noise reduction are shown below in **Table 10**:

The estimated design year interior noise levels summarized in **Table 10** indicate that traffic along Woodcreek Oaks Boulevard would result in interior noise levels ranging between 31 and 35 dBA Ldn in 2035 with the project. The increase in noise between existing conditions and the design-year is predicted to be between approximately 2 - 3 dB. No noise receptors were predicted to have interior noise levels exceeding the 45 dBA Ldn interior threshold for sensitive land uses.

Therefore, the proposed project would not result in the exposure or generation of noise levels from transportation sources in excess of standards established in the City of Roseville General Plan Noise Element or Noise Ordinance, nor would it result in any substantial permanent increase in ambient noise levels. Little additional operational noise would result from operation of the Proposed project. Furthermore, since traffic level volumes in the Existing Plus Project scenario would be less than cumulative levels, impacts to interior and exterior noise levels at sensitive receptors would be less than significant. Therefore, impacts to permanent ambient noise levels would be considered a Less Than Significant Impact.

Table 9 — Comparison of Estimated Exterior Noise Levels

Receptor # and Location	Existing (2016) Noise Level (dBA Ldn)	Existing Plus Project (2016) Noise Level (dBA Ldn)	Predicted Noise Level for No-Build (2035) (dBA Ldn)	Predicted Noise Level with Project (2035) (dBA Ldn)	Noise Impact with Project? (65 dBA exterior noise threshold)
City of Roseville					
SB-1	62.0	62.3	63.2	64.5	No
SB-2	60.7	60.9	61.8	63.0	No
SB-3	61.3	61.3	62.5	63.5	No
SB-4	59.8	59.7	61.0	61.9	No
SB-5	61.6	60.9	63.2	63.5	No
SB-6	60.5	60.7	62.2	63.4	No
SB-7	59.9	62.8	62.3	62.9	No
NB-1	62.0	62.1	63.1	64.2	No
NB-2	58.6	58.8	60.1	61.3	No
NB-3	60.4	60.6	62.1	63.3	No
NB-4	61.5	61.8	63.5	64.7	No

Source: FHWA Traffic Noise Model 2.5 & Traffic Study for the Woodcreek Oaks Boulevard Widening Project dated July 28, 2016

Table 10 — Comparison of Estimated Interior Noise Levels

Receptor # and Location	Existing (2016) Noise Level (dBA Ldn)	Existing Plus Project (2016) Noise Level (dBA Ldn)	Predicted Noise Level for No-Build (2035) (dBA Ldn)	Predicted Noise Level with Project (2035) (dBA Ldn)	Noise Impact with Project? (45 dBA interior noise threshold)
City of Roseville					
SB-1	32	32.3	33.2	34.5	No
SB-2	30.7	30.9	31.8	33	No
SB-3	31.3	31.3	32.5	33.5	No
SB-4	29.8	29.7	31	31.9	No
SB-5	31.6	30.9	33.2	33.5	No
SB-6	30.5	30.7	32.2	33.4	No
SB-7	29.9	32.8	32.3	32.9	No
NB-1	32	32.1	33.1	34.2	No
NB-2	28.6	28.8	30.1	31.3	No
NB-3	30.4	30.6	32.1	33.3	No
NB-4	31.5	31.8	33.5	34.7	No

Source: FHWA Traffic Noise Model 2.5 & Traffic Study for the Woodcreek Oaks Boulevard Widening Project dated July 28, 2016

Construction Impacts

Short-term construction noise was previously analyzed and related noise impacts were disclosed in the Environmental Impact Reports prepared for the *Northwest Roseville Specific Plan* (Final EIR dated May 10, 1989) and the *North Roseville Specific Plan Phase 1* (Final EIR dated July, 1997).

These EIRs disclosed that short-term construction noise would be significant and unavoidable for sensitive receptors that may exist within and adjacent these plan areas during specific plan buildout. These impacts apply to the proposed project as discussed further below.

Construction of the proposed project would be a source of temporary or periodic increases in ambient noise levels that could be audible to nearby land uses. Construction would involve the loading and unloading of equipment and supplies, grading and paving of the proposed project, and placing the bridge over Pleasant Grove Creek. The mix of equipment operating would vary depending on the activity being conducted onsite, and noise levels would vary based on the amount of equipment in operation and the location of the activity.

As required by Chapter 9.24.030(G) of the City Code, construction activities would be limited to occur only between the hours of 7:00 A.M. and 7:00 P.M., Monday through Friday, and 8:00 A.M. and 8:00 P.M. on Saturday and Sunday, as discussed above. Chapter 9.24.030(G) also requires the use of exhaust and intake silencers for internal combustion engines used during construction to reduce noise levels associated with construction activities.

Table 11 summarizes noise levels produced by construction equipment that is commonly used on roadway construction projects. Construction equipment is expected to generate noise levels ranging from 70 to 101 dB at a distance of 50 feet, and noise produced by construction equipment would be reduced over distance at a rate of about 6 dB per doubling of distance and by existing soundwalls.

Table 11 — Construction Equipment Noise

Equipment	Maximum Noise Level (dBA at 50 feet)
Impact Pile Driver	101
Scrapers	89
Bulldozers	85
Heavy Trucks	88
Backhoe	80
Pneumatic Tools	85
Concrete Pump	82

Source: Federal Transit Administration, 2006. See also:
http://www.fhwa.dot.gov/environment/noise/construction_noise/handbook/handbook09.cfm

The use of any of the above mentioned equipment may, therefore, exceed 50 dBA L_{eq} and 70 dBA L_{max} during daytime hours (7:00 A.M. to 10:00 P.M.). It is acknowledged that construction-related noise may be considered a nuisance to sensitive receptors in the residential neighborhoods adjacent to Woodcreek Oaks Boulevard; however, this increase would be short-term, and would not result in a permanent increase in ambient noise levels.

