COUNTY OF LAKE
COMMUNITY DEVELOPMENT DEPARTMENT
Planning Division
Courthouse - 255 N. Forbes Street
Lakeport, California 95453
Telephone 707/263-2221 FAX 707/263-2225

December 15, 2022

CALIFORNIA ENVIRONMENTAL QUALITY ACT ENVIRONMENTAL CHECKLIST FORM INITIAL STUDY 22-27

1. Project Title:	Chalk Mountain Road Over North Fork Cache Creek Bridge Replacement Project (Bridge No. 14C-0048)
2. Lead Agency Name & Address:	County of Lake Community Development Department Planning Division Courthouse – 255 North Forbes Street Lakeport CA 95453
3. Contact Person & Phone Number:	Laura Hall, Senior Planner (707) 263-2221
4. Project Location:	Bridge No. 14C-0048 is located in the unincorporated Spring Valley in Lake County, approximately 5.4 miles northeast of State Route 20; Quad: Benmore Canyon T14N, R07W, Section 12 UTM Zone 10 (39.069939, -122.584140)
5. Project Sponsor's Name & Address:	County of Lake 255 N Forbes St Lakeport, CA 95453
6. General Plan Designation(s):	Public Facilities PF
7. Zoning Designation(s):	"O"-"FF"-"WW", "RL"-"FF"-"B5" Open Space District-Floodway Fringe-Waterway, Rural Lands-Floodway Fringe-Special Lot size/Density
8. Permit Numbers:	Initial Study (IS 22-27) General Plan Conformity (GPC 22-10)
9. APN(s):	062-471-01, 02, 03, 062-481-03, 05/ Project Impact Area= 4.39 acres
10. Supervisor District:	District 3

11. Slope:	0-3% (bridge site)
12. Fire Hazard Zone:	Very High Fire Severity Zone
13. Earthquake Fault Zone:	N/A
14. Dam Failure Inundation Area:	Dam Failure Inundation Area
15. Flood Zone:	A- "Area inundated by the Base Flood with no Base Flood Elevations determined"
16. Fire Protection District:	Northshore (CALFIRE)
17. Site Visit:	July 29, 2022

18. Acronyms:

AASHTO	American Association of State Highway and Transportation Officials
ACM	Asbestos Containing Materials
ADT	Average Daily Traffic
APE	Area of Potential Effects
ASR	Archaeological Survey Report
BAAQMD	Bay Area Air Quality Management District
BMP	Best Management Practices
BSA	Biological Survey Area
CDFW	California Department of Fish and Wildlife
CEQA	California Environmental Quality Act
CGS	California Geological Survey
CVRWQCB	Central Valley Regional Water Quality Control Board
EPA	Environmental Protection Agency
HASP	Health and Safety Plan
HPSR	Historic Property Survey Report
HUC	Hydrologic Unit Code
LCAQMD	Lake County Air Quality Management District
MMRP	Mitigation Monitoring & Reporting Program
MLD	Most Likely Descendant
MND	Mitigated Negative Declaration
NAHC	Native American Heritage Commission
NOA	Naturally Occurring Asbestos
NPDES	National Pollutant Discharge Elimination System
NRCS	Natural Resources Conservation Service
NWIC	Northwest Information Center
PES	Preliminary Environmental Study
SAFETEA-LU	Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users
SWPPP	Storm water Pollution Prevention Plan

USC	United States Code
VMT	Vehicle Miles Traveled

19. Determination

Pursuant California Code of Regulations Title 14, Chapter 3, Article 5, Section 15063, the County has prepared a Mitigated Negative Declaration (MND) for the proposed project. Per Section 15105, "When a proposed negative declaration or mitigated negative declaration is submitted to the State Clearinghouse for review by state agencies, the public review period shall not be less than 30 days, unless a shorter period, not less than 20 days, is approved by the State Clearinghouse". Depending on comments received by interested agencies, stakeholders, and the public, this proposed MND is subject to change. The County has determined the proposed project would not have a significant impact on the environment because: The project would have no impact on Mineral Resources and Recreation; a less than significant impact on the following: Aesthetics, Agriculture/Forestry Resources, Energy, Greenhouse Gas Emissions, Land Use/ Planning, Population/Housing, Transportation, Utilities/Service Systems, Wildfire, Public Services; and a less than significant impact with mitigation incorporated on the following: Air Quality, Biological Resources, Cultural Resources, Hazards & Hazardous Materials, Geology and Soils, Hydrology and Water Quality, Noise, Public Services. Tribal Cultural Resources. The Monitoring and Reporting Program that includes mitigation measures to reduce potential significant impacts to less than significant is included in Attachment B.

20. Environmental Setting/Existing Conditions

The project site is located within the Upper Cache Watershed (Hydrologic Unit Code 18020116) which is approximately 1,300 square miles with an average annual precipitation of 60 inches. There are numerous lakes, rivers, and streams within the watershed. The project is located within the Interior North Coast Range of California. This is a region of steep, generally north-to-south-trending ridges and small interior valleys that eventually drain east to the Sacramento Valley and Sacramento River. The Chalk Mountain Road Bridge crosses the North Fork of Cache Creek in Long Valley, a minor alluvial plain surrounded by steep mountains and containing the confluences of Long Valley Creek, Wolf Creek, and the North Fork of Cache Creek. Runoff from the valley continues southeast as the North Fork of Cache Creek for 8.6 river miles to its confluence with the main channel of Cache Creek. Cache Creek continues 25 miles to the Capay Valley reaching the Sacramento Valley near the town of Esparto approximately 50 river miles southeast of the project area. This region of the Coast Range is typically dominated by chamise chaparral on steep slopes and blue oak woodland/savanna on the gentler hills and level valleys. Along Cache Creek and its tributaries, the transition from narrow riparian communities to the more xeric (dry soil) chaparral and woodland is abrupt due primarily to the steep river gradient and hot, dry Mediterranean climate (California Department of Transportation, 2016).

Description of Project: (Describe the whole action involved, including but not limited to later phases of the project, and any secondary, support, or off-site features necessary for its implementation. Attach additional sheets if necessary)

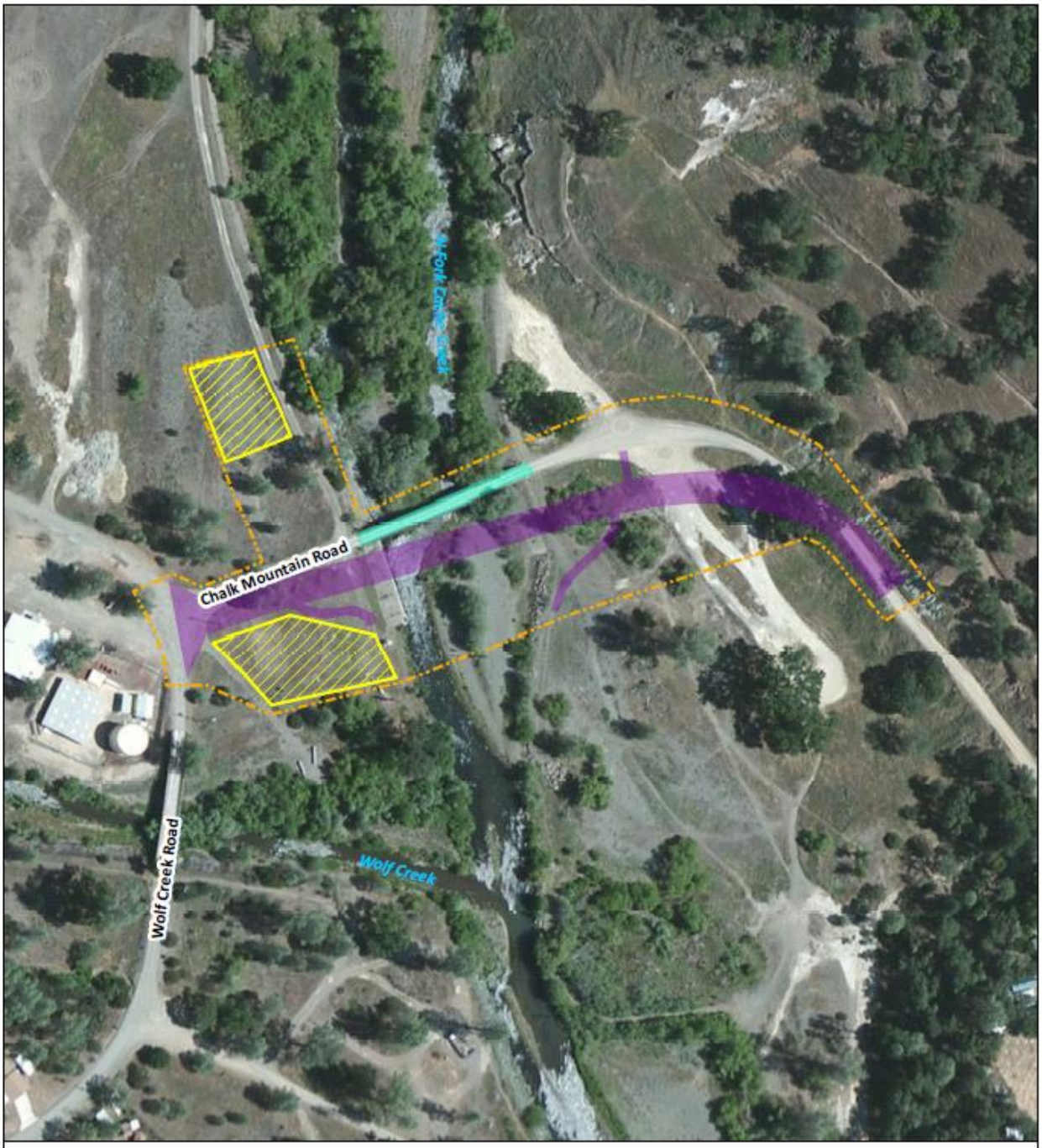
Project Purpose and Need

Lake County, in coordination with the California Department of Transportation (Caltrans), proposes replacing the existing Chalk Mountain Road at Creek Bridge Replacement Project (Bridge No. 14C-0048) to improve public safety. Bridge #14C-0048 is located east of the intersection of Wolf Creek Road and Chalk Mountain Road, in eastern Lake County approximately 5 miles northeast of Clear Lake Oaks (Attachment A). The bridge has a sufficiency rating of 26.7 and has been designated as structurally deficient per the Caltrans Structure Maintenance & Investigations, Local Agency Bridge List (February 2015). In its current condition, the foundations of the existing structure are unknown, the nearest structure Bridge No. 14C0051, Wolf Creek Road over Wolf Creek, was constructed in the same year, with the same engineer, and part of the same development. Flows in Wolf Creek in the spring of 1968 caused the Wolf Creek Road Bridge to settle some six inches. Similar substructure vulnerabilities may exist with the Chalk Mountain Road Bridge.

