PROJECT-SPECIFIC ANALYSIS AND PEIR ADDENDUM • MAY 2023

Hoyt-Purdon Fuel Reduction and Prescribed Fire Project









PREPARED FOR American Rivers 120 Union Street Nevada City, CA 95959

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Cover photos: Representative habitat types (from top left: Montane Hardwood, overview of Montane Hardwood–Conifer, Mixed Chaparral, and Douglas Fir) in the project area on 11 May 2021.

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1 INTRODUCTION

The California Vegetation Treatment Program (CalVTP) directs implementation of vegetation treatments within the California Department of Forestry and Fire Protection's (CAL FIRE's) State Responsibility Area (SRA). Vegetation treatments implemented in accordance with the CalVTP serve as one component of the state's range of actions to reduce wildfire risk, reduce fire suppression efforts and costs, and protect natural resources and other assets from wildfire. The Program Environmental Impact Report (PEIR) for the CalVTP (Ascent Environmental 2019) evaluates the potential environmental impacts of implementing qualifying vegetation treatments to reduce the risk of wildfire throughout the SRA. Within the 31 million-acre SRA, approximately 20.3 million acres were identified that may be appropriate for vegetation treatments. This area is called the treatable landscape. The PEIR streamlines California Environmental Quality Act (CEQA) review of subsequent activities that are found to be within the scope of the PEIR. If a proposed vegetation treatment project is covered by the evaluation of environmental effects in the PEIR, State CEQA Guidelines Section 15168(c)(2) allow for its approval based upon a finding that the project is within the scope of the PEIR for its CEQA compliance.

Sierra Nevada Conservancy (SNC), serving as the project proponent/ lead agency, and American Rivers, serving as the implementing entity on behalf of private landowners, proposes to implement the Hoyt-Purdon Fuel Reduction and Prescribed Fire Project (project) to reduce fuel loading and fire risk on 570 acres of privately owned land in Nevada County, California. American Rivers received grants from the SNC and California Department of Fish and Wildlife (CDFW) to assist the private landowners in the South Yuba River watershed with project planning for fuel reduction and prescribed fire. The planning grant agreement between American Rivers and SNC was approved on March 5, 2020. The grant agreement between American Rivers and CDFW was approved on September 22, 2021. Implementation funding from SNC may be awarded in June 2023. Pursuant to the CalVTP, this Project Specific Analysis (PSA) has been prepared to complete CEQA review of the proposed project and document the project's consistency with the PEIR.

1.1 Project Overview

The project is proposed to significantly reduce fuels and reintroduce prescribed fire to reduce wildfire risk and impacts, improve forest health and provide watershed benefits. The project is in the South Yuba River canyon, approximately two miles northwest of Nevada City and four miles north of Grass Valley (Figure 1-1). The area has a history of mining and logging and is dominated primarily by native woody vegetation. Current land use is a mix of privately owned residences and public land including the nearby South Yuba River State Park. The area proposed for vegetation treatment includes parcels owned by three private landowners but is considered one project area for cross-boundary treatments.

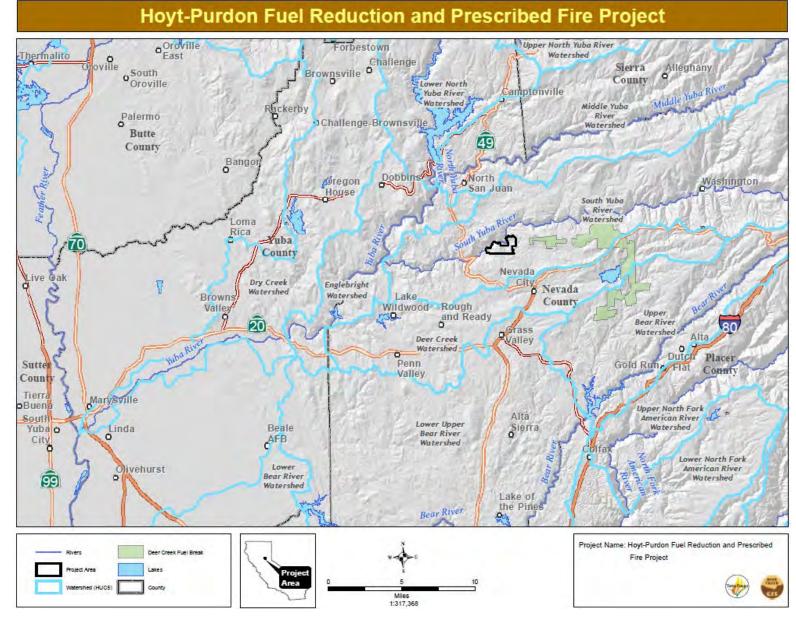


Figure 1-1. Project area and vicinity.

The project is designed as a landscape fuels reduction strategy of non-commercial thinning and wildfire fuel reduction at the Wildland Urban Interface (WUI) boundary of Nevada City and Grass Valley. The project area is within the WUI defined by the 2008 Nevada County Community Wildfire Protection Plan (CWPP). Most of the project area is also within the CAL FIRE WUI designation of Wildland Urban Influence zone. The project will protect the adjacent communities of Nevada City, Grass Valley, Newtown, Sweetland, North San Juan, and North Columbia from fires originating in the South Yuba canyon and protect the river canyon from fires originating in the communities. The project area, and the six adjacent communities are entirely within the high and very-high Fire Hazard Severity Zone (FHSZ). As a WUI fuel treatment project, the project will also support emergency response and create a defensible fuel profile for fire suppression. The fuel reduction will improve ingress and egress for firefighters and equipment by reducing flammable vegetation along emergency evacuation routes and access into the canyon terrain. The WUI treatments will also help enhance habitat quality by providing needed thinning and reducing non-native species.

Objectives of the project are to:

- Reduce the risk and impacts of high-severity wildfire to the high fire risk communities of Nevada City and Grass Valley and four other high-fire risk communities adjacent to the South Yuba River canyon;
- Reduce the threat of high-severity wildfire on the immediate and adjacent slopes of the South Yuba River to protect the watershed from wildfire's detrimental effects, including impaired water quality and aquatic habitat and threats to water supply;
- Enhance the ecological value of the landscape by creating a more heterogeneous forest structure that is tempered by fire and resilient to future natural disturbances and climate scenarios:
- Introduce and demonstrate the social and ecological benefits of prescribed fire in various thinned fuel profiles, and facilitate cost effective, long-term maintenance through the use of fire; and
- Bolster local experience, capacity, and coordination to plan and implement fuel treatments, including prescribed fire, to increase the pace and scale of wildfire risk reduction.

1.2 CEQA Lead Agency and Proposed Project

Serving as the lead agency under CEQA, SNC proposes to fund vegetation treatments on 570 acres of private land in Nevada County, which would be implemented by American Rivers. As defined in the CalVTP PEIR and the PSA, the project proponent is a public agency that provides funding for vegetation treatment or has land ownership, land management, or other regulatory responsibility in the treatable landscape and is seeking to fund, authorize, or implement vegetation treatments consistent with the CalVTP. The SNC Governing Board will approve the grant funding to American Rivers and delegate the implementation of the project, including all implementation requirements of the project proponent described in this PSA/Addendum, to American Rivers. American Rivers has accepted this delegation.

The proposed treatment type is Wildland-Urban Interface Fuel Reduction and the treatment activities are manual, mechanical, and prescribed burning treatments. These treatment types and treatment activities are consistent with those covered in the CalVTP PEIR. Ongoing maintenance of the proposed vegetation treatments would involve the same vegetation treatment activities as the initial treatment (i.e., manual, mechanical, and prescribed burning treatments) as well as prescribed herbivory.

1.3 Purpose of this Document

This document serves as the PSA to evaluate whether the project is within the scope of the CalVTP PEIR. As described above, the proposed treatment types and treatment activities are consistent with the CalVTP. An additional criterion for determining whether a treatment project is within the scope of the CalVTP PEIR is whether it is within the CalVTP treatable landscape (i.e., the geographic extent of analysis covered in the PEIR). Approximately 73 acres (13%) of the proposed 570-acre project treatment areas extend outside of the CalVTP treatable landscape (Figures 1-2 and 1-3). The areas of the proposed project outside of the CalVTP treatable landscape have essentially the same landscape conditions as the treatable landscape and the environmental analysis in the PEIR would therefore be applicable. Nevertheless, the proposed inclusion of areas outside of the CalVTP treatable landscape constitutes a revision to or change in the project compared to the PEIR and an addendum to the PEIR is therefore required. As described in CEQA Section 21166 and CEQA Guidelines Sections 15162, 15163, 15164, and 15168, an addendum to an EIR is appropriate when a previously certified EIR has been prepared and some changes or revisions to the project are proposed, but none of the changes or revisions would result in new or substantially more severe significant environmental impacts.

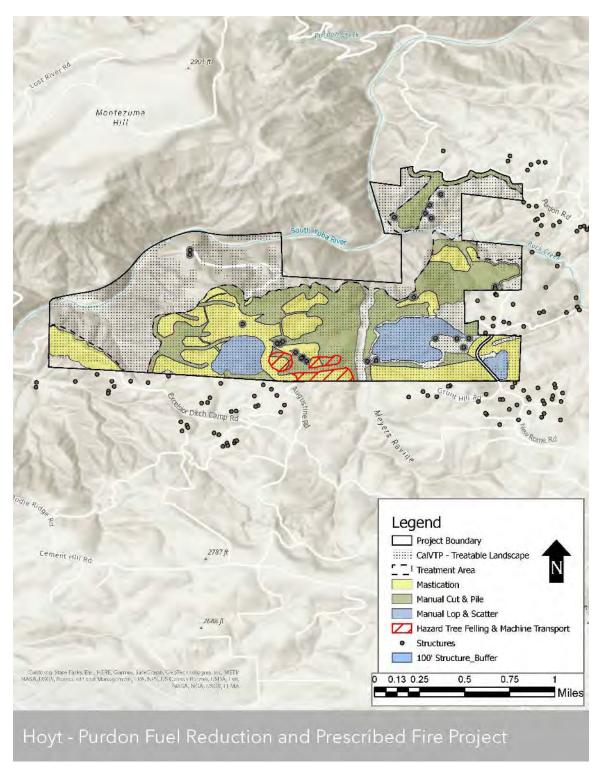


Figure 1-2. Proposed manual and mechanical treatments.

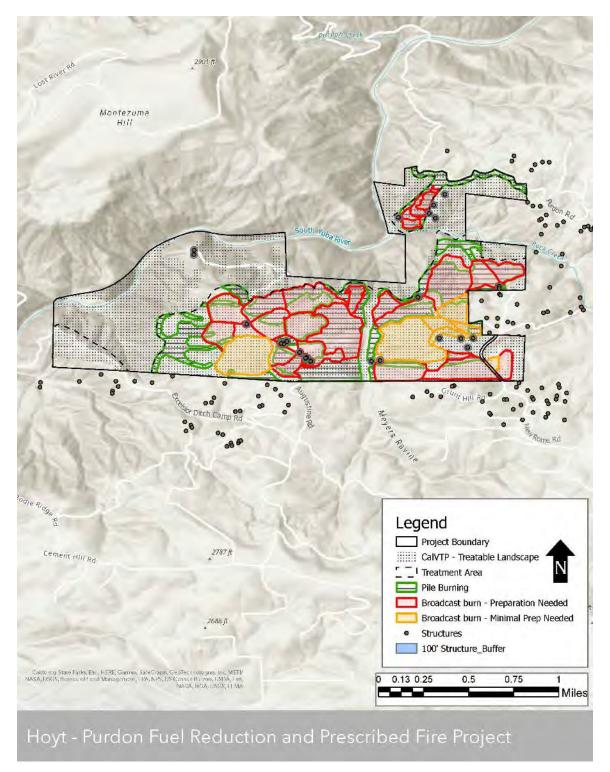


Figure 1-3. Proposed prescribed fire treatments.

The PSA checklist (see Section 3, Project-Specific Analysis/Addendum) includes the criteria to support an addendum to the CalVTP PEIR for the inclusion of proposed treatment areas outside the CalVTP treatable landscape. The checklist evaluates each resource in terms of whether the

proposed treatment project, including the "changed condition" of additional geographic area, would result in significant impacts that would be substantially more severe than those covered in the CalVTP PEIR and/or would result in any new impacts that were not covered in the PEIR.

This document serves as both a PSA and an addendum to the CalVTP PEIR to provide CEQA compliance for the proposed vegetation treatments within and outside of the treatable landscape. The project-specific mitigation monitoring and reporting program (MMRP), which identifies the CalVTP standard project requirements (SPRs) and mitigation measures (MMs) applicable to the proposed project, is included as Attachment A. The SPRs identified in the MMRP have been incorporated into the proposed vegetation treatments as a standard part of treatment design and implementation.

2 VEGETATION TREATMENT PROJECT INFORMATION

| 1. Project Title | Hoyt-Purdon Fuel Reduction and Prescribed Fire Project |
|---|---|
| 2. Implementing Entity Name and Address | American Rivers 120 Union Street Nevada City, CA 95959 |
| 3. Implementing Entity Contact Person | Julie Fair 530-412-1156 jfair@americanrivers.org |
| 4. Project Proponent Name and Address | Sierra Nevada Conservancy 11521 Blocker Drive, Suite 205 Auburn, CA 95603 |
| 5. Project Proponent Contact Person | Chris Dallas 530-718-0250 Chris.Dallas@sierranevada.ca.gov |
| 6. Project Location | Sections 23, 26, and 27 of Township 17 North, Range 8 East. Degrees Decimal Minutes: 121°3.3243082'W, 39°18.2379315'N |
| | The project area extends approximately two miles between Hoyt's |

The project area extends approximately two miles between Hoyt's and Purdon Crossings along the South Yuba River in Nevada County, California. It is located approximately two miles northwest of Nevada City and four miles north of Grass Valley. It includes parcels owned by three private landowners but is considered one project area for cross-boundary treatments. The project includes three treatment areas: one adjacent to the south side of Purdon Road extending to Rock Creek, one south of Rock Creek and accessible via New Rome Road and Augustine Road, and one adjacent to Excelsior Ditch Camp Road (Figure 1-2).

7. Total Area to be Treated (acres)

570 acres

8. Description of Project:

a. Initial Treatment

The proposed treatment type is Wildland-Urban Interface Fuel Reduction, and the treatment activities will include mechanical and manual treatments, and prescribed burning. The overall project approach is to use a combination of hand thinning, mastication, hazard tree felling and machine transport, pile burning, and broadcast burning to reduce fuels within the project area. The project team chose this approach to account for site-specific conditions in the project area, which include steep slopes and rough terrain. The proposed approach is also intended to reintroduce fire to the landscape, which is an important goal for partners and landowners. The project will generally use initial manual and mechanical treatments to establish conditions conducive to burning for initial fuel reduction and maintenance of fuel loads. Prescribed fire may be used to maintain desired conditions in the project area over the longer term. The project will use machines in tandem with hand methods to expedite site preparation and fuel reduction. Multiple treatments will occur on the same areas because cut and pile methods and/or mastication will be necessary before a prescribed burn would reduce surface fuels and not leave significant standing dead material.

The following equipment will be used to implement the proposed treatments:

- Hazard Tree Felling and Machine Transport: Up to two compact loaders and one excavator with thumb.
- Mastication: 2–3 excavators with the option of horizontal and vertical masticating head configurations
- Pile burn: Potential for standby equipment such as a water tender, Type 6 engine (200 gallons with pump and hard line), or a dozer as determined by Authority Having Jurisdiction (AHJ) for burn permits or contingency response.
- Broadcast burn: Type 6–Type 3 wildland engines, and other equipment as required by AHJ
 for burn permitting or contingency response. Standby equipment could include a water
 tender and dozer capable of working on slopes less than 30%
- Site preparation: Manual methods with ground crews and one compact loader

Implementation of initial treatments would require up to 30 crew members along with their associated vehicles to travel to and from the treatment areas. Biomass from treatments would be disposed of by burning hand piles using hand ignition, or by hand ignitions of mechanically constructed piles created with skid-steers and excavators using grapple attachments, or by lopping and scattering biomass in areas where material can be burned to meet objectives with a broadcast burn. Ground personnel will be used as the primary method for accessing and igniting piles as well as igniting and keeping control of prescribed fire. Engines, hose lays, and off-road utility vehicles are anticipated to be necessary to control and extinguish burning but may not be required in all burning conditions. Contingency equipment such as a dozer is also anticipated to be staged near the treatment area but would only be activated in the case of an escape and is not considered a planned action or treatment. Machine use for site preparation is included to mitigate the potential for smoldering materials and increase the dimensions of the control lines for better access and holding capabilities. Treatments would be scheduled to begin in summer or fall 2023 depending on equipment/contractor availability, weather conditions, and other restrictions and would be completed by spring of 2027.

The proposed treatments are described in detail below.

Manual Treatment

Fuel reduction using chainsaws and hand crew methods will be used where terrain is not conducive to mechanized equipment (greater than 30% slopes), or where there are not sufficient stems per acre to justify the increased impacts. This treatment method will be used in riparian areas, steep slopes, and sections close to residences to minimize soil disturbance and impacts to water quality and biological resources. However, the waterways of Meyers Ravine Creek and Rock Creek will not have any manual or mechanical treatments within 100 feet of the center of the waterway on both sides and light treatment between 100 and 200 feet of the waterway. Manual thinning treatment will be applied on approximately 298 acres, 254 acres of which is within the treatable landscape. Manual treatment will entail cutting of understory vegetation to reduce ladder fuels and overall fuel loading of the treatment area. Hand crews of 10-20 people will be used. For hand-thinning tactics under existing canopy, a diameter maximum and species preference will be used to determine residual and targeted vegetation. The project will use cut and pile and lop and scatter tactics for manual treatments to reduce fuel loading. Site preparation for prescribed burning will include the removal of organic material for the construction of control lines. Further removal of ladder fuels adjacent to control lines will be removed, and hazard trees within 1 and ½ times the height of the tree will be removed to provide for personnel safety while maintaining a high number of habitat trees within the treatment area.

Manual cut and pile tactics will be applied on 225 acres, including 184 acres within the treatable landscape. For cut and pile tactics, crewmembers will remove target vegetation from under and around residual trees or brush islands and create 4-foot x 4-foot x 4-foot piles outside of the dripline of residual trees for disposal via burning during the wet season. Piles may exceed the 4-foot height parameter for expected compaction. Lop and scatter tactics will be applied on 73 acres, including 70 acres within the treatable landscape. For lop and scatter tactics, crewmembers will cut vegetation and distribute the cut material outside of the drip line of residual trees, at a depth of no more than 12 inches. Manual treatment methods may also be used to provide enhanced outcomes as a follow up treatment to mastication. Follow up treatments by hand crews in mastication treatment areas would include thinning multiple-stem trees, felling perimeter hazard trees while maintaining a high number of snags, and using lop and scatter tactics to distribute cut material away from residual chaparral and residual tree drip lines. This would enhance the desired spacing and structure of the residual canopy. Manual treatment is expected to occur in 2023 - 2024 depending on funding.

Mechanical Treatment

Mechanical treatment is proposed where density of stems per acre is high. It will be avoided in riparian areas (within 200 feet of the waterway) and on slopes >30% to minimize soil disturbance and impacts to water quality and biological resources. Machine transport is included where hazard tree density is high, and where disposal of the biomass would be ineffective by ground personnel and manual methods.

Hazard Tree Felling and Machine Transport – The project will use equipment to transport and build piles in areas with extensive standing dead and dead and down material. Up to two compact track loaders would be used to transport material to ideal sites where an excavator with thumb would then pile the material. The project will use an excavator with a grapple head to make the piles, avoiding the use of scraping equipment, resulting in less ground debris and dirt. Piles will be built in locations near road access and where heat from the piles would not generate negative effects on the surrounding vegetation. Piles created by machines will not exceed 20 feet in length, width or diameter. Machine built burn piles will be the methods of disposal for insect damaged and infected biomass, and where fuel loading has naturally accumulated to an extent that hand methods of piling are not sufficient. Hazard Tree Felling and Machine Transport will occur on 18

acres within the treatable landscape. The piles would be subsequently burned (see below) when environmental and air quality conditions can be met. Treatment is expected to occur in 2023–2024 depending on funding.

Mastication – Mastication will be the primary tool for reducing and segmenting heavy fuel loads on high energy slopes and will be the preferred treatment method in areas along existing roads and areas with a high number of stems per acre. This method will employ excavators as the carrier machines, with the option of horizontal and vertical masticating head configurations, to modify understory and chapparal stands. Mastication will occur on 199 acres, including 185 acres within the treatable landscape. Mastication will use a technique of "seek and release" in dense chapparal to locate and clear around residual trees to reduce competition and contribute to the development of a dominant but horizontally broken overstory. The manipulation of dense understory, small trees, and extensive chapparal stands will be used to create canopy spacing relative to aspect and position on the slope. To avoid the effects of type conversion, retention plots would be established within chaparral areas such that a minimum of 35% of the area is retained in intact patches, as described in Section 3.5 under Impact BIO-3. In all areas subject to mastication, understory mastication will eliminate ladder fuels and redistribute the fuels across the ground. Consistent with manual methods, selection criteria will include residual species preference choices, and maximum 10-inch diameter at breast height (DBH) limitations and will be informed by aspect and slope-position guidelines to direct operators to create the desired mosaic, while creating a fuel profile that is resistant to crown fire, and susceptible to control. The release of residual trees, with moderated spacing will create shade benefits without eliminating quality, variable habitat for wildlife. Fuels reduced through mastication will be mulched into the soil for disposal or burned when sufficient loading and environmental conditions can be met. Mastication will be followed with manual treatment when fiscally possible; selective thinning of multiple stem trees and lop and scatter of fuels will enhance forest structure and provide fuel conducive to fire spread for broadcast burns. Mastication is expected to occur in 2023–2024 depending on funding.

Prescribed Burn Treatment

Pile Burning – Pile burning will be used to dispose of cut material from manual and equipment-assisted thinning treatments. It could occur anywhere manual or mechanical treatments occur. It could occur on approximately 239 acres, including 198 acres within the treatable landscape. Crews will generally pile the material during cutting, and burning would take place in the wet season, after sufficient curing of materials. Crews will cover the piles with waxed paper or another approved material, approximately two-thirds from the bottom of the pile as they are constructed to keep them dry, and resist blow away from wind. Pile burning may require support from a water tender or type 6 engine with a nearby water source. A smoke management plan, distinct from the plan for broadcast burning, would be required prior to ignition of piles. Pile burning is expected to occur in 2023–2025 depending on funding and adequate weather windows. Because burn timing can be challenging, it may occur through 2027.

Broadcast Burning – Broadcast burning will be used as an initial fuel reduction treatment and follow-up treatment to thinning and mastication. Broadcast burns within the project area will be designed to enhance ecological conditions, reduce surface fuel loading, and limit vegetation remergence. The project has been broken into numerous burn units to facilitate planning for this treatment. Some units will be immediately available for broadcast burning where previous thinning efforts already occurred or where the condition of the vegetation is conducive to the use of fire without significant additional thinning. 83 acres, including 82 acres within the treatable landscape, are identified for broadcast burning where only lop and scatter and control line improvements would be made. The remaining 249 acres, including 214 acres within the treatable

landscape, identified for broadcast burning would require significant fuel modification or removal prior to implementation. Pretreatment of vegetation would occur in these areas by the manual/mechanical treatments described above. All burning would occur in accordance with regulations regarding the use of prescribed fire. This would include preparation and implementation of a burn plan to be approved by the landowners, American Rivers and the AHJs, including CAL FIRE and Nevada County Consolidated Fire District. It also would involve preparation and implementation of a burn permit from the Northern Sierra Air Quality Management District (NSAQMD) and a smoke management plan.

Prescribed fire intervals and seasonal timing will be based on the dominant vegetation, method of pre-burn thinning, and the desired outcomes of the specific unit. Mastication units will require that fuel loading be conducive to meeting prescribed fire objectives and could require a year or more in order to build up enough fine fuel and leaf litter to achieve desired fire effects. However, masticated units could be burned within the same year if the surface fuel loading and other conditions are sufficient. Burn intensities are designed to be low to moderate, and to avoid riparian and sensitive habitat features. Fire in drainages will be by backing means only, and fire would not be introduced manually within sensitive areas but should be allowed to burn naturally to extinguishment whenever possible. The trail and road systems in the treatment area provide the majority of control lines, but some units will require experienced hand-crews to create holding lines and to lay hose and monitor the handline during operations.

This treatment is expected to occur in 2023–2026. Because burn timing can be challenging it may occur through 2027. Burning is expected to take place after a season ending event in the fall, and using all available, ecologically conducive burn windows into the early summer. Seasonal conditions differ year to year, and the dates are not binding, but would likely include November through July. Burns will be used for training purposes whenever possible, and can be burned by appropriate agency personnel, private contractors, or volunteers in a Prescribed Burn Association (PBA), but all will require a burn boss and adherence to the burn plan and smoke management plan.

| Treatment Types |
|--|
| Wildland-Urban Interface Fuel Reduction |
| ☐ Fuel Break |
| Ecological Restoration |
| Treatment Activities |
| Prescribed Burning (Broadcast), 334 acres |
| Prescribed Burning (Pile Burning), 239 acres |
| Mechanical Treatment, 217 acres |
| Manual Treatment, 298 acres |
| Prescribed Herbivory |
| Herbicide Application |
| Fuel Type |
| Grass Fuel Type |
| Shrub Fuel Type |
| Tree Fuel Type |

b. Treatment Maintenance

A key goal of the project is to reintroduce fire as a management technique within the treatment area. The initial manual and mechanical treatments will establish conditions that will allow

prescribed fire to dispose of residual surface fuels and create lasting structural changes so that prescribed fire may be used as a key maintenance technique, as well as allow the treatment area to benefit from the potential occurrence of wildfire. As such, the primary maintenance activity will be prescribed broadcast burning, however maintenance may also include manual treatment, mechanical treatment, pile burning and prescribed herbivory. Except for a high mortality event, manual methods and prescribed fire should be sufficient to maintain broadcast burn units. Whether additional manual or mechanical treatments are needed will be determined by project partners and landowners, based on whether conditions continue to allow for management with prescribed fire, and an evaluation of the outcomes of each burn unit relative to the objectives of the burns. Additional treatments for maintenance could include livestock methods for mitigating stump sprouts that will emerge after some species of vegetation are cut or girdled by heat.

Prescribed Burn Maintenance Treatment

Prescribed fire intervals and seasonal timing will be based on the dominant vegetation, method of pre-burn thinning, and the desired outcomes of the specific unit. We anticipate burn intervals of approximately 3–5 years for this fuel type to maintain open spaces where brush has been removed. Maintenance actions for keeping control lines open and secure, and for implementing multiple burns on the same unit would include the conveyance of crews and water equipment in and around the treatment areas. Small squads of hand crews (5–20) could be used to maintain and improve on control lines and the mitigation of sediment runoff from those control lines by the creation of small water bars where organic material had been disturbed. Some selective thinning may be used in conjunction with control line maintenance, and could be accomplished through hand-cut methods, with disposal through lop and scatter into the broadcast burn unit, or in pile burns separately from a broadcast burn.

Manual Treatment

Maintenance treatments would be in support of prescribed burning and would be the same as described under Prescribed Burn Maintenance Treatment above.

Mechanical Treatment

Maintenance mechanical treatments would occur if a high mortality event or partner and landowner objectives warranted their use. If needed, this treatment would likely be minimal in scale to augment conditions so that prescribed fire could continue to be used as the primary maintenance treatment.

Prescribed Herbivory

Prescribed herbivory may be used for maintenance treatment for mitigating stump sprouts that will emerge after some species of vegetation are cut or girdled by heat. Treatment will include using approximately 100 goats or similar animal in a targeted area for a short duration to target stump sprouts, using temporary fencing as needed. Once the stump sprouts had been mitigated the fencing and animals would be moved to another target area. If needed, fencing would be wildlife friendly. This treatment may occur wherever conditions warrant and access allows, except it would be excluded from slopes over 50% to reduce erosion impacts. It would not occur within 50 feet of waterways and animals would not be permitted to use waterways as a water source. If needed, outside water would be provided for the animals.

| Treatment Types |
|---|
| Wildland-Urban Interface Fuel Reduction |
| ☐ Fuel Break |
| Ecological Restoration |

| Treatment Activities |
|--|
| Prescribed Burning (Broadcast), 340 acres |
| Prescribed Burning (Pile Burning), 239 acres |
| Mechanical Treatment, 217 acres |
| Manual Treatment, 298 acres |
| Prescribed Herbivory, 570 acres |
| Herbicide Application |
| |
| Fuel Type |
| Grass Fuel Type |
| ∑ Shrub Fuel Type |
| Tree Fuel Type |

Use of the PSA for Treatment Maintenance

Prior to implementing a maintenance treatment, the project proponent will verify that the expected site conditions as described in the PSA are present in the treatment area. As time passes, the continued relevance of the PSA will be considered by the project proponent in light of potentially changed conditions or circumstances. Where the project proponent determines the PSA is no longer sufficiently relevant, the project proponent will determine whether a new PSA or other environmental analysis is warranted.

In addition to verifying that the PSA continues to provide relevant CEQA coverage for treatment maintenance, the project proponent will update the PSA at the time a maintenance treatment is needed when more than 10 years have passed since the approval of the PSA or the latest PSA update. For example, the project proponent may conduct a reconnaissance survey to verify conditions are substantially similar to those anticipated in the PSA. Updated information should be documented.

9. Regional Setting and Surrounding Land Uses:

The proposed project is located on private land between Hoyt's and Purdon Crossings in the South Yuba Canyon in Nevada County. The project is adjacent to the South Yuba River State Park on both the upstream and downstream ends and Bureau of Land Management (BLM) land to the north. The South Yuba River State Park experiences high visitation for recreation. It is located on rural land approximately two miles northwest of Nevada City and four miles north of Grass Valley and south of the communities of Sweetland, North San Juan, and North Columbia. It is in the South Yuba River watershed. Surrounding land uses include recreation areas, rural residences and undeveloped forest lands.

10. Other Public Agencies Whose Approval is Required: (e.g., permits)

A smoke management plan will be prepared for Northern Sierra Air Quality Management District (NSAQMD). One or more one-year burn permits will be obtained from NSAQMD.

CAL FIRE does not need to issue a permit outside of 'determined fire season', but for in-season burns a Project Type Burning Permit (LE-7) and companion Minimum Precautions for Project Type Burning (LE-8) will be required from CAL FIRE for permission to burn.

| Coastal Act Compliance | |
|---|--|
| ☐ The proposed project is NOT within the Coastal Zone | |
| The proposed project is within the Coastal Zone (<i>check one of the following boxes</i>) | |
| | |

has determined that a coastal development permit is not required

Project Specific Analysis and PEIR Addendum Hoyt-Purdon Fuel Reduction and Prescribed Fire Project

May 2023 Stillwater Sciences

11. Native American Consultation.

For treatment projects that are within the scope of the CalVTP PEIR, AB 52 consultation for AB 52 compliance has been completed. The Board of Forestry and Fire Protection (Board) conducted consultation pursuant to Public Resources Code section 21080.3.1 during preparation of the PEIR.

Pursuant to CalVTP SPR CUL-2, Native American contacts in Nevada County were contacted on April 19, 2022, and included Grayson Coney, Cultural Director, Tsi Akim Maidu; Gene Whitehouse, Chairperson, United Auburn Indian Community of the Auburn Rancheria; Darrel Cruz, Cultural Resources Department, Washoe Tribe of Nevada and California; Clyde Prout, Chairperson, Colfax-Todds Valley Consolidated Tribe, Pamela Cubbler, Treasurer, Colfax-Todds Valley Consolidated Tribe; Richard Johnson, Chairman, Nevada City Rancheria Nisenan; Shelly Covert, Tribal Secretary, Nevada City Rancheria Nisenan; and Saxon Thomas, Tribal Council Member, Nevada City Rancheria Nisenan. Responses were received from United Auburn Indian Community of the Auburn Rancheria and the Nevada City Rancheria Nisenan. American Rivers provided the Nevada City Rancheria Nisenan with additional information about the project. The representative from United Auburn Indian Community of the Auburn Rancheria provided input about specific preferences of the Tribe related to Tribal cultural resources that have been incorporated into the measures and the project.

DETERMINATION

On the basis of this PSA and the substantial evidence supporting it:

| | covered i | n the CalVTP PEIR, and (b) all applicable Stand identified in the CalVTP PEIR will be implement THE SCOPE of the CalVTP PEIR. NO ADDITION. | dard Project Recented. The prope | quirements and mitigation osed project is, therefore, | | | | | | |
|--------|--|---|---|---|--|--|--|--|--|--|
| The S | NC Gover | ning Board finds that: | | | | | | | | |
| | project, a pursuant impacts of | IVTP PEIR sufficiently analyzes and addressed potential environmental impacts from the and the project will not trigger any of the criteria requiring additional CEQA review at to CEQA Guidelines Section 15162. The project will not result in new significant so or a substantial increase in the severity of the significant environmental impacts identified CalVTP PEIR. | | | | | | | | |
| | treatable | of the proposed project that would be implemental landscape are within the scope of the CalVTP P 5168, subd. (c)(2), as documented in the PSA. | | | | | | | | |
| | landscape Guideline | lements of the proposed project that would be implemented in areas outside the CalVTP treatable indscape would not result in the occurrence of any of the conditions described in State CEQA duidelines Section 15162 calling for preparation of a subsequent EIR; therefore, an Addendum as been adopted to address the project areas outside the geographic extent presented in the PEIR. | | | | | | | | |
| | effects ar | t the proposed project will have effects that were te less than significant without any mitigation be TP PEIR. A NEGATIVE DECLARATION will | yond what is all | | | | | | | |
| | have effect these effect measures by the pro- | t the proposed project will have effects that were cts that are substantially more severe than those ects may be significant in the absence of addition s, revisions to the proposed project or additional oject proponent that would avoid or reduce the ecur. A MITIGATED NEGATIVE DECLARAT | covered in the chal mitigation be mitigation meas | CalVTP PEIR. Although eyond the CalVTP PEIR's sures have been agreed to early no significant effect | | | | | | |
| | were not the CalV | t the proposed project will have significant environment of the CalVTP PEIR and/or (b) substan TP PEIR. Because one or more effects may be san significant, an ENVIRONMENTAL IMPAC | tially more seve ignificant and ca | ere than those covered in annot be clearly mitigated | | | | | | |
| Signat | ure | Docusigned by: Ungla lvery D382EA80350B496 | Date | 6/1/2023 | | | | | | |
| Printe | d Name | Angela Avery | Title | Executive Officer | | | | | | |
| Agenc | y | Sierra Nevada Conservancy | | | | | | | | |
| | | | | | | | | | | |

3 PROJECT-SPECIFIC ANALYSIS/ADDENDUM

3.1 Aesthetics and Visual Resources

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | Ī | 1 | | | | |
| Impact AES-1: Result in Short-Term, Substantial Degradation of a Scenic Vista or Visual Character or Quality of Public Views, or Damage to Scenic Resources in a State Scenic Highway from Treatment Activities | LTS | Impact AES-1, pp. 3.2- 16–3.2-19 | Yes | AES-2, AQ-2, AQ-3 | NA | LTS | No | Yes |
| Impact AES-2: Result in Long-Term, Substantial Degradation of a Scenic Vista or Visual Character or Quality of Public Views, or Damage to Scenic Resources in a State Scenic Highway from WUI Fuel Reduction, Ecological Restoration, or Shaded Fuel Break Treatment Types | LTS | Impact AES-2, pp. 3.2- 20–3.2-25 | Yes | AES-1, AES-3 | NA | LTS | No | Yes |

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|----|---|--|----|------|----|----|----|
| Impact AES-3: Result in Long-Term Substantial Degradation of a Scenic Vista or Visual Character or Quality of Public Views, or Damage to Scenic Resources in a State Scenic Highway from the Non-Shaded Fuel Break Treatment Type | SU | Impact AES-3, pp. 3.2- 25–3.2-27 | No | NA | None | NA | NA | NA |

- ¹ LTS: less than significant; SU: significant and unavoidable
- NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact. None: there are SPRs and/or MMs identified in the PEIR for this impact, but none are applicable to the treatment project.

| New Aesthetic and Visual Resource Impacts: Would the treatment result in other impacts to aesthetics and visual resources that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion | |
|--|----------------------------|--|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant | |
| [identify new impact here, if applicable; add rows as needed] | | | | |

Discussion

Impact AES-1

Proposed treatment activities have the potential to result in short-term degradation of the visual character or quality of public views. The project area borders South Yuba River State Park, so project equipment, vehicles, and prescribed burning activities may be visible to recreationists in the park. Additionally, although no scenic highways have direct views of the project area, smoke from prescribed burning could be visible from State Routes 20 and 49, portions of which are either eligible or designated as state scenic highways (Caltrans 2019). The potential short-term aesthetic impacts of the project are consistent with those evaluated in the PEIR. Implementation of SPR AES-2 to avoid staging within viewsheds, and SPRs AQ-2 and AQ-3 to prepare a smoke management plan and burn plan, respectively, will prevent substantial short-term degradation of a scenic vista, visual character, or quality of public views and avoid damage to scenic resources.

Existing scenic resources are essentially the same in project treatment areas outside the geographic extent of the CalVTP treatable landscape and areas within it. Therefore, as described above, the project's short-term impact on aesthetic resources would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact AES-2

As described above, the project area may be directly visible from public recreation areas but not from nearby state scenic highways. Project treatment activities would be limited to removing understory vegetation and thinning small trees; thus, the project is expected to enhance the ecological and aesthetic value of the landscape over the long term. The project is within the scope

of the PEIR because the proposed treatment activities and long-term environmental goals are consistent with those evaluated in the PEIR. Where applicable, such as edges of clearings potentially visible from public recreation areas, SPRs AES-1 and AES-3 will be implemented to prevent substantial long-term degradation of a scenic vista, visual character, or quality of public views and avoid damage to scenic resources.

The visual character of project treatment areas is essentially the same, whether within or outside the CalVTP treatable landscape. As such, the project's long-term impact on aesthetic resources would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact AES-3

This impact does not apply to the project because no non-shaded fuel breaks are proposed.

New Aesthetic and Visual Resource Impacts

Proposed project treatment activities and existing visual resources in and near the project area and the site-specific characteristics of the proposed treatment project are consistent with the applicable environmental and regulatory conditions described in the CalVTP PEIR (Sections 3.2.1 and 3.2.2 in Volume II of the Final PEIR). The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR; however, the proposed treatment activities and visual resources in and near these areas are essentially the same as in areas within the CalVTP treatable landscape. There are no changed circumstances, and the inclusion of land outside the CalVTP treatable landscape would not result in any additional significant impacts. Therefore, no new impacts related to aesthetic or visual resources would occur.

Agriculture and Forestry Resources 3.2

| Impact in the PEIR ¹ | Project- specific Checklist ^{1,2} | | | | | | | |
|---|--|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact AG-1: Directly Result in the Loss of Forest Land or Conversion of Forest Land to a Non-Forest Use or Involve Other Changes in the Existing Environment Which, Due to Their Location or Nature, Could Result in Conversion of Forest Land to Non-Forest Use | LTS | Impact AG-1, pp. 3.3-7–3.3- 8 | Yes | NA | NA | LTS | No | Yes |

LTS: less than significant
 NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

| New Agriculture and Forestry Resource Impacts: Would the treatment result in other impacts to agriculture and forestry resources that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|---|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

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Discussion

Impact AG-1

The project area is forested and includes Douglas Fir, Mixed Chaparral, Montane Hardwood, Montane Hardwood-Conifer, and Ponderosa Pine habitat types (Attachment B). Although project treatment activities would remove large amounts of vegetation, they would focus on clearing understory vegetation and thinning trees with a DBH less than 10 inches in areas with high stem densities. These treatments are intended to enhance the ecological value of the landscape by creating a more heterogeneous forest structure. The proposed treatment methods are consistent with the methods examined in the PEIR so are within its scope. As indicated in the PEIR, because the project area would continue to support at least 10% native tree cover following initial and maintenance treatments, it would remain forest land as defined by Public Resources Code Section 12220(g). No SPRs are applicable to this impact.

The vegetation types present within the portions of the project area outside the extent of the CalVTP treatable landscape are similar to those within the treatable landscape and would be treated with essentially the same methods. As such, the impact in areas outside the CalVTP treatable landscape would be the same as described above and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

New Agriculture and Forestry Resource Impacts

Proposed project treatment activities and vegetation types present in the project area are consistent with the applicable environmental and regulatory conditions pertaining to agriculture and forestry resources described in the CalVTP PEIR (Sections 3.3.1 and 3.3.2 in Volume II of the Final PEIR). The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR; however, the proposed treatment methods and vegetation types are essentially the same as in areas within the CalVTP treatable landscape. There are no changed circumstances, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new project impacts related to agriculture or forestry resources would occur.

3.3 Air Quality

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|---|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | 1 | | 1 | 1 | · · · · · · · · · · · · · · · · · · · | | |
| Impact AQ-1: Generate Emissions of Criteria Air Pollutants and Precursors During Treatment Activities that Would Exceed CAAQS or NAAQS and Conflict with Regional Air Quality Plans | PSU | Impact AQ- 1, pp. 3.4- 26–3.4-33; | Yes | AD-4, AQ-1, AQ-2, AQ-3, AQ-4, AQ-6 | AQ-1 | PSU | No | Yes |
| Impact AQ-2: Expose People to Diesel Particulate Matter Emissions and Related Health Risk | LTS | Impact AQ- 2, pp. 3.4- 33–3.4-34; | Yes | HAZ-1, NOI-4, NOI-5 | NA | LTS | No | Yes |
| Impact AQ-3: Expose People to Fugitive Dust Emissions Containing Naturally Occurring Asbestos and Related Health Risk | LTS | Impact AQ- 3, pp. 3.4- 34–3.4-35 | No | None | NA | NA | NA | NA |
| Impact AQ-4: Expose People to Toxic Air Contaminants Emitted by Prescribed Burns and Related Health Risk | PSU | Impact AQ- 4, pp. 3.4- 35–3.4-37 | Yes | AD-4, AQ-2, AQ-3, AQ-6 | NA | PSU | No | Yes |
| Impact AQ-5: Expose People to Objectionable Odors from Diesel Exhaust | LTS | Impact AQ- 5, pp. 3.4- 37–3.4-38 | Yes | HAZ-1, NOI-4, NOI-5 | NA | LTS | No | Yes |

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Impact AQ-6: Expose People to Objectionable Odors from Smoke During Prescribed Burning | PSU | Impact AQ- 6, pp. 3.4- 38–3.4-39 | Yes | AD-4, AQ-2, AQ-3, AQ-6 | NA | PSU | No | Yes |

LTS: less than significant; PSU: potentially significant and unavoidable.

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact. None: there are SPRs and/or MMs identified in the PEIR for this impact, but none are applicable to the treatment project.

| New Air Quality Impacts: Would the treatment result in other impacts to air quality that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

Pursuant to SPR AQ-2, the project proponent will prepare a smoke management plan and submit it to the Northern Sierra Air Quality Management District (NSAQMD) prior to implementing any prescribed burning treatment. Per SPR AQ-3, the project proponent will also prepare a burn plan using the CAL FIRE burn plan template for all prescribed burns. The burn plan will be created with input from a qualified technician or certified State burn boss and will include measures to minimize soil burn severity from broadcast burning to reduce the potential for soil erosion and altered hydrology in burn areas.

Impact AQ-1

Project treatment activities (i.e., vehicle and mechanical equipment use, prescribed burning) would result in emissions of criteria air pollutants and precursors that could exceed California and/or national ambient air quality standards. The project treatment methods, air basin (Mountain Counties Air Basin [MCAB]), and air district (NSAQMD) are consistent with those analyzed in the PEIR; therefore, emissions of criteria air pollutants from these activities are within the scope of the PEIR. SPRs AD-4, AQ-1 through AQ-4, and AQ-6 are applicable to this impact and will be implemented to minimize impacts related to emissions of criteria air pollutants and avoid conflict with regional air quality plans. All feasible elements of Mitigation Measure AQ-1 will also be

implemented to minimize emissions of criteria air pollutants. Encouraging and providing incentives to contractors that use equipment meeting EPA's Tier 4 emission standards would likely be feasible to implement. Other aspects of Mitigation Measure AQ-1, including the use of renewable diesel fuels and carpooling or use of public transportation by workers, would not be feasible given the prohibitive cost and difficulty of reliably obtaining renewable fuel and the isolated, rural setting of the treatment area, respectively.

Portions of the project treatment area extend beyond the geographic extent of the CalVTP treatable landscape; however, these areas experience similar air quality conditions and are located within the same air basin and air quality district as the rest of the project area. Additionally, potential project emission impacts in these areas would be similar to those described above, which are within the scope of the PEIR. Therefore, this impact would be the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact AQ-2

Vehicle and equipment use during project treatment activities could expose people to diesel particulate matter emissions and related health risk. Project vehicle and equipment types and usage levels are consistent with those analyzed in the PEIR; therefore, diesel emissions are within the scope of the PEIR. SPRs HAZ-1, NOI-4, and NOI-5 are applicable to this potential project impact and will be implemented to minimize exposure and health risk related to diesel particulate matter emissions by preventing excessive emissions of diesel particulate matter, maximizing the distance between treatment activities (including staging areas) and human receptors, and restricting equipment idling time.

Although portions of the project treatment area extend beyond the geographic extent of the CalVTP treatable landscape, the air quality conditions and proximity to sensitive receptors in these areas are essentially the same as those in areas in the same air basin (MCAB) and air district (NSAQMD), which are analyzed in the PEIR. As such, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact AQ-3

No ultramafic rock formations with the potential for naturally occurring asbestos have been mapped in the project area (CGS 2022a). As such, this impact does not apply to the project.

Impact AQ-4

Smoke generated during prescribed burning activities could expose people to objectionable odors. The proposed prescribed burning methodology, vegetation types present in the project area, and air quality conditions in the MCAB are consistent with those evaluated in the PEIR, so the potential for exposure of people to objectionable odors as a result of prescribed burning is within the scope of the PEIR. SPRs AD-4, AQ-2, AQ-3, and AQ-6 are applicable to this potential project impact and include all feasible measures to prevent and minimize smoke emissions. Because no additional mitigation is feasible, this project impact would remain significant and unavoidable.

The portions of the project area that extend beyond the geographic extent of the CalVTP treatable landscape have similar air quality conditions and proximity to sensitive receptors as the portions of the project area within the CalVTP treatable landscape. Additionally, these areas would be treated with the same prescribed burning methods. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact AQ-5

Vehicle and equipment use during project treatment activities could expose people to objectionable odors from diesel exhaust. Project vehicle and equipment types and usage levels are consistent with those analyzed in the PEIR; therefore, diesel emissions are within the scope of the PEIR. SPRs HAZ-1, NOI-4, and NOI-5 are applicable to this potential project impact and will be implemented to avoid or minimize exposure to diesel exhaust and odors.