The majority of sensitive receptors are along Woodcreek Oaks Boulevard located approximately 50 feet from the proposed roadway widening behind a soundwall; however, the nearest sensitive receptor to the impact pile driver associated with the bridge construction is approximately 250 to 300 feet from the proposed project area. With the majority of sensitive receptors being located within 50

feet of the proposed project, the use of any of the above mentioned equipment may, therefore, exceed 50 dBA Leq and 70 dBA Lmax during daytime hours (7:00 A.M. to 10:00 P.M.).

It is acknowledged that construction-related noise may be considered a nuisance to sensitive receptors in the residential neighborhoods adjacent to Woodcreek Oaks Boulevard; however, this increase would be short-term, and would not result in a permanent increase in ambient noise levels. Furthermore, short-term signiticant construction noise impacts on existing residences during build out of the roadway to its ultimate configuration was previously disclosed in the EIR's prepared for the *Northwest Roseville Specific Plan* (Final EIR dated May 10, 1989) and the *North Roseville Specific Plan Phase 1* (Final EIR dated July, 1997).

In addition to normal construction activities, pile driving associated with the bridge construction would result in short-term increases in construction noise in the immediate project vicinity for the duration of the pile driving activities. Review of aerial imagery indicates that the pile driving activities would range from 250 to 300 feet from the nearest existing residences on the north western side of the bridge. Sound from a small localized source (a "point" source) attenuates or drops off at a rate of 6 dBA for each doubling of distance (i.e., if the noise level is 70 dBA at 25 feet, it is 64 dBA at 50 feet and 58 dBA at 100 feet) for point sources, such as impact pile drivers. Without mitigation, noise volumes at 250 to 300 feet from the impact pile drive are anticipated to measure approximately 83 to 85 dBA. This significant and unavoidable impact related to pile driving during construction was previously disclosed in the *North Roseville Specific Plan EIR* as Impact 4.11-1(a): Temporary Increases in Noise Levels Due to Earthmoving and General Construction Activities. Mitigation measures **NOI – 1** and **NOI — 2** would reduce the anticipated noise volumes associated with pile driving by up to 15 dBA at a distance of 50 feet through use of plywood or noise curtain positioned around the impact hammer. Noise volumes at 250 to 300 feet from the impact pile drive are anticipated to measure approximately 70 to 73 dBA between the hours of 9 A.M. and 5 P.M. when the pile driver is operating with implementation of **NOI – 1** and **NOI — 2**.

As all sensitive receivers, including homes, are more than 100 feet from the bridge, it is not anticipated that these residents will be impacted by vibration from the proposed pile driving related to the bridge construction. No excessive groundborne vibration at the nearby sensitive receivers is anticipated during construction of the proposed project.

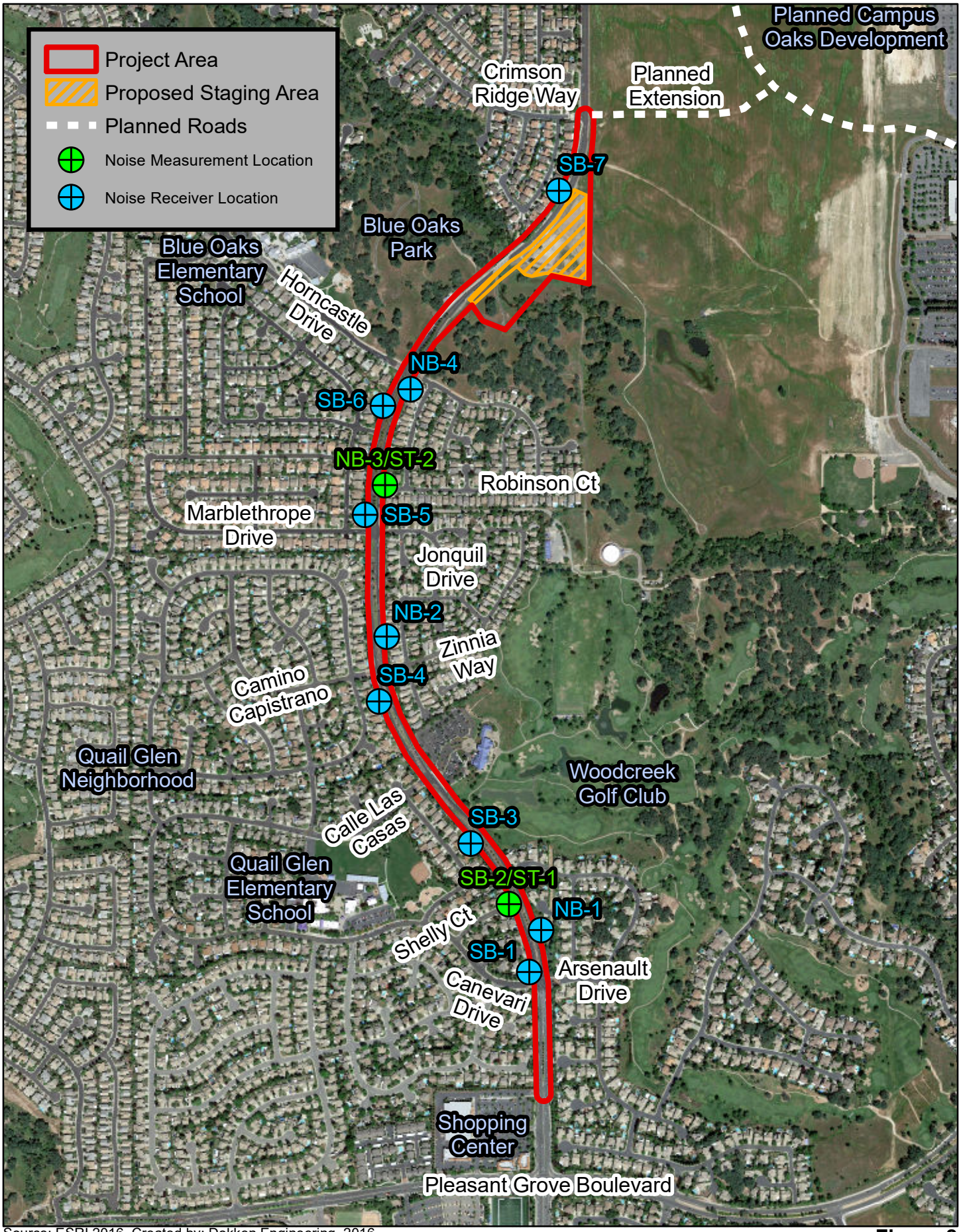
Additionally, the City exempts noise associated with construction that occurs between the hours of 7:00 A.M. and 7:00 P.M. Monday through Friday and between 8:00 A.M. and 8:00 P.M. on Saturday and Sunday because these hours are outside of the recognized sleep hours for residents and outside of evening and early morning hours and time periods where residents are most sensitive to exterior noise. Therefore, the proposed project would be exempt from the noise standards during these hours. Construction work on the proposed project would only occur between the hours of 7:00 A.M. and 7:00 P.M. Monday through Friday and between 8:00 A.M. and 8:00 P.M. on Saturday and Sunday. Due to the proximity of sensitive receptors and high noise levels generated by general road construction and impact pile driving activities, short-term construction noise impacts would be significant consistent with the previous applicable EIRs. These impacts would be minimized by incorporation of mitigation measures **NOI — 1** and **NOI — 2**. Additionally, minimization measure **BMP — 5** listed in Section 2.7 would be implemented to further reduce construction noise impacts. Therefore, with the exception to the previously disclosed significant impacts, construction-related noise impacts would be ***Less Than Significant With Mitigation Incorporated***.