Caltrans has reviewed the preliminary details of the project and supports a full replacement scope. The purpose of the proposed project is to provide a replacement structure that is consistent with appropriate Caltrans structural design standards, is placed on a road alignment that meets the appropriate AASHTO roadway geometry standards, and is hydraulically capable of passing and clearing the design storm events (50-year storm plus 2 feet of freeboard and 100-year storm). Figure 1 includes a Regional Location map, and Figure 2 includes a Project Location map of the project site, and Figure 3 includes the Area of Potential Effect where the bridge will be constructed (Drake Haglan and Associates, 2017).


Lake County
Project Location - Chalk Mountain Road Bridge
drake haglan AND ASSOCIATES
Project Name:
Chalk Mountain Road over N Fork Cache Creek Bridge (14C-0048) Replacement Project
Lake County, CA
Regional Location Map
Figure 1


Project Location - Chalk Mountain Road Bridge
drake haglan AND ASSOCIATES
Project Name:
Chalk Mountain Road over N Fork Cache Creek Bridge (14C-0048) Replacement Project
Lake County, CA
Project Location Map
Figure 2



Legend

- Project Impact Area
- Proposed Bridge and Roadway
- Existing Bridge
- Proposed Staging Area

drake haglan AND ASSOCIATES

Source: ESRI Online Basemap, Aerial Imagery, Lake County
Coordinate System: NAD 83 State Plane California II FIPS 0402 Feet
Notes: This map was created for informational and display purposes only

Project Name:
Chalk Mountain Road over N Fork Cache Creek Bridge (14C-0048) Replacement Project
Lake County, CA

Project Impact Area and Project Details

Figure 3

August 1, 2022, Site Visit

Photo 1: Standing on the west side of the Chalk Mountain Bridge looking east.

Photo 2: Standing on the east side of the Chalk Mountain Bridge looking west.

Photo 3: Standing on the center of the Chalk Mountain Bridge looking upstream.

Photo 4: Standing on the center of Chalk Mountain Bridge looking downstream.

Project Description

The replacement bridge will be wider to comply with current AASHTO standards for local rural roads, including 9-foot travel lanes and 2-foot shoulders, plus crash-tested vehicular barriers. A Class 1 bike trail is also proposed. The replacement structure will be approximately 230 feet long.

It is anticipated that deep foundations will be needed to support the replacement bridge. The underlying formation of the soil is rock overlaid by alluvial and fan deposits which have washed down from the mountains. The upper materials are subject to scour; this is often best suited for concrete piles, as they can be designed to act as columns if the soil material scours away. The most feasible pile type will be determined during the type selection process, when further geotechnical information is available.

The proposed project also includes a separated (Class 1) multi use path in the design of the bridge deck width of the replacement bridge. The Class 1 train is needed to support the local non-motorized traffic from the adjacent Spring Valley Community Center, camping areas, and parks. The Class 1 Trail is also needed to be in compliance with the Cache Creek Coordinated Resources Management Plan for Zone B.

Demolition and Construction Staging

Demolition of the existing bridge will be performed in accordance with the Caltrans Standard Specifications modified to meet environmental permit requirements. All concrete and other debris resulting from the bridge demolition will be removed from the project site and disposed of by the contractor. The construction contractor will prepare a bridge demolition plan.

It is anticipated that construction will occur when the creek bed is dry or near dry. However, if water is present during construction, temporary cofferdams will be installed upstream and downstream of the construction site. A temporary series of culverts will be installed between the cofferdams to carry water through the work area. The work area will then be dewatered by pumping. The temporary cofferdams and culverts will be completely removed after the completion of replacement bridge construction, the placement of rock slope protection, and the removal of the existing bridge. All in-channel work will be limited to the dry season (July-October).

Right-of-Way

Temporary construction easements will be required from the five properties adjacent to the bridge site. Permanent right-of-way takes are anticipated from the two adjacent properties south of the bridge. Detailed right-of-way takes have not been determined at this point.

Utilities

There are several utilities at the site. Overhead electric and communication lines run parallel to the bridge on the north side of Chalk Mountain Road. These lines may need to be temporarily relocated or de-energized during the construction of the replacement bridge; to be determined as the design of the project progresses.

Construction Activities

Construction will consist of the following activities:

- Removing trees, clearing, and grubbing to accommodate the new bridge structure and road approach work
- Excavating for the new bridge foundations
- Constructing the new bridge and road approaches, including excavating for and placing asphalt concrete
- Removing the existing bridge
- Placing erosion control native grass seeds and mulch

Table 1 provides a description of the type of equipment likely to be used during the construction of the proposed project.

Table 1. Construction Equipment

Equipment	**Construction Purpose**
Drill Rig	Construction of drilled or driven pile foundations
Backhoe	Soil manipulation + drainage work
Bobcat	Fill distribution
Bulldozer / Loader	Earthwork construction + clearing and grubbing
Crane	Placement of precast concrete girders or false work beams
Dump Truck	Fill material delivery
Excavator	Soil manipulation
Front-End Loader	Dirt or gravel manipulation
Grader	Ground grading and leveling
Haul Truck	Earthwork construction + clearing and grubbing
Roller / Compactor	Earthwork and asphalt concrete construction
Paver	Asphalt concrete construction
Truck with seed sprayer	Erosion control landscaping
Water Truck	Earthwork construction + dust control

Construction Schedule and Timing

Construction of the proposed project is anticipated to take between 4 to 8 months to complete, pending the scope of the final design and construction plans. Construction is anticipated for the spring of 2023. All work within the North Fork Cache Creek channel will be conducted in accordance with the regulatory agency permits. All work within the channel will be conducted in accordance with the regulatory agency permits.

Surrounding Land Uses and Setting: Briefly describe the project's surroundings

The North Fork Cache Creek Bridge lays to the east of unincorporated community of Spring Valley. Surrounding land uses from the bridge include: the bed and banks of the North Fork Cache Creek to the north and south, Chalk Mountain to the east, and the Spring Valley Community Center is located to the west. Below in the surrounding zoning designations:

North: "O"-"FF"-"WW", Open Space -Floodway Fringe-Waterway
East: "RL"-"FF"-"B5", Rural Lands-Floodway Fringe- Special Lot size/Density
South: "O"-"FF"-"WW", Open Space -Floodway Fringe-Waterway
West: "O"-"FF"-"WW", Open Space -Floodway Fringe-Waterway

21. Other public agencies whose approval is required (e.g., Permits, financing approval, or participation agreement.)

The following permits are required, and a copy of these permits will need to be sent to Caltrans Senior Environmental Planner of District 1 Local Assistance before construction begins:

II. Regional Water Quality Control Board - 401 Permit
III. U.S. Army Corps of Engineers - 404 Permit
IV. CA Department of Fish and Wildlife - 1602 Permit Stream Alteration Agreement
V. NPDES Construction General Permit - RWQCB

Funding for the project comes from the Federal Highway Administration through the Federal Highway Bridge Program. As a Responsible Agency, Caltrans is responsible for implementing funding and project approvals.

22. Have California Native American tribes traditionally and culturally affiliated with the project area requested consultation pursuant to Public Resources Code section 21080.3.1? If so, is there a plan for consultation that includes, for example, the determination of significance of impacts to tribal cultural resources, procedures regarding confidentiality, etc.?

Conducting consultation early in the CEQA process allows tribal governments, lead agencies, and project proponents to discuss the level of environmental review, identify and address potential adverse impacts to tribal cultural resources, and reduce the potential for delay and conflict in the environmental review process. (See Public Resources Code section 21080.3.2.) Information may also be available from the California Native American Heritage Commission's Sacred Lands File per Public Resources Code section 5097.96 and the California Historical Resources Information System administered by the California Office of Historic Preservation. Please also note that Public Resources Code section 21082.3(c) contains provisions specific to confidentiality.

Pursuant to Public Resources Code Section 21080.3.1, the Lake County Community Development Department sent a formal notification on July 7, 2022, to the Yocha Dehe Wintun Nation of California who are traditionally and culturally affiliated with the project area. The California Historical Resources Information System of Sonoma State was also notified and made recommendations that included having an assessment prepared by a qualified professional

archaeologist, conducting a field study, and having the lead agency contact the tribes. An Archaeological Survey Report was previously completed in 2017, which provides findings and conclusions. The report includes an investigation of archaeological resources in and around the Area of Potential Effects (APE), a records search, and pedestrian survey and consultation efforts. Consultation with the Tribal government occurred on September 14, 2022, and there was noted concerns from the tribes. As a result of communicating and working with the Tribal government, the County has agreed to a Cultural Resource Monitor being present at the site during excavation.

23. Initial Study Attachments

- Attachment A: Diagrams of Proposed Bridge
- Attachment B: Mitigation Monitoring & Reporting Program (MMRP)
- Attachment C: Natural Environmental Study

ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED:

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

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

DETERMINATION: (To be completed by the lead Agency)
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 project have been made by or agreed to by the project proponent. 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.

Initial Study prepared by:
Laura Hall, Senior Planner

Laura Hall
SIGNATURE

Date: 11/14/22

Mireya G. Turner, Director
Community Development Department

EVALUATION OF ENVIRONMENTAL IMPACTS:

1) A brief explanation is required for all answers except "No Impact" answers that are adequately supported by the information sources a lead agency cites in the parentheses following each question. A "No Impact" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g., the project falls outside a fault rupture zone). A "No Impact" answer should be explained where it is based on project-specific factors as well as general standards (e.g., the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).

2) All answers must take account of 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.