Although portions of the project treatment area extend beyond the geographic extent of the CalVTP treatable landscape, the air quality conditions and proximity to sensitive receptors in these areas are essentially the same as those in areas in the same air basin (MCAB) and air district (NSAQMD), which are analyzed in the PEIR As such, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact AQ-6

Prescribed burning could expose people to toxic air contaminants (i.e., particulate matter less than 2.5 microns in diameter [PM_{2.5}]). The proposed prescribed burning methodology, vegetation types present in the project area, and air quality conditions in the Mountain Counties Air Basin are consistent with those evaluated in the PEIR, so the potential for exposure of people to toxic air contaminants as a result of prescribed burning is within the scope of the PEIR. SPRs AD-4, AQ-2, AQ-3, and AQ-6 are applicable to this potential project impact and include all feasible measures to prevent and minimize smoke emissions. Because no additional mitigation is feasible, this project impact would remain significant and unavoidable.

The portions of the project area that extend beyond the geographic extent of the CalVTP treatable landscape have similar air quality conditions and proximity to sensitive receptors as the portions of the project area within the CalVTP treatable landscape. Additionally, these areas would be treated with the same prescribed burning methods. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

New Air Quality Impacts

The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR and the site-specific characteristics of the proposed treatment project are consistent with the applicable environmental and regulatory conditions described in the CalVTP PEIR (Sections 3.4.1 and 3.4.2 in Volume II of the Final PEIR). The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. Within the boundary of the project area, however, the existing environmental conditions, air districts, and proximity to sensitive receptors are essentially the same as those evaluated in the PEIR. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new impacts related to air quality would occur.

Archaeological, Historical, and Tribal Cultural Resources 3.4

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|--|--|---|---|--|---|--|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | • | | | • | • | | |
| Impact CUL-1: Cause a Substantial Adverse Change in the Significance of Built Historical Resources | LTS | Impact CUL-1, pp. 3.5- 14–3.5-15 | Yes | CUL-1 CUL-7 CUL-8 | N/A | LTS | No | Yes |
| Impact CUL-2: Cause a Substantial Adverse Change in the Significance of Unique Archaeological Resources or Subsurface Historical Resources | SU | Impact CUL-2, pp. 3.5- 15–3.5-16 | Yes | CUL-1 CUL-2 CUL-3 CUL-4 CUL-5 CUL-8 | CUL-2 | LTSM | No | Yes |
| Impact CUL-3: Cause a Substantial Adverse Change in the Significance of a Tribal Cultural Resource | LTS | Impact CUL-3, p. 3.5-17 | Yes | CUL-1 CUL-2 CUL-3 CUL-4 CUL-5 CUL-6 CUL-8 | N/A | LTS | No | Yes |
| Impact CUL-4: Disturb Human Remains | LTS | Impact CUL-4, p. 3.5-18 | Yes | N/A | N/A | LTS | No | Yes |

LTS: less than significant; SU: significant and unavoidable.
 NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact. None: there are SPRs and/or MMs identified in the PEIR for this impact, but none are applicable to the treatment project.

| New Archaeological, Historical, and Tribal Cultural Resource Impacts: Would the treatment result in other impacts to archaeological, historical, and tribal cultural resources that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

The requirements of SPRs CUL-1 and CUL-3 from the CalVTP PEIR have been met by the cultural resources records search conducted for the proposed project. A cultural resources records search from the North Central Information Center (NCIC) was completed for the treatment area. One archeological resource and four historic resources had been previously recorded in the project area. Protection measures for these resources have been integrated into the project.

Consistent with CalVTP SPR CUL-2, a list of geographically affiliated Native American representatives was obtained from the Native American Heritage Commission (NAHC) on April 5, 2022. American Rivers sent eight letters via email, inviting each Native American representative to consult on the proposed project. Two responses were received: one from the Nevada City Rancheria Nisenan and one from the United Auburn Indian Community.

Shelly Covert, Tribal Secretary for the Nisenan responded on April 19, 2022 requesting information about the firm completing on-the-ground treatment work and plans to protect fire-sensitive species. American Rivers and Stillwater Sciences prepared and sent an email response including information that the firm is to-be-determined and information about the evaluation of fire-sensitive species in the Biological Resources Evaluation (BRE; Attachment B) and PSA, including the results of reconnaissance level surveys, the plan for subsequent focused surveys, and related SPRs. Shelly did not provide additional response.

Cherilyn Ashmead, Cultural Regulatory Specialist for the United Auburn Indian Community, responded on May 6th, 2022, requesting a call to discuss protection and treatment of cultural resources within the project area. American Rivers and Ascent had a call with Cherilyn on May 20, 2022. Cherilyn expressed some specific preferences of the Tribe, and Ascent subsequently developed draft protection measures. Cherilyn reviewed the draft protection measures and provided suggested revisions. The revisions were incorporated into the measures and the measures have been integrated into the proposed project, as summarized below and detailed in the Mitigation and Monitoring Reporting Program (MMRP; Attachment A).

- A separate Cultural Resources Protection Measures Action Plan (Action Plan) containing the protection measures will be developed and appended to the Archaeological Survey Report (ASR). The Action Plan will reference the proposed project treatments and the location and actions of the protection measures. Only the Action Plan appendix will be supplied to the project proponent rather than the entire ASR document.
- The Cultural Resources Worker Awareness Training will be conducted before the start of work by the project proponent and will be given to crew members and contractors implementing treatment activities. The participating culturally affiliated Tribe(s) (Tribe) will be invited to participate in the training. The training will include a statement regarding the fact that sensitive archaeological, historical (built environment), and Tribal cultural resources are present within treatment limits; define each type of cultural resource (i.e., archaeological, built environment [historical], and Tribal cultural resources); discuss applicable state laws and regulations, the protocols for avoidance being applied for the project, and the consequences of violating the project protection protocols as well as state laws and regulations; and discuss what to do if cultural resources are inadvertently identified during treatment implementation. A draft of the training materials will be provided to the Tribe for review, comment, and approval and the training will be approved by the Tribe prior to implementation of treatment activities
- Prior to implementation of treatments, an equipment exclusion zone (EEZ) will be established to delineate areas to be protected. EEZs shall be demarcated on the project plans and/or mapping and marked on the ground with high visibility flagging. The specific

location of cultural resources within EEZs will not be identified or disclosed. No motorized equipment or mechanical treatment as defined under the CalVTP shall enter or be used in the EEZ. Either prior to or as part of the flagging effort for certain cultural resources, the Tribe shall be invited by the project proponent to conduct a survey of the resource location and/or to assist with the flagging.

- Within EEZs, vegetation shall be hand cleared using the manual treatments outlined under the CalVTP (e.g., use of hand tools and hand operated power tools). The Tribe will be invited to participate in hand clearing around certain cultural resources.
- Details of cultural resource sites will be kept confidential and their location only noted generally on maps and the landscape.
- After completion of prescribed burning in EEZs, the project proponent will invite the Tribe to conduct a post-implementation survey to evaluate the condition of known cultural resources and potentially identify additional sites not currently visible.

An April 5, 2022 search of NAHC's sacred lands database returned negative results. A list of the representatives identified by the NAHC and the method of contact and any response received is provided in Table 3-1 below.

Table 3-1. Geographically affiliated Native American representatives contact record.

| Name and Title | Affiliation | Date and Method of Initial Contact | Response Summary |
|-------------------------------------|--|---------------------------------------|---|
| Grayson Coney, Cultural Director | Tsi Akim Maidu | April 18, 2022 Email | None to date |
| Gene Whitehouse, Chairperson | United Auburn Indian Community of the Auburn Rancheria | April 18, 2022 Email | Developed revised cultural resource protection measures in consultation with Cherilyn Ashmead |
| Darrel Cruz, Cultural | Washoe Tribe of Nevada | April 18, 2022 | None to date |
| Resources Representative | and California | Email | |
| Clyde Prout, Chairperson | Colfax-Todds Valley Consolidated Tribe | April 18, 2022 Email | None to date |
| Pamela Cubbler, | Colfax-Todds Valley | April 18, 2022 | None to date |
| Treasurer | Consolidated Tribe | Email | |
| Richard Johnson, | Nevada City Rancheria | April 18, 2022 | None to date |
| Chairman | Nisenan | Email | |
| Shelly Covert, Tribal | Nevada City Rancheria | April 18, 2022 | Provided requested information |
| Secretary | Nisenan | Email | |
| Saxon Thomas, Tribal | Nevada City Rancheria | April 18, 2022 | None to date |
| Council Member | Nisenan | Email | |

Source: Compiled by Ascent Environmental in 2022.

Impact CUL-1

Initial and maintenance vegetation treatment activities would include manual and mechanical treatments and prescribed burning (both pile and broadcast burning). The use of heavy equipment could damage built historical resources if present within the treatment area. The potential for these treatment activities to result in disturbance to, damage to, or destruction of built-environment structures that have not yet been evaluated for historical significance, was examined in the PEIR.

Archaeological surveys (as required by SPR CUL-4) were conducted on December 6–12, 2021, January 4-7, 2022, and January 12-14, 2022. The surveys identified five previously recorded resources and four previously undiscovered resources, including historic-era resources. All resources will be flagged and avoided prior to treatment implementation per SPR CUL-7, which requires installing exclusion zones and prohibits mechanical treatments within 100 feet of all built-environment resources. This impact is within the scope of the PEIR because the treatment activities and the intensity of ground disturbance that would occur under the proposed project are consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the treatment area, the potential to encounter built-environment structures that have not yet been evaluated for historical significance in areas outside the treatable landscape is essentially the same as within the treatable landscape; therefore, the potential impact to historical resources is also the same, as described above. SPRs applicable to this impact are CUL-1, CUL-7, and CUL-8 and have been (i.e., CUL-1) or will be implemented to minimize adverse effects on cultural resources. This impact of the proposed project is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

Impact CUL-2

Initial and maintenance treatments could result in ground disturbance as vegetation is removed, which could result in damage to unique archaeological resources or subsurface historical resources if present within a treatment area. As described above, archeological surveys identified five previously recorded resources and four previously undiscovered resources. The potential for treatment activities to result in disturbance to, damage to, or destruction of such resources was examined in the PEIR.

This impact is within the scope of the PEIR because the treatment activities and the intensity of ground disturbance that would occur under the proposed project are consistent with those analyzed in the PEIR. SPRs applicable to this impact are CUL-1, CUL-3, CUL-4, CUL-5 and CUL-8 and either have been (CUL-1, CUL-3, and CUL-4) or will be implemented to minimize adverse effects on cultural resources. In addition, SPR CUL-2 has been implemented, ensuring geographically affiliated Native American tribes have had opportunity to provide input on the presence of potentially significant resources. All identified archaeological resources will be avoided during project implementation or treated as prescribed in SPR CUL-5. Mitigation Measure CUL-2 will be applied to protect any inadvertent discoveries of archaeological resources or subsurface historical resources and has been revised to comply with stricter PWP requirements related to the distance at which activity must cease if there is a discovery. This impact would be less than significant with implementation of mitigation to protect inadvertent resource discovery; this is less severe than the significant and unavoidable impact identified in the PEIR, which was identified as such because the feasibility of protecting inadvertent discoveries throughout the treatable landscape could not be determined with any certainty. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the treatment area, the potential for discovery of archaeological resources is essentially the same within and outside the treatable landscape; therefore, the potential impact to unique archaeological resources or subsurface historical resources is also the same and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

Impact CUL-3

As described above, a Native American contact list was obtained from the NAHC, and seven tribal representatives were contacted (see Table 3-1). Responses were received from two tribal

representatives. Consultation was completed with each of the representatives, which resulted in providing additional information to the Nevada City Rancheria Nisenan and modifications to cultural resource protection measures (SPRs CUL-5 and CUL-6). These modifications include changes to preserve the confidentiality of identified resources by delineating Equipment Exclusion Zones that do not identify the specific location of resources and ensuring tribal contact information is readily available in the cultural resource protection action plan. These protection measures are compliant with, and offer the potential for additional protection beyond the CalVTP SPRs.

The potential for treatment activities to cause a substantial adverse change in the significance of a tribal cultural resource (TCR) was examined in the PEIR. Ground-disturbing treatment activities, such as the use of heavy machinery, could inadvertently damage or destroy tribal cultural resources if they are present in treatment areas. However, the letters sent to tribes pursuant to SPR CUL-2 requested information on the presence of TCRs in the treatment area and provided an opportunity for the tribes to advise on measures to protect any TCRs that are present. Two precontact sites were identified in the treatment area. The United Auburn Indian Community intends to provide input on measures to protect the two sites. Other than these two sites, no TCRs were identified by the tribes and requested modifications to the cultural resource protection approach have been incorporated into the proposed project. As described above, archaeological surveys (as required by SPR CUL-4) conducted in late 2021 and early 2022 identified five previously recorded resources and four previously undiscovered resources, including historic-era resources—all of which will be flagged and avoided. Potential impacts to archeological resources will be minimized and avoided as explained above in Impact CUL-2. SPRs CUL-5 and CUL-6 are applicable to this impact and, with modifications described above, will be implemented to minimize adverse effects on archaeological resources including TCRs if present. SPR CUL-8 is applicable to this impact and will be implemented to ensure workers are properly trained to identify and protect archaeological and cultural resources. Additional SPRs applicable to this impact are CUL-1, CUL-2, CUL-3, and CUL-4, all of which have been implemented and are complete.

The potential for adverse effects on tribal cultural resources during implementation of the proposed project is within the scope of the activities and impacts addressed in the PEIR because the treatment activities and intensity of ground disturbance are consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, tribal cultural affiliations present in areas outside the treatable landscape are essentially the same as those within; therefore, the potential impact to tribal cultural resources is also the same. This impact of the proposed project is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

Impact CUL-4

Initial and maintenance treatment activities could uncover human remains if present in a treatment area. The potential for treatment activities to uncover human remains was examined in the PEIR. The NCIC records search did not reveal any known burials or sites containing human remains, but an inadvertent discovery could occur. This impact is within the scope of the PEIR because the intensity of ground disturbance under the proposed project is consistent with what was analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the treatment area, the potential for uncovering human remains during implementation of the treatment project is essentially the same within and outside the

treatable landscape and treatment activities; therefore, the impact related to disturbance of human remains is also the same, as described above. Additionally, consistent with the PEIR, the proposed project would comply with California Health and Safety Code Sections 7050.5 and Public Resources Code Section 5097 in the event of a discovery. This impact of the proposed project is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

New Archaeological, Historical, and Tribal Cultural Resource Impacts
Any cultural resources discovered during implementation of SPR CUL-4 will be avoided or treated as prescribed in SPR CUL-5. Implementation of SPR CUL-7 would avoid impacts to any built historical resources. The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatment project and determined they are consistent with the applicable environmental and regulatory conditions presented in the CalVTP PEIR (Sections 3.5.1, "Environmental Setting," and 3.5.2, "Regulatory Setting,"). The project proponent has also determined that including land from outside the CalVTP treatable landscape in the proposed treatment areas constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the treatment area, the existing environmental and regulatory conditions pertinent to archaeological, historical, or tribal cultural resources that are present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the impacts of the proposed treatment project are also consistent with those covered in the PEIR.

No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not give rise to any new significant impacts. Therefore, no new impact related to archaeological, historical, or tribal cultural resources would occur that is not covered in the PEIR.

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3.5 Biological Resources

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|---|--|---|---|---|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | 10.2 | | | | |
| Impact BIO-1: Substantially Affect Special-Status Plant Species Either Directly or Through Habitat Modifications | LTSM | Impact BIO-1, pp 3.6- 132–3.6- 139 | Yes | AQ-3 AQ-4 BIO-1 BIO-2 BIO-6 BIO-7 BIO-9 GEO-1 GEO-3 GEO-4 GEO-5 GEO-7 HYD-4 | BIO-1b | LTSM | No | Yes |
| Impact BIO-2: Substantially Affect Special-Status Wildlife Species Either Directly or Through Habitat Modifications | LTSM ³ | Impact BIO-2, pp 3.6- 139–3.6- 187 | Yes | BIO-1 BIO-2 BIO-4 BIO-9 BIO-10 BIO-11 HYD-3 HYD-4 | BIO-2a BIO-2b | LTSM | No | Yes |
| Impact BIO-3: Substantially Affect Riparian Habitat or Other Sensitive Natural Community Through Direct Loss or Degradation that Leads to Loss of Habitat Function | LTSM | Impact BIO-3, pp 3.6- 187–3.6- 192 | Yes | BIO-1 BIO-2 BIO-3 BIO-4 BIO-5 BIO-6 BIO-9 GEO-1 GEO-3 GEO-4 GEO-5 GEO-7 HYD-4 | BIO-3a | LTSM | No | Yes |

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|---|--|--|---|---|---|--|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Impact BIO-4: Substantially Affect State or Federally Protected Wetlands | LTSM | Impact BIO-4, pp 3.6- 192–3.6- 193 | No | BIO-1 BIO-2 BIO-4 GEO-1 GEO-3 GEO-4 GEO-5 GEO-7 HYD-1 HYD-4 | None | LTS | No | Yes |
| Impact BIO-5: Interfere Substantially with Wildlife Movement Corridors or Impede Use of Nurseries | LTSM | Impact BIO-5, pp 3.6- 193–3.6- 197 | Yes | BIO-1 BIO-2 BIO-3 BIO-4 BIO-11 HYD 4 | BIO-5 | LTSM | No | Yes |
| Impact BIO-6: Substantially Reduce Habitat or Abundance of Common Wildlife | LTS | Impact BIO-6, pp 3.6- 197–3.6- 199 | Yes | BIO-1 BIO-2 BIO-12 | None | LTS | No | Yes |
| Impact BIO-7: Conflict with Local Policies or Ordinances Protecting Biological Resources | No Impact | Impact BIO-7, pp 3.6- 199 | Yes | AD-3 | NA | No Impact | No | Yes |
| Impact BIO-8: Conflict with the Provisions of an Adopted Natural Community Conservation Plan, Habitat Conservation Plan, or Other Approved Habitat Plan | No Impact | Impact BIO-8, pp 3.6- 199–3.6- 200 | No | NA | NA | NA | NA | NA |

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LTS: less than significant; SU: significant and unavoidable; LTSM: less than significant with mitigation
 NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact. None: there are SPRs and/or MMs identified in the PEIR for this impact, but none are applicable to the treatment project.

The PEIR identified impacts to bumble bees as significant and unavoidable (SU). Based on the reconnaissance-level survey conducted in May 2021 (Attachment B), no bumble bee species are considered likely to occur in the project treatment area.

| New Biological Resources Impacts: Would the treatment result in other impacts to biological resources that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion | |
|--|----------------------------|--|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant | |
| [identify new impact here, if applicable; add rows as needed] | | | | |

Discussion

In accordance with SPR BIO-1, Stillwater Sciences conducted a data review to compile a list of the special-status plant, fish, and wildlife species, designated critical habitat for federally listed species, and sensitive natural communities previously documented in the region of the project area (Attachment B). The list was developed through a query of the following resources:

- CDFW's California Natural Diversity Database (CNDDB) (CDFW 2021a);
- U.S. Fish and Wildlife Service's (USFWS) Information for Planning and Conservation (IPaC) portal (USFWS 2021);
- National Oceanic and Atmospheric Administration (NOAA) Fisheries, West Coast Region, online Protected Resources Application (NOAA Fisheries 2021); and
- CNPS's online Inventory of Rare and Endangered Vascular Plants of California (CNPS 2021).

The CNDDB and CNPS database queries were based on a search of the U.S. Geological Survey 7.5-minute quadrangle in which the project area is located (Nevada City) and the surrounding eight quadrangles (Camptonville, Pike, North Bloomfield, Chicago Park, Grass Valley, Rough and Ready, French Corral, and Challenge), collectively referred to as the project region. The USFWS IPaC query was based on the spatial extent of the project area and vicinity.

To develop a preliminary vegetation map, California Wildlife Habitat Relationship (CWHR) vegetation types mapped by U.S. Department of Agriculture, Forest Service CalVeg (USDA Forest Service 2021) were reviewed in a geographic information system (GIS) and clipped to the project area. CalVeg polygon boundaries were then revised and re-digitized based upon signatures observed in 2016 aerial imagery (ESRI 2021). The CWHR classifications were converted to *Manual of California Vegetation* (CNPS 2022) alliances to identify sensitive natural communities classified within each CWHR type (and Regional Dominance Type, in the case of the Mixed Chaparral habitat type).

A Stillwater botanist (R. Thoms) and wildlife biologist (A. Kertesz) conducted a reconnaissance-level survey of the project area on 11 May 2021 to identify suitable habitats and determine the potential for the project area to support each of the special-status plants, fish, and wildlife identified in the queries. The 569.5-acre project area is dominated primarily by native woody vegetation (Table 3-2). Elevations in the project area range from approximately 1,605–2,770 feet above sea level (Google Earth 2021).

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Table 3-2. California Wildlife Habitat Relationship (CWHR) types in the project area (acres).

| CWHR Type | Acres | Percent of Project Area |
|--------------------------|-------|-------------------------|
| Douglas Fir | 61.3 | 10.8% |
| Mixed Chaparral | 27.9 | 4.9% |
| Montane Hardwood | 324.7 | 57.0% |
| Montane Hardwood-Conifer | 47.5 | 8.3% |
| Ponderosa Pine | 108.2 | 19.0 |
| Total | 569.5 | 100.0% |

Of the 16 special-status plant and non-vascular species previously documented in the project region (Attachment B), seven were determined to have no potential to occur in the project area due to lack of suitable habitat (e.g., no freshwater marshes and swamps, no serpentine soil, outside of elevation range); the remaining nine special-status plant and non-vascular species have the potential to occur in the project area (Table 3-3). Sixteen special-status fish and wildlife (invertebrate, amphibian, reptile, bird, and mammal) species were identified from the database queries as having been previously documented in the project region (Attachment B), twelve of which were determined to have low or no potential to occur in the project area due to lack of suitable habitat. The remaining four special-status wildlife species have a moderate potential to occur in the project area (Table 3-3). None of these special-status plant and wildlife species were observed during the May 2021 reconnaissance-level survey; however, protocol-level surveys for these species were not conducted at that time.

Table 3-3. Special-status species with the potential to occur in the project area.

| Scientific name | Common name | Status ¹ (CRPR / Federal / State) | Lifeform | Habitat | Potential to occur ² |
|---|-----------------------------|--|-------------------------------|---|--|
| Vascular plant species | | | | | |
| Carex cyrtostachya | Sierra arching sedge | 1B.2/-/- | perennial herb | Mesic lower montane coniferous forest, meadows and seeps, marshes and swamps, and margins of riparian forest | Yes, suitable habitat may be present |
| Clarkia mosquinii | Mosquin's clarkia | 1B.1/-/- | annual herb | Rocky or roadside areas in cismontane woodland and lower montane coniferous forest | Yes, suitable habitat may be present |
| Eriogonum umbellatum var. ahartii | Ahart's buckwheat | 1B.2 / - / - | perennial herb | Serpentinite, slopes, or openings in chaparral and cismontane woodland | Yes, suitable habitat may be present |
| Juncus digitatus | finger rush | 1B.1/-/- | annual herb | Openings of cismontane woodland, openings of lower montane coniferous forest, and xeric vernal pools | Yes, suitable habitat may be present |
| Lewisia cantelovii | Cantelow's lewisia | 1B.2/-/- | perennial herb | Mesic, granitic, and sometimes serpentinite seeps in broadleafed upland forest, chaparral, cismontane woodland, and lower montane coniferous forest | Yes, suitable habitat may be present; previously documented adjacent to project area |
| Poa sierrae | Sierra blue grass | 1B.3 / - / - | perennial rhizomatous herb | Openings in lower montane coniferous forest | Yes, suitable habitat may be present |
| Rhynchospora capitellata | brownish beaked-rush | 2B.2/-/- | perennial herb | Mesic areas in lower montane coniferous forest, meadows and seeps, marshes and swamps, and upper montane coniferous forest | Yes, suitable habitat may be present |
| Streptanthus tortuosus subsp. truei | True's mountain jewelflower | 1B.1/-/- | perennial herb | Partial shade on steep rocky slopes in lower montane coniferous forest | Yes, suitable habitat may be present |

| Scientific name | Common name | Status ¹ (CRPR / Federal / State) | Lifeform | Habitat | Potential to occur ² |
|-----------------------|--------------------------------|--|-----------|---|---|
| Non-vascular species | | | | | |
| Lycopodiella inundata | inundated bog club- moss | T ZB.Z/-/- I I montane conferous forest, and I | | Yes, suitable habitat may be present | |
| Wildlife species | | | | | |
| Actinemys marmorata | western pond turtle | -/-/SSC | reptile | Permanent, slow-moving fresh or brackish water with available basking sites and adjacent open habitats or forest for nesting | Moderate; Meyers Ravine Creek, a perennial tributary to the South Yuba River in the project area, may serve as a migration corridor; upland areas adjacent to Rock Creek may serve as wintering or nesting habitat, and several occurrences have been documented in the project region (CDFW 2021a) |
| Rana boylii | foothill yellow-legged frog | -/-/ST | amphibian | Shallow tributaries and mainstems of perennial streams and rivers, typically associated with cobble or boulder substrate | Moderate; suitable habitat is present in the project area in Meyers Ravine Creek (a perennial tributary to the South Yuba River), and Rock Creek, which is adjacent to the project area. The species is regularly documented in the South Yuba River near the project area (CDFW 2021a) |

| Scientific name | Common name | Status ¹ (CRPR / Federal / State) | Lifeform | Habitat | Potential to occur ² |
|----------------------------|-----------------------------|--|----------|---|---|
| Accipiter gentilis | northern goshawk | -/-/SSC, BOFS | bird | Mature and old-growth stands of coniferous forest, middle and higher elevations; nests in dense part of stands near an opening | Low-to-Moderate; marginal breeding and foraging habitat is present in the project area and project vicinity |
| Corynorhinus townsendii | Townsend's big-eared bat | -/-/ SSC | mammal | Most abundant in mesic habitats, also found in oak woodlands, desert, vegetated drainages, caves or cavelike structures (including basal hollows in large trees, mines, tunnels, and buildings) | Moderate; suitable hibernation and roosting habitat may be present in the project area, may forage in the project area |

¹ Status:

Federal

No federal status

State

BOFS California Board of Forestry Sensitive SSC CDFW Species of Special Concern ST Listed as threatened under the California

Endangered Species Act

No state status

California Rare Plant Rank (CRPR)

- 1B Plants rare, threatened, or endangered in California and elsewhere
- 2B Plants rare, threatened, or endangered in California, but more common elsewhere
- 0.1 Seriously threatened in California (high degree/immediacy of threat)
- 0.2 Fairly threatened in California (moderate degree/immediacy of threat)
- 0.3 Not very threatened in California (low degree/immediacy of threats or no current threats known)

Potential to occur for plants is either Yes or No Potential to occur for wildlife is No, Low, Moderate, or High

Impact BIO-1

Project implementation and maintenance activities have the potential to affect the nine specialstatus plant and non-vascular species with the potential to occur in the treatment area, as described below.

Four of the nine special-status plant and non-vascular species are found in variously wet and mesic areas (e.g., streambanks and riparian forests) (Table 3-3). As described in Section 2, no manual or mechanical treatments would occur within 100 feet of the center of Meyers Ravine Creek and Rock Creek and only light treatment would occur between 100 and 200 feet of the waterways. The proposed treatments are thus designed to provide riparian protection equivalent to or better than SPR HYD-4, which requires 50-100-foot Watercourse and Lake Protection Zones (WLPZs) to be established around all aquatic habitats in the project area. Implementation of SPR BIO-4 will further limit disturbance and reduce the potential for impacts to the four species found in wet and mesic habitats. Two of the nine plants are herbaceous annual species; project activities may be conducted outside of the dormant season for these species, therefore SPR BIO-1(2) applies and protocol-level surveys (i.e., SPR BIO-7) for these species would be required. The remaining three special-status plants are perennial herbs and it is not feasible for the proposed treatment activities to avoid their habitat or growing season, therefore SPR BIO-1(2) applies and protocol-level surveys (i.e., SPR BIO-7) will also be required. If any special-status plants are identified during these surveys, impacts would be avoided with the implementation of Mitigation Measure BIO-1b, including a no-disturbance buffer of at least 50 feet around the species. None of the special-status plant species with potential to occur in the treatment area are listed under the federal or state Endangered Species Acts, therefore Mitigation Measure BIO-1a would not be applicable.

The proposed treatment project could directly and/or indirectly adversely affect the special-status plant species with the potential to occur in the treatment area (Table 3-3). The PEIR analyzed the potential for proposed treatment activities to adversely affect the special-status plant species addressed above. A small proportion of land in the project area is outside the CalVTP treatable landscape but there are no significant differences in habitat structure or function between these areas and those in the treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impacts of the proposed project on special-status plant species are within the scope of the PEIR. The proposed project will implement SPRs AQ-3, AQ-4, BIO-1, BIO-2, BIO-6, BIO-7, BIO-9, GEO-1, GEO-3, GEO-4, GEO-5, GEO-7, and HYD-4 and Mitigation Measure BIO-1b to avoid or minimize adverse effects on special-status species as described above. The proposed project would not constitute a substantially more severe significant impact than those analyzed in the PEIR.

Impact BIO-2

Western pond turtle

Aquatic habitat features that could support western pond turtle are not present in the project treatment area; however, terrestrial habitat alongside Rock Creek and the South Yuba River could potentially support nesting or adult overwintering. These habitats could fall within the project area boundary near the confluence of these two channels. Most female pond turtles nest within 50 meters (approximately 165 feet) of water; however, individuals have been documented nesting over 400 meters (approximately 1,315 feet) away (Lovich and Meyer 2002). Adult turtles in the South Yuba River could also move off-channel into Meyers Ravine Creek during high flow events. However, the steep gradient between the project area and the confluence with the South Yuba River likely precludes turtles from entering the project area in this drainage.

Neither Rock Creek nor the South Yuba River are within the project treatment area. Meyers Ravine Creek and the intermittent and ephemeral creeks within the project area are smaller aquatic features identified during the reconnaissance-level survey conducted in May 2021 (Attachment B). Treatment activities would not be conducted within 100 feet of aquatic habitats, so adverse effects to any western pond turtles potentially present in these areas would be avoided. However, manual and mechanical treatments, prescribed burning activities, and prescribed herbivory—whether part of the initial treatment or follow-up maintenance—could adversely affect breeding western pond turtles or their nests, or overwintering adults in adjacent terrestrial habitat. Adults and eggs could be injured or killed by heavy equipment, vehicles, livestock, or fence installation for prescribed herbivory enclosures. Likewise, turtles seeking cover in burn piles or in the vicinity of broadcast burns prior to ignition could be injured or killed by burning activities. The PEIR analyzed the potential for these treatment activities to adversely affect special-status aquatic reptiles, including western pond turtle.

The May 2021 reconnaissance-level survey identified a moderate potential for western pond turtle to occur in the vicinity of Rock Creek and the South Yuba River (Attachment B). Western pond turtles have been found in uplands adjacent to aquatic habitat throughout the year (Reese and Welsh 1997); adults seek refuge from high flows in winter, while nesting occurs from late April-August, depending on elevation (Scott et al. 2008), and hatchlings emerge in the spring. Because the species has the potential to occupy terrestrial habitat in limited portions of the project area year-round, a limited operating period would not be sufficient to avoid all potential adverse effects on the species. Per SPR HYD-4, 50-100-foot WLPZs will be established around all aquatic habitats in the project area, depending on watercourse class and slope steepness. Furthermore, as described in Section 2, no manual or mechanical treatments would occur within 100 feet of the center of Meyers Ravine Creek and Rock Creek and only light treatment would occur between 100 and 200 feet of the waterways. In tandem, these measures would limit treatment activities in the terrestrial habitats that nesting or overwintering western pond turtle are most likely to occupy and minimize the potential for negative interactions with the species. However, because backing fires may be allowed to naturally burn to extinguishment within WLPZs, and treatment activities in upland areas outside the 100-foot no-treatment buffer and the WLPZs have the potential to adversely affect turtles if they occur in these areas, a qualified biologist or Registered Professional Forester (RPF) will conduct focused surveys in suitable habitat prior to the start of treatment activities as specified in SPR BIO-10. If western pond turtles or their nests are identified during surveys, potential adverse effects will be avoided by establishing a no-disturbance buffer of sufficient size, location, and establishment duration pursuant to Mitigation Measure BIO-2b. A qualified biologist, biological technician, or RPF will monitor treatment activities in the vicinity of these buffers for effectiveness. All personnel carrying out treatment activities will receive sensitive biological resources training required under SPR BIO-2, which would further reduce the likelihood of adverse impacts to the species.

Habitat function would be maintained because treatment activities would not occur in aquatic habitat and would be limited within WLPZs and adjacent terrestrial habitat within 200 feet of waterways. Likewise, SPR BIO-4 restricts treatment activities in riparian areas that could impair riparian habitat function; thus, the proposed project would not alter the long-term suitability of terrestrial habitat for turtle nesting or overwintering. Furthermore, restricting prescribed herbivory maintenance treatments in riparian areas, as required by SPR HYD-3, would reduce the likelihood of resultant sediment inputs to aquatic habitats which could adversely affect western pond turtle habitat.

Although a small proportion of land in the project area is outside the CalVTP treatable landscape, there are no significant differences between habitat structure or function in these areas and those in the adjacent treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the CalVTP treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impact of the proposed project on western pond turtle is within the scope of the PEIR and would not constitute a substantially more severe significant impact than those analyzed in it.

Foothill yellow-legged frog

Aquatic habitat that could support foothill yellow-legged frog breeding is not present in the project treatment area; however, Rock Creek and the South Yuba River, which are adjacent to the project area, contain suitable breeding habitat. Furthermore, Meyers Ravine Creek and the intermittent/ephemeral creeks in the project area could serve as overwintering habitat or as movement corridors. Upland habitat use is not well understood for the species; foothill yellow-legged frogs have been documented moving overland in summer and winter and have been observed in terrestrial areas several hundred meters from the nearest aquatic habitat (Van Hattem 2018). Bourque (2008) rarely encountered frogs more than 12 meters (40 feet) from stream channels, whereas Cook et al. (2012) reported encountering 60 juvenile frogs on roads between 16 and 331 meters (approximately 197–1,086 feet) from a natal stream over a four-year period.

Treatment activities would not be conducted within 100 feet of Rock Creek and Meyers Ravine Creek, and only light treatment would occur between 100 and 200 feet of these waterways, so adverse effects to all life stages potentially present in these areas would be avoided. However, preparatory activities, manual and mechanical treatment, prescribed burning activities, and prescribed herbivory occurring more than 100 feet from aquatic habitat—whether part of the initial treatment or maintenance treatments—could adversely affect foothill yellow-legged frogs occurring in adjacent terrestrial habitat in the project treatment area. Individuals could be injured or killed by heavy equipment, vehicles, livestock, or fence installation for prescribed herbivory enclosures. Likewise, individuals seeking refuge in burn piles or the vicinity of broadcast burns prior to ignition could be injured or killed by burning activities. The PEIR analyzed the potential for these treatment activities to adversely affect listed, special-status amphibian species including foothill yellow-legged frog.

The reconnaissance-level survey identified a moderate potential for foothill yellow-legged frog to occur in the vicinity of aquatic habitat features in the project area (Attachment B). Because the species may occur in these areas year-round, a limited operating period would not be sufficient to avoid all potential adverse effects on the species. Per SPR HYD-4, 50-100-foot WLPZs will be established around all aquatic habitats in the project area, depending on watercourse class and slope steepness. Furthermore, as described in Section 2, no manual or mechanical treatments would occur within 100 feet of the center of Meyers Ravine Creek and Rock Creek and only light treatment would occur between 100 and 200 feet of the waterways. In tandem, these measures would limit treatment activities in the terrestrial habitats that foothill yellow-legged frogs are most likely to occupy and minimize the potential for negative interactions with the species. However, because backing fires may be allowed to naturally burn to extinguishment within WLPZs, and treatment activities in upland areas outside the 100-foot no-treatment buffer and the WLPZs have the potential to adversely impact foothill yellow-legged frogs if they occur in these areas, a qualified biologist or RPF will conduct focused surveys for the species in suitable habitat prior to the start of treatment activities, as specified in SPR BIO-10. If foothill yellow-legged frogs are observed during surveys, potential adverse effects will be avoided by establishing a nodisturbance buffer pursuant to Mitigation Measure BIO-2a. Because foothill yellow-legged frog is a state-listed species, the project proponent will consult with the California Department of Fish and Wildlife (CDFW) to determine an appropriate size, location, and establishment duration for no-disturbance buffers implemented under Mitigation Measure BIO-2a. A qualified biologist, biological technician, or RPF will also monitor treatment activities in the vicinity of no-disturbance buffers. All personnel carrying out treatment activities will receive sensitive biological resources training required under SPR BIO-2, further reducing the likelihood of adverse impacts to the species.

Habitat function would be maintained because no treatment activities would occur in aquatic habitat and treatment would be limited within WLPZs and in adjacent riparian and upland habitat within 200 feet of waterways. Likewise, implementation of SPR BIO-4 will restrict treatment activities in riparian areas that could impair riparian habitat function; thus, the proposed project would not alter the capacity of adjacent terrestrial habitat to support nesting or overwintering. Implementing SPR HYD-3 to exclude prescribed herbivory from riparian areas will reduce the likelihood of sediment inputs to aquatic habitats resulting from this activity and avoid adverse impacts to foothill yellow-legged frogs and their habitat.

Although a small proportion of land in the project area is outside the CalVTP treatable landscape, there are no significant differences between habitat structure or function in these areas and those in the adjacent treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impact of the proposed project on foothill yellow-legged frog is within the scope of the PEIR and would not constitute a substantially more severe significant impact than those analyzed in it.

Northern goshawk

The project treatment area contains elements of suitable nesting habitat for northern goshawk (Attachment B), though it is limited in extent. Goshawks prefer to nest in mature, old-growth forest with stands of large trees, open understories, and a mosaic of canopy breaks. In contrast, the project area mainly contains shorter, second-growth forest with a dense understory. Furthermore, human activities, including recreation on a network of mountain biking and hiking trails, vehicular travel on roads, and residences, are likely to deter goshawks from establishing nests throughout much of the project area. Mixed-conifer stands adjacent to Rock Creek and Meyers Ravine Creek constitute the species' most typical nesting and foraging habitat. Nevertheless, northern goshawks have the potential to occur in and near the treatment area and thus manual and mechanical treatments, prescribed burning activities, and prescribed herbivory whether part of the initial treatment or follow-up maintenance—could directly affect northern goshawks, especially during sensitive periods like the nesting season. While adult goshawks are sufficiently mobile to avoid direct injury resulting from treatment activities, incubating adults could be alarmed by acoustic or visual disturbance, human presence, or burning activities, which could cause nest abandonment and the loss of eggs or young. The PEIR analyzed the potential for these treatment activities to adversely affect special-status tree-nesting species including northern goshawk.

The reconnaissance-level survey identified a moderate potential for northern goshawk to occur in some portions of the project area (Attachment B). If treatment activities occur during the nesting season (February 15–August 31), a qualified biologist or RPF will conduct focused surveys in suitable nesting habitat prior to treatment, as specified in SPR BIO-10. Surveys will be timed to maximize the likelihood of detecting active nests based on the species' breeding phenology at similar elevations. No additional mitigation would be required if active nests are not identified. If

an active goshawk nest is identified during focused surveys, adverse effects will be avoided by establishing a no-disturbance buffer around the nest until a qualified biologist or RPF determines that it is no longer active, per Mitigation Measure BIO-2b. Buffer size would range from 500–1,320 feet, with the area determined by the qualified biologist or RPF, to minimize disturbance based on the landscape surrounding the nest location and the treatment activities planned in the vicinity. A qualified biologist, biological technician, or RPF will monitor the effectiveness of the buffer during treatment and make any necessary adjustments to buffer boundaries. All personnel carrying out treatment activities will receive sensitive biological resources training required under SPR BIO-2, further reducing the likelihood of adverse impacts to the species. Potential impacts to northern goshawks will be further minimized by implementing SPR BIO-11, which requires wildlife-friendly fencing for prescribed herbivory enclosures and would reduce the likelihood of collisions or entanglement.

Habitat function would not be lost for northern goshawk because key habitat components, such as large trees and snags, would be retained under the project design. If northern goshawks are determined to be present in the project area, treatments designed to retain at least 60% canopy cover—a percentage preferred by the species (Bedford et al. 1988)—would be implemented per Mitigation Measure BIO 2-b. Furthermore, implementing SPR BIO-4 in riparian habitat, which restricts the removal of large, native, riparian hardwood trees, stipulates at least 75% of overstory canopy be retained, and limits treatments to the removal of uncharacteristic fuel loads, will maintain beneficial conditions in the areas which contain the most suitable nesting habitat. Proposed treatment activities may reduce the density of understory vegetation and fuel elements that could support common small mammal prey species, such as brush, leaf litter, or downed logs. However, the project area exists within a contiguous habitat block, and foraging opportunities would not be diminished in adjacent areas. Likewise, populations of small- and medium-sized birds, an important component of goshawk diet, are unlikely to be significantly reduced by treatment activities. Restoring the project area to a more natural fire regime and forest structure is unlikely to have long-term adverse effects on prey abundance. Thus, foraging habitat function would be retained.

Although a small proportion of land in the project area is outside the CalVTP treatable landscape, there are essentially no differences between habitat structure or function in these areas and those in the adjacent treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impact of the proposed project on northern goshawk is within the scope of the PEIR and would not constitute a substantially more severe significant impact than those analyzed in it.

Townsend's big-eared bat

The project treatment area contains suitable foraging and roosting habitat for Townsend's bigeared bat (Attachment B). Mixed conifer-deciduous forest, shrub/scrub habitat, and riparian areas with available free water could support foraging by the species. More importantly, the project area contains multiple features that bats could utilize as roosting habitat or hibernacula, including one unused building and several abandoned mine shafts. Manual and mechanical treatments, prescribed burning activities, and prescribed herbivory—whether part of the initial treatment or maintenance treatments—could directly and/or indirectly affect Townsend's big-eared bat occurring in the project area, especially during sensitive periods like the maternity season (spring–early fall). Females in maternity roosts could be alarmed by acoustic or visual disturbance, human presence, or burning activities, which could cause roost abandonment and the death of flightless young. Foraging adults are unlikely to be affected by project-related activities.

The PEIR analyzed the potential for these treatment activities to adversely affect special-status bat species, including Townsend's big-eared bat.

The reconnaissance-level survey identified a moderate potential for Townsend's big-eared bat to occur in the project area (Attachment B). Though focused surveys were not conducted, no bats or evidence of their presence were observed in the unused building. To avoid potential adverse impacts to the species, a qualified biologist or RPF will conduct focused surveys in habitat most likely to support roosting bats (e.g., abandoned mine shafts) prior to treatment, as specified in SPR BIO-10. No additional mitigation would be required if active roosts are not identified. If an active roost is identified, an appropriately sized no-disturbance buffer will be established around the roost until a qualified biologist or RPF determines that it is no longer active, as specified under Mitigation Measure BIO-2b. Buffers will generally be a minimum of 100-feet in diameter, or sized based on consultation with CDFW. No mechanical or manual treatments or prescribed burning will occur within the buffer. A qualified biologist, biological technician, or RPF will monitor the effectiveness of the buffer during treatment and make any necessary adjustments to the boundaries. All personnel carrying out treatment activities will receive sensitive biological resources training required under SPR BIO-2, further reducing the likelihood of adverse impacts to the species. Potential impacts to Townshend's big-eared bats will be further minimized by implementing SPR BIO-11, which requires wildlife-friendly fencing for prescribed herbivory enclosures and would reduce the likelihood of collisions or entanglement.

Roosting habitat function would not be lost because treatment activities would not alter buildings and cave-like features present in the treatment area. Likewise, proposed treatment activities would not diminish foraging opportunities or reduce the quality of foraging habitat in the project area in the long term.

Although a small proportion of land in the project area is outside the CalVTP treatable landscape, there are essentially no differences between habitat structure or function in these areas and those in the adjacent treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impact of the proposed project on Townsend's big-eared bat is within the scope of the PEIR and would not constitute a substantially more severe significant impact than those analyzed in it.

Conclusion

The proposed treatment project could directly and/or indirectly adversely affect special-status wildlife species with the potential to occur in the treatment area (Table 3-3). The PEIR analyzed the potential for proposed treatment activities to adversely affect the special-status wildlife species addressed above. A small proportion of land in the project area is outside the CalVTP treatable landscape but there are no significant differences in habitat structure or function between these areas and those in the treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impacts of the proposed project on special-status wildlife species are within the scope of the PEIR. The proposed project will implement SPRs BIO-1, BIO-2, BIO-4, BIO-9, BIO-10, BIO-11, BIO-12, HYD-3, and HYD-4 and Mitigation Measures BIO-2a and BIO-2b, to avoid or minimize adverse effects on special-status species as described above. The proposed project would not constitute a substantially more severe significant impact than those analyzed in the PEIR.

Impact BIO-3

The proposed initial and maintenance treatments have the potential to affect riparian habitats or other sensitive natural communities either through direct loss or degradation that leads to loss of habitat function in the proposed treatment area.

Prior to conducting a reconnaissance-level field survey, a query of the CNDDB was conducted to identify sensitive natural communities previously documented in the project region and none were found (CDFW 2021b). Additionally, the California Wildlife Habitat Relationship (CWHR) vegetation types mapped by the U.S. Department of Agriculture, Forest Service CalVeg (USDA Forest Service 2021) were reviewed in a geographic information system (GIS). The CWHR classifications were converted to *Manual of California Vegetation* (CNPS 2022) alliances to identify sensitive natural communities classified within each CWHR type (and Regional Dominance Type, in the case of the Mixed Chaparral habitat type). The reconnaissance-level field survey (conducted pursuant to SPR BIO-1) determined that the only sensitive natural community with the potential to occur in the proposed treatment area was bigleaf maple forest and woodland (Attachment B). Following the reconnaissance-level field survey, the Mixed Chaparral habitat type was further refined to the whiteleaf manzanita chaparral alliance. Although not a sensitive natural community, all chaparral communities are considered in the PEIR such that the effects of habitat loss and type conversion are avoided.

Within the proposed treatment area, bigleaf maple forests and woodlands were exclusively found in riparian habitats. SPR BIO-3 will be implemented to identify and record the limits of this sensitive natural community such that treatments are designed to avoid loss or degradation of riparian habitats (SPR BIO-4 and Mitigation Measure BIO-3a). As described in Section 2, no manual or mechanical treatments would occur within 100 feet of the center of Meyers Ravine Creek and Rock Creek and only light treatment would occur between 100 and 200 feet of the waterways. The proposed treatments are thus designed to provide riparian protection equivalent to or better than SPR HYD-4, which requires 50–100-foot WLPZs to be established around all aquatic habitats in the treatment area. Implementation of SPR BIO-4 will further limit disturbance and reduce the potential for impacts to riparian habitats and sensitive natural communities within the treatment area. Mitigation Measure BIO-3a will be implemented pursuant to SPR BIO-4 such that treatments would be designed to avoid loss of riparian habitat and sensitive natural communities.