e,f. **No Impact**. The Proposed project is not located within the immediate vicinity of an airport land use plan, or within two miles of a public airport. The Proposed project is approximately two miles northeast of the privately owned Fiddyment Field Airport; however, the airport is listed as permanently closed. Additionally, the proposed project would not result in people living or working within the vicinity of the airport. The Proposed project would involve the widening of Woodcreek Oaks Boulevard, which would not result in increased noise levels from the private airport. There would be ***No Impact*** and no mitigation is required.

Mitigation Measures:

NOI — 1: Pile driving activities will be limited to 9 A.M. to 5 P.M., Monday through Friday.

NOI — 2: In order to reduce the construction noise levels by up to 15 dBA at a distance of 50 feet during construction of the bridge, plywood or noise curtains designed specifically for construction noise mitigation shall be installed around the impact hammer and positioned as close as possible to the hammer / pile impact location during all pile driving activities.



Source: ESRI 2016. Created by: Dokken Engineering, 2016

0 500 1,000 1,500 2,000 Feet

Figure 8

Noise Measurement and Receiver Locations

Woodcreek Oaks Boulevard Widening Project
City of Roseville, Placer County, California

3.13 Population and Housing

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Induce substantial population growth in an area, either directly (e.g., by proposing new homes and businesses) or indirectly (e.g., through extension of roads or other infrastructure)?	☐	☐	☐	☒
b. Displace a substantial number of existing housing units, necessitating the construction of replacement housing elsewhere?	☐	☐	☐	☒
c. Displace a substantial number of people, necessitating the construction of replacement housing elsewhere?	☐	☐	☐	☒

Discussion of Checklist Answers:

a. **No Impact**. The Proposed project would involve the widening of Woodcreek Oaks Boulevard, and would not propose any new homes or businesses. The Proposed project would not directly induce population growth because it does not propose new housing or significant employment-generating uses. Project development would not indirectly induce population growth because it would not extend roads or infrastructure into previously undeveloped areas. Therefore ***No Impact*** would result from project development and no mitigation is required.

b,c. **No Impact**. The project area is within an existing roadway and would not displace people or housing. ***No Impact*** would result from development of the proposed project and no mitigation is required.

3.14 Public Services

	Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
Result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities or a 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 following public services:					
a.	Fire protection?	☐	☐	☒	☐
b.	Police protection?	☐	☐	☒	☐
c.	Schools?	☐	☐	☐	☒
d.	Parks?	☐	☐	☐	☒
e.	Other public facilities?	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b. **Less Than Impact**. The proposed project would involve the widening of Woodcreek Oaks Boulevard, which is an existing roadway. As part of the proposed project, security lighting would be situated throughout the site in a manner that would ensure all areas of the project area be visible to fire protection and law enforcement officials. This would enable the City Fire and Police departments to provide improved service to the parcel, which currently has no site-specific designated lighting. No increase in Fire or Police department staffing would be necessary to serve the project, as the proposed project would not increase the number of residents in the project vicinity or include operational elements that would contribute to increased crime or fire risk. Therefore, the proposed project would not result in the need for new or expanded Police or fire department space. As discussed in Section 2.7 under Environmental Commitments (**BMP — 6**), during construction, the City would require the contractor to implement a traffic management plan to be approved by the City Engineering Department. The plan would include notifications to the City Police and Fire departments 48 hours in advance of any temporary lane restrictions or closures to install utility improvements for the project. Therefore, impacts related to fire and police protection services would be ***Less than Significant.***

c. **No Impact**. The proposed project would not result in a population increase that would require school or parks. There would be ***No Impact.***

d. **No Impact**. The proposed project would increase the amount of parks in the City, thereby resulting in a beneficial impact on the availability of recreational facilities in the project vicinity.