- Once the lead agency has determined that a particular physical impact may occur, and then the checklist answers must indicate whether the impact is potentially significant, less than significant with mitigation, or less than significant. "Potentially Significant Impact" is appropriate if there is substantial evidence that an effect may be significant. If there are one or more "Potentially Significant Impact" entries when the determination is made, an EIR is required.

- "Negative Declaration: Less Than Significant With Mitigation Incorporated" applies where the incorporation of mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less Than Significant Impact." The lead agency must describe the mitigation measures, and briefly explain how they reduce the effect to a less than significant level (mitigation measures from Section XVII, "Earlier Analyses," may be cross-referenced).

5) Earlier analyses may be used where, pursuant to the tiering, program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR or negative declaration. Section 15063(c)(3)(D). In this case, a brief discussion should identify the following:
   a) Earlier Analysis Used. Identify and state where they are available for review.
   b) Impacts Adequately Addressed. Identify which effects from the above checklist were within the scope of and adequately analyzed in an earlier document pursuant to applicable legal standards, and state whether such effects were addressed by mitigation measures based on the earlier analysis.
   c) Mitigation Measures. For effects that are "Less than Significant with Mitigation Measures Incorporated," describe the mitigation measures, which were incorporated or refined from the earlier document and the extent to which they address site-specific conditions for the project.

6) Lead agencies are encouraged to incorporate into the checklist references to information sources for potential impacts (e.g., general plans, zoning ordinances). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated.

   i) Supporting Information Sources: A source list should be attached, and other sources used or individuals contacted should be cited in the discussion.

   ii) This is only a suggested form, and lead agencies are free to use different formats; however, lead agencies should normally address the questions from this checklist that are relevant to a project's environmental effects in whatever format is selected.

9) The explanation of each issue should identify:
   a) the significance criteria or threshold, if any, used to evaluate each question; and
   b) the mitigation measure identified, if any, to reduce the impact to less than significance

KEY: 1 = Potentially Significant Impact
2 = Less Than Significant with Mitigation Incorporated
3 = Less Then Significant Impact
4 = No Impact

IMPACT CATEGORIES*	1	2	3	4	All determinations need explanation. Reference to documentation, sources, notes and correspondence.	Source Number
I. AESTHETICS *Except as provided in Public Resources Code Section 21099, would the project:*						
a) Have a substantial adverse effect on a scenic vista?			X		There may be a temporary visual impact to the site during construction related to the presence of equipment, materials and earthmoving activities. However, the bridge was built in 1967 and is visibly aging. After construction, there would be a new bridge which would improve the scenic view of the area. In addition, a visual impact assessment guide was prepared for the proposed project by Caltrans. This spreadsheet is used by Caltrans to determine impacts on the visual impacts of a proposed project on the environment. Scoring starts at 6-9 with the highest score being 25-30. The proposed project scored an 8 indicating no noticeable visual changes to the environment are proposed and no further analysis is required (California Department of Transportation, 2016a). **Less than Significant Impact**	14.
b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?			X		Chalk Mountain Road is not on the Caltrans List of Officially Designated County Scenic Highways, or on the List of Eligible and Officially Designated State Scenic Highways List (California Department of Transportation, 2015c). **Less than Significant Impact**	8.
c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?			X		Please see response to Section I. a). **Less than Significant Impact**	14.

d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?			X		Work will be conducted during daylight hours. The project is not anticipated to create additional light or glare on the road or in the vicinity of the bridge. Also see Section I (a) response. **Less than Significant Impact**	14.
II. AGRICULTURE/FORESTRY RESOURCES *Would the project:*						
a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?			X		The staging area located on the northwest side of the bridge has been classified as "Farmland of Local Importance" according to the California Department of Conservation. Farmland of Local Importance is defined as: • Lands which do not quality as prime farmland or farmland of statewide importance or unique farmland, but are currently irrigated pasture or no irrigated crops; and unirrigated land with soils qualifying for prime farmland or farmland or statewide importance. Areas or unirrigated prime and statewide importance soils overlying ground water basins may have more potential for agricultural use. The portion of the project site where the North Fork Cache Creek Bridge is located, has been classified as "Grazing Land" in the California Department of Conservation's California Important Farmland Finder. Grazing Land is defined as: • Grazing Land is land on which the existing vegetation is suited to the grazing of livestock (California Department of Conservation, 2018). The proposed project would consist of replacing a bridge. A small amount of land from the Day Use Area would be affected, but that land is not classified as Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance Farmland. **Less Than Significant Impact**	9.
b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?				X	Please see response to Section II (a). The project only includes replacement of an existing bridge. There is no request for a change of use to the land. In addition, there are no known Williamson Act contracts on any of the adjacent surrounding properties, and Lake County is no longer accepting Williamson Act contracts. **No Impact**	9., 20.
c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)),				X	See responses to Section II (a) and (b). **No Impact**	9., 20.

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?			X		Forest land as defined under Public Resource Code 12220(g) is land that can support 10-percent native tree cover of any species, including hardwoods, under natural conditions, and that allows for management of one or more forest resources, including timber, aesthetics, fish and wildlife, biodiversity, water quality, recreation, and other public benefits. According to the project description, removing trees, clearing, and grubbing to accommodate the new bridge structure and rad approach work would occur However, this would not include 10-percent of the native tree cover (California Department of Transportation, 2018). **Less Than Significant Impact**	14., 15.
e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?				X	N/A **No Impact**	
III. AIR QUALITY *Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations.* *Would the project:*						
a) Conflict with or obstruct implementation of the applicable air quality plan?			X		Lake County Air Quality Management District (LCAQMD) is a full attainment district for criteria air pollutants and therefore has not adopted an air quality plan. Implementation of the proposed project would only include short-term impacts from construction activities (Lake County Air Quality Management District, 2022). **Less Than Significant Impact**	5., 33.
b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under and applicable federal or			X		The California Air Resources Board defines criteria air pollutants as air pollutants for which acceptable levels of exposure can be determined and were an ambient air quality standard has been set. Examples include: ozone, carbon monoxide, nitrogen dioxide, sulfur dioxide, and PM10 and PM2.5 (California Air Resources Board, 2022).	5.. 33., 13.

state ambient air quality standard?					The Preliminary Environmental Study concluded that although the project proposes to add an additional lane, widening from a one lane bridge to a two lane bridge, this will not lead to an increase in capacity of vehicles travelling along Chalk Mountain Road. The purpose of widening the bridge is to provide appropriate design standards for roadway geometry, accessibility, hydraulics, and structural integrity. Therefore, no cumulative increase would occur. Also, as mentioned before, Lake County is a full attainment district (California Department of Transportation, 2016a). **Less Than Significant Impact**	
c) Expose sensitive receptors to substantial pollutant concentrations?		X			According to the California Air Resources Board "Sensitive receptors are children, elderly, asthmatics and others who are at a heightened risk of negative health outcomes due to exposure to air pollution. The locations where these sensitive receptors congregate are considered sensitive receptor locations. Sensitive Receptor locations may include hospitals, schools, and day care centers, and such other locations as the air district board or California Air Resources Board may determine (California Health and Safety Code § 42705.5(a)(5))". The Spring Valley Community Center is located across the street from the project site, at 2975 Wolf Creek Rd, Clearlake Oaks, CA 95423. The Center hosts monthly dinners and other events. Demolition of the existing bridge will be performed in accordance with the Caltrans Standard Specifications modified to meet environmental permit requirements. All concrete and other debris resulting from the bridge demolition will be removed from the project site and disposed of by the contractor. The construction contractor will prepare a bridge demolition plan. (California Department of Transportation, 2016a. 2016b). An Asbestos Containing Materials and Natural Occurring Asbestos Assessment was completed for the proposed project. It was concluded that based on the results of the records review, published geologic mapping, reconnaissance and limited asbestos and lead sampling, there is no risk of encountering soil/rock with significant quantities of NOA or ACMs are present at the project site (Drake Haglan and Associates, 2017b). For LCAQMD fugitive dust emissions related to construction activities, the project will be required to obtain an Authority to Construct Permit. In addition, the project will include the removal of trees and clearing and grubbing. The following mitigation measures would reduce impacts to less than significant:	5., 13., 14., 23., 24.

					AQ-1: Prior to obtaining the necessary permits and/or approvals, the applicant shall contact the Lake County Air Quality Management District and obtain an Authority to Construct. **AQ-2:** All vegetation during site development shall be chipped and spread for ground cover and/or erosion control. The burning of vegetation, construction debris, including waste material is prohibited. **Less Than Significant with Mitigation Incorporated**	
d) Result in other emissions (such as those leading to odors or dust) adversely affecting a substantial number of people?		X			See Section III c) for mitigation measures for odors and dust. **Less Than Significant with Mitigation Incorporated**	
IV. BIOLOGICAL RESOURCES *Would the project:*						
a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?		X			A Natural Environment Study (NES) was prepared in May 2018 by Northwest Biosurvey, which included a pre-survey research, a floristic-level botanical survey, a delineation of waters of the U.S., and a survey for Valley elderberry longhorn. All surveys were conducted following agency protocols and within the appropriate survey window. Based on the results of the Natural Environmental Study, there are no California endangered species within the Biological Study Area (BSA). However, as discussed in Section 4.3, there are several wildlife species with sensitive status in California potentially present that require CEQA review and mitigation under Section 15380(d) of the CEQA Guidelines: western pond turtle, foothill yellow-legged frog, white-tailed kite, yellow warbler, yellow-breasted chat, North American river otter, and pallid bat. Four species are included due to their California Species of Concern or California Fully Protected status and the presence of potential habitat within the BSA. The following mitigation measures listed as Avoidance and Minimization Efforts in the NES will be applied to the project (Northwest Biosurvey, 2018) (Attachment C). **BIO-1**. Work within the channel should avoid disturbing downed trees, stumps and other basking sites and refuges within these aquatic habits Should any work occur within the banks or riparian habitat of the creek at times when the affected segment contains water, it should be immediately preceded by a site inspection of the channel by a qualified biologist with a valid CDFW collecting permit. Any turtles within the work area should be captured and transferred to another suitable portion of North Fork Cache Creek.	38.