Within the proposed treatment area, 27.9 acres of whiteleaf manzanita chaparral alliance were documented. Whiteleaf manzanita (*Arctostaphylos viscida*) dominated the canopy, with toyon (*Heteromeles arbutifolia*) frequently present. Cover in the tree canopy, when present, was sparse (<10 percent) and generally included black oak (*Quercus kelloggii*) and canyon live oak (*Quercus chrysolepis*). Cover in the shrub layer was generally very dense to complete, while cover in the herbaceous layer was generally sparse to nonexistent. The estimated fire return interval for this alliance is 20–70 years (CNPS 2022). According to the CalVTP Treatable Landscape tool (CAL FIRE 2022), the condition class within the proposed treatment area is predominantly condition class 1 (i.e., no or only minimal departure from natural regime; fire behavior is expected to be natural with low likelihood of loss of habitat via type conversion). To avoid the effects of type conversion, SPR BIO-5 will be implemented as follows:

All whiteleaf manzanita chaparral patches would be considered with respect to the scale at
which the effects of type conversion could potentially occur. Whiteleaf manzanita
chaparral was documented in four separate patches, ranging in size from 0.35 acres to
16.98 acres. The spatial scale at which a patch of vegetation meets the threshold of
requiring consideration for potential effects is imprecise; CDFW/CNPS have indicated in

- presentations that roughly 1/8th to 1/10th of an acre is the minimum mapping unit but there are multiple factors (e.g., sensitive natural community rank, size of the assessment area as a whole) to consider in raising or lowering that spatial threshold. Given that the smallest patch is more than three times that of the general guidance, all patches would be considered relevant for avoiding type conversion.
- Retention plots would be established within each of the four chaparral areas such that a
 minimum of 35% of the area is retained in intact patches. This percent coverage would
 ensure the membership rule for the whiteleaf manzanita alliance (>30% relative canopy
 cover of mature shrubs) would still be met (CNPS 2022) while the mature retained shrubs
 would be sources of food for wildlife and natural recruitment of the alliance via
 regeneration from seed.

The proposed treatment project could directly and/or indirectly adversely affect the riparian habitats, sensitive natural communities, and chaparral within the treatment area. Given that the PEIR analyzed the potential for proposed treatment activities to adversely affect the riparian habitats, sensitive natural communities, and chaparral addressed above and the proposed treatments are consistent with those analyzed in the PEIR, the potential impacts of the proposed project on these habitats are within the scope of the PEIR. SPRs applicable to Impact BIO-3 include SPRs BIO-1, BIO-2, BIO-3, BIO-4, BIO-5, BIO-6, BIO-9, GEO-1, GEO-3, GEO-4, GEO-5, GEO-7, and HYD-4. These SPRs will be implemented to maintain habitat function and prevent direct loss or degradation of riparian habitat (including bigleaf maple forest and woodland), and chaparral. The proposed project will also implement Mitigation Measure BIO-3a to avoid or minimize adverse effects on riparian habitat and sensitive natural communities. The proposed project would not constitute a substantially more severe significant impact than those analyzed in the PEIR.

Impact BIO-4

The proposed treatment area is adjacent to Meyers Ravine Creek and Rock Creek, both of which are considered waters under the jurisdiction of the U.S. Army Corps of Engineers and CDFW (i.e., waters of the U.S. and Waters of the State, respectively). Other than these two creeks, no state or federally protected wetlands are known to occur in the proposed treatment area. During the reconnaissance-level survey in May 2021—conducted pursuant to SPR BIO-1—these waters of the U.S. and Waters of the State were identified but no wetlands were found. These waters were not delineated but were entirely within riparian corridors.

The proposed initial and maintenance treatments have the potential to affect these waters, either directly or indirectly. Per SPR BIO-4, the treatment area was designed to exclude the aquatic habitat in the project vicinity (e.g., South Yuba River, Rock Creek). As described in Section 2, no manual or mechanical treatments would occur within 100 feet of the center of Meyers Ravine Creek and Rock Creek and only light treatment would occur between 100 and 200 feet of the waterways. The proposed treatments are thus designed to provide riparian protection equivalent to or better than SPR HYD-4, which requires 50–100-foot WLPZs to be established around all aquatic habitats in the project area. Prior to implementation, a qualified biologist or RPF will survey and mark the extent of any additional waters and wetlands and a no-disturbance buffer of at least 25 feet will be established with flagging or fencing. Within the identified waters and buffer, ground disturbance, herbicide use, fire ignition, and fire accelerant use would be prohibited. With the implementation of SPR BIO-4 and SPR HYD-4, riparian habitats will be avoided and any impacts to state or federally protected wetlands as a result of the project would be less than significant.

Because waters of the state and U.S. in and adjacent to the treatment area will be identified and fully avoided, the proposed treatment project is not expected to adversely affect these features directly or indirectly. The PEIR analyzed the potential for proposed treatment activities to adversely affect the waters and wetlands addressed above. Given that the proposed treatments are consistent with those analyzed in the PEIR, the potential impacts of the proposed project on waters of the state and U.S. are within the scope of the PEIR. SPRs BIO-1, BIO-2, BIO-4, GEO-1, GEO-3, GEO-4, GEO-5, GEO-7, HYD-1, and HYD-4 are applicable to Impact BIO-4 and will be implemented to avoid or minimize potential impacts to waters of the U.S. and Waters of the State. The proposed project would not constitute a substantially more severe significant impact than those analyzed in the PEIR.

Impact BIO-5

The project treatment area may contain wildlife movement corridors and/or nursery habitat. Manual and mechanical treatments, prescribed burning activities, and prescribed herbivory—whether part of the initial treatment or follow-up maintenance—could adversely affect native wildlife movement corridors or nursery habitat in the treatment area. Treatment-related acoustic or visual disturbance, human presence, or livestock presence could alter typical movement patterns by making portions of the treatment area temporarily unavailable to native fauna. Likewise, fencing for livestock enclosures could interrupt movement or cause injury through entanglement. The PEIR analyzed the potential for these treatment activities to adversely affect wildlife movement corridors and nursery sites or habitat.

All treatment-related effects on wildlife movement would be temporary, and habitat function would be maintained. The proposed project would not result in permanent changes to habitat in the treatment area that would reduce its capacity to support wildlife movement or migration. The treatment area contains lands categorized as Rank 3, 4, and 5 in the CDFW Areas of Conservation Emphasis (ACE) database, indicating moderate-to-high levels of intactness and connectivity with the surrounding landscape (CDFW 2021b). Because the treatment area exists within a contiguous habitat block, habitat structure and function in the surrounding landscape is similar. Wildlife moving along the axis of the South Yuba River would be able to utilize unaltered habitat between the treatment area boundary and the river should parts of the treatment area be made temporarily unavailable during treatment. Per the project design, fire control lines would follow preexisting habitat breaks, such as roads and mountain biking trails, to the greatest extent practicable. New control lines would be narrow enough to avoid exacerbating habitat fragmentation. Because large-diameter trees and snags would be retained under the project design, canopy closure would be maintained, which would facilitate movement of arboreal wildlife species and help maintain habitat connectivity across control lines. Furthermore, understory thinning could facilitate movement by larger-bodied species. The use of wildlife-friendly fencing for prescribed herbivory enclosures, specified under SPR BIO-11, would reduce the likelihood of injury resulting from entanglement. WLPZs implemented under SPR HYD-4, no-disturbance buffers incorporated into the project design, and treatment elements implemented under SPR BIO-4 to retain riparian habitat function would avoid adverse effects to wildlife movement in aquatic habitats and along riparian corridors and minimize project-related sediment inputs that could adversely affect aquatic nursery habitat. All personnel carrying out treatment activities will receive sensitive biological resources training required under SPR BIO-2, reducing the likelihood of adverse effects on wildlife movement and nursery sites.

The data review conducted under SPR BIO-1 revealed no historical nurseries or bird rookeries in the project area (Attachment B). Likewise, no obvious nursery sites were identified during the reconnaissance-level survey conducted in May 2021. However, aggregations of Sierra newt (*Taricha sierrae*) observed in Meyers Ravine Creek indicate that it could support breeding.

Because treatment activities would not be implemented in aquatic habitat or adjacent riparian and upland areas within WLPZs and no-disturbance or light treatment buffers, the proposed project would not adversely affect breeding in these habitats. Thus, the proposed project would not alter Meyers Ravine Creek's suitability as a potential nursery site for Sierra newt. If active nursery sites or important nursery habitat features are identified during surveys pursuant to SPR BIO-10 or BIO-12, Mitigation Measure BIO-5 will be implemented to retain and avoid active nursery sites. Likewise, the retention of large-diameter trees included in the project design would not alter habitat suitability for bird rookeries.

Although a small proportion of land in the proposed treatment area is outside the CalVTP treatable landscape, there are no significant differences between habitat structure or function in these areas and those in the adjacent treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impact of the proposed project on wildlife movement corridors and nurseries is within the scope of the PEIR and would not constitute a substantially more severe significant impact than those analyzed in it.

Impact BIO-6

The desktop review and reconnaissance-level survey conducted in May 2021 pursuant to SPR BIO-1 indicate that the proposed treatment area contains suitable habitat for numerous common wildlife species, including nesting migratory birds. Manual and mechanical treatments, prescribed burning activities, and prescribed herbivory—whether part of the initial treatment or follow-up maintenance—could directly or indirectly affect common wildlife occurring in the project area. Depending on timing and location, treatment activities could kill or injure individual animals, disrupt breeding behavior, or disturb breeding individuals causing nest or roost abandonment and the loss of eggs or young. Likewise, habitat quality or availability could be temporarily altered. The PEIR analyzed the potential for these treatment activities to adversely affect common wildlife species.

Suitable habitat for common wildlife is abundant within the CalVTP treatable landscape and in the landscape surrounding the proposed treatment area. Thus, any impacts to suitable habitat within the proposed treatment area would constitute a minor change in the overall availability of suitable habitat. Disturbance to foraging or reproductive behavior, movement, or displacement from preferred habitat that could result from treatment activities is expected to be temporary. Adverse effects on common wildlife resulting from project implementation would be unlikely to have measurable impacts on the range-wide persistence or viability of any species with the potential to occur in the project area. Implementing SPR BIO-3 will minimize adverse effects on common wildlife associated with sensitive natural communities.

Common birds and raptors have the potential to nest in the project area. If treatment activities occur during the nesting season¹, a qualified biologist RPF would conduct focused surveys in and around treatment sites prior to treatments, as specified under SPR BIO-12. Surveys will be timed to maximize the likelihood of detecting active nests while providing adequate time to implement potential avoidance strategies. If active nests are identified, appropriately sized no-disturbance buffers will be established around nest sites until a qualified biologist or RPF determines that they are no longer active. Active raptor nests would be monitored during treatment by a qualified biologist, biological technician, or RPF. Alternatively, treatment activities could be deferred until the nest becomes inactive. All personnel carrying out treatment activities will receive sensitive

¹ The active nesting season will be defined by the qualified RPF or biologist.

biological resources training required under SPR BIO-2, further reducing the likelihood of adverse impacts to common wildlife.

Although a small proportion of land in the proposed treatment area is outside the CalVTP treatable landscape, there are no significant differences in habitat structure or function between these areas and those in the adjacent treatable landscape. The sensitive biological resources and potential treatment effects analyzed above also apply to adjacent areas outside the treatable landscape. For this reason, and because the proposed treatments are consistent with those analyzed in the PEIR, the potential impact of the proposed project on common wildlife species is within the scope of the PEIR and would not constitute a substantially more severe significant impact than those analyzed in it.

Impact BIO-7

Nevada County Code Section L-II 4.3 contains regulations for the protection of landmark and heritage trees and groves; rare, threatened, and endangered species and their habitat; and watercourses, wetlands, and riparian areas. The potential for treatment activities to result in conflict with local policies or ordinances was analyzed in the PEIR. Consistent with SPR AD-3 in the PEIR, the project will comply with all local policies and ordinances. No landmark or heritage trees² would be removed during project treatment activities, so there would be no conflict with the ordinance protecting these trees. Additionally, SPRs and mitigation measures described under Impacts BIO-1 through BIO-4 above will be implemented for the protection of rare, threatened, and endangered species, and wetland and riparian areas, thus ensuring compliance with ordinances protecting these resources.

Project treatment areas outside the geographic extent of the CalVTP treatable landscape have similar biological resources and are covered by the same Nevada County Code as areas within the CalVTP treatable landscape. The project will comply with all local regulations throughout the entire project area. Therefore, this impact would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact BIO-8

None of the project area, whether within or outside the CalVTP treatable landscape, is within the plan area of any adopted natural community conservation plan, habitat conservation plan, or other approved habitat plan. Therefore, the project would not conflict with the provisions of such plans and there would be no impact.

New Biological Resource Impacts

The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR and the site-specific characteristics of the proposed treatment project are consistent with the applicable environmental and regulatory conditions described in the CalVTP PEIR (Sections 3.6.1 and 3.6.2 in Volume II of the Final PEIR). While inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent evaluated in the PEIR, the environmental and regulatory conditions pertaining to biological resources that are present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape. Therefore, the impacts of the proposed treatment project are also consistent with those analyzed in the PEIR. No changed circumstances are

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² Landmark trees include any oak (*Quercus* spp.) greater than 36 inches in diameter at breast height or any tree whose size, visual impact, or association with a historically significant structure or event has caused it to be marked for preservation by the county, state, or federal government. Heritage trees include any hardwood tree designated by the Nevada County Board of Supervisors to be of historical or cultural value.

present, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new impacts related to biological resources would occur.

3.6 Geology, Soils, Paleontology, and Mineral Resources

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|---|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | 1 | | | 1 | | | |
| Impact GEO-1: Result in Substantial Erosion or Loss of Topsoil | LTS | Impact GEO-1, pp. 3.7- 27–3.7-30 | Yes | AQ-3. AQ-4, GEO-1, GEO-2, GEO-3, GEO-4, GEO-5, GEO-6, GEO-7, GEO-8 HYD-3, HYD-4 | NA | LTS | No | Yes |
| Impact GEO-2: Increase Risk of Landslide | LTS | Impact GEO-2, pp. 3.7- 30–3.7-31 | Yes | AQ-3, GEO-3, GEO-4, GEO-7, GEO-8 | NA | LTS | No | Yes |

¹ LTS: less than significant.

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

| New Geology, Soils, Paleontology, and Mineral Resource Impacts: Would the treatment result in other impacts to geology, soils, paleontology, and mineral resources that are not evaluated in the CalVTP PEIR? | □Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

The project area is located in the western foothills of Nevada County, where the bedrock is typically metavolcanic or granitic formations (Nevada County 1995). The dominant soil types in the project area include Hoda sandy loam, Chaix-Hotaw complex, Chaix sandy loam, and Chaix-rock outcrop complex and range from well drained to somewhat excessively drained (NRCS 2022).

Impact GEO-1

Vegetation removal and soil disturbance due to project treatment activities have the potential to result in erosion or loss of topsoil. This potential impact is within the scope of the PEIR because the proposed treatment activities (e.g., equipment type, extent of vegetation removal, intensity of prescribed burning) and geologic setting (e.g., topography, soil characteristics) are consistent with those examined in the PEIR. SPRs AQ-3, AQ-4, GEO-1 through GEO-8, HYD-3, and HYD-4 are applicable to this impact and will be implemented to minimize the potential for substantial erosion and loss of topsoil.

The geologic setting in the portions of the proposed treatment area outside the extent of the CalVTP treatable landscape is essentially the same as that within the treatable landscape. Additionally, treatment methods used in areas outside the treatable landscape would be the same as the methods used within the treatable landscape. As such, the impact in areas outside the CalVTP treatable landscape would be within the scope of the PEIR, as described above, and would not constitute a substantially more severe significant impact than what was analyzed in the PEIR.

Impact GEO-2

Vegetation removal and soil disturbance in areas with steep topography have the potential to result in landslides. Although much of Nevada County, including much of the project area, has steep topography, the risk of landslides is generally low due to the shallow soils and dense bedrock (Nevada County 1995), and no landslides have been documented within the project area (CGS 2022b). The potential for project treatment activities to increase landslide risk is within the scope of the PEIR because the extent of vegetation removal, proposed treatment methods (i.e., primarily manual treatment on steep slopes), intensity of prescribed burning, and rough terrain are consistent with the analysis in the PEIR. SPRs AQ-3, GEO-3, GEO-4, GEO-7, and GEO-8 are applicable to this potential project impact and will be implemented to minimize the risk of landslide.

The topography within the portions of the proposed treatment area outside the extent of the CalVTP treatable landscape is similar to the topography in areas within it. Additionally, the same methods would be used to treat vegetation on steep slopes within and outside the treatable landscape. As such, the potential for increased landslide risk in areas outside the CalVTP treatable landscape would be within the scope of the PEIR and would not constitute a substantially more severe significant impact than what was analyzed in the PEIR.

New Geology, Soils, Paleontology, and Mineral Resource Impacts

The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR and the site-specific characteristics of the proposed treatment project are consistent with the applicable environmental and regulatory conditions described in the CalVTP PEIR (Sections 3.7.1 and 3.7.2 in Volume II of the Final PEIR). The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent analyzed in the PEIR. However, the geologic setting and applicable regulatory setting throughout the project area are essentially the same in areas within and outside the

treatable landscape and the impacts of the proposed treatment project are therefore within the scope of the PEIR analysis. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new impacts related to geology, soils, paleontology, or mineral resources would occur.

3.7 Greenhouse Gas Emissions

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact GHG-1: Conflict with Applicable Plan, Policy, or Regulation of an Agency Adopted for the Purpose of Reducing the Emissions of GHGs | LTS | Impact GHG-1, pp. 3.8- 10–3.8-11 | Yes | AD-3 | NA | LTS | No | Yes |
| Impact GHG-2: Generate GHG Emissions through Treatment Activities | PSU | Impact GHG-2, pp. 3.8- 11–3.8-17 | Yes | AQ-3 | GHG-2 | PSU | No | Yes |

¹ LTS: less than significant; PSU: potentially significant and unavoidable.

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

| New GHG Emissions Impacts: Would the treatment result in other impacts to GHG emissions that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

Impact GHG-1

Use of vehicles and mechanical equipment and prescribed burning during initial and maintenance treatments would result in greenhouse gas (GHG) emissions. Consistency of treatments under the

CalVTP with applicable plans, policies, and regulations aimed at reducing GHG emissions was examined in the PEIR. Consistent with the PEIR, although GHG emissions would occur from equipment and vehicles used to implement treatments, the purpose of the proposed project is to reduce wildfire risk, which could reduce GHG emissions and increase carbon sequestration over the long term. This impact is within the scope of the PEIR because the proposed activities, as well as the associated equipment, duration of use, and resultant GHG emissions, are consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the same plans, policies, and regulations adopted to reduce GHG emissions apply in the areas outside the treatable landscape, as well as areas within the treatable landscape; therefore, the GHG impact is also the same, as described above. SPR AD-3 is applicable to the proposed project as the project proponent has designed and will implement the treatments in a manner that is consistent with applicable local plans, policies, and ordinances. SPR AD-3 requires the project proponent to comply with applicable Nevada County plans, policies, and ordinances. SPR GHG-1 is not applicable to the proposed project because this project is not a registered offset project under the Board's Assembly Bill 1504 Carbon Inventory Process. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

Impact GHG-2

Use of vehicles and mechanical equipment and prescribed burning during initial and maintenance treatments would result in GHG emissions. The potential for treatments under the CalVTP to generate GHG emissions was examined in the PEIR. This impact is within the scope of the PEIR because the proposed activities, as well as the associated equipment and duration of use, and the intent of the treatments to reduce wildfire risk and GHG emissions related to wildfire are consistent with those analyzed in the PEIR. Mitigation Measure GHG-2 will be implemented and would reduce GHG emissions associated with the prescribed burning. However, emissions generated by the treatments would still contribute to the annual emissions generated by the CalVTP, and this impact would remain potentially significant and unavoidable, consistent with, and for the same reasons described in the PEIR. SPR AQ-3 is also applicable to this treatment and will contain the description of feasible GHG reduction techniques implemented per Mitigation Measure GHG-2. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the climate conditions present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the GHG impact is also the same, as described above. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

New Impacts Related to GHG Emissions

The proposed treatments are consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatments and determined they are consistent with the applicable regulatory and environmental conditions presented in the CalVTP PEIR (Sections 3.8.1 and 3.8.2 in Volume II of the Final PEIR). The project proponent has also determined that including land from outside the CalVTP treatable landscape in the proposed treatment areas constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing environmental conditions pertinent to the climate conditions that are present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the impacts are the same and, for the reasons described above, impacts of the proposed treatment project are also consistent with those covered in the PEIR. No changed circumstances

are present, and the proposed treatments and inclusion of areas outside of the CalVTP treatable landscape would not give rise to any new significant impacts. Therefore, no new impact related to GHG emissions would occur.

3.8 Energy Resources

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | • | | | • | | |
| Impact ENG-1: Result in Wasteful, Inefficient, or Unnecessary Consumption of Energy | LTS | Impact ENG-1, pp. 3.9-7– 3.9-8 | Yes | NA | NA | LTS | No | Yes |

¹ LTS: less than significant.

| Now Engage Description Improves Would the Assets and second | 1 | | | |
|---|----------------------------|--|--|--|
| New Energy Resource Impacts: Would the treatment result in other impacts to energy resources that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion | |
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant | |
| [identify new impact here, if applicable; add rows as needed] | | | | |

Discussion

Impact ENG-1

Use of vehicles and mechanical equipment during initial treatment and treatment maintenance activities would result in the consumption of energy through the use of fossil fuels. The use of fossil fuels for equipment and vehicles was examined in the PEIR. The consumption of energy during implementation of the treatment project is within the scope of the PEIR because the types of activities, as well as the associated equipment and duration of proposed use, are consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, the existing energy consumption is essentially the same within and outside the treatable landscape; therefore, the energy impact is also the same, as described above. No SPRs

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

are applicable to this impact. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than covered in the PEIR.

New Energy Resource Impacts

The proposed treatments are consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatment project and determined they are consistent with the applicable regulatory and environmental conditions presented in the CalVTP PEIR (Sections 3.9.1 and 3.9.2 in Volume II of the Final PEIR). The project proponent has also determined that including land outside the CalVTP treatable landscape in the proposed treatment areas constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing environmental and regulatory conditions present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the impacts of the proposed treatment project are also consistent with those considered in the PEIR. No changed circumstances are present, and the proposed treatments and inclusion of areas outside of the CalVTP treatable landscape would not give rise to any new significant impacts. Therefore, no new impact related to energy resources would occur.

3.9 Hazardous Materials, Public Health and Safety

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact HAZ-1: Create a Significant Health Hazard from the Use of Hazardous Materials | LTS | Impact HAZ-1, pp. 3.10-14- 3.10-15 | Yes | HAZ-1 | NA | LTS | No | Yes |
| Impact HAZ-2: Create a Significant Health Hazard from the Use of Herbicides | LTS | Impact HAZ-2, pp. 3.10-16– 3.10-18 | No | None | NA | NA | NA | NA |
| Impact HAZ-3: Expose the Public or Environment to Significant Hazards from Disturbance to Known Hazardous Material Sites | LTSM | Impact HAZ-3, pp. 3.10-19– 3.10-20 | Yes | NA | HAZ- 3 | LTSM | No | Yes |

¹ LTS: less than significant; LTSM: less than significant with mitigation.

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NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact. None: there are SPRs and/or MMs identified in the PEIR for this impact, but none are applicable to the treatment project.

| New Hazardous Materials, Public Health and Safety Impacts: Would the treatment result in other impacts related to hazardous materials, public health and safety that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

Impact HAZ-1

Hazardous materials (e.g., fuels) would be used for proposed prescribed burning, mechanical, and manual treatment activities. The PEIR evaluated the potential for treatment activities to cause a significant health hazard from the use of hazardous materials. This impact is within the scope of the PEIR because the treatment methods, equipment, and types of hazardous materials that would be used are consistent with those analyzed in the PEIR. SPR HAZ-1 is applicable to this impact and will be implemented during project treatment activities to avoid or minimize impacts related to fuels and other hazardous substances used in equipment.

Proposed treatment areas outside the geographic extent of the CalVTP treatable landscape would be treated with the same treatment methods using the same hazardous materials as areas within the CalVTP treatable landscape. Additionally, the exposure potential and regulatory conditions are essentially the same within and outside the treatable landscape. Therefore, as described above, this impact is consistent with the analysis in the PEIR and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact HAZ-2

Herbicide application is not a proposed treatment activity; therefore, this impact does not apply to the project.

Impact HAZ-3

Prescribed burning and ground-disturbing treatment activities could expose the public or environment to hazardous materials from disturbance to a contaminated site. The potential for these treatment activities to result in exposure to hazardous materials was examined in the PEIR, and the impact was treated as potentially significant because the large geographic extent covered by the CalVTP treatable landscape could include known hazardous material sites. However, database searches for hazardous materials sites done for the project area (Attachment C) as specified under Mitigation Measure HAZ-3 indicate that no sites are located within 2 miles of the project area (DTSC 2022, CalEPA 2022, SWRCB 2022); therefore, the project impact would be less than significant with incorporation of this mitigation measure. No SPRs are applicable to this impact.

No project treatment areas, including those outside the geographic extent of the CalVTP treatable landscape, are within 2 miles of a known hazardous material site. Therefore, the potential for impacts in the portions of the proposed treatment area outside the CalVTP treatable landscape would be the same as described above and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

New Hazardous Materials, Public Health and Safety Impacts

The proposed treatment activities and associated hazardous materials are consistent with the treatment types and activities considered in the CalVTP PEIR and the site-specific characteristics of the proposed treatment project are consistent with the applicable environmental and regulatory conditions described in the CalVTP PEIR (Sections 3.10.1 and 3.10.2 in Volume II of the Final PEIR). Additionally, no known hazardous materials sites are within the vicinity of the project. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR; however, the proposed treatment activities and potential for exposure to hazardous materials in these areas are essentially the same as in areas within the CalVTP treatable landscape. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new hazardous materials, public health, or safety impacts would occur.

3.10 Hydrology and Water Quality

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|--|--|--|---|--|--|--|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact HYD-1: Violate Water Quality Standards or Waste Discharge Requirements, Substantially Degrade Surface or Ground Water Quality, or Conflict with or Obstruct the Implementation of a Water Quality Control Plan Through the Implementation of Prescribed Burning | LTS | Impact HYD-1, pp. 3.11-25– 3.11-27 | Yes | AQ-3, BIO-4, GEO-4, GEO-6, HYD-1, HYD-4 | NA | LTS | No | Yes |

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|---|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Impact HYD-2: Violate Water Quality Standards or Waste Discharge Requirements, Substantially Degrade Surface or Ground Water Quality, or Conflict with or Obstruct the Implementation of a Water Quality Control Plan Through the Implementation of Manual or Mechanical Treatment Activities | LTS | Impact HYD-2, pp. 3.11-27– 3.11-29 | Yes | BIO-1, BIO-4, GEO-1, GEO-2, GEO-3, GEO-4, GEO-7, GEO-8, HAZ-1, HYD-1, HYD-4 | NA | LTS | No | Yes |
| Impact HYD-3: Violate Water Quality Standards or Waste Discharge Requirements, Substantially Degrade Surface or Ground Water Quality, or Conflict with or Obstruct the Implementation of a Water Quality Control Plan Through Prescribed Herbivory | LTS | Impact HYD-3, p. 3.11-29 | Yes | GEO-1, HYD-1, HYD-3 | NA | LTS | No | Yes |
| Impact HYD-4: Violate Water Quality Standards or Waste Discharge Requirements, Substantially Degrade Surface or Ground Water Quality, or Conflict with or Obstruct the Implementation of a Water Quality Control Plan Through the Ground Application of Herbicides | LTS | Impact HYD-4, pp. 3.11-29– 3.11-31 | No | None | NA | NA | NA | NA |

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|---|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Impact HYD-5: Substantially Alter the Existing Drainage Pattern of a Treatment Site or Area | LTS | Impact HYD-5, p. 3.11-31 | Yes | GEO-1, GEO-2, GEO-5, HYD-2, HYD-4, HYD-6 | NA | LTS | No | Yes |

¹ LTS: less than significant.

NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact. None: there are SPRs and/or MMs identified in the PEIR for this impact, but none are applicable to the treatment project.

| New Hydrology and Water Quality Impacts: Would the treatment result in other impacts to hydrology and water quality that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

The project area is located in the South Yuba River watershed adjacent to the southern bank of the South Yuba River. The project area includes the downstream ends of Meyers Ravine and Rock Creek immediately prior to their confluences with the South Yuba River. Per SPR HYD-4, 50–100-foot WLPZs will be established around all aquatic habitats in the project area, depending on watercourse class and slope steepness. Furthermore, as described in Section 2, no manual or mechanical treatments would occur within 100 feet of the center of Meyers Ravine Creek and Rock Creek and only light treatment would occur between 100 and 200 feet of the waterways. These measures will protect surface water quality in waterways in and adjacent to the project area and avoid violating water quality standards.

Impact HYD-1

Proposed project treatment activities include prescribed burning, which could impact water quality in adjacent waterways via runoff of ash and debris. The potential for this impact was evaluated in the PEIR, and proposed project activities are within its scope. SPRs AQ-3, BIO-4, GEO-4, GEO-6, HYD-1, and HYD-4 are applicable to this impact and will be implemented to minimize erosion and riparian disturbance and protect water quality.

The entire project area, including areas outside the geographic extent of the CalVTP treatable landscape, is within the South Yuba River watershed. The portions of the proposed treatment area that extend beyond the geographic extent of the CalVTP treatable landscape have similar surface water conditions (e.g., soil drainage, proximity to nearest waterway) as the portions of the treatment area within the CalVTP treatable landscape. Additionally, these areas would be treated with the same prescribed burning methods. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact HYD-2

Proposed project treatment activities include manual and mechanical methods that could impact water quality in adjacent waterways (e.g., by increasing erosion potential or fuel spills). The potential for this impact was evaluated in the PEIR, and proposed manual and mechanical methods (e.g., mastication, lop and scatter) are within its scope. SPRs BIO-1, BIO-4, GEO-1 through GEO-4, GEO-7, GEO-8, HAZ-1, HYD-1, and HYD-4 are applicable to this impact and will be implemented to minimize the risk of degradation of surface or groundwater quality due to manual and mechanical treatment activities.

The entire project area, including areas outside the geographic extent of the CalVTP treatable landscape, is within the South Yuba River watershed. The portions of the proposed treatment area that extend beyond the geographic extent of the CalVTP treatable landscape have similar surface water conditions (e.g., soil drainage, proximity to nearest waterway) as the portions of the treatment area within the CalVTP treatable landscape. Additionally, these areas would be treated with the same prescribed burning methods. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact HYD-3

Initial project treatment activities would not include prescribed herbivory. Maintenance treatments are expected to be performed primarily via manual methods and prescribed fire, but prescribed herbivory may be used for vegetation maintenance to mitigate stump sprout emergence following prescribed burning. Prescribed herbivory and associated potential impacts to water quality (e.g., from accumulation of manure along shorelines) are addressed in the PEIR, so this impact is within its scope. The project proponent will implement SPRs GEO-1, HYD-1, and HYD-3 to reduce the risk of degradation of surface or groundwater quality due to prescribed herbivory.

The portions of the proposed treatment area that extend beyond the geographic extent of the CalVTP treatable landscape have similar surface water conditions (e.g., soil drainage, proximity to nearest waterway) as the portions of the treatment area within the CalVTP treatable landscape. Additionally, these areas would be treated with the same prescribed herbivory methods. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact HYD-4

Herbicide application is not a proposed treatment activity; therefore, this impact does not apply to the project.

Impact HYD-5

Project treatment activities (e.g., heavy equipment use) have the potential to cause ground disturbance and erosion such that existing drainage patterns are altered. Proposed treatment methods, including equipment type and extent of vegetation removal, are consistent with the methods evaluated in the PEIR, and their potential impact on site drainage is within the scope of the PEIR analysis. The project proponent will implement SPRs GEO-1, GEO-2, GEO-5, HYD-2, HYD-4, and HYD-6 to limit soil disturbance and protect watercourses, thus minimizing the potential for on-site drainage patterns to be substantially altered.

The portions of the proposed treatment area that extend beyond the geographic extent of the CalVTP treatable landscape have similar surface water conditions (e.g., soil drainage) and would be treated with the same methods as the portions of the treatment area within the CalVTP treatable landscape. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

New Hydrology and Water Quality Impacts

The proposed treatment is consistent with the treatment types and activities considered in the CalVTP PEIR and the site-specific characteristics of the proposed treatment project (e.g., proximity to adjacent waterways) are consistent with the applicable environmental and regulatory conditions described in the CalVTP PEIR (Sections 3.11.1 and 3.11.2 in Volume II of the Final PEIR). The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, these areas are in the same watershed and have essentially the same hydrological characteristics as areas within the CalVTP treatable landscape and would be treated with the same methods. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new hydrology or water quality impacts would occur.

3.11 Land Use and Planning, Population and Housing

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|--|---|--|--|--|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact LU-1: Cause a Significant Environmental Impact Due to a Conflict with a Land Use Plan, Policy, or Regulation | LTS | Impact LU-1, pp. 3.12-13- 3.12-14 | Yes | AD-3 | NA | LTS | No | Yes |
| Impact LU-2: Induce Substantial Unplanned Population Growth | LTS | Impact LU-2, pp. 3.12-14– 3.12-15 | Yes | NA | NA | LTS | No | Yes |

¹ LTS: less than significant.

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

| New Land Use and Planning, Population and Housing Impacts: Would the treatment result in other impacts to land use and planning, population and housing that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | Ò | |

Discussion

The proposed project is located within Nevada County in the Forest (FR), Open Space (OS), and General Agriculture (AG) zoning districts, per the Nevada County General Plan (Nevada County 2022). The land use designations for the parcels located within the project site are listed as Forest (FOR), Open Space (OS), and Rural (RUR). The approximately 570-acre project area is located on private lands between Hoyt's and Purdon Crossings in the South Yuba River Canyon. The project extends two miles along the South Yuba River downstream of Purdon crossing, approximately two miles northwest of Nevada City and four miles north of Grass Valley. It is in the South Yuba River watershed, upstream of Englebright Reservoir. The project area is adjacent to the South Yuba River State Park on both the upstream and downstream ends and Bureau of

Land Management (BLM) land to the north. The site is accessible via New Rome Road. It includes parcels owned by three private landowners but is considered one project site for cross-boundary treatments.

Impact LU-1

Treatment activities would occur on private lands between Hoyt's and Purdon Crossings in the South Yuba River Canyon. As a local agency, the project proponent is required to comply with local plans, policies, and regulations. The potential for vegetation treatment activities to cause a significant environmental impact due to a conflict with a land use plan, policy, or regulation was examined in the PEIR. As required under SPR AD-3, the project proponent will comply with applicable Nevada County plans, policies, and ordinances, such as those pertaining to noise, biological resources, and water resources. This impact is within the scope of the PEIR because proposed treatment types and activities are consistent with those examined in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent considered in the PEIR. However, land uses in the project area are essentially the same within and outside the treatable landscape; therefore, the land use impact is also the same, as described above. No conflict would occur because the project proponent will adhere to SPR AD-3. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than covered in the PEIR.

Impact LU-2

The potential for treatments to result in substantial population growth as a result of increases in demand for employees was examined in the PEIR. Impacts associated with short-term increases in the demand for workers during implementation of the treatment project are within the scope of the PEIR because population and housing characteristics of the project area are essentially the same within and outside the CalVTP treatable landscape and the number of workers required for implementation of the treatments is consistent with (less than) the crew size analyzed in the PEIR for the types of treatments proposed (i.e., 10 to 20 workers for prescribed burns, 2 to 10 workers for mechanical treatments, and up to 10 workers for manual treatments). In addition, the proposed project would not require the hiring of new employees. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the population and housing characteristics present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the population and housing impact is also the same, as described above. No SPRs are applicable to this impact. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than covered in the PEIR.

New Land Use and Planning, Population and Housing Impacts

The proposed project is consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatment project and determined they are consistent with the applicable environmental and regulatory conditions presented in the CalVTP PEIR (Sections 3.12.1 and 3.12.2 in Volume II of the Final PEIR). The project proponent has also determined that the inclusion of land in the proposed treatment area that is outside the treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing environmental and regulatory conditions that are pertinent to land use and planning, population and housing that are present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the impacts of the proposed treatment project are also consistent with those covered in the PEIR. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not give rise to any

new significant impacts not addressed in the PEIR. Therefore, no new impact related to land use and planning, population and housing would occur that is not covered in the PEIR.

3.12 Noise

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact NOI-1: Result in a Substantial Short-Term Increase in Exterior Ambient Noise Levels During Treatment Implementation | LTS | Impact NOI-1, pp. 3.13-9- 3.13-12; | Yes | AD-3, NOI-1, NOI-2, NOI-3, NOI-4, NOI-5, NOI-6 | NA | LTS | No | Yes |
| Impact NOI-2: Result in a Substantial Short-Term Increase in Truck- Generated SENL's During Treatment Activities | LTS | Impact NOI-2, p. 3.13-12 | Yes | NOI-1 | NA | LTS | No | Yes |

¹ LTS: less than significant.

| New Noise Impacts: Would the treatment result in other noise-related impacts that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|---|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

Impact NOI-1

Use of heavy equipment (e.g., excavator, dozer) would generate a short-term increase in ambient noise levels surrounding project activities. The quantity and type of equipment proposed for the

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

project are consistent with those addressed in the PEIR; therefore, the proposed treatment activities are within its scope. All proposed treatment activities would also be in compliance with local regulations because the Nevada County Zoning Ordinance exempts construction activities from noise restrictions. However, project activities would be limited to weekday, daytime hours, thereby avoiding the potential for increased noise levels during the noise-sensitive nighttime hours when sleep disturbance is more likely. The SPRs applicable to this impact are AD-3 and NOI-1 through NOI-6. These SPRs will be implemented to ensure compliance with applicable Nevada County plans, policies, and ordinances pertaining to noise and reduce the potential for noise impacts during treatment activities.

Project treatment areas outside the geographic extent of the CalVTP treatable landscape are covered by the same noise ordinances and have similar noise exposure potential (i.e., presence of nearby sensitive receptors) to the portions of the project area within the treatable landscape. Additionally, these areas would be subject to the same noise-generating treatment activities. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

Impact NOI-2

Proposed treatment activities would utilize large trucks to transport equipment to and from the project area. The potential for short-term, truck-generated noise impacts was analyzed in the PEIR, and proposed project hauling activities are consistent with, and within the scope of, the PEIR analysis. SPR NOI-1 is applicable to this impact and will be implemented to ensure that all proposed hauling activities will occur during weekday, daytime hours, which are less noise-sensitive than nighttime hours when noise has the potential to cause sleep disturbance.

Project treatment areas outside the geographic extent of the CalVTP treatable landscape are covered by the same noise ordinances and have similar exposure potential (i.e., presence of nearby sensitive receptors) to treatment areas within the treatable landscape. Additionally, these areas would be subject to the same noise-generating treatment activities. Therefore, this impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

New Noise Impacts

Proposed project treatment and hauling activities are consistent with activities addressed in the PEIR. The site-specific characteristics of the proposed treatments are also consistent with the applicable environmental and regulatory conditions presented in the PEIR (Sections 3.13.1 and 3.13.2 in Volume II of the Final CalVTP PEIR). The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. Within the boundary of the project area, however, the proposed treatment activities and surrounding noise exposure potential are essentially the same in areas outside the treatable landscape as in areas within the treatable landscape. Therefore, the potential impacts are also the same and are consistent with the analysis in the PEIR. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new noise impacts would occur.

3.13 Recreation

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact REC-1: Directly or Indirectly Disrupt Recreational Activities within Designated Recreation Areas | LTS | Impact REC-1, pp. 3.14- 6–3.14-7 | Yes | REC-1 | NA | LTS | No | Yes |

¹ LTS: less than significant.

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

| New Recreation Impacts: Would the treatment result in other impacts to recreation that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | Ì | |

Discussion

Impact REC-1

The project area does not include any designated recreation areas, but it borders South Yuba River State Park on both its upstream and downstream ends. Proposed treatment activities have the potential to directly or indirectly disrupt recreational activities in the portions of South Yuba River State Park adjacent to the treatment areas (e.g., via increased noise, dust, smoke, traffic). All of the potential project disruptions to nearby recreational activities are evaluated in the PEIR; therefore, this potential project impact is within its scope. SPR REC-1 is applicable to this project and will be implemented, if appropriate, to give recreationists the opportunity to use alternate recreation areas.

Project treatment areas outside the geographic extent of the CalVTP treatable landscape are at a similar distance from South Yuba State Park as treatment areas within the treatable landscape. Additionally, treatment activities with the potential to directly or indirectly disrupt recreational activities in South Yuba River State Park would be the same in these areas. Therefore, the

potential impact would be essentially the same throughout all project treatment areas and would not constitute a substantially more severe significant impact than what was evaluated in the PEIR.

New Recreation Impacts

Proposed project treatment activities and their potential impact on surrounding recreational activities are consistent with the impact analysis in the PEIR. The site-specific characteristics of the proposed treatment project are also consistent with the applicable environmental and regulatory conditions presented in the PEIR (Sections 3.14.1 and Section 3.14.2 in Volume II of the Final CalVTP PEIR). The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR, but all portions of the project area would be treated using the same methods and are similar distances from surrounding recreational centers. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not result in any new significant impacts not evaluated in the PEIR. Therefore, no new recreation impacts would occur.

3.14 Transportation

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|---|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: Impact TRAN-1: Result in Temporary Traffic Operations Impacts by Conflicting with a Program, Plan, Ordinance, or Policy Addressing Roadway Facilities or Prolonged Road Closures | LTS | Impact TRAN-1, pp. 3.15-9– 3.15-10 | Yes | AD-3 TRAN-1 | NA | LTS | No | Yes |
| Impact TRAN-2: Substantially Increase Hazards due to a Design Feature or Incompatible Uses | LTS | Impact TRAN-2, pp. 3.15- 10–3.15-11 | Yes | AD-3 HYD-2 TRAN-1 | NA | LTS | No | Yes |
| Impact TRAN-3: Result in a Net Increase in VMT for the Proposed CalVTP | SU | Impact TRAN-3, pp. 3.15- 11–3.15-13 | Yes | NA | NA (No feasible mitigation available) | SU | No | Yes |

¹ LTS: less than significant; SU: significant and unavoidable.

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

| New Transportation Impacts: Would the treatment result in other impacts to transportation that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

Impact TRAN-1

Initial and maintenance treatments would temporarily increase vehicular traffic along several roads in the project area, including SR 49, SR 20, N Bloomfield Road, Lake Vera Purdon Road, Purdon Road, New Rome Road, Augustine Road and Excelsior Ditch Road. The potential for a temporary increase in traffic to conflict with a program, plan, ordinance, or policy addressing roadway facilities or prolonged road closures was examined in the PEIR. The proposed treatments would be short term, and temporary increases in traffic related to treatments are within the scope of the PEIR because the treatment duration and limited number of vehicles (i.e., heavy equipment transport, crew vehicles for crew members) associated with the proposed treatments are consistent with those analyzed in the PEIR. In addition, the proposed treatments would not all occur concurrently, and increases in vehicle trips associated with the treatments would be dispersed on multiple roadways. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing transportation conditions (e.g., roadways and road use) present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the transportation impact is also the same, as described above. SPRs applicable to this treatment are AD-3 and TRAN-1. Adherence to applicable Nevada County plans, policies, and ordinances pertaining to traffic (AD-3) will avoid conflicts, and preparation of a traffic management plan (TMP), if applicable (TRAN-1), will minimize the potential for temporary traffic operations impacts. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

Impact TRAN-2

Initial and maintenance treatments would not require the construction or alteration of any roadways. However, the proposed treatments would include prescribed burning, which would produce smoke and could potentially affect visibility along nearby roadways such that a transportation hazard could occur. The potential for smoke to affect visibility along roadways during implementation of the treatment project was examined in the PEIR. This impact is within the scope of the activities and impacts addressed in the PEIR because the burn duration is consistent with that analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing transportation conditions (e.g., roadways and road use) present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the transportation impact is also the same, as described above. SPRs applicable to this treatment are AD-3, HYD-2, and TRAN-1. Adherence to applicable Nevada County plans, policies, and ordinances pertaining to traffic (AD-3) will avoid conflicts, and preparation of a traffic

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management plan (TMP), if applicable (TRAN-1), will minimize the potential for temporary traffic operations impacts. Avoiding construction of new roads (HYD-2) is already part of the proposed treatment design and would eliminate the potential for a substantial increase in hazards due to a design feature. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

Impact TRAN-3

Initial and maintenance treatments could temporarily increase vehicle miles traveled (VMT) above baseline conditions because the treatment area is in a remote location and would require vehicle trips to access the area. This impact was identified as potentially significant and unavoidable in the PEIR because implementation of the CalVTP would result in a net increase in VMT. However, as noted under Impact TRAN-3 in the PEIR, individual vegetation treatment projects under the CalVTP are reasonably expected to generate fewer than 110 trips per day, which would cause a less-than-significant transportation impact for specific later activities, as described in the Technical Advisory on Evaluating Transportation Impacts, published by the Governor's Office of Planning and Research (OPR 2018). Initial treatments are expected to require up to 30 crew members, which would not exceed 110 trips per day. However, as a project contributing to the overall significant and unavoidable impacts of the CalVTP program, the effects of this project would be significant and unavoidable. Emission reduction techniques included in Mitigation Measure AQ-1 (i.e., encouraging workers to carpool to work sites, and/or use public transportation) would be infeasible for the project proponent to implement due to the rural location of the project area. The project proponent will encourage, but not require, use of these emission reduction techniques by its contractors, including by stating such in its contractor procurement process. In addition, crew sizes would be small and may not all be employed with the same company. Therefore, carpooling may not be feasible to implement for most of the workers or recommended during the ongoing COVID-19 pandemic. For these reasons, and as explained in the PEIR, this impact would remain significant and unavoidable.

Temporary increases in VMT are within the scope of the activities and impacts addressed in the PEIR because the number and duration of increased vehicle trips is consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing transportation conditions (e.g., roadways and road use) present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the transportation impact is also the same, as described above. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

New Transportation Impacts

The proposed treatments are consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatments and determined they are consistent with the applicable environmental and regulatory conditions presented in the PEIR (Sections 3.15.1 and 3.15.2 in Volume II of the Final CalVTP PEIR). The project proponent has also determined that including land from outside the CalVTP treatable landscape in the proposed treatment areas constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing environmental and regulatory conditions pertinent to transportation that are present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape. Therefore, for the reasons described above, the impacts of the proposed treatment project are consistent with those covered in the PEIR. No changed circumstances are present,

and the inclusion of areas outside of the CalVTP treatable landscape would not give rise to any new significant impacts. Therefore, no new impact related to transportation would occur.