e. **No Impact**. The proposed project would not result in alternation of other governmental facilities to accommodate the proposed project. There would be ***No Impact.***

3.15 Recreation

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?	☐	☐	☐	☒
b. Include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment?	☐	☐	☐	☒

Discussion of Checklist Answers:

a. **No Impact**. The proposed project would result in the widening of Woodcreek Oaks Boulevard. The Proposed project would not involve creation of new housing and therefore would not generate additional, substantial demand for recreational facilities. ***No Impact*** would result from development of the proposed project and no mitigation is required.

b. **No Impact**. The proposed project would not include recreational facilities or require the construction or expansion of recreational activities that might have an adverse physical effect on the environment. The proposed project includes the construction of Class II bike lane improvements that would connect with the existing bike lane. ***No Impact*** would result from the development of the proposed project and no mitigation is required.

3.16 Transportation/Traffic

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
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?	☐	☐	☐	☒
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?	☐	☐	☐	☒
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?	☐	☐	☐	☒
d. Substantially increase hazards because of a design feature (e.g., sharp curves or dangerous intersections or incompatible uses (e.g., farm equipment)?	☐	☐	☒	☐
e. Result in inadequate emergency access?	☐	☐	☐	☒
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?	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b. **No Impact**. The Proposed project involves reconfiguring approximately 1.5 miles of roadway to allow two travel lanes in each direction, Class II bike lanes, curb, gutter, sidewalk, curb ramps, center median, and drainage system improvements. The project would improve this corridor to be consistent with City roadway design goals and standards. Further, the project would also include improvements to provide American with Disabilities Act (ADA) access at existing curb ramps not currently compliant with ADA standard.

The development of the proposed project would not conflict with other components of the circulation system such as existing intersections, streets, highways, freeways or mass transit.

According to the traffic study performed by Fehr & Peers in August 2016 for the proposed project, the three intersections that would be modified as part of the proposed project (Horncastle Avenue/Woodcreek Oaks Boulevard, Camino Capistrano/Woodcreek Oaks Boulevard, and Canevari Drive/Woodcreek Oaks Boulevard) currently operate at LOS B during both AM and PM peak hours. The traffic study projects that peak hour volumes would increase at the Woodcreek Oaks Boulevard/Blue Oaks Bouleavard intersection by four percent and at the Woodcreek Oaks Boulevard/Pleasant Grove Boulevard intersection by one percent under Existing Plus Project conditions. Traffic model outputs from the traffic study show that these increases in volumes would not drop the LOS for either intersection to LOS D. Therefore, there are no expected project-specific impacts under Existing Plus Project conditions.

The growth in ADT from the Existing scenario to the Cumulative (2035) No Project scenario occurs as a result of planned/approved land use growth throughout the City. Traffic model outputs show that under the Cumulative No Project scenario, Woodcreek Oaks Boulevard would be near the capacity of a two-lane roadway. The widening of Woodcreek Oaks Boulevard as a four-lane roadway is included in the Amoruso Ranch Specific Ranch Plan EIR Cumulative Plus Project 2035 Scenario and consistent with the findings of the project traffic study. With the increased capacity, the traffic model outputs show that the three intersections within the project are able to remain at LOS B under Cumulative (2035) Plus Project conditions. Therefore, there are no expected project-specific impacts under Cumulative Plus Project 2035 conditions. ***No Impact*** related to local plans, ordinances, or level of service standards would occur.

c. **No Impact**. The Proposed project would not result in a change in air traffic patterns. There would be ***No Impact*** and no mitigation is required.

d. **Less Than Significant Impact**. The Proposed project does not include any design features that could result in increased safety hazards. The Proposed improvements would not reduce any existing site distances. The Proposed improvements would also correct sign distance issues at the project intersections for the current posted speed limits. Therefore, impacts are considered ***Less Than Significant Impact*** and no mitigation is required.

e. **No Impact**. There would be no temporary substantial effects to public services or emergency access routes would be affected by the project during construction or operation of the project. Pedestrians would be able to access the new sidewalk improvements which would connect to the existing sidewalk and bicyclists would be able to access the new bike lane improvements from the existing bike lane. There would be ***No Impact*** and no mitigation is required.

f. **No Impact**. As discussed above, the proposed project is needed to maintain acceptable levels of service as set by the City's general Plan. Intersections along Woodcreek Oaks Boulevard experience congestion during peak hours due to increased traffic volumes, which are projected to increase. The Proposed project would address the need to improve long-term traffic circulation in the vicinity. In addition, the proposed project would improve the existing roadway to be consistent with City roadway design goals and standards, and also include improvements to provide Americans with Disabilities Act (ADA) access at existing curb ramps not currently compliant with ADA standard.

The Proposed project would not conflict with the City's overall transportation service goal. ***No Impact*** would result from development of the proposed project and no mitigation is required.

3.17 Tribal Cultural Resources

Would the project:		Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with the cultural value to a California Native American Tribe, and that is:					
a.	Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k), or	☐	☐	☐	☒
b.	A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	☐	☐	☐	☒

Discussion of Checklist Answers:

a,b. No Impact. The City of Roseville sent AB52 letters via certified mail to tribes who requested to be notified of proposed projects on July 11th, 2016. The City of Roseville as CEQA Lead Agency has complied with subdivision (d) of Public Resources Code Section 21080.3.1 as the California Native American tribes contacted failed to request consultation within 30 days of receipt of the City's notice. Therefore, ***No Impact*** to tribal cultural resources would occur.