					BIO-2. The flowing portion of the stream shall be diverted through placement of temporary levees along the banks of the low flow channel to convey the water from the North Fork Cache Creek through the project site. The Resident Engineer shall check with Yolo County Flood Control to determine the volume of maximum construction season stream flows. **BIO-3.** The culverts shall be no less than two feet in diameter and inset into the channel to a depth of half their diameter in order to allow downstream passage of fish and herptiles. These structures shall be removed at the end of the project and prior to winter stream flows. **BIO-4.** The proposed diversion shall be reviewed and approved by a qualified biologist with a valid CDFW collecting permit prior to installation. That individual shall be present during its construction. During construction of this diversion, the qualified biologist shall inspect the diverted channel segment for sensitive herptiles and nests as described above and shall capture and release any herptiles or fish within the diversion area to a suitable segment of North Fork Cache Creek. **BIO-5.** Prior to construction outside of the period when water is present in the channel, the qualified biologist shall inspect adjacent banks within the proposed stream crossing (PIA) for turtle nests and flag any nests for installation of construction fencing around a 5-foot radius. Any nests that cannot be avoided shall be moved and monitored by the qualified biologist. If nests are found a monitoring report containing photographs of the nest relocation effort and weekly inspections for a period of one (1) month shall be submitted to CDFW staff for review upon completion of the monitoring period. **BIO-6.** Work within a minimum of 250 feet of a bald eagle or white-tailed kite nest should be avoided between February 15 and August 31 in order to avoid the potential for disrupting nesting and breeding, unless the work is preceded by the survey described below and the species are determined to not be present **BIO-7.** To the extent feasible, construction-related activities within the bridge crossing area, including vegetation removal, shall occur outside of the nesting season (February 15 through August 31). If construction during the nesting season cannot be avoided, any required vegetation removal should be the minimal amount necessary for construction and should be completed prior to the nesting season. In the event that vegetation removal is necessary during the nesting season, the work shall be preceded by a pre-construction nest survey conducted by a qualified biologist within two weeks of disturbance. If an active nest of a sensitive bird species is found, a	

					construction buffer shall be established around it in consultation with CDFW staff and shall remain in place until fledging is completed or until it is determined that the nesting effort has failed as determined by the qualified biologist. **BIO-8.** Work within 250 feet of the willow thicket habitats along North Fork Cache Creek should be avoided from February 15 through August 31 in order to avoid the potential for disrupting nesting and breeding for these species, unless the work is preceded by the survey described below and the species is determined to not be present. **BIO-9.** Any work requiring construction or vegetation clearing within 250 feet of the red and narrow-leaved willow thicket communities between February 15 and August 31 of any year should be preceded by pre-construction surveys pursuant to CDFW policy. In the event that this species is determined to be nesting within 250 feet of the proposed construction activities, construction should be delayed within 250 feet of the nest until after August 31, or until fledging is completed as determined by a qualified biologist. The construction buffer may be reduced depending on presence of screening vegetation or topography based on the recommendation of a qualified biologist **BIO-10.** Disturbance in and adjacent to the creek, within 100 feet of the bridge crossing area should be avoided between December 1 and April 30 to avoid the potential for disrupting nesting and breeding, unless the work is preceded by a survey. If work requiring construction or vegetation clearing at the bridge site between these dates is performed, it should be preceded by pre-construction surveys by a qualified biologist for active otter den sites within the proposed active disturbance area. In the event that an active den site is present within the area of active disturbance, construction should be delayed within 50 feet of the nest until young are independent as determined by a qualified biologist. **BIO-11.** Removal of the bridge or any trees containing hollows or peeling bark within the BSA should be completed between September 15 and October 15, or between February 15 and April 1, in order to avoid disrupting the breeding season or disturbance of hibernating bats unless the surveys and mitigation described below are implemented. **BIO-12.** If work is proposed within woodland habitat (outside of the dates listed above), all trees within the proposed area of work that are suitable for use by bats shall be surveyed for signs of bats no earlier than fourteen days prior to tree removal or other habitat disturbance. Suitable trees include those with hollows and/or shedding	

					bark. If pallid bats, or other bats with sensitive regulatory status, are discovered during the surveys, a buffer of 50 feet should be established depending on recommendations of the surveying biologist. Removal of these roost trees shall be restricted to between September 15 and October 15, when young of the year are capable of flying, or between February 15 and April 1 to avoid hibernating bats and prior to formation of maternity sites **Less than Significant with Mitigation Incorporated**	
b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?		X			Please see Section IV (a) BIO-1 through BIO-7, and Section IV (e). **Less than Significant with Mitigation Incorporated**	27., 38.
c) Have a substantial adverse effect on state or federally protected wetlands (including, not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?		X			An Aquatic Resources Delineation Report was completed by Drake Haglan and Associates in January 2020. The purpose of this investigation was to describe and delineate all waters of the U.S. within the study area that may be subject to Section 404 of the Clean Water Act. The report concluded that A total of 0.96 acres of potentially jurisdictional features occur within the 4.39-acre study area consisting of three wetlands and two other waters of the U.S. This report documents the wetland boundary delineation and best professional judgment of investigators. All conclusions presented should be considered preliminary and subject to change pending official review and verification in writing by the Corps. To minimize impacts to wetlands, the following mitigation measure shall be implemented at the site. **BIO-13**. The construction contractor would be required to avoid and minimize unnecessary impacts on wetlands during construction. Wetlands in the vicinity of construction zones would be marked with construction fencing to ensure vehicles do not inadvertently access them. Best management practices for erosion control would be used to ensure sediment from construction does not enter wetlands or other waters. **Less than Significant with Mitigation Incorporated**	27.
d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established		X			Riverine habitats are distinguished by intermittent or continually running water, and occur in association with a variety of terrestrial habitats. Within the study area, North Fork Cache Creek comprises the riverine habitat. Riverine habitat provides water and a migration corridor for a variety of amphibians, reptiles, and fish species. North	19., 27.

native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?					Fork Cache Creek had approximately 6 inches to 2 feet of flowing water during the delineation field work in May 2019. The banks are steep, and the western bank at the bridge is lined with concrete slope protection. The bed of North Fork Cache Creek is coarse gravel with fine sand and silt as well as small to large cobbles and angular rocks. North Fork Cache Creek is primarily devoid of aquatic vegetation but the edges of the channel are lined with emergent vegetation such as cattails, narrow-leafed willow (*Salix exigua)*, and red willow (*Salix laevigata*) (Drake Haglan and Associates, 2020). Section IV (a) BIO-1 through BIO-7 would reduce impacts to migratory wildlife. **Less Than Significant with Mitigation Incorporated**	
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?			X		Removal of oaks would have to comply with Lake County's Resolution No. 95-211 (Oak Woodland Management Policy). Zoning Article 34, identifies a scenic corridor district that may include significant stands of trees. The "WW" Waterway zoning district is established to protect riparian resources 30' from perennial and 20' from intermittent streams (or the boundary of riparian vegetation). According to zoning Article 37, clearing or removal of any trees greater than 4" in diameter at 3' off the ground requires a permit. Performance standards are established for erosion control (zoning Article 41.6) that include preservation of natural features including trees and groves of trees whenever possible. Landscaping standards (zoning Article 41.9) require landscaping plans that must show locations of existing trees including riparian vegetation and large oaks. **Less than Significant Impact**	17.
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?				X	Lake County does not have a Habitat Conservation Plan or Natural Community Conservation Plan. **No Impact**	
V. CULTURAL RESOURCES *Would the project:*						
a) Cause a substantial adverse change in the significance of a historical resource pursuant to §15064.5?			X		An Archeological Survey Report (ASR) was completed by ALTA Archaeological Consulting on July 2016 for the proposed project [Chalk Mountain Road Bridge over North Fork Cache Creek (Bridge 14C-0048)]. The survey was conducted in accordance with the State of California CEQA Guidelines, according to the California Department of Transportation (Caltrans) District 1 Office of Local Assistance. Caltrans has assumed the role of lead	1.

					Federal agency for Section 106 National Historic Preservation Act (NHPA) compliance for this undertaking. The results of the archaeological survey, archival research, and tribal outreach are provided in this ASR and in the associated Historic Property Survey Report (HPSR). A records search was conducted on April 5, 2016 by Alex DeGeorgey of ALTA at the Northwest Information Center (NWIC) of the California Historical Resources Information System, which is housed at Sonoma State University (NWIC No. 15-1436). The NWIC, an affiliate of the State of California Office of Historic Preservation, is the official state repository of archaeological and historical records and reports for an 18-county area that includes Lake County. Additional research was conducted using the files and literature available in the library of Alta Archaeological Consulting. The records search included a review of all sites records and study reports on file within a one-half mile radius of the study area. The NAHC was contacted via email on March 3, 2016, to request a review of the Sacred Lands file for information on Native American cultural resources in the study area and to request a list of Native American contacts in this area. On April 7, 2016, phone calls to both tribal representatives to initiate consultation was done. On April 5, 2016, ALTA staff member Alex DeGeorgey surveyed the project area for cultural resources. Field methods consisted of an on-foot survey conducted of the project area with transect spacing no greater than 10 meter throughout the study area and surroundings. A total of 9.2 acres of land were surveyed. Areas surrounding the APE on the west side of North Fork Cache Creek were included to ensure that the areas was sufficiently surveyed for cultural resources. Project area maps and aerial photos were used to identify the project APE. Ground surface visibility was poor (about 5%) due to low grasses, leaf litter, the presence of roads and fill material within the project area. A long handled hoe was used to periodically scrape the ground surface and inspect sediments for evidence of cultural materials. Road cuts, the stream bank, disturbed areas from off highway vehicles, and rodent burrows were targeted for inspection. Digital photos were taken of the project area and surroundings. According to the ASR completed April 11, 2017, and the HPSR completed by Caltrans on May 2, 2017, a finding of no historic properties affected was determined. **Less than Significant Impact**	
b) Cause a substantial adverse change in the significance of an		X			California Government Code Sections 6245 and 6254.10, and the National Historic Preservation Act of 1966, Section 304 has certain confidential requirements for	1.