3.15 Public Services, Utilities and Service Systems

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact UTIL-1: Result in Physical Impacts Associated with Provision of Sufficient Water Supplies, Including Related Infrastructure Needs | LTS | Impact UTIL-1, p. 3.16-9 | Yes | NA | NA | LTS | No | Yes |
| Impact UTIL-2: Generate Solid Waste in Excess of State Standards or Exceed Local Infrastructure Capacity | SU | Impact UTIL-2, pp. 3.16- 10–3.16- 12 | No | 1 | | | | |
| Impact UTIL-3: Comply with Federal, State, and Local Management and Reduction Goals, Statutes, and Regulations Related to Solid Waste | LTS | Impact UTIL-2, p. 3.16-12 | No | | | | | |

¹ LTS: less than significant; SU: significant and unavoidable.

² NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact.

| New Public Services, Utilities and Service System Impacts: Would the treatment result in other impacts to public services, utilities and service systems that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠No | If yes, complete row(s) below and discussion |
|---|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

Impact UTIL-1

Initial and maintenance treatments would include prescribed burning, which may require an onsite water supply if the burn goes out of prescription. If needed, water would be supplied from water trucks. The potential increased demand for water was examined in the PEIR. This impact is within the scope of the activities and impacts addressed in the PEIR because the type and extent of proposed prescribed burn treatments, amount of water required for prescribed burning, and water source-type are consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing environmental conditions present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the water supply impact is also the same, as described above. No SPRs are applicable to this impact. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than what was covered in the PEIR.

Impact UTIL-2

Initial and maintenance treatments would generate biomass as a result of vegetation removal within the treatment areas. Biomass from treatments would be disposed of by burning hand piles using hand ignition, by hand ignitions of mechanically constructed piles created with skid-steers and excavators using grapple attachments, or by lopping and scattering biomass in areas where material can be burned to meet objectives with a broadcast burn. This impact was identified as potentially significant and unavoidable in the PEIR because biomass hauled offsite could exceed the capacity of existing infrastructure for handling biomass. However, for the proposed treatment project, no biomass would be hauled off-site; therefore, there is no potential to exceed the capacity of existing infrastructure and this impact does not apply to the proposed project.

Impact UTIL-3

This impact does not apply to the proposed project because biomass generated from the proposed treatments would be disposed of on-site. Treatment activities implemented under the proposed project would not involve activities that would generate solid waste needing disposal at solid waste facilities.

New Impacts to Public Services, Utilities and Service Systems

The proposed treatments are consistent with the treatment types and activities considered in the PEIR. The project proponent has considered the site-specific characteristics of the proposed treatments and determined they are consistent with the applicable environmental and regulatory conditions presented in the PEIR (Sections 3.16.1 and Section 3.16.2 in Volume II of the Final CalVTP PEIR). The project proponent has also determined that including land outside the CalVTP treatable landscape in the proposed treatment areas constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the existing environmental and regulatory conditions pertinent to public services and utilities that are present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape. Therefore, the impacts are the same and, for the reasons described above, impacts of the proposed treatment project are also consistent with those covered in the PEIR. No changed circumstances are present, and the inclusion of areas outside the CalVTP treatable landscape would not give rise to any new significant impacts. Therefore, no new impact related to public services, utilities, or service systems would occur.

3.16 Wildfire

| Impact in the PEIR ¹ | | | Project- specific Checklist ^{1,2} | | | | | |
|--|---|--|--|--|---|--|--|---|
| Environmental Impact Covered in the PEIR | Identify Impact Significance in the PEIR | Identify Location of Impact Analysis in the PEIR | Does the Impact Apply to the Treatment Project? | List SPRs Applicable to the Treatment Project | List MMs Applicable to the Treatment Project | Identify Impact Significance for Treatment Project | Would this be a Substantially More Severe Significant Impact than Identified in the PEIR? | Is this Impact Within the Scope of the PEIR? |
| Would the project: | | | | | | | | |
| Impact WIL-1: Substantially Exacerbate Fire Risk and Expose People to Uncontrolled Spread of a Wildfire | LTS | Impact WIL-1, pp. 3.17-13- 3.17-14 | Yes | AQ-3 HAZ-2 HAZ-3 HAZ-4 | NA | LTS | No | Yes |
| Impact WIL-2: Expose People or Structures to Substantial Risks Related to Post-Fire Flooding or Landslides | LTS | Impact WIL-2, pp. 3.17-14– 3.17-15 | Yes | AQ-3 GEO-3, GEO-4, GEO-5, GEO-8 | NA | LTS | No | Yes |

¹ LTS: less than significant.

 $^{^2\,}$ NA: not applicable; there are no SPRs and/or MMs identified in the PEIR for this impact

| New Wildfire Impacts: Would the treatment result in other impacts related to wildfire that are not evaluated in the CalVTP PEIR? | ☐ Yes | ⊠ No | If yes, complete row(s) below and discussion |
|--|----------------------------|--|--|
| | Potentially Significant | Less Than Significant with Mitigation Incorporated | Less than Significant |
| [identify new impact here, if applicable; add rows as needed] | | | |

Discussion

Impact WIL-1

Vegetation treatments proposed would include manual, mechanical, and prescribed burn treatments. Vegetation treatments involving motorized equipment could pose a risk of accidental fire ignition. Temporary increases in risk associated with uncontrolled fire from prescribed burning could also occur. As discussed in Section 3.17.1, "Environmental Setting," in Volume II of the Final PEIR, under "Prescribed Burn Planning and Implementation," implementing a prescribed burn requires extensive planning, including the preparation of prescription burn plans, smoke management plans, site-specific weather forecasting, public notifications, safety considerations, and ultimately favorable weather conditions so a burn can occur on a given day. Prior to implementing a prescribed burn, fire containment lines would be established by clearing

vegetation surrounding the designated burn area to help prevent the accidental escape of fire. Water containers and safety equipment would be staged on site as necessary to provide readily available means to control any fire that escapes the containment lines.

The potential increase in exposure to wildfire during treatment implementation was examined in the PEIR. Increased wildfire risk associated with prescribed burning and use of heavy equipment in vegetated areas is within the scope of the PEIR because the types of equipment and treatment duration and the types of prescribed burn methods proposed as part of the project are consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the wildfire risk present in the areas outside the treatable landscape is essentially the same as those within the treatable landscape; therefore, the wildfire impact is also the same, as described above. SPRs AQ-3, HAZ-2, HAZ-3, and HAZ-4, pertaining to preparation of burn plans in accordance with CAL FIRE requirements, equipment safety requirements, keeping fire extinguishers, and prohibiting smoking in vegetated areas, apply to the proposed treatments. Implementation of these SPRs will reduce the risk of uncontrolled spread of fire from treatment activities. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than covered in the PEIR.

Impact WIL-2

Vegetation treatments proposed would include manual, mechanical, and prescribed burn treatments, which could temporarily exacerbate fire risk as described above in Impact WIL-1. In addition, steep slopes exist within the treatment area. The potential for post-fire landslides was examined in the PEIR. The potential exposure of people or structures to post-fire landslides are within the scope of the activities and impacts covered in the PEIR because the equipment types and duration, and methods of prescribed burn implementation are consistent with those analyzed in the PEIR. The inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the wildfire risk present in the areas outside the treatable landscape is essentially the same as those within the treatable landscape; therefore, the wildfire impact is also the same, as described above. SPRs applicable to this impact are AO-3, GEO-3. GEO-4, GEO-5, and GEO-8. These SPRs would be implemented to minimize soil burn severity during prescribed burns to retain vegetation and stabilize the soil (SPR AQ-3), stabilize disturbed soils from treatments to minimize erosion (SPR GEO-3), inspect treatment areas for evidence of erosion after prior to the rainy season and following the first large rainfall event (SPR GEO-4), construct water breaks to reduce stormwater runoff (SPR GEO-5), and require a qualified professional to evaluate treatment areas for instability and modify treatments to account for instability issues (SPR GEO-8). Furthermore, because the treatments reduce wildfire risk, they would also decrease post-wildfire landslide and flooding risk in areas that could otherwise burn in a high-severity wildfire without treatment. This determination is consistent with the PEIR and would not constitute a substantially more severe significant impact than covered in the PEIR.

New Wildfire Impacts

The proposed treatments are consistent with the treatment types and activities considered in the CalVTP PEIR. The project proponent has considered the site-specific characteristics of the proposed treatment project and determined they are consistent with the applicable regulatory and environmental conditions presented in the CalVTP PEIR (Sections 3.17.1 and 3.17.2 in Volume II of the Final PEIR). The project proponent has also determined that the inclusion of land in the proposed treatment area that is outside the CalVTP treatable landscape constitutes a change to the geographic extent presented in the PEIR. However, within the boundary of the project area, the

existing environmental and regulatory conditions pertinent to wildfire that are present in the areas outside the treatable landscape are essentially the same as those within the treatable landscape; therefore, the impacts of the proposed treatment project are also consistent with those covered in the PEIR. No changed circumstances are present, and the inclusion of areas outside of the CalVTP treatable landscape would not give rise to any new significant impacts not addressed in the PEIR. Therefore, no new impact related to wildfire risk would occur that is not covered in the PEIR.

4 LIST OF PREPARERS

The table below lists the preparers of this PSA and participants in the related planning, data gathering, and analytical tasks.

| Name | Title | Affiliation | Project Role |
|--------------------|--------------------------------------|-------------------------|---|
| AJ Keith | Senior Ecologist | Stillwater Sciences | Project management, environmental analysis, document preparation |
| Avi Kertesz | Wildlife Biologist | Stillwater Sciences | Environmental analysis: biological resources (wildlife) |
| Emily Applequist | Environmental Scientist | Stillwater Sciences | Environmental analysis: aesthetics and visual resources; agriculture and forestry resources; air quality; biological resources; geology, soils, paleontology, and mineral resources; hazardous materials, public health and safety, hydrology and water quality; noise; recreation; |
| Holly Burger | Senior Wildlife Biologist | Stillwater Sciences | Senior review: biological resources (wildlife) |
| Kelli Wheat Dawson | Document Production | Stillwater Sciences | Document production |
| Megan Keever | Senior Botanist | Stillwater Sciences | Senior review: biological resources (botanical, riparian, and wetland) |
| Rob Thoms | Botanist | Stillwater Sciences | Environmental analysis: biological resources (botanical, riparian, and wetland) |
| Adam Lewandowski | Senior Environmental Planner | Ascent Environmental | Senior review |
| Saba Asghary | Environmental Analyst | Ascent Environmental | Environmental analysis: wildfire, land use and planning, population and housing; public services, utilities and service systems; |
| Joshua Boldt | Senior Environmental Scientist | Ascent Environmental | Environmental analysis: greenhouse gas emissions, energy resources, transportation |
| Emilie Zelazo | Cultural Resources Specialist | Ascent Environmental | Archeological, Cultural, and Tribal Cultural Resources |

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INTRODUCTION

The California Environmental Quality Act (CEQA) and the State CEQA Guidelines (PRC Section 21081.6 and State CEQA Guidelines Sections 15091[d] and 15097) require public agencies "to adopt a reporting and monitoring program for changes to the project which it has adopted or made a condition of project approval to mitigate or avoid significant effects on the environment." A Mitigation Monitoring and Reporting Program (MMRP) is required for approval of the proposed project because the PSA/Addendum identifies potential significant adverse impacts and all feasible mitigation measures have been adopted. Standard project requirements (SPRs), which are part of the program description, have been defined to avoid or minimize adverse effects. Where potentially significant impacts remain after application of SPRs, mitigation measures have been identified to further reduce and/or compensate for those impacts. While only mitigation measures are required to be covered in an MMRP, both SPRs and mitigation are included in the MMRP to assist in implementation of all environmental protection features of later activities consistent with the CalVTP.

PURPOSE OF MITIGATION MONITORING AND REPORTING PROGRAM

This MMRP has been prepared to monitor the implementation of SPRs and mitigation measures. The attached table presents the text of each SPR and mitigation measure, the timing of its planned implementation, the implementing entity, and the entity with monitoring responsibility. The numbering of SPRs and mitigation measures follows the numbering used in the PEIR. SPRs and mitigation measures that are referenced more than once in the PSA/Addendum are not duplicated in the MMRP.

ROLES AND RESPONSIBILITIES

Unless otherwise specified herein, American Rivers is responsible for taking all actions necessary to implement the SPRs and mitigation measures under its jurisdiction according to the specifications provided for each measure and for demonstrating that the action has been successfully completed, pursuant to Section 15097 of the State CEQA Guidelines.

American Rivers is responsible for overall administration of the project-specific MMRP and for verifying that staff members or contractors have completed the necessary actions for each measure. For this project, the CEQA lead agency is Sierra Nevada Conservancy (SNC) who will be responsible for verifying that SPRs and mitigation measures are implemented by the responsible entities pursuant to Section 15097(a) of the State CEQA Guidelines. The SNC Governing Board will approve the grant funding to the project proponent and delegate the implementation of the MMRP to American Rivers.

As defined in the CalVTP PEIR and the PSA, the project proponent is a public agency that provides funding for vegetation treatment or has land ownership, land management, or other regulatory responsibility in the treatable landscape and is seeking to fund, authorize, or implement vegetation treatments consistent with the CalVTP. The SPRs and mitigation measures in this MMRP direct the project proponent to implement actions to avoid, minimize and mitigate impacts. As the implementing entity and reflecting delegation by SNC, the "project proponent"

as identified in the PSA/Addendum and this MMRP, including the SPRs and mitigation measures in the table below, refers to American Rivers.

REPORTING

SNC has delegated monitoring and reporting responsibilities to American Rivers, who accepted this delegation. American Rivers will document and describe the compliance of the proposed project with the required SPRs and mitigation measures either by adapting the project-specific MMRP table or preparing a separate post-project implementation report pursuant to the requirements of SPR AD-7, which shall also include submittal of SPR AD-7 documentation to SNC. American Rivers shall submit updates on progress related to completion and implementation of SPRs and mitigation measures to SNC pursuant to SNC grant funding requirements.

MITIGATION MONITORING AND REPORTING PROGRAM TABLE

The following categories are included in the attached MMRP table:

- **SPRs and Mitigation Measures** This column provides the text of the applicable SPR or adopted mitigation measure.
- **Applicable (Yes/No).** This column documents whether the SPR or mitigation measure is applicable to the initial treatment and/or treatment maintenance (Yes or No).
- **Timing.** This column identifies the time frame in which the SPR or mitigation measure will be implemented.
- **Implementing Entity.** This column identifies the party responsible for implementing the SPR or mitigation measure.
- **Verifying/Monitoring Entity**. This column identifies the party responsible for verifying and monitoring implementation of the SPR or mitigation measure.

QUALIFICATION REQUIREMENTS FOR BIOLOGICAL AND CULTURAL RESOURCE MEASURES

The biological and cultural resource SPRs and mitigation measures in the attached MMRP table require that qualified individuals implement components of the measures. The CalVTP PEIR requirements listed below will be met to be considered qualified and may be performed by individuals of various titles (including biologist, botanist, ecologist, Registered Professional Forester (RPF), biological technician, or supervised designees working at the direction of a qualified professional) as long they are qualified for the task at hand.

Archaeologically Trained Resource Professional: To be qualified, an archaeologically trained resource professional would hold a valid Archaeological Training Certificate issued by CAL FIRE and the Board of Forestry and Fire Protection or equivalent state or local agency training or certification. Work performed by an archaeologically trained resource professional must be reviewed and approved by a qualified archaeologist.

Qualified Archaeologist: To be qualified, an archaeologist would hold a Prehistoric Archaeology, Historic Archaeology, Conservation, Cultural Anthropology, or Curation degree from an accredited university and meet the Secretary of Interior's Qualifications Standards (36 CFR Part 61). The project proponent will review the resume and approve the qualifications of the archaeologists.

Qualified RPF or Biological Technician: To be qualified, an RPF or biological technician would 1) be knowledgeable in relevant species life histories and ecology, 2) be able to correctly identify relevant species and habitats, 3) have experience conducting biological monitoring of relevant species or resources, and 4) be knowledgeable about state and federal laws regarding the protection of special-status species. The project proponent will review the resume and approve the qualifications of RPFs or biological technicians.

Qualified RPF or Biologist: To be qualified, an RPF or biologist would hold a wildlife biology, botany, ecology, forestry, or other relevant degree from an accredited university and: 1) be knowledgeable in relevant species life histories and ecology, 2) be able to correctly identify relevant species and habitats, 3) have experience conducting field surveys of relevant species or

resources, 4) be knowledgeable about survey protocols, 5) be knowledgeable about state and federal laws regarding the protection of special-status species, and 6) have experience with CDFW's California Natural Diversity Database (CNDDB) and Biographic Information and Observation System (BIOS). The project proponent will review the resume and approve the qualifications of RPFs or biologists. If species-specific protocol surveys are performed, surveys would be conducted by qualified RPFs or biologists with the minimum qualifications required by the appropriate protocols, including having CDFW or USFWS approval to conduct such surveys, if required by certain protocols.

Qualified RPF or Botanist: To be qualified, an RPF or botanist would 1) be knowledgeable about plant taxonomy, 2) be familiar with plants of the region, including special-status plants and sensitive natural communities, 3) have experience conducting floristic botanical field surveys as described in CDFW "Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities" (current version dated March 20, 2018), or experience conducting such botanical field surveys under the direction of an experienced botanical field surveyor, 4) be familiar with the *California Manual of Vegetation* (Sawyer et al. 2009 or current version, including updated natural communities data at http://vegetation.cnps.org/), and 5) be familiar with federal, state, and local statutes and regulations related to plants and plant collecting. The project proponent will review the resume and approve the qualifications of RPFs or botanists.

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|------------------------|-----------------------------------|
| Administrative Standard Project Requirements | | | | |
| SPR AD-1 Project Proponent Coordination: For treatments coordinated with CAL FIRE, CAL FIRE will meet with the project proponent to discuss all natural and environmental resources that must be protected using SPRs and any applicable mitigation measures; identify any sensitive resources onsite; and discuss resource protection measures. For any prescribed burn treatments, CAL FIRE will also discuss the details of the burn plan in the incident action plan (IAP). This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Prior to treatment | American Rivers | American Rivers |
| SPR AD-2 Delineate Protected Resources: The project proponent will clearly define the boundaries of the treatment area and protected resources on maps for the treatment area and with highly visible flagging or clear, existing landscape demarcations (e.g., edge of a roadway) prior to beginning any treatment to avoid disturbing the resource. "Protected Resources" refers to environmentally sensitive places within or adjacent to the treatment areas that would be avoided or protected to the extent feasible during planned treatment activities to sustain their natural qualities and processes. This work will be performed by a qualified person, as defined for the specific resource (e.g., qualified Registered Professional Forester or biologist). This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Prior to treatment | American Rivers | American Rivers |
| SPR AD-3 Consistency with Local Plans, Policies, and Ordinances: The project proponent will design and implement the treatment in a manner that is consistent with applicable local plans (e.g., general plans, Community Wildfire Protection Plans, CAL FIRE Unit Fire Plans), policies, and ordinances to the extent the project is subject to them. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Prior to and throughout treatment activities | American Rivers | American Rivers, Nevada County |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|---|-------------------------|--------------------------------|
| SPR AD-4 Public Notifications for Prescribed Burning: At least three days prior to the commencement of prescribed burning operations, the project proponent will: (1) post signs along the closest public roadway to the treatment area describing the activity and timing, and requesting persons in the area to contact a designated representative of the project proponent (contact information will be provided with the notice) if they have questions or smoke concerns; (2) publish a public interest notification in a local newspapers or other widely distributed media source describing the activity, timing, and contact information; (3) send the local county supervisor and county administrative officer (or equivalent official responsible for distribution of public information) a notification letter describing the activity, its necessity, timing, and measures being taken to protect the environment and prevent prescribed burn escape. This SPR applies only to prescribed burn treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | At least three days prior to prescribed burn treatments | American Rivers | American Rivers |
| SPR AD-5 Maintain Site Cleanliness: If trash receptacles are used on-site, the project proponent will use fully covered trash receptacles with secure lids (wildlife proof) to contain all food, food scraps, food wrappers, beverages, and other worker generated miscellaneous trash. Remove all temporary non-biodegradable flagging, trash, debris, and barriers from the project site upon completion of project activities. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment | Treatment contractor | American Rivers |
| SPR AD-6 Public Notifications for Treatment Projects. One to three days prior to the commencement of a treatment activity, the project proponent will post signs in a conspicuous location near the treatment area describing the activity and timing, and requesting persons in the area to contact a designated representative of the project proponent (contact information will be provided with the notice) if they have questions or concerns. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. Prescribed burning is subject to the additional notification requirements of SPR AD-4. | Initial Treatment: Y Treatment Maintenance: Y | 1–3 days prior to treatment | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|----------------------|---------------------|------------------------|--------------------------------|
| SPR AD-7 Provide Information on Proposed, Approved, and | Initial Treatment: Y | During proposed, | American Rivers | American Rivers |
| Completed Treatment Projects. For any vegetation treatment | | approved, and | | |
| project using the CalVTP PEIR for CEQA compliance, the project | | completed stages of | | |
| proponent will provide the information listed below to the Board or | | the project | | |
| CAL FIRE during the proposed, approved, and completed stages of | Treatment | | | |
| the project. The Board or CAL FIRE will make this information | Maintenance: Y | | | |
| available to the public via an online database or other mechanism. | | | | |
| Information on proposed projects (PSA in progress): | | | | |
| ► GIS data that include project location (as a point); | | | | |
| ▶ project size (typically acres); | | | | |
| ► treatment types and activities; and | | | | |
| ► contact information for a representative of the project proponent. | | | | |
| The project proponent will provide information on the proposed | | | | |
| project to the Board or CAL FIRE as early as feasible in the | | | | |
| planning phase. The project proponent will provide this information | | | | |
| to the Board or CAL FIRE with sufficient lead time to allow those | | | | |
| agencies to make the information available to the public no later | | | | |
| than two weeks prior to project approval. The project proponent | | | | |
| may also make information available to the public via other | | | | |
| mechanisms (e.g., the proponent's own website). | | | | |
| Information on approved projects (PSA complete): | | | | |
| ► A completed PSA Environmental Checklist; | | | | |
| ► A completed Mitigation Monitoring and Reporting Program | | | | |
| (using Attachment A to the Environmental Checklist); | | | | |
| ► GIS data that include a polygon(s) of the project area, showing | | | | |
| the extent of each treatment type included in the project | | | | |
| (ecological restoration, fuel break, WUI fuel reduction). | | | | |
| Information on completed projects: | | | | |
| ► GIS data that include a polygon(s) of the treated area, showing | | | | |
| the extent of each treatment type implemented (ecological | | | | |
| restoration, fuel break, WUI fuel reduction) | | | | |
| ► A post-project implementation report (referred to by CAL FIRE | | | | |
| as a Completion Report) that includes | | | | |
| ► Size of treated area (typically acres); | | | | |
| ► Treatment types and activities; | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|------------------------|--------------------------------|
| Dates of work; A list of the SPRs and mitigation measures that were implemented Any explanations regarding implementation if required by SPRs and mitigation measures (e.g., explanation for feasibility determination required by SPR BIO-12; explanation for reduction of a no-disturbance buffer below the general minimum size described in Mitigation Measures BIO-1a and BIO-2b). This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | | | | |
| SPR AD-8 Request Access for Post-Treatment Assessment. For CAL FIRE projects, during contract development, CAL FIRE will include access to the treated area over a prescribed period (usually up to three years) to assess treatment effectiveness in achieving desired fuel conditions and other CalVTP objectives as well as any necessary maintenance, as a contract term for consideration by the landowner. For public landowners, access to the treated area over a prescribed period will be a requirement of the executed contract. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Access agreement: prior to treatment Assessment: after initial treatment and maintenance | American Rivers | American Rivers |
| SPR AD-9: Obtain a Coastal Development Permit for Proposed Treatment Within the Coastal Zone Where Required. When planning a treatment project within the Coastal Zone, the project proponent will contact the local Coastal Commission district office, or applicable local government to determine if the project area is within the jurisdiction of the Coastal Commission, a local government with a certified Local Coastal Program (LCP), or both. All treatment projects in the Coastal Zone will be reviewed by the local Coastal Commission district office or local government with a certified LCP (in consultation with the local Coastal Commission district office regarding whether a Coastal Development Permit (CDP) is required). If a CDP is required, the treatment project will be designed to meet the following conditions: | Initial Treatment: N Treatment Maintenance: N | n/a | n/a | n/a |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|---|---|------------------------|--------------------------------|
| i. The treatment project will be designed in compliance with applicable provisions of the Coastal Act that provide substantive performance standards for the protection of potentially affected coastal resources, if the treatment activity will occur within the original jurisdiction of the Commission or an area of a local coastal government without a certified LCP; and ii. The treatment project will be designed in compliance with the applicable provisions of the certified LCP, specifically the substantive performance standards for the protection of potentially affected coastal resources, if the treatment activity will occur within the jurisdiction of a local coastal government with a certified LCP. | | | | |
| This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | | | | |
| Aesthetic and Visual Resource Standard Project Requirements | | | | |
| SPR AES-1 Vegetation Thinning and Edge Feathering: The project proponent will thin and feather adjacent vegetation to break up or screen linear edges of the clearing and mimic forms of natural clearings as reasonable or appropriate for vegetation conditions. In general, thinning and feathering in irregular patches of varying densities, as well as a gradation of tall to short vegetation at the clearing edge, will achieve a natural transitional appearance. The contrast of a distinct clearing edge will be faded into this transitional band. This SPR only applies to mechanical and manual treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During mechanical and manual treatment activities | Treatment contractor | American Rivers |
| Project-specific Implementation: Verification of edge feathering to achieve a natural transitional appearance, where applicable, may be completed once, immediately after treatment is complete. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|---|---|
| SPR AES-2 Avoid Staging within Viewsheds: The project proponent will store all treatment-related materials, including vehicles, vegetation treatment debris, and equipment, outside of the viewshed of public trails, parks, recreation areas, and roadways to the extent feasible. The project proponent will also locate materials staging and storage areas outside of the viewshed of public trails, parks, recreation areas, and roadways to the extent feasible. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |
| SPR AES-3 Provide Vegetation Screening : The project proponent will preserve sufficient vegetation within, at the edge of, or adjacent to treatment areas to screen views from public trails, parks, recreation areas, and roadways as reasonable or appropriate for vegetation conditions. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |
| Air Quality Standard Project Requirements | | | | |
| SPR AQ-1 Comply with Air Quality Regulations: The project proponent will comply with the applicable air quality requirements of air districts within whose jurisdiction the project is located. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor, American Rivers | American Rivers, Northern Sierra Air Quality Management District |
| SPR AQ-2 Submit Smoke Management Plan: The project proponent will submit a smoke management plan for all prescribed burns to the applicable air district, in accordance with 17 CCR Section 80160. Pursuant to this regulation a smoke management plan will not be required for burns less than 10 acres that also will not be conducted near smoke sensitive areas, unless otherwise directed by the air district. Burning will only be conducted in compliance with the burn authorization program of the applicable air district(s) having jurisdiction over the treatment area. Example of a smoke management plan is in Appendix PD-2. This SPR applies only to prescribed burning treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Prior to prescribed burn treatments | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|------------------------|--------------------------------|
| SPR AQ-3 Create Burn Plan: The project proponent will create a burn plan using the CAL FIRE burn plan template for all prescribed burns. The burn plan will include a fire behavior model output of First Order Fire Effects Model and BEHAVE or other fire behavior modeling simulation and that is performed by a qualified fire behavior technical specialist that predicts fire behavior, calculates consumption of fuels, tree mortality, predicted emissions, greenhouse gas emissions, and soil heating. The project proponent will minimize soil burn severity from broadcast burning to reduce the potential for runoff and soil erosion. The burn plan will be created with input from a qualified technician or certified State burn boss. This SPR applies only to prescribed burning treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Prior to prescribed burn treatments | American Rivers | American Rivers |
| SPR AQ-4 Minimize Dust: To minimize dust during treatment activities, the project proponent will implement the following measures: Limit the speed of vehicles and equipment traveling on unpaved areas to 15 miles per hour to reduce fugitive dust emissions, in accordance with the California Air Resources Board (CARB) Fugitive Dust protocol. If road use creates excessive dust, the project proponent will wet appurtenant, unpaved, dirt roads using water trucks or treat roads with a non-toxic chemical dust suppressant (e.g., emulsion polymers, organic material) during dry, dusty conditions. Any dust suppressant product used will be environmentally benign (i.e., non-toxic to plants and will not negatively impact water quality) and its use will not be prohibited by ARB, EPA, or the State Water Resources Control Board (SWRCB). The project proponent will not over-water exposed areas such that the water results in runoff. The type of dust suppression method will be selected by the project proponent based on soil, traffic, site-specific conditions, and air quality regulations. Remove visible dust, silt, or mud tracked-out on to public paved roadways where sufficient water supplies and access to | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|---|--------------------------------------|-------------------------|--------------------------------|
| water is available. The project proponent will remove dust, silt, and mud from vehicles at the conclusion of each workday, or at a minimum of every 24 hours for continuous treatment activities, in accordance with Vehicle Code Section 23113. Suspend ground-disturbing treatment activities, including land clearing and bulldozer lines, when there is visible dust transport (particulate pollution) outside the treatment boundary, if the particulate emissions may "cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public, or that endanger the comfort, repose, health, or safety of any of those persons or the public, or that cause, or have a natural tendency to cause, injury or damage to business or property," per Health and Safety Code Section 41700. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |
| SPR AQ-5 Avoid Naturally Occurring Asbestos: The project proponent will avoid ground-disturbing treatment activities in areas identified as likely to contain naturally occurring asbestos (NOA) per maps and guidance published by the California Geological Survey, unless an Asbestos Dust Control Plan (17 CCR Section 93105) is prepared and approved by the air district(s) with jurisdiction over the treatment area. Any NOA-related guidance provided by the applicable air district will be followed. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: N Treatment Maintenance: N | n/a | n/a | n/a |
| SPR AQ-6: Prescribed Burn Safety Procedures. Prescribed burns planned and managed by non-CAL FIRE crews will follow all safety procedures required of CAL FIRE crew, including the implementation of an approved Incident Action Plan (IAP). The IAP will include the burn dates; burn hours; weather limitations; the specific burn prescription; a communications plan; a medical plan; a traffic plan; and special instructions such as minimizing smoke impacts to specific local roadways. The IAP will also assign responsibilities for coordination with the appropriate air district, such as conducting onsite briefings, posting notifications, weather | Treatment | During prescribed burn treatments | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|------------------------|--------------------------------|
| monitoring during burning, and other burn related preparations. This SPR applies only to prescribed burning treatment activities and all treatment types, including treatment maintenance. | | | | |
| Archaeological, Historical, and Tribal Cultural Resources Standard Project Requirements | | | | |
| SPR CUL-1 Conduct Record Search: An archaeological and historical resource record search will be conducted per the applicable state or local agency procedures. Instead of conducting a new search, the project proponent may use recent record searches containing the treatment area requested by a landowner or other public agency in accordance applicable agency guidance. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: N | Prior to preparation of PSA (Completed). See PSA for a summary of results | American Rivers | American Rivers |
| SPR CUL-2 Contact Geographically Affiliated Native American Tribes: The project proponent will obtain the latest Native American Heritage Commission (NAHC) provided Native Americans Contact List. Using the appropriate Native Americans Contact List, the project proponent will notify the California Native American Tribes in the counties where the treatment activity is located. The notification will contain the following: A written description of the treatment location and boundaries. Brief narrative of the treatment objectives. A description of the activities used (e.g., prescribed burning, mastication) and associated acreages. A map of the treatment area at a sufficient scale to indicate the spatial extent of activities. A request for information regarding potential impacts to cultural resources from the proposed treatment. A detailed description of the depth of excavation, if ground disturbance is expected. In addition, the project proponent will contact the NAHC for a review of their Sacred Lands File. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: N | Prior to preparation of PSA (Completed). See PSA for a summary of outreach and consultation. | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|------------------------|--------------------------------|
| SPR-CUL-3 Pre-field Research: The project proponent will conduct research prior to implementing treatments as part of the cultural resource investigation. The purpose of this research is to properly inform survey design, based on the types of resources likely to be encountered within the treatment area, and to be prepared to interpret, record, and evaluate these findings within the context of local history and prehistory. The qualified archaeologist and/or archaeologically trained resource professional will review records, study maps, read pertinent ethnographic, archaeological, and historical literature specific to the area being studied, and conduct other tasks to maximize the effectiveness of the survey. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: N | Prior to preparation of the PSA. Pre- field research was completed in 2021 and is documented in the Archeological Survey Report. See PSA for a summary. | American Rivers | American Rivers |
| SPR CUL-4 Archaeological Surveys: The project proponent will coordinate with an archaeologically trained resource professional and/or qualified archaeologist to conduct a site-specific survey of the treatment area. The survey methodology (e.g., pedestrian survey, subsurface investigation) depends on whether the area has a low, moderate, or high sensitivity for resources, which is based on whether the records search, pre-field research, and/or Native American consultation identifies archaeological or historical resources near or within the treatment area. A survey report will be completed for every cultural resource survey completed. The specific requirements will comply with the applicable state or local agency procedures. This SPR applies to all treatment activities and treatment types, including treatment maintenance. Project-specific Implementation: Per the preferences of the United Auburn Indian Community, a separate Cultural Resources Protection Measures Action Plan (Action Plan) containing the protection measures will be developed and appended to the Archaeological Survey Report (ASR). The Action Plan will reference the proposed project treatments and the location and actions of the protection measures but will not disclose the specific location of cultural resources. Only the Action Plan appendix will | Treatment Maintenance: N | Prior to preparation of the PSA. Archeological surveys were completed in late 2021 and early 2022 and are documented in the Archeological Survey Report. See PSA for a summary. | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|--------------------------|--|------------------------|--------------------------------|
| be supplied to the project proponent rather than the entire ASR document. | | | | |
| SPR CUL-5 Treatment of Archaeological Resources: If cultural resources are identified within a treatment area, and cannot be avoided, a qualified archaeologist will notify the culturally affiliated tribe(s) based on information provided by NAHC and assess, | | Prior to and during all treatment activities | American Rivers | American Rivers |
| whether an archaeological find qualifies as a unique archaeological resource, an historical resource, or in coordination with said tribe(s), as a tribal cultural resource. The project proponent, in consultation with culturally affiliated tribe(s), will develop effective protection measures for important cultural resources located within treatment | Treatment Maintenance: Y | | | |
| areas. These measures may include adjusting the treatment location or design to entirely avoid cultural resource locations or changing treatment activities so that damaging effects to cultural resources will not occur. These protection measures will be written in clear, | | | | |
| enforceable language, and will be included in the survey report in accordance with applicable state or local agency procedures. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |
| Project-specific Implementation: Protection measures developed in conjunction with the United Auburn Indian Community will be included in an Action Plan appended to the ASR (see SPR CUL-4). | | | | |
| Prior to implementation of treatments, an equipment exclusion zone (EEZ) will be established to delineate areas to be protected. EEZs shall be demarcated on the project plans and/or mapping and marked on the ground with high visibility flagging. The specific | | | | |
| location of cultural resources within EEZs will not be identified or disclosed. No motorized equipment or mechanical treatment as defined under the CalVTP shall enter or be used in the EEZ. Either prior to or as part of the flagging effort for certain cultural | | | | |
| resources, the Tribe shall be invited by the project proponent to conduct a survey of the resource location and/or to assist with the flagging. Within EEZs, vegetation shall be hand cleared using the manual treatments outlined under the CalVTP (e.g., use of hand tools and hand operated power tools). The Tribe will be invited to | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|---|--|------------------------|--------------------------------|
| participate in hand clearing around certain pre-identified cultural resources. After completion of prescribed burning in EEZs, the project proponent will invite the Tribe to conduct a post-implementation survey to evaluate the condition of known cultural resources and potentially identify additional sites not currently visible. | | | | |
| SPR CUL-6 Treatment of Tribal Cultural Resources: The project proponent, in consultation with the culturally affiliated tribe(s), will develop effective protection measures for important tribal cultural resources located within treatment areas. These measures may include adjusting the treatment location or design to entirely avoid cultural resource locations or changing treatment activities so that damaging effects to cultural resources will not occur. The project proponent will provide the tribe(s) the opportunity to submit comments and participate in consultation to resolve issues of concern. The project proponent will defer implementing the treatment until the tribe approves protection measures, or if agreement cannot be reached after a good-faith effort, the proponent determines that any or all feasible measures have been implemented, where feasible, and the resource is either avoided or protected. This SPR applies to all treatment activities and treatment types, including treatment maintenance. Project-specific Implementation: Protection measures developed in conjunction with the United Auburn Indian Community will be included in an Action Plan appended to the ASR (see SPR CUL-4). Prior to implementation of treatments, an equipment exclusion zone (EEZ) will be established to delineate areas to be protected. EEZs shall be demarcated on the project plans and/or mapping and marked on the ground with high visibility flagging. The specific location of cultural resources within EEZs will not be identified or disclosed. No motorized equipment or mechanical treatment as defined under the CalVTP shall enter or be used in the EEZ. Either prior to or as part of the flagging effort for certain cultural resources, the Tribe shall be invited by the project proponent to conduct a survey of the resource location and/or to assist with the | Initial Treatment: Y Treatment Maintenance: Y | Prior to and during all treatment activities | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|---|--|------------------------|--------------------------------|
| flagging. Within EEZs, vegetation shall be hand cleared using the manual treatments outlined under the CalVTP (e.g., use of hand tools and hand operated power tools). The Tribe will be invited to participate in hand clearing around certain pre-identified cultural resources. After completion of prescribed burning in EEZs, the project proponent will invite the Tribe to conduct a post-implementation survey to evaluate the condition of known cultural resources and potentially identify additional sites not currently visible. | | | | |
| SPR CUL-7 Avoid Built Historical Resources: If the records search identifies built historical resources, as defined in Section 15064.5 of the State CEQA Guidelines, the project proponent will avoid these resources. Within a buffer of 100 feet of the built historical resource, there will be no prescribed burning or mechanical treatment activities. Buffers less than 100 feet for built historical resources will only be used after consultation with and receipt of written approval from a qualified archaeologist. If the records search does not identify known historical resources in the treatment area, but structures (i.e., buildings, bridges, roadways) over 50 years old that have not been evaluated for historic significance are present in the treatment area, they will similarly be avoided. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Prior to and during all treatment activities | American Rivers | American Rivers |
| SPR CUL-8 Cultural Resource Training: The project proponent will train all crew members and contractors implementing treatment activities on the protection of sensitive archaeological, historical, or tribal cultural resources. Workers will be trained to halt work if archaeological resources are encountered on a treatment site and the treatment method consists of physical disturbance of land surfaces (e.g., soil disturbance). This SPR applies to all treatment activities and treatment types, including treatment maintenance. Project-specific Implementation: The United Auburn Indian Community may participate/support the project proponent in providing this training. | Initial Treatment: Y Treatment Maintenance: Y | Prior to and during all treatment activities | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-------------------|------------------------------|---|--------------------------------|
| Biological Resources Standard Project Requirements | | | | |
| SPR BIO-1: Review and Survey Project-Specific Biological Resources. The project proponent will require a qualified RPF or biologist to conduct a data review and reconnaissance-level survey prior to treatment, no more than one year prior to the submittal of the PSA, and no more than one year between completion of the PSA and implementation of the treatment project. The data reviewed will include the biological resources setting, species and sensitive natural communities tables, and habitat information in this PEIR for the ecoregion(s) where the treatment will occur. It will also include review of the best available, current data for the area, including vegetation mapping data, species distribution/range information, CNDDB, California Native Plant Society (CNPS) Inventory of Rare and Endangered Plants of California, relevant BIOS queries, and relevant general and regional plans. Reconnaissance-level biological surveys will be general surveys that include visual and auditory inspection for biological resources to help determine the environmental setting of a project site. The qualified surveyor will (1) identify and document sensitive resources, such as riparian or other sensitive habitats, sensitive natural community, wetlands, or wildlife nursery site or habitat (including bird nests), and (2) assess the suitability of habitat for special-status plant and animal species. The surveyor will also record any incidental wildlife observations. For each treatment project, habitat assessments will be completed at a time of year that is appropriate for identifying habitat and no more than one year prior to the submittal of the PSA, unless it can be demonstrated in the PSA that habitat assessments older than one year remain valid (e.g., site conditions are unchanged and no treatment activity has occurred since the assessment). If more than one year passes between completion of the PSA and initiation of the treatment project, the project proponent will verify the continued accuracy of the PSA prior to beginning the treatme | Maintenance: Y | Completed, see Attachment B. | American Rivers, in consultation with a qualified biologist or Registered Professional Forester | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-------------------|--------|------------------------|--------------------------------|
| with a qualified RPF or biologist, will determine which one of the following best characterizes the treatment: | | | | |
| Suitable Habitat Is Present but Adverse Effects Can Be Clearly Avoided. If, based on the data review and reconnaissance-level survey, the qualified RPF or biologist determines that suitable habitat for sensitive biological resources is present but adverse effects on the suitable habitat can clearly be avoided through one of the following methods, the avoidance mechanism will be implemented prior to initiating treatment and will remain in effect throughout the treatment: by physically avoiding the suitable habitat, or by conducting treatment outside of the season when a sensitive resource could be present within the suitable habitat or outside the season of sensitivity (e.g., outside of special-status bird nesting season, during dormant season of sensitive annual or geophytic plant species, or outside of maternity and rearing season at wildlife nursery sites). Physical avoidance will include flagging, fencing, stakes, or clear, existing landscape demarcations (e.g., edge of a roadway) to delineate the boundary of the avoidance area around the suitable habitat. For physical avoidance, a buffer may be implemented as determined necessary by the qualified RPF or biologist. Suitable Habitat is Present and Adverse Effects Cannot Be | | | | |
| Clearly Avoided. Further review and surveys will be conducted to determine presence/absence of sensitive biological resources that may be affected, as described in the SPRs below. Further review may include contacting USFWS, NOAA Fisheries, CDFW, CNPS, or local resource agencies as necessary to determine the potential for special-status species or other sensitive biological resources to be affected by the treatment activity. Focused or protocol-level surveys will be conducted as necessary to determine presence/absence. If protocol surveys are conducted, survey procedures will adhere to methodologies approved by resource agencies and the scientific community, | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|------------------------|---------------------------------------|
| such as those that are available on the CDFW webpage at: https://www.wildlife.ca.gov/Conservation/Survey-Protocols. Specific survey requirements are addressed for each resource type in relevant SPRs (e.g., additional survey requirements are presented for special-status plants in SPR BIO-7). This SPR applies to all treatment activities and treatment types, including treatment maintenance. Project-specific Implementation: For treatment maintenance that occurs within 5 years of the initial treatment, an abbreviated reconnaissance-level survey may be performed to verify that site conditions have not substantially changed since SPR BIO-1 was completed for the initial treatment. | | | | |
| SPR BIO-2: Require Biological Resource Training for Workers. The project proponent will require crew members and contractors to receive training from a qualified RPF or biologist prior to beginning a treatment project. The training will describe the appropriate work practices necessary to effectively implement the biological SPRs and mitigation measures and to comply with the applicable environmental laws and regulations. The training will include the identification, relevant life history information, and avoidance of pertinent special-status species; identification and avoidance of sensitive natural communities and habitats with the potential to occur in the treatment area; impact minimization procedures; and reporting requirements. The training will instruct workers when it is appropriate to stop work and allow wildlife encountered during treatment activities to leave the area unharmed and when it is necessary to report encounters to a qualified RPF, biologist, or biological technician. The qualified RPF, biologist, or biological technician will immediately contact CDFW or USFWS, as appropriate, if any wildlife protected by the California Endangered Species Act (CESA) or Federal Endangered Species Act (ESA) is encountered and cannot leave the site on its own (without being handled). This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Workers conducting treatment activities will receive sensitive biological resources awareness training prior to the start of treatment activities; any new workers introduced during treatment will receive the same training prior to beginning work. | American Rivers | American Rivers and CDFW as necessary |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|--|--------------------|------------------------|--------------------------------|
| Sensitive Natural Communities and Other Sensitive Habitats | | | | |
| SPR BIO-3: Survey Sensitive Natural Communities and Other Sensitive Habitats. If SPR BIO-1 determines that sensitive natural communities or sensitive habitats may be present and adverse effects cannot be avoided, the project proponent will: require a qualified RPF or biologist to perform a protocol-level survey following the CDFW "Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities" (current version dated March 20, 2018) of the treatment area prior to the start of treatment activities for sensitive natural communities and sensitive habitats. Sensitive natural communities will be identified using the best means possible, including keying them out using the most current edition of A Manual of California Vegetation (including updated natural communities data at http://vegetation.cnps.org/), or referring to relevant reports (e.g., reports found on the VegCAMP website). map and digitally record, using a Global Positioning System (GPS), the limits of any potential sensitive habitat and sensitive natural community identified in the treatment area. This SPR applies to all treatment activities and treatment types, | Initial Treatment: Y Treatment Maintenance: Y | Prior to treatment | American Rivers | American Rivers |
| Project-specific Implementation: For treatment maintenance, SPR BIO-1 shall be completed to determine if site conditions have changed since the initial treatment, such that new sensitive natural communities or sensitive habitats could be present. If new sensitive natural communities or habitats could be present, the surveys in SPR BIO-3 shall be completed for areas where those communities or habitats could be present. If implementation of SPR BIO-1 determines that site conditions have not changed to the extent that new sensitive communities or habitats are likely to occur, then the survey completed for SPR BIO-3 as part of the initial treatment is still valid and does not need to be redone for the treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|----------------------|----------------------|------------------------|--------------------------------|
| SPR BIO-4: Design Treatment to Avoid Loss or Degradation of | Initial Treatment: Y | Prior to and during | American Rivers | American Rivers |
| Riparian Habitat Function. Project proponents, in consultation | | treatment activities | in consultation | |
| with a qualified RPF or qualified biologist, will design treatments in | | | with a qualified | |
| riparian habitats to retain or improve habitat functions by | | | RPF or biologist | |
| implementing the following within riparian habitats: | Treatment | | | |
| Retain at least 75 percent of the overstory and 50 percent of the | Maintenance: Y | | | |
| understory canopy of native riparian vegetation within the | | | | |
| limits of riparian habitat identified and mapped during surveys | | | | |
| conducted pursuant to SPR BIO-3. Native riparian vegetation will be retained in a well distributed multi-storied stand | | | | |
| composed of a diversity of species similar to that found before | | | | |
| the start of treatment activities. | | | | |
| Treatments will be limited to removal of uncharacteristic fuel | | | | |
| loads (e.g., removing dead or dying vegetation), | | | | |
| trimming/limbing of woody species as necessary to reduce | | | | |
| ladder fuels, and select thinning of vegetation to restore | | | | |
| densities that are characteristic of healthy stands of the riparian | | | | |
| vegetation types characteristic of the region. This includes hand | | | | |
| removal (or mechanized removal where topography allows) of | | | | |
| dead or dying riparian trees and shrubs, invasive plant removal, | | | | |
| selective thinning, and removal of encroaching upland species. | | | | |
| ► Removal of large, native riparian hardwood trees (e.g., willow, | | | | |
| ash, maple, oak, alder, sycamore, cottonwood) will be | | | | |
| minimized to the extent feasible and 75 percent of the | | | | |
| pretreatment native riparian hardwood tree canopy will be | | | | |
| retained. Because tree size varies depending on vegetation type | | | | |
| present and site conditions, the tree size retention parameter | | | | |
| will be determined on a site-specific basis depending on | | | | |
| vegetation type present and setting; however, live, healthy, | | | | |
| native trees that are considered large for that type of tree and | | | | |
| large relative to other trees in that location will be retained. A | | | | |
| scientifically based, project-specific explanation substantiating | | | | |
| the retention size parameter for native riparian hardwood tree | | | | |
| removal will be provided in the Biological Resources | | | | |
| Discussion of the PSA. Consideration of factors such as site | | | | |

| | Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|--|-------------------|--------|------------------------|--------------------------------|
| | hydrology, erosion potential, suitability of wildlife habitat, | | | | |
| | presence of sufficient seed trees, light availability, and changes | | | | |
| | in stream shading may inform the tree size retention | | | | |
| | requirements. | | | | |
| • | Removed trees will be felled away from adjacent streams or | | | | |
| | waterbodies and piled outside of the riparian vegetation zone | | | | |
| | (unless there is an ecological reason to do otherwise that is approved by applicable regulatory agencies, such as adding | | | | |
| | large woody material to a stream to enhance fish habitat, e.g., | | | | |
| | see Accelerated Wood Recruitment and Timber Operations: | | | | |
| | Process Guidance from the California Timber Harvest Review | | | | |
| | Team Agencies and National Marine Fisheries Service). | | | | |
| • | Vegetation removal that could reduce stream shading and | | | | |
| | increase stream temperatures will be avoided. | | | | |
| • | Ground disturbance within riparian habitats will be limited to | | | | |
| | the minimum necessary to implement effective treatments. This | | | | |
| | will consist of the minimum disturbance area necessary to | | | | |
| | reduce hazardous fuels and return the riparian community to a | | | | |
| | natural fire regime (i.e., Condition Class 1) considering historic | | | | |
| | fire return intervals, climate change, and land use constraints. | | | | |
| • | Only hand application of herbicides approved for use in aquatic | | | | |
| | environments will be allowed and only during low-flow periods | | | | |
| | or when seasonal streams are dry. | | | | |
| • | The project proponent will notify CDFW when required by | | | | |
| | California Fish and Game Code Section 1602 prior to | | | | |
| | implementing any treatment activities in riparian habitats. | | | | |
| | Notification will identify the treatment activities, map the vegetation to be removed, identify the impact avoidance | | | | |
| | identification methods to be used (e.g., flagging), and | | | | |
| | appropriate protections for the retention of shaded riverine | | | | |
| | habitat, including buffers and other applicable measures to | | | | |
| | prevent erosion into the waterway. | | | | |
| • | In consideration of spatial variability of riparian vegetation | | | | |
| | types and condition and consistent with California Forest | | | | |
| | Practice Rules Section 916.9(v) (February 2019 version), a | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|--|-------------------------------|------------------------|--------------------------------|
| different set of vegetation retention standards and protection measures from those specified in the above bullets may be implemented on a site-specific basis if the qualified RPF and the project proponent demonstrate through substantial evidence that alternative design measures provide a more effective means of achieving the treatment goals objectives and would result in effects to the Beneficial Functions of Riparian Zones equal or more favorable than those expected to result from application of the above measures. Deviation from the above design specifications, different protection measures and design standards will only be approved when the treatment plan incorporates an evaluation of beneficial functions of the riparian habitat and with written concurrence from CDFW. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |
| SPR BIO-5: Avoid Environmental Effects of Type Conversion and Maintain Habitat Function in Chaparral and Coastal Sage Scrub. The project proponent will design treatment activities to avoid type conversion where native coastal sage scrub and chaparral are present. An ecological definition of type conversion is used in the CalVTP PEIR for assessment of environmental effects: a change from a vegetation type dominated by native shrub species that are characteristic of chaparral and coastal sage scrub vegetation alliances to a vegetation type characterized predominantly by weedy herbaceous cover or annual grasslands. For the PEIR, type conversion is considered in terms of habitat function, which is defined here as the arrangement and capability of habitat features to provide refuge, food source, and reproduction habitat to plants and animals, and thereby contribute to the conservation of biological and genetic diversity and evolutionary processes (de Groot et al. 2002). Some modification of habitat characteristics may occur provided habitat function is maintained (i.e., the location, essential habitat features, and species supported are not substantially changed). | Initial Treatment: Y Treatment Maintenance: Y | Prior to and during treatment | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-------------------|--------|------------------------|--------------------------------|
| During the reconnaissance-level survey required in SPR BIO-1, a | | | | |
| qualified RPF or biologist will identify chaparral and coastal sage | | | | |
| scrub vegetation to the alliance level and determine the condition | | | | |
| class and fire return interval departure of the chaparral and/or | | | | |
| coastal sage scrub present in each treatment area. | | | | |
| For all treatment types in chaparral and coastal sage scrub, the | | | | |
| project proponent, in consultation with a qualified RPF or qualified | | | | |
| biologist will: | | | | |
| ► Develop a treatment design that avoids environmental effects of | | | | |
| type conversion in chaparral and coastal sage scrub vegetation | | | | |
| alliances, which will include evaluating and determining the | | | | |
| appropriate spatial scale at which the proponent would consider | | | | |
| type conversion, and substantiating its appropriateness. The | | | | |
| project proponent will demonstrate with substantial evidence | | | | |
| that the habitat function of chaparral and coastal sage scrub | | | | |
| would be at least maintained within the identified spatial scale | | | | |
| at which type conversion is evaluated for the specific treatment | | | | |
| project. Consideration of factors such as site hydrology, erosion | | | | |
| potential, suitability of wildlife habitat, spatial needs of | | | | |
| sensitive species, presence of sufficient seed plants and nurse | | | | |
| plants, light availability, and edge effects may inform the | | | | |
| determination of an appropriate spatial scale. | | | | |
| ► The treatment design will maintain a minimum percent cover of | | | | |
| mature native shrubs within the treatment area to maintain | | | | |
| habitat function; the appropriate percent cover will be identified | | | | |
| by the project proponent in the development of treatment | | | | |
| design and be specific to the vegetation alliances that are | | | | |
| present in the identified spatial scale used to evaluate type | | | | |
| conversion. Mature native shrubs that are retained will be | | | | |
| distributed contiguously or in patches within the stand. If the | | | | |
| stand consists of multiple age classes, patches representing a | | | | |
| range of middle to old age classes will be retained to maintain | | | | |
| and improve heterogeneity, to the extent needed to avoid type | | | | |
| conversion. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|-------------------|--------|------------------------|--------------------------------|
| These SPR requirements apply to all treatment activities and all | | | | |
| treatment types, including treatment maintenance. | | | | |
| Additional measures will be applied to ecological restoration | | | | |
| treatment types: | | | | |
| ► For ecological restoration treatment types, complete removal of the mature shrub layer will not occur in native chaparral and coastal sage scrub vegetation types. | | | | |
| ▶ Ecological restoration treatments will not be implemented in vegetation types that are within their natural fire return interval (i.e., time since last burn is less than the average time listed as the fire return interval range in Table 3.6-1) unless the project proponent demonstrates with substantial evidence that the habitat function of chaparral and coastal sage scrub would be improved. | | | | |
| A minimum of 35 percent relative cover of existing shrubs and associated native vegetation will be retained at existing densities in patches distributed in a mosaic pattern within the treated area or the shrub canopy will be thinned by no more than 20 percent from baseline density (i.e., if baseline shrub canopy density is 60 percent, post treatment shrub canopy density will be no less than 40 percent). A different percent relative cover can be retained if the project proponent demonstrates with substantial evidence that alternative treatment design measures would result in effects on the habitat function of chaparral and coastal sage scrub that are equal or more favorable than those expected to result from application of the above measures. Biological considerations that may inform a deviation from the minimum 35 percent relative cover retention include but are not limited to soil moisture requirements, increased soil temperatures, changes in | | | | |
| light/shading, presence of sufficient seed plants and nurse plants, erosion potential, and site hydrology. If the stand within the treatment area consists of multiple age classes, patches representing a range of middle to old age classes will be retained to maintain and improve heterogeneity. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-------------------|--------|------------------------|--------------------------------|
| These SPR requirements apply to all treatment activities and only the ecosystem restoration treatment type, including treatment maintenance. A determination of compliance with the SB 1260 prohibition of type conversion in chaparral and coastal sage scrub is a statutory issue separate from CEQA compliance that may involve factors additional to the ecological definition and habitat functions presented in the PEIR, such as geographic context. It is beyond the legal scope of the PEIR to define SB 1260 type conversion and statutory compliance. The project proponent, acting as lead agency for the proposed later treatment project, will be responsible for | | | | |
| defining type conversion in the context of the project and making the finding that type conversion would not occur, as required by SB 1260. The project proponent will determine its criteria for defining and avoiding type conversion and, in making its findings, may draw upon information presented in this PEIR. | | | | |
| Project-specific Implementation: To avoid type conversion of the whiteleaf manzanita chaparral identified in the treatment area, the following measures will be implemented during treatment: ▶ All whiteleaf manzanita chaparral patches would be considered with respect to the scale at which the effects of type conversion could potentially occur. In the proposed treatment area, whiteleaf manzanita chaparral was documented in four separate patches, ranging in size from 0.35 acres to 16.98 acres. All patches would be considered relevant for avoiding type conversion. | | | | |
| Retention plots would be established within each of the four chaparral areas such that a minimum of 35% of the area is retained in intact patches. This percent coverage would ensure the membership rule for the whiteleaf manzanita alliance (>30% relative canopy cover of mature shrubs) would still be met (CNPS 2022) while the mature retained shrubs would be sources of food for wildlife and natural recruitment of the alliance via regeneration from seed. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|---|-------------------------------|-------------------------|--------------------------------|
| SPR BIO-6: Prevent Spread of Plant Pathogens. When working in sensitive natural communities, riparian habitats, or oak woodlands that are at risk from plant pathogens (e.g., Ione chaparral, blue oak woodland), the project proponent will implement the following best management practices to prevent the spread of <i>Phytopthora</i> and other plant pathogens (e.g., pitch canker (<i>Fusarium</i>), goldspotted oak borer, shot hole borer, bark beetle): ▶ clean and sanitize vehicles, equipment, tools, footwear, and | Initial Treatment: Y Treatment Maintenance: Y | Prior to and during treatment | Treatment Contractor | American Rivers |
| clothes before arriving at a treatment site and when leaving a contaminated site, or a site in a county where contamination is a risk; | | | | |
| include training on <i>Phytopthora</i> diseases and other plant pathogens in the worker awareness training; minimize soil disturbance as much as possible by limiting the number of vehicles, avoiding off-road travel as much as | | | | |
| possible, and limiting use of mechanized equipment; minimize movement of soil and plant material within the site, especially between areas with high and low risk of | | | | |
| contamination; clean soil and debris from equipment and sanitize hand tools, buckets, gloves, and footwear when moving from high risk to low risk areas or between widely separated portions of a treatment area; and | | | | |
| ▶ follow the procedures listed in Guidance for plant pathogen prevention when working at contaminated restoration sites or with rare plants and sensitive habitat (Working Group for <i>Phytophthoras</i> in Native Habitats 2016). | | | | |
| This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|--|--------------------|------------------------|--------------------------------|
| Special-Status Plants | | | | |
| Special-Status Plants SPR BIO-7: Survey for Special-Status Plants. If SPR BIO-1 determines that suitable habitat for special-status plant species is present and cannot be avoided, the project proponent will require a qualified RPF or botanist to conduct protocol-level surveys for special-status plant species with the potential to be affected by a treatment prior to initiation of the treatment. The survey will follow the methods in the current version of CDFW's "Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities." Surveys to determine the presence or absence of special-status plant species will be conducted in suitable habitat that could be affected by the treatment and timed to coincide with the blooming or other appropriate phenological period of the target species (as determined by a qualified RPF or botanist), or all species in the same genus as the target species will be assumed to be special-status. If potentially occurring special-status plants are listed under CESA or ESA, protocol-level surveys to determine presence/absence of the listed species will be conducted in all circumstances, unless determined otherwise by CDFW or USFWS. For other special-status plants not listed under CESA or ESA, as defined in Section 3.6.1 of this PEIR, surveys will not be required under the following circumstances: If protocol-level surveys, consisting of at least two survey visits (e.g., early blooming season and later blooming season) during a normal weather year, have been completed in the 5 years before implementation of the treatment project and no special- status plants were found, and no treatment activity has occurred | Initial Treatment: Y Treatment Maintenance: Y | Prior to treatment | American Rivers | American Rivers |
| following the protocol-level survey, treatment may proceed without additional plant surveys. If the target special-status plant species is an herbaceous annual, stump-sprouting, or geophyte species, the treatment may be carried out during the dormant season for that species or when the species has completed its annual lifecycle without conducting presence/absence surveys provided the treatment | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|--|---|---|---|
| will not alter habitat or destroy seeds, stumps, or roots, rhizomes, bulbs and other underground parts in a way that would make it unsuitable for the target species to reestablish following treatment. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |
| Project-specific Implementation: For treatment maintenance, if special status plant surveys have been conducted for the initial treatment within 5 years of the treatment maintenance, the surveys can be considered valid and do not need to be redone for the treatment maintenance. | | | | |
| Environmentally Sensitive Habitat Areas | | | | |
| SPR BIO-8: Identify and Avoid or Minimize Impacts in Coastal Zone ESHAs. When planning a treatment project within the Coastal Zone, the project proponent will, in consultation with the Coastal Commission or a local government with a certified Local Coastal Program (LCP) (as applicable), identify the habitat types and species present to determine if the area qualifies as an Environmentally Sensitive Habitat Area (ESHA). If the area is an ESHA, the treatment project may be allowed pursuant to this PEIR, if it meets the following conditions. If a project requires a CDP by the Coastal Commission or a local government with a certified LCP (as applicable), the CDP approval may require modification to these conditions to further avoid and minimize impacts: ▶ The treatment will be designed, in compliance with the Coastal Act or LCP if a site is within a certified LCP area, to protect the habitat function of the affected ESHA, protect habitat values, and prevent loss or type conversion of habitat and vegetation types that define the ESHA. ▶ Treatment actions will be limited to eradication or control of invasive plants, removal of uncharacteristic fuel loads (e.g., removing dead, diseased, or dying vegetation), trimming/limbing of woody species as necessary to reduce | Initial Treatment: N Treatment Maintenance: N | The project treatment area is not within the Coastal Zone; not applicable | The project treatment area is not within the Coastal Zone; not applicable | The project treatment area is not within the Coastal Zone; not applicable |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|---|------------------|------------------------|--------------------------------|
| ladder fuels, and select thinning of vegetation to restore densities that are characteristic of healthy stands of the vegetation types present in the ESHA. A qualified biologist or RPF familiar with the ecology of the treatment area will monitor all treatment activities in ESHAs. Appropriate no-disturbance buffers will be developed in compliance with the Coastal Act or relevant LCP policies for treatment activities in the vicinity of ESHAs to avoid adverse direct and indirect effects to ESHAs. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | | | | |
| Invasive Plants and Wildlife | | | | |
| SPR BIO-9: Prevent Spread of Invasive Plants, Noxious Weeds, and Invasive Wildlife. The project proponent will take the following actions to prevent the spread of invasive plants, noxious weeds, and invasive wildlife (e.g., New Zealand mudsnail): ▶ clean clothing, footwear, and equipment used during treatments of soil, seeds, vegetative matter, other debris or seed-bearing material, or water (e.g., rivers, streams, creeks, lakes) before entering the treatment area or when leaving an area with infestations of invasive plants, noxious weeds, or invasive wildlife; ▶ for all heavy equipment and vehicles traveling off road, pressure wash, if feasible, or otherwise appropriately decontaminate equipment at a designated weed-cleaning station prior to entering the treatment area from an area with infestations of invasive plants, noxious weeds, or invasive wildlife. Anti-fungal wash agents will be specified if the equipment has been exposed to any pathogen that could affect native species; ▶ inspect all heavy equipment, vehicles, tools, or other treatment-related materials for sand, mud, or other signs that weed seeds or propagules could be present prior to use in the treatment | Initial Treatment: Y Treatment Maintenance: Y | During treatment | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-------------------|--------|------------------------|--------------------------------|
| area. If the equipment is not clean, the qualified RPF or | | | | |
| biological technician will deny entry to the work areas; | | | | |
| stage equipment in areas free of invasive plant infestations | | | | |
| unless there are no uninfested areas present within a reasonable | | | | |
| proximity to the treatment area; | | | | |
| identify significant infestations of invasive plant species (i.e., | | | | |
| those rated as invasive by Cal-IPC or designated as noxious | | | | |
| weeds by California Department of Food and Agriculture) | | | | |
| during reconnaissance-level surveys and target them for | | | | |
| removal during treatment activities. Treatment methods will be | | | | |
| selected based on the invasive species present and may include | | | | |
| herbicide application, manual or mechanical treatments, | | | | |
| prescribed burning, and/or herbivory, and will be designed to | | | | |
| maximize success in killing or removing the invasive plants and | | | | |
| preventing reestablishment based on the life history | | | | |
| characteristics of the invasive plant species present. Treatments | | | | |
| will be focused on removing invasive plant species that cause | | | | |
| ecological harm to native vegetation types, especially those that can alter fire cycles; | | | | |
| treat invasive plant biomass onsite to eliminate seeds and | | | | |
| propagules and prevent reestablishment or dispose of invasive | | | | |
| plant biomass offsite at an appropriate waste collection facility | | | | |
| (if not kept on site); transport invasive plant materials in a | | | | |
| closed container or bag to prevent the spread of propagules | | | | |
| during transport; and | | | | |
| implement Fire and Fuel Management BMPs outlined in the | | | | |
| "Preventing the Spread of Invasive Plants: Best Management | | | | |
| Practices for Land Mangers" (Cal-IPC 2012, or current | | | | |
| version). | | | | |
| This SPR applies to all treatment activities and treatment types, | | | | |
| including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|--|--|---|---------------------------------------|
| Wildlife | | | | |
| SPR BIO-10: Survey for Special-Status Wildlife and Nursery Sites. If SPR BIO-1 determines that suitable habitat for special- status wildlife species or nurseries of any wildlife species is present and cannot be avoided, the project proponent will require a qualified RPF or biologist to conduct focused or protocol-level surveys for special-status wildlife species or nursery sites (e.g., bat maternity roosts, deer fawning areas, heron or egret rookeries, monarch overwintering sites) with potential to be directly or indirectly affected by a treatment activity. The survey area will be determined by a qualified RPF or biologist based on the species and habitats and any recommended buffer distances in agency protocols. The qualified RPF or biologist will determine if following an established protocol is required, and the project proponent may consult with CDFW and/or USFWS for technical information regarding appropriate survey protocols. Unless otherwise specified in a protocol, the survey will be conducted no more than 14 days prior to the beginning of treatment activities. Focused or protocol surveys for a special-status species with potential to occur in the treatment area may not be required if presence of the species is assumed. This SPR applies to all treatment activities and treatment types, including treatment maintenance. Project-specific Implementation ▶ To avoid adverse effects on special-status reptiles (i.e., western pond turtle) focused surveys will be conducted in suitable habitat prior to treatment implementation. ▶ To avoid adverse effects on special-status amphibians (i.e., foothill yellow-legged frog) focused surveys will be conducted in suitable habitat prior to treatment implementation. ▶ To avoid adverse effects on special-status birds (i.e., northern goshawk) focused surveys for nesting goshawk will be conducted prior to the implementation of treatment activities | Initial Treatment: Y Treatment Maintenance: Y | A qualified biologist will conduct focused surveys for special-status wildlife species identified as having the potential to occur in the project area during the reconnaissance-level survey conducted as required under SPR BIO-1. Surveys will typically occur no more than 14 days prior to the start of project activities, however, surveys for nesting goshawk will be based on the species' breeding phenology to maximize the likelihood of detection of nesting individuals. | American Rivers, in consultation with a qualified biologist or Registered Professional Forester | American Rivers and CDFW as necessary |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
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| that occur during the goshawk nesting season (February 15–August 31). ▶ To avoid adverse effects on special-status bats (i.e., Townsend's big-eared bat), focused surveys for maternity roosts will be conducted prior to treatment implementation in habitat likely to support maternity roosts. | | | | |
| SPR BIO-11. Install Wildlife-Friendly Fencing (Prescribed Herbivory). If temporary fencing is required for prescribed herbivory treatment, a wildlife-friendly fencing design will be used. The project proponent will require a qualified RPF or biologist to review and approve the design before installation to minimize the risk of wildlife entanglement. The fencing design will meet the following standards: Minimize the chance of wildlife entanglement by avoiding barbed wire, loose or broken wires, or any material that could impale or snag a leaping animal; and, if feasible, keeping electric netting-type fencing electrified at all times or laid down while not in use. Charge temporary electric fencing with intermittent pulse energizers; continuous output fence chargers will not be permitted. Allow wildlife to jump over easily without injury by installing fencing that can flex as animals pass over it and installing the top wire low enough (no more than approximately 40 inches high on flat ground) to allow adult ungulates to jump over it. The determination of appropriate fence height will consider slope, as steep slopes are more difficult for wildlife to pass. Be highly visible to birds and mammals by using high-visibility tape or wire, flagging, or other markers. This SPR applies only to prescribed herbivory and all treatment types, including treatment maintenance. | Initial Treatment: N Treatment Maintenance: Y | During treatment | Treatment contractor, in consultation with a qualified biologist or Registered Professional Forester | American Rivers |
| SPR BIO-12. Protect Common Nesting Birds, Including Raptors. The project proponent will schedule treatment activities to avoid the active nesting season of common native bird species, | Initial Treatment: Y | Surveys for common, native, nesting birds will | American Rivers, in consultation with a qualified | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
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| , | Treatment Maintenance: Y | be conducted prior to treatment activities that occur during the general bird nesting season. If an active nest is identified, appropriate avoidance and minimization strategies will be implemented prior to the start of treatment activities and maintained during treatment until a qualified biologist determines the nest is no longer active, or treatment activities are completed. | biologist or Registered Professional Forester | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|-------------------|--------|------------------------|--------------------------------|
| disturbance of active nests, which may include, but is not limited to, | | | | |
| one or more of the following: | | | | |
| Establish Buffer. The project proponent will establish a | | | | |
| temporary, species-appropriate buffer around the nest sufficient | | | | |
| to reasonably expect that breeding would not be disrupted. | | | | |
| Treatment activities will be implemented outside of the buffer. | | | | |
| The buffer location will be determined by a qualified RPF or | | | | |
| biologist. Factors to be considered for determining buffer | | | | |
| location will include: presence of natural buffers provided by | | | | |
| vegetation or topography, nest height above ground, baseline | | | | |
| levels of noise and human activity, species sensitivity, and | | | | |
| expected treatment activities. Nests of common birds within the | | | | |
| buffer need not be monitored during treatment. However, | | | | |
| buffers will be maintained until young fledge or the nest | | | | |
| becomes inactive, as determined by the qualified RPF, | | | | |
| biologist, or biological technician. | | | | |
| ► Modify Treatment. The project proponent will modify the | | | | |
| treatment in the vicinity of an active nest to avoid disturbance | | | | |
| of active nests (e.g., by implementing manual treatment | | | | |
| methods, rather than mechanical treatment methods). Treatment modifications will be determined by the project proponent in | | | | |
| coordination with the qualified RPF or biologist. | | | | |
| | | | | |
| • Defer Treatment. The project proponent will defer the timing of treatment in the portion(s) of the treatment site that could | | | | |
| disturb the active nest. If this avoidance strategy is | | | | |
| implemented, treatment activity will not commence until young | | | | |
| fledge or the nest becomes inactive, as determined by the | | | | |
| qualified RPF, biologist, or biological technician. | | | | |
| Feasible actions will be taken by the project proponent to avoid loss | | | | |
| of common native bird nests. The feasibility of implementing the | | | | |
| avoidance strategies will be determined by the project proponent | | | | |
| based on whether implementation of this SPR will preclude | | | | |
| completing the treatment project within the reasonable period of | | | | |
| time necessary to meet CalVTP program objectives, including, but | | | | |
| not limited to, protection of vulnerable communities. Considerations | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-------------------|--------|------------------------|--------------------------------|
| may include limitations on the presence of environmental and | | | | |
| atmospheric conditions necessary to execute treatment prescriptions | | | | |
| (e.g., the limited seasonal windows during which prescribed burning | | | | |
| can occur when vegetation moisture, weather, wind, and other | | | | |
| physical conditions are suitable). If it is infeasible to avoid loss of | | | | |
| common bird nests (not including raptor nests), the project | | | | |
| proponent will document the reasons implementation of the avoidance strategies is infeasible in the PSA. After completion of | | | | |
| the PSA and prior to or during treatment implementation, if there is | | | | |
| any change in the feasibility of avoidance strategies from those | | | | |
| explained in the PSA, this will be documented in the post-project | | | | |
| implementation report (referred to by CAL FIRE as a Completion | | | | |
| Report). | | | | |
| The following avoidance strategies may also be considered together | | | | |
| with or in lieu of other actions for implementation by a project | | | | |
| proponent to avoid disturbance to raptor nests: | | | | |
| ► Monitor Active Raptor Nest During Treatment. A qualified | | | | |
| RPF, biologist, or biological technician will monitor an active | | | | |
| raptor nest during treatment activities to identify signs of | | | | |
| agitation, nest defense, or other behaviors that signal | | | | |
| disturbance of the active nest is likely (e.g., standing up from a | | | | |
| brooding position, flying off the nest). If breeding raptors are | | | | |
| showing signs of nest disturbance, one of the other avoidance | | | | |
| strategies (establish buffer, modify treatment or defer | | | | |
| treatment) will be implemented or a pause in the treatment | | | | |
| activity will occur until the disturbance behavior ceases. | | | | |
| ► Retention of Raptor Nest Trees. Trees with visible raptor | | | | |
| nests, whether occupied or not, will be retained. | | | | |
| This SPR applies to all treatment activities and treatment types, | | | | |
| including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|------------------------|--------------------------------|
| Geology, Soils, and Mineral Resource Standard Project Requirements | | | | |
| SPR GEO-1 Suspend Disturbance during Heavy Precipitation: The project proponent will suspend mechanical, prescribed herbivory, and herbicide treatments if the National Weather Service forecast is a "chance" (30 percent or more) of rain within the next 24 hours. Activities that cause mechanical soil disturbance may resume when precipitation stops and soils are no longer saturated (i.e., when soil and/or surface material pore spaces are filled with water to such an extent that runoff is likely to occur). Indicators of saturated soil conditions may include, but are not limited to: (1) areas of ponded water, (2) pumping of fines from the soil or road surfacing, (3) loss of bearing strength resulting in the deflection of soil or road surfaces under a load, such as the creation of wheel ruts, (4) spinning or churning of wheels or tracks that produces a wet slurry, or (5) inadequate traction without blading wet soil or surfacing materials. This SPR applies only to mechanical, prescribed herbivory, and herbicide treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities if the National Weather Service forecast is a "chance" (30 percent or more) of rain within the next 24 hours | Treatment contractor | American Rivers |
| SPR GEO-2 Limit High Ground Pressure Vehicles: The project proponent will limit heavy equipment that could cause soil disturbance or compaction to be driven through treatment areas when soils are wet and saturated to avoid compaction and/or damage to soil structure. Saturated soil means that soil and/or surface material pore spaces are filled with water to such an extent that runoff is likely to occur. If use of heavy equipment is required in saturated areas, other measures such as operating on organic debris, using low ground pressure vehicles, or operating on frozen soils/snow covered soils will be implemented to minimize soil compaction. Existing compacted road surfaces are exempted as they are already compacted from use. This SPR applies only to mechanical treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During mechanical treatment activities where soils are wet and saturated | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|----------------------|----------------------|------------------------|--------------------------------|
| SPR GEO-3 Stabilize Disturbed Soil Areas: The project | Initial Treatment: Y | During mechanical, | Treatment | American Rivers |
| proponent will stabilize soil disturbed during mechanical, prescribed | | prescribed | contractor | |
| herbivory treatments, and prescribed burns that result in exposure of | | herbivory, and | | |
| bare soil over 50 percent or more of the treatment area with mulch | | prescribed burn | | |
| or equivalent immediately after treatment activities, to the | Treatment | treatment activities | | |
| maximum extent practicable, to minimize the potential for | Maintenance: Y | resulting in | | |
| substantial sediment discharge. If mechanical, prescribed herbivory, | | exposure of bare | | |
| or prescribed burn treatment activities could result in substantial | | soil over 50 percent | | |
| sediment discharge from soil disturbed by machinery, animal | | or more of the | | |
| hooves, or being bare, organic material from mastication or mulch | | treatment area | | |
| will be incorporated onto at least 75 percent of the disturbed soil | | | | |
| surface where the soil erosion hazard is moderate or high, and 50 | | | | |
| percent of the disturbed soil surface where soil erosion hazard is low | | | | |
| to help prevent erosion. Where slash mulch is used, it will be | | | | |
| packed into the ground surface with heavy equipment so that it is | | | | |
| sufficiently in contact with the soil surface. This SPR only applies | | | | |
| to mechanical, prescribed herbivory, and prescribed burns that result | | | | |
| in exposure of bare soil over 50 percent of the project area treatment | | | | |
| activities and all treatment types, including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|----------------------|-------------------------|------------------------|--------------------------------|
| SPR GEO-4 Erosion Monitoring: The project proponent will | Initial Treatment: Y | Inspect treatment | American Rivers | American Rivers |
| inspect treatment areas for the proper implementation of erosion | | areas for proper | | |
| control SPRs and mitigations prior to the rainy season. If erosion | | implementation of | | |
| control measures are not properly implemented, they will be | | erosion control | | |
| remediated prior to the first rainfall event per SPR GEO-3 and | Treatment | SPRs and | | |
| GEO-8. Additionally, the project proponent will inspect for | Maintenance: Y | mitigations prior to | | |
| evidence of erosion after the first large storm or rainfall event (i.e., | | the rainy season; | | |
| \geq 1.5 inches in 24 hours) as soon as is feasible after the event. Any | | remediate | | |
| area of erosion that will result in substantial sediment discharge will | | improperly | | |
| be remediated within 48 hours per the methods stated in SPRs GEO- | | implemented | | |
| 3 and GEO-8. This SPR applies only to mechanical, prescribed | | measures prior to | | |
| herbivory, and prescribed burning treatment activities and all | | the first rainfall | | |
| treatment types, including treatment maintenance. | | event. Inspect for | | |
| | | evidence of erosion | | |
| | | as soon as feasible | | |
| | | after the first large | | |
| | | rainfall event (i.e., | | |
| | | \geq 1.5 inches in 24 | | |
| | | hours) and | | |
| | | remediate areas | | |
| | | that will result in | | |
| | | substantial | | |
| | | sediment discharge | | |
| | | within 48 hours. | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
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| SPR GEO-5 Drain Stormwater via Water Breaks: The project proponent will drain compacted and/or bare linear treatment areas capable of generating storm runoff via water breaks using the spacing and erosion control guidelines contained in Sections 914.6, 934.6, and 954.6(c) of the California Forest Practice Rules (February 2019 version). Where waterbreaks cannot effectively disperse surface runoff, including where waterbreaks cause surface run-off to be concentrated on downslopes, other erosion controls will be installed as needed to maintain site productivity by minimizing soil loss. This SPR applies only to mechanical, manual, and prescribed burn treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | , | Treatment contractor | American Rivers |
| SPR GEO-6 Minimize Burn Pile Size: The project proponent will not create burn piles that exceed 20 feet in length, width, or diameter, except when on landings, road surfaces, or on contour to minimize the spatial extent of soil damage. In addition, burn piles will not occupy more than 15 percent of the total treatment area (Busse et al. 2013). The project proponent will not locate burn piles in a Watercourse and Lake Protection Zone as defined in SPR HYD-4. This SPR applies to mechanical, manual, and prescribed burning treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During prescribed burn treatments | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|----------------------|------------------|------------------------|--------------------------------|
| SPR GEO-7 Minimize Erosion: To minimize erosion, the project | Initial Treatment: Y | During treatment | Treatment | American Rivers |
| proponent will: | | activities | contractor | |
| (1) Prohibit use of heavy equipment where any of the following conditions are present: | | | | |
| (i) Slopes steeper than 65 percent. | Treatment | | | |
| (ii) Slopes steeper than 50 percent where the erosion hazard rating is high or extreme. | Maintenance: Y | | | |
| (iii) Slopes steeper than 50 percent that lead without flattening to sufficiently dissipate water flow and trap sediment before it reaches a watercourse or lake. | | | | |
| (2) On slopes between 50 percent and 65 percent where the erosion hazard rating is moderate, and all slope percentages are for average slope steepness based on sample areas that are 20 acres, or less, heavy equipment will be limited to: | | | | |
| (i) Existing tractor roads that do not require reconstruction, or | | | | |
| (ii) New tractor roads flagged by the project proponent prior to the treatment activity. | | | | |
| (3) Prescribed herbivory treatments will not be used in areas with over 50 percent slope. | | | | |
| This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-----------------------------|--|------------------------|--------------------------------|
| SPR GEO-8 Steep Slopes: The project proponent will require a Registered Professional Forester (RPF) or licensed geologist to evaluate treatment areas with slopes greater than 50 percent for unstable areas (areas with potential for landslide) and unstable soils (soil with moderate to high erosion hazard). If unstable areas or soils are identified within the treatment area, are unavoidable, and will be potentially directly or indirectly affected by the treatment, a licensed geologist (P.G. or C.E.G.) will determine the potential for landslide, erosion, of other issue related to unstable soils and identity measures (e.g., those in SPR GEO-7) that will be implemented by the project proponent such that substantial erosion or loss of topsoil would not occur. This SPR applies only to mechanical treatment activities and WUI fuel reduction, non-shaded fuel breaks, and ecological restoration treatment types, including treatment maintenance. | Treatment Maintenance: Y | Prior to and during treatment activities | American Rivers | American Rivers |
| Greenhouse Gas Emissions Standard Project Requirements | | | | |
| SPR GHG-1 Contribute to the AB 1504 Carbon Inventory Process: The project proponent of treatment projects subject to the AB 1504 process will provide all necessary data about the treatment that is needed by the U.S. Forest Service and FRAP to fulfill requirements of the AB 1504 carbon inventory, and to aid in the ongoing research about the long-term net change in carbon sequestration resulting from treatment activity. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | | n/a | n/a | n/a |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
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| Hazardous Material and Public Health and Safety Standard Project Requirements | | | | |
| SPR HAZ-1 Maintain All Equipment: The project proponent will maintain all diesel- and gasoline-powered equipment per manufacturer's specifications, and in compliance with all state and federal emissions requirements. Maintenance records will be available for verification. Prior to the start of treatment activities, the project proponent will inspect all equipment for leaks and inspect everyday thereafter until equipment is removed from the site. Any equipment found leaking will be promptly removed. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Inspect all diesel- and gasoline- powered equipment for leaks prior to the start of and daily during treatment activities. Equipment will be maintained throughout treatment activities and promptly removed if found leaking. | Treatment contractor | American Rivers |
| SPR HAZ-2 Require Spark Arrestors : The project proponent will require mechanized hand tools to have federal- or state-approved spark arrestors. This SPR applies only to manual treatment activities and all treatment types, including treatment maintenance. | | During treatment activities | Treatment contractor | American Rivers |
| SPR HAZ-3 Require Fire Extinguishers: The project proponent will require tree cutting crews to carry one fire extinguisher per chainsaw. Each vehicle would be equipped with one long-handled shovel and one axe or Pulaski consistent with PRC Section 4428. This SPR applies only to manual treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---------------------------------|-----------------------------|------------------------|--------------------------------|
| SPR HAZ-4 Prohibit Smoking in Vegetated Areas: The project proponent will require that smoking is only permitted in designated smoking areas barren or cleared to mineral soil at least 3 feet in | Initial Treatment: Y Treatment | During treatment activities | Treatment contractor | American Rivers |
| diameter (PRC Section 4423.4). This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Maintenance: Y | | | |
| SPR HAZ-5 Spill Prevention and Response Plan: The project proponent or licensed Pest Control Advisor (PCA) will prepare a Spill Prevention and Response Plan (SPRP) prior to beginning any herbicide treatment activities to provide protection to onsite | Initial Treatment: N | n/a | n/a | n/a |
| workers, the public, and the environment from accidental leaks or | Treatment | | | |
| spills of herbicides, adjuvants, or other potential contaminants. The | Maintenance: N | | | |
| SPRP will include (but not be limited to): | | | | |
| a map that delineates staging areas, and storage, loading, and mixing areas for herbicides; | | | | |
| a list of items required in an onsite spill kit that will be maintained throughout the life of the activity; | | | | |
| procedures for the proper storage, use, and disposal of any herbicides, adjuvants, or other chemicals used in vegetation treatment. | | | | |
| This SPR applies only to herbicide treatment activities and all treatment types, including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--------|------------------------|--------------------------------|
| SPR HAZ-6 Comply with Herbicide Application Regulations: The project proponent will coordinate pesticide use with the applicable County Agricultural Commissioner(s), and all required licenses and permits will be obtained prior to herbicide application. The project proponent will prepare all herbicide applications to do the following: Be implemented consistent with recommendations prepared annually by a licensed PCA. Comply with all appropriate laws and regulations pertaining to the use of pesticides and safety standards for employees and the public, as governed by the EPA, DPR, and applicable local jurisdictions. Adhere to label directions for application rates and methods, storage, transportation, mixing, container disposal, and weather limitations to application such as wind speed, humidity, temperature, and precipitation. Be applied by an applicator appropriately licensed by the State. This SPR applies only to herbicide treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: N Treatment Maintenance: N | n/a | n/a | n/a |
| spr HAZ-7 Triple Rinse Herbicide Containers: The project proponent will triple rinse all herbicide and adjuvant containers with clean water at an approved site, and dispose of rinsate by placing it in the batch tank for application per 3 CCR Section 6684. The project proponent will puncture used containers on the top and bottom to render them unusable, unless said containers are part of a manufacturer's container recycling program, in which case the manufacturer's instructions will be followed. Disposal of non-recyclable containers will be at legal dumpsites. Equipment will not be cleaned, and personnel will not be washed in a manner that would allow contaminated water to directly enter any body of water within the treatment area or adjacent watersheds. Disposal of all herbicides will follow label requirements and waste disposal regulations. This SPR applies only to herbicide treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: N Treatment Maintenance: N | n/a | n/a | n/a |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|-----------------------------|--------|------------------------|--------------------------------|
| SPR HAZ-8 Minimize Herbicide Drift to Public Areas: The project proponent will employ the following herbicide application parameters during herbicide application to minimize drift into public areas: | Initial Treatment: N | n/a | n/a | n/a |
| application will cease when weather parameters exceed label specifications or when sustained winds at the site of application exceeds 7 miles per hour (whichever is more conservative); spray nozzles will be configured to produce the largest | Treatment Maintenance: N | | | |
| appropriate droplet size to minimize drift; low nozzle pressures (30–70 pounds per square inch) will be utilized to minimize drift; and spray nozzles will be kept within 24 inches of vegetation during spraying. | | | | |
| This SPR applies only to herbicide treatment activities and all treatment types, including treatment maintenance. | | | | |
| SPR HAZ-9 Notification of Herbicide Use in the Vicinity of Public Areas: For herbicide applications occurring within or adjacent to public recreation areas, residential areas, schools, or any other public areas within 500 feet, the project proponent will post | Initial Treatment: N | n/a | n/a | n/a |
| signs at each end of herbicide treatment areas and any intersecting trails notifying the public of the use of herbicides. The signs will include the signal word (i.e., Danger, Warning or Caution), product name, and manufacturer; active ingredient; EPA registration | Treatment Maintenance: N | | | |
| number; target pest; treatment location; date and time of application; restricted entry interval, if applicable per the label requirements; date which notification sign may be removed; and a contact person with a telephone number. Signs will be posted prior to the start of | | | | |
| treatment and notification will remain in place for at least 72 hours after treatment ceases. This SPR applies only to herbicide treatment activities and all treatment types, including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|---|---|---------------------------------------|--------------------------------|
| provided by the Board of Forestry. The State Water Board will inform Project Proponents of their permit coverage by sending a Notice of Applicability to the primary contact listed in the Project Specific Analysis. | | | | |
| SPR HYD-2 Avoid Construction of New Roads: The project proponent will not construct or reconstruct (i.e., cutting or filling involving less than 50 cubic yards/0.25 linear road miles) any new roads (including temporary roads). This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |
| SPR HYD-3 Water Quality Protections for Prescribed Herbivory: The project proponent will include the following water quality protections for all prescribed herbivory treatments: Environmentally sensitive areas such as waterbodies, wetlands, or riparian areas will be identified in the treatment prescription and excluded from prescribed herbivory project areas using temporary fencing or active herding. A buffer of approximately 50 feet will be maintained between sensitive and actively grazed areas. Water will be provided for grazing animals in the form of an on-site stock pond or a portable water source located outside of environmentally sensitive areas. Treatment prescriptions will be designed to protect soil stability. Grazing animals will be herded out of an area if accelerated soil erosion is observed. This SPR applies to prescribed herbivory treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Prior to and during prescribed herbivory treatments | Treatment contractor, American Rivers | American Rivers |
| SPR HYD-4 Identify and Protect Watercourse and Lake Protection Zones: The project proponent will establish Watercourse and Lake Protection Zones (WLPZs) on either side of watercourses as defined in the table below, which is based on 14 CCR Section 916 .5 of the California Forest Practice Rules (February 2019 version). WLPZ's are classified based on the uses of the stream and the presence of aquatic life. Wider WLPZs are required for steep slopes. ¹ | Initial Treatment: Y Treatment Maintenance: Y | Establish WLPZs prior to treatment activities; implement WLPZ protections during treatment activities. | American Rivers | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|-------------------|--------|------------------------|--------------------------------|
| The following WLPZ protections will be applied for all treatments: | | | | - |
| ► Treatment activities with WLPZs will retain at least 75 percent | | | | |
| surface cover and undisturbed area to act as a filter strip for | | | | |
| raindrop energy dissipation and for wildlife habitat. If this | | | | |
| percentage is reduced a qualified RPF will provide the project | | | | |
| proponent with a site- and/or treatment activity-specific | | | | |
| explanation for the percent surface cover reduction, which will | | | | |
| be included in the PSA. After completion of the PSA and prior | | | | |
| to or during treatment implementation, if there is any deviation | | | | |
| (e.g., further reduction) from the reduced percent as explained | | | | |
| in the PSA, this will be documented in the post-project | | | | |
| implementation report (referred to by CAL FIRE as a | | | | |
| Completion Report). This requirement is based on 14 CCR | | | | |
| Section 916.4 [936.4, 956.4] Subsection (b)(6) (February 2019 | | | | |
| version) and 14 CCR Section 916.5 (February 2019 version). | | | | |
| ► Equipment, including tractors and vehicles, must not be driven | | | | |
| in wet areas or WLPZs, except over existing roads or | | | | |
| watercourse crossings where vehicle tires or tracks remain dry. | | | | |
| ► Equipment used in vegetation removal operations will not be | | | | |
| serviced in WLPZs, within wet meadows or other wet areas, or | | | | |
| in locations that would allow grease, oil, or fuel to pass into | | | | |
| lakes, watercourses, or wet areas. | | | | |
| ► WLPZs will be kept free of slash, debris, and other material | | | | |
| that harm the beneficial uses of water. Accidental deposits will | | | | |
| be removed immediately. | | | | |
| ► Burn piles will be located outside of WLPZs. | | | | |
| ► No fire ignition (nor use of associated accelerants) will occur | | | | |
| within WLPZs however low intensity backing fires may be | | | | |
| allowed to enter or spread into WLPZs. | | | | |
| Within Class I and Class II WLPZs, locations where project | | | | |
| operations expose a continuous area of mineral soil 800 square | | | | |
| feet or larger shall be treated for reduction of soil loss. | | | | |
| Treatment shall occur prior to October 15th and disturbances | | | | |
| that are created after October 15th shall be treated within 10 | | | | |
| days. Stabilization measures shall be selected that will prevent | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--------|------------------------|--------------------------------|
| significant movement of soil into water bodies and may include but are not limited to mulching, rip-rap, grass seeding, or chemical soil stabilizers. • Where mineral soil has been exposed by project operations on approaches to watercourse crossings of Class I, II, or III within a WLPZ, the disturbed area shall be stabilized to the extent necessary to prevent the discharge of soil into watercourses or lakes in amounts that would adversely affect the quality and beneficial uses of the watercourse. • Where necessary to protect beneficial uses of water from project operations, protection measures such as seeding, mulching, or replanting shall be used to retain and improve the natural ability of the ground cover within the WLPZ to filter sediment, minimize soil erosion, and stabilize banks of watercourses and lakes. • Equipment limitation zones (ELZs) will be designated adjacent to Class III and Class IV watercourses with minimum widths of 25 feet where side-slope is less than 30 percent and 50 feet where side-slope is 30 percent or greater. An RPF will describe the limitations of heavy equipment within the ELZ and, where appropriate, will include additional measures to protect the beneficial uses of water. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |
| SPR HYD-5 Protect Non-Target Vegetation and Special-status Species from Herbicides: The project proponent will implement the following measures when applying herbicides: Locate herbicide mixing sites in areas devoid of vegetation and where there is no potential of a spill reaching non-target vegetation or a waterway. Use only herbicides labeled for use in aquatic environments when working in riparian habitats or other areas where there is a possibility the herbicide could come into direct contact with water. Only hand application of herbicides will be allowed in | Initial Treatment: N Treatment Maintenance: N | n/a | n/a | n/a |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|-------------------|--------|------------------------|--------------------------------|
| riparian habitats and only during low-flow periods or when | | | | • |
| seasonal streams are dry. | | | | |
| No terrestrial or aquatic herbicides will be applied within | | | | |
| WLPZs of Class I and II watercourses, if feasible. If this is not | | | | |
| feasible, hand application of herbicides labeled for use in | | | | |
| aquatic environments may be used within the WLPZ provided | | | | |
| that the project proponent notifies the applicable regional water | | | | |
| quality control board no fewer than 15 days prior to herbicide | | | | |
| application. The feasibility of avoiding herbicide application | | | | |
| within WLPZ of Class I and II watercourses will be determined | | | | |
| by the project proponent and may be based on whether doing so | | | | |
| will preclude achieving CalVTP program objectives, including, | | | | |
| but not limited to, protection of vulnerable communities. The | | | | |
| reasons for infeasibility will be documented in the PSA. | | | | |
| ▶ No herbicides will be applied within a 50-foot buffer of ESA or | | | | |
| CESA listed plant species or within 50 feet of dry vernal pools. | | | | |
| ► For spray applications in and adjacent to habitats suitable for | | | | |
| special-status species, use herbicides containing dye (registered | | | | |
| for aquatic use by DPR, if warranted) to prevent overspray. | | | | |
| Application will cease when weather parameters exceed label | | | | |
| specifications or when sustained winds at the site of application | | | | |
| exceeds 7 miles per hour (whichever is more conservative); | | | | |
| ▶ No herbicide will be applied during precipitation events or if | | | | |
| precipitation is forecast 24 hours before or after project | | | | |
| activities. | | | | |
| This SPR applies to herbicide treatment activities and all treatment | | | | |
| types, including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|---|---|--------------------------------|
| SPR HYD-6 Protect Existing Drainage Systems: If a treatment activity is adjacent to a roadway with stormwater drainage infrastructure, the existing stormwater drainage infrastructure will be marked prior to ground disturbing activities. If a drainage structure or infiltration system is inadvertently disturbed or modified during project activities, the project proponent will coordinate with owner of the system or feature to repair any damage and restore pre-project drainage conditions. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | Stormwater drainage infrastructure will be marked prior to ground-disturbing activities. If inadvertent damage to a drainage or infiltration system occurs, it will be repaired and restored to preproject drainage conditions. | Treatment contractor, American Rivers | American Rivers |
| Noise Standard Project Requirements | | | | |
| SPR NOI-1 Limit Heavy Equipment Use to Daytime Hours: The project proponent will require that operation of heavy equipment associated with treatment activities (heavy off-road equipment, tools, and delivery of equipment and materials) will occur during daytime hours if such noise would be audible to receptors (e.g., residential land uses, schools, hospitals, places of worship). Cities and counties in the treatable landscape typically restrict construction-noise (which would apply to vegetation treatment noise) to particular daytime hours. If the project proponent is subject to local noise ordinance, it will adhere to those to the extent the project is subject to them. If the applicable jurisdiction does not have a noise ordinance or policy restricting the time-of-day when noise-generating activity can occur noise-generating vegetation treatment activity will be limited to the hours of 7:00 a.m. to 6:00 p.m., Monday through Saturday, and between 9:00 a.m. and 6:00 p.m. on Sunday and federal holidays. If the project proponent is not subject to local ordinances (e.g., CAL FIRE), it will adhere to the restrictions stated above or may elect to adhere to the restrictions identified by the local ordinance encompassing the treatment area. | Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--|---|--------------------------------|
| This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |
| SPR NOI-2 Equipment Maintenance: The project proponent will require that all powered treatment equipment and power tools will be used and maintained according to manufacturer specifications. All diesel- and gasoline-powered treatment equipment will be properly maintained and equipped with noise-reduction intake and exhaust mufflers and engine shrouds, in accordance with manufacturers' recommendations. This SPR applies to all activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |
| SPR NOI-3 Engine Shroud Closure: The project proponent will require that engine shrouds be closed during equipment operation. This SPR applies only to mechanical treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During operation of mechanical equipment | Treatment contractor | American Rivers |
| SPR NOI-4 Locate Staging Areas Away from Noise-Sensitive Land Uses: The project proponent will locate treatment activities, equipment, and equipment staging areas away from nearby noise-sensitive land uses (e.g., residential land uses, schools, hospitals, places of worship), to the extent feasible, to minimize noise exposure. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor, American Rivers | American Rivers |
| SPR NOI-5 Restrict Equipment Idle Time: The project proponent will require that all motorized equipment be shut down when not in use. Idling of equipment and haul trucks will be limited to 5 minutes. This SPR applies to all treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|---|------------------------|--------------------------------|
| SPR NOI-6 Notify Nearby Off-Site Noise-Sensitive Receptors: For treatment activities utilizing heavy equipment, the project proponent will notify noise-sensitive receptors (e.g., residential land uses, schools, hospitals, places of worship) located within 1,500 feet of the treatment activity. Notification will include anticipated dates and hours during which treatment activities are anticipated to occur and contact information, including a daytime telephone number, of the project representative. Recommendations to assist noise-sensitive land uses in reducing interior noise levels (e.g., closing windows and doors) will also be included in the notification. This SPR applies only to mechanical treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: Y Treatment Maintenance: Y | During mechanical treatment activities | American Rivers | American Rivers |
| Recreation Standard Project Requirements | | | | |
| SPR REC-1 Notify Recreational Users of Temporary Closures: If a treatment activity would require temporary closure of a public recreation area or facility, the project proponent will coordinate with the owner/manager of that recreation area or facility. If temporary closure of a recreation area or facility is required, the project proponent will work with the owner/manager to post notifications of the closure at least 2 weeks prior to the commencement of the treatment activities. Additionally, notification of the treatment activity will be provided to the Administrative Officer (or equivalent official responsible for distribution of public information) of the county(ies) in which the affected recreation area or facility is located. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | Treatment | At least 2 weeks prior to the commencement of treatment activities | American Rivers | American Rivers |
| Transportation Standard Project Requirements | | | | |
| SPR TRAN-1 Implement Traffic Control during Treatments: Prior to initiating vegetation treatment activities the project proponent will work with the agency(ies) with jurisdiction over affected roadways to determine if a Traffic Management Plan (TMP) is needed. A TMP will be needed if traffic generated by the project would result in obstructions, hazards, or delays exceeding applicable jurisdictional standards along access routes for individual | Initial Treatment: Y Treatment Maintenance: Y | During treatment activities | Treatment contractor | American Rivers |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|---|-------------------|--------|------------------------|--------------------------------|
| vegetation treatments. If needed, a TMP will be prepared to provide measures to reduce potential traffic obstructions, hazards, and service level degradation along affected roadway facilities. The scope of the TMP will depend on the type, intensity, and duration of the specific treatment activities under the CalVTP. Measures included in the TMP could include (but are not be limited to) construction signage to provide motorists with notification and information when approaching or traveling along the affected roadway facilities, flaggers for lane closures to provide temporary traffic control along affected roadway facilities, treatment schedule restrictions to avoid seasons or time periods of peak vehicle traffic, haul-trip, delivery, and/or commute time restrictions that would be implemented to avoid peak traffic days and times along affected roadway facilities. If the TMP identifies impacts on transportation facilities outside of the jurisdiction of the project proponent, the TMP will be submitted to the agency with jurisdiction over the affected roadways prior to commencement of vegetation treatment projects. This SPR applies to all treatment activities and treatment types, including treatment maintenance. | | | | |
| Smoke generated during prescribed burn operations could potentially affect driver visibility and traffic operations along nearby roadways. Direct smoke impacts to roadway visibility and indirect impacts related to driver distraction will be considered during the planning phase of burning operations. Smoke impacts and smoke management practices specific to traffic operations during prescribed fire operations will be identified and addressed within the TMP. The TMP will include measures to monitor smoke dispersion onto public roadways, and traffic control operations will be initiated in the event burning operations could affect traffic safety along any roadways. This SPR applies only to prescribed burn treatment activities and all treatment types, including treatment maintenance. | | | | |