3.18 Utilities and Service Systems

Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board?	☐	☐	☐	☒
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?	☐	☐	☐	☒
c. Require or result in the construction of new stormwater drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?	☐	☐	☒	☐
d. Have sufficient water supplies available to serve the project from existing entitlements and resources, or would new or expanded entitlements be needed?	☐	☐	☐	☒
e. Result in a determination by the wastewater treatment provider that 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?	☐	☐	☐	☒
f. Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?	☐	☐	☒	☐
g. Comply with federal, state, and local statutes and regulations related to solid waste?	☐	☐	☒	☐

Discussion of Checklist Answers:

a,b,e. No Impact. The proposed project would result in the widening of Woodcreek Oaks Boulevard. The proposed project would not include the construction of any wastewater-generating uses. The proposed project would not increase population in the project vicinity, and there would be no additional wastewater flows as a result of project development. Existing wastewater facilities within the park would continue to be adequate to serve recreational users within the park, including those utilizing improvements resulting from the proposed project; therefore, the proposed project would not result in the need for new or expanded wastewater facilities and would not have an adverse effect on wastewater treatment requirements. ***No Impact*** would result from development of the proposed project and no mitigation is required.

c. **Less than Significant Impact**. As discussed under Section 3.9, Hydrology and Water Quality, the proposed project includes reconfiguring the roadway to allow gutter, and drainage system improvements. Drainage Memorandum (Dokken Engineering 2016), the proposed project would introduce a net increase of 3.3 acres of new impervious surfaces. This project implements the final phase of drainage improvements along Woodcreek Oaks Boulevard by installing inlets at primarily preplanned locations and as necessary to achieve efficient intake of storm water into the existing storm drain system. The trunk system was designed as part of the initial roadway project and was preplanned for the widening. Inlet spacing and design will be in accordance with City of Roseville Standards. Tree plantings within the proposed medians and bioswales between the curb and sidewalk between Horncastle Avenue and Crimson Ridge Way, are anticipated to be implemented to meet LID guidelines as outlined in the West Placer Storm Water Quality Design Manual. The incorporation of these design elements would reduce impacts from increased surface runoff to the planned stormwater drainage systems would ensure impacts from surface runoff would remain ***Less Than Significant***. No mitigation is required.

d. **No Impact**. The project would not result in the need for new or expanded water supplies. ***No Impact*** would result from development of the proposed project and no mitigation is required.

f,g. **Less Than Significant Impact**. The Western Placer Waste Management Authority is a regional agency handling recycling and waste disposal for the City of Roseville and surrounding areas. Their facilities include a Material Recovery Facility and the Western Regional Sanitary Landfill. Project construction may generate construction debris and excavated soil. This would not affect landfill capacity because the amounts would not be substantial and would occur only during the construction period. As specified in the City's Design and Construction Standards for Solid Waste (Section 151) (City of Roseville 2014) and discussed in Section 2.7 under Environmental Commitments (**BMP — 7**), the City would ensure that contractors meet with the designated Roseville Environmental Utilities Inspector prior to beginning work to ensure that an approved plan is in place to store and dispose of all construction debris, according to relevant federal, State, and local statutes. Therefore, impacts associated with development of the proposed project would be considered ***Less Than Significant*** and no mitigation is required.

3.19 Mandatory Findings of Significance

	Would the project:	Potentially Significant Impact	Less Than Significant With Mitigation Incorporated	Less Than Significant Impact	No Impact
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, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory?	☐	☒	☐	☐
b.	Does the project have impacts that are individually limited but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects.)	☐	☐	☒	☐
c.	Does the project have environmental effects that will cause substantial adverse effects on human beings, either directly or indirectly?	☐	☒	☐	☐

Discussion of Checklist Answers:

a. **Less Than Significant With Mitigation Incorporated**. Potential impacts have been identified related to **Biological Resources** (**Section 3.4**) and **Cultural Resources** (**Section 3.5**). Mitigation measures have been identified related to individual potential resource-specific impacts.

The mitigation measures proposed by this document in order to protect Cultural Resources include: **Mitigation Measure CR — 1**, **Mitigation Measure CR — 2**, and **Mitigation Measure CR — 3**. Therefore, impacts are considered ***Less Than Significant With Mitigation Incorporated***.

b. **Less Than Significant Impact**. For natural resource topics (**Aesthetics, Air Quality, Biological Resources, Cultural Resources, Geology and Soils, Greenhouse Gas Emissions, Hazards and Hazardous Waste, Hydrology and Water Quality, Noise, Public Services, Transportation/Traffic,** and **Utilities and Service Systems**), there would be no cumulative effects because no resources would be adversely affected, or the project effects would be localized and of limited extent. Similarly, the project would involve minimal hazardous materials use, the risks of which are site-specific and are extensively regulated, and do not combine with similar effects resulting in a cumulative effect.

The Proposed project would not induce population growth or result in the development of new housing or employment-generating uses; therefore, it would not combine with cumulative development to create a cumulative effect related to increased demand for services or utilities, the expansion of which could result in significant environmental effects.

Therefore, impacts are considered ***Less Than Significant***.

c. Less Than Significant Impact with Mitigation Incorporated. There would be no significant adverse effects to human beings. There would be a less than significant increase in operational air emissions. Potential impacts have been identified related **to Noise (Section 3.12)**. Mitigation measures have been identified related to individual potential resource-specific impacts.

This impact was previously disclosed as a significant and unavoidable impact in the North Roseville Specific Plan EIR as Impact 4.11 1(a): Temporary Increases in Noise Levels Due to Earthmoving and General Construction Activities, which accounted for potential impacts associated with pile driving. The mitigation measures proposed by this document in order to mitigate for potential impacts associated with pile driving during construction of the bridge include **Mitigation Measure NOI – 1** and **Mitigation Measure NOI – 2**. Therefore, impacts are considered ***Less Than Significant With Mitigation Incorporated.***

For all other topics, there would be No Impact, a Less Than Significant Impact or impacts are considered Less Than Significant Impact With Mitigation Incorporated.