archeological resource pursuant to §15064.5?					cultural resources. The following mitigation measures will be incorporated into the project. **CUL-1**. All earthmoving activity within and around the immediate discovery area shall be halted until an archaeologist who meets state and federal qualifications can assess the nature and significance of the find. **CUL-2**. If human remains are discovered, contact the County Coroner. If the remains are thought to be Native American, the coroner will notify the Native American Heritage Commission, which will then notify the Most Likely Descendant (MLD). At that time, the District 1 Environmental Branch Chief or the District 1 Native American Coordinator will be contacted so that he/she may work with the MLD on the respectful treatment and disposition of the remains. **CUL-3**. A Tribal Cultural Resource Monitor shall be present at the site during excavation activities under the conditions agreed upon by the County and Tribal government. **Less than Significant with Mitigation Incorporated**	
c) Disturb any human remains, including those interred outside of formal cemeteries?		X			See Section V. b) and mitigation measure **CUL-1** and **CUL-2**. **Less than Significant with Mitigation Incorporated**	1.
VI. ENERGY *Would the project:*						
a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?			X		Construction activities would result in short-term consumption of fossil fuels in construction vehicles, worker commuter vehicles, and construction equipment. California regulation (13 California Code of Regulations, Section 2449[d][3], 2485) will limit idling of diesel-powered equipment. Due to the remoteness of the site, contractors would need to conserve on fuel. The project would apply Caltrans's Construction Manual to prevent waste. **Less than Significant Impact.**	25.
b) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?			X		Please see Section VI. a). **Less than Significant Impact.**	25.
VII. GEOLOGY AND SOILS *Would the project:*						
a) Directly or indirectly cause potential substantial adverse effects, including the			X		Pursuant to the Alquist-Priolo Earthquake Fault Zoning Act of 1972, the State is required to delineate regulatory "Zones of Required Investigation". There are certain development requirements for projects in these zones. The	6., 7., 10., 11., 37., 42., 44.

risk of loss, injury, or death involving: 3) 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. 4) Strong seismic ground shaking? 5) Seismic-related ground failure, including liquefaction? 6) Landslides?					"Alquist-Priolo Earthquake Fault Zones prevent buildings for human occupancy from being constructed upon active faults" (California Department of Conservation, 2019a). According to the State's "Earthquake Zones of Required Investigation" mapping database, none of the parcels where the proposed project is located are within an Earthquake Fault Zone, none of the parcels have been evaluated by the California Geological Survey for liquefaction or seismic landside hazards (California Department of Conservation, 2019b). California Geological Survey Map Sheet 48 (revised 2016)shows potential seismic shaking based on National Seismic Hazard Map calculations plus amplification of seismic shaking due to the near surface soils. The proposed project site is located in a region threat is at risk of increasing intensity for earthquake shaking potential (State of California, Resources Agency, Department of Conservation, 2016). The project site is located on flat ground just west of Chalk Mountain. Bartlett Springs fault zone is located on Chalk Mountain approximately 1,670 feet to the east of the site. Although there are reports included in the California Landslide Inventory of debris slide slope to the west of the project site, as of August 23, 2022, there are no reports to the east where Chalk Mountain is located (California Department of Conservation, 2019a and 2019b). As required by the State, the County of Lake has building requirements that will have to be incorporated into construction of the bridge. **Less than Significant Impact**	
b) Result in substantial soil erosion or the loss of topsoil?			X		Drake Haglan and Associates completed a Water Quality Technical Memorandum for the proposed project in 2017. The document concluded that In order to protect the water quality of North Fork Cache Creek from construction-related impacts, the following agency coordination and regulatory permits are anticipated for the proposed project. All Best Management Practices (BMP's) and other avoidance/minimization measures will be prepared in consultation with the project engineer, County of Lake, Central Valley Regional Water Quality Control Board (CVRWQCB), and other appropriate agencies (Drake Haglan and Associates, 2017b): 1. The proposed project would require an NPDES General Construction Permit for Discharges of storm water associated with construction activities (Construction General Permit (Order No. 2009-0009-DWQ [as amended by Order No. 2010-0014-DWQ and 2012-006-DWQ]). A Storm water	24.

					Pollution Prevention Plan (SWPPP) would also be developed and implemented as part of the Construction General Permit. In addition, the following NPDES permits may also be required: • State Water Resources Control Board Water Quality Order No. 2003-003-DWQ General Waste Discharge Requirements for Discharges to Land with a Low Threat to Water Quality • CVRWQCB Waiver of Reports of Waste Discharge within the Central Valley Region (Resolution R5-2013-0145). 2. U.S. Army Corps of Engineers – Clean Water Act, Section 404, Nationwide Permit #14 (Linear Transportation Projects). 3. California Department of Fish and Wildlife – California Endangered Species Act Section 1600-1602 Streambed Alteration Agreement. 4. Regional Water Quality Control Board - Clean Water Act, Section 401 Water Quality Certification. Best Management Practices to prevent soil erosion would be addressed with these requirement. **Less Than Significant Impact**	
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-site or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?			X		See Section VII a) for information on landslides. The project site is not included on the United States Geological Survey' map of Areas of Land Subsidence in California (United States Geological Survey, 2022). **Less Than Significant Impact**	6., 10., 11., 42., 43., 44.
d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?			X		According to the Aquatic Resources Delineation Report completed by Drake Haglan and Associates on January 2020 for the project, there are four different soil types at the project site, which are listed next. None of the soil types are classed as expansive: • 106: Bally – Phipps gravelly loams, 2 to 8 percent slopes, is not listed as hydric by the Natural Resources Conservation Service (NRCS) nor are any of the minor components considered hydric (NRCS, 2019b). The map unit composition is 45 percent Bally and similar soils, 35 percent Phipps and similar soils, and 20 percent minor components. The Bally series consists of well drained gravelly loam and very gravelly sandy clay formed from alluvium. The Phipps series consists of well drained gravelly loam, gravelly clay, gravelly clay loam, and very gravelly clay loam formed by from alluvium. Mapped areas	27., 37.

					are on hillslopes for both of the main components. Included in this map unit are minor components of Talmage and unnamed soils. • 197: Phipps complex, 30 to 50 percent slopes, is not listed as hydric by the NRCS nor are any of the minor components considered hydric (NRCS, 2019b). The map unit composition is 65 percent Phipps and similar soils and 35 percent minor components. The Phipps series consists of well drained loam, gravelly clay, gravelly clay loam, and very gravelly clay loam formed by from alluvium. Mapped areas are on hillslopes. Included in this map unit are minor components of Forbesville, steeper slopes, Bally, and unnamed soils. • 248: Xerofluvents, very gravelly, is listed as hydric by the NRCS and includes hydric minor components (NRCS 2019b). The map unit composition is 65 percent Xerofluvents and similar soils and 35 percent minor components. The Xerofluvents series is excessively drained, occasionally flooded, and formed from alluvium. Mapped areas are located within floodplains. Included in this map unit are minor components of Kelsey, Still, Talmage, Xerofluvents, and unnamed soils. • 249: Xerofluvents- Riverwash complex, is listed as hydric by the NRCS and includes hydric minor components (NRCS, 2019b). The map unit composition is 55 percent Xerofluvents and similar soils, 30 percent Riverwash, and 15 percent minor components. The Xerofluvents series is listed as excessively drained, frequently flooded, and formed from alluvium. The Riverwash series is listed as excessively drained, frequently flooded, and formed from sandy and gravelly alluvium parent material. Mapped areas are located within floodplains. Included in this map unit are minor components of Kelsey, Maywoodvariant, Talmage, and unnamed soils. **Less than Significant Impact**	
e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of waste water?			X		See Section VII d). **Less Than Significant Impact**	27.
f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?		X			See Section V b). **Less than Significant with Mitigation Incorporated**	

VIII. GREENHOUSE GAS EMISSIONS *Would the project:*						
a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?			X		The LCAQMD does not currently have any adopted greenhouse gas emissions thresholds for projects undergoing a CEQA analysis, but recommends the Bay Area Air Quality Management District (BAAQMDs) thresholds of significance contained within the district's CEQA Air Quality Guidelines (Lake County Air Quality Management District, 2022). However, the BAAQMD doesn't currently have thresholds for greenhouse gas emissions for construction projects. According to the BAAQMD, Greenhouse gas emissions from construction represent a very small portion of a project's lifetime greenhouse gas emissions (Bay Area Air Quality Management District, 2022). **Less than Significant Impact**	2., 33.
b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?			X		This project will not conflict with any adopted plans or policies for the reduction of greenhouse gas emissions**.** **Less than Significant Impact**	2.
VX: HAZARDS & HAZARDOUS MATERIALS *Would the project:*						
a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?		X			This project includes the replacement of the bridge. "Routine" activities normally associated with long-term operations would not occur after bridge construction. ACC Environmental Consultants, Inc. performed a limited asbestos and lead survey of Chalk Mountain Road Bridge (14C 0048) located in Clearlake Oaks, California on August 1, 2016. The survey of the sites were performed to identify suspect asbestos and lead containing building materials that may be impacted during the planned renovation projects. Based on the sample results, suspect materials that will reportedly be disturbed during planned project activities do not contain asbestos. Results of two lead samples collected at Chalk Mountain Road Bridge (14C 0048), one (1) was reported to contain lead above 0.5%, 5,000 parts per million (weight by weight), or 1.0 mg/cm2 which is the definition for lead based paint by the Environmental Protection Agency (EPA) and the California Department of Public Health (Drake Haglan & Associates, 2017a). The following avoidance measures that are applied to the project will be applied as mitigation measures. **HAZ-1.** Removal, disposal, storage and transportation of the structure containing lead-based paint shall be performed in compliance with federal and state regulations for hazardous waste.	23.