| Standard Project Requirements | Applicable? (Y/N) | Timing | Implementing Entity | Verifying/Monitoring Entity |
|--|---|--------|------------------------|--------------------------------|
| Public Services and Utilities Standard Project Requirements | | | | |
| SPR UTIL-1: Solid Organic Waste Disposition Plan. For projects requiring the disposal of material outside of the treatment area, the project proponent will prepare an Organic Waste Disposition Plan prior to initiating treatment activities. The Solid Organic Waste Disposition Plan will include the amount (e.g., tons) of solid organic waste to be managed onsite (i.e., scattering of wood materials, generating unburned piles, and pile burning) and transported offsite for processing (i.e., biomass power plant, wood product processing facility, composting). If the project proponent intends to transport solid organic waste offsite, the Solid Organic Waste Disposition Plan will clearly identify the location and capacity of the intended processing facility, consistent with local and state regulations to demonstrate that adequate capacity exists to accept the treated materials. This SPR applies only to mechanical and manual treatment activities and all treatment types, including treatment maintenance. | Initial Treatment: N Treatment Maintenance: N | n/a | n/a | n/a |

Procedures for Determining Watercourse and Lake Protection Zone (WLPZ) widths (Source: 14 CCR Section 916.5 [936.5, 956.5] [February 2019 version])

| Water Class | Class I | Class II | Class III | Class IV |
|---|---|---|--|--|
| Water Class Characteristics or Key Indicator Beneficial Use | 1) Domestic supplies, including springs, on site and/or within 100 feet downstream of the operations area and/or 2) Fish always or seasonally present onsite, includes habitat to sustain fish migration and spawning. | Fish always or seasonally present offsite within 1000 feet downstream and/or Aquatic habitat for nonfish aquatic species. Excludes Class III waters that are tributary to Class I waters. | No aquatic life present, watercourse showing evidence of being capable of sediment transport to Class I and II waters under normal high-water flow conditions after completion of timber operations. | Man-made watercourses, usually downstream, established domestic, agricultural, hydroelectric supply or other beneficial use. |
| | Class I WLPZ Width (ft) – Distance from top of bank to the edge of WLPZ | Class II WLPZ Width (ft) – Distance from top of bank to the edge of WLPZ | Class III WLPZ Width (ft) – Distance from top of bank to the edge of WLPZ | N/A |
| < 30 % Slope | 75 | 50 | Sufficient to prevent the degradation of downstream beneficial uses of water. Determined on a site-specific basis. | N/A |
| 30-50 % Slope | 100 | 75 | Same as above | N/A |
| >50 % Slope | 150 | 100 | Same as above | N/A |

REFERENCES

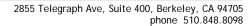
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May 2023 Stillwater Sciences





TECHNICAL MEMORANDUM

DATE: 2 December 2021

TO: Julie Fair, American Rivers

FROM: AJ Keith, Rob Thoms, and Avi Kertesz

SUBJECT: Final Biological Resources Evaluation for the Hoyt-Purdon Fuel Reduction and

Prescribed Fire Project

American Rivers is working with private landowners to complete the Hoyt-Purdon Fuel Reduction and Prescribed Fire Project (Project) to reduce fuel loading and fire risk on approximately 569 acres of privately owned land in the South Yuba River watershed. The Project will require compliance with the California Environmental Quality Act (CEQA) to analyze environmental impacts. CEQA compliance documentation will occur in a subsequent phase of the Project. Stillwater Sciences (Stillwater) prepared this Biological Resources Evaluation to characterize biological resources in the Project Area and assess the Project's potential for adverse effects on sensitive biological resources. The Stillwater team is also assisting American Rivers with a CEQA compliance strategy and technical input for a vegetation management plan and prescribed burn plan.

The CEQA documentation for the Project may proceed under the California Vegetation Treatment Program's (CalVTP's) Program Environmental Impact Report (PEIR, Ascent Environmental 2019), in which case the Project will need to comply with the PEIR's Standard Project Requirements (SPRs) to avoid or minimize adverse effects on biological resources to the maximum extent practicable and mitigate any significant impacts that would result from Project implementation. As detailed herein, several supplemental measures may need to be developed as part of the CEQA documentation (in addition to the CalVTP's SPRs) to avoid or minimize adverse effects to certain biological resources that could be affected by the Project.

1 PROJECT DESCRIPTION

The Project will complete significant fuels reduction and reintroduce prescribed burning on private land within the South Yuba River Canyon and adjacent to the existing Deer Creek Fuel Break and South Yuba River State Park. The Project will extend an existing fuel break to provide protection to nearby communities from fires originating in the South Yuba Canyon, which receives over a half million visitors each year, and will safeguard the watershed from catastrophic wildfire impacts, which would impact aquatic habitat and downstream beneficiaries.

1.1 Project Location

The 569.5-acre Project Area extends approximately two miles between Hoyt's and Purdon Crossings along the South Yuba River (above ordinary high water) in Nevada County, California

(Figure 1). It includes parcels owned by three private landowners but is considered one Project site for cross-boundary treatments. The Project is adjacent to the South Yuba River State Park on both the upstream and downstream ends and Bureau of Land Management (BLM) land to the north. It is located approximately two miles northwest of Nevada City and four miles north of Grass Valley. The site is accessible via New Rome Road.

1.2 Project Goals

The purpose of the Project is to reduce fuel loading and reintroduce fire in Wildland Urban Interface (WUI) lands within six miles of six high fire-risk communities and adjacent to the South Yuba River. The overall goal is to implement a fuel treatment project that will result in multiple watershed, ecological, community, and capacity benefits and will increase the pace of ecologically sound forest management in the long term. Specific Project goals include:

- Reduce the threat of high-severity wildfire directly adjacent to the South Yuba River to
 protect the watershed and nearby communities from wildfire's detrimental effects,
 including impairment of water quality and aquatic habitat, threats to water supply, and loss
 of life and property.
- Restore a healthier and more natural forest structure and reinstate the natural fire regime to provide the ecological benefits of fire and facilitate long-term maintenance.
- Bolster local experience, capacity, and coordination to plan and implement fuel treatments including prescribed fire to increase the pace and scale of wildfire risk reduction.
- Increase private landowner and CAL FIRE engagement and comfort with prescribed fire on private land.

1.3 Project Approach

The proposed approach for the Project is to use a combination of hand cutting, hand pile/burn, machine pile/burn, mastication, and prescribed fire to reduce fuels within the Project Area. The Project team chose this approach based on the conditions of the Project Area, which include steep slopes and rough terrain, and the desire to reintroduce fire to the landscape, an important component of the Project for partners and landowners. In addition, incorporating analysis for prescribed fire in the Project Area will make it easier to use prescribed fire to maintain the Project in the longer term. The Project will use machines in tandem with hand methods to expedite site preparation and fuel reduction.

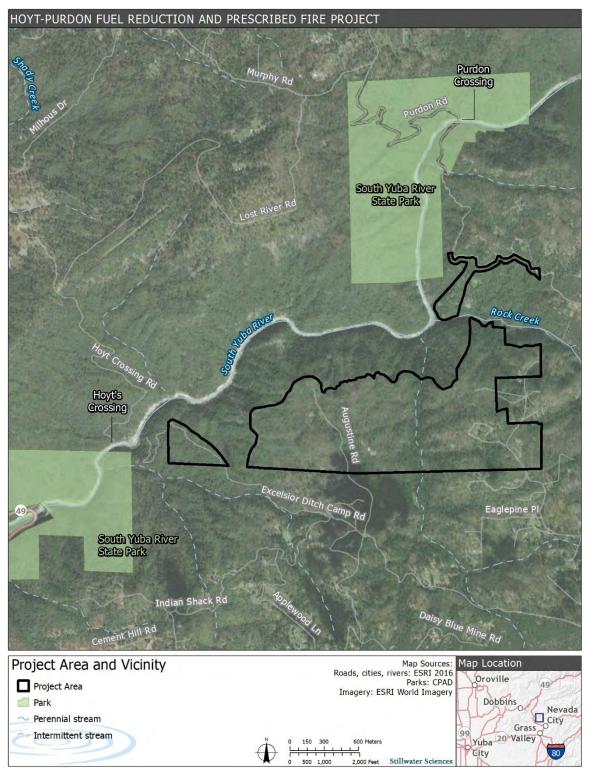


Figure 1. Project Area and vicinity, Nevada County, California.

2 METHODS

2.1 Definitions

For the purposes of this report, special-status species were defined as those that are:

- listed, proposed, or under review as endangered or threatened under the federal Endangered Species Act or the California Endangered Species Act;
- designated by California Department of Fish and Wildlife (CDFW) as a Species of Special Concern;
- designated by CDFW as Fully Protected under the California Fish and Game Code (Sections 3511, 4700, 5050, and 5515);
- protected under the federal Bald and Golden Eagle Protection Act;
- designated as rare under the California Native Plant Protection Act; and/or
- included on CDFW's most recent *Special Vascular Plants, Bryophytes, and Lichens List* (CDFW 2021a) with a California Rare Plant Rank (CRPR) of 1, 2, 3, or 4.

Sensitive natural communities were defined as those natural community types with a state ranking of S1 (critically imperiled), S2 (imperiled), or S3 (vulnerable) as listed in the most recent *California Sensitive Natural Communities List* (CDFW 2020).

2.2 Database Queries

Lists of special-status plant, fish, and wildlife species, designated critical habitat for federally listed species, and sensitive natural communities previously documented in the region of the Project Area were developed through a query of the following resources:

- CDFW's California Natural Diversity Database (CNDDB) (CDFW 2021b),
- U.S. Fish and Wildlife Service's (USFWS) Information for Planning and Conservation (IPaC) portal (USFWS 2021a),
- National Oceanic and Atmospheric Administration (NOAA) Fisheries, West Coast Region, online Protected Resources Application (NOAA Fisheries 2021), and
- CNPS's online Inventory of Rare and Endangered Vascular Plants of California (CNPS 2021a).

The CNDDB and CNPS database queries were based on a search of the U.S. Geological Survey 7.5-minute quadrangle in which the Project Area is located (Nevada City) and the surrounding eight quadrangles (Camptonville, Pike, North Bloomfield, Chicago Park, Grass Valley, Rough and Ready, French Corral, and Challenge), collectively referred to as the Project Region. The USFWS IPaC query was based on the spatial extent of the Project Area and vicinity.

2.3 Field Assessment and Existing Information Review

On 11 May 2021, Stillwater botanist R. Thoms and wildlife biologist A. Kertesz conducted a field habitat assessment of the Project Area. Habitats were qualitatively evaluated for potential to support special-status species—including plants, fish, and wildlife—based on habitat types, habitat elements, and visual observation of species present. General habitats and other notable features in the assessment area were photographed.

The following resources were also reviewed to gain further information regarding species' potential to occur in the Project Area:

- Google Earth aerial imagery (Google Earth 2021);
- soils data (USDA NRCS 2021); and
- wetlands and riparian data (USFWS 2021b).

2.4 Analysis

2.4.1 Vegetation and habitats

To develop a preliminary vegetation map, California Wildlife Habitat Relationship (CWHR) vegetation types mapped by U.S. Department of Agriculture, Forest Service CalVeg (USDA Forest Service 2021) were reviewed in a geographic information system (GIS) and clipped to the Project Area. CalVeg polygon boundaries were then revised and re-digitized based upon signatures observed in 2016 aerial imagery (ESRI 2021). The CWHR classifications were converted to *Manual of California Vegetation* (CNPS 2021b) alliances to identify sensitive natural communities classified within each CWHR type (and Regional Dominance Type, in the case of the Mixed Chaparral habitat type).

2.4.2 Special-status plants

Habitat requirements for the special-status plant species identified from the database queries (Appendix A) were reviewed and compared with the conditions observed in the Project Area during the May 2021 field habitat assessment to determine whether each species has the potential to occur in the Project Area. If a species' required habitat was lacking from the Project Area or if the Project Area was outside the species' known distribution or elevation range, the species was considered not likely to occur.

The timing of life history stages for each the special-status plant species with the potential to occur in the Project Area was reviewed to determine the recommended survey periods that would coincide with the phenological stage (e.g., flowering or fruiting) during which the special-status species will be most identifiable in the field.

2.4.3 Fish and wildlife

Habitat requirements for the special-status wildlife and fish species identified from the database queries (Appendix B) were reviewed and compared to habitat conditions in the Project Area observed during the May field habitat assessment to determine the potential for each species to occur in the Project Area. The evaluation for species to occur and be affected by the Project was also based on the list of resources in Section 2.3, research-grade documented occurrences in citizen science sources including iNaturalist (2021) and eBird (2021), and species-specific literature on species descriptions and life history. This analysis resulted in the following categories of the likelihood for a special-status species to occur in or near the Project Area:

- None (no potential to occur): the Project Area is outside of the species' known distribution or elevation range and/or the species' required habitat is lacking from the Project Area.
- Low (not expected to occur): the species' known distribution or elevation range overlaps with the Project Area and the species' required habitat is of very low quality or quantity in the Project Area; suitable key habitat or habitat elements may be present but may be of poor quality or isolated from the nearest extant occurrences.

- Moderate (may possibly occur): the species' known distribution or elevation range overlaps with the Project Area and the species' required habitat occurs in the Project Area.
- High (present): the species has been documented in the Project Area and/or its required habitat occurs in the Project Area and is of high quality.

3 RESULTS

3.1 Vegetation and Habitats

The 569.5-acre Project Area is dominated primarily by native woody vegetation (Table 1, Figures 2a–2c); representative photographs of the dominant vegetation types are provided in Figures 3 and 4. Several areas provide different habitats but were too small (<0.1 acre) to include in vegetation mapping. No sensitive natural communities were previously documented in the Project Region in CNDDB (CDFW 2021b). Elevations in the Project Area range from approximately 1,605–2,770 feet above sea level (Google Earth 2021). Project Area conditions observed during the May 2021 field assessment included:

- hilltops, canyons, and mid-slopes ranging from nearly flat to steep (approximately 70% slopes);
- one perennial creek, a tributary to the South Yuba River (hereafter "Meyers Ravine Creek") (Figure 4 c-f);
- one intermittent creek and two ephemeral drainages, all draining to the South Yuba River;
- unimproved and improved (e.g., gravel or asphalt) roads that include exposed bank cuts and occasional openings in the canopy; and
- several residential buildings and infrastructure with minimal ornamental vegetation.

Table 1. California Wildlife Habitat Relationship (CWHR) types in the Project Area (acres).

| CWHR Type | Acres | Percent of Project Area |
|--------------------------|-------|-------------------------|
| Douglas Fir | 61.3 | 10.8% |
| Mixed Chaparral | 27.9 | 4.9% |
| Montane Hardwood | 324.7 | 57.0% |
| Montane Hardwood-Conifer | 47.5 | 8.3% |
| Ponderosa Pine | 108.2 | 19.0 |
| Total | 569.5 | 100.0% |

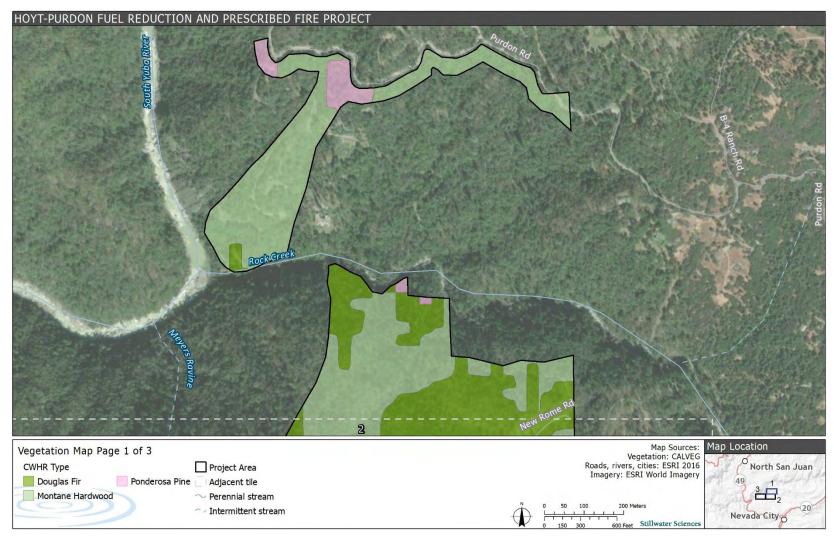


Figure 2a. Habitat types in the Project Area.

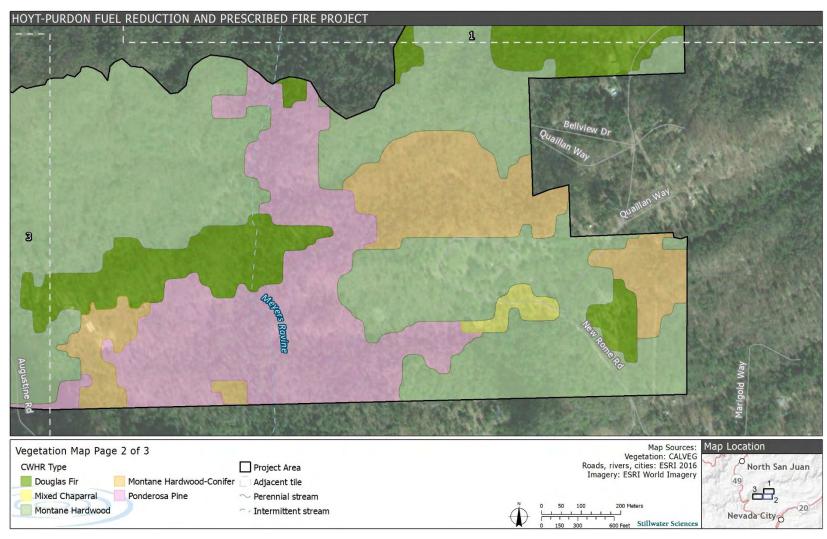


Figure 2b. Habitat types in the Project Area.

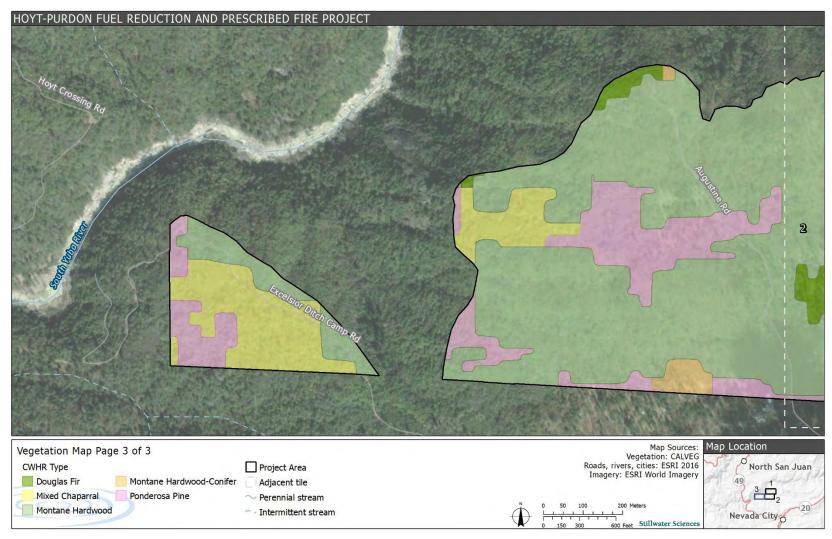


Figure 2c. Habitat types in the Project Area.

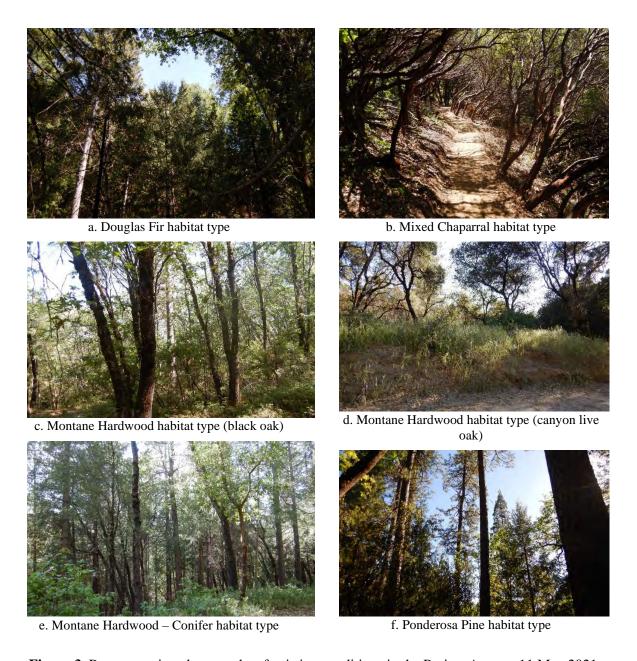


Figure 3. Representative photographs of existing conditions in the Project Area on 11 May 2021.

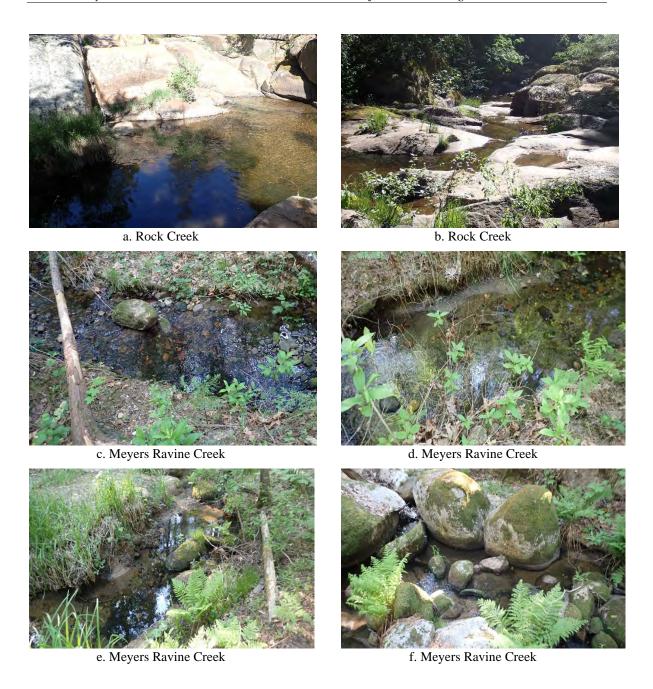


Figure 4. Representative photographs of aquatic habitat in Rock Creek and Meyers Ravine Creek. Rock Creek is outside but adjacent to the Project Area.

3.1.1 Douglas Fir

In the Project Area, the Douglas Fir habitat type was co-dominated by the native tree species Douglas-fir (*Pseudotsuga menziesii*) and ponderosa pine (*Pinus ponderosa*), generally with moderate to dense canopy cover in the tree layer. Other native tree species characteristically present included black oak (*Quercus kelloggii*), madrone (*Arbutus menziesii*), incense cedar (*Calocedrus decurrens*), and occasionally big-leaf maple (*Acer macrophyllum*). Cover in the shrub layer was generally sparse to moderate and of low-stature native shrubs including western poison oak (*Toxicodendron diversilobum*) and honeysuckle (*Lonicera* spp.). Cover in the

herbaceous layer ranged from sparse to low. One sensitive natural community within the Douglas Fir habitat type has the potential to occur in the Project Area: bigleaf maple forest and woodland (*Acer macrophyllum*; S3). Although Douglas-fir and incense cedar were both observed during the field habitat assessment and often in tandem, the sensitive natural community Douglas-fir – incense cedar forest and woodland alliance (*Pseudotsuga menziesii - Calocedrus decurrens*; S3) is described as being specific to the North Coast and Klamath ranges (CNPS 2021b) and is not considered further.

A total of 61.3 acres of the Douglas Fir habitat type (10.8% of the Project Area) was documented in the Project Area (Table 1, Figures 2a–2c).

3.1.2 Mixed Chaparral

In the Project Area, the Mixed Chaparral habitat type was dominated by the native shrub whiteleaf manzanita (*Arctostaphylos viscida*) with toyon (*Heteromeles arbutifolia*) frequently present. Cover in the tree canopy, when present, was sparse (<10 percent) and generally included black oak and canyon live oak (*Quercus chrysolepis*). Cover in the shrub layer was very dense to complete, while cover in the herbaceous layer was sparse to nonexistent. Mixed Chaparral within the Project Area was classified as Lower Montane Mixed Chaparral according to regional dominance types (CNPS 2021b). No sensitive natural communities within the Lower Montane Mixed Chaparral regional dominance type have the potential to occur in the Project Area.

A total of 27.9 acres of the Mixed Chaparral habitat type (4.9% of the Project Area) was documented in the Project Area (Table 1, Figures 2b–2c).

3.1.3 Montane Hardwood

In the Project Area, the Montane Hardwood habitat type was dominated by black oak and canyon live oak, with other native tree species characteristically present including interior live oak (*Quercus wislizeni*) and madrone, and generally formed a dense tree canopy. Cover in the shrub canopy was moderate and of low stature, including western poison oak and mountain misery (*Chamaebatia foliosa*). Where the tree canopy was moderate, the shrub layer was occasionally denser and of higher-stature species including whiteleaf manzanita and toyon. The herbaceous layer was sparse to non-existent. No sensitive natural communities within the Montane Hardwood habitat type have the potential to occur in the Project Area.

A total of 324.7 acres of the Montane Hardwood habitat type (57.0% of the Project Area) was documented in the Project Area (Table 1, Figures 2a–2c).

3.1.4 Montane Hardwood-Conifer

In the Project Area, the Montane Hardwood- Conifer habitat type was dominated by several native hardwood tree species (e.g., black oak, canyon live oak, and madrone) and native coniferous tree species (e.g., ponderosa pine, Douglas-fir, and incense cedar), generally forming a dense tree canopy. Cover in the shrub canopy was moderate but of low stature, frequently including western poison oak, mountain misery, and deerbrush (*Ceanothus integerrimus*). The herbaceous layer supported only trace cover. One sensitive natural community within the Montane Hardwood-Conifer habitat type has the potential to occur in the Project Area: bigleaf maple forest and woodland (S3).

A total of 47.5 acres of the Montane Hardwood-Conifer habitat type (8.3% of the Project Area) was documented in the Project Area (Table 1, Figures 2b–2c).

3.1.5 Ponderosa Pine

In the Project Area, the Ponderosa Pine habitat type was dominated by the native tree ponderosa pine in a mosaic of other native hardwood and coniferous trees including black oak, canyon live oak, Douglas-fir, incense cedar, and madrone. In general, cover in the tree canopy was moderate to dense, while cover in the shrub canopy was sparse and of low stature, frequently including western poison oak and mountain misery. The herbaceous layer supported only trace cover. There are no sensitive natural communities within the Ponderosa Pine habitat type, therefore no sensitive natural communities have the potential to occur in the Ponderosa Pine habitat within the Project Area.

A total of 108.2 acres of the Ponderosa Pine habitat type (19.0% of the Project Area) was documented in the Project Area (Table 1, Figures 2a–2c).

3.2 Special-status Plants

Of the 35 special-status plant species previously documented in the Project Region (Appendix A), nine were determined to have no potential to occur in the Project Area due to lack of suitable habitat (e.g., no serpentine soil); the remaining twenty-six special-status plant species have the potential to occur in the Project Area (Table 2). Two species have been previously documented either adjacent to or in the Project Area: Butte County fritillary (*Fritillaria eastwoodiae*) and Cantelow's lewisia (*Lewisia cantelovii*).

None of these species were observed during the field habitat assessment; however, protocol-level surveys were not conducted during the habitat assessment. A list of plant species incidentally observed during the field habitat assessment is provided in Appendix C.

Table 2. Special-status plants with the potential to occur in the Project Area.

| | <u> </u> | <u></u> |
|--------------------------------------|---------------------------|---|
| Scientific name | Common name | Lifeform |
| Vascular plant species | | |
| Allium sanbornii var. sanbornii | Sanborn's onion | perennial bulbiferous herb |
| Arctostaphylos mewukka subsp. truei | True's manzanita | perennial evergreen shrub |
| Brodiaea sierrae | Sierra foothills brodiaea | perennial bulbiferous herb |
| Carex cyrtostachya | Sierra arching sedge | perennial herb |
| Clarkia biloba subsp. brandegeeae | Brandegee's clarkia | annual herb |
| Clarkia mosquinii | Mosquin's clarkia | annual herb |
| Clarkia virgata | Sierra clarkia | annual herb |
| Cypripedium californicum | California lady's-slipper | perennial rhizomatous herb |
| Cypripedium fasciculatum | clustered lady's-slipper | perennial rhizomatous herb |
| Darlingtonia californica | California pitcherplant | perennial rhizomatous herb (carnivorous) |
| Erigeron petrophilus var. sierrensis | northern Sierra daisy | perennial rhizomatous herb |
| Eriogonum umbellatum var. ahartii | Ahart's buckwheat | perennial herb |

| Scientific name | Common name | Lifeform |
|--|-----------------------------|----------------------------|
| Vascular plant species | | |
| Fritillaria eastwoodiae | Butte County fritillary | perennial bulbiferous herb |
| Juncus digitatus | finger rush | annual herb |
| Lathyrus sulphureus var. argillaceus | dubious pea | perennial herb |
| Lewisia cantelovii | Cantelow's lewisia | perennial herb |
| Lilium humboldtii subsp. humboldtii | Humboldt lily | perennial bulbiferous herb |
| Lupinus dalesiae | Quincy lupine | perennial herb |
| Plagiobothrys glyptocarpus var. modestus | Cedar Crest popcornflower | annual herb |
| Poa sierrae | Sierra blue grass | perennial rhizomatous herb |
| Rhynchospora capitellata | brownish beaked-rush | perennial herb |
| Sidalcea gigantea | giant checkerbloom | perennial rhizomatous herb |
| Streptanthus longisiliquus | long-fruit jewelflower | perennial herb |
| Streptanthus tortuosus subsp. truei | True's mountain jewelflower | perennial herb |
| Non-vascular species | | |
| Lycopodiella inundata | inundated bog club-moss | perennial rhizomatous herb |
| Mielichhoferia elongata | elongate copper moss | moss |

3.3 Fish and Wildlife

Sixteen special-status fish and wildlife (invertebrate, amphibian, reptile, bird, and mammal) species were identified from the database queries as having been previously documented in the Project Region (Appendix B). Special-status fish species were determined to have no potential to occur in the Project Area due to the lack of suitable habitat and the inability of anadromous salmonids to access the South Yuba River upstream of Englebright Dam. Two non-fish species were eliminated from further consideration because no suitable habitat is present in the Project Area and/or the Project Area is outside of the current known range for the species, and six species were considered to have low potential to occur and are not discussed further in the main body of this document (Appendix B).

Four special-status wildlife species have moderate or high potential to occur within or near the Project Area:

- western pond turtle (Actinemys marmorata)
- foothill yellow-legged frog (*Rana boylii*)
- northern goshawk (Accipiter gentilis)
- Townsend's big-eared bat (Corynorhinus townsendii)

None of these species were observed during the habitat assessment; however, targeted surveys for these species were not conducted during the habitat assessment. These species are discussed below, along with a description of each species' status, habitat requirements, and potential to occur within or near the Project Area.

3.3.1 Western pond turtle

Western pond turtle, a California Species of Special Concern, is the only native freshwater turtle in California. The species' current range is limited to parts of Washington, Oregon, California, and northern Baja California (Buskirk 2002). Western pond turtles inhabit fresh or brackish water characterized by areas of deep water, low flow velocities, warm water and/or ample basking sites, and underwater cover elements such as large wood and aquatic vegetation (Jennings and Hayes 1994). Although aquatic, western pond turtles spend time on land basking, overwintering, and nesting (Holland 1994). Most females nest within 50 meters of water; however, some females nest upwards of 400 meters away from water (Lovich and Meyer 2002). Along major rivers, western pond turtles are often concentrated in side-channel and backwater areas and may move to off-channel habitats, such as oxbows, during periods of high flows (Holland 1994). The nesting season is from late April through mid-July at low elevation, and June through August at higher elevations (Scott et al. 2008). Although adults are habitat generalists, hatchlings and juveniles require specialized habitat for survival through their first few years. Hatchlings spend much of their time feeding in shallow, warm water with ample hiding cover in the form of dense submerged or short emergent vegetation (Jennings and Hayes 1994).

There are no CNDDB occurrence records for western pond turtle in the Project Area, but the species has been observed in the Project Region, including on the South Yuba River near the confluence with the Yuba River, approximately 7 miles west of the Project Area (CDFW 2021b). Meyers Ravine Creek does not contain water of sufficient depth to constitute suitable aquatic habitat. Likewise, it lacks adequate basking sites due to the high, closed canopy which permanently shades the forest floor. Nearby Rock Creek, which is directly adjacent to the Project Area, contains suitable aquatic habitat including pools with slow moving water, submerged structure, emergent vegetation, and ample sunlit, exposed bedrock. Portions of the Project Area adjacent to Rock Creek may contain upland habitat suitable for overwintering and/or nesting. Turtles may also migrate overland through the Project Area to standing water (e.g., man-made ponds) on private properties adjacent to the Project Area.

3.3.2 Foothill yellow-legged frog

Foothill yellow-legged frog is a California Species of Special Concern, historically found in the Sierra Nevada foothills up to elevations of approximately 6,000 feet and in the Coast Range from the Oregon border south to the San Gabriel River in Southern California (Stebbins 2003). Currently, populations are thought to have disappeared from the southern Sierra Nevada foothills, in areas south of the Transverse ranges, and along the coast south of Monterey County (Jennings and Hayes 1994). Foothill yellow-legged frogs are typically found in perennial streams or rivers, and intermittent creeks with pools. The species often breeds in low-gradient sections near junctions with tributary streams, due to the proximity of adult overwintering habitat in tributaries and to the presence of boulders and cobbles in these locations. Egg deposition usually occurs in cobble bars or under large boulders in areas of low-velocity flow. Tadpoles show affinity to the oviposition site, remaining in edgewater habitat with substrate interstices, vegetation, and/or detritus for cover. Adults prefer areas with exposed basking sites and cool, shady areas adjacent to the water's edge. Foothill yellow-legged frog egg-laying (oviposition) typically begins during spring when flows diminish, and average daily water temperatures reach approximately 53–55 °F (12–13 °C) (Kupferberg 1996).

There are no CNDDB occurrence records for foothill yellow-legged frog in the Project Area, but the species has been regularly documented in the Project Region along the South Yuba River, including at Purdon and Hoyt's Crossings (each approximately 0.8 miles from the Project Area)

(CDFW 2021b). Rock Creek, which is adjacent to the Project Area, contains suitable breeding habitat. Adult frogs may also use Meyers Ravine Creek or the intermittent and/or ephemeral creeks as overwintering habitat, or as overland migration corridors to suitable habitat on adjacent private properties.

3.3.3 Northern goshawk

Northern goshawk is a California Species of Special Concern. This species is a year-round resident in California, with the breeding stronghold distributed across much of the northern Coast Ranges, the Klamath, Siskiyou, and Warner mountains, Cascades, Modoc Plateau, and through most of the Sierra Nevada (Keane 2008). The species typically nests in mature, old-growth forests such as coniferous and mixed conifer-hardwood vegetation types. Preferred nesting stands are those with relatively tall, large diameter trees, high canopy cover, and an open understory (Keane 2008). In the Sierra Nevada, northern goshawks breed from the mixed conifer forests at low elevations up to and including high elevation lodgepole pine forests and eastside ponderosa pine habitats. Breeding occurs down to elevations of about 2,500 feet (Keane 2008); however, nesting is uncommon below 4,000 feet (S. Wood, Stillwater Sciences, pers. comm., 2021). Northern goshawks winter from lodgepole pine forest down slope to blue oak savannah (Verner and Boss 1980). Nesting habitat includes mature, old-growth forests with large trees and more than 60% closed canopy. Northern goshawks often build nests near breaks in the canopy, such as a forest trail, jeep road, or opening created by a downed tree, and prefer sites with a creek, pond, or lake nearby. Nests are located just below the forest canopy, usually on large branches against the trunk (Squires and Reynolds 1997). Northern goshawk nesting in California typically lasts from April to August, depending on the latitude (Zeiner et al. 1990). Foraging and nesting habitat are similar, but important components of foraging habitat also include snags and logs for prey base populations (USDA Forest Service 1991). Primary prey species include small mammals and small to medium-sized birds (Verner and Boss 1980, Fowler 1988).

There are no CNDDB occurrence records for northern goshawk in the Project Area, however there are two documented breeding occurrences in the Project Region (CDFW 2021b). An active nest in Malakoff Diggins State Historic Park (more than 8 miles from the Project Area) at approximately 3,300 feet elevation was first identified in 1980, and again in 1983. Protocol level broadcast surveys at this location in 2006 and 2007 failed to identify any goshawk activity (CDFW 2021b). In 1999, a nest with a single adult was identified on the South Yuba River, approximately 6.5 miles east of the Project Area in similar habitat and at a similar elevation (CDFW 2021b). Of the vegetation types present in the Project Area, Douglas Fir, Ponderosa Pine, and Montane Hardwood-Conifer forest (comprising approximately 38.1% of the Project Area) are most likely to contain elements of suitable nesting and foraging habitat for the species. No stands in the Project Area are old growth, however there are numerous tall, large diameter trees and snags that could be utilized as nest trees. In Montane Hardwood-Conifer areas, trees of sufficient size tend to be emergent, standing well above the canopy layer which is dominated by shorter native hardwoods. Exposed and unprotected locations such as these are not typical of preferred nest sites, which usually occur just below the canopy layer. Likewise, the understory in this vegetation type is uniformly dense, which is not indicative of high-quality foraging habitat for a species that hunts by aerial pursuit. These areas constitute only marginal nesting and foraging habitat. Mixed conifer stands in the Douglas Fir and Ponderosa Pine vegetation types, such as those adjacent to Rock Creek and Meyers Ravine Creek, represent the most typical northern goshawk nesting and foraging habitat, with a high, mostly closed canopy and open understory. Canopy breaks in all vegetation types were primarily associated with human activity (e.g., residential areas, regularly used mountain biking paths/roads, and equipment/materials storage areas), which is likely to discourage nest establishment. Multiple species of medium-sized

songbirds were observed or heard during the May field visit, and habitat components that are likely to support an adequate small mammal prey base, such as dead and downed logs and woody debris, were observed throughout the Project Area.

3.3.4 Townsend's big-eared bat

Townsend's big-eared bat, a California Species of Special Concern, occurs throughout western North America (Pierson and Rainey 1998, NatureServe 2011). In California, the range is nearly state-wide excluding the highest peaks of the Sierra Nevada Mountains. Historically, the Townsend's big-eared bat was found throughout California as a scarce but widespread species (Barbour and Davis 1969). The species occurs from sea level to over 10,000 feet in elevation in a wide variety of vegetation types (Barbour and Davis 1969, Philpott 1997, CWHR 2008). Its distribution is strongly correlated with geomorphic features such as natural and man-made caves, buildings, and bridges (Pierson et al. 1999, Sherwin et al. 2003, Gruver and Keinath 2006). Townsend's big-eared bats utilize well-ventilated, cold caves and mine tunnels as hibernacula, in particular locations from which they can hang from the ceiling (Gruver and Keinath 2006, Pierson and Rainey 1998). These habitat features are the most likely indicator of habitat suitability for this species. In addition to caves and mine tunnels, bridges and old buildings may be utilized as roosts (Barbour and Davis 1969, Pierson and Rainey 1998). Mating typically occurs from November to February after bats have entered their hibernacula for the winter, although some females will be inseminated prior to hibernation (Barbour and Davis 1969, Jameson and Peeters 1988, Kunz and Martin 1982, Zeiner et al. 1990), After delayed implantation and a 56- to 100-day gestation period, females give birth to a single pup in May or June (ibid.), sometimes after a move to a nursery colony (Pierson and Rainey 1998). Wildlife habitat associations in California (CWHR 2008) are broad. These bats are often associated with forest edges, open forests, oak woodlands, mixed conifer-deciduous forests, shrub and scrub habitats, grasslands, agricultural areas, and riparian areas (Pierson and Rainey 1998, CWHR 2008); or drier habitats where there is free water, which is an important habitat feature for this bat as it has a relatively poor urine-concentrating ability (Geluso 1978). This species is a moth specialist but feeds on a variety of lepidopterans (i.e., moths, butterflies, skipper butterflies, and moth-butterflies) (Pierson and Rainey 1998). Small moths, beetles, and a variety of soft-bodied insects also are taken in flight using echolocation, or by gleaning from foliage (Jameson and Peeters 1988, Zeiner et al. 1990). Townsend's big-eared bats do not migrate long distances (Barbour and Davis 1969, Humphrey and Kunz 1976, Dobkin et al. 1995, Woodruff and Ferguson 2005) and forage relatively close to roost sites (Gruver and Kenaith 2006). Habitat connectivity between roosting and foraging sites may be important for this species, especially because individuals tend to avoid open spaces (Gruver and Kenaith 2006).