Therefore, impacts, both direct and indirect, to human beings are considered ***Less Than Significant with Mitigation Incorporated***.

4.0 REPORT PREPARERS

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5.0 REFERENCES

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6.0 LIST OF TECHNICAL STUDIES

All technical studies will be available for review by request. These studies were used in preparation of the environmental document and provide supporting documentation in addition to the summary information contained within the environmental document.

Biological Resources Report. 2016. Prepared by Dokken Engineering.

Cultural Resources Inventory Report. 2016. Prepared by Dokken Engineering.

Drainage Memorandum. 2016. Prepared by Dokken Engineering.

Foundation and Geotechnical Design Report. 2016. Prepared by Geocon Consultants.

Noise Study Report. 2016. Prepared by Dokken Engineering.

Traffic Study. 2016. Prepared by Fehr & Peers.

Appendix A — Mitigation Monitoring and Reporting Program

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No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
BMP — 1	The requirements of the City of Roseville Tree Preservation Ordinance (RMC 19.66) will be implemented, including avoidance, minimization, or compensation for the removal or disturbance of native oak trees greater than six inches diameter at breast height (DBH) during construction. If native oak trees will be affected by the project, the City will prepare a tree mitigation plan that identifies trees that qualify for protection and specifies mitigation for impacts, including temporary construction impacts associated with any work required within the drip line of native oaks. For any oak trees that would be removed, the City will develop a replacement planting plan to be included in the construction documents or purchase credits through the City maintained In-lieu fee program.	City of Roseville	Prior to and during Construction	
BMP — 2	The following measures will be incorporated into the construction specifications for the proposed project to reduce and control potential impacts to biological resources consistent with various City, state, and federal policies: • Prior to the start of construction activities, the project limits in proximity to jurisdictional waters must be marked with high visibility Environmentally Sensitive Area (ESA) fencing or staking to ensure construction will not further encroach into waters. The project biologist will periodically inspect the ESA to ensure sensitive locations remain undisturbed.	Contractor	Prior to and during Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
	• Prior to arrival at the project site and prior to leaving the project site, construction equipment that may contain invasive plants and/or seeds must be cleaned to reduce the spreading of noxious weeds. • All temporarily disturbed areas will be restored following construction. All plant material used to re-vegetate temporarily disturbed areas will be locally appropriate native species. The re-vegetation plan must not include any species listed by Cal-IPC as invasive. • Plastic mono-filament netting (erosion control matting) or similar material that could trap wildlife must not be used. Acceptable substitutes include jute, coconut coir matting or tackified hydroseeding compounds. • A pre-construction clearance survey will be conducted by the project biologist to verify that no wildlife is located within the project area before ground disturbing activities. • The contractor must not apply rodenticide or herbicide within the project area during construction. • The contractor must dispose of all food-related trash in closed containers, and must remove it from the project area each day during construction. Construction personnel must not feed or attract wildlife to the project area.			

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
BMP — 3	Because the project would disturb more than an acre, the project contractor will be required to implement a storm water pollution prevention plan (SWPPP) to comply with the National Pollutant Discharge Elimination System (NPDES) general permit administered by the State Water Resources Control Board (refer to http://www.swrcb.ca.gov/stormwtr/index.html for more information on the NPDES permit process). The SWPPP would identify structural and nonstructural BMPs to control erosion. The SWPPP will include a spill prevention and control plan to ensure transport, storage, and handling of hazardous materials required for construction is conducted in a manner consistent with relevant regulations and guidelines In addition, the project will comply with the City's design/construction standards (refer to http://www.roseville.ca.us/gov/development_services/engineering_land_development/design_construction_standards.asp) and the City's Stormwater Quality BMP Guidance Manual for Construction (2011). The project would also implement the applicable requirements of the West Placer Storm Water Quality Design Manual (West Placer 2016). Contract specifications will include the following BMPs, where applicable, to reduce erosion during construction: • Implementation of the project will require approval of a site-specific Storm	Contractor	Prior to and during Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
	Water Pollution Prevention Plan (SWPPP) that would implement effective measures to protect water quality, which may include a hazardous spill prevention plan and additional erosion prevention techniques; • Existing vegetation will be protected in place where feasible to provide an effective form of erosion and sediment control; • Stabilizing materials will be applied to the soil surface to prevent the movement of dust from exposed soil surfaces on construction sites as a result of wind, traffic, and grading activities; • Roughening and terracing will be implemented to create unevenness on bare soil through the construction of furrows running across a slope, creation of stair steps, or by utilization of construction equipment to track the soil surface. Surface roughening or terracing reduces erosion potential by decreasing runoff velocities, trapping sediment, and increasing infiltration of water into the soil, and aiding in the establishment of vegetative cover from seed.			