					HAZ-2. Building materials associated with paint on structures, and paint on utilities shall be abated by a California licensed abatement contractor and disposed of as a hazardous waste. **HAZ-3.** A Lead Compliance Plan shall be prepared by the contractor for the disposal of lead-based paint. A California state licensed lead contractor shall be required to perform all work that will disturb any lead-based paint as a result of planned or unplanned renovations in the project area. **HAZ-4.** Removal of treated timber associated with the existing bridge will be removed and disposed at a Regional Water Quality Control Board certified treated wood waste (TWW) landfill. **HAZ-5.** The contractor should prepare a Health and Safety Plan (HASP) that describes appropriate procedures to follow in the event that any contaminated soil or groundwater is encountered during construction activities. Any unknown substances should be tested, handled and disposed of in accordance with appropriate federal, state and local regulations. **Less than Significant with Mitigation Incorporated**	
b) Create a significant hazard to the public or the environment through reasonable foreseeable upset and accident conditions involving the release of hazardous materials into the environment?		X			See Section IX a). **Less than Significant with Mitigation Incorporated**	23.
c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?				X	East Lake School in Clearlake Oaks is the closest school, but it is over approximately 10 miles away (Google Map, 2022). **No Impact**	30.
d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?				X	An EnviroStor search was completed for the project site, and sites within a 0.5 mile radius that resulted in no results (Department of Toxic Substances Control, 2022). **No Impact**	

e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?			X		According to the Lake County Airport Land Use Compatibility Plan, there are three airports that include the Lampson Field, Pearce Field, and the proposed Quackenbush Mountain Airport. None of these airports are within 2 miles of the project site (Hodges & Shutt, 1992). Additional public and private airports include: Redbud Community Hospital Heliport - CL53, Ferndale Resort Seaplane Base - CN20, Konocti - Clear Lake Seaplane Base - 5CA9, Sutter Lakeside Hospital Heliport - CL69, and the Gravelly Valley Airport - 1Q5 which is the closest airport located in Upper Lake, but still is several miles away. **Less than Significant Impact**	31.
f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?			X		The project site is located in a remote rural area of northeast Lake County, California, approximately 5.4 miles northwest of State Route 20 (SR20). Chalk Mountain Road is accessed by Wolf Creek Road, which is accessed from Spring Valley Road, which is accessed by New Long Valley Road. Temporary construction easements will be required from the five properties adjacent to the bridge site. Construction of the proposed project is anticipated to take between 4 to 8months to complete, pending the scope of the final design and construction plans. The Short-Team Traffic Impacts on page 2 of 4 of the Traffic Technical Memorandum offers two alternatives. Alternative 1 would allow the existing bridge to remain intact during construction, while Alternative 2 would leave one lane of the existing bridge open during construction (Drake Haglan and Associates, 2017c). Since emergency responders would be able to get through, and construction activities would be temporary, impacts would be less than significant **Less Than Significant Impact**	25.
g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?			X		The site is mapped as being in a Very High Fire Severity Zone (CAL FIRE, 2022). Due to the remoteness of the site, if a wildfire was to occur it could take first responders a significate amount of time to arrive. Therefore, the proposed project should have measures in place to prevent accidental construction fires, or non-construction related wildfires. The project will be required to comply with Lake County's Emergency Operations Plan (2020 Updated EOP), State requirements for construction workers including Caltrans's Construction Manual, as well as with Cal/OSHA Pocket Guide for the Construction Industry 2022 (County of Lake, 2020; California Department of Transportation, 20; Cal/OSHA, 2022). **Less than Significant Impact**	3., 4., 13., 18.

X. HYDROLOGY AND WATER QUALITY *Would the project:*						
a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?		X			A Water Quality Technical Memorandum was completed by Drake Haglan and Associates in January 2017. According to that report, demolition of the existing bridge will be performed in accordance with the Caltrans Standard Specifications modified to meet environmental permit requirements. The following specifications will apply: 13-4.03D(3) Concrete Waste: Prevent the discharge of concrete and asphalt concrete waste into storm drain systems and receiving waters. Collect concrete waste, including grout, dust and debris from demolition, saw cutting, coring, grinding, or grooving, simultaneously with the waste-producing activity. 13-4.03E(6) Structure Removal: Over or Adjacent to Water Do not allow demolished material to enter storm drain systems and receiving waters. Use authorized covers and platforms to collect debris. Use attachments on equipment to catch debris during small demolition activities. Empty debris-catching devices daily and handle debris under section 13-4.03D. All concrete and other debris resulting from the bridge demolition will be removed from the project site and disposed of by the contractor. The construction contractor will prepare a bridge demolition plan. As mentioned in the project description, this project will be required to apply for both federal and State permits. In addition, the following avoidance measures will be applied to the project: **WQ-1**. All temporarily disturbed areas will be returned to pre-project conditions upon completion of construction. These areas will be properly protected from washout and erosion using appropriate erosion control devices including coir netting, hydroseeding, and revegetation. In sloped areas, additional erosion control measures would be applied including erosion control blankets and fiber rolls. If woody species (i.e., trees and large shrubs) are removed, these areas would be replanted with comparable native vegetation. **WQ-2.** Develop and Implement Dewatering Plan. **WQ-3**. Develop Storm water Pollution Prevention Plan (SWPP) and Implement Water Quality Best Management Practices. The SWPPP must include a waste management section that provides procedural and structural BMPs for collecting, handling, storing, and disposing of wastes generated by the construction project to prevent the	24.

					accidental release of pollutants during construction. The SWPPP also includes measures to report, contain, and mitigate for any accidental spills during construction. Any spills or leaks from construction equipment (i.e., fuel, oil, hydraulic fluid, and grease) shall be cleaned up in accordance with applicable local, state, and/or federal regulations. **WQ-4.** The Contractor will install silt fencing, fiber rolls, or other equivalent erosion and sediment control measures between the designated work area and North Fork Cache Creek, as necessary, to ensure that construction debris and sediment does not inadvertently enter the waterway. Storage and stockpiling of earth materials near North Fork Cache Creek will be avoided if possible. To ensure that wildlife are not trapped, tightly woven fiber netting (no monofilament netting) or similar material shall be used for erosion control or other purposes within the project work limits. Coconut coir matting and burlap-contained fiber rolls are an example of acceptable erosion control materials. **WQ-5.** Immediately after bridge construction is complete, all exposed soil shall be stabilized. Soil stabilization may include, but is not limited to, seeding with a native grass seed mix, planting native plants and placement of rock. Hydraulic mulch should be used in conjunction with a native seed mix applied to the disturbed soil. Disturbed soil areas and areas where existing pavement is removed would be reseeded using a California native plant seed blend. An erosion control seed mix (hydroseed) would be applied in disturbed soil area and on slopes flatter than 1:1. Erosion control (e.g., Bonded Fiber Matrix with a native plant seed blend) would be applied on all disturbed or cut slopes steeper than 1:1. **WQ-6.** Sediment cleanup will be implemented anywhere sediment is tracked from the Project area and staging area onto public or private paved roads, typically at points of ingress/egress. For the Project, street sweeping may be used along Chalk Mountain Road. **WQ-7.** If dewatering is required during pile construction, activities will need to account for changes in pH associated with concrete contact water. High pH water (pH > 8.5) must be managed to prevent any discharges to receiving waters. Discharges of high pH water to land (upland disposal) must be approved by the RWQCB prior to disposal. **WQ-8.** To avoid waste products from pile driving operations, pile shells for construction of cast-in-steel-shell or cast-in-drilled-hole piles will be used in accordance to Caltrans Standard Specifications.	

					WQ-9. Use, storage, and disposal of materials and equipment on barges, boats, temporary construction pads, over or adjacent to a watercourse will be performed according to Caltrans Standard Specifications. **WQ-10**. During bridge demolition and removal, best management practices will be used to protect North Fork Cache Creek from debris and waste associated with the demolition. These measures include using attachments on construction equipment, platforms, or other means to catch debris. **Less than Significant with Mitigation Incorporated**	
b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?		X			According to the Quality Technical Memorandum, the project site lies within the Clear Lake Cache Formation Groundwater Basin. The Clear Lake Cache Formation Groundwater Basin is east of Clear Lake and shares a boundary with the Burns Valley Groundwater Basin in the southwest. The proposed project would include the use of groundwater during construction activities. However, incorporation of HAZ-5. Will require the contractor to prepare a HASP that describes appropriate procedures to follow in the event that any contaminated soil or groundwater is encountered during construction activities. In addition, BMPs from the SWPPP will be implemented, as appropriate, to retain, treat, and dispose of groundwater from dewatering activities. Additional measures related to groundwater include, but are not limited to: • Temporarily retain pumped groundwater, as appropriate, to reduce turbidity and concentrations of suspended sediments before discharge to surface waterways. • Convey pumped groundwater to a suitable land disposal area capable of percolating flows. • Incorporation of other measures from the California Storm water Quality Association (CASQA) Storm Water Quality Handbook as appropriate (2010). • Groundwater collected during dewatering shall be tested for contamination prior to disposal. Discharges shall comply with CVRWQCB requirements. **Less Than Significant with Mitigation Incorporated**	23., 24.
c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the		X			See Section X a) and b). **Less Than Significant with Mitigation Incorporated**	23., 24., 45.

course of a stream or river or through the addition of impervious surfaces, in a manner that would: i) result in substantial erosion or siltation on-site or off-site; ii) substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or offsite; iii) create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or iv) impede or redirect flood flows?						
d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?		X			The project is a bridge replacement over the North Fork Cache Creek. With WQ-1 through WQ-9, plus HAZ-5 incorporated into the project, impacts related to pollutants would be reduced. **Less Than Significant with Mitigation Incorporated**	
e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?		X			The Lake County Watershed Protection District is an authorized groundwater management agency as defined by the California Water Code (CWC) §10753 (a) and (b). The Groundwater Management Plan (GMP) supports the long-term maintenance of high quality groundwater resources within the 13 groundwater basins of the county. Groundwater Management Plan Objectives include the following: • Improve the understanding of groundwater hydrology and quality in Lake County; • Maintain a sustainable, high quality water supply for agricultural, environmental, and • urban uses; • Minimize the long-term drawdown of groundwater levels; • Protect groundwater quality; • Minimize changes to surface water flows and quality that directly affect groundwater • levels or quality; • Minimize the effect of groundwater pumping on surface water flows and quality; • Facilitate groundwater replenishment and cooperative management projects; and	16., 24.