There are no documented occurrences of Townsend's big-eared bats in the Project Area, however, the species has been documented on the South Yuba River approximately 7 miles from the Project Area, as recently as 2017 (CDFW 2021c). The Project Area contains mixed coniferdeciduous forest (Montane Hardwood-Conifer), shrub/scrub habitat (Mixed Chapparal), and riparian areas with available free water, each of which could support foraging by the species. More importantly, the Project Area contains multiple features that bats could utilize as roosting habitat or hibernacula, including one unused man-made structure on Augustine Road, numerous hollow snags, and several abandoned mine shafts. The northern- and southernmost boundaries of the Project Area are each approximately 0.8 miles from large bridges at Purdon Crossing and the State Route 49 crossing, respectively, which could also serve as roosting habitat. Habitat between potential roosting/hibernation areas and foraging habitat is mostly contiguous.

3.3.5 Migratory birds

Protection of migratory birds, their occupied nests, and their eggs is addressed by the Federal Migratory Bird Treaty Act (16 USC 703 et seq.), Title 50 Code of Federal Regulations (part 10), and California Fish and Game Code Sections 3503, 3513, and 3800. The full list of the species protected under the MBTA appears in Title 50, section 10.13, of the Code of Federal Regulations (50 CFR 10.13) and includes federal and state-listed migratory birds as well as other non-listed migratory birds. It is assumed that migratory birds have a high potential to occur in the Project Area.

4 POTENTIAL ENVIRONMENTAL EFFECTS

To investigate the potential effects of Project activities on special-status species and sensitive natural communities with the potential to occur in the Project Area, the Project description (Section 1), draft CEQA strategy for the Project, Biological Resources SPRs from the CalVTP PEIR (Appendix D), and information regarding special-status species and sensitive natural communities were reviewed.

4.1 Vegetation and Habitats

Fuel reduction and prescribed burn activities have the potential to adversely affect the following sensitive natural community with the potential to occur in the Project Area: bigleaf maple forest and woodland (S3).

Membership rules for the bigleaf maple forest and woodland alliance are defined as either 1) bigleaf maple has greater than 25% relative cover in the tree canopy, or 2) greater than 5% absolute cover in the tree canopy. This alliance occurs on raised stream benches, terraces, and lower slopes with seeps (CNPS 2021b). In the Project Area, populations of bigleaf maple trees were observed during the May 2021 field habitat assessment in lower canyons along ephemeral, intermittent, and perennial streams. If canopy cover of bigleaf maple is removed or damaged to the extent that the community no longer meets membership rules for such an alliance, there would be a temporary adverse effect from Project activities. Bigleaf maple trees resprout vigorously from the root crown following cutting or a low- to moderately intense fire (CNPS 2021b); therefore, there likely would be no permanent adverse effect from Project activities.

With the implementation of SPR BIO-4, which specifies retention of at least 75% of the overstory canopy of native riparian vegetation, there would be no adverse effect (whether temporary or permanent) on this sensitive natural community due to Project activities.

4.2 Special-status Plants

Five of the 26 special-status plant species with the potential to occur in the Project Area are annual species (Table 2), completing their lifecycle from germination to seed production each year. Annual species generally benefit from disturbance (e.g., canopy clearing, ground disturbance, and fire) if the disturbance occurs outside of the growing period. The earliest blooming period among these five plants is April and the latest is August (and occasionally September). With implementation of SPR BIO-1(1)(b), which requires that Project activities be conducted during the dormant season (Appendix D) and with the dormant season for these species estimated to be October 1 through February 28 (see the avoidance and minimization

measures [AMMs] in Section 5), adverse Project-related effects on the following species would be unlikely:

- Brandegee's clarkia (*Clarkia biloba* subsp. *brandegeeae*)
- Mosquin's clarkia (Clarkia mosquinii)
- Sierra clarkia (*Clarkia virgata*)
- finger rush (*Juncus digitatus*)
- Cedar Crest popcornflower (*Plagiobothrys glyptocarpus* var. *modestus*)

Eight of the 26 special-status plant species with the potential to occur in the Project Area are perennial species that occur in variously mesic and wet areas (e.g., bogs and fens, seeps, meadows, marshes and swamps, streambanks, and riparian forest) (Table 2, Appendix A). With the implementation of SPR BIO-1 and AMMs (Section 5), these habitats would be avoided and adverse Project-related effects on the following species would be unlikely:

- Sierra arching sedge (*Carex cyrtostachya*)
- California lady's-slipper (*Cypripedium californicum*)
- clustered lady's-slipper (*Cypripedium fasciculatum*)
- California pitcherplant (Darlingtonia californica)
- Cantelow's lewisia (Lewisia cantelovii)
- inundated bog club-moss (*Lycopodiella inundata*)
- brownish beaked-rush (Rhynchospora capitellata)
- giant checkerbloom (Sidalcea gigantea)

Six of the remaining 13 perennial special-status plant species with the potential to occur in the Project Area are geophytes (Table 2), which includes species that regenerate from bulbs (perennial bulbiferous herbs) and rhizomes (perennial rhizomatous herbs). Given that geophytes will generally be insulated from both above-ground disturbance (e.g., canopy clearing and low-intensity fire) as well as shallow ground disturbance, surveys for these species would not be required (per SPR BIO-7) and adverse Project-related effects on the following species would be unlikely:

- Sanborn's onion (Allium sanbornii var. sanbornii)
- Sierra foothills brodiaea (*Brodiaea sierrae*)
- northern Sierra daisy (Erigeron petrophilus var. sierrensis)
- Butte County fritillary (Fritillaria eastwoodiae)
- Humboldt lily (*Lilium humboldtii* subsp. *humboldtii*)
- Sierra blue grass (*Poa sierrae*)

The remaining seven perennial special-status plants with the potential to occur in the Project Area (Table 2) could be adversely affected by Project activities. Focused surveys for these species would need to be conducted (per SPR BIO-1(2) and SPR BIO-7) to determine presence/absence and ensure that either 1) Project activities are excluded from any areas supporting special-status species or 2) Project activities will not adversely affect the individuals and/or the habitat upon which they rely. May and July are the recommended survey times to ensure these target species are identifiable. Surveys would need to be conducted in the following habitats that may support these seven special-status species: chaparral; lower montane coniferous forest; cismontane woodland; and metamorphic rock areas that are usually acidic and/or vernally mesic, often in

roadsides, and sometimes in carbonate areas. If any special-status plant species are found, applicable SPRs (Appendix D) and supplemental AMMs (Section 5) would be implemented. With the implementation of SPR BIO-1(2), SPR BIO-7, and the applicable AMMs (Section 5), adverse Project-related effects on the following species would be unlikely:

- True's manzanita (Arctostaphylos mewukka subsp. truei)
- Ahart's buckwheat (*Eriogonum umbellatum* var. *ahartii*)
- dubious pea (*Lathyrus sulphureus* var. *argillaceus*)
- Quincy lupine (*Lupinus dalesiae*)
- elongate copper moss (*Mielichhoferia elongata*)
- long-fruit jewelflower (Streptanthus longisiliquus)
- True's mountain jewelflower (Streptanthus tortuosus subsp. truei)

4.3 Fish and Wildlife

Project activities are unlikely to decrease the long-term suitability of habitat in the Project Area for any of the special-status wildlife species identified as having the potential to occur (Section 3.3). Project activities have the potential to directly affect special-status species that may be present in the Project Area (e.g., by disrupting normal behavior) or indirectly by temporarily altering habitat suitability. Any effects are anticipated to be minor and temporary, and implementing applicable SPRs (Appendix D), such as requiring biological resource training for workers (SPR BIO-2), would reduce the likelihood and magnitude of any such effects. Implementation of any additional AMMs that may be developed during the CEQA process would further minimize or avoid potential effects resulting from Project activities. Individual species-specific considerations for wildlife are addressed below.

4.3.1 Western pond turtle

Within the Project Area, western pond turtles are most likely to occur as adult individuals overwintering or nesting in upland areas adjacent to Rock Creek. Adult turtles in the South Fork Yuba River may also move off-channel into Meyers Ravine Creek during periods of high flow. However, the steep gradient that exists between the Project Area and the confluence of Meyers Ravine Creek and South Yuba River is likely to preclude turtles from entering the Project Area in this drainage.

Project activities (e.g., use of heavy machinery) have the potential to disturb, injure, or kill turtles. If Project implementation occurs outside of the nesting season (late April through August, depending on elevation), Project activities are unlikely to affect egg laying, incubation, or reproductive success. Furthermore, SPR BIO-4, which requires buffers around riparian areas wherein Project activities will be limited, would minimize the potential for Project-related effects on migrating and overwintering turtles. Likewise, SPR BIO-4 would reduce Project-related effects that could impair or degrade aquatic habitat in Myers Ravine Creek and Rock Creek (e.g., increased turbidity caused by ash-laden runoff) and impact any life stages present. If work must occur within boundaries of riparian buffers, focused pre-activity surveys for western pond turtle would need to be conducted by a qualified biologist to minimize the likelihood of direct adverse effects (SPR BIO-10).

4.3.2 Foothill yellow-legged frog

Adult foothill yellow-legged frogs could occur in or around Rock Creek, Meyers Ravine Creek, and seasonally wetted areas such as the intermittent creek and two ephemeral creeks in the Project Area. Adult frogs may also migrate overland to suitable habitat on private properties adjacent to the Project Area, or seek shelter in moist cracks, soil interstices, or moist accumulations of leaf litter. Project activities adjacent to suitable aquatic features have the potential to affect foothill yellow-legged frogs directly by disturbing/displacing, injuring, or killing individual frogs, and indirectly by temporarily reducing the suitability of aquatic habitat (e.g., increased turbidity caused by ash-laden runoff), including any tadpoles and egg masses that may be present in Rock Creek, which is outside of the Project Area. Potential effects on individual foothill yellow-legged frogs and their habitat would be avoided or minimized by implementing applicable SPRs including SPR BIO-4, which would limit Project activities in and around riparian areas where frogs are most likely to occur and would reduce Project-related effects that could impair or degrade aquatic habitat outside of the Project Area. If work must occur within riparian buffers, focused pre-activity surveys would need to be conducted by a qualified biologist to minimize the likelihood of adverse effects on foothill yellow-legged frog (SPR BIO-10).

4.3.3 Northern goshawk

Habitat alterations resulting from Project activities are unlikely to decrease habitat suitability for northern goshawk. In the short term, prey species may be temporarily displaced from the Project Area; however, restoring the area to a more natural fire regime and forest structure is unlikely to have long-term adverse effects on prey abundance and may improve the prey base. Adult goshawks are sufficiently mobile to avoid direct injury or harm that could be caused by Project actions such as prescribed burning (e.g., physiological impairment or harm caused by smoke inhalation or contact with fire). Human presence, vehicular traffic, and noise-generating machinery used for Project activities may disrupt normal foraging behavior or displace individual goshawks from the Project Area. Northern goshawks are known to be sensitive to disturbance while nesting, and such disturbance may result in nest abandonment and lead to nest failure. If Project implementation occurs outside of the nesting season (April-August) (SPR BIO-1), young in the nest and adults attending them are unlikely to be affected by Project activities. If work must occur after the onset of the nesting season, focused pre-activity surveys would need to be conducted by a qualified biologist to minimize the likelihood of adverse effects (SPR BIO-12). Goshawks prospecting for nesting locations in the Project vicinity could be deterred from establishing nests in or near the Project Area. However, most potential nesting habitat in the Project Area is marginal, and the Project vicinity contains ample amounts of habitat of equal suitability. Any goshawks that are precluded from nesting in the Project Area by Project activities would not be expected to suffer reduced reproductive success.

4.3.4 Townsend's big-eared bat

Townsend's big-eared bats may forage throughout the Project Area. Individual foraging bats are sufficiently mobile to avoid Project-related disturbances. Project activities would occur during the daytime (SPR NOI-1) and are unlikely to interrupt or otherwise affect foraging behavior. Noise-and smoke- generating activities have the potential to disturb roosting bats and could cause roost abandonment, depending on proximity to the source of the disturbance. Tree-roosting bats are most likely to be affected by Project activities in this way. Maternity colonies are less likely to be affected as Townsend's big-eared bats are not known to use trees for maternity roosts. While

hibernating and in maternal colonies, bats are likely to be restricted to the limited suitable habitat available in the Project Area in the unused building on Augustine Road, and several abandoned mine shafts in the northwestern portion of the Project Area. Noise- and smoke-generating Project activities in the vicinity of these locations have the potential to directly disturb hibernating bats, potentially affecting individual winter survivorship and/or reproductive success. If Project activities must occur in the vicinity of potential hibernacula and/or maternity roost locations, conducting focused pre-activity surveys for maternal colonies and hibernating individuals would avoid or minimize potential effects on Townsend's big-eared bat (SPR BIO-10).

4.3.5 Migratory birds

Other non-listed but otherwise protected raptors or migratory bird species could establish nests in or near the Project Area. Effects on nesting migratory birds could result from human presence, fire or smoke resulting from prescribed burn activity, ground disturbance by heavy equipment, and noise or vibration that directly or indirectly affects nesting adults (e.g., causing nest abandonment), incubating eggs, or young. Nesting season for migratory birds is typically February 1 through August 15. Adverse effects on native migratory birds would be avoided or minimized through the implementation of applicable SPRs (Appendix D).

5 AVOIDANCE AND MINIMIZATION MEASURES

CEQA compliance for the Project may proceed under the Program Environmental Impact Report (PEIR) for the California Vegetation Treatment Program (CalVTP), in which case the Project would need to comply with the PEIR's Standard Project Requirements (SPRs, Appendix D) to avoid or minimize adverse effects on biological resources.

Based on the results of the habitat assessment (Section 3) and analysis of potential environmental effects (Section 4), below are recommended additional details, intended to supplement specific SPRs, that would need to be implemented to avoid adverse effects to biological resources with the potential to occur in the Project Area:

- SPR BIO-1(1):
 - o a. Habitats to be avoided include any bogs, fens, sweeps, meadows, marshes, swamps, streambanks, and riparian forest.
 - o b. The dormant period for the special-status annual and geophytic plant species with the potential to occur in the Project Area is assumed to be October 1 through February 28.
- SPR BIO-7:
 - o Focused surveys to determine the presence or absence of special-status plants with the potential to occur in the Project Area that may be affected by Project activities will be conducted in the months of May and July prior to prescribed burning, which may occur as early as November–December.
 - If special-status plant species are documented, Project activities with the
 potential to adversely affect the population will be excluded from areas
 supporting special-status plants.

6 CONCLUSIONS

One sensitive natural community, 26 special-status plant species, and four special-status wildlife species have the potential to occur in the Project Area. However, with the implementation of SPRs and applicable AMMs (Appendix D and Section 5), adverse effects would be avoided and/or minimized. The following surveys are recommended to determine presence of special-status species and guide the implementation of SPRs and AMMs:

- Focused surveys in May and July for seven special-status plant species (Section 4.2):
 - o True's manzanita
 - o Ahart's buckwheat
 - o dubious pea
 - o Quincy lupine
 - o elongate copper moss
 - o long-fruit jewelflower
 - o True's mountain jewelflower
- If Project activities must occur within riparian buffers the following surveys would need to be conducted:
 - o focused pre-activity surveys for western pond turtle;
 - o focused pre-activity surveys for foothill yellow-legged frog; and
 - o focused surveys for three special-status plant species with potential to occur in riparian areas: Sierra arching sedge, California lady's-slipper, and clustered lady's-slipper.
- If Project activities must occur between April and August, focused pre-activity surveys for northern goshawk would need to be conducted.
- If Project activities must occur in the vicinity of potential Townsend's big-eared bat hibernacula and/or roost locations, focused pre-activity surveys for roosting and hibernating individuals would need to be conducted.

The recommended period for implementing Project activities is October 1 through January 31, which avoids the active season for annual special-status plant species; nesting season for western pond turtle, northern goshawk, and migratory birds; and pupping season for Townsend's bigeared bat. Project activities can occur outside of this period provided that applicable SPRs are implemented.

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| Hoyt-Purdon Fuel Reduction and Prescribed Fire Project: Final Biological Resources Evaluation |
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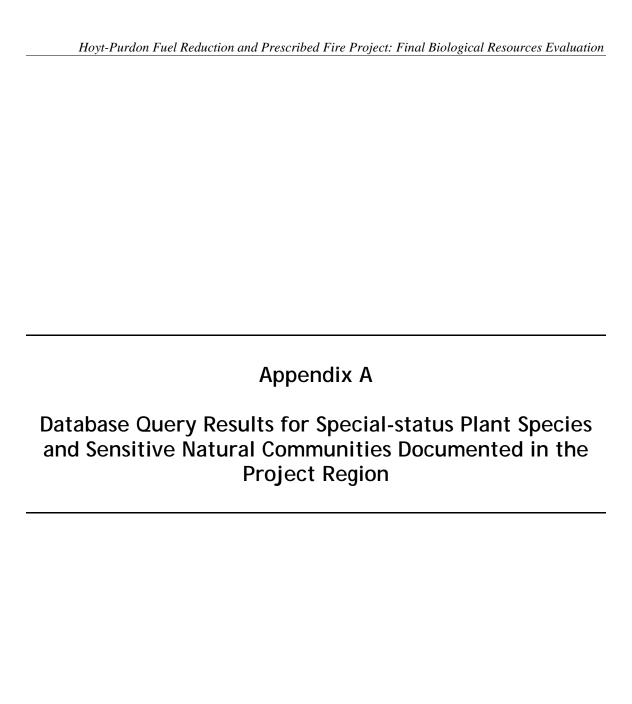


Table A. Database query results for special-status plant species documented in the Project Region.

| Scientific name | Common name | Status ¹ (CRPR / State / Federal) | Source | Blooming period | Elevation range (feet) | Habitat associations | Potential to occur in Project Area | | | |
|---|------------------------------|--|---------------------|-------------------------|------------------------|---|--|--|--|--|
| Vascular plants | Vascular plants | | | | | | | | | |
| Allium sanbornii var. sanbornii | Sanborn's onion | 4.2 / – / – | CNPS / - / - | May– September | 850–4,955 | Usually serpentinite and gravelly areas in chaparral, cismontane woodland, and lower montane coniferous forest | Yes, suitable habitat may be present | | | |
| Arctostaphylos mewukka subsp. truei | True's manzanita | 4.2 / – / – | CNPS / - / - | February–July | 1,390–4,560 | Sometimes roadsides in chaparral and lower montane coniferous forest | Yes, suitable habitat may be present | | | |
| Brodiaea sierrae | Sierra foothills brodiaea | 4.3 / – / – | CNPS / - / - | May–August | 160–3,215 | Usually serpentinite or gabbroic areas in chaparral, cismontane woodland, and lower montane coniferous forest | Yes, suitable habitat may be present | | | |
| Calystegia stebbinsii | Stebbins' morning-glory | 1B.1 / CE / FE | CNPS / CNDDB / – | April–July | 605–3,575 | Gabbroic or serpentinite areas in open chaparral and cismontane woodland | No, suitable habitat is not present | | | |
| Carex cyrtostachya | Sierra arching sedge | 1B.2/-/- | CNPS / CNDDB / – | May–August | 2,000–4,460 | Mesic lower montane coniferous forest, meadows and seeps, marshes and swamps, and margins of riparian forest | Yes, suitable habitat may be present | | | |
| Carex xerophila | chaparral sedge | 1B.2/-/- | CNPS / CNDDB / – | March–June | 1,440–2,525 | Serpentinite or gabbroic areas in chaparral, cismontane woodland, and lower montane coniferous forest | No, suitable habitat is not present | | | |
| Clarkia biloba subsp. brandegeeae | Brandegee's clarkia | 4.2 / – / – | CNPS / - / - | May–July | 245–3,000 | Often roadcuts in chaparral, cismontane woodland, and lower montane coniferous forest | Yes, suitable habitat may be present | | | |
| Clarkia mosquinii | Mosquin's clarkia | 1B.1/-/- | CNPS / CNDDB / – | May–July (September) | 605–4,890 | Rocky or roadside areas in cismontane woodland and lower montane coniferous forest | Yes, suitable habitat may be present | | | |

| Scientific name | Common name | Status ¹ (CRPR / State / Federal) | Source | Blooming period | Elevation range (feet) | Habitat associations | Potential to occur in Project Area |
|--|-------------------------------|--|---------------------|-----------------------------|------------------------|--|---|
| Clarkia virgata | Sierra clarkia | 4.3 / – / – | CNPS / - / - | May–August | 1,310–5,300 | Cismontane woodland and lower montane coniferous forest | Yes, suitable habitat may be present |
| Cypripedium californicum | California lady's- slipper | 4.2 / – / – | CNPS / - / - | April–August (September) | 95–9,020 | Usually serpentinite seeps and streambanks in bogs and fens and lower montane coniferous forest | Yes, suitable habitat may be present |
| Cypripedium fasciculatum | clustered lady's- slipper | 4.2 / – / – | CNPS / - / - | March–August | 325–7,990 | Usually serpentinite seeps and streambanks in lower montane coniferous forest and north Coast coniferous forest | Yes, suitable habitat may be present |
| Darlingtonia californica | California pitcherplant | 4.2 / – / – | CNPS / - / - | April–August | 0-8,480 | Mesic, generally serpentinite seeps in bogs, fens, meadows and seeps | Yes, suitable habitat may be present |
| Erigeron petrophilus var. sierrensis | northern Sierra daisy | 4.3 / – / – | CNPS / - / - | June-October | 980–6,800 | Sometimes serpentinite areas in cismontane woodland, lower montane coniferous forest and upper montane coniferous forest | Yes, suitable habitat may be present |
| Eriogonum umbellatum var. ahartii | Ahart's buckwheat | 1B.2/-/- | CNPS / CNDDB / – | June– September | 1,310–6,560 | Serpentinite, slopes, or openings in chaparral and cismontane woodland | Yes, suitable habitat may be present |
| Fremontodendron decumbens | Pine Hill flannelbush | 1B.2 / CR / FE | CNPS / CNDDB / – | April–July | 1,390–2,495 | Rocky gabbroic and/or serpentinite areas in chaparral and cismontane woodland | No, suitable habitat is not present |
| Fritillaria eastwoodiae | Butte County fritillary | 3.2 / – / – | CNPS / CNDDB / – | March–June | 160–4,920 | Sometimes serpentinite areas in chaparral, cismontane woodland, and openings of lower montane coniferous forest | Yes, suitable habitat may be present; previously documented in or near the Project Area |

| Scientific name | Common name | Status ¹ (CRPR / State / Federal) | Source | Blooming period | Elevation range (feet) | Habitat associations | Potential to occur in Project Area |
|--|---------------------------|--|---------------------|----------------------|------------------------|---|--|
| Juncus digitatus | finger rush | 1B.1/-/- | CNPS / CNDDB / – | (April) May– June | 2,165–2,590 | Openings of cismontane woodland, openings of lower montane coniferous forest, and xeric vernal pools | Yes, suitable habitat may be present |
| Lathyrus sulphureus var. argillaceus | dubious pea | 3 / – / – | CNPS / CNDDB / – | April–May | 490–3,050 | Cismontane woodland, lower montane coniferous forest, and upper montane coniferous forest | Yes, suitable habitat may be present |
| Lewisia cantelovii | Cantelow's lewisia | 1B.2 / – / – | CNPS / CNDDB / – | May-October | 1,080–4,495 | Mesic, granitic, and sometimes serpentinite seeps in broadleafed upland forest, chaparral, cismontane woodland, and lower montane coniferous forest | Yes, suitable habitat may be present; previously documented adjacent to Project Area |
| Lilium humboldtii subsp. humboldtii | Humboldt lily | 4.2 / – / – | CNPS / - / - | May–July (August) | 295–4,200 | Openings in chaparral, cismontane woodland and lower montane coniferous forest | Yes, suitable habitat may be present |
| Lupinus dalesiae | Quincy lupine | 4.2 / – / – | -/CNDDB/- | May–August | 2,804–8,200 | Openings and often disturbed areas in chaparral, cismontane woodland, lower montane coniferous forest and upper montane coniferous forest | Yes, suitable habitat may be present |
| Monardella follettii | Follett's monardella | 1B.2/-/- | CNPS / - / - | June– September | 1,965–6,560 | Rocky, serpentinite areas in lower montane coniferous forest | No, suitable habitat is not present |
| Perideridia bacigalupii | Bacigalupi's yampah | 4.2 / – / – | CNPS / - / - | June–August | 1,475–3,395 | Serpentinite areas in chaparral and lower montane coniferous forest | No, suitable habitat is not present |
| Plagiobothrys glyptocarpus var. modestus | Cedar Crest popcornflower | 3/-/- | CNPS / – / – | April–June | 2,850–2,855 | Cismontane woodland and mesic valley and foothill grassland | Yes, suitable habitat may be present |
| Poa sierrae | Sierra blue grass | 1B.3 / – / – | CNPS / CNDDB / – | April–July | 1,195–4,920 | Openings in lower montane coniferous forest | Yes, suitable habitat may be present |

| Scientific name | Common name | Status ¹ (CRPR / State / Federal) | Source | Blooming period | Elevation range (feet) | Habitat associations | Potential to occur in Project Area |
|---|-----------------------------|--|---------------------|--------------------------------|------------------------|---|--|
| Pyrrocoma lucida | sticky pyrrocoma | 1B.2 / - / - | CNPS / CNDDB / – | July-October | 2,295–6,400 | Alkaline clay areas in Great Basin scrub, lower montane coniferous forest, and meadows and seeps | No, suitable habitat is not present |
| Rhynchospora capitellata | brownish beaked-rush | 2B.2/-/- | CNPS / CNDDB / – | July–August | 145–6,560 | Mesic areas in lower montane coniferous forest, meadows and seeps, marshes and swamps, and upper montane coniferous forest | Yes, suitable habitat may be present |
| Sidalcea gigantea | giant checkerbloom | 4.3 / – / – | CNPS / - / - | (January–June) July–October | 2,195–6,400 | Meadows and seeps in lower montane coniferous forest and upper montane coniferous forest | Yes, suitable habitat may be present |
| Sidalcea stipularis | Scadden Flat checkerbloom | 1B.1 / CE / – | CNPS / CNDDB / – | July-August | 2,295–2,395 | Montane freshwater marshes and swamps | No, suitable habitat is not present |
| Streptanthus longisiliquus | long-fruit jewelflower | 4.3 / – / – | CNPS / - / - | April– September | 2,345–4,920 | Openings in cismontane woodland and lower montane coniferous forest | Yes, suitable habitat may be present |
| Streptanthus tortuosus subsp. truei | True's mountain jewelflower | 1B.1 / - / - | CNPS / - / - | June–July (September) | 2,505–2,820 | Partial shade on steep rocky slopes in lower montane coniferous forest | Yes, suitable habitat may be present |
| Viola tomentosa | felt-leaved violet | 4.2 / – / – | CNPS / - / - | (April)May– October | 4,705–6,560 | Gravelly areas in lower montane coniferous forest, subalpine coniferous forest, and upper montane coniferous forest | No; outside of elevation range |
| Non-vascular plants | 1 | | | | | | |
| Fissidens pauperculus | minute pocket moss | 1B.2/-/- | CNPS / CNDDB / – | n/a | 30–3,360 | Damp coastal soil in North Coast coniferous forest | No, suitable habitat is not present |
| Lycopodiella inundata | inundated bog club-moss | 2B.2/-/- | CNPS / CNDDB / – | June– September | 15–3,280 | Coastal bogs and fens, mesic lower montane coniferous forest, and margins of marshes and swamps | Yes, suitable habitat may be present |

| Scientific name | Common name | Status¹ (CRPR / State / Federal) | Source | Blooming period | Elevation range (feet) | Habitat associations | Potential to occur in Project Area |
|----------------------------|-------------------------|--|---------------------|--------------------|------------------------|--|--|
| Mielichhoferia elongata | elongate copper moss | 4.3 / – / – | CNPS / CNDDB / – | n/a | 0-6,430 | Metamorphic rock, usually acidic, usually vernally mesic, often roadsides and sometimes carbonate areas in broadleafed upland forest, chaparral, cismontane woodland, coastal scrub, lower montane coniferous forest, meadows and seeps, and subalpine coniferous forest | Yes, suitable habitat may be present |

¹ Status:

Federal

FE Federally listed as endangered

No federal status

State

CE California listed as endangered

CR California listed as rare

No state status

California Rare Plant Rank (CRPR)

- 1B Plants rare, threatened, or endangered in California and elsewhere
- 2B Plants rare, threatened, or endangered in California, but more common elsewhere
 - 3 More information needed about this plant, a review list
 - 4 Plants of limited distribution, a watch list
- 0.1 Seriously threatened in California (high degree/immediacy of threat)
- 0.2 Fairly threatened in California (moderate degree/immediacy of threat)
- $0.3\,\,$ Not very threatened in California (low degree/immediacy of threats or no current threats known)

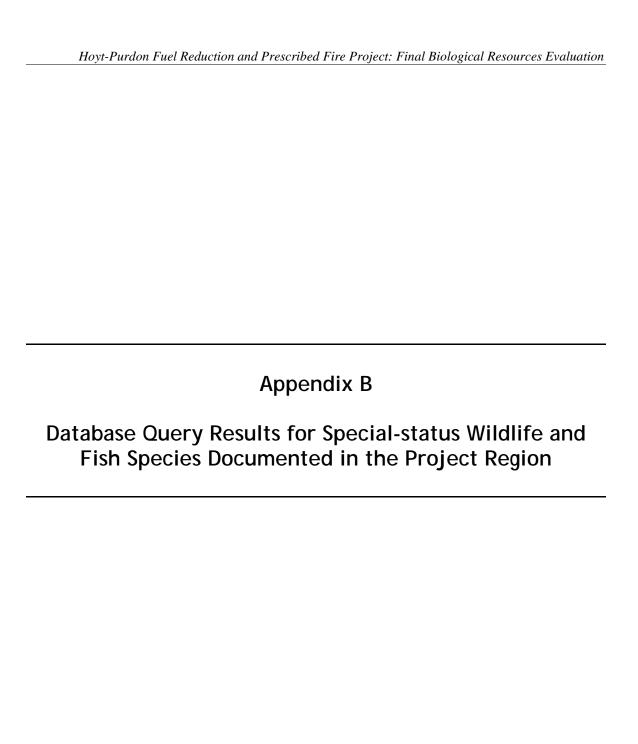


Table B. Database query results for special-status wildlife and fish species documented in the Project Region.

| Common name Scientific name | Query sources | Status ¹ Federal/ State | Distribution in California | Habitat association | Likelihood to occur in the Project Area |
|--|------------------|--|--|--|---|
| Invertebrates | | | | | |
| Western bumble bee Bombus occidentalis | CNDDB | -/SCE | Throughout California and adjacent states | Uses flowering plants in meadows and forested openings; abandoned rodent burrows are used for nest and hibernation sites for queens | Low; occurrence in California is rare, flowering plants with short corolla lengths are uncommon in the Project Area |
| Fish | | | | | |
| Delta smelt Hypomesus transpacificus | USFWS | FT/SE | Found only in the Sacramento- San Joaquin Estuary, including the lower reaches of Sacramento and Napa rivers; the Delta including Suisun Bay, Goodyear, Suisun, Cutoff, First Mallard, and Montezuma sloughs | Estuarine or brackish waters up to 18 parts per thousand (ppt); spawn in shallow brackish water upstream of the mixing zone (zone of saltwater-freshwater interface) where salinity is around 2 ppt | None; the Project Area does not contain estuarine or brackish habitat and the Project Region is outside of the species' range |
| Chinook salmon, central Valley spring-run ESU Oncorhynchus tshawytscha | NMFS | FT/ST | Sacramento River and its tributaries (Deer, Mill, Antelope, Battle, Beegum, Butte, and Big Chico creeks and the Feather and Yuba rivers) | Low- to mid-elevation rivers and streams with cold water, clean gravel of appropriate size for spawning and adequate rearing habitat; typically rear in freshwater for one or more years before migrating to the ocean | None; the Project Area does not contain anadromous fish habitat (the nearby reach of the South Yuba River is above Englebright Dam, an impassable barrier that precludes the presence of anadromous fish [NOAA Fisheries 2021]) |

| Common name Scientific name | Query sources | Status ¹ Federal/ State | Distribution in California | Habitat association | Likelihood to occur in the Project Area | | | | |
|---|------------------|--|--|---|--|--|--|--|--|
| Steelhead, Central Valley DPS Oncorhynchus mykiss | NMFS | FT/– | Sacramento and San Joaquin rivers and their tributaries | Rivers and streams with cold water, clean gravel of appropriate size for spawning, and suitable rearing habitat; typically rear in freshwater for one or more years before migrating to the ocean | None; the Project Area does not contain anadromous fish habitat; while resident <i>O. mykiss</i> (with no special status) may occur in the nearby reach of the South Yuba River, it is above Englebright Dam, an impassable barrier that precludes the presence of anadromous fish (NOAA Fisheries 2021) | | | | |
| Amphibians | | | | | | | | | |
| California red-legged frog Rana draytonii | CNDDB, USFWS | FT/SSC | Largely restricted to coastal drainages on the central coast from Mendocino County to Baja California; in the Sierra foothills south to Tulare and possibly Kern counties | Breeds in still or slow-moving water with emergent and overhanging vegetation, including wetlands, wet meadows, ponds, lakes, and low-gradient, slow moving stream reaches with permanent pools; uses adjacent uplands for dispersal and summer retreat | Very low; no permanent standing or slow-moving water is present in the Project Area. The only known occurrence of the species in Nevada County is a breeding population documented in a permanent, man-made pond approximately 9 miles east of the Project Area | | | | |
| Foothill yellow-legged frog (Northern Sierra clade) Rana boylii | CNDDB | -/ST | From the Oregon border along the coast to the Transverse Ranges, and south along the western side of the Sierra Nevada Mountains to Kern County; a possible isolated population in Baja California | Shallow tributaries and mainstems of perennial streams and rivers, typically associated with cobble or boulder substrate | Moderate; suitable habitat is present in the Project Area in Meyers Ravine Creek (a perennial tributary to the South Yuba River), and Rock Creek, which is adjacent to the Project Area. The species is regularly documented in the South Yuba River near the Project Area (CDFW 2021) | | | | |

| Common name Scientific name | Query sources | Status ¹ Federal/ State | Distribution in California | Habitat association | Likelihood to occur in the Project Area |
|--|------------------|--|--|---|---|
| Reptiles | • | • | | | |
| Coast horned lizard Phrynosoma blainvillii | CNDDB | -/SSC | West of deserts and Cascade- Sierran highlands, as far north as Shasta Reservoir | Open areas with sandy soil and/or patches of loose soil and low/scattered vegetation in scrublands, grasslands, conifer forests, and woodlands; frequently found near ant hills | Low; a single 0.05-acre area contains suitable habitat in the Project Area |
| Western pond turtle Actinemys marmorata | CNDDB | -/SSC | From the Oregon border along the coast ranges to the Mexican border, and west of the crest of the Cascades and Sierras | Permanent, slow-moving fresh or brackish water with available basking sites and adjacent open habitats or forest for nesting | Moderate; Meyers Ravine Creek, a perennial tributary to the South Yuba River in the Project Area, may serve as a migration corridor; upland areas adjacent to Rock Creek may serve as wintering or nesting habitat, and several occurrences have been documented in the Project Region (CDFW 2021) |
| Birds | | | | | |
| Bald eagle Haliaeetus leucocephalus | CNDDB, USFWS | FD, BGEPA/SE, SFP, BOFS | Permanent resident and uncommon winter migrant, found nesting primarily in Butte, Lake, Lassen, Modoc, Plumas, Shasta, Siskiyou, and Trinity counties | Large bodies of water or rivers with abundant fish, uses snags or other perches; nests in advanced-successional conifer forest near open water. | Low; some components of suitable breeding habitat (e.g., tall, large diameter trees and snags) are present in the Project Area. However, there are no water bodies large enough to constitute suitable foraging habitat in the Project vicinity, indicating that the Project Area is unlikely to support breeding |
| Northern goshawk Accipter gentilis | CNDDB | -/SSC, BOFS | Nests in North Coast Ranges through Sierra Nevada, Klamath, Cascade, and Warner Mountains, in Mount Pinos and San Jacinto, | Mature and old-growth stands of coniferous forest, middle and higher elevations; nests in dense part of stands near an opening | Low-to-Moderate; marginal breeding and foraging habitat is present in the Project Area and Project vicinity |

| Common name Scientific name | Query sources | Status ¹ Federal/ State | Distribution in California | Habitat association | Likelihood to occur in the Project Area |
|--|------------------|--|--|---|--|
| | | | San Bernardino, and White Mountains; winters along north coast, throughout foothills, and in northern deserts | | |
| California black rail Laterallus jamaicenis coturniculus | CNDDB | -/ST, SFP | Northern San Francisco Bay area (primarily San Pablo and Suisun bays) and Sacramento-San Joaquin Delta | Large tidally-influenced marshes with saline to brackish water, typically with a high proportion of pickleweed (Salicornia virginica); also can be associated with bulrush (Schoenoplectus spp.), cattail (Typha spp.), or rushes (Juncus spp.); peripheral vegetation at and above mean high higher water necessary to protect nesting birds during extremely high tides | None; no tidal marsh or suitable wetland habitat is present in the Project Area or Project vicinity. Occurrences in the Project Region represent a year-round, resident breeding population located approximately 12 miles southwest of the Project Area (CDFW 2021) |
| Great gray owl Strix nebulosa | CNDDB | -/SE | In the Sierra Nevada from the vicinity of Quincy, Plumas County south to around Yosemite, from 3,000 to 6,000 ft | Dense, coniferous forest, usually near a meadow for foraging; nests in large, broken-topped snags | Low; this species is rare in the Sierra Nevada outside of Yosemite National Park. The Project Area is below the typical elevational range for the species and does not contain suitable breeding habitat. A suspected breeding pair was documented between 2005 and 2010 approximately 7 miles north of the Project Area (CDFW 2021), however this was at a slightly higher elevation and in habitat that included significantly more suitable foraging habitat. |

| Common name Scientific name | Query sources | Status ¹ Federal/ State | Distribution in California | Habitat association | Likelihood to occur in the Project Area | | | | |
|--|------------------|--|---|--|---|--|--|--|--|
| Mammals | | | | | | | | | |
| Townsend's big-eared bat Corynorhinus townsendii | CNDDB | -/SSC | Throughout California, found in all but subalpine and alpine habitats, details of distribution not well known | Most abundant in mesic habitats, also found in oak woodlands, desert, vegetated drainages, caves or cave-like structures (including basal hollows in large trees, mines, tunnels, and buildings) | Moderate; suitable hibernation and roosting habitat may be present in the Project Area, may forage in the Project Area | | | | |
| Sierra Nevada red fox Vulpes vulpes necator | CNDDB | FPE/ST | Cascade Range east to the Sierra Nevada and south to Tulare County; majority of sightings in vicinity of Lassen and Yosemite National Parks; from 1,500 to 2,100 m (5,000 to 7,000 ft) | Wet meadows to forested areas; high- elevation conifer forest, and sub-alpine woodlands; dense vegetation and rocky areas for den sites | Low; the Project Area is below elevations at which this species typically occurs | | | | |
| Fisher Pekania pennanti Northern California- Southern Oregon DPS | CNDDB | _/_2 | Northern Coast Range, Klamath Mountains, Modoc Plateau and Cascades, and the Northern Sierra Nevada south to Butte County | Dense advanced-successional conifer forests, with complex forest structure; den in hollow trees and snags | None; the Project Area is outside of this species' current known range. The last known occurrence in the Project Region was in 1987 on the Yuba River in Plumas National Forest, approximately 7.5 miles northwest of the Project Area | | | | |

¹ Status:

- = None

FederalSFE= Listed as endangered under the federal Endangered Species ActEFT= Listed as threatened under the federal Endangered Species ActSFPE= Proposed for listing as endangered under the federal EndangeredSSpecies ActS

FPT = Proposed for listing as threatened under the federal Endangered Species Act

State

BOFS = California Board of Forestry Sensitive

SE = Listed as endangered under the California Endangered Species Act ST = Listed as threatened under the California Endangered Species Act

SCE = A candidate for listing as endangered under the California Endangered Species Act

SSC = CDFW Species of Special Concern

SFP = CDFW Fully Protected species

² In May 2020, the United States Fish and Wildlife Service (USFWS) reorganized what was then known as the Pacific fisher (*Pekania pekanti pacifica*) "West Coast DPS" into two geographically distinct groupings: The Northern California-Southern Oregon (NCSO) DPS, which is not protected under federal or state law, and the Southern Sierra Nevada (SSN) DPS, which is protected under the federal Endangered Species Act.