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
BMP — 4	No work, including staging or storage of construction equipment or materials, shall occur below the elevation of the 100-year water surface elevation from November 1st through April 15th , during the flood season.			
BMP — 5	The following measures will be incorporated into the construction specifications for the proposed project to reduce and control noise generated by construction-related activities, consistent with City ordinances and standards: • Noise-generating construction activities will be restricted to Monday through Friday from 7 a.m. to 7 p.m., and Saturday and Sunday from 8 a.m. to 8 p.m. to comply with the City of Roseville noise ordinance. • All construction equipment will have sound-control devices no less effective than those provided on the original equipment. No equipment will have an unmuffled exhaust. • Appropriate additional noise-reducing measures will be implemented, including (but not limited to) the following: stationary construction equipment will be located as far as possible from sensitive uses; sensitive uses will be identified on construction drawings; and equipment idling will be prohibited when the equipment is not in use.	Contractor	During Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
BMP — 6	The City would require the construction contractor to implement a traffic control plan, including a construction schedule and plan to meet the City's notice procedures, before construction activities are initiated. This plan would identify general methods by which construction activities will be managed to minimize substantial delays to traffic. These methods may include (but are not limited to): • Appropriately sequencing activities (e.g., segment phasing, timing of grading, hours of construction) to minimize effects on traffic flow, • Maintaining traffic flow in the project area to the extent possible, and • Maintaining bicycle and pedestrian access.	Contractor	Prior to Construction	
BMP — 7	As per the City's Design and Construction Standards for Solid Waste (Section 151) (City of Roseville 2014), the City would ensure that contractors meet with the designated Roseville Environmental Utilities Inspector prior to beginning work to ensure that an approved plan is in place to store and dispose of all construction debris, according to relevant federal, State, and local statutes.	City of Roseville	Prior to Construction	
BIO — 1	A focused plant survey will be conducted during the blooming season prior to the start of Construction (March-May). If rare plants are discovered during these surveys, additional ESA fencing or relocation will be implemented to avoid and minimize impact to the species.	Biological Consultant	Prior to Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
	Coordination with CDFW may be required to determine appropriate buffer distances.			
BIO — 2	If possible, vegetation removal should occur outside the nesting season for all bird species (February 1st – August 31st).	Contractor	During Construction	
BIO — 3	If vegetation removal is to take place during the nesting season (February 1st – August 31st), a pre-construction nesting bird survey must be conducted within 7 days prior to vegetation removal. Within 2 weeks of the nesting bird survey, all vegetation cleared by the biologist will be removed by the contractor. A minimum 100 foot no-disturbance buffer will be established around any active nest of migratory birds and a minimum 300 foot no-disturbance buffer will be established around any nesting raptor species. The contractor must immediately stop work in the nesting area until the appropriate buffer is established and is prohibited from conducting work that could disturb the birds (as determined by the project biologist and in coordination with wildlife agencies) in the buffer area until a qualified biologist determines the young have fledged. A	Contractor and Consultant	Prior to Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
	reduced buffer can be established if determined appropriate by the project biologist and approved by CDFW.			
BIO — 4	A preconstruction survey will be conducted within 7 days prior to ground disturbing activities to find active burrowing owl burrows within a 500-foot buffer zone around construction activities, between February 1st – August 31st. If burrowing owls are observed during the preconstruction survey, coordination with CDFW will be required to determine appropriate no-work buffer distances and other avoidance strategies.	City of Roseville/ Consultant	Prior to Construction	
BIO — 5	As required by BMP — 2, all temporary disturbed riparian areas will be restored following construction. In addition, all permanent impacts to riparian habitat (waters of the State) will be mitigated a minimum of 2:1 ratio via purchase of mitigation credits at an agency approved mitigation bank. Exact mitigation ratios and locations will be documented in the Section 1602 Lake and Streambed Alteration Agreement to be obtained from the California Department of Fish and Wildlife prior to construction.	City of Roseville/ Consultant	Prior to Construction	
BIO — 6	Permanent impacts to riverine (waters of the U.S.) will be mitigated to ensure no net loss by purchasing mitigation credits from the National Fish and Wildlife Foundation in-lieu fee program or an agency approved mitigation bank. Exact mitigation ratios and locations will	City of Roseville/ Consultant	Prior to Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
	be documented in the Section 404 Nationwide Permit to be obtained from the U.S. Army Corp of Engineers prior to construction.			
CR — 1	In the event of the discovery of buried archaeological deposits it is recommended that project activities in the vicinity of the find should be temporarily halted and a Qualified Archaeologist consulted to assess the resource and provide proper management recommendation. Possible management recommendations for important resources could include resource avoidance or data recovery excavations.	Contractor	During Construction	
CR — 2	The City shall ensure construction specifications shall include the following information in the grading notes: • If substantial fossil remains (particularly vertebrate remains) are discovered during earth-disturbing activities on the project site, activities will stop immediately until a state-registered Professional geologist or Qualified Professional Paleontologist can assess the nature and importance of the find and a Qualified Professional Paleontologist can recommend appropriate treatment. Treatment may include preparation and recovery of fossil materials so that they can be housed in an appropriate museum or university collection and may also	City of Roseville	During Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
	include preparation of a report for publication describing the finds. The City will be responsible for ensuring that recommendations regarding treatment and reporting are implemented.			
CR — 3	The City shall ensure construction specifications include the following in the grading notes: • If human remains are discovered during any phase of construction, including disarticulated or cremated remains, the construction contractor shall immediately cease all ground-disturbing activities within 100 feet of the remains and notify Mark Morse, Environmental Coordinator, and City of Roseville City Manager's Office. • In accordance with California State Health and Safety Code Section 7050.5, no further disturbance shall occur until the following steps have been completed: o The County Coroner has made the necessary findings as to origin and disposition pursuant to Public Resources Code (PRC) § 5097.98. o If the remains are determined by the County Coroner to be Native American, the NAHC shall be notified within 24 hours, and the guidelines of the NAHC shall be	City of Roseville	During Construction	

No.	Description of Commitment	Responsible Party/Monitor	Timing/Phase	Verification of Compliance
	adhered to in the treatment and disposition of the remains. It is further recommended that a professional archaeologist with Native American burial experience conduct a field investigation of the specific site and consult with the Most Likely Descendant (MLD), if any, identified by the NAHC. As necessary and appropriate, a professional archaeologist may provide technical assistance to the MLD, including but not limited to, the excavation and removal of the human remains.			
NOI — 1	Pile driving activities will be limited to 9 A.M. to 5 P.M., Monday through Friday.			
NOI — 2	In order to reduce the construction noise levels by up to 15 dBA at a distance of 50 feet during construction of the bridge, plywood or noise curtains designed specifically for construction noise mitigation shall be installed around the impact hammer and positioned as close as possible to the hammer / pile impact location during all pile driving activities.			