					• Prevent inelastic land surface subsidence from occurring as a result of groundwater pumping. According to the Water Quality Technical Memorandum completed by Caltrans, the project would not affect groundwater with mitigation incorporated. See Section X a) and d). **Less Than Significant with Mitigation Incorporated**	
XI. LAND USE AND PLANNING *Would the project:*						
a) Physically divide an established community?			X		It is anticipated that construction will occur when the creek bed is dry or near dry. All in-channel work will be limited to the dry season from July to October. Temporary construction easements will be required from the five properties adjacent to the bridge site. Permanent right-of-way takes are anticipated from the two adjacent properties south of the bridge. Detailed right-of-way takes have not been determined at this point. A community impact assessment was completed by Drake Haglan & Associates. The report concluded that "Although right-of-way take may occur from the two adjacent properties south of the bridge, the proposed project would not result in any residential or commercial relocation" (Drake Haglan & Associates, 2016). **Less than Significant Impact**	21., 22.
b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?			X		This project will have to be in compliance with the Lake County General Plan and Lake County Municipal Code, as well as State and federal regulations. **Less than Significant Impact**	13.
XII. MINERAL RESOURCES *Would the project:*						
a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?				X	The project site is not identified by the Lake County Aggregate Resource Management Plan as a mineral resource site (Lake County Planning Department Resource Management Division, 1992). **No Impact**	33., 35
b) Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific				X	Neither the County of Lake's General Plan, nor the Lake County Aggregate Resource Management Plan designates the project site as being a locally important mineral resource recovery site (Lake County Planning Department, Resource Management Division, 1992). **No Impact**	33., 35.

<table>
<tr><td>plan, or other land use plan?</td><td></td><td></td><td></td><td></td><td></td><td></td></tr>
<tr><td colspan="7">XIII. NOISE
Would the project result in:</td></tr>
<tr><td>a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?</td><td></td><td>X</td><td></td><td></td><td>A Noise Technical Memorandum was prepared by Drake Haglan and Associates on June 24, 2016. The Memorandum states that noise at the construction site will be intermittent and its intensity will vary. The degree of construction noise impacts may vary for different areas of the project study area and also vary depending on the construction activities. Roadway and/or bridge construction is accomplished in several different phases. General construction phases for typical roadway/highway projects and their estimated overall noise levels are summarized in Table 2 below.

Table 2. Construction Phases and Noise Levels
<table><tr><th>Construction Activity/Phase</th><th>Leq (dBA) at 50 Feet from Roadway Centerline</th></tr><tr><td>Ground Clearing</td><td>84 (dBA)</td></tr><tr><td>Excavation</td><td>88/78 (dBA)</td></tr><tr><td>Foundation</td><td>88 (dBA)</td></tr><tr><td>Erection</td><td>79/78 (dBA)</td></tr><tr><td>Finishing</td><td>84 (dBA)</td></tr></table>Source: United States Environmental Protection Agency, 1971.

Table 3 summarizes noise levels produced by construction equipment that is commonly used on bridge replacement projects and is representative of the equipment necessary for proposed project construction. Construction equipment is expected to generate noise levels ranging from 80 to 90 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.

Table 3. Typical Construction Equipment Noise
<table><tr><th>Equipment</th><th>Maximum Noise Level (dBA at 50 feet)</th></tr><tr><td>Scrapers</td><td>89 dB</td></tr><tr><td>Bulldozers</td><td>85 dB</td></tr><tr><td>Heavy Trucks</td><td>88 dB</td></tr><tr><td>Backhoe</td><td>80 dB</td></tr><tr><td>Pneumatic Tools</td><td>85 dB</td></tr><tr><td>Concrete Pump</td><td>82 dB</td></tr></table>Source: Federal Transit Administration 1995.

Some land uses are considered more sensitive to ambient noise levels than others because of the amount of noise exposure (in terms of both exposure duration and insulation from noise) and the types of activities typically involved. Residences, hotels, schools, rest homes, and</td><td>22.</td></tr>
</table>

					hospitals are generally more sensitive to noise than commercial and industrial land uses. Land use within and adjacent to the project corridor is predominately rural and open space. There is only one sensitive receptor (Spring Valley Community Center) within 500 ft. from the project that could be affected by construction noise. During construction of the proposed project, noise from construction activities may intermittently dominate the noise environment in the immediate area of construction. The project would have to comply with noise requirements of the Lake County Municipal Code. To further reduce noise impacts from construction activities, the following will be implemented. **NOS-1**. Construction operations are limited to daylight hours only (Monday to Friday, 7:00 AM to 7:00 PM). **NOS-2**. Use equipment with regulatory approved or meter muffling devices and ensure that all equipment items have the manufacturers' recommended noise abatement measures, such as mufflers, engine enclosures, and engine vibration isolators intact and operational. All construction equipment should be inspected at periodic intervals to ensure proper maintenance and presence of noise control devices (e.g., mufflers and shrouding, etc.). **NOS-3**. Utilize construction methods or equipment that shall provide the lowest level of noise and ground vibration impact such as drilled pile installation (i.e. use of CIDH piles) rather than pile driving. **NOS-4**. Turn off idling equipment. **NOS-5**. Provide information to the Community Center regarding the proposed Project and construction schedule. **Less Than Significant with Mitigation Incorporated**	
b) Generation of excessive groundborne vibration or groundborne noise levels?		X			See Section XIII a). **Less Than Significant with Mitigation Incorporated**	
XIV. POPULATION AND HOUSING *Would the project:*						
a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses)			X		This project includes replacing an existing bridge to improve public safety as determined by Caltrans. There is no other development planned. This is a remote area with very few single-family residences. Due to the remoteness of the site, the population in this area of Lake County is not expected to increase much.	26.

or indirectly (for example, through extension of roads or other infrastructure)?					**Less Than Significant Impact**	
b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?			X		See XIV. Section a). **Less Than Significant Impact**	
XV. PUBLIC SERVICES *Would the project:*						
a) Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services: - Fire Protection? - Police Protection? - Schools? - Parks? - Other Public Facilities?			X		A Traffic Technical Memorandum was completed for the project concluded that minor short-term traffic-related impacts are anticipated with the proposed project. Short-term impacts to traffic may occur from slight delays during construction times due to equipment and crews working on and around the bridge; however, since the Average Daily Traffic (ADT) on Chalk Mountain Road is only 50 vehicles, traffic impacts are expected to be minimal. The project is not anticipated to create any long term impacts to traffic circulation in the area, as the proposed project will not increase roadway capacity or change traffic patterns. Providing safer vehicular, bicycle and pedestrian access through the replacement of the deficient bridge will offset temporary impacts related to construction activity (Drake Haglan and Associates, 2017c). According to the Section 4(f) De Minimis Memorandum completed for the project, Section 6009(a) of the Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users (SAFETEA-LU) amended Section 4(f) legislation at 23 United States Code (USC) 138 and 49 USC 303 to simplify the processing and approval of projects that have only *de minimis* impacts on lands protected by Section 4(f). This revision provides that once the U.S. Department of Transportation determines that a transportation use of Section 4(f) property, after consideration of any impact avoidance, minimization, and mitigation or enhancement measures, results in a *de minimis* impact on that property, an analysis of avoidance alternatives is not required and the Section 4(f) evaluation process is complete. The Federal Highway Administration's final rule on Section 4(f) *de minimis* findings is codified in 23 Code of Federal Regulations (CFR) 774.3 and CFR 774.17. Helen Mitcham Park/Spring Valley Campground is located on both sides of North Fork Cache Creek near the confluence with Wolf Creek. The park and campground are county owned land that is managed by the Spring Valley Lakes Property Owners Association. Access to the	25., 26.

					campground is limited to the Spring Valley community property owners and their guests. Non-property owners must contact the Campground Committee for access. Vehicular access to the property is provided at the three gated locations. The portion of the park accessible through Gate 3, along the west edge of the creek is more developed with designated campsites, bathroom and shower facilities, a picnic area, and recreation facilities such as a disc golf course and nature trails for pedestrian and bicyclists. The Helen Mitcham Park/Spring Valley Campground provides approximately 1.5 miles of creek frontage and includes approximately 203 acres. The existing bridge is narrow for pedestrian, bicycle, or equestrian access to the portion of the park and campground east of North Fork Cache Creek due to the absence of sidewalks or bicycle lanes. Currently the only way for pedestrians, bicyclists, and equestrians to access the properties east of the bridge is to utilize the single, two-directional vehicle lane on the bridge. Existing access for all user types (vehicular, pedestrian, and equestrian) to the Helen Mitcham Park/Spring Valley Campground would remain open during and after construction of the proposed Project. Vehicular and pedestrian access to the park and campground east of North Fork Cache Creek would be maintained throughout the Project through Gate 2, for both alternatives. Staging of construction equipment would occur on the western portion of the park, primarily within the vacant area north of Wolf Creek and east of the Spring Valley Community Center. The temporary staging area consists of a total of 0.515 acres. The Project would require permanent conversion of approximately 0.745 acres of property. Access to the park through Gate 1 at the southeast corner of the existing bridge would be temporarily restricted during construction due to its proximity to the existing bridge and proposed construction. Access Gate 1 would be relocated approximately 100 feet southeast of its existing location following construction of the Project to conform to the new roadway and to improve safety of the access. Following the De Minimis Impact Findings from Section 4(f), measures to avoid and minimize impact to the Section 4(f) property (Helen Mitcham Park and Spring Valley Campground) will be applied here as mitigation measures (Drake Haglan and Associates, 2018). **PS-1**. During construction, maintain access to the public day-use portion of Helen Mitcham Park through Gate 2 throughout Project construction. **PS-2**. Following construction, restore areas of construction disturbance, such as staging and access areas, to preconstruction conditions.	