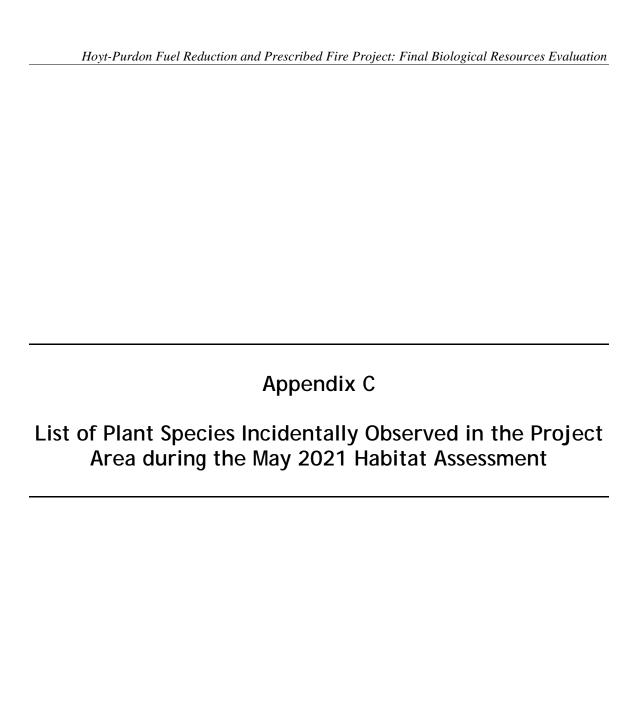


Table C. List of plant species incidentally observed in the Project Area during the May 2021 habitat assessment.

| Scientific name | Common name | Family | Native? | Cal-IPC rating ¹ | |
|---------------------------------------|--------------------------------------|--------------------|---------|-----------------------------|--|
| Acer macrophyllum | big-leaf maple | Sapindaceae | yes | _ | |
| Achillea millefolium | common yarrow | Asteraceae | yes | _ | |
| Achyrachaena mollis | blow wives | Asteraceae | yes | _ | |
| Acmispon americanus var. americanus | American bird's-foot trefoil | Fabaceae | yes | _ | |
| Adenocaulon bicolor | trail plant | Asteraceae | yes | _ | |
| Aegilops triuncialis | barbed goat grass | Poaceae | no | High | |
| Aesculus californica | California buckeye | Sapindaceae | yes | _ | |
| Agoseris heterophylla | annual agoseris | Asteraceae | yes | _ | |
| Agoseris retrorsa | spearleaf agoseris | Asteraceae | yes | _ | |
| Aira caryophyllea | silver hair grass | Poaceae | no | _ | |
| Alnus rhombifolia | white alder | Betulaceae | yes | _ | |
| Amsinckia menziesii | common fiddleneck | Boraginaceae | yes | _ | |
| Arbutus menziesii | Pacific madrone Ericaceae | | yes | _ | |
| Arctostaphylos viscida subsp. viscida | sticky whiteleaf manzanita Ericaceae | | yes | _ | |
| Aristolochia californica | California dutchman's pipe | Aristolochiaceae | yes | _ | |
| Artemisia douglasiana | mugwort | mugwort Asteraceae | | _ | |
| Avena (barbata or fatua) | oats | Poaceae | | Moderate | |
| Briza minor | annual quaking grass Poaceae | | no | _ | |
| Bromus diandrus | ripgut grass Poaceae | | no | Moderate | |
| Bromus hordeaceus | soft chess | soft chess Poaceae | | Limited | |
| Bromus madritensis | foxtail chess | tail chess Poaceae | | _ | |
| Bromus sitchensis var. carinatus | California brome | Poaceae | yes | _ | |
| Calocedrus decurrens | incense cedar | Cupressaceae | yes | _ | |
| Calochortus albus | white globe lily | Liliaceae | yes | _ | |
| Calycanthus occidentalis | sweet-shrub | Calycanthaceae | yes | _ | |

This list includes plant species incidentally observed during the May 2021 habitat assessment; protocol-level botanical surveys have not been completed for the Project.

| Scientific name | Common name | Family | Native? | Cal-IPC rating ¹ | |
|---|----------------------------|----------------------------|----------------|-----------------------------|--|
| Calystegia sp. | morning-glory | Convolvulaceae | yes | _ | |
| Carduus pycnocephalus subsp. pycnocephalus | Italian thistle | Asteraceae | no | Moderate | |
| Carex barbarae | whiteroot | Cyperaceae | yes | _ | |
| Carex multicaulis | stick sedge | Cyperaceae | yes | _ | |
| Castilleja applegatei subsp. pinetorum | wavyleaf Indian paintbrush | Orobanchaceae | yes | _ | |
| Ceanothus cuneatus | buckbrush | Rhamnaceae | yes | _ | |
| Ceanothus integerrimus | deer brush | Rhamnaceae | yes | _ | |
| Centaurea (melitensis or solstitialis) | knapweed | Asteraceae | no | Moderate or High | |
| Chamaebatia foliolosa | mountain misery | Rosaceae | yes | _ | |
| Chlorogalum pomeridianum var. pomeridianum | wavyleaf soap plant | Agavaceae | yes | _ | |
| Chondrilla juncea | skeleton weed Asteraceae | | no | Moderate | |
| Cirsium vulgare | bull thistle | Asteraceae | no | Moderate | |
| Clarkia rhomboidea | diamond clarkia | Onagraceae | Onagraceae yes | | |
| Clarkia sp. | clarkia | Onagraceae | yes | _ | |
| Clarkia unguiculata | elegant clarkia Onagraceae | | yes | _ | |
| Claytonia sp | springbeauty Montiaceae | | yes | _ | |
| Cornus nuttallii | mountain dogwood | logwood Cornaceae | | _ | |
| Cornus sericea | American dogwood | American dogwood Cornaceae | | _ | |
| Cuscuta sp. | dodder | Convolvulaceae | undetermined | _ | |
| Cynosurus echinatus | bristly dogtail grass | grass Poaceae | | Moderate | |
| Cytisus scoparius | Scotch broom | Scotch broom Fabaceae | | High | |
| Daucus pusillus | American wild carrot | Apiaceae | yes | _ | |
| Dicentra formosa | Pacific bleeding heart | Papaveraceae | yes | _ | |
| Diplacus aurantiacus | orange bush monkeyflower | Phrymaceae | yes | _ | |
| Diplacus kelloggii | Kellogg's monkeyflower | Phrymaceae | yes | _ | |

This list includes plant species incidentally observed during the May 2021 habitat assessment; protocol-level botanical surveys have not been completed for the Project.

| Scientific name | Common name | Family | Native? | Cal-IPC rating ¹ | |
|--|------------------------------|-----------------------------|--------------|-----------------------------|--|
| Dipterostemon capitatus | blue dicks | Themidaceae | yes | _ | |
| Elymus caput-medusae | medusa head | Poaceae | no | High | |
| Elymus glaucus | blue wild-rye | Poaceae | yes | - | |
| Elymus sp. | wild-rye | Poaceae | yes | - | |
| Erigeron canadensis | horseweed | Asteraceae | yes | - | |
| Erigeron foliosus | leafy fleabane | Asteraceae | yes | _ | |
| Erigeron inornatus | western rayless fleabane | Asteraceae | yes | - | |
| Eriogonum umbellatum var. nevadense | Nevada sulphur flower | Polygonaceae | yes | - | |
| Eriophyllum lanatum | common woolly sunflower | Asteraceae | yes | - | |
| Euphorbia oblongata | eggleaf spurge | Euphorbiaceae | no | Limited | |
| Festuca myuros | rattail sixweeks grass | Poaceae | no | Moderate | |
| Festuca perennis | rye grass | Poaceae 1 | | Moderate | |
| Festuca sp. | fescue | Poaceae | undetermined | - | |
| Galium aparine | goose grass | oose grass Rubiaceae yes | | - | |
| Galium parisiense | wall bedstraw | Rubiaceae | no | - | |
| Gilia capitata | bluehead gilia | Polemoniaceae | yes | - | |
| Githopsis specularioides | common bluecup Campanulaceae | | yes | _ | |
| Goodyera oblongifolia | rattlesnake-plantain | esnake-plantain Orchidaceae | | _ | |
| Heteromeles arbutifolia | toyon | toyon Rosaceae | | - | |
| Hieracium albiflorum | white hawkweed | Asteraceae | yes | - | |
| Hordeum murinum | wall barley Poaceae | | no | Moderate | |
| Hypericum calycinum | Aaron's beard | Hypericaceae no | | _ | |
| Hypericum perforatum subsp. perforatum | Klamathweed Hypericaceae | | no | Limited | |
| Iris hartwegii | rainbow iris | Iridaceae | yes | _ | |
| Lathyrus latifolius | perennial sweet pea | Fabaceae | no | - | |
| Lathyrus sulphureus | snub pea | Fabaceae | yes | _ | |

This list includes plant species incidentally observed during the May 2021 habitat assessment; protocol-level botanical surveys have not been completed for the Project.

| Scientific name | Common name | Family | Native? | Cal-IPC rating ¹ | |
|--------------------------------------|---------------------------|---------------------------------|---------|-----------------------------|--|
| Lilium sp. | lily | Liliaceae | yes | _ | |
| Logfia gallica | daggerleaf cottonrose | Asteraceae | no | _ | |
| Lonicera hispidula | pink honeysuckle | Caprifoliaceae | yes | _ | |
| Lonicera involucrata | twinberry | Caprifoliaceae | yes | _ | |
| Lupinus nanus | sky lupine | Fabaceae | yes | - | |
| Lysimachia latifolia | Pacific starflower | Myrsinaceae | yes | _ | |
| Madia gracilis | gumweed | Asteraceae | yes | - | |
| Melica bulbosa | oniongrass | Poaceae | yes | - | |
| Muhlenbergia rigens | deer grass | Poaceae | yes | _ | |
| Osmorhiza berteroi | sweetcicely | Apiaceae | yes | - | |
| Pellaea andromedifolia | coffee fern | Pteridaceae | yes | - | |
| Pentagramma triangularis | goldback fern | Pteridaceae | yes | _ | |
| Phacelia heterophylla var. virgata | phacelia | Boraginaceae | yes | - | |
| Philadelphus lewisii | wild mock orange | Hydrangeaceae | yes | _ | |
| Pinus ponderosa | ponderosa pine | ponderosa pine Pinaceae | | _ | |
| Plantago lanceolata | English plantain | English plantain Plantaginaceae | | Limited | |
| Poa bulbosa | bulbous bluegrass Poaceae | | no | _ | |
| Poa secunda | Nevada blue grass | Poaceae | yes | _ | |
| Polypodium californicum | California polypody | Polypodiaceae | yes | _ | |
| Prunella vulgaris | common selfheal | Lamiaceae | yes | _ | |
| Pseudognaphalium californicum | ladies' tobacco | Asteraceae | yes | _ | |
| Pseudotsuga menziesii var. menziesii | Douglas-fir | Pinaceae | yes | _ | |
| Pteridium aquilinum var. pubescens | hairy brackenfern | Dennstaedtiaceae | yes | _ | |
| Quercus chrysolepis | maul oak | ak Fagaceae | | _ | |
| Quercus kelloggii | California black oak | Fagaceae | yes | _ | |
| Ranunculus californicus | California buttercup | Ranunculaceae | yes | _ | |

This list includes plant species incidentally observed during the May 2021 habitat assessment; protocol-level botanical surveys have not been completed for the Project.

| Scientific name | Common name | Family | Native? | Cal-IPC rating ¹ | |
|---|-----------------------------------|------------------|--------------|-----------------------------|--|
| Ribes sp. | currant or gooseberry | Grossulariaceae | yes | | |
| Robinia pseudoacacia | black locust | Fabaceae | no | Limited | |
| Rosa sp. | rose | Rosaceae | yes | _ | |
| Rubus armeniacus | Himalayan blackberry | Rosaceae | no | High | |
| Rubus laciniatus | cutleaf blackberry | Rosaceae | no | _ | |
| Rumex sp. | dock | Polygonaceae | undetermined | _ | |
| Salix laevigata | red willow | Salicaceae | yes | _ | |
| Sambucus nigra subsp. caerulea | blue elderberry | Adoxaceae | yes | _ | |
| Sanicula crassicaulis | Pacific blacksnakeroot | Apiaceae | yes | _ | |
| Sedum spathulifolium | broadleaf stonecrop | Crassulaceae | yes | _ | |
| Silene laciniata subsp. californica | California pink | Caryophyllaceae | yes | _ | |
| Streptanthus tortuosus (not S.t. subsp. truei | mountain jewelflower Brassicaceae | | yes | _ | |
| Symphoricarpos albus var. laevigatus | snowberry | Caprifoliaceae | yes | _ | |
| Torilis arvensis | tall sock-destroyer | Apiaceae | no | Moderate | |
| Torreya californica | California nutmeg | utmeg Taxaceae | | _ | |
| Toxicodendron diversilobum | western poison oak | Anacardiaceae | yes | _ | |
| Trifolium dubium | little hop clover | over Fabaceae | | _ | |
| Trifolium hirtum | rose clover | Fabaceae | no | Limited | |
| Trifolium willdenovii | tomcat clover | Fabaceae | yes | _ | |
| Triteleia laxa | Ithuriel's spear Themidace | | yes | _ | |
| Umbellularia californica | California laurel Lauraceae | | yes | _ | |
| Verbascum thapsus | woolly mullein | Scrophulariaceae | no | Limited | |
| Vicia sativa | garden vetch | Fabaceae | no | _ | |
| Vicia villosa | hairy vetch | Fabaceae | no | _ | |
| Viola lobata | pine violet | Violaceae | yes | _ | |

This list includes plant species incidentally observed during the May 2021 habitat assessment; protocol-level botanical surveys have not been completed for the Project.

| Scientific name | Common name | Family | Native? | Cal-IPC rating ¹ | |
|-------------------|-----------------------|----------|---------|-----------------------------|--|
| Vitis californica | California wild grape | Vitaceae | yes | _ | |

Cal-IPC ratings (Cal-IPC 2019):

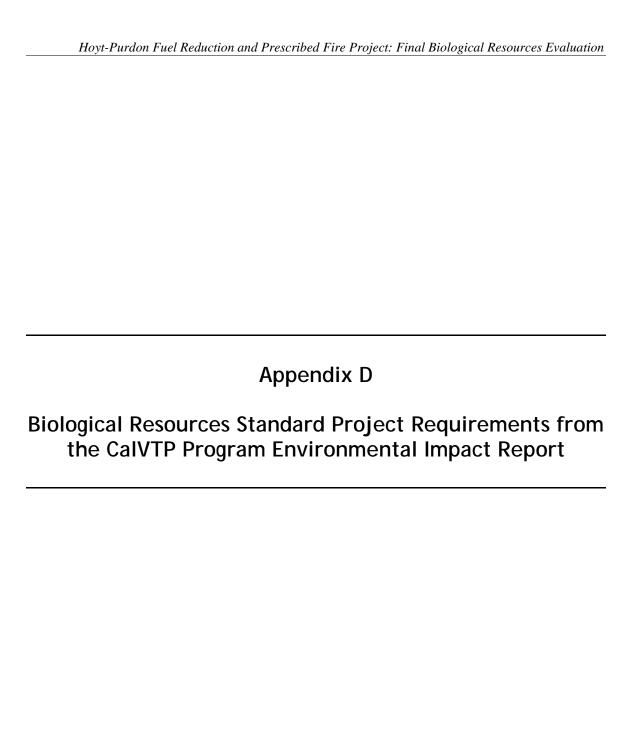
High Species having severe ecological impacts on physical processes, plant and animal communities, and vegetation structure.

Moderate Species having substantial and apparent—but generally not severe—ecological impacts on physical processes, plant and animal communities, and vegetation structure.

Limited Species having minor ecological impacts on a statewide level of for which there is not enough information to justify a higher score.

- None

This list includes plant species incidentally observed during the May 2021 habitat assessment; protocol-level botanical surveys have not been completed for the Project.



STANDARD PROJECT REQUIREMENTS FROM CALVTP PEIR (ASCENT ENVIRONMENTAL 2019)

The following Biological Resources SPRs reproduced from the CalVTP PEIR (Ascent Environmental 2019) would be incorporated into the Project if the CEQA process is completed under the CalVTP. SPRs are intended to avoid and minimize environmental impacts and comply with applicable laws and regulations.

Biological Resources Standard Project Requirements

Biological resource SPRs and mitigation measures require that qualified individuals implement components of the measures. The requirements listed below will be met to be considered qualified and may be performed by individuals of various titles (including biologist, botanist, ecologist, Registered Professional Forester, biological technician, or supervised designees working at the direction of a qualified professional) as long as they are qualified for the task at hand.

Qualified Registered Professional Forester (RPF) or Biologist: To be qualified, an RPF or biologist would hold a wildlife biology, botany, ecology, forestry, or other relevant degree from an accredited university and: 1) be knowledgeable in relevant species life histories and ecology, 2) be able to correctly identify relevant species and habitats, 3) have experience conducting field surveys of relevant species or resources, 4) be knowledgeable about survey protocols, 5) be knowledgeable about state and federal laws regarding the protection of special-status species, and 6) have experience with CDFW's California Natural Diversity Database (CNDDB) and Biogeographic Information and Observation System (BIOS). The project proponent will review the resume and approve the qualifications of RPFs or biologists. If species-specific protocol surveys are performed, surveys would be conducted by qualified RPFs or biologists with the minimum qualifications required by the appropriate protocols, including having CDFW or USFWS approval to conduct such surveys, if required by certain protocols.

Qualified RPF or Botanist: To be qualified, an RPF or botanist would 1) be knowledgeable about plant taxonomy, 2) be familiar with plants of the region, including special-status plants and sensitive natural communities, 3) have experience conducting floristic botanical field surveys as described in CDFW "Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities" (current version dated March 20, 2018), or experience conducting such botanical field surveys under the direction of an experienced botanical field surveyor, 4) be familiar with the *California Manual of Vegetation* (Sawyer et al. 2009 or current version, including updated natural communities data at http://vegetation.cnps.org/), and 5) be familiar with federal, state, and local statutes and regulations related to plants and plant collecting. The project proponent will review the resume and approve the qualifications of RPFs or botanists.

Qualified RPF or Biological Technician: To be qualified, an RPF or biological technician would 1) be knowledgeable in relevant species life histories and ecology, 2) be able to correctly identify relevant species and habitats, 3) have experience conducting biological monitoring of relevant species or resources, and 4) be knowledgeable about state and federal laws regarding the protection of special-status species. The project proponent will review the resume and approve the qualifications of RPFs or biological technicians.

SPR BIO-1: Review and Survey Project-Specific Biological Resources. The project proponent will require a qualified RPF or biologist to conduct a data review and reconnaissance-level

survey prior to treatment, no more than one year prior to the submittal of the PSA for each treatment project, and no more than one year between completion of the PSA and implementation of the treatment project. The data reviewed will include the biological resources setting, species and sensitive natural communities tables, and habitat information in this PEIR for the ecoregion(s) where the treatment will occur. It will also include review of the best available, current data for the area, including vegetation mapping data, species distribution/range information, CNDDB, California Native Plant Society (CNPS) Inventory of Rare and Endangered Plants of California, relevant BIOS queries, and relevant general and regional plans. Reconnaissance-level biological surveys will be general surveys that include visual and auditory inspection for biological resources to help determine the environmental setting of a project site. The qualified surveyor will 1.) identify and document sensitive resources, such as riparian or other sensitive habitats, sensitive natural community, wetlands, or wildlife nursery site or habitat (including bird nests), and 2.) assess the suitability of habitat for special-status plant and animal species. The surveyor will also record any incidental wildlife observations. For each treatment project, habitat assessments will be completed at a time of year that is appropriate for identifying habitat and no more than one year prior to the submittal of the PSA, unless it can be demonstrated in the Biological Resources Discussion in the PSA that habitat assessments older than one year remain valid (e.g., site conditions are unchanged and no treatment activity has occurred since the assessment). If more than one year passes between completion of the PSA and initiation of the treatment project, the project proponent will verify the continued accuracy of the PSA prior to beginning the treatment project by reviewing for any data updates and/or visiting the site to verify conditions. Based on the results of the data review and reconnaissance-level survey, the project proponent, in consultation with a qualified RPF or biologist, will determine which one of the following best characterizes the treatment:

- 1. Suitable Habitat Is Present but Adverse Effects Can Be Clearly Avoided. If, based on the data review and reconnaissance-level survey, the qualified RPF or biologist determines that suitable habitat for sensitive biological resources is present but adverse effects on the suitable habitat can clearly be avoided through one of the following methods, the avoidance mechanism will be implemented prior to initiating treatment and will remain in effect throughout the treatment:
 - a. by physically avoiding the suitable habitat, or
 - b. by conducting treatment outside of the season when a sensitive resource could be present within the suitable habitat or outside the season of sensitivity (e.g., outside of special-status bird nesting season, during dormant season of sensitive annual or geophytic plant species, or outside of maternity and rearing season at wildlife nursery sites).

Physical avoidance will include flagging, fencing, stakes, or clear, existing landscape demarcations (e.g., edge of a roadway) to delineate the boundary of the avoidance area around the suitable habitat. For physical avoidance, a buffer may be implemented as determined necessary by the qualified RPF or biologist.

2. Suitable Habitat is Present and Adverse Effects Cannot Be Clearly Avoided. Further review and surveys will be conducted to determine presence/absence of sensitive biological resources that may be affected, as described in the SPRs below. Further review may include contacting USFWS, NOAA Fisheries, CDFW, CNPS, or local resource agencies as necessary to determine the potential for special-status species or other sensitive biological resources to be affected by the treatment activity. Focused or protocol-level surveys will be conducted as necessary to determine presence/absence. If protocol surveys are conducted,

survey procedures will adhere to methodologies approved by resource agencies and the scientific community, such as those that are available on the CDFW webpage at: https://www.wildlife.ca.gov/Conservation/Survey-Protocols. Specific survey requirements are addressed for each resource type in relevant SPRs (e.g., additional survey requirements are presented for special-status plants in SPR BIO-7).

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

SPR BIO-2: Require Biological Resource Training for Workers. The project proponent will require crew members and contractors to receive training from a qualified RPF or biologist prior to beginning a treatment project. The training will describe the appropriate work practices necessary to effectively implement the biological SPRs and mitigation measures and to comply with the applicable environmental laws and regulations. The training will include the identification, relevant life history information, and avoidance of pertinent special-status species; identification and avoidance of sensitive natural communities and habitats with the potential to occur in the treatment area; impact minimization procedures; and reporting requirements. The training will instruct workers when it is appropriate to stop work and allow wildlife encountered during treatment activities to leave the area unharmed and when it is necessary to report encounters to a qualified RPF, biologist, or biological technician. The qualified RPF, biologist, or biological technician will immediately contact CDFW or USFWS, as appropriate, if any wildlife protected by the California Endangered Species Act (CESA) or Federal Endangered Species Act (ESA) is encountered and cannot leave the site on its own (without being handled). This SPR applies to all treatment activities and treatment types, including treatment maintenance.

SENSITIVE NATURAL COMMUNITIES AND OTHER SENSITIVE HABITATS

SPR BIO-3: Survey Sensitive Natural Communities and Other Sensitive Habitats. If SPR BIO-1 determines that sensitive natural communities or sensitive habitats may be present and adverse effects cannot be avoided, the project proponent will:

- ▶ require a qualified RPF or biologist to perform a protocol-level survey following the CDFW "Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities" (current version dated March 20, 2018) of the treatment area prior to the start of treatment activities for sensitive natural communities and sensitive habitats. Sensitive natural communities will be identified using the best means possible, including keying them out using the most current edition of *A Manual of California Vegetation* (including updated natural communities data at http://vegetation.cnps.org/), or referring to relevant reports (e.g., reports found on the VegCAMP website).
- ▶ map and digitally record, using a Global Positioning System (GPS), the limits of any potential sensitive habitat and sensitive natural community identified in the treatment area.

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

SPR BIO-4: Design Treatment to Avoid Loss or Degradation of Riparian Habitat Function.

Project proponents, in consultation with a qualified RPF or qualified biologist, will design treatments in riparian habitats to retain or improve habitat functions by implementing the following within riparian habitats:

- ▶ Retain at least 75 percent of the overstory and 50 percent of the understory canopy of native riparian vegetation within the limits of riparian habitat identified and mapped during surveys conducted pursuant to SPR BIO-3. Native riparian vegetation will be retained in a well distributed multi-storied stand composed of a diversity of species similar to that found before the start of treatment activities.
- ► Treatments will be limited to removal of uncharacteristic fuel loads (e.g., removing dead or dying vegetation), trimming/limbing of woody species as necessary to reduce ladder fuels, and select thinning of vegetation to restore densities that are characteristic of healthy stands of the riparian vegetation types characteristic of the region. This includes hand removal (or mechanized removal where topography allows) of dead or dying riparian trees and shrubs, invasive plant removal, selective thinning, and removal of encroaching upland species.
- Removal of large, native riparian hardwood trees (e.g., willow, ash, maple, oak, alder, sycamore, cottonwood) will be minimized to the extent feasible and 75 percent of the pretreatment native riparian hardwood tree canopy will be retained. Because tree size varies depending on vegetation type present and site conditions, the tree size retention parameter will be determined on a site-specific basis depending on vegetation type present and setting; however, live, healthy, native trees that are considered large for that type of tree and large relative to other trees in that location will be retained. A scientifically-based, project-specific explanation substantiating the retention size parameter for native riparian hardwood tree removal will be provided in the Biological Resources Discussion of the PSA. Consideration of factors such as site hydrology, erosion potential, suitability of wildlife habitat, presence of sufficient seed trees, light availability, and changes in stream shading may inform the tree size retention requirements.
- ▶ Removed trees will be felled away from adjacent streams or waterbodies and piled outside of the riparian vegetation zone (unless there is an ecological reason to do otherwise that is approved by applicable regulatory agencies, such as adding large woody material to a stream to enhance fish habitat, e.g., see *Accelerated Wood Recruitment and Timber Operations: Process Guidance from the California Timber Harvest Review Team Agencies and National Marine Fisheries Service*).
- Vegetation removal that could reduce stream shading and increase stream temperatures will be avoided.
- ► Ground disturbance within riparian habitats will be limited to the minimum necessary to implement effective treatments. This will consist of the minimum disturbance area necessary to reduce hazardous fuels and return the riparian community to a natural fire regime (i.e., Condition Class 1) considering historic fire return intervals, climate change, and land use constraints.
- ▶ Only hand application of herbicides approved for use in aquatic environments_will be allowed and only during low-flow periods or when seasonal streams are dry.
- The project proponent will notify CDFW when required by California Fish and Game Code Section 1602 prior to implementing any treatment activities in riparian habitats. Notification will identify the treatment activities, map the vegetation to be removed, identify the impact avoidance identification methods to be used (e.g., flagging), and appropriate protections for the retention of shaded riverine habitat, including buffers and other applicable measures to prevent erosion into the waterway.
- ► In consideration of spatial variability of riparian vegetation types and condition and consistent with California Forest Practice Rules Section 916.9(v) (February 2019

version), a different set of vegetation retention standards and protection measures from those specified in the above bullets may be implemented on a site-specific basis if the qualified RPF and the project proponent demonstrate through substantial evidence that alternative design measures provide a more effective means of achieving the treatment objectives and would result in effects to the Beneficial Functions of Riparian Zones equal or more favorable than those expected to result from application of the above measures. Deviation from the above design specifications, different protection measures and design standards will only be approved when the treatment plan incorporates an evaluation of beneficial functions of the riparian habitat and with written concurrence from CDFW.

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

SPR BIO-5: **Avoid Environmental Effects of Type Conversion and Maintain Habitat Function in Chaparral and Coastal Sage Scrub.** The project proponent will design treatment activities to avoid type conversion where native coastal sage scrub and chaparral are present. An ecological definition of type conversion is used in the CalVTP PEIR for assessment of environmental effects: a change from a vegetation type dominated by native shrub species that are characteristic of chaparral and coastal sage scrub vegetation alliances to a vegetation type characterized predominantly by weedy herbaceous cover or annual grasslands. For the PEIR, type conversion is considered in terms of habitat function, which is defined here as the arrangement and capability of habitat features to provide refuge, food source, and reproduction habitat to plants and animals, and thereby contribute to the conservation of biological and genetic diversity and evolutionary processes (de Groot et al. 2002). Some modification of habitat characteristics may occur provided habitat function is maintained (i.e., the location, essential habitat features, and species supported are not substantially changed).

During the reconnaissance-level survey required in SPR BIO-1, a qualified RPF or biologist will identify chaparral and coastal sage scrub vegetation to the alliance level and determine the condition class and fire return interval departure of the chaparral and/or coastal sage scrub present in each treatment area.

For all treatment types in chaparral and coastal sage scrub, the project proponent, in consultation with a qualified RPF or qualified biologist will:

- ▶ Develop a treatment design that avoids environmental effects of type conversion in chaparral and coastal sage scrub vegetation alliances, which will include evaluating and determining the appropriate spatial scale at which the proponent would consider type conversion, and substantiating its appropriateness. The project proponent will demonstrate with substantial evidence that the habitat function of chaparral and coastal sage scrub would be at least maintained within the identified spatial scale at which type conversion is evaluated for the specific treatment project. Consideration of factors such as site hydrology, erosion potential, suitability of wildlife habitat, spatial needs of sensitive species, presence of sufficient seed plants and nurse plants, light availability, and edge effects may inform the determination of an appropriate spatial scale.
- ▶ The treatment design will maintain a minimum percent cover of mature native shrubs within the treatment area to maintain habitat function; the appropriate percent cover will be identified by the project proponent in the development of treatment design and be specific to the vegetation alliances that are present in the identified spatial scale used to evaluate type conversion. Mature native shrubs that are retained will be distributed contiguously or in patches within the stand. If the stand consists of multiple age classes,

patches representing a range of middle to old age classes will be retained to maintain and improve heterogeneity, to the extent needed to avoid type conversion.

These SPR requirements apply to all treatment activities and all treatment types, including treatment maintenance.

Additional measures will be applied to ecological restoration treatment types:

- ► For ecological restoration treatment types, complete removal of the mature shrub layer will not occur in native chaparral and coastal sage scrub vegetation types.
- ▶ Ecological restoration treatments will not be implemented in vegetation types that are within their natural fire return interval (i.e., time since last burn is less than the average time listed as the fire return interval range in Table 3.6-1) unless the project proponent demonstrates with substantial evidence that the habitat function of chaparral and coastal sage scrub would be improved.
- ▶ A minimum of 35 percent relative cover of existing shrubs and associated native vegetation will be retained at existing densities in patches distributed in a mosaic pattern within the treated area or the shrub canopy will be thinned by no more than 20 percent from baseline density (i.e., if baseline shrub canopy density is 60 percent, post treatment shrub canopy density will be no less than 40 percent). A different percent relative cover can be retained if the project proponent demonstrates with substantial evidence that alternative treatment design measures would result in effects on the habitat function of chaparral and coastal sage scrub that are equal or more favorable than those expected to result from application of the above measures. Biological considerations that may inform a deviation from the minimum 35 percent relative cover retention include but are not limited to soil moisture requirements, increased soil temperatures, changes in light/shading, presence of sufficient seed plants and nurse plants, erosion potential, and site hydrology.
- ▶ If the stand within the treatment area consists of multiple age classes, patches representing a range of middle to old age classes will be retained to maintain and improve heterogeneity.

These SPR requirements apply to all treatment activities and only the ecosystem restoration treatment type, including treatment maintenance.

A determination of compliance with the SB 1260 prohibition of type conversion in chaparral and coastal sage scrub is a statutory issue separate from CEQA compliance that may involve factors additional to the ecological definition and habitat functions presented in the PEIR, such as geographic context. It is beyond the legal scope of the PEIR to define SB 1260 type conversion and statutory compliance. The project proponent, acting as lead agency for the proposed later treatment project, will be responsible for defining type conversion in the context of the project and making the finding that type conversion would not occur, as required by SB 1260. The project proponent will determine its criteria for defining and avoiding type conversion and, in making its findings, may draw upon information presented in this PEIR.

SPR BIO-6: Prevent Spread of Plant Pathogens. When working in sensitive natural communities, riparian habitats, or oak woodlands that are at risk from plant pathogens (e.g., Ione chaparral, blue oak woodland), the project proponent will implement the following best management practices to prevent the spread of *Phytopthora* and other plant pathogens (e.g., pitch canker (*Fusarium*), goldspotted oak borer, shot hole borer, bark beetle):

- ▶ clean and sanitize vehicles, equipment, tools, footwear, and clothes before arriving at a treatment site and when leaving a contaminated site, or a site in a county where contamination is a risk;
- include training on *Phytopthora* diseases and other plant pathogens in the worker awareness training;
- ▶ minimize soil disturbance as much as possible by limiting the number of vehicles, avoiding off-road travel as much as possible, and limiting use of mechanized equipment;
- minimize movement of soil and plant material within the site, especially between areas with high and low risk of contamination;
- ▶ clean soil and debris from equipment and sanitize hand tools, buckets, gloves, and footwear when moving from high risk to low risk areas or between widely separated portions of a treatment area; and
- ▶ follow the procedures listed in Guidance for plant pathogen prevention when working at contaminated restoration sites or with rare plants and sensitive habitat (Working Group for *Phytoptheras* in Native Habitats 2016).

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

SPECIAL-STATUS PLANTS

SPR BIO-7: Survey for Special-Status Plants. If SPR BIO-1 determines that suitable habitat for special-status plant species is present and cannot be avoided, the project proponent will require a qualified RPF or botanist to conduct protocol-level surveys for special-status plant species with the potential to be affected by a treatment prior to initiation of the treatment. The survey will follow the methods in the current version of CDFW's "Protocols for Surveying and Evaluating Impacts to Special Status Native Plant Populations and Sensitive Natural Communities."

Surveys to determine the presence or absence of special-status plant species will be conducted in suitable habitat that could be affected by the treatment and timed to coincide with the blooming or other appropriate phenological period of the target species (as determined by a qualified RPF or botanist), or all species in the same genus as the target species will be assumed to be special-status.

If potentially occurring special-status plants are listed under CESA or ESA, protocol-level surveys to determine presence/absence of the listed species will be conducted in all circumstances, unless determined otherwise by CDFW or USFWS.

For other special-status plants not listed under CESA or ESA, as defined in Section 3.6.1 of this PEIR, surveys will not be required under the following circumstances:

- ▶ If protocol-level surveys, consisting of at least two survey visits (e.g., early blooming season and later blooming season) during a normal weather year, have been completed in the 5 years before implementation of the treatment project and no special-status plants were found, and no treatment activity has occurred following the protocol-level survey, treatment may proceed without additional plant surveys.
- ▶ If the target special-status plant species is an herbaceous annual, stump-sprouting, or geophyte species, the treatment may be carried out during the dormant season for that species or when the species has completed its annual lifecycle without conducting

presence/absence surveys provided the treatment will not alter habitat or destroy seeds, stumps, or roots, rhizomes, bulbs and other underground parts in a way that would make it unsuitable for the target species to reestablish following treatment.

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

ENVIRONMENTALLY SENSITIVE HABITAT AREAS

SPR BIO-8: Identify and Avoid or Minimize Impacts in Coastal Zone ESHAs. When planning a treatment project within the Coastal Zone, the project proponent will, in consultation with the Coastal Commission or a local government with a certified Local Coastal Program (LCP) (as applicable), identify the habitat types and species present to determine if the area qualifies as an Environmentally Sensitive Habitat Area (ESHA). If the area is an ESHA, the treatment project may be allowed pursuant to this PEIR, if it meets the following conditions. If a project requires a CDP by the Coastal Commission or a local government with a certified LCP (as applicable), the CDP approval may require modification to these conditions to further avoid and minimize impacts:

- ► The treatment will be designed, in compliance with the Coastal Act or LCP if a site is within a certified LCP area, to protect the habitat function of the affected ESHA, protect habitat values, and prevent loss or type conversion of habitat and vegetation types that define the ESHA, or loss of special-status species that inhabit the ESHA.
- ► Treatment actions will be limited to eradication or control of invasive plants, removal of uncharacteristic fuel loads (e.g., removing dead, diseased, or dying vegetation), trimming/limbing of woody species as necessary to reduce ladder fuels, and select thinning of vegetation to restore densities that are characteristic of healthy stands of the vegetation types present in the ESHA.
- ► A qualified biologist or RPF familiar with the ecology of the treatment area will monitor all treatment activities in ESHAs.
- ▶ Appropriate no-disturbance buffers will be developed in compliance with the Coastal Act or relevant LCP policies for treatment activities in the vicinity of ESHAs to avoid adverse direct and indirect effects to ESHAs.

This SPR applies to all treatment activities and all treatment types, including treatment maintenance.

INVASIVE PLANTS AND WILDLIFE

SPR BIO-9: Prevent Spread of Invasive Plants, Noxious Weeds, and Invasive Wildlife. The project proponent will take the following actions to prevent the spread of invasive plants, noxious weeds, and invasive wildlife (e.g., New Zealand mudsnail):

- ▶ clean clothing, footwear, and equipment used during treatments of soil, seeds, vegetative matter, other debris or seed-bearing material, or water (e.g., rivers, streams, creeks, lakes) before entering the treatment area or when leaving an area with infestations of invasive plants, noxious weeds, or invasive wildlife;
- ▶ for all heavy equipment and vehicles traveling off road, pressure wash, if feasible, or otherwise appropriately decontaminate equipment at a designated weed-cleaning station prior to entering the treatment area from an area with infestations of invasive plants.

- noxious weeds, or invasive wildlife. Anti-fungal wash agents will be specified if the equipment has been exposed to any pathogen that could affect native species;
- ▶ inspect all heavy equipment, vehicles, tools, or other treatment-related materials for sand, mud, or other signs that weed seeds or propagules could be present prior to use in the treatment area. If the equipment is not clean, the qualified RPF or biological technician will deny entry to the work areas;
- stage equipment in areas free of invasive plant infestations unless there are no uninfested areas present within a reasonable proximity to the treatment area;
- ▶ identify significant infestations of invasive plant species (i.e., those rated as invasive by Cal-IPC or designated as noxious weeds by California Department of Food and Agriculture) during reconnaissance-level surveys and target them for removal during treatment activities. Treatment methods will be selected based on the invasive species present and may include herbicide application, manual or mechanical treatments, prescribed burning, and/or herbivory, and will be designed to maximize success in killing or removing the invasive plants and preventing reestablishment based on the life history characteristics of the invasive plant species present. Treatments will be focused on removing invasive plant species that cause ecological harm to native vegetation types, especially those that can alter fire cycles;
- ► treat invasive plant biomass onsite to eliminate seeds and propagules and prevent reestablishment or dispose of invasive plant biomass offsite at an appropriate waste collection facility (if not kept on site); transport invasive plant materials in a closed container or bag to prevent the spread of propagules during transport; and
- ▶ implement Fire and Fuel Management BMPs outlined in the "Preventing the Spread of Invasive Plants: Best Management Practices for Land Mangers" (Cal-IPC 2012, or current version).

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

WILDLIFE

SPR BIO-10: Survey for Special-Status Wildlife and Nursery Sites. If SPR BIO-1 determines that suitable habitat for special-status wildlife species or nurseries of any wildlife species is present and cannot be avoided, the project proponent will require a qualified RPF or biologist to conduct focused or protocol-level surveys for special-status wildlife species or nursery sites (e.g., bat maternity roosts, deer fawning areas, heron or egret rookeries, monarch overwintering sites) with potential to be directly or indirectly affected by a treatment activity. The survey area will be determined by a qualified RPF or biologist based on the species and habitats and any recommended buffer distances in agency protocols.

The qualified RPF or biologist will determine if following an established protocol is required, and the project proponent may consult with CDFW and/or USFWS for technical information regarding appropriate survey protocols. Unless otherwise specified in a protocol, the survey will be conducted no more than 14 days prior to the beginning of treatment activities. Focused or protocol surveys for a special-status species with potential to occur in the treatment area may not be required if presence of the species is assumed.

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

- **SPR BIO-11. Install Wildlife-Friendly Fencing (Prescribed Herbivory).** If temporary fencing is required for prescribed herbivory treatment, a wildlife-friendly fencing design will be used. The project proponent will require a qualified RPF or biologist to review and approve the design before installation to minimize the risk of wildlife entanglement. The fencing design will meet the following standards:
 - ▶ Minimize the chance of wildlife entanglement by avoiding barbed wire, loose or broken wires, or any material that could impale or snag a leaping animal; and, if feasible, keeping electric netting-type fencing electrified at all times or laid down while not in use.
 - ► Charge temporary electric fencing with intermittent pulse energizers; continuous output fence chargers will not be permitted.
 - Allow wildlife to jump over easily without injury by installing fencing that can flex as animals pass over it and installing the top wire low enough (no more than approximately 40 inches high on flat ground) to allow adult ungulates to jump over it. The determination of appropriate fence height will consider slope, as steep slopes are more difficult for wildlife to pass.
 - ▶ Be highly visible to birds and mammals by using high-visibility tape or wire, flagging, or other markers.

This SPR applies only to prescribed herbivory and all treatment types, including treatment maintenance.

SPR BIO-12. Protect Common Nesting Birds, Including Raptors. The project proponent will schedule treatment activities to avoid the active nesting season of common native bird species, including raptors, that could be present within or adjacent to the treatment site, if feasible. Common native birds are species not otherwise treated as special status in the CalVTP PEIR. The active nesting season will be defined by the qualified RPF or biologist.

If active nesting season avoidance is not feasible, a qualified RPF or biologist will conduct a survey for common nesting birds, including raptors. Existing records (e.g., CNDDB, eBird database, State Wildlife Action Plan) should be reviewed in advance of the survey to identity the common nesting birds, including raptors, that are known to occur in the vicinity of the treatment site. The survey area will encompass reasonably accessible areas of the treatment site and the immediately surrounding vicinity viewable from the treatment site. The survey area will be determined by a qualified RPF or biologist, based on the potential species in the area, location of suitable nesting habitat, and type of treatment. For vegetation removal or project activities that would occur during the nesting season, the survey will be conducted at a time that balances the effectiveness of detecting nests and the reasonable consideration of potential avoidance strategies. Typically, this timeframe would be up to 3 weeks before treatment. The survey will occur in a single survey period of sufficient duration to reasonably detect nesting birds, including raptors, typically one day for most treatment projects (depending on the size, configuration, and vegetation density in the treatment site), and conducted during the active time of day for target species, typically close to dawn and/or dusk. The survey may be conducted concurrently with other biological surveys, if they are required by other SPRs. Survey methods will be tailored by the qualified RPF or biologist to site and habitat conditions, typically involving walking throughout the survey area, visually searching for nests and birds exhibiting behavior that is typical of breeding (e.g., delivering food).

If an active nest is observed (i.e., presence of eggs and/or chicks) or determined to likely be present based on nesting bird behavior, the project proponent will implement a feasible

strategy to avoid disturbance of active nests, which may include, but is not limited to, one or more of the following measures:

- ▶ Establish Buffer. The project proponent will establish a temporary, species-appropriate buffer around the nest sufficient to reasonably expect that breeding would not be disrupted. Treatment activities will be implemented outside of the buffer. The buffer location will be determined by a qualified RPF or biologist. Factors to be considered for determining buffer location will include: presence of natural buffers provided by vegetation or topography, nest height above ground, baseline levels of noise and human activity, species sensitivity, and expected treatment activities. Nests of common birds within the buffer need not be monitored during treatment. However, buffers will be maintained until young fledge or the nest becomes inactive, as determined by the qualified RPF, biologist, or biological technician.
- ▶ Modify Treatment. The project proponent will modify the treatment in the vicinity of an active nest to avoid disturbance of active nests (e.g., by implementing manual treatment methods, rather than mechanical treatment methods). Treatment modifications will be determined by the project proponent in coordination with the qualified RPF or biologist.
- ▶ **Defer Treatment.** The project proponent will defer the timing of treatment in the portion(s) of the treatment site that could disturb the active nest. If this avoidance strategy is implemented, treatment activity will not commence until young fledge or the nest becomes inactive, as determined by the qualified RPF, biologist, or biological technician.

Feasible actions will be taken by the project proponent to avoid loss of common native bird nests. The feasibility of implementing the avoidance strategies will be determined by the project proponent based on whether implementation of this SPR will preclude completing the treatment project within the reasonable period of time necessary to meet CalVTP program objectives, including, but not limited to, protection of vulnerable communities. Considerations may include limitations on the presence of environmental and atmospheric conditions necessary to execute treatment prescriptions (e.g., the limited seasonal windows during which prescribed burning can occur when vegetation moisture, weather, wind, and other physical conditions are suitable). If it is infeasible to avoid loss of common bird nests (not including raptor nests), the project proponent will document the reasons implementation of the avoidance strategies is infeasible in the PSA. After completion of the PSA and prior to or during treatment implementation, if there is any change in the feasibility of avoidance strategies from those explained in the PSA, this will be documented in the post-project implementation report (referred to by CAL FIRE as a Completion Report).

The following avoidance strategies may also be considered together with or in lieu of other actions for implementation by a project proponent to avoid disturbance to raptor nests:

- ▶ Monitor Active Raptor Nest During Treatment. A qualified RPF, biologist, or biological technician will monitor an active raptor nest during treatment activities to identify signs of agitation, nest defense, or other behaviors that signal disturbance of the active nest is likely (e.g., standing up from a brooding position, flying off the nest). If breeding raptors are showing signs of nest disturbance, one of the other avoidance strategies (establish buffer, modify treatment or defer treatment) will be implemented or a pause in the treatment activity will occur until the disturbance behavior ceases.
- ▶ Retention of Raptor Nest Trees. Trees with visible raptor nests, whether occupied or not, will be retained.

This SPR applies to all treatment activities and treatment types, including treatment maintenance.

Hazards Database Search Results

May 2023 Stillwater Sciences

SITES IDENTIFIED WITH WASTE CONSTITUENTS ABOVE HAZARDOUS WASTE LEVELS OUTSIDE THE WASTE MANAGEMENT UNIT

| | | REGION | SWAT | WASTE | SOLID | | | |
|---------------|-------------------------|--------|------|-----------------------|-----------------|---------------------------------------|----------------------------------|--------------------------------|
| COUNTY | CITY | | | DINCHARGER SYSTEM NO. | WASTE ID NO. | WASTE MANAGEMENT UNIT NAME | FACILITY NAME | AGENCY NAME |
| DEL NORTE | CRESCENT CITY | 1 | 2 | 1A880520NSL-01 | | DEL NORTE COUNTY-PESTICIDE STORAGE | DEL NORTE PESTICIDE STORAGE AR | DEL NORTE, COUNTY OF |
| CONTRA COSTA | PITTSBURG | 2 | - 1 | 2 071059002-02 | 07-A1-0001 | U.S. STEEL CORPPITTSBURG SITE LA | WDR-USS-POSCO | USS-POSCO |
| OLANO | VALLEJO | 2 | 1 | 2 482011003-01 | 48-AA-0008 | US NAVY MARE ISLAND SANITARY LANDFILL | WDR-NAVAL SHIPYARD/CLASS I LAN | MARE ISLAND NAVAL SHIPYARD |
| CONTRA COSTA | RICHMOND | 2 | 3 | 2 071007002-01 | | CHEVRON CHEMICAL COMPANY-OLD SITES | WDR-ORTHO DIV-RICHMOND PLANT | CHEVRON CHEMICAL COMPANY |
| MONTEREY | FORT ORD (Marina) | 3 | 1 | 3 270301004-01 | 27-AA-0015 | FORT ORD LANDFILL | SANITARY LANDFILL | U.S. ARMY, FORT ORD |
| SANTA BARBARA | LOMPOC | 3 | 3 | 3 420305001-01 | 42-AA-0017 | LOMPOC CITY LANDFILL | SOLID WASTE DISPOSAL SITE | LOMPOC CITY |
| LOS ANGELES | MONTEREY PARK | -4 | 1 | 4B 190332001-01 | 19-AM-0001 | OPERATING INDUSTRIES LANDFILL | OPERATING INDUSTRIES, INC. | OPERATING INDUSTRIES, INC. |
| ULARE | WOODLAKE | 5F | 1 | 5D540300010-01 | 54-AA-0007 | TULARE COUNTY-WOODLAKE LANDFILL | WOODLAKE SWDS | TULARE, COUNTY OF |
| RESNO | FRESNO | 5F | 2 | 5D 10030000 1-01 | | MCKINLEY AVE. YARD | T.H. AGRICULTURE AND NUTRITION | NORTH AMERICAN PHILLIPS |
| INGS | CORCORAN | 5F | 2 | 5D160302001-01 | 16-AA-0011 | KINGS COUNTY-CORCORAN LANDFILL | CORCORAN SWDS | KINGS COUNTY WASTE MGMT AUTH. |
| RESNO | FRESNO | 5F | 3 | 5D100319001-01 | 10-AA-0013 | ORANGE AVENUE DISPOSAL COMPANY | ORANGE AVENUE LANDFILL | ORANGE AVENUE DISP CO. INC |
| ULARE | EXETER | 5F | 3 | 5D540300003-01 | 54-AA-0002 | TULARE COUNTY-EXETER DISPOSAL SITE | EXETER SWDS | TULARE, COUNTY OF |
| MERCED | ATWATER | 5F | 4 | 5C240115001-01 | | ATWATER CITY | BERT CRANE ROAD LANDFILL | ATWATER, CITY OF |
| RESNO | FOWLER | 5F | 5 | 5D 100325N01-01 | | FOWLER CITY | FOWLER CITY LANDFILL (OLD) | FOWLER, CITY OF |
| UTTE | OROVILLE | 5R | 2 | 5A042005001-01 | | KOPPERS COMPANY-OROVILLE SITE | KOPPERS WOOD PRESERVING ISW | KOPPERS INDUSTRIES INC. |
| UTTE | CHICO | 5R | 4 | 5A040302N01-01 | İ | CHICO CITY BURN DUMP | HUMBOLDT ROAD LANDFILL | CHICO, CITY OF |
| ACRAMENTO | SACRAMENTO | 5S | 1 | 5A340700003-01 | 34-AA-0008 | US AIR FORCE-MCCLELLAN AFB LANDFILL | CLASS III SITE 8 (CLOSURE) | US AIR FORCE-MCCLELLAN AFB |
| ACRAMENTO | MATHER (Rancho Cordova) | 5S | 2 | 5A340700001-01 | ľ | US AIR FORCE-MATHER FIELD LANDFILL | MATHER AFB ENVIRONMENTAL MGMT | US AIR FORCE – MATHER AFB |
| ACRAMENTO | SACRAMENTO | 5S | 3 | 5B342000N01-01 | | SACRAMENTO ARMY DEPOT | SACRAMENTO ARMY DEPOT | U.S. ARMY |
| SAN JOAQUIN | STOCKTON | 5S | 3 | 5 390002NUR-01 | 39-AA-0006 | US NAVY COMMUNICATIONS LANDFILL | U.S.N. COMMUNICATION STA. LANDF | U.S. NAVY COMMUNICATIONS |
| AN JOAQUIN | FRENCH CAMP | 5S | 3 | 5 390003NUR-01 | | US ARMY-SHARPE ARMY DEPOT | US ARMY-SHARPE ARMY DEPOT | US ARMY |
| AN JOAQUIN | TRACY | 5S | 5 | 5 390006NUR-01 | | SITE 300 (OTHER 39 WMUS) | LAWRENCE LIVERMORE LAB | LAWRENCE LIVERMORE LABS |
| ИЛО | KEELER | 6V | 1 | 6B142000041-01 | 14-AA-0008 | US TUNGSTEN OWENS LAKE LANDFILL | OWENS LAKE LANDFILL | UMETCO MINERALS CORPORATION |
| DRANGE | FULLERTON | 8 | 1 | 8300002NUR-01 | | MCCOLL SITE | MCCOLL SLUDGE DISPOSAL SITE | TOXIC SUBSTANCES CONTROL DIVIS |
| RIVERSIDE | RIVERSIDE | 8 | 1 | 8 330325001-01 | 1 | STRINGFELLOW QUARRY ACID PITS | STATE OF CALIFORNIA-STRINGFELLOW | TOXIC PROGRAM MANAGEMENT SECT |