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Appendix B — Road Construction Emissions Model, August 2016

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Road Construction Emissions Model, Version 8.1.0

Daily Emission Estimates for -> Woodcreek Oaks

Project Phases (Pounds)	ROG (lbs/day)	CO (lbs/day)	NOx (lbs/day)	Total PM10 (lbs/day)	Exhaust PM10 (lbs/day)	Fugitive Dust PM10 (lbs/day)	Total PM2.5 (lbs/day)	Exhaust PM2.5 (lbs/day)	Fugitive Dust PM2.5 (lbs/day)	SOx (lbs/day)	CO2 (lbs/day)	CH4 (lbs/day)	N2O (lbs/day)	CO2e (lbs/day)
Grubbing/Land Clearing	1.60	11.49	18.29	20.82	0.82	20.00	4.89	0.73	4.16	0.03	2,547.22	0.60	0.03	2,571.52
Grading/Excavation	6.26	40.37	69.07	23.45	3.45	20.00	7.31	3.15	4.16	0.07	6,832.25	1.93	0.07	6,900.03
Drainage/Utilities/Sub-Grade	4.95	35.43	47.49	22.74	2.74	20.00	6.71	2.55	4.16	0.06	5,551.92	1.14	0.05	5,596.44
Paving	2.25	17.35	21.57	1.41	1.41	0.00	1.24	1.24	0.00	0.04	3,671.56	0.67	0.06	3,706.13
Maximum (pounds/day)	6.26	40.37	69.07	23.45	3.45	20.00	7.31	3.15	4.16	0.07	6,832.25	1.93	0.07	6,900.03
Total (tons/construction project)	0.48	3.22	4.99	1.95	0.26	1.68	0.59	0.24	0.35	0.01	549.01	0.14	0.01	554.10

Notes:

Project Start Year ->	2017
Project Length (months) ->	9
Total Project Area (acres) ->	10
Maximum Area Disturbed/Day (acres) ->	2
Water Truck Used? ->	Yes

	Total Material Imported/Exported Volume (yd^3/day)		Daily VMT (miles/day)			
Phase	Soil	Asphalt	Soil Hauling	Asphalt Hauling	Worker Commute	Water Truck
Grubbing/Land Clearing	50	0	60	0	320	20
Grading/Excavation	0	20	0	20	400	20
Drainage/Utilities/Sub-Grade	0	0	0	0	680	20
Paving	200	50	200	60	520	20

PM10 and PM2.5 estimates assume 50% control of fugitive dust from watering and associated dust control measures if a minimum number of water trucks are specified.

Total PM10 emissions shown in column F are the sum of exhaust and fugitive dust emissions shown in columns G and H. Total PM2.5 emissions shown in Column I are the sum of exhaust and fugitive dust emissions shown in columns J and K.

CO2e emissions are estimated by multiplying mass emissions for each GHG by its global warming potential (GWP), 1 , 25 and 298 for CO2, CH4 and N2O, respectively. Total CO2e is then estimated by summing CO2e estimates over all GHGs.

Total Emission Estimates by Phase for -> Woodcreek Oaks

Project Phases (Tons for all except CO2e. Metric tonnes for CO2e)	ROG (tons/phase)	CO (tons/phase)	NOx (tons/phase)	Total PM10 (tons/phase)	Exhaust PM10 (tons/phase)	Fugitive Dust PM10 (tons/phase)	Total PM2.5 (tons/phase)	Exhaust PM2.5 (tons/phase)	Fugitive Dust PM2.5 (tons/phase)	SOx (tons/phase)	CO2 (tons/phase)	CH4 (tons/phase)	N2O (tons/phase)	CO2e (MT/phase)
Grubbing/Land Clearing	0.02	0.11	0.18	0.21	0.01	0.20	0.05	0.01	0.04	0.00	25.22	0.01	0.00	23.10
Grading/Excavation	0.28	1.80	3.08	1.04	0.15	0.89	0.33	0.14	0.19	0.00	304.38	0.09	0.00	278.87
Drainage/Utilities/Sub-Grade	0.15	1.05	1.41	0.68	0.08	0.59	0.20	0.08	0.12	0.00	164.89	0.03	0.00	150.79
Paving	0.03	0.26	0.32	0.02	0.02	0.00	0.02	0.02	0.00	0.00	54.52	0.01	0.00	49.93
Maximum (tons/phase)	0.28	1.80	3.08	1.04	0.15	0.89	0.33	0.14	0.19	0.00	304.38	0.09	0.00	278.87
Total (tons/construction project)	0.48	3.22	4.99	1.95	0.26	1.68	0.59	0.24	0.35	0.01	549.01	0.14	0.01	502.68

PM10 and PM2.5 estimates assume 50% control of fugitive dust from watering and associated dust control measures if a minimum number of water trucks are specified.

Total PM10 emissions shown in column F are the sum of exhaust and fugitive dust emissions shown in columns G and H. Total PM2.5 emissions shown in Column I are the sum of exhaust and fugitive dust emissions shown in columns J and K.

CO2e emissions are estimated by multiplying mass emissions for each GHG by its global warming potential (GWP), 1 , 25 and 298 for CO2, CH4 and N2O, respectively. Total CO2e is then estimated by summing CO2e estimates over all GHGs.

The CO2e emissions are reported as metric tons per phase.