					Less than Significant with Mitigation Incorporated	
XVI. RECREATION *Would the project:*						
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?				X	See Section XIV a). **Less than Significant with Mitigation Incorporated**	12., 27.
b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?				X	See Section XIV a). **Less than Significant with Mitigation Incorporated**	12., 27.
XVII. TRANSPORTATION *Would the project:*						
a) Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?			X		A Traffic Technical Memorandum was completed for the proposed project by Drake Haglan and Associates on March 28, 2017. According to the memorandum, the replacement bridge will be wider to comply with current AASHTO standards for local rural roads, which will include at a minimum two 9-foot travel lanes and two 2-foot shoulders, plus crash-tested vehicular barriers. It is anticipated that deep foundations will be needed to support the replacement bridge. The proposed project may also potentially include a Class 1 multi use path on the replacement bridge. The proposed project is listed in the Final 2022 Lake County Regional Transportation Plan/ Active Transportation Plan on page 53. Chalk Mountain Road is not included on the Lake Transit Authority Bus Passenger list (Lake Transit Authority, 2019). Nor is the road included on the 2011 Regional Transportation Bikeway Map #18 which covers the Shoreline Communities Planning Area, Lake County, California (Lake County/City Area Planning Council (APC), 2011). The road is not included in the Lake County Pedestrian Facility Needs Study either (Lake Area Planning Council, 2019). The project is also in agreement with the Lake County General Plan Chapter 6, Transportation & Circulation, and Chapter 5, Public facilities & Service, as well as with the Lake County Municipal Code. **Less than Significant Impact**	25., 28., 29., 32., 34., 36.

b) Would the project conflict or be inconsistent with CEQA Guidelines section 15064.3, subdivision (b)?			X		According to CEQA Guidelines Section 15064.3, subdivision (b) specifies the criteria for determining the significance of transportation impacts. As stated in subdivision (b), Vehicle Miles Traveled (VMT) is "generally" the best measurement of transportation impacts, thus allowing agencies room to tailor their analyses to include other measures if appropriate. The draft section describes factors that might indicate whether a project's VMT is less than significant or not, and gives examples of projects that might have less-than-significant impacts with respect to VMT, such as projects that would result in decreased VMT. Subdivision (b) recognizes that not all transportation projects will induce vehicle travel, such as projects improving transit operations, and thus would not result in a significant transportation impact. In addition to a project's impact on VMT, "a lead agency may also consider localized effects of project-related transportation on safety". Finally, subdivision (b) states that a lead agency's evaluation of a project's VMT "is subject to a rule of reason," but also states that "a lead agency generally should not confine its evaluation to its own political boundaries". Short-term impacts to traffic may occur from slight delays during construction times due to equipment and crews working on and around the bridge; however, since the ADT on Chalk Mountain Road is only 50 vehicles, traffic impacts are expected to be minimal. The project is not anticipated to create any long term impacts to traffic circulation in the area, as the proposed project will not increase roadway capacity or change traffic patterns. Providing safer vehicular, bicycle and pedestrian access through the replacement of the deficient bridge will offset temporary impacts related to construction activity. Replacement of an existing bridge will not increase roadway capacity and will no induce population growth in the project area. The project would however improve safety for the general public. **Less than significant Impact**	25., 41.
c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?			X		The road would have a slight realignment. However, the project would have to comply with the Lake County Municipal Code and Caltrans Construction Manual. **Less Than Significant Impact**	40., 41.
d) Result in inadequate emergency access?			X		North Fork Cache Creek Bridge is located in a State Responsibility Area, so fire protection services and emergency response services are provided by CAL FIRE. The closest CAL FIRE station is located at 3178 Tamarack Way, Clearlake Oaks, CA 95423. Police	28., 30.

					protection is provided by the Lake County Sheriff's Office, located at 6222 State Hwy 20, Lucerne, CA 95458. The nearest hospital is Redbud Community Hospital, located in the City of Clearlake, approximately 12.3 miles from the project site. Due to the remote location of the project site, in critical emergencies requiring rapid response the emergency response is typically provided by heliport. This will not change during construction, or in the case of a brief closure. If vehicle response is required, emergency vehicles can enter from Wolf Creek Road onto Chalk Mountain Road. **Less than Significant Impact**	
XVIII. TRIBAL CULTURAL RESOURCES *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 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		X			Pursuant to Public Resources Code Section 21080.3.1, the Lake County Community Development Department sent a formal notification on July 7, 2022, to the Yocha Dehe Wintun Nation of California who are traditionally and culturally affiliated with the project area. The California Historical Resources Information System of Sonoma State was also notified and made recommendations that included an assess the site by a qualified professional archaeologist, a field study, and that the lead agency contact the tribes. An Archaeological Survey Report was previously completed in 2017, which provides findings and conclusions. The report includes an investigation of archaeological resources in and around the Area of Potential Effects (APE), a records search, and pedestrian survey and consultation efforts. Consultation with the Tribal government occurred on September 14, 2022, and there was noted concerns from the tribes. As a result of communicating and working with the Tribal government, the County has agreed to a Cultural Resource Monitor being present at the site during excavation. If cultural resources are found during bridge construction, there are clear federal, state, or local regulations which must be followed. Please see Section V. a). The following mitigation measure will be incorporated into the project. **CUL-1**. All earthmoving activity within and around the immediate discovery area shall be halted until an archaeologist who meets state and federal qualifications can assess the nature and significance of the find. **CUL-2**. If human remains are discovered, contact the County Coroner. If the remains are thought to be Native American, the coroner will notify the Native American Heritage Commission, which will then notify the Most Likely Descendant (MLD). At that time, the District 1	

					Environmental Branch Chief or the District 1 Native American Coordinator will be contacted so that he/she may work with the MLD on the respectful treatment and disposition of the remains. **CUL-3**. A Tribal Cultural Resource Monitor shall be present at the site during excavation activities under the conditions agreed upon by the County and Tribal government. **Less than Significant with Mitigation Incorporated**	
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 Resources Code 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.			X		Please see Section XVIII. a). **Less Than Significant with Mitigation Incorporated**	
XIX. UTILITIES AND SERVICE SYSTEMS *Would the project:*						
a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?			X		According to the Initial Site Assessment (ISA) completed by Caltrans, overhead electrical lines and multiple overhead electric utility poles exist at the intersection of Wolf Creek and Chalk Mountain Road, adjacent to the northern edge of the existing bridge and adjacent to the proposed eastern approach. One utility pole will need to be relocated outside the proposed roadway improvements. Due to the roadway profile being raised, the overhead lines located at the eastern approach may potentially be affected as well. The overhead lines in this area will need to be surveyed to determine if the lines need to be raised to maintain acceptable overhead clearances from the roadway improvements. In addition, per OSHA standards, a minimum 10-ft of clearance must be kept between construction vehicles and the overhead electrical lines. The project would have to comply with PG&E's requirements. Relocation of overhead electrical utility would occur during roadway improvements and new bridge construction. Utility demand would remain the same during and after construction. The project would not result	13.

					in the need for new or expanded water, wastewater treatment, or other utility facilities (California Department of Transportation, 2016a). **Less Than Significant Impact**	
b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?				X	The project would not require a water supply connection for bridge construction. **No Impact**	
c) Result in a determination by the wastewater treatment provider, which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?				X	The project only includes replacing an existing bridge. **No Impact**	
d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?			X		Construction waste would be disposed of at the Eastlake Sanitary Landfill. The landfill recently received approval to expand its operations which would extend the lifespan of the landfill by 22 years (SHN Consulting Engineers & Geologists and SCS Engineers, 2020). **Less than Significant Impact**	39.
e) Comply with federal, state, and local management and reduction statutes and regulations related to solid waste?			X		The project would have to comply with Caltrans 2018 Standard Specifications Section 14, Subsection 14-10 Solid Waste Disposal and Recycling (State of California, California State Transportation Agency, Department of Transportation). Please also refer to Section IX. a). **Less than Significant Impact**	40.
XX. WILDFIRE *If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:*						
a) Substantially impair an adopted emergency response plan or emergency evacuation plan?			X		The project would have to comply with the County of Lake, 2020 Emergency Operations Plan with the Wildland Fire Annex, as well as with the Lake County Local Hazard Mitigation Plan Update (February 2018). Please refer to Section XV. a), and Section IX. g). **Less than Significant Impact**	12., 18.
b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and			X		Slopes at the bridge site appear to be less than 1%. There was no wind during the August 2022 site visit.	3., 12., 18.,

thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?					Because the bridge has been deemed to be unsafe by Caltrans, its replacement is not only necessary, but in the long run would result in a safer route for those needing to evacuate. Also, because the site has been classified as being in a Very High Fire Severity Zone, it is important that construction of the bridge follow all local, State, and federal regulations for the construction workers, as well as the public. **Less than Significant Impact**	
c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?			X		The project is not proposing to add or maintain any additional infrastructure beyond what is existing. There will be a slight realignment of the road, but the applicant will have to comply with all local, State, and federal regulations related to wildfires. **Less than Significant Impact**	13.
d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?			X		Please see Section XX. a). **Less than Significant Impact**	12., 18.

XXI. MANDATORY FINDINGS OF SIGNIFICANCE						
a) Does the project have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?		X			A Natural Environment Study was prepared in May of 2018 by Caltrans, which included the results from surveying special status animal and plant species, as well as a Delineation of Waters of the United States at the project site in January 2020 (California Department of Transportation, 2018). The incorporation of mitigation measures BIO-1 through BIO-14 in Section IV. Biological Resources of this study would reduce potential impacts to wildlife animals and plants to a less-than-significant level. A Historic Property Survey Report and Archaeological Survey Report was completed for this site. According to the report, Bartlett Bridge is not eligible for the NRHP (Alta Archaeological Consulting, LLC, 2016). It was also concluded from the records search that no prehistoric or historic-era sites have been recorded or otherwise identified within the APE boundary. **Less than Significant with Mitigation Incorporated**	
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)?		X			Due to the remoteness of the site and no change in the use, plus the short duration of construction, impacts after mitigation is applied would not be cumulatively considerable when viewed in connection with other past, current, and probable future projects. Although two other bridge replacement projects are proposed in the unincorporated Spring Valley, the distance is several miles away. The following environmental factors were considered with mitigation measures incorporated: Air Quality, Biological Resources, Cultural Resources, Hazards & Hazardous Materials, Geology and Soils, Hydrology and Water Quality, Noise, and Public Services. **Less than Significant with Mitigation Incorporated**	
c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?			X		The proposed project would reduce the safety hazards associated the existing bridge crossing over the North Fork Cache Creek, which has been determined to be functionally obsolete by Caltrans. Improved approach geometry would offer user a better site distance. Because the proposed project represents a net decrease in environmental effects that could adversely impact human beings, either directly or indirectly, project impacts to human beings would be less than significant. **Less than Significant Impact**	

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Attachment A: Diagrams of Proposed Bridge

Attachment B: Mitigation Monitoring & Reporting Program (MMRP)

Attachment C: Natural Environmental Study